

SEQUENCE STRATIGRAPHY OF THE MID.-CRETACEOUS MARINE DEPOSITS FROM THE ANDEAN ACTIVE MARGIN OF NORTHERN PERU.

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Between the Western (marine, distal) and the Eastern (continental, proximal) basins, the Northern cross-sections of Rentema, Zonanga, Corral Quemado (Jaen), Baños del Inca (Cajamarca) allow to demonstrate the diachronism of the SW-NE Mid.-Cretaceous transgression (Uppermost Early Albian) which begins more to the South (Huaraz, Lima) at the Aptian/Albian boundary. Above fluvio-deltaic siliciclastics (Goyallsquizca Formation), the 1st transgressive deposits (Inca Formation) consists of mixed depositional sequences including thick LST fluvio-deltaic sandstones, sometimes slumped, thin TST oolitic/sandy-glaucous limestones (with benthic Foraminifera and Oysters) and punctually HST marls (with Ammonites of the Chalensis zone, Uppermost Early Albian). The deepening is marked by the carbonates and marls of the Chulec Formation. (Knemiceras beds), where Ammonites point to the Halensis/Auritiformis zone (base) and the Dentatus zone (top), already Mid.-Albian in age. The depositional sequences correspond to the stacking of HST prograding parasequences marls -- biogenic mudstones. The following Formation (Pariatambo) is similar but anoxic (black shales facies). Containing Dentatus zone Ammonites, it points to the 2nd order transgressive peak of the mid.-Cretaceous series, just before the deposition of new HST carbonate - dominated and Ammonite - bearing Yumagual and Majarrón Formations, Upper-Mid. Albian and Late Albian in age.