

TRANSPORTING MACHINERY TO WORONORA DAM

"In 1927, Cleary Bros, otherwise Jack and Dan, secured the contract to move all the machinery and effects of the Public Works Department from Cordeaux Dam, to the site of Woronora Dam. To cope with this mammoth task, they purchased several new International 3 tonne trucks.

...What I saw those trucks do was almost unbelievable, some of the trucks would be able to make direct trips to Woronora via Broughton's Pass, over the Cataract River, the others with some shocking overloads would go to Douglas Park Railway Station, where it be loaded onto goods trains...

A team of six draughts were kept at each hill, and were hooked to each of the very overloaded trucks to help it reach the top... the shocks were all round when the weighbridge recorded 12 tons for one load, this was the base of a crane. Many times I saw a big truck load go by, with a string of Tip Drays, or Horse Jinkers tied on behind."

Interview with Sydney Percival
(former Appin resident), 1981
for www.familyorigins.net



FEATURES OF WORONORA DAM

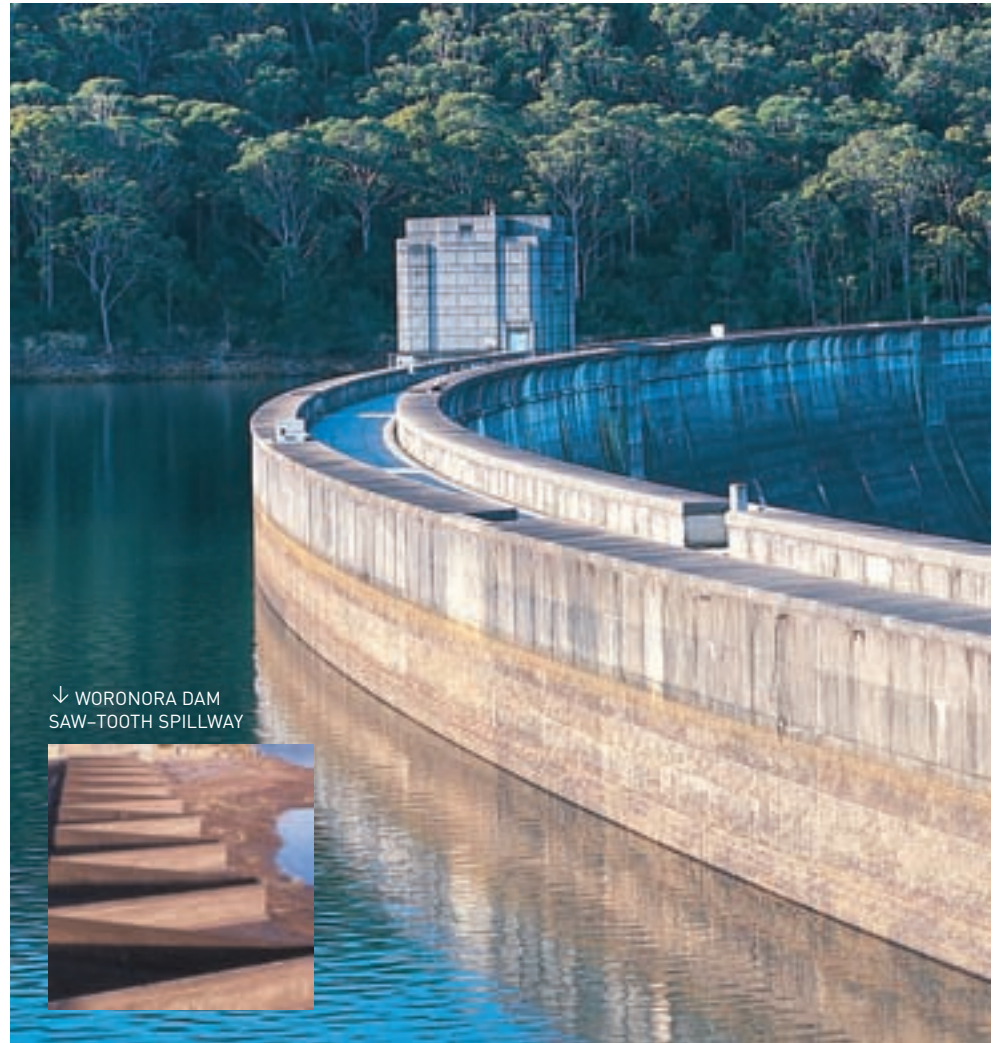
Woronora Dam is curved in appearance. It is a mass gravity dam, remaining in position under its own weight. Its lower levels are built of cyclopean masonry – massive sandstone blocks that were quarried on site. The main wall is made from blue metal and gravel concrete and there are two inspection galleries located inside.

Located south of Sydney near Waterfall, Woronora Dam has a separate, saw-tooth spillway that discharges floodwater through a concrete lined cutting into the Woronora River, downstream of the dam.

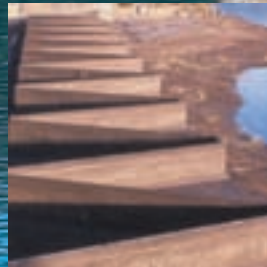
To meet international dam safety standards, Woronora Dam was upgraded in 1988 at a cost of \$2.9 million by a system of wall and foundation drains.

Raw water from Woronora Dam is pumped to the adjacent Woronora water filtration plant. This plant is one of nine in Sydney either operated by Sydney Water or privately owned and operated under contract to Sydney Water. The dam and water filtration plant supplies water to the areas south of the Georges River including Sutherland, Engadine, Helensburgh, Stanwell Park, Lucas Heights, and Bundeena.

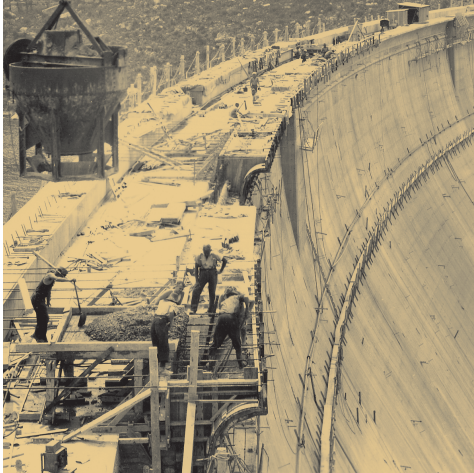
Height:	66 metres
Length:	390 metres
Total capacity:	71,790 ML
Catchment:	75 square kilometres
Lake:	4 square kilometres



↓ WORONORA DAM
SAW-TOOTH SPILLWAY



Did you know?



THE MARITIME OPERATIONS Division within the Department of Defence uses Woronora Dam to test its sonar facilities. The testing station is on a pontoon in the middle of the reservoir.



THE BUILDING of the Woronora Dam became part of the backdrop of the comedy drama "Dad Rudd MP" directed by Ken G. Hall for Cinesound and released in 1940.



The film featured several construction scenes and employed many workers and their families as extras.



SIR WILLIAM HUDSON (1896 – 1978), the former Commissioner for the Snowy Mountains Hydro Electricity Authority and a world-renowned civil engineer, was the Research Engineer for the construction of Woronora Dam.



WORONORA DAM is listed on the State Heritage Register for its historic and technological value.

Ensuring dam safety

It is essential that all SCA dams meet the requirements of the NSW Dams Safety Committee (DSC) under the *NSW Dams Safety Act (1978)*. The DSC, the State's regulator for dam safety, develops and implements policies and procedures for effective dam safety management in order to protect life, property and the environment from dam failures.

To ensure compliance with its operating licence, the SCA has adopted a structured program of surveillance and monitoring that complies with the requirements of the DSC and national and international best practice.



Monitoring water quality

The SCA conducts extensive routine water quality and quantity monitoring in the catchments, storages and in-flows to water filtration plants. Monitoring provides information to enable the best quality water to be drawn-off into the supply system, and to identify areas requiring special catchment management attention. The SCA also conducts regular testing at several locations for the presence of the protozoan parasites *Giardia* and *Cryptosporidium* in the water. Information collected from the SCA's monitoring programs is used for public health reporting and assessment.

MAINTAINING GOOD WATER QUALITY IN THE CATCHMENT

The SCA works with government, industry and the community to promote good water quality and healthy, sustainable catchments.

Extensive research is carried out by the SCA to help understand the catchment environment. The SCA also plays an important role in ensuring that proposed land use and development is compatible with preserving water quality.

Field staff undertake a range of on-ground activities in the catchments, such as pest control, fire control, erosion control and repair, regulating access, containing spills, chemical collections and weed control. In the Special Areas (land closest to the storages) these activities are jointly managed by the National Parks and Wildlife Service and the SCA.

Many successful projects are also undertaken jointly with landholders and community groups including riverbank stabilisation, willow removal, revegetation and riverbank fencing.



ENVIRONMENTAL FLOWS

The SCA recognises that Woronora Dam can affect the natural flow of water downstream. The SCA is currently modifying Woronora Dam's outlets to enable environmental releases. This will help to conserve the river's ecological systems and biodiversity of water dependent species.

Recreation at Woronora Dam

Woronora Dam is a popular sightseeing and picnic spot. Almost half a million visitors use the Woronora Dam picnic area each year.

Visiting hours are 10am to 5pm daily (7pm on weekends and public holidays during Daylight Saving Time).

For educational excursions and project material, please contact our Education Office on (02) 4720 0344/3

There are no entry fees to any of our dams. Picnic areas cannot be reserved.

WORONORA DAM FACILITIES

ELECTRIC BBQS



HOT WATER



PLAYGROUND



TOILETS



DRINKING WATER



VIEWING AREA



PICNIC SHELTERS

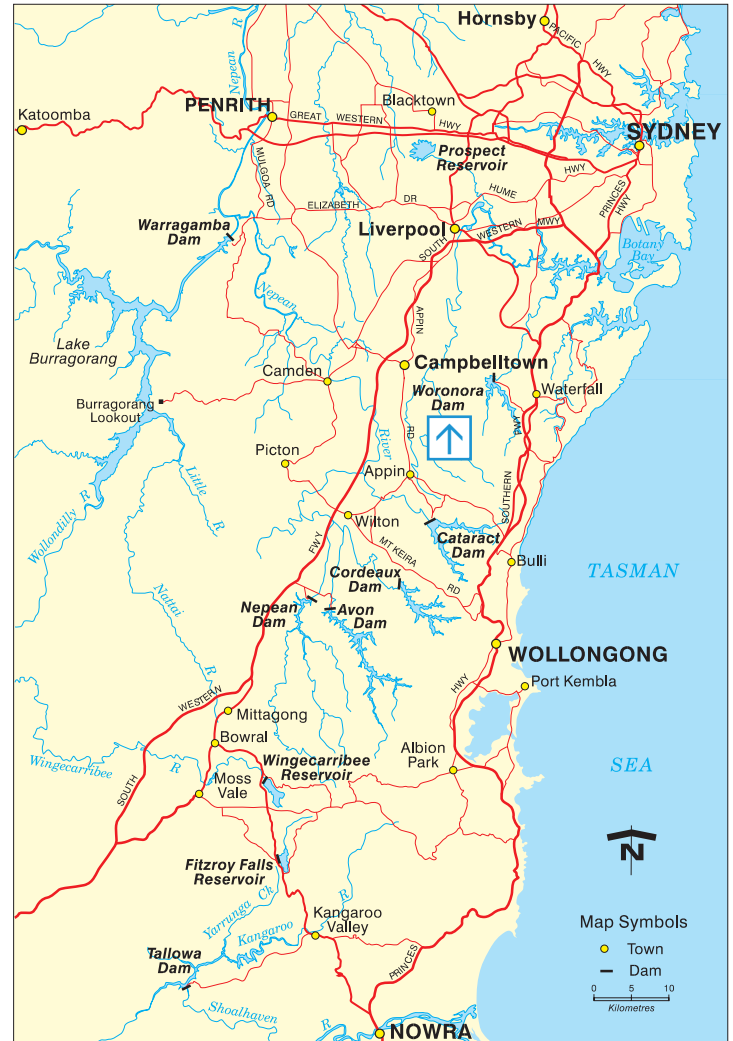


How to get there



Woronora Dam is located south of Sydney, near Waterfall.

Access is via the old Princes Highway, south from Sydney or north from Wollongong. Turn off Princes Highway onto the Woronora Dam access road just south of Waterfall.



Why Special Areas are protected



Woronora Special Area is approximately 75 square kilometres and includes all the land draining to Woronora Dam. In total, Special Areas cover about 3,700 square kilometres of land surrounding SCA water storages.



The Special Areas protect our water supply because they act as a buffer zone, helping to stop nutrients and other substances that could affect the quality of water entering the storages.

The Sydney Catchment Authority and the National Parks and Wildlife Service (NPWS) jointly manage the Special Areas, in accordance with the Special Areas Strategic Plan of Management.

This long-term plan aims to provide high quality water in the storages, ensure ecosystem integrity, and improve the environmental quality of the catchment areas.



Public access to parts of the Special Areas is restricted to protect water quality. This benefits the community by:

- ensuring we have safe, clean water
- protecting large areas of bushland and plant and animal habitats
- protecting threatened plants and animal species
- preserving evidence of Aboriginal occupation dating back many thousands of years, and
- preserving evidence of European exploration, early settlement, and phases of development such as forestry, mining and dam building.

Restrictions and controls are placed on land use, development and access within Special Areas. Activities such as swimming, fishing, boating and camping are prohibited, unless otherwise specified.

CONTACTING THE SYDNEY CATCHMENT AUTHORITY

SCA Head Office, Penrith

Sydney Catchment Authority:
Level 2, 311 High Street, Penrith 2750
PO Box 323, Penrith, NSW 2751
Phone: (02) 4725 2100
Fax: (02) 4732 3666

Website: www.sca.nsw.gov.au
Email: info@sca.nsw.gov.au

VISITOR INFORMATION

Warragamba Dam Visitors Centre

Phone: (02) 4720 0349
Hours: 10am to 4pm daily,
except Christmas Day and Good Friday

Other SCA dams

Phone (02) 4640 1200
Hours: 9am to 5pm Monday to Friday

EMERGENCY REPORTING (24 HOURS)

Fires, chemical spills
Freecall: 1800 061 069

FIELD OFFICE LOCATIONS

Goulburn Office

Phone: (02) 4823 4200
Fax: (02) 4822 9422
Hours: 8.30am to 5.00pm
Monday to Friday

Depots

Cordeaux Dam
Warragamba Dam
Campbelltown
Blue Mountains
Burrawang

IMPORTANT

Information contained in this brochure may change after the date of printing. The SCA accepts no responsibility or liability for any loss or inconvenience incurred as a result of reliance upon information printed in this brochure. For the most up-to-date information on SCA dams and recreational facilities, contact the SCA's head office on (02) 4725 2100 or visit our website at www.sca.nsw.gov.au

ACKNOWLEDGEMENT

The SCA acknowledges the assistance of the Sydney Water Corporation and Sydney Catchment Authority Historical Research and Archives Facility in researching and supplying historical images for use in this publication.

How you can help keep our catchments healthy

SAVING WATER

Water is a precious resource. Each of us has a responsibility to reduce the amount of water we use – no matter where we live.

By reducing the amount of water we all use, we reduce the need to build expensive new water supply infrastructure such as dams, reservoirs and pipelines.

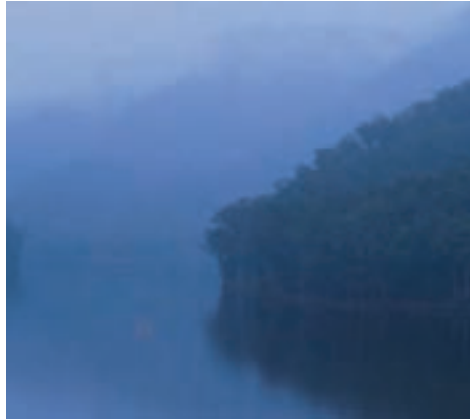
Reducing the amount of water we all use can also help make more water available for environmental flows, which protect the health of the rivers downstream of the dams.

The need to manage demand for water is reflected in the Operating Licences of both the SCA and Sydney Water. The SCA is working with Sydney Water to encourage water saving actions around the home, garden and office.

The SCA also recognises the need to adopt exemplary practices in managing our own business. Minimising leaks in pipelines and fitting water saving appliances and devices are just some of the ways the SCA is reducing the amount of water we use.

WATER SAVING TIPS

For great water saving ideas, visit the Sydney Catchment Authority website www.sca.nsw.gov.au. Follow the links to sites such as www.sydneywater.com.au for more information. If you don't have access to the internet, contact Sydney Water on 13 20 92.



↑ USING LESS WATER HELPS KEEP OUR CATCHMENTS HEALTHY

IN THE CATCHMENTS

People living and working in the catchment areas play a special role in keeping our catchments healthy. Some of the ways people in the catchments help include:

- using chemicals efficiently and carefully
- controlling weeds and pests
- retaining and planting vegetation to prevent soil loss
- protecting stream bank vegetation to provide a buffer against pollution
- managing on-site sewage systems effectively
- encouraging and developing improved sewage and stormwater management systems
- preventing bushfires
- reporting spills, and
- getting involved in a Landcare, Streamwatch or other local community group.