

Late Bronze Age Salt Production in the Carpathians and its socio-economic context

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A number of salt springs were observed on the northern slopes of the Góry Słonne (Salty Mountains) in the Tyrawka Valley in the Beskids (southeastern Poland). Several hundred salt springs were known from the entire eastern arc of the Carpathians as late as the 19th century, as evidenced by a map from this period (Kelb). However, most of these brine springs were at that time only exploited on a local level.

A salt extraction site was excavated at Tyrawa Solna 12. Pits with *briquetage* (very coarse evaporation vessels used to extract salt from brine) and settlement pottery associated with the Gáva culture of the Carpathian Basin were discovered. Radiocarbon dates corroborate dating to the early final millennium BC. Since there is no evidence of permanent structures and no proof of continuous habitation at the production site, it appears to be a salt extraction area with a separate settlement site.

Magnetic prospecting has been conducted at several locations in the Tyrawka Valley, mainly at Tyrawa Solna 12 and 33. *Briquetage* has also been found at some further locations in the lower part of the Tyrawka Valley and the San area (Tyrawa Solna 33, Siemuszowa, Hłomcza). The Early Iron Age hoards in the vicinity seem to be connected to salt production, evidenced by the presence of *briquetage* objects (Hłomcza, Lubatówka).

The organization of salt making in the production centre on the San River cannot yet be presented in detail as research in this region is still in its initial stages. However, it was probably local and seasonal salt exploitation at a subsistence, non-specialized production level. It is also possible that expeditions were made from more distant areas at favourable times of the year. This is in contrast to the large salt extraction centres with their specialized production in Krakow, Halle or in the Eastern Alps (Hallstatt, Hallein). Although the archaeological evidence at these famous sites indicates mass production, large-scale producers obviously could not meet demand. Therefore, local or regional self-supply always

played an important role, even during the peak periods of Late Bronze Age and Early Iron Age salt production.

The trade in salt formed part of the Late Bronze and Early Iron Age trade network in which other raw materials and commodities were also exchanged. In the unstable, clan-based social order of the time, the quest for control over trade routes and market places may often have led to conflicts. These were occasionally settled violently as attested by the fortified hilltop settlements, which were built as necessary infrastructure for conflicts (Heunischenburg), and the indications of actual fighting (Tollensetal, Niederviehbach).

References

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