



INDUSTRIAL PROCESSING MILL

OCT 2021 - MAY 2022
CONFIDENTIAL
\$4 M

DEMEX was engaged to undertake demolition of the crushing house, tank farms, factory workshops and offices, molasses tank, clarification tanks, processing area, sugar storage shed, and tanks. Asbestos removal works also formed part of the project scope.

The project provided the opportunity for DEMEX to demonstrate capability in the induced collapse method of demolition, meet business objectives around Indigenous employment and contractor engagement, and facilitate meaningful community engagement by providing access to items of historical value to former employees.

PROJECT METHODOLOGY

The first stage of the project required removal of asbestos to allow structural demolition works to commence. While asbestos was documented in the site asbestos register, friable asbestos was found in five of the efferts (heat exchangers) that were part of the processing plant.

Friable packing material found on site was removed to a cargo shed, which was wrapped in a full enclosure to prevent exposure; a measure that was undertaken in agreement with the client. This was a significant achievement given the seasonal wet and windy weather characteristic of the location.

Precision engineering was required for demolition of the uncontaminated crystallisation tanks, which weighed approximately 700 tonnes. The tanks were demolished using induced collapse, a process which was facilitated by oxy cutting the flooring to create sufficient room for the tanks to fall. Once on the ground, the tanks were pulled from the shed using the 30 and 35 tonne excavators.



SCRAP STEEL RECYCLED	4,800 TONNES
ASBESTOS REMOVED	84 TONNES
WASTE RECYCLED	98.6%

PROJECT CHALLENGES

The project was characterised by a significant volume of mechanical demolition and oxy cutting; a particular requirement to facilitate induced collapse of several large and smaller tanks, due to limitations to access that prevented large machinery being able to reach them. Throughout the demolition, care was taken to prevent injury or ignition from formaldehyde in the caustic tanks.

Another challenge emerged with the crushing house gearboxes. It was discovered that the gearboxes still retained grease and oil. This was drained from the gearbox shafts, allowing the gearboxes to be rigged up and lifted out safely. Additionally, molasses which was found in one of the tanks was removed to disused spray tanks onsite.

DEMEX worked as the principal contractor on the project coordinating works of the various subcontractors.

PROJECT HIGHLIGHTS

- Mobilisation of DEMEX equipment and project team to regional area (approximately 1,000 kilometres from headquarters)
- Induced collapse demolition of multiple tanks
- High risk work at height in challenging seasonal weather
- Full enclosure of sugar shed to contain asbestos removed from site.
- Indigenous contractor engagement and implementation of DEMEX Indigenous employment strategy.

