## **Project Reference P181**

### **Marine Structures**



## **Vale Main Jetty**

## **Project**

Vale Malaysia Manufacturing Project Phase 1A at Teluk Rubiah, Lumut, Perak.

#### Client

Vale Malaysia Manufacturing Sdn Bhd

## **Contract Sum**

RM825,403,673

#### **Contract Period**

Aug 2011 ~ Jan 2014 (31mths) - Including VO addition

### Client's Engineer

Murray & Roberts Marine (M) Sdn Bhd

Vale SA, the world's largest iron exporter, awarded the contract to BMS-JV to design and built the marine works for Vale Manufacturing Malaysia, of which SYS has a share of 20 percent. The jetty will be part of Vales Regional Distribution Center in Perak with a handling capacity of 30 million tonnes of iron ore a year. The works includes:-

Trestle: (1,800m x 16m wide road)
Transfer Platform A: 225m x 74m wide
Transfer Platform B: 160m x 70m wide
Import Wharf: 515m x 42.55m wide
Export Wharf: 560m x 22m wide

### **Design Parameters**

- Design Live Load 10-15 kN/m<sup>2</sup>
- Max axle load 85 MT
- Deck levels
   +10 CD (TP & MIW)
   +8.5 CD (MAT & MEW)
- Draft 25m (MIW) & 21m (MEW)

# **Major Quantities**

Element	Quantities	Unit	Largest Element	Unit
Piles	903	nos	100	m
	56,600	ton	97	ton
In-situ Concrete	58,783	m <sup>3</sup>	n/a	
Precast Concrete	6,247	nos	120	ton
	66,586	$m^3$	48	$m^3$
In-situ Rebar	10,217	ton	n/a	
Precast Rebar	14,187	ton	n/a	







