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# **America's Ultimate Christmas Catalog**

In this season when mailboxes overflow with catalogs featuring every imaginable Christmas gift, the National Academy of Sciences has sent us what should be one of the most exciting—Opportunities in Chemistry\*. It is an impressive 350-page catalog of the gifts to society that the chemical sciences can provide if we will just fill out our national order blank.

Twenty years ago another NAS report<sup>†</sup>, usually called the "Westheimer" report, made a similar case for those times. Yet 9 months ago (22 February, page 847) in this space, Philip H. Abelson had to report, "In proportion to its contribution to the advancement of other sciences and its contributions to the economy, chemistry is the most underfunded of all the natural sciences." This new report (called the "Pimentel" report, for its chairman), after a masterful exposition of chemistry's advances and their potential applications, outlines specific and sensible shifts in federal budgets that would allow more effective exploitation of these advances for the national good. A determined effort is needed to ensure an adequate response this time, despite current budget stringencies.

The report underlines the great range of the chemical sciences. Examples in catalysis, optics, photochemistry, superconductors, biosynthesis, biopolymer structure, enzymology, spectroscopy, chromatography, molecular structure theory, computer graphics, stratospheric chemistry, geochemistry, and many more areas stress the interaction of chemistry with other sciences. The view of chemistry as the "central science" is not just a chauvinistic blanket worn by those of us with the word "chemistry" somewhere on our diplomas, but we have not always convinced others of that. This report should convince the careful reader.

It also lays to rest any notion that chemistry is a "mature" science, lacking in exciting research challenges. The many areas of practical importance are highlighted in each of the three technical chapters, and a section in each describes the "intellectual frontiers." Chemistry continues to offer major challenges to the "pure" researcher. At the same time it is the key to meeting many of the needs of society.

The chemical sciences have made many vital contributions to the welfare of mankind and have the potential for even greater contributions in the future. This is ably documented in the Pimentel report.

All who are concerned that science make its full contribution to national life should study this report and its recommendations. They will be convinced that we need full support of the chemical sciences by government, industry, and our educational institutions. Society will be repaid manyfold for such an investment of resources.—E. G. JEFFERSON, Chairman of the Board, E. I. du Pont de Nemours & Company, Wilmington, Delaware 19898

<sup>\*</sup>Committee to Survey Opportunities in the Chemical Sciences, Opportunities in Chemistry (National Academy Press, Washington, D.C., 1985).
†Committee for the Survey of Chemistry, Chemistry: Opportunities and Needs (National Research Council, Washington, D.C., 1965).