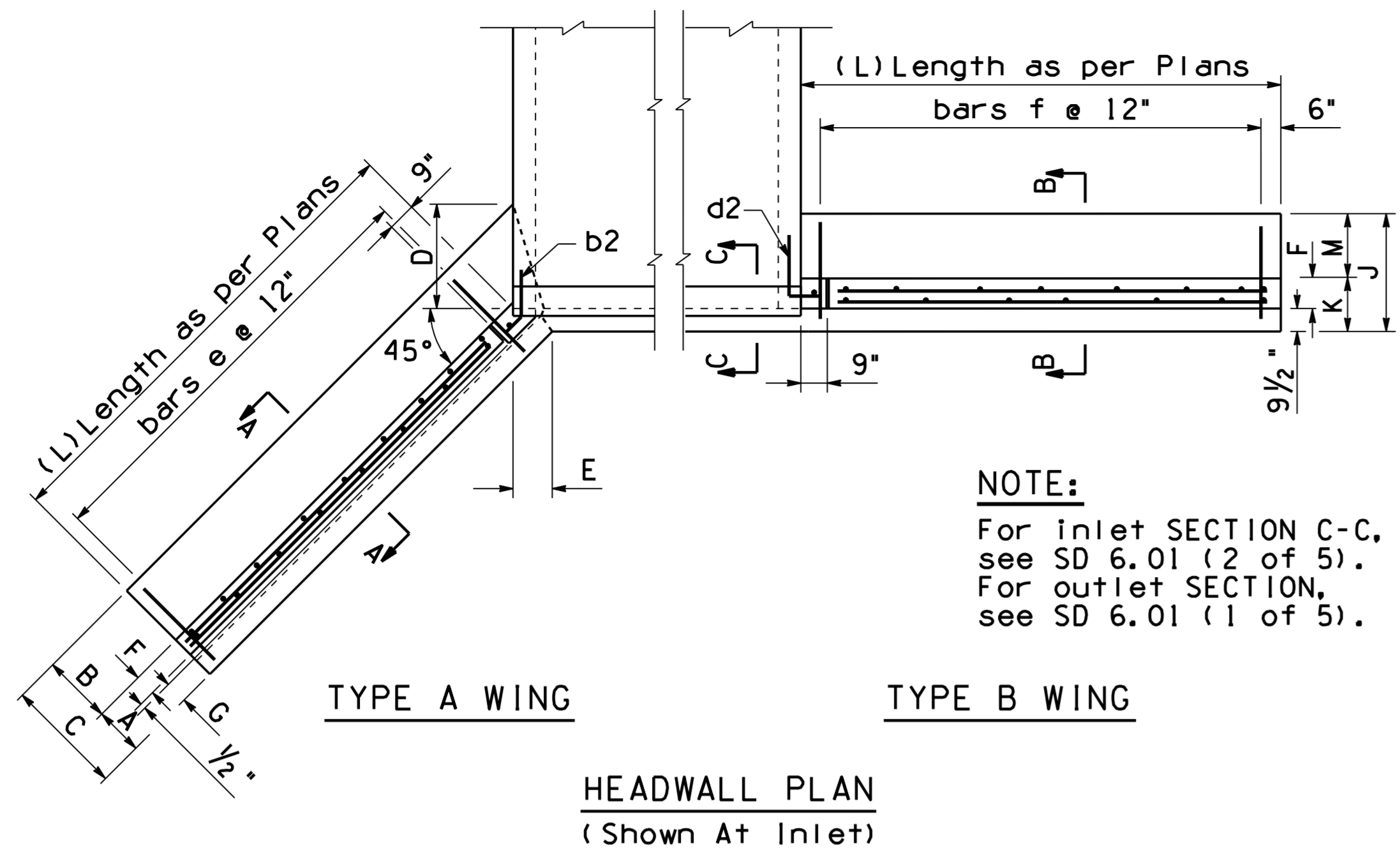


Note to Designer: The information presented in this Standard Detail has been prepared in accordance with recognized engineering principles and is for general use. It should not be used for specific application without competent professional examination and verification of its suitability and applicability by a licensed professional engineer. Contents within the inner border line shall not be altered.

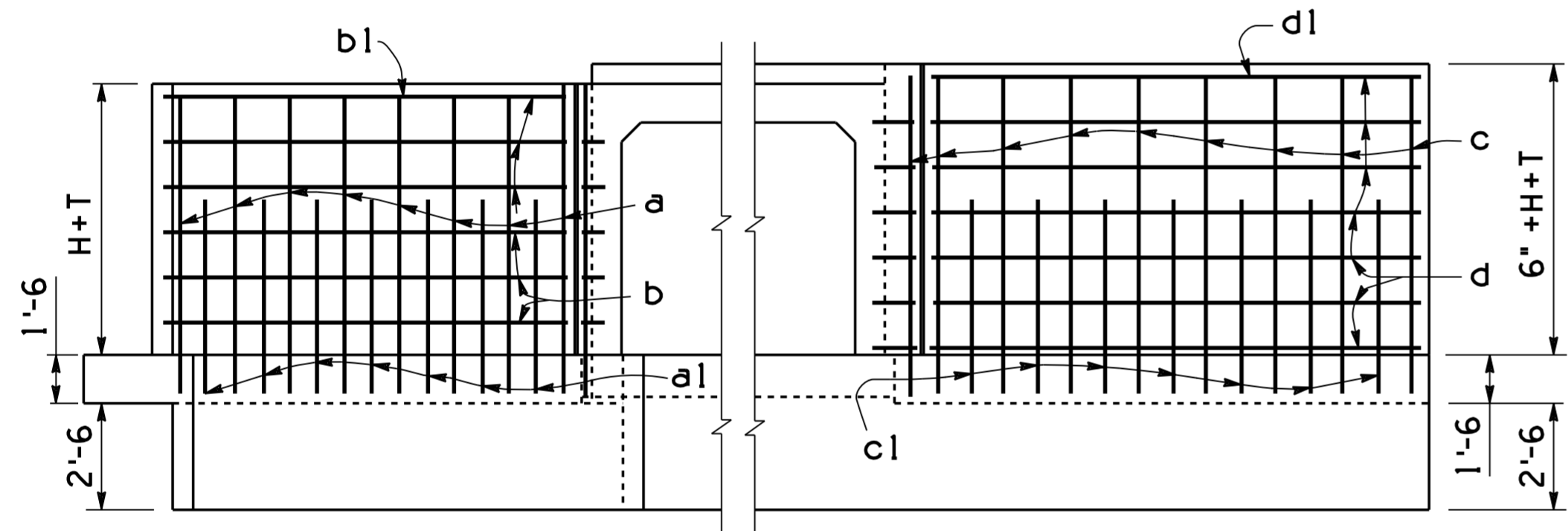
| NO. | DESCRIPTION OF REVISIONS | DATE | MADE BY | DATE |
|-----|--------------------------|------|---------|------|
| 1 | Original Issue | | SJH | 2-12 |
| 2 | | | | |
| 3 | | | | |
| 4 | | | | |



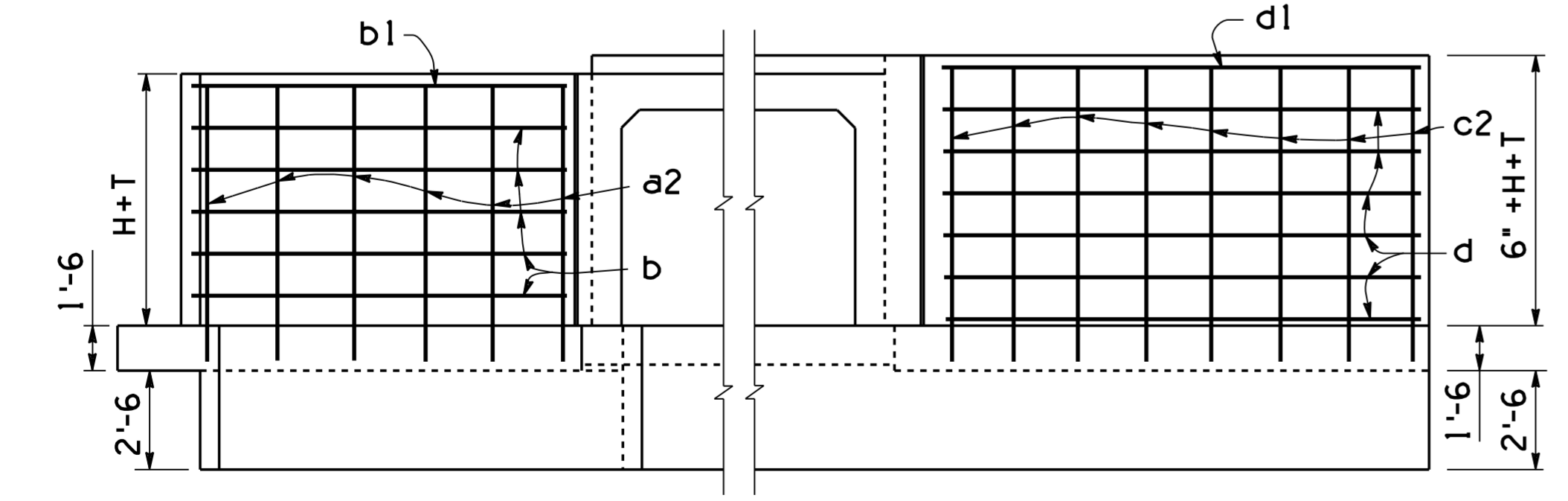
NOTE:
 For inlet SECTION C-C, see SD 6.01 (2 of 5).
 For outlet SECTION, see SD 6.01 (1 of 5).

| Height of Opening | A | B | C | D | E | F | G | J | K | M |
|-------------------|-------|-------|-------|-------|-----------|-----------|-------|-------|--------|-------|
| 8' | 1'-9" | 3'-9" | 5'-6" | 5'-4" | 1'-8 1/4" | 11 1/2" | 0'-9" | 5'-6" | 1'-9" | 3'-9" |
| 9' | 2'-0" | 4'-0" | 6'-0" | 5'-8" | 2'-1" | 11 1/2" | 1'-0" | 6'-0" | 1'-9" | 4'-3" |
| 10' | 2'-0" | 4'-6" | 6'-6" | 6'-4" | 2'-1" | 11 1/2" | 1'-0" | 6'-6" | 1'-9" | 4'-9" |
| 11' | 2'-4" | 4'-8" | 7'-0" | 6'-7" | 2'-6 3/4" | 1'-0 1/2" | 1'-3" | 7'-0" | 1'-10" | 5'-2" |
| 12' | 2'-6" | 4'-9" | 7'-3" | 6'-9" | 2'-9 3/4" | 1'-1 1/2" | 1'-4" | 8'-0" | 1'-11" | 6'-1" |

| Mark | Bend | 8' Height | | 9' Height | | 10' Height | | 11' Height | | 12' Height | | | | | | |
|-------------|------|-----------|------|-----------|------|------------|--------|------------|------|------------|------|----|--------|----|----|--------|
| | | No. | Size | No. | Size | No. | Size | No. | Size | No. | Size | | | | | |
| TYPE A WING | | | | | | | | | | | | | | | | |
| a | A | 20 | #7 | 11'-0" | 22 | #8 | 12'-3" | 24 | #6 | 13'-3" | 26 | #7 | 14'-3" | 28 | #7 | 15'-3" |
| al | A | | | | | | | 24 | #6 | 6'-6" | 26 | #7 | 6'-9" | 28 | #7 | 7'-0" |
| a2 | str. | 14 | #4 | 9'-9" | 14 | #4 | 11'-0" | 16 | #4 | 12'-0" | 18 | #4 | 13'-0" | 18 | #4 | 14'-0" |
| b | str. | 20 | #4 | 9'-0" | 24 | #4 | 10'-0" | 28 | #4 | 11'-0" | 28 | #4 | 12'-0" | 32 | #4 | 13'-0" |
| bl | str. | 4 | #6 | 9'-0" | 4 | #6 | 10'-0" | 4 | #6 | 11'-0" | 4 | #6 | 12'-0" | 4 | #6 | 13'-0" |
| b2 | B | 12 | #4 | 2'-3" | 14 | #4 | 2'-3" | 16 | #4 | 2'-3" | 16 | #4 | 2'-3" | 18 | #4 | 2'-3" |
| e | str. | 20 | #5 | 5'-0" | 22 | #6 | 5'-6" | 24 | #7 | 6'-0" | 26 | #7 | 6'-6" | 28 | #8 | 6'-9" |
| g | B | 4 | #4 | 12'-3" | 4 | #4 | 13'-9" | 4 | #4 | 14'-9" | 4 | #4 | 16'-0" | 4 | #4 | 17'-0" |
| m | str. | 10 | #4 | 9'-6" | 10 | #4 | 10'-6" | 10 | #4 | 11'-6" | 10 | #4 | 12'-6" | 10 | #4 | 13'-6" |
| TYPE B WING | | | | | | | | | | | | | | | | |
| c | A | 20 | #7 | 11'-6" | 22 | #8 | 12'-9" | 24 | #6 | 13'-9" | 26 | #7 | 14'-9" | 28 | #7 | 15'-9" |
| cl | A | | | | | | | 24 | #6 | 6'-6" | 26 | #7 | 6'-9" | 28 | #7 | 7'-0" |
| c2 | str. | 14 | #4 | 10'-3" | 14 | #4 | 11'-6" | 16 | #4 | 12'-6" | 18 | #4 | 13'-6" | 18 | #4 | 14'-6" |
| d | str. | 24 | #4 | 9'-0" | 28 | #4 | 10'-0" | 28 | #4 | 11'-0" | 32 | #4 | 12'-0" | 36 | #4 | 13'-0" |
| dl | str. | 4 | #6 | 9'-0" | 4 | #6 | 10'-0" | 4 | #6 | 11'-0" | 4 | #6 | 12'-0" | 4 | #6 | 13'-0" |
| d2 | D | 14 | #4 | 2'-3" | 16 | #4 | 2'-3" | 16 | #4 | 2'-3" | 18 | #4 | 2'-3" | 20 | #4 | 2'-3" |
| f | str. | 20 | #5 | 5'-0" | 22 | #6 | 5'-6" | 24 | #7 | 6'-0" | 26 | #7 | 6'-6" | 28 | #8 | 7'-6" |
| gl | str. | 4 | #4 | 11'-3" | 4 | #4 | 12'-3" | 4 | #4 | 13'-3" | 4 | #4 | 14'-3" | 4 | #4 | 15'-3" |
| n | str. | 10 | #4 | 9'-6" | 10 | #4 | 10'-6" | 10 | #4 | 11'-6" | 10 | #4 | 12'-6" | 10 | #4 | 13'-6" |

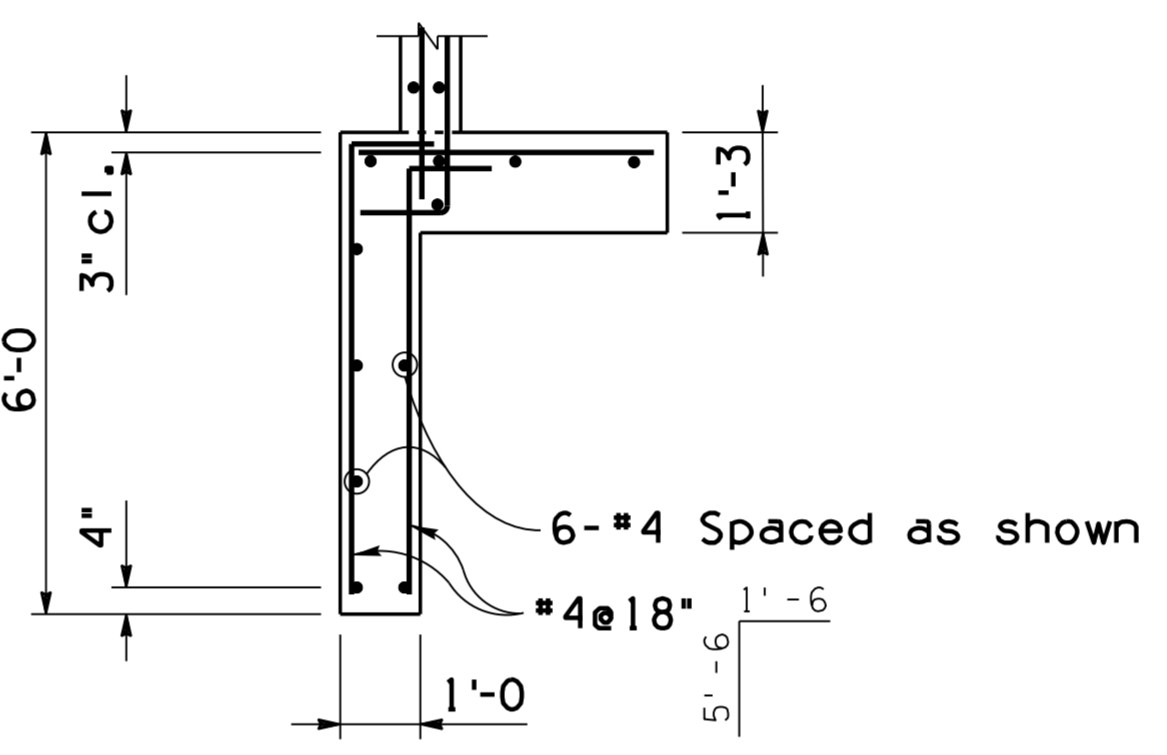


ELEVATION (Back Face Reinf.)
(Shown At Inlet)

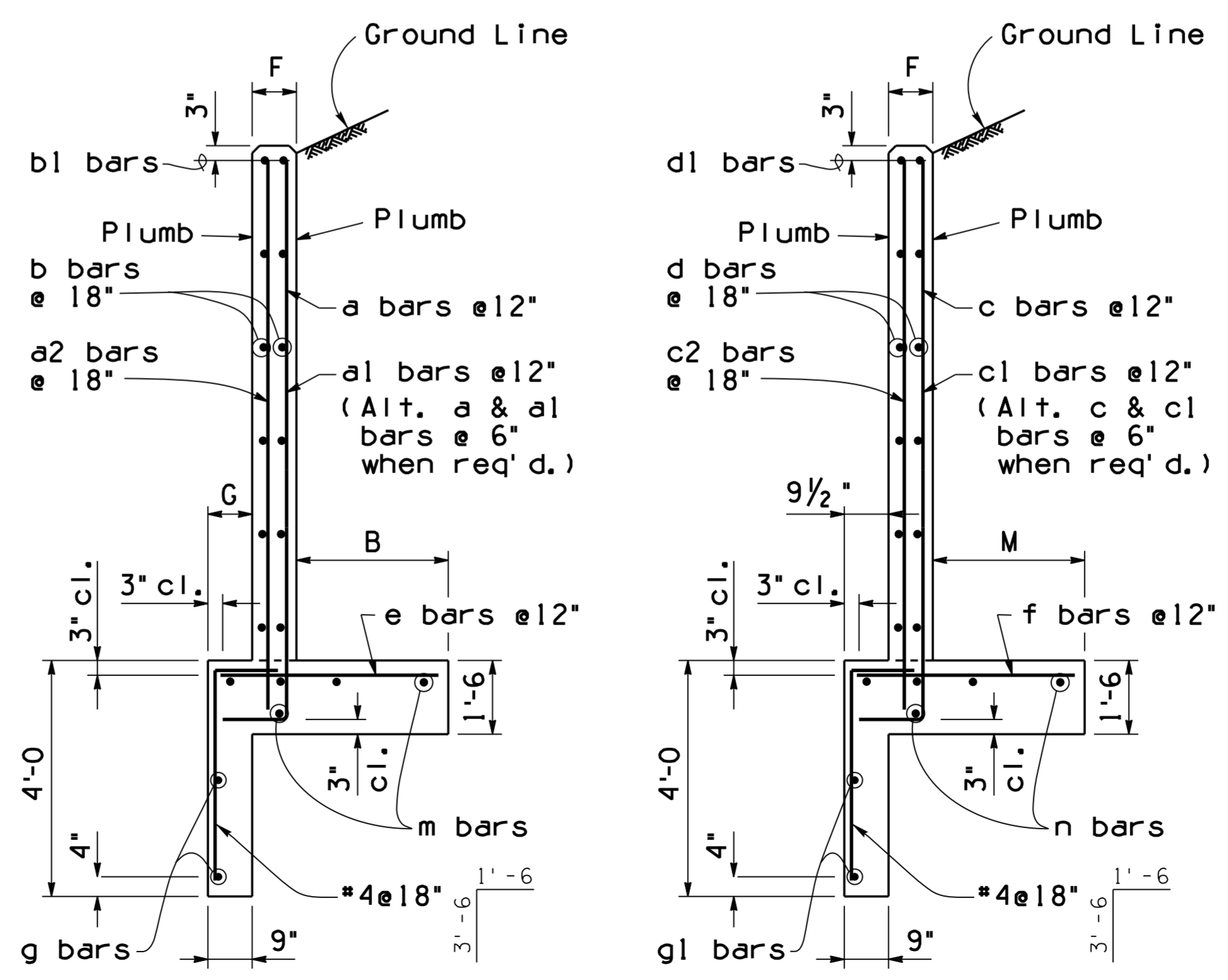


ELEVATION (Front Face Reinf.)
(Shown At Inlet)

For details not shown, see SECTION A-A or SECTION B-B.



OUTLET CUT-OFF WALL DETAIL



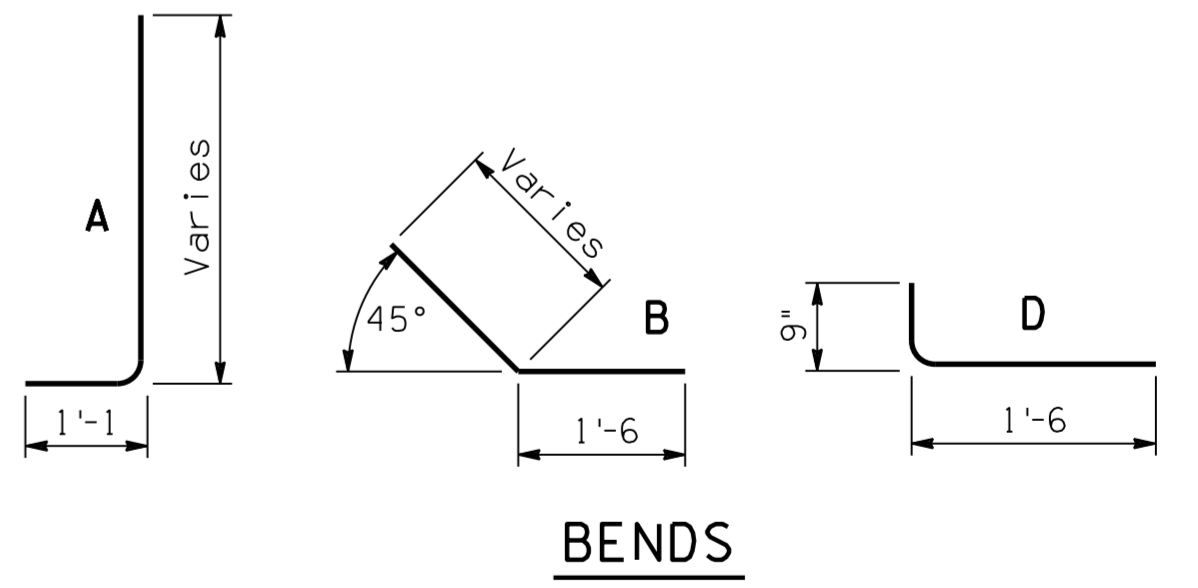
SECTION A-A

SECTION B-B

| Span | Height | Hdwl. Type A Wings | | | | Hdwl. Type B Wings | | | |
|------|--------|--------------------|-------|-----------------|-------|--------------------|-------|-----------------|-------|
| | | For L:H+2' | | Per each Add Ft | | For L:H+2' | | Per each Add Ft | |
| | | Conc. | Steel | Conc. | Steel | Conc. | Steel | Conc. | Steel |
| 8' | 8' | 15.07 | 1017 | 0.682 | 46 | 15.05 | 1095 | 0.703 | 49 |
| | 9' | 15.44 | 1045 | 0.690 | 46 | 15.41 | 1128 | 0.707 | 49 |
| | 10' | 18.30 | 1462 | 0.753 | 61 | 18.18 | 1556 | 0.771 | 63 |
| 10' | 10' | 21.49 | 1655 | 0.817 | 64 | 21.20 | 1708 | 0.835 | 65 |
| | 9' | 15.78 | 1071 | 0.696 | 46 | 15.80 | 1155 | 0.714 | 49 |
| | 8' | 18.67 | 1488 | 0.759 | 61 | 18.59 | 1582 | 0.777 | 63 |
| 12' | 10' | 21.86 | 1680 | 0.822 | 64 | 21.61 | 1734 | 0.840 | 65 |
| | 11' | 25.95 | 2197 | 0.663 | 78 | 25.61 | 2295 | 0.922 | 81 |
| | 12' | 30.03 | 2596 | 1.015 | 87 | 30.86 | 2908 | 1.035 | 98 |

* Includes curb and cut-off wall quantities for a single barrel.

| 8' Spans | | 10' Spans | | 12' Spans | |
|----------|-------|-----------|-------|-----------|-------|
| Conc. | Steel | Conc. | Steel | Conc. | Steel |
| 1.114 | 103 | 1.370 | 130 | 1.625 | 155 |



BENDS

NOTE:
 For General Notes, Dimensions, and additional Details, see SD 6.01 (1 & 2 of 5).

| | |
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| DESIGN APPROVED <i>Shafiq U. Hasan</i> | ARIZONA DEPARTMENT OF TRANSPORTATION INFRASTRUCTURE DELIVERY AND OPERATIONS DIVISION BRIDGE GROUP STRUCTURE DETAIL |
| APPROVED FOR DISTRIBUTION <i>Jason A. Nehme</i> | REINFORCED CONCRETE BOX CULVERTS INLET OR OUTLET - LEVEL WINGS CULVERT HEIGHT 8' TO 12' |
| ROUTE PROJECT NO. | FA NO. |
| LOCATION | DRAWING NO. SD 6.10 (2 of 2) |
| | SHEET NO. OF |