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### Book review

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"Gmelin Handbook of Inorganic Chemistry", 8th Edition, New Supplement Series, Volume 47, "Organobismuth Compounds", M. Wieber, volume author, H. Bitterer, volume editor, Gmelin Institut für Anorganische Chemie und Grenzgebiete der Max-Planck-Gesellschaft zur Förderung der Wissenschaften, Springer-Verlag, Berlin/Heidelberg/New York, 1977, viii + 173 pages, DM 432, \$198.80.

This short volume, the latest addition to the Gmelin coverage of organometallic compounds, brings all that is known about the organic compounds of bismuth which contain at least one bismuth-carbon bond. The discussion begins with  $R_5Bi$  compounds, continues on to  $[R_4Bi]X$  types, then to  $R_3BiX_2$ ,  $R_3Bi$ ,  $R_2BiX$  (including bismabenzene and its 1-bisma-2,5-cyclohexadiene precursor) and  $RBiX_2$ , and concludes with multinuclear compounds with Bi-Bi, Bi-R-Bi, Bi-O-Bi or Bi-S-Bi linkages and Lewis acid/base complexes of organobismuth compounds. In the latter, the bismuth moiety is either the acceptor (e.g.,  $LiBiPh_6$ ,  $[Ph_3Bi \cdot OAsPh_3](NO_3)_2$  and  $PhBiCl_2 \cdot 2py$ ) or the donor (e.g.,  $Et_3Bi \cdot AlEt_3$  and  $R_3BiCr(CO)_5$ ).

The coverage is complete through the middle of 1976. Very useful is the beginning section on the general literature which deals with organobismuth chemistry: first the general organometallic literature, then books and reviews which deal specifically with Group V organometallic chemistry and, even more specifically, with organobismuth chemistry. Included also are general references on analysis and toxicology. For the members of the classes of organobismuth compounds listed above are given all available physical and spectroscopic data, and detailed information concerning preparation and chemical reactivity is provided. References were obtained by way of "Chemical Abstracts", so coverage of the journal literature should be almost complete, but coverage of the patent literature will be spotty.

Although this book is written in German, the nomenclature used has curious Anglo-Saxon tendencies: "Bismut" for "Wismut", "Ethyl" for "Äthyl", "Iod" and  $I_2$  rather than "Jod" and  $J_2$ , which follows the new IUPAC guidelines but will make some German readers unhappy. To help the non-German reader, the usual Gmelin practise of providing English translations of the preface, table of contents and chapter and section headings is followed. A formula index is provided.

Activity in the organobismuth area has not been very vigorous in recent years, as the Annual Surveys of Doak and Freedman show, but for anyone already active in this area and for those who plan research on some phase of organobismuth chemistry, this book will be of great value.

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