

CHAPTER VI.

VALLEYS, PASSES, AND MOUNTAIN-RAVINES.

THAT depression of the Earth's surface which occurs between two mountains, hills, or neighbouring plateaus, we call a Valley. In form and origin these depressions present a remarkable variety. The valleys are very narrow, and closely resemble actual gaps of the soil, if the mountains which enclose them approach one another very nearly. When they are separated by a wide interval, the valleys expand until they form plains.

If we consider their geological origin, we shall divide them into "valleys of subsidence," "valleys of upheaval," "valleys of separation," and "valleys of denudation."

The former are produced by earthquakes; that is, by the great

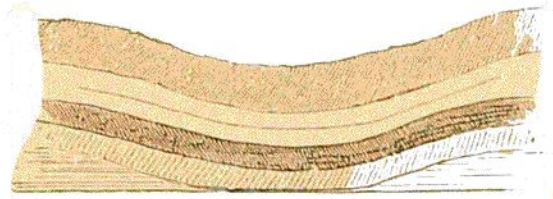


FIG. 71.—VALLEY OF SUBSIDENCE.

oscillations which in former ages convulsed the earth. Therein we see continued, with a gentle incline, the strata forming the lateral elevations.

"Valleys of upheaval" have originated in the sudden dislocation

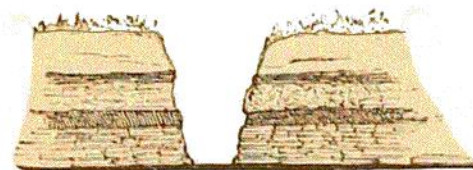


FIG. 72.—VALLEY OF UPHEAVAL.

of two or more layers of rock; a dislocation generally due to the action of an earthquake, as is shown in Figure 72.