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## Estremoz Marble: a nomination for 'Global Heritage Stone Resource' from Portugal

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Historically, the Estremoz marbles from Portugal have been quarried, as ornamental and raw material stone, in Alentejo's South Portugal District at least since 370 BC [1]. The Cambrian age marbles represents 13% outcrops of the Estremoz Anticline, a Variscan structure with Precambrian core and younger rocks aged Devonian Period [2,3]. The marbles occupy an intermediate stratigraphic position in the Volcano Sedimentary Sequence. The Variscan Orogeny was performed twice under ductile and brittle tension fields so, geological features imprinted in the marbles are beautiful aesthetic patterns highlighted when used as Dimension Stone (Figure 1).



*Figure 1: Slab sawed perpendicular to principal metamorphic orientation showing two fold interference patterns.*

Considered as a noble raw material since ever, the use of the Estremoz marble still is a symbol of economic strength, good taste and distinction. There is no city in Portugal where Estremoz Marble has not, somehow, been used in both small works of art or utilitarian objects as public monuments and in private homes. It is estimated there would be hundreds of thousands of buildings that have used Estremoz Marble [2]. Pieces of art made with Estremoz Marbles were exported abroad and can be found in Museums and Archaeological Sites throughout Europe and North Africa countries [4]. Today Estremoz Marble's production can be found all over the World. It may be said that marble based built heritage is omnipresent everywhere in Portugal. Under the "Estremoz Marble" nomination there are several varieties of stones, from pure white to dark blue colors, with or without stripes and veins. The most valuable and distinctive are the light pink varieties called "Rosa Aurora" and "Rosa Portugal", among others commercial names given by producers companies.

The historical and widespread application of these marbles in National and International Monuments, some of them already part of the UNESCO World Heritage Sites, is a condition to propose them as Global Heritage Stone Resource for their international recognition.

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