



### [www.nih.gov](http://www.nih.gov) — The Source for Evidence-Based, Reliable Health Information

The National Institutes of Health (NIH) is a vast repository of all types of valuable health information. The NIH has taken the lead, using innovative information technologies to speed access to scientific knowledge and expertise for the researchers, clinician - and especially - the patients who need them.

The NIH web site ([www.nih.gov](http://www.nih.gov)) provides comprehensive and current data on almost every disease — the signs and symptoms, prognosis, and evidence-based treatments and means of prevention. Over a billion hits to the NIH Web sites are recorded each year.

### *Resources*

#### [ClinicalTrials.gov](http://ClinicalTrials.gov) — for Patients, Families, Researchers, Clinicians, and other Health Care Providers

For patients and health care providers looking for experimental treatments and emerging data from the field, [ClinicalTrials.gov](http://ClinicalTrials.gov) site offers hope and novel alternatives to many standard treatments. [ClinicalTrials.gov](http://ClinicalTrials.gov) receives over 8 million hits per page per month and hosts approximately 20,000 visitors daily. The site contains a list of over 27,000 clinical studies sponsored by the NIH, other federal agencies, and private industry, conducted nationally throughout all 50 States and internationally in more than 120 countries.

The NIH, through its National Library of Medicine (NLM), developed the [ClinicalTrials.gov](http://ClinicalTrials.gov) site in collaboration with the Food and Drug Administration (FDA), as a result of the FDA Modernization Act of 1997.

The NLM also houses several other useful sites, tailored to specific needs of various consumer and patient groups. The Genetics Home Reference page (<http://ghr.nlm.nih.gov>) hosts daily nearly 4,000 visitors looking for an introduction to genes and genetics, and practical information on genetic disorders and a host of inherited conditions.

The Household Products Database (<http://hpd.nlm.nih.gov>) and Tox Town (<http://toxnet.nlm.nih.gov>) Web sites, contain information in user-friendly formats to help people identify health risks at home, work, school, and in their environment.

#### [MedlinePlus.gov](http://MedlinePlus.gov) — for Patients, and Families, Researchers, Teachers, and Students

The NLM [MedlinePlus](http://MedlinePlus.gov) web site allows one-stop-shopping for health information. In 2005 alone, 75 million users downloaded 661 million pages. Entering any disease or condition of interest into the [MedlinePlus](http://MedlinePlus.gov) search engine returns a [MedlinePlus.gov](http://MedlinePlus.gov) listing of a wide variety of health resources and reliable information vetted by NIH staff.

#### [NCBI's GenBank](http://NCBI's GenBank) — for Researchers

The NLM's National Center for Biotechnology Information (NCBI) was established in 1988, and it has become especially more important to the research community since the recent publishing of the human genome. A major challenge of the Human Genome Project was to organize, analyze, and interpret the flood of data emerging from sequencing projects worldwide. The NCBI's Web site <http://www.ncbi.nih.gov> and [GenBank](http://www.ncbi.nlm.nih.gov/Genbank) database (<http://www.ncbi.nlm.nih.gov/Genbank>) strive to offer an integrated, one-stop genomic information resource for data that promise to provide new insights into human biology and new approaches for combating disease. The site provides scientists with the sequences of DNA, or RNA, protein levels of any gene of interest, or the capabilities to search for similarities between sequences for human, monkey, mouse, frog, or other databases already created. Virtually all biomedical research labs in academics or industry have benefited from these profound tools of exploration.

#### [Office of Science Education](http://Office of Science Education) — for Teachers, Students, and Public

The Office of Science Education (OSE) was established in 1991 to coordinate science education activities at the NIH, and develop and sponsor science education programs. These programs serve elementary, secondary, and college students, and teachers, and the public. The OSE develops curriculum supplements and other educational materials related to medicine and research through collaborations with scientific experts at the NIH. The office also establishes national model programs in science education, such as the Mini-Med School and Science in the Cinema. Information on these and other OSE developed educational resources promoting science education can be viewed at <http://science.education.nih.gov/>.

## **Public Access Publishing Policy (PubMed Central) — for the NIH, Public, and Researchers**

In May of 2005, NIH implemented a new “Public Access Policy.” This voluntary Public Access Policy (<http://publicaccess.nih.gov/>) requests that investigators funded by the NIH submit an electronic version of their final, peer-reviewed manuscripts upon acceptance for publication to the NIH NLM’s PubMed Central (PMC). The PMC is a digital repository of full-text, peer-reviewed biomedical, behavioral, and clinical research journals. This electronic archive is publicly accessible, permanent, and searchable.

The Policy benefits: (1) authors and researchers with a higher visibility of their publication, (2) the public with full text access to publications sooner, and (3) the NIH, with a comprehensive archival system. This system will also help the NIH to manage its research dollars more efficiently, and to understand better its research portfolio, monitor its scientific productivity, and help set priorities.

## **PubMed/MEDLINE — for Researchers, Clinicians, and other Health Care Providers**

PubMed is the workhorse in the NLM’s effort to get scientific information out to clinicians and researchers, streamline the flow of knowledge from bench to bedside, and accelerate the rate of discovery in the nation’s labs and research facilities. PubMed is a search system for scanning health databases, such as MEDLINE, a database of some 16 million records for journal articles from the 1950s to the present. In 2005, 600,000 citations were published, and almost 5,000 journals were indexed in MEDLINE. Through this portal, searchers can easily find abstracts, authors, and links to full publications for almost any biomedical research finding from the past five decades. Last year, more than half a *billion* online searches were conducted through the PubMed gateway.

Although MEDLINE has been around since 1971, the NIH is constantly developing new tools to stoke the engines of scientific discovery as new technologies and data arise.

RESOURCE	DESCRIPTION	URL
<b>Cancer Genome Anatomy Project</b>	Generates the information and technological tools needed to decipher the molecular anatomy of the cancer cell.	<a href="http://www.ncbi.nlm.nih.gov/ncicgap/">www.ncbi.nlm.nih.gov/ncicgap/</a>
<b>ClinicalTrials.gov</b>	Patient studies for drugs and treatment.	<a href="http://clinicaltrials.gov">clinicaltrials.gov</a>
<b>GenBank</b>	An annotated collection of all publicly available DNA sequences.	<a href="http://www.ncbi.nlm.nih.gov/Genbank/GenbankSearch.html">www.ncbi.nlm.nih.gov/Genbank/GenbankSearch.html</a>
<b>MedlinePlus</b>	Health information for patients, families and health care providers.	<a href="http://medlineplus.gov">medlineplus.gov</a>
<b>National Center for Biotechnology Information</b>	Databases and tools for data mining, including BLAST and the Molecular Modeling Database.	<a href="http://www.ncbi.nih.gov">www.ncbi.nih.gov</a>
<b>NIH Homepage</b>	Gateway to all of the above sites, plus information about the NIH mission, Institutes, grant opportunities, news, and Director’s initiatives.	<a href="http://www.nih.gov">www.nih.gov</a>
<b>Online Mendelian Inheritance in Man</b>	Catalog of human genes and genetic disorders.	<a href="http://www.ncbi.nlm.nih.gov/entrez/query.fcgi?db=OIMIM">www.ncbi.nlm.nih.gov/entrez/query.fcgi?db=OIMIM</a>
<b>Office of Science Education</b>	Develops and sponsors science education programs, and materials for elementary, secondary, college students, teachers, and the public.	<a href="http://science.education.nih.gov/">science.education.nih.gov/</a>
<b>PubMed Central</b>	Free digital archive of biomedical and life sciences journal literature.	<a href="http://www.pubmedcentral.gov">www.pubmedcentral.gov</a>
<b>PubMed/MEDLINE</b>	References including abstracts from thousands of biomedical journals.	<a href="http://www.ncbi.nlm.nih.gov/entrez/query.fcgi?DB=pubmed">www.ncbi.nlm.nih.gov/entrez/query.fcgi?DB=pubmed</a>
<b>TOXNET</b>	Network of databases on toxicology, hazardous chemicals, and environmental health.	<a href="http://toxnet.nlm.nih.gov">toxnet.nlm.nih.gov</a>