



Tikhvin water system: history, modern state and perspective of partly restoration

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Tikhvin water system is important object of technical construction within Leningrad – Petersburg, Vologda and Yaroslavl districts. It was suggested by Peter the Great and built 100 years later – at 1811. It connected St.-Petersburg region (hubernia) with Volga water system. It was 902 km long and consisted of 62 sluices, number of artificial channels, rivers and ponds. To begin of XX century it became under suffocation because of transport progress. It was not available to serve great engine ships. Railways got a serious competition for water system. System began to destroy. Unfortunately, till now there is deficiency of whole description of past and present state of the system. The author of the report during some years was principal investigators of expedition for obstacles and fragments of Tikhvin water system. Staff of expeditions was completed by students educating for natural sciences. There is a big pattern of remains having historical importance. They are summarized and published within reviews of expeditions. Data of hydrology, hydrochemistry, hydrobiology were collected by expedition as material for ecological monitoring and ecological forecast for region. Destroyed systems and its remains are interest objects for ecological and historical tourism and may be perspective area of field practice for students. There are three possibilities of restoration of system. Maximal variant this is restoration of all system is expansive and having a little reason. Minimal variant is restoration of one lock as technical monument. The medium program deals with partly restoration of the system within modern rational use of nature development, ecological tourism and regional program of sustainable development.