

caBIO Home Page

Page Contents

- [caBIO Home Page Overview](#)
- [caBIO Home Page Search Tools](#)
- [Selecting the Right caBIO Home Page Tool for You](#)

Documentation Table of Contents

- [Documentation Main Page](#)
- [Creation of the Cancer Gene Index](#)
- [Data, Metadata, and Annotations](#)
- [Cancer Gene Index Gene-Disease and Gene-Compound XML Documents](#)
- [caBIO APIs](#)
- [Cancer Gene Index Shared Parsed Data and Code](#)
- [caBIO Portlet Templated Searches](#)
- [caBIO Home Page](#)
- [caBIO iPhone Application](#)
- [caBIO Portlet Simple Searches](#)
- [Glossary](#)
- [Credits and Resources](#)



To Print the Guide

We recommend you print one wiki page of the guide at a time. To do this, click the printer icon at the top right of the page; then from the browser File menu, choose Print. Printing multiple pages at one time is more complex. For instructions, refer to [Exporting Multiple Pages to PDF](#).



Having Trouble Reading the Text?

Resizing the text for any web page is easy. For information on how to do this in your web browser, refer to this [W3C tutorial](#) .

caBIO Home Page Overview

caBIO is a resource that integrates biomedical data on genes, proteins, clinical protocols, disease ontologies, pharmacological agents, pathways, and other entities with annotations, controlled vocabularies, and metadata models originating from [twenty-three data sources](#), including the Cancer Gene Index, the Pathway Interaction Database, and the University of California, Santa Cruz Distributed Annotation System.

The [caBIO Home Page](#) allows you to browse the entire caBIO object model. Thus, you may use this tool to view all Cancer Gene Index data and to find how these genes, diseases, and compounds relate to pathways, clinical protocols, and other biomedical and biological entities.

Specifically, you can use this interface to uncover fact-based associations between genes and diseases or genes and compounds. In addition, you can evaluate the evidence from which these associations were extracted and the [codes](#) and [details](#) that describe these associations. Other annotations, such as [sentence status flags](#), [negation indicators](#), [cell line indicators](#), and organism are also accessible through the Portal.

WELCOME TO CABIO v4.3.1

The cancer Bioinformatics Infrastructure Objects (caBIO) model and architecture is a synthesis of software, vocabulary, and metadata models for cancer research. Each of the caBIO domain objects represents an entity found in biomedical research such as Gene, Chromosome, Nucleic Acid Sequence, SNP, Library, Clone, and Pathway. Given the dynamic nature of this information, the data in caBIO is updated on a monthly basis through a series of ETL (Extract, Transform, and Load) processes.

References:

- [caBIO Overview](#) - High-level overview of caBIO
- [caBIO GForge site](#) - Contains news, information, documents, defects, feedback, and reports
- [caBIO Download site](#) - Contains download packages and release notes
- [caBIO 4.3.1 Release Notes](#) - Latest release notes for caBIO
- [caBIO 4.3.1 Data Refresh Release Notes](#) - Release notes describing the current data content of caBIO
- [caBIO 4.3.1 javadocs](#) - Java API documentation
- [caBIO 4.3.1 Tech Guide](#) - Technical Guide

caBIO API 4.3.1, Tag: [CABIO_431_QA_20091209](#), Build Date: 2010-01-20 16:18:54

Search for Biological Entities

[Continue](#)

WHAT'S NEW

- Introduce Entrez Genes that are not in Unigene
- Enhancement on the display for the search results for FreestyleLM search

Text Search

Center for Biomedical Informatics and Information Technology
FREESTYLE LEXICAL MINE

[Search](#) [more options...](#)



Warning!

Because you have to navigate through the caBIO object model to use these tools, you must be comfortable with the concept of computer programming classes, objects, attributes, and methods. It is also extremely helpful to understand the caBIO object model, itself.

If you are not already familiar with these concepts, **stop!** It is highly recommended that you instead use the caBIO Portlet Templated Search tool and refer to its [step-by-step end user documentation](#). If you still would prefer to use the caBIO Home Page, proceed slowly and with caution.

caBIO Home Page Search Tools

The caBIO Home Page allows you to view all Cancer Gene Index and other data through two search tools - a Google™-like Freestyle Lexical Mine and Search for Biological Entities.

The Freestyle Lexical Mine tool returns any caBIO object with an attribute that matches your search term. Associations between classes are represented as links, often as accessor or "getter" methods such as `getGene` or `getDiseaseOntology`, that you can click to walk the caBIO object model. In doing so, you not only can find relationships among Cancer Gene Index data, but also with these data and related caBIO objects.

The Search for Biological Entities tool, on the other hand, has a class-based search interface that also allows you to limit your search results to a specific object type. This tool still allows you to navigate through the caBIO object model, but gives you a single "point" from which to begin doing so.

Because you must click on at least two or three links for each gene-disease or gene-compound association in order to uncover all of the Cancer Gene Index data you would like to see, it can be quite tedious to compile even a relatively modest list of genes associated with a disease or compound. Even with the time-consuming click throughs to navigate the caBIO object model, it is still much faster to use the caBIO Portal than it is to use traditional methods of uncovering such relationships (for example, searching for and reviewing hundreds or even thousands of articles in PubMed).

Selecting the Right caBIO Home Page Tool for You

The caBIO Home Page Freestyle Lexical Mine and Search for Biological Entities tools both retrieve caBIO objects, but differ in their search interfaces, the types of retrieved objects, and result formatting.



Tip

It is recommended that you use the Freestyle Lexical Mine tool, as most end users will find this search interface to be more intuitive than the Search for Biological Entities.

- If you want to explore Cancer Gene Index data and how it is associated with other data in caBIO, refer to the [step-by-step guide for the caBIO Home Page Freestyle Lexical Mine](#).
- If you want to retrieve only specific types of objects related to Cancer Gene Index in the search results or to use a class-oriented search interface, you may refer to the [guide for the caBIO Home Page Search for Biological Entities tool](#).