Agru GeoClay®

GCL

A reinforced needle-punched Geosynthetic Clay Liner (GCL), Agru GeoClay® is the material of choice for primary or secondary containment in composite landfill cells and closures, mining leach pads, tailing impoundments and reclamations, and pools and lagoons.

The material is comprised of a uniform layer of granular bentonite encapsulated between two nonwoven Geotexiles. Agru GeoClay is ideal for moderate to steep slopes and moderate to high loads.

Agru GeoClay is available in roll widths up to 15.5'. Hydraulically superior to several feet of 1 x 10-7 cm/sec compacted clay, Agru GeoClay delivers additional airspace and reduction of carbon footprint. One truck-load covers 3/4 of an acre.

Agru GeoClay® NN36 - Mining Applications

Bentonite Property[1]	Test Method	Minimum Average Roll Value
Swell Index, ml/2 g min	ASTM D5890	24
Moisture Content, %	ASTM D4643	12% max
Fluid Loss, ml	ASTM D5891	18 max

Finished GCL Property	Test Method	Minimum Average Roll Value
Bentonite, Mass/Unit Area[2], lb/ft² (kg/m²)	ASTM D5993	0.50 (2.4)
Tensile Strength[3], lb/in (N/cm)	ASTM D6768	25 (43)
Peel Strength[3] lb/in (N/cm)	ASTM D6496	3.5 (6.1)
Hydraulic Conductivity4 cm/sec max	ASTM D5887	1 x 10-8
Index Flux4 m³/m²/sec max	ASTM D5887	3 x 10-8
Internal Shear Strength5 psf (kPa)	ASTM D6243	500 (24) Typical

Benefits of Agru GeoClay®

- Self-healing and self-sealing
- Efficient installation
- Reduced CQA and testing costs

Agru GeoClay® Supply Information
(Standard Roll Dimensions)

Width		Length		Area (approx)	
ft	**m**	**ft**	**m**	**ft2**	**m2**
15.5	4.7	150	45.7	2,325	216

Notes:
(1) Bentonite properties tests performed at a bentonite processing facility prior to shipment to GCL production facility.
(2) Reported at 0% moisture
(3) Tensile strength testing performed in MD using ASTM D 6768.
(4) Deaired, deionized water @5 psi maximum effective confining stress and 2 psi head pressure.
(5) Specimens are hydrated for 24 hours and sheared at 200 psf. Represent typical peak value.
(6) Data presented above is tentative pending production values.