816.01 Description. This work consists of furnishing and installing video detection equipment complete and ready for service.

816.02 Materials. The video detection system shall consist of power supply, hard-wired video cameras, all necessary video and power cabling with end connectors, mounting brackets, lightning protection as recommended by the manufacturer, video detection processors/extension modules capable of processing the number of camera and phase combination video sources shown on the project plans. Provide sufficient number of cameras to process vehicle presence, passage and system detection zones as shown on the project plans.

Furnish materials from the Department’s Qualified Products List (QPL) conforming to the following:

Video Detection System.................................................907

816.03 Documentation and Testing. All product documentation shall be written in the English language. Provide three bound copies and one PDF version of the user’s manual.

Perform functional tests and 10-day performance test according to 632.28.

816.04 Installation Requirements. Run coaxial cable serving the cameras unspliced between the camera and controller cabinet, with ten feet (3 m) of slack provided in the controller cabinet.

816.05 Training. Furnish two days of training in the operation, setup and maintenance of the video detection system installed as part of the Contract. Furnish all handouts, manuals and product information. For the training, use the same models of equipment furnished for the project. The maintaining agency shall furnish the facilities in which the training will take place. Furnish all media and test equipment needed to present the training.
Training instructor(s) shall be manufacturer-certified, experienced in the skill of training others and have conducted a minimum of three two day trainings on Video Detection Systems.

Coordinate video detection training with the Engineer a minimum of 30 days in advance of proposed date of training.

**816.06 Method of Measurement.** The Department will measure Video Detection System by the number of each intersection shown on the plans, in place, complete and ready for service and will include all materials, testing, labor and software.

The Department will measure Training on a lump sum basis, and will include providing the instruction materials, instructor travel expenses and test or media equipment for presenting the training material.

**816.07 Basis of Payment.** The Department will pay for accepted quantities at the contract prices as follows:

<table>
<thead>
<tr>
<th>Item</th>
<th>Unit</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>816</td>
<td>Each</td>
<td>Video Detection System</td>
</tr>
<tr>
<td>816</td>
<td>Lump</td>
<td>Training for Video Detection System</td>
</tr>
</tbody>
</table>