

Transportation

Product Evaluation

Product ID: 8132-1-1 Initiation Date: September 5, 2002 Revision Date: November 17, 2010

RE: Review of Erosion Control Blankets and Mats - North American Green S75

PRODUCT

Erosion control blankets and mats - North American Green S75. This product is distributed by Nilex Inc.

VENDOR CLAIMS AND INFORMATION

CLAIMS:

The erosion control blankets and mats are used to prevent erosion of soil on side slopes, channels and ditches.

DESCRIPTION:

The erosion control blankets and mats shall be machine-produced mat of 100% agricultural straw with a functional longevity of approximately 12 months. The blanket shall be consistent thickness with the straw evenly distributed over the entire area of the mat. The blanket shall be covered on the top side with a lightweight photo-degradable polypropylene netting having an approximately 1.27 x 1.27 cm mesh and be sewn together on 3.81 cm centres (50 stitches/roll width) with degradable thread. The blanket shall be manufactured with a colored line or thread stitched along both outer edges (5 to 12.5 cm) to ensure proper material overlapping.

POTENTIAL USAGE:

The blankets or mats may replace heavy armour such as rock riprap.

STANDARDS:

North American Green has slope and channel design data and physical specifications for the S75.

ASTM D5199/ECTC Thickness

ECTC Guidelines Resiliency, Swell, Light penetration, Smolder resistance

ASTM D5261 Mass per unit area

ASTM D1117/ECTC Water absorption

ASTM D1388/ECTC Stiffness/Flexibility

ASTM D5035 Tensile strength, Elongation

ALBERTA TRANSPORTATION COMMENTS

EXPERIENCE:

Alberta Transportation has tried a large variety of erosion control mats in the past and might have some experience with this product but there is no documentation of its actual use and performance.

APPLICATION STANDARDS:

Alberta Transportation has a performance specification for this product.

RECOMMENDATIONS:

North American Green S75 for erosion control be listed as a Proven Product under Alberta Transportation Product List, Erosion Control Systems, Rolled Erosion Control Blanket - Proprietary, based on the information provided.

TRIAL PROJECTS

Tower Road, Pincher Creek

Fred Cheng

New Product Evaluation Standing Committee - Terry Willis CC