Discovery of a dug-out boat in Cieśle, Poznań district

In 1992, during the exploitation of limemanure in a surface mine at the old shore of the Niepruszewskie Lake, a dug-out boat was discovered. The surface mine is situated *ca.* 250 m off today's shoreline of the lake (Figs. 1–2). The boat (Fig. 3) was incidentally found at 2.15 m of the calcareous gyttia underlying the surface

of the meadow. Ca. 30 m away from the finding's site at the same depth a concetration of several oak and pine pales was found (Fig. 4). Those are probably the remains of an on-shore construction connected with the use of the boat.

The specimen discovered represents one of the most primitive types of dug-outs, *i.e.* the trough dug-out, with no clearly discernible bow or stern, and no separate bulkheads. The only additional elements are the cuts two-thirds down the sides, probably used for fixing oars (Figs. 5–6). The dimentions of the boat are: lenght - 3.55 m, width - 0.84 m, height - 0.47 m (Fig. 7). The boat was made of oakwood, a material most often used for this type of construction due to its durability.

Among about 30 dug-outs found in the Polish territories (STEPIEŃ 1986) only few have an established chronology. The Cieśle specimen is one of the oldest, and is remarkably well preserved. Correlation of the results of two independent wood analyses, dendrochronological and radiocarbon allows to date the boat to the beginning of the 17th cent. BC, and the pales themselves – to the end of the 18th cent. BC. A more precise dating for felling of the trees (1708 and 1704 BC) and for the boat construction (*ca.* 1702–1694 BC) was also possible. The users were apparently the inhabitants of the nearby Prelusatian culture settlements.

The oldest findings of boats in Western and Central Europe come from the Late Palaeolithic from the territories of Germany and Denmark (AMMANN et al. 1977; ANDERSEN 1987; RAUSING 1984) and appeared in an almost unchanged form since the first century of our era (MCGRAIL, MILLETT 1985). In Polish territories the oldest artefacts connected with boat use are thought to be the fragments of wooden oars found in Szlachcin during the investigations of a bog settlement of the Funnel Beaker culture carried out in 1934–1935 (JAZDŻEWSKI 1936; TETZLAFFÓWNA 1966).

The dug-out is housed in the collections of the Archaeological Museum of Poznań.

Translated from Polish by Zofia Ziołkowska