

A POTENTIAL GSSP FOR THE UPPER PLEISTOCENE

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ABSTRACT: Negri A. *et al.*, *A potential GSSP for the Upper Pleistocene*. (IT ISSN 0394-3356, 2011)

Here we present the results of an integrated stratigraphic study performed in the Taranto area for the definition of the Tarentian stage for the Upper Pleistocene

RIASSUNTO: Negri A. *et al.*, *Un potenziale GSSP per il Pleistocene superiore*. (IT ISSN 0394-3356, 2011)

Presentiamo i risultati dello studio di una sezione localizzata nell'area di Taranto potenzialmente utile per la definizione del piano Tarentiano del Pleistocene Superiore

Key words: Chronostratigraphy Quaternary, Tarentian stage

Parole chiave: Cronostratigrafia, Quaternario, piano Tarentiano

The importance of a well established Chronostratigraphy is a starting point for the correlation of the various archives used for the reconstruction of climate, regional sea level fluctuations and tectonic movements. In this frame the Italian Commission on Stratigraphy of the SGI is seeking for a marine section suitable for defining the Upper Pleistocene GSSP. This Series has been usually identified with the Tyrrhenian Stage which in the wake of formalization received different meaning from stratigraphers and geomorphologists. Hence, the proposal of a new Upper Pleistocene Stage name and type area, the Tarentian, made in 1994. Criteria for defining the Tarentian Stage and selecting its GSSP can be the beginning of

MIS 5 (~ 134 ka) and the beginning of MIS 1 (~ 10 ka) taken for the base of the Holocene. The Tarentian Stage contains also MIS 5.5 highstand with its peak at ~ 125 ka.

Upper Pleistocene marine deposits of thickness exceeding 1 to 2 m are rarely exposed on land except for some Mediterranean countries. Italian coastal areas keep some hundreds of marine Upper Pleistocene sites. They are all characterized by the so called *Strombus bubonius* Senegalese tropical fauna (*Persististrombus latus* (Gmelin, 1791) (= *bubonius* (Lamarck, 1822)). They are found at different elevations from -130 to +170 m depending on the strong differential crustal mobility of the area. The best up to some 10 m thick Upper Pleistocene marine sections are exposed at the coast of the Gulf of Taranto facing the Ionian Sea. Here, where a well exposed marine succession has been uplifted very recently, we have explored the possibility to find a suitable GSSP for the upper Pleistocene adopting a combined stratigraphic approach based on litho bio and magnetostratigraphy and corroborated by paleoecological and, U-Th analyses.