ment has been termed the *heave* of a fault. Its dependence upon the angle of dip of the strata may be seen by a comparison of Sections A and B in Fig. 267. In the former, the bed *a b*, which may be supposed to be one of those in Fig. 266, dipping north at 20°, once prolonged above the present surface (marked by the horizontal line), is represented as having dropped from *w b* to *e d*. The heave amounts to the horizontal distance between *e* and *b*, the throw being the vertical distance between *b* and *d*. But if the angle should rise to 50°, as in B, though the amount of throw or vertical displacement is there one-fourth greater,

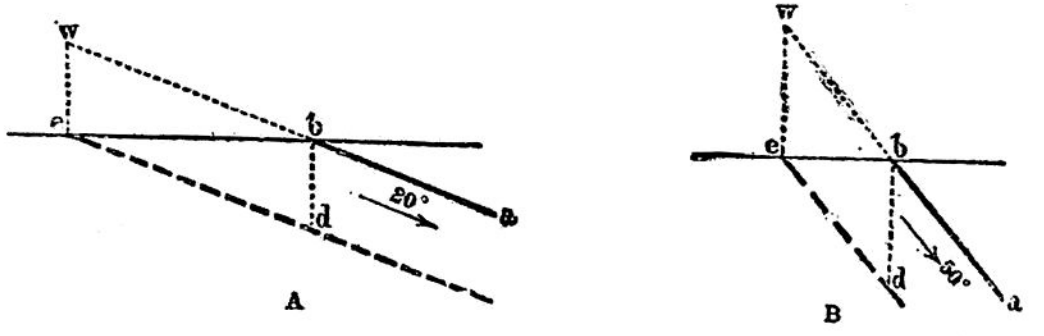

Fig. 267.—Sections to show the variation of horizontal displacement or Heave of Faults, according to the angle of inclination of strata.

the heave or horizontal shift diminishes to less than a half of what it is in A. This diminution augments with increase of inclination till among vertical beds there is no heave at all, though a fault with a horizontal thrust will cause a lateral shift even in vertical strata (see Fig. 331).

Strike-faults, where they exactly coincide with the strike, may remove the outcrops of some strata by never allowing them to reach the surface. Fig. 268 shows a plan (A) and section (B) of one of these faults, *f f*, having a downthrow toward the direction of dip. In crossing the strike, we pass successively over the edges of all the beds, except the part between the asterisks, which is cut out by the fault as shown in the section. It seldom happens, however, that