

## Deep Excavations with Embedded Retaining Walls - Diaphragm Walls

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**Abstract :** Due to urbanization, traffic congestion, air pollution and fuel consumption underground metros are constructed in urban cities nowadays. These metros reduce the commutation time and makes the daily transportation in urban cities hassle free. To construct the underground metros deep excavations are to be carried out. These excavations should be supported by an appropriate earth retaining structures to provide stability and to prevent deformation failures. The failure of deep excavations is catastrophic and hence appropriate caution need to be carried out during design and construction stages. This paper covers the construction aspects, equipment, quality control, design aspects of one of the earth retaining systems the Diaphragm Walls.

**Keywords :** underground metros, diaphragm wall, quality control of diaphragm wall, design aspects of diaphragm wall

**Conference Title :** ICDWC 2022 : International Conference on Diaphragm Walls Construction

**Conference Location :** Copenhagen, Denmark

**Conference Dates :** June 09-10, 2022