

Special Specification 3035

Raising Concrete Slabs with Cement Slurry Systems



1. DESCRIPTION

Raise concrete slabs at locations shown on the plans and as directed.

2. MATERIAL

Furnish Cement Slurry Mixture to be used for raising concrete slab composed of but not limited to cement, lime, fly ash, sand, ground clay.

3. EQUIPMENT

Provide machinery, tools, and equipment necessary for proper execution of the work. At a minimum, provide the following:

- 3.1. **Drill.** Use a drill capable of drilling holes of the required diameter and depth.
- 3.2. **Pump.** Furnish a pump unit with the appropriate attachments capable of injecting the Cement slurry under the concrete slab at the depths required in the plans.
- 3.3. **Level.** Provide control equipment to indicate when the final grade has been achieved and to monitor slab movement.

4. CONSTRUCTION

- 4.1. **Mix design.** Provide a mixture with a minimum compressive strength of 600 psi as measured by Tex-418-A, Compressive Strength of Cylindrical Concrete Specimens. Use materials in the mix design that meet Department Material Specifications from Department approved sources.
- 4.2. **Drilling.** Use drilling operations that do not damage the surrounding concrete. Drill injection holes with diameters less than or equal to 2 in. through the concrete as proposed or as directed.
- 4.3. **Injection.** Inject cement slurry directly under the slab. Do not extend the nozzle end below the bottom of the concrete. Take precautions to prevent the intrusion of injected material into any drainage facility and other structures. Remove any excessive material after the nozzle is removed from the hole. Seal the hole with an approved method and material.
- 4.4. **Grade Control.** Raise existing slabs to the closest point of the proposed profile elevations as shown in the plans. The Engineer may check the treated area to confirm that the pavement has been aligned properly to facilitate drainage.
- 4.5. **Acceptance Plan.** Attain the minimum compressive strength prior to opening to construction traffic unless otherwise directed.

5. MEASUREMENT

This Item will be measured by the cubic foot of Cement Slurry injected. Volume will be measured by calculating the average elevation difference between the existing and final slab grades by the area of the raised concrete slab.

6. 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 "Raising Concrete Slab." This price is full compensation for furnishing and injecting cement slurry material, concrete repairs, labor, materials, tools, and incidentals.