

Abstract

This doctoral thesis is focused on determining selected technical parameters in the implementation of repair of water management structures, especially reservoirs with an emphasis on optimal preparation of the concrete surface of these objects before repair.

Limiting factors in the testing of monitored objects, in particular the requirements to reduce the number of samples from the structure (due to the limited possibility of taking a sufficient number of samples from the structure to perform destructive tests) led us to search for the possibility of creating other relationships to complete and refine some of the required parameters (relation between tensile strength of concrete surface layers and compressive strength of concrete).