

## Online Talk

### Moisture & Chloride Content Detection and Estimation in Concrete Cover by using the Ground Penetrating Radar

Date : 21 Oct 2021 (Thurs)  
Time : 2.30pm to 4.30pm  
Venue : Zoom Online Platform

#### Synopsis

Monitoring moisture and chloride ingress in concrete cover is critical to determine the corrosion level in reinforced concrete (RC) components. The amplitude attenuation of Ground Penetrating Radar (GPR) waves due to water and chloride in concrete slab samples was used to evaluate these material concentrations. The amplitude attenuation has a strong relationship with amplitude attenuation. Both chemicals have a substantial relationship with the amplitude attenuation, which leads to the development of two multiple nonlinear regression models. The proposed models show a high association with the radar amplitude attenuation data. The proposed models can be used to predict the moisture and free chloride content of concrete covers.

#### Registration Fees

IEM Member	<b>RM 15</b>
Non-Member	<b>RM 50</b>

*\*T&C Apply*



Scan QR code to register:

Or Click this link : <https://event.iempenang.org>

### About the Speaker Ts Syahrul Fithry Bin Senin



Ts Syahrul Fithry is a senior lecturer in Structural Engineering Division and Professional Technologies in Building & Construction field who conduct research works on Damage Detection on Concrete Structure using the Ground Penetrating Radar.

#### Work Experiences

Universiti Teknologi MARA, Penang Branch,  
Permatang Pauh Campus

- 17 years in Structural Engineering Discipline
- Research and published work on Concrete Damage Detection and Quantification using the Non-Destructive Assessment
- Hidden anomaly detection in concrete and utilities using the Ground Penetrating Radar
- Defect identification on concrete structure using the Artificial Intelligence

**This event is organized by Women Engineers**

*Note:* IEM Penang Branch is the administrator of the above event and reserves the right to cancel or reschedule the event if necessary.