

covered with lamp-black, for example, receives in a given time, eight or nine times as much heat by radiation, as a polished tin surface receives. From these remarks, it will be readily inferred, that the *colours* of bodies may have considerable influence in the radiation and absorption of heat; now such is found to be the case; and the darker the colour of a body, the more readily it gives off, and absorbs, radiant heat. Radiant heat has the power of *passing through* transparent bodies, as glass. This power, however, varies according to the thickness of the glass, its relative position to the radiating body, and a variety of other circumstances, not well understood; but generally speaking, heat of great intensity, and particularly solar heat, as before observed, obeys laws, more or less analogous to those of light under similar circumstances. Heat of low intensity, on the contrary, as that from boiling water, is said to present some peculiarities in its motions. These peculiarities, however, are such as scarcely to require to be here detailed.

*Conduction of Heat.*—The conduction of heat is chiefly confined to solid bodies; and as solids exist of every degree of consistency and density, from perfect fluidity up to perfect hardness, the conducting power varies in like manner. Hence the laws of conduction, and those of radiation, have a mutual dependance; and, in