

little bundles of kindling wood, compared with all the vast forests of the earth!

To comprehend the *eventual* use of such vast masses of chalk, limestone, &c., we need only to bear in mind that the great force of light, heat, &c., stored up in the various strata of rock, for so many miles in depth, about the surface of our earth, has evidently been derived from the sun, and that while the earth and the other planets have been storing up all this force, the sun has certainly been expending its force during all these thousands of years: consequently a time must come, sooner or later, when the sun shall have exhausted its great store of force;—for continual expenditure without renewal of supply, cannot possibly go on for ever, and there is no evidence whatever that the sun has had any opportunity for renewing its supply of force during all these thousands of years past, in which the earth and the other planets have been storing up the force derived from it,—consequently we require to know, what *naturally* occurs when the enormous force stored in the sun is at last so far exhausted that the sun can no longer furnish light and heat sufficient for the requirements of the many habitable worlds revolving around it?

This great and most important question may not now be so very difficult to answer satisfactorily, for the main facts of modern science are now so generally well known, that there need be no great difficulty in perceiving clearly enough that such vast force is already stored up in the various strata of rock about the surface of our earth, that were all the water of the ocean but once decomposed into its constituent gases, hydrogen and oxygen, the earth itself must immediately become a miniature sun, and in proportion to its size, doubtless quite as capable, as is the sun, to furnish light and heat, &c., for thousands of years, until all its strata of chalk, limestone, &c., should be consumed, and nothing remain but the substance of primary rock in a molten condition, and other substances in a gaseous condition. Under such circumstances, of course, the burning hydrogen must soon begin to form an ocean of water; for the great store of force being exhausted, there would then be no longer heat enough about the surface of the earth to render the formation of such an ocean impossible.