DR 12-A - BK 22

OFFICE OF COUNTY ENGINEER
RAMSEY CO. MINN.

PLAN Survey

LAKE ST

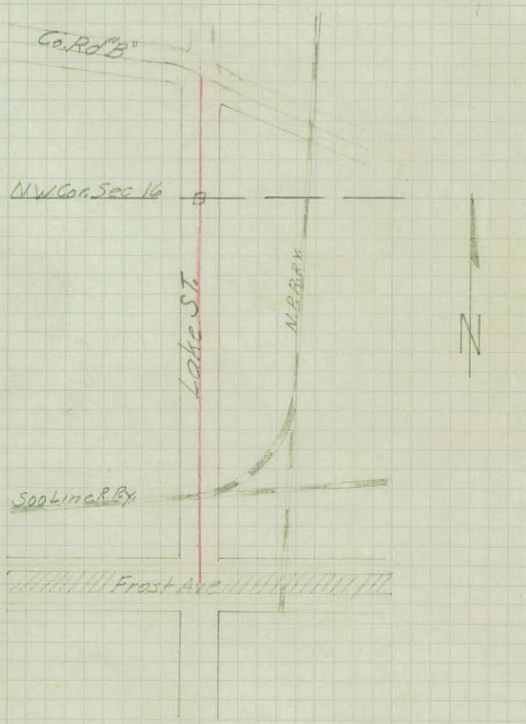
From FROST AVE To CO RD "B"

Road Acc't. No. N-8

Date Filed June 38

D12A-B22
File

PLAN SURVEY
LAKE ST.
from
Frost Ave to Co. Rd "B"



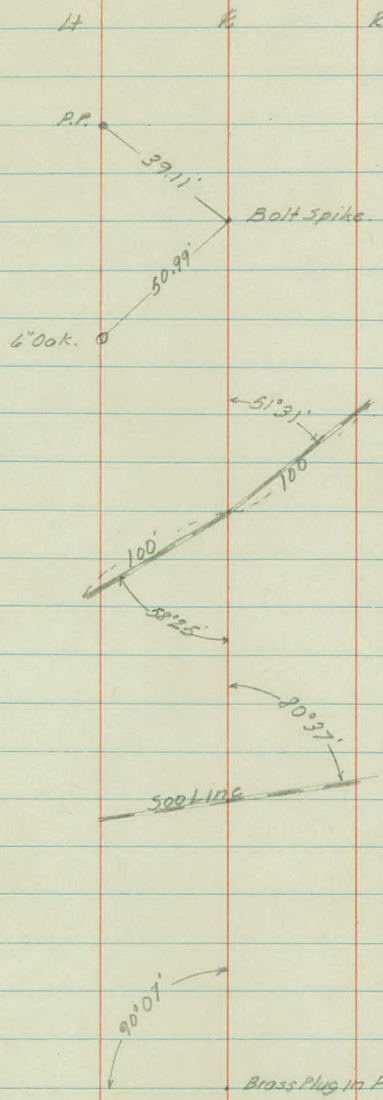
INDEX

Align P. 1-3
Topog - 4-9
X Sections - 10-20
Levels - A 20

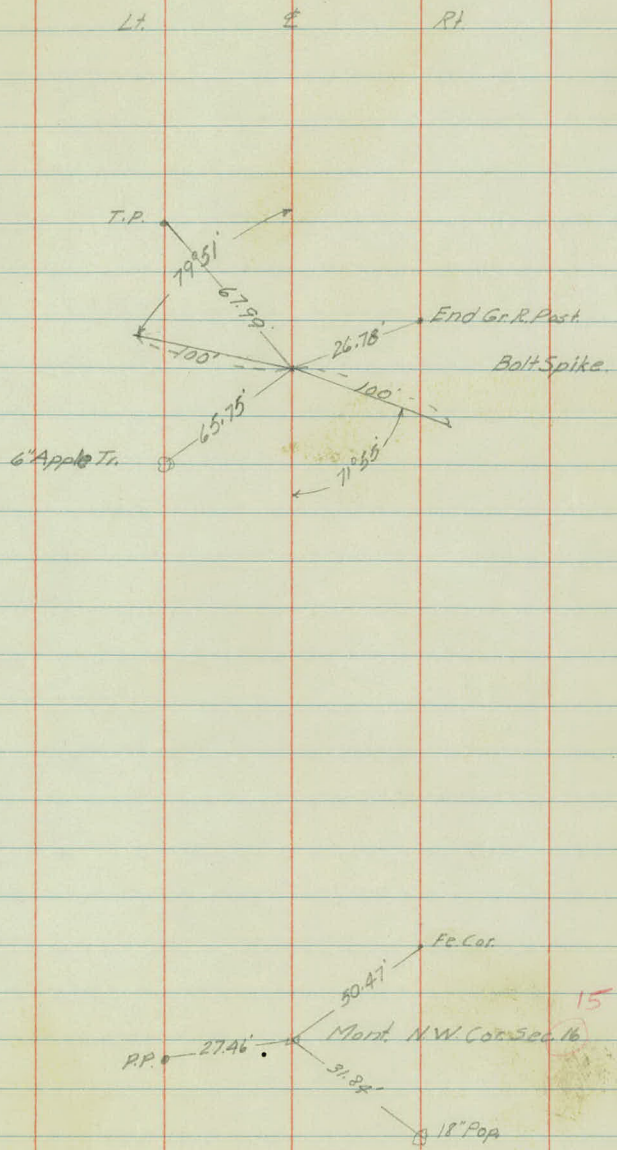
H. Anker
4/1/38

Alignment

Sta	Point	Δ Lt	Δ Rt
43 + 00	P.O.T.		
33 + 54.72	P.O.T.	= ℄ Sooline & N.P.R.R. Conn.	
32 + 58	P.O.T.	= ℄ Sooline R.R.	
26 + 39.12	= ℄ Frost Ave.		


Lt
℄
Rt.
P.P.
39.11'
Bolt Spike.
50.99'
6" Oak.
51°31'
100'
100'
38°25'
90°37'
Sod line
90°07'
Brass Plug in Pav.

Sta	Point	ΔLt	ΔRt
59 + 11.07	= Approx ℄ Co Rd "B"		
52 + 78.68	P.I.		0° 21½"


Lt.
℄
Rt.
T.P.
79°51'
67.99'
End Gr. R. Post
26.78'
Bolt. Spike.
100'
100'
65.75'
6" Apple Tr.
71°55'
Fe. Cor.
30.47'
15
Mont. N.W. Cor. Sec. 16
P.P.
27.46'
31.82'
18" Pop

XSections

Sta	+	∧	−	Elev.	
B.M.	5.51	901.55			896.04
26+39.12					
+39.12				896.0	
+59				96.2	
+65				96.1	
27				95.7	
+23				95.8	
+27				95.8	
+54				96.0	
+83				96.3	
+87				96.0	
28				96.4	
+50				96.9	

Lt E Rt

Top Brass Plug Frost Ave & Lake St.

5.97 5.6 5.16
50 50

5.7 5.7 6.0 5.4 5.5 5.3
50 30 19 26 50

8.0 7.6 7.6 6.0 5.5 5.6 5.7
50 36 21 16 29 50

7.5 7.3 7.1 8.4 6.1 5.9 6.0 5.7 4.8
50 33 29 23 13 10 31 50

7.1 6.9 6.4 7.9 6.1 5.8 6.4 5.3 5.1
50 33 29 21 12 11 33 50

7.0 6.9 6.2 7.8 6.1 5.8 6.8 7.8 6.9 7.0
50 33 29 22 13 16 19 33 50

6.6 6.6 6.3 7.4 6.7 5.9 5.6 6.1 5.6
50 33 28 23 18 13 15 33

6.1 6.0 5.9 7.0 7.0 5.6 5.3 5.6 5.2 5.2
50 33 27 22 17 12 10 33 50

6.1 5.9 5.4 7.1 6.9 5.6 5.6 5.7 7.2 5.6 4.7 5.0
50 33 27 23 17 13 10 17 24 33 50

5.7 5.5 5.1 6.7 6.7 5.4 5.2 5.6 6.9 6.9 4.1 4.2 4.1
51 33 27 23 17 13 10 15 18 27 33 50

4.5 4.0 3.5 6.6 6.3 5.1 4.7 5.1 7.0 7.1 2.4 2.7 3.2
51 33 29 22 17 14 9 14 18 27 33 50

Sta	+	HI	−	Elev
		901.55		
29				896.7
+ 50				96.4
30				96.3
+ 50				96.3
T.P.	6.25	902.49	5.31	896.24
31				96.3
+ 50				96.6
32				97.1
+ 12				97.2
+ 23				97.3
+ 34				97.5
+ 43				97.7

LH # RH

4.4	3.7	3.3	6.1	5.9	5.2	4.9	5.3	5.7	6.7	4.5	4.5	3.8
50	33	29	23	16	14		10	15	18	25	33	50

5.0	4.5	4.5	5.9	5.8	5.3	5.2	5.5	5.5	5.1	4.3	4.3
50	33	29	23	19	15		7	18	19	33	50

5.1	4.8	4.7	6.1	6.1	5.5	5.3	5.7	6.2	6.0	4.9	5.2
50	33	29	24	21	16		8	11	13	33	50

6.3	6.2	5.9	7.0	6.9	5.7	5.2	5.3	5.7	6.5	6.3	6.4	6.7
50	33	30	24	22	17	6		7	10	13	33	50

7.5	7.1	6.6	7.4	7.6	6.5	6.2	6.4	7.3	6.8	7.2	7.3
50	33	29	24	21	16		7	10	14	33	50

5.7	5.7	5.7	6.8	7.0	6.1	5.9	6.2	8.6	6.9	5.9	6.4
50	33	28	23	20	17		7	13	22	33	50

5.1	5.4	6.6	6.5	5.7	5.4	5.6	7.7	7.7	6.0	6.2	6.2
50	33	24	21	17		6	12	14	25	33	50

112	87	70	55	53	55	68	72	70	72
50	33	27	17		6	11	19	33	50

108	85	83	59	51	52	52	88	114	121
50	33	25	16	5		6	15	35	50

104	91	87	51	50	50	49	91	112	121
50	33	24	16	5		5.0	14	33	50

56	55	56	48	19	81	95	116
50	33	13		6	14	30	50

Sta	+	HI	−	Elev.
		902.49		
32	+52			897.9
	+55A	Top Rail		
	+60.5	Top Rail		
	+62			98.0
	+69			97.9
	+78			97.8
	+94			97.5
33	+05			97.4
T.P		6.13	902.04	6.58	895.91
	+16			97.5
	+30			97.6
	+48			97.4

Lt. Q Rt.

52/50 53/33 47/13 46/4 46/11 52/33 51/33 53/50

450 897.99.

445 898.04

85/50 70/33 45/14 45/6 43/3 49/7 50/33 50/50

122/50 96/33 81/23 95/14 46/6 46/33 50/33 49/50

140/50 132/36 124/31 48/14 47/5 49/13 88/23 85/33 84/33 60/50

140/50 132/33 113/25 49/13 50/6 53/18 116/33 125/33 133/50

75/30 117/36 117/30 50/14 50/7 51 53/6 102/14 137/33 141/50

54/50 57/43 79/39 93/24 47/14 45/6 46/11 57/33 66/33 76/50

54/50 51/33 52/19 45/14 44/5 45/11 55/33 60/33 64/50

58/60 54/33 53/26 46/14 46/5 47/10 56/33 61/33 62/50

Sta	+	H	−	Elev.
		902.04		
33	+51	Top Rail		
	+57	Top Rail		
	+61			897.4
	+79			97.0
	+91			96.9
34				96.8
T.P.		6.09 902.00	6.13	895.91
	+48			96.6
	+57			96.6
35				96.5
	+40			96.9
BM		2.90 892.00	2.90	899.10
36				96.7

Lt. & Rt.

442 897.62

454 897.50

95/50 93/30 56/21 45/16 46 50/30 53/25 54/33 58/50

101/50 100/33 94/26 50/15 50 50/5 57/9 55/11 52/33 53/50

100/50 97/33 91/25 51/15 48/5 51 53/3 94/11 93/17 57/28 53/50

103/50 103/33 96/26 53/16 50/7 52 55/3 100/8 99/25 63/37 54/50

7.6/50 8.0/33 8.0/23 5.5/17 5.2/9 5.4 5.6/2 9.4/11 9.8/23 9.5/50

6.3/50 6.1/35 7.8/28 7.8/23 5.5/17 6.2/7 6.4 5.6/2 9.3/10 9.8/33 9.1/50

4.2/50 5.1/33 6.0/25 6.5/23 5.4/20 5.1/9 5.5 5.5/1 8.0/11 8.4/27 7.7/36 7.3/50

3.8/50 4.3/33 6.0/24 4.8/21 4.7/10 5.1 5.1/1 6.8/9 7.4/19 6.2/33 5.6/50

Top N.E. Cor. Conc. Porch

4.4/50 4.6/38 5.1/33 6.0/25 5.3/20 5.0/11 5.3 5.4/1 6.9/8 7.2/22 5.8/33 4.6/50

Sta	+	HI 902.00	−	Elev.
36+50				896.6
37				96.8
+50				96.8
38				96.6
+50				96.6
T.P.	8.32	905.12	5.20	896.80
39				96.7
+50				96.8
40				97.2
+50				98.1
41				99.2
+50				900.7

Lt. | R.

4.6 4.3 5.4 6.3 6.2 5.3 5.1 5.4 5.5 6.9 6.2 5.7 6.0
5.0 38 27 25 22 19 8 2 8 14 33 5.0

6.1 6.1 6.2 6.7 6.5 5.3 4.9 5.2 5.3 6.3 6.5 6.1 4.7 2.8
50 33 28 27 23 19 9 2 5 11 22 33 50

5.4 5.7 6.3 6.4 5.4 5.0 5.2 5.3 6.6 6.7 5.0 3.7
50 30 27 22 18 9 2 7 19 33 50

5.7 5.5 6.3 6.8 6.7 5.4 5.1 5.4 5.5 6.8 6.9 5.7 4.8
50 37 28 26 23 19 9 2 5 20 33 50

6.8 6.6 6.6 7.0 6.8 5.7 6.2 5.4 5.3 7.1 7.3 6.7 6.7 6.2
50 33 26 24 22 19 9 2 6 22 24 33 50

7.9 9.7 10.6 10.1 8.7 8.3 8.4 8.5 10.1 10.6 8.9 8.2
50 33 28 22 18 8 3 6 20 33 50

10.2 10.2 10.0 8.3 8.0 8.3 8.4 10.7 11.3 10.5 10.2
50 33 23 18 8 2 8 17 33 50

9.8 9.8 9.6 7.8 7.6 7.9 8.1 11.5 12.8 13.2
50 33 23 18 8 3 9 33 50

9.0 9.0 9.0 7.2 6.7 7.0 7.1 10.9 12.0 12.6
50 33 22 18 8 2 11 33 50

6.1 6.6 7.1 5.8 5.6 5.9 6.0 7.2 7.7 8.2 9.2
50 33 25 18 8 3 7 15 33 50

7.1 7.7 8.4 6.3 6.2 6.4 6.5 8.5 8.0 8.3 9.2
50 33 28 21 8 3 8 12 25 50

Sta	+	∧	−	Elev
		905.12		
42				902.1 ✓
T.P.	7.33	909.75 ✓	2.70	902.42
	+50			03.1
43				04.1
	+50			04.9
44				04.7
	+50			04.4
45				03.6
	+50			02.6
46				01.3
T.P	0.78	900.96 ✓	9.57	900.18 ✓
	+50			899.6
47				98.3

Lt. ℄ Rt.

$\frac{07}{30}$ $\frac{09}{33}$ $\frac{11}{28}$ $\frac{31}{23}$ $\frac{31}{21}$ $\frac{28}{18}$ $\frac{27}{9}$ $\frac{30}{3}$ $\frac{31}{5}$ $\frac{37}{9}$ $\frac{38}{9}$ $\frac{21}{12}$ $\frac{03}{26}$ $\frac{12}{50}$

$\frac{40}{30}$ $\frac{41}{33}$ $\frac{42}{30}$ $\frac{68}{24}$ $\frac{69}{19}$ $\frac{66}{18}$ $\frac{64}{8}$ $\frac{67}{3}$ $\frac{68}{5}$ $\frac{71}{4}$ $\frac{72}{9}$ $\frac{56}{12}$ $\frac{38}{29}$ $\frac{37}{50}$

$\frac{35}{30}$ $\frac{34}{32}$ $\frac{60}{22}$ $\frac{61}{20}$ $\frac{58}{19}$ $\frac{54}{8}$ $\frac{57}{3}$ $\frac{58}{5}$ $\frac{61}{5}$ $\frac{62}{9}$ $\frac{48}{13}$ $\frac{37}{26}$ $\frac{34}{33}$ $\frac{32}{50}$

$\frac{28}{50}$ $\frac{27}{33}$ $\frac{58}{27}$ $\frac{60}{21}$ $\frac{55}{19}$ $\frac{49}{8}$ $\frac{49}{3}$ $\frac{49}{7}$ $\frac{51}{9}$ $\frac{43}{12}$ $\frac{36}{20}$ $\frac{33}{33}$ $\frac{25}{50}$

$\frac{18}{50}$ $\frac{18}{33}$ $\frac{60}{25}$ $\frac{60}{20}$ $\frac{53}{18}$ $\frac{49}{9}$ $\frac{51}{3}$ $\frac{54}{7}$ $\frac{30}{20}$ $\frac{27}{33}$ $\frac{25}{50}$

$\frac{22}{50}$ $\frac{16}{33}$ $\frac{60}{25}$ $\frac{62}{21}$ $\frac{55}{18}$ $\frac{51}{9}$ $\frac{54}{3}$ $\frac{56}{7}$ $\frac{29}{22}$ $\frac{29}{33}$ $\frac{35}{50}$

$\frac{40}{50}$ $\frac{30}{33}$ $\frac{71}{24}$ $\frac{71}{20}$ $\frac{66}{18}$ $\frac{61}{7}$ $\frac{62}{8}$ $\frac{64}{8}$ $\frac{57}{16}$ $\frac{35}{36}$ $\frac{36}{50}$

$\frac{68}{50}$ $\frac{50}{35}$ $\frac{71}{27}$ $\frac{71}{28}$ $\frac{25}{18}$ $\frac{71}{9}$ $\frac{72}{3}$ $\frac{74}{6}$ $\frac{67}{17}$ $\frac{47}{33}$ $\frac{45}{50}$

$\frac{78}{50}$ $\frac{75}{33}$ $\frac{78}{22}$ $\frac{84}{16}$ $\frac{83}{6}$ $\frac{85}{8}$ $\frac{90}{12}$ $\frac{93}{14}$ $\frac{85}{40}$ $\frac{67}{50}$ $\frac{65}{50}$

$\frac{4.8}{50}$ $\frac{4.9}{33}$ $\frac{3.9}{20}$ $\frac{1.3}{16}$ $\frac{1.2}{7}$ $\frac{1.4}{4}$ $\frac{1.8}{8}$ $\frac{3.3}{14}$ $\frac{4.6}{24}$ $\frac{3.9}{33}$ $\frac{4.0}{50}$ $\frac{4.3}{50}$

$\frac{6.3}{30}$ $\frac{5.9}{33}$ $\frac{6.0}{27}$ $\frac{6.3}{22}$ $\frac{2.6}{13}$ $\frac{2.5}{5}$ $\frac{2.7}{3}$ $\frac{3.0}{5}$ $\frac{7.0}{13}$ $\frac{7.4}{33}$ $\frac{7.9}{50}$

Sta	+	℄	−	Elev.
		900.96		
47+50				897.4
48				96.5
+ 50				96.0
49				96.2
+ 50				97.0
T.P.	10.76	909.19	2.53	898.43
50				98.4
+ 33				99.4
+ 60				900.1
51				00.4
+ 56				00.5
52				00.5

Lt 8 Rt.

6.8	6.3	7.0	6.9	3.8	3.6	3.7	7.8	7.7	8.1	9.0
50	26	22	19	12		5	12	27	33	50

8.2	7.7	7.5	8.4	8.4	4.8	4.5	4.8	8.1	8.9	9.0
50	33	25	23	19	12		6	11	33	50

10.5	10.1	9.2	8.4	5.1	5.0	5.2	9.2	9.1	8.9	9.5	10.4
50	33	23	18	12		6	13	18	19	33	50

11.0	11.2	10.6	5.0	4.8	5.1	10.6	11.8	12.7
50	33	21	12		8	16	25	50

8.7	8.7	7.9	4.3	4.0	4.5	8.0	8.3	8.2	8.8
50	30	20	13		10	16	25	35	50

9.4	8.5	12.0	11.8	10.7	10.8	11.3	12.0	12.5	6.9	9.3	10.2
50	31	24	19	16		8	11	20	29	38	50

5.3	4.3	10.8	10.9	10.0	9.8	10.5	11.2	11.5	6.4	7.9
50	33	24	17	14		11	13	22	33	50

4.0	2.6	10.3	10.3	9.6	9.1	9.7	10.8	10.4	5.2	7.1
50	33	24	17	13		11	14	21	31	50

5.5	4.0	10.2	9.9	9.3	8.8	9.3	10.7	10.4	3.7	4.0	5.2
50	33	25	17	14		11	15	19	29	33	50

9.7	7.8	7.5	10.3	9.9	9.2	8.7	9.1	9.7	9.6	4.7	4.2	4.6
50	33	27	21	16	12		12	15	19	27	33	50

13.5	13.2	12.2	11.7	9.1	8.7	9.0	9.8	10.0	5.4	5.4
50	39	28	16	9		13	15	23	34	50

Sta	+	↑	−	Elev.
		909.19		
52	+35			900.6
	+42			00.6
	+75			00.7
	+81			00.6
BM	8.83	909.12 ✓	8.90	900.29 ✓
53				00.7
	+50			01.3
54				02.1
	+50			03.1
55				03.9
	+50			05.0
56				06.0
TP	8.11	914.72 ✓	2.51	906.61 ✓

Lt. E Rt.

13.7	13.8	13.3	12.1	9.1	8.6	8.9	9.0	6.7	6.3
50	33	20	15	8		13	31	36	50

13.7	13.7	13.4	9.5	9.0	8.6		8.7	8.9	8.1
50	33	18	10	7			14	33	50

12.3	12.6	10.7	10.1	10.2	9.0	8.3	8.7	11.3	11.3	10.8	10.5
50	39	31	27	10	7		15	20	27	31	50

9.7	9.8	10.1	10.5	10.2	9.1	8.6	8.8	11.6	11.5	11.0	10.7
50	33	23	18	10	7		15	20	27	31	50

Top Mont

94	9.4	9.3	10.4	10.2	5.7	8.4	8.9	8.7	11.2	11.7	11.3	11.1	11.2
50	33	27	17	10	6		4	15	20	24	27	33	50

76	8.0	8.5	10.0	9.9	8.0	7.8	7.8	8.4	11.9	12.5	13.4
50	33	25	17	11	6		6	17	23	33	50

49	5.5	5.8	7.8	7.9	7.2	7.0	7.0	7.4	9.8	10.4	11.8	12.8
50	33	21	16	10	6		7	17	23	31	36	50

34	3.9	4.7	7.0	7.1	6.2	6.0	6.0	6.5	7.0	7.9	9.5	10.4
50	33	16	12	8	6		6	19	20	33	36	50

18	3.0	3.3	6.5	6.5	5.5	5.2	5.1	5.5	6.7	6.9	8.7	9.6
50	33	22	16	8	6		7	19	22	33	36	50

14	2.3	2.2	5.6	5.3	4.4	4.1	4.0	4.5	5.8	5.3	5.8	6.9	7.7
50	33	22	15	9	6		7	18	24	26	33	36	50

10.2	0.1	0.8	3.5	3.8	3.4	3.1	2.9	3.2	4.4	5.7	6.0
50	33	17	12	8	6		6	17	23	41	50

Sta	+	X	−	Elev.
		91472		
56	+50			907.2
57				08.4
	+50			09.4
58				10.2
	+60			10.0
	+72			09.4
	+79			09.1
	+92			09.0
59				09.0
	+1107			09.4
B.M.			4.95	910.27

Lt. ℄ Rt.

40/50 40/33 41/22 70/14 76/6 75/15 77/18 76/25 93/50 98/50

905.62

91
1st Floor Elev

23/50 27/33 26/23 63/12 65/6 63/— 62/7 64/18 84/24 96/33 105/50

10/50 07/33 07/22 60/13 56/6 53/— 51/7 53/15 68/19 70/28 89/31 87/36

04/29 25/21 39/12 47/6 45/— 43/6 47/16 79/26 90/33 103/50

See Page 30.

18/29 49/22 52/9 48/6 47/— 47/6 54/27 81/33 110/50

04/50 04/32 36/30 50/19 53/6 53/— 52/8 58/17 59/24 116/36 133/50

05/50 06/35 48/25 56/15 61/6 56/— 59/40 60/15 65/22 109/29 102/40 94/50

62/50 66/35 71/19 62/8 57/— 59/11 74/27 86/50 = R.B.Top

60/50 64/37 62/22 57/11 57/— 72/31 = R.B.Top

K Co. Rd 8" = 33/50 43/25 53/—

Top W. End C & M Culv. N.W. Cor. 8th & K St.

Sta	+	℄	−	Elev.	
B.M.	10.86	921.13		910.27	
58				10.2	
+60				10.0	

Bench Levels

B.M.	5.52	901.56 ✓		✓	896.04
T.P	6.19	902.38 ✓	5.32	896.24 ✓	
T.P	6.20	902.11 ✓	6.47	895.91 ✓	
B.M	3.00	902.11 ✓	3.00	899.11 ✓	
T.P	11.17	907.78 ✓	5.50	896.61 ✓	
T.P	2.56	905.44 ✓	4.90	902.88 ✓	
B.M.	12.86	913.22 ✓	5.08	900.36 ✓	
B.M.			2.90	910.32	

Lt. ℄ Rt.

Top C.M. Culv.

$\frac{38}{75}$ $\frac{34}{30}$ $\frac{31}{27}$ (10.9)

$\frac{39}{75}$ $\frac{44}{30}$ $\frac{50}{35}$ (11.1)

Top Brass Plug in Pav. Frost Ave & Lake St.

Top N.E. Cor. Conc. Porch

Top Mon't.

Top W. End C.M. Culv. N.W. Cor. Lake & "B"

Topog

31 16' 5'

30 15 5'

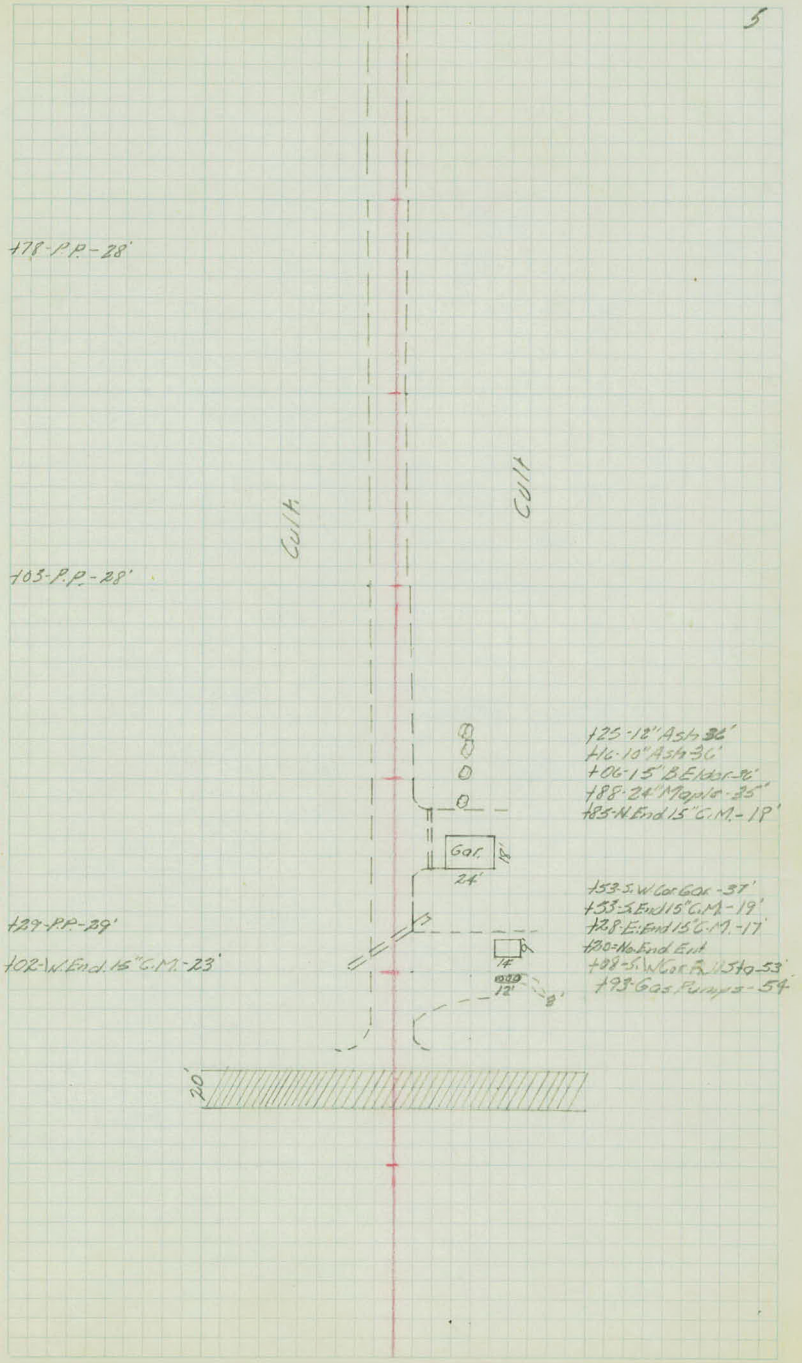
29 14' 6'

28 12' 10'

15" R.C.P. C.M.P.
27 12' 10'

+39.12=2.20'Rov.

26


478-P.P.-28'
Curb
Curb
103-P.P.-28'
Gar.
24'
18'
127-P.P.-29'
102-N.End 15"C.M.-23'
20'
125-12"Ash-32'
116-10"Ash-36'
106-15"B.Elder-26'
88-24"Maple-25'
85-N.End 15"C.M.-18'
53-S.W.Cor Gar.-37'
53-S.End 15"C.M.-19'
28-E.End 15"C.M.-17'
10-N.End End
88-S.W.Cor R.R.Sta-53'
93-Gas Pumps-54'

38 18' 2'

37 19' 1

144 SE Cor. Ho 89'

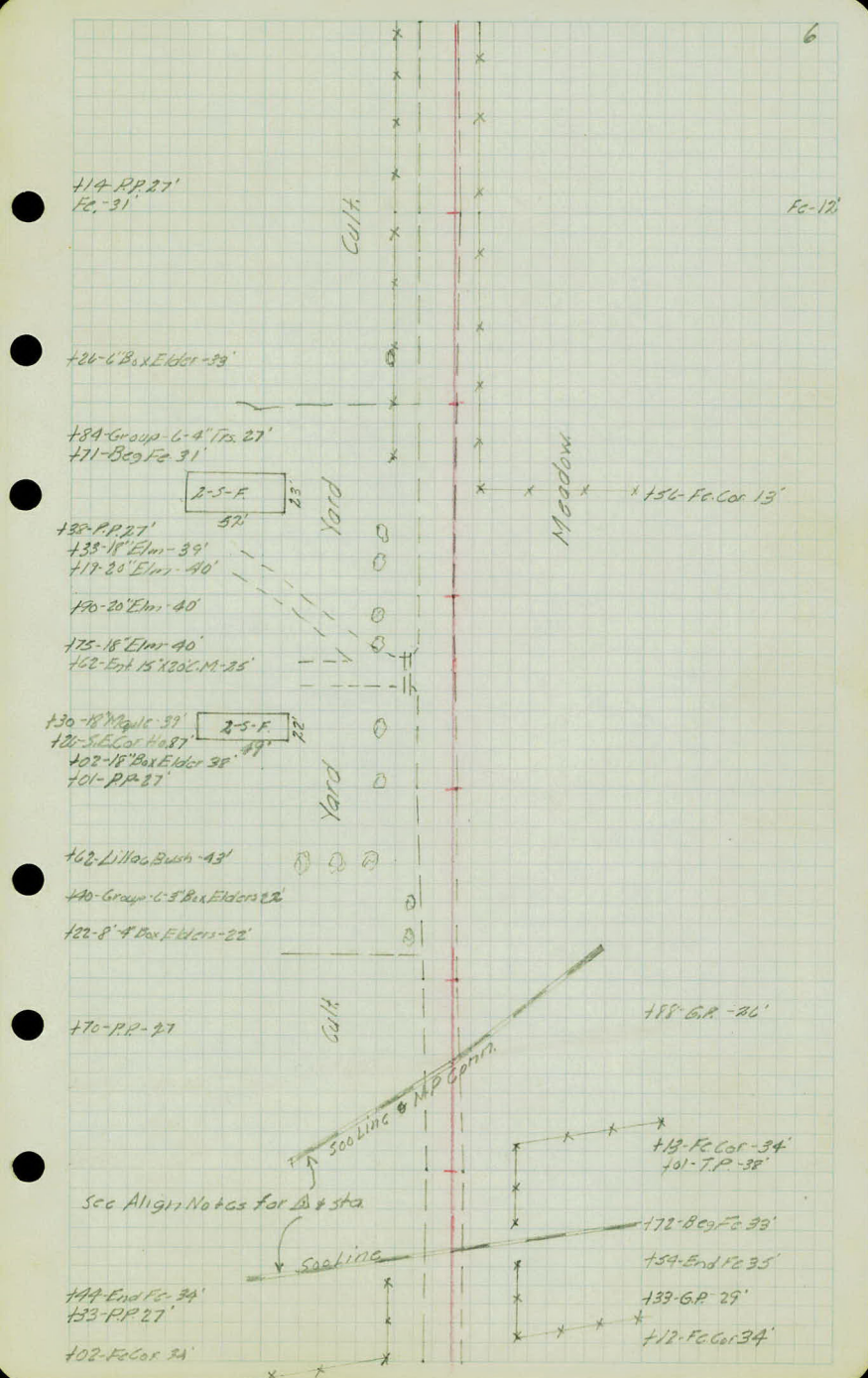
36 19' 00

35 19' 1

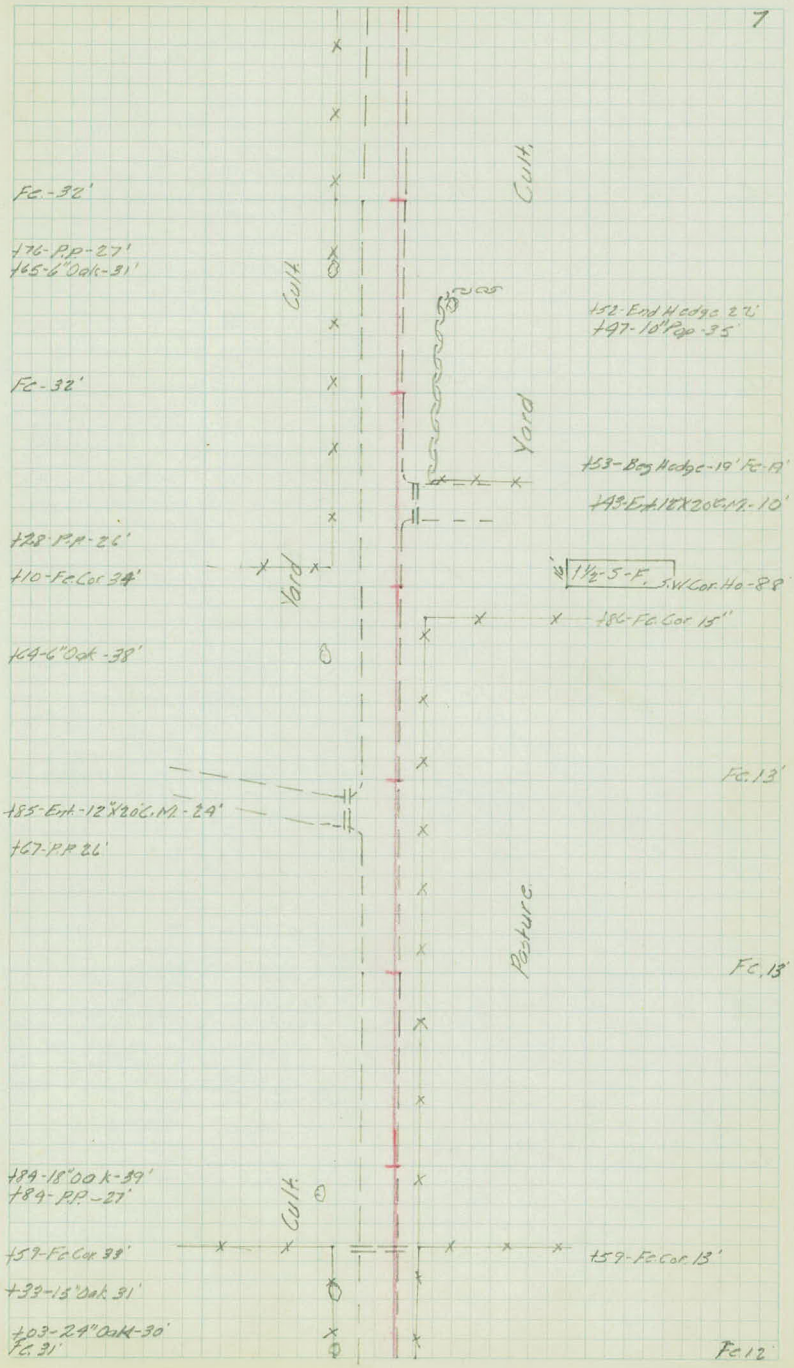
34 15' 1'

33 13' 4'

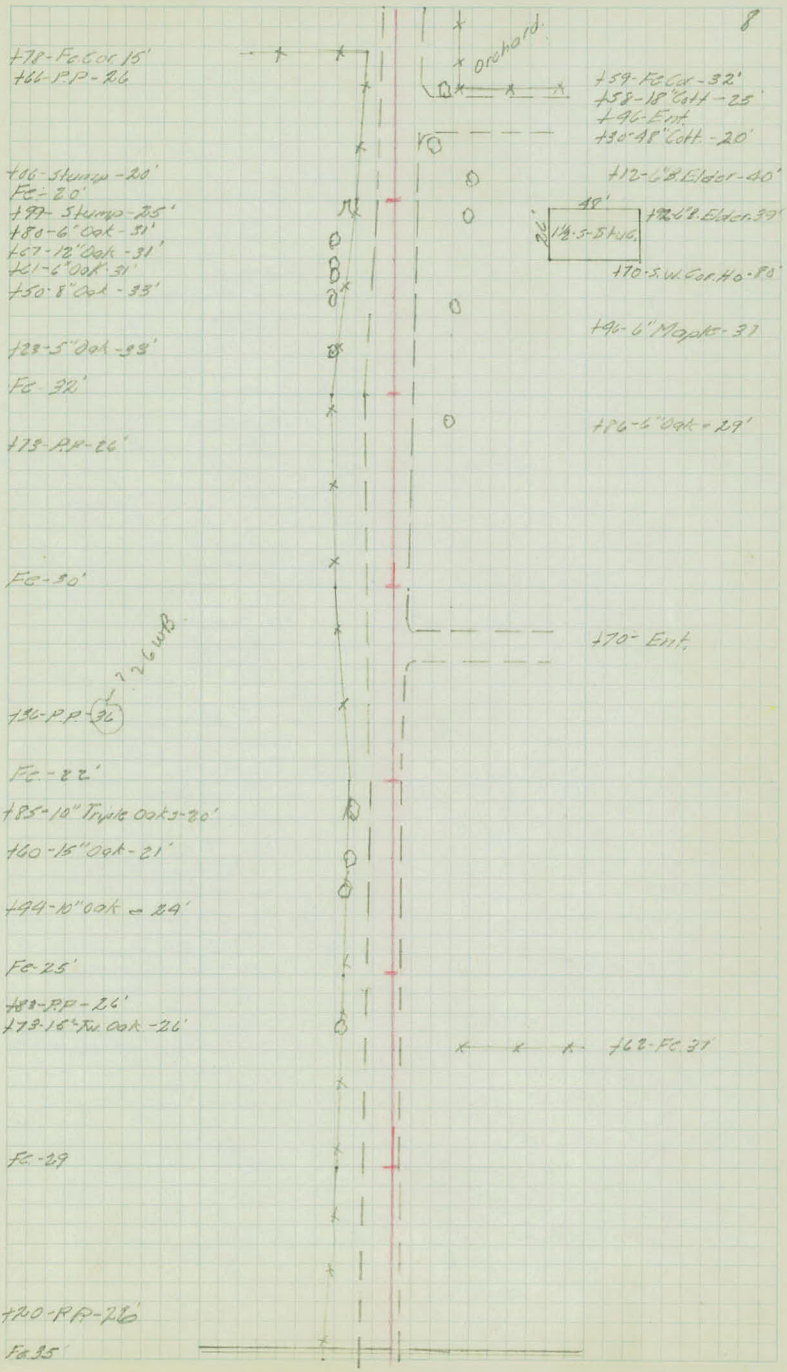
32 15' 5'


+14-P.P.27'
Fc.-31'
Cult.
Fc-12'
+26-6'Box Elder-33'
+84-Group-6-4"Trs.27'
+71-Beg Fc 31'
2-S-F.
23'
57'
Yard
Meadow
+56-Fc.Cor.13'
+35-P.P.27'
+33-18"Elm-39'
+17-20"Elm-40'
+90-20"Elm-40'
+75-18"Elm-40'
+62-Ent 15'X20'C.M.-25'
+30-18"Maple-39'
+21-S.E.Cor Ho.87'
2-S-F.
22'
49'
+02-15"Box Elder 38'
+01-P.P.27'
Yard
+62-Lilac Bush-43'
+40-Group-6-3"Box Elders 22'
+22-8'-4"Box Elders-22'
Cult.
+70-P.P.-27
+88-G.P.-36'
Seeding & N.P. Opnin.
+13-Fc Cor-34'
+01-T.P.-38'
See Align. Notes for Δ # sta.
+72-Beg Fc 33'
Seeding
+54-End Fc 35'
+49-End Fc-34'
+53-P.P.27'
+39-G.P. 29'
+12-Fc Cor 34'
+02-Fc Cor 34'

45	16'	3'
44	17'	3'
43	18'	2'
42	18'	1'
41	17'	2'
40	17'	1'
458-12"x30' C.M.	22'4".	8'8"
39	18'	1'


Fc.-32'
476-P.P.-27'
465-6"Oak-31'
Culv.
Culv.
452-End Hedge 27'
497-18"Pop-35'
Fc-32'
Yard
453-Beg Hedge-19' Fc-19'
493-End 18"X20'C.M.-10'
428-P.P.-26'
410-Fc.Cor.34'
Yard
1½-S-E. S.W.Cor.Ho-88'
486-Fc.Cor.15'
464-6"Oak-38'
Fc.13'
485-End-12"X20'C.M.-24'
467-P.P.26'
Pasture
Fc.13'
489-18"Oak-39'
489-P.P.-27'
Culv.
459-Fc.Cor.39'
459-Fc.Cor.13'
439-15"Oak.31'
403-24"Oak-30'
Fc.31'
Fc.12

52	9'	12'
51	14'	10'
50	13'	9'
49	11'	7'
48	13'	5
47	13'	4'
46	tol-Great Lakes Pipe Line X3 R 1c	4'

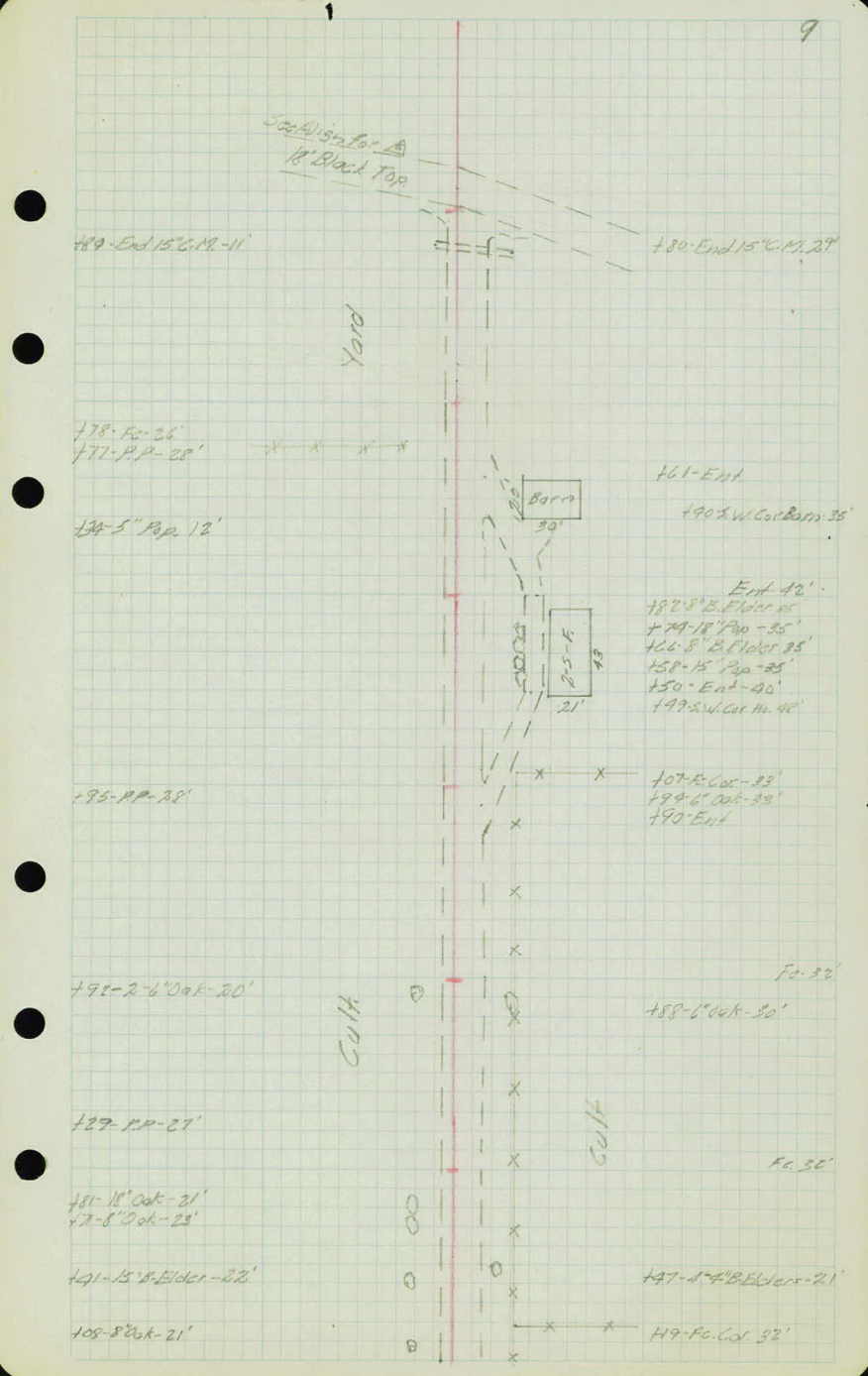

+78-Fe Cor 15'
+86-PP-26
Orchard
+59-Fe Cor-32'
+58-18" Colt-25'
+96-Ent
+90-48" Colt-20'
+06-Stump-20'
Fe-20'
+97-Stump-25'
+80-6" Oak-31'
+67-12" Oak-31'
+61-6" Oak-31'
+50-8" Oak-33'
+12-6" Elder-40'
48'
24'
1½-S-S Hwg.
+92-8 Elder-39'
+70-S.W. Cor. Ho-88'
+90-6" Maple-37
+28-5" Oak-33'
Fe-32'
+26-5" Oak-29'
+73-PP-26'
Fe-30'
+70-Ent.
26 wtr
+36-PP
36
Fe-22'
+85-18" Trunk Oaks-20'
+60-15" Oak-21'
+94-10" Oak-24'
Fe-25'
+83-PP-26'
+73-16" Tw. Oak-26'
+62-Fe-37
Fe-29
+20-PP-26'
Fe-35'

57 #11.07

15"x40' C.M.

58	5'	17'
57	6'	16'
56	5'	15'
55	5'	15'
54	6'	15'
53	6"	15

9


Sod Slope for 18' Black Top
+89-End 15"C.M.-11'
+80-End 15"C.M. 29'
Yard
+78-Fc-24'
+77-H.P.-28'
+61-End
Barn
30'
+90 S.W. Cor Barn-36'
End-42'
+87.5"B. Elder 45'
+79-18"Pap-35'
+66.5"B Elder 35'
+58-15"Pap-35'
+50-End-40'
+99 S.W. Cor No. 46'
+95-H.P.-28'
+107-Fc. Cor-33'
+94-6" Oak-33'
+90-End
+92-2-6"Oak-20'
Fc-32'
+88-6"Oak-30'
Culv.
Culv.
+27-H.P.-27'
Fc. 32'
+81-18"Oak-21'
+78-8"Oak-23'
+91-15"B. Elder-22'
+47-4-4"B. Elders-21'
+108-8"Oak-21'
+49-Fc. Cor 32'

Lake St. Plans in Hand

4-25-38
M.W.C.
A.L.B.

27+15 ℄	O.K. Leave
27+69 R	Rem + Rep.
30+00 R	Pl. 15" X 20' C.M.
30+00 L	Pl. 15" X 20' C.M.
35+62 L	Rem. & Rep.
37+00 R	Pl. 15" X 20' C.M.
39+58 ℄	Rem & Pl. 24" Conc.
41+85 L	Rem. + Rep.
43+43 R	Rem:- No Culv. Req. Haul To 49+70 Rt.
49+70 R	Rep. From 43+43 Rt.
52+46 R	No Culv. Req.
55+90 R	" " "
57+61 R	" " "
58+83 ℄	Rem & Pl. 18" Conc.

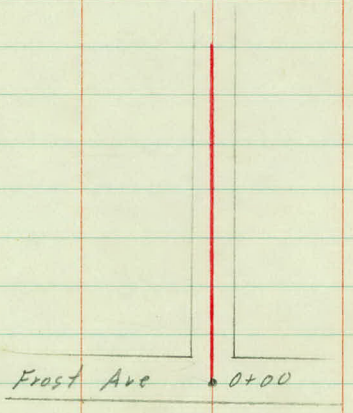
~~Frost Ave.~~

ENGLISH ST.

X-Sections

of Frost Ave

~~at English~~



X-Sections 1-3

Topog. 4-6

6 pages

Sta	+	A	-	Elev	9-24-46 Notes
BM	5.33	901.32			895.99
0+00					
+28					
+50					
/					
+50					
+48					
+58	℄ Ent 15"x20' CM				
+68					
2					
+40					
+50	℄ Ent 15"x20' CM				
+60					

3 Feb 1953 2

FK
AM
LC
MB

L+ ℄

Top Steel Plate intersection Frost Ave & English

95.0 95.29 95.49 95.65 95.99

6.3 6.03 5.83 5.67 5.33 ✓
200 150 100 50

92.1 93.6 95.3 95.5 95.6 95.5 96.2

9.2 7.7 6.0 5.8 5.7 5.8 5.1 ✓
250 200 150 100 50 15

95.8 95.6 96.0

5.5 5.7 5.3 ✓
50 20

95.8 95.1 95.4 96.0

5.5 5.6 5.9 5.3 ✓
50 27 20

95.4 95.7 94.5 94.9 96.3

5.9 5.6 6.8 6.4 5.0 ✓
50 27 24 20

94.67

6.65
FL
22

94.65

95.9 96.4 96.1 96.4 ✓

5.4 4.9 5.2 4.9
50 27 15

6.67
FL
22

97.8 97.2 95.0 95.1 96.5 96.9 ✓

3.5 4.1 6.3 6.2 4.8 4.4
50 31 24 20 13

98.27

3.05
FL
22

97.1 96.7 96.6 96.9 ✓

4.2 4.6 4.7 4.4
50 23 13

98.26

3.06
FL

Sta	+	π	-	Elev
		901.32		
3				
+50				
4				
+50				
5				
+50				
+75				
6				
+16.35	Top S. Rail		3.0	
BM			5.33	

Lt

Rt

96.8 96.2 95.4 95.2 96.6 96.9

4.5 5.1 5.9 6.1 4.7 4.4 ✓
50 29 24 20 14

96.4 96.6 95.6 95.5 96.7 97.0

4.9 4.7 5.7 5.8 4.6 4.3 ✓
50 28 23 19 13

95.7 95.6 94.9 95.4 96.8 97.0

5.6 5.7 6.4 5.9 4.5 4.3 ✓
50 28 23 19 13

95.0 95.3 95.2 95.8 96.9 97.2

6.3 6.0 6.1 5.5 4.4 4.1 ✓
50 35 24 20 13

96.0 96.2 96.8 97.2 97.5 ✓

5.3 5.1 4.5 4.1 3.8
50 29 15 10

97.6 97.1 96.1 97.4 97.6

3.7 4.2 5.2 3.9 3.7 ✓
50 28 20 13

90.9 92.0 95.3 97.4 97.7

10.4 9.3 6.0 3.9 3.6 ✓
50 40 29 16

93.9 95.1 96.1 97.7 97.9

7.4 6.2 5.2 3.6 3.4 ✓
50 35 23 14

Top Steel Plate 1st, Frost Ave & English

Topography

6

5 +21 NECor 62' 32' Front to Shop

4

3 +83 SECo. Ho. 61 23 x 30 .

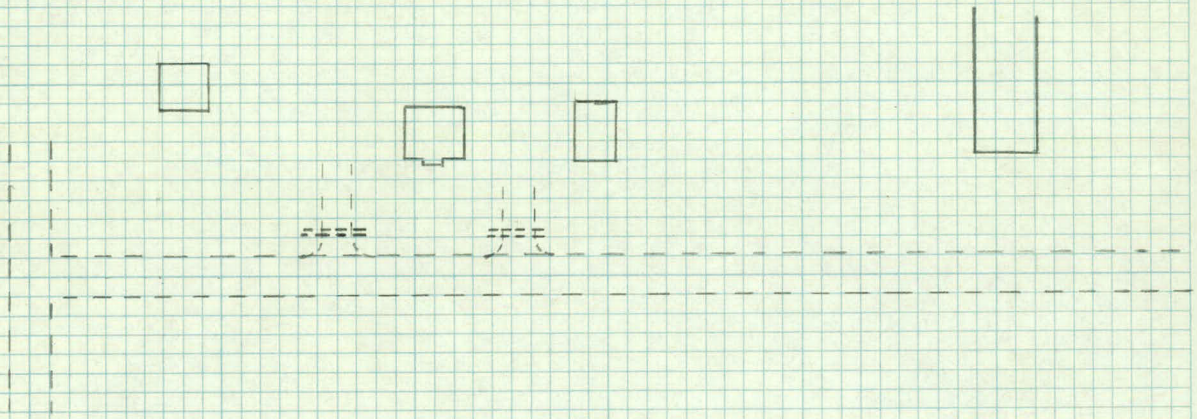
152 Ent 15"x20' CM 22' .

2 +96 SECo. Ho. 57 30 x 30 .
160 Ent 15"x20' CM 22' .

1

168 SECo. Restaurant 85' .

0



6 FIG. 35 So Rail of Tracks

9

10

90°42'

Fd. Cor.

90°11'

50.47

31.84 @ 18" Top.

27.46

P.P.

89°39'

16

89°26 1/2

15

St.

15"O.

@ 46.08

2639.75' E.

2638.71 Meas

2639.5C K.A. Planning

@ 39.83

12"O.

Erig 115'

90°07'

90°31'

Frost

2637.57 E.

1/31/97

FK
RG
KP
JT

March 27 1957
Fair 39°

1

English

Co. Rd "B" to S.T.H. #36

Plan Survey

21 pages

Rec. 6/3/57

Alignment

Sta	Point	△ Lt	△ Rt
A+00	P.O.T.		
0+00	= P.I. of Co. Rd. "B"		

85.51

4100.5
NW Cor
Ho. Fo.

Cor Fo.

89.82

PP o

89.96

Spike

Spike

4.54

PP o

1.69

Sta	Point	△Lt	△Rt
6+71.84			
6+71.74			
6+52.34 P.O.T. ¼ ¼ Line			

℄

R/W iron (state) ○ 70.48

74.52 ○ R/W Spike (state)

○ 0.13' W. of Line Bolt

FR
RG
KP
JT

March 28, 1957
Fair 30°

TOPOGRAPHY

℄

4 Lt B.T. 5-12 Rt

+54 PP 31.5

+146 6"Cc 24 +147 4"Cc. 32

3 B.T. 7-9.5

+46 PP 31

+44 End 6' Brush Row 16

+24 Beg Brush 6 22

2 B.T. 8.5-6

+67 4"BE 20'

+31 Stp 31

+37 PP 30.5

1 B.T. 10 4

+13 Stp 24

+61 Stp 22

+88 Stp 22

+88 N.E. Cor Ho 63

+58 Stp 21

+85 18"x34'CM 17-17

+53 Stp 24

+26 PP 29

+27 Stp 29

0+00 +06 E.R. 10 +00 Hse Bt 108 ? +03 E.R. 8

-15 B.R. 34 -02 W.E. 12"x30CM 15' -12 E.End 12"x30 CM 13.5

-31 ER 49 -21 Co Rd B.Bt E -31 BR 40

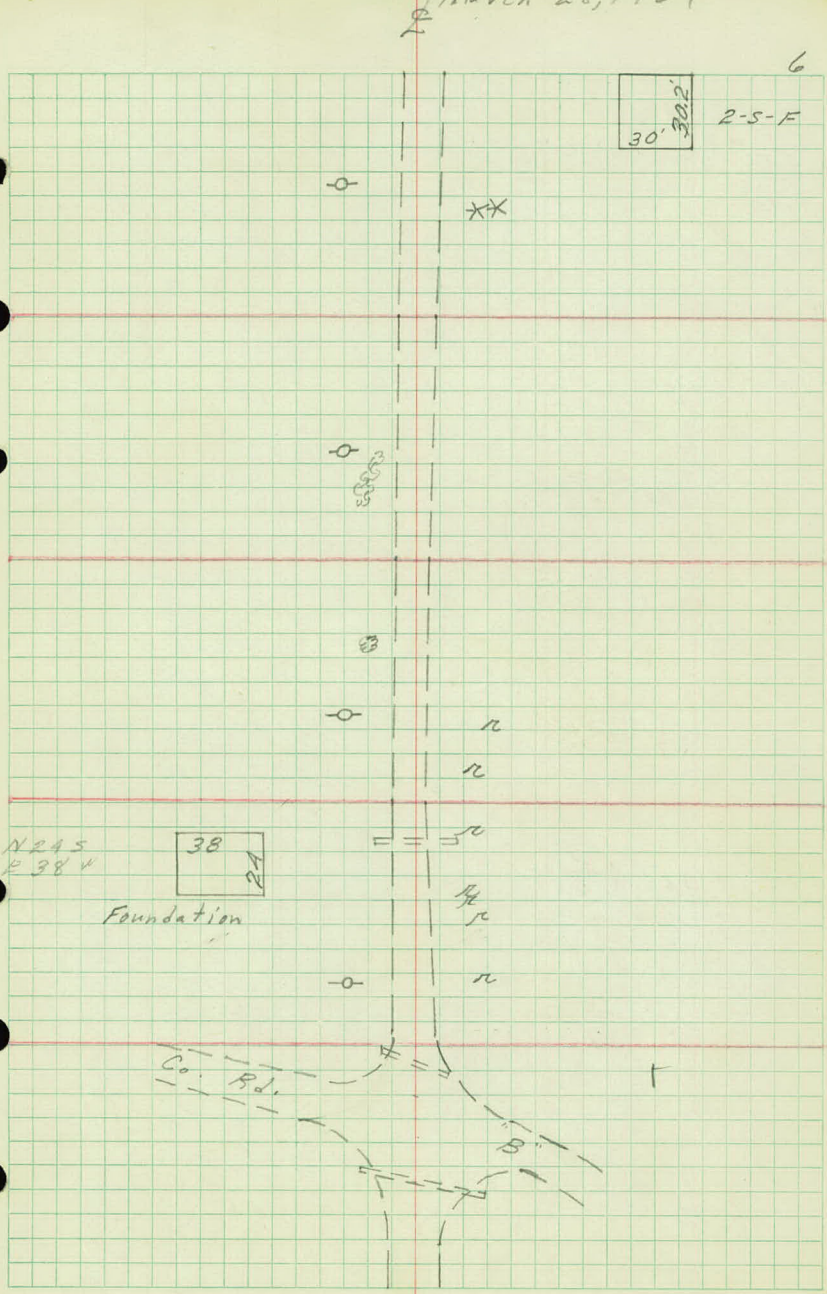
-51 15"x52'CM 22.4 -52 ER 45

-61 PP 29 -60 15"x52CM 29

+72 B.R. 12 -82 BR 9.5

B.T. 11 · 10

March 28, 1957



℄

8

BT
11 11

7

BT
11 10

+99 PP 34

+68 Edge St Rt

+52 St Rt 12"x28" CM 31

+50 Ent Lt

+34 12"x36" CM = 27

+30 Stp 47

+21 4" CE 50

+29 W.E. 12 x36 CM 9'

+31 P.O.R. 21.5

+45 ER 47

6

BT
8. 11

+14 BR 12

+83 PP 33

5

+00 20' Ent Lt

BT
6 14

+50 4" MH A. 47

+86 2-3" Plug 38+51

+34 Ent Rt

+11 10' Pine 27

+11 4' Pine 33

+57 PP 32.5

+06 4' Pine 30

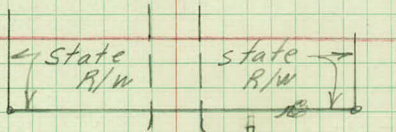
NW Cor Ho

4

BT
5 12

+00.5 85.6

March 28 1957



N 30.2 S
E 30. W

FK
RG
KP
JT

March 28, 1957

BENCH LEVELS

Sta	+	⊼	−	Elev.	
BM	7.27	907.63			(900.36)
TP	7.25	914.57	0.31	907.32	
BM			9.26	905.31	
TP	12.07	923.77	2.87	911.70	
BM			3.87	919.90	
BM	13.72	923.77	13.72	910.05	
TP	3.67	914.59	12.85	910.92	
BM			9.29	905.30	
TP	0.70	908.03	7.26	907.33	
BM			7.67	900.36	(900.36)

March 28, 1957
Windy

Top Mont S.E. Cor Sec. 9-29-22

Top E. End 18"x34"CM 17'Rt sta 0+85

NW Cor Conc Garage Apron Rt Sta 4+40

Top R/W Guard post 74'Rt sta 6+72

Top E. End 18"x34"CM 17'Rt sta 0+85

Top Mont S.E. Cor Sec 9-29-22

X-Sections

Sta	+	π	-	Elev.
BM	8.80	914.10		(905.30)
0+00				
-23				
-31	℄ C&RR B			
-42				
-60				
-100				

℄ March 28, 1959

Lt Rt 10

Top E. End 18"x34"CM 17'Rt Sta 0+85

09.9

4.2

09.6

4.5

09.3

4.8

09.1

5.0

09.3

4.8

10.0

4.1

Sta	+	↑	−	Elev	
		914.10			
-150					
-200					
-250					
VTP			6.77	907.33	(907.33)
BM	8.90	914.20			(905.30)
0-31	Profile Co Rd "B"				
0-10					

FK
RG
KP
JT

Lt

℄ March 28, 1957
March 29, 1957

Rt 11

10.0

4.1

09.4

4.7

08.5

5.6

Top E. End 18"x34" CM 19' Rt Sta 0+85

14.2 11.5 09.3 06.3 03.9 P.

0.0 2.7 4.7 7.9 10.3
99 50 50 100

11.7 10.3 10.1 10.1 09.9 09.6 08.7 08.3 04.8

2.5 3.9 3.8 4.1 4.3 4.6 5.5 5.9 9.4
50 41 22 9 6 14 20 27

P 00.3 01.8

13.9 12.4
50 35

Sta	+	π	-	Elev.
		9/A.20		
0+00				
✓				
+15				
✓				
+28				
✓				

& March 29, 1957

Lt. Rt. 12

11.6 11.0 10.1 09.7 10.2 09.4 09.0 09.4 04.9

2.6 3.2 4.1 4.5 4.0 4.8 5.2 5.8 9.4
50 33 17 15 8 14 21 27

900.0 01.5

14.2 12.7
50 33

11.8 07.0 07.6 08.5 09.2 09.6 09.2 08.8 05.9 03.2

2.4 6.2 4.6 5.7 5.0 4.6 5.0 5.4 8.3 11.0
33 25 19 17 9 6 18 23 28

911.9 899.9 00.1 00.9

2.3 14.2 14.1 13.3
50 50 37 32

07.6 07.0 08.4 08.6 09.1 08.0 09.0 05.4 01.8

6.6 7.2 5.8 5.6 5.1 5.2 5.2 8.8 12.4
30 17 15 10 9 11 17 23

10.0 11.5 11.7 00.3 00.1 00.4

4.2 2.7 2.5 13.9 14.1 13.8
38 44 50 51 42 32

Sta	+	℄	-	Elev
		914.20		
0+60				
+85	this x-drain is directly in line with New Garage in basement			
+50				

March 29, 1957

Lt

07.7 06.7 07.3 06.1 06.3 06.4 08.3 04.8 01.3

6.5 7.5 6.9 6.1 5.9 5.8 5.9 9.4 12.9
23 16 14 10 7 10 16 22

09.2 11.2 11.1 10.2 10.3

5.0 3.0 3.1 14.0 13.9
35 47 50 50 32

10.5 45-49 03.72

3.7 about what Garage Floor will Be

8.71
FL 18" x 34' CM
17'

10.48
FL 18" x 34' CM
17

07.5 06.7 08.0 06.0 06.0 08.1 08.0 05.3 01.7

6.1 7.5 6.2 6.2 6.2 6.1 6.2 8.9 12.5
23 16 12 8 4 10 15 21

06.5 09.4 11.3 11.9 10.4 10.5 10.6

5.7 4.8 2.9 2.3 13.8 13.7 13.6
25 32 39 50 50 12 31

09.8 08.4 08.0 08.3 08.4 08.4 08.2 07.9 06.1 02.5 01.6

4.4 5.8 6.2 5.9 5.8 5.8 6.0 6.3 8.1 11.7 12.6
26 21 17 13 8 5 10 15 21 27

10.4 11.3 01.4 01.7

3.8 2.9 12.8 13.0
38 50 50 39

Sta	+	℄	−	Elev.
		914.20		
2				
✓				
TP	9.83	920.62	3.41	910.79
+28				
✓				
+70				

March 29, 1957

	Lt						Rt	
09.9	09.1	09.2	09.4	09.7	09.5	09.5	09.2	06.6
4.3	5.1	5.0	4.8	4.5	4.7	4.7	5.0	7.6
21	17	14	8		6	10	12	18
11.1	11.9	13.3			04.1	03.6	03.6	04.3
3.1	2.3	0.9			10.1	10.4	10.6	9.9
27	38	50			50	43	30	23
12.4	10.0	10.3	10.4	10.9	10.5	10.3	09.6	07.1
8.2	10.6	10.3	10.2	9.7	10.1	10.3	11.0	13.5
26	17	13	8		8	11	13	17
12.9	14.0					05.9	05.2	05.5
7.7	6.6					14.7	15.4	15.1
38	50					50	38	26
16.2	16.3	14.0	12.4	12.1	13.1	12.6	13.2	12.5	11.7	11.6
4.4	4.3	6.6	8.2	8.1	7.5	8.0	7.4	8.1	8.9	9.0
24	23	18	13	8		11	14	25	35	44
15.4	15.2	15.6	15.3	16.5					11.4	
5.2	5.4	5.0	5.3	4.1					9.2	
26	28	35	39	50					50	

Sta	+	π	−	Elev.
		920.62		
3+00				
✓				
TP	10.51	929.35	1.78	918.84
+25				
✓				
+39				

March 29, 1957

Lt

Rt 15

17.8 15.2 14.5 14.4 15.1 14.9 14.9 15.4 15.9

2.8 5.4 6.1 6.2 5.5 6.2 5.7 5.2 4.7
19 15 11 8 11 14 23 31

20.5 18.5 19.3 20.1 14.7 15.3

0.1 2.1 1.3 0.5 5.9 5.3
24 29 41 50 50 35

21.0 19.5 16.4 16.2 16.8 16.1 16.6 17.6 18.2

8.4 10.9 13.0 13.2 12.6 13.3 12.8 11.8 11.2
21 16 10 7 11 14 21 37

23.3 22.3 22.3 22.6 23.7 19.4

6.1 7.1 7.1 6.8 5.7 11.0
26 29 37 42 50 50

25.0 21.1 17.4 16.9 17.5 17.0 17.5 18.1 18.4

4.4 8.3 12.0 12.5 11.9 12.4 11.9 11.3 11.0
25 20 13 7 13 14 25 39

25.3 25.9 26.2 18.7

4.1 3.5 3.2 10.7
29 40 50 50

Sta	+	π	-	Elev.
		929.35		
3+45				
✓				
+71				
✓				
4				

March 29, 1957

Lt

Rt 16

18.5	17.4	17.3	17.9	17.3	17.9	19.1	19.8
10.9	12.0	12.1	11.5	12.1	11.5	10.3	9.6
15	11	7		12	13	22	38

27.2	26.2	26.6	26.7				20.0
2.2	3.2	2.8	2.7				9.4
20	25	33	50				50

24.2	20.7	19.1	18.5	18.6	18.9	19.1	18.6	19.9	20.5
52	8.7	10.3	10.9	10.8	10.5	10.3	10.8	9.5	8.9
22	16	12	8	4		2	12	20	29

26.8	27.5	27.7	27.2	28.3			21.7		20.7
2.6	1.9	1.7	2.2	1.1			7.7		8.7
25	28	36	38	50			Ho 85		50

25.4	22.3	19.2	19.3	19.7	19.9	19.5	21.1	21.3	21.2
4.0	2.1	10.2	10.1	9.7	9.5	9.9	8.3	8.1	8.2
25	21	12	8		3	13	22	33	50

28.4	28.5	28.8	28.9
1.0	0.9	0.6	0.5
29	38	47	50

Sta	+	x	-	Elev	
		929.35			
1+26					
+50					
+74					
BM	1.47	921.37	9.43	919.92	919.90

℄ March 29, 1957

Lt | Rt 17

23.3	21.1	20.2	19.6	19.9	20.1	19.8	19.8	20.0
6.1	8.3	9.2	9.8	9.5	9.3	9.6	9.6	9.4
21	15	10	8		5	14	23	25
27.7	26.0	27.8	27.9			20.1	20.2	
1.7	1.4	1.6	1.5			9.3	9.2	
28	31	40	50			50	39	
25.0	23.2	21.8	19.6	19.4	16.6	19.6	19.4	19.6	19.7
4.0	6.2	7.6	9.8	10.0	9.8	9.8	10.0	9.8	9.7
26	22	17	10	5		6	15	21	35
25.7	25.8	26.1	26.6						19.6
3.7	3.6	3.3	2.8						9.8
28	35	45	50						50
21.6	20.8	19.9	18.5	18.8	18.8	18.7	18.4	18.1	18.2
7.8	8.6	9.5	10.9	10.6	10.6	10.7	11.0	11.3	11.2
23	17	15	11	5		4	13	16	19
22.7	23.5	23.9					17.7	18.1	
6.7	5.9	5.5					11.7	11.3	
26	39	50					50	37	

NW Cor Conc Garage Apron Rt Sta 4+40

Sta	+	π	−	Elev.
		921.37		
4+88	Good for Ent Lt Beyond 30'			
✓				
5	Good for Ent Lt to 30'			
+50				

March 29 1937

Lt

17.8 17.9 17.8 18.2 16.3 18.2

3.6 3.5 3.6 3.2 3.1 3.2
25 16 12 6 5

18.9 19.9 21.4

2.5 1.5 0.0
33 50 70

19.4 19.1 17.4 17.7 17.0 17.9

2.0 3.3 4.0 3.7 3.5 3.5
41 24 12 8 5

20.0

1.9
50

18.9 17.6 16.1 16.3 16.2 16.1

2.5 3.8 5.3 5.1 5.2 5.3
34 20 11 7 11

19.4 18.7

2.0 2.7
44 50

Rt 18

17.9 17.4 17.8

3.5 4.0 3.6
13 17 19

17.1 17.3 17.4

4.3 4.1 4.0
50 44 32

17.6 16.6 17.0

3.8 4.8 4.4
13 18 26

16.5 16.7 16.9

4.9 4.7 4.5
50 44 33

15.9 15.5 14.8

5.5 5.9 6.6
17 21 23

14.3 14.9 15.1

7.1 6.5 6.3
50 34 25

Sta	+	℄	-	Elev
		92i.37		
6				
V				
+29		W. End X-Drain Buried		
+30				
V				
+34				

March 29, 1957

Lt

15.8 15.3 14.9 15.3 15.2 15.0 14.6 13.4 12.2

5.6 6.1 6.5 6.1 6.2 6.4 6.8 8.0 9.2
22 18 13 8 10 19 24 29

17.1 17.6 17.8 11.3 11.4 11.7

4.3 3.8 3.6 10.1 10.0 9.7
33 43 50 50 46 35

15.4 15.0 14.5 15.0 14.9 14.6 14.2 12.8 12.0

6.0 6.4 6.9 6.4 6.5 6.8 7.2 8.6 9.4
28 22 14 7 6 10 22 27

16.3 16.7 16.8 10.6 11.0

5.1 4.7 4.6 10.8 10.4
38 48 50 50 35

Rt 19

910.72

10.65
FL. 12'CN
27

16.0 15.0 14.5 14.7 14.9 14.8 14.5 14.1 12.0 11.1 11.5

5.4 6.4 6.9 6.7 6.5 6.6 6.9 7.3 9.4 10.3 9.9
50 34 25 20 9 6 11 26 30 31

10.9 11.1

10.5 10.3
50 42

Sta	+	℄	−	Elev
		921.37		
6+38				
+40				
+50	℄ St Rt	+Ex+Lt		
+62				
+66				
+67				

March 29, 1957

Lt

Rt 20

10.52
FL SE 12"x48"CM
31

16.4 15.7 15.3 14.8 14.9 14.7 14.1 12.9 11.9 11.4 11.2

5.0 5.7 6.1 6.6 6.5 6.7 7.3 8.5 9.5 10.0 10.2
50 37 27 18 10 11 20 30 40 50

19.4 16.7 16.4 15.7 14.7 14.3 13.6 12.3 11.2 10.6

2.0 4.7 5.0 5.7 6.7 7.1 7.8 9.1 10.2 11.8
100 50 44 29 10 12 32 50 100

16.1 14.9 14.0 13.8 13.8 13.0 12.5 11.8 11.6 10.7

5.3 6.5 7.4 7.6 7.6 8.4 8.9 9.6 9.8 10.2
50 32 17 9 11 18 28 37 50

99.34

12.03
FL 12"CM
31

15.5 14.9 14.3 13.8 13.5 13.5 12.7 11.7 10.4 10.1 09.2

5.9 6.5 7.1 7.6 7.9 7.9 8.7 9.7 11.0 11.3 12.2
50 40 28 17 10 11 22 28 38 50

Sta	+	I	-	Elev	
		921.37			
7					
✓					
BM	1.77	911.82	11.32	910.05	(910.05)
+50					
8					
✓					
+50			7.2		
9			9.7		
+50			12.2		
BM			1.77	910.05	(910.05)

Lt ℄ Rt

11.5 10.7 11.2 11.7 12.0 11.7 11.1 09.1

9.9 10.7 10.2 9.7 9.4 9.7 10.3 12.3
24 20 17 7 10 15 25

14.2 14.8 15.3 06.7 07.8

7.2 6.6 6.1 14.7 13.6
34 41 50 50 35

Top R/W Guard post 74' Rt sta 6+72

09.3
2.1

05.2 05.2 06.3 06.9 07.2 06.8 06.0 04.9 05.3

6.6 6.6 5.5 4.9 4.6 5.0 5.8 6.9 6.5
20 18 13 10 10 15 20 24

06.3 09.0 11.5 13.3 14.3 04.8 05.4 06.0

5.5 2.8 0.3 +1.5 +2.5 7.0 6.4 5.8
24 30 36 41 50 50 45 34

04.6

99.6 02.1

Top R/w Guard Post 74' Rt sta 6+72

Sta	+	x	-	Elev