Preliminary results on siliceous and calcareous microfossil biostratigraphy and oxygen isotope stratigraphy of Site C9001 Hole C

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The studied Site C9001 Hole C was drilled on the continental slope in the northwest Pacific off the Shimokita Peninsula, Japan, during CK06-06 D/V Chikyu Shakedown Cruise. We investigated siliceous and calcareous microfossil biostratigraphy and oxygen isotope stratigraphy to construct an age model for the 365-m-long sediment core from Hole C9001C. A total of 237 samples were collected generally at 1.5 m interval (1 sample/section). Sample preparations were carried out using the standard techniques for siliceous and calcareous microfossils analyses. We performed oxygen isotopic analyses on a benthic foraminiferal species, *Uvigerina akitaensis*, at 226 horizons using an online system employing an IsoPrime isotope-ratio mass spectrometer (GV Instrumental) coupled to a Multicarb automatic sample treatment system at the Center for Advanced Marine Core Research, Kochi University, Japan. Stratigraphic variations of stable oxygen isotope for *U. akitaensis* represent cyclic changes between cooler and warmer intervals. The sequential change of the oxygen isotopic record from Hole C9001C is in good agreement with the standard stack of the oxygen isotope curve, although there are some minor excursions in the core. We detected seven biostratigraphically significant siliceous and calcareous microfossils datum levels in the Hole C9001C column. This study presents preliminary results on an age model for Hole C9001C based on a combination of magnetostratigraphy, tephrostratigraphy, microfossil biostratigraphy, and oxygen isotope stratigraphy.