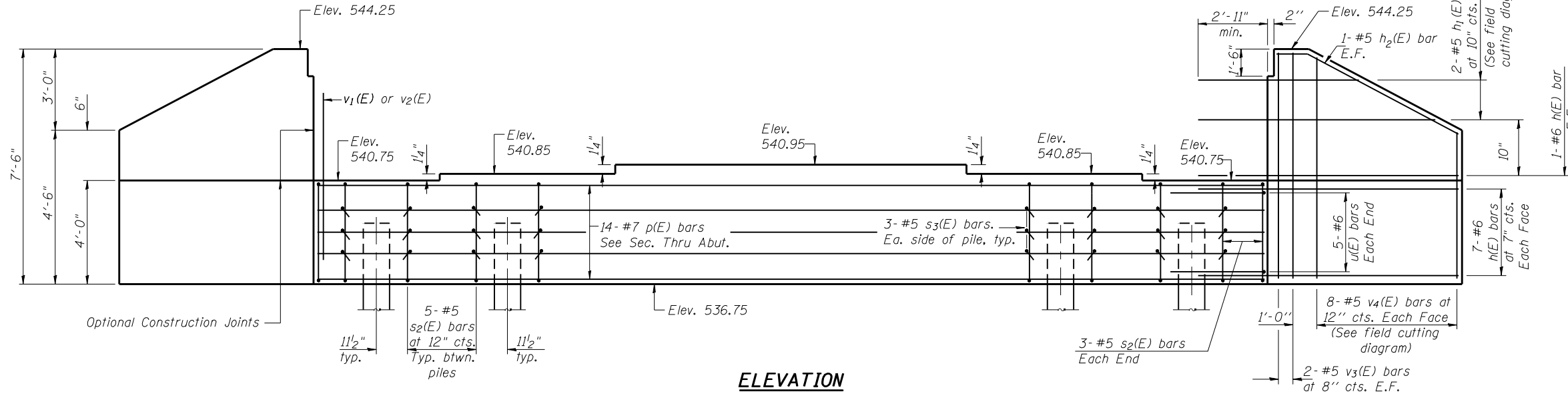
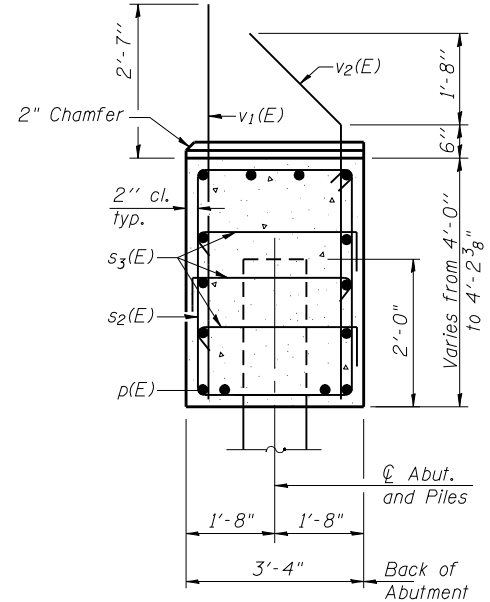


Notes:
Four steps monolithically with cap.



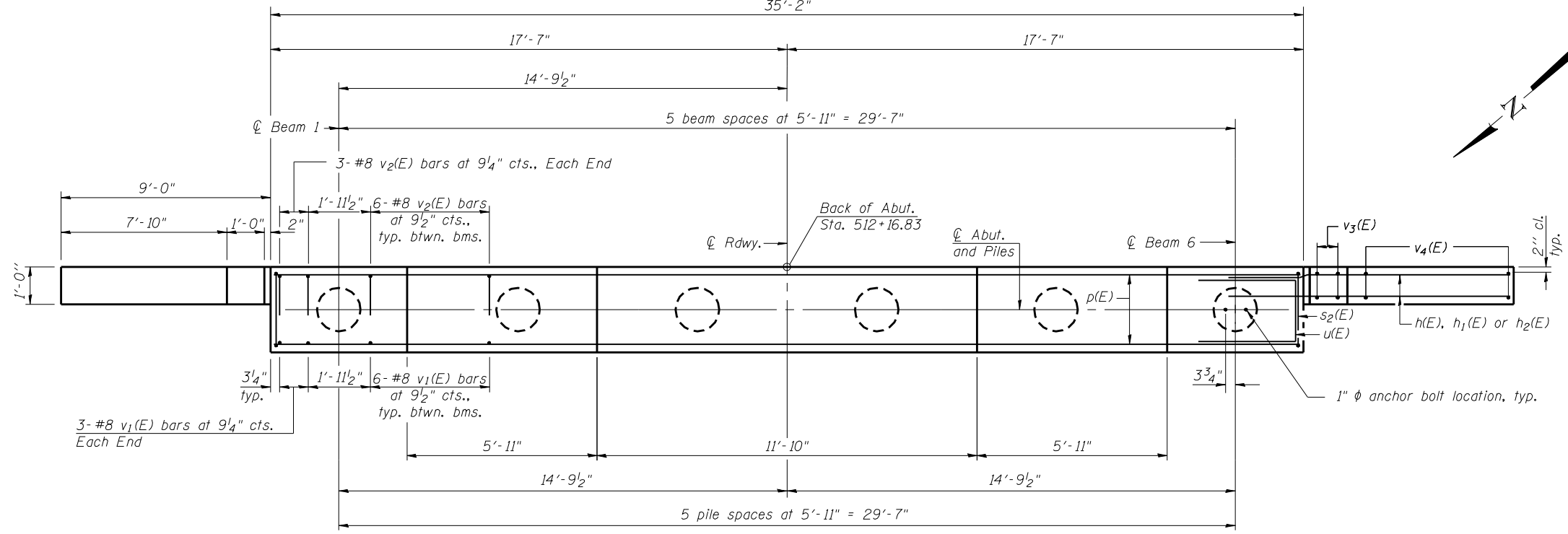
ELEVATION



SEC. THRU ABUT.

BILL OF MATERIAL

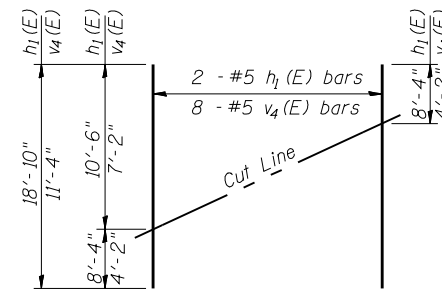
| Bar | No. | Size | Length | Shape |
|---|-----|---------|---------|-------|
| h(E) | 32 | #6 | 11'-11" | — |
| h ₁ (E) | 4 | #5 | 18'-10" | — |
| h ₂ (E) | 4 | #5 | 8'-10" | — |
| p(E) | 14 | #7 | 34'-10" | — |
| s ₂ (E) | 31 | #5 | 14'-3" | □ |
| s ₃ (E) | 36 | #5 | 4'-0" | ┌ |
| u(E) | 10 | #6 | 10'-6" | — |
| v ₁ (E) | 36 | #8 | 6'-5" | — |
| v ₂ (E) | 36 | #8 | 6'-8" | — |
| v ₃ (E) | 8 | #5 | 7'-2" | — |
| v ₄ (E) | 16 | #5 | 11'-4" | — |
| Structure Excavation | | Cu. Yd. | 92 | |
| Concrete Structures | | Cu. Yd. | 21.5 | |
| Reinforcement Bars, Epoxy Coated | | Pound | 3960 | |
| Furnishing Metal Shell Piles 14" x 0.250" | | Foot | 190 | |
| Driving Piles | | Foot | 190 | |
| Test Pile Metal Shells | | Each | 1 | |
| Pile Shoes | | Each | 6 | |



PLAN

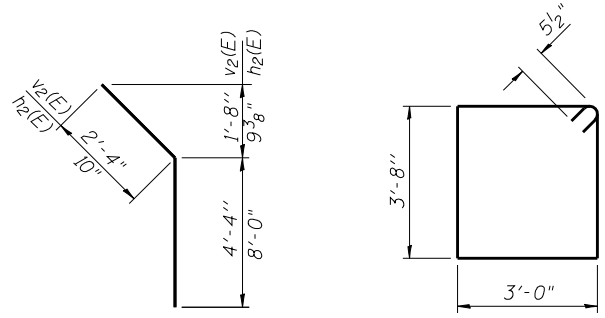
PILE DATA

Type: Metal Shell-14" x 0.250" with Pile Shoes
Nominal Required Bearing: 300 kip
Factored Resistance Available: 165 kip
Est. Length: 38 ft.
No. Production Piles: 5
No. Test Piles: 1

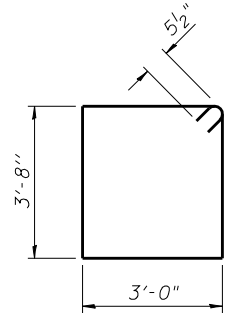


FIELD CUTTING DIAGRAM

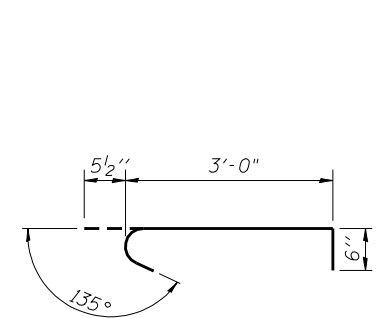
Order h₁(E) and v₄(E) full length. Cut as shown and use remainder of bars in opposite face.



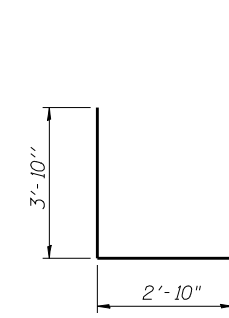
BAR v₂(E) & h₂(E)



BAR s₂(E)



BAR s₃(E)



BAR u(E)

For details of piles see sheet 19 of 23.

FILE NAME = 72882-015-abut.dgn
PROJECT NO. 07284-8

AI-2440-0

8-31-12

Combe-Bloxdorf P.C.
CIVIL ENGINEERS-
STRUCTURAL ENGINEERS-
LAND SURVEYORS
Design Firm License No. 184-002703

| | | |
|----------------------------|----------------|-----------|
| USER NAME = .MML. | DESIGNED - AMC | REVISED - |
| PLOT SCALE = 0.1667' / IN. | CHECKED - MCB | REVISED - |
| PLOT DATE = 10/23/2013 | DRAWN - MML | REVISED - |
| | CHECKED - MCB | REVISED - |

**STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION**

**EAST ABUTMENT
STRUCTURE NO. 054-0515**

SHEET NO. 16 OF 23 SHEETS

| | | | | |
|---------------------------|------------------------------|--------|--------------|-----------|
| F.A.P. RTE. | SECTION | COUNTY | TOTAL SHEETS | SHEET NO. |
| 717 | 1102B-1, 102CR, 102BR-2/RS-5 | LOGAN | 218 | 70 |
| CONTRACT NO. 72B82 | | | | |
| ILLINOIS FED. AID PROJECT | | | | |