

Schedule

SA Geolab International Pte Ltd
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Certificate No. : LA-2012-0520-B-3

Issue No. : 2

Date : 19 January 2021

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FIELD OF TESTING: Civil Engineering

MATERIALS / PRODUCTS TESTED	TESTS / PROPERTIES	STANDARD METHOD / TECHNIQUES / EQUIPMENT USED
A SOIL	1. Unconfined Compression (UC)	ASTM D 2166 – 2016 BS 1377-7 #7: 1990 BS EN 1997-2: 2007 BS EN ISO 17892-7: 2018 ISO 19901-8 #F.2.15.6: 2014
	2. Unconsolidated Undrained (UU) Triaxial	ASTM D 2850 – 2015 BS 1377-7 #8 & #9: 1990 BS EN 1997-2: 2007 BS EN ISO 17892-8: 2018 ISO 19901-8 #F.2.15.7: 2014
	3. Consolidated Undrained (CU) Triaxial	ASTM D 4767 – 2011 BS 1377-8 #7: 1990 BS EN 1997-2: 2007 BS EN ISO 17892-9: 2018 ISO 19901-8 #F.4.6: 2014
	4. Consolidated Drained (CD) Triaxial	ASTM D 7181 – 2011 BS 1377-8 #8: 1990 BS EN 1997-2: 2007 BS EN ISO 17892-9: 2018 ISO 19901-8 #F.4.6: 2014
	5. Isotropic Consolidation using Triaxial Compression Test	BS 1377-6 #5: 1990 BS EN ISO 17892-9 #6.4: 2018 ISO 19901-8 #F.4.5.2: 2014
	6. Saturated Unconsolidated Undrained Triaxial	K.H. Head Vol. 3
	7. Load-Controlled Cyclic Triaxial Strength of Soil	ASTM D 5311 – 2013 ISO 19901-8 #F.4.7: 2014

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	8. Determination of the Modulus and Damping properties of Soils using Cyclic Triaxial	ASTM D 3999 – 2011e1 ISO 19901-8 #F.4.6 & #F.4.9: 2014
	9. Consolidated K_0 Undrained (CK_0U) Triaxial	ISO 19901-8 #F4.5.3 & #F4.6: 2014
	10. Consolidated K_0 Drained (CK_0D) Triaxial	ISO 19901-8 #F4.5.3 & #F4.6: 2014
	11. Consolidated Anisotropic Undrained (CAU) Triaxial	BS EN 1997-2: 2007 BS EN ISO 17892-9: 2018 ISO 19901-8 #F4.5.3 & #F4.6: 2014
	12. Consolidated Anisotropic Drained (CAD) Triaxial	BS EN 1997-2: 2007 BS EN ISO 17892-9: 2018 ISO 19901-8 #F4.5.3 & #F4.6: 2014
	13. Vertical Extension Triaxial	ASTM STP 977 ISO 19901-8 #F.4.6.1: 2014
	14. Modulus and damping of soils by Fixed-Base Resonant Column Device	ASTM D 4015 – 2015 e1 ISO 19901-8 #F.6: 2014
	15. Bender Element Test	ASTM D8295-19 ISO 19901-8 #F.7: 2014
	16. Cyclic Direct Simple Shear (CDSS)	ASTM D8296-19 ISO 19901-8 #F.5.2.5: 2014
	17. Direct Simple Shear (DSS) – Consolidated Undrained Testing of Cohesive Soil	ASTM D 6528 – 2017 ISO 19901-8 #F.5.2.4: 2014
	18. Direct Shear (DS)	ASTM D 3080/3080M – 2011 BS 1377-7 #4: 1990 K. H. Head Vol. 2 BS EN 1997-2: 2007 BS EN ISO 17892-10: 2018 ISO 19901-8 #F.5.4: 2014
	19. Torsional Ring Shear Test (RS)	ASTM D 6467 – 2013e1 BS EN ISO 17892-10: 2018 ISO 19901-8 #F.5.3: 2014

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B. ROCK	20. Consolidation – One Dimensional test using Controlled Strain loading (CSL)	ASTM D 4186/4186M - 2012e1 ISO 19901-8 #F.3.3: 2014
	21. Determination of Permeability in a Triaxial Cell by Constant Head method (CH)	BS 1377-6 #6: 1990 BS EN 1997-2:2007 BS EN ISO 17892-11: 2018
	22. Rowe Cell	BS 1377-6 #3: 1990 BS EN ISO 17892-5: 2017
	23. Laboratory Vane Shear Test	ASTM D 4648/4648M – 2016 ISO 19901-8 F.2.15.5: 2014
	24. Compaction	ASTM D 698 – 2012e2 ASTM D 1557 – 2012e1 BS 1377-4 #3: 1990
	25. Maximum and Minimum Dry Densities of Granular Soils	ASTM D 4254 BS 1377-4 #4: 1990
	26. Resilient Modulus of Soils and Aggregate Materials	AASHTO Designation: T 307-99 (2012)
	1. Preparing Rock Core Specimens	ASTM D 4543 – 2019
	2. Slake Durability of Shales	ASTM D 4644 – 2016 JGS 2124-2006
	3. Uniaxial Compressive Strength of Intact Rock Core Specimens	ASTM D 7012 – 2014e1
	4. Point Load Test	ASTM D 5731 – 2016
5. Splitting Tensile Strength of Intact Rock Core Specimens	ASTM D 3967 – 2016	

Approved Signatories

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Note :

This laboratory is accredited in accordance with the recognized International Standard ISO/IEC 17025. A laboratory's fulfilment of the requirements of ISO/IEC 17025 means the laboratory meets both the technical competence requirements and **management system requirements** that are necessary for it to consistently deliver technically valid test results. The **management system requirements** in ISO/IEC 17025 are written in language relevant to laboratory operations and operate generally in accordance with the principles of ISO 9001.