

**SECTION 02850****SOIL STABILIZATION MATTING****02850.01 GENERAL****A. Description**

Soil stabilization matting shall include, but not necessarily be limited to, furnishing and placing jute or excelsior matting over seeded areas, securing with wire staples, and the installation of fiberglass erosion stops on seeded areas in accordance with the Contract Documents.

**B. Related Work Included Elsewhere**

Turf establishment; Section 02820.

**C. Quality Assurance**

The Engineer will inspect all materials prior to and/or after installation to ensure compliance with the Contract Documents.

**D. Submittals**

None.

**02850.02 MATERIALS****A. Materials Furnished by the County**

The County will not furnish any materials for soil stabilization matting or erosion stops.

**B. Contractor's Options**

Not applicable.

**C. Detailed Material Requirements**

1. Jute matting shall be as specified in Section 02840.02.
2. Excelsior Matting
  - a. Excelsior matting shall be machine produced from wood that has been properly cured to achieve adequately curled and barbed fibers. A maximum of 20% of the fibers may be less than 6 inches in length.
  - b. The excelsior matting shall have a uniform thickness and distribution of fibers throughout. The top and bottom of the excelsior matting shall be

covered with a biodegradable extruded plastic netting having a mesh opening 1 inch x 2 inches. The average break strength of any two strands running lengthwise shall be 5 pounds minimum. The net shall be entwined with the excelsior to aid handling and provide sufficient reinforcement against damage during handling and placement.

- c. The excelsior matting shall be smolder resistant. A chemical treatment may be applied to the matting to make it smolder resistant. The chemical treatment, if used, shall be nonleaching, nontoxic to vegetation and germination of seed, and noninjurious to human skin. Rolls of the excelsior matting shall meet the following requirements: width -  $48 \pm 1$  inch; weight - 0.60 pounds per square yard minimum at 0% moisture; nominal roll length - 180 feet.
3. Fiberglass erosion stop shall be as specified in Section 02830.02.
  4. Staples shall be as specified in Section 02860.02.
  5. T-pin staples shall be as specified in Section 02860.02.
  6. Materials required for seeding shall meet the requirements of Section 02820.02, except mulch binder will not be required.

### 02850.03 EXECUTION

#### A. General

When topsoil is specified for areas where matting is being placed, topsoil placement shall be completed before the soil stabilization matting operations are started.

#### B. Seeding

Seeding shall be performed in accordance with the provisions of Section 02820.03, except that fall season installation of soil stabilization matting shall end on September 30, and the rolling operation shall be omitted. The seed mixture shall be the same as in the areas immediately adjacent to the area where matting is to be placed.

#### C. Placing and Securing

The matting shall be placed within 48 hours after seeding operations have been completed in the work areas. Matting shall be rolled on in direction of the flow of water. Where more than one width of matting is required, the strips shall overlap at least 4 inches. Ends shall overlap at least 6 inches. The upgrade end of each strip of matting shall be turned down and buried to a depth of not less than 6 inches with the soil firmly tamped against it. Overlapping shall be done with the upgrade section on top. The Engineer may require any other edge exposed to more than normal flow of water be buried in a similar manner. Edges of matting must be similarly

buried around the edges of catch basins and other structures. Disturbed areas shall be fertilized and reseeded with the specified seed mixture for the area.

Matting shall be laid smoothly upon the seeded surface, and stretching shall be avoided. Matting shall be securely fastened with staples driven vertically into the soil, flush with the surface. Matting shall be in firm contact with the soil in its entirety. Staples shall be placed 2 feet apart along the edges and center of the matting. On all overlapping edges, staples shall be placed 18 inches apart. At all ends of the matting, staples shall be placed 6 inches apart.

If any staples become loosened or raised, or any matting becomes loose, torn or undermined, satisfactory repairs shall be made immediately without additional compensation. If seed is washed out before germination, the area shall be fertilized and reseeded without removal of the matting, and without additional compensation.

**D. Fiberglass Erosion Stop**

Construction requirements for fiberglass erosion stop shall be in accordance with the Standard Details. Specified fiberglass erosion stops shall be installed in drainage channels under soil stabilization matting as follows:

1. Approximately 1 yard down flow from the discharge of a feeder channel;
2. The minimum-maximum spacing between erosion stops shall be 20 and 50 feet, respectively.

**E. Contractor's Responsibility**

Immediately before final acceptance of the Project, it shall be the responsibility of the Contractor to remove all heaved staples, which have been in place a minimum of 6 months, from areas to be mowed, or as directed by the Engineer.

**02850.04 METHOD OF MEASUREMENT**

**A. Soil Stabilization Matting**

Measurement for soil stabilization matting will be made of the surface area of soil stabilization matting measured in place and acceptably installed. Areas of overlap will be measured only once.

**B. Fiberglass Erosion Stop**

Measurement for fiberglass erosion stop will be made in accordance with Section 02830.04.

**02850.05 BASIS OF PAYMENT**

**A. Soil Stabilization Matting**

Payment for soil stabilization matting will be made per square yard. The price bid shall include all labor, tools, equipment, and materials necessary to satisfactorily complete the work in accordance with the Contract Documents and accepted by the Engineer.

**B. Fiberglass Erosion Stop**

Payment for fiberglass erosion stop will be made in accordance with Section 02830.05.

NOTE: Where required, Placing Salvaged Topsoil and Furnished Topsoil are not to be included in the price for Soil Stabilization Matting or Fiber Glass Erosion Stop but will be paid for as specified in Section 02812.05 and Section 02813.05, respectively.