## Vishnu Waman Thakur Charitable Trust's



## VIVA INSTITUTE OF TECHNOLOGY

Shirgaon, Post: Virar (w), Tal: Vasai, Dist: Palghar – 401 305.

## CIVIL ENGINEERING DEPARTMENT

**Subject Name:** Geotechnical Engineering -2

Place: to Arnala Jetty, near Arnala beach Virar West, Virar

**Date:** 01-04-23

**Time:** 10:30 am

**Programme/Summary details**: As per the curriculum of University of Mumbai students of Third Year Civil Engineering having Geotechnical Engineering -2 subject, required to visit pile foundation site as a part of their term work. A site visit was arranged to Arnala Jetty, near Arnala beach Virar West, Virar, Maharashtra 401303.We reached there by 10:30 am in the morning and together we went from one jetty side to the other.

**About the Site :** The present work of the construction of new passenger jetty at Arnala, Virar involves the total jetty length of 353m with the approach length of 300m and the berthing length of 53m. Total 10 piles were casted for the project, of which 6 piles were of 750mm dia were used for approach jetty and remaining 4 piles were of 900 mm dia were used for berthing portion. All the piles were bored cast insitu type with M30 grade of concrete. Fe415-TMT grade bars were used as reinforcement amounting to 145 MT were used for piling work. Piles were provided with 5mm thick sacrificial MS liner. Superstructure consists of cast-in-situ beams, precast beams and slabs. Paving was done with paver blocks on deck slab for total area of 4000 sq. m. area..

