

NEANDERTHAL BONE TOOLS FROM INSIDE, AT JONZAC, QUINA LEVEL, FRANCE

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Abstract

Although pioneering studies a century ago revealed the existence of Mousterian bone tools of various morphologies, they were forgotten and only the retouchers present in many assemblages were finally retained as (pseudo) bone tools, but seen by prehistorians to be the result of opportunistic pickings in food wastes, despite their essential role in the functioning of lithic tools. This apparent lack of a Mousterian bone industry, according to current typological standards, was interpreted as a cognitive inability of Neanderthal to perceive the specificities of the bone material and the technical opportunities it offered. This led to the point that blunt ends of herbivore ribs shaped by scraping or abrasion from two late Middle Palaeolithic assemblages were quite recently regarded as the first standardised and specialised bone tools of humankind, that predicted the coming Upper Palaeolithic. However, mentions of bone tools of this kind exist at a low level

in the scientific literature, most often in the form of isolated finds, but sometimes also in sets. The recent discovery at the Chagyrskaya site in western Siberia of an undeniable Middle Palaeolithic bone industry, with a variety of tools on ribs and on blanks produced by fracturing, adjusted by retouch and scraping or abrasion, suggests that there is a part of the Mousterian technical system which has not been sufficiently explored. However, the identification of such artefacts is based on technological and traceological criteria that are difficult to understand outside a narrow community of specialists, while several decades of taphonomic research have warned against natural convergences in form. We shall see, with examples from the Quina bone industry of Chez Pinaud site at Jonzac, how X-ray microtomography can provide complementary clues to characterise the technically significant parts of the objects.

Keywords: bone industry; Neanderthal; Quina; traceology; microtomography