

ITEM 696

LOW PROFILE CONCRETE BARRIER

696.1 Description. This Item shall govern for furnishing and installing precast Low Profile Concrete Barrier (LPCB) at the locations shown on the plans, for moving the precast barrier from one location and placing the barrier in a new location and removing upon completion of work.

696.2 Materials. All materials shall conform to the pertinent requirements of the following Items:

- Item 421 "Structural Concrete"
- Item 440 "Reinforcing Steel"
- Item 442 "Metals for Structures"
- Item 526 "Membrane Curing"

A hardware assembly is defined as being sufficient hardware for one complete connection between two traffic-barrier sections, including all required bolts, nuts, washers, structural-steel shapes and/or dowels.

LPCB Type (1) and (2) shall be designed and fabricated in compliance with the standard detail drawings of the Texas Department of Transportation (TxDOT) "Low Profile Concrete Barrier".

When the Contractor elects to furnish LPCB that has been constructed prior to this contract, he shall submit written certification that the barrier sections substantially conform to the requirements herein specified.

When the Contractor cannot verify that the barrier sections were constructed in compliance with the requirements herein specified, the Engineer may accept the barrier for use as a temporary barrier only, if:

- a. the barrier sections substantially meet typical cross-sectional dimension requirements shown on the TxDOT standard drawings of LPCB type (1) & (2).
- b. the barrier sections are acceptable to the Engineer in regard to there being no evidence of structural damage such as major spalling or cracking; and
- c. the general condition of both the barrier sections and their connectors is acceptable to the Engineer.

In the event that previously constructed barrier has steel channel connectors for which the top flange protrudes outside the projected concrete surface of the barrier, the Contractor shall bevel each end of the top flange on a 30 degree bevel, with the 30 degrees being measured from the web.

- 696.3 Installation. It shall be the Contractor's responsibility to furnish low profile concrete barrier including end treatment and hardware assembly for use on the project. Barriers shall be installed in accordance with the requirements of the "Texas Manual on Uniform Traffic Control Devices", Item 671 "Traffic Control" and information herein. When barriers are no longer required on the project, they shall be removed. Upon removal of the LPCB at the completion of work, all LPCB, incidentals and hardware assemblies will remain the property of the Contractor.
- 696.4 Defects and Breakage of Barrier. Concrete traffic barrier damaged in the process of fabricating, curing, handling or placing shall be repaired or replaced as directed by the Engineer. All replacements and repairs shall be made at the Contractor's expense.
- 696.5 Damage and Loss of Hardware. Hardware damaged or lost in the process of handling, placing, removing or resetting shall be repaired or replaced as directed by the Engineer. All replacement and repairs shall be made at the Contractor's expense.
- 696.6 Measurement. This Item will be measured along the bottom face of the barrier by the linear foot, based on the nominal lengths of the barrier sections as shown on the plans.
- 696.7 Payment. The work performed and materials furnished in accordance with this Item and measured as provided under "Measurement" will be paid for at the unit price bid for the "Low Profile Concrete Traffic Barrier" including end treatment and hardware assembly and shall include all manipulations, labor, tools, equipment and incidentals necessary to complete the work; and described as follows:

Furnish and install low profile concrete barrier.  
Relocate low profile concrete barrier.  
Remove low profile concrete barrier.

There are line code(s), description(s), and unit(s) for this Item.

NOTE: This Item requires drawings (TxDOT standards) that are downloadable on TxDOT's website.

NOTE: This Item requires other Standard Specifications

Item 421 "Structural Concrete"  
Item 440 "Reinforcing Steel"  
Item 442 "Metals for Structures"  
Item 526 "Membrane Curing"  
Item 671 "Traffic Control"

END OF ITEM 696