

## The beaver *Steneofiber depereti* from the lower Upper Miocene hominid locality Hammerschmiede and remarks on its ecology

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*Acta Palaeontologica Polonica* 67 (4), 2022: 807-826 doi:<https://doi.org/10.4202/app.00997.2022>

Dental remains of a medium sized beaver from the early Late Miocene Hammerschmiede locality (MN 7/8) in the Northern Alpine Foreland Basin (Southern Germany, Bavaria) are described and assigned to *Steneofiber depereti*. The numerous material (160 teeth) was collected in the two fossiliferous layers HAM 5 and HAM 4 and comprises beaver individuals of a large range of age classes, from juvenile to old. The dental remains metrically and morphologically overlap the stratigraphic older *Steneofiber* spp. and the younger *Chalicomys* spp. This supports the hypothesis of the European anagenetic evolutionary lineage *Steneofiber depereti*–*Chalicomys jaegeri*. The morphological characters to differentiate *Steneofiber depereti* and *Chalicomys jaegeri* are discussed and redefined. The performed age-frequency distribution (Mortality profile) indicates a natural ecological mortality and confirms that at least the fluvial channel of the HAM 4 deposits was the actual optimal beaver habitat and continuously populated by larger family groups of beavers. Furthermore, there are indications that the Hammerschmiede beaver had a similar parental investment as today's beavers, where young adults migrate to poorer habitats in the second year, in search of their own territory. The shallower channel of HAM 5 possibly represents such a “second choice” habitat.

**Key words:** Mammalia, Rodentia, Castoridae, *Steneofiber depereti*, ecology, mortality, Miocene, Germany, Bavaria.

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