

THE USE MANGROVE WOOD IN PILING

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ABSTRACT

The mangrove piles are widely used in peninsular Malaysia for low-rise building. Although the use of mangrove piles is not recognized in other countries, Malaysia contractors and developers are very confident that the mangrove piles can actually being used for piling in the low-rise buildings due to the mangrove wood nature density and strength.

The use of mangrove wood in piling brings benefits and disadvantages. The mangrove piles are not only cheap, but also easy to be handled in pilling work. The buildings using the mangrove piles as foundation can at least stand for 10 years, and the mangrove piles are very easy to be cleared off when the other type of foundation is to be used. However, the mangrove piles may be damaged if they are not fully submerged under the water table level.

The minimum length of the mangrove piles use is only 6.0m and they can be joint with a pile joint, which is made up by a steel box. The lengthening of pile may increase the soil bearing capacity and make sure then the piles are stand on a firm or stiff clay, so that the downward movement of piles will not happen.

Drop hammer is used for the driver of the mangrove piles. To install the piles into soft clay, the drop hammer just pushes the piles with small force. The clay is excavate before the installation of piles.

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