

Hensel and Landsberg even at a time when they represented only a formal generalization.

As in any book written by mortal man there are a number of rough places. Although the reviewer did not read every proof in detail he observed the following. No attempt is made to motivate the use of a definition of "schlichtartig" not quite the usual one. The definition of the mapping h in the middle of p. 136 is either confused or confusing. Not sufficient discussion is given of the distinctions between the various decompositions of differentials in Chapter 7. On p. 237 it is not made clear what is meant by "adjacent sides". However without greater precision the last two sentences in the paragraph following Theorem 9-12 are questionable. Consider the modular group. On p. 268 there seems to be slight verbal confusion between divisors which are integral and those equivalent to an integral divisor. There is little attempt made to motivate the Jacobi inversion problem. Also in its discussion we find on p. 281 P_1, \dots, P_n specified as distinct points but at the top of p. 284 the conclusions are applied without further ado to the specialization $P_1 \dots P_g = P_0^g$. On p. 295 in the proof that a certain surface is not hyperelliptic it should be observed that the powers of z do not form a subfield (it should be the rational functions of z). Most of these points are comparatively minor and easily rectified but might distract the conscientious student. Finally a small number of misprints, pure and simple, were observed.

JAMES A. JENKINS

Teoria miary i calki Lebesgue'a. (Polish). By S. Hartman and J. Mikusinski. Panstwowe Wydawnictwo Naukowe, Warszawa, 1957. 140 pp. zł. 10.

This book is a short textbook on the theory of measure and of the Lebesgue integral, containing the classical material of the subject which corresponds to the requirements of the curriculum in Polish universities.

The main purpose of the book is to present that part of measure theory which has shown itself to be most useful in its applications in other fields such as the theory of probability and theoretical physics.

There are twelve chapters in the book. 1. Introductory concepts; 2. Lebesgue's measure of linear sets; 3. Measurable functions; 4. The Lebesgue definite integral; 5. Convergence in measure; 6. Integration and differentiation. Functions of bounded variation; 7. Absolutely continuous functions; 8. L^p spaces; 9. Orthogonal expansions; 10. Measure in plane and in space; 11. Multiple integrals; 12. The Stieltjes integral.