

### Early rock art and settlement in Brazil

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A short article just published by Watanabe et al (2003) presents thermoluminescence and EPR dating of a calcite veneer which covers a rock painting at the Toca da Bastiana shelter in the Serra da Capivara National Park in the Piauí region of Brazil. The dates obtained — 35 to 43 ka ago — imply that the painting is at least 36,000 years old.

Such a result may come as a shock to those who still cling to a belief in the “Clovis-first” model of New World settlement. However, the existence of rock art at such an early date fits perfectly with totally different and independent data obtained some years ago from the famous Pedra Furada rock shelter in the same region. Here, a detailed analysis by Maria Conceição Meneses Lage (1999) of pigments found buried in the site indicated clearly that they were manmade rather than artificial, and thus that the practice of making pigments and painting rocks at Pedra Furada dates back to more than 20,000 years ago.

By coincidence, the long-awaited monograph on the excavations of Pedra Furada also appeared fairly recently (Parenti 2001). The delay in its appearance — almost ten years after Parenti’s huge doctoral thesis was produced (Bahn 1993) — has ensured that Pedra Furada has not loomed large in the awareness of those engaged in the (now largely redundant) debate about Clovis-first. Many articles and books on this topic have mentioned the site sceptically or briefly, if at all, while last year one television documentary in Britain on the “First Americans” not only ignored the site completely but even failed to mention Monte Verde, which was astounding. Throughout the book, Parenti, fully conscious of the many and varied objections

that have been raised about the validity of the site’s Pleistocene data over the years, is meticulous in assessing the evidence he uncovered — the source of the sedimentation, the indisputably manmade structures and fireplaces, etc. No less than 55 radiocarbon dates have been obtained, 46 of which are considered valid, which form a “solid, coherent and remarkably long sequence” from about 6150 to 50,000 years ago.

In view of criticisms and doubts levelled at the site in the past, Parenti has devoted a tremendous amount of attention to the recognition of naturally flaked pebbles, and the elucidation of valid criteria for recognising human flaking. He has found that the vast majority of the pebbles that fall from the cliff-top above remain intact, while the rest never have more than three flakes removed, and these are always from only one side. In his study of the worked lithics, the author has focused on those pieces that he considers to have been most probably worked by humans. To aid his analysis, he carried out experimental flaking of the site’s raw materials. In this way he was able to establish that some Pleistocene pieces had indisputably been retouched.

So researchers can at last examine the evidence for themselves, in its newly available form. I believe that only the most hardened Clovis-first diehards will find it difficult to accept Parenti’s meticulous and objective approach to the site and its contents. So Brazil, along with Chile, should now be at the forefront of studies of the earliest settlement of the New World. But where did these early settlers come from? The brief article by Watanabe et al ends by referring to skulls from

Brazil which have Negroid characteristics, and the possible (albeit improbable) migration of people from Australia across the Pacific or from Africa across the Atlantic — speculations which take their place alongside the equally controversial theory of some link between the Solutrean industries of western Europe and the (somewhat

later) Clovis fluted points of America. For the moment, the most important point is for the authenticity of the Piauí Pleistocene sites to be accepted at last, together with their very early evidence for rock painting. That struggle is over. Therefore, the debate can now safely switch to these other controversies.

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Watanabe, S, Feria Ayta, Hamaguchi, Guidon, La Salvia, Maranca, and Baffa Filho 2003. Some evidence of a date of first humans to arrive in Brazil *Journal of Archaeological Science* 30:351-354