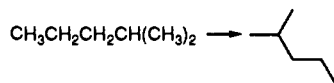


Color is now available. Objects (or parts thereof) can be selected with the "lasso" tool and then given one of eight standard colors (including white and black). Alternatively, a full color palette is available from a custom color submenu.

The program understands chemical structures (it actually has from the beginning) and can now calculate the molecular formula and weight of a selected structure. It can also check the chemical syntax of structures, reporting on atoms with incorrect valences. Further, structures represented as $\# \#$ can be easily converted to line drawings, as:



A number of different file formats can be opened and saved, including standard chemistry format (.SCF), PICT, Chemdraw 2.x, and Molecular Design MolFiles.

A separate Portfolio utility program is provided that affords a convenient tool for storing both ChemIntosh structures and PICT data. The portfolio is used in a simple and intuitive fashion by copy, paste, and cut operations.

A "magnifier" tool is included that can increase size to 800% and reduce to 12%. The window of the magnifier can be adjusted to encompass only a small portion of the screen or enlarged to cover the entire work area.

Overall, this version of ChemIntosh represents a significant improvement over previous releases and is highly recommended.

Book Reviews

Advances in Enzymology and Related Areas of Molecular Biology. Volume 65. Edited by Alton Meister (Cornell University Medical College). John Wiley & Sons: New York. 1992. viii + 436 pp. \$84.95. ISBN 0-471-527602.

There are few series that have been as influential or have maintained such high standards of excellence and timeliness as *Advances in Enzymology*. Volume 65 is no exception. Chapters in this volume are Traffic ATPases: A Superfamily of Transport Proteins Operating from *Escherichia coli* to Humans; The Respiratory Burst Oxidase; Pro- and Antioxidant Functions of Quinones and Quinone Reductase in Mammalian Cells; The Redox Centers of Ribonucleotide Reductase of *Escherichia coli*; Long Range Intramolecular Linked Functions in the Calcium Transport ATPase; Hydrogen-Bonding in Carbohydrates and Hydrate Inclusion Compounds; Methylation of mRNA; and Mammalian Nitric Oxide Synthase.

Collectively these chapters contains much of interest to diverse groups of chemists. Two chapters focus on ATPase transport proteins, covering both structural and mechanistic aspects of transport linked to ATP hydrolysis. Four chapters (those on the respiratory burst oxidase, quinones,

ribonucleotide reductase, and nitric oxide synthase) cover various aspects of the roles of radicals and radical reactions in biology. Investigators in bioorganic and bioinorganic chemistry, in particular, may find these chapters interesting and informative. The chapter on hydrogen bonding emphasizes cooperativity in hydrogen bonding, as evident in the structures and energetics of hydrogen-bonding networks in the crystal structures of carbohydrates and hydrate inclusion compounds. The chapter on mRNA methylation concentrates on the detection and possible biological significance of internal methylation of adenosine residues. The level of the chapters is such that the discussions are accessible to investigators who are new to a particular area and to graduate students. At the same time the coverage is generally up-to-date; literature citations appear to extend through 1991, with some 1992 (in press) citations. All the articles are well-referenced, and the titles of references are included. Another feature of this series, which greatly increases its utility as an entry into the literature, is the author index that lists each author whose work is referenced. Overall this volume is an excellent addition to a distinguished series.

SciWords. Pool, Heller, and Milne, Inc.: 9520 Linden Avenue, Bethesda, Maryland 20814 (301-493-6595). \$50.00 per copy; \$45.00 Government/Academic (Windows Word 6.0 \$70.00).

SciWords is a scientific dictionary for use on both Macintosh and IBM compatible systems with a number of word processing programs including WordPerfect and Word. It contains a large number of scientific terms as well as a standard collection of English words.

Installation on a Macintosh for Word (Version 5) is simple, as the file contains both standard as well as scientific words and replaces the dictionary supplied with Word. The file is copied to a directory (it need not be that containing Word) and then selected as the main dictionary using Tools→Preferences→Spelling→Main Dictionary.

The format of this dictionary is such that its contents cannot be viewed directly. As a result, evaluations of its accuracy and breadth could only be made indirectly. In terms of breadth, the dictionary contains a large number of chemical terms not present in Word's dictionary such as abiotic, acetal, alcoholysis, and maxima (the vendor states that the dictionary contains 75 000 scientific words from chemistry, physics, and biology). This comparison was made by spell checking an index for a sophomore organic textbook with the two dictionaries separately. Accuracy is more difficult to evaluate, as a presumption of misspelling in the dictionary is required. One quirk of the dictionary is that it does not always recognize accented letters, and "Kekulé" and "Schrödinger" are indicated as misspelled with "Kekule" and "Schrodinger" the suggested replacements. (Microsoft Word's dictionary recognizes neither.) There are also two separate dictionaries available which focus on agricultural and environmental terms.

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