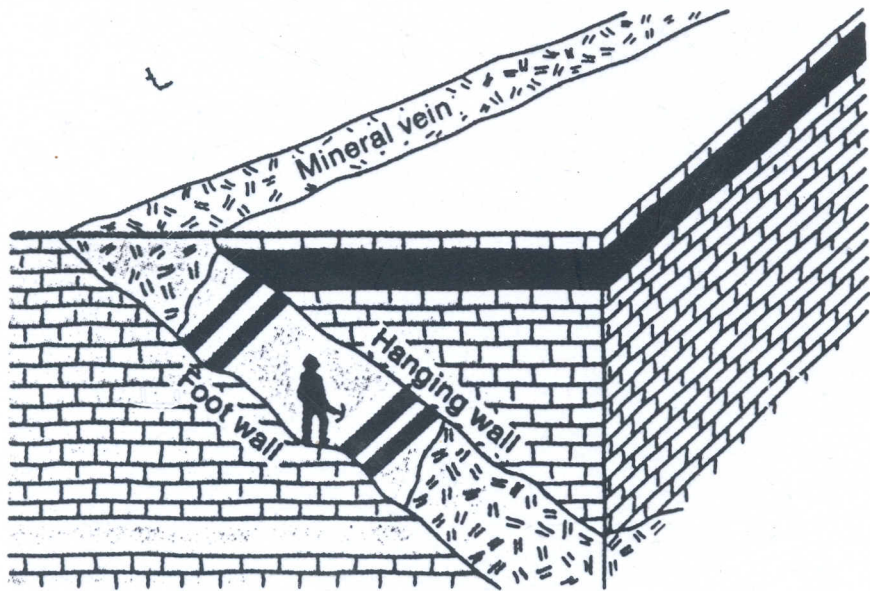


FIGURE 13.20 Diagram showing the relation of the hanging wall to the footwall of a fault. The miner stands on the footwall, and the hanging wall "hangs" above his head. A mineral vein has been deposited along the fault surface.



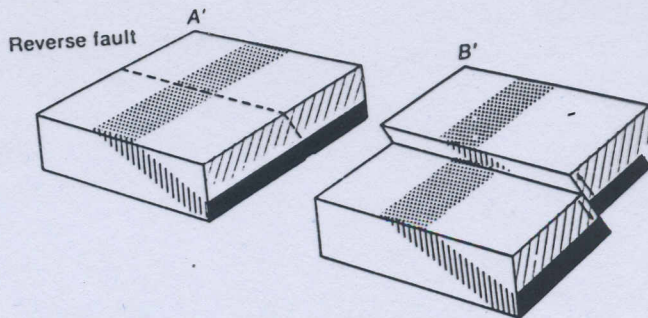
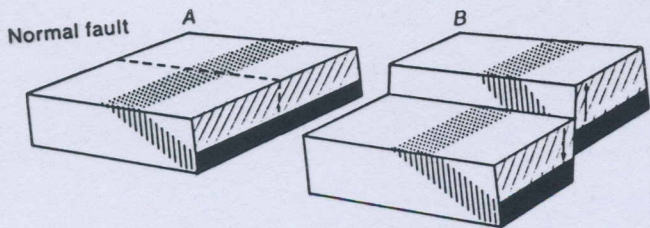
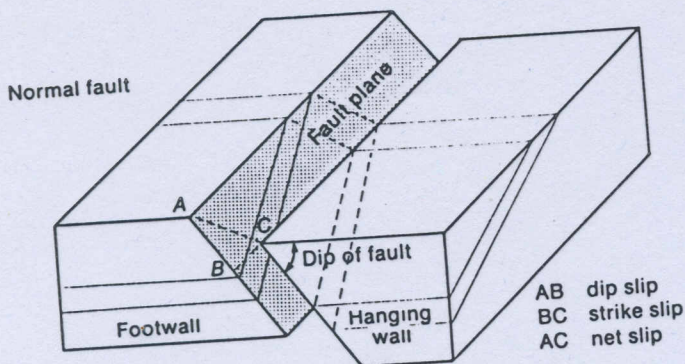


FIGURE 15.24 Series of block diagrams showing successive stages of development of a normal and reverse fault. A and A' are before faulting, with incipient fault plane shown by dashed line. B and B' are immediately after faulting, with relative movement along fault plane indicated by arrows.



AB dip slip
BC strike slip
AC net slip

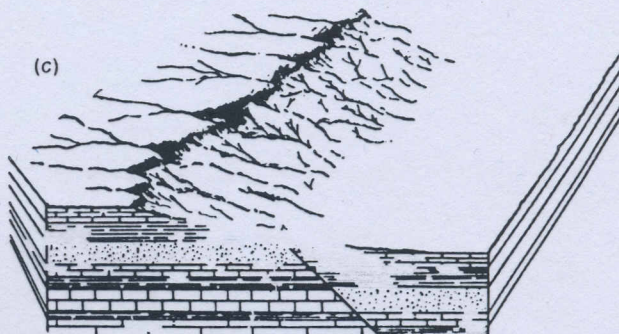
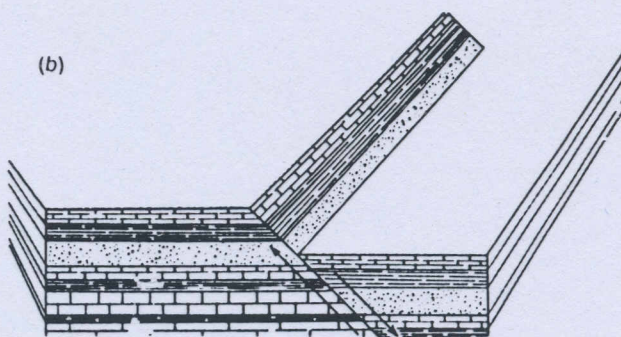
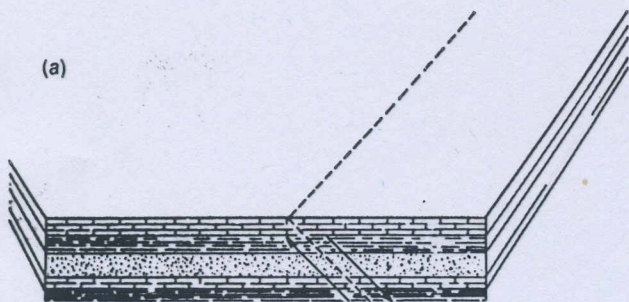
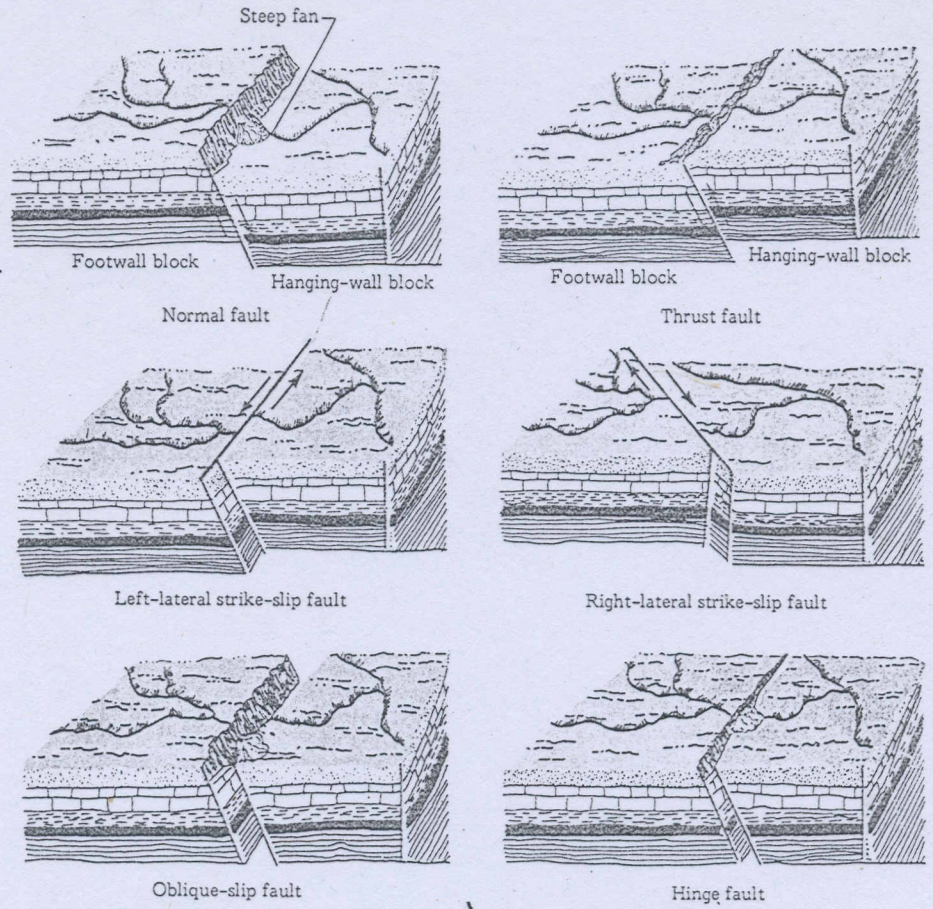


FIGURE 15.26 Development of fault-line scarp. Unfaulted block (a) is cut by a normal fault that produced fault scarp (b). Erosion of uppermost rocks produced fault-line scarp (c) facing in same direction as original fault scarp. Further erosion leaves behind high terrain formed of resistant rock, producing a fault-line scarp.

FIGURE 15.27 Fault scarp forming shore of MacDonald Lake near Great Slave Lake, MacKenzie District, Canada. The faulted block at the upper left has evidently been uplifted relative to the other block. (National Air Photo Library, Canada. Print A1520-105R.)

8.39 Types of fault.



8.40 Thrust fault on the Pan American Highway 40 km northwest of San Salvador. [Thomas F. Thompson.]



FIGURE 15.31 Diagram of a graben set (A). After extensive erosion, block (A) is reduced to the level of a peneplain, and the more resistant rock is removed from the highlands. Subsequent uplift of the region will cause stream erosion of the softer limestone along the margins of the sketch, leaving the resistant rock forming high ground. This produces an inversion in topography of the original graben structure. (After Lahee, 1952.)

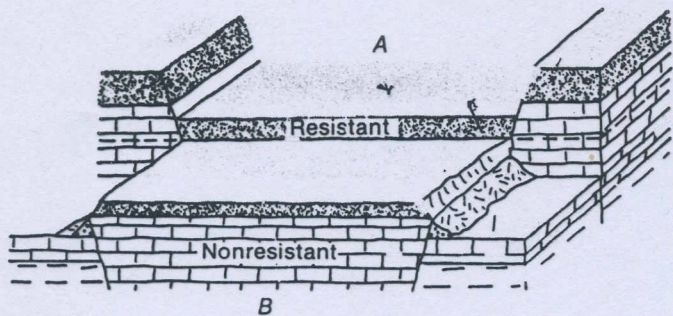
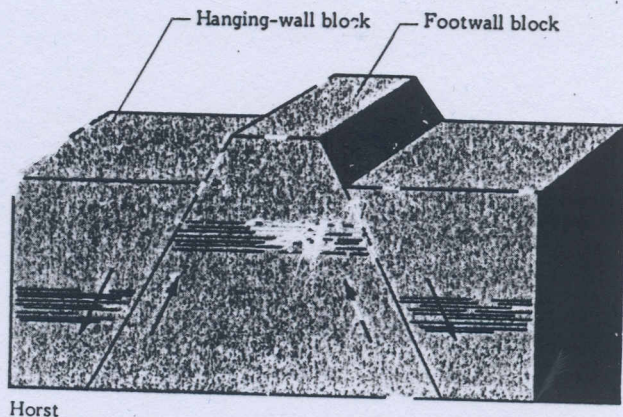
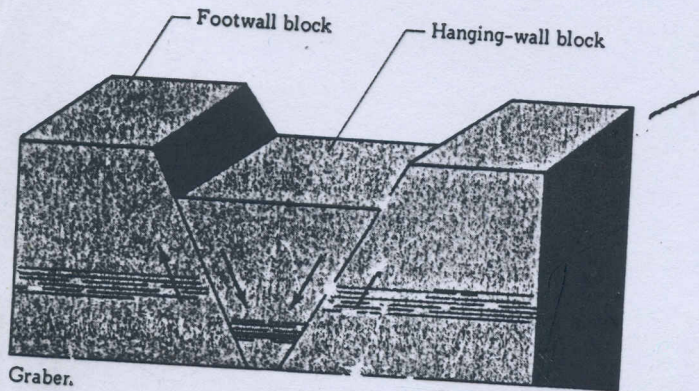
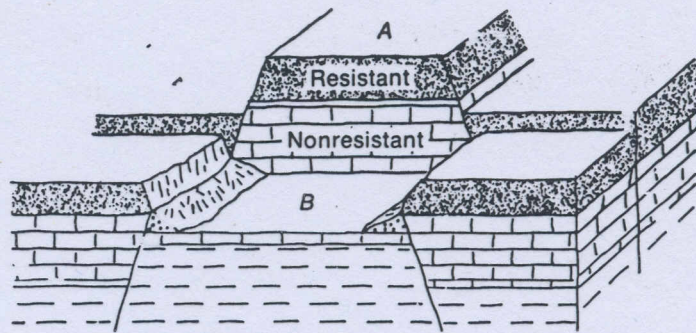


FIGURE 15.32 Diagram of a horst at (A). After extensive erosion, block (A) is reduced to the level of a peneplain, and the more resistant rock is removed from the high block. If the peneplain is uplifted and streams rejuvenated, a valley may develop as shown in block (B) in the foreground. Thus the lowlands of block (A) may become the highlands of block (B). Block (B) is still a horst in structure. (After Lahee, 1952.)



8.38 A graben, and a horst.

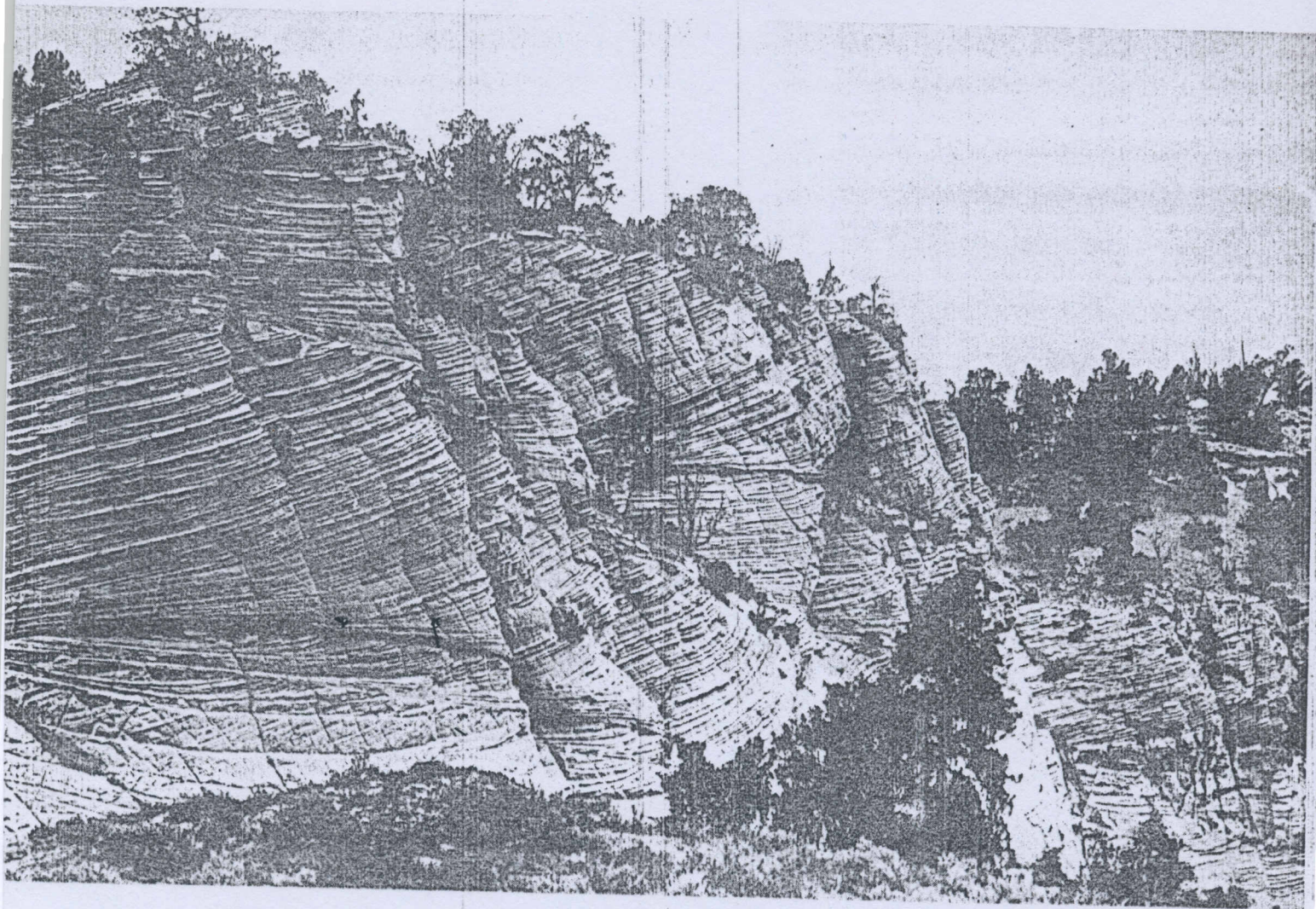


FIGURE 14-9

Wind-deposited cross-bedding is steeper and more erratic than that formed by water currents. Photograph is of the Navajo sandstone near Kanab, Utah. *J. K. Hillers, U.S. Geological Survey.*

1.46 Diagrammatic representation of one wall of the Grand Canyon along the Kaibab Trail, showing unconformities. [After W. J. Breed and E. Roat (eds.), *Geology of the Grand Canyon*, Museum of Northern Arizona—Grand Canyon Natural History Association, Flagstaff and Grand Canyon, Ariz., 1976.]

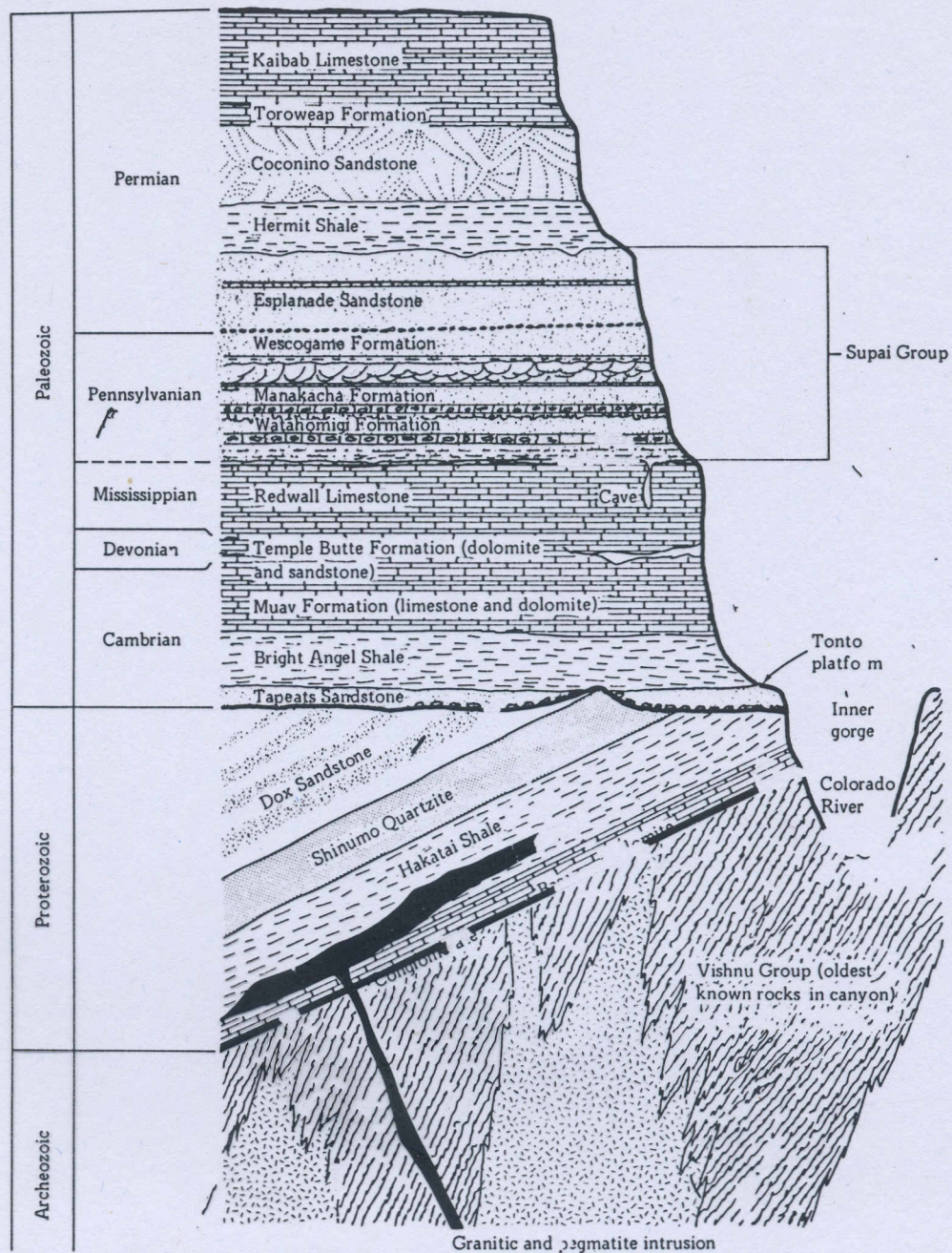




FIGURE 19.4

Boy Scout, Fritz Koenig. Sculpture made from the discarded tin cans of Boy Scouts, along with black cut-up pieces of tin for the face, Wisconsin.

draw a symmetrical fold & show anticline, syncline, axial plane in it- 08

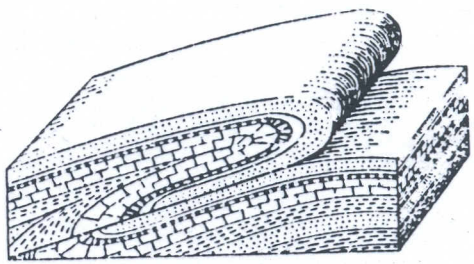
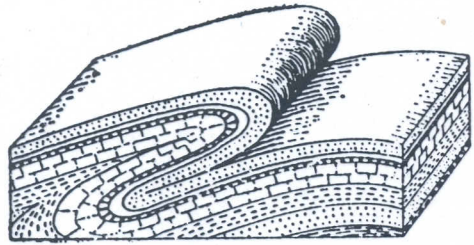
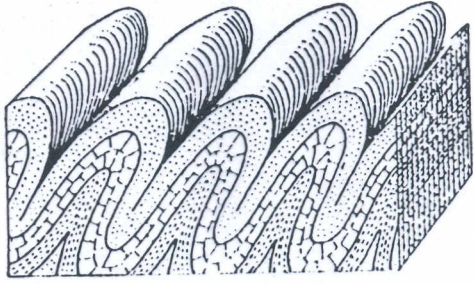
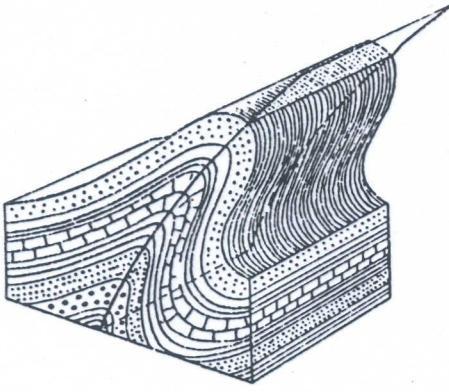
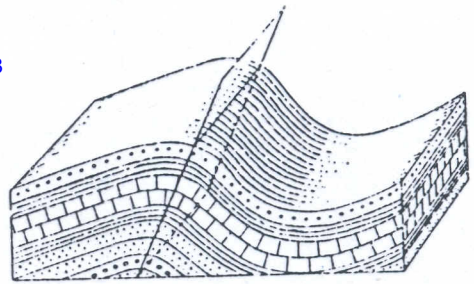
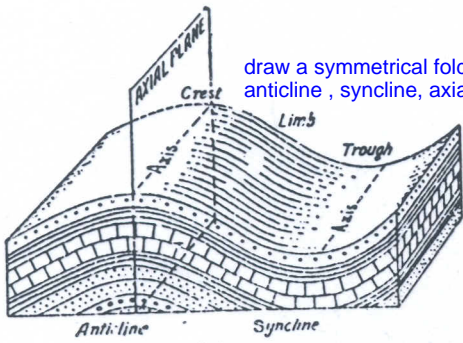


FIG. 66.—TYPES OF FOLDS.

(a) Symmetrical. (b) Asymmetrical. (c) Overturned. (d) Isoclinal. (e) Recumbent. (f) Recumbent, passing into a thrust.

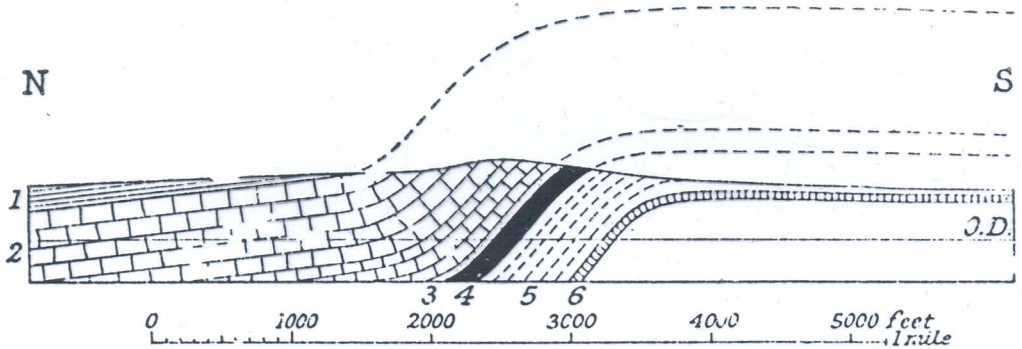


FIG. 67.—MONOCLINAL FOLD at the Hog's Back, about 4½ miles west of Guildford, Surrey (after H. G. Dines and R. H. Edmunds, H.M. Geol. Survey).

(1) Tertiary Loam. (2) Chalk. (3) Upper Greensand. (4) Gault. (5) Folkestone Beas. (6) Bargate Beds.