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Título: Famous Problems And Other Monographs: Second Edition

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Sinopsis

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Four volumes in one: Famous Problems of Elementary Geometry, by Klein. A fascinating, simple, easily understandable account of the famous problems of Geometry--The Duplication of the Cube, Trisection of the Angle, Squaring of the Circle--and the proofs that these cannot be solved by ruler and compass. Suitably presented to undergraduates, with no calculus required. Also, the work includes problems about transcendental numbers, the existence of such numbers, and proofs of the transcendence of e .

From Determinant to Tensor, by Sheppard. A novel and simple introduction to tensors.

"An excellent little book, the aim of which is to familiarize the student with tensors and to give an idea of their applications. We wish to recommend the book heartily ... The beginner will find the book a valuable introduction and the expert an interesting review with a refreshing novelty of presentation."

--Bulletin of the AMS

Chapter headings: 1: Origin of Determinants; 2: Properties of Determinants; 3: Solution of Simultaneous Equations; 4: Properties; 5: Tensor Notation; 6: Sets; 7: Cogredience, etc. 8: Examples from Statistics; 9: Tensors in Theory of Relativity.

Introduction to Combinatory Analysis, by MacMahon. An introduction to the author's two-volume work.

Three Lectures on Fermat's Last Theorem, by Mordell. This famous problem is so easy that a high-school student might not unreasonably hope to solve it: it is so difficult that as of the 1962 publication date of this book, tens of thousands of amateur and professional mathematicians, Euler and Gauss among them, failed to find a complete solution. Mordell himself had a solution (as he said he did). This work is one of the masterpieces of mathematical exposition.

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The Delian Problem and the Trisection of the Angle: The impossibility of solving the Delian problem with straight edge and compasses; The general equation $x^3=?$; The impossibility of trisecting an angle with straight edge and compasses

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Notes