explain in any detail the cumbrous machinery whereby the ancients sought to reconcile these various motions with the immovability of the earth.

Once the true position of the sun was recognized, the wayward motions of the planets in our skies became clear. On the assumption of an immovable earth they were well nigh inexplicable; but start the earth moving round the sun with the other planets, and the mystery is solved. What seemed intricate and involved beyond measure, becomes simplicity itself. Here is a striking illustration of the truth of the observation that everything depends on the point of view. The movements of Mars or any other planet as seen from this earth at rest, are, indeed, a puzzle. But when we come to realize that we are moving also — that both of us are circling about a common centre — then it becomes at once apparent that the convolutions of the planets are only partly real — that they are a combination of our own motion with theirs. Could we stand on the sun, in the centre of our system, and view the planets circling about us, all these complexities would disappear, and we should see the several planets holding their majestic courses through space with the most perfect simplicity and regularity.

I have briefly referred to the principal motions of the heavenly bodies that are apparent to our eyes. You know now that when the heavenly bodies appear to rise and set daily, it is not *they* that are turning — it is the earth on which we stand that is rotating once every 24 hours. When, with an independent movement, the stars appear to be forever disappearing in the west, it merely means that the earth is travlling round the sun, and thus presents to our view, in the hours of darkness, different portions of the heavens at different seasons — exposing the whole panorama in the course of a year. Once a month the moon travels round the earth, presenting different phases, because the sunlight is falling on her at different angles. The to-and-fro motion of the sun north and south of the east and west points,