

110

G110

FIELD BOOK

No. 385F

Alley Crosby Beardley 2nd Alley Naplog
2nd Alley Crosby Birkon N. H. 1885



64.96

64.26

Posted 2/15/26



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IRVING PARK STATION

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92 FIFTH ST.
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SAN FRANCISCO, CAL.

AGENTS FOR

"BERGER" TRANSITS and LEVELS

"GURLEY" SURVEYING and HYDRAULIC INSTRUMENTS

"CHICAGO" STEEL TAPES, etc.

APR 7 1965

Journal
H

Monroe Ave. Grading 4/13/24
 From E. Line Texas to W. Line 30th miles
 sharp wall

	S. Line	N. Line
00 = E Line Texas	339.25	340.25
+50	340.14	341.14
1+00	341.03	342.03
1+40 BRK	341.75	342.75
1+80	343.25	344.40
2+20 BRK	344.75	346.05
2+60	348.70	350.15
3+00 = W. Line Arizona	352.65	354.25
00 = E. " "	354.25	355.85
+60 BRK	363.25	364.25
1+00 BRK	367.25	368.25
1+40 BRK	369.25	370.25
+80	370.65	371.55
2+20	372.05	372.85
+60	373.45	374.15
3+00 = W. Line Hamilton	374.85	375.45
00 = E. " "	375.45	376.25
+50	376.12	
1+00	376.59	
+50	377.05	
2+00	377.52	
+50	377.99	
3+00 = W. Line Oregon	378.45	378.45

338.96 B.M. SE of Monroe

	Tax			BRK	
17.53					
351.53					
0.41					
351.12					
12.95	340.00	341.14	342.03	342.75	344.40
364.07	11.53	10.29	9.50	8.78	7.15
0.30		99	8.6	7.74	6.8
363.77		+0.4	+0.9	+1.0	+0.3
11.94					
375.71					
0.37					
375.38					
1.20	339.00	340.14	341.03	341.75	343.25
341.65	12.53	11.29	10.50	9.78	8.28
2.45		10.8	10.30	9.20	8.70
379.00	B.M. Mad Oregon	20.5	20.2	20.6	20.4
2.10					

	BRK		AMZ	
N	346.05	350.15	354.00	
	5.48	1.38	10.07	
	5.3	2.6	10.09	
	+0.2	-1.2		
S	344.75	348.70	352.40	
	6.78	2.83	11.67	
	7.5	3.7	11.71	
	+0.7	-0.9		
N	355.60	364.25	368.25	370.25
	8.47	11.5	7.5	5.5
	8.44	9.2	4.5	5.0
		2.3	11.0	10.5
				3.0
				11.2

S	354.00	363.25	367.25	369.25	370.65
	10.07	12.5	8.5	6.5	5.1
	9.96	12.4	8.5	6.7	4.5
		-0.4	0.0	-0.2	+0.6

N	372.85	374.15	375.20	
	2.90	1.6	0.55	
	2.4	0.9	0.62	
	+0.5	+0.7		

S	373.05	373.45	374.60	
	3.70	2.3	1.15	
	3.3	2.2	1.21	
	+0.4	+0.1		

N				
S	375.40	376.12	376.59	377.05
	6.25	5.83	5.06	4.60
	6.24	5.9	5.05	4.4
		-0.4	0.0	+0.2
				4.13
				0.0

N				
S	377.99	378.20		
	3.66	3.45	0.10	
	3.3	3.35		
	+1.4			

	S.H.H.C	Nline	
00 = E. Line Oregon	379.25	379.25	
+50		378.85	
100		378.45	
+50		378.05	
200		377.65	
+50		377.25	
300 = W. Line Idaho	376.85	376.85	
00 = E. " "	376.25	376.25	
+50	373.00	373.25	373.25
100 BRK	370.00	370.25	370.50
+40 BRK	3	369.75	370.25
+60 BRK		369.75	370.25
200	367.79	370.04	370.54
+50	370.14	370.39	370.64
300 W Line Utah	370.75	371.25	
00 = E. " "	370.75	371.25	
+30		370.83	
100		370.92	
+50		371.00	
200		371.08	
+50		371.16	
300 = W Line Kansas	371.25	372.25	

379.00 AN. SEC. 6 Monroev Oregon

Monroe Grades 20

379.00	N	379.00	378.85	378.45	378.05	377.65
379.20		3.20	3.35	3.75	4.15	4.55
382.20		3.16	3.4	3.3	3.8	4.2
9.35			0.0	+0.4	+0.2	+1.1
372.85						
2.34						
375.19	N	377.25	376.6			
2.48		4.95	5.2			
372.71		3.83	3.9			
3.16		3.9	5.67			
375.87		3.9	5.67			
372.04		4.10				

376.00	N	376.00	375.5	370.75	370.25	370.25
6.20		1.69	4.14	4.94	4.94	4.94
6.20		2.2	4.3	4.5	5.2	5.2
0.5		-0.5	+0.1	+0.4	-0.4	-0.4
376.00	S	373.25	370.25	369.75	369.75	369.75
6.20		8.95	4.94	5.44	5.44	5.44
6.20		9.35	4.7	5.7	5.7	5.7
0.40		-0.40	+0.2	-0.3	-0.3	-0.3

370.54	N	370.54	370.89	371.0		
4.65		4.30	4.19			
4.3		4.2	4.14			
40.3		+0.1				
370.04	S	370.39	370.50			
5.15		4.80	4.69			
5.9		5.8	4.73			
-0.8		-1.0	0.4L			

370.50	S	370.53	370.92	371.00	371.05	
4.69		5.04	4.95	4.97	4.77	
4.75		5.15	4.45	5.5	6.20	
0.04L		-0.1	+0.5	-0.6	-1.4	

371.06	S	371.00				
7.71		4.87	0.04L			
6.0		4.91				
-1.3						

373.25	N	370.50				

373.00	S	370.00	369.75	369.53	369.75	369.53
4.28		7.28	7.53	7.25	7.23	7.26
4.46		6.23	6.1	33	7.3	7.33
-0.18		+0.80	-0.08	+0.42	+0.35	+0.48
373.20	N	370.50	370.25	370.23	370.25	370.23
4.08		6.78	7.03	7.25	7.03	7.26
3.84		6.46	5.89	6.80	6.51	6.85
+0.14		+0.32	+1.14	+0.45	+0.52	+0.71
369.79	S	370.12				
7.49		7.16				
7.43		7.06				
+0.06		+0.10				
370.29	N	370.66				
6.22		6.62				
6.88		7.00				
0.35		-0.38				

	S. Line	N. Line
00 = Flint Kansas	372.25	373.25
+50	372.87	373.76 ²
1+00	373.50	374.25
+50	374.12	374.75
2+00 BrK	374.75	375.25
+50	376.75	377.25
3+00 W. line 30 th	378.75	379.25

372.04
8.37
 380.41

Monroe Grades 3

N.	373.00	373.75	374.25	374.75	375.25
	<u>7.41</u>	<u>6.66</u>	<u>6.16</u>	<u>5.46</u>	<u>5.16</u>
	7.53	5.93	5.1	5.1	4.74
		<u>+0.7</u>	<u>+1.1</u>	<u>+0.6</u>	<u>0.4</u>
S	372.00	372.87	373.50	374.12	374.75
	<u>8.41</u>	<u>7.54</u>	<u>6.9</u>	<u>6.29</u>	<u>5.46</u>
	8.37	7.8	7.1	6.3	4.45
		<u>-0.3</u>	<u>-0.2</u>	<u>0.0</u>	<u>1.1</u>
N	377.25	379.00			
	<u>3.16</u>	<u>1.41</u>			
	4.18	1.35			
	<u>-0.4</u>				
S	376.75	378.50			
	<u>3.26</u>	<u>1.41</u>			
	3.57	1.87			
	<u>+0.1</u>				

GRADES FOR PAVING
 HILLSIDE DRIVE
 IN LA JOLLA HILLS
 STAKES 2'E + 2'W of E+W Lines

	W.L.		E.L.
41.7' 50x41.7' La Jolla Hills			
0+00	99.50	99.75	99.50
+50	101.88	102.13	101.88
1 break	104.25	104.5	104.25
+25 break	105.35	105.60	105.35
+50 break	107.25	107.5	107.25
2	111.75	112.0	111.75
+50	116.25	116.5	116.25
3	120.75	121.0	120.75
+50	125.25	125.5	125.25
4	129.75	130.0	129.75
+50	134.25	134.5	134.25
5+00	138.75	139.0	138.75

These elevations are from assumed
 B.M.

4

Assumed	E	138.75	134.25	129.75	125.25	120.75	116.25	111.75
140.47	1.72	6.22	1.72	3.66	8.16	12.66	4.97	
129.6	1.64	7.40	1.64	2.20	7.87	12.96	4.76	
127.51	±0.08	-1.18	±0.05	+1.17	±0.29	-0.30	±0.21	
125.91								
127.8	W	138.75	134.25	129.75	125.25	120.75	116.25	111.75
116.13	1.72	6.22	1.72	3.66	8.16	12.66	4.97	
0.59	1.08	6.87	1.08	4.46	5.52	11.00	2.88	
116.72	±0.64	-0.15	-0.36	-0.80	±2.58	±1.66	±2.00	
115.6								
104.86	E	107.25	105.35	104.25	101.88	99.50		
2.44	2.47	1.137	3.05	5.42	7.80			
107.30	1.051	12.48	4.28	5.28				
	-1.04	-1.11	-1.23	±0.34				
	W	107.25	105.35	104.25	101.88	99.50		
	2.47	1.137	12.47	5.42				
	8.47	10.04	11.47	3.20				
	±1.00	±1.33	±1.00	±2.22				

E.L. Bayard 20200

4+95 = W.L. Bayard

155 1.65 155

4+35

096 -1.06

3+85

047 +0.57

3+35

-002, +0.08

2+85

-0.51 -0.41

2+35 break

-1.0 -0.90

1+85

-1.23 -1.13

1+35

-1.45 -1.35

at 95 = paving no wide here

-1.68 -1.58

at 35 = E.L. on Curb

-1.80 -1.80

E.C. 20100

-2.05

Bayard

5T.

Pacific Jogs
1.07 @ BayardCurb
Berm

Line

Pacific

3' Curb.

15' x 15'

Berm
Line

18'

Curb is 2' from prop. line

E.C.

Radius = 30' to Berm.

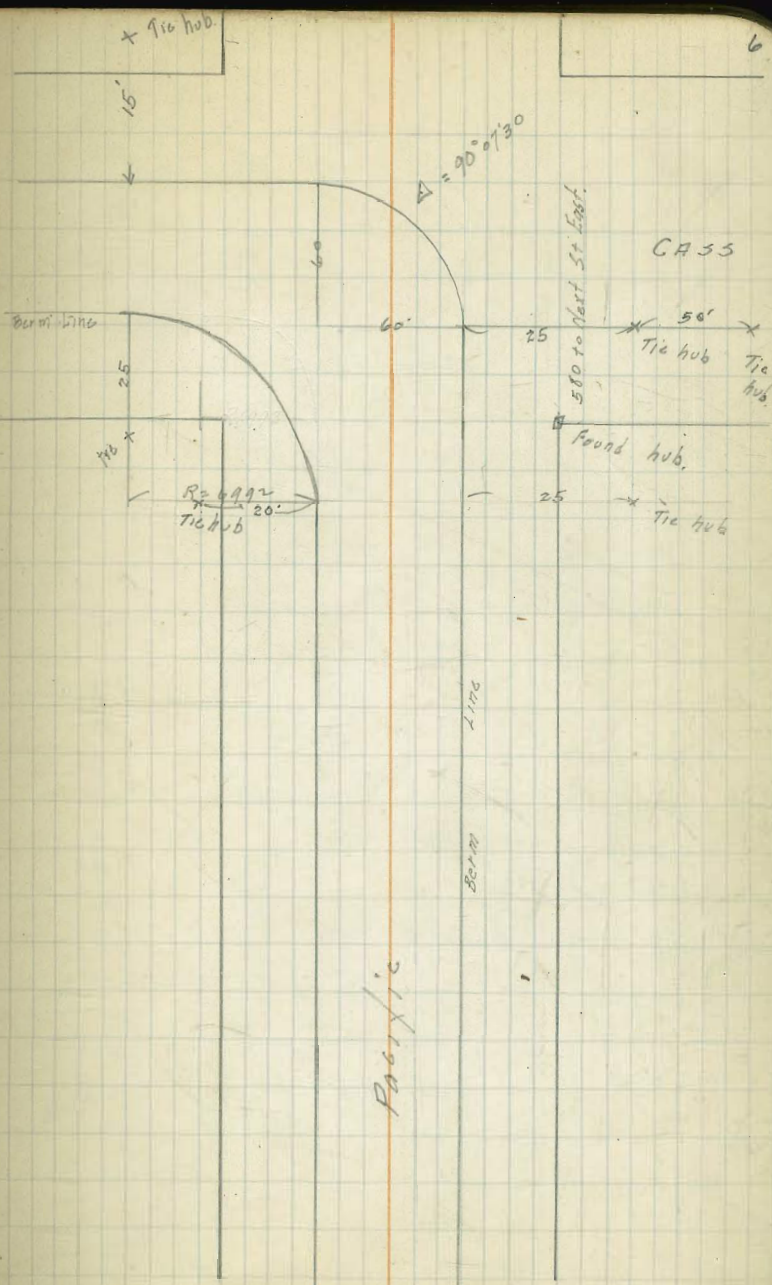
0.17

0.103

8/14/11
1771

90/05
0.6
90/5
3.70

	Grade		
300 page 7 for cuts here	-0.40	+0.72	
490 = P.C. on S.	-0.10	+0.65	
460 = P.C. on N.	-0.53	0.00	0.44
400 Level	0.13	0.23	+0.13
350	0.31	0.31	
300	0.49	0.49	
250	0.67	0.67	
200	0.84	0.84	
150	1.02	1.02	
100	1.20	1.20	
50	1.37	1.37	
EL. Bayard	1.55	1.65	1.55



100
100

24

Grade

50
56

102 6.65 6.65

108 5.85 5.85

54H 5.05 5.05

NL Oliver 4.45 4.35 4.25

200-5L Oliver 3.75 3.85 3.75

150 2.95 3.05 2.95

100 2.15 2.25

50 Level 1.35 + 1.45 1.35

EC on W top 0.15 + 0.65 1.07

EC on E 0.04 + 0.15 + 0.90

-0.07

-0.18 + 0.84

-0.19 + 0.78

continued on page 11

7.16 5.1 4.3 4.9 5.0 7.7 4.4 5.0 7
10.12 7.5 8M.1.7 1.8 1.7 1.2 1.2 5.0 7.7
10.2 2.62 2.0 2.9 3.6 4.2 4.2 4.2 4.2
10.3 6.13 3.5 3.6 3.6 4.2 4.2 4.2 4.2
8.1 6.70 3.5 3.6 3.6 4.2 4.2 4.2 4.2

W 6.55 5.75 4.95 4.15 3.65 2.85 2.05 1.25
10.6 2.4 3.2 4.0 4.5 5.3 6.1 6.9
10.1 2.0 2.9 3.6 4.2 5.0 5.8 6.6
7.05 7.04 7.03 7.04 7.03 7.04 7.03 7.04

E 6.55 5.75 4.95 4.15 3.65 2.85 2.05 1.25
1.6 2.4 3.2 4.0 4.5 5.3 6.1 6.9
3.0 3.5 4.2 5.0 5.8 6.6 7.4 8.2
-1.4 -1.1 -1.0 -1.0 -1.0 -1.2 -0.6 -0.2

W 6.2W
-0.10 0.23 0.34 0.46 0.56 0.67
8.22 8.9 9.5 10.1 10.7 11.3 11.9 12.5
7.0 7.3 7.6 7.9 8.2 8.5 8.8 9.1
7.0 7.0 7.0 7.0 7.0 7.0 7.0 7.0

E 1.27 1.27 1.21 1.16 1.09 1.02
5.9 6.7 7.5 8.3 9.1 9.9
7.0 7.0 7.0 7.0 7.0 7.0
-1.3 -2.0 -2.7 -3.6 -3.6 -1.7

S 0.66 0.03 0.21 0.39 0.57 0.74 0.92 1.10 1.27
7.5 8.1 8.6 9.1 9.6 10.1 10.6 11.1
7.1 7.4 7.7 8.0 8.3 8.6 8.9 9.2
-0.6 +0.07 +0.6 +0.8 +0.8 +0.9 +0.9 +0.7

N -0.30 0.03 0.21 0.39 0.57 0.74 0.92 1.10 1.27
7.9 8.1 8.6 9.1 9.6 10.1 10.6 11.1
7.7 7.8 7.9 8.0 8.1 8.2 8.3 8.4
7.0 7.0 7.0 7.0 7.0 7.0 7.0 7.0

S 1.45 1.45 5.6 6.1 6.7 7.3 7.8 8.1 8.2 8.4 8.5
5.3 5.3 5.3 5.3 5.3 5.3 5.3 5.3 5.3 5.3 5.3
5.0 4.9 4.8 4.7 4.6 4.5 4.4 4.3 4.2 4.1 4.0
+0.3 +0.4 +0.3 +0.3 +0.2 +0.2 +0.1 0.0 +0.2 +0.2 +0.2

N 1.45 1.45 5.6 6.1 6.7 7.3 7.8 8.1 8.2 8.4 8.5
5.3 5.3 5.3 5.3 5.3 5.3 5.3 5.3 5.3 5.3 5.3
5.0 4.9 4.8 4.7 4.6 4.5 4.4 4.3 4.2 4.1 4.0
+0.3 +0.3 +0.3 +0.3 +0.2 +0.2 +0.1 +0.3 +0.3 +0.2 +0.2

4.0
-0.6
-2.1
-0.5

12/24/27

PRIVATE PAVERING
BRANT SPRUCE & THORN

223.12
 805
 231.17
 0.11
 231.06
 14.03
 243.09
 22.03
 231.06
 4.21
 238.27

467
 22650

25.1
 28.00

24.1
 50.0

28.0
 27.0
 4721.3
 5.0

46.5
 66.0

24.1
 77.9

50.6
 26.1

9.0
 8.7

27.9
 53.8

27.9
 88.4

8.00

56.3
 5.54

2.81
 9.26

27.9
 2.74

2.00
 41.04

6.0
 6.24

11.7
 41.7

79.5
 153.0

2.0
 79.6

2.0
 32.0

6.81
 43.6

3.27
 38.0

71.5
 14.0

11.7
 34.6

9.15
 34.6

1.00

8.7
 34.0

7.9
 5.1

7.9
 5.1

5.00

2.82
 2.72

2.0
 1.0

8.7
 1.0

5.7
 7.7

2.0
 6.7

0.9

4.00

39.0
 1.7

3.27
 38.0

4.4
 0.7

4.4
 0.7

31.29
 29.45
 47.40

5.00

6.0
 0.2

3.27
 58.8

2.81
 25.0

2.81
 25.0

2.81
 25.0

0.9

SPRUCE

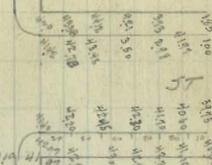
1900	1800	1700	1600	1500	1400	1300	1200	1100	1000	900	800	700	600	500	400	300	200	100	0
3845	3589	3410	3260	3110	2960	2810	2660	2510	2360	2210	2060	1910	1760	1610	1460	1310	1160	1010	860
1' Lower																			
3650	3491	3320	3159	3000	2840	2680	2520	2360	2200	2040	1880	1720	1560	1400	1240	1080	920	760	600
3510	3344	3177	3010	2844	2678	2512	2346	2180	2014	1848	1682	1516	1350	1184	1018	852	686	520	354
3370	3204	3037	2870	2704	2538	2372	2206	2040	1874	1708	1542	1376	1210	1044	878	712	546	380	214
3230	3064	2897	2730	2564	2398	2232	2066	1900	1734	1568	1402	1236	1070	904	738	572	406	240	74
3090	2924	2757	2590	2424	2258	2092	1926	1760	1594	1428	1262	1096	930	764	598	432	266	100	14
2950	2784	2617	2450	2284	2118	1952	1786	1620	1454	1288	1122	956	790	624	458	292	126	48	10
2810	2644	2477	2310	2144	1978	1812	1646	1480	1314	1148	982	816	650	484	318	152	86	20	10
2670	2504	2337	2170	2004	1838	1672	1506	1340	1174	1008	842	676	510	344	178	112	46	10	10
2530	2364	2197	2030	1864	1698	1532	1366	1200	1034	868	702	536	370	204	138	72	6	10	10
2390	2224	2057	1890	1724	1558	1392	1226	1060	894	728	562	396	230	64	10	10	10	10	10
2250	2084	1917	1750	1584	1418	1252	1086	920	754	588	422	256	90	10	10	10	10	10	10
2110	1944	1777	1610	1444	1278	1112	946	780	614	448	282	116	10	10	10	10	10	10	10
1970	1804	1637	1470	1304	1138	972	806	640	474	308	142	10	10	10	10	10	10	10	10
1830	1664	1497	1330	1164	998	832	666	500	334	168	10	10	10	10	10	10	10	10	10
1690	1524	1357	1190	1024	858	692	526	360	194	10	10	10	10	10	10	10	10	10	10
1550	1384	1217	1050	884	718	552	386	220	10	10	10	10	10	10	10	10	10	10	10
1410	1244	1077	910	744	578	412	246	10	10	10	10	10	10	10	10	10	10	10	10
1270	1104	937	770	604	438	272	10	10	10	10	10	10	10	10	10	10	10	10	10
1130	964	797	630	464	298	10	10	10	10	10	10	10	10	10	10	10	10	10	10
990	824	657	490	324	158	10	10	10	10	10	10	10	10	10	10	10	10	10	10
850	684	517	350	184	68	10	10	10	10	10	10	10	10	10	10	10	10	10	10
710	544	377	210	44	18	10	10	10	10	10	10	10	10	10	10	10	10	10	10
570	404	237	70	10	0	10	10	10	10	10	10	10	10	10	10	10	10	10	10

BRANT

8

THORN

5T



3845	3589	3410	3260	3110	2960	2810	2660	2510	2360	2210	2060	1910	1760	1610	1460	1310	1160	1010	860
3650	3491	3320	3159	3000	2840	2680	2520	2360	2200	2040	1880	1720	1560	1400	1240	1080	920	760	600
3510	3344	3177	3010	2844	2678	2512	2346	2180	2014	1848	1682	1516	1350	1184	1018	852	686	520	354
3370	3204	3037	2870	2704	2538	2372	2206	2040	1874	1708	1542	1376	1210	1044	878	712	546	380	214
3230	3064	2897	2730	2564	2398	2232	2066	1900	1734	1568	1402	1236	1070	904	738	572	406	240	74

EC

EC

5T

3740
 511
 4229

557
 25.0
 25.0

GRADES ON FILL
North of OLD TOWN BRIDGE

see plan 16/2L

30' Roadway

Grade

0+00 = Intersection of Δ of present paving + New Fill

00 13.80

50 13.68

100 13.56

150 13.44

171.19 edge of present paving 13.4

200 13.31

250 13.14

300 12.98

350 12.81

400 12.65

450 12.48

500 12.30

15' from Δ 15' .8' lower than Δ

W

Total slope

13.4
3.07
15.67
9.79
3.88
5.22
9.10

-3.4
20.1

-1.4
17.1

-2.6
18.9

-10.0
30.0

-9.6
29.4

-9.0
28.5

-9.8
29.7

-8.9
28.4

-8.1
27.2

-7.1
25.7

15.0
5.10
10.10
5.10
15.20

Total slope

00

00

00

-1.10

-6.7

-8.7

-9.0

-8.4

-9.2

-8.9

10.8
16.2

3.7
20.6

5.9
23.9

9.4
26.1

9.0
27.0

E

9

550	12.16
595 break	12.0
6+50	12.0
6+70 break	12.0
+95 break	12.2
7+20 break	12.8
+50	13.75
8	15.34
+50	16.93
+95 break	18.36
9+15 break	18.22
+35 break	19.0
+45.35 E. Bridge	19.0

2.10 AD

West
Toc ex slope

$$\frac{-6.7}{25.1}$$

-8.5

$$\frac{-7.1}{25.7}$$

-8.3

$$\frac{-7.8}{26.7}$$

-8.3

$$\frac{-9.2}{28.9}$$

-8.1

$$\frac{-11.8}{32.7}$$

-8.5

-12.6

East

Toc ex slope

$$\frac{-8.5}{27.8}$$

$$\frac{-7.5}{26.3}$$

$$\frac{-6.9}{25.4}$$

$$\frac{-5.1}{22.7}$$

$$\frac{-6.9}{25.4}$$

$$\frac{-7.8}{26.7}$$

318
411
1192
1272
1731
10

Water pond
here

Continued from page 7
GRADES ON CH33 ST.

	W Edge paving	E Edge Paving
270 = 5L GRAND	1560	15.75
216	14.93	15.09
102	14.26	14.43
508	13.59	13.77
54	12.92	13.11
NL Thomas	12.25	12.45
270 = 5L Thomas	11.60	11.75
216	11.03	11.16
102	10.46	10.55
108	9.89	9.96
54	9.32	9.36
NL Reed	8.75	8.75
270 = 5L Reed	8.25	8.20
216	7.68	7.65

1780
982
3700
1220
1537
179
722

17/33
67

1320
60

11

W	15.50 17 43 -0.6	14.83 23 3.2 -0.9	14.11 30 3.4 -0.4	13.49 37 4.4 -0.4	12.82 43 4.4 -0.1	12.15 50 5.0 -0.0	11.50 57 5.7 +0.0
E	15.65 15 28 -1.3	15.0 4.2 3.0 -0.8	14.33 2.8 3.2 -0.7	13.67 3.4 3.6 -0.1	13.0 4.2 4.1 +0.1	12.35 4.8 4.8 +0.4	11.65 5.5 5.8 -0.4
W	10.13 6.2 6.0 +0.2	10.36 6.8 6.6 +0.2	9.79 7.3 7.0 +0.3	9.22 7.9 7.6 +0.4	8.65 8.4 8.3 +0.4	8.16 8.0 8.7 +0.3	7.65 8.8 9.5 +0.3
E	11.05 6.1 6.6 -0.4	10.45 6.7 6.9 -0.2	9.75 7.3 7.0 +0.3	9.20 7.9 7.8 +0.6	8.65 8.5 7.9 +0.6	8.16 8.0 8.1 -0.1	7.65 8.8 8.7 +0.1

GRASS ST GRADES

W. Edge
paving

E

E. Edge
paving

270 - 51 - Garnet.

26.90

27.05

27.10

216

25.97

26.17

162

25.04

25.24

108

24.11

24.31

54

23.18

23.28

NL. Hornblend

22.25

22.40

22.45

270 - 51 - Hornblend

21.25

21.40

21.45

216

20.32

20.51

162

19.39

19.57

108

18.46

18.63

54

17.53

17.69

NL. GRAND

16.60

16.70

16.75

Q GRAND

16.1

16.25

17.80

12

E	W	
0.51	0.75	0.52
27.11	26.72	27.00
17.80 Max GRAND		
9.22		
27.62		

W	25.87	24.94	24.01	23.08	22.15	21.15
	1.76	2.7	3.6	4.5	5.5	6.5
	0.2	2.8	3.6	4.5	5.1	7.1
	+0.81	-0.1	0.0	0.0	+0.4	-0.6

E	26.07	25.14	24.21	23.28	22.35	21.35
	1.56	2.5	3.4	4.4	5.3	6.3
	0	2.1	2.8	3.9	4.9	6.4
	+0.6	+0.2	-1.4	0.5	+0.4	-0.1

1716 N.S.

W	20.22	19.37	18.36	17.43	16.50	15.0
	7.4	8.5	9.6	10.7	11.1	12
	8.3	9.1	10.3	11.5	12.3	12.8
	-0.9	-0.7	-0.3	-0.3	-1.2	+0.4

E	20.41	19.47	18.53	17.59	16.65	15.15
	7.21	8.10	9.1	10.0	11.0	12.0
	7.1	7.7	8.3	10.4	11.2	12.2
	+0.1	-0.6	-0.2	-0.4	-0.3	+0.8

146
143

Wightman St Grades
Arnold to Villa Terrace

60' wide
10' spw
15' Alley

	NL		SL	
EV Arnold	298.75	✓	297.75	✓
53 E	302.25	-0.2	301.45	+0.2
106 ✓	305.75	-1.8	305.15	-1.1
159 ✓	309.25	-1.7	308.85	-1.3
212 ✓	312.75	+1.2	312.55	0.0
✓65 = Villa Terrace	316.25	✓	316.25	✓

8200 Arnold & Wightman

2/3/55
Moore

13

297.39
11.84
309.28
0.24
308.94
11.64
319.58

N	98.50	302.25	305.75	309.25	312.75	316.0
	10.78	7.03	3.53	0.03	6.83	3.58
		7.27	5.33	1.73	5.63	
		-0.24	-1.80	-1.70	+1.20	

S	97.50	301.45	305.15	308.85	312.55	316.0
	11.78	7.83	4.13	0.43	7.03	3.58
		7.63	5.43	1.73	7.03	
		+0.20	-1.10	-1.30	0.0	

2/18/25

Gregory

GRADES IN ALLEY
BLK B LA JOLLA BEACH.

N.L. 5.L

W. La Jolla Blvd. 69.28 69.33

50' W 66.99 67.32 67.36 67.03

100' W 64.69 65.36 65.39 64.72

150' W 62.40 63.40 63.41 62.48
62.07 62.08

200' W. 60.10 60.10

GRADES ON OLIVETAS Sea Lane to Marine

	W. 28	506		
5L Marine	59.0	59.55	59.80	
52.55	59.17	59.76		
105.0	59.36	59.97		
157.5	59.51	60.18	60.18 60.46	
210.0	59.68	60.39		
262.5	59.86 59.77	60.60		
315.0 = NL Sea Lane	60.28 60.03	60.81	61.06	

4.51 2.66
69.33 7.28

1.26

14

71.86 Mon NE Sea Lane La Jolla

73.14 1.97 71.17	N	66.99 68.5 6.53 1.07	64.69 9.15 3.88 +0.66	62.40 6.12 5.17 +1.00	60.10 8.42 7.31 +1.11
	S	67.03 1.49 0.84 +0.60	64.77 3.50 3.80 +1.00	62.41 4.11 3.11 +2.00	60.10 8.42 7.13 +1.29

64.41
1.51
65.92

62.08
2.33
3.14
2.87
71.00

5.29
4.5

70.51 BR NE Sea Lane La Jolla

0.70
70.21
1.18
60.03
0.24
60.27

60.46
4.81
3.88
0.93
60.40
4.87
4.10
+0.77

69.33 BR NE Sea Lane La Jolla

0.70
70.03
11.18
58.85
5.24
64.09
1.11
70.31
0.77
71.28
10.47
60.81
3.14
64.11

	W	59.25 6.0 6.5 -0.5	59.42 5.85 6.7 -0.9	59.59 5.7 6.7 -1.0	59.76 5.5 5.7 -0.2	59.93 5.3 4.3 +0.4	60.11 5.76 4.10 +1.0
	E		60.01 5.26 4.4 +0.9	60.22 5.0 4.0 +1.0	60.4 4.8 3.7 +1.2	60.6 4.6 3.6 +1.2	60.85 4.40 3.4 +1.0

12.40
59.63
58.93
9.60
71.41
10.40
60.81

572
837
179.55

4/15/25

GRADES ON GENTER ST.

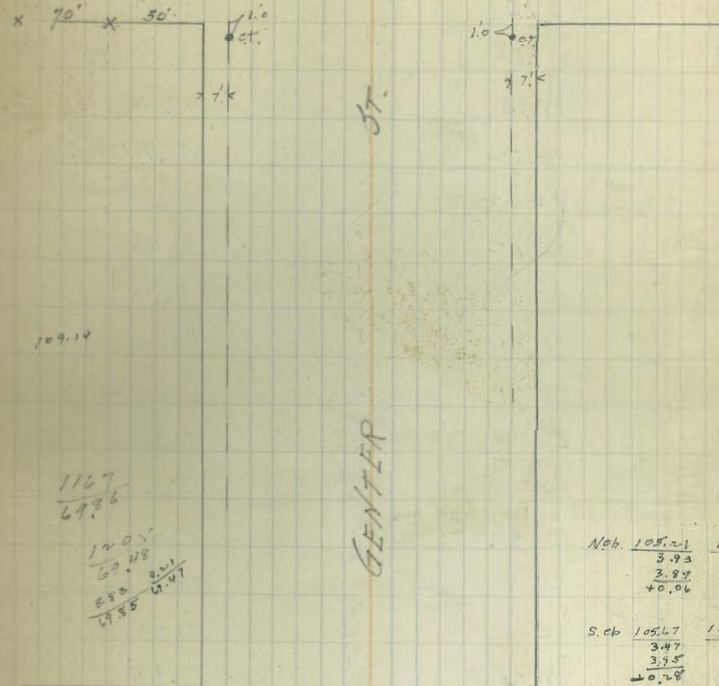
714.10
NW Draper

NL
106.85
105.45
102.66

SL
106.75
105.92
102.96

DRAPER

ST.



600 E	99.86 v	100.00 v
550 E	97.07 v	97.04 v
500 E	94.27 v	94.08 v
450 E	91.48 v	91.12 v
410 E	89.25 v	88.75 v
350	85.90 v	85.20 v
300 E break.	83.10 v	82.24 v
250 E	80.94 v	80.14 v
200 E	78.77 v	78.06 v
150 E	76.60 v	75.98 v
100 E	74.43	73.89 v
50 E	72.27	71.81
El. La Jolla Blvd.	70.10	69.73

Nob.	105.21	106.00
	3.93	3.14
	2.87	3.02
	+0.06	+0.14
S. cb	105.67	104.50
	3.47	2.44
	3.75	2.67
	+0.28	+0.03

LA JOLLA

BLVD

BM 70.81	81.7
	78.68
	1.04
	81.49
	13.26
	77.64
	12.01
	89.75
	0.29
	89.66
	12.33
	103.87
	0.17
	101.72
	2.42
	109.14

N	71	60	43	28	00	104	78	53	25	112	75	67	41	67	31
	730	785	770	787	813	840	866	886	920	950	974	1002	1052	1088	1088
	1881	244	766	788	804	831	859	883	915	943	971	995	1027	1067	1067
	41.6	+1.1	+0.6	-0.1	+0.4	+0.9	+0.7	+0.7	+0.7	+0.7	+0.3	+0.3	+0.1	-0.3	-0.4
S	93	72	54	37	25	12.1	70	47	13	11.1	76	52	27	02	01
	725	715	703	683	670	643	615	587	553	523	493	467	432	398	368
	719	730	742	751	761	771	781	791	801	811	821	831	841	851	861
	+0.1	+0.4	+0.7	+0.9	+1.0	+1.1	+1.2	+1.3	+1.4	+1.5	+1.6	+1.7	+1.8	+1.9	+2.0
Nob.	72.02	74.18	76.35	78.52	80.69	82.85	85.15	87.00	91.23	94.02	96.82	99.75	102.41	104.41	104.41
	1.66	4.80	2.33	0.76	9.26	7.10	4.30	0.95	10.66	7.87	5.07	2.28	2.78	6.73	6.73
	5.83	4.60	2.85	0.45	9.41	7.06	4.87	1.10	10.71	8.00	5.31	2.45	1.62	10.68	10.68
	+0.17	-0.10	-0.14	-0.09	-0.15	+0.04	-0.07	-0.15	-0.05	-0.03	+0.23	-0.17	-0.17	+0.11	+0.11
S	71.56	73.64	75.73	77.91	79.87	81.99	84.35	88.50	90.87	93.23	94.78	99.75	102.71	102.71	102.71
	7.18	5.04	2.95	0.87	10.06	7.96	5.00	1.45	11.02	8.04	5.10	2.14	4.43	4.43	4.43
	7.24	5.11	2.83	1.08	10.12	7.61	4.77	1.63	10.81	8.28	5.07	1.94	4.54	4.54	4.54
	-0.12	-0.07	+0.12	-1.17	-0.05	+0.35	+0.25	-0.18	+0.16	+0.28	+0.03	+0.20	-0.12	-0.12	-0.12

GRADES ON
SEA LANE

	N.L.	S.L.
7+11.7 = WL DRAPER	102.10	102.60
657.5 E	99.56	100.01
600 E	97.03	97.43
550 E	94.82	95.79
500 E	92.62	92.95
450 E	90.42	90.98
400 E	88.22	88.45
350 E	86.01	86.20
300 E	83.81	83.95
250 E	81.60	81.70
200 E	79.40	79.45
150 E	77.20	77.20
100 E	75.00	74.95
50 E	72.80	72.70
E.L. La Jolla Blvd.	70.60	70.45

MAKE PROPERTY LINE. / HOVE CURB TO SET LANE

7186
4045
75908
5295
90.51

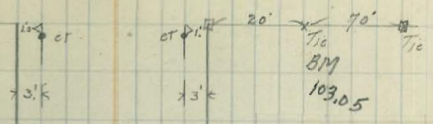
102.60
300
10605

10260
544

16

DRAPER

ST



LANE

SEA

LA JOLLA

BLVD.

7186
1106
8292
1231
7523
133
9390
1105
10295

S	740 1020 85 <u>+1.67</u>	75 74 68 <u>+1</u>	770 67 48 <u>+0.9</u>	795 34 38 <u>+0.1</u>	817 12 16 <u>-0.1</u>	84 11.2 11.6 <u>-0.3</u>	86.20 9.0 9.0 <u>+0.0</u>	88.5 6.7 6.5 <u>+0.2</u>	90.7 4.5 6.3 <u>-1.7</u>
N	7450 1010 90 <u>+1.1</u>	75 79 75 <u>+0.4</u>	770 57 55 <u>+0.2</u>	794 35 36 <u>-0.1</u>	816 13 14 <u>-0.1</u>	838 11.4 11.6 <u>-0.2</u>	860 9.2 9.1 <u>+0.1</u>	88.22 7.0 7.0 <u>+0.0</u>	90.4 4.8 5.1 <u>-3.3</u>
S	930 22 13 <u>+0.9</u>	95.2 9.3 9.2 <u>+0.8</u>	970 7.6 6.9 <u>+0.7</u>	1000 50 48 <u>+0.2</u>	1026 2.4 2.7 <u>+0.2</u>				
N	826 2.03 <u>+1.00</u>	848 10.25 2.8	870 4.95 2.8	895 5.39 2.8	921 2.58 2.8				

Hamilton St
Grades Univ to El Cajon

W line W.C.P. E.C.B. E. line

310.70		5.73
4.05		
314.75	309.20	5.55
1.00		.02
308.75		

Cross Line

Lincoln	324.25	324.12 - offset curb	324.00	324.25	
		324.00	326.00	326.25	
		470.00	474.53	474.53	326.25
+50	-1.4	323.0	4.76	4.94	325.0
			-0.06	-0.41	
5+00	-1.1	321.75	4.79	4.50	323.75
			-0.07	-0.27	
+50	-1.0	320.50	4.70	4.67	320.50
			-0.08	-0.14	
4+00	-0.5	319.25	4.35	4.50	321.25
			-0.25	-0.03	
+50	-0.4	318.0	4.35	4.68	320.0
			-0.25	-0.15	
3+00	-0.6	316.75	4.55	4.42	319.75
			-0.15	+0.11	
+50	-0.6	315.50	4.66	4.57	317.50
			-0.04	-0.04	
2+00	-0.1	314.25	4.66	4.48	316.25
			-0.04	+0.05	
1+50	-0.5	313.0	4.66	4.54	315.0
			-0.04	-0.01	
1+00	-0.4	311.75	4.77	4.04	313.75
			-0.07	+0.45	
+50	-0.1	310.50	4.65	4.29	311.50
			-0.05	+0.24	
005 N.Hinc	309.25	309.0		311.0	311.25
Univ Ave.				310.70 = offset curb	

309.20
off of S. de walk return
of N.W. will have to be 309.20

28.06
12.26
16.10
0.36
12.5

2/25/25
mills

47.0
57
4.7

17

El Cajon

E	325.0	237.5	225	212.5	20
	4.0	5.0	0.5	7.7	9.0
	3.8	5.3	0.4	7.6	8.0
	+0.2	-0.1	+0.1	+0.6	+1.0

W	23.0	217.5	20.5	192.5	18
	6.0	7.2	8.5	9.7	11.0
	7.4	8.3	8.5	10.2	11.2
	-1.4	-1.1	-1.0	-0.5	-0.2

E	187.5	195	160.5	150	137.5	125.0
	102	115	127	1.5	2.7	4.0
	93	103	117	2.7	3.3	3.2
	+0.9	+1.2	+1.0	+0.8	+1.4	+0.8

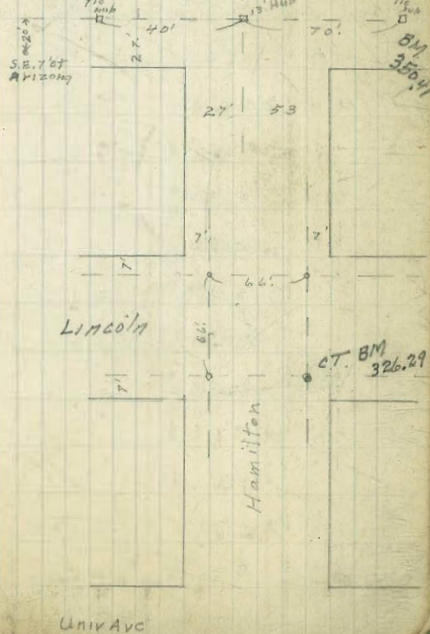
W	16.75	15.50	14.25	13.0	11.75	10.50
	1.9	1.0	2.2	3.5	4.7	6.0
	1.9	1.6	2.9	4.3	5.3	6.1
	-0.6	-0.6	-0.7	-0.8	-0.6	-0.1

W	324.12	326.00
	2.25	0.37
	2.10	0.18
	+0.15	-0.31

326.28
0.08
326.36
12.17
318.75
1.73
315.98

W	309.20	310.70
	6.78	5.28
	7.35	5.24
	-0.57	-0.46

Dolk



M. Hinc W. Ch. E. db E. Hinc

5320
1292
4020
087
2109
1511
2538
053
2896

279 40' Tie hub @ Polk. E of Hart.
504

18

E	4376 94 52 +4.2	4217 110 69 +4.1	4060 126 81 +4.5	3902 142 95 +4.7	3745 159 141 +4.6	3587 52 16 +3.2	3430 68 39 +2.9	3273 836 79 +2.3	3115 99 32 +1.9
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W	4425 109 124 -1.5	4007 64 03 +0.1	3910 20 37 -0.7	3745 36 37 -1.0	3585 51 58 -0.7	3437 67 16 -0.9	3280 83 39 -0.5	3123 99 109 -1.0	2965 114 124 -1.0
---	----------------------------	--------------------------	--------------------------	--------------------------	--------------------------	--------------------------	--------------------------	---------------------------	----------------------------

E	2925 118 101 +1.7	2867 124 114 +1.0	2796 131 121 0.0	2725
---	----------------------------	----------------------------	---------------------------	------

W	2775 133 125 -0.2	2703 119 124 -0.5	2614 28 37 -0.9	2525
---	----------------------------	----------------------------	--------------------------	------

32135
1292
34289
087
2109
1511
2538
053
2896

SW	NE	NW	SE	SE	NE	EW
312.0	0.49	303.0	43.50	397	44.50	2.99
549	5.55	279	397	397	2.99	3.13
555	0.06	420	461	397	2.91	-0.14
-0.06		4027	-0.02	4067	40.08	

N.L. Lincoln = W.C.6
325.10
6.34
6.64
-2.28

F.C.6
327.0
11.1
11.1
-11.8

Bush 140 N of N.L. Lincoln
W.
E
327.50
4.04
3.97
40.12

327.0
2.51
3.60
-0.06

6400 S line

Polk	-1.5	342.25	342.0	343.5	343.75	+1.2
+50	+0.1	340.67	+0.05	-0.17	342.17	+4.1
+100	-0.7	339.10	+0.17	+0.19	340.60	+4.5
+150	-1.0	337.52	+0.22	-0.02	339.02	+4.7
+200	-0.9	335.95	+0.11	-0.22	337.45	+4.6
+250	-0.9	334.37	+0.23	-0.15	335.87	+3.6
+300	-0.5	332.80	+0.05	-0.25	334.30	+2.9
+350	-1.0	331.23	-0.21	-0.15	332.73	+2.3
+400	-1.0	329.65	+0.11	-0.34	331.15	+1.9
+450	-0.2	327.75	+0.14	-0.31	329.55	+1.7
+500	-0.5	327.03	-0.28	-0.08	328.67	+1.0
+550	-0.4	326.14	-0.37	-0.94	327.16	0.0
Lincoln		325.25	325.0	327.0	327.25	

00 = N. Hinc

325.0
325.20 =
OK for ed.

327.0
OK for ed.

7364 N.D.
 1058
 63.06
 1.00
 6428
 1296
 5132
 133
 5320

E	6175	6033	5892	5751	561	5462	5324	5184	5042
	119	39	54	48	22	26	110	124	139
	25	23	16	35	42	59	65	38	26
	+34	+3.4	+3.3	+3.3	+3.4	+3.7	+4.5	+3.9	+4.3

W	6025	5883	5742	5601	546	5318	5176	5034	4892
	40	54	69	83	97	111	124	139	153
	46	58	71	85	98	111	124	138	152
	-0.6	-0.4	-1.2	-1.2	-1.4	-0.8	-1.7	-0.9	-0.7

E	49.00	47.58	46.17	44.75
	15.3	14.7	13.1	8.4
	2.9	1.6	1.3	3.2
	+5.4	+5.1	+4.9	+5.2

W	4750	4608	4467	4325
	57	71	86	99
	56	71	86	100
	+0.1	-1.0	-0.4	-0.3

3615
 357
 365.14

SW Return	W.L.	SE Return	EL
5.4		3.6	361.50
5.4	360.0	4.5	361.50
0.0	3.4		3.2
	4.5		3.2
	10.60		+0.20

6+00 ss. Lino						
Howard	06 360.25	360.0	361.5	361.75	+3.4	
		Red 5.4				
+50	04 358.83	-0.07	-0.32	360.33	+3.6	
5+00	01 357.42	-0.21	+0.03	358.92	+3.8	
+50	01 356.01	-0.08	+0.13	357.51	+3.3	
4+00	01 354.60	0.0	-0.38	356.10	+3.4	
+50	08 353.18	+0.22	-0.12	354.68	+3.1	
3+00	07 351.76	-0.02	-0.72	353.26	+4.5	
+50	09 350.34	+0.06	-0.48	351.84	+3.9	
2+00	01 348.92	+0.20	-0.07	350.42	+4.3	
+50	01 347.50	-0.06	+0.36	349.00	+5.4	
1+00	01 346.08	0.0	+0.36	347.58	+5.1	
+50	04 344.67	+0.20	+0.21	346.17	+4.9	
00-N.H.W.						
Boik	03 343.25	343.0	344.5	344.75	+5.4	

36835 NE El Cajon & Hamilton
529
37364

E	36875 4.8 2.2 +2.4	6915 4.5 2.9 +1.6	6875 4.0 2.9 +0.0	6775 5.7 2.1 +0.8	6647 7.2 5.2 +2.0	6486 8.8 6.1 +2.7	6325 10.4 6.1 +4.3
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W	6725 6.4 5.3 +1.1	6765 6.0 5.1 +0.9	6725 6.4 6.5 -0.1	6625 7.4 5.8 -0.9	6496 7.7 8.2 +0.5	6336 10.3 8.6 +1.7	6175 11.9 10.3 +1.6
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SE.
368.35 5.34 6.82
4.41 3.72 3.65 3.94
372.76

E	368.5 4.20 4.43 -0.17	368.9 3.90 3.98 -0.14	368.56 4.20 4.29 -0.09	368.79 3.97 4.07 -0.10	368.45 4.31 4.06 +0.25	368.14 5.62 4.70 -0.98	367.5 5.26 5.43 -0.17
---	--------------------------------	--------------------------------	---------------------------------	---------------------------------	---------------------------------	---------------------------------	--------------------------------

W	367.0 5.76 5.56 +0.20	367.4 5.34 5.27 +0.07	367.04 5.70 5.38 +0.37	367.29 5.47 5.44	366.95 5.81 5.74 +0.07	366.64 6.12 5.97 +0.15	366.00 6.76 6.83 -0.07
---	--------------------------------	--------------------------------	---------------------------------	------------------------	---------------------------------	---------------------------------	---------------------------------

E	366.22 6.54 6.67 -0.13	364.61 8.15 8.26 -0.11	363.00 9.16 9.42 +0.34	363.1 9.56 9.97 -0.31	363.25 9.51
---	---------------------------------	---------------------------------	---------------------------------	--------------------------------	----------------

W	364.71 9.05 7.97 +0.08	363.11 8.65 9.82 +0.13	361.5 11.26 11.19 +0.07	361.3 11.46 10.94 +0.52	361.75 11.01 9.44 on stub +1.6 on K
---	---------------------------------	---------------------------------	----------------------------------	----------------------------------	--

3+87.55 = 5.490

El. Cajon		368.05	365.8	367.4	367.65	
BRK 2+90	+1.1	367.25	367.0	368.5	368.75	+2.1
BRK 2+40	+0.9	367.65	367.4	368.9	369.15	+1.6
BRK 1+90	-0.1	367.25	367.0	368.5	368.75	+2.0
BRK 1+40	-0.9	366.25	366.0	367.5	367.75	+0.8
	+0.6	364.96		366.17		+2.0
	+5.0	363.36		364.86		+2.1
Howard	+1.6	361.75	361.5	363.0	363.25	+4.3

Regrade. Monroe St

W. L. Utah	N. Co	S. Co
	371.0	370.40
50' W	371.19	370.64
100' W	371.39	370.89
150' W	371.58	371.13
200' W	371.77	371.38
225' W	371.87	371.50

375.94 S.E. Idaho - Monroe.
 $\frac{1.24}{377.18}$

	N	372.13	372.02	371.83	371.64	371.44
		5.05	5.2	5.5	5.5	5.7
		4.65	6.3	6.1	6.2	6.2
		40.40	-1.1	-1.1	-0.9	-0.5
	S	371.75	371.63	371.38	371.14	370.89
		5.4	5.8	5.8	6.0	6.3
		5.8	6.7	7.6	7.2	7.7
		-0.4	-1.2	-1.8	-1.2	-1.6

GRADES ON
TENNYSON ST.
from Willow to W.L. of Roseville

	5.06	166.
W.L. Willow	194.20	194.20
25' W	193.80	193.80
50' W	193.17	193.33
100' ✓ Break	191.33	191.67
150' W	186.5	187.0
200' ✓	181.67	172.33
250' ✓	176.83	177.67
275	174.42	175.33
300' ✓ = E.L. Plum	172.0	173.0
W.L. Plum	171.0	172.0
48.1 W	169.20	170.12
96.2' ✓	167.40	168.25
144.3' ✓	165.60	166.37
192.4' ✓ = W.L. Roseville	163.80 on curb 163.5 = Established	164.5

161.0 = Est.
161.17 = 66

161.17
161.97 = cb.

161.58
10.21
171.79
5.01
166.78
12.83
179.66
11.77
167.89
7.24
175.13
10.07

WILLOW

Mon 4

57

S	165.85	167.65	169.10	170.25	170.40	170.6	171.22	171.75	172.58	173.20	173.80	174.40
	4.9	1.8	1.5	1.1	0.1	0.1	0.6	0.5	0.6	0.6	0.6	0.6
	-2.4	-3.1	-2.3	-2.9	-1.7	-2.4	-2.5	-0.9	1.0	+2.4	+2.4	+2.4
N	166.62	168.50	170.25	172.00	173.25	174.0	174.58	175.28	176.00	176.80	177.60	178.40
	8.8	2.4	5.2	3.3	1.5	0.4	0.6	0.7	0.8	0.8	0.8	0.8
	-1.1	-0.8	+0.1	+0.5	+0.3	+0.5	+0.3	+0.0	+0.4	+0.4	+0.4	+0.4

PLUM
30' SW Willow + Tennyson

Tic x 40' Tic x 40'

155.51
17.50
173.01
2.48
175.49

193.95
3.60
197.55
12.44
184.66
0.35
185.51

	W.L.	304	370	Roseville
S	193.80	193.17	191.33	186.5
	3.75	4.22	2.22	11.05
				19.35
				41.5
V	193.80	193.33	191.67	187.0
	3.75	4.22	5.88	10.55
S	171.00	169.20	167.40	165.60
	4.42	6.22	8.02	9.82
N	172.00	170.12	168.25	166.37
	3.42	5.30	7.17	9.05
				9.55
				-0.50

Alley BK 15 Mission Hills

Grades for Paving

	S Line	N. Line
00 = Elm St James	272.20	272.31
0+50 ✓	273.10	273.15
BK 1+00 ✓	274.00	274.00
1+40 ✓	275.29	275.15
BK 1+80 ✓	276.58	276.29
BK 2+00 ✓	277.03	276.70
" 2+20 ✓	277.10	276.77
" 2+40 ✓	276.80	276.59
" 2+60 ✓	276.15	275.90
" 2+80 ✓	275.04	274.86
" 3+00 ✓	273.63	273.68
1+3+20 ✓	272.00	272.25
3+70 ✓	269.58	269.78
BK 4+20 ✓	267.16	267.31
" 4+40 ✓	266.40	266.65
" 4+60 ✓	266.03	266.28
5+00 ✓	265.81	266.06
5+40 ✓	265.59	265.84
BK 5+80 ✓	265.37	265.62
" 6+00	264.88	265.14
" 6+20	264.24	264.37
641.90 N = 646.2 S = White Sheridan	262.90	263.14

changed
changed

252.02 B.M. B.P. S.W. St James & Lyndon

58400-53 268.88 9.12 277.70 5.94 3.39 272.31 7.55 279.70 3.76 276.33 1.22 277.55 10.90 266.65 3.74 270.39 4.83 265.51 4.22 270.43	N	272.31	273.15 6.94 5.94 +1.0	274.00 6.09 5.04 +1.0	275.15 4.24 3.24 +1.00	276.29 3.80 3.80 0.0	276.70 3.39 2.39 +1.0
276.33 1.22 277.55 10.90 266.65 3.74 270.39 4.83 265.51 4.22 270.43	S	272.19	273.10 6.94 5.4 +0.15	274.00 6.09 5.34 +0.56	275.29 4.30 3.80 +1.00	276.58 3.51 2.23 +0.58	277.03 3.06 2.32 +0.28
276.33 1.22 277.55 10.90 266.65 3.74 270.39 4.83 265.51 4.22 270.43	N	276.77	276.50 3.32 2.32 +1.0	275.90 1.65 0.34 +1.31	274.86 2.69 1.69 +1.0	273.68 3.87 2.87 +1.0	272.25 5.30 4.30 +1.0
276.33 1.22 277.55 10.90 266.65 3.74 270.39 4.83 265.51 4.22 270.43	S	272.10	276.80 3.29 2.29 +1.0	276.15 1.40 59 +0.81	275.08 2.47 2.16 +0.31	273.63 3.92 4.31 -0.37	272.00 5.55 5.62 -0.07
276.33 1.22 277.55 10.90 266.65 3.74 270.39 4.83 265.51 4.22 270.43	N	269.78	267.31 7.77 6.77 +1.0	266.65 10.24 9.24 +1.0	266.28 11.27 9.27 +2.0	266.06 4.43 2.43 +2.00	265.84 4.65 2.65 +2.0
276.33 1.22 277.55 10.90 266.65 3.74 270.39 4.83 265.51 4.22 270.43	S	269.55	267.16 7.97 6.97 +1.0	266.40 11.15 11.15 0.0	266.03 11.57 12.39 -0.87	265.51 4.68 4.68 0.0	265.59 4.90 3.90 +1.0
276.33 1.22 277.55 10.90 266.65 3.74 270.39 4.83 265.51 4.22 270.43	N	265.62	265.14 7.87 6.73 +1.14	264.37 6.29 4.99 +1.30	263.14 6.06 3.10 +2.96		
276.33 1.22 277.55 10.90 266.65 3.74 270.39 4.83 265.51 4.22 270.43	S	265.37	264.88 5.06 5.02 +1.004	264.24 5.55 5.05 +1.50	262.90 6.19 5.4 +0.78		

GRADES ALLEY
BLK 16 MISSION HILLS

Distances are on d'

	S		N
El. St. James: 00	260.71	260.81	261.59
+ 40 break.	261.28	261.4	261.53
+ 84.55 PC. 32 09	261.48		261.73
1 + 17.64	261.62		261.87
1 + 50.73	261.77		262.02
1 + 83.82	261.91		262.16
2 + 16.91	262.06		262.30
2 + 50 break	262.20		262.45
2 + 81.25	262.47		263.04
3 + 12.50	263.35		263.63
3 + 43.75	263.92		264.21
3 + 75 break	264.5		264.80
3 + 95 ✓	264.1		264.40
4 + 05 ✓	261.50		261.80
4 + 33 = Lyndon			

258.02 SW. St James - Lyndon

258.02								
10.57								
262.59								
1.71	S	261.25	261.48	261.62	261.77	261.91	262.06	262.20
260.88		3.97	3.79	3.65	3.50	3.28	3.08	2.94
4.34		3.19	4.77	4.32	3.44	4.23	4.02	3.94
265.27		00	-0.93	-0.70	+0.06	+1.0	+1.0	+1.0
3.44								
261.83	N	261.83	261.73	261.87	262.07	262.16	262.30	262.45
5.31		3.74	3.54	3.40	3.12	4.98	4.84	4.69
267.14		3.00	3.04	3.62	4.33	3.74	3.11	4.01
4.40		+0.74	-0.50	-0.22	+0.74	1.19	+1.29	1.06
262.74								
5.11	S	262.77	263.35	263.92	264.5	264.1	261.50	
267.85		5.08	4.50	3.93	3.35	3.75	6.35	
		5.08	4.75	4.47	3.30	3.26	3.20	
		00	-0.25	-0.54	+0.05	+0.49	+2.39	
	N	263.04	263.62	264.21	264.80	264.40	261.80	
		4.81	4.22	3.44	3.05	3.45	6.05	
		3.91	3.05	1.51	1.80	1.92	3.09	
		+1.0	1.17	+1.79	+1.15	+1.53	+2.96	

Pringle St Paving

Pringle St Grades Washington to Portola

S/N/E Pringle & Portola

260.18
7.41
269.59

N 260.00	265.58	65.14	64.70	64.27	63.83
3.59	4.01	4.15	4.89	5.32	5.76
3.93	4.10	0.0	5.07	5.26	5.55
-0.34	-0.09		-0.18	7.086	7.021

S 266.00	65.50	65.00	64.50	64.00	63.50
0.0	0.0	0.0	0.0	0.0	0.0

N 63.39	62.95	62.51	62.08	61.65	61.22
6.20	6.24	7.08	7.51	7.96	8.40
0.0	0.0	7.06	7.37	7.61	8.00
		7.00	7.11	7.05	6.50

S 63.00	62.50	62.00	61.50	61.00	60.50
6.59	7.07	7.54	8.09	8.59	9.07
6.90	7.00	7.95	8.33	8.71	9.44
0.31	0.0	-0.36	-0.24	-0.17	-0.34

N 60.75	60.31	59.88	59.44	59.00	58.50
8.84	9.28	9.71	10.15	10.59	11.04
9.74	9.15	9.77	10.23	10.87	11.79
-0.10	-0.13	-0.04	-0.08	-0.30	-0.1

S 60.00	59.50	59.00	58.50	58.00	57.50
9.59	10.09	10.39	11.09	11.59	11.71
7.82	10.63	10.74	10.73	11.59	11.73
-0.23	7.0.06	7.0.25	7.0.36	0.0	-0.02

S 57.75	57.63	57.50			
11.84	11.96	12.07			
11.65	11.47	11.99			
7.0.17	7.0.27	7.0.10			

N.W. Pringle Pk W

260.18
10.00
270.18
4.59
265.59
3.10
268.73

Portola Grades

W 262.15	265.20	66.0	66.40	66.38	66.30	66.10
5.95	2.90	2.10	2.70			
6.73	3.03	1.97				
-0.29	-0.13	7.0.23				

E 261.55	264.60	65.50	66.00	65.77	65.70	65.75
6.59	3.50	2.60	2.19	2.13	2.20	2.32
6.95	3.74	2.99	2.08	1.92	6.0	0.0
-0.40	-0.24	-0.34	7.0.02	7.0.21		

W 265.05	64.49	63.94	63.39	62.83	62.20	61.50
3.05	3.61	4.16	4.72	5.27	5.90	6.54
0.0	3.76	4.60	5.0	5.30	5.88	6.32
	-0.15	-0.44	-0.48	-0.03	7.0.02	7.0.02

W 260.93	260.30					
7.17	7.80					
7.13						
7.0.07						

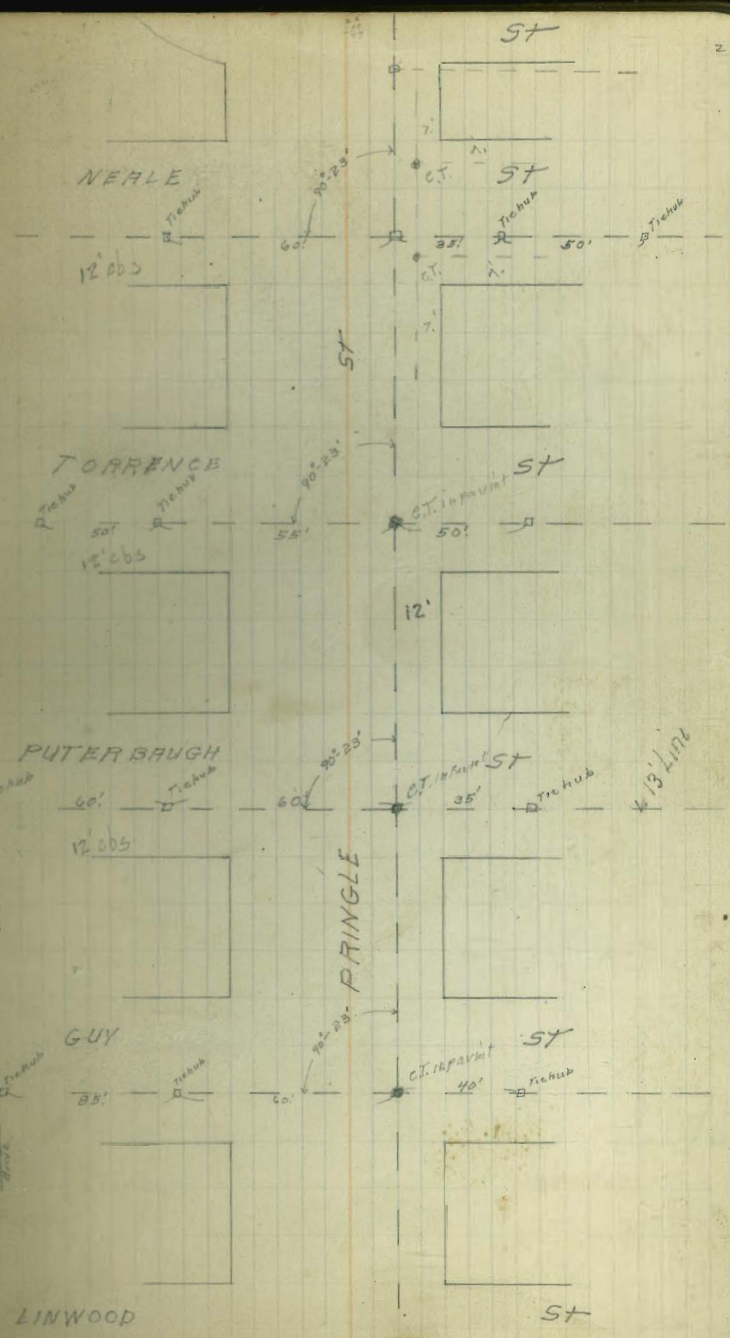
266.00
7.80
273.80
7.88
281.68

266.00	260.00	260.27	260.36	261.05	61.25	61.44	61.63
7.80	8.10	7.43	7.24	7.05	6.95	6.66	6.47
7.88	8.17	0.0	6.72	6.81	6.98	6.73	6.30
-0.08	-0.07		-0.44	-0.24	-0.02	-0.20	7.0.17

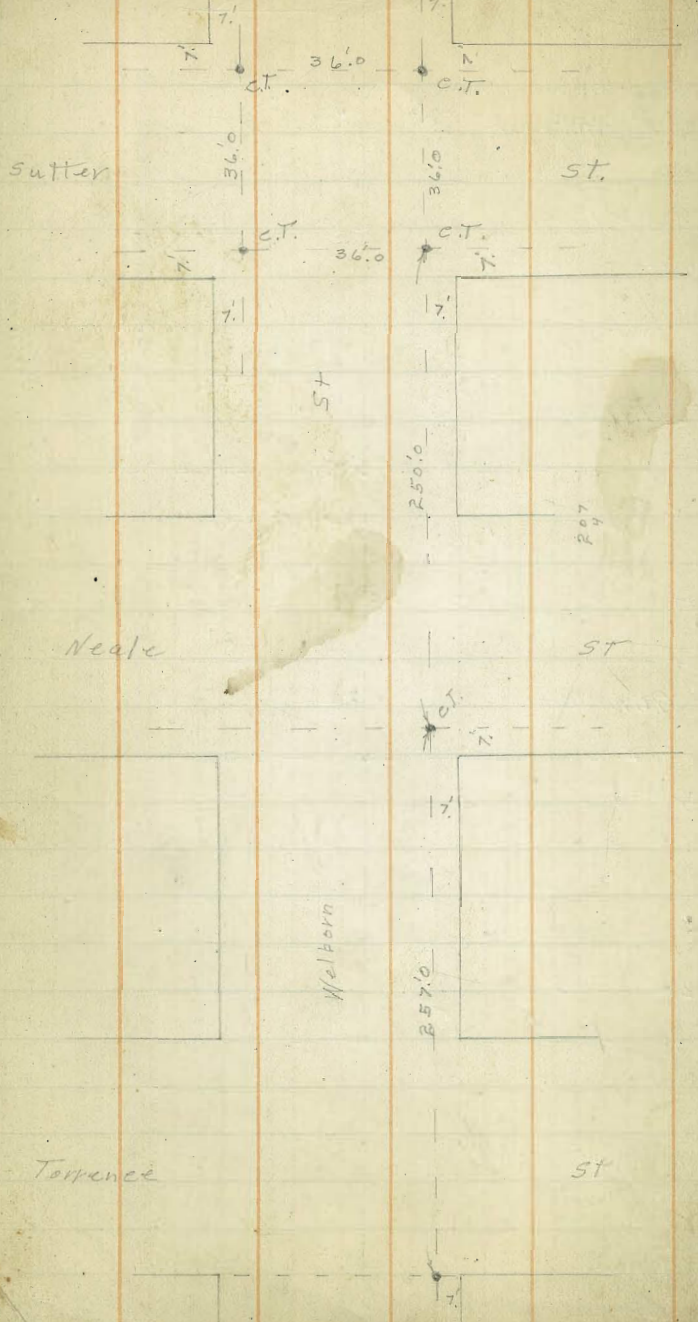
Washington Grades

65.43
4.77
70.20

65.43	65.26	65.10			
4.77	4.53	4.47			
4.77	4.53	4.47			
0.0	0.0	0.0			

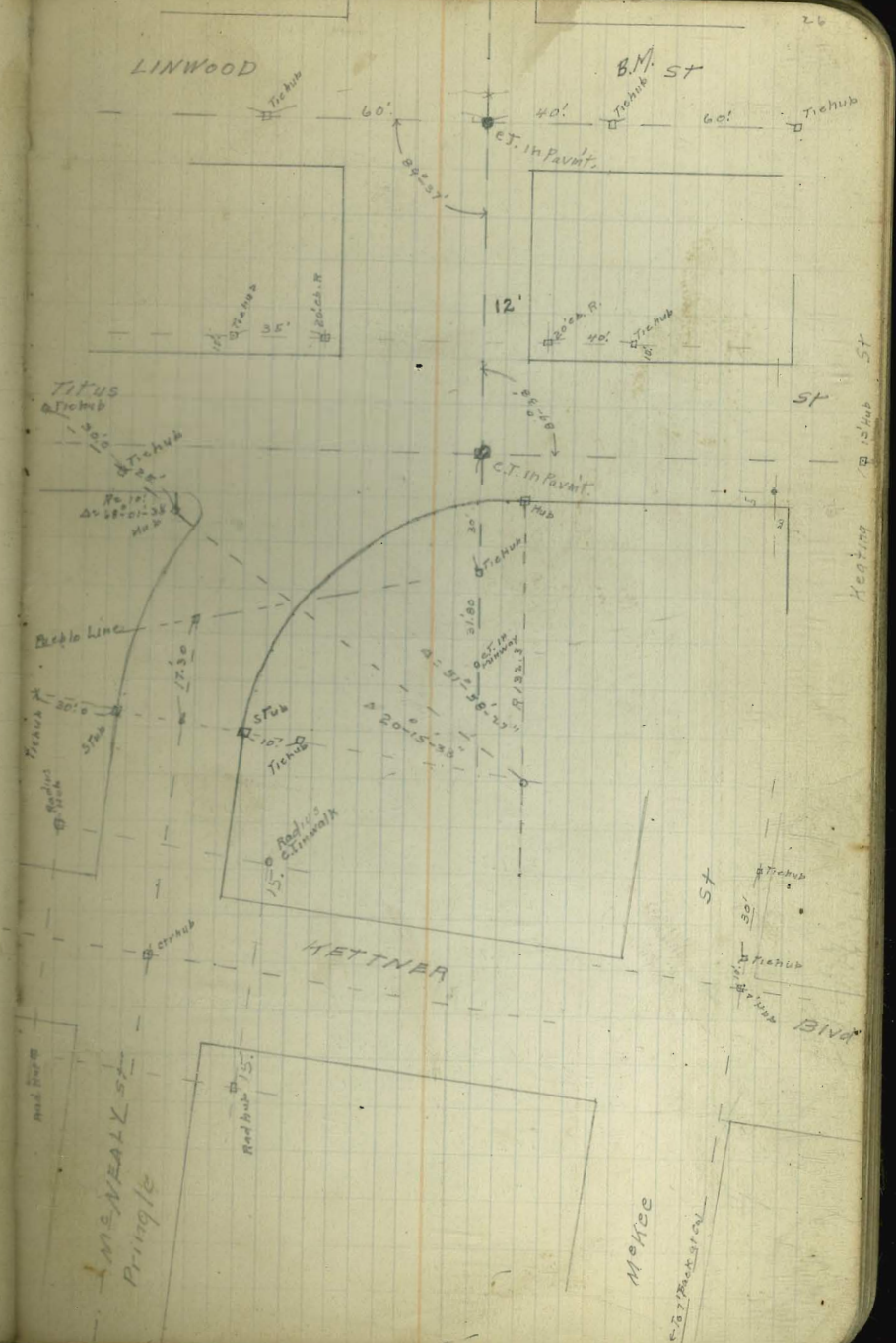


Malbone St Tie Points



LINWOOD

B.M. ST



W Line	N Line	N. Ch.	S. Ch.	S. Line
W Line				
W Line	163.25	00	+0.98	164.25
+50	155.75	-0.10	-0.12	156.75
100	148.25	-0.04	-0.48	149.25
+50	140.75	+0.12	+0.02	141.75
E Line + 90	134.75			135.75
T 745 = 2200	133.25	-0.17	-0.06	134.25
		S Line		N Line
W Line Kettner	95.25			96.25
E Line Kettner	97.25			98.25
E End R Curve	101.25			102.25
W End Curve	110.05			110.45
220' B' 82'	117.25			118.25
BxK	129.25			
EE S Line Pringle	181.25			
N.E. End Curve				122.45
E.L. Kettner				
W.L. Kettner	95.25	+0.09	+0.39	94.25
0+15 = E.G.	131.2	+0.02	+0.17	92.12
0+60.5	86.61	+0.12	+0.57	85.61
+060	80.11	+0.30	+0.15	79.11
1+51.5	73.61	-0.26	+0.11	72.61
1+97 = P.C.	67.11	-0.41	+0.04	66.11
2410	65.25	+0.62	+1.06	64.25
E.L. California				

W Line	N Line	N. Ch.	S. Ch.	S. Line
W Line				
W Line	163.25	00	+0.98	164.25
+50	155.75	-0.10	-0.12	156.75
100	148.25	-0.04	-0.48	149.25
+50	140.75	+0.12	+0.02	141.75
E Line + 90	134.75			135.75
T 745 = 2200	133.25	-0.17	-0.06	134.25
		S Line		N Line
W Line Kettner	95.25			96.25
E Line Kettner	97.25			98.25
E End R Curve	101.25			102.25
W End Curve	110.05			110.45
220' B' 82'	117.25			118.25
BxK	129.25			
EE S Line Pringle	181.25			
N.E. End Curve				122.45
E.L. Kettner				
W.L. Kettner	95.25	+0.09	+0.39	94.25
0+15 = E.G.	131.2	+0.02	+0.17	92.12
0+60.5	86.61	+0.12	+0.57	85.61
+060	80.11	+0.30	+0.15	79.11
1+51.5	73.61	-0.26	+0.11	72.61
1+97 = P.C.	67.11	-0.41	+0.04	66.11
2410	65.25	+0.62	+1.06	64.25
E.L. California				

This is the original

TITUS 5T
GRADES

	W.L.	E.L.
5.L. Pringle	131.25	133.25
+10 = EC on E		35
		133.45
+50	132.26	134.25
1 break	133.25	135.25
+50	133.0	135.0
2 BRK	132.75	134.75
+45	132.97	134.07
3 = NL Keating	131.25	133.25

	W	150	100 BRK	150	200
135.92	131.00	132.00	133.00	132.75	132.50
	3.92	2.92	3.17	3.42	
	3.77	3.25	2.70	3.22	
	30.15	-0.33	+0.47	+0.20	

	EC	134.00	135.00	134.75	134.50
133.10	2.82	1.92	0.92	1.17	1.42
	3.57	2.36	1.18	1.43	1.90
	-0.77	-0.44	-0.26	-0.26	-0.48

	W	245	131.00	132.25
131.88	4.04	4.92	5.67	
	3.81	4.57	4.5	
	+0.23	+0.35	-0.8	

	E	133.88	133.00
	2.04	2.92	
	2.141	2.27	
	-0.57	+0.65	

138.70

4.53

143.23

151.33

140.94

E

	57	37	33	30	42	46	58
137.5	137.5	139.5	139.7	140.2	139.0	138.6	138.4
46	29	1.2	2.4	3.6	4.2	5.1	
138.6	144.3	142.0	140.8	139.6	139.0	138.7	
33.5	34.3	35.3	35.0	34.8	34.1	33.2	
+5.1	+6.0	+6.7	+5.8	+4.8	+4.9	4.8	

W

	12.3	9.5	8.9	8.9	9.5	10.0	10.9
28.6	131.4	132.0	132.0	132.0	131.4	130.9	130.0
31.3	32.3	33.3	33.8	33.8	32.1	31.2	
-2.7	-1.7	-1.3	-1.0	-1.4	-1.2	-1.3	

	11.7	10	8.0	8	7.7	9.0	9.4
12.7	131.7	132.7	132.7	132.7	132.7	131.9	131.0

65.12 SP. P. H. & K. L. H. H. V.

	10.76	10.80	12.08	NE	E
75.88	65.04	63.05	63.05	90.00	90.00
0.36	SE	McK	McK	8.67	8.67
75.52	89.10	88.90	88.90	8.67	7.10
12.72	9.57	9.77	9.77	8.60	7.10
89.24	4.02	4.66	4.66	9.10	9.77
0.41	+1.25	70.11	70.11	9.36	9.36
87.48	5 SW	88.0	88.0	+0.21	.16
11.24	10.67	10.67	10.67		
98.67	11.25	11.25	11.25		
	-0.58	-0.47	-0.47		

McNally

	W	E
75.24	95.00	97.00
3.40	3.67	1.67
5.1	2.74	0.73
-1.7 dhk	+0.93	+0.94

Kettner

	P. H. & K. L. H. V.	E	W	W
51.76	-0.04	+0.31	+0.31	
"	-0.31	-0.20		
"	+0.36	+0.32		
"	+0.41	-0.31		
"	+0.36	+0.05		
S McKee	+0.11	-0.58		
"	+0.60			
51.67	+0.44	-0.07		
"	+0.57	+0.19		
"	+0.57	0.0		
"	+0.57	+0.61		
"	+0.30	+0.93		
"	+0.44	+0.93		

4/24/05
 GRADES ON
 SANTA MONICA
 N.C.B. 5.66
 47.0 47.0

600' E = W.L. EBERS

550' E 44.67 44.67

500' E 42.33 42.33

450' E 40.0 40.0

400' E 37.67 37.67

350' E 35.33 35.33

300' E Brick 33.0 33.0

250' E 31.58 31.58

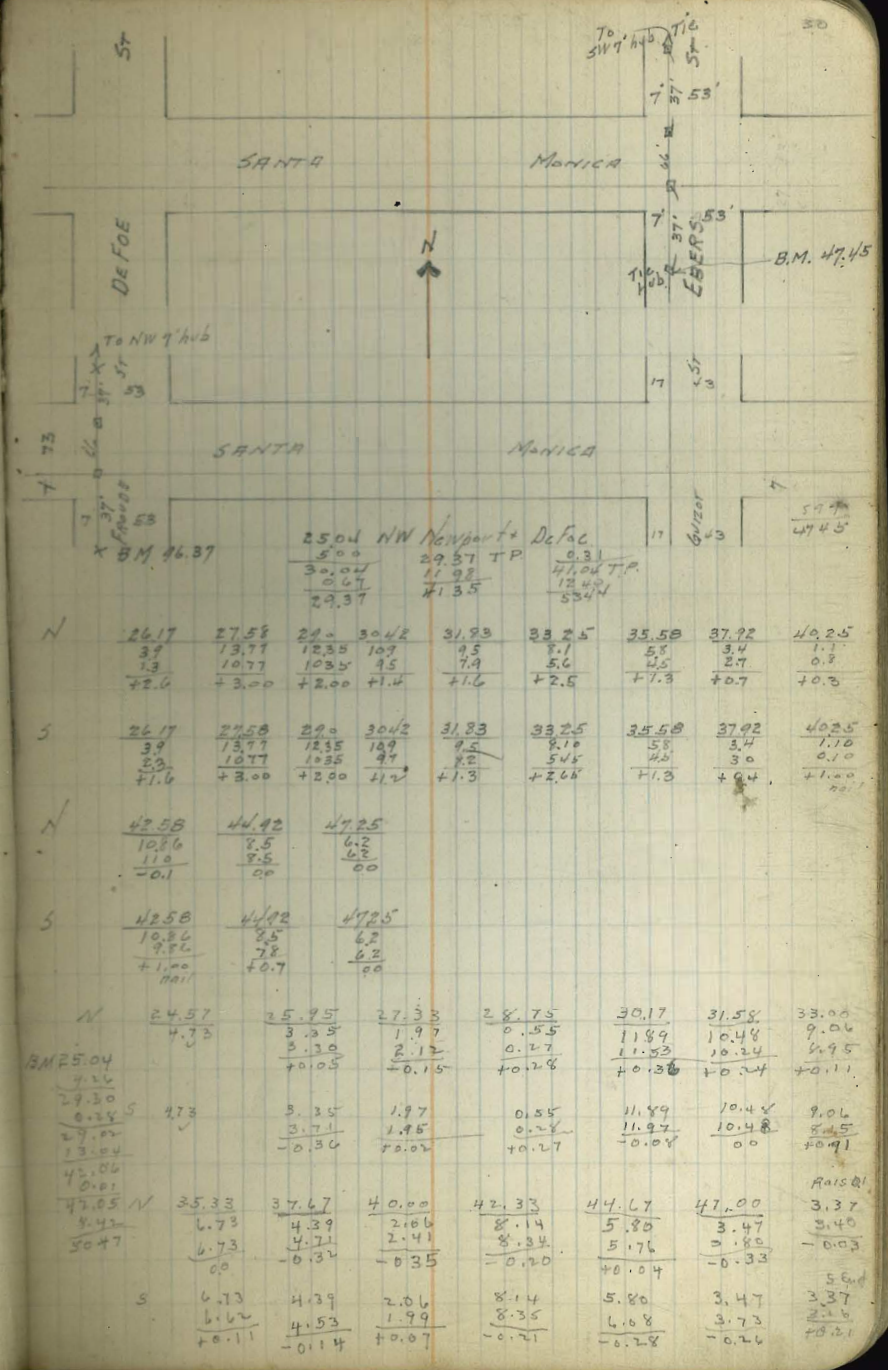
200' E 30.17 30.17

150' E 28.75 28.75

100' E 27.33 27.33

50' E 25.92 25.92

EL. DEFOE 24.5 24.5
 cb. 0.1 high cb. 0.1 high



Santa Monica Continued

N. Cb.		S. Cb.
600' E = W. Fronds	95.0	96.0
550' E	88.0	89.0
500' E break	81.0	82.0
460' E	77.0	78.0
420' E break	73.0	74.0
360' E	69.0	70.0
300' E break	65.0	66.0
250' E	62.17	63.0
200' E	59.33	60.0
150' E	56.50	57.0
100' E	53.67	54.0
50' E	50.83	51.0
E. EBERS	48.0	48.0

53.44	53.44	53.44	53.44
+0.01	66.33	79.26	91.93
53.45	0.14	0.03	0.17
53.35	66.19	79.23	91.76
66.33	13.07	18.70	12.73
	74.26	97.93	104.49

Santa Monica

BM 9637
5' Tie @
Fronds

N	48.25	51.00	53.92	56.75	59.58	62.42	65.25
	5.2	2.4	12.4	9.6	6.8	3.9	1.1
	3.8	3.5	11.6	3.7	4.6	4.2	0.8
	+1.4	-1.1	+0.8	+0.9	+0.2	-0.3	+0.3
S	48.25	51.25	54.25	57.25	60.25	63.25	66.25
	5.2	2.2	12.1	9.1	6.08	3.08	1.3.01
	3.7	1.1	11.1	8.6	5.08	2.08	1.2.01
	+1.5	+1.1	+1.0	+0.5	+1.0	+1.0	+1.0
N	69.25	73.25	77.25	81.25	85.25	89.25	93.25
	10.01	6.01	2.01	10.7	3.70	9.2	1.18
	10.0	5.4	1.9	10.0	4.3	1.8	2.6
	0.0	+0.6	+0.1	+0.7	-0.6	-0.6	-2.6
S	70.25	74.25	78.25	82.25	86.25	90.25	94.25
	9.01	5.01	1.01	9.68	2.88	8.24	1.68
	9.01	4.0	0.01	8.68	1.68	8.24	1.68
	+1.00	+1.0	+1.0	+1.0	+1.0	-0.00	naï
			naï	naï	naï	naï	naï
				51.25			
				8.56			
				+1.56			
				+1.56			
	48.00	50.43	53.67	56.50	59.33	62.17	65.00
	11.81	8.94	6.14	3.31	12.56	9.72	6.89
	11.68	8.88	5.60	3.45	12.66	9.67	6.82
	+0.13	+0.06	+0.54	-0.14	-0.10	+0.03	+0.07
S	48.00	51.00	54.00	57.00	60.00	63.00	66.00
	11.81	8.81	5.81	2.81	11.89	8.89	5.89
	11.89	8.87	5.70	2.98	12.00	9.00	6.01
	+0.44	+0.24	+0.11	-0.17	-0.11	-0.11	-0.12
N	69.00	73.00	77.00	81.00	85.00	89.00	93.00
	2.89	11.75	7.75	3.75	8.84	4.84	1.84
	2.89	11.27	7.51	3.48	4.89	2.75	1.81
	+0.27	+0.48	+0.24	.77	-0.25	-0.91	+0.03
S	70.00	74.00	78.00	82.00	86.00	90.00	94.00
	11.89	10.75	4.51	2.75	7.84	0.84	0.84
	11.81	11.65	6.82	2.14	7.48	1.48	4.2
	-0.07	-0.30	-0.31	+0.61	+0.16	-0.56	+0.86
50.47							
N	48.00	naï	2.57	2.60			
	2.47		2.10				
	2.24		+0.03				
	+0.13						
S	2.47	3.57	2.57	2.12			
	2.04		2.12				
	+0.43		+0.32				

6/17/33

5/14/22

Santa Monica Continued

N. Cb 566

600' E = WA 601207. 145.0 146.0

553 33 E 140.67 141.67

506.67 E 136.33 137.33

460' E break 132.0 133.0

400' E 130.0 131.0

340' E 128.0 129.0

280' E break 126.0 127.0

220' E 122.0 123.0

160' E break 118.0 119.0

106.67' E 110.67 111.67

53.33 E 103.33 104.33

EL. Froida 96.0 97.0

117.02
0.07
106.95
12.73
NS 117.22

117.02
0.05
117.17 T.P.
12.10
129.57

129.57
1.02
128.55
11.30
139.85

132.85
1.14
138.71
0.850
147.21

Santa Monica

37

N
96.25 103.58 110.92 118.25 122.25 126.25 128.25
5.2 13.6 6.3 11.3 7.3 3.3 11.6
5.6 12.8 4.8 11.1 5.9 3.5 11.4
+2.6 4.08 +1.5 +0.2 +1.4 -0.2 +0.2

S
97.25 104.58 111.92 119.25 123.25 127.25 129.25
7.2 12.0 17.6 10.3 16.6 12.6 18.0
2.2 9.0 17.5 5.2 8.2 2.2 4.7
+5.0 +3.6 +6.1 +5.1 +8.4 +10.7 +13.3

N
130.25 132.25 136.58 140.92 145.25
7.6 7.6 3.2 6.3 7.6
10.2 10.4 5.2 7.0
-0.6 -2.8 -2.0 -1.3

S
131.25 133.25 137.58 141.92 146.25
16.0 14.0 9.6 5.3 10.4
5.4 8.2 8.8 0.4
10.4 +5.8 +0.8 -1.1

96.37 T.P. Froida

127.25
2.44
104.21
13.47
121.22
2.81
121.21
12.61
123.57
0.24
123.74
12.50
146.24

N 96.00 103.33 110.67 118.00 122.00 126.00
13.15 13.15 5.92 10.55 3.22 7.32
13.15 13.00 6.92 10.34 11.73 7.32
+0.13 +0.14 +1.00 +2.17 +0.05 +0.44

S 97.00 104.33 111.67 119.00 123.00 127.00
12.25 12.25 9.55 2.22 6.02 6.62
12.05 11.59 5.18 9.57 10.92 0.82
+0.19 +0.66 +0.76 +0.18 -0.48 -0.14

N 128.00 130.00 132.00 136.33 140.67 145.00
5.27 3.82 1.82 9.91 5.57 11.74
5.13 3.84 2.39 10.34 5.62 12.4
+0.52 +0.02 -0.57 -0.42 -0.05

S 129.00 131.00 133.00 137.33 141.67 146.00
4.92 2.82 0.82 8.21 4.57 0.24
4.92 2.14 0.97 8.95 5.42 7.00
-0.17 -0.32 +0.73 -0.04 -0.85 -0.76

220.18

0.72	W	219.00	215.31	211.19	209.80	208.55	208.35	208.49
220.41		1.41	5.10	9.22	10.61	11.86	12.06	11.52
0.46		1.34	4.81	8.30	10.41	11.69	11.97	11.20
219.75		+0.07	+0.23	+0.92	+0.20	+0.17	+0.09	+0.32
12.39								
232.14								

0.25	E	220.00	216.00	212.00	210.36	209.42	209.20	209.69
221.11		0.41	4.41	8.41	10.05	10.97	11.21	10.72
12.34		0.41	3.92	8.62	10.07	10.99	10.98	10.84
244.50		+0.44	-0.21			00	+0.25	-0.12

W	210.17	212.00	217.50	225.00	227.00	231.00
	10.24	8.41	2.91	9.24	5.24	
	9.84	8.12	3.19	9.15	4.58	
	+0.28	+0.24	-0.28	+0.19	+0.87	

E	210.89	212.80	217.90	223.00	226.40	226.50
	9.52	7.61	2.51	7.34	5.94	5.84
	9.69	8.02	2.85	9.67	6.71	6.43
	-0.17	-0.41	-0.34	-0.28	-0.77	-0.59

M		231.00	234.80	237.13	239.05	240.50
		1.34	9.70	7.37	5.45	3.94
		1.92	9.67	7.98	5.76	4.10
		-0.58	+0.03	-0.61	-0.31	-0.16

230.50
14.00
14.04

E	227.00	229.00	230.50	234.60	237.10	239.05	240.50
	5.34	2.34	1.94	9.90	7.40	5.45	3.94
	5.26	4.50	1.89	9.87	7.81	5.48	4.77
	+0.08	-0.16	-0.05	+0.03	-0.41	-0.43	-0.27

M	241.66	242.25	242.63	242.50	241.98	241.03	239.67
	2.84	2.15	1.87	2.00	2.52	3.47	4.11
	2.78	1.50	1.99	2.16	2.62	3.53	4.11
	+0.06	+0.65	-0.12	-0.16	-0.10	-0.06	-0.11

E	241.64	242.34	242.60	242.46	241.91	240.95	239.67
	2.06	2.16	1.70	2.04	2.59	3.55	4.11
	2.98	2.62	2.03	2.52	2.55	3.64	4.11
	-0.12	-0.46	-0.13	-0.48	+0.04	-0.09	+0.11

M	237.91	235.76	231.00
	6.59	8.74	13.50
	6.14	8.95	13.22
	+0.45	-0.21	+0.28

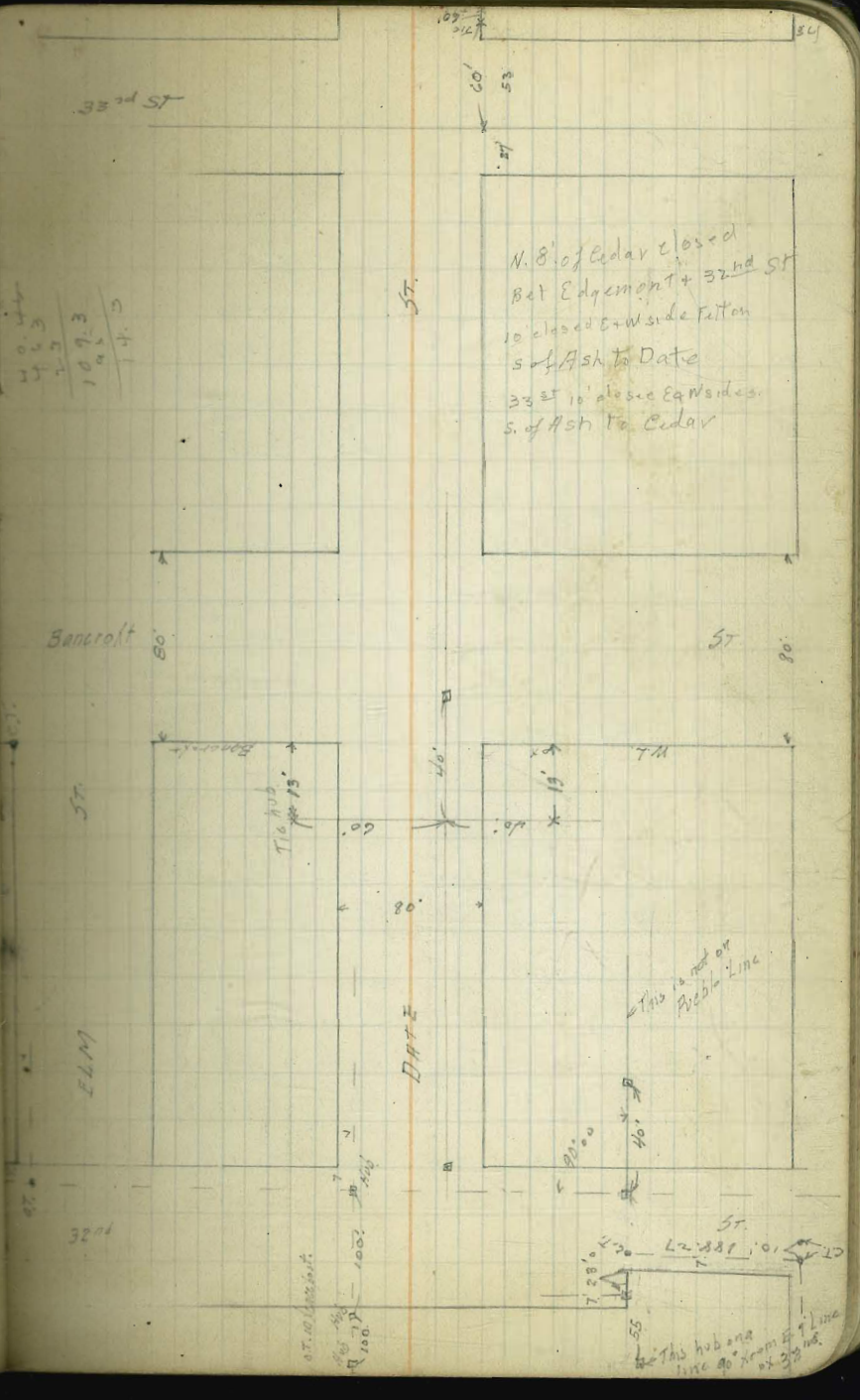
E	237.80	235.60	232.00
	6.70	8.40	12.50
	6.45	9.01	12.18
	+0.25	-0.11	+0.37

32nd ST GRADES

Station	W.C.B.	I.C.B.
290 Mon E		
285.61 v W	219.0	220.0
5L Date	215.31	216.0
250 N	211.19	212.0
210 N Break	209.80	210.36
190 N Break	208.55	209.42
150 N Break	208.35	209.20
130 N Break	208.29	209.69
110 N Break	210.17	210.89
90 N Break	212.0	212.80
45 N	219.5	219.9
N.L. Date	223.0	223.0
5L Date	231.0	231.0
30 S. Break	234.8	234.80
50 -	237.13	237.12
70 -	239.05	239.05
90 -	240.56	240.55
110 -	241.66	241.64
130 -	242.35	242.34
150 -	242.63	242.60
170 -	242.50	242.46
190 -	241.98	241.91
210 -	241.03	240.96
230 -	239.67	239.57
250 -	237.91	237.80
270 -	235.76	235.60
290 -	231.0	232.0

see page 34 for notes on 32nd st-stakes

20.44
4.5
1.3
10.93
14.0



DATE ST GRADES

N. 66

S 66

see plans for this intersection

EL 33rd St

W.L. 33rd

55' W

110' -

165' -

220' - EL Bancroft

W.L. Bancroft

5338' W

106.76' -

160.14' -

213.44' - EL 32nd

215' W locs.

234.0	235.0
232.26	233.26
230.50	231.50
228.75	229.75
227.0	228.0

228.0	229.0
227.63	228.51
227.25	228.01
226.87	227.57
226.50	227.0

EL 33rd	EL 32nd	N. 66	S 66	W.L. Bancroft	W.L. 33rd	W.L. 32nd
234.17	234.00	228.73	233.47	230.56	224.00	234.00
6.20	6.37	6.64	6.90	6.87	6.37	6.37
5.90	5.82	6.11	5.52	6.63	6.42	7.15
+0.10	+0.35	+0.33	+1.35	+0.18	-0.43	-0.78
6.41	6.41					235.00
5.23	5.10					5.37
5.22	5.27					5.33
5.62	5.49					-0.56
-0.42	-0.17					
						230.00
232.25	230.50	228.73	227.05	229.00	227.63	227.25
8.12	9.87	11.60	3.03	2.40	2.45	2.13
7.43	9.65	11.49	-3.19	2.23	2.36	2.14
+0.69	+0.22	+0.11	-0.16	-0.15	2.09	+0.67
227.25	227.00	229.75	228.00	229.00	228.51	228.01
7.12	1.08	10.62	2.10	1.08	1.57	2.07
6.90	1.23	10.68	2.06	1.23	1.67	2.17
+0.22	-0.35	-0.06	+0.02	-0.35	-0.05	-0.20

Cut 1.62 on E Basin
- 1.29 - W

33210	N	226.75	227.12	227.30	227.88	228.25
		5.4	5.0	4.6	4.2	3.9
		7.7	6.6	4.3	3.2	2.7
		-2.3	-1.6	+0.1	+1.0	+1.2
	S	227.25	227.76	228.26	228.76	229.25
		16.8	4.3	3.8	3.3	2.9
		11.7	0.9	0.9	0.6	0.6
		5.1	+3.4	+2.9	+2.7	+1.4
22617	N	229.0	230.75	232.50	234.25	235.81
		7.1	5.4	3.6	1.9	2.3
		2.0	6.2	3.8	0.8	0.6
		-1.9	-0.8	+0.1	+1.4	+1.7
	S	230.0	231.75	233.50	235.25	237.00
		6.1	4.4	2.6	0.9	0.4
		3.2	5.4	3.0	1.3	0.8
		-2.1	-1.0	-0.4		

32nd St Notes

BP SE 32nd ELM	E	216.25	217.25	218.25	219.25	220.25	221.25
220.18		3.9	7.9	9.6	10.7	10.5	10.2
-0.01		1.1	2.4	2.4	1.5	1.0	0.8
214.17		+2.8	-0.5	-2.3	-2.7	-0.3	+0.1
0.46							+0.2
2.977							
12.33							
232.75	W	215.56	217.44	219.05	220.80	222.60	224.40
232.75		4.6	8.7	10.1	11.4	11.6	11.0
232.75		5.8	7.8	10.1	12.1	15.2	15.2
231.33		-1.2	+1.1	-0.6	-2.7	-3.9	-4.2
230.0							
230.07							
228.0							
243.24	E	213.05	213.15	223.25	231.25	235.05	239.80
243.24		7.1	2.0	5.9	12.8	7.8	4.8
243.24		7.2	2.0	5.9	10.8	8.1	4.8
245.99		-0.1	-0.1	-0.1	1.9	4.9	4.6
							+1.1
	W	217.25	217.75	223.25	231.25	235.05	239.80
		7.9	2.4	8.9	15.8	3.0	4.8
		11.0	5.3	9.8	12.0	8.1	7.9
		-3.1	-2.9	-0.9	+2.3	+2.1	+2.9
							+2.0
	E	242.85	242.16	245.2	245.85		
		3.1	3.8	6.2	10.7		
		1.3	1.9	2.4	3.9		
		+1.3	+2.0	+3.8	+6.2		
	W	242.85	242.23	239.72	236.01		
		3.1	3.7	4.1	10.0		
		1.9	2.3	4.4	6.5		
		+1.2	+1.5	+1.7	+3.5		

67-11
3 13 1/2
45

BANCROFT ST GRADES

	W. Cb.	E. Cb.
S.L. ELM.	225.0	224.0
60' S break	222.0 223.0	222.0
120' ✓	223.0 223.75	222.75
180' ✓ break	224.0 224.5	223.5
225' ✓	225.33 225.67	224.67
270' ✓	226.67 226.83	225.83
315' ✓ - N.L. Date	228.0	227.0
S.L. Date	229.0	228.0
52.5' S	230.75	229.67
105' ✓	232.50	231.33
157.5' ✓	234.25	233.0
210' ✓	236.0	234.67
262.5' ✓	237.75	236.33
315' ✓ - N.L. Cedar	239.50	238.0

Culvert at Elma Bancroft

cb elev	Flow line
Rowed 223.00 222.00	219.50
222.00	219.20
	219.10
L 3' N	218.20
A 75' N	217.90
End P4pc	

2 1/2
9.55

382
37
33

26

E	230.58	230.22	233.25	231.58	229.22	228.25
	5.3	7.0	8.7	10.3	12.0	13.7
	2.1	3.5	4.7	11.6	13.0	8.5
	+1.2	-1.5	-1.0	-1.3	-1.0	-0.6
W	228.0	226.25	234.50	232.75	236.0	229.25
	5.7	5.0	7.0	9.2	10.9	
	1.3	3.0	6.0	7.3	3.6	
	+2.6	+1.8	+1.4	+1.3	+1.3	
E	227.25	226.25	227.25	223.75	223.0	222.25
	7.7	10.1	11.7	12.4	5.88	6.2
	2.9	10.3	11.2	13.1	5.1	5.4
	-1.0	-0.2	-0.2	+0.3	+0.7	+0.5
W	228.0	227.03	225.92	224.75	224.0	223.25
	5.9	6.6	10.2	11.4	4.86	5.6
	2.3	5.7	9.9	12.8	7.2	5.4
	+1.2	+0.9	+0.6	+1.1	-2.7	+1.6
		+0.9	+0.6	-0.6	-2.0	-0.6
E	228.75	228.26	223.75			
	8.2	5.5	+0.3			
	7.3	7.2	6.2			
	-3.1	-3.7	-6.5			

S.L. Elm	B-K	B-K	B-K	B-K	B-K	B-K	B-K
230.00	225.00	222.00	223.00	224.00	225.33	226.67	228.00
2.34	5.08	8.08	7.08	6.08	4.75	3.41	2.08
227.75	5.08	7.37	7.25	5.74	4.12	3.25	1.96
225.41	0.16	+0.86	-0.17	+0.34	+0.62	+0.16	30.12
224.00	222.00	222.75	223.50	224.17	225.83	227.00	
6.08	6.08	8.08	7.33	6.58	5.41	4.25	3.04
5.08	6.72	7.52	7.57	6.91	5.07	4.44	3.15
221.6	-0.24	+0.55	-0.24	-0.33	+0.34	-0.24	-0.37
W 229.25	230.75	232.50	234.25	236.00	237.75	239.50	
6.08	7.87	8.14	6.39	4.64	2.89	1.14	
1.24	9.15	7.77	5.99	4.78	2.91	1.50	
-0.19	+0.14	+0.37	+0.10	-0.14	-0.02	-0.36	
E 229.00	229.67	231.33	233.00	234.67	236.33	238.00	
2.08	10.97	9.31	7.64	5.97	4.31	2.64	
2.80	10.90	9.05	6.27	5.71	4.24	2.80	
-0.22	+0.07	+0.26	+0.27	+0.26	+0.07	+0.31	

S.L. Date	W. CB	E. CB
52.5 S	235.0	235.0
105 ✓	234.83	234.59
157.5 ✓	234.67	234.17
210 ✓	234.6	233.75
262.5 ✓	234.33	233.34
315 ✓ - N. Cedar	234.0	232.92
		232.50

234.65 Nov 33rd Cedar

225
241.90

E	W
$\begin{array}{r} 233.75 \\ 8.7 \\ 5.5 \\ \hline +3.2 \end{array}$	$\begin{array}{r} 233.59 \\ 8.3 \\ 5.3 \\ \hline +3.0 \end{array}$
$\begin{array}{r} 234.4 \\ 7.9 \\ 3.9 \\ \hline +4.0 \end{array}$	$\begin{array}{r} 234.47 \\ 7.5 \\ 4.5 \\ \hline +3.0 \end{array}$
$\begin{array}{r} 234.42 \\ 7.5 \\ 6.8 \\ \hline +1.0 \end{array}$	$\begin{array}{r} 234.65 \\ 7.3 \\ 4.8 \\ \hline +1.0 \end{array}$
$\begin{array}{r} 234.75 \\ 7.2 \\ 6.8 \\ \hline +0.8 \end{array}$	$\begin{array}{r} 234.92 \\ 7.0 \\ 6.5 \\ \hline +0.5 \end{array}$
$\begin{array}{r} 234.92 \\ 7.0 \\ 6.8 \\ \hline +0.5 \end{array}$	$\begin{array}{r} 235.08 \\ 6.8 \\ 6.2 \\ \hline +0.2 \end{array}$
$\begin{array}{r} 235.21 \\ 6.7 \\ 3.4 \\ \hline +3.3 \end{array}$	$\begin{array}{r} 235.25 \\ 6.7 \\ 4.2 \\ \hline +0.6 \end{array}$

234.65

572

240.27

6.75

227.62

2.40

230.02

Minuteman

E 232.50

7.87

7.84

7.66

+2.18

W 234.00

6.37

6.20

6.93

-0.10

E 235.00

5.37

6.41

-1.04

232.72

7.45

7.58

-0.13

234.17

6.20

5.93

+0.24

233.34

7.03

7.08

-0.05

234.33

6.04

6.02

+0.02

233.75

6.62

6.61

+0.01

234.50

5.87

5.72

+0.15

234.17

6.10

6.12

+0.02

234.67

5.70

5.10

+0.60

234.59

5.78

5.82

-0.04

234.63

5.54

5.41

+0.13

W 235.00

5.37

6.37

-0.10

Olive St Sidewalk and Stairs
bet Columbia + State

5/20/25
miller

BR. Streb Columbia
N. side Olive

13.M.
E. line walk
at Columbia = 00

0+33*
+58.83
+83.00
1+03.00
1+53.63
2+04.26

143.56
143.72 = 143.46 2nd flr
145.00
163.66
167.58
170.00
175.5
181.00

String	slant	slant	slant	slant	slant
45.00	163.66	167.50	170.00	175.5	181.0
7.11	1.16	8.78	6.24	11.01	5.51
7.11	1.16	8.78	6.24	11.01	5.51
0.045	0.045	0.045	0.045	0.045	0.045
143.56	143.56	143.56	143.56	143.56	143.56
3.55	3.55	3.55	3.55	3.55	3.55
152.11	152.11	152.11	152.11	152.11	152.11
0.18	0.18	0.18	0.18	0.18	0.18
151.93	151.93	151.93	151.93	151.93	151.93
12.89	12.89	12.89	12.89	12.89	12.89
164.82	164.82	164.82	164.82	164.82	164.82
0.35	0.35	0.35	0.35	0.35	0.35
164.47	164.47	164.47	164.47	164.47	164.47
11.51	11.51	11.51	11.51	11.51	11.51
175.98	175.98	175.98	175.98	175.98	175.98
1.53	1.53	1.53	1.53	1.53	1.53
174.45	174.45	174.45	174.45	174.45	174.45
11.73	11.73	11.73	11.73	11.73	11.73
186.18	186.18	186.18	186.18	186.18	186.18
15.83	15.83	15.83	15.83	15.83	15.83
173.35	173.35	173.35	173.35	173.35	173.35
0.92	0.92	0.92	0.92	0.92	0.92
174.27	174.27	174.27	174.27	174.27	174.27
0.66	0.66	0.66	0.66	0.66	0.66
171.94	171.94	171.94	171.94	171.94	171.94
0.35	0.35	0.35	0.35	0.35	0.35
169.59	169.59	169.59	169.59	169.59	169.59
2.66	2.66	2.66	2.66	2.66	2.66
177.49	177.49	177.49	177.49	177.49	177.49
0.93	0.93	0.93	0.93	0.93	0.93
180.42	180.42	180.42	180.42	180.42	180.42
2.05	2.05	2.05	2.05	2.05	2.05
182.27	182.27	182.27	182.27	182.27	182.27

0.0 side
4.51
+ 7.00 N. side

182.27 CHANRM.

Water GRADES
L.H. J. 119.

Westbourne.

Grades

34.5E. 161.
Westbourne

East Edge paving = 0+000	186	80.87	79.01			
				Hydrant SW. Westbourne.	180	
			79.07	78.80		+0.27
0+60 break		2.55	78.32	74.70		+3.6
1+14.3		4.10	76.77	73.10		+3.7
1+68.6		5.98	74.89	71.50		+3.4
2+22.9		7.31	73.56	69.90		+3.7
2+77.2		8.60	72.27	68.30		+4.0
3+31.5		10.22	70.65	66.70		+4.0
3+85.8		11.50	69.37	65.10		+4.2
4+40.0 break 110	69.09	12.88	67.99	63.50		+4.5
5+00		2.55	66.54	62.75		+3.8
5+60 break		3.94	65.15	62.00		+3.2
6+14.3		5.07	64.02	60.65		+3.4
6+68.6		6.44	62.65	59.29		+3.4
7+22.9		7.85	61.24	57.93		+3.3
7+77.2		9.07	60.02	56.57		+3.4
8+31.5		10.22	58.87	55.22		+3.6
8+85.8		11.35	57.74	53.86		+3.9
9+40.0 break 073	57.06	12.76	56.33	52.50		+3.8
9+93.33		2.18	54.88	50.00		+4.9
10+46.67		4.10	52.96	47.50		+5.5
11+00 break		6.43	50.63	45.00		+5.6
11+61.33	017	44.20	44.03	38.87		+5.1
12+22.67		7.98	36.22	32.74		+3.5
12+84 = 1' E. of N. Neptune.	458	36.21	31.63	25.60		+6.1
Hydrant SE. Neptune		10.57	23.68	22.00		+1.7
		10.57	25.63	22.00		+3.6

5/29/25 Gregory Water pipe Grades

3621, page 29
LA 56119
48.46

12+11 Nautilus 0.16 36.05 GRADES

120' W. of E.L. = 6 pipe on Neptune.
Neptune = 0+00

			0.16	36.05	GRADES	
			1		28.8	
0+52.5			11.06	37.40	34.70	+2.70
1+0.5 break			4.99	43.47	40.59	+2.9
1+4.5 ✓			2.79	45.67	42.79	+2.9
1+46' ✓	12.60	60.42	0.64	47.82	44.73	+3.1
1+65' ✓			10.38	49.54	46.44	+3.1
1+85' ✓			9.46	50.96	47.89	+3.1
2+0.5 ✓			8.39	52.03	49.10	+2.9
2+25' ✓			7.52	52.90	50.06	+2.9
2+46' ✓			6.78	53.64	50.78	+3.1
2+65' ✓			6.23	54.19	51.25	+2.9
3+15'			5.26	55.16	52.13	+3.0
3+65'			4.31	56.11	53.00	+3.1
4+15'			3.54	56.89	53.87	+3.1
4+65' break			2.49	57.93	54.75	+3.2
5+17.85			1.36	59.06	56.00	+3.0
5+70.70	12.13	72.54	0.01	60.41	57.33	+3.1
6+23.55			10.84	61.70	58.62	+3.1
6+76.40			9.66	62.88	59.90	+2.9
7+29.25			8.40	64.14	61.19	+3.0
7+82.10			7.0	65.54	62.48	+3.1
8+34.95			5.70	66.84	63.77	+3.1
8+87.80			4.44	68.10	65.05	+3.1
9+40.65			3.18	69.36	66.34	+3.0
9+93.50			1.89	70.65	67.63	+3.0

72.54

10+46.35	768	79.55	067	71.87	68.92	+3.0
10+99.20			637	73.16	70.20	+3.0
11+52.05			507	74.48	71.50	+3.0
12+04.90	break		388	75.67	72.80	+2.9
12+65 =	W.L. La Salle Blvd		229	77.26	72.80	+4.5
T.P.	298	74.85	768	71.87		

NAUTILUS 41

5/29/25 Gregory WATER PIPE LINE
LH JOLLA

BONAIR ST

GRADES

Station	Notes	Hyd	Grade	Change
WT LaSalle Blvd		74.85	73.75	
20+00			68.80	
+50		1.75	73.10	+4.30
1	break	2.62	72.23	+3.4
1+5333		4.55	70.30	+2.1
2+0667		6.27	68.58	+2.5
3+60		7.92	66.93	+2.1
3+1333		9.12	65.73	+2.3
3+6667		9.80	65.05	+2.9
4+20		10.91	63.94	+3.1
4+7333	rod 64.31	12.58	62.27	+2.8
5+2667		2.54	61.77	+3.6
5+80		3.64	60.67	+3.9
6+3333		4.57	59.74	+4.3
6+8667		4.60	59.71	+4.3
7+4000	break	6.63	57.68	+3.6
7+90		8.27	56.07	+3.2
8+40		9.63	54.68	+4.0
8+90		11.40	52.84	+4.3
9+40		12.79	51.52	+3.9
9+90		2.60	50.3	+3.3
10+40	break	5.40	47.50	+3.3
10+9625		9.21	43.69	+1.5
11+5250		11.78	41.12	+1.1
12+0875		44.07	42.00	+4.0
12+65	6" pipe Neptune Hydrant 65.76	2.07	38.67	+6.7
		5.40	33.12	+5.1
		10.95	29.00	
			24.0	
			20.5	

5/29/45 Gregory. Water Pipe Line La Jolla

Playa Del Norte.

53.26 from 43

Wt	La Jolla Blvd	1282	66.93	115	54.11	59.26	+6.1
0+00				322	63.71	57.26	+6.4
0+20				377	63.16	59.13	+3.9
0+40	break. 164		63.99	458	62.35	59.0	+3.3
1+00				357	60.42	56.40	+4.0
1+20				432	59.67	55.90	+3.7
1+40				527	58.72	56.18	+2.5
1+60				579	58.20	55.45	+2.7
1+80				662	57.37	54.45	+2.9
2				732	56.67	54.73	+1.9
2+20				818	55.81	54.0	+1.8
2+40	OUT					53.28	+2.5
2+60	break.			946	54.53	52.45	+2.1
2+80				992	54.07	50.28	+3.8
3				1049	53.50	49.96	+3.5
3+20				1129	52.70	49.43	+3.3
3+40				1196	52.03	48.40	+3.6
3+60	144	53.03		1240	51.59	46.37	+5.2
3+80				1322	51.21	47.24	+4.0
4				243	50.60	47.31	+3.3
4+20				301	50.02	46.76	+3.3
4+40				402	49.0	46.26	+2.8
4+60				445	48.58	45.76	+2.8
4+80				482	48.21	45.24	+3.0
5				531	47.42	44.69	+2.7
5+20	Hyd. Elev			540	47.68	44.80	+2.9
	OUT					44.16	

+40	OUT			4363		
+60			650	4653	4310	+3.4
+80			692	4611	4258	+3.5
6			732	4571	4205	+3.7
+20			799	4504	4153	+3.5
+40			862	4441	4100	+3.4
+60			934	4369	4047	+3.2
+80	break.		103	4273	3994	+2.8
7+00	OUT					
7+20	OUT					
+40	OUT	40.46	1279	4024	3695	+3.2
+60	break		134	3912	3599	+3.2
+80	break		223	3823	3500	+3.2
8			472	3574	290	+6.7
+20	break		946	3100	230	+7.0
+40			1430	2606	2260	+3.5
+60			1031	30.11	2220	+6.5
+80						
9			1216	2830	2140	+6.9
+20			1049	2997	2100	+9.0
+40	10.2	2910	1240	2806	2060	+6.5
+60			191	2719	2060	+6.0
+80			289	2621	2020	+6.0
			880	2030	1980	+0.5
			533	2347	1940	+4.1
10						
+20	OUT.		765	4145	190	+5.5
+40			765	2145	156	+2.9
+60			815	2092	1520	+2.7

29.10

+80		894	20.16	178	+2.4	
11		970	19.40	174	+2.0	
+20		977	19.33	170	+2.3	
+40		813	20.97	16.5	+4.5	
+60	break 607	2434	1083	18.27	16.0	+2.2
+80		650	1784	15.8	+2.0	
12		660	1774	15.6	+2.1	
+20	OUT	635	18.0	15.4	+2.6	
+40	OUT	599	18.35	15.2	+3.2	
+60		505	19.29	15.0	+4.3	
+80	OUT.	505	19.29	15.0	+4.3	
13		516	19.18	15.0	+4.7	
+20		492	19.42	15.2	+3.6	
+40		443	19.91	16.68	+3.2	
+60		392	20.42	17.62	+2.7	
+80		342	20.92	18.36	+2.5	
14+20		160	22.74	20.0	+2.7	
+40	701	30.64	071	23.63	20.83	+2.7
+60		590	24.92	21.72	+3.0	
+80		509	25.35	22.86	+3.0	
15+05		383	26.89	23.6	+3.2	
		255	28.09	87.52	115.74	
10' Ford Vista Del Mar	20100			23.6		
0+20				24.3		
0+40	break.			25.0		
+60				26.71		
+80				28.42		
1				30.13		
+20				31.85		
+40				33.57		
+60	break			35.3		
+80				36.3		
2				37.3		

Playa Del Sur.

La J. 119 Water

45

+20				38.3	
+40				39.2	
+60				40.2	
+80				41.2	
3	break			42.2	
+20				42.8	
+40				43.4	
+60				44.0	
+80				44.7	
4				45.3	
+20				45.9	
+40				46.5	
+60				47.1	
+80				47.7	
5				48.2	
+20				48.9	
+40				49.6	
+60				50.2	
+80				50.8	
6	break			51.4	
+20				52.0	
+40				53.0	
+60		14.1	57.0	54.4	2.6
+80		10.9	58.2	55.4	3.8
7		9.9	59.2 x	56.4	3.8
+20 out		7.1	59.2	57.5	

69.13

+40		8.0	61.1	58.5	2.6
+62.5T		6.9	62.2	59.8	2.4
+50		6.4	62.7	60.6	+2.6
8 ✓		5.6	63.5	61.6	+1.9
+20 break		3.71	65.4	62.6	+2.8

Gravilla ST

BM	1.30	70.16	48.86	NW 2nd 11.85	
00=Brk 25 E of Wline		1.20	68.96	66.00	+2.96
+50		2.70	67.96	64.14	+3.82
1+00		4.39	65.77	62.29	+3.48
+50		6.08	64.08	60.48	+3.60
2+00		7.81	62.35	58.61	+3.74
2+60 Brk		9.93	60.23	56.40	+3.83
50					
3+10		12.27	57.89	54.15	+3.74
T.P.	0.38	58.27	12.27	57.89	
3+60		2.71	55.56	51.90	+3.66
4+10		4.25	53.32	49.65	+3.67
4+60 Brk		7.28	50.99	47.40	+3.59
50					
5+00		10.15	48.12	44.00	+4.00
T.P.	0.75	46.28	12.74	45.53	
5+40 Brk		2.23	44.05	42.60	+3.45
50					
5+80		6.28	40.00	36.30	+3.70
6+20 Brk		10.43	35.85	32.00	+3.85
50 T.P.	0.64	34.34	12.62	33.66	
6+70		3.59	30.75	28.08	+2.67
7+20 Ft. Vista Delmar Line		7.0	27.35	24.16	3.20
T.P. on S.E. Return		6.14	28.20		

La Solla Water 47

Kel may St Line

00-Whine Blvd	71.00
+50	
1+00	
+50	
2+00	
+50	
3+00	
4+00	
+60	
4+20 Brk	54.60
+40 Brk	53.20
+60 Brk	51.70
+80 Brk	49.80
5+00 Brk	47.80
+50	
6+00	
7+00	
6+40 Brk	29.30
6+80 Pt Vista Del Mar Line	26.30

La Jolla Water 48

00 = 10 Main ka Jalle Blud				73.70	
+ 58.33				75.13	+33
1 + 11.67				76.57	+30
1 + 70				78.90	+3.2
2 + 20				78.75	+3.3
2 + 70 x 4 T = 00	79.01			79.50	+3.5
0 + 48		5.4	83.6	80.27	+3.3
0 + 48		5.0	84.0	81.04	+3.0
1 + 48 BK = 00 T.P.		4.0	85.0	81.80	+3.2
+ 50		4.8	84.2	81.40	+2.8
1 + 00		5.2	83.8	81.00	+2.8
+ 50		5.5	83.5	80.40	+2.7
2 + 00		5.9	83.1	80.20	+2.9
+ 50		6.3	82.7	79.80	+2.9
3 + 00		6.6	82.4	79.40	+3.0
+ 50 T.A.		6.9	82.1	79.00	+3.1
4 + 00 BK = 00		5.16	81.54	77.60	2.94
+ 50		6.50	80.20	77.50	+2.70
1 + 00		7.90	78.80	76.40	+2.40
4.50		9.22	77.48	71.30	+2.18
BM. 11.03	79.05		68.02	103.00 BK = 00	103.00 BK = 00
2 + 00		3.10	75.95	74.20	+1.75
+ 50		1.90	77.15	73.10	+4.05
3 + 00 BK = 00		3.12	75.93	72.00	+3.93
0 + 45		6.31	72.74	69.50	+3.24
0 + 90 BK = 00		6.35	72.70	67.00	+5.70

	79.05				
00 Brk		6.35	72.70	67.00	+ 5.70
150		6.56	72.89	67.15	+ 5.31
1100		9.79	69.26	67.37	+ 1.89
150		10.84	68.21	67.55	+ 0.66
200		10.28	68.77	67.73	+ 1.04
250		5.98	73.07	67.92	+ 5.15
300		5.91	73.19	68.10	+ 5.04
350		7.68	71.37	68.29	+ 3.08
400		5.36	73.69	68.48	+ 5.21
426		4.24	74.81	68.70	+ 6.11
486 connection				68.90	

Neptune Place
Westbourne To Bon air

T.P.	8.11	36.79		28.68	9.39
00: 4x4T in Westbourne			10.59	26.20	22.5
+42.5			6.17	30.62	24.75
0+94.5 Brk			7.93	31.86	27.0
49			4.64	32.15	27.56
1+45.5			4.22	32.57	27.72
1+92.5			4.23	32.56	28.08
2+41.5			4.16	32.63	28.49
2+90.5			4.52	32.27	28.80
3+99.5 T. in Nautilus					29.5

	36.79			28.90	+2.5
3+39.5 T Naxtilus					
57.5		3.37	23.42	29.65	+3.8
3+97.0					
57.5		2.50	34.29	30.50	+3.8
4+54.5 B/K					
4+94.5 B/K T.P. 1.32	36.38	1.73	35.06	30.45	+4.5
4+94.5 B/K		1.22	35.16	30.40	+4.8
5+14.5 B/K		1.43	34.95	30.05	+4.9
5+34.5 B/K		1.05	25.33	29.50	+5.8
467		7.33	29.05	27.66	+1.4
5+21.17		7.55	28.83	25.43	+3.0
6+27.83		8.79	27.59	24.00	+3.6
6+74.50 T _{1/2} Bonair		14.55	21.83	28.5	+6.7
Hvd S.E. Bonair + Neptune					
T.P. 13.13	44.07	5.44	30.94		

6/23/21

Palomar Water Grades

10' E. of Lot	12.50	42.92		30.42	BPA 6/19/21	
Vista Del Mar 20+00			6.78	36.14	Vista Del	
T.P.	1263	5545	010	4282	GRHDE	+3.1
0+32.6'			14.14	41.31		+2.4
0+86.50			8.70	46.75		+1.9
1+29.15			1.75	53.70		+2.9
T.P.	1297	6766	076	5469		
1+73 break			8.50	59.16		+2.5
1+93 ✓			6.6	61.06		+2.7
2+13 ✓			5.4	62.26		+2.8
2+33 ✓			4.4	63.26		+3.1
2+89			1.8	65.86		+3.7
T.P.	1285	8048	003	6763		
3+45			12.8	67.68		+3.6
4+01			12.9	67.58		+1.5
4+57			11.6	68.9		+0.9
5+13 break			8.1	72.4		+2.4
+73			6.1	74.4		+3.4
6+33 break			6.3	74.2		+2.2

La Jolla Water

52

Rosecrans Sewer
Owens to McCall

Moore
Cul
Shaw

0.700 = end spur
NLOWEN +14v

+40.5 = M.H.

1 +50

2 +50

3 +50

+75 = D.M.H

4 = SL Nichols

+50

5 50

6 50

7 +17

42.73

42.0

40.94

40.0

39.5

38.25

37.25

36.45

36.0

35.8v

35.25

35.09

34.7v

34.36

34.0

33.63

32.5

151v 32.30 = FINISHING EX MH

@ McCall + Rosecrans

BROWN McCall @ Rosecrans

38.1
9.8

47.7v
0.1v

47.28
5.13

52.41

33.50

18.9v
10.20

+3.8v

35.45

11.97
0.07

+5.30

40.0

7.38
1.4

+6.2v

33.63

13.79
9.8v

+3.97

35.6v

11.60
0.00

+5.60

40.9

6.48
0.15

+6.33

34.0

13.4v
9.30

+4.1v

36.0

11.4v
0.01

+5.81

42.0

10.41
0.8v

+6.59

34.26

13.06
8.66

+4.40

36.45

10.97
5.23

+5.64

42.73

9.68
2.77

+6.91

34.7v

12.70
8.05

+4.65

37.35

10.07
4.28

+5.59

38.25

9.17
3.30

+5.87

35.09

12.33
7.23

+5.0

39.15

8.27
2.20

+6.07

47.4v

15.1v

32.30

659

151v

139v

1.20

512

156

Meadow Ave Grading 6.11.11

	N Line	N. ch	S ch	S. Line
00 = W. Line Iowa	383.45	383.20	382.60	382.85
+50	82.25	+0.56	+0.20	82.59
100	83.05	+0.50	+0.12	82.57
+50	82.85	+0.34	-0.20	82.05
200	82.65	+0.40	+0.23	81.79
+50	382.45	+0.20	+0.19	381.52
300 = E Line Illinois	382.25	382.00	381.00	381.25
400 = W. Line Illinois	381.25	381.00	380.00	380.25
+50	80.19	+0.27	-0.13	79.19
100	79.12	+0.08	+0.81	78.12
+50	78.05	-0.14	-0.24	77.05
200	79.99	+0.31	+0.03	75.99
+50	75.92	+0.23	+0.04	74.92
300 = E. Line Ohio	374.85	374.60	373.60	373.85
400 = W. Line Ohio	374.25	374.00	373.0	373.25
+50	372.95	+0.18	+0.16	372.01
100	371.65	+0.25	+0.10	370.74
+50	370.35	+0.21	+0.41	369.55
200	369.05	+0.15	+0.42	368.33
+50	367.75	+0.20	+0.29	367.04
300 = E Line 30'	366.45	366.20	365.60	365.85

383.22 N.W. Meade Iowa

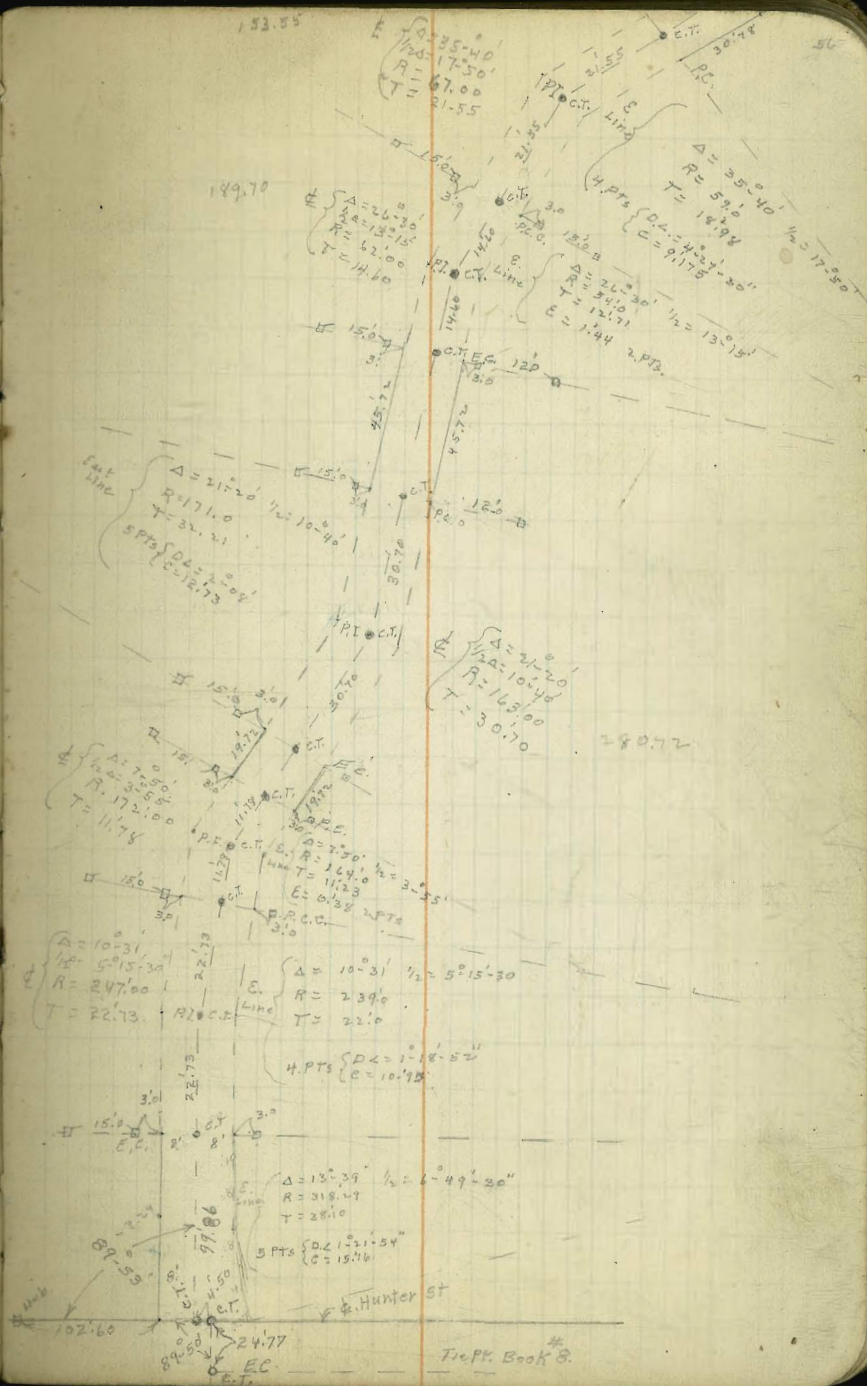
	N	S	N	S	N	S	N	S
383.22	83.45	83.25	83.05	82.85	82.65	82.45	82.25	
386.54	3.1	3.3	3.5	3.7	3.9	4.1	4.3	
377.65		3.3	3.2	3.8	2.4	2.4	3.2	
378.05		0.0	10.3	-0.1	+1.5	+1.7	+1.0	
373.52	3.7	4.0	4.2	4.5	4.7	5.0	5.2	
378.20		3.6	3.9	3.4	4.5	4.4	5.7	
367.94		+0.4	10.3	+1.1	+0.3	+0.6	-0.4	
	4.25	4.19	4.12	4.05	3.99	3.92	3.85	
	5.3	6.4	7.4	8.5	9.6	10.7	11.8	
	4.9	6.5	7.4	8.5	9.6	10.7	11.8	
	+0.4	+0.1	-0.2	-0.6	-0.5	-0.2		
	8.25	79.19	78.12	77.05	75.99	74.92	73.85	
	6.3	7.4	8.4	9.5	10.6	11.7	12.8	
	6.3	7.4	8.4	9.5	10.6	11.7	12.8	
	-0.6	-0.1	0.0	-0.9	0.0	+0.1		
	74.00	73.95	73.85	73.75	73.65	73.55	73.45	
	4.20	5.3	6.4	7.5	8.6	9.7	10.8	
	4.20	5.3	6.4	7.5	8.6	9.7	10.8	
	0.32	+1.7	+2.7	+1.2	+0.7	+1.0		
	73.00	72.01	70.79	69.55	68.31	67.08	65.85	
	5.20	6.2	7.4	8.7	9.9	11.1	12.3	
	5.20	6.2	7.4	8.7	9.9	11.1	12.3	
	0.0	0.0	-0.1	0.0	+0.7	+1.2		
	287.00	287.00	287.00	287.00	287.00	287.00	287.00	
	6.09	6.09	6.09	6.09	6.09	6.09	6.09	
	6.70	6.70	6.70	6.70	6.70	6.70	6.70	
	-0.41	+0.03	+0.33	-0.12	-0.12	-0.12	-0.12	
	380.00	380.00	380.00	380.00	380.00	380.00	380.00	
	7.09	7.09	7.09	7.09	7.09	7.09	7.09	
	6.74	6.74	6.74	6.74	6.74	6.74	6.74	
	+0.85	-0.27	+0.48	-0.12	+0.48	-0.12	+0.48	

	N. Line	N. cl	S. cl	S. Line
000 = 0. W. line 30'	366.25	366.00	365.60	365.85
+50	46.38		+0.18	-46.05
1200	46.51		-0.18 Prop	46.25
E. line Alley			-0.13	-0.02
+50	46.65			46.45
W. line Alley			-0.02 Prop	0.0
2100	46.78	+0.35	0.0	46.65
+50	46.91	+0.39	-0.05	46.85
3000 = E. line Kansas	367.05	366.80	366.80	367.05
000 = W. line Kansas	367.45	367.20	367.20	367.45
+50	67.58	+0.07	+0.10	67.58
1200	67.71	+0.01	-0.12 Prop	67.71
E. line Alley		+0.06	+0.22	-0.11
+50	67.85	+0.25	-0.64	67.45
W. line Alley		+0.09		
2100	67.98	+0.22	-0.13	67.98
+50	68.11	+0.12	-0.05	68.11
3000 = E. line Utah	368.25	368.00	368.00	368.25
000 = W. line Utah	368.65	368.40	368.40	368.65
+50	69.82	+0.07	-0.36	69.82
1200	70.99	-0.17	0.48	70.99
E. Alley		+0.16	+0.19	+1.05
+50	72.15	+0.38	+0.72	72.15
W. Alley		+0.76		70.20
2100	73.32	+0.55	0.0	73.32
+50	74.49	-0.51	-0.34	74.49
3000 = E. line Idaho	375.65	375.40	375.40	375.65

367.94 1.97 369.91 3.91 366.00 10.46 376.46	N. 66.25 66.38 66.51 66.65 66.78 66.91 67.05	66.38 3.5	66.51	66.65	66.78	66.91	67.05
S. 66.85 268.60 4.81 4.2 1.04	66.05 66.25 66.45 66.65 66.85 67.05	66.05 3.9 4.7 0.2	66.25 3.7 4.5 0.8	66.45 3.5 4.7 1.4	66.65 3.3 4.7 -1.4	66.85 3.1 4.8 -1.7	67.05 2.8 3.1 0.4
N. 67.45 67.40 2.71 2.95 0.24	67.58 67.71 67.85 67.98 68.11 68.25	67.58 2.3 2.4 4.0 -1.6	67.71 2.2 2.3 3.9 -1.6	67.85 8.6 10.6 -2.0	67.98 8.5 10.6 -1.6	68.11 9.3 9.6 -1.3	68.25 8.4 8.4 0.09
S. 2.71 2.95 0.24	68.37 68.50 68.63 68.76 68.89 69.02	68.37 2.3 3.0 -0.7	68.50 2.2 3.4 -1.2	68.63 8.6 10.5 -1.9	68.76 8.5 10.5 -2.0	68.89 9.3 9.8 -1.5	69.02 8.4 8.2 0.19
N. 68.65 68.40 8.04 8.03 0.44	69.82 70.99 72.15 73.32 74.49 75.65	69.82 6.6 7.4 -0.8	70.99 5.5 4.9 +0.6	72.15 4.3 3.8 +0.5	73.32 3.1 2.3 +0.8	74.49 2.0 0.4 +1.6	75.65 2.5 1.0 0.0
S. 8.04 7.92 0.14	76.82 77.99 79.15 80.32 81.49 82.65	76.82 6.6 7.0 -0.4	77.99 5.5 5.2 +0.3	79.15 4.3 3.1 +1.2	80.32 3.1 1.4 +1.7	81.49 2.0 1.2 +0.8	82.65 1.0 1.0 -0.4

Plumosa Way Private Paving

Station	TP	3.40	272.91	249.21 B.M.	SW Plumosa Palmetto
	0.75	241.03	12.63	260.29	
4			E 5.02	256.97	256.00 - 0.97
			W 4.79	252.24	- 3.74
			E 5.34	255.69	255.25 + 0.44
			E 5.35	255.68	254.50 + 1.18
P.C.C.			E 5.35	255.68	253.75 + 1.93
			E 5.49	255.54	253.00 W 2.54
2			W 11.75	249.28	
			E 5.62	255.41	252.24 + 3.17
E.C.	T.P. 5.24	254.12	E 5.53	255.50	251.40 + 4.10
P.C.			W 12.75	248.78	Curv 3.00
			E 0.06	254.06	250.14 + 3.92
5			W 8.25	245.87	- 4.27
			0.81	253.31	249.27 + 4.04
E.C.			1.44	252.72	248.40 + 4.32
			2.33	251.79	247.54 + 4.25
			2.15	251.97	246.67 + 5.30
P.C.			E 3.29	250.83	245.81 + 5.02
			W 10.06	244.06	- 1.73
2			E 7.83	246.29	242.70 + 3.59
			W 12.62	241.50	
T.P. 0.09	141.74	12.47	11.45	242.67	241.85 + 0.82
P.C.C.B.K.			E 0.92	240.82	241.00 - 0.18
			W 3.26	238.58	- 2.22
4			1.98	239.76	239.38 - 0.38
			3.17	238.57	238.77 - 0.20
E.C.			3.70	238.04	237.66 + 0.38
			E 4.15	237.59	236.85 + 0.74
P.C.			W 4.06	235.68	- 0.97
			E 7.74	241.00	232.84 + 8.16
4			W 8.40	233.74	- 0.50
			2.75	232.49	231.68 + 0.81
P.C.C.			E 11.49	230.25	230.53 + 0.28
			W 10.27	231.47	+ 0.22
T.P. 0.11	229.55		2.39	228.17	229.37 - 1.20
			W 2.30	226.26	- 1.91
				229.44	W 1.22



Tie Pl. Book 8.

229.55

E 4.46
W 7.67

224.47 226.90 - 2.43
227.93 - 1.03

E 1.67
W 3.42

222.88 225.58 - 2.70
226.13 + 0.55

E 4.25
W 5.02

221.30 224.27 - 2.97
224.53 + 0.26

E 9.94
W 4.45

219.59 222.94 - 3.35
223.10 + 0.14

E 11.69
W 8.06

217.96 221.42 - 3.46
224.49 + 0.07

E 1.89
W 9.55

216.37 219.88 - 3.51
224.00 + 0.12

E 3.24
W 11.24

215.02 218.34 - 3.32
218.21 + 0.13

E 3.75
W 11.27

214.51 217.80 - 2.29
216.99 + 0.19

E 8.56
W 6.86

209.70 211.30 - 1.60
211.40 + 0.10

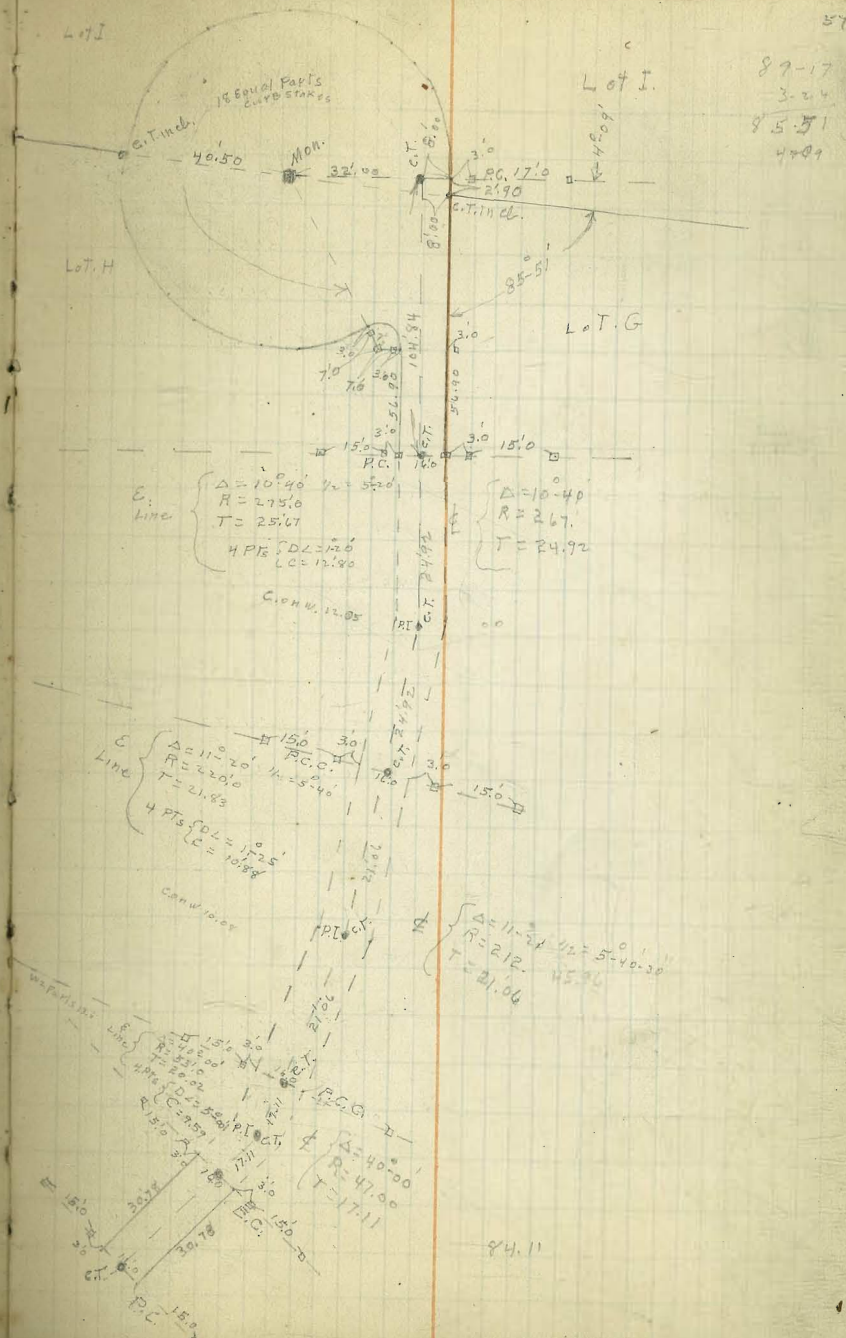
11.55 206.71 204.5 + 2.31

P.C.

E C BTK

P.C.

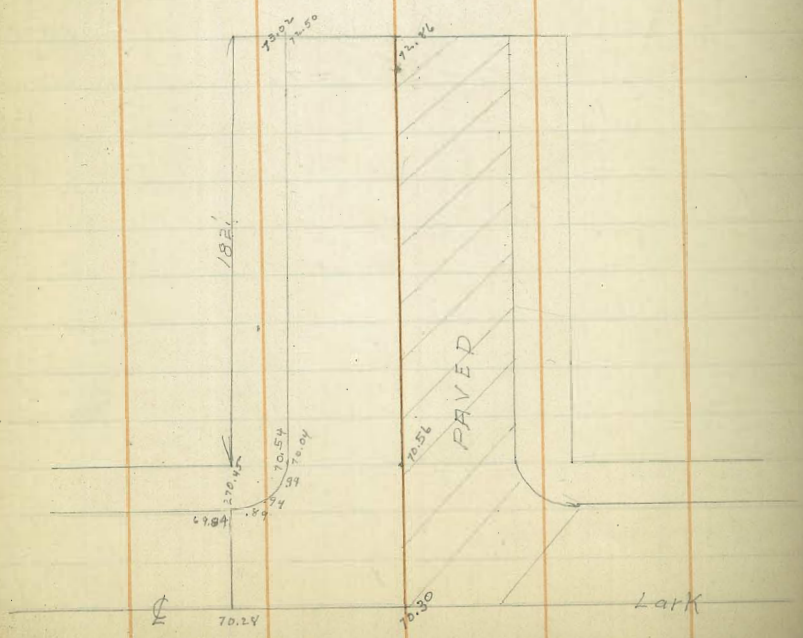
str Base



	S d	S Line	N Line	x. d	
300 E Line Tower		360.25	360.75		
150	+0.06	361.58	362.18	+0.55	
100	-0.18	362.91	363.61	+0.42	prop
W. Alley	-0.66			-0.02	+0.90
150		364.25	365.05		
BR. Alley	+0.24			+0.55	+0.85
250	+0.23	365.58	366.48	+0.67	
150	+0.36	366.91	367.91	+0.80	
300 = W Line 32nd		368.28	369.25		

Washington St. Parking
Grant School

269.94 BMS E Wash + Lark
6.68
276.62



747

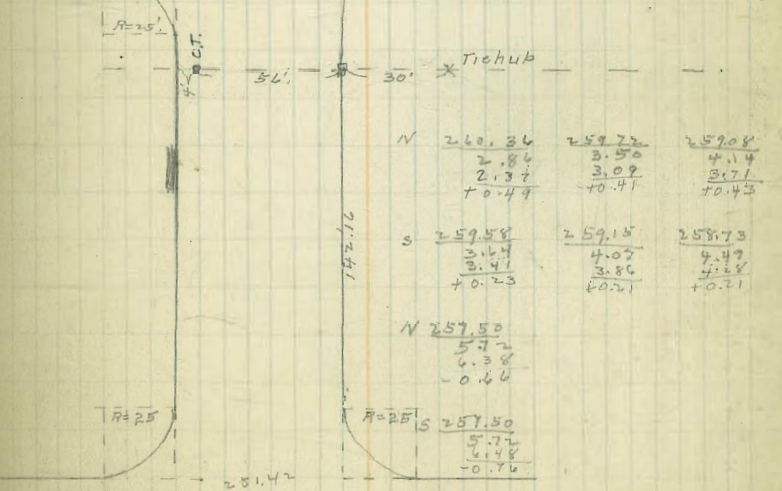
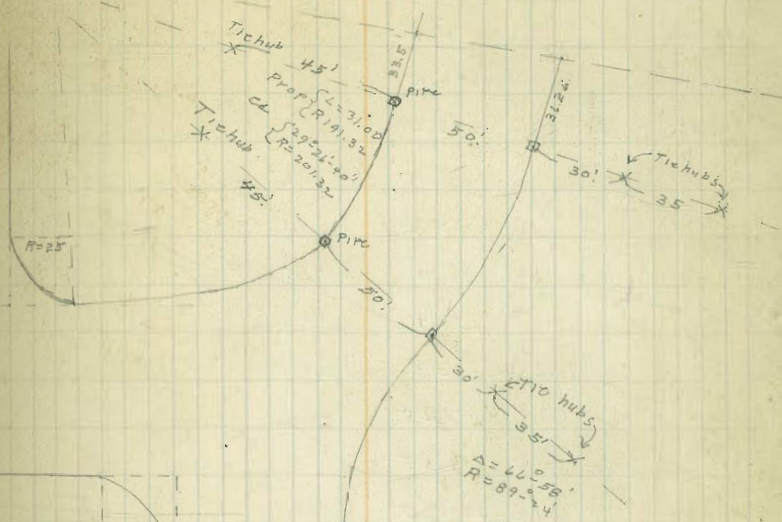
365.60									
0.79									
364.81									
6.86									
371.67									
	S	cl	61.5	62.7	64.00	65.7	66.5	4.23	
		60.00	10.2	9.0	7.7	6.5	5.3	67.45	cl
		5.60	8.7	8.8	8.4	5.9	4.2	67.45	
			+1.5	+0.2	-0.7	+0.6	+0.9	67.70	
	N	60.50	62.2	63.6	65.0	66.5	67.9	cl	
		5.10	3.4	8.1	6.7	5.2	3.8	69.00	
			+2.7	+1.6	+1.0	+2.5	+2.5	2.48	

Courts & Orizaba Paving

	white	net			
E.C. 259 of sunset	270.75	270.50	270.26	270.43	
+47.39	269.91	269.66	268.83	269.00	
+34.78	269.08	268.25	267.34	266.44	
+42.16 P.C.	268.25	266.88	265.50	264.12	
1					
2					
3					
4 = E.A.C.	262.75	262.28	261.41	261.34	261.25
1					
2					
3 B.R.K.	261.34	260.37	259.30	257.75	
4					
5 - E.C. 300	259.30	257.75			
+36.26					

261.02 N.W. Sunset & Wilherbe					
12.64					
273.56	W 270.75	269.91	269.08	268.25	266.88
12.39					
261.47					
3.02					
264.49					
261.02 S.S. + With	266.50	264.12	262.75	262.28	261.81
12.17					
273.19					
11.38					
261.81					
1.41					
263.22					
12.54					
250.63					
0.49					
251.42					

2209.14	268.13	268.11	266.09	265.05	264.06	263.04	262.02
4.05	5.06	6.08	7.10	8.11	9.13	10.15	11.17
4.05	4.66	5.41	6.27	7.14	8.03	8.92	9.82
00	+0.40	+0.27	+0.08	-0.08	+0.20	+0.07	.45
	+0.34	+0.15	+0.10	-0.32	-0.12	-0.24	.00

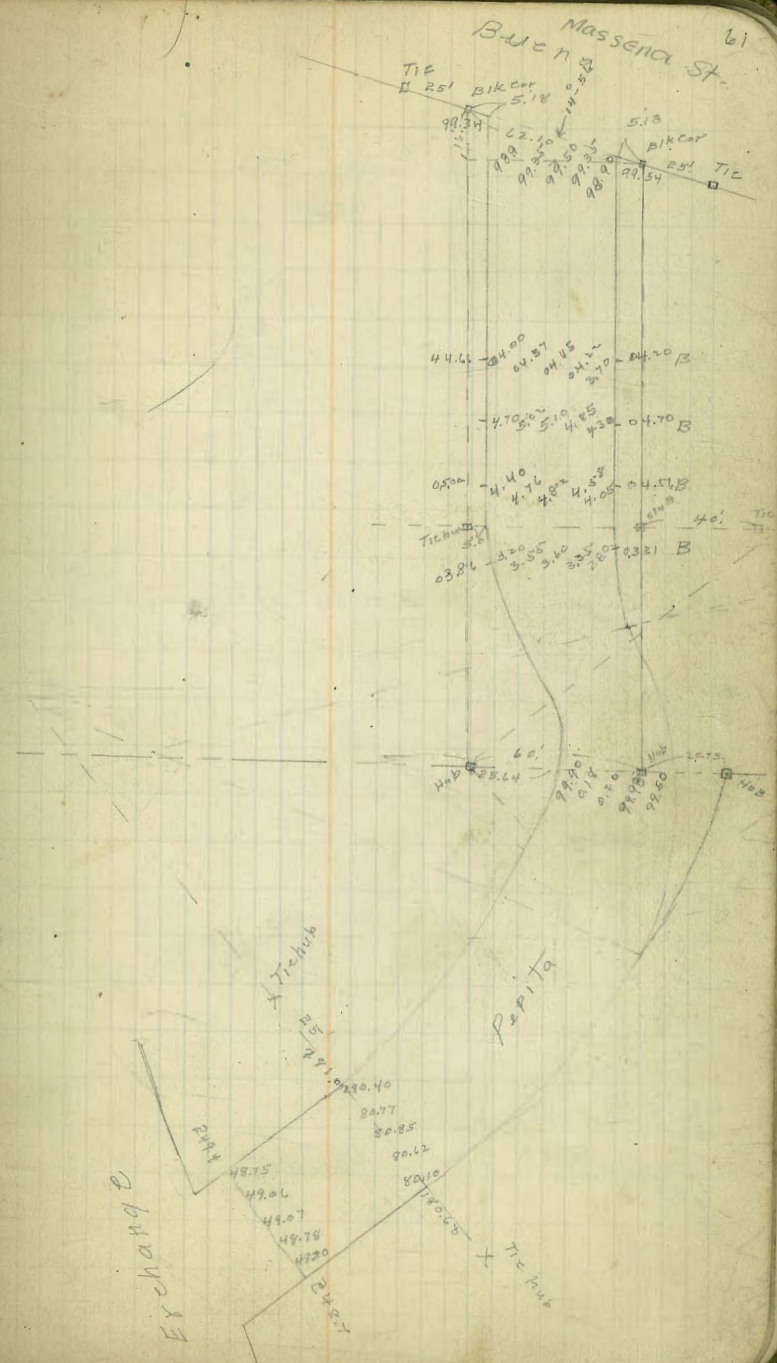


N 253.00	248.50	242.50	241.50
10.22	2.72	8.92	9.92
10.13	2.36	7.13	9.92
+0.03	+0.04	+1.79	chk on ct
S 258.34	249.17	243.50	
19.88	2.25	7.91	
10.02	8.10	6.75	
-0.16	+0.45	+1.17	

Pepita St
Grading & Paving
W. line W. of

4107 41.00	299.75	299.5
42.15	300.92	
784.10	302.10	
1429.15	303.27	
	304.4	304.2
BK 2433.20	305.25	305.0
BK 2482.20	304.75	304.5
RC 3110.25	303.4	
BK 3432.20	303.25	303.00
RC 3452.20	302.00	
367.20	301.15	
FL BK 3482.20	300.25	300.00
4406.70	298.0	
4731.20	295.7	
RC 4455.7	293.4	
4779.55	291.3	
5201.40	289.2	
5424.25	287.1	
5447.30	285.0	
5469.95	282.9	
5492.80 FT. BK	280.75	280.5

25th Exchange



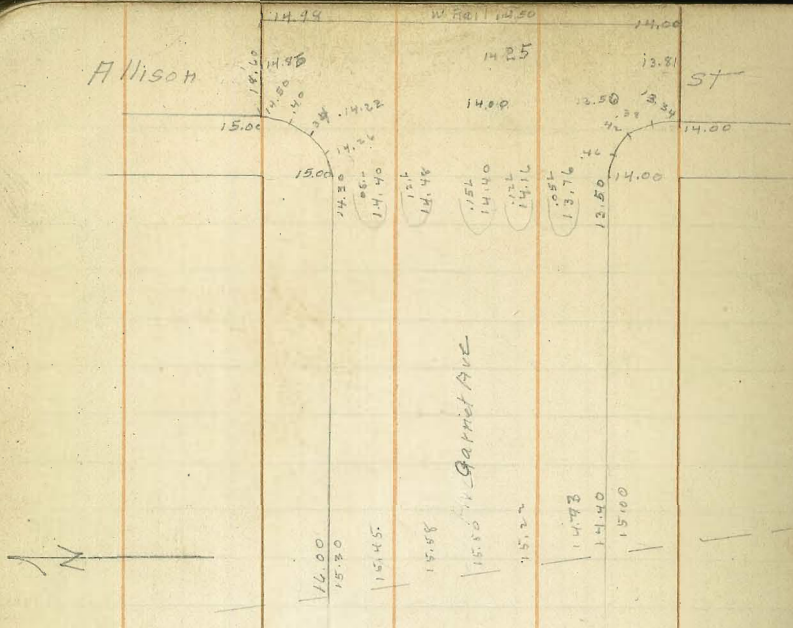
cc Name	E Line	E cl
00-Nunc Bunch on E	299.75	299.5
+59.05 43.05	301.4	
H02.10 43.05	302.6	
H45.15 43.05	303.8	
1+88.20 Brk 10	304.95	304.7
2+48.20 Brk 50	305.65	305.4
2+78.20 Brk 28.15	305.25	305.0
3+26.35 RC 21.95	304.4	
3+48.20 Brk 21.33	303.75	303.5
4+69.56 21.33	302.5	
3+90.89 RC 10	301.3	
4+00.89 Brk on P.L 10	300.75	300.5
4+10.98 21.22	299.5	
5 21.22	296.4	
2	298.2	
3	290.1	
4	286.9	
5	283.8	
80-545 of Pouch - Brk 4	281.25	281.0

BR245.83 Repita & Exchange									
11.18									
257.01 0.35	W	299.7	300.9	302.1	303.3	304.4	Brk	305.2	Brk
256.66		7.5	6.3	5.1	3.9	2.8		2.0	
12.42		8.8	6.8	5.2	3.9	3.2		2.7	
269.44 8.31		-1.3	-0.5	-0.1	0.0	-0.4		-0.7	
244.17 23.00	W	304.7	303.9	303.2	302.0	301.1	Brk	300.2	Brk
282.17		2.5	3.3	4.0	5.2	6.1		7.0	
80.5		2.1	2.5	3.5	4.2	5.6		6.8	
281.2		10.4	10.8	10.5	11.0	10.5		10.2	
12.45									
274.57 9.37	W	298.0	295.7	293.4	291.3	289.2		287.1	
294.20		9.2	11.5	1.2	3.3	5.4		7.5	
12.78		8.4	10.6	1.0	3.8	5.0		8.0	
307.18		10.8	0.9	10.2	-0.5	-0.4		-0.5	
7.25									
297.93	W	285.0	282.9	280.7	271.2	261.6		252.10	
8.95		9.4	11.7	1.5	11.0	7.9		4.9	
308.74		10.7	12.4	3.3	2.3	9.6		4.3	
71.3		-0.9	1.7	-1.8	+3.1	-1.7		0.0	
	W	242.6							
	E	299.7	301.4	302.6	303.8	304.9	Brk	305.6	Brk
		9.1	7.4	6.2	5.0	3.9		3.2	
		8.9	6.9	5.5	4.1	2.7		1.4	
		10.2	10.5	10.7	10.9	1.2		7.8	
	E	305.2	304.4	303.7	302.5	301.3	Brk	300.7	Brk
		3.6	7.4	5.1	6.3	7.5		8.1	
		1.5	1.7	1.7	3.0	4.9		5.9	
		+2.1	+2.7	+3.4	+3.3	+2.6		+2.2	
	E	299.5	296.4	293.2	290.1	286.9		283.8	
		9.3	12.4	15.6	4.5	7.7		10.8	
		7.4	10.3	13.0	2.5	4.6		4.8	
		+1.9	+2.1	+2.6	+2.0	3.1		+6.0	
	E	281.2	272.0	263.1	254.1	245.20			
		13.4	10.2	6.4	2.9				
		9.7	3.1	3.1	1.2				
		3.7	+7.1	+3.3	+5.7				

Pepita Curb Stakes

		W. cl	E. cl	W. cl	
245.83					
8.92					
254.75	1E	+0.60	+0.18	X +0.27	+0.63
0.33					
254.42					
12.87					
267.29		-0.10	+0.23	X +0.36	+0.84
0.46					
266.83		-0.14	+0.04	BK -0.11	+0.05
12.78					
279.61		0.0	+0.10	BK +0.10	+0.10
0.24					
279.37		+0.17	+0.15	BK +0.04	0.0
2.40					
281.77	PE	-0.43	-0.20 ^{W. cl}	X -0.0	+0.16
0.10					
291.67					
12.40			-0.19	X -0.06	+0.13
304.07					
1.39					
302.68		-0.39	-0.05	X 0.0	-0.03
5.57					
308.25		+0.03	+0.08	-0.08	+0.14
6.08					
302.17	BM				
NE. Curb Stakes		-0.38	+0.07		
Top Hydr		-0.20	-0.07		
		-0.07	+0.05		
		-0.38	+0.20		
		-0.46	+0.40		
		-0.69	+0.45		
		-0.31	+0.10		
		-0.42	+0.13		
	B/E	-0.35	0.0		
	X	-0.20	-0.02		
	X	+0.04	-0.14		
	X	-0.23	+0.07		
	X	-0.30	+0.15		
	BW X	-0.40 ^{W. cl}	+0.35 X		
	X	+0.08			
	X	+0.25			
	X	+0.20			
	X	+0.18			
	BK X	-0.32	+0.40		

Allison



Gannet Ave Paving

14.08 BM. SE Allison & Gannet

4.94
19.02

28.54 BM. Gannet & Cass

8.13
30.67

4.27

25.40

28.34

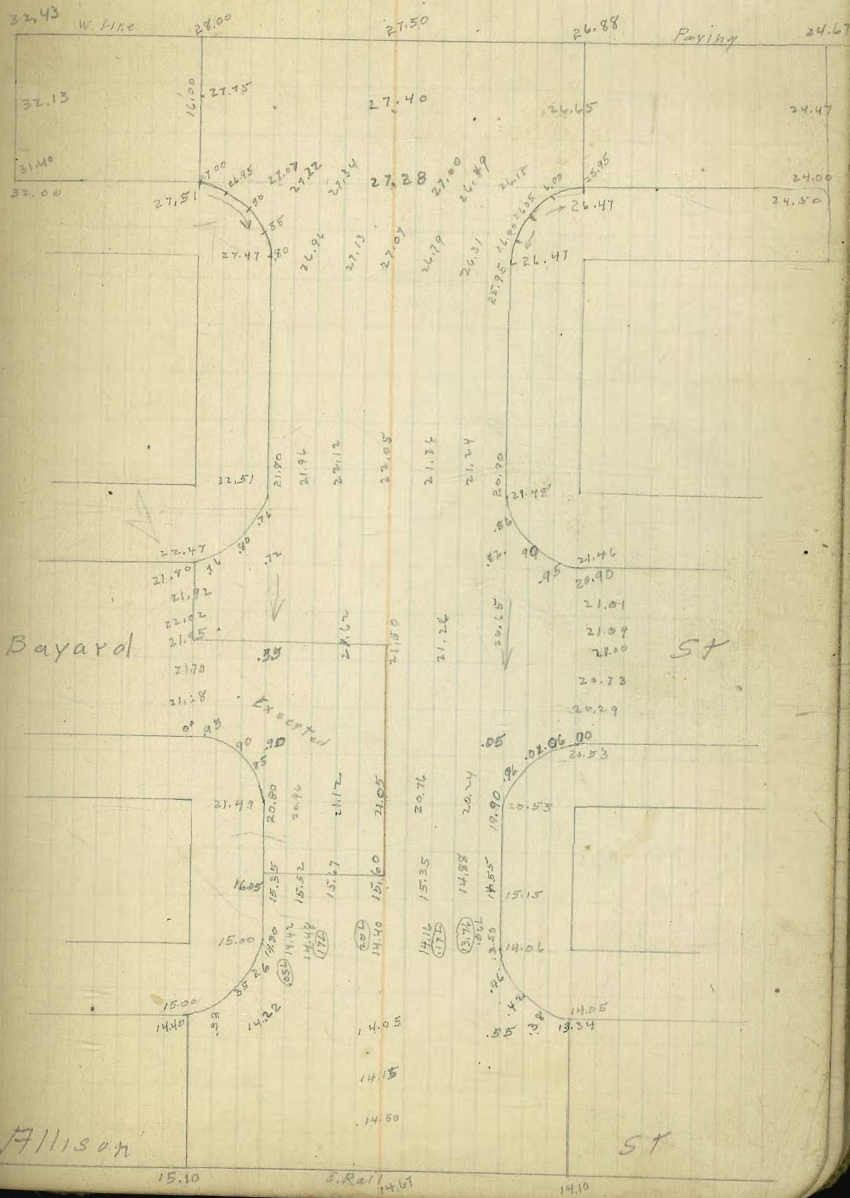
4.90

33.34

28.51

64

CASS



Allison

ST

Jefferson St Grading

Culverts

Flowline C.B. #1 = E. end Culvert #1.

" " " " #2 = W. " " " " #1 = End Culvert 2

78.09 B.M. E. Estudillo + La J Ave

12.70
90.79
0.34

90.41
12.26
102.67
0.04

118.83
11.76
113.74
2.52

111.27
18.33
101.60

102.03
7.67
109.70

w. end Cul #1
Lower 1/10
11.57
91.10
11.67
11.57
+0.10

E. end Cul #3
lowered 1.75

99.25
+3.42
0.64

113.50
9.10
3.34
+2.16
100.50
9.2
8.5
+0.7

84.15 E.M. NE Bandini + La J Ave

13.01
77.16
7.14

99.02
12.56
111.58
0.29

111.29
12.94
124.27
0.04

124.23
13.04
136.27
1.31

134.96 B.M. 1st + Bandini + Jeff

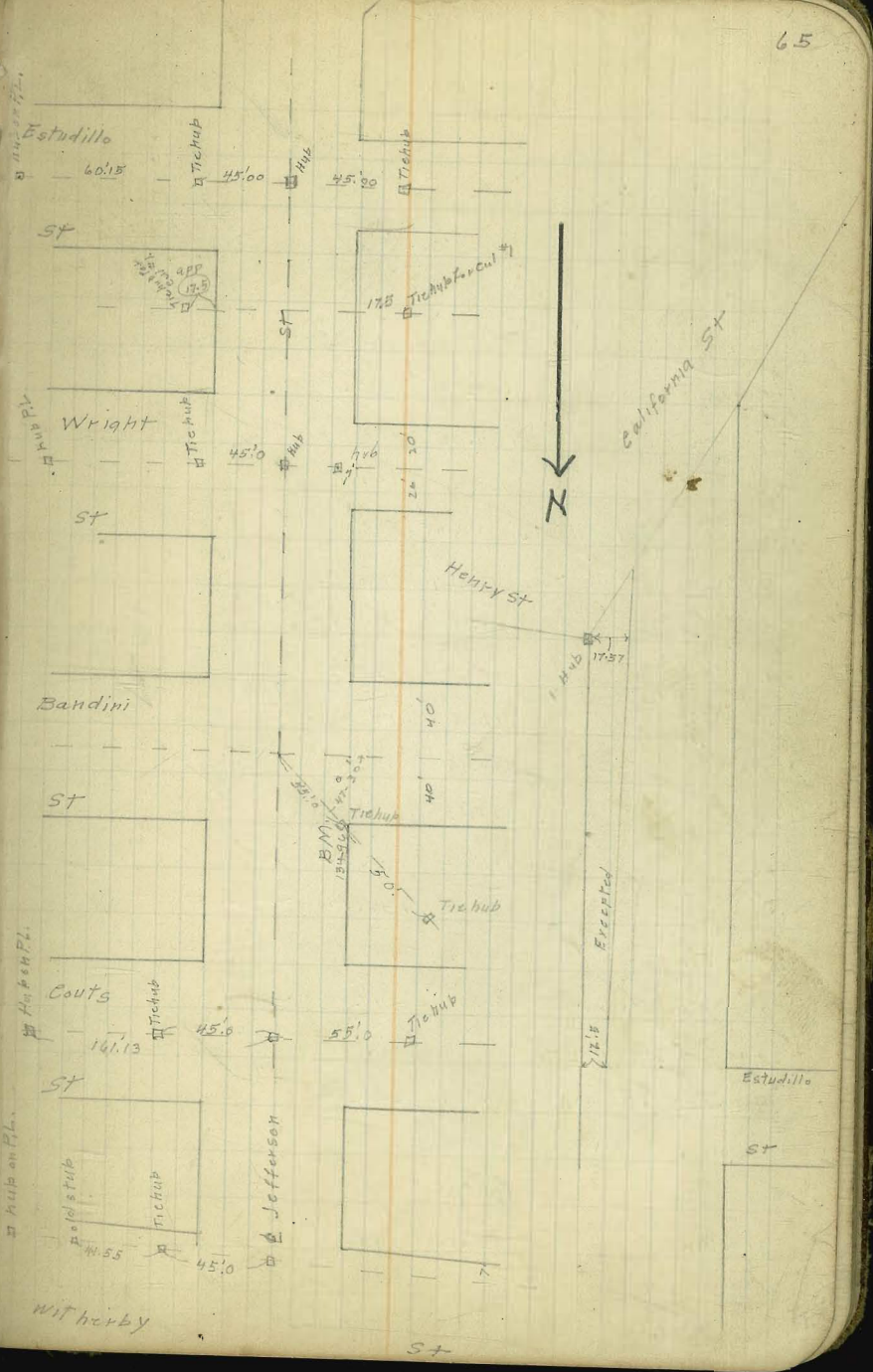
8.68
143.54

Culvert No 4

W. End

119.5
119.5
6.77
117.50
6.77
6.70
0.07

139.5
4.74
2.18
+1.32



	E. ch	W. ch
White Calif		134.10
+10 Brk		136.65
+30 v		135.33
+50 v		138.75
+70 v		140.33
+90 Brk		140.33
+140		140.58
+190 Brk		138.58
+190		140.00
+190 Brk	138.86	136.50
+240	134.70	135.50
+290	134.00	133.00
+340	130.23	129.20
+400		126.45
+400	122.67	121.60
+420 Brk	120.78	119.78
+440 v	119.47	118.47
+460 v	119.38	118.38
+480 W	120.45	119.45
+500 v	122.73	121.73
+560	131.32	130.32
+620	139.91	138.91
+680 Brk	148.50	147.50
+740 old S. line Wright	150.50	147.50
+800 News		149.50
+860 New N. #100		149.50
+920 4 400 old N " " "	150.50	149.50
+980	149.75	148.75
+1000 Brk	149.00	148.00

W	134.35 15.4	135.6 14.3 18.0 -3.7	137.50 12.4 16.1 -3.7	138.6 +3.0 5.1 -2.1	138.8 +3.2 4.1 -9.3	139.3 +2.7 3.1 -6.5 -8.5
W	135.8 +0.2 6.4 -6.8 10.2	133.3 2.3 8.3 -6.0 9.0	129.6 6.0 48 -2.8 3.0	125.7 9.9 10.3 -0.4 5.0	121.9 0.6 1.1 -0.5 6.4	118.7 2.4 7.0 -3.0 9.5
-78 E	136.9 13.0 0.0 +13.0 11.4	134.3 13.6 4.6 +9.0	130.6 17.3 8.4 +8.7	126.7 21.2 11.7 +9.5	122.9 12.7 4.0 +5.7	119.7 14.5 10.6 +3.9
W	118.6 +4.0 12.8 -7.6 109.70	119.70 13.3 4.6 12.2 12.2	122.0 13.3 28.0 37.5	130.6 2.1 10.5 -8.4 13.0	139.2 6.0 10.0 -4.0 6.0	147.8 +2.6 9.4 -12.4 +7.4
E	119.5 3.0 12.0 13.3	120.2 3.0 7.0 13.3	123.0 +13.3 4.2 -17.5 21.3	131.5 13.7 10.6 3.2	140.1 16.8 2.7 14.1	150.7 15.3 8.5 +14.2 +13.0
W	149.8 3.2 10.1 -6.9 3.87	149.00 4.00 10.1 -5.2 10.2	148.25 4.7 7.7 -1.5 10.5	149.25 4.8 7.4 +9.5	148.75 4.8 7.4 +7.2	
E	150.7 5.34 149.86	150.00 12.3 2.1	149.25 14.00 4.5	148.75 14.8 7.4		
	120.25 0.30 119.95 12.72 132.67 0.20 132.47 12.72 145.19 0.74 144.45 12.42 156.87 5.16 151.71 12.29 149.00					290 177 96
	151.71 1.34 153.05					

	<u>Ed</u>	<u>W.Cl</u>
1700 Brk	149.00	148.00
+50	147.00	146.00
2100	145.00	144.00
+50	143.00	142.00
3100 S. Line Bandini	141.00	140.00
00 = N. Line Bandini	142.00	141.00
+60 Brk	143.50	142.50
+100	143.79	142.79
+50	144.15	143.15
2100 Brk	144.50	143.50
+50	143.75	142.75
3100 S. line Couts	143.00	142.00
00 = N. line Couts	141.00	140.00
+60	139.50	138.50
1420	138.00	137.00
+85 E = 139.74	137.00	136.00
2150 E	136.00	
2+59.5 W		135.00
1.27		6.77

153.05 12.14	146.3	144.3	142.3	140.3	141.3	142.9
140.41 W	6.7	8.7	7.7	0.3	70.7	2.0
8.23	13.0	13.2	12.1	12.1	4.8	5.2
140.63	-3.3	-4.5	-9.3	-11.8	-5.0	-3.2
5.28	2.44	5.11	14.0	8.0	5.07	5.07
154.95						
<u>134.96</u>	E 147.2	145.2	143.2	141.2	142.2	143.7
	1.8	7.8	9.9	11.9	10.8	12.7
153.05	5.1	4.0	6.4	11.7	5.5	5.2
3.47	4.7	+3.8	+3.4	+0.1	+7.3	+7.5
149.58	143.1	143.4	143.8	143.0	142.3	142.8
7.45	5.3	5.2	4.0	1.7	2.7	4.0
157.03	3.7	4.2	4.7	5.0	7.3	11.3
	-3.7	-3.9	-3.2	3.9	4.9	6.9
139.90	2.44				(10.4)	(9.0)
7.72						
149.74	E 144.0	144.4	144.7	144.0	143.2	141.2
11.01	12.4	12.0	11.7	12.4	13.2	15.2
133.73	5.1	5.8	5.2	4.6	4.9	7.9
1.21	+7.3	6.2	+6.5	+7.8	+8.3	+7.3
134.74		137.3	136.3	135.3		
0.30		+2.4	6.4	+0.4		
134.44		7.0	5.5	11.1		
12.64		-9.4	-9.9	-11.5	W 140.00	139.70
147.78		14.0	17.3	17.3	6.5	6.8
0.36		9.1	10.1	11.1		
140.92	E 138.2	137.2	136.2			
9.51	13.3	12.8	11.5			
156.43	+7.8	+7.3	+7.6			
142.2						
17.2						
7.8	W 141.00	142.50	142.80	143.15	143.50	142.75
7.1	5.5	4.0	3.7	3.4	3.0	3.8
134.96	5.5	4.0	3.7	3.4	3.0	1.6
11.58						+2.0
<u>146.50</u>	E 142.00	143.50	143.80	144.15	144.50	143.75
	4.5	3.0	2.7	2.4	2.0	2.8
		3.0	2.7	2.4	2.0	2.8
	5 cents					
	W 142.00	140.00	138.50	127.00	134.00	138.00
	4.5	6.5	8.0	9.5	10.5	11.5
	4.5	6.5	8.0	9.5	10.5	11.5
	E 143.00	141.00	139.50	138.00	137.00	136.00
	3.5	5.5	7.0	8.5	9.5	10.5
	3.5	5.5	7.0	8.5	9.5	10.5

142.9
5.7
7.3
3.6

6.7

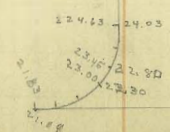
58m
N. Ban - 60 - Brk

5 Bandini 44 cent.

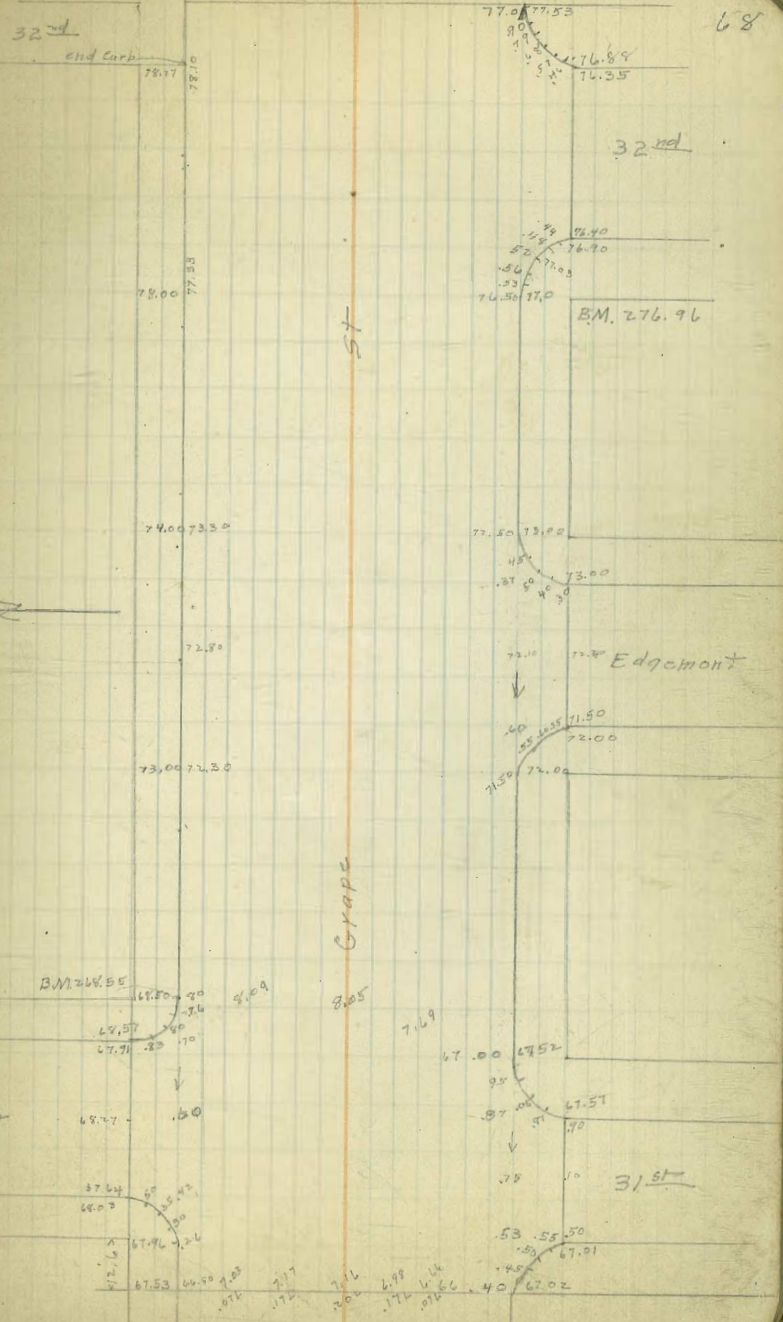
F14 1911

Grapt 3 R Paving

74.00	70.35	276.96 4.57 281.53 10.70 270.83 0.87 271.70 12.27 259.41 0.41 260.02 12.11 247.35 0.37 247.74 1.16 235.66 0.13 235.19	276.96 2.27 279.23 12.27 266.96 0.84 267.20 12.92 254.28 0.90 255.08 12.00 242.08 0.22 242.30 1.80 229.50 1.08 230.58
135'	74.23-74.83		
100'	71.48		
100'	70.24		
60'	64.36		
60'	62.57-62.07		
70'	55.87		
50'	53.57		
50'	51.27		
40'	48.82		
40'	46.38		
40'	44.36		
40'	40.95		
100'	24.03		



FW



31st

31st

B.M. 276.55

B.M. 276.96

68

GRAPE ST Paving

31st

ST

	67.00	66.70	1.00	1.17	1.16	1.14	1.16	66.43	67.02	
			.014	.174	.204	.174	.074			
260.0	1.35	2.54	2.75	2.74	2.51	2.24	1.73		262.3	
261.0	0.95	0.83	0.73	0.72	0.84	0.95	9.63		260.2	
259.6	0.75	0.55	0.32	0.29	0.37	0.43	9.43		259.0	
258.5	0.45	0.23	0.12	0.11	0.12	0.12	7.33		257.9	
257.8	0.15	0.25	0.17	0.19	0.27	0.23	6.13		257.2	
257.2	0.55	0.75	0.97	0.99	0.77	0.62	6.03		256.6	
256.4	0.15	0.15	0.19	0.20	0.27	0.23	5.63		256.2	
256.6		.02	.26	.27	.06	.03			256.0	
256.5	5.82	6.00	6.24	6.23	6.00	5.83			255.7	
256.6	5.95	6.15	6.33	6.33	6.17	5.93			256.0	
256.8	6.15	6.35	6.53	6.53	6.37	6.13			256.2	
257.2	6.50	6.69	6.87	6.87	6.69	6.50			256.5	
257.8	7.00	7.17	7.34	7.34	7.17	7.00			256.8	
258.4	7.45	7.64	7.82	7.82	7.64	7.45			257.6	
258.95	8.25	8.44	8.62	8.62	8.44	8.25			257.95	

8.25
6.50
14.75

150

GRAPE ST

Fern ST

8/21/25

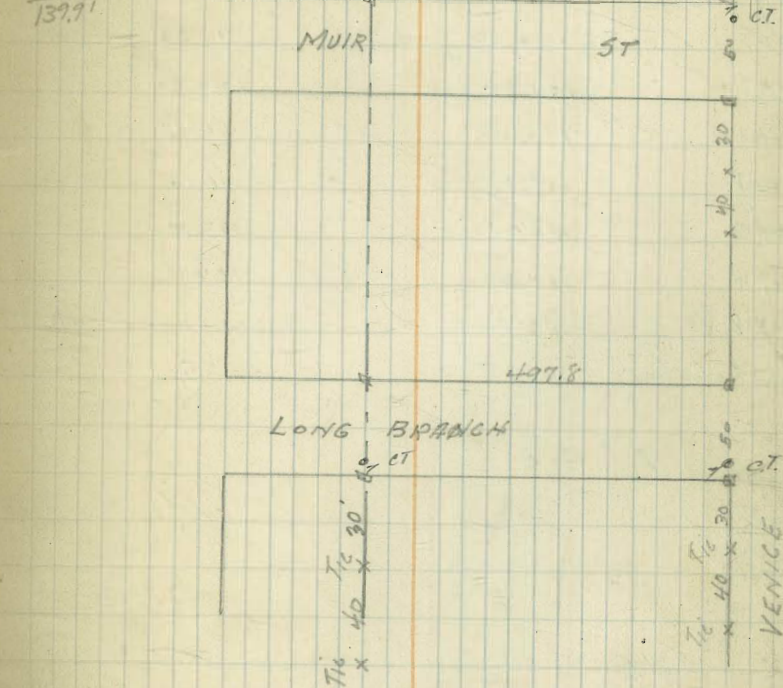
GRADES ON
LONG BRANCH.
Venice to 497.8 W of Venice

	S.L.	N.L.
W.L. of Survey -	123.25	122.25
0 + 59.3	130.23	129.23
1 + 18.6	137.21	136.21
1 + 77.8	144.19	143.19
2 + 07.8	147.06	146.06
2 + 37.8	148.59	147.59
2 + 67.8	148.80	147.80
2 + 97.8	147.67	146.67
3 + 47.8	144.69	143.69
3 + 97.8	141.71	140.71
4 + 47.8	138.73	137.73
4 + 97.8 = W.L. Venice	135.75	134.75

62
57x

BP 3E. Guizot + Bright 7 BM 125.75 on 30' Tie Hub
at West End.

	N					
	122.25	129.23	136.21	143.19	146.06	147.59
	7.8	2.8	2.2	3.6	5.8	4.2
	8.4	1.5	6.6	7.6	5.8	5.1
	+7.4	+1.3	+1.6	+1.0	0.0	-0.9
	123.25	130.23	137.21	144.19	147.06	148.59
	8.8	1.8	7.2	7.6	4.8	5.1
	8.4	+1.01	5.5	6.4	4.1	5.1
	+2.1	+1.9	+1.7	+1.2	0.7	



N	147.80	146.67	143.69	140.71	137.73	134.76
	4.0	5.2	8.1	11.1	2.2	5.2
	5.4	6.1	9.0	12.3	4.0	7.0
	-1.4	-1.0	-0.9	-1.2	-1.8	-1.3
S	148.80	147.67	144.69	141.71	138.73	135.75
	3.0	4.2	7.1	10.1	13.1	4.2
	2.2	+1.0	3.5	6.5	9.7	1.9
	+0.8	+2.2	+3.6	+8.0	3.4	+2.5

8/21/25

Grades on
Muir Ave
from Venice to 497.8' West of Venice
S.L. N.L.

W.L. Sunset
Grove Tract

0+53.9	106.45	105.45
1+07.8	112.52	101.52
1+32.8	118.61	117.61
1+57.8	120.93	119.93
1+92.8	122.21	121.21
2+09.8	122.53	121.53
2+56.13	121.82	120.82
3+04.47	119.48	118.48
3+52.80	117.13	116.13
4+01.14	114.79	113.79
4+49.47	112.44	111.44
4+97.8 = W.L. Venice	110.10	109.10
	107.75	106.75

112.27
5.07
1734
10369

130.91 A.D. from last page

8M 119.51 on 70' Tia @ 71

128.66	N	10.545	11.55	117.61	119.93	121.21	121.53
127.52							
115.91	on 30' Tia of Venice	9.5	34	7.8	6.5	6.2	
239		150	94	47	7.0	8.3	
118.30		152	101	-1.3	-2.1	-2.1	
0.59	S	10.45	11.52	118.61	120.93	122.21	122.53
11771		146	8.5	24	6.8	5.5	5.2
1002		101	39	10.1	4.0	2.7	1.7
1773		+4.5	+7.6	+2.8	+2.8	+2.8	+3.5
763							
11810	N	120.82	115.48	116.13	113.79	111.44	109.10
293		69	9.3	11.6	4.5	6.9	7.2
12103		70	10.5	13.5	6.6	8.3	10.2
		-2.1	-1.5	-1.9	-2.1	-1.4	-1.7
	S	121.82	119.48	117.13	114.79	112.44	110.10
		59	8.3	10.6	12.9	5.9	8.2
		11	32	5.9	3.6	1.2	3.5
		+4.8	+5.1	+4.7	+4.3	+4.7	+4.7
	N	106.75					
		115					
		156					
		-2.1					
	S	107.75					
		10.5					
		5.8					
		+4.7					

Fifth St Grades (4200)
Orange to El Cajon

	w Prop	w el	e el	e Prop
00-5 line El Cajon	364.45	364.2	363.9	364.15
+50	364.35			364.05
100	364.25			363.95
+50	364.15			363.85
200	364.05			363.75
+50	363.95			363.65
300	363.85			363.55
+50	363.75			363.45
400	363.65			363.35
+50	363.55			363.25
500	363.45			363.15
+50	363.35			363.05
600- Kline Orange	363.25	363.0	362.7	362.95

363.00 B.M. B.P. NW Orange & 5th St

	W	E	W	E
364.20	3.68			
364.35	3.5	2.6		
364.25	3.1	3.9		
364.15	3.7	4.3		
364.05	3.8	4.4		
363.95	3.9	4.7		
363.85	4.3	4.1		
363.75	4.4	4.5		
363.65	4.5	4.0		
363.55	4.1	3.4		
363.45	4.2	3.1		
363.35	4.3	2.7		
363.25	4.5	2.1		
363.15	4.5	1.1		
363.05	4.5	0.5		
363.00	4.0	0.0		
362.95	4.1	0.5		
362.85	4.8	0.0		
362.75	4.5	0.0		
362.65	4.2	0.0		
362.55	4.3	0.0		
362.45	4.3	0.0		
362.35	4.3	0.0		
362.25	4.3	0.0		
362.15	4.3	0.0		
362.05	4.3	0.0		
362.95	4.3	0.0		

9/8/25 Sewer Construction La Playa
 mill. San Geronimo, San Fernando, Rosecrans, San
 Antonio Laurence, Mc Call Nichols & Owens ST
 San Antonio

000 M.H. & Mc Call	5.00	9.60	4.60				
San Antonio			6.01	3.59	-1.60		+ 5.19
+ 47.8			7.85	1.75	-1.23		+ 2.98
+ 95.6			10.08	-0.48	-0.86		+ 0.38
1+43.4			9.27	0.33	-0.49		+ 0.82
1+91.2			6.84	2.76	-0.12		+ 2.88
2+39.0			5.06	4.54	+ 0.25		+ 4.29
2+86.8			2.60	7.00	+ 0.62		+ 6.38
00 3+34.5	M.H. of San Antonio 447.5 of N. Head Laurence.	6.97 11.57	3.40 5.39	4.60 6.18	2.70 +1.00		+ 5.18
+ 47.2			4.27	7.18	1.40		+ 3.78
+ 74.4			4.42	7.15	1.80		+ 5.35
1+41.6			3.87	7.70	2.20		+ 5.50
1+88.8			2.06	9.51	2.60		+ 6.91
2+36.0 DE			1.15	10.42	3.00		+ 7.42
LAURENCE ST LINE							
000 San Antonio M.H.			5.39	6.18	1.00		+ 5.18
B+K +25			4.11	7.46	2.50		+ 4.96
+ 73.33 T.P.	12.47	23.99	0.05	11.52	6.58		+ 4.94
1+21.67			8.40	15.59	10.66		+ 4.93
1+70			4.27	19.72	14.74		+ 4.98
2+18.33 T.P.	12.62	36.45	0.16	23.83	18.82		+ 5.01
2+66.67			8.54	27.91	22.91		+ 5.00
3+15=B+K			4.56	31.81	27.00		+ 4.81
3+51.5			1.91	34.54	28.50		+ 6.04
3+88=M.H. Rosecrans			0.67	35.78	30.00		+ 5.78
T.P. 12.52	48.61		0.36	36.09			

This line put WEST of
 Mc Call
 saving putting pavement

7) 265
 27

7) 355-6
 47.79

3 2 71 73
 332.6

25.07
 1.36

Laurence St Con

48.61

000 M.H. in Rosecrans St					30.00	+5.78
2202			11.94	36.67	31.59	+5.08
1-71.4			7.68	40.93	35.67	+5.26
1+228 T.P.	12.64	60.84	3.42	45.19	39.75	+5.44
			0.41	48.20		
1+74.2			11.32	49.52	43.83	+5.69
2+25.6			7.01	53.83	47.91	+5.92
2+77.0 Brk T.P.	12.57	73.13	2.77	58.07	52.00	+6.07
			0.28	60.56		
3+122.5 Brk MH & San 81/10 St			12.20	60.93	53.75	+6.18
3+37.5 Brk MH & San 81/10 St			12.42	60.71	55.00	+5.71
+50			8.94	64.19	59.14	+5.05
1+00			4.56	68.57	63.28	+5.29
+50 T.P.	12.44	85.45	0.12	73.01	67.43	+5.58
2+00			7.99	77.46	71.57	+5.89
+50 T.P.	8.08	93.45	3.58	81.87	75.71	+6.16
			0.08	85.37		
3+00			7.20	86.25	79.85	+6.40
San 81/10 St						
3+50 M.H. Fernand St			5.12	88.33	84.00	+4.33
T.P.			0.26	93.19		

McCall St Line

51.29

38.14

B.M. N.W. McCall & Rosecrans

Connection with 2 1/2" King Pipe 00: 40' M.H. Rosecrans	13.15					
			10.41	40.88	36.80	+4.08
+57			5.62	45.67	41.04	+4.63
1+14 T.P.	12.94	63.49	0.74	50.55	45.28	+5.27
1+11			8.07	55.42	49.52	+5.90
2+28			3.23	60.26	53.76	+6.50
2+55 M.H. San 81/10 St			0.74	62.75	58.00	+4.75
T.P.	12.83	75.60	0.72	62.77		

McCall St (con)
75.60

00-M.H. @ San Elijo St

725 Brk			11.60	64.00	59.00	+5.00
516						
+76.47			5.70	70.70	65.25	+5.15
T.P.	12.92	88.26	0.26	75.34		
1+28.24			11.53	76.73	71.50	+5.23
1+20.			5.70	82.51	77.75	+4.81
T.P.	13.01	101.17	0.10	88.16		
2+31.67			11.70	89.47	84.00	+5.47
2+22.24			5.45	95.72	90.25	+5.47
3+35. Brk			0.49	100.68	96.50	+4.18
T.P.	19 103.83		0.53	100.67		
3+50 M.H. @ San Fernando			2.21	101.62	97.25	+4.37
B.M. @ W Bolt Top Hydr N.E. Cor McCall & San Fernando				104.67		
9.78	174.45			104.67		
+35 Brk			9.45	105.00	99.00	+6.00
191			1.60	112.85	106.80	+6.05
T.P.	12.26	126.42	0.28	114.07		
1+47			5.69	120.74	114.60	+6.14
T.P.	12.46	138.54	0.35	126.08		
2+03			9.92	128.62	122.40	+6.22
2+59			1.90	136.64	130.20	+6.44
T.P.	11.98	150.14	0.38	138.16		
3+15 Brk			5.90	144.24	138.00	+6.24
McCall						
3+50 M.H. @ San Geronimo			4.52	145.62	139.00	+6.62
448.75			2.25	147.87	142.50	+5.39
T.P.	12.79	162.91	0.02	150.12		
+97.50			11.44	151.47	146.00	+5.47
1+46.25			7.82	155.09	149.50	+5.59
1+95 Brk			4.22	158.67	153.00	+5.69
T.P.	12.89	175.38	0.42	162.47		
2+10			9.48	165.90	160.50	+5.40
3+25 Brk			1.26	174.02	168.00	+6.02
3+50 M.H.			0.74	174.64	169.00	+5.64
T.P.	12.59	187.54	0.38	175.00		
4+05			11.64	175.95	170.67	+5.28
4+10			10.12	177.47	172.33	+5.14

		187.59					
5+15 Brk 6.16			8.59	179.00	174.00		+5.00
5+76.67			4.73	182.86	177.00		+5.86
6+38.33 T.P.	12.14	197.73	0.40 0.00	186.79 187.59	180.00		+6.79
7+00 MH			10.14	189.59	183.00		+6.59
+50			8.30	191.43	185.43		+6.00
8+00			5.60	194.13	187.86		+6.27
+50			2.93	196.80	190.29		+6.51
9+00 T.P.	13.00	212.63	0.30 0.10	199.43 199.63	192.72		+6.71
+50			10.50	202.13	195.15		+6.98
10+00			7.88	204.75	197.58		+7.17
10+50 MH & Perry (2)			5.99	206.64	200.00		+6.64
11+14 T.P.	12.24	224.67	1.97 0.20	210.64 212.43	205.40		+4.86
11+78			8.16	216.51	211.60		+4.91
12+42 T.P.	12.44	236.71	2.42 0.40	222.25 224.27	217.40		+4.85
13+06			8.63	228.08	223.20		+4.88
13+70 Brk T.P.	8.06	243.33	2.85 2.44	233.86 234.27	229.00		+4.86
14+00 MH & Aqualtough			4.76	238.57	229.80		+8.77
14+65 DE			0.35	242.98	232.00		+10.98

Michels St

	12.72	50.86		38.14			N.W. 1/2 Calla Rosecrans
00 1/2 M.H. 12' E. of W. Line Rosecrans			9.06	41.80	38.00		+3.80
+52 T.P.	12.75	62.65	0.96	49.90	43.17		+6.73
1+04			7.72	54.92	48.34		+6.59
+56 T.P.	12.78	74.91	2.38 0.52	60.27 62.13	53.51		+6.76
2+08			9.69	65.22	58.67		+6.55
+60			5.32	69.59	63.84		+5.75
3+12 Brk T.P.	12.10	86.13	0.88	74.03	69.00		+5.03

86.13

8

00-M.H. & San Eljo		10.19	75.94	69.50
+57.5		4.86	81.27	75.37
1+15 T.P. 12.84		97.85	1.12	85.01
+72.5		9.50	88.35	87.12
T.P. 12.60	110.51	0.00	97.85	93.00
2+30=DMH		8.87	101.64	101.00
T.P. 12.33	121.36	1.48	109.03	
+45		3.68	117.68	107.50
+90=BRK		0.62	120.74	114.60
1+20=MH & San Fernando		0.17	121.19	115.00

OWENS & San Fernando ST. LINE

146.72

00=D.F.		0.04	146.68	141.00
+50.17		5.04	141.48	136.00
1+00.34		10.35	136.37	131.00
T.P. 0.12	134.07	12.77	133.95	
1+50.5 BRK		2.29	131.78	126.00
1+91. MH & Owens		3.47	130.60	125.00
2+31 BRK	0.24	6.97	127.10	123.00
2+28		12.96	124.51	115.4
3+45		2.13	119.62	
4+02	0.22	9.44	112.31	107.8
4+59		11.52	107.33	100.2
5+16 BRK T.P. 0.40	96.91	4.58	104.93	
5+41 MH & San Eljo		12.03	77.48	72.6
		13.00	96.51	85.00
		6.92	90.09	
		8.71	88.30	83.50
5+76 BRK		10.14	86.77	82.00
T.P. 0.27	84.39	12.91	84.00	
1+24.33		4.18	80.21	75.58
6+76.67		10.86	73.53	69.15
T.P. 0.11	71.79	12.71	71.48	
7+27		4.82	66.97	62.74
7+77.33		11.30	60.49	56.32
T.P. 0.25	59.13	12.91	58.88	
8+27.67		5.24	53.89	49.91
			43.50	
8+78.00		10.50	48.63	42.00
DMH TARGOCHAS				

4.90
129.17 B.P. SE San Fernando & Owens

77

+6.44

+5.90

+3.76

+1.23

+8.64

+0.64

+10.18

+6.74

+6.79

+5.68

+5.48

+5.37

+5.78

+5.69

+4.10

+4.24

+4.51

+4.73

+4.88

+5.09

+4.70

+4.77

+4.63

+4.63

+4.38

+4.23

+4.17

+3.98

+5.13

+6.63

121.36

8.16

113.20

0.85

114.05

9.31

104.74

104.76

N.E. McColl's San Fern

121.19

13.07

134.26

0.31

133.95

12.77

146.72

59

41.80

71

32

59.13

49.90

9.23

71

32

59.13

49.90

9.23

PAVING FOOTAGE
THORN BRANT & SPRUCE 28

Now
216.2' curb on Brant S. of Spruce E. Side

THORN East of Brant.

43.9 x 10.5	439 105 2195 439 26095	460.95 ✓
43.9 x 25		1097.5 ✓
43.9 x 25		1097.5 ✓
43.9 x 25		1097.5 ✓
43.9 x 25		1097.5 ✓
		4848.45 ✓

BRANT THORN TO SPRUCE

49.8 x 155	498 155 1168.75	✓
49.8 x 25 - (25 x 3)	1170.0	✓
49.8 x 25 - (25 x 3)	1170.0	✓
49.8 x 20.8 - (20.8 x 3)	993.44	✓
43.85 x 50.8 - (51 x 3)	2274.58	✓
	14275.77 ✓	

SPRUCE INTERSECTION

17.1 x 27.9	477.09 ✓
8 x 51.9	415.2 ✓
13.7 x 36.2	496.62 ✓
46.5 x 32.9	1529.85 ✓
16" out. add 2.44	64.17 ✓
	11.14 ✓
	2994.07 ✓

SPRUCE BRANT TO 100 W

51.9 x 50.4	519 504 2615.76	✓
51.85 x 50	2592.50	✓
	5208.26 ✓	

BRANT ST. S. of Spruce

27.9 x 50.7	279 507 1414.53	✓
27.85 x 50	1392.5	✓
27.9 x 50	1395.0	✓
	4202.03 ✓	

1456 12
777° 46.5
95.8
15520
7770
2320
277.9
50.8
15
279
12.1
279
19.53
279.09
477.1
379
498
877
438.6
14275.77
14275.77
17710.77
14710.77
735.1
43.5
69.20
707.0
503
51
153
279
2.3
837
568
64.17

TABLE No. 2
IMPROVED TABLES
AND
INFORMATION

TABLE No. 2
379
25
30.2
13.7
253.75
1108.75
364.625
196.625
15
1200
1200
300
42
150
Brant 216.2
150'

TABLE X.
MIDDLE ORDINATES OF RAILS
Length of Rail (feet)

C o /	R Feet	Length of Rail (feet)							C o	R Feet	Length of Rail (feet)						
		30 Inch	28 Inch	26 Inch	24 Inch	22 Inch	20 Inch	18 Inch			16 Inch	14 Inch	12 Inch	10 Inch	8 Inch		
0-20	17189	.08	.07	.06	.05	.04	.03	8	716.8	1.88	1.64	1.42	1.20	1.01	.84		
0-40	8594	.16	.14	.12	.10	.08	.07	9	637.3	2.12	1.84	1.60	1.35	1.14	.94		
1-0	5730	.24	.20	.18	.15	.13	.10	10	573.7	2.36	2.05	1.78	1.50	1.27	1.04		
1-20	4297	.31	.27	.23	.20	.17	.13	11	521.7	2.59	2.26	1.95	1.65	1.39	1.15		
1-40	3438	.39	.34	.29	.25	.21	.17	12	478.3	3.83	2.47	2.15	1.81	1.54	1.26		
2-0	2865	.47	.41	.35	.30	.25	.20	13	441.7	3.05	2.66	2.30	1.96	1.66	1.36		
2-20	2456	.55	.48	.41	.35	.29	.23	14	410.3	3.30	2.87	2.48	2.10	1.78	1.46		
2-40	2149	.63	.55	.47	.40	.33	.27	15	383.1	3.54	3.08	2.68	2.26	1.91	1.57		
3-0	1910	.71	.62	.53	.45	.38	.31	16	359.3	3.76	3.28	2.83	2.40	2.04	1.67		
3-20	1719	.78	.68	.59	.50	.42	.35	17	338.3	4.00	3.48	3.02	2.57	2.16	1.78		
3-40	1563	.86	.75	.65	.55	.46	.38	18	319.6	4.21	3.67	3.18	2.70	2.28	1.87		
4-0	1433	.94	.82	.71	.60	.50	.42	19	302.9	4.45	3.89	3.36	2.86	2.41	1.98		
4-20	1323	1.02	.89	.77	.65	.55	.45	20	287.9	4.70	4.09	3.55	3.00	2.54	2.09		
4-40	1228	1.10	.96	.83	.70	.59	.48	22	262.0	5.16	4.44	3.84	3.30	2.80	2.29		
5	1146	1.18	1.03	.89	.75	.63	.52	24	240.5	5.64	4.92	4.20	3.59	3.04	2.50		
6	955.3	1.41	1.23	1.06	.90	.76	.62	26	222.3	6.07	5.29	4.58	3.88	3.29	2.70		
7	819.0	1.65	1.44	1.24	1.05	.89	.73										

TABLE XI.
SHORT RADIUS CURVES

Radius Feet	Chord Feet	Central Angle	Deflection Angle	Deflection for 1 Foot
35	10	16-26	8-13	49.3
45	10	12-46	6-23	38.3
50	15	17-16	8-38	34.5
60	15	14-22	7-11	28.8
75	15	11-30	5-45	23.0
100	20	11-30	5-45	17.3
120	20	9-34	4-47	14.3
150	20	7-39	3-49	11.5
190	25	7-32	3-46	9.15
200	25	7-10	3-35	8.6
225	25	6-25	3-12	7.7
240	25	5-58	2-59	7.2
250	25	5-44	2-52	6.9
275	25	5-12	2-36	6.2
288	50	9-58	4-59	6.0
300	50	9-32	4-46	5.7
350	50	8-12	4-06	4.9
376	50	7-40	3-50	4.6
400	50	7-10	3-35	4.3
410	50	7-00	3-30	4.2

To find length of curve divide angle from P. C. to P. T. by central angle of chord and multiply by length of chord.

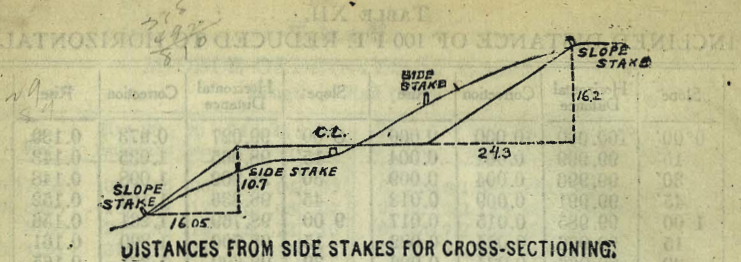
TABLE XII.
INCLINED DISTANCE OF 100 FT. REDUCED TO HORIZONTAL

Slope	Horizontal Distance	Correction	Rise	Slope	Horizontal Distance	Correction	Rise
0°00'	100.000	0.000	0.000	8°00'	99.027	0.973	0.139
15'	99.999	0.001	0.004	15'	98.965	1.035	0.143
30'	99.996	0.004	0.009	30'	98.902	1.098	0.148
45'	99.991	0.009	0.013	45'	98.836	1.164	0.152
1 00	99.985	0.015	0.017	9 00	98.769	1.231	0.156
15	99.976	0.024	0.022	15	98.700	1.300	0.161
30	99.966	0.034	0.026	30	98.629	1.371	0.165
45	99.953	0.047	0.031	45	98.556	1.444	0.169
2 00	99.939	0.061	0.035	10 00	98.481	1.519	0.174
15	99.923	0.077	0.039	15	98.404	1.596	0.178
30	99.905	0.095	0.044	30	98.325	1.675	0.182
45	99.885	0.115	0.048	45	98.245	1.755	0.187
3 00	99.863	0.137	0.052	11 00	98.163	1.837	0.191
15	99.839	0.161	0.057	15	98.079	1.921	0.195
30	99.813	0.187	0.061	30	97.992	2.008	0.199
45	99.786	0.214	0.065	45	97.905	2.095	0.204
4 00	99.756	0.244	0.070	12 00	97.815	2.185	0.208
15	99.725	0.275	0.074	15	97.723	2.277	0.212
30	99.692	0.308	0.078	30	97.630	2.370	0.216
45	99.657	0.343	0.083	45	97.534	2.466	0.221
5 00	99.619	0.381	0.087	13 00	97.437	2.563	0.225
15	99.580	0.420	0.092	15	97.338	2.662	0.229
30	99.540	0.460	0.096	30	97.237	2.763	0.233
45	99.497	0.503	0.100	45	97.134	2.866	0.238
6 00	99.452	0.548	0.105	14 00	97.030	2.970	0.242
15	99.406	0.594	0.109	15	96.923	3.077	0.246
30	99.357	0.643	0.113	30	96.815	3.185	0.250
45	99.307	0.693	0.118	45	96.705	3.295	0.255
7 00	99.255	0.745	0.122	15 00	96.593	3.407	0.259
15	99.200	0.800	0.126	15	96.479	3.521	0.263
30	99.144	0.856	0.131	30	96.363	3.637	0.267
45	99.087	0.913	0.135	45	96.246	3.754	0.271

For each foot take one one-hundredth of each reading.

TABLE XIII.
MINUTES IN DECIMALS OF A DEGREE.

0 30"	.00833	10' 30"	.17500	20' 30"	.34167	30' 10"	.50833	40' 30"	.67500	50' 10"	.84167
1 00	.01667	11 00	.18333	21 00	.35000	31 00	.51667	41 00	.68333	51 00	.85000
30	.02500	30	.19167	30	.35833	30	.52500	30	.69167	30	.85833
2 00	.03333	12 00	.20000	22 00	.36667	32 00	.53333	42 00	.70000	52 00	.86667
30	.04167	30	.20833	30	.37500	30	.54167	30	.70833	30	.87500
3 00	.05000	13 00	.21667	23 00	.38333	33 00	.55000	43 00	.71667	53 00	.88333
30	.05833	30	.22500	30	.39167	30	.55833	30	.72500	30	.89167
4 00	.06667	14 00	.23333	24 00	.40000	34 00	.56667	44 00	.73333	54 00	.90000
30	.07500	30	.24167	30	.40833	30	.57500	30	.74167	30	.90833
5 00	.08333	15 00	.25000	25 00	.41667	35 00	.58333	45 00	.75000	55 00	.91667
30	.09167	30	.25833	30	.42500	30	.59167	30	.75833	30	.92500
6 00	.10000	16 00	.26667	26 00	.43333	36 00	.60000	46 00	.76667	56 00	.93333
30	.10833	30	.27500	30	.44167	30	.60833	30	.77500	30	.94167
7 00	.11667	17 00	.28333	27 00	.45000	37 00	.61667	47 00	.78333	57 00	.95000
30	.12500	30	.29167	30	.45833	30	.62500	30	.79167	30	.95833
8 00	.13333	18 00	.30000	28 00	.46667	38 00	.63333	48 00	.80000	58 00	.96667
30	.14167	30	.30833	30	.47500	30	.64167	30	.80833	30	.97500
9 00	.15000	19 00	.31667	29 00	.48333	39 00	.65000	49 00	.81667	59 00	.98333
30	.15833	30	.32500	30	.49167	30	.65833	30	.82500	30	.99167
10 00	.16667	20 00	.33333	30 00	.50000	40 00	.66667	50 00	.83333	60 00	1.00000



DISTANCES FROM SIDE STAKES FOR CROSS-SECTIONING.

SLOPE 1 1/2 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
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50	75 00	75 15	75 30	75 45	75 60	75 75	75 90	76 05	76 20	76 35	50

Computed by L. Leland Locke.

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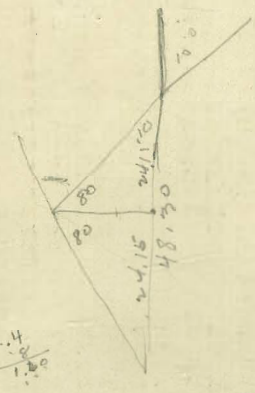
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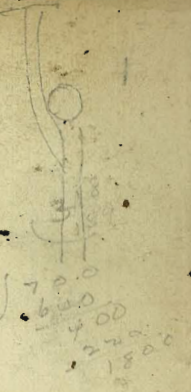
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