them within an interval of time inappretiably short, and without prejudice to the continuous perception of the vibratory movement communicated to the ether as light. The act of polarization consists then in the subsequent arrangement, at some definite point in the line of progress of the ray, of all these vibratory movements, into parallelism with each other, or into a single plane from which they have afterwards no tendency (per se) to deviate. As the particles of crystallized bodies must be conceived to be arranged in definite lines and planes, it is easily conceivable that, whether among them, or in conjunction with them, the ethereal molecules may be confined in their vibrations to two particular planes determined by the internal constitution of the crystal and the incidence of the light; that a vibratory movement propagated into a body so constituted should ipso facto resolve itself into two such movements in these two planes (according to the general mechanical principle of the composition and resolution of motion); that it should be so propagated during its progress through the crystal; and that at its emergence into free space, each vibration should thenceforward subsist separately, there being nothing to change it. Again, it is no less conceivable that in these vibrations the molecules of the ether moving in one plane may be differently impeded by, or stand in a different connexion with those of the medium, from those moving in the other, and that, in consequence, their propagation of the movement may be effected with a different velocity. and thus give rise to a difference of refractive power,