

1. Record Nr.	UNINA9910254613203321
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Titolo	Decoding the Mechanisms of Antikythera Astronomical Device // by Jian-Liang Lin, Hong-Sen Yan
Pubbl/distr/stampa	Berlin, Heidelberg : , : Springer Berlin Heidelberg : , : Imprint : Springer, , 2016
ISBN	3-662-48447-1
Edizione	[1st ed. 2016.]
Descrizione fisica	1 online resource (286 p.)
Disciplina	530
Soggetti	Physics Machinery Science - Study and teaching History History and Philosophical Foundations of Physics Machinery and Machine Elements Science Education History of Science
Lingua di pubblicazione	Inglese
Formato	Materiale a stampa
Livello bibliografico	Monografia
Note generali	Description based upon print version of record.
Nota di bibliografia	Includes bibliographical references at the end of each chapters and index.
Nota di contenuto	A Sketch of Ancient Western Astronomy -- Ancient Astronomical Instruments -- Amazing Discovery of Archaeology -- Modern Reconstruction Research -- Reconstruction Design Methodology -- Reconstruction Designs of the Calendrical Subsystem -- Reconstruction Designs of the Lunar Subsystem -- Reconstruction Designs of the Solar Subsystem -- Reconstruction Designs of the Planetary Subsystem -- Reconstruction Designs of the Moon Phase Display Device -- Assembly Work and Models.
Sommario/riassunto	This book presents a systematic design methodology for decoding the interior structure of the Antikythera mechanism, an astronomical device from ancient Greece. The historical background, surviving evidence and reconstructions of the mechanism are introduced, and the historical development of astronomical achievements and various astronomical instruments are investigated. Pursuing an approach based on the

conceptual design of modern mechanisms and bearing in mind the standards of science and technology at the time, all feasible designs of the six lost/incomplete/unclear subsystems are synthesized as illustrated examples, and 48 feasible designs of the complete interior structure are presented. This approach provides not only a logical tool for applying modern mechanical engineering knowledge to the reconstruction of the Antikythera mechanism, but also an innovative research direction for identifying the original structures of the mechanism in the future. In short, the book offers valuable new insights for all readers who are interested in the Antikythera mechanism.
