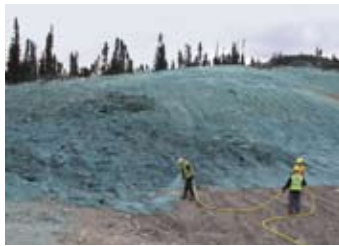




EcoFlex™

Flexible Growth Medium™

Erosion Control and Revegetation for Very Steep Slopes and Critical Sites

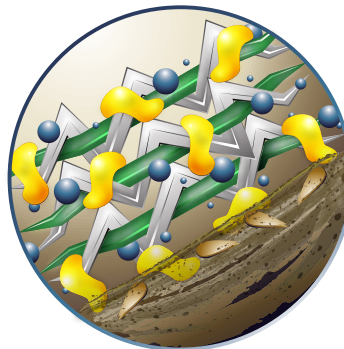






EcoFlex™ Flexible Growth Medium™ represents cutting-edge hydraulic technology that provides immediate erosion protection, prevents soil loss and creates an environment for optimum plant emergence. It has been proven to perform on slopes exceeding 1H:1V and remain effective during sustained rainfall events. University testing documented that straw and excelsior blankets lost an average of 50 times more soil than Flexible Growth Medium (applied at 3,500 pounds per acre) after three, 30-minute repetitions over 3 days at a rate 3.5 inches of rain per hour on 2:H:1V sandy loam slopes.

EcoFlex is ideal for immediate, intermediate and long-term site protection. The combination of Thermally Refined® wood fibers, crimped man-made fibers and performance-enhancing additives form a lofty interlocking matrix, creating air space and water-absorbing cavities to accelerate germination, reduce the impact of raindrop energy and minimize soil loss.



- Can be used as an alternative to Erosion Control Blankets – at a lower installation cost
- Once applied on the soil surface, EcoFlex provides a continuous layer of protection
- High water-holding capacity within the medium maximizes moisture where water is limited



- Wood Fibers**

- Co-Polymer Gel**

- Interlocking Fibers**

- Crosslinking Hydro-Colloid Tackifier**




Product Comparison:	EcoFlex™ FGM™	Blankets
• Effective without smoothing the site surface	✓	NO
• Can be applied without direct site access	✓	NO
• Eliminates the cost and labor of staking	✓	NO
• Forms an intimate bond with the soil	✓	NO
• Keeps site free of messy, leftover netting	✓	NO

EcoFlex™ FGM™ Specification

This section specifies a hydraulically applied Flexible Growth Medium™ (FGM™) composed of long strand, Thermally Refined® wood fibers, crimped, interlocking man-made fibers and performance-enhancing additives. The FGM requires no curing period and upon application forms an intimate bond with the soil surface to create a continuous, porous, absorbent and flexible erosion resistant blanket that allows for rapid germination and accelerated plant growth.

Flexible Growth Medium shall be EcoFlex FGM and conform to the following property values when uniformly applied at a rate of 3500 pounds per acre (3900 kilograms/hectare) under laboratory conditions.

	TEST METHOD	ENGLISH	SI
PHYSICAL			
Mass Per Unit Area	ASTM D6566 ¹	11.5 oz/yd ²	390 g/m ²
Thickness	ASTM D6525 ¹	0.19 in	4.8 mm
% Ground Cover	ASTM D6567 ¹	99%	99%
Water Holding Capacity	ASTM D7367	1500%	1500%
Flexural Rigidity (wet)	ASTM D6575	0.138 oz-in	10,000 mg-cm
Cure Time	Observed	< 2 hr	< 2 hr
Color (fugitive dye)	Observed	Green	Green
ENDURANCE			
Functional Longevity ²	Observed	≤ 18 months	≤ 18 months
PERFORMANCE			
Cover Factor ³ (6 in/hr event)	ASTM D7101 ¹	0.0066	0.0066
% Effectiveness ⁴	ASTM D7101 ¹	≥ 99%	≥ 99%
Cover Factor ³	Large Scale ⁵	≤ 0.01	≤ 0.01
% Effectiveness ⁴	Large Scale ⁵	≥ 99.0%	≥ 99.0%
Shear Stress	ASTM D7207 ¹	1 lb/ft ²	48 Pa
Vegetation Establishment	ASTM D7322 ¹	800%	800%

1. ASTM test methods developed for Rolled Erosion Control Products and have been modified to accommodate hydraulically applied erosion control products.
2. Functional longevity is an estimate of product functionality and is dependent upon moisture, light, microbial and other environmental conditions.
3. Cover Factor is calculated as soil loss ratio of treated surface versus an untreated control surface.
4. % Effectiveness = One minus Cover Factor multiplied by 100%.
5. Large scale testing conducted at Utah Water Research Laboratory, San Diego State University/Soil Research Laboratory, Texas Transportation Institute and TRI/Environmental, Inc. For specific testing information please contact a Profile technical service representative at 1-847-215-1144.

COMPOSITION

All components of the FGM shall be pre-packaged by the Manufacturer to assure both material performance and compliance with the following values. **Under no circumstances will field mixing of additives or components be accepted.**

Dry Organic Matter — 74.5% ± 3.5%
Moisture Content — 10.5% ± 1.5%

Proprietary Crosslinked Hydro-Colloid Tackifiers and Activators — 10% ± 1%
Proprietary Crimped, Interlocking Fibers — 5% ± 1%

INSTALLATION

Strictly comply with Manufacturer's installation instructions and recommendations. Use approved hydro-spraying machines with fan-type nozzle (50-degree tip) whenever possible to achieve best soil coverage. Apply FGM from opposing directions to assure 100% soil surface coverage. Slope interruption devices or water diversion techniques are recommended when slope lengths exceed 100 ft (30 m).

Erosion Control and Revegetation:

For maximum performance, apply FGM in a two-step process:

Step One: Apply fertilizer, other soil amendments and 50% of seed with a small amount of FGM for visual metering.

Step Two: Mix balance of seed and apply FGM at a rate of 50 lb per 125 gallons (23 kg/475 liters) of water over freshly seeded surfaces. Confirm loading rates with equipment manufacturer. Do not leave seeded surfaces unprotected, especially if precipitation is imminent.

Depending upon site conditions FGM may be applied in a one-step process where all components may be mixed together in single tank loads. Consult with Manufacturer for further details.

INSTALL PRODUCT AT THE FOLLOWING TYPICAL APPLICATION RATES.		
Slope Gradient/Condition	English	SI
≤ 3H to 1V	3000 lb/ac	3400 kg/ha
> 3H to 1V and ≤ 2H to 1V	3500 lb/ac	3900 kg/ha
> 2H to 1V and ≤ 1H to 1V	4000 lb/ac	4500 kg/ha
> 1H to 1V	4500 lb/ac	5100 kg/ha
Below ECB or TRM	1500 lb/ac	1700 kg/ha
As infill for TRM	3500 lb/ac	3900 kg/ha

Consult comprehensive CSI formatted specification for additional details.

PACKAGING

Bags: Net Weight - 50 lb (22.7 kg), UV and weather-resistant plastic film.

Pallets: Weather-proof, stretch-wrapped with UV-resistant pallet cover, 40 bags/pallet, 1 ton/pallet.

E-02 11/08



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For technical information, customer service, or distributor location, call 1-847-215-1144.
For distributor location and customer service call 1-800-366-1180.
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