

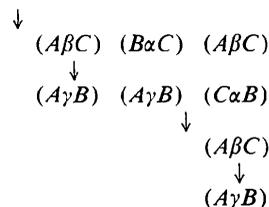
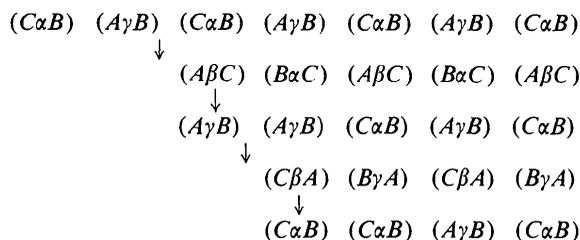
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Crystal structure of six new polytypes of cadmium iodide: corrigendum. By G. LAL, G. K. CHADHA and G. C. TRIGUNAYAT, *Department of Physics and Astrophysics, University of Delhi, Delhi-7, India*

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An error which appears in the scheme of derivation of polytype $14H_2$ by the introduction of stacking faults [Lal, Chadha & Trigunayat (1971). *Acta Cryst.* B27, 2293–2298] is corrected.

We have detected in our paper (Lal, Chadha & Trigunayat, 1971) a small error which appears in the scheme of derivation of polytype $14H_2$ by the introduction of stacking faults (p. 2297). It occurred at the second step of derivation and was perpetuated in the subsequent steps. The correct scheme of derivation should read as follows:



Thus, the final structure sequence for $14H_2$ is the following:
 $(C\alpha B) (A\gamma B) (A\gamma B) (C\alpha B) (A\gamma B) (A\gamma B) (A\gamma B)$.

Reference

LAL, G., CHADHA, G. K. & TRIGUNAYAT, G. C. (1971). *Acta Cryst.* B27, 2293–2298.

Book Review

Works intended for notice in this column should be sent direct to the Book-Review Editor (M. M. Woolfson, Physics Department, University of York, Heslington, York YO1 5DD, England). As far as practicable books will be reviewed in a country different from that of publication.

X-ray diffraction by polymers. By M. KAKUDO and N. KASAI. Pp. xii + 464. Figs. 238, Tables 44. Amsterdam: Elsevier, 1972. Price £ 125.00 (about U.S. \$ 48.10).

In writing this book on X-ray diffraction by polymers the authors' stated purpose was to provide 'an intermediate textbook bridging the gap between primers and specialist works', and on the whole they have been very successful in achieving this. The book is divided into three sections: Fundamental (seven chapters, 148 pages), Experimental (one chapter, 66 pages), and Analytical (six chapters, 216 pages); there is also an appendix, mostly of numerical tables, of 17 pages. The amount of space allocated to experimental techniques is perhaps disproportionately small: much is mentioned, but little is treated in detail. The gaps are partially remedied in the numerous applications to particular substances and particular problems in the analytical section, but this supplementary material on experimental methods is not systematically indexed or cross-referenced.

The fundamental section is thorough, beginning with the properties of X-rays, and proceeding through the theory of scattering by assemblages of atoms of varying degrees of order, to a brief but clear discussion of crystal symmetry and crystal structure. As would be expected, the Hosemann 'paracrystal' gets a good deal of attention. The section ends with a brief chapter summarizing the relationship between

structure (including texture) and the X-ray diffraction intensity, and a slightly longer one putting forward models for the structure (texture) of high polymers

It is perhaps worth while to list the chapters in the long analytical section, in order to give an adequate picture of its scope. They are: Identification of crystals by X-ray diffraction; Analysis of crystallite orientation; Crystal-structure analysis of high polymers; Analysis of the breadth and shape of diffraction patterns; Analysis using the total diffraction intensity distribution curves of high polymers; and Analysis of small-angle X-ray scattering. It is this part of the book that the reviewer found most impressive, with its numerous fully described practical illustrations. There are points about which one could quibble: the 'ASTM file' has been the 'JCPDS file' for many years now, and the Scherrer constant perhaps deserves a fuller treatment; but it is from this section that the beginner in the study of high polymers will begin to get a feeling of what has been achieved and what can be achieved.

The translation, by a London translation service, reads smoothly. The translator's name is not given. Very few misprints were noted, most of them in the six-page subject index. There is no author index.

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