

BIRTH CONTROL

A MEDICAL DICTIONARY, BIBLIOGRAPHY,
AND ANNOTATED RESEARCH GUIDE TO
INTERNET REFERENCES



JAMES N. PARKER, M.D.
AND PHILIP M. PARKER, PH.D., EDITORS

Miss Page

ICON Health Publications
ICON Group International, Inc.
4370 La Jolla Village Drive, 4th Floor
San Diego, CA 92122 USA

Copyright ©2003 by ICON Group International, Inc.

Copyright ©2003 by ICON Group International, Inc. All rights reserved. This book is protected by copyright. No part of it may be reproduced, stored in a retrieval system, or transmitted in any form or by any means, electronic, mechanical, photocopying, recording, or otherwise, without written permission from the publisher.

Printed in the United States of America.

Last digit indicates print number: 10 9 8 7 6 4 5 3 2 1

Publisher, Health Care: Philip Parker, Ph.D.
Editor(s): James Parker, M.D., Philip Parker, Ph.D.

Publisher's note: The ideas, procedures, and suggestions contained in this book are not intended for the diagnosis or treatment of a health problem. As new medical or scientific information becomes available from academic and clinical research, recommended treatments and drug therapies may undergo changes. The authors, editors, and publisher have attempted to make the information in this book up to date and accurate in accord with accepted standards at the time of publication. The authors, editors, and publisher are not responsible for errors or omissions or for consequences from application of the book, and make no warranty, expressed or implied, in regard to the contents of this book. Any practice described in this book should be applied by the reader in accordance with professional standards of care used in regard to the unique circumstances that may apply in each situation. The reader is advised to always check product information (package inserts) for changes and new information regarding dosage and contraindications before prescribing any drug or pharmacological product. Caution is especially urged when using new or infrequently ordered drugs, herbal remedies, vitamins and supplements, alternative therapies, complementary therapies and medicines, and integrative medical treatments.

Cataloging-in-Publication Data

Parker, James N., 1961-
Parker, Philip M., 1960-

Birth Control: A Medical Dictionary, Bibliography, and Annotated Research Guide to Internet References / James N. Parker and Philip M. Parker, editors

p. cm.

Includes bibliographical references, glossary, and index.

ISBN: 0-597-83566-7

1. Birth Control-Popular works. I. Title.

Disclaimer

This publication is not intended to be used for the diagnosis or treatment of a health problem. It is sold with the understanding that the publisher, editors, and authors are not engaging in the rendering of medical, psychological, financial, legal, or other professional services.

References to any entity, product, service, or source of information that may be contained in this publication should not be considered an endorsement, either direct or implied, by the publisher, editors, or authors. ICON Group International, Inc., the editors, and the authors are not responsible for the content of any Web pages or publications referenced in this publication.

Copyright Notice

If a physician wishes to copy limited passages from this book for patient use, this right is automatically granted without written permission from ICON Group International, Inc. (ICON Group). However, all of ICON Group publications have copyrights. With exception to the above, copying our publications in whole or in part, for whatever reason, is a violation of copyright laws and can lead to penalties and fines. Should you want to copy tables, graphs, or other materials, please contact us to request permission (E-mail: iconedit@san.rr.com). ICON Group often grants permission for very limited reproduction of our publications for internal use, press releases, and academic research. Such reproduction requires confirmed permission from ICON Group International Inc. **The disclaimer above must accompany all reproductions, in whole or in part, of this book.**

Acknowledgements

The collective knowledge generated from academic and applied research summarized in various references has been critical in the creation of this book which is best viewed as a comprehensive compilation and collection of information prepared by various official agencies which produce publications on birth control. Books in this series draw from various agencies and institutions associated with the United States Department of Health and Human Services, and in particular, the Office of the Secretary of Health and Human Services (OS), the Administration for Children and Families (ACF), the Administration on Aging (AOA), the Agency for Healthcare Research and Quality (AHRQ), the Agency for Toxic Substances and Disease Registry (ATSDR), the Centers for Disease Control and Prevention (CDC), the Food and Drug Administration (FDA), the Healthcare Financing Administration (HCFA), the Health Resources and Services Administration (HRSA), the Indian Health Service (IHS), the institutions of the National Institutes of Health (NIH), the Program Support Center (PSC), and the Substance Abuse and Mental Health Services Administration (SAMHSA). In addition to these sources, information gathered from the National Library of Medicine, the United States Patent Office, the European Union, and their related organizations has been invaluable in the creation of this book. Some of the work represented was financially supported by the Research and Development Committee at INSEAD. This support is gratefully acknowledged. Finally, special thanks are owed to Tiffany Freeman for her excellent editorial support.

About the Editors

James N. Parker, M.D.

Dr. James N. Parker received his Bachelor of Science degree in Psychobiology from the University of California, Riverside and his M.D. from the University of California, San Diego. In addition to authoring numerous research publications, he has lectured at various academic institutions. Dr. Parker is the medical editor for health books by ICON Health Publications.

Philip M. Parker, Ph.D.

Philip M. Parker is the Eli Lilly Chair Professor of Innovation, Business and Society at INSEAD (Fontainebleau, France and Singapore). Dr. Parker has also been Professor at the University of California, San Diego and has taught courses at Harvard University, the Hong Kong University of Science and Technology, the Massachusetts Institute of Technology, Stanford University, and UCLA. Dr. Parker is the associate editor for ICON Health Publications.

About ICON Health Publications

To discover more about ICON Health Publications, simply check with your preferred online booksellers, including Barnes & Noble.com and Amazon.com which currently carry all of our titles. Or, feel free to contact us directly for bulk purchases or institutional discounts:

ICON Group International, Inc.
4370 La Jolla Village Drive, Fourth Floor
San Diego, CA 92122 USA
Fax: 858-546-4341
Web site: www.icongrouponline.com/health

Table of Contents

FORWARD.....	1
CHAPTER 1. STUDIES ON BIRTH CONTROL.....	3
<i>Overview</i>	3
<i>The Combined Health Information Database</i>	3
<i>Federally Funded Research on Birth Control</i>	7
<i>E-Journals: PubMed Central</i>	8
<i>The National Library of Medicine: PubMed</i>	9
CHAPTER 2. NUTRITION AND BIRTH CONTROL.....	47
<i>Overview</i>	47
<i>Finding Nutrition Studies on Birth Control</i>	47
<i>Federal Resources on Nutrition</i>	48
<i>Additional Web Resources</i>	48
CHAPTER 3. ALTERNATIVE MEDICINE AND BIRTH CONTROL.....	53
<i>Overview</i>	53
<i>National Center for Complementary and Alternative Medicine</i>	53
<i>Additional Web Resources</i>	57
<i>General References</i>	66
CHAPTER 4. DISSERTATIONS ON BIRTH CONTROL	67
<i>Overview</i>	67
<i>Dissertations on Birth Control</i>	67
<i>Keeping Current</i>	76
CHAPTER 5. CLINICAL TRIALS AND BIRTH CONTROL	77
<i>Overview</i>	77
<i>Recent Trials on Birth Control</i>	77
<i>Keeping Current on Clinical Trials</i>	84
CHAPTER 6. PATENTS ON BIRTH CONTROL	87
<i>Overview</i>	87
<i>Patents on Birth Control</i>	87
<i>Patent Applications on Birth Control</i>	225
<i>Keeping Current</i>	233
CHAPTER 7. BOOKS ON BIRTH CONTROL.....	235
<i>Overview</i>	235
<i>Book Summaries: Federal Agencies</i>	235
<i>Book Summaries: Online Booksellers</i>	236
<i>The National Library of Medicine Book Index</i>	241
<i>Chapters on Birth Control</i>	243
CHAPTER 8. MULTIMEDIA ON BIRTH CONTROL	251
<i>Overview</i>	251
<i>Video Recordings</i>	251
<i>Audio Recordings</i>	252
<i>Bibliography: Multimedia on Birth Control</i>	253
APPENDIX A. PHYSICIAN RESOURCES.....	257
<i>Overview</i>	257
<i>NIH Guidelines</i>	257
<i>NIH Databases</i>	259
<i>Other Commercial Databases</i>	263
APPENDIX B. PATIENT RESOURCES	265
<i>Overview</i>	265
<i>Patient Guideline Sources</i>	265
<i>Finding Associations</i>	276
APPENDIX C. RESEARCHING MEDICATIONS.....	279

<i>Overview</i>	279
<i>U.S. Pharmacopeia</i>	279
<i>Commercial Databases</i>	280
APPENDIX D. FINDING MEDICAL LIBRARIES	283
<i>Overview</i>	283
<i>Preparation</i>	283
<i>Finding a Local Medical Library</i>	283
<i>Medical Libraries in the U.S. and Canada</i>	283
ONLINE GLOSSARIES	289
<i>Online Dictionary Directories</i>	291
BIRTH CONTROL DICTIONARY	293
INDEX	335

FORWARD

In March 2001, the National Institutes of Health issued the following warning: "The number of Web sites offering health-related resources grows every day. Many sites provide valuable information, while others may have information that is unreliable or misleading."¹ Furthermore, because of the rapid increase in Internet-based information, many hours can be wasted searching, selecting, and printing. Since only the smallest fraction of information dealing with birth control is indexed in search engines, such as **www.google.com** or others, a non-systematic approach to Internet research can be not only time consuming, but also incomplete. This book was created for medical professionals, students, and members of the general public who want to know as much as possible about birth control, using the most advanced research tools available and spending the least amount of time doing so.

In addition to offering a structured and comprehensive bibliography, the pages that follow will tell you where and how to find reliable information covering virtually all topics related to birth control, from the essentials to the most advanced areas of research. Public, academic, government, and peer-reviewed research studies are emphasized. Various abstracts are reproduced to give you some of the latest official information available to date on birth control. Abundant guidance is given on how to obtain free-of-charge primary research results via the Internet. **While this book focuses on the field of medicine, when some sources provide access to non-medical information relating to birth control, these are noted in the text.**

E-book and electronic versions of this book are fully interactive with each of the Internet sites mentioned (clicking on a hyperlink automatically opens your browser to the site indicated). If you are using the hard copy version of this book, you can access a cited Web site by typing the provided Web address directly into your Internet browser. You may find it useful to refer to synonyms or related terms when accessing these Internet databases. **NOTE:** At the time of publication, the Web addresses were functional. However, some links may fail due to URL address changes, which is a common occurrence on the Internet.

For readers unfamiliar with the Internet, detailed instructions are offered on how to access electronic resources. For readers unfamiliar with medical terminology, a comprehensive glossary is provided. For readers without access to Internet resources, a directory of medical libraries, that have or can locate references cited here, is given. We hope these resources will prove useful to the widest possible audience seeking information on birth control.

The Editors

¹ From the NIH, National Cancer Institute (NCI): <http://www.cancer.gov/cancerinfo/ten-things-to-know>.

CHAPTER 1. STUDIES ON BIRTH CONTROL

Overview

In this chapter, we will show you how to locate peer-reviewed references and studies on birth control.

The Combined Health Information Database

The Combined Health Information Database summarizes studies across numerous federal agencies. To limit your investigation to research studies and birth control, you will need to use the advanced search options. First, go to <http://chid.nih.gov/index.html>. From there, select the "Detailed Search" option (or go directly to that page with the following hyperlink: <http://chid.nih.gov/detail/detail.html>). The trick in extracting studies is found in the drop boxes at the bottom of the search page where "You may refine your search by." Select the dates and language you prefer, and the format option "Journal Article." At the top of the search form, select the number of records you would like to see (we recommend 100) and check the box to display "whole records." We recommend that you type "birth control" (or synonyms) into the "For these words:" box. Consider using the option "anywhere in record" to make your search as broad as possible. If you want to limit the search to only a particular field, such as the title of the journal, then select this option in the "Search in these fields" drop box. The following is what you can expect from this type of search:

- **Safer Sex for Women, Presented by Planned Parenthood: Seven Steps to a Healthier and Safer Sex Life; Temporary Methods of Birth Control, a Guide; What You Should Know About Sex and Disease**

Contact: Planned Parenthood of Federation of America Incorporated, PO Box 4457, New York, NY, 10163-4457, (800) 669-0156, <http://www.plannedparenthood.org>.

Summary: This reprint of an advertising section from magazines tells women how to have a healthier and safer sex life. It describes various methods of safer sexual conduct, including communicating with sex partners and limiting their numbers. The report warns about the dangers of Sexually transmitted diseases (STD's), including Human immunodeficiency virus (HIV) and Acquired immunodeficiency syndrome (AIDS). It describes symptoms of various STD's and discusses various methods of birth control.

4 Birth Control

The report recommends using a condom at all times to prevent STD transmission, even when also using other methods of birth control.

- **Birth Control Choices**

Source: *Diabetes Self-Management*. 8(3): 6-8, 10-12, 14-16. May-June 1991.

Contact: Available from R.A. Rapaport Publishing Company. 150 West 22nd Street, New York, NY 10011. (800) 234-0923.

Summary: This article provides information on the various methods of birth control available to women with diabetes. Topics include pregnancy planning; choosing a method of contraception; the process of human reproduction; barrier methods including diaphragms, condoms, contraceptive sponges, cervical caps, and vaginal spermicides; oral contraceptives; the intrauterine device; fertility-awareness methods; ineffective methods; sterilization; and contraceptive implants. Two final sections consider birth control methods currently in the research and trial phases and a comment on making the right choice. The contact addresses for three family planning organizations are included.

- **Pregnancy and Birth Control in Dialysis Patients**

Source: *Dialysis and Transplantation*. 23(1): 22-23,26. January 1994.

Summary: This article discusses pregnancy and birth control in dialysis patients. Topics include the need for birth control for women on dialysis; choosing the appropriate method of birth control; the outcome of pregnancy in dialysis patients; diagnosing pregnancy in a population commonly exhibiting similar symptoms (nausea and abdominal discomfort); maternal risks, including hypertension, anemia, and bleeding; the mode of dialysis and its impact on pregnancy; and problems in infants born to mothers on dialysis. 17 references.

- **Contraception: Part of Planning a Health Baby**

Source: *Diabetes Self-Management*. 18(1): 15-18, 20, 23, 26-27, 29. January-February 2001.

Contact: Available from R.A. Rapaport Publishing, Inc. 150 West 22nd Street, New York, NY 10011. (800) 234-0923. Website: www.diabetes-self-mgmt.com.

Summary: This article addresses the issue of contraception among people who have diabetes. For women who have diabetes and their partners, using birth control while planning a pregnancy can allow a woman the time she needs to get her blood glucose in the best control possible. This reduces the risks of birth defects to the baby and preserves the health of a woman prior to conception. Despite these important reasons for using birth control, the unplanned pregnancy rate for women with diabetes is 76 percent. This high rate of unintended pregnancy has been influenced by myths and misconceptions about diabetes, pregnancy, and birth control. Common myths are that women who have diabetes cannot get pregnant or cannot use birth control. Both myths are untrue, and women and their partners have a range of birth control options. No birth control option is off limits to a woman with diabetes just because she has diabetes. These options include nonhormonal methods and hormonal methods. Nonhormonal methods include natural methods such as abstinence, coitus interruptus, and fertility awareness and barrier methods such as the diaphragm, the cervical cap, male and female condoms, and one type of intrauterine device. Hormonal methods include contraceptive implants, injections, and pills. Two new hormonal contraceptive methods are expected to be available soon. One is an estrogen/progestin injection that has a 1

month duration, and the other is a 7 day contraceptive patch. In addition, the article offers suggestions for planning a pregnancy, identifies sources of help in preparing for a healthy pregnancy, and lists resources on contraceptive choices. 3 tables.

- **Oral Contraception and Adolescent Women With Insulin-Dependent Diabetes Mellitus: Risks, Benefits, and Implications for Practice**

Source: *Diabetes Educator*. 22(4): 374-378. July-August 1996.

Contact: Available from American Association of Diabetes Educators. 100 West Monroe, 4th floor, Chicago, IL 60603. (800) 338-3633 or (312) 424-2426. Fax (312) 424-2427.

Summary: In this article, the author reviews oral contraceptive issues for teens with diabetes. The author provides practice implications for health professionals who are in a favorable position to influence the quality of diabetes and general health care for these adolescents. Topics include adolescent sexuality in general and in adolescents with diabetes; the use of oral contraceptives (OC) and their impact on diabetes; and the risks and benefits of using oral contraception in adolescents with diabetes. The author notes that adolescents frequently have poor impulse control, and many adolescents with diabetes who feel bleak about their future anyway may have a live-for-today attitude that interferes with effectively using contraceptive planning and improving glycemic control. On the other hand, women who are able to maintain optimal metabolic control regarding their diabetes also may do well with other health-related issues, such as the use of birth control. The author encourages health care providers to become comfortable discussing sexual issues with teens as part of a holistic approach to diabetes care. 39 references. (AA-M).

- **Hormonal Contraception and Epilepsy**

Source: *Neurology*. 53(Supplement 1):S38-S40, September 1999.

Summary: A physician reviews current knowledge concerning the use of hormonal contraceptive methods in women with epilepsy. Even though there are well-known side effects of estrogen in that its use lowers the seizure threshold, there has been no evidence obtained that the use of estrogen-containing oral contraceptives worsens seizures in patients with epilepsy. Since progesterone is known experimentally to inhibit seizures, it is suggested that its presence in the combination of oral contraceptives could counterbalance the seizure-promoting effects of estrogen. Attempts to normalize the lifestyles and optimize quality of life in women with epilepsy should include the option to choose a reliable method of birth control, including the use of oral contraceptives. Unexpected pregnancies in women with epilepsy taking oral contraceptives and antiepileptic drugs (AED's) were reported anecdotally in the 1970's, soon after the oral contraceptives came into widespread use. Poor compliance with the taking of oral contraceptives was not suspected. The studies indicated there was an increased incidence of menstrual irregularity, which was corrected by increasing the estrogen concentration in the pill. Oral steroids are susceptible to drug interactions in several regards. In addition to direct effects on microsomal enzyme metabolism of sex hormones, the use of AED's in women taking oral contraceptives causes an increased hepatic synthesis of sex hormone-binding globulin, resulting in increased binding and a lowered free fraction of the hormones, which can also reduce the effectiveness of oral contraceptives. A study examined the knowledge of neurologists and obstetricians on the effects of six commonly prescribed AED's on oral contraceptives. Only 38 percent of the neurologists and 29 percent of the obstetricians knew that valproic acid did not interact with oral contraceptives. Not surprisingly, 27 percent of the neurologists and 21

percent of the obstetricians reported having seen patients with oral contraceptive failure who were taking AED's. In view of the findings, the author recommends that physicians should (1) consider using a noninducing AED, such as lamotrigine, gabapentin, valproic acid, or clobazam; (2) prescribe an oral contraceptive with more than 50 micrograms estrogen; (3) warn the patient that midcycle bleeding may indicate that the oral contraceptive is not working but that, even in the absence of breakthrough bleeding, the effectiveness of the oral contraceptive may still be lessened; and (4) recommend a contraceptive method such as condoms, foam, or an intrauterine device in addition to the oral contraceptive when feasible. If Depo-Provera is used, it may have to be given every 6 to 8 weeks instead of the usual 6-month interval. Subdermal levonorgestrel (Norplant) may have reduced effectiveness. 1 table, 23 references.

- **Contraceptive and Condom Use Adoption and Maintenance: A Stage Paradigm Approach**

Source: Health Education Quarterly; Feb. 1995.

Contact: University of Rhode Island, Cancer Prevention Research Center, Flagg Rd, Kingston, RI, 02881-0808, (401) 792-2830.

Summary: This study applies the Transtheoretical Model of Behavior Change to contraceptive and condom use in order to examine the model's applicability to these two related health behaviors. The model proposes that individuals do not go directly from old behaviors to new behaviors, but progress through a sequence of five stages: precontemplation, contemplation, preparation, action, and maintenance. A group of 248 men and women ranging in age from 18 to 26 participated in the study. The study measures were basic demographics; a traditional sexual history assessment; stages of change algorithms for general contraceptive use, condom use with main partner, and condom use with other (casual) partners; decisional balance measures; and self-efficacy measures. Data indicated that 244 of the study group were successfully staged for general contraceptive use and the overall mean score indicated that the highest pro for both general contraceptive use and for condom use with a main partner was protection from pregnancy. For use with casual partners the highest pro was protection from disease. Overall item means show that lower levels of self-efficacy were reported for general birth control if individuals were using alcohol or other drugs. This study suggests that the measures for the three constructs from the transtheoretical model may be promising for their application to college men and women in the area of contraceptive and condom use adoption and maintenance.

- **Contraceptive Use and Attitudes Among U.S. Women**

Source: Women's Health Issues; Vol. 4, No. 3, Fall 1994.

Contact: Elsevier Science, 655 Ave of the Americas, New York, NY, 10010, (212) 633-3971, <http://www.elsevier.com>.

Summary: This journal article addresses the issue of unintended pregnancy and contraceptive use in the U.S. Despite the availability of effective methods of contraception, more than half of the 6.3 million pregnancies that occur each year in the United States are unintended. The author reviews the methods of birth control that women in the United States are using, as well as their satisfaction with current birth control methods. The factors that affect a woman's choice of contraceptive method include childbearing plans, age, perceptions of birth control methods, past experience, physician influence, religious factors, education, access and cost factors, and health concerns. Future trends in contraception are likely to be shaped in part by increased

awareness of sexually transmitted diseases and AIDS. Current trends indicate that more women will choose active methods of contraception in the future, and that the pill will continue to be the most popular method.

- **Oral Contraceptives in Women With Diabetes**

Source: *Diabetes Care*. 13(8): 895-898. August 1990.

Summary: The authors of this article evaluated the association of oral contraceptive use with the presence and severity of diabetic retinopathy, hypertension, and glycosylated hemoglobin in women of childbearing age who have diabetes. Neither current or past use of oral contraceptives, nor duration of oral contraceptive use was associated with severity of retinopathy, hypertension, or current glycosylated hemoglobin. In conclusion, further study of various birth control methods in young women of childbearing age should be considered. 2 tables. 16 references. (AA).

Federally Funded Research on Birth Control

The U.S. Government supports a variety of research studies relating to birth control. These studies are tracked by the Office of Extramural Research at the National Institutes of Health.² CRISP (Computerized Retrieval of Information on Scientific Projects) is a searchable database of federally funded biomedical research projects conducted at universities, hospitals, and other institutions.

Search the CRISP Web site at http://crisp.cit.nih.gov/crisp/crisp_query.generate_screen. You will have the option to perform targeted searches by various criteria, including geography, date, and topics related to birth control.

For most of the studies, the agencies reporting into CRISP provide summaries or abstracts. As opposed to clinical trial research using patients, many federally funded studies use animals or simulated models to explore birth control. The following is typical of the type of information found when searching the CRISP database for birth control:

- **Project Title: BREAST CANCER AND THE BIRTH CONTROL PILL**

Principal Investigator & Institution: Daling, Janet R.; Fred Hutchinson Cancer Research Center Box 19024, 1100 Fairview Ave N Seattle, Wa 98109

Timing: Fiscal Year 2000; Project Start 30-SEP-1992; Project End 9-SEP-2000

Summary: The primary objective of this contract is to provide for the conduct of an epidemiologic study of the risk of breast cancer among women, ages 40-64, in relation to oral contraceptive use. Five Field Centers shall participate in the conduct of a multi-center, population-based, concurrent case-control study to elucidate effects of: 1) current and lifetime OC use; 2) timing of OC use relative to other reproductive events; 3) differential effects of contraceptive estrogens and progestins; and 4) possible modification of OC effects by subsequent estrogen or hormone replacement therapy on the risk of breast cancer. A sufficient number of breast cancer cases and controls shall be enlisted to provide for the detection of a small overall relative risk of breast cancer

² Healthcare projects are funded by the National Institutes of Health (NIH), Substance Abuse and Mental Health Services (SAMHSA), Health Resources and Services Administration (HRSA), Food and Drug Administration (FDA), Centers for Disease Control and Prevention (CDCP), Agency for Healthcare Research and Quality (AHRQ), and Office of Assistant Secretary of Health (OASH).

(approximately a 20% increase or decrease) in oral contraceptive users compared to non-users. In addition, the sample size shall be large enough to provide for subgroup analyses, based on possible differences in risk that may exist for various subgroups. Subgroups shall be defined in terms of race, family history of breast cancer, parity and other reproductive characteristics of women, and other suspected breast cancer risk factors. A secondary objective of this contract is to examine biological differences between cases, which may be associated with exogenous hormone use.

Website: http://crisp.cit.nih.gov/crisp/Crisp_Query.Generate_Screen

E-Journals: PubMed Central³

PubMed Central (PMC) is a digital archive of life sciences journal literature developed and managed by the National Center for Biotechnology Information (NCBI) at the U.S. National Library of Medicine (NLM).⁴ Access to this growing archive of e-journals is free and unrestricted.⁵ To search, go to <http://www.ncbi.nlm.nih.gov/entrez/query.fcgi?db=Pmc>, and type "birth control" (or synonyms) into the search box. This search gives you access to full-text articles. The following is a sample of items found for birth control in the PubMed Central database:

- **Effect of educational leaflets and questions on knowledge of contraception in women taking the combined contraceptive pill: randomised controlled trial.** by Little P, Griffin S, Kelly J, Dickson N, Sadler C. 1998 Jun 27;
<http://www.pubmedcentral.gov/articlerender.fcgi?tool=pmcentrez&artid=28594>
- **Emergency contraception.** by Cole M. 2000 Aug 8;
<http://www.pubmedcentral.gov/articlerender.fcgi?tool=pmcentrez&rendertype=external&artid=80282>
- **Emergency contraception: a matter of dedication and access.** by Weir E. 2001 Oct 16;
<http://www.pubmedcentral.gov/articlerender.fcgi?tool=pmcentrez&rendertype=external&artid=81562>
- **Improving teenagers' knowledge of emergency contraception: cluster randomised controlled trial of a teacher led intervention.** by Graham A, Moore L, Sharp D, Diamond I. 2002 May 18;
<http://www.pubmedcentral.gov/articlerender.fcgi?tool=pmcentrez&artid=111106>
- **Questionnaire study of use of emergency contraception among teenagers.** by Kosunen E, Vikat A, Rimpela M, Rimpela A, Huhtala H. 1999 Jul 10;
<http://www.pubmedcentral.gov/articlerender.fcgi?tool=pmcentrez&artid=28157>

³ Adapted from the National Library of Medicine: <http://www.pubmedcentral.nih.gov/about/intro.html>.

⁴ With PubMed Central, NCBI is taking the lead in preservation and maintenance of open access to electronic literature, just as NLM has done for decades with printed biomedical literature. PubMed Central aims to become a world-class library of the digital age.

⁵ The value of PubMed Central, in addition to its role as an archive, lies in the availability of data from diverse sources stored in a common format in a single repository. Many journals already have online publishing operations, and there is a growing tendency to publish material online only, to the exclusion of print.

The National Library of Medicine: PubMed

One of the quickest and most comprehensive ways to find academic studies in both English and other languages is to use PubMed, maintained by the National Library of Medicine.⁶ The advantage of PubMed over previously mentioned sources is that it covers a greater number of domestic and foreign references. It is also free to use. If the publisher has a Web site that offers full text of its journals, PubMed will provide links to that site, as well as to sites offering other related data. User registration, a subscription fee, or some other type of fee may be required to access the full text of articles in some journals.

To generate your own bibliography of studies dealing with birth control, simply go to the PubMed Web site at <http://www.ncbi.nlm.nih.gov/pubmed>. Type "birth control" (or synonyms) into the search box, and click "Go." The following is the type of output you can expect from PubMed for birth control (hyperlinks lead to article summaries):

- **"An abortionist city": maternal mortality, abortion, and birth control in Sheffield, 1920-1940.**
Author(s): McIntosh T.
Source: Medical History. 2000 January; 44(1): 75-96.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=10885124&dopt=Abstract
- **"Birth control decision".**
Author(s): Moore JL Jr.
Source: J Med Assoc Ga. 1965 October; 54(10): 343-4. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5887907&dopt=Abstract
- **"Natural family planning": effective birth control supported by the Catholic Church.**
Author(s): Ryder RE.
Source: Bmj (Clinical Research Ed.). 1993 September 18; 307(6906): 723-6.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=8401097&dopt=Abstract
- **3. A college health service should not dispense birth control and medications.**
Author(s): Prescott W.
Source: J Am Coll Health Assoc. 1968 February; 16(3): 240-3. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5644192&dopt=Abstract
- **A birth control alternative.**
Author(s): Lippes J.
Source: Science. 2002 August 16; 297(5584): 1121.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12192656&dopt=Abstract

⁶ PubMed was developed by the National Center for Biotechnology Information (NCBI) at the National Library of Medicine (NLM) at the National Institutes of Health (NIH). The PubMed database was developed in conjunction with publishers of biomedical literature as a search tool for accessing literature citations and linking to full-text journal articles at Web sites of participating publishers. Publishers that participate in PubMed supply NLM with their citations electronically prior to or at the time of publication.

- **A birth control vaccine is on the horizon for family planning.**
Author(s): Talwar GP, Singh O, Pal R, Chatterjee N, Upadhyay SN, Kaushic C, Garg S, Kaur R, Singh M, Chandrasekhar S, et al.
Source: Annals of Medicine. 1993 April; 25(2): 207-12. Review.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=7683889&dopt=Abstract
- **A case control study into the possible effects of birth control pills on pre-clinical carcinoma of the cervix.**
Author(s): Worth AJ, Boyes DA.
Source: J Obstet Gynaecol Br Commonw. 1972 August; 79(8): 673-9. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5070879&dopt=Abstract
- **A diaphragm tampon applied to an ovulation method in a birth control system.**
Author(s): Cattanach JF.
Source: Contraception. 1991 December; 44(6): 607-21.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=1773618&dopt=Abstract
- **A longitudinal study of birth control and pregnancy outcome among women in a Swedish population.**
Author(s): Larsson G, Blohm F, Sundell G, Andersch B, Milsom I.
Source: Contraception. 1997 July; 56(1): 9-16.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=9306026&dopt=Abstract
- **A national survey of women's attitudes toward oral contraception and other forms of birth control.**
Author(s): Murphy P, Kirkman A, Hale RW.
Source: Women's Health Issues : Official Publication of the Jacobs Institute of Women's Health. 1995 Summer; 5(2): 94-9.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=7613112&dopt=Abstract
- **A new method for estimating the level of natural fertility in populations practicing birth control.**
Author(s): Espenshade TJ.
Source: Demography. 1971 November; 8(4): 525-36.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5164014&dopt=Abstract
- **A practical guide for prescribing birth control pills.**
Author(s): Abrams J.
Source: N J Med. 1994 June; 91(6): 393-5.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=8047304&dopt=Abstract

- **A review of the birth control pill and its relationship to thrombophlebitis.**
 Author(s): Julsrud ME.
 Source: J Am Podiatry Assoc. 1979 June; 69(6): 376-82.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=448035&dopt=Abstract

- **A suitable job for a woman: women doctors and birth control to the inception of the NHS.**
 Author(s): Hall LA.
 Source: Clio Medica (Amsterdam, Netherlands). 2001; 61: 127-47.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=11603150&dopt=Abstract

- **A survey of attitudes among 979 women attending a birth control clinic.**
 Author(s): MacDevitt J, Goldman L.
 Source: Journal of Biosocial Science. 1976 July; 8(3): 253-61.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=1002739&dopt=Abstract

- **Abortion, birth control, and sex ratio in England and Wales.**
 Author(s): Cruz-Coke R.
 Source: Lancet. 1978 August 26; 2(8087): 480.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=79850&dopt=Abstract

- **Abortion: the rearguard in birth control.**
 Author(s): Kummer JM.
 Source: J Reprod Med. 1970 October; 5(4): 167-74. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5521939&dopt=Abstract

- **Adolescent perceptions of maternal approval of birth control and sexual risk behavior.**
 Author(s): Jaccard J, Dittus PJ.
 Source: American Journal of Public Health. 2000 September; 90(9): 1426-30.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=10983201&dopt=Abstract

- **Adolescents' communication styles and learning about birth control.**
 Author(s): De Pietro R, Allen RL.
 Source: Adolescence. 1984 Winter; 19(76): 827-37.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=6516932&dopt=Abstract

- **Adolescents' communication styles for learning about birth control from mass media.**
 Author(s): De Pietro R, Clark N.
 Source: Health Educ Q. 1983 Summer; 10(2): 106-19.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=6671899&dopt=Abstract

- **Age of entry into marriage and the date of the initiation of voluntary birth control.**
Author(s): Coale AJ.
Source: Demography. 1992 August; 29(3): 333-41.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=1426432&dopt=Abstract
- **American teens and birth control.**
Author(s): Brody C.
Source: N C Med J. 1988 March; 49(3): 169. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=3352804&dopt=Abstract
- **American teens and birth control. Commentary.**
Author(s): Ravenel SD.
Source: N C Med J. 1987 November; 48(11): 606-7. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=3480432&dopt=Abstract
- **An association with birth control pills. Moyamoya.**
Author(s): Sequeira W, Naseem M, Bouffard DA.
Source: Imj Ill Med J. 1984 December; 166(6): 434-6. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=6150921&dopt=Abstract
- **Associations of parity, breast-feeding, and birth control pills with lumbar spine and femoral neck bone densities.**
Author(s): Hreshchyshyn MM, Hopkins A, Zylstra S, Anbar M.
Source: American Journal of Obstetrics and Gynecology. 1988 August; 159(2): 318-22.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=3407686&dopt=Abstract
- **Attitude toward birth control and cognitive consistency: theoretical and practical implications of survey data.**
Author(s): Insko CA, Blake RR, Cialdini RB, Mulaik SA.
Source: Journal of Personality and Social Psychology. 1970 October; 16(2): 228-37.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5524182&dopt=Abstract
- **Attitudes of 30 American Indian women toward birth control.**
Author(s): Doran CM.
Source: Health Serv Rep. 1972 August-September; 87(7): 658-63. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5071316&dopt=Abstract
- **Attitudes of Chinese women towards sexuality and birth control.**
Author(s): Ellis D, Ho MS.
Source: Can Nurse. 1982 March; 78(3): 28-31.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=6916612&dopt=Abstract

- **Australian birth control to go on trial in India.**
 Author(s): Jones A.
 Source: The Nursing Journal of India. 1974 November; 65(11): 297.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4498724&dopt=Abstract

- **Beliefs regarding the consequences of birth control among black, colored, indian, and white South Africans.**
 Author(s): Barling J, Lanham W.
 Source: The Journal of Social Psychology. 1978 June; 105(First Half): 149-50.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=672202&dopt=Abstract

- **Benefits and risks of birth control in U.S. women.**
 Author(s): Harlap S.
 Source: Int J Fertil. 1992; 37 Suppl 3: 148-56. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=1360462&dopt=Abstract

- **Biodegradable delivery system for a birth control vaccine: immunogenicity studies in rats and monkeys.**
 Author(s): Singh M, Singh O, Talwar GP.
 Source: Pharmaceutical Research. 1995 November; 12(11): 1796-800.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=8592689&dopt=Abstract

- **Birth control after 1984.**
 Author(s): Djerassi C.
 Source: Science. 1970 September 4; 169(949): 941-51.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4914725&dopt=Abstract

- **Birth control and family planning in Hungary in the last two decades.**
 Author(s): Klinger A.
 Source: World Health Stat Q. 1979; 32(4): 257-68.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=538954&dopt=Abstract

- **Birth control and human evolution.**
 Author(s): Cruz-Coke R.
 Source: Lancet. 1968 December 7; 2(7580): 1249.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4177232&dopt=Abstract

- **Birth control and paroxysmal nocturnal haemoglobinuria.**
 Author(s): Fitzpatrick C.
 Source: Lancet. 1987 May 30; 1(8544): 1260.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=2884386&dopt=Abstract

- **Birth control and population control in Egypt.**
Author(s): Hassan A, el-Kholy AM.
Source: J Egypt Public Health Assoc. 1966; 41(2): 92-8. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=6002831&dopt=Abstract
- **Birth control and sex ratio.**
Author(s): Cruz-Coke R.
Source: Lancet. 1970 August 22; 2(7669): 426.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4194739&dopt=Abstract
- **Birth control and the argument of saving and investment.**
Author(s): Fucaraccio A.
Source: International Journal of Health Services : Planning, Administration, Evaluation. 1973 Spring; 3(2): 133-44.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4716552&dopt=Abstract
- **Birth control and the black American: a matter of genocide?**
Author(s): Weisbord RG.
Source: Demography. 1973 November; 10(4): 571-90.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4614988&dopt=Abstract
- **Birth control and the private physician.**
Author(s): Silver MA.
Source: Family Planning Perspectives. 1972 April; 4(2): 42-6.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5052571&dopt=Abstract
- **Birth control and the private physician: The view from Los Angeles.**
Author(s): Hulbert RC, Settlege RH.
Source: Family Planning Perspectives. 1974 Winter; 6(1): 50-5.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4459146&dopt=Abstract
- **Birth control as an international program.**
Author(s): Tang RF.
Source: Politics and the Life Sciences : the Journal of the Association for Politics and the Life Sciences. 1997 September; 16(2): 222-3.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=11902210&dopt=Abstract

- **Birth control by intrauterine devices.**
Author(s): Allan FN.
Source: Jama : the Journal of the American Medical Association. 1969 January 6; 207(1): 121-2.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5818129&dopt=Abstract
- **Birth control clinic: education and clinical services.**
Author(s): Penson AB, Mattmiller ED.
Source: J Am Coll Health Assoc. 1974 June; 22(5): 384-8. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4839391&dopt=Abstract
- **Birth control clinics in the city of Birmingham--a geographical study.**
Author(s): Giles BD, Ford VA.
Source: Social Science & Medicine (1982). 1977 November; 11(14-16): 763-72.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=594773&dopt=Abstract
- **Birth control considerations during chemotherapy.**
Author(s): Tarpay CC.
Source: Oncology Nursing Forum. 1985 March-April; 12(2): 75-8.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=3845605&dopt=Abstract
- **Birth control counselling in an adolescent clinic.**
Author(s): Wolfish MG.
Source: Can Med Assoc J. 1971 October 9; 105(7): 750 Passim. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5096917&dopt=Abstract
- **Birth control discontinuance as a diffusion process.**
Author(s): Porter EG.
Source: Stud Fam Plann. 1984 January-February; 15(1): 20-9.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=6701952&dopt=Abstract
- **Birth control experience in Taiwan.**
Author(s): Sun TH, Lee CH.
Source: Taiwan Yi Xue Hui Za Zhi. 1969 November 28; 68(11): 546-7. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5266436&dopt=Abstract
- **Birth control failure among patients with unwanted pregnancies: 1982-1984.**
Author(s): Sophocles AM Jr, Brozovich EM.
Source: The Journal of Family Practice. 1986 January; 22(1): 45-8.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=3941300&dopt=Abstract

- **Birth control failure.**
Author(s): Sophocles AM Jr.
Source: American Family Physician. 1986 October; 34(4): 101-6.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=3766356&dopt=Abstract
- **Birth control for economic development.**
Author(s): Enke S.
Source: Science. 1969 May 16; 164(881): 798-802.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5767778&dopt=Abstract
- **Birth control in India: the carrot and the rod?**
Author(s): Landman LC.
Source: Family Planning Perspectives. 1977 May-June; 9(3): 101-10.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=862829&dopt=Abstract
- **Birth control in Japan: realities and prognosis.**
Author(s): Jitsukawa M, Djerassi C.
Source: Science. 1994 August 19; 265(5175): 1048-51.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=8066442&dopt=Abstract
- **Birth control in Lima, Peru: attitudes and practices.**
Author(s): Hall MF.
Source: Milbank Mem Fund Q. 1965 October; 43(4): 409-38. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5845918&dopt=Abstract
- **Birth control method choice and use of barrier methods for sexually transmitted disease prevention among low-income African-American women.**
Author(s): Macaluso M, Cheng H, Akers R.
Source: Contraception. 2000 July; 62(1): 5-13.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=11024222&dopt=Abstract
- **Birth control methods in the United States.**
Author(s): Potts M.
Source: Family Planning Perspectives. 1988 November-December; 20(6): 288-97. Review.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=3068071&dopt=Abstract
- **Birth control pills and pancreatitis.**
Author(s): Liu JW.
Source: Md State Med J. 1982 February; 31(2): 66-7.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=7070128&dopt=Abstract

- **Birth control pills for minors.**
 Author(s): Reid RL.
 Source: J Med Assoc Ga. 1968 March; 57(3): 149-50. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5641003&dopt=Abstract

- **Birth control pills.**
 Author(s): Vennard WO.
 Source: The American Journal of Psychiatry. 1966 June; 122(12): 1449.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5948770&dopt=Abstract

- **Birth control policy in Japan: a review from eugenic standpoint.**
 Author(s): Matsunaga E.
 Source: Jinrui Idengaku Zasshi. 1968 December; 13(3): 189-200. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5753433&dopt=Abstract

- **Birth control practices and conservatism.**
 Author(s): Joe VC, Jones RN, Noel AS, Roberts B.
 Source: Journal of Personality Assessment. 1979 October; 43(5): 536-40.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=512818&dopt=Abstract

- **Birth control services and sex counseling at Yale.**
 Author(s): Sarrel PM, Sarrel LJ.
 Source: Family Planning Perspectives. 1971 July; 3(3): 33-6.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5122275&dopt=Abstract

- **Birth control survey in a lower social group in Melbourne.**
 Author(s): Wood C, de Mestre N, MacKenzie R, Barson M, Lewis E.
 Source: The Medical Journal of Australia. 1971 March 27; 1(13): 691-6.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5553819&dopt=Abstract

- **Birth control usage among abortion patients.**
 Author(s): Hill JG.
 Source: J Kans Med Soc. 1972 June; 73(6): 295-301 Passim. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5034847&dopt=Abstract

- **Birth control use by teenagers. One and two years postabortion.**
 Author(s): Abrams M.
 Source: J Adolesc Health Care. 1985 May; 6(3): 196-200.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=3988578&dopt=Abstract

- **Birth control vaccine.**
Author(s): Barzelatto J.
Source: Lancet. 1988 August 6; 2(8606): 338.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=2899754&dopt=Abstract
- **Birth control vaccines and immunological approaches to the therapy of noninfectious diseases.**
Author(s): Stevens VC.
Source: Infectious Disease Clinics of North America. 1990 June; 4(2): 343-54.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=2345290&dopt=Abstract
- **Birth control without contraceptives.**
Author(s): Ross C, Piotrow PT.
Source: Popul Rep I. 1974 June; (1): I1-19. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4412214&dopt=Abstract
- **Birth control, culture, and the poor.**
Author(s): Riessman CK.
Source: The American Journal of Orthopsychiatry. 1968 July; 38(4): 693-9.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5661553&dopt=Abstract
- **Birth control, income redistribution, and the rate of saving: the case of Mexico.**
Author(s): Isbister J.
Source: Demography. 1973 February; 10(1): 85-98.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4783730&dopt=Abstract
- **Birth control, sex-ratio, and anencephaly.**
Author(s): Cruz-Coke R.
Source: Lancet. 1972 November 18; 2(7786): 1094-5.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4117426&dopt=Abstract
- **Birth control, sterilization and abortion. Attitudes of catholic and protestant clergymen in San Diego toward use in families with genetic illness.**
Author(s): Schneiderman LF, Prichard L, Fuller S, Atkinson L.
Source: The Western Journal of Medicine. 1974 February; 120(2): 174-9.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4813802&dopt=Abstract
- **Birth control, teen-agers and the law: a new look, 1971.**
Author(s): Pilpel HF, Wechsler NF.
Source: Family Planning Perspectives. 1971 July; 3(3): 37-45.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5122276&dopt=Abstract

- **Birth control.**
Author(s): Martini SE.
Source: The Journal of Family Practice. 1993 June; 36(6): 597.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=8505596&dopt=Abstract

- **Birth control.**
Author(s): Pellow-McCauley T.
Source: Journal of Obstetric, Gynecologic, and Neonatal Nursing : Jognn / Naacog. 1991 September-October; 20(5): 420-1.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=1960587&dopt=Abstract

- **Birth control.**
Author(s): Selby J.
Source: Nursing (Lond). 1980 August; (16): 701-3. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=6903834&dopt=Abstract

- **Birth control. The restrictions of the western approach.**
Author(s): Stycos JM.
Source: Lancet. 1965 December 11; 2(7424): 1231-2.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4158835&dopt=Abstract

- **Birth control: a gynaecologist's point of view.**
Author(s): Dellepiane G.
Source: Panminerva Medica. 1967 May; 9(5): 163-6.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=6047460&dopt=Abstract

- **Birth control: independent and dependent variable for psychological research.**
Author(s): Pohlman E.
Source: The American Psychologist. 1966 October; 21(10): 967-70.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5918206&dopt=Abstract

- **Birth control: some experiences from Denmark.**
Author(s): Wielandt H, Knudsen LB.
Source: Contraception. 1997 May; 55(5): 301-6. Review.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=9220227&dopt=Abstract

- **Birth control--population policy.**
Author(s): Weissman MM, Reynolds R, Frank LC Jr, Johnson W, Barnhous-Beuscher R, Blake J.
Source: Science. 1969 July 11; 165(889): 121-4.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5787156&dopt=Abstract

- **Birth control-sex preference and sex ratio.**
Author(s): Toro MA.
Source: Heredity. 1981 December; 47(Pt 3): 417-23.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=7343549&dopt=Abstract
- **Birth control--the views of women.**
Author(s): Hurst JA.
Source: The Medical Journal of Australia. 1970 October 31; 2(18): 835-8.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5489524&dopt=Abstract
- **Black women in double jeopardy: a perspective on birth control.**
Author(s): Gould KH.
Source: Health & Social Work. 1984 Spring; 9(2): 96-105.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=6724429&dopt=Abstract
- **Breastfeeding and birth control.**
Author(s): Dwyer R, Potter C, Wright C, Smith M, Topp J, Holmes W.
Source: Lancet. 1991 June 8; 337(8754): 1415.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=1674787&dopt=Abstract
- **By the way, doctor. I'm 47 and my menstrual periods are quite irregular, so my doctor started me on birth control pills. How will I know when I enter menopause and when to switch to HRT?**
Author(s): Robb-Nicholson C.
Source: Harvard Women's Health Watch. 1999 November; 7(3): 8.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=10521920&dopt=Abstract
- **By the way, doctor. I've seen a lot in the news lately about women using birth control pills to delay their menstrual periods or avoid having them altogether. How does this work? Is it safe?**
Author(s): Robb-Nicholson C.
Source: Harvard Women's Health Watch. 2000 December; 8(4): 8.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=11114881&dopt=Abstract
- **Can a woman breastfeed while using Depo-Provera as an agent for birth control?**
Author(s): Emery M.
Source: Journal of Human Lactation : Official Journal of International Lactation Consultant Association. 1993 September; 9(3): 187-8. Review.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=8260041&dopt=Abstract

- **Can effective birth control be legislated? An analysis of factors that predict birth control utilization.**
 Author(s): Murphy JG, Symington BE, Jacobson S.
 Source: Journal of Public Health Policy. 1984 June; 5(2): 198-212.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=6470130&dopt=Abstract
- **Catholic parish priests and birth control: a comparative study of opinion in Colombia, the United States, and the Netherlands.**
 Author(s): Burch TK, Shea GA.
 Source: Stud Fam Plann. 1971 June; 2(6): 121-36. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5113353&dopt=Abstract
- **Cervical cytology and sequential birth control pills.**
 Author(s): Dougherty CM.
 Source: Obstetrics and Gynecology. 1970 November; 36(5): 741-4.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5474004&dopt=Abstract
- **Children and birth control.**
 Author(s): Gerber P.
 Source: The Medical Journal of Australia. 1985 December 9-23; 143(12-13): 633-4.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=3831760&dopt=Abstract
- **China invents male birth control pill.**
 Author(s): Wen W.
 Source: The American Journal of Chinese Medicine. 1980 Spring-Summer; 8(1-2): 195-7.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=7395797&dopt=Abstract
- **Choice of contraceptive method for birth control and attitudes toward abortion in Swedish women ages 23-29.**
 Author(s): Lindell ME, Olsson HM, Sjoden PO.
 Source: Health Care for Women International. 1995 January-February; 16(1): 75-84.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=7706142&dopt=Abstract
- **Chronic schizophrenic women's attitudes toward sex, pregnancy, birth control, and childrearing.**
 Author(s): McEvoy JP, Hatcher A, Appelbaum PS, Abernethy V.
 Source: Hosp Community Psychiatry. 1983 June; 34(6): 536-9.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=6862399&dopt=Abstract

- **Class, controversy, and contraceptives: birth control advocacy in Nashville, 1932-1944.**
Author(s): Turner WB.
Source: Tenn Hist Q. 1994 Fall; 53(3): 166-79. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=11639818&dopt=Abstract
- **Clinical experiences with birth control in Poland.**
Author(s): Sternadel Z.
Source: Mater Med Pol. 1976; 8(4): 456-8. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=1027963&dopt=Abstract
- **Coitus interruptus. Considerations as a method of birth control.**
Author(s): Lethbridge DJ.
Source: Journal of Obstetric, Gynecologic, and Neonatal Nursing : Jognn / Naacog. 1991 January-February; 20(1): 80-5.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=2005488&dopt=Abstract
- **Comparative analysis of the effectiveness of the diaphragm and birth control pill during the first year of use among suburban adolescents.**
Author(s): Fisher M, Marks A, Trieller K.
Source: J Adolesc Health Care. 1987 September; 8(5): 393-9.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=3667392&dopt=Abstract
- **Conception and birth control use: Cambodian refugee women's beliefs and practices.**
Author(s): Kulig JC.
Source: Journal of Community Health Nursing. 1988; 5(4): 235-46.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=3204423&dopt=Abstract
- **Condom use relative to knowledge of sexually transmitted disease prevention, method of birth control, and past or present infection.**
Author(s): Fleisher JM, Senie RT, Minkoff H, Jaccard J.
Source: Journal of Community Health. 1994 December; 19(6): 395-407.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=7844245&dopt=Abstract
- **Condoms and birth control in school clinics.**
Author(s): Saunders S.
Source: Postgraduate Medicine. 1993 June; 93(8): 40.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=8506182&dopt=Abstract

- **Condoms and birth control in school clinics.**
 Author(s): Merrill SC.
 Source: Postgraduate Medicine. 1993 June; 93(8): 38, 40.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=8506181&dopt=Abstract

- **Condoms and birth control in school clinics.**
 Author(s): Cohen MS.
 Source: Postgraduate Medicine. 1993 June; 93(8): 37.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=8506180&dopt=Abstract

- **Contact lens wear problems: implications of penicillin allergy, diabetic relatives, and use of birth control pills.**
 Author(s): Harrison DP.
 Source: Am J Optom Physiol Opt. 1984 November; 61(11): 674-8.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=6517123&dopt=Abstract

- **Contrasting cultures of contraception: birth control clinics and the working-classes in Britain between the wars.**
 Author(s): Fisher K.
 Source: Clio Medica (Amsterdam, Netherlands). 2002; 66: 141-57.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12028675&dopt=Abstract

- **Cooperation in the area of birth control.**
 Author(s): Taylor KR, Fox SC.
 Source: J Am Coll Health Assoc. 1974 June; 22(5): 372-4. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4839390&dopt=Abstract

- **Correlation of moral development with use of birth control and pregnancy among teenage girls.**
 Author(s): Jurs J.
 Source: Psychological Reports. 1984 December; 55(3): 1009-10.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=6522535&dopt=Abstract

- **Counseling of birth control patients.**
 Author(s): Kendall C.
 Source: The Journal of Adolescent Health : Official Publication of the Society for Adolescent Medicine. 1999 June; 24(6): 374-5.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=10401963&dopt=Abstract

- **Criteria for appropriate birth control.**
Author(s): Westhoff C.
Source: *Gynecological Endocrinology : the Official Journal of the International Society of Gynecological Endocrinology*. 2001 August; 15 Suppl 3: 19-22. Review.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=11570314&dopt=Abstract
- **Definitive birth control and the physician--ethical issues.**
Author(s): Sobel RJ, Gert B.
Source: *Isr J Med Sci*. 1986 November; 22(11): 841-6.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=3793442&dopt=Abstract
- **Demography and birth control.**
Author(s): Zuckerman L.
Source: *Ippf Med Bull*. 1974 August; 8(4): 1-2. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4448270&dopt=Abstract
- **Desexing birth control.**
Author(s): Stycos JM.
Source: *Family Planning Perspectives*. 1977 November-December; 9(6): 286-92.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=923759&dopt=Abstract
- **Determinants of contraceptive use: from birth control to fertility awareness.**
Author(s): Oddens BJ.
Source: *European Journal of Obstetrics, Gynecology, and Reproductive Biology*. 1997 January; 71(1): 1-2. Review.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=9031952&dopt=Abstract
- **Development of a decision aid for women choosing a method of birth control.**
Author(s): Wall EM.
Source: *The Journal of Family Practice*. 1985 November; 21(5): 351-5.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4056670&dopt=Abstract
- **Development of a scale to measure attitudes toward using birth control pills.**
Author(s): Herold ES, Goodwin MS.
Source: *The Journal of Social Psychology*. 1980 February; 110(First Half): 115-22.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=7366184&dopt=Abstract
- **Domiciliary birth control: a new dimension in negative eugenics.**
Author(s): Peel J, Schenk F.
Source: *Eugen Rev*. 1965 June; 57(2): 67-71. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5888674&dopt=Abstract

- **Domiciliary midwives and birth control advice 1970/71. 2.**
 Author(s): Waite M.
 Source: Nurs Times. 1972 December 14; 68(50): Suppl 197-9. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4640246&dopt=Abstract
- **Domiciliary midwives and birth control advice 1970-71. 1.**
 Author(s): Waite M.
 Source: Nurs Times. 1972 December 7; 68(49): Suppl: 193-5.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4635596&dopt=Abstract
- **Effectiveness of abortion as birth control.**
 Author(s): Williams SJ, Pullum TW.
 Source: Soc Biol. 1975 Spring; 22(1): 23-33.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=1188406&dopt=Abstract
- **Effects of sex guilt and sexual arousal on the retention of birth control information.**
 Author(s): Schwartz S.
 Source: Journal of Consulting and Clinical Psychology. 1973 August; 41(1): 61-4.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4726713&dopt=Abstract
- **Emergency contraception and risk of ectopic pregnancy: is there need for extra vigilance?**
 Author(s): Vinson DR.
 Source: Annals of Emergency Medicine. 2003 August; 42(2): 306-7.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12899155&dopt=Abstract
- **Employment and the use of birth control by sexually active single Hispanic, black, and white women.**
 Author(s): Kraft JM, Coverdill JE.
 Source: Demography. 1994 November; 31(4): 593-602.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=7890094&dopt=Abstract
- **Ethical birth control.**
 Author(s): Phaosavasdi S, Taneepanichskul S, Tannirandom Y.
 Source: J Med Assoc Thai. 2000 May; 83(5): 575-6. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=10863906&dopt=Abstract

- **European Society of Contraception oral contraceptives survey update: birth control methods in "Europe of the 12".**
Author(s): Serfaty D, Wildemeersch D, Verougstraete A, Creatsas G.
Source: Int J Fertil Menopausal Stud. 1995; 40 Suppl 2: 73-9.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=8574253&dopt=Abstract
- **Exploring risks and benefits of the birth control pill.**
Author(s): Dunn DA.
Source: Health Educ. 1981 January-February; 12(1): 35.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=6792119&dopt=Abstract
- **Extinction or explosion of the population. Birth control in Sweden with particular reference to its consequences and significance for population development.**
Author(s): Gyllensward C.
Source: Acta Paediatr Scand. 1967 March; 56(2): 198-210. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=6049802&dopt=Abstract
- **Factors influencing birth control habits in Victoria.**
Author(s): Selwood T, Leeton J.
Source: Aust Fam Physician. 1981 February; 10(2): 96-101.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=7247847&dopt=Abstract
- **Factors influencing women's satisfaction with birth control methods.**
Author(s): den Tonkelaar D, Oddens BJ.
Source: The European Journal of Contraception & Reproductive Health Care : the Official Journal of the European Society of Contraception. 2001 September; 6(3): 153-8.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=11763979&dopt=Abstract
- **Factors predictive of adolescents' intentions to use birth control pills, condoms, and birth control pills in combination with condoms.**
Author(s): Craig DM, Wade KE, Allison KR, Irving HM, Williams JI, Hlibka CM.
Source: Canadian Journal of Public Health. Revue Canadienne De Sante Publique. 2000 September-October; 91(5): 361-5.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=11089290&dopt=Abstract
- **Factors related to self-efficacy for use of condoms and birth control among women at risk for HIV infection.**
Author(s): Lauby JL, Semaan S, O'Connell A, Person B, Vogel A.
Source: Women Health. 2001; 34(3): 71-91.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=11708688&dopt=Abstract

- **Family planning--birth control.**
 Author(s): Bloch E, Cobliner WG, Kaiser IH, Koren Z, Moukhtar M, Rand AT, Romney SL, Schulman H, Smith JL.
 Source: American Journal of Obstetrics and Gynecology. 1972 January 15; 112(2): 309.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5008458&dopt=Abstract

- **Frequency and severity of premenstrual symptoms in women taking birth control pills.**
 Author(s): Yuk VJ, Cumming CE, Fox EE, Cumming DC.
 Source: Gynecologic and Obstetric Investigation. 1991; 31(1): 42-5.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=2010113&dopt=Abstract

- **From birth control to reproductive health.**
 Author(s): Faundes A, Hardy E.
 Source: International Journal of Gynaecology and Obstetrics: the Official Organ of the International Federation of Gynaecology and Obstetrics. 1995 April; 49(1): 55-62. Review.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=9457987&dopt=Abstract

- **Gender discrimination within the reproductive health care system: Viagra v. birth control.**
 Author(s): Hayden LA.
 Source: J Law Health. 1998-99; 13(2): 171-98. Review. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=10947393&dopt=Abstract

- **General practitioners and birth control advice in 1970-71.**
 Author(s): Waite M, Cartwright A.
 Source: Br J Prev Soc Med. 1972 February; 26(1): 56. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5016146&dopt=Abstract

- **Guidelines to birth control counselling of the physically handicapped.**
 Author(s): Szasz G, Miller S, Anderson L.
 Source: Can Med Assoc J. 1979 June 9; 120(11): 1353-68.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=156579&dopt=Abstract

- **Health visitors and birth control advice 1970-71. 1.**
 Author(s): Waite M.
 Source: Nurs Times. 1972 October 12; 68(41): Suppl: 157-9. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4646629&dopt=Abstract

- **Helping patients choose an appropriate method of birth control.**
Author(s): King J.
Source: Mcn. the American Journal of Maternal Child Nursing. 1992 March-April; 17(2): 91-5.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=1593941&dopt=Abstract
- **Hormonal birth control and pregnancy: a comparative analysis of thromboembolic risk.**
Author(s): Wilks JF.
Source: The Annals of Pharmacotherapy. 2003 June; 37(6): 912-6. Review.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12773085&dopt=Abstract
- **How birth control affects births.**
Author(s): Keyfitz N.
Source: Soc Biol. 1971 June; 18(2): 109-21. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5094431&dopt=Abstract
- **II. A college health service should dispense birth control information, services and medications.**
Author(s): Osborne MM Jr.
Source: J Am Coll Health Assoc. 1968 February; 16(3): 235-40. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5644191&dopt=Abstract
- **Induced abortion: a method for birth control?**
Author(s): Guldal D, Semin S.
Source: Advances in Contraception : the Official Journal of the Society for the Advancement of Contraception. 1999; 15(1): 49-59.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=10794046&dopt=Abstract
- **Informed consent for postfertilization effects of hormonal and surgical forms of birth control for women.**
Author(s): Sherfey MA.
Source: Archives of Family Medicine. 2000 August; 9(8): 690-1.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=10927703&dopt=Abstract
- **Inhibition of ovulation in women by chronic treatment with a stimulatory LRH analogue - a new approach to birth control?**
Author(s): Nillius SJ, Bergquist C, Wide L.
Source: Contraception. 1978 June; 17(6): 537-44.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=363344&dopt=Abstract

- **Inhibition of ovulation in women by chronic treatment with a stimulatory LRH analogue--a new approach to birth control?**
Author(s): Nillius SJ, Bergquist C, Wide L.
Source: Contraception. 1978 June; 17(6): 537-45.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=352612&dopt=Abstract
- **Interactions between carbamazepine and birth control pills.**
Author(s): Rapport DJ, Calabrese JR.
Source: Psychosomatics. 1989 Fall; 30(4): 462-4.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=2798744&dopt=Abstract
- **Internal-external locus of control and the practice of birth control.**
Author(s): MacDonald AP Jr.
Source: Psychological Reports. 1970 August; 27(1): 206.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5454102&dopt=Abstract
- **Knowledge and use of birth control methods in active duty Army enlisted medical trainees.**
Author(s): Battista RM, Creedon JF Jr, Salyer SW.
Source: Military Medicine. 1999 June; 164(6): 407-9.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=10377708&dopt=Abstract
- **Legalising abortion for birth control.**
Author(s): Chand A.
Source: J Indian Med Assoc. 1965 July 16; 45(2): 95-7. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5889875&dopt=Abstract
- **Letter: Birth control and genetic changes in Chile.**
Author(s): Cruz-Coke R.
Source: Lancet. 1976 March 13; 1(7959): 591-2.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=55871&dopt=Abstract
- **Letter: Non-medical birth control.**
Author(s): Pierson MB.
Source: American Journal of Public Health. 1973 December; 63(12): 1021.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4759863&dopt=Abstract

- **Letter: Retinitis pigmentosa and birth control pills.**
Author(s): Pearlman JT, Saxton J.
Source: *Jama : the Journal of the American Medical Association*. 1975 February 24; 231(8): 810.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=1172745&dopt=Abstract
- **Liability for failure of birth control methods.**
Author(s): Mark DJ.
Source: *Columbia Law Rev.* 1976 November; 76(7): 1186-204. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=1028563&dopt=Abstract
- **Liability for unsuccessful birth control.**
Author(s): O'Hern VM.
Source: *Jama : the Journal of the American Medical Association*. 1967 October 16; 202(3): 269-70.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=6072366&dopt=Abstract
- **Lunelle monthly injectable contraceptive. An effective, safe, and convenient new birth control option.**
Author(s): Kaunitz AM.
Source: *Archives of Gynecology and Obstetrics*. 2001 August; 265(3): 119-23. Review.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=11561738&dopt=Abstract
- **Magnetic resonance imaging of cerebral venous thrombosis secondary to "low-dose" birth control pills.**
Author(s): Granato DB, Archer CR, Awwad EE.
Source: *Clinical Imaging*. 1989 September; 13(3): 220-4.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=2819587&dopt=Abstract
- **Malthusian mutations: the changing politics and moral meanings of birth control in Britain.**
Author(s): Hall LA.
Source: *Clio Medica (Amsterdam, Netherlands)*. 2000; 59: 141-63.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=11027073&dopt=Abstract
- **Medicine, nursing, social work. Professionals and birth control: student and faculty attitudes.**
Author(s): Werley HH, Ager JW, Rosen RA, Shea FP.
Source: *Family Planning Perspectives*. 1973 Winter; 5(1): 42-9.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4805717&dopt=Abstract

- **Medicolegal file. Tell everything you know about birth control pills.**
 Author(s): Winkelaar PG.
 Source: Can Fam Physician. 1999 February; 45: 299.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=10065301&dopt=Abstract

- **Mensus-inducing drugs: their role in antique, medieval and renaissance gynecology and birth control.**
 Author(s): Jochle W.
 Source: Contraception. 1974 October; 10(4): 425-39.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4614935&dopt=Abstract

- **Metabolic effects of the birth control pill.**
 Author(s): Sondheimer S.
 Source: Clinical Obstetrics and Gynecology. 1981 September; 24(3): 927-41. Review.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=7026112&dopt=Abstract

- **Methods of birth control.**
 Author(s): Guttmacher AF.
 Source: Minn Med. 1968 January; 51(1): 138-9. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5636222&dopt=Abstract

- **Midwifery: birth control?**
 Author(s): Flint C.
 Source: Nurs Times. 1987 July 15-21; 83(28): 20. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=3650812&dopt=Abstract

- **Minor consent in birth control and abortion: Part 1.**
 Author(s): Trandel-Korenychuk D, Trandel-Korenychuk K.
 Source: The Nurse Practitioner. 1980 March-April; 5(2): 47, 50-1, 54.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=7360418&dopt=Abstract

- **Modern birth control.**
 Author(s): Crawford J.
 Source: Va Med Mon (1918). 1967 September; 94(9): 526-32. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=6074620&dopt=Abstract

- **Morning after birth control.**
 Author(s): Rahwan RG.
 Source: Lancet. 1995 July 22; 346(8969): 252.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=7677889&dopt=Abstract

- **Morning-after birth control.**
Author(s): Pillaye J.
Source: Lancet. 1995 July 22; 346(8969): 251-2.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=7616824&dopt=Abstract
- **Motivations for the use of birth control: evidence from West Africa.**
Author(s): Ware H.
Source: Demography. 1976 November; 13(4): 479-93.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=992171&dopt=Abstract
- **Natural birth control.**
Author(s): Westmore A.
Source: Aust Nurses J. 1980 November; 10(5): 51-2. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=6906208&dopt=Abstract
- **Natural family planning: a birth control alternative.**
Author(s): Matis N.
Source: Journal of Nurse-Midwifery. 1983 January-February; 28(1): 7-16.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=6551435&dopt=Abstract
- **Natural methods and birth control: a choice in harmony with the conjugal anthropology of the couple.**
Author(s): Honings B.
Source: Suppl Int J Gynecol Obstet. 1989; 1: 161-6. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=2803575&dopt=Abstract
- **No room to assume in birth control.**
Author(s): Katz A.
Source: Can Fam Physician. 1996 February; 42: 232, 234. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=9222570&dopt=Abstract
- **Non-medical birth control--a neglected and promising field.**
Author(s): Harvey PD, Altman DL.
Source: American Journal of Public Health. 1973 June; 63(6): 473-5.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4707546&dopt=Abstract
- **Nursing, social contexts, and ideologies in the early United States birth control movement.**
Author(s): Lagerwey MD.
Source: Nursing Inquiry. 1999 December; 6(4): 250-8.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=10696211&dopt=Abstract

- **Obstacles to condom use: the combination of other forms of birth control and short-term monogamy.**
 Author(s): Critelli JW, Suire DM.
 Source: Journal of American College Health : J of Ach. 1998 March; 46(5): 215-9.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=9558820&dopt=Abstract
- **On the evidence. Birth control.**
 Author(s): Dickson R, Fullerton D, Sheldon T.
 Source: Health Serv J. 1997 February 20; 107(5541): 40-1. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=10165744&dopt=Abstract
- **On the possibility of a perfect rhythm method of birth control by periodic light stimulation.**
 Author(s): Dewan EM.
 Source: American Journal of Obstetrics and Gynecology. 1967 December 1; 99(7): 1016-9.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=6058735&dopt=Abstract
- **Options for immunocontraception and issues to be addressed in the development of birth control vaccines.**
 Author(s): Griffin PD.
 Source: Scand J Immunol Suppl. 1992; 11: 111-7.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=1514024&dopt=Abstract
- **Our most explosive sex education issue: birth control.**
 Author(s): Hoyman HS.
 Source: The Journal of School Health. 1969 September; 39(7): 458-69.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5194810&dopt=Abstract
- **Overview of commonly-practiced birth control methods.**
 Author(s): Collins J.
 Source: Imprint. 1989 November; 36(4): 63-7.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=2807349&dopt=Abstract
- **Ovulation method of birth control.**
 Author(s): Timby BK.
 Source: The American Journal of Nursing. 1976 June; 76(6): 928-9.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=1046918&dopt=Abstract

- **Participation of low-income urban women in a public health birth control program.**
Author(s): Janus ZL, Fuentes R.
Source: Public Health Reports (Washington, D.C. : 1974). 1970 October; 85(10): 859-67.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4990241&dopt=Abstract
- **Personality patterns of couples practicing the temperature-rhythm method of birth control.**
Author(s): Tolor A, Rice FJ, Lanctot CA.
Source: Journal of Sex Research. 1975 May; 11(2): 119-33.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=1142744&dopt=Abstract
- **Phase I clinical trial of a World Health Organisation birth control vaccine.**
Author(s): Jones WR, Bradley J, Judd SJ, Denholm EH, Ing RM, Mueller UW, Powell J, Griffin PD, Stevens VC.
Source: Lancet. 1988 June 11; 1(8598): 1295-8.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=2453766&dopt=Abstract
- **Physicians' responsibility toward birth control.**
Author(s): De Marco TJ.
Source: Can Fam Physician. 1995 December; 41: 2085. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=8680290&dopt=Abstract
- **Plans for a cohort investigation of abnormal cervical cytology among users of different methods of birth control.**
Author(s): Merritt CG, Balin H, Hontz A, Mausner JS.
Source: J Reprod Med. 1972 April; 8(4): 175-85. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4555283&dopt=Abstract
- **Political, not scientific, birth control solutions.**
Author(s): Djerassi C.
Source: Science. 2002 August 16; 297(5584): 1120.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12192655&dopt=Abstract
- **Polling Americans on birth control and population.**
Author(s): Lipson G, Wolman D.
Source: Family Planning Perspectives. 1972 January; 4(1): 39-42.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5020857&dopt=Abstract

- **Population, birth control and West Virginia.**
 Author(s): Allen DT, Dyer NH, Basman J.
 Source: W V Med J. 1970 May; 66(5): 167-70.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5269018&dopt=Abstract
- **Post-abortion attitudes and patterns of birth control.**
 Author(s): Abrams M, DiBiase V, Sturgis S.
 Source: The Journal of Family Practice. 1979 October; 9(4): 593-9.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=479786&dopt=Abstract
- **Poverty, birth control, and public health.**
 Author(s): Grant M.
 Source: Bull N Y Acad Med. 1966 January; 42(1): 46-53. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5215587&dopt=Abstract
- **Pregnancy and birth control in CAPD patients.**
 Author(s): Hou S.
 Source: Adv Perit Dial. 1993; 9: 173-6.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=8105917&dopt=Abstract
- **Preliminary studies with recombinant chorionic gonadotropin beta-subunit produced in Escherichia coli for use as an antigen in a birth control vaccine.**
 Author(s): Mukhopadhyay A, Bhatia PK, Majumdar SS.
 Source: American Journal of Reproductive Immunology (New York, N.Y. : 1989). 1998 March; 39(3): 172-82. Erratum In: Am J Reprod Immunol 1998 August; 40(2): 122.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=9526606&dopt=Abstract
- **Proceedings: The contraceptive dilemma in adolescents. The birth control pill versus the intrauterine device.**
 Author(s): Shearin RB.
 Source: Acta Paediatr Scand Suppl. 1975; (256): 53-4. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=1065199&dopt=Abstract
- **Public backs teaching birth control to teens.**
 Author(s): Steiber SR.
 Source: Hospitals. 1986 October 5; 60(19): 148. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=3759000&dopt=Abstract

- **Public opinion trends: elective abortion and birth control services to teenagers.**
Author(s): Pomeroy R, Landman LC.
Source: Family Planning Perspectives. 1972 October; 4(4): 44-55.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4680252&dopt=Abstract
- **Quality of care given to first time birth control patients at a free clinic.**
Author(s): Grover M, Greenberg T.
Source: American Journal of Public Health. 1976 October; 66(10): 986-7.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=970516&dopt=Abstract
- **Relationship between women's attitudes and choice of birth control.**
Author(s): Hunter KI, Linn MW, Harris R.
Source: Psychological Reports. 1981 October; 49(2): 372-4.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=7302057&dopt=Abstract
- **Reproductive mortality and its relation to different methods of birth control.**
Author(s): Hogberg U, Wall S.
Source: Journal of Biosocial Science. 1990 July; 22(3): 323-31.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=2401675&dopt=Abstract
- **Risks of rhythm method of birth control.**
Author(s): Iffy L, Wingate MB.
Source: J Reprod Med. 1970 September; 5(3): 96-102. Review. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4940411&dopt=Abstract
- **Safety of intrauterine administration of purified neem seed oil (Praneem Vilci) in women & effect of its co-administration with the heterospecies dimer birth control vaccine on antibody response to human chorionic gonadotropin.**
Author(s): Talwar GP, Pal R, Singh O, Garg S, Taluja V, Upadhyay SN, Gopalan S, Jain V, Kaur J, Sehgal S.
Source: The Indian Journal of Medical Research. 1995 August; 102: 66-70.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=8834816&dopt=Abstract
- **Scale of use, safety and impact of birth control methods.**
Author(s): Southam AL.
Source: Contraception. 1973 July; 8(1): 1-11. Review.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4598743&dopt=Abstract

- **School-based health centers and the birth control debate.**
 Author(s): Dailard C.
 Source: Issues Brief (Alan Guttmacher Inst). 2000 November; (3): 1-4. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12134880&dopt=Abstract
- **Serum gamma-glutamyl transpeptidase activity in viral hepatitis: suppression in pregnancy and by birth control pills.**
 Author(s): Combes B, Shore GM, Cunningham FG, Walker FB, Shorey JW, Ware A.
 Source: Gastroenterology. 1977 February; 72(2): 271-4.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12064&dopt=Abstract
- **Sex of offspring of women using oral contraceptives, rhythm, and other methods of birth control around the time of conception.**
 Author(s): Shiono PH, Harlap S, Ramcharan S.
 Source: Fertility and Sterility. 1982 March; 37(3): 367-72.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=7060788&dopt=Abstract
- **Sexual experience and responses to a birth control film.**
 Author(s): Herold ES, Thomas RE.
 Source: The Journal of School Health. 1980 February; 50(2): 66-73.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=6898262&dopt=Abstract
- **Sexual experience, birth control usage, and sex education of unmarried Canadian university students: changes between 1968 and 1978.**
 Author(s): Barrett FM.
 Source: Archives of Sexual Behavior. 1980 October; 9(5): 367-90.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=7447682&dopt=Abstract
- **Sexuality, birth control and abortion: a decision-making sequence.**
 Author(s): Diamond M, Steinhoff PG, Palmore JA, Smith RG.
 Source: Journal of Biosocial Science. 1973 July; 5(3): 347-61.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4732043&dopt=Abstract
- **Sexuality, birth control and childbirth in orthodox Jewish tradition.**
 Author(s): Feldman P.
 Source: Cmaj : Canadian Medical Association Journal = Journal De L'association Medicale Canadienne. 1992 January 1; 146(1): 29-33.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=1728349&dopt=Abstract

- **Should we teach about birth control in high school sex education.**
Author(s): Hoyman HS.
Source: The Journal of School Health. 1968 November; 38(9): 545-56.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5188547&dopt=Abstract
- **Signs of fertility: the personal science of natural birth control.**
Author(s): Nofziger M.
Source: Journal of Nurse-Midwifery. 1989 November-December; 34(6): 359-60.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=2614526&dopt=Abstract
- **Social work attitudes toward birth control for teenagers.**
Author(s): Reichelt PA, Werley HH, Ager JW.
Source: Community Mental Health Journal. 1977 Winter; 13(4): 352-9.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=589981&dopt=Abstract
- **Stages of birth control behavior in young, unmarried women.**
Author(s): Lindemann C.
Source: Commun Nurs Res. 1976 January; 7: 249-58. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=1048021&dopt=Abstract
- **Subjective efficacy and ideal family size as predictors of favorability toward birth control.**
Author(s): Williamson JB.
Source: Demography. 1970 August; 7(3): 329-39.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5524638&dopt=Abstract
- **Successful treatment of hirsutism in HAIR-AN syndrome using flutamide, spironolactone, and birth control therapy.**
Author(s): Zemtsov A, Wilson L.
Source: Archives of Dermatology. 1997 April; 133(4): 431-3.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=9126004&dopt=Abstract
- **Teenage sex and birth control.**
Author(s): Lieberman EJ.
Source: Jama : the Journal of the American Medical Association. 1978 July 21; 240(3): 275-6.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=660859&dopt=Abstract

- **The ageing gamete in relation to birth control failures and Down syndrome.**
 Author(s): Jongbloet PH.
 Source: European Journal of Pediatrics. 1985 November; 144(4): 343-7. Review.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=2934254&dopt=Abstract

- **The birth control clinic.**
 Author(s): Nichol C.
 Source: Can Nurse. 1989 February; 85(2): 24-5. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=2914308&dopt=Abstract

- **The birth control movement and oral contraceptives in the college population.**
 Author(s): Donald IR, Kinch RA.
 Source: J Am Coll Health Assoc. 1974 June; 22(5): 375-83. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4600399&dopt=Abstract

- **The birth control pill and its ophthalmologic side effects.**
 Author(s): Levinson JM.
 Source: Del Med J. 1969 April; 41(4): 118-20. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5798034&dopt=Abstract

- **The birth control pill revisited.**
 Author(s): Harris CD.
 Source: Naacogs Clin Issu Perinat Womens Health Nurs. 1992; 3(2): 246-52. Review.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=1596433&dopt=Abstract

- **The birth control program in the Mecklenburg County Health Department.**
 Author(s): Corkey EC.
 Source: Am J Public Health Nations Health. 1966 January; 56(1): Suppl: 40-7. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5948067&dopt=Abstract

- **The birth of birth control.**
 Author(s): Fairley A.
 Source: Cmaj : Canadian Medical Association Journal = Journal De L'association Medicale Canadienne. 1990 May 1; 142(9): 993-5.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=2183921&dopt=Abstract

- **The effect of birth control methods on sexually transmitted disease/HIV risk.**
Author(s): O'Connell ML.
Source: Journal of Obstetric, Gynecologic, and Neonatal Nursing : Jognn / Naacog. 1996 July-August; 25(6): 476-80. Review.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=8835806&dopt=Abstract
- **The effect of the phase of the menstrual cycle and the birth control pill on athletic performance.**
Author(s): Lebrun CM.
Source: Clinics in Sports Medicine. 1994 April; 13(2): 419-41. Review.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=8013042&dopt=Abstract
- **The effects of birth control measures on sex and marriage.**
Author(s): Rao BK.
Source: J Indian Med Assoc. 1967 July; 49(1): 47-9. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=6074846&dopt=Abstract
- **The effects of gender and birth control pill use on spontaneous blink rates.**
Author(s): Yolton DP, Yolton RL, Lopez R, Bogner B, Stevens R, Rao D.
Source: J Am Optom Assoc. 1994 November; 65(11): 763-70.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=7822673&dopt=Abstract
- **The history and future of birth control.**
Author(s): Hardin G.
Source: Perspectives in Biology and Medicine. 1966 Autumn; 10(1): 1-18.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=6002666&dopt=Abstract
- **The identification of candidate antigens for the development of birth control vaccines. An international multi-centre study on antibodies to reproductive tract antigens, using clinically defined sera.**
Author(s): Hjort T, Griffin PD.
Source: Journal of Reproductive Immunology. 1985 December; 8(4): 271-8.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=2422369&dopt=Abstract
- **The lack of utopia in birth control.**
Author(s): Wendt WP.
Source: Nebr State Med J. 1969 December; 54(12): 806-9. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4242936&dopt=Abstract

- **The ovum, the uterus and birth control.**
Author(s): Nilsson O.
Source: Acta Eur Fertil. 1972 December; 3(4): 355-61. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4679730&dopt=Abstract
- **The pathology of birth control.**
Author(s): Craig JM.
Source: Arch Pathol. 1975 May; 99(5): 233-6. Review. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=1093536&dopt=Abstract
- **The physician's influence on the nonacceptance of birth control.**
Author(s): Wolf SR, Ferguson EL.
Source: American Journal of Obstetrics and Gynecology. 1969 July 1; 104(5): 752-7.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5788022&dopt=Abstract
- **The politics of birth control, 1920-1940: the impact of professionals.**
Author(s): Gordon L.
Source: International Journal of Health Services : Planning, Administration, Evaluation. 1975; 5(2): 253-77.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=1102468&dopt=Abstract
- **The politics of birth control.**
Author(s): Rosoff JI.
Source: Family Planning Perspectives. 1988 November-December; 20(6): 312-20, 297.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=3068073&dopt=Abstract
- **The problem of birth control.**
Author(s): Rankin E.
Source: R Soc Health J. 1972 April; 92(2): 81-4. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5070476&dopt=Abstract
- **The production and use of an attitudinal film in birth control education.**
Author(s): Herold ES.
Source: The Journal of School Health. 1978 May; 48(5): 307-10.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=77356&dopt=Abstract

- **The provision of birth control services to unwed minors: a national survey of physician attitudes and practices.**
Author(s): Boldt ED, Roberts LW, Latif AH.
Source: Canadian Journal of Public Health. Revue Canadienne De Sante Publique. 1982 November-December; 73(6): 392-5.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=7159851&dopt=Abstract
- **The relationship between barriers to birth control use and actual birth control use among Mexican-American adolescents.**
Author(s): Pesa JA, Mathews J.
Source: Adolescence. 2000 Winter; 35(140): 695-707.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=11214208&dopt=Abstract
- **The revolution in birth control practices of U.S. Roman Catholics.**
Author(s): Westoff CF, Bumpass L.
Source: Science. 1973 January 5; 179(68): 41-4.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4682130&dopt=Abstract
- **The rhetoric of reproduction and the reconfiguration of womanhood in the French birth control movement, 1890-1920.**
Author(s): Accampo EA.
Source: Journal of Family History. 1996; 21(3): 351-71.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=11613319&dopt=Abstract
- **The role of birth control in the survival of the human race.**
Author(s): Wiechert R.
Source: Angewandte Chemie (International Ed. in English). 1977 August; 16(8): 506-13.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=411386&dopt=Abstract
- **The safety and effectiveness of a new hysteroscopic method for permanent birth control: results of the first Essure pbc clinical study.**
Author(s): Kerin JF, Carignan CS, Cher D.
Source: The Australian & New Zealand Journal of Obstetrics & Gynaecology. 2001 November; 41(4): 364-70.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=11787907&dopt=Abstract
- **The secularization of U.S. Catholic birth control practices.**
Author(s): Westoff CF, Jones EF.
Source: Family Planning Perspectives. 1977 September-October; 9(5): 203-7.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=902714&dopt=Abstract

- **The status of state policies concerning birth control education.**
 Author(s): Parcel GS, Kenepf DL.
 Source: The Journal of School Health. 1972 December; 42(10): 614-7.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4485224&dopt=Abstract

- **The teenage birth control dilemma and public opinion.**
 Author(s): Blake J.
 Source: Science. 1973 May 18; 180(87): 708-12.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4702569&dopt=Abstract

- **The three levels of human life and death, the presumed location of the soul, and some of the implications for the social problems of abortion, birth control and euthanasia.**
 Author(s): Still JW.
 Source: Med Ann Dist Columbia. 1968 June; 37(6): 316-8. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=5241830&dopt=Abstract

- **The unmet need for birth control in five Asian countries.**
 Author(s): Westoff CF.
 Source: Family Planning Perspectives. 1978 May-June; 10(3): 173-81.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=658326&dopt=Abstract

- **The use of birth control pills in women with medical disorders.**
 Author(s): Decherney AH.
 Source: Clinical Obstetrics and Gynecology. 1981 September; 24(3): 965-75. Review.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=7026114&dopt=Abstract

- **The WHO birth control vaccine.**
 Author(s): Benagiano G.
 Source: The FASEB Journal : Official Publication of the Federation of American Societies for Experimental Biology. 1994 July; 8(10): 784-6.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=8050680&dopt=Abstract

- **Third World birth control--is it abortion? Drug combination gains support as alternative to surgical abortion.**
 Author(s): Soller PC.
 Source: Med Law. 1991; 10(3): 241-7.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=1943510&dopt=Abstract

- **Thomas Malthus (1766-1834): population growth and birth control.**
Author(s): Dunn PM.
Source: Archives of Disease in Childhood. Fetal and Neonatal Edition. 1998 January; 78(1): F76-7.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=9536847&dopt=Abstract
- **Topics in radiology/case of the month. Acute dyspnea in a young woman taking birth control pills.**
Author(s): Goffman TE, Bloom RL, Dvorak VC.
Source: Jama : the Journal of the American Medical Association. 1984 March 16; 251(11): 1465-6.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=6700044&dopt=Abstract
- **Transdermal contraceptive patch--a new birth control option.**
Author(s): Banerjee S.
Source: Issues Emerg Health Technol. 2001 November; (26): 1-4. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=11902225&dopt=Abstract
- **U.S. lags on birth control development.**
Author(s): Roberts L.
Source: Science. 1990 February 23; 247(4945): 909.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=2305259&dopt=Abstract
- **Unintended pregnancy and the risks/safety of birth control methods.**
Author(s): Klein L.
Source: Jogn Nurs. 1984 September-October; 13(5): 287-9. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=6566812&dopt=Abstract
- **Use of birth control pills and condoms among 17-19-year-old adolescents in Norway: contraceptive versus protective behaviour?**
Author(s): Traeen B, Lewin B, Sundet JM.
Source: Aids Care. 1992; 4(4): 371-80.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=1493144&dopt=Abstract
- **Use of birth control pills, condoms, and withdrawal among U.S. high school students.**
Author(s): Everett SA, Warren CW, Santelli JS, Kann L, Collins JL, Kolbe LJ.
Source: The Journal of Adolescent Health : Official Publication of the Society for Adolescent Medicine. 2000 August; 27(2): 112-8.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=10899471&dopt=Abstract

- **Use of drugs and intrauterine devices for birth control.**
 Author(s): Meeker CI.
 Source: The New England Journal of Medicine. 1969 May 8; 280(19): 1058-60.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4180710&dopt=Abstract
- **Use of hormonal methods of birth control among sexually active adolescent girls.**
 Author(s): Middleman AB, Robertson LM, DuRant RH, Chiou V, Emans SJ.
 Source: Journal of Pediatric and Adolescent Gynecology. 1997 November; 10(4): 193-8.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=9391901&dopt=Abstract
- **Use of matched pairs in evaluation of a birth control program.**
 Author(s): Okada LM.
 Source: Public Health Reports (Washington, D.C. : 1974). 1969 May; 84(5): 445-50.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=4976809&dopt=Abstract
- **Using film to inform nurses about teenagers and birth control.**
 Author(s): Herold ES, Thomas R.
 Source: Nurs Care. 1977 November; 10(11): 22-3. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=243180&dopt=Abstract
- **Vaccination for birth control.**
 Author(s): Dirnhofer S, Berger P.
 Source: International Archives of Allergy and Immunology. 1995 December; 108(4): 350-4. Review.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=7580307&dopt=Abstract
- **Which birth control pill should be prescribed?**
 Author(s): Speroff L.
 Source: Fertility and Sterility. 1976 September; 27(9): 997-1008. Review.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=786747&dopt=Abstract
- **Who has the right to advise children on birth control?**
 Author(s): Gerber P, Rahemtula A.
 Source: The Medical Journal of Australia. 1986 April 14; 144(8): 419-23.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=3959972&dopt=Abstract
- **Women's satisfaction with birth control.**
 Author(s): Rosenfeld JA, Zahorik PM, Saint W, Murphy G.
 Source: The Journal of Family Practice. 1993 February; 36(2): 169-73.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=8426136&dopt=Abstract

- **Women's satisfaction with birth control: a population survey of physical and psychological effects of oral contraceptives, intrauterine devices, condoms, natural family planning, and sterilization among 1466 women.**

Author(s): Oddens BJ.

Source: Contraception. 1999 May; 59(5): 277-86.

http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=10494480&dopt=Abstract

- **You and the law: teenagers, birth control and the nurse.**

Author(s): Sklar C.

Source: Can Nurse. 1978 November; 74(10): 14-6.

http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=251108&dopt=Abstract

CHAPTER 2. NUTRITION AND BIRTH CONTROL

Overview

In this chapter, we will show you how to find studies dedicated specifically to nutrition and birth control.

Finding Nutrition Studies on Birth Control

The National Institutes of Health's Office of Dietary Supplements (ODS) offers a searchable bibliographic database called the IBIDS (International Bibliographic Information on Dietary Supplements; National Institutes of Health, Building 31, Room 1B29, 31 Center Drive, MSC 2086, Bethesda, Maryland 20892-2086, Tel: 301-435-2920, Fax: 301-480-1845, E-mail: ods@nih.gov). The IBIDS contains over 460,000 scientific citations and summaries about dietary supplements and nutrition as well as references to published international, scientific literature on dietary supplements such as vitamins, minerals, and botanicals.⁷

As a service of the ODS, access to the IBIDS database is available free of charge at the following Web address: <http://ods.od.nih.gov/databases/ibids.html>. After entering the search area, you have three choices: (1) IBIDS Consumer Database, (2) Full IBIDS Database, or (3) Peer Reviewed Citations Only.

Now that you have selected a database, click on the "Advanced" tab. An advanced search allows you to retrieve up to 100 fully explained references in a comprehensive format. Type "birth control" (or synonyms) into the search box, and click "Go." To narrow the search, you can also select the "Title" field.

⁷ Adapted from <http://ods.od.nih.gov>. IBIDS is produced by the Office of Dietary Supplements (ODS) at the National Institutes of Health to assist the public, healthcare providers, educators, and researchers in locating credible, scientific information on dietary supplements. IBIDS was developed and will be maintained through an interagency partnership with the Food and Nutrition Information Center of the National Agricultural Library, U.S. Department of Agriculture.

The following information is typical of that found when using the “Full IBIDS Database” to search for “birth control” (or a synonym):

- **Third World birth control--is it abortion? Drug combination gains support as alternative to surgical abortion.**
Source: Soller, P C Med-Law. 1991; 10(3): 241-7 0723-1393

Federal Resources on Nutrition

In addition to the IBIDS, the United States Department of Health and Human Services (HHS) and the United States Department of Agriculture (USDA) provide many sources of information on general nutrition and health. Recommended resources include:

- healthfinder®, HHS’s gateway to health information, including diet and nutrition: <http://www.healthfinder.gov/scripts/SearchContext.asp?topic=238&page=0>
- The United States Department of Agriculture’s Web site dedicated to nutrition information: www.nutrition.gov
- The Food and Drug Administration’s Web site for federal food safety information: www.foodsafety.gov
- The National Action Plan on Overweight and Obesity sponsored by the United States Surgeon General: <http://www.surgeongeneral.gov/topics/obesity/>
- The Center for Food Safety and Applied Nutrition has an Internet site sponsored by the Food and Drug Administration and the Department of Health and Human Services: <http://vm.cfsan.fda.gov/>
- Center for Nutrition Policy and Promotion sponsored by the United States Department of Agriculture: <http://www.usda.gov/cnpp/>
- Food and Nutrition Information Center, National Agricultural Library sponsored by the United States Department of Agriculture: <http://www.nal.usda.gov/fnic/>
- Food and Nutrition Service sponsored by the United States Department of Agriculture: <http://www.fns.usda.gov/fns/>

Additional Web Resources

A number of additional Web sites offer encyclopedic information covering food and nutrition. The following is a representative sample:

- AOL: <http://search.aol.com/cat.adp?id=174&layer=&from=subcats>
- Family Village: http://www.familyvillage.wisc.edu/med_nutrition.html
- Google: <http://directory.google.com/Top/Health/Nutrition/>
- Healthnotes: <http://www.healthnotes.com/>
- Open Directory Project: <http://dmoz.org/Health/Nutrition/>
- Yahoo.com: <http://dir.yahoo.com/Health/Nutrition/>
- WebMD® Health: <http://my.webmd.com/nutrition>

- WholeHealthMD.com: <http://www.wholehealthmd.com/reflib/0,1529,,00.html>

The following is a specific Web list relating to birth control; please note that any particular subject below may indicate either a therapeutic use, or a contraindication (potential danger), and does not reflect an official recommendation (some Web sites are subscription based):

- **Vitamins**

- **Ascorbic Acid**

- Alternative names: Vitamin C (Ascorbic Acid)

- Source: Integrative Medicine Communications; www.drkoop.com

- **Folic Acid**

- Source: Healthnotes, Inc. www.healthnotes.com

- **Folic Acid**

- Alternative names: Vitamin B9 (Folic Acid)

- Source: Integrative Medicine Communications; www.drkoop.com

- **Niacin**

- Source: Integrative Medicine Communications; www.drkoop.com

- **Pyridoxine**

- Alternative names: Vitamin B6 (Pyridoxine)

- Source: Integrative Medicine Communications; www.drkoop.com

- **Riboflavin**

- Alternative names: Vitamin B2 (Riboflavin)

- Source: Integrative Medicine Communications; www.drkoop.com

- **Riboflavin (vitamin B2)**

- Source: WholeHealthMD.com, LLC. www.wholehealthmd.com

- Hyperlink:

- http://www.wholehealthmd.com/refshelf/substances_view/0,1525,895,00.html

- **Vitamin A**

- Source: Healthnotes, Inc. www.healthnotes.com

- **Vitamin A**

- Source: WholeHealthMD.com, LLC. www.wholehealthmd.com

- Hyperlink:

- http://www.wholehealthmd.com/refshelf/substances_view/0,1525,10066,00.html

- **Vitamin B**

- Source: WholeHealthMD.com, LLC. www.wholehealthmd.com

- Hyperlink:

- http://www.wholehealthmd.com/refshelf/substances_view/0,1525,10067,00.html

- **Vitamin B1**

- Source: Healthnotes, Inc. www.healthnotes.com

Vitamin B12

Source: Healthnotes, Inc. www.healthnotes.com

Vitamin B2

Source: Healthnotes, Inc. www.healthnotes.com

Vitamin B2

Source: Prima Communications, Inc. www.personalhealthzone.com

Vitamin B2 (Riboflavin)

Alternative names: Riboflavin

Source: Integrative Medicine Communications; www.drkoop.com

Vitamin B3

Source: Healthnotes, Inc. www.healthnotes.com

Vitamin B3 (Niacin)

Source: Integrative Medicine Communications; www.drkoop.com

Vitamin B6

Source: Healthnotes, Inc. www.healthnotes.com

Vitamin B6 (Pyridoxine)

Alternative names: Pyridoxine

Source: Integrative Medicine Communications; www.drkoop.com

Vitamin B9 (Folic Acid)

Alternative names: Folate

Source: Integrative Medicine Communications; www.drkoop.com

Vitamin C

Source: Healthnotes, Inc. www.healthnotes.com

Vitamin C (Ascorbic Acid)

Alternative names: Ascorbic Acid

Source: Integrative Medicine Communications; www.drkoop.com

Vitamin E

Alternative names: Alpha-Tocopherol, Beta-Tocopherol, D-Alpha-Tocopherol, Delta-Tocopherol, Gamma-Tocopherol

Source: Integrative Medicine Communications; www.drkoop.com

- **Minerals**

Alpha-Tocopherol

Alternative names: Vitamin E

Source: Integrative Medicine Communications; www.drkoop.com

Beta-Tocopherol

Alternative names: Vitamin E

Source: Integrative Medicine Communications; www.drkoop.com

Calcium

Source: Healthnotes, Inc. www.healthnotes.com

Copper

Source: Healthnotes, Inc. www.healthnotes.com

Copper

Source: Integrative Medicine Communications; www.drkoop.com

D-Alpha-Tocopherol

Alternative names: Vitamin E

Source: Integrative Medicine Communications; www.drkoop.com

Delta-Tocopherol

Alternative names: Vitamin E

Source: Integrative Medicine Communications; www.drkoop.com

Folate

Alternative names: Vitamin B9 (Folic Acid)

Source: Integrative Medicine Communications; www.drkoop.com

Folate

Source: Prima Communications, Inc. www.personalhealthzone.com

Gamma-Tocopherol

Source: Integrative Medicine Communications; www.drkoop.com

Gamma-Tocopherol

Alternative names: Vitamin E

Source: Integrative Medicine Communications; www.drkoop.com

Iodine

Source: Integrative Medicine Communications; www.drkoop.com

Iron

Source: Healthnotes, Inc. www.healthnotes.com

Iron

Alternative names: Ferrous Sulfate

Source: Integrative Medicine Communications; www.drkoop.com

Magnesium

Source: Healthnotes, Inc. www.healthnotes.com

Magnesium

Source: Prima Communications, Inc. www.personalhealthzone.com

Manganese

Source: Healthnotes, Inc. www.healthnotes.com

Manganese

Source: Prima Communications, Inc. www.personalhealthzone.com

Retinol

Alternative names: Vitamin A (Retinol)

Source: Integrative Medicine Communications; www.drkoop.com

Retinol

Source: Integrative Medicine Communications; www.drkoop.com

Vitamin A (Retinol)

Source: Integrative Medicine Communications; www.drkoop.com

Vitamin A (Retinol)

Alternative names: Retinol

Source: Integrative Medicine Communications; www.drkoop.com

Zinc

Source: Healthnotes, Inc. www.healthnotes.com

Zinc

Source: Integrative Medicine Communications; www.drkoop.com

- **Food and Diet**

Ferrous Sulfate

Source: Integrative Medicine Communications; www.drkoop.com

Ferrous Sulfate

Alternative names: Iron

Source: Integrative Medicine Communications; www.drkoop.com

CHAPTER 3. ALTERNATIVE MEDICINE AND BIRTH CONTROL

Overview

In this chapter, we will begin by introducing you to official information sources on complementary and alternative medicine (CAM) relating to birth control. At the conclusion of this chapter, we will provide additional sources.

National Center for Complementary and Alternative Medicine

The National Center for Complementary and Alternative Medicine (NCCAM) of the National Institutes of Health (<http://nccam.nih.gov/>) has created a link to the National Library of Medicine's databases to facilitate research for articles that specifically relate to birth control and complementary medicine. To search the database, go to the following Web site: <http://www.nlm.nih.gov/nccam/camonpubmed.html>. Select "CAM on PubMed." Enter "birth control" (or synonyms) into the search box. Click "Go." The following references provide information on particular aspects of complementary and alternative medicine that are related to birth control:

- **"Not thrush again!" Women's experience of post-antibiotic vulvovaginitis.**
Author(s): Pirootta MV, Gunn JM, Chondros P.
Source: The Medical Journal of Australia. 2003 July 7; 179(1): 43-6.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12831384&dopt=Abstract
- **"Spoiling the womb": definitions, aetiologies and responses to infertility in north west province, Cameroon.**
Author(s): Richards SC.
Source: Afr J Reprod Health. 2002 April; 6(1): 84-94.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12476732&dopt=Abstract
- **"Theater of light". IEC.**
Author(s): Arca Ra Jr.

Source: *Integration*. 1998 Spring; (55): 14-5.

http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12294068&dopt=Abstract

- **(Re)defining reproductive health with and for the community: an example of participatory research from Mali.**
Author(s): Castle S, Traore S, Cisse L.
Source: *Afr J Reprod Health*. 2002 April; 6(1): 20-31.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12476726&dopt=Abstract
- **Age-old methods of contraception.**
Author(s): Guerrero AM.
Source: *Initiatives Popul*. 1977 March; 3(1): 20-5.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12309378&dopt=Abstract
- **Birth control techniques in China.**
Author(s): Xiao B, Wang M.
Source: *China Popul Newsl*. 1983 December; 1(2): 1-7.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12312957&dopt=Abstract
- **Breastfeeding as a means of contraception.**
Author(s): Diaz CA.
Source: *Initiatives Popul*. 1983; 7(3): 16-22.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12339840&dopt=Abstract
- **Comparative study on the acceptance and use of contraceptive methods in a rural population in Kelantan.**
Author(s): Kamalanathan JP.
Source: *Malays J Reprod Health*. 1990 December; 8(2): 66-71.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12343150&dopt=Abstract
- **Contraception. Playing a responsible game.**
Author(s): Hastings-Asatourian B.
Source: *Pract Midwife*. 2002 October; 5(9): 32-4. No Abstract Available.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12400415&dopt=Abstract
- **Contraceptive method switching in Peninsular Malaysia: ethnic differences, 1940s-1970s.**
Author(s): Davanzo J, Starbird E, Reboussin D, Tan Boon Ann, Abdullah SH.
Source: *Malays J Reprod Health*. 1988 June; 6(1): 1-21.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12281591&dopt=Abstract

- **Control of physiological phenomena via hypnosis with special reference to contraception.**
 Author(s): Perry BJ.
 Source: Aust J Clin Hypnother. 1980 September; 1(2): 73-7.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12339307&dopt=Abstract

- **Developments in male contraception.**
 Author(s): Bialy G, Alexander NJ.
 Source: Health Sex. 1992 Fall; 3(2): 10-1.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12286189&dopt=Abstract

- **Efficacy of Contrasperm as a male contraceptive: clinical trials in Malaysian men.**
 Author(s): Hamid A, Jaffar A.
 Source: Malays J Reprod Health. 1983 January; 1(1): 75-82.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12279893&dopt=Abstract

- **Folklore information from Assam for family planning and birth control.**
 Author(s): Tiwari KC, Majumder R, Bhattacharjee S.
 Source: Int J Crude Drug Res. 1982 November; 20(3): 133-7.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12266264&dopt=Abstract

- **Herbal contraceptives: exploring indigenous methods of family planning.**
 Author(s): Quijano Nv Jr.
 Source: Initiatives Popul. 1986; 8(2): 22, 31-35.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12280742&dopt=Abstract

- **Interactions of the oral contraceptive pill with antibiotics and St John's work: knowledge of female college students.**
 Author(s): Hindmarch M, Oakeshott P.
 Source: Family Practice. 2002 December; 19(6): 708.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12429683&dopt=Abstract

- **Medicinal plants: conception / contraception.**
 Author(s): Chaing HS, Merino-chavez G, Yang LL, Wang FN, Hafez ES.
 Source: Adv Contracept Deliv Syst. 1994; 10(3-4): 355-63.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12287843&dopt=Abstract

- **New IPPF statement on breast feeding, fertility and post-partum contraception.**
 Author(s): International Planned Parenthood Federation IPPF. International Medical Advisory Panel IMAP.

Source: Ippf Med Bull. 1990 April; 24(2): 2-4.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12316284&dopt=Abstract

- **New progress in research on contraceptive technology.**
Author(s): Han S.
Source: China Popul Newsl. 1986 February; 3(1): 3-6.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12268508&dopt=Abstract
- **No coercion in birth control.**
Author(s): Desai SM.
Source: Swasth Hind. 1979 July; : 178-9.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12261735&dopt=Abstract
- **Plants used as means of abortion, contraception, sterilization and fecundation by Paraguayan indigenous people.**
Author(s): Arenas P, Moreno Azorero R.
Source: Econ Bot. 1977 July-September; 31(3): 302-6.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12335641&dopt=Abstract
- **Prostaglandins: the once-a-month birth control pill of the future.**
Author(s): Portoghese PS.
Source: Minn Pharm. 1972 March; 26(6): 8-9.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12311415&dopt=Abstract
- **Reproductive knowledge, sexual behaviour and contraceptive use among adolescents in Niger State of Nigeria.**
Author(s): Sunmola AM, Dipeolu M, Babalola S, Adebayo OD.
Source: Afr J Reprod Health. 2003 April; 7(1): 37-48.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12816312&dopt=Abstract
- **Reproductive, sexual and contraceptive behaviour of adolescents in Niger State, Nigeria.**
Author(s): Sunmola AM, Dipeolu M, Babalola S, Otu AD.
Source: Afr J Reprod Health. 2002 December; 6(3): 82-92.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12685412&dopt=Abstract
- **Romanian FPA (SECS) starts sexual and contraceptive consultations on the Black Sea coast.**
Author(s): Vinereanu D.
Source: Plan Parent Eur. 1991 May; 20(1): 24-5.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12343176&dopt=Abstract

- **Statement on breast feeding, fertility and contraception.**
Author(s): International Planned Parenthood Federation IPPF. International Medical Advisory Panel IMAP.
Source: Ippf Med Bull. 1987 December; 21(6): 5-6.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12268854&dopt=Abstract
- **The “new” contraceptive method of breastfeeding.**
Author(s): Townsend S.
Source: Network (Bristol, England). 1992 October; 13(2): 4-9.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12286083&dopt=Abstract
- **The impact of the Navrongo Project on contraceptive knowledge and use, reproductive preferences, and fertility.**
Author(s): Debpuur C, Phillips JF, Jackson EF, Nazzar A, Ngom P, Binka FN.
Source: Stud Fam Plann. 2002 June; 33(2): 141-64.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12132635&dopt=Abstract
- **The myth about contraceptives and breast cancer.**
Author(s): Ibekwe J.
Source: Dly Times. 1993 March 18; : 7.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12179509&dopt=Abstract
- **The Subanen of Zamboanga del Sur. Said to be the first tribe to practise birth control.**
Author(s): Daligang H.
Source: Popul Forum. 1981; 7(4): 9-12.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12338244&dopt=Abstract
- **Young people's contraception and sexual health: report of a local needs assessment in Staveley, North Derbyshire.**
Author(s): Smith A.
Source: The Journal of Family Planning and Reproductive Health Care / Faculty of Family Planning & Reproductive Health Care, Royal College of Obstetricians & Gynaecologists. 2001 January; 27(1): 29-31.
http://www.ncbi.nlm.nih.gov:80/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=12457544&dopt=Abstract

Additional Web Resources

A number of additional Web sites offer encyclopedic information covering CAM and related topics. The following is a representative sample:

- Alternative Medicine Foundation, Inc.: <http://www.herbmed.org/>
- AOL: <http://search.aol.com/cat.adp?id=169&layer=&from=subcats>

- Chinese Medicine: <http://www.newcenturynutrition.com/>
- drkoop.com[®]: <http://www.drkoop.com/InteractiveMedicine/IndexC.html>
- Family Village: http://www.familyvillage.wisc.edu/med_altn.htm
- Google: <http://directory.google.com/Top/Health/Alternative/>
- Healthnotes: <http://www.healthnotes.com/>
- MedWebPlus:
http://medwebplus.com/subject/Alternative_and_Complementary_Medicine
- Open Directory Project: <http://dmoz.org/Health/Alternative/>
- HealthGate: <http://www.tnp.com/>
- WebMD[®]Health: http://my.webmd.com/drugs_and_herbs
- WholeHealthMD.com: <http://www.wholehealthmd.com/reflib/0,1529,,00.html>
- Yahoo.com: http://dir.yahoo.com/Health/Alternative_Medicine/

The following is a specific Web list relating to birth control; please note that any particular subject below may indicate either a therapeutic use, or a contraindication (potential danger), and does not reflect an official recommendation (some Web sites are subscription based):

- **General Overview**

- Abnormal Pap Smear**

- Source: Healthnotes, Inc. www.healthnotes.com

- Acne**

- Source: Integrative Medicine Communications; www.drkoop.com

- Acne Vulgaris**

- Source: Healthnotes, Inc. www.healthnotes.com

- Amenorrhea**

- Source: Healthnotes, Inc. www.healthnotes.com

- Amenorrhea**

- Source: Integrative Medicine Communications; www.drkoop.com

- Birth Defects Prevention**

- Source: Healthnotes, Inc. www.healthnotes.com

- Breast Cancer**

- Source: Healthnotes, Inc. www.healthnotes.com

- Breast Cancer**

- Source: Integrative Medicine Communications; www.drkoop.com

- Candida/Yeast Hypersensitivity Syndrome**

- Source: Prima Communications, Inc. www.personalhealthzone.com

Cervical Dysplasia

Source: Integrative Medicine Communications; www.drkoop.com

Cervical Dysplasia

Source: Prima Communications, Inc. www.personalhealthzone.com

Colds and Flu

Source: Prima Communications, Inc. www.personalhealthzone.com

Depression

Source: Healthnotes, Inc. www.healthnotes.com

Depression

Source: Integrative Medicine Communications; www.drkoop.com

Depression (Mild to Moderate)

Source: Prima Communications, Inc. www.personalhealthzone.com

Diabetes

Source: Healthnotes, Inc. www.healthnotes.com

Dysmenorrhea

Source: Healthnotes, Inc. www.healthnotes.com

Dysmenorrhea

Source: Integrative Medicine Communications; www.drkoop.com

Dysmenorrhea

Alternative names: Painful Menstruation

Source: Prima Communications, Inc. www.personalhealthzone.com

Endometriosis

Source: Healthnotes, Inc. www.healthnotes.com

Endometriosis

Source: Integrative Medicine Communications; www.drkoop.com

Erythema

Source: Integrative Medicine Communications; www.drkoop.com

Fibrocystic Breast Disease

Source: Healthnotes, Inc. www.healthnotes.com

Gallstones

Source: Healthnotes, Inc. www.healthnotes.com

Hair Disorders

Source: Integrative Medicine Communications; www.drkoop.com

Hair Growth, Excessive

Source: Integrative Medicine Communications; www.drkoop.com

Heart Attack

Source: Integrative Medicine Communications; www.drkoop.com

High Blood Pressure

Source: Integrative Medicine Communications; www.drkoop.com

High Cholesterol

Source: Integrative Medicine Communications; www.drkoop.com

Hirsutism

Source: Integrative Medicine Communications; www.drkoop.com

Hypercholesterolemia

Source: Integrative Medicine Communications; www.drkoop.com

Hypertension

Source: Integrative Medicine Communications; www.drkoop.com

Hypochondriasis

Source: Integrative Medicine Communications; www.drkoop.com

Lupus

Source: Integrative Medicine Communications; www.drkoop.com

Menorrhagia

Source: Healthnotes, Inc. www.healthnotes.com

Menstrual Pain

Source: Integrative Medicine Communications; www.drkoop.com

Menstruation, Absence of

Source: Integrative Medicine Communications; www.drkoop.com

Migraine Headaches

Source: Healthnotes, Inc. www.healthnotes.com

Myocardial Infarction

Source: Integrative Medicine Communications; www.drkoop.com

Pelvic Inflammatory Disease

Source: Integrative Medicine Communications; www.drkoop.com

PMS

Alternative names: Premenstrual Stress Syndrome

Source: Prima Communications, Inc. www.personalhealthzone.com

Premenstrual Syndrome

Source: Healthnotes, Inc. www.healthnotes.com

Raynaud's Disease

Source: Healthnotes, Inc. www.healthnotes.com

Skin Disorders, Erythema

Source: Integrative Medicine Communications; www.drkoop.com

Stroke

Source: Integrative Medicine Communications; www.drkoop.com

Systemic Lupus Erythematosus

Source: Integrative Medicine Communications; www.drkoop.com

Urinary Tract Infection in Women

Source: Integrative Medicine Communications; www.drkoop.com

UTI

Source: Integrative Medicine Communications; www.drkoop.com

Vaginal Inflammation

Source: Integrative Medicine Communications; www.drkoop.com

Vaginitis

Source: Healthnotes, Inc. www.healthnotes.com

Vaginitis

Source: Integrative Medicine Communications; www.drkoop.com

Viral Hepatitis

Source: Prima Communications, Inc. www.personalhealthzone.com

Yeast Infection

Source: Healthnotes, Inc. www.healthnotes.com

- **Alternative Therapy**

Cosmo-biological birth control

Source: The Canoe version of A Dictionary of Alternative-Medicine Methods, by
Priorities for Health editor Jack Raso, M.S., R.D.

Hyperlink: <http://www.canoe.ca/AltmedDictionary/c.html>

Kulkarni Naturopathy

Source: The Canoe version of A Dictionary of Alternative-Medicine Methods, by
Priorities for Health editor Jack Raso, M.S., R.D.

Hyperlink: <http://www.canoe.ca/AltmedDictionary/k.html>

- **Herbs and Supplements**

Aloe

Alternative names: Aloe vera, Aloe barbadensis, Aloe ferox , Aloe Vera

Source: Integrative Medicine Communications; www.drkoop.com

Aloe Vera

Source: Integrative Medicine Communications; www.drkoop.com

Andrographis

Source: Prima Communications, Inc. www.personalhealthzone.com

Angelica sinensis

Alternative names: Dong Quai

Source: Integrative Medicine Communications; www.drkoop.com

Angelica sinensis

Source: Integrative Medicine Communications; www.drkoop.com

Black cohosh

Source: WholeHealthMD.com, LLC. www.wholehealthmd.com

Hyperlink:

http://www.wholehealthmd.com/refshelf/substances_view/0,1525,10009,00.html

Carotenoids

Source: WholeHealthMD.com, LLC. www.wholehealthmd.com

Hyperlink:

http://www.wholehealthmd.com/refshelf/substances_view/0,1525,763,00.html

Cat's Claw

Alternative names: Uncaria tomentosa

Source: Healthnotes, Inc. www.healthnotes.com

Cat's Claw

Source: Prima Communications, Inc. www.personalhealthzone.com

Chaste Tree

Source: The Canadian Internet Directory for Holistic Help, WellNet, Health and Wellness Network; www.wellnet.ca

Chasteberry

Source: Prima Communications, Inc. www.personalhealthzone.com

Chasteberry

Source: WholeHealthMD.com, LLC. www.wholehealthmd.com

Hyperlink:

http://www.wholehealthmd.com/refshelf/substances_view/0,1525,767,00.html

Chinese Angelica

Alternative names: Dong Quai

Source: Integrative Medicine Communications; www.drkoop.com

Danggui

Alternative names: Angelica sinensis, Chinese Angelica, Dang Gui, Danngui, Dong Qua, Tang Kuei, Tan Kue Bai zhi (Note: Dong quai should not be confused with Angelica root or Angelica seed.)

Source: Integrative Medicine Communications; www.drkoop.com

Danggui

Alternative names: Dong Quai

Source: Integrative Medicine Communications; www.drkoop.com

Dioscorea villosa

Source: Integrative Medicine Communications; www.drkoop.com

Dong Quai

Alternative names: Angelica sinensis, Chinese Angelica, Dang Gui, Danngui, Dong Qua, Tang Kuei, Tan Kue Bai zhi (Note: Dong quai should not be confused with Angelica root or Angelica seed.)

Source: Integrative Medicine Communications; www.drkoop.com

Estradiol

Source: Healthnotes, Inc. www.healthnotes.com

Estrogen

Source: Prima Communications, Inc. www.personalhealthzone.com

Estrogens

Source: Healthnotes, Inc. www.healthnotes.com

Estrogens (Combined)

Source: Healthnotes, Inc. www.healthnotes.com

False unicorn root

Source: WholeHealthMD.com, LLC. www.wholehealthmd.com

Hyperlink:

http://www.wholehealthmd.com/refshelf/substances_view/0,1525,10075,00.html

Glycyrrhiza glabra

Alternative names: Licorice

Source: Integrative Medicine Communications; www.drkoop.com

Hypericum perforatum

Alternative names: St. John's Wort

Source: Integrative Medicine Communications; www.drkoop.com

Klamathweed

Alternative names: St. John's Wort

Source: Integrative Medicine Communications; www.drkoop.com

Lepidium meyenii

Alternative names: Maca; Lepidium meyenii Walp.

Source: Alternative Medicine Foundation, Inc. www.amfoundation.org

Hyperlink: <http://www.herbmed.org/>

Lepidium sp

Alternative names: Cress; Lepidium sp.

Source: Alternative Medicine Foundation, Inc. www.amfoundation.org

Hyperlink: <http://www.herbmed.org/>

Licorice

Alternative names: Glycyrrhiza glabra, Spanish Licorice
Source: Integrative Medicine Communications; www.drkoop.com

Medroxyprogesterone

Source: Healthnotes, Inc. www.healthnotes.com

Melatonin

Source: WholeHealthMD.com, LLC. www.wholehealthmd.com
Hyperlink:
http://www.wholehealthmd.com/refshelf/substances_view/0,1525,804,00.html

Milk Thistle

Source: Prima Communications, Inc. www.personalhealthzone.com

Monophasic, Biphasic, and Triphasic Preparations

Source: Integrative Medicine Communications; www.drkoop.com

Oral Contraceptives

Source: Healthnotes, Inc. www.healthnotes.com

Oral Contraceptives

Source: Prima Communications, Inc. www.personalhealthzone.com

Phenytoin

Alternative names: Dilantin Infatab, Dilantin-125 Oral Suspension
Source: Prima Communications, Inc. www.personalhealthzone.com

Phytolacca

Alternative names: Poke root, Endod; Phytolacca dodecandra L.
Source: Alternative Medicine Foundation, Inc. www.amfoundation.org
Hyperlink: <http://www.herbmed.org/>

Progesterone

Source: Healthnotes, Inc. www.healthnotes.com

Red Clover

Alternative names: Trifolium pratense , beebread, cow clover, cow grass, meadow clover, purple clover
Source: Integrative Medicine Communications; www.drkoop.com

Red Clover

Source: Prima Communications, Inc. www.personalhealthzone.com

SAMe (S-Adenosylmethionine)

Source: Prima Communications, Inc. www.personalhealthzone.com

Spanish Licorice

Alternative names: Licorice
Source: Integrative Medicine Communications; www.drkoop.com

St. John's Wort

Alternative names: Hypericum perforatum, Klamathweed

Source: Integrative Medicine Communications; www.drkoop.com

St. John's Wort

Source: Prima Communications, Inc. www.personalhealthzone.com

St. John's wort

Source: WholeHealthMD.com, LLC. www.wholehealthmd.com

Hyperlink:

http://www.wholehealthmd.com/refshelf/substances_view/0,1525,824,00.html

Stevia

Alternative names: Sweetleaf; Stevia rebaudiana Bertoni

Source: Alternative Medicine Foundation, Inc. www.amfoundation.org

Hyperlink: <http://www.herbmed.org/>

Tanacetum v

Alternative names: Tansy; Tanacetum vulgare (L.)

Source: Alternative Medicine Foundation, Inc. www.amfoundation.org

Hyperlink: <http://www.herbmed.org/>

Tang Kuei

Alternative names: Dong Quai

Source: Integrative Medicine Communications; www.drkoop.com

Tang Kuei

Source: Integrative Medicine Communications; www.drkoop.com

Terminalia

Alternative names: Myrobalans; Terminalia arjuna

Source: Alternative Medicine Foundation, Inc. www.amfoundation.org

Hyperlink: <http://www.herbmed.org/>

Trigonella

Alternative names: Fenugreek; Trigonella foenum graecum L.

Source: Alternative Medicine Foundation, Inc. www.amfoundation.org

Hyperlink: <http://www.herbmed.org/>

Wild yam

Alternative names: Dioscorea villosa

Source: Integrative Medicine Communications; www.drkoop.com

Wild Yam

Source: Prima Communications, Inc. www.personalhealthzone.com

Wild Yam

Source: The Canadian Internet Directory for Holistic Help, WellNet, Health and Wellness Network; www.wellnet.ca

General References

A good place to find general background information on CAM is the National Library of Medicine. It has prepared within the MEDLINEplus system an information topic page dedicated to complementary and alternative medicine. To access this page, go to the MEDLINEplus site at <http://www.nlm.nih.gov/medlineplus/alternativemedicine.html>. This Web site provides a general overview of various topics and can lead to a number of general sources.

CHAPTER 4. DISSERTATIONS ON BIRTH CONTROL

Overview

In this chapter, we will give you a bibliography on recent dissertations relating to birth control. We will also provide you with information on how to use the Internet to stay current on dissertations. **IMPORTANT NOTE:** When following the search strategy described below, you may discover non-medical dissertations that use the generic term “birth control” (or a synonym) in their titles. To accurately reflect the results that you might find while conducting research on birth control, we have not necessarily excluded non-medical dissertations in this bibliography.

Dissertations on Birth Control

ProQuest Digital Dissertations, the largest archive of academic dissertations available, is located at the following Web address: <http://wwwlib.umi.com/dissertations>. From this archive, we have compiled the following list covering dissertations devoted to birth control. You will see that the information provided includes the dissertation’s title, its author, and the institution with which the author is associated. The following covers recent dissertations found when using this search procedure:

- **A Comparison of Ever-pregnant and Never-pregnant Adolescents on Manifest Needs and Field-dependence - Independence (contraception, Black Females)** by Harper, Charlyn Alaine, Phd from Georgia State University, 1986, 199 pages
<http://wwwlib.umi.com/dissertations/fullcit/8616277>
- **A Cost-effectiveness Study of Clinical Methods of Birth Control** by Kelly, William John, Phd from Rice University, 1971, 190 pages
<http://wwwlib.umi.com/dissertations/fullcit/7126305>
- **A Discernment Model for the Ethics of Birth Control: an Application of a Narrative Method with Critical Observations** by Mccarthy, Jeremiah Joseph, Phd from Graduate Theological Union, 1985, 271 pages
<http://wwwlib.umi.com/dissertations/fullcit/8529994>

- **'A Great Thing for Poor Folks': Birth Control, Sterilization, and Abortion in Public Health and Welfare in the Twentieth Century** by Schoen, Johanna, Phd from The University of North Carolina at Chapel Hill, 1996, 267 pages
<http://wwwlib.umi.com/dissertations/fullcit/9631980>
- **A Model of Births for Developing Countries and Its Use in the Study of the Demographic Effect of Birth Control.** by Bendel, Jean-pierre, Phd from Carnegiemellon University, 1978, 194 pages
<http://wwwlib.umi.com/dissertations/fullcit/7814379>
- **A Qualitative Examination of the Attitudes of Unmarried, Heterosexual Women Aged 18--25 toward Barrier Birth Control** by Sicard, Erin Kristine; Psyd from Alliant International University, San Diego, 2003, 160 pages
<http://wwwlib.umi.com/dissertations/fullcit/3080400>
- **A Study of Birth Control Information in College Textbooks Dealing with Human Sexuality.** by Conn, Frances E. G., Edd from The American University, 1977, 223 pages
<http://wwwlib.umi.com/dissertations/fullcit/7714614>
- **A Study of the Historical Development and Contemporary Use of Arguments in the Birth Control Controversy Within the Roman Catholic Church.** by Baker, James Warren, Edd from Columbia University, 1974, 182 pages
<http://wwwlib.umi.com/dissertations/fullcit/7418711>
- **A Study of the Perceptions of Middle School Girls Regarding the Factors Which Influence Their Knowledge, Attitudes and Behaviors Concerning the Use or the Non-use of Contraceptives** by Hines-harris, Julia, Edd from University of Pennsylvania, 1985, 398 pages
<http://wwwlib.umi.com/dissertations/fullcit/8611012>
- **Abortion before Birth Control: the Politics of Reproduction in Postwar Japan** by Norgren, Christiana A. E., Phd from Columbia University, 1998, 320 pages
<http://wwwlib.umi.com/dissertations/fullcit/9838995>
- **Adolescent Attitudes towards Parental Sex Roles, Family Size, and Birth Control** by Metcalf-whittaker, Marilyn, Phd from The University of North Carolina at Chapel Hill, 1996, 95 pages
<http://wwwlib.umi.com/dissertations/fullcit/9631956>
- **Adolescent Contraceptive Problem-solving Skills and Contraceptive Behavior: the Relation of Cognitive Level, Locus of Control, Self-esteem and Peer Influence** by Saravalli, Susan K., Phd from The Ohio State University, 1989, 265 pages
<http://wwwlib.umi.com/dissertations/fullcit/9014480>
- **Adolescents and Birth Control: a Study of Oral Contraceptive Use** by Balassone, Mary Lou, Dsw from University of California, Berkeley, 1987, 240 pages
<http://wwwlib.umi.com/dissertations/fullcit/8726121>
- **Adolescents' Knowledge of How to Use Contraceptives** by Myers-bowman, Karen Sue, Phd from Purdue University, 1994, 148 pages
<http://wwwlib.umi.com/dissertations/fullcit/9513033>
- **An Analysis of the Allocation of the Resources of Birth Control Programs** by Lawrence, Charles Edward, Phd from Cornell University, 1971, 148 pages
<http://wwwlib.umi.com/dissertations/fullcit/7127385>
- **An Analysis of the Relationship between the Values of Sexual Regulation, Male Dominance, and Motherhood, and Mexican-american Women's Attitudes,**

- Knowledge, and Usage of Birth Control** by Ortiz, Silvia Maria, Phd from University of California, Santa Barbara, 1987, 128 pages
<http://wwwlib.umi.com/dissertations/fullcit/8803875>
- **An Evaluation of a Program to Investigate Four Views of Birth Control (contraception Education)** by Hornok, Richard John, Dmin from Dallas Theological Seminary, 1993, 171 pages
<http://wwwlib.umi.com/dissertations/fullcit/9322321>
 - **'an Uncommonly Silly Law': the Connecticut Birth Control Cases in the U.s. Supreme Court** by Pollack, Harriet, Phd from Columbia University, 1967, 240 pages
<http://wwwlib.umi.com/dissertations/fullcit/6714080>
 - **Analysis of a Peer Contraception Education Program Based on the Health Belief Model** by Jorgensen, Cheryl Marie, Phd from The Pennsylvania State University, 1982, 127 pages
<http://wwwlib.umi.com/dissertations/fullcit/8305656>
 - **Associations of Birth Control Knowledge, Attitude, and Practice with Mass Media Contact/program Preference in South Teheran, Iran.** by Jordan, Michael Cushing, Phd from Indiana University, 1978, 281 pages
<http://wwwlib.umi.com/dissertations/fullcit/7906714>
 - **'better Babies': the Arkansas Birth Control Movement during the 1930s (eugenics)** by Leung, Marianne, Phd from The University of Memphis, 1996, 240 pages
<http://wwwlib.umi.com/dissertations/fullcit/9633860>
 - **Birth Control and the American Imagination: Textual Con(tra)ceptions, 1914--1944** by Capo, Beth Widmaier; Phd from The Pennsylvania State University, 2001, 310 pages
<http://wwwlib.umi.com/dissertations/fullcit/3036012>
 - **Birth Control Behavior of Young, Unmarried Women** by Lindemann, Constance, Phd from University of California, Los Angeles, 1972, 192 pages
<http://wwwlib.umi.com/dissertations/fullcit/7310444>
 - **Birth Control in an Econometric Simulation Model.** by Sommers, Paul Martin, Phd from University of California, San Diego, 1976, 167 pages
<http://wwwlib.umi.com/dissertations/fullcit/7620334>
 - **Birth Control in India and in the People's Republic of China: a Comparison of Policy Evolution, Methods of Birth Control, and Program Organization, 1949-1974.** by Maru, Rushikesh Mukandrai, Phd from The University of Michigan, 1976, 442 pages
<http://wwwlib.umi.com/dissertations/fullcit/7619185>
 - **Birth Control Policy, Practice and Prohibition in the 1930s: the Maternal Health Association of Cleveland, Ohio** by Meyer, Jimmy Elaine Wilkinson, Phd from Case Western Reserve University, 1993, 277 pages
<http://wwwlib.umi.com/dissertations/fullcit/9406249>
 - **Birth Control: Lay Challenge to Medical Authority over Childbirth** by Steckevicz, Mary Jo, Phd from Northeastern University, 1981, 328 pages
<http://wwwlib.umi.com/dissertations/fullcit/8205053>
 - **Birth Control: Its Heroine and Its History in America-the Career of Margaret Sanger** by Kennedy, David Michael, Edd from Yale University, 1968, 428 pages
<http://wwwlib.umi.com/dissertations/fullcit/6908372>

- **Black and Hispanic Teenage Sexual and Contraceptive Attitudes and Behavior: a School-based Study** by Gibson, John Wendell, Dsw from Columbia University, 1987, 276 pages
<http://wwwlib.umi.com/dissertations/fullcit/8724017>
- **Conceptualizing Interactive Behavior toward Legal Change: Perspectives on Birth Control and Artificial Insemination** by Dienes, Charles Thomas, Phd from Northwestern University, 1968, 556 pages
<http://wwwlib.umi.com/dissertations/fullcit/6901821>
- **Contraceptive and Condom Use for the Prevention of Pregnancy, Stds, and Aids: a Transtheoretical Approach (immune Deficiency)** by Grimley, Diane Marie, Phd from University of Rhode Island, 1994, 453 pages
<http://wwwlib.umi.com/dissertations/fullcit/9513242>
- **Contraceptive Risk-taking Behavior by Sexually Active Adolescent Females in the United States** by Durant, Robert Hare, Phd from Emory University, 1987, 161 pages
<http://wwwlib.umi.com/dissertations/fullcit/8803288>
- **Contraceptive Switching among American Women: a Dynamic Analysis of Event History** by Gu, Quanzhong, Phd from University of Illinois at Urbana-champaign, 1994, 189 pages
<http://wwwlib.umi.com/dissertations/fullcit/9503200>
- **Contraceptive Use and Abortion among Immigrant and Ethnic Groups in Israel, 1974 and 1987-1988** by Wilder, Esther Isabelle, Phd from Brown University, 1997, 245 pages
<http://wwwlib.umi.com/dissertations/fullcit/9738644>
- **Controlling Births, Policing Sexualities: a History of Birth Control in Colonial India, 1877--1946** by Ahluwalia, Sanjam; Phd from University of Cincinnati, 2000, 321 pages
<http://wwwlib.umi.com/dissertations/fullcit/9999183>
- **Coping with Contraception: a Cognitive-behavioral Approach to Prevention of Unwanted Teenage Pregnancy** by Gilchrist, Lewayne Dorman, Phd from University of Washington, 1981, 132 pages
<http://wwwlib.umi.com/dissertations/fullcit/8113441>
- **Coups D'etat and Contraceptives: a Political Economy Analysis of Family Planning in Haiti** by Maternowska, Mary Catherine, Phd from Columbia University, 1996, 412 pages
<http://wwwlib.umi.com/dissertations/fullcit/9631748>
- **Dalkon Shield Iud Survivors: a Case Study of Contraceptive Tragedy and an Emerging Social Protest Movement, 1986-1989** by Hicks, Karen M., Phd from University of Pennsylvania, 1990, 277 pages
<http://wwwlib.umi.com/dissertations/fullcit/9026576>
- **Demographic, Individual Difference, and Social Variables Related to Contraceptive Use by Young, Male, College Students** by Farnham, Carole Erskine, Phd from Virginia Commonwealth University, 1987, 128 pages
<http://wwwlib.umi.com/dissertations/fullcit/8717316>
- **Dirty Discourse: Birth Control Advertising in the 1920s and 1930s (american Medical Association)** by Sarch, Amy, Phd from University of Pennsylvania, 1994, 297 pages
<http://wwwlib.umi.com/dissertations/fullcit/9427611>

- **Factors Influencing the Sexual and Contraceptive Behavior of Sexually Abused Adolescents of Color: an Investigation of Self-efficacy, Stages of Change and Perceived Risk** by Richardson, Bonnie Alane; Edd from Columbia University Teachers College, 1999, 168 pages
<http://wwwlib.umi.com/dissertations/fullcit/9939543>
- **Fertile Fields: a History of the Ideological Origins and Institutionalisation of the International Birth Control Movement, 1870--1940** by Burnett, Genevieve; Phd from University of New South Wales (australia), 1999
<http://wwwlib.umi.com/dissertations/fullcit/f2135497>
- **Gender-based Decision-making and the Use of Contraceptives by College Undergraduates** by Brennan, Ellen, Phd from University of Southern California, 1983
<http://wwwlib.umi.com/dissertations/fullcit/f3032933>
- **Implications of Treatment on Sex Knowledge, Sex Attitudes, and Contraception of Sexual Liberal/conservative Males** by Haverstock, Lynda Maureen, Phd from The University of Saskatchewan (canada), 1984
<http://wwwlib.umi.com/dissertations/fullcit/f2125557>
- **Locus-of-control As Related to Birth Control Knowledge, Attitudes and Practices.** by Lieberman, Janet Mirjam Joseph, Phd from Temple University, 1976, 102 pages
<http://wwwlib.umi.com/dissertations/fullcit/7612009>
- **Maintenance of a Birth Control Method: the Effects of Attitude and Distance on First-time Users in Santiago, Dominican Republic** by Novak, John Adam, Phd from The Pennsylvania State University, 1983, 170 pages
<http://wwwlib.umi.com/dissertations/fullcit/8327534>
- **Making Decisions under Stress: the Case of Adolescents Seeking Birth Control** by Strover, Sharon Lee, Phd from Stanford University, 1982, 240 pages
<http://wwwlib.umi.com/dissertations/fullcit/8307250>
- **Male Adolescent Psychosexual Development: the Influence of Significant Others on Contraceptive Behavior** by Cohen, Donald Dale, Phd from University of Pennsylvania, 1982, 358 pages
<http://wwwlib.umi.com/dissertations/fullcit/8307298>
- **Male Teenagers and Contraceptive Use (psychosocial)** by De Blasi, Pasquale, Jr., Dsw from Columbia University, 1985, 171 pages
<http://wwwlib.umi.com/dissertations/fullcit/8523149>
- **Margaret Sanger and the Birth Control Movement in Japan, 1921-1955** by Johnson, Malia Sedgewick, Edd from University of Hawaii, 1987, 202 pages
<http://wwwlib.umi.com/dissertations/fullcit/8812141>
- **Margaret Sanger Vs. the Catholic Church: the Early Debate on Contraception** by Mulloy, Clement A. Phd from University of Arkansas, 2000, 240 pages
<http://wwwlib.umi.com/dissertations/fullcit/9987246>
- **Marriage, Sexuality, and Contraception in the British Middle Class, 1918-1939: the Correspondence of Marie Stopes** by Holtzman, Ellen Martha, Phd from Rutgers the State University of New Jersey - New Brunswick, 1982, 175 pages
<http://wwwlib.umi.com/dissertations/fullcit/8305748>

- **My Dear Mrs. Ames: a Study of the Life of Suffragist Cartoonist and Birth Control Reformer Blanche Ames Ames, 1878-1969** by Clark, Anne Biller, Phd from University of Massachusetts Amherst, 1996, 278 pages
<http://wwwlib.umi.com/dissertations/fullcit/9638948>
- **Negotiating Intimacy: Intrahousehold Dynamics, Sexuality and Birth Control Experiences of Indian Women in Poverty (india)** by Seal, Arna, Phd from Tulane University, 1993, 220 pages
<http://wwwlib.umi.com/dissertations/fullcit/9405642>
- **Objectives and Content Areas for the Development of School-based Birth Control Education Programs Kindergarten Through Grade Twelve** by Gould, Bruce Allan, Edd from Columbia University, 1973, 130 pages
<http://wwwlib.umi.com/dissertations/fullcit/7324068>
- **On the Pill: a Social History of Oral Contraceptives in America, 1950-1970 (sexual Revolution, Birth Control, Feminism)** by Watkins, Elizabeth Rose Siegel, Phd from Harvard University, 1996, 336 pages
<http://wwwlib.umi.com/dissertations/fullcit/9631613>
- **Participation of Government and Non-government Organizations in United Nations Decisions on Birth Control: a Problem in Organization Theory** by Burt, John Corwin, Phd from City University of New York, 1971, 190 pages
<http://wwwlib.umi.com/dissertations/fullcit/7120934>
- **Politics, Economics and the Public Morality: State Regulation of Gambling, Liquor, Divorce and Birth Control.** by Fairbanks, James David, Phd from The Ohio State University, 1975, 366 pages
<http://wwwlib.umi.com/dissertations/fullcit/7603423>
- **Population and Power: the Religious Debate over Contraception, 1916-1936. (volumes I and II)** by Tobin-schlesinger, Kathleen, Phd from The University of Chicago, 1994, 340 pages
<http://wwwlib.umi.com/dissertations/fullcit/9501554>
- **Prophylactic Practices: Contraception and the Construction of Female Desire from Eliza Haywood to George Eliot** by Silverman, Debra Beth, Phd from University of Southern California, 1995, 296 pages
<http://wwwlib.umi.com/dissertations/fullcit/9614071>
- **Quantitative Study to Compare Teenage Mothers' Knowledge, Fears, Support, and Attitudes toward Birth Control** by Schnautz, Maria A. Msw from California State University, Long Beach, 2002, 54 pages
<http://wwwlib.umi.com/dissertations/fullcit/1410341>
- **Race, Class and Gender in U.s. Birth Control Politics, 1920-1945 (united States)** by Mccann, Carole Ruth, Phd from University of California, Santa Cruz, 1987, 311 pages
<http://wwwlib.umi.com/dissertations/fullcit/8810866>
- **Reproducing Persons As a Global Concern: the Making of an Institution (birth Control, Human Reproduction, Population Policies)** by Barrett, Deborah Anne, Phd from Stanford University, 1995, 308 pages
<http://wwwlib.umi.com/dissertations/fullcit/9602835>
- **Reproductive Technology, Disciplinary Technology: Exploring Empowerment and Birth Control in New Order Indonesia** by Fillion, Nancy Elizabeth; Ma from York University (canada), 2002, 164 pages
<http://wwwlib.umi.com/dissertations/fullcit/MQ71579>

- **Social-psychological and Communication Factors in Discontinuance of Birth Control Use in the Dominican Republic** by Porter, Elaine Gertrude, Phd from The Pennsylvania State University, 1980, 411 pages
<http://wwwlib.umi.com/dissertations/fullcit/8024481>
- **Spatial and Temporal Aspects of Contraceptive Adoption: an Analysis of Contemporary Fertility Behavior in Costa Rica** by Fridman, Samuel, Phd from Cornell University, 1984, 334 pages
<http://wwwlib.umi.com/dissertations/fullcit/8415344>
- **Sterilization, Birth Control and Population Control: the News Coverage of 'el Mundo', 'el Imparcial' and 'claridad' (puerto Rico)** by Lugo-ortiz, Maria De Lourdes, Phd from The University of Wisconsin - Madison, 1994, 386 pages
<http://wwwlib.umi.com/dissertations/fullcit/9506544>
- **The Afro-american Community and the Birth Control Movement, 1918-1942** by Rodrique, Jessie May, Phd from University of Massachusetts, 1991, 242 pages
<http://wwwlib.umi.com/dissertations/fullcit/9132903>
- **The American Birth Control Movement: a Study in Collective Behavior with Especial Reference to N. Smelser's Model of Norm-oriented Movements.** by Bartleson, Henrietta Lorraine, Phd from Syracuse University, 1974, 473 pages
<http://wwwlib.umi.com/dissertations/fullcit/7513961>
- **The Birds and the Bees and Decision Trees: Couples Talk about Their Birth Control and Family Decisions** by Finch, Susan Chloe; Phd from University of Southern California, 2000, 262 pages
<http://wwwlib.umi.com/dissertations/fullcit/3054868>
- **The Birth Control Clinic in America: Life Within; Life Without, 1923--1972** by Holz, Rosemarie Petra; Phd from University of Illinois at Urbana-champaign, 2002, 274 pages
<http://wwwlib.umi.com/dissertations/fullcit/3044116>
- **The Birth Control Debate in the Roman Catholic Church.** by Erhart, Joseph Francis, Phd from University of Pittsburgh, 1973, 240 pages
<http://wwwlib.umi.com/dissertations/fullcit/7418429>
- **The Birth Control Revolution: Consequences for College Student Life Styles.** by Makepeace, James Michael, Phd from Washington State University, 1975, 165 pages
<http://wwwlib.umi.com/dissertations/fullcit/7604368>
- **The Comparative Politics of Birth Control: Determinants of Policy Variation and Change in the Developed Nations.** by Clark, Marilyn Jane Field, Phd from The University of Michigan, 1976, 319 pages
<http://wwwlib.umi.com/dissertations/fullcit/7707892>
- **The Correlates of Sexual and Contraceptive Behavior among In-school Adolescents in Kenya (sexual Behavior)** by Kiragu, Karungari, Phd from The Johns Hopkins University, 1991, 461 pages
<http://wwwlib.umi.com/dissertations/fullcit/9132679>
- **The Diffusion of Birth Control in Germany, 1871 - 1933** by Woycke, James Edward, Phd from University of Toronto (canada), 1984
<http://wwwlib.umi.com/dissertations/fullcit/f2283221>
- **The Diffusion of Birth Control in Germany, 1871-1933** by Woycke, James Edward; Phd from University of Toronto (canada), 1984
<http://wwwlib.umi.com/dissertations/fullcit/NL23477>

- **The Effect of Age at Marriage and Birth Control Practices on Fertility Differentials in Taiwan** by Mohapatra, Partha Sarathi, Phd from The University of Michigan, 1966, 249 pages
<http://wwwlib.umi.com/dissertations/fullcit/6708313>
- **The Effects of Demographic, Socioeconomic and Health Factors on Family Size and the Use of Birth Control Methods: a Case of a Major Developing Country with High Rate of Population Growth (brazil)** by El-shafie, Mohamed El-mahdi, Phd from Emory University, 1983, 353 pages
<http://wwwlib.umi.com/dissertations/fullcit/8328057>
- **The Effects of Formal Sex Education on Adolescent Intercourse, Contraception and Pregnancy in the United States** by Dawson, Deborah Anne, Phd from The Johns Hopkins University, 1986, 104 pages
<http://wwwlib.umi.com/dissertations/fullcit/8615963>
- **The Formation of a National Birth-control Movement and the Establishment of Contraceptive Services in South Africa, 1930--1939** by Klausen, Susanne Maria; Phd from Queen's University at Kingston (canada), 1999, 372 pages
<http://wwwlib.umi.com/dissertations/fullcit/NQ42950>
- **The Fragmentation of Reproductive Health Policy: the Case of Maternity Care and Birth Control** by Aries, Nancy Ruth, Phd from Brandeis U., the F. Heller Grad. Sch. for Adv. Stud. in Soc. Wel., 1982, 228 pages
<http://wwwlib.umi.com/dissertations/fullcit/8222727>
- **The Implications of Whitehead's Concept of God and Order for a Thomistic Understanding of the Natural Law Ethic in Relation to the Problem of Birth Control.** by Keady, Richard Emmett, Phd from The Claremont Graduate University, 1974, 246 pages
<http://wwwlib.umi.com/dissertations/fullcit/7516237>
- **The Influences of Cognitive Development and Reference Groups on Teen Contraceptive Use** by Belicose, Raymond Michael, Phd from Rutgers the State University of New Jersey - New Brunswick, 1998, 170 pages
<http://wwwlib.umi.com/dissertations/fullcit/9900631>
- **The New Woman, the New Family and the Rationalization of Sexuality: the Sex Reform Movement in Germany 1928 to 1933 (abortion, Birth Control, Sterilization)** by Grossmann, Atina, Phd from Rutgers the State University of New Jersey - New Brunswick, 1984, 726 pages
<http://wwwlib.umi.com/dissertations/fullcit/8424110>
- **The Organization That Delayed Birth Control: a History of the Malthusian League, 1877-1927** by Ledbetter, Rosanna, Phd from Northern Illinois University, 1972, 356 pages
<http://wwwlib.umi.com/dissertations/fullcit/7222792>
- **The Politics of Birth Control in Puerto Rico.** by Ramos-bellido, Carlos Gil, Phd from University of California, Berkeley, 1977, 195 pages
<http://wwwlib.umi.com/dissertations/fullcit/7812739>
- **The Politics of Population in Communist China: a Case Study of Birth Control Policy, 1949-1965.** by Chen, Pi-chao, Phd from Princeton University, 1966, 331 pages
<http://wwwlib.umi.com/dissertations/fullcit/6712014>

- **The Press and the Beginning of the Birth Control Movement in the United States (law, History)** by Goldstein, Cynthia, Phd from The Pennsylvania State University, 1985, 294 pages
<http://wwwlib.umi.com/dissertations/fullcit/8516028>
- **The Relationship of Unwanted Teenage Pregnancy to Sex Knowledge, Attitudes toward Birth Control, Acceptance of One's Sexuality, Parental Acceptance, Risk Taking, and Age.** by Eaton, Linda Ferar, Phd from The University of Michigan, 1979, 192 pages
<http://wwwlib.umi.com/dissertations/fullcit/7925140>
- **The Rhetoric of Birth Control: 'the Love Rights of Women' in the Early Twentieth-century Novels of Henry James and Theodore Dreiser (James Henry, Dreiser Theodore, Twentieth Century)** by Bender, Madge Helene, Phd from Tulane University, 1993, 292 pages
<http://wwwlib.umi.com/dissertations/fullcit/9325975>
- **The Role of Communication in Family Planning: the Case of the Philippines (birth Control, Mass Media)** by Yehya, Riad Melhem, Phd from Bowling Green State University, 1992, 141 pages
<http://wwwlib.umi.com/dissertations/fullcit/9237699>
- **The Rural-urban Difference in Contraceptive Use in Pakistan: the Effects of Women's Literacy and Desired Fertility** by Zaki, Khalida Parveen, Phd from Michigan State University, 1991, 181 pages
<http://wwwlib.umi.com/dissertations/fullcit/9208869>
- **The Social Organization of Birth Control Information in Public Libraries** by Lundberg, Norma June, Phd from The University of Western Ontario (Canada), 1991, 363 pages
<http://wwwlib.umi.com/dissertations/fullcit/NN64263>
- **The Spatial Diffusion of Birth Control in Chile** by Fuller, Gary Albert, Phd from The Pennsylvania State University, 1972, 257 pages
<http://wwwlib.umi.com/dissertations/fullcit/7307436>
- **The Speaking of Margaret Sanger in the Birth Control Movement from 1916 to 1937** by Morehouse, William M., Phd from Purdue University, 1968, 229 pages
<http://wwwlib.umi.com/dissertations/fullcit/6812590>
- **The Timing of Births during the Onset of the Fertility Transition in Ghana (birth Control)** by Oheneba-sakyi, Yaw, Phd from Brigham Young University, 1989, 210 pages
<http://wwwlib.umi.com/dissertations/fullcit/9000760>
- **The Unmet Need and Demand for Modern Contraception in the Philippines (birth Control)** by Mortezo, Linda Verra, Phd from Bowling Green State University, 1995, 128 pages
<http://wwwlib.umi.com/dissertations/fullcit/9628817>
- **Toward a Taxonomy of Contraceptive Behaviors and Attitudes of Single College Men** by Stephen, David Bruce, Sr., EdD from Oregon State University, 1982, 161 pages
<http://wwwlib.umi.com/dissertations/fullcit/8224122>
- **Woman Rebel: the Rhetorical Strategies of Margaret Sanger and the American Birth Control Movement, 1912 to 1938.** by Gaulard, Joan Marie, Phd from Indiana University, 1978
<http://wwwlib.umi.com/dissertations/fullcit/f2492678>

- **Women's Response to Reproductive Trauma Secondary to Contraceptive Iatrogenesis: a Phenomenological Approach to the Dalkon Shield Case** by Anselmi, Katherine Kaby, Phd from University of Pennsylvania, 1994, 226 pages
<http://wwwlib.umi.com/dissertations/fullcit/9427493>

Keeping Current

Ask the medical librarian at your library if it has full and unlimited access to the *ProQuest Digital Dissertations* database. From the library, you should be able to do more complete searches via <http://wwwlib.umi.com/dissertations>.

CHAPTER 5. CLINICAL TRIALS AND BIRTH CONTROL

Overview

In this chapter, we will show you how to keep informed of the latest clinical trials concerning birth control.

Recent Trials on Birth Control

The following is a list of recent trials dedicated to birth control.⁸ Further information on a trial is available at the Web site indicated.

- **Breast Imaging Studies in Women at High Genetic Risk of Breast Cancer: Annual Follow-Up Study**

Condition(s): Breast Neoplasm

Study Status: This study is currently recruiting patients.

Sponsor(s): National Cancer Institute (NCI)

Purpose - Excerpt: This study will explore new screening methods for early detection of breast and ovarian cancer in women at high risk for these diseases, because they have an altered breast cancer 1 (BRCA1) or breast cancer 2 (BRCA2) gene. It will also try to determine if breast tissue characteristics in women with a BRCA1 or BRCA2 mutation differ from those in women with a normal gene. Premenopausal women between 25 and 45 years of age who have participated in National Cancer Institute studies for families or individuals at high genetic risk of cancer (78-C-0039 or 99-C-0081) and who have at least a 50 percent probability of carrying an altered BRCA1 or BRCA2 gene may be eligible for this study. At the first visit, participants will have from 4 to 24 tablespoons of blood drawn and will be interviewed about breast and ovarian cancer risk factors, family and personal history of cancer, history of pregnancies, use of oral contraceptives and other hormones and drugs, and previous surgery on the breasts and ovaries. In addition, they will undergo the following procedures: Routine breast and ovarian cancer screening for high-risk women, including a mammogram, breast and pelvic exam, instruction in breast self-examination, CA 125 blood test and transvaginal ultrasound of the ovaries. Magnetic Resonance Imaging (MRI) of the breast- MRI uses a strong magnetic field to

⁸ These are listed at www.ClinicalTrials.gov.

show structural and chemical changes in tissues. Breast Duct Lavage-In this procedure samples of fluid and cells from the lining of the breast milk ducts are collected to look for cancerous or pre-cancerous cell changes. Positron Emission Tomography (PET) scan-PET scanning will be done only in participants whose mammogram or MRI findings require additional evaluation. This diagnostic test is based on differences in how cells take up and use glucose (sugar), one of the body's main fuels. Annual follow-up visits will be scheduled for 3 years and will include routine high-risk screening as described above, blood draw, update of family history and risk factors, breast MRI, breast duct lavage and, if there are changes on the MRI or mammogram that need further evaluation, the PET will be repeated.

Study Type: Observational

Contact(s): see Web site below

Web Site: <http://clinicaltrials.gov/ct/show/NCT00006421>

- **Depo-Medroxyprogesterone Acetate (DMPA, Depo-Provera) Use with Certain Anti-HIV Drugs in HIV-Infected Women**

Condition(s): HIV Infections

Study Status: This study is currently recruiting patients.

Sponsor(s): National Institute of Allergy and Infectious Diseases (NIAID); National Institute of Child Health and Human Development (NICHD)

Purpose - Excerpt: The purpose of this study is to look at the level of depo-medroxyprogesterone acetate (DMPA or Depo-Provera) in the blood to see if it is affected by certain anti-HIV drugs (nelfinavir [NFV], efavirenz [EFV], indinavir [IDV] in combination with ritonavir [RTV], and nevirapine [NVP]). This study will also look at the levels of these anti-HIV drugs to see if they are affected by DMPA. DMPA is a hormonal **birth control** method that is given as an injection. It is not known if taking DMPA together with anti-HIV drugs changes the amount of DMPA and/or the amount of anti-HIV drugs in the blood. If higher levels of DMPA occur, side effects may increase. If lower levels of anti-HIV drugs occur, the drugs may become less effective against HIV. This study will look at the levels of anti-HIV drugs and DMPA in the blood when these medications are used together.

Study Type: Interventional

Contact(s): see Web site below

Web Site: <http://clinicaltrials.gov/ct/show/NCT00016601>

- **Effectiveness of BufferGel as a Vaginal Contraceptive**

Condition(s): Pregnancy

Study Status: This study is currently recruiting patients.

Sponsor(s): National Institute of Child Health and Human Development (NICHD)

Purpose - Excerpt: BufferGel is a new **contraceptive** gel designed to be used with a diaphragm. In addition to preventing pregnancy, BufferGel may also prevent some types of sexually transmitted diseases (STDs). This study will compare BufferGel to Gynol II, a currently available **contraceptive** gel.

Phase(s): Phase II; Phase III; MEDLINEplus consumer health information

Study Type: Interventional

Contact(s): see Web site below

Web Site: <http://clinicaltrials.gov/ct/show/NCT00065858>

- **Increased Access to Emergency Contraceptive Pills**

Condition(s): Pregnancy; Sexually Transmitted Diseases

Study Status: This study is currently recruiting patients.

Sponsor(s): National Institute of Child Health and Human Development (NICHD)

Purpose - Excerpt: This study will evaluate the effect of easy access to emergency **contraceptive** pills (ECPs) on the rates of pregnancy and sexually transmitted infections (STIs).

Study Type: Interventional

Contact(s): see Web site below

Web Site: <http://clinicaltrials.gov/ct/show/NCT00060463>

- **Norplant and Irregular Bleeding/Spotting**

Condition(s): Endometrial bleeding; Periodontal Disease

Study Status: This study is currently recruiting patients.

Sponsor(s): National Institute of Child Health and Human Development (NICHD)

Purpose - Excerpt: Irregular or prolonged menstrual bleeding and/or spotting are common side effects in patients using progestin-only hormonal **contraception** such as levonorgestrel implants (Norplant). Doxycycline, a drug approved by the Food and Drug Administration (FDA) to treat gum disease, may reduce the occurrence of uterine bleeding and spotting in women who use Norplant. This study will evaluate the effects of doxycycline on uterine bleeding/spotting in women using Norplant.

Phase(s): Phase IV

Study Type: Interventional

Contact(s): see Web site below

Web Site: <http://clinicaltrials.gov/ct/show/NCT00064766>

- **Providing Birth Control Through Home Health Visits**

Condition(s): Pregnancy

Study Status: This study is currently recruiting patients.

Sponsor(s): National Institute of Child Health and Human Development (NICHD)

Purpose - Excerpt: This study will evaluate a program that provides **birth control** to low income and minority women through home visits by a community health nurse. The goal of the program is to reduce unwanted pregnancies.

Study Type: Interventional

Contact(s): see Web site below

Web Site: <http://clinicaltrials.gov/ct/show/NCT00065078>

- **Quick Start Approach to Birth Control Pills**

Condition(s): Pregnancy; Contraception

Study Status: This study is currently recruiting patients.

Sponsor(s): National Institute of Child Health and Human Development (NICHD)

Purpose - Excerpt: Women who choose to take **birth control** pills are currently instructed to begin taking the pills at the end of a menstrual cycle. This creates a window of time between when the woman is given the pills and when she begins taking them. Some women fail to begin taking the pills, placing them at increased risk of pregnancy. This study will evaluate a new approach to beginning **birth control** pills. Women will take the first pill in the doctor's office rather than waiting until the next menstrual cycle.

Phase(s): Phase IV; MEDLINEplus consumer health information

Study Type: Interventional

Contact(s): see Web site below

Web Site: <http://clinicaltrials.gov/ct/show/NCT00068848>

- **Randomized Study of Oral Contraceptives or Hormone Replacement Therapy in Women With Systemic Lupus Erythematosus**

Condition(s): Systemic Lupus Erythematosus

Study Status: This study is currently recruiting patients.

Sponsor(s): National Center for Research Resources (NCRR); UAB Comprehensive Cancer Center

Purpose - Excerpt: Objectives: I. Determine the effect of oral contraceptives containing low-dose synthetic estrogens and progestins on disease activity in premenopausal women with inactive, stable, or moderate systemic lupus erythematosus (SLE). II. Determine the effect of hormone replacement therapy with conjugated estrogens and progestins on disease activity in postmenopausal women with inactive, stable, or moderate SLE.

Study Type: Interventional

Contact(s): see Web site below

Web Site: <http://clinicaltrials.gov/ct/show/NCT00006133>

- **The Direct Access Study: Access to Hormonal Birth Control Through Community Pharmacies**

Condition(s): Contraception

Study Status: This study is currently recruiting patients.

Sponsor(s): National Institute of Child Health and Human Development (NICHD)

Purpose - Excerpt: Hormonal **birth control** methods include **birth control** pills, patches, and vaginal rings; they are normally available only with a doctor's prescription. This study will evaluate a program designed to increase the availability of **birth control** by allowing pharmacists to give women hormonal **birth control** without a doctor's prescription. Under this program, pharmacists will evaluate women who want to use **birth control** according to specific guidelines created by doctors. If a woman meets the criteria in the guidelines, a pharmacist could then give her the appropriate form of hormonal birth control.

Study Type: Interventional

Contact(s): see Web site below

Web Site: <http://clinicaltrials.gov/ct/show/NCT00065871>

- **A Study to Evaluate the Effects of Different Methods of Birth Control on the Drug Actions of Zidovudine (an Anti-HIV Drug) in HIV-Positive Women and to Compare Zidovudine Metabolism in Men and Women**

Condition(s): HIV Infections

Study Status: This study is no longer recruiting patients.

Sponsor(s): National Institute of Allergy and Infectious Diseases (NIAID)

Purpose - Excerpt: The purpose of this study is to look at the effects of different methods of **birth control** (oral and injectable) on how the body absorbs, makes available, and removes zidovudine (ZDV). This study will also evaluate the differences in men and women in how the body absorbs, makes available, and removes ZDV. Past research has shown that the effectiveness of ZDV as an anti-HIV drug might be decreased in individuals who use certain methods of birth control. ZDV may also have different effects in men compared to women.

Study Type: Interventional

Contact(s): see Web site below

Web Site: <http://clinicaltrials.gov/ct/show/NCT00000897>

- **Effects of hypericum perforatum on effectiveness of oral contraceptives**

Condition(s): Contraception

Study Status: This study is no longer recruiting patients.

Sponsor(s): National Center for Complementary and Alternative Medicine (NCCAM)

Purpose - Excerpt: The purpose of this study is to evaluate the effects of a common herbal remedy, St. John's Wort, on the effectiveness of **birth control** pills. St. John's Wort has recently been shown to increase metabolism of some drugs. If it could increase metabolism of oral contraceptives as well, it may increase the risk of **contraceptive** failure and unintended pregnancy. Study participants will be evaluated for risk of ovulation on oral contraceptives before and during simultaneous therapy with St. John's Wort.

Study Type: Interventional

Contact(s): see Web site below

Web Site: <http://clinicaltrials.gov/ct/show/NCT00026013>

- **Hormonal Birth Control and the Risk of Acquiring HIV**

Condition(s): HIV Infections; HIV Seronegativity

Study Status: This study is no longer recruiting patients.

Sponsor(s): National Institute of Child Health and Human Development (NICHD); National Institute of Allergy and Infectious Diseases (NIAID)

Purpose - Excerpt: The purpose of this study is to find out whether hormonal **birth control** increases, decreases, or does not change the risk of women becoming infected with HIV. Sexual intercourse between men and women is the main way HIV is transmitted. About 90 percent of HIV infections in women are caused by sexual

intercourse. Also, hormonal birth controls are widely used. This study hopes to find out whether hormonal **birth control** changes the risk of women becoming infected with HIV.

Study Type: Interventional

Contact(s): see Web site below

Web Site: <http://clinicaltrials.gov/ct/show/NCT00006324>

- **Safety of Estrogens in Lupus: Birth Control Pills**

Condition(s): Systemic Lupus Erythematosus

Study Status: This study is no longer recruiting patients.

Sponsor(s): National Institute of Arthritis and Musculoskeletal and Skin Diseases (NIAMS); Office of Research on Women's Health (ORWH)

Purpose - Excerpt: Safety of Estrogens in Lupus Erythematosus - National Assessment (SELENA) is a study to test whether women with systemic lupus erythematosus (SLE or lupus) can safely use estrogen. We will determine this by looking at the effects of oral contraceptives (birth control pills, also known as "the pill") on disease activity and severity in women with SLE. The results of the study will show whether it is safe for women with SLE to use the pill.

Phase(s): Phase III

Study Type: Interventional

Contact(s): see Web site below

Web Site: <http://clinicaltrials.gov/ct/show/NCT00000420>

- **Emergency Contraception (ECP): Reducing Unintended Pregnancies**

Condition(s): Contraception; Pregnancy

Study Status: This study is completed.

Sponsor(s): National Institute of Child Health and Human Development (NICHD)

Purpose - Excerpt: Emergency **contraception** is a method of **birth control** that can be used up to three days after sexual intercourse. Emergency **contraceptive** pills (ECPs) can be given to a woman before she needs them (advance provision) or when she needs them (emergency provision). This study will compare these two methods of providing ECPs.

Phase(s): Phase IV; MEDLINEplus consumer health information

Study Type: Interventional

Contact(s): see Web site below

Web Site: <http://clinicaltrials.gov/ct/show/NCT00067509>

- **Hostility and Pathogenic Mechanisms of Coronary Heart Disease in Women**

Condition(s): Cardiovascular Diseases; Coronary Disease; Heart Diseases

Study Status: This study is completed.

Sponsor(s): National Heart, Lung, and Blood Institute (NHLBI)

Purpose - Excerpt: To determine the combined effects of hostility, harassment, lipids, and oral **contraceptive** (OC) use on physiological responses in young and middle-aged premenopausal women.

Study Type: Observational

Contact(s): see Web site below

Web Site: <http://clinicaltrials.gov/ct/show/NCT00005435>

- **Myocardial Infarction and Current Oral Contraceptive Use**

Condition(s): Cardiovascular Diseases; Coronary Disease; Myocardial Infarction; Heart Diseases

Study Status: This study is completed.

Sponsor(s): National Heart, Lung, and Blood Institute (NHLBI)

Purpose - Excerpt: To assess whether current oral **contraceptive** (OC) use (within the previous month) increased the risk of myocardial infarction. Also, to assess the combined effects of cigarette smoking and oral **contraceptive** use.

Study Type: Observational

Contact(s): see Web site below

Web Site: <http://clinicaltrials.gov/ct/show/NCT00005241>

- **Myocardial Infarction and Past Oral Contraceptive Use**

Condition(s): Cardiovascular Diseases; Coronary Disease; Myocardial Infarction; Heart Diseases; Menopause; Postmenopause

Study Status: This study is completed.

Sponsor(s): National Heart, Lung, and Blood Institute (NHLBI)

Purpose - Excerpt: To evaluate whether the long-term use of oral contraceptives, after discontinuation, was associated with an increased incidence of first nonfatal myocardial infarction among women above the age of 50.

Study Type: Observational

Contact(s): see Web site below

Web Site: <http://clinicaltrials.gov/ct/show/NCT00005173>

- **Phase II Randomized Study of Leuprolide vs Oral Contraceptive Therapy vs Leuprolide and Oral Contraceptive Therapy for Ovarian Hyperandrogenism**

Condition(s): Hyperandrogenism

Study Status: This study is completed.

Sponsor(s): National Center for Research Resources (NCRR); Baylor College of Medicine

Purpose - Excerpt: Objectives: I. Evaluate the beneficial effects of leuprolide depot, oral **contraceptive** therapy, and leuprolide/oral **contraceptive** therapy in the management of patients with ovarian hyperandrogenism.

Phase(s): Phase II

Study Type: Interventional

Contact(s): see Web site below

Web Site: <http://clinicaltrials.gov/ct/show/NCT00004763>

Keeping Current on Clinical Trials

The U.S. National Institutes of Health, through the National Library of Medicine, has developed ClinicalTrials.gov to provide current information about clinical research across the broadest number of diseases and conditions.

The site was launched in February 2000 and currently contains approximately 5,700 clinical studies in over 59,000 locations worldwide, with most studies being conducted in the United States. ClinicalTrials.gov receives about 2 million hits per month and hosts approximately 5,400 visitors daily. To access this database, simply go to the Web site at <http://www.clinicaltrials.gov/> and search by “birth control” (or synonyms).

While ClinicalTrials.gov is the most comprehensive listing of NIH-supported clinical trials available, not all trials are in the database. The database is updated regularly, so clinical trials are continually being added. The following is a list of specialty databases affiliated with the National Institutes of Health that offer additional information on trials:

- For clinical studies at the Warren Grant Magnuson Clinical Center located in Bethesda, Maryland, visit their Web site: <http://clinicalstudies.info.nih.gov/>
- For clinical studies conducted at the Bayview Campus in Baltimore, Maryland, visit their Web site: <http://www.jhbmc.jhu.edu/studies/index.html>
- For cancer trials, visit the National Cancer Institute: <http://cancertrials.nci.nih.gov/>
- For eye-related trials, visit and search the Web page of the National Eye Institute: <http://www.nei.nih.gov/neitrials/index.htm>
- For heart, lung and blood trials, visit the Web page of the National Heart, Lung and Blood Institute: <http://www.nhlbi.nih.gov/studies/index.htm>
- For trials on aging, visit and search the Web site of the National Institute on Aging: <http://www.grc.nia.nih.gov/studies/index.htm>
- For rare diseases, visit and search the Web site sponsored by the Office of Rare Diseases: http://ord.aspensys.com/asp/resources/rsch_trials.asp
- For alcoholism, visit the National Institute on Alcohol Abuse and Alcoholism: http://www.niaaa.nih.gov/intramural/Web_dicbr_hp/particip.htm
- For trials on infectious, immune, and allergic diseases, visit the site of the National Institute of Allergy and Infectious Diseases: <http://www.niaid.nih.gov/clintrials/>
- For trials on arthritis, musculoskeletal and skin diseases, visit newly revised site of the National Institute of Arthritis and Musculoskeletal and Skin Diseases of the National Institutes of Health: <http://www.niams.nih.gov/hi/studies/index.htm>
- For hearing-related trials, visit the National Institute on Deafness and Other Communication Disorders: <http://www.nidcd.nih.gov/health/clinical/index.htm>
- For trials on diseases of the digestive system and kidneys, and diabetes, visit the National Institute of Diabetes and Digestive and Kidney Diseases: <http://www.niddk.nih.gov/patient/patient.htm>

- For drug abuse trials, visit and search the Web site sponsored by the National Institute on Drug Abuse: <http://www.nida.nih.gov/CTN/Index.htm>
- For trials on mental disorders, visit and search the Web site of the National Institute of Mental Health: <http://www.nimh.nih.gov/studies/index.cfm>
- For trials on neurological disorders and stroke, visit and search the Web site sponsored by the National Institute of Neurological Disorders and Stroke of the NIH: http://www.ninds.nih.gov/funding/funding_opportunities.htm#Clinical_Trials

CHAPTER 6. PATENTS ON BIRTH CONTROL

Overview

Patents can be physical innovations (e.g. chemicals, pharmaceuticals, medical equipment) or processes (e.g. treatments or diagnostic procedures). The United States Patent and Trademark Office defines a patent as a grant of a property right to the inventor, issued by the Patent and Trademark Office.⁹ Patents, therefore, are intellectual property. For the United States, the term of a new patent is 20 years from the date when the patent application was filed. If the inventor wishes to receive economic benefits, it is likely that the invention will become commercially available within 20 years of the initial filing. It is important to understand, therefore, that an inventor's patent does not indicate that a product or service is or will be commercially available. The patent implies only that the inventor has "the right to exclude others from making, using, offering for sale, or selling" the invention in the United States. While this relates to U.S. patents, similar rules govern foreign patents.

In this chapter, we show you how to locate information on patents and their inventors. If you find a patent that is particularly interesting to you, contact the inventor or the assignee for further information. **IMPORTANT NOTE:** When following the search strategy described below, you may discover non-medical patents that use the generic term "birth control" (or a synonym) in their titles. To accurately reflect the results that you might find while conducting research on birth control, we have not necessarily excluded non-medical patents in this bibliography.

Patents on Birth Control

By performing a patent search focusing on birth control, you can obtain information such as the title of the invention, the names of the inventor(s), the assignee(s) or the company that owns or controls the patent, a short abstract that summarizes the patent, and a few excerpts from the description of the patent. The abstract of a patent tends to be more technical in nature, while the description is often written for the public. Full patent descriptions contain much more information than is presented here (e.g. claims, references, figures, diagrams, etc.). We will tell you how to obtain this information later in the chapter. The following is an

⁹Adapted from the United States Patent and Trademark Office:
<http://www.uspto.gov/web/offices/pac/doc/general/whatis.htm>.

example of the type of information that you can expect to obtain from a patent search on birth control:

- **Alpha-lactalbumin contraceptive**

Inventor(s): Shur; Barry D. (Houston, TX)

Assignee(s): University Patents, Inc. (Westport, CT)

Patent Number: 4,511,558

Date filed: May 16, 1983

Abstract: A contraceptive agent is provided which comprises biologically-active alpha-lactalbumin. The agent can be administered to female mammals using a variety of pharmaceutically acceptable vehicles, provided the alpha-lactalbumin retains its biological activity in the presence of the vehicle.

Excerpt(s): This invention relates to contraceptive compositions and in particular to a contraceptive composition which includes biologically-active alpha-lactalbumin. ... The search for effective contraceptives has been going on for literally thousands of years. Among the contraceptive methods presently in general use are oral contraceptives, intrauterine devices, diaphragms, condoms and various vaginal spermicides administered in the form of jellies, creams, foams, foaming tablets, suppositories and soluble films. As is commonly known, each of these contraceptive methods has disadvantages for particular individuals or for all individuals when used over an extended period of time. For example, the use of oral contraceptives, the most popular form of contraceptive at the present time, has been associated with nausea, depression, weight gain and headache, as well as an increased long-term risk of stroke, myocardial infarction, thromboembolism and hypertension. ... In particular, the vaginal spermicides have come under increasing criticism because of the absorption and subsequent effects of the chemicals used in such preparations on various female tissues and organs. The spermicide most commonly used today in such preparations is the nonionic detergent nonylphenoxypolyethyleneoxyethanol (nonoxynol 9). Numerous studies have been done on the absorption of nonoxynol 9 by the vaginal epithelium. See, for example, Buttar, H. S., "Transvaginal Absorption and Disposition of Nonoxynol-9 in Gravid Rats", *Toxicology Letters*, Vol. 13, 1982, pages 211-216; Chvapil, M., Droegemueller, W., Owen, J. A., Eskelson, C. D., Betts, K., "Studies of Nonoxynol-9. I. The Effect on the Vaginas of Rabbits and Rats", *Fertility and Sterility*, Vol. 33, No. 4, April 1980, pages 445-449; Chvapil, M., Eskelson, C. D., Droegemueller, W., Ulreich, J. B., Owen, J. A., Ludwig, J. C., Stiffel, V. M., "New Data on the Pharmacokinetics of Nonoxynol 9", in *Vaginal Contraception: New Developments*, Zatuchni et al. editors, Harper & Row, Hagerstown, Md., 1979, pages 165-174; Chvapil, M., Eskelson, C. D., Stiffel, V., Owen, J. S., and Droegemueller, W., "Studies on Nonoxynol-9. II. Intravaginal Absorption, Distribution, Metabolism and Excretion in Rats and Rabbits", *Contraception*, September 1980, Vol. 22, No. 3, pages 325-339; Jick, H., Walker, A. M., Rothman, K. J., Hunter, J. R., Holmes, L. B., Watkins, R. N., D'Eward, D. C., Danford, A., Madsen, S., "Vaginal Spermicides and Congenital Disorders", *JAMA*, Apr. 3, 1981, Vol. 245, No. 13, pages 1329-1332; and Shapiro, S., Slone, D., Holnonon, O. P., Kaufman, D. W., Rosenberg, L., Mitchell, A. A., Helmrich, S. P., "Birth Defects and Vaginal Spermicides", *JAMA*, May 7, 1982, Vol. 247, No. 17, pages 2381-2384.

Web site: http://www.delphion.com/details?pn=US04511558__

- **Antigen for early pregnancy test and contraceptive vaccine**

Inventor(s): Bahl; Om P. (Williamsville, NY)

Assignee(s): Research Corporation (New York, NY)

Patent Number: 4,256,629

Date filed: April 17, 1979

Abstract: Antisera suitable for detecting the presence of human chorionic gonadotropin in body fluids by immunoassay are prepared by administering to a host animal an antigen comprising the .beta.-subunit of human chorionic gonadotropin which has been modified by cleaving and optionally conjugating the thus modified .beta.-subunit with a protein or hapten capable of enhancing the immunogenetic potency of the antigen. The antigens are also useful for the contraceptive purposes to terminate pregnancy.

Excerpt(s): This invention relates to antisera produced by novel antigens, which are useful in testing for pregnancy in humans and more particularly to antisera having an immunological reaction with human chorionic gonadotropin, wherein the immunological cross-reactivity with human luteinizing hormone is reduced or eliminated. This further relates to the production of antigens to prepare said antisera, and which may also be used for contraceptive purposes to terminate human pregnancy. ... Human chorionic gonadotropin is a hormone produced by the placenta during pregnancy. Presence of the hormone in the serum and urine therefore serves as an indication of pregnancy. The presence of this hormone has been detected by its effect on the ovaries of animals and, more recently, by immunoassay. ... However, because the tests used hitherto do not sufficiently distinguish between hCG and other hormones which are present, such as luteinizing hormone, the presence of hCG cannot be unambiguously detected until several weeks after conception, by which time the levels of hCG are high enough so that it can be detected even in the presence of interfering substances.

Web site: http://www.delphion.com/details?pn=US04256629__

- **Apparatus for assembling a contraceptive device**

Inventor(s): Broad, Jr.; Robert L. (2300 Brookwood Dr., SE., Decatur, AL 35601)

Assignee(s): none reported

Patent Number: 5,165,422

Date filed: November 16, 1990

Abstract: In an apparatus for assembling a contraceptive device, an apparatus for transferring a condom from a conveyor to a moving packaging strip, the condom having on opposite sides thereof a pair of polymeric strips, each of the strips having one end thereof rolled into the condom and the other end thereof depending from the condom, wherein a hand having a plurality of fingers which engage and hold the rolled condom carries the condom from a position above the conveyor to a position above the packaging strip. As the hand is lowered to deposit the condom on the packaging strip a pair of sweeps sweep the depending ends of the polymeric strips to generally horizontal positions such that when the condom is deposited on the packaging strip the polymeric strips will be free of wrinkles and folds.

Excerpt(s): This invention relates to apparatus for assembling contraceptive devices. ... Conventional condoms, after being suitably tested, are fed onto a moving lower strip

which will become the bottom portion of the package that encloses and protects the condom. With the condoms precisely spaced on the moving lower strip, an upper strip is fed downward in alignment with the lower strip, the strips being heat-sealable to each other. The strips are then heat-sealed to each other around the condom to form the finished package. The strips are then cut to separate the packaged condoms. ... In an apparatus for assembling a contraceptive device including a condom having a pair of polymeric strips rolled into opposite sides thereof with the strips having free ends depending from the condom on opposite sides thereof, a "hand" moveable from a position above a conveyor to a position above a moving lower packaging strip carries fingers which close on the rolled condom to carry the condom into position above the packaging strip. The apparatus is provided with a pair of sweeps each being moveable from a position below the condom and between the depending strips to a position such that the free ends of the strips are moved outward to extend in generally horizontal directions from the condom prior to depositing the condom on the packaging strip. The movement of the sweeps is timed to hold the polymeric strips in this horizontal position as the hand is lowered to place the condom on the packaging strip, so that the polymeric strips will extend transversely across the packaging strip without folds or wrinkles. An upper packaging strip is then heat-sealed to the lower packaging strip to enclose the condom.

Web site: http://www.delphion.com/details?pn=US05165422__

- **Assembly of intra-uterine contraceptive device and insertor**

Inventor(s): van Os; Willem A. A. A. (Le Rouret, FR)

Assignee(s): Akzo N.V. (Arnhem, NL)

Patent Number: 4,690,136

Date filed: December 12, 1985

Abstract: The invention comprises an assembly of an intra-uterine contraceptive device and an insertor, whereby the contraceptive device is provided with a central stem and two or more flexible self-supporting arms; at least the said stem is accommodated in the insertor, and said insertor is at one end, over some distance, opened to form a groove or half-cylinder in such a way that the stem of the contraceptive device can be introduced and removed therefrom, said half-cylinder portion ending into a knob or thickening.

Excerpt(s): The invention relates to an assembly of an intra-uterine contraceptive device and the corresponding insertor, the contraceptive device being provided with a central stem which at one of the ends merges into at least two flexible self-supporting arms, at least the stem being accommodated in the insertor with the aid of which the said contraceptive device can be fitted into the uterine cavity. ... This type of assembly of a contraceptive device and corresponding insertor is known from, inter alia, Netherlands Patent Specification No. 173,707, where the contraceptive device described consists of an elongate stem which possesses two highly flexible self-supporting arms on one of its ends. These arms are attached to opposite sides of the stem and in the state of rest curve back toward the stem in such a way that the arms together form, the entire or partial periphery of an ellipse, with the stem as the long axis or a part of the long axis of the said ellipse. ... This assembly of contraceptive device and corresponding insertor--the stem of the contraceptive device being fitted into the preferably tubular insertor--is now introduced into the uterus via the cervix. While passing through the cervix, the arms of the contraceptive device are compressed against the outside of the insertor.

Web site: http://www.delphion.com/details?pn=US04690136__

- **Barrier contraceptive**

Inventor(s): Mohajer; Reza (1275 Orchard Ridge Rd., Bloomfield Hills, MI 48013)

Assignee(s): none reported

Patent Number: 4,832,052

Date filed: April 10, 1987

Abstract: A barrier type contraceptive is an umbrella-like device including a flexible, barrier member with a plurality of radially disposed resilient stiffening members associated therewith. The stiffening members bias the barrier member into a generally planar configuration while allowing for the device to be folded into a generally fusiform shape for insertion.

Excerpt(s): This invention relates generally to contraceptive devices and in particular to barrier contraceptive devices of the diaphragm type. ... Control of conception has been an important medical endeavor for many years and instructions for the manufacture of contraceptive devices and compositions are found in some of the earliest known medical manuscripts. Presently, contraceptive technologies rely upon pharmaceutical and mechanical methods. Pharmaceutical methods involve the use of medicinal compounds which prevent pregnancy by interfering with ovulation, implantation or spermatogenesis. Mechanical methods are directed to preventing contact of ovum and sperm and involve the use of mechanical barriers and spermicidal compounds. ... Because of the increasing concern with the side effects of pharmaceutical compositions, mechanical methods of contraception are increasing in popularity. Additionally, concern with sexually transmitted diseases has engendered a renewed interest in barrier type devices.

Web site: http://www.delphion.com/details?pn=US04832052__

- **Barrier contraceptive torus**

Inventor(s): Buckles; Richard G. (Basel, CH)

Assignee(s): World Health Organization (Geneva, CH)

Patent Number: 4,326,510

Date filed: November 20, 1979

Abstract: A barrier contraceptive device and a method for preventing conception utilizing the device. The device comprises a torus of biocompatible material sized to fit in a vagina, structure--such as overlapping flaps--being provided with the torus for providing a primary barrier preventing direct ejaculation into the cervix while allowing fluid drainage from the cervix. The material forming the torus contains a spermicide and is operative to allow release of the spermicide to maintain an effective level of spermicide in the area between the torus and the cervix to kill any sperm that passes the primary barrier. The torus is constructed so that the spermicide is more readily releasable through the inner peripheral surface thereof than the outer peripheral surface thereof. The torus releases an effective amount of spermicide approximately over a period of time from the last day of menses until the start of the next menstrual period,

the torus being inserted about the last day of menses and removed and disposed of at about the start of the next menstrual period.

Excerpt(s): There have been developed a wide variety of spermicide releasing devices for placement in the vagina for providing an effective level of spermicide within the vagina, such as described in an article by F. G. Burton, et al in CONTRACEPTION 17, pages 221-230, 1978, entitled "Fabrication and Testing of Vaginal Contraceptive Devices Designed for Release of Pre-Specified Dose Levels of Steroids", and U.S. Pat. No. 3,545,439 (the disclosure of which is hereby incorporated by reference herein). There also have been a wide variety of devices used for barrier methods of contraception, such as conventional diaphragms. While most of such devices are generally effective, there are a number of drawbacks associated with each. ... Conventional barrier diaphragms have not been satisfactory for large fractions of the population because of the need to insert the barrier diaphragm, coated with a spermicidal formulation, within a few hours of coitus, the need to add additional spermicide if coitus is repeated, the need to remove the diaphragm after usage due to build up of unacceptable odors and/or the discomfort of the occlusive fit within the vagina, and the general unacceptability surrounding the "messiness" of the insertion, removal, and washing procedure for re-use. While vaginal rings releasing spermicide overcome some of the above-mentioned drawbacks associated with barrier diaphragms, in most instances they have not been demonstrated to be entirely effective in preventing conception. ... According to the present invention, a contraceptive device is provided which overcomes most of the drawbacks associated with conventional barrier diaphragms and vaginal rings. The device according to the invention comprises a torus of biocompatible material sized to fit in a vagina, and has means formed therewith for providing a primary barrier preventing direct ejaculation into the cervix while allowing fluid drainage from the cervix. The device is designed to be disposable after one use (one menstrual period), is readily insertable, and can be constructed to allow release (e.g., diffusion) of spermicide therefrom at an effective level in the area between the device and the cervix to kill any sperm that pass the primary barrier. The device may be constructed so that the spermicide is more readily releasable through the inner peripheral surface thereof than through the outer peripheral surface thereof.

Web site: http://www.delphion.com/details?pn=US04326510__

- **Bioerodible contraceptive suppository**

Inventor(s): Britton; Peter (Scotch Plains, NJ), Flanagan; Patricia (Naperville, IL), Hart; William P. (Freehold, NJ), Linkin; Deborah (Madeira Beach, FL)

Assignee(s): McNeil-PPC, Inc. (Skillman, NJ)

Patent Number: 5,863,553

Date filed: March 7, 1997

Abstract: The invention relates to an intravaginally-dissolvable contraceptive suppository, a method of using said suppository, and an improved method of manufacturing said birth control device. The suppositories of the invention, which comprise a lyophilized foam and a contraceptive, have a dissolution time of at least about 2 hours, and up to about 24 hours, and provide superior protection against pregnancy.

Excerpt(s): The invention relates to a bioerodible contraceptive device, and, more particularly, to an intravaginally-dissolvable contraceptive suppository comprising a

lyophilized foam and a contraceptive, a method of using such suppositories and a method for manufacturing them. ... Vaginal contraceptives are well-known in the art, including, for example, spermicidal creams and gels. These products can be used alone or in conjunction with removable contraceptive devices, such as intrauterine devices. Although many of these products are readily available without a prescription, there are several disadvantages associated with their use. The effectiveness of these products is generally limited to one or two hours. In addition, these creams or gels tend to melt very readily and, thus, are easily discharged from the vagina, thereby further limiting their effectiveness. Furthermore, the tendency to rapidly melt makes such products inconvenient and messy to use. ... In the area of foams, although the use of foams and freeze-dried foams to deliver various active ingredients is well-known, such foams generally do not possess the requisite characteristics that would render them suitable for use as a contraceptive suppository. For example, in U.S. Pat. No. 4,642,903, Davies discloses the use of freeze-dried foams for dispensing a variety of active ingredients. However, Davis' foams are designed to have very rapid dissolution rates (virtually instantaneous) which would render his foam highly ineffective for use as a contraceptive. Moreover, it is not possible to control the degree of aeration in Davis' foaming process; accordingly, using Davis' method it is not possible to control densities, dosage delivery rates and dissolution times of the foams which is critical to the manufacture of a contraceptive suppository.

Web site: http://www.delphion.com/details?pn=US05863553__

- **Biological contraceptive and contraceptive technique for males**

Inventor(s): Wiebe; John P. (London, CA)

Assignee(s): University of Western Ontario (London, CA)

Patent Number: 4,720,507

Date filed: March 5, 1984

Abstract: A male contraceptive preparation and a contraceptive technique are disclosed. The contraceptive preparation consists essentially of 1,2,3-trihydroxypropane ("THP"; glycerol) in solution in a suitable carrier such as distilled water or saline solution. In accordance with the contraceptive technique, the contraceptive preparation is injected into the testes. The THP has been found to act as a potent inhibitor of spermatogenesis, resulting in long term infertility, with no apparent effect on libido, secondary sex characters, mating behavior and hormone levels. There are no observed side effects and no observed effects on other aspects of reproductive and hormonal biology.

Excerpt(s): This invention relates generally to contraception, and specifically to a biological contraceptive and contraceptive technique for males. ... In the case of humans, overpopulation remains one of the most critical problems facing humankind. In recent times, the contraceptive pill has been successfully employed by women to prevent ovulation and conception. However, the contraceptive pill designed for use by women consists of steroids (a mixture of progestagens and estrogens) and there is considerable concern about its potentially harmful side-effects following prolonged use. There is thus at present considerable pressure to block the reproductive capacity in the male and to not place all the chemical and psychological burden on the female. ... Methods of male fertility control are also highly desirable in the case of animals, especially as simpler alternatives to the present procedures of castration or other forms of surgical sterilization.

Web site: http://www.delphion.com/details?pn=US04720507__

- **Biological contraceptive for males**

Inventor(s): Wiebe; John P. (London, CA)

Assignee(s): The University of Western Ontario (London, CA)

Patent Number: 4,760,097

Date filed: October 1, 1985

Abstract: A male contraceptive preparation is disclosed. The contraceptive preparation consists essentially of 1,2,3-trihydroxypropane in solution in a suitable carrier such as distilled water or saline solution. The method of contraception comprises injecting the contraceptive preparation into the testes. The 1,2,3-trihydroxypropane has been found to act as a potent inhibitor of spermatogenesis, resulting in long term infertility, with no apparent effect on libido, secondary sex characters, mating behaviour and hormone levels. There are no observed side effects and no observed effects on other aspects of reproductive and hormonal biology.

Excerpt(s): This invention relates generally to contraception, and specifically to a biological contraceptive for males. ... In the case of humans, overpopulation remains one of the most critical problems facing humankind. In recent times, the contraceptive pill has been successfully employed by women to prevent ovulation and conception. However, the contraceptive pill designed for use by women consists of steroids (a mixture of progestagens and estrogens) and there is considerable concern about its potentially harmful sideeffects following prolonged use. There is thus at present considerable pressure to block the reproductive capacity in the male and to not place all the chemical and psychological burden on the female. ... Methods of male fertility control are also highly desirable in the case of animals, especially as simpler alternatives to the present procedures of castration or other forms of surgical sterilization.

Web site: http://www.delphion.com/details?pn=US04760097__

- **Birth control and disease preventing device**

Inventor(s): Wu; Cheng M. (13726 Damian St., Cerritos, CA 90701)

Assignee(s): none reported

Patent Number: 5,156,165

Date filed: May 6, 1991

Abstract: This invention relates to a birth control and disease preventing device, and more particularly to a device having a large pubic elastic shield (40) integrated about a secure-and-rolled-up (toroidal) ring (28) which is integrated about the open end (26) of a tubular portion that is configured as a conventional condom. The pubic shield has a stationary upper portion (42) and two movable lower portions (44), (46), and has a folding portion (48) between the movable portion to improve the protection of the area around the pubic and the scrotum when the user's legs are in different positions.

Excerpt(s): This invention relates to a birth control and disease preventing device, and more particularly to a device having a large elastic pubic shield integrated about a secure-and-rolled-up ring which integrated about the open end of a tubular sheath. The

public shield has a stationary upper portion and two movable lower portions, and has a folding portion between the movable portions to improve the protection on the area around the pubic and the scrotum when the user's legs are in different positions. ... As the population of the earth has increased tremendously each year, birth control is an important subject to pursuit. Another important problem facing the world today is the serious consequence of the transferable diseases obtained through sexual intercourse: from the annoying skin itch, to the awful venereal diseases, and sometimes to the deadly AIDS. It can be understood that effective method is still needed to provide more efficiency for avoiding the unwanted pregnancy; and more important, to reducing the possibility of obtaining communicable sexual diseases when performing a sexual activity. ... Various methods have been developed for birth control, e.g. birth control pill and IUD, etc. However, using a condom for birth control is still a simple method for those people, who may have side effects when using other birth control methods, or due to personal preference. While no contraceptive device provides 100% protection, a condom can aid in the prevention of having pregnancy when properly used. For the purpose of preventing transmission of sexual diseases, a condom is considered simple and common useful device to achieve such goal.

Web site: http://www.delphion.com/details?pn=US05156165__

- **Birth control device**

Inventor(s): Robichaud; David M. (15 Edgehill Road, Islington, Ontario, CA)

Assignee(s): none reported

Patent Number: 4,794,920

Date filed: July 14, 1987

Abstract: A birth control device comprises an oversized sheath portion fitting loosely about the male organ and a flange about the open end of the sheath for retaining the open end of the device outside the woman's body.

Excerpt(s): The present invention is a birth control or prophylactic device for use by male and female partners during coitus. ... Presently available prophylactic devices for men comprise various types of condoms which are sheaths made of rubber or a synthetic material which is very thin yet strong enough to prevent the formation of holes therein during use. These devices are elastic and designed to fit tightly on the male organ during coitus. Condoms are also available which are made of animal skin or tissue which is generally less elastic than the rubber or synthetic materials and thus, do not fit as tightly about the male organ. However, the general principle of operation for all condoms presently available is the same, namely that the device frictionally or elastically engages the male organ during coitus to provide a receptacle for seminal fluid. ... One of the presently available prophylactic devices for women is a diaphragm which is positioned within the vagina to provide a physical barrier to sperm at the entrance to the uterus.

Web site: http://www.delphion.com/details?pn=US04794920__

- **Birth control method and device employing electric forces**

Inventor(s): Kaali; Steven (Penthouse E, 225 E. 63rd St., New York, NY 10021), Schwolsky; Peter M. (4101 Cathedral Ave. NW., Washington, DC 20016), Porter; Joseph W. (Washington, DC)

Assignee(s): Kaali; Steven (New York, NY), Schwolsky; Peter M. (Washington, DC)

Patent Number: 4,616,640

Date filed: November 14, 1983

Abstract: A method and device for birth control which comprises producing an electrical force within the cervical canal of a female for acting on male sperm and preventing migration of the sperm through the cervical canal and into the uterine cavity. The electrical force is provided by a self-contained, sealed battery capable by itself of producing an electromotive force and is inserted within the cervical canal and retained therein over extended periods of use. The device is designed such that it does not impede the free flow of menstrual and other discharges through the cervical canal and is fabricated with or covered by biologically inert material so that it can be retained in place in the cervical canal for indefinite periods as long as desired by the user for birth control purposes. The device is provided with anchoring means which are designed to engage the wall of the cervical canal for securely holding the device in place within the cervical canal with the electric force producing electrodes so positioned as to be exposed to fluids passing through the cervical canal.

Excerpt(s): This invention relates to the field of birth control methods and devices for use by human females as well as the female of most quadrupeds and other vertebrates. ... Known methods of birth control have relied either on chemical action (i.e., birth control pills, spermicides or the like), or on mechanical means such as prophylactics, diaphragms, the interuterine device (IUD) or a combination of both chemical and mechanical means, or on permanent birth control measures such as tubaligation. While these known devices and methods for using them have been satisfactory in certain respects, there is always room for improvement in the field of birth control. ... The present invention provides an entirely new approach to birth control methods and devices wherein an electric force is employed within the cervical canal of the female so that the electrical force acts on and prevents active male sperm from fertilizing female eggs thereby providing a reliable and safe form of birth control.

Web site: http://www.delphion.com/details?pn=US04616640__

- **Carrying case for contraceptive devices**

Inventor(s): Handelman; Susan (2910 Orchard La., Wilmette, IL 60091)

Assignee(s): none reported

Patent Number: 4,301,916

Date filed: April 7, 1980

Abstract: A compact carrying case for contraceptive devices has a series of pouches and a compartment which hold various elements used in a birth control system. The pouches have an entrance side which has elastic closing means for holding partially enclosed devices in place. A lid is hingedly attached to the bottom of the case adjacent the open ends of the pouches. The compartment fully encloses an additional device in one of two ways, both of which permit easy cleaning. A compartment having an

entrance edge may be provided with a flap which covers the edge and fastens shut. The edge itself may expand, or expanding sides may be provided on the compartment, for easy cleaning. In the alternative, the compartment may be hingedly attached to the bottom and have an elastic opening in the side adjacent the pouches. The case may be closed by folding the compartment over the pouches and fastening the lid of the case to the outside of the compartment. The compartment may be opened and unfolded for easy cleaning.

Excerpt(s): This invention relates to carrying cases for contraceptive devices, and more particularly to compact carrying cases which may be cleaned easily. ... Various methods of contraception have been developed to prevent pregnancy. Some are relatively unreliable, while others may cause harmful side effects and present potential health hazards to the user. The use of a diaphragm as a method of contraception has become increasingly popular because it is relatively reliable and safe. ... A contraceptive diaphragm is generally stored in a hard, plastic cover. Use of the diaphragm usually requires several ancillary articles, including a chemical jelly, which is generally purchased in a tube, an introducer for inserting the diaphragm into the body, and an applicator for putting additional jelly on the diaphragm without removing it from the body. Each of these devices is generally purchased in individual packages, and is often carried loosely and unorganized in a handbag or purse.

Web site: http://www.delphion.com/details?pn=US04301916__

- **Cellulose sulfate for use as antimicrobial and contraceptive agent**

Inventor(s): Anderson; Robert A. (Chicago, IL), Zaneveld; Lourens J. D. (Chicago, IL), Usher; Thomas C. (Nassau, BS)

Assignee(s): Polydex Pharmaceuticals Ltd. (Nassau, BS), Rush-Presbyterian-St. Luke's Medical Center (Chicago, IL)

Patent Number: 6,063,773

Date filed: September 29, 1995

Abstract: The present invention relates to a method of reducing the risk of infections and the risk of conception. In particular, the invention relates to cellulose sulfate having contraceptive and anti-microbial properties. Cellulose sulfate may be administered in appropriate dosage forms to reduce the risk of infections or the risk of conception. It can also be used during sexual contact to concomitantly reduce the risk of conception and the risk of sexually transmitted diseases.

Excerpt(s): The present invention relates to a pharmaceutical composition and method for reducing the risk of conception and transmission of infectious agents during sexual contact. In particular, it relates to a composition comprising cellulose sulfate having contraceptive and anti-microbial and anti-viral properties. ... Various contraceptive methods are known for reducing the risk of conception. The condom is a contraceptive method developed for use by men, and is known to reduce the risk of contracting sexually transmitted diseases. Presently, no contraceptive method for use by women is generally known to be effective in reducing the risk of contracting sexually transmitted diseases such as gonorrhea, herpes and more recently, AIDS. ... Contraceptive methods currently available to and under the control of women include oral contraceptives, diaphragm, intrauterine devices and vaginal foams, creams and suppositories. Each one of the vaginal formulations utilizes a cytotoxic agent, usually the detergent nonoxynol-9, as active ingredient. A vaginal suppository containing sulphuric acid ester of a

polysaccharide (SAEP) in combination with nonoxynol-9 is also known. SAEP is a sulfated polysaccharide with a molecular weight of about 175,000. It inhibits hyaluronidase, an enzyme which is believed to have an indispensable role in fertilization. Nonoxynol-9, if used frequently causes irritation to the mucus membrane of the vagina, inactivates the natural protective vaginal flora and can cause lesions through which an infectious agent can invade and cause infection.

Web site: http://www.delphion.com/details?pn=US06063773__

- **Chimeric contraceptive vaccines**

Inventor(s): Reeves; Jerry J. (Pullman, WA), Bertrand; Kevin P. (Pullman, WA), Zhang; Yuzhi (Pullman, WA)

Assignee(s): Washington State University (Pullman, WA)

Patent Number: 6,045,799

Date filed: May 4, 1998

Abstract: The invention is directed to contraceptive vaccines comprising a carrier protein or fragment thereof in peptide linkage with a reproduction related polypeptide, protein or fragment thereof, and to DNAs encoding the chimeric proteins. The invention also includes the use of the chimeric proteins in immunocontraceptive methods.

Excerpt(s): Fertility management in mammals is a global issue of agricultural, economic and social importance. Conventional approaches of preventing pregnancy are surgical, can cause morbidity and mortality, and are unacceptable in some countries. Other approaches to contraception include the use of various hormones to regulate the ovulatory cycle and which may be associated with certain side effects. Still other approaches to contraception include the use of zona pellucida proteins as immunocontraceptives to induce permanent or transient infertility. ... The decapeptide luteinizing hormone releasing hormone (LHRH) is the key regulatory brain peptide that controls reproduction in mammals and, thus, is a logical target for devising approaches to contraception. The endocrine effects of active immunization against LHRH have been studied in a variety of young and adult male and female animals (Adams et al., *Biol. Reprod.* 35:360, (1986); Esbenshade et al., *Biol. Reprod.* 33:569, (1985); Garza et al., *Biol. Reprod.* 35:347, (1986); Johnson et al., *J. Anim. Sci.* 66:719, (1988); Schanbacher et al., *Am. J. Physiol.* 242:3201, (1985)). These studies demonstrated decreases in gonadotropins, sperm production, follicular development, ovulation and conception after immunization against LHRH chemically conjugated to a carrier protein. ... Johnson et al., *J. Anim. Sci.* 66:719, (1988) developed a conjugated ovalbumin LHRH molecule which, when used with Complete Freund's Adjuvant (CFA), was 100% effective in preventing pregnancy in a limited number of animals. However, in a commercial application in Australia, LHRH conjugated to ovalbumin (Vaxtrate) prevents only 80% of pregnancies of heifers (Hoskinson et al., *Austral. J. Biotech.* 4:166-176 (1990)).

Web site: http://www.delphion.com/details?pn=US06045799__

- **Chorionic gonadotropin derived antigen for early pregnancy test and contraceptive vaccine**

Inventor(s): Bahl; Om P. (Williamsville, NY)

Assignee(s): Research Corporation (New York, NY)

Patent Number: 4,268,435

Date filed: April 17, 1979

Abstract: Antisera suitable for detecting the presence of human chorionic gonadotropin in body fluids by immunoassay are prepared by administering to a host animal an antigen comprising the .beta.-subunit of human chorionic gonadotropin which has been modified by cleaving and optionally conjugating the thus modified .beta.-subunit with a protein or hapten capable of enhancing the immunogenetic potency of the antigen. The antigens are also useful for the contraceptive purposes to terminate pregnancy.

Excerpt(s): This invention relates to antisera produced by novel antigens, which are useful in testing for pregnancy in humans and more particularly to antisera having an immunological reaction with human chorionic gonadotropin, wherein the immunological cross-reactivity with human luteinizing hormone is reduced or eliminated. This further relates to the production of antigens to prepare said antisera, and which may also be used for contraceptive purposes to terminate human pregnancy. ... Human chorionic gonadotropin is a hormone produced by the placenta during pregnancy. Presence of the hormone in the serum and urine therefore serves as an indication of pregnancy. The presence of this hormone has been detected by its effect on the ovaries of animals and, more recently, by immunoassay. ... However, because the tests used hitherto do not sufficiently distinguish between hCG and other hormones which are present, such as luteinizing hormone, the presence of hCG cannot be unambiguously detected until several weeks after conception, by which time the levels of hCG are high enough so that it can be detected even in the presence of interfering substances.

Web site: http://www.delphion.com/details?pn=US04268435__

- **Combination compound for contraception based on natural estrogen**

Inventor(s): Dittgen; Michael (Apolda, DE), Fricke; Sabine (Jena, DE), Hoffmann; Herbert (Jena, DE), Moore; Claudia (Jena, DE), Oettel; Michael (Jena, DE), Ostertag; Monika (Göttingen, DE)

Assignee(s): Jenapharm GmbH & Co. KG (Jena, DE)

Patent Number: 6,133,251

Date filed: October 25, 1996

Abstract: The combination preparation for contraception includes a first stage of 2 to 4 first stage daily dosage portions, a second stage of two groups of second stage daily dosage portions, a third stage of 2 to 4 third stage daily dosage portions and an additional stage of 2 to 4 additional stage daily dosage portions. The first stage daily dosage portion is an effective amount of natural estrogen, the second stage daily dosage portion is an effective amount of a combination of natural estrogen and natural or synthetic gestogen, the third stage daily dosage portion is another effective amount of natural estrogen and an additional stage daily dosage portion consists of a placebo. The first group of the second stage consists of 3 to 5 daily dosage portions and the second

group, 13 to 17 daily dosage portions. More of the gestogen is included in the effective amount in the second group of the second stage than in the first group. The effective amount of the natural estrogen is constant in both the first and third stages, but smaller in the third stage than in the first stage.

Excerpt(s): The present invention relates to a multistage contraceptive preparation based on natural estrogens. ... Oral contraceptives were first marketed 60 years ago. By continuous research it has been possible to reduce the required dosages of hormones in a stepwise manner. Currently low dosage oral contraceptives exist which chiefly comprise an estrogen component and a gestogen component. The hormone dosage of these contraceptives is delivered in different combinations and dosages in the form of combination preparations (one-stage preparation) or multistage combination preparations (staged preparations) and sequenced preparations (two-stage preparations) over time periods of from 21 to 28 days. ... One-stage preparations (usually designated as combination preparations) are characterized by a constant dosage of certain estrogens and gestogens each day. Because of the uniform delivery of gestogen ingredients with estrogen components from the first application day, the combination preparation is a highly reliable contraceptive.

Web site: http://www.delphion.com/details?pn=US06133251__

- **Combined pharmaceutical estrogen-androgen-progestin oral contraceptive**

Inventor(s): Hughes, Jr.; Claude L. (Mebane, NC), Jayo; Manuel J. (Winston-Salem, NC)

Assignee(s): Wake Forest University (Winston-Salem, NC)

Patent Number: 5,770,226

Date filed: July 10, 1996

Abstract: Disclosed are methods and compositions for oral contraception. Certain compositions of the invention contain androgens, preferably methyltestosterone to be taken by younger users of the contraceptives to inhibit adverse effects of oral contraceptive use on bone mineral density.

Excerpt(s): The present invention relates generally to the field of pharmaceutical preparations and in particular to the field of oral contraceptives. In particular the present invention addresses the field of peak bone mass accrual in young oral contraceptive users. ... Due to the relatively high rate of teenage pregnancy in the United States, pediatric and adolescent gynecologists often recommend that young women take some form of contraception to prevent unwanted pregnancies (The Contraception Report, 1995). The most common method of contraception among adolescents is oral contraceptives, taken by approximately 46% of the sexually active population. Consequently, almost half of all premenopausal women (<44 years) are potentially taking oral contraceptives while their skeleton is still maturing and before reaching peak bone mass, which occurs at about age 30-35. Peak bone mass is a term that describes a point at which the maximum bone density is reached. For a woman, bone density increases until about age 30-35, and then slowly decreases for the remainder of her life. This peak is known as the peak bone mass. As the bone density decreases in later years, osteoporosis or bone breakage are more likely to occur. It is important, therefore, to forestall these problems by attaining as high a peak as possible. ... Although estrogen is necessary for maintaining bone density in premenopausal women, the role of androgens or their combined effect is unclear. It is generally accepted that low-dose estrogens are potent bone growth promoters and probably provide the major growth stimulus in girls,

while in boys, estrogens may be involved in the growth spurt along with testosterone (Kulin, 1991). However, some recent evidence suggests that androgens play an important role in building and maintaining bone in the female as well as in the male. During puberty, androgens influence bone growth and peak bone mass, but after puberty, during adolescence and early adulthood, androgens are also involved in the maintenance of bone mass. Peak bone mass is acquired by age 30-35 (Recker, et al., 1992), but 15% of the adult height and 48% of the skeletal mass are attained during adolescence.

Web site: http://www.delphion.com/details?pn=US05770226__

- **Competitive progesterone antagonist for demand-oriented female birth control**

Inventor(s): Chwalisz; Kristof (Berlin, DE), Stockemann; Klaus (Berlin, DE), Schmidt-Gollwitzer; Karin (Berlin, DE), Klemann; Walter (Berlin, DE)

Assignee(s): Schering Aktiengesellschaft (Berlin, DE)

Patent Number: 6,143,754

Date filed: March 22, 1999

Abstract: This invention describes the novel use of dissociated competitive progesterone antagonists for the production of a pharmaceutical agent for demand-oriented female birth control (pill on demand), which can be used regardless of the point in the menstrual cycle, in a dosage unit that is to be administered on a one-time basis, whose dosage is below the ovulation-inhibiting dosage.

Excerpt(s): This invention relates to the use of at least one competitive progesterone antagonist for the production of a pharmaceutical agent for demand-oriented female birth control ("pill on demand"), which can be used at any point in the menstrual cycle, in a dosage unit that is to be administered on a one-time basis, whose dosage is below the ovulation-inhibiting dosage. ... Already all over the world, the use of oral contraceptives has developed into a business factor that cannot be ignored. Especially in view of the fact that the world population is continuing to shoot upward, further development of the hitherto proven methods for birth control is absolutely necessary. ... Puri et al., Contraceptive Potential of a Progesterone Antagonist ZK 98 734: Effect on Folliculogenesis, Ovulation and Corpus Luteum Function in Bonnet Monkeys. In Moudgal et al., (eds) (1990).

Web site: http://www.delphion.com/details?pn=US06143754__

- **Composition for contraception**

Inventor(s): Spona; Jurgen (Vienna, AT), Dusterberg; Bernd (Berlin, DE), Ludicke; Frank (Geneva, CH)

Assignee(s): Schering Aktiengesellschaft (Berlin, DE)

Patent Number: RE37,564

Date filed: February 15, 2000

Abstract: A combination product for oral contraception is disclosed comprising an estrogen selected from 2.0 to 6.0 mg of 17.beta.-estradiol and 0.020 mg of ethinylestradiol; and a gestagen selected from [0.25 to 0.30]. I.add.2.5 to 3.0 I.addend.mg

of drospirenone and [.0.1 to 0.2]. .ladd.1 to 2 .laddend.mg of cyproterone acetate, followed by 5 or 4 pill-free or sugar pill days.

Excerpt(s): This invention relates to the common use of estrogen and gestagens for the production of a combination preparation for oral contraception and a corresponding pack containing this combination preparation. ... Combination preparations for oral contraception are already known, for example, Femovan.RTM. [DE-PS 2 546 062] or Marvelon.RTM. [DE-OS 2 361 120]. These preparations consist of 21 active ingredient-containing (estrogen/gestagen) dosage units and 7 active ingredient-free coated tablets (sugar pills; placebos). The dose to be administered daily is uniformly high in each case (so-called single-phase preparations) and produces the desired contraceptive effect in the entire intake period and in the intake pause or during the intake of the placebos. In most preparations, a 7-day interruption of the intake of active ingredient-containing dosage units was considered necessary until quite recently to trigger a reliable withdrawal bleeding and thus to achieve a satisfactory cycle control. ... Other preparations, which exhibit more than 21 dosage units containing an estrogenic and progestational active ingredient, and in which the intake pause is partially (Ijzerman, Pasquale) or completely (Kuhl) bridged over by estrogen-containing dosage units. In this case, it is possible that the synthetic estrogen ethinylestradiol otherwise contained in oral contraceptives is replaced partially or completely by a conjugated estrogen, preferably estradiol.

Web site: http://www.delphion.com/details?pn=US0RE37564__

- **Compositions and methods of effecting contraception utilizing melatonin**

Inventor(s): Cohen; Michael (Wassenaar, NL)

Assignee(s): Applied Medical Research (Washington, DC)

Patent Number: 4,855,305

Date filed: March 23, 1987

Abstract: A method of effecting contraception in human females comprises administering an ovulation-inhibiting amount of melatonin. Optionally, the melatonin is administered in combination with a progestogen and/or an estrogen. The administration of melatonin also provides a method of preventing breast cancer in women.

Excerpt(s): This invention relates to a method of inhibiting ovulation in human females. More particularly, the invention relates to a method of inhibiting ovulation by administering an ovulation-inhibiting amount of melatonin. Optionally, the melatonin is administered in combination with a progestational and/or estrogenic agent. ... Research and development in the field of contraception in humans has been in the areas of physical and chemical barriers to sperm transport, such as vaginal foams, diaphragms, intrauterine devices, and condoms, and in the area of oral contraceptives containing one or more steroid hormones. Oral contraceptives have been developed which are highly effective in preventing contraception, and today more than fifty million women around the world use oral contraceptives. Typically, the oral contraceptives take the form of a combination of an estrogen and a progestogen (also known as progestin). In some of these regimens, known as combination regimens, a consistent dose of an estrogen and a progestogen is administered daily throughout the period of administration. In other regimens, referred to as sequential regimens, the amount of estrogen or progestogen or both is increased or decreased during the menstrual cycle. Some sequential regimens

provide two-stage or bi-phasic control. (See, for example, U.S. Pat. No. 3,969,502). Others provide a three-stage or tri-phasic combination of components. (See, for example, U.S. Pat. Nos. 4,628,051; 4,390,531.) A third type of regimen also is known in which one or more progestogens is administered daily throughout the menstrual cycle. ... The hormones in oral contraceptives act both within the central nervous system and in tissues of the urogenital tract to inhibit reproductive function. The principal sites of action are the hypothalamus and pituitary to prevent the midcycle surge of luteinizing hormone (LH) and hence to prevent ovulation. The basal concentrations of LH and follicle-stimulating hormone (FSH) and plasma levels of estradiol and progesterone are suppressed in users of oral contraceptives. In essence, these contraceptives work by causing changes in hormone levels that imitate those caused by pregnancy. This effect is dose dependent. These conventional oral contraceptives are administered for a minimum of 21 days of a woman's cycle, and in some instances for the entire 28-30 days of the cycle.

Web site: http://www.delphion.com/details?pn=US04855305__

- **Compounds with progesterone-antagonistic and antiestrogenic action to be used together for female contraception**

Inventor(s): Chwalisz; Kristof (Berlin, DE), Stockemann; Klaus (Berlin, DE)

Assignee(s): Schering Aktiengesellschaft (Berlin, DE)

Patent Number: 6,362,237

Date filed: December 26, 1995

Abstract: This invention describes the use of at least one compound with a progesterone-antagonistic (PA) action and at least one compound with an antiestrogenic (AE) action, each in a non-ovulation-inhibiting dosage in a single dosage unit, for the production of pharmaceutical agents for female contraception.

Excerpt(s): This invention relates to the use of at least one compound with progesterone-antagonistic (PA) activity and at least one compound with antiestrogenic (AE) activity, each in a non-ovulation-inhibiting dosage in a single dosage unit, for the production of pharmaceutical agents for female contraception. ... The pharmaceutical agents produced according to the invention exert their contraceptive action based on receptivity inhibition, by preventing nidation of a fertilized egg cell in the mucous membrane of the uterus, without ovulation or the cycle being disrupted. ... Already all over the world, the use of oral contraceptives has developed into a business factor that cannot be ignored. Especially in view of the fact that the world population is continuing to shoot upward, further development of the hitherto proven methods for birth control is absolutely necessary.

Web site: http://www.delphion.com/details?pn=US06362237__

- **Contraception and flavor delivery system**

Inventor(s): Stang; Michael A. (26 Stockmill Rd., Apt. F, Pikesville, MD 21208)

Assignee(s): none reported

Patent Number: 4,919,149

Date filed: July 8, 1988

Abstract: A contraception and flavor delivery system (10) includes an extended tubular member (20) having a closed distal end (22) and an open proximal end (24). The contraception and delivery system (10) further includes a mechanism for flavor delivery (30) formed on an external surface of the tubular member (20). The mechanism for flavor delivery (30) includes at least one longitudinally extended tubular housing (40) having an open first end (42) and a closed second end (46) for containing a predetermined quantity of an ingestible flavored composition. The open first end (42) of tubular housing (40) is provided with a closure (44) adapted to release the ingestible flavored composition into a bodily orifice responsive to an external stimuli.

Excerpt(s): This invention directs itself to contraceptive systems for preventing the transmittal of disease and preventing conception. In particular, this invention directs itself to a condom-like device which includes a means for dispensing a flavored composition into the bodily orifice penetrated therewith. More in particular, this invention pertains to condom-like devices having at least one tubular housing formed on an external surface thereof for containing a predetermined quantity of an ingestible flavored composition. Further, this invention directs itself to a means for delivering a flavored composition to a bodily orifice having a closure adapted to release the flavored composition responsive to an external stimuli. ... Contraceptive systems are well known in the art. The best prior art known to the Applicant include U.S. Pat. Nos.: 4,432,357; 4,498,466; 4,564,006; 4,508,114; 3,809,090; 4,009,717; and, 4,625,718, and include the publication entitled "The Condom Book" by Jane Everett and Walter D. Glanze, Copyright 1987. ... In some prior art systems, such as that described in the publication entitled "The Condom Book" condom-like devices formed from a confection, known as candy condoms, are provided. The device which is sleeve-shaped is placed over the male genital member and while playful penetration is possible, the device is intended to be simply eaten off. However, this device does not offer any contraceptive protection, nor does it provide any protection from the transmittal of disease.

Web site: http://www.delphion.com/details?pn=US04919149__

- **Contraception and prophylaxis enhancement system**

Inventor(s): Boarman; George L. (13187 Highland Rd., Highland, MD 20777)

Assignee(s): none reported

Patent Number: 5,113,873

Date filed: June 4, 1990

Abstract: The contraception and prophylaxis enhancement system (10) is provided for use by women, having a one-piece formation which includes an extended tubular member (12) coupled to a genital shield member (14). Contraceptive system (10) includes an absorbent fluid capturing element (40) disposed within the distal end (30) of tubular member (12). In addition to its fluid absorbing function, absorbent fluid capturing element 40 applies an elastic biasing force to the tubular wall (31) of tubular member (12) for biasing wall (31) against the interior surface of the vaginal cavity, thereby providing a mechanism for retaining tubular member (12) therein. Further, contraceptive system (10) includes a mechanism for inserting tubular member (12) within the vaginal cavity. A tubular container (50) provides both the instrumentality for insertion and placement of tubular member (12) within the vaginal cavity, as well as providing an internal cavity (56) for storage of the prophylactic assembly (11) and the retention straps (18).

Excerpt(s): In some prior art references, such as the inventor's previously issued U.S. Pat. No. 4,834,114 there are provided prophylactic systems incorporating shields for use by females. However, this system lacks an absorbent fluid capturing element for preventing seepage of bodily fluids discharged into the tubular member. Such is important to the overall prophylactic concept whereby a barrier is maintained between the genitals of sexual partners and contact with the partner's bodily fluids must be prevented both during and subsequent to use of the device. Further, this prior art system lacks a means for inserting the tubular member within the vaginal cavity. Such means for insertion is important to promote the continued use of such contraceptive systems. ... Other prior art systems, such as that disclosed in U.S. Pat. No. 4,393,871 are directed to sponge-like contraceptive devices which are inserted into the vaginal cavity. However, such devices are impregnated with spermicides or other medications, and are not intended to absorb and prevent seepage of discharged bodily fluids. ... Other prior art systems direct themselves to various devices having tubular members coupled to retention or support straps, but lack similar means for retaining the tubular member within the vaginal cavity, absorbent fluid capturing elements, and insertion devices for providing an overall system. tubular member within the vaginal cavity also providing means for storage of the contraceptive prior to use.

Web site: http://www.delphion.com/details?pn=US05113873__

- **Contraception in female primates without affecting the menstrual cycle**

Inventor(s): Bhatnagar; Ajay (Basel, CH)

Assignee(s): Ciba-Geigy Corporation (Tarrytown, NY)

Patent Number: 5,583,128

Date filed: September 2, 1994

Abstract: The invention relates to the use of aromatase inhibitors for contraception in female primates and to a method for contraception in female primates using such substances and to the use of those substances for the preparation of pharmaceutical compositions for contraception in female primates.

Excerpt(s): Pregnancy occurs in primates, including humans, when a fertilised egg has become implanted in the mucous coat of the uterus. In the course of the female cycle, under the control of the anterior pituitary hormones FSH and LH, follicle stimulation and ovulation occur, whereupon the ovum is released into the funnel of the fallopian tube. If a sperm cell meets the ovum, fertilisation occurs. The fertilised egg takes 3-4 days to pass through the fallopian tube and into the uterus. During that time, by a series of divisions, it develops into a blastocyst, which implants in the tissue of the uterus approximately 7 days after fertilisation. ... Conventional hormonal contraception (the "pill") relies on the inhibition of ovulation. The compositions used are a combination of synthetic gestagens and oestrogens which, by means of a negative feed-back mechanism, inhibit secretion of the gonadotropic hormones LH and FSH and thus inhibit follicle stimulation and ovulation. ... The so-called "minipill" consists of a low dose of gestagen. Contraceptives of that type do not have an inhibiting effect on the cycle, rather they stimulate the production of cervical mucus and alter its physical properties so that the sperm are not able to pass through it. This form of contraception relies exclusively on a mechanical barrier produced by physically altering the cervical mucus and is therefore less reliable than the ingestion of ovulation inhibitors, but on the other hand is associated with fewer risks (side effects).

Web site: http://www.delphion.com/details?pn=US05583128__

- **Contraception method using competitive progesterone antagonists and novel compounds useful therein**

Inventor(s): Chwalisz; Krzysztof (Berlin, DE), Elger; Walter (Berlin, DE), Schmidt-Gollwitzer; Karin (Berlin, DE), Ottow; Eckhard (Berlin, DE)

Assignee(s): Schering AG (Berlin, DE)

Patent Number: 6,608,074

Date filed: November 28, 2001

Abstract: Competitive progesterone antagonists, including two novel steroids, viz., 11.beta.,19-[4-(cyanophenyl)-o-phenylene]-17.beta.-hydroxy-17.alpha.-(3-hydroxyprop-1(Z)-enyl)-4-androsten-3-one and 11.beta.,19-[4-(3-pyridinyl)-o-phenylene]-17.beta.-hydroxy-17.alpha.-(3-hydroxyprop-1(Z)-enyl)-4-androsten-3-one, inhibit formation of endometrial glands at below their ovulation inhibiting dose and the abortive dose, and thus achieve oral contraception in females without adversely affecting the menstrual cycle and without risk of aborting a previous implanted fertilized egg or a fetus.

Excerpt(s): This invention relates to a novel contraceptive method employing a competitive progesterone antagonist and to novel progesterone antagonists useful therein. ... By inhibiting the formation of endometrial glands and epithelium growth, the implantation of a fertilized egg in the uterus is rendered impossible (inhibition of the uterine receptivity). The employment of competitive progesterone antagonists according to the invention can thus be used for contraception in the female. ... U.S. Pat. No. 4,764,513 teaches that the receptivity of the endometrium for implantation (implantation window) can be shifted (delayed) by administering a competitive progesterone antagonist to a female to increase the likelihood of successful implantation of an in vitro fertilized egg.

Web site: http://www.delphion.com/details?pn=US06608074__

- **Contraception system and method**

Inventor(s): Pasquale; Samuel A. (5 Normandy Ct., Basking Ridge, NJ 07920)

Assignee(s): none reported

Patent Number: 4,921,843

Date filed: October 20, 1988

Abstract: A method of contraception is disclosed which comprises a two-stage protocol. In the first stage, an estrogenic compound in a first composition is administered daily as the sole contraceptively active substance to a human female from about Day 2 to about Day 7 of her menstrual cycle, where Day 1 is the first day of menses. The second stage of the protocol occurs immediately thereafter during which at least one follow-up composition containing a progestin is administered daily to the same human female. The follow-up composition can contain a progestin as the sole contraceptively active ingredient, or can contain a combination of an estrogenic compound with a progestin in different weight ratios. A drug delivery system containing daily dosage units is also described.

Excerpt(s): This invention relates to the practice of contraception utilizing a two-stage protocol that minimizes the incidence of breakthrough bleeding. ... Oral contraceptives first became available in the early 1960's. Through continued research, new lower-dose estrogen products of high effectiveness have been developed. The oral administration of combination-type preparations containing estrogens and progestins has been known for some time. The administration of purely sequential preparations to mimic the normal 28-day menstrual cycle of the patient is also known. In such instances, an estrogen is administered at a high dosage, in the absence of a progestin, over a period of fourteen to sixteen days, thereafter the estrogen is administered at the same high dosage in combination with a relatively high amount of a progestin over a period of five to six days, and during the next seven to eight days there is no administration of estrogen or progestin. Physician's Desk Reference, 30th edition, pages 1026, 1127 and 1532, respectively (1976). ... It has more recently been published in Goodman and Gilman, The Pharmacological Basis of Therapeutics, 7th edition, pages 1430-1436 (1985), that sequential combination administration includes the usage of an estrogen at a high dosage, in the absence of a progestin, over a period of seven days, thereafter the estrogen is administered at the same high dosage in combination with a relatively high amount of a progestin over a period of 15 days, and during the next six days there is no administration of estrogen or progestin.

Web site: http://www.delphion.com/details?pn=US04921843__

- **Contraceptive**

Inventor(s): Lipfert; Donald E. (Woolwich, ME), Romney; Seymour L. (Mamaroneck, NY), Zeidman; Robert (Mamaroneck, NY), Goldschmidt; Willfred (Greenwich, CT)

Assignee(s): The Medevice Company (Greenwich, CT)

Patent Number: 3,952,737

Date filed: August 28, 1974

Abstract: A contraceptive device in the form of a pessary or cervical cap for attachment to the cervix, comprising a valve mechanism to permit outflow of material from the cervix and prevent inflow of material into the cervix.

Excerpt(s): Various forms of contraceptive devices of a mechanical nature are known to the art. Some of those are in the form of pessaries or cervical caps designed to cover the opening of the uterus and prevent the inflow of semen. There are also intrauterine devices which require planting intrauterine portions of the device in the sensitive interior of the uterus. Intrauterine devices may also require the use of drugs or medicaments. ... The present invention provides a non-intrauterine contraceptive system which will prevent the inflow of sperm to the uterus and yet permit normal menstrual outflow while the device is attached to the uterus without the necessity of using medicaments or drugs in connection therewith. ... It is a principal object of the invention to provide a cervical cap which may be applied with little training and may be effectively attached to the cervix for extended periods of time without danger of being rejected or causing side effects from the use of drugs, or from positioning within sensitive portions of the uterus.

Web site: http://www.delphion.com/details?pn=US03952737__

- **Contraceptive and menstrual cycle controlling drug having oncostatic therapeutic properties for treatment of mammary tumors and melanomas, and method therefor**

Inventor(s): Frascini; Franco (Via Prandina, 7, 20127 Milano, IT), Stankov; Bojidar (Via Prandina, 7, 20127 Milano, IT), Di Bella; Luigi (Via Prandina, 7, 20127 Milano, IT), Duranti; Ermanno (Via Prandina, 7, 20127 Milano, IT), Lagguzzi; Aldo (Via Prandina, 7, 20127 Milano, IT)

Assignee(s): none reported

Patent Number: 5,272,141

Date filed: September 27, 1991

Abstract: The present invention relates to a drug for human use, having contraceptive and menstrual cycle controlling properties, characterized in that the drug comprises N-acetyl-5-methoxytryptamine or melatonin, in a dose of 100-200 mg per day, N-acetyl-2-bromo-5-methoxytryptamine or 2-bromomelatonin in a dose of 25-50 mg per day, N-acetyl-2-iodo-5-methoxytryptamine or 2-iodomelatonin, in a dose of 20-40 mgs per day, in association with a progestine compound. The administration is carried out for 23 days, by using an association of 2-iodomelatonin and/or melatonin and/or 2-bromomelatonin and a progestinic compound, followed by 5 days in which only 2-iodomelatonin and/or melatonin and/or 2-bromomelatonin is administered; the drug having oncostatic preventive and therapeutic properties, in mammary tumours and melanomas, characterized by the use of 2-iodomelatonin, melatonin and 2-bromomelatonin respectively with doses of 20-40 mgs., 100-200 mgs., 25-50 mg per day; and the drug having moreover antikinetotic properties, and being characterized by the use of 2-iodomelatonin in a dose per day of 2.5 mg.; melatonin, in a dose per day of 10 mg and 2-bromomelatonin in a dose per day of 3.5 mg, either individually and/or in association with the acetyl coenzyme A-(AcCoA), in a dose of 8-10 mg per day.

Excerpt(s): The present invention relates to a contraceptive and menstrual cycle controlling drug having oncostatic, antikinetotic preventive and therapeutic properties for treating mammary tumors and melanomas and a method therefor. ... After several years of studies and experiments, related to the mechanism of action of melatonin, this indole is at present considered as the most important hormonal product of the pineal gland. ... The developments in the field of receptor research have led to the localization of two important receptor sites of melatonin in SNC: the median eminence, pars tuberalis of the pituitary gland, and the supra chiasmatic nuclei of the hypothalamus.

Web site: http://www.delphion.com/details?pn=US05272141__

- **Contraceptive and prophylactic device**

Inventor(s): Evans; Mark I. (4734 Rolling Ridge, West Bloomfield, MI 48033), Greenwood; Frederick C. (949 Koa St., Honolulu, HI 96826)

Assignee(s): none reported

Patent Number: 4,945,923

Date filed: July 10, 1989

Abstract: A contraceptive device adapted to be worn by a female, and which serves to prevent the exchange of body fluids during intercourse, is disclosed. A preferred embodiment of the device has an elongate tubular sheath formed of thin, fluid impermeable material, the sheath having a closed inner end portion and an open outer

end portion. A resilient inner ring is connected to the inner end portion for anchoring the same to the cervix of a wearer. An outer ring is connected to the open outer end portion for maintaining the outer end portion in an open configuration.

Excerpt(s): Contraceptive devices which prevent the exchange of body fluids during sexual intercourse, and thereby serve as a prophylaxis against the sexual transmission of disease, have been known for many years. The best known of these devices is the conventional condom, though other devices in this general category have also been developed. See U.S. Pat. No. 2,410,460 to Robinson; U.S. Pat. No. 3,536,066 to Ludwig; and Swedish Patentschrift No. 117,234 to Liebermann. ... With the staggering increase in sexually transmitted diseases such as AIDS, there has been a resurgence of interest in the use of prophylactic devices such as condoms. However, many men consider the use of condoms undesirable, and there is often great resistance to their use. The availability of a simple, convenient prophylactic device which could be worn by a woman would serve to reduce this problem by giving both sexual partners the option of using a device which will prevent the exchange of body fluids. Examination of such devices in the prior art, however, reveals them to be cumbersome. Insofar as this Applicant is aware, there is no contraceptive and prophylactic device adapted to be worn by a woman on the market today which serves to prevent the exchange of body fluids during sexual intercourse. An object of applicant's invention is to provide such a device. ... The foregoing and other objects and advantages are achieved by a contraceptive device adapted to be worn by a female which serves to prevent the exchange of body fluids during intercourse, as disclosed herein. The device comprises an elongate tubular sheath formed of thin, fluid impermeable material, with the sheath having a closed inner end portion and an open outer end portion. A mounting means is connected to the closed inner end portion for anchoring the same so as to overlie the cervix of a wearer. Means are connected to the open outer end portion of the sheath for maintaining the outer end portion in an open configuration.

Web site: http://www.delphion.com/details?pn=US04945923__

- **Contraceptive and/or antivenereal disease tampon**

Inventor(s): Donald; Jack W. (Suite C, 10780 Pebble Hills, El Paso, TX 79935)

Assignee(s): none reported

Patent Number: 4,309,997

Date filed: March 24, 1980

Abstract: A new concept of pregnancy and disease prevention is provided by a medicated tampon in the form of a soft, porous foam ball of substantially spherical configuration, which is easily insertable into the vagina to cover the cervical area and which is impregnated with a contraceptive for control of pregnancy, and/or with a safe spectrum of antibiotics for control of venereal disease. The tampon may be inserted before intercourse to remain in place during intercourse.

Excerpt(s): This invention relates to the field of control of conception and/or to venereal disease control. ... Prior art methods are known for preventing conception by utilization of vaginal suppositories, foams or creams along with tampons containing contraceptive compositions. The prior art means of preventing conception are often inconvenient to use or have physiological or psychological drawbacks. ... U.S. Pat. No. 3,594,468 shows a spermicidal and germicidal composition which can be used in tablets, capsules, suppositories, powders, jellies, liquids, sprays and on fabrics.

Web site: http://www.delphion.com/details?pn=US04309997__

- **Contraceptive composition**

Inventor(s): Howie; Peter W. (Monifieth, GB2), McNeilly; Alan (Galashiels, GB2)

Assignee(s): Societe d'Etudes Scientifiques et Industrielles de l'Ile de France (Paris, FR)

Patent Number: 4,639,439

Date filed: October 10, 1985

Abstract: The invention relates to a contraceptive composition of a prolactin elevating benzamide, such as N-[(1-ethyl-2-pyrrolidiny)methyl]2-methoxy 5-sulfamoyl benzamide, and a progestogen.

Excerpt(s): The invention relates to a contraceptive composition of a prolactin elevating benzamide, such as sulpiride or N-[(1-ethyl-2-pyrrolidiny)methyl]2-methoxy 5-sulfamoyl benzamide, and a progestogen. ... Benzamides, such as sulpiride, are primarily known for their psychotropic properties. Sulpiride was observed to have a contraceptive effect at the usual doses employed to treat patients for psychiatric disorders, (100 to 1000 mg per day). It has not been used extensively as a contraceptive, however, because of the relatively high dosage required for satisfactory protection and because clinical tests have shown that protection is incomplete during the first two months of drug administration. (D. Buvat et al. Rev. Fr. Gynecol. Obstet. 71 (1) pp. 53-51). ... The use of psychotropic substances for contraceptive purposes has previously been recommended only in the form of local application as illustrated, for example in PCT publication Nos. 81/03421 and 83/00086 issued to Cormier, which describe preparations for intra-vaginal or intra-uterine use. These preparations include a psychotropic derivative, such as a phenothiazine or benzodiazepine, which is employed as a foam, jelly, or other conventional pharmaceutical vehicle for external use. In principle, the usual spermicidal compound is combined with or replaced by a psychotropic substance, which penetrates the spermatozoon membrane and inhibits spermatozoon activation by calmoduline, thus blocking the spermatozoon's fertilizing action.

Web site: http://www.delphion.com/details?pn=US04639439__

- **Contraceptive composition**

Inventor(s): Curtis-Prior; Peter B. (Histon, GB), Leslie; Stewart T. (Cambridge, GB), Miller; Ronald B. (Basel, CH), Shill; Alison L. (Histon, GB)

Assignee(s): Euroceltique S.A. (Luxembourg, LU)

Patent Number: 4,795,761

Date filed: March 6, 1987

Abstract: A contraceptive composition for application to the vagina of a female mammal comprising a contraceptive amount of a contraceptive combination, the combination containing a spermicidal or sperm-immobilizing polyethoxyethanol and a beta-adrenergic blocker (as herein before defined). The polyethoxyethanol may be, for example, an octoxynol or, which is preferred, a nonoxynol, especially nonoxynol-9. The beta-adrenergic blocker is preferably a spermicidal or sperm-immobilizing beta-adrenergic blocker, propranolol (in particular the d-isomer) being especially

preferred. The composition may also contain a spermicidal or sperm-immobilizing preservative.

Excerpt(s): The present invention relates to a contraceptive composition to be applied to the vagina of a female mammal, especially a human female, and to a contraceptive method employing the composition. ... According to the present invention, there is provided a contraceptive composition for application to the vagina of a female mammal comprising a contraceptive amount of a contraceptive combination, the combination comprising at least one spermicidal or sperm-immobilising polyethoxyethanol and at least one beta-adrenergic blocker (as herein after defined). ... Preferably the beta-adrenergic blocker is a spermicidal or sperm-immobilising material.

Web site: http://www.delphion.com/details?pn=US04795761__

- **Contraceptive compositions**

Inventor(s): Brode; George L. (Bridgewater, NJ), Doncel; Gustavo F. (Norfolk, VA), Gabelnick; Henry L. (N. Bethesda, MD), Kreeger; Russell L. (Flemington, NJ), Salensky; George A. (White House Station, NJ)

Assignee(s): Medical College of Hampton Roads (Arlington, VA), Biomaterials Corporation (Plainsboro, NJ)

Patent Number: 5,595,980

Date filed: April 7, 1995

Abstract: Improved contraceptive compositions are disclosed which comprise a spermicide or virucide, a polymeric delivery component and optionally a cosmetic ingredient. The improvement is directed to the use of certain hydrophobically modified polysaccharides as the polymeric delivery component. Quite advantageously, the hydrophobically modified polysaccharides of the present invention can alter sperm motility. Moreover, the hydrophobically modified polysaccharides can provide reduced irritation potential when used in combination with spermicides such as, for example, nonoxynol-9, which may reduce the potential for infection of sexually transmitted diseases such as HIV and herpes.

Excerpt(s): The present invention generally relates to contraceptive compositions, and more specifically relates to improved contraceptive compositions comprising certain hydrophobically modified polysaccharides as polymeric delivery components. ... Contraceptive compositions typically comprise an active ingredient, such as, for example, nonoxynol-9, a polymeric delivery component for delivering the active ingredient, such as, for example, hydroxyethyl cellulose or carboxymethyl cellulose, cosmetic ingredients, such as, for example, water, sorbitol and propylene glycol, and optionally other ingredients, such as, for example, stabilizers, fragrances, viscosity adjusters, and the like. ... One important attribute of contraceptive compositions is that the active ingredients should be effective as a spermicide. In addition, the other ingredients present in the contraceptive compositions should not interfere with the effectiveness of the active ingredient. Many existing contraceptive compositions possess these properties. However, such existing contraceptive compositions typically do not have a high degree of substantivity to the mucosal lining of the vagina. Moreover, existing polymeric delivery components generally do not provide any functional effect with respect to altering sperm motility.

Web site: http://www.delphion.com/details?pn=US05595980__

- **Contraceptive compositions and methods**

Inventor(s): Carr; Daniel W. (Portland, OR), Vijayaraghavan; Srinivasan (Kent, OH)

Assignee(s): Oregon Health Sciences University (Portland, OR)

Patent Number: 6,011,013

Date filed: June 18, 1998

Abstract: The present invention includes a pharmaceutical composition having an effective contraceptive amount of a synthetic peptide that includes an amphipathic .alpha.-helix domain that binds to an RII subunit of protein kinase A, and competitively inhibits the binding of protein kinase A to sperm A kinase anchoring proteins. Particular disclosed synthetic peptides having this activity include s-Ht31: N-Stearate-DLIEEAASRIVDAVIEQVKAAGAY (SEQ ID No. 9), s-Ht31-P: N-Stearate-DLIEEAASRPVDAVPEQVKAAGAY (SEQ ID No. 10), and s-AKAP79: N-Stearate-YETLLIETASSLVKNAIQLSIE (SEQ ID No. 11). The invention also includes methods of inhibiting sperm motility, by exposing them to an effective amount of the peptide, for example by placing the pharmaceutical composition (such as a suppository, foam, cream, or gel) in the vagina.

Excerpt(s): This invention pertains to contraceptive compositions, particularly compositions that affect sperm motility. ... Signal transduction enzymes such as protein kinases and phosphatases play pivotal roles in mediating cellular responses to a wide variety of stimuli. These enzymes are often targeted to specific substrates or cellular compartments through their interaction with cellular "anchoring proteins" (Hubbard and Cohen, Trends Biochem. Sci. 18:172-177, 1993). This anchoring or compartmentalization is thought to be critical in determining the specificity of response for a particular stimulus (Scott and Carr, News Physiol. Sci. 7:143-148, 1992; Rubin, Biochim. Biophys. Acta 1224:467-479, 1994; Mochly-Rosen, Science 268:247-251, 1995). Anchoring of cyclic AMP (cAMP)-dependent protein kinase (PKA or A-kinase) is accomplished by the binding of the regulatory subunit (R) to an amphipathic helix-binding motif located within A-kinase anchoring proteins (AKAPs) (Carr et al., J. Biol. Chem. 266:14188-14192, 1991). ... Synthetic peptides containing an amphipathic helix domain are able to competitively disrupt PKA binding to AKAPs (Carr et al., J. Biol. Chem. 267:13376-13382, 1992). Microinjection of these anchoring inhibitor peptides (AIPs) into neurons or skeletal muscle cells disrupts PKA anchoring and PKA modulation of glutamate receptor channels (Rosenmund et al., Nature 368:853-856, 1994) and voltage-gated calcium channels (Johnson et al., Proc. Natl. Acad. Sci. USA 91:11492-11496, 1994). However, microinjection is impractical for normal pharmaceutical applications.

Web site: http://www.delphion.com/details?pn=US06011013__

- **Contraceptive compositions and methods employing 1-substituted imidazole derivatives**

Inventor(s): Hallesy; Duane W. (Palo Alto, CA), Jones; Richard E. (Woodside, CA), Vickery; Brian H. (Cupertino, CA), Walker; Keith A. M. (Los Altos Hills, CA)

Assignee(s): SYNTEX (U.S.A.) Inc. (Palo Alto, CA)

Patent Number: 4,439,441

Date filed: July 19, 1982

Abstract: 1-Substituted imidazole derivatives exhibit spermatostatic and spermatocidal activity and are useful for contraceptive purposes both in male and female mammals.

Excerpt(s): It has long been known that a variety of chemical agents when introduced into the vaginal canal as suitable compositions will interfere with mammalian spermatocidal cells and prevent their ability to effect conception either by reducing the motility of such cells (i.e. a spermatostatic effect) or by cytotoxicity (i.e. a spermatocidal effect). In general, the types of agents most widely used for such purpose are alkylphenoxypolyethoxyethanols, quaternary ammonium compounds and organomercurial compounds. Recently a series of 1,2-benzisothiazole derivatives having powerful spermatocidal activity were described in U.S. Pat. No. 4,093,730. ... In general such spermatostatic and spermatocidal compounds for vaginal administration show little if any effect upon spermatocidal cells when administered systemically to the male mammal. Furthermore, for such systemic administration a compound must not only have powerful spermatostatic or spermatocidal activity but must show a low degree of toxicity to the host mammal. ... It would, therefore, be desirable to have agents for contraceptive purposes which inhibit mammalian sperm cells from effecting conception (and possibly also prevent sperm cell production or maturation in the case of male contraception), which agents could be administered either intravaginally to the female mammal or systemically, preferably orally or via an implant, to the male mammal.

Web site: http://www.delphion.com/details?pn=US04439441__

- **Contraceptive containing device**

Inventor(s): Bronner; Emanuel H. (Escondido, CA)

Assignee(s): All One God Faith, Inc. (Escondido, CA)

Patent Number: 4,108,309

Date filed: March 21, 1977

Abstract: A contraceptive containing device including a contraceptive gel having a pH of less than 3.0; an elongated casing containing the gel and having an insertion end extending beyond the gel; and a hygienically sealed pouch enclosing the casing. The seal at one end of the pouch overlaps the insertion end of the casing to secure the casing to the pouch and close the insertion end of the casing. The casing is weakened in a region near where it is secured to the pouch for tearing when the pouch is opened to expose the casing and the casing is pulled with respect to the overlapping end of the pouch so as to provide a shearing stress in the casing near the insertion end, for thereby separating the casing from the pouch.

Excerpt(s): The present invention generally pertains to contraceptive devices and is particularly directed to contraceptive devices containing a contraceptive gel for insertion into the vagina. ... In view of the rapidly expanding rate of growth of the world's

population, there is a great need for improvement in contraceptive devices. The "pill" has proven unsatisfactory in many cases because of harmful side effects, as have intra-uterine devices. Other means of preventing conception, such as the "rhythm method" and the use of condoms, have not been reliable. ... There is, however, a reliable and safe method of preventing conception. According to God's natural law, conception is impossible when the pH within the vagina is less than 4.0. Consistent with this law of nature, the Essenes over 2,000 years ago prescribed as a method of contraception the placement of a rose hip in the vagina during intercourse, the rose hip being rich in ascorbic acid and having the effect of lowering the pH within the vagina sufficiently to prevent conception. It is also known that a lemon slice may be inserted into the vagina before intercourse to lower the pH in order to prevent conception.

Web site: http://www.delphion.com/details?pn=US04108309__

- **Contraceptive device**

Inventor(s): Gabbay; Shlomo (1 Randall Dr., Short Hills, NJ 07078), Gabbay; Shlomo (1 Randall Dr., Short Hills, NJ 07078)

Assignee(s): none reported, none reported

Patent Number: 4,703,752

Date filed: July 24, 1986

Abstract: A contraceptive device for females comprising a toroidal collar having an anterior portion, a posterior portion, an internal wall, and an external wall, the internal wall having an internal diameter sufficient to surround the cervix and the external wall having an outside diameter such that the anterior and posterior fornices are substantially filled by the collar. The posterior portion is in the posterior fornix and the anterior portion is in the anterior fornix. There is a bowl, below the cervix, on the collar and extending downwardly therefrom. A valve depends from the lower portion of the bowl and is connected therewith, thereby to allow flow from said bowl into the vagina but restricting or preventing entry into the bowl from the vagina. A projection is attached to the collar or the bowl extending anteriorly of the device, whereby reversal of the device and/or substantial rotation thereof around the cervix is prevented. It also assists in removal thereof. The projection may be a loop, preferably having thickened sides to aid in preventing unwanted movement of the device after insertion.

Excerpt(s): The present invention is directed to an improved female contraceptive device, more specifically to a device which can be inserted over the cervix and removed at will by the user. ... The present invention is directed to an improved female contraceptive device, more specifically to a device which can be inserted over the cervix and removed at will by the user. ... There are a number of types of contraceptive devices which have been generally known. There is a sponge, usually impregnated with a spermicide, which is inserted into the vagina. This has a number of serious disadvantages. In the first place, it does not constitute any form of physical barrier, the sperm may move past it, especially if it is not precisely in the proper position. Furthermore, its action is substantially dependent upon the effectiveness of the spermicide which, especially if the user does not impregnate it properly, may permit at least some sperm to pass. In addition, because the surface of the sponge is porous, any attempt to leave the sponge in the body for an extended period of time is likely to result in serious infection. ... There are a number of types of contraceptive devices which have been generally known. There is a sponge, usually impregnated with a spermicide, which is inserted into the vagina. This has a number of serious disadvantages. In the first place,

it does not constitute any form of physical barrier, the sperm may move past it, especially if it is not precisely in the proper position. Furthermore, its action is substantially dependent upon the effectiveness of the spermicide which, especially if the user does not impregnate it properly, may permit at least some sperm to pass. In addition, because the surface of the sponge is porous, any attempt to leave the sponge in the body for an extended period of time is likely to result in serious infection. ... Another class of contraceptive devices is the cervical cap. Most prior devices of this kind adhere to the cervix by suction and/or by constriction. However, insertion and removal is difficult and is usually carried out by a physician. Moreover, they cannot be permitted to remain for any extended period of time, because degeneration of the cervix will take place because of the constriction. Furthermore, they cannot remain in place during menstruation because they do not permit any flow through them. ... Another class of contraceptive devices is the cervical cap. Most prior devices of this kind adhere to the cervix by suction and/or by constriction. However, insertion and removal is difficult and is usually carried out by a physician. Moreover, they cannot be permitted to remain for any extended period of time, because degeneration of the cervix will take place because of the constriction. Furthermore, they cannot remain in place during menstruation because they do not permit any flow through them.

Web site: http://www.delphion.com/details?pn=US04703752__

- **Contraceptive device**

Inventor(s): Gabbay; Shlomo (1 Randall Dr., Short Hills, NJ 07078)

Assignee(s): none reported, none reported

Patent Number: 4,703,752

Date filed: July 24, 1986

Abstract: A contraceptive device for females comprising a toroidal collar having an anterior portion, a posterior portion, an internal wall, and an external wall, the internal wall having an internal diameter sufficient to surround the cervix and the external wall having an outside diameter such that the anterior and posterior fornices are substantially filled by the collar. The posterior portion is in the posterior fornix and the anterior portion is in the anterior fornix. There is a bowl, below the cervix, on the collar and extending downwardly therefrom. A valve depends from the lower portion of the bowl and is connected therewith, thereby to allow flow from said bowl into the vagina but restricting or preventing entry into the bowl from the vagina. A projection is attached to the collar or the bowl extending anteriorly of the device, whereby reversal of the device and/or substantial rotation thereof around the cervix is prevented. It also assists in removal thereof. The projection may be a loop, preferably having thickened sides to aid in preventing unwanted movement of the device after insertion.

Excerpt(s): The present invention is directed to an improved female contraceptive device, more specifically to a device which can be inserted over the cervix and removed at will by the user. ... The present invention is directed to an improved female contraceptive device, more specifically to a device which can be inserted over the cervix and removed at will by the user. ... There are a number of types of contraceptive devices which have been generally known. There is a sponge, usually impregnated with a spermicide, which is inserted into the vagina. This has a number of serious disadvantages. In the first place, it does not constitute any form of physical barrier, the sperm may move past it, especially if it is not precisely in the proper position. Furthermore, its action is substantially dependent upon the effectiveness of the

spermicide which, especially if the user does not impregnate it properly, may permit at least some sperm to pass. In addition, because the surface of the sponge is porous, any attempt to leave the sponge in the body for an extended period of time is likely to result in serious infection. ... There are a number of types of contraceptive devices which have been generally known. There is a sponge, usually impregnated with a spermicide, which is inserted into the vagina. This has a number of serious disadvantages. In the first place, it does not constitute any form of physical barrier, the sperm may move past it, especially if it is not precisely in the proper position. Furthermore, its action is substantially dependent upon the effectiveness of the spermicide which, especially if the user does not impregnate it properly, may permit at least some sperm to pass. In addition, because the surface of the sponge is porous, any attempt to leave the sponge in the body for an extended period of time is likely to result in serious infection. ... Another class of contraceptive devices is the cervical cap. Most prior devices of this kind adhere to the cervix by suction and/or by constriction. However, insertion and removal is difficult and is usually carried out by a physician. Moreover, they cannot be permitted to remain for any extended period of time, because degeneration of the cervix will take place because of the constriction. Furthermore, they cannot remain in place during menstruation because they do not permit any flow through them. ... Another class of contraceptive devices is the cervical cap. Most prior devices of this kind adhere to the cervix by suction and/or by constriction. However, insertion and removal is difficult and is usually carried out by a physician. Moreover, they cannot be permitted to remain for any extended period of time, because degeneration of the cervix will take place because of the constriction. Furthermore, they cannot remain in place during menstruation because they do not permit any flow through them.

Web site: http://www.delphion.com/details?pn=US04703752__

- **Contraceptive device**

Inventor(s): Verschoof; Karel J. H. (Staringsstraat 31, 7514 DE Enschede, NL), Smit; Jan W. (Schumannlaan 31, 7522 KD Enschede, NL)

Assignee(s): none reported

Patent Number: 4,537,186

Date filed: September 2, 1983

Abstract: Contraceptive device for intra uterine application in the oviducts having two enlargements 1, 2 connected by an oblong connection element 3 to a halter shape which enlargements remain fixed in the muscle tissues since the surface areas of the projections of these enlargements on a plane transverse to the longitudinal axis of the device are almost equal.

Excerpt(s): The invention relates to a contraceptive device for intra uterine application having an oblong connection element connecting two separate enlargements having rounded shapes. A contraceptive device of this kind is disclosed in Dutch Patent Application No. 74 01380 and comprises an oblong elastic slightly curved element having club shaped enlargements at either end. The remote sides of these enlargements are semi spherical and the adjoining sides gradually merge into the connection element. The enlargements each are to be positioned in the opposite oviducts but cannot suitably be fixed therein. Moreover is the distance between the funnel shaped mouths of the opposite oviducts in the uterus not constant such that either an insufficient closure or an excessive pressure on the tissues surrounding the enlargements is the result. The changes in distance can be partly compensated by making the connection element,

having a length of some centimeters, curved and of a flexible material, but this is not reliable. ... Object of the invention is to provide an improved contraceptive device which can be reliably positioned and fixed in the oviducts since the enlargements and the oblong connection element are of a dumb-bell shape and the surface areas of the projections of these enlargements on a plane transverse to the longitudinal axis of the device are almost equal, and the enlargements abruptly merging into the connection element. ... This contraceptive device is to be positioned such that one of the enlargements is just in the oviduct mouth and the other in the oviduct on the outside of the muscle tissue of the uterus.

Web site: http://www.delphion.com/details?pn=US04537186__

- **Contraceptive device**

Inventor(s): Ragheb; Gamal A. (79 Bradstreet Ave., Revere, MA 02151)

Assignee(s): none reported

Patent Number: 4,932,422

Date filed: June 12, 1989

Abstract: A contraceptive device having a cylindrical body adapted to be retained within the cervix having a valve mechanism adapted to allow passage of menstrual fluid yet blocking seminal fluid.

Excerpt(s): The device of this invention resides in the area of contraceptive devices and more particularly relates to a device which is inserted into the cervix having a "security valve" which allows the escape of menstrual flow but yet blocks semen from entering the uterus through the cervix. ... Birth control devices are well known such as interuterine device which are inserted through the cervix, some of which are positioned within the uterus. Many of these devices have drawbacks such as spontaneous expulsion and spontaneous invasion into the uterus requiring surgical removal. Other inconvenient side effects are those such as may be caused by the string members of interuterine devices which must be left extending out of the cervix into the vagina for future removal of the device and which strings can be noticeable during sexual intercourse and may interfere with the physical act. ... It is an object of this invention to provide a new contraceptive device which is introduced into the cervix and utilizes a one-way valve which allows menstrual flow to escape but yet prevents the passage of semen through the cervix. The device of this invention has a cylindrical body and is inserted into the cervix by an inserting applicator. The valve member has a movable flap as will be described further below and hook members at the top which, when the device is inserted through the cervix and withdrawn slightly, hooks to the inner bottom wall of the uterus to retain the "cervical security valve" of this invention in place.

Web site: http://www.delphion.com/details?pn=US04932422__

- **Contraceptive device**

Inventor(s): Zelson; Steve T. (209 Mulberry La., Larchmont, NY 10538)

Assignee(s): none reported

Patent Number: 5,025,800

Date filed: January 26, 1988

Abstract: This invention relates to contraceptive devices. More particularly, this invention relates to novel contraceptive devices for males and females which provide immunological barriers to the spread of sexually transmitted diseases along with related methods to prevent the spread of these diseases.

Excerpt(s): This invention relates to birth control or contraceptive devices. More particularly, this invention relates to contraceptive devices for males and females which provide novel immunological means for preventing the spread of sexually transmitted diseases. Contraceptive devices such as condoms and diaphragms, which typically only provide a physical barrier from the transmission of sperm and possibly disease causing agents have, by this invention, been provided with an additional immunological barrier which immunologically binds to a venereal disease causing agent, such as a bacteria or virus, present in a bodily fluid thereby neutralizing it and preventing the spread of the disease causing agent whose mode of introduction and infection typically is accomplished via sexual transmission of bodily fluids. ... The primary purpose of most contraceptive products is the prevention of pregnancy. This goal has been accomplished by a variety of means such as providing a physical barrier to prevent contact between sperm cells and ova [i.e. with condoms, cervical caps or contraceptive "sponges" (described in U.S. Pat. No. 4,393,871 which is hereby incorporated by reference); altering the estrogen levels of the female with oral contraceptives so as to prevent the female from conceiving; and surgical sterilization procedures. ... One of the most readily utilized contraceptives are condoms (otherwise equivalently referred to herein as prophylactics). Condoms have been known for decades to be reasonably effective in preventing conception so long as the condom maintains its physical integrity and, thereby, provide the physical barrier which keeps sperm within the condom sheath. Condoms also are known to provide a physical barrier to certain disease causing agents which might otherwise be passed along from one partner to the other during intercourse. To date, no other contraceptive device, composition or method is believed to provide the same degree of protection by physical barrier against transmission of infectious agents during intercourse as do condoms.

Web site: http://www.delphion.com/details?pn=US05025800__

- **Contraceptive device**

Inventor(s): Ferguson; Andrew R. B. (11 Harcourt Close, Henley-on-Thames, Oxon, RG9 1UZ, GB2)

Assignee(s): none reported

Patent Number: 5,050,619

Date filed: December 22, 1989

Abstract: A male contraceptive device has two sheaths (1, 4) which are relatively slidable for cleaning and assembly but keep stationary during use. Sheath (4) has an air hole (6) and the arrangement is such that air is allowed to and from the inner sheath via the air hole and passages between the sheaths. Air flow is partially restricted so that partial collapse of the sheaths occurs on withdrawal.

Excerpt(s): This invention relates to a male contraceptive device. ... The normal thin rubber sheaths, known as condoms, suffer from a number of disadvantages: (1) they sometimes break in use, (2) the Aids virus is 1000 times smaller than sperm, so, for this reason too, they do not provide a particularly secure barrier against disease, (3) they cover the penile surface with an immobile protective layer which some people find

deadens most of the pleasurable stroking sensations associated with intercourse, (4) condoms do not enhance the pleasures of non-penetrative sex. ... Although modifying a standard condom by increasing the thickness of the rubber would mitigate problems (1) and (2), it would exacerbate the problem of (3), and thus it would not be acceptable to many people. A condom serves no useful function (except disease prevention) during non-penetrative sex.

Web site: http://www.delphion.com/details?pn=US05050619__

- **Contraceptive device and related method**

Inventor(s): Reyner; Franklin C. (165 N. Village Ave., Rockville Center, NY 11570)

Assignee(s): none reported

Patent Number: 4,696,294

Date filed: August 31, 1981

Abstract: The outer convex surface of a contraceptive diaphragm is texturized in omnidirectional manner to simulate the rugae of the vagina. The texturization takes various forms including concentric rings which can be regular or irregular or symmetrical arrangements of discrete projections.

Excerpt(s): The present invention relates to contraceptive devices and more particularly to contraceptive devices which are insertable into the vagina to block the cervical os for purposes of birth control and the like. ... Contraceptive devices such as pessaries and diaphragms are known which are intended to remain in the vagina to block the cervical os and to occupy a position so as to remain substantially undisturbed within the vaginal cavity during sexual intercourse. Such devices should be soft and flexible in order to conform perfectly to the conformation of the vagina and to result in minimal awareness during wear and during coitus. ... Various patents are directed to improvements in construction of pessaries and other such vaginal contraceptives. Two such patents are U.S. Pat. Nos. 2,851,032 and 4,198,976. U.S. Pat. No. 2,681,261 is also directed to a pessary, but of a significantly different type.

Web site: http://www.delphion.com/details?pn=US04696294__

- **Contraceptive device for oral sex**

Inventor(s): Saba; Gracie M. (5150 N. Valentine Ave. #203, Fresno, CA 93711)

Assignee(s): none reported

Patent Number: 5,649,549

Date filed: June 6, 1996

Abstract: A contraceptive device for oral sex including a body portion having a rounded upper portion, a tapered lower portion, and an intermediate portion therebetween. A plurality of nubs extend outwardly from the intermediate portion of the body portion. The body portion is securable over the genitalia area of a woman with the plurality of nubs disposed over a clitoral area of the woman to allow for safe oral stimulation thereof.

Excerpt(s): The present invention relates to a contraceptive device for oral sex and more particularly pertains to reducing risks of transmitting sexually transmitted diseases with

a contraceptive device for oral sex. ... The use of condom devices is known in the prior art. More specifically, condom devices heretofore devised and utilized for the purpose of providing sexual protection are known to consist basically of familiar, expected and obvious structural configurations, notwithstanding the myriad of designs encompassed by the crowded prior art which have been developed for the fulfillment of countless objectives and requirements. ... By way of example, U.S. Pat. No. 5,390,681 to Daley discloses a prophylactic device for oral sex.

Web site: http://www.delphion.com/details?pn=US05649549__

- **Contraceptive device: micro-condom**

Inventor(s): Sharkan; Arnold L. (9120-D Niles Center Rd., Skokie, IL 60076)

Assignee(s): none reported

Patent Number: 4,869,269

Date filed: January 13, 1988

Abstract: A new and useful contraceptive-prophylactic condom is provided which, by means of a novel configuration and a medical grade adhesive, forms a leak-free seal with the tip (glans section) of the male sex organ. This invention eliminates the need for the roll-down hood present in a conventional contraceptive-prophylactic devices, providing increased user pleasure and reduced risk of unwanted pregnancy and venereal disease. Because the roll-down hood is eliminated, the breakage problem associated with conventional condoms can also be substantially solved without sacrificing user pleasure by manufacturing the condom of the invention from a thicker material.

Excerpt(s): This application relates to a new and useful contraceptive-prophylactic device which, by means of a novel configuration and a medical grade adhesive, adheres to the tip (glans section) of the male sex organ, eliminating the need for the roll-down hood present on conventional contraceptive-prophylactic devices, providing increased user pleasure and reduced risk of unwanted pregnancy and venereal disease. ... Contraceptive-prophylactic devices, otherwise known as condoms, are well known in the art for their role in preventing unwanted pregnancy and preventing or reducing the spread of various venereal diseases. Conventional condoms cover both the penile head and the penile shaft and utilize a roll-down hood for installation onto the penile shaft. A disadvantage of conventional condoms is that they can slip off the penis during usage allowing leakage of semen into the vaginal passage. Another disadvantage is that these condoms can break during usage. The breakage problem can be eliminated or reduced substantially by manufacturing the condom from a thicker material but this causes reduction in user pleasure. ... Attempts have been made to solve the leakage problem by utilizing an adhesive material to secure the hood of the condom to the penile shaft. U.S. Pat. No. 4,638,790, for instance, discloses a condom in which the hood, initially in a rolled-up configuration, has an outer member which releases adhesive onto the inner surface of the condom as the hood is unrolled, the outer member being removed after the condom is in place. A projecting head is provided on the outer member for grasping the outer member to facilitate its removal. Lubricant may be present between the inner and outer members to further facilitate removal of the outer member and to facilitate use of the condom during intercourse. This condom solves the problem of leakage but does not eliminate the breakage problem, or the problem of reduced user pleasure if the thickness is increased to prevent breakage.

Web site: http://www.delphion.com/details?pn=US04869269__

- **Contraceptive diaphragm**

Inventor(s): Austin; Glenn D. (Seattle, WA), Colburn; Theodore J. (Seattle, WA), Kilbourne-Brook; Margaret Z. (Seattle, WA), Todd; Donald A. (Bedminster, NJ)

Assignee(s): Path (Seattle, WA)

Patent Number: 5,771,900

Date filed: July 22, 1997

Abstract: A contraceptive diaphragm having a rim surrounding a thin membrane, the membrane having a cervical dome extending downwardly from a posterior portion of the membrane. The rim has two curvilinear bands joined together at their respective ends and encased in a coil spring. The shape of the bands creates a rim which curves slightly upwardly at the anterior end of the diaphragm and slightly downwardly at its posterior end. The rim is formed with a curvilinear profile which provides an advantageous fit. A small dome projects upwardly from an anterior portion of the membrane which is grasped by the wearer to remove the diaphragm.

Excerpt(s): The present invention is directed to contraceptive diaphragms, and more particularly to contraceptive diaphragms having a contoured shaped rim. ... Contraceptive diaphragms, or simply diaphragms, have been used in their current form for over one hundred years. They are classified as an intra-vaginal barrier contraceptive, although they are commonly used in conjunction with spermicide. ... Diaphragms typically consist of an outer rim which defines a generally planar loop having a diameter on the order of 55 to 95 mm, and a dome-shaped membrane which extends across the interior of the rim to form a barrier. The dome-shaped membrane is typically 0.2 to 0.3 mm thick and attached along a central, transverse axis of the rim. The rim and dome are usually made of latex rubber, but have been produced from other inert medical grade elastomers, such as silicone, urethane, vinyl, or thermoplastic elastomer (TPE). The rim has a generally cylindrical cross section which houses a spring that provides stiffness when folding or squeezing for insertion, and which opens the device after insertion. The spring is ordinarily in the form of either a single length of spring coil joined at its ends or a band of spring material.

Web site: http://www.delphion.com/details?pn=US05771900__

- **Contraceptive diaphragm with molded plastic rim**

Inventor(s): Karg; Jeffrey A. (14 Highwood Ave., Waldwich, NJ 07463), Staab; Robert J. (73 Franklin Turnpike, Allendale, NJ 07401)

Assignee(s): none reported

Patent Number: 5,228,456

Date filed: September 19, 1991

Abstract: A contraceptive diaphragm has a cup-shaped body molded from a thermoplastic or thermosetting material, and a rim formed with the diaphragm body having a thickness and an inner core structure sufficient to provide a desired bending resilience for use of the diaphragm without any metal spring therein. The thermoplastic or thermosetting material is preferably a silicone rubber. In one embodiment, the rim is

molded with a solid inner core structure with a circular cross-section of between 0.060 to 0.375 inch outer diameter. In another embodiment, the rim is formed by an outer layer molded around an inner core in the form of a plastic, injection- or compression-molded ring. The molded plastic ring is preferably made of an acetal plastic material with an outer diameter of between 0.040 to 0.250 inch. The plastic ring may have two or more cutout portions formed spaced apart along its circumference for defining flexing points on the diaphragm rim.

Excerpt(s): This invention generally relates to a contraceptive diaphragm, and more particularly, to one having a molded plastic rim. ... Intravaginal contraceptive devices have become widely accepted as a safe and reliable method of birth control, as well as for the prevention of sexually transmitted diseases. Some devices take the form of a porous, absorbent sponge which is impregnated with spermicidal and/or bacteriocidal agents. Other devices commonly take the form of a diaphragm, made of an elastic film material such as latex, having an annular rim with a resilient metal spring, such as a coiled or leaf spring or flat spring or metal band, incorporated therein. ... The metal springs for contraceptive diaphragms are difficult to make, since they must be resilient for bending and durable enough to last with repeated use. For a molded latex diaphragm, the spring is typically a coiled wire that is placed on one mold-half, and latex is poured in the mold so that the spring becomes embedded therein. For a rolled latex diaphragm, a latex sleeve is formed on a mold element by dipping it in the latex, then a spring is placed over the mold base and rolled up in the latex by hand until it is secured therein.

Web site: http://www.delphion.com/details?pn=US05228456__

- **Contraceptive for use by a male**

Inventor(s): Guha; Sujoy K. (9 West Avenue, I.I.T., New Delhi 110016, IN)

Assignee(s): none reported

Patent Number: 5,488,075

Date filed: September 20, 1994

Abstract: The present invention relates to a contraceptive for use by a male. The contraceptive consists of a copolymer of styrene maleic anhydride which is prepared by the step of irradiation at a dose of 0.2 to 0.24 megarad for every 40 gms. of the copolymer. The contraceptive consists of an injectable fluid of said copolymer and pure dimethyl sulphoxide.

Excerpt(s): This invention relates to a contraceptive and to a method of preparing the same. In particular, this invention relates to a contraceptive for use by a male. ... It is generally known that vas deferens is a suitable site for contraceptive intervention in the male. Vasectomy is a well established method of male contraception. In such a method, the vas deferens is cut and tied so as to prevent the sperms from flowing in the forward direction, and the sperms accumulate in the epididymes. Due to the presence of such sperms, the body generates enhanced antibodies to destroy the accumulated sperms. A disadvantage associated with such a method is that even after rejoining of the vas deferens, fertility is low as the body maintains the high level of antibodies and continues to destroy the sperms. Yet another disadvantage is that such a method requires surgery. ... Besides vasectomy, reversible occlusion methods are also known in the art, which also prevents a forward flow of the sperm. One such occlusion method consists in implanting a reversible occlusion device for providing a blockage of the flow of

sperms in the vas deferens. The device has a regulator knob outside of the vas deferens but inside the serotum. The regulator knob is normally operated by only a trained medical assistant. A disadvantage associated with such a device is that it also requires a surgery so as to allow an implantation. Another disadvantage is that during blockage, the body once again develops an enhanced level of antibodies to the sperms, which persists even upon opening or removal of the device. Yet another disadvantage arises in the instance where the closure may not be perfect resulting in a flow of sperms, though limited only quantitatively, but which cannot then be destroyed.

Web site: http://www.delphion.com/details?pn=US05488075__

- **Contraceptive hood**

Inventor(s): Conway; Anthony J. (Chatfield, MN), Conway; Peter R. (Chatfield, MN), Conway; Philip J. (Stewartville, MN)

Assignee(s): Carter-Wallace, Inc. (New York, NY)

Patent Number: 5,102,405

Date filed: August 3, 1990

Abstract: A male contraceptive hood which is adhesively secured to the penis, the hood being initially rolled up and the interior of the hood being free of adhesive until it is unrolled. The hood has a thin sheath which serves as the contraceptive device and an outer cylindrical member which is initially rolled together with the thin sheath. The outer cylindrical member has an adhesive on a portion of its outer surface, separated from the outer surface by a release agent, the adhesive being transferred to the inner surface of the sheath as the hood is unrolled onto a penis. The outer member can then be removed leaving only the thin inner sheath on the penis. A projecting portion is provided on the outer member for grasping the outer member to remove it. In a preferred form, a lubricant is disposed between the sheath and the inner surface of the outer cylindrical member. This lubricant remains on the outer surface of the sheath to facilitate removal of the outer member and also to aid in intercourse. The contraceptive hood may be either relatively short so as to extend only slightly beyond the head of the penis, or sufficiently long to extend over substantially the entire length of the penile shaft.

Excerpt(s): The present invention relates to male contraceptive hoods which are adhesively secured to the penis, the hood being initially rolled up with an outer thicker member, and the interior of the hood being free of adhesive until it is unrolled. ... The conventional contraceptive condom is designed to cover not only the penile head but the entire penile shaft. It is usually used initially in a rolled up condition and is unrolled to extend for substantially the full length of the penile shaft. It is retained in position largely by friction between the inner wall of the condom and the penis. An objection to condoms of this type is that they tend to slip off the penis after ejaculation has occurred and the penis tends to assume a flaccid condition. This may result in semen accidentally entering the vaginal passage. ... Recognizing the drawback of the conventional condom, various attempts have been made to provide a contraceptive hood which is adhesively secured to the penis. The early United States Woodruff patent, U.S. Pat. No. 822,092, for example, shows a short contraceptive hood in which there is adhesive applied to the interior. It is obviously very difficult to apply such a contraceptive hood when adhesive is already in place. Furthermore, the arrangement of the Woodruff patent has the drawback that it provides a long extending nipple which would interfere with the sexual act. The United States Patents to Kopelowicz, U.S. Pat. No. 3,951,141; Wayne, U.S.

Pat. No. 2,448,938; and Czirely, U.S. Pat. No. 3,677,225 all show arrangements in which there is an adhesive over a portion of the interior of a short contraceptive hood with a release strip of some kind which is stripped off in connection with applying the contraceptive hood to the penis. The arrangements of these patents all have the drawback, however, a separate release strip is necessary and that the adhesive is not always located where it is most effective. The Ormo U.S. Pat. No. 2,839,060 shows an arrangement in which adhesive is applied on the inner surface of an inner sheath. There is also a ridge that acts as a sealing device. The device can be relatively complicated to apply partly due to the continual presence of the adhesive on the inner surface. The Warner U.S. Pat. No. 3,648,700 shows a contraceptive device in which there are bands which are used for overlapping encirclement of the penis behind the tip, these overlapping bands being coated on the inside with adhesive. Such an arrangement provides an adhesive over only a very limited area of the contraceptive hood and further provides a very irregular surface due to the space between the strap and the main portion of the hood and also due to a thickened portion resulting from the overlapping portions of the straps. The Welsh U.S. Pat. No. 2,389,831 shows a protective covering for a member of the body, such as finger or toe. Initially, there is adhesive on an outer surface. This is covered by a protective tape which must be removed. In order to bring the adhesive into the inner surface, the entire unit is turned inside out. This would be very difficult to manipulate as a contraceptive device.

Web site: http://www.delphion.com/details?pn=US05102405__

- **Contraceptive implant**

Inventor(s): De Nijs; Hendrik (Oss, NL)

Assignee(s): Akzo N.V. (Arnhem, NL)

Patent Number: 5,088,505

Date filed: June 21, 1990

Abstract: The invention relates to an implant of polymeric material which can release a contraceptive agent for a relatively long time when fitted subcutaneously or locally.

Excerpt(s): The invention relates to an implant of polymeric material which can release a contraceptive agent for a relatively long time when fitted subcutaneously or locally. More specifically, the invention relates to an implant of such small dimensions that it can be fitted subcutaneously with an ordinary hypodermic needle. ... There is a large demand for the development of new, long-acting contraceptives which require a minimum of medical guidance. This is valid in particular for those areas of the world where the medical infrastructure is poor, and where family planning can be organized only to an insufficient extent. ... An implant of this type, which can release a contraceptive agent in virtually constant quantities over a period of at least 2 years, but preferably for about 4 to 5 years, is a new development which can certainly supply what is needed. The great problem, however, is that the often large amount of the contraceptive agent with which the polymeric material of the implant has to be charged to guarantee release for about 4 years leads to very large implants which can only be fitted surgically, or to several smaller implants which have to be fitted simultaneously.

Web site: http://www.delphion.com/details?pn=US05088505__

- **Contraceptive intrauterine device**

Inventor(s): Del Conte; Maria L. (Scala Campi Elisi, 1, Trieste, IT)

Assignee(s): none reported

Patent Number: 4,200,091

Date filed: April 17, 1978

Abstract: A woman's contraceptive in the form of an intrauterine device, having an elastic structure in the form of a stylized inverted Delta which, when viewed in profile, possesses a rectangular shape over its entire cross-section, and which comprises an arc internal to the Delta-shaped structure at the center of which there is a channel through which a monofilament is knotted, to descend double and pass through a hole provided in the center of the lower arc of the Delta, said device being adaptable to the variable shape of the uterine cavity so as to avoid causing injury.

Excerpt(s): This invention relates to a new intrauterine device for use as a woman's contraceptive. This device is totally different from known devices and is characterised by a completely individual form. ... Fertility control methods must be effective and safe and should afford no more than a minimum of side-effects both in terms of frequency and intensity. ... (1) Pearl and mathematical index as close as possible to 0.

Web site: http://www.delphion.com/details?pn=US04200091__

- **Contraceptive method**

Inventor(s): Kaminski; Joanne M. (Chicago, IL), Bauer; Ludwig (Wilmette, IL), Zaneveld; Lourens (Forest Park, IL)

Assignee(s): University of Illinois Foundation (Urbana, IL)

Patent Number: 4,423,069

Date filed: January 20, 1982

Abstract: Contraceptive method comprises maintaining in the genital tract of a mammal an ester of 4-guanidinobenzoic acid and certain substituted phenols in a concentration effective to inhibit the fertilization of ova. In addition to effectively inhibiting the enzymes necessary for conception, the compounds used in the method of the invention are advantageous in possessing low toxicity. Further, the phenolic materials which may be liberated on hydrolysis of the 4-guanidinobenzoates in the genital tract of the animal are low in toxic, caustic or irritating properties, so that the contraceptive compositions are suitable for long-term use without adverse side-effects.

Excerpt(s): This invention relates to contraceptive methods and compositions for use in mammals and more particularly to such methods wherein certain aryl 4-guanidinobenzoates are used as vaginal contraceptive agents. ... The compositions which have found practical use as vaginal contraceptives typically incorporate an active ingredient which is spermicidal in effect. In spite of their high spermicidal activity, however, vaginal contraceptives incorporating these materials are not as effective in preventing conception as would be desirable. In addition, there are some indications that these materials possess undesirable side-effects. ... In accordance with the invention, there is provided a method for inhibiting conception in mammals in which the contraceptive effects are achieved, not by immobilizing spermatozoa, as in the case of spermicidal contraceptives heretofore known, but by preventing the fusion of spermatozoa with ova by inhibiting one or more of the sperm enzymes necessary for

this process, i.e., by functioning as enzyme inhibitors. It has been found that certain compounds, hereinafter described, function as inhibitors of sperm acrosin and possibly other enzymes and have high contraceptive potency when used vaginally in mammals, in a concentration sufficient to prevent fusion of ova and spermatozoa in the presence of the inhibitor.

Web site: http://www.delphion.com/details?pn=US04423069__

- **Contraceptive method and composition containing tannic acid**

Inventor(s): Bagros; Michel (Paris, FR)

Assignee(s): Laboratories Human-Pharm S.A. (Perret, FR)

Patent Number: 4,387,094

Date filed: February 18, 1981

Abstract: The present invention relates to a novel local contraceptive method according to which the passage of spermatozoa in the cervical canal is prevented, the said method being characterized in that the physico-chemical structure of the cervical mucus is modified by means of at least one coagulating agent. It also concerns compositions for putting this novel method into effect, particularly compositions comprising at least one coagulating agent such as tannic acid. These compositions may also contain an agent which assists and completes the action of the coagulating agent.

Excerpt(s): The present invention concerns a novel contraceptive method based on a modification of the structure of the cervical mucus. It also concerns the means by which the said method can be carried out. ... It is known that, to prevent fertilisation of the ovule, apart from contraception by hormones, mechanical means and chemical means involving spermicidal compositions have already been suggested; each of these methods has its disadvantages, its risks and its limitations. ... It is also known that, to reduce the risks, to improve the reliability and to make the use easier, local contraceptives have more recently been proposed which are soluble or capable of melting in the vagina in such a manner as to release the spermicide or spermicides which they contain. None of these methods is entirely reliable.

Web site: http://www.delphion.com/details?pn=US04387094__

- **Contraceptive method using a subdermally implantable device**

Inventor(s): Moo-Young; Alfred Joseph (Hastings-On-Hudson, NY), Croxatto; Horacio Bruno (Santiago, CL)

Assignee(s): The Population Council, Center for Biomedical Research (New York, NY)

Patent Number: 5,756,115

Date filed: June 7, 1995

Abstract: Disclosed is a subdermally implantable drug-delivery device, which contains: a central core extending in an axial direction and having an outer surface and opposing ends, which core includes a matrix of a pharmaceutically effective amount of a subdermally administrable drug substantially uniformly dispersed in a polymeric base material; an intermediate polymeric layer overlying the outer surface of the central core; and an outer polymeric layer overlying the intermediate layer, wherein the intermediate layer controls the rate of diffusion of the drug from the central core to the outer layer. In

preferred embodiments, the subdermally administrable drug is a contraceptive agent such as the 16-methylene-17- α -acetoxy-19-norprogesterone-progestin; the polymeric base material and the outer polymeric layer each contain a polydimethylsiloxane such as Silastic.RTM.; and the intermediate layer contains a porous material such as cellulose. The devices provide for the substantially zero-order release of the drug for their intended lifetime without initial overdosing of the drug.

Excerpt(s): The disclosed invention relates to subdermally implantable devices which provide for the sustained release of a pharmaceutically effective amount of a drug to a subject. ... In many therapeutic programs pertaining to the management of health and disease, the use of drug delivery devices which provide for the slow release of a drug to the body at a controlled rate over a prolonged period of time to achieve a desired physiologic or pharmacologic effect has proved beneficial. A principal advantage of employing sustained-release compositions is that many therapeutic agents would otherwise be rapidly metabolized or cleared from the patient's system necessitating frequent administration of the drug to maintain a therapeutically effective concentration. ... Accordingly, a variety of sustained release devices have been designed for oral, rectal and subcutaneous administration. "Matrix" type devices typically consist of an active compound dispersed in a matrix of carrier material which may be either porous or non-porous, solid or semi-solid, and permeable or impermeable to the active compound. These devices are rather easily prepared; however, they are not suitable for administering some pharmacologically active compounds. In addition, the rate of release of the active compound decreases with time. "Reservoir" type devices consist of a central reservoir of active compound surrounded by a rate controlling membrane (rcm). The rcm is generally a porous or a non-porous material which is non-biodegradable. In the case of the transdermal devices of this type, to maintain an effective concentration of active compound, the rate controlling membrane must have a large surface area. Thus, a common disadvantage of these devices is that their large size makes administration quite inconvenient. Other sustained release devices are hybrid-type devices which contain a matrix core surrounded by a rcm. Yet other devices are mechanical in nature, and include active compound-filled electrical or osmotic pumps. These devices require frequent replacement. In addition, they have proved to be too large and expensive to be practical.

Web site: http://www.delphion.com/details?pn=US05756115__

- **Contraceptive methods**

Inventor(s): Chantler; Eric N. (Stockport, GB), Hutchinson; Francis G. (Lymm, GB), Sharman; Deborah A. (Hadfield, GB)

Assignee(s): Imperial Chemical Industries PLC (London, GB2)

Patent Number: 4,590,070

Date filed: August 7, 1984

Abstract: This invention relates to the use of polymeric biguanides as topical contraceptive agents, which operate both by rendering vaginal mucus impenetrable to sperm, or by a direct spermicidal action.

Excerpt(s): This invention relates to contraceptive methods, and in particular it relates to a method of increasing the viscosity of cervical mucus to such an extent as to render it essentially impermeable to sperm, and to a spermicidal or sperm-immobilising method. ... wherein X and Y stand for bridging groups in which together the total number of

carbon atoms directly interposed between the adjacent nitrogen atoms is greater than 9 and less than 17, or an acid-addition salt thereof. ... The said bridging groups may consist of polymethylene chains, which optionally may be interrupted, as by oxygen or sulphur atoms, and also they may incorporate cyclic nuclei which themselves may be saturated or unsaturated. The number of carbon atoms directly interposed between the nitrogen atoms when the groups X and/or Y incorporate a cyclic group or groups includes those in that segment of the cyclic group or groups which is the shortest.

Web site: http://www.delphion.com/details?pn=US04590070__

- **Contraceptive methods and compositions**

Inventor(s): Chantler; Eric N. (Marple Bridge, GB2), Elstein; Max (Didsbury, GB2)

Assignee(s): The Victoria University of Manchester (Manchester, GB2)

Patent Number: 5,013,544

Date filed: January 29, 1990

Abstract: Pharmaceutical compositions comprising a combination of a polymeric biguanide and a spermicidal surfactant, useful for contraceptive purposes, for their spermicidal or sperm-immobilizing effect, and contraceptive methods and devices using them. The polymeric biguanide is preferably a compound as described in U.K. Patent Specification No. 702,268 or a bisbiguanide as described in U.K. Patent Specification No. 705,838 or 1,095,902, but especially chlorhexidine. The spermicidal surfactant may be derived from ethylene oxide, preferably a condensate of nonylphenol and ethylene oxide, and especially with 9 to 11 molecular proportions thereof. To avoid short-lived activity, the compositions are preferably made substantially free from anions (notably halide ions and especially chloride ions) which cause deactivation, apparently by reducing the solubility of the active ingredients.

Excerpt(s): This invention relates to contraceptive methods, and in particular it relates to improved methods which utilise combinations of known spermicidal or sperm-immobilising agents, a spermicidal or sperm-immobilising method, and improved pharmaceutical compositions useful in such methods. ... It is also known that polymeric biguanide compounds have properties which make them useful) for contraceptive purposes. The term "polymeric biguanide" is used here to include the bisbiguanides as well as the higher polymeric biguanides containing more than two biguanide moieties. (European Patent Application No. 8430945.3, Publication No. 0138304, and European Patent Application No. 8430946.1, Publication No. 0138305, of Imperial Chemical Industries PLC). ... A particular example of such a spermicidal polymeric biguanide compound is that known as chlorhexidine, which is also commonly used for its antiseptic properties.

Web site: http://www.delphion.com/details?pn=US05013544__

- **Contraceptive methods and delivery systems thereof**

Inventor(s): Daunter; Brian (Bellbowrie, AU)

Assignee(s): University of Queensland (Queensland, AU)

Patent Number: 4,959,216

Date filed: December 17, 1987

Abstract: A contraceptive method for living animals (including human beings) can utilize a polyurethane or polyvinylacetate (PVA) disc as an inert carrier for contraceptive preparations, the disc being implanted before intercourse to engage the external os of the cervical canal. Preferred contraceptive preparations include (1) the copper (II) salt of ethylenediamine-tetraacetic acid (EDTACu) and L-L-ascorbic acid; (2) the sialic acid-removing enzyme neuraminidase; and (3) an asialoglycoprotein, such as asialofetuin. Of these preparations, which can be used separately or in any combination, the first two act on the cervical mucus to change it from the open cellular structure found at midcycle of the menstrual period to the closed cellular structure and thus form an impenetrable barrier for spermatozoa. The second and third preparations remove sialic acid from spermatozoa, the presence of which is necessary for successful fertilization.

Excerpt(s): This invention relates to contraceptive preparations and methods for living animals (including human beings) and to delivery systems for the preparation. ... A report from the Royal College of General Practitioners in 1981 stated that evidence indicated women who had taken oral contraceptives had a 40% higher death rate than those who used other contraceptive methods. The high mortality rate appeared to be mainly due to diseases in the circulatory system in the over-35 age group. These findings give cause for concern. Indeed, many women have returned to traditional contraceptive methods as a result of the publicity given to the use of hormonal contraceptives. ... It is an object of the present invention to provide a contraceptive method which acts at the level of the vagina and/or the cervical canal.

Web site: http://www.delphion.com/details?pn=US04959216__

- **Contraceptive methods and formulations for use therein**

Inventor(s): Spicer; Darcy V. (Pasadena, CA), Pike; Malcolm C. (Long Beach, CA)

Assignee(s): University of Southern California (Los Angeles, CA)

Patent Number: 5,211,952

Date filed: April 12, 1991

Abstract: Contraceptive devices which are effective for extended periods of time are described, in the form of means for releasing an effective amount of a gonadotropin hormone releasing hormone composition and means for releasing an effective amount of an estrogenic hormone over a first period of time, and means for releasing an effective amount of a progestogen for a second period of time, the second period of time being substantially shorter than and running simultaneously with a portion of the first period of time. The gonadotropin hormone releasing hormone composition is selected from gonadotropin hormone releasing hormone, gonadotropin hormone releasing hormone analogues, gonadotropin hormone releasing hormone agonists, gonadotropin hormone releasing hormone antagonists and mixtures thereof. Contraceptive methods employing the devices are also described.

Excerpt(s): This invention relates to methods for inhibiting conception in mammals, especially human females, and to formulations for use in such methods. More particularly, the present invention is directed to contraceptive methods and preparations for use therein effective for extended periods of time. ... Gonadotropin releasing hormone (GnRH), also known as luteinizing hormone releasing hormone (LHRH), produced by the hypothalamus controls the secretion of follicle stimulating hormone (FSH) and luteinizing hormone (LH) by the pituitary and thence gonadal

steroid hormone production. Potent synthetic agonists of GnRH administered to premenopausal women have been shown to produce a transient rise in FSH/LH release followed by a sustained suppression. Immediately after GnRH agonists became available in the late 1970s, a number of approaches to the use of a GnRH agonist as a contraceptive were explored. Among these approaches, inhibition of ovulation by the chronic administration of GnRH agonists appeared to offer the greatest potential. It was hoped that GnRH agonists would form the basis of an improved method of contraception by offering greater convenience, increased effectiveness or fewer side effects than is the case with combination-type oral contraceptives (COCs). ... Inhibition of ovulation by GnRH agonists has been found, as expected, to be dose-related. When administered in a dose just high enough to ensure anovulation, the ovaries may continue to produce estrogen. This is an unstable situation, with different women having widely varying serum estrogen levels. There has also been concern that endometrial hyperplasia would occur in some women, while in others there would be periods of hypoenestrogenemia with unacceptable vasomotor symptoms and probably loss of bone mineral content.

Web site: http://www.delphion.com/details?pn=US05211952__

- **Contraceptive methods employing 1-substituted imidazole derivatives**

Inventor(s): Vickery; Brian H. (Cupertino, CA)

Assignee(s): Syntex (U.S.A.) Inc. (Palo Alto, CA)

Patent Number: 4,277,475

Date filed: January 11, 1979

Abstract: 1-Substituted imidazole derivatives exhibit spermatostatic and spermatocidal activity and are useful for contraceptive purposes both in male and female mammals.

Excerpt(s): It has long been known that a variety of chemical agents when introduced into the vaginal canal as suitable compositions will interfere with mammalian spermatocidal cells and prevent their ability to effect conception either by reducing the motility of such cells (i.e. a spermatostatic effect) or by cytotoxicity (i.e. a spermatocidal effect). In general, the types of agents most widely used for such purpose are alkylphenoxypolyethoxyethanols, quaternary ammonium compounds and organomercurial compounds. Recently a series of 1,2-benzisothiazole derivatives having powerful spermatocidal activity were described in U.S. Pat. No. 4,093,730. ... In general such spermatostatic and spermatocidal compounds for vaginal administration show little if any effect upon spermatocidal cells when administered systemically to the male mammal. Furthermore, for such systemic administration a compound must not only have powerful spermatostatic or spermatocidal activity but must show a low degree of toxicity to the host mammal. ... It would, therefore, be desirable to have agents for contraceptive purposes which inhibit mammalian sperm cells from effecting conception (and possibly also prevent sperm cell production or maturation in the case of male contraception), which agents could be administered either intravaginally to the female mammal or systemically, preferably orally or via an implant, to the male mammal.

Web site: http://www.delphion.com/details?pn=US04277475__

- **Contraceptive penile cap**

Inventor(s): Herr; Jan E. (P.O. Box 15044, San Diego, CA 92175)

Assignee(s): none reported

Patent Number: 5,458,114

Date filed: April 14, 1995

Abstract: A new and useful contraceptive and prophylactic attachment having a dome shaped bowl which conforms to the shape of a portion of the penile glans surrounding the urethral orifice. The bowl has an aperture overlying the orifice which leads into a collapsed bladder contained within a protective retaining structure. During ejaculation, semen flows through the aperture into the bladder expanding it and causing it to extrude itself through an expandable outlet in the retaining structure. As a penile cap or micro-condom, the shape of the bowl and a layer of medical grade adhesive forms a leak-free seal between the attachment and the penis. The sensitive corona of the glans is left exposed.

Excerpt(s): This invention relates to contraceptive and prophylactic devices for preventing pregnancy and the transmission of sexually transmitted diseases (STDs) during sexual intercourse, and more particularly to condoms and so-called micro-condoms or penile caps. ... The conventional contraceptive-prophylactic condom is designed to cover not only the penile glans but a major portion of the penile shaft as well. It is typically applied in an initially roll-up condition and is unrolled to extend over almost the entire length of the tumescent male organ. It is retained in position largely by the friction between its inner wall and the outer surface of the penile shaft. An objection to contraceptive devices of this type is that the pull-down hood which covers the penile shaft interferes with stimulation. Also, it may slip off when the penis assumes a flaccid condition after ejaculation. This slippage may result in seminal fluid accidentally entering the vaginal passage. Another objection to the use of conventional condoms is that their thinness tends to allow them to tear or leak during use, thereby permitting seminal fluid to enter the vaginal passage. The leakage problem can be diminished by manufacturing the condom of thicker material, but such a method will further lower the level of stimulation afforded the user. ... Attempts have been made to solve the leakage problem by utilizing an adhesive material to secure a miniature condom or contraceptive cap to the tip or glans of the male sex organ. U.S. Pat. No. 3,677,225, for example, discloses a micro-condom or penile cap which covers the glans rather than the greater part of the penis. Although this device is targeted toward increased user stimulation, it could very easily become dislodged during the sexual act because its loose and unprotected seminal reservoir would be pulled upon by the movement of the glans against the wall of the vaginal canal.

Web site: http://www.delphion.com/details?pn=US05458114__

- **Contraceptive pill**

Inventor(s): Wright; Jeri D. (Dublin, CA), Childers; Jerry D. (Fremont, CA), Barclay; Brian L. (Sunnyvale, CA), Wong; Patrick S.-L. (Palo Alto, CA), Atkinson; Linda E. (Portola Valley, CA)

Assignee(s): Alza Corporation (Palo Alto, CA)

Patent Number: 5,200,197

Date filed: December 9, 1991

Abstract: An osmotic device is disclosed comprising an exterior coat comprising an estrogenic and a progestogenic steroid that are delivered immediately as a contraceptive pair for fertility regulation in a female, and a compartment comprising an estrogenic steroid that is delivered at a controlled rate over a prolonged period of time for fertility regulation in a female.

Excerpt(s): This invention pertains to an osmotic oral dosage form useful for fertility control. The dosage form provides an initial pulsed delivery of a progestogen and an estrogen followed by a prolonged delivery of an estrogen. The invention concerns also a method of administering orally the dosage form for providing a pulsed delivery of a progestogen and an estrogen followed by the controlled delivery of an estrogen over an extended period of time. ... A continuous need exists for fertility control for providing freedom for women to choose when they want to have children. Efforts were made, in the early 1960's, to satisfy the need for fertility control with the introduction of the oral contraceptive pill comprising an estrogenic steroid and a progestational steroid. The contraceptive pill used by the prior art comprises a tablet form that delivers the steroids in a bulk, nonrate, uncontrolled dose. In one prior art contraceptive regimen, a tablet comprising both an estrogen and a progestin are administered for about three weeks, while in another modification a tablet comprising an estrogen is administered for about two weeks and a tablet comprising an estrogen and progestin are administered for about a week. The contraceptive steroids were delivered as an oral tablet devoid of rate-controlled delivery properties because the contraceptive steroids are practically insoluble in aqueous fluids and, accordingly, they do not lend themselves for manufacture into a dosage form that administers the steroids at a controlled and known rate per unit time. ... The contraceptive steroids, moreover, were delivered by the prior art in a dose unprotected from the changing environment of the gastrointestinal tract, with little consideration for the steroid's pharmacological and physiological effects and the accompanying disadvantages on a recipient. For example, one disadvantage associated with the prior art tablet accompanies the dose-dumping of estrogen which can lead to gastrointestinal disturbances, nausea, weight-gain, edema, and an increase in the incidence of thrombophelbitis and associated cardiovascular disorders. Also, the prior art tablet does not provide for the fast release of a progestational steroid for avoiding liver metabolism of the steroid and the subsequent delivery of an estrogen in small continuous doses for lessening the incidence of side effects in the recipient. The oral contraceptives are disclosed in *The Pharmacological Basis of Therapeutics*, by Goodman and Gilman, 7th Ed., pages 1430 to 1439 (1985), published by Macmillian Publishing Company.

Web site: http://www.delphion.com/details?pn=US05200197__

- **Contraceptive regimen**

Inventor(s): Bennink; Herman J. T. C. (Driebergen, NL)

Assignee(s): Akzo N.V. (Arnhem, NL)

Patent Number: 5,418,228

Date filed: January 14, 1994

Abstract: A contraceptive method and regimen utilizing an initially greater amount of progestogen, which gradually tapers over the period in which the contraceptive is administered. The regimen includes a multiphasic combination and contraceptive kit containing at least 21 daily sequential dosage units divided into 3 phases. The first phase contains 6-8 dosage units, each containing a progestogen at a dosage equivalent in

progestogenic activity to 75-150 .mu.g desogestrel and an estrogen at a dosage equivalent in estrogenic activity to 20-25 .mu.g ethinyl estradiol. The second phase contains 6-8 dosage units, each containing less progestogen than in the previous dosage units, but still having progestogen equivalent to 75-125 .mu.g desogestrel and an estrogen equivalent to 20 .mu.g ethinyl estradiol. The third phase contains 6-8 dosage units, each containing less progestogen than in the previous dosage units, but still containing a progestogen equivalent to 75-100 g desogestrel and an estrogen equivalent to 20 .mu.g ethinyl estradiol. The kit may also include another phase of 4 to 7 dosage units having no contraceptive steroid.

Excerpt(s): The invention relates generally to contraceptive preparations, and more specifically to an oral contraceptive regimen. ... Known oral contraceptive regimens typically involve administering tablets containing a combination of estrogen and progestogen to an adult female over her menstrual cycle, usually followed by a "pill-free" or blank pill period. The amount of progestogen in the tablets of these regimens typically increases during the administration of the regimen. Alternatively, the amount of progestogen may remain fixed, or reaches a peak and then declines. ... For example in French Patent Application No. 2,223,018 to Ortho Pharmaceutical, a progestogen is administered from at least the fifth day to the twenty-fifth day of the menstrual cycle, the dosage of the progestogen being greater during the last seven days of administration than it is during the first seven days.

Web site: http://www.delphion.com/details?pn=US05418228__

- **Contraceptive sheath**

Inventor(s): Scholl; Thomas (14, Quai Kleber, F-67000 Strassbourg, FR)

Assignee(s): none reported

Patent Number: 5,836,307

Date filed: September 20, 1995

Abstract: A process is disclosed for producing a contraceptive sheath that is subdivided into two sections. The sections are delimited by a boundary line. The process is characterized in that the sheath is produced with its particularities in at least the immersion step with no further vulcanization steps. The boundary line is reinforced by the same elastic material and has a smaller diameter than the remaining elongated cylindrical part, so that the sheath is reliably retained in its original position.

Excerpt(s): The present invention deals with a procedure for the production of a contraceptive sheath for contraception, especially a contraceptive sheath which guarantees a secure hold on the erected penis of the man. ... Such a contraceptive sheath is already known from DE-OS 166 365. The contraceptive sheath known from the state of the art reveals at a certain point in the upper part of the contraceptive sheath an elastic rubber ring, which is put in a deepening groove in the immersion form either by hand or machine and then the actual contraceptive sheath is put on the immersion form. The ringshaped product can be vulcanised either on the inner or outside. Such a ring is regarded as disturbing during use and moreover is large-scale and cost-intensive in production. ... Therefore it is the object of the present invention to put at disposal a procedure for production of a contraceptive sheath, which is easy and cheap in production and which meets the requirements of the approving authorities.

Web site: http://www.delphion.com/details?pn=US05836307__

- **Contraceptive sponge - diaphragm bilayer**

Inventor(s): Chvapil; Milos (5655 N. Mina Vista, Tucson, AZ 85718)

Assignee(s): none reported

Patent Number: 4,369,773

Date filed: November 5, 1980

Abstract: An intravaginal insert, serving as a mechanical and chemical contraceptive barrier is described. The insert consists of a thin circular disc bilayer of a resilient and fluid absorbent sponge, preferably made of collagen, laminated on the inside with a soft membrane. Both layers of laminated sponge are connected at the circumference to form a pocket with a small opening. A spermicide, preferably a detergent, is deposited within the matrix of the sponge, which is also buffered to pH 4 to 5. Into a pocket made from this composite material a silastic ring is inserted before wetting the sponge with tap water and inserting it into the upper vault of the vagina to cover the cervix in a similar manner to the standard diaphragm.

Excerpt(s): Various contraceptive techniques are evaluated as to their conception preventing effectiveness, safety and convenience to the user. The use of the diaphragm is considered one of the safer methods, although the effectiveness, and mainly convenience, is rather poor. In order to be effective, the diaphragm must be used in combination with spermicidal creams, foams, jellies. About one teaspoon of a spermicide should be applied inside the dome, on the convex side of the latex as well as around the circumference of the ring reinforcing the diaphragm structure and enabling its retention and proper intravaginal position. Due to the application of the spermicidal moieties the use of the diaphragm is considered as "messy" by the user as well as her partner. Insufficient amount of spermicidal cream placed on the circumference is probably the main reason, next to improper placement, for contraceptive failure of this method. Still another reason for inconvenience in using the spermicide with rubber diaphragm is the need to administer the jelly, or cream, on the diaphragm no longer than two hours before intercourse. Another inconvenience lies with the need for repetitive application of the spermicide between intercourses. Because the diaphragm is formed of the rubber membrane, it does not absorb liquified ejaculate, which causes the discomfort by dripping. ... It is the object of this invention to present a new contraceptive method which eliminates all the above mentioned inconveniences of the diaphragm and in addition offers higher contraceptive effectiveness than the conventional diaphragm contraceptive method. ... A thin layer of a sponge-like matrix, characterized by high resiliency, by large fluid binding capacity and by fast wetting is laminated by a thin membrane made of biocompatible plastics. I found that sponges made from collagen by known processes, such as described in U.S. Pat. No. 3,823,212 ,nd U.S. Pat. No. 4,193,813, are very suitable because of large wet resilience and fluid binding properties. In addition, collagen sponge was found safe when administered intravaginally. I also found that collagen sponge matrix will retain solutions of any medications, which when applied intravaginally are slowly released into the vaginal canal. Another material which showed to function adequately was a sponge made of polyvinylalcohol, polyurethane, acetylcellulose and other biologically inert polymers.

Web site: http://www.delphion.com/details?pn=US04369773__

- **Contraceptive sponge and tampon**

Inventor(s): Leveen; Harry H. (321 Confederate Cir., Charleston, SC 29407), Leveen; Robert F. (312 Lombard St., Philadelphia, PA 19147), Leveen; Eric G. (19 Palmetto Rd., Charleston, SC 29407)

Assignee(s): none reported

Patent Number: 5,070,889

Date filed: November 15, 1990

Abstract: A bacteriocidal virocidal sponge containing iodine and/or chlorhexidine and a surfactant which can be used as a contraceptive and virocidal and bacteriocidal sponge positioned within a human body comprising a polyurethane open cell foam impregnated with a surfactant and iodine and/or chlorhexidine. A bacteriocidal tampon containing an iodophor or chlorhexidine does not induce toxic shock syndrome.

Excerpt(s): In recent years there has been a serious increase in sexually transmitted disease. Sexual freedom among consenting adults has been a partial cause of this increase. In addition, oral contraceptives and a change in the mores has created a situation which has increased the number of sexual contacts, thus favoring dissemination of sexually transmitted disease. Since these factors are unlikely to change, sexually transmitted disease has now become a major public health problem. Some diseases which were formerly unassociated with sexual transmission, such as B virus hepatitis, are now known to be sexually transmitted. Other new diseases such as acquired immune deficiency syndrome (AIDS) are viral diseases which are usually transmitted sexually. A need therefore exists for all conceivable types of control measures to reverse the increasing incidence of sexually transmitted disease. ... The intravaginal contraceptive doughnut shaped sponge containing a spermicidal agent has become an accepted method of birth control in western society. Yet this sponge does little to halt the incidence of sexually transmitted disease which is steadily increasing. Such sponges are formed of an open cell polyurethane foam sponge impregnated with a spermicidal agent, nonoxynol-9, (U.S. Pat. No. 2,541,103). Nonoxynol is a polyethylene glycol nonylphenyl ether which is a mild surfactant. Like other non ionic surfactants it is a cytolytic agent which acts by disrupting the plasma membrane of animal cells. It is not as effective on the cell walls of bacteria which are unlike the lipid containing membranes of animal cells. Unfortunately, nonylphenoxypolyethoxyethanol is only bacteriostatic and not bacteriocidal when placed in a culture of staphylococcus aureus (TSS-S aureus). Toxic shock syndrome (TSS) is caused by the proliferation of staphylococcus aureus in absorbent tampons at the time of menstruation and in contraceptive sponges used in the absence of menstruation. Although nonoxynol does suppress colony counts of staphylococcus aureus during the first 6 hours of growth in a culture medium, the number of bacteria in the culture flask after 30 hours has been shown to be identical to that of control cultures. (Contraception 33:395 1986). Therefore, nonoxynol does not prevent the growth of staphylococci in contraceptive sponges and the absorption of the toxins from proliferating staphylococci can produce toxic shock syndrome. Thirteen cases have been reported in users of a contraceptive sponge impregnated with nonoxynol. (Int Fertil [Sweden] 30:81 1985). In all of these cases, TSS-S aureus was cultured. It has been estimated that the incidence of TSS would be 10 cases a year per 100,000 women using the sponge. To prevent TSS, contraceptive sponges must contain a bacteriocidal agent in addition to nonoxynol. The current mortality from TSS is 3% (J.A.M.A. 251:1016 1984). The death rate in contraceptive sponge users is less than that occurring with tampons where the incidence of TSS is also 10 per 100,000 menstrual users (NEJM 303:1429 1980). Even though nonoxynol is only bacteriostatic, a study of prostitutes in Bangkok,

Thailand who used nonoxynol-9 intravaginal contraceptive sponges showed that these prostitutes had a lower incidence of venereal disease (chlamydial infection and gonorrhoea) than those who did not use this contraceptive sponge. (J.A.M.A. 257:2308 1987). The incidence of monilia vaginitis was increased because nonoxynol is not fungicidal. The slight reduction in the incidence of venereal disease in frequently exposed prostitutes is not acceptable with regard to disease prevention and the decrease in incidence is eventually eliminated by frequency of exposure. If a contraceptive sponge could be made which contained virocidal, bactericidal and fungicidal agents in addition to the spermicide, it would completely protect against sexually transmitted disease. Such a sponge would not only protect the female from sexually transmitted disease, but would be equally protective for the male. This consideration has not been addressed by the medical literature. Bactericidal tampons would eliminate the possibility of toxic shock syndrome. Such developments would fulfill major public health needs and lead to a reduction in the rate of sexually transmitted disease. ... The present invention describes a bacteriocidal, virocidal and protozoicidal contraceptive sponge which, unlike a sponge which relies totally on a spermicidal agent which cannot prevent sexually transmitted disease, liberates a biocidal agent. The present invention preferentially liberates iodine which is useful in treating vaginal infections (vaginitis) caused by trichomonas, gonococcus, monilia and chlamydia. A vaginal absorbent tampon which cannot induce toxic shock syndrome is also described. Furthermore, such a contraceptive sponge releasing iodine in addition to nonoxynol would lower the incidence of carcinoma of the cervix which is now known to be a manifestation of the sexually transmitted papilloma virus. Iodine would also prevent the transmission of the highly prevalent genital herpes which is known to predispose to malignancy.

Web site: http://www.delphion.com/details?pn=US05070889__

- **Contraceptive suppository**

Inventor(s): Kazmiroski; Michael S. (Philadelphia, PA), Latshaw; Wilmer E. (Berwyn, PA)

Assignee(s): Menley & James Laboratories, Ltd. (Philadelphia, PA)

Patent Number: 4,384,003

Date filed: June 29, 1981

Abstract: A vaginal contraceptive suppository having both a rapid release of active ingredient and prolonged duration of effectiveness. The suppository comprises a mixture of sodium starch glycolate, a thickening agent and a vegetable oil base combined with a spermicide.

Excerpt(s): This invention relates to contraceptive suppositories adopted for vaginal insertion. ... Prior to this invention commercial contraceptive suppositories were usually preferred with a water soluble base, such as polyethylene glycol, which dissolves quite rapidly when inserted in the vaginal cavity and releases the spermicide ingredient. Although fast acting, approximately fifteen minutes, these commercial suppositories have two major disadvantages. First, they dissolve in the aqueous media of the vaginal cavity to form thin, runny solutions that are messy and tend to leak rapidly from the cavity. Second, they remain effective for only a short period of time, no more than an hour. ... Attempts have been made to solve the above problems by using other suppository bases. For example, oil soluble glycerides of natural fatty acids (synthetic butters) which are widely used in rectal suppositories have been considered. These vehicles melt at body temperature to release their active ingredient and are somewhat

more viscous than the water soluble bases. However, the release of the active ingredient from such vehicles is delayed. In vitro sperm immobilization tests show that up to two hours is required to obtain effective levels of spermicidal action. This is an undesirable delay for such products because commercial products state on the label that they should be used ten to fifteen minutes prior to intercourse and are effective for only one hour.

Web site: http://www.delphion.com/details?pn=US04384003__

- **Contraceptive system**

Inventor(s): Boorman; George L. (13187 Highland Rd., Highland, MD 20777)

Assignee(s): none reported

Patent Number: 4,834,114

Date filed: May 19, 1987

Abstract: A contraceptive system (10) is provided for use by both men and women having one piece formation which includes an extended tubular member (12) coupled to a genital shield member (14). Extended tubular member (12) is closed at the distal end (30) and open at the proximal end (32). In the embodiment adapted for use by women, extended tubular member (12) has a non-uniform wall thickness where the bottom wall thickness (36) is greater than the top wall thickness (34). Genital shield (14) includes an absorbent layer (16) adhesively bonded to the surface (15) of shield member (14). Shield member (14) also includes retention straps (18) with clasps (20) for maintaining contraceptive system (10) in position on the body.

Excerpt(s): This invention directs itself to contraceptive systems. In particular, this invention directs itself to contraceptive systems having an extended tubular member for insertion into the vaginal cavity. More in particular, this invention directs itself to contraceptive systems having an extended tubular member secured to a shield-like member. Still further, this invention relates to a contraceptive system which incorporates retention straps for releasably coupling the shield like member to the individual using the contraceptive system. Still further, this invention relates to a contraceptive system wherein the extended tubular member has a non-uniform wall thickness where the bottom wall thickness is greater than the upper wall thickness. Still further, this invention pertains to a contraceptive system formed of a rubber-like composition in one-piece formation. Still further, this invention pertains to a contraceptive system where the shield-like member includes a layer of absorbent material adhesively bonded to the outside surface of the shield-like member. ... Contraceptive systems having an extended tubular member are well-known in the art. However, contraceptive systems having an extended tubular member having a non-uniform wall thickness secured to a shield mechanism all of a one-piece formation has not been found in the prior art. ... The best prior art known to the Applicant are U.S. Pat. Nos. 2,591,783; 4,568,340; 4,553,968; 3,032,038; 4,232,675; 3,999,550; 1,866,060; 713,900; 2,389,831; 3,677,225; and, 4,354,494.

Web site: http://www.delphion.com/details?pn=US04834114__

- **Contraceptive vaccine**

Inventor(s): Alves; Kenneth (Manalapan, NJ), Gupta; Sunil K. (Piscataway, NJ), Hollis; Gregory Franklin (Wilmington, DE)

Assignee(s): Merck & Co., Inc. (Rahway, NJ)

Patent Number: 5,935,578

Date filed: December 19, 1996

Abstract: The instant invention is drawn to a sperm surface protein in substantially pure form selected from a human PH30 beta chain protein and a mouse PH30 beta chain proteins. Such proteins are useful as contraceptive vaccines in humans and mice respectively, and for identifying small molecules that will disrupt sperm-egg interaction and fertilization.

Excerpt(s): The present invention provides sperm surface proteins and DNA sequences encoding the proteins which are useful in the prevention of fertilization. More particularly, the cloning and characterization of the mouse and human PH30 beta chain genes, as well as their use as contraceptive vaccines, are described. ... Four methods of family planning are currently available in the U.S., sterilization, abstinence, abortion and contraception. Of these four birth control methods, contraception is the most widely utilized. Despite the substantial U.S. and global demand for contraception, the presently available methodologies fall short of market needs. Oral contraceptives and barrier methods dominate today's contraceptive market but have significant shortcomings. Oral contraceptives, though efficacious, are documented to be associated with significant side effects including increased risks of cardiovascular disease and breast cancer and are not recommended for women over the age of 35. Barrier methods, while safe, have failure rates approaching 20%. There is a clear need for increased availability of and improvements in contraceptives that offer superior safety, efficacy, convenience, acceptability and are affordable to women and men worldwide. Identification of novel approaches for controlling fertility is therefore necessary. ... Immunization of male and female animals with extracts of whole sperm is known to cause infertility. >Tung, K., et al., J. Reproductive Immunol., 1; 145-158 (1979); Menge, A., et al., Biol. of Reproduction, 20, 931-937 (1979)!. Moreover, men and women who spontaneously produce antisperm antibodies are infertile, but otherwise healthy. >Bronson, R., et al., Fert. and Sterile, 42, 171-183 (1984)!. Although the critical sperm antigens are unknown, these observations have led to the proposal that sperm proteins might be useful in the development of a contraceptives vaccine.

Web site: http://www.delphion.com/details?pn=US05935578__

- **Contraceptive vaccine based on alloimmunization with zona pellucida polypeptides**

Inventor(s): Dean; Jurrien (Bethesda, MD)

Assignee(s): The United States of America as represented by the Department of Health (Washington, DC)

Patent Number: 5,916,768

Date filed: May 23, 1997

Abstract: The present invention relates to contraceptive vaccines based on cloned zona pellucida genes and the strategy of alloimmunization with zona pellucida polypeptides. In particular, the present invention relates to a contraceptive vaccine for use in a

mammalian female comprising a polypeptide which displays at least one epitope for binding of an antibody that inhibits fertilization of an oocyte by a sperm. This epitope is from a zona pellucida protein of the species in which the said vaccine is used. This invention relates, more particularly, to such vaccines wherein the zona pellucida protein is either the ZP3 or the ZP2 or the ZP1 protein or the mouse or homologues of these proteins in some other mammalian species. Further, this invention comprehends vaccines comprising a synthetic peptide that displays an epitope for such an antibody that inhibits fertilization. In addition, this invention relates to cloned DNA segments variously encoding the mouse ZP3 or ZP2 proteins or the human ZP3 or ZP2 protein.

Excerpt(s): The present invention relates to contraceptive vaccines based on cloned zona pellucida genes and the strategy of alloimmunization with zona pellucida polypeptides. In particular, the present invention relates to a contraceptive vaccine for use in a mammalian female comprising a polypeptide which displays at least one epitope for binding of an antibody that inhibits fertilization of an oocyte by a sperm. This epitope is from a zona pellucida protein of the species in which the said vaccine is used. ... This invention relates, more particularly, to such vaccines wherein the zona pellucida protein is either the mouse ZP2 protein, the mouse ZP3 protein, the human ZP2, the human ZP3 protein, or homologues of these proteins found in other mammalian species. Further, this invention includes vaccines comprising a synthetic peptide that displays an epitope for such an antibody that inhibits fertilization. In addition, this invention relates to cloned DNA segments variously encoding the mouse ZP3 or ZP2 proteins, or the human ZP2 or ZP3 proteins. ... There is currently much interest in the development of a safe and effective contraceptive vaccine for control of diverse mammalian populations. Contraceptive vaccines would be useful under certain circumstances where relatively long-term but not permanent contraception is desired without the need for frequent intervention, for example, in pets including cats and dogs, in agriculturally important livestock such as cattle and pigs, and in human beings. A contraceptive vaccine preferably should have an effect which is long-lasting and highly specific. Further, to minimize possibilities for birth defects in the event of failed contraception, the antigen which is selected as the immunogen should produce contraceptive antibodies that inhibit fertilization of the egg by a sperm rather than by an abortifacient mechanism involving disruption of early development. In addition, the vaccine preferably should induce an immunological response that is sufficient to be effective for contraception without eliciting a cytotoxic response that might result in abnormal reproductive function.

Web site: http://www.delphion.com/details?pn=US05916768__

- **Contraceptive vaccine comprising a glycosylated 55 kD zona pellucida protein immunogen and method of use of the same in contraception**

Inventor(s): Dunbar; Bonnie S. (2001 Holcombe #2302, Houston, TX 77030), Prasad; Sarvamangala V. (5123 Jackwood, Houston, TX 77096)

Assignee(s): none reported

Patent Number: 5,637,300

Date filed: August 3, 1994

Abstract: Recombinant zona pellucida proteins having altered, non-native glycosylation patterns are able to elicit the production of antibodies to matured zona pellucida proteins. Such recombinant proteins and the elicited antibodies can therefore be used in a contraceptive vaccine to prevent pregnancy in humans and animals.

Excerpt(s): The present invention relates to the use of a recombinant protein as a contraceptive vaccine. More specifically, the invention relates to a recombinant zona pellucida protein that can be used to elicit antibodies that prevent sperm cells from binding to, and penetrating, the zona pellucida that surrounds egg cells. The invention is directed to the therapeutic use of such molecules, as well as to their diagnostic use. This invention was made with U.S. Government funds. The U.S. Government has certain rights in this invention. ... The zona pellucida ("ZP") is a complex extracellular glycoprotein matrix that surrounds the mammalian oocyte (see, Wassarman, P. M., *Ann. Rev. Biochem.* 57:415-442 (1988); Dunbar, B. S. et al., In: *A Comparative Overview of Mammalian Fertilization* (Dunbar, B. et al., eds.) Plenum Press, pp. 97-115 (1991)). The matrix is formed during the early stages of oocyte growth and follicular cell differentiation and serves to protect the oocyte and embryo until implantation in the uterine wall (Schwoebel, E. et al., *Biol. Reprod.* 47:857-865 (1992)). ... In addition to protecting the oocyte, the zona pellucida plays an important role in the fertilization process (Dunbar, B. S. et al., In: *Mechanism and Control of Animal Fertilization* (Hartmann, J. et al., eds.) Academic Press, pp. 139-175 (1983)). Sperm cells are capable of binding to the zona pellucida. Fertilization occurs when a bound sperm cell penetrates the ZP. Sperm penetration of the zona pellucida is probably mediated by the limited hydrolysis of zona pellucida components by sperm enzymes such as acrosin (Dunbar, B. S. et al., *Biol. Reprod.* 32:619 (1985), and Stambaugh, *Gam. Res.* 1:65 (1978)). The zona pellucida remains intact after fertilization to ensure proper embryonic development and perhaps to prevent embryo fusion in the oviduct (Mintz, *Science* 138:594 (1962)). The zona pellucida also plays a role in preventing polyspermy (i.e., fertilization of an oocyte by multiple sperm cells). In some mammalian species, fertilization alters sperm binding to the zona pellucida, and increases its resistance to proteolytic digestion.

Web site: http://www.delphion.com/details?pn=US05637300__

- **Contraceptive vaginal tablets**

Inventor(s): Kovacs; Andras (Bajcsy Zs. ut 19/a, 1065 Budapest, HU), Szebeni; Rudolf (Beke u. 48, 2131 God, HU), Koszegi; Bela (Corvin korut 52, 1192 Budapest, HU)

Assignee(s): none reported

Patent Number: 4,565,694

Date filed: June 7, 1984

Abstract: The invention relates to contraceptive vaginal tablets as well as to a process for preparing them. The tablets of the invention have the following composition: 0.2 to 3 parts by weight of boric acid, 10 to 20 parts by weight of tartaric acid, 1 to 2 parts by weight of vitamin K₃-sodium bisulfite adduct, 0.8 to 1.2 parts by weight of polyvinyl pyrrolidone, 2 to 5 parts by weight of magnesium stearate, 8 to 12 parts by weight of carboxymethyl cellulose, 8 to 12 parts by weight of lactose and 50 to 65 parts by weight of microcrystalline cellulose. The vaginal tablets contain preferably 5 to 10 mg of vitamin K₃-sodium bisulfite adduct and have a total weight of 500 mg. The tablets of the invention are prepared preferably in such way that the boric acid, the tartaric acid and the vitamin K₃-sodium bisulfite adduct, as well as the polyvinyl pyrrolidone, the magnesium stearate, the carboxymethyl cellulose, the lactose and the microcrystalline cellulose are homogenized separately to powder mixtures thereafter the powder mixtures are mixed and pressed to tablets. The tablets should be wetted and put into the back-vaginal fornix 10 minutes before the coitus.

Excerpt(s): The invention relates to contraceptive vaginal tablets being free from hormones as well as to a process for preparing them. ... Three methods are known--except for operations--which hinder the occurrence of undesirable pregnancy. These methods are the use of condoms, the insertion of intrauterine instruments and the insertion of vaginal pessaries (mechanical instruments) which hinder the occurrence of the pregnancy by using hormonal preparations or local spermicidal preparations free from hormones. ... All the known methods have, however, certain disadvantages which do not make possible general application. It is known that not every conceptive age-group may use the preparations containing hormones. However, certain persons, who could take these preparations in view of their age, are deprived of employing them owing to the side effects. From among the mechanical instruments the condom and the vaginal pessary cause in certain cases uncomfortable feeling or require preparation which destroys the illusion. The intrauterine instruments are free from these disadvantages, but have the disadvantage that not all persons may wear them as well as the fact that the youngest age-group may not use them. A further disadvantage of these instruments is that they may be inserted only by the physician. In case of the hormone free preparation no contraindication of the age-group exists. These are rarely applied per se, however since they are not reliable enough.

Web site: http://www.delphion.com/details?pn=US04565694__

- **Contraceptive-antivenereal disease tampon**

Inventor(s): Donald; Jack W. (El Paso, TX)

Assignee(s): Donald Enterprises, Inc. (El Paso, TX)

Patent Number: 4,186,742

Date filed: June 9, 1978

Abstract: A new concept of pregnancy and disease prevention is provided by a medicated tampon in the form of a soft, porous foam ball, which is easily insertable into the vagina to cover the cervical area and which is impregnated with a safe spectrum of antibiotics for control of venereal disease and with a contraceptive for control of pregnancy. The tampon may be inserted before intercourse to remain in place during intercourse.

Excerpt(s): U.S. Pat. No. 3,594,468 shows a germicidal composition. ... U.S. Pat. No. 3,639,562 shows a vaginal suppository plus the use of impregnated tampon. ... U.S. Pat. No. 3,691,271 shows a sanitary napkin with microcapsules filled with a bactericidal and fungicidal deodorant.

Web site: http://www.delphion.com/details?pn=US04186742__

- **Copper wire for intrauterine contraceptive devices and a method for manufacturing the same**

Inventor(s): Kosonen; Ahti A. (Pori, FI)

Assignee(s): Outokumpu Oy (Helsinki, FI)

Patent Number: 4,351,326

Date filed: October 3, 1980

Abstract: A copper wire for intrauterine contraceptive devices is disclosed as having a core wire of a flexible tough metal nobler than copper and a copper coating fixed on the core wire by means of a thin diffusion layer.

Excerpt(s): The present invention relates to copper wire for intrauterine contraceptive devices, the copper wire having a core wire owing corrosion-resistivity against uterine fluids, and to a method for manufacturing such copper wire. ... It has been observed that, due to the dissolution in the uterus, copper wire often corrodes locally, and consequently the wire fragmentates and disintegrates before all of the copper has dissolved. This decreases the effective using time of intrauterine devices. In the publication "Fertility and Sterility", 30 (1) (1978) 59-65, it is pointed out that in the copper T-200 (manufactured by Hallmark Plastics Inc, U.S.A.) devices investigated, fragmentation was detected in one case after only 8 months of use. Previous studies [Population Council's Report (NDA), Wire Fragmentation, 1973] have shown severe corrosion and fragmentation in the copper wire of a intrauterine device after only 5 months of use. ... In all present available intrauterine copper devices the problem is the reduced using time due to the corrosion and fragmentation of the copper wires used in them. It has been suggested that copper can be deposited electrolytically on a stainless wire, in order to avoid described disadvantage. In this case, the actual wire consists of stainless steel. Stainless, acid-resistant steel or other such kind of alloys are, however, quite rigid and thus not suitable for use in intrauterine devices. Furthermore, electrolytically coated copper may flake when corrosion reaches the steel. Furthermore, it can be assumed that, owing to electrochemical difference in voltage between the steel and the copper, the corrosion of copper is accelerated when the core is exposed.

Web site: http://www.delphion.com/details?pn=US04351326__

- **Corn extract contraceptive**

Inventor(s): Markaverich; Barry M. (The Woodlands, TX), Faith; Robert (Houston, TX), Mani; Shaila (Houston, TX)

Assignee(s): Baylor College of Medicine (Houston, TX)

Patent Number: 6,277,418

Date filed: May 14, 1999

Abstract: Novel compositions extracted from corn products provide contraceptive and anti-neoplastic activities. Using novel extraction procedures, compositions may be isolated from corn products. For example, a Zea mays plant product is extracted in a first solvent to produce a solvent extract, the solvent extract is dried to produce an extracted solid, the extracted solid is solubilized in a second solvent, the solubilized extract is purified in a chromatographic process, and an active fraction is collected from the chromatographic process. Compositions may be applied to animal bedding or food, and are adaptable to any suitable method of administration. The contraceptive activity of these compositions is effective for both males and females.

Excerpt(s): This invention relates to pharmaceutical compositions derived from corn extracts useful as contraceptive compositions and antineoplastic compositions. ... Contraception is often desired to control reproduction. While a plurality of contraceptive compositions and methods are available commercially, most methods of chemical contraceptives are active through a limited number of pathways. Thus, the majority of contraceptive compositions still involve the use of one or more natural or synthetic hormones such as estrogen, progestin and ethinyl estradiol. ... While natural

and synthetic hormones are effective, their use has not been without substantial and undesirable side effects. Numerous side effects have been associated with the use of natural or synthetic hormones in contraceptives, such as, for example, thrombophlebitis, thrombosis, pulmonary embolism, coronary thrombosis, myocardial infarction, cerebral thrombosis, cerebral hemorrhage, hypertension, irregular bleeding, and irregular menstrual cycle.

Web site: http://www.delphion.com/details?pn=US06277418__

- **Device for fixing a contraceptive device to the wall of the uterus**

Inventor(s): Wildemeersch; Dirk (Vossenhul 8, Knokke-Heist, B-8300, BE)

Assignee(s): none reported

Patent Number: 5,303,717

Date filed: November 22, 1991

Abstract: A device for fixing a contraceptive device to the wall of the uterus is disclosed. The fixing device consists of a thread (10) of non-biodegradable material, designed to be attached to the contraceptive device, and a retaining member (11) implantable in the tissue of the uterus; this retaining member (11) consists of a permanent element (12) of non-biodegradable material and a temporary element (13) of biodegradable material which temporarily confers on the retaining member (11) a greater resistance to pulling out than that of the permanent element (12) alone. The device according to the invention is to be used during the period immediately following confinement.

Excerpt(s): The present invention has as its subject matter a device for fixing a contraceptive device to the wall of the uterus, of the type consisting of a thread, integral with the contraceptive device, and a retaining member implantable in the tissue of the uterus and integral with the thread. ... However, immediately after confinement, the dimensions of the uterine cavity and the neck of the womb are large, a fact which entails significant risks of rejection and/or displacement of the intra-uterine device. ... This is one of the reasons which have led to the designing of intra-uterine devices fixed to the wall of the uterus. Such devices have been described in particular in US-A-3 954 103 and BE-A-899 286.

Web site: http://www.delphion.com/details?pn=US05303717__

- **Device for fixing an intra-uterine contraceptive device to the uterine wall**

Inventor(s): Wildemeersch; Dirk (Vossenhul 8, Knokke-Heist, BE)

Assignee(s): none reported

Patent Number: 4,721,105

Date filed: March 21, 1985

Abstract: The present invention relates to a device for the insertion and fixation of an intrauterine contraceptive device (IUD) to the uterine fundus of a female in the immediate post-partum or post-abort period. The device comprises a thread affixed to the IUD and to a retaining member, a needle for the insertion of the retaining member attached to the thread into the uterine muscle, a protecting member for the needle, a receiving member for the IUD, an actuating member for the needle, movable with respect to the protecting member, and a locking member for temporarily locking the

actuating member to the protecting member. This device extends backwards to form a gripping member, while the retaining member loosely engages the needle and an element for achieving and maintaining a traction on the thread, ensuring the cooperation of the retaining member with the needle was long as the locking member and the protecting member are not disengaged and the IUD is not released from its receiving member.

Excerpt(s): The present invention relates to a device for the insertion and fixation of an intrauterine contraceptive device (IUD) to the uterine fundus of a female in the immediate post-partum or post-abort period. ... For many years, numerous studies have been done on the possibility of immediate post-partum insertion of IUDs. This method offers many advantages, especially in the developing world which faces overpopulation. The method of immediate post-partum insertion is of high interest in these countries because a high proportion of pregnant women deliver in a hospital setting mostly on an out-patient basis. So, the method reaches a large number of motivated women, confers protection before resumption of sexual activity and ovulation, is easily inserted without the slightest pain, does not interfere with lactation and the financial burden is small. ... Unfortunately, the few reported experiences of immediate post-partum insertion, in which several models of IUDs have been used, lead to rather disappointing results because of a high rate of expulsion mainly during the first three months. The rate of translocation after insertion of the IUD has not been mentioned in these studies, but is most probably higher than the expulsion rate. Translocation of an IUD not only hinders its efficiency but can also damage the uterus, and thus be dangerous for the health of the woman.

Web site: http://www.delphion.com/details?pn=US04721105__

- **Dispensing packages containing novel cyclic progestogen-interrupted estrogen oral contraceptive regimens**

Inventor(s): Segre; Eugene J. (Los Altos, CA)

Assignee(s): Syntex Corporation (Panama, PM)

Patent Number: 3,942,641

Date filed: March 24, 1975

Abstract: This invention relates to a method of fertility control by use of novel cyclic progestogen-interrupted estrogen oral contraceptive regimens. Considering the first day of menstrual flow as day one of a 28 day medication administration cycle, a combined formulation of estrogen and progestogen substances is administered on the 3rd, 4th, 5th or 6th day of the cycle and every second or third day thereafter through, and including, the 23rd, 24th, 25th, 26th, 27th or 28th day of the cycle, and a formulation having only a progestogen substance as the active component is administered on the 4th, 5th, 6th, or 7th day of the cycle and every day thereafter on which a combination formulation is not administered, through, and including, the 22nd, 23rd, 24th, 25th, 26th, 27th or 28th day of the cycle. In a particular regimen, a combination of estrogen and progestogen is administered starting with the 5th day of the cycle and continuing every other day through the 25th day of the cycle, and starting with the 6th day of the cycle and continuing every other day through the 24th day of the cycle only progestogen is administered. The remaining seven days are dosage-free or the regimen is completed by use of placebos or other nonhormonal supplements. Dispensing packages for holding unit dosage forms for oral ingestion of one unit dosage form daily in the appropriate sequence during a single cycle of medication administration are also described.

Excerpt(s): The present invention relates to a method of fertility control in the human female by adherence to a novel oral contraceptive regimen. The regimen includes the administration of a combination of an estrogen and a progestogen during certain days of the reproductive cycle, and the administration of only the progestogen on certain of the other days of the cycle. ... Research and development in the area of human contraception or fertility control has heretofore concentrated almost exclusively on preventative methods, whether in the form of chemical or physical diversions of or barriers to sperm transport, e.g. vaginal creams and foams, condoms, diaphragms, and intrauterine devices, or in the form of chemically based oral contraceptives. The former methods have been largely supplanted by the use of oral contraceptives which have proven to be extremely effective in the prevention of conception. This effectiveness, however, necessarily requires the administration of the oral contraceptive tablets over approximately 21 days of each reproductive cycle. During the remaining 7 days of the 28 day cycle, no hormone-containing tablets are given and it is during this period, if the reproductive cycle is accurately regulated, that normal menstrual flow takes place. ... The most common form of oral contraception is based upon the daily administration of a combination of estrogen and progestogen substances for about 21 successive days, starting generally on the 5th day of the menstrual cycle. After the 21 day period, there follows a 7 day period during which neither estrogen or progestogen substances are taken. If the reproductive cycle of the female has been properly regulated, the normal and characteristic menstrual flow is supposed to, and generally does, occur within the 7 day period.

Web site: http://www.delphion.com/details?pn=US03942641__

- **Disposable contraceptive cervical barrier**

Inventor(s): Strickman; Melvyn B. (R.D. 1, Lawrence Rd., Bridgeton, NJ 08302), Fournier; Erick-Pierre (30 Park Ave., New York, NY 10016)

Assignee(s): none reported

Patent Number: 4,630,602

Date filed: March 29, 1984

Abstract: A disposable contraceptive cervical barrier includes a bowl-shaped thin flexible member and a substantially thicker circular rim unitary with the flexible member. The rim provides a spring tension effect for helping to maintain the barrier in position. A plurality of cavities are formed in the rim and are equidistantly spaced therearound. The cavities are open so as to be capable of receiving and holding a quantity of a spermicide. Alternatively, the flexible member itself can be provided with a plurality of grooves for holding the spermicide. Preferably, the barrier is made from a mixture of a hydrophilic foam polymer and a more conventional polyurethane polyether prepolymer-catalyst system. The mixture is molded in a closed mold having a volume of about ten percent of the volume which the material would occupy if allowed to foam freely. The finished product is similar to an elastomer except that internally it has a dense cellular structure and is bounded by an impermeable skin.

Excerpt(s): The present invention is directed toward a disposable contraceptive cervical barrier and more particularly toward such a device which includes improved means for retaining a supply of a spermicide. The invention is also directed toward a method of making a disposable contraceptive cervical barrier and the use of novel materials for doing so. ... Contraceptive cervical barriers such as diaphragms, cervical caps and other pessaries have been known and used for many years as a method of birth control. Until

recently, such devices were intended to be used numerous times and, therefore, had to be made of relatively expensive elastomeric material. Furthermore, in order to make the rim of the barrier flexible yet have a spring tension effect, it was necessary to include a ring insert therein which added to the expense. ... While the cervical barrier by itself provides some protection since it constitutes a physical barrier to sperm, it is customary to utilize a spermicide cream or gel with such devices. This is normally done by applying a thin layer of the spermicide on one or both faces of the barrier and along the circumference of the rim portion. However, since the rim must be squeezed by the user in order to insert the cervical barrier, it is not uncommon for the spermicide to be wiped clean from a substantial part of the barrier when it is being inserted into place. Thus, the effectiveness of the device is reduced.

Web site: http://www.delphion.com/details?pn=US04630602__

- **Disposable female contraceptive**

Inventor(s): Rudel; Harry W. (Mexico, MX)

Assignee(s): Dia-Sert Corp. (White Plains, NY)

Patent Number: 4,300,544

Date filed: May 14, 1979

Abstract: Disclosed is a disposable contraceptive in which a first member engages the vaginal vault and a second member, secured to the first member, engages and closes the cervical opening. The first and second members are substantially discoid, with the second member smaller in discoid area than the first. The second member is a generally impermeable sponge-like material which is lubricated to aid in adhesion and closure of the cervix. The first member is generally resiliently closable so that the overall dimension of the contraceptive may be reduced in size for insertion into the vaginal vault. The first member is defined at least by opposed anterior and posterior portions which engage the respective anterior and posterior portions of the vaginal vault. The second member is coupled or joined to the first member at the posterior portion. In one embodiment, the second member is a sponge joined to a film. The film is held in position to define the first discoid member surface by a rim. In other embodiments, the first and second members are resiliently joined at the posterior portion so as to urge the second member into positive engagement with the cervix. Thus, a finite resilient nylon filament is bent into a figure 8 and covered with a soft, yieldable, foam plastic covering. By folding at the intersection of the upper and lower loops, the contraceptive is formed. In another example, a liner of resilient plastic in the shape of conjoined circles is covered by a soft, flexible, plastic envelope. In yet another example, an annular discontinuous rim is covered by a foam plastic. The rim has an integrally formed tongue extending therein and about, to which may be secured (by any well known means) a sponge-like impermeable plastic second member.

Excerpt(s): This invention relates to contraceptives and, more particularly, to a female contraceptive. ... The most common type of female contraceptive is the diaphragm. A diaphragm is a device usually made of thin, flexible material which is placed in the vaginal vault for blocking the entrance to the cervix in order to prevent impregnation during sexual intercourse. Generally, such diaphragms comprise a loose hanging pouch made of an elastomeric material such as rubber formed with an integral, heavy, resilient rim intended to engage the walls of the vaginal vault. In order to prevent the intrusion of spermatozoa or disease-carrying organisms into the cervix, a diaphragm is most usually used in combination with a spermicidal cream. The combination of the two--

diaphragm and the spermicidal cream--usually makes a cumbersome and inconvenient contraceptive. ... Over the years, a number of improvements in contraceptives have been suggested. Thus, for example, J. T. Clark, in U.S. Pat. Nos. 2,463,356; 2,540,932; and 2,638,896; as well as Ballard et al., in U.S. Pat. No. 2,529,363; Snell, in U.S. Pat. Nos. 2,538,478; and 3,117,573; Young, in U.S. Pat. No. 2,625,154; Kunas, Jr., in U.S. Pat. No. 2,823,669; Milgrom et al., in U.S. Pat. No. 3,036,570; Lay, in U.S. Pat. No. 2,249,316; and Duncan, in U.S. Pat. No. 3,545,439 all suggest spring-loaded diaphragm rims for resiliently collapsing the diaphragm for ease of insertion and the subsequent firm engagement of the walls of the vaginal vault.

Web site: http://www.delphion.com/details?pn=US04300544__

- **Female contraceptive**

Inventor(s): Gabbay; Shlomo (Hartsdale, NY)

Assignee(s): Kedma, Incorporated (Hartsdale, NY)

Patent Number: 4,381,771

Date filed: December 21, 1981

Abstract: A female contraceptive, cervical cover, including a dome-like main portion which is shaped to cover the cervix, long extending lips which form a one-way valve to permit waste material to flow out of the cervix and an outwardly biased collar which holds the cover securely to the walls of the vagina surrounding the cervix, without exerting any substantial pressure on the cervix.

Excerpt(s): There have been many attempts at producing a female contraceptive that can remain in place for long periods of time without the need for removal. ... The five basic types of female contraceptives now on the market are the diaphragm, the contraceptive pill, containing estrogen or progesterone, contraceptive foaming agents, cervical caps and intra-uterine devices or I.U.D.'s. Diaphragms are reliable but must be continually removed each day; contraceptive pills reportedly have various undesirable side effects, including reports of carcinogenic damage to gall bladder and liver; foams fail to foam in many women and in any case are only reliable for one day at the most; I.U.D.'s are reliable but their reported side effects including excessive bleeding, possible sterility and other effects have lessened their desirability. Cervical caps are effective but must be removed every month for menstruation to take place. Moreover, many females have deformed cervixes and cervical caps simply will not fit over such cervixes. ... The desire then has been to develop a contraceptive which could be left in place for a long period of time, two months to two years or more without any undesirable effects.

Web site: http://www.delphion.com/details?pn=US04381771__

- **Female contraceptive device**

Inventor(s): Feng; Du Xiong (12705 Roark Ct., Herndon, VA 20191)

Assignee(s): none reported

Patent Number: 6,170,484

Date filed: March 10, 2000

Abstract: An approach for providing a female contraceptive device is disclosed. The contraceptive device has an upper portion that contacts the cervix and an outer wall. A

lower portion of the contraceptive device has corrugated inner walls that form a hollow petal-shaped sections with the outer wall. Each of the petal-shaped sections has a curled edge and is capable of storing semen. The inner wall of the lower portion forms a cavity that receives the penis. The outer wall of the lower portion has surface protrusions that creates a barrier to the flow of semen, yet permits the flow of vaginal secretion. The contraceptive device occupies the upper portion of the vaginal canal, leaving the lower portion of the canal exposed to enhance sensitivity. The bulbous shape of the contraceptive device provides additional sensual stimulation for the female, while the corrugated inner walls enhance simulation for the male.

Excerpt(s): The present invention relates to reproductive health, and is more particularly related to a female contraceptive device. ... Because modern society faces the challenge of controlling the spread of sexually transmitted disease and over-population, development of effective contraceptive measures are vital to addressing these issues. Accordingly, numerous approaches have emerged: the pill, male condom, and various female contraceptive devices (e.g., IUDs (intrauterine devices), diaphragms, and female condoms). ... The traditional pill provides a relatively high level of prevention against pregnancy. However, a number of drawbacks attend such a solution. Most significantly, the pill can produce unwanted side effects, such as hormonal disturbance and migraine headaches. Also, the pill does not assist with the prevention of sexually transmitted diseases. Further, administration of the pill requires the assistance of a physician and, therefore, lacks convenience.

Web site: http://www.delphion.com/details?pn=US06170484__

- **Genes encoding porcine zona pellucida protein PZP-4, expression thereof and contraceptive vaccines comprising expressed (poly) peptides**

Inventor(s): Isojima; Shinzo (9-12 Kendani-cho, Nishinomiya-shi, Hyogo-ken, JP), Akatani; Akiko (Nishiyinomiya, JP), Okazaki; Yuichi (Chiba, JP), Sugimoto; Masanobu (Shiki, JP)

Assignee(s): Isojima; Shinzo (Nishinomiya, JP), Tonen Corporation (Chiyoda, JP)

Patent Number: 5,348,866

Date filed: March 20, 1992

Abstract: This invention relates to a DNA sequence comprising at least part of a porcine zona pellucida PZP-4.alpha. or -4.beta. gene coding for an amino acid sequence represented by SEQ ID NO: 1 or SEQ ID NO: 2, respectively, in SEQUENCE LISTING. This invention also relates to an expression system and to expression of said DNA. In addition, this invention relates to an immunogenic recombinant polypeptide or peptide which comprises at least part of said amino acid sequence and which is obtained by expressing said DNA, and to a contraceptive vaccine for use in human or other animals which comprises said polypeptide or peptide as an active ingredient.

Excerpt(s): This invention relates to a gene encoding a proteinous component PZP-4 of porcine zona pellucida, and to a contraceptive vaccine antigen prepared by expressing the gene, for use in human or other animals. ... Unlike the general sterilization such as Pill, IUD, condom, rhythm method, operative sterilization, etc., the sterilization by inoculation of vaccines belongs to an immunological one. It has been suggested that zona pellucida can be used as an antigen for the contraceptive vaccine. When the zona pellucida is therefore inoculated as a vaccine antigen into human or other animals, a specific antibody to the antigen is formed in their bodies, by which fertilization or ovum

growth is inhibited to result in contraception. ... Among zona pellucidae from various sources, porcine zona pellucida has been mainly studied as a source of such a vaccine antigen. Development of the contraceptive vaccines has been attempted using the whole porcine zona pellucida (PZP-1 of a molecular weight 80 to 90 kDa, PZP-2 of 60 to 65 kDa, PZP-3 of 55 kDa, and PZP-4 of 20 to 25 kDa (Wassarman P. M., "Zona Pellucida Glycoproteins", *Ann. Rev. Biochem.*, 1988, Vol.57, pp.415-420)), or using only the PZP-3 component (Sacco A. G., "Zona Pellucida: Current Status as a Candidate Antigen for Contraceptive Vaccine Development", *American Journal of Reproductive Immunology and Microbiology*, 1987, Vol.15, pp.122-130).

Web site: http://www.delphion.com/details?pn=US05348866__

- **Graduated estrogen contraceptive**

Inventor(s): Boissonneault; Roger M. (Long Valley, NJ)

Assignee(s): Warner-Lambert Company (Morris Plains, NJ)

Patent Number: 5,010,070

Date filed: May 22, 1990

Abstract: Contraceptive methods and delivery systems involving few undesirable side effects during administration are based on novel triphasic estrogen/progestogen combinations, wherein the amount of estrogen is increased stepwise over the three phases.

Excerpt(s): The study of the prevention of pregnancy in human females has led to the evolution of many hormone-based compositions. Some compositions contain both estrogenic and progestogenic compounds. Such compositions, referred to herein as "estrogen/progestogen combinations", are highly effective in controlling ovulation and conception. ... It has long been recognized that the progestin component is primarily responsible for the efficacy of the combination oral contraceptive. When original researchers attempted to synthesize pure progesterone, estrogen was a common contaminant. It was at this point that researchers realized that small quantities of estrogen could significantly minimize the major unwanted side effect, breakthrough bleeding or spotting. Small amounts of estrogen helped stabilize the endometrium and allowed cyclic withdrawal bleeding, similar to the natural menstrual cycle. Initially, the doses of estrogen in combination oral contraceptives were quite high (150 mcg). To minimize estrogen's major negative side effect on blood clotting factors, the dose of estrogen was reduced over time (30-35 mcg). However, as estrogen doses decreased, the incidences of unwanted breakthrough bleeding or spotting have generally increased. Most recently a new family of oral contraceptives (multiphasics) have been introduced that mimic the natural rise of progesterone over the cycle in an attempt to solve this problem. The present invention relates to the discovery that the side effects of breakthrough bleeding or spotting can be minimized by (1) a gradual increase of the estrogenic component throughout the cycle, (2) an increase of the ratio of estrogen/progestin throughout the cycle, (3) administration of those combinations at appropriately-timed intervals. ... It has been discovered that the unwanted side effects generally associated with the administration of estrogen/progesterone contraceptive schemes can be minimized when the compositions used correspond to phases containing, in sequence, about 0.5-1.5 mg norethindrone acetate and about 10-50 mcg ethinyl estradiol for the first phase (Phase I); about 0.5-1.5 mg norethindrone acetate and about 10-50 mcg ethinyl estradiol in the second phase (Phase II); about 0.5-1.5 mg norethindrone acetate and about 10-50 mcg ethinyl estradiol in the third phase (Phase

III) and a suitable quantity of an iron supplement, e.g., ferrous fumarate, or other non-steroidal agent or placebo in an optional fourth, or inactive, phase (Phase IV). It is essential that the phases succeed each other in increasing order (i.e., I, II, III, IV).

Web site: http://www.delphion.com/details?pn=US05010070__

- **hCG-hLH receptor and hCG-hLH receptor-hCG complex as antigens, antibodies thereto and contraceptive vaccine**

Inventor(s): Saxena; Brij B. (Englewood, NJ), Rathnam; Premila (Englewood Cliffs, NJ), Singh; Mukul (New York, NY)

Assignee(s): Cornell Research Foundation, Inc. (Ithaca, NY)

Patent Number: 4,966,888

Date filed: September 23, 1986

Abstract: Purified hCG-hLH receptor, hCG-hLH receptor-hCG complex and combinations between their subunits as antigens, as well as antibodies thereto which are useful as a contraceptive vaccine.

Excerpt(s): The present invention relates to purified hCG-hLH receptor, hCG-hLH receptor-hCG complex and combinations between their subunits as antigens, as well as antibodies thereto which are useful as a contraceptive vaccine. ... In recent years significant effort has been expended toward developing an immunological approach to contraception. The basic approach has been to either provide an antibody (passive immunization), or to elicit an antibody response (active immunization), to a hormone critical to the establishment and/or maintenance of pregnancy. The production and effects of human chorionic gonadotropin (hCG) in pregnancy have singled out hCG as a prime candidate for studies in immunological contraception. hCG is not present in the normal, healthy female prior to fertilization, but is secreted by the developing blastocyst and can be detected in pregnant women as early as 6 to 7 days after fertilization. hCG, in turn, initially acts upon the corpus luteum, and later upon the placenta, in causing each of them to secrete progesterone. Progesterone, at a high level, acts upon the endometrium to aid in preparing it for implantation and to maintain it after implantation. Therefore, both hCG and progesterone are essential for pregnancy to proceed immediately following fertilization. However, a significant reduction of hCG level prevents sufficient hCG from interacting with the hCG receptors of the corpus luteum and the placenta for maintenance of the high level of progesterone required for pregnancy. Progesterone drops back to or remains at a level too low for support of the endometrium, in the absence of hCG. ... A number of researchers have attempted to develop contraceptive vaccines which immunologically block progesterone production. These vaccines provide or produce hCG antibodies to immunologically interact with circulating hCG determinants, thereby preventing the hCG determinants from reaching the hCG receptors of the corpus luteum and of the placenta.

Web site: http://www.delphion.com/details?pn=US04966888__

- **High energy coprecipitate of nonoxynol oligomer, PVP and iodine having contraceptive and potent anti-HIV properties**

Inventor(s): Digenis; George A. (Lexington, KY), Digenis; Alexander G. (Nashville, TN)

Assignee(s): University of Kentucky Research Foundation (Lexington, KY)

Patent Number: 5,380,523

Date filed: August 17, 1993

Abstract: A composition which is a contraceptive with potent anti-HIV activity. The composition is a high energy coprecipitate of nonoxynol-9 oligomers, polyvinylpyrrolidone (PVP) and iodine or PVP-I and shows a pronounced synergistic, anti-HIV effect between the compounds of the composition. A method of obtaining a contraceptive and anti-HIV environment in a female comprising administering to said female an effective amount of a high energy coprecipitate.

Excerpt(s): The present invention relates to a composition which is a contraceptive with potent anti-HIV activity. The composition is a high energy coprecipitate of nonoxynol oligomers, polyvinylpyrrolidone (PVP) and iodine and shows a pronounced synergistic effect between the compounds of the composition. ... Nonoxynol or nonylphenol(polyethoxy)ethanol is a nonionic surfactant used as the active ingredient in the majority of the commercially available spermicides. It inhibits the in vitro growth of venereal pathogens (see Benes, S. et al., (1985) *Antimicrob. Agent Chemother.* 27: 724-726; Kelly, J. P. et al., (1985), *Antimicrob. Agent Chemother* 27: 760-762; Austin, H., et al., (1984) *JAMA*, 251: 2822-2824; and Singh, B. et al., (1972) *Br. J. Vener. Dis.* 48: 57-64), including the herpes simplex viruses (see Asculai, S. S. et al., (1978) *Antimicrob. Agent Chemother.* 13: 686-690; Hicks, D. R., (1985) *Lancet*, 1422-1423; Friedman-Kein, (1986) *J. Am. Acad. Dermol.* 15: 989-994; Rapp, R. et al., (1985) *Antimicrob. Agent Chemother.* 28: 449-451; Voeller, B., (1986) *Lancet*, 1153; Malkovsky, M. et al., (1988) *Lancet*, 645; and Barbi, M. et al., (1987) *Boll. 1st. Sieroter. (Milan)* 66: 158-160). ... The above reaction does not yield a distinct compound but a mixture of oligomers with different molecular weights. The physical and chemical characteristics of these oligomers change as a function of the varying molecular weight. (See Liebert, M. A., (1983) *J. Am. Coll. Toxicol.* 2: 35-60). As the length of the EO chain increases, the oligomers increase in water solubility. Nonoxynol-9 oligomers 1 through 6 (n=1-6) are considered oil soluble compounds, whereas the oligomers with a longer EO chain are soluble in water and polar organic solvents (see Liebert, supra).

Web site: http://www.delphion.com/details?pn=US05380523__

- **Hormonal contraceptive**

Inventor(s): Hesch; Rolf-Dieter (Constance, DE)

Assignee(s): Wyeth Pharmaceuticals (St. Davids, PA)

Patent Number: 6,500,814

Date filed: June 5, 2000

Abstract: The present invention relates to a hormonal contraceptive product having two hormonal components, an estrogen and a gestagen, and a process for the combined, continuous administration of the product of the invention.

Excerpt(s): The present invention relates to a hormonal contraceptive product with two hormonal components, the use thereof and a hormonal contraception process. ... Since

hormonal contraceptives became available in the 1960's, a number of hormonal components have been investigated with regards to their suitability in the most varied administration diagrams. A fundamental subdivision into combination and sequential products is possible. ... For example, if the desired cycle time is 28 days, in the case of the known combination products administration takes place over 21 days in a constant or varying absolute and/or relative dosage of a combination of an estrogen product and a gestagen product, in which the estrogen product can e.g. be natural estrogen or synthetic ethinyl estradiol and the taking of the aforementioned 21 daily units is followed by a seven-day interval where there is a withdrawal bleeding simulating natural menstruation.

Web site: http://www.delphion.com/details?pn=US06500814__

- **Injectable contraceptive and method**

Inventor(s): Tribble; Ronald L. (Savannah, MO), Stagg; Charles M. (St. Joseph, MO)

Assignee(s): Philips Roxane, Inc. (St. Joseph, MO)

Patent Number: 4,122,166

Date filed: February 23, 1978

Abstract: An injectable contraceptive antiserum, a process of preparing said antiserum and the method of preventing conception in mammals by the use of said antiserum, is disclosed. An antigen which causes the production of antibodies directed against a hormone essential to the reproductive cycle of mammal is prepared by coupling such a hormone with a carrier to form a hormone-carrier conjugate. A mammal is injected with said conjugate, and the produced antiserum is recovered from blood obtained from said mammal. Conception in mammals is prevented by injection of such recovered antiserum during the proper period of the reproductive cycle of said mammal. Specifically described is the antiserum recovered from the blood of a mammal which has been injected with an antigen prepared by coupling a hormone, such as, estradiol-17 beta with a protein and its use to temporarily sterilize a female of the canine species.

Excerpt(s): This invention relates to a contraceptive antiserum, to a process of its preparation and to a method for the prevention of conception in female mammals by the properly timed use of such antiserum. ... Particularly, the invention relates to a contraceptive antiserum to an estrogen, which estrogen is essential to the reproductive cycle of a female mammal, and which antiserum has been produced by the immunological system of a member of the same species. ... Still more particularly, the invention comprises a contraceptive antiserum against the estrogen, estradiol-17 beta (E.sub.2), which antiserum is prepared by injecting the E.sub.2 -- protein conjugate into a mammal, either male or female, recovering from the blood of such mammal the antiserum produced by its immunological system, and using such recovered antiserum as a contraceptive for, or for the temporary sterilization of, a female mammal.

Web site: http://www.delphion.com/details?pn=US04122166__

- **Injectable contraceptive vaccine and method**

Inventor(s): Tribble; Ronald L. (Savannah, MO), Stagg; Charles M. (St. Joseph, MO)

Assignee(s): Philips Roxane, Inc. (St. Joseph, MO)

Patent Number: 4,123,519

Date filed: February 23, 1978

Abstract: An injectable contraceptive vaccine, a method of preparing said vaccine and the method of preventing conception in mammals by use of said vaccine, is disclosed. A vaccine which stimulates the production of antibodies directed against a hormone essential to the reproductive cycle of a mammal is prepared by coupling such a hormone to a carrier to form a hormone-carrier conjugate. Conception in mammals is prevented by injection of such vaccine during the proper period of the reproductive cycle of said mammal. Specifically described is the vaccine prepared by coupling a hormone, such as estradiol-17 beta, with a protein and its use to sterilize a female of the canine species.

Excerpt(s): This invention relates to a contraceptive vaccine, to a method of its preparation and to a process for the prevention of conception in female mammals by the use of such vaccine. ... Particularly, the invention relates to a contraceptive vaccine which stimulates the production of antibodies to an estrogen, which estrogen is essential to the reproductive cycle of a female mammal, and which antibodies have been produced by the immunological system of the female mammal. ... Still more particularly, the invention comprises a contraceptive vaccine which stimulates the production of antibodies against the estrogen, estradiol-17 beta (E.sub.2), when injected into a female mammal such that an antibody level of at least 70 PEA units per ml blood serum exist in such female at the time of expected estrus.

Web site: http://www.delphion.com/details?pn=US04123519__

- **Instrument and method for inserting an intrauterine contraceptive device**

Inventor(s): Holmes; Gordon W. (Mississauga, CA)

Assignee(s): Ortho Pharmaceutical Corporation (Raritan, NJ)

Patent Number: 4,143,656

Date filed: April 7, 1978

Abstract: An instrument for inserting an intrauterine contraceptive device of the kind having one or more outwardly extending arms or protrusions is described. The insertion instrument comprising an inserter tube and coating rod maintains the arm or arms of the device in an extended configuration during storage but quickly and facilely folds the arms of the device into a protective housing or sheath for insertion into the uterus and releases the device by a withdrawal of the protective housing. A uterine sound which may be employed with the insertion instrument is also described.

Excerpt(s): This invention relates to an instrument for inserting a sterile intrauterine contraceptive device into the uterine cavity; to a combination of contraceptive device and instrument for inserting same suitable for sterile packaging; and to methods for inserting contraceptive devices. ... Intrauterine contraceptive devices, hereinafter sometimes referred to as IUDs are employed by insertion into the uterus when prevention of conception is desired. The use of such devices is based on the knowledge that the presence of a foreign object in the uterus discourages conception. The devices

have been of various preformed configurations including a ring, a spiral, a bow, one which has a shape characteristic of a "7" and one which has a shape characteristic of a "T." The devices of various configurations are designed to occupy a significant portion of the space in the uterus and therefore are of effective dimensions which are larger than the cervical os through which they must pass. Thus, insertion of the IUD is carried out by use of an inserter which modifies the configuration of the IUD during insertion. It is contemplated that the IUD on release in the uterus assumes the original configuration. However, materials from which the devices are made generally have such properties that if any force is applied to the IUD for an extended time, the configuration assumed while the force has been applied is retained. When the IUD fails to assume its original configuration, its effectiveness is impaired. For this reason, it is undesirable to provide an insertion instrument in which the IUD is pre-positioned in an insertion configuration. Rather, the IUD is restrained into an insertion configuration for a brief few moments immediately prior to use thereby causing little or no distortion or impairment to the IUD. ... Illustrative of this is a practice employed with one of the frequently employed IUDs which is in the shape of a "T". One method for inserting it employs an insertion tube and a complementary plunger. The tube is of sufficient size and malleability for retaining the extended arms of the device in a folded position during insertion and is released from this position by interaction with the plunger. Thus, when it is desired to insert the IUD, the physician at that time fits the extended arms of the "T" into the upper end of the insertion tube with his fingers while attempting to maintain sterile conditions. He then inserts the loaded tube through the cervical os into the uterine cavity and after locating the tube in the desired position pulls downward on the tube to expel the IUD while he attempts to maintain the IUD in the correct position in the uterus by holding the inner plunger stationary. When the insertion tube is withdrawn the arms of the "T" then unfold in the uterus.

Web site: http://www.delphion.com/details?pn=US04143656__

- **Instrument for retrieval of retracted threads of intrauterine contraceptive devices**

Inventor(s): Akerlund; Mats (Lund, SE)

Assignee(s): AB Myometricon (SE)

Patent Number: 4,372,302

Date filed: April 6, 1981

Abstract: The invention concerns an instrument for retrieval of retracted threads of intrauterine contraceptive devices (IUD), the instrument being characterized by a relatively stiff handle part (1) connected to an archedly curved distal part (2), which has a rounded cross-section, is flexible, and, on its concave surface, is provided with a number of notches at relative distances along the curved distal part (3,4,5) these notches to be used for gripping the threads at the insertion and turning of the instrument within the uterus.

Excerpt(s): The present invention concerns an instrument for retrieval of retracted threads of intrauterine contraceptive devices. ... For the prevention of pregnancy a large proportion of fertile women today use intrauterine contraceptive devices (IUD), which are provided with threads hanging out through the cervix, so that the doctor or nurse at a check-up will be able to see that the IUD is still at its place. Many women regularly check themselves that the threads and, thus, the IUD is still in its right place after each menstruation. However, it happens quite frequently that the threads cannot be seen or felt at a check-up which could be due to loss of the IUD, perforation by it of the uterine

wall, or retraction of the threads into the uterine cavity. The latter could be the result of enlargement of the uterus due to pregnancy or myomas, but most frequently, retraction of threads occurs without an apparent cause. ... By sounding of the uterine cavity one can sometimes verify the presence of an IUD even if the threads are not visible. Another way to verify the correct positioning of an IUD is by x-ray or ultrasonic investigation. The drawbacks of these methods are that an X-ray investigation includes a certain, although small dose of ionizing radiation, and that an ultrasonic investigation is complicated and time-consuming. Furthermore, even if the IUD is found, the question remains how to extract it from the uterus. To leave the IUD with retracted threads would make most women unsure and worried, since they cannot check that the IUD is at place.

Web site: http://www.delphion.com/details?pn=US04372302__

- **Intra cervical contraceptive device**

Inventor(s): Shroff; Behzad D. (P.O. Box 448, Fremantle, Western Australia, AU)

Assignee(s): none reported

Patent Number: 4,146,024

Date filed: May 20, 1977

Abstract: An intracervical contraceptive device comprising a tubular member open at each end and adapted to be positioned in the cervical canal and having a valve member incorporated therein which allows body fluids to pass from the uterine cavity into the vagina but not in the reverse direction.

Excerpt(s): This invention relates to an intracervical contraceptive device. ... In one form the invention resides in an intracervical contraceptive device comprising a tubular member open at each end and adapted to be positioned in the cervical canal and having a valve member incorporated therein which allows body fluids to pass from the uterine cavity into the vagina but not in the reverse direction. ... Preferably the device is provided with a member which projects into the uterine cavity to prevent accidental dislodgement of the device.

Web site: http://www.delphion.com/details?pn=US04146024__

- **Intracervical contraceptive device**

Inventor(s): Nakamura; Robert M. (4633 Brown Deer Lane, Rolling Hills Estates, CA 90274), Davajan; Val (1512 Addison Road, Palos Verdes Estates, CA 90274)

Assignee(s): none reported

Patent Number: 4,004,582

Date filed: October 28, 1975

Abstract: An intracervical contraceptive device (ICD) is provided with an elongated, circular cylindrical stem having a hollow bore which allows the flow of fluids from the uterus. Two opposed long arms and two opposed short arms are formed at one end of the stem and extend into the uterine cavity to prevent inadvertent expulsion of the device. The long arms flair outwardly in the lateral plane of the uterine cavity while the short arms flair outwardly in a plane parallel to the anterior-posterior plane of the uterine cavity. A barrel-shaped sleeve surrounds the stem and initially conforms to the

contour of the walls of the cervical canal. The sleeve is composed of a biodegradable binder material impregnated with a pharmaceutical agent which prevents spermatozoa from performing their fertilization function when the pharmaceutical agent is released into fluids passing over the sleeve. Apertures are provided in the side wall of the stem so that the pharmaceutical agent will also be released into fluids passing through the stem bore.

Excerpt(s): This invention relates to contraceptive devices, and particularly to an intracervical contraceptive device (ICD) which allows the flow of fluids from the uterus while at the same time preventing spermatozoa from performing their fertilization function. ... In the field of contraceptive devices, orally administered hormonal "pills" have been found to cause numerous unpleasant secondary side effects, such as circulatory troubles, an increase in weight, dermatological disorders, nausea, and the like. Diaphragms are very inconvenient and have a substantial "failure" rate. Intrauterine devices (IUD) are subject to expulsion (or loss) from the uterus, host intolerance, penetration through uterine tissues, and the like. These IUD side effects naturally result from the IUD's principle of operation which is to irritate the muscle tissue lining the uterus. Furthermore, the IUD is not always effective since it acts at a point after the spermatozoa has had a chance to penetrate into the uterus. ... The ICD of this invention provides an apparatus to be inserted into the cervical canal which allows the free flow of fluids from the uterus while at the same time preventing spermatozoa from performing their fertilization function by disrupting spermatozoa transport or causing changes in the spermatozoa prior to entering the uterus. The ICD of this invention does not depend upon irritation for its effectiveness and thus avoids many of the undesirable secondary effects of the IUD. Furthermore, the ICD, once operatively positioned, need not be replaced for an extended period of time. In addition, the ICD of this invention is adapted to be constructed so that the operation of preventing spermatozoa from performing their fertilization function may be accomplished in a variety of ways consistent with the physiological and psychological characteristics of a variety of individuals.

Web site: http://www.delphion.com/details?pn=US04004582__

- **Intracervical cuff (ICC) for contraception and prevention of venereal disease and applicator therefor**

Inventor(s): Horne, Jr.; Herbert W. (Framingham, MA), Gresser; Joseph D. (Brookline, MA)

Assignee(s): Dynatech Corp. (Burlington, MA)

Patent Number: 4,246,896

Date filed: October 30, 1978

Abstract: A two-stage device for use within the canal of the cervix of the uterus for the dual and simultaneous purposes of venereal disease prevention and of contraception by prohibiting the migration of sperm through the cervical canal. The two-stage device will consist of (Part A) an insertable member which will be inserted into and be maintained within the cervical canal to which (Part B) a temporary member, effective for upward of a year, can be attached easily with a minimum of discomfort to the patient. [Either or both parts of this two-stage device (at present most probably the temporary part) can incorporate metals such as copper, silver, or others, or suitable compounds thereof, and also spermicidal and pathogenocidal agents, steroids or other drugs.] A unique feature of the invention is its placement within the cervical canal rather than in the fundus or

vagina. Part A of the device is designed for semipermanent placement within the cervical canal; its main structural function is to act as a support for Part B which is designed for facile and comfortable removal and replacement and which contains the active agents possibly but not necessarily contained within a slow release matrix. A second unique feature of the invention is the use of magnets to attach Part B to Part A.

Excerpt(s): The prior art involves two technologies: (1) incorporation of biologically active agents into solid or paste-like polymeric excipients for the purpose of sustaining delivery of those agents for periods longer than otherwise possible and (2) fabrication of various polymeric materials and metals into devices for insertion into the human uterine fundus and/or vagina for the prevention of pregnancy. ... Devices for the controlled and continuous delivery of an active agent from a polymer excipient are known to the prior art. One group of such devices are best termed reservoir devices, characterized by a reservoir of the drug surrounded by a wall. The drug may be present separately or may be contained within a carrier permeable to the drug and in which the drug has limited solubility. The wall of the device permits passage of the drug as by diffusion and it is this step which controls the rate of drug release to the environment. U.S. Pat. No. 3,977,404 describes one such device utilizing a wall permeable to external fluid and permeable to drug via microporous openings to the environment. Another reservoir device described in U.S. Pat. No. 3,967,519 utilizes a reservoir formed of a drug carrier permeable to the drug in which the drug has limited solubility. In this case also, the wall is less permeable to the drug than is the carrier and is the rate controlling barrier to release. All of these devices can be designated to release drug within a body orifice; the object of U.S. Pat. No. 3,977,404 can also be used under an eyelid. ... A number of devices all operating on the principle of drug diffusion through a wall or membrane permeable to the drug have been patented. Included are U.S. Pat. No. 3,961,628, which uses a nonbiodegradable polymer wall; U.S. Pat. No. 3,988,262, also of this type, may be used for anal or uterine drug delivery. U.S. Pat. No. 3,948,254 also claims a drug in a permeable carrier surrounded by an even less permeable wall. Permeability of the wall usually has been controlled by pore size or other openings in the wall but in U.S. Pat. No. 3,938,515, permeability is said to be controlled by addition of a small amount of polymeric material such as polyester (from a glycol and a dibasic acid), polyethylene glycol, etc.

Web site: http://www.delphion.com/details?pn=US04246896__

- **Intraurethral contraceptive device**

Inventor(s): McClenahan; R. William (450 Cola Ballena, Apt. G, Alameda, CA 94501)

Assignee(s): none reported

Patent Number: 5,603,335

Date filed: September 27, 1995

Abstract: A male inboard contraceptive device of the containment type including a urethral sealing member in the form of an oblong ring (1) designed to reside in a fossa navicularis (14) and engage an orificium externum (15) in a sealing relationship, it being of such outside diameter and thickness as to allow it to enter into the orifice in one axis and seal it in another: an attached flexible container bag (2) designed to reside alongside a penile shaft (12) during coitus: a tail (4) or other tensioning means attached to the bag, to regulate position of the device.

Excerpt(s): This invention relates to a contraceptive device, and more particularly to a contraceptive device for men. ... Over the years, several mechanical and oral products have been introduced for birth control, prophylactic condoms being one of them. However, today, condoms present the only means of protection--albeit, incomplete protection--against venereal disease a.k.a., sexually transmitted diseases (STDs) in risky (extramarital) sexual activity. Among those who engage in such sexual activity, many choose not to take this precaution. Reasons why this might be so could include cost, discomfort, dissatisfaction, unavailability. I believe dissatisfaction would predominate. It is widely known that wearing a "rubber" is regarded as obligatory, and not as a natural prelude to pleasure. Condoms introduce a barrier to intimate genital contact. ... U.S. Pat. No. 4,183,358 to Cohen (1980) discloses a contraceptive device that appears to solve the problem of loss of genital skin contact, but has some disturbing aspects. For example, a tube of undescribed rigidity is inserted somewhat far into a male member, after which a rigid cap covering the glans is threaded thereon. U.S. Pat. No. 2,291,191 to Scudder (1942) employs a lengthy and narrow passageway restricting fluid flow, and protrudes rigidly externally.

Web site: http://www.delphion.com/details?pn=US05603335__

- **Intrauterine contraceptive and method of manufacturing the same**

Inventor(s): Kaivola; Seppo (Linnanherrantie 3B, 00950 Helsinki 95, FI)

Assignee(s): none reported

Patent Number: 4,198,966

Date filed: August 2, 1978

Abstract: An intrauterine contraceptive device and method of manufacturing the same including a separately formed elongate body member including a lower body portion and an upper, reduced diameter body portion and a separately formed transversal member removably affixed to the upper end of the reduced diameter body portion. Prior to affixing the transversal member on the body member, a copper helical member is located over the reduced diameter body portion. A connecting member may be provided on the transversal member to facilitate connection thereof to the body member.

Excerpt(s): The intrauterine copper spiral or helical contraceptive devices presently in use are generally formed of a unitary plastic member comprising an elongated body portion and an integrally formed transversal portion formed at one of the body portion ends and projecting outwardly therefrom. In construction, such conventional spiral contraceptive devices are formed by winding copper wire around the entire body portion to form the spiral or helical component. ... Such conventional copper spiral contraceptive devices are not entirely satisfactory since it is necessary during manufacture to wind the spiral or helical component onto the body portion. This manufacturing operation comprises a separate and distinct step in the overall manufacturing process and is time consuming. ... Furthermore, in such conventional copper spiral intrauterine devices, the copper spiral is wound around the entire length of the body portion of the device despite the fact that the portion of the helix or spiral in the vicinity of the lower part of the body portion, i.e., that part of the body portion which is remote from the transversal portion, has little or no contraceptive effect. Despite the fact that such lack of contraceptive effect is known, prior art contraceptive devices of this type are formed with the copper helix or spiral along the entire body portion for reasons of ease in manufacture.

Web site: http://www.delphion.com/details?pn=US04198966__

- **Intrauterine contraceptive device**

Inventor(s): Kosonen; Ahti A. (Pori, SF)

Assignee(s): Outokumpu Oy (Helsinki, SF)

Patent Number: 3,937,217

Date filed: March 8, 1974

Abstract: An intrauterine contraceptive device, resembling the shape of T, deviating from that, however, by having in the end of a vertical arm a loop which is easy to compress for insertion and having in the upper end of the vertical arm two arms departing to opposite sides and jointed smoothly to the vertical arm so that the bending radius is relatively big, the angle between the horizontal and vertical arm being preferably smaller than 90.degree..

Excerpt(s): This invention relates to an improved intrauterine contraceptive device. The object of the invention is to obtain a device which has a lower expulsion rate and is less irritative than other IUDs. There is a known IUD having the shape of a T according to U.S. Pat. No. 3,533,406. Its horizontal arms are placed into the upper part of the endometrial cavity near the fundus and the distance of the ends of horizontal arms is 30-35 mm corresponding to the size of the portion of the uterus. The vertical arm is relatively thin having a length of 28- 36 mm. The purpose is that the device is completely placed into the endometrial cavity and the end of the vertical arm extends toward the cervical os when the crossbar of the T lies at the fundus of the uterus. ... Statistics have revealed that the rate of bleeding and pain by the T device as well as by Lippes Loop is relatively high approximately 10 per cent calculated on the basis of 100 used women months. This is caused mainly by the rigidity of the mentioned devices. During the contraction of the uterus the high pressure is directed against the horizontal arms and when these arms in the T device only slightly deviate from the horizontal line a rather high pressure is needed to change its shape. This causes the relatively pointed ends of the horizontal arms to penetrate to the mucous membrane and uterus wall. This is also admitted in the above-mentioned patent which says: "X-rays studies indicate that the ends of crossbar will become slightly imbedded in the endometrium". ... It is also evident that both the T and Lippes Loop are even in the vertical direction relatively rigid and cases have been found when the vertical arm of the T has penetrated into the uterus wall causing bleeding and pain.

Web site: http://www.delphion.com/details?pn=US03937217__

- **Intrauterine contraceptive device**

Inventor(s): Von Kesseru; Istvan (Lima, PE), Laudahn; Gerhard (Berlin, DT), Muhe; Barbara (Berlin, DT), Schopflin; Gisela (Berlin, DT)

Assignee(s): Schering Aktiengesellschaft (Berlin & Bergkamen, DT)

Patent Number: 4,034,749

Date filed: December 15, 1975

Abstract: A Y-shaped medicated contraceptive IUD for human use having a pair of elastomeric arms rounded at the ends thereof to facilitate insertion and removal, and a

base containing protrusions to aid in gripping of the device by the cervix muscles. The device is adaptable to virtually any size human uterus and shows fewer side effects and spontaneous expulsions than known IUD's.

Excerpt(s): This invention relates to a human intrauterine contraceptive device containing a contraceptionally active medicinal agent. ... Contraceptives containing a medicinal agent for intrauterine application (IUD's) make available safely effective contraceptives without ovulation inhibition by using smaller quantities of active medicinal agent than are required when administered by way of the gastrointestinal tract. The human organism is accordingly burdened only with a minimum of medicinal agent and thus treated more gently; subjective as well as objective side effects are greatly reduced in comparison with other birth control techniques. ... The use of IUD's widely differing with respect to material, configuration and effectiveness has been known for a long time. An early contraceptive means, to be used as an intrauterine device, was developed in 1920 by GRAEFENBERG with the utilization of a wire copper-silver alloy. The activity mechanism of presently known IUD contraceptive devices, however, has not yet been extensively clarified or fully understood.

Web site: http://www.delphion.com/details?pn=US04034749__

- **Intrauterine contraceptive device**

Inventor(s): Kessel; Elton (Chapel Hill, NC)

Assignee(s): International Pregnancy Advisory Services (Chapel Hill, NC)

Patent Number: 4,054,131

Date filed: August 10, 1976

Abstract: An integral intrauterine contraceptive device comprises a relatively thick elongated stem, a downwardly bowed crossbar secured to the top of the stem, and a pair of downwardly and inwardly extending arms formed as continuations of the crossbar. The crossbar and arm construction is designed for atraumatic embedding in the endometrium to reduce expulsion caused by uterine contractions.

Excerpt(s): This invention relates to contraceptive devices and particularly to intrauterine contraceptive devices. ... U.S. Pat. No. 3,533,406 discloses an intrauterine contraceptive device having a "T" shape. The device is completely placed into the endometrial cavity where the end of the stem extends toward the cervical os when the crossbar of the "T" lies at the fundus of the uterus. The contraceptive efficacy of the "T" device has proven unacceptable for many families. As a result, the "T" device has been used in many applications as a carrier for contraceptive chemicals such as copper. It is believed that the relatively small cross section of the stem of the "T" device prevents it from having the desired contraceptive effect. The so-called "7" shaped devices have produced effects nearly identical to the "T" devices. Both the "T" and "7" devices are lightweight and embed somewhat in the endometrial tissue. Expulsion rates and bleeding are modest, primarily because of the form and size of the devices. ... U.S. Pat. No. 3,881,475 discloses an intrauterine contraceptive device having a pair of loops extending in opposite directions from a common stem. Each loop has a free end. This design has attempted to provide a device wherein the loops are capable of more readily conforming to the walls of the uterine cavity and are soft enough to move with the uterine walls as they move or contract. Higher expulsion rates and removal rates are reported with use of the device.

Web site: http://www.delphion.com/details?pn=US04054131__

- **Intrauterine contraceptive device**

Inventor(s): Hasson; Harrith M. (345 Fullerton Pkway., Chicago, IL 60614)

Assignee(s): none reported

Patent Number: 4,117,838

Date filed: March 14, 1977

Abstract: An intrauterine contraceptive device (IUD) is provided for placement in the frontal plane of the upper uterine segment. The IUD comprises a member formed of flexible material and having a central portion, with a pair of upper arms extending outwardly and around from the central portion to form non-spiral loops in which the distal end of each of the arms does not return toward and overlap the central portion. This construction prevents the formation of a spiral under normal compression which may cause the distal ends to extend out of the main plane of the member. This construction also allows the IUD to be retained in a stable state in the frontal plane, adapts the IUD to uterine shape variations and contains a compliance property that combines transverse bend resilience with axial stiffness.

Excerpt(s): This invention relates to an improved intrauterine contraceptive device (IUD). ... The utility of IUD's in birth control has been established. IUD performance, however, depends on many factors, including uterine dimensions and functions. For example, a large number of uterine shape variations can exist in the presence of a uniform endometrical length. Under such circumstances, it is impossible to insert IUD's with fixed transverse diameters into endometrical cavities of unknown shapes without the occasional occurrence of a disproportion between the IUD and the cavity. Thus it is desirable that the transverse diameters of the IUD be variable in response to variations in uterine shape, in order to preserve the structural integrity of the device and the uterine cavity. ... While the uterus can easily accommodate a device of reasonable size that is placed in the frontal (horizontal) plane of its endometrial cavity, it cannot tolerate a device placed in an oblique or sagittal plane of the cavity. Such misplaced devices compress the endometrium and the myometrium excessively, leading to distortion of the device and the cavity, and increase the probability of associated bleeding and pain. Therefore, consistent placement of the IUD in the horizontal plane of the endometrial cavity is a requirement of correct insertion technique.

Web site: http://www.delphion.com/details?pn=US04117838__

- **Intrauterine contraceptive device**

Inventor(s): Pope; Maurice R. (87 Sander Rd., New Germany, Natal, 3600, ZA)

Assignee(s): none reported

Patent Number: 4,146,023

Date filed: September 28, 1977

Abstract: An intrauterine contraceptive device of the type comprising the figure 7, the invention comprising the provision of a downwardly-extending element to the end of horizontal portion of the 7, the downwardly-extending element having a thread anchored thereto, the thread passing slidably through an orifice at the bottom end of the vertical portion of the 7.

Excerpt(s): This invention relates to intrauterine contraceptive devices, and in particular to a device of the type marketed as GRAVIGARD (registered trade mark of G. D. Searle & Company). ... Withdrawal is accomplished by drawing the thread. The horizontal portion of the 7 is bent upwardly to a degree limited by the strength of the bulb at the angle and the device is then drawn through the cervical canal. As this canal is of the order of 4 mm the withdrawal causes pain and discomfort. Another disadvantage of this type of device is that the necessary rigidity of the plastic used results in a resistance of the device towards uterine contractions and there is a tendency for the open end of the horizontal portion to perforate the uterine wall and for the device to migrate out of the uterus. ... In a preferred form of the invention the downwardly-extending element is of the order of one centimeter in length and is at an angle to the horizontal portion of the 7 so that it follows the contour of the wall of the uterus.

Web site: http://www.delphion.com/details?pn=US04146023__

- **Intrauterine contraceptive device**

Inventor(s): Zimmerman; Clota E. (9 de Julio 532-A, Cordoba, AR)

Assignee(s): none reported

Patent Number: 4,326,511

Date filed: October 5, 1979

Abstract: Disclosed is an intrauterine device contraceptive to avoid pregnancy. The device comprises a vector and contraceptive, said vector consisting of a vertical stem having two horizontal arms, the arm at the end of said vertical stem being longer than the second arm, said vertical stem being twisted by a copper wire having a surface area of above 200 square millimeters. The vertical stem is made from a plastic material, generally polyethylene. The present intrauterine device contraceptive has the advantage of a complete reduction of the expulsion in view of its new particular shape.

Excerpt(s): The present invention relates to an intrauterine device to avoid pregnancy. More particularly the invention relates to an intrauterine device contraceptive (hereinafter referred to as IUD). ... Already in 1959 it was suggested to utilize IUD made of inert materials as contraceptive and the expected results were indeed obtained. Today the IUD is considered to be an ideal contraceptive. Although it requires a clinical procedure for its fixation, it rarely causes systemic hazards, and provides long-term protection against pregnancy. The known IUD which was rigorously tested and is being described in the prior art, consists normally from a plastic device having the shape of the letter T. Later on in 1969 Zipper et al. (Amer. Journal of Obstetrics and Gynecology, 105, 529-34, 1969) demonstrated the antifertility effect of copper ions. Extensive thorough explorations were subsequently done on twisting copper wire on the T device. The wire should be very thin in order to enable a large surface area, since copper ions are continuously released within the uterus. The mechanism to explain the copper influence is not yet fully elucidated. Apparently the contraceptive action of the copper is due to the release of the copper ions into the uterine cavity where they influence various biochemical reactions. Most likely, the copper ions influence the cationic antagonism specifically related to zinc. One of the most important zinc-containing enzymes in the female reproductive tract is carbonic anhydrase. Copper may compete with zinc and inhibit the carbonic anhydrase reaction, thus resisting implantation. It could certainly be stated that the copper wire changes the pH in the zone of the female reproductive tract from alkaline to acid, thus paralyzing the spermatozoon and avoiding pregnancy. In order to increase the useful life of such IUD, attempts have been made to increase the

copper content of the device by its impregnation with metallic copper or copper salts such as copper carbonate or copper sulfate. However these attempts have not been successful because the copper is not released from the impregnated plastic device and therefore no effect was actually obtained. ... One of the main disadvantages of the T-shaped intrauterine device is its repulsion from the uterus. Tests have been carried out looking for a better shape, without this disadvantage. Today there are indeed available on the market various copper IUD shapes, but in particular the 7-shape (patented and manufactured by G. D. Searle & Co.) and the Lippes loop IUD are most encountered. Although statistic data show that the new shapes may have a trend of better results than the T-shape device, it appears that there is a long felt need for an improved shape which could solve completely the repulsion problem. It is an object of the present invention to provide a new copper intrauterine contraceptive device which is completely free of expulsion. It is another object of the present invention to provide a new copper intrauterine contraceptive device which can be utilized for longer periods of time than the known copper IUD. Thus the invention consists of an intrauterine contraceptive device comprising a vector and contraceptive, said vector consisting of a vertical stem having two horizontal arms, the arm at end of said stem being longer than the second arm, said vertical stem being twisted by a copper wire having a surface area of above 200 square mm. It was found that the new copper IUD according to the present invention, reduces substantially to zero any incident due to its utilization. In particular, the new contraceptive device suppresses completely its expulsion, a fact which contributes to the prolonged safe use. The vector can be made from any plastic material, usually polyethylene or other flexible plastic materials to which a reagent is added to make it radio-opaque.

Web site: http://www.delphion.com/details?pn=US04326511__

- **Intrauterine contraceptive device**

Inventor(s): Chiozza; Enrico (Rome, IT)

Assignee(s): Uniderm Farmaceutici s.n.c. (Rome, IT)

Patent Number: 4,553,536

Date filed: February 24, 1983

Abstract: An intrauterine contraceptive device comprising two curved arms, lying on offset planes, having one end integral to a sleeve and the other end free, and a post, engaged in a not removable way with the sleeve, made of plastic material incorporating micronized copper powder. The particular configuration of the device hinders the ejection of the device due to womb shrinking forces (FIG. 1).

Excerpt(s): The present invention relates to a device, usually called "spiral" or "IUD", which can be introduced into a woman's womb to prevent fecundation. ... At present, various devices of the above mentioned kind are well known, which, however, have some drawbacks in practical use. ... In fact, they may tend to be ejected owing to womb contractions, may not be absolutely safe as contraceptives, are difficult to be inserted and extracted and have a comparatively short effective life.

Web site: http://www.delphion.com/details?pn=US04553536__

- **Intrauterine contraceptive device**

Inventor(s): Gainutdinova; Raisa V. (Kazan, SU), Petrova; Vera M. (Kazan, SU), Blokhina; Alevtina I. (Kazan, SU), Fridman; Boris S. (Kazan, SU), Gamer; Pinkhos U. (Kazan, SU)

Assignee(s): Nauchno-Proizvodstvennoe Obiedinenie "Medinstrument" (Kazan, SU)

Patent Number: 4,841,991

Date filed: September 1, 1987

Abstract: An intrauterine contraceptive device, comprising a strip with rounded-off ends, a rod connected to the strip to form a T-shaped element therewith, a fixing element for retaining the entire device in the uterine cavity, made as an elastic loop, and a coil fitted over the rod, the elastic loop of the fixing element having an arc-shaped base and two elastic arms connected to the base and secured to the strip at the base of the rod, which elastic loop is coplanar with the rod and strip and encompasses the rod.

Excerpt(s): This invention relates generally to contraceptive devices and more specifically, to intrauterine devices (IUD). ... The invention is applicable in gynecological practice for prevention of an undesirable pregnancy in women with diversely sized and shaped uterine cavity, as well as a prevention measure aimed at birth control and family planning. ... One state-of-the-art intrauterine device (cf. GB, B, No. 1,456,46) is known to be made as a T-shaped element, comprising a rod and two elastic arms branching off radially therefrom, and an elastic loop provided at its end. The arms are equally curved, the radius of curvature of each arm being adequately large, while the angle between the rod and each of the arms is less than 90 degrees.

Web site: http://www.delphion.com/details?pn=US04841991__

- **Intrauterine contraceptive device**

Inventor(s): Van Os; Willem A. A. (L'Esperanza, 17, Rue Bosio, 98000, MC)

Assignee(s): none reported

Patent Number: 5,494,047

Date filed: March 6, 1995

Abstract: The invention relates to an intrauterine contraceptive device having at least two flexible arms. The contraceptive device is provided with at least two almost horizontal arms having solid tips. The arms, are provided at the front and back with cavities in longitudinal direction. The central point of the contraceptive device is provided with a flexible thread, surrounded by a device acting as contraceptive. The active device may consist of copper rings, which rings are retained by a holding means located below the thread. Next to copper rings a flexible tube provided with openings may be used, into which an active contraceptive drug, for instance a hormone preparation, is inserted. An important advantage of the contraceptive device according to the invention is the absence of the vertical stem of the IUD. The arms and the central point of the contraceptive device are made from a flexible synthetic material which is tolerated by the uterus, preferably from polyethylene. The thread is also usually made from a synthetic tolerated by the uterus, preferably from nylon.

Excerpt(s): The invention relates to an intrauterine contraceptive device comprising at least two flexible arms, extending from a central point. ... A great variety of mechanical methods of fertility control and of the prevention of pregnancy is known. It has been

known for decades that a foreign object in the virtual cavum uteri is able to prevent conception. ... Departing from the basic idea, a large number of different intrauterine contraceptive devices, also called IUDs, have been suggested and applied in practice.

Web site: http://www.delphion.com/details?pn=US05494047__

- **Intrauterine contraceptive device**

Inventor(s): Cimber; Hugo (Bernstrasse 34, Ch-3072 Ostermundigen, CH)

Assignee(s): none reported

Patent Number: 5,555,896

Date filed: September 22, 1995

Abstract: The intrauterine contraceptive device to be inserted in the uterus comprises a supporting stem (1) having two branches (4) disposed at the front end (3) thereof in the direction of insertion. Each of the branches bears at its free end a permanent closure member (7). The closure members are intended to seal the mouths of the Fallopian tubes into the uterus. Each closure member is made of a soft material and has a substantially spherical or tear-shaped form. Fixed to these closure members is a temporary holding and positioning rod (9) of flexible, resorbable material, e.g., of collagen or polyglycolic acid, in such a way that this holding and positioning rod, together with the supporting stem (1), forms the shape of a T, the positioning ends (10) of the holding and positioning rod (9) being farther apart than the permanent closure members (7). The intrauterine contraceptive device is suitable for use immediately after a pregnancy. Insertion in the uterus is easily possible at that time through the still open uterine orifice without the diameter of the insertion means having to be kept minimal. Moreover, the temporary holding and positioning rod takes over the function of a sealing means for the mouths of the Fallopian tubes. It also retains this function during its biodegradation, during the interval when the uterus, still stretched after the pregnancy, undergoes involution within a period of six weeks. Thereafter, the permanent closure members (7) take over the sealing function.

Excerpt(s): The present invention relates to an intrauterine contraceptive device, suitable for being used immediately after a pregnancy. ... Intrauterine contraceptive devices are known in which two branches capable of spreading apart are expelled from a small tube, the branches bearing closure means at their ends. Thus, for example, an intrauterine contraceptive device is known from FR-A-2,085,578 which is inserted into the uterus by means of a small tube, a supporting stem being provided with two branches hinged to its front end in the direction of insertion, in such a way that the branches spread laterally apart after their expulsion from the tube. At their free ends, the branches each bear a spherical closure member, which closure members are intended and suitable for closing off the mouths of the Fallopian tubes into the uterus. The branches are of approximately equal length so that the two closure members come to lie next to one another upon retraction of the intrauterine device into the tube, and the tube must thus have a comparatively large diameter. According to EP-A-0,208,653, the aim in intrauterine contraceptive devices is to keep the diameter of the tube as small as possible since, as is well known, the smaller the tube diameter is, the easier and more agreeable is the insertion of such tubes. This diameter, in turn, is substantially dependent upon the mutual position in which the closure members at the ends of the mentioned branches can be pulled into the tube. Contrary to the first-mentioned French document, it is provided in the second-mentioned text that one of the branches is provided with at least one predetermined buckling location so that with the branches

pulled into the tube, the spherical closure members come to lie one behind the other as viewed in the direction of retraction and not next to one another. Until now, in the case of women who had just undergone parturition, it has been necessary to delay the insertion of an intrauterine contraceptive device for about six weeks so that the uterus could revert to its original size because otherwise the intrauterine device would in all probability be ejected again. Thus there is a need for an intrauterine device, the insertion of which can be carried out immediately after parturition. This has not been possible with the previously known intrauterine devices since the distance between the closure members of the prior art intrauterine devices corresponds to the distance between the mouths of the Fallopian tubes in the post-involutorial state. Immediately after parturition, the uterus is about 12 cm wide and 17 cm long; the uterine orifice then has a diameter of from 3 to 4 cm. In the post-involutorial state, about six weeks after parturition, the uterus is about 4 cm wide and 7 cm long, and the uterine orifice is from 3-4 mm. Thus, immediately after parturition the prerequisites for insertion of an intrauterine device would be very favourable owing to the open cervical os since insertion can take place during a concluding examination of the woman prior to her release from the hospital. For this purpose, the intrauterine device must be designed in such a way that it can also perform its task during the six weeks of involution of the uterus, i.e., it must remain in the correct position after insertion, and at the same time the closure members must carry out their sealing function. Until now, no such intrauterine devices have been available. ... It is thus the object of the present invention to provide an intrauterine contraceptive device which is so designed that in comparison with the prior art, it can be inserted immediately after a pregnancy, a positioning and holding means being adapted to the lessening dimensions simultaneously with the involution of the uterus.

Web site: http://www.delphion.com/details?pn=US05555896__

- **Intrauterine contraceptive device**

Inventor(s): Kessel; Elton (520 Morgan Creek Rd., Chapel Hill, NC 27514)

Assignee(s): none reported

Patent Number: RE30,312

Date filed: September 5, 1978

Abstract: An integral intrauterine contraceptive device comprises a relatively thick elongated stem, a downwardly bowed crossbar secured to the top of the stem, and a pair of downwardly and inwardly extending arms formed as continuations of the crossbar. The crossbar and arm construction is designed for atraumatic embedding in the endometrium to reduce expulsion caused by uterine contractions.

Excerpt(s): This invention relates to contraceptive devices and particularly to intrauterine contraceptive devices. ... U.S. Pat. No. 3,533,406 discloses an intrauterine contraceptive device having a "T" shape. The device is completely placed into the endometrial cavity where the end of the stem extends toward the cervical os when the cross bar of the "T" lies at the fundus of the uterus. The contraceptive efficacy of the "T" device has proven unacceptable for many families. As a result, the "T" device has been used in many applications as a carrier for contraceptive chemicals such as copper. It is believed that the relatively small cross section of the stem of the "T" device prevents it from having the desired contraceptive effect. The so-called "7" shaped devices have produced effects nearly identical to the "T" devices. Both the "T" and "7" devices are lightweight and embed somewhat in the endometrial tissue. Expulsion rates and

bleeding are modest, primarily because of the form and size of the devices. ... U.S. Pat. No. 3,881,475 discloses an intrauterine contraceptive device having a pair of loops extending in opposite directions from a common stem. Each loop has a free end. This design has attempted to provide a device wherein the loops are capable of more readily conforming to the walls of the uterine cavity and are soft enough to move with the uterine walls as they move or contract. Higher expulsion rates and removal rates are reported with use of the device.

Web site: http://www.delphion.com/details?pn=US0RE30312__

- **Intra-uterine contraceptive device**

Inventor(s): Csatory; Laszlo Kalman (1913 Windsor Road, Alexandria, VA 22307), Pongracz; Frank Istvan (10833 Margate Road, Silver Spring, MD 20901)

Assignee(s): none reported

Patent Number: 3,996,932

Date filed: May 15, 1975

Abstract: An intra-uterine contraceptive device of the inflatable type provided with a plurality of protrusions for providing an unimpeded passage of the menstrual flow, such protrusions in one embodiment are wave-like configurations and in other embodiments they are arm-like extensions for providing also a plurality of contact regions with the inner wall of the uterus.

Excerpt(s): The present invention relates generally to intra-uterine contraceptive devices, known as I.U.D., and more particularly it relates to inflatable I.U.D. having improved shape and insertion possibilities. ... I.U.D.'s used for the purpose of contraception are old in art, having been popularized by the development of Dr. Ernst Grafenberg's silver ring. Since that time, almost 40 years ago, there have been many improvements in both the configuration and the material of the device as well as the efficiency and the public acceptance of the device. The configuration of the I.U.D.'s most frequently used today may be categorized generally as coils, loops, rings and bows, the best known examples being those devices developed by Margulies, Lippes, Ota and Birnberg, respectively. ... It has long been recognized that even though I.U.D.'s are safe, reliable and efficient, there are still several very important structural aspects that can be improved. For example, the I.U.D. must be capable of insertion using a thin-walled cannula and a push rod without the need for dilation of the cervix, such as described in U.S. Pat. No. 3,628,530 issued on Dec. 21, 1971 to Jerome Schwartz.

Web site: http://www.delphion.com/details?pn=US03996932__

- **Intrauterine contraceptive device and device for its insertion and fixation to the uterus**

Inventor(s): Wildemeersch; Dirk A. A. (Vossenhul 8, B-8300 Knokke-Heist, BE)

Assignee(s): none reported

Patent Number: 4,708,134

Date filed: January 9, 1986

Abstract: The invention relates to a new and improved intrauterine contraceptive device (IUD), which includes a fixing device to the fundal part of the uterine cavity, attached to

members made in a material active into the uterine cavity, said members being attached the one behind the others, in a non-rigid assembly. The members are hollow members, open at both end and arranged in a sequence to form a longitudinal passage allowing passing through of a needle, and the fixing device to the fundal part of the uterine cavity is a thread affixed to the assembly of hollow members, provided with a retaining device in the uterine tissue, adapted for insertion by means of a needle. The invention relates also to a device for the insertion and the fixation of such an IUD to the uterine wall which comprises a needle for inserting the retaining device interlocked to the thread in the uterine tissue, a member for protecting the needle and receiving the IUD, and an actuating member for the needle, movable in relation the protecting member. The needle passes through the passage of the IUD to engage the retaining device in the uterine tissue, and the internal cross section of the member for protecting the needle and receiving the IUD corresponds substantially with the outer cross section of the hollow members of the IUD.

Excerpt(s): The present invention relates to a new and improved intrauterine contraceptive device (IUD), remarkably well tolerated by the uterus and which is also very efficient due to its large effective copper surface area. Moreover, the special design of the IUD makes insertion thereof into the uterus easy, even for women who have never been pregnant, by means of an inserting device of very small diameter. ... Most of the IUDs of the art are made of a plastic frame with a particular geometrical shape allowing its retention in the uterus, on which are brought copper wire or copper sleeves. The geometrical, generally T or Y type, shape of these frames, has been so designed as to allow adaptation thereof to the internal shape of the triangular uterine cavity. However, the diversity in size of the uterine cavities makes necessary an adaptation in size of the IUD to the size of the uterine cavity. Moreover, during uterine contractions, translocations of the IUD are always possible. Finally, it must be pointed out that the relative rigidity of such IUD often sets up tolerance problems, said rigidity frequently causing pain and bleeding problems, and even possibly hard damages to the uterus (perforation of the wall). ... The contraceptive effectiveness of these IUDs depends largely on the surface area of copper and also on the correct position of the copper load in the uterus. In such IUD, it is generally admitted that about 60% of the copper area on the loop is effective, the remaining 40% being in contact with the frame, and having thus no contraceptive action. Moreover, when the IUD is out of its normal position the effect of the copper on the internal wall is uneven.

Web site: http://www.delphion.com/details?pn=US04708134__

- **Intrauterine contraceptive device of C or omega form with tubular inserter and method of placement**

Inventor(s): Emmett; Lionel C. R. (7C Denmark Rd., Kingston-upon Thames, Surrey, GB2)

Assignee(s): Emmett; Lionel C. R. (Kingston-upon Thames, GB2)

Patent Number: 4,111,196

Date filed: February 23, 1976

Abstract: An intrauterine contraceptive device made from plastic having a C-shape or Omega-shape to enable it to lie in the uterine cavity. Lines of predetermined length are attached at one of their ends respectively to enlargement portions of the terminal ends of the device and with their other ends fastened by a plastic bead and aid in insertion, removal and as a telltale marker. The device can include a metallic contraceptive

material such as copper. One embodiment uses copper wire, which can be of selected different diameter, wound on the body of the device and retained against slippage by serrations on the body. A tubular inserter with appropriate grips and a cervical abutment flange is used to receive the IUD in elongated deformation. The device is slipped through the tubular inserter by a plunger and as the IUD emerges from the upper end of the tube, strain on one of the lines caused by abutment of the bead on the lower end of the tube positively bows and pulls the emerging IUD into a substantially circular configuration within the plane of the fundal cavity, the inserter having been appropriately oriented during the preliminary insertion steps.

Excerpt(s): Contraception with a foreign body in the uterine cavity of a woman -- the intrauterine contraceptive device, commonly known as an IUD -- has been practiced by the medical profession with an increasing measure of success. Thus the pregnancy rate with an IUD in position can be at least as low as 1.4%. ... One proposed IUD is in the form of a zig-zag, others are T-shaped, bow-shaped, coiled and closed perimeters such as O-shapes. ... According to one aspect of the invention this invention provides a contraceptive device comprising a substantially C-, omega-, or triangular shaped device which is adapted to lie in the uterine cavity and including an inserter.

Web site: http://www.delphion.com/details?pn=US04111196__

- **Intrauterine contraceptive devices and processes**

Inventor(s): Gutnick; Morton (8329 Fairview Road, Elkins Park, PA 19117)

Assignee(s): none reported

Patent Number: 3,996,933

Date filed: October 14, 1975

Abstract: An intrauterine contraceptive device comprising an elongated shank having divergent convoluted portions at its distal end, said convoluted portions being generally sinusoidal in nature, said device having incorporated in said shank a permanent magnet and having a substantial portion of its surface covered with a biologically inert, silicone elastomeric material which may contain an analgaesic or anti-fertility agent which is gradually released in utero. In a preferred embodiment of the invention, the proximal end, of the shank contains a pair of downwardly extending divergent, resilient legs which tend to prevent inadvertent expulsion of the device. In another preferred embodiment, the lower end of the device is also formed with one or more small refillable containers for certain types of medication which are released gradually into the vagina and the lower end of the uterus over a prolonged period of time for the prevention and cure of such venereal diseases as gonorrhea, syphilis, trichomonas vaginalis and moniliasis.

Excerpt(s): The invention relates to both new and useful improvements in contraceptive devices for human beings and other animals which serve also to prevent and cure venereal and other diseases. ... It has been known for many years that a foreign object in the uterus will prevent conception. To date, many different types of intrauterine contraceptive devices, also known as IUDs, have been proposed, and several types are in widespread use, but none have been fully satisfactory. ... Bleeding and pain account for eighty-five per cent of the complications or side effects of intrauterine contraceptive devices. Therefore, any device that would reduce or eliminate bleeding and pain would lead to fewer removals of intrauterine contraceptive devices for "cause," and would

allow a greater percentage of patients to "continue to use" the IUDs and would probably also expand the usage of IUDs.

Web site: http://www.delphion.com/details?pn=US03996933__

- **Intrauterine contraceptive loading device and method**

Inventor(s): Krzeminski; Melvin L. (Palatine, IL)

Assignee(s): G. D. Searle & Co. (Skokie, IL)

Patent Number: 4,428,371

Date filed: November 16, 1981

Abstract: A method and apparatus are provided for loading an intrauterine contraceptive device into the barrel of an inserter. The device includes an apertured tubular section having a closed end section at one end. The closed end defines an enlarged chamber. The device has a stem, a flexible arm generally transverse to the stem, and an enlarged head at one end of the stem. The device is receivable in the instrument when the stem is partially disposed within the barrel and the barrel is displaced forwardly until the head is received in the chamber. The head engages the shoulder that is defined between the aperture and the chamber in the instrument, thereby to retain the device in the instrument when the barrel is withdrawn. The device is removable from the instrument when the barrel is inserted again into the instrument to dislodge the head from the shoulder so that the barrel can be withdrawn together with the device.

Excerpt(s): This invention relates to intrauterine contraceptive devices and more particularly to a method and apparatus for loading the device onto the barrel of an inserter. ... It has long been recognized that the presence of a foreign object in the uterus tends to prevent conception. In general, however, such devices must occupy a significant portion of the space in the uterus, and because the effective dimension of these devices is often larger than that of the nulliparous cervical canal, a dilation procedure requiring general anesthesia is often required to satisfactorily insert the devices. ... In commonly assigned U.S. Pat. No. 3,777,748, the contents of which are incorporated herein by reference, an intrauterine contraceptive device is disclosed which could be conveniently emplaced without resorting to dilation of the nulliparous cervical canal. This device is known and referred to hereinafter as the "Cu-7" and it is generally in the shape of the numeral "7." It is comprised of a generally longitudinal arcuate stem member and an arcuate arm member which extends transversely from the terminal end of the stem member. The transverse arm of the Cu-7 is flexible so that it can be folded in overlying relationship with the longitudinal stem.

Web site: http://www.delphion.com/details?pn=US04428371__

- **Intravaginal contraception method**

Inventor(s): Dickey; Richard P. (5640 Read Blvd., Ste. 640, New Orleans, LA 70127)

Assignee(s): none reported

Patent Number: 4,228,797

Date filed: September 25, 1978

Abstract: A chemical contraception system is described in which the spermicidal chemical, for example, "Nonoxynol-9", is provided in a powder or tablet form and is dissolved in a solvent, primarily water, immediately before use. The solution containing the spermicide is then allowed to soak into an applicator matrix, such as a sponge or pad. The spermicide-impregnated matrix is inserted into the vagina and later removed. The system can be provided in kit form (FIGS. 1 and 2) including a storage container for the powder, a mixing container, and a measuring spoon, or in a pre-packaged form where the chemical has already been added to the sponge. Among the preferred embodiments of the system are the use of the spermicidal chemical in powder or tablet form and the use of a sponge for vaginal retention of the spermicidal solution.

Excerpt(s): The present invention relates to chemical contraception systems, and more particularly relates to an intravaginal spermicidal applicator system in which the spermaticidal agent, originally in tablet or powder form, is dissolved in an appropriate solvent immediately before use. ... The use of sponges or tampons with spermicides for intravaginal contraception is known in the art. Intrauterine applicators for contraception and drug administration have been extensively developed. A variety of spermicidal foams and jellies are separately available as well. ... One reason spermaticidal agents are effective is that they alter the surface tension of the spermatozoa and so immobilize them. It is believed that the greater the viscosity of the material in which the chemical is contained, the more effective it can be in altering surface tension. Theoretically, then, spermaticides are most effective when dissolved in water. The problems of using water as the solvent have been the instability of the agent when dissolved in water and the difficulty of retaining the substance within the vagina.

Web site: http://www.delphion.com/details?pn=US04228797__

- **Intravaginal contraceptive and drug release device and method for making and using same**

Inventor(s): Chvapil; Milos (Tucson, AZ)

Assignee(s): Medi-Coll, Inc. (Tucson, AZ)

Patent Number: 4,274,410

Date filed: January 16, 1980

Abstract: A contraceptive device and method of contraception as well as a method of making the contraceptive device are described. Native collagen form of fibrillar protein is comminuted and homogenized in an acid environment; noncollagenous material is removed and residual collagen is mixed with water the pH of the resulting slurry is adjusted to 4.5 to 5.0 by the addition of acetic acid; gluteraldehyde is then added and the slurry poured into molds and frozen at approximately -10.degree. centigrade for approximately 20 hours. The frozen mass is then thawed, washed, and immersed in a wash of pH 8 to 9 for approximately 2 hours at 20.degree. centigrade. Sufficient reducing agent is added to the wash to create excess reducing equivalents. The sponge is then immersed in a buffer solution of pH 4 to 5 for a time sufficient to equilibrate to uniform pH. The sponge formed by the above method is then moistened and self-administered in the upper vault of the vagina proximal to the cervix. The sponge is then retained for a desired period, usually several days to one month.

Excerpt(s): Of the great variety of contraceptive techniques presently utilized, or previously utilized and no longer advocated, all have definite undesirable aspects. Surgical techniques are confronted with unavoidable irreversibility; oral/chemical

techniques have been shown to include certain undesirable side effects. Interuterine contraceptive devices have not been altogether satisfactory and, while such devices may be effective in preventing conception, there exists evidence of some local as well as systemic difficulties in a certain proportion of users; further, inconvenience attending the use of interuterine devices, such as the requirement for trained medical personnel for application, militates against their use. ... Both intrauterine devices and oral contraceptives have recently been subject to criticism, suggesting heretofore unrealized or unrecognized risks to the user. With regard to some interuterine devices, recent studies pertaining to the biology of trace elements may suggest that the presence of copper in interuterine devices is a potential source of metal ions effective in catalyzing lipid peroxidation. With regard to oral contraceptive systems, it has been shown that they decrease serum zinc content and often increase copper content in the serum. Zinc is known to contribute to the integrity of biomembranes of cells and reactivity of tissues; further, zinc supplementation has been shown to inhibit platelet aggregation, the release of serotonin and also to limit the necrotic changes in the heart after isoproterenol. Decreased zinc content in the plasma following the ingestion of certain oral contraceptives may be the causal factor labelizing platelets increasing their aggregability and adhesiveness and thus be a contributing factor to the known enhanced coagulability and thereby probably contribute a higher incidence of thromboembolism in users of hormonal contraceptive drugs. ... Another, and much older contraceptive technique is the utilization of an intravaginal material. Basically, intravaginal contraception techniques may be divided into three general approaches used or suggested by the prior art; first, chemical techniques (e.g. jells, foams, and the like, incorporating spermicidal agents and/or astringents); second, occlusives such as diaphragms or cervical caps; and third, tampon devices. These techniques, as used today, could be considered safer to the user than in previous ages; they are, however, inefficient and inconvenient. The present invention relates to the third category of intravaginal techniques but offers safety, efficiency and convenience.

Web site: http://www.delphion.com/details?pn=US04274410__

- **Intravaginal contraceptive device**

Inventor(s): Spits; Marc (Achel, BE)

Assignee(s): Fundatech S.A. (Geneva, CH)

Patent Number: 4,607,630

Date filed: June 6, 1984

Abstract: The present invention relates to an intravaginal contraceptive device such as a diaphragm or pessary. The contraceptive device of the invention comprises a central, flexible cap-like body portion engaged by the inside of a rigid inner ring with almost fixed diameter, and by an outer part lying in the plane of and around the inner ring and being connected thereto, the outer diameter of said outer part having the ability of increasing under influence of the local circumstances after being inserted into the vagina. Preferably the outer part consists of an outer ring of a material having the ability of expanding, thus increasing the diameter of the outer ring, and an elastic membrane continuously connecting the outer ring with the inner ring. The cap-like body portion, may be impregnated with a retarded release medicine such as a spermicide.

Excerpt(s): The present invention relates to an intravaginal contraceptive device such as a diaphragm or pessary. ... Contraceptive devices of this type are already known from NL-A-78.04542. The diaphragm described in this patent application comprises a cap-like

body, with a circular, somewhat rigid but nevertheless elastic peripheral structure. The edge generally comprises a spring retaining the shape of the diaphragm. Both the edge and the cap-like body may be formed of the same or different elastomers. The opposing sides of the edge may be folded together to facilitate the insertion of the diaphragm into the vagina. ... After being inserted in the vaginal cavity, mostly in close proximity to the cervical os, contraceptive devices of this type form a sealing barrier between the vagina and the cervical os, the spring strongly forcing the elastic edge into engagement with the inner wall of the vagina. The sealing effect of the edge prevents spermatozoids from penetrating the uterus.

Web site: http://www.delphion.com/details?pn=US04607630__

- **Iodine contraceptive sponge**

Inventor(s): LeVeen; Harry H. (321 Confederate Cir., Charleston, SC 29407), LeVeen; Robert F. (312 Lombard St., Philadelphia, PA 19147)

Assignee(s): none reported

Patent Number: 5,156,164

Date filed: February 4, 1991

Abstract: A bacteriocidal virocidal sponge containing iodine and a surfactant which can be used as a contraceptive and as therapy for vaginitis. It consists of a polyurethane open cell foam impregnated with a surfactant and iodine. A bacteriocidal tampon containing an iodophor does not induce toxic shock syndrome.

Excerpt(s): In recent years there has been a serious increase in sexually transmitted disease. Sexual freedom among consenting adults has been a partial cause of this increase. In addition, oral contraceptives and a change in the mores has created a situation which has increased the number of sexual contacts, thus favoring dissemination of sexually transmitted disease. Since these factors are unlikely to change, sexually transmitted disease has now become a major public health problem. Some diseases which were formerly unassociated with sexual transmission such as B virus hepatitis are now known to be sexually transmitted. Other new diseases such as acquired immune deficiency syndrome (AIDS) are viral diseases which are usually transmitted sexually. A need therefore exists for all conceivable types of control measures to reverse the increasing incidence of sexually transmitted disease. ... The intravaginal contraceptive doughnut shaped sponge containing a spermicidal agent has become an accepted method of birth control in western society. Yet this sponge does little to halt the incidence of sexually transmitted disease which is steadily increasing. Such sponges are formed of an open cell polyurethane foam sponge impregnated with a spermicidal agent, nonoxynol-9, (U.S. Pat. No. 2,541,103). Nonoxynol is a polyethylene glycol nonylphenyl ether which is a mild surfactant. Like other non ionic surfactants it is a cytolytic agent which acts by disrupting the plasma membrane of animal cells. It is not as effective on the cell walls of bacteria which are unlike the lipid containing membranes of animal cells. Unfortunately, nonyl-phenoxypolyethoxyethanol is only bacteriostatic and not bacteriocidal when placed in a culture of staphylococcus aureus (TSS-S aureus). Toxic shock syndrome (TSS) is caused by the proliferation of staphylococcus aureus in absorbent tampons at the time of menstruation and in contraceptive sponges used in the absence of menstruation. Although nonoxynol does suppress colony counts of staphylococcus aureus during the first 6 hours of growth in a culture medium, the number of bacteria in the culture flask after 30 hours has been shown to be identical to that of control cultures. (Contraception 33:395 1986). Therefore, nonoxynol does not

prevent the growth of staphylococci in contraceptive sponges. The absorption of the toxins from proliferating staphylococci can produce toxic shock syndrome. Thirteen cases have been reported in users of a contraceptive sponge impregnated with nonoxynol. (Int Fertil [Sweden] 30:81 1985). In all of these cases, TSS-S aureus was cultured. It has been estimated that the incidence of TSS would be 10 cases a year per 100,000 women using the sponge. The current mortality from TSS is 3% (J.A.M.A. 251:1016 1984). The death rate in contraceptive sponge users is less than that occurring with tampons where the incidence of TSS is also 10 per 100,000 menstrual users (NEJM 303:1429 1980). Even though nonoxynol is only bacteriostatic, a study of prostitutes in Bangkok, Thailand who used nonoxynol-9 intravaginal contraceptive sponges showed that these prostitutes had a lower incidence of venereal disease (chlamydial infection and gonorrhoea) than those who did not use this contraceptive sponge. (J.A.M.A. 257:2308 1987). The incidence of monilia vaginitis was increased because nonoxynol is not fungicidal. The slight reduction in the incidence of venereal disease in frequently exposed prostitutes is not acceptable with regard to disease prevention and the decrease in incidence is eventually eliminated by frequency of exposure. If a contraceptive sponge could be made which was spermicidal, virocidal, bactericidal and fungicidal, it would completely protect against sexually transmitted disease. Such a sponge would not only protect the female from sexually transmitted disease, but would be equally protective for the male. This consideration has not been addressed by the medical literature. Bactericidal tampons would eliminate the possibility of toxic shock syndrome. Such developments would fulfill major public health needs and lead to a reduction in the rate of sexually transmitted disease. ... The present invention describes a bactericidal, virocidal and protozoicidal contraceptive sponge which unlike a sponge which relies totally on a weak bacteriostatic compound will prevent sexually transmitted disease caused by viruses and bacteria and is useful in treating vaginal infections (vaginitis) caused by trichomonas, gonococcus, monilia and chlamydia. It also describes a vaginal absorbent tampon which cannot induce toxic shock syndrome. Furthermore, such a contraceptive sponge may prevent the carcinoma of the cervix which is now known to be a manifestation of the sexually transmitted papilloma virus, In addition, transmission of the highly prevalent genital herpes which is known to predispose to malignancy may be prevented.

Web site: http://www.delphion.com/details?pn=US05156164__

- **Isolating diseaseproof and contraceptive hygienic cover**

Inventor(s): Huang; Ching-Hsiang (No.60, Sec.2, Chung Shan Rd., Chung Ho City, Tapei Hsien, TW)

Assignee(s): none reported

Patent Number: 5,513,653

Date filed: April 21, 1995

Abstract: An isolating diseaseproof and contraceptive hygienic cover including a cover body and a ring member. The cover body is substantially hoof-shaped and has an opening at a middle lower portion thereof. The ring member is coaxially fixedly connected to peripheral wall of the opening. The cover body has a wall radially extending from the opening and rearward inclined. The wall of the cover body has a thickness gradually reduced from the peripheral wall of the opening to outer edge of the cover body. The hygienic cover is sheet-like and has greatly reduced area and volume, so that the manufacturing cost and time thereof are decreased. In use, the present

hygienic cover is able to provide more reliable contraceptive and diseaseproof effect and can be more conveniently and quickly put on/taken off in a simple manner without affecting a sexual activity.

Excerpt(s): The present invention relates to a contraceptive and diseaseproof hygienic implement, and more particularly to an isolating diseaseproof contraceptive hygienic cover which prevents the peripheral portions around private parts or sexual organs of people from being infected due to skin contact in the process of sexual intercourse. ... 1. It is difficult in manufacture of such contraceptive implement, resulting in high cost of time and labor. ... 2. It takes away the sensational thrills of sexual intercourse wearing such contraceptive.

Web site: http://www.delphion.com/details?pn=US05513653__

- **Long lasting contraceptive suppository composition and methods of use**

Inventor(s): Ahmad; Nawaz (Piscataway, NJ), Ziets; George A. (Flemington, NJ), Das; Sudeb (Dayton Square, NJ)

Assignee(s): Ortho Pharmaceutical Corporation (Raritan, NJ)

Patent Number: 4,999,342

Date filed: August 16, 1988

Abstract: Compositions and methods for providing long lasting contraceptive protection comprising a mixture of a contraceptive effective amount of spermicidal agent, a polymeric gum, a dispersing agent, and a water miscible polyethylene glycol polymer suppository base; and mammalian contraceptive methods utilizing the compositions of the invention in suppository form to provide up to 12 hours of contraceptive protection after initial insertion of the suppository.

Excerpt(s): This invention relates to a long lasting contraceptive suppository composition. More particularly, this invention relates to a contraceptive suppository composition comprising a spermicide and a viscous adhesive composition which provides long lasting contraceptive action. ... Conventional vaginal contraceptive products utilizing a spermicidal agent provide a very limited duration of contraception. Conventional methods of spermicidal contraception require that the products need to be inserted into the vagina not more than one hour preferably 10-30 minutes before coitus for suppository products and even less time for foam and gel products. In view of such time constraints these products must be reapplied if coitus is repeated more than one hour after the original insertion. While various attempts have been made in the art to provide a longer lasting and more convenient vaginal contraceptive spermicidal suppository, they have met with only limited success. ... Riley, Jr. et al. in U.S. Pat. No. 4,551,148 describe a vaginal delivery system which is allegedly bio-adherent to the vaginal surface and releases an active agent in a controlled manner for at least three hours to a receptor site. Foamable-type vaginal suppository compositions have also been developed, but such have not been found to provide effective contraceptive activity for long periods of time.

Web site: http://www.delphion.com/details?pn=US04999342__

- **Male contraception**

Inventor(s): Ewing; Larry L. (Timonium, MD), Desjardins; Claude (Austin, TX)

Assignee(s): The Johns Hopkins University (Baltimore, MD)

Patent Number: 4,210,644

Date filed: February 23, 1978

Abstract: A method of affecting male contraception which comprises subdermally implanting in the male an effective amount of an androgen and an estrogen in one or more slow release capsules. The combination of androgen and estrogen may also be used to enhance libido in an aging male.

Excerpt(s): The present invention is concerned with certain improvements in male contraception. ... A great deal of work is going on to find effective contraceptive methods for men. Many different methods have been proposed and a few of these have met with some degree of success. For example, vasectomy is used fairly extensively for male contraception but there are some indications of possible undesirable side effects, e.g. high antibody buildup. Additionally, once a vasectomy has been performed, there is no real assurance that the resulting contraceptive effect can be reversed if this is later desired. ... Methods involving the administration of contraceptive compounds, e.g. steroids, orally or by injection, offer the advantage of being reversible but undesired side effects can result and/or the activity of the contraceptive can be substantially diminished due to breakdown in the gut or metabolism thus requiring the administration of relatively large dosages to insure the contraceptive effect. Additionally, these methods require a disciplined and periodic administration of the contraceptive to be effective and, as a consequence, compliance with the necessary regimen is difficult to obtain or maintain.

Web site: http://www.delphion.com/details?pn=US04210644__

- **Male contraceptive**

Inventor(s): Loeffler; Charles P. (5573 Peacock La., Riverside, CA 92505)

Assignee(s): none reported

Patent Number: 5,701,914

Date filed: October 31, 1995

Abstract: A contraceptive device for blocking a male urethra canal includes an expandable body unit having an elastic member covering a plurality of body segments, a forwardly opening cavity extending within the body unit and having first, second, and third progressively rearwardly spaced cavity regions collectively in the body segments, a cam member having an expansion cam and a forwardly extending shaft being movable in the cavity with the cam sequentially locatable in the first, second, and third regions thereof, for expanding the body unit from a contracted configuration for insertion into a male urethra penis cavity to an expanded configuration 10% or more larger than the contracted position for blocking the urethra when the cam is in the second region, the body contracting to the contracted configuration for permitting withdrawal of the body unit when the cam is in the third region, the cam member being blocked from moving from the second position to the first position and from the third position to the second position for preventing successive uses of the device, and a cam actuator having an expanding position and a contracting position on the shank of the

cam member and a handle portion projecting forwardly of the body unit for manipulating the device, the cam member being blocked from the third position when the actuator is in the expanding position, the first position of the cam member being visually distinguishable from the other positions thereof externally of the device.

Excerpt(s): The present invention relates to male contraceptive devices, and more particularly to male contraceptive devices that do not require surgical intervention. ... The most common male contraceptive device, the condom, has at least three major drawbacks. The use thereof requires a physical response on the part of the male partner in order to be worn. This use often compromises the passion in a sexual act, postponing culmination by the necessity of wearing the prophylactic in order to prevent unwanted pregnancy. Secondly, the material used in these devices becomes a barrier between the partners, reducing vital sensitivity during intercourse. Thirdly, failure of the material composing the prophylactic, or accidental removal, causes known high failure rates of about 32%, often resulting in unwanted pregnancy and/or further increasing the risk of sexually transmitted diseases. ... U.S. Pat. No. 2,696,209 to Varaney discloses an internal contraceptive device in the form of a rigid tubular member that is covered by a flexible sack that can be folded back inside of itself, the open end of the tubular member is inserted into the urethra and moved along by finger pressure on the outside of the penis, and the bag is also moved into the urethra, by means such as another tube and a plunger. This device is substantially awkward to use, and is somewhat complex, having a number of separate parts to be managed. U.S. Pat. No. 3,373,746 to White et al. discloses encapsulated foam members and having a spermicide to produce a chemical congealing action with semen for sealing to prevent conception. U.S. Pat. No. 4,139,007 to Diamond discloses an external device that seals off the urethra. The disadvantages to this device include a hard external band that may cause pain and chaffing to the vagina and also may be of marginal safety as far as prevention of pregnancy if it is not adjusted properly. U.S. Pat. No. 4,821,742 to Phelps, III discloses an external device only, and U.S. Pat. No. 4,457,299 to Cornwell discloses an internal device that seals the urethra against low pressure to prevent incontinence but does not seal against higher pressures associated with intentional evacuation; there is no disclosure of a contraceptive device. It is believed that in addition to the above disadvantages, several of the devices are ineffective against external fluid entering the urethra, and none of the prior art devices prevents the unsafe practice of reusing the device, which reuse creates the risk of contamination from person to person.

Web site: http://www.delphion.com/details?pn=US05701914__

- **Male contraceptive and method of achieving male contraception**

Inventor(s): Parlow; Albert F. (Torrance, CA)

Assignee(s): Professional Staff Association of the Los Angeles County Harbor General (Torrance, CA)

Patent Number: 4,010,256

Date filed: July 30, 1975

Abstract: A method of immunization of human males to achieve contraception is provided which includes the step of administering, periodically, predetermined amounts of, non-primate, highly purified FSH having a biologic potency of at least 1,000 I.U. (International Units)/mg, an LH contamination of below 11 I.U./mg and a TSH contamination of less than 0.1 I.U./mg, to a human male until his sperm production

declines below about twenty million per cc. FSH is the Follicle Stimulating Hormone; LH the Luteinizing Hormone; and TSH the Thyroid Stimulating Hormone.

Excerpt(s): Highly purified FSH will be administered as an "alum precipitated"* antigen in a dose of 0.5 mg. three times monthly to normal human males, until suitably high titers of antibodies are generated, i.e. until sperm production declines below 20 million per cc. ... The use of highly purified FSH, as opposed to the crude extracts utilized in the 1950's, will maximize the likelihood of achieving high antibody titers with minimal side reactions, if any. The highly purified FSH is essentially devoid of luteinizing hormone (LH) activity, unlike the crude extracts previously used, such that antibodies will be generated only to FSH, not to LH as well. In addition, the use of "alum precipitated antigen" preparations of FSH will again maximize the likelihood of high antibody titer formation, which is essential to success of the procedure. ... The pituitaries derived from sheep or rats should be removed at the time of autopsy and placed directly into pure acetone without exposure to any other fixative. The pituitaries may be stored (in the cold) for many months in acetone, the volume of acetone being at least 20 times the volume of the glands. It is recommended that acetone be poured off occasionally and fresh acetone added to the glands. Before shipping the acetone should be poured off, glands rinsed with fresh acetone and sent in a well-sealed container.

Web site: http://www.delphion.com/details?pn=US04010256__

- **Male contraceptive arrangement**

Inventor(s): Meldahl; Edward N. (230 W. 55th St., Apt. 11D, New York, NY 10019)

Assignee(s): none reported

Patent Number: 4,232,675

Date filed: March 29, 1979

Abstract: A male contraceptive arrangement defined, basically, by a modified condom, i.e. one having a shorter length than now commercially available and a configuration particularly adapted to contain semen; a spermicidal ring received within the condom; and, an elasticized retaining cover adapted to position the condom on the male organ. In one invention form, a harness, disposed on the glans penis, extends to the spermicidal ring, where, in another invention form, the harness includes sensitivity segments which are located rearwardly of the glans penis. In a further invention form, additional positive positioning of the condom is afforded through an elasticized retaining device arranged over the condom at a position in front of the spermicidal ring and to the rear of the elasticized retaining cover. The invention also presents a wrap-around positioning device, used in association with the rim or beaded end at the opening to the condom, which serves to further assure placement of the contraceptive arrangement during use.

Excerpt(s): As is known, a serious overpopulation problem is threatening many areas of the world and, accordingly, an important need arises for effective and yet convenient birth control. While existing contraceptive approaches need not be discussed in detail herein, the known male condom has been recognized as a relatively reliable and one of the safest contraceptives in use. One advantage of such condom is that it does not normally occasion any side effects either to the male or female. On the other hand, drawbacks to the present male condom are the loss of sensitivity during sexual performance and the fact that the condom must be removed from the vagina shortly following ejaculation so as to prevent leakage of semen into the vagina. ... The invention provides an improved male contraceptive arrangement, overcoming the aforesaid

objections to the male condom currently in use. Broadly, the contraceptive arrangement includes a modified condom, both as to overall length and plan configuration; a ring for receiving or incorporating a spermicide, where the latter is positioned around the male organ and beneath an enlargement near the open or entry end of the modified condom; and, an elasticized cover which extends over the rim or beaded end of the condom and serves as one approach for retaining the condom on the male organ. ... In a preferred embodiment, a harness, disposed within the condom and about the glans penis, extends to the spermicidal ring, where, in a modification to the preferred embodiment, the harness includes the use of sensitivity segments, typically positioned by elasticized bands or threads, for example, which extend in the space behind the glans penis and towards the spermicidal ring. The sensitivity segments may be in the form of a textured, velvet, or like strip material affording stimulation of the male organ, and the spermicidal ring is typically made from cellulose or other material suitable for receiving and containing a spermicide.

Web site: http://www.delphion.com/details?pn=US04232675__

- **Male contraceptive device**

Inventor(s): Walston; Wayne T. (505 S. 24th St., Arlington, VA 22202)

Assignee(s): none reported

Patent Number: 5,063,939

Date filed: September 5, 1990

Abstract: A male contraceptive device includes a resistive heating unit secured in an insulated scrotum sack. The heating unit is linked to a control unit by conductors. The control unit forms part of a carrying case worn at the user's waistline and which contains a power source, on-off switch, low battery indicator, defective element indicator, timer, beeper and telethermometer. The control unit and heating unit produce a significant increase in intrascrotal temperature which creates a suppression of spermatogenesis rendering the person temporarily sterile. The heating unit can be concentrated at the posterior end of the sack for quickly suppressing spermatogenesis in the human epididymis.

Excerpt(s): This invention relates to the field of contraceptive devices and, more particularly, to a birth control device designed to limit sperm production by effecting a temperature increase in the male testes. ... It is known that the male scrotum regulates testicular temperature and that an increase in scrotal temperature causes a suppression of spermatogenesis. Clinical findings of these affects are documented in "Effect of Induced Intrascrotal Hyperthermia on Testicular Function in Man", American Journal of Obstetrics and Gynecology, John Rock, M.D. and Derek Robinson, M.D., Volume 93, No. 6, Nov. 15, 1965 and "Intrascrotal Hyperthermia Induced by Scrotal Insulation: Affect on Spermatogenesis", Obstetrics and Gynecology, Volume 29, No. 2, February 1967. ... As a result of these findings, attempts have been made to provide a device which increases scrotal temperature and is acceptable to a large number of men. These devices have taken the form of scrotum insulators which are designed to be worn by the man for several hours each day. Insulating materials are used in an article of clothing worn by the man which covers and holds the scrotum against the body of the person in a manner to exclude free circulation of air about the scrotum.

Web site: http://www.delphion.com/details?pn=US05063939__

- **Male contraceptive implant**

Inventor(s): Moo-Young; Alfred J. (Hastings-on-Hudson, NY), Saleh; Saleh I. (Queens, NY)

Assignee(s): The Population Council, Center for Biomedical Research (New York, NY)

Patent Number: 5,733,565

Date filed: February 23, 1996

Abstract: The present invention relates to implantable male contraceptive devices. An ethylene vinyl acetate copolymer based implant is described for delivery of an androgen and a system including an ethylene vinyl acetate copolymer based implant as well as a second implant are described for the administration of both androgen and a sterilitant. These implants may be used to provide contraception for men, as well as, for hormone therapy, treatment of enlarged prostate and other ailments.

Excerpt(s): The present invention relates to the field of male contraception as well as the treatment of benign prostrate hypertrophy, and other conditions which can be treated by androgen or hormone therapy and to methods and apparatus regarding same. ... Contraception is a difficult subject under any circumstance. It is fraught with cultural and social stigma, religious implications and, most certainly, significant health concerns. This situation is only exacerbated when the subject focuses on male contraception. ... Despite the availability of suitable contraceptive devices, historically, society has looked to women to be responsible for contraceptive decisions and their consequences. Although health concerns over sexually transmitted diseases has made men more aware of the need to develop safe and responsible sexual habits, women still often bear the brunt of contraceptive choice.

Web site: http://www.delphion.com/details?pn=US05733565__

- **Male contraceptive steroids and methods of use**

Inventor(s): Babcock; John C. (Kalamazoo, MI), Campbell; J. Allan (Kalamazoo, MI), Lobl; Thomas J. (Portage, MI)

Assignee(s): The Upjohn Company (Kalamazoo, MI)

Patent Number: 4,297,350

Date filed: October 10, 1978

Abstract: The steroids of the present invention have been found to be useful as male contraceptives when administered orally. Upon cessation of administration of the male contraceptive steroids of the present invention the male promptly regains normal fertility.

Excerpt(s): Most forms of reversible contraception are practiced by the female member of an animal pair, whether the animal be human or not. With humans, physical (diaphragm and IUD) and chemical ("the Pill", vaginal creams, foams, ointments, etc.) methods are available. At present there are only two acceptable methods for the human male. These are the condom and bilateral vasectomy. With the condom the failure rate is high, resulting in unwanted pregnancies. Vasectomies for practical purposes must be considered irreversible. Therefore, a method of male human contraception which is both reversible and reliable is highly desirable. ... With regards to the non-human mammals a male contraceptive is also highly desirable. For non-domestic commercial animals such as horses, cattle, sheep, etc., the present situation is to separate male and female animals

so the female may be selectively, artificially inseminated. It would, of course, be simpler to permit the animals to cohabit under circumstances where the female cannot become pregnant. Domestic animals normally cohabit because it is virtually impossible to separate male and female cats and dogs in a household. Many times it would be desirable to be able to prevent unwanted pregnancies of domestic animals under cohabitation circumstances. Additionally, with undesirable rodents a male contraceptive would be helpful to decrease fertility and thereby decrease or eliminate the number of undesirable rodents. ... H. J. Ringold et al. in J. Am. Chem. Soc. 81, 427 (1959) disclose 17.beta.-hydroxy-2.alpha.-methyl-5.alpha.-androstanes in general and in particular 17.beta.-hydroxy-2.alpha.-methyl-5.alpha.-androstan-3-one and 17.beta.-hydroxy-2.alpha.,17.alpha.-dimethyl-5.alpha.-androstan-3-one. U.S. Pat. No. 2,852,537 discloses 2.alpha.-alkyl-17.beta.-hydroxy-17.alpha.-vinyl and -17.alpha.-ethinylandrost-4-ene-3-one type compounds and their anti-androgenic properties. R. Youssefyeh in Tetrahedron Letters 2161 (1964) discloses some 2.alpha.-methyl and ethyl-17.beta.-hydroxy-5.alpha.-androstan-3-ones. U.S. Pat. No. 3,846,456 discloses 17.beta.-hydroxy-2.alpha.,7.alpha.-dimethylandrost-4-en-3-one and its use as an anti-fertility agent but without stating anti-fertility in the male or female.

Web site: http://www.delphion.com/details?pn=US04297350__

- **Male oral contraceptive**

Inventor(s): Nassar; Michael F. (8731 Dewey Dr., Garden Grove, CA 92641)

Assignee(s): none reported

Patent Number: 4,148,892

Date filed: May 8, 1978

Abstract: A simple, nontoxic, effective male oral contraceptive is disclosed which directly effects the metabolism of the sperm by causing an acidotic state in the fluid medium surrounding the sperm thereby inhibiting the sperm's activity.

Excerpt(s): Social scientists recognize that over population is one of the most serious problems which mankind must face and solve. As an example, in the United States the Department of Health, Education and Welfare released statistics recently which showed that 3.3 million babies were born in the United States in 1977, up 5% from the previous year. This marked an increase in the nation's birth rate for the first time since 1970. (1) The problem is even more critical in underdeveloped countries. ... In order to control our increasing world population, there exists a myriad of contraceptive devices to prevent unwanted pregnancy. ... Each method attempts to achieve a contraceptive possessing the qualities of simplicity, acceptability, efficacy, nontoxicity and absence of adverse side effects. One class of such measures are mechanical contraceptives, such as the diaphragm, which are inserted into the vagina to completely occlude the orifice of the cervix, thus obstructing the migration of spermatozoa upward into the fallopian tubes. Such contraceptives have serious application problems due to the wide variation in size and geometry of the vaginal canal and the cervical opening. These devices often require special insertion instruments and careful fitting, usually by a trained physician. Furthermore, since trained help in application is often necessary, these devices are ill-suited for the underdeveloped countries where they are needed most.

Web site: http://www.delphion.com/details?pn=US04148892__

- **Method and apparatus for contraception**

Inventor(s): Diamond; Harvey (C/O Saul Epstein, 1880 Century Park East, Suite 500, Los Angeles, CA 90067)

Assignee(s): none reported

Patent Number: 4,139,007

Date filed: September 20, 1976

Abstract: A method of male contraception utilizing external pressure applied to the underside of the penis at the base thereof to close the urethral canal and thereby prevent the escape of semen. Apparatus comprises a pressure pad which applies a concentrated force on the canal and is held in place by a strap member around the penis.

Excerpt(s): This invention relates to the field of methods and apparatus for contraception and more particularly to a method and devices for male contraception. ... The traditional male contraceptive device is the condom. While generally effective, condoms are not popular with men because of their well known effect of reducing feeling and consequent enjoyment of the sexual act. For this and other reasons, female contraception has become popular in recent years and the "pill" and intrauterine devices are widely used. Recently both of these methods of contraception have come under attack for their possible adverse health effects on the users. There remains a pressing need, particularly among the poorer nations of the world, for an inexpensive and safe contraceptive method and device which is both simple to use and effective. The present invention is intended to fulfill this need. ... There are a number of devices in the prior art which apply pressure to the dorsal vein of the penis and which restrict blood flow from the penis and thereby prolong erection. See, e.g., U.S. Pat. No. 3,794,020. There are also devices for applying pressure to the urethra so as to retain urethral medicants or to prevent enuresis. See U.S. Pat. No. 1,748,227 and No. 3,147,754.

Web site: http://www.delphion.com/details?pn=US04139007__

- **Method and apparatus for inserting an intrauterine contraceptive device**

Inventor(s): Mayberry; Derral (Somerset, NJ), Sawardeker; Jawahar (Bound Brook, NJ), McShefferty; John (Somerville, NJ)

Assignee(s): Ortho Pharmaceutical Corporation (Raritan, NJ)

Patent Number: 4,026,281

Date filed: October 12, 1973

Abstract: A method of inserting an intrauterine contraceptive device is described. The device is mounted in a plunger and the plunger containing the device is inserted into a hollow insertion tube for insertion into the uterine cavity.

Excerpt(s): This invention relates to an apparatus for inserting a sterile intrauterine contraceptive device into the uterine cavity and a method of inserting same. ... It is known that in a vast majority of cases conception may not occur when a foreign body is present in the uterus. The use of intrauterine devices to prevent pregnancy has recently received a great deal of attention, and a number of preformed configurations have been suggested for such devices. Among these prior art devices are the Lippes "loop", the Margulies "spiral", the Birnberg "bow", the "T", elemental copper or zinc, and various ring configurations. ... Various methods have been proposed for introducing the device into the uterine cavity. For example, the Lippes "loop" is drawn into a hollow rod prior

to insertion and then pushed out into the uterine cavity after insertion. Since the configuration is important to the effectiveness of the device, it is not desirable to store the "loop" in the tube prior to use. The Tatum "T" device employs an inserter which consists of an elongated tube adapted to be extended through the cervical os and into the uterine cavity. When loaded for implantation, the intrauterine device is placed in the distal end of the inserter tube with the extended arms of the "T" pressed down along the outer walls of the tube into a pair of grooves formed in the sides of the walls. The device is then expelled from the inserter tube by means of a plunger which extends through the inserter. In many of the known methods for inserting an intrauterine device, it is necessary to carry out certain manipulations with the device prior to insertion which may lead to possible contamination of the device and the complications which may follow. Thus, the prior art methods require considerable handling by the physician prior to insertion of the device which is cumbersome and may result in undesirable side effects. There is a need, therefore, for a method of inserting intrauterine devices which eliminates the handling of the device prior to insertion into the uterine cavity.

Web site: http://www.delphion.com/details?pn=US04026281__

- **Method and kit for contraception with GnRH-antagonist**

Inventor(s): Hodgen; Gary D. (Norfolk, VA), Kenigsberg; Daniel (Stony Brook, NY)

Assignee(s): Medical College of Hampton Roads (Norfolk, VA)

Patent Number: 5,116,818

Date filed: August 9, 1990

Abstract: A method of providing contraception for and regulation of the menstrual cycle of a gonadal female mammal by a) administering thereto about once a week throughout her menstrual cycle an amount of a GnRH-antagonist effective to block folliculogenesis and thereby achieve a contraceptive state but less than the amount thereof required to block hormonogenesis; and b) inducing menses by administering during the last half of that cycle an amount of a progestin effective to produce a secretory endometrium and then terminating the progestin administration.

Excerpt(s): This invention relates to a method and kit for achieving contraception in gonadal female mammals with GnRH-antagonists without inducing an agonadal state. ... Although inhibition of ovulation in the form of estrogen/progestin combination oral contraceptives has been the most effective strategy for achieving reversible pharmacological fertility control in women, because of the known adverse side-effects associated with long term contraception by this method, especially in women who smoke in the 40-44 age group, there is increasing interest in contraception achieved through GnRH analogs that act on the pituitary to induce a hypogonadotropic status. GnRH-agonists do so after a transient stimulatory phase that lasts from 1-3 weeks. Monroe, S. E. et al. *Fertil Steril* 1985; 43:361; Berquist, C. et al., *Contraception*, 1979, 19:497. In contrast, GnRH-antagonists lack stimulatory activity, causing prompt reduction of gonadotropin secretion and an agonadal state Kenigsberg, D. et al., Dose-response using a gonadotropin-releasing hormone antagonist. *Fertil Steril*, 1984, 42:116; Kenigsberg, D. et al., *Fertil Steril* 1984, 42:116. ... As reported by us in *J. Clin. Endocrinol. Metab.* 62: 734 (April, 1986), the contents of which article are incorporated herein by reference, we have now found that reliably effective contraception (by inhibition of ovulation) can be achieved with GnRH-antagonists in gonadal female mammals without blocking hormonogenesis, thereby avoiding the side effects associated with a long term agonadal state.

Web site: http://www.delphion.com/details?pn=US05116818__

- **Method for contraception by immunization against the zona pellucida**

Inventor(s): Grimes; Stephen (Davis, CA), Benjamini; Elizer (Davis, CA), Gevas; Philip (Honolulu, HI)

Assignee(s): Apton Corporation (Woodland, CA)

Patent Number: 4,795,634

Date filed: March 14, 1986

Abstract: This invention relates to a method for contraception comprising the active immunization of a female mammal against zona pellucida using a composition comprising an effective amount of anti-idiotypic antibodies formed against anti-zona pellucida antibodies, which anti-idiotypic antibodies express internal images of zona pellucida antigenic determinants capable of eliciting a contraceptive response.

Excerpt(s): This invention relates to the control of female fertility. More particularly, this invention relates to a method of contraception comprising immunizing a female mammal against the zona pellucida by means of active immunization. According to this invention, anti-idiotypic antibodies to antibodies to the zona pellucida, which express an internal image of an antigenic determinant of the zona pellucida, are administered to a female mammal in order to elicit an active immune response to the zona pellucida and thereby prevent conception. ... Conventional methods of contraception include the use of mechanical or chemical barriers to fertilization, administration of hormones, or the use of mechanical means to prevent implantation of a fertilized ovum. Typically, these methods have serious drawbacks, including practical inconvenience, incomplete effectiveness and various undesirable side effects. Mechanical means of contraception may cause infection and are often not sufficiently effective. The oral administration of hormones, commonly referred to as "the pill," has been linked to many physiological problems, including various forms of cancer. ... In view of the disadvantages of such treatments, efforts have been directed to making use of the body's immune system to prevent conception. For example, immunization against hormones such as follicle stimulating hormone (FSH) or human chorionic gonadotropin hormone (HCG) for the purpose of contraception has been previously reported [U.S. Pat. No. 4,526,716]. However, these methods are also characterized by various side effects.

Web site: http://www.delphion.com/details?pn=US04795634__

- **Method for contraception by the administration of sequential contraceptive preparations**

Inventor(s): Lachnit-Fixson; Ursula (Berlin, DT)

Assignee(s): Schering Aktiengesellschaft (Berlin & Bergkamen, DT)

Patent Number: 3,969,502

Date filed: July 9, 1974

Abstract: Method of contraception over a 21-day cycle in which an estrogen and a progestogen are administered in a low dosage for 10-12 days and thereafter at a slightly higher dosage for the next 11-9 days.

Excerpt(s): Numerous hormonal methods for contraception are known, i.e., the oral administration of combination-type preparations, e.g., "Ovulen," "Anovlar," "Lyndiol," and similar combinations of estrogenic and gestagenic active agents. Also conventional is the administration of purely sequential preparations such as, for example, "Ovanone," etc., wherein first an estrogen is administered at a high dosage in the absence of gestagen, over a period of 7 days, and thereafter the estrogen is administered at the same high dosage in combination with a relatively high amount of gestagen over a period of 15 days, with the next 6 days being a blank period without administration of estrogenic or gestagenic agent in order to mimic the normal 28-day menstrual cycle of the woman. ... The administration of modified sequential preparations is likewise conventional, such as, for example, "Kombiquens," "Tri-Ervonum," and "Oraconal," etc., wherein first an estrogen is administered at a high dosage in combination with a low amount of gestagen over a period of 16 days, and subsequently the estrogen is administered over a period of about 7 days at the same high dosage in combination with an amount of gestagen about 5-10 times the original amount. See U.S. Pat. No. 3,568,828. To adapt to the natural 28-day cycle of the female, a 5-day hormone-free period follows the administration of these preparations wherein placebos or any desired other non-contraceptive effective agents are taken, such as, for example, tonics, iron supplements, etc. ... The disadvantages of the administration of the above-mentioned sequential preparations are, in particular, the relatively high doses of estrogen, resulting, in addition to evoking the customary symptoms caused by an excess of estrogen, such as, for example, gastrointestinal disturbances, nausea, weight gain from edema, etc., along with an increase in the risk of thromboembolism. On the other hand, however, it was considered essential to ingest high doses of estrogen for reliable contraceptive effect.

Web site: http://www.delphion.com/details?pn=US03969502__

- **Method for contraception by the application of combination-type sequential preparations**

Inventor(s): Lachnit-Fixson; Ursula (Berlin, DT), Pitchford; Alan G. (High Hurstwood, near Uckfield, EN)

Assignee(s): Schering Aktiengesellschaft (Berlin & Bergkamen, DT)

Patent Number: 3,957,982

Date filed: December 23, 1974

Abstract: Method of contraception in which an estrogen and a progestagen are orally administered daily for 21 days, the first 4-6 days at a low contraceptively effective daily dose, the next 4-6 days at a daily estrogen dose 1-2 times and a daily progestrogen dose 1-1.5 times that of the first 4-6 days, and for the next 9-11 days at a daily estrogen dose from that of the first 4-6 days to that of the next 4-6 days and a daily progestogen dose higher than either prior daily dose, up to 3 times that of the initial dose, followed by 7 days without hormone administration.

Excerpt(s): Numerous hormonal methods for contraception are known, i.e., the oral administration of combination-type preparations, e.g., "Ovulen," "Anovlar," "Lyndiol" and similar combinations of estrogenic and gestagenic active agents. Also conventional is the administration of purely sequential preparations, such as, for example, "Ovanone," etc., wherein first an estrogen is administered at a high dosage in the absence of gestagen, over a period of 7 days, and thereafter the estrogen is administered at the same high dosage in combination with a relatively high amount of gestagen over a period of 15 days, with the next 6 days being a blank period without administration of

estrogenic or gestagenic agent in order to mimic the normal 28-day menstrual cycle of the woman. ... The administration of modified sequential preparations is likewise conventional, such as, for example, "Kombiquens", "Tri-Ervonum" and "Oraconal", etc., wherein first an estrogen is administered at a high dosage in combination with a low amount of gestagen over a period of 16 days, and subsequently the estrogen is administered over a period of about 7 days at the same high dosage in combination with an amount of gestagen about 5-10 times the original amount. See U.S. Pat. No. 3,568,828. To adapt to the natural 28-day cycle of the female, a five-day hormone-free period follows the administration of these preparations wherein placebos or any desired other non-contraceptive effective agents are taken, such as, for example, tonics, iron supplements, etc. ... It is also known to administer two-stage combination-type oral contraceptives, with a combination of an estrogen at a low dosage and a progestogen at a low dosage first being administered for 10-12 days and subsequently a combination of the same dosage of estrogen and a dosage of progestogen increased to 2-3 times as much, is ingested for 11-9 days. To adapt to the normal about 28-day female cycle, a 5-7 day hormone-free period follows in which no estrogens or progestogens are ingested. For continuity of dosage, a placebo or a nonhormonal effective agent is usually administered during this period. See application Ser. No. 350,590, filed Apr. 12, 1973.

Web site: http://www.delphion.com/details?pn=US03957982__

- **Method for making a lipped vaginal contraceptive diaphragm**

Inventor(s): Milgrom; Hymen (Chicago, IL)

Assignee(s): Milex Products, Incorporated (Chicago, IL)

Patent Number: 4,427,477

Date filed: March 11, 1983

Abstract: A method for making a cervical contraceptive diaphragm provides for fabricating the entire dome assembly in a separate step, thereafter inserting a toroidal spring within a toroidal chamber pre-formed in a flange affixed to the base of the dome structure, the spring being sealed in by a separate sealing process preferably by a thin filament of vulcanizable rubber laid along the flange away from the spring. Local heating of the filament to cure it and seal the flange about the spring provides for a spring not interpenetrated by liquid elastomer during the curing process, resulting in a free floating spring. The method allows the fabrication of structures employing relatively stiff springs of limited radial compliance, so that the diaphragm may be removed from the first forming mold with minimum loss arising from tearing of the lip.

Excerpt(s): The technical field of the invention is manufacturing methods for contraceptive devices, in particular vaginal diaphragms (pessaries). ... U.S. Pat. No. 3,036,570 issued to H. T. Milgrom and W. T. Hewboski discloses a vaginal contraceptive diaphragm (pessary) having an integral inwardly projecting lip to provide increased retention thereof. An embedded toroidally wound spring peripherally disposed within a flange surrounding a central dome-shaped portion provides the principal retentive force, the spring being integrally molded to the flange during the manufacturing process, using conventional pressure molding techniques. The dome-like portion with an integral flange is first manufactured in a separate step by pressure molding, whereupon the spring is laid over an annular portion of the flange, and the second inwardly extending lip portion is formed therearound in a second molding operation wherein the lip is formed integrally attached to the flange of the diaphragm body, with the spring trapped there between. ... This manufacturing process frequently results in

the spring being carried completely to the edge of the structure because of molding pressures, resulting in a spring substantially off center, and close to, if not actually penetrating, the outer wall of the flange. Since the spring portion is routinely flexed in insertion, a possibility exists that a thin flange wall in the vicinity of the spring can result in a protruding spring, resulting in irritation to the user. Such defects are frequently observed during the manufacturing process, resulting in a substantial number of manufacturing rejects. Additionally, as will subsequently be discussed, this integral formation method leads to a substantial problem in extracting the finished diaphragm assembly from the injection mold, because of topological problems presented by the inwardly extending lip and spring rigidity.

Web site: http://www.delphion.com/details?pn=US04427477__

- **Method for packaging birth control and disease preventing device**

Inventor(s): Wu; Cheng M. (13726 Damian St., Cerritos, CA 90701)

Assignee(s): none reported

Patent Number: 5,083,414

Date filed: February 15, 1991

Abstract: This invention relates to a method for packaging birth control and disease preventing device that has sheath and shield, and more particularly to a method having steps including: pleats the protecting shield toward tubular sheath forming a pleated star-like shape near the closed end of the sheath, bends the pleated star-like shape portion of the shield close to the tubular sheath forming a whirled-like cylindrical tubular, rolls the secure-and-rolled-up ring in the longitudinal direction toward the closed end of the sheath, and packs the rolled-up device into a water proof sealed container.

Excerpt(s): This invention relates to a method for packaging birth control and disease preventing device that has sheath and shield, and more particularly to a method having steps including: pleats the protecting shield toward tubular sheath forming a pleated star-like shape near the closed end of the sheath, bends the pleated star-like shape portion of the shield close to the tubular sheath forming a whirled-like cylindrical tubular, rolls the secure-and-rolled-up ring in the longitudinal direction toward the closed end of the sheath, and packs the rolled-up device into a water proof sealed container. ... As the population of the earth has increased tremendously each year, birth control is an important subject to pursuit. Another important problem facing the world today is the serious consequence of the transferable diseases obtained through sexual intercourse: from the annoying skin itch, to the awful venereal diseases, and sometimes to the deadly AIDS. It can be understood that effective method is still needed to provide more efficiency for avoiding the unwanted pregnancy; and more important, to reduce the possibility of obtaining the communicable sexual diseases when performing a sexual activity. ... Various method has been developed for birth control, e.g. birth control pill and IUD, etc. However, using a condom for birth control is still a simple method for those people, who may have side effects when using other birth control methods or due to personal preference. While no contraceptive device provides 100% protection, condom when properly used can aid in the prevention of having pregnancy. For the purpose of preventing transmission of sexual diseases, condom is the simple and common useful device to achieve such goal. Conventional condom is easy to use, however, such condom can not protect the skin contact at the pubic area. Consequently, several condom with pubic shield have been invented. Some of those are: Puggard,

Canadian Patent No. 1,158,507; Lee, U.S. Pat. No. 4,840,624; Sorkin, U.S. Pat. No. 4,808,174; Robichaud, U.S. Pat. No. 4,794,920; Grubman, U.S. Pat. No. 4,781,709, etc. Those device all have different shape and construction, but all have a pubic shield; and that pubic shield will increase the protecting for preventing disease transmission and reduce the chance of being pregnancy.

Web site: http://www.delphion.com/details?pn=US05083414__

- **Method of contraception**

Inventor(s): De Jage; Evert (Oss, NL), De Visser; Jacob (Oss, NL)

Assignee(s): Akzona Incorporated (Asheville, NC)

Patent Number: 4,143,136

Date filed: November 17, 1977

Abstract: A three-phase method of human female contraception wherein (1) starting on about the ninth to about the twelfth day of the female cycle (first cycle day being first menstruation day) an effective amount of at least one progestagenic substance is administered in daily or shorter intervals for about three to about six days followed at substantially similar intervals by (2) administration for about one to about three days starting from about the fourth to about the seventh day after the first phase of both an effective amount of the progestagenic substance(s), and a peptide possessing LHRF (Luteinizing Hormone Release Factor) activity, followed by (3) administration of an effective amount of the progestagenic substance(s) until the total time of the progestagenic substance administration with and without the LHRF compound is from about seven to about fifteen days. A contraceptive preparation or pack comprising a suitable number of dosage units ranging from about seven to about fifteen corresponding with the total time abovementioned, of which the first three to six dosage units contained as hormonal compound only an effective amount of a progestagenic substance, followed by one to three dosage units containing an effective amount of an orally LHRF active peptide in addition to the noted level of progestagenic substance, with the remaining dosage units again containing only the progestagenic substance at the level noted.

Excerpt(s): The invention relates to the field of contraception and to the subfields of human female contraceptives and oral contraceptive devices. ... The physiological processes occurring during the menstrual cycle of the woman are regulated by hormones from at least (1) the hypothalamus, (2) the hypophysis and (3) the ovary. In the first phase of the cycle, the follicular phase, the gonadotropic hormone FSH (Follicle Stimulating Hormone) is secreted by the hypophysis. FSH effects the development and maturation of one or more follicles in the ovary. In addition, oestrogen production increases, and under the oestrogenic influence, proliferation of the endometrium occurs. ... In a second phase, follicle maturation is followed, about halfway through the cycle, by ovulation and development of the corpus luteum from the ruptured follicle under an influence of another gonadotropic hormone, LH (Luteinizing Hormone). The secretion of the LH hormone is regulated by the hypothalamus, which in turn is again subject to ovarian influence.

Web site: http://www.delphion.com/details?pn=US04143136__

- **Method of contraception and a device therefor**

Inventor(s): Bauer; Hans A. (Sudliche Stadtmauer-strasse 58, Erlangen 8520, DE)

Assignee(s): none reported

Patent Number: 4,658,810

Date filed: April 23, 1985

Abstract: The present invention discloses a method of contraception employing an intrauterine device comprising retaining means for retaining a contraception element within a uterine cavity. The retaining means includes anchoring means for penetrating into and positively engaging the uterine muscle, so that the device is securely retained in the cavity. The device also preferably includes associated driving means for driving the anchoring means into the uterine muscle. A new device for contraception is also disclosed.

Excerpt(s): Intrauterine devices known to the prior art are typically secured within the uterine cavity by conforming the device to the contours of the cavity. Since the uterine cavity increases in cross-section in the direction of the fundus, conventional means for retaining the device within the cavity are adapted to this conformation. For example, devices in common use include T-shaped devices, wherein the sidearms of the "T" extend into the wider section of the cavity, thereby retaining the device within the uterus. Notwithstanding the shape-adapting conformation of such devices, they are frequently involuntarily expelled, owing to especially strong contractions of the musculature of the uterus, failure of the device to conform adequately to the conformations of individual uterine cavities, or for other reasons. ... It is accordingly an object of the invention to provide a method of contraception comprising employing an intrauterine device (IUD) which is reliably retained within the uterine cavity, and which is not dependent for retention upon a precise conformation. ... The invention comprises an intrauterine device including retaining means for penetrating into and engaging the uterine muscle wall and for retaining the device within the uterine cavity. Preferably, the IUD includes contraception means comprising a source of metallicity, especially iron, copper, silver, gold or platinum, which are slowly released into the uterine cavity and promote contraception. The IUD of the invention further includes, associated driving means for driving the retaining means into penetrating engagement with the muscle wall; the driving means is disassociated from the IUD and withdrawn after the device has been secured.

Web site: http://www.delphion.com/details?pn=US04658810__

- **Method of contraception using peak progestogen dosage**

Inventor(s): Edgren; Richard A. (Woodside, CA)

Assignee(s): Syntex Pharmaceuticals International Ltd. (Hamilton, BM)

Patent Number: 4,390,531

Date filed: August 10, 1981

Abstract: A method of contraception and a pharmaceutical package for effecting the method are disclosed. The method comprises a three phase sequence of estrogen/progestogen administration which is a daily sequence of unit dosages over a repeating cycle, which dosage sequence comprises, for one cycle:(a) administering, as phase one, about 20-40 .mu.g of ethinyl estradiol, (or of other estrogen in an amount

sufficient to result in an equivalent effect) and about 0.3-0.8 mg of norethindrone (or of other progestogen in an amount sufficient to result in an equivalent effect) each day for 5-8 days, followed by;(b) administering, as phase two, the same dosage of estrogen and twice the dosage of progestogen each day as was administered each day in phase one, for 7-11 days, followed by;(c) administering, as phase three, the same dosage of estrogen and the same dosage of progestogen each day as was administered each day in phase one, for 3-7 days, followed by;(d) administering, as phase four, no therapeutically active dosage, i.e. either no treatment or a placebo each day for 6-8 days,with the proviso that the total number of days in phases one through three is 21.

Excerpt(s): The present invention relates to novel methods and articles of manufacture which are packages containing compositions useful for effecting contraception in the human female. More particularly, the invention is directed to achieving contraception by administering a sequential dose of estrogen and progestogen, which includes a peak dosage of progestogen at approximately the mid-point of the menstrual cycle. ... A number of regimens for controlling ovulation and conception by administering hormones are known, and are available commercially. Some of these are based on consistent dosage, throughout the administration period, of either estrogen or progestogen or both. Others are directed to biphasic treatments whereby the amounts of either or both of these hormones are increased or decreased at some point during the cycle. Closest to the regimen of the present invention are those administration programs which involve both progestogen and estrogen, and vary the amounts of either or both hormones such that a three-phase program is maintained. Methods of contraception which fit this description are found in U.S. Pat. Nos. 3,795,734 to American Home Products; 4,066,757 to Ortho; 3,957,982 to Schering A. G.; and German Pat. No. 2,431,704 to Asche. Of the aforementioned patents, that closest to the present invention is the Schering patent which describes a peak dosage of estrogen at the middle of the administration interval. ... The present invention is designed so as to minimize the side effect of breakthrough bleeding by optimizing the amount of progestogen administered at the mid-point of the cycle.

Web site: http://www.delphion.com/details?pn=US04390531__

- **Method of hormonal contraception**

Inventor(s): Ehrlich; Marika (Bahnhofstr. 1, D55234 Framersheim, DE), Kuhl; Herbert (Hotzelstr. 18, D63741 Aschaffenburg, DE)

Assignee(s): none reported

Patent Number: 5,662,927

Date filed: December 21, 1994

Abstract: A method for hormonal contraception having a first hormonal component and a second hormonal component packaged separately in a packing unit and intended for short-term sequential administration, each of the hormonal components being composed of a plurality of daily hormone units separately packaged and individually removable in the packing unit. The first hormonal component contains almost exclusively an estrogen preparation as an active hormonal ingredient, effecting a disturbance of the follicle stimulation. The second hormonal component contains, in combination, an estrogen preparation and a progestogen preparation in a therapeutic amount sufficient for ovulation inhibition. The total number of daily hormone units is equal to the total number of days of the desired cycle, with the first hormonal component including 5 or 14 daily units and the second hormonal component including

23 or 14 daily units. The plurality of daily units of the first hormonal component is lower than the plurality of daily units of the second hormonal component, characterized by such an arrangement of the daily units in the packaging unit that the daily units of the second hormonal component are taken first and the daily units of the first hormonal component are taken thereafter. The daily units of the second hormonal component do not contain the combination of biologically produced estrogen and synthetic estrogen.

Excerpt(s): The present invention relates to a method of hormonal contraception. More particularly, the present invention relates to two hormonal components separately packaged in a packaging unit and intended for short-term sequential administration. The hormonal components are respectively composed of a plurality of daily hormone units packaged separately and individually removable in the packaging unit. The first hormonal component contains an estrogen preparation as an active hormonal ingredient that impairs follicle stimulation. The second hormonal component contains an estrogen preparation and a progestogen preparation in a dose at least adequate for inhibiting ovulation in combination, and the total number of daily hormone units is equal to the total number of days of the desired cycle. The first hormonal component comprises 5 or 14 daily units and the second hormonal component comprises 23 or 14 daily units. The plurality of daily units of the first hormonal component is lower than the plurality of daily units of the second hormonal component. ... German Letters Patent 41 04 385 discloses a method of inhibiting ovulation as well as a method for hormonal contraception of the above-described type, whereby the daily units of the first hormonal component are first administered and those of the second hormonal component are administered thereafter in daily succession, preferably for hormonal contraception within the desired cycle, on which the first daily unit of the first hormonal component of the next cycle is repeated upon exclusion of breaks in administration. ... An advantage of the present invention is that it provides continuous administration of the estrogen component, i.e., of the daily units of the first hormonal component. Heretofore, the method of ovulation inhibition has involved the administration-free interval of 6 or 7 days. It has been shown, however, that follicle stimulation is disturbed, but ovulation is not reliably prevented given initial employment of the method whereby the first hormonal component is given in a beneficially low dosage of the daily units in order to minimize the health risk. This low contraception reliability in the first administration cycle compared to the following administration cycles is based on the fact that the new follicle stimulation is already in the last part of the luteal phase of the preceding ovulation cycle when the endogenous gestradiol, the endogenous estradiol and the endogenous progesterone decrease.

Web site: http://www.delphion.com/details?pn=US05662927__

- **Method of manufacturing a disposable contraceptive intravaginal cervical barrier**

Inventor(s): Strickman; Robert L. (Lawrence Rd., R.D. 1, Bridgeton, NJ 08302), Fournier; Erick-Pierre (30 Park Ave., New York, NY 10016), Strickman; Melvyn B. (Lawrence Rd., R.D. 1, Bridgeton, NJ 08302)

Assignee(s): none reported

Patent Number: 4,311,543

Date filed: January 11, 1980

Abstract: Disposable contraceptive intravaginal cervical barriers of one, two, three, four, or five layers in the form of standard pessaries with at least one layer impervious to the passage of sperm, with a medicament such as spermicide, germicide, or an abortion

inducing agent either impregnated into a foam plastic layer or in the form of a layer of gel or powder, said medicament being activatable upon contact with an aqueous solution. Methods of producing disposable contraceptive barriers either as a wet foam plastic method wherein medicament is added to liquid foam and the resulting mixture is formed in a mold with any subsequent layers then added, or as a dry foam plastic method wherein layers including a layer of medicament in the form of a gel or a powder are superposed in sequence and formed in a die.

Excerpt(s): The present invention relates to the manufacture of disposable contraceptive intravaginal barriers. It also relates to the methods for making these disposable barriers. ... Recent incidence of complications with the intrauterine device (IUD) and the contraceptive pill has led women throughout the world to revert to reusable cervical contraceptive pessaries such as the diaphragm and other related cervical pessaries such as the cervical cap, the vault cap, and the vimule. These pessaries, although not as effective as the IUD and the pill preventing pregnancy, have shown no adverse physiological or systemic effects. ... Currently available cervical pessaries such as the diaphragm and related cervical pessaries are generally made in the form of a soft rubber cap with a metal spring embedded in the rim. These pessaries present certain disadvantages that operate to discourage their widespread use. Some of these disadvantages are as follows: their effectiveness is substantially lower than the pill, the IUD, and injectable hormones; prior to insertion they must be coated with spermicidal foam or jelly; after use they must be cleaned and properly stored (this requirement discourages their use especially in areas of the world where water is not readily available); and, because of the cost of spermicides, cervical pessaries can become expensive if used frequently.

Web site: http://www.delphion.com/details?pn=US04311543__

- **Methods and compositions for intravaginal contraception**

Inventor(s): Schmolka; Irving R. (Grosse Ile, MI)

Assignee(s): BASF Corporation (Wyandotte, MI)

Patent Number: 4,585,647

Date filed: November 19, 1984

Abstract: A pressurized contraception composition in an aerosol container and adapted to form a spray upon release of pressure therefrom which composition is a liquid inside the container and forms a gel on contact with living tissue and process employing same, whereby the composition comprises water, propellant, a polyoxyethylene-polyoxypropylene copolymer, and preferably a sperm function inhibitor.

Excerpt(s): After two decades of effort to devise satisfactory contraceptive methods which depend on metabolic control mechanisms (oral contraceptives and progestational inserts) or on intra-uterine mechanical disruption, i.e. intrauterine devices (IUD's); alternative methods which depend on barriers (diaphragms, condoms) and on topical application of spermicides or other contraceptives (intravaginal foams or suppositories) have not become obsolete, and are still in wide use. These methods attract considerable interest due to their safety, freedom from undesirable side effects, and relative accessibility, without the need for a physician's intervention. The present invention relates to compositions for, and methods of, contraception based on topical intravaginal application of spermicides or other antifertility agents which inhibit sperm function. ... Present formulations for intravaginal application of sperm function inhibitors are

designed to insure coverage of the entire vaginal vault with the active ingredient (usually a surfactant, and typically nonoxynol-9, a nonionic surfactant). ... One method for intravaginal application comprises supplying the contraceptive composition in the form of a gel.

Web site: http://www.delphion.com/details?pn=US04585647__

- **Methods of contraception**

Inventor(s): Ling; Nicholas C. (San Diego, CA)

Assignee(s): The Salk Institute for Biological Studies (San Diego, CA)

Patent Number: 5,037,805

Date filed: March 20, 1989

Abstract: Methods are disclosed for regulating ovulation or fertility in female mammals, for regulating spermatogenesis in males and for treating conditions such as endometriosis. Administration of effective amounts of an FSH-Inhibiting Protein (FSH-IP) can be used for female contraception and also for male contraception by preventing sperm production. FSH-IP, in its native form, is a glycosylated protein having an apparent molecular weight of about 50,000 Daltons (50kD) which inhibits the production of estradiol that would otherwise be stimulated by FSH in certain cells, such as granulosa cells. Antibodies to these FSH-IP proteins, preferably of monoclonal form can be produced using techniques presently known in the art and are useful for treatment to promote ovulation or superovulation in mammals, including humans and livestock.

Excerpt(s): This invention relates to the regulation of fertility, and more particularly to methods for male and female contraception using proteins which block the effect of FSH at the ovaries and testes and thereby prevent FSH from carrying out its normal function in the gonad. ... It is known that FSH is required for the maturation of ovarian follicles and testicular spermatogenesis, and that, in adults, circulating FSH regulates gonadal differentiation and steroidogenesis. However, increases in ovarian follicle growth are not always correlated with elevations of FSH levels in circulating blood serum. It is also known that a particular ovarian follicle that is destined to ovulate is derived from a fairly large number of growing follicles which are, in turn, selected from a still larger group of nonproliferating primordial follicles formed during fetal development. As a result, it is concluded that there is some selection process by which, during each ovarian cycle, one of these follicles destined to ovulate is activated. ... It has previously been postulated that there are proteins which suppress follicular response to gonadotropins such as FSH: diZerega et al., *J. of Clin. Endocrinol. Metab.*, 56, 1, 35-41 (1983), *J. of Clin. Endocrinol. Metab.*, 57, 4, 838-846 (1983), and *J. of Clin. Endocrinol. Metab.*, 54, 6, 1091-1096 (1982). It was hypothesized by these investigators that the dominant follicle may be secreting a substance that suppressed the responses of the other follicles to the FSH: diZerega et al., *J. Clin. Endocrinol. Metab.*, 56, 4, 147-155 (1983).

Web site: http://www.delphion.com/details?pn=US05037805__

- **Methods, composites and articles for contraception**

Inventor(s): Thoene; Jess G. (1308 Brooks St., Ann Arbor, MI 48103)

Assignee(s): none reported

Patent Number: 5,725,870

Date filed: January 16, 1996

Abstract: Vaginal application of cysteamine, cystamine, phosphocysteamine, or a pharmaceutically acceptable salt thereof is effective for contraception.

Excerpt(s): The present invention relates to methods, compositions, and articles, effective for contraception. ... Currently, there are a number of pharmaceutical compositions available for use as contraceptive agents. For example, the contraceptive foam Semicid, contains nonylphenoxypolyoxyethylene glycol (nonoxynol-9) as a contraceptive agent. However, nonoxynol-9 is irritating to mucus membranes and can cause cervico-vaginal irritation. This irritation increases the risk of infections, because it causes a disruption of the vaginal and cervical epithelial cell integrity (see Sex. Trans. Dis., vol. 18, p. 176 (1991)). Further studies have shown that nonoxynol-9 is not an effective anti-viral agent (see J. Med. Primatol, vol. 19, p. 401 (1990)). Thus, nonoxynol-9 is effective as a contraceptive agent but is irritating to the mucus membranes and serves to increase the risk of vital infection because of its irritant activity. ... The drawbacks of conventional contraceptive agents, such as nonoxynol-9, are discussed extensively in U.S. Pat. Nos. 5,387,611 and 5,380,523, which are incorporated herein by reference.

Web site: http://www.delphion.com/details?pn=US05725870__

- **Multi-colored contraceptive sheath**

Inventor(s): Lee; Calvin S. (2835 Sierra Grande St., Pasadena, CA 91107-3448)

Assignee(s): none reported

Patent Number: 6,367,477

Date filed: February 5, 2001

Abstract: A contraceptive sheath can provide extra leak protection by forming at least one latex film over the bulbous closed end of a latex sheath liner. A transparent elastic covering overlies the sheath outer surface to seal the latex films against separation from the latex liner.

Excerpt(s): This invention relates to contraceptive sheaths usable during sexual intercourse to prevent conception. ... Contraceptive sheaths have been devised for insertion over the male penis to prevent conception during sexual intercourse. Such contraceptive sheaths typically take the form of an elastic tubular sleeve having a bulbous closed end that traps the seminal fluid against escape from the sheath during sexual intercourse. ... Typically the contraceptive sheath is formed by dipping a glass mold into a molten bath of latex material. The mold is removed from the bath, so that some of the latex adheres to the mold surface. After drying, the latex is peeled from the mold to form the finished product.

Web site: http://www.delphion.com/details?pn=US06367477__

- **Multi-phase combination-type sequential preparation for oral contraception and method of oral contraception**

Inventor(s): De Jager; Evert (Oss, NL)

Assignee(s): Akzon N.V. (Oss, NL)

Patent Number: 4,378,356

Date filed: March 16, 1981

Abstract: The invention relates to a multiphase combination-type sequential preparation for oral contraception consisting of 20-22 tablets each containing a gestagen and an oestrogen wherein a first phase consists of 5-8 tablets, each of which contains a low dose of gestagen and a relatively high dose of oestrogen, a second phase of 5-8 tablets each having a gestagen dose which is greater than that during the first phase and an oestrogen dose which is smaller than that in the first phase, and a third phase of 5-11 tablets each of which has a gestagen dose equal to or greater than that during the second phase and an oestrogen dose equal to or less than that in the second phase, and to a method of oral contraception using said preparation.

Excerpt(s): The invention relates to a multi-phase combination-type sequential preparation for oral contraception consisting of 20-22 tablets (daily dose units), each comprising a gestagen and an oestrogen and to a method of oral contraception using said preparation. ... Oral contraceptives of the "combination-type" for sequential or cyclic use are generally known, for example the preparations "Lyndiol", "Ovulen", "Anovlar", "Neogynon", "Stediril", "Ovostat" and similar combinations of a gestagen and an oestrogen. Such combination-type preparations consist normally of 20-22 tablets of the same composition for daily dosage (each day one tablet), which is followed by a tablet-free period of 5-7 days which completes the natural female cycle of roughly 28 days. During the tablet-free period, withdrawal bleeding occurs. After the tablet-free period a new cycle is started using the combination-type preparation. The tablet-free period can if required be supplemented by placebos, such as for example is the case with the combination-type preparation "Pregnon 28". Multi-phase combination-type sequential preparations, whereby different quantities of gestagen and/or oestrogen are employed during the different phases, are also known. Thus in U.S. Pat. No. 3,939,264 a description is given of a two-phase combination-type preparation for oral contraception, consisting of 21-23 tablets, where the first 10-12 tablets each comprise a quantity of gestagen, which in activity corresponds with 0.050-0.125 mg of d-norgestrel, and a quantity of oestrogen which corresponds as regards activity with 0.030-0.050 17.alpha.-ethinyloestradiol (EE), and each of the following 11-9 tablets contains a quantity of gestagen which is 2-3 times greater than that during the first phase, the quantity of oestrogen remaining the same. An attempt is made in this manner to obtain better adaptation to the natural female cycle, while a continuous, constant dosage of oestrogen is employed. In this way good contraceptive effect with reduced side effects should be obtained. ... A variation on this two-phase combination-type sequential preparation is described in U.S. Pat. No. 3,969,502. The difference here is that the quantity of oestrogen per tablet in the second phase is greater than that in the first phase, with a maximum of two times as great, so that not only the gestagen but also the oestrogen is administered in phased fashion. With this preparation there should be less oestrogen-dependent side effects.

Web site: http://www.delphion.com/details?pn=US04378356__

- **Multistage combination preparation and its use for oral contraception**

Inventor(s): Lachnit-Fixson; Ursula (Berlin, DE), Unger; Renate (Berlin, DE)

Assignee(s): Schering Aktiengesellschaft (Berlin and Bergkamen, DE)

Patent Number: 4,621,079

Date filed: December 21, 1984

Abstract: A multistage combination preparation is useful for oral contraception and comprises a surprisingly low amount of gestodene as the gestagen and comprises ethinylestradiol as the estrogen.

Excerpt(s): This invention relates to a multistage combination preparation made up of 21 or 28 units, each to be administered on separate days, and its use for oral contraception for females of child bearing age. ... Multistage combination preparations for oral contraception are known, for example, from DE-A No. 2,365,103 (U.S. Pat. No. 3,957,982) and the patents derived therefrom. Usually two or three stages are involved. These multistage preparations consist of 21 or 28 dragees, and contain, in the first stage, 4-6 dragees wherein each dragee contains an amount of estrogen corresponding to 0.02-0.05 mg of ethinylestradiol, and an amount of gestagen (progestogen) corresponding to 0.04-0.09 mg of d-norgestrel; in the second stage, (which can be a continuation of the first in essence), 4-6 dragees each containing onefold to twofold the amount of estrogen of the first stage, for example 0.03-0.05 mg of ethinylestradiol, and onefold to one and one-half-fold the amount of gestagen of the first stage, for example 0.05-0.125 mg of d-norgestrel; and, in the third stage, 9-11 dragees each containing an amount of estrogen that is larger than or exactly as large as that in the first stage and smaller than or exactly as large as in that in the second stage, for example, 0.025-0.050 mg of ethinylestradiol, and an amount of gestagen larger than that in the second stage, but no larger than three times as large as that in the first stage, for example 0.10-0.25 mg of d-norgestrel, and optionally, in the fourth stage, 7 dragees without estrogen and without gestagen. The number of dosage units in the three stages which contain estrogen and gestagen amounts to 21; to adapt to the 28-day cycle, 7 units free of active ingredient can be additionally included with the 21 units containing active agent. ... Such multistage preparations provide higher compatibility and improved cycle control as compared with the known combination preparations for cyclic or sequential usage.

Web site: http://www.delphion.com/details?pn=US04621079__

- **No hands contraceptive device**

Inventor(s): Broad, Jr.; Robert L. (2300 Brookwood Dr., SE, Decatur, AL 35601)

Assignee(s): none reported

Patent Number: 4,987,905

Date filed: January 23, 1989

Abstract: A contraceptive device wherein a condom having a rolled portion is positioned between a pair of sheets which are secured together around the edges thereof to form a package for the condom, the condom being provided with a pair of strips positioned on opposite sides of the condom and each having one end helically rolled into the rolled portion of the condom and the other end thereof extending toward and secured to the sheets at the edges thereof. The strips, which are pulled to unroll the condom, and the condom are provided with sufficient give that the package can be torn

into two parts and the condom pulled out of the package without premature unrolling. A tear guide extends across the package at a position on the package coordinated with slack in the strips. Preferably, the strips have a width sufficient to cause the rolled portion of the condom to assume a generally elliptical configuration having a major and minor axes, with the strips extending from the rolled portion of the condom in directions lying between the directions of the axes.

Excerpt(s): This invention relates to contraceptive devices. ... Condoms are not only used to prevent conception but also serve another purpose in that they inhibit the spread of a number of sexually transmitted diseases. ... Most of the condoms now on the market are purchased in a sealed packet and are liberally coated with a lubricant. The user tears open the packet, removes the condom and then, using his hands, unrolls the condom onto his penis. One disadvantage of this is that the user cannot avoid having a large part of the lubricant wind up on his hands, an undesirable situation. Also, lubricated condoms are very slippery. This makes them difficult to put on and causes the donning to take an excessive amount of time. These problems have existed for decades.

Web site: http://www.delphion.com/details?pn=US04987905__

- **Non-hormonal method of contraception**

Inventor(s): Conti; Marco (Stanford, CA), Hsueh; Aaron J. W. (Stanford, CA), Tsafiriri; Alexander (Rehovot, IL)

Assignee(s): The Board of Trustees of the Leland Stanford Junior University (Stanford, CA)

Patent Number: 6,110,471

Date filed: September 12, 1997

Abstract: A method of contraception by delivering to the ovaries of a female mammal a pharmaceutically-effective dose of a PDE3-specific inhibitor at about the time of ovulation.

Excerpt(s): The present invention relates to methods of contraception. In particular, the invention relates to methods of contraception which prevent the oocyte from maturing. ... Alvarez, R., et al., Mol. Pharmacol. 29:554-560 (1986). ... Beavo, J. A., and Reifsnnyder, D. H., Trends. Pharmacol. Sci. 11:150-155 (1990).

Web site: http://www.delphion.com/details?pn=US06110471__

- **Novel cyclic progestogen-interrupted estrogen oral contraceptive regimens**

Inventor(s): Segre; Eugene J. (Los Altos, CA)

Assignee(s): Syntex Corporation (Panama, PM)

Patent Number: 3,932,635

Date filed: May 5, 1972

Abstract: This invention relates to a method of fertility control by use of novel cyclic progestogen-interrupted estrogen oral contraceptive regimens. Considering the first day of menstrual flow as day one of a 28 day medication administration cycle, a combined formulation of estrogen and progestogen substances is administered on the 3rd, 4th, 5th or 6th day of the cycle and every second or third day thereafter through, and including,

the 23rd, 24th, 25th, 26th, 27th or 28th day of the cycle, and a formulation having only a progestogen substance as the active component is administered on the 4th, 5th, 6th, or 7th day of the cycle and every day thereafter on which a combination formulation is not administered, through, and including, the 22nd, 23rd, 24th, 25th, 26th, 27th or 28th day of the cycle. In a particular regimen, a combination of estrogen and progestogen is administered starting with the 5th day of the cycle and continuing every other day through the 25th day of the cycle, and starting with the 6th day of the cycle and continuing every other day through the 24th day of the cycle only progestogen is administered. The remaining seven days are dosage-free or the regimen is completed by use of placebos or other nonhormonal supplements. Dispensing packages for holding unit dosage forms for oral ingestion of one unit dosage form daily in the appropriate sequence during a single cycle of medication administration are also described.

Excerpt(s): The present invention relates to a method of fertility control in the human female by adherence to a novel oral contraceptive regimen. The regimen includes the administration of a combination of an estrogen and a progestogen during certain days of the reproductive cycle, and the administration of only the progestogen on certain of the other days of the cycle. ... Research and development in the area of human contraception or fertility control has heretofore concentrated almost exclusively on preventative methods, whether in the form of chemical or physical diversions or barriers to sperm transport, e.g., vaginal creams and foams, condoms, diaphragms, and intrauterine devices, or in the form of chemically based oral contraceptive. The former methods have been largely supplanted by the use of oral contraceptives which have proven to be extremely effective in the prevention of conception. This effectiveness, however, necessarily requires the administration of the oral contraceptive tablets over approximately 21 days of each reproductive cycle. During the remaining 7 days of the 28 day cycle, no hormone-containing tablets are given and it is during this period, if the reproductive cycle is accurately regulated, that normal menstrual flow takes place. ... The most common form of oral contraception is based upon the daily administration of a combination of estrogen and progestogen substances for about 21 successive days, starting generally on the 5th day of the menstrual cycle. After the 21 day period, there follows a 7 day period during which neither the estrogen or progestogen substances are taken. If the reproductive cycle of the female has been properly regulated, the normal and characteristic menstrual flow is supposed to, and generally does, occur within the 7 day period.

Web site: http://www.delphion.com/details?pn=US03932635__

- **Oral contraceptive**

Inventor(s): Gast; Michael J. (Phoenixville, PA)

Assignee(s): American Home Products Corporation (Madison, NJ)

Patent Number: 5,858,405

Date filed: July 2, 1997

Abstract: This invention provides a bridged triphasic combination progestin/estrogen oral contraceptive regimen comprising the administration of a contraceptive progestin/estrogen combination for 23-25 days consecutive days beginning on the first day of menses, followed by the administration of an estrogen for 3-5 days following the administration of the estrogen/progestin combination, so that the total period of administration is 28 days per 28 day cycle. Particularly preferred progestins of this invention are trimegestone, dienogest, and drospirenone.

Excerpt(s): This application claims the benefit of U.S. Provisional Application No. 60/022,624, filed Jul. 26, 1996. ... The vast majority of oral contraceptives consist of a combination of a progestin and estrogen that are administered concurrently for 21 days followed either by a 7 day pill free interval or by the administration of a placebo for 7 days in each 28 day cycle. The most important aspects of a successful oral contraceptive product are effective contraception, good cycle control (absence of spotting and breakthrough bleeding and occurrence of withdrawal bleeding), and minimal side effects. Combination oral contraceptives have traditionally acted by suppression of gonadotropins. In addition, it appears that the progestin component is primarily responsible for contraceptive efficacy through inhibition of ovulation, and other peripheral effects which include changes in the cervical mucus (which increase the difficulty of sperm entry into the uterus) and the endometrium (which reduce the likelihood of implantation). The estrogenic component intensifies the anovulatory effect of the progestin, and is also important for maintaining cycle control. ... Since the introduction of oral contraceptives (OCs) over a quarter-century ago, research has been directed toward developing preparations that minimize the potential for side effects while maintaining efficacy and normal menstrual patterns. The first-generation OCs contained more progestin and estrogen than was necessary to prevent conception. Adverse hemostatic and metabolic changes, clinical problems, and side effects were associated with these high-dose preparations. In 1978, the World Health Organization (WHO) recommended that the focus of OC research should be the development of products containing the lowest possible dose levels of estrogen and progestin.

Web site: http://www.delphion.com/details?pn=US05858405__

- **Oral contraceptive regimen**

Inventor(s): Pasquale; Samuel A. (Basking Ridge, NJ)

Assignee(s): Ortho Pharmaceutical Corporation (Raritan, NJ)

Patent Number: 4,066,757

Date filed: March 26, 1973

Abstract: An oral contraceptive regimen in which a progestin is administered from the fifth through the twenty-fifth day of the physiological cycle is described. The amount of progestin administered is serially increased during the period of administration; regular menses occurs when administration of the regimen is complete.

Excerpt(s): The oral contraceptive methods which are currently accepted fall into three categories, i.e. combination cyclic regimens, sequential cyclic regimens and continuous low dose progestin regimens. ... In the combination oral contraceptive regimen, an individual daily dose containing both a progestin and estrogen is prescribed for daily use over a period of 20 or 21 days, followed by a 5 to 7 day period when neither is taken to allow for uterine bleeding of a menstrual type. After the bleeding phase, administration of the combination is continued. It is generally accepted that the administration of the ovarian hormones progesterone and estrogen is primarily responsible for suppressing ovulation through inhibition of gonadotropin secretion by the pituitary, as indicated by the reduced urinary pregnanediol excretion during the period of administration. Progestational change in the endometrium is stimulated to the extent that the stroma development progresses occasionally even to the decidual stage. ... In the sequential oral contraceptive regimen, an individual daily dosage of estrogen is administered to the patient during the first part of the cycle, i.e. from about day 5 through day 15. Then, in the last 6 or 7 days of the cycle, a combination of estrogen and

a progestin is administered as in the combination type. This therapy thus mimics the normal menstrual pattern which is characterized by a rise in estrogen levels during the first part of the cycle, the proliferative phase, and a rise in progestin levels during the second part of the cycle after ovulation, the secretory phase. In the sequential regimen, it is the estrogen which suppresses ovulation by depressing the follicle-stimulating hormone (F.S.H.) levels which in turn prevents the follicles from maturing. Therefore, the luteinizing hormone (L.H.) output of the pituitary has no opportunity to induce ovulation. This is in contrast to the combination oral contraceptive regimen in which both F.S.H. and L.H. pituitary secretion are suppressed. The progestin is also administered during the last six or seven days of treatment to induce changes in the endometrium closely resembling the progesterone influence in the secretory stage of the normal cycle; thus the irregular withdrawal bleeding which is associated with the use of estrogens alone is avoided. At the end of the administration of medication there is a sluffing-off of the endometrial lining in a fashion which mimics normal menstruation.

Web site: http://www.delphion.com/details?pn=US04066757__

- **Oral male contraceptive composition**

Inventor(s): Coulson; Patricia B. (7417 Sheffield Dr., Knoxville, TN 37919)

Assignee(s): none reported

Patent Number: 4,381,298

Date filed: October 13, 1981

Abstract: A male contraceptive composition is described that may be administered orally. This permits adjusting the dose of the constituents to provide for sperm production inhibition and for normal functioning of secondary sex glands to permit normal sexual activity without fertility. The constituents of the composition are gossypol or derivatives thereof for controlling the sperm production combined with an orally active replacement androgen for counteracting the effect of the gossypol or its derivatives upon secondary sex glands. Ranges of composition and discussions of test results are described together with the method of determining the dose levels needed to achieve the desired result. The composition may be preferably administered as a pill. A maintenance dose level may be utilized after azoospermia sperm levels are achieved.

Excerpt(s): This invention relates generally to compositions for inhibiting fertility in mammals and more particularly to an orally administered composition for substantially inhibiting sperm production in males without inhibiting any other sexual activity. ... An acceptable male contraceptive composition should satisfy the following criteria. Primarily, it should provide complete antifertility activity during treatment and be completely reversible after discontinuation of treatment. At the same time, it should not affect the secondary sex organs thereby permitting normal sexual performance such as erection, ejaculation, libido, etc. Also, the composition should be easily administered, such as orally, for convenience in use, and should cause no uncomfortable, biologically significant or harmful long-term side effect. ... To date, there are no oral male contraceptive treatments which are safe, reliable, and clinically or commercially available for males, i.e., approved by the United States Federal Drug Administration. Many compounds or medicines have been shown to cause the inhibition of sperm production (azoospermia) in experimental animals but many of these have either mutagenic or carcinogenic side effects. Others such as Danocrine must be given by injection, and will induce impotency along with the reduced sperm count.

Web site: http://www.delphion.com/details?pn=US04381298__

- **Ovulation-inhibiting preparation for hormonal contraception**

Inventor(s): Ehrlich; Marika (Bahnhofstrasse 1, 6509 Framersheim, DE), Kuhl; Herbert (Hotzelstrasse 18, 8750 Aschaffenburg, DE)

Assignee(s): Ehrlich; Marika (Fremersheim, DE), Kuhl; Herbert (Aschaffenburg, DE)

Patent Number: 5,510,341

Date filed: October 6, 1993

Abstract: An ovulation-inhibiting preparation for hormonal contraception, comprising two hormone constituents packed spatially separate in a packing unit intended for chronological, sequential oral administration, said constituents each comprising a plurality of daily hormone units accommodated spatially separate and individually removable in the packaging unit. The first hormone constituent consists essentially of an estrogen preparation which effects a disturbance of the follicle stimulation; the second hormone constituent consists of an estrogen preparation and a gestagen preparation in a dose at least adequate for inhibiting ovulation. The total number of daily hormone units is equal to the total number of days in the desired cycle, and the number of daily units of the first hormone constituent is less than the number of daily units of the second hormone constituent. The first hormone constituent comprises 5 to 14 daily units, and the second hormone constituent comprises 23 to 14 daily units.

Excerpt(s): The present invention relates to a preparation for hormonal contraception. More specifically, the present invention relates to an ovulation-inhibiting preparation for hormonal contraception. ... Hormonal ovulation inhibitors, which are orally administered in daily units, include combination preparations and sequential preparations. In combination preparations, a combination of an estrogen preparation and a gestagen preparation is administered for 21 days in constant or alternating, or absolute and/or relative dosing, to the extent that the desired cycle duration is 28 days. The estrogen preparation can be a natural estrogen or a synthetic ethinyl estradiol. After the administration of the aforementioned 21 daily units, this dosing is followed by a 7-day pause, whereby withdrawal bleeding simulating the natural menses occurs. ... With typical sequential preparations that are given during a desired cycle duration of 28 days, a pure estrogen preparation is administered for 7 days and then a combination of an estrogen preparation and a gestagen preparation is administered for 15 days. An administration-free time of, for example, six days follows, during which withdrawal bleeding occurs. Although it is known to bridge the administration pause time in the combination and the sequential preparations with placebos for the sake of greater reliability of administration, no hormones of the type previously discussed have been administered during the approximately one-week administration pause to guarantee reliable withdrawal bleeding.

Web site: http://www.delphion.com/details?pn=US05510341__

- **Package for oral contraceptive tablet**

Inventor(s): Urheim; John E. (Lincolnshire, IL)

Assignee(s): Gynex, Inc. (Deerfield, IL)

Patent Number: 4,958,736

Date filed: March 18, 1986

Abstract: The present invention contemplates a package for oral contraceptive tablets. The package contains four rows of seven tablets per row. Three adjacent rows contain active contraceptive tablets, while the fourth row contains placebo tablets. A line of severability is provided between the row of placebo tablets and an adjacent row of active tablets, thereby enabling dispensing 21-day and 28-day oral contraceptive formulations using a single package.

Excerpt(s): This invention relates to packages for oral contraceptive tablets. ... Conventional oral contraceptives are administered on a repeating 28 day cycle. Contraceptive tablet taking generally begins on the fifth day of the menstrual cycle or on the first Sunday after menstruation begins, continues for a total of 21 days and begins again after seven days without contraceptive tablets. The patient thereafter takes a tablet each day for three weeks, takes no contraceptives for one week, and begins another 28 day cycle of three weeks of tablet taking and one week without tablets for the desired duration of contraceptive treatment. ... Some physicians prefer to prescribe 21 tablet packages and have the patient go without tablets for seven days each cycle. Other physicians prefer 28 tablet packages containing seven placebo tablets to facilitate proper tablet administration.

Web site: http://www.delphion.com/details?pn=US04958736__

- **Pharmaceutical combined preparation, kit and method for hormonal contraception**

Inventor(s): Schmidt-Gollwitzer; Karin (Berlin, DE), Klemann; Walter (Berlin, DE)

Assignee(s): Schering Aktiengesellschaft (Berlin, DE)

Patent Number: 6,312,722

Date filed: January 3, 2000

Abstract: The present invention describes a two-stage pharmaceutical combined preparation for hormonal contraception containing at least 30 daily unit doses, which preparation, in its first stage, comprises as hormonal active ingredient a combination of an oestrogen preparation and, in a dose that is at least sufficient to inhibit ovulation, a gestagen preparation, in single stage form and, in the second stage comprises as hormonal active ingredient an oestrogen preparation only, wherein the first stage comprises a minimum of 25 and a maximum of 77 daily discrete or continuous unit doses and the second stage comprises 5, 6 or 7 daily discrete or continuous unit doses, and wherein the total number of daily units is equal to the total number of days of the desired cycle of a minimum of 30 and a maximum of 84 days. This combined preparation, in the form of a monthly pack, which is used for female fertility control, permits as low as possible an oestrogen content in each individual unit dose and also has a low total hormone content per cycle of administration, with high contraceptive reliability, low incidence of follicle development, and satisfactory cycle control with reliable avoidance of intermediate bleeding as well as undesired side effects.

Excerpt(s): The present invention relates to a two-stage pharmaceutical combined preparation for hormonal contraception containing at least 30 daily unit doses, which preparation, in its first stage, comprises as hormonal active ingredient a combination of an oestrogen preparation and, in a dose that is at least sufficient to inhibit ovulation, a gestagen preparation, in single stage form and, in the second stage comprises as hormonal active ingredient an oestrogen preparation only, wherein the first stage comprises a minimum of 25 and a maximum of 77 daily discrete or continuous unit doses and the second stage comprises 5, 6 or 7 daily discrete or continuous unit doses, and wherein the total number of daily units is equal to the total number of days of the desired cycle of a minimum of 30 and a maximum of 84 days, and relates also to a corresponding pack (contraceptive kit) containing that combined preparation, and to a contraceptive method that uses the above contraceptive preparation. ... Oral contraceptives in the form of combined preparations have been known since 1960 as so-called monophasic preparations. Those preparations consist of 21 unit doses that comprise active ingredient and 7 tablets or dragees that are active ingredient-free. The daily unit dose is composed of an oestrogen and gestagen. In monophasic preparations the dose of active ingredient to be administered daily is the same in each unit dose. If the dose that is to be administered daily of the active components in the individual unit doses is different in individual sections over the administration cycle, then the preparation is referred to as a so-called multi-phase preparation. Triquilar.RTM. may be mentioned as an especially well-known example (DE-AS 23 65 103). ... (3) a minimum of undesired side effects should be ensured.

Web site: http://www.delphion.com/details?pn=US06312722__

- **Polymeric acid contraceptive devices**

Inventor(s): Barrows; Thomas H. (Cottage Grove, MN)

Assignee(s): Minnesota Mining and Manufacturing Company (St. Paul, MN)

Patent Number: 4,360,013

Date filed: April 21, 1980

Abstract: A disposable non-woven sponge vaginal contraceptive device is made of alginic acid or related polysaccharides bearing carboxylic acid functionality and a method of making same is disclosed.

Excerpt(s): The present invention relates to a disposable non-woven sponge vaginal contraceptive device particularly suited as a chemical and mechanical barrier to the passage of sperm into the female uterine cavity. ... Due to increasing concern about the side effects of oral contraceptives and IUD's, there is renewed interest in barrier contraceptives by health care providers, government regulatory officials and consumers. Barrier methods of contraception have been in scientific eclipse for almost two decades but there has been a recent shift of interest back to these traditional methods of fertility regulation. ... The prior art is replete with intravaginal materials useful as contraceptives and medicaments. The goal in these contraceptive methods has been to provide an effective, efficient and convenient means of preventing sperm from reaching the cervical uterine canal. The normal vagina maintains an acid pH of from 4 to 5 and in this environment spermatozoa have motility and viability for a relatively short period of time, i.e. about 1 to 2 hours. On the other hand, sperm maintain their motility and viability in the uterine cervix for up to 48 hours. The objective of all barrier contraception is to prevent sperm from entering the uterine cervix and subsequently fertilizing an ovum in the fallopian tube.

Web site: http://www.delphion.com/details?pn=US04360013__

- **Porous contraceptive device with an interstitial liquid**

Inventor(s): Lutz; Peter L. (561 Satinwood Dr., Miami, FL 33149), Richard; Joseph D. (3647 St. Gaudens Rd., Miami, FL 33133)

Assignee(s): none reported

Patent Number: 4,527,988

Date filed: September 20, 1982

Abstract: An improved contraceptive device comprising a condom of conventional shape and material such as latex. A large number of small holes in the condom allow the transfer of hormonal, pheromonal, and other bio-active fluids during sexual intercourse. The cross sectional diameter of the holes is made small enough to impede the passage of human spermatozoa so that the contraceptive function is retained.

Excerpt(s): Although latex condoms are less expensive and more convenient to use, the relatively more expensive condoms made of animal membranes, such as sheep intestine, are still widely used throughout the world. In fact, they are preferred by the cognocenti despite their several disadvantages. The widespread preference for these so called "natural skins" is generally attributed to their superior thermal conductivity. However, thermodynamic considerations indicate that an appreciable temperature gradient across even a relatively thick latex condom can persist for only a very brief period after intromission. This observation, along with recent research findings, has led us to the more rational conclusion that the enhanced sensitivity of natural membrane condoms is largely, if not solely, attributable to their permeability. Thus, the diffusion of one or more bio-active fluids, possibly including pheromones, through the natural membrane provides the subtle yet widely appreciated sensory advantage over impermeable latex. The object of this invention is to provide a condom of artificial material such as latex which has all the advantages of permeability while still retaining the contraceptive function. ... The present invention provides an improved condom of latex or other suitable material which is made artificially permeable by the inclusion of a large number of small uniformly sized holes. The cross sectional diameter of the holes is kept small enough to impede the passage of human spermatozoa, while at the same time allowing the diffusion of at least some of the bio-active fluids secreted during sexual intercourse. Because of the small size of the human spermatozoon, conventional methods of punching holes in elastic material are unsuitable for this application. In the preferred method of making contraceptive devices according to the present invention, a low power pulsed laser is used to burn (or ablate) small and uniformly sized holes in the condom, preferably while it is still mounted on the forming mandrel. ... From the foregoing it will be seen that the present invention provides a porous condom of synthetic material which has at least some of the advantages of condoms made of animal membranes. Although a particular condom shape and pattern of holes is shown in the drawing for purposes of illustration, many alternatives to the details shown are possible. For example, as an alternative to the use of a simple aqueous solution with a wetting agent in the pores to facilitate diffusion of other fluids, a spermicide can be added to increase the contraceptive safety factor. Alternatively, other aqueous solutions (or other liquids) can be used to fill the holes in the porous condom. As a further alternative, the fluid within the holes can be omitted entirely.

Web site: http://www.delphion.com/details?pn=US04527988__

- **Primate intra-acrosomal sperm antigen for use in a contraceptive vaccine**

Inventor(s): Herr; John C. (Charlottesville, VA), Wright; Richard M. (Palmyra, VA)

Assignee(s): University of Virginia (Charlottesville, VA)

Patent Number: 5,753,231

Date filed: October 30, 1995

Abstract: A substantially purified intra-acrosomal primate sperm antigen useful in a contraceptive vaccine is disclosed herein. The antigen remains associated with primate sperm after the acrosome reaction. In particular, it remains associated with the inner and outer acrosomal membranes. Modified antigens and fragments thereof prepared by protein modification techniques are also disclosed as well as methods for purifying and using the antigens. Also disclosed are monoclonal and polyclonal antibodies to the antigen and methods of making and using such antibodies. Methods of use include purification of the antigen or use in various diagnostic techniques. Also disclosed are cDNA, expression vectors, and transformed microorganisms that produce the antigen.

Excerpt(s): This invention relates to contraceptive vaccines. In particular, it relates to a class of intra-acrosomal human and other primate sperm antigens for use in contraceptive vaccines, a class of monoclonal and polyclonal antibodies to the antigens, and related methods of making and using the antigens and antibodies, including a cDNA expression system for the production of the antigens in vitro. ... Several publications are referenced herein by Arabic numerals within brackets or parentheses. Full citations for these references may be found at the end of the specification immediately proceeding the claims. The disclosures of these publications are hereby incorporated herein by reference in their entirety unless otherwise noted. ... Antibodies to sperm have been implicated in human infertility, and the deliberate immunization of animals with sperm or mature testis extracts has resulted in a significant inhibition of fertility. Accordingly, researchers have actively pursued the study of sperm antigens in the hopes of identifying a germ cell specific antigen that can be used as an immunogen in a contraceptive vaccine. The approach of identifying gamete specific antigens has the advantage over other approaches, such as the HCG vaccine, of being a pre-fertilization vaccine--one which induces immunity which blocks fertilization as opposed to attacking the early embryo.

Web site: http://www.delphion.com/details?pn=US05753231__

- **Progestogen-only contraceptive**

Inventor(s): Bergink; Engelbert W. (Oss, NL), Bennink; Herman J. T. C. (Driebergen, NL)

Assignee(s): Akzo Nobel N.V. (Velperweg, NL)

Patent Number: 5,461,041

Date filed: January 19, 1994

Abstract: Disclosed is an oral contraceptive regimen containing daily dosage units each containing from 70 to 80 micrograms of desogestrel, 3-ketodesogestrel or mixtures thereof. It has been found that by making a selection of desogestrel or 3-ketodesogestrel at the described dosages in an oral contraceptive regimen administered over the entire menstrual cycle (e.g. 28 days), effective ovulation inhibition is achieved and

intermenstrual bleeding is avoided, while acceptable cycle control is retained. Moreover, the regimen also prevents the formation of persistent ovarian cysts.

Excerpt(s): The invention relates generally to contraceptive preparations, and more specifically to a contraceptive regimen involving only the administration of desogestrel, 3-ketodesogestrel or mixtures thereof. ... It has been known for some time that contraception can be achieved by the oral administration of sufficient quantities of a progestogen to a female of child-bearing age. ... For example in French Patent Application No. 2,223,018 to Ortho Pharmaceutical, a progestogen is administered from at least the fifth day to the twenty-fifth day of the menstrual cycle, the dosage of the progestogen being greater during the last seven days of administration than it is in the first seven days.

Web site: http://www.delphion.com/details?pn=US05461041__

- **Recombinant birth control vaccine**

Inventor(s): Talwar; Gursaran Prasad (c/o National Institute of Immunology, Shadid Jeet Singh Marg, New Delhi, IN), Srinivasan; Jay (Dept. of Biology, Washington University Campus, Box No:1137, One Brookings, St. Louis, MO 63130-4899), Chakrabarti; Sekhar (c/o The National Institutes of Health, (Room 237, Building 4)

Assignee(s): none reported

Patent Number: 5,733,553

Date filed: June 21, 1994

Abstract: A recombinant birth control vaccine comprising a beta subunit of chorionic gonadotropin, a recombinant luteinizing hormone or a mixture thereof has been developed. This recombinant birth control vaccine may also act as a vaccine against a protein or peptide unassociated with the mammalian reproductive system, such as a protein or peptide associated with a disease organism such as hepatitis B.

Excerpt(s): Population is growing at a rapid pace in many economically developing countries and there is a continuing need of an alternate method for regulation of fertility. We proposed several years back a birth control vaccine which induces the formation of antibodies against the human pregnancy hormone, the human chorionic gonadotropin (hCG). These inventions are described in patents issued in India, U.S.A. and several other countries. (Ref. EP 204566, JP 62286928, CA 1239346, U.S. Pat. No. 4,780,312, CN 8603854). We describe now another invention which generates antibody response of a long duration against hCG after a single or a limited number of injections. ... Whereas the possibility of controlling fertility by raising antibodies against hCG is known from our previous studies and those of others, the vaccines utilized earlier were conjugates of two or more peptides such as the natural beta hCG peptide of 145 amino acids linked to tetanus toxoid or other carriers. In another modality, the beta hCG peptide was associated with alpha oLH and then linked to carriers (Talwar et al 1988; U.S. Pat. No. 4,780,312). These vaccines demand purification and preparation of the constituent proteins from natural sources. The cost of some of these is at present very high which will be restrictive to their large scale use in family planning programs of economically developing countries. Moreover these vaccines demand three injections for primary immunization followed by a fourth as booster. A major advantage of the present embodiment is the possibility of getting satisfactory and sustained antibody response with one primary injection and at most one booster. Another interesting feature is the low cost at which this vaccine can be prepared and made available for

large scale use. ... Vaccinia virus is well known as a versatile tool for molecular biologists. In the New Scientist dated 3 Dec., 1988 (Anon, p.38) an article refers to a new vaccine for rinderpest virus in cattle and states that the vaccine is a genetically engineered version of the vaccinia virus, researchers having transformed two genes coding for the coating of rinderpest virus into the vaccinia virus.

Web site: http://www.delphion.com/details?pn=US05733553__

- **Slip-resistant contraceptive male condom**

Inventor(s): Delson; David A. (Seattle, WA)

Assignee(s): New Designs Corporation (Seattle, WA)

Patent Number: 5,513,654

Date filed: April 20, 1995

Abstract: The disclosed sheath-like contraceptive condom, even in a rolled-up condition suitable for packaging or use, has a high coefficient of friction on the surface that comes into contact with penile skin, particularly the portion of this surface contacting the glans and preferably also the shaft of the penis. The outer surface of the rolled condom, on the other hand, preferably has anti-blocking or release properties, so that it can be rolled up and unrolled without difficulty. The high coefficient of static friction (≥ 0.70 , preferably \geq about 1.0, according to ASTM Designation D 1894-90) on the interior surface provides reliable frictional engagement of at least the glans and preferably also the shaft of the penis, so that the condom clings to the contours of the penis and resists slippage during intercourse.

Excerpt(s): This invention relates to a male condom or prophylactic device which is to be used for preventing human conception and the transmission of infection, disease, and general contamination caused by exposure of a male sexual organ to a contaminated or problematic environment. Other aspects of this invention relate to methods for making and using the condom. ... It is likely that some form of contraceptive has been employed by man since prehistoric times. There is evidence that the ancient Greeks, Romans, and Egyptians used oiled animal bladders and lengths of intestines as sheaths, most probably for preventing both conception and disease. In some respects, even the most modern of condoms share some common features with these very ancient contraception and disease prevention devices, but the use of elastomers (e.g., natural or synthetic rubber sheaths, typically formed from latices) in modern times has opened the door to a variety of condom design concepts. Thus, while animal skin condoms are still commercially available, and synthetic elastomers are beginning to be introduced into the commercial marketplace, much of the patent literature is concerned with rubber latex sheaths. ... Although vulcanization of rubber has been known since the early 1840's, vulcanized rubber was not perfected as a means of condom manufacture until many decades after its discovery. By converting natural rubber from a generally linear polymer to a highly crosslinked material, vulcanization lowers the brittleness temperature; raises the tensile stress at significant elongations (e.g., 50-100%); raises the tensile strength of rubber to well over 1000 pounds per square inch, i.e., \geq about 7 megapascals (mPa), typically to ≥ 20 mPa; improves resistance to degradation at temperatures of ≥ 40 .degree. C.; improves elongation to at least 500%, more typically $\geq 600\%$, and thereby makes possible a relatively safe (breakage-resistant) but relatively thin (and hence disposable) condom, e.g., a condom with wall-thicknesses in the range of about 1 to 6 mils or about 0.03 to 0.15 millimeters (mm), more typically about 0.05 to 0.10 mm. Vulcanized natural rubber tensile strengths above 25 mPa are

readily achieved and can be superior to tensile strengths of synthetic polymers, although excellent physical properties are also obtainable with modern synthetic polymers (e.g., elastomeric polyurethanes which can, if desired, be highly crosslinked). Today, vulcanization can be effected either before or after a natural rubber latex is formed into a sheet (rubber which has been vulcanized while still in a particulate state is often referred to as "pre-vulcanized"). Thus, modern rubber technology offers the condom designer a range of possibilities which were unknown in this field as recently as the 1920's.

Web site: http://www.delphion.com/details?pn=US05513654__

- **Soluble contraceptive liquid formulation**

Inventor(s): Wong; George (Belle Mead, NJ), Wei; Shifeng (Belle Mead, NJ), Uang; Herling (Somerset, NJ)

Assignee(s): Ortho-McNeil Pharmaceutical, Inc. (Raritan, NJ)

Patent Number: 6,506,742

Date filed: December 1, 2000

Abstract: This invention provides a convenient process for preparing an oral contraceptive liquid formulation having improved solubility, bioavailability and stability useful as a reference standard.

Excerpt(s): This invention provides a process for preparing a pharmaceutically useful oral contraceptive liquid formulation. More particularly, this invention provides a convenient process for preparing a oral contraceptive liquid formulation using certain ingredients having improved solubility, bioavailability and stability and pharmaceutically useful as a reference standard for comparing the bioavailability of another oral contraceptive formulation. ... Pharmaceutical manufacturers are required to compare the bioavailability of dosage forms after formulation changes have been made. For example, the bioavailability of an approved formulation of a tablet batch produced at commercial scale is compared with that of a formulation for which approval is sought, hereinafter referred to as a "biobatch." A comparative bioavailability study must then be conducted wherein tablets from the approved and biobatch formulation are each administered to volunteers. Plasma samples are then drawn and the amount of active agent present is analyzed. For an agent that is metabolized quickly after absorption, though, relative bioavailability must be measured instead. The parent compound remains in such a low quantities for quickly metabolized agents that the plasma concentration cannot be measured due to analytical equipment limits of detection. Therefore, the amount of metabolite present serves as a measure of relative bioavailability. ... Relative bioavailability of a biobatch formulation is determined by using a reference standard that delivers a known and measurable quantity of the active agent. Such a reference standard may be in the dosage form of an IV solution, an oral solution or a tablet. Many steroid contraceptive drugs, however, are either poorly soluble or completely insoluble in water. Therefore, formulating an IV reference standard for such drugs is subject to many problems associated with low aqueous solubility properties. While an IV reference standard will provide a higher dose of active agent, a suitable IV formulation is limited by the poor solubility of the active agent in water and is not as convenient to administer as a tablet.

Web site: http://www.delphion.com/details?pn=US06506742__

- **Spatial intrauterine contraceptive insert**

Inventor(s): Krzaklewski; Stanislaw (Wroclaw, PO), Reszczynski; Andrzej (Wroclaw, PO), Suski; Henryk (Warsaw, PO)

Assignee(s): Akademia Medyczna We Wroclawiu (Wroclaw, PO)

Patent Number: 3,957,042

Date filed: April 23, 1975

Abstract: A spatial intrauterine contraceptive insert which after being introduced by means of a normal inserter into the uterus cavity takes on by itself the appearance of a spatial body. The insert has two arms 1, 2, the ends of which are connected permanently and formed into two spatial spirals along axes 4, 5 that intersect in an acute angle. In cross-section, the arms 1, 2 take on the shape of a circle. The parts of the arms 1, 2 which are formed as spirals of about $1\frac{1}{2}$ turns have the appearance of a mirror image. Near the end of the first turn of the spiral the arms 1 and 2 are immobilized by means of a link 6 made of copper. At the juncture point of said arms there is provided a thread 7 for facilitating the removal of the insert from the uterus.

Excerpt(s): This invention relates to a spatial intrauterine contraceptive insert which constitutes an improvement in relation to the interuterine pesarium for contraception known from the applied formula No. 20 289 as well as the two armed intrauterine contraceptive insert disclosed in Polish Pat. No. 68,808. ... The pesarium according to the formula No. 20 289 has a single trunk from which form two parted branches terminated with a non-coiling spiral; one of the branches is longer and its spiral is terminated with a thickening. The trunk and branches have a greater cross-section than those of the spirals. ... The two-armed contraceptive insert according to Polish Pat. No. 68,808 has two non-coiling spirals, the individual branches of which are arranged in various planes; the intersection line determining the position of the trunk which integrates both branches into one whole.

Web site: http://www.delphion.com/details?pn=US03957042__

- **Transdermal contraceptive delivery system and process**

Inventor(s): Chien; Yie W. (North Brunswick, NJ), Chien; Te-Yen (Branchburg, NJ), Gong; Sai-Jun (Piscataway, NJ)

Assignee(s): Rutgers, The State University of New Jersey (New Brunswick, NJ)

Patent Number: 5,762,956

Date filed: April 24, 1996

Abstract: A transdermal contraceptive delivery system (TCDS) for fertility control in women is described comprising a backing layer, an adjoining layer of a solid absorption adhesive polymer matrix in which minimum effective daily doses of an estrogen and a progestin are dispersed and released for transdermal absorption. Presently preferred is use of the natural estrogen, 17-beta-estradiol, and the synthetic progestin, levonorgestrel. Along with these two steroidal contraceptive agents, a combination of several chemical skin permeation enhancing agents, blended at specific weight ratios, are homogeneously dispersed in the adhesive polymer matrix. The invention also provides a process of fertility control utilizing the transdermal contraceptive delivery system.

Excerpt(s): Control of fertility continues to be an important issue throughout the world even though the population growth rate has shown a steady decline in many countries, partly owing to the extensive use of oral contraceptives. The efficacy of these contraceptives depends on the type and dose of hormonal ingredients. The first oral contraceptives to be marketed were progestin-estrogen combinations, and the majority of currently marketed products are of this type. The two substances are present in various ratios and act principally by inhibiting ovulation in normally cycling women. Estrogen is usually present in relatively high doses in these contraceptives, which are nearly 100% effective when taken correctly. However, there is a small probability of ovulation and hence, conception, if a single pill is missed, and thus any failures are generally attributable to the negligence of the user. ... Since over 90% of the natural estrogen taken orally is destroyed in the digestive tract or in the liver, a large excess must be administered in order to provide an effective dosage orally. This overdosing results in uncertain effectiveness and the creation of a large quantity of undesirable metabolites. Therefore, a synthetic estrogen is ordinarily used as the estrogen component in combination contraceptive preparations. Similarly, in the case of orally administered progestin, a substantial amount of metabolic breakdown occurs causing undesired metabolic products. Therefore, orally administered contraceptive products necessarily contain either "overdoses" of natural estrogen and progestin or synthetic forms of these hormones to provide the desired fertility control. ... Although the combination of a progestin and estrogen is very effective in suppressing ovulation, certain undesirable side effects became apparent on widespread usage of this type of oral contraceptive. The incidence of thromboembolic and related vascular disorders, including stroke and myocardial infarction, is higher in women using oral contraceptives; the relative risk may be eleven times greater in users as compared to a control population. Further, the risk increases sharply in women over 35 years of age. Contraceptive use has also been associated with increased evidence of benign liver tumors and an increased risk of gallbladder disease. Additionally, fetal abnormalities may result if the mother continues to take the pill after becoming pregnant. Finally, some possible, but unproven complications of contraceptive use include breast cancer, and cancer of the uterus, cervix and vagina.

Web site: http://www.delphion.com/details?pn=US05762956__

- **Treatment of side effects of progestins and progesterone analogues used for birth control**

Inventor(s): Bair; Glenn O. (5520 SW. Lincolnshire Cir., Topeka, KS 66614)

Assignee(s): none reported

Patent Number: 5,744,463

Date filed: June 3, 1996

Abstract: The present invention provides methods for treating the deleterious effects of progestins and progesterone analogues used for birth control. The invention also provides pharmaceutical compositions useful in those methods.

Excerpt(s): The present invention provides methods for treating the deleterious effects of progestins and progesterone analogues used for birth control. The invention also provides pharmaceutical compositions useful in those methods. ... The undesirable side effects commonly associated with the use of progesterone analogue-based contraceptive drugs are well documented (Facts and Comparison, pp. 104-8 (1996)!). They include headache, mood changes, nervousness, abdominal cramps, dizziness, weakness or

fatigue, nausea, vaginal irritation, breast swelling and tenderness, bloating, swelling of the hands or feet, backache, depression, mastalgia, insomnia, acne rashes, hot flashes and joint pains and vomiting. These side effects are observed in a subpopulation of women using such contraceptive drugs. ... The use of progesterone analogue-based contraceptive drugs has also been causally implicated in more serious disorders such as deep vein thrombosis, pulmonary embolus, breast cancer, cervical cancer, pseudotumor cerebri and stroke ›D. K. Wysowski, L. Green, *Obstet. Gynecol.*, 85(4), pp. 538-42 (1995)!.
 Web site: http://www.delphion.com/details?pn=US05744463__

- **Tubular pessary as a contraceptive means**

Inventor(s): Hamou; Jacques (2 - Chaussee De LaMulette, 75016 Paris, FR)

Assignee(s): none reported

Patent Number: 4,595,000

Date filed: May 21, 1984

Abstract: Tubular pessary as a contraceptive means, which can be carried or worn on either side by hysteroscopy. The invention relates to a tubular pessary having a contraceptive action through the obturation of the proximal uterine tube in non-surgical manner by hysteroscopy and which can easily be worn on either side. The tubular pessary has a cylindrical, sensitive central part permitting the obturation of the uterine tube. It has a distal elastic loop, which prevents sliding back into the uterus of the device. It has a proximal elastic loop, which prevents migration of the device into the abdominal cavity and which can easily be removed through a hysteroscope. The object of the invention is to overcome the inadequacies of the known contraceptive means.

Excerpt(s): The invention relates to a tubular pessary as a contraceptive means by non-surgical hysteroscopy and which women can carry or wear on either side. ... All the known methods and devices of this type have limits, with regards to application and effectiveness. ... Ideally, a contraceptive means must have a 100% efficiency, but enable unimpeded sexual intercourse, being comfortable to wear, inexpensive and in particular having a reversible action.

Web site: http://www.delphion.com/details?pn=US04595000__

- **Unit package containing ready-to-use vaginal contraceptive**

Inventor(s): Gero; Ilona B. (180 East End Ave., New York, NY 10028)

Assignee(s): none reported

Patent Number: 4,692,143

Date filed: May 19, 1986

Abstract: A premoistened ready-for-use vaginal contraceptive device and method of use thereof are described wherein a porous polyurethane sponge is provided which is impregnated with a bacteria-free sterile spermicide, pectin and pH control and swelling agent aqueous solution enclosed within and readily removable from a sealed packet and wherein the premoistened polyurethane sponge with its absorbed components when removed from the packet is immediately inserted in position and is ready for contraceptive use. After one or more coital episodes the sponge is removed, its effective

life being up to about 24 hours. The spermicide is present in a maximum of 8% and the pectin constitutes about 5%, both percentages being based on the weight of the solution.

Excerpt(s): Oral contraceptives of various types, particularly in "pill" form are well known and widely used because they have been found to be generally effective in the prevention of conception and it is further known that they can and do present risks of hormonal imbalances coupled with neurological disorders and other disadvantageous side effects. Spermicidal foams, gels and suppositories as well as diaphragms and IUD's are well known for preventing contraception. ... Studies to find better and safer intravaginal contraceptives are constantly under investigation including a recently available device comprising a polyurethane disc having a central recess and containing 1,000 milligrams of a spermicide known as nonoxynol-9, chemically definable as nonylphenoxypoly (ethyleneoxy) ethanol. While generally comparable in effectiveness to a conventional diaphragm, the polyurethane disc device has serious drawbacks as set forth in my aforesaid copending application as it is capable of causing irritation and allergic reactions of sensitive tissue and the relatively large content of nonoxynol-9 has been found to be undesirable and even unsafe because it must be combined with water before use which may render the device non-sterile and the polyurethane disc is not reliably shape-stable in the presence of moisture and/or pressure due to its shape and relatively poor absorbent power or retention of substances coming into contact therewith. ... This invention relates to a sealed foil or plastic package containing a ready-to-use vaginal contraceptive comprising a sponge or spongy vaginal insert premoistened with a spermicidal composition and which insert, upon removal from its package, is positionable in and removable from the vagina at will and constitutes a safe, effective and reliable sterile non-toxic means for avoiding conception without harmful side effects.

Web site: http://www.delphion.com/details?pn=US04692143__

- **Universal contraceptive and prophylactic device**

Inventor(s): Pien; Pao C. (1105 Marbelle Club, 840 S. Collier Blvd., Marco Island, FL 33937)

Assignee(s): none reported

Patent Number: 5,327,911

Date filed: April 5, 1993

Abstract: A universal contraceptive and prophylactic device, and method of using the device, having a condom support device of annular configuration and including an inwardly opening groove formed on the periphery thereof, a securing device that secures the support device in place on person's body, the condom includes an elongate tubular sheath formed of thin, flexible fluid impermeable material, the condom has a closed end an open end and is sized to fit loosely about an erect male organ.

Excerpt(s): Various types of contraceptive and prophylactic devices have been developed in the prior art for the purpose of preventing the exchange of body fluids between partners during sexual intercourse. Because of the AIDS epidemic, the use of such devices to provide so-called "safe sex" has become of supreme importance to the public, and many efforts have been made to provide improved forms of protection. ... Male condoms are the most common form of device to prevent conception as well as the sexual transmission of disease. However, many men are reluctant to use male condoms because of reduced sexual sensation. Female condoms have also been developed so that

women can protect themselves and ensure that they are not at risk during sexual intercourse. In addition, universal contraceptive and prophylactic devices have been designed for use either by a male or female. Even though male and female condoms are readily available at the present time, the spread of the HIV virus has not been significantly slowed by the use of such condoms due to the fact that they have not proved to be satisfactory to the general public because of certain shortcomings thereof. A drastically improved device is now required which will be readily accepted by the public in order to make efforts at arresting the spread of the HIV virus successful. ... Since the practice of "safe sex" is literally a matter of life and death for everyone, people should not depend on their sex partner to take necessary precautions, but rather should have the ability to personally ensure that they are properly protected. It is accordingly highly desirable to provide a universal device which can be used by either men or women and which will be sufficiently attractive to use so that there will be no objection to its use by either sex partner.

Web site: http://www.delphion.com/details?pn=US05327911__

- **Use of 8-anilino-1-naphthalenesulfonate as a vaginal contraceptive**

Inventor(s): Cormier; Milton J. (Bogart, GA)

Assignee(s): University of Georgia Research Foundation, Inc. (Athens, GA)

Patent Number: 4,444,789

Date filed: July 14, 1982

Abstract: The use of 8-anilino-1-naphthalenesulfonate as a vaginal contraceptive is disclosed. The invention may be implemented by incorporating the drug in a known method such as jelly, foam, or suppository introduction means prior to intercourse.

Excerpt(s): The present invention relates to a method of preventing conception. More specifically, the present invention relates to the use of calmodulin binding drugs as vaginal contraceptives. ... Presently, many forms of contraception are available, including oral contraceptives, mechanical contraceptives, and vaginal contraceptive solutions generally comprising spermicides. Each form of contraception suffers from undesirable characteristics such as varying effectiveness, discomfort, or physical side effects. ... Vaginal contraceptives comprising spermicidal agents are well known in the prior art in many methods of usage, including jellies and creams (hereinafter referred to as jelly), foams from tablets or aerosols, and suppositories. However, these methods are among the least effective in terms of preventing conception and are basically unsatisfactory as a sole method of contraception.

Web site: http://www.delphion.com/details?pn=US04444789__

- **Use of 9-anthroylcholine as a vaginal contraceptive**

Inventor(s): Cormier; Milton J. (Bogart, GA)

Assignee(s): University of Georgia Research Foundation, Inc. (Athens, GA)

Patent Number: 4,470,995

Date filed: October 27, 1983

Abstract: The use of 9-anthroylcholine as a vaginal contraceptive is disclosed. The invention may be implemented by incorporating the drug in a known method such as jelly, foam, or suppository introduction means prior to intercourse.

Excerpt(s): The present invention relates to a method of preventing conception. More specifically, the present invention relates to the use of calmodulin binding drugs as vaginal contraceptives. ... Presently, many forms of contraception are available, including oral contraceptives, mechanical contraceptives, and vaginal contraceptive solutions generally comprising spermaticides. Each form of contraception suffers from undesirable characteristics such as varying effectiveness, discomfort, or physical side effects. ... Vaginal contraceptives comprising spermaticidal agents are well known in the prior art in many methods of usage, including jellies and creams (hereinafter referred to as jelly), foams from tablets or aerosols, and suppositories. However, these methods are among the least effective in terms of preventing conception and are basically unsatisfactory as a sole method of contraception.

Web site: http://www.delphion.com/details?pn=US04470995__

- **Use of butylurea as a contraceptive agent**

Inventor(s): Rubinstein; Arye (Monsey, NY)

Assignee(s): Albert Einstein College of Medicine of Yeshiva University (Bronx, NY)

Patent Number: 5,229,423

Date filed: March 6, 1992

Abstract: This invention relates to the use of butylurea as a contraceptive agent. Butylurea may be used either alone or with a pharmaceutically acceptable carrier, and may be used in conjunction with conventional contraceptive means to abrogate sperm motility.

Excerpt(s): This invention relates to the use of butylurea as a contraceptive agent. Specifically, it is directed to the use of butylurea as an agent for abrogating sperm motility. ... U.S. Pat. No. 4,880,836 describes the use of alkylureas as anti viral agents effective against Herpes I virus, Herpes II virus and the AIDS virus. This patent further describes methods of treating viral infection in media such as blood supply, blood bank and surfaces of all kinds by administering to such media an anti virally effective amount of alkylureas. The present invention describes the use of butylurea as a contraceptive agent. ... It is an object of this invention to provide methods of abrogating sperm motility utilizing butylurea.

Web site: http://www.delphion.com/details?pn=US05229423__

- **Use of butylurea, nonoxynol-9 and benzalkonium chloride as anti-bacterial, anti-viral contraceptive agents**

Inventor(s): Rubinstein; Arye (Monsey, NY)

Assignee(s): Albert Einstein College of Medicine of Yeshiva University, a Division of (Bronx, NY)

Patent Number: 5,387,611

Date filed: June 3, 1993

Abstract: This invention relates to methods of abrogating sperm motility utilizing the anti-bacterial, anti-viral agents butylurea, Nonoxynol-9 and benzalkonium chloride. This invention is further directed to anti-bacterial, anti-viral, non-irritating contraceptive compositions, and to methods of enhancing contraceptive capabilities of conventional contraceptive means as well as to enhanced conventional contraceptive means.

Excerpt(s): This invention relates to the use of butylurea, Nonoxynol-9 and benzalkonium chloride as anti-bacterial, anti-viral contraceptive agents. Specifically, it is directed to the use of butylurea, in combination with Nonoxynol-9 or benzalkonium chloride, or both, as agents for abrogating sperm motility. These agents have anti-bacterial and anti-viral activity, and are non-irritating. ... U.S. Pat. No. 4,880,836 describes the use of alkylureas as anti-viral agents effective against Herpes I virus, Herpes II virus and the AIDS virus. This patent further describes methods of treating viral infections in media such as blood supply, blood bank and surfaces of all kinds by administering to such media an anti-virally effective amount of alkylurea. However, this patent does not describe the use of any alkylureas, including butylurea, as contraceptive agents. ... Several pharmaceutical compositions are currently used as contraceptive agents. For example, Nonoxynol-9 is used as a contraceptive agent in the contraceptive foam Semicid. However, prior hereto, Nonoxynol-9 has been found to be irritating to mucus membranes. For example, 6% Nonoxynol-9 has been shown to cause cervico-vaginal irritation. This irritation increases the risk of HIV-1 infections because it causes a disruption to the vaginal and cervical epithelial cell integrity. See Niruthisard et al. *Sex. Trans. Dis.*, Vol. 18, p. 176 (1991). In further studies, rhesus monkeys exposed to simian immunodeficiency virus were also exposed to a high dose of vaginally-inserted Nonoxynol-9 foam. Half of the monkeys developed simian immunodeficiency virus, thus further indicating that Nonoxynol-9 is not an effective anti-viral agent. See Miller et al., *J. Med. Primatol*, Vol. 19, p. 401 (1990). Hence, Nonoxynol-9, while effective as a contraceptive agent, is irritating to the mucus membranes and is not only not a potent anti-viral agent, but actually serves to increase the risk of viral infection because of its irritant activity.

Web site: http://www.delphion.com/details?pn=US05387611__

- **Use of EGF to reverse the contraceptive activity of MIS**

Inventor(s): Donahoe; Patricia K. (Weston, MA)

Assignee(s): The General Hospital Corporation (Boston, MA)

Patent Number: 5,010,055

Date filed: April 25, 1988

Abstract: The invention discloses a novel use of Mullerian Inhibiting Substance (MIS) as a contraceptive agent. MIS has been found to reversibly inhibit the maturation of oocytes in vitro. Additionally, the invention provides a means for restoring the fertility of females who are infertile due to abnormal production of MIS.

Excerpt(s): The present invention relates to Mullerian Inhibiting Substance, and its use as a contraceptive agent. ... Mullerian Inhibiting Substance (MIS) is a 140,000 dalton glycoprotein responsible for the regression of the Mullerian duct in a male embryo (Jost, A., *Comptes Rend. Soc. Biol.*, 140:463-464 (1946); Jost, A., *Comptes Rend. Soc. Biol.*, 141:135-136 (1947); Balanchard, M. G., et al., *Ped. Res.*, 8:968-971 (1974); Donahoe, P.K., et al., *Biol. Reprod.*, 15:329-334 (1976); Donahoe, P. K., et al., *J. Ped. Surg.*, 12:323-330 (1977); Donahoe, P. K., et al., *Biol. Reprod.*, 16:238-243 (1977)). ... Mullerian Inhibiting

Substance has been found to be a glycoprotein hormone. The substance is produced by fetal and neonatal Sertoli cells of the testes. MIS has been partially purified and found to be a dimeric glycoprotein of 72,000 and 74,000 daltons (Budzik, G. P., et al., In: Lash, J. W., Saxen, L., (Eds.), *Developmental Mechanisms: Normal and Abnormal*. N.Y., Alan R. Liss, pp. 207-223 (1985)). The purification of MIS is described in Donahoe, P. K., et al. (U.S. Pat. No. 4,510,131).

Web site: http://www.delphion.com/details?pn=US05010055__

- **Use of mullerian inhibiting substance as a contraceptive agent**

Inventor(s): Donahoe; Patricia (Weston, MA)

Assignee(s): The General Hospital Corporation (Boston, MA)

Patent Number: 4,753,794

Date filed: June 24, 1986

Abstract: The invention discloses a novel use of Mullerian Inhibiting Substances (MIS) as a contraceptive agent. MIS has been found to inhibit the maturation of oocytes in vitro. Additionally, the invention provides a means for restoring the fertility of females who are infertile due to abnormal production of MIS.

Excerpt(s): The present invention relates to Mullerian Inhibiting Substance, and its use as a contraceptive agent. ... Mullerian Inhibiting Substance (MIS) is a 140,000 dalton glycoprotein responsible for the regression of the Mullerian duct in a male embryo (Jost, A., *Comptes Rend. Soc. Biol.*, 140:463-464 (1946); Jost, A., *Comptes Rend. Soc. Biol.*, 141:135-136 (1947); Balanchard, M. G., et al., *Ped. Res.*, 8:968-971 (1974); Donahoe, P. K., et al., *Biol. Repro.*, 15:329-334 (1976); Donahoe, P. K., et al., *J. Ped. Surg.*, 12:323-330 (1977); Donahoe, P. K., et al., *Biol. Repro.*, 16:238-243 (1977)). ... Mullerian Inhibiting Substance has been found to be a glycoprotein hormone. The substance is produced by fetal and neonatal Sertoli cells of the testes. MIS has been partially purified and found to be a dimeric glycoprotein of 72,000 and 74,000 daltons (Budzik, G. P., et al., In: Lash, J. W., Saxen, L., (Eds.), *Developmental Mechanisms: Normal and Abnormal*. New York, Alan R. Liss, pp. 207-223 (1985)). The purification of MIS is described in Donahoe, P. K., et al. (U.S. Pat. No. 4,510,131).

Web site: http://www.delphion.com/details?pn=US04753794__

- **Use of N-phenyl-1-naphthylamine as a vaginal contraceptive**

Inventor(s): Cormier; Milton J. (Bogart, GA)

Assignee(s): University of Georgia Research Foundation, Inc. (Athens, GA)

Patent Number: 4,470,996

Date filed: October 27, 1983

Abstract: The use of N-phenyl-1-naphthylamine as a vaginal contraceptive is disclosed. The invention may be implemented by incorporating the drug in a known method such as jelly, foam, or suppository introduction means prior to intercourse.

Excerpt(s): The present invention relates to a method of preventing conception. More specifically, the present invention relates to the use of calmodulin binding drugs as vaginal contraceptives. ... Presently, many forms of contraception are available,

including oral contraceptives, mechanical contraceptives, and vaginal contraceptive solutions generally comprising spermicides. Each form of contraception suffers from undesirable characteristics such as varying effectiveness, discomfort, or physical side effects. ... Vaginal contraceptives comprising spermicidal agents are well known in the prior art in many methods of usage, including jellies and creams (hereinafter referred to as jelly), foams from tablets or aerosols, and suppositories. However, these methods are among the least effective in terms of preventing conception and are basically unsatisfactory as a sole method of contraception.

Web site: http://www.delphion.com/details?pn=US04470996__

- **Use of the pregnancy-specific .beta..sub.1 -glyco-protein and its antibody for contraception**

Inventor(s): Bohn; Hans (Marbach, near Marburg an der Lahn, DT), Weinmann; Ernst (Michelbach, near Marburg an der Lahn, DT)

Assignee(s): Behringwerke Aktiengesellschaft (Frankfurt an der Lahn, DT)

Patent Number: 3,957,975

Date filed: September 10, 1974

Abstract: Use of the pregnancy-specific .beta..sub.1 -glycoprotein (SP.sub.1) and its antibody for contraception and for inducing miscarriages.

Excerpt(s): The present invention relates to the use of the pregnancy-specific .beta..sub.1 -glycoprotein (SP.sub.1) and its antibody for contraception and for inducing miscarriages. ... Attempts have been made in which antisera against extracts of animal placentae were to prevent rabbits from conception and to induce miscarriages in monkeys and mice. Further attempts have been made to reduce the fertilisation rate of rats by the active immunisation with human placenta-lactogen. All these attempts did not reach beyond the commencing stage and, especially, were not used in medicine. ... Now, it was found that the pregnancy-specific .beta..sub.1 -glycoprotein which can be obtained from placentae or sera, and its antiserum can be used for contraception and induction of miscarriages in primates, for example, in human beings and in monkeys.

Web site: http://www.delphion.com/details?pn=US03957975__

- **Vaginal contraceptive**

Inventor(s): Drobish; James L. (Cincinnati, OH), Gougeon; Thomas W. (Cincinnati, OH)

Assignee(s): The Procter & Gamble Company (Cincinnati, OH)

Patent Number: 4,219,016

Date filed: December 7, 1978

Abstract: Improved devices which can be retained in the vagina during intercourse deliver spermicidal surfactants and provide contraceptive benefits.

Excerpt(s): The present invention encompasses devices which are used in the vagina to deliver spermicidal surfactants. By virtue of their unique construction and shape, the devices remain in position, even during intercourse, so that delivery of the spermicidal surfactant is not interrupted. ... The devices of this invention are designed for use in the vagina, can be inserted by the user, and do not require insertion by a physician as, for

example, in the case of intrauterine contraceptive devices. The devices are designed to remain in the vagina during the time between menstrual periods to provide desirable, prolonged release of a spermicidal surfactant, and their construction and shape facilitate retention therein. An effective between-period contraceptive device is thereby provided. ... The present invention combines the desirable features of devices which provide prolonged release of medicaments, e.g., spermicides, or the like, into the vaginal area with the added advantages that the unique construction and shape of the present devices allows them to be worn comfortably in the vagina for periods of several weeks and to remain substantially undisturbed within the vaginal cavity during sexual intercourse.

Web site: http://www.delphion.com/details?pn=US04219016__

- **Vaginal contraceptive**

Inventor(s): Lucker; Peter W. (Am Rebstockel 13, D-6719 Bobenheim am Berg, DE), Wetzelsberger; Nikolaus (Durerstrasse 12, D-6700 Ludwigshafen am Rhein, DE)

Assignee(s): none reported

Patent Number: 4,277,461

Date filed: December 20, 1979

Abstract: The contraceptive consists of a spermicidal active substance of the formula $RCONH-(CH_2CH_2O)_n-H$, in which R denotes a C_5-C_{19} -alkyl or -alkenyl radical and n has a value of 3 to 20, a mixture of an alkali metal bicarbonate and a water-soluble, solid, anhydrous mono- or poly-carboxylic acid having 2 to 6 carbon atoms, in a stoichiometric ratio, as a foam generator, and a polyethylene glycol, or mixture of polyethylene glycols, which melts at body temperature.

Excerpt(s): The invention relates to a new contraceptive which is intended for vaginal use and is based on a spermicidal active substance, a mixture of substances which evolves carbon dioxide on absorption of water and a water-soluble excipient which melts at body temperature. ... Oral contraceptives of the steroid series have been available commercially for about 15 years; most of these consist of a combination of a compound having a gestagenic activity and a compound having an oestrogenic activity. With regard to the reliability of contraception, these preparations answer the purpose, since, depending on the literature source, their Pearl index varies between 0.0 and 2.3 or between 1.6 and 2.1 (J. Brotherton, Sex Hormone Pharmacology, pages 211-212. Academic Press, London, 1976). However, a general disadvantage of all formulations containing gestagen must be seen in the massive intervention in the female hormonal system over a period of possibly 20 to 30 years, the full effects of which cannot yet be assessed. Moreover, not all women tolerate oral contraceptives, since the gestagenic action in some cases results in symptoms similar to those of pregnancy and these cannot always be prevented even by the oestrogen which is added. Furthermore, certain contraindications exist, inter alia the varicose symptom complex, a case history of phlebitis, diabetes and hypertension. It is for these reasons that it has been possible to observe an unmistakable move away from these preparations in recent times. ... On the other hand, a large number of contraceptives for local use have already been proposed; in general, these contraceptives contain a spermicidal active substance and a dispersing agent. The active substances encountered include compounds of very diverse chemical structures, ranging from the organometallic derivatives (for example phenyl-mercury nitrate and phenyl-mercury acetate) via quaternary ammonium salts (for example benzalkonium chloride, benzethonium chloride and cetylpyridinium chloride) to

natural substances of vegetable origin (for example saponins) and substances of a purely synthetic type.

Web site: http://www.delphion.com/details?pn=US04277461__

- **Vaginal contraceptive**

Inventor(s): Drobish; James L. (Wyoming, OH), Gougeon; Thomas W. (Springfield Township, Hamilton County, OH)

Assignee(s): The Procter & Gamble Company (Cincinnati, OH)

Patent Number: 4,304,226

Date filed: March 3, 1980

Abstract: Improved reinforced devices, which can be retained in the vagina during intercourse, deliver spermicidal surfactants and provide contraceptive benefits. Lobed devices provide channels through which menses and other biological fluids can pass. Multi-compartment devices provide added protection against leakage, rupture or perforation during manufacture, handling and use.

Excerpt(s): The present invention encompasses devices which are used in the vagina to deliver spermicidal surfactants. By virtue of their unique construction and shape, the devices herein are foldable for easy insertion. Once in position at or near the cervical os, the devices open to cap or block the os and remain in position, even during intercourse, so that access of the spermicidal surfactant source to the cervical os is not interrupted. ... The devices of this invention are designed for use in the vagina, can be inserted by the user, and do not require insertion by a physician as, for example, in the case of intrauterine contraceptive devices. The devices are designed to remain in the vagina during the time between menstrual periods to provide desirable, prolonged release of a spermicidal surfactant, and their construction and shape facilitate retention therein. An effective between-period contraceptive device is thereby provided. ... The devices of the present invention combine the desirable features of devices which provide prolonged release of medicaments, e.g., spermicides, or the like, through a membrane and into the vaginal area with the added advantages that the unique construction and shape of the present devices allow them to be worn comfortably in the vagina for periods of several weeks and to remain substantially undisturbed within the vaginal cavity during sexual intercourse.

Web site: http://www.delphion.com/details?pn=US04304226__

- **Vaginal contraceptive and method of using**

Inventor(s): Drobish; James L. (Cincinnati, OH)

Assignee(s): The Procter & Gamble Company (Cincinnati, OH)

Patent Number: 4,200,090

Date filed: January 15, 1979

Abstract: A device which is used in the vagina to deliver spermicidal surfactants. This device can be inserted by the user, and does not require insertion by a physician as, for example, in the case of intrauterine contraceptive devices. By virtue of its unique construction and shape, the device herein is foldable for easy insertion. Once in position at the cervical os, the device opens to "cap" the os and remain in position, even during

intercourse, so that access of the spermicidal surfactant source to the cervical os is not interrupted. The device is designed to remain comfortably in the vagina during the time between menstrual periods to provide desirable, prolonged release of a spermicidal surfactant, and its construction and shape facilitate retention therein while minimizing awareness and discomfort. An effective between-period contraceptive device is thereby provided.

Excerpt(s): Current methods for achieving artificial contraception include the condom, the diaphragm, the intrauterine device or IUD, and oral (hormonal) contraceptives. Each of these methods has disadvantages which prevent their complete acceptance either by users or by medical authorities. ... Oral contraceptives ("the Pill") are popular but are accompanied by the many side effects which tend to accompany any use of estrogens and/or progestins at levels which alter the hormonal balance of the body. For example, the Pill suppresses lactation. Thus, in social or cultural groups where mother's milk is a major nutrient for children up to the age of three, oral contraceptives may be economically unacceptable. Other complications of oral contraceptive therapy, such as thromboembolism, can be fatal. Finally, oral contraceptives in current use must be taken according to a strict daily regimen, which means that they can only be effectively used by women who are sufficiently motivated to follow such a regimen. ... The intrauterine device, or IUD, must be aseptically inserted into the uterus by a trained person, usually a physician. This involves additional time and expense to the user. Also, clinical experience over the past few years indicates that complications, including excessive bleeding, backache, spontaneous expulsion, and uterine perforation occur in approximately one-third of IUD users.

Web site: http://www.delphion.com/details?pn=US04200090__

- **Vaginal contraceptive shield**

Inventor(s): Place; Virgil A. (91 Hillbrook Dr., Portola Valley, CA 94025), Crow; Harold L. (25 E. 83rd St., New York, NY 10028)

Assignee(s): none reported

Patent Number: 4,286,593

Date filed: May 5, 1980

Abstract: A flexible contraceptive vaginal shield having a supporting structure with an outer ring and an internal member which may comprise one or more concentric rings with or without a plurality of ribs connecting the rings said structure bonded to a flexible non-elastomeric film. A spermicide is normally applied to both sides of the film. The bonding of the supporting structure to the film is preferably by heat sealing. Spermicide applied to the ring side of the film is retained within reservoirs formed by the rings, the ribs and the film. In addition there may be reservoirs formed within the supporting structure that release spermicide through the flexing action caused by sexual intercourse.

Excerpt(s): This invention relates to vaginal contraceptives, herein termed medicated vaginal shield contraceptive which through its specific configuration provides optimum placement and distribution of spermicide. ... Vaginal contraceptives in the form of spermicides have been used for over 3800 years. Ancient vaginal contraceptives were often highly acidic substances carried by a pasty or sticky base and had some effect in immobilizing sperm. Presently, spermicides are available in various forms such as creams, foams, jellies, foaming tablets, suppositories, and films. However, all of these

spermicides, regardless of their form, suffer from the same primary disadvantage of being difficult to properly distribute within the vagina, especially near the cervix. Further, the spermicides are often messy, have a tendency to run out of the vagina when the user is standing and often are not readily acceptable for use because their application usually interrupts the normal flow of events. They generally do not heighten, but rather diminish, the pleasurable aspects flowing from such physical activity. ... Pessaries are used either to support the interior walls of the vagina or as a contraceptive to cover the cervix of the uterus. When used as a contraceptive, pessaries typically takes the form of a domed diaphragm for the application of a spermicide. An example of a domed contraceptive pessary is shown in U.S. Pat. No. 3,015,598. Pessaries intended to support the vaginal walls must be stiff enough to provide the mechanical support needed. Such a support pessary is disclosed by U.S. Pat. No. 2,234,495. As noted in such patent, resilient metallic springs are generally required to produce a pessary which is sufficiently stiff as well as resilient to provide the required mechanical support. Other U.S. patents which may be of interest are Nos. 2,141,040; 2,580,133; 3,216,422; 3,983,874; 3,995,663; and 4,093,490.

Web site: http://www.delphion.com/details?pn=US04286593__

- **Vaginal contraceptive system**

Inventor(s): Gero; Ilona B. (300 Park Ave. South, Suite 1410, New York, NY 10010)

Assignee(s): none reported

Patent Number: 4,693,705

Date filed: July 11, 1986

Abstract: The invention features an innovative vaginal sponge contraceptive device that has active spermicide. The active spermicide allows the device to be used instantly upon removal from its sealed packet. The sponge is of a sufficient size such that swelling agents, contained therein, maintain the sponge in pressured contact with the vaginal wall to prevent slippage from cervical contact. A low level of spermicide allows for effectiveness without irritation. A deodorant, contained in the sponge, provides for continuous use over a 24-hour period.

Excerpt(s): This invention relates to a vaginal contraceptive system, and more particularly to a safe, ready-to-use, sponge-type vaginal insert containing an active spermicide. ... Recent clinical studies have indicated that young women using oral contraceptives may increase their risk of developing breast and cervical cancers in mid-life. These studies have caused anxiety in many women. ... Whether this type of contraception is dangerous or not will be the subject of debates for many years to come. One fact was certain, however, the "pill" did interfere with the hormonal balance of the user. Side effects from the use of oral contraceptives have been observed in many women.

Web site: http://www.delphion.com/details?pn=US04693705__

- **Vaginal contraceptive system made from block copolymer**

Inventor(s): Wong; Patrick S. (Palo Alto, CA)

Assignee(s): Alza Corporation (Palo Alto, CA)

Patent Number: 4,215,691

Date filed: October 11, 1978

Abstract: An intravaginal contraceptive system for the pre-programmed, unattended delivery of an antifertility steroid is disclosed. The system comprises (a) an antifertility steroid, (b) a delivery module comprising a reservoir for storing the steroid in an amount for execution of the program, a rate controller which maintains the rate of steroid delivered in a contraceptive effective amount throughout the life of the system, an energy source for transferring steroid from the reservoir to the vagina, and a portal for releasing the steroid from the module to the vagina, (c) a platform which integrates the module into a unit sized, shaped and adapted for insertion and retention in a vagina, and (d) a contraceptive program which provides for the controlled release of steroid to produce an antifertility effect over a prolonged period of time.

Excerpt(s): This invention pertains to an intravaginal system. The system comprises an antifertility steroid, a delivery module, a platform and a contraceptive program that operates as a unit for delivering an effective amount of an antifertility steroid to the vagina of a fertile female. More specifically, the invention relates to an intravaginal contraceptive system manufactured from block copolymers of styrene and butadiene in the form of an intravaginal device for delivering an antifertility steroid. ... Vaginal devices for delivering a drug are known to the prior art. For example, U.S. Pat. No. 3,545,439 issued to Gordon W. Ducan discloses an intravaginal ring-shaped device that can be made of varying types of polymeric materials. The device is formed of a solid polymer containing drug that is released by diffusion to the vagina. The device optionally contains a tension spring for keeping it in the vagina. In U.S. Pat. No. 3,920,805 patentee Theodore J. Roseman discloses a solid, polymeric device that has a nonmedical central core and an encircling medicated coating of the polymer. The device releases drug by diffusion and in a preferred embodiment, the device is ring-shaped with a flat tensioning spring molded in the nonmedicated central core. ... While, the above-described devices are useful for certain applications, serious disadvantages are frequently associated with these devices that limit their use. For example, generally the polymers used by the prior art are thermoset polymers which require molding and curing fabrication procedures to form solid devices. These fabrication procedures tend to restrict the shape of the device, and the use of said polymers limits the amount of drug that can be loaded into the polymer and leads to a more rigid device. Those versed in the art will recognize that if vaginal devices can be provided made of materials that are essentially free from the above tribulations, such devices would be a valuable advancement in the art and a useful improvement.

Web site: http://www.delphion.com/details?pn=US04215691__

- **Vaginal device for contraceptive control**

Inventor(s): Boschetti; Enrica (Via Melchiorre Gioia, 171, 20125 Milano, IT)

Assignee(s): none reported

Patent Number: 4,497,317

Date filed: November 22, 1982

Abstract: A contraceptive vaginal or intra-uterine device is formed of two separate elements one of which is a ring and a second is a container made of fabric impregnated with a spermicide or medicinal substance. The ring before use is inserted into the container through a closable opening formed therein. An additional closable opening is formed in the container for removing the ring from the container.

Excerpt(s): The present invention relates to intra-uterine contraceptive devices. ... None-chemical contraceptive means generally known as diaphragms are known in the prior art. Such diaphragms are normally associated immediately before being used, with spermicide and/or medicinal substances. Generally such diaphragms comprise an outer structure which is a rubber cap peripherally fixed to a base structure. These diaphragms are of circular or oval shape and the outer structure is generally planar. Moreover, the outer structure which is elastic may be peripherally deformed by a user or a therapist to anatomically adapt its shape. ... Known vaginal diaphragms are disclosed, for example in U.S. Pat. Nos. 961,880; 2,087,610; 2,443,943; 2,463,356; 2,529,363; 2,638,896; 2,664,082; 2,679,589; 2,823,669; 3,169,894; 2,875,755; 3,060,931; 4,031,886 and the German Pat. No. 557,914.

Web site: http://www.delphion.com/details?pn=US04497317__

- **Variable size intrauterine contraceptive device**

Inventor(s): Moulding, Jr.; Thomas S. (1954 Glencoe St., Denver, CO 80220)

Assignee(s): none reported

Patent Number: 4,005,707

Date filed: May 30, 1975

Abstract: An intrauterine contraceptive device is provided which is inserted into a uterus in a collapsed position and held in expanded position by a locking means which prevents any further expansion of the IUD and limits the pressure exerted thereby on the uterine wall. The locking means, however, permits the IUD to collapse upon contraction of the uterus. The locking means may take the form of a string fixedly connected to one arm of the IUD and slidably attached to the other arm to be fixed in position upon initial expansion of the IUD by a quick setting adhesive or by means of an interengaging beaded chain and slot arrangement. The arms of the IUD can also be telescopically expandable in a longitudinal direction and fixed in expanded position once the ends of the arms come into engagement with the uterine wall but can collapse in response to uterine contractions.

Excerpt(s): This invention relates to an intrauterine contraceptive device, and more particularly to such a device which after initial expansion in the plane of the uterine cavity is locked to prevent further expansion but can contract upon contraction of the uterus. ... As the effects of increased population become increasingly severe, resulting in environmental conditions which are deteriorating at an alarming rate, more and more effort is being placed on means for slowing the increase in world population, if not entirely halting such increase. ... One type of contraception which has found considerable acceptance is the intrauterine contraceptive device, commonly known as an IUD. The IUD is a device which is placed inside the uterus, a soft tissue organ made primarily of smooth muscle. The way in which it operates to prevent pregnancy is not entirely understood but it is well known that any foreign body placed in the uterus has a contraceptive effect which is 90 to 95 percent effective. However, some such devices which have been used have caused the wall of the uterus to become eroded or partially

penetrated causing pain and bleeding to the user, thereby necessitating removal. In many instances the IUD's are expelled from the uterus and this is believed to be because they are not fitted properly, such as being too small, or otherwise not constructed to resist expulsion. However, when larger IUD's are used, there is a greater instance of pain and bleeding and sometimes the IUD induces unwanted contractions of the uterus.

Web site: http://www.delphion.com/details?pn=US04005707__

- **Zona pellucida proteins for contraception**

Inventor(s): Habenicht; Ursula-Friederike (Berlin, DE), Lobbia; Alessandro (Glienicke, DE)

Assignee(s): Schering Aktiengesellschaft (DE)

Patent Number: 6,344,442

Date filed: May 3, 1999

Abstract: The present invention relates to the use of peptides which are derived from zona pellucida proteins and are used for contraception, and pharmaceutical formulations which contain the peptides without the peptides having an immunogenic effect.

Excerpt(s): This invention relates to the use of peptides that are derived from zona pellucida proteins for contraception and for pharmaceutical formulations that contain these peptides, without these peptides having an immunizing action. ... With the increase in world population, the need for efficient methods of contraception is also growing. In addition to oral contraceptives and spermicides, mechanical contraceptives are also available here, such as, for example, IUDs (intrauterine devices), vaginal rings, and condoms. Another approach is based on preventing fertilization by blocking the egg-sperm interaction. The sperm must penetrate the zona pellucida, an extracellular matrix that consists of glycoproteins and that surrounds the female gametes (the growing oocytes and the ovulated egg). This interaction takes place via a complex interplay of ligands, as well as sperm receptors on the part of the ovocyte or the sperm surface. The zona pellucida of the various mammalian species consists of three to four glycoproteins, which are normally referred to as ZP1, 2, and 3 or ZPA, B and C [Harris, J. et al.: Cloning and Characterization of Zona Pellucida Genes and cDNA's from Variety of Mammalian Species: The ZPA, ZPB and ZPC Gene Families. DNA Sequence: 4, 361-393, (1994)]. In mice, it has been described that the sperm bond first to ZP3 via O-bonded oligosaccharide chains, and the additional bond is probably mediated by ZP2. ZP3 seems to mediate not only the initial bond of the sperm to the zona pellucida, but also another decisive process for fertilization, the acrosome reaction [Dean, J.: Biology of Mammalian Fertilization. J. Clin. Invest.: 89, 1055-1059 (1992); Wassermann, P. M.: Regulation of Fertilization by Zona Pellucida Glycoproteins. J. Reprod. Suppl.: 42, 79-87, (1990)]. ... In view of the fact that the zona pellucida glycoproteins are unique in the ovary, exhibit antigenic properties, and are accessible to circulating antibodies during the intraovarian growth phase, the research has focused on the development of contraceptive vaccines on the basis of zona pellucida proteins [Naz, R. K. et al.: Development of Contraceptive Vaccines for Humans Using Antigen Derived from Gametes (Spermatozoa and Zona Pellucida) and Hormones (Human Chorionic Gonadotropin): Current Status. Human Reprod. Update: 1, 1-18, (1995); Millar, S. E. et al.: Vaccination with Zona Pellucida Peptides Produces Long-Term Contraception in Female Mice. Science: 246, 935-938, (1989)]. A phenomenon that was noted in almost all animals in the case of immunization with zona pellucida proteins is the induction of an

oophoritis. Previously it was not possible to completely explain the reason for the occurrence of an oophoritis. In any case, the formation of an oophoritis makes the longer-term use of zona pellucida proteins or of peptides that are derived from these proteins appear problematical for contraceptive immunization.

Web site: http://www.delphion.com/details?pn=US06344442__

Patent Applications on Birth Control

As of December 2000, U.S. patent applications are open to public viewing.¹⁰ Applications are patent requests which have yet to be granted. (The process to achieve a patent can take several years.) The following patent applications have been filed since December 2000 relating to birth control:

- **ANDROGEN AS A MALE CONTRACEPTIVE AND NON-CONTRACEPTIVE ANDROGEN REPLACEMENT**

Inventor(s): MOO-YOUNG, ALFRED J. ; (HASTINGS-ON-HUDSON, NY)

Correspondence: LERNER, DAVID, LITTENBERG,; KRUMHOLZ & MENTLIK; 600 SOUTH AVENUE WEST; WESTFIELD; NJ; 07090; US

Patent Application Number: 20020193359

Date filed: September 16, 1998

Abstract: The present invention relates to methods of providing male contraception using a specified androgen without the need of a separate sterilizing agent. The invention also describes methods for non-contraceptive androgen replacement and devices useful for carrying out both processes.

Excerpt(s): The present application claims benefit of U.S. Provisional Patent Application Nos. 60/059,300 and 60/062,962, filed Sep. 17, 1997, and Oct. 10, 1997, respectively, the disclosures of which are hereby incorporated by reference herein. ... The present invention relates to the fields of medicine and pharmaceutical science in providing androgen replacement methods of male contraception and devices useful in accordance with those methods. ... Male contraception has been enigmatic. Mechanical devices offer reduced sensation and inconvenience. While they may be effective in reducing the transmission of sexually transmitted diseases, they may also be a source of friction in a relationship. Moreover, such contraceptive methods are not without a significant incidence of failure.

Web site: <http://appft1.uspto.gov/netathtml/PTO/search-bool.html>

¹⁰ This has been a common practice outside the United States prior to December 2000.

- **Chimeric contraceptive vaccines**

Inventor(s): Bertrand, Kevin P. ; (Pullman, WA), Zhang, Yuzhi ; (Pullman, WA), Reeves, Jerry J. ; (Pullman, WA)

Correspondence: David W Clough Esq; Marshall O'Toole Gerstein Murray & Borun; 6300 Sears Tower; 233 South Wacker Drive; Chicago; IL; 60606-6402; US

Patent Application Number: 20020198364

Date filed: March 14, 2000

Abstract: The invention is directed to contraceptive vaccines comprising a carrier protein or fragment thereof in peptide linkage with a reproduction related polypeptide, protein or fragment thereof, and to DNAs encoding the chimeric proteins. The invention also includes the use of the chimeric proteins in immunocontraceptive methods.

Excerpt(s): Fertility management in mammals is a global issue of agricultural, economic and social importance. Conventional approaches of preventing pregnancy are surgical, can cause morbidity and mortality, and are unacceptable in some countries. Other approaches to contraception include the use of various hormones to regulate the ovulatory cycle and which may be associated with certain side effects. Still other approaches to contraception include the use of zona pellucida proteins as immunocontraceptives to induce permanent or transient infertility. ... The decapeptide luteinizing hormone releasing hormone (LIRH) is the key regulatory brain peptide that controls reproduction in mammals and, thus, is a logical target for devising approaches to contraception. The endocrine effects of active immunization against LHRH have been studied in a variety of young and adult male and female animals (Adams et al., Biol. Reprod. 35:360, (1986); Esbenshade et al., Biol. Reprod. 33:569, (1985); Garza et al., Biol. Reprod. 35:347, (1986); Johnson et al., J. Anim. Sci. 66:719, (1988); Schanbacher et al., Am. J. Physiol. 242:3201, (1985)). These studies demonstrated decreases in gonadotropins, sperm production, follicular development, ovulation and conception after immunization against IMRH chemically conjugated to a carrier protein. ... Johnson et al., J. Anim. Sci. 66:719, (1988) developed a conjugated ovalbumin UIRH molecule which, when used with Complete Freund's Adjuvant (CFA), was 100% effective in preventing pregnancy in a limited number of animals. However, in a commercial application in Australia, UIRH conjugated to ovalbumin (Vaxtrate) prevents only 80% of pregnancies of heifers (Hoskinson et al., Austral. J. Biotech. 4:166-176 (1990)).

Web site: <http://appft1.uspto.gov/netahtml/PTO/search-bool.html>

- **Combination preparation for contraception based on natural estrogens**

Inventor(s): Ostertag, Monika ; (Gottingen, DE), Moore, Claudia ; (Jena, DE), Hoffmann, Herbert ; (Jena, DE), Fricke, Sabine ; (Jena, DE), Dittgen, Michael ; (Apolda, DE), Oettel, Michael ; (Jena, DE)

Correspondence: STRIKER, STRIKER & STENBY; 103 EAST NECK ROAD; HUNTINGTON; NY; 11743; US

Patent Application Number: 20020107229

Date filed: September 12, 2001

Abstract: The combination preparation for contraception includes from 2 to 4 first stage daily dosage portions each including an effective amount of at least one natural estrogen as sole active ingredient, from 16 to 22 second stage daily dosage portions each

including an effective amount of a combination of at least one natural estrogen and at least one natural or synthetic gestogen as active ingredient; from 2 to 4 third stage daily dosage portions each including an effective amount of at least one natural estrogen as sole active ingredient; and from 2 to 4 final stage daily dosage portions containing a pharmaceutically acceptable placebo. The estrogen may be estradiol, an estradiol compound that is metabolized to estradiol when taken into the body, a conjugated equine estrogen or a phytoestrogen. The natural or synthetic gestogen can be natural progesterone or a synthetic gestogens, such as medroxyprogesterone acetate.

Excerpt(s): The present invention relates to a multistage contraceptive preparation based on natural estrogens. ... Oral contraceptives were first marketed 60 years ago. By continuous research it has been possible to reduce the required dosages of hormones in a stepwise manner. Currently low dosage oral contraceptives exist which chiefly comprise an estrogen component and a gestogen component. The hormone dosage of these contraceptives is delivered in different combinations and dosages in the form of combination preparations (one-stage preparation) or multistage combination preparations (staged preparations) and sequenced preparations (two-stage preparations) over time periods of from 21 to 28 days. ... One-stage preparations (usually designated as combination preparations) are characterized by a constant dosage of certain estrogens and gestogens each day. Because of the uniform delivery of gestogen ingredients with estrogen components from the first application day, the combination preparation is a highly reliable contraceptive.

Web site: <http://appft1.uspto.gov/netathtml/PTO/search-bool.html>

- **Contraception method using competitive progesterone antagonists and novel compounds useful therein**

Inventor(s): Schmidt-Gollwitzer, Karin ; (Berlin, DE), Chwalisz, Krzysztof ; (Berlin, DE), Elger, Walter ; (Berlin, DE), Ottow, Eckhard ; (Berlin, DE)

Correspondence: MILLEN, WHITE, ZELANO & BRANIGAN, P.C.; 2200 CLARENDON BLVD.; SUITE 1400; ARLINGTON; VA; 22201; US

Patent Application Number: 20020058649

Date filed: November 28, 2001

Abstract: Competitive progesterone antagonists, including two novel steroids, viz., 11.beta.,19-[4-(cyanophenyl)-o-phenylene]-17.beta.-hydroxy-17.alpha.-(3-hydroxyprop-1(Z)-enyl)-4-androsten-3-one and 11.beta.,19-[4-(3-pyridinyl)-o-phenylene]-17.beta.-hydroxy-17.alpha.-(3-hydroxyprop-1(Z)-enyl)-4-androsten-3-one, inhibit formation of endometrial glands at below their ovulation inhibiting dose and the abortive dose, and thus achieve oral contraception in females without adversely affecting the menstrual cycle and without risk of aborting a previous implanted fertilized egg or a fetus.

Excerpt(s): This invention relates to a novel contraceptive method employing a competitive progesterone antagonist and to novel progesterone antagonists useful therein. ... By inhibiting the formation of endometrial glands and epithelium growth, the implantation of a fertilized egg in the uterus is rendered impossible (inhibition of the uterine receptivity). The employment of competitive progesterone antagonists according to the invention can thus be used for contraception in the female. ... RU 486 (11.beta.-[4-N,N-(dimethylamino)phenyl]-17.beta.-hydroxy-17.alpha.-propinyl-estra-4,9(10)-dien-3-one; EP-A-0057115) and other 11.beta.-aryl or 11.beta.,19-arylene-substituted steroids are compounds which can displace progesterone and the glucocorticoids from their

respective receptors. These substances are pharmacologically distinguished by strong progesterone- and glucocorticoid-antagonistic effects. These properties determine their previously practiced therapeutic uses. RU 486 is useful, e.g., as a progesterone antagonist for therapeutic termination of pregnancy and also as a glucocorticoid antagonist for treatment of Cushing's syndrome in the wake of a pathologically increased secretory activity of the suprarenal cortex. The abortive dose of RU 486 is 200-600 mg in the female.

Web site: <http://appft1.uspto.gov/netahtml/PTO/search-bool.html>

- **Hormonal contraceptive product**

Inventor(s): Hesch, Rolf-Dieter ; (Konstanz, DE)

Correspondence: KNOBBE MARTENS OLSON & BEAR LLP; 2040 MAIN STREET; FOURTEENTH FLOOR; IRVINE; CA; 92614; US

Patent Application Number: 20030073673

Date filed: November 19, 2002

Abstract: The present invention relates to a hormonal contraceptive product having two hormonal components, an estrogen and a gestagen, and a method for the continuous suppression of the menstrual cycle by uninterrupted administration of the product of the invention.

Excerpt(s): The application is a continuation of U.S. application Ser. No. 09/508,648, filed Jun. 5, 2000, which is the U.S. National Phase under 35 U.S.C. .sctn.371 of International Application PCT/DE98/02636, filed Sep. 11, 1998, which claims priority to German Application No. DE 19739916.9, filed Sep. 11, 1997. ... The present invention relates to a hormonal contraceptive product with two hormonal components, the use thereof and a hormonal contraception process. ... Since hormonal contraceptives became available in the 1960's, a number of hormonal components have been investigated with regards to their suitability in the most varied administration diagrams. A fundamental subdivision into combination and sequential products is possible.

Web site: <http://appft1.uspto.gov/netahtml/PTO/search-bool.html>

- **Male contraceptive formulation comprising norethisterone**

Inventor(s): Ursula-Friederike, Habenicht ; (Berlin, DE), Schillinger, Ekkerhard ; (Berlin, DE), Oettel, Michael ; (Jena, DE), Kamischke, Axel ; (Muenster, DE), Nieschlag, Eberhard ; (Muenster, DE), Ruebig, Alexander ; (Berlin, DE)

Correspondence: MILLEN, WHITE, ZELANO & BRANIGAN, P.C.; 2200 CLARENDON BLVD.; SUITE 1400; ARLINGTON; VA; 22201; US

Patent Application Number: 20020103176

Date filed: January 19, 2001

Abstract: A formulation for male contraception comprising a progestin possessing both estrogenic and androgenic properties is remarkably effective for spermatogenesis suppression in males. The progestin Norethisterone (NET), particularly its derivatives Norethisterone acetate and Norethisterone enanthate in sufficient doses induce oligozoospermia or azoospermia in males. Formulations further comprising an

androgen, such as a testosterone derivative such as a testosterone ester, particularly testosterone undecanoate, are especially effective male contraceptive formulations.

Excerpt(s): The invention relates to a formulation of a male contraceptive comprising a progestin as well as methods of male contraception utilising progestins. Moreover, the invention relates to formulation further comprising an androgen as well as to methods using formulations comprising a progestin and an androgen so as to suppress spermatogenesis. ... Contraceptive methods for men are considered an essential component of world-wide reproductive health (Nieschlag and Behre; Testosterone: action, deficiency, substitution, 1998, Springer, Berlin, p 514). Hormonal methods of male contraception offer the advantages of high-reversibility and efficacy. In hormonal male contraception, the suppression of spermatogenesis is sought through the suppression of the gonadotropins leuteinizing hormone (LH) and follicle stimulating hormone (FSH) to undetectable levels within the endocrine feedback mechanism operating between the pituitary gland and the hypothalamus. Disadvantageously, suppression of these gonadotropins also induces symptoms related to androgen deficiency (Nieschlag and Behre; 1998, pp 513-528). ... Male contraceptive methods seek to suppress FSH and LH, resulting in a depletion of intratesticular testosterone and cessation of spermatogenesis, whilst substituting peripheral testosterone with another androgen. This androgen has typically been testosterone itself and serves the endocrine androgenic role of testosterone such as to maintain libido, male sex characteristics, protein anabolism, hematopoiesis and others. In short, the objective is to deplete the testes of testosterone whilst maintaining levels in the general circulation.

Web site: <http://appft1.uspto.gov/netahhtml/PTO/search-bool.html>

- **Multi-colored contraceptive sheath**

Inventor(s): Lee, Calvin S. ; (Pasadena, CA)

Correspondence: ERIK M. ARNHEM; Second Floor; 4250 Wilshire Blvd.; Los Angeles; CA; 90010; US

Patent Application Number: 20020005203

Date filed: February 5, 2001

Abstract: A contraceptive sheath can provide extra leak protection by forming at least one latex film over the bulbous closed end of a latex sheath liner. A transparent elastic covering overlies the sheath outer surface to seal the latex films against separation from the latex liner.

Excerpt(s): This is a continuation-in-part of my co-pending U.S. patent application Ser. No. 09/617,684 filed on Jul. 17, 2000. ... This invention relates to contraceptive sheaths usable during sexual intercourse to prevent conception. ... Contraceptive sheaths have been devised for insertion over the male penis to prevent conception during sexual intercourse. Such contraceptive sheaths typically take the form of an elastic tubular sleeve having a bulbous closed end that traps the seminal fluid against escape from the sheath during sexual intercourse.

Web site: <http://appft1.uspto.gov/netahhtml/PTO/search-bool.html>

- **Once-a-month injection as a depot contraceptive and for hormone replacement therapy for perimenopausal and premenopausal women**

Inventor(s): Lachnit-Fixson, Ursula ; (Berlin, DE), Aydinlik, Semiramis ; (Berlin, DE)

Correspondence: MILLEN, WHITE, ZELANO & BRANIGAN, P.C.; 2200 CLARENDON BLVD.; SUITE 1400; ARLINGTON; VA; 22201; US

Patent Application Number: 20020193358

Date filed: February 5, 2002

Abstract: This invention describes the use of a once-a-month injection (once-a-month injectable) that contains an estrogenic and gestagenic component as an active ingredient for the production of a pharmaceutical agent for contraception and simultaneous hormone replacement therapy for perimenopausal and premenopausal women. With this pharmaceutical agent, a more reliable contraceptive effect with a "natural" estrogen (without ethinylestradiol) with accompanying active therapy of the beginning estrogen-loss symptoms, as well as prevention of osteoporosis, is achieved.

Excerpt(s): This invention relates to the use of a once-a-month injection (once-a-month injectable composition) that contains an estrogenic and gestagenic component as an active ingredient for the production of a pharmaceutical agent for contraception and simultaneous hormone replacement therapy for perimenopausal and premenopausal women. ... A once-a-month injection as defined by this invention means a hormone preparation that is injected in women of child-bearing age once a month for contraception. In this hormone preparation, a gestagenic as well as an estrogenic component are contained as active substances, each with a sufficiently long action to achieve a contraceptive effect for a one-month period. ... So-called progestogen-only injectables are also available, which ensure longer-lasting contraceptive protection, but with poor cycle control.

Web site: <http://appft1.uspto.gov/netathtml/PTO/search-bool.html>

- **Soluble contraceptive liquid formulation**

Inventor(s): Uang, Herling ; (Somerset, NJ), Wei, Shifeng ; (Belle Mead, NJ), Wong, George ; (Belle Mead, NJ)

Correspondence: Philip S. Johnson, Esq.; Johnson & Johnson; One Johnson & Johnson Plaza; New Brunswick; NJ; 08933-7003; US

Patent Application Number: 20020103179

Date filed: December 1, 2000

Abstract: This invention provides a convenient process for preparing an oral contraceptive liquid formulation having improved solubility, bioavailability and stability useful as a reference standard.

Excerpt(s): This invention provides a process for preparing a pharmaceutically useful oral contraceptive liquid formulation. More particularly, this invention provides a convenient process for preparing a oral contraceptive liquid formulation using certain ingredients having improved solubility, bioavailability and stability and pharmaceutically useful as a reference standard for comparing the bioavailability of another oral contraceptive formulation. ... Pharmaceutical manufacturers are required to compare the bioavailability of dosage forms after formulation changes have been made. For example, the bioavailability of an approved formulation of a tablet batch produced

at commercial scale is compared with that of a formulation for which approval is sought, hereinafter referred to as a "biobatch." A comparative bioavailability study must then be conducted wherein tablets from the approved and biobatch formulation are each administered to volunteers. Plasma samples are then drawn and the amount of active agent present is analyzed. For an agent that is metabolized quickly after absorption, though, relative bioavailability must be measured instead. The parent compound remains in such a low quantities for quickly metabolized agents that the plasma concentration cannot be measured due to analytical equipment limits of detection. Therefore, the amount of metabolite present serves as a measure of relative bioavailability. ... Relative bioavailability of a biobatch formulation is determined by using a reference standard that delivers a known and measurable quantity of the active agent. Such a reference standard may be in the dosage form of an IV solution, an oral solution or a tablet. Many steroid contraceptive drugs, however, are either poorly soluble or completely insoluble in water. Therefore, formulating an IV reference standard for such drugs is subject to many problems associated with low aqueous solubility properties. While an IV reference standard will provide a higher dose of active agent, a suitable IV formulation is limited by the poor solubility of the active agent in water and is not as convenient to administer as a tablet.

Web site: <http://appft1.uspto.gov/netahtml/PTO/search-bool.html>

- **Use of sulfonated compounds as a barrier contraceptive**

Inventor(s): Cherr, Gary N. ; (Penngrove, CA), Salinas, Edward R. ; (Vallejo, CA)

Correspondence: QUINE INTELLECTUAL PROPERTY LAW GROUP, P.C.; P O BOX 458; ALAMEDA; CA; 94501; US

Patent Application Number: 20030134803

Date filed: February 13, 2002

Abstract: This invention provides methods, compositions and contraceptive devices that use sulfonated compounds that interact with sperm to inhibit fertilization. Natural contraceptive methods, compositions and contraceptive devices are also included. These natural contraceptives use sulfonated compounds isolated from natural sources. Methods, compositions and contraceptive devices are also provided that use a lignin and/or a derivative thereof.

Excerpt(s): This application is related to U.S. S No. 60/349,144 "THE USE OF SULFONATED COMPOUNDS AS A BARRIER CONTRACEPTIVE" by Cherr et al., filed Jan. 15, 2002, the disclosure of which is incorporated herein by reference. The present application claims priority to and the benefit of this prior application, pursuant to 35 U.S.C. .sctn.119(e). ... This invention relates to methods, compositions and devices involved in inhibiting fertilization. Fertilization is inhibited in the present invention by using compounds that interact with sperm. The interaction of the compounds with the sperm can prevent the sperm from interacting with the zona pellucida. The compounds of the present invention include sulfonated compounds, sulfonated compounds from natural sources, lignins and derivatives of lignins. ... The fertilization of an oocyte is a complex process. One region of the oocyte involved in fertilization is the zona pellucida (ZP). The ZP is a covering that surrounds mammalian oocytes. The ZP is formed during the development of the oocyte and follicular cell differentiation. The ZP serves to protect the oocyte and embryo until implantation in the uterine wall and serves as an attachment site for sperm. Upon attachment of the sperm to the zona pellucida and penetration of the zona pellucida by the sperm, the oocyte becomes fertilized. ZP may

also prevent polyspermy because fertilization of the oocyte alters sperm binding to the ZP.

Web site: <http://appft1.uspto.gov/netahtml/PTO/search-bool.html>

- **ZONA PELLUCIDA PROTEINS FOR CONTRACEPTION**

Inventor(s): HABENICHT, URSULA-FRIEDERIKE ; (BERLIN, DE), LOBBIA, ALESSANDRO ; (GLIENICKE, DE)

Correspondence: MILLEN WHITE ZELANO & BRANIGAN; ARLINGTON COURTHOUSE PLAZA I; 2200 CLARENDON BOULEVARD SUITE 1400; ARLINGTON; VA; 22201

Patent Application Number: 20020004479

Date filed: May 3, 1999

Abstract: The present invention relates to the use of peptides which are derived from zona pellucida proteins and are used for contraception, and pharmaceutical formulations which contain said peptides without said peptides having an immunogenic effect.

Excerpt(s): This invention relates to the use of peptides that are derived from zona pellucida proteins for contraception and for pharmaceutical formulations that contain these peptides, without these peptides having an immunizing action. ... With the increase in world population, the need for efficient methods of contraception is also growing. In addition to oral contraceptives and spermicides, mechanical contraceptives are also available here, such as, for example, IUDs (intrauterine devices), vaginal rings, and condoms. Another approach is based on preventing fertilization by blocking the egg-sperm interaction. The sperm must penetrate the zona pellucida, an extracellular matrix that consists of glycoproteins and that surrounds the female gametes (the growing oocytes and the ovulated egg). This interaction takes place via a complex interplay of ligands, as well as sperm receptors on the part of the ovocyte or the sperm surface. The zona pellucida of the various mammalian species consists of three to four glycoproteins, which are normally referred to as ZP1, 2, and 3 or ZPA, B and C [Harris, J. et al.: Cloning and Characterization of Zona Pellucida Genes and cDNA's from Variety of Mammalian Species: The ZPA, ZPB and ZPC Gene Families. DNA Sequence: 4, 361-393, (1994)]. In mice, it has been described that the sperm bond first to ZP3 via O-bonded oligosaccharide chains, and the additional bond is probably mediated by ZP2. ZP3 seems to mediate not only the initial bond of the sperm to the zona pellucida, but also another decisive process for fertilization, the acrosome reaction [Dean, J.: Biology of Mammalian Fertilization. J. Clin. Invest.: 89, 1055-1059 (1992); Wassermann, P. M.: Regulation of Fertilization by Zona Pellucida Glycoproteins. J. Reprod. Suppl.: 42, 79-87, (1990)]. ... In view of the fact that the zona pellucida glycoproteins are unique in the ovary, exhibit antigenic properties, and are accessible to circulating antibodies during the intraovarian growth phase, the research has focused on the development of contraceptive vaccines on the basis of zona pellucida proteins [Naz, R. K. et al.: Development of Contraceptive Vaccines for Humans Using Antigen Derived from Gametes (Spermatozoa and Zona Pellucida) and Hormones (Human Chorionic Gonadotropin): Current Status. Human Reprod. Update: 1, 1-18, (1995); Millar, S. E. et al.: Vaccination with Zona Pellucida Peptides Produces Long-Term Contraception in Female Mice. Science: 246, 935-938, (1989)]. A phenomenon that was noted in almost all animals in the case of immunization with zona pellucida proteins is the induction of an oophoritis. Previously it was not possible to completely explain the reason for the

occurrence of an oophoritis. In any case, the formation of an oophoritis makes the longer-term use of zona pellucida proteins or of peptides that are derived from these proteins appear problematical for contraceptive immunization.

Web site: <http://appft1.uspto.gov/netahtml/PTO/search-bool.html>

Keeping Current

In order to stay informed about patents and patent applications dealing with birth control, you can access the U.S. Patent Office archive via the Internet at the following Web address: <http://www.uspto.gov/main/patents.htm>. Under "Services," click on "Search Patents." You will see two broad options: (1) Patent Grants, and (2) Patent Applications. To see a list of granted patents, perform the following steps: Under "Patent Grants," click "Quick Search." Then, type "birth control" (or synonyms) into the "Term 1" box. After clicking on the search button, scroll down to see the various patents which have been granted to date on birth control. You can also use this procedure to view pending patent applications concerning birth control. Simply go back to the following Web address: <http://www.uspto.gov/main/patents.htm>. Under "Services," click on "Search Patents." Select "Quick Search" under "Patent Applications." Then proceed with the steps listed above.

CHAPTER 7. BOOKS ON BIRTH CONTROL

Overview

This chapter provides bibliographic book references relating to birth control. In addition to online booksellers such as www.amazon.com and www.bn.com, excellent sources for book titles on birth control include the Combined Health Information Database and the National Library of Medicine. Your local medical library also may have these titles available for loan.

Book Summaries: Federal Agencies

The Combined Health Information Database collects various book abstracts from a variety of healthcare institutions and federal agencies. To access these summaries, go directly to the following hyperlink: <http://chid.nih.gov/detail/detail.html>. You will need to use the "Detailed Search" option. To find book summaries, use the drop boxes at the bottom of the search page where "You may refine your search by." Select the dates and language you prefer. For the format option, select "Monograph/Book." Now type "birth control" (or synonyms) into the "For these words:" box. You should check back periodically with this database which is updated every three months. The following is a typical result when searching for books on birth control:

- **The contraceptive handbook: A guide to safe and effective choices**

Source: Yonkers, NY: Consumer Reports Books. 1992. 248 pp.

Contact: Available from Consumer Reports Books, 51 East 42nd Street, New York, NY 10017. \$18.95 plus postage and handling.

Summary: This guide provides detailed information about all birth control methods and devices available in the American market. Each birth control method, its effectiveness, use, and health effects are described. Issues related to birth control are also discussed. These include breastfeeding and contraception, abortion, and new alternatives currently being developed. This guide was produced with the editors of Consumer Reports, and is intended for a general audience.

Book Summaries: Online Booksellers

Commercial Internet-based booksellers, such as Amazon.com and Barnes&Noble.com, offer summaries which have been supplied by each title's publisher. Some summaries also include customer reviews. Your local bookseller may have access to in-house and commercial databases that index all published books (e.g. Books in Print®). **IMPORTANT NOTE:** Online booksellers typically produce search results for medical and non-medical books. When searching for "birth control" at online booksellers' Web sites, you may discover non-medical books that use the generic term "birth control" (or a synonym) in their titles. The following is indicative of the results you might find when searching for "birth control" (sorted alphabetically by title; follow the hyperlink to view more details at Amazon.com):

- **"The Sex Side of Life": Mary Ware Dennett's Pioneering Battle for Birth Control and Sex Education** by Constance M. Chen (1996); ISBN: 1565841328;
<http://www.amazon.com/exec/obidos/ASIN/1565841328/icongroupinterna>
- **A Cooperative Method of Natural Birth Control** by Margaret Nofziger (1992); ISBN: 0913990841;
<http://www.amazon.com/exec/obidos/ASIN/0913990841/icongroupinterna>
- **A Dirty Filthy Book: The Writings of Charles Knowlton and Annie Besant on Reproductive Physiology and Birth Control and an Account of the Bradlaugh** by Sripati Chandrasekhar (1981); ISBN: 0520041682;
<http://www.amazon.com/exec/obidos/ASIN/0520041682/icongroupinterna>
- **A Simple Guide to Birth Control** by Kamal K., Md. Dutta, Janice m Phelps (Illustrator) (2002); ISBN: 1931991502;
<http://www.amazon.com/exec/obidos/ASIN/1931991502/icongroupinterna>
- **Abortion before Birth Control: The Politics of Reproduction in Postwar Japan.** by Tiana Norgren, Christiana A. E. Norgren; ISBN: 0691070059;
<http://www.amazon.com/exec/obidos/ASIN/0691070059/icongroupinterna>
- **Astrological birth control** by Sheila Ostrander; ISBN: 0130494119;
<http://www.amazon.com/exec/obidos/ASIN/0130494119/icongroupinterna>
- **Birth control : or the limitation of offspring** by William J. Robinson (Author); ISBN: B00005X9FA;
<http://www.amazon.com/exec/obidos/ASIN/B00005X9FA/icongroupinterna>
- **Birth Control and Christian Discipleship** by John F. Kippley (1993); ISBN: 0926412108;
<http://www.amazon.com/exec/obidos/ASIN/0926412108/icongroupinterna>
- **Birth Control and Controlling Birth: Women-Centered Perspectives (Contemporary Issues in Biomedicine, Ethics, and Society)** by Helen B. Holmes (Editor), et al (1981); ISBN: 0896030229;
<http://www.amazon.com/exec/obidos/ASIN/0896030229/icongroupinterna>
- **Birth Control and Protection: Choices for Teens (Perspectives on Healthy Sexuality)** by Judith Peacock; ISBN: 0736807152;
<http://www.amazon.com/exec/obidos/ASIN/0736807152/icongroupinterna>
- **Birth control and the marriage covenant** by John F. Kippley; ISBN: 0814609155;
<http://www.amazon.com/exec/obidos/ASIN/0814609155/icongroupinterna>
- **Birth Control Choices** by Gloria M. Bertacchi (1988); ISBN: 0945753020;
<http://www.amazon.com/exec/obidos/ASIN/0945753020/icongroupinterna>

- **Birth Control for Christians: Making Wise Choices** by Jenell Williams Paris (2003); ISBN: 0801064376;
<http://www.amazon.com/exec/obidos/ASIN/0801064376/icongroupinterna>
- **Birth Control in America: The Career of Margaret Sanger** by David M. Kennedy (1970); ISBN: 0300014953;
<http://www.amazon.com/exec/obidos/ASIN/0300014953/icongroupinterna>
- **Birth Control in China 1949-2000: Population Policy and Demographic Development (Chinese Worlds)** by Thomas Scharping (2002); ISBN: 0700711546;
<http://www.amazon.com/exec/obidos/ASIN/0700711546/icongroupinterna>
- **Birth Control in Jewish Law: Marital Relations, Contraception, and Abortion As Set Forth in the Classic Texts of Jewish Law** by David M. Feldman (1998); ISBN: 0765760584;
<http://www.amazon.com/exec/obidos/ASIN/0765760584/icongroupinterna>
- **Birth control in practice; analysis of ten thousand case histories of the Birth Control Clinical Research Bureau** by Marie Elizabeth Kopp; ISBN: 0405038674;
<http://www.amazon.com/exec/obidos/ASIN/0405038674/icongroupinterna>
- **Birth Control Politics in the United States, 1916-1945** by Carole R. McCann (1994); ISBN: 0801424909;
<http://www.amazon.com/exec/obidos/ASIN/0801424909/icongroupinterna>
- **Birth control practice and marital fertility in Great Britain : a report on a survey carried out in 1967-68** by Christopher M. Langford; ISBN: 0905804007;
<http://www.amazon.com/exec/obidos/ASIN/0905804007/icongroupinterna>
- **Birth Control Technologies: Prospects by the Year 2000** by Michael J. K. Harper (1983); ISBN: 0292707398;
<http://www.amazon.com/exec/obidos/ASIN/0292707398/icongroupinterna>
- **Birth Control Vaccines (Medical Intelligence Unit)** by G. P. Talwar, Raj Raghupathy (1995); ISBN: 1570591261;
<http://www.amazon.com/exec/obidos/ASIN/1570591261/icongroupinterna>
- **Birth Control: A Woman's Choice** by American College of Obstetricians and Gy (2003); ISBN: 0915473879;
<http://www.amazon.com/exec/obidos/ASIN/0915473879/icongroupinterna>
- **Breast Cancer : Its Link to Abortion and the Birth Control Pill** by Kahlenborn, MD Chris, MD Chris Kahlenborn (2000); ISBN: 0966977734;
<http://www.amazon.com/exec/obidos/ASIN/0966977734/icongroupinterna>
- **Coerced Contraception: Moral and Policy Challenges of Long-Acting Birth Control** by Ellen H. Moskowitz (Editor), Bruce Jennings (Editor) (1996); ISBN: 0878403647;
<http://www.amazon.com/exec/obidos/ASIN/0878403647/icongroupinterna>
- **Congratulations! You're Not Pregnant: An Illustrated Guide to Birth Control** by Peter Mayle, Arthur Robins; ISBN: 0025825402;
<http://www.amazon.com/exec/obidos/ASIN/0025825402/icongroupinterna>
- **Contraception: A Guide to Birth Control Methods** by Vern L. Bullough, Bonnie Bullough (1997); ISBN: 1573921599;
<http://www.amazon.com/exec/obidos/ASIN/1573921599/icongroupinterna>
- **Coping With Birth Control (Coping)** by Michael D. Benson, Roger Benson (Editor); ISBN: 0823914895;
<http://www.amazon.com/exec/obidos/ASIN/0823914895/icongroupinterna>

- **Cosmo-Biological Birth Control** by Shalila Sharamon, et al; ISBN: 0941524825;
<http://www.amazon.com/exec/obidos/ASIN/0941524825/icongroupinterna>
- **Echoes from the past : a pictorial history of the social changes that grew out of the struggle for birth control, and of new threats against this basic human right** by Gina Johnson; ISBN: 0934586039;
<http://www.amazon.com/exec/obidos/ASIN/0934586039/icongroupinterna>
- **Encyclopedia of Birth Control** by Marian Rengel (Author); ISBN: 1573562556;
<http://www.amazon.com/exec/obidos/ASIN/1573562556/icongroupinterna>
- **Encyclopedia of Birth Control** by Vern L. Bullough (Editor), et al; ISBN: 1576071812;
<http://www.amazon.com/exec/obidos/ASIN/1576071812/icongroupinterna>
- **Every Child a Wanted Child: Clarence James Gamble and His Work in the Birth Control Movement** by Doone Williams (Contributor), et al (1978); ISBN: 0674270258;
<http://www.amazon.com/exec/obidos/ASIN/0674270258/icongroupinterna>
- **Everything You Need to Know About Birth Control (Need to Know Library)** by Gary Mucciolo (1998); ISBN: 0823922928;
<http://www.amazon.com/exec/obidos/ASIN/0823922928/icongroupinterna>
- **From Private Vice to Public Virtue: The Birth Control Movement and American Society Since 1830** by James, Reed; ISBN: 046502582X;
<http://www.amazon.com/exec/obidos/ASIN/046502582X/icongroupinterna>
- **Herbal Birth Control: A Brief History With Ancient and Modern Herbal Recipes** by R. R. McGregor; ISBN: 0963660209;
<http://www.amazon.com/exec/obidos/ASIN/0963660209/icongroupinterna>
- **Immaculate Contraception: The Extraordinary Story of Birth Control from the First Fumblings to the Present Day** by Emma Dickens (2000); ISBN: 1861053371;
<http://www.amazon.com/exec/obidos/ASIN/1861053371/icongroupinterna>
- **Intended Consequences: Birth Control, Abortion, and the Federal Government in Modern America** by Donald T. Critchlow (2001); ISBN: 0195145933;
<http://www.amazon.com/exec/obidos/ASIN/0195145933/icongroupinterna>
- **Issues of Life and Death: Abortion, Birth Control, Capital Punishment, Euthanasia** by James Norman Dalrymple, Sir. Anderson; ISBN: 0877847215;
<http://www.amazon.com/exec/obidos/ASIN/0877847215/icongroupinterna>
- **It's Your Choice: A Personal Guide to Birth Control Methods for Women and Men, Too!** by Josephs Hatcher, et al; ISBN: 0878574719;
<http://www.amazon.com/exec/obidos/ASIN/0878574719/icongroupinterna>
- **Love, Marriage, and the Catholic Conscience: Understanding the Church's Teachings on Birth Control** by Dietrich Von Hildebrand, et al; ISBN: 0918477824;
<http://www.amazon.com/exec/obidos/ASIN/0918477824/icongroupinterna>
- **Margaret Sanger and the Birth Control Movement** by Gloria Moore, Ronald Moore; ISBN: 0810819031;
<http://www.amazon.com/exec/obidos/ASIN/0810819031/icongroupinterna>
- **Margaret Sanger: A Biography of the Champion of Birth Control** by Madeline. Gray; ISBN: 0399900195;
<http://www.amazon.com/exec/obidos/ASIN/0399900195/icongroupinterna>
- **Marie Stopes and birth control** by Harry Verdon Stopes-Roe; ISBN: 0850781159;
<http://www.amazon.com/exec/obidos/ASIN/0850781159/icongroupinterna>

- **Marital Relations, Birth Control, and Abortion in Jewish Law** by David M. Feldman; ISBN: 0805204385;
<http://www.amazon.com/exec/obidos/ASIN/0805204385/icongroupinterna>
- **Mental Birth Control** by Mildred Jackson, et al (1978); ISBN: 0932516009;
<http://www.amazon.com/exec/obidos/ASIN/0932516009/icongroupinterna>
- **Methods of Birth Control** by Lewis Warsh; ISBN: 0940650215;
<http://www.amazon.com/exec/obidos/ASIN/0940650215/icongroupinterna>
- **Natural Birth Control Made Simple** by Barbara Kass-Annese, Hal C., Md. Danzer (2003); ISBN: 0897934032;
<http://www.amazon.com/exec/obidos/ASIN/0897934032/icongroupinterna>
- **Negotiating Intimacies: Sexualities, Birth Control & Poor Households** by Arna Seal; ISBN: 8185604290;
<http://www.amazon.com/exec/obidos/ASIN/8185604290/icongroupinterna>
- **New No-Pill No-Risk Birth Control** by Nona Aguilar (2002); ISBN: 0743244834;
<http://www.amazon.com/exec/obidos/ASIN/0743244834/icongroupinterna>
- **No Pill No Risk Birth Control** by Nona Aguilar (1980); ISBN: 0892561297;
<http://www.amazon.com/exec/obidos/ASIN/0892561297/icongroupinterna>
- **No-Pill No-Risk Birth Control** by Nona Aguilar; ISBN: 0892561181;
<http://www.amazon.com/exec/obidos/ASIN/0892561181/icongroupinterna>
- **Population, Evolution and Birth Control: A College of Controversial Ideas** by Garrett Hardin (Editor); ISBN: 0716706709;
<http://www.amazon.com/exec/obidos/ASIN/0716706709/icongroupinterna>
- **Practical preveception; or, The technique of birth control; giving the latest methods of prevention of conception, discussing their effect, favorable or unfavorable, on the sex act; their indications and contra-indications, pointing out the reasons** by William J. Robinson (Author); ISBN: B00005XQ3T;
<http://www.amazon.com/exec/obidos/ASIN/B00005XQ3T/icongroupinterna>
- **Preventing Pregnancy, Protecting Health: A New Look at Birth Control** by Susan Harlap, et al; ISBN: 0939253216;
<http://www.amazon.com/exec/obidos/ASIN/0939253216/icongroupinterna>
- **Prophet and Priests: The Hidden Face of the Birth Control Movement** by Ann Farmer (2002); ISBN: 1901157628;
<http://www.amazon.com/exec/obidos/ASIN/1901157628/icongroupinterna>
- **Reforming Sex: The German Movement for Birth Control and Abortion Reform, 1920-1950** by Atina Grossmann (1997); ISBN: 0195121244;
<http://www.amazon.com/exec/obidos/ASIN/0195121244/icongroupinterna>
- **Reproductive Physiology and Birth Control: The Writings of Charles Knowlton and Annie Besant** by S. Chandrasekhar (Editor) (2002); ISBN: 0765809044;
<http://www.amazon.com/exec/obidos/ASIN/0765809044/icongroupinterna>
- **Seventy birth control clinics; a survey and analysis including the general effects of control on size and quality of population** by Caroline Robinson; ISBN: 0405038755;
<http://www.amazon.com/exec/obidos/ASIN/0405038755/icongroupinterna>
- **Sex, Fertility and Birth Control** by Isadore Rossman; ISBN: 087396022X;
<http://www.amazon.com/exec/obidos/ASIN/087396022X/icongroupinterna>

- **Signs of Fertility: The Personal Science of Natural Birth Control** by Margaret Nofziger, et al; ISBN: 0940847086;
<http://www.amazon.com/exec/obidos/ASIN/0940847086/icongroupinterna>
- **Slaughter of the Innocents: Abortion, Birth Control, and Divorce in Light of Science, Law and Theology** by John Warwick Montgomery (1981); ISBN: 0891072160;
<http://www.amazon.com/exec/obidos/ASIN/0891072160/icongroupinterna>
- **Slaughter of the Innocents: Coercive Birth Control in China** by John S. Aird (1990); ISBN: 0844737038;
<http://www.amazon.com/exec/obidos/ASIN/0844737038/icongroupinterna>
- **Taking Charge of Your Fertility: The Definitive Guide to Natural Birth Control, Pregnancy Achievement, and Reproductive Health (Revised Edition)** by Toni Weschler (Author); ISBN: 0060937645;
<http://www.amazon.com/exec/obidos/ASIN/0060937645/icongroupinterna>
- **The agonising choice; birth control, religion, and the law** by Norman St. John-Stevas; ISBN: 0253100607;
<http://www.amazon.com/exec/obidos/ASIN/0253100607/icongroupinterna>
- **The American Religious Debate over Birth Control 1907-1937** by Kathleen A. Tobin (2001); ISBN: 0786410817;
<http://www.amazon.com/exec/obidos/ASIN/0786410817/icongroupinterna>
- **The Birth Control Book** by Philip A. Belcastro; ISBN: 0867200685;
<http://www.amazon.com/exec/obidos/ASIN/0867200685/icongroupinterna>
- **The Birth Control King of Upper Volta** by Leon Rooke; ISBN: 0920802486;
<http://www.amazon.com/exec/obidos/ASIN/0920802486/icongroupinterna>
- **The Birth Control Movement and American Society: From Private Vice to Public Virtue** by James Reed; ISBN: 0691094047;
<http://www.amazon.com/exec/obidos/ASIN/0691094047/icongroupinterna>
- **The Complete Cervical Cap Guide: Everything You Want to Know About This Safe, Effective...Birth Control Program** by Rebecca Chalker, Suzann Gage; ISBN: 0060961139;
<http://www.amazon.com/exec/obidos/ASIN/0060961139/icongroupinterna>
- **The Facts About Birth Control** by Judie Brown; ISBN: 1890712132;
<http://www.amazon.com/exec/obidos/ASIN/1890712132/icongroupinterna>
- **The Margaret Sanger Story : and the Fight for Birth Control** by Lawrence Lader (Author) (1975); ISBN: 0837170761;
<http://www.amazon.com/exec/obidos/ASIN/0837170761/icongroupinterna>
- **The Moral Property of Women: A History of Birth Control Politics in America** by Linda Gordon (2002); ISBN: 0252027647;
<http://www.amazon.com/exec/obidos/ASIN/0252027647/icongroupinterna>
- **The new birth control program** by Christine Garfink; ISBN: 0918282039;
<http://www.amazon.com/exec/obidos/ASIN/0918282039/icongroupinterna>
- **The new natural astrological way to birth control** by Robert Choy; ISBN: 0917766016;
<http://www.amazon.com/exec/obidos/ASIN/0917766016/icongroupinterna>
- **The New No-Pill, No-Risk Birth Control**; ISBN: 0892562994;
<http://www.amazon.com/exec/obidos/ASIN/0892562994/icongroupinterna>
- **The Pill, Pygmy Chimps, and Degas' Horse/the Remarkable Autobiography of the Award-Winning Scientist Who Synthesized the Birth Control Pill** by Carl Djerassi

(1998); ISBN: 0465057586;
<http://www.amazon.com/exec/obidos/ASIN/0465057586/icongroupinterna>

- **The Pivot of Civilization in Historical Perspective: The Birth Control Classic** by Margaret Sanger, et al; ISBN: 158742004X;
<http://www.amazon.com/exec/obidos/ASIN/158742004X/icongroupinterna>
- **The Politics of Abortion and Birth Control in Historical Perspective (Issues in Policy History, No 5)** by Donald T. Critchlow (Editor) (1996); ISBN: 0271015705;
<http://www.amazon.com/exec/obidos/ASIN/0271015705/icongroupinterna>
- **Turning Point: The Inside Story of the Papal Birth Control Commission, and How Humane Vitae Changed the Life of Patty Crowley and the Future of the Church** by Robert McClory (1997); ISBN: 0824516133;
<http://www.amazon.com/exec/obidos/ASIN/0824516133/icongroupinterna>
- **Wild Yam: Birth Control Without Fear** by Willa Shaffer (2011); ISBN: 0913923109;
<http://www.amazon.com/exec/obidos/ASIN/0913923109/icongroupinterna>
- **Woman of Valor: Margaret Sanger and the Birth Control Movement in America** by Ellen Chesler; ISBN: 0671600885;
<http://www.amazon.com/exec/obidos/ASIN/0671600885/icongroupinterna>
- **Woman's Body, Woman's Right: A Social History of Birth Control in America** by Linda Perlman Gordon; ISBN: 0140046836;
<http://www.amazon.com/exec/obidos/ASIN/0140046836/icongroupinterna>

The National Library of Medicine Book Index

The National Library of Medicine at the National Institutes of Health has a massive database of books published on healthcare and biomedicine. Go to the following Internet site, <http://locatorplus.gov/>, and then select "Search LOCATORplus." Once you are in the search area, simply type "birth control" (or synonyms) into the search box, and select "books only." From there, results can be sorted by publication date, author, or relevance. The following was recently catalogued by the National Library of Medicine:¹¹

- **Beyond birth control; the Christian experience of sex.** Author: Callahan, Sidney Cornelia.; Year: 1967; New York, Sheed and Ward [1968]
- **Birth control and love; the complete guide to contraception and fertility [by] Alan F. Guttmacher, with Winfield Best and Frederick S. Jaffe.** Author: Guttmacher, Alan Frank.; Year: 1969; New York] Macmillan; London, Collier-Macmillan [c1969]
- **Birth control and natural law.** Author: Drinkwater, Francis Harold.; Year: 1965; Baltimore, Helicon [c1965]
- **Birth control and the state; a plea and a forecast, by C. P. Blacker...** Author: Blacker, Charles Paton.; Year: 1962; New York, E. P. Dutton; company [c1926]

¹¹ In addition to LOCATORPlus, in collaboration with authors and publishers, the National Center for Biotechnology Information (NCBI) is currently adapting biomedical books for the Web. The books may be accessed in two ways: (1) by searching directly using any search term or phrase (in the same way as the bibliographic database PubMed), or (2) by following the links to PubMed abstracts. Each PubMed abstract has a "Books" button that displays a facsimile of the abstract in which some phrases are hypertext links. These phrases are also found in the books available at NCBI. Click on hyperlinked results in the list of books in which the phrase is found. Currently, the majority of the links are between the books and PubMed. In the future, more links will be created between the books and other types of information, such as gene and protein sequences and macromolecular structures. See <http://www.ncbi.nlm.nih.gov/entrez/query.fcgi?db=Books>.

- **Birth control ethics, being a criticism of the report of a committee appointed by the National council of public morals, 1925, by Rev. Henry Davis...** Author: Davis, Henry;; Year: 1928; London, Burns, Oates; Washbourne ltd [1928]
- **Birth control in Asia; a report of a conference held at the London School of Hygiene & Tropical Medicine, November 24-25, 1933.** Author: Fielding, Michael.; Year: 1935; London,
- **Birth control in the modern world; the role of the individual in population control.** Author: Draper, Elizabeth;; Year: 1965; [Harmondsworth, Eng.] Penguin Books [1965]
- **Birth control program; policies and procedures manual.** Author: District of Columbia. Dept. of Public Health.; Year: 1966; [Washington] 1966
- **Birth control simplified; describing effective and inexpensive modern methods of avoiding pregnancy, acceptable and accessible to the majority of couples.** Author: Pillay, A. P.; Year: 1968; Bombay, Taraporevala [1965]
- **Birth control, a continuing controversy, compiled and edited by Edward T. Tyler.** Author: Tyler, Edward T. (Edward Titlebaum);; Year: 1967; Springfield, Ill., Thomas [c1967]
- **Birth control, by Ernest Havemann and the editors of Time-Life Books.** Author: Havemann, Ernest.; Year: 1967; New York, Time Incorporated, 1967
- **Birth control.** Author: Sharma, Lakshminarayan;; Year: 1967; [Delhi, Hind Pocket Books, 1967?]
- **Birth control; advice on family spacing and health sex life.** Author: Wright, Helena.; Year: 1964; London, Cassell [1964]
- **Family planning: the Family Planning Association's guide to birth control.** Author: Vaughan, Paul.; Year: 1969; London, Queen Anne Press [c1969]; ISBN: 362000441
- **Illustrations and proofs of the principle of population; being the first work on population in the English language recommending birth control, now exactly reproduced with an introduction demonstrating Francis Place as the founder of the modern birth control movement, together with unpublished letters of Place on birth control, Coleridge's criticisms of Malthus' views on the birth control. Critical and textual notes by Norman E. Himes.** Author: Place, Francis;; Year: 1967; New York, Kelley, 1967
- **Inside information on sex and birth control.** Author: Taylor, Rosalie.; Year: 1969; [London] Dickens [c1969]; ISBN: 850901995
- **Margaret Sanger, pioneer of birth control [by] Lawrence Lader [and] Milton Meltzer.** Author: Lader, Lawrence.; Year: 1969; New York, Crowell [c1969]
- **Methods of birth control.** Author: Airi, Em.; Year: 1950; New Delhi, Varma [1950?]
- **Modern contraception; a practical guide to scientific birth control.** Author: Bloom, Philip M.; Year: 1964; London, Delisle [9164]
- **Modern marriage and birth control.** Author: Griffith, Edward F. (Edward Fyfe); Year: 1944; London, Gollancz, 1944
- **Plan your family; practical birth control.** Author: Cilento, Phyllis D.; Year: 1965; [Brisbane] Jacaranda [1965]
- **Population, evolution, birth control; a collage of controversial readings.** Author: Hardin, Garrett;; Year: 1964; San FRANCISCO, ?Freeman [c1964]
- **Practical birth control.** Author: Smyth, Margaret.; Year: 1966; London, Heinemann [c1966]

- **Round the world for birth control with Margaret Sanger and Edith How-Martyn; an account of an international tour under the auspices of Birth Control International Information Centre, London.** Author: Birth Control International Information Centre, London.; Year: 1967; [New York, 1936?]
- **Sex, fertility and birth control.** Author: Rossman, Isadore;; Year: 1965; New York, Stravon [1967]
- **The right to birth control information in family planning; report of a Joint Committee of the Committee on Family and Child Welfare and the Committee on Health. Report prepared for the Committee by Alice R. McCabe and Aline F. LeMat.** Author: Community Service Society of New York. Dept. of Public Affairs.; Year: 1964; New York, 1964

Chapters on Birth Control

In order to find chapters that specifically relate to birth control, an excellent source of abstracts is the Combined Health Information Database. You will need to limit your search to book chapters and birth control using the "Detailed Search" option. Go to the following hyperlink: <http://chid.nih.gov/detail/detail.html>. To find book chapters, use the drop boxes at the bottom of the search page where "You may refine your search by." Select the dates and language you prefer, and the format option "Book Chapter." Type "birth control" (or synonyms) into the "For these words:" box. The following is a typical result when searching for book chapters on birth control:

- **Cervical Cancer**

Source: in Harvard Guide to Women's Health. Carlson, K.J. Eisenstat, S.A. Ziporyn, T. Harvard University Press, Cambridge, MA, pp. 130-132, 1996.

Summary: Cervical Cancer, a chapter in The Harvard Guide to Women's Health, discusses the symptoms, evaluation, treatment, and prevention of cervical cancer. Cervical cancer is the third most common cancer of the female genital tract after endometrial and ovarian cancer. Cervical cancer develops gradually starting with precancerous abnormal cell changes called low-grade squamous intraepithelial lesions or dysplasia. These cells may revert to normal or may develop into localized cancer that then can invade deeper tissue. Women of any age and ethnic group can develop cervical cancer, but black women are twice as likely as white women to die from it. Hispanic, black, and Native American women have a higher incidence of cervical cancer. Lack of health care access is a factor. Risk factors include (1) having multiple sex partners, (2) early age of first sexual intercourse, (3) a prior history of sexually transmitted diseases, (4) cigarette smoking, (5) human papillomavirus infection, and (6) human immunodeficiency virus infection. There are usually no symptoms associated with preinvasive cervical cancer. Symptoms of cervical cancer include (1) bleeding after intercourse or between menstrual periods; (2) heavy menstrual periods; (3) vaginal discharge; (4) leg, back, or pelvic pain; (5) painful urination; and (6) swelling of the legs. Cervical cancer is diagnosed by pelvic examinations and abnormal cells on a Papanicolaou (Pap) smear test. Further tests include colposcopy, blood tests, a chest x-ray, and an intravenous pyelogram. Cervical cancer is divided into four stages: (1) Stage one is confined to the cervix; (2) stage two extends beyond the cervix and may include the upper two-thirds of the vagina; (3) stage three involves the pelvic sidewall and all of the vagina; and (4) stage four involves the bladder, rectum, or more distant organs. Treatment depends on the stage of disease and may involve (1) cryotherapy, (2) laser

surgery, (3) electrosurgical loop excision, (4) hysterectomy, (5) radiation therapy, or (6) chemotherapy. Prevention strategies include (1) a barrier method of **birth control**, and (2) having an annual Pap test starting at age 18 or at the onset of sexual activity.

- **Breast Cancer Screening**

Source: in Breast Cancer Education for Department of Defense Primary Care Managers: Master Faculty Instruction Manual. Morris, L.L. Osuch, J.R. Alexandria, VA, American Medical Women's Association, pp. I-1-106, (n.d.).

Contact: American Medical Women's Association, 801 North Fairfax Street, Suite 400, Alexandria, VA 22314. (703) 838-0500. FAX: (703) 549-3864.

Summary: Breast Cancer Screening, a module in Breast Cancer Education for Department of Defense Primary Care Managers: Master Faculty Instruction Manual, describes breast cancer screening and detection techniques. The module reviews the anatomy of the breast and stages of breast development. Understanding how breasts change over the course of a woman's life enables the physician to better perform and interpret clinical breast exams. The module continues with a discussion of risk factors for breast cancer, including (1) family history, (2) age factors, (3) lactation, (4) **birth control** pills, (5) hormone replacement, and (6) elective abortion. A subgroup of women have a genetic alteration that makes them more susceptible to the development of breast cancer. Candidates for genetic susceptibility testing include women diagnosed with early-onset breast cancer, women diagnosed with ovarian cancer, women with a family pedigree suggesting breast and/or ovarian cancer, and blood relatives of those who carry a BRCA1 or BRCA2 mutation. The module also discusses surveillance, mastectomies, cancer survival, and cancer prevention.

- **Effect of Medications on Diabetes**

Source: in Carlisle, B.A. Kroon, L.A. Koda-Kimble, M.A. 101 Medication Tips for People with Diabetes. Alexandria, VA: American Diabetes Association. 1999. p. 76-83.

Contact: Available from American Diabetes Association (ADA). Order Fulfillment Department, P.O. Box 930850, Atlanta, GA 31193-0850. (800) 232-6733. Fax (770) 442-9742. Website: www.diabetes.org. PRICE: \$14.95 plus shipping and handling. ISBN: 1580400329. Order number 483301.

Summary: This chapter answers questions about the effects of common medications, alcohol, **birth control** pills, estrogen therapy, beta blockers, hydrochlorothiazide, and niacin on blood glucose levels. Common medications that can increase blood glucose include glucocorticoids, niacin, and protease inhibitors. Glucocorticoids taken as pills or by injection are likely to increase blood glucose levels if they are taken in large doses. If they are inhaled or applied to the skin, they are unlikely to increase blood glucose. The effect of alcohol on blood glucose depends on how much a person drinks during a particular timespan. **birth control** pills will not generally make diabetes worse, and estrogen replacement therapy is safe for most women with diabetes. The benefits of beta blockers for people who have diabetes and who have had a heart attack far exceed the risks; currently prescribed doses of hydrochlorothiazide used to control blood pressure have minimal effects on blood glucose level. The amount of niacin in multivitamins is not high enough to increase blood glucose levels.

- **Diabetes and Sex**

Source: in American Diabetes Association. American Diabetes Association Complete Guide to Diabetes: The Ultimate Home Diabetes Reference. 2nd ed. Alexandria, VA: American Diabetes Association. 1999. p. 321-360.

Contact: Available from American Diabetes Association (ADA). Order Fulfillment Department, P.O. Box 930850, Atlanta, GA 31193-0850. (800) 232-6733. Fax (770) 442-9742. Website: www.diabetes.org. PRICE: \$23.95 plus shipping and handling. ISBN: 1580400388.

Summary: This chapter discusses the impact of diabetes on sexual health and pregnancy. Diabetes can affect a person's sexual performance, his or her choice of **birth control**, and his or her response to the aging of the reproductive system. Women need to deal with the effects of sex hormones on blood glucose levels throughout the menstrual cycle and as they go through menopause. For women whose blood glucose levels are affected by their menstrual cycle, steps for staying in control include controlling the symptoms of premenstrual syndrome and making changes in diet and physical activity in the days prior to the onset of menstruation. Menopause can also upset a diabetes management plan. Hormone replacement therapy may be an answer for some women. Practicing **birth control** and safe sex are especially important for people with diabetes. **birth control** options for women include **birth control** pills, the intrauterine device, the diaphragm, the sponge and cervical cap, the female condom, and sterilization. Although men have more limited **birth control** options than women, the condom is the most popular. Sterilization is also an option for men. Sexual problems for women who have diabetes include poor vaginal lubrication and pain during intercourse or diminished sexual desire and problems achieving orgasm. For men, the major concern is impotence. Women also face challenges as they prepare for pregnancy and carrying a baby. Issues that women need to consider before they become pregnant include the genetic risk of passing diabetes to a child, the woman's health status and level of glucose control, and financial considerations. Once a woman becomes pregnant, she and her health care team need to choose blood glucose goals and she needs to consider her food and exercise habits, times for blood glucose testing, and obstetrical care. Other pregnancy related issues include delivery complications, postpartum care, and breastfeeding.

- **Men's Health**

Source: in Hagan, P.T., ed. Mayo Clinic Guide to Self-Care: Answers for Everyday Health Problems. New York, NY: Kensington Publishers. 1999. p. 140-143.

Contact: Available from Mayo Clinic. 200 First Street, S.W., Rochester, MN 55905. (800) 291-1128 or (507) 284-2511. Fax (507) 284-0161. Website: www.mayo.edu. PRICE: \$16.95 plus shipping and handling. ISBN: 0962786578.

Summary: This chapter on men's health issues is from a family health book published by the Mayo Clinic. The chapter covers testicular pain, including the pain caused by testicular torsion, epididymitis, or orchitis; screening for cancer of the testicle; enlarged prostate; screening for prostate cancer; painful urination; erectile dysfunction (impotence); and vasectomy (male birth control). In each section, this consumer oriented reference book explains symptoms, risk factors, diagnostic tests, self care and medical treatment choices, and patient care considerations. 2 figures.

- **Marriage, Pregnancy, and Children**

Source: in *Seizures and Epilepsy in Childhood: A Guide for Parents*. Second Edition. Freeman, J.M. Vining, E. Pillas, D.J. Baltimore, MD, Johns Hopkins University Press, pp. 290-296, 1997.

Contact: Johns Hopkins University Press, 2715 North Charles Street, Baltimore, MD 21218-4319.

Summary: *Marriage, Pregnancy, and Children*, a chapter in *Seizures and Epilepsy in Childhood: A Guide for Parents*, explains that marriage and parenthood are perfectly reasonable for individuals with epilepsy. While marriage of persons with epilepsy used to be illegal, those laws were abolished. However, many misconceptions still abound, for example, about the effects of pregnancy on epilepsy and about the effects of epilepsy and its treatment on a fetus. Physicians often give outdated answers to these questions. The truth is, people with epilepsy can marry, and most women with epilepsy can bear children. They can be competent parents, even if they still have seizures. Although pregnancy may affect a person's seizures, the woman's risks during pregnancy are little different from the risks other women face. Pregnancy is not a good time to change or adjust anticonvulsant medications. There is little evidence that brief seizures injure the fetus, although prolonged seizures could affect it. There are risks to the fetus from anticonvulsant drugs, although the risks vary with the drug and are usually small. Most anticonvulsants affect the metabolism of vitamin K in the newborn and may lead to bleeding, so the mother should receive vitamin K during the last week of pregnancy or the infant should receive it immediately after birth. It is possible to breast-feed while taking anticonvulsants, because concentrations in breast milk are usually low. Anticonvulsants increase the metabolism of **birth control** steroids and make them less effective. There is a very small risk of the children of parents with epilepsy developing epilepsy. Epilepsy may be a manifestation of some other diseases, such as phenylketonuria, Tay-Sachs, and metachromatic leukodystrophy. There is a genetic tendency to inherit epilepsy, but the risk is small for the children of the person with epilepsy.

- **Epilepsy**

Source: in *Harvard Guide to Women's Health*. Carlson, K.J. Eisenstat, S.A. Ziporyn, T. Harvard University Press, Cambridge, MA, pp. 229-232, 1996.

Contact: Harvard University Press, 79 Garden Street, Cambridge, MA 02138-1499. (617) 495-2606.

Summary: *Epilepsy*, a chapter in the *Harvard Guide to Women's Health*, defines epilepsy and describes the symptoms, evaluation, treatment, and prevention of epilepsy. The chapter defines epilepsy as a group of related disorders that involve recurrent seizures. Topics include (1) who is likely to develop a seizure disorder, (2) symptoms, (3) diagnosing a seizure disorder, (4) treatment, and (5) prevention of seizures. Seizures are caused by inappropriate electrical discharges of neurons in the brain. Most seizure disorders are either generalized or partial. Generalized seizures involve abnormal electrical activity throughout the brain. Partial seizures involve a limited area of the brain or begin in a specific area of the brain before spreading to other areas. About 4 percent of the population has some kind of seizure disorder. Some seizure disorders can be traced to brain injuries, but many have no known cause and are referred to as idiopathic. Deaths from seizures are rare. Diagnosis of a seizure disorder requires an electroencephalogram to detect fluctuations in brain waves. About 75 percent of seizure disorders can be treated effectively with antiepileptic drugs (AED's). The choice of AED

depends on the type of seizure disorder, and the patient's response to the AED. Women with epilepsy may not be able to take **birth control** pills while on AED therapy. AED therapy can be complicated by pregnancy. Many AED's have side effects, including nausea, drowsiness, and decreased sex drive. There is no way to prevent epilepsy, but susceptible people can minimize seizures by avoiding known precipitants, such as excessive alcohol use, substance abuse, irregular sleep, or overcommitment.

- **Adolescents With Epilepsy: A Psychological and Social Perspective**

Source: in *Childhood Seizures*. Shinnar, S. Amir, N. Branski, D. eds. Basel, Switzerland, S. Karger AG, pp. 179-186, 1995.

Contact: S. Karger AG, P.O. Box, CH-4009 Basel, Switzerland.

Summary: *Adolescents With Epilepsy: A Psychological and Social Perspective*, a book chapter in *Childhood Seizures*, reviews the psychological and social aspects of adolescents with epilepsy, including (1) psychopathology and maladjustment in epilepsy, (2) the impact of epilepsy on the developmental tasks of adolescence, (3) the stigma associated with epilepsy and its effect on self-esteem, and (4) concrete suggestions for health professionals who work with these patients. Although there has not been much research on psychopathology in adolescents with epilepsy, adults and children with epilepsy have increased psychiatric disorders and psychological and behavioral problems. It is more than the presence of chronic illness that threatens the mental health of individuals with epilepsy; neurological impairment also can impede normal psychological and behavioral functioning. Poor academic performance and school experience may also contribute to psychosocial problems. When epilepsy is present, normal adolescent progression toward forming and integrating a self-identity is affected. In early adolescence, hormonal changes may cause an increase in seizure frequency, which threatens adolescents' sense of physical competence. Parental overprotection, misinformation about epilepsy, and the restriction of normal teen activities are all potential problems at this phase. Self-acceptance and peer acceptance are also important in middle adolescence, and driving a car becomes an issue. Teens in middle adolescence usually try to keep their epilepsy a secret if possible, and this concealment creates anxiety. Issues in the late adolescent years center around dating and sexual relationships, leaving home, achieving financial independence, and preparing for career, marriage, and parenting roles. The perceived stigma of having epilepsy is a source of psychological stress at all stages of adolescence. Adolescents who believe that having epilepsy interferes with social relationships are likely to exhibit low self-esteem and symptoms of psychological distress. The pediatrician or family physician can help minimize psychosocial problems by intervening early. The doctor should (1) encourage self-responsibility for taking antiepileptic medications, (2) understand psychological factors behind compliance problems, (3) provide factual information, and (4) talk to adolescents about topics such as **birth control** and substance use.

- **Adolescent Female With Epilepsy**

Source: in *Women and Epilepsy*. Trimble, M.R. ed. New York, NY, John Wiley and Sons, pp. 87-105, 1991.

Contact: John Wiley and Sons, Inc., 605 Third Avenue, New York, NY 10158-0012.

Summary: *The Adolescent Female with Epilepsy*, a chapter in *Women and Epilepsy*, explores problems faced by the adolescent female and discusses what her physicians should consider when treating her epilepsy. The physical maturity reached during

adolescence is usually completed a number of years before the adolescent girl reaches psychosocial maturity. Psychosocial development involves achieving increased independence from parents and adults, establishing a self-identity and sexual identity, and preparing for an adult role in society. Juvenile absence epilepsy typically begins at or near puberty, with an equal sex distribution. Juvenile myoclonic epilepsy typically presents during puberty, with patients experiencing their first grand mal or tonic-clonic seizure or repeated myoclonic jerks on awakening. Other types of adolescent epilepsy syndromes include epilepsy with generalized tonic-clonic seizures on awakening, Kojewnikow's syndrome, and progressive myoclonic epilepsy. Treatment of adolescent epilepsy begins by identifying the seizure type, then selecting the anticonvulsant drug that will completely control seizures without producing undue side effects. The effects of uncontrolled epilepsy on the adolescent may include delays in physical and/or emotional maturation, interference with education and socialization, and additional confusion with sexual identity. Adolescents use a number of coping mechanisms to manage increased stress, such as denial, rationalization, and projection. Issues that may affect adolescents with epilepsy include drug abuse, alcohol abuse, and driving. Adolescents with epilepsy have the same sexual drive as other adolescents. Physicians can counsel the young woman about sexuality, **birth control**, and sexually transmitted diseases during early and middle adolescence. Physicians can enhance compliance by establishing a good relationship with the adolescent who has epilepsy. They can, for example, take school work into account when ordering a medication schedule at regular intervals. An understanding of adolescent health and psychosocial issues will help the physician treat the adolescent female with epilepsy. 5 tables, 76 references.

- **Cultural Considerations in Providing Care to American Indians**

Source: in *American Indian Health: Innovations in Health Care, Promotion, and Policy*. Rhoades, E.R. ed. Baltimore, MD, Johns Hopkins University Press, pp. 418-425, 2000.

Contact: Johns Hopkins University Press, 2715 North Charles Street, Baltimore, MD 21218-4363. INTERNET/EMAIL: www.press.jhu.edu.

Summary: *Cultural Considerations in Providing Care to American Indians*, a chapter in *American Indian Health: Innovations in Health Care, Promotion, and Policy*, discusses important considerations in personally dealing with Indian patients and their respective communities. Certain requirements for an ultimately successful interpersonal encounter seem to be universal. These include pleasantness, politeness, and general friendliness. However, two special considerations have been noted in dealing with Indians. The first is that, in public and sometimes private situations, Indians often appear unusually passive. Secondly, in Indian encounters, there is the necessity of establishing a satisfactory ambience. In most, perhaps all, instances, especially in situations such as a clinic visit, one should be aware that the encounter is to some degree uncomfortable to the Indian person. The initial encounter should always be conducted with decorum and dignity. Determine which language the patient is most comfortable using. In spite of inherent discomfort, Indian persons will generally tend to be accommodating to the physician, and often acquiesce to questions that they do not understand. Another seldom discussed component of much present-day Indian life is the element of shame. This is often barely suppressed and colors a good deal of individual reaction. An aspect of the interpersonal encounter is that more than fleeting eye contact is a sign of great intrusion, if not outright disrespect. When attending a public ceremony, one should observe unobtrusively and listen without asking questions in a forward manner. Great decorum and deference should always be exhibited in appearance before tribal councils. One of the keys to a successful encounter with an Indian and an attribute that the

medical profession often lacks is the willingness to listen. It is good to know topics that Indians consider taboo so that discussions of these are held with respect for the feelings of those who treated these topics as taboo. One such topic is death. One practice considered foreign to many Indians is **birth control** and family planning. A great deal is made of the different ways in which Indians regard time. The time when something is to take place is when things are right for that event to take place, not necessarily at a present appointment time. In one sense, there is no special mystique to an encounter with an Indian. Certain universals of human intercourse are always appropriate. The importance of respect cannot be overemphasized. In addition, friendliness and pleasantness, even in an uncomfortable situation, are always beneficial.

- **Advocacy Program for Mothers with FAS/FAE**

Source: in *Challenge of Fetal Alcohol Syndrome: Overcoming Secondary Disabilities*. Streissguth, A.P., Kanter, J. eds. Seattle, WA, University of Washington Press, pp. 102-112, 1997.

Contact: University of Washington Press, Seattle, WA.

Summary: *Advocacy Program for Mothers with FAS/FAE*, a chapter in *Challenge of Fetal Alcohol Syndrome: Overcoming Secondary Disabilities*, describes an existing advocacy program for high-risk, substance-abusing mothers during the first 3 years of their children's lives, and discusses the possible application of the program to mothers with fetal alcohol syndrome (FAS) or fetal alcohol effects (FAE). The Seattle advocacy model, the Birth to Three program, uses a case management approach involving paraprofessional advocates working with a caseload of 12 to 14 clients and their families from birth of the target child until the child is age 3 years. While there are no specific requirements for the advocate position, the most important background characteristics of advocates is their shared history with clients and their ability to solve problems, be goal-oriented, and be empathetic. Program goals are to (1) assist mothers in getting treatment for substance abuse, maintaining recovery, and resolving the problems associated with substance abuse; (2) ensure a safe environment and health care for children; (3) link families with community resources; and (4) show successful strategies for working with this population to prevent risk behavior of children in the future. The authors found the program to be effective in (1) helping women enter alcohol or drug treatment, (2) remain abstinent from alcohol or drugs, (3) use **birth control** regularly, and (4) become involved with health and social services for themselves and their children. Applying the Birth to Three model to mothers with FAS/FAE involves (1) diagnosing FAS/FAE, (2) helping clients evaluate family planning needs and get reliable **birth control**, (3) helping clients become financially stable, (4) helping clients get alcohol or drug treatment if necessary, (5) helping build a protective environment for clients and their children, (6) helping clients build linkages with community service providers, and (7) helping to find long-term mentors for clients.

- **Education for the New Mother and Her Family**

Source: in *Health Education for Women: A Guide for Nurses and Other Health Professionals*. Littlefield, V. M., ed. Norwalk, CT, Appleton-Century-Crofts, p. 303-322, 1986.

Summary: Strategies for addressing the learning needs of new mothers and their families are presented. There is a great deal of information that can support a new family, but it cannot be presented appropriately in a few days in the hospital. This information must be provided in a comprehensive long-range program that

encompasses prenatal, perinatal, and postpartum care, education, and support. Ideally, a program should begin during pregnancy and continue through the new family's first year. Teaching needs of the new mother during the early postpartum period concern psychological adjustment, physical self care, transition from meeting her own needs to meeting the infant's needs, infant feeding, and **birth control**. Other postpartum teaching needs focus on the infant's interaction with the family, the physical care of the infant, fathers, and siblings. Special considerations are involved in teaching multiparas, women of various educational levels, older primiparas, high-risk families, and families in various cultural contexts. Posthospital support and educational strategies include home visits, telephone calls, parenting groups, and support groups for working mothers. Several strategies are available for evaluating educational programs for postpartum parents. 72 references.

CHAPTER 8. MULTIMEDIA ON BIRTH CONTROL

Overview

In this chapter, we show you how to keep current on multimedia sources of information on birth control. We start with sources that have been summarized by federal agencies, and then show you how to find bibliographic information catalogued by the National Library of Medicine.

Video Recordings

An excellent source of multimedia information on birth control is the Combined Health Information Database. You will need to limit your search to "Videorecording" and "birth control" using the "Detailed Search" option. Go directly to the following hyperlink: <http://chid.nih.gov/detail/detail.html>. To find video productions, use the drop boxes at the bottom of the search page where "You may refine your search by." Select the dates and language you prefer, and the format option "Videorecording (videotape, videocassette, etc.)." Type "birth control" (or synonyms) into the "For these words:" box. The following is a typical result when searching for video recordings on birth control:

- **Swept away is not okay: Teens make decisions about sex and contraception**

Source: Hackensack, NJ: Planned Parenthood of Greater Northern New Jersey. n.d. 1 videotape, 2 lessons.

Contact: Available from Planned Parenthood of Greater Northern New Jersey, 575 Main Street, Hackensack, NJ 07601. Telephone: (201) 489-1265. \$14.95 plus \$3.00 for shipping and handling; make check payable to Planned Parenthood of Greater Northern New Jersey.

Summary: This videotape informs adolescents of the dangers of media messages that encourage sex but do not discuss contraception, of the importance of protecting themselves from unplanned pregnancies, and of the procedures at a birth control clinic, including the gynecological exam. The videotape is accompanied by two lesson plans, a worksheet entitled 'Facts and Feelings: Thinking About Birth Control,' and an evaluation form for the workshop on contraception.

Audio Recordings

The Combined Health Information Database contains abstracts on audio productions. To search CHID, go directly to the following hyperlink: <http://chid.nih.gov/detail/detail.html>. To find audio productions, use the drop boxes at the bottom of the search page where "You may refine your search by." Select the dates and language you prefer, and the format option "Sound Recordings." Type "birth control" (or synonyms) into the "For these words:" box. The following is a typical result when searching for sound recordings on birth control:

- **Listen Carefully**

Contact: Emory University, School of Medicine, Department of Gynecology/Obstetrics, 1462 Clifton Rd, Atlanta, GA, 30322, (404) 589-3556.

Summary: This cassette contains information in a question-and-answer format about **birth control** pills and other forms of contraception. Special instructions for beginning oral contraceptives are given, as well as instructions on steps to be taken if pills are missed. Side effects and danger signs are also explained. While oral contraceptives are effective in preventing pregnancy, condoms are urged as an effective means of preventing sexually transmitted diseases (STD's), including HIV and AIDS.

- **Cultural Ethnic and Racial Issues: National Conference on Women and AIDS/HIV Infection, Washington, DC, December 12-13, 1990**

Contact: Triad Media Group, PO Box 778, Frederick, MD, 21701, (301) 663-1471.

Summary: The conference examined the cultural, ethnic, and racial factors causing certain woman to be at greater risk for being infected with the HIV. The first speaker deals with Haitian women in the United States. Heterosexual transmission is the most common route of HIV infection in these women, and men and women are infected in nearly equal proportions. Treatment delays are due to financial and language problems. The second speaker describes the situation among Hispanics in the United States, pointing out their diverse culture. She describes their perception of sexuality as intimate and personal and notes IV-needle sharing for vitamins is not uncommon within Hispanic families and close friends. She discusses the need for additional bilingual materials and an understanding of the reluctance of many women to seek treatment for fear of losing their children. She also stresses the importance of the priests and the hairdressers, when planning for educational needs, and discusses the needs of Pacific Islanders, especially Hawaiian women, who generally have menial jobs in the tourist industry. Sex begins at a relatively young age, and drug-abuse rates are high. The fourth speaker explains problems relating to treatment for AIDS among Native Americans. Because their communities tend to be small, they may not visit local clinics for fear of being recognized and ostracized. The fifth speaker describes the Asian community in Los Angeles and stereotypes which affect treatment and funding. She describes their resistance to barrier methods of **birth control** and condoms. For a variety of reasons, many return to traditional treatments of acupuncture and herbal remedies.

Bibliography: Multimedia on Birth Control

The National Library of Medicine is a rich source of information on healthcare-related multimedia productions including slides, computer software, and databases. To access the multimedia database, go to the following Web site: <http://locatorplus.gov/>. Select "Search LOCATORplus." Once in the search area, simply type in birth control (or synonyms). Then, in the option box provided below the search box, select "Audiovisuals and Computer Files." From there, you can choose to sort results by publication date, author, or relevance. The following multimedia has been indexed on birth control (for more information, follow the hyperlink indicated):

- **A Client using birth control pills [electronic resource]** Source: MEPC Software; Year: 1987; Format: Electronic resource; New York, N.Y.: Elsevier Science Pub. Co., c1987
- **Contraception [filmstrip]** Source: Medical Electronic Educational Services; produced by School of Nursing, University of Missouri-Columbia; Year: 1973; Format: Filmstrip; Tucson: The Services, c1973
- **Contraception [videorecording]** Source: Dept. of Psychology and the Office of Telecourses, Continuing Education, University of Washington; Year: 1975; Format: Videorecording; [Seattle]: The University: [for loan or sale by University of Washington Press, 1975]
- **Contraception [videorecording]: issues and answers** Source: Ambrose Video Publishing Incorporated; produced in association with the Association of Reproductive Professionals; Information Television Network; Year: 2001; Format: Videorecording; New York: Ambrose Video, c2001
- **Contraceptive choices [videorecording]** Source: [presented by] Milner-Fenwick; Year: 1992; Format: Videorecording; Timonium, MD: Milner-Fenwick, c1992
- **Fertile territory (male contraception) [videorecording]** Source: Chip Taylor Communications; a Wark Clements production; Year: 2002; Format: Videorecording; Derry, N.H.: Chip Taylor Communications, 2002
- **The biology of conception and the mechanism of contraception [motion picture]** Source: produced under the auspices of the Birth Control Clinical Research Bureau of New York; Year: 1942; Format: Motion picture; [United States]:

APPENDICES

APPENDIX A. PHYSICIAN RESOURCES

Overview

In this chapter, we focus on databases and Internet-based guidelines and information resources created or written for a professional audience.

NIH Guidelines

Commonly referred to as “clinical” or “professional” guidelines, the National Institutes of Health publish physician guidelines for the most common diseases. Publications are available at the following by relevant Institute¹²:

- Office of the Director (OD); guidelines consolidated across agencies available at <http://www.nih.gov/health/consumer/conkey.htm>
- National Institute of General Medical Sciences (NIGMS); fact sheets available at <http://www.nigms.nih.gov/news/facts/>
- National Library of Medicine (NLM); extensive encyclopedia (A.D.A.M., Inc.) with guidelines: <http://www.nlm.nih.gov/medlineplus/healthtopics.html>
- National Cancer Institute (NCI); guidelines available at <http://www.cancer.gov/cancerinfo/list.aspx?viewid=5f35036e-5497-4d86-8c2c-714a9f7c8d25>
- National Eye Institute (NEI); guidelines available at <http://www.nei.nih.gov/order/index.htm>
- National Heart, Lung, and Blood Institute (NHLBI); guidelines available at <http://www.nhlbi.nih.gov/guidelines/index.htm>
- National Human Genome Research Institute (NHGRI); research available at <http://www.genome.gov/page.cfm?pageID=10000375>
- National Institute on Aging (NIA); guidelines available at <http://www.nia.nih.gov/health/>

¹² These publications are typically written by one or more of the various NIH Institutes.

- National Institute on Alcohol Abuse and Alcoholism (NIAAA); guidelines available at <http://www.niaaa.nih.gov/publications/publications.htm>
- National Institute of Allergy and Infectious Diseases (NIAID); guidelines available at <http://www.niaid.nih.gov/publications/>
- National Institute of Arthritis and Musculoskeletal and Skin Diseases (NIAMS); fact sheets and guidelines available at <http://www.niams.nih.gov/hi/index.htm>
- National Institute of Child Health and Human Development (NICHD); guidelines available at <http://www.nichd.nih.gov/publications/pubskey.cfm>
- National Institute on Deafness and Other Communication Disorders (NIDCD); fact sheets and guidelines at <http://www.nidcd.nih.gov/health/>
- National Institute of Dental and Craniofacial Research (NIDCR); guidelines available at <http://www.nidr.nih.gov/health/>
- National Institute of Diabetes and Digestive and Kidney Diseases (NIDDK); guidelines available at <http://www.niddk.nih.gov/health/health.htm>
- National Institute on Drug Abuse (NIDA); guidelines available at <http://www.nida.nih.gov/DrugAbuse.html>
- National Institute of Environmental Health Sciences (NIEHS); environmental health information available at <http://www.niehs.nih.gov/external/facts.htm>
- National Institute of Mental Health (NIMH); guidelines available at <http://www.nimh.nih.gov/practitioners/index.cfm>
- National Institute of Neurological Disorders and Stroke (NINDS); neurological disorder information pages available at http://www.ninds.nih.gov/health_and_medical/disorder_index.htm
- National Institute of Nursing Research (NINR); publications on selected illnesses at <http://www.nih.gov/ninr/news-info/publications.html>
- National Institute of Biomedical Imaging and Bioengineering; general information at http://grants.nih.gov/grants/becon/becon_info.htm
- Center for Information Technology (CIT); referrals to other agencies based on keyword searches available at http://kb.nih.gov/www_query_main.asp
- National Center for Complementary and Alternative Medicine (NCCAM); health information available at <http://nccam.nih.gov/health/>
- National Center for Research Resources (NCRR); various information directories available at <http://www.ncrr.nih.gov/publications.asp>
- Office of Rare Diseases; various fact sheets available at http://rarediseases.info.nih.gov/html/resources/rep_pubs.html
- Centers for Disease Control and Prevention; various fact sheets on infectious diseases available at <http://www.cdc.gov/publications.htm>

NIH Databases

In addition to the various Institutes of Health that publish professional guidelines, the NIH has designed a number of databases for professionals.¹³ Physician-oriented resources provide a wide variety of information related to the biomedical and health sciences, both past and present. The format of these resources varies. Searchable databases, bibliographic citations, full-text articles (when available), archival collections, and images are all available. The following are referenced by the National Library of Medicine:¹⁴

- **Bioethics:** Access to published literature on the ethical, legal, and public policy issues surrounding healthcare and biomedical research. This information is provided in conjunction with the Kennedy Institute of Ethics located at Georgetown University, Washington, D.C.: http://www.nlm.nih.gov/databases/databases_bioethics.html
- **HIV/AIDS Resources:** Describes various links and databases dedicated to HIV/AIDS research: <http://www.nlm.nih.gov/pubs/factsheets/aidsinfs.html>
- **NLM Online Exhibitions:** Describes “Exhibitions in the History of Medicine”: <http://www.nlm.nih.gov/exhibition/exhibition.html>. Additional resources for historical scholarship in medicine: <http://www.nlm.nih.gov/hmd/hmd.html>
- **Biotechnology Information:** Access to public databases. The National Center for Biotechnology Information conducts research in computational biology, develops software tools for analyzing genome data, and disseminates biomedical information for the better understanding of molecular processes affecting human health and disease: <http://www.ncbi.nlm.nih.gov/>
- **Population Information:** The National Library of Medicine provides access to worldwide coverage of population, family planning, and related health issues, including family planning technology and programs, fertility, and population law and policy: http://www.nlm.nih.gov/databases/databases_population.html
- **Cancer Information:** Access to cancer-oriented databases: http://www.nlm.nih.gov/databases/databases_cancer.html
- **Profiles in Science:** Offering the archival collections of prominent twentieth-century biomedical scientists to the public through modern digital technology: <http://www.profiles.nlm.nih.gov/>
- **Chemical Information:** Provides links to various chemical databases and references: <http://sis.nlm.nih.gov/Chem/ChemMain.html>
- **Clinical Alerts:** Reports the release of findings from the NIH-funded clinical trials where such release could significantly affect morbidity and mortality: http://www.nlm.nih.gov/databases/alerts/clinical_alerts.html
- **Space Life Sciences:** Provides links and information to space-based research (including NASA): http://www.nlm.nih.gov/databases/databases_space.html
- **MEDLINE:** Bibliographic database covering the fields of medicine, nursing, dentistry, veterinary medicine, the healthcare system, and the pre-clinical sciences: http://www.nlm.nih.gov/databases/databases_medline.html

¹³ Remember, for the general public, the National Library of Medicine recommends the databases referenced in MEDLINEplus (<http://medlineplus.gov/> or <http://www.nlm.nih.gov/medlineplus/databases.html>).

¹⁴ See <http://www.nlm.nih.gov/databases/databases.html>.

- **Toxicology and Environmental Health Information (TOXNET):** Databases covering toxicology and environmental health: <http://sis.nlm.nih.gov/Tox/ToxMain.html>
- **Visible Human Interface:** Anatomically detailed, three-dimensional representations of normal male and female human bodies:
http://www.nlm.nih.gov/research/visible/visible_human.html

The Combined Health Information Database

A comprehensive source of information on clinical guidelines written for professionals is the Combined Health Information Database. You will need to limit your search to one of the following: Brochure/Pamphlet, Fact Sheet, or Information Package, and "birth control" using the "Detailed Search" option. Go directly to the following hyperlink: <http://chid.nih.gov/detail/detail.html>. To find associations, use the drop boxes at the bottom of the search page where "You may refine your search by." For the publication date, select "All Years." Select your preferred language and the format option "Fact Sheet." Type "birth control" (or synonyms) into the "For these words:" box. The following is a sample result:

- **Abstinence First: Teen Birth Control Decisions (Version A)**

Contact: Human Relations Media Incorporated, 175 Tompkins Ave, Pleasantville, NY, 10570, (914) 769-7496.

Summary: This information kit serves as an abstinence-based educational curriculum for adolescents. The information kit outlines the benefits of sexual abstinence, the physical and emotional consequences of adolescent pregnancy and sexually transmitted diseases (STDs), how to commit to and maintain abstinence, and how to talk to partners and friends about this decision. This version, Version A, of this curriculum emphasizes that an individual's decision to become sexually active should only be made in the context of marriage.

- **American Teens Speak: Sex, Myths, TV and Birth Control**

Contact: Louis Harris and Associates, Inc., 111 Fifth Ave, New York, NY, 10003, (212) 539-9697.

Summary: This report presents the results of a poll asking American teenagers, age 12 through 17, how they view the problem of teenage pregnancy. Topics in the survey include: why so many teenagers do not wait to have sexual intercourse; why so many fail to use contraceptives; arguments teens think would influence their peers to delay sexual activity and use birth control; areas of knowledge and ignorance about sexuality; sources of information about sexuality; the perceived realism of TV in dealing with sexual topics; the content of sex education in the schools; and the resulting impact on teenager's sexual behavior or knowledge, parental talks, and sex education courses. Chapters present detailed data on the following topics: problems of teenage sex and pregnancy; how teens learn about sex, conception, and birth control; outside help for the family from school and television; and what society can do. An appendix presents profiles of the American teenager and the three high-risk groups: those who have a low level of sexual information; those who have had sexual intercourse; and those who are sexually active but do not usually use birth control. A second appendix displays the questionnaire used in the survey, with marginal frequencies.

- **American Teens Speak: Sex, Myths, TV and Birth Control: The Planned Parenthood Poll**

Source: New York, NY. Louis Harris and Associates, 1986, 101 p.

Contact: Planned Parenthood Federation of America, Inc., 810 Seventh Avenue, New York, NY 10010. 212-541-7800, \$5.00.

Summary: In October 1986, a Harris poll of 1,000 teenagers was conducted to assess their views on sex, teenage pregnancy, sex education, and birth control. Survey topics include the following: (1) reasons why so many teens do not wait to have sexual intercourse, (2) reasons why so many sexually active teens do not use birth control, (3) arguments that teens think would influence their peers to delay sex, (4) arguments and steps that teens think would influence their peers to use birth control, (5) areas of knowledge and ignorance about sexuality, (6) sources of information and misinformation about sexual topics, (7) perceived realism of TV in dealing with sexual topics, (8) content of school sex education courses as perceived by students, (9) extent of talks between parents and children on sex and birth control, (10) the results of parental talks and sex education courses on teens' sexual behavior and knowledge, and (11) barriers to increased use of birth control by teens. The report also presents findings on teenagers views on abortion.

- **Preventing pregnancy, protecting health: A new look at birth control choices in the United States**

Source: New York, NY: Alan Guttmacher Institute. 1991. 129 pp.

Contact: Available from Alan Guttmacher Institute, 120 Wall Street, 21st Floor, New York, NY 10005. Telephone: (212) 248-1111 or (202) 296-4012 Washington, D.C. office / fax: (212) 248-1951; Washington, D.C. office (202) 223-5756 / e-mail: info@agi-usa.org / Web site: <http://www.agi-usa.org>. \$20.00, reduced prices for multiple copies over four.

Summary: This book examines how the various birth control methods available in the United States affect the likelihood of avoiding an unintended pregnancy, of preventing infertility, and of maintaining good health. Specific topics include sexual activity and unintended pregnancy, contraceptive methods, current use of contraceptives, pregnancies occurring during contraceptive use, sexually transmitted diseases, upper genital tract infection, ectopic pregnancy, tubal infertility, cancer, cardiovascular disease, complications requiring hospitalization, and mortality.

The NLM Gateway¹⁵

The NLM (National Library of Medicine) Gateway is a Web-based system that lets users search simultaneously in multiple retrieval systems at the U.S. National Library of Medicine (NLM). It allows users of NLM services to initiate searches from one Web interface, providing one-stop searching for many of NLM's information resources or databases.¹⁶ To use the NLM Gateway, simply go to the search site at <http://gateway.nlm.nih.gov/gw/Cmd>. Type "birth control" (or synonyms) into the search box and click "Search." The results will be presented in a tabular form, indicating the number of references in each database category.

¹⁵ Adapted from NLM: <http://gateway.nlm.nih.gov/gw/Cmd?Overview.x>.

¹⁶ The NLM Gateway is currently being developed by the Lister Hill National Center for Biomedical Communications (LHNCBC) at the National Library of Medicine (NLM) of the National Institutes of Health (NIH).

Results Summary

Category	Items Found
Journal Articles	49360
Books / Periodicals / Audio Visual	10000
Consumer Health	405
Meeting Abstracts	403
Other Collections	7
Total	60175

HSTAT¹⁷

HSTAT is a free, Web-based resource that provides access to full-text documents used in healthcare decision-making.¹⁸ These documents include clinical practice guidelines, quick-reference guides for clinicians, consumer health brochures, evidence reports and technology assessments from the Agency for Healthcare Research and Quality (AHRQ), as well as AHRQ's Put Prevention Into Practice.¹⁹ Simply search by "birth control" (or synonyms) at the following Web site: <http://text.nlm.nih.gov>.

Coffee Break: Tutorials for Biologists²⁰

Coffee Break is a general healthcare site that takes a scientific view of the news and covers recent breakthroughs in biology that may one day assist physicians in developing treatments. Here you will find a collection of short reports on recent biological discoveries. Each report incorporates interactive tutorials that demonstrate how bioinformatics tools are used as a part of the research process. Currently, all Coffee Breaks are written by NCBI staff.²¹ Each report is about 400 words and is usually based on a discovery reported in one or more articles from recently published, peer-reviewed literature.²² This site has new articles every few weeks, so it can be considered an online magazine of sorts. It is intended for general background information. You can access the Coffee Break Web site at the following hyperlink: <http://www.ncbi.nlm.nih.gov/Coffeebreak/>.

¹⁷ Adapted from HSTAT: <http://www.nlm.nih.gov/pubs/factsheets/hstat.html>.

¹⁸ The HSTAT URL is <http://hstat.nlm.nih.gov/>.

¹⁹ Other important documents in HSTAT include: the National Institutes of Health (NIH) Consensus Conference Reports and Technology Assessment Reports; the HIV/AIDS Treatment Information Service (ATIS) resource documents; the Substance Abuse and Mental Health Services Administration's Center for Substance Abuse Treatment (SAMHSA/CSAT) Treatment Improvement Protocols (TIP) and Center for Substance Abuse Prevention (SAMHSA/CSAP) Prevention Enhancement Protocols System (PEPS); the Public Health Service (PHS) Preventive Services Task Force's *Guide to Clinical Preventive Services*; the independent, nonfederal Task Force on Community Services' *Guide to Community Preventive Services*; and the Health Technology Advisory Committee (HTAC) of the Minnesota Health Care Commission (MHCC) health technology evaluations.

²⁰ Adapted from <http://www.ncbi.nlm.nih.gov/Coffeebreak/Archive/FAQ.html>.

²¹ The figure that accompanies each article is frequently supplied by an expert external to NCBI, in which case the source of the figure is cited. The result is an interactive tutorial that tells a biological story.

²² After a brief introduction that sets the work described into a broader context, the report focuses on how a molecular understanding can provide explanations of observed biology and lead to therapies for diseases. Each vignette is accompanied by a figure and hypertext links that lead to a series of pages that interactively show how NCBI tools and resources are used in the research process.

Other Commercial Databases

In addition to resources maintained by official agencies, other databases exist that are commercial ventures addressing medical professionals. Here are some examples that may interest you:

- **CliniWeb International:** Index and table of contents to selected clinical information on the Internet; see <http://www.ohsu.edu/clinweb/>.
- **Medical World Search:** Searches full text from thousands of selected medical sites on the Internet; see <http://www.mwsearch.com/>.

APPENDIX B. PATIENT RESOURCES

Overview

Official agencies, as well as federally funded institutions supported by national grants, frequently publish a variety of guidelines written with the patient in mind. These are typically called “Fact Sheets” or “Guidelines.” They can take the form of a brochure, information kit, pamphlet, or flyer. Often they are only a few pages in length. Since new guidelines on birth control can appear at any moment and be published by a number of sources, the best approach to finding guidelines is to systematically scan the Internet-based services that post them.

Patient Guideline Sources

The remainder of this chapter directs you to sources which either publish or can help you find additional guidelines on topics related to birth control. Due to space limitations, these sources are listed in a concise manner. Do not hesitate to consult the following sources by either using the Internet hyperlink provided, or, in cases where the contact information is provided, contacting the publisher or author directly.

The National Institutes of Health

The NIH gateway to patients is located at <http://health.nih.gov/>. From this site, you can search across various sources and institutes, a number of which are summarized below.

Topic Pages: MEDLINEplus

The National Library of Medicine has created a vast and patient-oriented healthcare information portal called MEDLINEplus. Within this Internet-based system are “health topic pages” which list links to available materials relevant to birth control. To access this system, log on to <http://www.nlm.nih.gov/medlineplus/healthtopics.html>. From there you can either search using the alphabetical index or browse by broad topic areas. Recently, MEDLINEplus listed the following when searched for “birth control”:

- Guides on birth control

Birth Control/Contraception

<http://www.nlm.nih.gov/medlineplus/birthcontrolcontraception.html>

- Other guides

Breast Cancer

<http://www.nlm.nih.gov/medlineplus/breastcancer.html>

Disasters and Emergency Preparedness

<http://www.nlm.nih.gov/medlineplus/disastersandemergencypreparedness.html>

Managed Care

<http://www.nlm.nih.gov/medlineplus/managedcare.html>

Ovarian Cancer

<http://www.nlm.nih.gov/medlineplus/ovariancancer.html>

Teen Sexual Health

<http://www.nlm.nih.gov/medlineplus/teensexualhealth.html>

Teenage Pregnancy

<http://www.nlm.nih.gov/medlineplus/teenagepregnancy.html>

Within the health topic page dedicated to birth control, the following was listed:

- General/Overviews

Birth Control

Source: American College of Obstetricians and Gynecologists

http://www.medem.com/MedLB/article_detailb.cfm?article_ID=ZZZ48OI527C&sub_cat=5

Birth Control Guide

Source: Food and Drug Administration

<http://www.fda.gov/fdac/features/1997/babytabl.html>

Planning Your Family

<http://www.ncfh.org/pateduc/en-famplan.htm>

What Kind of Birth Control Is Best for You?

<http://www.fda.gov/opacom/lowlit/brthcon.html>

- Specific Conditions/Aspects

Are Fertility Awareness Methods Right for Me?

Source: EngenderHealth

<http://www.engenderhealth.org/wh/fp/cfer1.html>

Birth Control for Women with Epilepsy

Source: Epilepsy Foundation

<http://www.epilepsyfoundation.org/answerplace/Life/adults/women/weibirtheontrol.cfm>

Birth Control Pills: Can Antibiotics Decrease Their Effectiveness?

Source: Mayo Foundation for Medical Education and Research
<http://www.mayoclinic.com/invoke.cfm?id=AN00099>

Birth Control Pills: Do They Increase Blood Pressure?

Source: Mayo Foundation for Medical Education and Research
<http://www.mayoclinic.com/invoke.cfm?id=AN00204>

Cervical Cap: The Right Form of Birth Control for You?

Source: Mayo Foundation for Medical Education and Research
<http://www.mayoclinic.com/invoke.cfm?id=PR00074>

Combined Injectable Contraceptives (CICs) FAQ

Source: Family Health International
http://www.fhi.org/en/RH/FAQs/CIC_faq.htm

Condoms

<http://www.kff.org/content/2001/3117/Fact%2520Sheet.pdf>

Contraception While Breastfeeding

Source: American College of Obstetricians and Gynecologists
http://www.medem.com/medlb/article_detailb.cfm?article_ID=ZZZ9XXA7AEC&sub_cat=5

Contraceptive Sponge: The Right Form of Birth Control for You?

Source: Mayo Foundation for Medical Education and Research
<http://www.mayoclinic.com/invoke.cfm?id=WO00045>

Counseling, Informed Choice, Informed Consent, and the Rights of the Client

Source: EngenderHealth
<http://www.engenderhealth.org/wh/fp/iwhat.html>

Depo-Provera: The Right Form of Birth Control for You?

Source: Mayo Foundation for Medical Education and Research
<http://www.mayoclinic.com/invoke.cfm?id=PR00076>

Diaphragm: The Right Form of Birth Control for You?

Source: Mayo Foundation for Medical Education and Research
<http://www.mayoclinic.com/invoke.cfm?id=PR00073>

Emergency Contraception

Source: National Women's Health Information Center
<http://www.4woman.gov/faq/econtracep.htm>

FDA Approves New Female Sterilization Device

Source: Food and Drug Administration
<http://www.fda.gov/bbs/topics/ANSWERS/2002/ANS01168.html>

FDA Approves Seasonale Oral Contraceptive

Source: Food and Drug Administration
<http://www.fda.gov/bbs/topics/ANSWERS/2003/ANS01251.html>

Fertility Awareness Methods: Questions & Answers

Source: EngenderHealth
<http://www.engenderhealth.org/wh/fp/cfer2.html>

Intrauterine Devices: The Right Form of Birth Control for You?

Source: Mayo Foundation for Medical Education and Research
<http://www.mayoclinic.com/invoke.cfm?id=WO00033>

Lactational Amenorrhea FAQ

Source: Family Health International
http://www.fhi.org/en/RH/FAQs/lam_faq.htm

Lunelle: The Right Form of Birth Control for You?

Source: Mayo Foundation for Medical Education and Research
<http://www.mayoclinic.com/invoke.cfm?id=WO00032>

Natural Family Planning

Source: American Academy of Family Physicians
<http://familydoctor.org/handouts/126.html>

Natural Family Planning: The Right Form of Birth Control for You?

Source: Mayo Foundation for Medical Education and Research
<http://www.mayoclinic.com/invoke.cfm?id=WO00035>

Natural Methods of Family Planning FAQ

Source: Family Health International
http://www.fhi.org/en/RH/FAQs/natural_faq.htm

Oral Contraceptives and Cancer Risk

Source: National Cancer Institute
http://cis.nci.nih.gov/fact/3_13.htm

Pill Revisited: Benefits Beyond Birth Control

Source: Mayo Foundation for Medical Education and Research
<http://www.mayoclinic.com/invoke.cfm?id=HQ01522>

Right Way to Use a Condom

Source: American Social Health Association
http://www.ashastd.org/stdfaqs/condom_a.html

Risk of Ectopic Pregnancy after Tubal Sterilization

Source: Centers for Disease Control and Prevention
http://www.cdc.gov/nccdphp/drh/mh_ectopic.htm

Sterilization as Permanent Birth Control

Source: Mayo Foundation for Medical Education and Research
<http://www.mayoclinic.com/invoke.cfm?id=HO00141>

Tubal Ligation: The Right Form of Birth Control for You?

Source: Mayo Foundation for Medical Education and Research
<http://www.mayoclinic.com/invoke.cfm?id=WO00047>

Vaginal Ring: The Right Form of Birth Control for You?

Source: Mayo Foundation for Medical Education and Research
<http://www.mayoclinic.com/invoke.cfm?id=WO00036>

- Latest News

Asia 'Needs Billions of Condoms'

Source: 08/18/2003, United Press International
http://www.nlm.nih.gov//www.nlm.nih.gov/medlineplus/news/fullstory_13700.html

Barr Gets Approval for Extended Oral Contraceptive

Source: 09/08/2003, Reuters Health

http://www.nlm.nih.gov//www.nlm.nih.gov/medlineplus/news/fullstory_13911.html

Continuous Use of the Pill Curbs Pelvic Pain

Source: 09/11/2003, Reuters Health

http://www.nlm.nih.gov//www.nlm.nih.gov/medlineplus/news/fullstory_13956.html

Recall of Nortrel 7/7/7 Due to Mispackaging Causes Increased Chance of Pregnancy

Source: 07/11/2003, Food and Drug Administration

<http://www.fda.gov/bbs/topics/ANSWERS/2003/ANS01238.html>

- Men

Facts about Vasectomy Safety

Source: National Institute of Child Health and Human Development

<http://www.nichd.nih.gov/publications/pubs/vasect.htm>

Vasectomy

<http://www.nlm.nih.gov/medlineplus/tutorials/vasectomyloader.html>

- Organizations

National Institute of Child Health and Human Development

<http://www.nichd.nih.gov/>

National Women's Health Information Center

Source: Dept. of Health and Human Services

<http://www.4woman.org/>

Sexuality Information and Education Council of the United States

<http://www.siecus.org/>

United States Agency for International Development

<http://www.usaid.gov/>

- Research

Bone Loss in Depo-Provera Users Largely Reversible

Source: National Institute of Child Health and Human Development

<http://www.nih.gov/news/pr/sep2002/nichd-06.htm>

Vasectomy and Cancer Risk

Source: National Cancer Institute

http://cis.nci.nih.gov/fact/3_26.htm

- Statistics

Contraceptive Use and Methods in the U.S.

Source: Henry J. Kaiser Family Foundation

http://www.kff.org/content/2002/3244/Contraception_Fact_Sheet_FINAL.pdf

Family Planning Prevents Abortion

http://www.usaid.gov/pop_health/pop/publications/docs/preventab.pdf

FASTATS: Contraceptive Use

Source: Centers for Disease Control and Prevention

<http://www.cdc.gov/nchs/fastats/usecontr.htm>

- Teenagers

Birth Control Pill

Source: Nemours Foundation

http://kidshealth.org/teen/sexual_health/contraception/contraception_birth.html

Cervical Cap

Source: Nemours Foundation

http://kidshealth.org/teen/sexual_health/contraception/contraception_cap.html

Condom

Source: Nemours Foundation

http://kidshealth.org/teen/sexual_health/contraception/contraception_condom.html

Depo-Provera

Source: Nemours Foundation

http://kidshealth.org/teen/sexual_health/contraception/contraception_depo.html

Diaphragm

Source: Nemours Foundation

http://kidshealth.org/teen/sexual_health/contraception/contraception_diaphragm.html

Douching

Source: Nemours Foundation

http://kidshealth.org/teen/sexual_health/contraception/contraception_douche.html

Emergency Contraception

Source: Nemours Foundation

http://kidshealth.org/teen/sexual_health/contraception/contraception_emergency.html

Intrauterine Device (IUD)

Source: Nemours Foundation

http://kidshealth.org/teen/sexual_health/contraception/contraception_iud.html

Rhythm Method

Source: Nemours Foundation

http://kidshealth.org/teen/sexual_health/contraception/contraception_rhythm.html

Spermicide

Source: Nemours Foundation

http://kidshealth.org/teen/sexual_health/contraception/contraception_spermicide.html

Withdrawal

Source: Nemours Foundation

http://kidshealth.org/teen/sexual_health/contraception/contraception_withdrawal.html

You may also choose to use the search utility provided by MEDLINEplus at the following Web address: <http://www.nlm.nih.gov/medlineplus/>. Simply type a keyword into the search box and click "Search." This utility is similar to the NIH search utility, with the exception that it only includes materials that are linked within the MEDLINEplus system (mostly patient-oriented information). It also has the disadvantage of generating unstructured results. We recommend, therefore, that you use this method only if you have a very targeted search.

The Combined Health Information Database (CHID)

CHID Online is a reference tool that maintains a database directory of thousands of journal articles and patient education guidelines on birth control. CHID offers summaries that describe the guidelines available, including contact information and pricing. CHID's general Web site is <http://chid.nih.gov/>. To search this database, go to <http://chid.nih.gov/detail/detail.html>. In particular, you can use the advanced search options to look up pamphlets, reports, brochures, and information kits. The following was recently posted in this archive:

- **Does Your Birth Control Protect You Against AIDS?**

Contact: Women and AIDS Project, 302-1720 Grant St, Vancouver.

Summary: This brochure warns women that of all contraceptive devices, only condoms provide protection against transmission of Human immunodeficiency virus (HIV), the etiologic agent of Acquired immunodeficiency syndrome (AIDS). Tips on using condoms are listed and a wrapped condom is included with the brochure.

- **Facts About Birth Control**

Contact: Family Planning Council, Circle of Care, 260 S Broad St 10th Fl Ste 1000, Philadelphia, PA, 19102-3865, (215) 985-2657, <http://www.familyplanning.org>.

Summary: This brochure discusses various methods of contraception, including the sponge, condoms, diaphragm, spermicides, oral contraception, and natural family planning in terms of their advantages and drawbacks, one of which is their ability or inability to prevent Sexually transmitted diseases (STD's), including Human immunodeficiency virus (HIV), the etiologic agent of Acquired immunodeficiency syndrome (AIDS).

- **Methods of birth control: The key to family planning**

Source: Richmond, VA: Virginia Department of Health. 1997. 2 pp.

Contact: Available from Barbara Parker, (804) 786-8663, Fax: (804) 371- 6032, bparker@vdh.state.va.us, Virginia Department of Health, 1500 East Main Street, Richmond, VA 23219. Available at no charge.

Summary: This brochure presents information comparing ten methods of birth control, their use, effectiveness, advantages, side effects, and other considerations. The information is presented in a chart.

- **Birth control: Your choices**

Source: [Austin, TX]: Texas Department of Health. 1996. 16 pp.

Contact: Available from Texas Department of Health, 1100 West 49th Street, Austin, TX 78756. Telephone: (512) 458-7658 or (800) 434-4453 / fax: (512) 458-7713.

Summary: This educational booklet describes various birth control techniques. The booklet describes how each technique works and how it is used; indicates possible problems, benefits, and disadvantages; and reviews how well the technique works. It covers condoms; female condoms; spermicidal foams, jellies, creams, and suppositories, and contraceptive films; diaphragms, intrauterine devices, Norplant, depo-provera, the pill, the lactational amenorrhea method, sterilization, natural family planning, and abstinence.

- **Birth control pills**

Source: Washington, DC: American College of Obstetricians and Gynecologists. 1994. 4 pp.

Contact: Available from Rebecca Rinehart, American College of Obstetricians and Gynecologists, 409 12th Street, S.W., Washington, DC 20024-2188. Telephone: (202) 638-5577 or (202) 863-2518 reference desk / Web site: <http://www.acog.org/>. Single copies available at no charge; Copies of 50 available for \$15.00.

Summary: This brochure, part of the American College of Obstetricians and Gynecologists' Patient Education series, is designed to educate women about oral contraceptives. It covers topics such as how they work, how they should be taken, and what side effects may occur. Line drawings illustrate the reproductive cycle. The authors used the SMOG formula to determine that the brochure is written at a sixth-grade reading level.

- **Birth control facts**

Source: Santa Cruz, CA: ETR Associates/Network Publications. 1992. 2 pp.

Contact: Available from ETR Associates, P.O. Box 1830, Santa Cruz, CA 95061-1830. Telephone: (831) 438-4060 or (800) 321-4407 / fax: (831) 438-4284 / Web site: <http://www.etr.org>. Available for purchase in quantities of 50 or more, contact publisher for prices.

Summary: This pamphlet includes most the birth control methods available today. For the condom, diaphragm, fertility awareness method, spermicides, IUD, natural family planning, Norplant, birth control pills, sponge, and sterilization, a description is given of how the method works, its effectiveness, advantages, and disadvantages.

- **Norplant: A new birth control**

Source: Lake Andes, SD: Native American Women's Health Education Resource Center. 1992. 2 pp.

Contact: Available from Carey Luckenbach, Native American Women's Health Education Resource Center, P.O. Box 572, Lake Andes, SD 57356. Telephone: (605) 487-

7072 / fax: (605) 487-7964 / e-mail: nativewoman@igc.apc.org / Web site: <http://www.nativeshop.org>. Single copies available at no charge; charges for multiple copies based on quantity ordered.

Summary: This pamphlet provides simple information on the Norplant birth control system including who should consider using it, who should not use it, and how the system works. Written at a fifth grade reading level, the pamphlet was developed using low literacy criteria. The pamphlet was formally evaluated by the National Women's Health Network and has been translated and distributed in Spanish.

- **Birth control options**

Source: Yardley, PA: Medicine Group USA. 1991. 38 pp.

Contact: Available from Medicine Group USA, 301 Oxford Valley Road, Suite 804 A, Yardley, PA 19067.

Summary: This patient education brochure describes how various forms of birth control work, and their advantages and disadvantages, so that the patient, with the assistance of his or her physician, can make an informed decision about the appropriate birth control method. Oral contraceptives, the intrauterine device (IUD), barrier methods, rhythm methods, the contraceptive implant, and sterilization are discussed as birth control methods.

- **Abstinence First: Teen Birth Control Defense (Version B)**

Contact: Human Relations Media Incorporated, 175 Tompkins Ave, Pleasantville, NY, 10570, (914) 769-7496.

Summary: This information kit serves as a curriculum with educational information regarding the benefits of sexual abstinence and how to practice and maintain it. The information kit discusses the physical and emotional consequences of adolescent pregnancy, the advantages of sexual abstinence over various methods of contraception, good decision-making habits, how to deflect peer pressure to have sex, and the importance of self-esteem in practicing sexual abstinence. This version, Version B, of the curriculum does not make judgments regarding an individual's decision to have or abstain from premarital sex.

- **Condoms, Pills and Other Useful Things : A Young Person's Guide to Contraception and STIs**

Contact: AVERT, 4 Brighton Rd, Horsham, <http://www.avert.org>.

Summary: This brochure, written with the input of young people for other young people aged 13 to 16 years, discusses pregnancy, birth control (i.e., the pill, condoms, diaphragms [the cap], intrauterine devices [IUDs], emergency contraceptives), first sexual experiences, and sexually transmitted diseases (STDs). The brochure explains how a girl becomes pregnant, how the pill works chemically to prevent pregnancy, what 'going on the pill' means and requires, and how to find out which type of pill is suitable. It discusses contraceptives that are effective against pregnancy and/or preventing STD transmission. The brochure discusses getting contraception from a family doctor or family planning clinic and the embarrassment that may be associated with getting contraception. It discusses pregnancy testing and STDs, their prevention, symptoms, and treatment. A list of resources for additional information is provided.

- **Contraceptive Use: It's No Secret! A Guide for You by Teens for Teens!**

Contact: Advocates for Youth, 1025 Vermont Ave NW Ste 200, Washington, DC, 20005, (202) 347-5700, <http://www.advocatesforyouth.org>.

Summary: This hand printed and illustrated brochure for teenagers provides information on the available forms of contraception, and how to prevent the transmission of sexually transmitted diseases (STDs). It begins with a statement about the importance of sexual abstinence. Those teenagers who do engage in premarital sexual relations are advised on the proper use of a latex condom or a female condom. Other forms of contraception discussed include the diaphragm, spermicide, cervical cap, Norplant, Depo-Provera, natural family planning, and withdrawal. The rate of effectiveness for STD prevention and birth control are included for each form of contraception.

- **PREG - NOT: A Modern Guide to the Pill and Other Contraceptives**

Contact: Do It Now Foundation, PO Box 27568, Tempe, AZ, 85285, (480) 736-0599, <http://www.doitnow.org>.

Summary: This brochure enumerates methods a woman can use to prevent pregnancy. It discusses oral contraceptives and explains alternatives to oral contraceptives, including the barrier methods. Explanations on how anovulatory pills work and what risks are involved, including that they do not protect against AIDS, are included. Ovulation and the rhythm method are explained. Condoms are described as a safe and effective option for birth control and disease prevention. The safety and efficacy of intrauterine devices, contraceptive foams, and cervical caps are discussed. The brochure concludes, however, that none of the methods work unless used properly and consistently.

- **Today's Contraceptives. What's Best for You?**

Contact: Spence Research, Incorporated, Health Educo, 5045 Franklin Ave, Waco, TX, 76702, (817) 776-6461.

Summary: This brochure discusses all forms of contraception and the advantages and disadvantages of each method in preventing pregnancy and Sexually transmitted diseases (STD'S), such as Acquired immunodeficiency syndrome (AIDS) and the Human immunodeficiency virus (HIV). Methods discussed are the pill, barrier devices, and intrauterine devices. Included also is a discussion on natural birth control and sterilization.

Healthfinder™

Healthfinder™ is sponsored by the U.S. Department of Health and Human Services and offers links to hundreds of other sites that contain healthcare information. This Web site is located at <http://www.healthfinder.gov>. Again, keyword searches can be used to find guidelines. The following was recently found in this database:

- **Birth Control Guide**

Summary: Efficacy rates in this chart are based on Contraceptive Technology.

Source: U.S. Food and Drug Administration

<http://www.healthfinder.gov/scripts/recordpass.asp?RecordType=0&RecordID=1387>

- **Choosing a Birth Control Method**

Source: Association of Reproductive Health Professionals

<http://www.healthfinder.gov/scripts/recordpass.asp?RecordType=0&RecordID=6045>

- **Norplant Birth Control: Questions and Answers**

Summary: A general overview on Norplant birth control -- a long-lasting but not permanent method of birth control.

Source: American Academy of Family Physicians

<http://www.healthfinder.gov/scripts/recordpass.asp?RecordType=0&RecordID=6239>

- **Oral Contraceptives and Cancer Risk**

Source: Cancer Information Service, National Cancer Institute

<http://www.healthfinder.gov/scripts/recordpass.asp?RecordType=0&RecordID=7080>

- **School-Based Health Centers and the Birth Control Debate**

Summary: Facts about school-based health centers in the United States and their role as a source of counseling and reproductive health care, especially for low-income and uninsured youth in the communities.

Source: Alan Guttmacher Institute

<http://www.healthfinder.gov/scripts/recordpass.asp?RecordType=0&RecordID=6022>

- **What to Expect at Your Annual Exam: For Guys**

Summary: Description of what is involved for an adolescent male in a routine annual physical examination and advice on addressing concerns about your body, sex, or birth control.

Source: Planned Parenthood Federation of America

<http://www.healthfinder.gov/scripts/recordpass.asp?RecordType=0&RecordID=4348>

The NIH Search Utility

The NIH search utility allows you to search for documents on over 100 selected Web sites that comprise the NIH-WEB-SPACE. Each of these servers is "crawled" and indexed on an ongoing basis. Your search will produce a list of various documents, all of which will relate in some way to birth control. The drawbacks of this approach are that the information is not organized by theme and that the references are often a mix of information for professionals

and patients. Nevertheless, a large number of the listed Web sites provide useful background information. We can only recommend this route, therefore, for relatively rare or specific disorders, or when using highly targeted searches. To use the NIH search utility, visit the following Web page: <http://search.nih.gov/index.html>.

Additional Web Sources

A number of Web sites are available to the public that often link to government sites. These can also point you in the direction of essential information. The following is a representative sample:

- AOL: <http://search.aol.com/cat.adp?id=168&layer=&from=subcats>
- Family Village: <http://www.familyvillage.wisc.edu/specific.htm>
- Google: http://directory.google.com/Top/Health/Conditions_and_Diseases/
- Med Help International: <http://www.medhelp.org/HealthTopics/A.html>
- Open Directory Project: http://dmoz.org/Health/Conditions_and_Diseases/
- Yahoo.com: http://dir.yahoo.com/Health/Diseases_and_Conditions/
- WebMD® Health: http://my.webmd.com/health_topics

Finding Associations

There are several Internet directories that provide lists of medical associations with information on or resources relating to birth control. By consulting all of associations listed in this chapter, you will have nearly exhausted all sources for patient associations concerned with birth control.

The National Health Information Center (NHIC)

The National Health Information Center (NHIC) offers a free referral service to help people find organizations that provide information about birth control. For more information, see the NHIC's Web site at <http://www.health.gov/NHIC/> or contact an information specialist by calling 1-800-336-4797.

Directory of Health Organizations

The Directory of Health Organizations, provided by the National Library of Medicine Specialized Information Services, is a comprehensive source of information on associations. The Directory of Health Organizations database can be accessed via the Internet at <http://www.sis.nlm.nih.gov/Dir/DirMain.html>. It is composed of two parts: DIRLINE and Health Hotlines.

The DIRLINE database comprises some 10,000 records of organizations, research centers, and government institutes and associations that primarily focus on health and biomedicine. To access DIRLINE directly, go to the following Web site: <http://dirline.nlm.nih.gov/>.

Simply type in “birth control” (or a synonym), and you will receive information on all relevant organizations listed in the database.

Health Hotlines directs you to toll-free numbers to over 300 organizations. You can access this database directly at <http://www.sis.nlm.nih.gov/hotlines/>. On this page, you are given the option to search by keyword or by browsing the subject list. When you have received your search results, click on the name of the organization for its description and contact information.

The Combined Health Information Database

Another comprehensive source of information on healthcare associations is the Combined Health Information Database. Using the “Detailed Search” option, you will need to limit your search to “Organizations” and “birth control”. Type the following hyperlink into your Web browser: <http://chid.nih.gov/detail/detail.html>. To find associations, use the drop boxes at the bottom of the search page where “You may refine your search by.” For publication date, select “All Years.” Then, select your preferred language and the format option “Organization Resource Sheet.” Type “birth control” (or synonyms) into the “For these words:” box. You should check back periodically with this database since it is updated every three months.

The National Organization for Rare Disorders, Inc.

The National Organization for Rare Disorders, Inc. has prepared a Web site that provides, at no charge, lists of associations organized by health topic. You can access this database at the following Web site: <http://www.rarediseases.org/search/orgsearch.html>. Type “birth control” (or a synonym) into the search box, and click “Submit Query.”

APPENDIX C. RESEARCHING MEDICATIONS

Overview

While a number of hard copy or CD-ROM resources are available for researching medications, a more flexible method is to use Internet-based databases. Broadly speaking, there are two sources of information on approved medications: public sources and private sources. We will emphasize free-to-use public sources.

U.S. Pharmacopeia

Because of historical investments by various organizations and the emergence of the Internet, it has become rather simple to learn about the medications recommended for birth control. One such source is the United States Pharmacopeia. In 1820, eleven physicians met in Washington, D.C. to establish the first compendium of standard drugs for the United States. They called this compendium the U.S. Pharmacopeia (USP). Today, the USP is a non-profit organization consisting of 800 volunteer scientists, eleven elected officials, and 400 representatives of state associations and colleges of medicine and pharmacy. The USP is located in Rockville, Maryland, and its home page is located at <http://www.usp.org/>. The USP currently provides standards for over 3,700 medications. The resulting USP DI® Advice for the Patient® can be accessed through the National Library of Medicine of the National Institutes of Health. The database is partially derived from lists of federally approved medications in the Food and Drug Administration's (FDA) Drug Approvals database, located at <http://www.fda.gov/cder/da/da.htm>.

While the FDA database is rather large and difficult to navigate, the Pharmacopeia is both user-friendly and free to use. It covers more than 9,000 prescription and over-the-counter medications. To access this database, simply type the following hyperlink into your Web browser: <http://www.nlm.nih.gov/medlineplus/druginformation.html>. To view examples of a given medication (brand names, category, description, preparation, proper use, precautions, side effects, etc.), simply follow the hyperlinks indicated within the United States Pharmacopeia (USP).

Below, we have compiled a list of medications associated with birth control. If you would like more information on a particular medication, the provided hyperlinks will direct you to ample documentation (e.g. typical dosage, side effects, drug-interaction risks, etc.). The

following drugs have been mentioned in the Pharmacopeia and other sources as being potentially applicable to birth control:

Acitretin

- **Systemic - U.S. Brands:** Soriatane
<http://www.nlm.nih.gov/medlineplus/druginfo/uspdi/203365.html>

Estrogens and Progestins Oral Contraceptives

- **Systemic - U.S. Brands:** Alesse; Brevicon; Demulen 1/35; Demulen 1/50; Desogen; Estrostep; Estrostep Fe; Genora 0.5/35; Genora 1/35; Genora 1/50; Intercon 0.5/35; Intercon 1/35; Intercon 1/50; Jenest; Levlen; Levlite; Levora 0.15/30; Lo/Ovral; Loestrin 1.5/30; Loestrin 1/20; Lo
<http://www.nlm.nih.gov/medlineplus/druginfo/uspdi/202228.html>

Isotretinoin

- **Systemic - U.S. Brands:** Accutane
<http://www.nlm.nih.gov/medlineplus/druginfo/uspdi/202309.html>

Medroxyprogesterone and Estradiol

- **Systemic - U.S. Brands:** Lunelle
<http://www.nlm.nih.gov/medlineplus/druginfo/uspdi/500255.html>

Progesterone Intrauterine Device

- **Iud) - U.S. Brands:** Progestasert
<http://www.nlm.nih.gov/medlineplus/druginfo/uspdi/202774.html>

Progestins for Contraceptive Use

- **Systemic - U.S. Brands:** Depo-Provera Contraceptive Injection; Micronor; NORPLANT System; Nor-QD; Ovrette; Plan B
<http://www.nlm.nih.gov/medlineplus/druginfo/uspdi/202757.html>

Spermicides

- **Vaginal - U.S. Brands:** Advantage 24; Because; Conceptrol Contraceptive Inserts; Conceptrol Gel; Delfen; Emko; Emko Pre-Fil; Encare; Gynol II Extra Strength Contraceptive Jelly; Gynol II Original Formula Contraceptive Jelly; Koromex Cream; Koromex Crystal Clear Gel; Koromex Fo
<http://www.nlm.nih.gov/medlineplus/druginfo/uspdi/202531.html>

Commercial Databases

In addition to the medications listed in the USP above, a number of commercial sites are available by subscription to physicians and their institutions. Or, you may be able to access these sources from your local medical library.

Mosby's Drug Consult™

Mosby's Drug Consult™ database (also available on CD-ROM and book format) covers 45,000 drug products including generics and international brands. It provides prescribing

information, drug interactions, and patient information. Subscription information is available at the following hyperlink: <http://www.mosbysdrugconsult.com/>.

PDRhealth

The *PDRhealth* database is a free-to-use, drug information search engine that has been written for the public in layman's terms. It contains FDA-approved drug information adapted from the Physicians' Desk Reference (PDR) database. *PDRhealth* can be searched by brand name, generic name, or indication. It features multiple drug interactions reports. Search *PDRhealth* at http://www.pdrhealth.com/drug_info/index.html.

Other Web Sites

Drugs.com (www.drugs.com) reproduces the information in the Pharmacopeia as well as commercial information. You may also want to consider the Web site of the Medical Letter, Inc. (<http://www.medletter.com/>) which allows users to download articles on various drugs and therapeutics for a nominal fee.

If you have any questions about a medical treatment, the FDA may have an office near you. Look for their number in the blue pages of the phone book. You can also contact the FDA through its toll-free number, 1-888-INFO-FDA (1-888-463-6332), or on the World Wide Web at www.fda.gov.

APPENDIX D. FINDING MEDICAL LIBRARIES

Overview

In this Appendix, we show you how to quickly find a medical library in your area.

Preparation

Your local public library and medical libraries have interlibrary loan programs with the National Library of Medicine (NLM), one of the largest medical collections in the world. According to the NLM, most of the literature in the general and historical collections of the National Library of Medicine is available on interlibrary loan to any library. If you would like to access NLM medical literature, then visit a library in your area that can request the publications for you.²³

Finding a Local Medical Library

The quickest method to locate medical libraries is to use the Internet-based directory published by the National Network of Libraries of Medicine (NN/LM). This network includes 4626 members and affiliates that provide many services to librarians, health professionals, and the public. To find a library in your area, simply visit <http://nnlm.gov/members/adv.html> or call 1-800-338-7657.

Medical Libraries in the U.S. and Canada

In addition to the NN/LM, the National Library of Medicine (NLM) lists a number of libraries with reference facilities that are open to the public. The following is the NLM's list and includes hyperlinks to each library's Web site. These Web pages can provide information on hours of operation and other restrictions. The list below is a small sample of

²³ Adapted from the NLM: <http://www.nlm.nih.gov/psd/cas/interlibrary.html>.

libraries recommended by the National Library of Medicine (sorted alphabetically by name of the U.S. state or Canadian province where the library is located)²⁴:

- **Alabama:** Health InfoNet of Jefferson County (Jefferson County Library Cooperative, Lister Hill Library of the Health Sciences), <http://www.uab.edu/infonet/>
- **Alabama:** Richard M. Scrusby Library (American Sports Medicine Institute)
- **Arizona:** Samaritan Regional Medical Center: The Learning Center (Samaritan Health System, Phoenix, Arizona), <http://www.samaritan.edu/library/bannerlibs.htm>
- **California:** Kris Kelly Health Information Center (St. Joseph Health System, Humboldt), <http://www.humboldt1.com/~kkhic/index.html>
- **California:** Community Health Library of Los Gatos, <http://www.healthlib.org/orgresources.html>
- **California:** Consumer Health Program and Services (CHIPS) (County of Los Angeles Public Library, Los Angeles County Harbor-UCLA Medical Center Library) - Carson, CA, <http://www.colapublib.org/services/chips.html>
- **California:** Gateway Health Library (Sutter Gould Medical Foundation)
- **California:** Health Library (Stanford University Medical Center), <http://www-med.stanford.edu/healthlibrary/>
- **California:** Patient Education Resource Center - Health Information and Resources (University of California, San Francisco), <http://sfghdean.ucsf.edu/barnett/PERC/default.asp>
- **California:** Redwood Health Library (Petaluma Health Care District), <http://www.phcd.org/rdwdlib.html>
- **California:** Los Gatos PlaneTree Health Library, <http://planetreesanjose.org/>
- **California:** Sutter Resource Library (Sutter Hospitals Foundation, Sacramento), <http://suttermedicalcenter.org/library/>
- **California:** Health Sciences Libraries (University of California, Davis), <http://www.lib.ucdavis.edu/healthsci/>
- **California:** ValleyCare Health Library & Ryan Comer Cancer Resource Center (ValleyCare Health System, Pleasanton), <http://gaelnet.stmarys-ca.edu/other.libs/gbal/east/vchl.html>
- **California:** Washington Community Health Resource Library (Fremont), <http://www.healthlibrary.org/>
- **Colorado:** William V. Gervasini Memorial Library (Exempla Healthcare), <http://www.saintjosephdenver.org/yourhealth/libraries/>
- **Connecticut:** Hartford Hospital Health Science Libraries (Hartford Hospital), <http://www.harthosp.org/library/>
- **Connecticut:** Healthnet: Connecticut Consumer Health Information Center (University of Connecticut Health Center, Lyman Maynard Stowe Library), <http://library.uchc.edu/departm/hnet/>

²⁴ Abstracted from <http://www.nlm.nih.gov/medlineplus/libraries.html>.

- **Connecticut:** Waterbury Hospital Health Center Library (Waterbury Hospital, Waterbury), <http://www.waterburyhospital.com/library/consumer.shtml>
- **Delaware:** Consumer Health Library (Christiana Care Health System, Eugene du Pont Preventive Medicine & Rehabilitation Institute, Wilmington), http://www.christianacare.org/health_guide/health_guide_pmri_health_info.cfm
- **Delaware:** Lewis B. Flinn Library (Delaware Academy of Medicine, Wilmington), <http://www.delamed.org/chls.html>
- **Georgia:** Family Resource Library (Medical College of Georgia, Augusta), http://cmc.mcg.edu/kids_families/fam_resources/fam_res_lib/frl.htm
- **Georgia:** Health Resource Center (Medical Center of Central Georgia, Macon), <http://www.mccg.org/hrc/hrchome.asp>
- **Hawaii:** Hawaii Medical Library: Consumer Health Information Service (Hawaii Medical Library, Honolulu), <http://hml.org/CHIS/>
- **Idaho:** DeArmond Consumer Health Library (Kootenai Medical Center, Coeur d'Alene), <http://www.nicon.org/DeArmond/index.htm>
- **Illinois:** Health Learning Center of Northwestern Memorial Hospital (Chicago), http://www.nmh.org/health_info/hlc.html
- **Illinois:** Medical Library (OSF Saint Francis Medical Center, Peoria), <http://www.osfsaintfrancis.org/general/library/>
- **Kentucky:** Medical Library - Services for Patients, Families, Students & the Public (Central Baptist Hospital, Lexington), <http://www.centralbap.com/education/community/library.cfm>
- **Kentucky:** University of Kentucky - Health Information Library (Chandler Medical Center, Lexington), <http://www.mc.uky.edu/PatientEd/>
- **Louisiana:** Alton Ochsner Medical Foundation Library (Alton Ochsner Medical Foundation, New Orleans), <http://www.ochsner.org/library/>
- **Louisiana:** Louisiana State University Health Sciences Center Medical Library-Shreveport, <http://lib-sh.lsuhscc.edu/>
- **Maine:** Franklin Memorial Hospital Medical Library (Franklin Memorial Hospital, Farmington), <http://www.fchn.org/fmh/lib.htm>
- **Maine:** Gerrish-True Health Sciences Library (Central Maine Medical Center, Lewiston), <http://www.cmmc.org/library/library.html>
- **Maine:** Hadley Parrot Health Science Library (Eastern Maine Healthcare, Bangor), <http://www.emh.org/hll/hpl/guide.htm>
- **Maine:** Maine Medical Center Library (Maine Medical Center, Portland), <http://www.mmc.org/library/>
- **Maine:** Parkview Hospital (Brunswick), <http://www.parkviewhospital.org/>
- **Maine:** Southern Maine Medical Center Health Sciences Library (Southern Maine Medical Center, Biddeford), <http://www.smmc.org/services/service.php3?choice=10>
- **Maine:** Stephens Memorial Hospital's Health Information Library (Western Maine Health, Norway), <http://www.wmhcc.org/Library/>

- **Manitoba, Canada:** Consumer & Patient Health Information Service (University of Manitoba Libraries), <http://www.umanitoba.ca/libraries/units/health/reference/chis.html>
- **Manitoba, Canada:** J.W. Crane Memorial Library (Deer Lodge Centre, Winnipeg), http://www.deerlodge.mb.ca/crane_library/about.asp
- **Maryland:** Health Information Center at the Wheaton Regional Library (Montgomery County, Dept. of Public Libraries, Wheaton Regional Library), <http://www.mont.lib.md.us/healthinfo/hic.asp>
- **Massachusetts:** Baystate Medical Center Library (Baystate Health System), <http://www.baystatehealth.com/1024/>
- **Massachusetts:** Boston University Medical Center Alumni Medical Library (Boston University Medical Center), <http://med-libwww.bu.edu/library/lib.html>
- **Massachusetts:** Lowell General Hospital Health Sciences Library (Lowell General Hospital, Lowell), <http://www.lowellgeneral.org/library/HomePageLinks/WWW.htm>
- **Massachusetts:** Paul E. Woodard Health Sciences Library (New England Baptist Hospital, Boston), http://www.nebh.org/health_lib.asp
- **Massachusetts:** St. Luke's Hospital Health Sciences Library (St. Luke's Hospital, Southcoast Health System, New Bedford), <http://www.southcoast.org/library/>
- **Massachusetts:** Treadwell Library Consumer Health Reference Center (Massachusetts General Hospital), <http://www.mgh.harvard.edu/library/chrcindex.html>
- **Massachusetts:** UMass HealthNet (University of Massachusetts Medical School, Worcester), <http://healthnet.umassmed.edu/>
- **Michigan:** Botsford General Hospital Library - Consumer Health (Botsford General Hospital, Library & Internet Services), <http://www.botsfordlibrary.org/consumer.htm>
- **Michigan:** Helen DeRoy Medical Library (Providence Hospital and Medical Centers), <http://www.providence-hospital.org/library/>
- **Michigan:** Marquette General Hospital - Consumer Health Library (Marquette General Hospital, Health Information Center), <http://www.mgh.org/center.html>
- **Michigan:** Patient Education Resource Center - University of Michigan Cancer Center (University of Michigan Comprehensive Cancer Center, Ann Arbor), <http://www.cancer.med.umich.edu/learn/leares.htm>
- **Michigan:** Sladen Library & Center for Health Information Resources - Consumer Health Information (Detroit), <http://www.henryford.com/body.cfm?id=39330>
- **Montana:** Center for Health Information (St. Patrick Hospital and Health Sciences Center, Missoula)
- **National:** Consumer Health Library Directory (Medical Library Association, Consumer and Patient Health Information Section), <http://caphis.mlanet.org/directory/index.html>
- **National:** National Network of Libraries of Medicine (National Library of Medicine) - provides library services for health professionals in the United States who do not have access to a medical library, <http://nnlm.gov/>
- **National:** NN/LM List of Libraries Serving the Public (National Network of Libraries of Medicine), <http://nnlm.gov/members/>

- **Nevada:** Health Science Library, West Charleston Library (Las Vegas-Clark County Library District, Las Vegas), http://www.lvcld.org/special_collections/medical/index.htm
- **New Hampshire:** Dartmouth Biomedical Libraries (Dartmouth College Library, Hanover), <http://www.dartmouth.edu/~biomed/resources.html#conshealth.html#d/>
- **New Jersey:** Consumer Health Library (Rahway Hospital, Rahway), <http://www.rahwayhospital.com/library.htm>
- **New Jersey:** Dr. Walter Phillips Health Sciences Library (Englewood Hospital and Medical Center, Englewood), <http://www.englewoodhospital.com/links/index.htm>
- **New Jersey:** Meland Foundation (Englewood Hospital and Medical Center, Englewood), <http://www.geocities.com/ResearchTriangle/9360/>
- **New York:** Choices in Health Information (New York Public Library) - NLM Consumer Pilot Project participant, <http://www.nypl.org/branch/health/links.html>
- **New York:** Health Information Center (Upstate Medical University, State University of New York, Syracuse), <http://www.upstate.edu/library/hic/>
- **New York:** Health Sciences Library (Long Island Jewish Medical Center, New Hyde Park), <http://www.lij.edu/library/library.html>
- **New York:** ViaHealth Medical Library (Rochester General Hospital), <http://www.nyam.org/library/>
- **Ohio:** Consumer Health Library (Akron General Medical Center, Medical & Consumer Health Library), <http://www.akrongeneral.org/hwlibrary.htm>
- **Oklahoma:** The Health Information Center at Saint Francis Hospital (Saint Francis Health System, Tulsa), <http://www.sfh-tulsa.com/services/healthinfo.asp>
- **Oregon:** Planetree Health Resource Center (Mid-Columbia Medical Center, The Dalles), <http://www.mcmc.net/phrc/>
- **Pennsylvania:** Community Health Information Library (Milton S. Hershey Medical Center, Hershey), <http://www.hmc.psu.edu/commhealth/>
- **Pennsylvania:** Community Health Resource Library (Geisinger Medical Center, Danville), <http://www.geisinger.edu/education/commlib.shtml>
- **Pennsylvania:** HealthInfo Library (Moses Taylor Hospital, Scranton), <http://www.mth.org/healthwellness.html>
- **Pennsylvania:** Hopwood Library (University of Pittsburgh, Health Sciences Library System, Pittsburgh), http://www.hsls.pitt.edu/guides/chi/hopwood/index_html
- **Pennsylvania:** Koop Community Health Information Center (College of Physicians of Philadelphia), <http://www.collphyphil.org/koopp1.shtml>
- **Pennsylvania:** Learning Resources Center - Medical Library (Susquehanna Health System, Williamsport), <http://www.shscars.org/services/lrc/index.asp>
- **Pennsylvania:** Medical Library (UPMC Health System, Pittsburgh), <http://www.upmc.edu/passavant/library.htm>
- **Quebec, Canada:** Medical Library (Montreal General Hospital), <http://www.mghlib.mcgill.ca/>

- **South Dakota:** Rapid City Regional Hospital Medical Library (Rapid City Regional Hospital), <http://www.rcrh.org/Services/Library/Default.asp>
- **Texas:** Houston HealthWays (Houston Academy of Medicine-Texas Medical Center Library), <http://hhw.library.tmc.edu/>
- **Washington:** Community Health Library (Kittitas Valley Community Hospital), <http://www.kvch.com/>
- **Washington:** Southwest Washington Medical Center Library (Southwest Washington Medical Center, Vancouver), <http://www.swmedicalcenter.com/body.cfm?id=72>

ONLINE GLOSSARIES

The Internet provides access to a number of free-to-use medical dictionaries. The National Library of Medicine has compiled the following list of online dictionaries:

- ADAM Medical Encyclopedia (A.D.A.M., Inc.), comprehensive medical reference:
<http://www.nlm.nih.gov/medlineplus/encyclopedia.html>
- MedicineNet.com Medical Dictionary (MedicineNet, Inc.):
<http://www.medterms.com/Script/Main/hp.asp>
- Merriam-Webster Medical Dictionary (Inteli-Health, Inc.):
<http://www.intelihealth.com/IH/>
- Multilingual Glossary of Technical and Popular Medical Terms in Eight European Languages (European Commission) - Danish, Dutch, English, French, German, Italian, Portuguese, and Spanish: <http://allserv.rug.ac.be/~rvdstich/eugloss/welcome.html>
- On-line Medical Dictionary (CancerWEB): <http://cancerweb.ncl.ac.uk/omd/>
- Rare Diseases Terms (Office of Rare Diseases):
<http://ord.aspensys.com/asp/diseases/diseases.asp>
- Technology Glossary (National Library of Medicine) - Health Care Technology:
<http://www.nlm.nih.gov/nichsr/ta101/ta10108.htm>

Beyond these, MEDLINEplus contains a very patient-friendly encyclopedia covering every aspect of medicine (licensed from A.D.A.M., Inc.). The ADAM Medical Encyclopedia can be accessed at <http://www.nlm.nih.gov/medlineplus/encyclopedia.html>. ADAM is also available on commercial Web sites such as drkoop.com (<http://www.drkoop.com/>) and Web MD (http://my.webmd.com/adam/asset/adam_disease_articles/a_to_z/a). The NIH suggests the following Web sites in the ADAM Medical Encyclopedia when searching for information on birth control:

- **Basic Guidelines for Birth Control**

Birth control pills overdose

Web site: <http://www.nlm.nih.gov/medlineplus/ency/article/002599.htm>

Contraception and family planning

Web site: <http://www.nlm.nih.gov/medlineplus/ency/article/001946.htm>

- **Signs & Symptoms for Birth Control**

Breast tenderness

Web site: <http://www.nlm.nih.gov/medlineplus/ency/article/003152.htm>

Discoloration of urine

Web site: <http://www.nlm.nih.gov/medlineplus/ency/article/003139.htm>

Drowsiness

Web site: <http://www.nlm.nih.gov/medlineplus/ency/article/003208.htm>

Emesis

Web site: <http://www.nlm.nih.gov/medlineplus/ency/article/003117.htm>

Headache

Web site: <http://www.nlm.nih.gov/medlineplus/ency/article/003024.htm>

Mental changes

Web site: <http://www.nlm.nih.gov/medlineplus/ency/article/003205.htm>

Nausea and/or vomiting

Web site: <http://www.nlm.nih.gov/medlineplus/ency/article/003117.htm>

Rash

Web site: <http://www.nlm.nih.gov/medlineplus/ency/article/003220.htm>

Vaginal bleeding

Web site: <http://www.nlm.nih.gov/medlineplus/ency/article/003156.htm>

- **Surgery and Procedures for Birth Control**

Tubal ligation

Web site: <http://www.nlm.nih.gov/medlineplus/ency/article/002913.htm>

Vasectomy

Web site: <http://www.nlm.nih.gov/medlineplus/ency/article/002995.htm>

- **Background Topics for Birth Control**

Birth control

Web site: <http://www.nlm.nih.gov/medlineplus/ency/article/001946.htm>

Cervix

Web site: <http://www.nlm.nih.gov/medlineplus/ency/article/002317.htm>

Condoms

Web site: <http://www.nlm.nih.gov/medlineplus/ency/article/004001.htm>

Female condom

Web site: <http://www.nlm.nih.gov/medlineplus/ency/article/004002.htm>

Heart disease

Web site: <http://www.nlm.nih.gov/medlineplus/ency/article/000147.htm>

Intrauterine

Web site: <http://www.nlm.nih.gov/medlineplus/ency/article/002389.htm>

Penis

Web site: <http://www.nlm.nih.gov/medlineplus/ency/article/002279.htm>

Vagina

Web site: <http://www.nlm.nih.gov/medlineplus/ency/article/002342.htm>

Online Dictionary Directories

The following are additional online directories compiled by the National Library of Medicine, including a number of specialized medical dictionaries:

- Medical Dictionaries: Medical & Biological (World Health Organization):
<http://www.who.int/hlt/virtuallibrary/English/diction.htm#Medical>
- MEL-Michigan Electronic Library List of Online Health and Medical Dictionaries (Michigan Electronic Library): <http://mel.lib.mi.us/health/health-dictionaries.html>
- Patient Education: Glossaries (DMOZ Open Directory Project):
http://dmoz.org/Health/Education/Patient_Education/Glossaries/
- Web of Online Dictionaries (Bucknell University):
<http://www.yourdictionary.com/diction5.html#medicine>

BIRTH CONTROL DICTIONARY

The definitions below are derived from official public sources, including the National Institutes of Health [NIH] and the European Union [EU].

Abdominal: Having to do with the abdomen, which is the part of the body between the chest and the hips that contains the pancreas, stomach, intestines, liver, gallbladder, and other organs. [NIH]

Abortion: 1. The premature expulsion from the uterus of the products of conception - of the embryo, or of a nonviable fetus. The four classic symptoms, usually present in each type of abortion, are uterine contractions, uterine haemorrhage, softening and dilatation of the cervix, and presentation or expulsion of all or part of the products of conception. 2. Premature stoppage of a natural or a pathological process. [EU]

Acceptor: A substance which, while normally not oxidized by oxygen or reduced by hydrogen, can be oxidized or reduced in presence of a substance which is itself undergoing oxidation or reduction. [NIH]

Acrosome: Cap-like structure covering the nucleus and anterior part of the sperm head. [NIH]

Acrosome Reaction: Changes that occur to liberate the enzymes of the acrosome of spermatozoa that allow the entry of a spermatozoon into the ovum. [NIH]

Adjustment: The dynamic process wherein the thoughts, feelings, behavior, and biophysiological mechanisms of the individual continually change to adjust to the environment. [NIH]

Adolescence: The period of life beginning with the appearance of secondary sex characteristics and terminating with the cessation of somatic growth. The years usually referred to as adolescence lie between 13 and 18 years of age. [NIH]

Adrenal Cortex: The outer layer of the adrenal gland. It secretes mineralocorticoids, androgens, and glucocorticoids. [NIH]

Adverse Effect: An unwanted side effect of treatment. [NIH]

Age Factors: Age as a constituent element or influence contributing to the production of a result. It may be applicable to the cause or the effect of a circumstance. It is used with human or animal concepts but should be differentiated from aging, a physiological process, and time factors which refers only to the passage of time. [NIH]

Ageing: A physiological or morphological change in the life of an organism or its parts, generally irreversible and typically associated with a decline in growth and reproductive vigor. [NIH]

Albumin: 1. Any protein that is soluble in water and moderately concentrated salt solutions and is coagulable by heat. 2. Serum albumin; the major plasma protein (approximately 60 per cent of the total), which is responsible for much of the plasma colloidal osmotic pressure and serves as a transport protein carrying large organic anions, such as fatty acids, bilirubin, and many drugs, and also carrying certain hormones, such as cortisol and thyroxine, when their specific binding globulins are saturated. Albumin is synthesized in the liver. Low serum levels occur in protein malnutrition, active inflammation and serious hepatic and renal disease. [EU]

Alcoholic Beverages: Drinkable liquids containing ethanol. [NIH]

Alertness: A state of readiness to detect and respond to certain specified small changes occurring at random intervals in the environment. [NIH]

Algorithms: A procedure consisting of a sequence of algebraic formulas and/or logical steps to calculate or determine a given task. [NIH]

Alpha Particles: Positively charged particles composed of two protons and two neutrons, i.e., helium nuclei, emitted during disintegration of very heavy isotopes; a beam of alpha particles or an alpha ray has very strong ionizing power, but weak penetrability. [NIH]

Alternative medicine: Practices not generally recognized by the medical community as standard or conventional medical approaches and used instead of standard treatments. Alternative medicine includes the taking of dietary supplements, megadose vitamins, and herbal preparations; the drinking of special teas; and practices such as massage therapy, magnet therapy, spiritual healing, and meditation. [NIH]

Amenorrhea: Absence of menstruation. [NIH]

Amino acid: Any organic compound containing an amino (-NH₂) and a carboxyl (-COOH) group. The 20 α-amino acids listed in the accompanying table are the amino acids from which proteins are synthesized by formation of peptide bonds during ribosomal translation of messenger RNA; all except glycine, which is not optically active, have the L configuration. Other amino acids occurring in proteins, such as hydroxyproline in collagen, are formed by posttranslational enzymatic modification of amino acids residues in polypeptide chains. There are also several important amino acids, such as the neurotransmitter γ-aminobutyric acid, that have no relation to proteins. Abbreviated AA. [EU]

Amino Acid Sequence: The order of amino acids as they occur in a polypeptide chain. This is referred to as the primary structure of proteins. It is of fundamental importance in determining protein conformation. [NIH]

Amyloid: A general term for a variety of different proteins that accumulate as extracellular fibrils of 7-10 nm and have common structural features, including a beta-pleated sheet conformation and the ability to bind such dyes as Congo red and thioflavine (Kandel, Schwartz, and Jessel, Principles of Neural Science, 3rd ed). [NIH]

Anaesthesia: Loss of feeling or sensation. Although the term is used for loss of tactile sensibility, or of any of the other senses, it is applied especially to loss of the sensation of pain, as it is induced to permit performance of surgery or other painful procedures. [EU]

Anal: Having to do with the anus, which is the posterior opening of the large bowel. [NIH]

Analgesic: An agent that alleviates pain without causing loss of consciousness. [EU]

Analog: In chemistry, a substance that is similar, but not identical, to another. [NIH]

Anatomical: Pertaining to anatomy, or to the structure of the organism. [EU]

Androgen-Binding Protein: Carrier proteins produced in the Sertoli cells of the testis, secreted into the seminiferous tubules, and transported via the efferent ducts to the epididymis. They participate in the transport of androgens. Androgen-binding protein has the same amino acid sequence as sex hormone binding-globulin. They differ by their sites of synthesis and post-translational oligosaccharide modifications. [NIH]

Androgenic: Producing masculine characteristics. [EU]

Androgens: A class of sex hormones associated with the development and maintenance of the secondary male sex characteristics, sperm induction, and sexual differentiation. In addition to increasing virility and libido, they also increase nitrogen and water retention and stimulate skeletal growth. [NIH]

Anemia: A reduction in the number of circulating erythrocytes or in the quantity of

hemoglobin. [NIH]

Anesthesia: A state characterized by loss of feeling or sensation. This depression of nerve function is usually the result of pharmacologic action and is induced to allow performance of surgery or other painful procedures. [NIH]

Angiogenesis: Blood vessel formation. Tumor angiogenesis is the growth of blood vessels from surrounding tissue to a solid tumor. This is caused by the release of chemicals by the tumor. [NIH]

Animal model: An animal with a disease either the same as or like a disease in humans. Animal models are used to study the development and progression of diseases and to test new treatments before they are given to humans. Animals with transplanted human cancers or other tissues are called xenograft models. [NIH]

Anthropology: The science devoted to the comparative study of man. [NIH]

Antibiotic: A drug used to treat infections caused by bacteria and other microorganisms. [NIH]

Antibodies: Immunoglobulin molecules having a specific amino acid sequence by virtue of which they interact only with the antigen that induced their synthesis in cells of the lymphoid series (especially plasma cells), or with an antigen closely related to it. [NIH]

Antibody: A type of protein made by certain white blood cells in response to a foreign substance (antigen). Each antibody can bind to only a specific antigen. The purpose of this binding is to help destroy the antigen. Antibodies can work in several ways, depending on the nature of the antigen. Some antibodies destroy antigens directly. Others make it easier for white blood cells to destroy the antigen. [NIH]

Anticonvulsants: Drugs used to prevent seizures or reduce their severity. [NIH]

Antiepileptic: An agent that combats epilepsy. [EU]

Antigen: Any substance which is capable, under appropriate conditions, of inducing a specific immune response and of reacting with the products of that response, that is, with specific antibody or specifically sensitized T-lymphocytes, or both. Antigens may be soluble substances, such as toxins and foreign proteins, or particulate, such as bacteria and tissue cells; however, only the portion of the protein or polysaccharide molecule known as the antigenic determinant (q.v.) combines with antibody or a specific receptor on a lymphocyte. Abbreviated Ag. [EU]

Anti-inflammatory: Having to do with reducing inflammation. [NIH]

Anti-Inflammatory Agents: Substances that reduce or suppress inflammation. [NIH]

Antiviral: Destroying viruses or suppressing their replication. [EU]

Anus: The opening of the rectum to the outside of the body. [NIH]

Anxiety: Persistent feeling of dread, apprehension, and impending disaster. [NIH]

Apheresis: Components being separated out, as leukapheresis, plasmapheresis, plateletpheresis. [NIH]

Aphthous Stomatitis: Inflammation of the mucous membrane of the mouth. [NIH]

Applicability: A list of the commodities to which the candidate method can be applied as presented or with minor modifications. [NIH]

Aqueous: Having to do with water. [NIH]

Arterial: Pertaining to an artery or to the arteries. [EU]

Arteries: The vessels carrying blood away from the heart. [NIH]

Artery: Vessel-carrying blood from the heart to various parts of the body. [NIH]

Aseptic: Free from infection or septic material; sterile. [EU]

Aspirin: A drug that reduces pain, fever, inflammation, and blood clotting. Aspirin belongs to the family of drugs called nonsteroidal anti-inflammatory agents. It is also being studied in cancer prevention. [NIH]

Asymptomatic: Having no signs or symptoms of disease. [NIH]

Autodigestion: Autolysis; a condition found in disease of the stomach: the stomach wall is digested by the gastric juice. [NIH]

Autoimmune disease: A condition in which the body recognizes its own tissues as foreign and directs an immune response against them. [NIH]

Azoospermia: Absence of spermatozoa in the semen, or failure of formation of spermatozoa. [EU]

Bacteria: Unicellular prokaryotic microorganisms which generally possess rigid cell walls, multiply by cell division, and exhibit three principal forms: round or coccid, rodlike or bacillary, and spiral or spirochetal. [NIH]

Barbiturate: A drug with sedative and hypnotic effects. Barbiturates have been used as sedatives and anesthetics, and they have been used to treat the convulsions associated with epilepsy. [NIH]

Base: In chemistry, the nonacid part of a salt; a substance that combines with acids to form salts; a substance that dissociates to give hydroxide ions in aqueous solutions; a substance whose molecule or ion can combine with a proton (hydrogen ion); a substance capable of donating a pair of electrons (to an acid) for the formation of a coordinate covalent bond. [EU]

Basement Membrane: Ubiquitous supportive tissue adjacent to epithelium and around smooth and striated muscle cells. This tissue contains intrinsic macromolecular components such as collagen, laminin, and sulfated proteoglycans. As seen by light microscopy one of its subdivisions is the basal (basement) lamina. [NIH]

Beta blocker: A drug used to slow the heart rate and reduce pressure inside blood vessels. It also can regulate heart rhythm. [NIH]

Bewilderment: Impairment or loss of will power. [NIH]

Bile: An emulsifying agent produced in the liver and secreted into the duodenum. Its composition includes bile acids and salts, cholesterol, and electrolytes. It aids digestion of fats in the duodenum. [NIH]

Biliary: Having to do with the liver, bile ducts, and/or gallbladder. [NIH]

Biliary Tract: The gallbladder and its ducts. [NIH]

Bioavailability: The degree to which a drug or other substance becomes available to the target tissue after administration. [EU]

Biological Transport: The movement of materials (including biochemical substances and drugs) across cell membranes and epithelial layers, usually by passive diffusion. [NIH]

Biopsy: Removal and pathologic examination of specimens in the form of small pieces of tissue from the living body. [NIH]

Biosynthesis: The building up of a chemical compound in the physiologic processes of a living organism. [EU]

Bladder: The organ that stores urine. [NIH]

Blastocyst: The mammalian embryo in the post-morula stage in which a fluid-filled cavity, enclosed primarily by trophoblast, contains an inner cell mass which becomes the embryonic disc. [NIH]

Bloating: Fullness or swelling in the abdomen that often occurs after meals. [NIH]

Blood Cell Count: A count of the number of leukocytes and erythrocytes per unit volume in a sample of venous blood. A complete blood count (CBC) also includes measurement of the hemoglobin, hematocrit, and erythrocyte indices. [NIH]

Blood Glucose: Glucose in blood. [NIH]

Blood pressure: The pressure of blood against the walls of a blood vessel or heart chamber. Unless there is reference to another location, such as the pulmonary artery or one of the heart chambers, it refers to the pressure in the systemic arteries, as measured, for example, in the forearm. [NIH]

Blood transfusion: The administration of blood or blood products into a blood vessel. [NIH]

Blood vessel: A tube in the body through which blood circulates. Blood vessels include a network of arteries, arterioles, capillaries, venules, and veins. [NIH]

Body Fluids: Liquid components of living organisms. [NIH]

Bone Marrow: The soft tissue filling the cavities of bones. Bone marrow exists in two types, yellow and red. Yellow marrow is found in the large cavities of large bones and consists mostly of fat cells and a few primitive blood cells. Red marrow is a hematopoietic tissue and is the site of production of erythrocytes and granular leukocytes. Bone marrow is made up of a framework of connective tissue containing branching fibers with the frame being filled with marrow cells. [NIH]

Bone scan: A technique to create images of bones on a computer screen or on film. A small amount of radioactive material is injected into a blood vessel and travels through the bloodstream; it collects in the bones and is detected by a scanner. [NIH]

Bowel: The long tube-shaped organ in the abdomen that completes the process of digestion. There is both a small and a large bowel. Also called the intestine. [NIH]

Bowel Movement: Body wastes passed through the rectum and anus. [NIH]

Brachytherapy: A collective term for interstitial, intracavity, and surface radiotherapy. It uses small sealed or partly-sealed sources that may be placed on or near the body surface or within a natural body cavity or implanted directly into the tissues. [NIH]

Brain Injuries: Acute and chronic injuries to the brain, including the cerebral hemispheres, cerebellum, and brain stem. Clinical manifestations depend on the nature of injury. Diffuse trauma to the brain is frequently associated with diffuse axonal injury or coma, post-traumatic. Localized injuries may be associated with neurobehavioral manifestations; hemiparesis, or other focal neurologic deficits. [NIH]

Brain Stem: The part of the brain that connects the cerebral hemispheres with the spinal cord. It consists of the mesencephalon, pons, and medulla oblongata. [NIH]

Branch: Most commonly used for branches of nerves, but applied also to other structures. [NIH]

Breast Feeding: The nursing of an infant at the mother's breast. [NIH]

Breast Self-Examination: The inspection of one's breasts, usually for signs of disease, especially neoplastic disease. [NIH]

Buccal: Pertaining to or directed toward the cheek. In dental anatomy, used to refer to the buccal surface of a tooth. [EU]

Capsules: Hard or soft soluble containers used for the oral administration of medicine. [NIH]

Carbamazepine: An anticonvulsant used to control grand mal and psychomotor or focal seizures. Its mode of action is not fully understood, but some of its actions resemble those of phenytoin; although there is little chemical resemblance between the two compounds, their

three-dimensional structure is similar. [NIH]

Carbohydrate: An aldehyde or ketone derivative of a polyhydric alcohol, particularly of the pentahydric and hexahydric alcohols. They are so named because the hydrogen and oxygen are usually in the proportion to form water, $(\text{CH}_2\text{O})_n$. The most important carbohydrates are the starches, sugars, celluloses, and gums. They are classified into mono-, di-, tri-, poly- and heterosaccharides. [EU]

Carcinogenic: Producing carcinoma. [EU]

Carcinoma: Cancer that begins in the skin or in tissues that line or cover internal organs. [NIH]

Cardiac: Having to do with the heart. [NIH]

Cardiovascular: Having to do with the heart and blood vessels. [NIH]

Cardiovascular disease: Any abnormal condition characterized by dysfunction of the heart and blood vessels. CVD includes atherosclerosis (especially coronary heart disease, which can lead to heart attacks), cerebrovascular disease (e.g., stroke), and hypertension (high blood pressure). [NIH]

Case report: A detailed report of the diagnosis, treatment, and follow-up of an individual patient. Case reports also contain some demographic information about the patient (for example, age, gender, ethnic origin). [NIH]

Case series: A group or series of case reports involving patients who were given similar treatment. Reports of case series usually contain detailed information about the individual patients. This includes demographic information (for example, age, gender, ethnic origin) and information on diagnosis, treatment, response to treatment, and follow-up after treatment. [NIH]

Catalyze: To speed up a chemical reaction. [EU]

Catheter: A flexible tube used to deliver fluids into or withdraw fluids from the body. [NIH]

Caudal: Denoting a position more toward the cauda, or tail, than some specified point of reference; same as inferior, in human anatomy. [EU]

Cell: The individual unit that makes up all of the tissues of the body. All living things are made up of one or more cells. [NIH]

Cell Differentiation: Progressive restriction of the developmental potential and increasing specialization of function which takes place during the development of the embryo and leads to the formation of specialized cells, tissues, and organs. [NIH]

Cell Division: The fission of a cell. [NIH]

Cellulose: A polysaccharide with glucose units linked as in cellobiose. It is the chief constituent of plant fibers, cotton being the purest natural form of the substance. As a raw material, it forms the basis for many derivatives used in chromatography, ion exchange materials, explosives manufacturing, and pharmaceutical preparations. [NIH]

Central Nervous System: The main information-processing organs of the nervous system, consisting of the brain, spinal cord, and meninges. [NIH]

Central Nervous System Infections: Pathogenic infections of the brain, spinal cord, and meninges. DNA virus infections; RNA virus infections; bacterial infections; mycoplasma infections; Spirochaetales infections; fungal infections; protozoan infections; helminthiasis; and prion diseases may involve the central nervous system as a primary or secondary process. [NIH]

Centrifugation: A method of separating organelles or large molecules that relies upon differential sedimentation through a preformed density gradient under the influence of a

gravitational field generated in a centrifuge. [NIH]

Cerebral: Of or pertaining of the cerebrum or the brain. [EU]

Cerebral hemispheres: The two halves of the cerebrum, the part of the brain that controls muscle functions of the body and also controls speech, emotions, reading, writing, and learning. The right hemisphere controls muscle movement on the left side of the body, and the left hemisphere controls muscle movement on the right side of the body. [NIH]

Cerebrovascular: Pertaining to the blood vessels of the cerebrum, or brain. [EU]

Cerebrum: The largest part of the brain. It is divided into two hemispheres, or halves, called the cerebral hemispheres. The cerebrum controls muscle functions of the body and also controls speech, emotions, reading, writing, and learning. [NIH]

Cervical: Relating to the neck, or to the neck of any organ or structure. Cervical lymph nodes are located in the neck; cervical cancer refers to cancer of the uterine cervix, which is the lower, narrow end (the "neck") of the uterus. [NIH]

Cervix: The lower, narrow end of the uterus that forms a canal between the uterus and vagina. [NIH]

Chemotherapy: Treatment with anticancer drugs. [NIH]

Chimeric Proteins: Proteins in individuals that are derived from genetically different zygotes. [NIH]

Chin: The anatomical frontal portion of the mandible, also known as the mentum, that contains the line of fusion of the two separate halves of the mandible (symphysis menti). This line of fusion divides inferiorly to enclose a triangular area called the mental protuberance. On each side, inferior to the second premolar tooth, is the mental foramen for the passage of blood vessels and a nerve. [NIH]

Chromatin: The material of chromosomes. It is a complex of DNA, histones, and nonhistone proteins (chromosomal proteins, non-histone) found within the nucleus of a cell. [NIH]

Chromosome: Part of a cell that contains genetic information. Except for sperm and eggs, all human cells contain 46 chromosomes. [NIH]

Chronic: A disease or condition that persists or progresses over a long period of time. [NIH]

CIS: Cancer Information Service. The CIS is the National Cancer Institute's link to the public, interpreting and explaining research findings in a clear and understandable manner, and providing personalized responses to specific questions about cancer. Access the CIS by calling 1-800-4-CANCER, or by using the Web site at <http://cis.nci.nih.gov>. [NIH]

Clinical study: A research study in which patients receive treatment in a clinic or other medical facility. Reports of clinical studies can contain results for single patients (case reports) or many patients (case series or clinical trials). [NIH]

Clinical trial: A research study that tests how well new medical treatments or other interventions work in people. Each study is designed to test new methods of screening, prevention, diagnosis, or treatment of a disease. [NIH]

Clonic: Pertaining to or of the nature of clonus. [EU]

Coagulation: 1. The process of clot formation. 2. In colloid chemistry, the solidification of a sol into a gelatinous mass; an alteration of a disperse phase or of a dissolved solid which causes the separation of the system into a liquid phase and an insoluble mass called the clot or curd. Coagulation is usually irreversible. 3. In surgery, the disruption of tissue by physical means to form an amorphous residuum, as in electrocoagulation and photocoagulation. [EU]

Coenzymes: Substances that are necessary for the action or enhancement of action of an enzyme. Many vitamins are coenzymes. [NIH]

Cofactor: A substance, microorganism or environmental factor that activates or enhances the action of another entity such as a disease-causing agent. [NIH]

Coitus: Sexual intercourse. [NIH]

Coitus Interruptus: A contraceptive method whereby coitus is purposely interrupted in order to prevent ejaculation of semen into the vagina. [NIH]

Colon: The long, coiled, tubelike organ that removes water from digested food. The remaining material, solid waste called stool, moves through the colon to the rectum and leaves the body through the anus. [NIH]

Colposcopy: The examination, therapy or surgery of the cervix and vagina by means of a specially designed endoscope introduced vaginally. [NIH]

Combination Therapy: Association of 3 drugs to treat AIDS (AZT + DDC or DDI + protease inhibitor). [NIH]

Complement: A term originally used to refer to the heat-labile factor in serum that causes immune cytolysis, the lysis of antibody-coated cells, and now referring to the entire functionally related system comprising at least 20 distinct serum proteins that is the effector not only of immune cytolysis but also of other biologic functions. Complement activation occurs by two different sequences, the classic and alternative pathways. The proteins of the classic pathway are termed 'components of complement' and are designated by the symbols C1 through C9. C1 is a calcium-dependent complex of three distinct proteins C1q, C1r and C1s. The proteins of the alternative pathway (collectively referred to as the properdin system) and complement regulatory proteins are known by semisystematic or trivial names. Fragments resulting from proteolytic cleavage of complement proteins are designated with lower-case letter suffixes, e.g., C3a. Inactivated fragments may be designated with the suffix 'i', e.g. C3bi. Activated components or complexes with biological activity are designated by a bar over the symbol e.g. C1 or C4b,2a. The classic pathway is activated by the binding of C1 to classic pathway activators, primarily antigen-antibody complexes containing IgM, IgG1, IgG3; C1q binds to a single IgM molecule or two adjacent IgG molecules. The alternative pathway can be activated by IgA immune complexes and also by nonimmunologic materials including bacterial endotoxins, microbial polysaccharides, and cell walls. Activation of the classic pathway triggers an enzymatic cascade involving C1, C4, C2 and C3; activation of the alternative pathway triggers a cascade involving C3 and factors B, D and P. Both result in the cleavage of C5 and the formation of the membrane attack complex. Complement activation also results in the formation of many biologically active complement fragments that act as anaphylatoxins, opsonins, or chemotactic factors. [EU]

Complementary and alternative medicine: CAM. Forms of treatment that are used in addition to (complementary) or instead of (alternative) standard treatments. These practices are not considered standard medical approaches. CAM includes dietary supplements, megadose vitamins, herbal preparations, special teas, massage therapy, magnet therapy, spiritual healing, and meditation. [NIH]

Complementary medicine: Practices not generally recognized by the medical community as standard or conventional medical approaches and used to enhance or complement the standard treatments. Complementary medicine includes the taking of dietary supplements, megadose vitamins, and herbal preparations; the drinking of special teas; and practices such as massage therapy, magnet therapy, spiritual healing, and meditation. [NIH]

Compliance: Distensibility measure of a chamber such as the lungs (lung compliance) or bladder. Compliance is expressed as a change in volume per unit change in pressure. [NIH]

Computational Biology: A field of biology concerned with the development of techniques for the collection and manipulation of biological data, and the use of such data to make biological discoveries or predictions. This field encompasses all computational methods and theories applicable to molecular biology and areas of computer-based techniques for solving biological problems including manipulation of models and datasets. [NIH]

Conception: The onset of pregnancy, marked by implantation of the blastocyst; the formation of a viable zygote. [EU]

Condoms: A sheath that is worn over the penis during sexual behavior in order to prevent pregnancy or spread of sexually transmitted disease. [NIH]

Cone: One of the special retinal receptor elements which are presumed to be primarily concerned with perception of light and color stimuli when the eye is adapted to light. [NIH]

Confusion: A mental state characterized by bewilderment, emotional disturbance, lack of clear thinking, and perceptual disorientation. [NIH]

Conjugated: Acting or operating as if joined; simultaneous. [EU]

Connective Tissue: Tissue that supports and binds other tissues. It consists of connective tissue cells embedded in a large amount of extracellular matrix. [NIH]

Connective Tissue: Tissue that supports and binds other tissues. It consists of connective tissue cells embedded in a large amount of extracellular matrix. [NIH]

Contraception: Use of agents, devices, methods, or procedures which diminish the likelihood of or prevent conception. [NIH]

Contraceptive: An agent that diminishes the likelihood of or prevents conception. [EU]

Contraindications: Any factor or sign that it is unwise to pursue a certain kind of action or treatment, e. g. giving a general anesthetic to a person with pneumonia. [NIH]

Coronary: Encircling in the manner of a crown; a term applied to vessels; nerves, ligaments, etc. The term usually denotes the arteries that supply the heart muscle and, by extension, a pathologic involvement of them. [EU]

Coronary heart disease: A type of heart disease caused by narrowing of the coronary arteries that feed the heart, which needs a constant supply of oxygen and nutrients carried by the blood in the coronary arteries. When the coronary arteries become narrowed or clogged by fat and cholesterol deposits and cannot supply enough blood to the heart, CHD results. [NIH]

Coronary Thrombosis: Presence of a thrombus in a coronary artery, often causing a myocardial infarction. [NIH]

Corpus: The body of the uterus. [NIH]

Corpus Luteum: The yellow glandular mass formed in the ovary by an ovarian follicle that has ruptured and discharged its ovum. [NIH]

Cortex: The outer layer of an organ or other body structure, as distinguished from the internal substance. [EU]

Cortical: Pertaining to or of the nature of a cortex or bark. [EU]

Corticosteroids: Hormones that have antitumor activity in lymphomas and lymphoid leukemias; in addition, corticosteroids (steroids) may be used for hormone replacement and for the management of some of the complications of cancer and its treatment. [NIH]

Cortisol: A steroid hormone secreted by the adrenal cortex as part of the body's response to stress. [NIH]

Cranial: Pertaining to the cranium, or to the anterior (in animals) or superior (in humans)

end of the body. [EU]

Craniocerebral Trauma: Traumatic injuries involving the cranium and intracranial structures (i.e., brain; cranial nerves; meninges; and other structures). Injuries may be classified by whether or not the skull is penetrated (i.e., penetrating vs. nonpenetrating) or whether there is an associated hemorrhage. [NIH]

Creatinine: A compound that is excreted from the body in urine. Creatinine levels are measured to monitor kidney function. [NIH]

Cryotherapy: Any method that uses cold temperature to treat disease. [NIH]

Curative: Tending to overcome disease and promote recovery. [EU]

Cutaneous: Having to do with the skin. [NIH]

Cyproterone: An anti-androgen that, in the form of its acetate, also has progestational properties. It is used in the treatment of hypersexuality in males, as a palliative in prostatic carcinoma, and, in combination with estrogen, for the therapy of severe acne and hirsutism in females. [NIH]

Cytokine: Small but highly potent protein that modulates the activity of many cell types, including T and B cells. [NIH]

Cytoplasm: The protoplasm of a cell exclusive of that of the nucleus; it consists of a continuous aqueous solution (cytosol) and the organelles and inclusions suspended in it (phaneroplasm), and is the site of most of the chemical activities of the cell. [EU]

Databases, Bibliographic: Extensive collections, reputedly complete, of references and citations to books, articles, publications, etc., generally on a single subject or specialized subject area. Databases can operate through automated files, libraries, or computer disks. The concept should be differentiated from factual databases which is used for collections of data and facts apart from bibliographic references to them. [NIH]

Decorum: Propriety and good taste especially in conduct, manners, or appearance. [EU]

Degenerative: Undergoing degeneration : tending to degenerate; having the character of or involving degeneration; causing or tending to cause degeneration. [EU]

Dendrites: Extensions of the nerve cell body. They are short and branched and receive stimuli from other neurons. [NIH]

Diabetes Insipidus: A metabolic disorder due to disorders in the production or release of vasopressin. It is characterized by the chronic excretion of large amounts of low specific gravity urine and great thirst. [NIH]

Diabetes Mellitus: A heterogeneous group of disorders that share glucose intolerance in common. [NIH]

Diabetic Retinopathy: Retinopathy associated with diabetes mellitus, which may be of the background type, progressively characterized by microaneurysms, interretinal punctuate macular edema, or of the proliferative type, characterized by neovascularization of the retina and optic disk, which may project into the vitreous, proliferation of fibrous tissue, vitreous hemorrhage, and retinal detachment. [NIH]

Diagnostic procedure: A method used to identify a disease. [NIH]

Diaphragm: The musculofibrous partition that separates the thoracic cavity from the abdominal cavity. Contraction of the diaphragm increases the volume of the thoracic cavity aiding inspiration. [NIH]

Diastolic: Of or pertaining to the diastole. [EU]

Diencephalon: The paired caudal parts of the prosencephalon from which the thalamus, hypothalamus, epithalamus, and subthalamus are derived. [NIH]

Diffuse Axonal Injury: A relatively common sequela of blunt head injury, characterized by a global disruption of axons throughout the brain. Associated clinical features may include neurobehavioral manifestations; persistent vegetative state; dementia; and other disorders. [NIH]

Diffusion: The tendency of a gas or solute to pass from a point of higher pressure or concentration to a point of lower pressure or concentration and to distribute itself throughout the available space; a major mechanism of biological transport. [NIH]

Digestion: The process of breakdown of food for metabolism and use by the body. [NIH]

Digestive system: The organs that take in food and turn it into products that the body can use to stay healthy. Waste products the body cannot use leave the body through bowel movements. The digestive system includes the salivary glands, mouth, esophagus, stomach, liver, pancreas, gallbladder, small and large intestines, and rectum. [NIH]

Dihydrotestosterone: Anabolic agent. [NIH]

Dilatation: The act of dilating. [NIH]

Diploid: Having two sets of chromosomes. [NIH]

Direct: 1. Straight; in a straight line. 2. Performed immediately and without the intervention of subsidiary means. [EU]

Discrimination: The act of qualitative and/or quantitative differentiation between two or more stimuli. [NIH]

Disease Progression: The worsening of a disease over time. This concept is most often used for chronic and incurable diseases where the stage of the disease is an important determinant of therapy and prognosis. [NIH]

Disorientation: The loss of proper bearings, or a state of mental confusion as to time, place, or identity. [EU]

Diuretic: A drug that increases the production of urine. [NIH]

Dizziness: An imprecise term which may refer to a sense of spatial disorientation, motion of the environment, or lightheadedness. [NIH]

Dosage Forms: Completed forms of the pharmaceutical preparation in which prescribed doses of medication are included. They are designed to resist action by gastric fluids, prevent vomiting and nausea, reduce or alleviate the undesirable taste and smells associated with oral administration, achieve a high concentration of drug at target site, or produce a delayed or long-acting drug effect. They include capsules, liniments, ointments, pharmaceutical solutions, powders, tablets, etc. [NIH]

Dose-dependent: Refers to the effects of treatment with a drug. If the effects change when the dose of the drug is changed, the effects are said to be dose dependent. [NIH]

Douche: A procedure in which water or a medicated solution is used to clean the vagina and cervix. [NIH]

Doxycycline: A synthetic tetracycline derivative with a range of antimicrobial activity and mode of action similar to that of tetracycline, but more effective against many species. Animal studies suggest that it may cause less tooth staining than other tetracyclines. [NIH]

Drive: A state of internal activity of an organism that is a necessary condition before a given stimulus will elicit a class of responses; e.g., a certain level of hunger (drive) must be present before food will elicit an eating response. [NIH]

Drug Interactions: The action of a drug that may affect the activity, metabolism, or toxicity of another drug. [NIH]

Drug Tolerance: Progressive diminution of the susceptibility of a human or animal to the

effects of a drug, resulting from its continued administration. It should be differentiated from drug resistance wherein an organism, disease, or tissue fails to respond to the intended effectiveness of a chemical or drug. It should also be differentiated from maximum tolerated dose and no-observed-adverse-effect level. [NIH]

Duct: A tube through which body fluids pass. [NIH]

Duodenum: The first part of the small intestine. [NIH]

Dyspareunia: Painful sexual intercourse. [NIH]

Dysplasia: Cells that look abnormal under a microscope but are not cancer. [NIH]

Dyspnea: Difficult or labored breathing. [NIH]

Ectopic: Pertaining to or characterized by ectopia. [EU]

Ectopic Pregnancy: The pregnancy occurring elsewhere than in the cavity of the uterus. [NIH]

Edema: Excessive amount of watery fluid accumulated in the intercellular spaces, most commonly present in subcutaneous tissue. [NIH]

Efficacy: The extent to which a specific intervention, procedure, regimen, or service produces a beneficial result under ideal conditions. Ideally, the determination of efficacy is based on the results of a randomized control trial. [NIH]

Ejaculation: The release of semen through the penis during orgasm. [NIH]

Elastic: Susceptible of resisting and recovering from stretching, compression or distortion applied by a force. [EU]

Elective: Subject to the choice or decision of the patient or physician; applied to procedures that are advantageous to the patient but not urgent. [EU]

Electrolytes: Substances that break up into ions (electrically charged particles) when they are dissolved in body fluids or water. Some examples are sodium, potassium, chloride, and calcium. Electrolytes are primarily responsible for the movement of nutrients into cells, and the movement of wastes out of cells. [NIH]

Electrons: Stable elementary particles having the smallest known negative charge, present in all elements; also called negatrons. Positively charged electrons are called positrons. The numbers, energies and arrangement of electrons around atomic nuclei determine the chemical identities of elements. Beams of electrons are called cathode rays or beta rays, the latter being a high-energy biproduct of nuclear decay. [NIH]

Embryo: The prenatal stage of mammalian development characterized by rapid morphological changes and the differentiation of basic structures. [NIH]

Embryo Transfer: Removal of a mammalian embryo from one environment and replacement in the same or a new environment. The embryo is usually in the pre-implantation phase, i.e., a blastocyst. The process includes embryo or blastocyst transplantation or transfer after in vitro fertilization and transfer of the inner cell mass of the blastocyst. It is not used for transfer of differentiated embryonic tissue, e.g., germ layer cells. [NIH]

Enanthate: An oily injectable contraceptive given every 8 weeks. [NIH]

Endemic: Present or usually prevalent in a population or geographical area at all times; said of a disease or agent. Called also endemial. [EU]

Endocrinology: A subspecialty of internal medicine concerned with the metabolism, physiology, and disorders of the endocrine system. [NIH]

Endometrial: Having to do with the endometrium (the layer of tissue that lines the uterus). [NIH]

Endometriosis: A condition in which tissue more or less perfectly resembling the uterine mucous membrane (the endometrium) and containing typical endometrial granular and stromal elements occurs aberrantly in various locations in the pelvic cavity. [NIH]

Endometrium: The layer of tissue that lines the uterus. [NIH]

Endopeptidases: A subclass of peptide hydrolases. They are classified primarily by their catalytic mechanism. Specificity is used only for identification of individual enzymes. They comprise the serine endopeptidases, EC 3.4.21; cysteine endopeptidases, EC 3.4.22; aspartic endopeptidases, EC 3.4.23, metalloendopeptidases, EC 3.4.24; and a group of enzymes yet to be assigned to any of the above sub-classes, EC 3.4.99. EC 3.4.-. [NIH]

Endoscope: A thin, lighted tube used to look at tissues inside the body. [NIH]

Environmental Health: The science of controlling or modifying those conditions, influences, or forces surrounding man which relate to promoting, establishing, and maintaining health. [NIH]

Enzyme: A protein that speeds up chemical reactions in the body. [NIH]

Epithelial: Refers to the cells that line the internal and external surfaces of the body. [NIH]

Epithelial Cells: Cells that line the inner and outer surfaces of the body. [NIH]

Epithelium: One or more layers of epithelial cells, supported by the basal lamina, which covers the inner or outer surfaces of the body. [NIH]

Erectile: The inability to get or maintain an erection for satisfactory sexual intercourse. Also called impotence. [NIH]

Erection: The condition of being made rigid and elevated; as erectile tissue when filled with blood. [EU]

Erythrocyte Indices: Quantification of size and cell hemoglobin content or concentration of the erythrocyte, usually derived from erythrocyte count, blood hemoglobin concentration, and hematocrit. Includes the mean cell volume (MCV), mean cell hemoglobin (MCH), and mean cell hemoglobin concentration (MCHC). Use also for cell diameter and thickness. [NIH]

Erythrocytes: Red blood cells. Mature erythrocytes are non-nucleated, biconcave disks containing hemoglobin whose function is to transport oxygen. [NIH]

Escalation: Progressive use of more harmful drugs. [NIH]

Esophagus: The muscular tube through which food passes from the throat to the stomach. [NIH]

Estradiol: The most potent mammalian estrogenic hormone. It is produced in the ovary, placenta, testis, and possibly the adrenal cortex. [NIH]

Estrogen: One of the two female sex hormones. [NIH]

Estrogen Replacement Therapy: The use of hormonal agents with estrogen-like activity in postmenopausal or other estrogen-deficient women to alleviate effects of hormone deficiency, such as vasomotor symptoms, dyspareunia, and progressive development of osteoporosis. This may also include the use of progestational agents in combination therapy. [NIH]

Ethanol: A clear, colorless liquid rapidly absorbed from the gastrointestinal tract and distributed throughout the body. It has bactericidal activity and is used often as a topical disinfectant. It is widely used as a solvent and preservative in pharmaceutical preparations as well as serving as the primary ingredient in alcoholic beverages. [NIH]

Eugenic: Tending to improve the genetic qualities of future generations. [NIH]

Euthanasia: The act or practice of putting to death people or animals suffering from incurable conditions or diseases. [NIH]

Exhaustion: The feeling of weariness of mind and body. [NIH]

Exogenous: Developed or originating outside the organism, as exogenous disease. [EU]

External-beam radiation: Radiation therapy that uses a machine to aim high-energy rays at the cancer. Also called external radiation. [NIH]

Extracellular: Outside a cell or cells. [EU]

Extracellular Matrix: A meshwork-like substance found within the extracellular space and in association with the basement membrane of the cell surface. It promotes cellular proliferation and provides a supporting structure to which cells or cell lysates in culture dishes adhere. [NIH]

Extracellular Space: Interstitial space between cells, occupied by fluid as well as amorphous and fibrous substances. [NIH]

Extremity: A limb; an arm or leg (membrum); sometimes applied specifically to a hand or foot. [EU]

Facial: Of or pertaining to the face. [EU]

Facial Nerve: The 7th cranial nerve. The facial nerve has two parts, the larger motor root which may be called the facial nerve proper, and the smaller intermediate or sensory root. Together they provide efferent innervation to the muscles of facial expression and to the lacrimal and salivary glands, and convey afferent information for taste from the anterior two-thirds of the tongue and for touch from the external ear. [NIH]

Fallopian tube: The oviduct, a muscular tube about 10 cm long, lying in the upper border of the broad ligament. [NIH]

Family Health: The health status of the family as a unit including the impact of the health of one member of the family on the family as a unit and on individual family members; also, the impact of family organization or disorganization on the health status of its members. [NIH]

Family Planning: Programs or services designed to assist the family in controlling reproduction by either improving or diminishing fertility. [NIH]

Fat: Total lipids including phospholipids. [NIH]

Fathers: Male parents, human or animal. [NIH]

Femoral: Pertaining to the femur, or to the thigh. [EU]

Femur: The longest and largest bone of the skeleton, it is situated between the hip and the knee. [NIH]

Fertilization in Vitro: Fertilization of an egg outside the body when the egg is normally fertilized in the body. [NIH]

Fetal Alcohol Syndrome: A disorder occurring in children born to alcoholic women who continue to drink heavily during pregnancy. Common abnormalities are growth deficiency (prenatal and postnatal), altered morphogenesis, mental deficiency, and characteristic facies - small eyes and flattened nasal bridge. Fine motor dysfunction and tremulousness are observed in the newborn. [NIH]

Fetus: The developing offspring from 7 to 8 weeks after conception until birth. [NIH]

Fibrosis: Any pathological condition where fibrous connective tissue invades any organ, usually as a consequence of inflammation or other injury. [NIH]

Flutamide: An antiandrogen with about the same potency as cyproterone in rodent and canine species. [NIH]

Forearm: The part between the elbow and the wrist. [NIH]

Friction: Surface resistance to the relative motion of one body against the rubbing, sliding, rolling, or flowing of another with which it is in contact. [NIH]

Fungi: A kingdom of eukaryotic, heterotrophic organisms that live as saprobes or parasites, including mushrooms, yeasts, smuts, molds, etc. They reproduce either sexually or asexually, and have life cycles that range from simple to complex. Filamentous fungi refer to those that grow as multicellular colonies (mushrooms and molds). [NIH]

Fungus: A general term used to denote a group of eukaryotic protists, including mushrooms, yeasts, rusts, moulds, smuts, etc., which are characterized by the absence of chlorophyll and by the presence of a rigid cell wall composed of chitin, mannans, and sometimes cellulose. They are usually of simple morphological form or show some reversible cellular specialization, such as the formation of pseudoparenchymatous tissue in the fruiting body of a mushroom. The dimorphic fungi grow, according to environmental conditions, as moulds or yeasts. [EU]

Gallbladder: The pear-shaped organ that sits below the liver. Bile is concentrated and stored in the gallbladder. [NIH]

Gamma Rays: Very powerful and penetrating, high-energy electromagnetic radiation of shorter wavelength than that of x-rays. They are emitted by a decaying nucleus, usually between 0.01 and 10 MeV. They are also called nuclear x-rays. [NIH]

Gas: Air that comes from normal breakdown of food. The gases are passed out of the body through the rectum (flatus) or the mouth (burp). [NIH]

Gastric: Having to do with the stomach. [NIH]

Gastrin: A hormone released after eating. Gastrin causes the stomach to produce more acid. [NIH]

Gelatin: A product formed from skin, white connective tissue, or bone collagen. It is used as a protein food adjuvant, plasma substitute, hemostatic, suspending agent in pharmaceutical preparations, and in the manufacturing of capsules and suppositories. [NIH]

Gene: The functional and physical unit of heredity passed from parent to offspring. Genes are pieces of DNA, and most genes contain the information for making a specific protein. [NIH]

Genital: Pertaining to the genitalia. [EU]

Germ Cells: The reproductive cells in multicellular organisms. [NIH]

Gestation: The period of development of the young in viviparous animals, from the time of fertilization of the ovum until birth. [EU]

Ginkgo biloba: Exclusive species of the genus Ginkgo, family Ginkgoaceae. It produces extracts of medicinal interest. Ginkgo may refer to the genus or species. [NIH]

Gland: An organ that produces and releases one or more substances for use in the body. Some glands produce fluids that affect tissues or organs. Others produce hormones or participate in blood production. [NIH]

Glucocorticoid: A compound that belongs to the family of compounds called corticosteroids (steroids). Glucocorticoids affect metabolism and have anti-inflammatory and immunosuppressive effects. They may be naturally produced (hormones) or synthetic (drugs). [NIH]

Glucose: D-Glucose. A primary source of energy for living organisms. It is naturally occurring and is found in fruits and other parts of plants in its free state. It is used therapeutically in fluid and nutrient replacement. [NIH]

Glucose tolerance: The power of the normal liver to absorb and store large quantities of glucose and the effectiveness of intestinal absorption of glucose. The glucose tolerance test is

a metabolic test of carbohydrate tolerance that measures active insulin, a hepatic function based on the ability of the liver to absorb glucose. The test consists of ingesting 100 grams of glucose into a fasting stomach; blood sugar should return to normal in 2 to 21 hours after ingestion. [NIH]

Glucose Tolerance Test: Determination of whole blood or plasma sugar in a fasting state before and at prescribed intervals (usually 1/2 hr, 1 hr, 3 hr, 4 hr) after taking a specified amount (usually 100 gm orally) of glucose. [NIH]

Glycoprotein: A protein that has sugar molecules attached to it. [NIH]

Gonad: A sex organ, such as an ovary or a testicle, which produces the gametes in most multicellular animals. [NIH]

Gonadal: Pertaining to a gonad. [EU]

Gonadorelin: A decapeptide hormone released by the hypothalamus. It stimulates the synthesis and secretion of both follicle-stimulating hormone (FSH) and luteinizing hormone (LH) from the pituitary gland. [NIH]

Gonadotropin: The water-soluble follicle stimulating substance, by some believed to originate in chorionic tissue, obtained from the serum of pregnant mares. It is used to supplement the action of estrogens. [NIH]

Gonorrhoea: Infection due to *Neisseria gonorrhoeae* transmitted sexually in most cases, but also by contact with infected exudates in neonatal children at birth, or by infants in households with infected inhabitants. It is marked in males by urethritis with pain and purulent discharge, but is commonly asymptomatic in females, although it may extend to produce suppurative salpingitis, oophoritis, tubo-ovarian abscess, and peritonitis. Bacteraemia occurs in both sexes, resulting in cutaneous lesions, arthritis, and rarely meningitis or endocarditis. Formerly called blennorrhagia and blennorrhoea. [EU]

Governing Board: The group in which legal authority is vested for the control of health-related institutions and organizations. [NIH]

Gp120: 120-kD HIV envelope glycoprotein which is involved in the binding of the virus to its membrane receptor, the CD4 molecule, found on the surface of certain cells in the body. [NIH]

Grade: The grade of a tumor depends on how abnormal the cancer cells look under a microscope and how quickly the tumor is likely to grow and spread. Grading systems are different for each type of cancer. [NIH]

Grafting: The operation of transfer of tissue from one site to another. [NIH]

Granulocytes: Leukocytes with abundant granules in the cytoplasm. They are divided into three groups: neutrophils, eosinophils, and basophils. [NIH]

Gravidity: Pregnancy; the condition of being pregnant, without regard to the outcome. [EU]

Growth: The progressive development of a living being or part of an organism from its earliest stage to maturity. [NIH]

Gynecology: A medical-surgical specialty concerned with the physiology and disorders primarily of the female genital tract, as well as female endocrinology and reproductive physiology. [NIH]

Haploid: An organism with one basic chromosome set, symbolized by n ; the normal condition of gametes in diploids. [NIH]

Harmony: Attribute of a product which gives rise to an overall pleasant sensation. This sensation is produced by the perception of the product components as olfactory, gustatory, tactile and kinaesthetic stimuli because they are present in suitable concentration ratios. [NIH]

Headache: Pain in the cranial region that may occur as an isolated and benign symptom or as a manifestation of a wide variety of conditions including subarachnoid hemorrhage; craniocerebral trauma; central nervous system infections; intracranial hypertension; and other disorders. In general, recurrent headaches that are not associated with a primary disease process are referred to as headache disorders (e.g., migraine). [NIH]

Headache Disorders: Common conditions characterized by persistent or recurrent headaches. Headache syndrome classification systems may be based on etiology (e.g., vascular headache, post-traumatic headaches, etc.), temporal pattern (e.g., cluster headache, paroxysmal hemicrania, etc.), and precipitating factors (e.g., cough headache). [NIH]

Health Behavior: Behaviors expressed by individuals to protect, maintain or promote their health status. For example, proper diet, and appropriate exercise are activities perceived to influence health status. Life style is closely associated with health behavior and factors influencing life style are socioeconomic, educational, and cultural. [NIH]

Heart attack: A seizure of weak or abnormal functioning of the heart. [NIH]

Hematocrit: Measurement of the volume of packed red cells in a blood specimen by centrifugation. The procedure is performed using a tube with graduated markings or with automated blood cell counters. It is used as an indicator of erythrocyte status in disease. For example, anemia shows a low hematocrit, polycythemia, high values. [NIH]

Hemiparesis: The weakness or paralysis affecting one side of the body. [NIH]

Hemoglobin: One of the fractions of glycosylated hemoglobin A1c. Glycosylated hemoglobin is formed when linkages of glucose and related monosaccharides bind to hemoglobin A and its concentration represents the average blood glucose level over the previous several weeks. HbA1c levels are used as a measure of long-term control of plasma glucose (normal, 4 to 6 percent). In controlled diabetes mellitus, the concentration of glycosylated hemoglobin A is within the normal range, but in uncontrolled cases the level may be 3 to 4 times the normal concentration. Generally, complications are substantially lower among patients with Hb levels of 7 percent or less than in patients with HbA1c levels of 9 percent or more. [NIH]

Hemorrhage: Bleeding or escape of blood from a vessel. [NIH]

Hepatic: Refers to the liver. [NIH]

Hepatitis: Inflammation of the liver and liver disease involving degenerative or necrotic alterations of hepatocytes. [NIH]

Heredity: 1. The genetic transmission of a particular quality or trait from parent to offspring. 2. The genetic constitution of an individual. [EU]

Hirsutism: Excess hair in females and children with an adult male pattern of distribution. The concept does not include hypertrichosis, which is localized or generalized excess hair. [NIH]

Hormonal: Pertaining to or of the nature of a hormone. [EU]

Hormone: A substance in the body that regulates certain organs. Hormones such as gastrin help in breaking down food. Some hormones come from cells in the stomach and small intestine. [NIH]

Hormone Replacement Therapy: Therapeutic use of hormones to alleviate the effects of hormone deficiency. [NIH]

Host: Any animal that receives a transplanted graft. [NIH]

Human papillomavirus: HPV. A virus that causes abnormal tissue growth (warts) and is often associated with some types of cancer. [NIH]

Hydrochlorothiazide: A thiazide diuretic often considered the prototypical member of this class. It reduces the reabsorption of electrolytes from the renal tubules. This results in increased excretion of water and electrolytes, including sodium, potassium, chloride, and magnesium. It has been used in the treatment of several disorders including edema, hypertension, diabetes insipidus, and hypoparathyroidism. [NIH]

Hydrogen: The first chemical element in the periodic table. It has the atomic symbol H, atomic number 1, and atomic weight 1. It exists, under normal conditions, as a colorless, odorless, tasteless, diatomic gas. Hydrogen ions are protons. Besides the common H1 isotope, hydrogen exists as the stable isotope deuterium and the unstable, radioactive isotope tritium. [NIH]

Hydrolysis: The process of cleaving a chemical compound by the addition of a molecule of water. [NIH]

Hyperandrogenism: A state characterized or caused by an excessive secretion of androgens by the adrenal cortex, ovaries, or testes. The clinical significance in males is negligible, so the term is used most commonly with reference to the female. The common manifestations in women are hirsutism and virilism. It is often caused by ovarian disease (particularly the polycystic ovary syndrome) and by adrenal diseases (particularly adrenal gland hyperfunction). [NIH]

Hypericum: Genus of perennial plants in the family Clusiaceae (Hypericaceae). Herbal and homeopathic preparations are used for depression, neuralgias, and a variety of other conditions. Contains flavonoids, glycosides, mucilage, tannins, and volatile oils (oils, essential). [NIH]

Hypertension: Persistently high arterial blood pressure. Currently accepted threshold levels are 140 mm Hg systolic and 90 mm Hg diastolic pressure. [NIH]

Hypertrichosis: Localized or generalized excess hair. The concept does not include hirsutism, which is excess hair in females and children with an adult male pattern of distribution. [NIH]

Hypnotic: A drug that acts to induce sleep. [EU]

Hypothalamus: Ventral part of the diencephalon extending from the region of the optic chiasm to the caudal border of the mammillary bodies and forming the inferior and lateral walls of the third ventricle. [NIH]

Hysterectomy: Excision of the uterus. [NIH]

Ibuprofen: A nonsteroidal anti-inflammatory agent with analgesic properties used in the therapy of rheumatism and arthritis. [NIH]

Id: The part of the personality structure which harbors the unconscious instinctive desires and strivings of the individual. [NIH]

Idiopathic: Describes a disease of unknown cause. [NIH]

Immune function: Production and action of cells that fight disease or infection. [NIH]

Immune response: The activity of the immune system against foreign substances (antigens). [NIH]

Immune Sera: Serum that contains antibodies. It is obtained from an animal that has been immunized either by antigen injection or infection with microorganisms containing the antigen. [NIH]

Immune system: The organs, cells, and molecules responsible for the recognition and disposal of foreign ("non-self") material which enters the body. [NIH]

Immunity: Nonsusceptibility to the invasive or pathogenic effects of foreign

microorganisms or to the toxic effect of antigenic substances. [NIH]

Immunization: Deliberate stimulation of the host's immune response. Active immunization involves administration of antigens or immunologic adjuvants. Passive immunization involves administration of immune sera or lymphocytes or their extracts (e.g., transfer factor, immune RNA) or transplantation of immunocompetent cell producing tissue (thymus or bone marrow). [NIH]

Immunodeficiency: The decreased ability of the body to fight infection and disease. [NIH]

Immunodeficiency syndrome: The inability of the body to produce an immune response. [NIH]

Immunogenic: Producing immunity; evoking an immune response. [EU]

Immunologic: The ability of the antibody-forming system to recall a previous experience with an antigen and to respond to a second exposure with the prompt production of large amounts of antibody. [NIH]

Immunosuppressive: Describes the ability to lower immune system responses. [NIH]

Impairment: In the context of health experience, an impairment is any loss or abnormality of psychological, physiological, or anatomical structure or function. [NIH]

Implant radiation: A procedure in which radioactive material sealed in needles, seeds, wires, or catheters is placed directly into or near the tumor. Also called [NIH]

Implantation: The insertion or grafting into the body of biological, living, inert, or radioactive material. [EU]

Impotence: The inability to perform sexual intercourse. [NIH]

In situ: In the natural or normal place; confined to the site of origin without invasion of neighbouring tissues. [EU]

In vitro: In the laboratory (outside the body). The opposite of in vivo (in the body). [NIH]

In vivo: In the body. The opposite of in vitro (outside the body or in the laboratory). [NIH]

Incision: A cut made in the body during surgery. [NIH]

Indinavir: A potent and specific HIV protease inhibitor that appears to have good oral bioavailability. [NIH]

Induction: The act or process of inducing or causing to occur, especially the production of a specific morphogenetic effect in the developing embryo through the influence of evocators or organizers, or the production of anaesthesia or unconsciousness by use of appropriate agents. [EU]

Infarction: A pathological process consisting of a sudden insufficient blood supply to an area, which results in necrosis of that area. It is usually caused by a thrombus, an embolus, or a vascular torsion. [NIH]

Infection: 1. Invasion and multiplication of microorganisms in body tissues, which may be clinically unapparent or result in local cellular injury due to competitive metabolism, toxins, intracellular replication, or antigen-antibody response. The infection may remain localized, subclinical, and temporary if the body's defensive mechanisms are effective. A local infection may persist and spread by extension to become an acute, subacute, or chronic clinical infection or disease state. A local infection may also become systemic when the microorganisms gain access to the lymphatic or vascular system. 2. An infectious disease. [EU]

Infertility: The diminished or absent ability to conceive or produce an offspring while sterility is the complete inability to conceive or produce an offspring. [NIH]

Inflammation: A pathological process characterized by injury or destruction of tissues

caused by a variety of cytologic and chemical reactions. It is usually manifested by typical signs of pain, heat, redness, swelling, and loss of function. [NIH]

Informed Consent: Voluntary authorization, given to the physician by the patient, with full comprehension of the risks involved, for diagnostic or investigative procedures and medical and surgical treatment. [NIH]

Infusion: A method of putting fluids, including drugs, into the bloodstream. Also called intravenous infusion. [NIH]

Ingestion: Taking into the body by mouth [NIH]

Initiation: Mutation induced by a chemical reactive substance causing cell changes; being a step in a carcinogenic process. [NIH]

Insomnia: Difficulty in going to sleep or getting enough sleep. [NIH]

Insulin: A protein hormone secreted by beta cells of the pancreas. Insulin plays a major role in the regulation of glucose metabolism, generally promoting the cellular utilization of glucose. It is also an important regulator of protein and lipid metabolism. Insulin is used as a drug to control insulin-dependent diabetes mellitus. [NIH]

Internal radiation: A procedure in which radioactive material sealed in needles, seeds, wires, or catheters is placed directly into or near the tumor. Also called brachytherapy, implant radiation, or interstitial radiation therapy. [NIH]

Intestinal: Having to do with the intestines. [NIH]

Intestines: The section of the alimentary canal from the stomach to the anus. It includes the large intestine and small intestine. [NIH]

Intoxication: Poisoning, the state of being poisoned. [EU]

Intracellular: Inside a cell. [NIH]

Intraepithelial: Within the layer of cells that form the surface or lining of an organ. [NIH]

Intravenous: IV. Into a vein. [NIH]

Intravenous pyelogram: IVP. A series of x-rays of the kidneys, ureters, and bladder. The x-rays are taken after a dye is injected into a blood vessel. The dye is concentrated in the urine, which outlines the kidneys, ureters, and bladder on the x-rays. [NIH]

Invasive: 1. Having the quality of invasiveness. 2. Involving puncture or incision of the skin or insertion of an instrument or foreign material into the body; said of diagnostic techniques. [EU]

Joint: The point of contact between elements of an animal skeleton with the parts that surround and support it. [NIH]

Kb: A measure of the length of DNA fragments, 1 Kb = 1000 base pairs. The largest DNA fragments are up to 50 kilobases long. [NIH]

Keto: It consists of 8 carbon atoms and within the endotoxins, it connects polysaccharide and lipid A. [NIH]

Lactation: The period of the secretion of milk. [EU]

Large Intestine: The part of the intestine that goes from the cecum to the rectum. The large intestine absorbs water from stool and changes it from a liquid to a solid form. The large intestine is 5 feet long and includes the appendix, cecum, colon, and rectum. Also called colon. [NIH]

Laser Surgery: The use of a laser either to vaporize surface lesions or to make bloodless cuts in tissue. It does not include the coagulation of tissue by laser. [NIH]

Lavage: A cleaning of the stomach and colon. Uses a special drink and enemas. [NIH]

Leg Ulcer: Ulceration of the skin and underlying structures of the lower extremity. About 90% of the cases are due to venous insufficiency (varicose ulcer), 5% to arterial disease, and the remaining 5% to other causes. [NIH]

Lens: The transparent, double convex (outward curve on both sides) structure suspended between the aqueous and vitreous; helps to focus light on the retina. [NIH]

Lesion: An area of abnormal tissue change. [NIH]

Leukapheresis: The preparation of leukocyte concentrates with the return of red cells and leukocyte-poor plasma to the donor. [NIH]

Leukocytes: White blood cells. These include granular leukocytes (basophils, eosinophils, and neutrophils) as well as non-granular leukocytes (lymphocytes and monocytes). [NIH]

Leukopenia: A condition in which the number of leukocytes (white blood cells) in the blood is reduced. [NIH]

Leuprolide: A potent and long acting analog of naturally occurring gonadotropin-releasing hormone (gonadorelin). Its action is similar to gonadorelin, which regulates the synthesis and release of pituitary gonadotropins. [NIH]

Levonorgestrel: A progestational hormone with actions similar to those of progesterone and about twice as potent as its racemic or (+-)-isomer (norgestrel). It is used for contraception, control of menstrual disorders, and treatment of endometriosis. [NIH]

Libido: The psychic drive or energy associated with sexual instinct in the broad sense (pleasure and love-object seeking). It may also connote the psychic energy associated with instincts in general that motivate behavior. [NIH]

Library Services: Services offered to the library user. They include reference and circulation. [NIH]

Life Expectancy: A figure representing the number of years, based on known statistics, to which any person of a given age may reasonably expect to live. [NIH]

Ligament: A band of fibrous tissue that connects bones or cartilages, serving to support and strengthen joints. [EU]

Ligands: A RNA simulation method developed by the MIT. [NIH]

Ligation: Application of a ligature to tie a vessel or strangulate a part. [NIH]

Linkage: The tendency of two or more genes in the same chromosome to remain together from one generation to the next more frequently than expected according to the law of independent assortment. [NIH]

Lip: Either of the two fleshy, full-blooded margins of the mouth. [NIH]

Liver: A large, glandular organ located in the upper abdomen. The liver cleanses the blood and aids in digestion by secreting bile. [NIH]

Localized: Cancer which has not metastasized yet. [NIH]

Locomotion: Movement or the ability to move from one place or another. It can refer to humans, vertebrate or invertebrate animals, and microorganisms. [NIH]

Longitudinal study: Also referred to as a "cohort study" or "prospective study"; the analytic method of epidemiologic study in which subsets of a defined population can be identified who are, have been, or in the future may be exposed or not exposed, or exposed in different degrees, to a factor or factors hypothesized to influence the probability of occurrence of a given disease or other outcome. The main feature of this type of study is to observe large numbers of subjects over an extended time, with comparisons of incidence rates in groups that differ in exposure levels. [NIH]

Loop: A wire usually of platinum bent at one end into a small loop (usually 4 mm inside diameter) and used in transferring microorganisms. [NIH]

Lubricants: Oily or slippery substances. [NIH]

Lubrication: The application of a substance to diminish friction between two surfaces. It may refer to oils, greases, and similar substances for the lubrication of medical equipment but it can be used for the application of substances to tissue to reduce friction, such as lotions for skin and vaginal lubricants. [NIH]

Lumbar: Pertaining to the loins, the part of the back between the thorax and the pelvis. [EU]

Lupus: A form of cutaneous tuberculosis. It is seen predominantly in women and typically involves the nasal, buccal, and conjunctival mucosa. [NIH]

Lymph: The almost colorless fluid that travels through the lymphatic system and carries cells that help fight infection and disease. [NIH]

Lymph node: A rounded mass of lymphatic tissue that is surrounded by a capsule of connective tissue. Also known as a lymph gland. Lymph nodes are spread out along lymphatic vessels and contain many lymphocytes, which filter the lymphatic fluid (lymph). [NIH]

Lymphatic: The tissues and organs, including the bone marrow, spleen, thymus, and lymph nodes, that produce and store cells that fight infection and disease. [NIH]

Lymphatic system: The tissues and organs that produce, store, and carry white blood cells that fight infection and other diseases. This system includes the bone marrow, spleen, thymus, lymph nodes and a network of thin tubes that carry lymph and white blood cells. These tubes branch, like blood vessels, into all the tissues of the body. [NIH]

Lymphocyte: A white blood cell. Lymphocytes have a number of roles in the immune system, including the production of antibodies and other substances that fight infection and diseases. [NIH]

Lymphoid: Referring to lymphocytes, a type of white blood cell. Also refers to tissue in which lymphocytes develop. [NIH]

Lymphoma: A general term for various neoplastic diseases of the lymphoid tissue. [NIH]

Lymphoproliferative: Disorders characterized by proliferation of lymphoid tissue, general or unspecified. [NIH]

Malaria: A protozoan disease caused in humans by four species of the genus *Plasmodium* (*P. falciparum* (malaria, falciparum), *P. vivax* (malaria, vivax), *P. ovale*, and *P. malariae*) and transmitted by the bite of an infected female mosquito of the genus *Anopheles*. Malaria is endemic in parts of Asia, Africa, Central and South America, Oceania, and certain Caribbean islands. It is characterized by extreme exhaustion associated with paroxysms of high fever, sweating, shaking chills, and anemia. Malaria in animals is caused by other species of plasmodia. [NIH]

Malaria, Falciparum: Malaria caused by *Plasmodium falciparum*. This is the severest form of malaria and is associated with the highest levels of parasites in the blood. This disease is characterized by irregularly recurring febrile paroxysms that in extreme cases occur with acute cerebral, renal, or gastrointestinal manifestations. [NIH]

Malaria, Vivax: Malaria caused by *Plasmodium vivax*. This form of malaria is less severe than malaria, falciparum, but there is a higher probability for relapses to occur. Febrile paroxysms often occur every other day. [NIH]

Malignancy: A cancerous tumor that can invade and destroy nearby tissue and spread to other parts of the body. [NIH]

Malignant: Cancerous; a growth with a tendency to invade and destroy nearby tissue and spread to other parts of the body. [NIH]

Mammogram: An x-ray of the breast. [NIH]

Mass Media: Instruments or technological means of communication that reach large numbers of people with a common message: press, radio, television, etc. [NIH]

Maternal Mortality: Maternal deaths resulting from complications of pregnancy and childbirth in a given population. [NIH]

Maximum Tolerated Dose: The highest dose level eliciting signs of toxicity without having major effects on survival relative to the test in which it is used. [NIH]

Mediate: Indirect; accomplished by the aid of an intervening medium. [EU]

Medicament: A medicinal substance or agent. [EU]

MEDLINE: An online database of MEDLARS, the computerized bibliographic Medical Literature Analysis and Retrieval System of the National Library of Medicine. [NIH]

Medroxyprogesterone: (6 alpha)-17-Hydroxy-6-methylpregn-4-ene-3,20-dione. A synthetic progestational hormone used in veterinary practice as an estrus regulator. [NIH]

Medroxyprogesterone Acetate: An injectable contraceptive, generally marketed under the name Depo-Provera. [NIH]

Membrane: A very thin layer of tissue that covers a surface. [NIH]

Memory: Complex mental function having four distinct phases: (1) memorizing or learning, (2) retention, (3) recall, and (4) recognition. Clinically, it is usually subdivided into immediate, recent, and remote memory. [NIH]

Menopause: Permanent cessation of menstruation. [NIH]

Menstrual Cycle: The period of the regularly recurring physiologic changes in the endometrium occurring during the reproductive period in human females and some primates and culminating in partial sloughing of the endometrium (menstruation). [NIH]

Menstruation: The normal physiologic discharge through the vagina of blood and mucosal tissues from the nonpregnant uterus. [NIH]

Mental: Pertaining to the mind; psychic. 2. (L. mentum chin) pertaining to the chin. [EU]

Mental deficiency: A condition of arrested or incomplete development of mind from inherent causes or induced by disease or injury. [NIH]

Mental Disorders: Psychiatric illness or diseases manifested by breakdowns in the adaptational process expressed primarily as abnormalities of thought, feeling, and behavior producing either distress or impairment of function. [NIH]

Mental Health: The state wherein the person is well adjusted. [NIH]

Mentors: Senior professionals who provide guidance, direction and support to those persons desirous of improvement in academic positions, administrative positions or other career development situations. [NIH]

Metabolite: Any substance produced by metabolism or by a metabolic process. [EU]

Metastasis: The spread of cancer from one part of the body to another. Tumors formed from cells that have spread are called "secondary tumors" and contain cells that are like those in the original (primary) tumor. The plural is metastases. [NIH]

Metastasize: To spread from one part of the body to another. When cancer cells metastasize and form secondary tumors, the cells in the metastatic tumor are like those in the original (primary) tumor. [NIH]

Metastatic: Having to do with metastasis, which is the spread of cancer from one part of the body to another. [NIH]

MI: Myocardial infarction. Gross necrosis of the myocardium as a result of interruption of the blood supply to the area; it is almost always caused by atherosclerosis of the coronary arteries, upon which coronary thrombosis is usually superimposed. [NIH]

Microbe: An organism which cannot be observed with the naked eye; e. g. unicellular animals, lower algae, lower fungi, bacteria. [NIH]

Microsomal: Of or pertaining to microsomes : vesicular fragments of endoplasmic reticulum formed after disruption and centrifugation of cells. [EU]

Mitochondrial Swelling: Increase in volume of mitochondria due to an influx of fluid; it occurs in hypotonic solutions due to osmotic pressure and in isotonic solutions as a result of altered permeability of the membranes of respiring mitochondria. [NIH]

Modification: A change in an organism, or in a process in an organism, that is acquired from its own activity or environment. [NIH]

Molecular: Of, pertaining to, or composed of molecules : a very small mass of matter. [EU]

Molecule: A chemical made up of two or more atoms. The atoms in a molecule can be the same (an oxygen molecule has two oxygen atoms) or different (a water molecule has two hydrogen atoms and one oxygen atom). Biological molecules, such as proteins and DNA, can be made up of many thousands of atoms. [NIH]

Monitor: An apparatus which automatically records such physiological signs as respiration, pulse, and blood pressure in an anesthetized patient or one undergoing surgical or other procedures. [NIH]

Monoclonal: An antibody produced by culturing a single type of cell. It therefore consists of a single species of immunoglobulin molecules. [NIH]

Monocytes: Large, phagocytic mononuclear leukocytes produced in the vertebrate bone marrow and released into the blood; contain a large, oval or somewhat indented nucleus surrounded by voluminous cytoplasm and numerous organelles. [NIH]

Morals: Standards of conduct as right or wrong. [NIH]

Morphogenesis: The development of the form of an organ, part of the body, or organism. [NIH]

Morphological: Relating to the configuration or the structure of live organs. [NIH]

Motion Sickness: Sickness caused by motion, as sea sickness, train sickness, car sickness, and air sickness. [NIH]

Mucins: A secretion containing mucopolysaccharides and protein that is the chief constituent of mucus. [NIH]

Mucosa: A mucous membrane, or tunica mucosa. [EU]

Muscle relaxant: An agent that specifically aids in reducing muscle tension, as those acting at the polysynaptic neurons of motor nerves (e.g. meprobamate) or at the myoneural junction (curare and related compounds). [EU]

Muscle Spindles: Mechanoreceptors found between skeletal muscle fibers. Muscle spindles are arranged in parallel with muscle fibers and respond to the passive stretch of the muscle, but cease to discharge if the muscle contracts isotonically, thus signaling muscle length. The muscle spindles are the receptors responsible for the stretch or myotactic reflex. [NIH]

Mycosis: Any disease caused by a fungus. [EU]

Mycosis Fungoides: A chronic malignant T-cell lymphoma of the skin. In the late stages the

lymph nodes and viscera are affected. [NIH]

Myocardial infarction: Gross necrosis of the myocardium as a result of interruption of the blood supply to the area; it is almost always caused by atherosclerosis of the coronary arteries, upon which coronary thrombosis is usually superimposed. [NIH]

Myocardium: The muscle tissue of the heart composed of striated, involuntary muscle known as cardiac muscle. [NIH]

Nausea: An unpleasant sensation in the stomach usually accompanied by the urge to vomit. Common causes are early pregnancy, sea and motion sickness, emotional stress, intense pain, food poisoning, and various enteroviruses. [NIH]

NCI: National Cancer Institute. NCI, part of the National Institutes of Health of the United States Department of Health and Human Services, is the federal government's principal agency for cancer research. NCI conducts, coordinates, and funds cancer research, training, health information dissemination, and other programs with respect to the cause, diagnosis, prevention, and treatment of cancer. Access the NCI Web site at <http://cancer.gov>. [NIH]

Necrosis: A pathological process caused by the progressive degradative action of enzymes that is generally associated with severe cellular trauma. It is characterized by mitochondrial swelling, nuclear flocculation, uncontrolled cell lysis, and ultimately cell death. [NIH]

Need: A state of tension or dissatisfaction felt by an individual that impels him to action toward a goal he believes will satisfy the impulse. [NIH]

Needle Sharing: Usage of a single needle among two or more people for injecting drugs. Needle sharing is a high-risk behavior for contracting infectious disease. [NIH]

Needs Assessment: Systematic identification of a population's needs or the assessment of individuals to determine the proper level of services needed. [NIH]

Nelfinavir: A potent HIV protease inhibitor. It is used in combination with other antiviral drugs in the treatment of HIV in both adults and children. [NIH]

Neoplasia: Abnormal and uncontrolled cell growth. [NIH]

Neoplasm: A new growth of benign or malignant tissue. [NIH]

Neoplastic: Pertaining to or like a neoplasm (= any new and abnormal growth); pertaining to neoplasia (= the formation of a neoplasm). [EU]

Nerve: A cordlike structure of nervous tissue that connects parts of the nervous system with other tissues of the body and conveys nervous impulses to, or away from, these tissues. [NIH]

Nervous System: The entire nerve apparatus composed of the brain, spinal cord, nerves and ganglia. [NIH]

Neurobehavioral Manifestations: Signs and symptoms of higher cortical dysfunction caused by organic conditions. These include certain behavioral alterations and impairments of skills involved in the acquisition, processing, and utilization of knowledge or information. [NIH]

Neurologic: Having to do with nerves or the nervous system. [NIH]

Neurons: The basic cellular units of nervous tissue. Each neuron consists of a body, an axon, and dendrites. Their purpose is to receive, conduct, and transmit impulses in the nervous system. [NIH]

Neutrons: Electrically neutral elementary particles found in all atomic nuclei except light hydrogen; the mass is equal to that of the proton and electron combined and they are unstable when isolated from the nucleus, undergoing beta decay. Slow, thermal, epithermal, and fast neutrons refer to the energy levels with which the neutrons are ejected from heavier

nuclei during their decay. [NIH]

Nevirapine: A potent, non-nucleoside reverse transcriptase inhibitor used in combination with nucleoside analogues for treatment of HIV infection and AIDS. [NIH]

Niacin: Water-soluble vitamin of the B complex occurring in various animal and plant tissues. Required by the body for the formation of coenzymes NAD and NADP. Has pellagra-curative, vasodilating, and antilipemic properties. [NIH]

Non-nucleoside: A member of a class of compounds, including delavirdine, loviride and nevirapine, that acts to directly combine with and block the action of HIV's reverse transcriptase. [NIH]

Norgestrel: (+-)-13-Ethyl-17-hydroxy-18,19-dinorpregn-4-en-20-yn-3-one. A progestational agent with actions similar to those of progesterone. This racemic or (+-)-form has about half the potency of the levo form (levonorgestrel). Norgestrel is used as a contraceptive and ovulation inhibitor and for the control of menstrual disorders and endometriosis. [NIH]

Nuclear: A test of the structure, blood flow, and function of the kidneys. The doctor injects a mildly radioactive solution into an arm vein and uses x-rays to monitor its progress through the kidneys. [NIH]

Nucleic acid: Either of two types of macromolecule (DNA or RNA) formed by polymerization of nucleotides. Nucleic acids are found in all living cells and contain the information (genetic code) for the transfer of genetic information from one generation to the next. [NIH]

Nucleus: A body of specialized protoplasm found in nearly all cells and containing the chromosomes. [NIH]

Odds Ratio: The ratio of two odds. The exposure-odds ratio for case control data is the ratio of the odds in favor of exposure among cases to the odds in favor of exposure among noncases. The disease-odds ratio for a cohort or cross section is the ratio of the odds in favor of disease among the exposed to the odds in favor of disease among the unexposed. The prevalence-odds ratio refers to an odds ratio derived cross-sectionally from studies of prevalent cases. [NIH]

Ointments: Semisolid preparations used topically for protective emollient effects or as a vehicle for local administration of medications. Ointment bases are various mixtures of fats, waxes, animal and plant oils and solid and liquid hydrocarbons. [NIH]

Oocytes: Female germ cells in stages between the prophase of the first maturation division and the completion of the second maturation division. [NIH]

Oophoritis: Inflammation of an ovary. [NIH]

Ophthalmologic: Pertaining to ophthalmology (= the branch of medicine dealing with the eye). [EU]

Ophthalmology: A surgical specialty concerned with the structure and function of the eye and the medical and surgical treatment of its defects and diseases. [NIH]

Optic Chiasm: The X-shaped structure formed by the meeting of the two optic nerves. At the optic chiasm the fibers from the medial part of each retina cross to project to the other side of the brain while the lateral retinal fibers continue on the same side. As a result each half of the brain receives information about the contralateral visual field from both eyes. [NIH]

Orchitis: Inflammation of a testis. The disease is marked by pain, swelling, and a feeling of weight. It may occur idiopathically, or it may be associated with conditions such as mumps, gonorrhoea, filarial disease, syphilis, or tuberculosis. [EU]

Orgasm: The crisis of sexual excitement in either humans or animals. [NIH]

Osteoporosis: Reduction of bone mass without alteration in the composition of bone, leading to fractures. Primary osteoporosis can be of two major types: postmenopausal osteoporosis and age-related (or senile) osteoporosis. [NIH]

Outpatient: A patient who is not an inmate of a hospital but receives diagnosis or treatment in a clinic or dispensary connected with the hospital. [NIH]

Ovalbumin: An albumin obtained from the white of eggs. It is a member of the serpin superfamily. [NIH]

Ovaries: The pair of female reproductive glands in which the ova, or eggs, are formed. The ovaries are located in the pelvis, one on each side of the uterus. [NIH]

Ovary: Either of the paired glands in the female that produce the female germ cells and secrete some of the female sex hormones. [NIH]

Overdose: An accidental or deliberate dose of a medication or street drug that is in excess of what is normally used. [NIH]

Ovulation: The discharge of a secondary oocyte from a ruptured graafian follicle. [NIH]

Ovum: A female germ cell extruded from the ovary at ovulation. [NIH]

Palliative: 1. Affording relief, but not cure. 2. An alleviating medicine. [EU]

Pancreas: A mixed exocrine and endocrine gland situated transversely across the posterior abdominal wall in the epigastric and hypochondriac regions. The endocrine portion is comprised of the Islets of Langerhans, while the exocrine portion is a compound acinar gland that secretes digestive enzymes. [NIH]

Pancreatic: Having to do with the pancreas. [NIH]

Pancreatitis: Acute or chronic inflammation of the pancreas, which may be asymptomatic or symptomatic, and which is due to autodigestion of a pancreatic tissue by its own enzymes. It is caused most often by alcoholism or biliary tract disease; less commonly it may be associated with hyperlipaemia, hyperparathyroidism, abdominal trauma (accidental or operative injury), vasculitis, or uraemia. [EU]

Papillomavirus: A genus of Papovaviridae causing proliferation of the epithelium, which may lead to malignancy. A wide range of animals are infected including humans, chimpanzees, cattle, rabbits, dogs, and horses. [NIH]

Parasitic: Having to do with or being a parasite. A parasite is an animal or a plant that lives on or in an organism of another species and gets at least some of its nutrients from it. [NIH]

Parity: The number of offspring a female has borne. It is contrasted with gravidity, which refers to the number of pregnancies, regardless of outcome. [NIH]

Parotid: The space that contains the parotid gland, the facial nerve, the external carotid artery, and the retromandibular vein. [NIH]

Paroxysmal: Recurring in paroxysms (= spasms or seizures). [EU]

Patch: A piece of material used to cover or protect a wound, an injured part, etc.: a patch over the eye. [NIH]

Pathologic: 1. Indicative of or caused by a morbid condition. 2. Pertaining to pathology (= branch of medicine that treats the essential nature of the disease, especially the structural and functional changes in tissues and organs of the body caused by the disease). [EU]

Patient Education: The teaching or training of patients concerning their own health needs. [NIH]

Pedigree: A record of one's ancestors, offspring, siblings, and their offspring that may be used to determine the pattern of certain genes or disease inheritance within a family. [NIH]

Pellucida: The hyaline or faintly radially striated eosinophilic membrane in immediate contact with the outer wall of the ovum. [NIH]

Pelvic: Pertaining to the pelvis. [EU]

Pelvis: The lower part of the abdomen, located between the hip bones. [NIH]

Penicillin: An antibiotic drug used to treat infection. [NIH]

Penis: The external reproductive organ of males. It is composed of a mass of erectile tissue enclosed in three cylindrical fibrous compartments. Two of the three compartments, the corpus cavernosa, are placed side-by-side along the upper part of the organ. The third compartment below, the corpus spongiosum, houses the urethra. [NIH]

Peptide: Any compound consisting of two or more amino acids, the building blocks of proteins. Peptides are combined to make proteins. [NIH]

Peptide T: N-(N-(N(2)-(N-(N-(N-D-Alanyl L-seryl)-L-threonyl)-L-threonyl) L-threonyl)-L-asparaginy)-L-tyrosyl) L-threonine. Octapeptide sharing sequence homology with HIV envelope protein gp120. It is potentially useful as antiviral agent in AIDS therapy. The core pentapeptide sequence, TTNYT, consisting of amino acids 4-8 in peptide T, is the HIV envelope sequence required for attachment to the CD4 receptor. [NIH]

Perception: The ability quickly and accurately to recognize similarities and differences among presented objects, whether these be pairs of words, pairs of number series, or multiple sets of these or other symbols such as geometric figures. [NIH]

Perennial: Lasting through the year or for several years. [EU]

Perimenopausal: The time of a woman's life when menstrual periods become irregular. Refers to the time near menopause. [NIH]

Perinatal: Pertaining to or occurring in the period shortly before and after birth; variously defined as beginning with completion of the twentieth to twenty-eighth week of gestation and ending 7 to 28 days after birth. [EU]

Pharmaceutical Solutions: Homogeneous liquid preparations that contain one or more chemical substances dissolved, i.e., molecularly dispersed, in a suitable solvent or mixture of mutually miscible solvents. For reasons of their ingredients, method of preparation, or use, they do not fall into another group of products. [NIH]

Pharmacist: A person trained to prepare and distribute medicines and to give information about them. [NIH]

Pharmacokinetic: The mathematical analysis of the time courses of absorption, distribution, and elimination of drugs. [NIH]

Pharmacologic: Pertaining to pharmacology or to the properties and reactions of drugs. [EU]

Phenyl: Ingredient used in cold and flu remedies. [NIH]

Phenytoin: An anticonvulsant that is used in a wide variety of seizures. It is also an antiarrhythmic and a muscle relaxant. The mechanism of therapeutic action is not clear, although several cellular actions have been described including effects on ion channels, active transport, and general membrane stabilization. The mechanism of its muscle relaxant effect appears to involve a reduction in the sensitivity of muscle spindles to stretch. Phenytoin has been proposed for several other therapeutic uses, but its use has been limited by its many adverse effects and interactions with other drugs. [NIH]

Physical Examination: Systematic and thorough inspection of the patient for physical signs of disease or abnormality. [NIH]

Physiologic: Having to do with the functions of the body. When used in the phrase "physiologic age," it refers to an age assigned by general health, as opposed to calendar age.

[NIH]

Physiology: The science that deals with the life processes and functions of organismus, their cells, tissues, and organs. [NIH]

Pituitary Gland: A small, unpaired gland situated in the sella turcica tissue. It is connected to the hypothalamus by a short stalk. [NIH]

Placenta: A highly vascular fetal organ through which the fetus absorbs oxygen and other nutrients and excretes carbon dioxide and other wastes. It begins to form about the eighth day of gestation when the blastocyst adheres to the decidua. [NIH]

Plants: Multicellular, eukaryotic life forms of the kingdom Plantae. They are characterized by a mainly photosynthetic mode of nutrition; essentially unlimited growth at localized regions of cell divisions (meristems); cellulose within cells providing rigidity; the absence of organs of locomotion; absence of nervous and sensory systems; and an alteration of haploid and diploid generations. [NIH]

Plasma: The clear, yellowish, fluid part of the blood that carries the blood cells. The proteins that form blood clots are in plasma. [NIH]

Plasma cells: A type of white blood cell that produces antibodies. [NIH]

Plasmapheresis: Procedure whereby plasma is separated and extracted from anticoagulated whole blood and the red cells retransfused to the donor. Plasmapheresis is also employed for therapeutic use. [NIH]

Plateletpheresis: The preparation of platelet concentrates with the return of red cells and platelet-poor plasma to the donor. [NIH]

Platelets: A type of blood cell that helps prevent bleeding by causing blood clots to form. Also called thrombocytes. [NIH]

Platinum: Platinum. A heavy, soft, whitish metal, resembling tin, atomic number 78, atomic weight 195.09, symbol Pt. (From Dorland, 28th ed) It is used in manufacturing equipment for laboratory and industrial use. It occurs as a black powder (platinum black) and as a spongy substance (spongy platinum) and may have been known in Pliny's time as "alutiae". [NIH]

Pneumonia: Inflammation of the lungs. [NIH]

Poisoning: A condition or physical state produced by the ingestion, injection or inhalation of, or exposure to a deleterious agent. [NIH]

Polycystic: An inherited disorder characterized by many grape-like clusters of fluid-filled cysts that make both kidneys larger over time. These cysts take over and destroy working kidney tissue. PKD may cause chronic renal failure and end-stage renal disease. [NIH]

Polypeptide: A peptide which on hydrolysis yields more than two amino acids; called tripeptides, tetrapeptides, etc. according to the number of amino acids contained. [EU]

Polysaccharide: A type of carbohydrate. It contains sugar molecules that are linked together chemically. [NIH]

Population Control: Includes mechanisms or programs which control the numbers of individuals in a population of humans or animals. [NIH]

Population Growth: Increase, over a specific period of time, in the number of individuals living in a country or region. [NIH]

Posterior: Situated in back of, or in the back part of, or affecting the back or dorsal surface of the body. In lower animals, it refers to the caudal end of the body. [EU]

Postmenopausal: Refers to the time after menopause. Menopause is the time in a woman's life when menstrual periods stop permanently; also called "change of life." [NIH]

Postnatal: Occurring after birth, with reference to the newborn. [EU]

Post-translational: The cleavage of signal sequence that directs the passage of the protein through a cell or organelle membrane. [NIH]

Post-traumatic: Occurring as a result of or after injury. [EU]

Potassium: An element that is in the alkali group of metals. It has an atomic symbol K, atomic number 19, and atomic weight 39.10. It is the chief cation in the intracellular fluid of muscle and other cells. Potassium ion is a strong electrolyte and it plays a significant role in the regulation of fluid volume and maintenance of the water-electrolyte balance. [NIH]

Practice Guidelines: Directions or principles presenting current or future rules of policy for the health care practitioner to assist him in patient care decisions regarding diagnosis, therapy, or related clinical circumstances. The guidelines may be developed by government agencies at any level, institutions, professional societies, governing boards, or by the convening of expert panels. The guidelines form a basis for the evaluation of all aspects of health care and delivery. [NIH]

Precancerous: A term used to describe a condition that may (or is likely to) become cancer. Also called premalignant. [NIH]

Pregnancy Outcome: Results of conception and ensuing pregnancy, including live birth, stillbirth, spontaneous abortion, induced abortion. The outcome may follow natural or artificial insemination or any of the various reproduction techniques, such as embryo transfer or fertilization in vitro. [NIH]

Premalignant: A term used to describe a condition that may (or is likely to) become cancer. Also called precancerous. [NIH]

Premenopausal: Refers to the time before menopause. Menopause is the time of life when a women's menstrual periods stop permanently; also called "change of life." [NIH]

Premenstrual Syndrome: A syndrome occurring most often during the last week of the menstrual cycle and ending soon after the onset of menses. Some of the symptoms are emotional instability, insomnia, headache, nausea, vomiting, abdominal distension, and painful breasts. [NIH]

Prenatal: Existing or occurring before birth, with reference to the fetus. [EU]

Progesterone: Pregn-4-ene-3,20-dione. The principal progestational hormone of the body, secreted by the corpus luteum, adrenal cortex, and placenta. Its chief function is to prepare the uterus for the reception and development of the fertilized ovum. It acts as an antiovaratory agent when administered on days 5-25 of the menstrual cycle. [NIH]

Progestogen: A term applied to any substance possessing progestational activity. [EU]

Progression: Increase in the size of a tumor or spread of cancer in the body. [NIH]

Progressive: Advancing; going forward; going from bad to worse; increasing in scope or severity. [EU]

Projection: A defense mechanism, operating unconsciously, whereby that which is emotionally unacceptable in the self is rejected and attributed (projected) to others. [NIH]

Prophase: The first phase of cell division, in which the chromosomes become visible, the nucleus starts to lose its identity, the spindle appears, and the centrioles migrate toward opposite poles. [NIH]

Prophylaxis: An attempt to prevent disease. [NIH]

Prospective study: An epidemiologic study in which a group of individuals (a cohort), all free of a particular disease and varying in their exposure to a possible risk factor, is followed over a specific amount of time to determine the incidence rates of the disease in the exposed

and unexposed groups. [NIH]

Prostate: A gland in males that surrounds the neck of the bladder and the urethra. It secretes a substance that liquifies coagulated semen. It is situated in the pelvic cavity behind the lower part of the pubic symphysis, above the deep layer of the triangular ligament, and rests upon the rectum. [NIH]

Protease: Proteinase (= any enzyme that catalyses the splitting of interior peptide bonds in a protein). [EU]

Protease Inhibitors: Compounds which inhibit or antagonize biosynthesis or actions of proteases (endopeptidases). [NIH]

Protein S: The vitamin K-dependent cofactor of activated protein C. Together with protein C, it inhibits the action of factors VIIIa and Va. A deficiency in protein S can lead to recurrent venous and arterial thrombosis. [NIH]

Proteins: Polymers of amino acids linked by peptide bonds. The specific sequence of amino acids determines the shape and function of the protein. [NIH]

Protons: Stable elementary particles having the smallest known positive charge, found in the nuclei of all elements. The proton mass is less than that of a neutron. A proton is the nucleus of the light hydrogen atom, i.e., the hydrogen ion. [NIH]

Protozoa: A subkingdom consisting of unicellular organisms that are the simplest in the animal kingdom. Most are free living. They range in size from submicroscopic to macroscopic. Protozoa are divided into seven phyla: Sarcomastigophora, Labyrinthomorpha, Apicomplexa, Microspora, Ascetospora, Myxozoa, and Ciliophora. [NIH]

Protozoan: 1. Any individual of the protozoa; protozoon. 2. Of or pertaining to the protozoa; protozoal. [EU]

Psychiatric: Pertaining to or within the purview of psychiatry. [EU]

Psychiatry: The medical science that deals with the origin, diagnosis, prevention, and treatment of mental disorders. [NIH]

Psychic: Pertaining to the psyche or to the mind; mental. [EU]

Psychoactive: Those drugs which alter sensation, mood, consciousness or other psychological or behavioral functions. [NIH]

Psychomotor: Pertaining to motor effects of cerebral or psychic activity. [EU]

Psychopathology: The study of significant causes and processes in the development of mental illness. [NIH]

Puberty: The period during which the secondary sex characteristics begin to develop and the capability of sexual reproduction is attained. [EU]

Public Health: Branch of medicine concerned with the prevention and control of disease and disability, and the promotion of physical and mental health of the population on the international, national, state, or municipal level. [NIH]

Public Opinion: The attitude of a significant portion of a population toward any given proposition, based upon a measurable amount of factual evidence, and involving some degree of reflection, analysis, and reasoning. [NIH]

Publishing: "The business or profession of the commercial production and issuance of literature" (Webster's 3d). It includes the publisher, publication processes, editing and editors. Production may be by conventional printing methods or by electronic publishing. [NIH]

Pulmonary: Relating to the lungs. [NIH]

Pulmonary Artery: The short wide vessel arising from the conus arteriosus of the right ventricle and conveying unaerated blood to the lungs. [NIH]

Pyridoxal: 3-Hydroxy-5-(hydroxymethyl)-2-methyl-4- pyridinecarboxaldehyde. [NIH]

Quality of Life: A generic concept reflecting concern with the modification and enhancement of life attributes, e.g., physical, political, moral and social environment. [NIH]

Race: A population within a species which exhibits general similarities within itself, but is both discontinuous and distinct from other populations of that species, though not sufficiently so as to achieve the status of a taxon. [NIH]

Racemic: Optically inactive but resolvable in the way of all racemic compounds. [NIH]

Radiation: Emission or propagation of electromagnetic energy (waves/rays), or the waves/rays themselves; a stream of electromagnetic particles (electrons, neutrons, protons, alpha particles) or a mixture of these. The most common source is the sun. [NIH]

Radiation therapy: The use of high-energy radiation from x-rays, gamma rays, neutrons, and other sources to kill cancer cells and shrink tumors. Radiation may come from a machine outside the body (external-beam radiation therapy), or it may come from radioactive material placed in the body in the area near cancer cells (internal radiation therapy, implant radiation, or brachytherapy). Systemic radiation therapy uses a radioactive substance, such as a radiolabeled monoclonal antibody, that circulates throughout the body. Also called radiotherapy. [NIH]

Radioactive: Giving off radiation. [NIH]

Radiolabeled: Any compound that has been joined with a radioactive substance. [NIH]

Radiology: A specialty concerned with the use of x-ray and other forms of radiant energy in the diagnosis and treatment of disease. [NIH]

Radiotherapy: The use of ionizing radiation to treat malignant neoplasms and other benign conditions. The most common forms of ionizing radiation used as therapy are x-rays, gamma rays, and electrons. A special form of radiotherapy, targeted radiotherapy, links a cytotoxic radionuclide to a molecule that targets the tumor. When this molecule is an antibody or other immunologic molecule, the technique is called radioimmunotherapy. [NIH]

Randomized: Describes an experiment or clinical trial in which animal or human subjects are assigned by chance to separate groups that compare different treatments. [NIH]

Rationalization: A defense mechanism operating unconsciously, in which the individual attempts to justify or make consciously tolerable, by plausible means, feelings, behavior, and motives that would otherwise be intolerable. [NIH]

Reabsorption: 1. The act or process of absorbing again, as the selective absorption by the kidneys of substances (glucose, proteins, sodium, etc.) already secreted into the renal tubules, and their return to the circulating blood. 2. Resorption. [EU]

Receptivity: The condition of the reproductive organs of a female flower that permits effective pollination. [NIH]

Receptor: A molecule inside or on the surface of a cell that binds to a specific substance and causes a specific physiologic effect in the cell. [NIH]

Recombinant: A cell or an individual with a new combination of genes not found together in either parent; usually applied to linked genes. [EU]

Rectum: The last 8 to 10 inches of the large intestine. [NIH]

Refer: To send or direct for treatment, aid, information, de decision. [NIH]

Regimen: A treatment plan that specifies the dosage, the schedule, and the duration of treatment. [NIH]

Relative risk: The ratio of the incidence rate of a disease among individuals exposed to a specific risk factor to the incidence rate among unexposed individuals; synonymous with risk ratio. Alternatively, the ratio of the cumulative incidence rate in the exposed to the cumulative incidence rate in the unexposed (cumulative incidence ratio). The term relative risk has also been used synonymously with odds ratio. This is because the odds ratio and relative risk approach each other if the disease is rare (5 percent of population) and the number of subjects is large. [NIH]

Reproduction Techniques: Methods pertaining to the generation of new individuals. [NIH]

Resolving: The ability of the eye or of a lens to make small objects that are close together, separately visible; thus revealing the structure of an object. [NIH]

Retina: The ten-layered nervous tissue membrane of the eye. It is continuous with the optic nerve and receives images of external objects and transmits visual impulses to the brain. Its outer surface is in contact with the choroid and the inner surface with the vitreous body. The outer-most layer is pigmented, whereas the inner nine layers are transparent. [NIH]

Retinal: 1. Pertaining to the retina. 2. The aldehyde of retinol, derived by the oxidative enzymatic splitting of absorbed dietary carotene, and having vitamin A activity. In the retina, retinal combines with opsins to form visual pigments. One isomer, 11-cis retinal combines with opsin in the rods (scotopsin) to form rhodopsin, or visual purple. Another, all-trans retinal (trans-r.); visual yellow; xanthopsin) results from the bleaching of rhodopsin by light, in which the 11-cis form is converted to the all-trans form. Retinal also combines with opsins in the cones (photopsins) to form the three pigments responsible for colour vision. Called also retinal, and retinene1. [EU]

Retinopathy: 1. Retinitis (= inflammation of the retina). 2. Retinosis (= degenerative, noninflammatory condition of the retina). [EU]

Rheumatism: A group of disorders marked by inflammation or pain in the connective tissue structures of the body. These structures include bone, cartilage, and fat. [NIH]

Rhythm Method: A contraceptive method whereby abstinence is practiced a few days before and after the estimated day of ovulation. [NIH]

Rigidity: Stiffness or inflexibility, chiefly that which is abnormal or morbid; rigor. [EU]

Risk factor: A habit, trait, condition, or genetic alteration that increases a person's chance of developing a disease. [NIH]

Ritonavir: An HIV protease inhibitor that works by interfering with the reproductive cycle of HIV. [NIH]

Rod: A reception for vision, located in the retina. [NIH]

Rural Population: The inhabitants of rural areas or of small towns classified as rural. [NIH]

Safe Sex: Sex behavior that prevents or decreases the spread of sexually transmitted diseases or pregnancy. [NIH]

Saliva: The clear, viscous fluid secreted by the salivary glands and mucous glands of the mouth. It contains mucins, water, organic salts, and ptylin. [NIH]

Salivary: The duct that convey saliva to the mouth. [NIH]

Salivary glands: Glands in the mouth that produce saliva. [NIH]

Saponins: Sapogenin glycosides. A type of glycoside widely distributed in plants. Each consists of a sapogenin as the aglycon moiety, and a sugar. The sapogenin may be a steroid or a triterpene and the sugar may be glucose, galactose, a pentose, or a methylpentose. Sapogenins are poisonous towards the lower forms of life and are powerful hemolytics when injected into the blood stream able to dissolve red blood cells at even extreme

dilutions. [NIH]

Sarcoma: A connective tissue neoplasm formed by proliferation of mesodermal cells; it is usually highly malignant. [NIH]

Schizoid: Having qualities resembling those found in greater degree in schizophrenics; a person of schizoid personality. [NIH]

Schizophrenia: A severe emotional disorder of psychotic depth characteristically marked by a retreat from reality with delusion formation, hallucinations, emotional disharmony, and regressive behavior. [NIH]

Schizotypal Personality Disorder: A personality disorder in which there are oddities of thought (magical thinking, paranoid ideation, suspiciousness), perception (illusions, depersonalization), speech (digressive, vague, overelaborate), and behavior (inappropriate affect in social interactions, frequently social isolation) that are not severe enough to characterize schizophrenia. [NIH]

Sclerosis: A pathological process consisting of hardening or fibrosis of an anatomical structure, often a vessel or a nerve. [NIH]

Screening: Checking for disease when there are no symptoms. [NIH]

Secondary tumor: Cancer that has spread from the organ in which it first appeared to another organ. For example, breast cancer cells may spread (metastasize) to the lungs and cause the growth of a new tumor. When this happens, the disease is called metastatic breast cancer, and the tumor in the lungs is called a secondary tumor. Also called secondary cancer. [NIH]

Secretion: 1. The process of elaborating a specific product as a result of the activity of a gland; this activity may range from separating a specific substance of the blood to the elaboration of a new chemical substance. 2. Any substance produced by secretion. [EU]

Secretory: Secreting; relating to or influencing secretion or the secretions. [NIH]

Seizures: Clinical or subclinical disturbances of cortical function due to a sudden, abnormal, excessive, and disorganized discharge of brain cells. Clinical manifestations include abnormal motor, sensory and psychic phenomena. Recurrent seizures are usually referred to as epilepsy or "seizure disorder." [NIH]

Self Care: Performance of activities or tasks traditionally performed by professional health care providers. The concept includes care of oneself or one's family and friends. [NIH]

Sella: A deep depression in the shape of a Turkish saddle in the upper surface of the body of the sphenoid bone in the deepest part of which is lodged the hypophysis cerebri. [NIH]

Sella Turcica: A bony prominence situated on the upper surface of the body of the sphenoid bone. It houses the pituitary gland. [NIH]

Semen: The thick, yellowish-white, viscid fluid secretion of male reproductive organs discharged upon ejaculation. In addition to reproductive organ secretions, it contains spermatozoa and their nutrient plasma. [NIH]

Seminal fluid: Fluid from the prostate and other sex glands that helps transport sperm out of the man's body during orgasm. Seminal fluid contains sugar as an energy source for sperm. [NIH]

Senile: Relating or belonging to old age; characteristic of old age; resulting from infirmity of old age. [NIH]

Septic: Produced by or due to decomposition by microorganisms; putrefactive. [EU]

Sequence Homology: The degree of similarity between sequences. Studies of amino acid and nucleotide sequences provide useful information about the genetic relatedness of

certain species. [NIH]

Sex Characteristics: Those characteristics that distinguish one sex from the other. The primary sex characteristics are the ovaries and testes and their related hormones. Secondary sex characteristics are those which are masculine or feminine but not directly related to reproduction. [NIH]

Sex Counseling: Advice and support given to individuals to help them understand and resolve their sexual adjustment problems. It excludes treatment for psychosexual disorders or psychosexual dysfunction. [NIH]

Sex Distribution: The number of males and females in a given population. The distribution may refer to how many men or women or what proportion of either in the group. The population is usually patients with a specific disease but the concept is not restricted to humans and is not restricted to medicine. [NIH]

Sex Education: Education which increases the knowledge of the functional, structural, and behavioral aspects of human reproduction. [NIH]

Sex Hormone-Binding Globulin: A glycoprotein migrating as a beta-globulin. Its molecular weight, 52,000 or 95,000-115,000, indicates that it exists as a dimer. The protein binds testosterone, dihydrotestosterone, and estradiol in the plasma. Sex hormone-binding protein has the same amino acid sequence as androgen-binding protein. They differ by their sites of synthesis and post-translational oligosaccharide modifications. [NIH]

Sex Ratio: The number of males per 100 females. [NIH]

Sexual Abstinence: Refraining from sexual intercourse. [NIH]

Sexually Transmitted Diseases: Diseases due to or propagated by sexual contact. [NIH]

Shame: An emotional attitude excited by realization of a shortcoming or impropriety. [NIH]

Side effect: A consequence other than the one(s) for which an agent or measure is used, as the adverse effects produced by a drug, especially on a tissue or organ system other than the one sought to be benefited by its administration. [EU]

Small intestine: The part of the digestive tract that is located between the stomach and the large intestine. [NIH]

Social Change: Social process whereby the values, attitudes, or institutions of society, such as education, family, religion, and industry become modified. It includes both the natural process and action programs initiated by members of the community. [NIH]

Social Environment: The aggregate of social and cultural institutions, forms, patterns, and processes that influence the life of an individual or community. [NIH]

Social Problems: Situations affecting a significant number of people, that are believed to be sources of difficulty or threaten the stability of the community, and that require programs of amelioration. [NIH]

Social Welfare: Organized institutions which provide services to ameliorate conditions of need or social pathology in the community. [NIH]

Social Work: The use of community resources, individual case work, or group work to promote the adaptive capacities of individuals in relation to their social and economic environments. It includes social service agencies. [NIH]

Socialization: The training or molding of an individual through various relationships, educational agencies, and social controls, which enables him to become a member of a particular society. [NIH]

Sodium: An element that is a member of the alkali group of metals. It has the atomic symbol Na, atomic number 11, and atomic weight 23. With a valence of 1, it has a strong

affinity for oxygen and other nonmetallic elements. Sodium provides the chief cation of the extracellular body fluids. Its salts are the most widely used in medicine. (From Dorland, 27th ed) Physiologically the sodium ion plays a major role in blood pressure regulation, maintenance of fluid volume, and electrolyte balance. [NIH]

Sodium Channels: Cell membrane glycoproteins selective for sodium ions. Fast sodium current is associated with the action potential in neural membranes. [NIH]

Soft tissue: Refers to muscle, fat, fibrous tissue, blood vessels, or other supporting tissue of the body. [NIH]

Solid tumor: Cancer of body tissues other than blood, bone marrow, or the lymphatic system. [NIH]

Somatic: 1. Pertaining to or characteristic of the soma or body. 2. Pertaining to the body wall in contrast to the viscera. [EU]

Sonogram: A computer picture of areas inside the body created by bouncing sound waves off organs and other tissues. Also called ultrasonogram or ultrasound. [NIH]

Sound wave: An alteration of properties of an elastic medium, such as pressure, particle displacement, or density, that propagates through the medium, or a superposition of such alterations. [NIH]

Spatial disorientation: Loss of orientation in space where person does not know which way is up. [NIH]

Specialist: In medicine, one who concentrates on 1 special branch of medical science. [NIH]

Species: A taxonomic category subordinate to a genus (or subgenus) and superior to a subspecies or variety, composed of individuals possessing common characters distinguishing them from other categories of individuals of the same taxonomic level. In taxonomic nomenclature, species are designated by the genus name followed by a Latin or Latinized adjective or noun. [EU]

Sperm: The fecundating fluid of the male. [NIH]

Sperm Head: The anterior, usually ovoid, nucleus-containing part of spermatozoa. [NIH]

Spermatogenesis: Process of formation and development of spermatozoa, including spermatocytogenesis and spermiogenesis. [NIH]

Spermatozoa: Mature male germ cells that develop in the seminiferous tubules of the testes. Each consists of a head, a body, and a tail that provides propulsion. The head consists mainly of chromatin. [NIH]

Spermatozoon: The mature male germ cell. [NIH]

Spermicide: An agent that is destructive to spermatozoa. [EU]

Spleen: An organ that is part of the lymphatic system. The spleen produces lymphocytes, filters the blood, stores blood cells, and destroys old blood cells. It is located on the left side of the abdomen near the stomach. [NIH]

Spontaneous Abortion: The non-induced birth of an embryo or of fetus prior to the stage of viability at about 20 weeks of gestation. [NIH]

Spotting: A slight discharge of blood via the vagina, especially as a side-effect of oral contraceptives. [EU]

Squamous: Scaly, or platelike. [EU]

Squamous cells: Flat cells that look like fish scales under a microscope. These cells cover internal and external surfaces of the body. [NIH]

Squamous intraepithelial lesion: SIL. A general term for the abnormal growth of

squamous cells on the surface of the cervix. The changes in the cells are described as low grade or high grade, depending on how much of the cervix is affected and how abnormal the cells appear. [NIH]

Stabilization: The creation of a stable state. [EU]

Stem Cells: Relatively undifferentiated cells of the same lineage (family type) that retain the ability to divide and cycle throughout postnatal life to provide cells that can become specialized and take the place of those that die or are lost. [NIH]

Sterile: Unable to produce children. [NIH]

Sterilization: The destroying of all forms of life, especially microorganisms, by heat, chemical, or other means. [NIH]

Steroid: A group name for lipids that contain a hydrogenated cyclopentanoperhydrophenanthrene ring system. Some of the substances included in this group are progesterone, adrenocortical hormones, the gonadal hormones, cardiac aglycones, bile acids, sterols (such as cholesterol), toad poisons, saponins, and some of the carcinogenic hydrocarbons. [EU]

Stillbirth: The birth of a dead fetus or baby. [NIH]

Stimulus: That which can elicit or evoke action (response) in a muscle, nerve, gland or other excitable issue, or cause an augmenting action upon any function or metabolic process. [NIH]

Stomach: An organ of digestion situated in the left upper quadrant of the abdomen between the termination of the esophagus and the beginning of the duodenum. [NIH]

Stress: Forcibly exerted influence; pressure. Any condition or situation that causes strain or tension. Stress may be either physical or psychological, or both. [NIH]

Stroke: Sudden loss of function of part of the brain because of loss of blood flow. Stroke may be caused by a clot (thrombosis) or rupture (hemorrhage) of a blood vessel to the brain. [NIH]

Stromal: Large, veil-like cell in the bone marrow. [NIH]

Subacute: Somewhat acute; between acute and chronic. [EU]

Subarachnoid: Situated or occurring between the arachnoid and the pia mater. [EU]

Subclinical: Without clinical manifestations; said of the early stage(s) of an infection or other disease or abnormality before symptoms and signs become apparent or detectable by clinical examination or laboratory tests, or of a very mild form of an infection or other disease or abnormality. [EU]

Sublingual: Located beneath the tongue. [EU]

Submandibular: Four to six lymph glands, located between the lower jaw and the submandibular salivary gland. [NIH]

Subspecies: A category intermediate in rank between species and variety, based on a smaller number of correlated characters than are used to differentiate species and generally conditioned by geographical and/or ecological occurrence. [NIH]

Substance P: An eleven-amino acid neurotransmitter that appears in both the central and peripheral nervous systems. It is involved in transmission of pain, causes rapid contractions of the gastrointestinal smooth muscle, and modulates inflammatory and immune responses. [NIH]

Suction: The removal of secretions, gas or fluid from hollow or tubular organs or cavities by means of a tube and a device that acts on negative pressure. [NIH]

Support group: A group of people with similar disease who meet to discuss how better to

cope with their cancer and treatment. [NIH]

Suppositories: A small cone-shaped medicament having cocoa butter or gelatin at its basis and usually intended for the treatment of local conditions in the rectum. [NIH]

Suprarenal: Above a kidney. [NIH]

Symphysis: A secondary cartilaginous joint. [NIH]

Symptomatic: Having to do with symptoms, which are signs of a condition or disease. [NIH]

Syphilis: A contagious venereal disease caused by the spirochete *Treponema pallidum*. [NIH]

Systemic: Affecting the entire body. [NIH]

Systemic lupus erythematosus: SLE. A chronic inflammatory connective tissue disease marked by skin rashes, joint pain and swelling, inflammation of the kidneys, inflammation of the fibrous tissue surrounding the heart (i.e., the pericardium), as well as other problems. Not all affected individuals display all of these problems. May be referred to as lupus. [NIH]

Systolic: Indicating the maximum arterial pressure during contraction of the left ventricle of the heart. [EU]

Taboo: Any negative tradition or behavior that is generally regarded as harmful to social welfare and forbidden within a cultural or social group. [NIH]

Terminator: A DNA sequence sited at the end of a transcriptional unit that signals the end of transcription. [NIH]

Testicle: The male gonad where, in adult life, spermatozoa develop; the testis. [NIH]

Testicular: Pertaining to a testis. [EU]

Testis: Either of the paired male reproductive glands that produce the male germ cells and the male hormones. [NIH]

Testosterone: A hormone that promotes the development and maintenance of male sex characteristics. [NIH]

Tetracycline: An antibiotic originally produced by *Streptomyces viridifaciens*, but used mostly in synthetic form. It is an inhibitor of aminoacyl-tRNA binding during protein synthesis. [NIH]

Thalidomide: A pharmaceutical agent originally introduced as a non-barbiturate hypnotic, but withdrawn from the market because of its known teratogenic effects. It has been reintroduced and used for a number of immunological and inflammatory disorders. Thalidomide displays immunosuppressive and anti-angiogenic activity. It inhibits release of tumor necrosis factor alpha from monocytes, and modulates other cytokine action. [NIH]

Therapeutics: The branch of medicine which is concerned with the treatment of diseases, palliative or curative. [NIH]

Thigh: A leg; in anatomy, any elongated process or part of a structure more or less comparable to a leg. [NIH]

Third Ventricle: A narrow cleft inferior to the corpus callosum, within the diencephalon, between the paired thalami. Its floor is formed by the hypothalamus, its anterior wall by the lamina terminalis, and its roof by ependyma. It communicates with the fourth ventricle by the cerebral aqueduct, and with the lateral ventricles by the interventricular foramina. [NIH]

Thoracic: Having to do with the chest. [NIH]

Thorax: A part of the trunk between the neck and the abdomen; the chest. [NIH]

Threonine: An essential amino acid occurring naturally in the L-form, which is the active form. It is found in eggs, milk, gelatin, and other proteins. [NIH]

Threshold: For a specified sensory modality (e. g. light, sound, vibration), the lowest level (absolute threshold) or smallest difference (difference threshold, difference limen) or intensity of the stimulus discernible in prescribed conditions of stimulation. [NIH]

Thrombocytes: Blood cells that help prevent bleeding by causing blood clots to form. Also called platelets. [NIH]

Thrombophlebitis: Inflammation of a vein associated with thrombus formation. [NIH]

Thrombosis: The formation or presence of a blood clot inside a blood vessel. [NIH]

Thrombus: An aggregation of blood factors, primarily platelets and fibrin with entrapment of cellular elements, frequently causing vascular obstruction at the point of its formation. Some authorities thus differentiate thrombus formation from simple coagulation or clot formation. [EU]

Thrush: A disease due to infection with species of fungi of the genus *Candida*. [NIH]

Thymus: An organ that is part of the lymphatic system, in which T lymphocytes grow and multiply. The thymus is in the chest behind the breastbone. [NIH]

Time Factors: Elements of limited time intervals, contributing to particular results or situations. [NIH]

Tissue: A group or layer of cells that are alike in type and work together to perform a specific function. [NIH]

Tolerance: 1. The ability to endure unusually large doses of a drug or toxin. 2. Acquired drug tolerance; a decreasing response to repeated constant doses of a drug or the need for increasing doses to maintain a constant response. [EU]

Tome: A zone produced by a number of irregular spaces contained in the outermost layer of denture of the root of a tooth. [NIH]

Torsion: A twisting or rotation of a bodily part or member on its axis. [NIH]

Toxic: Having to do with poison or something harmful to the body. Toxic substances usually cause unwanted side effects. [NIH]

Toxicity: The quality of being poisonous, especially the degree of virulence of a toxic microbe or of a poison. [EU]

Toxicology: The science concerned with the detection, chemical composition, and pharmacologic action of toxic substances or poisons and the treatment and prevention of toxic manifestations. [NIH]

Toxin: A poison; frequently used to refer specifically to a protein produced by some higher plants, certain animals, and pathogenic bacteria, which is highly toxic for other living organisms. Such substances are differentiated from the simple chemical poisons and the vegetable alkaloids by their high molecular weight and antigenicity. [EU]

Toxoplasma: A genus of protozoa parasitic to birds and mammals. *T. gondii* is one of the most common infectious pathogenic animal parasites of man. [NIH]

Transaminase: Aminotransferase (= a subclass of enzymes of the transferase class that catalyse the transfer of an amino group from a donor (generally an amino acid) to an acceptor (generally 2-keto acid). Most of these enzymes are pyridoxal-phosphate-proteins. [EU]

Transcriptase: An enzyme which catalyses the synthesis of a complementary mRNA molecule from a DNA template in the presence of a mixture of the four ribonucleotides (ATP, UTP, GTP and CTP). [NIH]

Transfer Factor: Factor derived from leukocyte lysates of immune donors which can transfer both local and systemic cellular immunity to nonimmune recipients. [NIH]

Transfusion: The infusion of components of blood or whole blood into the bloodstream. The blood may be donated from another person, or it may have been taken from the person earlier and stored until needed. [NIH]

Transmitter: A chemical substance which effects the passage of nerve impulses from one cell to the other at the synapse. [NIH]

Transplantation: Transference of a tissue or organ, alive or dead, within an individual, between individuals of the same species, or between individuals of different species. [NIH]

Transvaginal ultrasound: A procedure used to examine the vagina, uterus, fallopian tubes, and bladder. An instrument is inserted into the vagina, and sound waves bounce off organs inside the pelvic area. These sound waves create echoes, which a computer uses to create a picture called a sonogram. Also called TVS. [NIH]

Trauma: Any injury, wound, or shock, must frequently physical or structural shock, producing a disturbance. [NIH]

Tuberculosis: Any of the infectious diseases of man and other animals caused by species of Mycobacterium. [NIH]

Tumor Necrosis Factor: Serum glycoprotein produced by activated macrophages and other mammalian mononuclear leukocytes which has necrotizing activity against tumor cell lines and increases ability to reject tumor transplants. It mimics the action of endotoxin but differs from it. It has a molecular weight of less than 70,000 kDa. [NIH]

Unconscious: Experience which was once conscious, but was subsequently rejected, as the "personal unconscious". [NIH]

Uraemia: 1. An excess in the blood of urea, creatinine, and other nitrogenous end products of protein and amino acids metabolism; more correctly referred to as azotemia. 2. In current usage the entire constellation of signs and symptoms of chronic renal failure, including nausea, vomiting, anorexia, a metallic taste in the mouth, a uraemic odour of the breath, pruritus, uraemic frost on the skin, neuromuscular disorders, pain and twitching in the muscles, hypertension, edema, mental confusion, and acid-base and electrolyte imbalances. [EU]

Ureters: Tubes that carry urine from the kidneys to the bladder. [NIH]

Urethra: The tube through which urine leaves the body. It empties urine from the bladder. [NIH]

Urine: Fluid containing water and waste products. Urine is made by the kidneys, stored in the bladder, and leaves the body through the urethra. [NIH]

Uterine Contraction: Contraction of the uterine muscle. [NIH]

Uterus: The small, hollow, pear-shaped organ in a woman's pelvis. This is the organ in which a fetus develops. Also called the womb. [NIH]

Vaccination: Administration of vaccines to stimulate the host's immune response. This includes any preparation intended for active immunological prophylaxis. [NIH]

Vaccine: A substance or group of substances meant to cause the immune system to respond to a tumor or to microorganisms, such as bacteria or viruses. [NIH]

Vagina: The muscular canal extending from the uterus to the exterior of the body. Also called the birth canal. [NIH]

Vaginal: Of or having to do with the vagina, the birth canal. [NIH]

Valproic Acid: A fatty acid with anticonvulsant properties used in the treatment of epilepsy. The mechanisms of its therapeutic actions are not well understood. It may act by increasing GABA levels in the brain or by altering the properties of voltage dependent

sodium channels. [NIH]

Varicose: The common ulcer in the lower third of the leg or near the ankle. [NIH]

Varicose Ulcer: Ulcer due to varicose veins. Chronic venous insufficiency in the deep veins of the legs leads to shunting the venous return into the superficial veins, in which pressure and flow rate, as well as oxygen content, are increased. [NIH]

Vascular: Pertaining to blood vessels or indicative of a copious blood supply. [EU]

Vasculitis: Inflammation of a blood vessel. [NIH]

Vasectomy: An operation to cut or tie off the two tubes that carry sperm out of the testicles. [NIH]

Vasomotor: 1. Affecting the calibre of a vessel, especially of a blood vessel. 2. Any element or agent that effects the calibre of a blood vessel. [EU]

VE: The total volume of gas either inspired or expired in one minute. [NIH]

Vein: Vessel-carrying blood from various parts of the body to the heart. [NIH]

Venous: Of or pertaining to the veins. [EU]

Venous blood: Blood that has given up its oxygen to the tissues and carries carbon dioxide back for gas exchange. [NIH]

Venous Thrombosis: The formation or presence of a thrombus within a vein. [NIH]

Vesicular: 1. Composed of or relating to small, saclike bodies. 2. Pertaining to or made up of vesicles on the skin. [EU]

Veterinary Medicine: The medical science concerned with the prevention, diagnosis, and treatment of diseases in animals. [NIH]

Video Recording: The storing or preserving of video signals for television to be played back later via a transmitter or receiver. Recordings may be made on magnetic tape or discs (videodisc recording). [NIH]

Videodisc Recording: The storing of visual and usually sound signals on discs for later reproduction on a television screen or monitor. [NIH]

Viral: Pertaining to, caused by, or of the nature of virus. [EU]

Viral Hepatitis: Hepatitis caused by a virus. Five different viruses (A, B, C, D, and E) most commonly cause this form of hepatitis. Other rare viruses may also cause hepatitis. [NIH]

Virilism: Development of masculine traits in the female. [NIH]

Virulence: The degree of pathogenicity within a group or species of microorganisms or viruses as indicated by case fatality rates and/or the ability of the organism to invade the tissues of the host. [NIH]

Virus: Submicroscopic organism that causes infectious disease. In cancer therapy, some viruses may be made into vaccines that help the body build an immune response to, and kill, tumor cells. [NIH]

Viscera: Any of the large interior organs in any one of the three great cavities of the body, especially in the abdomen. [NIH]

Visceral: , from viscus a viscus) pertaining to a viscus. [EU]

Vitreous: Glasslike or hyaline; often used alone to designate the vitreous body of the eye (corpus vitreum). [EU]

Vitreous Hemorrhage: Hemorrhage into the vitreous body. [NIH]

Vitro: Descriptive of an event or enzyme reaction under experimental investigation occurring outside a living organism. Parts of an organism or microorganism are used

together with artificial substrates and/or conditions. [NIH]

Vulva: The external female genital organs, including the clitoris, vaginal lips, and the opening to the vagina. [NIH]

Vulvovaginitis: Inflammation of the vulva and vagina, or of the vulvovaginal glands. [EU]

Warts: Benign epidermal proliferations or tumors; some are viral in origin. [NIH]

White blood cell: A type of cell in the immune system that helps the body fight infection and disease. White blood cells include lymphocytes, granulocytes, macrophages, and others. [NIH]

Withdrawal: 1. A pathological retreat from interpersonal contact and social involvement, as may occur in schizophrenia, depression, or schizoid avoidant and schizotypal personality disorders. 2. (DSM III-R) A substance-specific organic brain syndrome that follows the cessation of use or reduction in intake of a psychoactive substance that had been regularly used to induce a state of intoxication. [EU]

Womb: A hollow, thick-walled, muscular organ in which the impregnated ovum is developed into a child. [NIH]

Xenograft: The cells of one species transplanted to another species. [NIH]

X-ray: High-energy radiation used in low doses to diagnose diseases and in high doses to treat cancer. [NIH]

Zidovudine: A dideoxynucleoside compound in which the 3'-hydroxy group on the sugar moiety has been replaced by an azido group. This modification prevents the formation of phosphodiester linkages which are needed for the completion of nucleic acid chains. The compound is a potent inhibitor of HIV replication, acting as a chain-terminator of viral DNA during reverse transcription. It improves immunologic function, partially reverses the HIV-induced neurological dysfunction, and improves certain other clinical abnormalities associated with AIDS. Its principal toxic effect is dose-dependent suppression of bone marrow, resulting in anemia and leukopenia. [NIH]

Zona Pellucida: The transport non-cellular envelope surrounding the mammalian ovum. [NIH]

Zygote: The fertilized ovum. [NIH]

INDEX

A

Abdominal, 4, 293, 302, 319, 322
 Acceptor, 293, 331
 Acrosome, 293
 Acrosome Reaction, 293
 Adjustment, 250, 293, 327
 Adolescence, 11, 42, 247, 248, 293
 Adrenal Cortex, 293, 301, 305, 310, 322
 Adverse Effect, 293, 320, 327
 Age Factors, 244, 293
 Ageing, 39, 293
 Albumin, 293, 319
 Alcoholic Beverages, 293, 305
 Alertness, 294
 Algorithms, 6, 294
 Alpha Particles, 294, 324
 Alternative medicine, 294
 Amenorrhea, 58, 268, 272, 294
 Amino acid, 294, 295, 320, 321, 323, 326, 327, 329, 330, 331, 332
 Amino Acid Sequence, 294, 295, 327
 Amyloid, 294
 Anaesthesia, 294, 311
 Anal, 294, 313
 Analgesic, 294, 310
 Analog, 294, 313
 Anatomical, 294, 299, 311, 326
 Androgen-Binding Protein, 294, 327
 Androgenic, 294
 Androgens, 293, 294, 310
 Anemia, 4, 294, 309, 314, 334
 Anesthesia, 295
 Angiogenesis, 295
 Animal model, 295
 Anthropology, 32, 295
 Antibiotic, 53, 295, 320, 330
 Antibodies, 40, 295, 310, 314, 321
 Antibody, 36, 295, 300, 311, 316, 324
 Anticonvulsants, 246, 295
 Antiepileptic, 5, 246, 247, 295
 Antigen, 35, 295, 300, 310, 311
 Anti-inflammatory, 295, 296, 307, 310
 Anti-Inflammatory Agents, 295, 296
 Antiviral, 295, 317, 320
 Anus, 294, 295, 297, 300, 312
 Anxiety, 247, 295
 Apheresis, 295
 Aphthous Stomatitis, 295

Applicability, 6, 295
 Aqueous, 295, 296, 302, 313
 Arterial, 295, 310, 313, 323, 330
 Arteries, 295, 297, 301, 316, 317
 Artery, 295, 301, 319
 Aseptic, 296
 Aspirin, 296
 Asymptomatic, 296, 308, 319
 Autodigestion, 296, 319
 Autoimmune disease, 296
 Azoospermia, 296

B

Bacteria, 295, 296, 316, 331, 332
 Barbiturate, 296, 330
 Base, 296, 312, 332
 Basement Membrane, 296, 306
 Beta blocker, 244, 296
 Bewilderment, 296, 301
 Bile, 296, 307, 313, 329
 Biliary, 296, 319
 Biliary Tract, 296, 319
 Bioavailability, 296, 311
 Biological Transport, 296, 303
 Biopsy, 296
 Biosynthesis, 296, 323
 Bladder, 243, 296, 300, 312, 323, 332
 Blastocyst, 296, 301, 304, 321
 Bloating, 297
 Blood Cell Count, 297, 309
 Blood Glucose, 4, 244, 245, 297, 309
 Blood pressure, 244, 297, 298, 310, 316, 328
 Blood transfusion, 297
 Blood vessel, 295, 296, 297, 298, 299, 312, 314, 328, 329, 331, 333
 Body Fluids, 297, 304, 328
 Bone Marrow, 297, 311, 314, 316, 328, 329, 334
 Bone scan, 297
 Bowel, 294, 297, 303
 Bowel Movement, 297, 303
 Brachytherapy, 297, 312, 324
 Brain Injuries, 246, 297
 Brain Stem, 297
 Branch, 287, 297, 314, 318, 319, 323, 328, 330
 Breast Feeding, 55, 57, 297
 Breast Self-Examination, 77, 297
 Buccal, 297, 314

C

Capsules, 297, 303, 307
 Carbamazepine, 29, 297
 Carbohydrate, 298, 308, 321
 Carcinogenic, 298, 312, 329
 Carcinoma, 10, 298, 302
 Cardiac, 298, 317, 329
 Cardiovascular, 82, 83, 261, 298
 Cardiovascular disease, 261, 298
 Case report, 298, 299
 Case series, 298, 299
 Catalyze, 298, 331
 Catheter, 298
 Caudal, 298, 302, 310, 321
 Cell Differentiation, 298
 Cell Division, 296, 298, 321, 322
 Cellulose, 298, 307, 321
 Central Nervous System, 298, 309
 Central Nervous System Infections, 298, 309
 Centrifugation, 298, 309, 316
 Cerebral, 30, 297, 299, 314, 323, 330
 Cerebral hemispheres, 297, 299
 Cerebrovascular, 298, 299
 Cerebrum, 299
 Cervical, 4, 21, 34, 59, 240, 243, 245, 267, 270, 274, 299
 Cervix, 10, 243, 290, 293, 299, 300, 303, 329
 Chemotherapy, 15, 244, 299
 Chimeric Proteins, 299
 Chin, 299, 315
 Chromatin, 299, 328
 Chromosome, 299, 308, 313
 Chronic, 21, 28, 29, 247, 297, 299, 302, 303, 311, 316, 319, 321, 329, 330, 332, 333
 CIS, 268, 269, 299, 325
 Clinical study, 42, 299
 Clinical trial, 7, 34, 55, 77, 84, 259, 299, 324
 Clonic, 248, 299
 Coagulation, 299, 312, 331
 Coenzymes, 300, 318
 Cofactor, 300, 323
 Coitus, 4, 22, 300
 Coitus Interruptus, 4, 300
 Colon, 300, 312
 Colposcopy, 243, 300
 Combination Therapy, 300, 305
 Complement, 300
 Complementary and alternative medicine, 53, 66, 300
 Complementary medicine, 53, 300
 Compliance, 5, 247, 248, 300

Computational Biology, 259, 301
 Conception, 4, 22, 37, 55, 239, 253, 260, 293, 301, 306, 322
 Condoms, 4, 6, 22, 23, 26, 44, 46, 252, 267, 268, 271, 272, 273, 274, 290, 301
 Cone, 301, 330
 Confusion, 248, 301, 303, 332
 Conjugated, 80, 301
 Connective Tissue, 297, 301, 306, 307, 314, 325, 326, 330
 Contraindications, ii, 301
 Coronary, 82, 83, 298, 301, 316, 317
 Coronary heart disease, 298, 301
 Coronary Thrombosis, 301, 316, 317
 Corpus, 301, 320, 322, 330, 333
 Corpus Luteum, 301, 322
 Cortex, 301
 Cortical, 301, 317, 326
 Corticosteroids, 301, 307
 Cortisol, 293, 301
 Cranial, 301, 302, 306, 309
 Craniocerebral Trauma, 302, 309
 Creatinine, 302, 332
 Cryotherapy, 243, 302
 Curative, 302, 318, 330
 Cutaneous, 302, 308, 314
 Cyproterone, 302, 306
 Cytokine, 302, 330
 Cytoplasm, 302, 308, 316

D

Databases, Bibliographic, 259, 302
 Decorum, 248, 302
 Degenerative, 302, 309, 325
 Dendrites, 302, 317
 Diabetes Insipidus, 302, 310
 Diabetes Mellitus, 5, 302, 309, 312
 Diabetic Retinopathy, 7, 302
 Diagnostic procedure, 87, 302
 Diaphragm, 4, 10, 22, 78, 245, 267, 270, 271, 272, 274, 302
 Diastolic, 302, 310
 Diencephalon, 302, 310, 330
 Diffuse Axonal Injury, 297, 303
 Diffusion, 15, 73, 75, 296, 303
 Digestion, 296, 297, 303, 313, 329
 Digestive system, 84, 303
 Dihydrotestosterone, 303, 327
 Dilatation, 293, 303
 Diploid, 303, 321
 Direct, iii, 5, 80, 279, 303, 324
 Discrimination, 27, 303
 Disease Progression, 303

- Disorientation, 301, 303
- Diuretic, 303, 310
- Dizziness, 303
- Dosage Forms, 303
- Dose-dependent, 303, 334
- Douche, 270, 303
- Doxycycline, 79, 303
- Drive, ii, vii, 47, 247, 248, 303, 313
- Drug Interactions, 5, 281, 303
- Drug Tolerance, 303, 331
- Duct, 78, 304, 325
- Duodenum, 296, 304, 329
- Dyspareunia, 304, 305
- Dysplasia, 59, 243, 304
- Dyspnea, 44, 304
- E**
- Ectopic, 25, 261, 268, 304
- Ectopic Pregnancy, 25, 261, 268, 304
- Edema, 302, 304, 310, 332
- Efficacy, 6, 26, 38, 55, 71, 274, 275, 304
- Ejaculation, 300, 304, 326
- Elastic, 304, 328
- Elective, 36, 244, 304
- Electrolytes, 296, 304, 310
- Electrons, 296, 304, 324
- Embryo, 293, 296, 298, 304, 311, 322, 328
- Embryo Transfer, 304, 322
- Enanthate, 304
- Endemic, 304, 314
- Endocrinology, 24, 304, 308
- Endometrial, 79, 243, 304, 305
- Endometriosis, 59, 305, 313, 318
- Endometrium, 304, 305, 315
- Endopeptidases, 305, 323
- Endoscope, 300, 305
- Environmental Health, 258, 260, 305
- Enzyme, 5, 300, 305, 323, 331, 333
- Epithelial, 296, 305
- Epithelial Cells, 305
- Epithelium, 296, 305, 319
- Erectile, 245, 305, 320
- Erection, 305
- Erythrocyte Indices, 297, 305
- Erythrocytes, 294, 297, 305
- Escalation, 305
- Esophagus, 303, 305, 329
- Estradiol, 63, 280, 305, 327
- Estrogen, 4, 5, 7, 63, 82, 244, 302, 305
- Estrogen Replacement Therapy, 244, 305
- Ethanol, 293, 305
- Eugenic, 17, 305
- Euthanasia, 43, 238, 305
- Exhaustion, 306, 314
- Exogenous, 8, 306
- External-beam radiation, 306, 324
- Extracellular, 294, 301, 306, 328
- Extracellular Matrix, 301, 306
- Extracellular Space, 306
- Extremity, 306, 313
- F**
- Facial, 306, 319
- Facial Nerve, 306, 319
- Fallopian tube, 306, 332
- Family Health, 245, 267, 268, 306
- Fat, 297, 301, 306, 325, 328
- Fathers, 250, 306
- Femoral, 12, 306
- Femur, 306
- Fertilization in Vitro, 306, 322
- Fetal Alcohol Syndrome, 249, 306
- Fetus, 246, 293, 306, 321, 322, 328, 329, 332
- Fibrosis, 306, 326
- Flutamide, 38, 306
- Forearm, 297, 306
- Friction, 307, 314
- Fungi, 307, 316, 331
- Fungus, 307, 316
- G**
- Gallbladder, 293, 296, 303, 307
- Gamma Rays, 307, 324
- Gas, 303, 307, 310, 329, 333
- Gastric, 296, 303, 307
- Gastrin, 307, 309
- Gelatin, 307, 330
- Gene, 77, 241, 307
- Genital, 243, 261, 307, 308, 334
- Germ Cells, 307, 318, 319, 328, 330
- Gestation, 307, 320, 321, 328
- Ginkgo biloba, 307
- Gland, 293, 307, 310, 314, 319, 321, 323, 326, 329
- Glucocorticoid, 307
- Glucose, 78, 244, 245, 297, 298, 302, 307, 308, 309, 312, 324, 325
- Glucose tolerance, 307
- Glucose Tolerance Test, 307, 308
- Glycoprotein, 308, 327, 332
- Gonad, 308, 330
- Gonadal, 308, 329
- Gonadorelin, 308, 313
- Gonadotropin, 35, 36, 308, 313
- Gonorrhoea, 308, 318
- Governing Board, 308, 322
- Gp120, 308, 320

- Grade, 72, 243, 272, 273, 308, 329
 Grafting, 308, 311
 Granulocytes, 308, 334
 Gravidity, 308, 319
 Growth, 59, 293, 294, 295, 306, 308, 309, 315, 317, 321, 326, 328
 Gynecology, 12, 21, 24, 27, 30, 31, 33, 41, 43, 45, 252, 308
- H**
 Haploid, 308, 321
 Harmony, 32, 308
 Headache, 290, 309, 322
 Headache Disorders, 309
 Health Behavior, 6, 309
 Heart attack, 244, 298, 309
 Hematocrit, 297, 305, 309
 Hemiparesis, 297, 309
 Hemoglobin, 7, 295, 297, 305, 309
 Hemorrhage, 302, 309, 329, 333
 Hepatic, 5, 293, 308, 309
 Hepatitis, 309, 333
 Heredity, 20, 307, 309
 Hirsutism, 38, 302, 309, 310
 Hormonal, 4, 5, 28, 45, 78, 79, 80, 81, 247, 305, 309
 Hormone Replacement Therapy, 7, 80, 309
 Host, 309, 311, 332, 333
 Human papillomavirus, 243, 309
 Hydrochlorothiazide, 244, 310
 Hydrogen, 293, 296, 298, 310, 316, 317, 323
 Hydrolysis, 310, 321
 Hyperandrogenism, 83, 310
 Hypericum, 63, 65, 81, 310
 Hypertension, 4, 7, 60, 298, 309, 310, 332
 Hypertrichosis, 309, 310
 Hypnotic, 296, 310, 330
 Hypothalamus, 302, 308, 310, 321, 330
 Hysterectomy, 244, 310
- I**
 Ibuprofen, 310
 Id, 5, 48, 57, 267, 268, 276, 286, 288, 310
 Idiopathic, 246, 310
 Immune function, 310
 Immune response, 295, 296, 310, 311, 329, 332, 333
 Immune Sera, 310, 311
 Immune system, 310, 311, 314, 332, 334
 Immunity, 310, 311, 331
 Immunization, 311
 Immunodeficiency, 3, 243, 271, 274, 311
 Immunodeficiency syndrome, 3, 271, 274, 311
 Immunogenic, 311
 Immunologic, 311, 324, 334
 Immunosuppressive, 307, 311
 Impairment, 247, 296, 311, 315
 Implant radiation, 311, 312, 324
 Implantation, 301, 311
 Impotence, 245, 305, 311
 In situ, 248, 311
 In vitro, 304, 311
 In vivo, 311
 Incision, 311, 312
 Indinavir, 78, 311
 Induction, 294, 311
 Infarction, 60, 83, 311
 Infertility, 53, 261, 311
 Inflammation, 61, 293, 295, 296, 306, 309, 311, 318, 319, 321, 325, 330, 331, 333, 334
 Informed Consent, 267, 312
 Infusion, 312, 332
 Ingestion, 308, 312, 321
 Initiation, 12, 312
 Insomnia, 312, 322
 Insulin, 5, 308, 312
 Internal radiation, 312, 324
 Intestinal, 307, 312
 Intestines, 293, 312
 Intoxication, 312, 334
 Intracellular, 311, 312, 322
 Intraepithelial, 312
 Intravenous, 243, 312
 Intravenous pyelogram, 243, 312
 Invasive, 310, 312
- J**
 Joint, 243, 312, 330
- K**
 Kb, 258, 312
 Keto, 312, 331
- L**
 Lactation, 20, 244, 312
 Large Intestine, 303, 312, 324, 327
 Laser Surgery, 244, 312
 Lavage, 78, 312
 Leg Ulcer, 313
 Lens, 23, 313, 325
 Lesion, 313
 Leukapheresis, 295, 313
 Leukocytes, 297, 308, 313, 316, 332
 Leukopenia, 313, 334
 Leuprolide, 83, 313
 Levonorgestrel, 6, 79, 313, 318

- Libido, 294, 313
- Library Services, 286, 313
- Life Expectancy, 313
- Ligament, 306, 313, 323
- Ligands, 313
- Ligation, 268, 290, 313
- Linkage, 313
- Lip, 313
- Liver, 293, 296, 303, 307, 309, 313
- Localized, 243, 297, 309, 310, 311, 313, 321
- Locomotion, 313, 321
- Longitudinal study, 10, 313
- Loop, 244, 314
- Lubricants, 314
- Lubrication, 245, 314
- Lumbar, 12, 314
- Lupus, 60, 61, 80, 82, 314, 330
- Lymph, 299, 314, 317, 329
- Lymph node, 299, 314, 317
- Lymphatic, 311, 314, 328, 331
- Lymphatic system, 314, 328, 331
- Lymphocyte, 295, 314
- Lymphoid, 295, 301, 314
- Lymphoma, 314, 316
- Lymphoproliferative, 314
- M**
- Malaria, 314
- Malaria, Falciparum, 314
- Malaria, Vivax, 314
- Malignancy, 314, 319
- Malignant, 315, 316, 317, 324, 326
- Mammogram, 77, 315
- Mass Media, 11, 69, 75, 315
- Maternal Mortality, 9, 315
- Maximum Tolerated Dose, 304, 315
- Mediate, 315
- Medicament, 315, 330
- MEDLINE, 259, 315
- Medroxyprogesterone, 64, 78, 280, 315
- Medroxyprogesterone Acetate, 78, 315
- Membrane, 295, 300, 305, 308, 315, 316, 320, 322, 325, 328
- Memory, 315
- Menopause, 20, 83, 245, 315, 320, 321, 322
- Menstrual Cycle, 40, 80, 245, 315, 322
- Menstruation, 59, 60, 245, 294, 315
- Mental, v, 7, 38, 85, 239, 247, 258, 262, 290, 299, 301, 303, 306, 315, 323, 332
- Mental deficiency, 306, 315
- Mental Disorders, 85, 315, 323
- Mental Health, v, 7, 38, 85, 247, 258, 262, 315, 323
- Mentors, 249, 315
- Metabolite, 315
- Metastasis, 315, 316
- Metastasize, 315, 326
- Metastatic, 315, 316, 326
- MI, 291, 316
- Microbe, 316, 331
- Microsomal, 5, 316
- Mitochondrial Swelling, 316, 317
- Modification, 7, 294, 316, 324, 334
- Molecular, 259, 262, 301, 316, 327, 331, 332
- Molecule, 295, 296, 300, 308, 310, 316, 324, 331
- Monitor, 302, 316, 318, 333
- Monoclonal, 316, 324
- Monocytes, 313, 316, 330
- Morals, 242, 316
- Morphogenesis, 306, 316
- Morphological, 293, 304, 307, 316
- Motion Sickness, 316, 317
- Mucins, 316, 325
- Mucosa, 314, 316
- Muscle relaxant, 316, 320
- Muscle Spindles, 316, 320
- Mycosis, 316
- Mycosis Fungoides, 316
- Myocardial infarction, 83, 301, 316, 317
- Myocardium, 316, 317
- N**
- Nausea, 4, 247, 290, 303, 317, 322, 332
- NCI, 1, 77, 84, 257, 268, 269, 299, 317
- Necrosis, 311, 316, 317
- Need, 3, 4, 25, 43, 75, 78, 235, 238, 243, 245, 251, 252, 260, 277, 317, 327, 331
- Needle Sharing, 252, 317
- Needs Assessment, 57, 317
- Nelfinavir, 78, 317
- Neoplasia, 317
- Neoplasm, 77, 317, 326
- Neoplastic, 297, 314, 317
- Nerve, 295, 299, 302, 306, 317, 325, 326, 329, 332
- Nervous System, 298, 317, 329
- Neurobehavioral Manifestations, 297, 303, 317
- Neurologic, 297, 317
- Neurons, 246, 302, 316, 317
- Neutrons, 294, 317, 324
- Nevirapine, 78, 318
- Niacin, 49, 50, 244, 318
- Non-nucleoside, 318
- Norgestrel, 313, 318

- Nuclear, 304, 307, 317, 318
 Nucleic acid, 318, 334
 Nucleus, 293, 299, 302, 307, 316, 317, 318,
 322, 323, 328
O
 Odds Ratio, 318, 325
 Ointments, 303, 318
 Oocytes, 318
 Oophoritis, 308, 318
 Ophthalmologic, 39, 318
 Ophthalmology, 318
 Optic Chiasm, 310, 318
 Orchitis, 245, 318
 Orgasm, 245, 304, 318, 326
 Osteoporosis, 305, 319
 Outpatient, 319
 Ovalbumin, 319
 Ovaries, 77, 310, 319, 327
 Ovary, 301, 305, 308, 310, 318, 319
 Overdose, 289, 319
 Ovulation, 10, 28, 29, 33, 81, 274, 318, 319,
 325
 Ovum, 41, 293, 301, 307, 319, 320, 322, 334
P
 Palliative, 302, 319, 330
 Pancreas, 293, 303, 312, 319
 Pancreatic, 319
 Pancreatitis, 16, 319
 Papillomavirus, 319
 Parasitic, 319, 331
 Parity, 8, 12, 319
 Parotid, 319
 Paroxysmal, 13, 309, 319
 Patch, 5, 44, 319
 Pathologic, 296, 301, 319
 Patient Education, 271, 272, 273, 284, 286,
 291, 319
 Pedigree, 244, 319
 Pellucida, 320
 Pelvic, 60, 77, 243, 269, 305, 320, 323, 332
 Pelvis, 314, 319, 320, 332
 Penicillin, 23, 320
 Penis, 290, 301, 304, 320
 Peptide, 294, 305, 320, 321, 323
 Peptide T, 320
 Perception, 252, 301, 308, 320, 326
 Perennial, 310, 320
 Perimenopausal, 320
 Perinatal, 250, 320
 Pharmaceutical Solutions, 303, 320
 Pharmacist, 80, 320
 Pharmacokinetic, 320
 Pharmacologic, 295, 320, 331
 Phenyl, 320
 Phenytoin, 64, 297, 320
 Physical Examination, 275, 320
 Physiologic, 296, 315, 320, 324
 Physiology, 236, 239, 304, 308, 321
 Pituitary Gland, 308, 321, 326
 Placenta, 305, 321, 322
 Plants, 55, 56, 307, 310, 321, 325, 331
 Plasma, 293, 295, 307, 308, 309, 313, 321,
 326, 327
 Plasma cells, 295, 321
 Plasmapheresis, 295, 321
 Plateletpheresis, 295, 321
 Platelets, 321, 331
 Platinum, 314, 321
 Pneumonia, 301, 321
 Poisoning, 312, 317, 321
 Polycystic, 310, 321
 Polypeptide, 294, 321
 Polysaccharide, 295, 298, 321
 Population Control, 14, 73, 242, 321
 Population Growth, 44, 74, 321
 Posterior, 294, 319, 321
 Postmenopausal, 80, 305, 319, 321
 Postnatal, 306, 322, 329
 Post-translational, 294, 322, 327
 Post-traumatic, 297, 309, 322
 Potassium, 304, 310, 322
 Practice Guidelines, 262, 322
 Precancerous, 243, 322
 Pregnancy Outcome, 10, 322
 Premalignant, 322
 Premenopausal, 77, 80, 83, 322
 Premenstrual Syndrome, 60, 245, 322
 Prenatal, 250, 304, 306, 322
 Progesterone, 5, 64, 280, 313, 318, 322, 329
 Progestogen, 322
 Progression, 247, 295, 322
 Progressive, 248, 298, 303, 305, 308, 317,
 322
 Projection, 248, 322
 Prophase, 318, 322
 Prophylaxis, 322, 332
 Prospective study, 313, 322
 Prostate, 245, 323, 326
 Protease, 244, 300, 311, 317, 323, 325
 Protease Inhibitors, 244, 323
 Protein S, 241, 323, 330
 Proteins, 294, 295, 299, 300, 316, 320, 321,
 323, 324, 330, 331
 Protons, 294, 310, 323, 324

- Protozoa, 323, 331
 Protozoan, 298, 314, 323
 Psychiatric, 247, 315, 323
 Psychiatry, 17, 21, 323
 Psychic, 313, 315, 323, 326
 Psychoactive, 323, 334
 Psychomotor, 297, 323
 Psychopathology, 247, 323
 Puberty, 248, 323
 Public Health, 11, 14, 21, 26, 29, 32, 34, 35,
 36, 39, 42, 45, 68, 242, 262, 323
 Public Opinion, 43, 323
 Publishing, 4, 8, 253, 323
 Pulmonary, 297, 323, 324
 Pulmonary Artery, 297, 324
 Pyridoxal, 324, 331
Q
 Quality of Life, 5, 324
R
 Race, 8, 42, 72, 313, 318, 324
 Racemic, 313, 318, 324
 Radiation, 244, 306, 307, 312, 324, 334
 Radiation therapy, 244, 306, 312, 324
 Radioactive, 297, 310, 311, 312, 318, 324
 Radiolabeled, 324
 Radiology, 44, 324
 Radiotherapy, 297, 324
 Randomized, 80, 83, 304, 324
 Rationalization, 74, 248, 324
 Reabsorption, 310, 324
 Receptivity, 324
 Receptor, 295, 301, 308, 320, 324
 Recombinant, 35, 324
 Rectum, 243, 295, 297, 300, 303, 307, 312,
 323, 324, 330
 Refer, 1, 297, 300, 303, 307, 313, 314, 317,
 324, 327, 331
 Regimen, 304, 324
 Relative risk, 7, 325
 Reproduction Techniques, 322, 325
 Resolving, 249, 325
 Retina, 302, 313, 318, 325
 Retinal, 301, 302, 318, 325
 Retinopathy, 7, 302, 325
 Rheumatism, 310, 325
 Rhythm Method, 33, 34, 36, 270, 273, 274,
 325
 Rigidity, 321, 325
 Risk factor, 8, 77, 243, 244, 245, 322, 325
 Ritonavir, 78, 325
 Rod, 16, 325
 Rural Population, 54, 325
S
 Safe Sex, 245, 325
 Saliva, 325
 Salivary, 303, 306, 325, 329
 Salivary glands, 303, 306, 325
 Saponins, 325, 329
 Sarcoma, 326
 Schizoid, 326, 334
 Schizophrenia, 326, 334
 Schizotypal Personality Disorder, 326, 334
 Sclerosis, 326
 Screening, 77, 244, 245, 299, 326
 Secondary tumor, 315, 326
 Secretion, 308, 310, 312, 316, 326
 Secretory, 326
 Seizures, 5, 246, 247, 248, 295, 297, 319,
 320, 326
 Self Care, 245, 250, 326
 Sella, 321, 326
 Sella Turcica, 321, 326
 Semen, 296, 300, 304, 323, 326
 Seminal fluid, 326
 Senile, 319, 326
 Septic, 296, 326
 Sequence Homology, 320, 326
 Sex Characteristics, 293, 294, 323, 327, 330
 Sex Counseling, 17, 327
 Sex Distribution, 248, 327
 Sex Education, 33, 37, 38, 74, 236, 260, 261,
 327
 Sex Hormone-Binding Globulin, 5, 327
 Sex Ratio, 11, 14, 20, 327
 Sexual Abstinence, 260, 273, 274, 327
 Sexually Transmitted Diseases, 7, 78, 79,
 243, 248, 252, 260, 261, 273, 274, 325, 327
 Shame, 248, 327
 Side effect, 5, 39, 78, 79, 247, 248, 252, 272,
 279, 293, 327, 331
 Small intestine, 304, 309, 312, 327
 Social Change, 238, 327
 Social Environment, 324, 327
 Social Problems, 43, 327
 Social Welfare, 327, 330
 Social Work, 20, 30, 327
 Socialization, 248, 327
 Sodium, 304, 310, 324, 327, 328, 333
 Sodium Channels, 328, 333
 Soft tissue, 297, 328
 Solid tumor, 295, 328
 Somatic, 293, 328
 Sonogram, 328, 332
 Sound wave, 328, 332

Spatial disorientation, 303, 328
 Specialist, 276, 328
 Species, 303, 306, 307, 314, 316, 319, 324,
 327, 328, 329, 331, 332, 333, 334
 Sperm, 4, 271, 272, 280, 293, 294, 299, 326,
 328, 333
 Sperm Head, 293, 328
 Spermatogenesis, 328
 Spermatozoa, 293, 296, 326, 328, 330
 Spermatozoon, 293, 328
 Spermicide, 270, 274, 328
 Spleen, 314, 328
 Spontaneous Abortion, 322, 328
 Spotting, 79, 328
 Squamous, 243, 328
 Squamous cells, 328, 329
 Squamous intraepithelial lesion, 243, 328
 Stabilization, 320, 329
 Stem Cells, 329
 Sterile, 296, 329
 Sterilization, 4, 18, 46, 56, 68, 73, 74, 245,
 267, 268, 272, 273, 274, 329
 Steroid, 301, 325, 329
 Stillbirth, 322, 329
 Stimulus, 303, 329, 331
 Stomach, 293, 296, 303, 305, 307, 308, 309,
 312, 317, 327, 328, 329
 Stress, 60, 71, 247, 248, 301, 317, 329
 Stroke, 61, 85, 258, 298, 329
 Stromal, 305, 329
 Subacute, 311, 329
 Subarachnoid, 309, 329
 Subclinical, 311, 326, 329
 Sublingual, 329
 Submandibular, 329
 Subspecies, 328, 329
 Substance P, 315, 322, 326, 329
 Suction, 329
 Support group, 250, 329
 Suppositories, 272, 307, 330
 Suprarenal, 330
 Symphysis, 299, 323, 330
 Symptomatic, 319, 330
 Syphilis, 318, 330
 Systemic, 61, 80, 82, 280, 297, 311, 324, 330,
 331
 Systemic lupus erythematosus, 80, 82, 330
 Systolic, 310, 330
T
 Taboo, 249, 330
 Terminator, 330, 334
 Testicle, 245, 308, 330

Testicular, 245, 330
 Testis, 294, 305, 318, 330
 Testosterone, 327, 330
 Tetracycline, 303, 330
 Thalidomide, 330
 Therapeutics, 281, 330
 Thigh, 306, 330
 Third Ventricle, 310, 330
 Thoracic, 302, 330
 Thorax, 314, 330
 Threonine, 320, 330
 Threshold, 5, 310, 331
 Thrombocytes, 321, 331
 Thrombophlebitis, 11, 331
 Thrombosis, 323, 329, 331
 Thrombus, 301, 311, 331, 333
 Thrush, 53, 331
 Thymus, 311, 314, 331
 Time Factors, 293, 331
 Tolerance, 308, 331
 Tome, 62, 331
 Torsion, 245, 311, 331
 Toxic, v, 311, 331, 334
 Toxicity, 303, 315, 331
 Toxicology, 260, 331
 Toxin, 331
 Toxoplasma, 331
 Transaminase, 331
 Transcriptase, 318, 331
 Transfer Factor, 311, 331
 Transfusion, 332
 Transmitter, 332, 333
 Transplantation, 4, 304, 311, 332
 Transvaginal ultrasound, 77, 332
 Trauma, 76, 297, 317, 319, 332
 Tuberculosis, 314, 318, 332
 Tumor Necrosis Factor, 330, 332
U
 Unconscious, 310, 332
 Uraemia, 319, 332
 Ureters, 312, 332
 Urethra, 320, 323, 332
 Urine, 289, 296, 302, 303, 312, 332
 Uterine Contraction, 293, 332
 Uterus, 41, 293, 299, 301, 304, 305, 310,
 315, 319, 322, 332
V
 Vaccination, 45, 332
 Vaccine, 10, 13, 18, 34, 35, 36, 43, 332
 Vagina, 243, 290, 299, 300, 303, 315, 328,
 332, 334

- Vaginal, 4, 61, 78, 80, 243, 245, 268, 280,
290, 314, 332, 334
Valproic Acid, 5, 332
Varicose, 313, 333
Varicose Ulcer, 313, 333
Vascular, 309, 311, 321, 331, 333
Vasculitis, 319, 333
Vasectomy, 245, 269, 290, 333
Vasomotor, 305, 333
VE, 20, 333
Vein, 312, 318, 319, 331, 333
Venous, 30, 297, 313, 323, 333
Venous blood, 297, 333
Venous Thrombosis, 30, 333
Vesicular, 316, 333
Veterinary Medicine, 259, 333
Video Recording, 251, 333
Videodisc Recording, 333
Viral, 37, 61, 333, 334
Viral Hepatitis, 37, 61, 333
Virilism, 310, 333
Virulence, 331, 333
Virus, 3, 243, 271, 274, 298, 308, 309, 333
Viscera, 317, 328, 333
Visceral, 333
Vitreous, 302, 313, 325, 333
Vitreous Hemorrhage, 302, 333
Vitro, 333
Vulva, 334
Vulvovaginitis, 53, 334
W
Warts, 309, 334
White blood cell, 295, 313, 314, 321, 334
Withdrawal, 44, 271, 274, 334
Womb, 53, 332, 334
X
Xenograft, 295, 334
X-ray, 243, 307, 312, 315, 318, 324, 334
Z
Zidovudine, 81, 334
Zona Pellucida, 334
Zygote, 301, 334

