# 2H

# ROCK FILL

(Effective January 1, 2010; Revised April 1, 2014)

**Description**. This work shall consist of the furnishing and placement of rock fill where unstable and/or unsuitable materials have been removed below the plan bedding grade of proposed cast‑in‑place and/or precast concrete box culverts. This work shall be done as shown on the plans and as directed by the Engineer.

**Materials.** Materials shall meet the following requirements of the Standard Specifications:

Item Article/Section

1. Coarse Aggregate………………….1004
2. Rock fill……………………………...1005
3. Geotextile Fabric…………………… 1080.02

The gradation of rock fill shall be selected based on the following table:

|  |  |
| --- | --- |
| Total Rock Fill Layer  Thickness | Rock Fill Gradation |
| Less than  3 feet (0.9 meter) | CS 01 or CS 02 (Note 1) |
| 3 feet (0.9 meter)  or Greater | Primary Crusher Run  or Shot Rock (Note 2) |

Note 1. CS 01 and CS 02 shall be crushed stone, crushed slag, crushed gravel, or crushed concrete and shall consist of sound durable particles reasonably free of deleterious materials.

Note 2. Primary Crusher Run and Shot Rock shall not exceed 18 in.

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| --- | --- | --- | --- | --- | --- | --- |
|  | COARSE AGGREGATE SUBGRADE GRADATIONS | | | | | |
| Grad No. | Sieve Size and Percent Passing | | | | | |
| 8” | 6” | 4” | 2” | #4 |  |
| CS 01 | 100 | 97 ± 3 | 90 ± 10 | 45 ± 25 | 20 ± 20 |  |
| CS 02 |  | 100 | 80 ± 10 | 25 ± 15 |  |  |

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
|  | COARSE AGGREGATE SUBGRADE GRADATIONS | | | | | |
| Grad No. | Sieve Size and Percent Passing | | | | | |
| 200 mm | 150 mm | 100 mm | 50 mm | 4.75 mm |  |
| CS 01 | 100 | 97 ± 3 | 90 ± 10 | 45 ± 25 | 20 ± 20 |  |
| CS 02 |  | 100 | 80 ± 10 | 25 ± 15 |  |  |

If gradation CS 02 is used, geotextile fabric shall be used as a separation layer between the soil and the aggregate.

**Construction Requirements**. Rock fill shall be placed following the excavation of unstable and/or unsuitable material. The rock fill shall be seated to the satisfaction of the Engineer. The top surface of the rock fill shall consist of 3 in. of aggregate gradations CA 07 or CA 11.

Geotextile fabric, if required, shall be installed according to the applicable portions of Section 210 of the Standard Specifications.

**Method of Measurement**. Rock fill will be measured for payment in cubic yards.

Geotextile fabric used with gradation CS 01 will be measured for payment according to Article 210.05 of the Standard Specifications. Geotextile fabric used with gradation CS 02 will not be measured for payment.

**Basis of Payment**. Rock fill will be paid for at the contract unit price per cubic yard for ROCK FILL.

Geotextile fabric will be paid for according to Article 210.06 of the Standard Specifications.

Box culverts, removal and disposal of unstable and unsuitable materials, porous granular bedding material, and the excavation required for bedding will be paid for according to Section 540 of the Standard Specifications.