

NORTH HEAD BIOSOLIDS UPGRADE EARTHWORKS & COGEN CIVIL WORKS

CLIENT: SYDNEY WATER

LOCATION: MANLY NSW

DURATION: 6 MONTHS

VALUE OF ENGAGEMENT: \$3 MILLION

Ferrycarrig was engaged to deliver two work packages as part of Sydney Water's North Head Biosolids Treatment Plant Upgrade in Manly.

The first package includes Cogen Civil works with the following scope:

- Services search and relocation
- Detailed excavation works to allow construction of new Cogen Slabs, Cogen beams, transformer slab, radiator slab, oil tank slabs, footings, pits, pipes bridge, and ancillary equipment
- FRP of slabs, footings, pits and pipe bridge installation of earthing and interconnecting conduits for the installation of electrical Cogen equipment
- Reinstatement of kerb and asphalt.

The second package of works involved the bulk excavation and drainage works on Digester 4 and 5. The scope of work included:

- Locating and relocating of services (one of the Cogen units was in the excavation and needed to be relocated)
- Demolition works of existing foundations from the Co-engine
- Bulk excavation and very specific detailed excavation in rock for Digester 4 and 5
- Bulk excavation and detailed excavation of a new retaining wall and footing in rock
- Installation of drainage works and required adjustments around Digester 4 and 5
- Installation of a crane pad for the digester's installation
- Management of stockpile area restoration

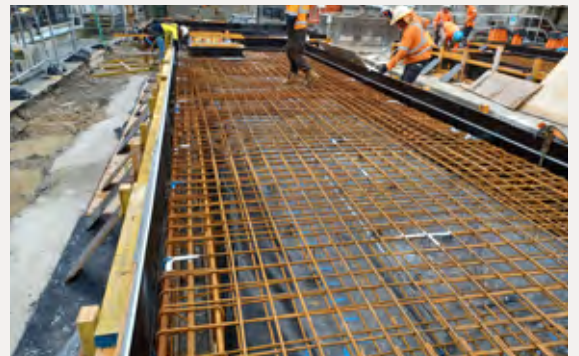
The main challenge of these works was to be able to work safely in a space-constrained area within a live treatment plant and still achieve the required tight program.

Ferrycarrig had to minimise the battering of the excavation of the digesters, so the adjacent road can be maintained for the plant operations for the biosolids truck movements.

All existing live assets and services were effectively protected during the works, with no incident/damage recorded.

Ferrycarrig proactively engaged with the daily coordination to manage the construction interface with the treatment plant, including scheduling to ensure traffic and deliveries didn't impact Sydney Water plant operations.

Ferrycarrig also ensured that no heavy truck movements were programmed during school pick-up and drop-off times to limit the impacts on the local Manly community.



FERRYCARRIG ALSO ENSURED THAT NO HEAVY TRUCK MOVEMENTS WERE PROGRAMMED DURING SCHOOL PICK-UP AND DROP-OFF TIMES TO LIMIT THE IMPACTS ON THE LOCAL MANLY COMMUNITY.