Cheung, R.W.M. & Lo, D.O.K. (2011). Use of time domain reflectometry for quality control of soil nailing works. Journal of Geotechnical and Geoenvironmental Engineering, ASCE, Vol. 137, No. 12, pp 1222-1235

The Assessment Board selected this paper for the 2014 HKIE Geotechnical Paper Award, for its potential to advance local geotechnical practice and its quality of writing for the readership of practicing geotechnical engineers. It hence noted:

> The paper Cheung & Lo (2011) gives a brief overview, illustrated with cases, of the technique of Time Domain Reflectometry for quality control on soil nails, and a more detailed account of the attention to its reliability for practical use. It provides leads to relevant publications and background information for users of the technique. When viewed with these publications, the paper demonstrates the commitment and mental flexibility of the geotechnical profession in the process of enhancing quality control of the most commonly used technique in improving slope safety. By itself, the paper offers an example of the detailed considerations and care required to turn a concept into a practical tool for industry-wide application. The field measurement trials, in particular, highlight the importance of physical data and statistical concepts in handling human and material uncertainties. The paper is simple in structure, clearly illustrated with figures and tables, and supported by demonstrative cases to capture the attention of a wide range of practicing geotechnical engineers. Work reported by a paper may be less than perfect. An example in this paper is the low number of operators in the multi-operator trial. The authors appear to be aware of the shortcoming as the number was significantly increased in a later trial reported in one of the references cited. It is good that the paper includes this part for completeness.