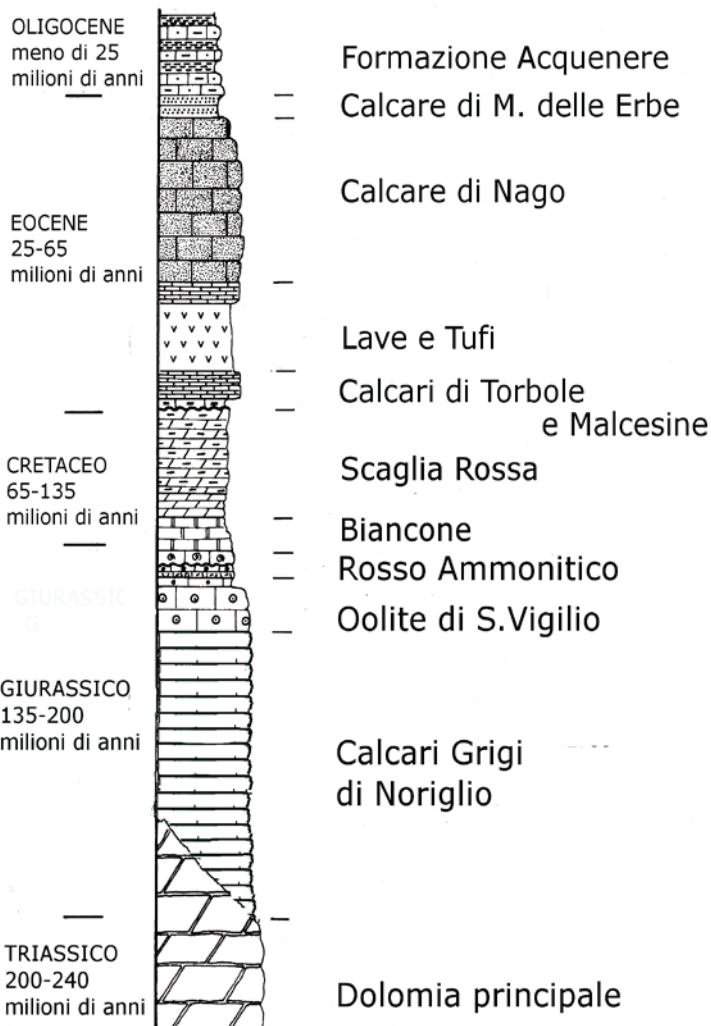


Geomorphology of Mount Baldo

The rocks

Mount Baldo is composed prevalently of carbonate sedimentary rocks formed by marine organisms. These rocks were uplifted as a result of pressure exerted by tectonic forces from two opposite directions: the Pre-Alps of Brescia on one side, the block of the Lessinia Mountains on the other.



Triassic (200 million to 240 million years ago)

- Main Dolomite - consisting of alternate layers of calcium-magnesium carbonate and algal mats (*stromatolites*).

Jurassic (135 million to 200 million years ago)

- Calcari Grigi di Noriglio Formations: these rocks are gray due to the presence of organic matter deposited in shallow water.
- San Vigilio Oolitic Limestone; light hazel, consisting in spherical grains of calcite (*oolites*) that formed as a result of the movement of tidal currents.
- Red Verona Marble: this limestone rich in macrofossils (*ammonites*) bears witness to the sinking of the ocean floor in the period of formation.

Cretaceous (65 million to 135 million years ago)

- Biancone: ivory white limestone thickly laminated with layers of flint, formed from sediments of great depth (over a 1000 meters).
- Scaglia Rossa: thickly laminated limestone, is reddish due to the presence of clay containing iron oxides.

Eocene (25 million to 65 million years ago)

- Torbole Limestone and Malcesine Limestone - fossiliferous limestone very rich in remains of marine organisms (nummulites, corals and echinoderms).
- Lavas and tuffs - produced by localized volcanic phenomena.
- Nago and Monte delle Erbe Limestone - these rocks result from a further deposition of calcareous sediments on surfaces already covered by tuffs and basaltic lavas.

Oligocene (less than 25 million years ago)

- Acquenere rock formations: can be considered as the last deposition on Mount Baldo of marine carbonate-rich detrital sediments.