

Australian Standard™

Methods of testing soils for engineering purposes

Method 6.7.3: Soil strength and consolidation tests—Determination of permeability of a soil—Constant head method using a flexible wall permeameter

1 SCOPE This Standard sets out the method for the determination of the coefficient of permeability of a soil in a flexible wall permeameter or triaxial cell with percolation under constant head conditions. The Standard includes testing of both remoulded and undisturbed specimens of soil.

2 REFERENCED DOCUMENTS The following documents are referred to in this Standard:

AS

- 1152 Specification for test sieves
- 1289 Methods of testing soils for engineering purposes
- 1289.1 Method 1: Preparation of disturbed soil samples for testing
- 1289.2.1.1 Method 2.1.1: Soil moisture content tests—Determination of the moisture content of a soil—Oven drying method (standard method)
- 1289.5.1.1 Method 5.1.1: Soil compaction and density tests—Determination of the dry density/moisture content relation of a soil using standard compactive effort
- 1289.5.2.1 Method 5.2.1: Soil compaction and density tests—Determination of the dry density/moisture content relation of a soil using modified compactive effort
- 1289.5.5.1 Method 5.5.1: Soil compaction and density tests—Determination of the minimum and maximum dry density of a cohesionless material—Standard method

ASTM

- D 5084 Test method for measurement of hydraulic conductivity of saturated porous materials using a flexible wall permeameter

3 DEFINITIONS

3.1 Laboratory density ratio—the ratio of the dry density of the compacted specimen to the maximum dry density of the material as determined by AS 1289.5.1.1, or AS 1289.5.2.1 or AS 1289.5.5.1, as applicable, expressed as a percentage.

3.2 Laboratory moisture ratio—the ratio of the moisture content of the compacted specimen to the optimum moisture content of the material as determined by AS 1289.5.1.1 or AS 1289.5.2.1, as applicable, expressed as a percentage.