SciFinder Scholar 2006

A Basic Guide
Chemical Abstracts Service

Scope

classic chemistry disciplines, biotechnology, agricultural chemistry, toxicology, environmental science, medicine, food science, materials science, geochemistry

Abstracts	1907 - present **UPDATED DAILY**	25 million records* 9,500 journals
Registry	1957 – present **UPDATED DAILY**	26.7 million substances 56.8 million sequences
Reactions	1907 - present	9.7 million single and multi-step
Patents	1907 - present	50 nationalities & organizations
MEDLINE	1958 - present	14.3 million biomedical citations

* from journals, patents, books, reviews, meeting abstracts, dissertations, conference proceedings, technical reports, preprints

Searching Options

EXPLORE by Research Topic, Author, Company, Structure, Reaction or Molecular Formula
LOCATE by Citation, Patent Number, Chemical Name or Registry Number

Finding References

- Research Topic
- Author
- Company Name / Organization
- Citation
- Patent Number, CA Abstract Number
- Browse tables of contents of ~1600 journals

Finding Chemical Substances

- Chemical Name, Common Name, Trade Name
- CAS Registry Number
- Molecular Formula
- Structure, Substructure
- Reaction

Research Topic Searching

- Use plain English - enter phrases as you would say them, specify 2 or 3 concepts.
- Use prepositions instead of OR and AND
  - e.g. Effects **of** human growth hormone **on** fetal development.
- Distribute modifiers across all words to which they apply
  - e.g. blue coat and blue hat (not blue coat and hat).
- Synonyms can be used in parentheses
  - e.g. topical treatments for poison ivy (Rhus radiacans).
- You can use negatives such as **not** and **except**.
- Limit ahead by Year, Document Type, Language, Author, Company.

Contact: Stephen Stich, Librarian for Chemistry, C-Level, MSEL, sstich@jhu.edu, 410-516-8357

Drawing Structures

- Draw structures as you would on paper, hydrogen atoms are assumed by default.
- Draw bonds the way you want them in your answers. Use 'unspecified' if you want to retrieve any of single, double, or triple bonds.
- Indicate variable groups and R-groups, and analyze results by composition.
- Use a CAS Registry Number as a model by copying it from any SciFinder display and pasting it into the SciFinder drawing window. (Note: not all RNs can be models).
- To create templates: draw the structure, select File Save and save the structure in the user_def folder.
- Draw radicals by adding a charge to a heteroatom. No 'dot' is available, but SciFinder is tricked by the charge.
- In substructure searching all atoms can be substituted. Use the lock-down atom and ring features to control substitution.
- The exact search will also return stereoisomers, coordination compounds, mixtures, polymers, isotopes, etc. Use the filters to eliminate some of these results.
- Use the similarity search to identify structurally similar substances.

Navigation

- **Back** – undo one screen unlimited times.
- **History** - displays search steps for current search only (no previous searches).
- **Full Text** - links are available for US Patents and select journals.

Analyze Results

Analysis function enables exploration, evaluation, and review of results.

- **References** – by frequency of: Author, CAS Registry Number, Section Title, Company, Document Type, Index Term, Journal, Language, Year, Supplementary Terms
- **Substances** – by composition of: Real-Atom Attachments, Variable Groups, R-Groups, Precision, Ring Skeletons, Stereochemistry
- **Reactions** - by frequency of: Catalyst, Solvent, Author, Company, Document Type, Reaction Steps, Yield, Journal, Language, Year

Printing & Saving Results

- **Content:** Compact, Standard, Summary, Full
- **Format:**
  - Plain ASCII - no structures
  - Rich Text Format - MS Word with structures
  - Quoted Format - Access, Lotus, Excel
  - Tagged Format - Endnote, ProCite, Reference Manager
  - Answer Keys - to save and re-run searches

Online Resources

- **Installation Files & Instructions** – http://www.welch.jhu.edu/scifinder/scifinder.cfm
- **Searching Tips** – http://www.cas.org/SCIFINDER/SCHOLAR/resources.html
- **Endnote, Procite, Reference Manager** – http://www.cas.org/Support/scifinder2006/bibapps/bibapps.html

Note: SciFinder Scholar is for use only by Johns Hopkins University students, faculty and staff and not the general public.

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