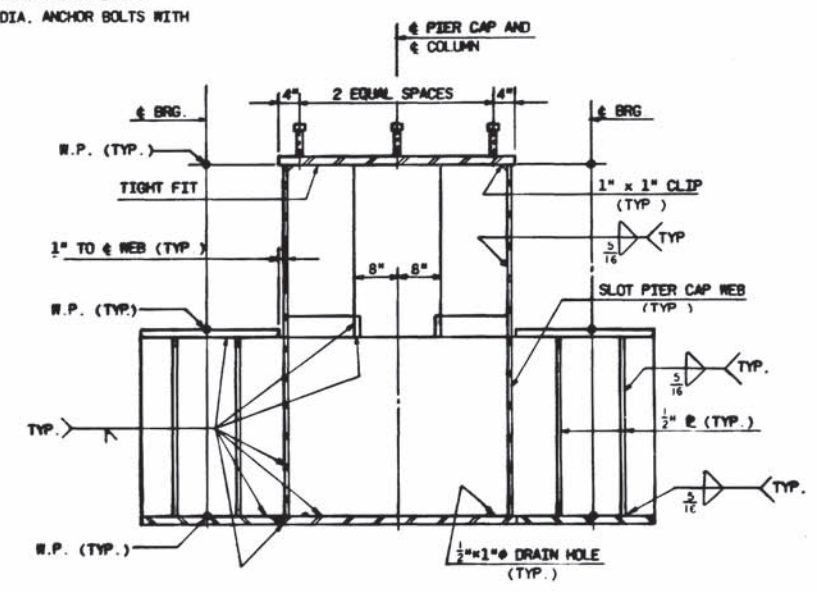


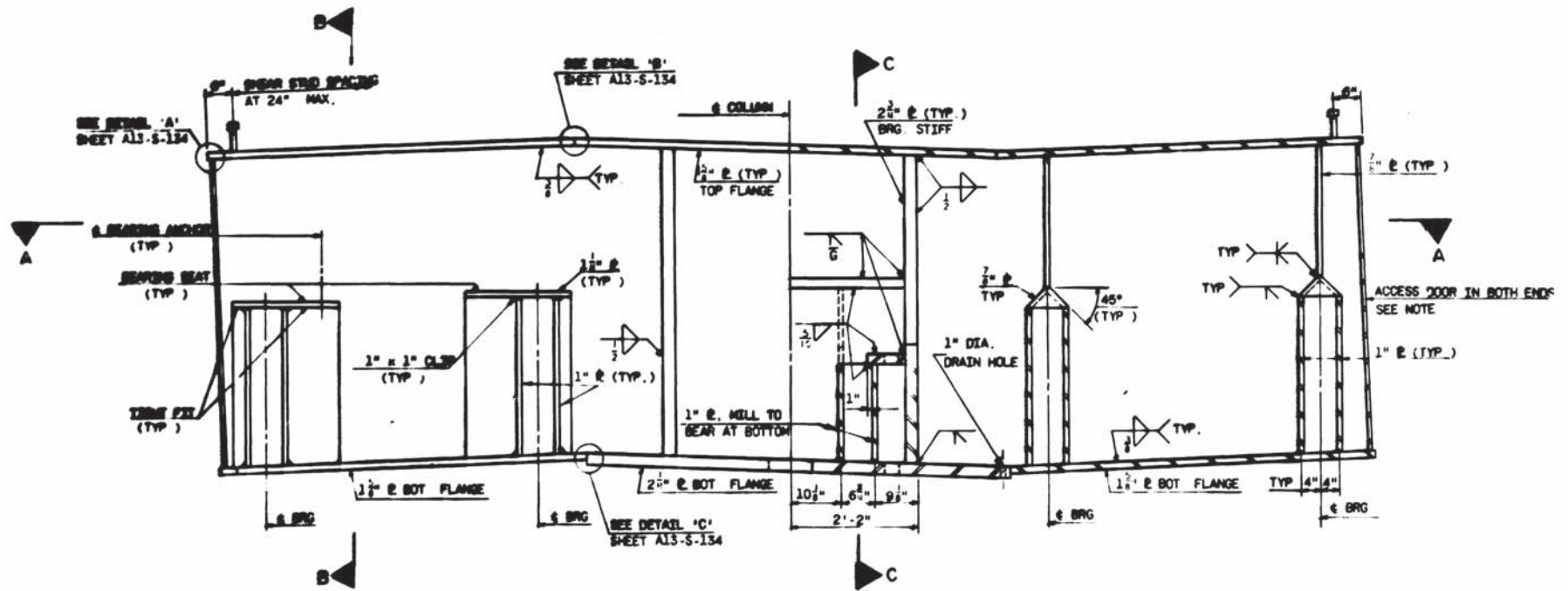
PLAN-SECTION A-A

LEGEND:  
 ○ INDICATES 2 1/2" HOLES FOR 7/8" DIA. ANCHOR BOLTS  
 ⊗ INDICATES 2 3/4" HOLES FOR 7/8" DIA. ANCHOR BOLTS WITH LEVELING NUT.

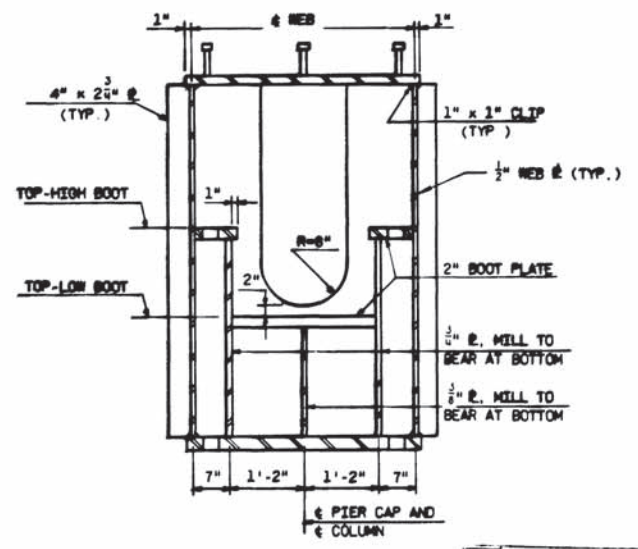


SECTION B-B

NOTE:  
 FOR GEOMETRY LAYOUT OF WORKING POINTS AND WORKING LINES, SEE DRAWING NO. A13-S-119  
 FOR ANCHOR BOLTS, ANCHOR PLATE DETAILS, AND ADDITIONAL NOTES, SEE DRAWING NO. A13-S-154  
 FOR ACCESS DOOR (BOTH ENDS), SEE DRAWING NOS. A13-S-154 AND A13-S-166.  
 FOR SHEAR STUD CONNECTOR DETAILS, SEE DRAWING NO. A13-S-154  
 FOR BEARING ANCHORS, SEE DRAWING NO. A13-S-112  
 FOR SPIRAL AROUND ANCHOR BOLTS, SEE DRAWING NO. A13-S-154  
 FOR TYPICAL BRACKET DETAILS, SEE DRAWING NO. A13-S-150



ELEVATION - SECTION D-D



SECTION C-C

WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
 AS-BUILT CONDITION  
 MAY 03 1979  
 RESIDENT ENGINEER DATE

REFERENCE DRAWINGS		REVISIONS	
NUMBER	DESCRIPTION	DATE	BY
A13-S-140	COLUMN SCHEDULE AND DETAILS		
A13-S-119	PIER CAP GEOMETRY LAYOUT		
A13-S-166	PIER CAP DETAILS		
A13-S-112	BEARING ASSEMBLIES		
A13-S-165	PIER CAP DETAILS (DETAILS A, B & C)		
A13-S-160	PIER CAP DETAILS (BRACKET DETAILS)		



**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**BUCHART-HORN**  
 CONSULTING ENGINEERS AND PLANNERS

DE LEUW, CATHER & COMPANY  
 GENERAL ENGINEERING CONSULTANT

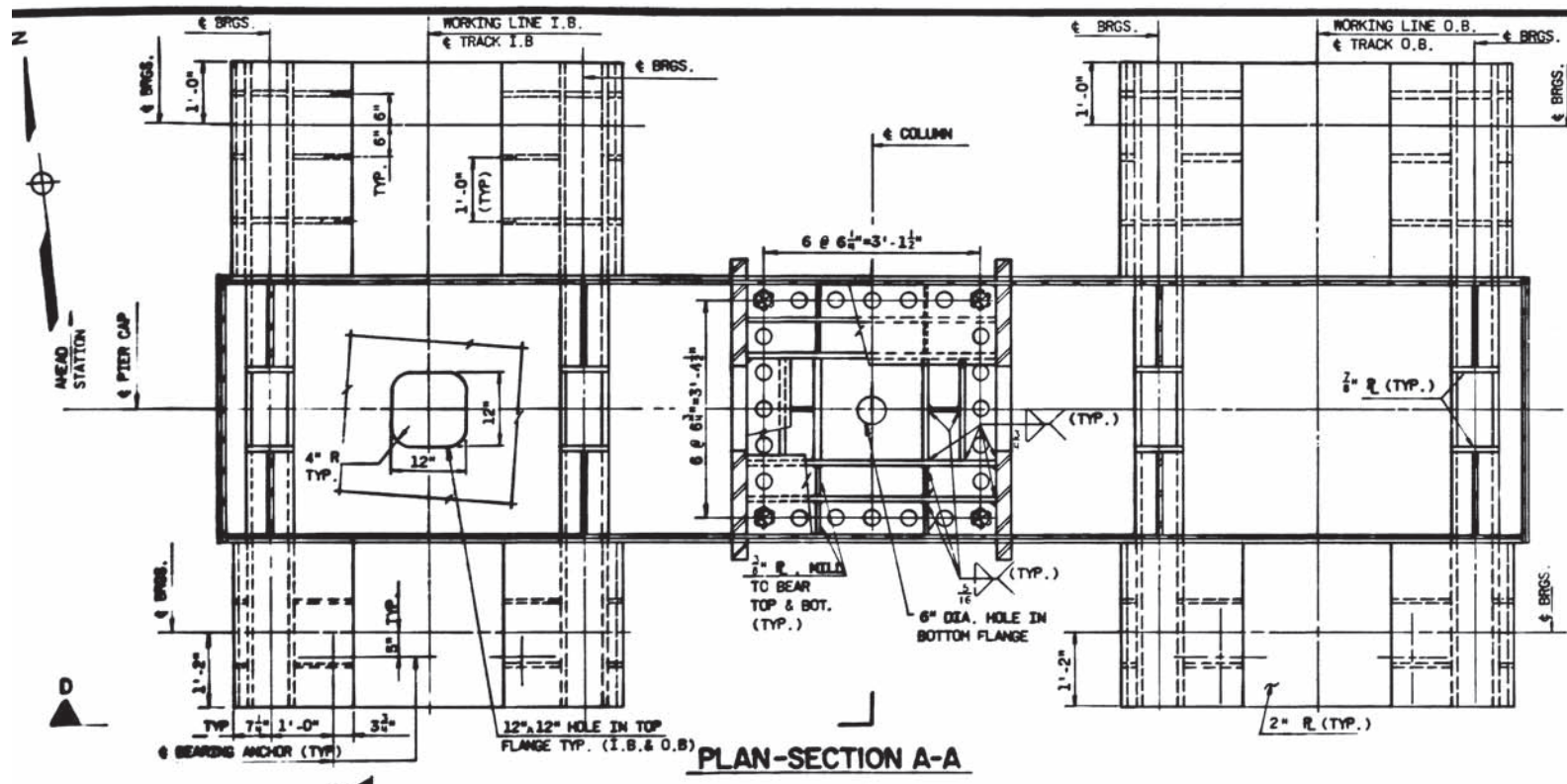
MARRY WISSE & ASSOCIATES  
 GENERAL ARCHITECTURAL CONSULTANT

SUBMITTED: *[Signature]* APPROVED: *[Signature]*

**ROCKVILLE ROUTE**  
 AERIAL STRUCTURE  
 PIER CAP DETAILS-PIER A5447

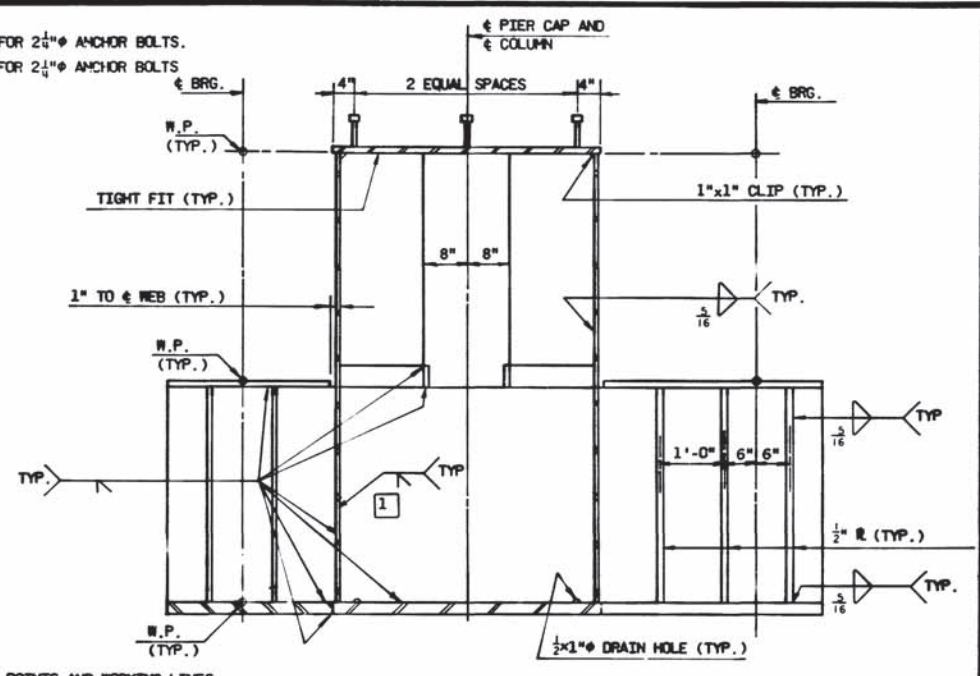
SCALE: 1/4" = 1'-0"

DRAWING NO. A13-S-141 M220-291



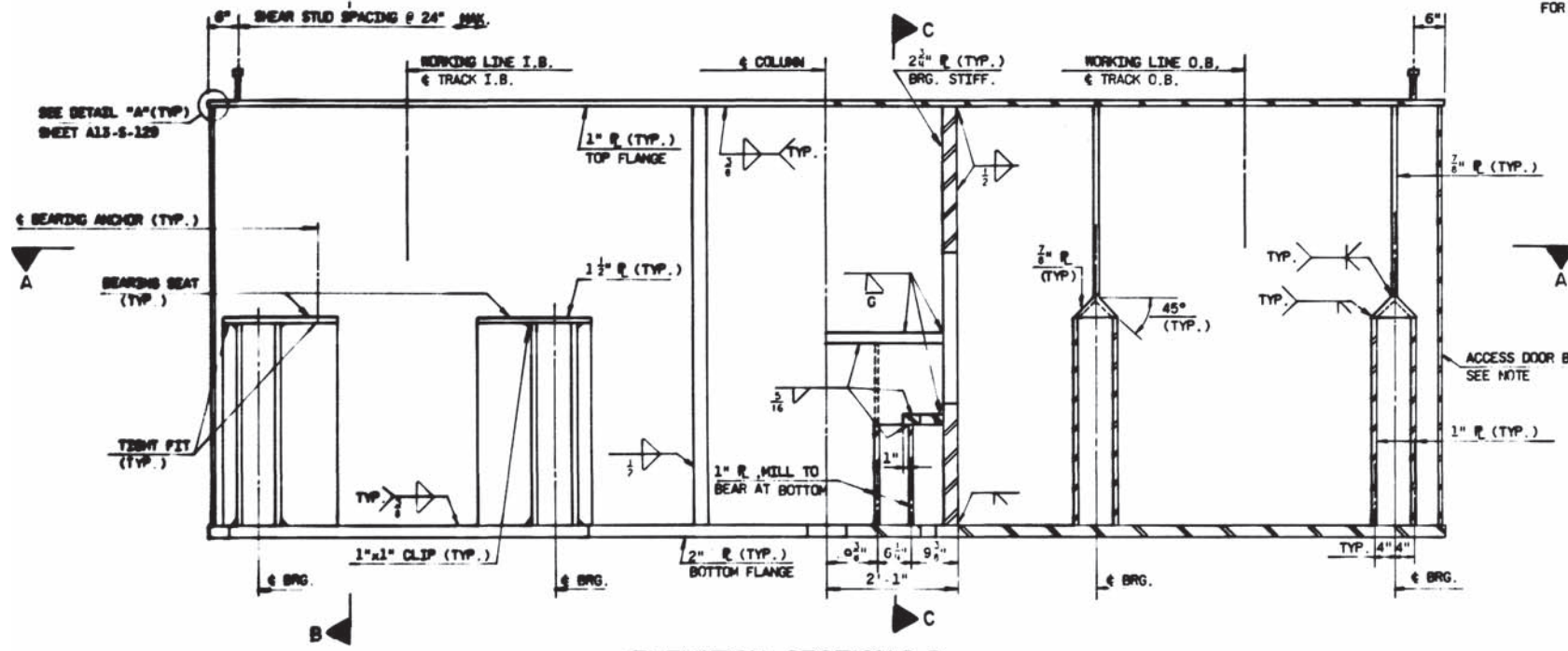
**PLAN-SECTION A-A**

**LEGEND:**  
 ○ INDICATES 2 1/4" HOLES FOR 2 1/4" ANCHOR BOLTS.  
 ⊗ INDICATES 2 1/4" HOLES FOR 2 1/4" ANCHOR BOLTS WITH LEVELING NUT.

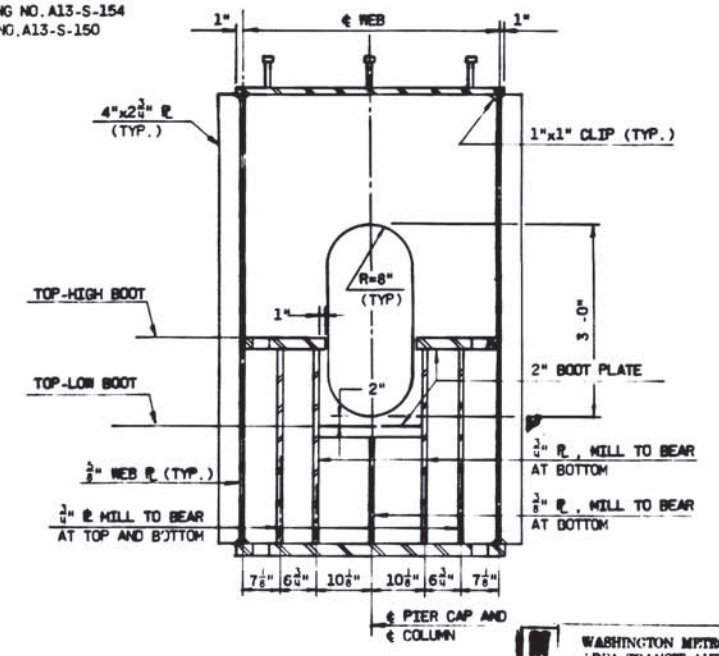


**SECTION B-B**

**NOTE:**  
 FOR GEOMETRY LAYOUT OF WORKING POINTS AND WORKING LINES, SEE DRAWING NO. A13-S-92  
 FOR ANCHOR BOLTS, ANCHOR PLATE DETAILS, AND ADDITIONAL NOTES, SEE DRAWING NO. A13-S-154  
 FOR ACCESS DOOR (BOTH ENDS), SEE DRAWING NOS. A13-S-154 AND A13-S-166.  
 FOR SHEAR STUD CONNECTOR DETAILS, SEE DRAWING NO. A13-S-154  
 FOR BEARING ANCHORS, SEE DRAWING NO. A13-S-112  
 FOR SPIRAL AROUND ANCHOR BOLTS, SEE DRAWING NO. A13-S-154  
 FOR TYPICAL BRACKET DETAILS, SEE DRAWING NO. A13-S-150



**ELEVATION-SECTION D-D**



**SECTION C-C**

WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
**AS-BUILT CONDITION**  
 MAY 03 1978  
 GENERAL ENGINEER DATE

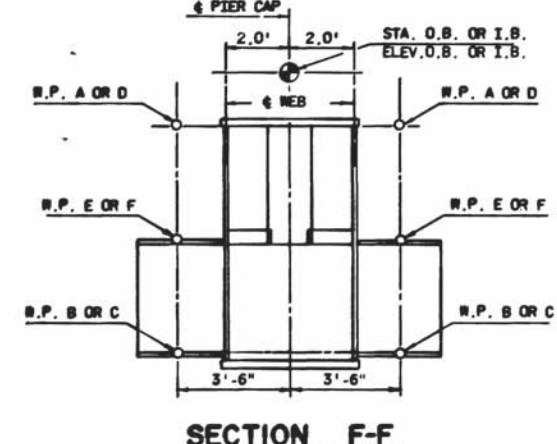
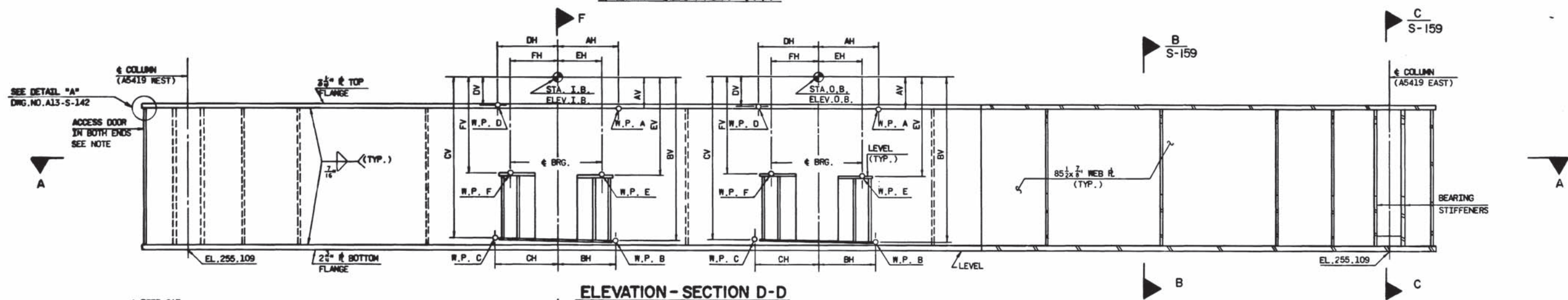
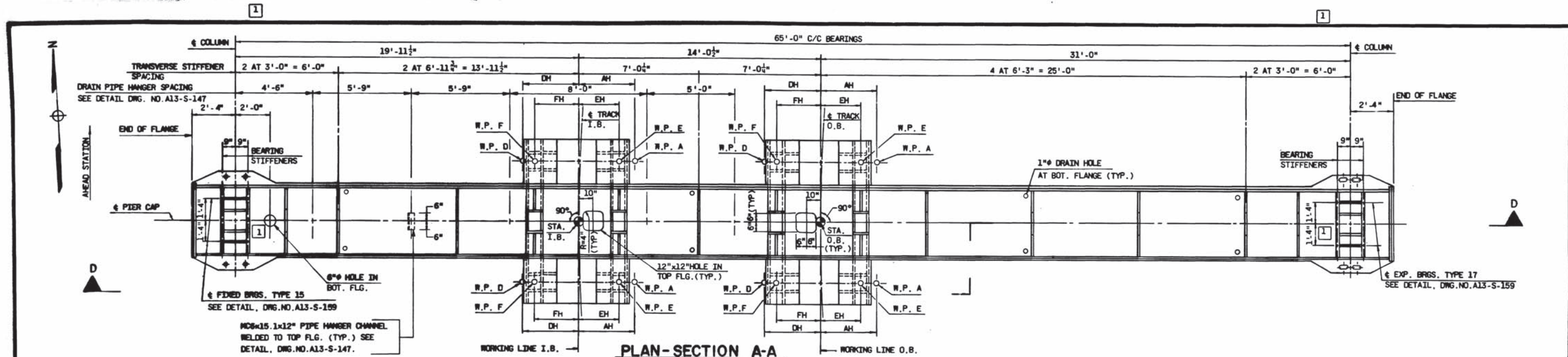
REVISED	BY	DATE	REFERENCE DRAWINGS		REVISIONS	
			NUMBER	DESCRIPTION	DATE	DESCRIPTION
DESIGNED	T.C.P.P.	8/76	A13-S-140	COLUMN SCHEDULE AND DETAILS	10/14/76	G.P. 11 EXTEND VERT. BRACKET B THRU WEB & PEE
DRAWN	M.S. BISH	8/76	A13-S-92	PIER CAP GEOMETRY LAYOUT		P.C.O. #8
CHECKED	E.P. BARRANGER	8/76	A13-S-184	PIER CAP DETAILS		
APPROVED	J. C. [Signature]	DATE	A13-S-112	BEARING ASSEMBLIES		
			A13-S-129	PIER CAP DETAILS (DETAIL A)		
			A13-S-150	PIER CAP DETAILS (BRACKET DETAILS)		

**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**BUCHART-HORN**  
 CONSULTING ENGINEERS AND PLANNERS  
 SUBMITTED: [Signature]  
 DE LEUW, CATHER & COMPANY  
 GENERAL ENGINEERING CONSULTANT  
 HARRY WEESE & ASSOCIATES  
 GENERAL ARCHITECTURAL CONSULTANT  
 APPROVED: [Signature]

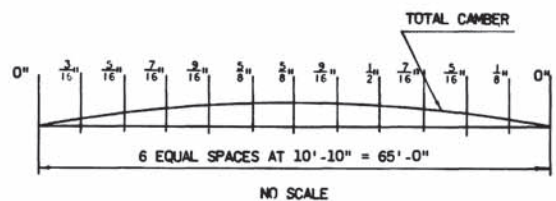
**ROCKVILLE ROUTE**  
 AERIAL STRUCTURE  
 PIER CAP DETAILS - PIER A5435

SCALE	1" = 1'-0"	DRAWING NO.	A13-S-131	M220-292
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**NOTE:**  
 ENDS OF CAP, BEARING STIFFENERS AND BRACKET SUPPORT PLATES SHALL BE VERTICAL AFTER APPLICATION OF FULL DEAD LOAD.  
 CAP SHALL BE A STRAIGHT SLOPE BETWEEN END ELEVATIONS SHOWN.  
 FOR ACCESS DOOR (BOTH SIDES) DETAILS, SEE DRG. NOS. A13-S-154 AND A13-S-166.

**NOTE:**  
 THIS SHEET TO BE USED IN CONJUNCTION WITH DRG. NO. A13-S-159.



WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY

AS-BUILT CONDITION

RESIDENT ENGINEER: [Signature]

DATE: MAY 03 1978

**GEOMETRY**

O.B. AND I.B.	STATION AND ELEVATION	LOCATION	* DIMENSIONS (FEET)											
			AV	BV	CV	DV	EV	FV	AH	BH	CH	DH	EH	FH
O.B.	541+90	BACK	1.889	8.887	8.732	1.734	5.326	5.210	3.298	3.132	3.367	3.200	2.382	2.525
O.B.	264.374	AHEAD	1.911	8.909	8.767	1.769	5.350	5.343	3.291	3.137	3.361	3.208	2.388	2.526
I.B.	541+91.82	BACK	1.887	8.886	8.740	1.742	5.326	5.216	3.281	3.125	3.374	3.217	2.375	2.537
I.B.	264.367	AHEAD	1.909	8.908	8.776	1.778	5.350	5.250	3.281	3.139	3.360	3.218	2.389	2.531

DESIGNED	D.T. WILHELM	4/75	NUMBER	DESCRIPTION	DATE	BY	DESCRIPTION
DRAWN	H.R. BINK	4/75	A13-S-140	COLUMN SCHEDULE AND DETAILS	10/14/76	CPL	CHANGE BRG. STIFF. SIZE PER P.C.D. 26
CHECKED	C.P. LEE	4/75	A13-S-154	PIER CAP DETAILS			
APPROVED	[Signature]	10/75	A13-S-112	BEARING ASSEMBLIES			
			A13-S-159	PIER CAP DETAILS - PIER A5419			
			A13-S-159	BEARING ASSEMBLIES			
			A13-S-142	PIER CAP DETAILS - PIER A5174			

**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**BUCHART-HORN**  
 CONSULTING ENGINEERS AND PLANNERS

DE LEUW, CATHY & COMPANY  
 GENERAL ENGINEERING CONSULTANT

HARRY WEESE & ASSOCIATES  
 GENERAL ARCHITECTURAL CONSULTANT

SUBMITTED: [Signature]

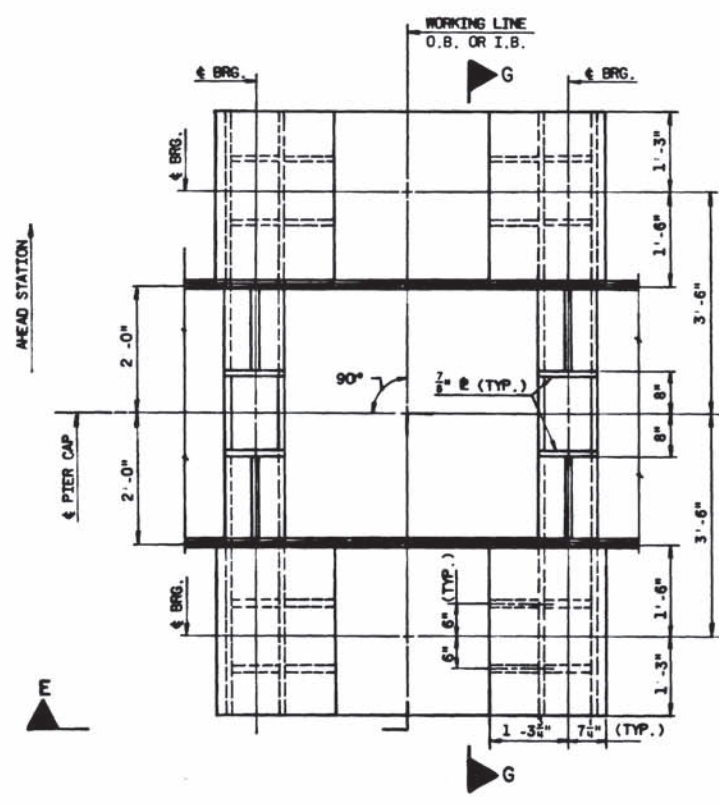
APPROVED: [Signature]

**ROCKVILLE ROUTE**  
 AERIAL STRUCTURE  
 PIER CAP DETAILS-PIER A5419

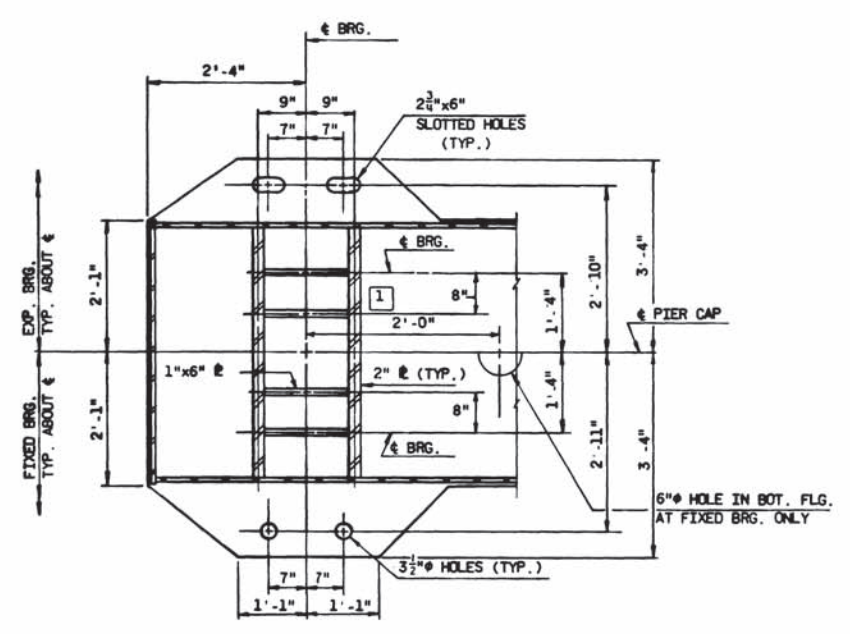
SCALE: 3/8" = 1'-0"

DRAWING NO. A13-S-148

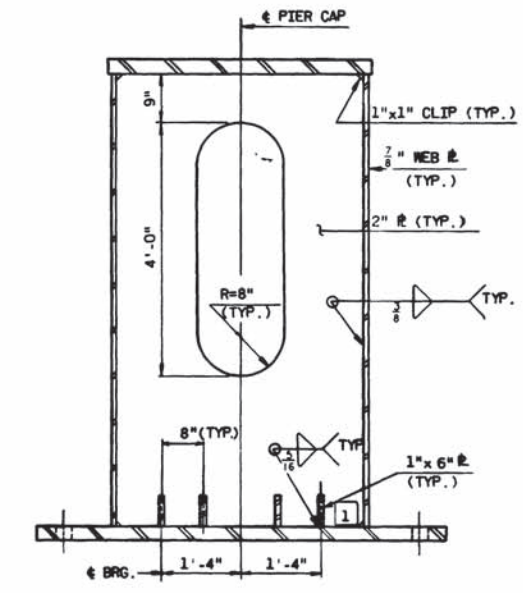
M220-293



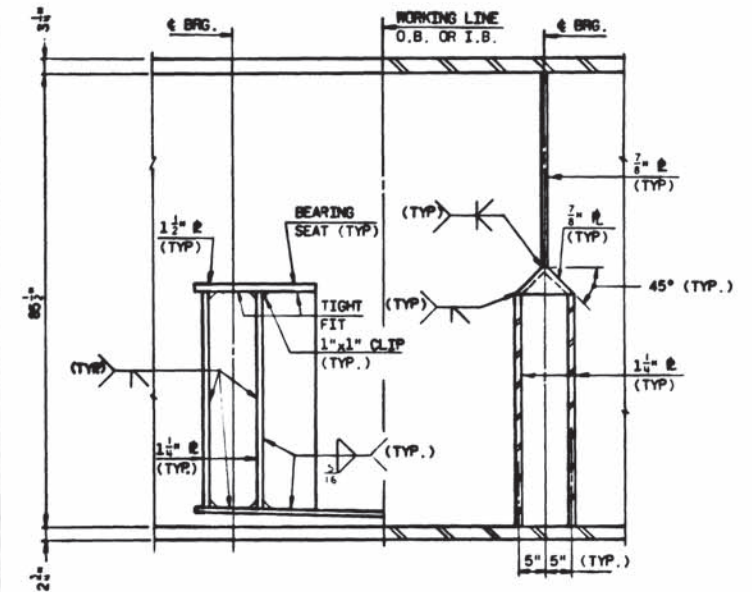
DETAIL PLAN-BRACKETS



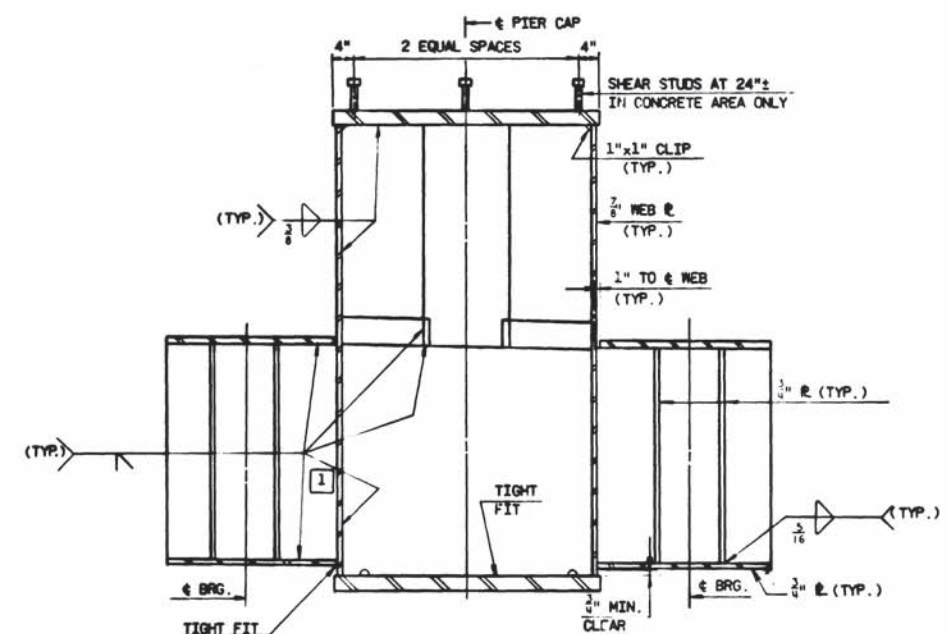
DETAIL AT ENDS OF PIER



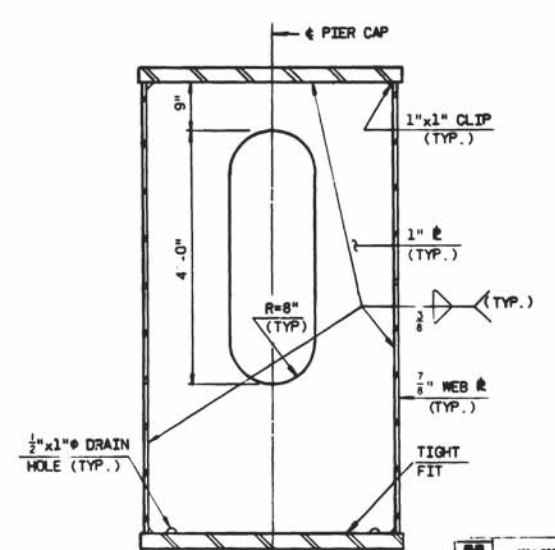
SECTION C-C  
S-148



SECTION E-E



SECTION G-G



SECTION B-B  
S-148

WASHINGTON METROPOLITAN  
AREA TRANSIT AUTHORITY  
AS-BUILT CONDITION  
MAY 03 1979  
RESIDENT ENGINEER

DESIGNED	D. I. WILHELM	4/75
DRAWN	M. R. BISH	4/75
CHECKED	C. P. LEE	4/75
APPROVED	<i>Paul G. ...</i>	4/75

REFERENCE DRAWINGS		REVISIONS	
NUMBER	DESCRIPTION	DATE	BY
A13-S-148	PIER CAP DETAILS - PIER A5419	10/14/76	G.P.



**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**BUCHART-HORN**  
CONSULTING ENGINEERS AND PLANNERS

DE LEUW, CATHER & COMPANY  
GENERAL ENGINEERING CONSULTANT

HARRY WEESE & ASSOCIATES  
GENERAL ARCHITECTURAL CONSULTANT

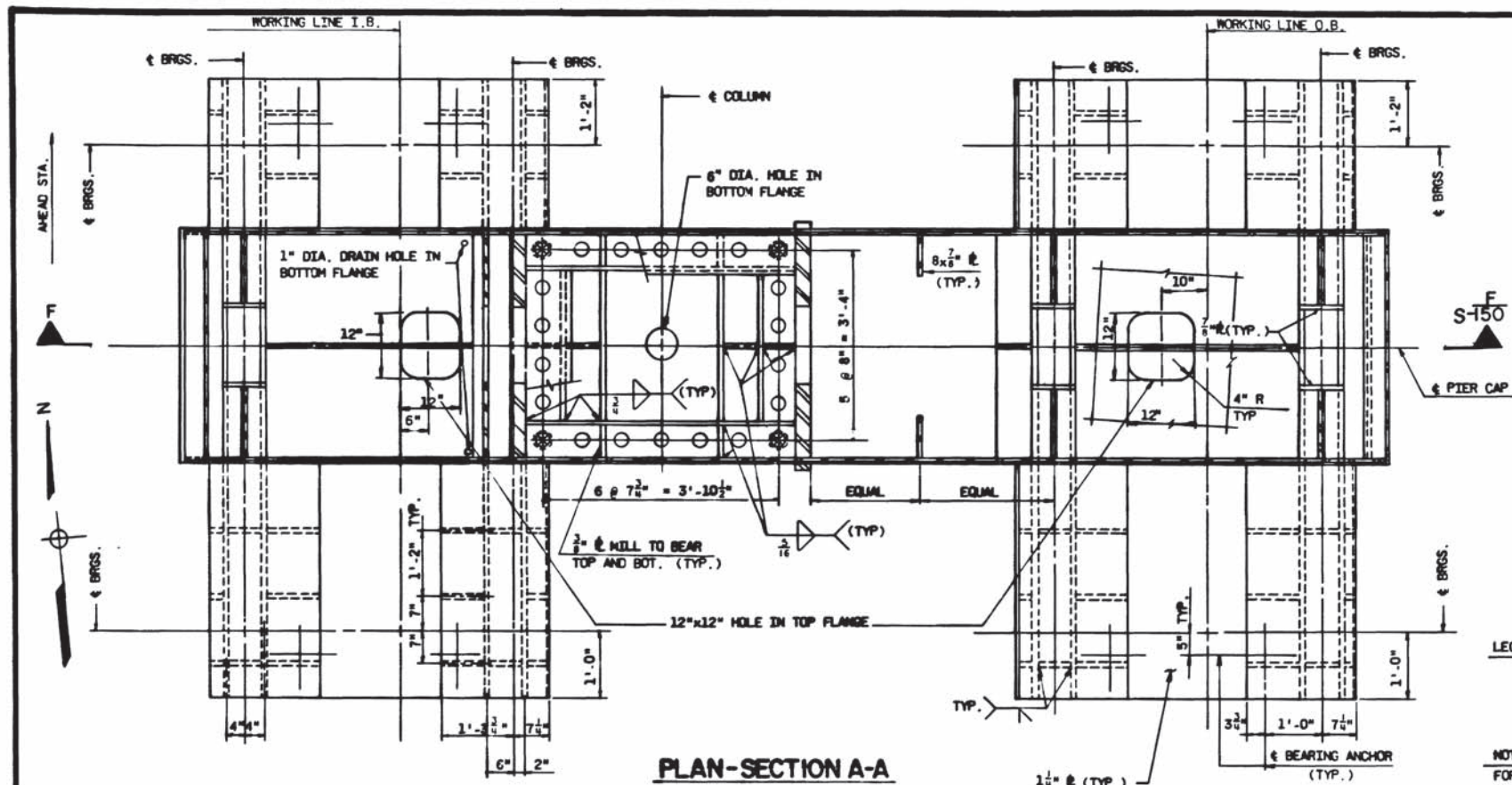
DATE: 10/14/76

**ROCKVILLE ROUTE**  
AERIAL STRUCTURE  
PIER CAP DETAILS PIER A5419

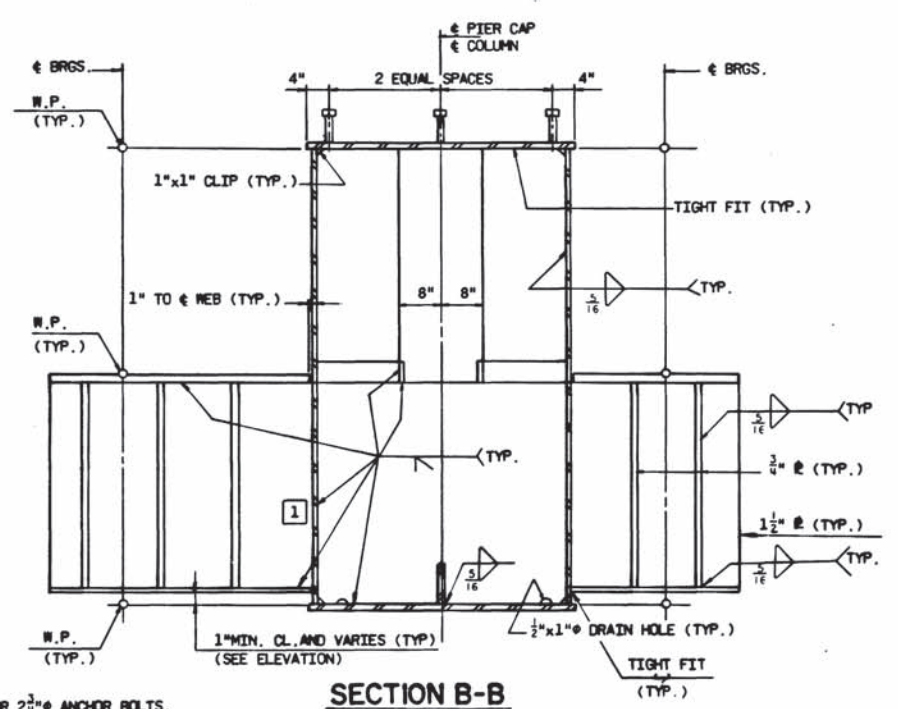
SCALE: 3/4" = 1'-0"

DRAWING NO. A13-S-159

M220-294



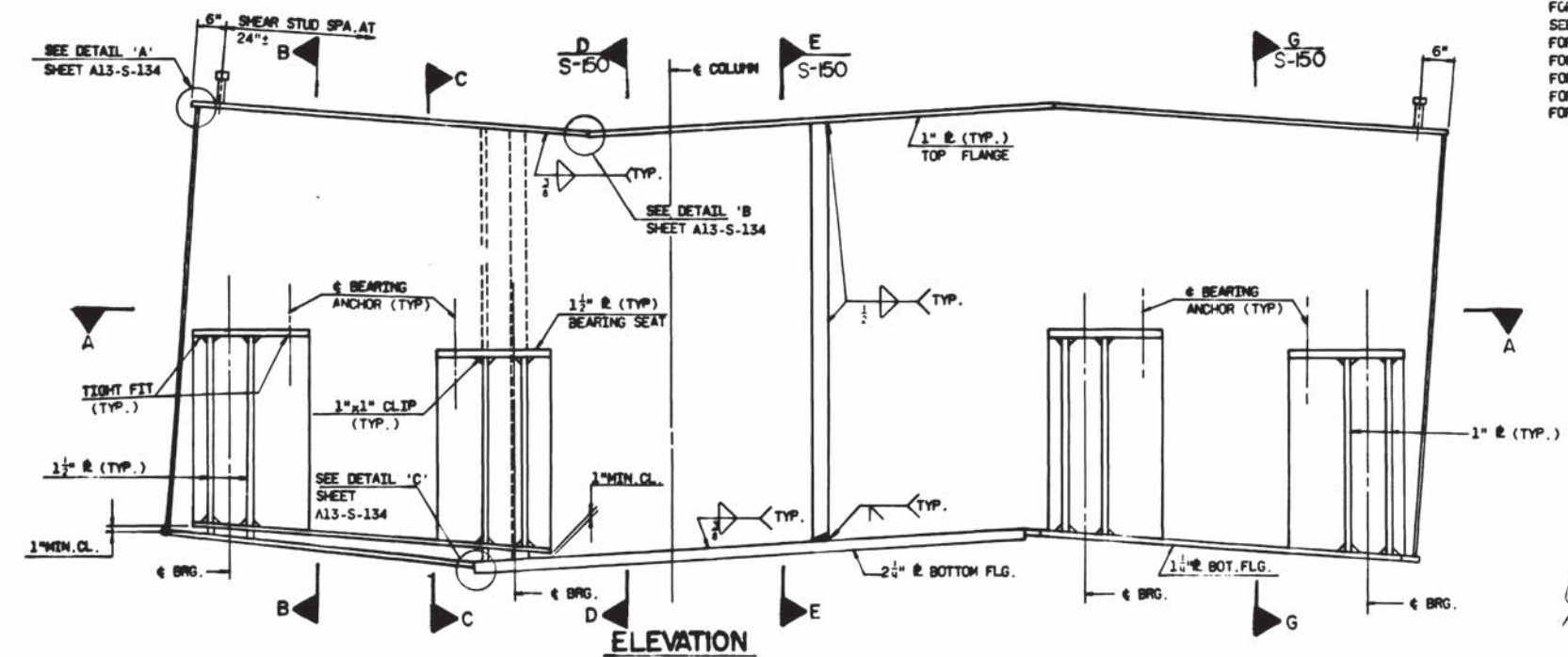
PLAN-SECTION A-A



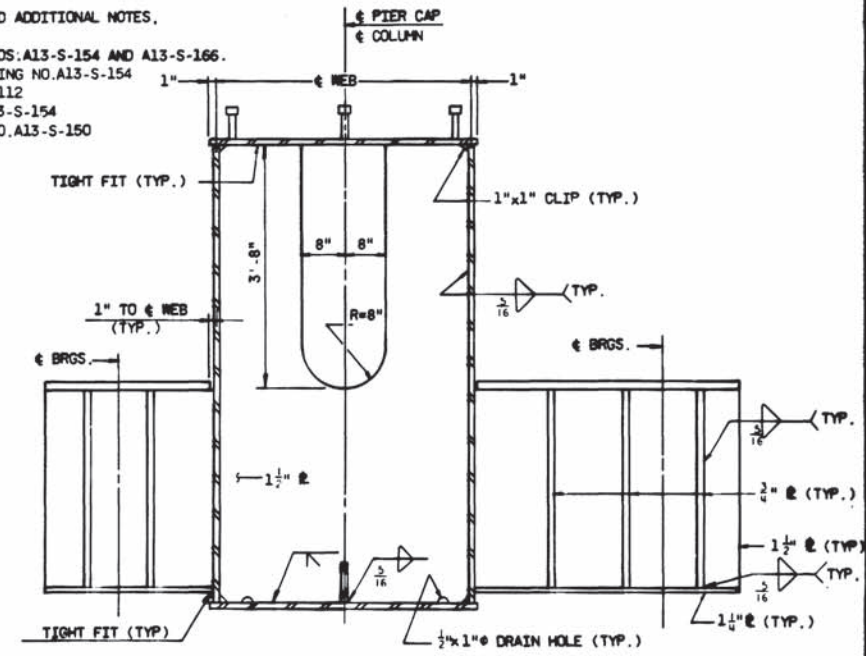
SECTION B-B

LEGEND:  
 ○ INDICATES 3/4" HOLES FOR 2 1/2" ANCHOR BOLTS.  
 ⊗ INDICATES 3/4" HOLES FOR 2 1/2" ANCHOR BOLTS WITH LEVELING NUT.

NOTE:  
 FOR GEOMETRY LAYOUT OF WORKING POINTS AND WORKING LINES, SEE DRAWING NO. A13-S-119.  
 FOR ANCHOR BOLTS, ANCHOR PLATE DETAILS, AND ADDITIONAL NOTES, SEE DRAWING NO. A13-S-154.  
 FOR ACCESS DOOR (BOTH ENDS), SEE DRAWING NOS. A13-S-154 AND A13-S-166.  
 FOR SHEAR STUD CONNECTOR DETAILS, SEE DRAWING NO. A13-S-154.  
 FOR BEARING ANCHORS, SEE DRAWING NO. A13-S-112.  
 FOR SPIRAL AROUND BOLTS, SEE DRAWING NO. A13-S-154.  
 FOR TYPICAL BRACKET DETAILS, SEE DRAWING NO. A13-S-150.



ELEVATION



SECTION C-C

WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
 AS-BUILT CONDITION  
 Resident Engineer: *John S. [Signature]* DATE: MAY 03 1978

DESIGNED		REFERENCE DRAWINGS		REVISIONS	
Y. C. PAN	9/75	NUMBER	DESCRIPTION	DATE	BY
A. W. HOOPER	8/75	A13-S-140	COLUMN SCHEDULE AND DETAILS	10/14/76	CPL
K. P. SADHARAN	6/75	A13-S-119	PIER CAP GEOMETRY LAYOUT		
		A13-S-154	PIER CAP DETAILS		
		A13-S-112	BEARING ASSEMBLIES		
		A13-S-150	PIER CAP DETAILS		
		A13-S-134	PIER CAP DETAILS (DETAILS A, B & C)		

**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**BUCHART-HORN**  
 CONSULTING ENGINEERS AND PLANNERS

DE LEUW, CATHER & COMPANY  
 GENERAL ENGINEERING CONSULTANT

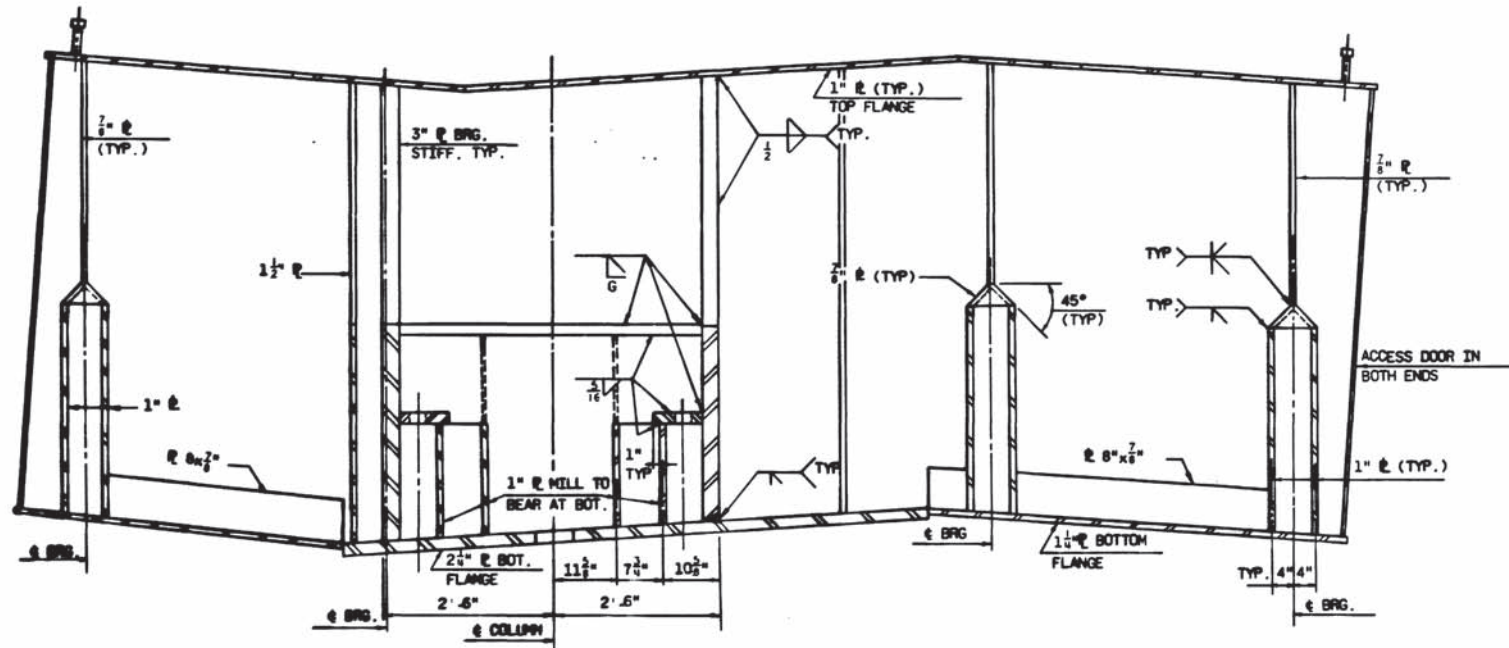
HARRY WEESE & ASSOCIATES  
 GENERAL ARCHITECTURAL CONSULTANT

APPROVED: *John [Signature]*

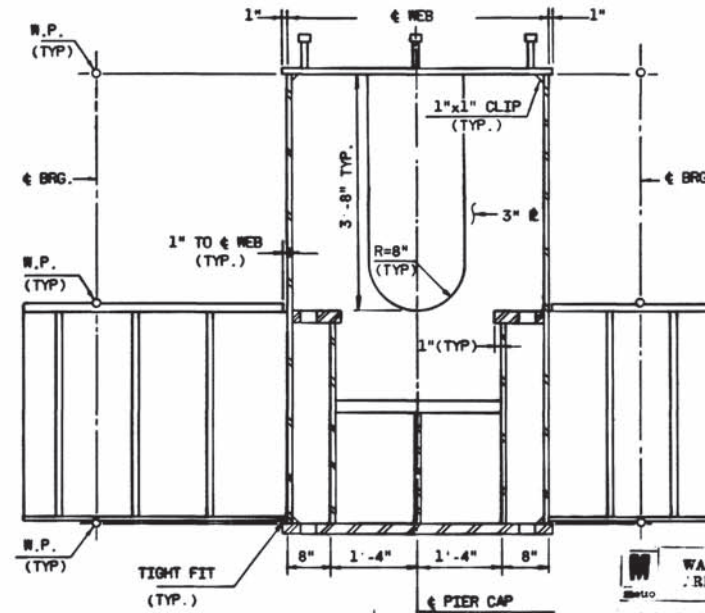
**ROCKVILLE ROUTE**  
 AERIAL STRUCTURE  
 PIER CAP DETAILS-PIER A 5403

SCALE: 3/4" = 1'-0"

DRAWING NO. A13-S-149 M220-295

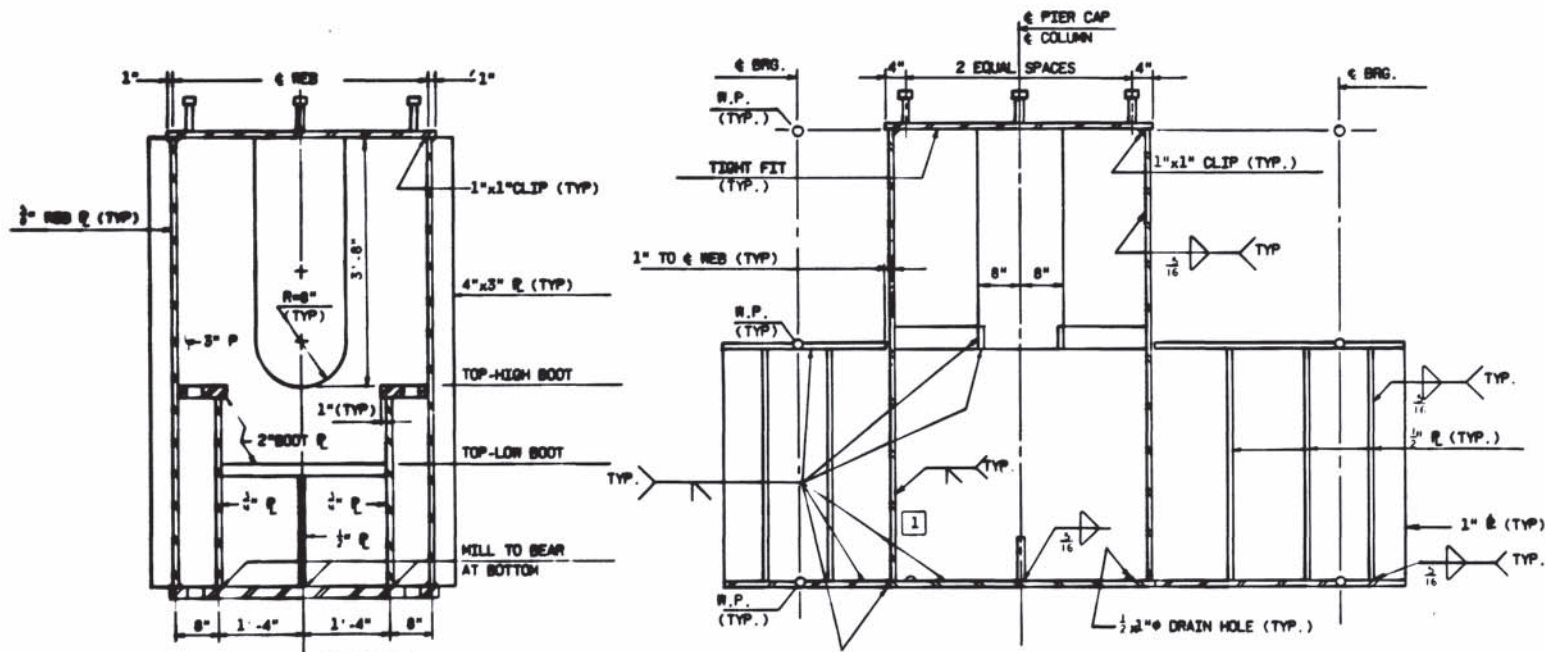


**SECTION F-F**  
S-149

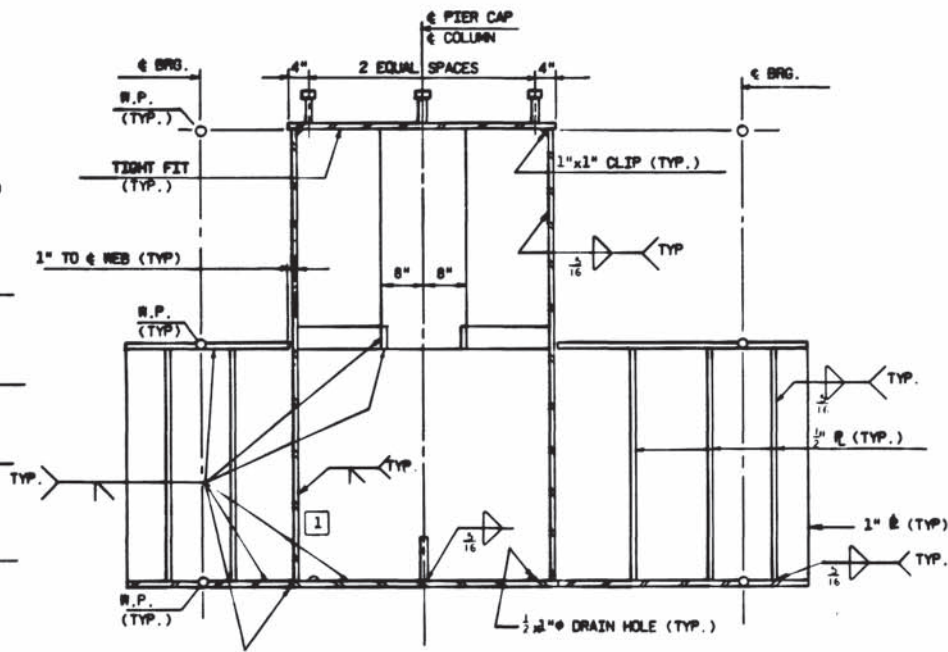


**SECTION D-D**  
S-149

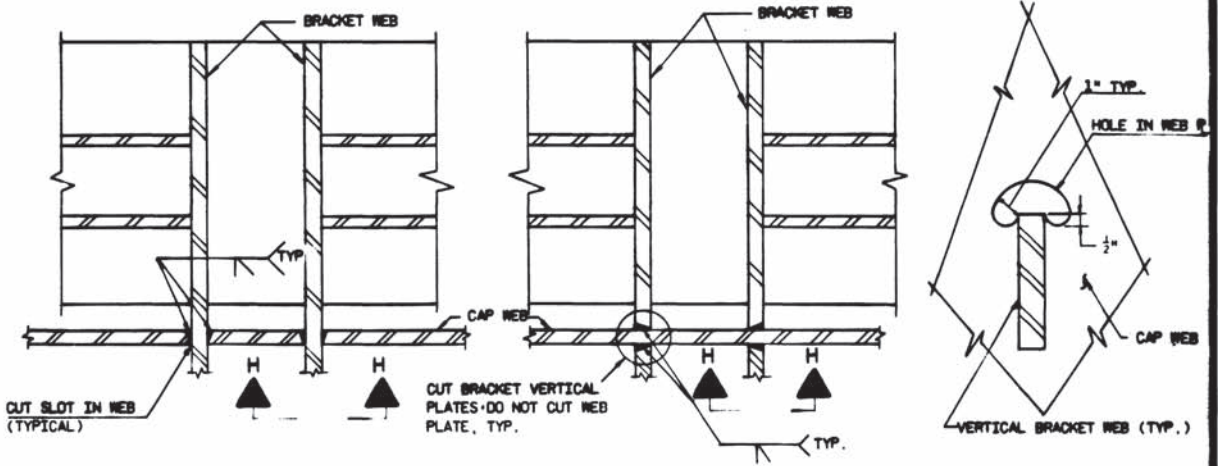
WASHINGTON METROPOLITAN  
AREA TRANSIT AUTHORITY  
**AS-BUILT CONDITION**  
MAY 03 1979  
ENGINEER DATE



**SECTION E-E**  
S-149



**SECTION G-G**  
S-149



- 1. **BOTTOM SECTION**  
ALL PIER CAPS EXCEPT AT INSIDE BEARING OF INBOUND GIRDER AT PIER A5403
- 1. **BOTTOM SECTION**  
CAP OF PIER A5403 AT INSIDE BEARING OF INBOUND GIRDER
- SECTION H-H**  
WEB RELIEF HOLE (SEE NOTES)

**TYPICAL BRACKET DETAILS**

- NOTES:**
- HOLE MAY BE BURNED OR DRILLED AND REAMED.
  - HOLE CONTOUR SHALL BE SMOOTH WITH NO SHARP BREAKS OR RE-ENTRANT SECTIONS.
  - FINISH OF THE HOLE SHALL BE AT LEAST COMPARABLE TO A GROUND FINISH.
  - PROVIDE AT TOP OF ALL VERTICAL BRACKET PLATES.

REFERENCE DRAWINGS		REVISIONS	
NUMBER	DESCRIPTION	DATE	BY
A13-S-100	COLUMN SCHEDULE AND DETAILS	10/14/78	CPL
A13-S-118	PIER CAP GEOMETRY LAYOUT		
A13-S-112	BEARING ASSEMBLIES		
A13-S-104	PIER CAP DETAILS		
A13-S-108	PIER CAP DETAILS		

**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

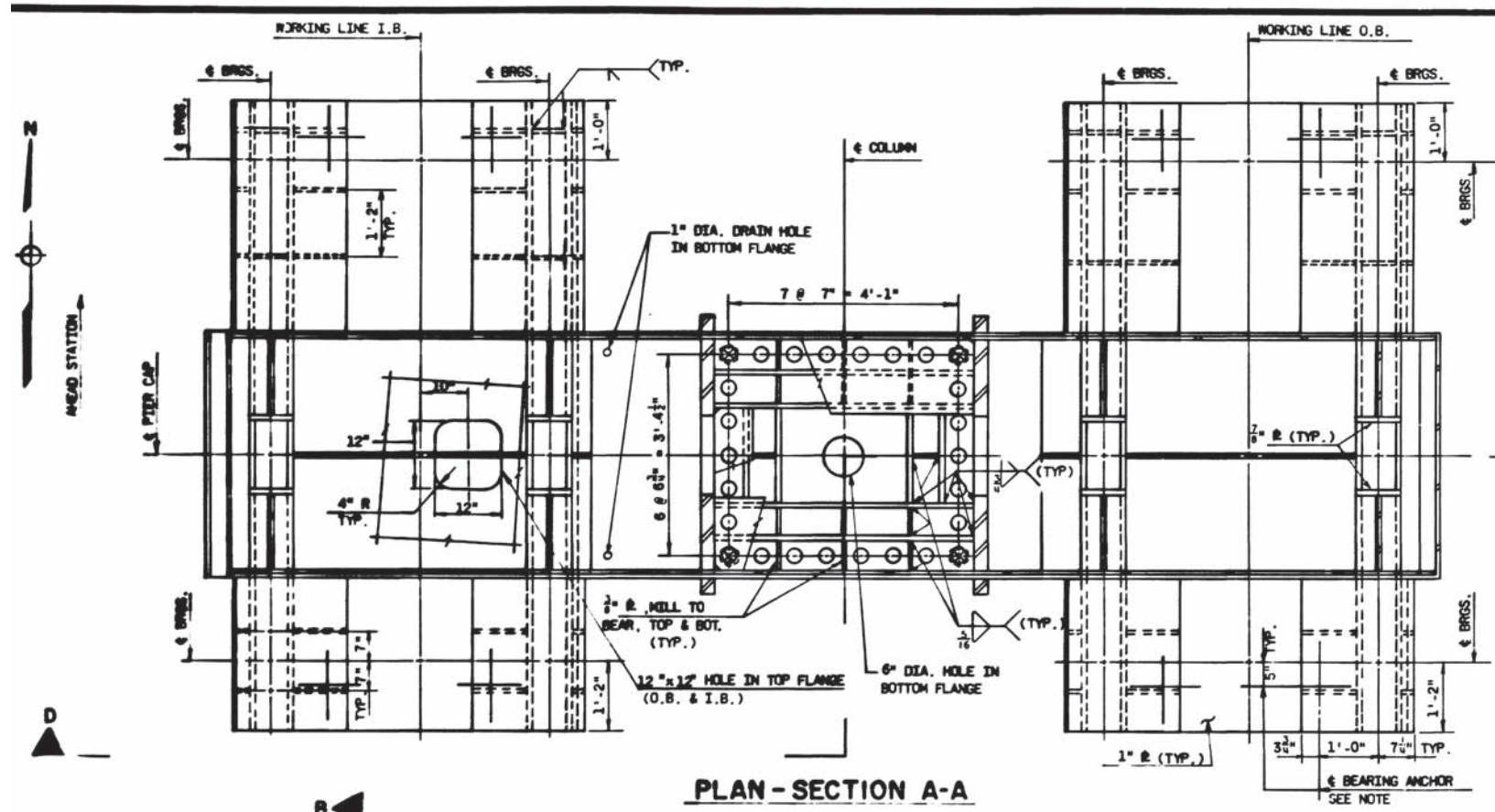
SECTION DESIGNER  
**BUCHART-HORN**  
CONSULTING ENGINEERS AND PLANNERS

DE LEUW, CATHIER & COMPANY  
GENERAL ENGINEERING CONSULTANT

HARRY WIEBE & ASSOCIATES  
GENERAL ARCHITECTURAL CONSULTANT

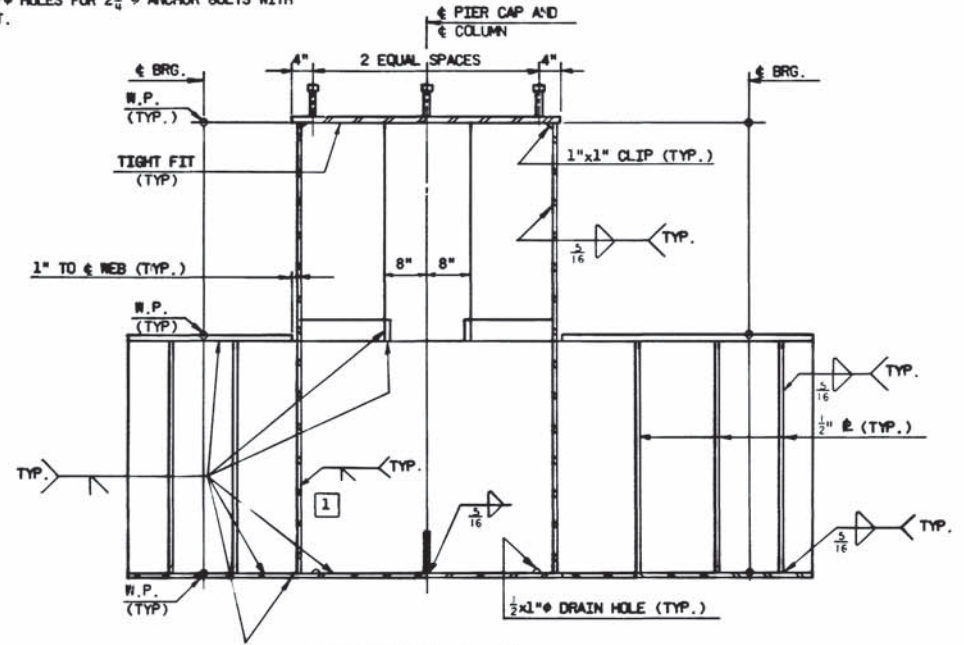
ROCKVILLE ROUTE  
AERIAL STRUCTURE  
PIER CAP DETAILS-PIER A5403

DRAWING NO. **A13-S-150**  
M220-296



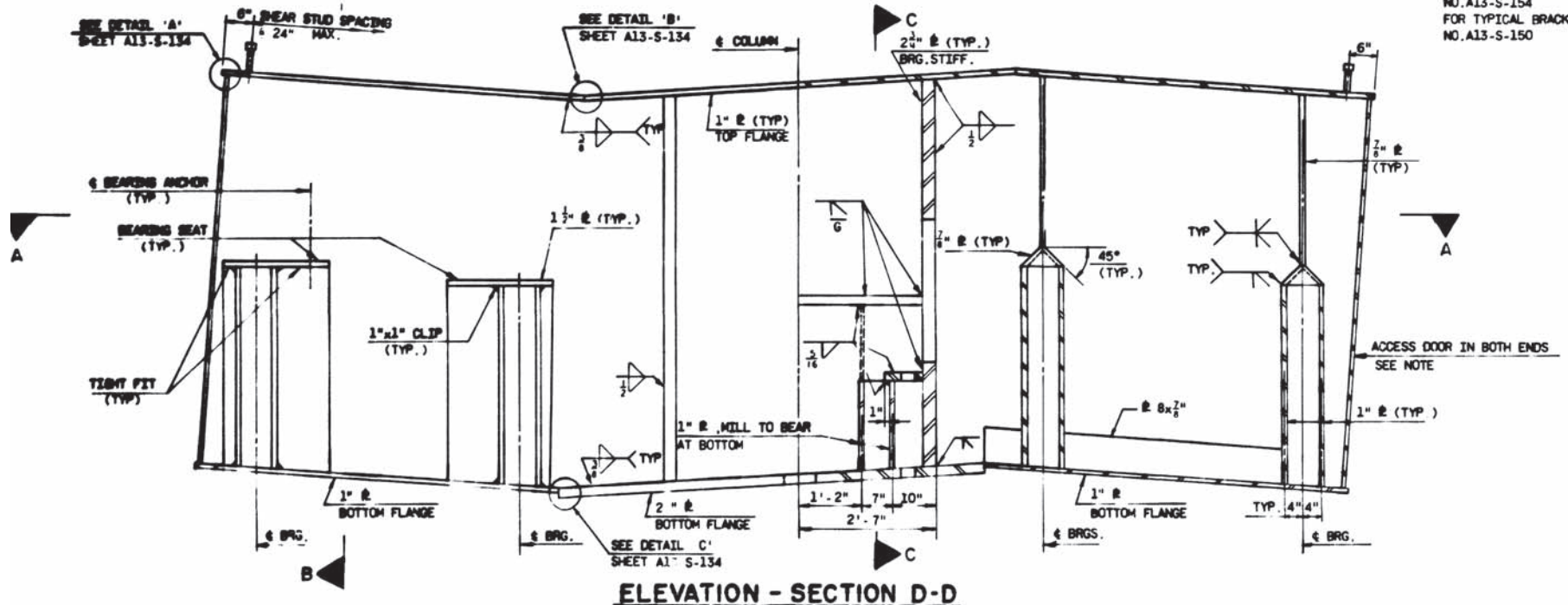
PLAN - SECTION A-A

- LEGEND:
- INDICATES 2 1/4" HOLES FOR 2 1/4" ANCHOR BOLTS.
  - ⊗ INDICATES 2 1/4" HOLES FOR 2 1/4" ANCHOR BOLTS WITH LEVELING NUT.

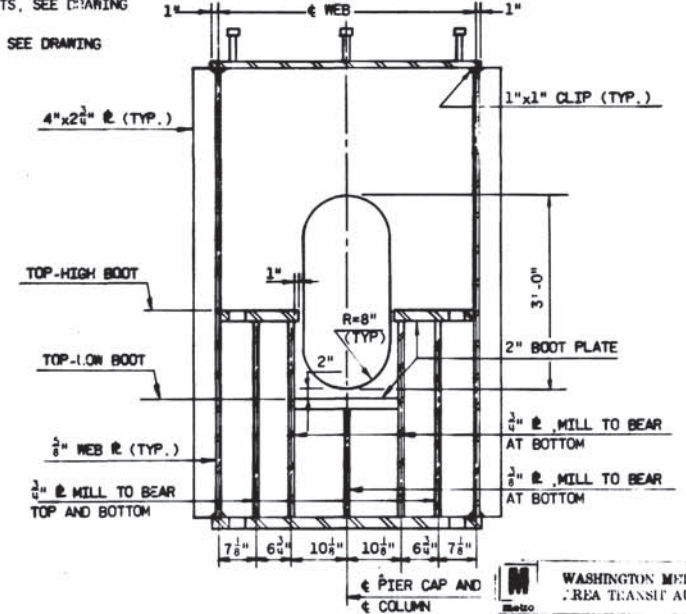


SECTION B-B

NOTE:  
 FOR GEOMETRY LAYOUT OF WORKING POINTS AND WORKING LINES, SEE DRAWING NO. A13-S-106 FOR ANCHOR BOLTS, ANCHOR PLATE DETAILS, AND ADDITIONAL NOTES, SEE DRAWING NO. A13-S-154 FOR ACCESS DOOR (BOTH ENDS), SEE DRAWING NOS. A13-S-154, AND A13-S-166. FOR SHEAR STUD CONNECTOR DETAILS, SEE DRAWING NO. A13-S-154 FOR BEARING ANCHOR, SEE DRAWING NO. A13-S-112 FOR SPIRAL AROUND ANCHOR BOLTS, SEE DRAWING NO. A13-S-154 FOR TYPICAL BRACKET DETAILS, SEE DRAWING NO. A13-S-150



ELEVATION - SECTION D-D



SECTION C-C

WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
 AS-BUILT CONDITION  
 Resident Engineer: [Signature] DATE: MAY 03 1978

REFERENCE DRAWINGS		REVISIONS	
NUMBER	DESCRIPTION	DATE	DESCRIPTION
A13-S-100	COLUMN SCHEDULE AND DETAILS	10/18/74 CPL	1 EXTEND VERTICAL BRACKET & THRU WEB & PER PCO #6
A13-S-104	PIER CAP GEOMETRY LAYOUT		
A13-S-112	BEARING ASSEMBLIES		
A13-S-104	PIER CAP DETAILS		
A13-S-104	PIER CAP DETAILS (DETAILS A, B & C)		
A13-S-100	PIER CAP DETAILS (BRACKET DETAILS)		



**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**BUCHART-HORN**  
 CONSULTING ENGINEERS AND PLANNERS

DE LEUW, CATHEN & COMPANY  
 GENERAL ENGINEERING CONSULTANT

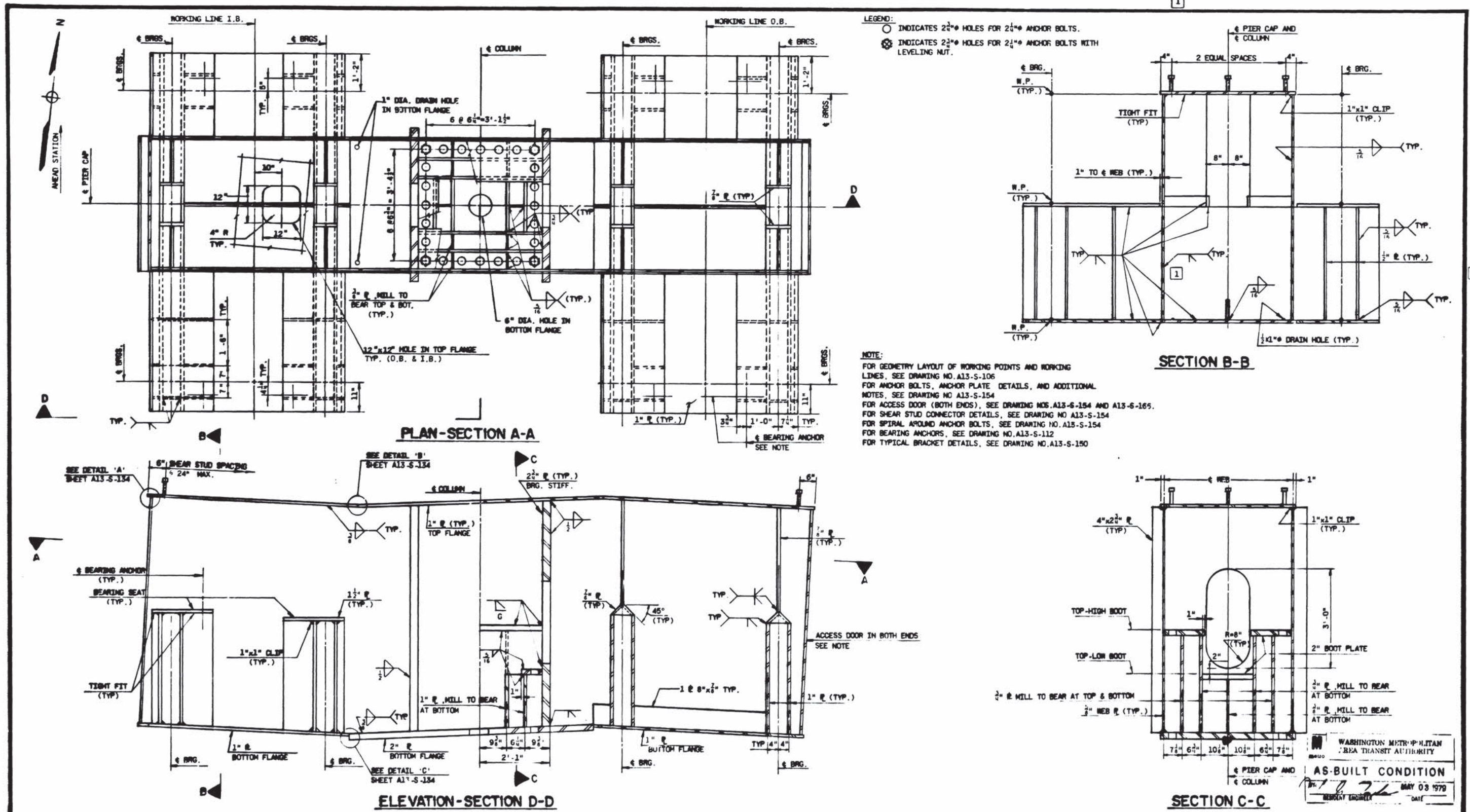
HARRY WEERE & ASSOCIATES  
 GENERAL ARCHITECTURAL CONSULTANT

SUBMITTED: [Signature]  
 APPROVED: [Signature]

**ROCKVILLE ROUTE**  
 AERIAL STRUCTURE  
 PIER CAP DETAILS - PIER A5392

SCALE: 3/4" = 1'-0"

DRAWING NO. A13-S-137  
 M220-297



REVISION	DATE	BY	DESCRIPTION
1	10/19/76	CPL	EXTEND VERTICAL BRACKET B THRU WEB & PER PG 98

NUMBER	DESCRIPTION
A13-S-140	COLUMN SCHEDULE AND DETAILS
A13-S-106	PIER CAP GEOMETRY LAYOUT
A13-S-112	BEARING ASSEMBLIES
A13-S-154	PIER CAP DETAILS
A13-S-154	PIER CAP DETAILS (DETAILS A, B & C)
A13-S-150	PIER CAP DETAILS (BRACKET DETAILS)

**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**BUCHART-HORN**  
 CONSULTING ENGINEERS AND PLANNERS

DE LEJW, CATHIER & COMPANY  
 GENERAL ENGINEERING CONSULTANT

HARRY WEESE & ASSOCIATES  
 GENERAL ARCHITECTURAL CONSULTANT

APPROVED: *[Signature]*

**ROCKVILLE ROUTE AERIAL STRUCTURE PIER CAP DETAILS-PIER A5376**

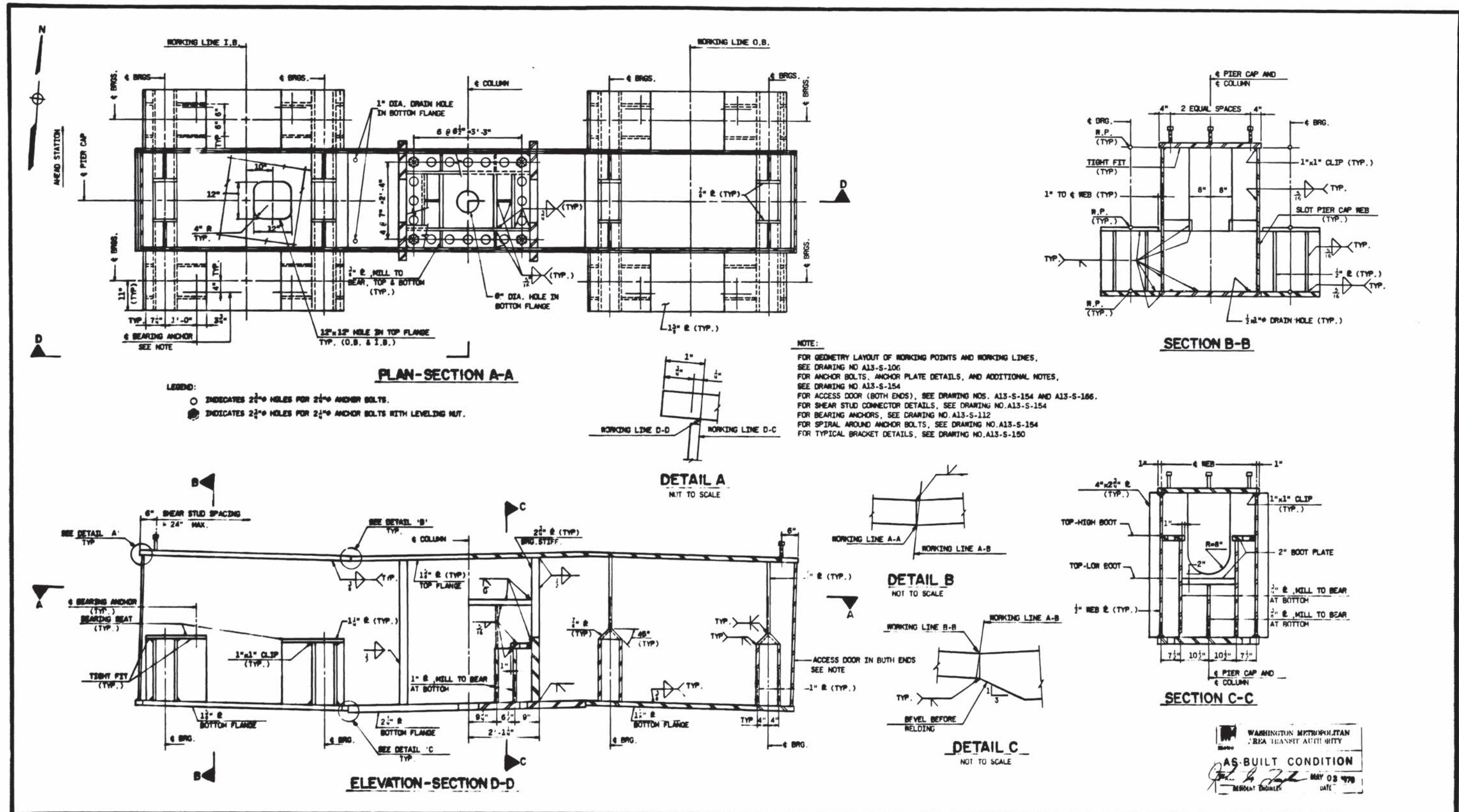
AS-BUILT CONDITION  
 MAY 03 1979  
 DATE

SCALE: 3/8" = 1'-0"

DRAWING NO. A13-S-138

M220-298





DESIGNED	DATE	NUMBER	DESCRIPTION	DATE	BY	DESCRIPTION
T.C.PAD	3/75	A13-S-106	COLUMN SCHEDULE AND DETAILS			
M.S. BUSH	3/75	A13-S-106	PIER CAP GEOMETRY LAYOUT			
J.P. SARANDAN	4/75	A13-S-106	PIER CAP DETAILS			
		A13-S-112	BEARING ASSEMBLIES			
		A13-S-154	PIER CAP DETAILS (BRACKET DETAILS)			

**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**BUCHART-HORN**  
CONSULTING ENGINEERS AND PLANNERS

SUBMITTED *[Signature]*

DE LEUW, CATHY & COMPANY  
GENERAL ENGINEERING CONSULTANT

HARRY WEISE & ASSOCIATES  
GENERAL ARCHITECTURAL CONSULTANT

APPROVED *[Signature]*

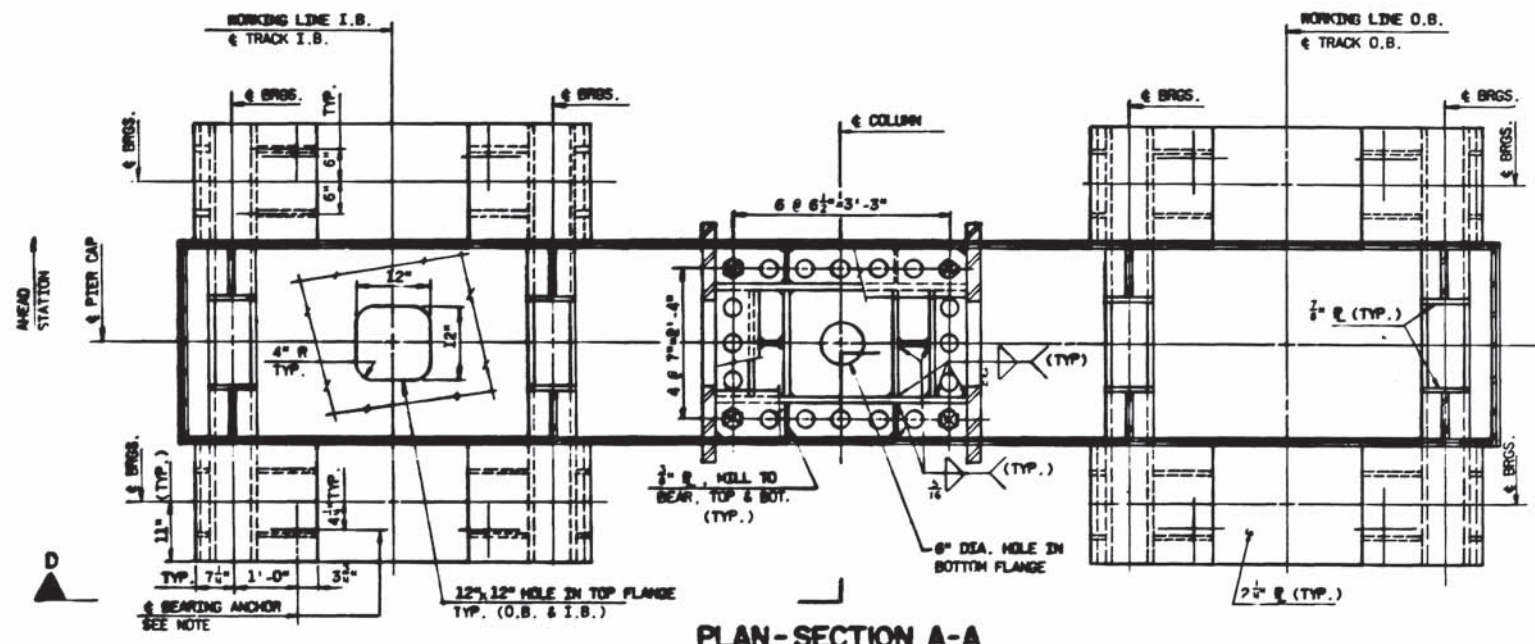
**ROCKVILLE ROUTE**  
AERIAL STRUCTURE  
PIER CAP DETAILS - PIERS A5345 AND A5366

SCALE: 1/4" = 1'-0"

DRAWING NO. A13-S-134

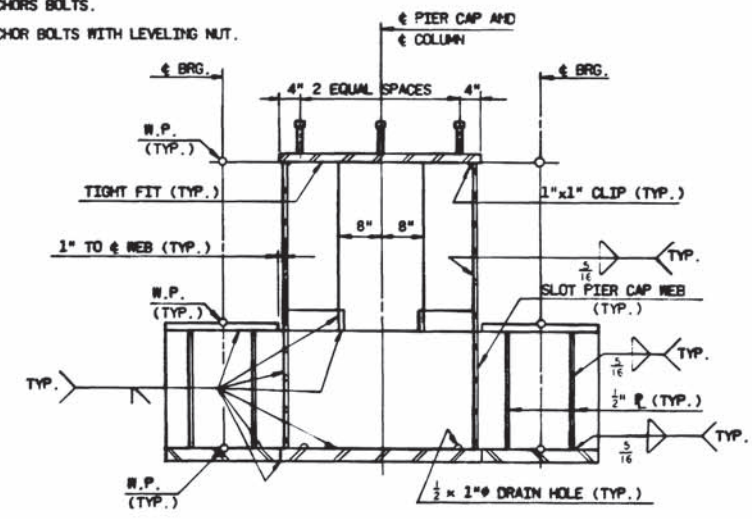
MAY 03 1978

M220-299

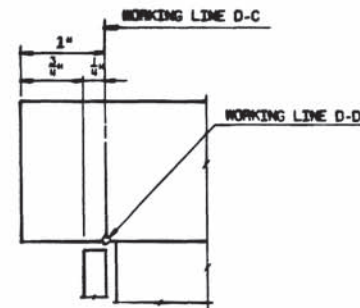


PLAN-SECTION A-A

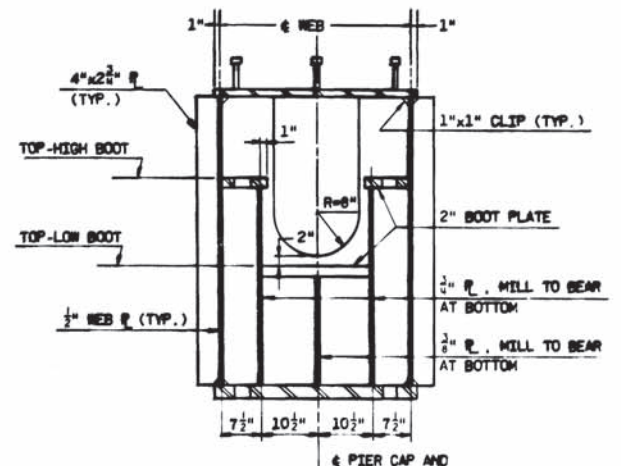
LEGEND:  
 ○ INDICATES 2 1/4" HOLES FOR 2 1/4" ANCHORS BOLTS.  
 ⊗ INDICATES 2 1/4" HOLES FOR 2 1/4" ANCHOR BOLTS WITH LEVELING NUT.



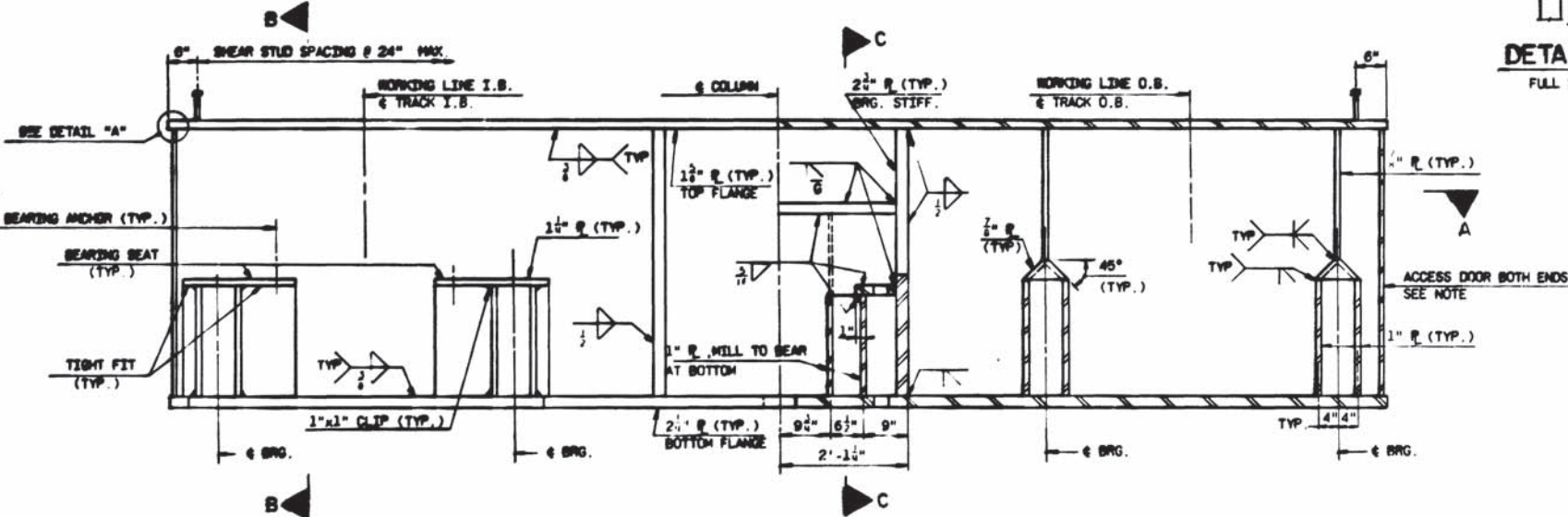
SECTION B-B



DETAIL A  
FULL SCALE



SECTION C-C



ELEVATION-SECTION D-D

NOTE:  
 FOR GEOMETRY LAYOUT OF WORKING POINTS AND WORKING LINES, SEE DRAWING NO. A13-S-92  
 FOR ANCHOR BOLTS, ANCHOR PLATE DETAILS, AND ADDITIONAL NOTES, SEE DRAWING NO. A13-S-154  
 FOR ACCESS DOOR (BOTH ENDS), SEE DRAWING NOS. A13-S-154 AND A13-S-166.  
 FOR SHEAR STUD CONNECTOR DETAILS, SEE DRAWING NO. A13-S-154  
 FOR BEARING ANCHORS, SEE DRAWING NO. A13-S-112  
 FOR SPIRAL AROUND ANCHOR BOLTS, SEE DRAWING NO. A13-S-154  
 FOR TYPICAL BRACKET DETAILS, SEE DRAWING NO. A13-S-150

WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
**AS-BUILT CONDITION**  
 MAY 03 1978  
 HARRY WEZBE & ASSOCIATES

DESIGNED	T.C. PAN	2/75
DRAWN	H.P. SHIPP	2/75
CHECKED	S.P. SARADAPPA	6/75
APPROVED	<i>[Signature]</i>	10/75

REFERENCE DRAWINGS		REVISIONS	
NUMBER	DESCRIPTION	DATE	BY
A13-S-140	COLUMN SCHEDULE AND DETAILS		
A13-S-92	PIER CAP GEOMETRY LAYOUT		
A13-S-154	PIER CAP DETAILS		
A13-S-112	BEARING ASSEMBLIES		
A13-S-150	PIER CAP DETAILS (BRACKET DETAILS)		

**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**BUCHART-HORN**  
 CONSULTING ENGINEERS AND PLANNERS

DE LEIJW, CATHAR & COMPANY  
 GENERAL ENGINEERING CONSULTANT

HARRY WEZBE & ASSOCIATES  
 GENERAL ARCHITECTURAL CONSULTANT

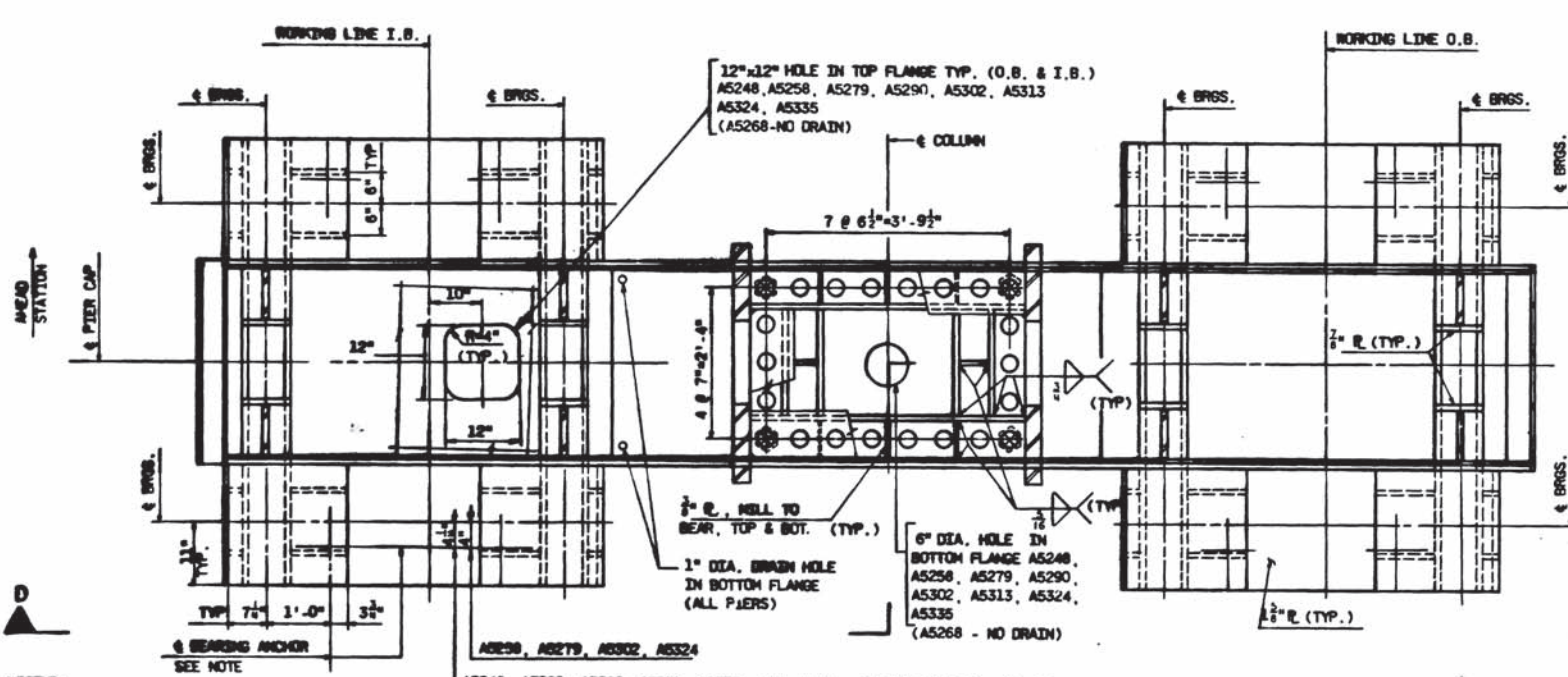
SUBMITTED *[Signature]* APPROVED *[Signature]*

**ROCKVILLE ROUTE AERIAL STRUCTURE**  
 PIER CAP DETAILS-PIER A5356

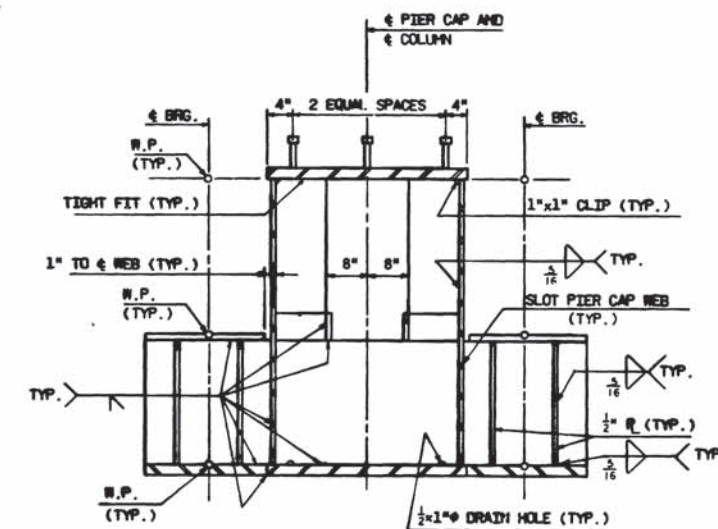
SCALE: 1/4" = 1'-0"

SHOWING NO. A13-S-129

M220-300

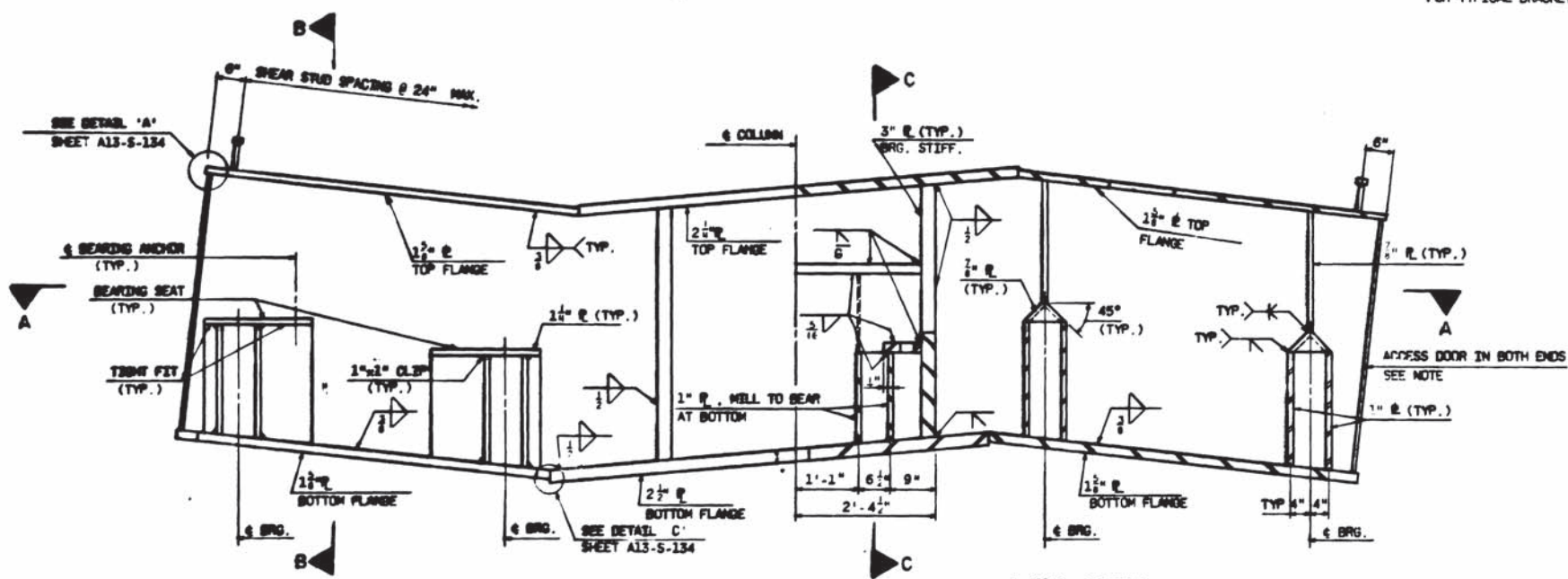


PLAN-SECTION A-A

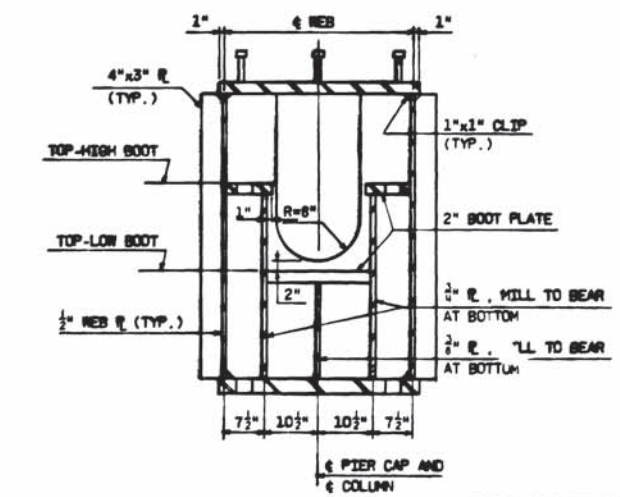


SECTION B-B

NOTE:  
 FOR GEOMETRY LAYOUT OF WORKING POINTS AND WORKING LINES, SEE DRAWING NO. A13-S-106  
 FOR ANCHOR BOLT, ANCHOR PLATE DETAILS, AND ADDITIONAL NOTES, SEE DRAWING NO. A13-S-154  
 FOR ACCESS DOOR (BOTH ENDS), SEE DRAWING NOS. A13-S-154 AND A13-S-166.  
 FOR SHEAR STUD CONNECTOR DETAILS, SEE DRAWING NO. A13-S-154  
 FOR BEARING ANCHORS, SEE DRAWING NO. A13-S-112  
 FOR SPIRAL AROUND ANCHOR BOLTS, SEE DRAWING NO. A13-S-154  
 FOR TYPICAL BRACKET DETAILS, SEE DRAWING NO. A13-S-150



ELEVATION-SECTION D-D



SECTION C-C

WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
 AS-BUILT CONDITION  
 DATE: 05/07/80

REVISIONS	NUMBER	DESCRIPTION	DATE	BY	DESCRIPTION
1	A13-S-100	CONCRETE SCHEDULE AND DETAILS			
2	A13-S-106	PIER CAP GEOMETRY LAYOUT			
3	A13-S-104	PIER CAP DETAILS			
4	A13-S-112	BEARING ASSEMBLIES			
5	A13-S-104	PIER CAP DETAILS (DETAILS A, B & C)			
6	A13-S-150	PIER CAP DETAILS (BRACKET DETAILS)			

**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**BUCHART-HORN**  
 CONSULTING ENGINEERS AND PLANNERS

DE LEJW, CATHEN & COMPANY  
 GENERAL ENGINEERING CONSULTANT

HARRY WEISE & ASSOCIATES  
 GENERAL ARCHITECTURAL CONSULTANT

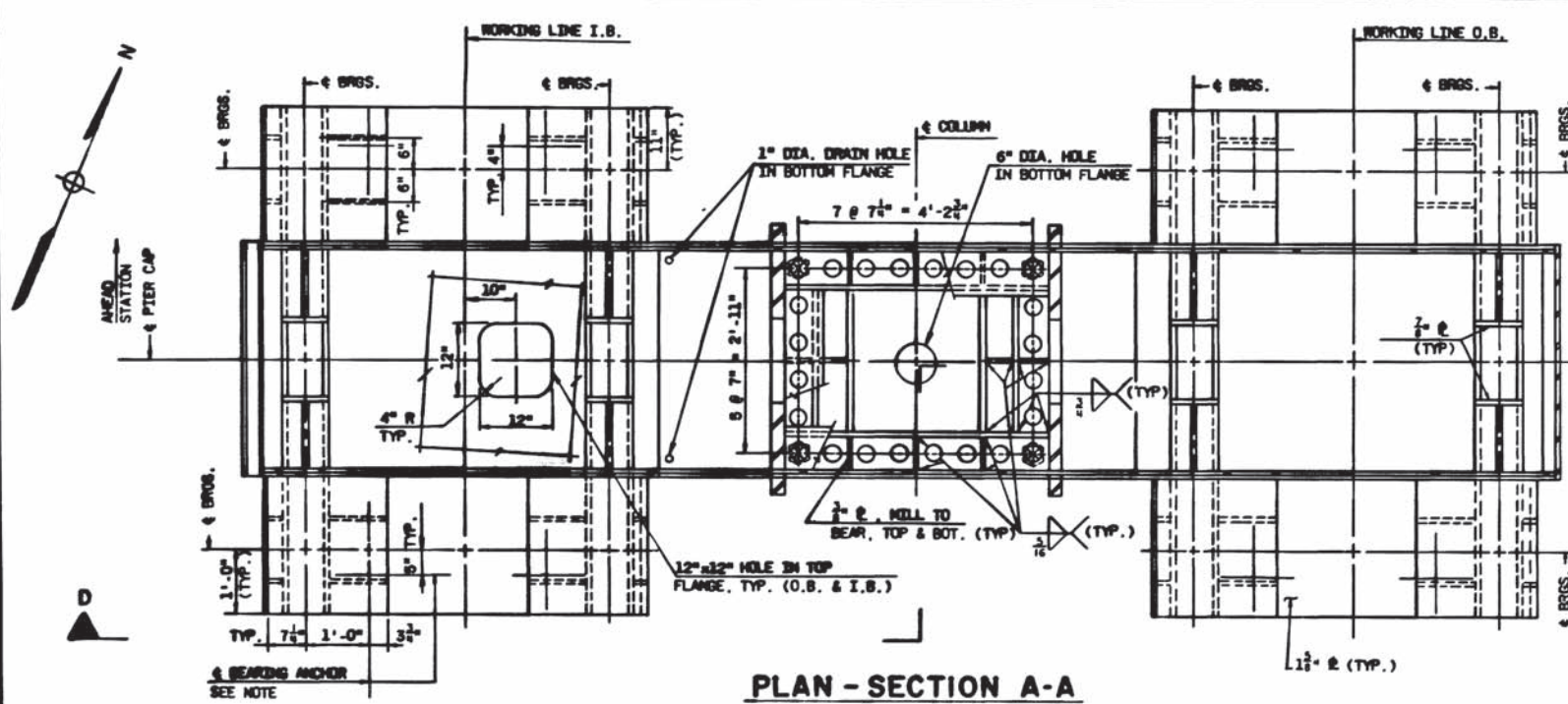
DATE: 05/07/80

**ROCKVILLE ROUTE**  
 AERIAL STRUCTURE  
 PIER CAP DETAILS  
 PIERS A5248, A5258, A5268, A5279  
 A5290, A5302, A5313, A5324, A5335

SCALE: 3/4" = 1'-0"

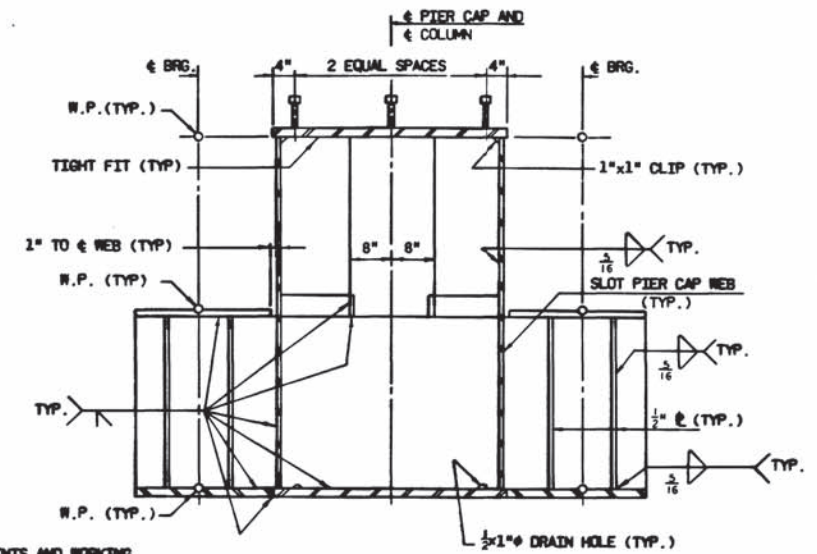
DRAWING NO. A13-S-133

M220-301



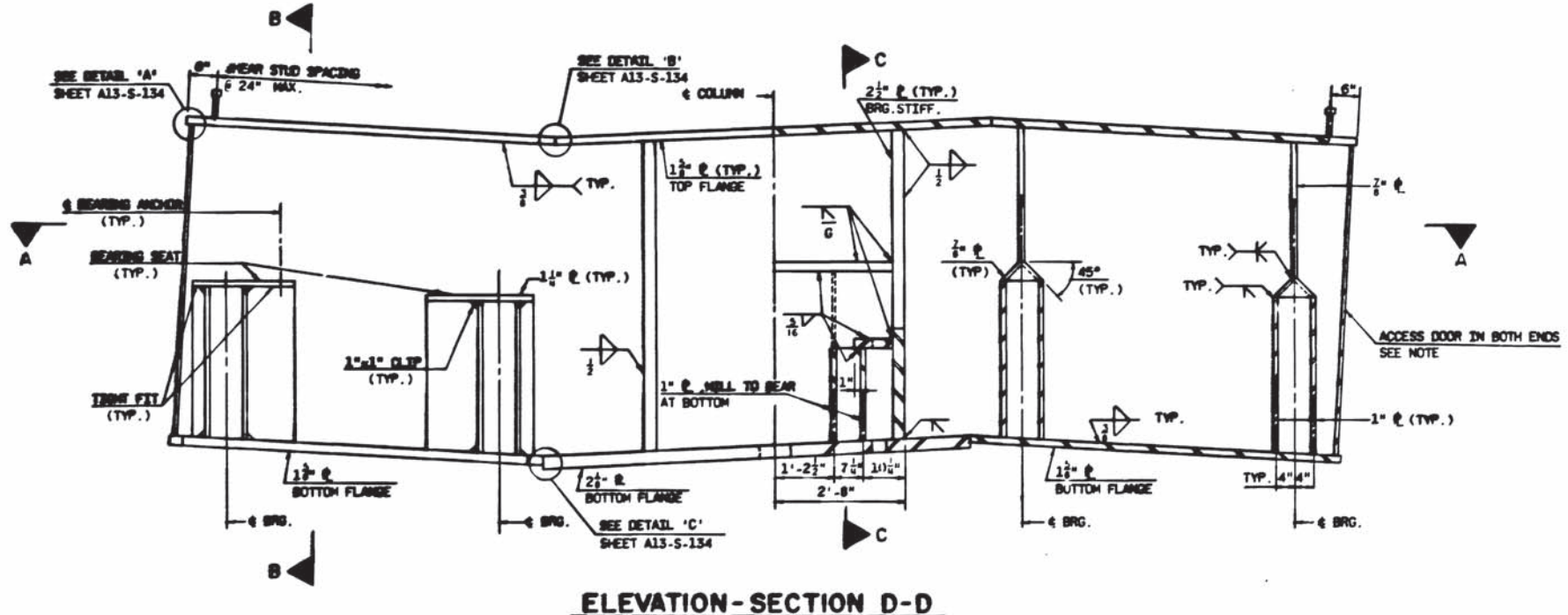
PLAN - SECTION A-A

**LEGEND:**  
 ○ INDICATES 2 1/4" HOLES FOR 2 1/4" ANCHOR BOLTS.  
 ⊗ INDICATES 2 1/4" HOLES FOR 2 1/4" ANCHOR BOLTS WITH LEVELING NUT.

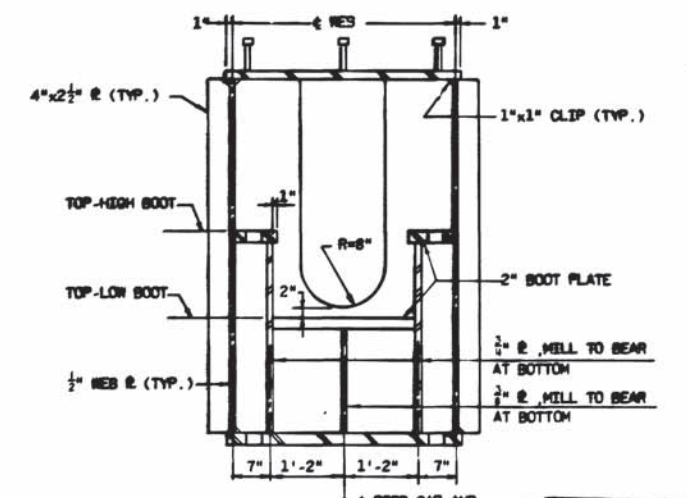


SECTION B-B

**NOTE:**  
 FOR GEOMETRY LAYOUT OF WORKING POINTS AND WORKING LINES, SEE DRAWING NO.A13-S-106  
 FOR ANCHOR BOLTS, ANCHOR PLATE DETAILS, AND ADDITIONAL NOTES, SEE DRAWING NO.A13-S-154  
 FOR ACCESS DOOR (BOTH ENDS), SEE DRAWING NOS.A13-S-154 AND A13-S-166.  
 FOR SHEAR STUD CONNECTOR DETAILS, SEE DRAWING NO.A13-S-154  
 FOR BEARING ANCHORS, SEE DRAWING NO.A13-S-112  
 FOR SPIRAL AROUND ANCHOR BOLTS SEE DRAWING NO.A13-S-154  
 FOR TYPICAL BRACKET DETAILS, SEE DRAWING NO.A13-S-150



ELEVATION - SECTION D-D



SECTION C-C

WASHINGTON METROPOLITAN  
 AREA TRANSIT AUTHORITY  
**AS-BUILT CONDITION**  
 MAY 03 1978  
 DATE

REVISIONS	REFERENCE DRAWINGS		REVISIONS	
	NUMBER	DESCRIPTION	DATE	BY
	A13-S-140	COLUMN SCHEDULE AND DETAILS		
	A13-S-106	PIER CAP GEOMETRY LAYOUT		
	A13-S-154	PIER CAP DETAILS		
	A13-S-112	BEARING ASSEMBLIES		
	A13-S-139	PIER CAP DETAILS (DETAILS A, B & C)		
	A13-S-150	PIER CAP DETAILS (BRACKET DETAILS)		

**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**BUCHART-HORN**  
 CONSULTING ENGINEERS AND PLANNERS

DE LEUW, CATHIER & COMPANY  
 GENERAL ENGINEERING CONSULTANT

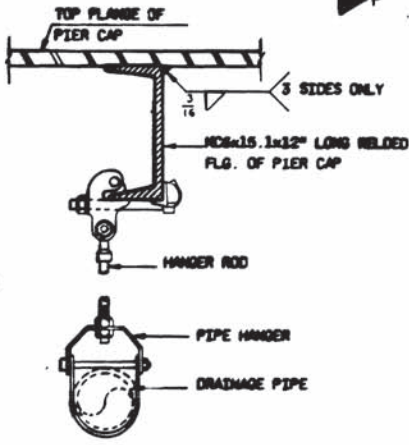
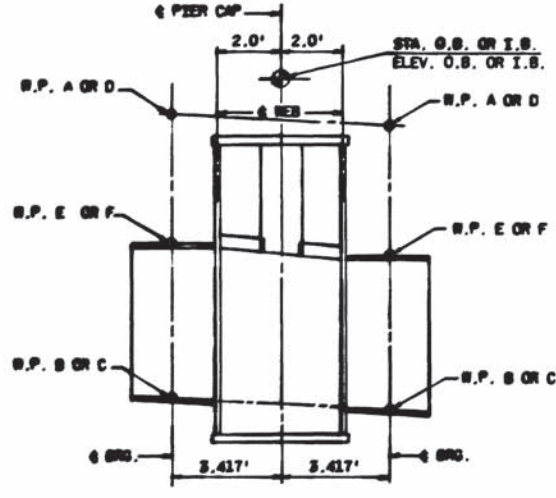
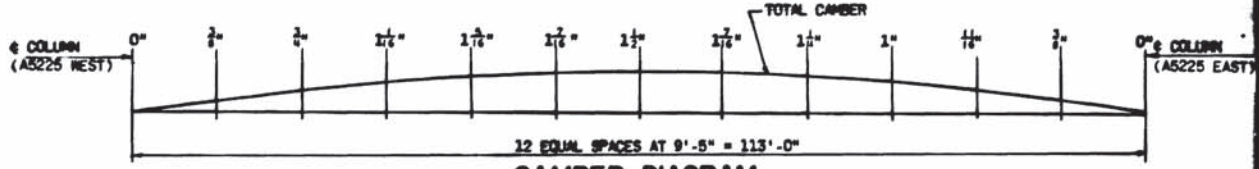
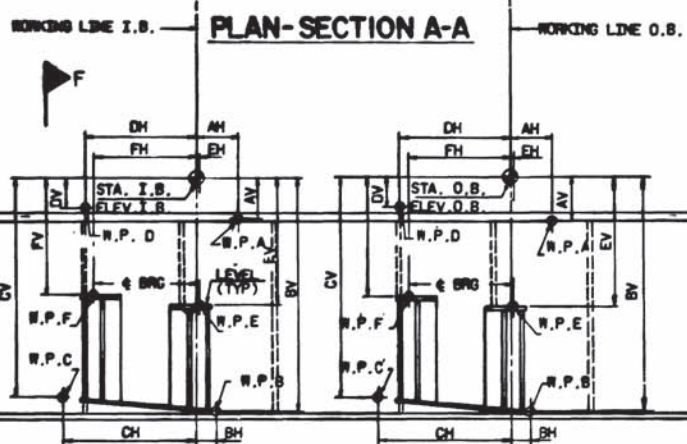
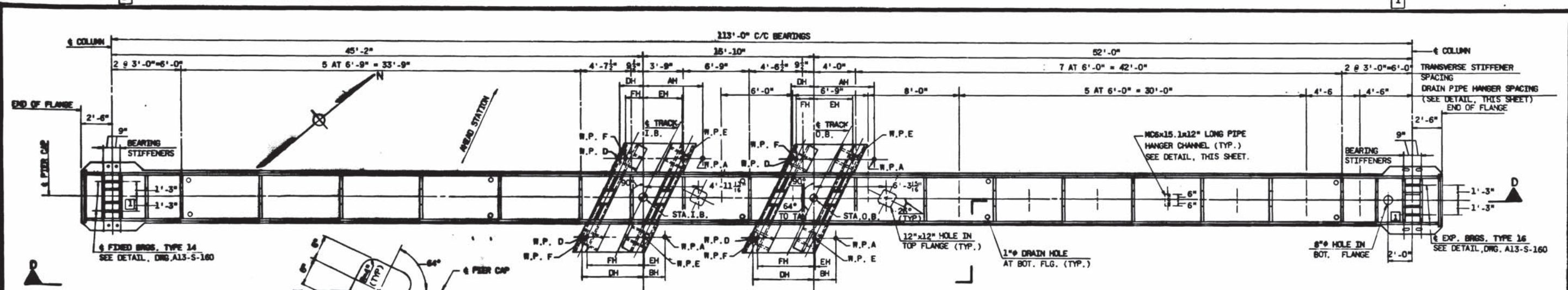
HARRY WEISER & ASSOCIATES  
 GENERAL ARCHITECTURAL CONSULTANTS

DATE: 5/75

**ROCKVILLE ROUTE**  
 AERIAL STRUCTURE  
 PIER CAP DETAILS-PIER A5238

SCALE: 3/4" = 1'-0"

DRAWING NO. A13-S-136  
 M220-302



**NOTE:**  
 ENDS OF CAP, BEARING STIFFENERS AND BRACKET SUPPORT PLATES SHALL BE VERTICAL AFTER APPLICATION OF FULL DEAD LOAD.  
 CAP SHALL BE A STRAIGHT SLOPE BETWEEN END ELEVATIONS SHOWN.  
 FOR ACCESS DOOR (BOTH SIDES) DETAILS, SEE DRG. NOS. A13-S-154 AND A13-S-166.

WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
**AS-BUILT CONDITION**  
 MAY 09 1979

\* ELEVATIONS AND GEOMETRY AS SHOWN ARE FINAL UNDER FULL DEAD LOAD WITH ALL THEORETICAL DEAD LOAD CAMBER DEFLECTED OUT.

GEOMETRY														
O.B. AND I.B.	STATION AND ELEVATION	LOCATION	DIMENSIONS (FEET)											
			AV	BV	CV	DV	EV	FV	AH	BH	CH	DH	EH	FH
O.B.	522+52	BACK	2.034	10.993	10.368	1.410	5.988	5.543	1.950	0.883	6.303	5.236	0.053	4.837
O.B.	265.278	AHEAD	1.869	10.828	10.202	1.244	5.803	5.377	5.288	4.219	2.976	1.908	3.369	1.508
I.B.	522+45.94	BACK	2.035	10.994	10.370	1.412	5.970	5.545	1.956	0.890	6.287	5.222	0.061	4.823
I.B.	265.156	AHEAD	1.867	10.826	10.201	1.243	5.802	5.376	5.274	4.206	2.980	1.913	3.378	1.514

DESIGNED	DATE	REFERENCE DRAWINGS	REVISIONS
S.T. WILSON	4/75	A13-S-140 COLUMN SCHEDULE AND DETAILS	
S. PARDOLINO	4/75	A13-S-154 PIER CAP DETAILS	
C.P. LEE	5/75	A13-S-112 BEARING ADDENDUMS	
		A13-S-153 BEARING ADDENDUMS	
		A13-S-160 PIER CAP DETAILS - PIER A5225	
		A13-S-160 PIER CAP DETAILS (BRACKET DETAILS)	



**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**BUCHART-HORN**  
 CONSULTING ENGINEERS AND PLANNERS

DE LEIJW, CATHIER & COMPANY  
 GENERAL ENGINEERING CONSULTANT

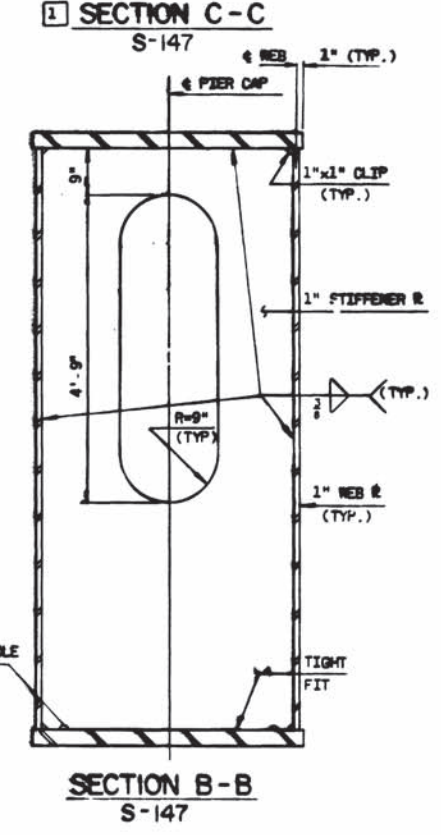
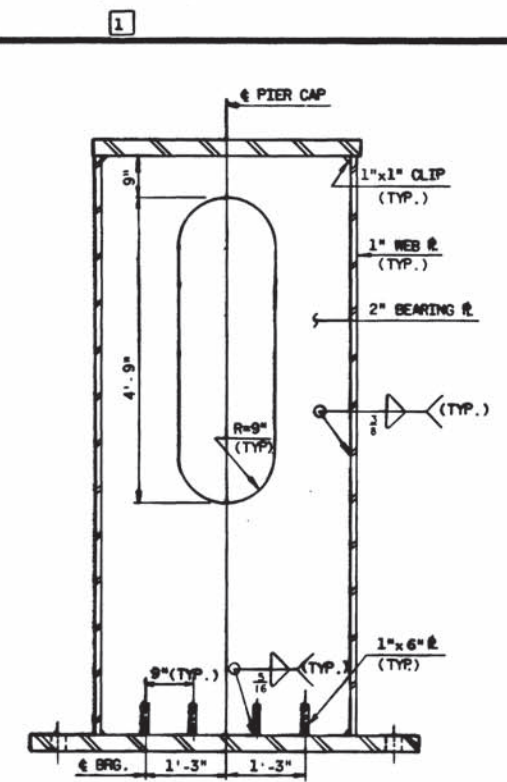
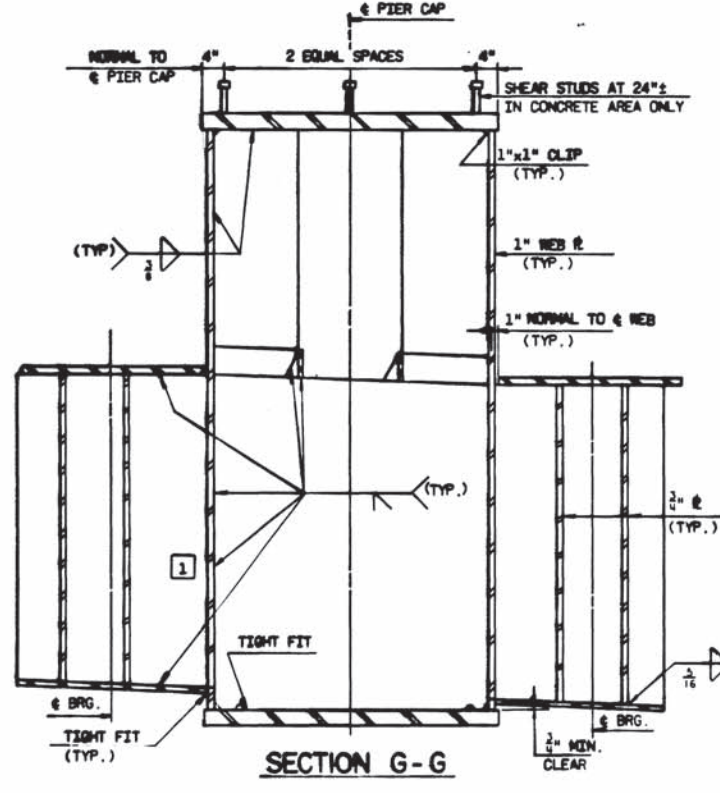
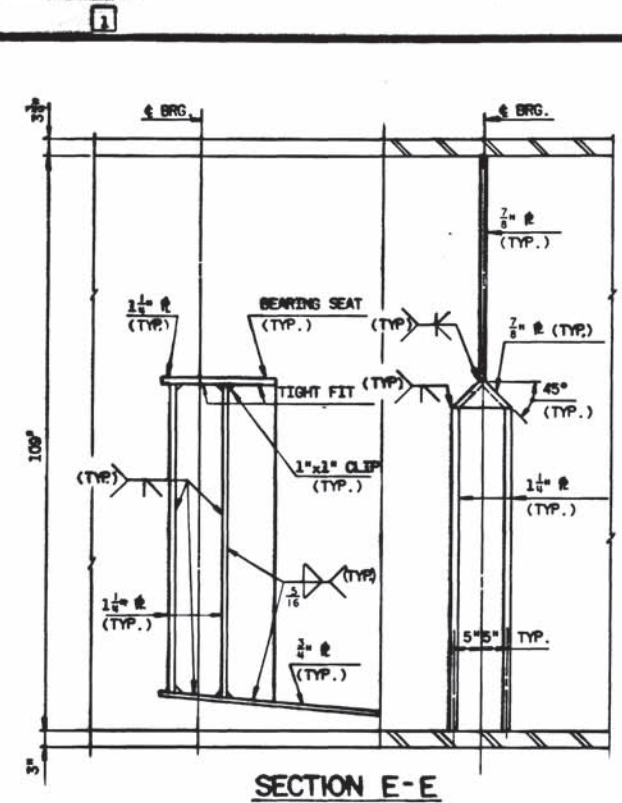
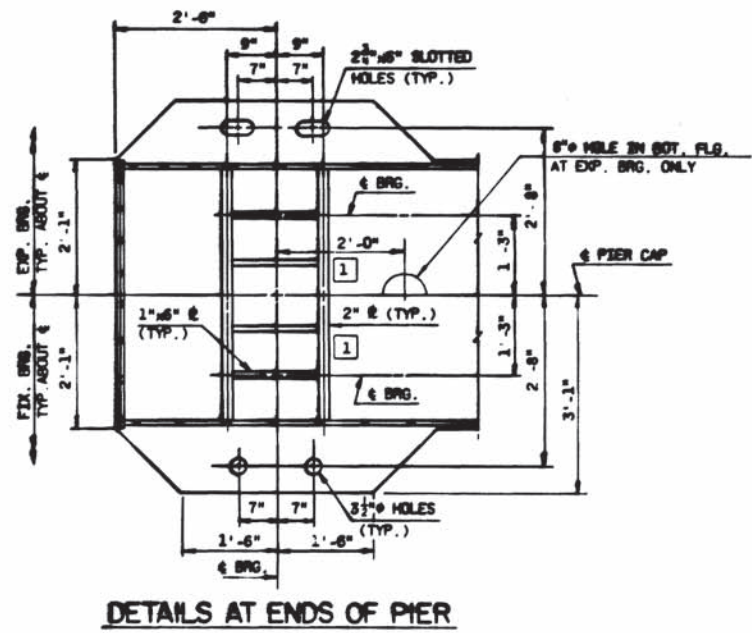
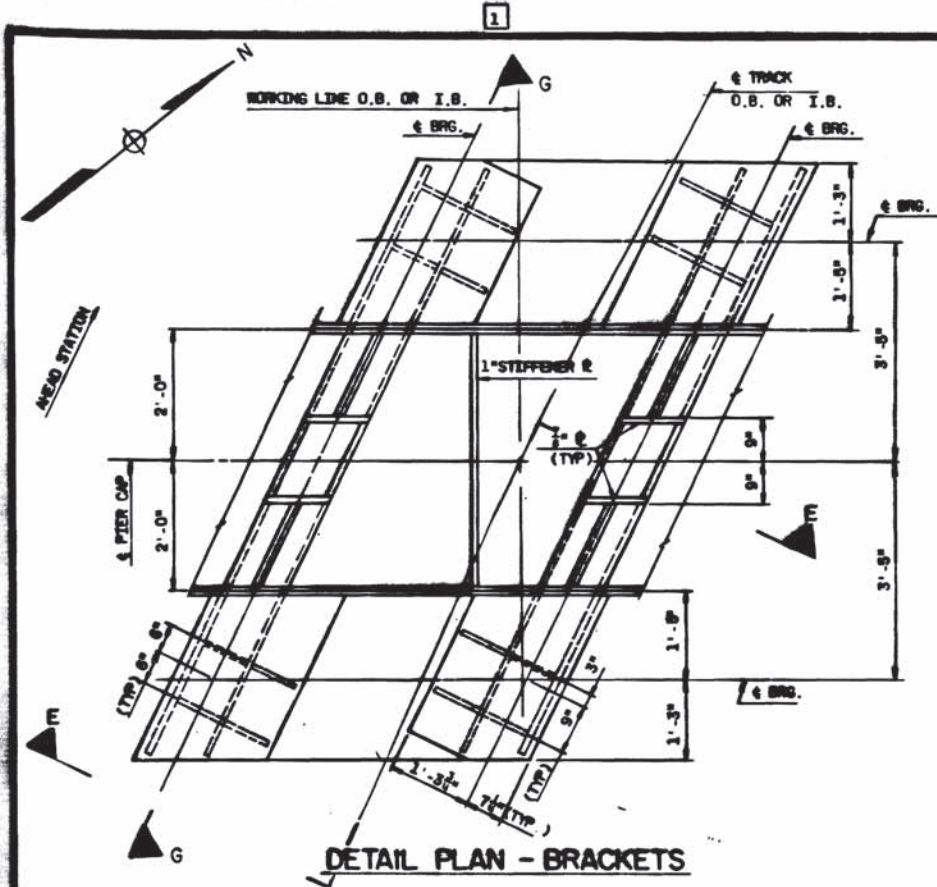
HARRY WISSE & ASSOCIATES  
 GENERAL ARCHITECTURAL CONSULTANT

**ROCKVILLE ROUTE**  
 AERIAL STRUCTURE  
 PIER CAP DETAILS - PIER A5225

SCALE: 1" = 1'-0"

DRAWING NO.: **A13-S-147**

M220-303



WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
**AS-BUILT CONDITION**  
 DATE: MAY 03 1978  
 DRAWN BY: [Signature]

DESIGNED		REFERENCE DRAWINGS		REVISIONS	
D.T. WILHELM	6/75	NUMBER	DESCRIPTION	DATE	BY
M.B. BRINK	6/75	A13-S-147	PIER CAP DETAILS - PIER A5225	10/18/76	CPL
C.P. LEE	6/75				
REVISIONS: (1) EXTEND VERTICAL BRACKET & THRU WEB & AND CHANGE BRG. STIFF. SIZE PER PCO					

**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**BUCHART-HORN**  
 CONSULTING ENGINEERS AND PLANNERS

DE LEUW, CATHY & COMPANY  
 GENERAL ENGINEERING CONSULTANT

HARRY WEBER & ASSOCIATES  
 GENERAL ARCHITECTURAL CONSULTANT

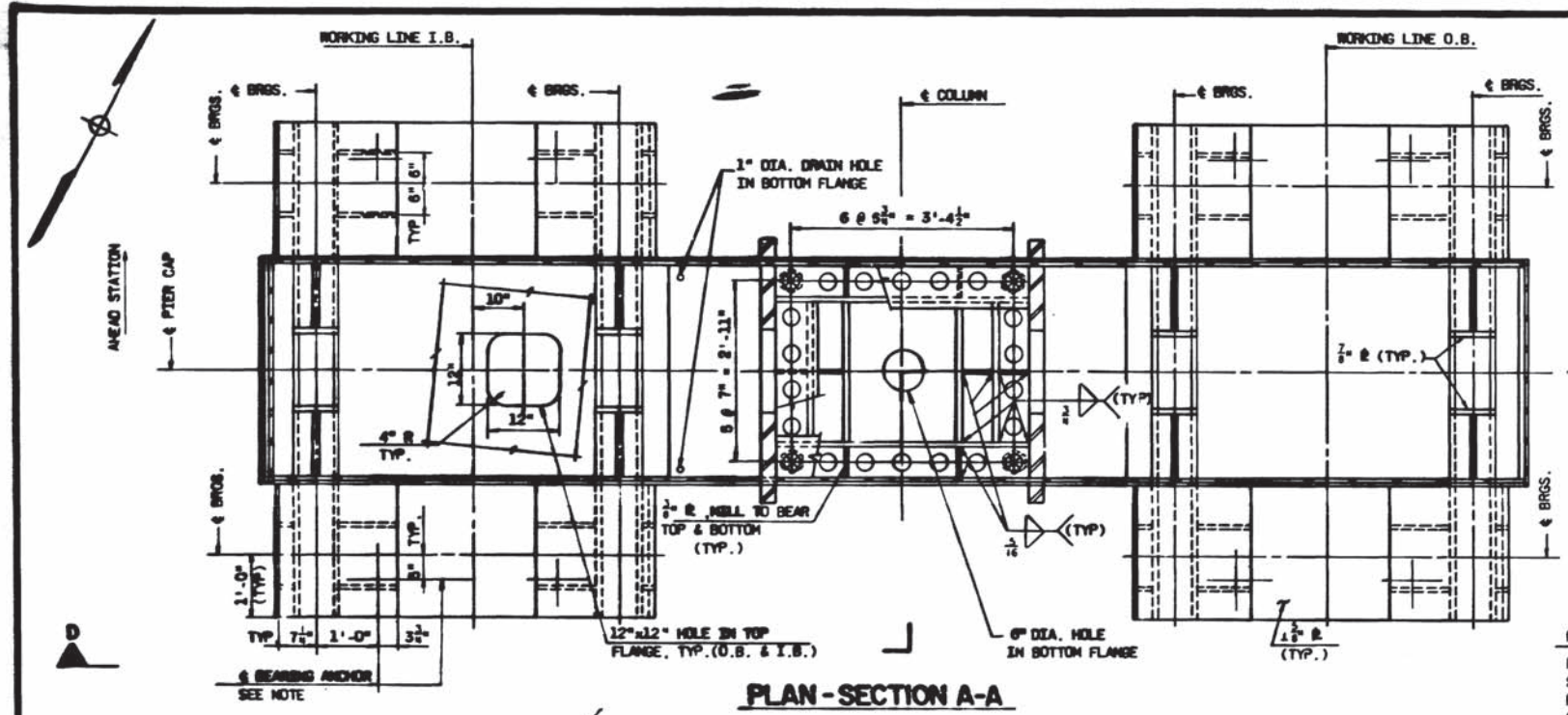
APPROVED: [Signature]

**ROCKVILLE ROUTE**  
 AERIAL STRUCTURE  
 PIER CAP DETAILS - PIER A5225

SCALE: 1/2" = 1'-0"

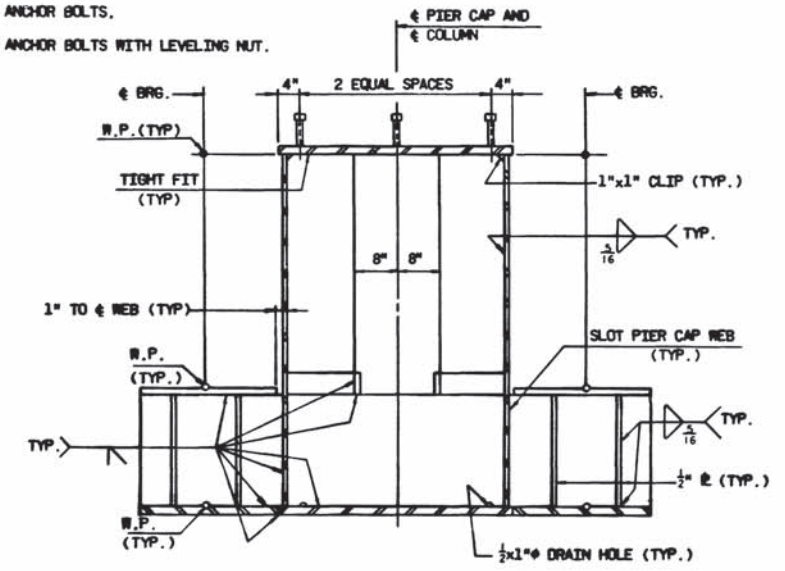
DRAWING NO. A13-S-160

M220-304



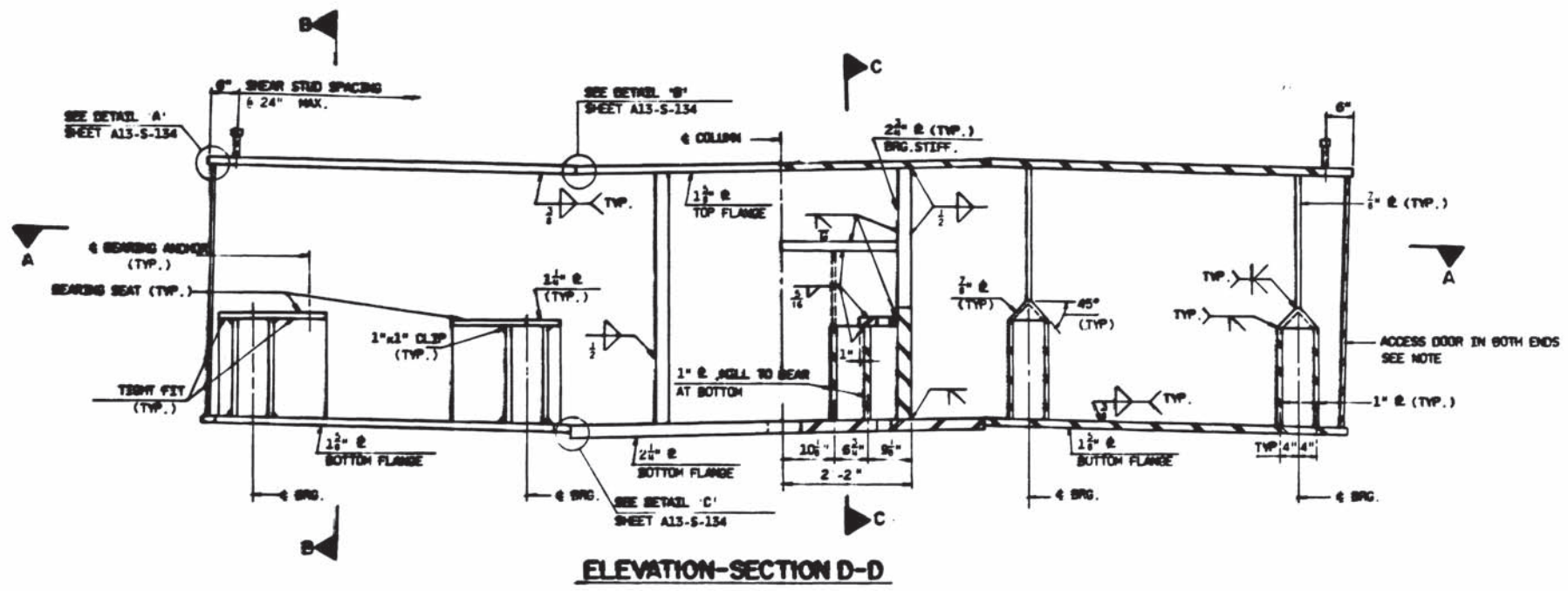
PLAN-SECTION A-A

LEGEND:  
 ○ INDICATES 2 1/4" HOLES FOR 2 1/4" ANCHOR BOLTS.  
 ⊗ INDICATES 2 1/4" HOLES FOR 2 1/4" ANCHOR BOLTS WITH LEVELING NUT.

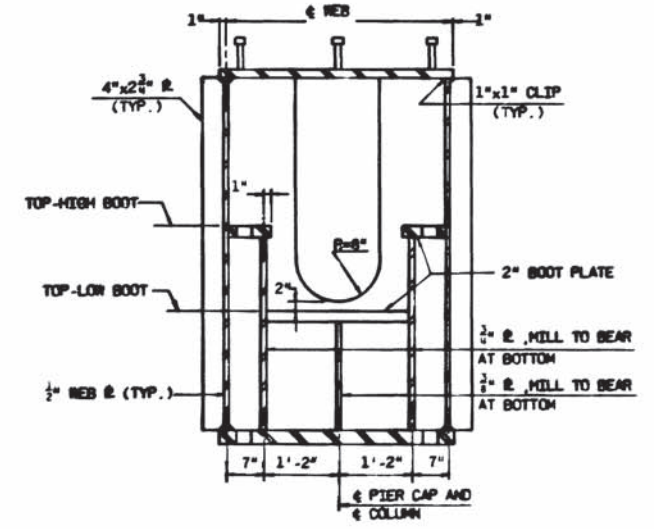


SECTION B-B

NOTE:  
 FOR GEOMETRY LAYOUT OF WORKING POINTS AND WORKING LINES, SEE DRAWING NO. A13-S-106.  
 FOR ANCHOR BOLTS, ANCHOR PLATE DETAILS, AND ADDITIONAL NOTES, SEE DRAWING NO. A13-S-154.  
 FOR ACCESS DOOR (BOTH ENDS), SEE DRAWING NOS. A13-S-154 AND A13-S-166.  
 FOR SHEAR STUD CONNECTOR DETAILS, SEE DRAWING NO. A13-S-154.  
 FOR BEARING ANCHORS, SEE DRAWING NO. A13-S-112.  
 FOR SPIRAL AROUND ANCHOR BOLTS, SEE DRAWING NO. A13-S-154.  
 FOR TYPICAL BRACKET DETAILS, SEE DRAWING NO. A13-S-150.



ELEVATION-SECTION D-D



SECTION C-C

WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
 AS-BUILT CONDITION  
 DATE 03/1979

DESIGNED	DATE	NUMBER	DESCRIPTION	DATE	BY	DESCRIPTION
Y.C.P.M.	8/75	A12-S-140	COLUMN SCHEDULE AND DETAILS			
DRAWN	8/75	A13-S-104	PIER CAP GEOMETRY LAYOUT			
CHECKED	8/75	A13-S-112	BEARING ANCHORS			
APPROVED	8/75	A13-S-104	PIER CAP DETAILS			
		A13-S-106	PIER CAP DETAILS (DETAILS A, B & C)			
		A13-S-150	PIER CAP DETAILS (BRACKET DETAILS)			

**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**BUCHART-HORN**  
 CONSULTING ENGINEERS AND PLANNERS

DE LEUW, CATHER & COMPANY  
 GENERAL ENGINEERING CONSULTANTS

HARRY WEBER & ASSOCIATES  
 GENERAL ARCHITECTURAL CONSULTANTS

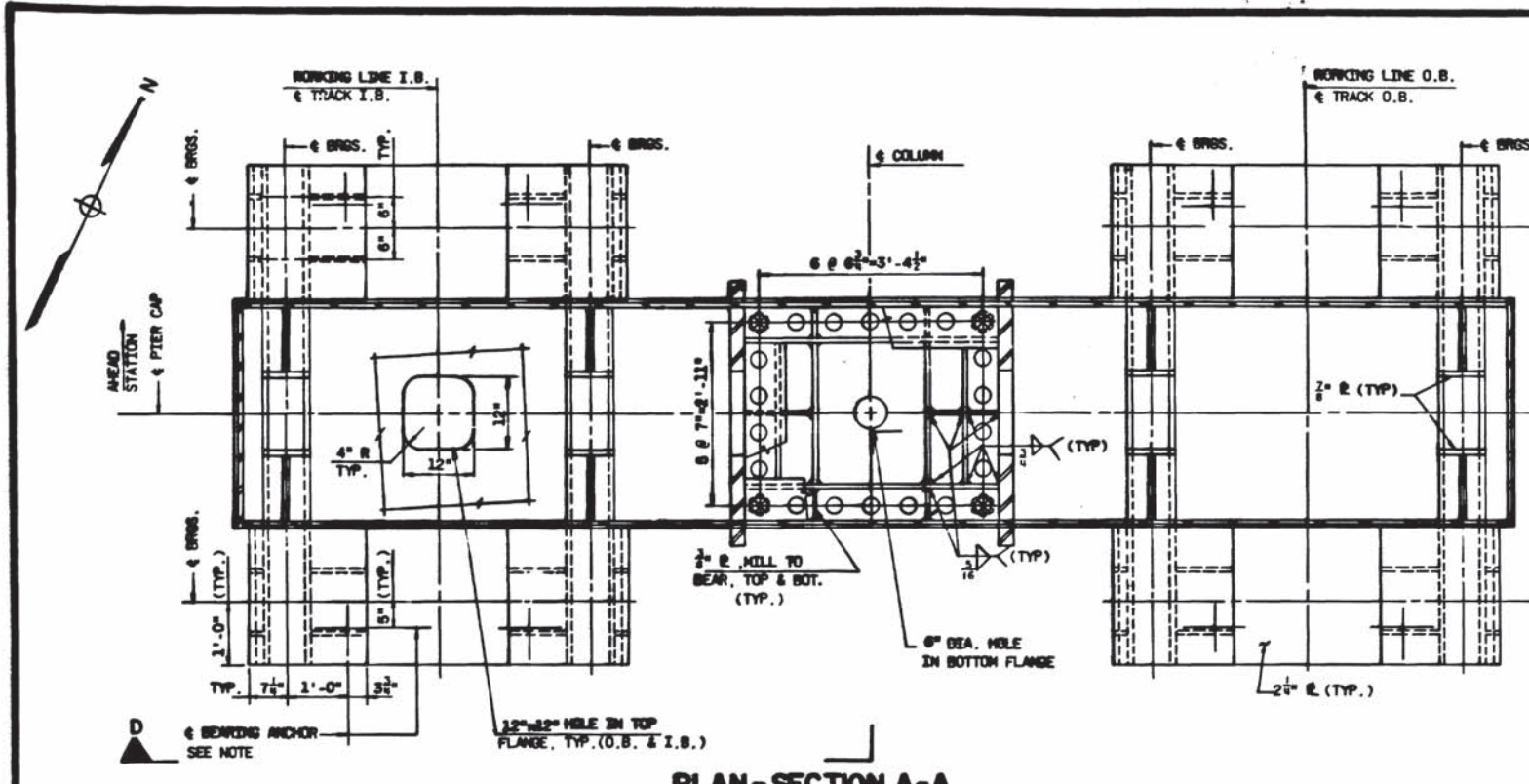
APPROVED: *[Signature]*

**ROCKVILLE ROUTE**  
 AERIAL STRUCTURE  
 PIER CAP DETAILS-PIERS A5199 & A5212

SCALE: 1/2" = 1'-0"

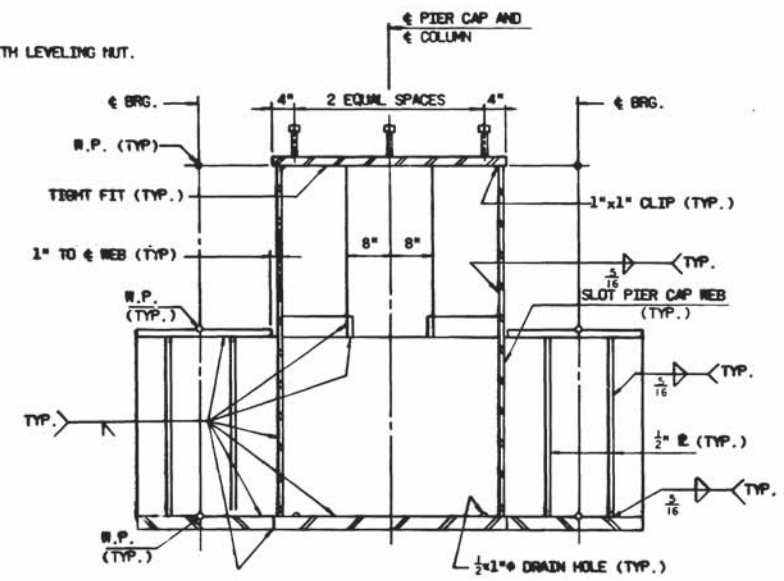
DRAWING NO. A13-S-135

M220-305



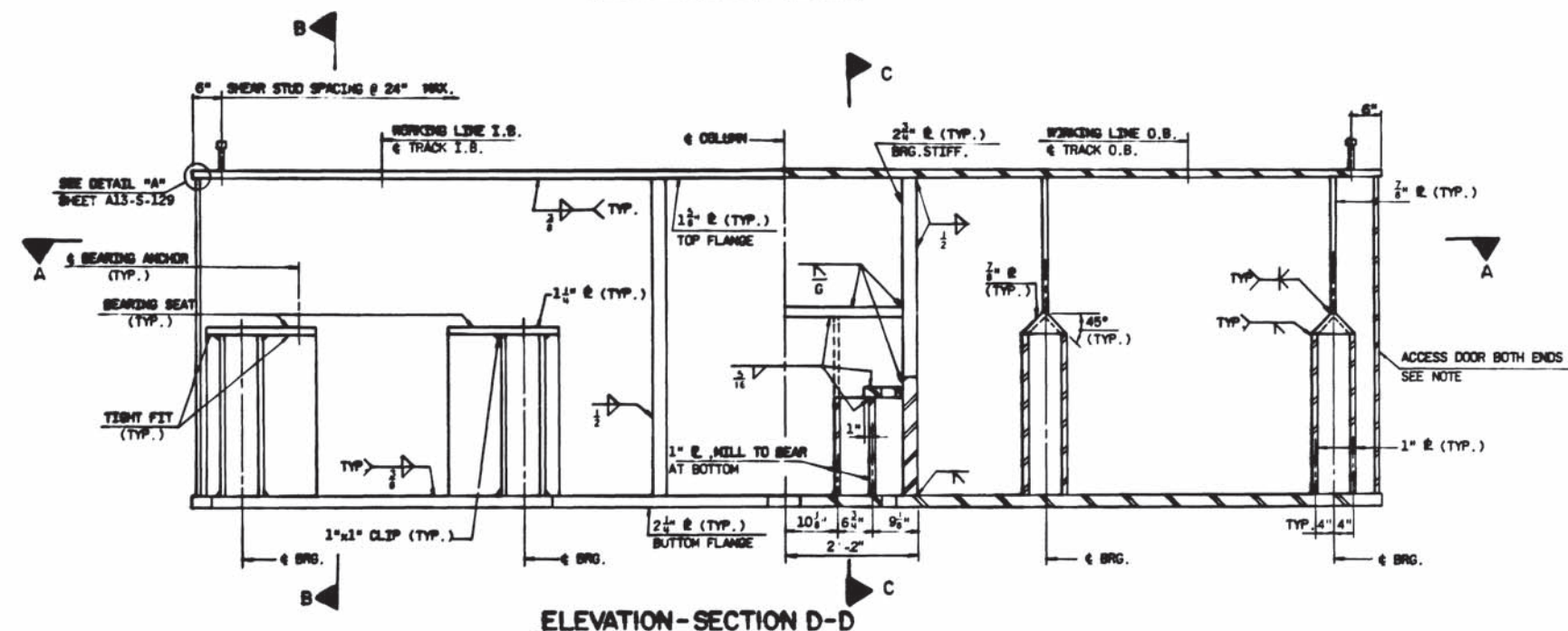
PLAN-SECTION A-A

LEGEND:  
 ○ INDICATES 2 1/4" HOLES FOR 2 1/4" ANCHOR BOLTS.  
 ⊗ INDICATES 2 1/4" HOLES FOR 1/4" ANCHOR BOLTS WITH LEVELING NUT.

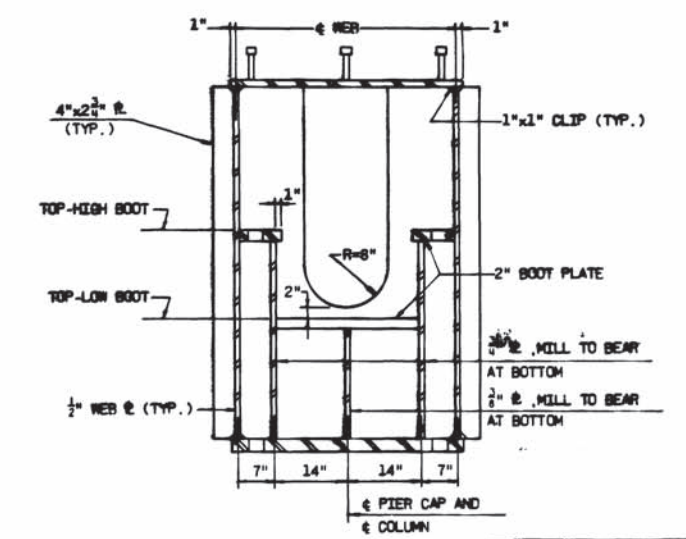


SECTION B-B

NOTE:  
 FOR GEOMETRY LAYOUT OF WORKING POINTS AND WORKING LINES, SEE DRAWING NO. A13-S-92.  
 FOR ANCHOR BOLTS, ANCHOR PLATE DETAILS, AND ADDITIONAL NOTES, SEE DRAWING NO. A13-S-154.  
 FOR ACCESS DOOR (BOTH ENDS), SEE DRAWING NOS. A13-S-154 AND A13-S-166.  
 FOR SHEAR STUD CONNECTOR DETAILS, SEE DRAWING NO. A13-S-154.  
 FOR BEARING ANCHORS, SEE DRAWING NO. A13-S-112.  
 FOR SPIRAL AROUND ANCHOR BOLTS, SEE DRAWING NO. A13-S-154.  
 FOR TYPICAL BRACKET DETAILS, SEE DRAWING NO. A13-S-150.



ELEVATION-SECTION D-D



SECTION C-C

WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
 AS-BUILT CONDITION  
 DATE: 03/1979

REVISIONS	REFERENCE DRAWINGS		REVISIONS	
	NUMBER	DESCRIPTION	DATE	BY
DESIGNED	112-S-140	COLUMN SCHEDULE AND DETAILS		
DRAWN	A13-S-92	PIER CAP GEOMETRY LAYOUT		
CHECKED	A13-S-154	PIER CAP DETAILS		
APPROVED	A13-S-112	BEARING ASSEMBLIES		
	A13-S-129	PIER CAP DETAILS (DETAIL A)		
	A13-S-180	PIER CAP DETAILS (BRACKET DETAILS)		

**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**BUCHART-HORN**  
 CONSULTING ENGINEERS AND PLANNERS

DE LEUW, CATHIER & COMPANY  
 GENERAL ENGINEERING CONSULTANT

HENRY WEISER & ASSOCIATES  
 GENERAL ARCHITECTURAL CONSULTANT

DATE: 03/1979

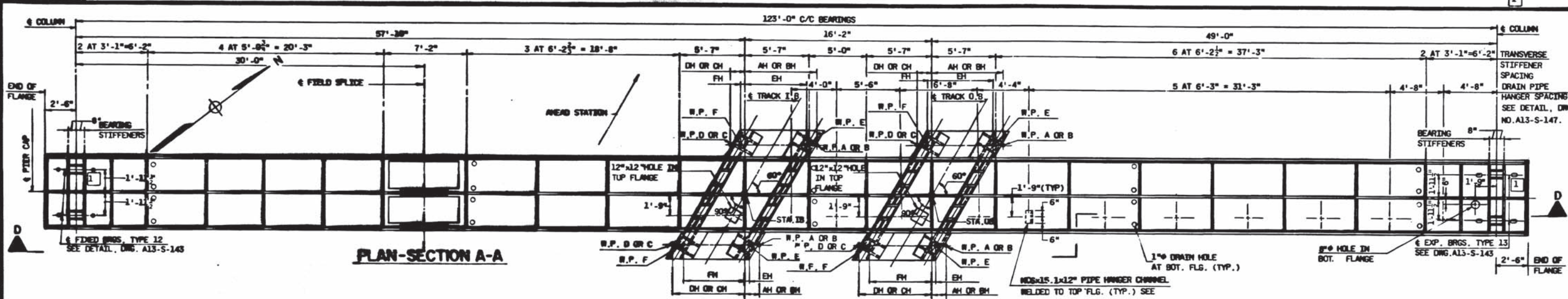
**ROCKVILLE ROUTE**  
 AERIAL STRUCTURE  
 PIER CAP DETAILS-PIER AS186

SCALE: 3/4" = 1'-0"

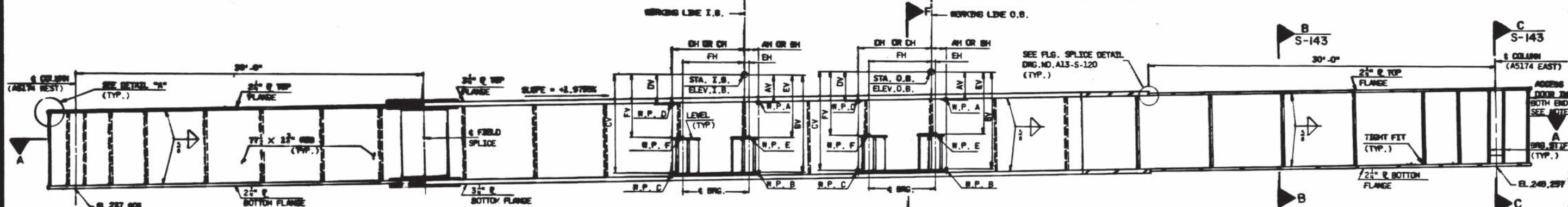
DRAWING NO. A13-S-130

M220-306

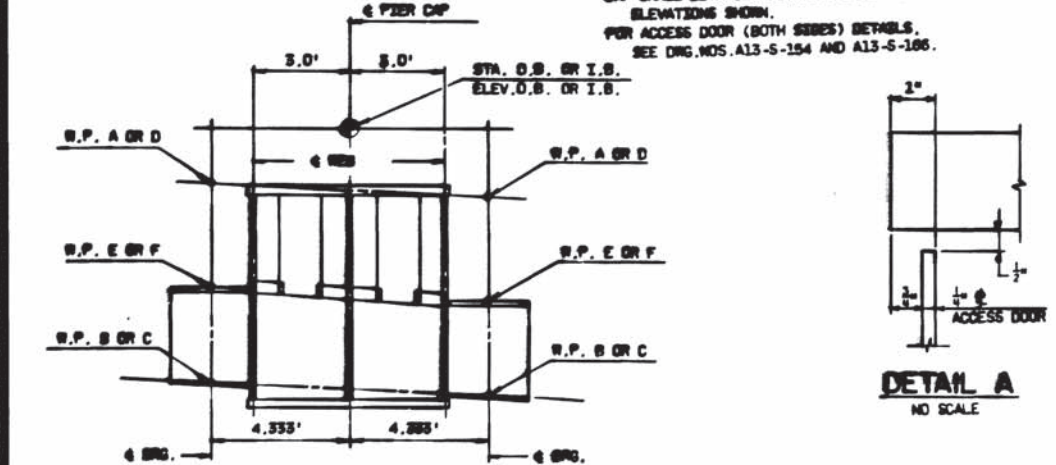




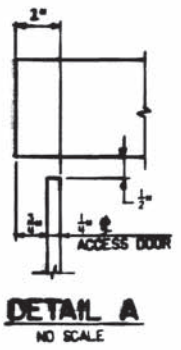
PLAN-SECTION A-A



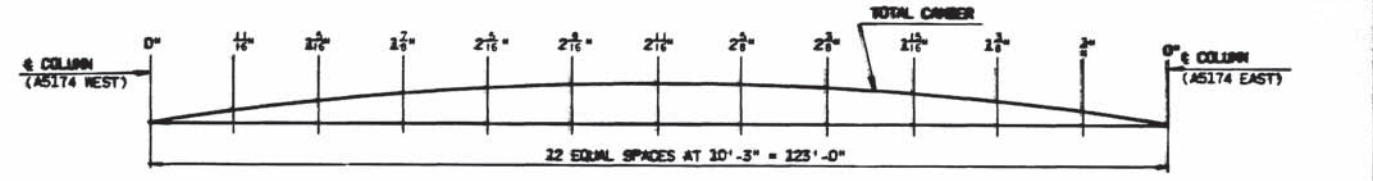
ELEVATION-SECTION D-D



SECTION F-F



DETAIL A  
NO SCALE



CAMBER DIAGRAM  
NO SCALE

NOTE:  
ENDS OF CAP, BEARING STIFFENERS AND BRACKET  
SUPPORT PLATES SHALL BE VERTICAL AFTER  
APPLICATION OF FULL DEAD LOAD.  
CAP SHALL BE A STRAIGHT SLOPE BETWEEN END  
ELEVATIONS SHOWN.  
FOR ACCESS DOOR (BOTH SIDES) DETAILS,  
SEE DWG. NOS. A13-S-154 AND A13-S-166.

\* THE ELEVATIONS AND GEOMETRY AS SHOWN  
ARE FINAL UNDER FULL DEAD LOAD WITH  
ALL THEORETICAL DEAD LOAD CAMBER  
DEFLECTED OUT

WASHINGTON METROPOLITAN  
AREA TRANSIT AUTHORITY

AS-BUILT CONDITION

DATE: MAY 03 1978

NOTE:  
THIS SHEET TO BE USED IN CONJUNCTION WITH  
DWG. NOS. A13-S-143 AND A13-S-164

		GEOMETRY												
O. R. AND I. B.	STATION AND ELEVATION	LOCATION	* DIMENSIONS (FEET)										FH	
			AV	BV	CV	DV	EV	FV	AH	BH	CH	DH		
O. B.	517+42	BACK	2.049	8.382	8.532	2.199	5.395	5.510	1.251	1.251	6.255	6.255	0.385	5.389
	247.929	AHEAD	1.648	7.981	8.151	1.798	4.994	5.110	6.255	6.255	1.251	1.251	5.389	0.385
I. B.	517+53.92	BACK	2.048	8.381	8.551	2.198	5.394	5.510	1.251	1.251	6.255	6.255	0.385	5.389
	247.909	AHEAD	1.648	7.981	8.151	1.798	4.994	5.110	6.255	6.255	1.251	1.251	5.389	0.385

APPROVED	S.T. HELM	4/75
DRAWN	S.S. SMITH	4/75
CHECKED	C.P. LEE	5/75

NUMBER	DESCRIPTION	DATE	BY	REVISIONS
A13-S-140	COLUMN SCHEDULE AND DETAILS	10/18/74	CPL	(1) CHANGE DRG. STIFF. SIZE PER PC046
A13-S-146	PIER CAP DETAILS			
A13-S-148	PIER CAP DETAILS - PIER AS174			
A13-S-112	BEARING ASSEMBLIES			
A13-S-152	BEARING ASSEMBLIES			
A13-S-166	PIER CAP DETAILS - PIER AS174			



WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY

SECTION DESIGNER  
**BUCHART-HORN**  
CONSULTING ENGINEERS AND PLANNERS

DE LEUW, CATHYER & COMPANY  
GENERAL ENGINEERING CONSULTANT

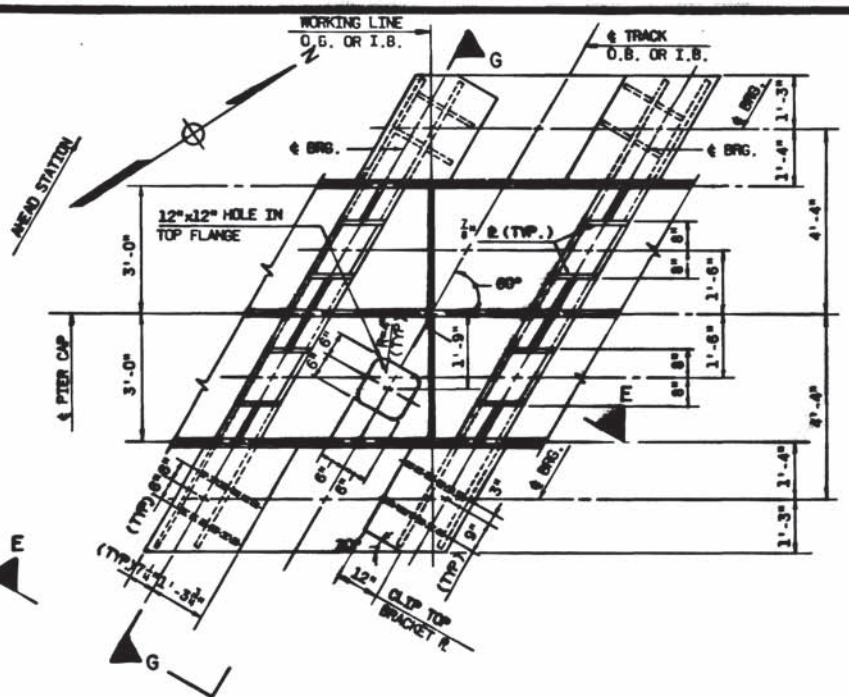
HARRY WIERSE & ASSOCIATES  
GENERAL ARCHITECTURAL CONSULTANT

ROCKVILLE ROUTE  
AERIAL STRUCTURE  
PIER CAP DETAILS - PIER AS174

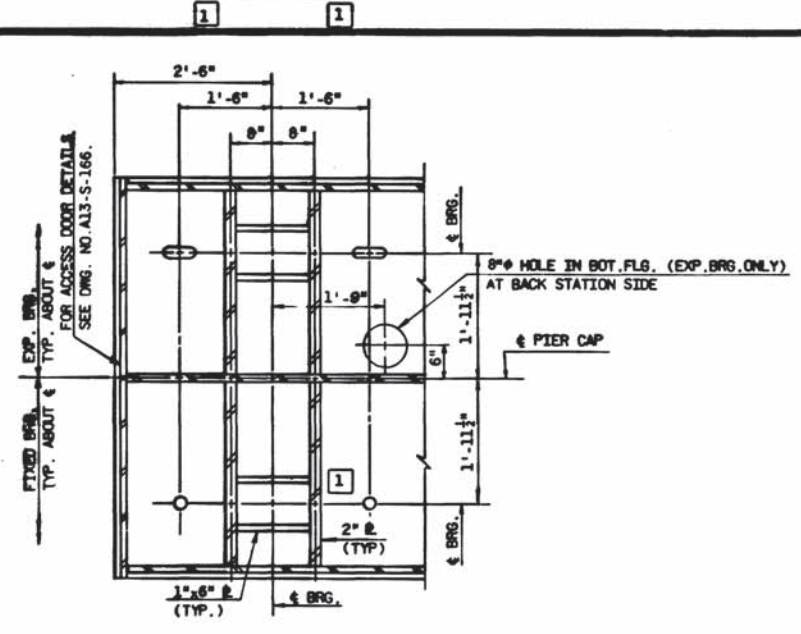
SCALE: 1/2" = 1'-0"

ISSUES NO. A13-S-142

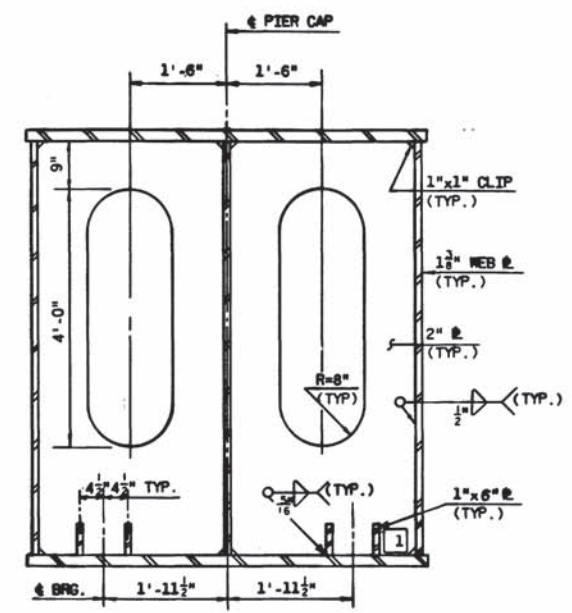
M220-307



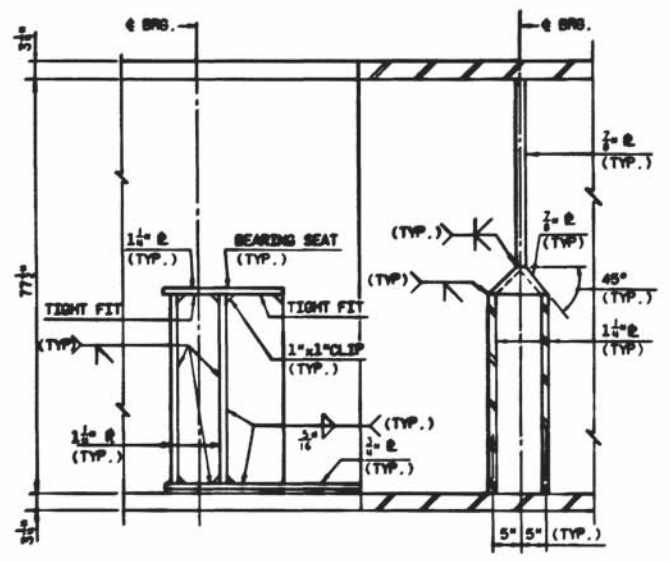
**DETAIL PLAN - BRACKETS**  
SCALE: 1/2" = 1'-0"



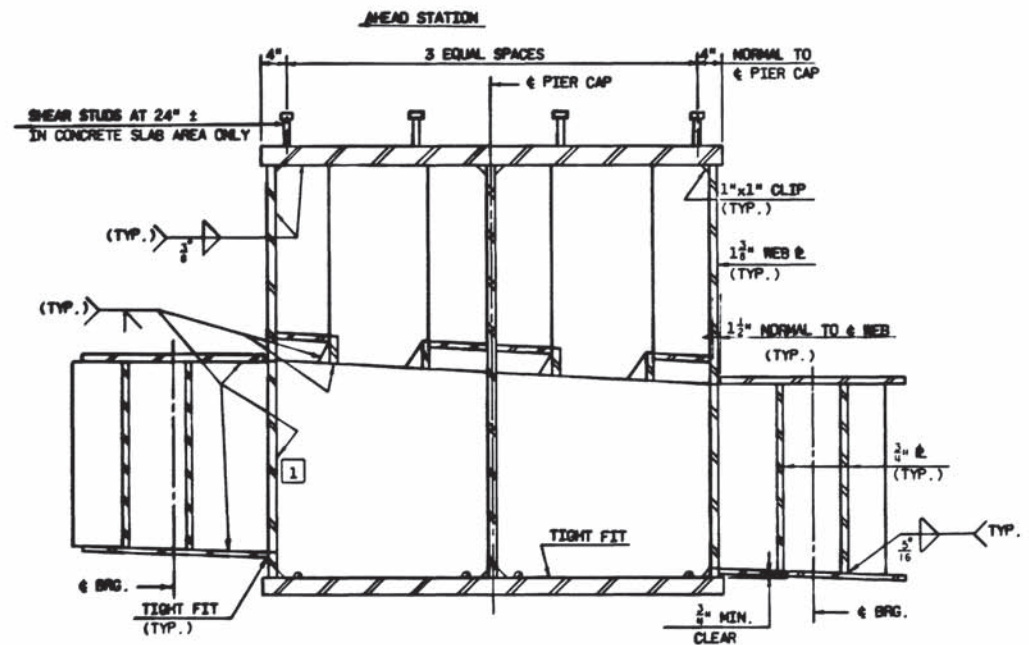
**DETAIL AT END OF PIER**



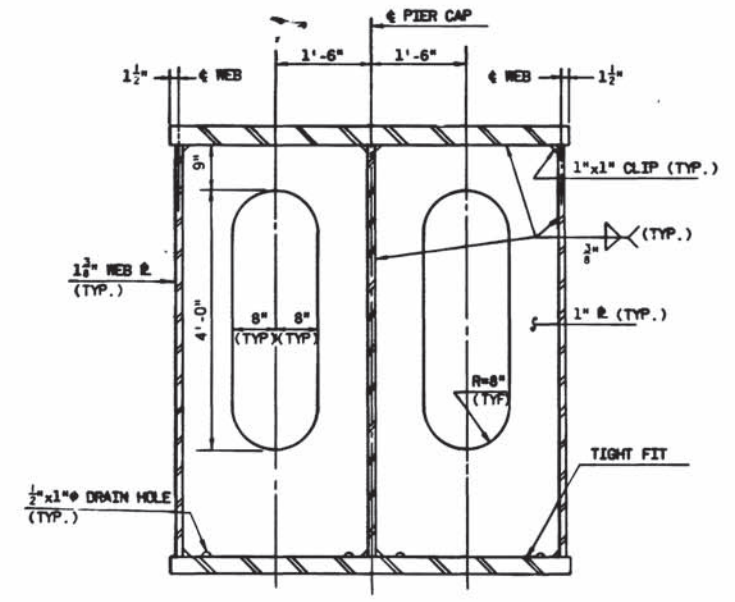
**SECTION C-C**  
S-142



**SECTION E-E**



**SECTION G-G**



**SECTION B-B**  
S-142

WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
AS-BUILT CONDITION  
RESIDENT ENGINEER DATE  
MAY 03 1978

DESIGNED	D. T. WILHELM	5/75
DRAWN	H. B. BROWN	5/75
CHECKED	C. P. LEE	5/75
APPROVED	<i>Paul A. ...</i>	10/75

NUMBER	DESCRIPTION	DATE	BY	DESCRIPTION
A13-S-143	PIER CAP DETAILS - PIER A5174	10/19/76	CPL	1) ESTABLISH VERTICAL BRACKET & TRUSS WEB R AND CHANGE BRG. STIFF. SIZE PER PC099

NUMBER	DESCRIPTION	DATE	BY	DESCRIPTION



**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**BUCHART-HORN**  
CONSULTING ENGINEERS AND PLANNERS  
SUBMITTED *Paul A. ...*

DE LEUW, CATHER & COMPANY  
GENERAL ENGINEERING CONSULTANT

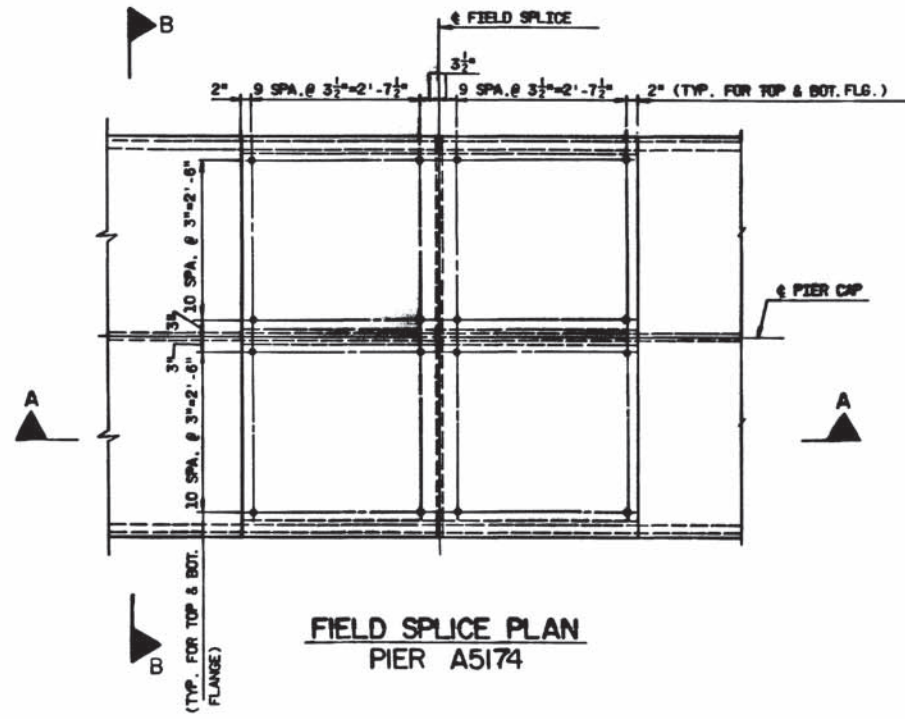
HARRY WEEBE & ASSOCIATES  
GENERAL ARCHITECTURAL CONSULTANT

APPROVED *...*

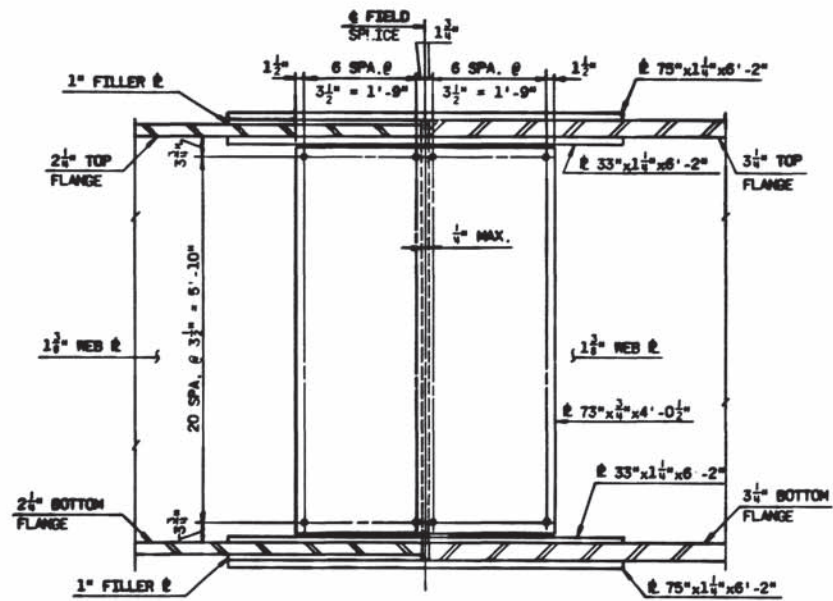
**ROCKVILLE ROUTE**  
AERIAL STRUCTURE  
PIER CAP DETAILS - PIER A5174

SCALE: 3/8" = 1'-0" AND AS NOTED

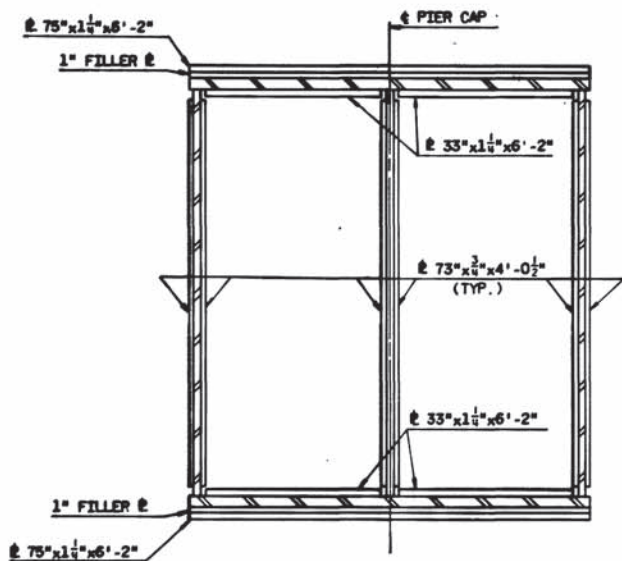
DRAWING NO. A13-S-143 M220-308



FIELD SPLICE PLAN  
PIER A5174



SECTION A-A



SECTION B-B

WASHINGTON METROPOLITAN  
AREA TRANSIT AUTHORITY  
AS-BUILT CONDITION  
MAY 03 1978  
DATE

DESIGNED	DATE	REFERENCE DRAWINGS		REVISIONS	
		NUMBER	DESCRIPTION	DATE	BY
D.T. WILHELM	4/75	A13-S-162	PIER CAP DETAILS - PIER A5174		
DRWN	4/75	A13-S-163	PIER CAP DETAILS - PIER A5174		
CHECKED	4/75				
APPROVED	4/75				

WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY

SECTION DESIGNER  
**BUCHART-HORN**  
CONSULTING ENGINEERS AND PLANNERS

DE LEUW, CATHAR & COMPANY  
GENERAL ENGINEERING CONSULTANT

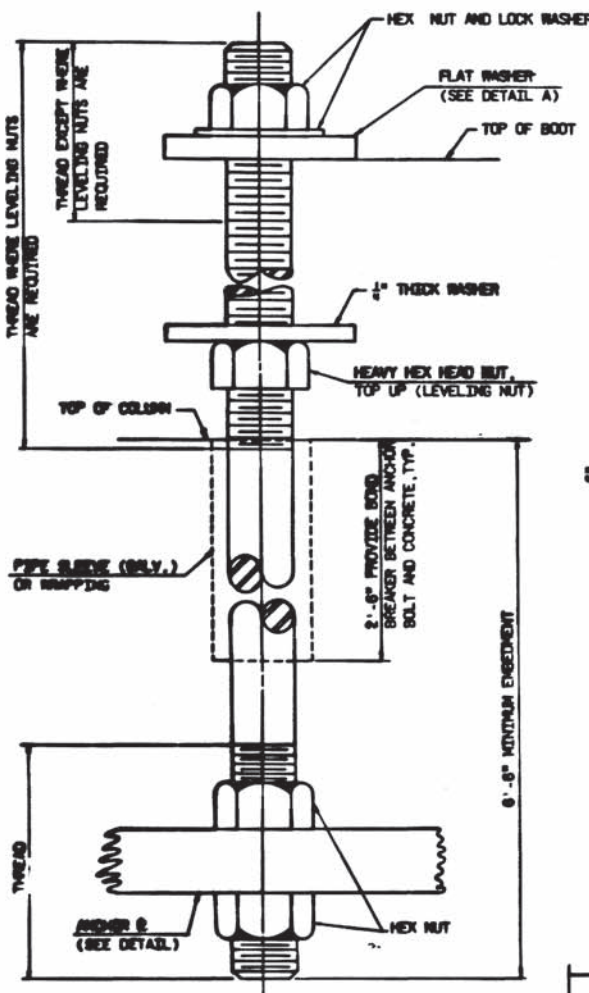
HARRY WEISE & ASSOCIATES  
GENERAL ARCHITECTURAL CONSULTANT

SUBMITTED *[Signature]* APPROVED *[Signature]*

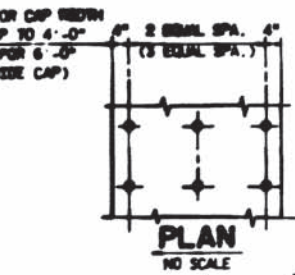
ROCKVILLE ROUTE  
AERIAL STRUCTURE  
FIELD SPLICE DETAILS - PIER A5174

SCALE: 3/4" = 1'-0"

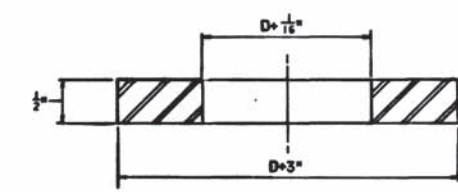
DRAWING NO. A13-S-164 M220-309



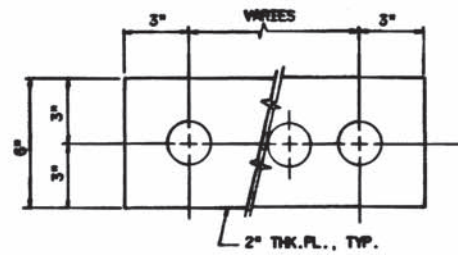
**ANCHOR BOLT DETAIL**  
NO SCALE



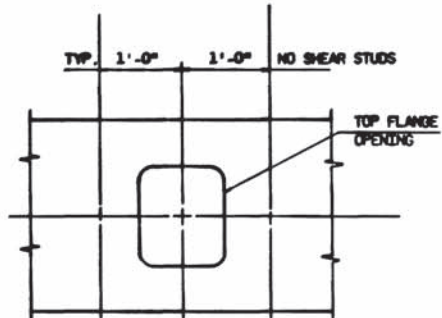
**SHEAR STUD DETAIL**  
NO SCALE



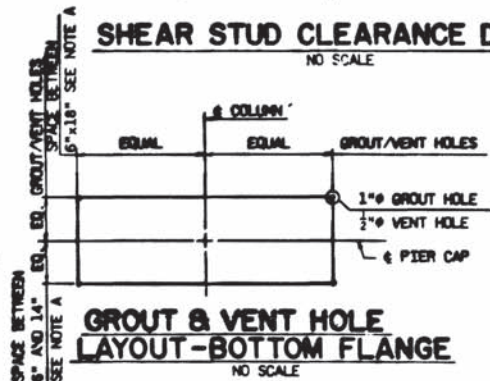
**DETAIL A**



**ANCHOR PLATE DETAIL**  
NO SCALE



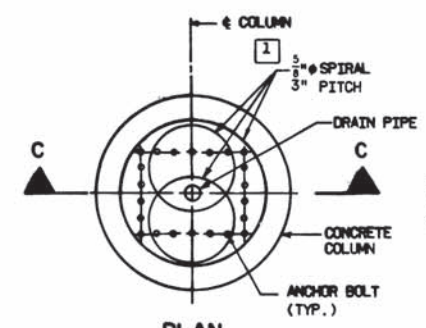
**SHEAR STUD CLEARANCE DIAGRAM**  
NO SCALE



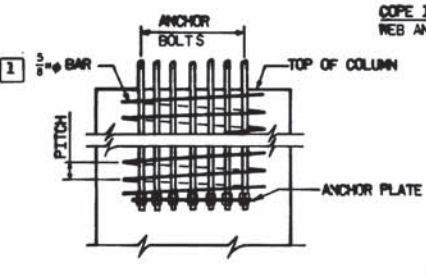
**GROUT & VENT HOLE LAYOUT - BOTTOM FLANGE**  
NO SCALE

**NOTE:**  
PROVIDE 4 LEVELING NUTS FOR EACH PIER CAP AS INDICATED ON PLAN.  
D = DIAMETER OF BOLT.

- ANCHOR PLATE NOTES:**
1. PROVIDE 4 ANCHOR PLATES FOR EACH COLUMN.
  2. MINIMUM EDGE DISTANCE 3".
  3. COPE PLATES AS NECESSARY TO CLEAR COLUMN REINFORCEMENT AND ANCHOR BOLT SPIRALS.
  4. THE CONTRACTOR SHALL MAKE THE ANCHOR PLATE ARRANGEMENTS IN ACCORDANCE WITH THE LIMITS SET ON THIS SHEET.



**PLAN**

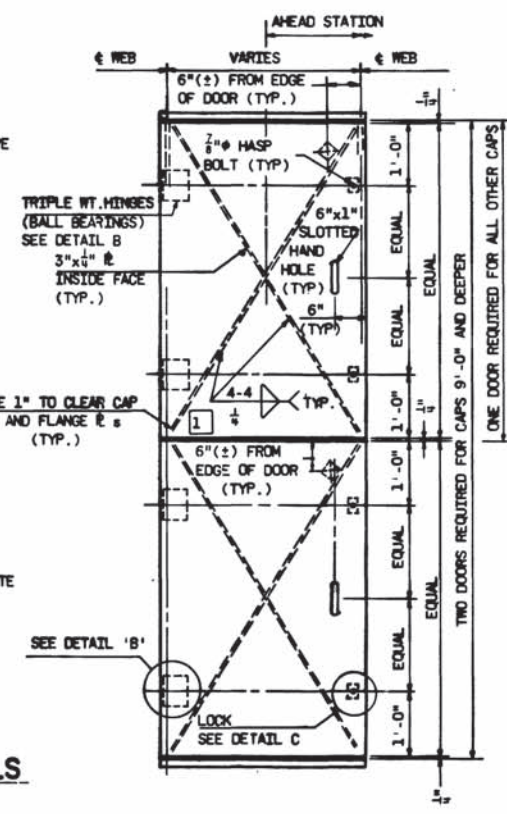


**SECTION C-C**  
NO SCALE

**ANCHOR BOLT SPIRAL DETAILS**

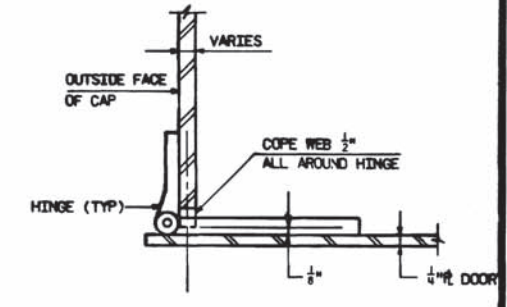
- SPIRAL NOTES:**
1. MINIMUM RADII TO THE INSIDE OF THE SPIRALS ARE:  
2'-0" FOR OUTSIDE RINGS ENCASED CORNER BOLTS.  
1'-6" FOR INSIDE RINGS
  2. MINIMUM NUMBER OF ANCHOR BOLTS ENCASED BY ANY ONE SPIRAL SHALL BE 4.
  3. THE CONTRACTOR SHALL ADJUST THE DIAMETER OF THE SPIRALS TO CLEAR ALL REINFORCEMENT, DRAIN PIPE AND ANCHOR BOLTS

**NOTE A:**  
SPACE HOLES TO CLEAR ANCHOR BOLTS AND STIFFENERS.  
VENT HOLES/PIPES TO BE LOCATED 3" AWAY FROM GROUT HOLES.

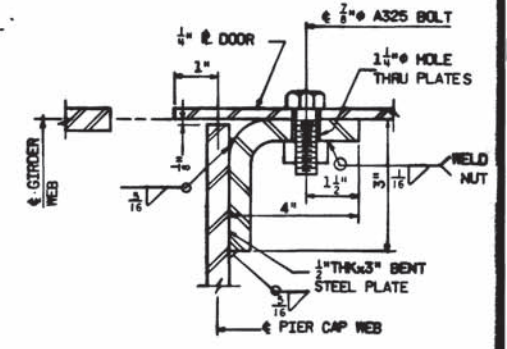


**DETAIL-END ACCESS DOOR**  
SCALE: 3/4" = 1'-0"

FOR ALL PIERS EXCEPT PIER A5174

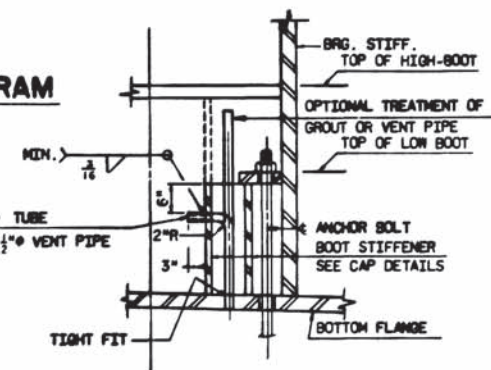


**DETAIL B**  
NO SCALE

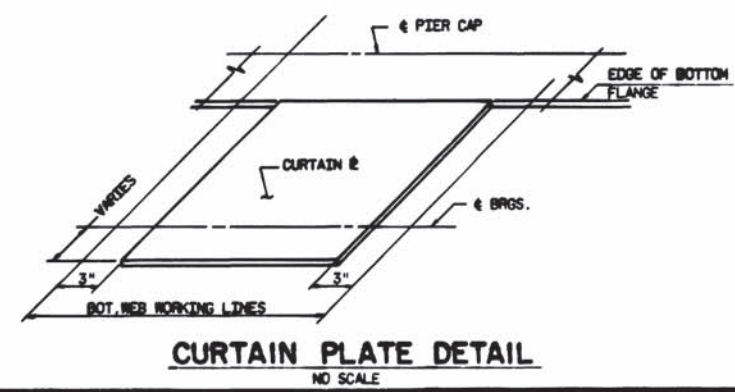


**DETAIL C**  
NO SCALE

**NOTE:**  
FOR LOCATION OF WEB CATCH BRACKETS, DETAILS OF CATCH BRACKETS, DOOR OPENERS (IN CAP WEB), DOOR LATCHES AND DOOR LATCH BRACKETS (IN CAP WEB), SEE DWG. NO. A13-S-166.



**DETAIL-GROUT & VENT PIPES**  
NO SCALE



**CURTAIN PLATE DETAIL**  
NO SCALE

WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
AS-BUILT CONDITION  
MAY 03 '78  
DATE

REVISIONS	DATE	BY	DESCRIPTION
1	10/19/76	CPL	CHANGE SPIRAL SIZE & PITCH PER PC096

REFERENCE DRAWINGS	NUMBER	DESCRIPTION
	A13-S-150	COLUMN SCHEDULE AND DETAILS
	A13-S-166	PIER CAP DETAILS

**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**BUCHART-HORN**  
CONSULTING ENGINEERS AND PLANNERS

DE LEUW, CATHY & COMPANY  
GENERAL ENGINEERING CONSULTANT

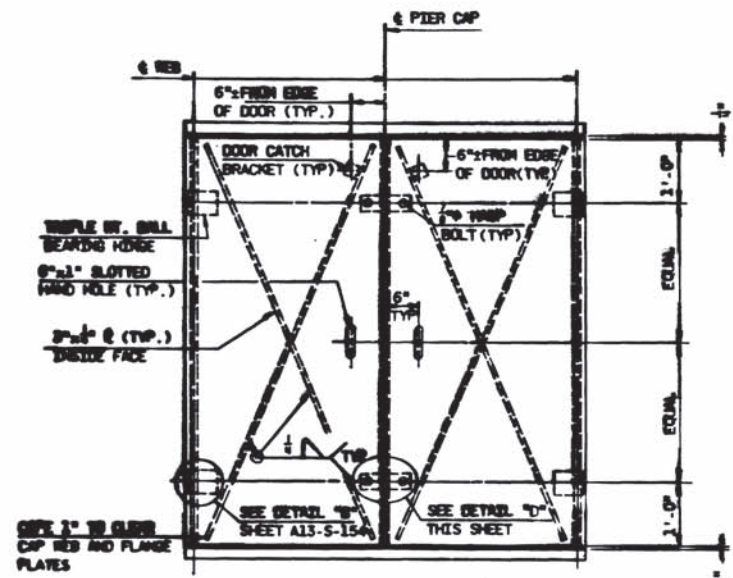
HARRY WEESE & ASSOCIATES  
GENERAL ARCHITECTURAL CONSULTANTS

**ROCKVILLE ROUTE**  
AERIAL STRUCTURE  
PIER CAP DETAILS

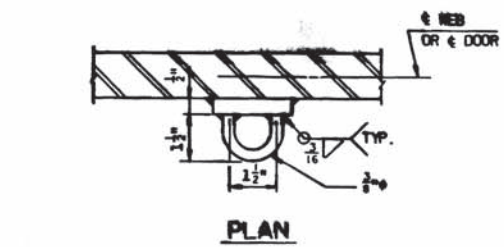
SCALE: 3/4" = 1'-0" AND AS NOTED

DRAWING NO. **A13-S-154**

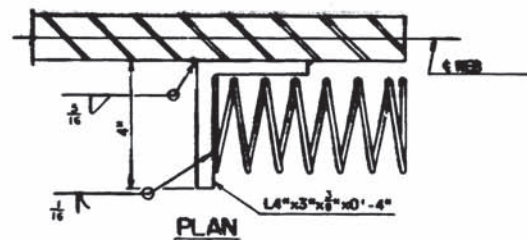
PROJECT NO. **M220-310**



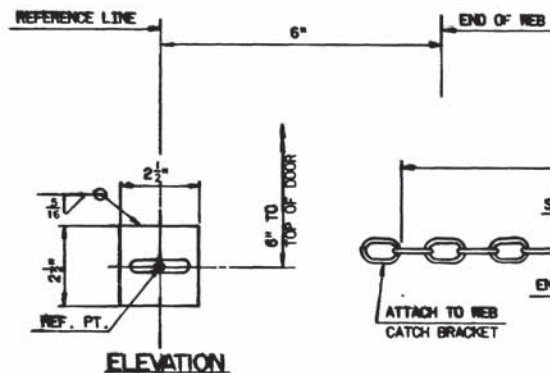
**DETAILS-END ACCESS DOORS**  
PIER A5174 ONLY



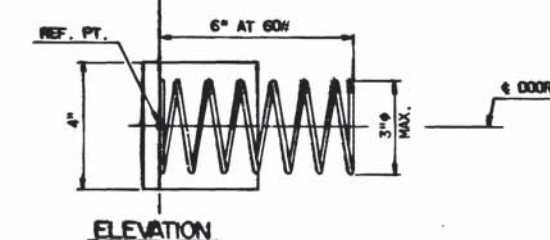
**DOOR AND WEB CATCH BRACKET**



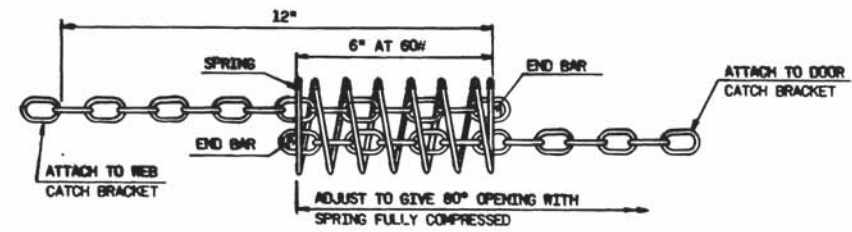
**DOOR OPENER**



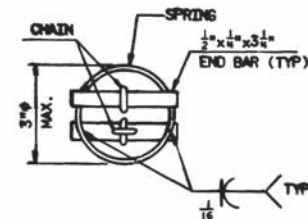
**DOOR CATCH**



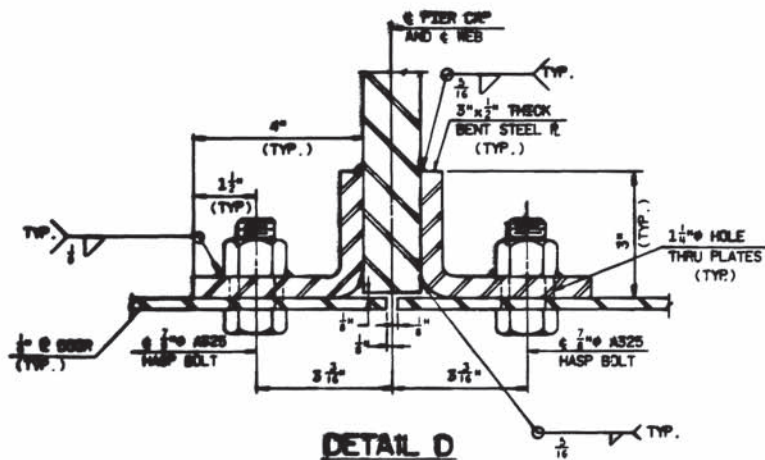
**DOOR OPENER**



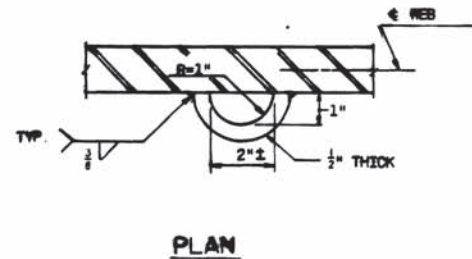
**DOOR CATCH**



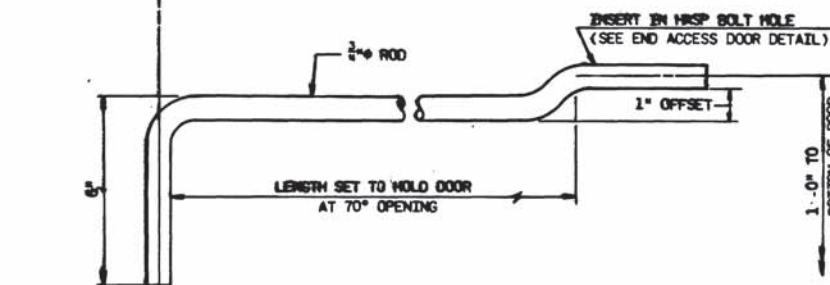
**END VIEW-DOOR CATCH**



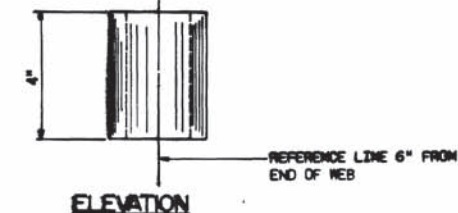
**DETAIL D**



**DOOR LATCH BRACKET**



**DOOR LATCH - ELEVATION**



**DOOR LATCH BRACKET**

WASHINGTON METROPOLITAN  
AREA TRANSIT AUTHORITY  
**AS-BUILT CONDITION**  
MAY 03 1974

**GENERAL NOTES FOR CAP HARDWARE**

1. TYPICAL WELD ON ALL HINGES IS 1/16" FILLET ON FULL LEAF TO 1/4" FROM THE PIN.
2. WELD TEST LOADS:  
1 HINGE TO CAP 1000 LB.  
1 SPRING TO END BAR OR BRACKET 400 LB.
3. CHAIN AND ITS CONNECTIONS SHALL HAVE A MINIMUM STRENGTH OF 400 LB. PULL AND A MINIMUM LINK SIZE OF 1 1/4"x3/4"x1/2" THICK.
4. SPRINGS SHALL HAVE A SPRING FACTOR OF 10 LB. PER INCH AND A MINIMUM ELASTIC STRENGTH OF 400 LB.
5. AS CAP DETAILED SHOP DRAWINGS ARE DEVELOPED, INTERFERENCE OF DOOR HARDWARE WITH CAP WEB STIFFENERS SHOULD BE CAREFULLY EXAMINED. LOCATION OF HARDWARE SHOWN IN THE DRAWING MAY BE ALTERED TO AVOID INTERFERENCE WHILE MAINTAINING ITS PROPER FUNCTION.

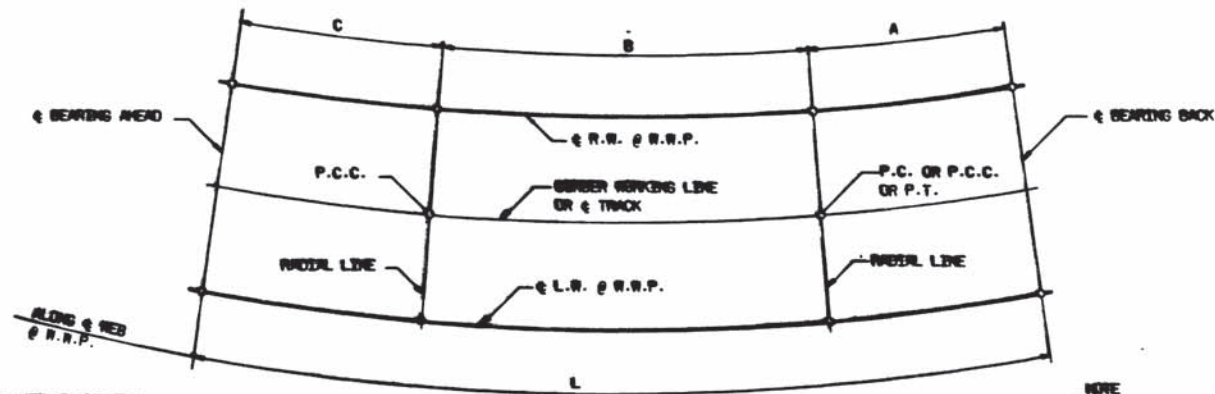
DESIGNED	DATE	REFERENCE DRAWINGS	REVISIONS	WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY	
DRAWN	DATE	NUMBER	DESCRIPTION	DATE	BY
V.L.F.M.	6/75	A13-S-162	PIER CAP DETAILS - PIER A5174		
H.G. GIBB	6/75	A13-S-163	PIER CAP DETAILS - PIER A5174		
S.P. BARNHART	7/75	A13-S-164	PIER CAP DETAILS		

SECTION DESIGNER  
**BUCHART-HORN**  
CONSULTING ENGINEERS AND PLANNERS  
SUBMITTED *[Signature]*

DE LEUW, CATHIER & COMPANY  
GENERAL ENGINEERING CONSULTANT  
HENRY WISSE & ASSOCIATES  
GENERAL ARCHITECTURAL CONSULTANT  
APPROVED *[Signature]*

ROCKVILLE ROUTE  
AERIAL STRUCTURE  
PIER CAP DETAILS

SCALE: NO SCALE  
DRAWING NO. A13-S-166  
M220-311



**LEGEND**  
 OB - OUTBOUND TRACK  
 IB - INBOUND TRACK  
 R.W. - RIGHT WEB  
 L.W. - LEFT WEB  
 W.W.P. - WEB WORKING POINT

\* @ WEB ON TANGENT  
 \*\* @ WEB ON SINGLE CURVE

**NOTE**  
 LEFT HAND CURVE  
 SIMILAR

**TYPICAL COMPOUND CURVED GIRDER**  
 (IN SPIRAL SIMULATION ONLY)

UNIT	WEB	A	B	C	L
A5308	OB	R.W.			122.123 *
		L.W.			111.870 *
A5310	IB	R.W.			100.060 *
		L.W.			89.787 *
A5380	OB	R.W.			112.120 *
		L.W.			115.873 *
A5185	IB	R.W.			120.203 *
		L.W.			125.956 *
A5195	OB	R.W.	70.052 *	51.896 **	121.988
		L.W.	70.052 *	51.896 **	122.012
A5205	IB	R.W.	80.884 *	41.155 **	122.039
		L.W.	80.884 *	41.171 **	122.086
A5219	OB	R.W.	98.221 **	23.713 **	121.934
		L.W.	98.290 **	23.774 **	122.084
A5285	IB	R.W.	96.540 **	25.676 **	122.216
		L.W.	96.606 **	25.745 **	122.351
A5296	OB	R.W.	112.772 **	13.888 **	126.660
		L.W.	112.987 **	10.756 **	123.743
A5307	IB	R.W.	99.452 **	20.817 **	120.269
		L.W.	99.636 **	17.719 **	117.355
A5282	OB	R.W.			123.482 **
		L.W.			126.932 **
A5243	IB	R.W.			131.062 **
		L.W.			134.528 **
A5318	OB	R.W.			93.637 **
		L.W.			93.863 **
A5330	IB	R.W.			94.131 **
		L.W.			94.356 **

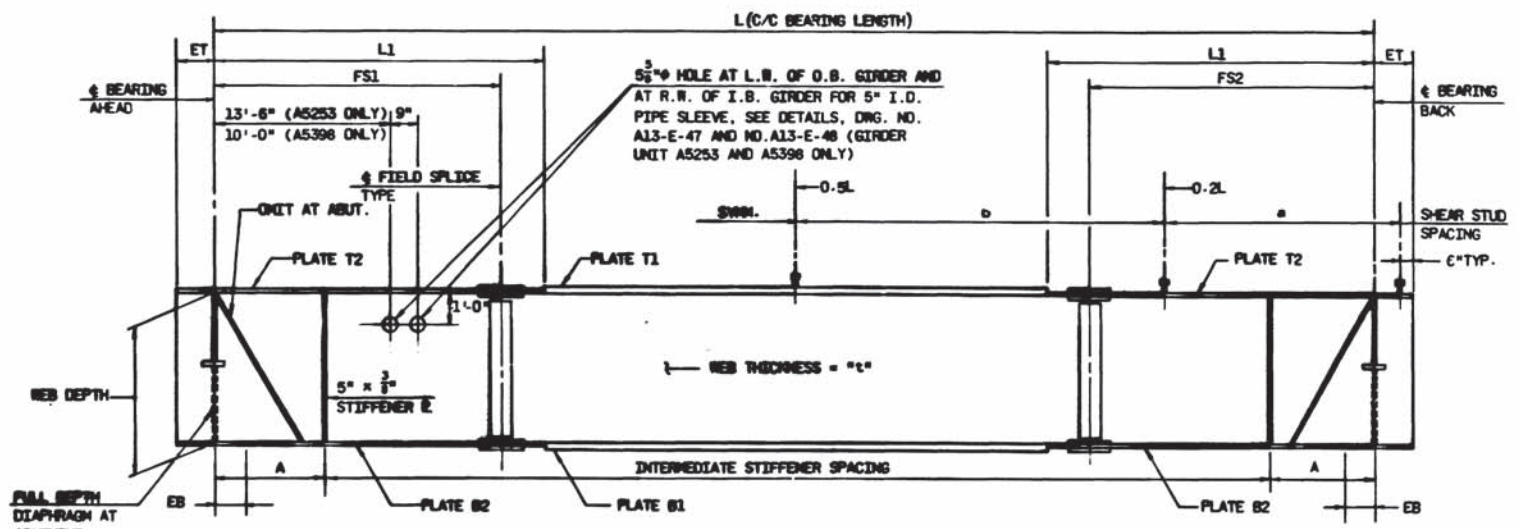
UNIT	WEB	A	B	C	L
A5253	OB	R.W.			92.890 **
		L.W.			93.110 **
A5263	IB	R.W.			93.373 **
		L.W.			93.594 **
A5274	OB	R.W.			92.890 **
		L.W.			93.110 **
A5285	IB	R.W.			93.373 *
		L.W.			93.594 **
A5296	OB	R.W.			106.874 **
		L.W.			107.126 **
A5307	IB	R.W.			107.427 **
		L.W.			107.679 **
A5318	OB	R.W.			106.874 **
		L.W.			107.126 **
A5330	IB	R.W.			107.427 **
		L.W.			107.679 **
A5338	OB	R.W.			106.874 **
		L.W.			107.126 **
A5350	IB	R.W.			107.427 **
		L.W.			107.679 **
A5361	OB	R.W.			106.874 **
		L.W.			107.126 **
A5371	IB	R.W.			107.427 **
		L.W.			107.679 **
A5384	OB	R.W.			106.874 **
		L.W.			107.126 **
A5398	IB	R.W.			107.427 **
		L.W.			107.679 **
A5411	OB	R.W.			106.874 **
		L.W.			107.126 **
A5427	IB	R.W.			107.427 **
		L.W.			107.679 **
A5441	OB	R.W.			106.874 **
		L.W.			107.126 **
A5454	IB	R.W.			107.427 **
		L.W.			107.679 **
A5330	OB	R.W.			67.891 **
		L.W.			38.986 **
A5338	IB	R.W.			68.050 **
		L.W.			39.074 **
A5350	OB	R.W.			82.027 **
		L.W.			25.390 **
A5361	IB	R.W.			82.217 **
		L.W.			25.446 **

**NOTE**  
 ALL DIMENSIONS SHOWN ARE IN FEET

UNIT	WEB	A	B	C	L
A5330	OB	R.W.			98.494 **
		L.W.			98.682 **
A5340	IB	R.W.			100.739 **
		L.W.			100.935 **
A5350	OB	R.W.			40.794 **
		L.W.			40.812 **
A5361	IB	R.W.			30.011 **
		L.W.			30.026 **
A5371	OB	R.W.			77.607 *
		L.W.			77.607 *
A5384	IB	R.W.			98.454 *
		L.W.			98.454 *
A5398	OB	R.W.			77.607 *
		L.W.			77.607 *
A5411	IB	R.W.			77.607 *
		L.W.			77.607 *
A5427	OB	R.W.			4.880 **
		L.W.			4.869 **
A5441	IB	R.W.			3.062 **
		L.W.			3.044 **
A5454	OB	R.W.			72.320 **
		L.W.			72.494 **
A5330	IB	R.W.			86.361 **
		L.W.			86.565 **
A5340	OB	R.W.			84.571 **
		L.W.			84.735 **
A5350	IB	R.W.			86.729 **
		L.W.			86.890 **
A5361	OB	R.W.			96.906 **
		L.W.			96.935 **
A5371	IB	R.W.			46.121 **
		L.W.			46.149 **
A5384	OB	R.W.			33.888 *
		L.W.			33.888 *
A5398	IB	R.W.			23.094 *
		L.W.			23.094 *
A5411	OB	R.W.			30.205 **
		L.W.			30.184 **
A5427	IB	R.W.			31.967 **
		L.W.			31.937 **

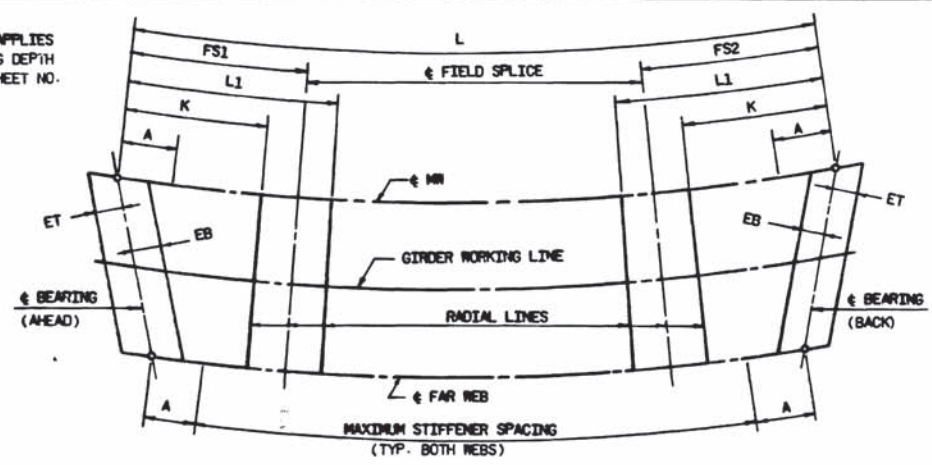
WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
**AS-BUILT CONDITION**  
 DATE: 09/23/99

DESIGNED: C.P. LEE 1/75 DRAWN: S. PRINCE/MLH 1/75 CHECKED: A.M. PATEL 5/75 APPROVED: [Signature] 12/75	<b>REFERENCE DRAWINGS</b> NUMBER DESCRIPTION A13-S-80 HORIZONTAL BOX GIRDER DEFINITION	<b>REVISIONS</b> DATE BY DESCRIPTION	<b>WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY</b> SECTION DESIGNER <b>BUCHART-HORN</b> CONSULTING ENGINEERS AND PLANNERS SUBMITTED: [Signature]	DE LEIJW, CATHY & COMPANY GENERAL ENGINEERING CONSULTANT HARRY WISSE & ASSOCIATES GENERAL ARCHITECTURAL CONSULTANT APPROVED: [Signature]	<b>ROCKVILLE ROUTE</b> AERIAL STRUCTURE HORIZONTAL BOX GIRDER LENGTHS SCALE: NO SCALE DRAWING NO: A13-S-84 M220-312
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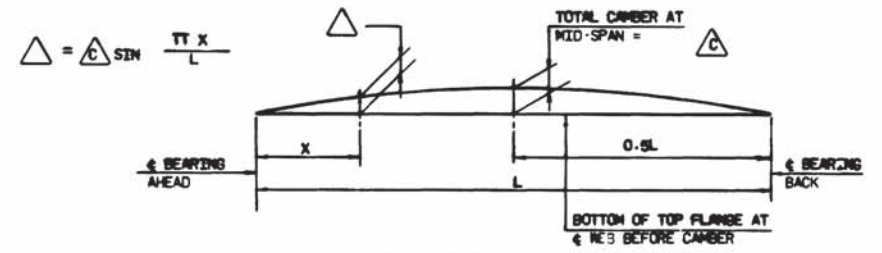
**GIRDER ELEVATION**

NOTE:  
DIMENSION "K" APPLIES ONLY TO VARYING DEPTH GIRDERS. SEE SHEET NO. A13-S-93.



**HORIZONTAL MEASUREMENT**

TYPICAL CURVED UNIT  
TANGENT SIMILAR



**CAMBER DIAGRAM**

- NOTES**
- CAMBERS ARE GIVEN IN INCHES.
  - SHEAR STUD SPACING IS GIVEN IN INCHES.
  - STIFFENER PLATE SPACING IS GIVEN IN INCHES.
  - WEB DEPTH GIVEN IN INCHES. VARIES LINEARLY BETWEEN BEARING.
  - FIELD SPLICES, INTERMEDIATE DIAPHRAGMS, KINK IN BOTTOM FLANGE AND TOP AND BOTTOM FLANGE PLATE CHANGES ARE TO BE PROJECTED RADIAL (OR NORMAL ON TANGENT) FROM MW TO FAR WEB OF BOX GIRDER. MAXIMUM STIFFENER PLATE SPACING AND SHEAR STUD SPACING ARE APPLICABLE TO EACH WEB.
  - FOR WEB WORKING POINT DEFINITION, SEE SHEET A13-S-80.
  - FOR VERTICAL AND HORIZONTAL CONTROL AT BEARING OF BOX GIRDER WORKING POINTS, SEE SHEET NOS. A13-S-92, S-119, S-121, S-106, S-148, S-147 AND S-142.
  - TOP AND BOTTOM PLATES ARE IN INCHES.
- LEGEND**
- MW - DENOTES WEB (L.W. OR R.W.)
  - ALONG WHICH SCHEDULED DIMENSIONS ARE MEASURED. SEE "HORIZONTAL MEASUREMENT" DETAIL THIS SHEET.
  - L - DENOTES HORIZONTAL WEB LENGTH ALONG WEB AT BOTTOM OF TOP FLANGE. SEE SHEET A13-S-84
  - WCO - DENOTES CAMBER DUE TO VERTICAL CURVATURE AND CROSS SLOPE.
  - DWS - DENOTES CAMBER DUE TO DEAD HEIGHT OF STRUCTURAL STEEL.
  - DWC - DENOTES CAMBER DUE TO DEAD HEIGHT OF CONCRETE SLAB.
  - SOL - DENOTES CAMBER DUE TO WEIGHT OF SUPERIMPOSED DEAD LOAD.

GIRDER UNIT	MR	L1	FS1	FS2	ET1	ET2	EB1	EB2	WEB DEPTH	t	STIFFENER S		SHEAR STUD SPACING		ET		EB		SPLICE TYPE	CAMBER AT MID-SPAN					
											A	SPA.	a	b	BACK	AHEAD	BACK	AHEAD		WCO	DWS	DWC	SOL	TOTAL	
A5185	OB	R.R.	30'-0"	20'-0"	-	16x1 1/2	14x3/8	80x1 1/2	80x3/8	86	1/2	3'-3"	86	9	15	1'-1"	11 1/2"	1'-3"	1'-3"	2	0.856	0.822	2.826	0.277	4.781
A5206	IB	R.R.	30'-0"	20'-0"	-	16x1 1/2	14x3/8	80x1 1/2	80x3/8	86	1/2	3'-3"	86	9	15	11 1/2"	1'-1"	1'-3"	1'-3"	2	1.313	0.822	2.826	0.277	5.238
A5253	OB	R.R.	23'-0"	-	-	16x7/8	12x3/8	80x3/8	80x3/8	54	1/2	7'-0"	54	10	15	8 3/4"	10"	1'-1 1/2"	1'-1 1/2"	-	0.702	0.524	2.343	0.201	3.770
A5263	IB	R.R.	23'-0"	-	-	16x7/8	12x3/8	80x3/8	80x3/8	54	1/2	3'-0"	54	10	15	10"	8 3/4"	1'-1 1/2"	1'-1 1/2"	-	0.845	0.524	2.343	0.201	3.913
A5274	OB	R.R.	26'-6"	-	-	16x1 1/2	12x7/8	80x7/8	80x3/8	54	1/2	3'-0"	54	9	14	8 1/2"	10"	1'-1 1/2"	1'-1 1/2"	7	0.779	0.739	3.023	0.283	4.951
A5286	IB	R.R.	26'-6"	-	-	16x1 1/2	12x7/8	80x7/8	90x3/8	54	1/2	3'-0"	54	9	14	10"	8 1/2"	1'-1 1/2"	1'-1 1/2"	-	0.810	0.739	3.023	0.283	4.993
A5286	OB	R.R.	26'-6"	-	-	16x1 1/2	12x7/8	80x7/8	80x3/8	54	1/2	3'-0"	54	9	14	8 1/2"	10"	1'-1 1/2"	1'-1 1/2"	-	0.739	0.739	3.023	0.283	4.045
A5307	OB	R.R.	26'-6"	-	-	16x1 1/2	12x7/8	80x7/8	80x3/8	54	1/2	3'-0"	54	9	14	10"	8 1/2"	1'-1 1/2"	1'-1 1/2"	-	0.739	0.739	3.023	0.283	4.045
A5318	IB	R.R.	26'-6"	-	-	16x1 1/2	12x7/8	80x7/8	80x3/8	54	1/2	3'-0"	54	9	14	8 1/2"	10"	1'-1 1/2"	1'-1 1/2"	-	0.739	0.739	3.023	0.283	4.045
A5330	OB	R.R.	26'-6"	-	-	16x1 1/2	12x7/8	80x7/8	80x3/8	54	1/2	3'-0"	54	9	14	10"	8 1/2"	1'-1 1/2"	1'-1 1/2"	-	0.739	0.739	3.023	0.283	4.045
A5340	IB	R.R.	23'-6"	-	-	16x7/8	12x3/8	80x3/8	80x3/8	54	1/2	3'-0"	54	10	15	8 3/4"	10"	1'-1 1/2"	1'-1 1/2"	-	0.524	0.524	2.343	0.201	3.066
A5380	OB	R.R.	23'-6"	-	-	16x7/8	12x3/8	80x3/8	80x3/8	54	1/2	3'-0"	54	10	15	10"	8 3/4"	1'-1 1/2"	1'-1 1/2"	-	0.524	0.524	2.343	0.201	3.066
A5381	IB	R.R.	23'-6"	-	-	16x7/8	12x3/8	80x3/8	80x3/8	54	1/2	3'-0"	54	10	15	8 3/4"	10"	1'-1 1/2"	1'-1 1/2"	-	0.524	0.524	2.343	0.201	3.066
A5384	OB	R.R.	38'-6"	27'-0"	27'-0"	18x1 3/4	16x1	80x1 1/2	80x7/8	84	3/8	3'-9"	84	10	16	1'-1 1/2"	1'-4"	1'-5"	1'-5"	5	1.270	3.274	0.375	4.919	
A5388	IB	R.R.	25'-0"	-	-	16x7/8	12x3/8	80x3/8	80x3/8	84	3/8	3'-6"	84	14	21	2'-10"	2'-8 3/4"	1'-3"	1'-3"	-	0.302	0.981	0.096	1.379	
A5411	OB	R.R.	38'-6"	27'-0"	27'-0"	20x2	16x1 1/2	80x2 1/2	80x1 3/4	84	3/8	3'-9"	84	11	17	1'-1 1/2"	1'-4"	1'-5"	1'-5"	6	1.151	2.239	0.275	3.665	
A5427	IB	R.R.	38'-6"	27'-0"	27'-0"	18x1 3/4	16x1	80x1 1/2	80x7/8	84	3/8	3'-9"	84	10	16	1'-4"	1'-1 1/2"	1'-5"	1'-5"	5	1.270	3.274	0.375	4.919	
A5454	OB	L.R.	30'-0"	17'-6"	-	16x1 1/2	14x3/8	80x1 1/2	80x3/8	86	1/2	3'-3"	86	9	15	1'-1"	1'-1 1/2"	1'-3"	-	2	0.822	2.826	0.277	3.925	

REVISIONS	DATE	BY	DESCRIPTION
1	3-22-79	JH	REV. FOR FIELD CONDITION, AS-BUILT.

REFERENCE DRAWINGS	NUMBER	DESCRIPTION
A13-S-122	1/75	FIELD SPLICES AND DETAILS
A13-S-126	1/75	MISC. GIRDER DETAILS
A13-S-116	4/75	DIAPHRAGM DETAILS
A13-S-112	4/75	BEARING ASSUMPTIONS
A13-S-112	4/75	BEARING ASSUMPTIONS

**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**BUCHART-HORN**  
CONSULTING ENGINEERS AND PLANNERS

DE LEUW, CATHIER & COMPANY  
GENERAL ENGINEERING CONSULTANT

HARRY WEEBE & ASSOCIATES  
GENERAL ARCHITECTURAL CONSULTANT

APPROVED: *[Signature]*

**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

**AS-BUILT CONDITION**

DATE: MAY 03 1979

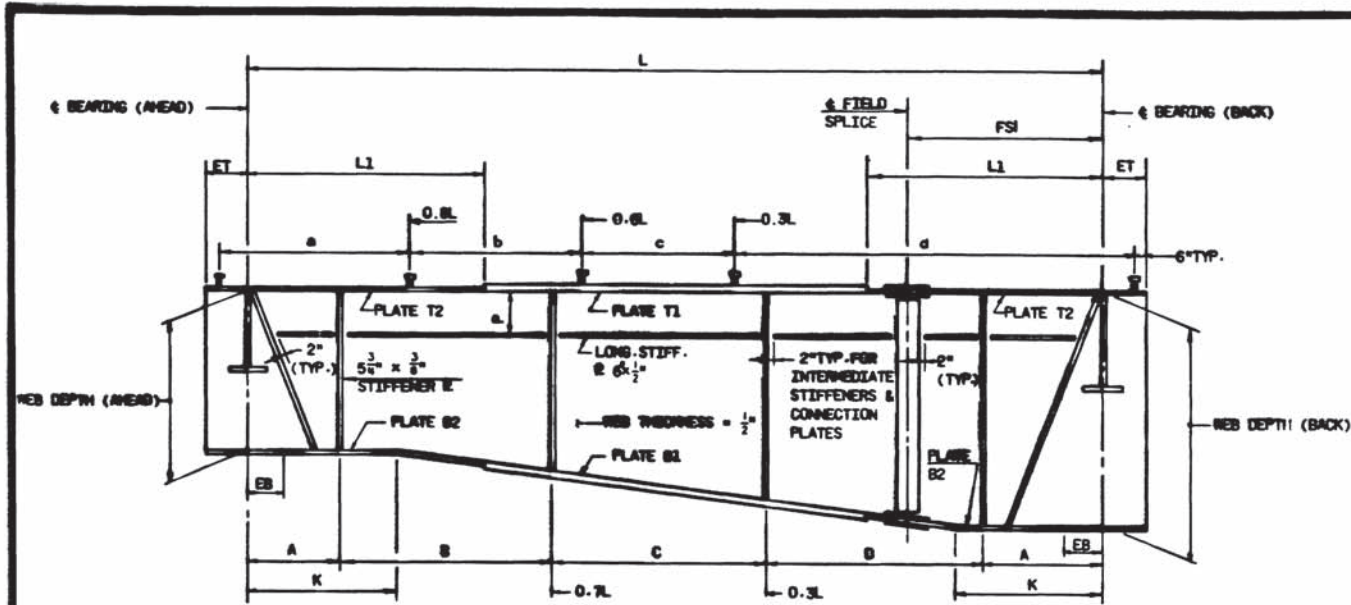
**ROCKVILLE ROUTE AERIAL STRUCTURE**

BOX GIRDER SCHEDULE - CONSTANT WEB UNITS

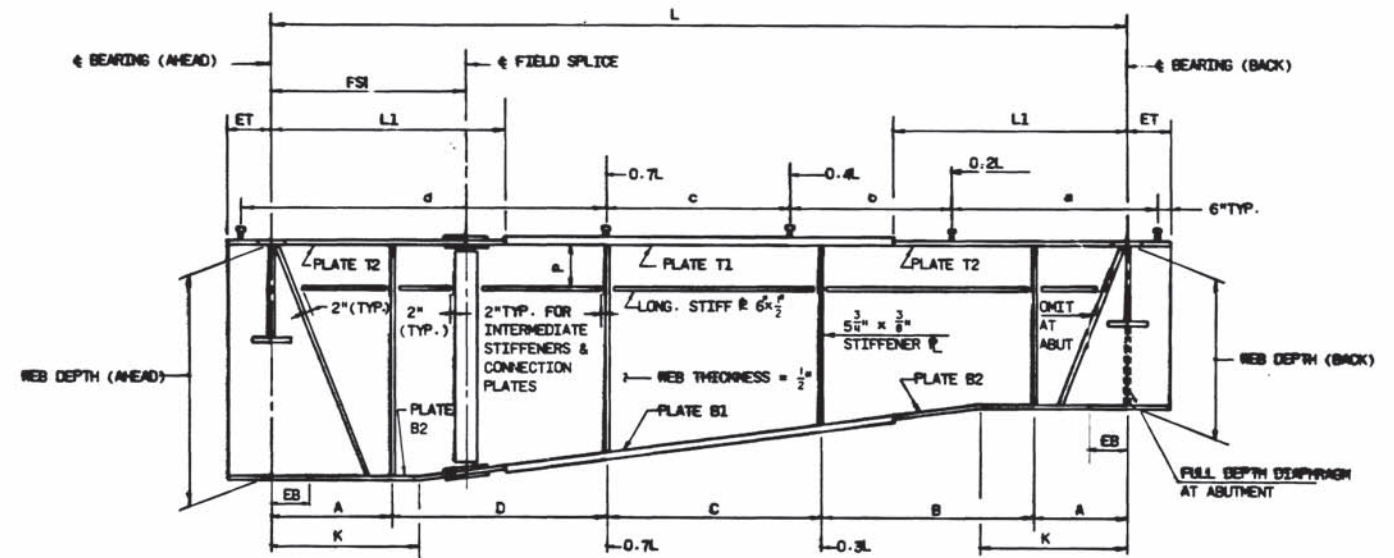
NO SCALE

DRAWING NO. **A13-S-88**

**M220-313**



**GIRDER ELEVATION**  
UNITS A5180, A5232, A5243, A5441



**GIRDER ELEVATION**  
UNITS A5168, A5219, A5371

NOTE:  
FOR IDENTIFICATION OF SYMBOLS, SEE  
"HORIZONTAL MEASUREMENT" DETAIL,  
SHEET A13-S-88.

GIRDER UNIT	NR	L1	FSI	ET T1	ET T2	EB B1	EB B2	WEB DEPTH		A				STIFFENER SPACING				SHEAR STUD SPACING				P	ET		EB		SPLICE TYPE	K		CAMBER AT MID-SPAN				
								BACK	AHEAD	BACK	AHEAD	B	C	D	a	b	c	d	BACK	AHEAD	BACK		AHEAD	BACK	AHEAD	VCD		DWS	DNC	SDL	TOTAL			
A5180	OB	R.W.	33'-0"	27'-0"	18" <sup>7</sup> / <sub>8</sub>	14" <sup>3</sup> / <sub>4</sub>	80" <sup>1</sup> / <sub>2</sub>	80" <sup>1</sup> / <sub>2</sub>	86	76	3'-0"	4'-0"	66	69	73	10	17	22	12	1'-3"	1'-3"	11" <sup>1</sup> / <sub>4</sub>	-	1'-6"	1'-3"	1	7'-6"	8'-6"	-	0.770	2.854	0.279	3.903	
A5180	IB	R.W.	25'-6"	-	16" <sup>1</sup> / <sub>2</sub>	12" <sup>3</sup> / <sub>4</sub>	80" <sup>1</sup> / <sub>2</sub>	80" <sup>1</sup> / <sub>2</sub>	76	66	4'-0"	3'-3"	66	69	73	12	20	23	14	1'-3"	11" <sup>1</sup> / <sub>4</sub>	1'-1"	1'-6"	1'-3"	1	4'-6"	0	-	0.770	2.854	0.279	3.903		
A5219	OB	R.W.	35'-8"	36'-8"	18" <sup>7</sup> / <sub>8</sub>	14" <sup>3</sup> / <sub>4</sub>	80" <sup>1</sup> / <sub>2</sub>	80" <sup>1</sup> / <sub>2</sub>	86	108	3'-3"	4'-0"	66	78	84	10	18	24	15	1'-10"	1'-1"	1'-0" <sup>3</sup> / <sub>4</sub>	1'-3"	1'-5"	3	0	8'-3"	1.447	0.633	2.240	0.225	4.545		
A5219	IB	R.W.	34'-0"	34'-0"	16" <sup>1</sup> / <sub>2</sub>	12" <sup>3</sup> / <sub>4</sub>	80" <sup>1</sup> / <sub>2</sub>	80" <sup>1</sup> / <sub>2</sub>	76	66	4'-0"	3'-3"	66	69	73	12	20	23	14	1'-3"	11" <sup>1</sup> / <sub>4</sub>	1'-1"	1'-6"	1'-3"	1	4'-6"	0	-	0.770	2.854	0.279	3.903		
A5232	OB	R.W.	32'-0"	32'-0"	18" <sup>7</sup> / <sub>8</sub>	14" <sup>3</sup> / <sub>4</sub>	80" <sup>1</sup> / <sub>2</sub>	80" <sup>1</sup> / <sub>2</sub>	108	66	4'-6"	3'-3"	64	78	82	10	17	24	14	1'-10"	1'-0" <sup>3</sup> / <sub>4</sub>	1'-1"	1'-5"	1'-3"	3	0	8'-3"	1.416	0.633	2.240	0.225	4.514		
A5232	IB	R.W.	33'-0"	33'-0"	16" <sup>1</sup> / <sub>2</sub>	12" <sup>3</sup> / <sub>4</sub>	80" <sup>1</sup> / <sub>2</sub>	80" <sup>1</sup> / <sub>2</sub>	76	66	4'-0"	3'-3"	66	69	73	12	20	23	14	1'-3"	11" <sup>1</sup> / <sub>4</sub>	1'-1"	1'-6"	1'-3"	1	4'-6"	0	-	0.770	2.854	0.279	3.903		
A5243	OB	R.W.	23'-0"	-	18" <sup>7</sup> / <sub>8</sub>	12" <sup>3</sup> / <sub>4</sub>	80" <sup>1</sup> / <sub>2</sub>	80" <sup>1</sup> / <sub>2</sub>	66	54	3'-0"	3'-0"	54	57	62	10	16	18	12	-	1'-10"	8" <sup>3</sup> / <sub>4</sub>	1'-1 <sup>1</sup> / <sub>2</sub> "	1'-1 <sup>1</sup> / <sub>2</sub> "	-	0	0	0.016	0.394	1.667	0.148	3.025		
A5243	IB	R.W.	23'-0"	-	16" <sup>1</sup> / <sub>2</sub>	12" <sup>3</sup> / <sub>4</sub>	80" <sup>1</sup> / <sub>2</sub>	80" <sup>1</sup> / <sub>2</sub>	66	54	3'-0"	3'-0"	54	57	62	10	16	18	12	-	1'-10"	8" <sup>3</sup> / <sub>4</sub>	1'-1 <sup>1</sup> / <sub>2</sub> "	1'-1 <sup>1</sup> / <sub>2</sub> "	-	0	0	0.016	0.394	1.667	0.148	3.025		
A5371	OB	R.W.	23'-0"	-	18" <sup>7</sup> / <sub>8</sub>	12" <sup>3</sup> / <sub>4</sub>	80" <sup>1</sup> / <sub>2</sub>	80" <sup>1</sup> / <sub>2</sub>	54	84	3'-0"	3'-0"	54	63	75	10	17	22	16	1'-5"	10"	3'-2 <sup>1</sup> / <sub>4</sub> "	1'-1 <sup>1</sup> / <sub>2</sub> "	1'-1 <sup>1</sup> / <sub>2</sub> "	-	0	0	-	0.304	1.223	0.113	1.640		
A5371	IB	R.W.	23'-0"	-	16" <sup>1</sup> / <sub>2</sub>	12" <sup>3</sup> / <sub>4</sub>	80" <sup>1</sup> / <sub>2</sub>	80" <sup>1</sup> / <sub>2</sub>	54	84	3'-0"	3'-0"	54	63	75	10	17	22	16	1'-5"	10"	3'-2 <sup>1</sup> / <sub>4</sub> "	1'-1 <sup>1</sup> / <sub>2</sub> "	1'-1 <sup>1</sup> / <sub>2</sub> "	-	0	0	-	0.304	1.223	0.113	1.640		
A5441	OB	L.W.	29'-0"	29'-0"	18" <sup>7</sup> / <sub>8</sub>	14" <sup>3</sup> / <sub>4</sub>	80" <sup>1</sup> / <sub>2</sub>	80" <sup>1</sup> / <sub>2</sub>	84	66	3'-6"	3'-3"	66	71	78	10	17	23	14	1'-5"	2'-2 <sup>1</sup> / <sub>4</sub> "	1'-1"	1'-3"	1'-3"	7	0	0	-	0.629	2.370	0.228	3.227		
A5441	IB	L.W.	29'-0"	29'-0"	16" <sup>1</sup> / <sub>2</sub>	12" <sup>3</sup> / <sub>4</sub>	80" <sup>1</sup> / <sub>2</sub>	80" <sup>1</sup> / <sub>2</sub>	84	66	3'-6"	3'-3"	66	71	78	10	17	23	14	1'-5"	2'-2 <sup>1</sup> / <sub>4</sub> "	1'-1"	1'-3"	1'-3"	7	0	0	-	0.629	2.370	0.228	3.227		

WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
AS-BUILT CONDITION  
MAY 03 1979

DESIGNED	DATE	REFERENCE DRAWINGS		REVISIONS	
		NUMBER	DESCRIPTION	DATE	BY
B.T. PILBEAM	1/75	A12-S-122	FIELD SPLICES AND DETAILS		
G. PERRELLI	1/75	A12-S-120	MISC. GIRDER DETAILS		
		A12-S-110	DIAPHRAGM DETAILS		
		A12-S-112	BEARING ASSEMBLIES		
		A12-S-118	BEARING ASSEMBLIES		

**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**SUCHART-HORN**  
CONSULTING ENGINEERS AND PLANNERS

DE LEUW, CATHIER & COMPANY  
GENERAL ENGINEERING CONSULTANT

HARRY WISSE & ASSOCIATES  
GENERAL ARCHITECTURAL CONSULTANT

SUBMITTED: *[Signature]* APPROVED: *[Signature]*

**ROCKVILLE ROUTE**  
AERIAL STRUCTURE  
BOX GIRDER SCHEDULE - VARYING WEB UNITS

NO SCALE

ISSUE NO. A13-S-93

M220-314



SPIRAL NO.	OUTBOUND				
	CURVE NO.	POINT	STATION OR ARC LENGTH FROM T.S. OR C.S.	COORDINATES	
				NORTH	EAST
640A		T.S.	519+09.878	431177.4803	771164.9891
	640A-1	P.C.	27.173	431201.4176	771182.1275
	640A-2	P.C.C.	183.377	431339.5344	771079.1888
640B		P.C.C.(S.C.)	326.000	432467.4882	772036.1490
	640B-2	P.C.C.(C.S.)	531+98.470	432990.9457	770780.7868
	640B-1	P.C.C.	142.618	432533.0764	770749.1519
660A		P.T.	298.834	432889.0867	770740.7674
		S.T.	326.000	432736.3040	770798.8043
		T.S.	535+13.123	432904.7807	770735.3426
680A		P.C.	22.984	432827.7201	770734.3139
	680A-2	P.C.C.	155.251	432908.8773	770728.9522
		P.C.C.(S.C.)	276.000	433080.6086	770726.9380
680B		P.C.C.(C.S.)	539+97.407	433188.8894	770729.0877
	680B-2	P.C.C.	120.746	433308.4084	770735.9028
	680B-1	P.T.	253.084	433441.2471	770746.5145
680A		S.T.	276.000	433464.1482	770746.4948
		T.S.	543+57.889	433587.9835	770786.6083
	680A-1	P.C.	20.818	433678.7034	770786.4033
680A-2	P.C.C.(S.C.)	140.625	433886.1241	770787.9808	
			290.000	433907.3270	770773.9880

SPIRAL NO.	INBOUND				
	CURVE NO.	POINT	STATION OR ARC LENGTH FROM T.S. OR C.S.	COORDINATES	
				NORTH	EAST
630A		T.S.	519+22.874	431182.3024	771146.9053
	630A-1	P.C.	25.009	431204.5333	771134.6880
	630A-2	P.C.C.	188.746	431331.2882	771087.4639
630B		P.C.C.(S.C.)	300.000	432448.9482	772008.1888
	630B-2	P.C.C.(C.S.)	532+17.828	432908.2186	770746.2887
	630B-1	P.C.C.	131.296	432534.0848	770734.8975
660A		P.T.	275.008	432677.8051	770727.2888
		S.T.	300.000	432702.8788	770726.1288
		T.S.	536+26.121	432817.0887	770720.7888
680A		P.C.	20.833	432857.9043	770719.8290
	680A-2	P.C.C.	140.821	432957.9804	770714.8997
		P.C.C.(S.C.)	290.000	433086.9437	770712.7530
680B		P.C.C.(C.S.)	540+12.289	433203.0724	770715.4670
	680B-2	P.C.C.	108.371	433312.2480	770721.9510
	680B-1	P.T.	228.164	433431.6470	770731.6320
670A		S.T.	290.000	433462.4051	770733.4270
		T.S.	543+54.572	433546.2182	770741.5415
	670A-1	P.C.	23.021	433669.1540	770743.5252
670A-2	P.C.C.	136.248	433780.8853	770754.0048	
670	P.C.C.(S.C.)	276.000	433821.9488	770780.2297	

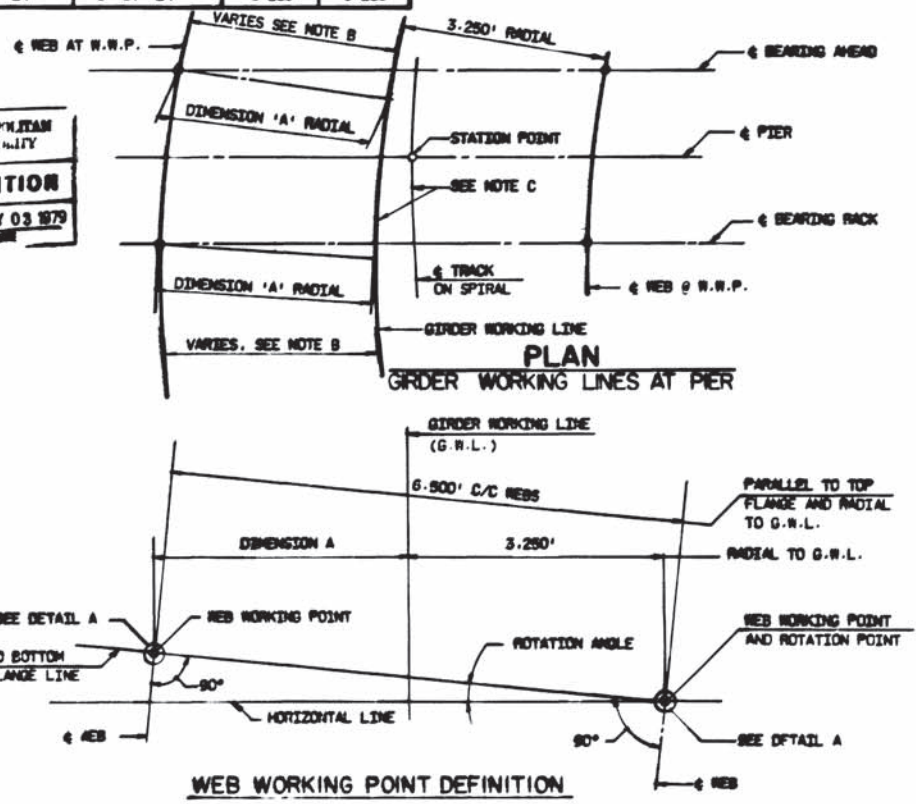
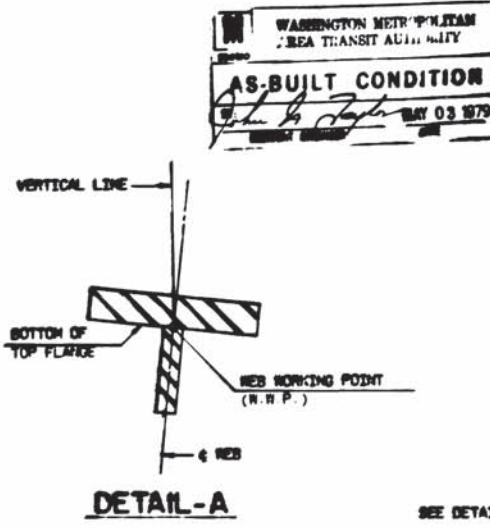
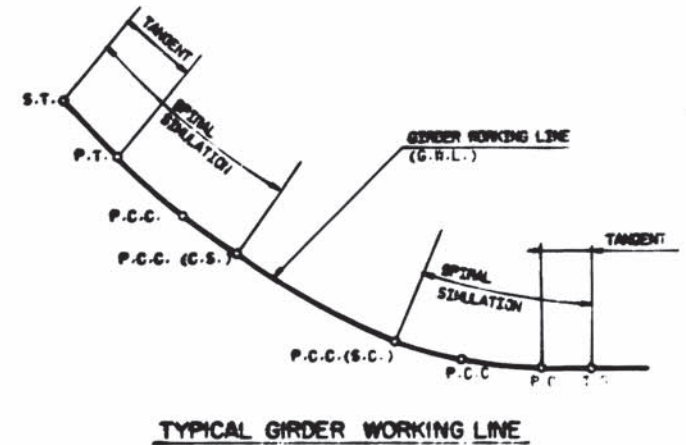
CURVE	Δ	R	T	L
640A-1	0°-48'-32.6"	11061.777	78.103	156.204
640A-2	2°-25'-37.8"	3366.747	71.322	142.623
640	19°-06'-43.0"	2885.780	485.810	962.592
640B-2	2°-25'-37.9"	3366.618	71.320	142.618
640B-1	0°-48'-32.6"	11062.819	78.109	156.216
680A-1	0°-40'-59.0"	11094.355	66.134	132.267
680A-2	2°-02'-56.5"	3376.448	60.381	120.749
680	2°-08'-37.7"	2894.000	54.150	108.284
680B-2	2°-02'-56.2"	3376.464	60.379	120.746
680B-1	0°-40'-58.9"	11094.909	66.135	132.268
680A-1	0°-42'-58.4"	9384.109	69.904	119.807
680A-2	2°-08'-54.5"	2916.817	54.694	109.375
680	5°-32'-53.7"	2500.000	121.140	242.090

CURVE	Δ	R	T	L
630A-1	0°-44'-27.1"	11115.916	71.869	143.736
630A-2	2°-13'-21.3"	3383.604	65.636	131.256
630	19°-39'-26.6"	2900.000	502.410	994.951
630B-2	2°-13'-21.6"	3383.492	65.636	131.256
630B-1	0°-44'-27.0"	11117.856	71.878	143.754
660A-1	0°-36'-56.3"	11148.347	68.884	119.788
660A-2	1°-50'-48.0"	3393.129	54.694	109.579
660	2°-40'-57.7"	2908.190	68.100	136.168
660B-2	1°-50'-48.2"	3392.782	54.690	109.571
660B-1	0°-36'-56.5"	11147.613	68.897	119.793
670A-1	0°-47'-42.9"	9826.637	66.115	132.228
670A-2	2°-23'-07.8"	2900.230	60.384	120.751
670	4°-54'-58.2"	2485.770	106.710	213.288

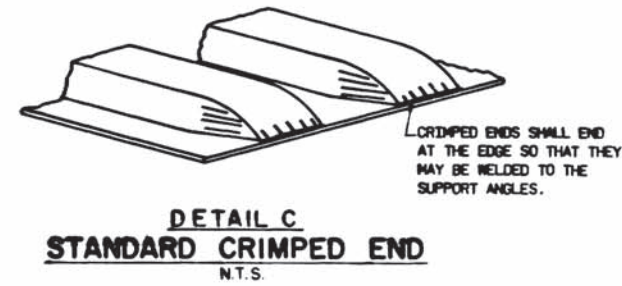
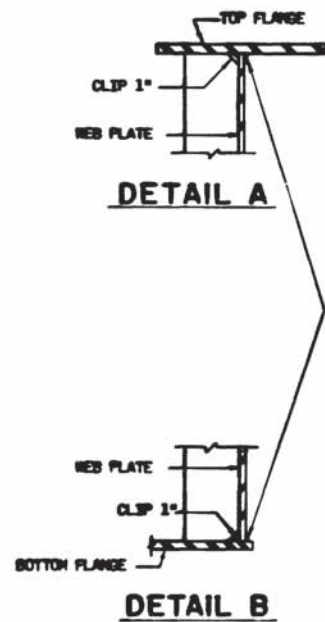
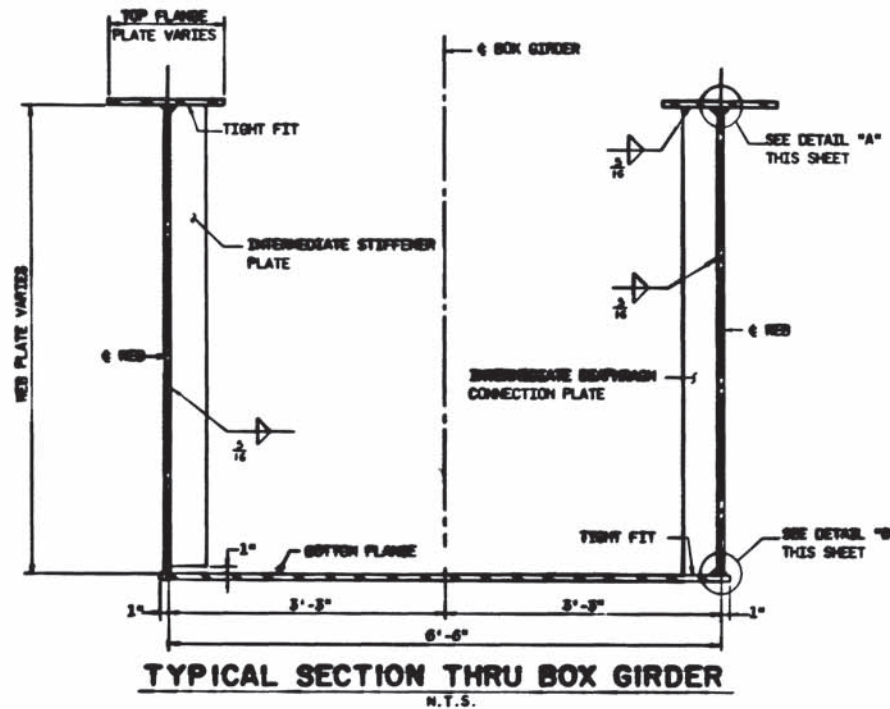
PIER, FRAME OR ABUT. NUMBER	BEARING	WEB ROTATION POINT	ROTATION ANGLE		DIMENSION A	
			OUTBOUND	INBOUND	OUTBOUND	INBOUND
A5199	BACK	R.W.	1°-29'-00"	1°-20'-54"	3.248	3.248
OB: IB	AHEAD	R.W.	1°-35'-45"	1°-28'-14"	3.248	3.248
A5212	BACK	R.W.	3°-53'-09"	3°-57'-53"	3.235	3.234
OB: IB	AHEAD	R.W.	3°-59'-55"	4°-05'-14"	3.234	3.233
A5324	BACK	R.W.	5°-23'-16"	5°-36'-09"	3.221	3.219
OB: IB	AHEAD	R.W.	5°-17'-37"	5°-30'-01"	3.222	3.220
A5335	BACK	R.W.	3°-16'-55"	3°-18'-21"	3.239	3.239
OB: IB	AHEAD	R.W.	3°-11'-17"	3°-12'-14"	3.240	3.240
A5345	BACK	R.W.	1°-22'-05"	1°-13'-21"	3.248	3.249
OB: IB	AHEAD	R.W.	1°-16'-28"	1°-07'-15"	3.248	3.249
A5366	BACK	R.W.	0°-39'-53"	0°-30'-33"	3.250	3.250
OB: IB	AHEAD	R.W.	0°-44'-35"	0°-35'-44"	3.250	3.250
A5376	BACK	R.W.	2°-13'-05"	2°-13'-37"	3.245	3.245
OB: IB	AHEAD	R.W.	2°-21'-34"	2°-22'-58"	3.245	3.244
A5392	BACK	R.W.	4°-19'-59"	4°-19'-59"	3.231	3.231
OB: IB	AHEAD	R.W.	4°-19'-59"	4°-19'-59"	3.231	3.231
A5403	BACK	R.W.	3°-53'-57"	4°-05'-20"	3.235	3.233
OB: IB	AHEAD	R.W.	3°-45'-56"	3°-56'-29"	3.236	3.236
A5419	BACK	R.W.	1°-21'-48"	1°-16'-52"	3.248	3.248
OB: IB	AHEAD	R.W.	1°-15'-13"	1°-09'-35"	3.248	3.249
A5447	BACK	L.W.	2°-07'-41"	2°-08'-54"	3.246	3.245
OB: IB	AHEAD	L.W.	2°-15'-01"	2°-16'-33"	3.245	3.245
A5480	BACK	L.W.	4°-44'-26"	4°-31'-19"	3.228	3.230
OB: IB						
SEE NOTE A	BACK	R.W.	6°-07'-24"	6°-07'-24"	3.213	3.213
	AHEAD	R.W.	6°-07'-24"	6°-07'-24"	3.213	3.213

**NOTES:**  
A. ROTATION ANGLE AND DIMENSION 'A' ARE CONSTANT FOR PIER OR FRAME NUMBERS SHOWN:  
R.W. ROTATION  
A5225 OB: IB    A5279 OB: IB  
A5238 OB: IB    A5290 OB: IB  
A5248 OB: IB    A5302 OB: IB  
A5258 OB: IB    A5313 OB: IB  
A5268 OB: IB  
B. IN ROTATION SPANS ONLY DIMENSION 'A' VARIES LINEARLY BETWEEN BEARINGS  
C. OUTSIDE THE SPIRAL SIMULATION GIRDER WORKING LINE AND TRACK COINCIDE.  
D. ALL DIMENSIONS ARE IN DECIMAL FEET  
E. THE ROTATION ANGLE IS MEASURED IN A PLANE PERPENDICULAR TO THE WEB WORKING LINE AT THE POINT WHERE THE WORKING LINE INTERSECTS THE BEARING.

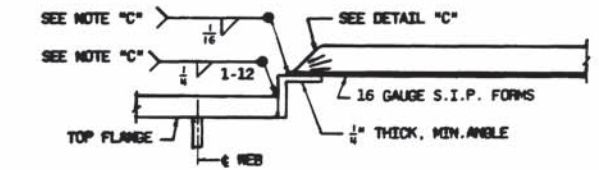
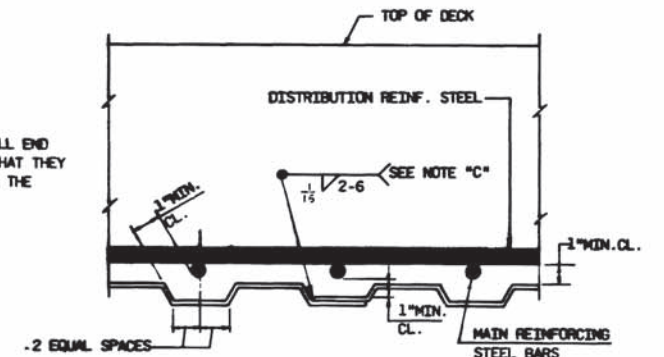
**LEGEND:**  
R.W. = RIGHT WEB  
L.W. = LEFT WEB  
G.W.L. = GIRDER WORKING LINE



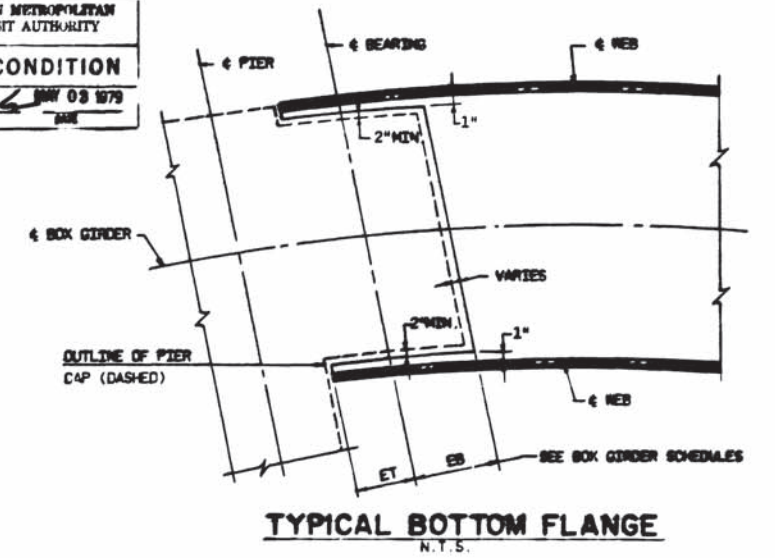
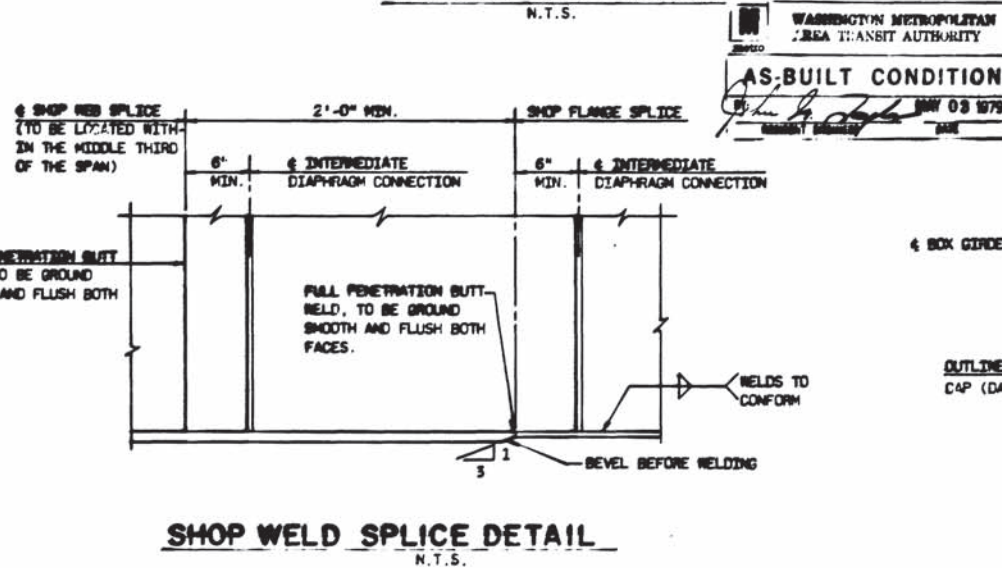
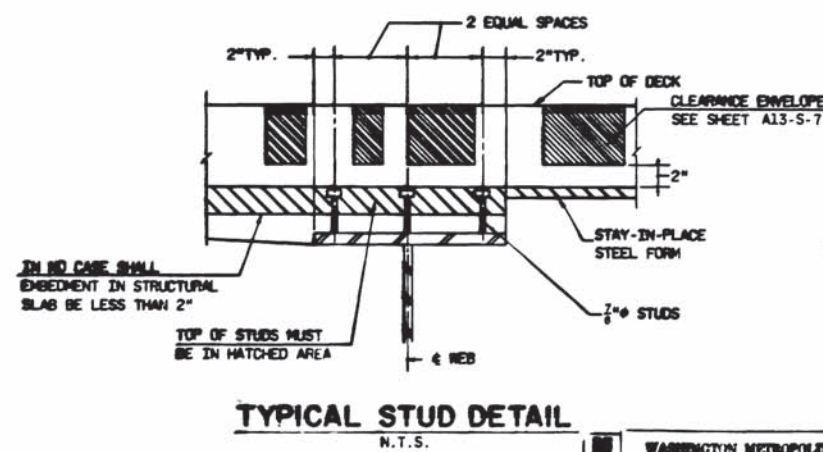
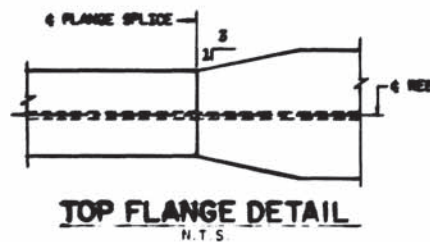
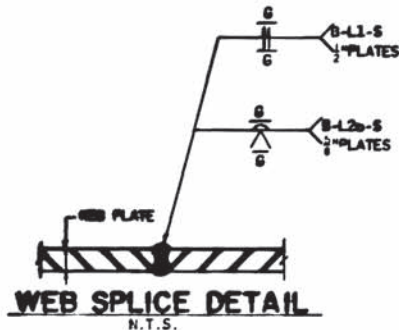
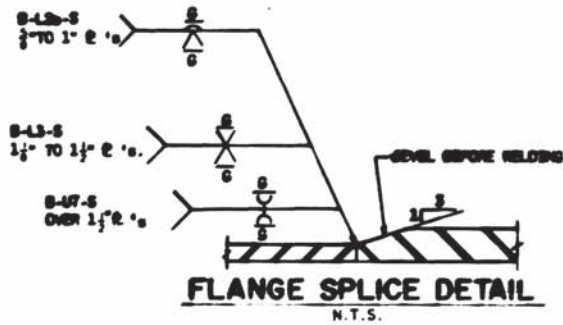
DESIGNED: J.C.M. 1/75 DRAWN: G.FORRELL/MS 1/75 CHECKED: J.C.M. 9/75 APPROVED: [Signature] 8/88	<b>REFERENCE DRAWINGS</b> NUMBER DESCRIPTION DATE BY A13-S-84 HORIZONTAL BOX GIRDER LENGTHS	<b>REVISIONS</b> NUMBER DESCRIPTION DATE BY	<b>WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY</b> SECTION CHIEF: <b>BUCHART-HORN</b> CONSULTING ENGINEERS AND PLANNERS SUBMITTED: [Signature]	DE LEUW, CATHNER & COMPANY GENERAL ENGINEERING CONSULTANT HENRY WISSE & ASSOCIATES GENERAL ARCHITECTURAL CONSULTANT APPROVED: [Signature]	<b>ROCKVILLE ROUTE AERIAL STRUCTURE</b> <b>HORIZONTAL BOX GIRDER DEFINITION</b> SCALE: NO SCALE DRAWING NO: A13-S-80 M220-315
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NOTE-C  
ADJUST CURRENT AND ELECTRODE SPEED TO PREVENT BURN-THROUGH.



NOTE:  
STEEL FORMS WHICH REMAIN IN PLACE SHALL BE USED BETWEEN THE FLANGES OF A BOX GIRDER (i.e., WITHIN THE GIRDER) AND SHALL BE 16 GAUGE MINIMUM THICKNESS, AND ZINC COATED (GALVANIZED) IN ACCORDANCE WITH A.S.T.M. SPECIFICATION A-446 COATING CLASS 2.00. STEEL FORMS WILL BE PROPERLY WELDED TO TOP FLANGE PLATES OF THE BOX GIRDER AS SHOWN IN THE DETAIL. STEEL STAY-IN-PLACE FORMS SHALL NOT BE USED BETWEEN THE FLANGES OF ADJACENT BOX GIRDERS (i.e., FOR THE EXPOSED UNDER-SURFACE OF THE CONCRETE DECK).



WELD INSPECTION-BOX GIRDERS AND PIER CAPS  
NOTE-A:  
ALL SHOP BUTT WELDS IN THE WEBS AND TOP AND BOTTOM FLANGES SHALL BE COMPLETELY INSPECTED BY RADIOGRAPHIC OR ULTRASONIC TESTING AND SHALL BE FINISHED SMOOTH AND FLUSH WITH THE BASE METAL BY GRINDING IN THE DIRECTION OF APPLIED STRESS, LEAVING SURFACES FREE FROM DEPRESSIONS.  
NOTE-B:  
ALL WEB TO FLANGE, WEB TO ENCLOSED END DIAPHRAGM PLATE AND END DIAPHRAGM BEAM WEB TO BEARING STIFFENER PLATE FILLET WELDS SHALL BE INSPECTED IN THEIR ENTIRETY BY THE MAGNETIC PARTICLE METHOD.

WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
AS-BUILT CONDITION  
DATE 03 1979

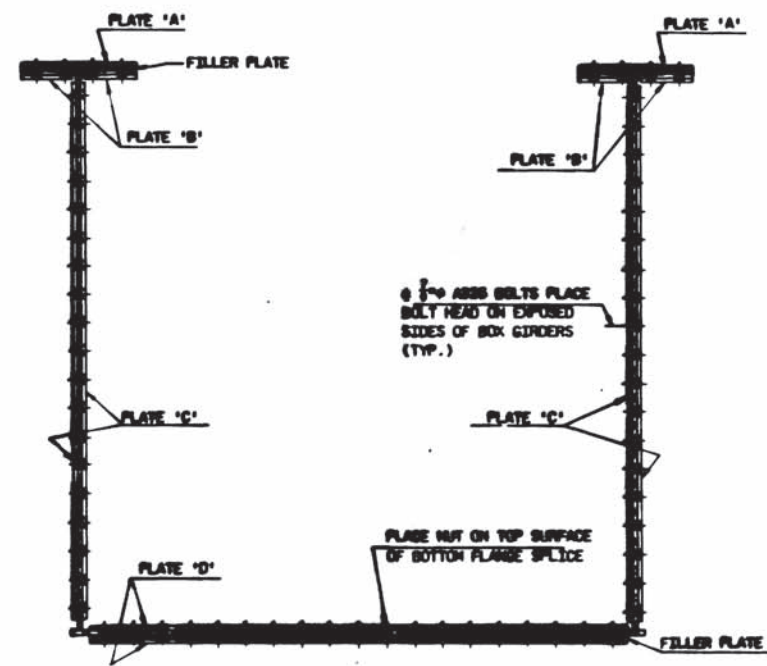
REVISIONS	REFERENCE DRAWINGS		REVISIONS	
	NUMBER	DESCRIPTION	DATE	BY
	A13-S-122	FIELD SPLICES AND DETAILS		
	A13-S-7	BOX GIRDER AND DECK SLAB SECTIONS		
	A13-S-89	BOX GIRDER AND DECK SLAB SECTIONS		

WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
SECTION DESIGNER  
**BUCHART-HORN**  
CONSULTING ENGINEERS AND PLANNERS  
SUBMITTED: [Signature]

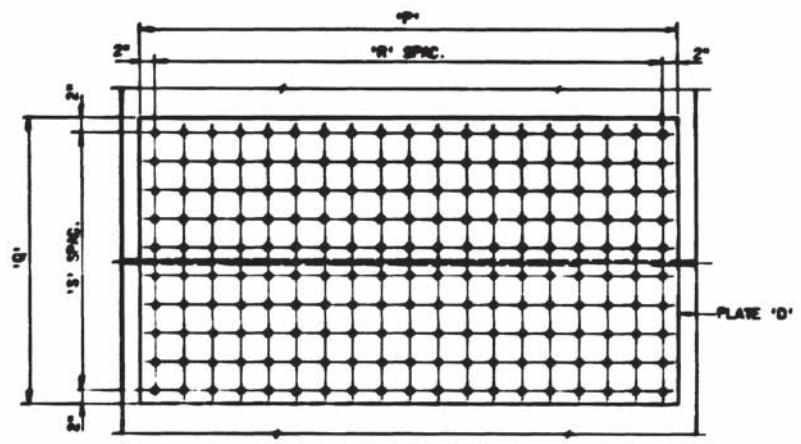
DE LEJAY, CATHY & COMPANY  
GENERAL ENGINEERING CONSULTANT  
HARRY WISSE & ASSOCIATES  
GENERAL ARCHITECTURAL CONSULTANT  
APPROVED: [Signature]

ROCKVILLE ROUTE  
AERIAL STRUCTURE  
MISCELLANEOUS GIRDER DETAILS

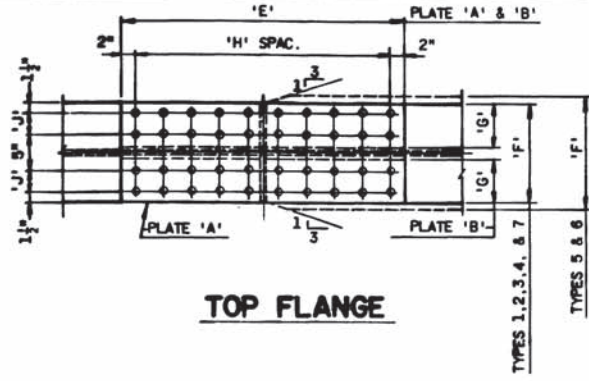
NO SCALE  
DRAWING NO. A13-S-120  
M220-316



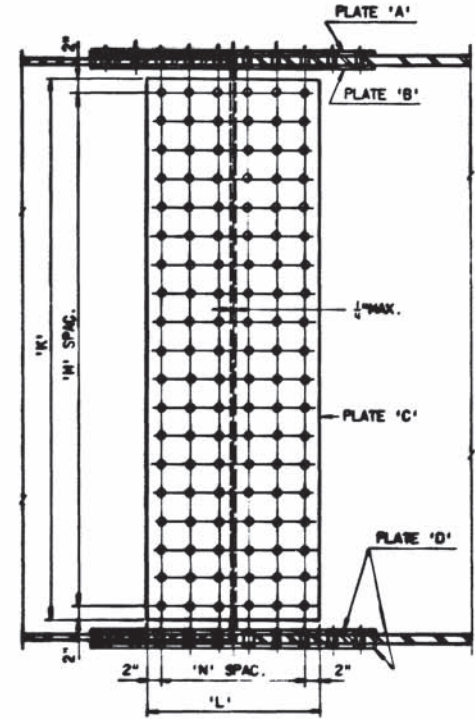
TYPICAL SECTION



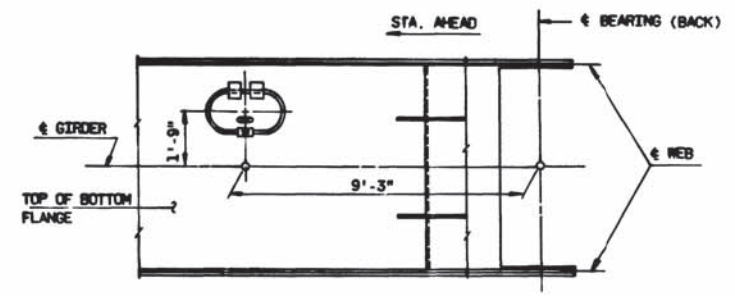
BOTTOM FLANGE



TOP FLANGE

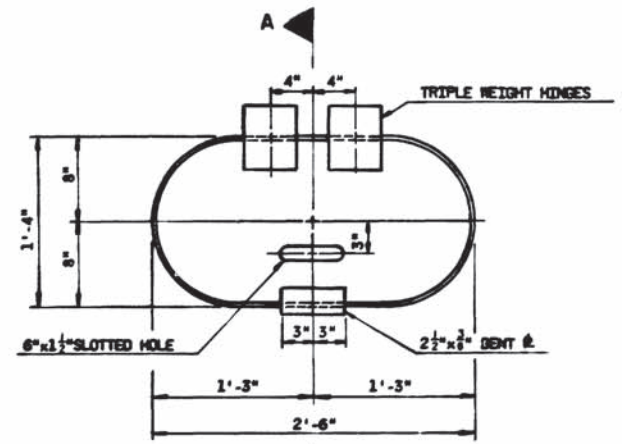


WEB SPLICE



PLAN

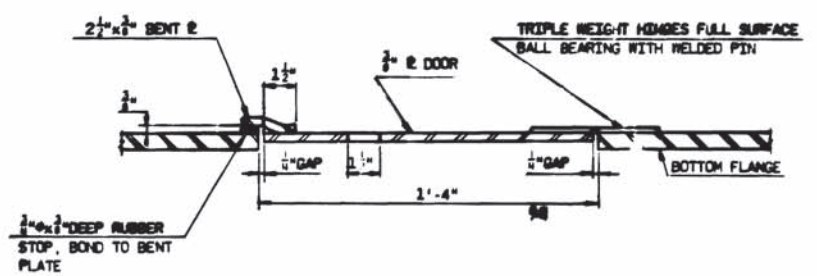
NOTE: BOTTOM ACCESS HATCH SHALL BE PLACED AT BACK STATION END ONLY OF EACH GIRDER AS SHOWN.



TYPICAL BOTTOM ACCESS HATCH

WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
**AS-BUILT CONDITION**  
 MAY 03 1979

SPLICE TYPE	TOP FLANGE										WEB				BOTTOM FLANGE								
	PLATE 'A'		FILLER PLATE	PLATE 'B'		BOLTS		PLATE 'C'		BOLTS		PLATE 'D'		FILLER PLATE	BOLTS								
	'E'	'F'		TH'K.	'E'	'G'	TH'K.	NO.	'H' SPAC.	'J'	'K'	'L'	TH'K.		NO.	'M' SPAC.	'N' SPAC.	'P'	'Q'	TH'K.	NO.	'R' SPAC.	'S' SPAC.
1	32"	14"	1/2"	32"	6"	1/2"	32	7 x 4"=28"	3"	72"	24"	1/2"	108	17 x 4"=68"	5 x 4"=20"	76"	32"	1/2"		152	18 x 4"=72"	7 x 4"=28"	
2	32"	14"	1/2"	32"	6"	1/2"	32	7 x 4"=28"	3"	64"	24"	1/2"	96	15 x 4"=60"	5 x 4"=20"	76"	32"	1/2"		152	18 x 4"=72"	7 x 4"=28"	
3	32"	14"	1/2"	14 x 1/2" x 32"	32"	6"	1/2"	32	7 x 4"=28"	3"	96"	24"	1/2"	144	23 x 4"=92"	5 x 4"=20"	76"	32"	1/2"		152	18 x 4"=72"	7 x 4"=28"
4	32"	14"	1/2"	14 x 1/2" x 32"	32"	6"	1/2"	32	7 x 4"=28"	3"	96"	24"	1/2"	144	23 x 4"=92"	5 x 4"=20"	76"	32"	1/2"	32 x 1/2" x 76"	152	18 x 4"=72"	7 x 4"=28"
5	40"	16"	3/8"		40"	7"	3/8"	40	9 x 4"=36"	4"	82"	24"	3/8"	162	26 x 4"=78"	5 x 4"=20"	76"	40"	3/8"		190	18 x 4"=72"	9 x 4"=36"
6	48 1/2"	16"	3/8"		48 1/2"	7"	3/8"	96	13 x 3 1/2"=45 1/2"	4"	82"	24"	3/8"	162	26 x 4"=78"	5 x 4"=20"	74"	48 1/2"	3/8"		280	20 x 3 1/2"=70"	13 x 3 1/2"=45 1/2"
7	32"	14"	1/2"	14 x 1/2" x 32"	32"	6"	1/2"	32	7 x 4"=28"	3"	76"	24"	1/2"	114	18 x 4"=72"	5 x 4"=20"	76"	32"	1/2"		152	18 x 4"=72"	7 x 4"=28"



SECTION A-A

REVISION	DATE	BY	DESCRIPTION
1	2/75		
2	2/76		
3	6/75		

**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**BUCHART-HORN**  
 CONSULTING ENGINEERS AND PLANNERS

DE LEUW, CATHER & COMPANY  
 GENERAL ENGINEERING CONSULTANT

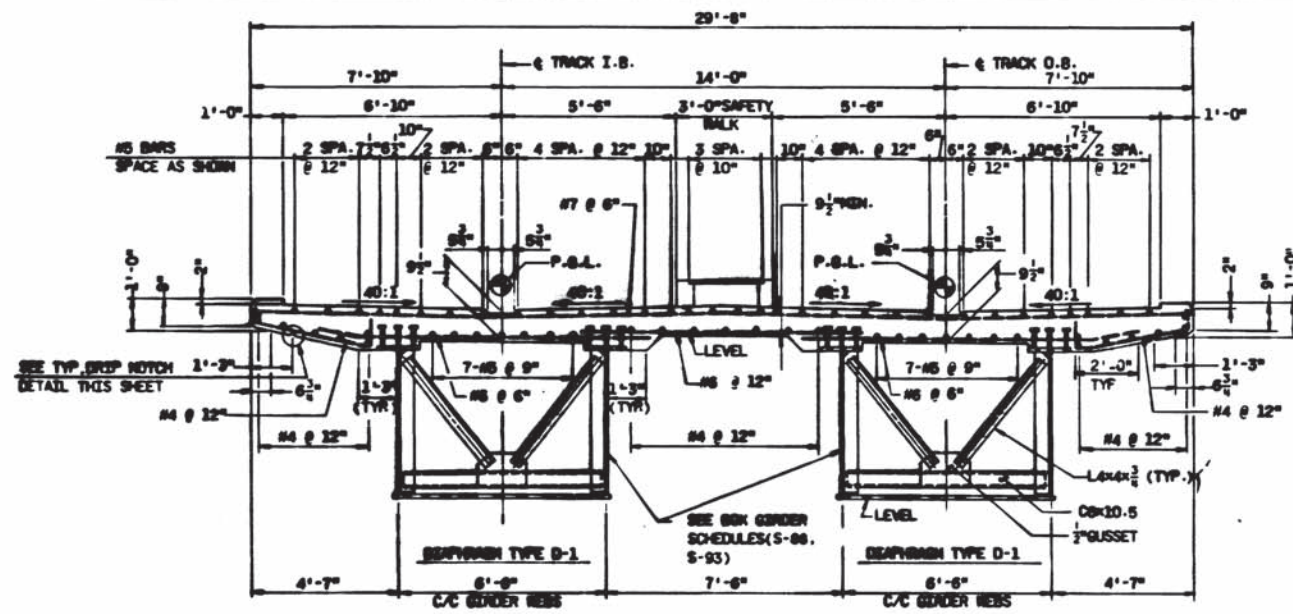
HARRY WEEKE & ASSOCIATES  
 GENERAL ARCHITECTURAL CONSULTANT

**ROCKVILLE ROUTE AERIAL STRUCTURE**  
 FIELD SPLICES AND DETAILS

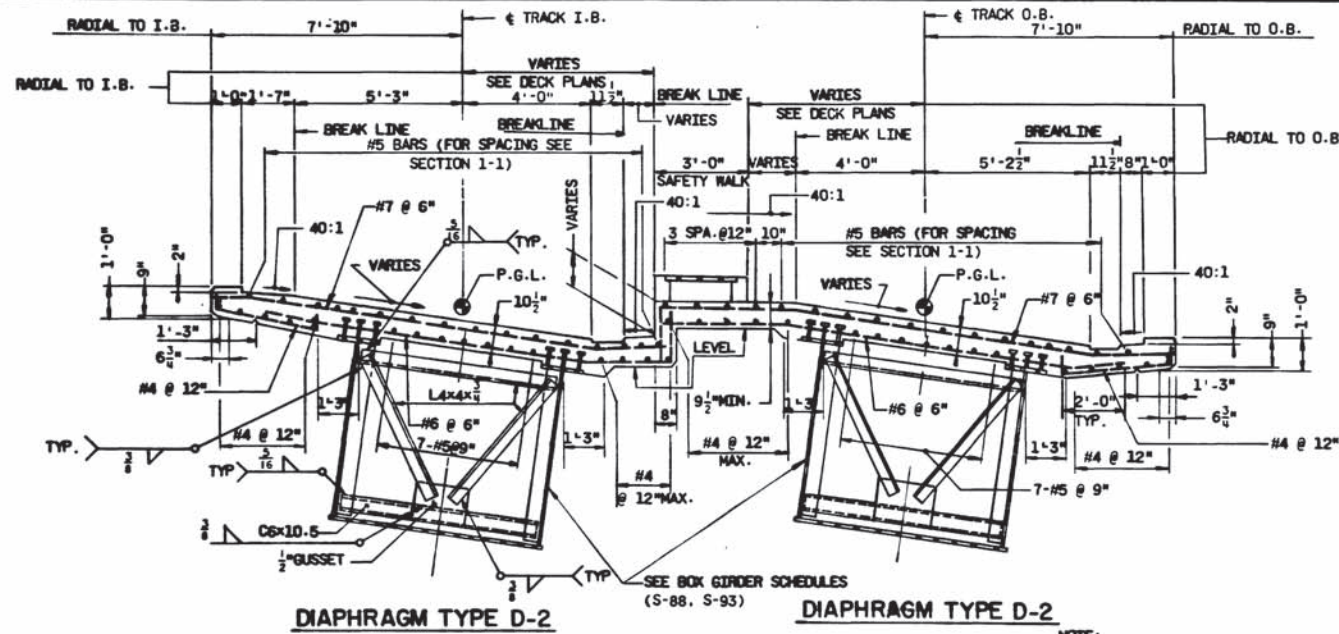
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ISSUE NO. A13-S-122

M220-317

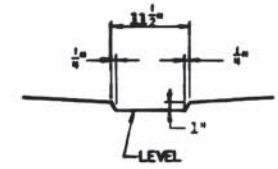


**SECTION 1-1**  
S-23, S-24, S-25, S-26, S-27, S-38, S-39, S-56, S-62



**SECTION 2-2**  
S-27, S-28, S-29, S-30, S-31, S-32, S-33, S-35, S-38, S-39,  
S-41, S-45, S-46, S-47, S-48, S-54, S-55, S-61, S-62

NOTE:  
SAFETY WALK RAILING NOT SHOWN  
FOR DIAPHRAGM TYPE AND LOCATION, SEE DECK PLANS.  
WELDING SHOWN AT DIAPHRAGM TYPE D-2 IS SIMILAR  
AT DIAPHRAGM TYPE D-1.

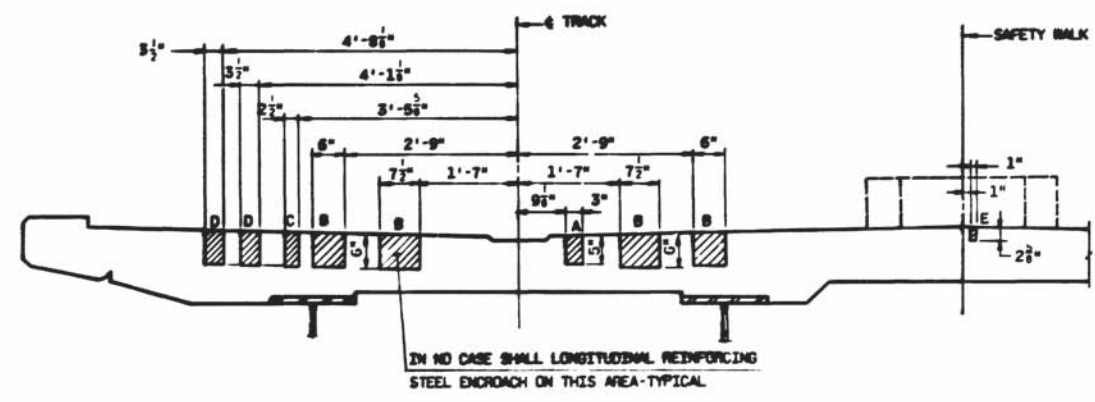
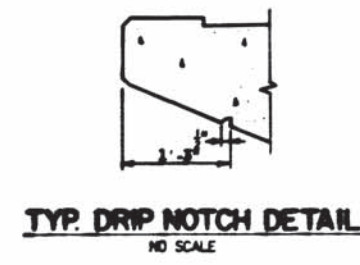


**TYPICAL DRAINAGE TROUGH**  
SCALE: 1" = 1'-0"

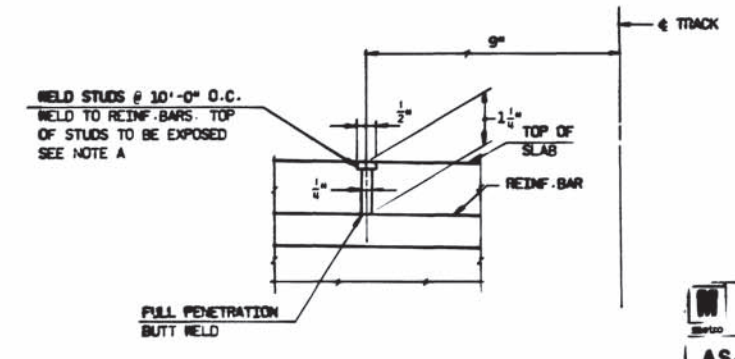
- LEGEND**
- A-GUARD RAIL AND RESTRAINING RAIL FASTENERS (M.I.C.)
  - B-CORRECT FIXATION RAIL FASTENERS (M.I.C.)
  - C-CONTACT RAIL ANCHOR (M.I.C.)
  - D-CONTACT RAIL DISPLAY BASE (M.I.C.)
  - E-CABLE TROUGH FASTENERS

**NOTE A**  
LOCATOR STUDS ARE ALWAYS TO BE LOCATED TO THE LEFT OF TRACK (LOOKING UPSTATION)  
AS SHOWN IN DETAIL. SPACING SHALL BE EVERY 10 FT. BEGINNING WITH THE FIRST TRANSVERSE  
BAR IN EACH SPAN UNIT, AND ONLY THE FIRST AND LAST TRANSVERSE BARS IN EACH PIER CAP  
UNIT.

**AS-BUILT NOTE**  
TOP MAT LONGITUDINAL RE-STEEL CAN BE PLACED BENEATH TRANSVERSE REINFORCING BARS, HOLDING THE MIN. 1/4 COVER OVER THE TRANSVERSE BAR.



**ANCHOR CLEARANCE ENVELOPES**  
SCALE: 3/4" = 1'-0"



**TYPICAL LOCATOR STUD DETAIL**  
SCALE: 6" = 1'-0"

WASHINGTON METROPOLITAN  
AREA TRANSIT AUTHORITY

**AS-BUILT CONDITION**

DATE: MAY 02 1978

REVISIONS	NUMBER	DESCRIPTION	DATE	BY
1)	11/76	SAFETY WALK AND CABLE TROUGH DETAILS	3-22-79	7b
2)	11/76	SAFETY WALK AND CABLE TROUGH DETAILS		
3)	4/75	SAFETY WALK AND CABLE TROUGH DETAILS		
4)	11/76	BOX GIRDER AND DECK SECTIONS		

**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**BUCHART-HORN**  
CONSULTING ENGINEERS AND PLANNERS

DE LEUW, CATHNER & COMPANY  
GENERAL ENGINEERING CONSULTANT

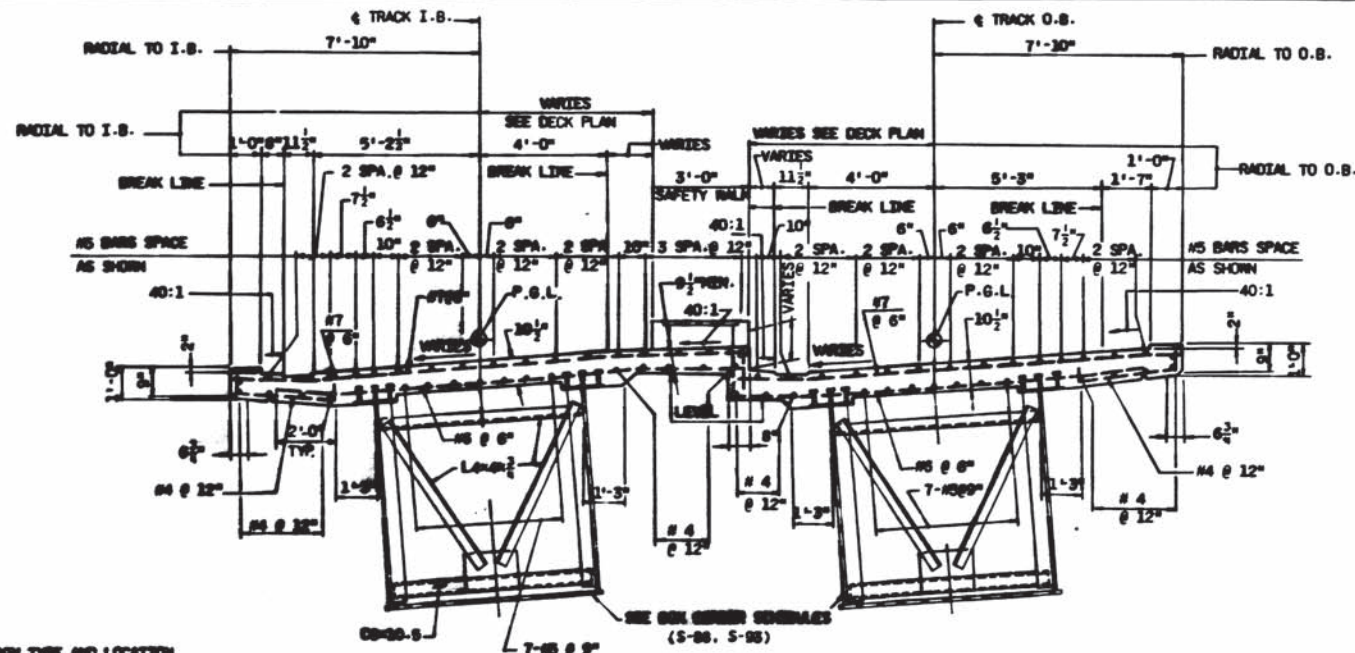
HARRY WISSE & ASSOCIATES  
GENERAL ARCHITECTURAL CONSULTANT

**ROCKVILLE ROUTE**  
AERIAL STRUCTURE  
BOX GIRDER AND DECK SLAB SECTIONS

SCALE: 3/8" = 1'-0" AND AS NOTED

DRAWING NO. A13-S-7

M220-348



NOTE:  
FOR DIAPHRAGM TYPE AND LOCATION,  
SEE DECK PLANS.  
SEE DRG. A13-S-7 FOR WELDING AT  
DIAPHRAGMS.

DIAPHRAGM TYPE D-2

DIAPHRAGM TYPE D-2

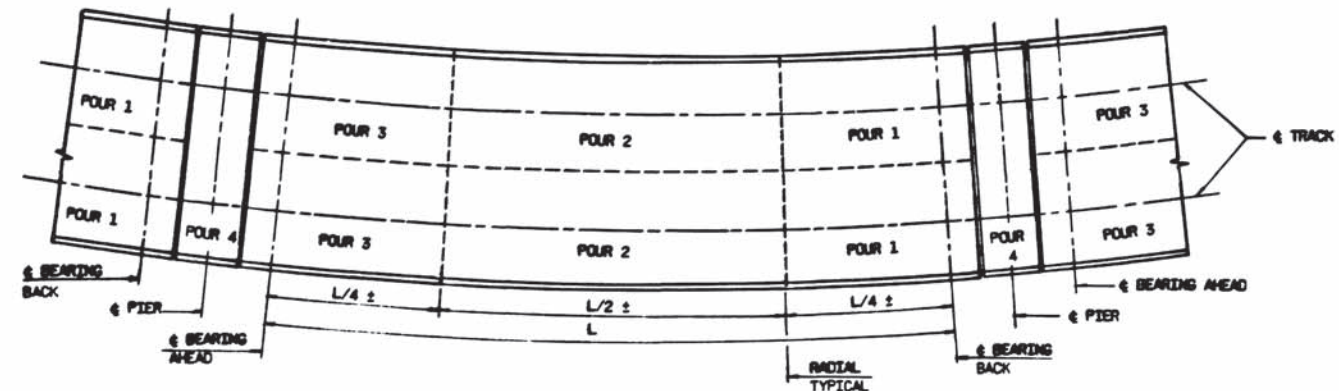
**SECTION 3-3**

S-66, S-63

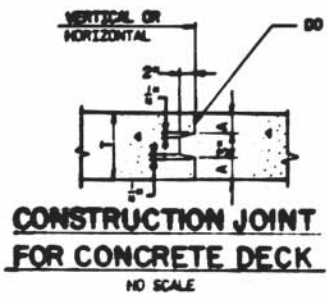
- POURING SEQUENCE NOTES:**
1. CONSTRUCTION JOINTS IN CONFORMANCE WITH THE LIMITS OF THIS SHEET OF THE CONTRACT DRAWINGS ARE AT THE OPTION OF THE CONTRACTOR.
  2. THE REINFORCING STEEL DETAILS NOT SHOWN. FOR THESE DETAILS REFER TO SECTIONS THIS SHEET AND DRG. NO. A13-S-7 AND ALSO DRG. NO. A13-S-89, A13-S-155 AND A13-S-156.
  3. POURS #1, #2 & #3 MAY BE MADE IN ANY ORDER, OR ANY WORKABLE COMBINATION. POUR #4 MUST BE MADE AFTER THE DECKS HAVE BEEN POURED ON BOTH ADJACENT UNITS.
  4. WHERE LONGITUDINAL CONSTRUCTION JOINTS ARE EMPLOYED, THE FORMS SHALL BE ADJUSTED AND CONSTRUCTED, AND THE SEQUENCE OF THE POURS MADE SO AS TO ACCOUNT FOR DIFFERENTIAL SETTLEMENTS WITHOUT INDUCING UNDER STRESS.
  5. A COMPLETE WRITTEN SCHEDULE OF POURING SEQUENCE, CONSTRUCTION JOINTS AND FORM ADJUSTMENTS METHOD SHALL BE SUBMITTED TO THE ENGINEER. THE DECK POUR SHALL NOT BE MADE UNTIL APPROVAL BY THE ENGINEER IN WRITING IS GIVEN TO THIS SCHEDULE.
  6. DETAILS SHOWN ARE FOR DECK TRANSVERSELY CONTINUOUS ACROSS TWO BOX GIRDERS.

**AS-BUILT NOTE**  
TOP MAT LONGITUDINAL RE-STEEL CAN BE PLACED BENEATH TRANSVERSE BARS, HOLDING THE MINIMUM 1/4" COVER OVER THE TRANSVERSE BAR.

WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
AS-BUILT CONDITION  
MAY 03 1979  
DATE

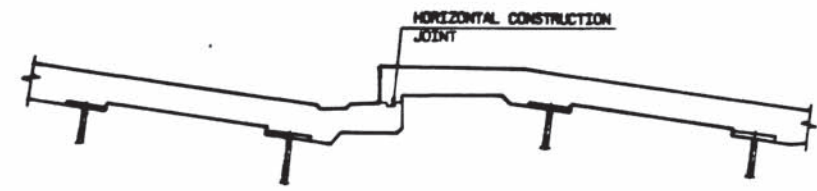


**POURING SEQUENCE FOR CONCRETE DECKS**  
NO SCALE

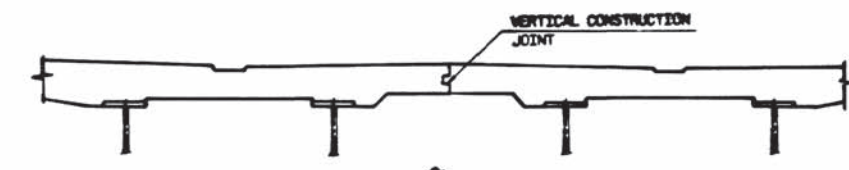


**CONSTRUCTION JOINT FOR CONCRETE DECK**  
NO SCALE

- NOTES:**
1. EXTEND REGULAR REINFORCING THROUGH THE JOINT
  2. THE DIMENSION A = (T-3")/2



**MAJOR DIFFERENCE IN DECK ELEVATION**



**MINOR DIFFERENCE IN DECK ELEVATION**

**TYPICAL SECTIONS**  
NO SCALE

REVISIONS	REFERENCE DRAWINGS																		
<table border="1"> <thead> <tr> <th>NO.</th> <th>DATE</th> <th>BY</th> <th>DESCRIPTION</th> </tr> </thead> <tbody> <tr> <td>1</td> <td>5-22-79</td> <td>TD</td> <td>1) NOTE ADDED PER FIELD CONDITION, "AS-BUILT."</td> </tr> </tbody> </table>	NO.	DATE	BY	DESCRIPTION	1	5-22-79	TD	1) NOTE ADDED PER FIELD CONDITION, "AS-BUILT."	<table border="1"> <thead> <tr> <th>NUMBER</th> <th>DESCRIPTION</th> </tr> </thead> <tbody> <tr> <td>A13-S-7</td> <td>BOX GIRDER AND DECK SLAB SECTIONS (MINOR CLEARANCE ENVELOPES)</td> </tr> <tr> <td>A13-S-79</td> <td>SAFETY WALK AND CABLE TROUGH DETAILS</td> </tr> <tr> <td>A13-S-78</td> <td>SAFETY WALK AND CABLE TROUGH DETAILS</td> </tr> <tr> <td>A13-S-75</td> <td>SAFETY WALK AND CABLE TROUGH DETAILS</td> </tr> </tbody> </table>	NUMBER	DESCRIPTION	A13-S-7	BOX GIRDER AND DECK SLAB SECTIONS (MINOR CLEARANCE ENVELOPES)	A13-S-79	SAFETY WALK AND CABLE TROUGH DETAILS	A13-S-78	SAFETY WALK AND CABLE TROUGH DETAILS	A13-S-75	SAFETY WALK AND CABLE TROUGH DETAILS
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**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**BUCHART-HORN**  
CONSULTING ENGINEERS AND PLANNERS

DE LEUW, CATHER & COMPANY  
GENERAL ENGINEERING CONSULTANT

HENRY WIEBE & ASSOCIATES  
GENERAL ARCHITECTURAL CONSULTANT

**ROCKVILLE ROUTE AERIAL STRUCTURE**  
BOX GIRDER AND DECK SLAB SECTIONS

SCALE: 1" = 1'-0" AND AS NOTED

DRAWING NO. A13-S-60

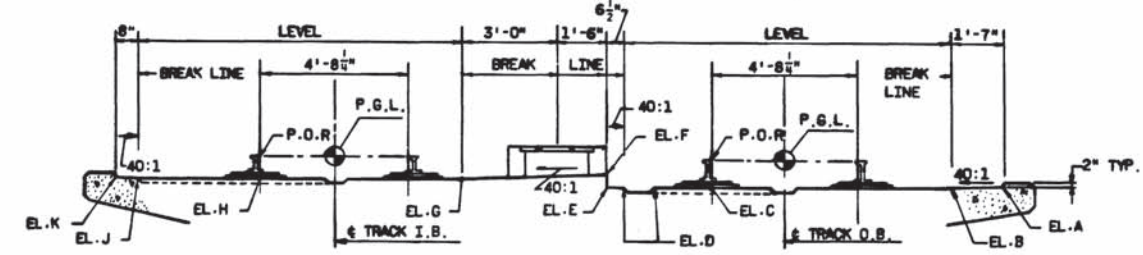
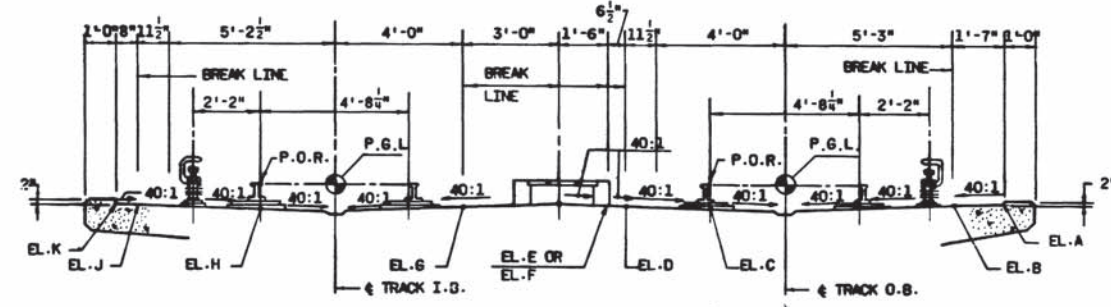
M220-319

SEE DECK TRANSITION DETAILS THIS SHEET

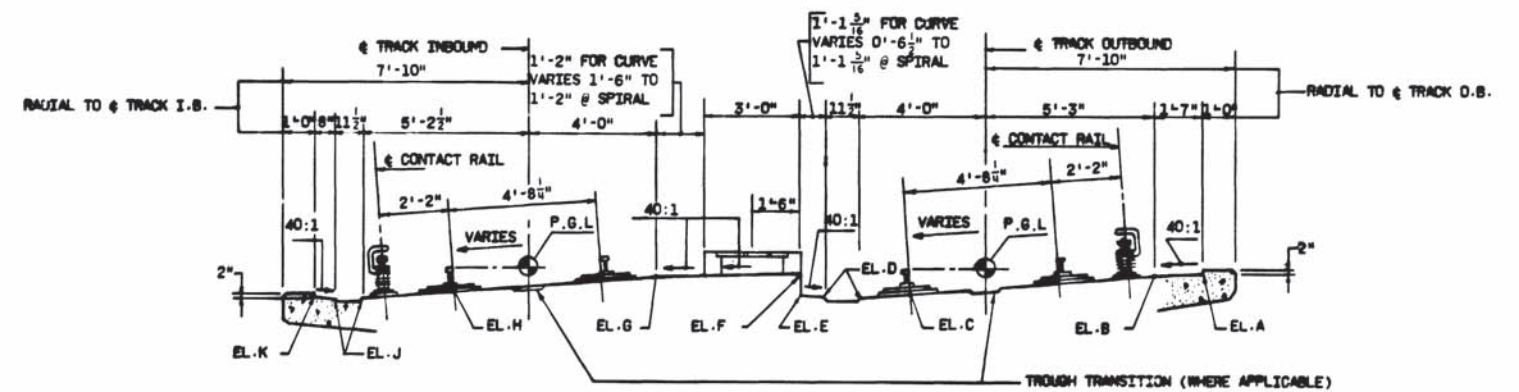
STATION	INBOUND						SUPER ELEV. (IN.)	OUTBOUND						SUPER ELEV. (IN.)
	P.G.L.	EL.F	EL.G	EL.H	EL.J	EL.K		P.G.L.	EL.A	EL.B	EL.C	EL.D	EL.E	
543+24.57	263.90	263.22	263.19	263.14	263.24	263.26								
+30	263.88	263.20	263.16	263.12	263.20	263.22								
+37.57							0.098	263.78	263.08	263.05	263.03	263.04	263.06	
+40	263.84	263.17	263.11	263.08	263.14	263.18		263.75	263.04	263.00	263.00	263.00	263.01	
+50	263.81	263.15	263.06	263.05	263.07	263.09		263.71	263.03	262.99	262.96	262.95	262.96	
+54.57	263.79	263.15	263.04	263.04	263.04	263.06		263.67	263.02	262.98	262.92	262.91	262.92	
+60	263.77	263.14	263.03	263.02	263.01	263.03		263.64	263.01	262.97	262.89	262.87	262.88	
+67.57								263.60	263.01	262.97	262.85	262.83	262.84	
+70	263.74	263.13	263.02	262.98	262.97	262.98	0.279	263.57	263.00	262.96	262.82	262.79	262.80	
+80	263.70	263.11	263.00	262.95	262.93	262.94	0.461	263.53	262.99	262.95	262.78	262.75	262.76	
+90	263.67	263.10	262.99	262.91	262.88	262.90	0.642	263.49	262.96	262.92	262.72	262.69	262.70	
544+00	263.63	263.08	262.97	262.88	262.84	262.86	0.823	263.46	262.94	262.90	262.70	262.67	262.68	
+10	263.60	263.07	262.96	262.86	262.79	262.81	1.004	263.43	262.93	262.89	262.68	262.65	262.66	
+20	263.56	263.06	262.94	262.81	262.75	262.77	1.185	263.39	262.92	262.88	262.66	262.63	262.64	
+30	263.53	263.04	262.93	262.78	262.71	262.72	1.366	263.36	262.91	262.87	262.64	262.61	262.62	
+40	263.49	263.03	262.92	262.74	262.66	262.68	1.548	263.32	262.90	262.86	262.62	262.59	262.60	
+50	263.46	263.01	262.90	262.71	262.62	262.63	1.729	263.29	262.89	262.85	262.60	262.57	262.58	
+60	263.42	262.99	262.89	262.67	262.57	262.59	1.910	263.25	262.88	262.84	262.58	262.55	262.56	
+70	263.39	262.98	262.87	262.64	262.53	262.54	2.091	263.22	262.87	262.83	262.56	262.53	262.54	
+80	263.35	262.97	262.86	262.60	262.48	262.50	2.272	263.18	262.86	262.82	262.54	262.51	262.52	
+90	263.32	262.95	262.84	262.57	262.44	262.46	2.453	263.15	262.85	262.81	262.52	262.49	262.50	
545+00	263.28	262.94	262.83	262.53	262.40	262.41	2.635	263.11	262.84	262.80	262.50	262.47	262.48	
+10	263.25	262.92	262.81	262.50	262.35	262.37	2.816	263.08	262.83	262.79	262.48	262.45	262.46	
+20	263.21	262.91	262.80	262.46	262.31	262.32	2.997	263.04	262.82	262.78	262.46	262.43	262.44	
+30	263.18	262.89	262.78	262.43	262.26	262.28	3.178	263.01	262.81	262.77	262.44	262.41	262.42	
+40	263.14	262.88	262.77	262.39	262.22	262.23	3.359	262.97	262.80	262.76	262.42	262.39	262.40	
+50	263.11	262.86	262.75	262.36	262.17	262.19	3.540	262.94	262.79	262.75	262.40	262.37	262.38	
+60	263.07	262.85	262.74	262.32	262.14	262.14	3.722	262.90	262.78	262.74	262.38	262.35	262.36	
+70	263.04	262.83	262.72	262.29	262.08	262.10	3.905	262.87	262.77	262.73	262.36	262.33	262.34	
+80	263.00	262.82	262.71	262.25	262.04	262.06	4.084	262.83	262.75	262.71	262.34	262.31	262.32	
+90	262.97	262.80	262.70	262.22	262.00	262.01	4.265	262.80	262.73	262.69	262.32	262.29	262.30	
+99.39	262.93	262.79	262.68	262.18	261.95	261.97	4.446	262.77	262.71	262.67	262.30	262.27	262.28	
546+00								262.74	262.68	262.64	262.28	262.25	262.26	
+10	262.90	262.77	262.67	262.15	261.91	261.92	4.627	262.70	262.64	262.60	262.26	262.23	262.24	

FOR NOTES SEE DRAWING NO. A13-S-76.

SEE DECK TRANSITION DETAILS THIS SHEET



DECK TRANSITION DETAILS AT 680A AND 670A



WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
AS-BUILT CONDITION  
MAY 03 1978

DESIGNED G.P. LEE 1/75  
DRAWN A.S. PAUL 1/75  
CHECKED G.P. LARSON 4/75  
APPROVED [Signature] 10/75

REFERENCE DRAWINGS		REVISIONS	
NUMBER	DESCRIPTION	DATE	BY
A13-S-7	BOX GIRDER AND DECK SLAB SECTIONS		
A13-S-80	BOX GIRDER AND DECK SLAB SECTIONS		
A13-S-83	PLAN UNIT 45494		
A13-S-84	PLAN UNIT 45491		

WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
SECTION DESIGNER  
**BUCHART-HORN**  
CONSULTING ENGINEERS AND PLANNERS  
SUBMITTED [Signature]

DE LEUW, CATHAR & COMPANY  
GENERAL ENGINEERING CONSULTANT  
HARRY WEBER & ASSOCIATES  
GENERAL ARCHITECTURAL CONSULTANT  
APPROVED [Signature]

ROCKVILLE ROUTE  
AERIAL STRUCTURE  
TABLE OF ELEVATIONS  
SCALE: NO SCALE  
DRAWING NO. A13-S-105  
M220-320

STATION	INBOUND					OUTBOUND					SUPER ELEV. (IN.)	
	P.G.L.	EL. A	EL. B	EL. D	EL. C	EL. E	P.G.L.	EL. F	EL. H	EL. G		EL. J
542+62.29	264.12	263.41	263.37	263.37								LEVEL
+70	264.09	263.40	263.34	263.33								
+73.41					263.40	264.08	263.33	263.33	263.35			LEVEL
* +75.29	264.08	263.39	263.32	263.30	263.40	264.08	263.33	263.33	263.35			
STATION EQUIPMENT STA. 542+75.29 I.B. AND O.B. AND STA. 542+73.41 I.B. AND O.B. AND.												
+80	264.05	263.39	263.30	263.27	263.26	264.08	263.31	263.29	263.24			LEVEL
+90	264.02	263.38	263.28	263.22	263.27	264.02	263.27	263.25	263.24			
+90-43	264.02	263.38	263.28	263.22								LEVEL
543+00	263.98	263.34	263.23	263.18	263.29	263.99	263.24	263.19	263.14			
543+03.41					263.24	263.98	263.22	263.18	263.14			LEVEL
+10	263.95	263.31	263.22	263.15	263.32	263.95	263.20	263.16	263.11			
+20	263.91	263.27	263.16	263.11	263.28	263.92	263.17	263.12	263.08			LEVEL
+24.57	263.90	263.26	263.14	263.10	263.26							
+30	263.88	263.22	263.12	263.08	263.23	263.88	263.13	263.09	263.04			LEVEL
+37.57					263.20	263.85	263.11	263.06	263.02			
+40	263.84	263.18	263.08	263.07	263.18	263.85	263.10	263.05	263.00			LEVEL
+50	263.81	263.08	263.05	263.05	263.14	263.81	263.08	263.03	263.04			
+54.57	263.79	263.06	263.04	263.04	263.11							LEVEL
+60					263.79	263.05	263.02	263.08				
+67.57					263.75	263.00	263.00	263.04				

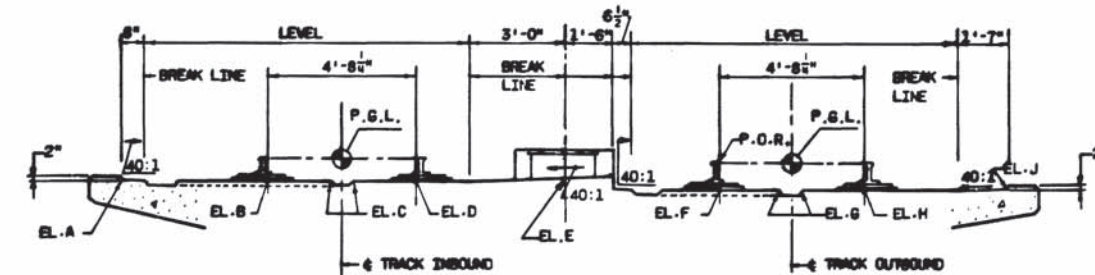
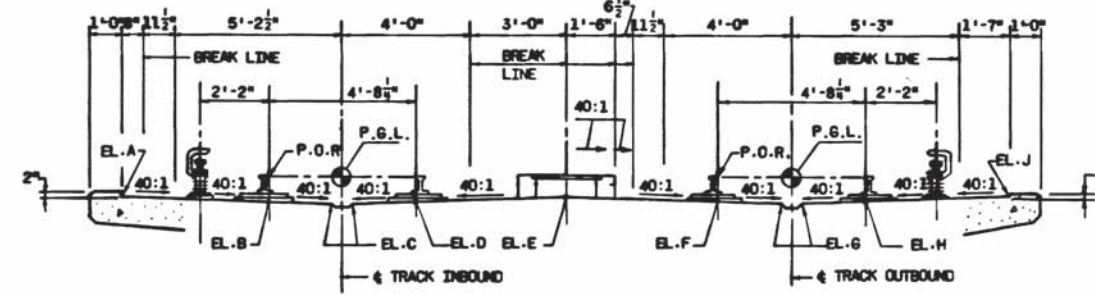
SEE DECK TRANSITION DETAILS Dwg. NO. A13-S-76.

SEE DECK TRANSITION DETAILS THIS SHEET

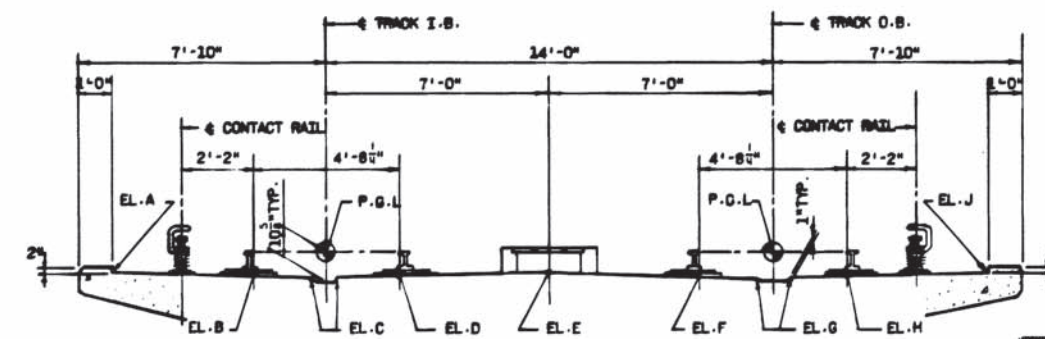
SEE DECK TRANSITION DETAILS SEE Dwg. NO. A13-S-76.

SEE DECK TRANSITION DETAILS THIS SHEET

FOR NOTES SEE DRAWING NO. A13-S-76.  
\* INDICATES I.B. BACK STATION



DECK TRANSITION DETAILS AT 680A AND 670A



WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
AS-BUILT CONDITION  
MAY 08 1979

REVISIONS	NUMBER	DESCRIPTION	DATE	BY	DESCRIPTION
	A13-S-7	BOX GIRDER AND DECK SLAB SECTIONS			
	A13-S-80	BOX GIRDER AND DECK SLAB SECTIONS			
	A13-S-82	PARTIAL PLAN UNIT ASPT			
	A13-S-84	PLAN UNIT ASPT			

**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**BUCHART-HORN**  
CONSULTING ENGINEERS AND PLANNERS

DE LEUW, CATHY & COMPANY  
GENERAL ENGINEERING CONSULTANT

HARRY WHEE & ASSOCIATES  
GENERAL ARCHITECTURAL CONSULTANT

**ROCKVILLE ROUTE**  
AERIAL STRUCTURE  
TABLE OF ELEVATIONS

SCALE: NO SCALE

DRAWING NO. A13-S-104

PROJECT NO. M220-321

STATION	INBOUND						SUPER ELEV. (IN.)	OUTBOUND						SUPER ELEV. (IN.)						
	P.G.L.	EL. A	EL. B	EL. C	EL. D	EL. E		P.G.L.	EL. F	EL. G	EL. H	EL. J	EL. K							
535+83.12							LEVEL	266.50	265.82	265.79	265.75	265.84	265.86	LEVEL	266.50	265.82	265.79	265.75	265.84	265.86
+96.12	266.45	265.81	265.77	265.70	265.75	265.78	LEVEL	266.47	265.80	265.75	265.72	265.80	265.81	LEVEL	266.47	265.80	265.75	265.72	265.80	265.81
536+00	266.44	265.79	265.75	265.69	265.74	265.76	LEVEL	266.44	265.76	265.70	265.69	265.73	265.75	LEVEL	266.44	265.76	265.70	265.69	265.73	265.75
+10	266.40	265.73	265.69	265.65	265.69	265.70	LEVEL	266.40	265.75	265.66	265.65	265.66	265.68	LEVEL	266.39	265.75	265.64	265.64	265.64	265.66
+13.12							LEVEL	266.37	265.74	265.63	265.62	265.61	265.63	LEVEL	266.37	265.74	265.63	265.62	265.61	265.63
+20	266.37	265.67	265.63	265.62	265.63	265.64	LEVEL	266.35	265.72	265.61	265.58	265.57	265.59	LEVEL	266.35	265.72	265.61	265.58	265.57	265.59
+26.12	266.35	265.63	265.59	265.59	265.59	265.61	LEVEL	266.33	265.71	265.59	265.55	265.53	265.54	LEVEL	266.33	265.71	265.59	265.55	265.53	265.54
+30	266.33	265.63	265.59	265.58	265.58	265.59	LEVEL	266.30	265.71	265.59	265.55	265.53	265.54	LEVEL	266.30	265.71	265.59	265.55	265.53	265.54
+40	266.30	265.62	265.58	265.56	265.54	265.55	LEVEL	266.28	265.69	265.58	265.51	265.48	265.50	LEVEL	266.28	265.69	265.58	265.51	265.48	265.50
+50	266.26	265.61	265.57	265.51	265.50	265.51	LEVEL	266.25	265.67	265.56	265.48	265.46	265.46	LEVEL	266.25	265.67	265.56	265.48	265.46	265.46
+60	266.23	265.59	265.55	265.48	265.46	265.47	LEVEL	266.23	265.67	265.56	265.48	265.46	265.46	LEVEL	266.23	265.67	265.56	265.48	265.46	265.46
+70	266.19	265.58	265.54	265.44	265.42	265.43	LEVEL	266.19	265.65	265.54	265.44	265.40	265.41	LEVEL	266.19	265.65	265.54	265.44	265.40	265.41
+80	266.16	265.57	265.53	265.41	265.38	265.39	LEVEL	266.16	265.63	265.52	265.41	265.35	265.37	LEVEL	266.16	265.63	265.52	265.41	265.35	265.37
+90	266.12	265.56	265.52	265.37	265.34	265.35	LEVEL	266.12	265.62	265.51	265.37	265.31	265.33	LEVEL	266.12	265.62	265.51	265.37	265.31	265.33
537+00	266.09	265.55	265.51	265.34	265.30	265.32	LEVEL	266.09	265.60	265.49	265.34	265.27	265.29	LEVEL	266.09	265.60	265.49	265.34	265.27	265.29
+10	266.06	265.53	265.49	265.30	265.28	265.28	LEVEL	266.05	265.58	265.47	265.30	265.23	265.24	LEVEL	266.05	265.58	265.47	265.30	265.23	265.24
+20	266.02	265.52	265.48	265.27	265.22	265.24	LEVEL	266.02	265.56	265.45	265.27	265.18	265.20	LEVEL	266.02	265.56	265.45	265.27	265.18	265.20
+30	265.98	265.51	265.47	265.23	265.18	265.20	LEVEL	265.98	265.54	265.44	265.23	265.14	265.16	LEVEL	265.98	265.54	265.44	265.23	265.14	265.16
+40	265.95	265.50	265.46	265.20	265.14	265.16	LEVEL	265.95	265.53	265.42	265.20	265.11	265.14	LEVEL	265.95	265.53	265.42	265.20	265.11	265.14
+50	265.91	265.49	265.46	265.18	265.10	265.12	LEVEL	265.91	265.51	265.40	265.16	265.05	265.07	LEVEL	265.91	265.51	265.40	265.16	265.05	265.07
+60	265.88	265.47	265.43	265.13	265.08	265.08	LEVEL	265.88	265.49	265.38	265.13	265.01	265.03	LEVEL	265.88	265.49	265.38	265.13	265.01	265.03
+70	265.84	265.46	265.42	265.08	265.02	265.04	LEVEL	265.84	265.47	265.36	265.09	264.97	264.98	LEVEL	265.84	265.47	265.36	265.09	264.97	264.98
+80	265.81	265.45	265.41	265.06	264.98	265.00	LEVEL	265.81	265.46	265.35	265.06	264.92	264.94	LEVEL	265.81	265.46	265.35	265.06	264.92	264.94
+90	265.77	265.44	265.40	265.02	264.94	264.98	LEVEL	265.77	265.44	265.33	265.02	264.88	264.90	LEVEL	265.77	265.44	265.33	265.02	264.88	264.90
538+00	265.74	265.42	265.38	264.98	264.90	264.92	LEVEL	265.74	265.42	265.31	264.99	264.84	264.86	LEVEL	265.74	265.42	265.31	264.99	264.84	264.86
+10	265.70	265.41	265.37	264.95	264.86	264.88	LEVEL	265.70	265.40	265.29	264.95	264.80	264.81	LEVEL	265.70	265.40	265.29	264.95	264.80	264.81
+20	265.67	265.40	265.36	264.92	264.82	264.84	LEVEL	265.67	265.38	265.28	264.92	264.75	264.77	LEVEL	265.67	265.38	265.28	264.92	264.75	264.77
+30	265.63	265.39	265.35	264.88	264.78	264.80	LEVEL	265.63	265.36	265.26	264.88	264.71	264.73	LEVEL	265.63	265.36	265.26	264.88	264.71	264.73
+40	265.60	265.38	265.34	264.85	264.74	264.76	LEVEL	265.60	265.35	265.24	264.85	264.67	264.68	LEVEL	265.60	265.35	265.24	264.85	264.67	264.68
+50	265.56	265.36	265.32	264.81	264.70	264.72	LEVEL	265.56	265.33	265.22	264.81	264.62	264.64	LEVEL	265.56	265.33	265.22	264.81	264.62	264.64
+60	265.53	265.35	265.31	264.78	264.66	264.68	LEVEL	265.53	265.31	265.21	264.78	264.58	264.60	LEVEL	265.53	265.31	265.21	264.78	264.58	264.60
+70	265.49	265.34	265.30	264.74	264.62	264.64	LEVEL	265.49	265.29	265.19	264.74	264.54	264.55	LEVEL	265.49	265.29	265.19	264.74	264.54	264.55
+76.12	265.47	265.33	265.29	264.72	264.59	264.62	LEVEL	265.46	265.27	265.17	264.71	264.49	264.51	LEVEL	265.46	265.27	265.17	264.71	264.49	264.51
+80	265.45	265.32	265.28	264.71	264.58	264.60	LEVEL	265.43	265.26	265.15	264.68	264.46	264.47	LEVEL	265.43	265.26	265.15	264.68	264.46	264.47
+89.12							LEVEL	265.42	265.25	265.15	264.67	264.45	264.47	LEVEL	265.42	265.25	265.15	264.67	264.45	264.47
539+00	265.39	265.25	265.21	264.64	264.51	264.53	LEVEL	265.39	265.22	265.12	264.64	264.42	264.43	LEVEL	265.39	265.22	265.12	264.64	264.42	264.43
+10	265.35	265.21	265.17	264.60	264.47	264.50	LEVEL	265.35	265.19	265.08	264.60	264.38	264.40	LEVEL	265.35	265.19	265.08	264.60	264.38	264.40
+20	265.32	265.18	265.14	264.57	264.44	264.46	LEVEL	265.32	265.15	265.05	264.57	264.35	264.36	LEVEL	265.32	265.15	265.05	264.57	264.35	264.36
+30	265.28	265.14	265.10	264.53	264.40	264.43	LEVEL	265.28	265.12	265.01	264.53	264.31	264.33	LEVEL	265.28	265.12	265.01	264.53	264.31	264.33
+40	265.25	265.11	265.07	264.50	264.37	264.39	LEVEL	265.25	265.08	264.98	264.50	264.28	264.29	LEVEL	265.25	265.08	264.98	264.50	264.28	264.29
+50	265.21	265.07	265.03	264.46	264.33	264.36	LEVEL	265.21	265.06	264.94	264.46	264.24	264.26	LEVEL	265.21	265.06	264.94	264.46	264.24	264.26
+60	265.18	265.04	265.00	264.43	264.30	264.32	LEVEL	265.18	265.01	264.91	264.43	264.21	264.22	LEVEL	265.18	265.01	264.91	264.43	264.21	264.22
+70	265.14	265.00	264.96	264.39	264.26	264.29	LEVEL	265.14	264.98	264.87	264.39	264.17	264.19	LEVEL	265.14	264.98	264.87	264.39	264.17	264.19
+80	265.11	264.97	264.93	264.36	264.23	264.25	LEVEL	265.11	264.94	264.84	264.36	264.14	264.15	LEVEL	265.11	264.94	264.84	264.36	264.14	264.15
+90	265.07	264.93	264.89	264.32	264.19	264.22	LEVEL	265.07	264.91	264.80	264.32	264.10	264.12	LEVEL	265.07	264.91	264.80	264.32	264.10	264.12
+97.41							LEVEL	265.05	264.88	264.77	264.30	264.08	264.09	LEVEL	265.05	264.88	264.77	264.30	264.08	264.09
540+00	265.04	264.86	264.82	264.29	264.16	264.18	LEVEL	265.04	264.87	264.76	264.29	264.07	264.09	LEVEL	265.04	264.87	264.76	264.29	264.07	264.09
+10	265.00	264.86	264.82	264.25	264.12	264.15	LEVEL	265.00	264.81	264.71	264.25	264.04	264.06	LEVEL	265.00	264.81	264.71	264.25	264.04	264.06
+12.29							LEVEL	265.00	264.86	264.82	264.24	264.12	264.14	LEVEL	265.00	264.86	264.82	264.24	264.12	264.14
+20	264.97	264.81	264.77	264.22	264.09	264.12	LEVEL	264.97	264.78	264.68	264.22	264.02	264.03	LEVEL	264.97	264.78	264.68	264.22	264.02	264.03
+30	264.93	264.75	264.71	264.18	264.06	264.09	LEVEL	264.93	264.71	264.60	264.18	263.99	264.01	LEVEL	264.93	264.71	264.60	264.18	263.99	264.01
+40	264.90	264.70	264.66	264.15	264.03	264.06	LEVEL	264.90	264.68	264.55	264.15	263.96	263.98	LEVEL	264.90	264.68	264.55	264.15	263.96	263.98
+50	264.86	264.64	264.60	264.11	264.00	264.03	LEVEL	264.86	264.61	264.50	264.11	263.93	263.95	LEVEL	264.86	264.61	264.50	264.11	263.93	263.95
+60	264.83	264.58	264.54	264.08	263.97	264.00	LEVEL	264.83	264.55	264.45	264.08									





STATION	INBOUND						SUPER ELEV. (IN.)	OUTBOUND						SUPER ELEV. (IN.)
	P.G.L.	EL. A	EL. B	EL. C	EL. D	EL. E		P.G.L.	EL. F	EL. G	EL. H	EL. J	EL. K	
523+00	266.27	266.37	266.33	265.53	265.34	265.37	6.000	266.26	266.29	266.19	265.51	265.20	265.21	6.000
+10	266.46	266.56	266.52	265.71	265.53	265.56		266.45	266.48	266.37	265.70	265.39	265.40	
+20	266.65	266.74	266.70	265.90	265.71	265.74		266.63	266.66	266.56	265.89	265.57	265.59	
+30	266.83	266.92	266.88	266.08	265.89	265.92		266.81	266.84	266.74	266.06	265.75	265.76	
+40	267.00	267.10	267.06	266.25	266.06	266.09		266.99	267.01	266.91	266.24	265.92	265.94	
+50	267.17	267.26	267.22	266.42	266.23	266.26		267.15	267.18	267.08	266.40	266.09	266.10	
+60	267.33	267.42	267.39	266.58	266.39	266.42		267.31	267.34	267.24	266.57	266.25	266.27	
+70	267.48	267.58	267.54	266.74	266.55	266.58		267.47	267.50	267.39	266.72	266.41	266.42	
+80	267.64	267.73	267.69	266.89	266.70	266.73		267.62	267.65	267.55	266.87	266.56	266.57	
+90	267.78	267.88	267.84	267.03	266.85	266.88		267.77	267.79	267.69	267.02	266.70	266.72	
524+00	267.92	268.02	267.98	267.17	266.98	267.02		267.91	267.93	267.83	267.16	266.84	266.86	
+10	268.06	268.15	268.11	267.31	267.12	267.15		268.04	268.07	267.97	267.29	266.96	266.99	
+20	268.19	268.28	268.24	267.44	267.25	267.28		268.17	268.20	268.09	267.42	267.11	267.12	
+30	268.31	268.41	268.37	267.56	267.37	267.40		268.29	268.32	268.22	267.55	267.23	267.25	
+40	268.43	268.53	268.49	267.68	267.49	267.52		268.41	268.44	268.34	267.66	267.35	267.37	
+50	268.54	268.64	268.60	267.79	267.61	267.64		268.53	268.56	268.45	267.78	267.46	267.48	
+60	268.65	268.75	268.71	267.90	267.71	267.74		268.65	268.68	268.56	267.88	267.57	267.59	
+70	268.75	268.85	268.81	268.00	267.82	267.85		268.74	268.76	268.66	267.99	267.67	267.69	
+80	268.85	268.95	268.91	268.10	267.91	267.94		268.83	268.86	268.76	268.08	267.77	267.78	
+90	268.94	269.04	269.00	268.19	268.00	268.03		268.92	268.95	268.85	268.17	267.86	267.88	
525+00	269.03	269.12	269.08	268.28	268.09	268.12		269.01	269.03	268.93	268.25	267.94	267.96	
+10	269.18	269.27	269.23	268.36	268.17	268.20		269.09	269.12	269.01	268.34	268.02	268.04	
+20	269.31	269.40	269.36	268.43	268.24	268.27		269.16	269.19	269.09	268.42	268.10	268.12	
+30	269.43	269.52	269.48	268.53	268.34	268.37		269.23	269.26	269.16	268.49	268.17	268.19	
+40	269.54	269.63	269.59	268.63	268.44	268.47		269.30	269.33	269.22	268.56	268.23	268.25	
+50	269.65	269.74	269.70	268.73	268.54	268.57		269.36	269.39	269.28	268.61	268.29	268.31	
+60	269.75	269.84	269.80	268.83	268.64	268.67		269.41	269.44	269.33	268.66	268.34	268.36	
+70	269.85	269.94	269.90	268.93	268.74	268.77		269.46	269.49	269.38	268.71	268.39	268.41	
+80	269.94	270.03	270.00	269.03	268.84	268.87		269.51	269.54	269.42	268.75	268.43	268.45	
+90	270.03	270.12	270.08	269.13	268.94	268.97		269.54	269.57	269.46	268.79	268.47	268.49	
526+00	270.11	270.20	270.17	269.23	269.04	269.07		269.57	269.60	269.48	268.82	268.50	268.52	
+10	270.24	270.33	270.29	269.33	269.14	269.17		269.59	270.02	269.52	268.84	268.53	268.55	
+20	270.36	270.45	270.41	269.43	269.24	269.27		269.61	270.04	269.54	268.86	268.55	268.57	
+30	270.47	270.56	270.52	269.53	269.34	269.37		269.63	270.06	269.56	268.88	268.57	268.59	
+40	270.57	270.66	270.62	269.63	269.44	269.47		269.64	270.07	269.57	268.89	268.58	268.60	
+50	270.67	270.76	270.72	269.73	269.54	269.57		269.65	270.08	269.58	268.90	268.59	268.61	
+60	270.76	270.85	270.81	269.83	269.64	269.67		269.66	270.09	269.59	268.91	268.60	268.62	
+70	270.85	270.94	270.90	269.93	269.74	269.77		269.67	270.10	269.60	268.92	268.61	268.63	
+80	270.94	271.03	270.99	270.03	269.84	269.87		269.68	270.11	269.61	268.93	268.62	268.64	
+90	271.03	271.12	271.08	270.13	269.94	269.97		269.69	270.12	269.62	268.94	268.63	268.65	
527+00	271.11	271.20	271.17	270.23	270.04	270.07		269.70	270.13	269.63	268.95	268.64	268.66	
+10	271.23	271.32	271.28	270.33	270.14	270.17		269.71	270.14	269.64	268.96	268.65	268.67	
+20	271.34	271.43	271.39	270.43	270.24	270.27		269.72	270.15	269.65	268.97	268.66	268.68	
+30	271.44	271.53	271.49	270.53	270.34	270.37		269.73	270.16	269.66	268.98	268.67	268.69	
+40	271.54	271.63	271.59	270.63	270.44	270.47		269.74	270.17	269.67	268.99	268.68	268.70	
+50	271.63	271.72	271.68	270.73	270.54	270.57		269.75	270.18	269.68	269.00	268.69	268.71	
+60	271.72	271.81	271.77	270.83	270.64	270.67		269.76	270.19	269.69	269.01	268.70	268.72	
+70	271.81	271.90	271.86	270.93	270.74	270.77		269.77	270.20	269.70	269.02	268.71	268.73	
+80	271.90	271.99	271.95	271.03	270.84	270.87		269.78	270.21	269.71	269.03	268.72	268.74	
+90	271.99	272.08	272.04	271.13	270.94	270.97		269.79	270.22	269.72	269.04	268.73	268.75	
528+00	272.07	272.16	272.12	271.23	271.04	271.07		269.80	270.23	269.73	269.05	268.74	268.76	
+10	272.17	272.26	272.22	271.33	271.14	271.17		269.81	270.24	269.74	269.06	268.75	268.77	
+20	272.26	272.35	272.31	271.43	271.24	271.27		269.82	270.25	269.75	269.07	268.76	268.78	
+30	272.35	272.44	272.40	271.53	271.34	271.37		269.83	270.26	269.76	269.08	268.77	268.79	
+40	272.44	272.53	272.49	271.63	271.44	271.47		269.84	270.27	269.77	269.09	268.78	268.80	
+50	272.53	272.62	272.58	271.73	271.54	271.57		269.85	270.28	269.78	269.10	268.79	268.81	
+60	272.62	272.71	272.67	271.83	271.64	271.67		269.86	270.29	269.79	269.11	268.80	268.82	
+70	272.71	272.80	272.76	271.93	271.74	271.77		269.87	270.30	269.80	269.12	268.81	268.83	
+80	272.80	272.89	272.85	272.03	271.84	271.87		269.88	270.31	269.81	269.13	268.82	268.84	
+90	272.89	272.98	272.94	272.13	271.94	271.97		269.89	270.32	269.82	269.14	268.83	268.85	
529+00	272.97	273.06	273.02	272.23	272.04	272.07		269.90	270.33	269.83	269.15	268.84	268.86	
+10	273.06	273.15	273.11	272.33	272.14	272.17		269.91	270.34	269.84	269.16	268.85	268.87	
+20	273.15	273.24	273.20	272.43	272.24	272.27		269.92	270.35	269.85	269.17	268.86	268.88	
+30	273.24	273.33	273.29	272.53	272.34	272.37		269.93	270.36	269.86	269.18	268.87	268.89	
+40	273.33	273.42	273.38	272.63	272.44	272.47		269.94	270.37	269.87	269.19	268.88	268.90	
+50	273.42	273.51	273.47	272.73	272.54	272.57		269.95	270.38	269.88	269.20	268.89	268.91	
+60	273.51	273.60	273.56	272.83	272.64	272.67		269.96	270.39	269.89	269.21	268.90	268.92	
+70	273.60	273.69	273.65	272.93	272.74	272.77		269.97	270.40	269.90	269.22	268.91	268.93	
+80	273.69	273.78	273.74	273.03	272.84	272.87		269.98	270.41	269.91	269.23	268.92	268.94	
+90	273.78	273.87	273.83	273.13	272.94	272.97		269.99	270.42	269.92	269.24	268.93	268.95	
530+00	273.86	273.95	273.91	273.23	273.04	273.07		270.00	270.43	269.93	269.25	268.94	268.96	
+10	273.95	274.04	274.00	273.33	273.14	273.17		270.01	270.44</					



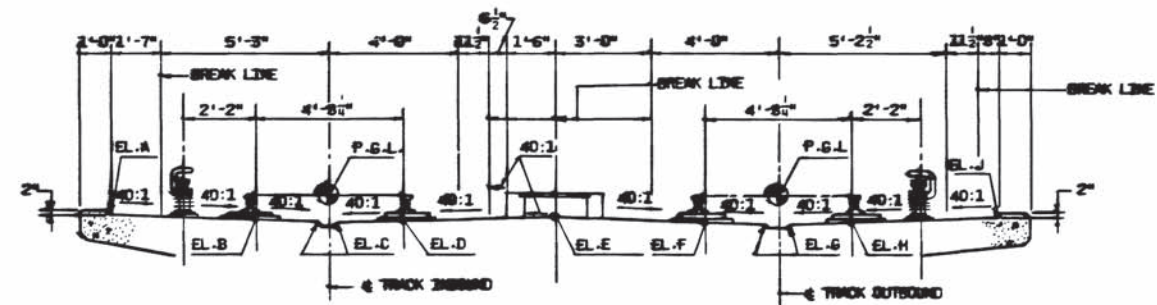
STATION	INBOUND					OUTBOUND					SUPER ELEV. (IN.)
	P.G.L.	EL. A	EL. B	EL. D	EL. C	EL. E	P.G.L.	EL. F	EL. H	EL. G	
516+20						242-43	245-48	242-30	242-25	242-41	LEVEL
+30						242-51	245-45	242-70	242-65	242-52	
+60	245-04	245-21	245-30	245-45	245-21	245-45	245-30	245-45	245-21		
+90	244-25	243-51	245-30	245-45	245-51	244-35	245-30	245-45	245-51		
+60	244-65	244-01	245-30	245-45	244-01	244-65	245-30	245-45	244-01		
+70	245-05	244-41	244-30	244-35	244-45	245-05	244-30	244-35	244-45		
+80	245-45	244-51	244-70	244-45	244-51	245-45	244-70	244-45	244-51		
+80	245-85	245-21	245-30	245-45	245-55	245-85	245-30	245-45	245-21		
517+80	246-25	245-01	245-30	245-45	245-55	246-25	245-30	245-45	245-01		
+30	246-65	245-51	245-30	245-45	245-55	246-65	245-30	245-45	245-51		
+60	247-05	246-41	246-30	246-35	246-45	247-05	246-30	246-35	246-41		
+60	247-45	246-51	246-70	246-45	246-51	247-45	246-70	246-45	246-51		
+60	247-85	247-21	247-30	247-35	247-45	247-85	247-30	247-35	247-21		
+90	248-25	247-51	247-30	247-35	247-45	248-25	247-30	247-35	247-51		
+60	248-65	248-51	247-30	247-35	247-45	248-65	247-30	247-35	248-51		
+70	249-05	248-41	248-30	248-35	248-45	249-05	248-30	248-35	248-41		
+60	249-45	248-51	248-70	248-45	248-51	249-45	248-70	248-45	248-51		
+60	249-85	249-21	249-30	249-35	249-45	249-85	249-30	249-35	249-21		
519+80	250-25	249-51	249-30	249-35	249-45	250-25	249-30	249-35	249-51		
+30	250-65	250-51	249-30	249-35	249-45	250-65	249-30	249-35	250-51		
+60	251-05	250-41	250-30	250-35	250-41	251-05	250-30	250-35	250-41		
+60	251-45	250-51	250-70	250-45	250-51	251-45	250-70	250-45	250-51		
+60	251-85	251-21	251-30	251-35	251-41	251-85	251-30	251-35	251-21		
+60	252-25	251-51	251-30	251-35	251-41	252-25	251-30	251-35	251-51		
+60	252-65	252-01	251-30	251-35	251-41	252-65	251-30	251-35	252-01		
+70	253-05	252-41	252-30	252-35	252-41	253-05	252-30	252-35	252-41		
+79-68						252-41	252-44	252-49	252-45	252-60	
+60	253-45	252-51	252-70	252-45	252-51	253-45	252-70	252-45	252-51		
+60	253-85	253-21	253-30	253-35	253-41	253-85	253-30	253-35	253-21		
+62-67	253-97	253-35	253-22	253-17	253-33						
520+80	254-25	253-50	253-30	253-47	253-59	254-25	253-30	253-47	253-59	253-94	
+89-88						253-97	254-44	253-89	253-89	253-91	
+30	254-65	253-97	253-30	253-49							
+60	255-05	254-35	254-30	254-30							
+62-67	255-17	254-45	254-41	254-41							

SEE DECK TRANSITION DETAILS THIS SHEET

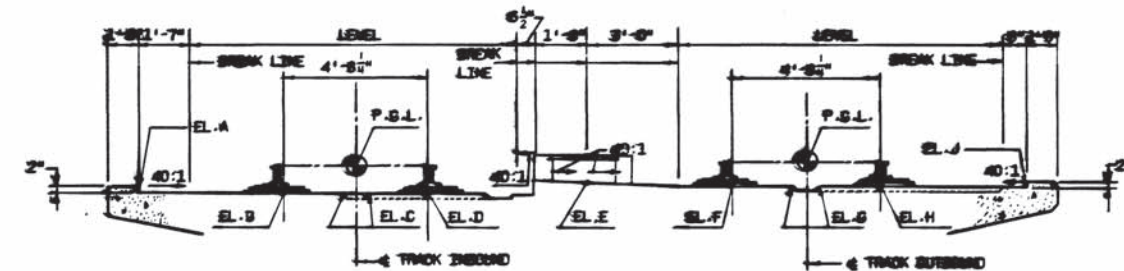
SEE DECK TRANSITION DETAILS THIS SHEET

NOTES:-

1. RUNNING RAILS, CONTACT RAILS AND GUARD RAILS INCLUDING PINS AND ANCHOR BOLTS FOR THESE RAILS ARE NOT IN THIS CONTACT.
2. FOR DRAINAGE TROUGH LOCATIONS AND EXTENTS, SEE INDIVIDUAL LAYOUT PLANS.
3. BREAK LINE LOCATIONS VARY, SEE PARTICULAR DECK SECTIONS.

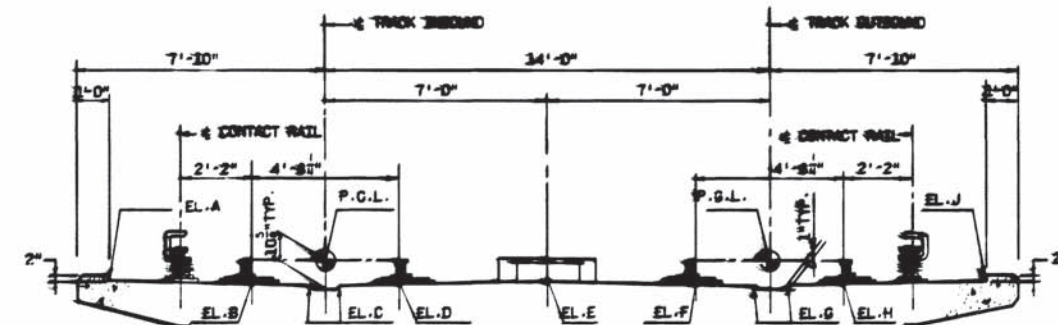


NORMAL SECTION AT 30'-0" BEFORE T.S. OR 30'-0" AFTER S.T.



SECTION AT T.S. OR S.T.

TYPICAL DECK TRANSITION DETAILS



DECK SECTION (TANGENT)

WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
 AS-BUILT CONDITION  
 DATE: 09/09/79

REVISION	DATE	BY	DESCRIPTION
1	1/75	AM/PTL	ISSUE FOR CONSTRUCTION
2	1/75	AM/PTL	ISSUE FOR CONSTRUCTION
3	4/75	AM/PTL	ISSUE FOR CONSTRUCTION
4	11-5-75	AM/PTL	ISSUE FOR CONSTRUCTION

**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**BUCHART-HORN**  
 CONSULTING ENGINEERS AND PLANNERS

DE LEUW, CATHER & COMPANY  
 GENERAL ENGINEERING CONSULTANT

GARRY GREEN & ASSOCIATES  
 GENERAL ELECTRICAL CONSULTANT

APPROVED: *[Signature]*

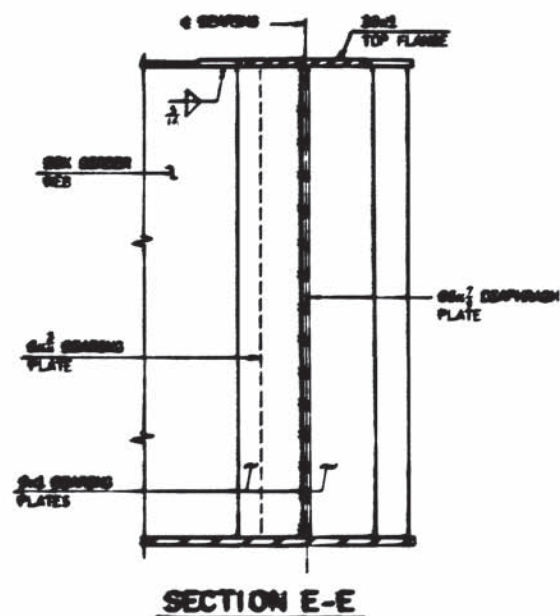
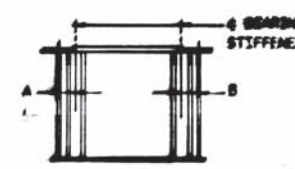
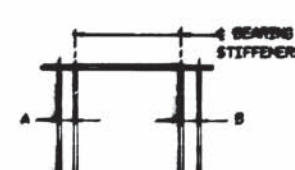
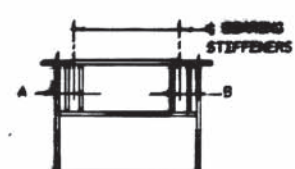
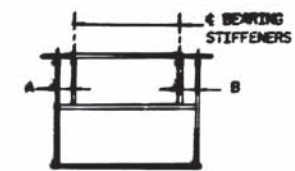
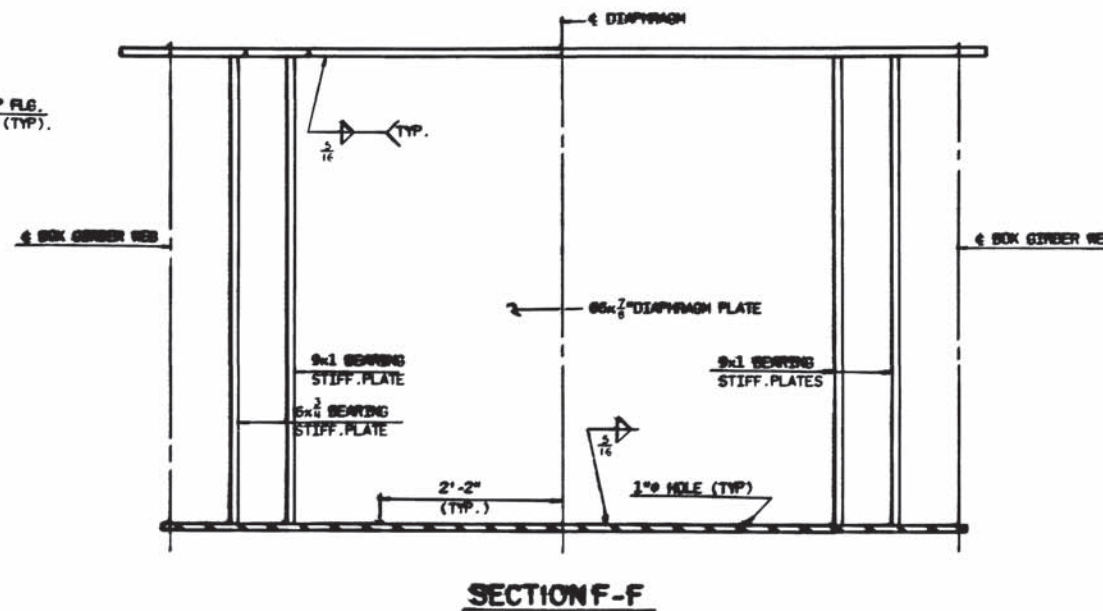
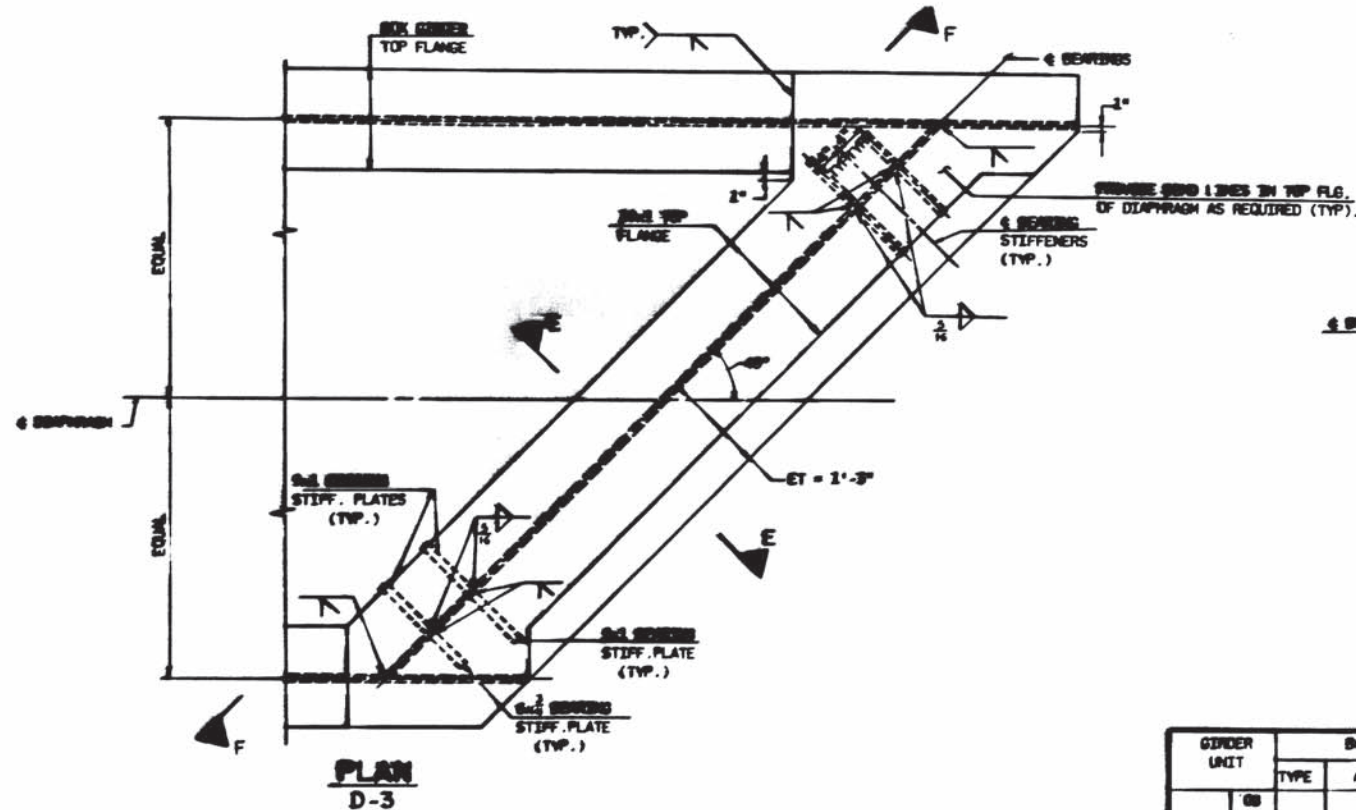
**ROCKVILLE ROUTE**  
 AERIAL STRUCTURE  
 TABLE OF ELEVATIONS

NO SCALE

ISSUED: 09/09/79

PROJECT NO: A13-S-76

DRAWING NO: M220-326



- NOTES:**
- "A" AND "B" DIMENSIONS ARE MEASURED NORMAL TO A LINE FORMED BY THE INTERSECTION OF THE PLANES OF THE CENTERLINE OF BEARING AND THE CENTERLINE OF GIRDER WEB.
  - BEARING STIFFENERS ARE PLACED PERPENDICULAR TO THE DIAPHRAGM WEB PLATE.
  - SEE "DIAPHRAGM DETAILS" SHEETS A13-S-109, A13-S-110, AND A13-S-111 FOR VARIOUS ARRANGEMENTS OF PLATES AND DETAILS.
  - ALL DIMENSIONS ARE MEASURED IN THE VERTICAL PLANE THROUGH THE CENTERLINE OF BEARING.
  - ALL "A" AND "B" DIMENSIONS ARE MEASURED LOOKING AHEAD STATION.
  - ENDS OF GIRDERS AND DIAPHRAGM WEBS SHALL BE VERTICAL AFTER APPLICATION OF FULL DEAD LOAD.

GIRDER UNIT	BACK			AHEAD			GIRDER UNIT	BACK			AHEAD				
	TYPE	A	B	TYPE	A	B		TYPE	A	B	TYPE	A	B		
A5188	OB	D-5	1'-0 1/2"	1'-0 1/2"	D-4	10 1/2"	10 1/2"	A5307	OB	D-10	9"	11 1/2"	D-10	9"	11 1/2"
A5180	OB	D-5	10 1/2"	10 1/2"	D-8	"	5"	A5318	OB	D-10	9"	11 1/2"	D-10	9"	11 1/2"
A5193	OB	D-8	9"	9"	D-8	9"	9 1/2"	A5340	OB	D-10	9"	11 1/2"	D-10	9"	10 7/8"
A5206	OB	D-8	9"	10"	D-8	9"	11 1/2"	A5340	OB	D-10	9"	10 7/8"	D-10	9"	9 1/2"
A5219	OB	D-8	9"	11 1/2"	D-6	10"	1'-5 1/2"	A5380	OB	D-10	9"	9 1/2"	D-10	9"	9"
A5222	OB	D-7	10"	1'-5 1/2"	D-8	9"	1'-0 1/2"	A5361	OB	D-10	9"	9"	D-10	9"	9 1/2"
A5245	OB	D-11	9"	1'-0 1/2"	D-10	9"	11 1/2"	A5371	OB	D-10	9"	9 1/2"	D-12	9"	10 1/2"
A5253	OB	D-10	9"	11 1/2"	D-10	9"	11 1/2"	A5384	OB	D-13	9"	10 1/2"	D-13	9"	1'-0 1/2"
A5263	OB	D-10	9"	11 1/2"	D-10	9"	11 1/2"	A5388	OB	D-9	9"	1'-0 7/8"	D-9	9"	1'-0 1/2"
A5274	OB	D-10	9"	11 1/2"	D-10	9"	11 1/2"	A5411	OB	D-13	9"	1'-0 1/2"	D-13	9"	10 1/2"
A5285	OB	D-10	9"	11 1/2"	D-10	9"	11 1/2"	A5427	OB	D-13	9"	10"	D-13	9"	9"
A5296	OB	D-10	9"	11 1/2"	D-10	9"	11 1/2"	A5441	OB	D-9	9"	9"	D-8	10 1/2"	9"
A5454	OB	D-8	10 7/8"	9"	D-14	9"	9"								

WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
**AS-BUILT CONDITION**  
 MAY 02, 2002

DATE	BY	DESCRIPTION
3/75		
3/75		
5/75		
5/75		

**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**SUCHART-HORN**  
 CONSULTING ENGINEERS AND PLANNERS

DE LEUW, CATHY & COMPANY  
 GENERAL ENGINEERING CONSULTANT

HARRY WENGE & ASSOCIATES  
 GENERAL ARCHITECTURAL CONSULTANT

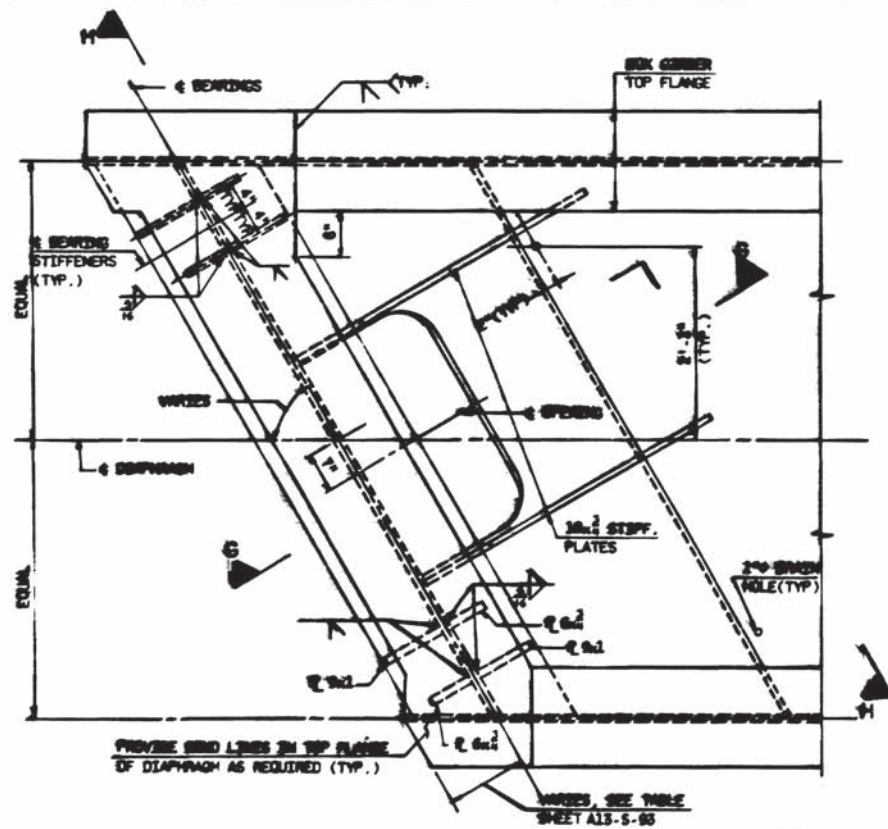
APPROVED: *[Signature]*

**ROCKVILLE ROUTE AERIAL STRUCTURE**  
 DIAPHRAGM DETAILS

SCALE: 1"=1'-0"

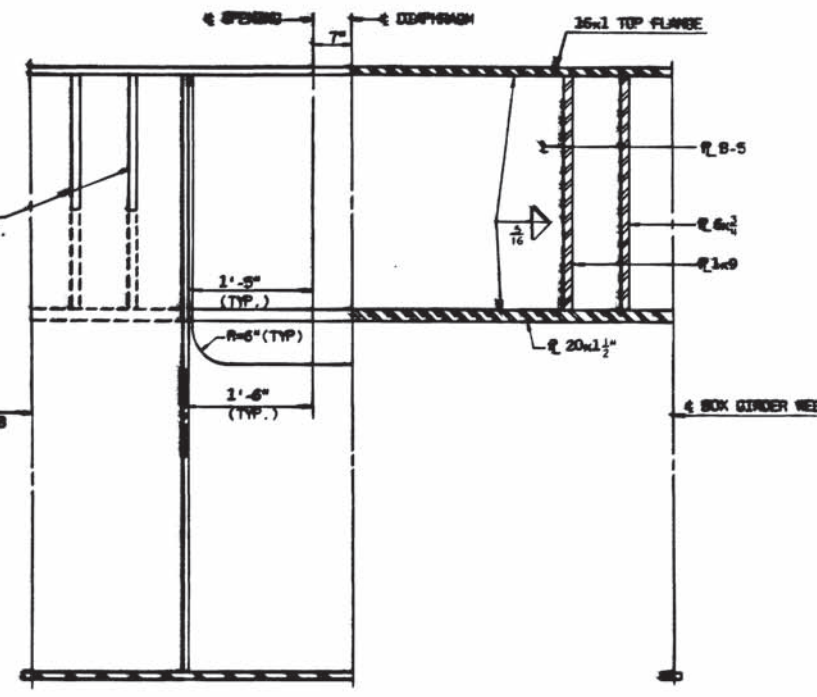
NO. 13  
 A13-S-110

M220-327

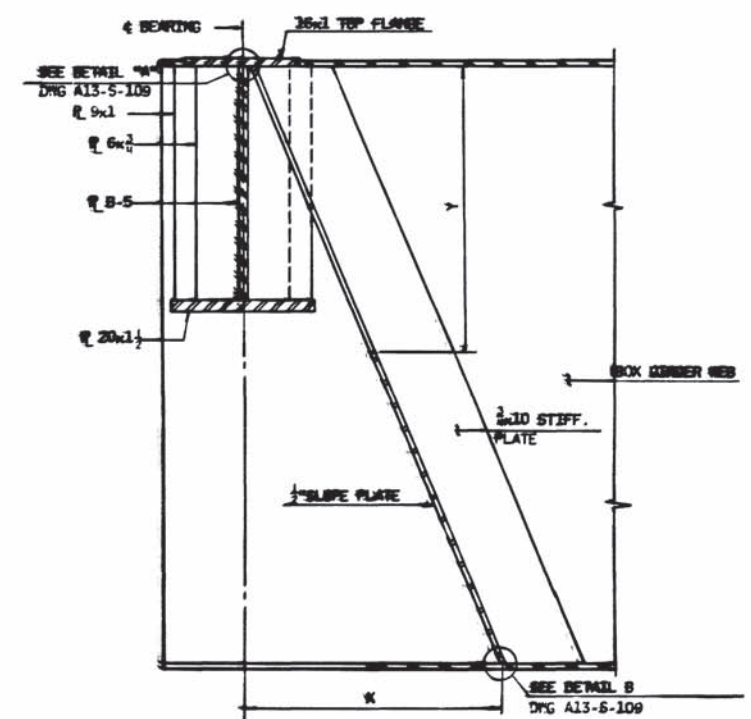


**PLAN**  
D-4 & D-6  
D-5 & D-7 SIMILAR BY  
ROTATION THRU 180°

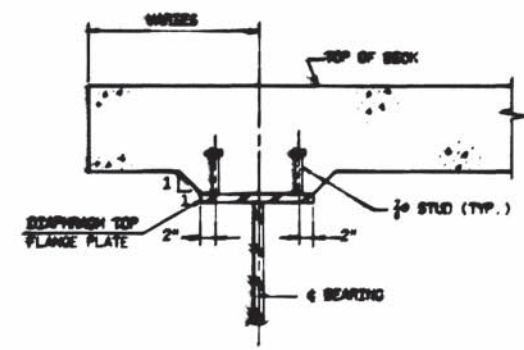
**NOTE:**  
FOR DIMENSIONS FROM  $\nabla$  BOX GIRDER WEB TO  
 $\nabla$  BEARING STIFFENERS, SEE TABLE, SHEET A13-S-110  
FOR NOTES, SEE SHEET A13-S-110



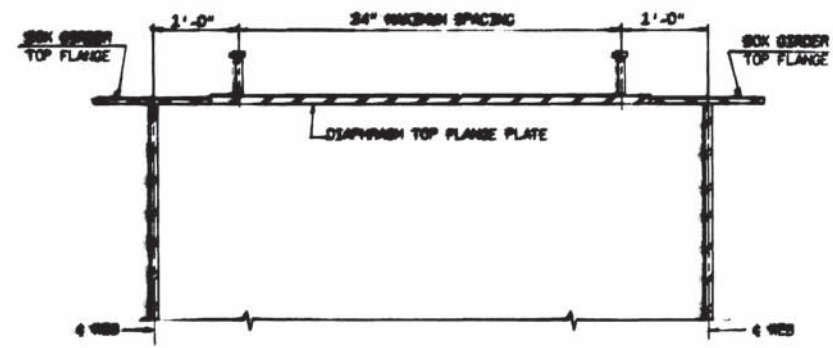
**SECTION H-H**



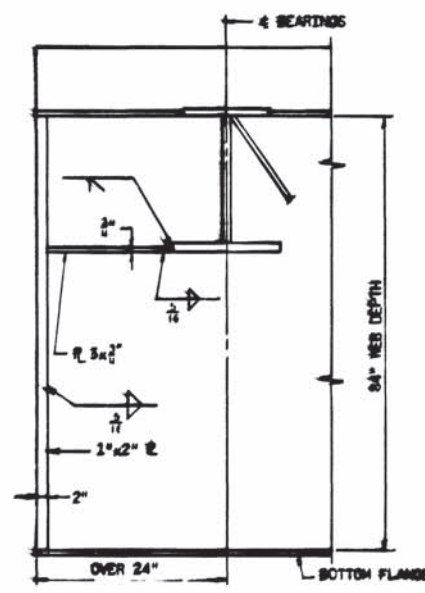
**SECTION G-G**



**SECTION**



**END VIEW**



**END OF GIRDER STIFFENING DETAILS**

DIAPHRAGM	X	Y	$\nabla$ B-5
D-4	3'-0"	3'-11"	33x1
D-5	3'-0"	3'-11"	33x1
D-6	3'-8"	4'-8"	42x1
D-7	3'-8"	4'-8"	42x1

WASHINGTON METROPOLITAN  
AREA TRANSIT AUTHORITY  
**AS-BUILT CONDITION**  
DATE: 08/09/80

DESIGNED	DRAWN	CHECKED	APPROVED	REFERENCE DRAWINGS		REVISIONS	
				NUMBER	DESCRIPTION	DATE	BY
J. L. LAMM	8/75			A13-S-110	DIAPHRAGM DETAILS		

**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**SUCHART HORN**  
CONSULTING ENGINEERS AND PLANNERS

DE LEW, CATHY & COMPANY  
GENERAL ENGINEERING CONSULTANT

HARRY WISSE & ASSOCIATES  
GENERAL CONTRACTOR

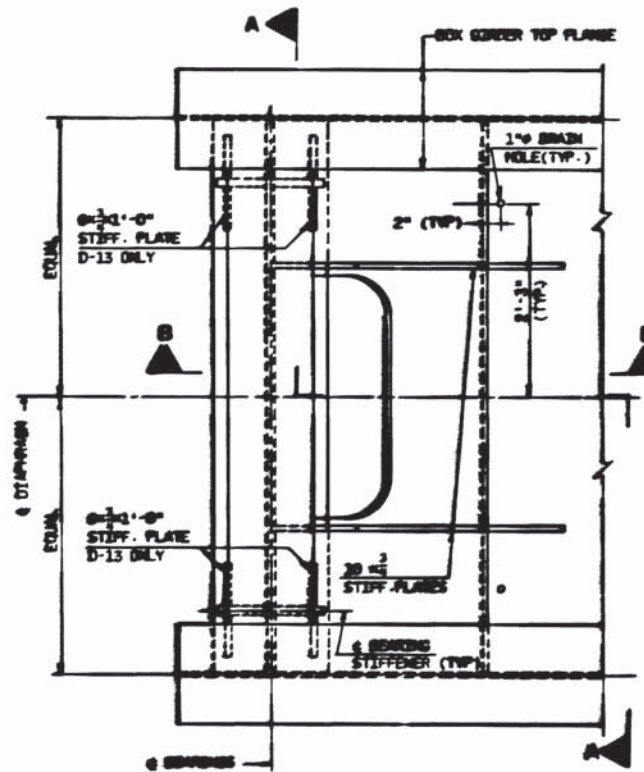
SUBMITTED: [Signature]  
APPROVED: [Signature]

**ROCKVILLE ROUTE**  
AERIAL STRUCTURE  
DIAPHRAGM DETAILS

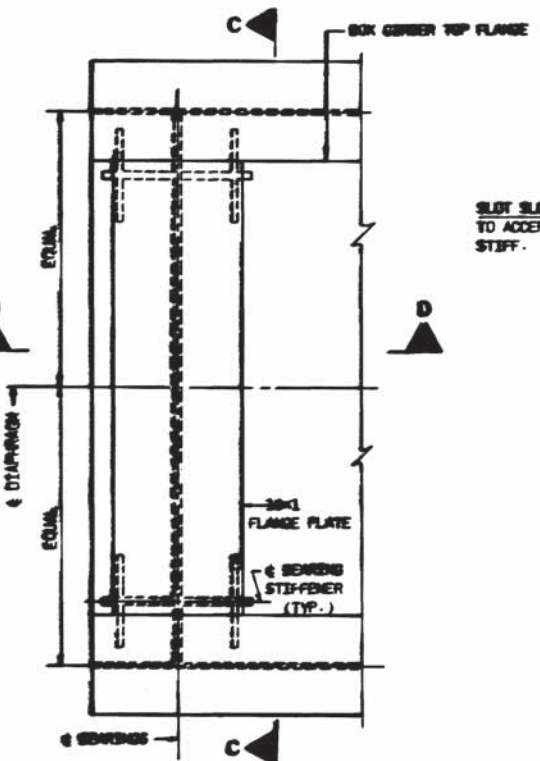
NO SCALE

DRAWING NO.  
A13-S-111

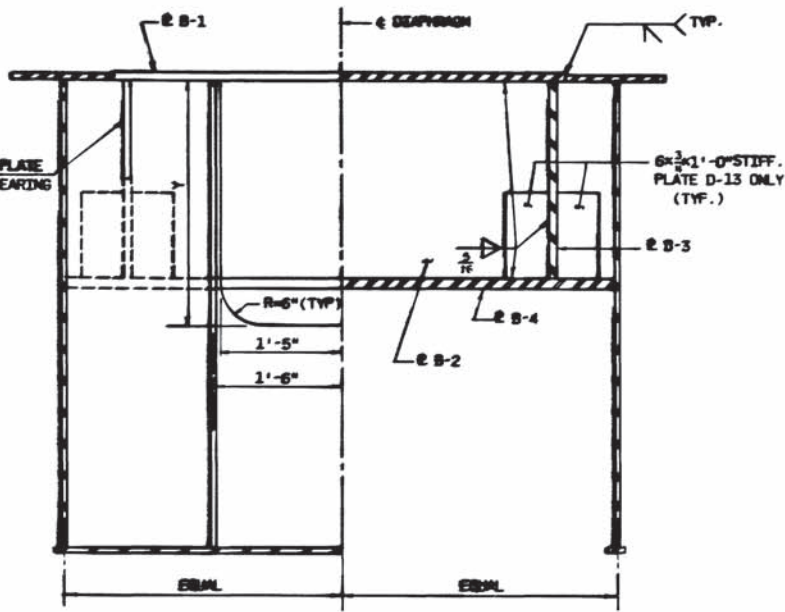
M220-328



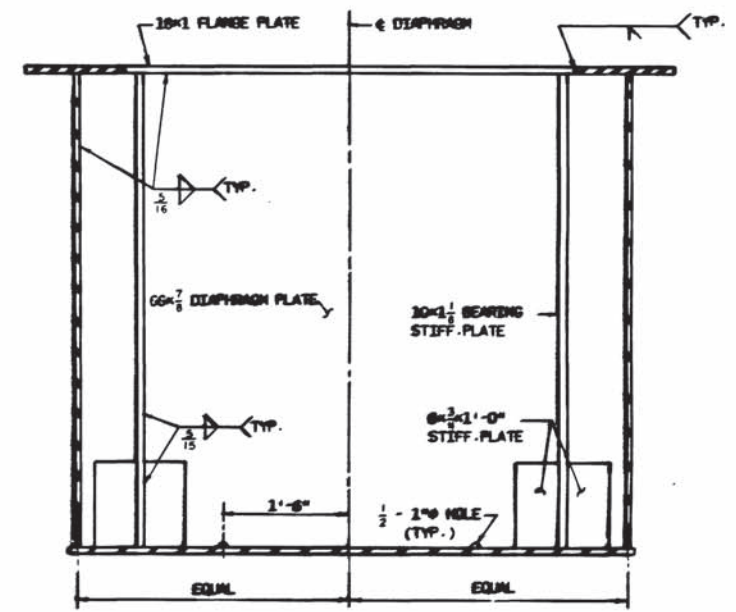
**PLAN**  
D-8 THRU D-13



**PLAN**  
D-14



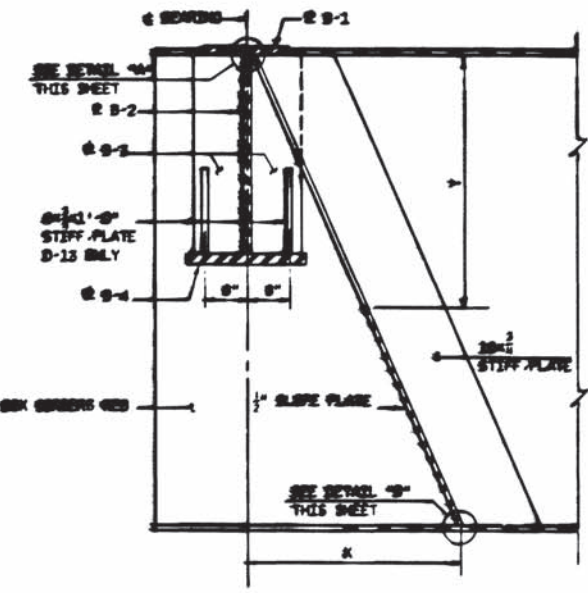
**SECTION A-A**



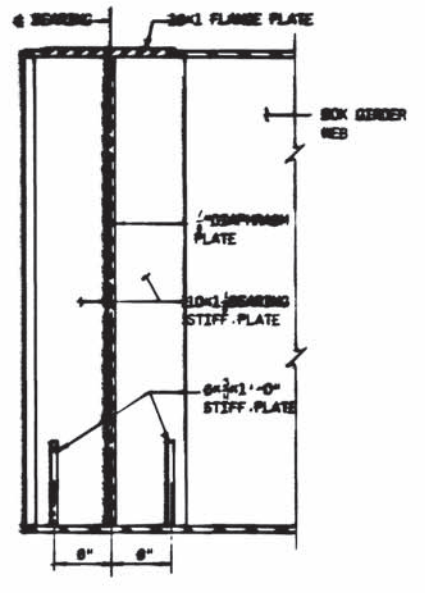
**SECTION C-C**

WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
**AS-BUILT CONDITION**  
 DATE: MAY 09 1979

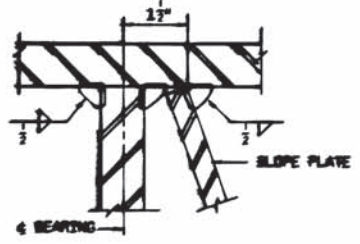
**NOTE:**  
 FOR DIMENSIONS FROM  $\phi$  BOX GIRDER WEB TO  $\phi$  BEARING STIFFENERS, SEE TABLE, SHEET A13-S-110  
 FOR NOTES, SEE SHEET A13-S-110



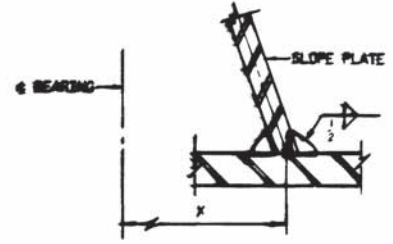
**SECTION B-B**



**SECTION D-D**



**DETAIL A**  
NO SCALE



**DETAIL B**  
NO SCALE

TABLE OF DIMENSIONS AND PLATE SIZES						
DIAPHRAGM	X	Y	E B-1	E B-2	E B-3	E B-4
D-8	2'-9"	3'-6"	10x1	20x1	9x1	20x1 1/2
D-9	3'-0"	4'-3"	16x1	36 3/4x1	9x1	20x1 1/2
D-10	2'-6"	3'-3"	12x 3/4	25x1	7x 3/4	18x1 1/2
D-11	2'-6"	3'-6"	12x 3/4	28x1	7x 3/4	18x1 1/2
D-12	2'-6"	4'-3"	12x 3/4	37x1	7x 3/4	18x1 1/2
D-13	3'-3"	4'-2"	16x1	38x1	11x1 1/4	24x1 1/2

REVISION	DATE	BY	DESCRIPTION
1	5/75	J.T. ALLEN	ISSUED FOR CONSTRUCTION
2	5/75	J.T. ALLEN	AS-BUILT CONDITION
3	5/75	J.T. ALLEN	AS-BUILT CONDITION
4	5/75	J.T. ALLEN	AS-BUILT CONDITION

**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**BUCHART-HORN**  
 CONSULTING ENGINEERS AND PLANNERS

DE LEUW, CATHER & COMPANY  
 GENERAL ENGINEERING CONSULTANT

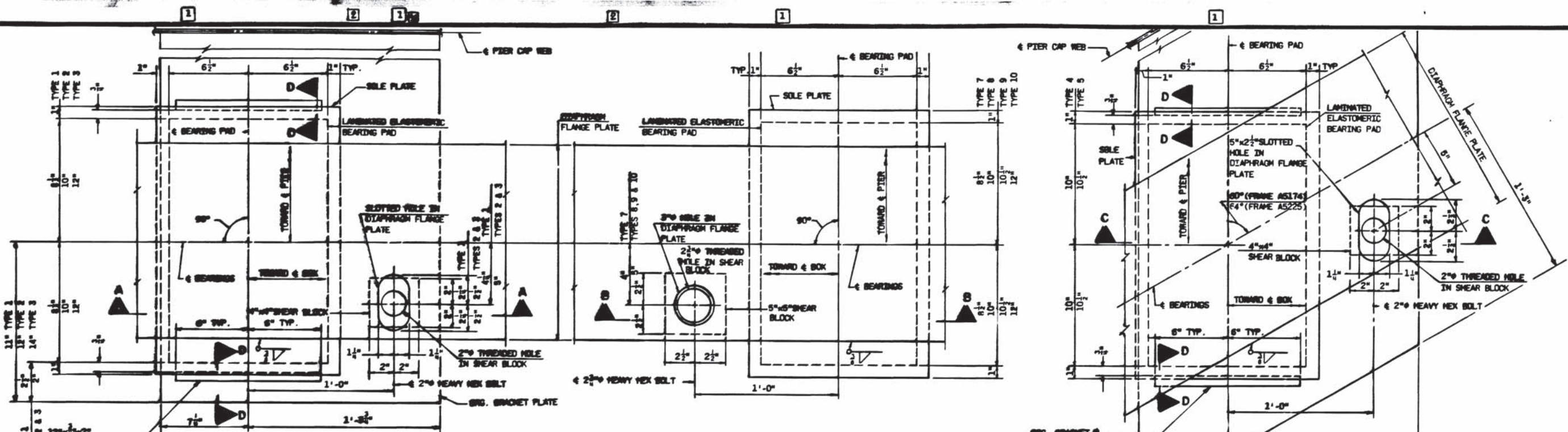
HARRY WISSE & ASSOCIATES  
 GENERAL ARCHITECTURAL CONSULTANT

**ROCKVILLE ROUTE**  
 AERIAL STRUCTURE  
 DIAPHRAGM DETAILS

SCALE: 1"=1'-0"

DATE: MAY 09 1979

A13-S-109 M220-329



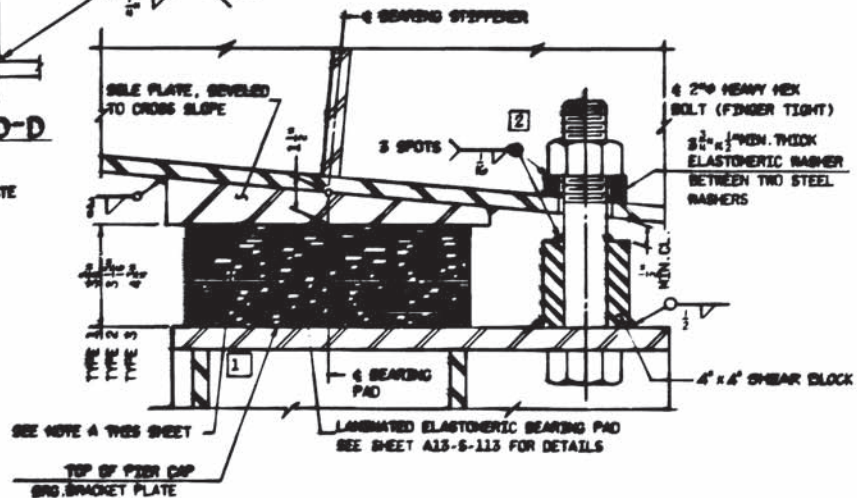
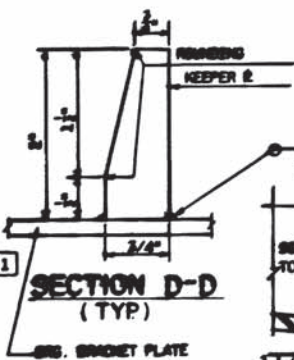
**PLAN - EXPANSION**  
TYPES 1, 2 & 3

**PLAN - FIXED**  
TYPES 7, 8, 9 & 10

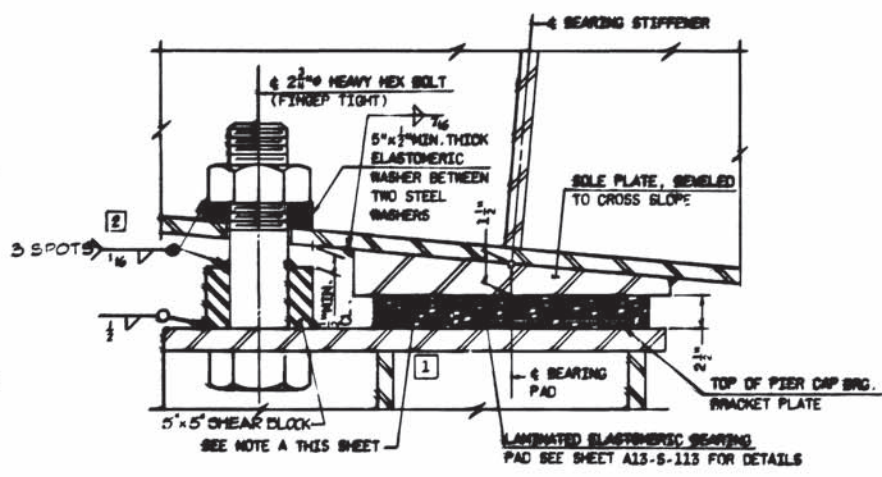
**PLAN - EXPANSION**  
TYPES 4 & 5

**NOTE:**  
FOR DIMENSIONS FROM & BOX CORNER AND  
TO & BEARING STIFFENERS, SEE TABLE,  
SHEET A13-S-110.

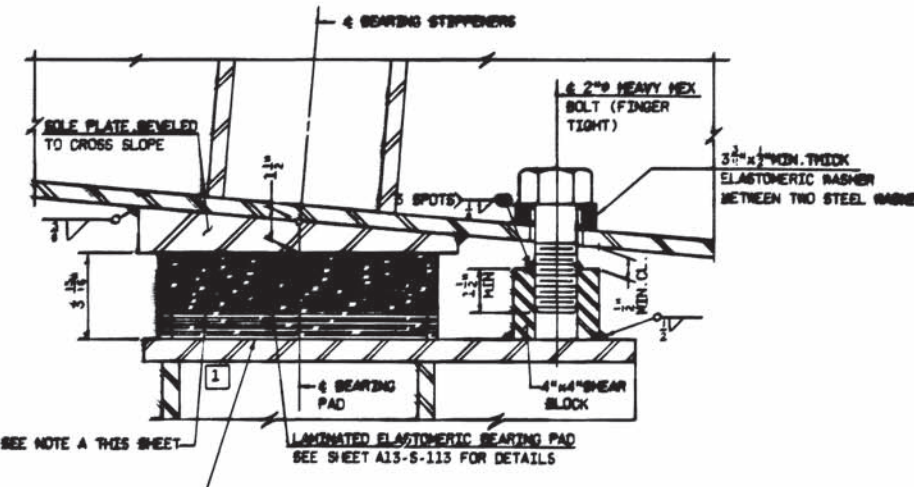
**NOTE:** BRG. BRACKET NOT SHOWN.



**SECTION A-A**



**SECTION B-B**



**SECTION C-C**

**NOTE A:**  
LAMINATED ELASTOMERIC BEARING PAD TO BE BONDED  
TO SOLE PLATE

WASHINGTON METROPOLITAN  
AREA TRANSIT AUTHORITY  
**AS-BUILT CONDITION**  
MAY 03 1978

REVISIONS	DATE	BY	DESCRIPTION
REVISED NOTE A	2-12-76	C.L.	
KEEPER PLATE ADDED FOR POPS	10-20-76	S.P.	
REVISED FOR FIELD CONDITION, "AS-BUILT"	5-25-78	THY	

**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**SUCHART-NORN**  
CONSULTING ENGINEERS AND PLANNERS

DE LEW, CATHERS & COMPANY  
GENERAL ENGINEERING CONSULTANT

HARRY WEEBE & ASSOCIATES  
GENERAL CONTRACTOR

APPROVED: *[Signature]*

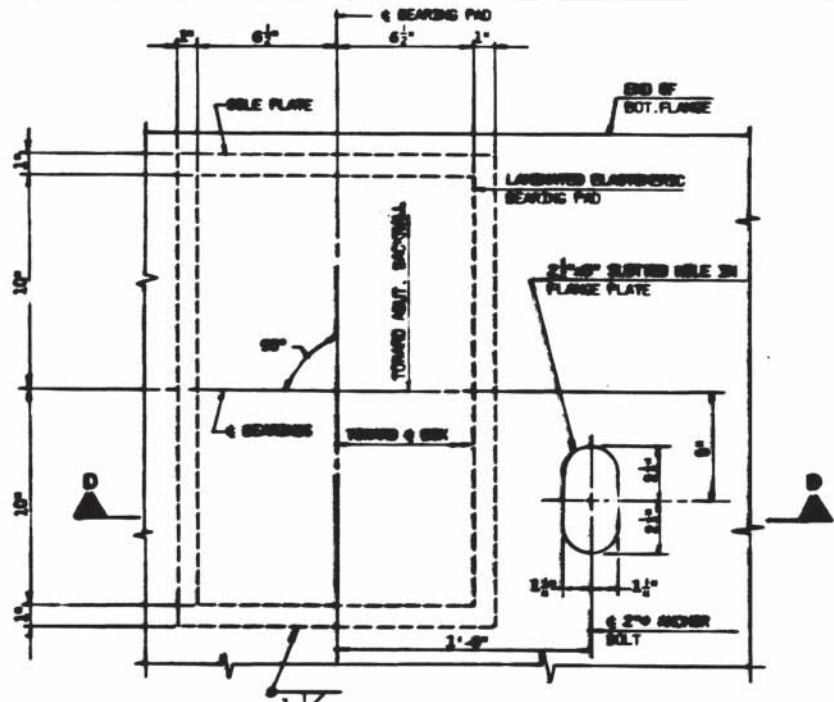
**ROCKVILLE ROUTE**  
AERIAL STRUCTURE  
BEARING ASSEMBLIES

SCALE: NO SCALE

WORKING NO. A13-S-112

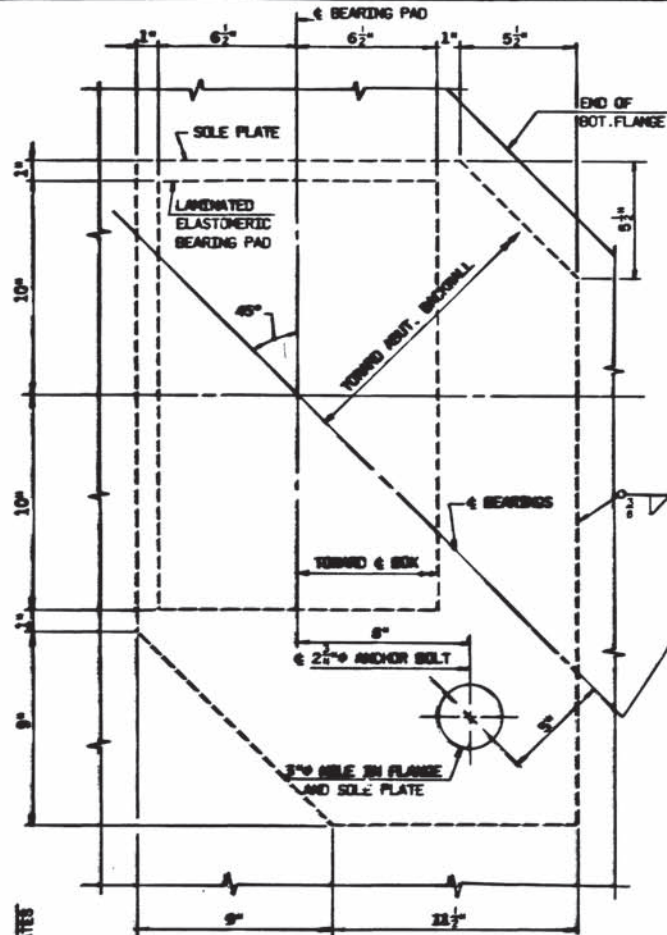
M220-330



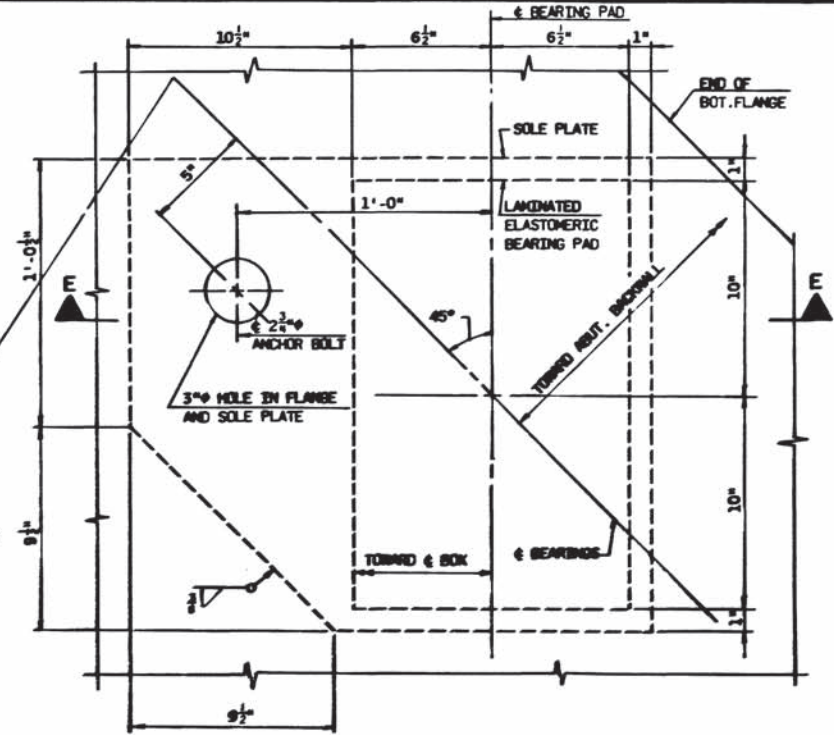


**PLAN-EXPANSION  
TYPE-6**

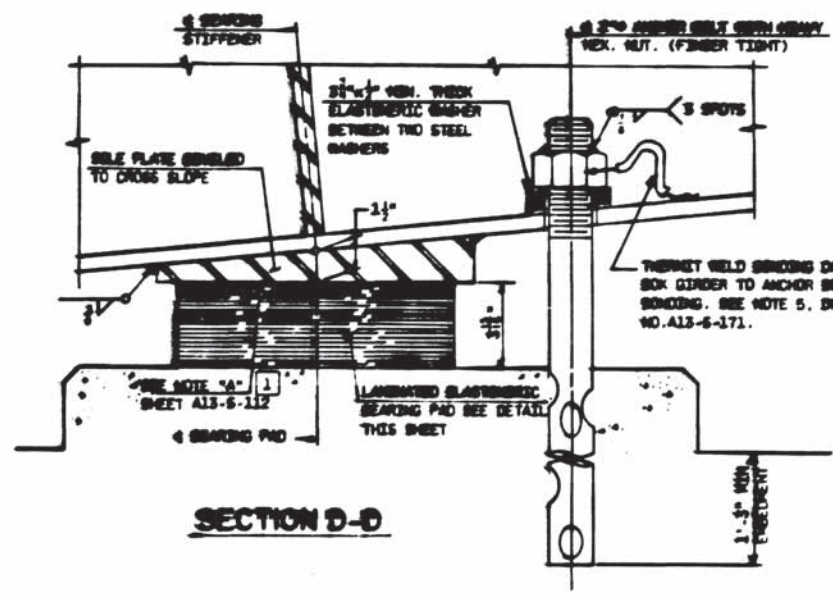
NOTE:  
FOR DIMENSIONS FROM 0 BOX CENTER AND  
TO 0 BEARING STOPPERS, SEE TABLE,  
SHEET A13-S-130.



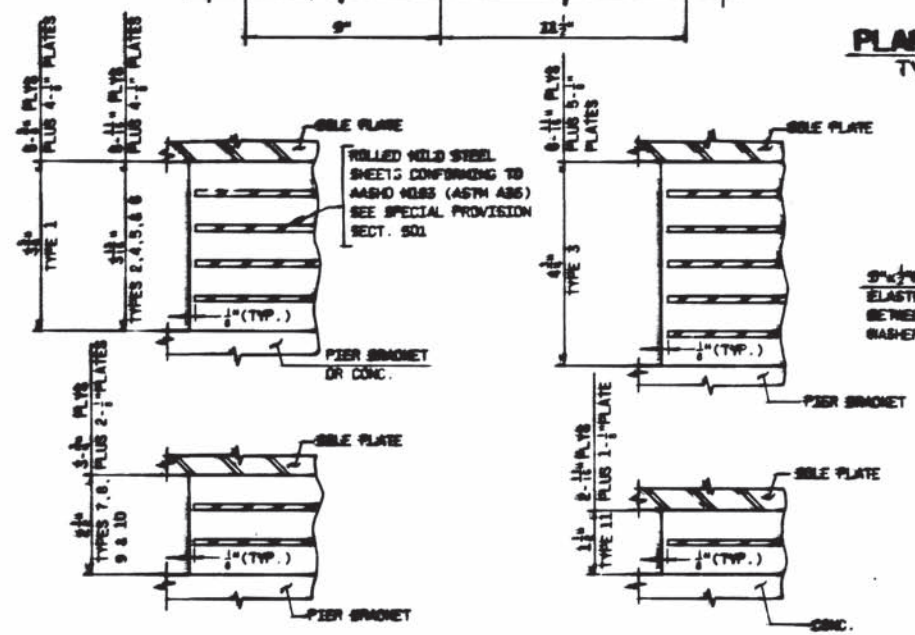
**PLAN-FIXED  
TYPE-II**



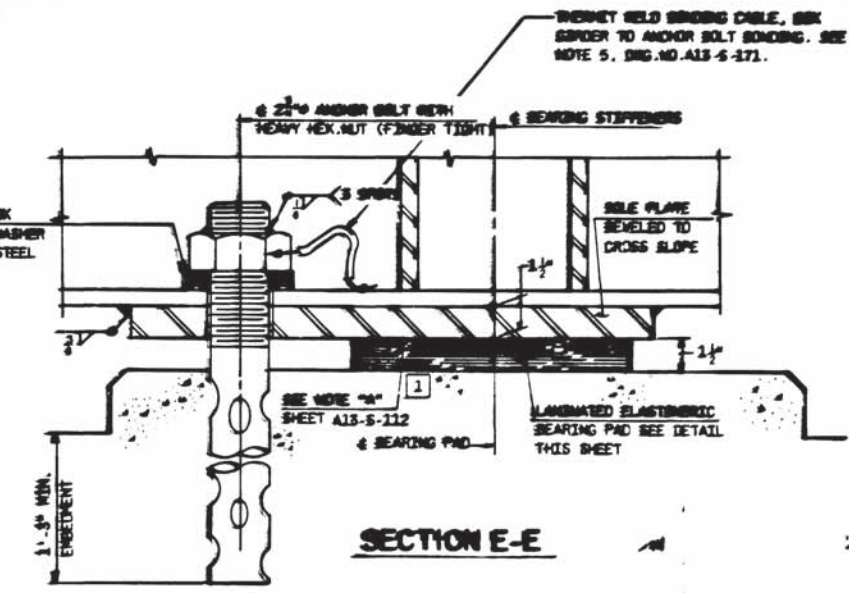
WASHINGTON METROPOLITAN  
AREA TRANSIT AUTHORITY  
**AS-BUILT CONDITION**  
DATE: 08/03/89  
BY: [Signature]



**SECTION D-D**



**LAMINATED BEARING PAD DETAILS**



**SECTION E-E**

REVISION	DATE	BY	DESCRIPTION
1	12/10/78	OP	DELETE BONDING PER PCO #6

REVISION	DATE	BY	DESCRIPTION
1	12/10/78	OP	DELETE BONDING PER PCO #6

**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**BUCHART-HORN**  
CONSULTING ENGINEERS AND PLANNERS

SE LEVY, OATNER & COMPANY  
GENERAL ENGINEERING CONSULTANTS

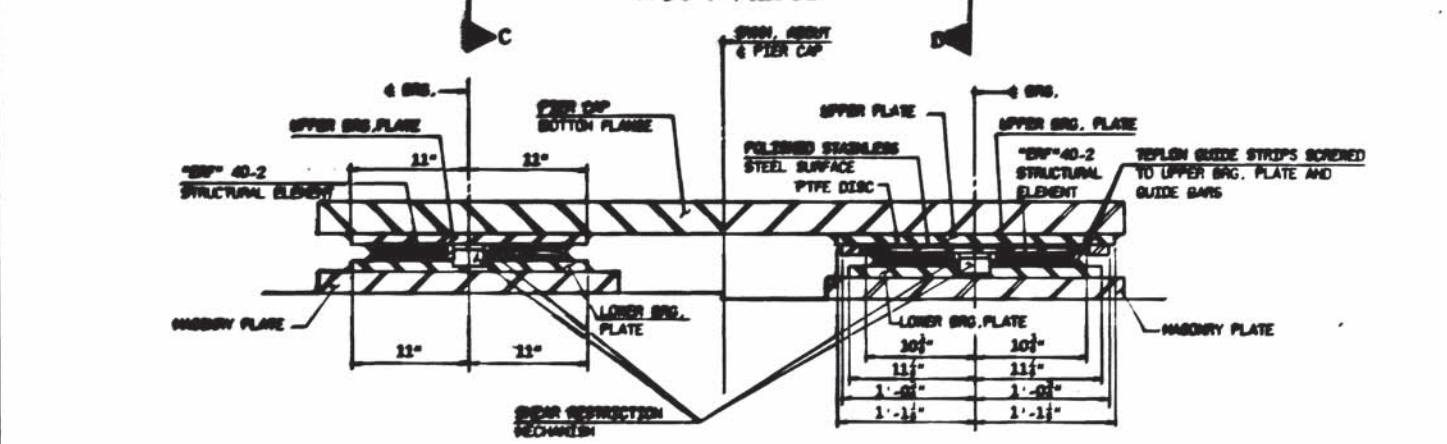
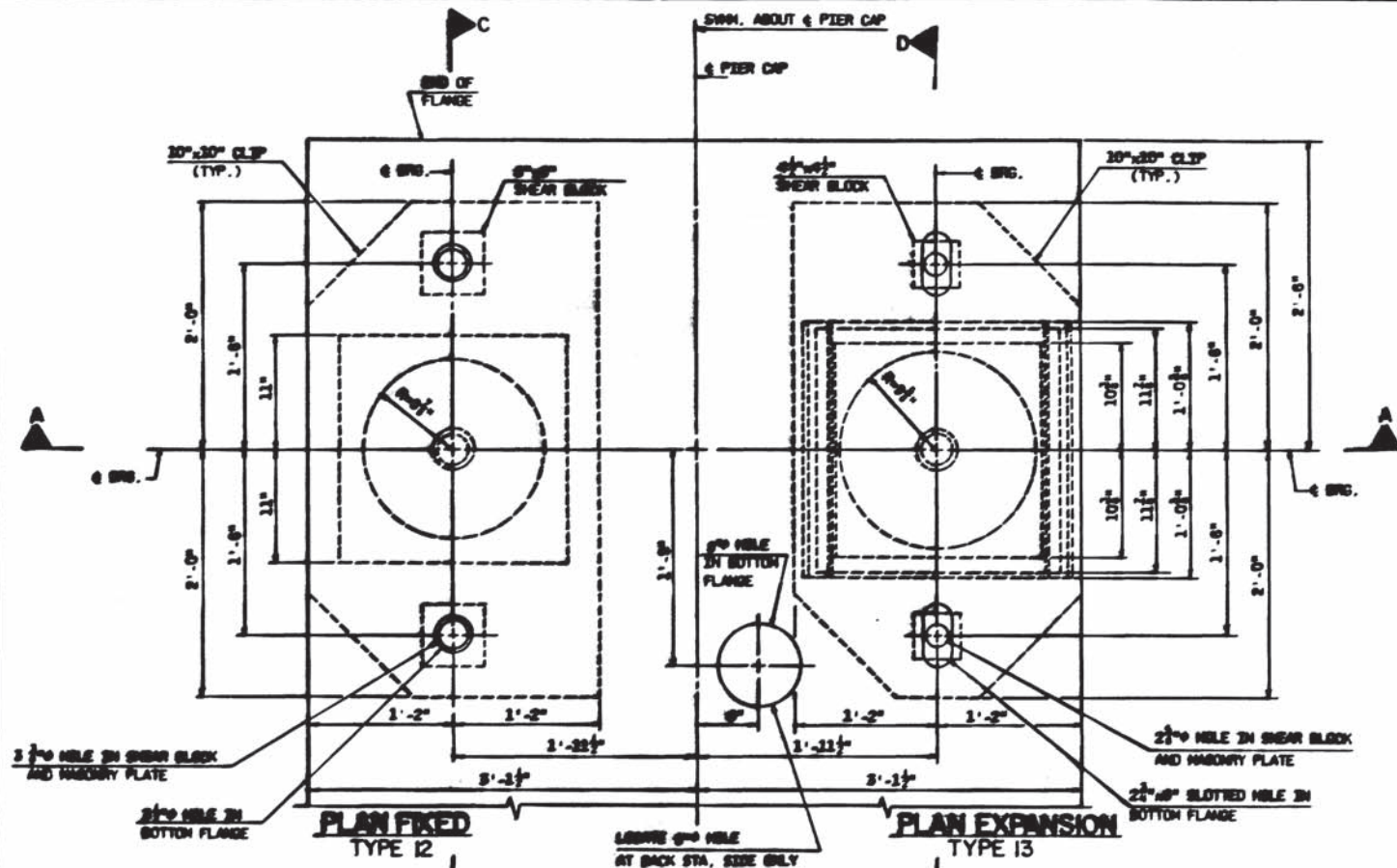
SEBASTIAN W. OATNER & ASSOCIATES  
GENERAL ENGINEERING CONSULTANTS

**ROCKVILLE ROUTE  
AERIAL STRUCTURE  
BEARING ASSEMBLIES**

SCALE: NO SCALE

WORKS NO. A13-S-113

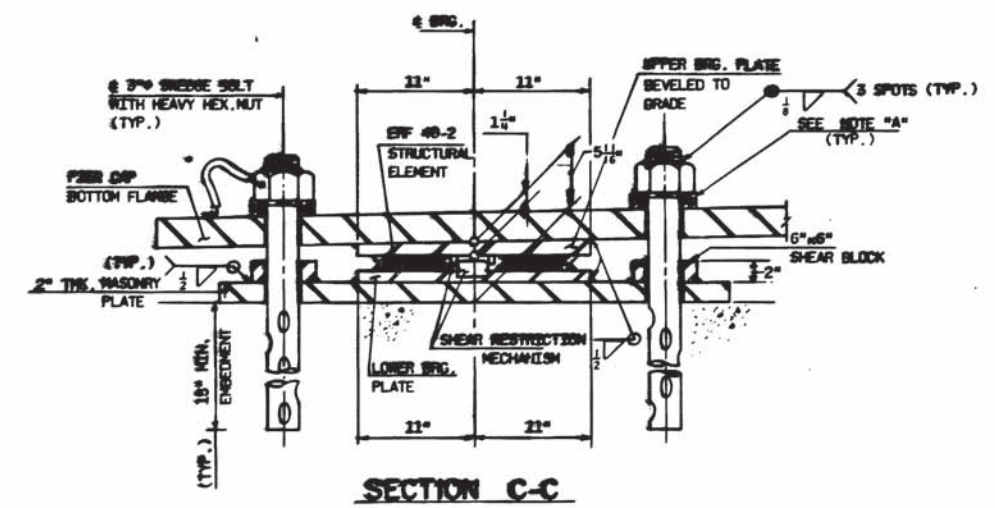
M220-33A



DESIGN VALUES			
TYPE	DESCRIPTION	MAX. LOAD	MIN. LOAD
12	EPF 300 (300)	970	160
13	EPF 300 (300)	645	175
14	EPF 300 (400)	745	85
16	EPF 300 (300)	1070	85
16	EPF 300 (300)	685	80
17	EPF 300 (400)	760	85

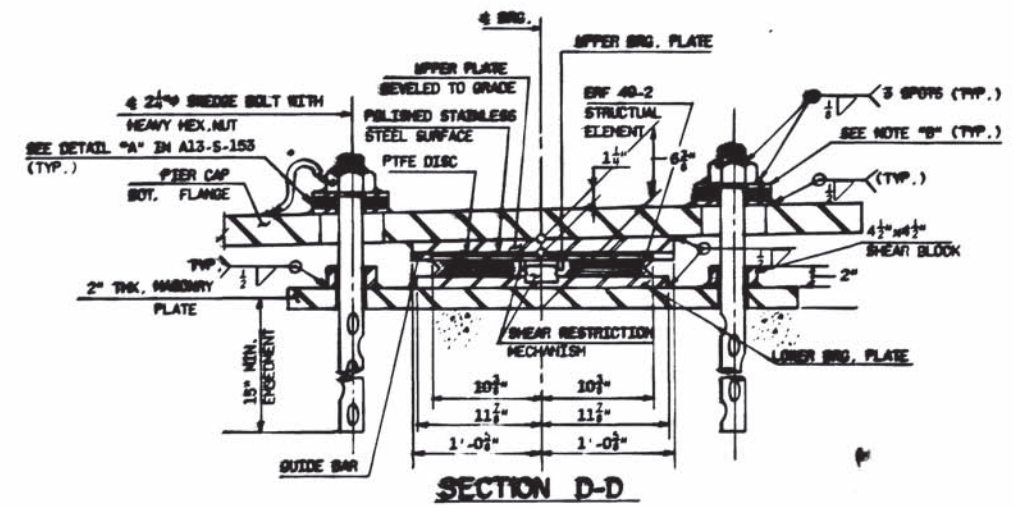
SECTION A-A

NOTE:  
 USE "RABO-PYPE" BRIDGE BEARINGS MANUFACTURED BY  
 RAYSON BORMAN ASSOC. INC., BUFFALO, N.Y.  
 SEE SPECIAL PROVISIONS, SECTION 501.



SECTION C-C

\* ELECTRICAL BONDING CABLE, (PIER CAP TO ANCHOR BOLT).  
 THERMIT WELD - SEE NOTE 5, DRG. NO. A13-S-171.



SECTION D-D

NOTE A:  
 5 1/2" x 1" THICK ELASTOMERIC WASHER BETWEEN TWO 5 1/2" x 1"  
 THICK STEEL WASHERS.

NOTE B:  
 7 1/2" x 1" THICK FIBERGLASS PAD BONDED TO 7 1/2" x 1" THICK  
 STEEL WASHER.

WASHINGTON METROPOLITAN  
 AREA TRANSIT AUTHORITY  
 AS-BUILT CONDITION  
 [Signature]

DESIGNED	DATE
J.L. LORAN	6/75
R.A. HORN	6/75
C.P. LEE	6/75

REFERENCE DRAWINGS		REVISIONS	
NUMBER	DESCRIPTION	DATE	BY
A13-S-140	CRANE BEARING AND DETAILS		
A13-S-142	PIER CAP DETAILS - PIER 4017A		
A13-S-143	PIER CAP DETAILS - PIER 4017B		
A13-S-144	BEARING ASSEMBLIES		



**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**BUCHART-HORN**  
 CONSULTING ENGINEERS AND PLANNERS

DE LEUW, CATHIER & COMPANY  
 GENERAL ENGINEERING CONSULTANT

HARRY WISSE & ASSOCIATES  
 GENERAL ARCHITECTURAL CONSULTANT

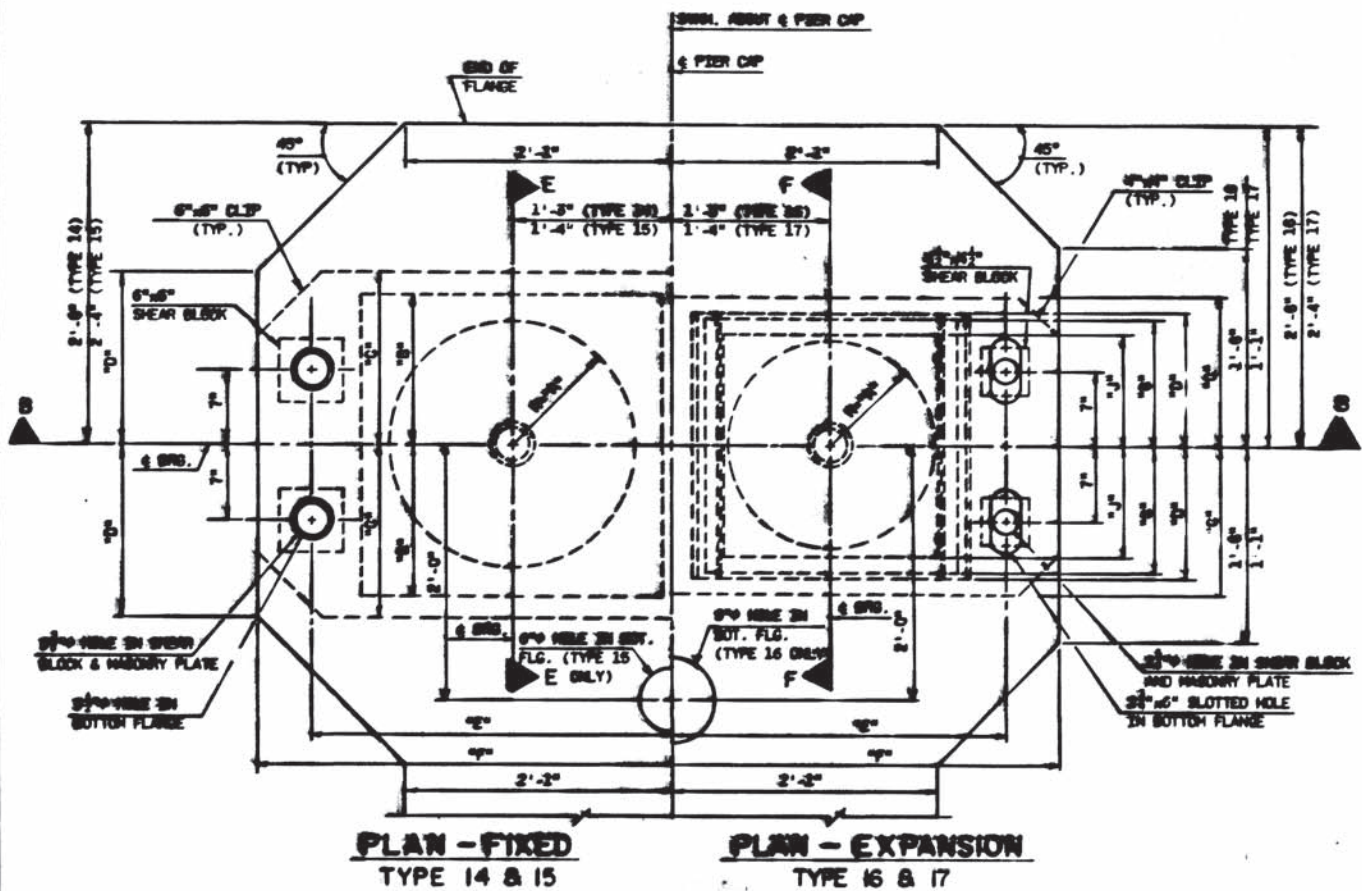
APPROVED [Signature]

**ROCKVILLE ROUTE AERIAL STRUCTURE BEARING ASSEMBLIES**

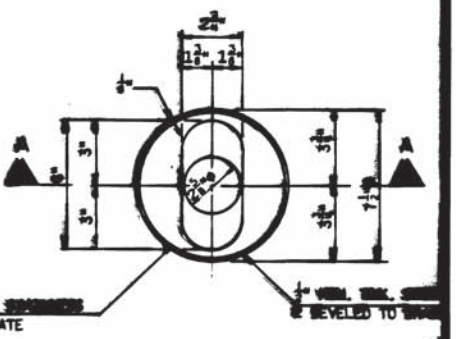
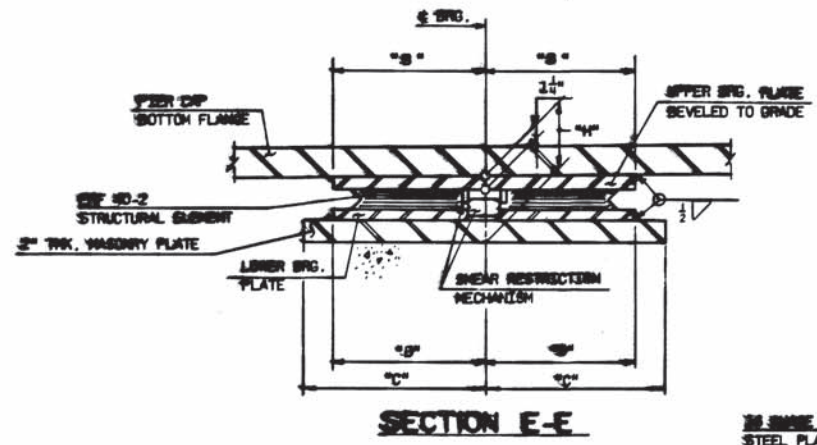
SCALE: 1/2" = 1'-0"

DRAWING NO. A13-S-152

M220-332



		DIMENSIONS							
TYPE	DESIGNATION	A	B	C	D	E	F	G	H
16	ERF 101 (350)	9 $\frac{1}{2}$ "	1'-1 $\frac{1}{2}$ "	1'-2"	1'-0 $\frac{1}{2}$ "	2'-8"	3'-1"	11 $\frac{1}{2}$ "	6 $\frac{1}{2}$ "
17	ERF 201 (480)	10 $\frac{1}{2}$ "	1'-1 $\frac{1}{2}$ "	1'-3"	1'-1 $\frac{1}{2}$ "	2'-10"	3'-4"	1'-0 $\frac{1}{2}$ "	6 $\frac{1}{2}$ "

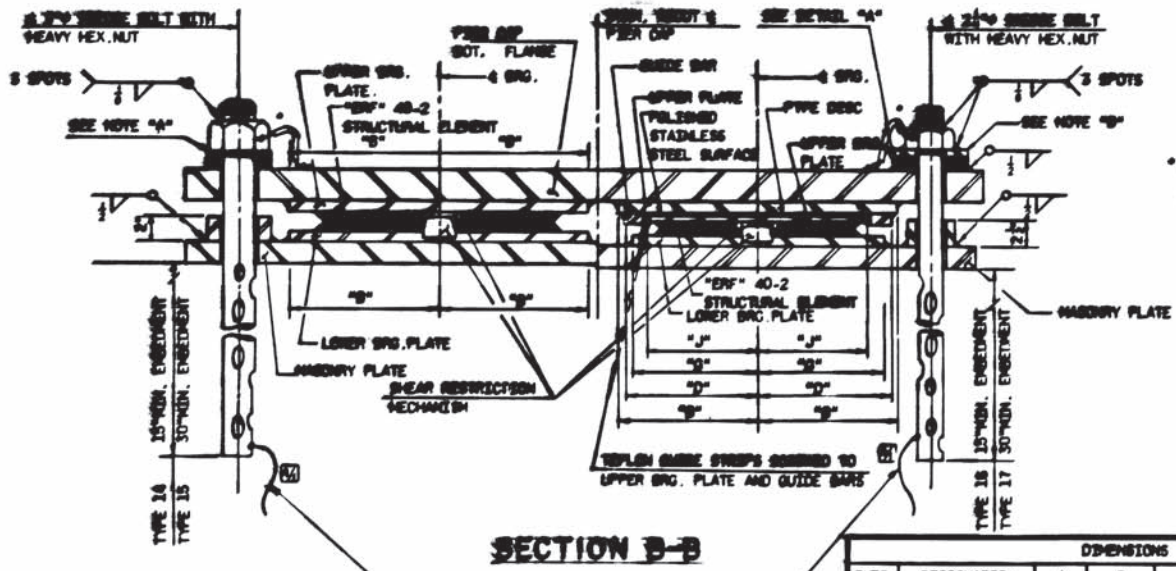


**PLAN - FIXED**  
TYPE 14 & 15

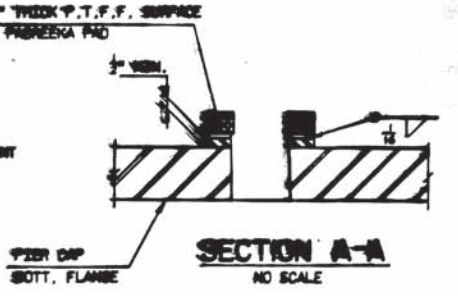
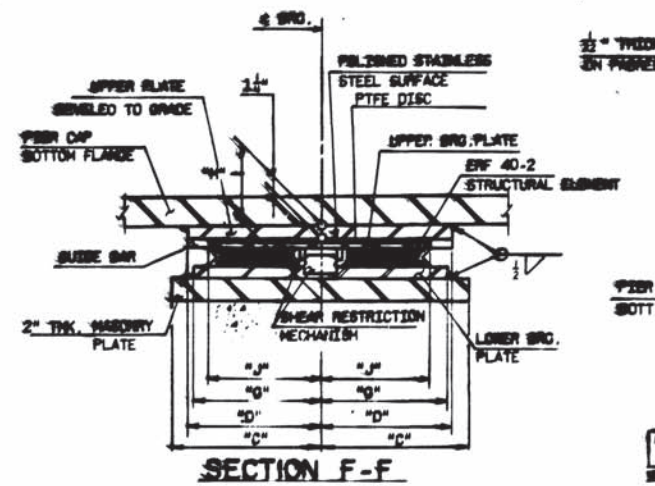
**PLAN - EXPANSION**  
TYPE 16 & 17

**SECTION E-E**

**PLAN**  
NO SCALE



\* ELECTRICAL BONDING CABLE, (PIER CAP TO ANCHOR BOLT) THERMIT WELD-SEE NOTE 5, BRG. NO. A13-8-171.



**SECTION A-A**  
NO SCALE

**DETAIL "A"**

**SECTION B-B**

**SECTION F-F**

WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
AS-BUILT CONDITION  
MAY 03 1979

		DIMENSIONS							
TYPE	DESIGNATION	A	B	C	D	E	F	G	H
14	ERF 103 (400)	10 $\frac{1}{2}$ "	1'-0 $\frac{1}{2}$ "	1'-3"	1'-8"	2'-8"	3'-1"	6 $\frac{1}{2}$ "	
15	ERF 103 (500)	12"	1'-2 $\frac{1}{2}$ "	1'-8"	1'-1"	2'-11"	3'-4"	6 $\frac{1}{2}$ "	

NOTE:  
USE "M80-PW2" BRIDGE BEARINGS MANUFACTURED BY PATTON BORMAN ASSOC. INC., BUFFALO, N.Y. SEE SPECIAL PROVISIONS, SECTION 501.

NOTE A:  
5/16x1/2" THICK ELASTOMERIC WASHER BETWEEN TWO 5/16x1/2" THICK STEEL WASHERS

NOTE B:  
7/16x1/2" THICK FIBERGLASS PAD BONDED TO 7/16x1/2" THICK STEEL WASHER.

DESIGNED	DATE	REVISIONS	DESCRIPTION
J.L. HARRIS	5/75		
H.C. SMITH	6/75		
J.L. HARRIS	8/75		
J.L. HARRIS	8/75		
J.L. HARRIS	8/75		



**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**BUCHART-HORN**  
CONSULTING ENGINEERS AND PLANNERS

DE LEW, CATHER & COMPANY  
GENERAL ENGINEERING CONSULTANT

HARRY WISSE & ASSOCIATES  
GENERAL ARCHITECTURAL CONSULTANT

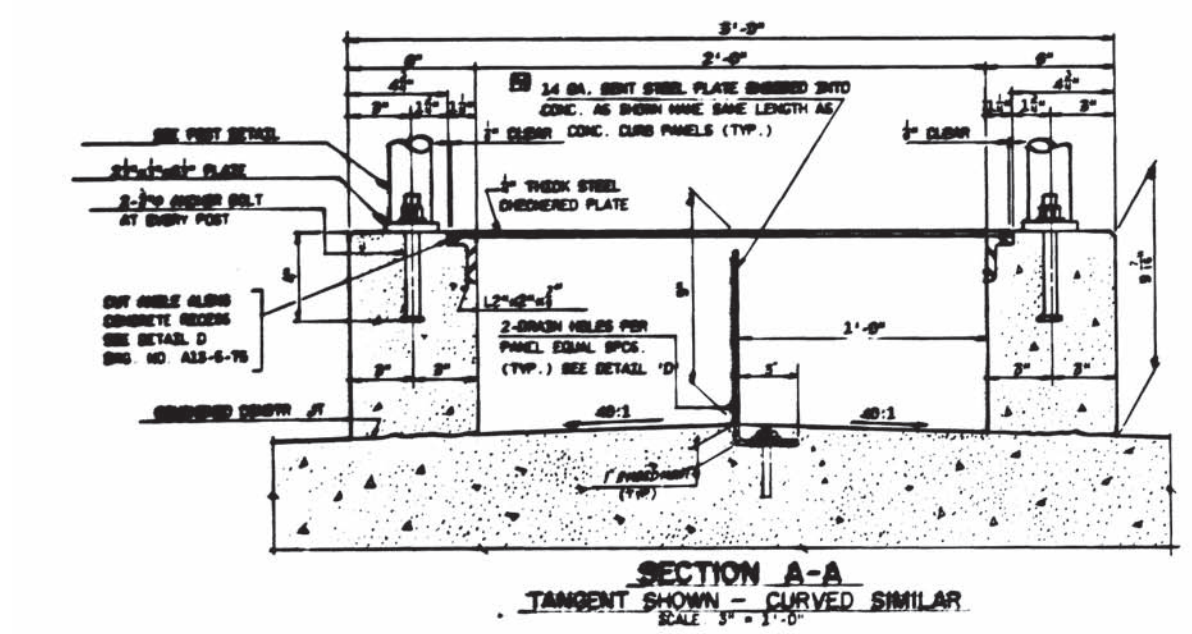
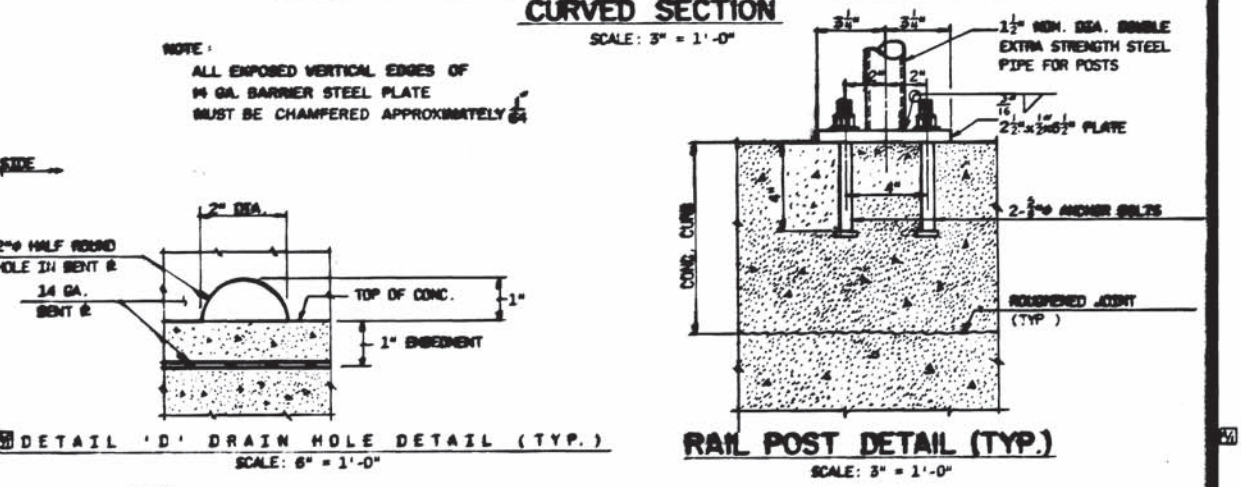
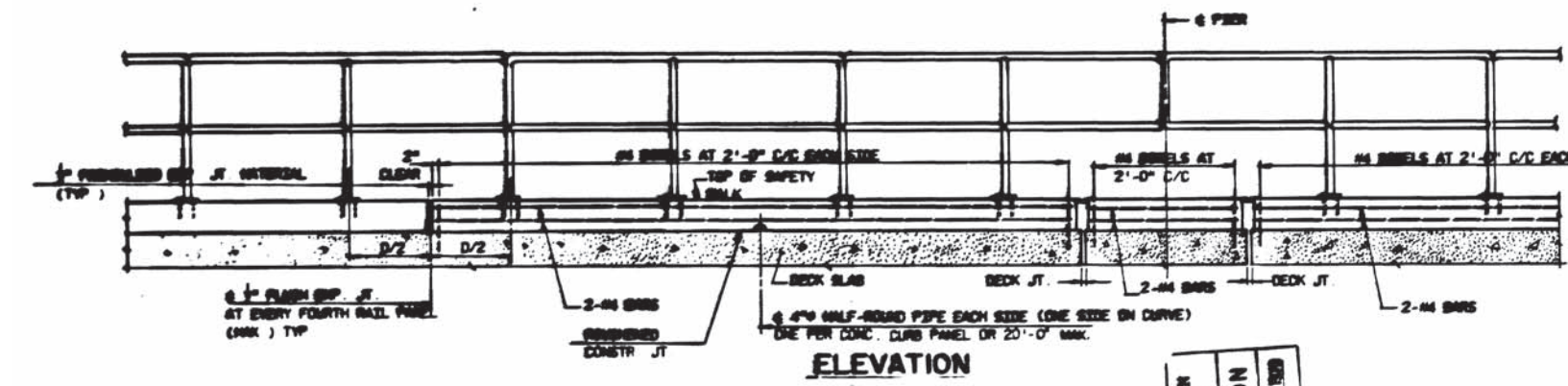
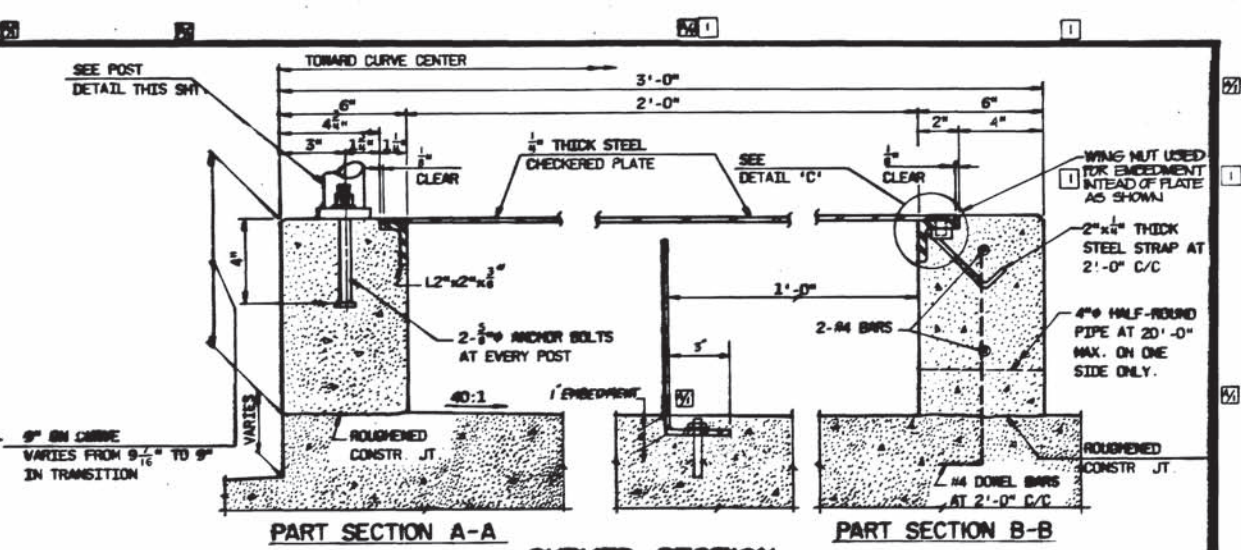
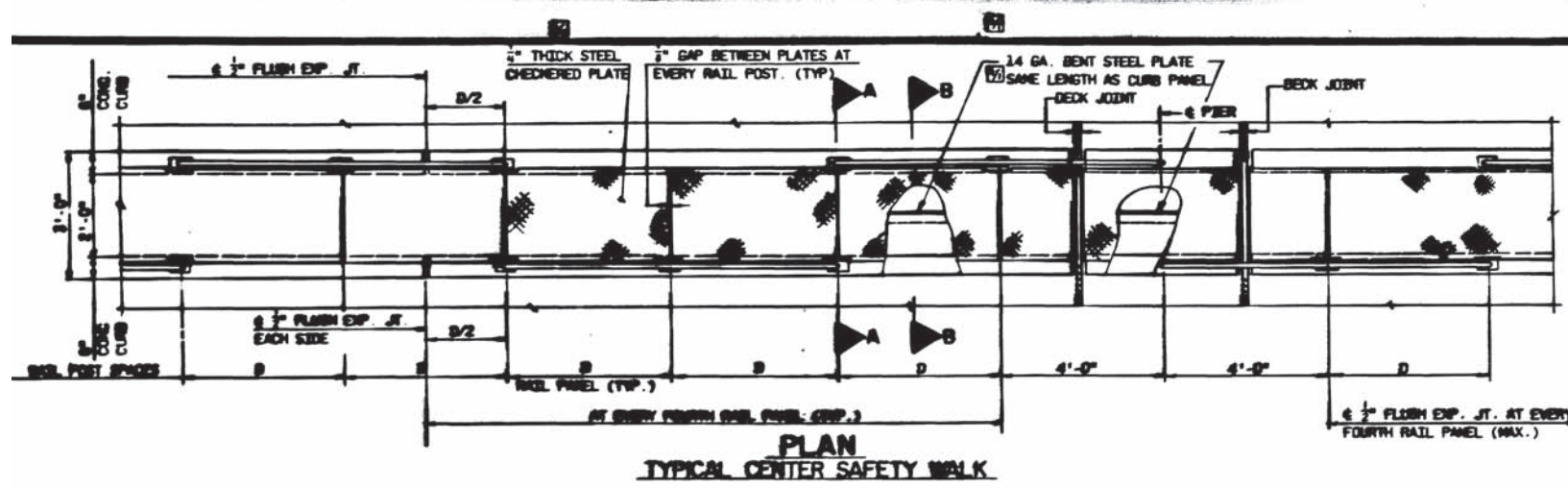
APPROVED: *[Signature]*

**ROCKVILLE ROUTE**  
AERIAL STRUCTURE  
BEARING ASSEMBLIES

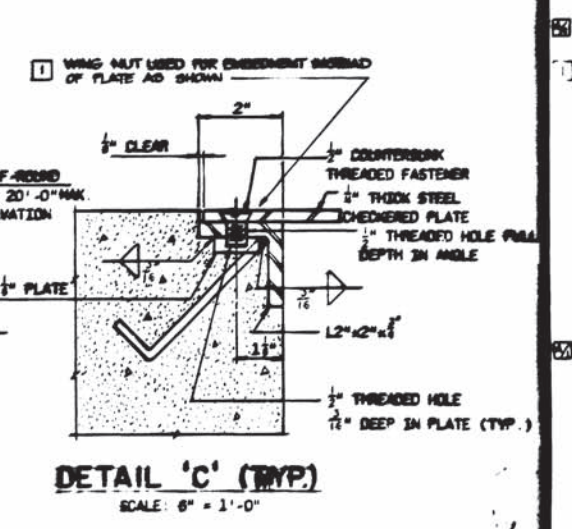
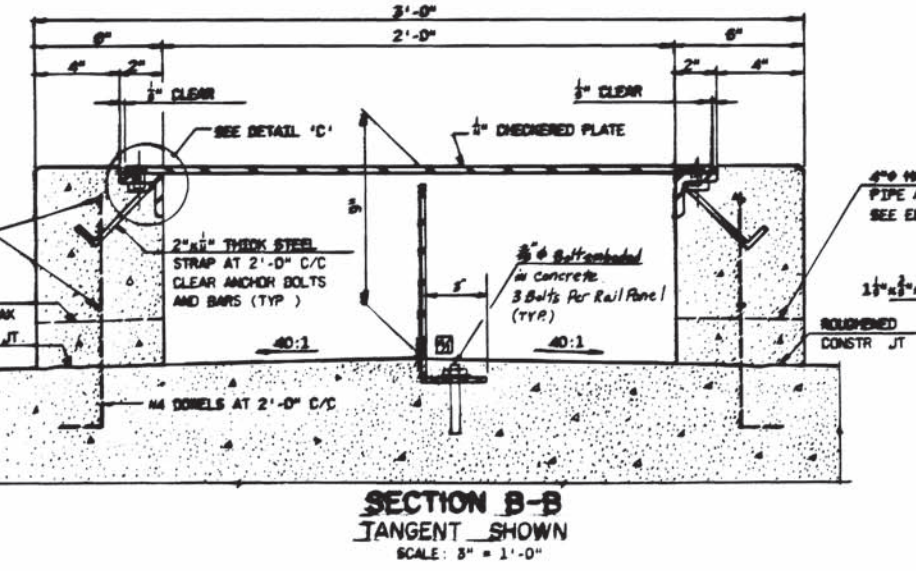
SCALE: 1/2" = 1'-0"  
AND AS NOTED

PROJECT NO. A13-S-153

DWG. NO. M220-353



WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
 AS BUILT CONDITION  
 DATE: MAY 03 1978  
 BY: [Signature]



NO.	DATE	DESCRIPTION	BY	REVISIONS
1	1-19-76	ISSUED 'A' EXP. BOLT CONNECTION.	S.P.	
2	5-25-76	ISSUED 'B' EXP. BOLT CONNECTION.	TRAY	



**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**SUCHART-HORN**  
CONSULTING ENGINEERS AND PLANNERS

DE LEUW, CATHEN & COMPANY  
GENERAL ENGINEERING CONSULTANT

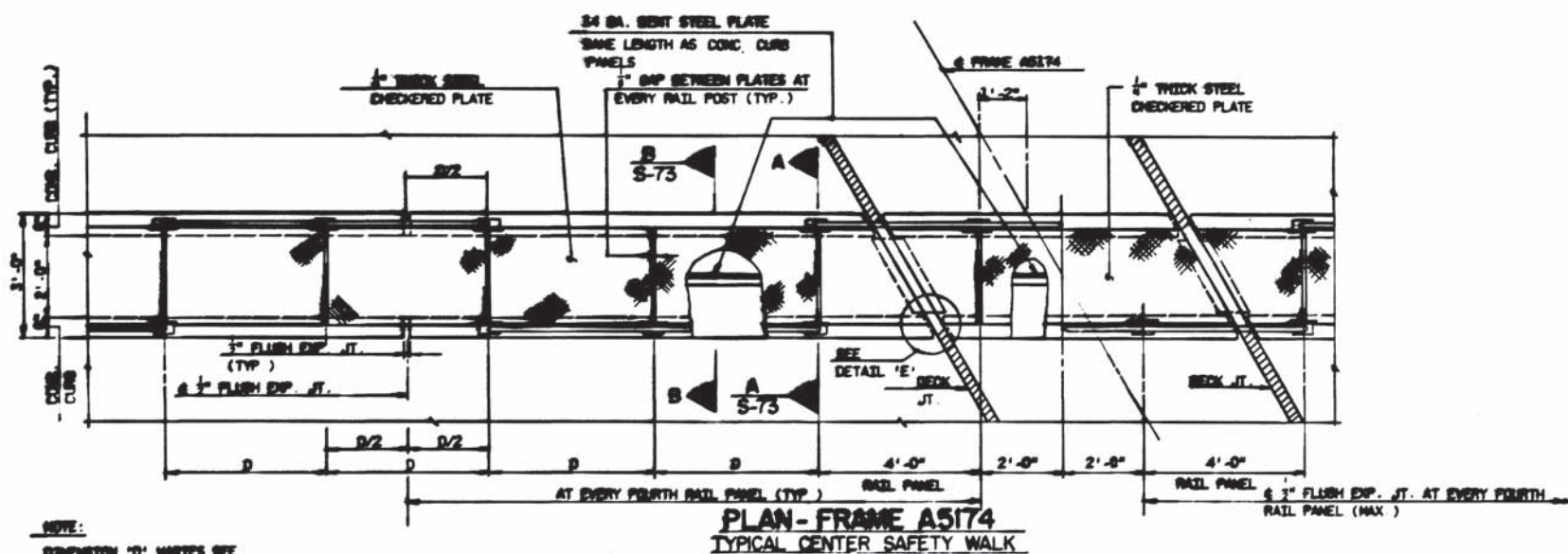
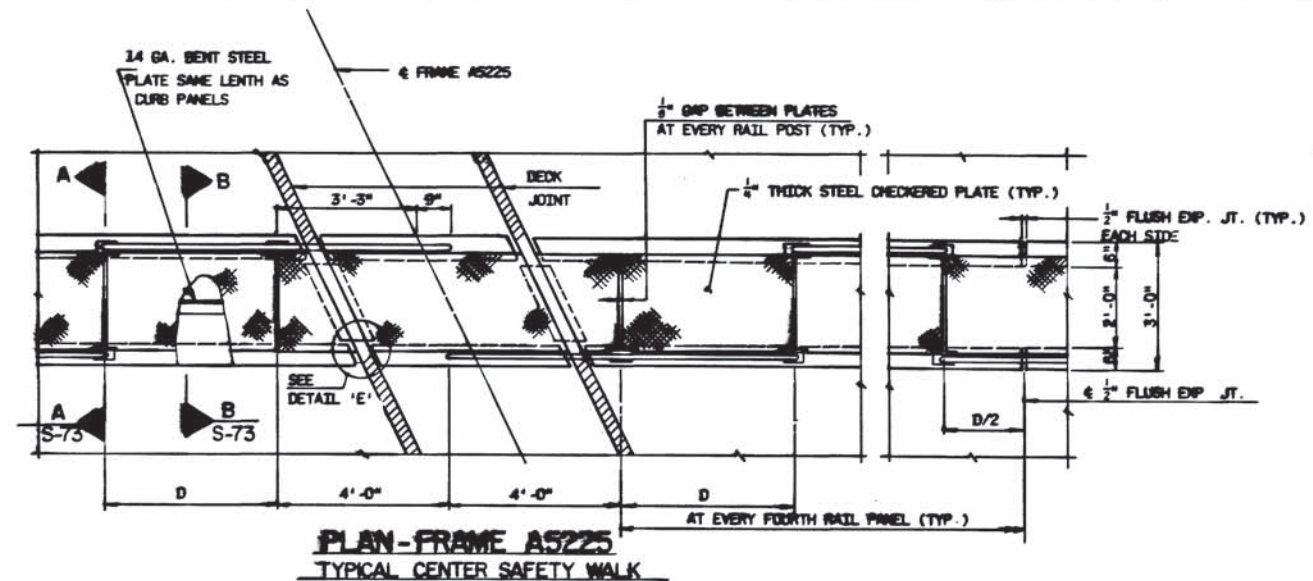
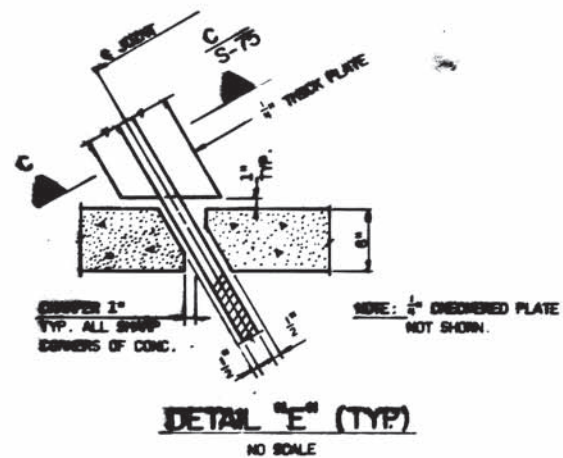
HARRY WISSE & ASSOCIATES  
GENERAL ARCHITECTURAL CONSULTANT

SUBMITTED: [Signature]

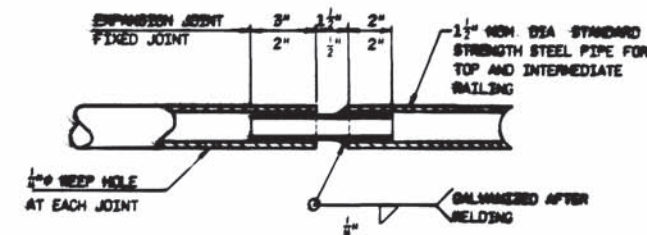
**ROCKVILLE ROUTE**  
AERIAL STRUCTURE  
SAFETY WALK AND CABLE TROUGH DETAILS

SCALE: 1/2" = 1'-0" AND AS NOTED

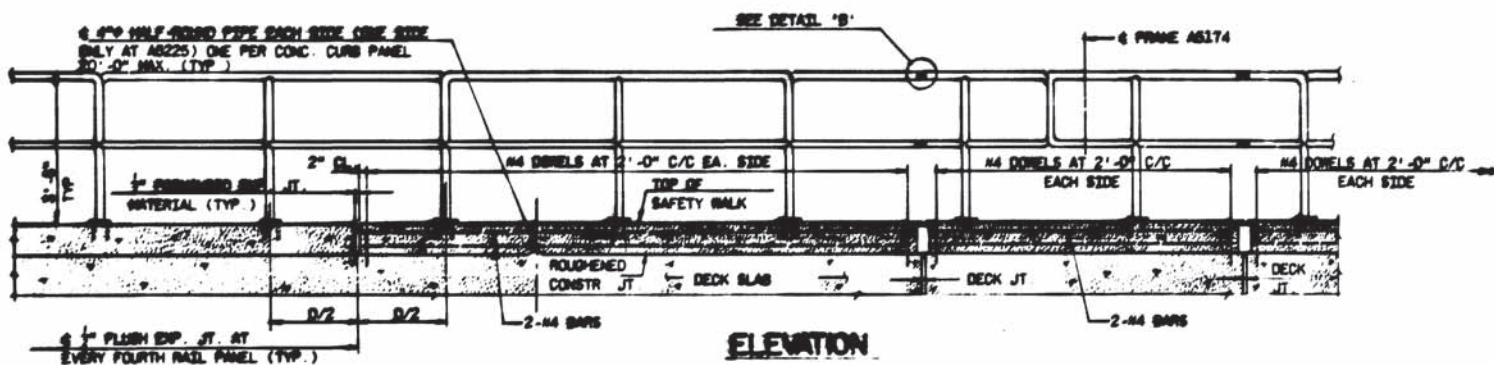
ISSUED NO: **A13-S-73** M220-334



NOTE:  
DIMENSION 'D' VARIES SEE  
DECK PLAN FOR SPACING



DETAIL "B"  
SCALE: 3" = 1'-0"



WASHINGTON METROPOLITAN  
TRANSIT AUTHORITY  
AS-BUILT CONDITION  
DATE: 09/29/77

REVISIONS	DATE	BY	DESCRIPTION
1	10/75	SM	SAFETY WALK AND CABLE TROUGH DETAILS
2	11/2-75	SM	SAFETY WALK AND CABLE TROUGH DETAILS

REVISIONS	DATE	BY	DESCRIPTION
1	10/75	SM	SAFETY WALK AND CABLE TROUGH DETAILS
2	11/2-75	SM	SAFETY WALK AND CABLE TROUGH DETAILS

**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**SUCHART-HORN**  
CONSULTING ENGINEERS AND PLANNERS

DE LEJW, CATHY & COMPANY  
GENERAL ENGINEERING CONSULTANT

HARRY WISSE & ASSOCIATES  
GENERAL ARCHITECTURAL CONSULTANT

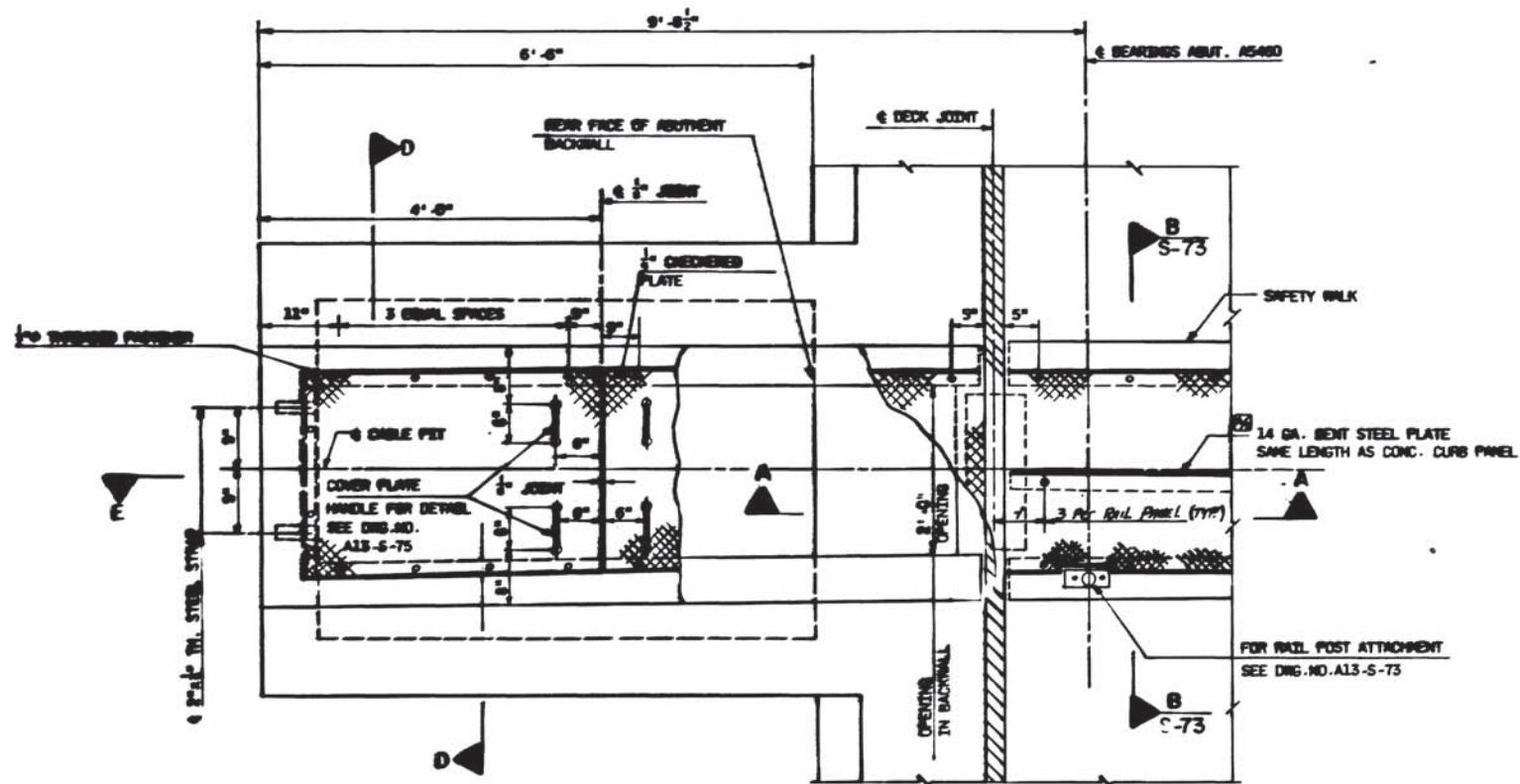
**ROCKVILLE ROUTE  
AERIAL STRUCTURE  
SAFETY WALK AND CABLE TROUGH DETAILS**

SCALE: 1/2" = 1'-0" AND AS SHOWN

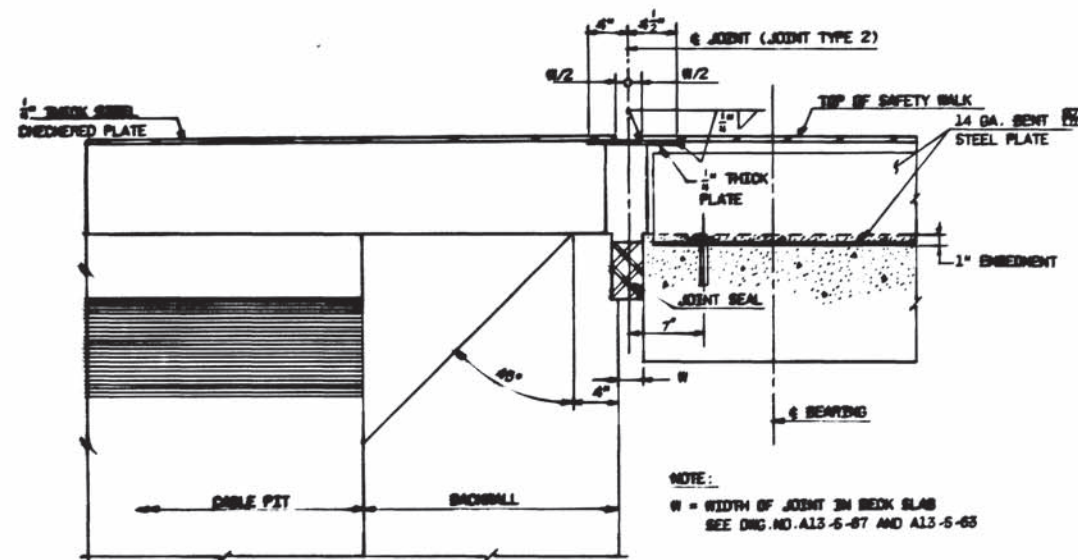
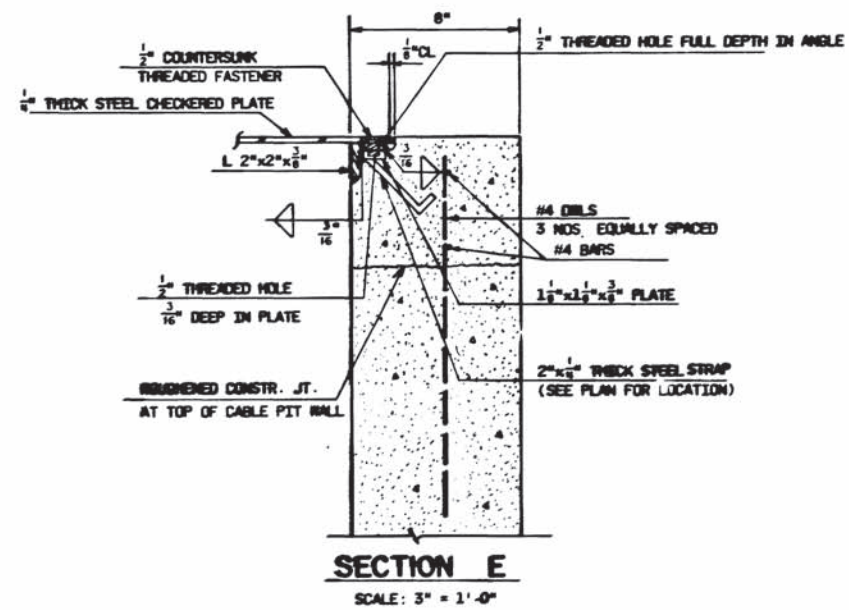
DRAWING NO. **A13-S-74**

PROJECT NO. **M220-335**

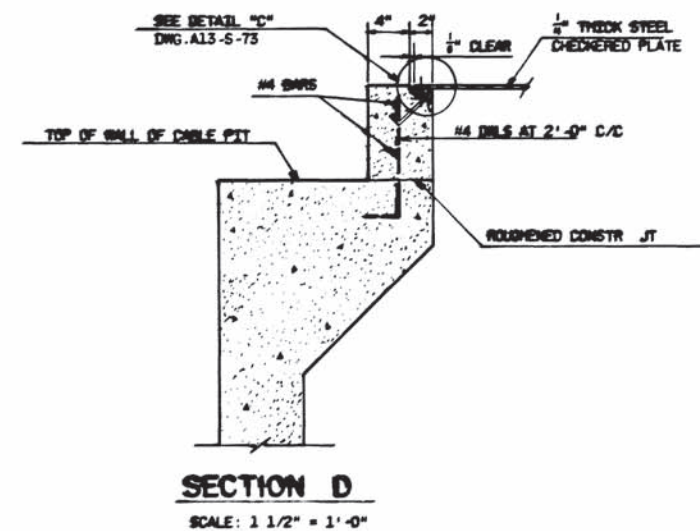




PLAN AT ABUTMENT A5460 AND TIE BREAKER STATION



SECTION A-A  
SCALE: 1 1/2" = 1'-0"



SECTION D  
SCALE: 1 1/2" = 1'-0"

WASHINGTON METROPOLITAN  
AREA TRANSIT AUTHORITY  
AS-BUILT CONDITION  
DATE: MAY 02 1978

NUMBER	DESCRIPTION	DATE	BY	REVISIONS
113-173	SAFETY WALK AND CABLE TROUGH DETAILS	1-16-78	S.P.	ADMITTED 3" EXP. BOLT CONNECTION.
113-174	PLAN AND ELEV. ABUT. A5460			EMBED IN GA. BENT & INTO CONCRETE
113-178	ANNUAL PLAN AND CABLE PIT DETAILS			



WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY

SECTION DESIGNER  
**BUCHART-HORN**  
CONSULTING ENGINEERS AND PLANNERS

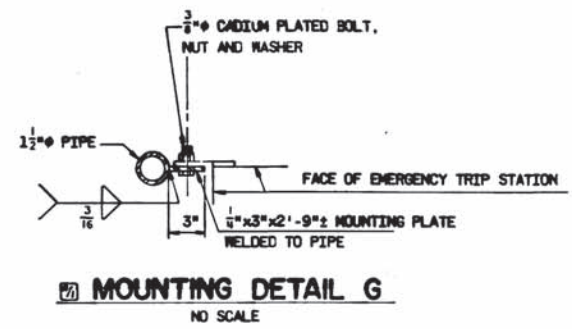
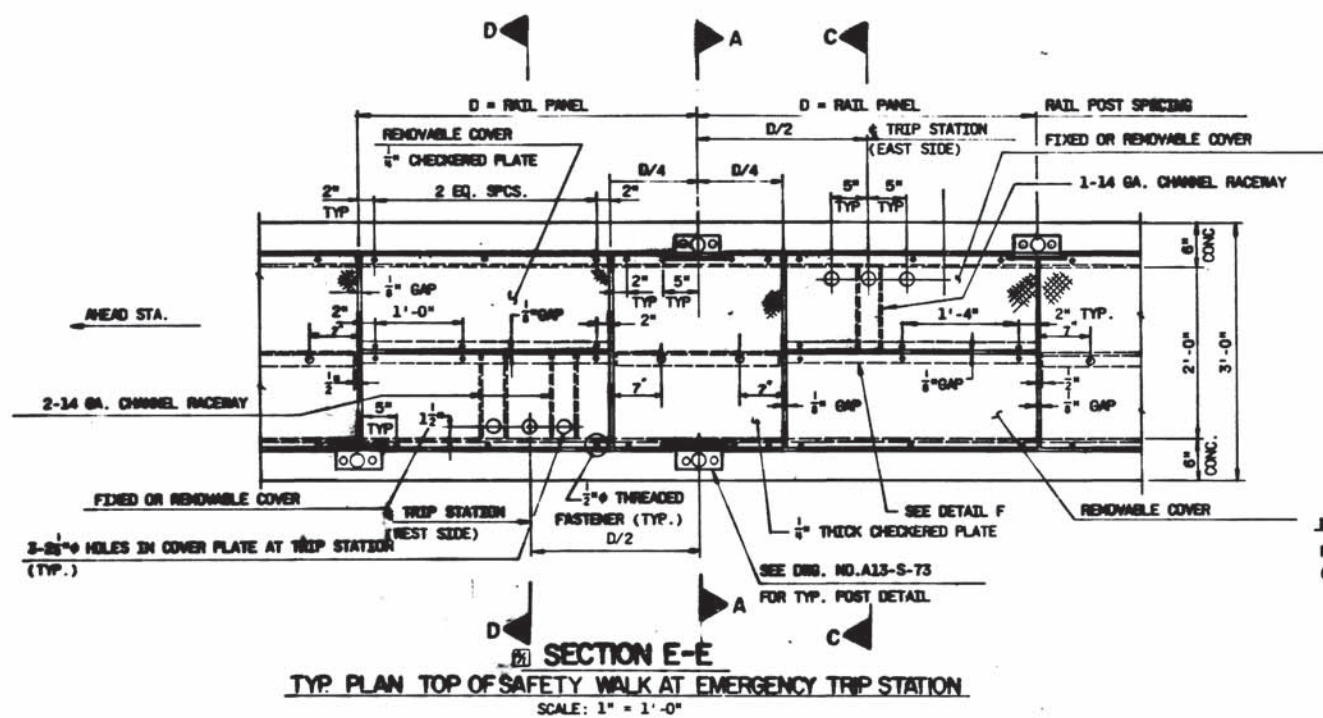
DE LEJAW, CATHY & COMPANY  
GENERAL ENGINEERING CONSULTANT  
HARRY WEESE & ASSOCIATES  
GENERAL ARCHITECTURAL CONSULTANT

ROCKVILLE ROUTE  
AERIAL STRUCTURE  
SAFETY WALK AND CABLE TROUGH DETAILS

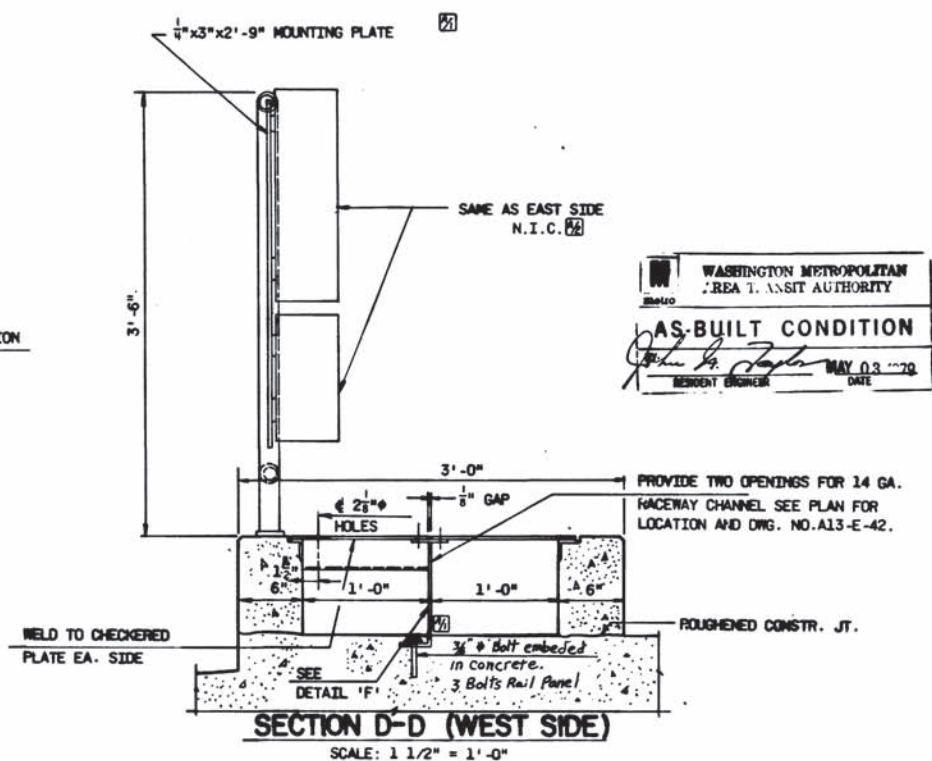
SCALE: 1" = 1'-0" AND AS NOTED

DRAWING NO.  
A13-S-161

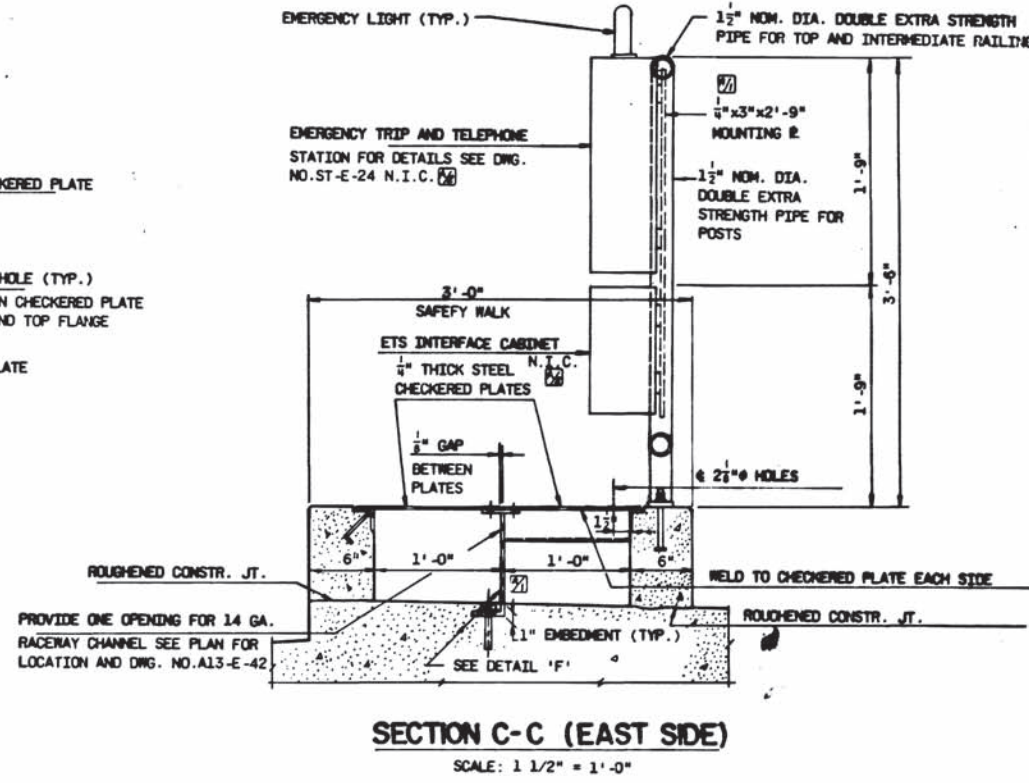
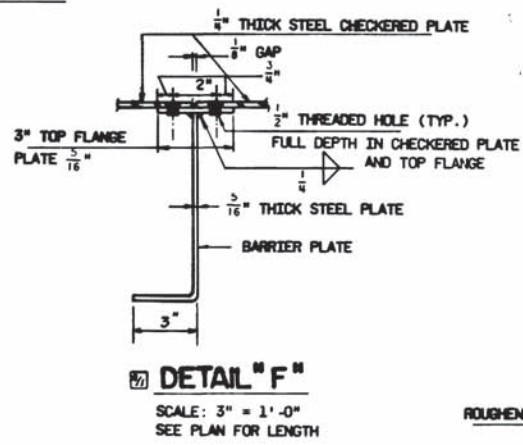
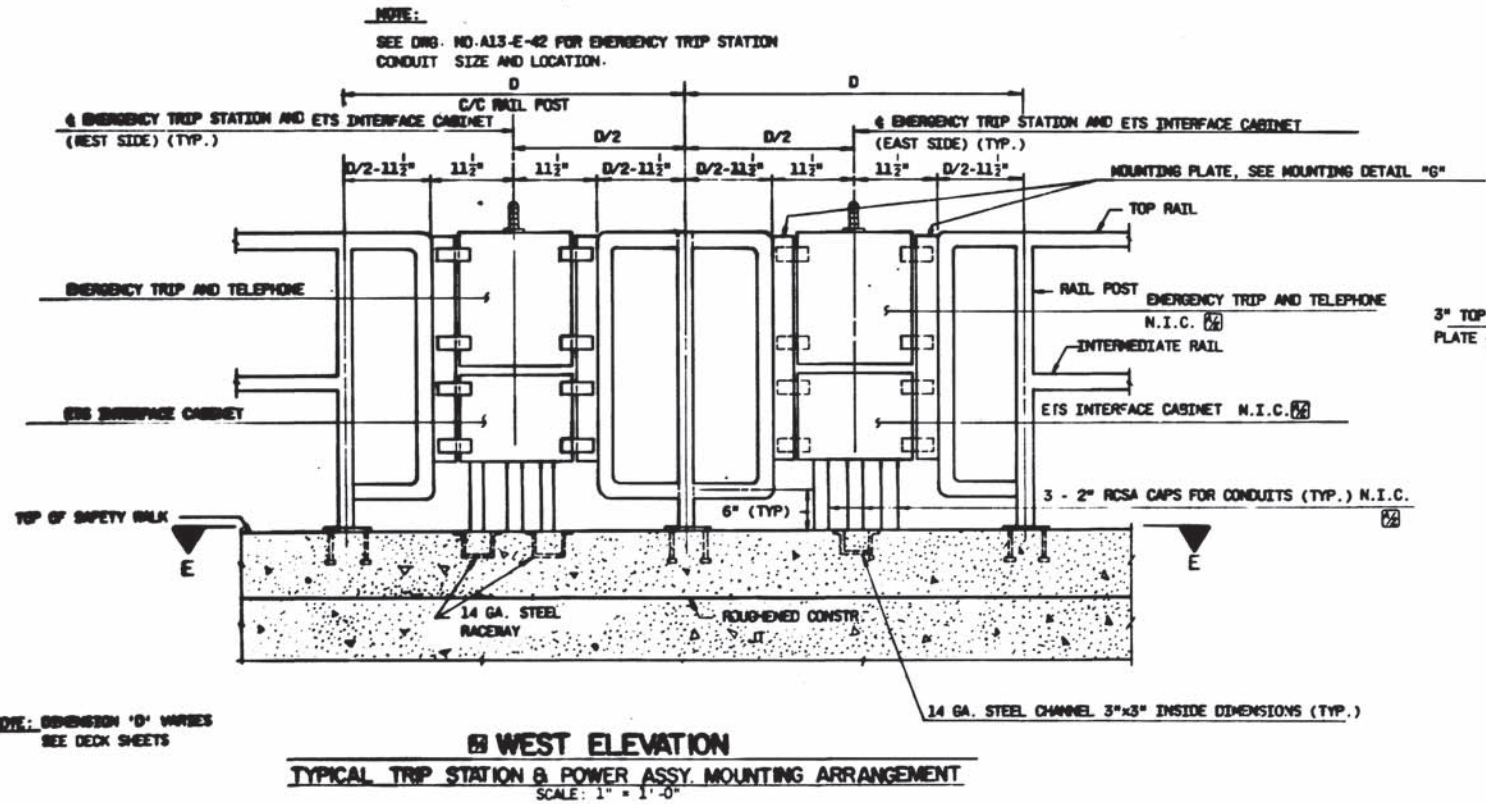
M220-337



NOTE:  
FOR LOCATION OF EMERGENCY TRIP STATION AND ETS INTERFACE CABINET, SEE DWG. NOS. A13-S-48, A13-S-35 AND A13-S-32.



WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
AS-BUILT CONDITION  
MAY 03 1978  
REVISION NUMBER DATE



NOTE: DIMENSION 'D' VARIES SEE DECK SHEETS

DESIGNED	C-P LEE	10/75
DRAWN	E. P. HARRIS	10/75
CHECKED	J.M. PETER	10/75
APPROVED	Paul Chubb	10/75

NUMBER	DESCRIPTION	DATE	BY	REVISIONS
A13-S-72	SAFETY WALK AND CABLE THROUGH DETAILS	1-19-76	S.P.	REVISED EMERGENCY TRIP STATION
A13-S-42	KEY PLAN OF STRUCTURE (FOR ELECTRICAL)			MOUNTING DETAILS AND BARRIER B CONNECTION
A13-S-74	SAFETY WALK AND CABLE THROUGH DETAILS	2-12-76	C.L.	INDICATED B.I.C. ITEMS

**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**BUCHART-HORN**  
CONSULTING ENGINEERS AND PLANNERS

DE LEUW, CATHAR & COMPANY  
GENERAL ENGINEERING CONSULTANT

HARRY WEESSE & ASSOCIATES  
GENERAL STRUCTURAL CONSULTANT

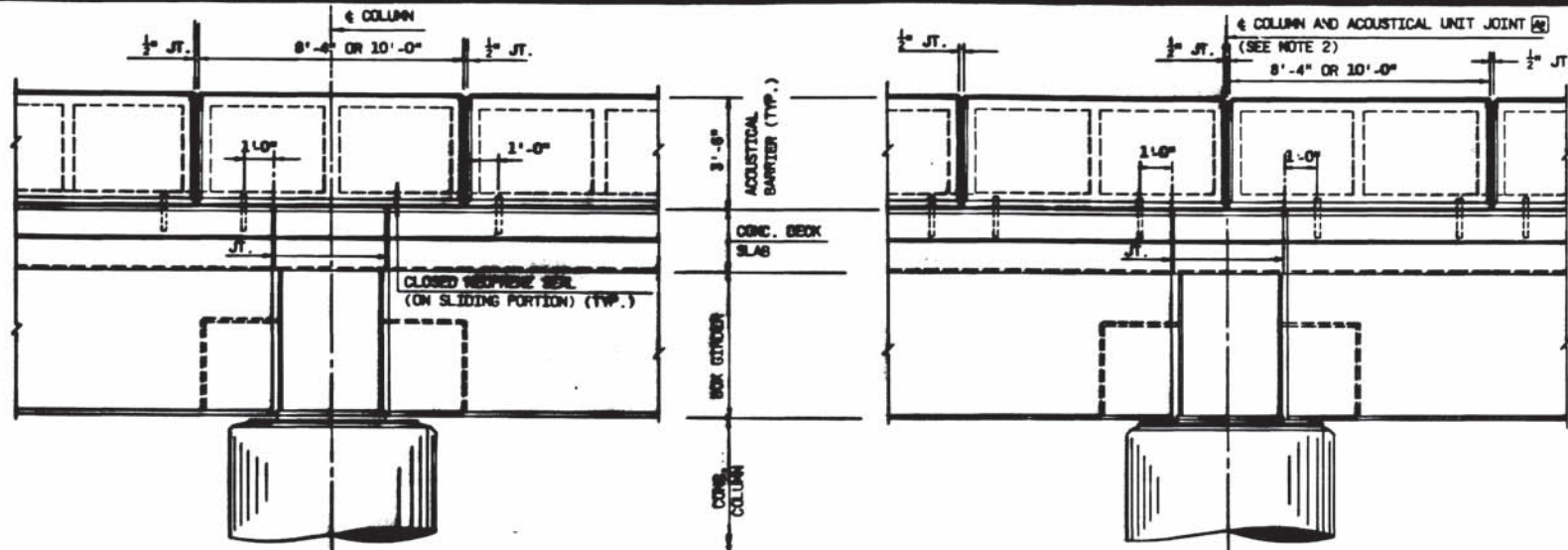
SUBMITTED: [Signature]  
APPROVED: [Signature]

**ROCKVILLE ROUTE AERIAL STRUCTURE**  
TYPICAL RAILING DETAILS AND EMERGENCY TRIP & TELEPHONE STATION

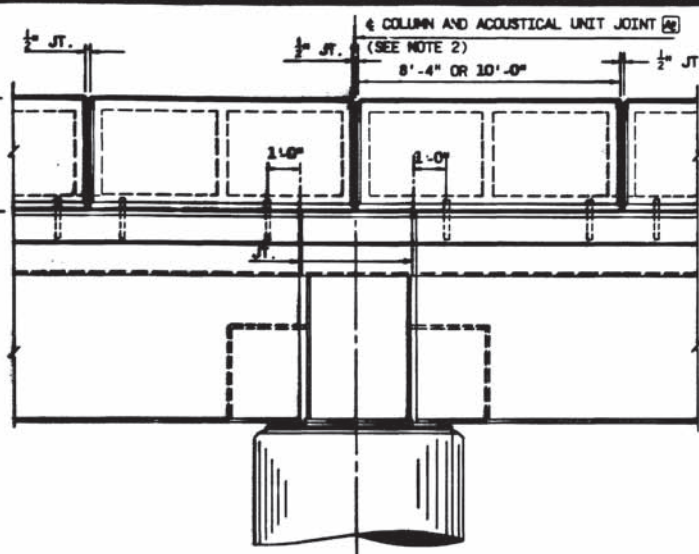
SCALE: 1" = 1'-0" AND AS NOTED

DRAWING NO. A13-S-168  
M220-338

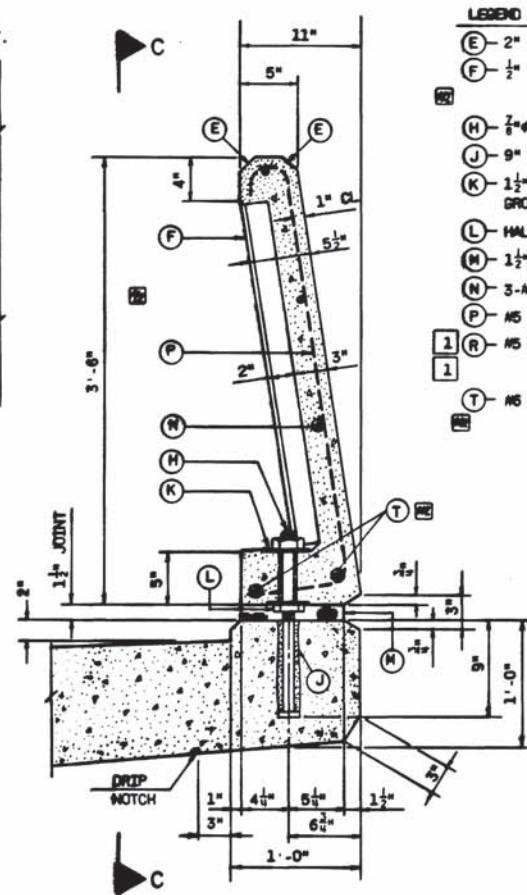




PARTIAL ELEVATION SIMPLE SPANS  
NO SCALE



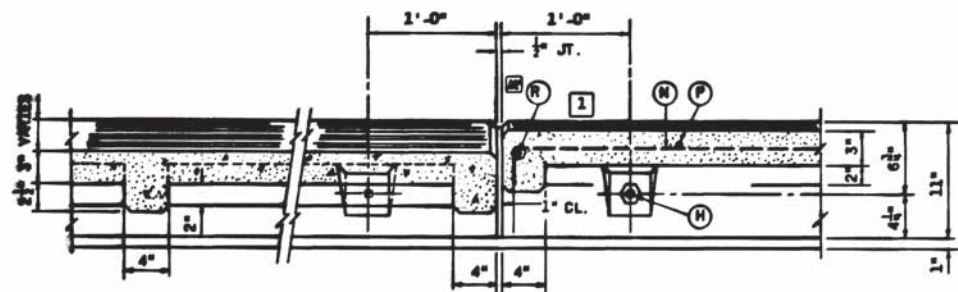
PARTIAL ELEVATION SIMPLE SPANS  
NO SCALE



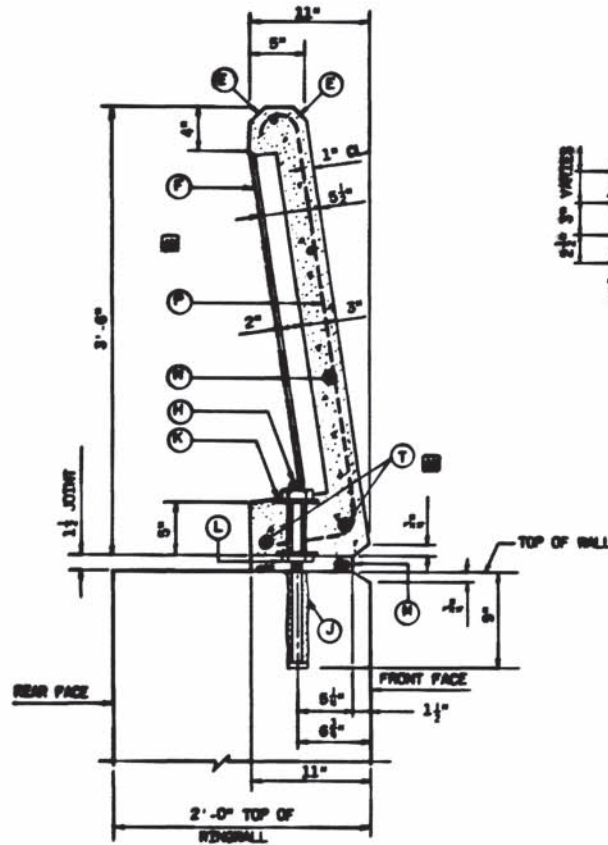
DETAIL 1  
ACUSTICAL BARRIER (CURB MOUNTING)  
SCALE: 1 1/2" = 1'-0" (SEE NOTE 1)

- LEGEND
- (E) 2" CHAMFER (TYP.)
  - (F) 1/2" CHAMFER (TYP.)
  - (H) 1/2" A-449 ANCHOR BOLT WITH NUT, DRILLED INTO CONCRETE
  - (J) 9" MIN. EMBEDMENT-EPHOXY GROUTED.
  - (K) 1 1/2" PIPE SLEEVE WITH PLATE 4" x 2 1/2" x 4" TOP AND BOTTOM GROUTED AFTER POSITIONING OF BARRIER.
  - (L) HALF NUT (LEVELING NUT)
  - (M) 1 1/2" JOINT, NON SHRINK GROUT
  - (N) 3-#4 BARS HORIZ.
  - (P) #5 BARS AT 12" VERT.
  - (R) #5 BAR
  - (T) #6 BARS HORIZ.

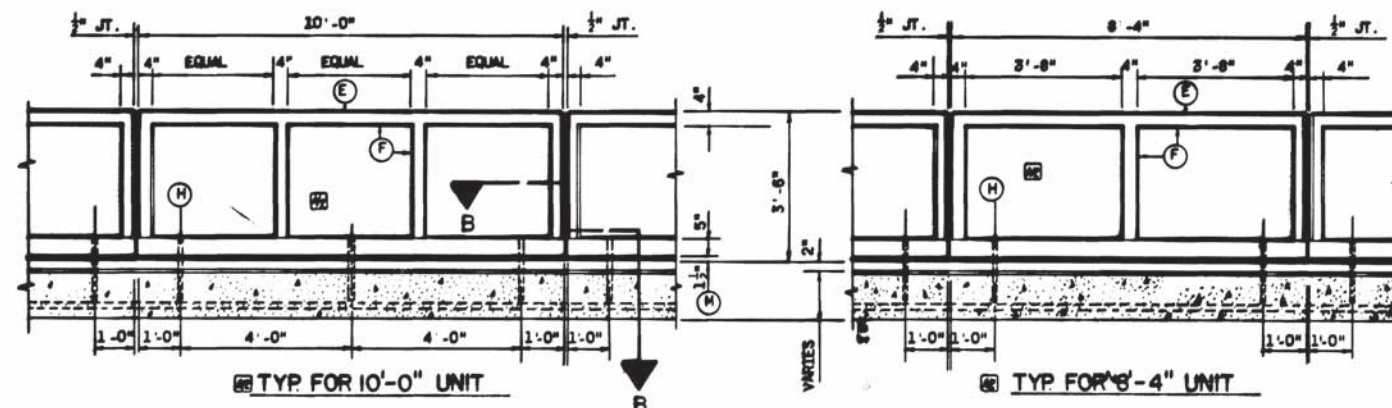
- NOTES:
1. ACUSTICAL BARRIER SHOWN ON DETAIL 1, SHALL BE USED ONLY AT LOCATIONS SHOWN ON UNIT DECK DRGS. A13-S-63, A13-S-65, A13-S-62, A13-S-61 AND ABUT. DRGS. A13-S-15 AND A13-S-16.
  2. SPANS FOR AERIAL STRUCTURES SHALL, WHENEVER POSSIBLE, BE SO CHOSEN THAT PRECAST CONCRETE ACUSTICAL BARRIER UNIT JOINT WILL COINCIDE WITH THE C OF EACH COLUMN AS SHOWN, WHILE MAINTAINING THE STANDARD UNIT LENGTHS OF 8'-4" OR 10'-0" WHENEVER THIS BECOMES IMPRACTICABLE, A SLIDING JOINT, AS SHOWN ON THE PARTIAL, SHALL BE USED. THE CENTER OF ACUSTICAL UNIT SHALL BE LOCATED AS CLOSE AS POSSIBLE TO THE C OF COLUMN.



SECTION B-B  
SCALE: 1 1/2" = 1'-0"



ACUSTICAL BARRIER (WALL MOUNTING)  
SCALE: 1 1/2" = 1'-0"



ELEVATION C-C  
SCALE: 1/2" = 1'-0"

WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
AS-BUILT CONDITION  
MAY 03 1979

REVISION	DATE	BY	DESCRIPTION
1	2-12-78	S.L.	REVISIONS
2	10-9-78	CPL	CHANGE REBAR DETAIL PER PGS 78



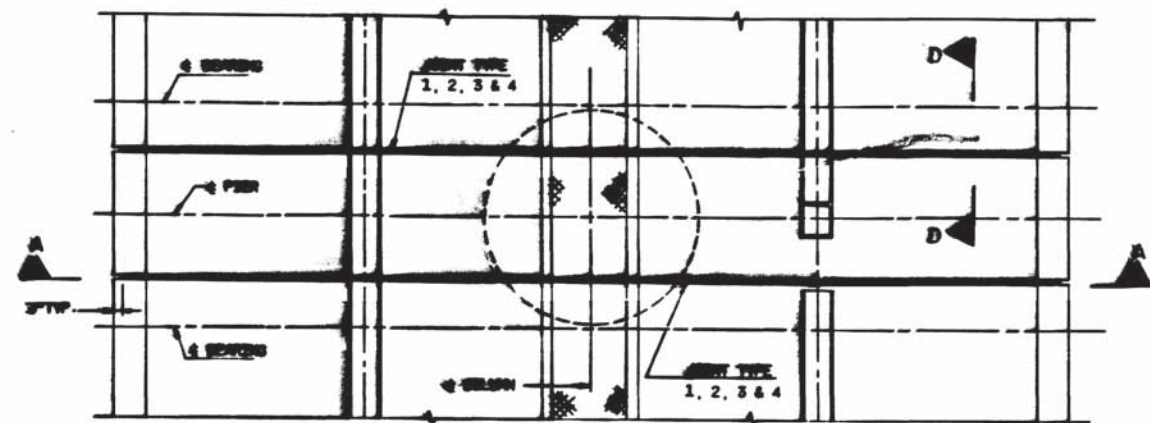
WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY

SECTION DESIGNER  
**BUCHART-HORN**  
CONSULTING ENGINEERS AND PLANNERS

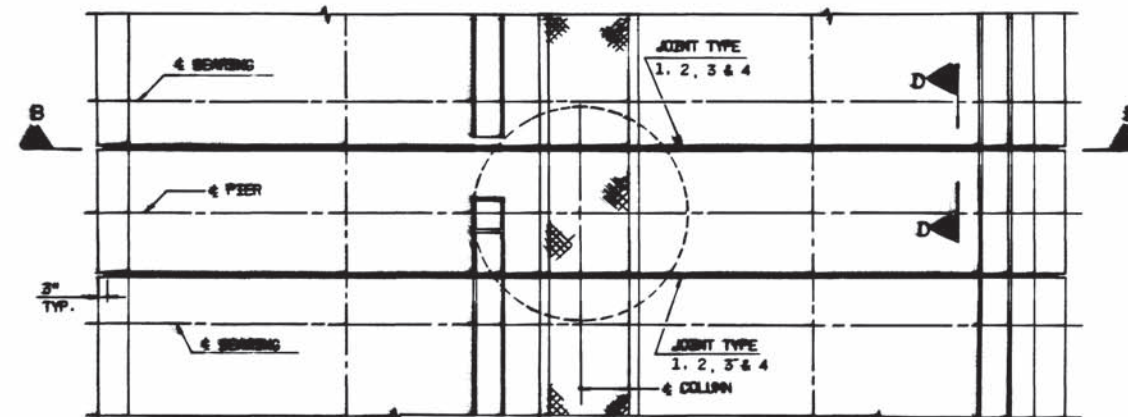
DE LEUW, CATHAR & COMPANY  
GENERAL ENGINEERING CONSULTANT  
HARRY WEERE & ASSOCIATES  
GENERAL ARCHITECTURAL CONSULTANT

ROCKVILLE ROUTE  
AERIAL STRUCTURE  
ACUSTICAL BARRIER-ELEVATIONS, SECTIONS AND DETAILS

SCALE: 1/2" = 1'-0" AND AS NOTED  
DRAWING NO. A13-S-169 M220-339



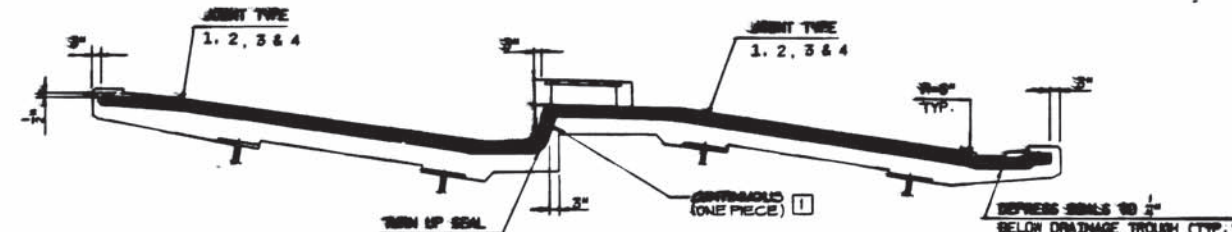
PLAN TANGENT



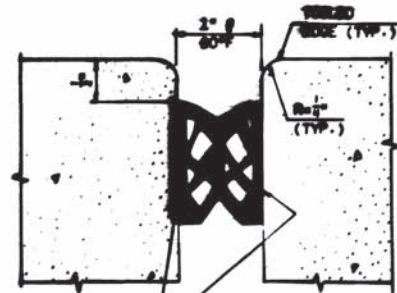
PLAN SUPERELEVATED



SECTION A-A

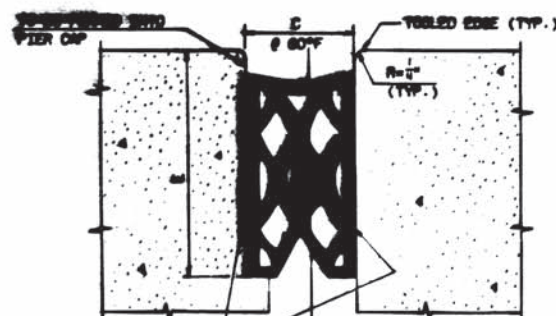


SECTION B-B



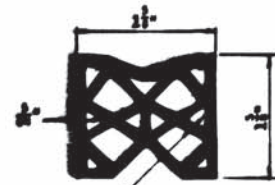
SHOWN TO CONC. WITH POLYURETHANE ADHESIVE

DETAIL-K

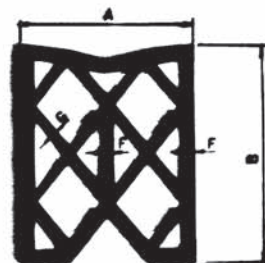


SHOWN TO CONC. WITH POLYURETHANE ADHESIVE

DETAIL-Y

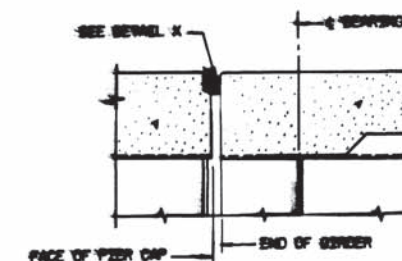


TYPE-4 SEAL

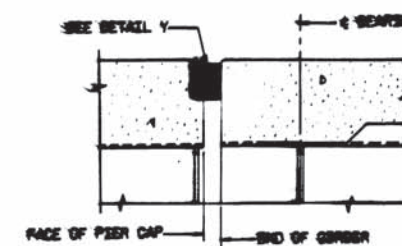


TYPE - 1,2,3, SEALS

TYPE	JOINT SEAL SCHEDULE					ROB THICKNESS	
	A	B	C	D	E	F	G
	1	$4'' \pm \frac{3}{16}''$ $- 0''$	$4\frac{1}{2}'' \pm \frac{1}{8}''$	$2\frac{1}{2}''$	$2\frac{1}{2}''$	$6\frac{1}{2}''$	$\frac{1}{4}'' \pm \frac{3}{32}''$ $- 0''$
2	$6'' \pm \frac{3}{16}''$ $- 0''$	$6\frac{1}{2}'' \pm \frac{1}{8}''$	$3''$	$2\frac{1}{2}''$	$6\frac{1}{2}''$	$\frac{1}{4}'' \pm \frac{3}{32}''$ $- 0''$	$\frac{3}{16}'' \pm \frac{3}{32}''$ $- 0''$
3	$6'' \pm \frac{3}{16}''$ $- 0''$	$6\frac{1}{2}'' \pm \frac{3}{16}''$	$3\frac{1}{2}''$	$3\frac{1}{2}''$	$6\frac{1}{2}''$	$\frac{1}{4}'' \pm \frac{3}{32}''$ $- 0''$	$\frac{3}{16}'' \pm \frac{3}{32}''$ $- 0''$



SECTION D-D FOR TYPE 4 ONLY



SECTION D-D FOR TYPE 1, 2, & 3 ONLY

WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
AS-BUILT CONDITION  
MAY 03 1979

DATE	BY	DESCRIPTION
11-1-76	THY	(1) REVISED PER FIELD COND. AS-BUILT
11-1-76	THY	
11-1-76	THY	
11-1-76	THY	
11-1-76	THY	

**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**SUCHART-HORN**  
CONSULTING ENGINEERS AND PLANNERS

DE LEUW, CATHIER & COMPANY  
GENERAL ENGINEERING CONSULTANT

HARRY WERRE & ASSOCIATES  
GENERAL ARCHITECTURAL CONSULTANT

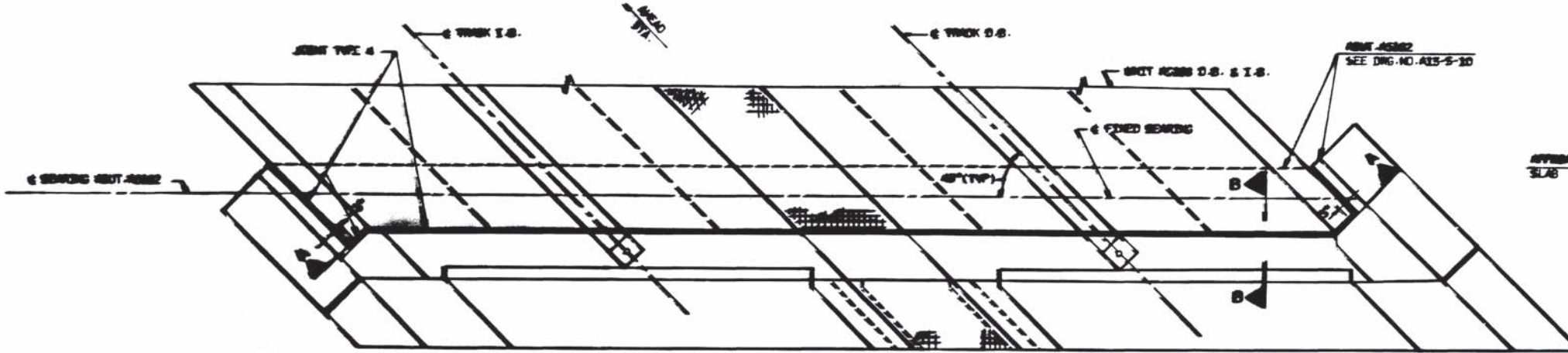
APPROVED: [Signature]

**ROCKVILLE ROUTE AERIAL STRUCTURE DECK SLAB JOINT SEAL DETAILS**

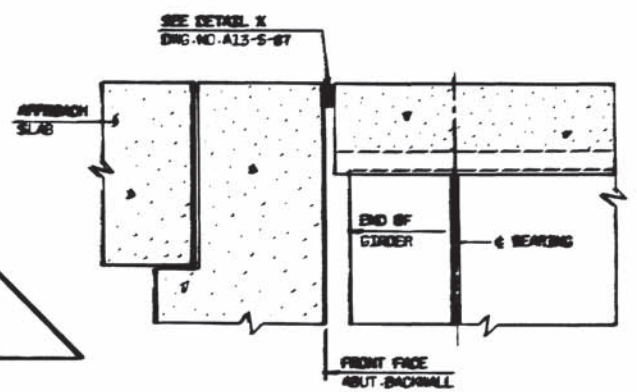
SCALE: NO SCALE

DRAWING NO. A13-S-87

NO. M220-348



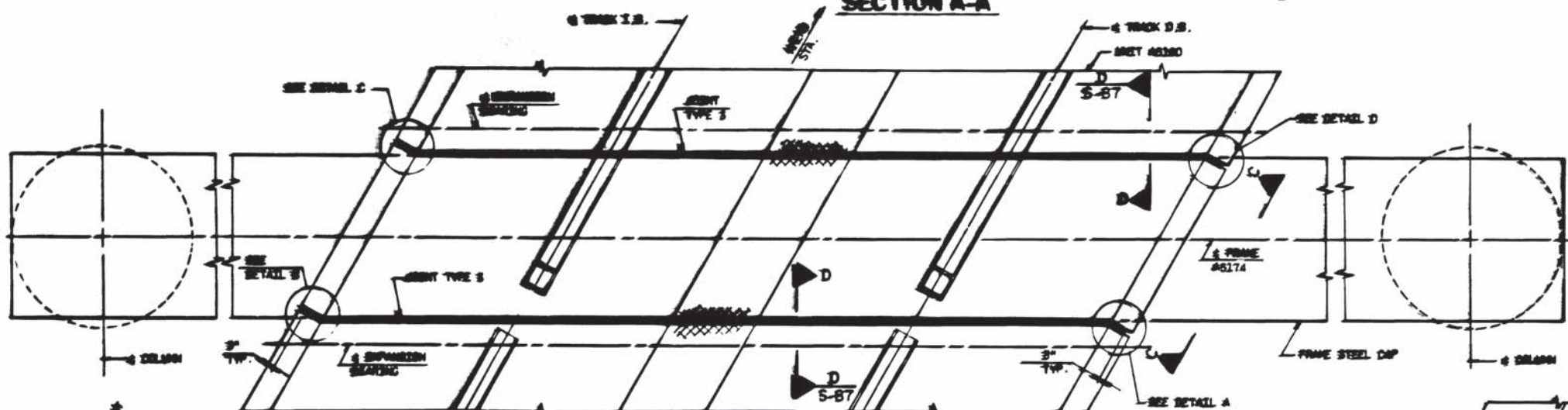
**PLAN**  
ABUT. A5162



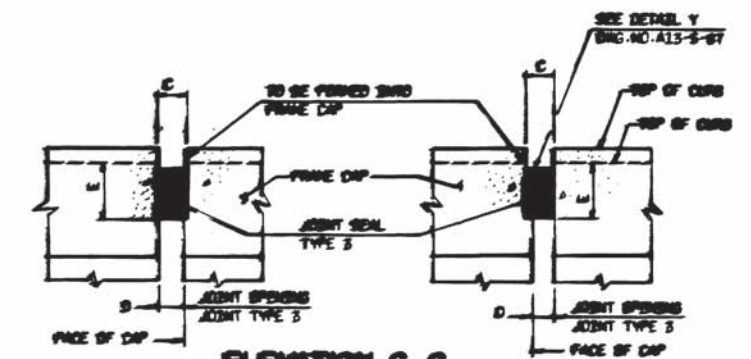
**SECTION B-B**



**SECTION A-A**



**PLAN**  
PIER A5174

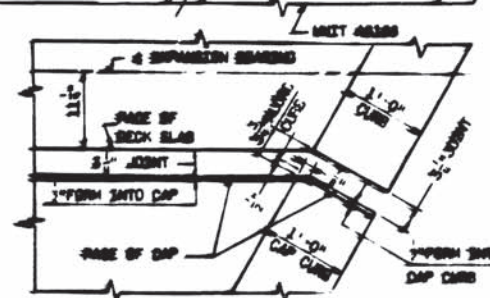


**ELEVATION C-C**

SEE JOINT SEAL SCHEDULE DRG. NO. A13-S-97 FOR DIMENSIONS C, D & E

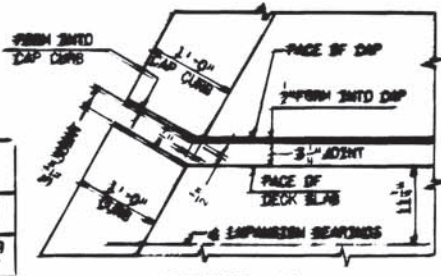


**DETAIL-C**

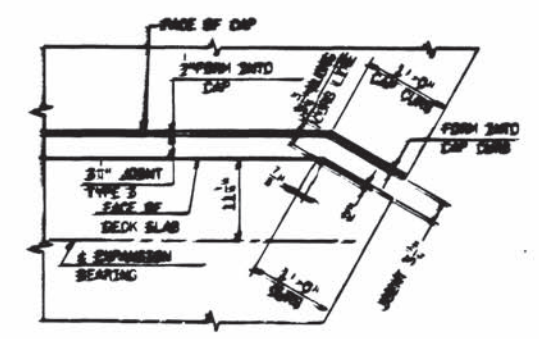


**DETAIL-D**

WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
**AS-BUILT CONDITION**  
DATE: JAN 08 1998



**DETAIL-B**



**DETAIL-A**

REVISION	DATE	BY	DESCRIPTION	NO.	OF	TOTAL
1	1/7/98	JLW	ISSUED FOR CONSTRUCTION	1	1	1
2	1/7/98	JLW	ISSUED FOR CONSTRUCTION	2	1	2
3	1/7/98	JLW	ISSUED FOR CONSTRUCTION	3	1	3
4	1/7/98	JLW	ISSUED FOR CONSTRUCTION	4	1	4

**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**SUCKERT-SOHN**  
CONSULTING ENGINEERS AND PLANNERS

BY: J. LEW. CATHY & COMPANY  
GENERAL ENGINEERING CONSULTANTS  
HARRY W. CATHY & ASSOCIATES  
GENERAL ARCHITECTURAL ENGINEERS

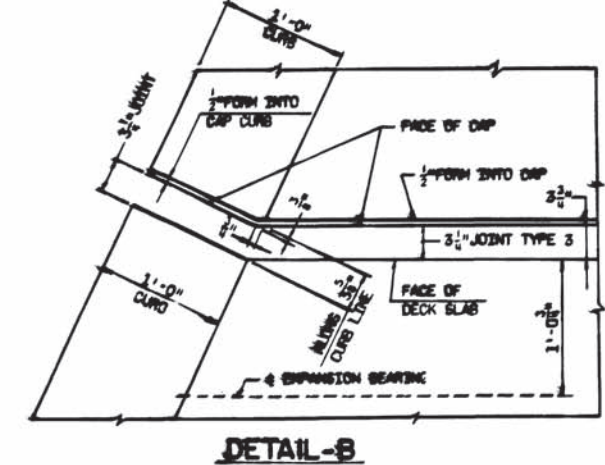
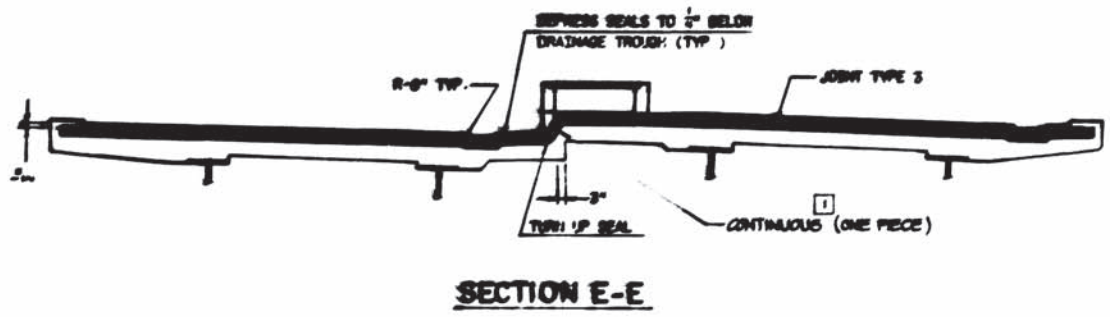
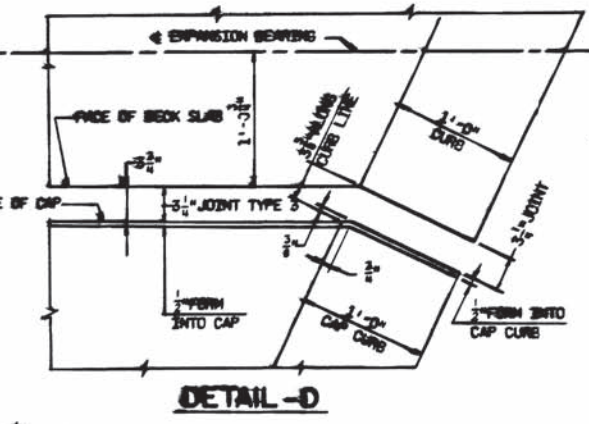
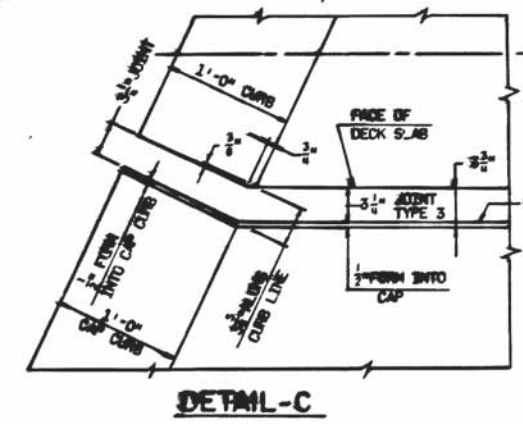
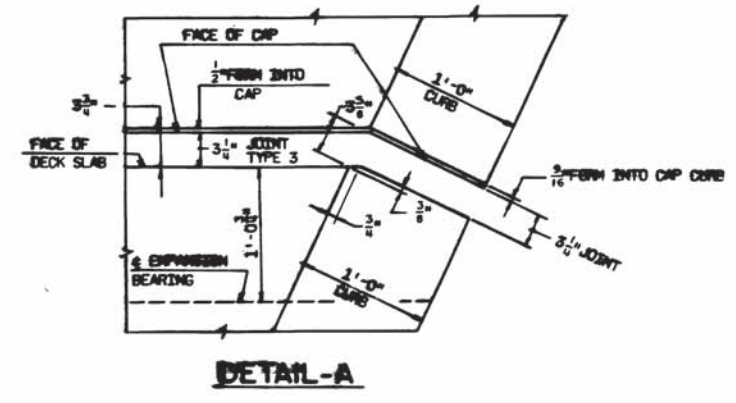
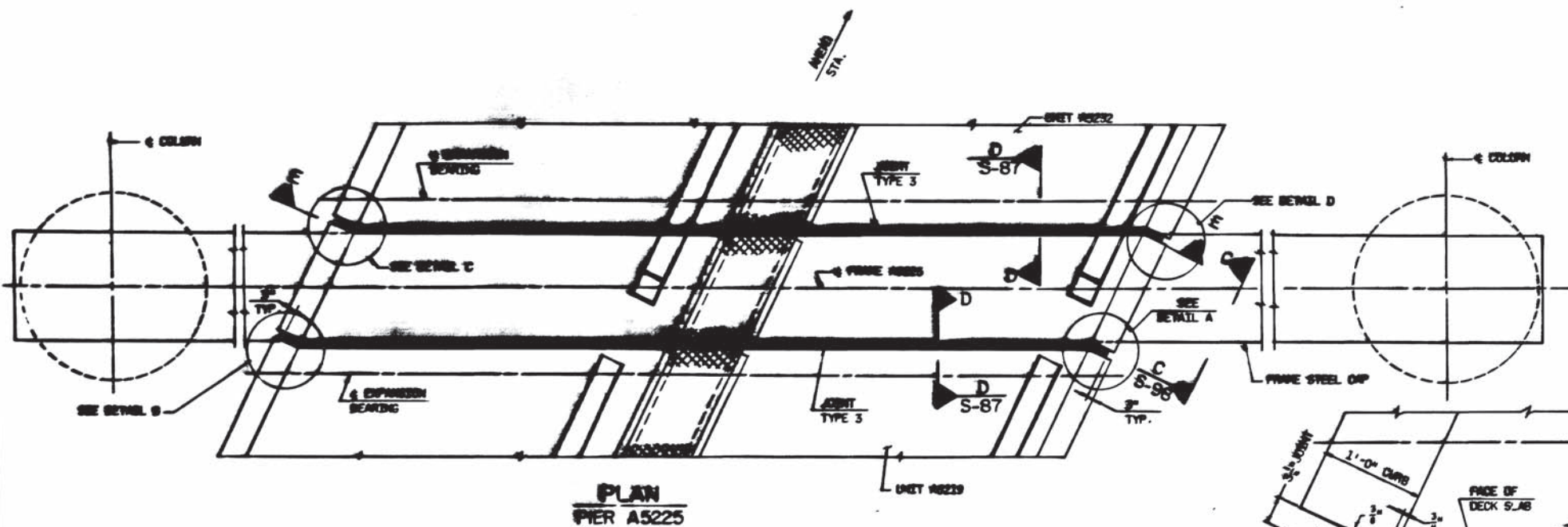
APPROVED: *[Signature]*

**ROCKVILLE ROUTE**  
AERIAL STRUCTURE  
DECK SLAB JOINT SEAL DETAILS

NO SCALE

DATE: 1/3-5-98

NO. 220-341



WASHINGTON METROPOLITAN  
AREA TRANSIT AUTHORITY  
**AS-BUILT CONDITION**  
DATE: 03/19/99

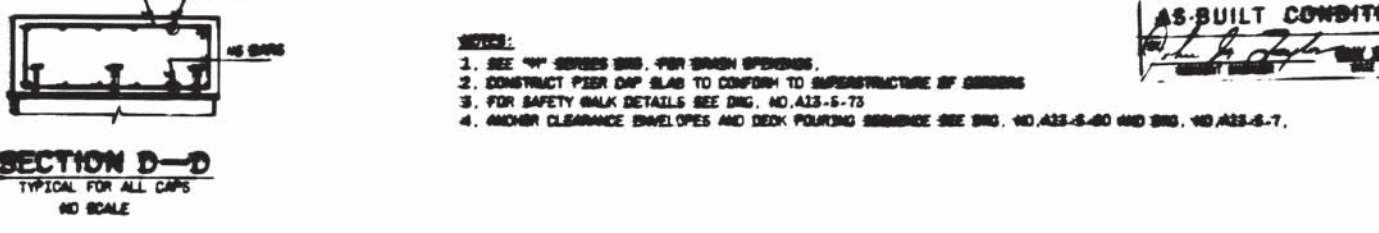
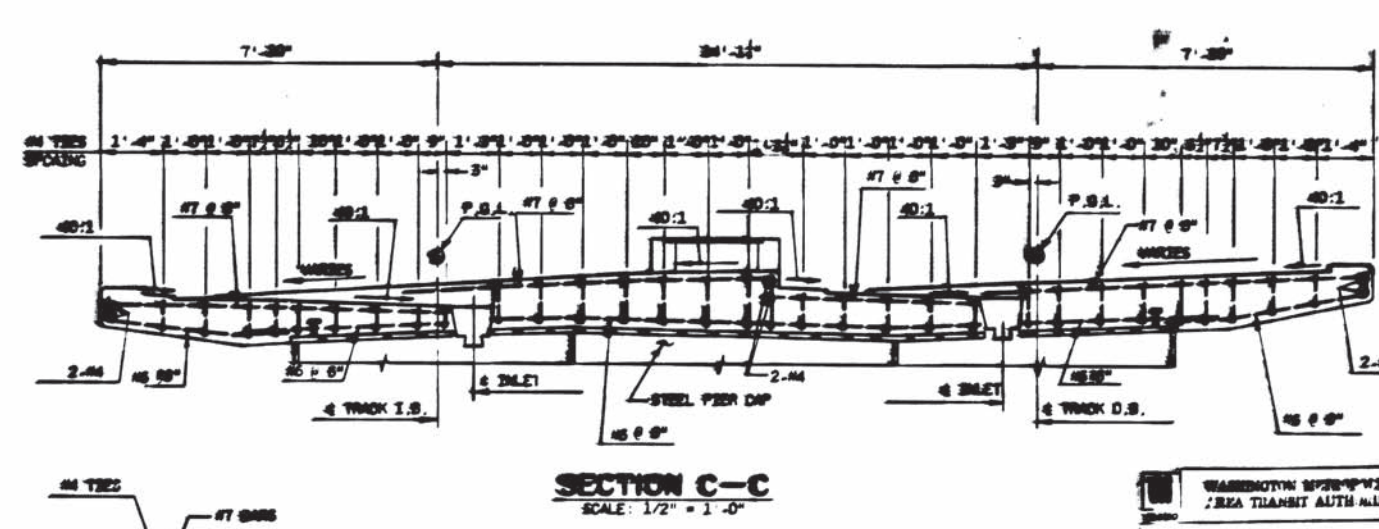
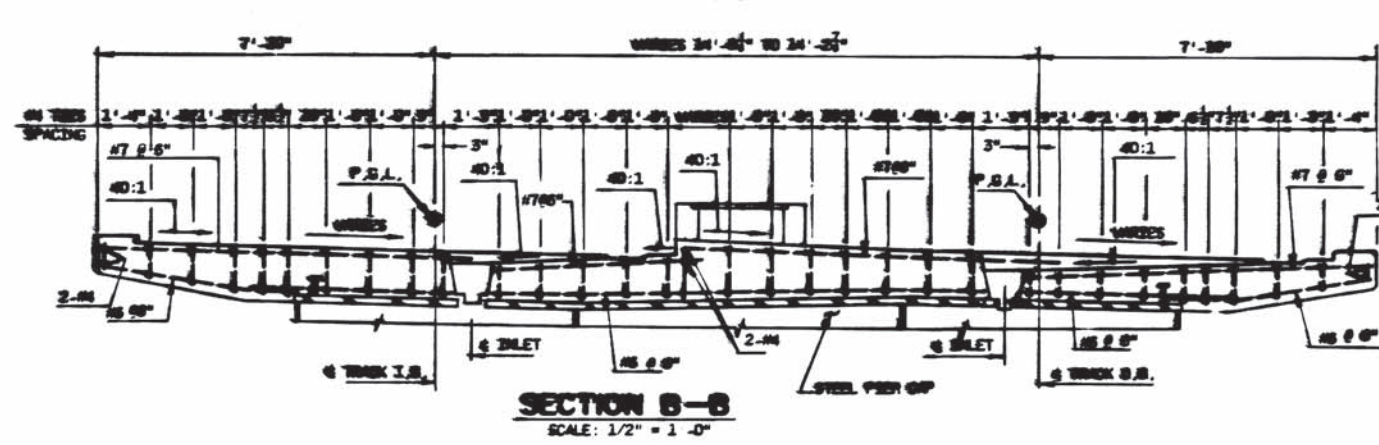
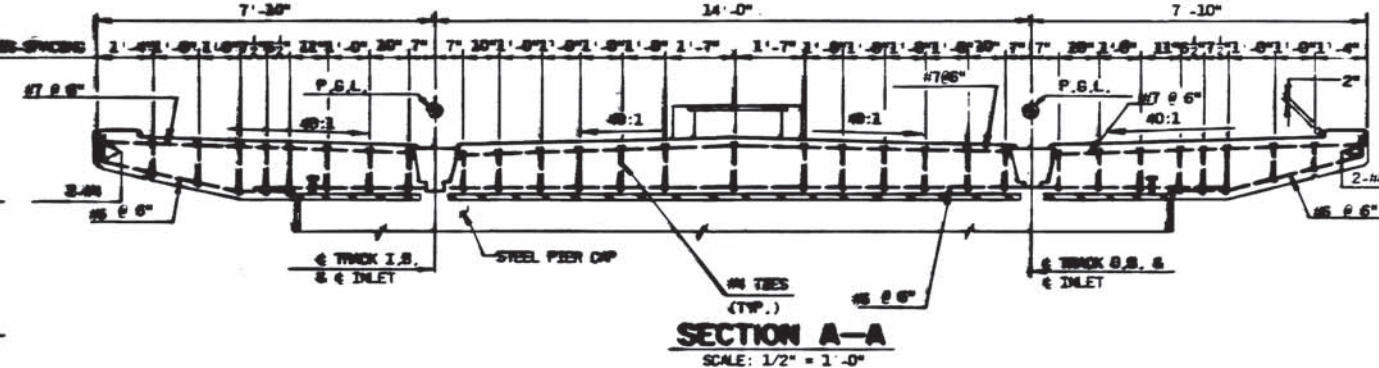
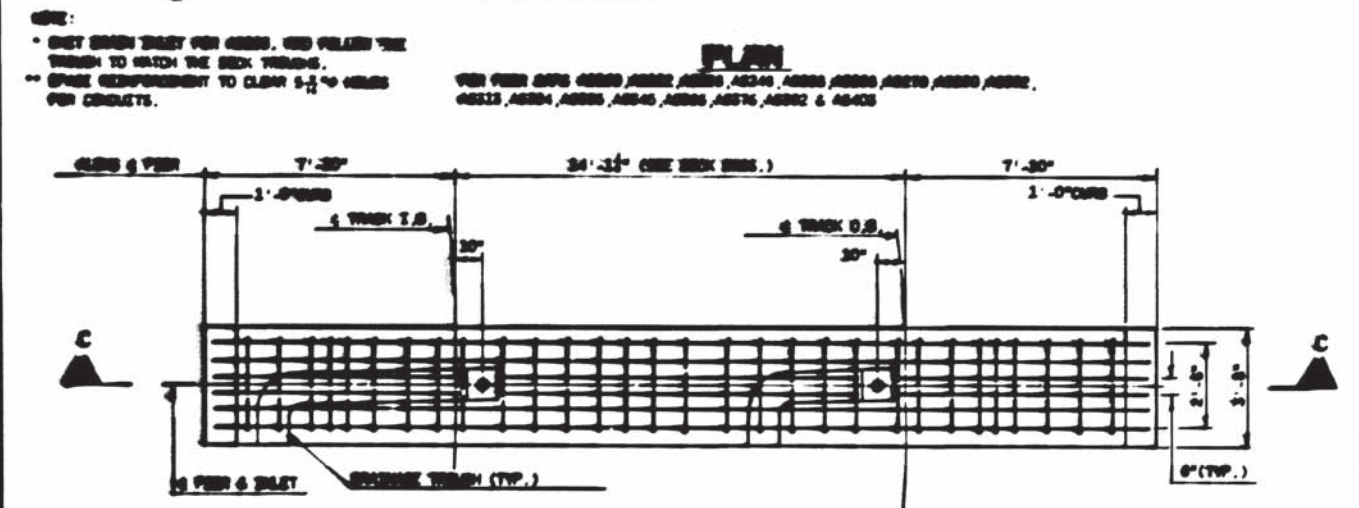
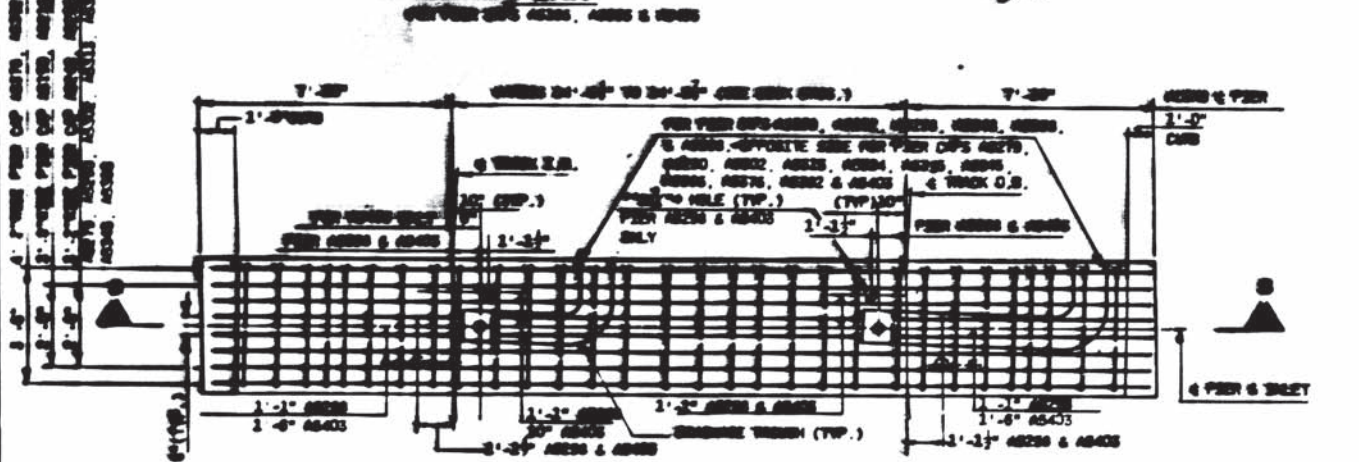
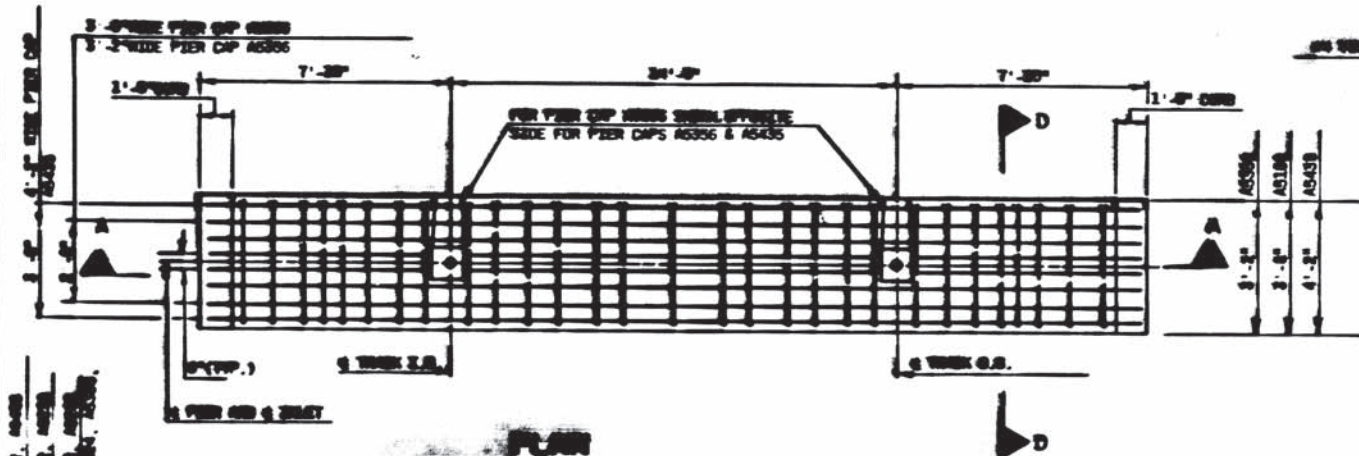
NO.	DATE	DESCRIPTION	BY	CHKD.
1	1/75	ISSUED FOR CONSTRUCTION		
2	1/75	ISSUED FOR CONSTRUCTION		
3	1/75	ISSUED FOR CONSTRUCTION		
4	1/75	ISSUED FOR CONSTRUCTION		



**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**  
SECTION DESIGNER  
**SUCHART-NORN**  
CONSULTING ENGINEERS AND PLANNERS  
APPROVED: [Signature]

**DE LEUW, CATHY & COMPANY**  
GENERAL ENGINEERING CONSULTANT  
**TERRY WHEE & ASSOCIATES**  
GENERAL ARCHITECTURAL CONSULTANT  
APPROVED: [Signature]

**ROCKVILLE ROUTE AERIAL STRUCTURE DECK SLAB JOINT SEAL DETAILS**  
SCALE: NO SCALE  
DRAWING NO: A13-8-101  
PROJECT NO: M220-342



**NOTE:**  
1. SET BRUSH BENT FOR GIRDERS, AND FILLER THE TRUSS TO MATCH THE DECK TRUSSING.  
2. SPACE REINFORCEMENT TO CLEAR 5/8" GIRDERS FOR CONCRETE.

- NOTE:**
1. SEE "M" SERIES BRG. FOR BRUSH SPACINGS.
  2. CONSTRUCT PIER CAP SLAB TO CONFORM TO SUPERSTRUCTURE OF GIRDERS.
  3. FOR SAFETY WALK DETAILS SEE BRG. NO. A13-S-73.
  4. ANCHOR CLEARANCE ENVELOPES AND DECK POURING SEQUENCE SEE BRG. NO. A13-S-60 AND BRG. NO. A13-S-7.

WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
**AS-BUILT CONDITION**

NO.	DATE	DESCRIPTION	BY	CHKD.
01	6/75	CONCEPT DRAWINGS		
02	6/75	CONCEPT DRAWINGS		
03	7/75	CONCEPT DRAWINGS		

**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

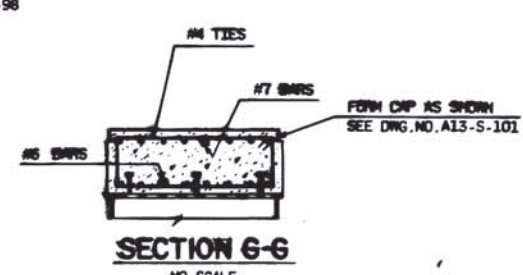
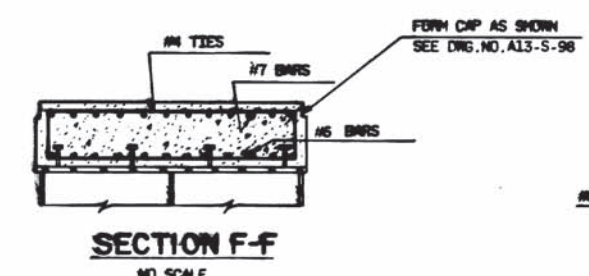
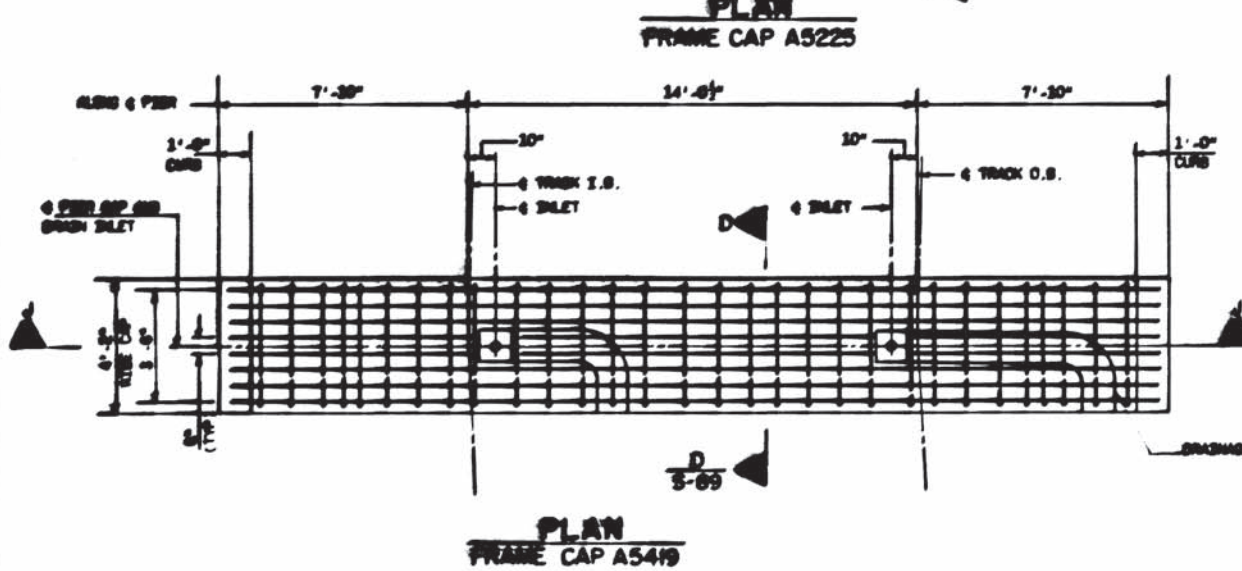
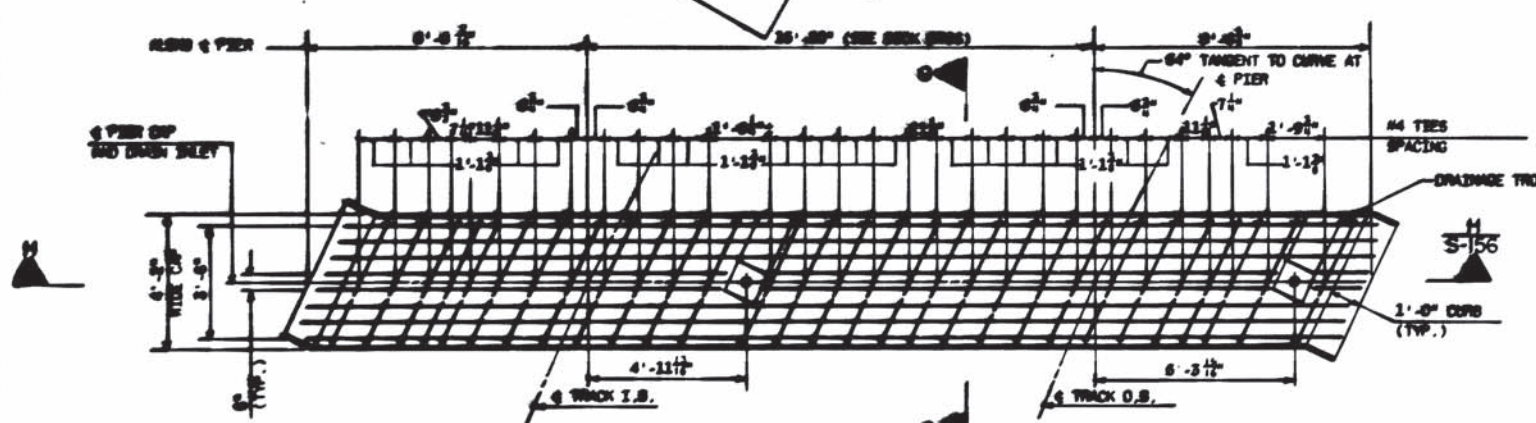
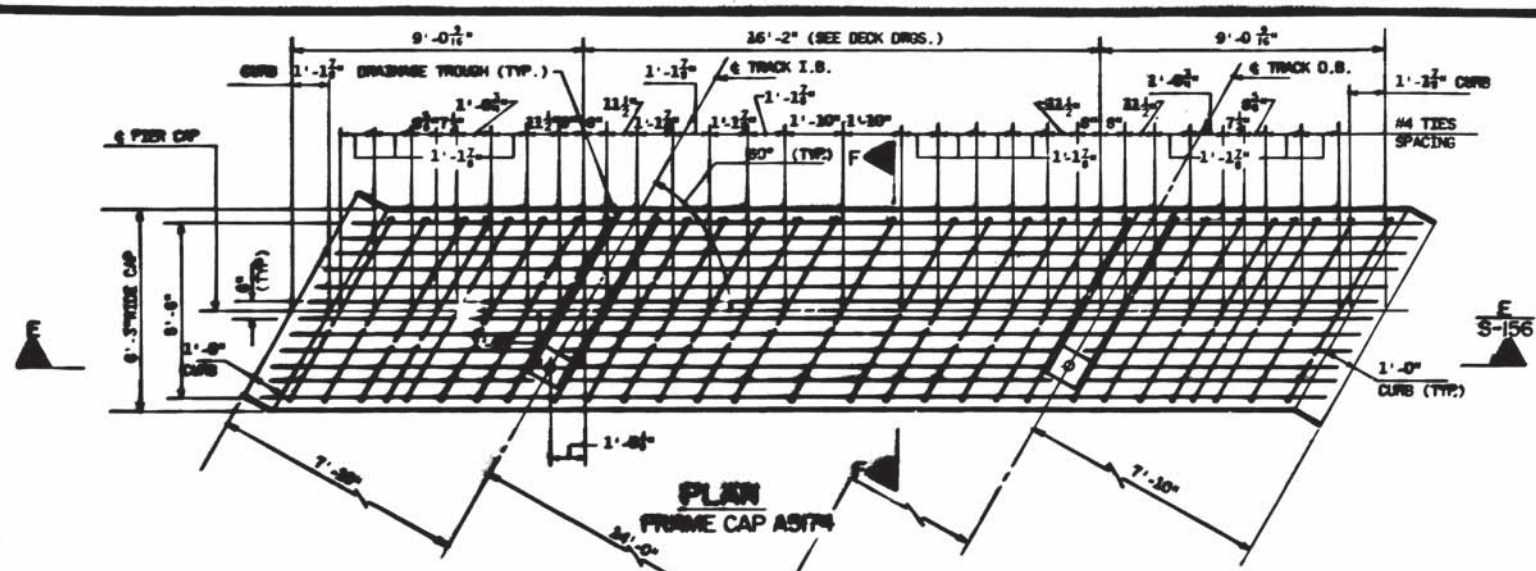
SECTION DESIGNER  
**BUCHART-HORN**  
CONSULTING ENGINEERS AND PLANNERS

BY LEWIS, OWEN & COMPANY  
GENERAL ENGINEERING CONSULTANTS  
VARRY GIBSON & ASSOCIATES  
GENERAL ARCHITECTURAL CONSULTANTS

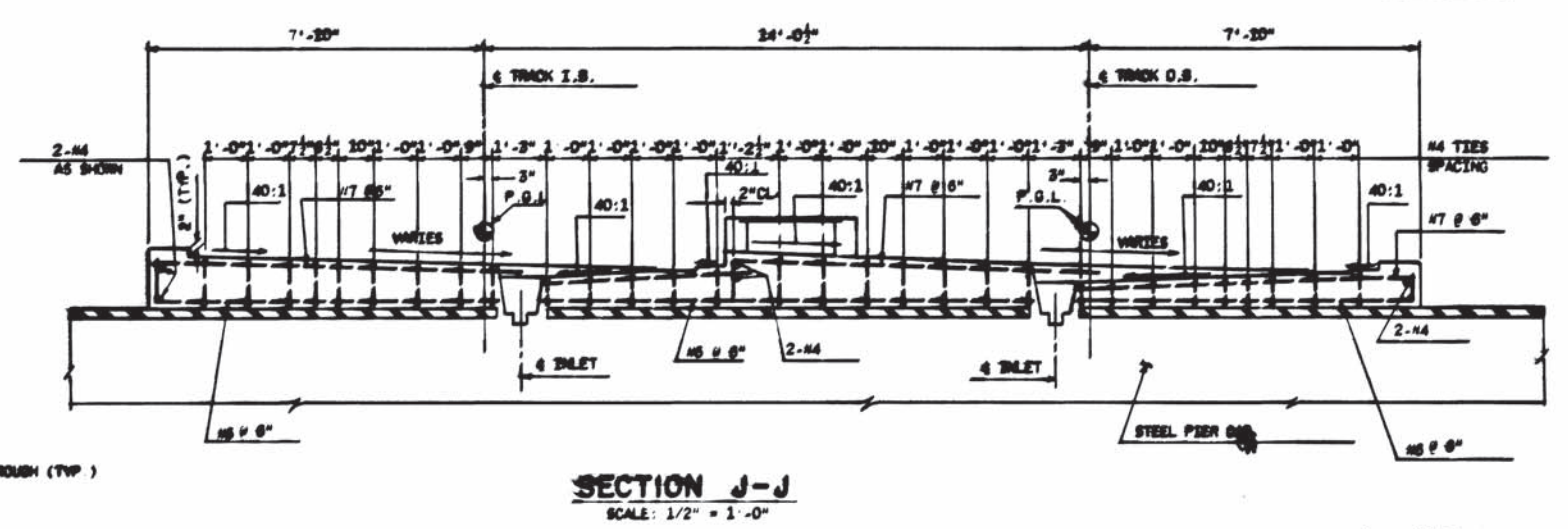
**ROCKVILLE ROUTE**  
AERIAL STRUCTURE  
SLAB DETAILS AT PIERS

SCALE: 1/2" = 1'-0"

NO. **A13-S-89** M220-343



- NOTES:**
1. SEE "M" SERIES DNG. FOR DRAIN OPENINGS
  2. CONSTRUCT PIER CAP SLAB TO CONFORM TO SUPERSTRUCTURE OF GINDERS
  3. FOR SAFETY WALK DETAILS SEE DNG. NO. A13-S-73
  4. ANCHOR CLEARANCE ENVELOPES AND DECK POURING SEQUENCE SEE DNG. NO. A13-S-80 AND DNG. NO. A13-S-7



WASHINGTON METROPOLITAN  
AREA TRANSIT AUTHORITY  
**AS-BUILT CONDITION**  
DATE: 03/09/99

REVISION	DATE	BY	DESCRIPTION
1	01/77		ISSUED FOR CONSTRUCTION
2	01/77		ISSUED FOR CONSTRUCTION
3	01/77		ISSUED FOR CONSTRUCTION
4	01/77		ISSUED FOR CONSTRUCTION
5	01/77		ISSUED FOR CONSTRUCTION

**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**SCHWARTZ-HORN**  
CONSULTING ENGINEERS AND PLANNERS

DE LEUW, CATHEN & COMPANY  
GENERAL ENGINEERING CONSULTANT

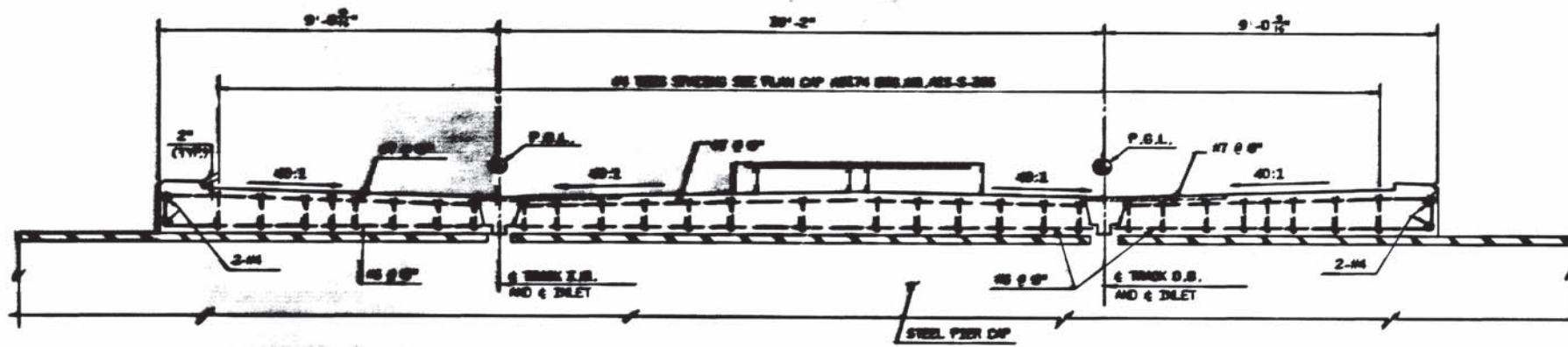
HARRY WELLS & ASSOCIATES  
GENERAL CONTRACTOR

APPROVED: *[Signature]*

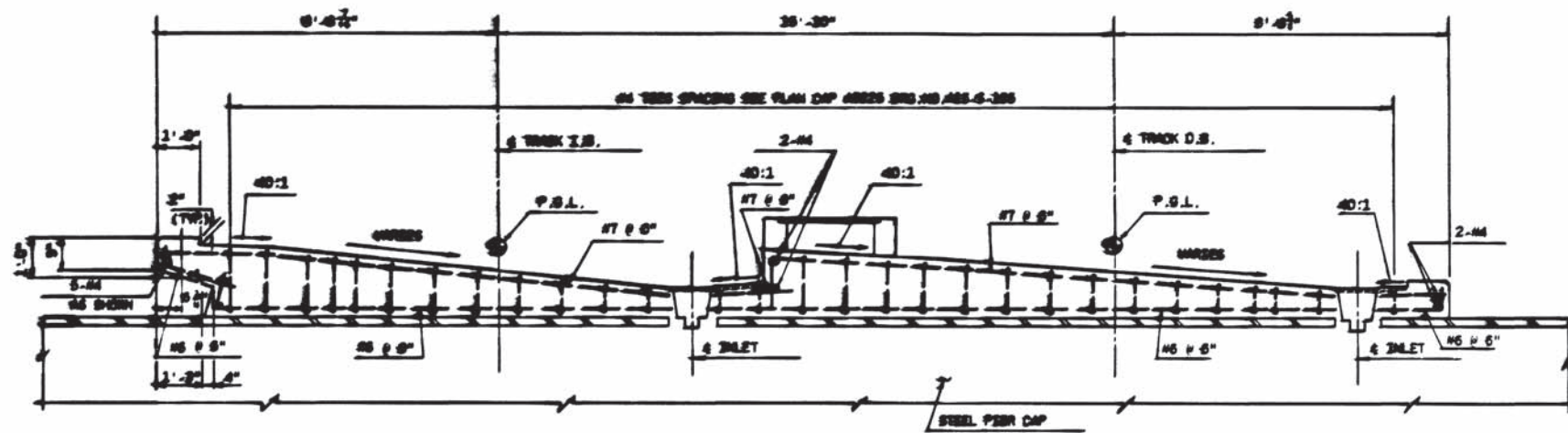
**ROCKVILLE ROUTE**  
AERIAL STRUCTURE  
SLAB DETAILS AT PIERS

SCALE: 1/8" = 1'-0" AND AS NOTED

DRAWING NO. **A13-S-155** N220-344



**SECTION E-E**  
S-155



**SECTION H-H**  
S-155

**NOTES:**

1. SEE "W" SPICES ENG. FOR BRASH SPICES
2. CONSTRUCT PIER DAP SLAB TO CONFORM TO SUPERSTRUCTURE OF GENDERS
3. FOR SAFETY WALK DETAILS SEE ENG. NO. A13-S-74 AND A13-S-75
4. UNDER CLEARANCE SHELFES AND BRK. PILING SEQUENCE SEE ENG. NO. A13-S-80 AND A13-S-7

WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY

**AS-BUILT CONDITION**

*John H. [Signature]* 03/19/82

DATE	BY	DESCRIPTION	DATE	BY	DESCRIPTION
07/75	J.C.M.	ISSUED			
07/75	J.C.M.	REVISED			
7/75	J.C.M.	REVISED			



**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

**BUCHART-SOHN**  
CONSULTING ENGINEERS AND PLANNERS

SE. LEWIS, CATHER & COMPANY  
GENERAL ENGINEERING CONSULTANT

GARRY WENZEL & ASSOCIATES  
GENERAL ARCHITECTURAL CONSULTANT

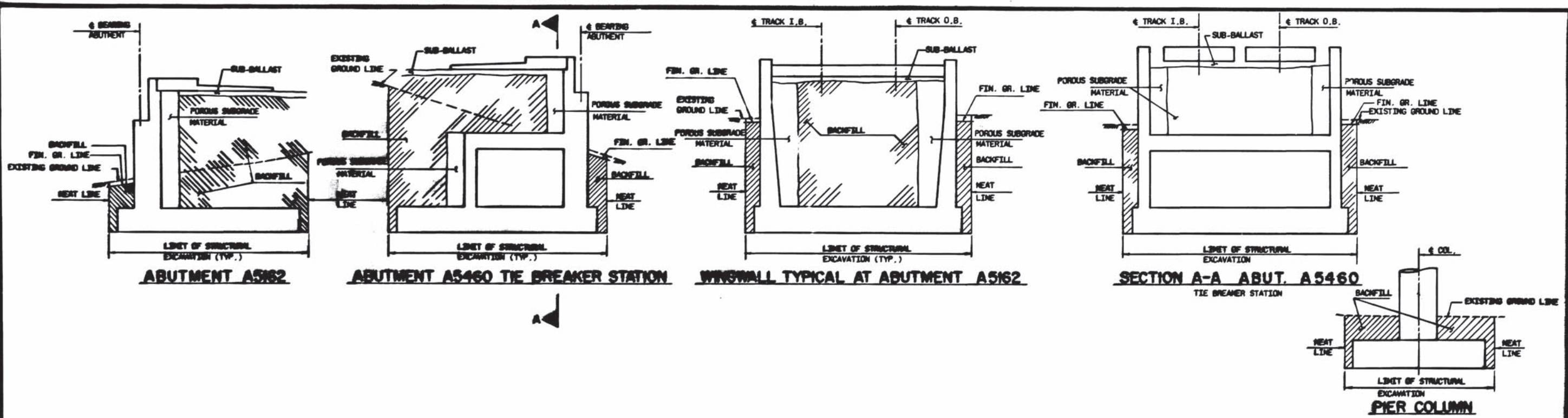
DATE: *Jul 2, 1982*

**ROCKVILLE ROUTE**  
**AERIAL STRUCTURE**  
**SLAB DETAILS AT PIERS**

SCALE: 1" = 1'-0" AND AS NOTED

PROJECT NO. **A13-S-155**

DWG. NO. **M220-345**



- NOTES:
1. ALL STRUCTURAL EXCAVATION TO BE TO BOTTOM OF FOOTING AND 1'-0" ON EACH SIDE UNLESS OTHERWISE NOTED.
  2. FOR FOOTING SIZES, COLUMN DIMENSIONS, ABUTMENT WINGWALLS, OVERPASS WINGWALLS, SUB-STATION SEE RELATED DRAWINGS.
  3. FIRST TWO FEET OF THE BACKFILL MATERIAL IN ALL SENS SHALL BE PLACED WITHOUT ANY MECHANICAL COMPACTION THE REMAINDER OF FILL SHALL BE PLACED AS SPECIFIED IN SPECIFICATION SECTION 204, 3.5.
  4. NO HEAVY EQUIPMENT SHOULD BE ALLOWED TO GO WITHIN 5 FEET OF WALLS.

WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
 AS-BUILT CONDITION  
 DATE 03/07/08

DESIGNED	J.P. LEE	5/75
DRAWN	J. PERDUE	5/75
CHECKED	A. ALLEN	7/75
APPROVED	<i>[Signature]</i>	8/75

REFERENCE DRAWINGS		REVISIONS	
NUMBER	DESCRIPTION	DATE	BY



**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER  
**BUCHART-HORN**  
 CONSULTING ENGINEERS AND PLANNERS

DE LEUW, CATHNER & COMPANY  
 GENERAL ENGINEERING CONSULTANT

MARRY WEBER & ASSOCIATES  
 GENERAL ARCHITECTURAL CONSULTANT

DATE: 03/07/08

**ROCKVILLE ROUTE**  
 AERIAL STRUCTURE  
 LIMITS OF PAYMENT  
 TYPICAL EXCAVATION AND BACKFILL DIAGRAMS

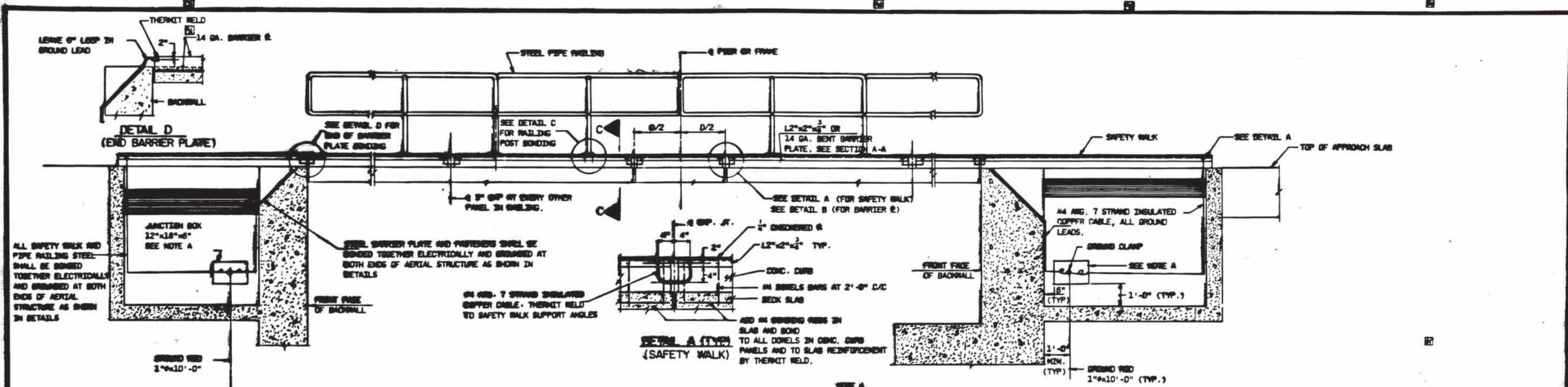
SCALE: 1/2" = 1'-0"

REVISION NO. 10 2 4 6 8 10

WORKSHEET NO. **A13-S-162**

PROJECT NO. **M220-346**

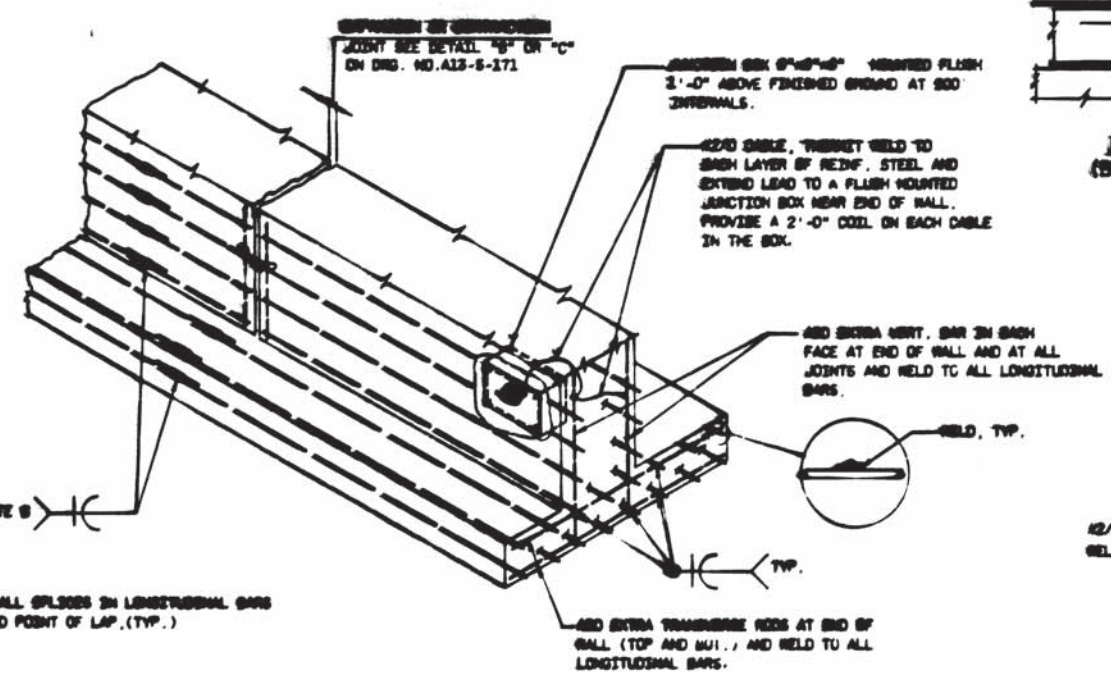




**SAFETY WALK & CABLE TROUGH BONDING**  
SCALE: 1/2" = 1'-0"

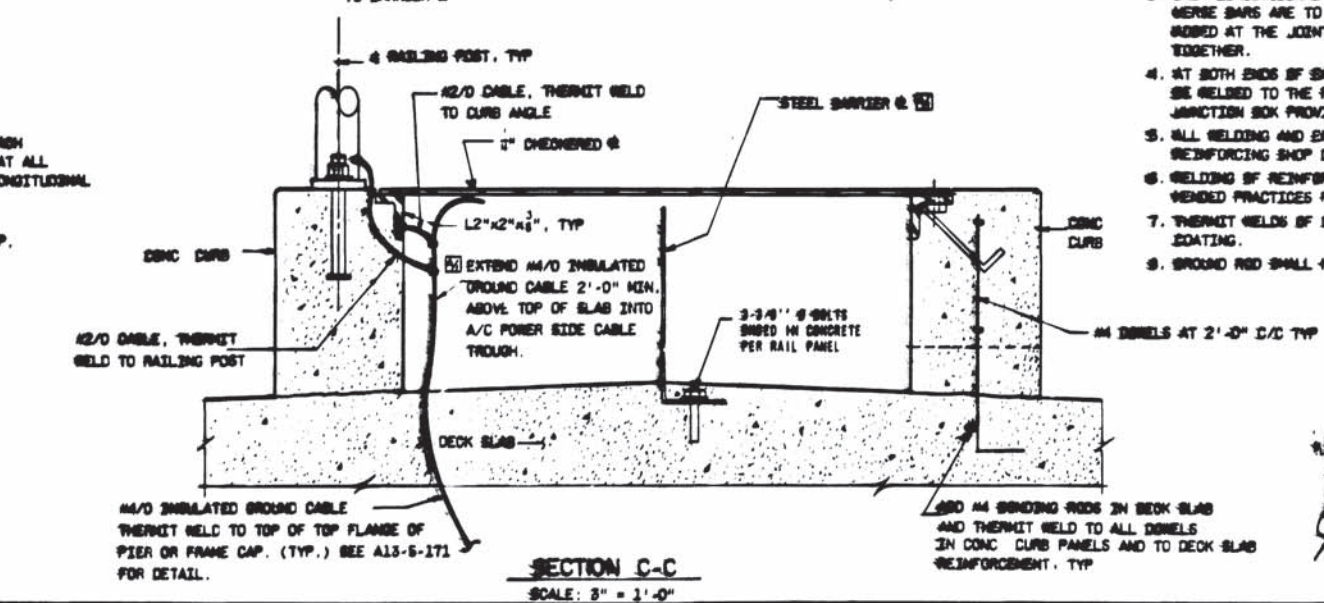
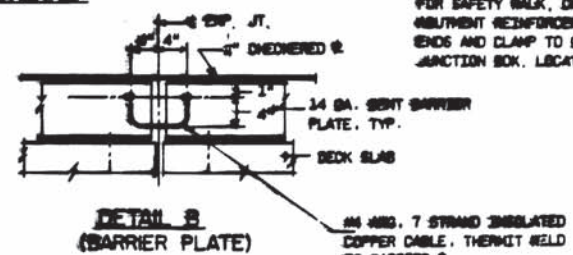
**NOTE A**  
PROVIDE A 20'-0"± COIL IN BONDING LEADS IN CABLE PIT FOR SAFETY WALK, CABLE TROUGH, DECK REINFORCEMENT STEEL, ABUTMENT REINFORCEMENT STEEL AND GORNER STEEL. SPLICE CABLE ENDS AND CLAMP TO GROUND ROD IN FLUSH MOUNTED 12"x18"x6" JUNCTION BOX. LOCATE BOX ON SIDE WALL TO CLEAR ALL DUCTS.

- NOTES FOR CONSTRUCTION CONTROL BONDING**
1. THE PURPOSE OF BONDING IS TO TIE TOGETHER BELOW-GRADE REINFORCING STEEL AND STEEL PILING ADJACENT TO THE METRO TRACKS SO AS TO PROVIDE ELECTRICAL CONTINUITY, AND THEREBY REDUCE CORROSION EFFECTS RESULTING FROM STRAY CURRENTS.
  2. UNLESS OTHERWISE INDICATED ON THE DRAWINGS, REINFORCING IN WALL, RETAINING WALLS, FOOTINGS, ABUTMENTS AND OTHER WALLS SHALL BE BONDING IN THE MANNER SHOWN IN DETAIL ON THIS DRAWING. ALL CONTIGUOUS COMPONENTS THAT ARE SO MARKED SHALL BE BONDING TOGETHER, EITHER BY DIRECT WELDING OF LAPPED REINFORCING STEEL AT CONSTRUCTION JOINTS OR AS PER DETAIL "B" OR "C" AT EXPANSION AND CONTRACTION JOINTS.
  3. ONLY LONGITUDINAL REINFORCING BARS MUST BE FULLY BONDED. TRANSVERSE BARS ARE TO BE BONDED ONLY IN THE CASE OF THE EXTRA BARS ADDED AT THE JOINTS TO ELECTRICALLY TIE THE LONGITUDINAL BARS TOGETHER.
  4. AT BOTH ENDS OF EACH RUN OF WALL OR FOOTING, 4-#6'S CABLE SHALL BE WELDED TO THE REINFORCING STEEL AND EXTENDED TO A FLUSH MOUNTED JUNCTION BOX PROVIDED AT 50' INTERVALS AND EACH END OF THE WALL.
  5. ALL WELDING AND EXTRA STEEL FOR BONDING SHALL BE SHOWN IN THE REINFORCING SHOP DRAWINGS.
  6. WELDING OF REINFORCEMENT SHALL CONFORM TO A.A.S.D. 22.1 "RECOMMENDED PRACTICES FOR WELDING REINFORCING STEEL."
  7. THERMIT WELDS OF CABLES TO PILES SHALL BE PAINTED WITH COAL TAR COATING.
  8. GROUND ROD SHALL HAVE NOT MORE THAN 2 OHMS RESISTANCE TO GROUND.



**NOTE B**  
WELD ALL SPLICES IN LONGITUDINAL BARS AT MID POINT OF LAP. (TYP.)

**TYPICAL BONDING METHOD**  
APPLICABLE FOR ABUTMENTS, WING WALLS, RETAINING WALLS  
NO SCALE



**SECTION C-C**  
SCALE: 3\"/>

WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
AS-BUILT CONDITION  
DATE: 11/15/76

REVISIONS	DATE	BY	DESCRIPTION
1	1-19-76	S.P.	REVISED 1\"/>
2	1-19-76	S.P.	ADD #4 INSULATED BONDING CABLE FROM TOP OF TOP FIB. OF PIER CAP
3	1-19-76	C.A.	DELETE DETAIL

**WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY**

SECTION DESIGNER: **BUCHART-HORN**  
CONSULTING ENGINEERS AND PLANNERS

GENERAL ENGINEERING CONSULTANT: **DE LEJAY, CATHY & COMPANY**

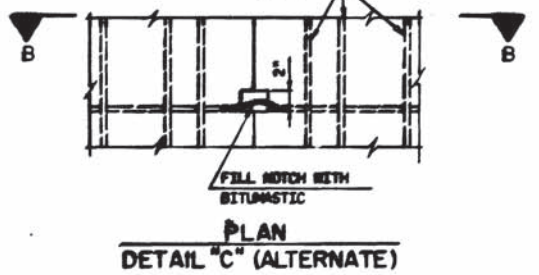
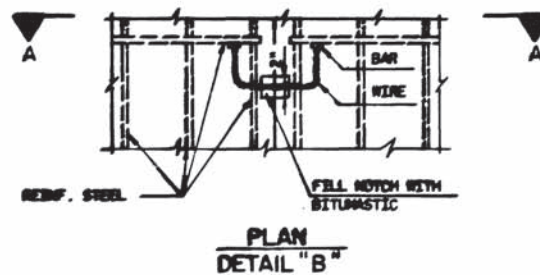
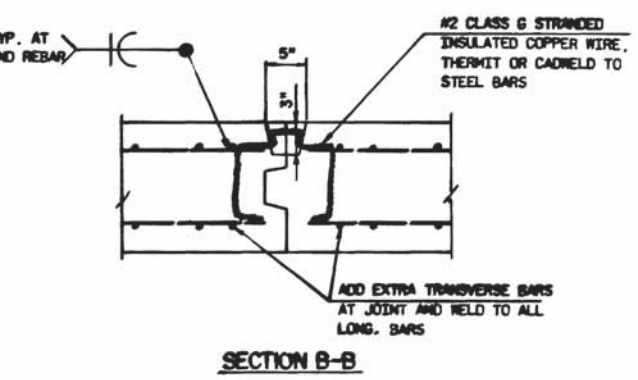
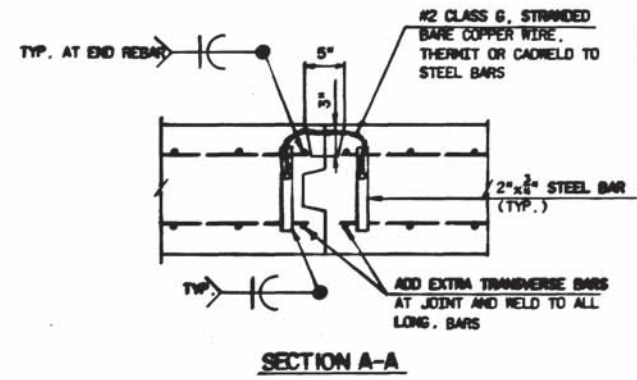
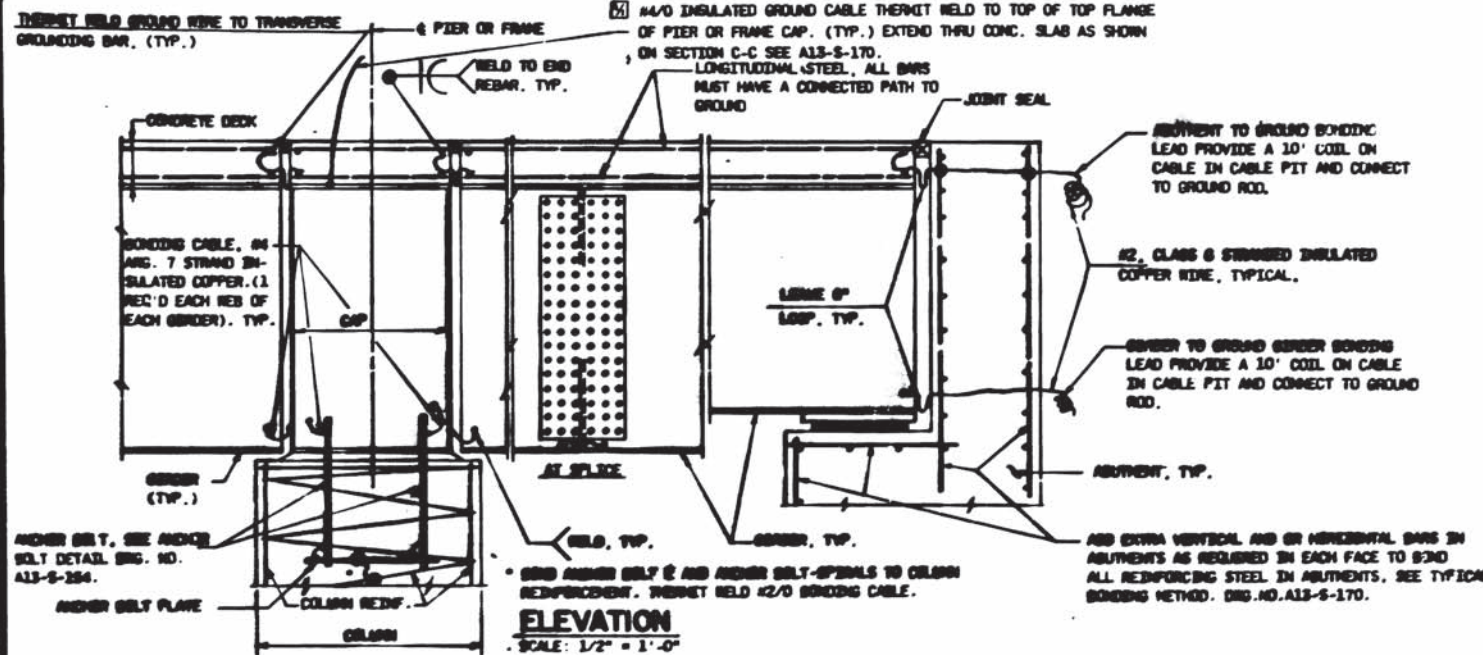
GENERAL ARCHITECTURAL CONSULTANT: **HARRY WERBE & ASSOCIATES**

APPROVED: *[Signature]*

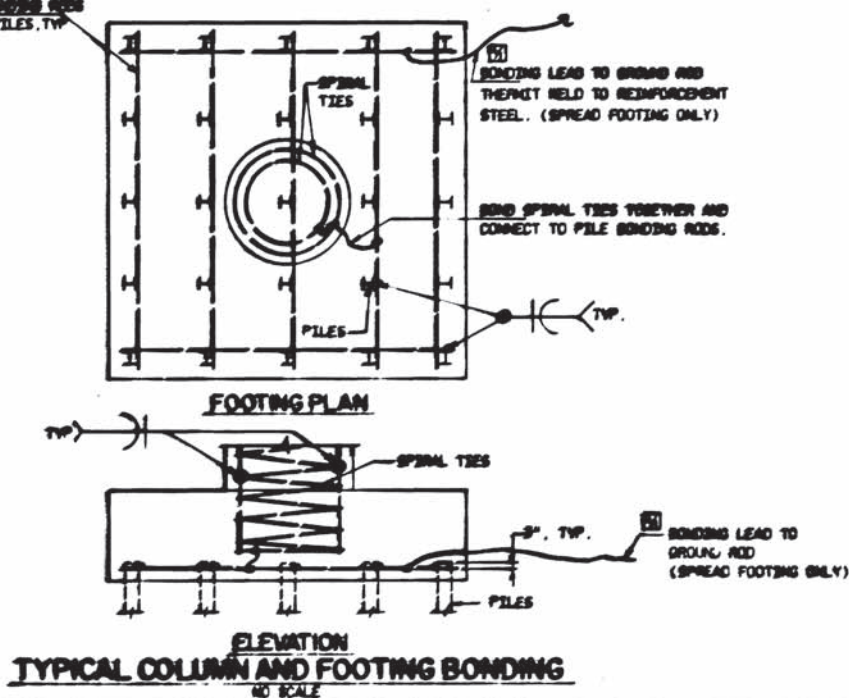
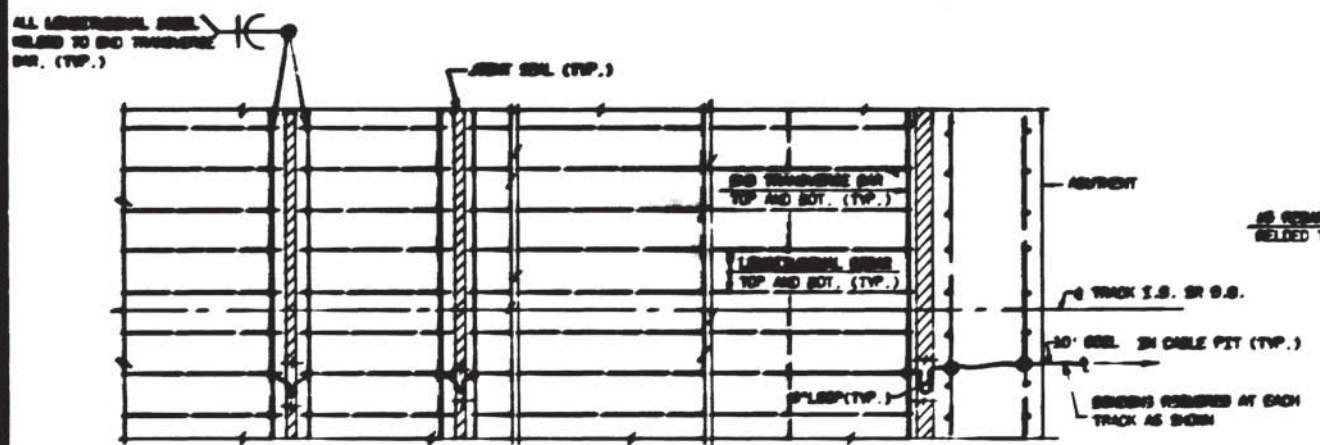
**ROCKVILLE ROUTE**  
AERIAL STRUCTURE  
TYPICAL BONDING DETAILS

SCALE: 1/2" = 1'-0" AND AS NOTED

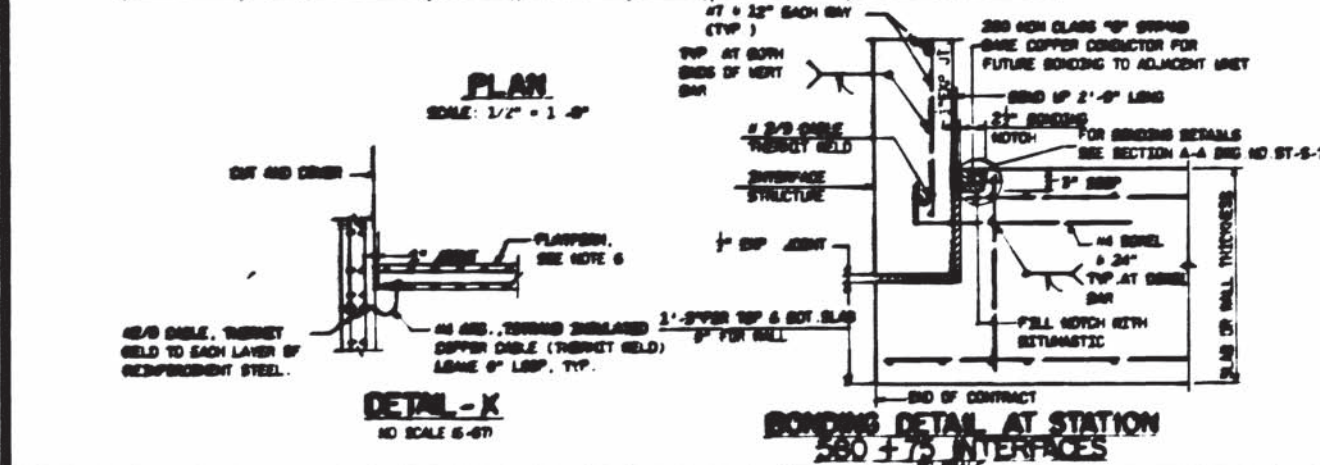
PROJECT NO: **A3-S-170**  
DRAWING NO: **M220-347**



TYPICAL BONDING DETAILS FOR JOINTS  
NOT TO SCALE



- NOTE:
- UNLESS OTHERWISE NOTED, ALL LONGITUDINAL REINFORCING STEEL IN THE DECK AND TOP SLAB ON GANDE SHALL BE BONDED AS SHOWN, AND GROUNDED AT EACH END OF STRUCTURE.
  - ALL GROUND STEEL, PIER CAPS AND/OR FRAME CAPS, SHALL BE BONDED AS SHOWN, AND GROUNDED AT EACH END OF STRUCTURE.
  - COLUMN SPIRAL TIES AND PIER OR FRAME FOOTING PILES SHALL BE BONDED AS SHOWN AND GROUNDED.
  - ELECTRICAL BOND ANCHOR BOLTS AND ANCHOR PLATES TO COLUMN REINFORCING STEEL, SEE ELEVATION THIS SHEET.
  - ELECTRICAL BONDING DETAILS FOR BEARINGS, IN FRAMES AND ABUTMENTS, ARE SHOWN ON DWGS. NO. A13-S-113, A13-S-192, A13-S-193. BONDING CABLE SHALL BE #4 ANG. 7 STRAND INSULATED COPPER CABLE. ANCHOR BOLTS TO BE BONDED TO COLUMN REINFORCEMENT.
  - ELECTRICAL BONDING, PLATFORM TO CUT AND COVER INVERTFACE, STA. 568+72. THERMIT WELD TWO #4 ANG. 7 STRAND INSULATED COPPER CABLES TO REINFORCEMENT STEEL IN PLATFORM AND IN CUT AND COVER SECTION AS SHOWN IN DETAIL THIS SHEET. SEE ALSO PLAN DWG. NO. A13-S-C7.



WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
AS-BUILT CONDITION  
DATE: 02 1978  
SCALE: 1/2\" = 1'-0\"

REVISION	DATE	DESCRIPTION	BY	CHKD
1	6/75	ISSUED		
2	6/75	ST-S-7 ELECTRICAL BONDING DETAILS		
3	7/75	A13-S-170 TYPICAL BONDING DETAILS		
4	7/75			
5	7/75			

WASHINGTON METROPOLITAN AREA TRANSIT AUTHORITY  
SECTION DESIGNER  
**BUCHART-NORN**  
CONSULTING ENGINEERS AND PLANNERS  
RE: LEWIS, CARVER & COMPANY  
GENERAL ENGINEERING CONSULTANT  
HARRY WENKE & ASSOCIATES  
GENERAL ARCHITECTURAL CONSULTANT

ROCKVILLE ROUTE  
AERIAL STRUCTURE  
TYPICAL BONDING DETAILS  
SCALE: 1/2\" = 1'-0\"  
DATE: 02 1978  
NO. A13-S-171 M220-348