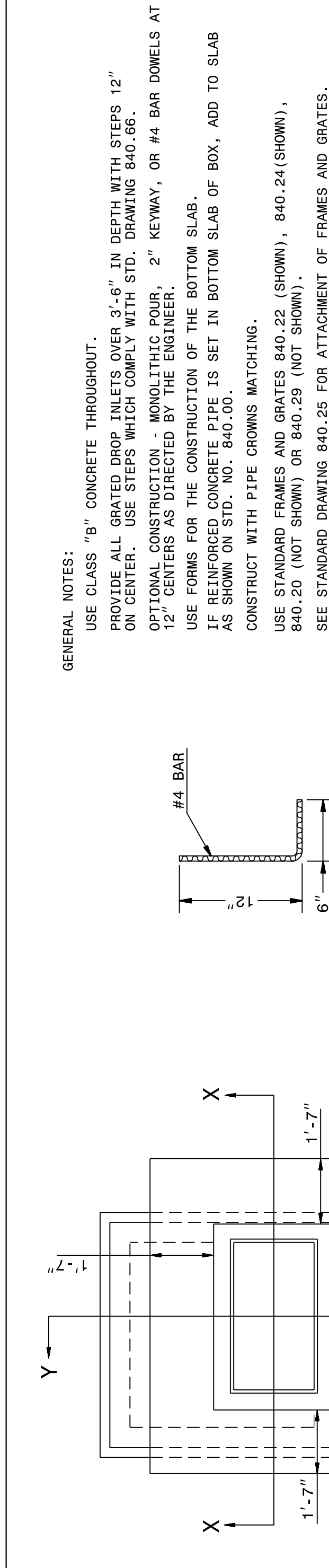


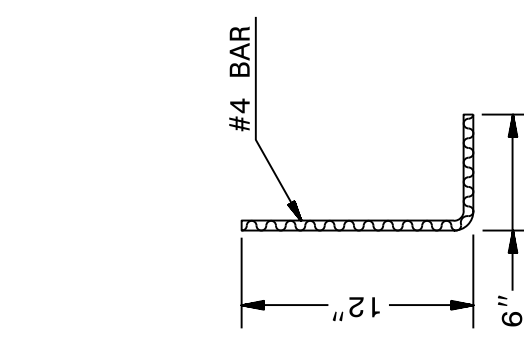
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DIVISION OF HIGHWAYS  
RALEIGH, N.C.

ENGLISH DETAIL DRAWING FOR  
**CONCRETE GRATED DROP INLET TYPE 'A'**  
MINIMUM DEPTH  
12" THRU 72" PIPE

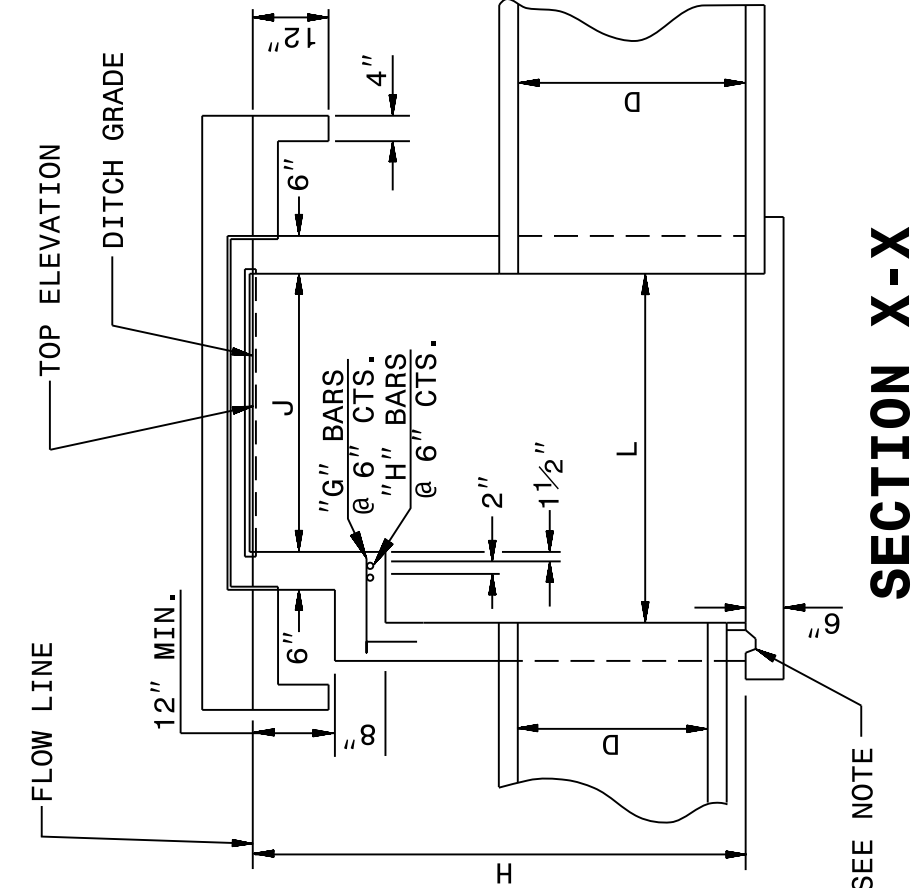
SHEET 1 OF 2  
**840d17**



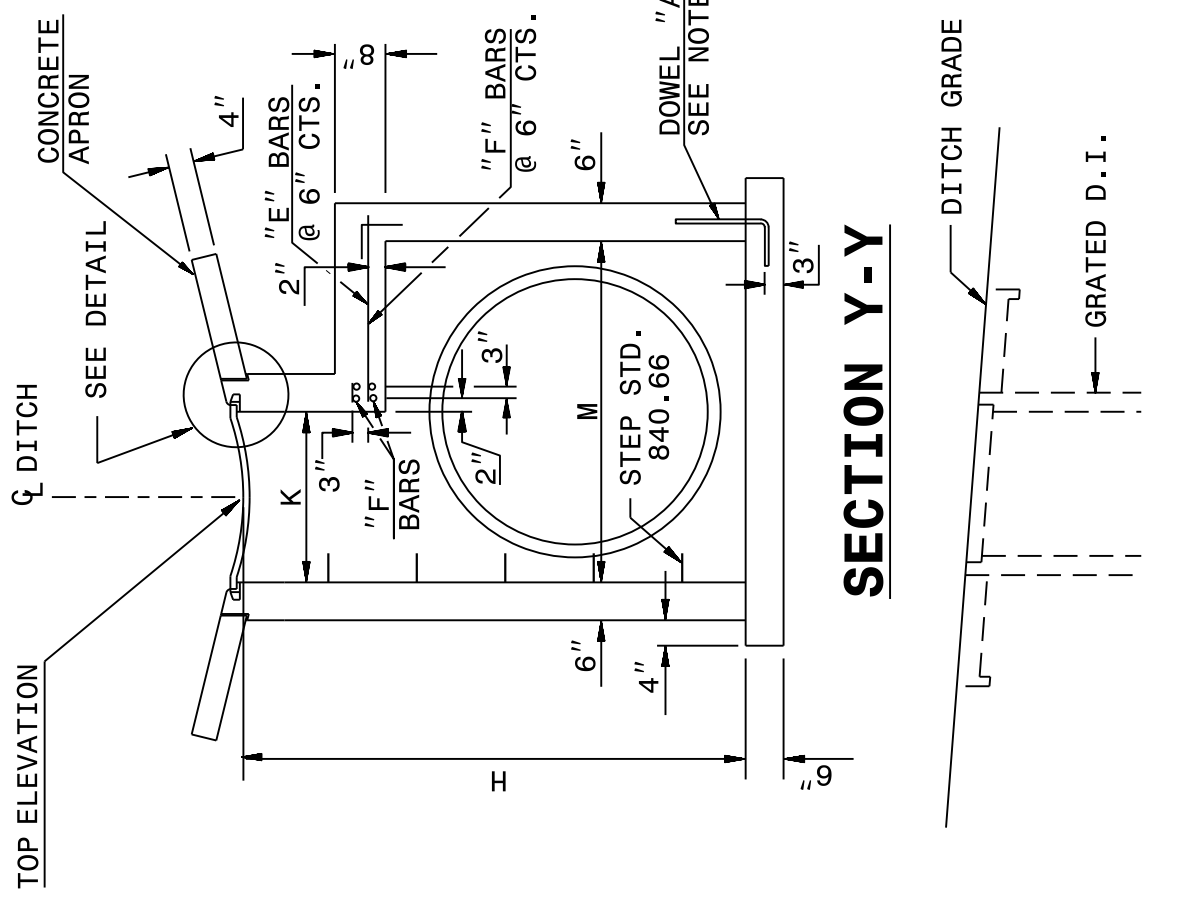
**DOWEL - A**



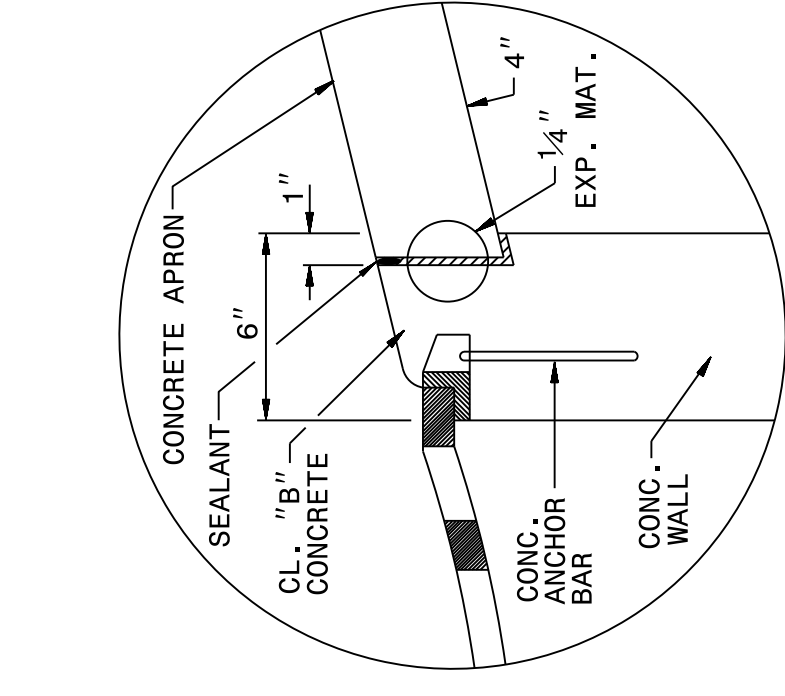
GENERAL NOTES:  
USE CLASS "B" CONCRETE THROUGHOUT.  
PROVIDE ALL GRATED DROP INLETS OVER 3'-6" IN DEPTH WITH STEPS 12" ON CENTER. USE STEPS WHICH COMPLY WITH STD. DRAWING 840.66.  
OPTIONAL CONSTRUCTION - MONOLITHIC POUR, 2" KEYWAY, OR #4 BAR DOWELS AT 12" CENTERS AS DIRECTED BY THE ENGINEER.  
USE FORMS FOR THE CONSTRUCTION OF THE BOTTOM SLAB.  
IF REINFORCED CONCRETE PIPE IS SET IN BOTTOM SLAB OF BOX, ADD TO SLAB AS SHOWN ON STD. NO. 840.00.  
CONSTRUCT WITH PIPE CROWNS MATCHING.  
USE STANDARD FRAMES AND GRATES 840.22 (SHOWN), 840.24 (SHOWN), 840.20 (NOT SHOWN) OR 840.29 (NOT SHOWN).  
SEE STANDARD DRAWING 840.25 FOR ATTACHMENT OF FRAMES AND GRATES.  
CHAMFER ALL EXPOSED CORNERS 1".  
DRAWING NOT TO SCALE.  
MAX. DEPTH OF THIS STRUCTURE FROM TOP OF BOTTOM SLAB TO TOP ELEVATION IS 12 FEET.



**SECTION X-X**



**SECTION Y-Y**



**DETAIL**  
(APRON SUPPORT NOTCH)

ENGLISH DETAIL DRAWING FOR  
**CONCRETE GRATED DROP INLET TYPE 'A'**  
MINIMUM DEPTH  
12" THRU 72" PIPE

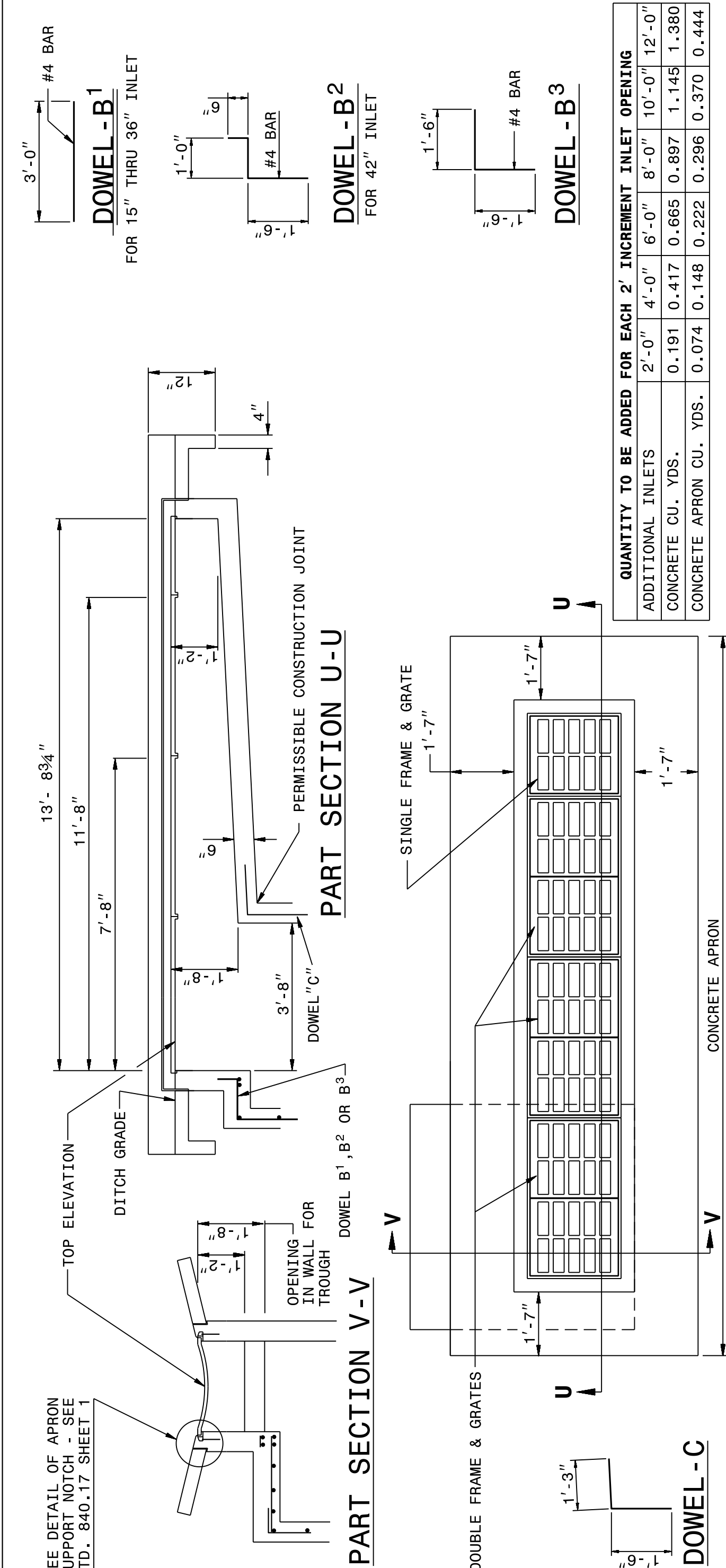
SHEET 1 OF 2  
**840d17**

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ENGLISH DETAIL DRAWING FOR  
**CONCRETE GRATED DROP INLET TYPE 'A'**  
MINIMUM DEPTH  
12" THRU 72" PIPE

SHEET 2 OF 2  
**840d17**



**PART SECTION V-V**

**PART SECTION U-U**

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ENGLISH DETAIL DRAWING FOR  
**CONCRETE GRATED DROP INLET TYPE 'A'**  
MINIMUM DEPTH  
12" THRU 72" PIPE

SHEET 2 OF 2  
**840d17**

DIMENSIONS OF BOX AND PIPE		REINFORCING STEEL - NO. 4 BARS										MIN. DIMENSIONS AND QUANTITIES FOR CONCRETE GRATED DROP INLET (BASED ON MIN. HEIGHT, H)	
PIPE	SPAN	WIDTH	HEIGHT	BARS E	BARS F	BARS G	BARS H	TOTAL BOTTOM SLAB	H PER FT	APRON TOTAL	DEDUCTIONS FOR ONE PIPE		
D	J	K	L	M	N	O	P	Q	R	S	T	U	V
12"	3'-8"	2'-0"	3'-8"	2'-0"	2'-3"	—	—	—	—	—	—	—	—
15"	3'-8"	2'-0"	3'-8"	2'-0"	2'-5"	—	—	—	—	—	—	—	—
18"	—	—	—	—	—	—	—	—	—	—	—	—	—
24"	—	—	—	—	—	—	—	—	—	—	—	—	—
30"	—	—	—	—	—	—	—	—	—	—	—	—	—
36"	—	—	—	—	—	—	—	—	—	—	—	—	—
42"	—	—	—	—	—	—	—	—	—	—	—	—	—
48"	—	—	—	—	—	—	—	—	—	—	—	—	—
54"	—	—	—	—	—	—	—	—	—	—	—	—	—
60"	—	—	—	—	—	—	—	—	—	—	—	—	—
66"	—	—	—	—	—	—	—	—	—	—	—	—	—
72"	—	—	—	—	—	—	—	—	—	—	—	—	—

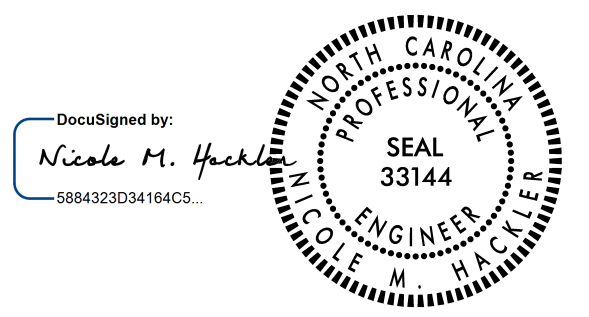
QUANTITY TO BE ADDED FOR EACH 2' INCREMENT INLET OPENING

ADDITIONAL INLETS	2'-0"	4'-0"	6'-0"	8'-0"	10'-0"	12'-0"
CONCRETE CU. YDS.	0.191	0.417	0.665	0.897	1.145	1.380
CONCRETE APRON CU. YDS.	0.074	0.148	0.222	0.296	0.370	0.444

CONTRACT STANDARDS  
AND DEVELOPMENT UNIT  
Office 919-707-6950 FAX 919-250-4119

**SEE TITLE BLOCK**

ORIGINAL BY: J. Howerton DATE: 1/22/14  
MODIFIED BY: DATE:  
CHECKED BY: DATE:  
FILE SPEC.: jhowerton\minimum\_depth\_type A.dgn



9/20/2023

DOCUMENT NOT CONSIDERED FINAL  
UNLESS ALL SIGNATURES COMPLETED

I:\SEP-2017\1455\portraits\Special Details\jhowerton\840d17 Minimum Depth Type A.dgn  
jhowerton At 05/25/2015