

**COMPARATIVE STUDY ON INTERPRETING PILE BEARING
CAPACITY FROM CPT RESULT**

By

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DECLARERATION BY THE CANDIDATE

I am Nydia Binti Mohamad Yatim, UiTM no 2003366994 confirms that the work is my own and that appropriate credit has been given where reference has been made to the works of others.

Signed :.....

Date :.....November 2006

ACKNOWLEDGEMENT

In the name of Allah, most gracious and merciful, with his permission, nothing may take place without His leave. Praised to Prophet Muhammad S.A.W, his companion and those are on the path as what he preached upon, might Allah almighty keep us his blessing and tenders.

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May The Almighty One shower His blessing upon all of us and make this small effort useful and beneficial for others for future reference.

ABSTRACT

Prediction of pile capacity is performed, however, the statistical analyses and evaluation of the prediction methods is conducted based on the results of several friction piles installed. Piles were tested to twice working loads, and did not fail during pile load tests. Chin Method was used to predict the ultimate load capacity of the piles. An evaluation scheme was executed to evaluate the CPT methods based on their ability to predict the measured ultimate pile capacity. Several criteria are selected to evaluate the ratio of the predicted to measured pile capacities. The final ranks of each method are obtained by averaging the ranks of the method from the selected criteria. Based on this evaluation, between the 8 methods, some methods will show the best performance in predicting the load carrying capacity of piles driven. The worst prediction method is obtained also, which is very conservative (under predicted pile capacities).

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