TRAVERTINE FROM ROMANIA: ACTUAL EXPLOITATION AND ECONOMIC RECOVERY

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The exploitation of travertine in Romania is developing in Harghita (Borsec area) and Hunedoara (Carpinis, Geoagiu areas) counties. Today the total actual annual production of travertine in Romania is around 4000 m³, compared to the maximum of 62000 m³ in 1981 and 1983.

The Borsec deposit is stratiform, with a thickness of 12-15 m and 5° dip. It is formed by chemical precipitation of calcium carbonate from spring waters deposited on crystalline basement rocks. The rock has a white to slightly gray color, with diaclases filled by calcium carbonate. The travertine has a microcrystalline structure and a vacuolar texture. Current exploitation is made in a quarry where a 8 m thick travertine layer is mined. The travertine is extracted in blocks of $1.5 - 2.0 \text{ m}^3$ and is very easy to process. The annual production at Borsec is around 1000 m^3

The Carpinis deposit is overlaying schists and is about 90 m thick. The bottom part of the deposits (60 m) has a compact, slightly vacuolar texture while the upper part (30 m) show a only vacuolar texture. The travertine deposit is covered by 1-4 m thick red clays. The travertine has a white-yellow, white-gray or brown-yellow color. The structure of the travertine is microcrystalline, amorphous or of incrustation-type. At present the whole annual production of 2000 m³ comes from a single quarry.

The Geoagiu deposit formed above the Cretaceous and Miocene deposits. The color of this travertine is white-yellow to white-gray, the structure is microcrystalline or of incrustation-type and the texture is vacuolar. The travertine is exploited in 1-2 m³ blocks, the annual production being about 1000 m³ The travertine is extracted in blocks and is easy to process.