1 INTRODUCTION

1.1 Background

1.1.1 In order to validate the rail noise model accuracy, measurements have been conducted at NSRs and compare against the predicted results by the rail noise model.

2 VALIDATION METHODOLOGY

2.1 Measurement Detail

- 2.1.1 Light Rail existing NSR Parkview Garden were selected for the model validation.
- 2.1.2 Leq 30 mins with 1 second interval were recorded at 0615-0645 on 18 May 2016 with the train pass by event logged for train noise evaluation.
- 2.1.3 Leq 30 mins of train noise were evaluated with background correction.

2.2 Rail Noise Model Prediction

2.2.1 Leq 30 mins train noise were predicted based on the parameters and assumption in this EIA with the actual train speed and frequency measured on site.

3 COMPARSION

3.1.1 The predicted train noise were compared with the measured train noise level at the same location to validate the train noise prediction model.

 Table 3.1
 Comparison between Predicted Model and Measurement Results

Rail Line	Location	Model Prediction L _{eq 30mins} , dB(A)	Measurement Result L _{eq 30mins} , dB(A)	Difference dB(A)
Light Rail	Parkview Garden	59.9	58.4	1.5

3.1.2 The predicted train noise were 1.5 dB(A) larger than the measured train noise level at the same position which show the noise model are conservative for rail noise prediction.



Photo 1. Parkview Garden



Photo 2. View from Parkview Garden to LRT