



FIG. 77.—View of the Firth of Tay from Moncrieffe Hill, looking east. (A valley worn out of an arch of the rocks; the long slopes of the hill-tops on either side show the dip of the beds.)

Reduced to diagrammatic form the structure represented in Fig. 77 may be expressed as in Fig. 78.

There can be no doubt that the several coal-fields of Scotland were at one time united, if indeed they did not extend continuously across the site of the Southern Uplands into the north of England. They have been thrown into folds, the troughs of which now hold the different basins of coal, while from the intervening arches several thousand feet of sedimentary strata have been worn away (see Fig. 76).

I have already indicated that much of this great denudation was accomplished even as far back as Palæozoic time. But the Tertiary basalt dykes, as in the other regions of the country, furnish us with an interesting proof that there has been enormous erosion even within the comparatively brief interval that separates us from the