33[10, 11].—C. J. BOUWKAMP, *Catalogue of Solutions of the Rectangular $3 \times 4 \times 5$ Solid Pentomino Problem*, Technological University Eindhoven and Philips Research Laboratories, N. V. Philips' Gloeilampenfabrieken, Eindhoven, Netherlands, July 1967, 310 pp., 30 cm. One copy deposited in the UMT file.

In this remarkable document, which resembles a small town telephone directory both in size and composition, Professor Bouwkamp, who is more widely known for his contributions to electromagnetic theory, presents a catalog of the 3940 solutions which he and an assortment of computers succeeded in finding, over a period of several years, to the $3 \times 4 \times 5$ solid pentomino problem, described by this reviewer [1].

Although the programming of two-dimensional problems, pioneered in 1958 by Dana Scott, has now become commonplace, with 2339 solutions to the 6×10 rectangle of (plane) pentominoes having been found independently by numerous investigators, this catalog appears to be the first publication to document the exhaustive computer search for the solutions of a three-dimensional problem.

In addition to the obvious contribution to polyominology, these methods should also be applicable to crystallography, organic chemistry, and other disciplines in which it is of interest to enumerate the possible ways in which a given set of three-dimensional building blocks can be fitted together.

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1. S. W. GOLOMB, *Polyominoes*, Charles Scribner's Sons, New York, 1965, pp. 116–118.

34[12].—JOHN M. BLATT, *Introduction to Fortran IV Programming*, Goodyear Publishing Co., Pacific Palisades, Calif., 1968, xi + 313 pp. Price $5.25.

By now there are various versions of Fortran IV—different dialects as it were. This particular text by John Blatt is geared specifically to users of computers using the IBM G-level Fortran IV, a language which is implemented in the student compiler WATFOR for the IBM 360.

Certain features will look unfamiliar to the seasoned programmer, but this textbook is not intended for him; it is aimed at the novice whose task is to learn the WATFOR version of Fortran IV in minimum time. From this point of view, the author succeeds admirably. In clear terms he covers each of the topics thoroughly and with pedagogic finesse. His text is abundant with good examples, well-documented and to the point, and each chapter contains a series of pertinent questions, the answers to which are also supplied.

Most textbooks on the subject would stop at this point, but John Blatt goes further. With customary thoroughness, the author expounds his philosophy on computers and languages and pinpoints the frequent inconsistencies in this field. Thus, in addition to supplying the beginning student with all the tools necessary