

Spatiotemporal change of sedimentary environments of the incised-valley fills in the Tokyo lowland, central Japan

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About eighty to sixty meters of incised-valley fills have been formed during the post-last glacial period in the Tokyo lowland and the Eastern part of Saitama Prefecture. These fills are supposed to be composed of fluvial basal gravel (BG), the Nanagochi Formation of fluvial to brackish environments, the lower Yurakucho Formation of mud dominated inner-bay environments and the upper Yurakucho Formation of sand dominated fluvial environments in ascending order. Though a lot of boreholes for ground surveys and some ^{14}C ages obtained from well cores are examined to establish the stratigraphic of the fills, the spatiotempral change of sedimentary environments based on detailed dating data are not clarified yet.

In this study, we investigated six well cores obtained along the Nakagawa River of the Tokyo lowland. Sedimentary structures, mud contents, molluscan fossils and about twenty ^{14}C ages of each core were examined respectively. We clarify sedimentary facies and their spatiotempral changes of the incised-valley fills in the Tokyo lowland and the Eastern part of Saitama Prefecture based on the detailed dating data.