



**WEST ABUTMENT
BILL OF MATERIAL**

| Bar | Size | No. | Length | Shape |
|-------------------------------------|------|-----|--------|--------------|
| d(E) | #5 | 20 | 5'-6" | □ |
| p(E) | #7 | 16 | 49'-2" | □ |
| p1(E) | #5 | 8 | 37'-1" | □ |
| p2(E) | #5 | 4 | 26'-7" | □ |
| p3(E) | #5 | 8 | 47'-5" | □ |
| s(E) | #5 | 72 | 11'-8" | □ |
| s1(E) | #5 | 2 | 12'-0" | □ |
| s2(E) | #5 | 73 | 3'-8" | □ |
| s3(E) | #5 | 8 | 2'-11" | □ |
| s4(E) | #5 | 22 | 8'-6" | □ |
| u(E) | #6 | 8 | 10'-0" | □ |
| v1(E) | #5 | 156 | 5'-11" | □ |
| v2(E) | #5 | 20 | 9'-8" | □ |
| Porous Granular Embankment, Special | | | | Cu. Yd. 149 |
| Concrete Structures | | | | Cu. Yd. 37.4 |
| Reinforcement Bars, Epoxy Coated | | | | Pound 5,230 |
| Furnishing Steel Piles HP14x73 | | | | Foot 770 |
| Driving Piles | | | | Foot 770 |
| Test Pile Steel HP14x73 | | | | Each 1 |
| Concrete Encasement | | | | Cu. Yd. 13 |
| Pile Shoes | | | | Each 23 |

See Piles and Concrete Encasement sheet for details.
Reinforcement bar designated (E) shall be epoxy coated.
Bars indicated thus 20X3 -#5 etc. indicates 20 lines of bars with 3 lengths per line.
See sheet West abutment details for section B-B
Minimum bar lap lengths for #7 bars is 2'-9" and for #5 bars is 2'-2".