

ion;—so current, indeed, that the Abbé Bouillaud, or Bullialdus, as we more commonly call him, gave the title of *Philolaus* to the defence of Copernicus which he published in 1639; and Chiaramonti, an Aristotelian, published his answer under the title of *Antiphilolaus*. In 1645 Bullialdus published his *Astronomia Philolaica*, which was another exposition of the heliocentric doctrine.

Yet notwithstanding this general belief, it appears to be tolerably certain that Philolaus did not hold the doctrine of the earth's motion round the sun. (M. H. Martin, *Etudes sur le Timée*, 1841, Note xxxvii. Sect. i.; and Boeckh, *De vera Indole Astronomiæ Philolaicæ*, 1810.) In the system of Philolaus, the earth revolved about *the central fire*; but this central fire was not the sun. The Sun, along with the moon and planets, revolved in circles external to the earth. The Earth had the *Antichthon* or *Counter-Earth* between it and the centre; and revolving round this centre in one day, the Antichthon, being always between it and the centre, was, during a portion of the revolution, interposed between the Earth and the Sun, and thus made night; while the Sun, by his proper motion, produced the changes of the year.

When men were willing to suppose the earth to be in motion, in order to account for the recurrence of day and night, it is curious that they did not see that the revolution of a spherical earth about an axis passing through its centre was a scheme both simple and quite satisfactory. Yet the illumination of a globular earth by a distant sun, and the circumstances and phenomena thence resulting, appear to have been conceived in a very confused manner by many persons. Thus Tacitus (*Agric.* xii.), after stating that he has heard that in the northern part of the island of Britain, the night disappears in the height of summer, says, as his account of this phenomenon, that “the extreme parts of the earth are low and level, and do not throw their shadow upwards; so that the shade of night falls below the sky and the stars.” But, as a little consideration will show, it is the globular form of the earth, and not the level character of the country, which produces this effect.

It is not in any degree probable that Pythagoras taught that the Earth revolves round the Sun, or that it rotates on its own axis. Nor did Plato hold either of these motions of the Earth. They got so far as to believe in the Spherical Form of the Earth; and this was apparently such an effort that the human mind made a pause before going any further. “It required,” says M. H. Martin, “a great struggle for