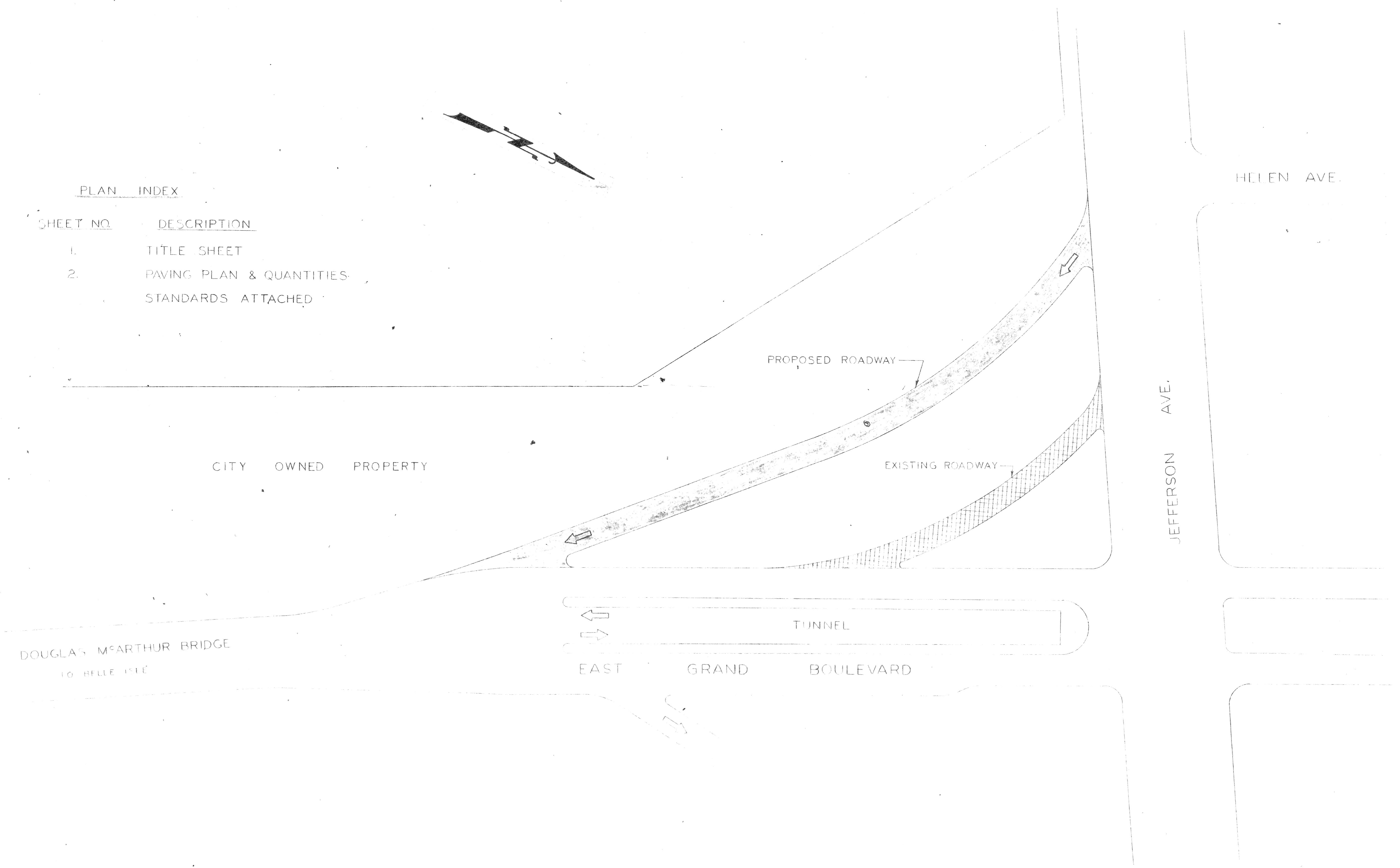
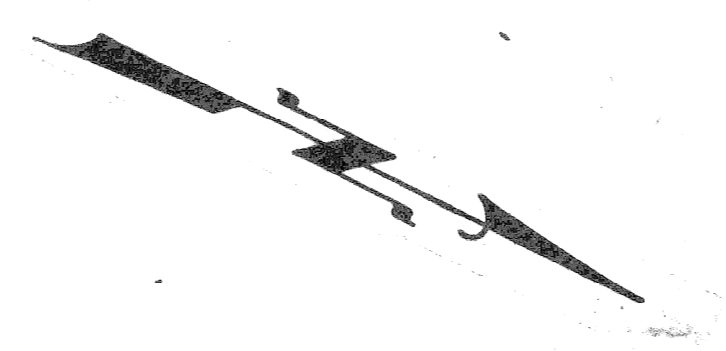


PLAN INDEX

SHEET NO.	DESCRIPTION
1.	TITLE SHEET
2.	PAVING PLAN & QUANTITIES STANDARDS ATTACHED



REVISIONS LOCATED BY COORDINATES ON SHEET		DESIGNED BY DRAWN BY CHECKED BY	APPROVED ENGINEER OF STREETS CITY ENGINEER	<b>CITY OF DETROIT</b> DEPARTMENT OF PUBLIC WORKS CITY ENGINEERS OFFICE 100	DIVISION OF PUBLIC WORKS GRAND TRUNK & BELLE ISLE URBAN DESIGN & CONSTRUCTION PROJECT MICH 89	SHEET 1 OF 2 SHEETS CONTRACT No. PP 207 DRWG No. DATE JAN 21 1989
---	--	---------------------------------------	--	--	---	--

QUANTITIES			
NO.	DESCRIPTION OF ITEM	UNIT	QUANTITY
1	EXCAVATION	CYDS	1052
2	STREET SEADING	SYDS	601
3	STREET PAVEMENT REMOVAL	SYDS	564
4	SIDEWALK REMOVAL	SFT	8337
5	FENCE REMOVAL (INCL. FOUNDATION)	LFT	120
6	CURB REMOVAL	LFT	187
7	MANHOLE, DROP	EACH	1
8	MANHOLE ADJUSTMENT	EACH	3
9	MANHOLE RECONSTRUCT EDGE	EACH	1
10	MANHOLE, STANDARD NEW	EACH	1
11	CATCH BASIN, STANDARD NEW	EACH	2
12	CATCH BASIN ABANDONMENT	EACH	2
13	SEWER-12" PIPE	LFT	300
14	SEWER-6" PERFORATED PIPE	LFT	40
15	PAVING-9" UNIF REINF+INT CURB	SYDS	1177
16	PAVING-9" UNIF REINF+INT CURB	SYDS	216
17	STRIP & ADJUST ASPHALT	SYDS	63
18	SEPARATE TYPE CURB	LFT	172
19	TEST COBES	EACH	2
20	SIDEWALK, STD. 4"	SFT	10,405
21	FILL, GRADE A	CYDS	127
22	FILL, SEA	CYDS	275
23	FOUNDATION REMOVAL	CYDS	5
24	MAINTAIN TRAFFIC	LUMP SUM	
25	P.L.C. MANHOLE OR MANHOLE ADJ.	EACH	1

**BENCH MARKS**

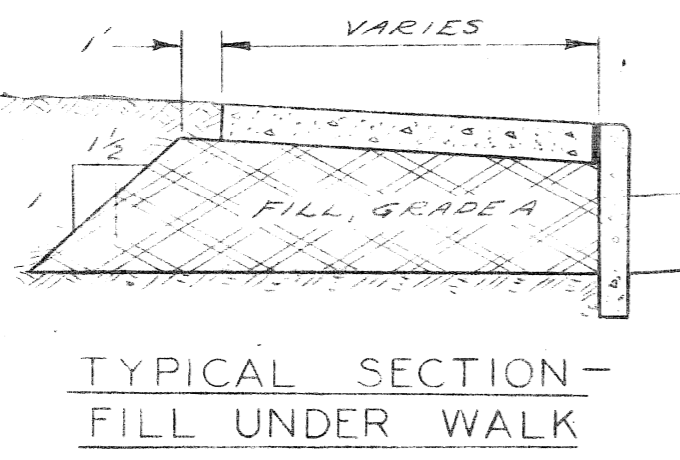
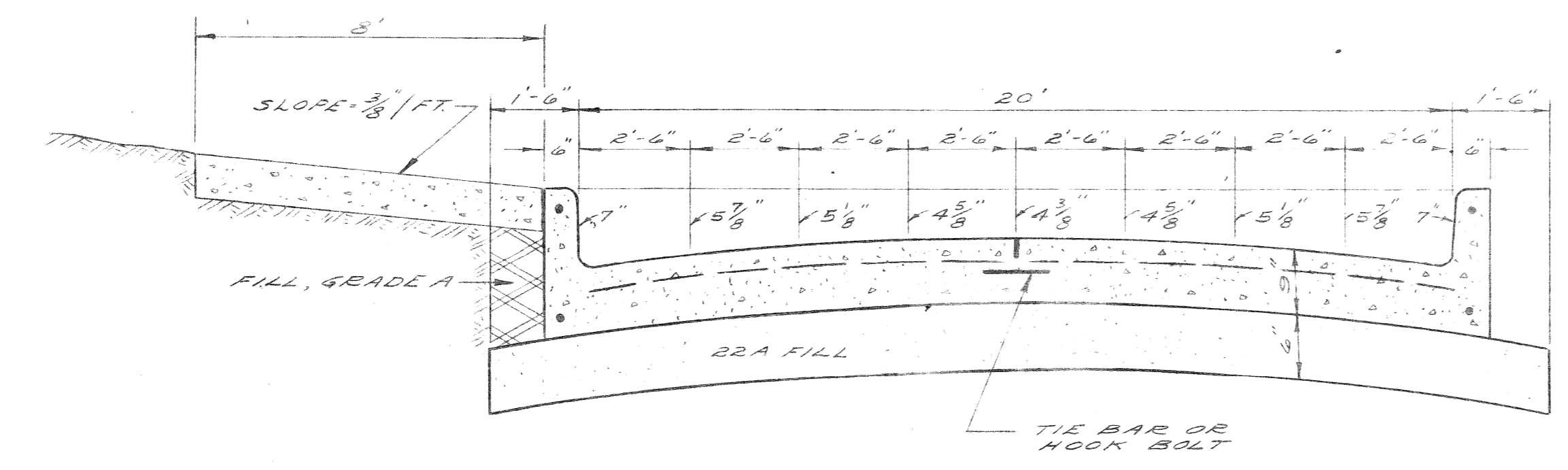
P.B.M. 46-253A NE COR. JEFFERSON & GRAND 11723.8  
 P.B.M. 46-253 N.E. COR. JEFFERSON & GRAND BLVD. 11704.5  
 G.C.M. ON HYD 264.5' E OF P.C.I. 121.41

FOR FIELD NOTES SEE LL 46-D-2 DATED 12-10-67

**LEGEND**

	STREET PAVEMENT REMOVAL (INCL. CURB)
	WALK REMOVAL
	CURB REMOVAL
	SIDEWALK STD. 4"
	SEPARATE TYPE CURB
	PAVING 10" UNIF REINFORCED CONC.
	STRIP & ADJUST ASPHALT

**NOTE:**  
 ADD 10.00 TO ALL  
 PAVT ELEVATIONS

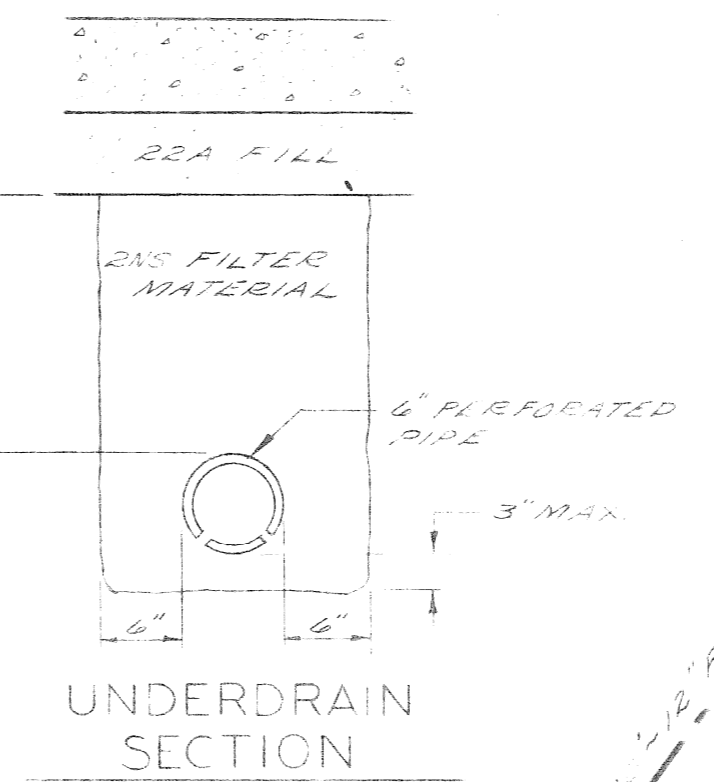


TYPICAL PAVEMENT SECTION

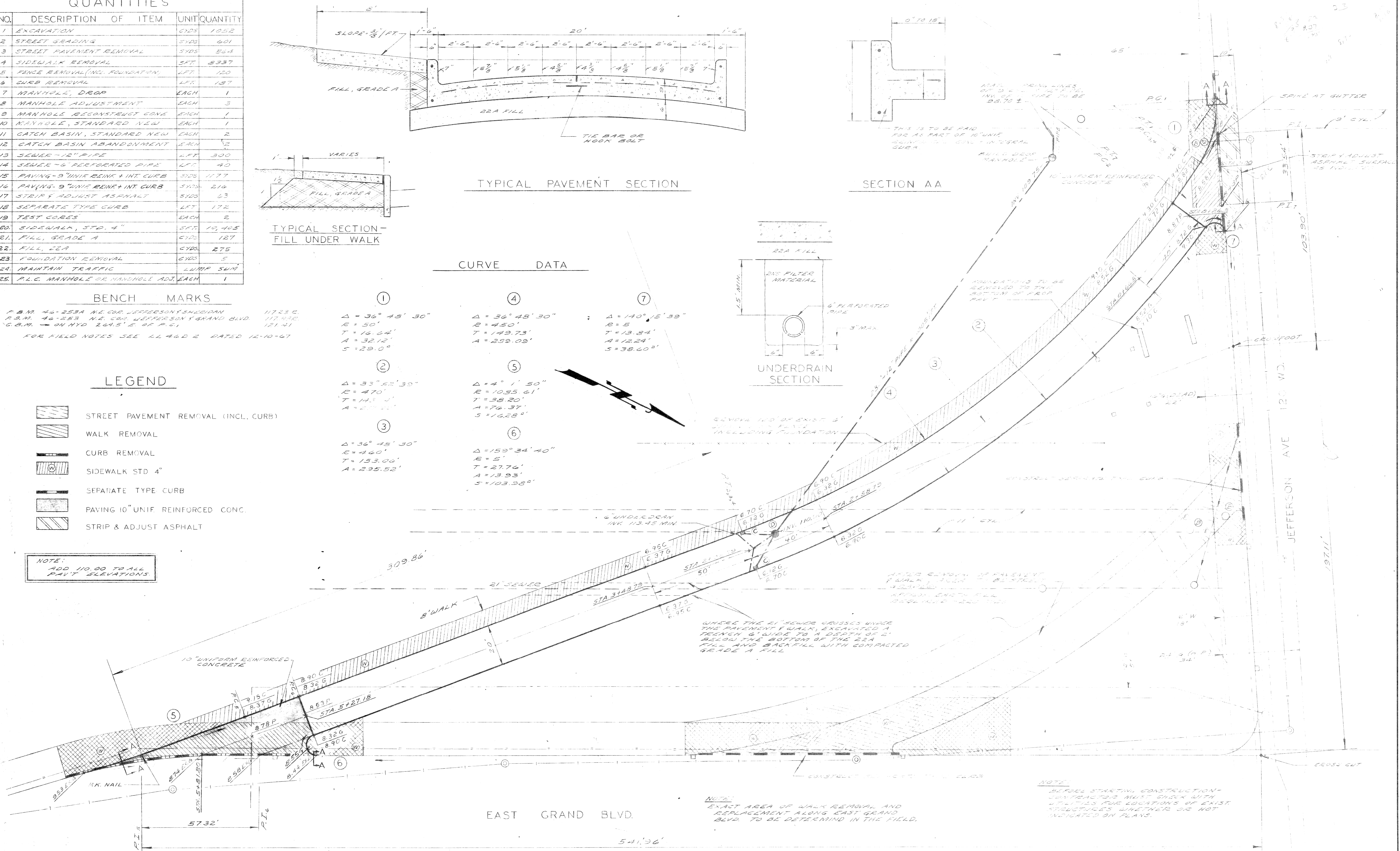
CURVE DATA

① Δ = 36° 48' 30" R = 50' T = 16.64' A = 32.12' S = 29.0°	④ Δ = 36° 48' 30" R = 450' T = 149.73' A = 259.09'	⑦ Δ = 140° 15' 39" R = 5' T = 13.84' A = 12.24' S = 38.60°
② Δ = 33° 52' 39" R = 470' T = 14.34' A = 27.32'	⑤ Δ = 4° 1' 50" R = 1035.61' T = 38.20' A = 76.37' S = 16.28°	
③ Δ = 36° 48' 30" R = 460' T = 153.06' A = 235.52'	⑥ Δ = 153° 34' 40" R = 5' T = 27.76' A = 13.93' S = 103.36°	

SECTION AA



UNDERDRAIN SECTION



**NOTE:**  
 EXACT AREA OF WALK REMOVAL AND  
 REPLACEMENT ALONG EAST GRAND  
 BLVD. TO BE DETERMINED IN THE FIELD.

**NOTE:**  
 BEFORE STARTING CONSTRUCTION  
 CONTRACTOR MUST CHECK WITH  
 UTILITIES FOR LOCATIONS OF EXIST  
 STRUCTURES WHETHER OR NOT  
 INDICATED ON PLANS.

SCALE ~ 1" = 20'

DESIGNED BY	R.C.M. GREGOR	APPROVED:	<i>J. Erickson</i>
DRAWN BY	T. SEYMOUR	ENGINEER OF STREETS	<i>R. R. Hicks</i>
SEWER APPROVAL	<i>V. J. G. B.</i>	ASSISTANT CITY ENGINEER	<i>Alfred Berarducci</i>
CHECKED BY	R.C.M. GREGOR	CITY ENGINEER	

**CITY OF DETROIT**  
 DEPARTMENT OF PUBLIC WORKS  
 CITY ENGINEERS OFFICE  
 FOR  
 THE DEPARTMENT OF PARKS & RECREATION

NEW RIGHT TURN ROADWAY INTO BELLE ISLE  
 GRAND BLVD & JEFFERSON  
 URBAN BEAUTIFICATION AND IMPROVEMENT PROJECT MICH B-9  
 PAVEMENT PLAN & QUANTITIES

A.O. 1828C
SHEET 2 OF 2 SHEETS
CONTRACT No. PR-207
DRWG No.
DATE JAN. 5, 1966

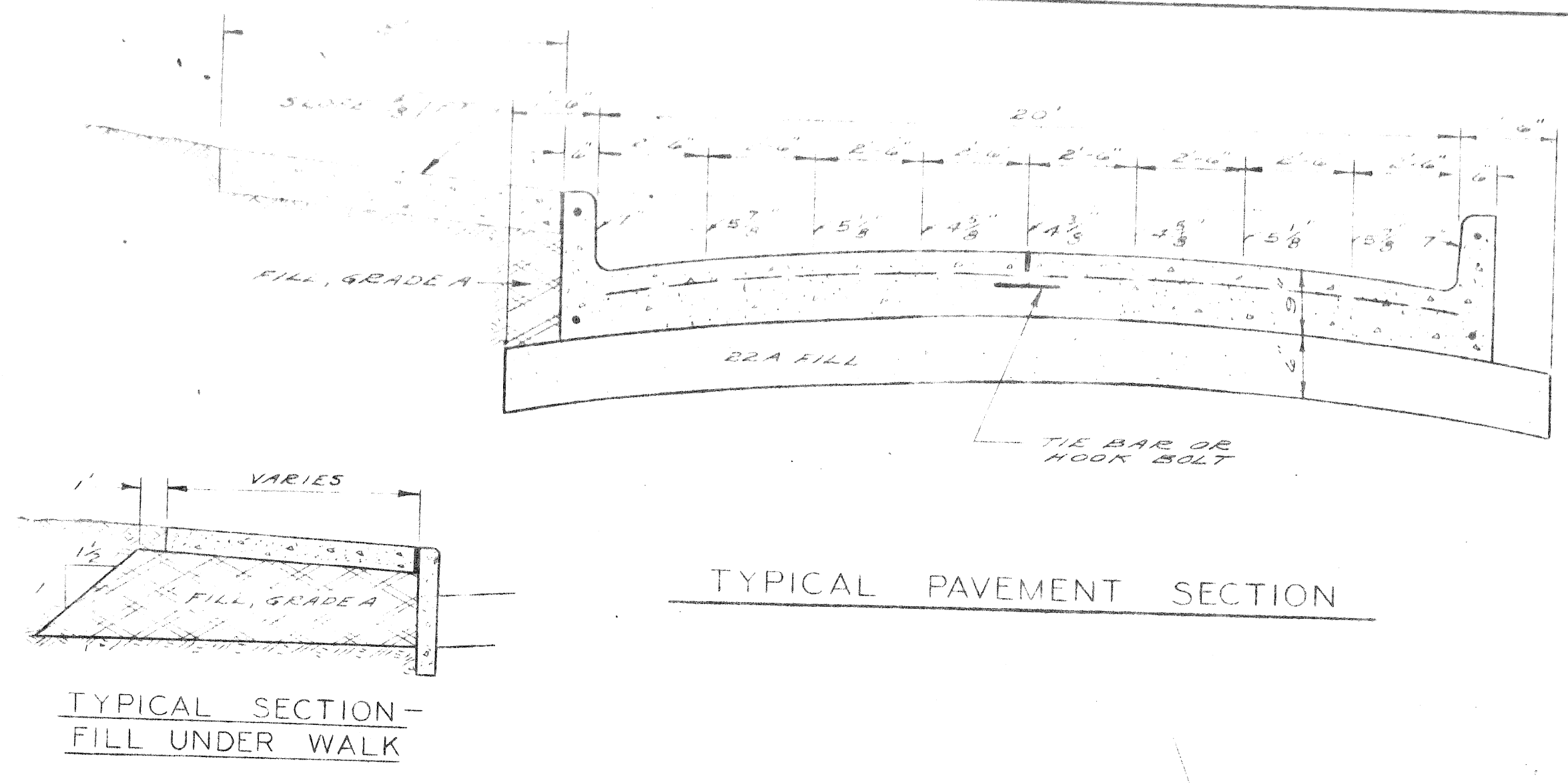
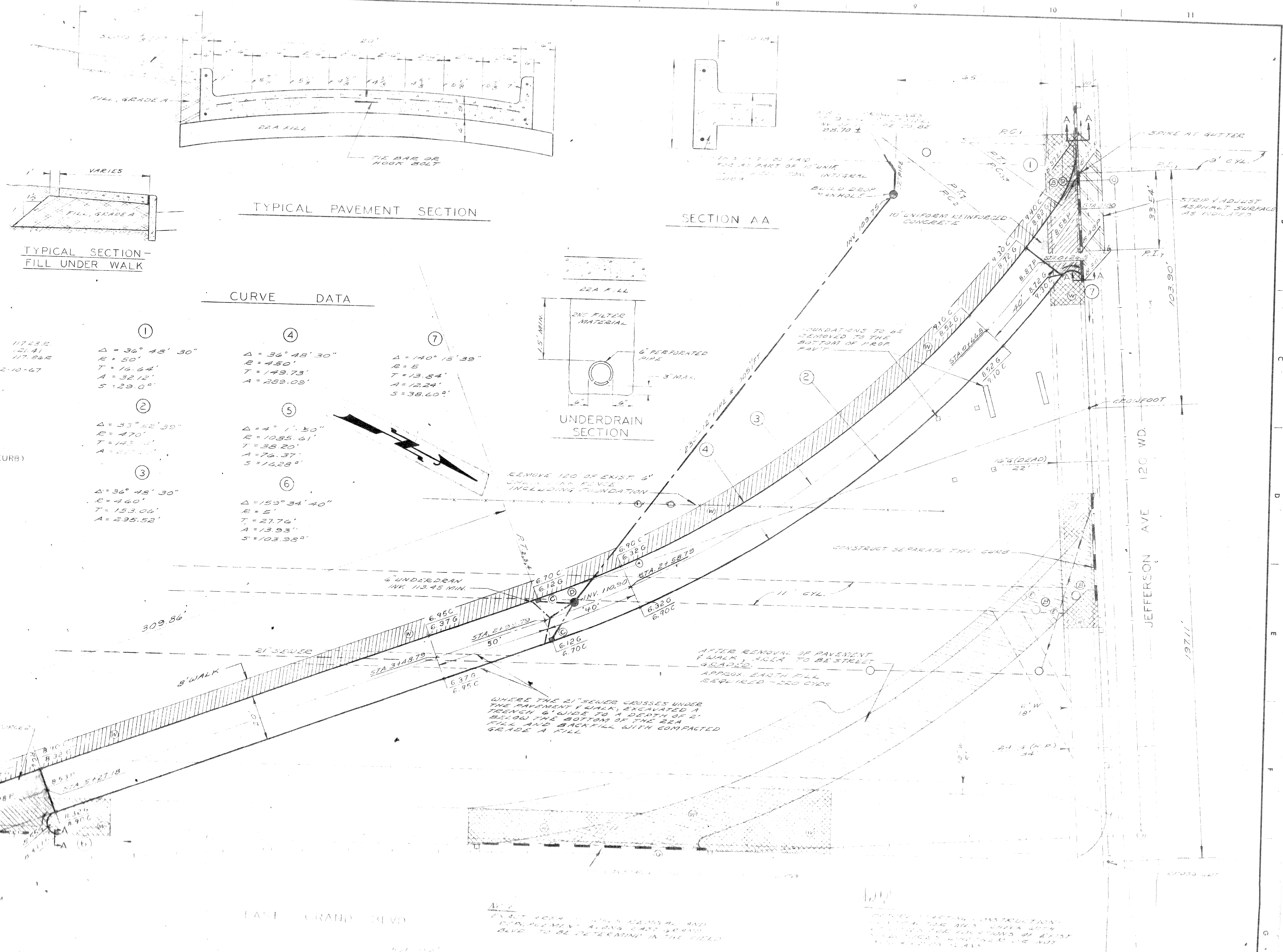
QUANTITIES			
NO.	DESCRIPTION OF ITEM	UNIT	QUANTITY
1	EXCAVATION	CY	12.5
2	STREET PAVEMENT	SQ. YD.	201
3	STREET PAVEMENT REMOVAL	SQ. YD.	201
4	SIDEWALK REMOVAL	SQ. YD.	84.3
5	CURB REMOVAL	LF	5
6	CURB REMOVAL	LF	5
7	MANHOLE DROP	EACH	1
8	MANHOLE ADJUSTMENT	EACH	1
9	MANHOLE RECONSTRUCT CONE	EACH	1
10	MANHOLE STANDARD VIEW	EACH	1
11	CATCH BASIN STANDARD VIEW	EACH	2
12	CATCH BASIN ABANDONMENT	EACH	2
13	SEWER 12" PIPE	LF	300
14	SEWER 6" PERFORATED PIPE	LF	40
15	PAVING 10" UNIF REINFC INT CURB	SQYD	1177
16	PAVING 10" UNIF REINFC INT CURB	SQYD	216
17	STRIP ADJUST ASPHALT	SQYD	63
18	SEPARATE TYPE CURB	LF	172
19	TEST COBES	EACH	2
20	SIDEWALK STD. 4"	SQYD	10,405
21	FILL, GRADE A	CYDS	187
22	FILL, 2EA	CYDS	275
23	FOUNDATION REMOVAL	CYDS	5
24	MAINTAIN TRAFFIC	LUMP SUM	
25	P.L.C. MANHOLE OR MANHOLE ADJ.	EACH	1

BENCH MARKS	
P.B.M. 46-253A N.E. COR. JEFFERSON & GRAND BLVD	117.23
P.B.M. 46-253 N.E. COR. JEFFERSON & GRAND BLVD	121.41
C.B.M. ON HYD. 244.5' S. OF P.C. 1	117.842

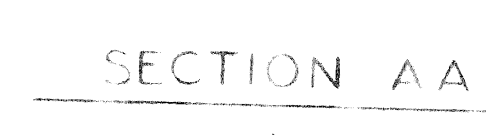
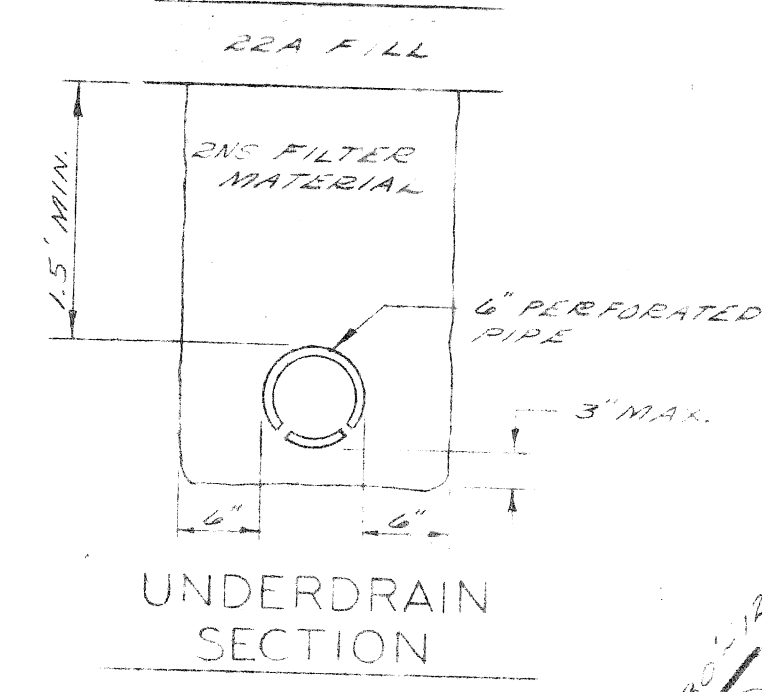
FOR FIELD NOTES SEE LL 442 D DATED 12-10-67

LEGEND	
	STREET PAVEMENT REMOVAL (INCL. CURB)
	WALK REMOVAL
	CURB REMOVAL
	SIDEWALK STD. 4"
	SEPARATE TYPE CURB
	PAVING 10" UNIF REINFORCED CONC.
	STRIP & ADJUST ASPHALT

NOTE: ADD 110.00 TO ALL PAVT ELEVATIONS.



CURVE DATA	
①	$\Delta = 36^\circ 48' 30''$ $R = 50'$ $T = 16.64'$ $A = 32.13'$ $S = 29.09'$
②	$\Delta = 33^\circ 52' 30''$ $R = 470'$ $T = 143.11'$ $A = 217.11'$
③	$\Delta = 36^\circ 48' 30''$ $R = 460'$ $T = 153.06'$ $A = 235.52'$
④	$\Delta = 36^\circ 48' 30''$ $R = 450'$ $T = 149.73'$ $A = 259.09'$
⑤	$\Delta = 4^\circ 1' 50''$ $R = 1055.61'$ $T = 38.20'$ $A = 76.37'$ $S = 16.28'$
⑥	$\Delta = 159^\circ 34' 40''$ $R = 5'$ $T = 27.76'$ $A = 13.93'$ $S = 103.95'$
⑦	$\Delta = 140^\circ 15' 39''$ $R = 5'$ $T = 13.84'$ $A = 12.24'$ $S = 38.60'$



SCALE: 1" = 20'

CITY OF DETROIT  
DEPARTMENT OF PUBLIC WORKS  
CITY ENGINEERS OFFICE

FOR THE DEPARTMENT OF PUBLIC UTILITIES

APPROVED: [Signature]

DESIGNED BY: [Signature]

DRAWN BY: [Signature]

NEW 21" CURB ROADWAY INTO BELL PUE  
ROAD BLVD & JEFFERSON

AG 1828C

SHEET 2 OF 2 SHEETS

CONTRACT No. PR 07

COLOR	SYMBOL	DESCRIPTION	SYMBOL	DESCRIPTION	SYMBOL	DESCRIPTION
BLACK	—	PROPERTY AND LOT LINES.	○	SEWER MANHOLE.	#	STREET SIGN POST
	—	PROPOSED CURB LINES AND HEADERS AT RETURNS	○	P.L.C. MANHOLE.	□	CATCH BASIN.
	—	EXISTING CURB LINES OR EDGE OF PAVEMENT.	⊕	WATER MANHOLE OR GRATE.	(W)	WATER METER.
	—	PROPOSED CURB OR PAVING ON INTERSECTING STREET	⊕	GAS MANHOLE OR GRATE.	(-)	WATER SHUT-OFF.
	—	EXISTING LATERAL SEWERS.	⊖	WESTERN UNION MANHOLE.	(+)	GAS SHUT-OFF.
	—	EXISTING PUBLIC SEWERS.	⊙	MICHIGAN BELL MANHOLE.	⊞	GAS DRIP.
	—	EXISTING GAS LINES.	⊚	EDISON STEAM MANHOLE.	⊞	DRAIN OR VENT.
	—	EXISTING WATER LINES.	⊚	EDISON ELECTRIC MANHOLE.		GUY POLE.
	—	ELEV. OF SEWER INVERT.	⊚	FIRE DEPT. MANHOLE.	+	MAIL BOX.
BLACK	—	PROPOSED C.B. M.H. & INLET SEWER	⊚	POLICE DEPT. MANHOLE.	⊞	AREAWAY OR COAL CHUTE.
	—	ELEV.	⊚	FIRE DEPT. STANDARD HYDRANT.	⊞	FLAG POLE.
	—	EXISTING C.B. M.H. & INLET SEWERS	⊚	FIRE DEPT. HIGH PRESSURE HYDRANT.	⊞	SPRINKLER BOX.
	—		⊚	FIRE DEPT. CALL BOX.	⊞	DEAD MANHOLE.
	—		⊚	FIRE DEPT. HIGH PRESSURE MANHOLE.	⊞	TREE.
	—		⊚	POLICE DEPT. CALL BOX.	⊞	PLC & FD MANHOLE FILLED WITH SAND.
	—		⊚	P.L.C. LIGHT POLE.	⊞	TRACK DRAIN.
	—		⊚	P.L.C. POLE.	⊞	TRAFFIC SIGN POST.
	—		⊚	TELEPHONE POLE.	⊞	(2) TRAFFIC SIGNAL LIGHT.
	—		⊚	PROPOSED C.B. M.H. & INLET SEWERS ON INTERSECTING STREETS.	⊞	II D.S.R. DANGER PLATE.
	—		⊚		⊞	
	—		⊚		⊞	
	—		⊚		⊞	
	—		⊚		⊞	
	—		⊚		⊞	
	—		⊚		⊞	
	—		⊚		⊞	
	—		⊚		⊞	
	—		⊚		⊞	

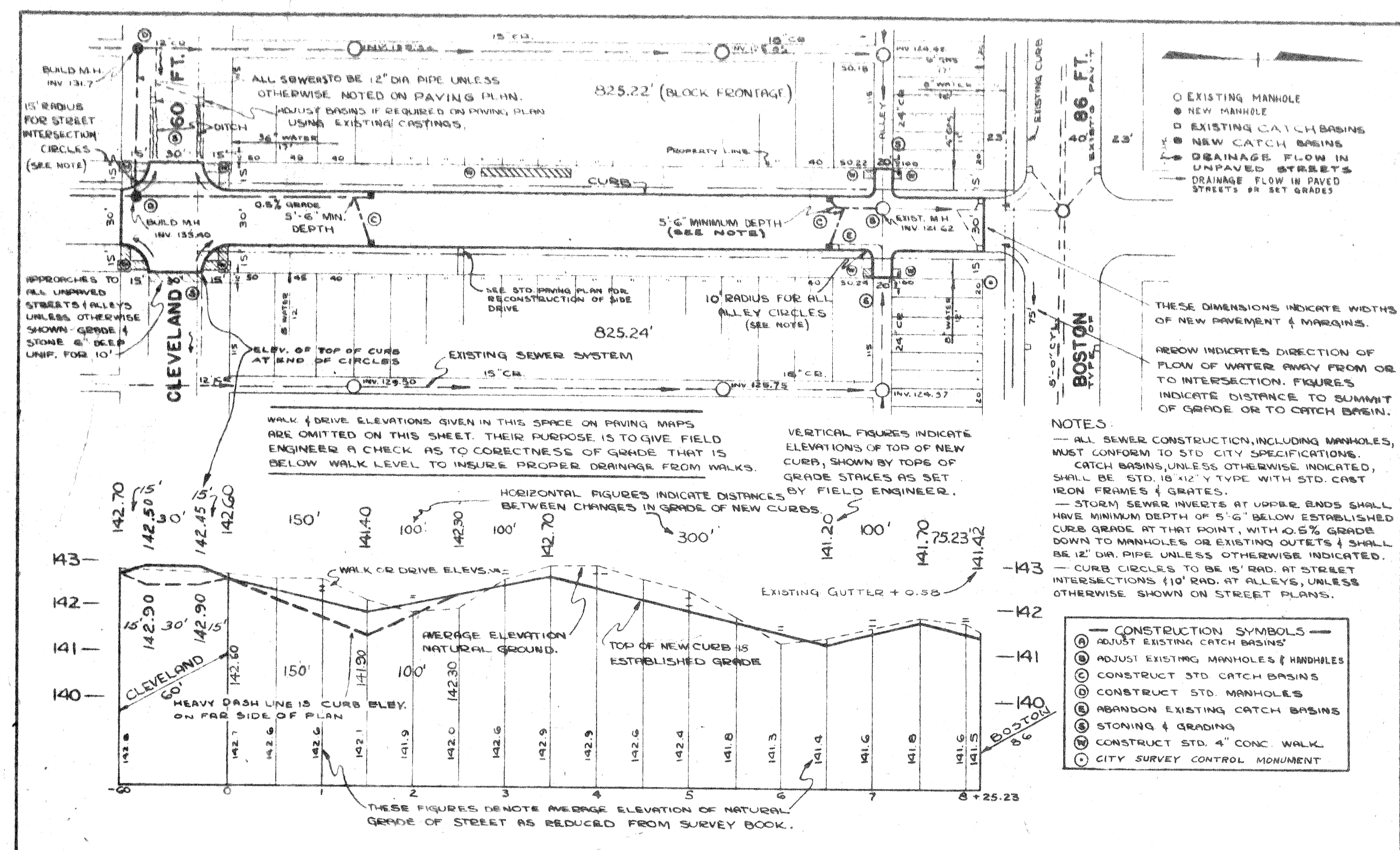
CITY OF DETROIT  
**DEPARTMENT OF PUBLIC WORKS**  
CITY ENGINEER'S OFFICE  
BUREAU OF DESIGN

**STANDARD SYMBOLS FOR UTILITIES**

**PAVING DETAIL NO. 25**

BOOK NO. \_\_\_\_\_ SCALE NO. SCALE \_\_\_\_\_ DWS. NO. C-902-A

PAGE NO. \_\_\_\_\_ DATE 10-11-29



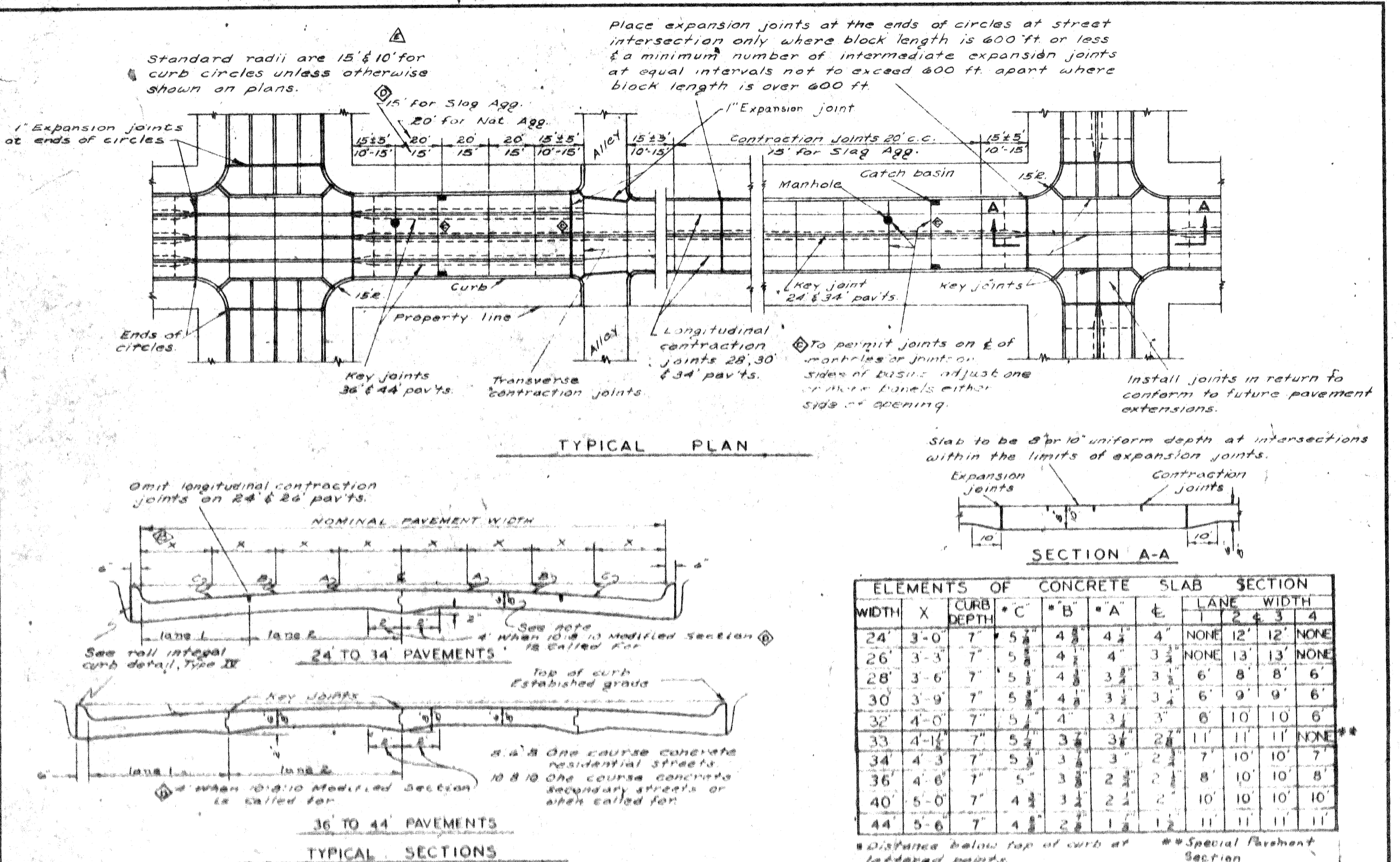
CITY OF DETROIT  
**DEPARTMENT OF PUBLIC WORKS**  
CITY ENGINEER'S OFFICE  
BUREAU OF DESIGN

**TYPICAL PLAN FOR STREET PAVING**

**DETAIL STANDARD NO. 1**

BOOK NO. \_\_\_\_\_ SCALE AS NOTED \_\_\_\_\_ DWS. NO. C-4378

PAGE NO. \_\_\_\_\_ DATE MAR. 2, 1959



CITY OF DETROIT  
**DEPARTMENT OF PUBLIC WORKS**  
CITY ENGINEER'S OFFICE  
BUREAU OF DESIGN

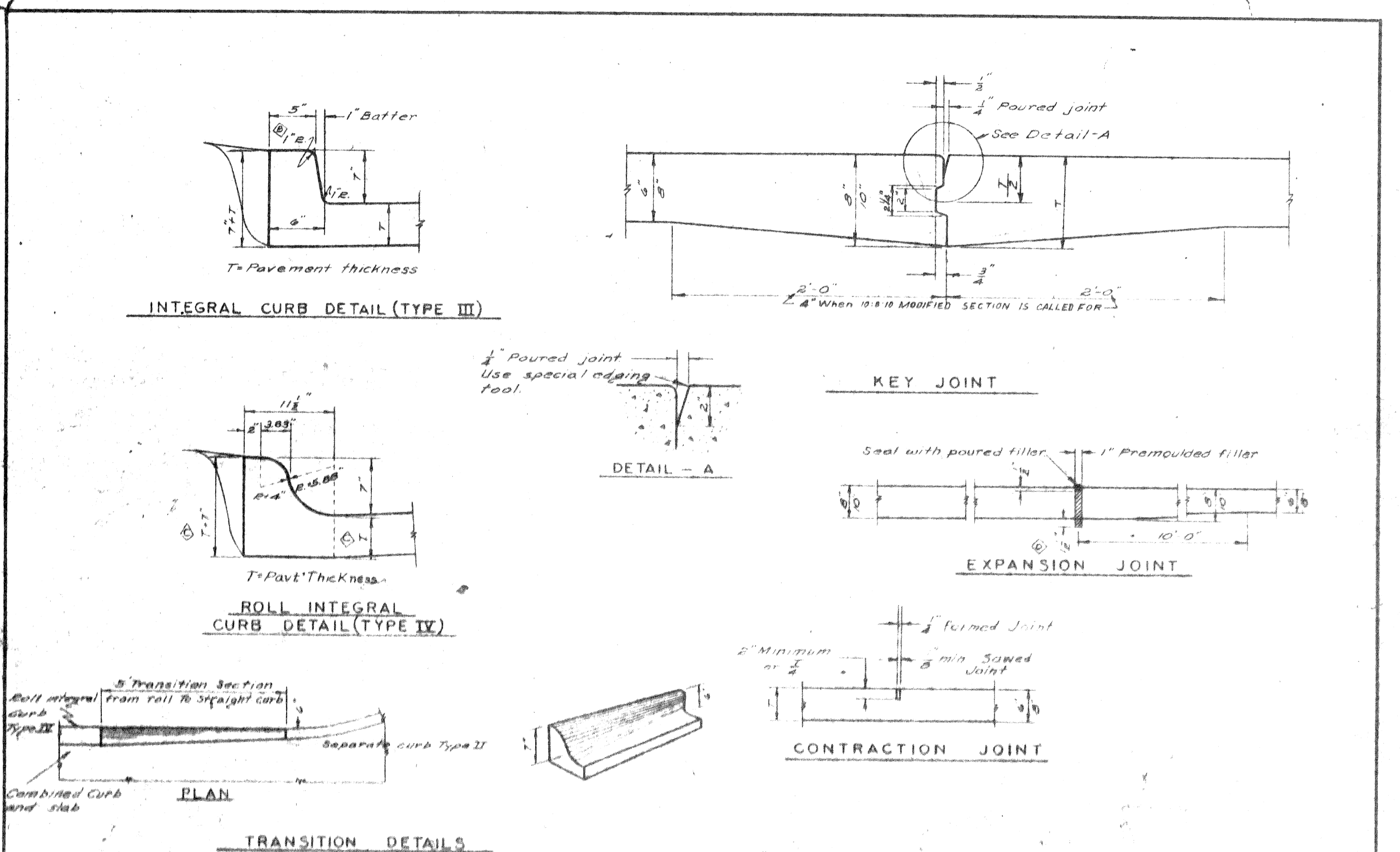
**STREET PAVEMENT WITH ROLL INTEGRAL CURB**

**TYPICAL PLAN CROSS SECTIONS & SCHEDULE OF WIDTHS**

WIDTH	X	CURB DEPTH	*C	*B	*A	E	LANE WIDTH	1	2	3	4
24	3-0	7"	5"	4"	4"	4"	NONE	12"	12"	NONE	
26	3-3	7"	5"	4"	4"	3"	NONE	13"	13"	NONE	
28	3-6	7"	5"	4"	3"	3"	6"	8"	8"	6"	
30	3-9	7"	5"	4"	3"	3"	6"	9"	9"	6"	
32	4-0	7"	5"	4"	3"	3"	8"	10"	10"	6"	
33	4-1	7"	5"	3"	3"	2"	11"	11"	11"	NONE	
34	4-3	7"	5"	3"	3"	2"	7"	10"	10"	7"	
36	4-6	7"	5"	3"	2"	2"	8"	10"	10"	8"	
40	5-0	7"	4"	3"	2"	2"	10"	10"	10"	10"	
44	5-6	7"	4"	2"	1"	1"	11"	11"	11"	11"	

BOOK NO. \_\_\_\_\_ SCALE NO. SCALE \_\_\_\_\_ DWS. NO. C-4379

PAGE NO. \_\_\_\_\_ DATE MAR. 2, 1959



CITY OF DETROIT  
**DEPARTMENT OF PUBLIC WORKS**  
CITY ENGINEER'S OFFICE  
BUREAU OF DESIGN

**DETAILS OF STANDARD CURBS AND JOINTS**

BOOK NO. \_\_\_\_\_ SCALE AS NOTED \_\_\_\_\_ DWS. NO. C-4380

PAGE NO. \_\_\_\_\_ DATE MAR. 2, 1959

TYPE I CURB					
PAVEMENT	CU YDS CONCRETE PER LIN. FT. OF STREET INCL. CURBS	27'-0"	31'-0"	37'-0"	41'-0"
8:6:8	0.5536	0.6277	0.7635	0.8375	
10:8:10	0.7141	0.8129	0.9556	1.0846	

USED ONLY FOR REPLACEMENT OF OLD TYPE CURB

TYPE II CURB					
PAVEMENT	CU YDS CONCRETE PER LIN. FT. OF STREET INCL. CURBS	27'-0"	31'-0"	37'-0"	41'-0"
8:6:8	0.5463	0.6204	0.7562	0.8302	
10:8:10	0.7133	0.8121	0.9550	1.0839	

FOR CONNECTIONS TO STATE & COUNTY PAVEMENT AND WHERE FUTURE WIDENING IS INDICATED

TYPE III CURB					
PAVEMENT	CU YDS CONCRETE PER LIN. FT. OF STREET INCL. CURBS	27'-0"	31'-0"	37'-0"	41'-0"
8:6:8	0.5321	0.6062	0.7420	0.8161	
10:8:10	0.6991	0.7980	0.9709	1.0697	

TYPE IV CURB					
PAVEMENT	CU YDS CONCRETE PER LIN. FT. OF STREET INCL. CURBS	27'-0"	31'-0"	37'-0"	41'-0"
8:6:8	0.5339	0.6080	0.7438	0.8178	
10:8:10	0.7009	0.7998	0.9717	1.0715	

FOR ALL STREETS & INTERSECTIONS EXCEPT AS OTHERWISE CALLED FOR IN THIS PLANS.

DESIGNED BY	APPROVED	CITY OF DETROIT	STANDARD TYPES OF CONCRETE CURBS
DRAWN BY L.E.L.	ENGINEER OF STREETS	DEPARTMENT OF PUBLIC WORKS	CUBIC YARDS OF CONCRETE PER LINEAL FOOT OF STREET INCLUDING CURBS.
TRACED BY	ASST. CITY ENGINEER	CITY ENGINEER'S OFFICE	
CHECKED BY	CITY ENGINEER	BUREAU OF DESIGN	
DESCRIPTION	DATE	REVISIONS	

1968 1967 1966 1965 1964 1963 1962 1961 1960

DESIGNED BY	APPROVED	CITY OF DETROIT	DETAILS OF STANDARD SEWER & DROP MANHOLES
DRAWN BY J. Clark	ENGINEER OF STREETS	DEPARTMENT OF PUBLIC WORKS	CITY ENGINEER'S OFFICE
TRACED BY	ASST. CITY ENGINEER	BUREAU OF DESIGN	
CHECKED BY	CITY ENGINEER		
DESCRIPTION	DATE	REVISIONS	

1968 1967 1966 1965 1964 1963 1962 1961 1960

NOTE (A) THIS DIMENSION BASED ON 2'-0" LENGTH OF STD. PIPE. IF SHORTER PIPE IS USED, DECREASE THIS DIMENSION ACCORDINGLY. SEE NOTE (B)

(B) (FOR MODIFIED BASIN) TO CLEAR AN EXISTING UTILITY LINE AS SHOWN ON THE PLAN, OR TO USE A SHALLOW OUTLET, BASIN MAY BE MODIFIED BY PLACING A 12" LENGTH OF STRAIGHT 18" DIA. PIPE ON TOP OF "Y" INSTEAD OF THE STANDARD 24" LENGTH.

(C) ALL EXCAVATED SPACE BELOW PIPE TO BE FILLED WITH GRADE "C" CONCRETE TO 4" OF PIPE.

(D) BACKFILL AROUND SUMP SHALL BE TAMPED IN 6" LAYERS. WHERE STANDARD STRENGTH VIT. CLAY PIPE IS USED ENCASE IN 6" GRADE "A" CONCRETE.

REQUIRED

1 - FLAT GRATE FRAME & COVER  
 1 - 18" STRAIGHT PIPE  
 1 - 18" 1/2" SPECIAL "Y"  
 1 - 12" DIA. 30° CURVE  
 3 - CU. YDS. EXCAVATION  
 0.15 - CU. YDS. GRADE "A" CONC. QUANTITIES VARIABLE  
 FILL CONCRETE GRADE "C" CONCRETE.

DESIGNED BY	APPROVED	CITY OF DETROIT	STANDARD DESIGN 18" x 12" SPECIAL "Y" CATCH BASIN TO BE USED UNLESS DIRECTED OTHERWISE BY FIELD ENGINEER
DRAWN BY J. Clark	ENGINEER OF STREETS	DEPARTMENT OF PUBLIC WORKS	
TRACED BY	ASST. CITY ENGINEER	CITY ENGINEER'S OFFICE	
CHECKED BY	CITY ENGINEER	BUREAU OF DESIGN	
DESCRIPTION	DATE	REVISIONS	

1968 1967 1966 1965 1964 1963 1962 1961 1960

NOTE: When "L" type basin is ordered to be used by the Field Engineer or called for on drawings in-stead of the standard 18"x12" Y basin, contractor shall construct a standard half-trap if directed to do so by the Field Engineer.

For details of Flat Grate and Frame, See Standard Drawing 199 C-4392

Note A Where standard strength vit. clay pipe is used encase in 6" Grade "A" Concrete.

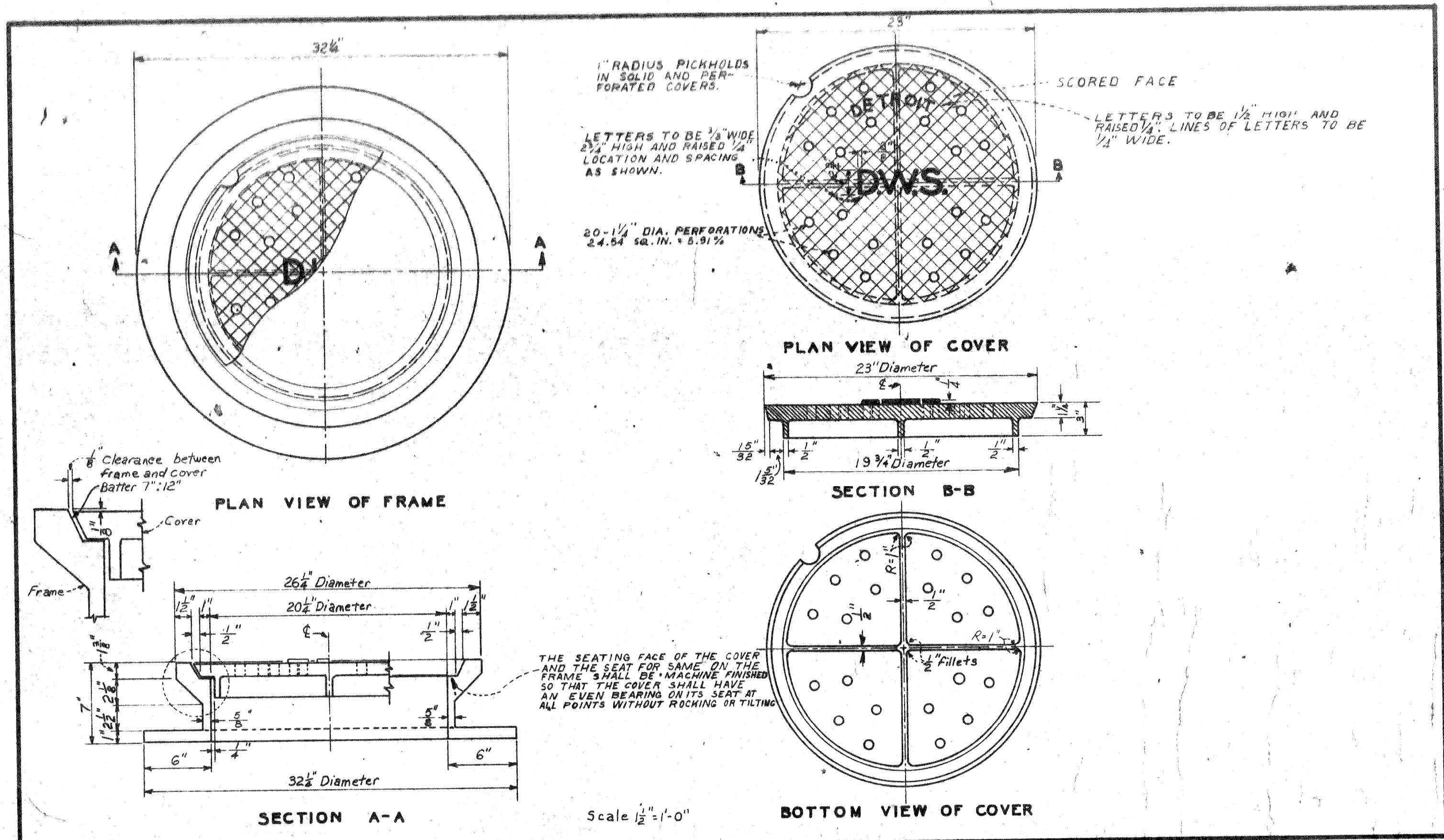
For Standard 12" Type Basin use 2'-0" length. For Modified 12" Type Basin use 1'-0" length

THIS TYPE TO BE USED ONLY WHEN DIRECTED BY FIELD ENGINEER

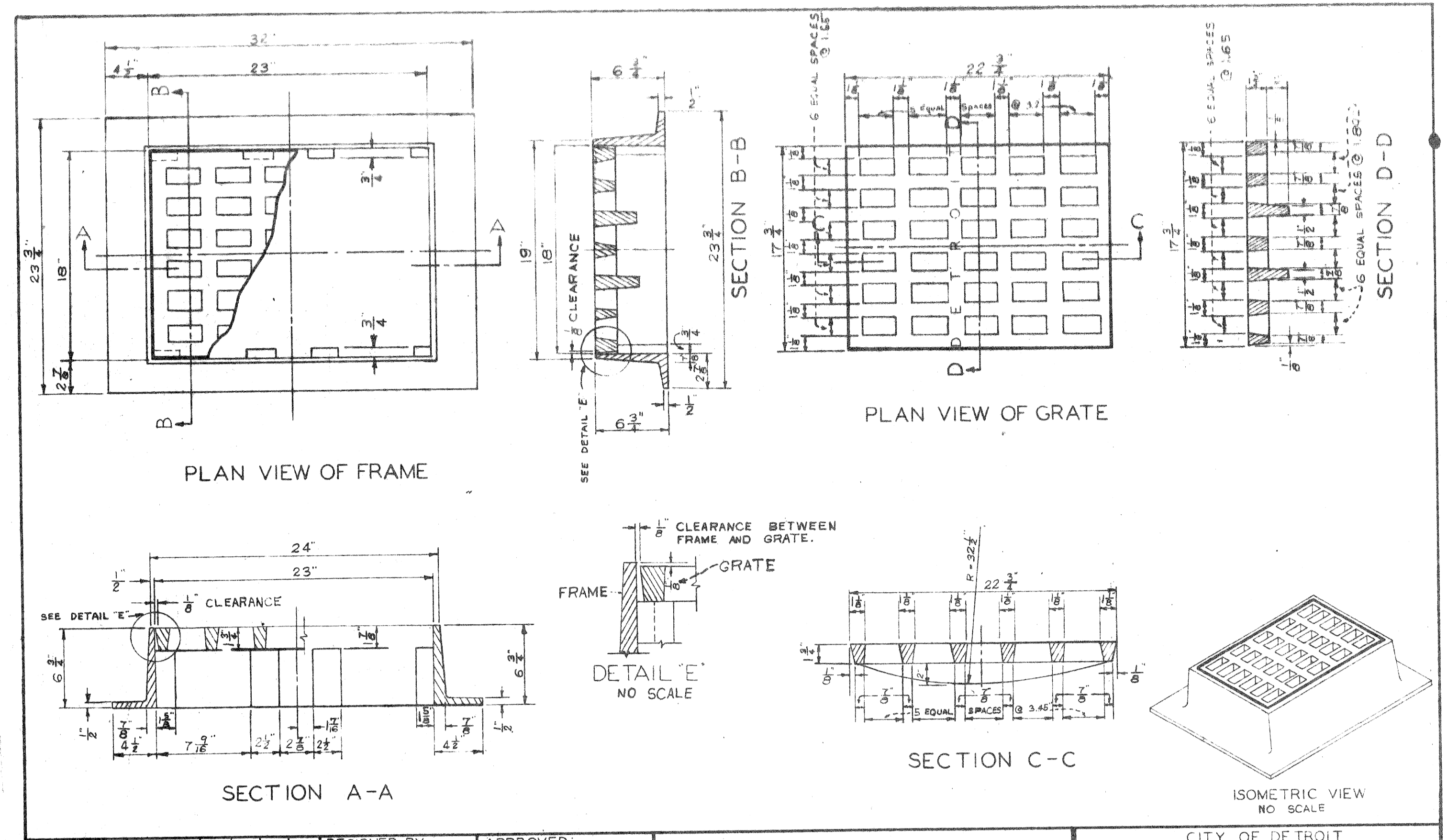
NOTE: See street paving plan for location of catch basin to be installed.

DESIGNED BY	APPROVED	CITY OF DETROIT	TYPICAL SUMP MANHOLE & "L" TYPE CATCH BASINS
DRAWN BY J. Clark	ENGINEER OF STREETS	DEPARTMENT OF PUBLIC WORKS	CITY ENGINEER'S OFFICE
TRACED BY	ASST. CITY ENGINEER	BUREAU OF DESIGN	
CHECKED BY	CITY ENGINEER		
DESCRIPTION	DATE	REVISIONS	

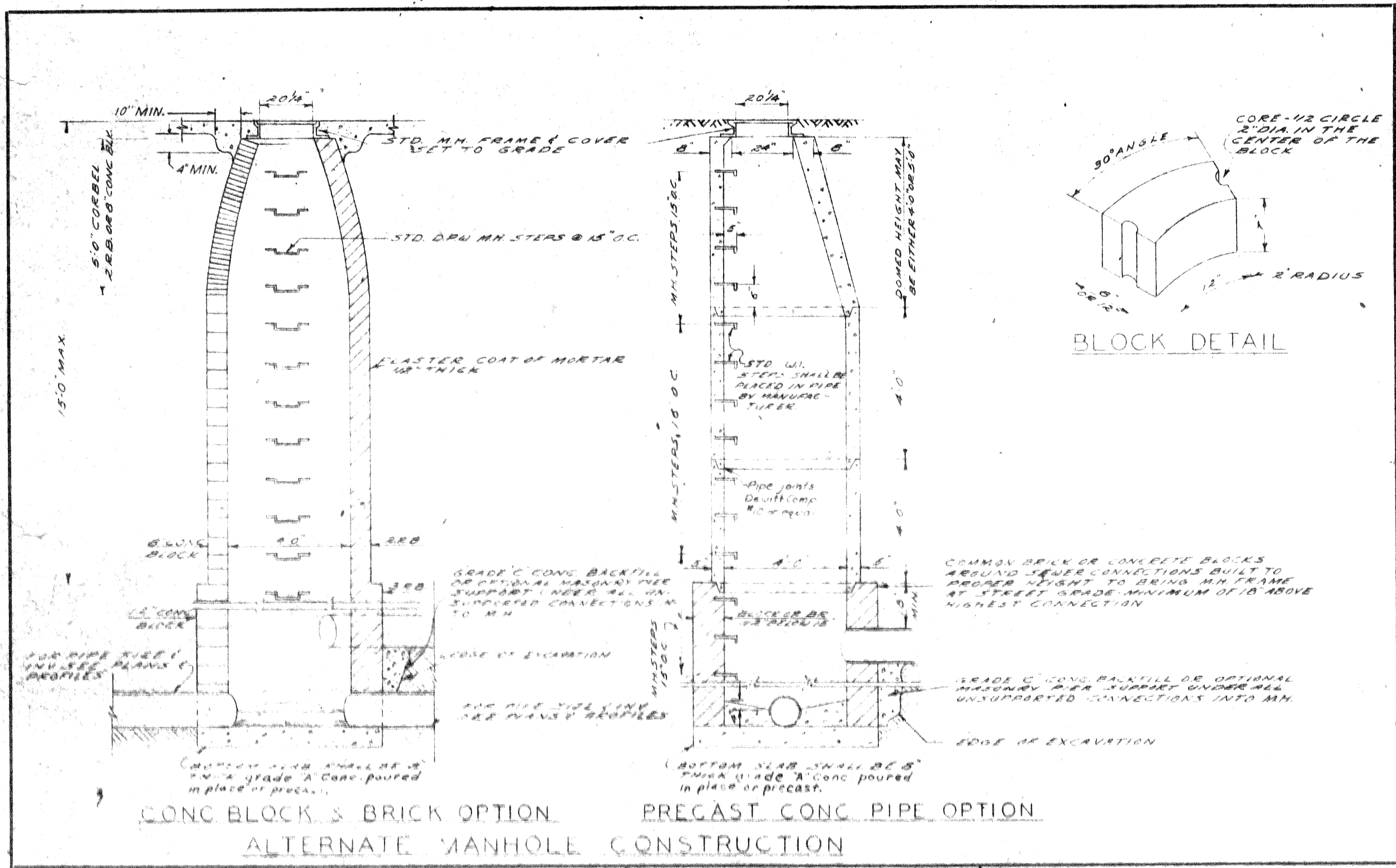
1968 1967 1966 1965 1964 1963 1962 1961 1960



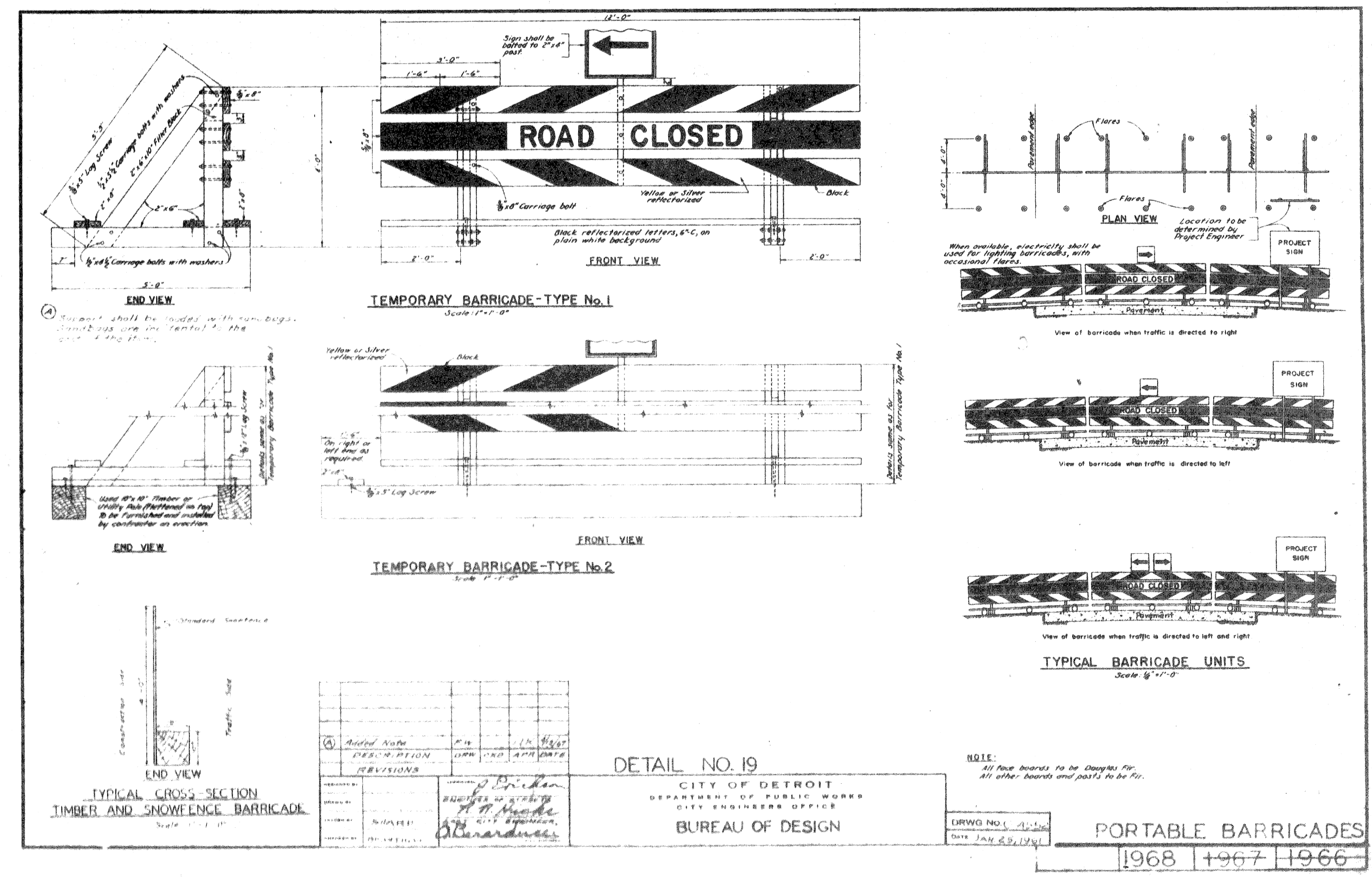
DESIGNED BY		APPROVED	CITY OF DETROIT	
DRAWN <i>E. Jackson</i>		ENGINEER OF STREETS	DEPARTMENT OF PUBLIC WORKS	
TRACED BY		ASST. CITY ENGINEER	CITY ENGINEER'S OFFICE	
CHECKED BY <i>R. Kowas</i>		CITY ENGINEER	BUREAU OF DESIGN	
DESCRIPTION	DRW	CHKD	APR	DATE
REVISIONS				
DETAILS OF STANDARD			MANHOLE FRAME AND COVER	
BOOK NO.	SCALE: AS SHOWN	DATE: OCTOBER 14, 1966	DETAIL STANDARD NO. 14	DWG. NO. C-4391
				1968 1967



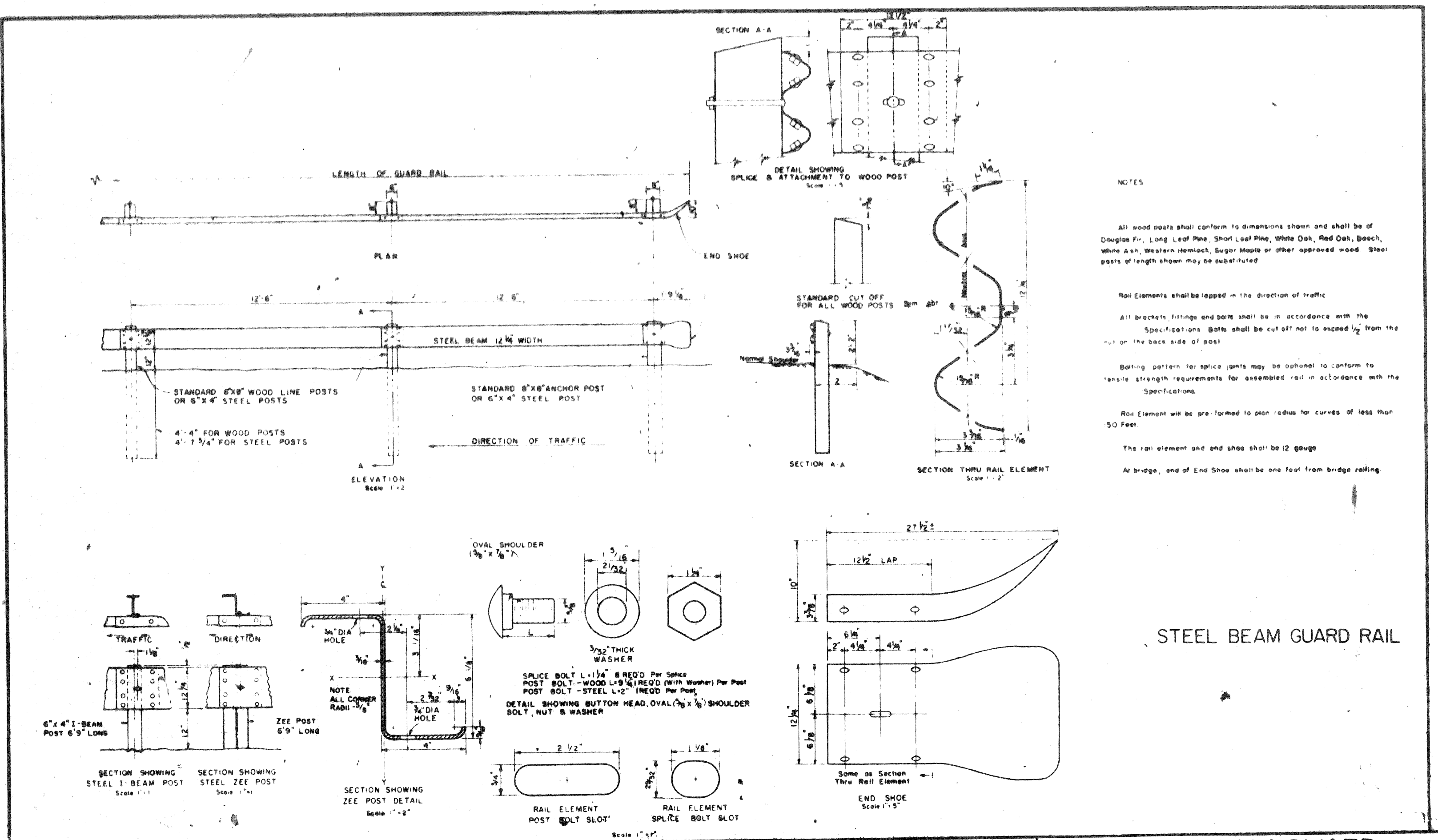
DESIGNED BY		APPROVED	CITY OF DETROIT	
DRAWN BY <i>E. Jackson</i>		ENGINEER OF STREETS	DEPARTMENT OF PUBLIC WORKS	
TRACED BY		ASST. CITY ENGINEER	CITY ENGINEER'S OFFICE	
CHECKED BY <i>R. Kowas</i>		CITY ENGINEER	BUREAU OF DESIGN	
DESCRIPTION	DRW	CHKD	APR	DATE
REVISIONS				
DETAILS OF STANDARD			FLAT GRATE AND FRAME	
BOOK NO.	SCALE: 1/2" = 1'-0"	DATE: MAR 2, 1967	DETAIL STANDARD NO. 15	DWG. NO. C-4392
				1968 1967 1966 1965 1964 1963 1962 1961 1960



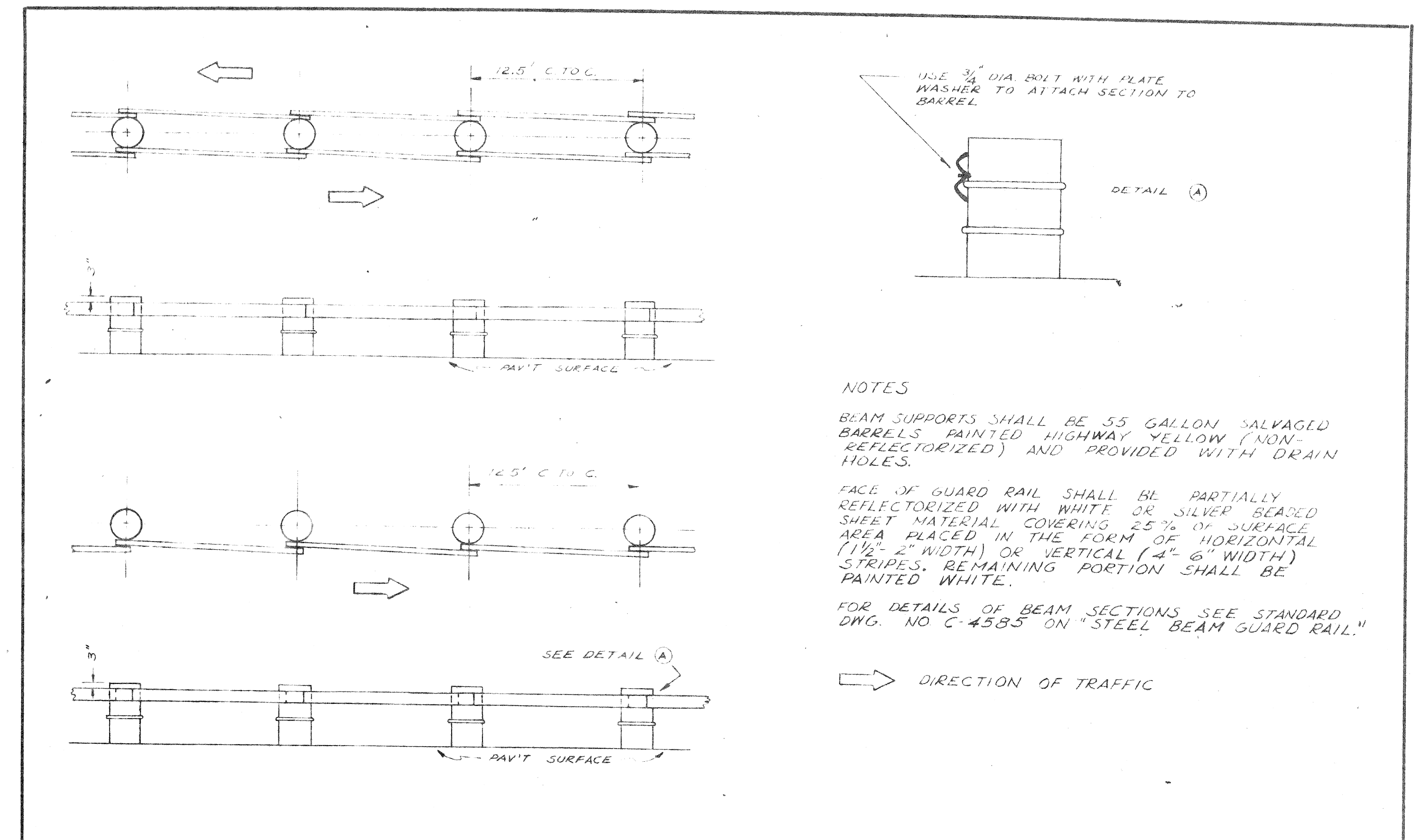
DESIGNED BY		APPROVED	CITY OF DETROIT	
DRAWN BY <i>E. Jackson</i>		ENGINEER OF STREETS	DEPARTMENT OF PUBLIC WORKS	
TRACED BY		ASST. CITY ENGINEER	CITY ENGINEER'S OFFICE	
CHECKED BY <i>R. Kowas</i>		CITY ENGINEER	BUREAU OF DESIGN	
DESCRIPTION	DRW	CHKD	APR	DATE
REVISIONS				
STD DPW MANHOLES			CONSTRUCTION ALTERNATES	
BOOK NO.	SCALE: NONE	DATE: 7-20-67	DWG. NO. C-4395A	
				1968 1967 1966 1965 1964



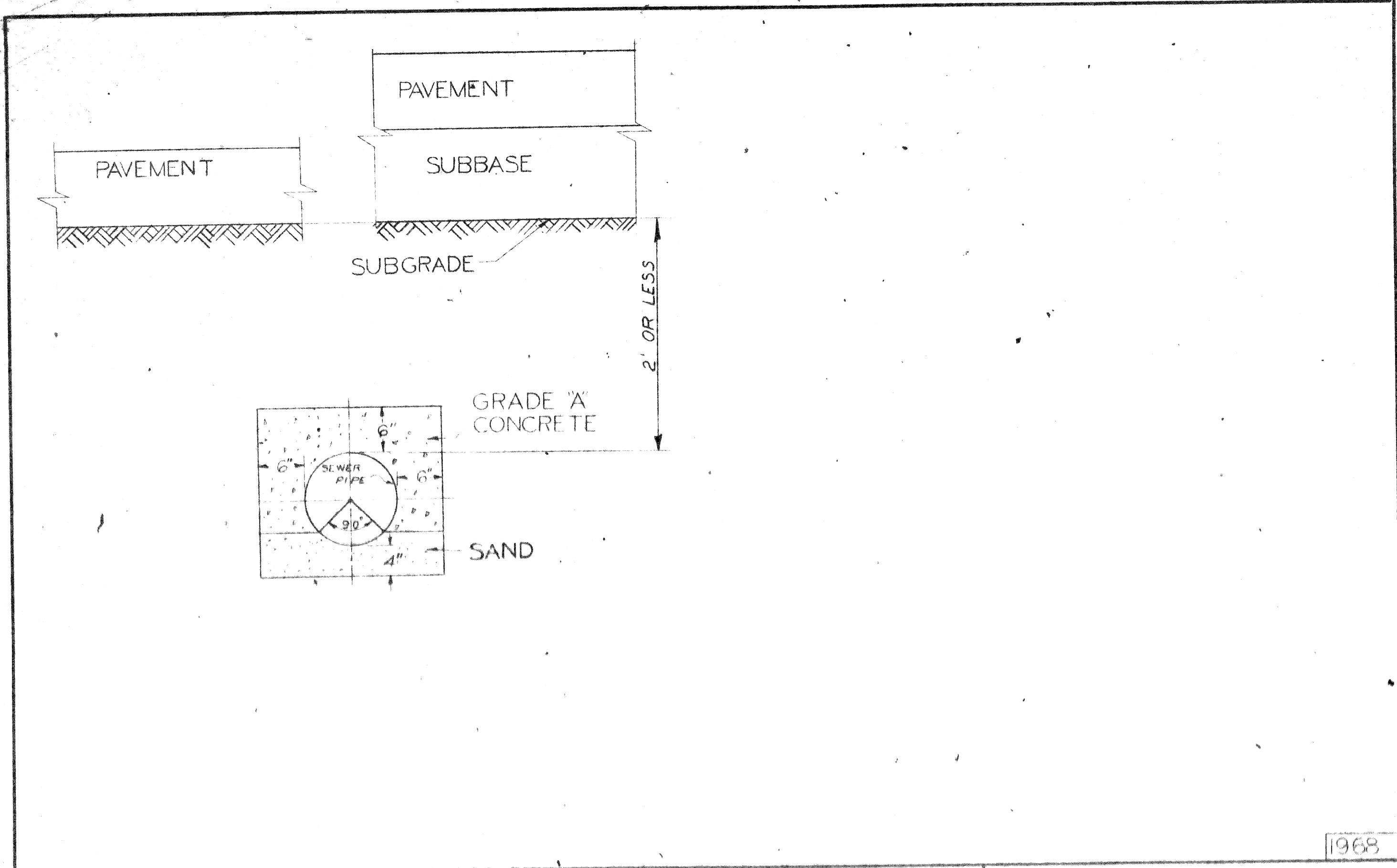
DESIGNED BY		APPROVED	CITY OF DETROIT	
DRAWN BY <i>E. Jackson</i>		ENGINEER OF STREETS	DEPARTMENT OF PUBLIC WORKS	
TRACED BY		ASST. CITY ENGINEER	CITY ENGINEER'S OFFICE	
CHECKED BY <i>R. Kowas</i>		CITY ENGINEER	BUREAU OF DESIGN	
DESCRIPTION	DRW	CHKD	APR	DATE
REVISIONS				
TYPICAL CROSS-SECTION			TIMBER AND SNOWPLow BARRICADE	
BOOK NO.	SCALE: NONE	DATE: 7-20-67	DWG. NO. C-4395A	
				1968 1967 1966 1965 1964



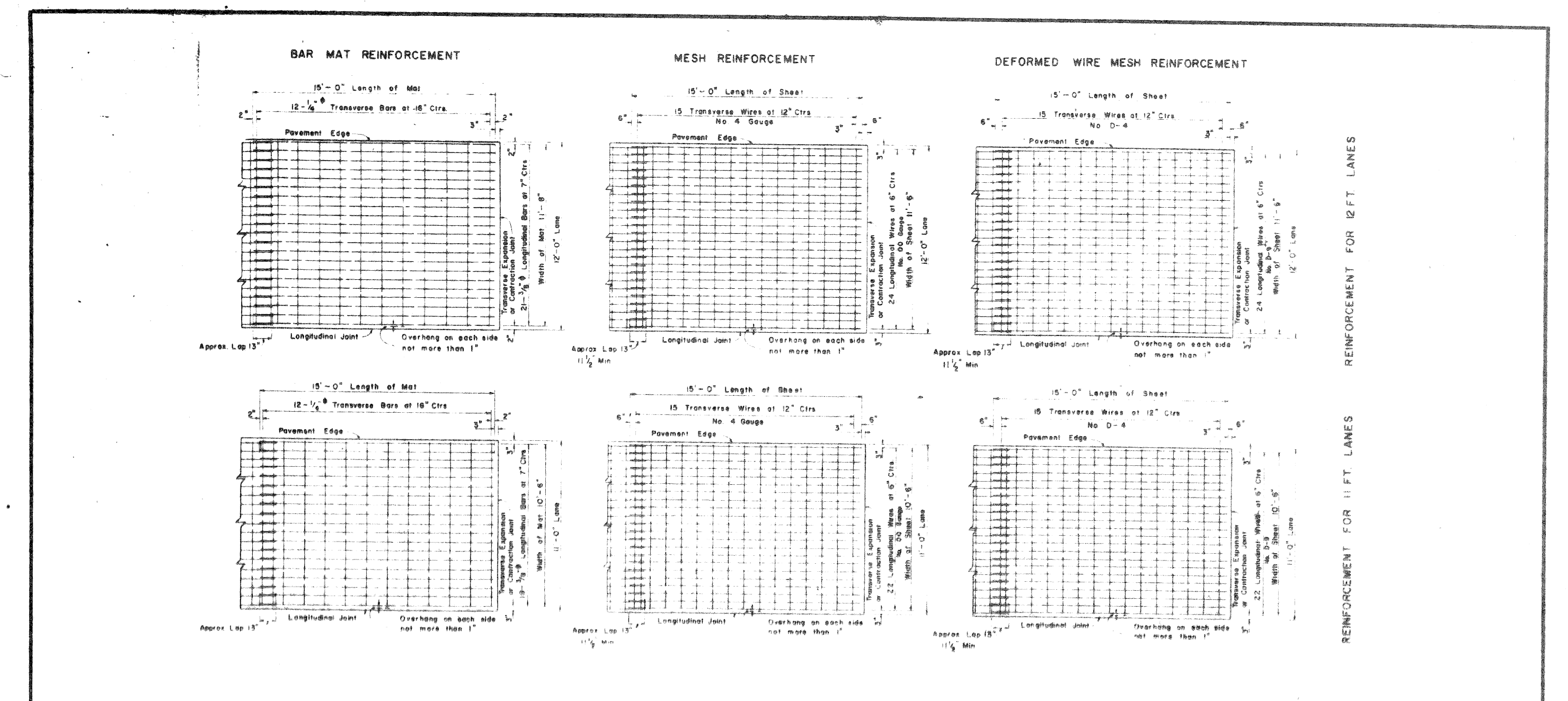
DESIGNED BY <i>C. Beckman</i>		APPROVED <i>J. Erickson</i>		CITY OF DETROIT DEPARTMENT OF PUBLIC WORKS CITY ENGINEER'S OFFICE BUREAU OF DESIGN		STEEL BEAM GUARD RAIL	
DRAWN BY <i>R. H. Hicks</i>		ENGINEER OF STREETS		BOOR NO.		SCALE	
TRACED BY <i>Edward Berarducci</i>		ASST. CITY ENGINEER		PAGE NO.		DATE 12, 28, 67	
CHECKED BY <i>Edward Berarducci</i>		CITY ENGINEER		DWG. NO. C-4585		1968	
DESCRIPTION REVISIONS		DRAWN / CKD / APR / DATE		CHECKED BY		1968	



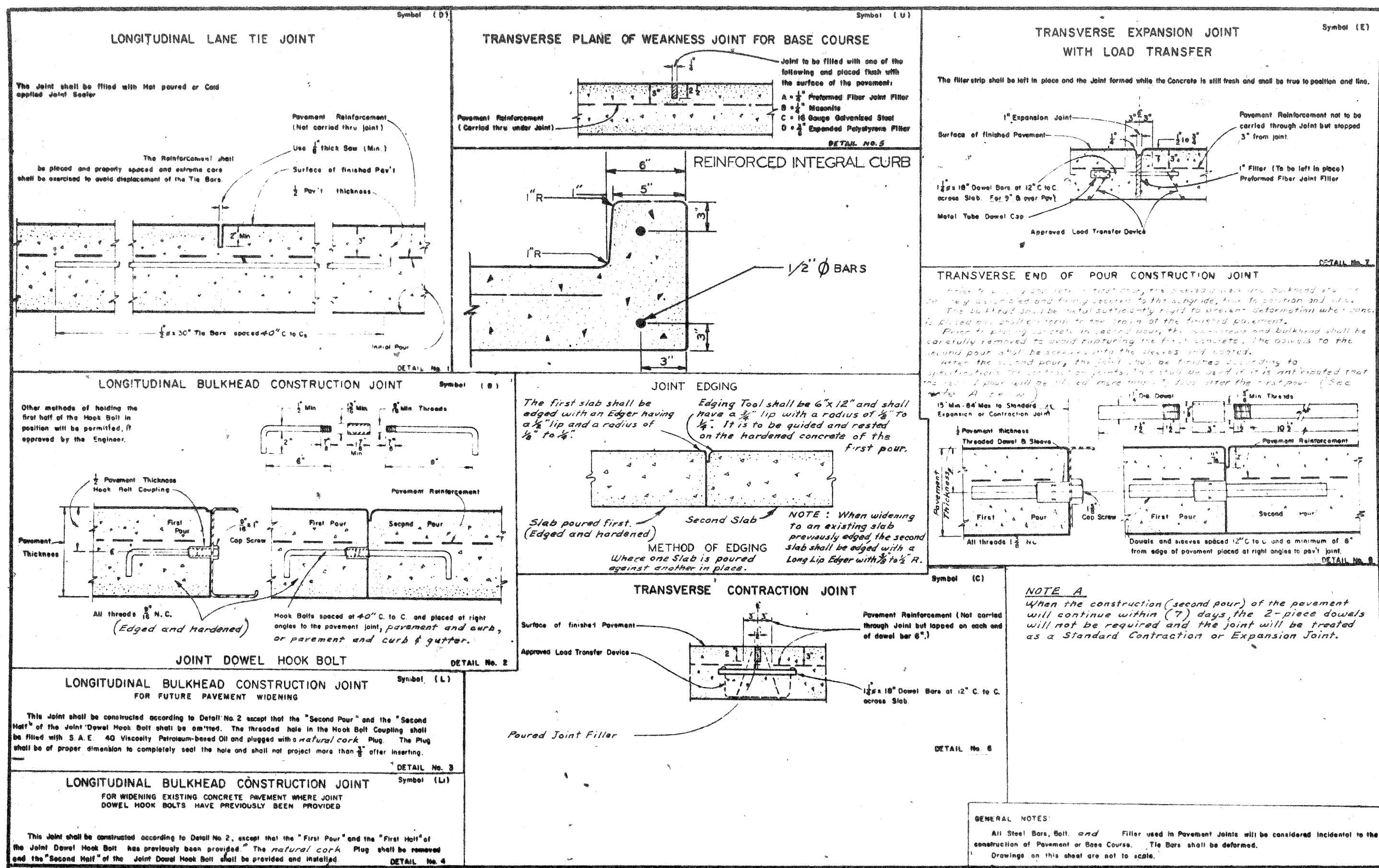
DESIGNED BY <i>L. P. King</i>		APPROVED <i>J. Erickson</i>		CITY OF DETROIT DEPARTMENT OF PUBLIC WORKS CITY ENGINEER'S OFFICE BUREAU OF DESIGN		SINGLE AND DOUBLE BEAM BARREL BARRICADE	
DRAWN BY <i>R. H. Hicks</i>		ENGINEER OF STREETS		BOOR NO.		SCALE	
TRACED BY <i>Edward Berarducci</i>		ASST. CITY ENGINEER		PAGE NO.		DATE 5-18-63	
CHECKED BY <i>Edward Berarducci</i>		CITY ENGINEER		DWG. NO. C-4729		1968	
DESCRIPTION REVISIONS		DRAWN / CKD / APR / DATE		CHECKED BY		1968	



DESIGNED BY <i>C. Beckman</i>		APPROVED <i>J. Erickson</i>		CITY OF DETROIT DEPARTMENT OF PUBLIC WORKS CITY ENGINEER'S OFFICE BUREAU OF DESIGN		SEWER PIPE PARTIAL ENCASEMENT	
DRAWN BY <i>R. H. Hicks</i>		ENGINEER OF STREETS		BOOR NO.		SCALE	
TRACED BY <i>Edward Berarducci</i>		ASST. CITY ENGINEER		PAGE NO.		DATE 12 13 67	
CHECKED BY <i>Edward Berarducci</i>		CITY ENGINEER		DWG. NO. C-4990		1968	
DESCRIPTION REVISIONS		DRAWN / CKD / APR / DATE		CHECKED BY		1968	

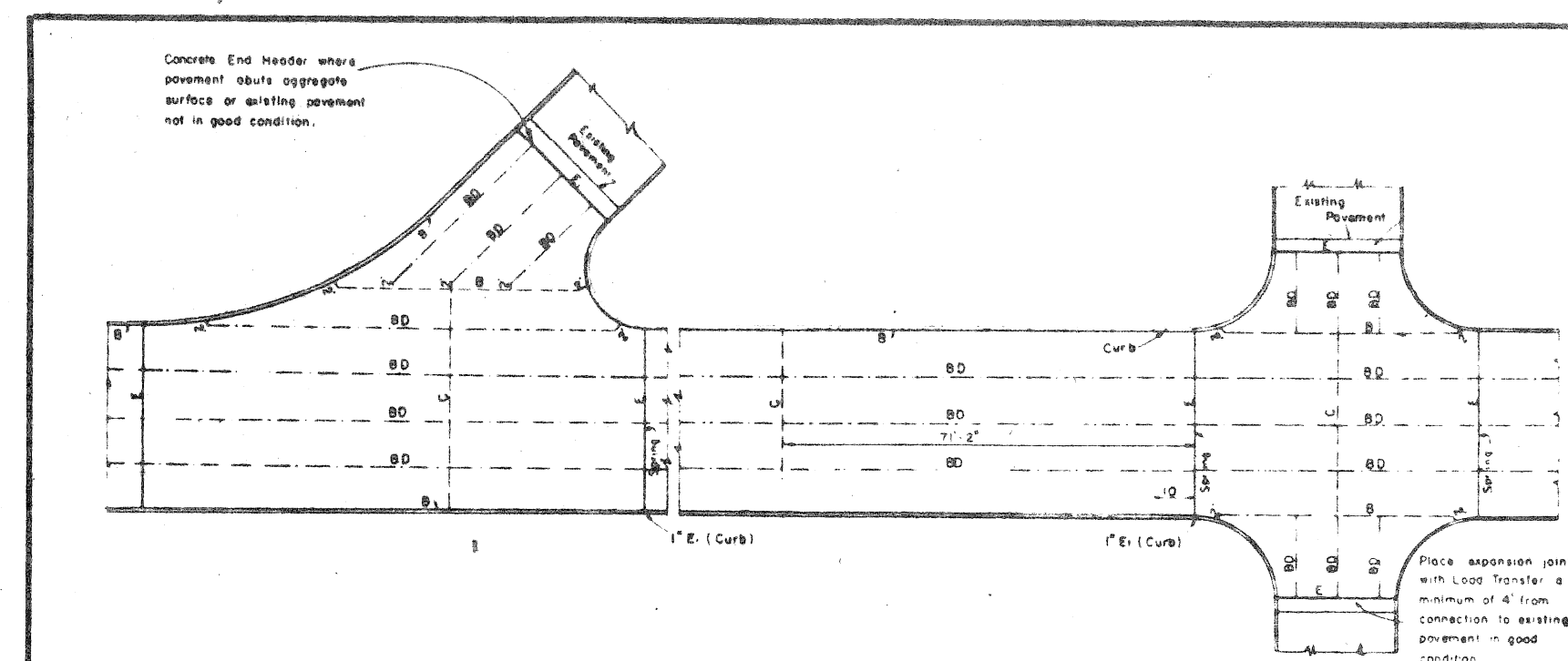


DESIGNED BY <i>L. P. King</i>		APPROVED <i>J. Erickson</i>		CITY OF DETROIT DEPARTMENT OF PUBLIC WORKS CITY ENGINEER'S OFFICE BUREAU OF DESIGN		PAVEMENT REINFORCEMENT	
DRAWN BY <i>R. H. Hicks</i>		ENGINEER OF STREETS		BOOR NO.		SCALE	
TRACED BY <i>Edward Berarducci</i>		ASST. CITY ENGINEER		PAGE NO.		DATE 5-18-63	
CHECKED BY <i>Edward Berarducci</i>		CITY ENGINEER		DWG. NO. C-4942		1968	
DESCRIPTION REVISIONS		DRAWN / CKD / APR / DATE		CHECKED BY		1968	



GENERAL NOTES:  
 All Steel Bars, Bolt, and Filler used in Pavement Joints will be considered incidental to the construction of Pavement or Base Course. The Bars shall be deformed.  
 Drawings on this sheet are not to scale.

DESIGNED BY <i>J. Jackson</i>		APPROVED <i>J. Jackson</i> CITY ENGINEER		CITY OF DETROIT DEPARTMENT OF PUBLIC WORKS CITY ENGINEER'S OFFICE BUREAU OF DESIGN DETAIL NO. 24		REINFORCED CONCRETE PAVEMENT JOINTS AND CURB	
DRAWN BY <i>A. H. Hecker</i>		TRACED BY <i>A. H. Hecker</i>		FORM C of D-346 SH A		BOOK NO. SCALE DRG NO. C-4943	
CHECKED BY <i>J. Kawas</i>		CITY ENGINEER				PAGE NO. DATE 4-21-66	

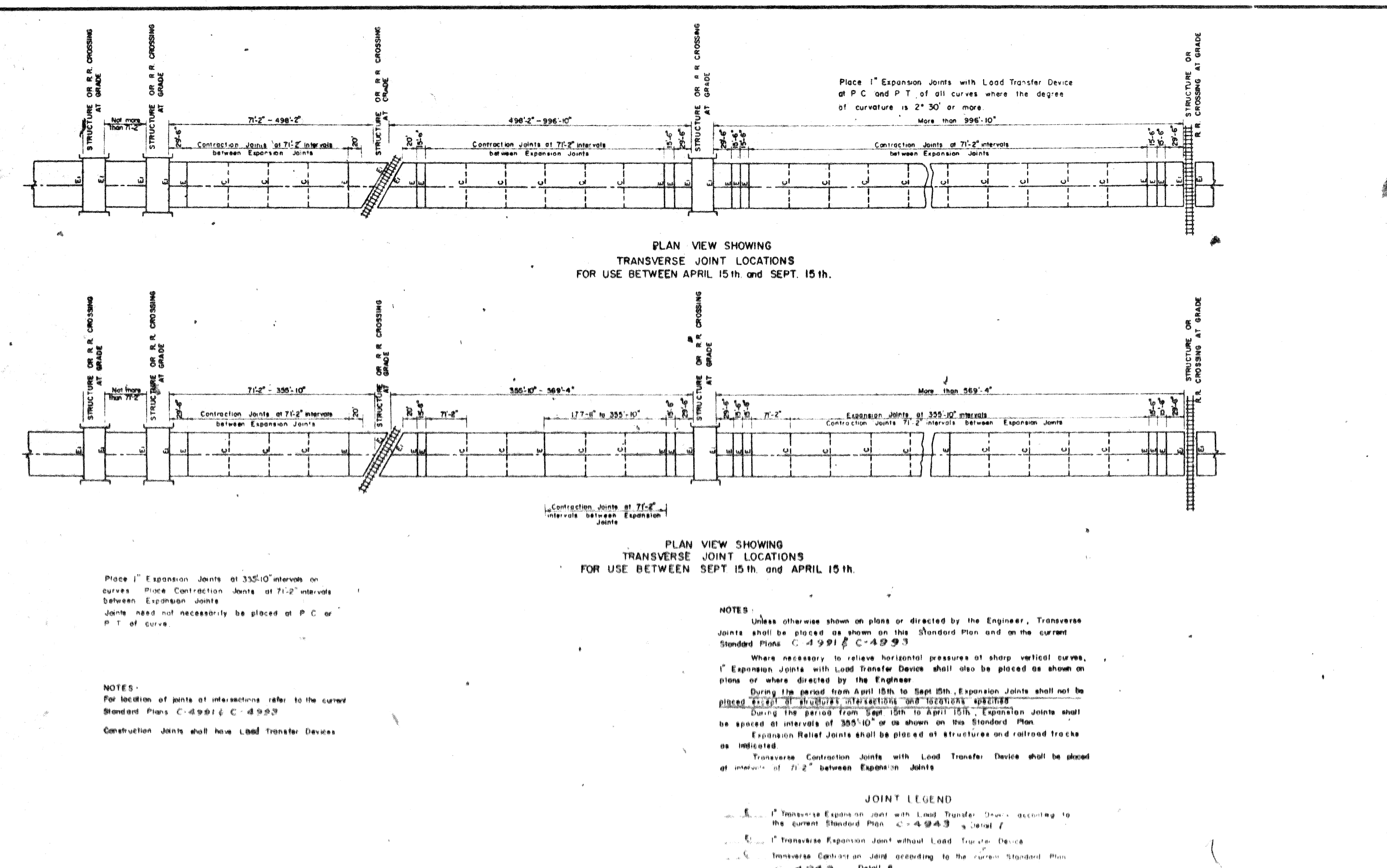


TRANSVERSE JOINTS IN CONCRETE PAVEMENT  
 (Refer to standard plan)  
 TRANSVERSE JOINTS IN CURB, GUTTER, CURB AND GUTTER DRIVEWAY RETURNS AND OPENINGS ABUTTING A CONCRETE PAVEMENT  
 Unless otherwise shown on plans, place transverse joints as follows:  
 One inch expansion joints in line with all transverse construction joints in concrete pavement.  
 Construction joints in line with all transverse construction joints in concrete pavement. Place joints of weakness joint in each end of driveway returns and openings.  
 For load transfer, place intermediate joints of weakness joints at 10' intervals between the above joints.  
 TRANSVERSE JOINTS IN CONCRETE PAVEMENT  
 Unless otherwise shown on plans, place transverse joints as follows:  
 One inch expansion joints with load transfer device at the spring of vehicle and elsewhere as shown on special details or on the current Standard Plan, C-4943.  
 Construction joints with load transfer device placed at 7 1/2' intervals between expansion joints, and elsewhere at uniform intervals of 7 1/2' or greater if so joint.

JOINT LEGEND FOR PAVEMENT JOINTS  
 1. Expansion Joint with Load Transfer Device  
 2. Transverse Expansion Joint without Load Transfer Device  
 3. Longitudinal Lane Tie Joint  
 4. Transverse Contraction Joint in Concrete Pavement  
 5. Longitudinal Bulkhead Construction Joint  
 6. Longitudinal Bulkhead Construction Joint for future pavement widening  
 7. Transverse Plane of Weakness Joint for concrete base course  
 8. Longitudinal Bulkhead Construction Joint for widening existing concrete pavement  
 9. Joint Dowel Hook Bolt  
 10. Joint Dowel Hook Bolt

JOINT LEGEND FOR CURB STRUCTURE AND SIDEWALK  
 1. Expansion Joint without Load Transfer Device  
 2. Transverse Contraction Joint

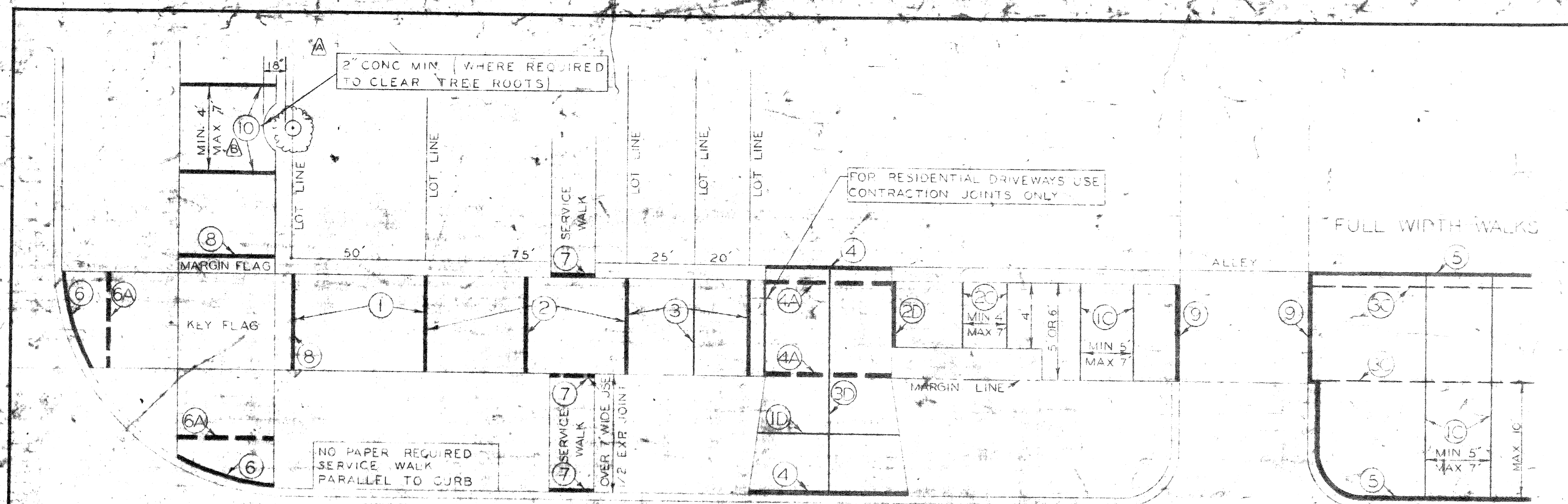
DESIGNED BY <i>J. Jackson</i>		APPROVED <i>J. Jackson</i> CITY ENGINEER		CITY OF DETROIT DEPARTMENT OF PUBLIC WORKS CITY ENGINEER'S OFFICE BUREAU OF DESIGN DETAIL NO. 27		TYPICAL JOINT LAYOUT FOR REINFORCED CONCRETE PAVEMENT	
DRAWN BY <i>A. H. Hecker</i>		TRACED BY <i>A. H. Hecker</i>		FORM C of D-346 SH A		BOOK NO. SCALE DRG NO. C-499	
CHECKED BY <i>J. Kawas</i>		CITY ENGINEER				PAGE NO. DATE 4-21-66	



NOTES:  
 Unless otherwise shown on plans or directed by the Engineer, Transverse joints shall be placed as shown on the Standard Plan and on the current Standard Plan, C-4943 & C-4943.  
 Where necessary to relieve horizontal pressures of sharp vertical curves, Expansion joints with Load Transfer Device shall also be placed as shown on plans or where directed by the Engineer.  
 During the period from April 15th to Sept 15th, Expansion joints shall not be placed at intervals of 355' 10" or more.  
 During the period from Sept 15th to April 15th, Expansion joints shall be placed at intervals of 355' 10" or as shown on the Standard Plan.  
 Expansion Relief Joints shall be placed at structures and railroad tracks as indicated.  
 Transverse Contraction Joints with Load Transfer Device shall be placed at intervals of 7 1/2' between Expansion Joints.

DESIGNED BY <i>J. Jackson</i>		APPROVED <i>J. Jackson</i> CITY ENGINEER		CITY OF DETROIT DEPARTMENT OF PUBLIC WORKS CITY ENGINEER'S OFFICE BUREAU OF DESIGN DETAIL NO. 28		LOCATION OF TRANSVERSE EXPANSION & CONTRACTION JOINTS IN CONCRETE PAVEMENT (REINFORCED)	
DRAWN BY <i>A. H. Hecker</i>		TRACED BY <i>A. H. Hecker</i>		FORM C of D-346 SH A		BOOK NO. SCALE DRG NO. C-4992	
CHECKED BY <i>J. Kawas</i>		CITY ENGINEER				PAGE NO. DATE 4-21-66	





**EXPANSION JOINTS**

- ① PLACE 1/2" PAPER EXPANSION JOINTS AT LOT LINES WHEN LOT LINES ARE BETWEEN 25' AND 50' APART
- ② PLACE ADDITIONAL 1/2" PAPER EXPANSION JOINTS SO THAT THE DISTANCE BETWEEN JOINTS DOES NOT EXCEED 50' WHEN LOT LINES ARE OVER 50' APART
- ③ PLACE 1/2" PAPER EXPANSION JOINTS AT EVERY 2ND LOT LINE AND CONTRACTION JOINT AT INTERVENING LOT LINE WHEN LOT LINES ARE LESS THAN 25' APART
- ④ PLACE 1" PAPER EXPANSION JOINTS AT CURB AND BUILDING OR PROPERTY LINE OR AT ALTERNATE POSITION ④A AS SHOWN, FOR DRIVEWAY
- ⑤ PLACE 1" PAPER EXPANSION JOINTS AT CURB AND BUILDING OR PROPERTY LINE FOR FULL WIDTH SIDEWALK EXCEEDING 7' IN WIDTH
- ⑥ PLACE 1" PAPER EXPANSION JOINTS AT CURB CIRCLES OR AT ALTERNATE POSITION ⑥A AS SHOWN
- ⑦ PLACE 1/2" PAPER EXPANSION JOINTS AT INTERSECTIONS OF SERVICE WALKS AND SIDEWALKS, AND SERVICE WALKS AND CURBS
- ⑧ PLACE 1" PAPER EXPANSION JOINTS AT MARGIN FLAGS AT CROSSWALKS
- ⑨ PLACE 1" PAPER EXPANSION JOINTS AT ALLEY APRONS
- ⑩ PLACE 1/2" PAPER EXPANSION JOINT EITHER SIDE OF SIDEWALK FLAG ABUTTING TREE

**CONTRACTION JOINTS**

- ⑩ PLACE CONTRACTION JOINTS AT INTERVALS OF NOT LESS THAN 5' NOR MORE THAN 7' ON WALKS 5' WIDE OR WIDER, INCLUDING FULL WIDTH WALKS
- ⑪ PLACE CONTRACTION JOINTS AT INTERVALS OF NOT LESS THAN 4' NOR MORE THAN 7' ON WALKS 4' WIDE
- ⑫ PLACE CONTRACTION JOINTS AT THE MARGIN LINE ON FULL WIDTH WALKS (OPTIONAL)
- ⑬ PLACE CONTRACTION JOINTS IN DRIVEWAYS SO THAT NO STORE WILL EXCEED THE DIMENSIONS OF 15' BY 15'
- ⑭ PLACE CONTRACTION JOINTS AT THE CENTER LINE OF DRIVEWAYS (OPTIONAL)
- ⑮ PLACE CONTRACTION JOINTS AT THE CENTER LINE OF DRIVEWAYS EXCEEDING 15' IN WIDTH

**DRIVEWAYS**

- ⑬ PLACE CONTRACTION JOINTS IN DRIVEWAYS SO THAT NO STORE WILL EXCEED THE DIMENSIONS OF 15' BY 15'
- ⑭ PLACE CONTRACTION JOINTS AT THE CENTER LINE OF DRIVEWAYS (OPTIONAL)
- ⑮ PLACE CONTRACTION JOINTS AT THE CENTER LINE OF DRIVEWAYS EXCEEDING 15' IN WIDTH

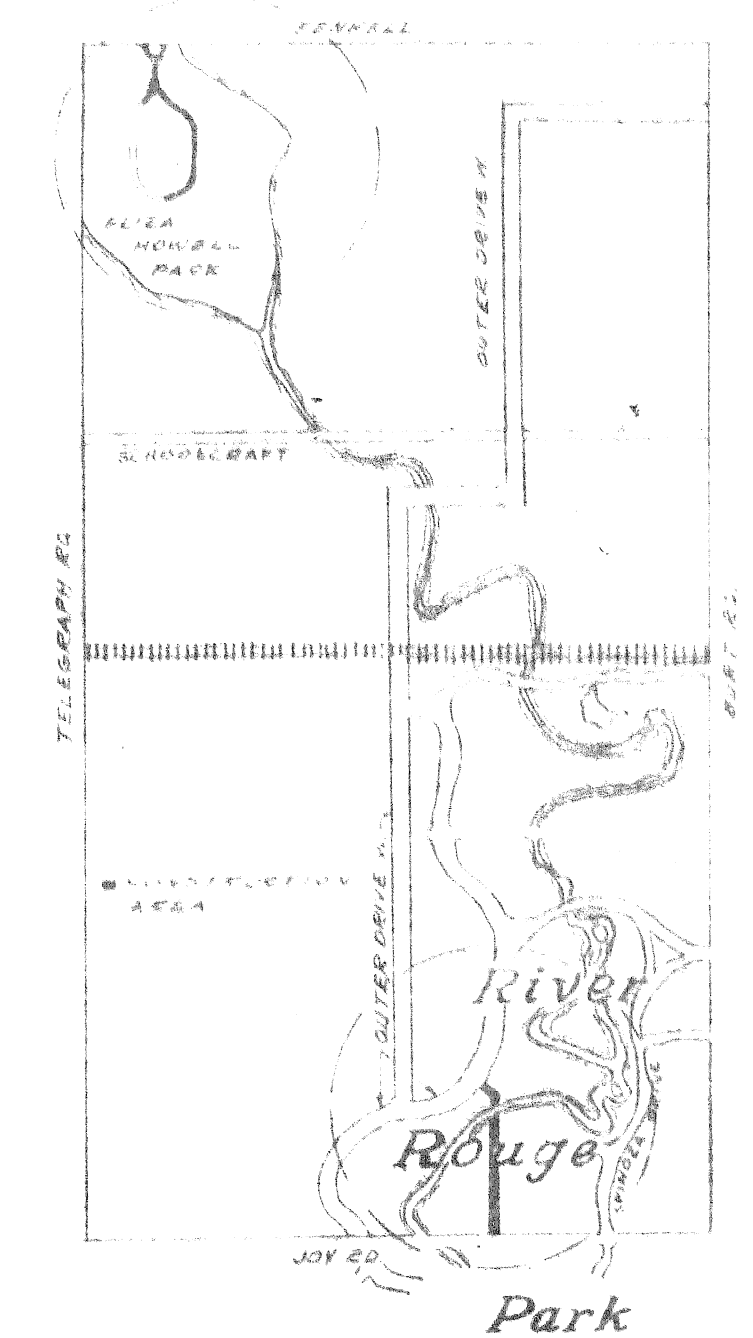
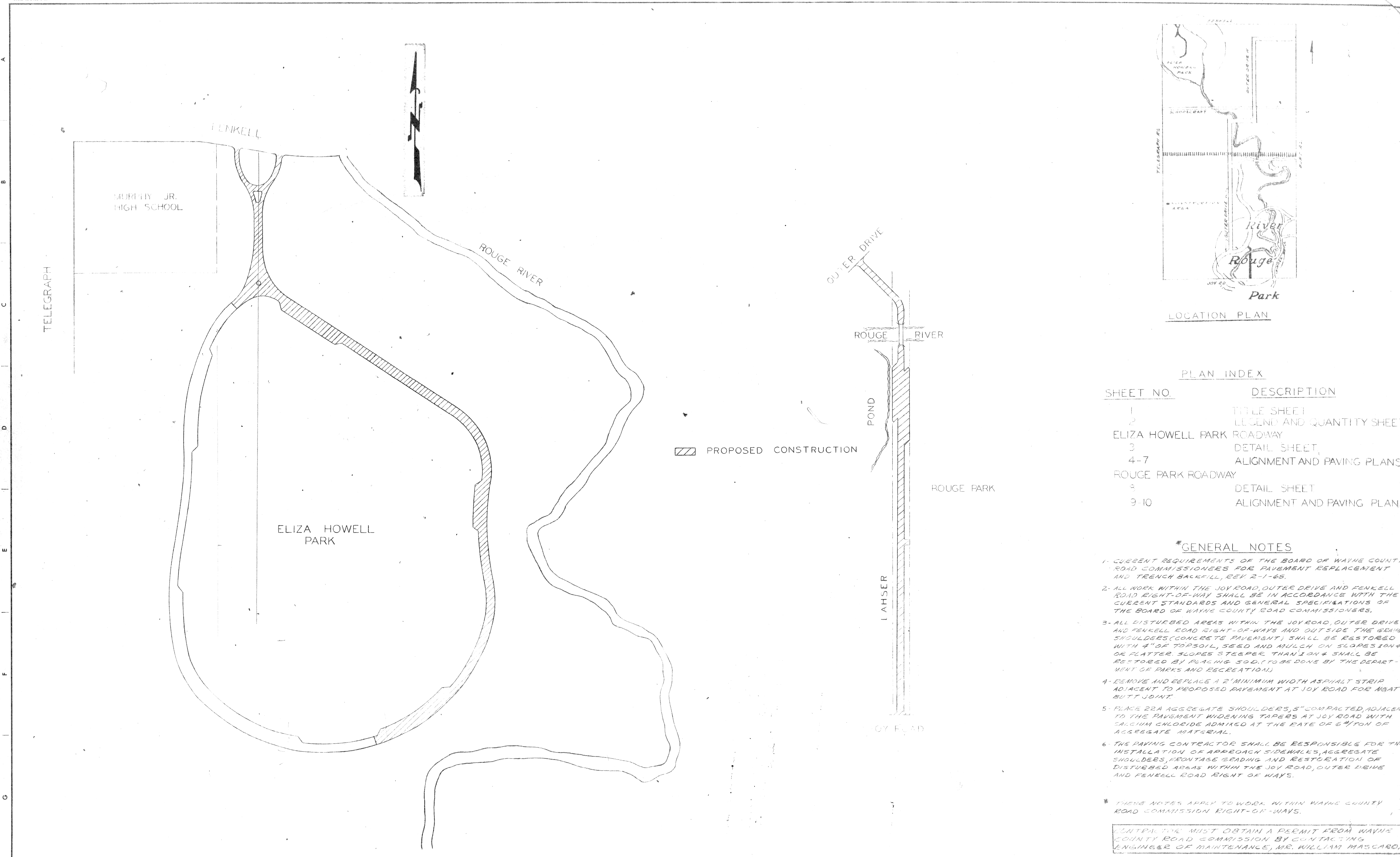
**LEGEND**

- LOT, PROPERTY AND CURB LINES
- WALK AND DRIVEWAY AREA
- EXPANSION JOINT
- EXPANSION JOINT ALTERNATE POSITION
- CONTRACTION JOINT
- CONTRACTION JOINT ALTERNATE POSITION
- MARGIN LINE

REVISED 1963 1964 1965 1966 1967 1968

DESIGNED BY <i>[Signature]</i>		APPROVED <i>[Signature]</i>		<b>CITY OF DETROIT</b> DEPARTMENT OF PUBLIC WORKS CITY ENGINEERS OFFICE BUREAU OF STREET DESIGN	SHEET NO. 4417
CHECKED BY <i>[Signature]</i>		DATE 1968			
REVISIONS A ADDED EXP. JOINT B CHANGED TREE DETAIL		DATE 1968		DATE 1968	

WORK FROM THIS PLAN SHALL BE APPROVED BY THE ENGINEER



PLAN INDEX

SHEET NO.	DESCRIPTION
1	TITLE SHEET
2	LEGEND AND QUANTITY SHEET
ELIZA HOWELL PARK ROADWAY	
3	DETAIL SHEET
4-7	ALIGNMENT AND PAVING PLANS
ROUGE PARK ROADWAY	
8	DETAIL SHEET
9-10	ALIGNMENT AND PAVING PLANS

- \*GENERAL NOTES**
- CURRENT REQUIREMENTS OF THE BOARD OF WAYNE COUNTY ROAD COMMISSIONERS FOR PAVEMENT REPLACEMENT AND TRENCH BACKFILL, REV 2-1-65.
  - ALL WORK WITHIN THE JOY ROAD, OUTER DRIVE AND FENKELL ROAD RIGHT-OF-WAY SHALL BE IN ACCORDANCE WITH THE CURRENT STANDARDS AND GENERAL SPECIFICATIONS OF THE BOARD OF WAYNE COUNTY ROAD COMMISSIONERS.
  - ALL DISTURBED AREAS WITHIN THE JOY ROAD, OUTER DRIVE AND FENKELL ROAD RIGHT-OF-WAYS AND OUTSIDE THE EXISTING SHOULDERS (CONCRETE PAVEMENT) SHALL BE RESTORED WITH 4" OF TOPSOIL, SEED AND MULCH ON SLOPES 10% OR FLATTER. SLOPES STEEPER THAN 10% SHALL BE RESTORED BY PLACING SOD. (TO BE DONE BY THE DEPARTMENT OF PARKS AND RECREATION)
  - REMOVE AND REPLACE A 2' MINIMUM WIDTH ASPHALT STRIP ADJACENT TO PROPOSED PAVEMENT AT JOY ROAD FOR NEAT BUTT JOINT.
  - PLACE 22A AGGREGATE SHOULDERS, 5" COMPACTED, ADJACENT TO THE PAVEMENT WIDENING TAPERS AT JOY ROAD WITH CALCIUM CHLORIDE ADMIXED AT THE RATE OF 6#/TON OF AGGREGATE MATERIAL.
  - THE PAVING CONTRACTOR SHALL BE RESPONSIBLE FOR THE INSTALLATION OF APPROACH SIDEWALKS, AGGREGATE SHOULDERS, FRONTAGE GRADING AND RESTORATION OF DISTURBED AREAS WITHIN THE JOY ROAD, OUTER DRIVE AND FENKELL ROAD RIGHT OF WAYS.
- \* THESE NOTES APPLY TO WORK WITHIN WAYNE COUNTY ROAD COMMISSION RIGHT-OF-WAYS.

CONTRACTOR MUST OBTAIN A PERMIT FROM WAYNE COUNTY ROAD COMMISSION BY CONTACTING ENGINEER OF MAINTENANCE, MR. WILLIAM MASCARO.

DESIGNED BY DRAWN BY TALLEY TRACED BY CHECKED BY		APPROVED: <i>R. R. Hicks</i> ASSISTANT CITY ENGINEER <i>Alfred Berarducci</i> CITY ENGINEER		<b>CITY OF DETROIT</b> DEPARTMENT OF PUBLIC WORKS CITY ENGINEERS OFFICE FOR DEPARTMENT OF PARKS AND RECREATION			PAVING OF ROADS IN ELIZA HOWELL PARK & ROUGE PARK URBAN BEAUTIFICATION AND IMPROVEMENT PROJECT MICH. B-9			SHEET 1 OF 10 SHEETS CONTRACT No. 112,205 DATE 12-25-58	
---	--	---	--	--	--	--	---	--	--	---	--

ITEM NO	DESCRIPTION OF ITEM	PAY UNIT	ELIZA HOWELL PARK				ROUGE PARK		TOTAL
			SHEET 4	SHEET 5	SHEET 6	SHEET 7	SHEET 8	SHEET 9	
1	EXCAVATION	CYDS.	1621	1318	1177	1915	2945	460	10,056
2	STREET PAVEMENT REMOVAL	SYDS.	-	-	-	87	-	-	87
3	SIDEWALK REMOVAL	SFT.	-	-	-	72	132	-	204
4	POST AND RAIL BARRICADE REMOVAL	LUMP SUM	-	-	-	LUMP SUM	-	LUMP SUM	LUMP SUM
5	WOOD BARRICADE REMOVAL	LUMP SUM	LUMP SUM	-	-	-	-	-	LUMP SUM
6	TCEB REMOVAL - (4" DIA)	EACH	12	20	16	1	9	16	80
7	" " (15" DIA)	EACH	5	5	1	4	4	4	23
8	" " 20" DIA	EACH	-	-	-	-	-	-	1
9	" " 24" DIA	EACH	-	-	-	-	8	10	18
10	" " 30" DIA	EACH	-	-	-	-	-	1	1
11	" " 36" DIA	EACH	-	-	-	-	4	2	6
12	STUMP REMOVAL	EACH	-	-	-	1	1	2	4
13	STONING & GRADING	SYDS.	-	-	-	-	95	-	95
14	CURB REMOVAL	LFT.	-	-	-	108	-	-	108
15	MANHOLE (R.I.C.), ADJUSTMENT	EACH	-	-	-	-	3	1	4
16	MANHOLE (SEWER), ADJUSTMENT	EACH	-	1	-	-	-	-	1
17	MANHOLE-RECONSTRUCT CONE	EACH	-	1	-	-	-	-	1
18	MANHOLE-STANDARD, NEW	EACH	-	-	-	1	-	3	4
19	CATCH BASIN NEW	EACH	-	4	2	6	2	11	25
20	CATCH BASIN-ABANDONMENT	EACH	-	1	6	2	-	-	9
21	CATCH BASIN-ADJUSTMENT	EACH	4	4	2	1	-	-	11
22	CATCH BASIN-CAPPED	EACH	-	6	9	5	-	-	20
23	CATCH BASIN FRAME AND COVER REPLACEMENT	EACH	-	-	-	1	2	-	3
24	CATCH BASIN INLET WITH SALVAGED FRAME AND COVER	EACH	-	-	-	2	1	-	3
25	SEWER - 12" PIPE	LFT.	-	80	30	405	35	795	1325
26	SEWER - 15" PIPE	LFT.	-	-	-	380	-	265	645
27	SEWER - 12" PIPE, C-76 CLASS II	LFT.	-	-	-	155	47	-	202
28	SEWER - 12" CORRUGATED PIPE	LFT.	123	-	-	-	-	16	139
29	SEWER - 15" CORRUGATED PIPE	LFT.	-	-	-	-	-	16	16
30	REINFORCED CONCRETE CURB AND GUTTER	LFT.	1975	2125	1816	2553	2162	2212	12,843
31	PAVING - 6" BASE COURSE	SYDS.	5317	5028	4649	5280	543	4334	25,151
32	PAVING - 8" BASE COURSE	SYDS.	-	-	-	-	2277	-	2277
33	BITUMINOUS PRIME COAT	GALS.	1772	1676	1550	1760	940	1445	9143
34	AGGREGATE SHOULDER	SYDS.	-	-	-	-	65	-	65
35	STRIPPING	SYDS.	-	-	-	-	30	-	30
36	BOND COAT	GALS.	-	-	-	-	5	-	5
37	CONCRETE HEADER	LFT.	-	-	-	-	26	-	26
38	SEPARATE TYPE CURB	LFT.	-	-	-	63	-	-	63
39	SIDEWALK 4" STANDARD*	SFT.	-	-	-	522	222	-	744
40	STALL MARKINGS	LFT.	-	-	-	-	-	1459	1459
41	MAINTAIN TRAFFIC	LUMP SUM	-	-	-	-	-	-	LUMP SUM
42	SURFACING MIXTURES IN PLACE (ALL NATURAL AGGREGATES)								
	A) FINE BINDER COURSE MIXTURE	TONS	439	415	383	436	295	358	2326
	B) WEARING SURFACE MIX. 31A	TONS	292	277	256	290	158	239	1512
43	SURFACING MIXTURES IN PLACE (ALL SLAG AGGREGATES)								
	A) FINE BINDER COURSE MIXTURE	TONS	402	380	351	400	270	328	2131
	B) WEARING SURFACE MIX. 31A	TONS	275	261	241	274	149	225	1425

\*CONSTRUCTION ONLY

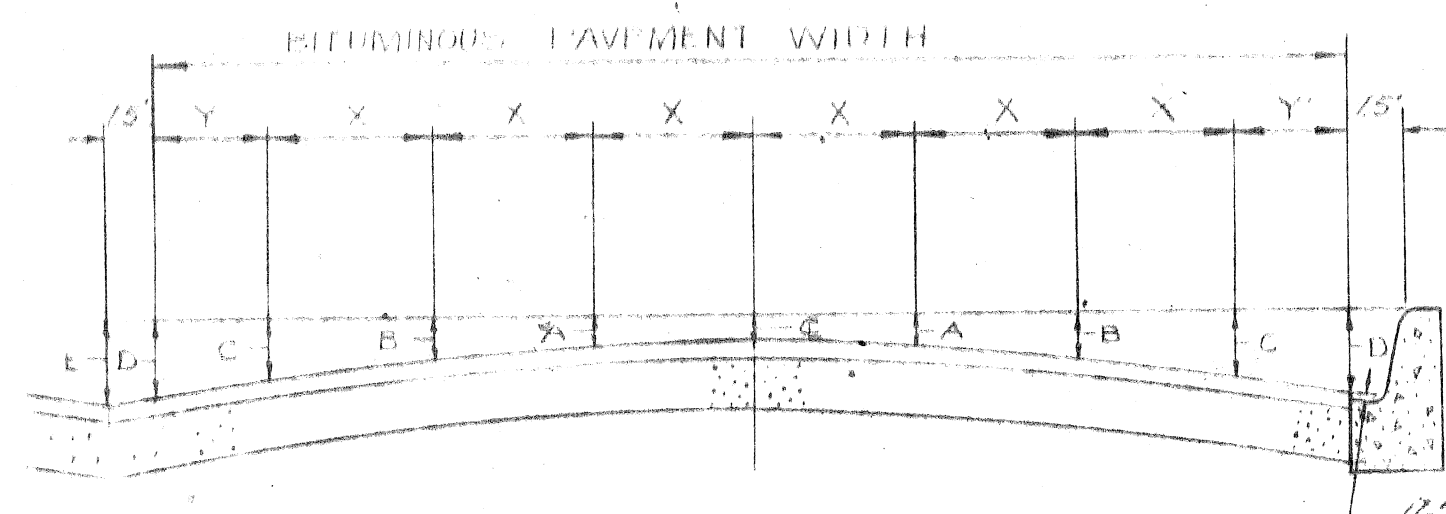
### LEGEND

- ① ADJUST EXISTING CATCH BASINS
- ② ADJUST EXISTING MANHOLES AND MANHOLES
- ③ CONSTRUCT STANDARD CATCH BASINS
- ④ CONSTRUCT STANDARD MANHOLES
- ⑤ ABANDON EXISTING CATCH BASINS\*\*
- ⑥ STONING AND GRADING
- ⑦ BUILD CATCH BASIN INLET WITH 12" CONCRETE PIPE C-76 CLASS II - SEE SH. # 3 OF 10
- ⑧ ADJUST AND PLACE MANHOLE FRAME AND COVER\*\*\*
- ⑨ CONSTRUCT STANDARD 4" CONCRETE WALL
- ⑩ CAP AND BURY EXISTING CATCH BASINS
- ⑪ CITY SURVEY CONTROL MONUMENT
- ⑫ EXISTING CATCH BASIN
- ⑬ PROPOSED CATCH BASIN
- ⑭ EXISTING SEWER MANHOLE
- ⑮ PROPOSED SEWER MANHOLE
- ⑯ R.I.C. POLE
- ⑰ STALL MARKINGS
- ⑱ WALK REMOVAL
- ⑲ R.I.C. MANHOLE AND CONDUIT
- ⑳ EXISTING SEWER LINE
- ㉑ PROPOSED SEWER LINE
- ㉒ WATER LINE

\*\*CATCH BASINS ARE TO BE ABANDONED AND DRAINAGE MAINTAINED IN THE MANNER SHOWN ON STANDARD DRAWING C-4390.

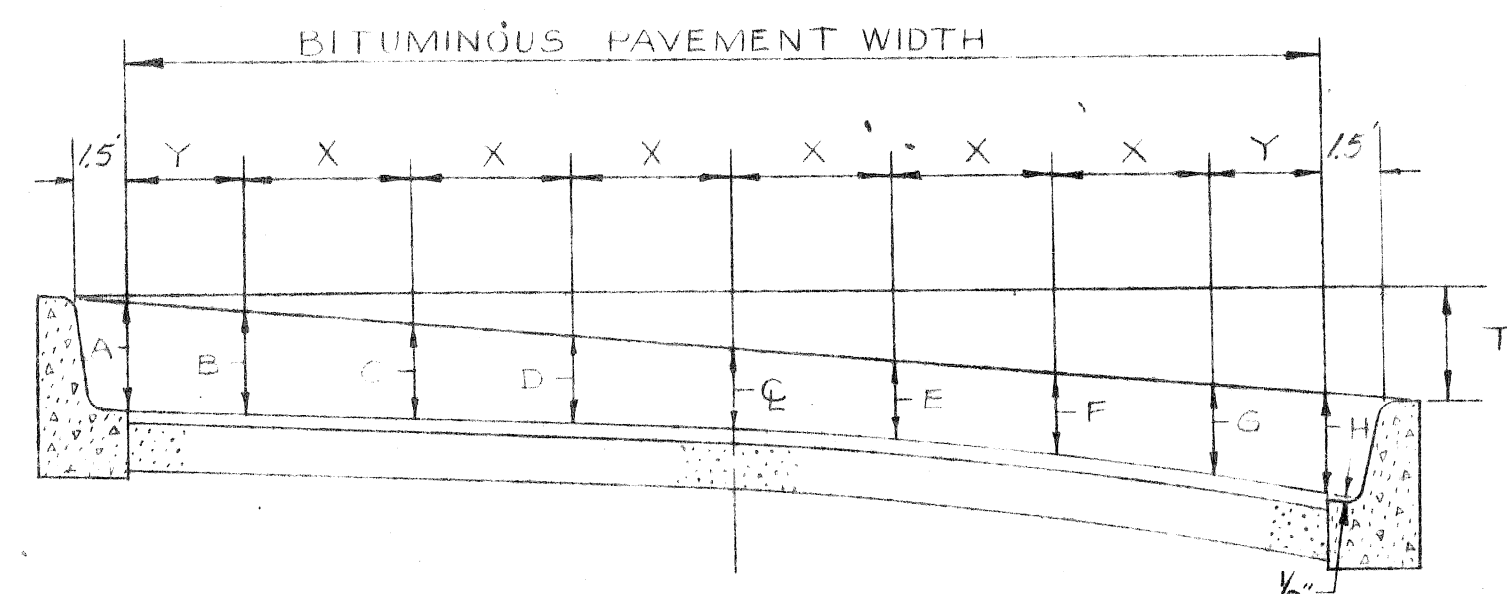
\*\*\*PER WAYNE COUNTY ROAD COMMISSION STANDARDS

REVISIONS LOCATED BY COORDINATES ON SHEET	DESIGNED BY	APPROVED	<b>CITY OF DETROIT</b> DEPARTMENT OF PUBLIC WORKS CITY ENGINEERS OFFICE FOR DEPARTMENT OF PARKS AND RECREATION	PAVING OF ROADS IN ELIZA HOWELL PARK & ROUGE PARK URBAN REHAUSICATION AND IMPROVEMENT PROJECT (MCH. B.9)	SHEET 10 OF 10 SHEETS
	DRAWN BY CHECKED BY	ENGINEER OF STREETS ASSISTANT CITY ENGINEER			CONTRACT NO. PR 205 APPROVAL NO. 1828A DATE 3/27/68



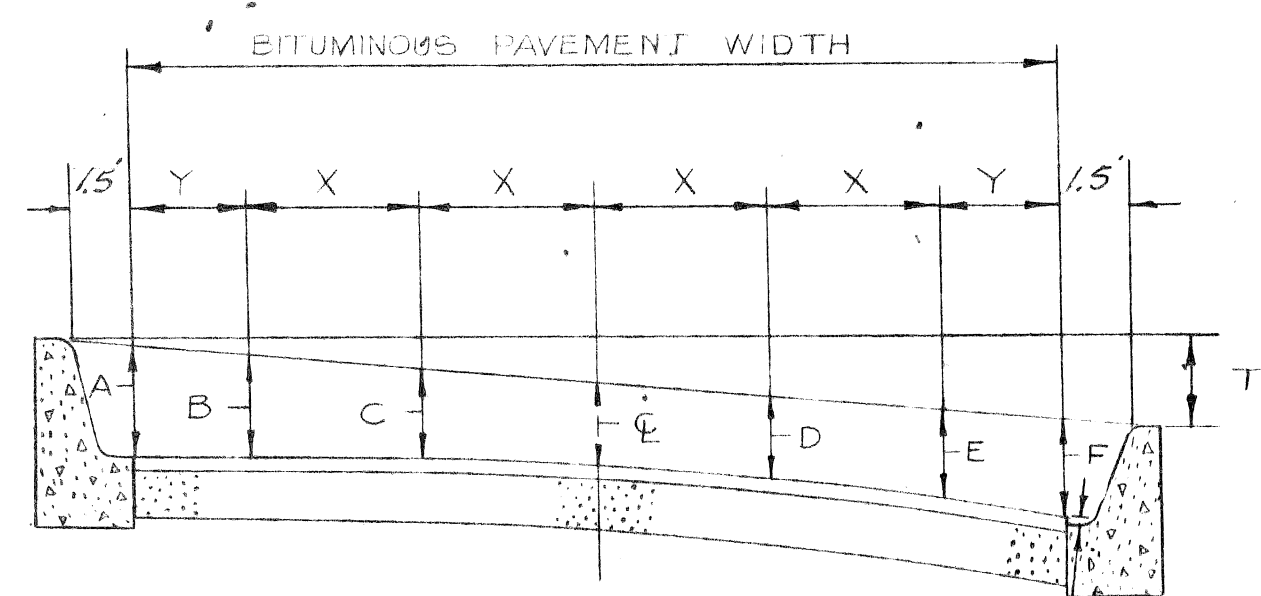
TYPICAL SECTION  
NO SCALE

ELEMENTS OF BITUMINOUS CONCRETE PAVEMENT										
WIDTH	Y	X	CURB	E	D	C	B	A	G	H
21'	1'-6"	3'	7"	6 1/8"	5 3/8"	4 1/8"	3 3/4"	3 1/2"		
37'	3'-6"	5'	7"	7"	6 1/8"	4 1/2"	2 1/8"	1 3/4"	1 1/2"	



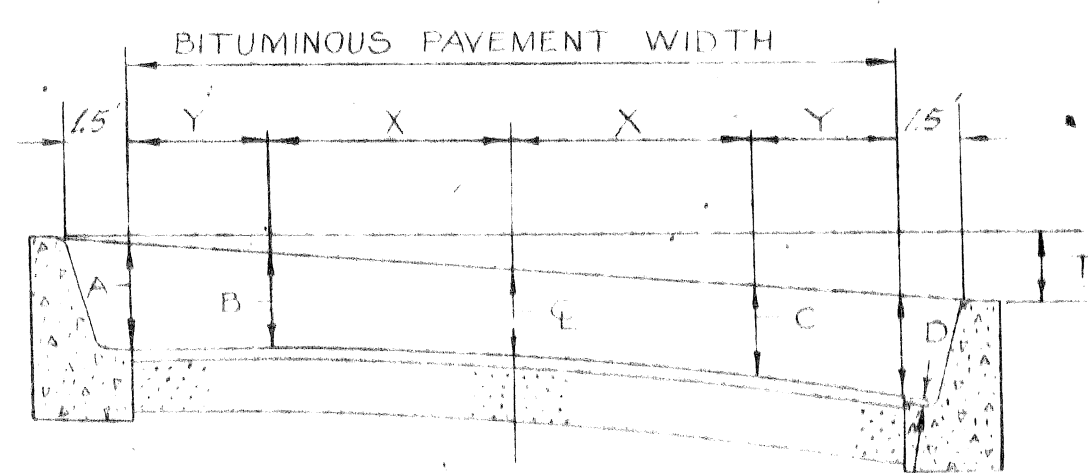
TYPICAL SECTION  
NO SCALE

ELEMENTS OF BITUMINOUS CONCRETE PAVEMENT												
WIDTH	Y	X	CURB DEPTH	T	A	B	C	D	E	F	G	H
37'	3'-6"	5'	7"	.83	6 1/8"	6 1/8"	5 3/4"	5 3/8"	5 3/8"	5 3/4"	6 1/4"	6 1/2"



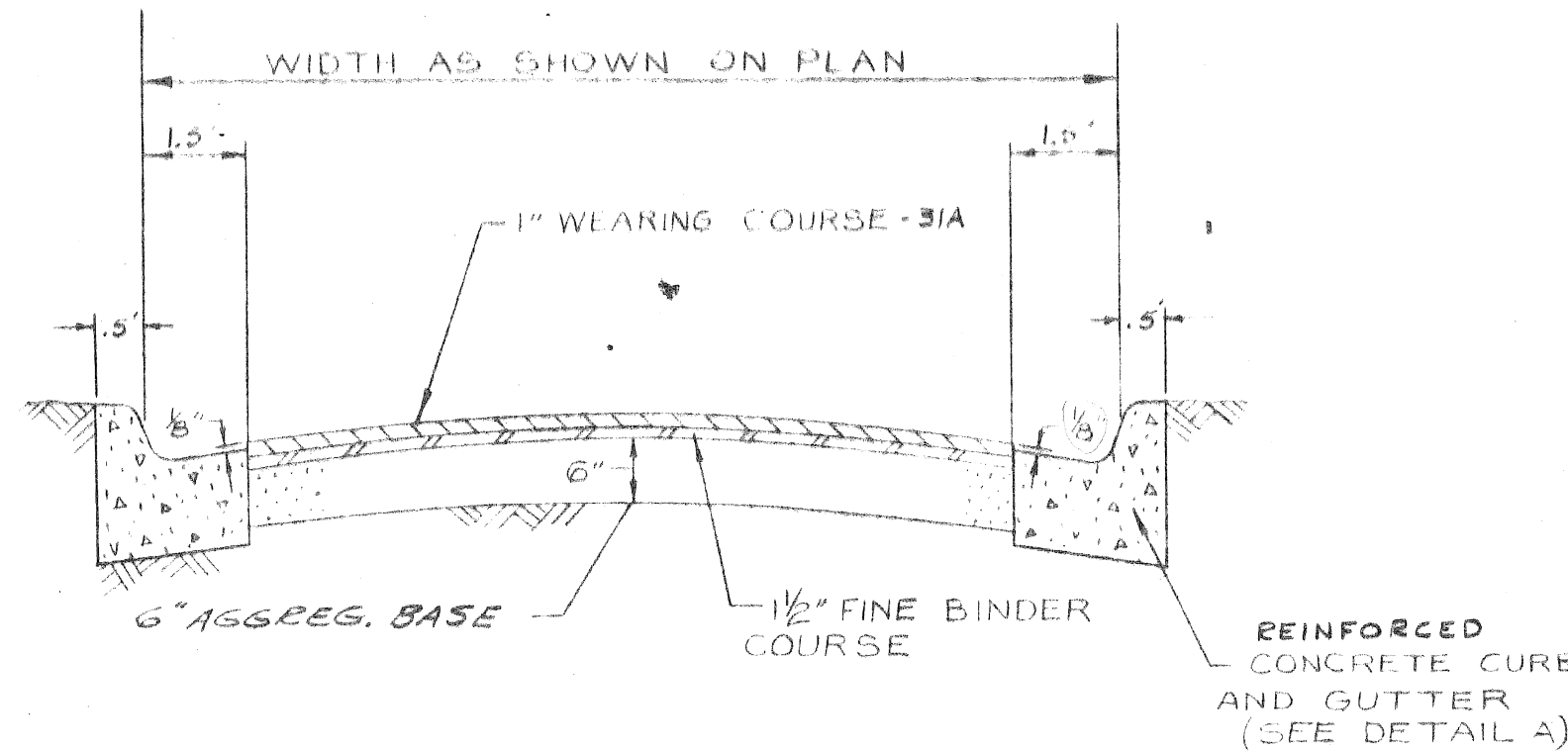
TYPICAL SECTION  
NO SCALE

ELEMENTS OF BITUMINOUS CONCRETE PAVEMENT											
WIDTH	Y	X	CURB DEPTH	T	A	B	C	D	E	F	
27'	3'-6"	5'	7"	.70	6 3/4"	6 1/4"	5 3/8"	5 3/8"	6"	6 3/8"	6 1/2"

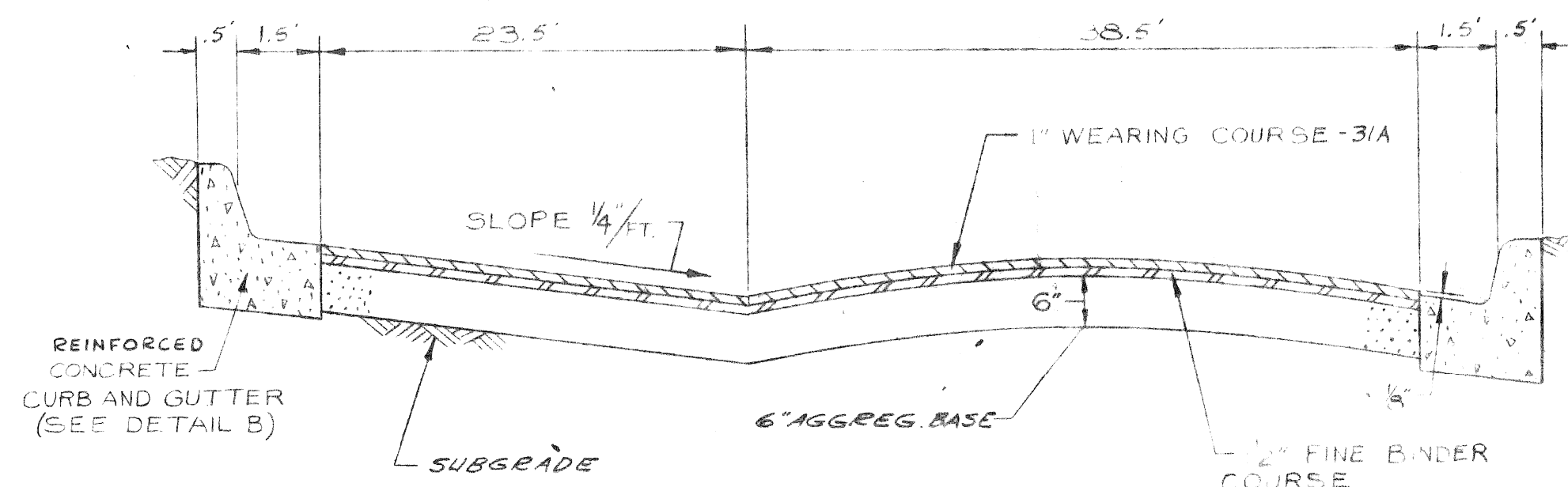


TYPICAL SECTION  
NO SCALE

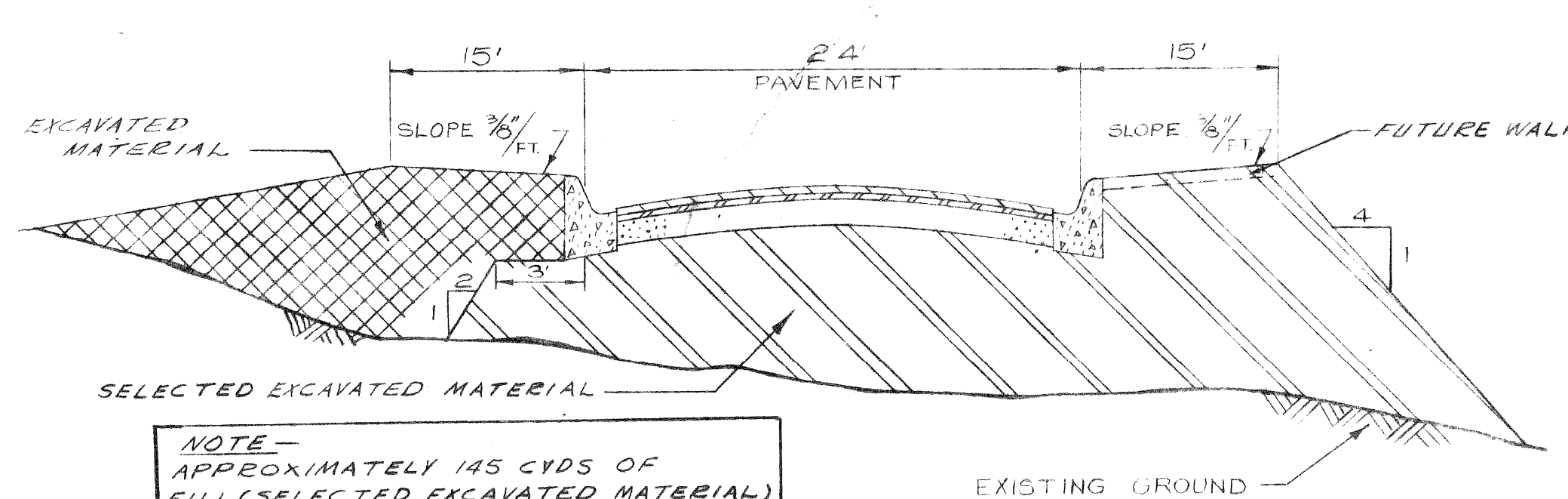
ELEMENTS OF BITUMINOUS CONCRETE PAVEMENT										
WIDTH	Y	X	CURB DEPTH	T	A	B	C	D		
17'	1'-6"	3'	7"		6 1/8"	6 1/8"	5 3/8"	5 3/8"	6 1/4"	6 1/2"



TYPICAL PAVEMENT SECTION  
NO SCALE

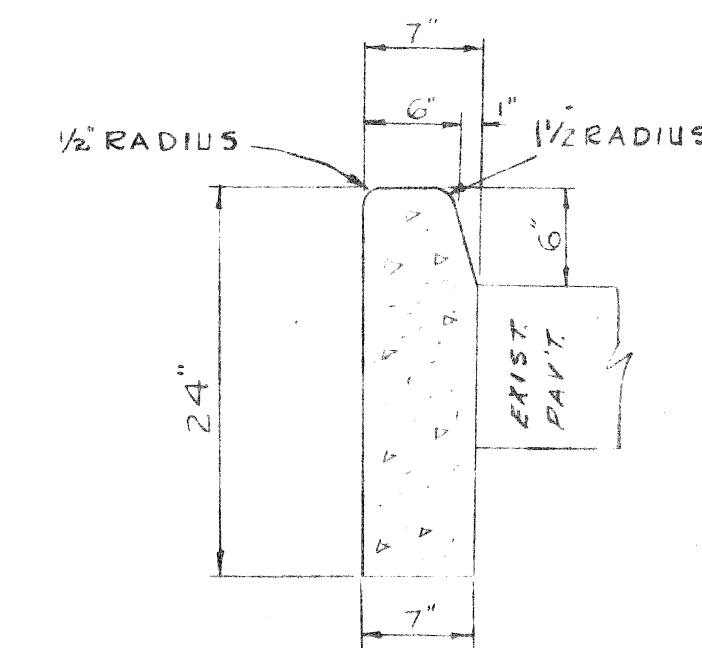


TYPICAL PARKING BAY SECTION  
NO SCALE

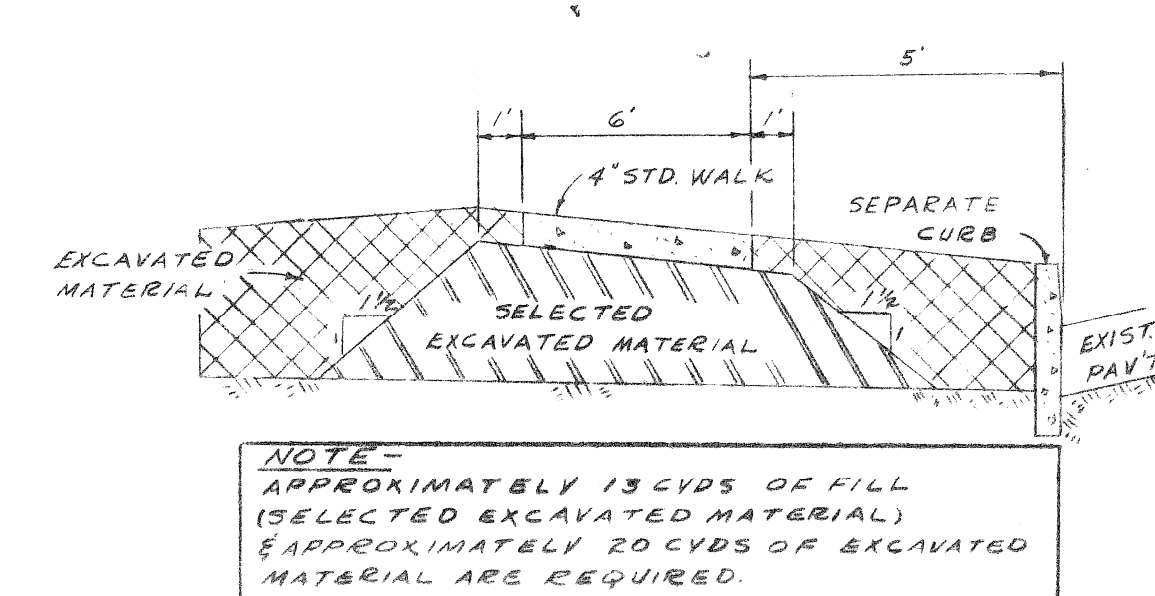


NOTE -  
APPROXIMATELY 145 CYDS OF FILL (SELECTED EXCAVATED MATERIAL)  
& APPROXIMATELY 48 CYDS OF EXCAVATED MATERIAL ARE REQUIRED.

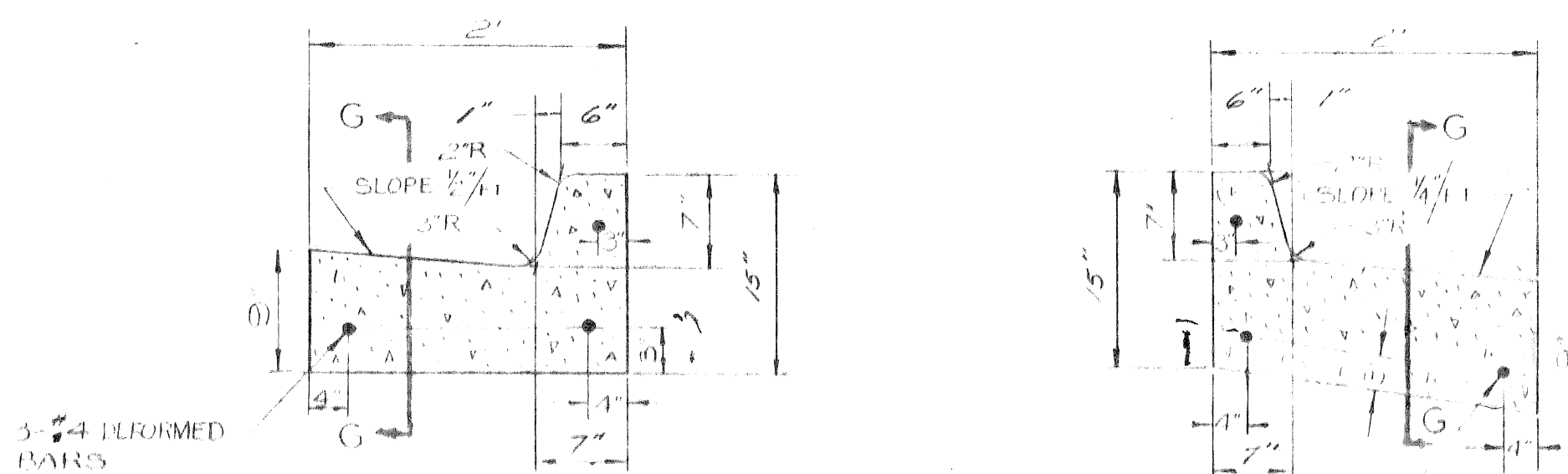
SECTION A-A  
NO SCALE



DETAIL H-H  
SEPARATE TYPE CURB & FILL SECTION  
NO SCALE



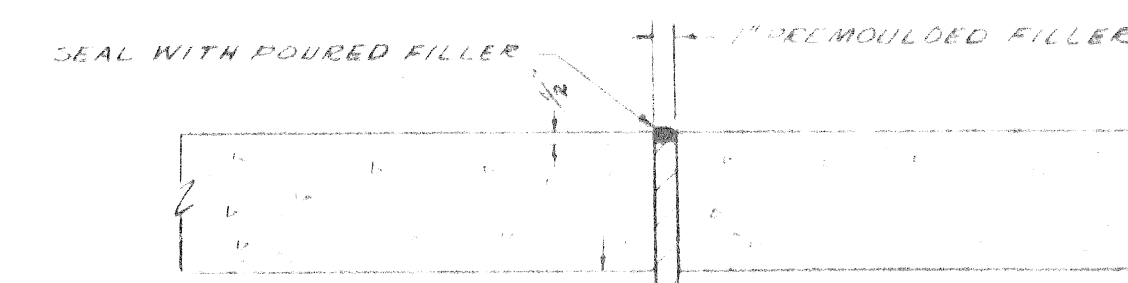
NOTE -  
APPROXIMATELY 13 CYDS OF FILL (SELECTED EXCAVATED MATERIAL)  
& APPROXIMATELY 20 CYDS OF EXCAVATED MATERIAL ARE REQUIRED.



REINFORCED CONCRETE CURB AND GUTTER SECTIONS

DETAIL A  
NO SCALE

DETAIL B  
NO SCALE

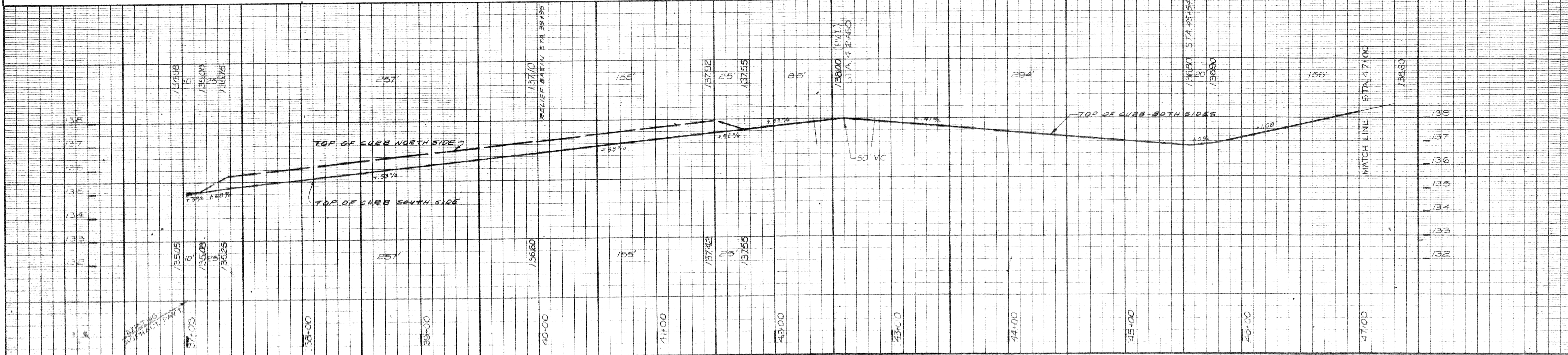
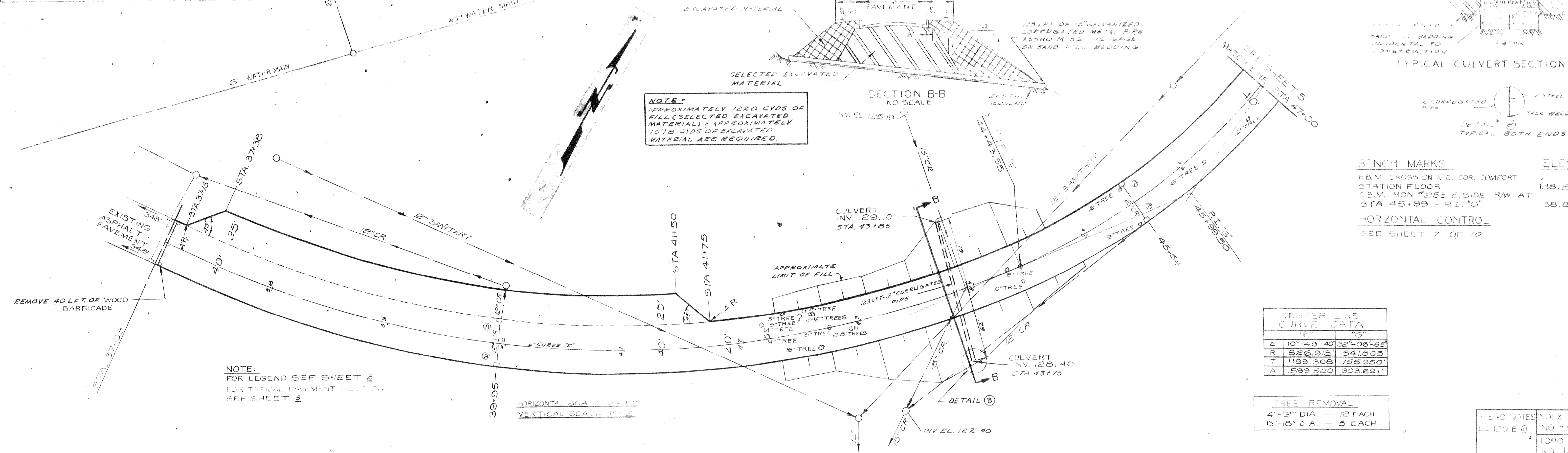


EXPANSION JOINT

SECTION G-G

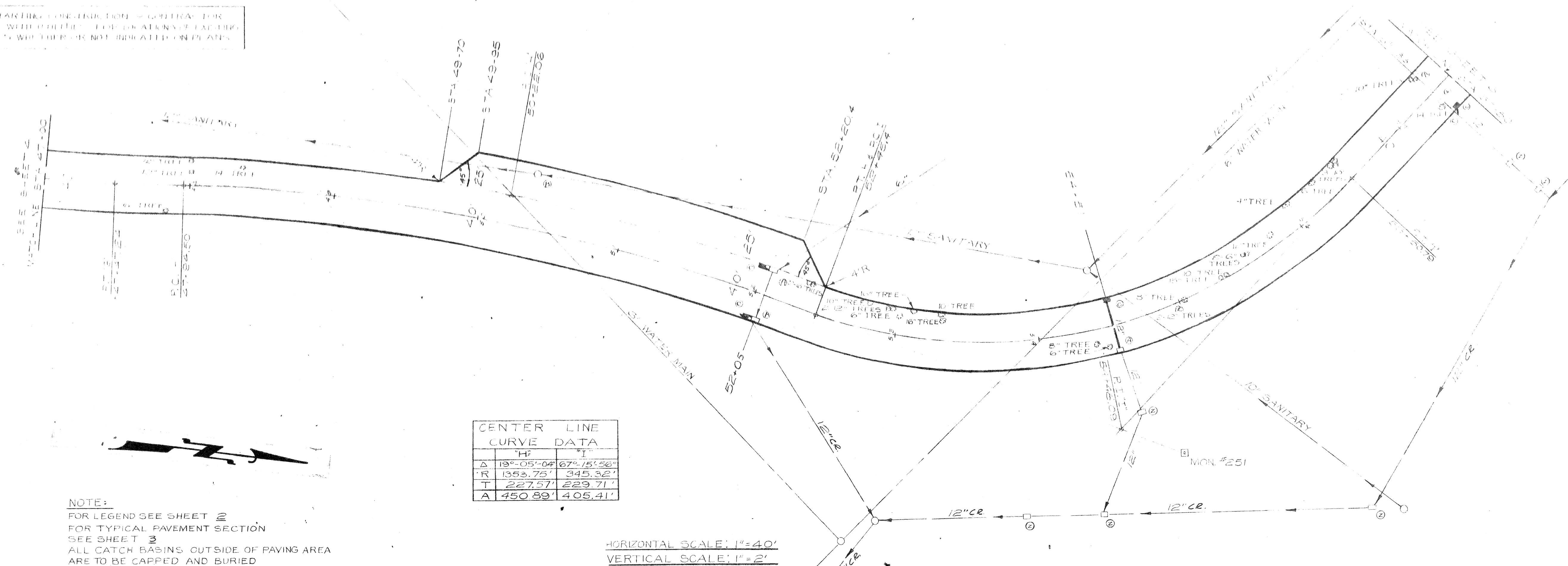
REVISIONS LOCATED BY COORDINATES ON SHEET	DESIGNED BY	TALLEY	APPROVED:	<i>J. Erickson</i>	<b>CITY OF DETROIT</b> DEPARTMENT OF PUBLIC WORKS CITY ENGINEERS OFFICE FOR DEPARTMENT OF PARKS AND RECREATION	PAVING OF ROADS IN ELIZA HOWELL PARK & ROUGE PARK URBAN BEAUTIFICATION AND IMPROVEMENT PROJECT MICH B-9 ELIZA HOWELL PARK - DETAIL SHEET 1	SHEET 2 OF 10 SHEETS
	DRAWN BY	DEU	ASSISTANT CITY ENGINEER	CONTRACT NO.			118 205
	CHECKED BY	W.L.T. R. Kamm	CITY ENGINEER	DATE			5 25 68
	REFERENCE DRAWINGS						

BEFORE STARTING CONSTRUCTION — CONTRACTOR MUST CHECK WITH UTILITIES FOR LOCATIONS OF EXISTING STRUCTURES WHETHER OR NOT INDICATED ON PLANS.



DESIGNED BY <b>TALLEY</b>	APPROVED: <i>[Signature]</i> ENGINEER OF STREETS	CITY OF DETROIT DEPARTMENT OF PUBLIC WORKS CITY ENGINEERS' OFFICE FOR DEPARTMENT OF PARKS AND RECREATION	PAVING OF ROADS IN ELIZA HOWELL PARK & ROUGE PARK URBAN BEAUTIFICATION AND IMPROVEMENT PROJECT MICH. B. 9	HEET 4 of 10 SHEETS
DRAWN BY <b>M. COLL</b>	APPLICANT CITY ENGINEER <i>[Signature]</i> CITY ENGINEER			CONTRACT NO. 10 205
FINAL CHECK <b>M. GAWNE</b>			ELIZA HOWELL PARK ALIGNMENT AND PAVING PLAN	ATTACHMENT NO. 428 A
COORD. REVISIONS LOCATED BY COORDINATES ON SHEET				DATE 3-25-68

BEFORE STARTING CONSTRUCTION - CHECK FOR  
 MOUNTAIN WITH THE CITY OF DETROIT. THE  
 INSTRUCTIONS WILL BE FOR NOT INDICATED ON PLANS.



CENTER LINE CURVE DATA	
HP	IP
Δ 19°-05'-04"	67°-15'-56"
R 1353.75'	345.32'
T 227.57'	229.71'
A 450.89'	405.41'

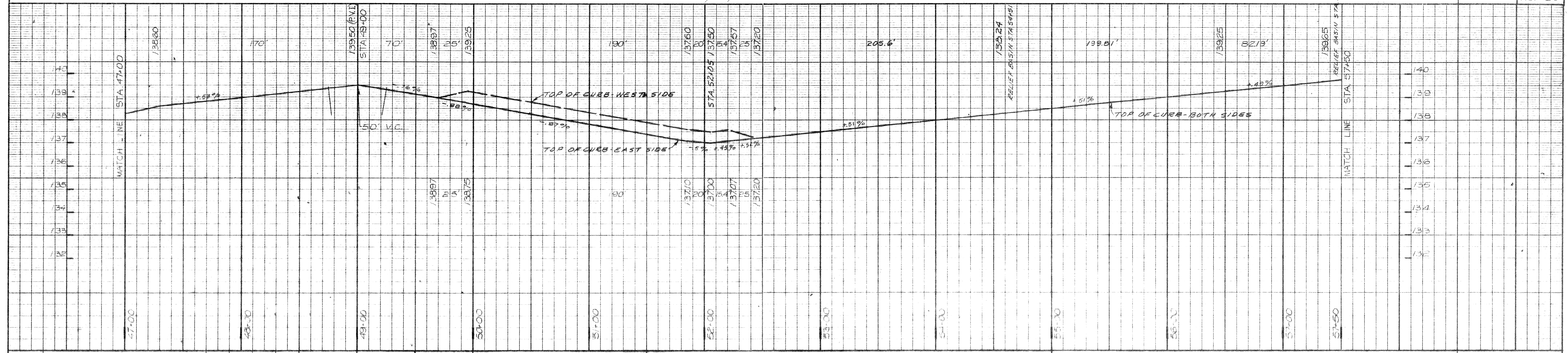
NOTE:  
 FOR LEGEND SEE SHEET 2  
 FOR TYPICAL PAVEMENT SECTION  
 SEE SHEET 3  
 ALL CATCH BASINS OUTSIDE OF PAVING AREA  
 ARE TO BE CAPPED AND BURIED

HORIZONTAL SCALE: 1"=40'  
 VERTICAL SCALE: 1"=2'

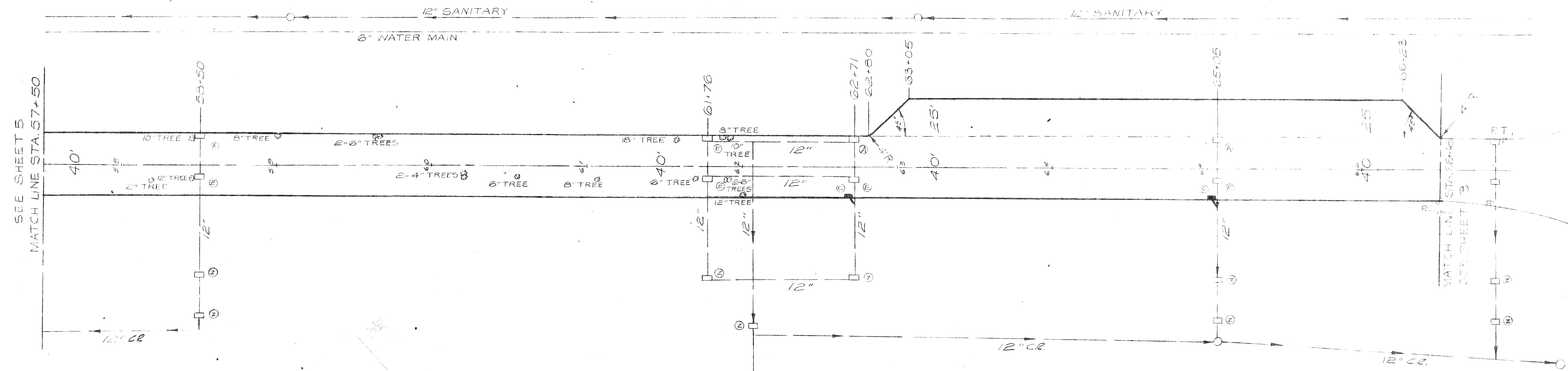
STATION FLOOR  
 STATION FLOOR 138.29  
 CAN. 10' 6" W. FROM MON. #251 143.03  
 CAN. 10' 6" W. OF R.W. 129.30  
 AT STA. 53+75  
 CBM. MON. #251 STA. 55+18 138.75  
 HORIZONTAL CONTROL  
 SEE SHEET 70F10

TREE REMOVAL  
 4"-12" DIA. - 26 EACH  
 13"-18" DIA. - 5 EACH

FIELD NOTES	INDEX
LL 120 B 0	NO. 75
	TOPO
	NO. 120



COORDINATOR	DESCRIPTION	DATE	APPROVED BY	DATE	PROJECT TITLE	SHEET NO.	TOTAL SHEETS
			TALLEY		CITY OF DETROIT DEPARTMENT OF PUBLIC WORKS DEPARTMENT OF PARKS AND RECREATION	10	10
			DRAWN BY			1	
			FINAL CHECK				
ELIZA HOWELL PARK - ALIGNMENT AND PAVING PLAN						NO. 102	10
						FORM NO. 10	
						DATE	3-25-68



NOTE:  
FOR LEGEND SEE SHEET 2  
FOR TYPICAL PAVEMENT SECTION SEE SHEET 3  
ALL CATCH BASINS OUTSIDE OF THE PAVING AREA TO BE CAPPED AND BURIED

HORIZONTAL SCALE: 1"=40'  
VERTICAL SCALE: 1"=2'

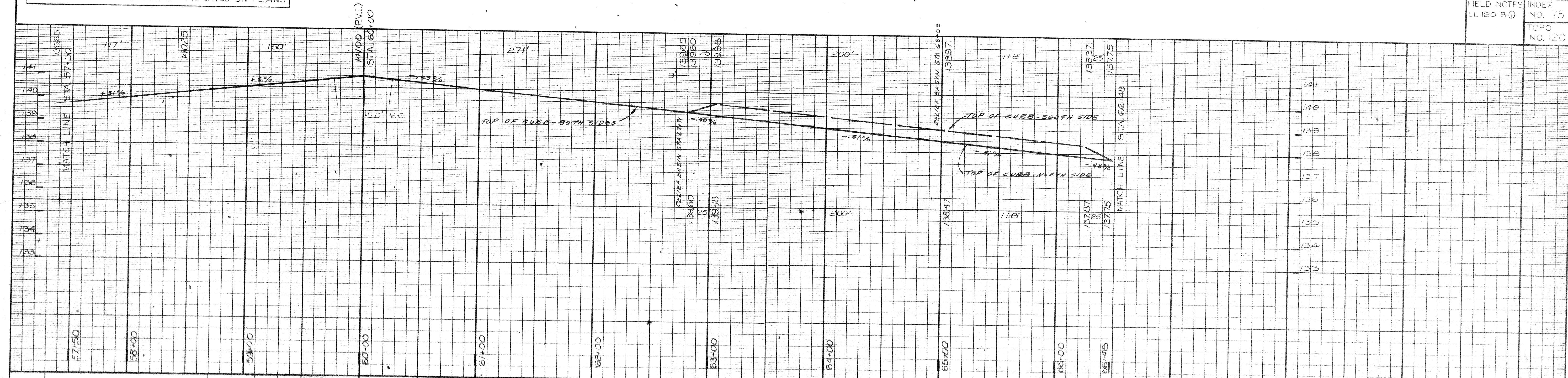
NOTE:  
THE SALVAGEABLE SURVEY MONUMENT SHALL BECOME THE PROPERTY OF THE CITY ENGINEER.

BENCH MARKS  
ELEV.  
C.B.M. / HYD. AT STA. 57+94 108' S. OF R/W @ 143.24  
C.B.M. / HYD. AT STA. 61+75 112' S. OF R/W @ 143.37  
C.B.M. MON. #250 @ OLD R/W AT TRI. 'K' 139.17

HORIZONTAL CONTROL  
SEE SHEET 7 OF 10

TREE REMOVAL  
4"-12" DIA - 16 EACH  
13"-18" DIA - 1 EACH

BEFORE STARTING CONSTRUCTION — CONTRACTOR MUST CHECK WITH UTILITIES FOR LOCATIONS OF EXISTING STRUCTURES WHETHER OR NOT INDICATED ON PLANS



FIELD NOTES	INDEX
LL 120 B 0	NO. 75
	TOPO
	NO. 120

DESIGNED BY <b>TALLEY</b>	APPROVED: <i>J. Prichon</i> ENGINEER OF STREETS	CITY OF DETROIT DEPARTMENT OF PUBLIC WORKS CITY ENGINEER'S OFFICE FOR DEPARTMENT OF PARKS AND RECREATION	PAVING OF ROADS IN ELIZA HOWELL PARK & ROUGE PARK URBAN BEAUTIFICATION AND IMPROVEMENT PROJECT MICH. B-9	SEE 15 OF 10 SHEETS
DRAWN BY <i>D. Co U</i>	ASSISTANT CITY ENGINEER <i>Robert [unclear]</i> CITY ENGINEER			CONTRACT NO. PR 205
FINAL CHECK <i>W. L. S.</i>			ELIZA HOWELL PARK ALIGNMENT AND PAVING PLAN	DATE 3-25-18



NOTE - THE ENTIRE HORSESHOE AREA SHALL BE SCARIFIED TO A MINIMUM DEPTH OF 6 INCHES PRIOR TO FILLING & GRADING, TO INSURE PROPER DRAINAGE THE ENTIRE HORSESHOE AREA SHALL BE GRADED TOWARD THE PAVED ROADWAYS.

NOTE: FENCE TO BE REMOVED BY OTHERS

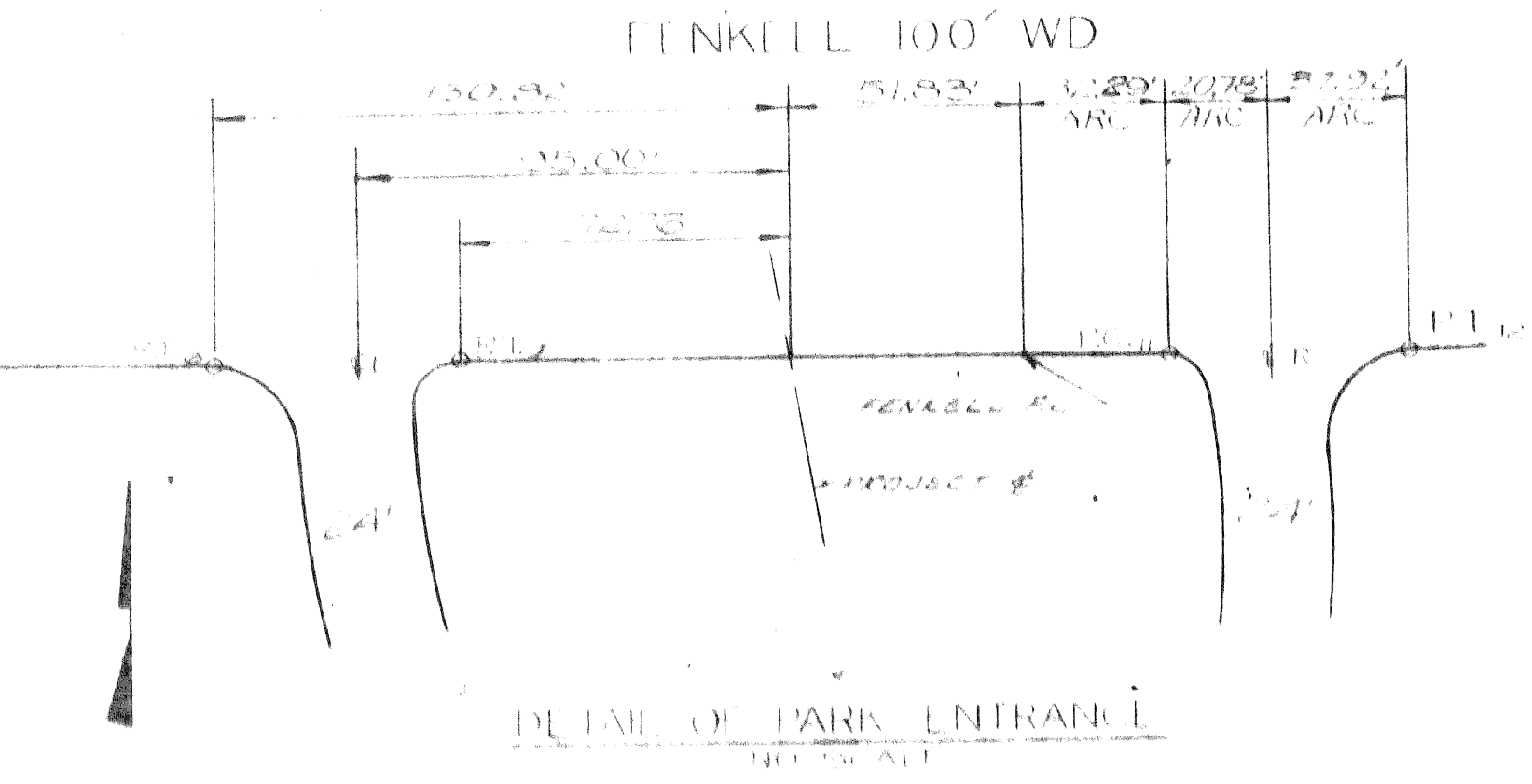
NOTE: REMOVE CABLE AND POST BRICK WALL

NOTE: REMOVE ONE SECTION OF EXISTING GUARD RAIL, INSTALL ONE END SHOE, THIS REMOVAL AND CONSTRUCTION SHALL BE INCIDENTAL TO COST OF CONSTRUCTION.

POINT	STATION	CO-ORDINATES OF P.C.'S & P.T.'S	
		DISTANCE WEST OF G	DISTANCE EAST OF G
PC <sub>1</sub>	0+33.82	71.96'	
PT <sub>1</sub>	0+80.24		86.84'
PC <sub>2</sub>	0+98.29	132.44'	
PT <sub>2</sub>	0+20	56.57'	
PC <sub>3</sub>	0+20	56.57'	
PT <sub>3</sub>	2+33.13	20.00'	
PC <sub>4</sub>	3+33.13	20.00'	
PT <sub>4</sub>	4+03.86	66.86'	
PC <sub>5</sub>	4+03.86	66.86'	
PT <sub>5</sub>	6+49.35	128.43'	
PC <sub>6</sub>	6+49.35	128.43'	
PT <sub>6</sub>	6+68.44	128.62'	
PC <sub>7</sub>	6+49.35	83.27'	
PT <sub>7</sub>	6+57.83	71.53'	
PC <sub>8</sub>	5+12.06	56.31'	
PT <sub>8</sub>	6+49.35	83.27'	
PC <sub>9</sub>	5+06.19		52.48'
PT <sub>9</sub>	5+12.06	56.31'	
PC <sub>10</sub>	6+13.52		91.30'
PT <sub>10</sub>	5+06.19		52.48'
PC <sub>11</sub>	6+29.70		82.80'
PT <sub>11</sub>	6+19.52		91.30'
PC <sub>12</sub>	6+29.70		141.02'
PT <sub>12</sub>	6+22.12		141.02'
PC <sub>13</sub>	4+92.03		71.86'
PT <sub>13</sub>	6+00.59		140.02'
PC <sub>14</sub>	3+33.13		20.00'
PT <sub>14</sub>	4+92.03		71.86'
PC <sub>15</sub>	0+69		142.98'
PT <sub>15</sub>	1+52.50		20.00'
QR	6+26.81		103.38'
QL	6+41.89	93.40'	

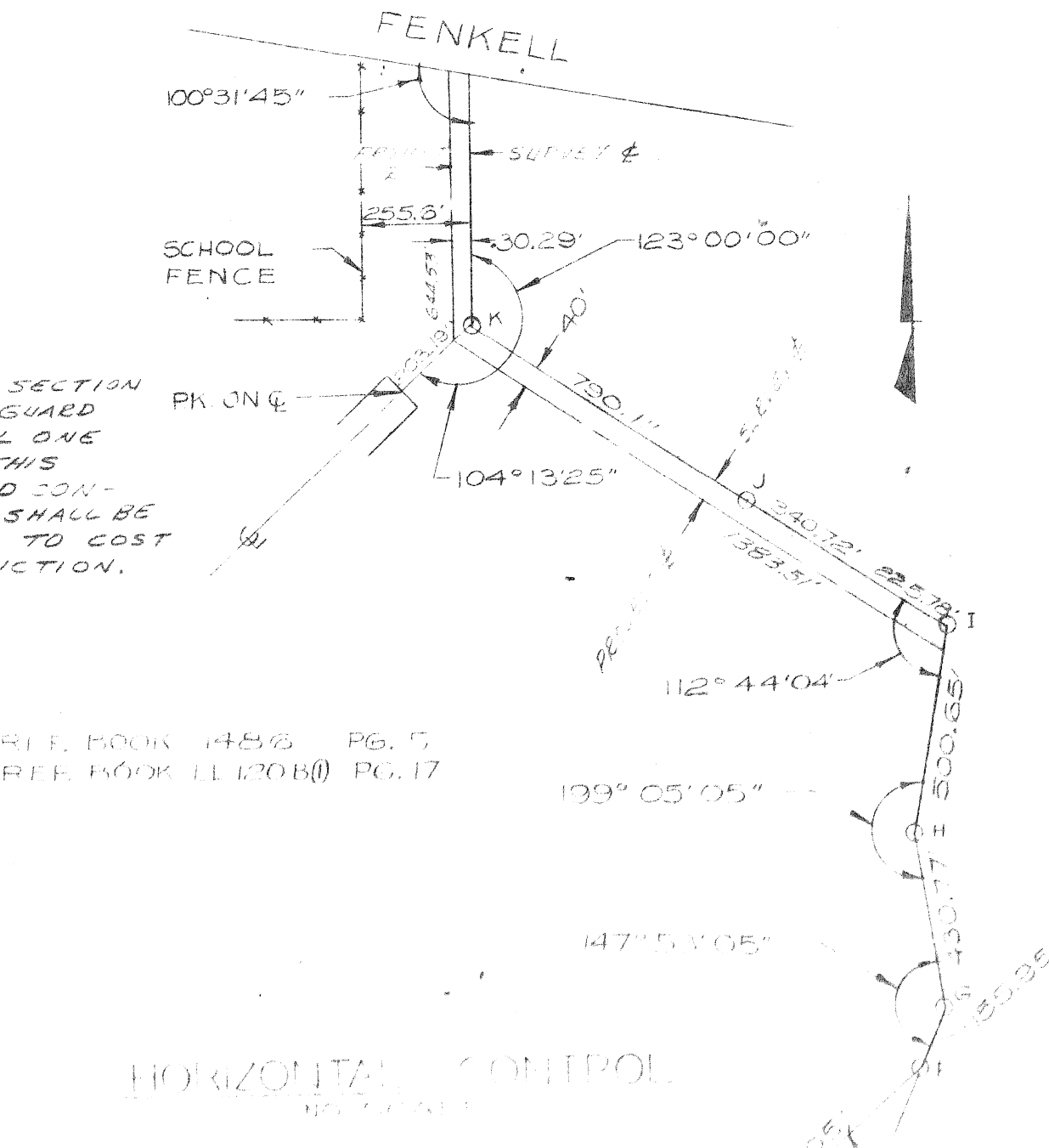
- LEGEND**
- ① BUILD CATCH BASIN
  - ② CONSTRUCT STANDARD MANHOLE
  - ③ ADJUST AND PLACE MANHOLE COVER & COVER
  - ④ ADJUST EXISTING CATCH BASINS
  - ⑤ CONSTRUCT STD CATCH BASINS
  - ⑥ ABANDON EXISTING CATCH BASINS
  - ⑦ CONSTRUCT STD CONC WALK
  - ⑧ CAP AND BURY EXISTING CATCH BASINS
  - ⑨ CITY SURVEY CONTROL MONUMENT
  - ⑩ STREET PAVEMENT REMOVAL (INCL CURB)
  - ⑪ WALK REMOVAL
  - ⑫ CONSTRUCT SEPARATE TIRE CURB
  - ⑬ CURB REMOVAL
  - ⑭ TOP OF CURB ELEVATIONS
  - ⑮ PAVEMENT ELEVATIONS

NOTES - FOR TYPICAL PAVEMENT SECTION SEE SHEET 3  
 SEE SHEET 3 FOR DETAIL



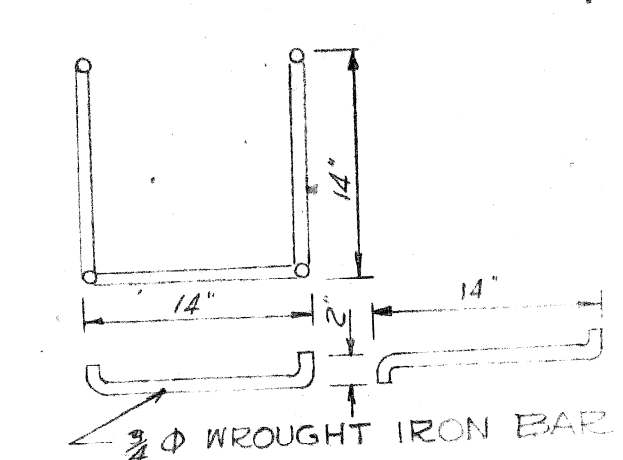
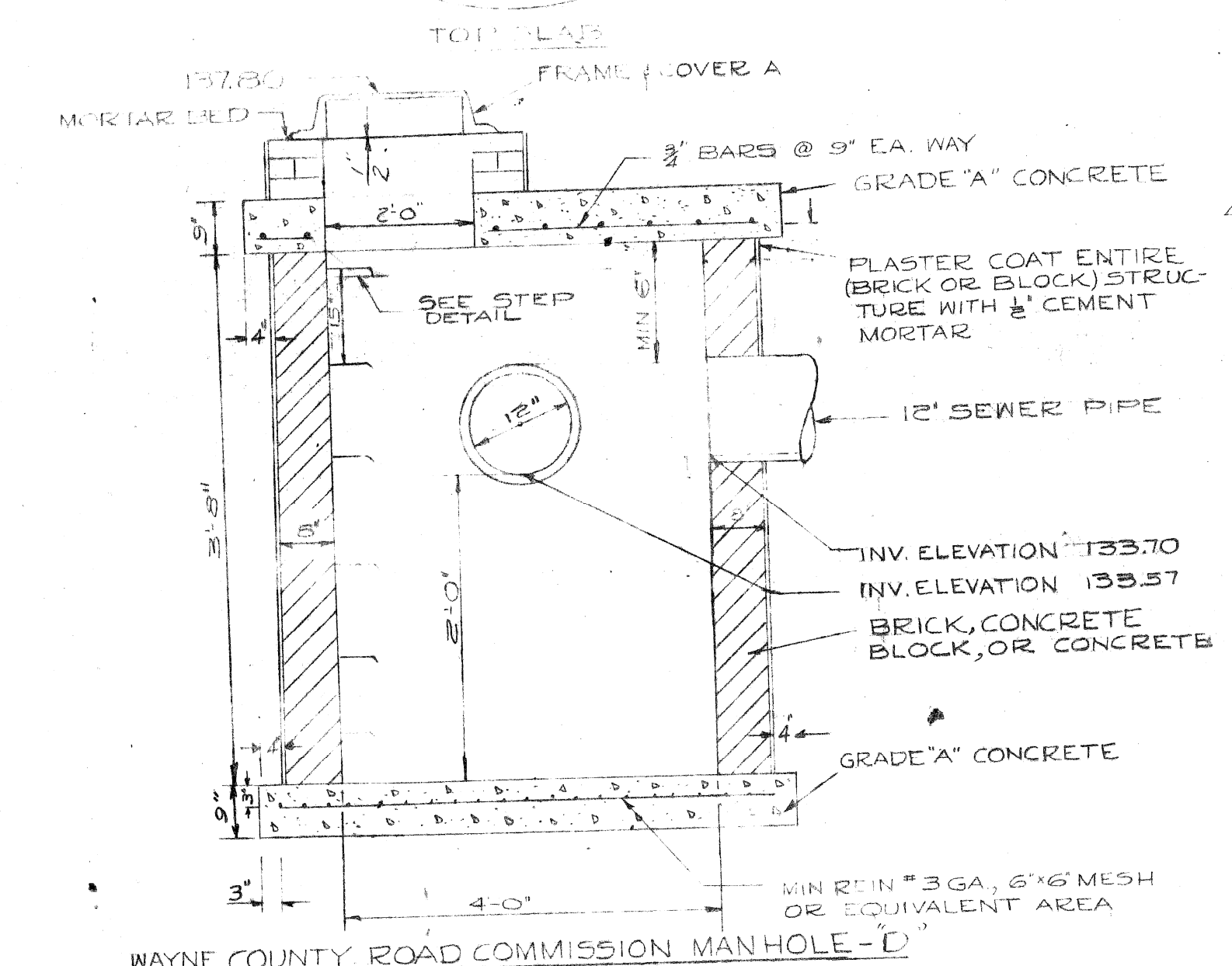
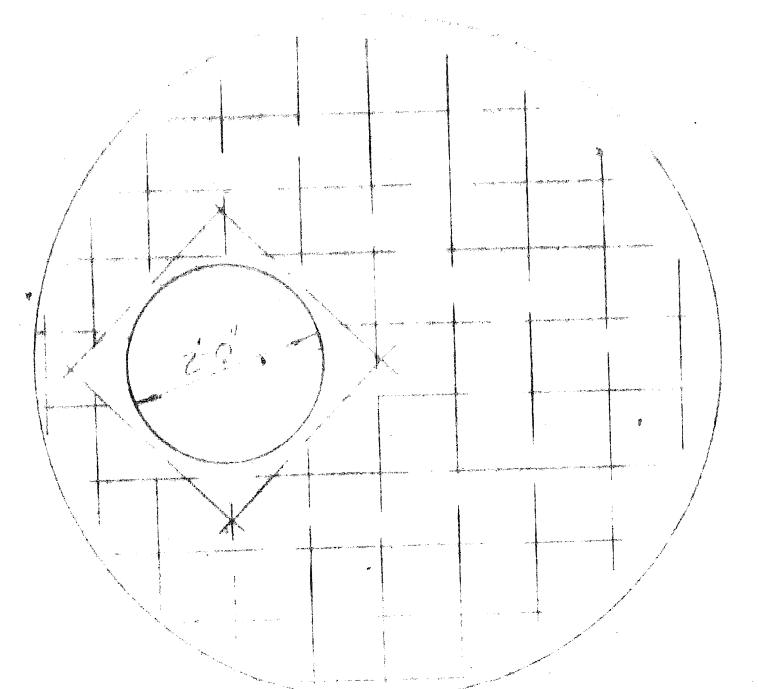
**CURVE DATA**

Station	Δ	R	T	A
①	27°45'30"	274.06'	287.75'	170.97'
②	27°45'06"	287.75'	170.97'	170.97'
③	27°45'30"	274.06'	287.75'	170.97'
④	27°45'06"	287.75'	170.97'	170.97'
⑤	27°45'30"	274.06'	287.75'	170.97'
⑥	27°45'06"	287.75'	170.97'	170.97'
⑦	27°45'30"	274.06'	287.75'	170.97'
⑧	27°45'06"	287.75'	170.97'	170.97'
⑨	27°45'30"	274.06'	287.75'	170.97'
⑩	27°45'06"	287.75'	170.97'	170.97'
⑪	27°45'30"	274.06'	287.75'	170.97'
⑫	27°45'06"	287.75'	170.97'	170.97'
⑬	27°45'30"	274.06'	287.75'	170.97'
⑭	27°45'06"	287.75'	170.97'	170.97'
⑮	27°45'30"	274.06'	287.75'	170.97'
⑯	27°45'06"	287.75'	170.97'	170.97'
⑰	27°45'30"	274.06'	287.75'	170.97'
⑱	27°45'06"	287.75'	170.97'	170.97'
⑲	27°45'30"	274.06'	287.75'	170.97'
⑳	27°45'06"	287.75'	170.97'	170.97'

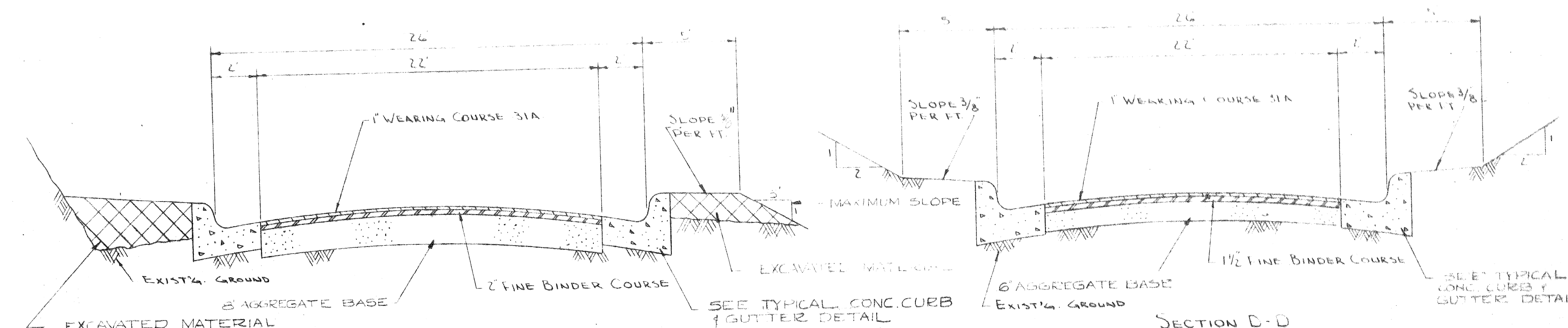


<b>CITY OF DETROIT</b> DEPARTMENT OF PUBLIC WORKS CITY ENGINEERS OFFICE FOR DEPARTMENT OF PARKS AND RECREATION			PAYING OF ROAD TAXES URBAN PLANNING AND DEVELOPMENT 1111 A HOWELL PARK - ZEPHYRUS AND CAVENDISH BLVD		
DESIGNED BY DRAWN BY CHECKED BY	TALLEY [Signature] [Signature]	APPROVED [Signature] [Signature]	SHEET 1 OF 1 SHEETS CONTRACT No. 1111-205 DATE 5-25-68	[Blank space for notes or additional information]	



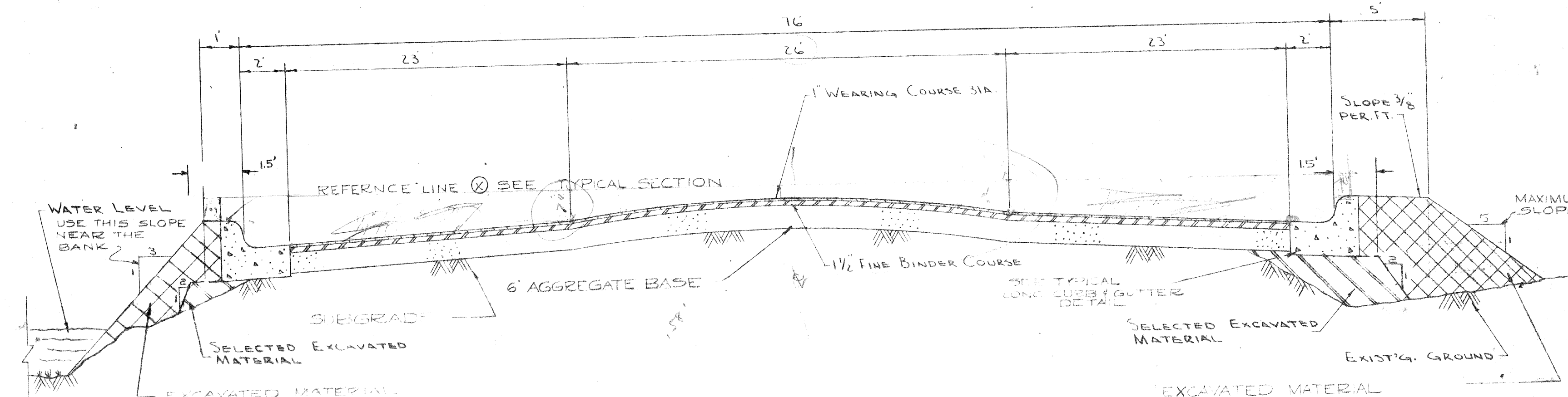


M.H. "D" STEP DETAIL  
SCALE 1"=1'-0"

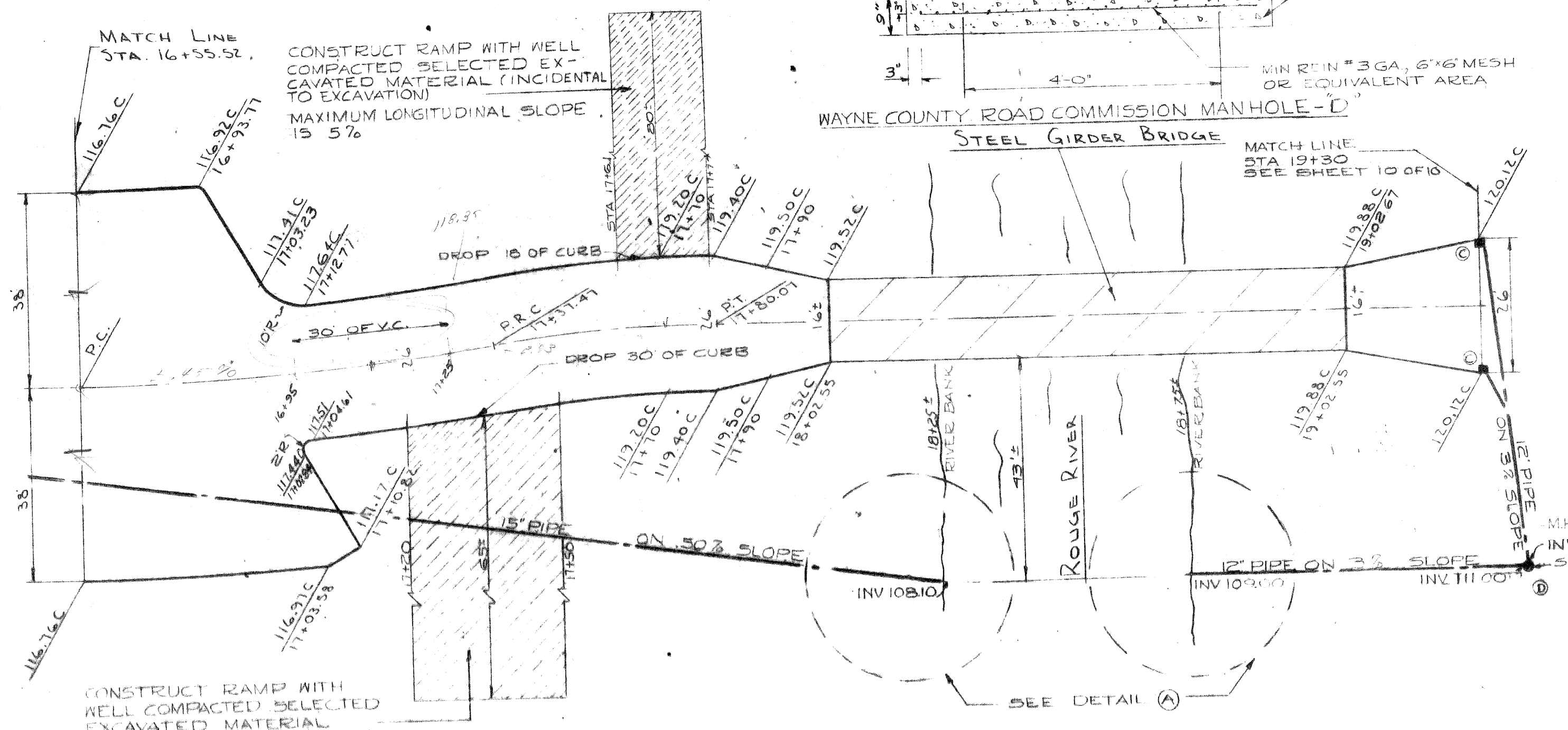


SECTION C-C  
STA. 0+22 TO STA. 8+18  
NO SCALE

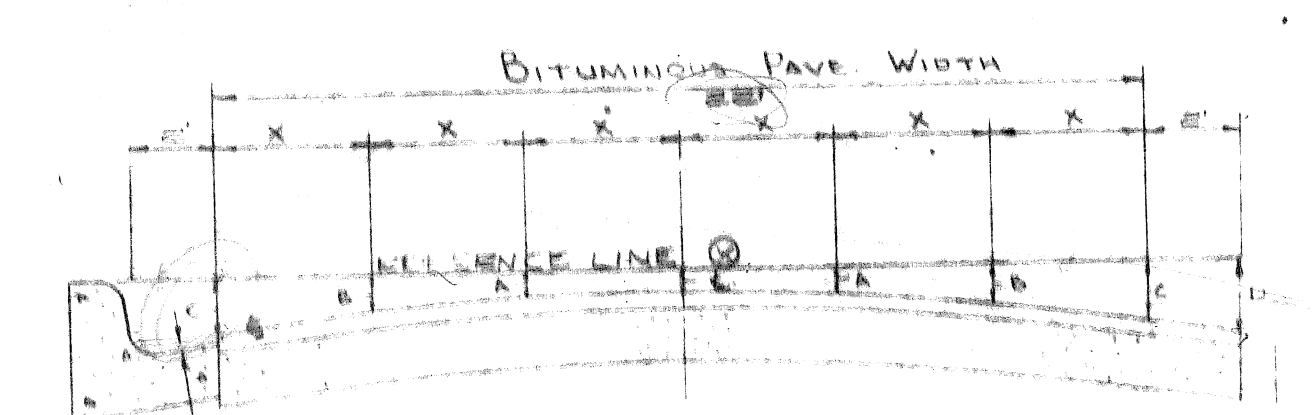
SECTION D-D  
STA. 8+18 TO STA. 22+39.54  
NO SCALE



SECTION F-F  
NO SCALE

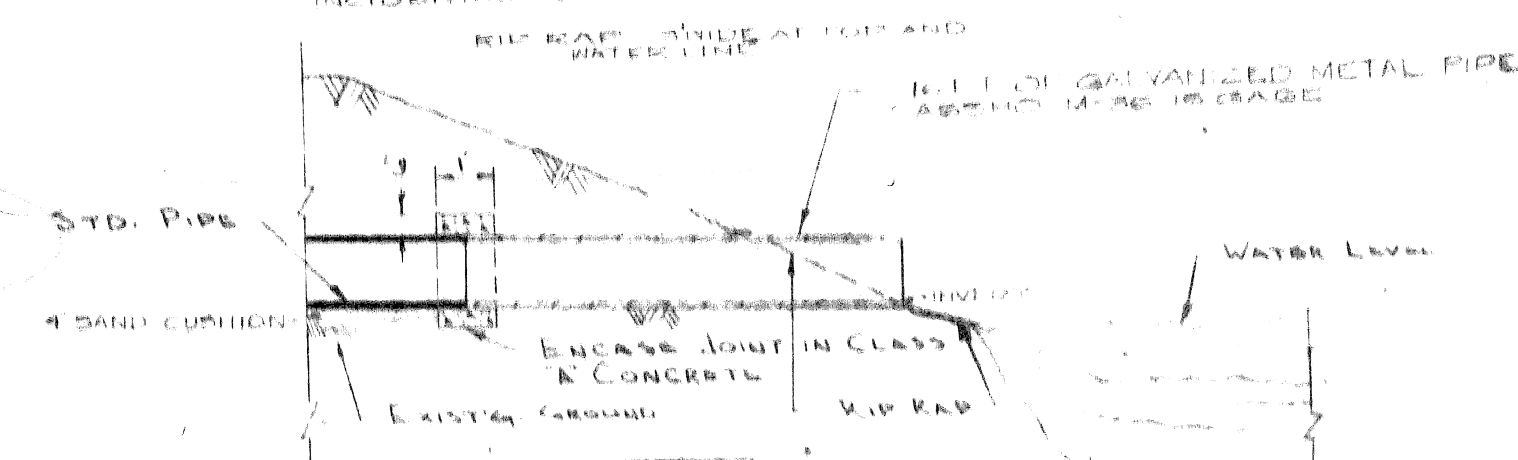


GRADE DETAIL  
STA. 16+15 TO 19+30  
SCALE 1"=20'

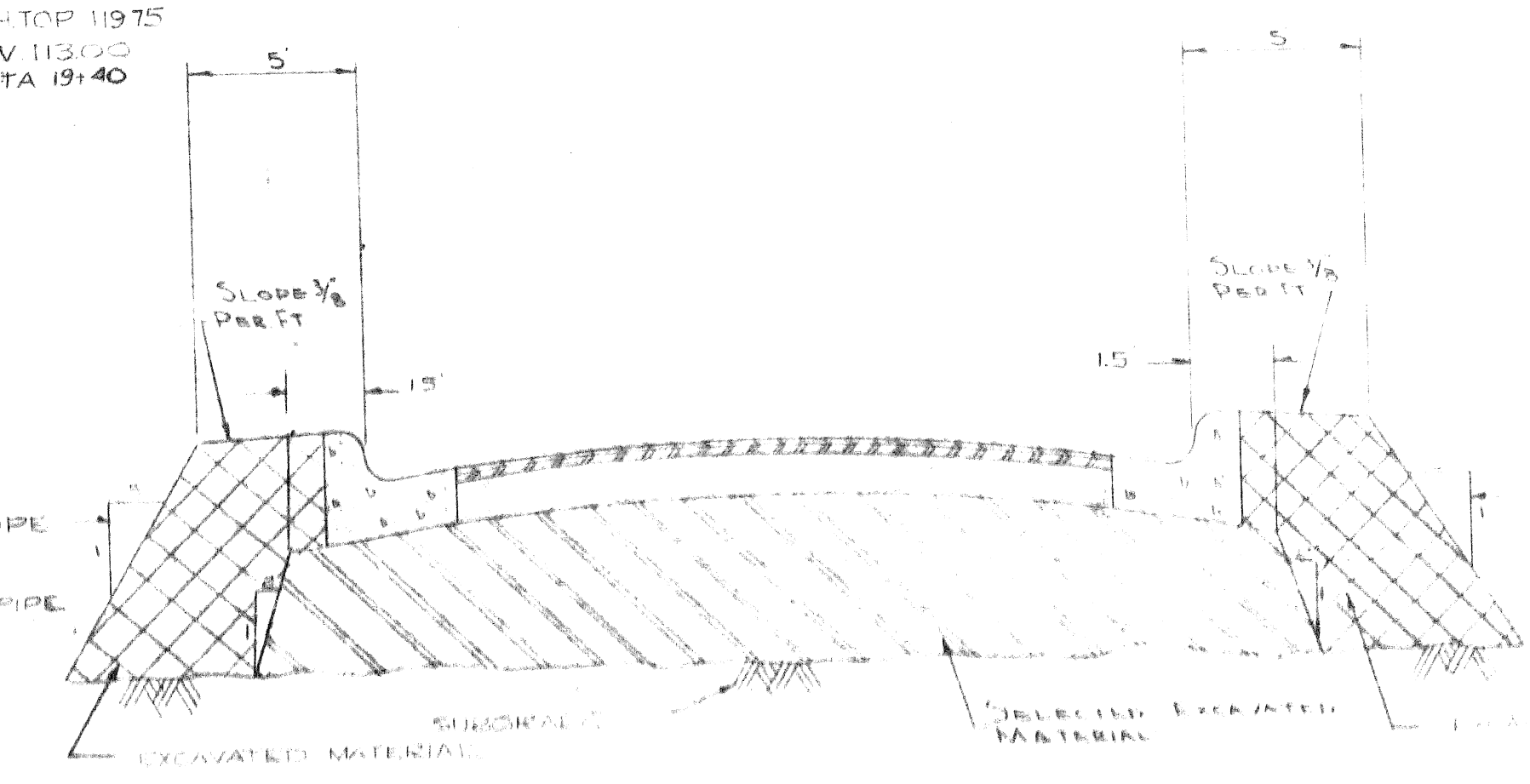


TYPICAL SECTION  
NO SCALE

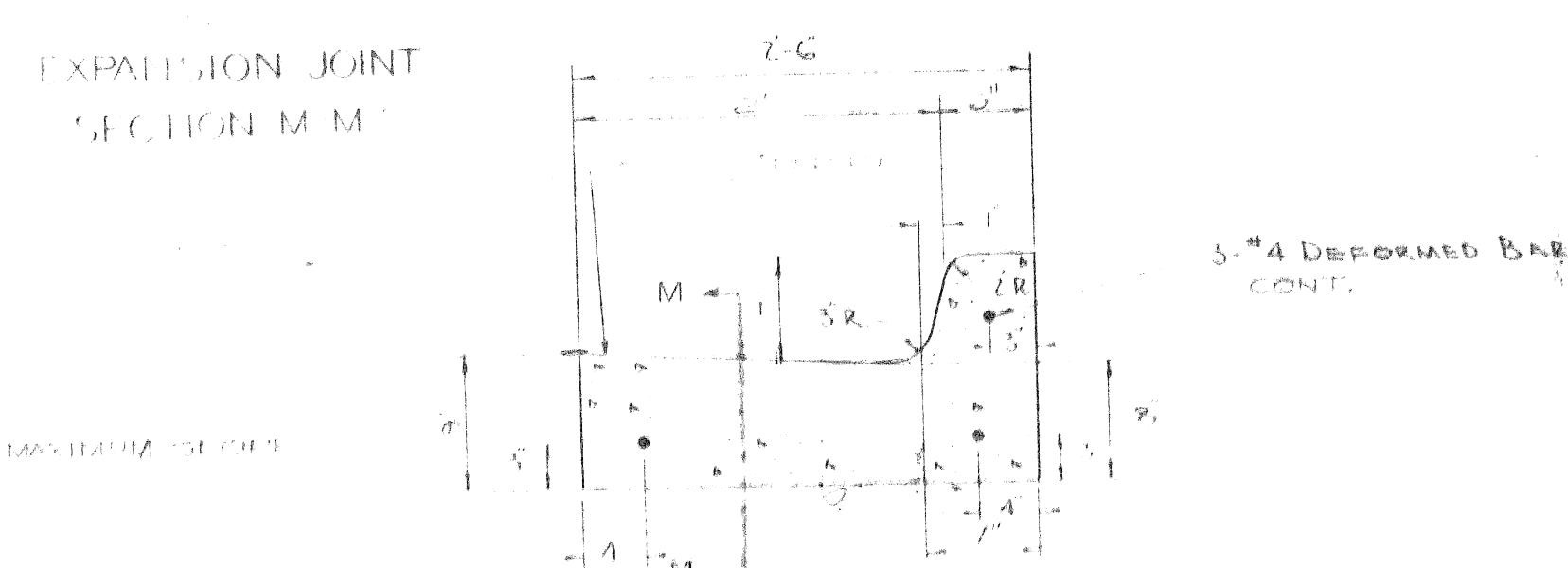
ELEMENTS OF BITUMINOUS CONCRETE PAVEMENT					
Width	X	L	C	B	A
22'	4"	1"	5 1/8"	4 1/8"	3 1/8"



DETAIL (A)  
NO SCALE



SECTION L-L  
NO SCALE



3/4" DIA DEFORMED BARS, CONT.

CITY OF DETROIT  
DEPARTMENT OF PUBLIC WORKS  
CITY ENGINEERS OFFICE  
FOR  
DEPARTMENT OF PARKS AND RECREATION

PAVING OF ROAD IN ELYA HOWELL'S EDGE PARK  
URBAN RECREATION CENTER AND PARKS AND RECREATION DEPARTMENT  
ROULE PARK DETAIL SHEET

SHEET 2 OF 2 SHEETS  
CONTRACT NO. PR 295  
DATE 4-25-68

NO.	DESCRIPTION	DATE	BY	APPROVED

DESIGNED BY <i>W. J. ...</i>	APPROVED <i>J. ...</i>
DRAWN BY L. E. CHAPMAN	ENGINEER OF STREETS <i>R. ...</i>
CHECKED BY <i>...</i>	ASSISTANT CITY ENGINEER <i>...</i>

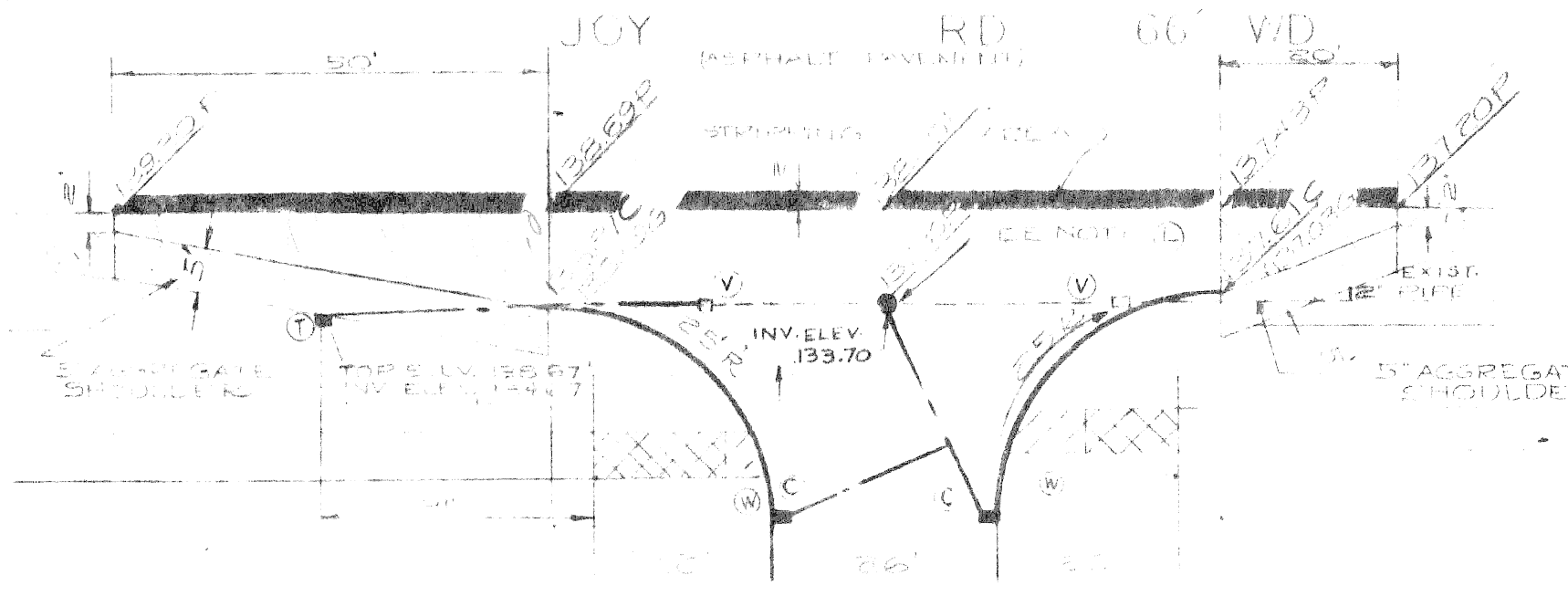
JOY RD. 66' WD. ASPHALT PAVT.



TREE REMOVAL SCHEDULE			
NO.	SIZE	STA.	LOCATION
1	15"	7153	18' E OF C.
2	36"	8100	25' W OF C.
3	36"	8137	25' W OF C.
4	15"	9187	25' W OF C.
5	15"	9173	25' W OF C.
6	24"	9151 TO 1100	26' W OF C.

STUMP REMOVAL SCHEDULE			
NO.	SIZE	STA.	LOCATION
1	24"	8193	18' E OF C.

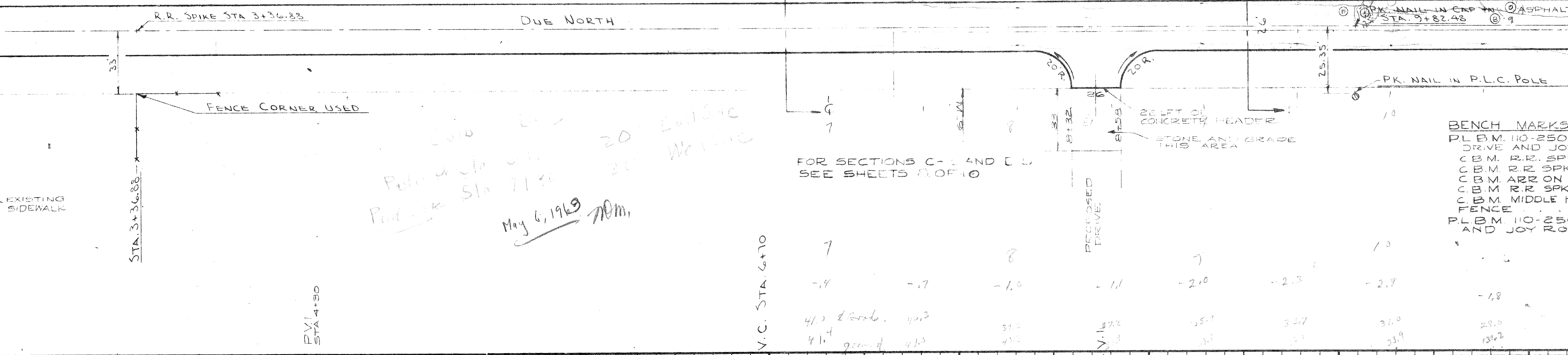
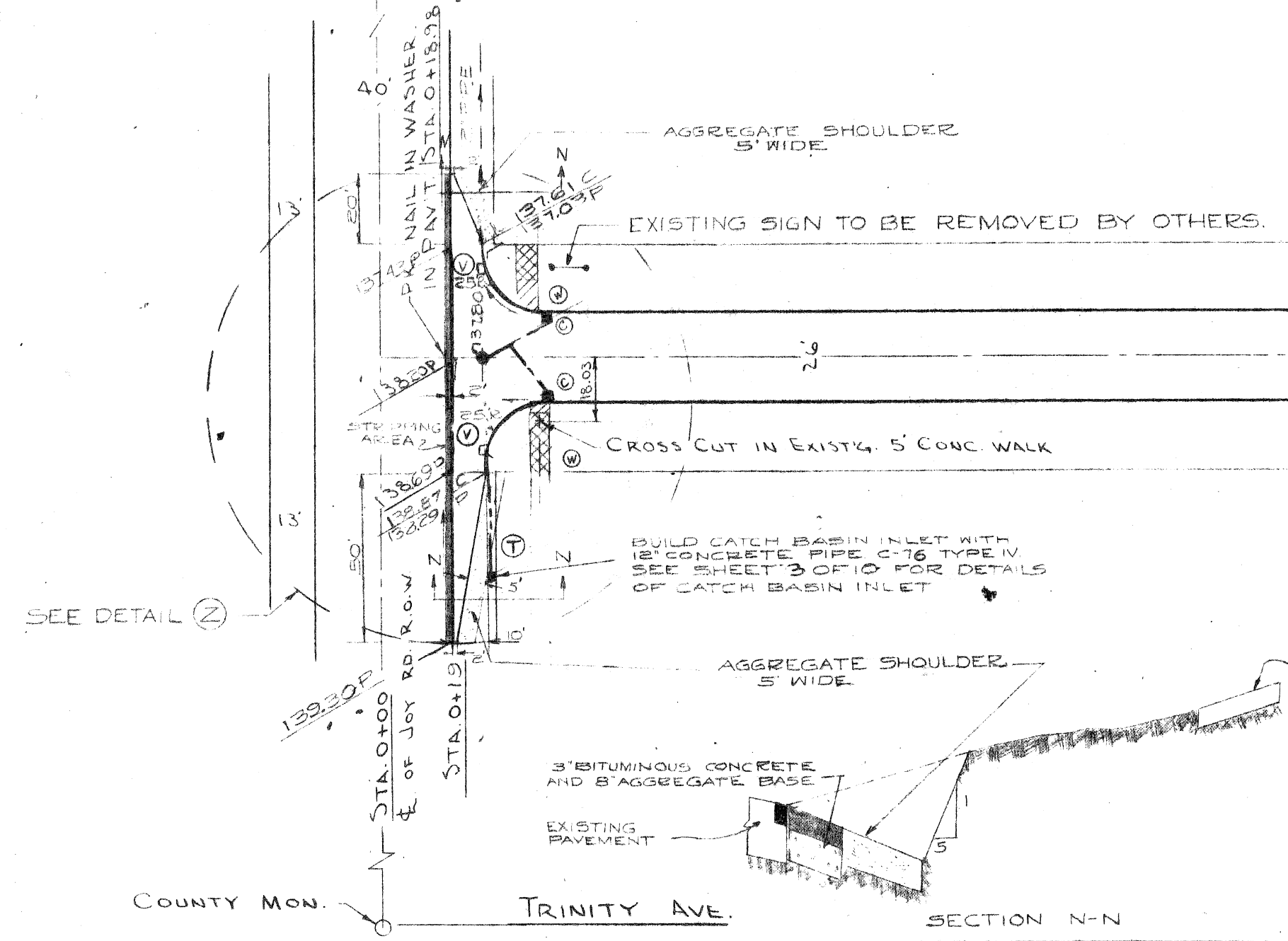


**TYPE OF PAVEMENT**  
 3" BITUMINOUS CONCRETE WITH 6" STONE BASE WITH REINFORCED CURB AND GUTTER FROM STA 0+00 TO 8+78.  
 2" BITUMINOUS CONCRETE WITH 6" STONE BASE WITH REINFORCED CURB AND GUTTER FROM STA 8+78 TO 22+39.54.  
 NOTE FOR SYMBOLS (A) ETC., SEE SHEET 2 OF 10.

BEFORE STARTING CONSTRUCTION CONTRACTOR MUST CHECK WITH UTILITIES FOR LOCATIONS OF EXISTING STRUCTURES WHETHER OR NOT INDICATED ON THE PLANS.

**NOTE**  
 CONSTRUCT MANHOLE COUNTY ROAD COMMISSION MANHOLE AS DETAILED ON SHEET 5010 THIS MANHOLE SHALL BE PAID FOR AS PER PROPOSAL ITEM - MANHOLE - STANDARD NEW.

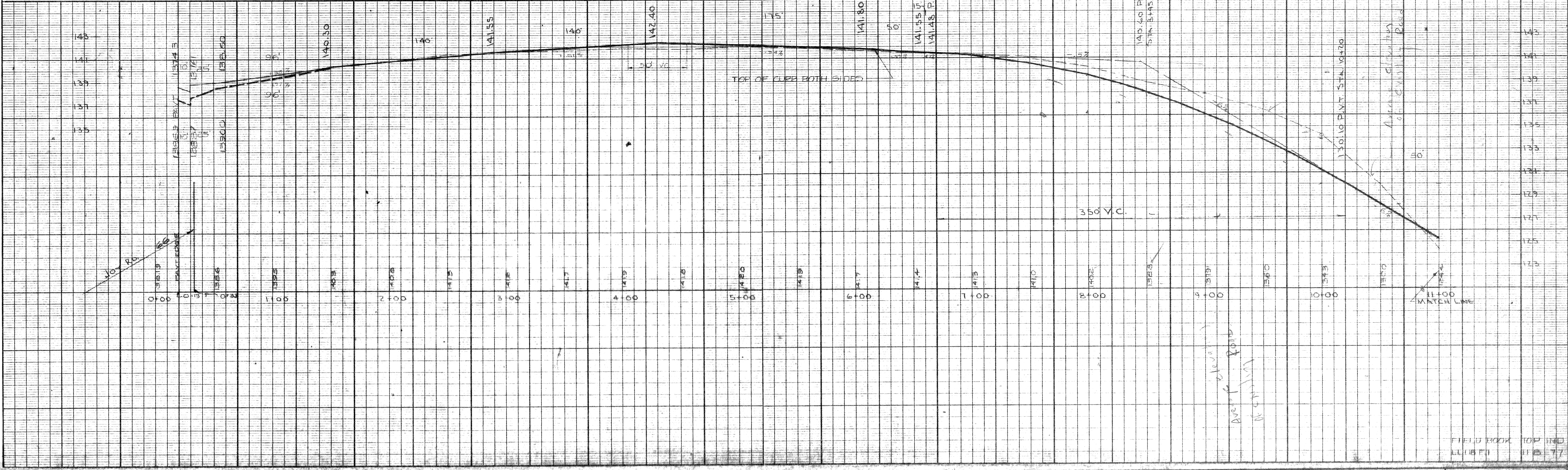
**BENCH MARKS ELEVATION**  
 P.L. 110-250A NW COR SPINZA DRIVE AND JOY ROAD 136.026  
 C.B.M. RR. SPK IN P.L.C. POLE 4+23 142.11  
 C.B.M. RR. ON HYD 7+38 143.41  
 C.B.M. RR. SPK IN P.L.C. POLE 9+24 136.98  
 C.B.M. MIDDLE HORIZONTAL RAIL CYCLOPE FENCE 110-250' NE COR LAHSER AND JOY ROAD 129.94  
 P.L. 110-250A NW COR SPINZA DRIVE AND JOY ROAD 136.026



*Handwritten notes:*  
 Point of Sta 7153  
 Point of Sta 7173  
 May 6, 1969  
 20' E of C  
 25' W of C

FOR SECTIONS C-C AND E-E SEE SHEETS 2 OF 10

**PLAN SCALE**  
 1"=40'  
**PROFILE SCALE**  
 HOR. 1"=40'  
 VER. 1"=4'



DESIGNED BY <i>W. J. ...</i>	APPROVED <i>J. ...</i>
DRAWN BY <i>L. ...</i>	ENGINEER OF STREETS <i>R. ...</i>
TRACED BY <i>...</i>	ASSISTANT CITY ENGINEER <i>...</i>
CHECKED BY <i>...</i>	CITY ENGINEER <i>...</i>

**CITY OF DETROIT**  
 DEPARTMENT OF PUBLIC WORKS  
 CITY ENGINEERS' OFFICE  
 FOR  
 DEPARTMENT OF PARKS AND RECREATION

PAVING OF ROADS IN ELIZA HOWELL PARK & ROUGH PARK  
 URBAN BEAUTIFICATION AND IMPROVEMENT PROJECT MICH B-9  
 ROUGE PARK - ALIGNMENT AND PAVING PLAN

SHEET 9 OF 10 SHEETS  
 CONTRACT NO. PR 205  
 ASSIGNMENT NO. 102011  
 DATE 3-25-68

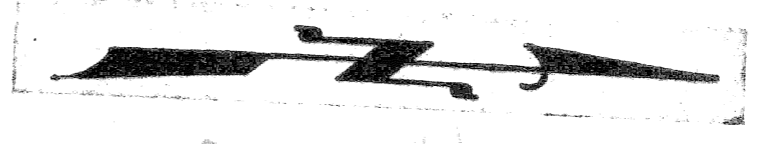
TREE REMOVAL SCHEDULE			
NO.	SIZE	STA.	LOCATION
1	4"	1100	1100
2	4"	1100	1100
3	4"	1100	1100
4	4"	1100	1100
5	4"	1100	1100
6	4"	1100	1100
7	4"	1100	1100
8	4"	1100	1100
9	4"	1100	1100
10	4"	1100	1100
11	4"	1100	1100
12	4"	1100	1100
13	4"	1100	1100
14	4"	1100	1100
15	4"	1100	1100
16	4"	1100	1100
17	4"	1100	1100
18	4"	1100	1100

STUMP REMOVAL SCHEDULE		
NO.	STA.	LOCATION
1	21+91	7E OF E
1	22+06	22E OF E

**CURVE DATA**

①	②	③
A = 7° 19' 11"	A = 1° 41' 50"	A = 46° 1' 0"
R = 500'	R = 250'	R = 100'
T = 41.07'	T = 41.5'	T = 41.57'
A = 81.35°	A = 42.6°	A = 80.49°
S = 47.50'	S = 16.50'	S = 132.50'



4-24-69  
 Inspector Harvey called  
 He wanted permission to  
 pick up the drainage of  
 Park in Recreation  
 into the proposed 15 pipe  
 along the south side  
 Permission was given  
 JEM

EXISTING SIGN AT STATION  
 TO BE REMOVED BY OTHERS

TYPE OF PAVEMENT  
 2 1/2" BITUMINOUS CONCRETE WITH 6" STONE BASE  
 WITH REINFORCED CURB AND GUTTER.

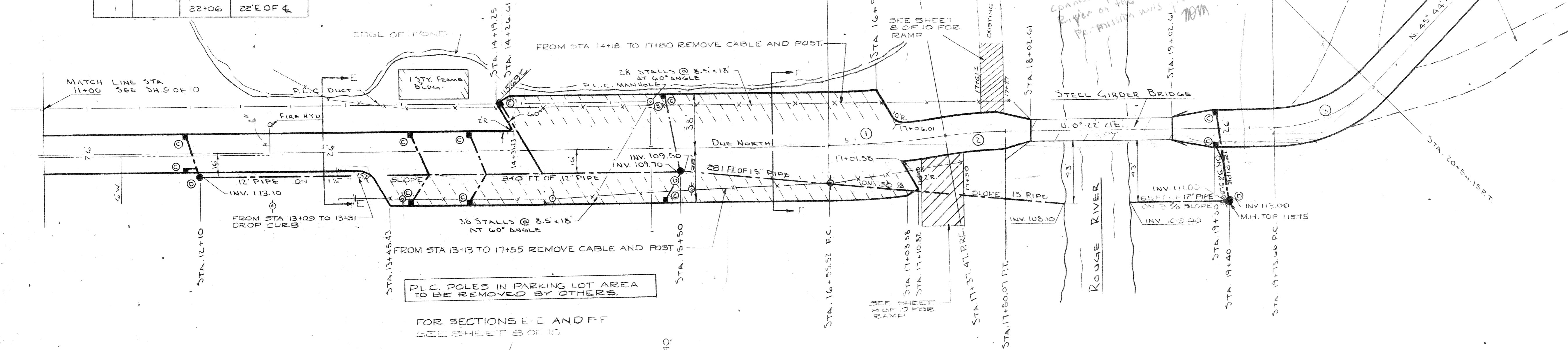
NOTE FOR SYMBOLS (A) ETC SEE SHEET  
 2 OF 10

BEFORE STARTING CONSTRUCTION CONTRACTOR  
 MUST CHECK WITH UTILITIES FOR LOCATIONS OF  
 EXISTING STRUCTURES WHETHER OR NOT  
 INDICATED ON THE PLANS.

**BENCH MARKS**

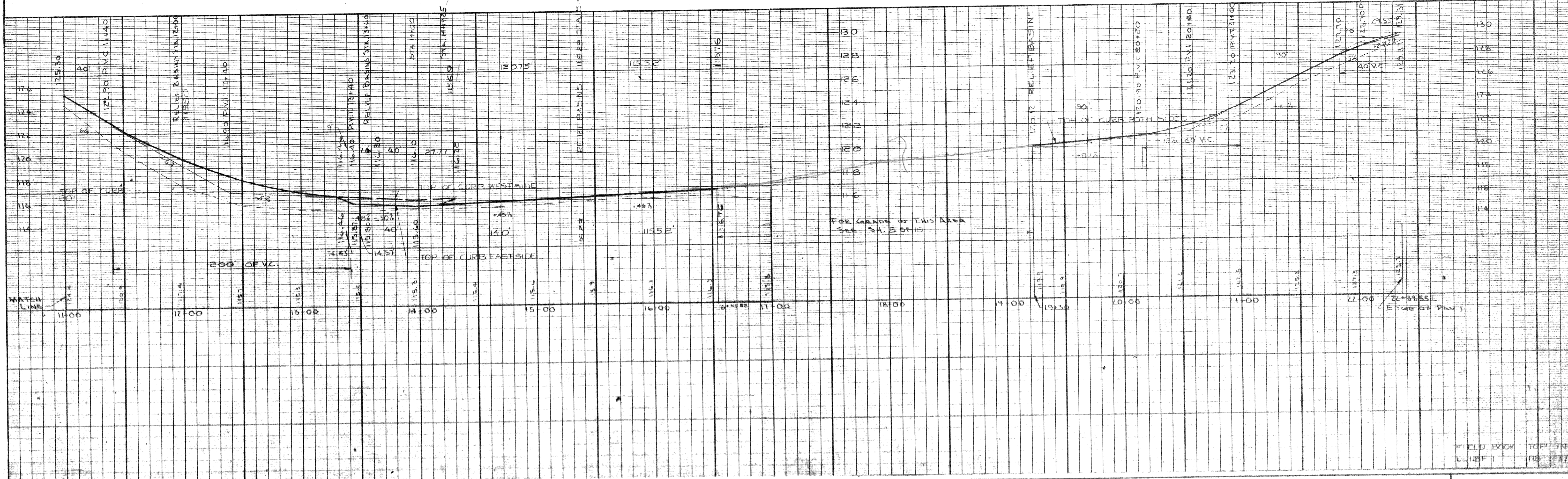
BENCH MARKS	ELEVATION
PL.B.M. 110-250 N.W. COR. SPINOZA	136.086
DRIVE & JOY ROAD	136.086
CB.M. EYE BOLT IN PLC POLE	122.67
AT STA 11+22	117.93
CB.M. RR. SPK ON PLC POLE AT	115.91
STA 15+58	120.74
CB.M. RR. SPK ON PLC POLE AT	124.27
STA 19+40	129.97
PL.B.M. 110-250 N.E. COR. LAHSE	138.702
AND JOY RD.	

PLAN SCALE  
 1" = 40'  
 PROFILE SCALE  
 Hor 1" = 40'  
 Ver 1" = 4'

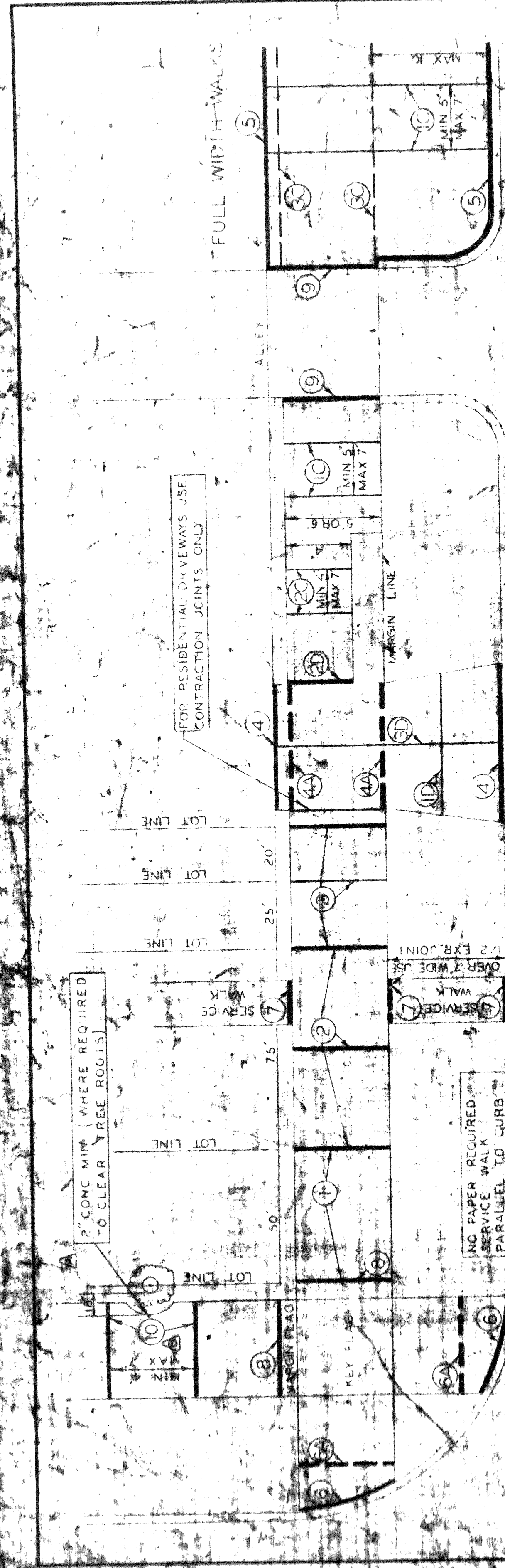


PLC. POLES IN PARKING LOT AREA  
 TO BE REMOVED BY OTHERS.

FOR SECTIONS E-E AND F-F  
 SEE SHEET 8 OF 10



CITY OF DETROIT DEPARTMENT OF PUBLIC WORKS CITY ENGINEERS OFFICE FOR DEPARTMENT OF PARKS AND RECREATION		PROJECT MICH B 9 URBAN RECREATION AND RECREATION PROJECT MICH B 9	
DESIGNED BY: <i>Harold M...</i> DRAWN BY: <i>L. CHADWICK</i> CHECKED BY: <i>Harold M...</i>	APPROVED: <i>[Signature]</i> ENGINEER OF STREETS ASSISTANT CITY ENGINEER CITY ENGINEER	SHEET 12 OF 17 SHEETS CONTRACT NO. PR 205 ASSIGNMENT NO. 12 DATE 3-25-68	FIELD BOOK TOP AND BOTTOM RE 27



- EXPANSION JOINTS**
- PLACE PAPER EXPANSION JOINTS AT LOT LINES WHEN LOT LINES ARE BETWEEN 25' AND 50' APART.
  - PLACE 3/4\"/>
- CONTRACTION JOINTS**
- PLACE CONTRACTION JOINTS AT INTERVALS OF NOT LESS THAN 5' NOR MORE THAN 7' ON WALKS 5' WIDE OR WIDER, INCLUDING FULL WIDTH WALKS.
  - PLACE CONTRACTION JOINTS AT INTERVALS OF NOT LESS THAN 4' FOR MORE THAN 4' WIDE WALKS.
  - PLACE CONTRACTION JOINTS AT THE MARGIN LINE ON FULL WIDTH WALKS (OPTIONAL).
  - PLACE PAPER EXPANSION JOINTS AT CURB AND BUREAU OR PROPERTY LINE OR AT ALTERNATE POSITION FOR DRIVEWAYS.
  - PLACE PAPER EXPANSION JOINTS AT CURBS AND PROPERTY LINE.
  - PLACE PAPER EXPANSION JOINTS AT INTERSECTIONS OF SERVICE WALKS AND CURBS.
  - PLACE PAPER EXPANSION JOINTS AT INTERSECTIONS OF SERVICE WALKS AND DRIVEWAYS.
  - PLACE PAPER EXPANSION JOINTS AT ALLEY APRONS.
  - PLACE 1/2\"/>
- DRIVEWAYS**
- PLACE CONTRACTION JOINTS IN DRIVEWAYS SO THAT NO JOINT WILL EXCEED THE DIMENSIONS OF 15' BY 15'.
  - PLACE PAPER EXPANSION JOINTS ON ALL SIDES OF CORNER TAIL DRIVES.
  - PLACE CONTRACTION OR CONTRACTION JOINT ON CENTER LINE WHEN WIDTH OF DRIVEWAY EXCEEDS 15'.

REVISIONS

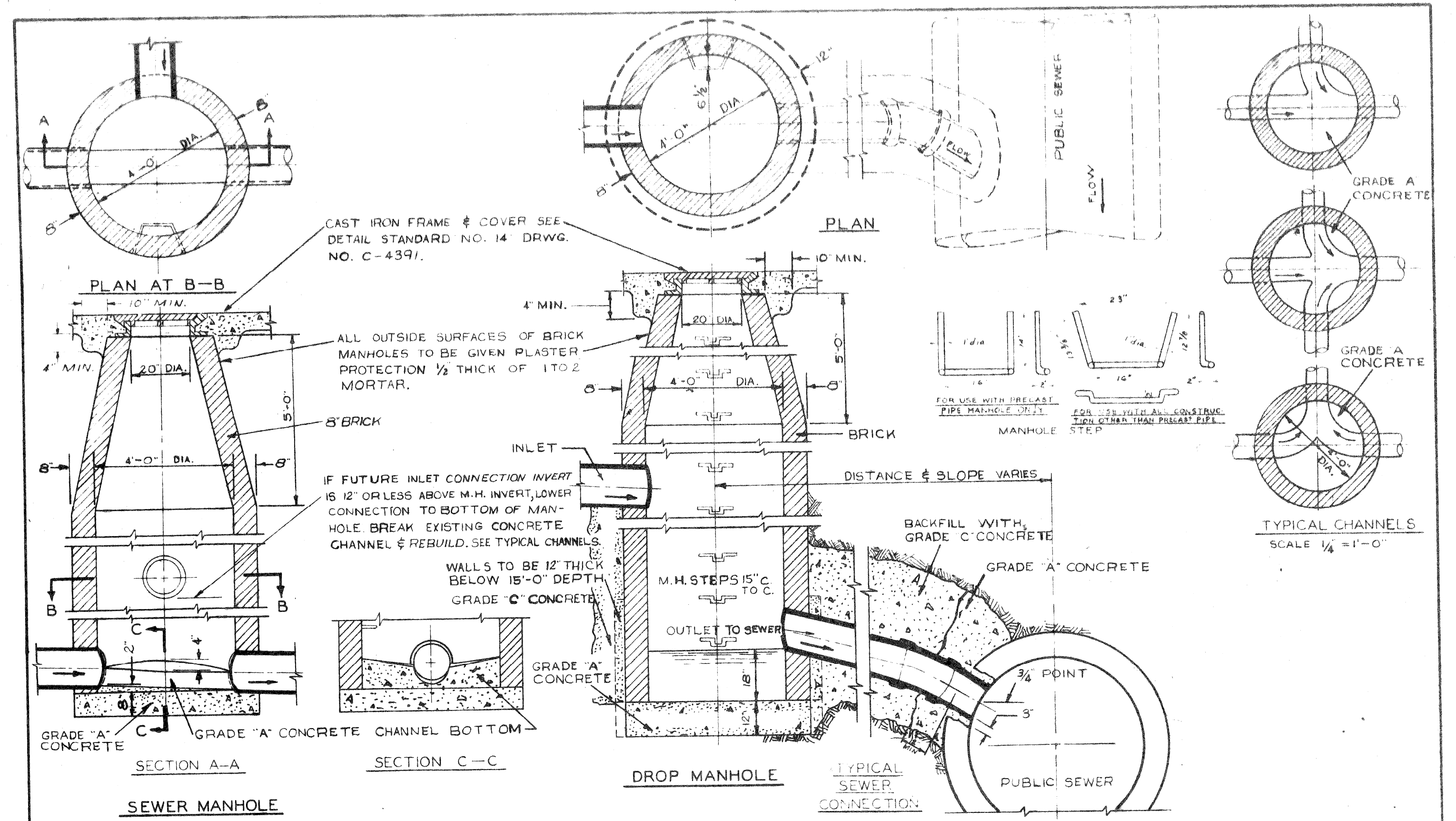
NO.	DATE	BY	DESCRIPTION
1	8-27-66	J. H. ...	...
2	...	...	...

CITY OF DETROIT  
DEPARTMENT OF PUBLIC WORKS  
BUREAU OF DESIGN

DESIGNED BY: J. H. ...  
DRAWN BY: J. Clark  
CHECKED BY: T. H. ...

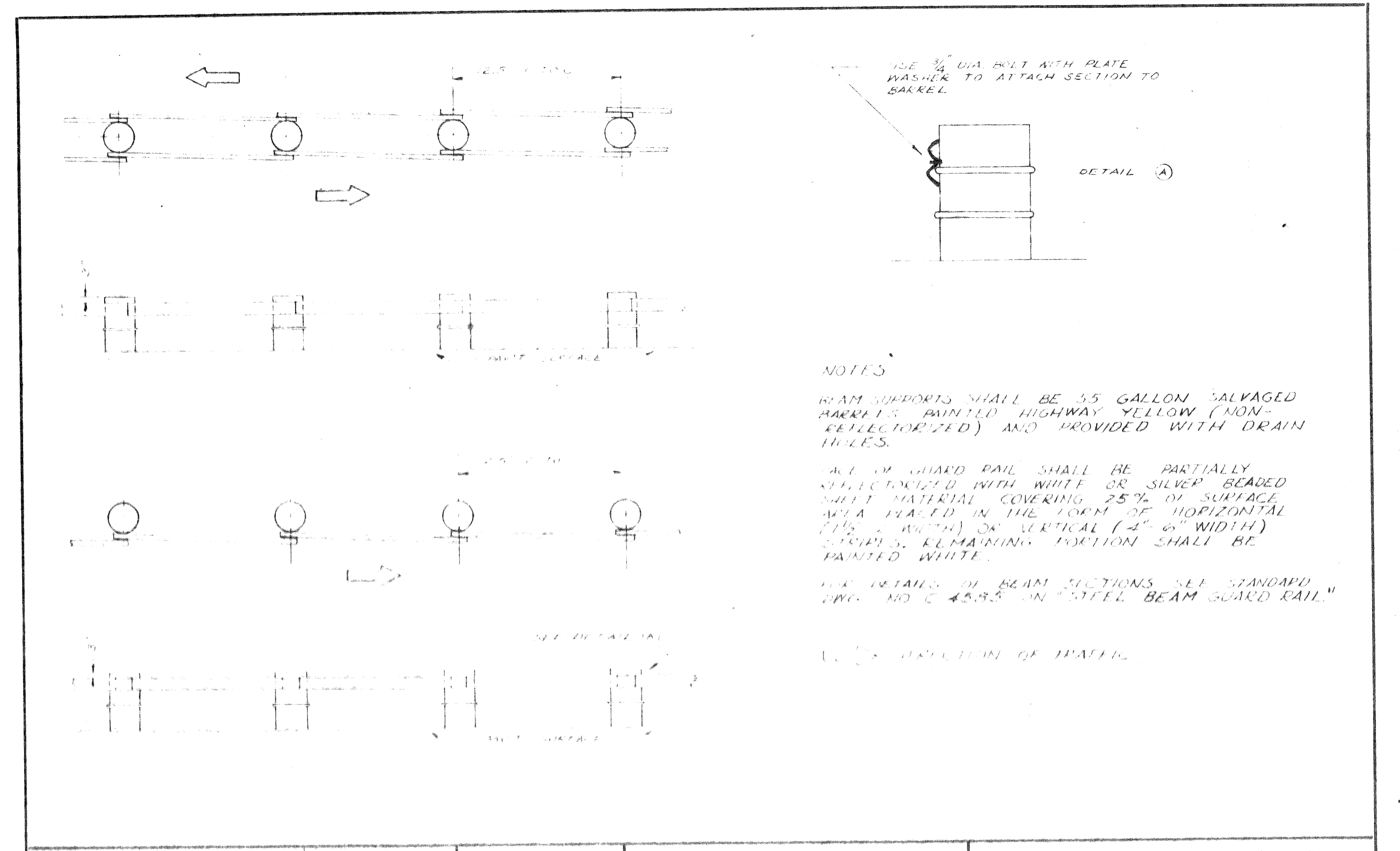
DETAIL STANDARD NO. 14  
DWG. NO. C-4387

VARIAION FROM THIS PLAN MUST BE APPROVED BY THE ENGINEER



DESIGNED BY	APPROVED BY	CITY OF DETROIT DEPARTMENT OF PUBLIC WORKS BUREAU OF DESIGN
DRAWN BY J. Clark	ENGINEER OF STREETS	
TRACED BY	ASST. CITY ENGINEER	DETAIL STANDARD NO. 10 DWG. NO. C-4387
CHECKED BY T. H. ...	CITY ENGINEER	

DESCRIPTION: SEWER & DROP MANHOLES  
SCALE: 3/8\"/>



DESIGNED BY	APPROVED BY	CITY OF DETROIT DEPARTMENT OF PUBLIC WORKS BUREAU OF DESIGN
DRAWN BY	...	
TRACED BY	...	DETAIL NO. 21
CHECKED BY	...	

DESCRIPTION: SINGLE AND DOUBLE BEAM BARREL BARRICADE  
SCALE: 1/2\"/>

**NOTES**

BEAM SUPPORTS SHALL BE 55 GALLON SALVAGED BARRELS PAINTED HIGHWAY YELLOW (NON-REFLECTORIZED) AND PROVIDED WITH DRAIN HOLES.

ALL OF GUARD RAIL SHALL BE PARTIALLY REFLECTORIZED WITH WHITE OR SILVER BEADED SHEET MATERIAL COVERING 25% OF SURFACE AREA PAINTED IN THE FORM OF HORIZONTAL (1 1/2\"/>

