Project: Lekir Bulk Terminal

Client: Lekir Bulk Terminal Sdn Bhd
Contractor: Leighton Malaysia
Year: 2000-2001
Contract period: 15 months

Project scope:

Design and construct an 8 million tonne/yr coal import terminal at Lumut on the east coast of Malaysia complete with all civil, structural, mechanical and electrical works.

Approach jetty 2000m*15m with roadway and 2*1800mm 3,500t/hr conveyors, small boat landing plus provision for two future conveyors. The jetty consisted of 5*60t precast concrete decks spanning 33.5m with insitu topping and insitu concrete headstocks on 260 spun concrete piles 900mm diameter up to 54m long.

Wharf 550m*30m with berths for two 160,000DWT and one 70,000DWT vessel in a water depth of 20m. The wharf is fitted with two 1500t/hr grab unloaders and all associated conveyors, transfer towers and facilities. The wharf consisted of 55t precast concrete decks with insitu topping on a grillage of precast U beams spanning 12.5m and pile caps with 320 steel piles 900mm diameter up to 74m long. Fender frames were precast concrete up to 70t with struts back to the wharf deck.

Stockyard civil and structural works complete with all associated infrastructure and buildings.

Roam scope:

Preparations of all method statements, barges, lift studies and temporary works design including:

- Temporary jetty.
- Development of precast concepts for the wharf beams, pile caps and fender frames.
- Formwork for insitu concrete headstocks.
- Crane mats for 300t crawler to place 60t slabs on the wharf.
- Crane barge with ballasting system for 300t crawler to place 10*60t jetty deck girders.
- Management of interfaces with constructers, wharf designer, client, suppliers, mechanical and electrical subcontractors.
- Dynamic and static pile testing.