



A

PORTABLE
COSMOS

Revealing the
Antikythera Mechanism,
Scientific Wonder
of the Ancient World



ALEXANDER JONES

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For Elizabeth and Martin Jones

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Preface

In the name of his master Theoderic, king of the Ostrogoths, Cassiodorus wrote a letter to the philosopher Boethius about AD 506, commissioning him to arrange to have two time-telling devices made, a sundial and a water clock; they were to be a present to dazzle Gundobad, the king of the Burgundians.¹ A rhetorical manner was expected in such official correspondence, and Cassiodorus expands floridly on the astonishing works of which the mechanical art is capable: it can raise water, move fire, cause the organ to make music, defend cities, drain flooded buildings, and fashion sounding effigies of singing birds and hissing snakes. Nay, it even creates a means of imitating the heavens with no risk of impiety, through something called the “sphere of Archimedes,” in which the mechanical art

has made a second Sun take its course; it has fashioned another zodiacal circle by human cogitation; it has shown the Moon restored from its eclipse by the light of the art—it has set in revolution a little machine, pregnant with the cosmos, a portable sky, a compendium of all that is, a mirror of nature, in the image of the ether in its unimaginable mobility. . . . What a thing it is for a human being to make this thing, which can be a marvel even to understand!

Perhaps a still greater marvel is that a specimen of such a portable cosmos, which Cassiodorus had probably read about only in books, was found a little over a century ago off the small Greek island of Antikythera, where it had been lost 2000 years ago in a shipwreck. It