

AWRANA 2022
BARCELONA, APRIL 4-7
COSMOCAIXA

TRACING SOCIAL DYNAMICS

BOOK OF ABSTRACTS



CSIC

CONSEJO SUPERIOR DE INVESTIGACIONES CIENTÍFICAS

awr^ona

Association of Archaeological Wear & Residue Analysts

ORGANIZERS



EEHAR
Escuela Española de Historia
y Arqueología en Roma - CSIC



SPONSORS



CAN STONE TOOL HAFTING REFLECT UPPER PALAEOLITHIC SOCIAL DYNAMICS? NEW DATA FROM ABRI PATAUD, HOHLE FELS, AND MAISIÈRES-CANAL

Noora Taipale 1*

¹ TRACEOLAB / PREHISTORY, UNIVERSITY OF LIÈGE, BELGIUM.

* noora.taipale@uliege.be

Abstract

Study of stone tool hafting extends the scope of traceological analysis into the reconstruction of composite tools, which aids in assessing the time and resources invested in Palaeolithic technology independently of the level of organic preservation. We present the results of a PhD project that investigated stone tool hafting at three Gravettian and Magdalenian sites located in Western and Central Europe. The data from a functional screening of tens of thousands of stone tools and a detailed use-wear analysis of over 1000 artefacts recovered at the rock shelter Abri Pataud, the cave site Hohle Fels, and the open-air site Maisières-Canal are used to describe and explain variability in lithic tool hafting. Domestic tools are given here particular attention and, in the case of Abri Pataud, studied in parallel with projectile armatures. We attempt to start from the simplest mechanical explanations for the observed patterns and proceed towards more complex ones involving the

social organisation of subsistence and other activities. Our analysis demonstrates that while certain patterns, such as the difference in the relative frequency of scraper and burin hafting, are best explained by basic task mechanical requirements and tool use preferences, others, such as the varying frequency of hafted scrapers in different sub-assemblages, seem to require other explanations. We show that scraper hafting likely predates the oldest assemblages analysed here and is applied flexibly according to context. By ruling out explanations related to e.g. lithic raw material economy, we wish to show that the variability may be linked to the differences in the investment in hafted tool technologies, which is likely to have been related to social organisation. Based on these results, we argue that data on stone tool hafting can be valuable to enquiries into the ways in which past technologies were tied to their social contexts.

Keywords: lithic use-wear; hafting; Gravettian; Magdalenian