

**DEFORMATION OF REINFORCED CONCRETE WALL-SLAB
CONNECTION UNDER LATERAL LOADS**

By

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DECLARATION BY THE CANDIDATE

I Salusiah Binti Japar confirm that the work is on my own and the appropriate credit has been given where reference has been made to the work of other researchers.

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ABSTRACT

The subject of the behavior and strength of the connection between wall-slab connection has been of significant interest to researchers since 1850. The nature problem of concrete such as cracking and brittleness has become major problem especially when it comes to the weaker point of a structure which is the connection. This study is conducted to determine the deformation of reinforced concrete wall-slab connection under in terms of deformation and limiting cracking width. Based from the load displacement profile, the ultimate load of the sample is 29.42kN at 19.85mm displacement before the sample was failed. In the other hand, the load and strain are considered to behave linearly until it reached the maximum load. The maximum load of the sample is 32.00kN at 1.30 % drift. In terms of cracking hairline crack started at 0.2% drift and become wider as the drift level increased. From the observation, there are failure cracks along the connection and at the side of the connection that influence the strength of the connection itself. A flexural crack and a longitudinal crack can be seen along connection part obviously after the sample failed. The smallest design of steel fabric were use to limit the cracks width and control the cracks to prevent from weaken the structure especially the connection of the wall-slab.

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