tity of heat which they have to support, Mercury will be seven times more dense than the earth, and twenty-eight times denser than the sun; and the comet of 1680 would be 28,000 times denser than the earth, or 112,000 times denser than the sun; and supposing it as large as the earth, it would contain a quantity of matter nearly equal to the ninth part of the sun, or by giving it only the 100th part of the size of the earth, its mass would still be equal to the 900th part of the sun. Hence it is easy to conclude, that such a body, though it would be but a small comet, might separate and drive off from the sun a 900th or a 650th part, particularly if we attend to the immense *acquired velocity* with which comets move when they pass in the vicinity of the sun.

Another analogy which merits some attention is the conformity between the density of the matter of the planets, and that of the sun. It is well known that both on and near the surface of the earth, there are some matters 14 or 15,000 times denser than others. The densities of gold and air are nearly in this relation. But the internal parts of the earth and planets are composed of a more uniform matter, whose comparative density varies much less; and the