



RCMNS Interim Colloquium "Continental-marine interactions during the Neogene in the Mediterranean area"

Granada, Spain, 9-12 September 2019

ABSTRACT BOOK



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DE GRANADA**



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Ciencias

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THE TENSERT LACUSTRINE LIMESTONES (CENTRAL DAHRA, ALGERIA): MESSINIAN STRATIGRAPHIC AND PALEOGEOGRAPHIC CONTEXT

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Keywords: marls, limestones, diatomites, Tortonian, Messinian, Dahra, Algeria.

Lacustrine limestones (80 m thick) with mollusks (*Planorbis* and *Lymnaea*) outcrop locally at Mediouna (Tensert wadi). They are circumscribed between diatomitic marls to the East and blue marls to the West, and rest on about 30 m of micaceous sandstones. These lacustrine limestones and diatomitic marls were considered contemporaneous and dated from the Late Miocene. In Sidi M'hamed Benali (Timzlat), the blue marls are unconformably found on Serravallian "variegated clays". They delivered a succession of *Neobloboquadrina acostaensis*, *Nq. humerosa* and *Nq. dutertrei* attributed to the N16 and N17 biozones. The same samples yielded *Coccolithus pelagicus*, *Reticulofenestra pseudumbilica*, *Discoaster variabilis* and *Discoaster prepentaradiatus*; the absence of *Discoaster hamatus* suggests their assignation to the NN10a subzone. The presence of *Discoaster neorectus* in the upper levels indicates they correspond to the NN10b subzone, i.e. middle and late Tortonian age. The absence of the (marine) base of the Tortonian is reported elsewhere in the Bas Chelif Basin. A sample taken at Tensert Wadi, in blue marls (under micaceous sandstones and lacustrine limestones), revealed the presence of *Globorotalia mediterranea* (N17: Messinian), confirmed by the presence of *Amaurolithus primus* (NN11b). Moreover, the diatomitic marls (Ben Abd Arfiâ locality), succeeding the micaceous sandstones, were attributed to the Messinian in several localities. The lacustrine limestones and diatomitic marls contemporaneity supposes either (i) a setting up of a Messinian paleolake which communicated, intermittently (threshold), with the open sea (diatomitic), which would explain the alternation of lacustrine limestones and siliceous limestones, or (ii) an uplift of the reliefs / lowering of the sea level inducing an intense erosion, posterior to the diatomitic marl unit, to feed into detrital products (silica, among others) the paleolake from the surrounding anterior diatomitic terrains (ongoing study).

