CHINA’S EARLIEST INHABITANTS

BY

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Abstract

Recent reevaluations of the absolute chronology of human ancestry in East Asia, particularly China and Indonesia, yield the not unexpected conclusion that eastern Eurasian Homo erectus may be synchronic with the earliest members of that hypodigm known from Africa.

In the past decade, both archaeological and paleontological evidence has come to light in China suggesting the presence of human ancestors prior to the Matuyama [R] chron–Brunhes [N] chron boundary of ca. 730,000 BP. Preliminary chronometric data derived from several localities indicate ages in excess of one million years.

For the past two decades, south China has dominated the picture of palaeoanthropological discovery in the easternmost Old World. Localities discovered in Yunnan, Guangxi, Guizhou, and elsewhere south of the Yangzi drainage have yielded both fossil and cultural remains radically altering interpretations of primate and human evolution in the region (Olsen and Miller-Antonio 1992).

Among the most recent of these discoveries are those made in 1992 at Shanghuang 上黃 in southern Jiangsu province (Beard et al. 1994). Setting the stage for subsequent primate evolution in the region, the middle Eocene Shanghuang fauna comprises at least two species of lemur-like adapiforms, two tarsiiform genera, including a new species of Macrotarsiis, a genus otherwise known only from North America, and a new family of basal simians, the Eosimiidae, that collectively demonstrate even the earliest phases of primate evolution in East Asia were characterized by complex interactions with other continents, including Europe, North America, and perhaps Africa, through dispersal. While many factors underlying the dispersal patterns of individual taxa remain to be explained, the Shanghuang discoveries indicate complexity of interaction rather than insular separation is the key to formulating models of primate development in the region.

The large sedimentary Yuanmou 元謀 Basin in northern Yunnan province, near China’s border with Myanmar (formerly Burma), has long
been known as a source of Cenozoic fossils. In 1965, two upper central incisors ascribed to a new subspecies of *Homo erectus*, *H. e. yuanmouensis*, were discovered near the village of Shangnabang. Several thick quartzite scrapers were also found in questionable association with the hominid teeth. In 1973 cores, flakes, scrapers, choppers and pointed tools were recovered from five additional localities within a 15 km radius of Shangnabang, although again no clear association could be established between the artifacts and the hominid remains recovered earlier.

During the 1970s and early 1980s, palaeoanthropological research in the Yuanmou Basin focused on the problem of chronology. The Yuanmou Formation, in which the hominid remains and artifacts were recovered, is a nearly 700 m thick sequence of fluvio-lacustrine strata subdivisible into four main members. Precisely locating the original find-spots of the Middle Pleistocene hominid fossils and artifacts within this sedimentary sequence has proven difficult and subsequent palaeomagnetic determinations have led Chinese workers to infer ages ranging from nearly 1.8 million years to only 500-600 thousand years for the hominid-bearing strata (Chen and Zhang 1991; Hu 1973; Zhou and Hu 1979).

Of greatest relevance to the discussion at hand is a series of discoveries made in the Yuanmou Basin in 1986. There, in the Zhupeng district, more than 200 isolated primate teeth were recovered including several that subsequent analysis has ascribed to a new species of *Homo*(IL *orientalis*) and a new species of *Ramapithecus* (=Lufengpithecus), *R. hudiensis* (Zhang et al. 1989). A handful of chipped stone tools were also recovered from the same sedimentary deposit as the hominid remains. Palaeomagnetic dates of 3.0-4.4 million years ago have been proposed for the Zhupeng *Homo*, but substantial doubt remains as to the true association between the fossils, artifacts and the derived dates. Few scholars accept IL *orientalis* as a taxonomically valid species, and it is likely these remains will be subsumed under *H. erectus* after additional comparison. Nonetheless, the extraordinarily early dates proposed for the Zhupeng hominid remains necessitate consideration of the possibility that *H. erectus* in south China antedates *Homo* in the north by some substantial margin (Olsen and Miller-Antonio 1992).

In March 1993, Chinese scientists recovered a partial fossilized hominid cranium at Huludong, a karst cave near Tangshan in Jiangning County, Jiangsu, east of Nanjing. These remains, including the frontal bone, anterior portions of the two parietals, a partial occipital, complete nasals, an incomplete left zygomatic arch, and a small part of the left maxilla, have been ascribed to *Homo erectus* both on the basis of their morphology as well as their depositional context which includes an associated middle Pleistocene