
News from IUPAC

Chemical Nomenclature Round Table

On 3 May 2000, IUPAC Executive Director John Jost (secretariat@iupac.org) and IUPAC Secretary General Edwin D. Becker (tbecker@nih.gov) sent the following message to IUPAC's Associate National Adhering Organizations, Associated Organizations, and Company Associates; to ICSU Unions; and to a number of chemical societies:

Chemical nomenclature has been a major core activity of IUPAC since its inception. In order to help develop a strategy for the Union's future work in nomenclature, including advances in computer-based aspects of nomenclature, IUPAC held a Round Table discussion on "Representations of Molecular Structure: Nomenclature and Its Alternatives" in Washington, DC on 10–11 March 2000. The meeting brought together 41 participants from 10 coun-

tries and included experts in organic, inorganic, biochemical, and macromolecular nomenclature; users of nomenclature in academia, industry, the patent, international trade, health and safety communities; journal editors and publishers; database providers; and software vendors. A detailed report of the conference, including 14 recommendations for IUPAC action, is available on the IUPAC web site at http://www.iupac.org/news/archives/2000/NRT_Report.html, or you can follow the links from the News & Notices page.

The IUPAC Executive Committee has already implemented three recommendations as follows:

1. An ad hoc Committee on Chemical Identity and Nomenclature Systems (CCINS) has been established, with Dr. Alan D. McNaught as Chairman. The CCINS will be responsible for developing



Upper left: Participants at the IUPAC Chemical Nomenclature Round Table meeting in Washington, DC in March 2000; **upper right:** Alan D. McNaught and Jonathan Goodman in discussion; **lower left:** Kenneth Cole, Alexander Lawson, Derek Maclean, and John Brennan in discussion; **lower right:** IUPAC President Alan Hayes (left) and American Chemical Society President Daryle H. Busch, who visited the IUPAC Executive Committee meeting held just before the March 2000 ACS Meeting in San Francisco.

systems for conventional and computer-based chemical nomenclature, cooperating with the four current nomenclature Commissions, coordinating interdisciplinary activities in the nomenclature field, and recommending to the Bureau long-range strategy on chemical nomenclature. It is expected that this body will provide the long-term central planning, management, and coordination of chemical nomenclature that would otherwise be lost when the Commissions are discontinued at the end of 2001.

2. A feasibility study of the Chemical Identifier project, to be managed by the CCINS, has been initiated. A “chemical identifier” is intended to be a meaningful alphanumeric text string that can uniquely identify a chemical compound and facilitate its handling in computer databases. This code would be the equivalent of an IUPAC systematic name but would be designed to be easily used by computers. The identifier could also include other information about the specific substance in question. Because there are several issues to be resolved, the participants in the Nomenclature Round Table recommended that the feasibility of the project and resolution of these issues be carried out as soon as possible by representatives of a wide range of interested parties. Drs. Stephen R. Heller and Steve Stein (NIST) were asked to recommend a list of individuals and groups that should be consulted initially and to propose a framework for addressing the issues.
3. IUPAC has agreed to play a lead role in representing the international chemistry communities in the development of Chemical Markup Language (CML), which is an extension of the more general XML (Extensible Markup Language) with special ability to handle chemical information. XML is a new standard being adopted by web publishers worldwide. It is expected to replace the current standard HTML over the next few years.

Chemistry International Strategy Development Committee

IUPAC President Alan Hayes has appointed a Strategy Development Committee for *Chemistry International* (CI), charged with the responsibility for developing a recommended mission and strategy for the magazine. Among other things, the committee is being asked to define CI's function within IUPAC and to relate its content to the general mission of the Union in a time of profound change.

Readers who have views on the material that has been or should be included in CI, on its organization or physical appearance and layout, or on its relationship to the mission of IUPAC, are urged to communicate with the Chairman of the Strategy Development Committee:

Dr. D. H. Michael Bowen
8609 Ewing Drive
Bethesda, Maryland 20817 USA
Tel./Fax: +1 (301) 530 5764
E-mail: m_bowen@acs.org

DIDACTic Tools for Teaching Chemistry

Carbon—you can talk about it many different ways; what would be yours? You can do your best and picture yourself as the latest avant-garde modernist painter (see Fig. 1), or simply use DIDAC (see Fig. 2, which illustrates diamond, graphite, and fullerene—three different allotropic forms of carbon).

Because chemistry is fun and teaching it is not always easy, Agfa-Gevaert N.V., Belgium, has developed and produced “didactic” tools such as the DIDAC overhead transparency sheets. For more than five years, Belgian chemistry teachers in several respected schools have been using DIDAC overhead sheets. In the past year, and with the impulse of the Belgian National Adhering Organization, IUPAC's Committee on Chemistry and Industry (COCI), and, more recently, IUPAC's Committee on Teaching of Chemistry (CTC) have recognized the value of this project, and are actively promoting these materials.

Via a collaboration with UNESCO, and after the

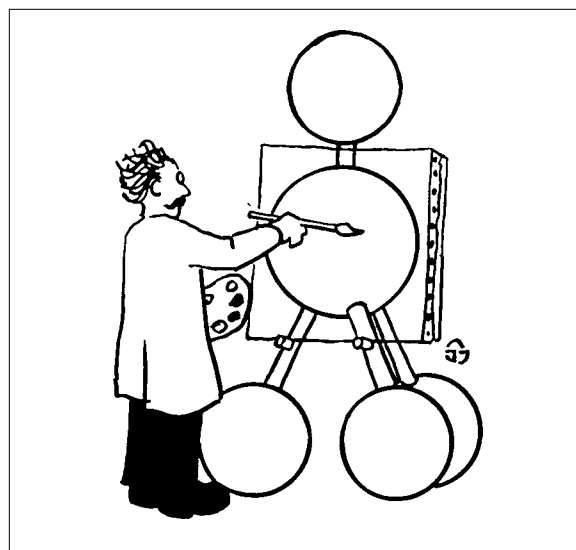


Fig. 1 Avant-garde modernist painter depicting a methane molecule.