MICROFILMED

APR 16 1965

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~ GRAND AVE. ~

℄ Station Rose Canyon Creek Bridge

Walker Pope Oltman

Plan 2561-D

WO 22093

2-17-55

23+14.94 = Paving Notch

23+14.22 = End Bridge Deck

23+13.72 = ℄ Bent #4

22+67.72 = ℄ Bent #3

22+07.72 = ℄ Bent #2

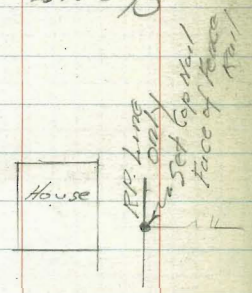
21+61.72 = ℄ Bent #1

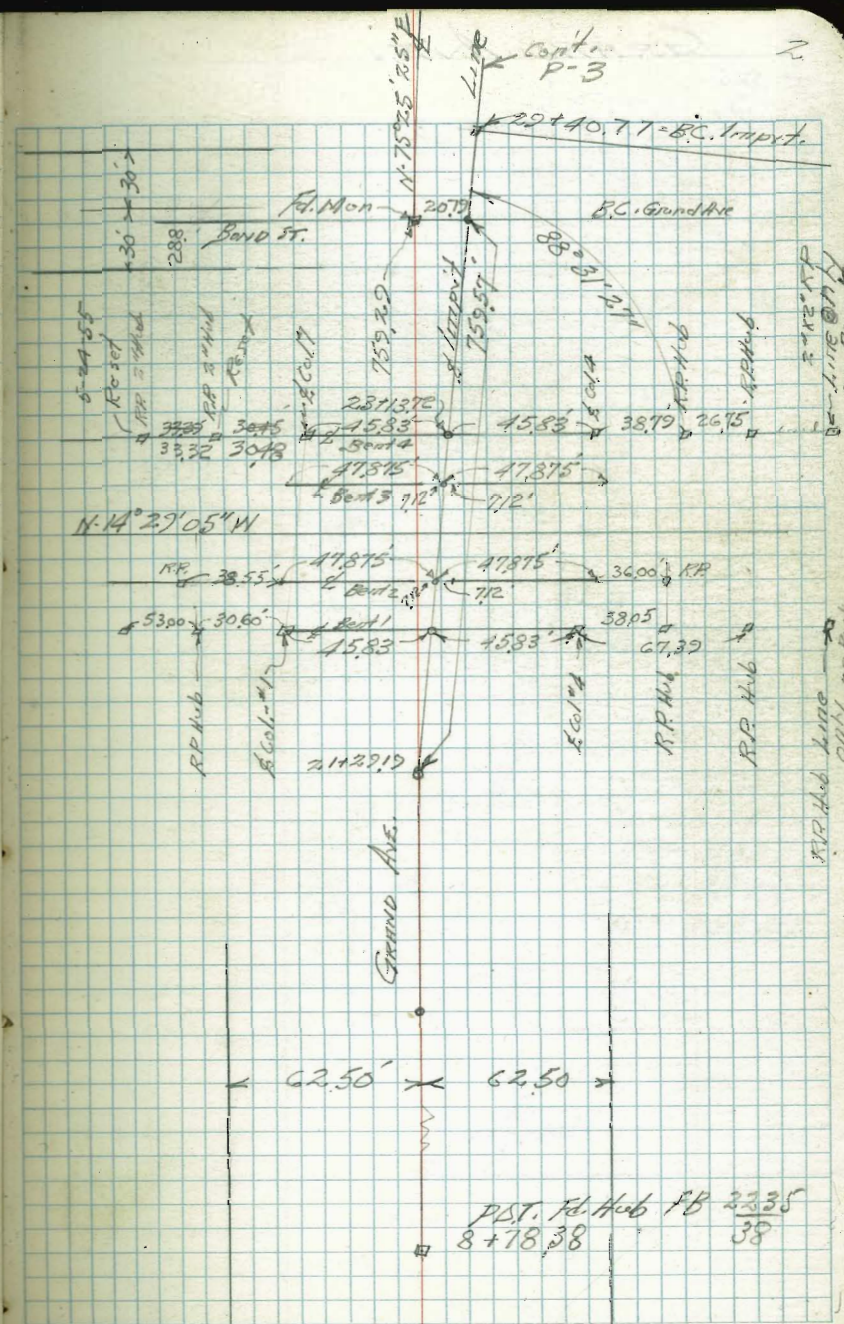
21+61.22 = End Bridge Deck

21+60.50 = Pav. Notch

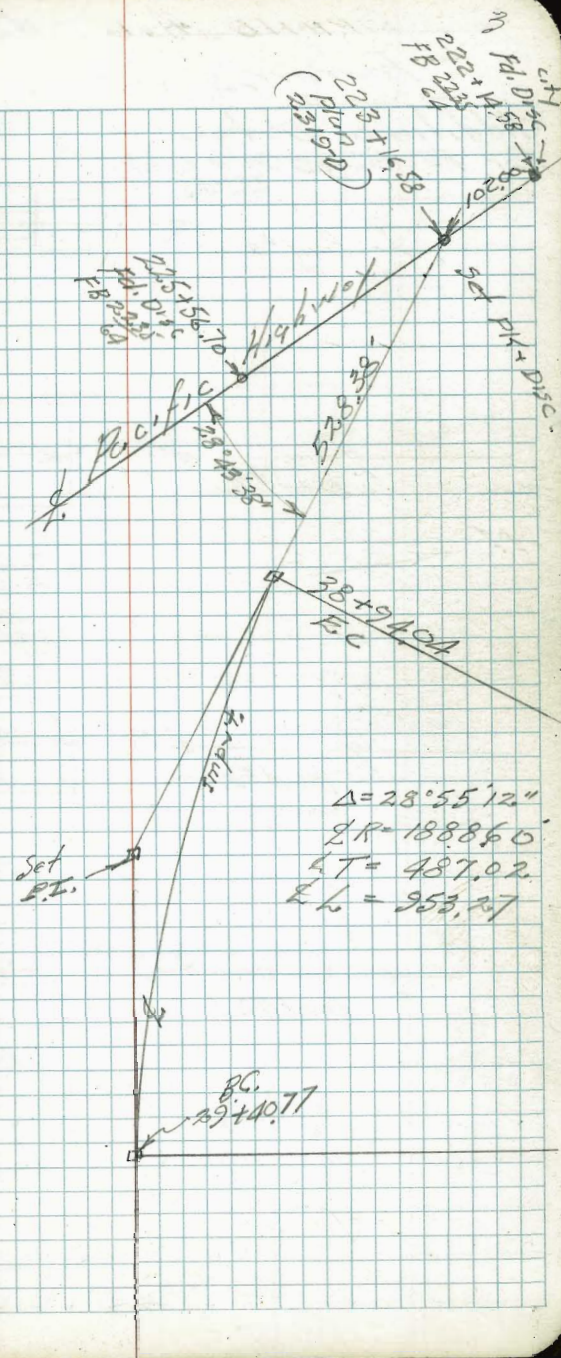
21+29.19 = Δ Rt 1°34'08"

19+29.60 = P.O.T. Set PK & Disc in Pav.





GRAND AVE.

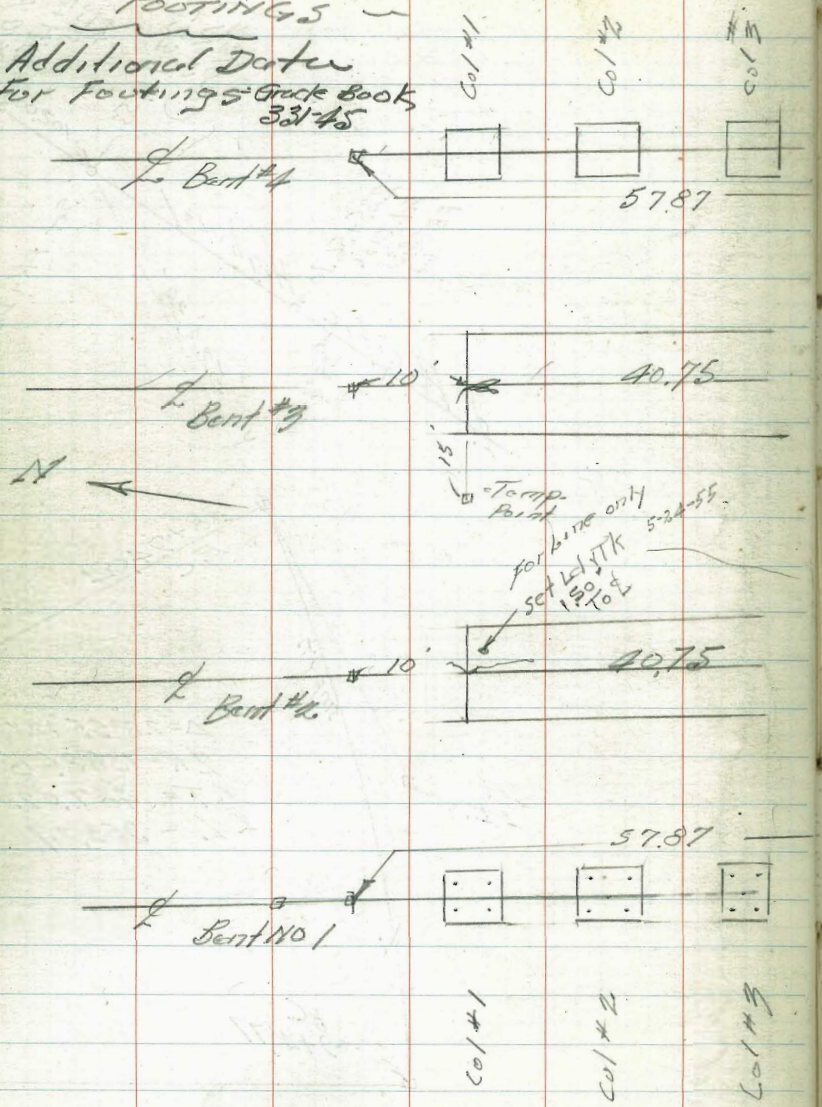


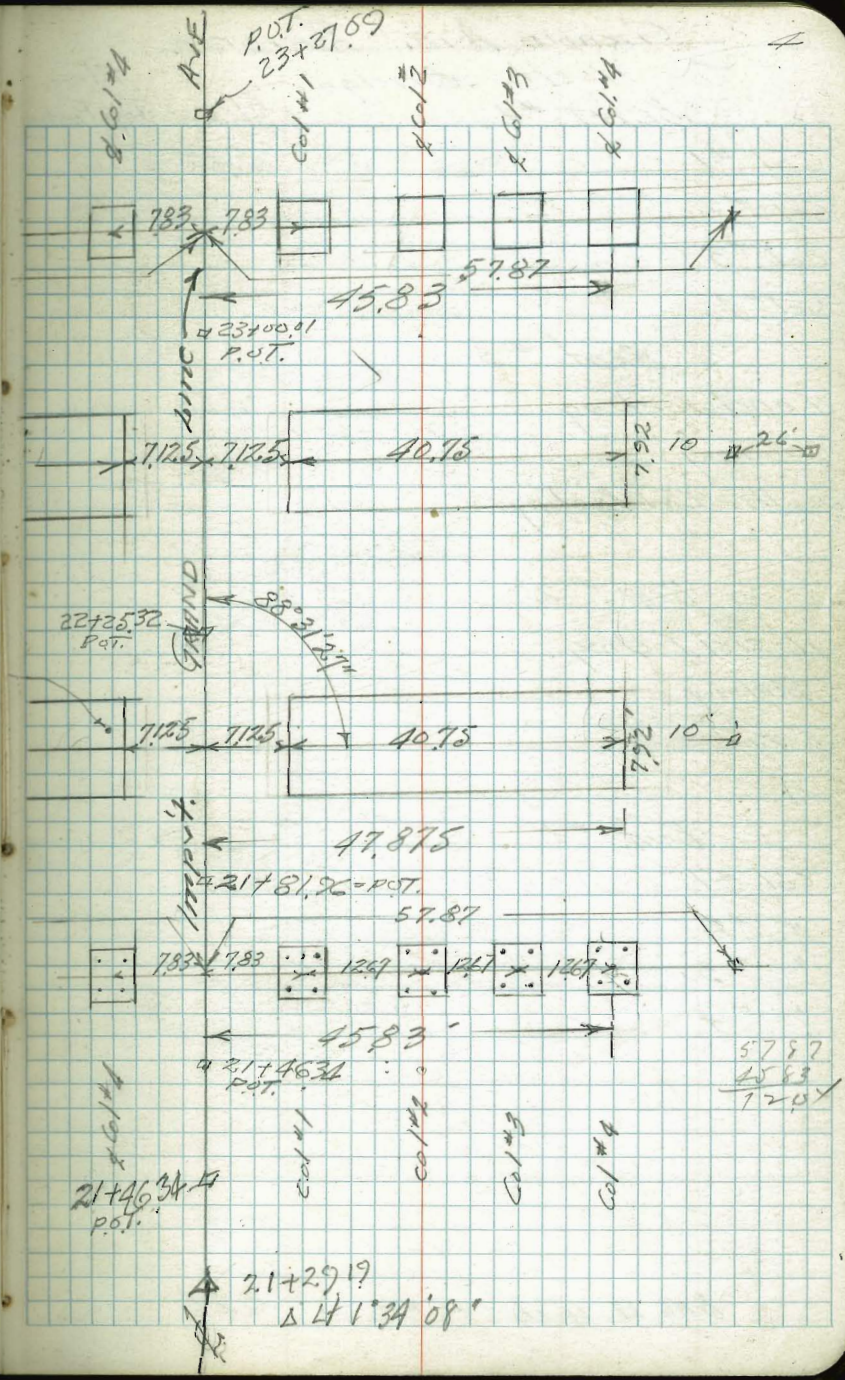
3
City Fd. Disc
222+14.58
FB 2235 64
223+16.58
plan (2319-D)
102.00
Set PK + Disc.
225+56.70
Fd. Disc
FB 2235 64
Pacific Highway
℄
28°43'38"
528.38'
38+94.04
E.C.
Impvt.
Set P.I.
Δ = 28°55'12"
℄R = 1888.60'
℄T = 487.02
℄L = 953.27
B.C.
29+40.77

GRAND AVE ~ BRIDGE

~ FOOTINGS ~

Additional Data
For Footings - Grade Book 331-45





57.87
45.83
12.04

GRAND AVE. BRIDGE

~ North Bridge ~

	El. Stukes	Elev. Top Footing		
BENT #4				
Col #1	2.18		RP 30.45' N of ℄ Col #1	
Col #2				
Col #3				
Col #4				
Bent #3				
N end Footing	-3.50		15' West of N End	Chk Top Conc. N end - 7.16
Midway				
South End Footing			15 "	Chk Top Conc. 7-15-55 ~ 6.48
Bent #2				
N-end Footing	-2.78		38.55' Lt = RP	7-15-55 Chk Top Conc. - 6.95 N-end
Midway				
S End "				Chk Top Conc 6.21 South end
Bent #1				
Col #1	2.35		30.60 Lt	
" #2				
" #3				
" #4				
B.M. □ inch P-32	6.26			

GRAND AVE. - Bridge

South Bridge - Footings

BENT #4	Elev. Stakes	Elev. Top Footing
		-5.00
Col #1		
" #2		
" #3		
" #4	0.69	
Bent #3		
N end Footing		
Midpoint		
South End Footing	-3.57	
BENT #2		
N end Footing		
Mid point		
South End Footing	-3.64	
BENT #1		
Col. #1		
" #2		
" #3		
" #4	0.55	
curb 62.5' Rt 20+83 FB 2235-52		
ctrk x Set BM	6.26	
	4.39	

38.79' South of ℄ Col. #4

15' West

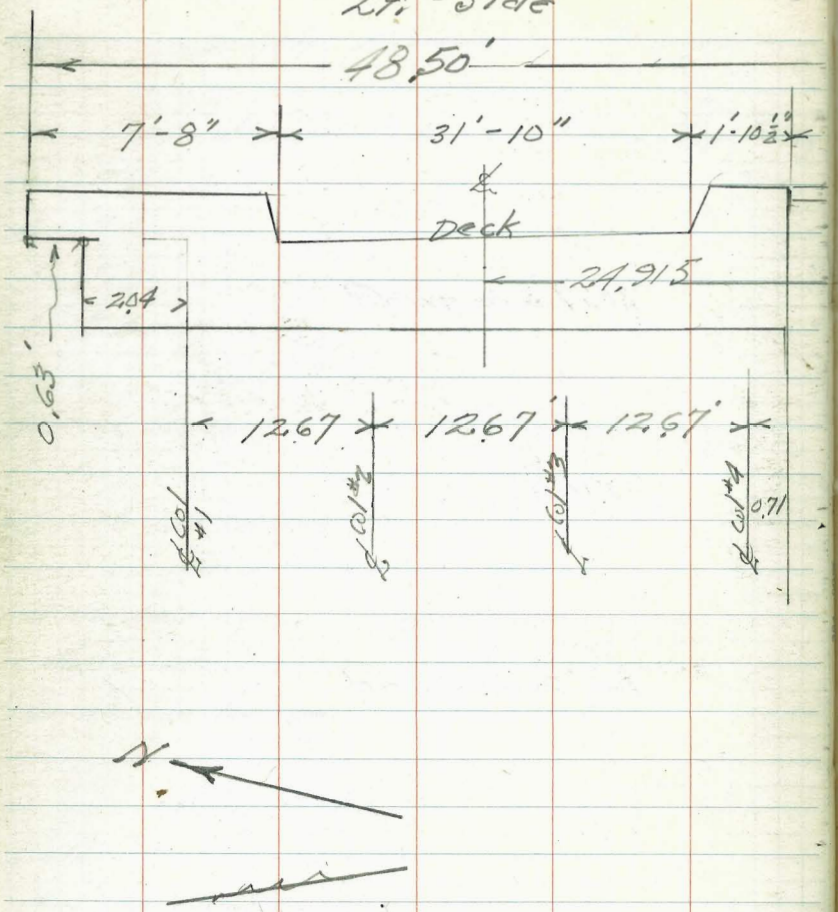
36.0' South of S end

38.05
~~38.85~~ South of ℄ Col. #4

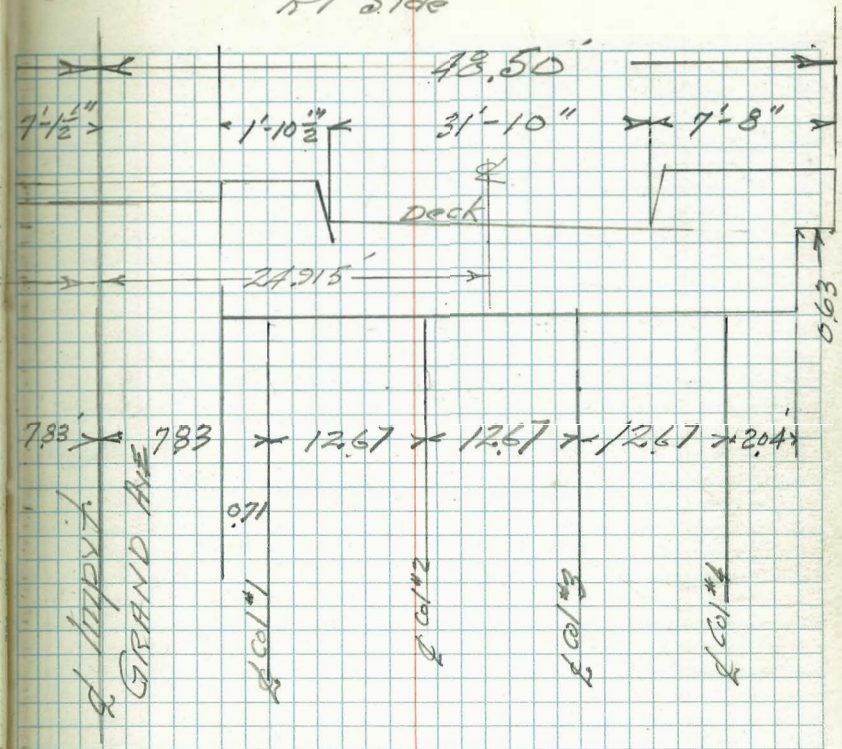
Set
B.M. = chisled Square End East. Curb 20+83 = 62.5' Rt

B.M. PK Nail in Pole #299 43.5' Rt 21+45 F.B. 2235/52

GRAND AVE. BRIDGE
Lt. - Side



GRAND AVE. BRIDGE
RT side



~ GRAND AVE. ~

Walker
Pope
Altman
Clow
3-2-55

BENCH MARKS. For
Channel Construction
from 0+00 of Channel
To 16+72.3 = Exist. 60" R.C.P. CULVERT.
at DE-ANZA RD.

Cont. P-13

	6.01	15+11.80 = E.C. 20' Lt.
	-2.29	Elev. Invert Exist. 60" RCP Culvert 16+72.30
	4.29	Top Hd Wall at ℄ of Culvert 16+72.3
	6.71	13+28.71 BC 20' Rt.
	7.45	10+77.62 E.C. 20' Rt
	7.17	10+06.04 = E.C.
T.P.	6.55	8+96.36 = E.C 20' Rt
T.P.	10.80	5+28.32 20' Rt on stake
	11.34	℄ stake 3+84.49 = E.C
T.P.	8.10	
Set New Spike 9-16-55	9.07	
Direct Elev. Rod used	~~10.65~~	BM. 3 Nails in Pole = P-10

~ GRAND AVE. ~

Grades For 3'X8' Box Culvert
at Station 40+77
Plan 2321-D WO 22093
Reference

1+09		12.75	-0.39	-0.12	F0.27
0+75		13.24	-0.88	0.00	F0.88
0+25		13.23	-0.87	0.18	F1.05
0+00		12.22	0.14	0.27	F0.13
@BM	1.71	12.36	10.65		

Finish Grades = Above Data

	El. Stakes	El. Invert	
1+24.62 = ℄ channel	7.86	-0.12	C7.98
1+09		-0.12	
0+75			
0+~~51.62~~ 50.8	7.64	0.09	C7.55 10' Rt
0+25			
0+00	4.53	0.27	C4.26 10' Rt

Rough Grades

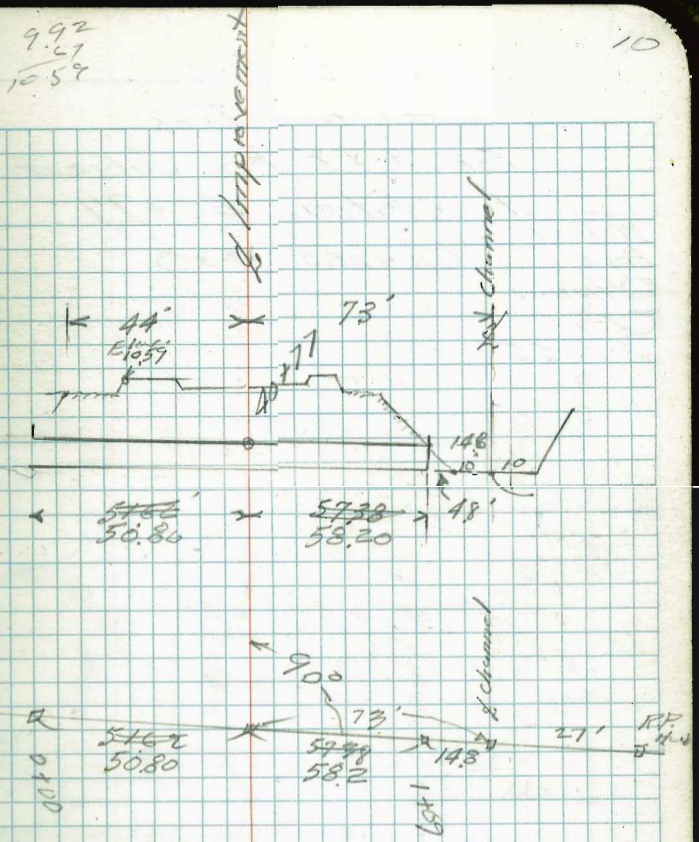
Set New Spk. 9.07

3 ~~Nails & Shiner~~ Approx

Set B.M. on Pole on Rt 41+50 ~~10.65~~ ~~P-10~~ P-7

11.63

9.92
.67
10.59



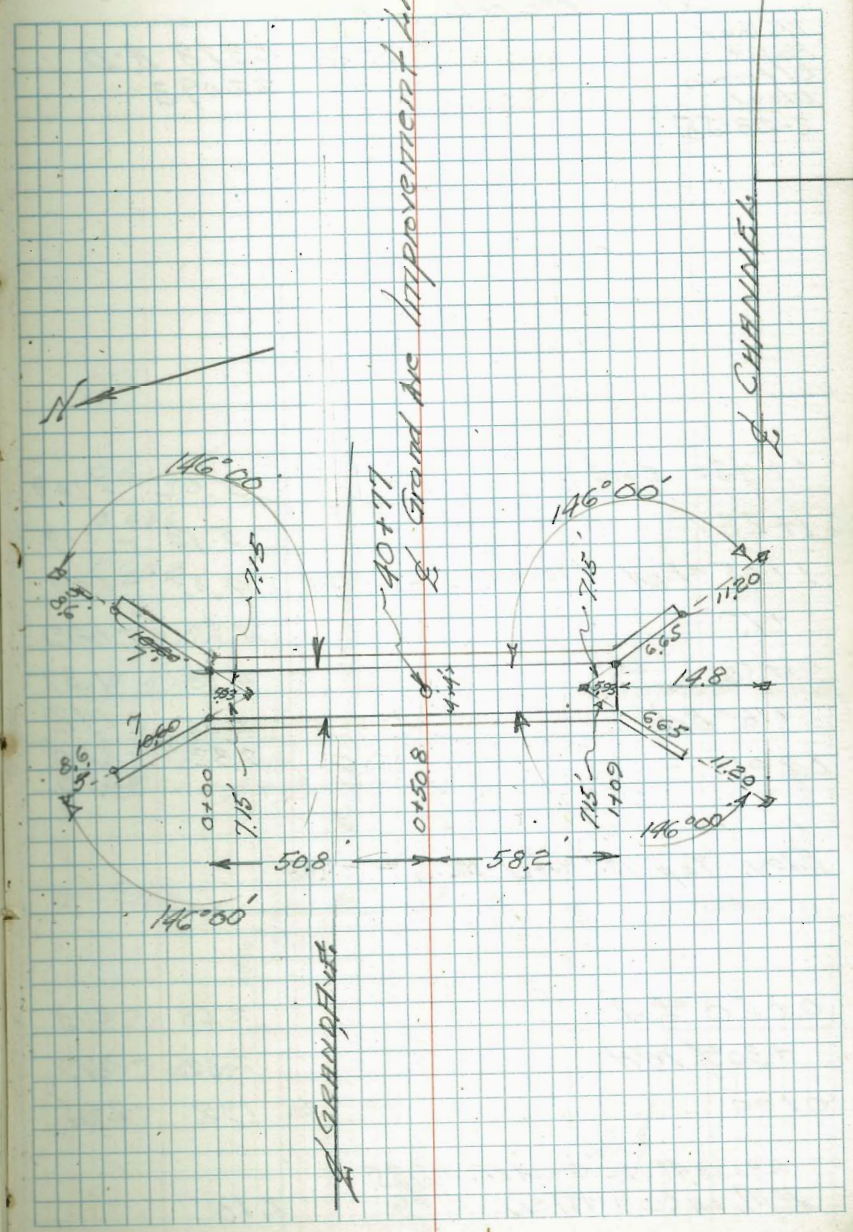
B.M. on ℄ Hub 12+97.57 FB 2382-1

GRAND AVE.

Reference Ties
For 3'x8' Box Culvert
at Station 40+77

GRADES P-10

Walker
Pope
Ottman
Owl
3-2-55



GRAND AVE. ~ SEWER CONST.

at BOND ST.

Walker
Pope
Oltman
Olow
2-23-55

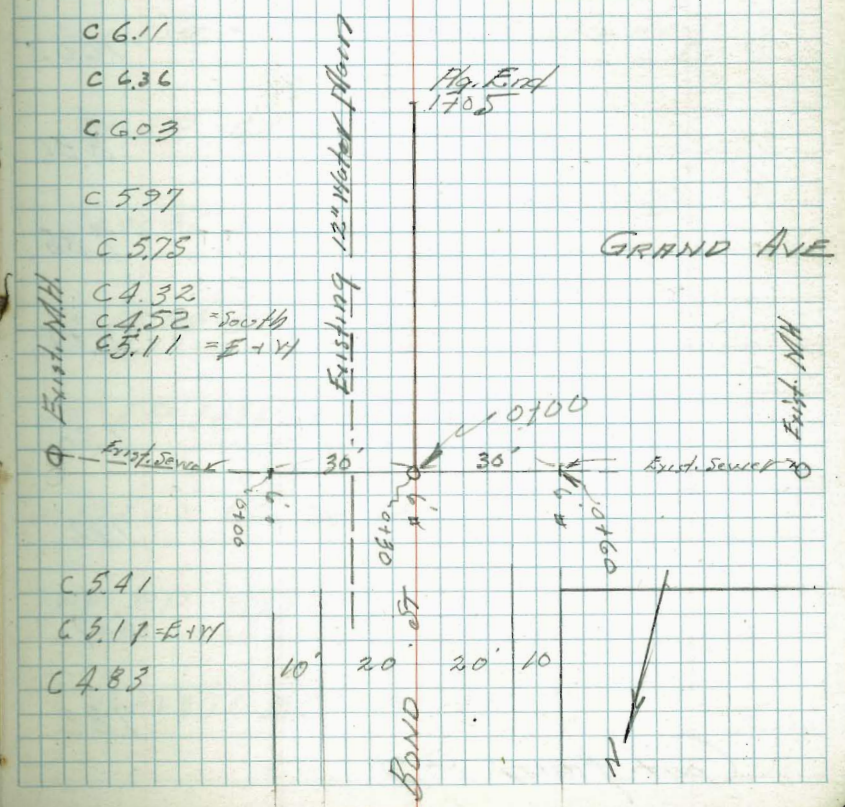
Plan 2318-A-D
WO 22093

1+45 = End		5.02	-1.09
1+25		5.19	-1.17
1+05 = End	chk. Exist. F.L. -1.25	4.83	-1.20
+75		4.68	-1.29
0+50		4.38	-1.37
+16 = Brk		2.85	-1.47
0+00		2.32	-2.20
			-2.79

Elev. Top 12" Water Main = -0.88

0+60 = End		2.68	-2.73
+30 = ℄ MH		2.32	-2.79
0+00		1.98	-2.85

old.
2.8+88.48 = B.C. Grand F.B. 2235/56
B.M. on Conc Mon 2.13



GRAND AVE

BENCH MARKS

Cont. from P-9

BM Set Chisled Square NE Cor Hd. Wall on Lt. 4.91 → Sketch P-13

9.07 Set Next BM. Large Spk. 9-16-58

Error = 0.01

~~10.65~~

10.64

Chk starting BM Nails in Pole P-9

0.01

11.63

11.62

Chk BM on EC & Hub P-10

10.03 City Disc. = 232+14.58 = Sta. Pacific Hwy.

8.36 PK RR 64' Lt 8+96.36

7.85 8+96.36 E.C. 20' Lt

8.05 10+06.04 - B.C. 20' Lt

7.30 PK RR 34.92' Lt 10+77.62

7.82 10+77.62 E.C. 20' Lt

6.27 PK RR 35.24' Lt 13+28.71

7.83 13+28.71 B.C. 20' Lt

Cont. from P-9

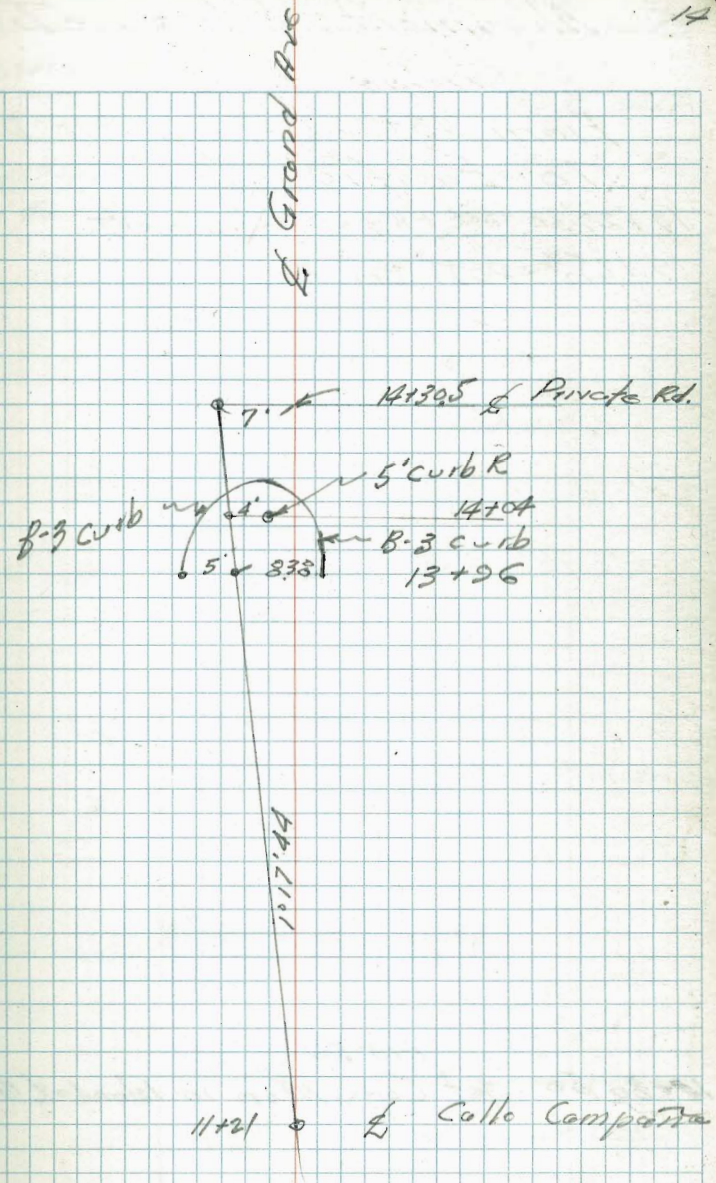
Curb Nose staking
at 13+96 To 14+04

Walker
Pope
Johns
Elmore

Plan 2316-D

Data by Phone
from MEHAN

9-8-55



Alignment - Reference Ties

Grand Ave

From 13+96 Plan 2318-D

To Pacific Highway

19+29.60 = set PK & city DISC. = P.O.T.

19+25.3 P.O.T. set PK

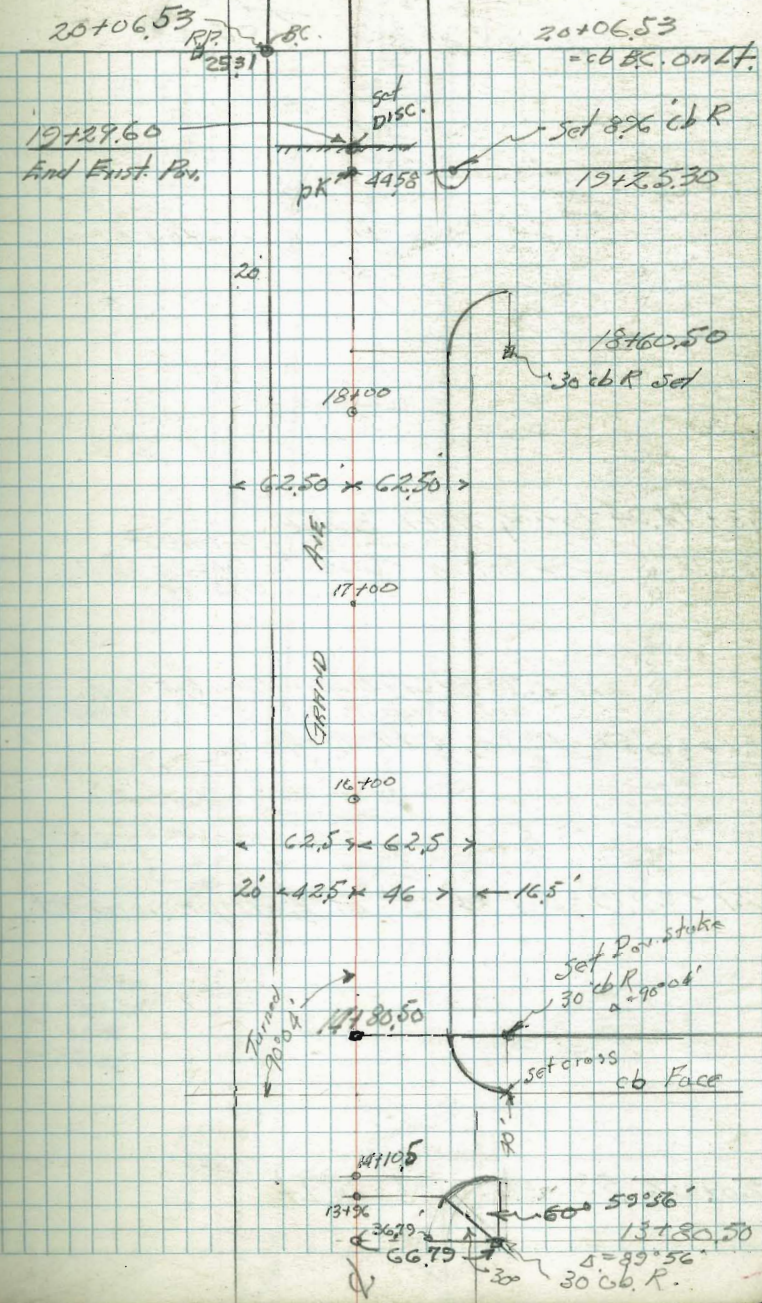
1-13-56

14+80.50 Set Conc. Mon in Island = ℄ Grand.

14+04 Set PK in Pav. 3.24' Lt = 5' Gut R For ctr. Island

13+96 = Beg. Project

13+80.5 = opp 30' cb R.



Grand Ave. ~ Alignment
Ties

21+60.76
153.65
23+14.41

23+14.94 = Paving Notch Bridge

23+14.41 → Set Ld & Disc Top Conc. Ret Wall ℄ Imprt. 8-18-55

Bridge P.2

21+60.76 Set Ld & Disc. in Conc. Ret. wall on ℄ Imprt. 8-18-55 - Walker.

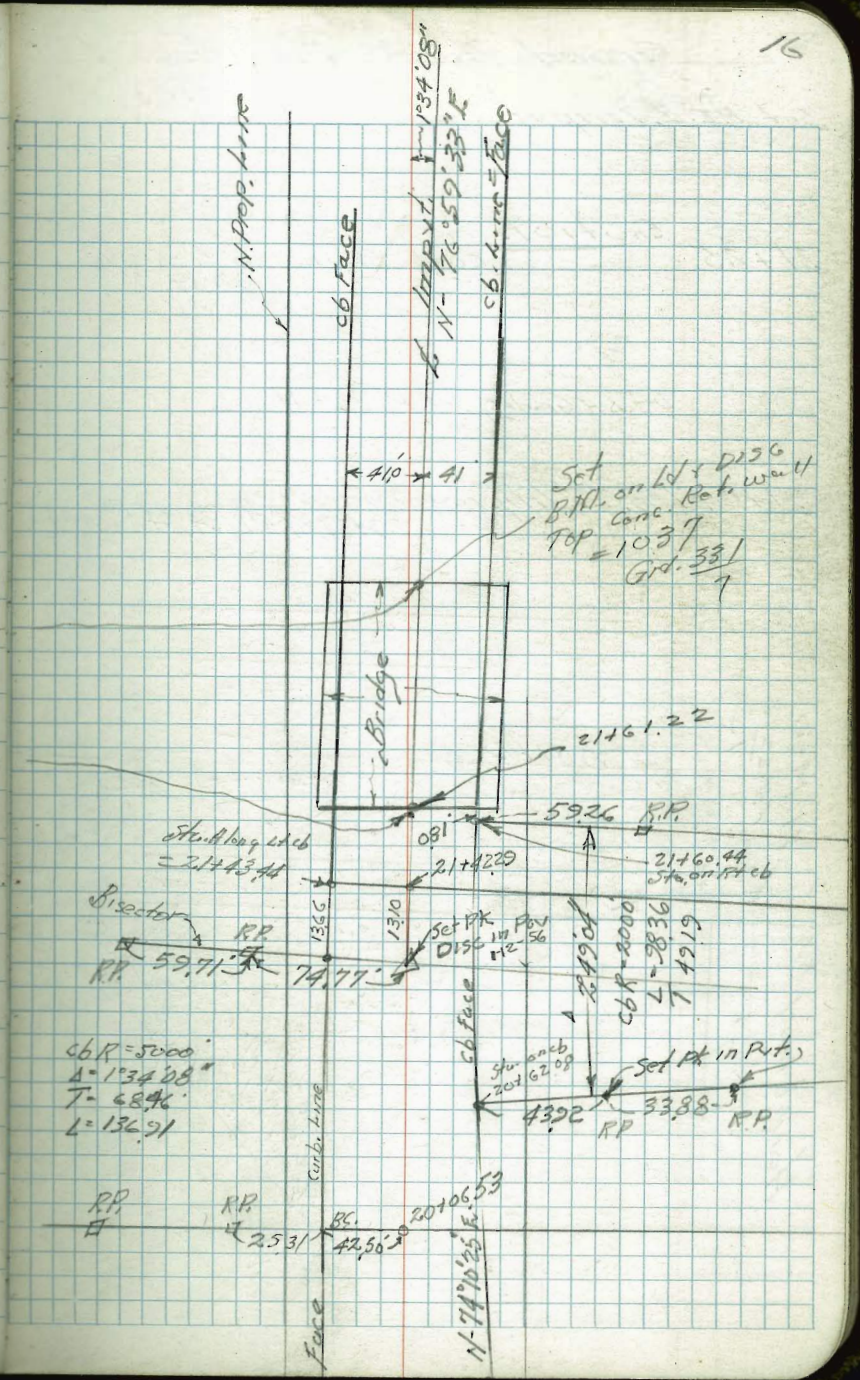
21+60.50 = Paving Notch Bridge

1°33'38" = WILD T2 - 1-12-56

21+29.19 = Δ 1°34'08" Rt = ℄ Improvement.

14

20+06.53 - B.C. Curb on Lt.



Grand Ave ~ Alignment ~ Ties.

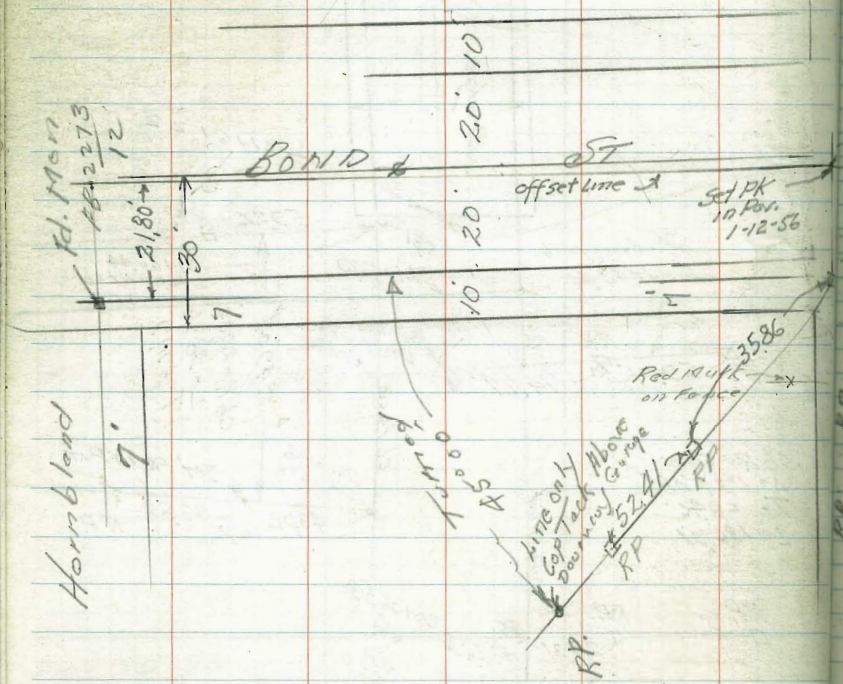
Set PI. ℄ Impvt.

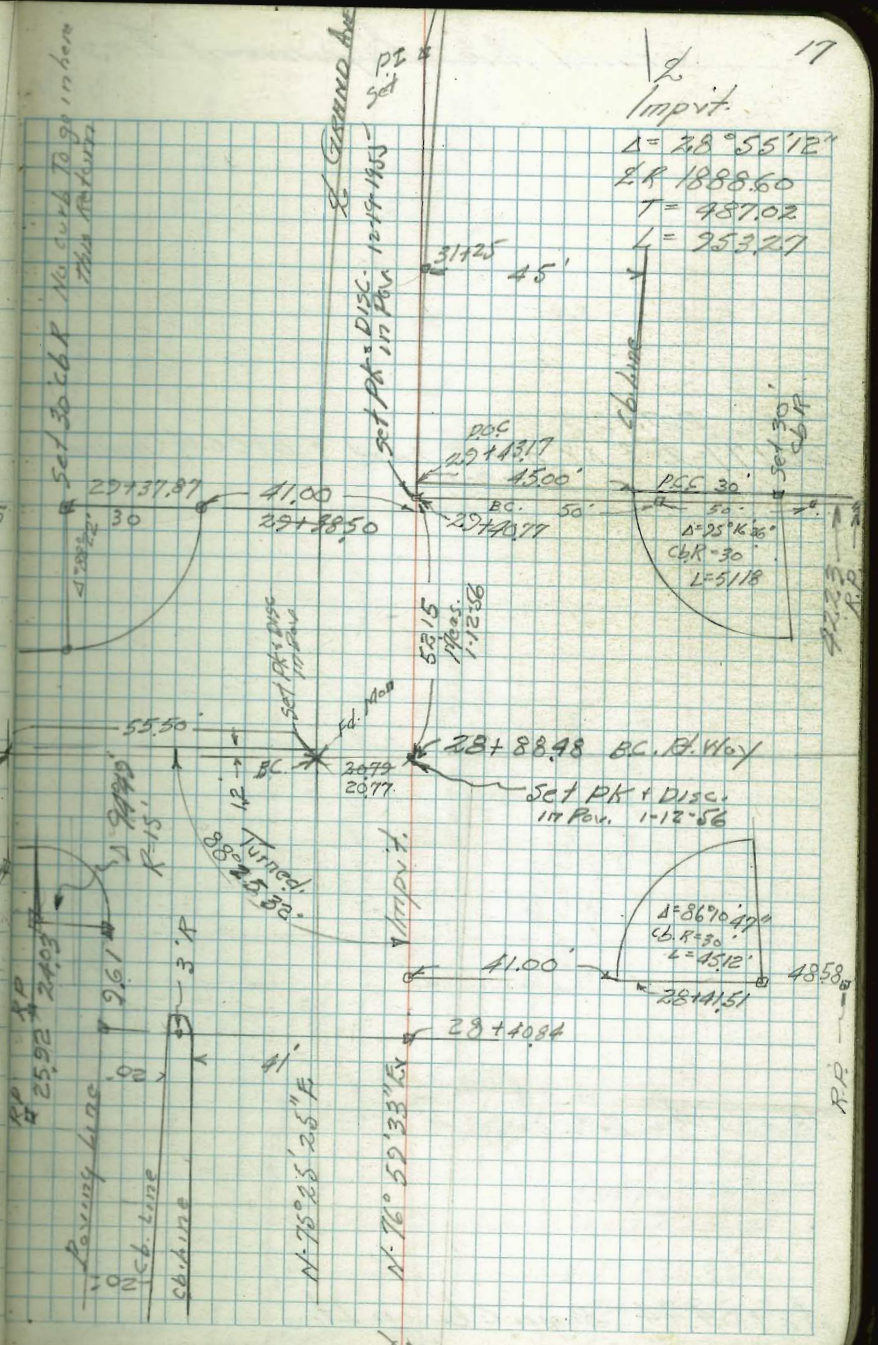
31+25 Caution Curb Begins To Narrow on Rt.

Def's & Grades, See P. 36-41

29+40.77 = B.C. ℄ Improvement

29+37.87 — 34.24 — 32.35



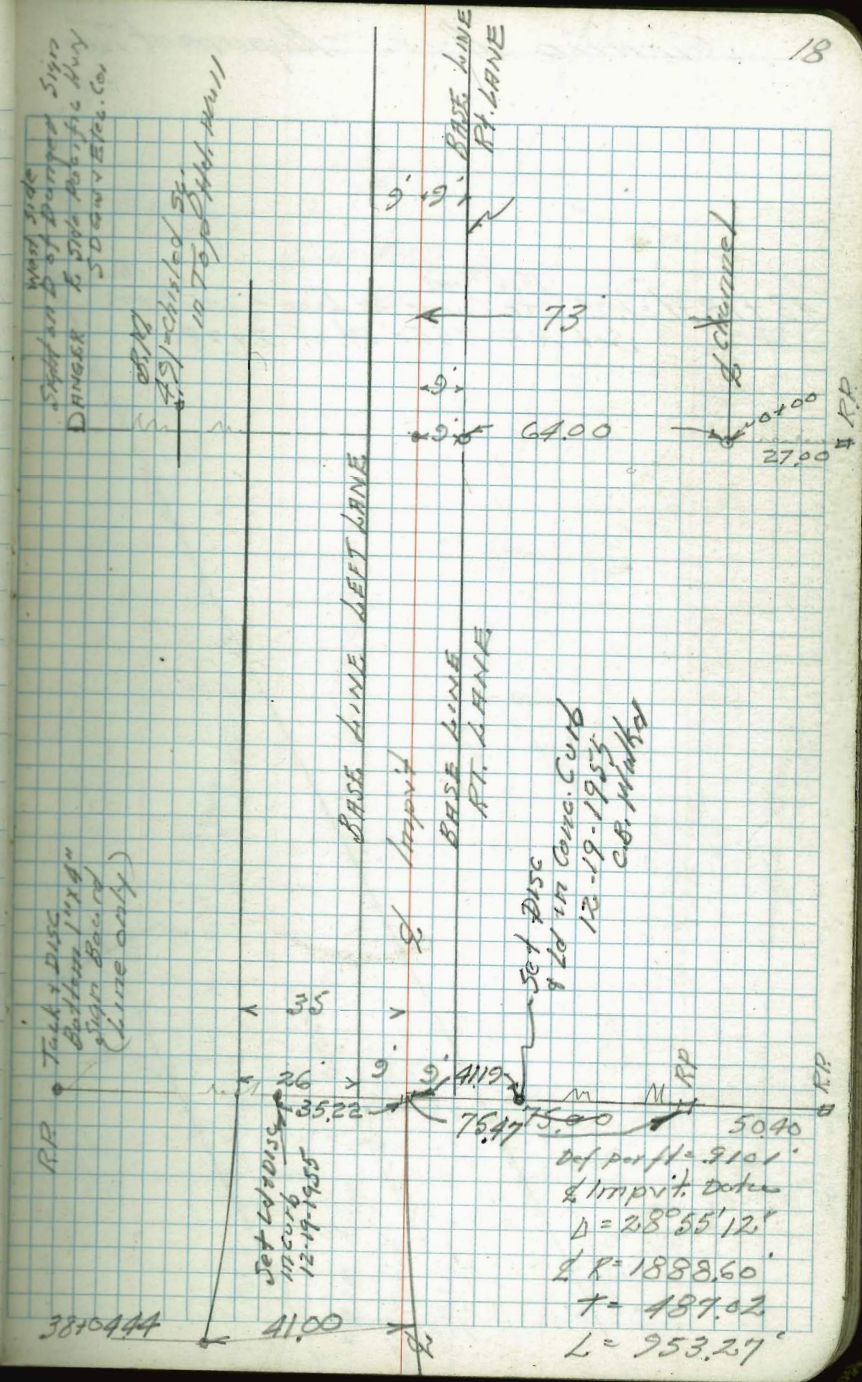


Grand Ave - Alignment Ties

P.O.T.
40+77 = ℄ 3'x8' Box Culvert = 0+00 of Channel
P-9-11

14 38+94.4 E.C.

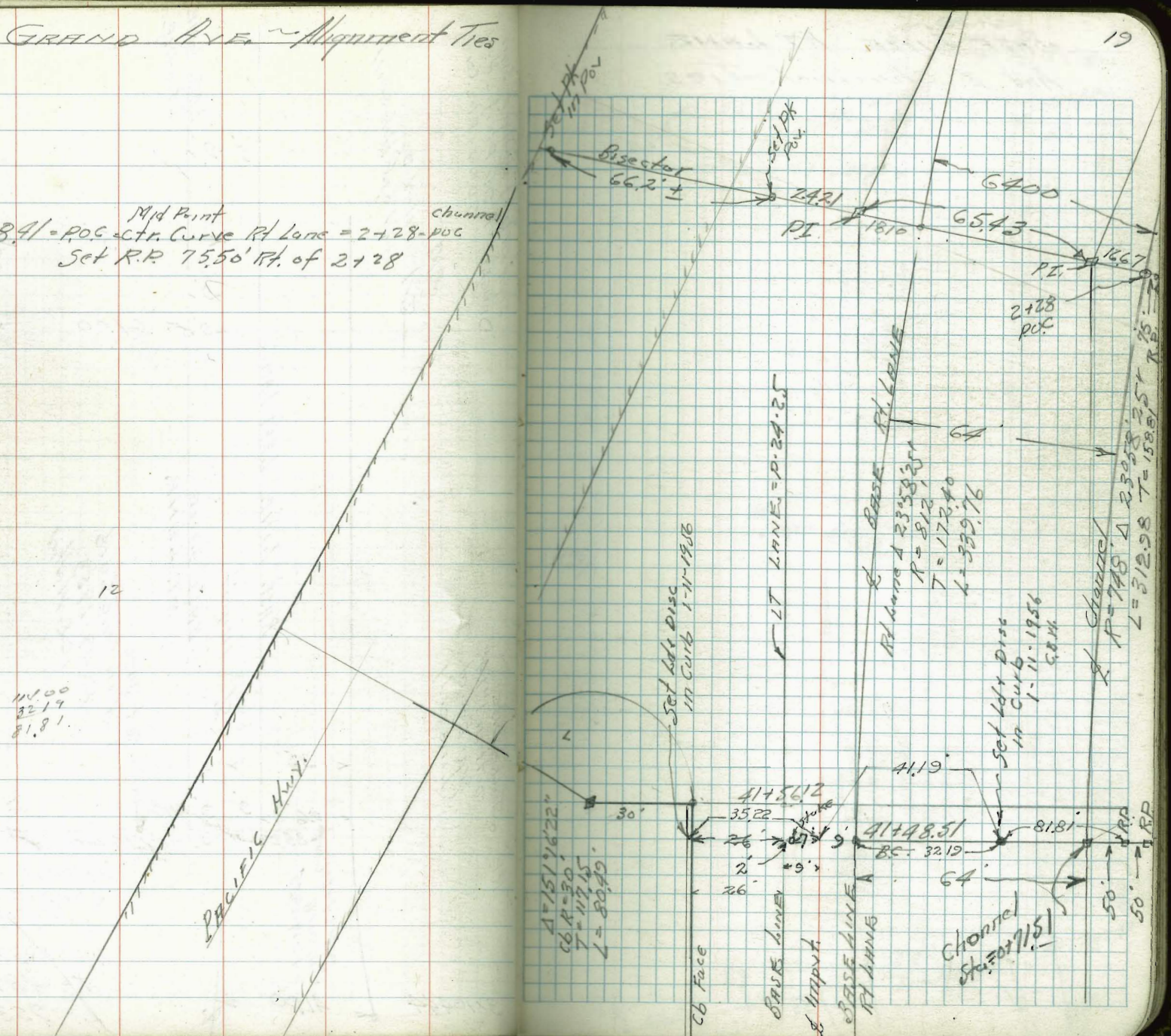
38+04.44 = Sign C.b. on Lt.



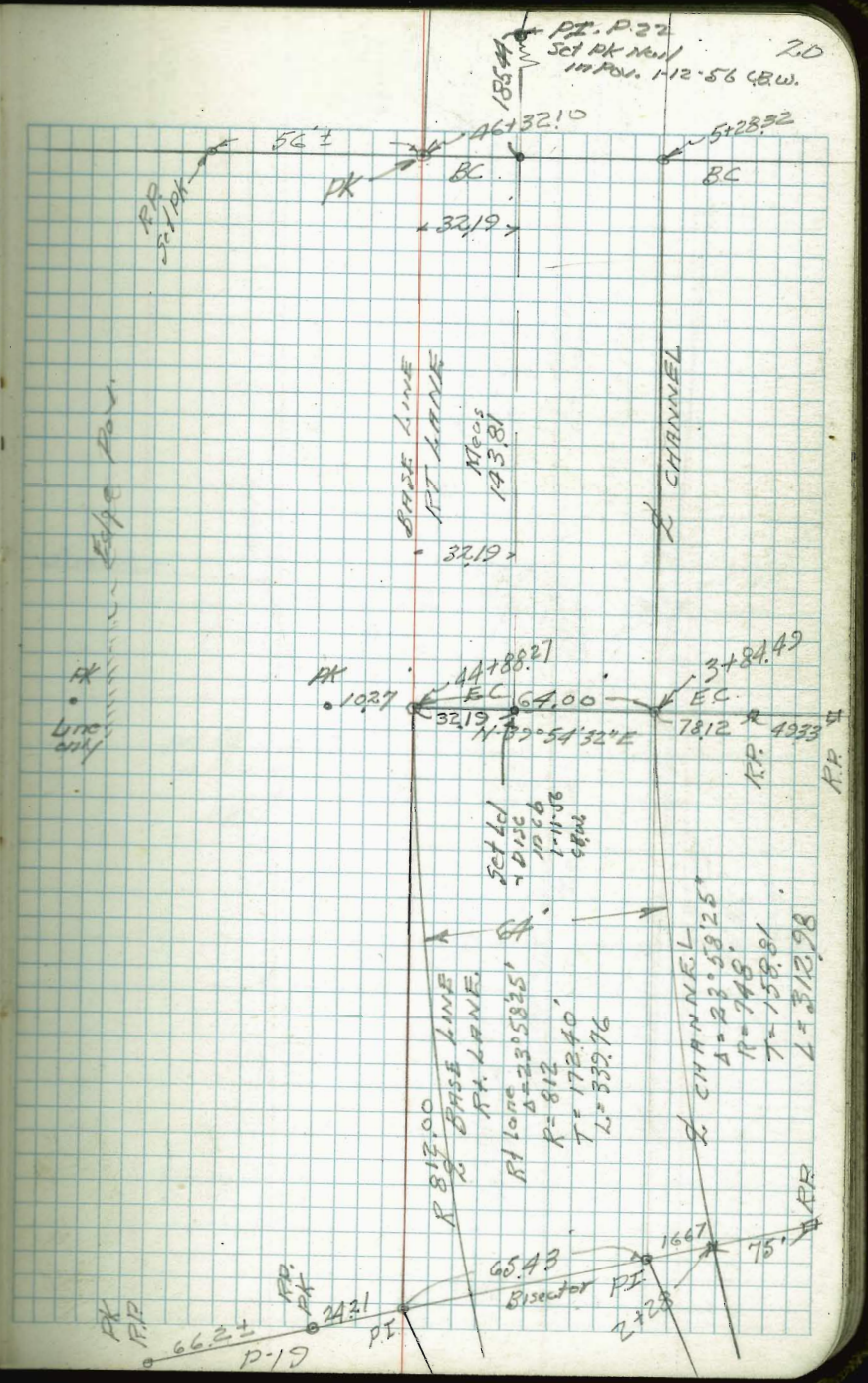
GRAND AVE. ~ Alignment Ties

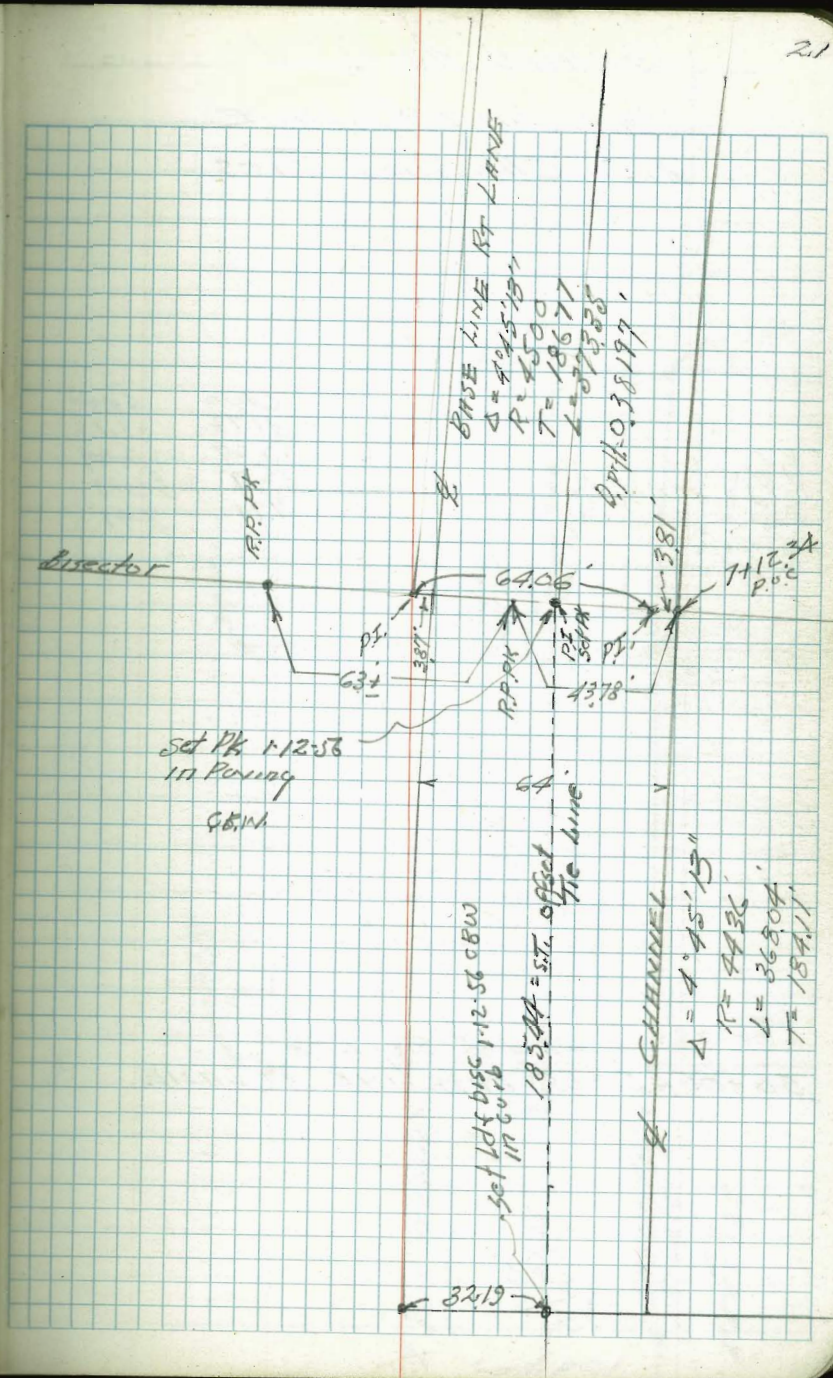
43+18.41 = P.O.C. = Mid Point Ctr. Curve Rt Lane = 2+28 = Channel POC

Set R.P. 75.50' Rt. of 2+28



BASE LINE RT LANE
And ℄ Channel ~ Ties.




BASE LINE RT LANE
Δ = 4°45'13"
R = 4500
T = 186.77
L = 373.35
D.pr/L 0.38197'
Bisector
R.P. PK
64.06'
3.81'
7+12.34 P.O.C.
P.I.
3.87'
63±
R.P. PK
P.I. set PK
P.I.
43.78'
Set PK 1-12-56 in Paving
C.B.W.
64'
Set Ldt bisc in curb 1-12-56 CBW
183.44 = S.T. offset Tie Line
CHANNEL
Δ = 4°45'13"
R = 4436
L = 368.04'
T = 184.11'
32.19

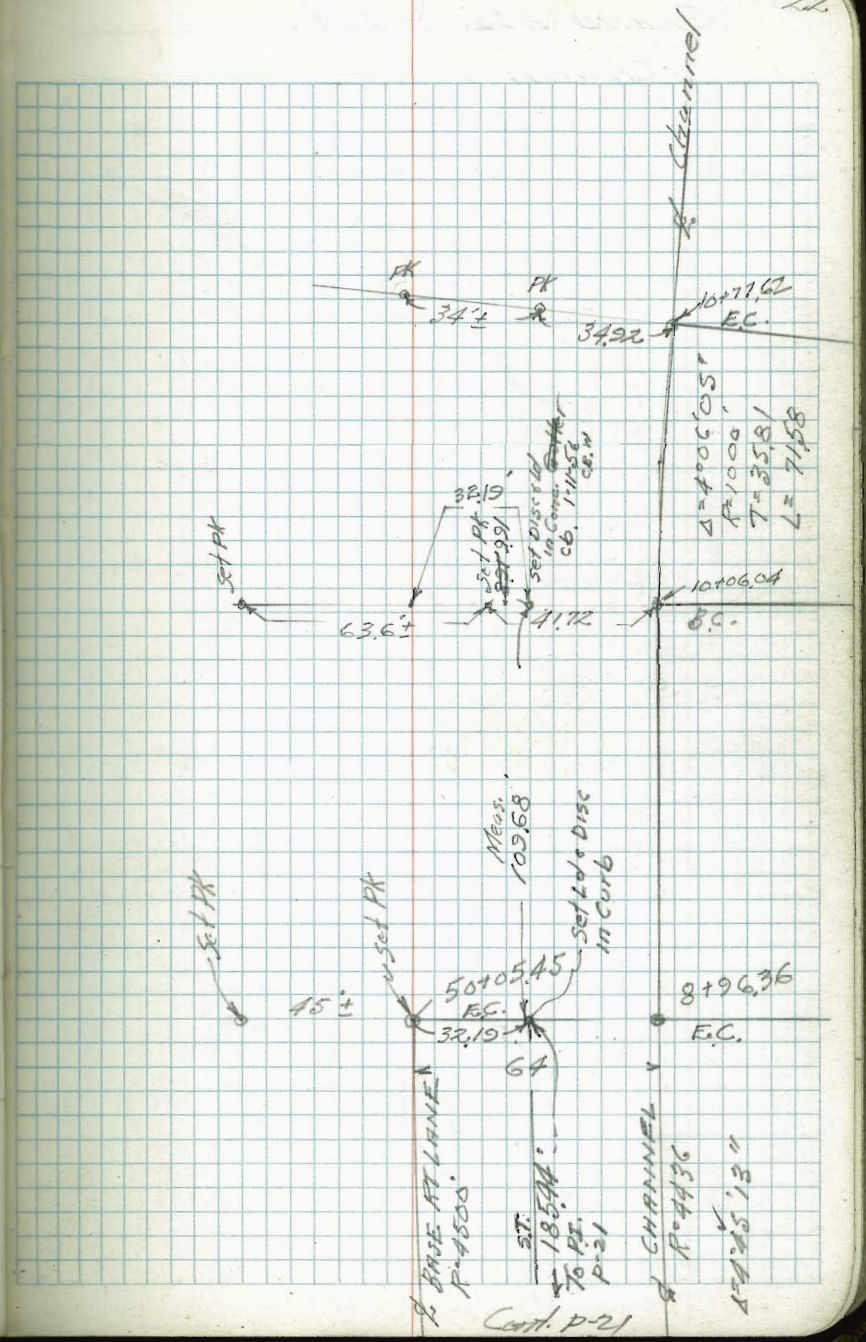
GRAND AVE ~ Job

BASE LINE RT. LANE
And Channel Ties

64.00	64.00
- 41.72	41.72
22.28	22.28
32.19	32.19
9.91	9.91

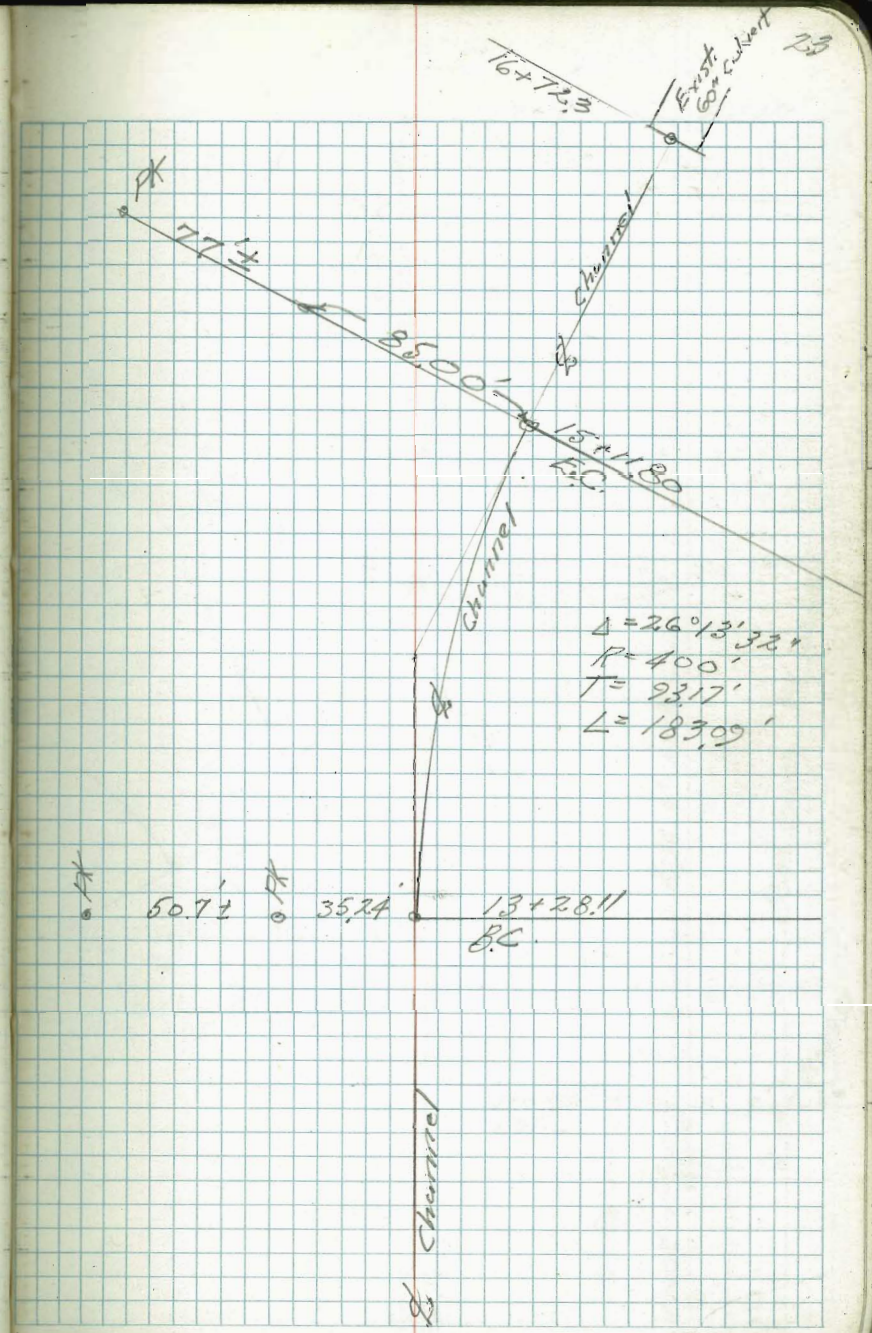
= End of Base Line

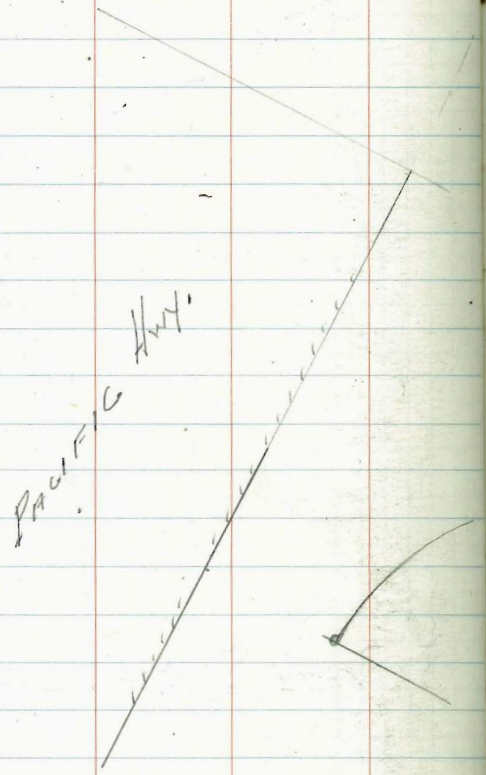
50+05.45 = E.C. BASE LINE RT. LANE

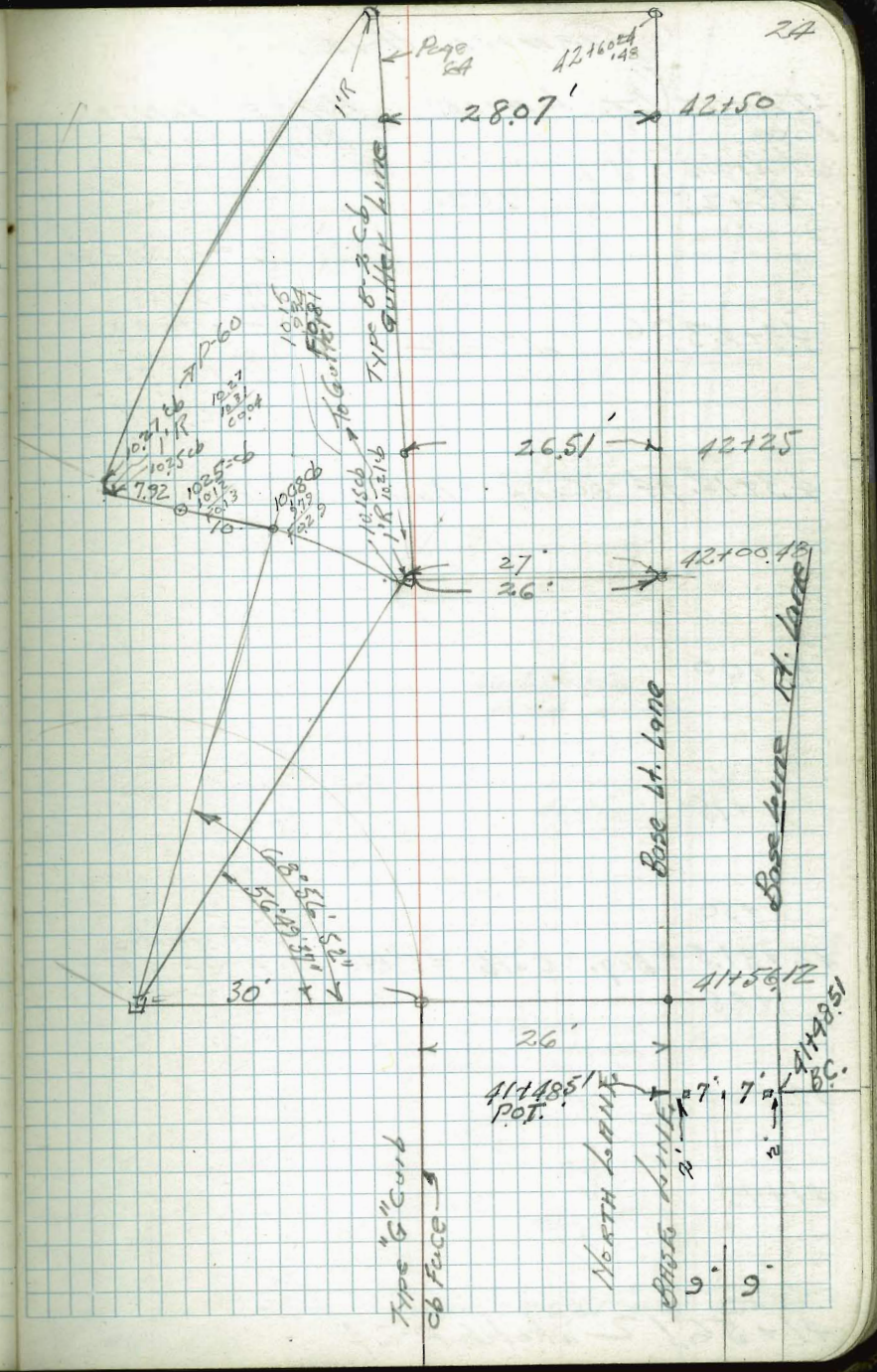


GRAND AVE ~ Job.

Channel Ties




PACIFIC HWY.


Page 64
42+60.24
.48
28.07'
42+50
1'R
Type 8-3 Cb Gutter Line
To Gutter
P-60
26.51'
42+25
7.92
10
27'
26'
42+00.48
Base Lt. Lane
Base Line Rt. Lane
68°56'52"
56°49'37"
30'
41+56.12
26'
41+48.51 B.C.
41+48.51 POT.
7'
7'
2'
2'
Type "G" Curb
Cb Face
North Lane
Base Line
9'
9'

GRAND AVE.

LT. LANE (LT. LANE BASE LINE Alignment)

Base Stations

43+25 1°18.24

Δ = 28°43'38"
R = 276
T = 70.68
L = 138.38
d = 6.228

43+23.06 1°06.14

43+12.44 = BC Rt = Base Line Lt. Lane

43+00

+75

+50

42+31.5 = Beg. Curb = 5' Rt.

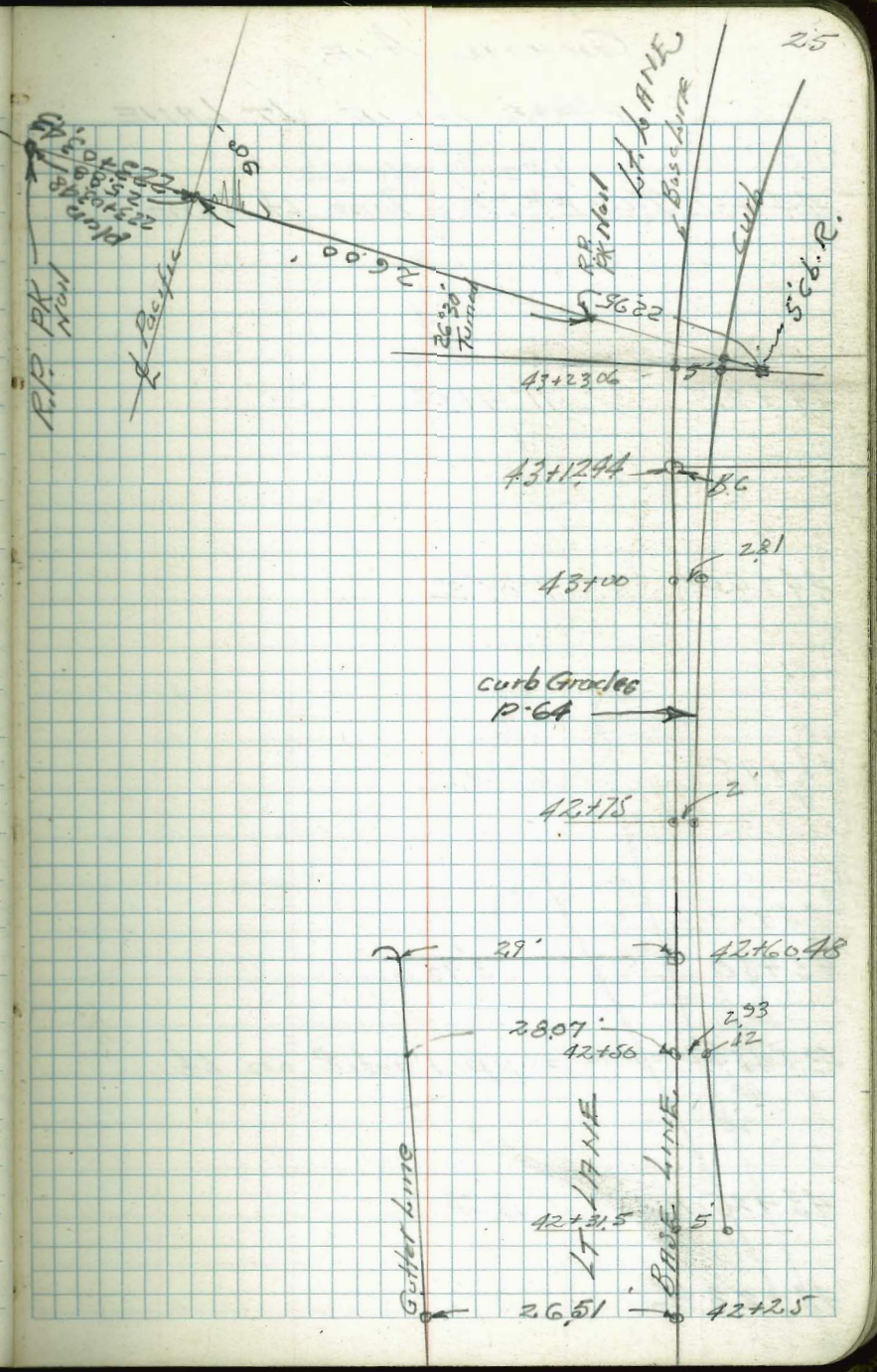
curb Grades P-64

+25

42+00

41+75

41+56.12 Sketch P-24



GRAND AVE

BASE LINE LT. LANE

14°21.89

44+50.82 = E.C. = Base Line Lt Lane

44+25 11° 41.02

44+00 9°05.32

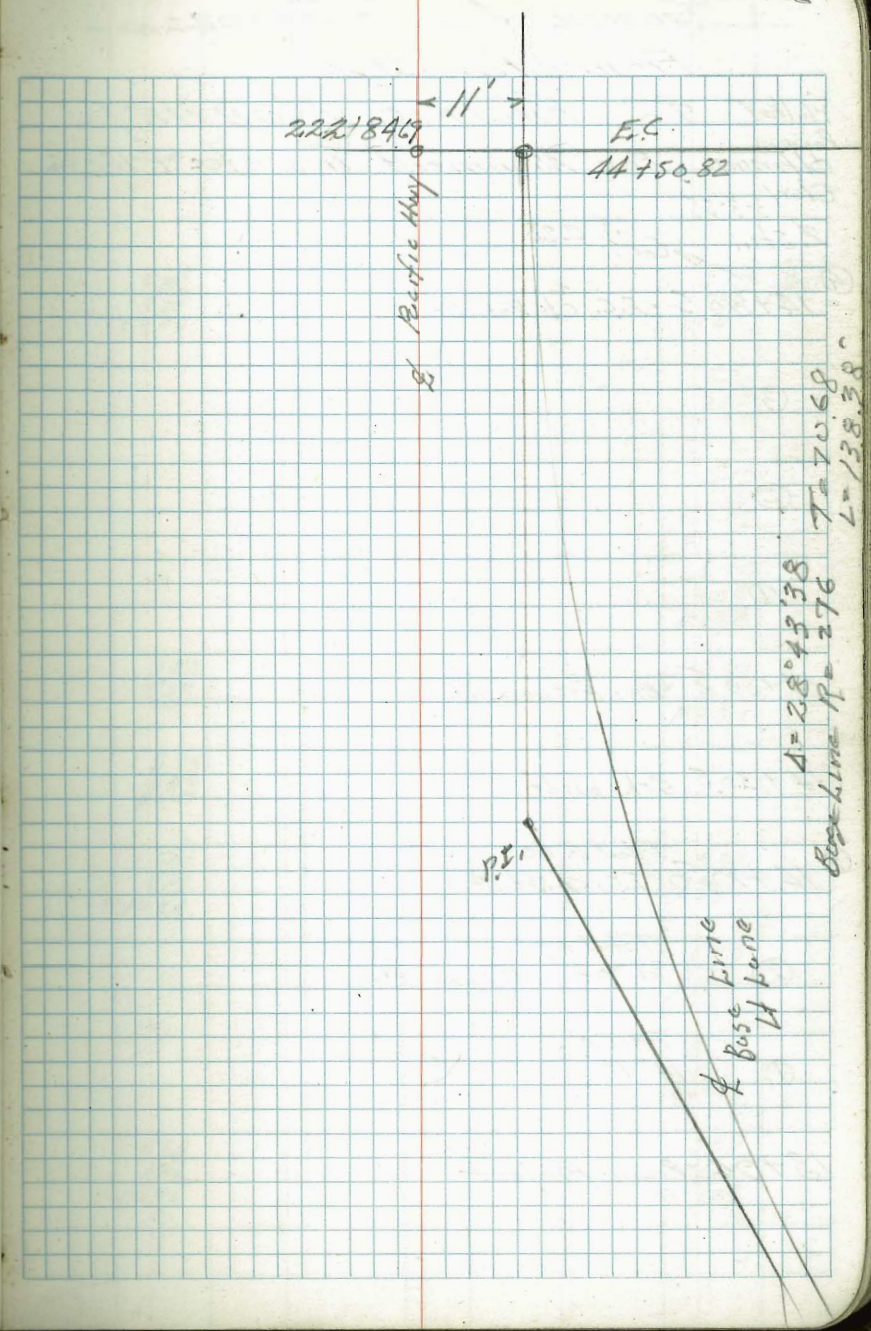
43+75 6°29.62

43+50 3°53.92

43+45.52 = P.O.C = opp 1' Gutter on Lt.

43+25 P.25 1° 18.24

43+23.06



GRAND AVE ~ GRADES

From Sta. 13+96

Walker To PACIFIC HIGHWAY

Pope

Oltman For Alignment Ties etc. = P-15, -26.

Olor 3-3-55

℄ Sta. Cont. P-28

	Lt. Cb.	℄	Rt. Cb	
④ = 14+80.5 = E.C. Cb Ret. Rt	5.86 5.95 C0.09		5.27 5.59 C0.32	5.27 5.67 C0.4
③			5.20 5.52 C0.32	
②			5.15 5.20 C0.05	
①			5.10 4.82 F0.28	
14+50.5 = B.C. Cb Ret. on Rt	5.82 5.82 0.00		5.04 4.77 F0.27	
14+30.5 Brk on Lt	5.79 5.62 F0.17			
③ 14+10.50 = E.C. Cb Ret Rt. Total Δ 60°	5.81 5.57 F0.24		5.02 4.51 F0.51	
② Total Δ 37°04' Ret. on Rt.			5.09 3.99 F1.10	
① Total Δ 14°16' " " "			5.20 3.95 F1.25	
13+96 = Begin Project	5.84 5.48 F0.36		5.35 4.13 F1.22	

℄ Station		Lt cb		Rt cb	
18+00		6.69 6.69 0.00		6.35 6.32 C0.17	
+75		6.61 6.67 C0.06		6.24 6.46 C0.22	C21 C18 C06
+50		6.54 6.62 C0.08		6.14 6.69 C0.55	17+35 6.10 6.7 C0.6
+25		6.48 6.56 C0.08		6.03 6.27 C0.24	
17+00		6.42 6.47 C0.05		5.93 6.28 C0.35	5.73 6.31 C0.4
+75		6.34 6.36 C0.02		5.85 6.15 C0.30	
+50	6.23 = T.R	6.26 6.23 F0.03		5.78 6.27 C0.49	
+25		6.18 5.90 F0.28		5.70 6.13 C0.43	5.7 6.3 C0.6
16+00		6.10 5.95 F0.15		5.63 5.95 C0.32	
+75		6.03 6.06 C0.03		5.55 5.86 C0.31	5.5 5.88 C0.3
15+50		5.97 5.93 F0.04		5.48 5.66 C0.18	
15+25		5.92 5.87 F0.03		5.40 5.69 C0.29	5.4 5.7 C0.3
15+00	5.69 T.R	5.89 5.95 C0.06		5.33 5.64 C0.31	

℄ Sta	Hinge = N Line Grand	Lt cb	℄		Rt cb	
19+75		7.43 7.50 C0.07	7.99 = cb 7.38 F0.61		7.27 6.85 F0.42	
19+50	7.86 3.96 F3.6 5.5	7.22 7.19 F0.03	7.82 = cb 7.06 F0.76		7.07 7.01 F0.06	
19+29.6		7.07 6.75 F0.32	7.24 = Pav			
				Ctr Rt 7.02 6.86 F0.16	E.C. 6.88 North 6.83 F0.05	E.C. 7.17 South 6.80 F0.37
19+25.3 E.C. + B.C. cb Rct on Rt						
7.28 = T.P. Top Lath						
19+16.34 = ctr. Rct. on Rt.					7.02	
19+00		6.96 6.93 F0.03				
④ 18+90.5 = E.C. cb. Rct Rt.				7.17 7.01 F0.16	= Exist. 7.12	
③				7.21 7.35 F0.16	7.17	
②				6.96 6.59 F0.37	6.93	
18+75		6.89 6.75 F0.14				
①				6.66 6.93 C0.27	6.64	
18+60.5 = B.C. cb Rct Rt					6.51 6.97 C0.46	6.5 6.9 C0.4
18+50 on Lt.		6.83 6.79 F0.04				
					6.45 6.73 C0.28	18+20 6.43 6.8 C0.4
18+25		6.76 6.79 C0.03			6.40 6.67 C0.27	

B.M. C.T. Disc ℄ W end Bridge 9.90

GRAND AVE
Grades

Station	Notes	Lt cb	℄	Rt cb	Other
		10.14	Lt cb. 10.73 / cb. 10.80 → To Meet Bridge cb → To Meet Exist Bridge cb	10.14	
21+61.22 = Begin Bridge Deck			For ℄ island Note: chk with McKee on Transition of B-Type curb into 10" curb at Bridge		
21+60.44 = Sta E.C. on Rt cb	Rt cb 1°24.5' 21+60.44 = EC; Sketch P-16; Stations are along Curb Line Through Curves				
21+50	Rt cb 21+50 1°15.61'	9.95 9.86 9.72 8.11 F1.75 — 21+43.44	cb 10.55 / cb 10.61 8.95 F1.66	9.96 8.46 F1.50	10.41 1.9 F8.5
21+43.44 = E.C. N Curb.	Note: stations on N curb from 20+06.53 to 21+43.44		21+38 → 10.33 8.72 F1.61		1.05 .27 F.78 1.17
+25 Lt cb 0°40.75	Rt cb 21+25 0°54.11; Δ=2°49'04"	9.52 8.48 F1.04	10.12 / cb 10.16 8.58 / 8.55 F1.54 / F1.61	9.51 8.43 F1.08	
			21+12.5 = 9.91 cb 8.94 F0.97		
21+00 Lt cb. 0°32.15	Rt. cb. 21+00 0°32.6; CbR=2000; cb L 98.36 on Rt cb	9.06 8.38 F0.68	cb 9.69 / cb. 9.71 8.36 / 8.18 F1.33 / F1.53	9.00 7.86 F1.14	9.45 5.5 F3.9 (9.42 / 3.4 / F6.0 / 9.0)
			21+87.5 = 9.48 cb 8.28 F1.20		
20+75 Lt cb 0°23.55	Rt. curb 20+75 0°11.1	8.68 8.32 F0.36	cb. 9.26 7.60 F1.66	8.64 8.35 F0.29	
20+62.08 ~~20+61.92~~ = B.C. Rt. on Rt cb	20+62.08 = B.C. ℞ ~~20+61.92~~			8.44 = cb 8.20 F0.24 Reset 8.44 6.46 F1.98 20+86.4 → 8.30 = Exist	
20+50 0°14.95		8.33 8.04 F0.29	cb 8.91 7.14 F1.77	8.26 6.52 F1.74	8.67 3.57 F4.1 6.1
20+25 0°06.35		7.99 8.08 C0.09	8.56 = cb 7.13 F1.43	7.88 6.52 F1.36	
20+06.53 B.C. Rt on cb on Lt.		7.76 8.17 C0.41			8.10 3.8 -4.3 6.5
20+00		7.68	8.23 - cb 6.80 F1.43	7.53 6.78 F0.75	

GRAND AVE ~ GRADES

G.J-331-7

B.M. Ld & Disc. East end Bridge 1037 = ℄ Impvt

23+14.22 = End Bridge Deck

	Lt cb.	℄	Rt. cb
		Lip 10.42 Gut 10.44 / cb 11.27 / cb 11.27 / 1042 Lip 1044 Gut	
23+00	10.69	cb. 11.33	10.69
+87.5			
+75	10.73	11.37	10.73
+62.50			
+50	10.71	11.35	10.71
+37.5			
22+25	10.63	11.27	10.63
22+12.50			
22+00	10.49	11.13	10.49
21+87.5			
21+75	10.28	10.92	10.28

℄ Station	GRAND AVE Lt. Prop Line Grand Ave	Lt. Ditch Grand Ave		Toe RP
26+00				2.98 2.90 F0.1
+75				
+50				3.67 3.63 00
+25				
25+00				3.45 3.2 F0.3
+75				
+50				3.13 3.53 C0.4
+25				
24+33	Set BM on	P.K. in Pole Rt - New Pole	4.85	Rechecked OK - 7-6-55 CB. Walker
24+00				2.52 3.12 C0.6
+75	Chisled □ in cb			
BM.	P-6	62.5' Rt 20+83	6.26	OK Used To Set Finish curb 7-6-55
+50				
23+25				
	Direct Elev. Rod used		4.39	

47' Hinge	Lt cb		℄	Rt. 33'	Rt cb	Hinge 5' RP
8.38 2.98 F5.4	8.26 8.08 F0.18	7.63=Lip	cb 881 881 881 / 876 432 871 / F0.05 F4.5 F0.10	7.83	8.26 6.17 F2.09	8.38 4.38 F4.0 6.0
8.57	8.45 8.30 F0.15	7.82=Lip	cb 900 900 / 898 887 / F0.02 F0.13	8.02	8.45 6.12 F2.33	8.57
8.77 3.67 F5.1	8.65 8.80 C0.15	8.02=Lip	cb 920 920 920 / 912 460 924 / C0.08 F4.60 C0.04	8.22	8.65 5.97 F2.68	8.77 4.25 F4.2 6.8
	8.84 9.05 C0.21	8.21=Lip	cb 939 939 / 955 940 / C0.16 C0.01	8.41	8.84 6.13 2.71	8.96
9.15 3.45 F5.7 8.6	9.03 8.96 F0.07	8.40=Lip	cb 958 958 958 cb / 950 475 937 / F0.08 F4.83 F0.21	8.60	9.03 6.15 F2.88	9.15 3.85 F5.3 0.8
	9.22 8.92 F0.30	8.59=Lip	cb 977 977 / 961 957 / F0.16 F0.20	8.79	9.22	9.34
9.53 3.13 F6.4 9.6	9.41 9.22 F0.19	8.78=Lip	cb 996 996 996 / 975 50 996 / F0.21 F4.96 0.00	8.98	9.41	9.53 3.33 F6.2 9.3
9.73	9.61 9.22 F0.39	8.98 Lip	Lip 964 / 992 0 / cb 1016 / 992 / F0.24 / cb 1016 / 984 / F0.32 / Lip 964	9.18	9.61	9.73 8.2 F1.5 2.3
9.92 2.52 F7.4 11.1	9.80 9.18 F0.63	9.17=Lip	cb 1043 1035 1035 1035 cb / 1041 378 1005 / F0.42 F6.57 F0.38 / 24+00 9.95=Gut	9.37	9.80	9.92 2.42 F7.5 11.3
10.17 5.0 F8.0 12.0	10.05	9.36=Lip	Lip 1002 / Gut 10.04 / 1069 954 / F1.15 / 1069 996 / F0.73 / 1002=Lip / 1004=Gut	9.56	10.05	10.17 5.6 F4.6 6.7
	10.34	9.56=Lip	cb 1096 1096 / 831 848 / F2.65 F2.48 / 1021=Lip / 1023 Gut	9.75	10.34	10.46
10.69 6.9 F3.8 5.7	10.57	9.75=Lip	cb 1119 1119 cb / 868 866 / F2.51 F2.53 / 1037=Lip / 1039=Gut	33' 9.91	10.55	10.67 6.7 F3.9 5.9

GRAND AVE.

Station	Toe R.P.	Hinge	Lt cb	Lt ℄ Rt.	Rt cb	Hinge	5' R.P.
27+75			7.19 = cb 7.15 F0.04	cb 7.47 7.40 F0.07 9' / cb 7.50 7.40 F0.10 / Pav 6.97	9' 6.91 / 33 6.49	6.92 4.81 F2.11	7.04
27+50	2.48 2.68 C0.2	7.38 2.48 F4.9 7.5	7.26 6.96 F0.30	7.66 7.61 F0.02 9' Lt / cb 7.70 7.61 F0.09 / Pav 7.17 4.48 F2.7	9' 7.11 / 33 6.68	7.11 5.55 F1.56	7.23 4.63 F2.6 3.9 / 4.63
27+25 E.C. in center Island			7.44 7.27 F0.17	7.85 7.69 F0.16 9' Lt / cb 7.90 7.69 F0.21 / Pav 7.37	9' 7.32 / 33 6.87	7.30 6.55 F0.75	7.42
27+12.5'				8.02 7.86 F0.16 3.25 Lt = Rt ℄ cb			
27+00 T.P. 4.23	3.0 3.3 C0.3	7.61 3.0 F4.6 6.9	7.49 7.33 = T.P. F0.16	8.04 8.18 C0.14 / 8.09 4.23 F3.86	2' Rt 8.11 8.18 C0.07 / 9' 7.52 / 33' 7.06	7.49 6.20 F1.29	7.61 4.61 F3.0 4.5 / 4.61 4.51 F0.1
26+87.5 = 7.25' Rt. of ℄ (Rt ctr cb)				7.25' Rt 8.16 7.80 F0.36			
26+75 = Beg. Narrowing Curb center Island			7.69 7.20 F0.49	9' 8.23 8.18 F0.05 / 9' 8.23 8.12 F0.11 = cb	7.26	7.69 5.95 F1.74	
26+50	3.3 3.1 F0.2	8.00 3.3 F4.7 7.1	7.88 7.73 F0.15	9' 8.43 8.43 0.00 / 8.43 4.20 F4.2 / 9' 8.43 8.39 F0.04 = cb.	7.45	7.88 5.94 F1.94	8.00 4.2 F3.8 3.7 / 4.2 0.0
26+25			8.07 7.62 F0.45 / Lip 7.44	8.62 = cb 8.67 C0.05 / 8.62 cb 8.55 F0.07	7.64	8.07 6.04 F2.03	

GRAND AVE.

Station	Toe R.P.	Hinge	Lt cb	33	9'	℄	9	33	41'	Rt cb	Hinge	5' RP
28+75				7.03	6.57	6.40	6.22	5.72	5.49			
86°10'48" Part 3 = E.C. cb Return on Bond										4.91 5.00 C 0.09	5.11 4.51 F0.6	4.51 4.2 F0.3
Part 2 57°27'12" ~~28°43'36~~										5.27 3.93 F1.34		
Part ① 28°43'36 SW cb Return									4	5.91 4.94 F0.97		
28+50		47' 6.56 2.78 F3.8	Pave	Pave 6.96 33	9 Pave 6.62	Pave 6.48 4.23 F2.25	9' Pave 6.34 9'	33' 5.92 33				
28+45 = 1'Gut R 6'Lt					Lt 6'Rt 7.11 7.08 6.20 6.20 F0.91 F0.88							
28+41.51 = Beg 30' cb Rad Ret. on Rt										6.39 5.48 F0.91	6.51 3.61 F2.9 4.4	3.61 3.21 F0.4
28+40.84 = opp 3'cb R on Lt		47' 6.97	41'Lt 7.01 5.87 F1.14									
28+25 = Beg curve ctr Island			7.05 6.48 F0.57	7.20 6.88 F0.32 9'	5' cb 7.17 6.88 F0.29 5'	Pav 6.61 6'				6.52 5.19 F1.33	~~6.64~~	
28+00	2.84 2.7 F0.2	7.24 3.84 F4.4 6.6	7.12 6.98 F0.14	cb 7.31 7.22 F0.09 9	cb 7.30 7.22 F0.08 5	Pav 6.77 4.32 F2.45	9' ~~14~~ 6.70	33 6.30		6.73 4.71 F2.02	6.85 3.35 F3.5 5.3	3.35

GRAND AVE | 5' RP. | 44' Hinge 7.60

Part 5
(29+~~38.50~~ +37.87) = E.C. cb Ret on Grand on Lt.

Part 4 on Lt

T.P. 7-6-55 5.47

T.P. 6.49

29+25

Part 3

Part 2

Part 1

N.L. Grand 7.66 7.24 F0.42

29+0~~9.68~~ 07.87 = East curb Bond B.C. ~~Cb~~ Pav. Ret. on Bond st

29+00

28+89.68 = ℄ Bond St.

Lt | ℄ | Rt. | 35

~~44'~~ N.E. Return Bond St.
7.54 = Pav. E.C. 30' Rad.
7.33
F0.21

7.51 = Pav.
7.43
F0.08

33 7.17 | 9 6.55 | 9 6.08 | 33' 5.42

7.47 Pav Gut
7.38
F0.09

71°27'18" (3) | 5.37 cb
5.23
F0.14

7.39 Pav Gut
7.70
C0.31

47°38'12" (2) | 5.27 cb
5.47
C0.20
2' Back

7.25 Pav Gut
7.63
C0.38

23°49'06 (1) | 5.20 cb
4.22
F0.98

7.03 = Pav Gut.
7.67
C0.64

Rt B.C. cb Ret on Bond = cb 5.17 5.37
4.51
F0.66

33 7.10 | 9' 6.55 | Pav. 6.34 4.80 F1.54 | 9' 6.13 | 33 5.53

74 Pav.
4.37
5.37
C1.0
1.5 from Pav.

5.37
5.17
F0.2

GRAND AVE.

31+00 2°25.00'

30+75 2°02.25'

30+50 1°39.50'

30+25 1°16.75'

30+00 0°54.00'

29+75 0°31.25'

29+50 0°08.5'

29+40.77 = B.C. Rt. (Not in order but OK)

Port 4 on Rt.

29+43.17 = E.C. 30' cb R on Rt.

29+34 = opp 1' R = 6' Rt. island

36

1½:1 Lt. ℄ Rt

44' 5' RP.

Hinge

				Pav.		Pav.					Pav.		Pav.					Hinge	
			41'	33'		9'			5' cb		9' cb		33'	41'	45' cb				
247		8.07	7.86	7.68		6.82	6.75		7.20		7.13 cb		5.76	5.44	5.95	6.01	5.71		
1.57		2.47	8.15				6.22		6.51		6.51				5.85	5.71	5.81		
F0.6		F5.6	0.79				F0.53		F0.69		F0.62				F0.10	F0.3	0.1		
		6.4														0.5			
			41'	33'		9'			5' cb		9' cb		33'	41	45' cb				
			7.90	7.61		6.78			7.12		7.02		5.69	5.37	5.88				
			8.38						6.54		6.54				6.02				
			0.88						F0.58		F0.48				0.14				
			41'	33'		9'			5' cb		9' cb		33	41	45' cb				
281		7.91	7.81	7.54		6.74	6.61		7.04		6.90		5.62	5.30	5.81	5.87			
2.36		2.81	8.40				5.89		6.57		6.57				5.74	5.87			
F0.5		F5.1	0.59				F0.72		F0.47		F0.33				F0.07	0.0			
		7.7																	
			41'	33'		9'			5' cb		9' cb		33	41	45'				
			7.92	7.46		6.70			6.96		6.78		5.55	5.23	5.74				
			8.15						6.56		6.56				5.77				
			0.43						F0.40		F0.22				0.03				
			41	33		9'			5'		9'		33'	41	45'				
312		7.72	7.63	7.39		6.66	6.48		6.83 cb		6.67 cb		5.47	5.15	5.66	5.72			
2.52		3.12	7.94				5.75		6.37		6.37				5.75	5.72			
F0.6		F4.6	0.31				F0.73		F0.51		F0.30				0.09	0.0			
		6.7																	
			41'																
			7.86	33		9'			5' cb		9'		33	41	45'				
			7.84	7.22		6.62			6.80		6.60 cb		5.40	5.08	5.59 cb				
			0.28						6.46		6.26				5.06				
									F0.54		F0.34				F0.53				
			41'	33'		9'			5'		9'		33		41	45'			
		7.86	7.47	7.25		6.58 = F0.34			6.72 cb		6.57 cb		5.38		5.07	5.53 = cb			
			7.75						6.24		6.24				5.23	5.23			
			0.28						F0.48		F0.33					F0.30			
							6.92 = Pav.												
							5.08												
							F1.24												
													95°16'26"		45'				
													⊕ = E.C. =		5.51 cb			Hinge	
															5.35			5.57	
															F0.16				
									5' Rt				7' Rt						
									6.63 cb				6.63 cb						
									6.09				6.09						
									F0.52				F0.54						

℄ GRAND AVE.

Impvt. Def Δ 4° 41.50

Cont

32+50 = ℄ 18" Culvert TYPE J-Drop Inlet = P-66

= Find Curb Center Island

~~32~~ -

5' R.P.

32+50 — Def Δ — 16.6 / 15.3 / F0.1

32+25 — 4° 18.75

Note: From 31+75 To 38+04 See Grd 331 / 52-65

32+00 — 3° 56.00

For Notes per Revised Plan # 2320-B-D

31+75 — 3° 33.25 " 37

31+62.50 — 3° 21.88

31+50 — 3° 10.5 " 37

31+37.5 — 2° 59.13 " 37

31+25 — 2° 47.75 ~~Beg Widening Island Hcb.~~ And Narrowing Curb on Rt side

See Plan change = Plan # 2320 B-D

Set Temp B.M. = New Nail Pole on Rt. ~~7.19~~ 30+87

Pole → Settled

Lt ℄ Rt

Lt 50.5' 41 — 33 — 9' — 4' cb — Top Bot — 6' cb — 9' — 33 — 41' cb

2.90 = Invert 8.44 — 8.12 — 7.16 — 7.46 — 7.16 — 7.78 — 7.16 — 6.20 — 6.55 — 5.61 — 5.61

5.96 / 5.28 / 5.33 = Invert — N.C. — 7.00 — 5.98 — 5.57 — 5.61 — 5.79

F1.00 — F0.78 — F0.57 — F5 — C0.2

41 — 8.56 = Hinge — 1.66 — F6.7 — 10.5

41 — 33' — 6.78 cb — 8.25 Rt — 33' — 41

8.45 — 8.37 — 8.05 — 7.50 cb — 7.62 cb — 6.13 — 6.48

6.67 — 7.09 — 6.43

F0.83 — F0.53 — F0.05

33 — 8.44 Lt — 9' cb — 33' — 41 cb

1.32 — 8.42 — 7.97 — 7.49 cb — 7.51 — 6.05 — 6.40 — 6.46 — 5.46

1.92 — 1.87 — 6.81 — 7.6 — 7.39 — 6.40 — 5.46 — 5.54

C0.1 — F6.6 — 6.68 — 5.40 — F2.10 — F0.12 — 0.00 — F1.06 — C0.1

9.9 — 1.5

33' — 9' cb — 9' cb — 33 — 41' cb

7.90 — 7.44 — 7.44 — 5.98 — 6.33

6.37 — 6.99 — 6.15

F0.47 — F0.45 — F0.18

7.25 Lt

7.40 — ~~6.90~~ cb

6.56 — ~~6.38~~

F0.84 — ~~F0.62~~

41' — 33 — 9' — 2' cb — 9' cb — 33 — 41 — 43' cb

2.56 — 8.14 — 7.83 — 6.90 — 7.36 — 6.86 — 7.36 — 5.91 — 5.59 — 6.18 — 6.24 — 5.94

2.16 — 8.88 — 7.03 — 7.44 — 7.36 — 6.91 — 6.50 — 5.94 — 6.10

F0.4 — C0.74 — F0.38 — 7.25 — 3.80 — F1.56 — F0.45 — C0.42 — F0.3 — C0.16

0.5

32.5'

7.32 = cb

6.76

F0.56

5' cb — 9' cb — 33' — 41'

8.05 — 7.28 — 7.25 — 5.83 — 5.51 — 6.02

8.66 — 6.71 — 6.71 — 6.24

C0.61 — F0.57 — F0.54 — C0.22

℄ Imprit.	GRAND AVE.		44' Hinge	Lt. 41' shoulder	℄ Shoulder Lt. 7'	Valley	Shoulder Rt. 7'	Rt. 41' ch	Hinge	5' R.P.
34+50	7°43.5'		1.93 1.43 F0.5	9.13 1.93 F7.2 10.8	9.01	7.67	6.73 5.77 F0.96	7.79	7.12 6.57 F0.55	7.18 5.58 F1.6 2.4	5.58 5.88 C0.3
+25	7°20.75	See Note P-37			8.94	7.60	6.66	7.72	7.05 6.65 F0.40		
34+00	6°57.0'		2.0 1.7 F0.3	8.99 2.0 F7.0 10.5	8.87	7.53	6.59 5.68 F0.91	7.65	6.98 6.52 F0.46	7.04 5.94 F1.1 1.7	5.94 6.04 C0.1
33+75	6°34.25'				8.79	7.45	6.51	7.57	6.90 6.37 F0.53		
+50	6°11.5'		2.04 1.9 F0.1	8.84 2.04 F6.8 10.2	8.72	7.38	6.44 6.02 F0.42	7.51	6.83 6.36 F0.47	6.89 5.89 F1.0 1.5	5.89 6.0 C0.1
+25	5°48.75			8.77	8.65	7.31	6.37	7.44	6.76 6.51 F0.25		
33+00	5°26.0'		1.6 1.4 F0.2	8.70 1.6 F7.1 10.6	8.58	7.24	6.30 6.02 F0.28	7.36	6.69 6.17 F0.52	6.75 5.7 F1.0 1.5	5.75 5.95 C0.2
T.P.		6.21									
32+75	5°04.25'				8.51	7.17	6.23 6.52 C0.19	7.29	6.62 5.76 F0.86		

℄ Imprvt.	GRAND AVE. Def Δ		Toe 5' R.P.	Lt	℄	Rt	1½:1	5' R.P.
				44' Hinge	shoulder	shoulder	Hinge	
				41 shoulder	7' valley	7'	41 ach	
36+50	10°45.49		1.8 / 0.0 / 2	9.72 / 1.8 / F7.9 / 12.0	9.60	8.26 / 7.32 / 6.73 / F0.6	8.38	7.71 / 7.62 / F0.09	7.77 / 6.97 / F0.8 / 1.2	6.97 ✓
T.P.		7.56								
+25	10°22.74				9.53	8.19 / 7.25 / 6.73 / 1.052	8.31	7.64 / 7.57 / F0.07		
36+18.26	10°16.61									
36+00	10°00.00		3.67 / 2.47 / F1.2	9.57 / 3.67 / F5.9 / 9.0	9.45	8.11 / 7.17 / 6.21 / F0.96	8.23	7.56 / 7.35 / F0.21	7.62 / 6.72 / F0.9 / 1.4	6.72 / 7.12 / 6.4
+75	9°37.25				9.38	8.04 / 7.10	8.16	7.49 / 7.25 / F0.24		
+50	9°14.50		1.33 / 0.75 / F0.6	9.43 / 1.33 / F8.1 / 12.2	9.31	7.97 / 7.03 / 5.92 / F1.11	8.09	7.42 / 6.86 / F0.56	7.48 / 6.38 / F1.1 / 1.7	6.38 ✓
+34.56	9°00.27									
+25	8°51.75				9.24	7.90 / 6.96	8.02	7.35 / 6.22 / F1.13		
T.P. Nail in Pole		~~7.19~~								
+20.5 = opp 50'R	8°47.65 = See Grd 331-65									
35+00	8°29.00		1.08 / 0.88 / F0.2	9.28 / 1.08 / F8.2 / 12.3	9.16	7.83 / 6.88 / 6.00 / F0.88	7.94	7.27 / 6.42 / F0.85	7.33 / 5.73 / F1.6 / 2.4	5.73 ✓
34+75	8°06.25				9.09	7.75 / 6.81	7.87	7.20 / 6.55 / F0.65		

See Note P-37 on Grades

(Same Elev. as previous Pole)

Station ℄ Impvt.	GRAND AVE. Def Δ	RP.
38+25	13°24.74'	
38+04.44 = Beg. Curb on Lt	13°06.03'	
38+00	13°01.99'	2.24 / 6.11 / F 0.1 / 15.0
+75	12°39.24'	
+50	12°16.49'	1.00 / 2.7 / C 1.7 / 150
+25	11°53.74'	
37+00	11°30.99'	3' / 0.86 / W
36+75	11°08.24'	

See Note P-37

Lt	℄	Rt.
Hinge		40 1½:1 Hinge 5' RP
38.57 / 10.61 / 9.40 / F 1.21	9.3 / 9.13 / 8.82	Shoulder 7' / 8.75 / 7.81 / 7.97 / C 0.16
41.27 / 10.70 / 9.60 / F 1.10	9.3 / 9.21 / 8.77	
41' / 10.14 / 9.26 / F 7.9 / 12.0	9' / 41 / 9.26 / 8.75 / 8.74	8.63 / 7.74 / 7.84 / F 0.9
41	9.28	8.61 / 7.67 / 8.73
41' / 10.00 / 1.0 / F 9.0 / 13.5	9.88	8.54 / 7.60 / 7.60 / F 1.0
41'	9.81	8.47 / 7.53 / 8.59
41 / 9.76 / 0.76 / F 8.9 / 13.4	9.74	8.40 / 7.46 / 7.46 / F 0.9
	9.67	8.33 / 7.39 / 8.45

Rt.		
41'cb / 8.21 / 8.06 / F 0.15		
41'cb / 8.14 / 8.17 / C 0.03	8.20 / 7.3 / F 0.7 / 1.4	7.3 / 7.4 / C 0.1
41'cb / 8.07 / 7.63 / F 0.44		
41 cb / 8.06 / 7.83 / F 0.17	7.96 / 7.16 / F 0.9 / 1.4	7.16 / 7.26 / C 0.1
7.92 / 7.87 / F 0.05		
41'cb / 7.85 / 7.81 / F 0.04	7.91 / 7.11 / F 0.8 / 1.7	7.11 / 7.3 / C 0.2
7.78 / 7.74 / F 0.04		

GRAND AVE.

RP 5'

40+00 — 3' RP 3.34 3.1 F0.2

See Note P-37

+75

T.P. on 3' offset Lt Rt — 838 — 3.5 3.2 F0.3

+50

39+25

FP

39+00

6.60 = TP.

38+94.04 F.C. & Impvt. 14°27.56' — 3.4 3.2 F0.2 5'

+75 — 14°10.24'

TP. — 8.39

38+50 — 13°47.49' — 2.35 2.50 Ca2 13.0

3 Nails Navy Pole 37+90 on Rt.

TP. — 9.50 941 = Navy El. 7.6.55

Lt — & Impvt. — Rt. — 41.5 ft

Hinge — 7/Hinge 5 RP

44

1064 / 33X / F7.3 / 11.0	35' cb / 10.52 = cb / 10.86 / C0.34	9' / 9.33 / 9.15 / F0.14	7'Lt / 9.29	8.33 / 8.34 / F0.01	7'Rt / 9.37	9.30 / 9.00 / F0.30	8.35	41' cb / 8.70 / 8.50 / F0.20	8.76 / 7.5 / 2.3	7.36 / 7.26 / 00
	35' cb / 10.45 / 10.55 / C0.10	9' / 9.26	9.22	8.26	9.32	9' / 9.26	33 / 8.30	41' cb / 8.45 / 8.39 / F0.26	8.71	
1051 / 3.5 / F7.0 / 10.5	35' cb / 10.39 / 10.28 / F0.11	9' / 9.18 / 9.00 / F0.18	9.12	8.18 / 8.10 / F0.08	9.24	9 / 9.19 / 8.75 / F0.43	33 / 8.23	41' cb / 8.58 / 8.38 / F0.20	7.44 / 7.44 / 1.2 / 1.8	7.44 / 7.44 / <.03
	35' cb / 10.38 / 10.04 / F0.34	9 / 9.11	9' / 9.06	8.11	9.17	9' / 9.11	33 / 8.15	41' cb / 8.50 / 8.49 / F0.01		
Hinge 1050 / 3.4 / F7.1 / 10.7	35' cb / 10.38 / 9.59 / F0.79	9' / 8.97 / 9.02 / 8.95 / F0.07	7'Lt	8.90 / 8.92 / 7.12 / F0.83	7'Rt / 9.14	9 / 9.02 / 8.84 / F0.18	33 / 8.06	41' cb / 8.41 / 8.38 / F0.03	8.47 / 7.61 / F0.8 / 1.2	7.67 / 7.77 / <.01
	35' 2.8' Lt Top cb / 10.45 / 9.50 = TP / F0.95	9' / 8.97	8.90	7.96 / 8.04 / C0.08	9.02	8.96	8.00	41' cb / 8.35 / 8.17 / F0.18		
Hinge 42.5 / 3.4 Lt / 1065 / 7.11 / F8.3 / 11.5 / F9.5 = Rt. sat. / 14.5	36.4 Lt cb / 10.52 / 9.43 / F1.10	33 / 9.43 / 9.24	9' / 8.89 / 8.74 / F0.15	7 / 8.82	7.88 / 7.93 / C0.05	7 / 8.94	9 / 8.88 / 8.59 / F0.29	33 / 7.93	41' cb. / 8.28 / 8.21 / F0.07	8.34 / 7.44 / F0.9 / 1.4	7.44

Rt. Lane GRAND AVE.

Def Δ

Station	Notes	Def Δ		Right col.
41+75	Sta. Base Rt. Lane Ahead = 9' Rt. of ℄ Impvt. at 41+48.51	6°56.11		
41+50				
41+48.51 = B.C. Rt. LANE				1.41 / 3.31 / C1.9
+25				
41+05 Beg. Curb on Lt side of Rt. LANE				
41+00				1.41 / 1.2 / F0.2
+75				
+50				3' Rt. / 4.5 / 4.5 / 0.0
40+25	Dist. out from ℄ Impvt			

Note: Left Lane Cont. P. 47

℄ Base ℄ Rt. Lane; 24' Rt. of Base; Curb 32' Rt. of Base; Hinge; 5' Rt.

2' Lane: 8.84 | 10.00 / 9.50 / F0.50 | 9.35 | 7.57 | cb 7.65 / 6.68 / F0.97

9': 8.76 | 2' cb 10.01 | 9.37 | 9.37 / 8.66 / F0.7 | 7.77 | 32: 7.89 | 7.95 / 7.95 / 0.0

Hinge 10.71 / 1.41 / F9.3 | cb 10.59 | 9: 8.69 / 9.33 / C0.64 | ℄: 9.89 / 9.34 | F0.45 | 7.90 / 7.90 / 0.00 | 7.90 cb / 7.05 / F0.85

Hinge 41' Lt. | Lt | ℄ Impvt. | Rt

Hinge 41' Lt.	35 cb		7	℄ Impvt.	9'		33	41 cb	
	10.59 / 11.49 / C0.90		9.36	8.69 / cb 6.08 9.99 / 9.28 / F0.71; 4.00 = Gut / 10.10 = cb / 8.86 / F1.24	9.39		7.93	8.12 / 7.78 / F0.34	
10.71 / 1.41 / F9.3 / 1.40	35 cb 10.59 / 11.43 / C0.84	9: 9.40 / 9.37 / F0.03	7: 9.36	8.62 / 8.97 / C0.35	7': 9.50	9.40	33: 8.12	41 cb 8.36 / 8.27 / F0.09	8.42 / 8.42 / 0.0
10	35: 10.59 / 11.29 / C0.70	9: 9.39	7: 9.36	8.55	7: 9.48	9.39	8.25	41 cb 8.54 / 8.22 / F0.32	
10.71 / 4.5 / F6.2 / 9.3	35: 10.59 cb / 11.11 / C0.52	9: 9.38 / 9.15 / F0.23	7: 9.36	8.48 / 8.41 / F0.07	7: 9.46	9.38 / 7.11 / F0.27	8.34	41 cb 8.66 / 8.29 / F0.37	8.72 / 6.82 / F1.9; 6.82 / 6.82 / 0.0
	35: 10.59 cb / 10.98 / C0.39	9: 9.40	7: 9.36	8.40	7': 9.41	9': 9.35	33: 8.37	41 cb 8.71 / 8.15 / F0.56	

Base Rt. LANE Sta.

GRAND AVE

~ RIGHT LANE ~

44+62.15 = 1' Radius = 3' Lt

curb 11°03.9'

+50	10°38.19	
+28.27	9°52	Temp Point over Elec Duct. cb 7.05 5.13 F1.92
+25	9°45.27	
44+00	8°52.35	2.1168' = def pr. ft.
+75	7°59.43	
+50	7°06.51	
+44.66	~~6°35.7~~ 6°55.7	
+25	6°13.59	
T.P. 43+00	5°20.67	7.65 = TP
42+88.60	4°56.5	
+75	4°27.75	
+50	3°34.83	
+25	2°41.91	
42+00	1°48.99	

Note: For Left Turn Lane To Pacific
See Grade 331 / 71-76
Plan 2321-A-D

Lt	Gut at curb 20 El.	Rt LANE BASE	Rt 24'	Curb 32' Rt.	Hinge
1'R PRC. cb = 9.55 stake = 8.65 F 0.90					
9.65 cb 8.72 F 0.93	9.65 ~~8.69~~ F ~~0.96~~	~~9.78~~ 8.69 F ~~1.09~~	9.13 8.78 F 0.4	7.28	7.23 5.72 F 1.51	7.29 4.19 F 3.1 4.7
9.82 cb 8.87 F 0.95	9.82 cb ~~8.78~~ F ~~1.04~~		7.13	7.03 5.72 F 1.31	
9.85 cb 9.01 F 0.84	9.85 cb ~~8.93~~ F ~~0.92~~	9.17 9.37 C 0.2	6.99	6.83 6.15 F 0.68	6.89 6.47 F 0.8 0.6
9.88 cb 8.75 F 1.13	9.88 ~~8.87~~ F ~~1.04~~		6.90	6.71 5.57 F 1.14	
9.91 8.69 F 1.22	9.91 cb ~~8.15~~ F ~~1.76~~	9.21 6.24 F 3.0	6.84	6.58 5.78 F 0.80	6.64 6.64 0.0
9.93 8.96 F 0.97	cb 9.93 ~~7.33~~ F ~~2.60~~		6.83	6.43 6.03 F 0.40	
9.95 9.05 F 0.90	9.95 cb ~~7.65~~ F ~~2.30~~	9.25 4.29 = Top Lath F 4.0	6.86	6.60 6.16 F 0.44	6.66 7.90 C 1.24
9.97 9.12 F 0.85	9.97 cb ~~8.13~~ F ~~1.84~~		6.93	6.72 5.99 F 0.73	
9.98 9.09 F 0.89	9.98 cb ~~8.67~~ F ~~1.31~~	9.29 9.49 C 0.2	7.04	6.86 5.75 F 1.11	6.91 7.48 C 0.57
9.17 = ℄ Imp	9.99 cb 8.98 F 1.01	9.31	7.20	7.07 5.94 F 1.13	
℄ Imp rt 8.93	2.0 9.99 9.07 F 0.92	9.33 12.65 C 3.32	7.38	7.40 cb 6.43 F 0.97	7.46 7.96 C 0.5

Rt. LANE
Grand Ave

T.P. on	cb offset 35' Rt 46+32.10		6.93	
46+25				
46+00				8.43 6.64 F1.79
+75				
+50				8.04 5.83 F2.21
+25				
45+00				7.64 4.80 F2.84
44+88.27 = E.C.		11°59.2'		
44+75		11°31.11'		

44

Lt.	Rt. LANE BASE	12' Rt	Rt.	cub. 32' Rt	Hinge
				8.60 6.93	
		8.75	8.30	8.56 6.93 F1.63	
		8.77	8.17	8.43 7.11 F1.32	8.99 5.27 F3.72 4.8
		8.79	8.01	8.24 7.18 F1.06	
		8.81	7.86	8.04 6.66 F1.40	8.00 1.39 F6.7 10.1
	9.07		7.72	7.84 6.74 F1.10	
	9.09		7.57	7.64 6.26 F1.38	
	9.10 8.57 F0.54		7.50	7.58 6.36 F1.18	7.60 3.3 F4.3
	9.11		7.42	7.43 5.96 F1.47	

GRAND AVE.

	Rt. LANE	Cb El. Elec Duct	℄ Base Rt. LANE	Rt 12' Rt	24' R	Curb 32'	Hinge
+25	1°13.3				8.21	8.46 6.96 F1.50	
48+00	1°03.8	8.56 7.45 F1.11			8.27	8.56 7.15 F1.41	8.62 7.04 F1.58
+75	0°54.3				8.32	8.66 7.32 F1.34	
+50	0°44.8	8.76 6.99 F1.77			8.36	8.76 7.34 F1.42	8.82 7.39 F1.43
+25	0°35.3				8.40	8.83 7.35 F1.48	
47+00	0°25.8	8.83 7.23 F1.60			8.42	8.83 7.38 F1.45	8.89 7.69 F1.2 0
46+75	0°16.3			8.71	8.44	8.76 7.24 F1.52	
46+50	0°06.8	8.66 7.03 T.P. F1.63		8.73	8.39	8.66 7.25 F1.41	8.72 6.32 F2.40 0
46+32.10 = B.C. Rt		8.59 7.02 F1.57				8.60 6.93 F1.67	

GRAND AVE ~ RT-LANE

		Elec. Duct Data For curb	℄ Base	24' Rt	32' Rt = curb	Hinge
215+50 = Beg. Curb = Page 55						
16323						
= 217+13.23 Pacific Highway						
50+05.45 = EC	2°22.6				8.30 7.46 F0.84	= T.P.
+75	2°10.3				8.29 7.53 F0.76	
+50	2°00.8				8.21 7.06 F1.15	8.27 7.87 F0.4
49+33.45 = Pull Box = 1°55.1'		8.04 = cb 7.56 F0.48				
+25	1°51.3				7.96 6.82 F1.14	
49+00	1°41.8	8.16 7.54 F0.62		8.12	8.16 6.94 F1.22	8.22 7.52 F0.7
+75	1°32.3			8.14	8.26 7.11 F1.15	
48+50	1°22.8	8.36 7.02 F1.34		8.17	8.36 6.94 F1.40	8.42 7.34 F1.08

LEFT LANE ~ GRADES

GRAND AVE.

41+75 ↗ Cont P-64 For Alignment, Def Δ, see P-25, 26

Total Δ
151°16'42"

⑧ = Cb Ret E.C. on Pacific

⑦ 132°22'

⑥ 113°27'24"

⑤ 94°32'50"

④ 75°38'16"

③ 56°43'42"

② 37°49'08"

① 18°54'34"

NW Curb Return at Pacific

41+56.12 = B.C. Curb Ret. on Lt. 30' cb R Plan 2321-A-D

41+50 (Cont. from P-42)

41+25 P-42

				℄ Base Lt LANE	
10.63 = cb. 10.53 F 0.10					
10.49 cb. 10.80 C 0.31					
10.14 cb. 10.65 C 0.51					
9.87 cb. 10.82 C 0.95					
9.86 cb 10.50 C 0.64 ✓					
10.08 cb. 10.10 C 0.02					
10.33 cb. 9.65 F 0.68					
10.52 cb. 10.10 F 0.42					
10.59 cb. 10.87 C 0.28					
35' 10.59 cb 11.03 C 0.44	9.88	9.64	9.40	9' Rt 8.76	

GRADES FOR CHANNEL

Sketch of Ties P-19-23
BENCH MARKS - P-9, 13.

Walker
Oltman
Olow
3-15-55

				Lt. 10' 1½":1		℄	10' Rt. 1½":1		R.P. 5
2+34.09	6°13.59		12.56 9.82 F2.74	-0.41 12.56 C12.97 29.5		-0.41 8.67 C9.08		-0.41 7.65 C8.06 22.1	7.65 7.62 F0.03
2+11.06	5°20.67		13.33 13.22 F0.11	-0.39 13.33 C13.72 30.6		-0.39 8.01 C8.40		-0.39 7.70 C8.09 22.2	7.70 7.82 C0.12
TP.		8.26	13.03 13.43 C0.40	-0.35 13.03 C13.38 30.1		-0.35 7.89 C8.24		-0.35 7.75 C8.10 22.2	7.75 7.51 F0.24
1+88.03	4°27.75		7.95 8.03 C0.08	-0.33 7.95 C8.28 22.4		-0.33 8.04 C8.34		-0.33 8.26 C8.59 22.9	8.26 8.05 F0.21
1+65	3°34.83		8.30 8.06 F0.24	-0.30 8.30 C8.60 22.9		-0.30 8.27 C8.57		-0.30 7.86 C8.16 22.3	7.86 7.98 C0.12
1+41.97	2°41.91		8.03 8.23 C0.20	-0.26 8.03 C8.29 22.5		-0.26 7.73 C7.99		-0.26 7.93 C8.19 22.3	7.93 7.93 00
1+18.94	1°49'		8.66 8.66 0.00	-0.25 8.66 C8.91 23.4		-0.25 8.12 C8.37		-0.25 7.96 C8.21 22.3	7.96 8.00 C0.04
0+95.91	0°56.07		7.72 7.79 C0.07	-0.21 7.72 C7.93 22.1		-0.21 8.07 C8.28		-0.21 8.09 C8.30 22.5	8.09 8.09 00
0+71.51	-B.C. Rt.								
+48						-0.18 7.90 C8.08		-0.18 7.76 C7.94 22.0	C0.14
0+23						-0.15	-0.15 8.05 C8.20 22.3		
0+00				-0.12		-0.12	-0.12 7.88 C8.0 22		

Direct Elev. Rod used

Note; stations are opp. Rt Lane 25' sta.
stations To 5+28.32

channel

4+71.22			25' RP 2.65 7.72 C 5.07	
4+46.22				
4+21.22			25' RP 4.48 7.80 C 3.32	
3+96.22				
3+84.49	11°59.2 E.C.	RP PK Lincoln Hwy E Edge Pav. Pacific Hwy	RP PK 10.27	RP PK 64.00
3+72.27	11°31.11			
TP		6.14		
3+49.21	10°38.19			
3+26.21	9°45.27			
3+03.18	8°52.35			
2+80.15	7°59.43			
2+57.12	7°06.51			

	5' RP				5' R.P.
	0.73 2.65 C 3.38 16.1	-0.73 2.44 C 1.17	-0.73 8.47 C 7.20 23.6	8.47 7.73 F 0.74	
		-0.70			
	-0.67 4.48 C 3.81 17.7	-0.67 10.47 C 11.14	-0.67 9.53 C 10.20 23.3	9.53 7.91 F 1.62	
4.82 2.57 F 2.30	-0.63 4.82 C 5.45 18.2	-0.63 11.64 C 12.27	-0.63 9.57 C 10.20 25.3	9.57 8.57 F 0.78	
		-0.62 11.65 C 12.27			
5.81 3.33 F 2.48	-0.60 5.81 C 6.41 17.6	-0.60 12.55 C 13.15	-0.60 9.27 C 9.87 24.8	9.27 8.64 F 1.23	
6.14 3.84 F 2.30	-0.57 6.14 C 6.71 20.1	-0.57 12.79 C 13.31	-0.57 8.88 C 9.45 24.2	8.88 8.38 F 0.50	
6.88 5.03 F 1.85	-0.53 6.88 C 7.41 21.1	-0.53 12.71 C 13.24	-0.53 8.58 C 9.11 23.7	8.58 8.05 F 0.53	
7.61 6.47 F 1.14	-0.51 7.61 C 8.12 22.2	-0.51 12.1 C 13.21	-0.51 8.31 C 8.82 23.2	8.31 7.88 F 0.43	
9.40 7.40 F 2.00	-0.48 9.40 C 9.88 24.8	-0.48 12.43 C 12.91	-0.48 8.25 C 8.73 23.1	8.25 7.74 F 0.51	
10.80 8.69 F 2.31	-0.45 10.80 C 11.25 26.9	-0.45 11.01 C 11.46	-0.45 7.91 C 8.36 22.6	7.91 7.23 F 0.68	

Channel

7+50	1°25.88									
T.P. on cut stub on Rt 7+00				10.63						
7+00	1°06.42									
+50	0°47.12									
6+00	0°27.76									
T.P.										
5+50	0°08.4			7.21						
5+28.32 B.C. Rt.			PK 56t	PK 64.00						
T.P. on PK 5+28.32 = 6x' Lt.				8.96 ~~8.93~~ Elev.						
5+21.22										
4+96.22										

From Toe RP. 5'	Lt.	℄	Rt	5' R.P.
7.41 7.04 F0.37	-1.09 7.41 C 8.50 22.8	-1.09	-1.09 9.71 C 10.80 26.2	9.71 8.28 F0.43
5' R.P.				
5.97 6.55 C0.58	-1.03 5.97 C 7.00 20.5	-1.03	-1.03 10.63 C 11.66 27.4	10.63 8.47 F2.16
1.05 5.25 C4.2 7' RP	-0.96 1.05 C 2.01 13.0	-0.96	-0.96 10.64 C 11.60 27.4	10.64 9.86 F0.78
0.15 5.21 C 5.06 10' R.P.	-0.90 0.15 C 1.05 11.6	-0.90	-0.90 10.72 C 11.62 27.4	10.72 8.88 F1.84
0.63 7.53 C 6.9 25' RP	-0.83 0.63 C 1.46 12.2	-0.83	-0.83 9.82 C 10.65 26.0	9.82 8.92 F0.90
12.6 8.35 C 7.09 25' RP	-0.81 12.6 C 2.07 13.1	-0.81 ~~7.20~~ C 8.01	-0.81 9.36 C 10.17 25.3	9.36 7.88 F1.48
		-0.80		
		-0.77		

Channel			Lt.	℄	Rt	5' R.P.
10+77.62 = E.C.	2°03.03	PK ∝ 34.0± PK ∝ 34.92	7.79 7.40 F0.39	-1.51 7.79 C9.30 24.0	-1.51	-1.51 10.79 C12.30 28.5	10.79 10.71 F0.08
10+41.83	1°31.51	PK ~~∝ 63.6±~~ PK ~~∝ 41.72~~	7.83 7.68 F0.15	-1.47 7.83 C9.30 24.0	-1.47	-1.47 10.93 C12.40 28.6	10.93 10.53 F0.40
TP		7.45					
10+06.04 = B.C.		PK ∝ 63.6± PK ∝ 41.72	8.08 7.95 F0.13	-1.42 8.08 C9.50 24.3	-1.42	-1.42 10.71 C12.13 28.2	10.71 10.50 F0.19
9+50			7.65 7.73 C0.08	-1.35 7.65 C9.00 23.5	-1.35	-1.35 7.65 C9.00 23.5	7.65 10.53 C2.88
T.P.		7.86					
8+96.36 = E.C.	2°22.5	PK ∝ 45± PK ∝ 64.00	7.91 7.91 00	-1.29 7.91 C9.20 23.8	-1.29	-1.29 7.21 C8.50 22.8	7.21 9.72 C2.51
+50	2°04.6		7.58 7.79 C0.21	-1.22 7.58 8.80 23.2	-1.22	-1.22 10.58 C11.80 27.7	10.58 10.33 F0.25
8+00	1°45.24		7.54 7.46 F0.08	-1.16 7.54 C8.70 23.1	-1.16	-1.16 10.44 C11.60 27.4	10.44 10.06 F0.38

Channel

13+75	3°18.87			
13+50	1°31.44			
13+28.71 = BC Rt		RK 50.71	RK 3524	
13+00				
TP		783		
+50				
12+00				
+50				
11+00				

52

5' R.P.	Lt.	L	Rt	5' R.P.
7.71	-1.89	-1.89	-1.89	7.21
7.91	7.71		7.21	9.49
F0.70	C9.60		C7.10	C2.28
	24.4		23.1	
7.84	-1.86	-1.86	-1.86	7.57
6.57	7.84		7.54	9.76
F1.27	C9.70		C9.40	C2.22
	24.6		24.1	
7.83	-1.83	-1.83	-1.83	7.97
6.51	7.83		7.97	9.89
F1.25	C9.66		C9.80	C1.92
	24.5		24.7	
7.90	-1.80	-1.80	-1.80	8.00
7.06	7.90		8.0	10.31
F0.84	C9.7		C9.80	C2.31
	24.1		24.7	
7.97	-1.73	-1.73	-1.73	7.57
7.18	7.97		7.57	10.16
F0.79	C9.70		C9.30	C2.39
	24.1		24.00	
7.83	-1.67	-1.67	-1.67	7.22
7.10	7.83		7.23	9.53
F0.73	C9.50		C8.90	C2.30
			23.4	
8.00	-1.60	-1.60	-1.60	6.60
7.37	8.00		6.60	7.20
F0.63	C9.60		C9.20	C0.60
	24.4		22.3	
7.76	-1.54	-1.54	-1.54	10.66
7.49	7.76		10.66	10.62
F0.27	C9.30		C12.20	F0.04
	24.0		28.3	

	Channel				Lt.		℄	Rt.	
+25							-2.22		
16+00					4.61 4.67 C0.06	-2.19 4.61 C6.80 20.2	-2.19	-2.19 3.81 C6.00 19.00	3.81 6.37 C2.56
+75							-2.15		
T.P.			5.74						
+50					5.08 5.12 C0.04	-2.12 5.08 C7.2 20.8	-2.12	-2.12 5.08 C7.20 20.8	5.08 8.30 C3.22
+25							2.09		
15 +11.80 = E.C.		13° 06.7	RP ← 77 PK	R.P. → 85' PK	6.08 6.07 F0.01	-2.07 6.08 8.15	-2.07	-2.07 5.93 C8.00 22.0	5.93 8.40 C2.47
15+00		12° 16.02					-2.06	-2.06	
+75		10° 28.59			6.58 6.79 C0.21	-2.02 6.58 C8.60 22.9	-2.02	-2.02 5.98 C8.00 22.0	5.98 8.02 C2.04
+50		8° 41.16			7.31 7.35 C0.04	-1.99 7.31 C9.30 24.0	-1.99	-1.99 7.51 C9.50 24.3	7.51 7.85 C0.34
+25	6° 53.73				7.74 7.77 C0.03	-1.96 7.74 C9.70 24.1	-1.96	-1.96 8.39 C10.35 25.6	8.39 8.36 F0.03
14+00	5° 06.3				7.89 7.73 F0.16	-1.93 7.89 C9.82 24.7	-1.93	-1.93 8.17 C10.10 25.2	8.17 8.69 C0.52

Channel
For Grand Ave

Chk Top Hd Wall P-9 4.29✓

16+72.3 = Beg. First 60" Culvert

16+50

5'8P.

Invert as in Place
-2.29

434	-2.26	-2.26	-2.26	1.24
443	4.34		1.24	1.24
C009	C6.60		C3.50	0.0
	1.99		1.53	

GRADES ~ PACIFIC Hwy.

Plan 2321-A-D
WO 22093

℄ Pacific Sta.		R.P.	50' Hinge	47' Curb Grade	39' Lt Pav. Grade	Lt. Edge Exist. Pav.	℄ Pacific = Base Line
	From Station 215+50 To						
	— Con't. P.56						
217+00	— Curb Cont P.46		8.34 7.39 F0.95	8.28	7.80	7.90	
216+75			8.24 6.64 F1.60	8.18	7.74	7.82	
216+50			8.14 6.63 F1.51	8.08	7.67	7.74	
216+25	Elec. Data Cb. 8.98 7.14 F1.84		8.04 7.00 F1.04	7.98	7.66	7.70	
216+00			7.94 6.75 F1.19	7.88	7.63	7.65	
215+75			7.85 6.91 F0.94	7.79	7.61	7.63	
215+50 = Beg. "G" Type Curb on Lt.			7.74 7.19 F0.55	7.68	7.60		

PACIFIC HWY. ~ PAVING

℄ Pacific Stations	50' Hinge	47' Curb	39' Lt	Lt. Edge Exist. Pav.	℄ Pacific
218+50			8.20	8.33	
+25			8.13	8.27	
218+00			8.06	8.22	
217+75			7.98	8.12	
217+50			7.92	8.03	
217+25			7.86	7.97	
↗ Note; From Here north, curb stakes are Rt Lane Grand					
217+13.23 = 50+05.45 = E.C. Rt. Lane Grand · P-46 ↗		8.30 7.58 P.47 2			
~~217+25~~	8.39	8.33	7.86	7.97	

PACIFIC Highway — LEFT ℄

	39' Lt.	Lt. Pav. Edge	PACIFIC
220+50	8.72	8.96	
220+25	8.66	8.87	
220+00	8.60	8.79	
219+75	8.54	8.72	
219+50	8.48	8.65	
219+25	8.41	8.53	
219+00	8.34	8.41	
218+75	8.27	8.37	

PACIFIC HIGHWAY

	39' Lt	Lt. Edge Exist. Pav	℄ Pacific
222+50	9.20	9.51	
+25	9.14	26' 9.46	
222+00	9.08	26' 9.42	
+75	9.02	9.35	
+50	8.96	9.27	
+25	8.90	9.18	
221+00	8.84	9.10	
220+75	8.78	9.07	

Pacific Highway

	Lt.				℄
	Curbs = Reset This line	~~41'~~ Curb Grade	39' = Pav.	26 Edge Exist Pav.	Pacific
224+25			9.74	9.85	
+03.48					
224+00 Note; Rest of curb this island = in Notes on Lt. Lane Grand Ave P-65	10.08 ~~9.88~~ 9.15 ✓ 0.93	43.90 9.88 cb	9.63	9.80	
Note; Curb Grades Raised as shown From 222+55.80 to 224+00 To Fit Conditions Better.					
+75	9.99 ~~9.87~~ cb 8.68 ✓ F ~~1.19~~ 1.31	41.74 ~~9.87~~ cb ~~8.68~~ F ~~1.19~~	9.52	9.76	
+58.48 Set curb 41' Lt. Note. Curb widens from this point Ahd.					
+50	9.94 ~~9.81~~ 9.10 ✓ F 0.84	41' ~~9.81~~ ~~8.71~~ F ~~1.10~~	9.44	9.73	
+25	9.85 ✓ 9.75 9.15 ✓ F ~~0.60~~ F 0.70	41' ~~9.75~~ ~~9.14~~ F ~~0.61~~	9.38	9.69	
223+00	9.76 ~~9.69~~ 8.93 ✓ F 0.83	41' ~~9.69~~ ~~8.93~~ F ~~0.76~~	9.32	9.65	
222+75	9.67 ~~8.82~~ ✓ F ~~0.81~~ F 0.85	41' ~~9.63~~ ~~8.75~~ 0.88	9.26	9.58	
222+55.80 = opp 1' Gut. R on Lt		41' 9.58 8.65 F 0.93	9.21		

PACIFIC HIGHWAY

225+85 = ℄ Lt. std #1 = 42.7' Lt.					cb 10.60 8.80 F1.80
225+81.35 = E.C. Curb Rct. on Lt. Type "G" curb					
225+75					
225+50					
225+31.75 = opp 1' Gut R on Lt. = End of island					
+25					
225+00					
224+76.42 = opp. 1' Gut R on Lt.					
224+50					

RP. 5'	Hinge	Lt.		℄ Edge Exist. Rt. 26	Pacific
			39'		
			"G" Type		
	47	41 = Top cb Face			
6.75	10.75	10.63	10.00		
6.75	6.75	10.53			
C0.1	F4.0	F0.10			
	6.0				
			9.98		
			9.92	10.17	
		44.00 = Gut			
		~~44.33~~			
		10.27	9.88		
		10.31			
		C0.04			
		43.27 = Gut Line			
		~~43.60~~			
		10.29 cb	9.86	10.09	
		10.26			
		F0.03			
		41.53 = Gut Line			
		~~41.86~~			
		10.33 cb	9.87	10.06	
		10.18			
		F0.15			
		41.00 = Gut Line			
		~~41.33~~			
		10.35 cb	9.87	9.98	
			9.85	9.91	

PACIFIC HIGHWAY

	Left				℄
	R.P.	Hinge		~~39' Lt.~~	Edge Exist. Pov. 26'	Pacific Hwy
227+50	5.95 5.65 F0.3	48.5 10.95 5.95 F5.0 7.5	45.50 10.89 9.93 F0.96	37.50 10.48	10.71	
227+25		49.25 10.88	46.25 10.82 9.90 F0.92	38.25 10.41	10.63	
227+00	6.01 5.71 F0.3	49.4 10.81 6.01 F4.8 7.2	46.81 10.75=cb 10.05 F0.70	38.81 10.34	10.56	
226+75				39' 10.27	10.51	
226+71.35 = South Side "K" Type Inlet on Lt			47' 10.67 = Top Box 10.49 F0.18			
+50	6.28 6.28 .50	50.5' 10.88 6.28 F4.6 6.9	44.48 10.76 11.29 C0.53	39' 10.20	10.46	
226+25	6.15 6.7 C0.6	48.4 10.85 6.15 F4.7 7.1	42.41 10.73=cb 11.25 C0.52	39' 10.13	10.39	
226+00		47.3 10.79	41.26 10.67=cb 10.95 C0.28	39' 10.06	10.32	

PACIFIC HIGHWAY

	Left RP	Left Hinge			℄ Pacific 26' Edge Exist Pav.
+50				31.50' 11.04	11.13
+25				32.25' 10.97	11.09
229+00 = End ~~Exist~~ Proposed Curb. on Lt.	10.17 7.47 F1.7	44 11.37 10.17 F1.2	41 11.31 10.75 F0.56	33' 10.90	11.05
+75			41.75 11.24 10.70 F0.54	33.75 10.83	11.03
+50	5.93 5.43 F0.5	45.5' 11.23 5.93 5.3	42.50 11.17 cb 10.92 F0.25	34.50 10.76	11.01
+25.0		46.25 11.16	43.25 11.10 cb 10.72 F0.38	35.25 10.69	10.95
228+00	6.19 5.79 F0.4	47' 11.09 6.19 F4.9 7.5	44 11.03 cb 10.68 F0.35	36 10.62	10.89
227+75		47.75 11.02	44.75 10.96 cb 10.05 F0.91	36.75 10.55	10.80

PACIFIC HIGHWAY

231 +25 = Meet Exist Pav. & Curb on Island

231+00

+75

+50

+25

230+00

229+75

Lt		℄ Pacific
	26'	
27 11.21	11.23	
27.19 11.69	11.71	
27.75 11.51	11.55	
28.50' 11.35	11.40	
29.25 11.18	11.27	
30' 11.18	11.31	
30.75 11.11	11.22	

GRAND AVE – LEFT LANE GRADES

For Alignment & Defs See P-25, 26.

		24'	12'	℄ BASE	Rt.	
42+60.24 = opp 1' Gut Rad. on Lt.	29.33 10.38 = cb 9.98 F 0.40					
+50	28.40 10.44 10.17 F 0.27	9.88		9.47	32.6' 9.87 = cb 7.80 F 2.07	9.87 9.09 ✓ F 0.78
42+30 = Beg. Curb 5.33' Rt. of Base Line (+31.5 → Alignment P-25)					5.33 9.67 = cb Face 7.99 F 1.68	9.67 8.93 ✓ F 0.74
42+25	26.84' 10.43 = cb 10.03 F 0.40	9.88		9.40	10.5' 9.00	
42+20 = Elec Std #2 28.40' Lt. of Base Line	10.44 = cb 7.29 F 3.15					
42+00.48 opp 1' Gut R on Lt.	26.33 cb 10.46			9.40	9.5' 8.93	
42+00		9.88		9.40		
+75		9.88		9.40		
41+50	28 = Hinge 10.71	26' 10.59 = cb	9.88	9.40	9' 8.76	

Cont. from P-42

GRAND AVE. ~ LEFT LANE GRADES

For Alignment & Def Δ See P-25-26,

Note; Balance of Curb Grades Are Under Pacific Hwy Notes Page 59

ctr 5' curb R → 10.00 = cb
8.26
F 1.74 = cb

43+23.06

43+12.44 = B.C. Rt.

43+00

42+75

Lt	℄ Base	Rt.	Reset on this line
		5.33' 10.10 = cb ~~8.46~~ F ~~1.64~~	10.10 844 ✓ F 1.66
		3.14' 10.07 = cb ~~7.75~~ F ~~2.32~~	10.07 929 ✓ F 0.78
2.4' 9.88	9.53	2.33' 9.99 = cb 7.49 F 2.50	9.99 928 F 0.71

GRAND AVE.

GRADES ~ 18" Culvert
at Sta 32+50 P 37

Walker
Pope
Oltman
Olow 5-24-50

PLAN 2320A-D
WO 22093

	El. Stakes	Elev. INVERT	Cuts
0+50.5 = End Pipe	3.46	2.90	Cu.56
0+25.25	6.34	3.12	3.22
0+00 = ℄ J-TYPE DROP INLET	6.96	3.33	3.63
	7.19		

B.M. Nail in Pole on Rt 30+87 = Page 57

GRAND AVE.
BORROW PIT.

*
*
*

140.00
4,552.00
18,765.00
35,250.00
42,775.00
53,005.00
54,300.00
52,225.00
50,025.00
500.00
2,975.00
7,675.00
13,675.00
17,425.00
17,275.00
9,744.00
4,400.00
384,706.00 *

14,248.27 cu. yds
CUT

GRAND AVE.

GRADES ~ 18" Culvert
at Sta 32 + 50 P 37

Walker
Pope
Oltman
Olow 5-24-50

PLAN 2320 A-D
WO 22093

	El. Stakes	Elev. INVERT	Cuts	offsets
0 + 50.5 = End Pipe	3.46	2.90	C 0.56	10' Rt.
0 + 25.25	6.34	3.12	3.22	"
0 + 00 = ℄ J-TYPE DROP INLET	6.96	3.33	3.63	10' Rt
	7.19		B.M. Nail in Pole on Rt 30 + 87 = Page 37	

Walker
Popo
Johns
Elmore
7-26-55

GRAND AVE GRADES FOR Drainage Ditch
on North Between Bond & Pacific

→ Cont. P-68

Drawing 2318-A.D.
2319-D.

	El. stakes	El. Ditch	Cuts
~~150~~			
32+00	3.51	2.21	C-1.30
+50	3.82	2.25	C-1.57
31+00	3.97	2.30	C-1.67
+50	2.95	2.35	C-0.60
30+00	3.73	2.40	C-1.33
29+50	4.08	2.45	C-1.63

28+88.48-B.C. ℄ Rt. of Way

DRAINAGE DITCH

GRAND AVE, North side

Cont. P69		Elev. stakes	Bottom ditch	Cuts.
36+00		2.17	1.79	C 0.38
+50		2.26	1.85	C- 0.41
35+00		2.23	1.90	C-0.33
+50		2.49	1.95	C 0.54
34+00		3.30	2.00	C- 1.30
+50		3.02	2.05	C 0.97
33+00		3.29	2.10	C 1.19
32+50	TP	3.55	2.15	C- 1.40

Cont. from P67

DRAINAGE Ditch ~ GRAND AVE.

		Elev. Stakes	El. Ditch	
40+77 ℄ opp Exist. Box Culvert		6.57	0.27	C- 6.30
0.09 = exist. Fl. culvert				
40+00		3.66	0.70	C. 2.96
+50		2.77	1.11	C- 1.66
39+00		2.40	1.51	C 0.89
+50		2.16	1.54	C. 0.62
38+00		2.52	1.58	C 0.94
+50		2.24	1.63	C-0.61
37+00		2.63	1.68	C. 0.95
36+50	TP	3.12	1.73	C 1.39

Cont. from P-68

Walker
Taylor
Johns
Elmore
10-6-55

GRAND AVE - GRADES FOR DITCH

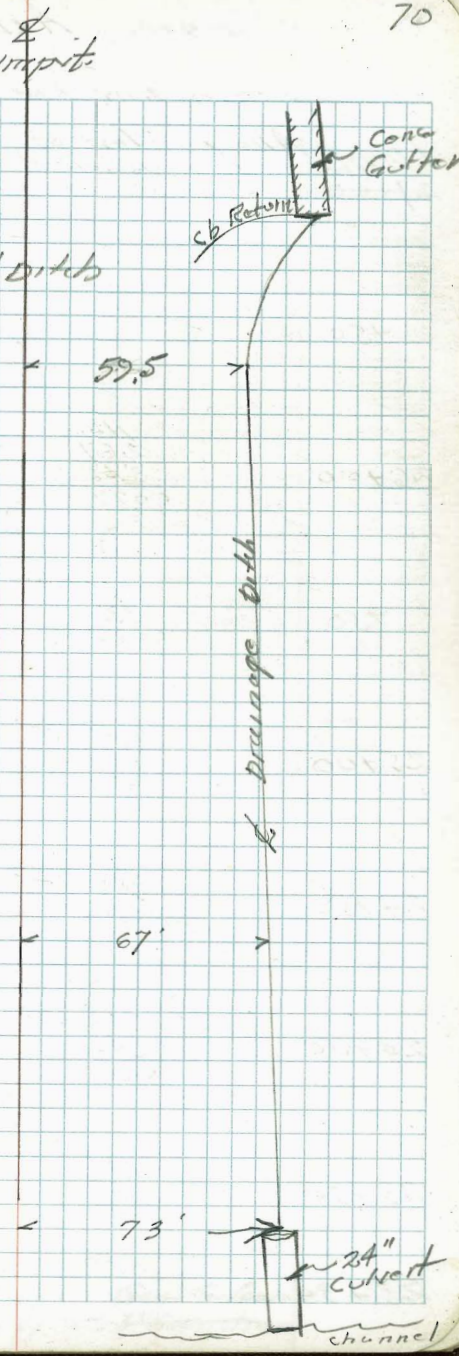
Between Bond & Pico St

on South

Plan 2318-D

	Elev. Stakes		Flow Ditch	Cuts	offsets
		Exist Conc	= 4.28		
28+74 = WLY end Exist. Conc. Gutter.			4.28		
~~+41.51~~		~~3.55~~	4.08	~~F 0.53~~	10' = To ℄ Ditch
28+00	3.62	~~3.62~~ ~~3.23~~	3.45 ~~3.91~~	C 0.17 ~~F 0.68~~	59.5
+50	4.79	~~4.95~~	2.87 ~~3.70~~	C 1.92 ~~C 1.05~~	
27+00	4.91	~~4.62~~	2.29 ~~3.50~~	C 2.62 ~~C 1.12~~	
+50	4.39	~~4.29~~	1.71 ~~3.29~~	C 2.68 ~~C 1.0~~	
26+00	4.19	~~4.23~~	1.13 ~~3.09~~	C 3.06 ~~C 1.14~~	
+50	4.18	~~4.10~~	0.55 ~~2.88~~	C 3.63 ~~C 1.22~~	
		~~4.10~~	~~2.88~~	~~C 1.22~~	
25+00	3.34	~~3.53~~	-0.03 ~~2.68~~	C 3.4 ~~C 0.85~~	67'
24+50	3.02	~~3.05~~ ~~2.47~~	-0.61 ~~2.47~~	C 3.6 ~~C 0.58~~	
24+00	2.32		-1.19	C 3.5	
23+29			-2.00		73'

GRADES changed as shown
By order Geo. Gilson
10-5-55



GRAND AVE - DRAINAGE Ditch on North Side From East End Bridge (Approx) To

℄ Impvt Sta.	Alley	West of N.L. Grand	Bond St.		Stakes 2' N.N.L. Grand	N.P.L. Grand		Flow Line Ditch
27+00	38		3.8 Rt. N.L. 2.88 3.32 C0.44	23.8 Rt. of N.L. 2.68	2.88 3.36 C0.48	←	15.0	→ 2.68 3.36 C0.68
						←	Variable Dist.	→
+50	19		1.9 Rt. N.L. 2.77 3.31 C0.54	21.9 Rt. of N.L. 2.57	2.77 3.31 C0.54	←	13.6	→ 2.45 3.31 C0.86
26+00		N.L. 2.67 3.46 C0.79	~~2.67~~	20' Rt 2.47	2.67 3.46 C0.8	←	11.7	→ 2.22 Flow 3.46 C1.24
+50		2.56 N.L. 3.38 C0.82		20' Rt. 2.36	2.56 3.38 C0.82		9.8	2.00 3.38 C1.38
25+00		2.46 N.L. 5.25 C2.79		20' 2.26	2.46 5.25 C2.8		8.3	1.77 5.25 C3.48
24+50		2.35 N.L. 3.65 C1.3		15' ~~20'~~ Rt. 2.20	2.35 3.65 C1.3		6.6	1.54 3.65 C2.11
24+00		2.25 N.L. 3.44 C1.2		15' Rt 2.15	Prop 2.25 3.44 C1.2	←	5.0	1.31 3.44 C2.13
23+50		1.31 2.67 C1.36		1.28	2.15 2.67 C0.5		3.3	1.08 2.67 C1.59
23+34		1.00		1.00 = Grating			Grating	2.00

IE = -2.72

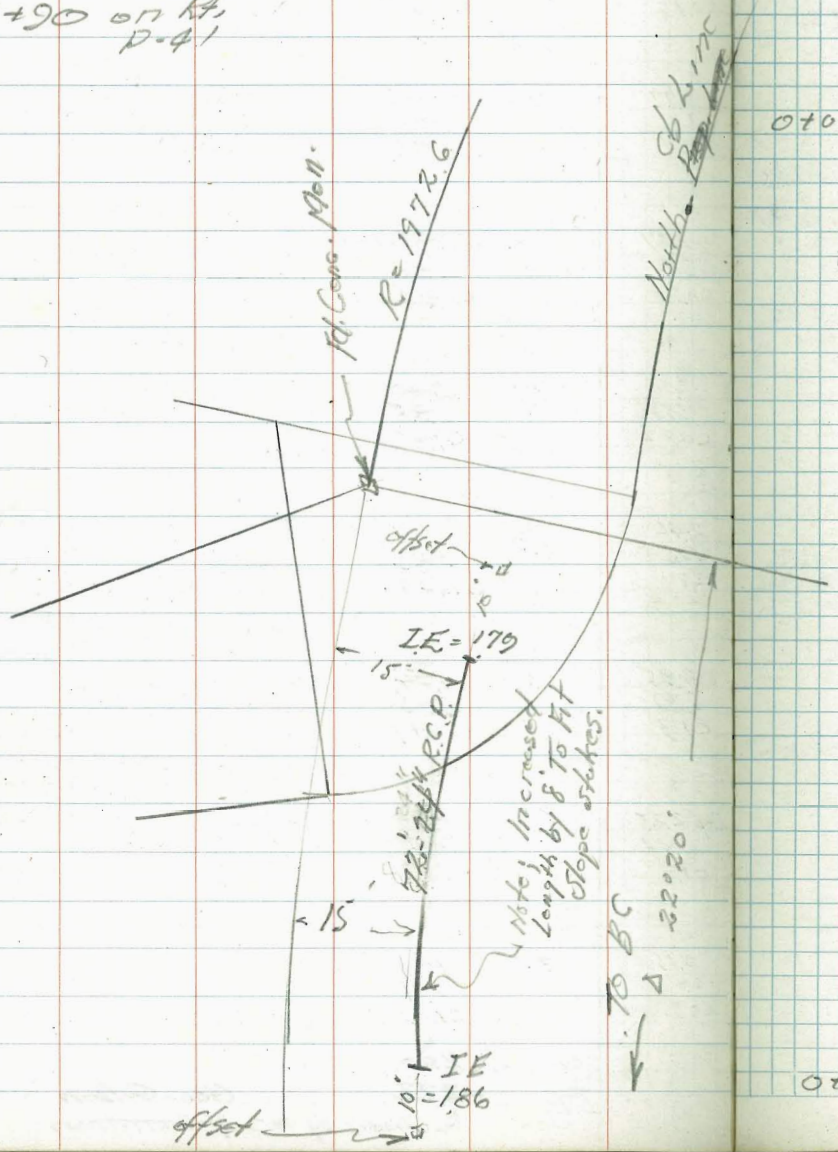
← Grades by Per - ~~E.F. Gabrielson~~ Geo-Gilson

GRADES ~ Culverts

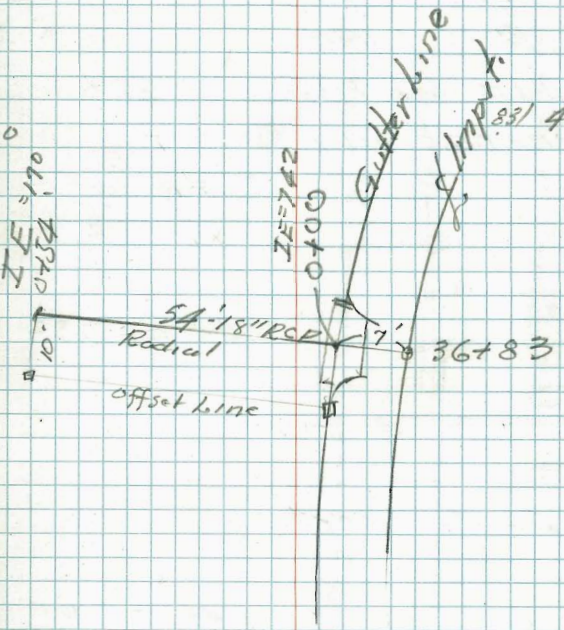
GRAND AVE.

2.01 11.42 2.41 2.41

B.M. Hail Pole
37+90 on Rt.
D-41



	Elev. Stakes	Invert	Cuts
0+54	3.76	1.70	C2.06
0+00	8.31	4.00	C4.31
0+72 ~~0+64~~	1.47	1.79	F 0.32
0+00	1.87	1.86	C 0.01



GRAND AVE - CULVERTS

Walker Pope Johns Elmore 9-8-55

at Pico St.

Plan 2320-A-D.

		Stakes	Top	
Lt. side cb inlet		4.21	3.25	c 0.96
Rt " " inlet		5.33	3.25	c=2.08

BM = Chisled □ in cb P-32 6.26

GRADES NLY Culvert

	El. stake	El. Invert	Cuts	offsets
0+24	3.77	-2.70	c 6.47	7' Lt
0+00	1.34	-2.82	4.16	7' Lt

S.L. Culvert

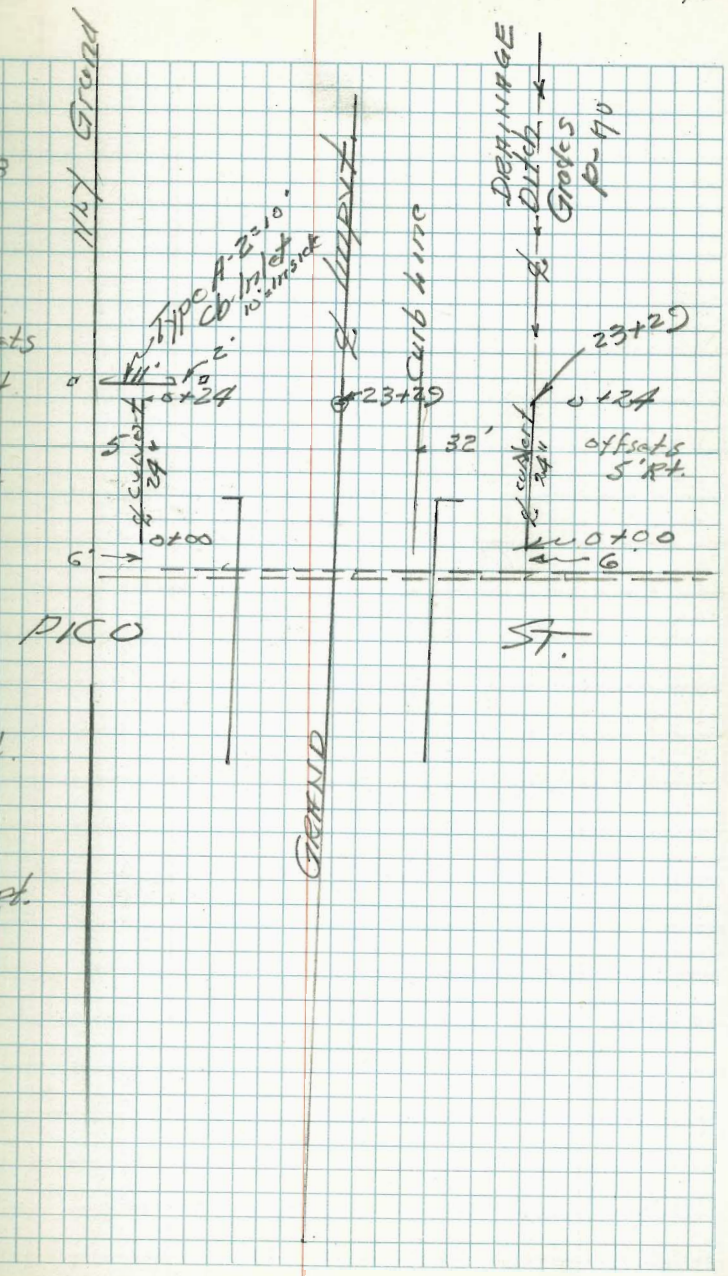
			Cuts	
0+24	0.43	-2.00	2.43	5' Rt.
0+00	-1.17	-3.20	c 2.03	5' Rt.

11-19-1955

Note: Check Flow Above NLY Culvert

And Fd. East end at El -2.32

" " West " " El -3.00



BOND STREET

Walker
~~Pope~~
Slow
Oltman 3-11-55

GRADES FOR DRAINAGE PURPOSES
in Connection With Grand St
Plan # 2320 A-D

Sta	Lt Curb Grades	13' Lt Hinge	℄	13' Rt = Hinge	Rt Curb Grades
2+80	4.50 = Curb 3.86 F 0.64				4.50 = Curb 4.36 F 0.14
2+50	4.58 4.85 C .27				4.58 4.75 C 0.17
+25	4.64 4.61 F 0.03				4.64 4.78 C 0.14
2+00	4.71 4.83 F 0.18				4.71 5.04 C 0.33
+70	4.79 4.85 F 0.74				4.79 4.99 C 0.20
+40	4.87 4.80 F 0.37				4.87 4.90 C 0.03
1+20	4.92 4.85 F 0.87				4.92 4.78 F 0.14
1+00	4.96 3.66 F 1.30				4.96 4.69 F 0.27
0+75	5.01 3.65 F 1.36	3.56 3.65 C 0.09		3.56 4.56 C 1.00	5.01 ~~4.94~~ F ~~2.07~~
+55	5.27 3.19 F 2.08	3.94 3.19 F 0.75		3.94 4.59 C 0.65	5.27 4.57 F 0.70
+35	5.84 3.57 F 2.27	6.02 3.57 F 2.45		6.02 4.16 F 1.86	5.84 4.62 F 1.22
0+25	7.16 3.05 F 4.11	7.22 3.05 F 4.17		7.22 3.48 F 3.74	7.16 3.55 F 3.61
0+00					

Note: offsets To Hinge
22' Lt + 22' Rt.

Hinge Lt	℄	Rt
6.91		6.91
3.44		4.43
3.47		F 2.48

B.M. SW 7' Mon 2.36
Bond & Hornblend P-78

Grades For Drainage

Alley West of Bond St.

Walker From Grand to Hornblend

Bltman Olow 3-11-55

3+50 = N.L. Hornblend

3+20 = ℄ Hornblend

2+80 = .8± S.L. Hornblend

+70			
T.P.		4.51	
+40			
2+10			
+80			
T.P.		5.35	Nail in Pole
+50			
1+20			
+90			
+60			
+30			
0+00			
	B.M. N.R.P. Bent #4 P-5	2.18	

	Lt Shoulder	℄ Valley	Rt. Shoulder
	3.93	3.68	3.93
5' Back	4.45 3.78 C 0.67	3.53	4.64 = Stake on Line 3.78 = Pipe C 0.86
5' Back	4.39 3.76 C 0.63	3.51	4.85 2' Back 3.76 C 1.09
1' Back	3.97 3.70 C 0.27	3.45	4.51 1' Back 3.70 C 0.81
5' Back	3.96 = Stake 3.62 C 0.34	3.37	4.01 = Stake 5' Back 3.62 C 0.39
2' Back	3.89 Stake 3.56 C 0.33	3.31	3.97 = Stake 5' Back 3.56 C 0.31
5' Back	3.77 = Stake 3.49 = Grade C 0.28	3.24	4.24 Stake 5' Back 3.49 C 0.75
5' Back	3.39 = Stake 3.43 = Grade F 0.04	3.18	4.19 = Stake 5' Back 3.43 C 0.76
	3.32 Stake 3.36 = Grade F 0.04	3.11	4.08 Stake 0.5' Back 3.36 C 0.72
	3.12 = Stake 3.30 = Grade F 0.18	3.05	4.40 = Stake 0.3' Back 3.30 C 1.10
	3.00 = Stake 3.23 F 0.23	2.98	4.72 = Stake 0.7 Back 3.23 = Nail C 0.49
	3.33 = Stake 3.17 = Grade C 0.16	2.92	3.23 = Stake 3.17 = Grade C 0.06

GRADES ~ HORNBLEND
For Drainage

Plan 2320-A-D

chkout cont. P76

Bond & Hornblend
TP. SW 7' Conc. Mon 2.36

	Lt Gutter Grades	℄	Rt Gutter Grades
1+30	3.57 = Gutter 4.64 = Stake C 1.07		3.85 = Gutter 4.94 = Stakes C 1.09
1+04	3.65 4.73 C 1.08		3.93 5.26 C 1.33
0+78	3.73 4.40 C 0.67		4.01 5.19 C 1.18
+52	3.81 4.50 C 0.69 C 0.69		4.09 5.11 C 1.02
+26	3.89 4.27 C 0.38		4.17 4.77 C 0.60
0+00 = Wh. Bond St	3.97 3.86 F 0.11		4.27 4.00 F 0.27

Walker
Pope
Johns
Elmore
8-10-55

BOND STREET

GRAND AVE

GRADES FOR ACCESS RD.

13' Lt.
Hinge ℄ Lt. ← 10' → ℄ ← 10' → Rt.
← 3' → Pav. cb.

Cont. P. 75

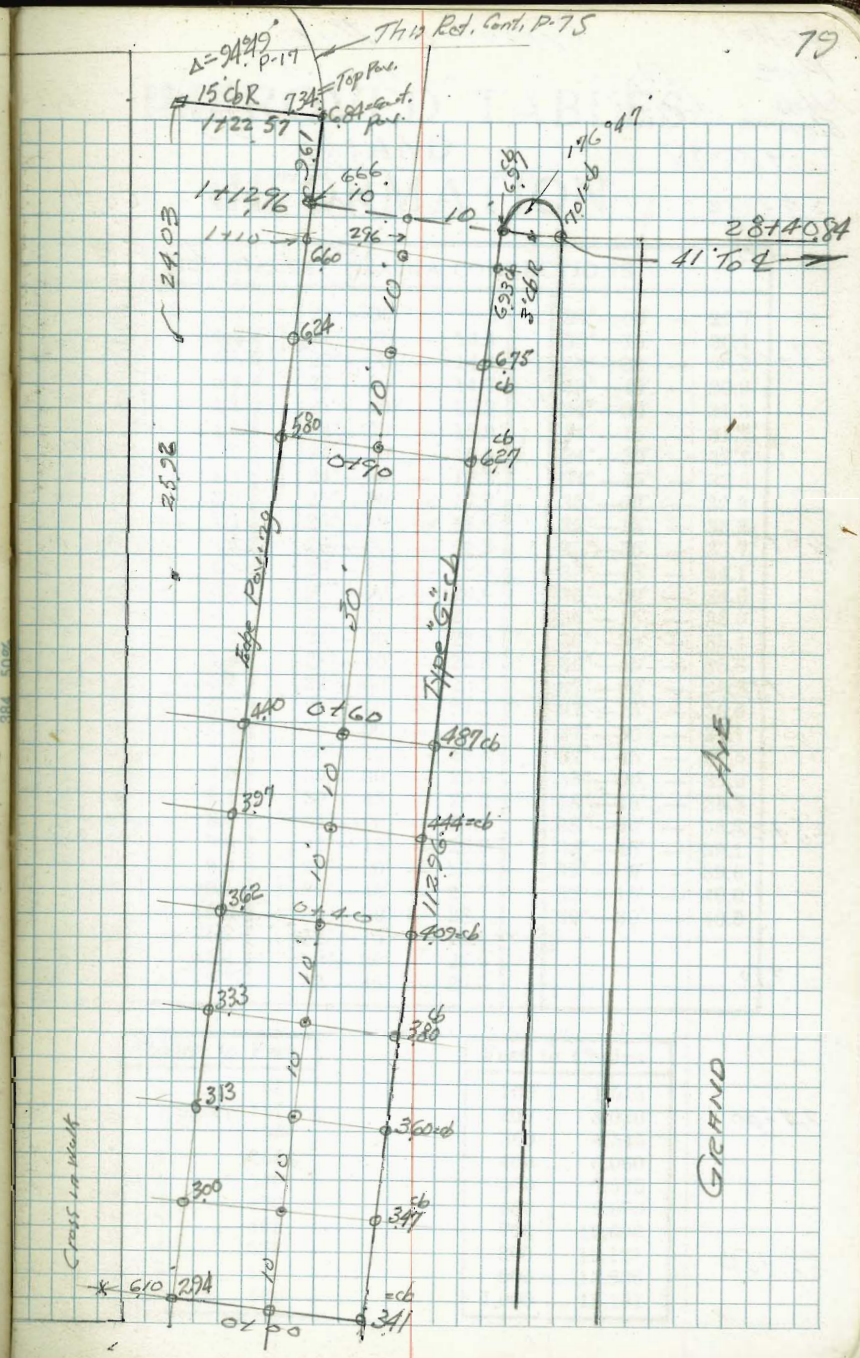
6.72
2.6
F4.1 - out 6.2 To Hinge 6.84
6.66
F ~~5.48~~ - F0.18

1+22.57 = BC. 15' Pav. Radius.

~~6.97~~ = cb
~~5.87~~ = stake P-34

		Edge Pav.		
1+12.96				6.97 = cb 5.87 P-34 = stake F1.10 7.01 5.87 F1.14
1+10		6.60 6.11 F0.49		6.93 = cb 6.21 F0.72
1+00		6.24 6.00 F0.24	~~6.27~~ 6.75 6.55 F0.20	
0+90	5.86 2.66 F3.2 4.7 To Hinge	5.80 5.76 F0.04		6.27 6.51 C0.24
0+60	4.46 2.56 F1.9 2.9 To Hinge	4.40 4.58 C0.18		4.87 6.36 C1.49
+50		3.97 4.17 C0.20	4.44 5.96 C1.52	
0+40	3.68 2.58 F0.8 1.2 To Hinge	3.62 3.84 C0.22		4.09 5.63 C1.54
+30		3.33 3.56 C0.23	3.80 5.28 C1.48	
0+20	3.19 3.0 F0.2 0.3	3.13 3.31 C0.18		3.60 5.26 C1.66
0+10		3.00 3.19 C0.19	3.47 4.69 C1.22	
0+00	3.00 0.0 0.0	2.94 3.13 C0.19		3.41 4.57 C1.16

Alley



Walker
Pope
Johns
Elmore

GRAND AVE

	Reset	Rough	Grades	Finish Pav.	Cuts
	8-19-55				
40+84			5.83		
28+00			7.14	6.77	C0.37
+50			6.82	7.17	F0.35
27+00			7.20	8.09	F0.89
+50			7.36	8.43	F1.07
26+00			7.90	8.81	F0.91
+50			7.96	9.20	F1.24
25+00			7.68	9.58	F1.90
+50			8.14	9.96	F1.82
24+00			8.08	10.35	F2.27
23+50			7		

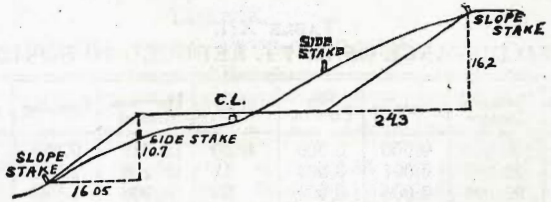
IMPROVED TABLES AND INFORMATION

HORIZONTAL STADIA CORRECTIONS

2°—00′	— 0.1	21°—00′	— 12.8	33°—00′	— 29.7
3°—00′	— 0.3	21°—30′	— 13.4	33°—15′	— 30.1
4°—00′	— 0.5	22°—00′	— 14.0	33°—30′	— 30.5
5°—00′	— 0.8	22°—30′	— 14.7	33°—45′	— 30.9
6°—00′	— 1.1	23°—00′	— 15.3	34°—00′	— 31.3
7°—00′	— 1.5	23°—30′	— 15.9	34°—15′	— 31.7
8°—00′	— 1.9	24°—00′	— 16.5	34°—30′	— 32.1
9°—00′	— 2.5	24°—30′	— 17.2	34°—45′	— 32.5
10°—00′	— 3.0	25°—00′	— 17.9	35°—00′	— 32.9
10°—30′	— 3.3	25°—30′	— 18.6	35°—15′	— 33.3
11°—00′	— 3.6	26°—00′	— 19.2	35°—30′	— 33.7
11°—30′	— 4.0	26°—30′	— 19.9	35°—45′	— 34.1
12°—00′	— 4.3	27°—00′	— 20.6	36°—00′	— 34.6
12°—30′	— 4.7	27°—30′	— 21.3	36°—15′	— 35.0
13°—00′	— 5.1	28°—00′	— 22.0	36°—30′	— 35.4
13°—30′	— 5.5	28°—30′	— 22.8	36°—45′	— 35.8
14°—00′	— 5.9	29°—00′	— 23.5	37°—00′	— 36.2
14°—30′	— 6.3	29°—30′	— 24.3	37°—15′	— 36.6
15°—00′	— 6.7	30°—00′	— 25.0	37°—30′	— 37.1
15°—30′	— 7.2	30°—15′	— 25.4	37°—45′	— 37.5
16°—00′	— 7.6	30°—30′	— 25.8	38°—00′	— 37.9
16°—30′	— 8.1	30°—45′	— 26.2	38°—15′	— 38.3
17°—00′	— 8.5	31°—00′	— 26.5	38°—30′	— 38.7
17°—30′	— 9.0	31°—15′	— 26.9	38°—45′	— 39.1
18°—00′	— 9.5	31°—30′	— 27.3	39°—00′	— 39.6
18°—30′	— 10.1	31°—45′	— 27.7	39°—15′	— 40.0
19°—00′	— 10.6	32°—00′	— 28.1	39°—30′	— 40.5
19°—30′	— 11.2	32°—15′	— 28.5		
20°—00′	— 11.7	32°—30′	— 28.9		
20°—30′	— 12.3	32°—45′	— 29.3		

Chains to Feet	
1	66
2	132
3	198
4	264
5	330
6	396
7	462
8	528
9	594
10	660

Feet to Chains	
100	1.515
200	3.030
300	4.545
400	6.060
500	7.575
600	9.090
700	10.606
800	12.121
900	13.636
1,000	15.151



DISTANCES FROM SIDE STAKES FOR CROSS-SECTIONING.

SLOPE 1½ TO 1. ROADWAY OF ANY WIDTH.

	0	.1	.2	.3	.4	.5	.6	.7	.8	.9	
0	0.00	0.15	0.30	0.45	0.60	0.75	0.90	1.05	1.20	1.35	0
1	1.50	1.65	1.80	1.95	2.10	2.25	2.40	2.55	2.70	2.85	1
2	3.00	3.15	3.30	3.45	3.60	3.75	3.90	4.05	4.20	4.35	2
3	4.50	4.65	4.80	4.95	5.10	5.25	5.40	5.55	5.70	5.85	3
4	6.00	6.15	6.30	6.45	6.60	6.75	6.90	7.05	7.20	7.35	4
5	7.50	7.65	7.80	7.95	8.10	8.25	8.40	8.55	8.70	8.85	5
6	9.00	9.15	9.30	9.45	9.60	9.75	9.90	10.05	10.20	10.35	6
7	10.50	10.65	10.80	10.95	11.10	11.25	11.40	11.55	11.70	11.85	7
8	12.00	12.15	12.30	12.45	12.60	12.75	12.90	13.05	13.20	13.35	8
9	13.50	13.65	13.80	13.95	14.10	14.25	14.40	14.55	14.70	14.85	9
10	15.00	15.15	15.30	15.45	15.60	15.75	15.90	16.05	16.20	16.35	10
11	16.50	16.65	16.80	16.95	17.10	17.25	17.40	17.55	17.70	17.85	11
12	18.00	18.15	18.30	18.45	18.60	18.75	18.90	19.05	19.20	19.35	12
13	19.50	19.65	19.80	19.95	20.10	20.25	20.40	20.55	20.70	20.85	13
14	21.00	21.15	21.30	21.45	21.60	21.75	21.90	22.05	22.20	22.35	14
15	22.50	22.65	22.80	22.95	23.10	23.25	23.40	23.55	23.70	23.85	15
16	24.00	24.15	24.30	24.45	24.60	24.75	24.90	25.05	25.20	25.35	16
17	25.50	25.65	25.80	25.95	26.10	26.25	26.40	26.55	26.70	26.85	17
18	27.00	27.15	27.30	27.45	27.60	27.75	27.90	28.05	28.20	28.35	18
19	28.50	28.65	28.80	28.95	29.10	29.25	29.40	29.55	29.70	29.85	19
20	30.00	30.15	30.30	30.45	30.60	30.75	30.90	31.05	31.20	31.35	20
21	31.50	31.65	31.80	31.95	32.10	32.25	32.40	32.55	32.70	32.85	21
22	33.00	33.15	33.30	33.45	33.60	33.75	33.90	34.05	34.20	34.35	22
23	34.50	34.65	34.80	34.95	35.10	35.25	35.40	35.55	35.70	35.85	23
24	36.00	36.15	36.30	36.45	36.60	36.75	36.90	37.05	37.20	37.35	24
25	37.50	37.65	37.80	37.95	38.10	38.25	38.40	38.55	38.70	38.85	25
26	39.00	39.15	39.30	39.45	39.60	39.75	39.90	40.05	40.20	40.35	26
27	40.50	40.65	40.80	40.95	41.10	41.25	41.40	41.55	41.70	41.85	27
28	42.00	42.15	42.30	42.45	42.60	42.75	42.90	43.05	43.20	43.35	28
29	43.50	43.65	43.80	43.95	44.10	44.25	44.40	44.55	44.70	44.85	29
30	45.00	45.15	45.30	45.45	45.60	45.75	45.90	46.05	46.20	46.35	30
31	46.50	46.65	46.80	46.95	47.10	47.25	47.40	47.55	47.70	47.85	31
32	48.00	48.15	48.30	48.45	48.60	48.75	48.90	49.05	49.20	49.35	32
33	49.50	49.65	49.80	49.95	50.10	50.25	50.40	50.55	50.70	50.85	33
34	51.00	51.15	51.30	51.45	51.60	51.75	51.90	52.05	52.20	52.35	34
35	52.50	52.65	52.80	52.95	53.10	53.25	53.40	53.55	53.70	53.85	35
36	54.00	54.15	54.30	54.45	54.60	54.75	54.90	55.05	55.20	55.35	36
37	55.50	55.65	55.80	55.95	56.10	56.25	56.40	56.55	56.70	56.85	37
38	57.00	57.15	57.30	57.45	57.60	57.75	57.90	58.05	58.20	58.35	38
39	58.50	58.65	58.80	58.95	59.10	59.25	59.40	59.55	59.70	59.85	39
40	60.00	60.15	60.30	60.45	60.60	60.75	60.90	61.05	61.20	61.35	40
41	61.50	61.65	61.80	61.95	62.10	62.25	62.40	62.55	62.70	62.85	41
42	63.00	63.15	63.30	63.45	63.60	63.75	63.90	64.05	64.20	64.35	42
43	64.50	64.65	64.80	64.95	65.10	65.25	65.40	65.55	65.70	65.85	43
44	66.00	66.15	66.30	66.45	66.60	66.75	66.90	67.05	67.20	67.35	44
45	67.50	67.65	67.80	67.95	68.10	68.25	68.40	68.55	68.70	68.85	45
46	69.00	69.15	69.30	69.45	69.60	69.75	69.90	70.05	70.20	70.35	46
47	70.50	70.65	70.80	70.95	71.10	71.25	71.40	71.55	71.70	71.85	47
48	72.00	72.15	72.30	72.45	72.60	72.75	72.90	73.05	73.20	73.35	48
49	73.50	73.65	73.80	73.95	74.10	74.25	74.40	74.55	74.70	74.85	49
50	75.00	75.15	75.30	75.45	75.60	75.75	75.90	76.05	76.20	76.35	50

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TP 3.68
TP 9.42 (Nat Impd 3.545)
TP 7.23
chk. BM 5.35

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