6626730

Hradecky Bridge: the Story of the Oldest Three-Hinged Bridge Still in Use

Lara Slivnik
University of Ljubljana, Faculty of Architecture

Abstract

During the year 2017 the Hradecky Bridge will celebrate its 150th anniversary. The bridge crosses the River Ljubljanica in Ljubljana, Slovenia. It was the first three-hinged arch bridge built in Habsburg Monarchy and nowadays it became the world's oldest surviving three-hinged bridge.

The bridge was planned in 1865 by chief engineer Johann Hermann (Herrmann) from Vienna, cast-iron prefabricated structure was made at the iron foundry in Dvor near Žužemberk, and the concrete foundations were constructed by Gustav Tönnies from Ljubljana. Bridge was named after Mayor of Ljubljana Janez Hradecky (Hradeczky) and was opened in 18th October 1867.

The primary structure of a bridge is a prefabricated three-hinged truss arch with the total span of 30 metres, width of 5.7 metres, and the high of the arch is 2.2 meters. The prefabricated structure allows the bridge to be moved three times to three different locations. At the original location the bridge connected Old Square and Now Square in the Ljubljana city centre as Hradecky Bridge (Hradeckega most, 1867-1930). Because of the regulation of the river banks, designed by the architect Jože Plečnik in 1930s, the bridge was moved near the Mortuary and become popular with a nick name Mortuary Bridge (Mrtvaški most, 1931-2009). As the transport over the bridge become too heavy at the end of 20th century, the bridge was moved again. Nowadays it is used as a pedestrian bridge in Ljubljana city centre and bearing again its original name, Hradecky Bridge (Hradeckega most, 2011).

The presentation of the Hradecky Bridge will combine architectural and art history with the history of Ljubljana as well as the history of three-hinged arch bridges and the history of cast iron as a material. The Hradecky Bridge is an important although not well known treasure of the world's heritage.