proper place in the main body of the text. Besides, the appendix contains two tables to serve as an aid in properly classifying and integrating differential equations.

The book is well written and is well adapted as a general introduction to Lie's theory. As already indicated, the too systematic treatment of differential equations from this point of view appears to the reviewer to be a defect. It is one thing to recognize that Lie's theory is capable of bringing some order into the haphazard methods of the elementary theory of differential equations; but is is quite another to use Lie's theory as a strait jacket which every differential equation must be made to fit.

And now for a few points of detail. The author's definition of a one-parameter group is rather clumsy, as a result of the unfortunately so common desire to put it all into one sentence. The two parts of remark 1 on page 7 are not obviously connected. The true reason for the validity of remark 1 is to be found in the latter part of remark 2. Although the author speaks everywhere of one-parameter groups, he really means such groups as are generated by an infinitesimal transformation. At least, a number of his theorems are not true for mixed groups. On page 176 in deriving the condition for a "union of lineal elements" he neglects the case where the union consists of the elements of a fixed point. The printing is well done. The reviewer has noticed only a few misprints. On page 45 last line read $-A\eta$ instead of $+A\eta$. Page 177 in Ex. 5 read $-\cot t$ instead of $-\cos t$. Page 188 just above equation (130′) read characteristic instead of charactertisic.

A rather confusing feature is the use of two different scarcely distinguishable fonts for the same letters, as on page 24. There is no necessity for this. It seems a pity that the publishers have not seen fit to give the book a wider margin. The binding also is none too good.

E. J. WILCZYNSKI.

Abriss der Algebra der Logik. Bearbeitet im Auftrag der Deutschen Mathematiker-Vereinigung von Dr. EUGEN MÜLLER, Professor an der Oberrealschule zu Konstanz. In drei Teilen. Erster und Zweiter Teil. Leipzig und Berlin, B. G. Teubner, 1909–1910, 159 pp. 8 marks.

ALMOST from the days of Boole an ever-increasing need has been felt for an elementary introduction to the growing subject