



Simulation of Unexpected Pump-stop Water Hammer of Pressure Conduit of the Miyun Reservoir Storage Project

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Water Hammer of cavities collapsing with water column separation often occurs in long distance pressure water transmission pipe line system with high-lift and multi-fluctuation. In this paper, the water hammer simulation calculation of a section from Yan XI pump station to Xi Wengzhuang pump station multi - ups and downs in the Miyun Reservoir Storage Project is carried out. According to the simulation results, the effective water hammer protection measures are selected so as to improve the safety of the water delivery system. The results show that the effective protection of the pipeline system can be realized by the combination of the combined intake and exhaust valve and liquid controlled slow closing check valve