

# Connecticut Department of Transportation

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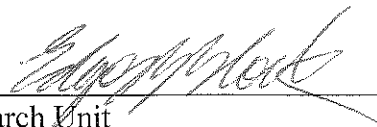
## Qualified Product List

Revised June 2019

Connecticut Department of Transportation  
Bureau of Policy and Planning  
Office of Strategic Planning and Projects  
Research & Performance Management



APPROVALS

  
Research Unit

6-3-2019  
Date

  
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6-3-2019  
Date

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Research & Performance Management  
New Product Evaluation

## Preface

This report has been developed as a means for determining what products, suppliers, manufacturers, equipment and methodologies may be used on ConnDOT construction projects. The items referenced have met the approval of ConnDOT personnel in one of the following ways:

- They have been approved by the Research Liaison Committee.
- They have been used successfully since before the establishment of a formal approval process.
- They currently satisfy Department of Transportation specifications.

It should be understood that this document is open to refinement and will be under close scrutiny to ensure that the information contained herein is complete and accurate. Over the years, many items will be added and deleted.

Many products that may be used in ConnDOT will not be represented in this document because they conform to a generic specification, and the approval procedure is in accordance with the standard specifications.

- **ConnDOT's Product Evaluation Web Site:**

<http://www.ct.gov/dot/cwp/view.asp?a=1387&q=259630>

- **ConnDOT's Qualified Product List (QPL):**

<http://www.ct.gov/dot/cwp/view.asp?a=1387&q=259630>

- **AASHTO's NATIONAL TRANSPORTATION PRODUCT EVALUATION PROGRAM (NTPEP):**

<http://www.ntpep.org/Pages/default.aspx>

- **AASHTO Product Evaluation List (APEL):**

<http://apel.transportation.org/>

<p><b>If you have any questions, inquires or suggestions, please contact:</b></p>	<p><b><u>Technical Contact:</u></b></p> <p><b>Andrew J. Mroczkowski</b> <b>Research Liaison Committee Secretary</b> <b>Voice: (860) 594-3296</b> <b>E-mail: <a href="mailto:Andrew.Mroczkowski@ct.gov">Andrew.Mroczkowski@ct.gov</a></b></p> <p><b><u>Administrative Contact:</u></b></p> <p><b>Leo L. Fontaine, P.E.</b> <b>Research Liaison Committee Chairman</b> <b>Voice: (860) 594-3180</b> <b>E-mail: <a href="mailto:Leo.Fontaine@ct.gov">Leo.Fontaine@ct.gov</a></b></p>
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## SI (Modern Metric) Conversion Factors

<b>SI* (MODERN METRIC) CONVERSION FACTORS</b>				
<b>APPROXIMATE CONVERSIONS TO SI UNITS</b>				
<b>Symbol</b>	<b>When You Know</b>	<b>Multiply By</b>	<b>To Find</b>	<b>Symbol</b>
<b>LENGTH</b>				
in	inches	25.4	millimeters	mm
ft	feet	0.305	meters	m
yd	yards	0.914	meters	m
mi	miles	1.61	kilometers	km
<b>AREA</b>				
in <sup>2</sup>	square inches	645.2	square millimeters	mm <sup>2</sup>
ft <sup>2</sup>	square feet	0.093	square meters	m <sup>2</sup>
yd <sup>2</sup>	square yard	0.836	square meters	m <sup>2</sup>
ac	acres	0.405	hectares	ha
mi <sup>2</sup>	square miles	2.59	square kilometers	km <sup>2</sup>
<b>VOLUME</b>				
fl oz	fluid ounces	29.57	milliliters	mL
gal	gallons	3.785	liters	L
ft <sup>3</sup>	cubic feet	0.028	cubic meters	m <sup>3</sup>
yd <sup>3</sup>	cubic yards	0.765	cubic meters	m <sup>3</sup>
NOTE: volumes greater than 1000 L shall be shown in m <sup>3</sup>				
<b>MASS</b>				
oz	ounces	28.35	grams	g
lb	pounds	0.454	kilograms	kg
T	short tons (2000 lb)	0.907	megagrams (or "metric ton")	Mg (or "t")
<b>TEMPERATURE (exact degrees)</b>				
°F	Fahrenheit	5 (F-32)/9 or (F-32)/1.8	Celsius	°C
<b>ILLUMINATION</b>				
fc	foot-candles	10.76	lux	lx
fl	foot-Lamberts	3.426	candela/m <sup>2</sup>	cd/m <sup>2</sup>
<b>FORCE and PRESSURE or STRESS</b>				
lbf	poundforce	4.45	newtons	N
lbf/in <sup>2</sup>	poundforce per square inch	6.89	kilopascals	kPa
<b>APPROXIMATE CONVERSIONS FROM SI UNITS</b>				
<b>Symbol</b>	<b>When You Know</b>	<b>Multiply By</b>	<b>To Find</b>	<b>Symbol</b>
<b>LENGTH</b>				
mm	millimeters	0.039	inches	in
m	meters	3.28	feet	ft
m	meters	1.09	yards	yd
km	kilometers	0.621	miles	mi
<b>AREA</b>				
mm <sup>2</sup>	square millimeters	0.0016	square inches	in <sup>2</sup>
m <sup>2</sup>	square meters	10.764	square feet	ft <sup>2</sup>
m <sup>2</sup>	square meters	1.195	square yards	yd <sup>2</sup>
ha	hectares	2.47	acres	ac
km <sup>2</sup>	square kilometers	0.386	square miles	mi <sup>2</sup>
<b>VOLUME</b>				
mL	milliliters	0.034	fluid ounces	fl oz
L	liters	0.264	gallons	gal
m <sup>3</sup>	cubic meters	35.314	cubic feet	ft <sup>3</sup>
m <sup>3</sup>	cubic meters	1.307	cubic yards	yd <sup>3</sup>
<b>MASS</b>				
g	grams	0.035	ounces	oz
kg	kilograms	2.202	pounds	lb
Mg (or "t")	megagrams (or "metric ton")	1.103	short tons (2000 lb)	T
<b>TEMPERATURE (exact degrees)</b>				
°C	Celsius	1.8C+32	Fahrenheit	°F
<b>ILLUMINATION</b>				
lx	lux	0.0929	foot-candles	fc
cd/m <sup>2</sup>	candela/m <sup>2</sup>	0.2919	foot-Lamberts	fl
<b>FORCE and PRESSURE or STRESS</b>				
N	newtons	0.225	poundforce	lbf
kPa	kilopascals	0.145	poundforce per square inch	lbf/in <sup>2</sup>

\*SI is the symbol for the International System of Units. Appropriate rounding should be made to comply with Section 4 of ASTM E380.  
(Revised March 2003)

## Table of Contents - Continued

### **Qualified Product Lists:**

	Page
Title Page.....	i
Approvals.....	ii
Preface.....	iii
SI (Modern Metric) Conversion Factors.....	iv
Table of Contents.....	v
Addendum.....	viii
<b><u>Qualified Product Lists</u></b> .....	1
Bituminous Concrete Patching Materials (Cold Applied) .....	1
Chemical Anchors.....	3
Detectable Warning ADA Truncated Dome Detectable Warning Systems.....	7
Erosion Control Matting.....	8
Geotextiles.....	14
Impact Attenuation Systems.....	21
Sand Barrels.....	21
Impact Attenuation Systems (Tangential).....	22
Impact Attenuation Systems (Flared).....	23
Impact Attenuation Systems (Median/Gore).....	24
Impact Attenuation Systems (Non-Gating).....	25
Impact Attenuation Systems (Non-Gating – High Incident).....	26
Penetrating Sealer Protective Compound – Clear or Pigmented.....	27
Retroreflective Sheeting.....	29
Construction Barricade Sheeting.....	29
Traffic Drums, 42” Traffic Cones, Opposing Traffic Lane Divider, Glare Screens and Posts and Tubular Markers (Flexible) Sheeting.....	30
Traffic Cone Collar Sheeting.....	31
Construction Roll-Up Sign Sheeting.....	32
Delineator Non-Adhesive Backing Type Sheeting.....	33
Sign and Delineator Sheeting.....	34

## Table of Contents - Continued

### **Qualified Product Lists - Continued**

	Page
Spray-Applied Membrane Waterproofing.....	39
Walls: Embankment Walls.....	41
Walls: Retaining Walls - Mechanically Stabilized Earth (MSE) Walls.....	42
Walls: Retaining Walls - Prefabricated Modular Walls.....	42

### **Qualified Product References (with Acceptance Criteria).....**

Antistripping Additives.....	43
Asphalt Plug Expansion Joints – Movement Capacity 1½” or less).....	43
Bearings – Pot, Spherical or Disc.....	43
Channelizing Devices – Traffic Cones and Drums Type 1 (purchased after 10/1/98).....	43
Coating Systems for New Steel.....	44
Elastomeric Concrete Expansion Joint Systems.....	44
Epoxy Injection Crack Repair.....	44
Fast Setting High Strength Header Materials.....	44
Field Coatings for Blast Cleaned Steel.....	45
Field Touch-Up Paint.....	45
Grouts – Non-Shrink Cementitious.....	45
High Strength Patch Materials for Concrete Bridge Decks.....	45
Offset Blocks for W-Beam Guide Rail – Plastic.....	46
Pavement Joint and Crack Sealants.....	46
Pile Point Reinforcement – Prefabricated.....	46
Pile Splicers – Prefabricated.....	46
Polypropylene (5A) & Polyester Fibers (5B).....	47

## Table of Contents - Continued

### **Qualified Product References (with Acceptance Criteria) – Continued**

	Page
Portland Cement Concrete.....	47
Air-Entraining Admixtures.....	47
High Range Water-Reducing Admixtures.....	47
Portland Cement.....	47
Retarders.....	47
Water-Reducing Admixtures.....	47
Prefabricated Expansion Joints – Movement Capacity Over 4”.....	47
Prefabricated Geocomposite Drain.....	48
Rebar Connectors.....	48
Release Agents.....	48
Rebar Zinc Rich Coatings – Rehabilitation.....	48
Shear Connectors – Welded Stud.....	49
Silicone Expansion Joint System.....	49
Stormwater Treatment (Oil/Grit Separators).....	49
Strip Seal Expansion Joint Systems (with Bridge Joint Extrusions).....	49
Variable Depth Patch.....	50



## Addendum

<b>Date:</b>	<b>Item Changed</b>	<b>Page</b>
05/17	X-LITE Guardrail End Terminal – (Removed )	22&26
06/17	List Removed – no longer needed. <ul style="list-style-type: none"> <li>▪ Qualified Products for Use on Municipal or Other Non- ConnDOT Systems Only</li> </ul>	49
08/17	Impact Attenuation Systems lists updated. <ul style="list-style-type: none"> <li>▪ Type B Impact Attenuation Systems (Tangential)</li> <li>▪ Type B Impact Attenuation Systems (Flared)</li> <li>▪ Type B Impact Attenuation Systems (Median/Gore)</li> </ul>	22 23 24
06/18	Retroreflective Sheeting Type IX - Revise intended use of Type IX sheeting .	35&36
07/18	Impact Attenuation Systems lists updated to match revised specification descriptions. <ul style="list-style-type: none"> <li>▪ Sand Barrels</li> <li>▪ Impact Attenuation Systems (Tangential)</li> <li>▪ Impact Attenuation Systems (Flared)</li> <li>▪ Impact Attenuation Systems (Median/Gore)</li> <li>Added MAX-Tension Median Terminal</li> <li>▪ Impact Attenuation Systems (Non-Gating)</li> <li>▪ Impact Attenuation Systems (Non-Gating – High Incident)</li> </ul>	21 22 23 24 24 25 26
08/18	Dural HS Gel added to Chemical Anchors list.	5
11/18	Wasser Polyflex Bridge Deck System added to Waterproofing List	40
06/19	Dewalt Chemical Anchor update (new names, same formulations)	4
06/19	Hilti Chemical Anchor update (new name, same formulation)	3
06/19	Orafol Type IX added to Retroreflective Sheeting List	37
06/19	PmB Blue Shield updated expiration date.	40
06/19	Retroreflective Sheeting – entire list revised & updated	29-39
06/19	TufTile Inc. Polymer tiles approved for use.	7

## Qualified Product Lists

The following pages contain lists, which are directly referenced in either the standard specifications or in special provisions as Qualified Products Lists. These lists will be updated annually, and no product may be used in these categories unless it is shown on an appropriate list.

### **Bituminous Concrete Patching Materials (Cold Applied):**

**SPECIFICATION:** REFERENCE FILE No. 2011-01

**PREAPPROVAL CRITERIA:** Compliance with Section 22a-174-20(k) of the Regulations of Connecticut

<b>Manufacturer/Supplier</b>	<b>Product Brand Name</b>
Cold Mix Manufacturing Corp. Mr. Scott Herman 120-30 28 <sup>th</sup> Avenue Flushing, NY 11354 Mr. Scott Herman – Office Telephone: 914-755-4575 Website: <a href="http://www.GREENPATCH.com">www.GREENPATCH.com</a>  <u>Local Distributor:</u> O&G Industries, Inc. 112 Wall Street Torrington, CT 06790 Office Telephone: 860-489-9261	GreenPatch
HI TECH Asphalt Solutions, Inc. 5113 Pole Green Road Mechanicsville, VA 23116-5432 Website: <a href="http://www.aquaphalt.com">www.aquaphalt.com</a>	Aquaphalt
The EZ Street Company Mr. Tom Francione 1786 NW 82 Avenue Miami, FL 33126 Website: <a href="http://www.ezstreetasphalt.com">www.ezstreetasphalt.com</a>	EZ Street Cold Asphalt
Tri-Products, LLC Mr. Mike Jennings 89 Ship Street Providence, RI 02903 Website: <a href="http://www.hudsoncompanies.com/hag/tripproducts.asp">www.hudsoncompanies.com/hag/tripproducts.asp</a>	Plus Patch Asphalt Emulsion

**Continued on Next Page:**

## Qualified Product Lists – Continued

### **Bituminous Concrete Patching Materials (Cold Applied) - Continued:**

**SPECIFICATION:** REFERENCE FILE No. 2011-01

**PREAPPROVAL CRITERIA:** Compliance with Section 22a-174-20(k) of the Regulations of Connecticut

<b>Manufacturer/Supplier</b>	<b>Product Brand Name</b>
Logan County Asphalt Mr. Steven McBride 2905 Commerce Boulevard Guthrie, OK 73044 Website: <a href="http://www.prolinecoldasphalt.com/predistributors.php">www.prolinecoldasphalt.com/predistributors.php</a>	ProLine Cold Asphalt Patching Material
Quality Pavement Repair Mr. Anthony J. Fagnoli 154 Bouckhart Avenue Rochester, NY 14622 Website: <a href="http://www.qprcoldpatch.com">www.qprcoldpatch.com</a>	QPR
UNIQUE Paving Materials Corp William Stull 3993 East 93 <sup>rd</sup> Street Cleveland, OH 44105 Website: <a href="http://www.uniquepavingmaterials.com">www.uniquepavingmaterials.com</a>	UPM Permanent Pavement Repair Material
B. Metcalf Asphalt Benjamin Metcalf 104 Interlaken Rd Lakeville, CT 06039 Website: <a href="http://www.bmetcalfasphalt.com">www.bmetcalfasphalt.com</a>	GemPatch

## Qualified Product Lists – Continued

### Chemical Anchors:

**SPECIFICATION:** Standard Specification, M.03.07

### PREAPPROVAL CRITERIA:

1. ASTM E-1512 pullout test by an independent laboratory.
2. The use of all chemical anchors (referenced in Standard Specifications Section M.03.07) in sustained tensile-load overhead applications is prohibited where failure of the chemical adhesive would result in a risk to the public. This applies to all design and ongoing construction projects. Other anchorage alternatives must be used for such applications.

Manufacturer/Supplier	Product Brand Name
A & P Foglia, Inc. 14 Hickory Drive East Brunswick, NJ 08816	Magnabond
Adhesives Technology Corp. 450 East Copans Road Pompano Beach, FL 33064 Website: <a href="http://www.atcepoxy.com">www.atcepoxy.com</a> .	<b>Ultrabond:</b> 1 1300 2 HS200
Covert Operations, Inc. 1940 Freeman Avenue Signal Hill, CA 90755	CIA Gel 7000
Dayton Superior Chemical Division 4226 Kansas Avenue Kansas City, KS 66106 Website: <a href="http://www.daytonsuperiorchemical.com">www.daytonsuperiorchemical.com</a>	Highway Fast Set Epoxy (AHT) ResCon 304 (Symons) Sure Anchor I (J-51)
Fosroc, Inc. 150 Carley Court Georgetown, KY 40324	<b>Thoroc:</b> Anchor Bond Anchortite
Hilti, Inc. P.O. Box 21148 Tulsa, OK 74121 Website: <a href="http://www.us.hilti.com">www.us.hilti.com</a>	<b>Hilti:</b> HIT HY150MAX HIT HY100 HTE50 HVA Capsules HY-200 RE500

Continued on Next Page:

## Qualified Product Lists – Continued

### Chemical Anchors - Continued:

**SPECIFICATION:** Standard Specification, M.03.07

### PREAPPROVAL CRITERIA:

1. ASTM E-1512 pullout test by an independent laboratory.
2. The use of all chemical anchors (referenced in Standard Specifications Section M.03.07) in sustained tensile-load overhead applications is prohibited where failure of the chemical adhesive would result in a risk to the public. This applies to all design and ongoing construction projects. Other anchorage alternatives must be used for such applications.

Manufacturer/Supplier	Product Brand Name
ITW Commercial Construction 1300 North Michael Drive Wood Dale, IL 60191 Website: <a href="http://www.ramset-redhead.com">www.ramset-redhead.com</a>	Epcon Ceramic 6 Granite 5 RedHead A7+
Powers Fasteners, Inc. 2 Powers Lane Brewster, NY 10509 Website: <a href="http://www.powers.com">www.powers.com</a>	AC 100+ GOLD Chem-Stud PE1000+ PURE GP PURE110+ PURE50+ T308+
DEWALT / Powers Fasteners 701 East Joppa Road Towson, MD 21286 Telephone: (800) 524-3244 Web Site: <a href="http://www.powers.com">www.powers.com</a>	DEWALT Pure50+ DEWALT PE1000+ DEWALT AC100+ Gold DEWALT PURE110+
Kelken Construction Systems P.O. Box 284 Parlin, NJ 08859 Website: <a href="http://www.kelken.com">www.kelken.com</a>	Kelibond Anchors KeligROUT KeligROUT 101
MKT Fastening LLC #1 Gunnebo Drive Lonoke, AR 72086 Website: <a href="http://www.mktfastening.com">www.mktfastening.com</a>	<b>Liquid Roc:</b> 300 28oz. Twin Tube 300 Capsule Anchors Polyester Pump 500 Epoxy Twin Tube
Polygem, Inc. 1105 Carolina Avenue West Chicago, IL 60185 Website: <a href="http://www.polygem.com">www.polygem.com</a>	Polybac 1257

**Continued on Next Page:**

## Qualified Product Lists – Continued

### Chemical Anchors - Continued:

**SPECIFICATION:** Standard Specification, M.03.07

### PREAPPROVAL CRITERIA:

1. ASTM E-1512 pullout test by an independent laboratory.
2. The use of all chemical anchors (referenced in Standard Specifications Section M.03.07) in sustained tensile-load overhead applications is prohibited where failure of the chemical adhesive would result in a risk to the public. This applies to all design and ongoing construction projects. Other anchorage alternatives must be used for such applications.

Manufacturer/Supplier	Product Brand Name
Unitex 3101 Gardner Avenue Kansas City, MO 64120 Website: <a href="http://www.unitex-chemicals.com">www.unitex-chemicals.com</a>	<b>Pro-Poxy:</b> 300 300 Fast Sonneborn Epogel (ChemRex, Inc.)
Simpson StrongTie Anchoring Systems 4120 Dublin Boulevard, Suite 400 Dublin, CA 94568 Website: <a href="http://www.simpsonanchors.com">www.simpsonanchors.com</a>	EDOT ET-HP (formally known as Simpson Strong-Tie Epoxy-Tie) Simpson Strong-Tie Acrylic-Tie
Unisorb Installation Technologies P.O. Box 1000 Jackson, MI 49204-1000 Website: <a href="http://www.unisorb.com">www.unisorb.com</a>	Unisorb Capsule Anchor
USP Structural Connectors 14305 Southcross Drive – Suite 200 Burnsville, MN 55306 Website: <a href="http://www.uspconnectors.com">http://www.uspconnectors.com</a>	CIA-GEL 6000-GP
Adhesives Technology Corp. 450 East Copans Road Pompano Beach, Florida 33064	Dural HS Gel

Continued on Next Page:

## **Qualified Product Lists – Continued**

### **Chemical Anchors - Continued:**

**SPECIFICATION:** Standard Specification, M.03.07

### **PREAPPROVAL CRITERIA:**

1. ASTM E-1512 pullout test by an independent laboratory.
2. The use of all chemical anchors (referenced in Standard Specifications Section M.03.07) in sustained tensile-load overhead applications is prohibited where failure of the chemical adhesive would result in a risk to the public. This applies to all design and ongoing construction projects. Other anchorage alternatives must be used for such applications.

<b>Manufacturer/Supplier</b>	<b>Product Brand Name</b>
W.R. Meadows, Inc. 300 Industrial Drive Hampshire, IL 60140 Website: <a href="http://www.wrmeadows.com">www.wrmeadows.com</a>	Sealtight Rezi-Weld Gel Paste UCE
Wejit, Inc. 7737 Japine Drive Liverpool, NY 13090 315-396-8063 (Cell) Website: <a href="http://www.wejit.com">www.wejit.com</a>	<b>Inject-TITE:</b> AWF (All Weather Formula) Fast Set

## Qualified Product Lists – Continued

**Detectable Warning – (i.e., ADA Truncated Dome Detectable Warning Systems)**

**SPECIFICATION: Standard Specification 9.21**

**PREAPPROVAL CRITERIA:** Federal Standard 595A Color #22144 or approved equal.

<b>Manufacturer/Supplier</b>	<b>Product Brand Name</b>
Access Products Inc. 241 Main Street, Suite 100 Buffalo, NY 14203 Telephone: 888-679-4022 Website: <a href="http://www.accessproducts.com">www.accessproducts.com</a>	Access Tile Detectable Warning Tiles
Cape Fear Systems, LLC 215 South Water Street, Suite 103 Wilmington, NC 28401 Telephone: 800-456-5263 Website: <a href="http://www.alerttile.com/">www.alerttile.com/</a>	<b>alerttile® Detectable Warnings:</b> alerttile Surfaced Applied alertcast Cast-In-Place
Armor-Tile 300 International Drive, Suite 100 Williamsville, NY 14221 Telephone: 800-682-2525 Website: <a href="http://www.armor-tile.com/">www.armor-tile.com/</a>	<b>Armor-Tile Tactile System:</b> Cast-In-Place System Surface Applied System (Retrofit)
ADA Solutions, Inc. P.O Box 179 North Billerica, MA 01862 Telephone: 978-262-9900 Website: <a href="http://www.adatile.com">www.adatile.com</a>	<b>Detectable Warning Tile:</b> Cast-In-Place Tactile Surface Applied Tactile (Retrofit) Cast-In-Place Replaceable Tactile
East Jordan Iron Works 5000 Airport Road PO Box 439 East Jordan, MI 49727 Telephone: 231-536-2261 Website: <a href="http://www.ejco.com">www.ejco.com</a>	DURALAST Detectable Warning Plates Cast Iron Uncoated Natural Finish
TufTile Inc. 1200 Flex Court Lake Zurich, IL 60047 Telephone: 888-960-8897 Website: <a href="http://www.tuftile.com">www.tuftile.com</a>	Cast Iron Wet Set (cast-in-place) Polymer Wet-Set (cast-in-place) Polymer Surface-Applied



## Qualified Product Lists – Continued

### **Erosion Control Matting:**

**SPECIFICATION:** Standard Specification 9.50 & M.13.09

**PREAPPROVAL CRITERIA:** See below.

In general, organic materials are cheaper than synthetics, will photo-degrade after a period of time leaving a naturally vegetated channel, and are adequate for channels, which are expected to carry storm water flows not exceeding 95.76 Pa shear stress. Synthetic materials generally do not photo-degrade and often remain as a permanent element within a drainage channel, although more expensive, synthetic materials are generally best for critical channels which will carry high flows or velocities of storm water runoff.

### Minimum Performance Standards

Erosion control matting is evaluated for use in eight Types, grouped in two Classes. In order for a product to be placed upon the Department's Qualified Products List, it must meet the following Minimum Performance Standards.

**Class 1: Slope Protection** – Classification is based upon steepness of slope and soil type. The purpose is to protect the seedbed from loss of sediment and promote the establishment of a warm season, perennial vegetative cover.

- Type A. Slopes 3:1 or Flatter – Clay Soils
- Type B. Slopes 3:1 or Flatter – Sandy Soils
- Type C. Slopes Steeper than 3:1 – Clay Soils
- Type D. Slopes Steeper than 3:1 – Sandy Soils

#### Minimum Acceptable Vegetation Density Standards<sup>1</sup>

	<u>Clay Soils</u>	<u>Sandy Soils</u>
Slopes 3:1 or Flatter	80%	70%
Slopes Steeper than 3:1	80%	70%

#### Minimum Acceptable Sediment Loss Standards (kg/10 m<sup>2</sup>)<sup>1</sup>

	<u>Clay Soils</u>	<u>Sandy Soils</u>
Slopes 3:1 or Flatter	0.35	12.00
Slopes Steeper than 3:1	0.35	27.00

**Class 2: Flexible Channel Liner Protection** – Classification is based upon the permissible shear stress<sup>2</sup> ( $T_p$ ) present. The purpose is to protect the geometry of the channel from loss of sediment, and to promote the establishment of a warm-season, perennial vegetative cover.

- Type E. Permissible shear stress: <25 Pa
- Type F. Permissible shear stress: 25 to <50 Pa
- Type G. Permissible shear stress: 50 to <100 Pa
- Type H. Permissible shear stress: ≥100 Pa

$T_p$ , the permissible shear stress, indicates the force required to initiate the movement of the lining material.

#### Minimum Acceptable Vegetation Density Standards<sup>1</sup>

70%

**Continued on Next Page:**

## **Qualified Product Lists – Continued**

### **Erosion Control Matting - Continued:**

#### **Minimum Acceptable Sediment Loss Standards<sup>1</sup>**

	<u>Average Soil Deformation (cm)</u>
Shear Stress 1 to 100 Pa	1.15
Shear Stress > 100 Pa	1.00

It should be recognized that those products listed by brand or trade name on the Qualified Products List have demonstrated their ability to meet or exceed the Department's minimum Performance standards. It is the Contractor's option as to which product he or she actually uses on a project, provided that the product used is on the Qualified Products List for that application.

It will be the district's responsibility to verify that the Erosion Control Matting proposed by the Contractor is, in fact, listed as an acceptable product on the Qualified Products List.

It should also be recognized that the decision to undergo testing for possible approval rests solely with the manufacturers or distributors of Erosion Control Matting. The Department has created a fair but rigorous testing process for Erosion Control Matting. The Department does not choose or stipulate which products are to be tested.

The Department's position is that, while we encourage the evaluation of new products for possible use in our operations, we cannot utilize a product that has not been tested and approved through the Department's evaluation process.

As new products are tested on an annual basis, those meeting our requirements will be added to the Qualified Products List. If, by the time actual field installation of Erosion Control Matting commences on a project, new products have been added to the Qualified Products List, the Contractor may elect to use these newly approved products even though they were not an "approved" product at the time bids were received on the project.

<sup>1</sup> Final Performance Analysis – 1995 Evaluation Cycle, Texas DOT/Texas Transportation Institute, Hydraulics and Erosion Control Laboratory, February 1996.

<sup>2</sup> Shear Stress ranges based on values published in FHWA Hydraulic Engineering Circular No. 15 (HEC-15), Design of Roadside Channels with Flexible Linings, Publication No. FHWA-ZP-87-7, April 19

**Continued on Next Page:**

## Qualified Product Lists – Continued

### Erosion Control Matting - Continued:

**SPECIFICATION:** Standard Specification, Section 9.50 & M.13.09

**PREAPPROVAL CRITERIA:** Certified Test Report

Manufacturer/Supplier	Class 1: Slope Protection *				Class 2: Flexible Channel Type Protection			
	Type A	Type B	Type C	Type D	Type E *	Type F *	Type G *	Type H **
American Excelsior Co. 831 Pioneer Avenue Rice Lake, WI 54868 Website: <a href="http://www.curlex.com">www.curlex.com</a>	AEC Premier Coconut AEC Premier Straw/Coconut AEC Premier StrawDoubleNet AEC Premier StrawSingleNet AEC Premier Bindex BFM AEC Premier Curlex I AEC Premier Curlex I CL AEC Premier Curlex II AEC Premier Curlex NetFree	AEC Premier Coconut AEC Premier Straw/Coconut AEC Premier StrawDoubleNet AEC Premier StrawSingleNet AEC Premier Bindex BFM AEC Premier Curlex I AEC Premier Curlex I CL AEC Premier Curlex II CL AEC Premier Curlex NetFree	AEC Premier Coconut AEC Premier Straw/Coconut AEC Premier StrawDoubleNet AEC Premier Bindex BFM AEC Premier Curlex I AEC Premier Curlex I CL	AEC Premier Coconut AEC Premier Straw/Coconut AEC Premier StrawDoubleNet AEC Premier Bindex BFM AEC Premier Curlex I AEC Premier Curlex I CL AEC Premier Curlex II AEC Premier Curlex II CL AEC Premier Curlex NetFree	AEC Premier Straw/Coconut AEC Premier StrawDoubleNet AEC Premier PremierCoconut AEC Premier Curlex Enforcer AEC Premier Curlex II AEC Premier Curlex II CL AEC Premier Curlex III AEC Premier Recyclex AEC Premier Recyclex TRM-V	AEC Premier Coconut AEC Premier Straw/Coconut AEC Premier StrawDoubleNet AEC Premier Curlex Enforcer AEC Premier Curlex II AEC Premier Curlex II CL AEC Premier Curlex III AEC Premier Recyclex AEC Premier Recyclex TRM-V	Curlex Enforcer Recyclex Recyclex TRM-V	Curlex Enforcer Recyclex Recyclex TRM-V
Belton Industries 8613 Roswell Road Atlanta, GA 30350		Geocoir/DeKoWe 700 Geocoir/DeKoWe 900		Geocoir/DeKoWe 700 Geocoir/DeKoWe 900				
Contech Construction Products, Inc. 265 Highland Avenue Cheshire, CT 06410 Website: <a href="http://www.contech-cpi.com">www.contech-cpi.com</a>	Ero-Mat Ero-Mat Hi-Velocity Ero-Mat Standard	Ero-Mat Ero-Mat Standard	Ero-Mat Hi-Velocity					

\* Products listed in this category are generally temporary (bio- or photo-degradable). Exceptions are noted.

\*\* Products listed in this category are generally permanent (non-bio- or non-photo-degradable). Exceptions are noted.

TYPE E – Generally includes, but is not limited to, Woven Paper Net, Jute Net.

TYPE F – Generally includes, but is not limited to, Fiberglass Roving (single or double).

TYPE G – Generally includes, but is not limited to, Straw with Net, Curled Wood Mat.

TYPE H – Generally includes, but is not limited to, Synthetic Net.

**Continued on Next Page:**

## Qualified Product Lists – Continued

### Erosion Control Matting – Continued:

**SPECIFICATION:** Standard Specification, Section 9.50 & M.13.09

**PREAPPROVAL CRITERIA:** Certified Test Report

Manufacturer/Supplier	Class 1: Slope Protection *				Class 2: Flexible Channel Type Protection			
	Type A	Type B	Type C	Type D	Type E *	Type F *	Type G *	Type H **
Conwed Fibers 219 Simpson Street Conover, NC 28613	Futerra Mat	Futerra Mat						
East Coast Erosion Blankets 443 Bricker Road Bernville, PA 19506	ECS - 1 ECS - 1B ECS - 1D ECS - 2 ECS - 2B ECS - 2D ECSC - 2 ECSC - 2B ECX - 1 ECX - 2	EC - 7Y EC - 9Y ECS - 1B ECS - 1D ECS - 2 ECS - 2B ECS - 2D ECS - 1 ECSC - 2 ECSC - 2B ECX - 1 ECX - 2	ECC - 2 ECC - 2B ECC - 3 ECP - 2 ECS - 2 ECS - 2B ECS - 2D ECSC - 2 ECSC - 2B ECX - 1 ECX - 2	EC - 7Y EC - 9Y ECC - 2 ECC - 2B ECC - 3 ECP - 2 ECS - 2 ECS - 2B ECS - 2D ECSC - 2 ECSC - 2B ECX - 1 ECX - 2	ECC - 2 ECC - 2B ECC - 3 ECP - 2 10 oz. ECP - 2 T-RECS ECP - 3 ECSC - 3	ECC - 2 ECC - 2B ECC - 3 ECP - 2 10 oz. ECP - 2 T-RECS ECP - 3 ECSC - 3	ECC - 2 ECC - 2B ECC - 3 ECP - 2 10 oz. ECP - 2 T-RECS ECP - 3 ECSC - 3	ECC - 2 ECC - 2B ECC - 3 ECP - 2 10 oz. ECP - 2 T-RECS ECP - 3 ECSC - 3
ErosionControlBlanket.com P.O. Box 69 Riverton, Manitoba R0C 2R0 Canada	S31 S31UVD	S31 S31UVD	S32 S32UVD	S32 S32UVD	P42 S32 S32UVD	P42 S32 S32UVD	P42	P42
Enviroscape ECM 22700 Street, Rt. 613 Oakwood, OH 45873	S1000 S1000BD S2000 S2000BD SC3000 SC3000BD	S1000 S1000BD S2000 S2000BD SC3000 SC3000BD	C4000 C4000BD	C4000 C4000BD	S1000 S1000BD S2000 S2000BD SC3000 SC3000BD	C4000 C4000BD		

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TYPE F – Generally includes, but is not limited to, Fiberglass Roving (single or double).

TYPE G – Generally includes, but is not limited to, Straw with Net, Curled Wood Mat.

TYPE H – Generally includes, but is not limited to, Synthetic Net.

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## Qualified Product Lists – Continued

### Erosion Control Matting – Continued:

**SPECIFICATION:** Standard Specification, Section 9.50 & M.13.09

**PREAPPROVAL CRITERIA:** Certified Test Report

Manufacturer/Supplier	Class 1: Slope Protection *				Class 2: Flexible Channel Type Protection			
	Type A	Type B	Type C	Type D	Type E *	Type F *	Type G *	Type H **
Greenstreak Group 3400 Tree Court Boulevard St. Louis, MO 63122	Pec-Mat	Pec-Mat					Pec-Mat	Pec-Mat
North American Green 14649 Highway 41 Evansville, IN 47711	S150 S150BN S75 S75BN SC150 SC150BN	S150 S150BN S75 S75BN SC150 SC150BN	S150 S150BN SC150 SC150BN	C125 C125BN S150 S150BN SC150 SC150BN	C125 C125BN P300	P300	P300	C350 Biodegradable P300
SI Geosolutions (formally known as Synthetic Industries) 6025 Lee Highway Chattanooga, TN 37421 <a href="http://www.fixsoil.com">www.fixsoil.com</a>	<b>Landlok:</b> CS2 unseeded S1 S2 TRM435	<b>Landlok:</b> CS2 unseeded S1 S2 TRM 435	<b>Landlok:</b> C2 CS2 unseeded S2 TRM 435	<b>Landlok:</b> C2 CS2 unseeded S2 TRM 435	<b>Landlok:</b> C2 TRM 435 TRM 450 TRM1060	<b>Landlok:</b> C2 TRM 435 TRM 450 TRM1060	<b>Landlok:</b> C2 TRM 1060 TRM 435 TRM 450	<b>Landlok:</b> TRM 1060 TRM 435 TRM 450 <b>Pyramat:</b> SFB 12
US Erosion Control Products 1034 Albany Avenue W. Pearson, GA 31642							US-1S US-2C US-2S US-2S	US-2P10 US-2P12

\* Products listed in this category are generally temporary (bio- or photo-degradable). Exceptions are noted.

\*\* Products listed in this category are generally permanent (non-bio- or non-photo-degradable). Exceptions are noted.

TYPE E – Generally includes, but is not limited to, Woven Paper Net, Jute Net.

TYPE F – Generally includes, but is not limited to, Fiberglass Roving (single or double).

TYPE G – Generally includes, but is not limited to, Straw with Net, Curled Wood Mat.

TYPE H – Generally includes, but is not limited to, Synthetic Net.

**Continued on Next Page:**

## Qualified Product Lists – Continued

### Erosion Control Matting – Continued:

**SPECIFICATION:** Standard Specification, Section 9.50 & M.13.09

**PREAPPROVAL CRITERIA:** Certified Test Report

Manufacturer/Supplier	Class 1: Slope Protection *				Class 2: Flexible Channel Type Protection			
	Type A	Type B	Type C	Type D	Type E *	Type F *	Type G *	Type H **
Verdyol Alabama, Inc. P.O. Box 605 407 Miles Parkway Pell City, AL 35125	<b>Ero-Mat:</b> Standard <b>Excelsior:</b> Hi-Velocity Standard	<b>Ero-Mat:</b> Standard <b>Excelsior:</b> Standard	<b>Excelsior:</b> Hi-Velocity					
Western Excelsior Corp. 4609 E Boonville-New Harmony Road Evansville, IN 47725	Excel R-1 Excel S-2 Excel SR-1 Excel SS-2	Excel R-1 Excel S-2 Excel SR-1 Excel SS-2	Excel S-2 Excel SS-2	Excel S-2 Excel SS-2	Excel PP5-8 Excel S-2 ExcelSD-3	Excel PP5-8 Excel SD-3	Excel PP5-8 Excel PP5-10 Excel PP5-12	Excel PP5-10 Excel PP5-12

\* Products listed in this category are generally temporary (bio- or photo-degradable). Exceptions are noted.

\*\* Products listed in this category are generally permanent (non-bio- or non-photo-degradable). Exceptions are noted.

TYPE E – Generally includes, but is not limited to, Woven Paper Net, Jute Net.

TYPE F – Generally includes, but is not limited to, Fiberglass Roving (single or double).

TYPE G – Generally includes, but is not limited to, Straw with Net, Curled Wood Mat.

TYPE H – Generally includes, but is not limited to, Synthetic Net.

## **Qualified Product Lists – Continued**

### **Geotextiles:**

**SPECIFICATION:** Standard Specification, Sections 2.19, 7.51, 7.55 and M.08.01-19

**PREAPPROVAL CRITERIA:** Certified Test Report According to AASHTO M 288

The following list denotes those geotextiles that are approved for use on ConnDOT projects. The categories listed are in accordance with the AASHTO M 288 specification. Geotextile selection shall be based on the following definitive information and the applicable design criteria.

1. **Subsurface Drainage** – Geotextiles within this category shall be used for, but not limited to, the following applications: pavement edge drains; interceptor drains; wall drains; recharge basins and relief wells. The geotextile shall be designed to allow the passage of water normal to its surface while retaining in situ soil without clogging. Class A drainage applications for fabrics are where installation stresses are more severe than Class B applications, i.e., very coarse, sharp, angular aggregate is used; a heavy degree of compaction (95% or greater by AASHTO method T 99) is specified; or, depth of trench is greater than 3.00 m. Class B drainage applications are those where the fabric is used with smooth graded surfaces having no sharp angular projections, no sharp angular aggregate is used; compaction requirements are light (less than 95% by AASHTO method T 99); and, trenches are less than 3.00 m in depth.
2. **Sediment Control** – Geotextiles within this category shall be used as a barrier-fence designed to remove suspended particles from the water that passes through it. “Wire Supported” signifies that fabric is supported with a mesh made of wire or plastic.
3. **Erosion Control** – Geotextiles within this category shall be used for, but not limited to, the following applications: cut and fill slope protection; protection of various small drainage structures and ditches, wave protection for causeways and shoreline roadway embankments; and, and scour protection for structures such as bridges and abutments. The geotextile shall be designed to allow the passage of water while retaining in situ soil without clogging. Class A erosion control applications are those where the fabrics are used under conditions where installation stresses are more severe than Class B, i.e., aggregate placement height should be less than 1.00 m; and, aggregate weights should not exceed 115.00 kg. Class B erosion control applications are those where the fabric is used in structures or under conditions where the fabric is protected by a sand cushion or by “zero drop height” placement of aggregate.
4. **Separation** – Geotextiles within this category shall be used for, but are not limited to, the following applications: separation of dissimilar materials, such as subgrades and pavement base courses and zones in embankments, foundations and select fill materials. When soil stabilization is the primary concern, the Design Engineer is cautioned that a detailed process must be followed, taking into consideration not only the separation properties of the geotextile, but its reinforcement function as well. The geotextile shall be designed to allow the passage of water while retaining in situ soil without clogging.

**Continued on Next Page:**

## Qualified Product Lists – Continued

### Geotextiles - Continued:

**SPECIFICATION:** Standard Specification, Sections 2.19., 7.51, 7.55 and M.08.01-19

**PREAPPROVAL CRITERIA:** Certified Test Report According to AASHTO M 288

Manufacturer/Supplier	Subsurface Drainage		Sediment Control		Erosion Control		Separation	
	Class A	Class B	Wire Supported	Self Supported	Class A	Class B	High Survivability <sup>1</sup>	Medium Survivability <sup>1</sup>
A.H. Harris & Sons, Inc. P.O. Box 311058 367 Alumni Road Newington, CT 06131			Harris Siltfence	Harris Siltfence				
American Engineering Fabrics, Inc. 1 Coffin Avenue New Bedford, MA 02746 Website: <a href="http://www.boomenviro.com">www.boomenviro.com</a>	<b>AEF:</b> 200W 300W 600W 650W 880 1080 1280	<b>AEF:</b> 100W 130W 150W 200W 300W 480 480HS 600W 650W 680 880 1080 1280	<b>AEF:</b> 180W	<b>AEF:</b> 100W 150W 180W	<b>AEF:</b> 300W 650W 880 1080 1280	<b>AEF:</b> 100W 180W 300W 480 480HS 650W 680 880 1080 1280	<b>AEF:</b> 300W 1080 1280	<b>AEF:</b> 200W 300W 600W 880 1080 1280
BBA Fiberweb, Inc. 70 Old Hickory Boulevard Old Hickory, TN 37138		<b>Typar:</b> 3401G	<b>Typar:</b> 3401G	<b>Typar:</b> 3401G		<b>Typar:</b> 3401G	<b>Typar:</b> 3631G	<b>Typar:</b> 3401G

\* Product is satisfactory only where the affected soil contains less than 50% material, by weight, passing the number 200 sieve.

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## Qualified Product Lists – Continued

### Geotextiles - Continued:

**SPECIFICATION:** Standard Specification, Sections 2.19., 7.51, 7.55 and M.08.01-19

**PREAPPROVAL CRITERIA:** Certified Test Report According to AASHTO M 288

Manufacturer/Supplier	Subsurface Drainage		Sediment Control		Erosion Control		Separation	
	Class A	Class B	Wire Supported	Self Supported	Class A	Class B	High Survivability <sup>1</sup>	Medium Survivability
Belton Industries, Inc. P.O. Box 127 Belton, SC 29627 Website: <a href="http://www.boomenviro.com">www.boomenviro.com</a>	768 769 977 1475	307 308 751 768 769 977 1475	940	307 940	769 1475	307 769 940 1475	1475	768 977 1475
Carthage Mills 4243 Hunt Road Cincinnati, OH 45242 Website: <a href="http://www.carthagemills.com">www.carthagemills.com</a>	Carthage - 6% FX-75NW	Carthage - 6% FX-35HS FX-35NW FX-40HS FX-40NW FX-75NW	FX-11	FX-11	Carthage - 6% FX-55 * FX-66 FX-75NW	Carthage - 6% FX-33 FX-35HS FX-35NW FX-40HS FX-40NW FX-44 FX-55 * FX-66 FX-75NW	FX-66 FX-75NW	FX-55 * FX-66 FX-75NW
DGI Industries P.O. Box 16522 Hooksett, NH 03442 Website: <a href="http://www.dgiindustries.com">www.dgiindustries.com</a>			CT138036 CT213036	CT138036 CT213036				
Evergreen Technologies Inc. (Div. of Tensar) 200 Miller Sellers Drive Evergreen, AL 36401	TG650	TG420 * TG500 TG650	TG420	TG550	TG700	TG420 * TG500 TG700	TG650	TG500 TG650

\* Product is satisfactory only where the affected soil contains less than 50% material, by weight, passing the number 200 sieve.

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## Qualified Product Lists – Continued

### Geotextiles - Continued:

**SPECIFICATION:** Standard Specification, Sections 2.19., 7.51, 7.55 and M.08.01-19

**PREAPPROVAL CRITERIA:** Certified Test Report According to AASHTO M 288

Manufacturer/Supplier	Subsurface Drainage		Sediment Control		Erosion Control		Separation	
	Class A	Class B	Wire Supported	Self Supported	Class A	Class B	High Survivability	Medium Survivability
First Line Corp. P.O. Box 68 Pearson, GA 31642			CSF 330	CSF 330				
Hanes Geo Components 815 Buxton Street Winston-Salem, NC 27101 Website: <a href="http://www.hanesgeo.com">www.hanesgeo.com</a>	<b>Terratex:</b> EP NO8	<b>Terratex:</b> EP NO4 NO8 SD SO4	<b>Terratex:</b> SC SC-90	<b>Terratex:</b> SC SC-90	<b>Terratex:</b> GS * NO8	<b>Terratex:</b> GS * GS-150 * NO4 NO8 SD	<b>Terratex:</b> EP HD *	<b>Terratex:</b> EP GS * HD * NO8
Hoechst Celanese Corp. P.O. Box 5650 Spartanburg, SC 29304-5650			<b>Trevira:</b> 011/140			<b>Trevira:</b> 011/140		<b>Trevira:</b> 011/200
Indian Valley Industries Inc. 60-100 Corliss Avenue Johnson City, NY 13790 Website: <a href="http://www.iviindustries.com">www.iviindustries.com</a>			CT-3611	CT-3611		CT-3611		

\* Product is satisfactory only where the affected soil contains less than 50% material, by weight, passing the number 200 sieve.

**Continued on Next Page:**

## Qualified Product Lists – Continued

### Geotextiles - Continued:

**SPECIFICATION:** Standard Specification, Sections 2.19., 7.51, 7.55 and M.08.01-19

**PREAPPROVAL CRITERIA:** Certified Test Report According to AASHTO M 288

Manufacturer/Supplier	Subsurface Drainage		Sediment Control		Erosion Control		Separation	
	Class A	Class B	Wire Supported	Self Supported	Class A	Class B	High Survivability	Medium Survivability
LINQ Industrial Fabrics, Inc. 4550 W. Fifth North Street Summerville, SC 29483	180EX 225EX 250EX 275EX 350EX	180EX 125EX 130EX 150EX 225EX 250EX 275EX 350EX	180 102 104 105	180 102 104 105	180EX 225EX 250EX 275EX 350EX GTF 400E	180EX 125EX 130EX 150EX 225EX 250EX 275EX 350EX GTF 400E	180EX 225EX 250EX 275EX GTF 300 * 130EX 150EX 225EX 250EX 275EX 350EX	180EX GTF 200S GTF 200 * GTF 300 * 130EX 150EX 225EX 250EX 275EX 350EX
Mutual Industries Inc. 707 West Grange Street Philadelphia, PA 19120			MISF 1830 MISF 1855	MISF 1830 MISF 185 5				
OnSite Systems, Inc. P.O. Box 241166 Charlotte, NC 28224			WCF 120	WCF 120	WCF 200	WCF 150 WCF 200	WCF 300	WCF 200 WCF 300

\* Product is satisfactory only where the affected soil contains less than 50% material, by weight, passing the number 200 sieve.

**Continued on Next Page:**

## Qualified Product Lists – Continued

### Geotextiles - Continued:

**SPECIFICATION:** Standard Specification, Sections 2.19., 7.51, 7.55 and M.08.01-19

**PREAPPROVAL CRITERIA:** Certified Test Report According to AASHTO M 288

Manufacturer/Supplier	Subsurface Drainage		Sediment Control		Erosion Control		Separation	
	Class A	Class B	Wire Supported	Self Supported	Class A	Class B	High Survivability	Medium Survivability
Propex Geosolutions 6025 Lee Highway Suite 425 PO Box 22788 Chattanooga, TN 37422 Website: <a href="http://www.geotextile.com">www.geotextile.com</a>	Geotex: 104F 135ST 102F 200ST 401 701 801 1071 1291 170 1	Geotex 200ST 311 351 401 451 501 601 701 801 1071 1291 1701		Geotex 117F 2130	Geotex 104F 200ST 315ST 102F 801 1071 1291 1701	Geotex 104F 200ST 315ST 102F 351 401 451 601 801 1071 1291 1701	Geotex 315ST 2x2HF 701 801 1071 1291 1701	Geotex 200ST 315ST 2x2HF 451 501 601 701 801 1071 1291 1701
SKAPS Industries 335 Athena Drive Athens, GA 30601	M706 GT170 GT180	GT131 GT135 GT140 GT142 M706	GT135 W100	W100	SW200* SW315* GT180 M706	GT135 GT140 GT142 SW200* SW315*		M706 GT140 GT142 SW200* SW315* GT180

\* Product is satisfactory only where the affected soil contains less than 50% material, by weight, passing the number 200 sieve.

**Continued on Next Page:**

## Qualified Product Lists – Continued

### Geotextiles - Continued:

**SPECIFICATION:** Standard Specification, Sections 2.19., 7.51, 7.55 and M.08.01-19

**PREAPPROVAL CRITERIA:** Certified Test Report According to AASHTO M 288

Manufacturer/Supplier	Subsurface Drainage		Sediment Control		Erosion Control		Separation	
	Class A	Class B	Wire Supported	Self Supported	Class A	Class B	High Survivability <sup>1</sup>	Medium Survivability
Willacoochee Industrial Fabrics, Inc. PO Box 599 769 W Main Street Willacoochee, GA 31650 Website: <a href="http://www.winfabusa.com">www.winfabusa.com</a>	<b>WINFAB:</b> 200W 400N 700N 800N 1000NE 2199	<b>WINFAB:</b> 600N 700N 800N 1000NE			<b>WINFAB:</b> 200W 315W 800N 1000NE 2199	<b>WINFAB:</b> 200W 315W 400N 600N 700N 800N 1000NE 2199	<b>WINFAB:</b> 315W 700N 800N 2x2HF 1000NE	<b>WINFAB:</b> 200W 315W 600N 700N 800N 2x2HF 1000NE
TenCate Geosynthetics North America (formerly TC Mirafi) 365 South Holland Drive Pendergrass, GA 30567 Website: <a href="http://www.tencate.com">www.tencate.com</a>	170N 180N FW404 FW500 FW700	135N 140N 140NC 140NL FW404 FW500 FW700	100X FW500 FW700	100X Enviro-Fence FW404 FW500 FW700	180N 500X * 600X * FW404 FW500 FW700	140N 140NL 500X * 600X * FW404 FW500 FW700	170N 180N 600X * FW404 FW500 FW700 HP370	140N 500X * 550X 600X * FW500 FW700
TNS Advanced Technologies, Inc. 681 DeYoung Road Greer, SC 29651	R070 R080	R031 R035 R040 R042	R035	W280	R080	R035 R040 R042	R070 R080	R042
US Silt & Site Supply/GETSco Telephone: 603-225-4600 X10 E-Mail: <a href="mailto:sales@ussilt.com">sales@ussilt.com</a> Website: <a href="http://www.ussilt.com">www.ussilt.com</a>			CT36112130	CT36112130				

\* Product is satisfactory only where the affected soil contains less than 50% material, by weight, passing the number 200 sieve.

## Qualified Product Lists – Continued

### Impact Attenuation Systems:

**SPECIFICATION(s):** January 2018 Supplements Section 18.02 SAND BARRELS

Standard Specification Form 817 Section 18.02 TYPE A – IMPACT ATTENUATION SYSTEM

**PREAPPROVAL CRITERIA:** Written approval from FHWA for use on National Highway System roads and Crash Tested in accordance with “National Cooperative Highway Research (NCHRP) Report 350 – Recommended Procedures for the Safety Performance Evaluation of Highway Features” Test Level 3 criteria; *or*, Crash tested in accordance with “AASHTO Manual for Assessing Safety Hardware (MASH)” Test Level 3 criteria.

**Comments:** For all attenuators, see the [ConnDOT Highway Design Manual](#) for guidance.

Sand Barrels **									
System	Manufacturer/Supplier	Energy Absorbing	Transition to Rigid System Required	Available Widths (Barrel Size)	Available Lengths	Deck Structure Required	Bi-Direct Capable	Redirect Capable	Comments
Big Sandy Barrels	TraFFix Devices, Inc. Telephone: 949-361-5663 Extension 219	No	No	80” (36” Tall x 36” Dia.)	TL-1: approx. 14’ TL-3: approx. 29’	No	Yes	No	*Primarily used as a temporary barrier. System is fully gating.
CrashGard Barrels	Plastic Safety Systems, Inc. Telephone: 800-662-6338	No	No	6.5 to unlimited (48” Tall x 36” Dia.)	TL-3 : approx. 28’	No	Yes	No	*Primarily used as a temporary barrier. System is fully gating.
Energite III Barrels	TRANSPO Telephone: 800-321-7870	No	No	6.5 to unlimited (36” Tall x 36” Dia.)	TL-3: 18’ to 40’	No	Yes	No	*Primarily used as a temporary barrier. System is fully gating.

\* Interchangeable with other approved sand barrel systems; however, this system must be installed in the back due to height.

\*\* Publication of January 2018 Supplements changed Section 18.02 title from “TYPE A – IMPACT ATTENUATION SYSTEM” to “SAND BARRELS”

## Qualified Product Lists – Continued

### Impact Attenuation Systems - Continued:

**SPECIFICATION(s)** January 2018 Supplements Section 18.03 IMPACT ATTENUATION SYSTEM

CTDOT Special Provision Item # 1803064A TYPE B IMPACT ATTENUATION SYSTEM (TANGENTIAL) REPLACEMENT PARTS

CTDOT Special Provision Item # 1803071A TYPE B IMPACT ATTENUATION SYSTEM (TANGENTIAL)

**PREAPPROVAL CRITERIA:** Crash Tested in accordance with “National Cooperative Highway Research (NCHRP) Report 350 – Recommended Procedures for the Safety Performance Evaluation of Highway Features” Test Level 3 criteria; *or*, Crash tested in accordance with “AASHTO Manual for Assessing Safety Hardware (MASH)” Test Level 3 criteria.

**Comments:** For all attenuators, see the [ConnDOT Highway Design Manual](#) for guidance.

Impact Attenuation Systems (Tangential) *			
System	Manufacturer/ Supplier	Compatible Barrier System	Crash Test Specification
SoftStop	<a href="#">Trinity Products</a>	R-B 350, R-B MASH	MASH
SKT-SP	<a href="#">Road Systems, Inc.</a>	R-B 350	NCHRP-350
MSKT-SP	<a href="#">Road Systems, Inc.</a>	R-B 350, R-B MASH	MASH
MAX-Tension	<a href="#">Barrier Systems by Lindsay</a>	R-B 350, R-B MASH	MASH
BEAT	<a href="#">Road Systems, Inc.</a>	6” Box Beam	NCHRP-350

\* Publication of January 2018 Supplements incorporated CTDOT Special Provision “TYPE B IMPACT ATTENUATION SYSTEM (TANGENTIAL)” into Section 18.03 “IMPACT ATTENUATION SYSTEM”

## Qualified Product Lists – Continued

### Impact Attenuation Systems - Continued:

**SPECIFICATION(s):** January 2018 Supplements Section 18.03 IMPACT ATTENUATION SYSTEM

CTDOT Special Provision Item # 1803063A TYPE B IMPACT ATTENUATION SYSTEM (FLARED) REPLACEMENT PARTS

CTDOT Special Provision Item #1803070A TYPE B IMPACT ATTENUATION SYSTEM (FLARED)

**PREAPPROVAL CRITERIA:** Crash Tested in accordance with “National Cooperative Highway Research (NCHRP) Report 350 – Recommended Procedures for the Safety Performance Evaluation of Highway Features” Test Level 3 criteria; *or*, Crash tested in accordance with “AASHTO Manual for Assessing Safety Hardware (MASH)” Test Level 3 criteria.

**Comments:** For all attenuators, see the [ConnDOT Highway Design Manual](#) for guidance.

Impact Attenuation Systems (Flared) *			
System	Manufacturer/ Supplier	Compatible Barrier System	Crash Test Specification
SRT	<a href="#">Trinity Products</a>	R-B 350, R-B MASH	NCHRP-350
FLEAT-SP	<a href="#">Road Systems, Inc.</a>	R-B 350, R-B MASH	NCHRP-350

\* Publication of January 2018 Supplements incorporated CTDOT Special Provision “TYPE B IMPACT ATTENUATION SYSTEM (FLARED)” into Section 18.03 “IMPACT ATTENUATION SYSTEM”



## Qualified Product Lists – Continued

### Impact Attenuation Systems - Continued:

**SPECIFICATION(s):** January 2018 Supplements Section 18.03 IMPACT ATTENUATION SYSTEM

CTDOT Special Provision Item # 1803065A TYPE B IMPACT ATTENUATION SYSTEM (MEDIAN/GORE) REPLACEMENT PARTS

CTDOT Special Provision Item # 1803072A TYPE B IMPACT ATTENUATION SYSTEM (MEDIAN/GORE)

CTDOT Special Provision Item # 1807200A TEMPORARY IMPACT ATTENUATION SYSTEM TYPE B

CTDOT Special Provision Item # 1807201A RELOCATION OF TEMPORARY IMPACT ATTENUATION SYSTEM TYPE B

**PREAPPROVAL CRITERIA:** Crash Tested in accordance with “National Cooperative Highway Research (NCHRP) Report 350 – Recommended Procedures for the Safety Performance Evaluation of Highway Features” Test Level 3 criteria; *or*, Crash tested in accordance with “AASHTO Manual for Assessing Safety Hardware (MASH)” Test Level 3 criteria.

**Comments:** For all attenuators, see the [ConnDOT Highway Design Manual](#) for guidance.

Impact Attenuation Systems (Median/Gore) *			
System	Manufacturer/ Supplier	Compatible Barrier System	Crash Test Specification
CAT 350	<a href="#">Trinity Products</a>	R-B 350, R-B MASH, MD-B 350, MD-B MASH	NCHRP-350
BEAT-MT	<a href="#">Road Systems, Inc.</a>	8” x 6” Box Beam	NCHRP-350
MAX-Tension Median	<a href="#">Barrier Systems by Lindsay</a>	MD-B 350, MD-B MASH	MASH

\* Publication of January 2018 Supplements incorporated CTDOT Special Provision “TYPE B IMPACT ATTENUATION SYSTEM (MEDIAN/GORE)” into Section 18.03 “IMPACT ATTENUATION SYSTEM”

## Qualified Product Lists – Continued

### Impact Attenuation Systems - Continued:

**SPECIFICATION(s):** January 2018 Supplements Section 18.03 IMPACT ATTENUATION SYSTEM

CTDOT Special Provision Item # 1803060A TYPE B IMPACT ATTENUATION SYSTEM (NON-GATING)

CTDOT Special Provision Item # 1803062A TYPE B IMPACT ATTENUATION SYSTEM (NON-GATING) REPLACEMENT PARTS

**PREAPPROVAL CRITERIA:** Written approval from FHWA for use on National Highway System roads and Crash Tested in accordance with “National Cooperative Highway Research (NCHRP) Report 350 – Recommended Procedures for the Safety Performance Evaluation of Highway Features” Test Level 3 criteria; *or*, Crash tested in accordance with “AASHTO Manual for Assessing Safety Hardware (MASH)” Test Level 3 criteria.

**Comments:** For all attenuators, see the [ConnDOT Highway Design Manual](#) for guidance.

Impact Attenuation Systems (Non-Gating) *									
System	Manufacturer/ Supplier	Energy Absorbing	Transition to Rigid System Required	Available Widths (Barrel Size)	Available Lengths	Deck Structure Required	Bi-Direct Capable	Redirect Capable	Comments
QUADGUARD Family	Distributed by TRANSCO Telephone: 800- 321-7870	Yes	No	2' to 7.5'	5.7' To 38.7'	Yes	Yes	Yes	Primarily used to shield fixed objects. Available widths are measured at back up.
TAU II	Distributed by Barrier Systems Telephone: 856- 424-8186	Yes	Yes	2'	5.3' To 28'	Yes	Yes	Yes	Primarily used to shield fixed objects. Available widths are measured at back up.
TRACC	Manufactured by Trinity Products Telephone: 800- 321-2755	Yes	No	2.6'	21'	Yes	Yes	Yes	Unit is shipped completely assembled.

\* Publication of January 2018 Supplements incorporated CTDOT Special Provision “TYPE B IMPACT ATTENUATION SYSTEM (NON-GATING)” into Section 18.03 “IMPACT ATTENUATION SYSTEM”

## Qualified Product Lists – Continued

### Impact Attenuation Systems - Continued:

**SPECIFICATION(s):** January 2018 Supplements Section 18.03 IMPACT ATTENUATION SYSTEM

CTDOT Special Provision Item # 1803066A TYPE B IMPACT ATTENUATION SYSTEM (HIGH-INCIDENT) NON-GATING

**PREAPPROVAL CRITERIA:** Written approval from FHWA for use on National Highway System roads and Crash Tested in accordance with “National Cooperative Highway Research (NCHRP) Report 350 – Recommended Procedures for the Safety Performance Evaluation of Highway Features” Test Level 3 criteria; **or**, Crash tested in accordance with “AASHTO Manual for Assessing Safety Hardware (MASH)” Test Level 3 criteria.

**Comments:** For all attenuators, see the [ConnDOT Highway Design Manual](#) for guidance.

Impact Attenuation Systems (Non-Gating – High Incident) *									
System	Manufacturer/ Supplier	Energy Absorbing	Transition to Rigid System Required	Available Widths (Barrel Size)	Available Lengths	Deck Structure Required	Bi-Direct Capable	Redirect Capable	Comments
REACT 350 Family	Distributed by TRANSCO Telephone: 800-321-7870	Yes	No (transition to W- beam available).	3' to 10'	15' to 30'	Yes	Yes	Yes	Primarily used in locations where a high # of accidents have occurred on high-speed (NHS) high-volume roadways.
SCI100GM Family	Distributed by Onsite, Inc. Telephone: 860-669-3988	Yes	No, if under 24'- 9" and no reverse direction traffic.	24" to 11'	13'-6" to 50'	Yes	Yes	Yes	Primarily used in locations where a high # of accidents have occurred on high-speed (NHS) high-volume roadways.

\* Publication of January 2018 Supplements incorporated CTDOT Special Provision “TYPE B IMPACT ATTENUATION SYSTEM (NON-GATING – HIGH INCIDENT)” into Section 18.03 “IMPACT ATTENUATION SYSTEM”

## **Qualified Product Lists – Continued**

### **Penetrating Sealer Protective Compound – Clear or Pigmented:**

**SPECIFICATION:** Standard Specification, M.03.09

**PREAPPROVAL CRITERIA:** Independent laboratory test results per NCHRP 244 for northern climates.

**TYPES OF SEALER** – Each product will be assigned a category based on its physical characteristics, as follows:

P - Pigmented. Not necessarily white. Overcoat for clear.

C - Clear. Intended for use on structure wing walls, beam seats, inside faces of parapets, or as called for by the engineer. Requires pigmented sealant overcoat.

W - White. Intended for use on Jersey barrier or when called for by the engineer.

<b>Manufacturer/Supplier</b>	<b>Product Brand Name</b>	<b>Type</b>
Advanced Chemical Technologies 100 W. Wilshire Boulevard Oklahoma City, OK 73116 Website: <a href="http://www.advchemtech.com">www.advchemtech.com</a>	Sil-Act ATS-42	C
Bay Oil Company 38 Plainfield Street Chicopee, MA 01013	BayGuard Salt Protector No. 244	C
Degussa Building Systems 889 Valley Park Drive Shakopee, MN 55379 Website: <a href="http://www.DegussaBuildingSystems.com">www.DegussaBuildingSystems.com</a>	Enviroseal 20 Enviroseal 40 Masterseal SL40 VOC	C,P
Modac Products Co. 600 Reed Road Broomall, PA 19008 Website: <a href="http://www.modacproducts.com">www.modacproducts.com</a>	Modac F	C,P
Nox-crete Products Group P.O. Box 8102 Omaha, NE 68108 Website: <a href="http://www.NOX-CRETE.com">www.NOX-CRETE.com</a>	Stifel-S	C
Princeton Chemical, Inc. P.O. Box 132 Lincoln, RI 02865	Crete-Shield	C
ProSoCo, Inc. 3741 Greenway Circle Lawrence, KS 66046 Website: <a href="http://www.prosoco.com">www.prosoco.com</a>	Consolideck Saltguard WB	C

**Continued on Next Page:**

## **Qualified Product Lists – Continued**

### **Penetrating Sealer Protective Compound – Clear or Pigmented - Continued:**

**SPECIFICATION:** Standard Specification, M.03.09

**PREAPPROVAL CRITERIA:** Independent laboratory test results per NCHRP 244 for northern climates.

**TYPES OF SEALER** – Each product will be assigned a category based on its physical characteristics, as follows:

P - Pigmented. Not necessarily white. Overcoat for clear.

C - Clear. Intended for use on structure wing walls, beam seats, inside faces of parapets, or as called for by the engineer. Requires pigmented sealant overcoat.

W - White. Intended for use on Jersey barrier or when called for by the engineer.

<b>Manufacturer/Supplier</b>	<b>Product Brand Name</b>	<b>Type</b>
Sivento, Inc. 65 Challenger Road Ridgefield Park, NJ 07660	CHEM-TRETE BSM 40 VOC Dynasylan BH-N	C
Tamms Industries 3835 State Route 72 Kirkland, IL 60146	Baracade 16 (Formerly SMS-250 and Chemstop SMS-250)	C
Vexcon Chemicals 7240 State Road Philadelphia, PA 19135 Website: <a href="http://www.vexcon.com">www.vexcon.com</a>	<b>Certi-Vex:</b> Enfio Smooth VOC Enfio Tex VOC Powerseal 40%	C,P
Watson-Bowman & Acme 95 Pineview Drive Amherst, NY 14228	WABO HorseySet WDE	C,P

## **Qualified Product Lists – Continued**

### **Retroreflective Sheeting:**

#### **Construction Barricade Sheeting**

**SPECIFICATION:** 1) Standard Specification M.18.09  
2) Material Certificate submission conforming to Standard Specification 1.06.07.

**PREAPPROVAL CRITERIA:** 1) Conformance to ASTM D4956  
2) Participation in the National Transportation Product Evaluation Program (NTPEP) 1-Year Retroreflective Sheeting Test Deck.

Retroreflective Sheeting Type IV	
Manufacturer/Supplier	Product Brand Name
3M Company Transportation Safety Division 3M Center, Building 235-03W-052 St. Paul, MN 55144	3336 White/Orange
Avery Dennison Reflective Products Division 7542 Natchez Avenue Niles, IL 60714	W11144 White/Orange W11145 White/Orange

Retroreflective Sheeting Type XI	
Manufacturer/Supplier	Product Brand Name
3M Company Transportation Safety Division 3M Center, Building 235-03W-052 St. Paul, MN 55144	446 White/Orange

## **Qualified Product Lists – Continued**

### **Retroreflective Sheeting:**

**Traffic Drums, 42” Traffic Cones, Opposing Traffic Lane Divider, Glare Screens and Posts and Tubular Markers (Flexible) Sheeting**

**SPECIFICATION:** 1) Standard Specification M.18.09  
2) Material Certificate submission conforming to Standard Specification 1.06.07.

**PREAPPROVAL CRITERIA:** 1) Conformance to ASTM D4956  
2) Participation in the National Transportation Product Evaluation Program (NTPEP) 1-Year Retroreflective Sheeting Test Deck.

Retroreflective Sheeting Type IV	
Manufacturer/Supplier	Product Brand Name
3M Company Transportation Safety Division 3M Center, Building 235-03W-052 St. Paul, MN 55144	3310 - White
Avery Dennison Corp. 7542 N. Natchez Avenue Niles, Illinois, 60714	WR-7100 Reboundable White Prismatic WR-7114 Reboundable Fluorescent Orange Prismatic
ORAFOL Americas Inc. 120 Darling Drive Avon, Connecticut 06001	Resilience Channelizer – Fluorescent Orange

## **Qualified Product Lists – Continued**

### **Retroreflective Sheeting:**

#### **Traffic Cone Collar Sheeting**

**SPECIFICATION:** 1) Standard Specification M.18.09  
2) Material Certificate submission conforming to Standard Specification 1.06.07.

**PREAPPROVAL CRITERIA:** 1) Conformance to ASTM D4956

Retroreflective Sheeting Type VI	
Manufacturer/Supplier	Product Brand Name
ORAFOL Americas, Inc. 120 Darling Drive Avon, CT 06001	ORALITE: 2010 White Cone Collar
3M Company Transportation Safety Division 3M Center, Building 235-03W-052 St. Paul, MN 55144	3340 – Flexible Prismatic Cone Sheeting



## **Qualified Product Lists – Continued**

### **Retroreflective Sheeting:**

#### **Construction Roll-Up Sign Sheeting**

**SPECIFICATION:** 1) Standard Specification M.18.09  
2) Material Certificate submission conforming to Standard Specification 1.06.07.

**PREAPPROVAL CRITERIA:** 1) Conformance to ASTM D4956  
2) Participation in the National Transportation Product Evaluation Program (NTPEP) 1-Year Retroreflective Sheeting Test Deck.

Retroreflective Sheeting Type VI	
Manufacturer/Supplier	Product Brand Name
3M Company Transportation Safety Division 3M Center, Building 235-03W-052 St. Paul, MN 55144	RS60 - White RS64I – Fluorescent Orange  RS20 - White RS24 – Fluorescent Orange RS33 – Fluorescent Pink
ORAFOL Americas, Inc. 120 Darling Drive Avon, CT 06001	ORALITE: Orange Roll Up Sign Fluorescent Orange Super Bright Roll Up Sign

## **Qualified Product Lists – Continued**

### **Retroreflective Sheeting:**

#### **Delineator Non-Adhesive Backing Type Sheeting**

**SPECIFICATION:** 1) Standard Specification M.18.09  
2) Material Certificate submission conforming to Standard Specification 1.06.07.

**PREAPPROVAL CRITERIA:** 1) Conformance to ASTM D4956  
2) Participation in the National Transportation Product Evaluation Program (NTPEP) 3-Year Retroreflective Sheeting Test Deck.

Retroreflective Sheeting Type V	
Manufacturer/Supplier	Product Brand Name
ORAFOL Americas, Inc. 120 Darling Drive Avon, CT 06001	ORALITE: AP1000 Red AP1000 White AP1000 Yellow AR1000 White AR1000 Yellow

## **Qualified Product Lists – Continued**

### **Retroreflective Sheeting:**

#### **Sign and Delineator Sheeting**

**SPECIFICATION:** 1) Standard Specification M.18.09  
2) Material Certificate submission conforming to Standard Specification 1.06.07.

**PREAPPROVAL CRITERIA:** 1) Conformance to ASTM D4956  
2) Participation in the National Transportation Product Evaluation Program (NTPEP) 3-Year Retroreflective Sheeting Test Deck.

Retroreflective Sheeting Type IV	
Manufacturer/Supplier	Product Brand Name
3M Company Transportation Safety Division 3M Center, Building 235-03W-052 St. Paul, MN 55144	3930 – White 3931 – Yellow 3932 – Red 3935 – Blue 3937 – Green 3939 – Brown
Avery Dennison Corp. 7542 N. Natchez Avenue Niles, Illinois, 60714	T-6500 – White T-6501 – Yellow T-6505 – Blue T-6507 – Green T-6508 – Red T-6509 – Brown
Nippon Carbide Industries 12981 E. Florence Avenue Santa Fe Springs, CA 90670	94802 – White 94804 – Yellow 94805 – Red 94806 – Blue 94807 – Orange 94808 – Green
ORAFOL Americas, Inc. 120 Darling Drive Avon, CT 06001	5900-010 – White 5900-020 – Yellow 5900-030 – Red 5900-050 – Blue 5900-060 – Green 5900-080 – Brown

## **Qualified Product Lists – Continued**

### **Retroreflective Sheeting:**

#### **Sign and Delineator Sheeting – Continued**

**SPECIFICATION:** 1) Standard Specification M.18.09  
2) Material Certificate submission conforming to Standard Specification 1.06.07.

**PREAPPROVAL CRITERIA:** 1) Conformance to ASTM D4956  
2) Participation in the National Transportation Product Evaluation Program (NTPEP) 3-Year Retroreflective Sheeting Test Deck.

Retroreflective Sheeting Type VIII	
Manufacturer/Supplier	Product Brand Name
3M Company Transportation Safety Division 3M Center, Building 235-03W-052 St. Paul, MN 55144	3924S Fluorescent Orange
Avery Dennison Corp. 7542 N. Natchez Avenue Niles, Illinois, 60714	W7514 Fluorescent Orange
Nippon Carbide Industries, Inc. 3136 East Victoria Street Rancho Dominguez, CA 90221	Nikkalite: 92847 Fluorescent Orange
ORAFOL Americas, Inc. 120 Darling Drive Avon, CT 06001	Oralite®: 5930-038 Fluorescent Orange

## Qualified Product Lists – Continued

### **Retroreflective Sheeting:**

#### **Sign and Delineator Sheeting – Continued**

**SPECIFICATION:** 1) Standard Specification M.18.09  
2) Material Certificate submission conforming to Standard Specification 1.06.07.

**PREAPPROVAL CRITERIA:** 1) Conformance to ASTM D4956  
2) Participation in the National Transportation Product Evaluation Program (NTPEP) 3-Year Retroreflective Sheeting Test Deck.

Retroreflective Sheeting Type IX	
Manufacturer/Supplier	Product Brand Name
3M Company Transportation Safety Division 3M Center, Building 235-03W-052 St. Paul, MN 55144	3910 – White 3914 – Fluorescent Orange 3981 – Fluorescent Yellow 3983 – Fluorescent Yellow/Green 3990 – White 3991 – Yellow 3992 – Red 3995 – Blue 3997 – Green  4091 – Yellow 4092 – Red 4095 – Blue 4097 – Green 4081 – Fluorescent Yellow 4083 – Fluorescent Yellow-Green 4084 – Fluorescent Orange
Avery Dennison Corp. 7542 N. Natchez Avenue Niles, Illinois, 60714	T-9500 – White T-9501 – Yellow T-9505 – Blue T-9507 – Green T-9508 – Red T-9513 – Fluorescent Yellow/Green W-9514 – Fluorescent Orange  T-11500 – White T-11501 – Yellow T-11505 – Blue T-11507 – Green T-11508 – Red T-11511 – Fluorescent Yellow T-11513 – Fluorescent Yellow/Green W-11514 – Fluorescent Orange

## **Qualified Product Lists – Continued**

### **Retroreflective Sheeting:**

#### **Sign and Delineator Sheeting – Continued**

**SPECIFICATION:** 1) Standard Specification M.18.09  
2) Material Certificate submission conforming to Standard Specification 1.06.07.

**PREAPPROVAL CRITERIA:** 1) Conformance to ASTM D4956  
2) Participation in the National Transportation Product Evaluation Program (NTPEP) 3-Year Retroreflective Sheeting Test Deck.

Retroreflective Sheeting Type IX	
Manufacturer/Supplier	Product Brand Name
ORAFOL Americas, Inc. 120 Darling Drive Avon, CT 06001	7900-010 – White 7900-020 – Yellow 7900-050 – Blue 7900-060 – Green 7900-029 – Fluorescent Yellow-Green 7900-037 – Fluorescent Yellow 5930-038 – Fluorescent Orange

## **Qualified Product Lists – Continued**

### **Retroreflective Sheeting:**

#### **Sign and Delineator Sheeting – Continued**

**SPECIFICATION:** 1) Standard Specification M.18.09  
2) Material Certificate submission conforming to Standard Specification 1.06.07.

**PREAPPROVAL CRITERIA:** 1) Conformance to ASTM D4956  
2) Participation in the National Transportation Product Evaluation Program (NTPEP) 3-Year Retroreflective Sheeting Test Deck.

Retroreflective Sheeting Type XI	
Manufacturer/Supplier	Product Brand Name
3M Company Transportation Safety Division 3M Center, Building 235-03W-052 St. Paul, MN 55144	4090 – White 4091 – Yellow 4092 – Red 4095 – Blue 4097 – Green 4099 – Brown 4081 – Fluorescent Yellow 4083 – Fluorescent Yellow-Green
Avery Dennison Corp. 7542 N. Natchez Avenue Niles, Illinois, 60714	T-11501 – Yellow T-11509 – Brown T-11511 – Fluorescent Yellow

## **Qualified Product Lists – Continued**

### **Spray-Applied Membrane Waterproofing System:**

**SPECIFICATION:** Item No. 0707009A – Membrane Waterproofing (Cold Liquid Elastomeric)

#### **PRE-APPROVAL CRITERIA:**

**A) Material requirements:**

1. Primer: The primer shall be a 100% reactive, acrylic based, two component, spray applied resin capable of full cure in 40 minutes at 68°F (20°C).
2. Membrane: The membrane shall be 100% solvent free reactive, acrylic based, two component, spray applied material.
3. Aggregate: The aggregate shall be a nonfriable, durable #8 aggregate stone.

**B) Test Requirements:**

The membrane, when tested as an 80 mil layer alone or as an 80mil layer plus 40mil topping with aggregate system, shall meet or exceed the following performance requirements:

Water Vapor Transmission	ASTM E96	0.3 Perms or less
Adhesion (Concrete)	ASTM D4541	150 psi (1.0 MPa) or failure in concrete.
Adhesion (Steel)	ASTM D4541	300 psi (2.1 MPa)
Minimum Tensile Strength	ASTM D638, Method A, Die C	940 psi (6.4 MPa)
Minimum Elongation at Break	ASTM D638, Method A, Die C	80%
Crack Bridging (3.2mm) -15°F (-26°C)	ASTM 1305	Pass @ 10 cycles, 0.125 in.
Resistance to Heat Aging	ASTM C1522	Pass

#### **APPROVAL:**

Submitted products will be reviewed for approval pending results of a one-year long test trial.

#### **PROVISIONS FOR CONTINUANCE ON QPL:**

All testing shall have been performed no longer than 5 years prior to the product installation date. Testing showing conformance with the above noted performance requirements shall be submitted to the Department who shall establish the “Date of Test Compliance”. Products with a “Date of Test Compliance” greater than 5 years prior to the product installation date shall not allowed to be used.

**Continued on Next Page:**



## **Qualified Product Lists – Continued**

### **Spray-Applied Membrane Waterproofing System - Continued:**

**SPECIFICATION:** Item No. 0707009A – Membrane Waterproofing (Cold Liquid Elastomeric)

**PRE-APPROVAL CRITERIA:** See previous page.

**APPROVAL:** See previous page.

**PROVISIONS FOR CONTINUANCE ON QPL:** See previous page.

<b>Manufacturer/Supplier</b>	<b>Product Brand Name</b>	<b>Date of Test Compliance</b>	<b>Expiration Date</b>
Bridge Preservation, LLC 87 Shawnee Avenue Kansas City, KS 66105 Telephone: 913-321-9006	Bridge Deck Membrane System	March 1, 2015	Feb. 29, 2020
Stirling Lloyd Products, Inc. 152 Rockwell Road, Building A Newington, CT 06111 Telephone: 860-666-5008	Eliminator	March 1, 2015	Feb. 29, 2020
PIM Corporation 201 Circle Drive North, Suite 105 Piscataway, NJ 08854 Telephone: 732-469-6224	PmB Blue Shield	November 29, 2017	November 28, 2022
Wasser Coatings Inc. 4118 B Place NW Suite B Auburn, WA 98001	Wasser Polyflex Bridge Deck System	November 7, 2018	November 7, 2023

## Qualified Product Lists – Continued

### Walls: Embankment Walls:

**SPECIFICATION:** ConnDOT Special Provision:

1. ITEM #0601445A - #0601449A (SITE NO. 1 thru 5)
2. ITEM #0601490A - #0601495A (SITE NO. 6 thru 11)

**PREAPPROVAL CRITERIA:** LRFD Bridge Design Specification

SUPPLIER/LOCATION	PRODUCT BRAND NAME
Keystone Retaining Wall Systems 4444 West 78 <sup>th</sup> Street Bloomington, MN 55435 Telephone: 952-897-1040 E-Mail: <a href="mailto:jfriederichs@keystonewalls.com">jfriederichs@keystonewalls.com</a> Website: <a href="http://www.keystonewalls.com">www.keystonewalls.com</a>	KeySystem I Retaining Wall
TENSAR Earth Technology, Inc. 227 Ritter Road Sewickley, PA 15143 Telephone: 412-749-9190	MESA Retaining Wall System
The Reinforced Earth Company 133 Park Street North Reading, MA 01864 Telephone: 978-664-2830 E-Mail: <a href="mailto:PAnderson@reinforcedearth.com">PAnderson@reinforcedearth.com</a> Website: <a href="http://www.reinforcedearth.com">www.reinforcedearth.com</a>	Pyramid Modular Blockwall
Connecticut Precast Corp. 555 Fan Hill Road Monroe, CT 06468 Telephone: 203-268-8688 Fax: 203-452-1007 Website: <a href="http://www.ctprecast.com">www.ctprecast.com</a>	Recon Retaining Wall
Redi-Rock Walls - CT Division 68A South Canal Street Plainville, CT 06062 Telephone: 860-793-6805	Redi-Rock Retaining Wall-Cobblestone Face Mold
VERSA-LOK of New England 5 Northern Boulevard, Unit 15 Amherst, NH 03031 Telephone: 603-883-3042 E-Mail: <a href="mailto:Sales@wallsthatwork.com">Sales@wallsthatwork.com</a> Website: <a href="http://www.versa-Lok.com">www.versa-Lok.com</a>	VERSA-LOK Retaining Wall

## **Qualified Product Lists – Continued**

### **Walls: Retaining Walls - Mechanically Stabilized Earth (MSE) Walls:**

**SPECIFICATION:** ConnDOT Special Provision: Item #'s 0601651A, 0601665A, 0601678A & 0601687A  
RETAINING WALL

**PREAPPROVAL CRITERIA:** LRFD Bridge Design Specification

<b>SUPPLIER/LOCATION</b>	<b>PRODUCT BRAND NAME</b>
Big R Bridge Corporate P.O. Box 1290 Greeley, CO 80632 Telephone: 207-232-3228	Vist-A-Wall Systems
TEG Engineering, LLC 1505 44th Street Wyoming, MI 49509	Tricon Retained Soil Wall System
The Reinforced Earth Company 133 Park Street North Reading, MA 01864 Telephone: 978-664-2830	Reinforced Earth Walls
The Reinforced Earth Company 1372 Oldbridge Road, Suite 101 Woodbridge, VA 22192 Telephone: 703-499-9818	Retained Earth
Inventure Civil LLC P.O. Box 1781 Wake Forest, NC 27588 Telephone: (919) 453-2011	SINE WALL

### **Walls: Retaining Walls - Prefabricated Modular Walls:**

**SPECIFICATION:** ConnDOT Special Provision: Item #'s 0601651A, 0601665A, 0601678A & 0601687A  
RETAINING WALL

**PREAPPROVAL CRITERIA:** LRFD Bridge Design Specification

<b>PRODUCT BRAND NAME</b>	<b>SUPPLIER/LOCATION</b>
Doublewal-Standard Module	Doublewal Corporation 7 West Main Street Plainville, CT 06062 Telephone: 860-793-0295
T-Wall Retaining Wall System	The Neel Company 8328-D Traford Lane Springfield, VA 22152 Telephone: 703-913-7858

## **Qualified Product Lists – Continued**

The categories listed below have products and or materials that have met the specific requirements of the Standard Specifications or project Special Provisions.

### **Antistripping Additives**

RESPONSIBLE UNIT: Division of Materials Testing

Technical Contact: Eliana V. Carlson, P.E.  
Telephone: 860-258-0325

Administrative Contact: James P. Connery, P.E.

Acceptance Criteria: Special Provision.

### **Asphalt Plug Expansion Joints – Movement Capacity 1½” or less**

RESPONSIBLE UNIT: Bridge Consultant Design

Technical Contact: Timothy D. Fields, P.E.  
Telephone: 860-594-3217

Administrative Contact: Theodore H. Nezames, P.E.

Acceptance Criteria: 1) Special Provision.  
2) Prequalification Procedure.

### **Bearings – Pot, Spherical or Disc**

RESPONSIBLE UNIT: Bridge Consultant Design

Technical Contact: Timothy D. Fields, P.E.  
Telephone: 860-594-3217

Administrative Contact: Theodore H. Nezames, P.E.

Acceptance Criteria: Recurring Special Provision.

### **Channelizing Devices – Traffic Cones and Drums Type 1 (purchased after 10/1/98)**

RESPONSIBLE UNIT: Division of Traffic Engineering

Technical Contact: Mark F. Makuch P.E.  
Telephone: 860-594-2788

Administrative Contact: Mark F. Carlino, P.E.

Acceptance Criteria: 1) Catalog cut check for compliance with state specifications.  
2) Manufacturer’s self-certifying letter, stating NCHRP 350 testing requirements.

## **Qualified Product References (With Acceptance Criteria)**

### **Coating Systems for New Steel**

RESPONSIBLE UNIT: Division of Materials Testing

Technical Contact: Jonathan T. Boardman  
Telephone: 860-258-0327

Administrative Contact: James P. Connery, P.E.

Acceptance Criteria: Prequalification Procedure NEPCOAT.

### **Elastomeric Concrete Expansion Joint Systems**

RESPONSIBLE UNIT: Bridge Consultant Design

Technical Contact: Timothy D. Fields, P.E.  
Telephone: 860-594-3217

Administrative Contact: Theodore H. Nezames, P.E.

Acceptance Criteria: 1) Special Provision.  
2) Prequalification Procedure.

### **Epoxy Injection Crack Repair**

RESPONSIBLE UNIT: Division of Materials Testing

Technical Contact: John R. Giannini  
Telephone: 860-258-0324

Administrative Contact: James P. Connery, P.E.

Acceptance Criteria: Special Provision; Prequalification Procedure.

### **Fast Setting High Strength Header Materials**

RESPONSIBLE UNIT: Bridge Consultant Design

Technical Contact: Timothy D. Fields, P.E.  
Telephone: 860-594-3217

Administrative Contact: Theodore H. Nezames, P.E.

Acceptance Criteria: 1) Special Provision.  
2) Prequalification Procedure.

## **Qualified Product References (With Acceptance Criteria)**

### **Field Coatings for Blast Cleaned Steel**

RESPONSIBLE UNIT: Division of Materials Testing

Technical Contact: Jonathan T. Boardman  
Telephone: 860-258-0327

Administrative Contact: James P. Connery P.E.

Acceptance Criteria: Prequalification Procedure NEPCOAT.

### **Field Touch-Up Paint**

RESPONSIBLE UNIT: Division of Bridge Design

Technical Contact: Timothy D. Fields, P.E.  
Telephone: 860-594-3217

Administrative Contact: Theodore H. Nezames, P.E.

Acceptance Criteria: 1) Special Provision.  
2) Prequalification Procedure.

### **Grouts – Non-Shrink Cementitious**

RESPONSIBLE UNIT: Division of Materials Testing

Technical Contact: John R. Giannini  
Telephone: 860-258-0324

Administrative Contact: James P. Connery, P.E.

Acceptance Criteria: Standard Specification, M.03.05.

### **High Strength Patch Materials for Concrete Bridge Decks**

RESPONSIBLE UNIT: Bridge Consultant Design

Technical Contact: Timothy D. Fields, P.E.  
Telephone: 860-594-3217

Administrative Contact: Theodore H. Nezames, P.E.

Acceptance Criteria: 1) Special Provision.  
2) Prequalification Procedure.

## **Qualified Product References (With Acceptance Criteria)**

### **Offset Blocks for W-beam Guide Rail – Plastic**

RESPONSIBLE UNIT: Division of Design Services

Technical Contact: David J. Kilpatrick  
Telephone: 860-594-3288

Administrative Contact: Leo L. Fontaine, P.E.

Acceptance Criteria: 1) Special Provision.  
2) Prequalification.

### **Pavement Joint and Crack Sealants**

RESPONSIBLE UNIT: Division of Materials Testing

Technical Contact: John R. Giannini  
Telephone: 860-258-0324

Administrative Contact: James P. Connery, P.E.

Acceptance Criteria: Standard Specification, M.04.01.

### **Pile Point Reinforcement – Prefabricated**

RESPONSIBLE UNIT: Division of Materials Testing

Technical Contact: Jonathan T. Boardman  
Telephone: 860-258-0327

Administrative Contact: James P. Connery, P.E.

Acceptance Criteria: ASTM A27.

### **Pile Splicers – Prefabricated**

RESPONSIBLE UNIT: Division of Materials Testing

Technical Contact: Jonathan T. Boardman  
Telephone: 860-258-0327

Administrative Contact: James P. Connery, P.E.

Acceptance Criteria: ASTM A36.

## **Qualified Product References (With Acceptance Criteria)**

### **Polypropylene (5A) & Polyester Fibers (5B)**

RESPONSIBLE UNIT: Division of Materials Testing

Technical Contact: John R. Giannini  
Telephone: 860-258-0324

Administrative Contact: James P. Connery, P.E.

Acceptance Criteria: Standard Specification or Special Provision, M.04.02.

### **Portland Cement Concrete**

**Air-Entraining Admixtures**

**High Range Water-Reducing Admixtures**

**Portland Cement**

**Retarders**

**Water-Reducing Admixtures**

RESPONSIBLE UNIT: Division of Materials Testing

Technical Contact: John R Giannini  
Telephone: 860-258-0324

Administrative Contact: James P. Connery, P.E.

Acceptance Criteria: Standard Specification, M.03.01-3.

### **Prefabricated Expansion Joints – Movement Capacity Over 4”**

RESPONSIBLE UNIT: Bridge Consultant Design

Technical Contact: Timothy D. Fields, P.E.  
Telephone: 860-594-3217

Administrative Contact: Theodore H. Nezames, P.E.

Acceptance Criteria: 1) Special Provision.  
2) Prequalification Procedure.



## **Qualified Product References (With Acceptance Criteria)**

### **Prefabricated Geocomposite Drain**

RESPONSIBLE UNIT: Soils and Foundations Section

Technical Contact: Leo L. Fontaine, P.E.  
Telephone: 860-594-3180

Administrative Contact: Timothy M. Wilson, P.E.

Acceptance Criteria: 1) Special Provision.  
2) Prequalification Procedure.

### **Rebar Connectors**

RESPONSIBLE UNIT: Division of Materials Testing

Technical Contact: John R. Giannini  
Telephone: 860-258-0324

Administrative Contact: James P. Connery, P.E.

Acceptance Criteria: AASHTO 8.32.2.3.

### **Release Agents**

RESPONSIBLE UNIT: Division of Materials Testing

Technical Contact: Eliana V. Carlson, P.E.  
Telephone: 860-258-0325

Administrative Contact: James P. Connery, P.E.

Acceptance Criteria: Standard Specification or Special Provision, 4.06.03-3

### **Rebar Zinc Rich Coatings – Rehabilitation**

RESPONSIBLE UNIT: Division of Bridge Design

Technical Contact: Timothy D. Fields, P.E.  
Telephone: 860-594-3217

Administrative Contact: Theodore H. Nezames, P.E.

Acceptance Criteria: Special Provision.

## **Qualified Product References (With Acceptance Criteria)**

### **Shear Connectors – Welded Stud**

RESPONSIBLE UNIT: Division of Materials Testing

Technical Contact: Jonathan T. Boardman  
Telephone: 860-258-0327

Administrative Contact: James P. Connery, P.E.

Acceptance Criteria: Standard Specification, M.06.02-4; Prequalification AMS D1.5.

### **Silicone Expansion Joint System**

RESPONSIBLE UNIT: Bridge Consultant Design

Technical Contact: Timothy D. Fields, P.E.  
Telephone: 860-594-3217

Administrative Contact: Theodore H. Nezames, P.E.

Acceptance Criteria: Special Provision; Prequalification Procedure.

### **Stormwater Treatment (Oil/Grit Separators)**

RESPONSIBLE UNIT: Office of Environmental Compliance

Technical Contact: Kevin F. Carifa; Telephone: 860-594-2932

Administrative Contact: Kimberly C. Lesay,

Acceptance Criteria: 1) Special Provision.  
2) Prequalification Procedure.

### **Strip Seal Expansion Joint Systems (with Bridge Joint Extrusions)**

RESPONSIBLE UNIT: Bureau of Highway & Bridge Operations

Technical Contact: David Hiscox  
Telephone: 860-594-2626

Administrative Contact: **TBD**

Acceptance Criteria: Special Provision ITEM #0520034A.

## **Qualified Product References (With Acceptance Criteria)**

### **Variable Depth Patch**

RESPONSIBLE UNIT: Division of Bridge Design

Technical Contact: Timothy D. Fields, P.E.  
Telephone: 860-594-3217

Administrative Contact: Theodore H. Nezames, P.E.

Acceptance Criteria: 1) Special Provision.  
2) Prequalification Procedure.