



Amber bearing deposit in SW Saaremaa, Estonia – sedimentary environment and palaeogeography

Triine Post (1), Mirja Ots (2), and Alar Rosentau (3)

(1) University of Tartu, Tartu, Estonia (triinep@gmail.com), (2) Tallinn University, Tallinn, Estonia (mirja@tlu.ee), (3) University of Tartu, Tartu, Estonia (alar.rosentau@ut.ee)

The paper describes a deposit of natural amber found from Estonia. Finds of natural amber are important in the context of the Bronze Age archaeology, because the amount of Bronze Age archaeological amber found in Estonia is very small. Most of the amber is from the Late Bronze Age and is mainly discovered from the fortified settlements in Saaremaa, some also from burials of the same time. Now, the discovery of the deposit of natural amber in the island of Saaremaa makes us reconsider the general opinion that all archaeological amber items found in Estonia have been imported. The aim of this study is to clarify the origin and age of the natural amber using scientific methods.

A layer of buried organic matter (BOM) containing pieces of natural amber was discovered in Holocene coastal plain on Sõrve peninsula, island of Saaremaa. The BOM layer is buried under ca 90 cm-thick sandy coastal deposits and consists of remains of coastal plants and pieces of driftwood. Palaeogeographic reconstructions and sediment composition indicate that the layer was deposited in the coastal zone and buried quickly by sandy marine sediments. According to radiocarbon dating of the seeds of *Polygonum lapathifolium* the formation of the BOM layer remained in the Late Bronze Age (2480 ± 30 14C yr BP). Amber finds have been characterized using ATR-FTIR spectroscopy and isotope analysis of light elements (H and C) – both are referring to Baltic amber. Therefore it is probable that amber was transported to Saaremaa within organic matter from the Latvian-Lithuanian coastal zone where secondary Baltic amber deposits are widely known.