1041

LEVEL BOOK

373

KEUFFEL & ESSER CO.

DRAWING MATERIALS
AND
SURVEYING INSTRUMENTS.

NEW YORK.

CHICAGO. ST. LOUIS. SAN FRANCISCO. MONTREAL.

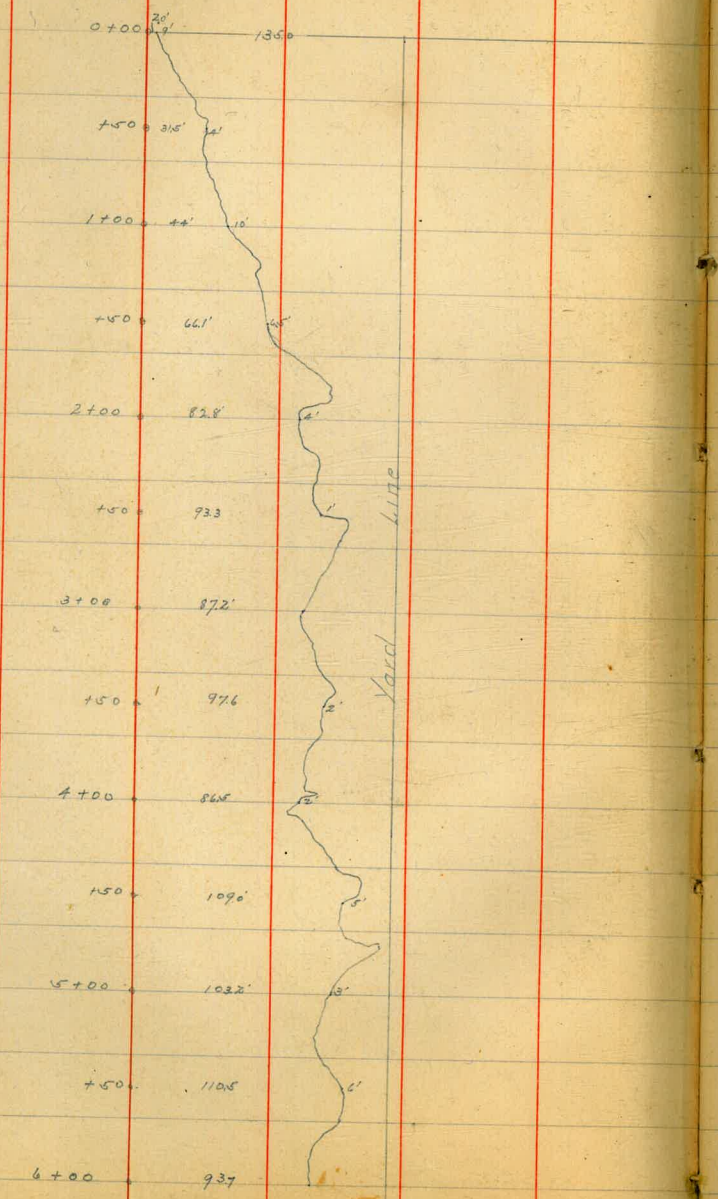
Tables for Excavations and Embankments.

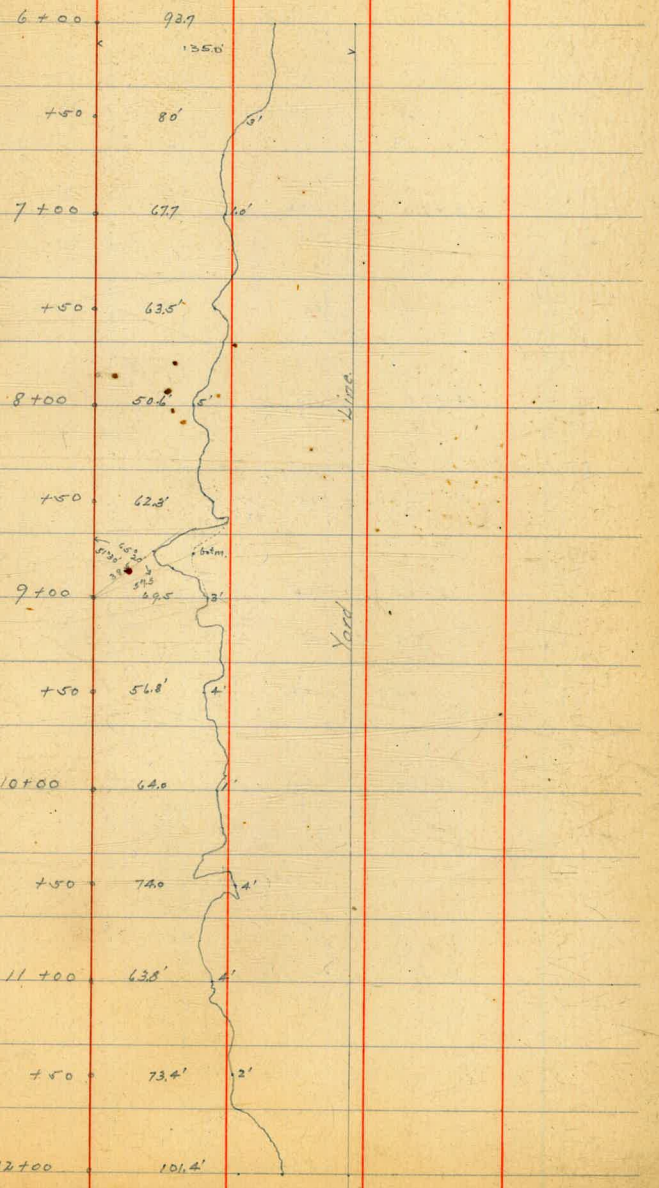
DISTANCES FROM CENTER OF ROADWAY FOR CROSS-SECTIONING.
ROADWAY 18 FEET WIDE. SIDE SLOPES 1 TO 1.
FOR SINGLE TRACK EXCAVATION.

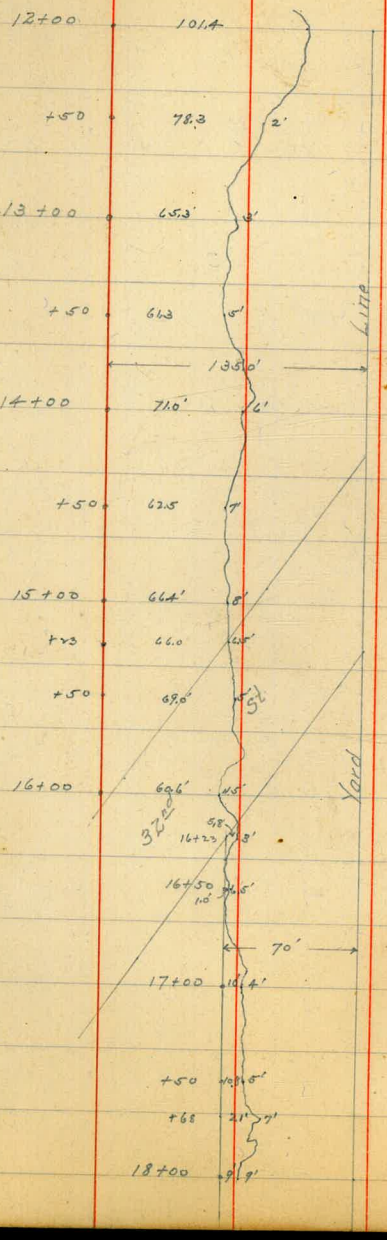
	0	.1	.2	.3	.4	.5	.6	.7	.8	.9	
0	9.0	9.1	9.2	9.3	9.4	9.5	9.6	9.7	9.8	9.9	0
1	10.0	10.1	10.2	10.3	10.4	10.5	10.6	10.7	10.8	10.9	1
2	11.0	11.1	11.2	11.3	11.4	11.5	11.6	11.7	11.8	11.9	2
3	12.0	12.1	12.2	12.3	12.4	12.5	12.6	12.7	12.8	12.9	3
4	13.0	13.1	13.2	13.3	13.4	13.5	13.6	13.7	13.8	13.9	4
5	14.0	14.1	14.2	14.3	14.4	14.5	14.6	14.7	14.8	14.9	5
6	15.0	15.1	15.2	15.3	15.4	15.5	15.6	15.7	15.8	15.9	6
7	16.0	16.1	16.2	16.3	16.4	16.5	16.6	16.7	16.8	16.9	7
8	17.0	17.1	17.2	17.3	17.4	17.5	17.6	17.7	17.8	17.9	8
9	18.0	18.1	18.2	18.3	18.4	18.5	18.6	18.7	18.8	18.9	9
10	19.0	19.1	19.2	19.3	19.4	19.5	19.6	19.7	19.8	19.9	10
11	20.0	20.1	20.2	20.3	20.4	20.5	20.6	20.7	20.8	20.9	11
12	21.0	21.1	21.2	21.3	21.4	21.5	21.6	21.7	21.8	21.9	12
13	22.0	22.1	22.2	22.3	22.4	22.5	22.6	22.7	22.8	22.9	13
14	23.0	23.1	23.2	23.3	23.4	23.5	23.6	23.7	23.8	23.9	14
15	24.0	24.1	24.2	24.3	24.4	24.5	24.6	24.7	24.8	24.9	15
16	25.0	25.1	25.2	25.3	25.4	25.5	25.6	25.7	25.8	25.9	16
17	26.0	26.1	26.2	26.3	26.4	26.5	26.6	26.7	26.8	26.9	17
18	27.0	27.1	27.2	27.3	27.4	27.5	27.6	27.7	27.8	27.9	18
19	28.0	28.1	28.2	28.3	28.4	28.5	28.6	28.7	28.8	28.9	19
20	29.0	29.1	29.2	29.3	29.4	29.5	29.6	29.7	29.8	29.9	20
21	30.0	30.1	30.2	30.3	30.4	30.5	30.6	30.7	30.8	30.9	21
22	31.0	31.1	31.2	31.3	31.4	31.5	31.6	31.7	31.8	31.9	22
23	32.0	32.1	32.2	32.3	32.4	32.5	32.6	32.7	32.8	32.9	23
24	33.0	33.1	33.2	33.3	33.4	33.5	33.6	33.7	33.8	33.9	24
25	34.0	34.1	34.2	34.3	34.4	34.5	34.6	34.7	34.8	34.9	25
26	35.0	35.1	35.2	35.3	35.4	35.5	35.6	35.7	35.8	35.9	26
27	36.0	36.1	36.2	36.3	36.4	36.5	36.6	36.7	36.8	36.9	27
28	37.0	37.1	37.2	37.3	37.4	37.5	37.6	37.7	37.8	37.9	28
29	38.0	38.1	38.2	38.3	38.4	38.5	38.6	38.7	38.8	38.9	29
30	39.0	39.1	39.2	39.3	39.4	39.5	39.6	39.7	39.8	39.9	30
31	40.0	40.1	40.2	40.3	40.4	40.5	40.6	40.7	40.8	40.9	31
32	41.0	41.1	41.2	41.3	41.4	41.5	41.6	41.7	41.8	41.9	32
33	42.0	42.1	42.2	42.3	42.4	42.5	42.6	42.7	42.8	42.9	33
34	43.0	43.1	43.2	43.3	43.4	43.5	43.6	43.7	43.8	43.9	34
35	44.0	44.1	44.2	44.3	44.4	44.5	44.6	44.7	44.8	44.9	35
36	45.0	45.1	45.2	45.3	45.4	45.5	45.6	45.7	45.8	45.9	36

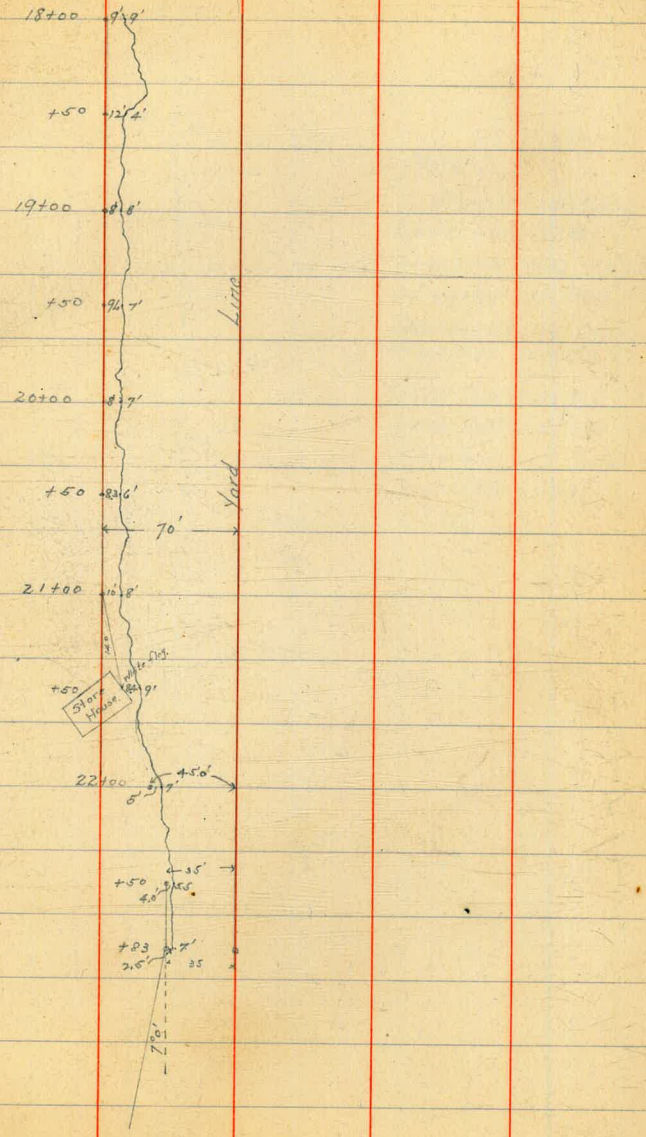
Calculated by Julien A. Hall, M. Am. Soc. C. E.

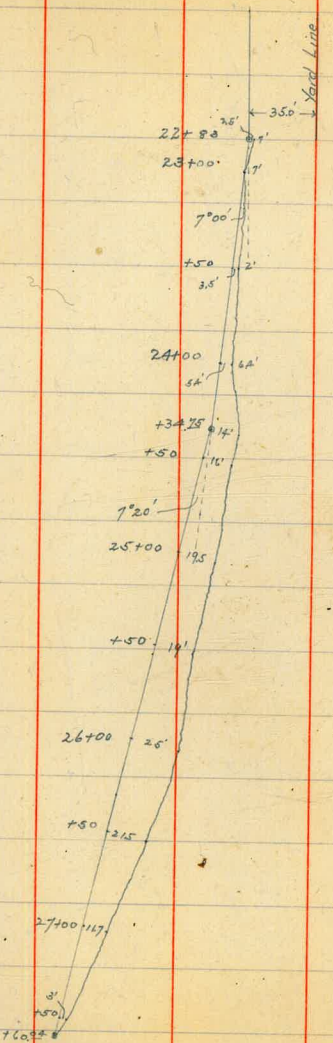
Offsets to top and bottom of bluff at Shipyard's Drive.






12+00
10.1.4
+50
78.3
2'
13+00
65.3'
3'
+50
64.3
5'
Line
135.0'
14+00
71.0'
6'
+50
62.5
7'
15+00
66.4'
8'
+43
66.0
6.5'
+50
69.0'
5'
16+00
60.6'
4.5'
32°
5.8
16+23
3'
16+50
1.0'
4.5'
70'
17+00
10.4'
Yard
+50
+68
2.1'
7'
18+00
9'
9'


18+00
9.9'
+50
12.4'
19+00
8.8'
+50
9.6.7'
Line
20+00
8.2.7'
+50
8.3.6'
Yard
70'
21+00
10.8'
+50
Store House
9'
22+00
4.5.0'
6'
9'
+50
4.0'
4.5'
35'
+23
2.5'
7'
35
7.01



Soundings for Concrete ship yard.

— X Sect. at Sta. 22+83 —

Station	Depth of Water	Elev. W.S.	Elev. Bottom
21	31	G = 0.7	− 30.3
+50	29		28.3
20	29		28.3
+50	28	0.8	27.2
19	27		26.2
+50	26		25.2
18	25		24.2
+50	23	0.9	22.1
17	22		21.1
+50	19.5		18.6
16	18.5	1.0	17.5
+50	17		16.0
15	16		15.0
+50	15	1.1	13.9
14	14		12.9
+50	13		11.9
13	12.5		11.4
+50	12	1.2	10.8
12	12		10.8
+50	11.5		10.3

{Norman
Otten.
Shaw.

Aug 1918

— Note —

Plane of reference is Lower Low Water. Soundings give depth of water at time the soundings are taken together with elev. of Water Surface at that time refered to L.L.W.

0 = −7.01 City Datum
= −2.89 U.S.G.S.

11	11	1.2	9.8
+50	11	G=1.3	9.7
10	10		8.7
+50	10		8.7
9	8		7.7
+50	7 1/2	1.4	6.1
8	5 1/2		4.1
+50	4.		2.6
7	3 1/2	1.5	2.1
+50	3 1/2	1.5	2.0
6	3 1/2		2.0
+50	3 1/2		2.0
5	3	1.6	1.4
+50	2 1/2		0.9
4	2 1/2		0.9
+50	2		− 0.4
3	1 1/2	1.7	+ 0.2
+50	1 1/2		+ 0.2
2	1		+ 0.7
+50	1	1.8	+ 0.8

1	0.8		+ 1.0
+50	0.4		+ 1.4
00	0.2	G=1.9	+ 1.7
	Section 31	22+50	
21	31		- 29.2
+50	30	G=1.8	28.2
20	29.5		27.7
+50	28.5		26.7
19	27 1/2		25.7
+50	26		24.2
18	25	line of	23.2
50	23 1/2		21.7
17	22		20.2
+50	21		19.2
16	19	2.0	17.0
+50	18	3.1	15.9
15	18		14.9
+50	17		13.9
14	16	3.2	12.8
+50	15		11.8
13	14 1/2		11.3

+50	14	3.2	10.8
12	13 1/2		10.3
+50	13 1/2		10.3
11	13		9.8
+50	12 1/2	3.3	9.2
10	12		8.7
+50	11 1/2		8.2
9	11		7.7
+50	10		6.7
8	7 1/2		4.2
+50	6		2.7
7	5	3.4	1.6
+50	5 1/2		2.1
6	5		1.6
+50	5		1.6
5	4 1/2		1.1
+5	4		0.6
4	4		0.6
+50	3 1/2		-0.1
3	3 1/2	3.5	0.0

+50	3	3.5	+0.5
2	3		+0.5
+50	2 1/2		+1.0
1	2 1/2		+1.0
+50	2		+1.5
00	2	G = 3.6	+1.6

Sta 22	2	G=2.8				+	11½	3.1	8.4		
00	1.0		+ 1.8			10	12		8.9		
+ 50	1.5		+ 1.3			+	12½		9.4		
1	1.5		+ 1.3			11	13		9.9		
+ 50	1.5		+ 1.3			+	13		9.9		
2	2.0		+ 0.8			12	13½	3.2	10.3		
+ 50	2½		+ 0.3			+	14		10.8		
3	3	2.9	- 0.1			13	14½		11.3		
+ 50	3		0.1			+	15		11.8		
4	4		1.1			14	16		12.8		
+	4		1.1			+	17		13.8		
5	4½		1.6			15	18	3.3	14.7		
+	5		2.1			+ 50	19½		16.2		
6	5	3.0	2.0			16	21		17.7		
+ 50	5		2.0			+	22½		19.2		
7	5		2.0			17	24		20.7		
+	6½		3.5			+	25½		22.2		
8	8		6.0			18	27	3.4	23.6		
+	10		7.0			+	27½		24.1		
9	11½	3.1	8.4			19	30		26.6		

+	30 ½	3.4	27.1
20	31	3.5	27.5
+	32		28.5
21	33	G=3.5	- 29.5

21+50

00	3 ½	G 5.3	+1.8
+	4		+1.3
1	4		+1.3
+	4 ¼		+0.8
2	4 ½		+0.8
+	5		+0.3
3	5 ½		- 0.2
+	6		0.7
4	6		0.7
+	6 ½		1.2
5	7	5.4	1.6
+	7		1.6
6	7		1.6
+	7 ½		2.1
7	8		2.6
+	10 ½		5.1
8	12		6.6
+	12 ½		7.1
9	13 ½		8.1
+	14		8.6

10	14		8.5
+	15	55	9.5
11	15½		10.0
+	16		10.5
12	16		10.5
+	16		10.5
13	16		10.5
+	17½		12.0
14	18		12.5
+	18½		13.0
15	20		14.5
+	21½	56	15.9
16	23		17.4
+	24½		18.9
17	26		20.4
+	27½		21.9
18	29		23.4
+	30½		24.9
19	32		26.4
+	33		27.4

20	33½		27.8
+	34½		28.8
21	35	G=5.7	-29.3

00	4½	G=5.9	+ 1.4
+	4½		+1.4
1	5		+0.9
+	※5		+0.9
2	5		+0.9
+	5½		+0.4
3	6		- 0.1
+	6½		0.6
4	7		1.1
+	7		1.1
5	7½	5.8	1.7
+	7½		1.7
6	7½		1.7
+	9		3.2
7	10		4.2
+	7½		5.7
8	12½		6.7
+	13		7.2
9	14		8.2
+	14½		8.7

10	15		9.2
+	15	5.8	9.2
11	15½		9.7
+	16		10.2
12	16		10.2
+	17		11.2
13	17		11.2
+	17½		11.7
14	18½		12.7
+	19½		13.7
15	20½		14.7
+	22		16.2
16	23½	5.7	17.8
+	25		19.3
17	26½		20.8
+	27½		21.8
18	29½		23.8
+	31		25.3
19	32		26.3
+	33		27.3

20	34		283		
4	35		293		
21	35	57	- 293		

10+50

00	1.	G=2.7	+1.2		
+50	1.		+1.2		
1	1 1/2		+0.7		
+	1 1/2		+0.7		
2	2		+0.2		
+	2	2.3	+0.3		
3	2 1/2		-0.2		
+	3		-0.7		
4	3 1/2		1.2		
+	3 1/2	2.3	1.2		
5	3 1/2		1.2		
+	4		1.7		
6	5 1/2		3.2		
+	6 1/2	2.4	4.1		
7	7 1/2		5.1		
+	8 1/2		6.1		
8	9	2.4	6.6		
+	10		7.6		
9	10 1/2		8.1		
+	11		8.6		

10	11½	25	9.0
〃	12		9.5
11	12		9.5
〃	13		10.5
12	13		10.5
〃	13½	25	11.0
13	13½		11.0
〃	14		11.5
14	15		12.5
〃	16½	26	13.9
15	17		14.4
〃	19		16.4
16	21		18.4
〃	22½	26	19.9
17	24		21.4
〃	25		22.4
18	26½		23.9
〃	28	27	25.3
19	30		27.3
〃	31		28.3
20	31		28.3
〃	32		29.3
21	32	G=2.7	- 29.3

20			
00	3	G=4.3	+1.3
+	3		+1.3
1	3 1/2		+0.8
+	3 1/2		+0.8
2	4	4.4	+0.4
+	4 1/2		-0.1
3	4 1/2		-0.1
+	5		-0.6
4	5	4.4	0.6
+	6		1.6
5	6 1/2		2.1
+	7 1/2		3.1
6	9	4.5	4.5
+	9 1/2		5.0
7	10		5.5
+	11		6.5
8	11 1/2	4.5	7.0
+	12		7.5
9	12 1/2		8.0
+	13		8.5
10	13 1/2	4.6	8.9
+	14		9.4
11	14 1/2		9.9
+	15		10.4
12	15		10.4
+	15 1/2	4.6	10.9
13	16		11.4
+	16 1/2		11.9
14	17		12.4
+	18 1/2	4.7	13.8
15	20		15.3
+	21 1/2		16.8
16	23		18.3
+	25	4.7	20.3
17	26		21.3
+	27 1/2		22.8
18	29		24.3
+	31	4.8	26.2
19	32		27.2
+	33 1/2		28.7

20	34		29.2
+	34½		29.7
21	34½	G=4.8	-29.7

21	35½	G=5.7	-29.8
+	35½		29.8
20	35		29.3
+	34		28.3
19	33		27.3
+	32		26.3
18+10		Offset line of piling	
18	31		25.3
+	29	5.8	23.2
17	27½		21.7
+	26		20.2
16	24½		18.7
+	22½		16.7
15	21		15.2
+	19		13.2
14	18	5.8	12.2
+	17		11.2
13	16		10.2
+	16½		10.7
12	16		10.2

+	15½	5.8	9.7		
11	15½		9.7		
+	15	5.9	9.1		
10	14½		8.6		
+	14		8.1		
9	13½		7.6		
+	13		7.1		
8	12½		6.6		
+	12		6.1		
7	11½	5.9	5.6		
+	11		5.1		
6	10½		4.6		
+	9½		3.6		
5	9		3.1		
+	8		2.1		
4	7½		1.6		
+	6½	6.0	- 0.5		
3	6		0.0		
+	6		0.0		
2	5½		+0.5		

+	5		+1.0		
1	4½		+1.5		
+	4½		+1.5		
1-00	4½	G=6.0	+1.5		

19

00	1	G = 2.6	+ 1.6
+	1 1/2		+ 1.1
1	1 1/2		+ 11
+	2		+ 0.6
2	2		+ 0.6
+	2 1/2		+ 0.1
3	3		- 0.4
+	+	2.7	1.3
4	5		2.3
+	5 1/2		2.8
5	6		3.3
+	6 1/2		3.8
6	7		4.3
+	7 1/2		4.8
7	8	G = 2.7	- 5.3

18+50

00	9	G 2.8	- 6.2
+	8		5.2
6	7 1/2		4.7
+	7		4.2
5	6 1/2		3.7
+	6		3.2
4	5		2.2
+	4 1/2	2.9	1.6
3	3 1/2		0.6
+	3		- 0.1
2	2 1/2		+ 0.4
+	2		+ 0.9
1	1 1/2		+ 1.4
+	1 1/2		+ 1.4
00	1 1/2	G = 2.9	+ 1.4

7	10	G=3.9	- 6.1
+	9 1/2		5.6
6	9		5.1
+	8		4.1
5	7 1/2		3.6
+	7		3.1
4	6 1/2		2.6
+	6	4.0	2.0
3	5 1/2		- 1.5
+	4		0.0
2	3 1/2		+0.5
+	3 1/2		+0.5
1	3		+1.0
+	3		+1.0
0 0	3	G=4.0	+1.0

7	10	G=4.3	- 5.7
+	9 1/2		5.2
6	9		4.7
+	8 1/2		4.2
5	8	4.4	3.6
+	7 1/2		3.1
4	7		2.6
+	6 1/2	4.4	2.1
3	6		1.6
+	5		- 0.6
2	4	4.5	+0.5
+	4		+0.5
1	3 1/2		+1.0
+50	3 1/2		+1.0
0 0	3	G=4.5	+1.5

7	10	G=4.9	− 5.1
+	10		5.1
6	9 1/2		4.6
+	9		4.1
5	8 1/2		3.6
+	8		3.1
4	7 1/2		2.6
+	7 1/2	5.0	2.5
3	7		2.0
+	6		− 1.0
2	5		0.0
+	4 1/2		+ 0.5
1	4		+ 1.0
+	4		+ 1.0
0	3 1/2	G=5.0	+ 1.5

7	10	G=5.7	− 4.3
+	10 1/2		4.8
6	10		4.3
+	10		4.3
5	9 1/2		3.8
+	9		3.3
4	8 1/2		2.8
+	8	5.8	2.2
3	7 1/2		1.7
+	7		1.2
2	6		− 0.2
+	5 1/2		+ 0.3
1	5		+ 0.8
+	4 1/2	G=5.8	+ 1.3
0	4		+ 1.8

7	9	G = 3.4	- 5.6
+	8		4.6
6	8		4.6
+	7 1/2		4.1
5	7		3.6
+	6 1/2		3.1
4	6		2.6
+	6		2.6
3	5 1/2		2.1
+	4 1/2		1.1
2	4		0.6
+	3 1/2		- 0.1
1	3		+ 0.4
+	2 1/2		+ 0.9
0.0	2	G = 3.4	+ 1.4

7	8	G = 3.0	- 5.0
+	8		5.0
6	7 1/2		4.5
+	7		4.0
5	6 1/2		3.5
+	6 1/2		3.5
4	6		3.0
+	5 1/2		2.5
3	5		2.0
+	4		1.0
2	4		1.0
+	3 1/2		- 0.5
1	3		0.0
+	2		+ 1.0
0.0	2	G = 3.0	+ 1.0

7	8	G = 2.7	- 5.3
+	7 1/2		4.8
6	7		4.3
+	6 1/2		3.8
5	6 1/2		3.8
+	6		3.3
4	5 1/2		2.8
+	5		2.3
3	4 1/2		1.8
+	4		1.3
2	3 1/2		0.8
+	3		0.3
1	3		- 0.3
+	2 1/2		+ 0.2
00	2	G = 2.7	+ 0.7

14+50

7	7 1/2	G = 2.7	- 4.8
+	7		4.3
6	7		4.3
+	6 1/2		3.8
5	6		3.3
+	6		3.3
4	5 1/2		2.8
+	5		2.3
3	4		1.3
+	4		1.3
2	3 1/2		0.8
+	3.3		0.6
1	3		0.3
+	3		- 0.3
00	2 1/2	G = 2.7	+ 0.2

7	7½	G = 3.4	- 4.1
+	7½		4.1
6	7		3.6
+	6½		3.1
5	6½		3.1
+	6		2.6
4	6		2.6
+	5½		2.1
3	5		1.6
+	4½		1.1
2	4		0.6
+	4		0.6
1	3½		0.1
+	3½		0.1
0 0	3½	G = 3.4	- 0.1

7	8	G = 4.1	- 3.9
+	7½		3.4
6	7.2		3.4
+	7		2.9
5	7		2.9
+	6½		2.4
4	6½		2.4
+	6.2		2.1
3	6		1.9
+	5		0.9
2	5		0.9
+	4.2		- 0.1
1	4		+ 0.1
+	4		+ 0.1
0 0	3½	G = 4.1	+ 0.6

7	8½	G=4.3	-4.2
+	8		3.7
6	7.8		3.5
+	7½		3.2
5	7.2		2.9
+	7		2.7
4	6½		2.2
+	6.3		2.0
3	6.		1.7
+	5½		1.2
2	5		0.7
+	4.8		-0.5
1	4		+0.3
+	4		+0.3
00	3.8	G=4.3	+0.5

7	7.8	G=3.8	-4.0
+	7.½		3.6
6	7.3		3.4
+	7.0		3.1
5	7.0		3.1
+	6.8		2.9
4	6.2		2.3
+	6.0		2.1
3	5½		1.6
+	5.2		1.3
2	5		1.1
+	4½		0.6
1	4		0.1
+	4		-01
00	3½	G=3.8	+0.4

12

7	7 1/2	G = 3 1/2	- 4.0
+	7 1/2		4.0
6	7.2		3.7
+	7.		3.5
5	7		3.5
+	6 1/2		3.0
4	6.1		2.6
+	6.0		2.5
3	5 1/2		2.0
+	5		1.5
2	4 1/2		1.0
+	4.3		0.8
1	4.0		0.5
+	3.8		- 0.3
00	3.2	3 1/2	+ 0.3

11+50

22

7	7.0	G = 3.0	- 4.0
+	6.8		3.8
6	6 1/2		3.5
+	6.3		3.3
5	6.1		3.1
+	6		3.0
4	5.8		2.8
+	5.1		2.1
3	5		2.0
+	4.6		1.6
2	4.2		1.2
+	4		1.0
1	3 1/2		0.5
+	3.2		- 0.2
00	2.9	G = 3.0	+ 0.1

11

7	6.0	G=2.7	- 3.3
+	6.2		3.5
6	6.1		3.4
+	6		3.3
5	6		3.3
+	5.9		3.2
4	5 1/2		2.8
+	5		2.3
3	4 1/2		1.8
+	4		1.3
2	4		1.3
+	3 1/2		0.8
1	3		0.3
+	3		- 0.3
00	2.1	G=2.7	+0.6

10+50

23

7	6.5	G=2.8	- 3.6
+	6.3		3.4
6	6		3.1
+	6		3.1
5	5.8		2.9
+	5.8		2.9
4	5.2		2.3
+	4.8		1.9
3	4.8		1.9
+	4 1/2		1.6
2	4		1.1
+	3.8		0.9
1	3.0		.0.1
+	3.0		- 0.1
00	2 1/2	G=2.8	+ 0.4

7	6.9	G=3.3	- 3.5
+	6.6		3.3
6	6 1/2		3.2
+	6		2.7
5	6		2.7
+	6		2.7
4	5.9		2.6
+	5.2		1.9
3	5		1.7
+	5		1.7
2	4 1/2		1.2
+	4		0.7
1	3.8		- 0.5
+	3.2		+ 0.1
00	3	G=3.3	+ 0.3

7	7.0	G=4.0	- 3.0
+	7.0		3.0
6	6.8		2.8
+	6.7		2.7
6	6.7		2.7
+	6.7		2.7
1	6.0		2.0
+	6.0		2.0
3	5.8		1.8
+	5.7		1.7
2	5.0		1.0
+	4.8		0.8
1	4.5		- 0.5
+	4.0		0.0
00	3.5	G=4.0	+ 0.5

9

7	7.8	G=4.7	-3.1
+	7 1/2		2.8
6	7.3		2.6
+	7.3		2.6
5	7.1		2.4
+	7		2.3
4	7		2.3
+	6.9		2.2
3	6.3		1.6
+	6.1		1.4
2	5.9		1.2
+	5.5		0.8
1	5.5		0.8
+	4.9		-0.2
00	4.4	G=4.7	+0.3

8+50

25

7	7 1/2	G=4.6	-2.9
+	7 1/2		2.9
6	7.2		2.6
+	7		2.4
5	7		2.4
+	6.8		2.2
4	6.9		2.2
+	6 1/2		1.9
3	6.1		1.5
+	6.0		1.4
2	5 1/2		0.9
+	5 1/2		0.9
1	5.2		0.6
+	5.		-0.4
00	4	G=4.6	+0.6

8			
7	7	G=3.7	-3.3
+	7		3.3
6	6 1/2		2.8
+	6 1/2		2.8
5	6.2		2.5
+	6		2.3
4	6		2.3
+	5.8		2.1
3	5.7		2.0
+	5.3		1.6
2	5		1.3
+	5		1.3
1	4.8		1.1
+	4 1/2		0.8
00	3.8	G=3.7	-01

7+50			
7	8 1/2	G=5.2	-3.3
+	8		2.8
6	7.8		2.6
+	7.8		2.6
5	7.8		2.6
+	7.5		2.3
4	7.3		2.1
+	7.3		2.1
3	7		1.8
+	6.8		1.6
2	6.2		1.0
+	6		0.8
1	6		0.8
+	6		0.8
00	5 1/2	G=5.2	-0.3

7			
7	8	G = 4.9	− 3.1
+	8		3.1
6	7.9		3.0
+	7 1/2		2.6
5	7 1/2		2.6
+	7.1		2.2
4	7		2.1
+	7		2.1
3	6 1/2		1.6
+	6.2		1.4
2	6		1.1
+	5.8		0.9
1	5.6		0.7
+	5.5		0.6
00	5.0	G = 4.9	− 0.1

+ 50		G = 3.8	
7	7.0		− 3.2
+	6.8		3.0
6	6.8		3.0
+	6.3		2.5
5	6.5		2.7
+	6.2		2.4
+	6.0		2.2
+	5.8		2.0
3	5.5		1.7
+	5.5		1.7
2	5 1/2		1.7
+	5.0		1.2
1	4 1/2		0.7
+	4.0		0.2
00	4.0		− 0.2

6

8	35½	C=2.2	-3.3
7	5		2.8
6	5		2.8
5	5		2.8
4	5		2.8
3	4.6		2.4
4	4		1.8
3	4		1.8
3	3.8		1.6
3	3.8		1.6
2	3½		1.3
2	3.2		1.0
1	3.0		0.8
2	2½	C=2.2	-0.3
00	2.2		0.0

5+50

28

7	5.0	C=2.0	-3.0
7	4.8		2.8
6	4½		2.5
7	4.2		2.2
6	4.1		2.1
7	4.0		2.0
4	3.8		1.8
3	3.5		1.5
3	3.3		1.3
3	3.2		1.2
2	3.1		1.1
2	3.1		1.1
1	2½		-0.5
2	2		0.0
00	2	C=2.0	0.0

5					
7-	5.0	G= 2.1	- 2.9		
+	5.0		2.9		
6	4 1/2		2.4		
+	4.2		2.1		
5	4		1.9		
+	3.9		1.8		
4	3.6		1.5		
+	3 1/2		1.4		
3	3.3		1.2		
+	3.4		1.3		
2	3.2		1.1		
+	3.1		1.0		
1	2.5		0.4		
+	2.5		- 0.4		
00	2.0	G= 2.1	+ 0.1		

4+50					29
7	6.5	G= 4.1	- 2.4		
+	6.1/2		2.4		
6	6.3		2.2		
+	6.3		2.2		
5	6.1		2.0		
+	6		1.9		
4	5.8		1.7		
+	5 1/2	4.2	1.3		
3	5.2		1.0		
+	5.2		1.0		
2	5.3		1.1		
+	4.8		0.6		
1	4.9		0.6		
+	4 1/2		- 0.3		
00	3.0	G= 4.2	+ 1.2		

4

7	7.3	G=4.8	- 2.5		
+	7.0		2.2		
6	7.0		2.2		
+	6.8		2.0		
5	6.8	49	1.9		
+	6.5		1.6		
4	6.4		1.5		
+	6.2		1.3		
3	6.0		1.1		
+	6.0	50	1.0		
2	6.0		1.0		
+	5 1/2		0.5		
1	5 1/2		0.5		
+	5.2		- 0.2		
0 0	5.2	G=5.0	0.0		

3+50

30

7	8.0	G=5.3	- 2.7		
+	7.8		2.5		
6	7.8		2.5		
+	7.5		2.2		
5	7.0		1.7		
+	7.0		1.7		
4	6.8		1.5		
+	6.3	54	0.9		
3	6.1		0.7		
+	6.2		0.8		
2	6.2		0.8		
+	5.8		0.4		
1	5.5		- 0.1		
+	5.4		0.0		
0 0	5.0	G=5.4	+ 0.4		

3

7	8.0	G=5.4	- 2.6		
+	8.0		2.6		
6	7.9		1.9		
+	7.5		2.1		
5	7.2		1.8		
+	7.2		1.8		
4	7.0		1.6		
+	6 1/2		1.1		
3	6.3		0.9		
1	6.1		0.7		
2	6.0		0.6		
+	6.0		0.6		
1	5.5		0.1		
+	5.5		- 0.1		
00	4.8	G=5.4	+ 0.6		

3450

7	8	G=5.1	- 2.9		
+	7.9		2.7		
6	7.8		2.7		
+	7.1/2		2.4		
5	7		1.9		
+	7		1.9		
4	6.8		1.7		
+	6.5		1.4		
3	6.1		1.0		
+	6.1		1.0		
2	5.8		0.7		
+	5.7		- 0.6		
1	5.0		+ 0.1		
+	4.9		+ 0.2		
00	4.2	G=5.1	+ 0.9		

2

7	7.1	G=4.9	-2.2
+	7.0		2.1
6	7.0		2.1
+	6.9		2.0
5	6.8		1.9
+	6.3		1.4
4	6.1		1.2
+	6.0		1.1
3	5.9		1.0
+	5.8		0.9
2	5.2		0.3
+	5.0		0.1
1	5.0		-0.1
+	4.5		+0.4
00	4.0	G=4.9	+0.9

1+50

32

7	7.8	G=5.3	-2.5
+	7.8		2.5
6	7.7		2.4
+	7.3		2.0
5	7.0		1.7
+	6.8		1.5
4	6.8		1.5
+	6½	5.4	1.1
3	6.1		0.7
+	6.0		0.6
2	5.7		0.3
+	5½		-0.1
1	5.1		+0.3
+	5.0		+0.4
00	4½	G=5.0	+0.9

7	8.0	G=5.6	- 2.4
+	8.0		2.4
6	8.0		2.4
+	7.7		2.1
5	7.2		1.6
+	7.0		1.4
4	7.0		1.4
+	7.0	5.7	1.3
3	6.7		1.0
+	6 1/2		0.8
2	6 1/2		0.8
+	6.0		- 0.3
1	5.4		+ 0.3
+	5.2		+ 0.5
00	4 1/2	G=5.7	+ 1.2

0 +50

7	8.0	G=5.7	- 2.3
+	8.0		2.3
6	7.9		2.2
+	7.3		1.6
5	7.3		1.6
+	7.0		1.3
4	7.0		1.3
+	6.8		1.2
3	6.7		1.0
+	6.0		0.3
2	6.0		0.3
+	6.0		- 0.3
1	5 1/2		+ 0.2
+	5.3		+ 0.4
00	5.0	G=5.7	+ 0.7

00			
7	6.3	G=4.0	2.3
+	6.2		2.2
6	6.0		2.0
+	6.0		2.0
5	5.9		1.9
+	5.9		1.9
4	5.5		1.5
+	5.3		1.3
3	5.0		1.0
+	5.0		1.0
2	4.3		- 0.3
+	4.0		0.0
1	3.9		+ 0.1
+	3.8		+ 0.2
00	3.2	G=4.0	+ 0.8

19+00			
20	32.2	G=2.5	29.7
+50	31.3		28.8
19	30.0		27.5
+50	28.7		26.2
18	27.5		25.0
+50	26.0		23.5
17	24.3		21.8
+50	22.5		20.0
16	21.0		18.5
+50	19.0	2.6	16.4
15	17.0		14.4
+50	15.5		12.9
14	14.5		11.9
+50	14.0		11.4
13	13.0		10.4
+50	12.8		10.2
12	12.5		9.9
+50	12.4		9.8
11	12.0	2.7	9.3

8 / 13 / 18 { Davis, Byers, Shaw, Butler.

	19+00		
		2.7	
+50	11.8		9.1
10	11.6		8.9
+50	11.0		8.4
9	10.6		8.0
+50	10.0		7.4
8	9.7		7.1
+50	9.0		6.4
7	8.6		5.9
+50	8.0		5.4
6	7.6	2.8	4.6
+50	6.6		3.8
5	6.0		3.2
+50	5.5		2.7
4	5.0		2.2
+50	4.3		1.5
3	3.3		0.5
+50	3.0		0.2
2	2.6		+0.3
+50	2.3		+0.5
1	2.0		+0.8
+50	1.8		+1.0
0	1.7	G=2.9	+1.2

	18+50		
	G 3.70		
20	33.3	—	29.6
+50	32.8		29.1
19	31.6		27.9
+50	31.0		27.3
18	29.5		25.8
+50	27.8		24.1
17	26.0		22.3
+50	24.3	3.8	20.5
16	22.5		18.7
+50	20.8		17.0
15	18.5		14.7
+50	16.8		13.0
14	15.7		11.9
+50	15.0		11.2
13	14.4		10.6
+50	14.0	3.9	10.1
12	13.4		9.5
+50	12.8		8.9
11	12.5		8.6

18+50		3.9	
+50	12.5		8.6
10	12.0		8.1
+50	12.0		8.1
9	11.4		7.5
+50	11.0	4.0	7.0
8	10.8		6.8
+50	10.5		6.5
7	10.5		6.5
+50	9.5		5.5
6	9.0	G=4.10	4.9

18+00			
20	35.0	G=5.1	29.9
+50	34.3		29.2
19	33.4		28.5
+50	32.0		26.9
18	31.0		25.9
+50	29.5		24.4
17	27.5		22.4
+50	25.7		20.6
16	24.0		18.9
+50	21.6		16.5
15	19.8		14.7
+50	18.0		12.9
14	16.9	5.1	11.8
+50	16.0		10.9
13	15.4		10.3
+50	15.0		9.9
12	14.2		9.1
+50	14.0		8.9
11	13.5		8.4

18+00	5.2		
+50	13.0		7.8
10	13.0		7.8
+50	12.5		7.3
9	12.2		7.0
+50	12.0		6.8
8	11.7		6.5
+50	11.0		5.8
7	10.8		5.6
+50	10.3		5.1
6	10.0	G=5.2	-4.8

19/14/18 { Doris Shaw Byers Butler

37

23+00			
7+00	5.2	G=3.0	-2.2
+50	5.2		-2.2
6	5.0		-2.0
+50	4.8		-1.8
5	4.5		-1.5
+50	4.0	3.1	-0.9
4	3.5		-0.4
+50	3.2		-0.1
3	3.0		+0.1
+50	2.6		+0.5
2	2.2		+0.9
+50	2.1	3.2	+1.1
1	2.0		+1.2
+50	1.8		+1.4
0	1.8	G=3.2	+1.4

23+50			
7	6.0	G = 3.4	- 2.6
+50	5.7		- 2.3
6	5.4		- 2.0
+50	5.0		- 1.6
5	4.2		- 0.8
+50	4.4	3.5	- 0.9
4	3.5		- 0.0
+50	3.5		0.0
3	3.2		+ 0.3
+50	3.0		+ 0.5
2	2.7		+ 0.8
+50	2.4	3.6	+ 1.2
1	2.2		+ 1.4
+50	2.0		+ 1.6
0	2.0	G = 3.6	+ 1.6

24+00			
7	6.7	G = 3.9	- 2.3
+50	6.0		2.1
6	6.0		2.1
+50	5.8		1.9
5	4.5		0.6
+50	4.5		0.6
4	4.0		- 0.1
+50	3.8		+ 0.1
3	3.7	4.0	0.3
+50	3.3		0.7
2	3.0		1.0
+50	2.8		1.2
1	2.5		1.5
+50	2.5		1.5
0	2.3	G = 4.0	+ 1.7

24+50			
7	7.0	G=4.8	-2.2
+50	6.7		1.9
6	6.5		1.7
+50	6.4		1.6
5	6.0		1.2
+50	5.0		0.2
4	5.1		-0.3
+50	4.4		+0.4
3	4.3	4.9	0.6
+50	4.1		0.8
2	3.8		1.1
+50	3.5		1.4
1	3.3		1.6
+50	3.1		1.8
0	3.0	G=4.9	+1.9

25+00			
7	7.2	G=5.0	-2.2
+50	7.0		2.0
6	6.9		1.9
+50	6.7		1.7
5	6.0		1.0
+50	6.0		-1.0
4	4.5		+0.5
+50	5.0		0.0
3	4.4		0.6
+50	4.2		0.8
2	4.0		1.0
+50	3.8		1.2
1	3.5		1.5
+50	3.2		1.8
0	3.1	G=5.0	+1.9

25+50			
7	7.2	G=5.1	-2.1
+50	7.2		2.1
6	6.8		1.7
+50	6.3		1.2
5	6.0		-0.9
+50	4.9		+0.2
4	4.4		0.7
+50	4.2		0.9
3	4.3		0.8
+50	4.3		0.8
2	4.3		0.8
+50	4.0		1.1
1	3.5		1.6
+50	3.2		1.9
0	3.2	G=5.1	+1.9

26+00			
7	7.0	G=5.1	-1.9
+50	6.8		1.7
6	6.5		1.4
+50	6.0		0.9
5	5.7		-0.6
+50	4.9		+0.2
4	4.5		0.6
+50	4.2	5.0	0.8
3	4.3		0.7
+50	4.2		0.8
2	4.0		1.0
+50	3.7		1.3
1	3.5		1.5
+50	3.2		1.8
0	3.0	G=5.0	+2.0

8/15/18

0+50 So of Sta 0+00

7	5.4	G=3.7	-2.2
+50	5.5		2.3
6	5.3		2.1
+50	5.1		1.9
5	4.9		1.7
+50	5.0		1.8
4	4.9		1.7
+50	4.8		1.6
3	4.7	3.3	1.4
+50	4.5		1.2
2	4.4		-1.1
+50	3.3		00
1	3.5		-0.2
+50	3.0		+0.3
0	2.9	G=3.3	+0.4

1+00 So

7	6.0	G=3.4	-2.6
+50	5.6		2.2
6	5.9		2.5
+50	5.7		2.3
5	5.3		1.9
+50	5.2		1.8
4	5.2		1.8
+50	4.9	3.5	-1.4
3	4.9		1.4
+50	4.8		1.3
2	4.4		0.9
+50	4.0		-0.5
1	3.4		+0.1
+50	3.1		+0.4
0	3.0	G=3.6	+0.5

1+50' 50

7	9.0	G=4.3	-4.7
+50	9.0		4.7
6	9.0		4.7
+50	9.0		4.7
5	8.0		3.7
+50	7.1		2.8
4	6.1		1.8
+50	6.0		1.7
3	5.8	4.4	-1.5
+50	5.6		1.1
2	5.2		0.8
+50	5.0		0.6
1	4.5		-0.1
+50	4.0		+0.4
0	3.9	G=4.4	+0.5

2+00 50

7	9.9	G=4.5	-5.4
+50	10.0		5.5
6	10.0		5.5
+50	10.0		5.5
5	9.9		5.4
+50	9.5		5.0
4	9.0		4.5
+50	7.5		3.0
3	6.5	4.6	-1.9
+50	5.9		1.3
2	5.5		0.9
+50	5.1		0.5
1	4.9		-0.3
+50	4.1		+0.5
0	4.0	G=4.6	+0.6

2+50	S₀		
7	10.1	G=4.8	-5.3
+50	10.2		5.4
6	10.2		5.4
+50	10.1		5.3
5	10.1		5.3
+50	10.0		5.2
4	9.7		4.9
+50	9.1	4.9	-4.2
3	8.5		3.6
+50	8.2		3.3
2	6.0		1.1
+50	5.4		0.5
1	5.0		0.1
+50	5.0		-0.1
0	4.2	G=4.9	+0.7

3+00	S₀		
7	10.2	G=5.1	-5.1
+50	10.2		5.1
6	10.6		5.5
+50	10.6		5.5
5	10.3		5.2
+50	10.3		5.2
4	10.1		5.0
+50	10.0		-4.9
3	9.3		4.2
+50	8.8		3.7
2	7.3		2.2
+50	6.1		1.0
1	5.2		-0.1
+50	5.0		+0.1
0	4.5	G=5.1	+0.6

Cross Section of Arctic St. So. line 'B' St to N. line Date

	75' St. 12' Sidewalks - 1275 quarters - Cross Sts 83 - 14' Walks - 13' Atlas.			
	+ 1.92	H.I 18.36	−	Elev 16.44 Pkg ch. SW India & B
	S. Line 'B' St			
W	on paving		69	11.5
ch	" "		7.16	11.20
ch	" "		6.89	11.47
ch	" "		6.57	11.79
C	" " W's paved - 8 south		6.22	12.14
ch			62	12.2
ch.			6.0	12.4
E.			57	12.7
		So ch.		
E.	on Curb.		5.86	12.50
ch.			61	12.3
ch			61	12.3
C			62	12.2
ch			63	12.1
ch.			67	11.7
W			68	11.6

S (Davis
13 Moore
H Zoike

Arctic St.

So ½ 'B' St.

W		68	11.6
ch		66	11.8
ch		6.1	12.0
C		6.1	12.0
ch		62	12.2
ch.		58	12.6
E.	on paving	5.95	12.41
	℄ B		
E	on paving	590	12.46
ch.		57	12.7
ch		61	12.3
C		62	12.2
ch		65	11.9
ch.		69	11.5
W		68	11.6

18.36

No 4

W		69	11.5
ct.		66	11.8
4		64	12.0
C		62	12.2
4		61	12.3
Ct		59	12.5
E	on paving	59.1	12.45
	No Ct.		
E	on Ct.	59.	12.46
Ct.		60	12.4
4		61	12.3
C		62	12.2
4		63	12.1
Ct		67	11.7
W		69	11.5

Note. Cross Sections on half of St. at a time on acct of cars.

Arctic St.

No line 'B' St

℄		61	12.3
E 4		61	12.3
Ct		60	12.4
E.		58	12.6
	+50		
E		50	13.4
+2		44	14.0
+10		44	14.0
Ct		56	12.9
4		59	12.5
C		60	12.4
	1+00		
C		59	12.5
4		57	12.7
Ct		57	12.7
4		49	13.5
E		47	13.7

		Arctic St			
		18.36			
		1+50			
E			46	13.8	
Ch			48	13.6	
W			56	12.8	
C			55	12.9	
		2+00			
C			54	13.0	
W			52	13.0	
Ch			55	12.9	
+2			48	13.6	
E			44	14.0	
		2+50			
E			42	14.2	
+10			46	13.8	
Ch			54	13.0	
W			52	13.2	
C			50	13.4	
		3+00 S. Line 'A' St.			
C			49	13.5	
W			51	13.3	
Ch			51	13.3	
+2			47	13.7	
E			44	14.0	

T.P	6.73	18.74	5.85	12.51
		N. line 'B' St.		
W			6.8	11.9
Ch			6.9	11.8
W			6.6	12.1
		+50		
W			6.4	12.3
Ch			7.0	11.7
W			7.4	11.3
		1+00		
W			6.5	12.2
Ch			6.3	12.4
+2			7.0	11.7
+7			6.4	12.3
W			6.3	12.4
		1+50		
W			6.2	12.5
+10			6.8	11.9
Ch			5.9	12.8
W			6.0	12.7

18.74

2+00

W	62	12.5
+10	59	12.8
Cl	65	12.2
↓	60	12.7

2+50

↓	57	13.0
+8	62	12.5
Cl	56	13.1
W	60	12.7

3+00 So. L. A St.

W	60	12.7
Cl	60	12.7
↓	55	13.2

So Ch A St.

W	60	12.7
Cl	59	12.8
↓	54	13.3
C	52	13.5
↓	54	13.3
Cl	54	13.3
E	52	13.5

Arctic St

So. A St

E	47	14.0
Cl	52	13.5
↓	52	13.5
C	52	13.5
↓	55	13.2
Cl	56	13.1
W	56	13.1

℄ A St

W	57	13.0
Cl	54	13.3
↓	52	13.5
C	50	13.7
↓	49	13.8
Cl	47	14.0
E	44	14.3

18.74

No 4 A St.

E		4.6	14.1
Ch		4.7	14.0
4		4.9	13.8
C		5.0	13.7
4		5.2	13.5
Ch		5.4	13.3
W		5.6	13.1
	No Ch A St		
W.		6.1	12.6
Ch		6.0	12.7
4		5.3	13.4
4		5.1	13.6
C		5.0	13.7
4		4.6	14.1
Ch.		4.7	14.0
E.		4.6	14.1

Arctic St.

No line A St.

E		4.4	14.3
10		4.3	14.4
Ch.		5.1	13.6
4		4.7	14.0
C		4.8	13.9
4		4.9	13.8
Ch.		5.5	13.2
W.		5.3	13.4
1 x 5			
W.		4.0	14.7
Ch.		5.1	13.6
1 50			
W		4.1	14.6
Ch.		4.5	14.2
4		4.5	14.2
1 00			
4		4.0	14.7
Ch		3.9	14.8
W		3.1	15.0

18.74

1+50

W			4.0	14.7
Ch			3.8	14.9
H			3.6	15.1
T.P	6.65	21.66	3.73	15.01
	0+50 N. of "A" 51.			
E			5.7	16.0
+9			6.2	15.5
Ch.			7.3	14.4
H			7.3	14.4
C			7.3	14.4
		1+00		
C			6.8	14.9
H			6.8	14.9
Ch			6.8	14.9
+3			5.8	15.9
E			5.1	16.6

1+50

E	5.3	16.4
+10	5.1	16.6
Ch.	6.5	15.2
H	6.3	15.4
C	6.4	15.3
	2+00	
W	6.5	15.2
Ch	6.3	15.4
H	6.2	15.5
C	5.9	15.8
H	6.0	15.7
Ch	6.0	15.7
+2	4.8	16.9
E	4.4	17.3

21.66

2+50

E		41	17.6
+10		49	16.8
Cl		56	16.1
¼		55	16.2
C		58	15.9
¼		59	15.8
Cl.		60	15.7
W		64	15.3

3+00 = S. Line Ash

W		61	15.6
Cl.		57	16.0
¼		52	16.5
C		49	16.8
¼		52	16.5
Cl.		52	16.5
+2		48	16.9
E		47	17.0

Arctic St.

So Cl. Ash

E		44	17.3
Cl		48	16.9
¼		51	15.6
C		50	16.7
¼		52	16.5
Cl		56	16.1
W		60	15.7

So ¼

W		58	15.9
Cl		55	16.2
¼		52	16.5
C		49	16.8
¼		49	16.8
Cl		46	17.1
E		44	17.3

21.66

℄ Ash St

E		4.2	17.5
Cl		4.5	17.2
H		4.8	16.9
C		4.8	16.9
H		4.9	16.8
Cl.		5.1	16.6
W.		5.6	16.1

No 4

W.		5.7	16.0
Cl.		5.3	16.4
H		4.9	16.8
C		4.8	16.9
H		4.8	16.9
Cl.		4.3	17.4
E		4.1	17.6

Arctic St

No Cl.

E		3.7	18.0
Cl		4.3	17.4
H		4.6	17.1
C		4.7	17.0
H		4.9	16.8
Cl		5.3	16.4
W		5.6	16.1

No line Ash

W		5.9	15.8
Cl		5.1	16.6
H		4.8	16.9
C		4.6	17.1
H		4.6	17.1
Cl.		4.4	17.3
E		4.4	17.3

21.66

		1+50 No.	Ash		
E			3.2	18.5	
cl.			3.6	18.1	
sl			4.0	17.7	
C			4.1	17.6	
sl			4.2	17.3	
Cl.			4.8	16.9	
W			5.2	16.5	
		1+00			
W			4.7	17.0	
Cl			4.1	17.6	
sl			4.0	17.7	
C			3.4	18.3	
sl			3.2	18.5	
Cl.			2.3	19.4	
E			2.2	19.5	

Arctic St

		1+50			
E			1.5	20.2	
cl			1.9	19.8	
sl			2.6	19.1	
C			2.8	18.9	
sl			3.1	18.6	
cl			3.7	18.0	
W			4.0	17.7	
T.P.	8.54	27.08	3.12	18.52	
		2+00			
W			8.5		
Cl			8.5		
sl			8.1		
C			7.8		
sl			7.5		
sl			6.6		
E			6.1		

27.08

2+50

E	5.0
Ch	5.9
H	6.7
C	7.3
H	7.8
Ch	7.9
W	7.8

3+00 S. Line Beach.

W	7.8
Ch	7.6
H	7.2
C	6.6
H	6.6
Ch	5.8
E	4.7

Arctic St. 52

So Ch. Beach

E	5.9
Ch	6.3
H	6.6
C	6.6
H	7.1
Ch	7.6
W	7.8

So H

W	7.6
Ch	7.0
H	6.7
C	6.4
H	6.2
Ch	5.4
E	5.8

27.08

& Beech St

E	5.5
Cl	5.7
H	6.1
C	6.3
H	6.4
Cl	6.9
W	7.4

No H

W	7.4
Cl	6.7
H	6.2
C	6.2
H	5.8
Cl	5.4
E	5.1

Arctic St.

No Cl

E	5.6
Cl	5.8
H	5.9
C	6.0
H	6.5
Cl	6.8
W	7.3

N. Line Beech St

W	6.7
Cl	6.8
H	6.8
C	5.9
H	5.6
Cl	5.4
E	5.4

27.08

+50 No. Beach

E	5.1
Ch	5.3
½	5.0
C	5.3
½	6.2
Ch	6.6
W.	6.4

+80

W	7.0
Ch.	6.5

1+00

W.	5.8
Ch	6.2
¼	5.6
C	4.6
½	4.3
Ch	4.4
E.	4.3

1+50

E	3.0
Ch	3.4
¼	3.6
C	3.8
¼	4.6
Ch.	5.3
W.	5.1

2+00

W.	4.3
Ch	4.2
¼	3.8
C	2.9
½	2.9
Ch	2.4
E.	1.9

27.08

2+50

E			0.5	
Ch			1.4	
¼			2.0	
C			2.0	
¼			3.1	
Ch			3.2	
W.			3.2	
T.P	9.57	34.22	2.43	24.65

3+00. S Line Cedar

W			9.2	
Ch			9.2	
¼			8.4	
C			8.3	
¼			8.2	
Ch			8.0	
E.			7.6	

S. Ch.

E			7.6	
Ch			8.1	
¼			8.2	
C			8.4	
¼			8.6	
Ch			9.2	
W.			9.3	

S. ¼

W			9.3	
Ch			8.7	
¼			8.7	
C			8.2	
¼			7.9	
d			7.8	
E.			7.4	

34.2

℄ Cedar St

E	6.9
Ch	7.2
H	7.7
C	8.0
H	8.1
Ch	8.2
W.	8.7

No H

W.	8.6
Ch.	8.1
H	8.0
C	7.8
H	7.6
Ch	7.1
E.	6.7

Arctic St

No Ch.

E	6.4
Ch	7.3
H	7.3
C	7.8
H	8.1
Ch	8.5
W.	8.9

No. line Cedar St

W.	7.7
Ch	7.3
H	7.1
+2	8.0
C	7.6
H	7.3
Ch	6.9
+1	5.4
E.	5.5

3422

	+10 No of N.L. Cedar	
E		43
+10		49
Cl		61
¼		70
C		74
+4		78
¼		62
Cl		67
W.		70
	+50	
W.		68
Cl		65
¼		65
+4		76
C		68
+6		71
¼		58
Cl		51
+1		34
E.		31

	1+00	
E.		32
Cl		36
+2		49
¼		57
+3		58
+5		67
C		66
+9		69
¼		56
Cl		65
W.		67
	1+50	
W.		78
Cl		71
¼		64
C		63
¼		55
Cl		50
Cl on concrete Cl.		527
E.		47

Note: Cl. & sidewalk in on E. side bet 1+50 & 2+00

3422

2+00

E.	4.3
Cl. on concrete ☐	4.4
¼	4.9
C	6.0
¼	7.0
Cl.	7.6
W.	7.6
2+50	
W.	7.4
Cl.	7.3
¼	7.0
¼	6.0
C	5.4
¼	4.7
Cl.	4.7
E.	3.8

3+00: 5L. Date St

E	3.7
Cl.	4.0
¼	4.1
C	4.8
¼	5.2
¼	5.9
Cl.	6.6
W.	6.4
5. Cl.	
W	6.0
Cl.	6.4
¼	5.4
C	4.5
¼	4.2
Cl.	4.2
E	3.8

3422

So 41 Date 51.

E.	3.7
Cl	4.1
if	3.9
C	4.3
4	5.0
Cl.	5.8
W.	5.8

& Date

W	5.8
Cl	5.3
4	4.6
C	3.9
if	3.5
Cl	3.4
E.	2.8

Arctic 51

No 41

E	3.6
Cl	3.5
4	3.7
C	3.7
4	4.3
Cl	5.2
W.	6.0

No Cl.

W	6.1
Cl	5.3
4	4.5
C	4.1
4	3.6
Cl	3.6
E	3.0

Arctic St.

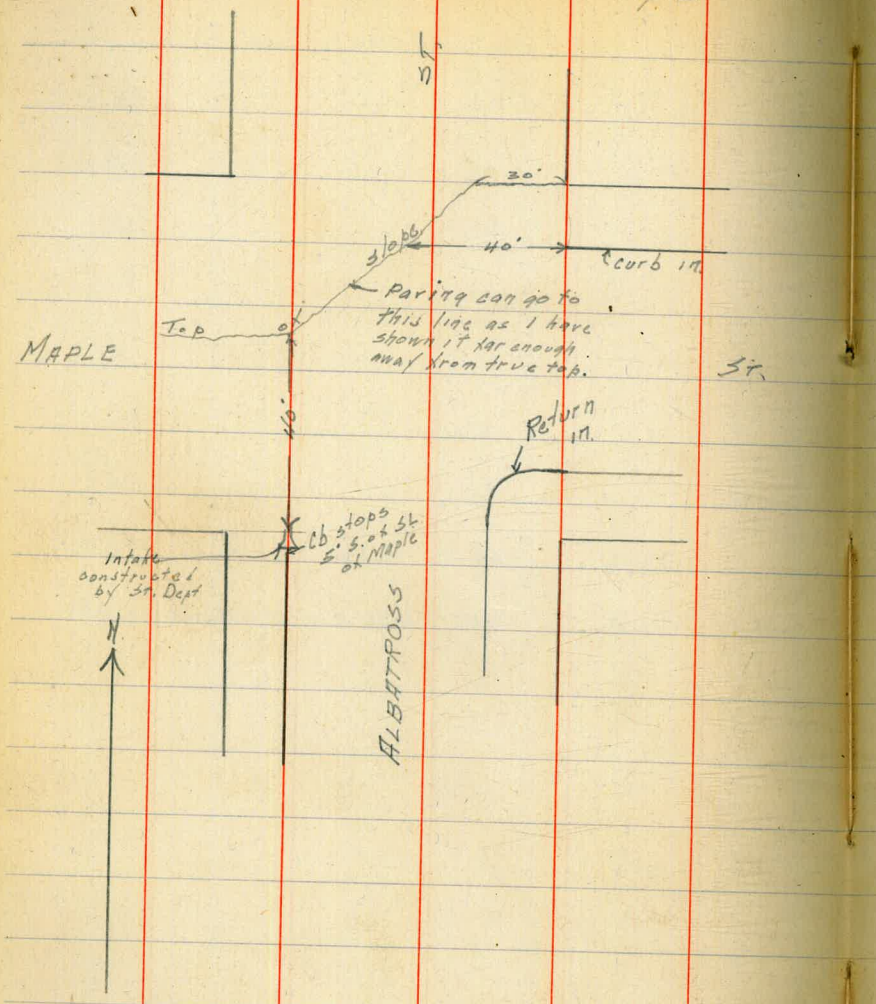
3422

No Line Date 54

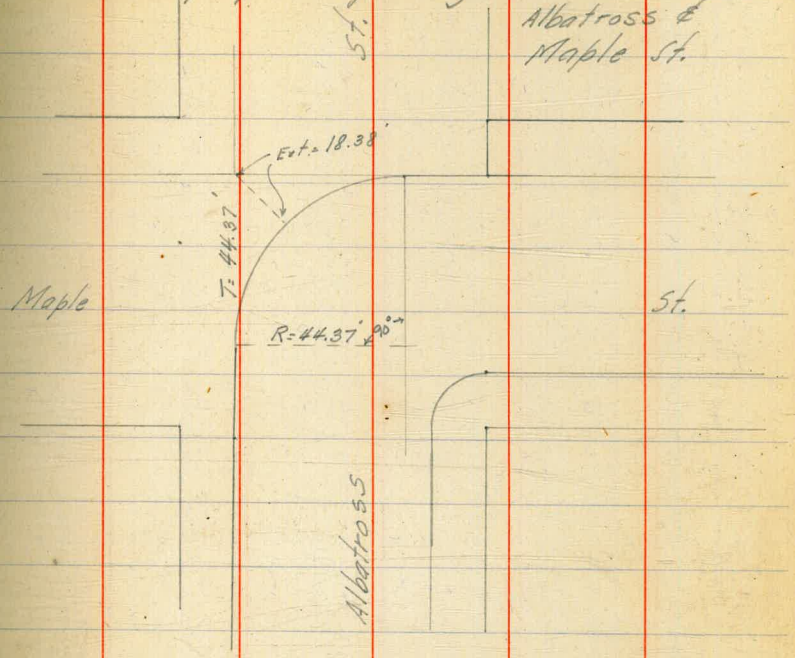
E.			2.7		
C.			3.0		
U			3.4		
C			4.0		
U			4.4		
Ch			5.2		
W.			6.1		
T.P	12.10	43.69	2.63	31.59	
BM. Pkg Ch. S.W. India & Date			1.20	42.49 ✓	42.47

2/26/20 Gregory & Moore

Condition at Intersection of Albatross & Maple



Curve proposed paving of Int. of Albatross & Maple St.



Proposed Catch Basin & Storm Drain
Maple St. & Albatross St.

2+30.82 P.O.T.

1+64.65 P.O.T.

1+28.61 Δ 29° 43' Rt.

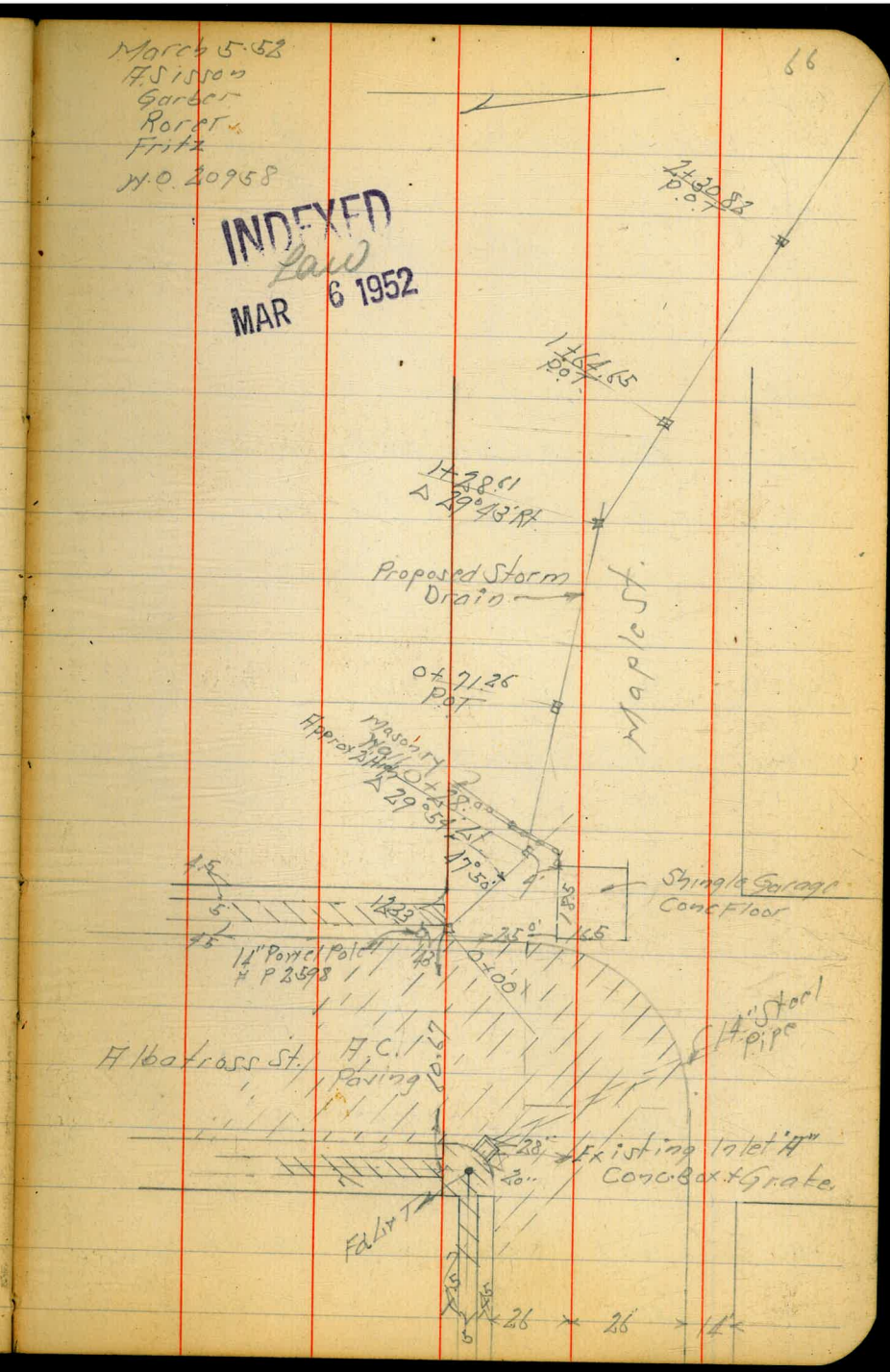
0+71.26 P.O.T.

0+28.00 Δ 29° 54' Lt.

0+00

March 5-52
H. Sisson
Garber
Rorer
Fritz
W.O. 20958

66



Levels Proposed Storm Drain
Maple St at Albatross St.

Sketch Page 66

Reduced & plotted 3-11-52 - RBF

+30

+28

+25 4' Lt of ℄ = 44.30" Rubber Tree Huge Rock

+22 2' Rt of ℄ - ℄ 8" Euc. Tree.

0+0

0-01.67 = West Curb Line of Albatross

Inlet A'

BM	0.42	183.427	7.50	180.007	SET L.P. Maple & Albatross
TP	8.78	187.507	6.29	178.727	
TP	0.572	185.017	13.05	184.445	N.W. BP
BM	0.475	197.475		19700	Kalmia + Front

4-5 ℄ Rt-1 67

177.47
5.96 = Top Masonry Wall

177.5 177.6 177.6
5.9 5.8 5.8
10 1 - 5.74 Cor Garage

178.3 177.9
5.1 5.5
10

177.67 178.13 177.43 177.89 177.15 178.01 178.10 177.46 178.23 177.70
5.96 5.30 5.98 5.44 6.48 5.92 5.83 5.97 5.20 5.73
25 Gal 25 CB 7.5 Gal 7.5 CB 0.0 Gal ℄ Top CB 7.5 CB 7.5 Gal 25 CB 25 Gal

179.25 177.32
4.18 6.11 = Bottom Box Conc.
on Grate

183.43 π

TP	0.53	149.822	12.055	149.292
1+10				
+79				
+73	5.5' Δt. of Δ = Δ 20" Euc. Arc			
TP	0.91	161.347	12.79	160.437
+52				
+47				
TP	2.73	173.227	12.93	170.497
0+10				
		183.437		

Lt Δ Rt

154.3 151.2 141.5 139.8 135.3 136.3 148.9 148.1
20 10.1 19.8 21.5 26.0 25.0 13.4 13.2
30 19 17 8 3 3 20

157.7 156.1 152.3 145.3 144.9 136.9 157.7
9.6 5.2 9.0 16.0 16.1 1.4 8.6
20 13 1 8 10 20

158.1 159.0 157.9 156.7 160.0 160.5
8.2 7.3 8.1 4.6 1.3 0.8
20 3 6 7 20

161.347

168.7 167.2 161.0 167.8 169.4
4.5 6.0 12.2 5.1 3.4
10 2 3 10

164.8 166.9 166.5 172.6 174.2
0.4 4.2 6.9 0.6 10.0
10 2 4 10

173.227

172.7 173.4 174.2 171.4 174.8
10.7 10.0 12.2 13.0 8.6
10 3 BOTH 3 8

183.437

+69				
TP	0.385	124.587	12.945	124.202
+65				
+50				
+49	2.0 Lt of ℄ = Fly 8" Euc Tree			
+42	20 Rt of ℄ = Fly 18" Euc. Tree			
+36				
+28.61	Δ		Taken 90° to Back Tang	
TP	0.095	137.147	12.77	137.052
1710				
		149.822		

Lt. ℄ Rt.

126.6	129.6	121.2	111.8	124.6		123.7
+2.0 15.	0.0 8	0.4 3.	13.8	0.0 4		+0.9 15

124.587

127.6	125.3	120.8	120.1	114.4	125.9	126.7
9.5 15	11.8 10	16.2	17.0 3.	23.3 4.	11.2 5.	10.4 15.

133.6	132.7	129.6	120.1	120.6	130.4	131.7
3.5 15	4.4 10	7.5 4	17.0	16.5 3.	6.7 5.	5.4 15.

138.3	135.1	130.3	123.3	123.1	133.6	134.8
+1.9 15.	2.0 6	6.8 1	18.8	14.0 3.	6.5 5.	2.4 15.

146.7	133.2	125.2	124.2	137.3		140.1
+9.6 17.	3.9 10	11.9	12.9 5.	+0.9 18.		+3.0 20

137.147

131.5	126.5	130.7	131.5	144.6		143.8
+1.7 36.	12.3 18.	19.1	18.3 8.	5.0 9.		6.0 20

149.82

+62					
+45					
TP	2.98	102.487	12.65	99.507	2+80.82
+24					
2+06					
TP	0.245	112.157	12.675	111.912	
+92					
1+81					
		124.587			

Lt. | 2 | Rt. | 70

98.3 | 97.4 | 97.1 | 94.6 | 94.7
4.2 / 15 | 5.1 | 5.4 / 3 | 7.9 / 7 | 7.8 / 15

98.6 | 98.7 | 96.1 | 95.7
3.9 / 15 | 3.8 | 4.4 / 8 | 6.8 / 15

102.487

110.2 | 106.6 | 99.5 | 99.6 | 99.2
2.0 / 18 | 5.6 / 10 | 12.7 / 6 | 12.6 | 13.0 / 16

112.6 | 112.2 | 100.1 | 100.2 | 100.2 | 107.3 | 111.5
+0.4 / 15 | 0.0 / 9 | 12.1 / 3 | 12.0 | 12.0 / 3 | 4.9 / 0 | 0.7 / 15

112.157

119.4 | 112.2 | 101.6 | 100.3 | 101.6 | 117.3 | 118.9
5.3 / 15 | 12.4 / 6 | 23.0 / 4 | 24.3 | 23.0 / 2 | 7.3 / 5 | 5.7 / 15

121.3 | 117.8 | 108.8 | 115.0 | 120.9 | 124.3
3.3 / 15 | 6.5 / 10 | 14.8 / 3 | 9.6 | 3.7 / 3 | 0.3 / 15

3 Box Culverts

124.587

TP			10.78	57.787	SEC6 Maple + State FEnd
TP	0.315	68.567	9.675	68.252	
TP	0.56	77.927	12.73	77.367	
TP	0.24	90.097	12.63	89.857	

2+70 = Sct. of Work to East

102.487

Profile # 2281
57.88

97.1 95.9 97.8 97.9
54 46 97 95.8 of Work
15 6 Sct of Work to East

102.487

BM's near India St.

B. Sd. Pig 16.44
A " 18.99
ash " 22.97
Beech " 30.42
Cedar " 34.97
Date " 42.47

Bridge at Boyden Road

N 9 E 84.56

DISTANCES FROM CENTER OF ROADWAY FOR CROSS-SECTIONING.

ROADWAY 14 FEET WIDE. SIDE SLOPES 1½ TO 1.

FOR SINGLE TRACK EMBANKMENT.

	0	.1	.2	.3	.4	.5	.6	.7	.8	.9	
0	7.0	7.2	7.3	7.5	7.6	7.8	7.9	8.1	8.2	8.4	0
1	8.5	8.7	8.8	9.0	9.1	9.3	9.4	9.6	9.7	9.9	1
2	10.0	10.2	10.3	10.5	10.6	10.8	10.9	11.1	11.2	11.4	2
3	11.5	11.7	11.8	12.0	12.1	12.3	12.4	12.6	12.7	12.9	3
4	13.0	13.2	13.3	13.5	13.6	13.8	13.9	14.1	14.2	14.4	4
5	14.5	14.7	14.8	15.0	15.1	15.3	15.4	15.6	15.7	15.9	5
6	16.0	16.2	16.3	16.5	16.6	16.8	16.9	17.1	17.2	17.4	6
7	17.5	17.7	17.8	18.0	18.1	18.3	18.4	18.6	18.7	18.9	7
8	19.0	19.2	19.3	19.5	19.6	19.8	19.9	20.1	20.2	20.4	8
9	20.5	20.7	20.8	21.0	21.1	21.3	21.4	21.6	21.7	21.9	9
10	22.0	22.2	22.3	22.5	22.6	22.8	22.9	23.1	23.2	23.4	10
11	23.5	23.7	23.8	24.0	24.1	24.3	24.4	24.6	24.7	24.9	11
12	25.0	25.2	25.3	25.5	25.6	25.8	25.9	26.1	26.2	26.4	12
13	26.5	26.7	26.8	27.0	27.1	27.3	27.4	27.6	27.7	27.9	13
14	28.0	28.2	28.3	28.5	28.6	28.8	28.9	29.1	29.2	29.4	14
15	29.5	29.7	29.8	30.0	30.1	30.3	30.4	30.6	30.7	30.9	15
16	31.0	31.2	31.3	31.5	31.6	31.8	31.9	32.1	32.2	32.4	16
17	32.5	32.7	32.8	33.0	33.1	33.3	33.4	33.6	33.7	33.9	17
18	34.0	34.2	34.3	34.5	34.6	34.8	34.9	35.1	35.2	35.4	18
19	35.5	35.7	35.8	36.0	36.1	36.3	36.4	36.6	36.7	36.9	19
20	37.0	37.2	37.3	37.5	37.6	37.8	37.9	38.1	38.2	38.4	20
21	38.5	38.7	38.8	39.0	39.1	39.3	39.4	39.6	39.7	39.9	21
22	40.0	40.2	40.3	40.5	40.6	40.8	40.9	41.1	41.2	41.4	22
23	41.5	41.7	41.8	42.0	42.1	42.3	42.4	42.6	42.7	42.9	23
24	43.0	43.2	43.3	43.5	43.6	43.8	43.9	44.1	44.2	44.4	24
25	44.5	44.7	44.8	45.0	45.1	45.3	45.4	45.6	45.7	45.9	25
26	46.0	46.2	46.3	46.5	46.6	46.8	46.9	47.1	47.2	47.4	26
27	47.5	47.7	47.8	48.0	48.1	48.3	48.4	48.6	48.7	48.9	27
28	49.0	49.2	49.3	49.5	49.6	49.8	49.9	50.1	50.2	50.4	28
29	50.5	50.7	50.8	51.0	51.1	51.3	51.4	51.6	51.7	51.9	29
30	52.0	52.2	52.3	52.5	52.6	52.8	52.9	53.1	53.2	53.4	30
31	53.5	53.7	53.8	54.0	54.1	54.3	54.4	54.6	54.7	54.9	31
32	55.0	55.2	55.3	55.5	55.6	55.8	55.9	56.1	56.2	56.4	32
33	56.5	56.7	56.8	57.0	57.1	57.3	57.4	57.6	57.7	57.9	33
34	58.0	58.2	58.3	58.5	58.6	58.8	58.9	59.1	59.2	59.4	34
35	59.5	59.7	59.8	60.0	60.1	60.3	60.4	60.6	60.7	60.9	35
36	61.0	61.2	61.3	61.5	61.6	61.8	61.9	62.1	62.2	62.4	36

Calculated by Julien A. Hall, M. Am. Soc. C. E.