EROSION AND SEDIMENT CONTROL PLANS

Erosion and sediment control must be addressed on all Department projects involving clearing and grubbing, grading or excavation. Particular attention must be paid during the design and construction of all projects that involve site preparation in or near any surface waterbody or state regulated or federal-jurisdictional wetland.

An initial "erosion and sediment control plan" (E&S Plan) should be included in the contract documents and may consist of appropriate plan sheets, details, tables and specifications. The E&S Plan should address erosion and sediment control to the extent that it is reasonable and practicable to do so in design based on the design teams knowledge of the project site, the planned scope of work, and the assumed sequence of construction activities. The complexity of the E&S Plan and the types, locations and quantities of various erosion and sediment control practices will be dependent upon the scale and scope of the project and the natural and man-made resources requiring protection.

For example, the E&S Plan for a simple resurfacing project with some minor culvert repairs might consist of several erosion and sediment control details and reference to Section 209 of the Standard Specifications. However, a complex project involving a roadway widening and bridge replacement over a Class A stream might require numerous details, several or more tables, and a separate plan sheet showing the types and locations of the erosion and sediment control practices.

The initial E&S Plan developed by the design team is intended to supplement, not replace, Section 209 of the Standard Specifications. An appropriately developed and detailed plan will help the contractor understand the Department’s expectations as to what work is required under Section 209 and should assist the Engineer-In-Charge (EIC) in assuring that erosion and sediment control is adequately provided.

Consistent with Section 209, EIC’s will still need to obtain the contractor's schedule of operations and plans for temporary and permanent erosion and sediment control measures not otherwise addressed in the Department-developed E&S Plan. For example, the contractor would have to identify erosion and sediment control measures for staging areas, borrow areas and work operations that the designer could not have foreseen in design.

The contractor may seek to modify the Department's initial E&S Plan by submitting alternate erosion and sediment control plans and/or practices to the EIC for review and approval. The EIC should coordinate with the project designer and the regional environmental and landscape architecture staff regarding any substantive changes.

The E&S Control Plan developed by the design team should, as appropriate:

a) identify and show in the contract plans the location of sensitive on-site and adjacent off-site natural and man-made resources that could be affected by the
work, including but not limited to surface waterbodies, wetlands, special wildlife habitat areas, existing trees and other vegetation to remain, adjacent residential and commercial properties, and public recreation facilities.

b) describe the temporary and permanent structural and vegetative measures to be used for soil stabilization, runoff control and sediment control for each stage of the project from initial clearing and grubbing to project close-out;

c) identify on the plan sheet(s) and/or in appropriate tables the specific location(s), size(s) and length(s) of each required erosion and sediment control practice;

d) provide material, dimensional, and installation details for all erosion and sediment control practices and facilities, including the siting and sizing of temporary sediment basins;

e) identify temporary practices that will be converted to permanent facilities;

f) provide an implementation schedule for staging temporary erosion and sediment control practices, including the timing of initial placement and the duration that each practice should remain in place; and

g) provide a maintenance schedule to ensure continuous and effective operation of the erosion and sediment control practices.

Sound engineering and environmental judgement should be used to assure that only those sediment and erosion control practices that are necessary and effective are included in the contract documents. To that end, feedback is necessary and important between designers, Engineers-In-Charge, Regional Environmental Contacts and Regional Landscape Architects.