PROPEX Landlok 435

PROPEX® Landlok® 435 turf reinforcement mat (TRM) features X3® technology that consists of a dense web of interlocking, multi-lobed polypropylene fibers positioned between two biaxially oriented nets and mechanically bound together by parallel stitching with polypropylene thread. The TRM is designed to accelerate seedling emergence, exhibit high resiliency, and possess strength and durability properties to minimize damage during installation. Every component of Landlok 435 is stabilized against chemical and ultraviolet degradation which are normally found in a natural soil environment. Furthermore, the TRM contains no biodegradable components.

Landlok 435 conforms to the property values listed below[1] and is manufactured at a Propex facility having achieved ISO 9001:2015 and ISO 14001:2015 certifications. Propex performs internal Manufacturing Quality Control (MQC) tests that have been accredited by the Geosynthetic Accreditation Institute – Laboratory Accreditation Program (GAI-LAP).

Properties	Test Method	English	Metric
Origin of material			
% U.S. Manufactured		100%	100%
Physical Properties			
Mass/Unit Area [2]	ASTM D6566	8.0 oz/sy	271 g/m^2
Thickness [2]	ASTM D6526	0.35 in	8.9 mm
Light Penetration (% Passing) [2]	ASTM D6567	40%	
Color	Visual	Green	
Mechanical Properties			
Tensile Strength [2]	ASTM D6818	225 x 175 lb/ft	3.3 x 2.6 kN/m
Elongation [2]	ASTM D6818	50%	
Resiliency [2]	ASTM D6524	80%	
Flexibility [2]	ASTM D6575	0.015 in-lb	17,308 mg-cm
Endurance			
UV Resistance % Retained at 1,000 hrs [2]	ASTM D4355	80%	
Performance			
Velocity (Vegetated) [2,3]	Large Scale	12 ft/s	3.7 m/s
Shear Stress (Vegetated) [2,3]	Large Scale	8 lb/ft^2	383 Pa
Manning's n (Unvegetated) [2,4]	Calculated	0.025	
Seedling Emergence [2]	ASTM D7322	273%	
Roll Sizes		8.0 ft x 140 ft 16.0 ft x 140 ft	2.45 m x 42.7 m 4.88 m x 42.7 m

NOTES:

(1) The property values listed above are effective 05/01/2023 and are subject to change without notice. Values represent testing at time of manufacture.

(2) Values represent testing at time of manufacture and are shown as typical values.

(3) Maximum permissible velocity and shear stress has been obtained through vegetated testing programs featuring specific soil types, vegetation classes, flow conditions, and failure criteria. These conditions may not be relevant to every project nor are they replicated by other manufacturers. Please contact Solmax for further information.

(4) Calculated as typical values from large-scale flexible channel lining test programs with a flow depth of 6 to 12 inches.