This is a collection of David Speiser's essays on the history of mechanics during the crucial period 1600-1800. The purpose of the book is to make available in a single volume a selection of the historical papers and lectures assembled over the course of more than forty years of work. The history of mechanics is by now considered of importance for both physics and mathematics, but few historians are competent to address it and the definitive history remains to be written. Ordered chronologically to address historical developments in elasticity, rigid body dynamics, relativity, electricity, magnetism, optics and more by scientists such as Galileo, Huygens, Newton, the Bernoullis, Euler, Lambert and Maupertuis, David Speiser's essays represent an important step forward. The book includes two lectures that were previously unpublished, and essays originally published in German, French and Italian translated into English, making the work easily accessible for a wide readership of specialists and non-specialists. In collaboration with the author, all essays have been re-edited, and the bibliographies and references have been fully updated. The book includes a foreword by the author, an introduction by the editors, and two comprehensive indexes for easy reference.