

A new rebbachisaurid sauropod from the Aptian–Albian, Lower Cretaceous Rayoso Formation, Neuquén, Argentina

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Rebbachisaurids are a group of basal diplodocimorph sauropods that diversified in Gondwana at the end of the Early Cretaceous and the beginning of the Late Cretaceous. It is a group of great palaeobiogeographical interest, for it clearly illustrates various processes of dispersal throughout Gondwana and to Laurasia prior to the breakup of Africa and South America. However, the relationships within the group are still under discussion owing to the scarcity of cranial material that would help clarify them. In the present paper we describe the new rebbachisaurid *Lavocatisaurus agrioensis* gen. et sp. nov. from the Aptian–Albian (Lower Cretaceous) of Neuquén (Argentina). Remains have been recovered belonging to an adult specimen (holotype) and two immature specimens (paratypes). Taken together, almost all the bones of the taxon are represented, including most of the cranium. *Lavocatisaurus agrioensis* gen. et sp. nov. is the first rebbachisaurid from Argentina with an almost complete cranium, making it possible to recognize differences with respect to other rebbachisaurids, such as the highly derived *Nigersaurus*. Among its most notable characters are the presences of a large preantorbital fenestra and maxillary teeth that are significantly larger than those of the dentary. Our phylogenetic study places *Lavocatisaurus* amongst basal rebbachisaurids, as the sister lineage to *Khebbashia* (the clade formed by *Limaysaurinae* + *Rebbachisaurinae*). This position, which is somewhat more derived than that previously suggested for *Comahuesaurus* and *Zapalasaurus* (the Argentinean rebbachisaurids closest in geographical and geological terms), reaffirms the presence of different basal rebbachisaurid lineages in the Early Cretaceous of Patagonia.

Key words: Dinosauria, Rebbachisauridae, phylogeny, Cretaceous, Rayoso Formation, Argentina.

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