

**Item No. 636S**  
**Perimeter Swale**

**636S.1 Description**

This item shall govern construction of a temporary excavated drainageway located along the perimeter of the site or disturbed area. The purpose of a perimeter swale is to prevent offsite runoff from entering the disturbed area and to prevent sediment-laden runoff from leaving the construction site or disturbed area. This item shall also include removal of the "Perimeter Swale" and re-vegetation of the area.

This specification is applicable for projects or work involving either inch-pound or SI units. Within the text, the inch-pound units are given preference followed by SI units shown within parentheses.

**636S.2 Submittals**

The submittal requirements for this specification item shall include:

- A. Coarse Aggregate, Grade 1 shall include source, gradation and characteristics of the proposed aggregate [Section 403S.2 (3) of Standard Specification Item 403S].
- B. The Dry Riprap submittal shall include:
  - 1. Type, size and source of rock,
  - 2. Filter fabric, and
  - 3. Construction details.
- C. The seeding submittal shall include:
  - 1. Identification of the type, source, mixture, pure live seed (PLS) and rate of application of the seeding.
  - 2. Type of mulch.
  - 3. Type of tacking agent.
  - 4. Type and rate of application of fertilizer.

**636S.3 Materials**

A. Stabilization

Stabilization shall conform to Coarse Aggregate, Grade 1, under Standard Specification Item No. 403S, "Concrete for Structures". Riprap for vehicle crossings shall conform to the requirements for Dry Riprap (Section 591S.5) of Standard Specification Item No. 591S, "Riprap for Slope Protection".

B. Seeding

Seeding shall conform to Item No. 604S, "Seeding for Erosion Control".

**636S.4 Construction Methods**

All trees, brush, stumps, obstructions and other objectionable material shall be removed and disposed of so as not to interfere with the proper functioning of the swale.

The swale shall be excavated or shaped to lines, grades and cross sections indicated on the Drawings and Standard Detail 636S-1, "Perimeter Swale" and shall be free of bank projections or other irregularities, which will impede normal flow.

All earth, that is removed and not needed in construction, shall be disposed of at an approved spoils site so that it will not interfere with the functioning of the swale.

Stabilization shall conform to Coarse Aggregates, Grade 1, (Standard Specification Item No. 403S, "Concrete for Structures") in a layer at least 3 inches (75 mm) in thickness and embedded into the soil. The lining shall extend across the bottom and up both sides of the channel to a height of at least 8 inches (200 mm) vertically above the bottom.

At all points where several vehicle crossings will be made per day, the swale shall be stabilized in accordance with Standard Specification Item No. 591S, "Dry Riprap", except the stone lining shall be at least 6 inches (150 mm) in thickness for the full width of the traffic crossing roadway.

The structure shall be inspected monthly and after each rainfall. Repairs shall be made by the Contractor, as needed, throughout the duration of the contract or until the Engineer or designated representative provides written permission to remove the structure.

**636S.5 Measurement**

Acceptable work performed as prescribed in this item shall be measured by the lineal foot (lineal meter: 1 lineal meter equals 3.281 lineal feet) along the 4-foot (1.2 meter) minimum bottom width.

**636S.6 Payment**

Work performed and material furnished for this item will be paid for at the unit bid price per lineal foot. The Unit Bid Price shall include full compensation for: (a) furnishing, hauling and placing all materials including all labor, tools, equipment and the incidentals needed to complete the work, (b) maintaining the dike, (c) removing any silt accumulations; (d) removing, re-grading and disposing of all materials when the dike is no longer required and (e) re-vegetating the area upon removal of the dike.

Payment will be made under:

<b>Pay Item No. 636S:</b>	Perimeter Swale -	Per Lineal Foot.
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**End**

<b><i>SPECIFIC</i> CROSS REFERENCE MATERIALS</b>
Specification 636S, "Perimeter Swale"

City of Austin Standard Details

<u>Designation</u>	<u>Description</u>
Number 636S-1	Perimeter Swale

City of Austin Standard Specifications

<u>Designation</u>	<u>Description</u>
Item No. 403S	Concrete for Structures
Item No. 591S,	Riprap for Slope Protection
Item No. 604S	Seeding for Erosion Control

<b><i>RELATED</i> CROSS REFERENCE MATERIALS</b>
Specification 636S, "Perimeter Swale"

City of Austin Standard Specifications

<u>Designation</u>	<u>Description</u>
Item No. 101S	Preparing Right of Way
Item No. 102S	Clearing and Grubbing
Item No. 111S	Excavation
Item No. 120S	Channel Excavation
Item No. 401	Structural Excavation and Backfill
Item No. 602S	Sodding for Erosion Control
Item No. 605S	Soil Retention Blanket
Item No. 606S	Fertilizer
Item No. 608S	Planting
Item No. 610S	Preservation of Trees and Other Vegetation
Item No. 620S	Filter Fabric
Item No. 621S	Diversion
Item No. 627S	Grass-Lined Swale and Grass-Lined Swale With Stone Center
Item No. 631S	Interceptor Swale

Texas Department of Transportation: Standard Specifications for Construction and Maintenance of Highways, Streets, and Bridges

<u>Designation</u>	<u>Description</u>
Item No. 100	Preparing Right of Way
Item No. 110	Excavation
Item No. 132	Embankment
Item No. 158	Specialized Excavation Work
Item No. 166	Fertilizer
Item No. 168	Vegetative Watering
Item No. 169	Soil Retention Blanket
Item No. 204	Sprinkling