

Current Comments

Introducing *Current Chemical Reactions*

Number 2

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Last year I indicated that ISI¹ was planning to expand its line of chemical information services.¹ This hope will become a reality in 1979 with the introduction of *Current Chemical Reactions*[™] (*CCR*[™]).

ISI has been in the business of indexing chemical information since 1960 when we started *Index Chemicus*[®] (*IC*[®]) (later changed to *Current Abstracts of Chemistry & Index Chemicus*[™]). Originally, *IC* was intended to be a simple molecular formula index. By 1968 we were not only indexing over 150,000 new chemical compounds per year, we had also begun to indicate, without giving specifics, new reactions appearing in the articles abstracted.

Current Chemical Reactions will provide detailed information on these new reactions and syntheses. This new monthly service will alert readers to new synthetic methods including new and newly modified reactions and syntheses. *CCR* will describe the methods used, product yields, and give other reaction data of use to organic chemists.

There has been continuing interest in improving access to reaction data. Most chemists are familiar with Theilheimer's *Synthetic Methods, Beilstein*, and other systems too numerous to mention here. There is also considerable interest in so-called "automatic" reaction indexing. Michael Lynch at the University of Sheffield has pioneered such research.^{2,3} More recently, Peter Willett has expanded on this work.^{4,5,6} George Vladutz of ISI is another pioneer in the field of "automatic" reaction indexing.^{7,8}

Improved access to reaction data has a strong economic incentive. The organic chemist has a continuing need for information on reactions which produce better yields, faster or cleaner methods, and descriptions of the conditions necessary to duplicate certain reactions. All this information will be reported in *CCR*.

For *Current Chemical Reactions*, ISI's chemists will regularly scan approximately 110 primary chemistry and pharmaceutical journals. They will read about 35,000 ar-

ticles. Of these, about 8 to 9% will be selected for *CCR*. Thus, an annual selection of close to 3,000 papers which report new reactions is expected.

Each *CCR* entry will of course include complete bibliographic data: article title, author, author's address, journal citation, and language if other than English. But it is more than likely that reference to the original article will not be necessary to determine exactly what is needed to make the reaction go. In Figure 1 a sample *CCR* entry is provided.

Perhaps the most important aspect of *CCR* is the extensive use of clear, easily scanned diagrams which save time. Flow charts will be provided for each reaction, all of the product yields will be given (if available), and the techniques used in analyzing compounds will be highlighted.

Authors' abstracts, when provided in the source journal, will be part of the *CCR* entry. Also included will be a description of the type of reaction, proven or potential uses of compounds synthesized by the reaction, and a notice of explosive reactions.

Since review articles are becoming increasingly valuable in all branches of scientific literature, we will include as many as possible in *CCR*.⁹ This will help keep organic chemists alerted to reviews dealing with reactions in their field. ISI's staff of chemists will look for review articles not only in the *Current*

Abstracts of Chemistry & Index Chemicus source journals, but also in additional journals and books. Each issue of *CCR* will include complete bibliographic information on any review articles which appeared in the previous month.

The four indexes to each monthly issue of *CCR* will be useful for current awareness. They will also be cumulated annually for convenient retrospective searching. The indexes will permit searching from a variety of access points—by author, journal, author's affiliation, or subject.

The *Subject Index* is an alphabetic listing of permuted words and phrases which describe synthetic methods by name and by type of reaction. Descriptive terms will be selected by our staff of chemists from the article itself. The indexing words or phrases chosen are then permuted to form term-pairs that are highly specific.

It is not necessary to subscribe to *CAC&IC* to receive *CCR*. *CCR* is available to non-subscribers for \$300 per year. However, if you already subscribe to *CAC&IC* you will automatically receive one copy of the twelve monthly issues of *CCR* and the annual cumulated index. Additional copies are available to *CAC&IC* subscribers at a special annual rate of \$125 each.

Cross-referencing between the products will be provided so that the two can be used together easily. *CAC&IC* will continue to alert users to new synthetic methods, but the

user will be referred to the pertinent *CCR* entry for further details. Each *CCR* entry will include the number of the corresponding *CAC&IC* abstract, where more specific information on the new compounds is available.

Like any other new service we expect that with use further modifications will occur. But *CCR* is a step in the direction of more specific data retrieval that we can expect from all information suppliers in the future.

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