



Dam Investigations

Background

NSW Public Works MHL provides a comprehensive service in dam investigations, including hydraulic, environmental and field investigations, and numerical and physical modelling.

NSW Public Works MHL has been involved in the investigation of many Australian dams, either when constructed or during investigations to upgrade these dams. These dams include Warragamba, Burrinjuck, Keepit, Copeton, Burrendong, Chaffey, Hume, Dungowan, Split Rock, Pindari, Mangrove Creek, Lake Manchester, Googong, Tallowa, Wellington and Worsley FWL.

Services Provided

NSW Public Works MHL has the capacity to cater for both physical and numerical modelling of dams and associated infrastructure. Areas of investigation include:

- spillways – including discharge characteristics, pressures, forces, air demand
- outlet controls, regulator works, valve cavitation, energy dissipators, scour
- pumping stations
- coffer dams and diversion structures
- fishways and fish ladders
- underwater inspections
- coldwater pollution investigations
- algal pollution investigations
- dam movement studies.

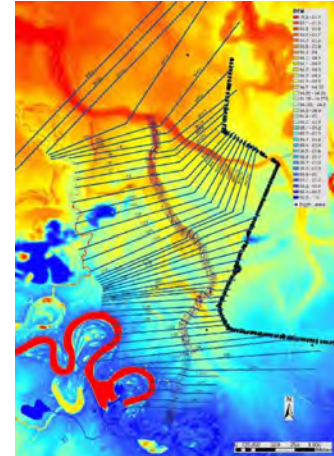
Key Features

NSW Public Works MHL has the resources to provide a comprehensive physical and numerical dam modelling service to the water industry.

Benefits

The laboratory is a unique resource for the water industry that allows shortlisting of options using numerical models and verification/refinement using physical models at scale prior to adoption and construction. NSW Public Works MHL has an extensive range of facilities and expertise available for both physical and numerical modelling.

Koondrook-Perricoota numerical modelling digital elevation map



Lake Manchester spillway Hydroplus fusegate testing



Burrendong Dam spillway physical model