Page 417: For eq 2 substitute the following.

$$\frac{K^{1/2}}{2A_0} \ln \left| \frac{CK^{-1/2} - C + A_0}{CK^{-1/2} + C - A_0} \right| = k_+ t \qquad (2)$$

The calculations using eq 2 do not require correction.

Structures and Mass Spectral Behavior of the Inositol Cyclic Boronic Esters [*J. Am. Chem. Soc.*, **101,** 979 (1979)]. By JACEK WIECKO and WILLIAM R. SHERMAN,* Departments of Psychiatry and Biological Chemistry, Washington University School of Medicine, St. Louis, Missouri 63110.

On p 982, column 2, paragraph 2, line 7, the text should read: "In the spectra of these inositol butaneboronates the ratio of abundances of *m/e* 126 to *m/e* 139 is about 3:1, whereas in the spectra of the other inositol butaneboronates the ratio is 1:3 or greater."

Nonchair Conformations in Phosphorus-Containing Cyclohexanes. Crystal and Molecular Structures of *cis*- and *trans*-2-Phenyl-2-oxo-5-*tert*-butyl-1,3,2-dithiaphosphorinanes and *cis*-2-Phenyl-5-*tert*-butyl-1,3,2-dithiaphosphorinane [*J. Am. Chem. Soc.*, **101,** 1600 (1979)]. By ROBERT O. HUTCHINS,* BRUCE E. MARYANOFF,* MARIO J. CASTILLO, KARL D. HARGRAVE, and ANDREW T. MCPHAIL,* Department of Chemistry, Drexel University, Philadelphia, Pennsylvania 19104; Chemical Research Department, McNeil Laboratories, Fort Washington, Pennsylvania 19034; and Paul M. Gross Chemical Laboratory, Duke University, Durham, North Carolina 27706.

Structure **5** should read R_1 = Se, R_2 = NH-*t*-C_4H_9, R_3 = CH_3 (R_3 was inadvertently omitted).

A Pair-Specific Osmium Reagent for Polynucleotides [*J. Am. Chem. Soc.*, **101,** 2251 (1979)]. By H. FORD, C.-H. CHANG, and E. J. BEHRMAN,* Department of Biochemistry, The Ohio State University, Columbus, Ohio 43210.

Line 14: VIII, not VII.

Line 21: $(k_0 + k[L])$, not $(k_0 + k)[L]$.

Acknowledgments: Insert, "We are very grateful to John W. Fowble for the NMR spectra."

Book Reviews

Atmospheric Chemistry. By JULIAN HEICKLEN. Academic Press, New York. 1976. xiii + 406 pp. $38.00.

The author has presented a systematic organization of the vast amount of new information provided during the recent surge of interest in atmospheric processes. The monograph provides a synthesis of these results, mainly those of the Climatic Impact Assessment Program, through 1974. The emphasis is on experimental results. The book discussues both the lower and upper atmosphere neutral and ion chemistry.

The first chapter is a presentation of the physical and chemical structure of the atmosphere. A review of the spectroscopy of the main atmospheric constituents is included. Chapter Two presents an analysis of the neutral chemistry of the atmosphere, beginning with the photochemistry of neutral oxygen and successively introducing more species as the chemical structure is developed in detail. The analysis is closely related to in situ observations and explained using simple steady-state arguments. A brief summary of the stratospheric effects of NO_x and the chlorofluorocarbons concludes this chapter. Chapter Three briefly presents the chemistry of the ionosphere. Chapter Four considers the major atmospheric pollutants: CO, CO_2, NO_x, hydrocarbons, oxidants, halogenated compounds, sulfur compounds, and particulate matter. The concern of this chapter is not the chemistry of these species but rather to catalog their known sources and environmental insult. The detailed chemistry of hydrocarbon combustion, photochemical smog, ozone and singlet oxygen, SO_2, and aerosols is presented in succeeding chapters. The final chapter presents an interesting analysis of attempts at controlling atmospheric pollutants, including a controversial suggestion for chemical control of photochemical smog through large-scale dispersion of a radical scavenger.

This book must be compared with "Chemistry of the Atmosphere", by McEwan and Phillips, published two years earlier, which covers much the same material, although the present book is slightly more current. However, the style is quite different. The present author, in attempting to present a vast amount of precise experimental detail, has had to sacrifice, to an extent, readability. The earlier book, although not as rich in detail, is easier to absorb.

Thomas J. O'Brien, *Texas Tech University*

Polyvinylidene Chloride. By RITCHIE A. WESSLING (Dow Chemical Co.). Gordon and Breach Science Publishers, New York. 1977. xii + 199 pp. $25.00.

This well-organized book fills a real need for a review of significant aspects of vinylidene chloride copolymers, best known in formulations of the Dow Chemical Company as Saran packaging films and coatings of low moisture permeability. Wessling not only has reviewed the extensive literature critically but has included historical, polymerization, properties, and applications data contributed by his named colleagues of Dow. The commercialization of Saran is credited to Ralph M. Wiley and coworkers at Midland in 1933 to 1940.

Wessling uses "polyvinylidene chloride", abbreviated PVDC, to include the VDC copolymers. In fact, there are relatively few data available on the unmodified homopolymers. The book includes excellent chapters on the monomer, copolymerization (including heterogeneous, graft and ionic), copolymer structure, transitions, and degradation, as well as a short chapter on application technology. The latter contains some disclosures about Saran copolymer compositions. For example, packaging films are lower in vinyl chloride units than commercial shrink films, and acrylonitrile is a comonomer along with alkyl acrylate or methacrylate for copolymers used as coatings of low moisture permeability.

Among the features of the book are photomicrographs of a wide variety of VDC copolymer morphologies obtained from different copolymerization systems and from different solvents. Areas needing further research are pointed out, for example, branching, morphology, and the conformations of the crystalline polymers.

Perhaps Wessling might have given more attention to problems of toxicity. The commercial VDC monomer may contain some vinyl chloride. VDC in air forms peroxides which decompose to phosgene and formaldehyde. Pyrolysis of Saran gives HCl gas as well as carbons having interesting electrical properties. The book gives many patent and other references as well as both subject and author indexes.

C. E. Schildknecht, *Gettysburg College*

Organometallic Polymers. Edited by CHARLES E. CARRAHER, JR. (Wright State University), JOHN E. SHEATS (Rider College), and CHARLES U. PITTMAN, JR. (University of Alabama). Academic Press, New York. 1978. v-xii + 353 pp. $18.50.

Polymeric materials combining the thermal and oxidative stability of organic polymers and the interesting optical and electrochemical properties of metal complexes have much obvious potential: thus, the study of organometallic polymers is becoming an important area of research and development activity. This book consists of a series of papers (33) presented as part of a three-day Symposium on Organometallic Polymers held at the ACS National Meeting in New Orleans, March 1977. The book is divided into seven major sections dealing