

U. S. No. 508

FIELD BOOK



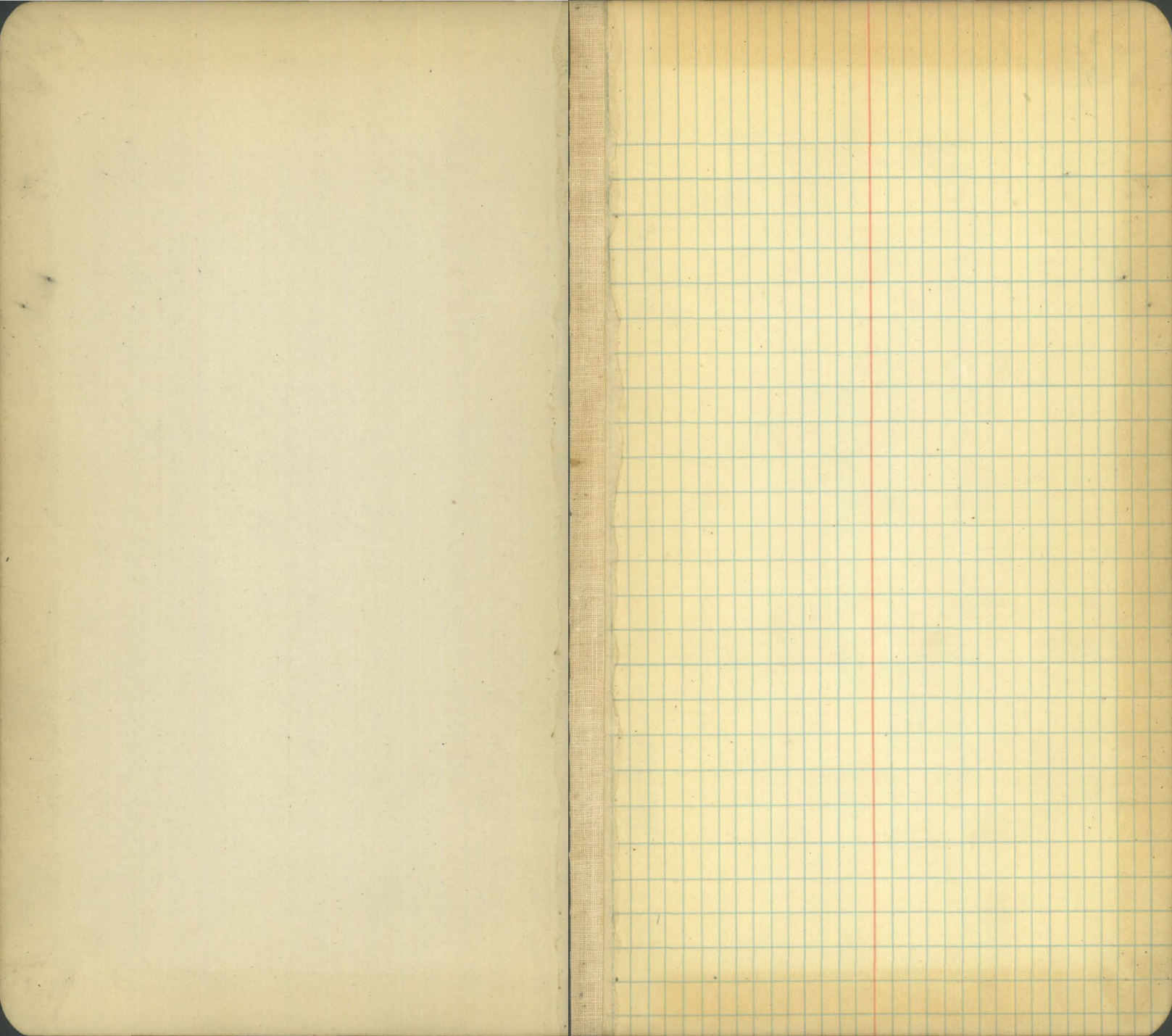
Miscellaneous Book For 1928

78

Property of
Black Hawk County
Care of
County Engr.



406



1928

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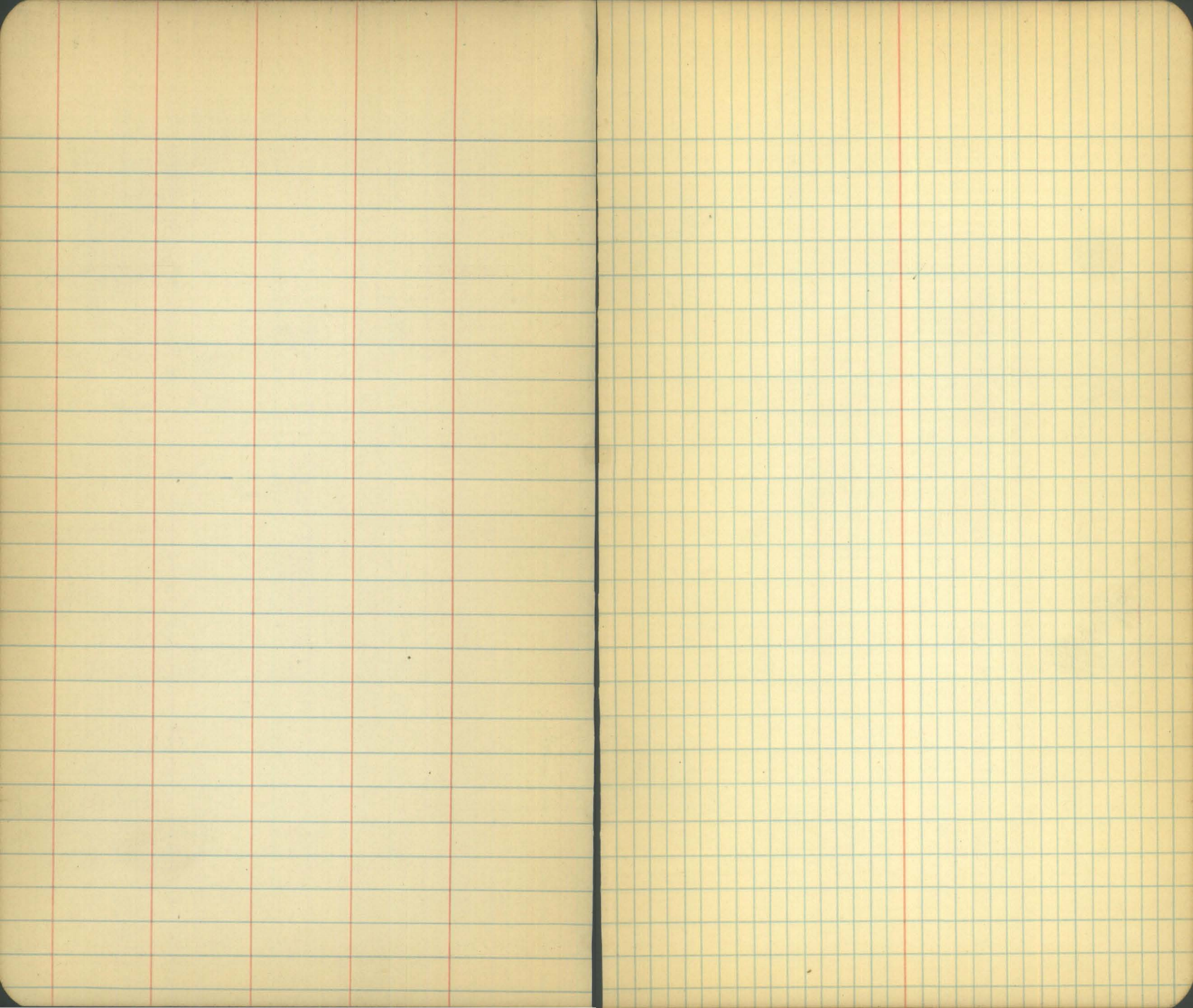
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3/3/28

Thompson
Refshange
Decker
Ahles
Butterfield

- #1 Located approx. 40 rods S. of ^{center} Section Corner
between Sections 27-28 Cedar Falls Twp.
Present Structure 18" Corr Pipe.
Drains Approx. 10 Acres. Const. 2'X2'X26' R.C.B.

1/3/28 Thompson - Butterfield

- # Wood Pile Bridge - located between
Sections 15-22 Mt. Vernon Twp.
20' Long - 16' Wide - 6' Opening.
6 small I-Beams
Replace with 8'X6'X30' - 60° Skew R.C.B.

Let
3-26-28

3/7/28

Ahles District

Ahles
Teeter
Bentley
Thompson
Butterfield

- # 1. Located approx. 30 rods W. of E. corner
between Sections 5-8 Fox Twp.
Drains Approx. 5 Acres. Hilly
Place 24" Corr. Pipe 29' long with steel Hdws.
- # 2. Located little less than $\frac{3}{4}$ mile W. of
E. corner between 34 Fox Twp. & Spring Creek.
Drains approx. 12 Acres Rolling.
Place 30" Corr. Pipe 36' long with steel Hdws.

A.M.

3/22/28 Ahles-Bentley-Teeter-Butterfield.

Located near center section between
14 & 15 Payner Twp. Culvert in poor
condition.

Northey's District

3/22/28 P.M.

Bentley
Ahles
Teeter
Butterfield.

Located between 31 & 32 Waterloo Twp. near
junction of ^{old} Black Hawk Rd. & Four Bridge Rd.
Present structure old 4'x4'x18' Fair Condition.
Drains Approx 100 Acres Rolling land.
New structure should be considered for
location Approx. 15' S.W. of E of present structure.

3/9/28

Dist # 4

Miller
Refshauge.
Decker
Thompson

3

1. Located approx 20 rods N. of
S. Line sec. 23 + 24 - 88-13.
old 6x4 - Poor condition
Construct ^{R.C.B.} increase in size.
Dr. A. 320 A. Rolling.
Regd. 8'x4'x26' Flow East. →

2. 18" corr. Pipe under mined.
Located bet sec. 26-35
3/4 E. of Blessing Church 100 a.
Regd. 4'x3'x26'
3. 7'x16' Pile Br.
Located bet sec 28 + 33. 87-14
locate new R.C.B. a little west of
old Br. Dr. 160 a.
1 1/2 W. of Blessing Ch.
Regd. 5'x3'x26'
3. Old Cons. broken down
Located bet 28-33 - 87-14
Build R.C.B.
Dr. 150 a.
1 3/4 W. of Blessing
Regd. 5'x3'x26' R.C.B.

Let 3/26/28

5. Old I-Beam over dry run 32'x16'
Sec. 9+10T-88-R 13
1000 Acres. Rolling.
Const. Twin 8'x6'x36'-10" 45° skew.

3/23/28. Miller, Decker, Refshauge
Thompson

1. Located Between Sec. 18 + 19 - 88-13
80 rods E. of W. Sec. line. 24" Corr. pipe
Dr. Area = 400 ac. Low Rolling.
Const. - Twin 5'x4'x30 - 30° skew.
Note: - Flows - N.E.
Blow willow on So. side.
- 2- Located between Sec. 2 - 88-14
Old 3x4 x? - Flag stone top. Conc.
walks broken in.
Drainage Area 200 ac. Rolling.
Blow willows on each end
of culvert sight. Const. 6'x4'x26'
- 3- Located Center Sec. 14 - 89-14
Old Triple 3x4 - Bottom + Flag Stone
Dr. 800 ac. Low Rolling.
7' Max. from F.L. to Grade.
Const. - Twin. 6'x5'x30 30° skew.
Flows. S.E.

Section 17-87-14

E. 1/4 Corner Sec. 17

1097.2

570

581.0

61

2649

2649

3.8 Acres

g.f.t. =

165585

43560

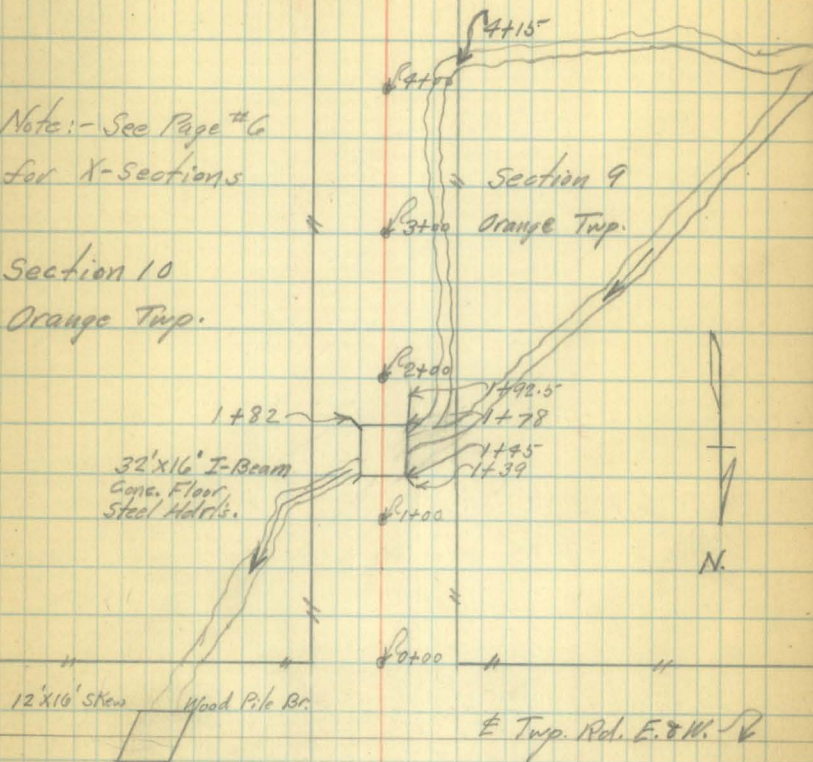
4 Twp. Rd. 2

 $\rightarrow 2649'$
$$\begin{array}{r} 165585 \\ \hline 43560 \end{array} \quad \begin{array}{l} \text{sq. ft.} \\ = \end{array}$$

3.8 Acres.

Note: - See Page #6
for X-Sections

Section 10
Orange Twp.



Section 3
Orange Twp.

Section 4
Orange Twp.

E. Co. Rd. N. & S.

9/14/28

O.S. Butterfield,
C.V. Cavanaugh
E.M. Matthews.X-Section for Twin 8'X6'X36'-10" - 75' skew
Located between Sections 9-10 Orange Twp.

6

Sta. B.S. H.I. F.S. Elev.

B.M. 6.77 106.77 100.00

0+00

1+00

1+39 = N. end Wings.

1+45 = N. end of Bridge

1+61 = E. of Bridge Water 3 deep.

1+78 S. end of Bridge

1+82 S. end of wing wall east side of road.

1+92.5 S. end of wing wall west side of road

2+00

94.0

123
98Note: - See Page 45 for sketch of these X-sections
Spike in the Line Pole Approx. 65' N. of N. End Bridge W. Side

97.1	96.6	94.8	92.1	98.5	98.9	98.3	98.1	99.0	95.1	100.1	99.3	99.8	99.3	99.4	99.8	100.0
9.7	10.2	12.8	14.7	8.3	2.9	8.5	8.4	2.8	6.3	5.6	6.1	2.9	2.0	2.5	2.4	2.0
10.5	10.0	9.0	7.9	2.6	3.1	2.9	2.2	1.9	1.5	1.1	1.4	1.8	2.2	2.6	2.8	3.3

97.6	96.6	93.8	95.6	96.8	97.7	97.1	97.5	101.2	101.5	101.4	99.8	97.5	98.4	99.7	98.7	
9.2	9.2	13.0	11.2	12.0	9.1	9.7	9.5	5.6	5.3	5.4	9.0	9.3	8.4	8.1	8.1	
55	52	46	45	39	30	25	21	14		9	16	23	24	30	31	

97.1	97.1	96.5	94.0	94.4	94.9	94.8	100.8	101.8	102.8	96.5	94.0	97.8	98.5	98.9		
9.1	9.1	10.5	12.8	12.4	11.9	9.4	5.0	4.9	4.8	8.3	9.9	9.5	8.2	8.3	2.7	
15	41	37	35	28	23	17	11		6	12	19	21	25	28	30	

97.1	97.1	96.5	94.0	94.4	94.9	94.8	100.8	101.8	102.8	96.5	94.0	97.8	98.5	98.9		
9.1	9.1	10.5	12.8	12.4	11.9	9.4	5.0	4.9	4.8	8.3	9.9	9.5	8.2	8.3	2.7	
5	40	33	30	10.5	10.5					5.5	5.5	16	21	24	30	

97.1	97.1	96.5	94.0	94.4	94.9	94.8	100.8	101.8	102.8	96.5	94.0	97.8	98.5	98.9		
9.1	9.1	10.5	12.8	12.4	11.9	9.4	5.0	4.9	4.8	8.3	9.9	9.5	8.2	8.3	2.7	
38	38	28	14	13	10.5	10.5				5.5	5.5	8	10	17	22	30

97.1	97.1	96.5	94.0	94.4	94.9	94.8	100.8	101.8	102.8	96.5	94.0	97.8	98.5	98.9		
9.1	9.1	10.5	12.8	12.4	11.9	9.4	5.0	4.9	4.8	8.3	9.9	9.5	8.2	8.3	2.7	
33	28	25	20	18	10.5	10.5				5.5	5.5	9	12	13	16	21

97.1	97.1	96.5	94.0	94.4	94.9	94.8	100.8	101.8	102.8	96.5	94.0	97.8	98.5	98.9		
9.1	9.1	10.5	12.8	12.4	11.9	9.4	5.0	4.9	4.8	8.3	9.9	9.5	8.2	8.3	2.7	
38	27	23	21	15	14	10				6	6	10	14	20	25	26

97.1	97.1	96.5	94.0	94.4	94.9	94.8	100.8	101.8	102.8	96.5	94.0	97.8	98.5	98.9		
9.1	9.1	10.5	12.8	12.4	11.9	9.4	5.0	4.9	4.8	8.3	9.9	9.5	8.2	8.3	2.7	
38	27	23	21	15	14	10				6	6	10	14	20	25	26

97.1	97.1	96.5	94.0	94.4	94.9	94.8	100.8	101.8	102.8	96.5	94.0	97.8	98.5	98.9		
9.1	9.1	10.5	12.8	12.4	11.9	9.4	5.0	4.9	4.8	8.3	9.9	9.5	8.2	8.3	2.7	
34	28	24	23	13						6	9	13	18	20	23	25

97.1	97.1	96.5	94.0	94.4	94.9	94.8	100.8	101.8	102.8	96.5	94.0	97.8	98.5	98.9		
9.1	9.1	10.5	12.8	12.4	11.9	9.4	5.0	4.9	4.8	8.3	9.9	9.5	8.2	8.3	2.7	
31	17	23	14							6	9	11				

I

99.6	99.6	98.0	99.0	101.4	101.7	101.1	96.4	101.1	98.3	96.6	99.0	99.2	95.4
<u>22</u>	<u>22</u>	<u>8.0</u>	<u>28</u>	<u>54</u>	<u>51</u>	<u>57</u>	<u>10.4</u>	<u>14.7</u>	<u>8.5</u>	<u>8.2</u>	<u>7.8</u>	<u>9.6</u>	<u>11.4</u>
33	27	26	22	16		12	21	24	28	69	100	110	112
									95.1	96.7	92.5	96.5	
									11.7	10.1	7.5	7.5	
									116	118	125	130	

100.7	100.7	100.7	99.9	100.0	101.9	102.2	101.7	99.9	98.5	96.3	96.4	95.1	98.8	94.4
6.1	6.1	6.1	6.9	6.8	4.9	4.6	5.1	6.9	8.3	10.5	13.4	2.9	8.0	8.2
33	27	25	22	19	15		10	14	20	22	26	28	20	100
								99.8	100.1	98.8	97.8	96.9	96.3	97.9
								7.0	6.7	8.8	9.0	9.9	11.5	8.9
								150	175	179	185	186	190	192
								99.0	100.3	100.3				
								2.8	6.5	6.5				
								200	204	210				

P.M.

P.S.B.
F.R.K.

B-M.	6.83	106.83	100.00
------	------	--------	--------

Inlet stake = 11.88 99.95 = 99.50 = Cut = 0.45 } Twin 8'x6'x36'-10" P.C.B.
Outlet stake = 10.86 95.97 99.20 = Cut = 1.77 }

Check on Bridge Lumber.

3-21-28 Cedar Falls

Refshauges Car load of 3rd plank

O.K. looked good.

100 3x12x18 - 101 } by count
320 3x12x16. 321 } of Refshaug
Decker +
Thompson.

3-21-28. Hudson. with
Miller to inspect car of Bridge
lumber. Fullsawn. O.K.

3-23-28 410 3x12x16.

checked by Decker + Refshaug

Billed for 430 3x12x16 -

10 - 3x12x16 Short.

3/23/28

Survey for Culv. Sec 3 Spr. Creek - 34 Fox.

Sta.	B.S.	I.I.	F.S.	Elev.	Grade
B.M.	6.86	106.86		100.00	

400 $\pm$ of 18" corr. pipe

Sta.	B.S.	I.I.	F.S.	Elev.
B.M.	5.97	105.97		100.00

X-sec. $\pm$ Culv. Sete

Inlet = 94.3 = Stake = 96.90 = Cut = 2.60
 Outlet = 94.0 = Stake = 94.84 = Cut = 0.84

B.M.	4.56	104.56	100.00
Inlet	95.80	Stake = 96.50	Cut = 0.70
Outlet	95.00	Stake = 95.00	Cut = 0.00

B.M.	5.16	105.16	100.00
Inlet	97.00	Stake = 98.38	Cut = 1.37
Outlet	96.70	Stake = 97.56	Cut = 0.86

B.M.	5.95	105.95	100.00
Inlet	98.5	Stake = 99.08	Cut = 0.53
Outlet	98.3	Stake = 99.46	Cut = 1.16

Nail in Hiline pole 50' east of present culv.

102.5	93.2	94.3	95.8	97.1	97.4	101.6	102.4	101.7	98.1	98.5	101.9	102.6
14.4	13.7	12.6	11.1	9.8	9.5	5.3	4.5	5.2	8.8	8.4	5.0	4.3
33	26	20	15	14	11	9		9	11	14	16	23

D.S.B. - E.M.M. - C.J.C. - K.R.K.

Spike in Willow N. Side Rd. & N. Side Culv.

93.8	94.84	94.0	100.9	94.2	94.5	96.90	97.0
12.2	11.13	11.9	12.0	11.6	5.1	5.1	4.9
50	5	36	24	7	7	8	10

4'X3'X26' between Sec's 26-35 Lincoln Twp. Item #3

Spike in Hiline Pole N. Side Rd. at Inlet of Culv.

93.8	94.84	94.0	100.9	94.2	94.5	96.90	97.0
12.2	11.13	11.9	12.0	11.6	5.1	5.1	4.9
50	5	36	24	7	7	8	10

8' Bottom ditch Inlet Stake 50.3 Bottom ditch Outlet = 10.80 Stake 9.56

Spike in Fence post N. Side Rd. opp. structure

5'X3'X26' between 28-33 Lincoln Twp. Approx. center of section

97.56	97.2	100.4	96.9	98.38
7.60	8.0	4.8	8.3	6.78
Stake	Outlet ditch	Inlet ditch	Stake	

5'X3'X26' between Sec's 28-33 Lincoln Twp. Item #5

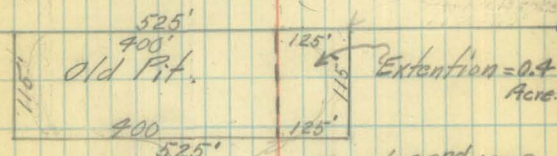
Spike in Cor-post S. Side Rd. Approx. 50' W. of structure.

97.56	97.2	100.4	96.9	98.38
7.60	8.0	4.8	8.3	6.78
Stake	Outlet ditch	Inlet ditch	Stake	

Sta. B. S. H. L. F. S. Elev. Grade



1/2 Twp. Rd. R 1/4 Mile from N. Line Sec 23 Barclay Twp.



March 22nd 1928

Ahles
Bentley
Teeter
Butterfield
Peavoy.

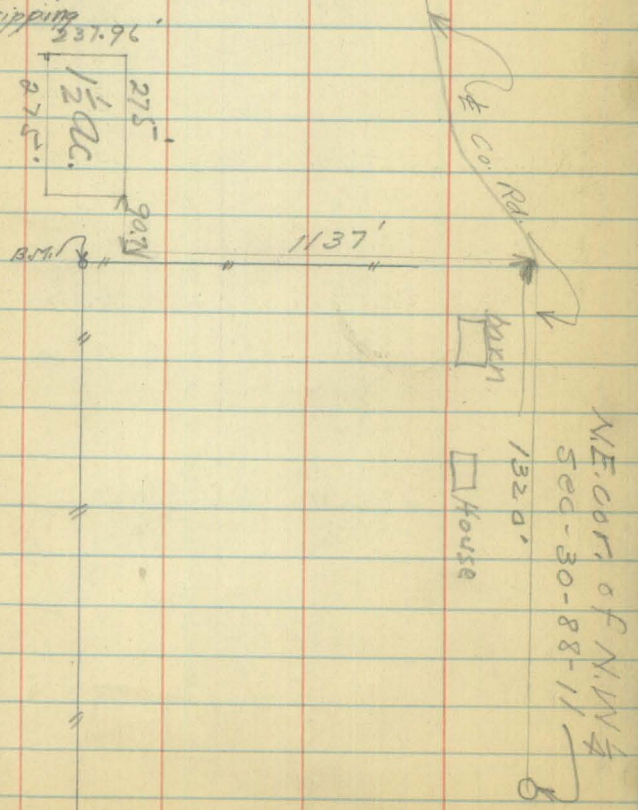
Section 23-89-11

Note: - See Book #27 Page #58
for Old Gravel Pit sketch -
dated 6/8/22

Note: - See Page #70 for sketch of
Pit staked 11/6/31
D.S. Butterfield
C.E. Schmidt.

Sta. B.S. H.L. F.S. Elev. Grade
Gravel Pit on Peter
Schommer's Farm in Sec.
30-88-11.
Staked = April 28 - 28
1009⁰⁰

Note: See Page #26 for Prelim. X-Sections
for stripping



Sta. B.S. H.I. F.S. Elev. Grade
 Decker-Miller-Refshauge-Thompson
 4-27-28

On Crane Cr. bet. Section

3-10. 90-12

Old 5-20' Spans pile Br. { fits to stream

Joist + caps - Fair

piling + floor - Poor

Construct new pile Br. on
 section line 140' Long

June 11-28
 Decker-Miller, Foster P. Mc.
 Thompson

Located midway between

Sec. 17 + 18 - 88 - 12 Cedar / Juniper
 Old concrete broken in + graded road
 Required a 5' x 3' x 26' R.B.C.

Miller.
Decker
Ref.
Thompson.

5-2-28. A.M.

Location. bet = Sec. 31-32 - 87-13

old 5X3 X20 conc. Dr. 150. Rolling
outlet end undermined.

Const. New broken back conc.

5X4 X24 Rd. Way.

take levels before Designed.

Repair.

Located bet. 31-32 - 87-14

1/4 Mi. So. of N. line.

I-Beam joist on piling.

Blow willows on both sides and
cut old piling.

shirley to blow - 6-9-28.

Guard rail on Eagle Center Voorhies

South side Sta. 273+^{Br}3 to 286+00

" " " 286+40 to 300+00

North side - Sta. 278+00 to 286+00

" " " 286+40 to 300+00

5-28-28 Bentley's Dist.

Bet. Sec. 8+17 - 89-12

Old 16'X16' pile Br.

Dr. Area - 380 Acres Rolling.

Requires - 8'X6 X

Note: - See X-sections Page #18

Bet. Sec. 9+16 - 89-12

Old. 20'X16' pile Br.

Dr. A. 100 Acres Rolling high.

Requires - 5X4 X

Note: See X-sections Page #18

Gravel Pit on Newton's
place in Sec. 12-87-13.

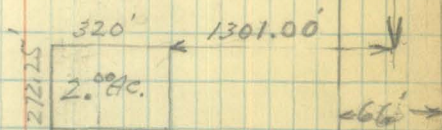
1200.00

Thompson $1\frac{1}{4}$
Miller

May: 9-1928.

Note: - See Page #27 for Prelim. X-Sections
for Stripping

Sec. 12-87-13



Note: -

Placed oak Hub at
each corner of Pit.

5-11-28.

Culverts on Ault's job.

~~24" x 20' @ Sta 279+12~~

15" x 30'

15 x 20

12 x 20

12 x 24

265+76 Twp. Rd. N.

259 x 35

255 x 91

256 + 20

Old Bridge Data N.E. of Laporte City
at Cut-off to be replaced with
18' x 130' High Truss.

Out-side Channel = 1'-0"

I-Beams = 12" x $\frac{3}{8}$ " x 30' Long - 6 I-Beams - 2 Channels

4 Spans 30' Long

5-12-28

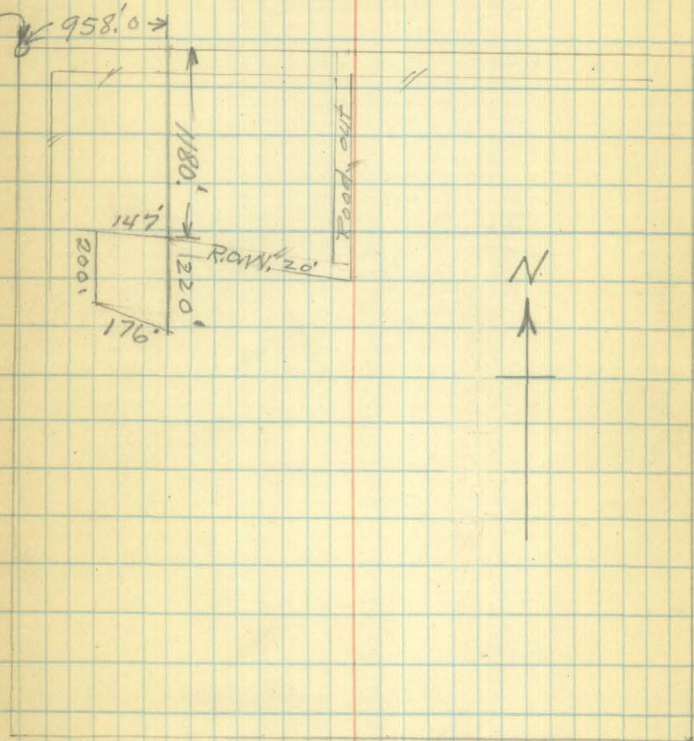
Thompson
Refshuagø.

Gravel Pit on Aug. Miller's Farm.

Sec. 31-89-14

450.⁰⁰

N.W. cor. Sec. 31-89-14.



5/11/28

207.

D.S. Butterfield
C.J. Cavanaugh
F.R. Kurksh

Sta.	B.S.	H.I.	Elev.	Elev.
B.M.	2.51	102.51		100.00
0+00			11.6	
1+00			9.2	
2+00			7.8	
3+00			7.3	95.2
4+00			7.2	95.3
4+54 =	Old Conc. Culv. 8'x3'x16' No. Floor.		8.1	93.7
B.M.	Poor Condition Gas. Pipe Hdr's.		3.25	99.26

Note: - See next page for
x-section at 8'x3'x16' culv.

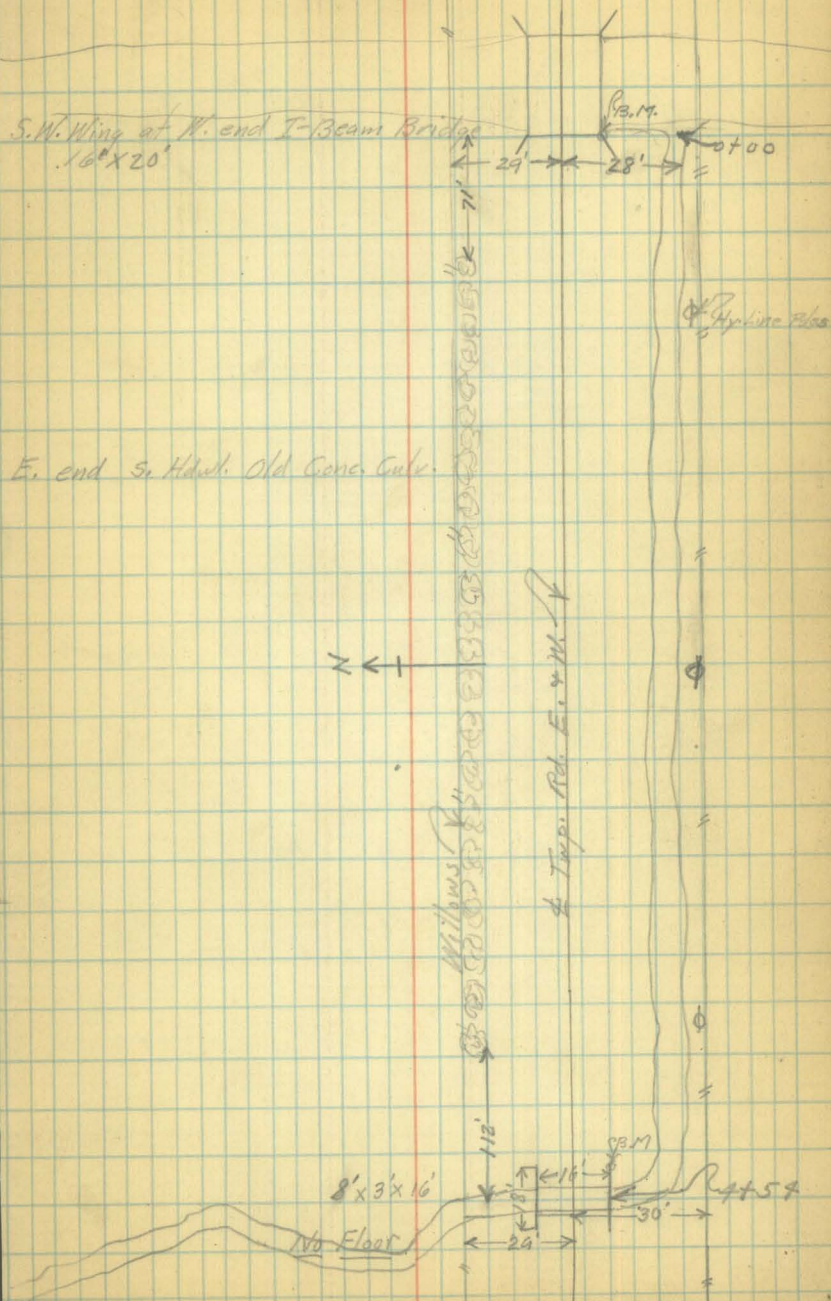
Dr. Area. 500 Ac. Flat.
Does flood water reach this
culvert? (no)

Construct 6'x3'x26' (R.B.D.)
changed to 8'x3'x26' in construct

7/11/28

Section 29 Black Hawk Twp.
Approx. 2 1/2 Miles West of Hudson
Levels taken in S. Ditch.

17



Sta. B.S. Ht. F.S. Elev.

B.M. 4.17 103.43 99.26

X-Section 8'x3'x16' Conc Culv. at
Sta 4+54 on page 17.

6/2/28 P.M. D.S.B - D.B.R. - F.R.R.

B.M. 4.36 103.62 99.26

Item #4 } Inlet Stake = 96.17 = Grade = 95.3 = Cut = 0.87
 6'x3'x20' } Outlet Stake = 96.52 = Grade = 95.1 = Cut = 1.42

B on E. end S. Haul. Old Conc. Culv.

99.3 95.3 95.3 95.3 95.3 95.3
 9.0 9.3 9.3 5.0 4.9 5.1 4.3 4.3 8.9 8.1 7.9 8.0 7.8
 9 9 8 8 8 8 8 9 9 29 50 100 200

Inlet 96.17 96.52
 7.55 5.1 7.10 outlet
 5 0 5

P.M. D.S.B
5/17/28 C.V.C
F.R.R.

B.M. 4.08 104.08 100.00

X-Section of old Culv. 47'x3'x19'

E. Haul. broken off.

Drains Approx. 150 Acres Rolling

Nail in large Cottonwood W. Side Rd. Approx. 125' S. present structure

14.2 13.7 13.6 9.7 5.0 5.0 4.8 4.8 9.5 9.7 9.9 8.4 8.5 8.2
 100 36 11 10 10 0 8 9 9 17 33 38 50 100
 89.9 90.4 90.5 91.1 99.1 99.1 99.3 99.3 94.6 94.4 94.2 95.5 95.6 95.9

1 > W.

P.M. D.S.B - D.B.R.
6/8/28 C.V.C - F.R.R.

B.M. 6.68 106.68 100.00

Sec's. 8-17-89-12
8'x6'x R.C.B.

X-Section Wood Pile Bridge near center Section between 8-17-89-12

Spike in Hy. Line Pole S. Side Rd. at W. end of Old Wood Pile Bridge

93.4 94.4 94.4 94.6 102.2 102.1 102.3 94.3 95.1 95.3 95.7
 13.3 12.4 12.0 12.1 7.5 4.1 3.4 12.4 11.6 11.9 11.0
 100 50 25 8 8 0 8 8 25 50 100

Sec's. 9-16-89-12

5'x4'x R.C.B.

B.M. 7.55 107.55 100.00

X-sections Wood Pile Bridge between Section 9-16-89-12

Spike in Hy. Line Pole S. Side Rd. Approx. 10' W. of W. end of Bridge

93.1 93.9 93.1 94.5 102.3 102.1 102.3 94.3 94.4 95.3 95.6 96.4
 14.5 13.7 13.5 13.1 5.3 5.2 5.2 13.1 13.3 12.3 12.0 11.0
 100 50 25 8 8 0 8 8 25 50 100

5/19/28 AM.

D.S.B.
F.R.K.

19

Sta.	B.S.	H.I.	F.S.	Elev.
B.M.	3.98	103.24		99.26
0+00 = Bottom Big ditch			10.4	92.08
0+07 = Top W. bank			5.1	98.1
1+00			4.4	98.8
2+00			4.2	99.0
3+00			3.6	99.6
4+00			3.0	100.2
5+00			3.6	99.6
6+00			3.4	99.8
6+23 = Top E. bank			3.4	99.8
6+35 = Bottom ditch			6.2	97.0
B.M.			3.98	99.26

⊗ on E. end S. Adw. old Conc. Culv. Note: See Page # 17

RM.	P.S.B. D.B.R. F.R.K.	Item #2 Letting	N ↑ +
B.M.	6.76	106.76	100.00
Inlet Stake = 98.70 = Grade = 96.2 = Cut = 2.50			
Outlet " = 98.37 = Grade = 95.8 = Cut = 2.57			

8'x4'x26' R.C.B. Item #2

Spoke in Hy. Line Pole E. Side of Rd. Approx. 45' S. of structure													
98.70	96.4	96.0	101.6	101.0	101.3	101.5	101.6	101.6	95.3	96.1	95.3	96.1	95.3
Inlet	9.06	10.4	10.45	5.2	5.2	5.3	5.2	5.2	11.5	10.7	10.2	10.7	10.2
	5	27	6	6	5.5	5.5	8	11	11	11.6	22	43	43

7/7/28 A.M.

20

Sta.	B.S.	H.I.	F.S.	Elev.	Grade
------	------	------	------	-------	-------

B.M.	454	104.54		100.00	
------	-----	--------	--	--------	--

Item #5 = 5'x4'x30' P.C.B.

Nail in Gate-post S. Side Approx. 75' E. of structure

95.7	99.2	96.7
8.8	5.3	8.1
21	0	21

Inlet Stake = 6.35 98.19 96.00 = Cut 2.19

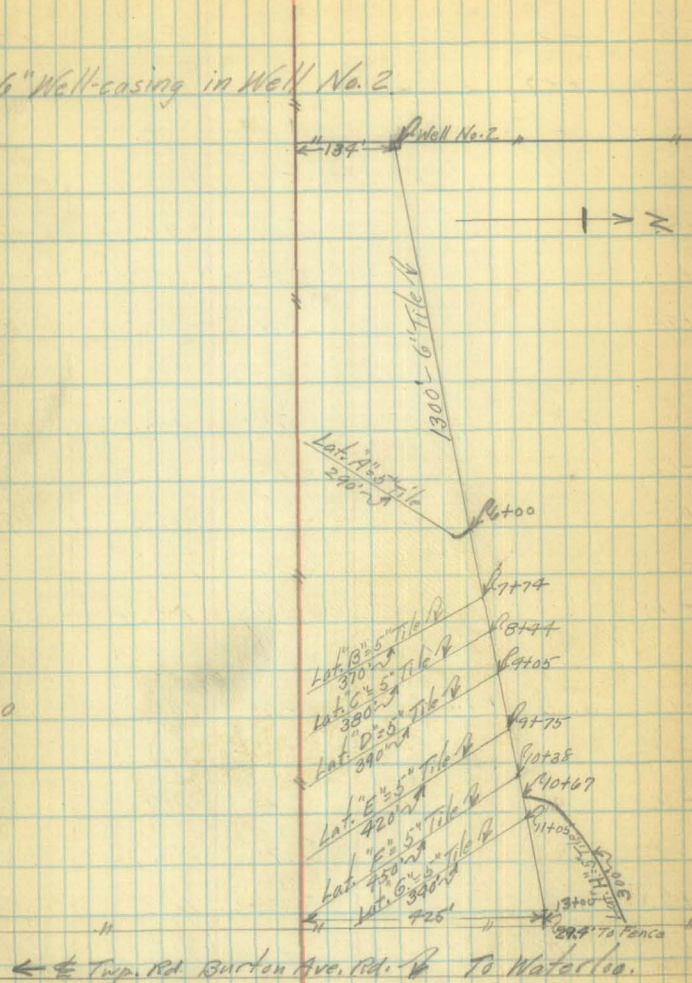
Outlet Stake = 7.64 96.80 95.90 = Cut 1.00

5/23/28 AM

D.S.B.
F.P.K.Black Hawk County Farm
Levels on 6" Tile E. from Well #2.

21

Sta	B.S.	I.I.	F.S.	Elev.	Grade	Cut
B.M.	4.25	104.25		100.00		Top of 6" Well-casing in Well No. 2
Outlet = 8" Tile in S.E. corner of Well 9.27 94.98						
0+00 = Outlet of 6" Tile			5.17	99.08	94.98	4.10
1+00			5.17	99.08	95.69	3.39
2+00			3.64	100.61	96.40	4.21
3+00			2.94	101.31	96.60	4.71
4+00			2.44	101.81	96.80	5.01
①	3.37	105.18	2.44	101.81		
5+00			3.72	101.46	97.00	4.46
6+00			5.11	100.07	97.20	2.87
7+00			4.65	100.53	97.50	3.03
8+00			4.58	100.60	97.80	2.80
9+00			3.95	101.23	98.10	3.13
①	6.16	107.39	3.95	101.23	= Top Skate at Sta. 9+00	
10+00			5.24	102.15	98.40	3.75
11+00			4.85	102.54	98.70	3.84
12+00			5.32	102.07	99.00	2.07
13+00 = End 6" Tile			4.32	103.07	100.20	2.87



Note:- See Sketch in File "E."

Sta.	B.S.	H.I.	F.S.	Elev.	Grade	Cut
B.M.	4.47	105.70		101.23		Top Stake Sta. 9+00 on 6" Line
0+00=Lat. "A"=6+00 on 6" Line			5.63	100.06	97.20	2.87
0+20			5.64	100.06	97.24	2.82
1+00			5.92	99.78	97.40	2.38
2+00			5.95	99.75	97.60	2.15
2+90=End.			6.14	99.56	97.80	1.76
0+00=Lat. "B"=7+74-6" Line			5.17	100.53	97.72	2.81
1+00			4.61	101.09	98.11	2.98
2+00			4.15	101.55	98.50	3.05
3+00			3.83	101.83	99.00	2.83
3+70=End.			2.75	102.95	100.00	2.95
0+00=Lat. "C"=8+44-6" Line			4.92	100.78	97.93	2.85
1+00			4.25	101.45	98.29	3.16
2+00			3.90	101.80	98.64	3.16
3+00			3.92	101.78	99.00	2.78
3+80=End.			2.64	103.06	100.00	3.06
①	6.19	107.42	4.47	101.23		
0+00=Lat. "D"=9+05-6" Line			6.12	101.30	98.11	3.19
1+00			5.39	102.03	98.46	3.57
2+00			5.29	102.13	98.80	3.33
3+00			5.60	101.82	99.00	2.82
3+90=End.			4.05	103.37	100.50	2.87

Sta.	B.S.	H.I.	F.S.	Elev.	Grade	Cut
107.42						
0+00=Lat. F"=9+75-6" Line			5.42	102.00	98.32	3.68
1+00			5.04	102.38	99.00	3.38
2+00			4.95	102.47	99.40	3.07
3+00			5.02	102.40	99.80	2.60
4+00			4.04	103.38	100.38	3.00
4+20=End			3.60	103.82	100.50	3.32

0+00=Lat. F"=10+38-6" Line			5.00	102.42	98.51	3.91
1+00			4.89	102.53	99.50	3.03
2+00			4.87	102.55	99.80	2.75
3+00			4.32	103.10	100.15	2.95
4+00			3.79	103.63	100.50	3.13
4+50=End			3.03	104.39	101.50	2.89

0+00=Lat. G"=11+05-6" Line			4.95	102.47	98.71	3.76
1+00			5.15	102.27	99.36	2.91
2+00			4.72	102.70	100.00	2.70
3+00			3.68	103.74	101.07	2.67
3+40=End.			3.27	104.15	101.50	2.65

Sta.	B.S.	H.I.	F.S.	Elev.	Grade	Cut.
		107.42				
0+00 = Lat. "H" = 10+67-6" Line			5.09	102.33	98.60	3.73
0+56			5.13	102.29	99.10	3.19
1+00			4.81	102.61	99.50	3.11
2+00			4.74	102.68	99.80	2.88
3+00 = End.			3.60	103.82	100.80	3.02
B.M.			6.19	101.23		Top Stake Sta. 9+00-6" Line

B.M.	5.67	108.21		102.54		Top Stake Sta. 11+00-6" Line
0+00 = Lat. "I" = 11+68-6" Line			6.25	101.96	98.90	3.06
1+00			6.10	102.11	99.20	2.91
2+00			4.56	103.65	100.70	2.95
3+48 = End			4.45	103.76	100.90	2.86

0+00 = Lat. "J" = 12+32-6" Line			6.23	101.98	99.38	2.60
1+00			5.15	102.86	100.00	2.86
40' Rd. Crossing				103.02		
2+00			4.31	103.90	100.90	3.00
				103.3		
2+50 = End			3.00	105.21	102.00	3.21

13+45 = End 6" Tile			3.86	104.35	101.20	3.15
			W.D. Feb 5.2	103.0		

Sta.	B.S.	H.I.	F.S.	Elev.	Grade	Cut
		108.21				
0+00 = Left "K" = 11+82 - 6" Line			6.48	101.73	98.95	2.78
1+35			6.18	102.13	99.07	3.06
1+00			6.14	102.07	99.30	2.77
1+75 = End			4.37	103.84	100.80	3.04

Checking 6" Tile on Main Line Co. Farm.

B.M.	6.87	107.47		100.60	
8+00			9.12		
9+00			8.73		
10+00			8.32		
11+00			7.94		
12+00			7.70		
13+00			6.65		

Top Stake Sta. 8+00

6/1/28 P.M. D.S.B.
F.R.K.

Schammer Gravel Pit 26

Prelim. X-Sections for Stripping.
Note: - See Page #11 for Sketch of Pit.

Sta.	B.S.	H.I.	F.S.	Elev.
B.M.	7.38	107.38		100.00

0+00 = S.E. Cor. of Pit

0+50 = 50' W. of S.E. Cor. along S. Side Pit etc.

1+00

1+50

2+00

2+75

B.M.	7.38	100.00
------	------	--------

Spike in Corner-post Approx. 9' E. of center of E. Side Pit.

0+00	3.2	3.2	1.9	0.9	0.4	99.6	99.2	97.2	96.6	95.6
0	3.2	4.2	5.5	6.5	7.0	7.8	9.2	10.2	10.8	11.9
0	3.2	6.8	8.9	10.0	12.0	15.4	18.2	20.0	23.8	

1+00	3.8	3.1	2.5	1.1	0.6	99.7	98.6	97.4	96.4	95.3
0	3.8	4.3	4.9	6.3	6.8	7.7	8.8	10.0	10.8	11.9
0	3.8	5.3	8.8	10.0	12.2	14.9	17.7	20.0	23.8	

1+50	3.7	2.8	2.0	1.5	0.8	99.6	98.7	97.6	96.7	95.6
0	3.7	4.6	5.7	5.9	6.6	7.8	8.7	9.8	10.5	11.8
0	3.7	6.6	6.6	8.0	10.0	13.0	15.5	18.1	20.0	23.8

2+00	3.9	3.7	3.0	2.5	2.0	1.6	99.9	98.3	97.2	95.6
0	3.5	3.7	4.4	4.9	5.4	5.8	7.5	9.1	10.2	11.8
0	3.5	1.9	5.9	8.4	10.0	11.0	14.6	17.8	20.0	23.8

2+75	3.6	3.3	2.6	1.8	0.8	99.3	97.8	96.6	95.2	
0	3.8	4.1	4.8	5.6	6.6	8.1	9.6	10.8	13.2	
0	3.8	4.7	7.8	10.0	12.6	15.0	17.2	20.0	23.8	

	1.5	1.0	0.6	99.5	98.5	96.7	94.9	93.7		
0	5.4	6.4	6.8	7.9	8.7	10.7	12.5	13.7		
0	5.4	2.7	6.1	10.0	12.7	16.5	20.0	23.8		

4/1/28 P.M.

D.S.B.
F.R.K.

Sta. B.S. H.I. F.S. Elev.

B.M. 6.90 106.90 100.00

0+00 = N.E. Cor. Pit

0+50 = 50' S. of N.E. Cor. on E. Side Pit + etc

1+00

1+50

2+00

2+50

2+72.25

Newton Gravel Pit
Prelim. X-Sections for Stripping
Note: - See Page #14 for Sketch of Pit

Top of Oak Hub. N.W. Cor. of Pit

0.5	0.1	0.3	0.0	99.2
6.7	6.8	6.6	6.9	7.7
0	60	100	150	200

1.9	1.8	1.6	1.2	0.6
5.0	5.1	5.3	5.7	6.3
0	41	95	150	200

2.4	2.3	2.0	1.6	1.3
4.5	4.6	4.9	5.3	5.6
0	54	100	150	200

1.8	1.7	1.6	1.4	1.3
5.1	5.2	5.3	5.5	5.6
0	56	100	150	200

0.1	0.4	0.4	0.3	0.4
6.8	6.5	6.5	6.6	6.5
0	59	100	150	200

98.0	98.3	99.1	98.8	99.1	99.1
8.9	8.6	8.2	8.1	7.8	7.8
0	38	73	100	150	200

97.0	97.5	98.0	98.0	98.5	98.4
8.9	8.4	8.9	8.9	8.6	8.5
0	34	75	100	150	200

6/4/28 A.M.

D.S. Butterfield
C. J. Cavanaugh
F. R. Krulish

Raymond - Dewar Co. Rd.

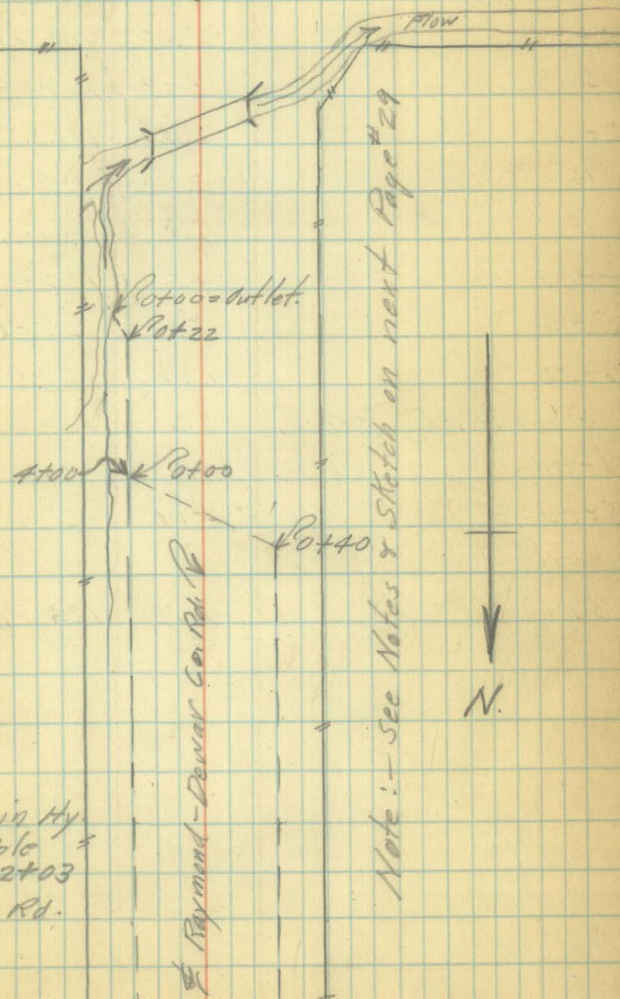
28

Just N. from Prim. No. 20 at
Dewar Corner.
Levels on 6" Tile:
E. Side of Road

Sta.	B.S.	H.I.	F.S.	Elev.	Grade	Cut
B.M.	5.82	105.82		100.00		
Bottom of Ditch			8.60	97.20		
0+00 = Outlet			8.23	98.59	97.20	1.39
0+22			5.54	100.28	97.24	3.04
1+00			5.39	100.43	97.40	3.03
2+00			4.47	101.35	97.60	3.75
3+00			3.80	102.02	98.00	4.02
○	11.90	113.92	3.80	102.02		
E. Side Rd.						
4+00 = 0+00 Junction for W. Side of Rd.			9.95	103.97	99.80	4.17
5+00			6.41	107.51	103.65	3.86
6+00			1.53	111.39	107.50	3.89
○	11.11	124.79	0.24	113.68		
7+00			7.90	116.89	112.80	4.09
8+00			4.40	120.39	116.20	4.19
9+00			2.23	122.56	118.15	4.41
○	6.94	131.07	0.66	124.13		
10+00			6.84	124.23	120.10	4.13
11+00			4.74	126.33	122.05	4.28
12+00 = End			3.00	128.07	124.00	4.07
B.M.			1.52	129.55		

Spike in Hy. Line Pole

E. Prim. No. 20



Note: - See Notes & Sketch on next Page #29

Spike in Hy.
Line Pole
Sta 12+03
E. Side Rd.

6/4/28 A.M.

D.S.B.
C.V.C.
F.R.K.Raymond-Dewar Co. Rd.
Just N. from Prim. No. 20 at Dewar
Corner. Levels on 6" Tile on W.
Side of Road.

29

Sta.	B.S.	H.I.	F.S.	Elev.	Grade	Cut.
B.M.	5.82	105.82		100.00		
①	11.90	113.92	3.80	102.02		
E. Side Rd. 4+00=0+00 for 6" Tile crossing 9.95'						
0+40			8.43	105.49	101.80	3.69
1+00			6.23	107.69	103.50	4.19
2+00			2.04	111.88	108.25	3.63
②	11.11	124.79	0.24	113.68		
3+00			7.90	116.89	113.00	3.89
4+00			4.30	120.49	116.50	3.99
5+00			2.32	122.47	118.50	3.97
6+00			0.66	124.13	120.33	3.80
③	6.94	131.07	0.66	124.13		
7+00			4.98	126.09	122.16	3.93
8+00=End			3.19	127.88	124.00	3.88

B.M. 1.52 129.55 = Spike in Hy. Line Pole E. Side Rd.
Sta. 12+03B.M.
Spike in Hy. Line Pole
outlet in bottom of ditch

Pot+22

4+00 Pot+00

Pot+40

6" Tile E. Side of Rd. N

6" Tile W. Side of Rd. N

12+00
B.M.

8+00

N
Note - See notes & sketch on Page 28

Wooden Bridges.

6-14-28 - Miller Dist.
Miller, Decker, Retshuagge, Thompson.

1. Bet. Sec. 12-13 - Black Hawk - 6 spans.
rebuild W. end. 2-16' span + 1-20' span.
2 - pilings.

2. Bet. Sec. 26-25 Lincoln middle of mile.
replace 3. end piling -
Blow 3 trees. 2 - west + channel ch.

3. Bet. 23-24 Lincoln. $\frac{1}{4}$ N. of S. line
2 - 12' spans. replace with
1-20' span at little to the So.
ch. ch. + block old.
Blow. 1 - willow + west

6/23/28 A.M.

D.S.B.
D.B.R.
C.V.C.
F.R.K.Schommer Gravel Pit.
X-Sections after stripping (1st stripping)

31

Sta.	B.S.	H.I.	F.S.	Elev
B.M.	5.37	105.37		100.00

0+00

0+50

1+00

1+50

2+00

2+75

Spike in Cor. post Approx 91' E. of center of E. side Pit.

79.1 79.2 96.8 97.8 96.9 96.1 96.7 96.1
 6.3 7.9 8.6 8.7 8.5 8.7 8.7 ✓
 128 134 151 165 180 196 200 206

99.1 99.1 97.8 96.8 96.6 96.8 96.2 96.1 96.8 ✓
 5.8 7.9 7.6 8.6 8.8 8.6 9.2 9.3 8.6
 131 133 144 154 164 169 180 198 206

99.5 99.4 95.1 97.4 96.5 96.8 96.0 96.9 92.5 ✓
 5.9 7.2 7.3 8.0 8.9 9.6 9.8 8.5 7.9
 131 133 140 159 179 185 195 200 206

09 99.8 95.4 97.0 95.8 97.4 ✓
 5.0 6.6 7.0 8.4 9.6 8.0
 131 136 149 174 200 208

08 99.5 99.3 98.4 97.3 96.2 95.6 94.9 95.1 96.3 ✓
 4.6 5.9 6.1 7.0 8.1 9.2 9.8 10.5 10.3 9.1
 131 136 144 156 170 177 191 195 203 206

98.2 96.7 96.3 95.8 95.2 94.6 94.7 ✓
 7.2 8.7 9.1 9.6 10.2 10.5 10.7
 185 193 195 190 182 200 207

5/30/28 AM.

D.S.B.
F.R.K.

Sta. B.S. H.L. F.S. Elev. Grade

B.M. 4.58 104.58 100.00
 = Mt. Vernon
 Item 6 Sec. 15-22 Inlet = 96.0 = Stake = 98.64 = Cut = 2.64
 Outlet = 95.8 = Stake = 96.61 = Cut = 0.81

Nail in Twin Soft Maple S. Side Rd. Approx. 26' S.E. of E. Culv.
 N. ← 96.61 95.5 96.0 99.8 100.3 100.0 99.5 95.8 96.2 98.64 → S.
 7.97 9.1 8.0 7.8 4.3 4.6 5.1 8.8 8.4 5.94
 3 30 12 10 8 10 11 11 31 3

7/10/28 D.S.B.
D.B.R.
F.R.K. Grade

B.M. 7.53 107.53 100.00
 Item #9
 8'x4'x35' R.C.B.
 Inlet Stake = 10.95 96.58 = 94.60 = Cut = 1.98
 Outlet Stake = 10.55 96.98 = 94.20 = Cut = 2.78

Between Section 9-16-89-12
 Spike in Hy-Line Pole S. Side Rd. Approx. 12' W. of E. end Wood Bridge

7/18/28 AM. D.S.B.
D.B.R.
F.R.K.

B.M. 7.42 107.42 100.00
 Item #8
 8'x6'x30' R.C.B.
 Inlet Stake = 11.93 95.49 = 95.10 = Cut = 0.39
 Outlet Stake = 8.42 99.00 = 94.70 = Cut = 4.30

Spike in Hy-Line Pole S. Side Rd. Approx. 12' W. of E. Bridge

7/30/28 M.A.

B.M. 7.15 107.15 100.00
 Item #7 between Sec. 31 Mt. Vernon and Sec. 30 Wash. Tap's.
 Inlet = 7.05 = 100.10 = 98.50 = 1.60
 Outlet = 8.11 = 99.04 = 98.30 = 0.74

Spike in Tel. Pole #6157 E. Side Rd. and S. of Culv.
 98.1 98.3 98.3 99.04 99.1 102.0 98.7 100.10 99.1 98.6 98.2 98.7
 9.1 8.9 8.9 8.11 8.1 5.1 5.2 5.0 8.5 7.05 8.1 8.6 9.0 8.8
 100 50 30 54K 13 12 0 12 13 54K 30 30 100 150
 Outlet 7.7 C Inlet

7/10/28 A.M.

D.S.B.
D.B.P.
F.R.K.Schommer Gravel Pit
X-Section after Stripping (2nd stripping)

33

Sta.	B.S.	I.I.	F.S.	Elev.
------	------	------	------	-------

B.M.	4.19	104.19		100.00
------	------	--------	--	--------

0+00

0+50

1+00

1+50

2+00

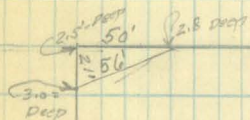
2+75

Spike in Cor-post Approx 91' E. of Center of E. side Pit.

99.2	97.7	96.3	95.0	94.2	93.6	92.6
5.0	6.5	7.9	9.2	10.0	10.6	7.6
127	129	139	170	192	204	205

99.2	96.8	94.5	93.9	92.3
------	------	------	------	------

4.8	7.4	9.7	10.3	7.5
180	131	187	204	205



7/18/28 P.M.
D.S.B.
D.B.R.
F.R.R.

Newton Gravel Pit
X-Sections after stripping

34

Sta.	B.S.	I.L.	F.S.	Elev.
B.M.	4.41	104.41		100.00

0+00

0+50

1+00

1+50

2+00

2+50

2+72.25

Top of Oak Hub N.W. Corner of Pit

05	98.0	97.1	97.7	98.8	99.6	0.9
2.7	6.4	6.7	6.2	6.1	5.6	3.5
0	1	17	40	69	89	105

1.4	99.2	99.2	99.5	99.2	99.7	99.5	1.4
2.6	5.2	5.2	4.9	5.2	4.7	4.9	3.0
0	1	15	46	82	100	104	108

2.3	0.6	0.9	0.6	99.8	0.9	99.9	1.8
2.1	3.9	4.1	3.9	4.6	4.1	4.5	2.6
0	1	34	55	75	100	108	110

1.6	99.6	99.4	99.8	98.7	99.8	99.0	99.2	1.5
2.8	4.8	5.0	5.1	5.7	5.1	5.4	5.2	2.9
0	1	31	62	79	96	100	114	116

99.9	97.9	96.7	97.9	96.8	96.7	97.5	97.7	99.7
2.5	6.5	7.7	7.1	7.6	7.7	6.9	6.7	4.7
0	6	24	41	63	79	100	123	129

97.9	95.5	95.4	95.1	95.4	95.5	95.4	96.6	98.9
6.5	8.9	8.0	7.3	7.0	8.9	7.0	8.8	5.5
0	0	23	53	87	100	113	126	128

96.9	95.6	94.6	94.9	94.8	94.2	95.0	97.0	99.8
7.5	9.4	9.8	10.1	9.6	10.2	9.4	7.4	4.6
0	0	30	59	88	100	110	124	129

1/19/28

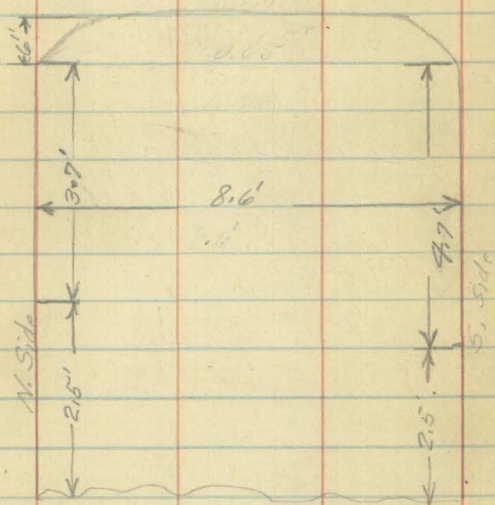
R.M.

D.S.B.
D.B.R.
F.R.K.

35

Sta B.S. H.I. F.S. Elev Grade
B.M. 2.12 102.12 100.09

± Culv. 45° skew



1/24/28

B.M. 1.86 101.86 Stake 100.00
Inlet = 10.03 91.83 90.00 = 1.83
Outlet = 12.49 89.37 88.50 = 0.87

#5422

Spike in tele. pole at E. Side Rd. Approx. 60' S. of Culv.

8.6 x 3.7 N-475

87.8	88.0	88.5	89.1	90.0	91.0	92.1	93.3	94.2	95.1	96.1	97.1	98.1	99.1	100.0
1.33	1.39	1.36	1.30	1.1	1.1	3.0	2.8	2.9	1.0	1.0	1.8	10.6	10.2	✓
100	57	90	7	7	6.5	6.5	0	9.5	9.5	19.2	10.8	2.7	5.2	5.2
										70	75	100	200	

7/26/28

D.S.B.
O.B.R.
F.R.K.Schammer Gravel Pit
X-Sections after Stripping

37

Sta.	B.S.	H.I.	F.S.	Elev.
B.M.	7.52	107.52		100.00
1+50 = Stripping begins				
1+63 Stripping at above width - 66'				

2+00

2+45 Stripping ends - Abrupt bank.

Splice in Car-pool Approx. 91' E. of center of E. side of Pit

3.4	1.5	1.2	1.2	1.3	2.9
-----	-----	-----	-----	-----	-----

1.4	6.0	6.3	6.3	6.2	4.6
32	33	47	60	65	66

9.9	99.8	99.9	99.2	99.8	99.6	99.5	99.4
-----	------	------	------	------	------	------	------

4.2	2.7	8.2	8.3	8.1	7.9	8.0	9.3
32	33	53	66	89	100	121	131

9.9	99.0	99.1	99.2	98.9	98.4	97.0
5.2	8.5	8.4	8.3	8.4	7.1	10.5
32	32	55	79	100	117	131

7/25/28 P.M.
D.S.B.
B.B.R.
F.R.K.

38

Sta	B.S.	M.I.	F.S.	Elev.
B.M.	3.14	810.65		807.51
○	5.01	808.84	7.72	802.93
○	2.43	805.61	5.46	803.18

on S. Hdwl. Cncl. Sta. 158+25 Laporte-Brandon Co. Rd.
Near end of Proj. 1922

8/7/28 A.M.
D.S.B.
F.R.K.

B.M.	6.75	106.75		100.00
------	------	--------	--	--------

Item #1

Twin 6'x5'x30'-30" skew N.W. of I.S.T.C. Campus
Inlet stake = 616 = 100.54 = 97.00 = 3.54'
Outlet stake = 570 = 100.85 = 96.60 = 4.25'

Spike in Willow W. Side of Rd. Approx. 75' S. of New Structure
Twin 8'x1.50'x30'
30" skew.

97.0	100.54	101.91	102.85	96.6				
97.4	97.8	97.7	98.6	97.9	97.0	101.2	100.6	
200	100	80	50	570	0	570	80	100

8/15/28 A.M.
D.S.B.
F.R.K.
P.G.H.

B.M.	5.54	105.54		100.00
------	------	--------	--	--------

Item #2

2'x2'x26'
Grade stake Cut
Inlet Grade = 98.50 = 101.06 = 2.56
Outlet Grade = 97.90 = 99.22 = 1.32

Spike in Gate-post E. Side Rd. S. of structure Approx. 125'

101.06	101.2	98.7	100.4	98.4	97.5	99.22
4.48	4.3	6.8	5.1	7.1	8.0	6.32
570	28	12	0	12	27	570
Inlet						Outlet

8/21/28 D.S.B.
B.B.R.
F.R.K.

B.M.	7.68	104.68		100.00
------	------	--------	--	--------

Item #3

6'x4'x26'
Grade stake Cut
Inlet Grade = 96.2 = 98.70 = 2.50
Outlet Grade = 95.8 = 97.05 = 1.25

Wail in Tel. Pole W. Side Rd. Approx. 75' S. of Culv.

95.8	97.05	96.2	96.1	100.5	101.2	100.9	95.9	98.70	96.3	96.9
10.9	96.3	10.5	11.6	6.2	5.5	5.8	10.8	7.98	10.4	9.8
75	5	45	10	10	0	10	10	5	35	50

8/9/28 AM

O.C.T.
F.R.K.

39

Schummer Gravel Pit
X-sections after stripping.
(Third - stripping)

Sta.	B.S.	H.I.	F.S.	Elev.
B.M.	7.02	107.02		100.00

0+00

+31 } Begin.

0+50

+76 } From +31 to +76 for this section. (+50)

1+00 } +85 } X-section on 1+00 to be figured

1+15 } from +85 to 1+15

1+50

102.16 101.22 100.30 99.64

4.86 5.80 6.72 7.58

60 61 78 79

See former notes.

130

99.86 99.12 98.62

7.16 7.90 8.60

98 119 120

See former notes.

131

August 18th 1925
 O.S. Butterfield.
 O.B. Raymond.
 E.R. Kralish.

Sec. 14 B.H. Twp.

#4 Twp. Rd. N. D

Sec. 11 B.H. Twp.



E.E. Mattingly

Sec. 12 Black Hawk Twp.

Sec. 13 Black Hawk Twp.

Black Hawk Creek

Found lime stone

Set large bridge spike here 4-4 corner
 Found lime stone 4 corner

Found stone Nov. 21st 1930

#3

#2

#1

33.0'

33.0'

1316.25'

1316.25'

Hub Drive
 Iron Bar
 49.3
 33.0
 #4
 47.0
 → N

Stone & Iron Bar & Twp. Rd.

Hub

Iron stake

Iron stake

Iron Bar

No. 3

35.20

41.05

33.0

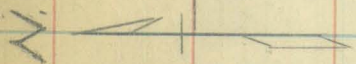
37.80

Iron stake

Lime stone

Between Sections
 11-12 9/13-14 B.H. Twp.

Iron stake



Black Hawk Creek

4th Post from W. end Bridge

No. 2

7th Post from W. end Wood Pile Bridge

Large Bridge Spike

8" Elm

41.27'

33.95'

20.16'

16.25'

5.40'

W. Maple in
 Group of 4-12' Maples

Corner Post of
 Handrail

Corner Post of
 Handrail

14" Oak

Iron stake

Iron stake

Iron Pin

No. 1

30.25'

33.0

32.05'

30.25'

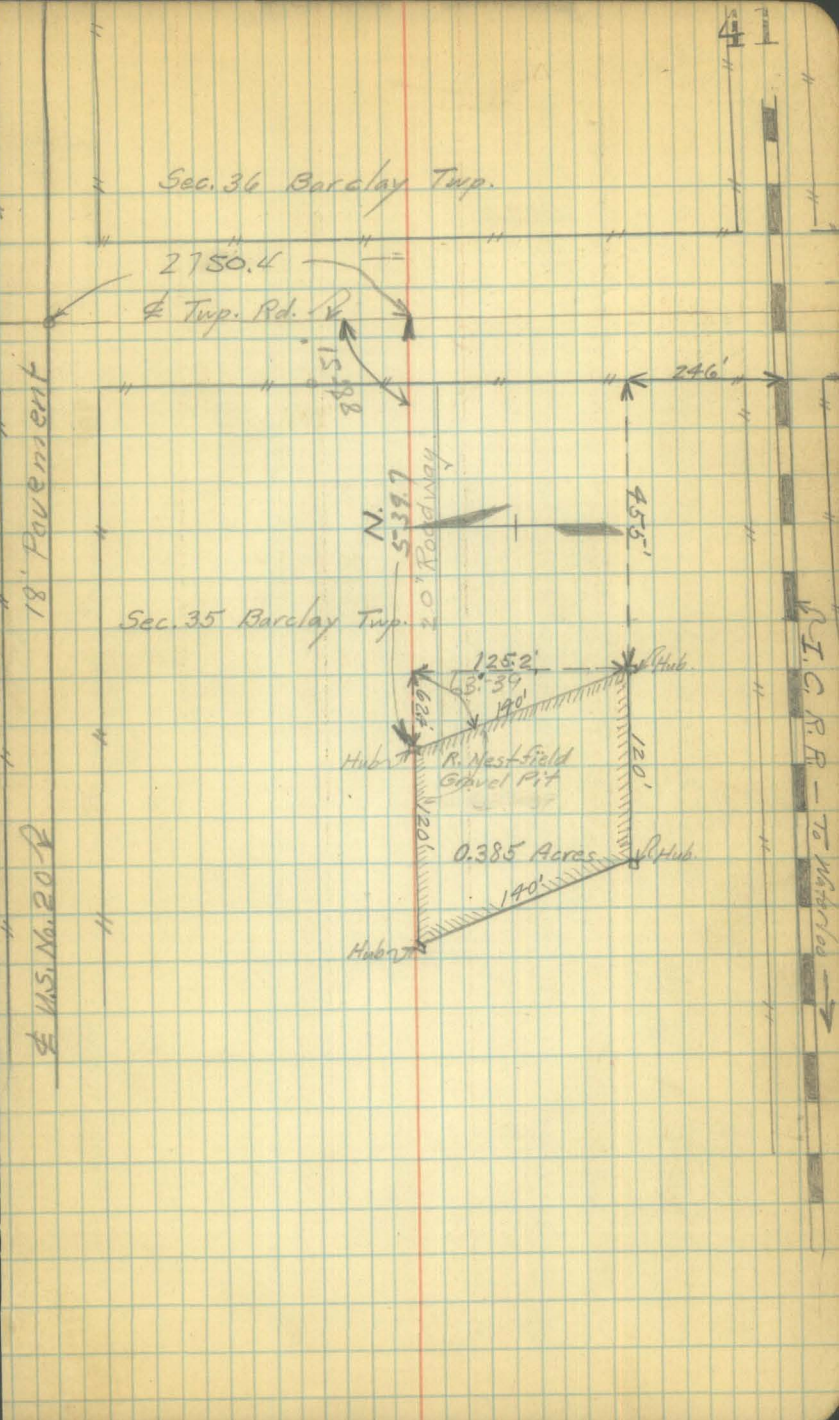
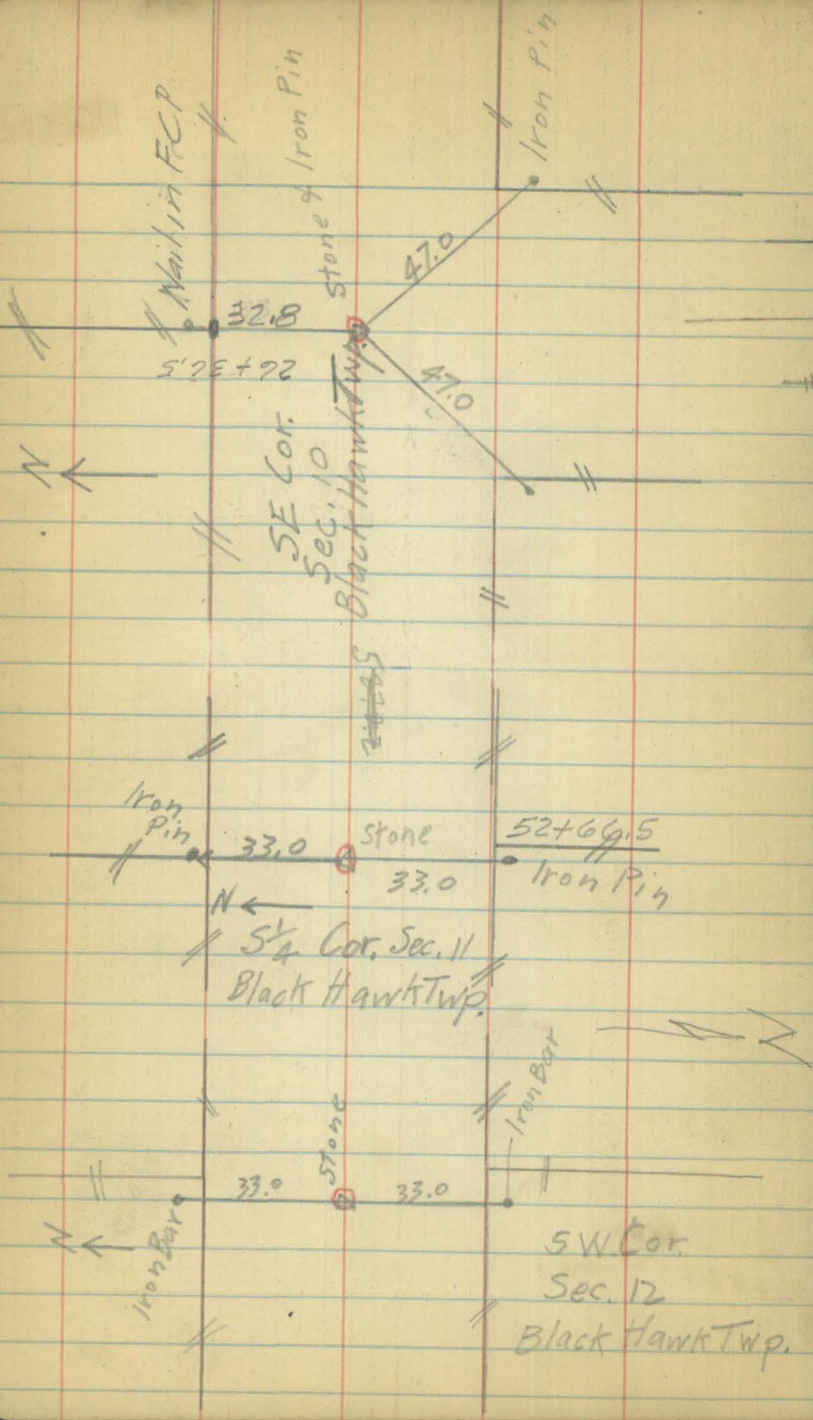
33.0

33.20'

Iron stake

Iron stake

Lime stone



41

N.

9/4/28 AM.
D.S. Butterfield - F.R. Newish &
C.D. Carraway

McHale's Farm

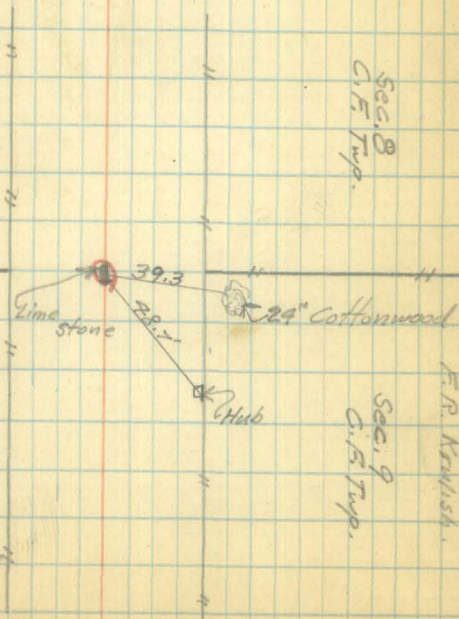
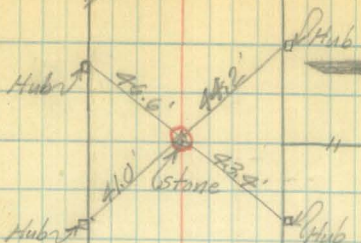
Sec. 34
C.F. Twp.

Sec. 33
C.F. Twp.

Sec. 8
C.F. Twp.

Sec. 9
C.F. Twp.

9/7/28 AM.
D.S. Butterfield
F.R. Newish.

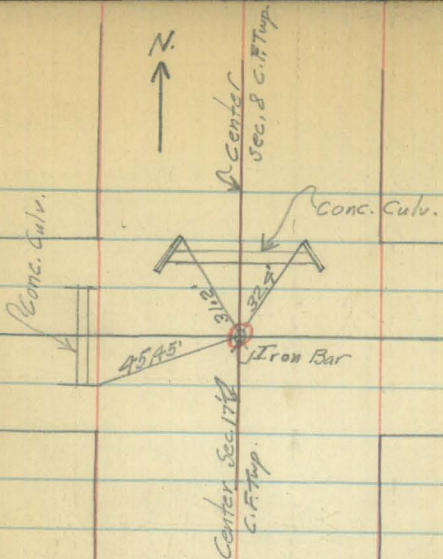


Sec. 17
C.F. Twp.

Sec. 16
C.F. Twp.

Sec. 3
B.H. Twp.

Sec. 4
B.H. Twp.

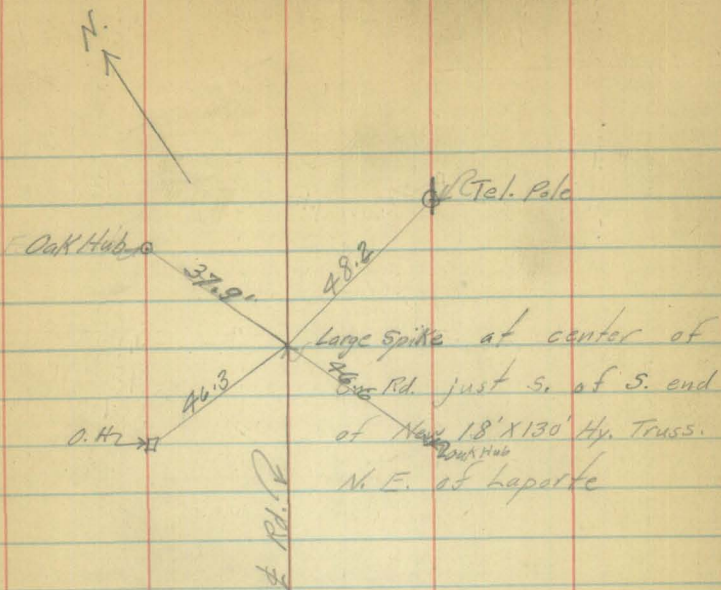


Center Sec. 17 &
C.F. Twp.

Conc. Culv.

Iron Bar

N.



$$\text{Br. seat} = 809.42$$

Sta	B.S.	H.I.	F.S.	Elev.	Grade.
B.M.				<u>803.10</u>	

N.E. of Laporte City
Spike in Willow on S. bank of 130' X 18' Hy. Truss
Bridge and Approx. 50' E. of S. end of Bridge

Top Sheet Piling 9th pile from S.E. Cor. of Abut.
Elev. = 798.20. or 13'-9 1/2" to
bottom of pier.

9/19/28

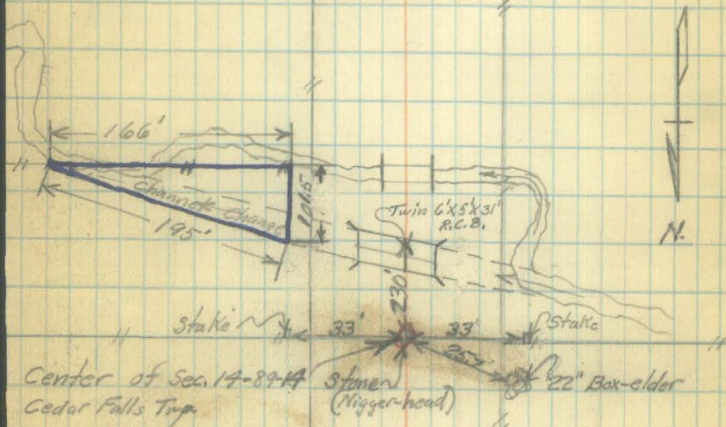
D.S. Butterfield.
F.R. Krulish.

1/1

Iowa State Teachers
College N.W. corner
of Campus.

M.R. Thompson.
\$100.00 for
channel change.

± 23rd St. V



Center of Sec. 14-89-14
Cedar Falls Twp.

± 19th St. V

9/24/28 AM.

D.S.B.
F.P.K.

45

± Profile of Twp. Rd. N. of Bridge

Sta.	B.S.	H.I.	F.S.	Elev.	Grade
B.M.	2.88	102.88		100.00	
0+00 = N. end of Bridge					99.80
				3.5	
0+50					99.40
				3.9	
1+00					99.00
				4.0	
1+50					98.87
				4.2	
2+00					98.74
				4.3	
2+50					98.60

② on N.E. Wing Concr. I-Beam Bridge in front of "Dell" Wilson Farm

99.8
3.1
0

97.5

5.7
0

97.1

5.8
0

97.2

5.7
0

97.9

5.0
0

98.6

7.3
0

9/24/28 A.M.

D.S.B.
F.R.K.

45

Profile of Twp. Rd. S, of Bridge

Sta.	B.S.	H.I.	F.S.	Elev.	Grade
B.M.	2.88	102.88		100.00	
0+00 = S. end of Bridge				99.70	
			3.3	99.60	
0+50					
			3.4	99.50	
1+00					
			3.3	99.60	
1+50					
			3.2	99.70	
2+00					

99.7

3.2
0

98.4

4.5
0

98.3

4.6
0

98.9

4.0
0

99.7

3.2
0

10/4/28 A.M.
P.S.B.
C.J.C.
F.R.K.

Schommer Gravel Pit
X-sections after stripping
for
Twp. Graveling.

4

Sta. B.S. H.I. F.S. Elev

B.M. 9.18 109.18 100.00

0+23 stripping begins (Abrupt bank)

average 3' X 85' X 15'

0+40 stripping begins for X-sectioning

0+50

1+00

1+50 = stripping ends.

Spike in Corner-post Approx 21' E. of center of E side pit.

102.7 101.1 100.0 98.6
6.3 5.1 9.2 10.4
31 32 58 73

102.5 100.4 99.4 99.2 99.2
6.7 8.8 9.8 10.0 10.0
32 32 66 97 11

103.3 100.2 99.2 100.3 99.7 99.2 99.7 98.4 98.0
5.9 9.0 10.0 8.9 9.5 10.0 11.0 10.8 11.2
32 32 50 69 86 99 111 128 141

stripping = 405 C.Y.
3' X 85' X 15' = 142 C.Y.
547 C.Y. = Total

10/8/28

A.C. Thompson
D.S. Butterfield
C.V. Cavanaugh
F.R. Kautish

Robert
Munro
Wagner
Frank
Ashley

Laporte City
Levels to extend storm sewer
on W. to pond in Ashley's pasture

48

Sta.	B.S.	I.I.	F.S.	Elev.
B.M.	4.08	819.52		815.44
Top Conc. Intake			6.58	812.94
+00			5.53	$\frac{5.21}{807.73} = \text{Bottom of Intake}$
Intersection 1 block W.			4.65	
Low Ground E. Side St. 2 blocks W.			7.80	
St. 2 blocks W.			5.20	
Low Ground W. Side St. 2 blocks W.			7.70	811.82
Low ground in pond.			7.60	

Laporte City
Spike in Hard Maple N.W. Corner of Tourist Park

32.5' = 24" Tile

336' = 18" Tile

5.21' Top Conc. Intake to bottom of Intake
W. Side of Street at N.E. Corner Tourist Park

10/18/28 A.M.

D.S. Butterfield
C.V. Cavanaugh
F.R. Krulish

Cloudy - Cool

Laporte City
Levels on 24" & 18" Storm Sewer Tile

49

Sta.	B.S.	I.I.	F.S.	Elev.	Grade	Cut.	Laporte City
B.M.	4.40	819.84		815.44			Spike in Hard Maple N.W. Corner of Tourist Park.
Top Conc. Intake			6.93	812.91	807.70		Bottom of Intake Outletting 24" Tile into 30" Tile
Bottom Intake - 5.21							
0+00			5.70	814.14	807.70	6.44	= 6'-5"
0+50			4.71	815.13	807.83	7.30	= 7'-4"
1+00			4.57	815.27	807.95	7.32	= 7'-4"
1+50			4.45	815.39	808.08	7.31	= 7'-4"
2+00			4.49	815.35	808.20	7.15	= 7'-2"
2+50			4.74	815.10	808.33	6.77	= 6'-9"
3+00			5.00	814.84	808.45	6.39	= 6'-7½"
Intake N.W. Sink Outst.							
3+50			5.63	814.21	808.58	5.63	= 5'-7½"
4+00			5.71	814.13	808.70	5.43	= 5'-5"
4+50			6.40	813.44	808.83	4.61	= 4'-7½"
5+00			6.74	813.10	808.95	4.15	= 4'-2"
5+50			7.98	811.86	809.08	2.78	= 2'-9"
6+00			8.05	811.79	809.20	2.59	= 2'-7"
6+50			5.90	813.94	809.33	4.61	= 4'-7½"
6+67=End			7.62	812.22	809.37	2.85	= 2'-10"
B.M.			4.40	815.44			

27th St. Rd. 7

Sec. 20

Hy. L.P. 7

Tel. Pole

Sec. 17

2650.8'

$$\begin{array}{r} 66.8 \\ 51.9 \\ \hline 5.9 \end{array}$$
2nd Oak Hub2nd Oak Hub

23'

28'

93'

78.5'

1327'

2644.5'

G. F. Twp.

G. F. Twp.

Sec. 17

Sec. 18

21.5'

Prime stone

2651.9'

12th St. Rd. 11

40' Cottonwood

Sec. 9

Sec. 8

Prime stone

2651.9'

2660.5'

C. F. Twp.

Sec. 8

Sec. 7

$$\begin{array}{r} 819.92 \\ 604.85 \\ \hline 525.07 \end{array}$$

Hole	stripping	Gravel	yellow Sand	Gravel	Clay
1.					
2	1.2'				
3	0.8'	5.0'			
4	2.9'	4.5			
5	1.5'	2.9'			3.5
6	1.6'				4.0
7	0.8'	6.0			
8	No	Good.			
9	No	Good			
10	2.0'	No Good.			
11	3.5'		4.6'	5.7'	

Sec. 8-89-14

Sec. 8-89-14

5

Reinforcing Bar = Sta. 52+95.7

of Survey run
4/23/30
D.S. Butterfield
C.V. Cavanaugh
Jim. Wayner
Burton Johnston
Irvin Ploug



Sec. 17-89-14

Cedar Falls Twp. and

33.0' 33.0' K.O.H.
2" O.H. = Sta. 26+50.5

Sec. 17-89-14
Cedar Falls Twp.

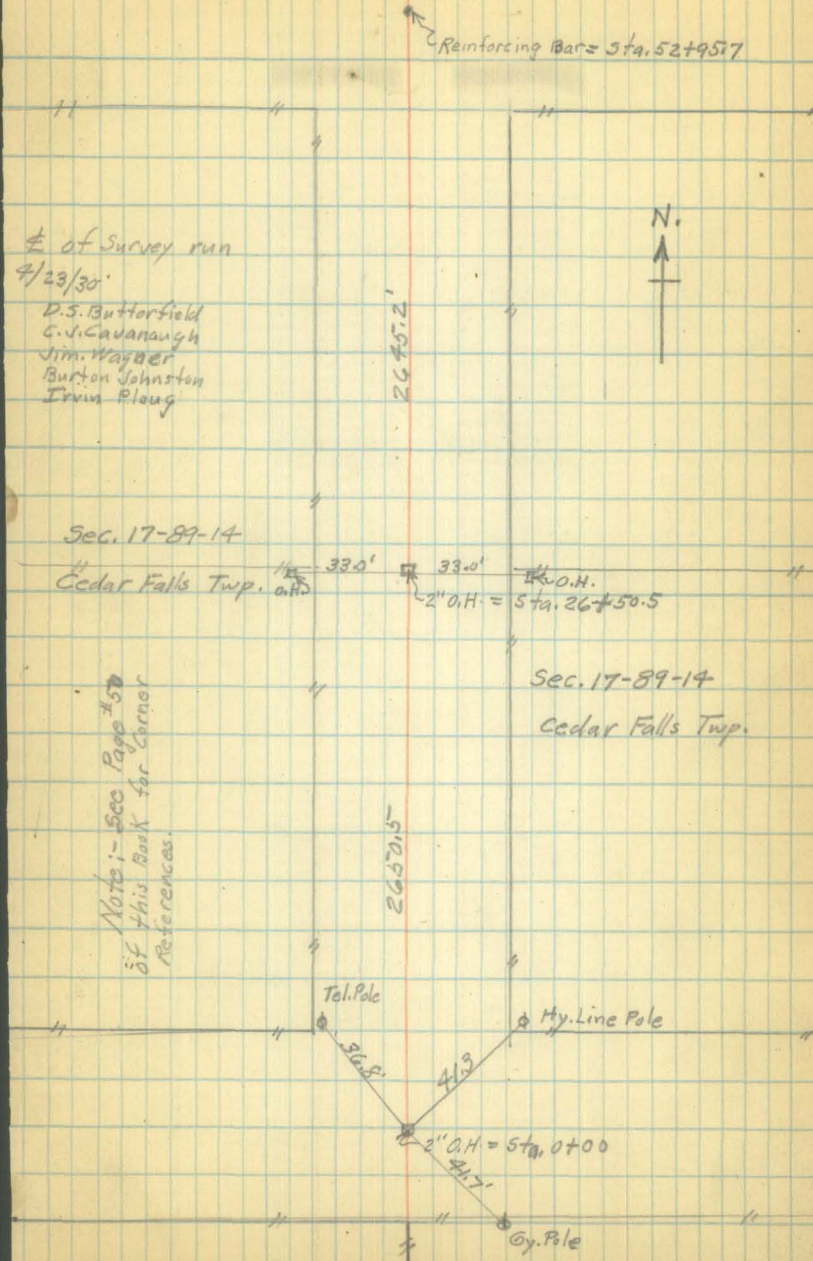
Note: - Sec. Page 50
of this Book for Corner
References.

Tel. Pole

Hy. Line Pole

2" O.H. = Sta. 0+00

Cy. Pole



Sec. 5-89-14

Sec. 5-89-14

53

± Prim. No. 20 W. ±

± Cross in ± Intersection on Pavement.
 ± Prim. #20 Sta. 780+64 = End of Project
 for Rd. 2 Mi. S. = Sta. 106+151

N.



2652.8'

Sec. 8-89-14
 Cedar Falls Twp.

a.H.

33.0'

33.0'

a.H.

2" O.H. = Sta. 79+61.3

Sec. 8-89-14

Cedar Falls Twp.

2665.6'

B.S. H.I. F.S. Elev

B.M. 5.5 14.15 100.00

100.00 12.0 98.00

100.00 11.3 98.75

100.00 9.6 99.00

100.00 5.4 99.50

100.00 5.1 99.50

100.00 4.8 99.50

100.00 4.2 99.50

100.00 4.3 99.50

100.00 6.37 100.00 100.00

100.00 10.00 100.00

100.00 10.00 100.00

100.00 10.00 100.00

100.00 10.00 100.00

100.00 10.00 100.00

100.00 10.00 100.00

100.00 10.00 100.00

100.00 10.00 100.00

B.M. 10.00 10.00 100.00

0.7 of water at outlet of culv.

Sta.	B.S.	H.I.	F.S.	Elev.	N. Ditch
	2.16	110.97	N ^{Shoulder} Levels	108.81	Levels
0+00			3.9		7.7
1+00			5.1		8.0
2+00			5.3		7.9
3+00			4.7		7.5
4+00			4.6		7.3
5+00			5.2		7.7
T.P.	4.36	110.32	5.01	105.96	
6+00			4.8		7.3
7+00			5.3		8.1
8+00			5.4		7.7
9+00			5.3		8.0
10+00			4.4		7.2
10+96			3.5		7.8
B.M.					

Outlet of Conc. Culv.

Water in N ditch ends at 9+90

E of bridge

3/22/28 Levels East of Culv. on Denver
Dunkerton Road. Section 29-90-N

Sta	B.S.	H.I	F.S.	Elev.	S. Ditch
	2.16	110.97	S. shoulder levels	108.81	levels
0+00			3.9		7.4
1+00			5.0		7.7
2+00			5.2		7.7
3+00			5.0		7.7
4+00			4.8		7.4
5+00			5.4		7.7
T.P.	4.36	110.32	5.01	105.96	
6+00			4.5		7.0
7+00			4.8		7.2
8+00			5.2		7.5
9+00			5.1		7.6
10+00			4.8		7.5
10+96			3.3		7.8
B.M			3.54	106.78	

Water in S ditch ends at 6+50

E of bridge

Sta 10+90 @ on W end of S. wheel guard

3/23/28

Levels West of Culv. on Dewar-

Drinker-ton Road. Section 29-90-11

58

Sta.	B.S.	H.I.	F.S.	Elev.	N. Ditch
B.M.	3.29		N. shoulder levels.	108.81	levels
0+00			5.1		8.8
1+00			5.5		8.6
2+00			5.7		8.7
3+00			5.5		9.0
4+00			5.3		8.9
5+00			4.9		8.3
6+00			4.6		
T.P.	6.05	114.14	4.01	108.09	
7+00			6.00		
8+00			5.6		
8+31			4.6		

4+75 Water ends in N. ditch

E. fence of cross-road N. side of rd.

3/23/28 Levels West of Culv. on Denwar-
Dunkerton Road. Section 29-90-11

Sta.	B.S.	H.I.	F.S.	Elev.	S. Ditch
B.M.	3.29	112.10	^{S. shoulder} levels	108.81	levels
0+00			4.8		8.6
1+00			5.4		7.9
1+26			7.89 ft.		
2+00			5.2		7.6
3+00			5.2		7.5
4+00			5.0		
5+00			4.8		
6+00			4.2		
T.P.	6.05	114.14	4.01	108.09	
7+00			5.7		
8+00			5.1		
8+31			4.3		
B.M.			2.25	111.89	

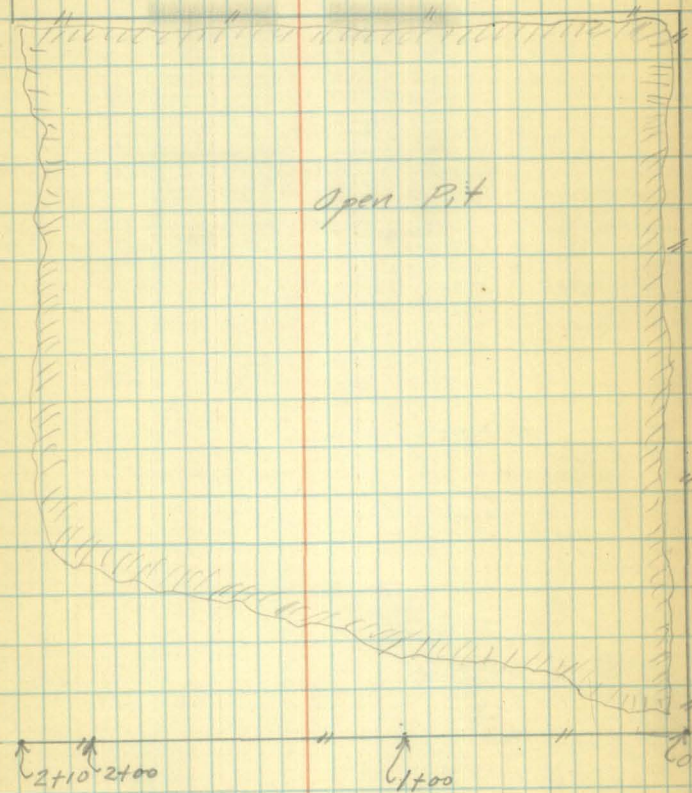
8' Tile outlet from field on S side of road

1470 End of water in S ditch

E. fence of cross road S side of road

⊙ On S. Hdwn of intersection culv.

to Top. Rd. rd



10/30/28

 D.S. Butterfield
 C.J. Cavanaugh
 F.R. Krulish

 Mahood Gravel Pit.
 X-sections before stripping

51

Sta	B.S.	M.L.	F.S.	Elev
B.M.	12.00	112.00		100.00
①	9.25	117.59	3.66	108.34

0+00 = S.E. Corner of Pit.

0+04 = stripping begins

0+50

0+65

0+92

1+00

1+38 = Hauled stripping

1+50

1+80

2+00

T.B.M.

9.98 107.61

 Note: - Deduct 40 yds stripping
 hauled to Cemetery.

 Nail in root Honey-Locust W. Side Rd. Approx. 150' S. of
 S. end wood Bridge just N. of Pit.

17.1	10.4	10.4	8.9
6.5	7.0	7.2	9.6
8	2	6	6

11.6	11.7	10.7	9.8	8.8
6.0	5.9	6.9	7.8	8.8
0	2	3	5	5

11.5	11.7	10.8	10.9	11.2	11.4	9.1
6.1	5.9	6.8	6.7	6.4	6.2	8.5
0	3	4	6	8	12	13

11.5	11.1	11.1	11.6	11.9	8.6
6.1	6.5	6.5	6.0	6.2	9.0
0	3	9	14	23	23

11.3	11.0	11.2	11.4	11.4	8.0
6.3	6.6	6.4	6.2	6.2	8.6
0	7	11	20	25	25

10.3	10.9	9.5	9.8	13.8	11.3	9.8	7.3
7.3	6.7	8.3	7.8	3.8	6.3	7.8	10.7
0	4	7	17	20	26	31	31

9.6	10.1	8.8	8.8	11.8	12.5	11.1	10.5	9.2	7.2
8.0	7.5	8.8	8.8	5.8	5.1	6.5	7.1	8.4	10.4
0	3	3	18	23	27	31	34	35	35

7.9	9.2	8.6	5.6	9.0	9.2	7.5	5.8
9.7	8.4	9.0	9.0	8.6	8.4	10.1	11.8
0	4	6	18	25	37	42	42

Nail in Corner - past S.W. Corner Pit.

11/13/28 AM.

D.S.B.
C.V.C.
F.R.R.Mahood Gravel Pit.
X-Sections after stripping

62

Sta.	B.S.	H.I.	F.S.	Elev.
B.M.	5.41	113.02		107.61

0+04

0+50

0+65

0+92

1+00

1+50

1+80

2+00

Note: 2+10 stripping ends - Abrupt banks

Nail in Corner-post S.W. Corner Pit.

11.2	11.1	10.6	10.5	8.5
1.8	1.9	2.4	2.5	4.5
0	1	3	5	5

11.6	8.8	8.0
1.7	2.2	5.0
0	1	4

11.5	11.6	8.8	7.2
1.5	1.4	2.2	5.8
0	3	5	13

11.4	11.5	11.0	8.9	8.7	7.1	6.4
1.6	1.5	2.0	4.7	4.3	5.9	6.6
0	2	3	6	12	19	21

11.3	11.1	10.5	8.8	8.4	8.9	7.6	6.4
1.7	1.9	2.5	4.2	4.6	7.1	5.7	6.6
0	2	3	7	10	17	20	28

10.3	10.5	7.5	7.7	7.2	6.4	5.5	5.1
2.7	2.5	5.3	5.3	5.8	6.6	7.5	7.9
0	2	5	12	20	28	35	38

9.1	9.4	8.7	6.4	6.2	6.7	6.6	5.8	5.0
3.9	3.4	4.3	6.6	6.8	6.3	6.4	7.2	8.0
0	2	3	5	13	22	31	39	41

7.8	8.4	5.9	5.8	6.3	6.7	6.0	6.8	4.9
5.2	4.6	7.1	7.2	6.7	6.3	7.0	7.2	8.1
0	2	4	17	19	28	35	40	42

Total Yardage = 477 Cu. Yd's.
 Hauled by load $\times$ Deduct 40 Cu. Yd's.
 Total Yards Stripping = 437 Cu. Yd's.

Levels for Septic tank at County Farm.

8-29-29

63

O.C.T.

C.J.C.

BM. 4.50 104.50

100.00

3.88

11.10

14.98

89.52

X on walk at NE. cor. of Administration Bldg.

Window sill of Boiler Room.

Floor of " "

3.88

6.05

9.93

94.57

Window sill of Poor Bldg.

Floor basement " "

12.33

6.03

18.33

86.17

bottom of Septic tank 92.17 ceiling of Septic

10.13

3.92

14.06

90.44

to tank - 91.67 Fl. near into tank

Flow Line of Intet pipe at its End.

11.58

92.72

Elev. Sewer. from Insane Bldg. at water tanks.

T.P. 2.12 97.73

8.89

95.61

T.P. 1.07 86.86

11.94

85.79

T.P. 3.47 78.92

11.41

75.45

6.76

72.16

Elev. of Filter Bed.

9.47

69.45

" " Creek "

Detention Hqs.

10-15-29

64

BM. 4.19 104.19

100.00

6.57 97.52

3.75 100.44

04.00

3.34 100.85

1+00

5.00 99.19

24.00

5.20 98.99

Y- on inside cor. wall S.E. cor. Bldg.

Top 4" sewer pipe from old Bldg.

Ground Level over above pipe

" " " pipe from new Bldg.

10-18-29

BM. 4.38 104.38

100.00

11.69 88.69

10.69 89.69

Set Elev. for Floor of Septic tank W. end

" " " " " " " E. end

10-24-29

BM. 4.39 104.39

100.00

95.85

95.69

96.69

Set Elev. for inlet to Septic tank

" " " Outlet " " "

" " " Ceiling " " "

Levels for Sewer. at Detention
to Septic tank.

11/4/29

65

4.27	104.27	100.	Grades	Cuts	Inlet.
00		8.39	95.88	95.88	End Pipe from Septic tank F.L.
+25		5.32	98.75	96.08	2.87
+50		5.18	99.09	96.28	2.81
+75		5.25	99.02	96.48	2.54
+100		5.17	99.10	96.68	2.42
+125		5.07	99.20	96.88	2.32
+150		4.94	99.33	97.08	2.25
+175		3.83	100.44	97.28	3.16
+200		3.48	100.79	97.48	3.31

V = 26.5' from W.
edge of 6th window
from E. end Horiz.

8.70 95.57 Outlet pipe of Septic tank (F.L.)

11-5.29					
4.51	104.51		100.00		
B.M.	5.60	105.60	12-3-29	100.00	
			8.06	97.54	
00			4.46	98.14	97.54
+37			4.23	101.37	97.84
+49.5			4.48	101.12	97.94
					3.60
					3.53
					3.18

Cuts for tile in Disposal Field

H.I. = 104.12

	A		Grade		B.			Cut		C		
00	4.32	99.80	95.32	4.48	4.55	99.57	95.34	4.23	4.95	99.17	95.36	3.81
		H.I.	104.27									
+50	5.17	99.10	95.27	3.83	5.23	99.04	95.29	3.75	5.54	98.73	95.31	3.42
1+00	5.72	98.55	95.22	3.33	5.48	98.79	95.24	3.55	5.73	98.54	95.26	3.28

	D	H.I. 104.12			E	F						
00	5.76	98.36	95.38	2.98	5.68	98.44	95.38	3.06	5.36	98.76	95.36	3.40
		H.I. = 104.27										
+50	5.72	98.55	95.33	3.22	5.64	98.63	95.33	3.30	5.61	98.66	95.31	3.35
1+00	5.83	98.44	95.28	3.16	5.92	98.35	95.28	3.07	6.07	98.20	95.26	2.94

G		H.I. 104.12		H.							
00	5.24	98.88	95.34	3.54	5.51	98.61	95.32	3.29			
		H.I. = 104.27									
+50	5.52	98.75	95.29	3.46	6.08	98.19	95.27	2.92			
1+00	6.15	98.12	95.24	2.88	6.38	97.89	95.22	2.67			

Elev. for Filter Bed of Co. Farm

4.62 104.62

100.00

B.M. slope stake in fence line @ N.W. cor.
of filter bed.

7.06

95.56

^{Top} End of outlet tile in NE. cor. of old Filter Bed

6.85

97.77

Elev. Inlet tile @ fence line.

5.03

99.59

95.30

Cor. set for ^{out} tile N. end C. 4.29

4.90

99.72

97.77

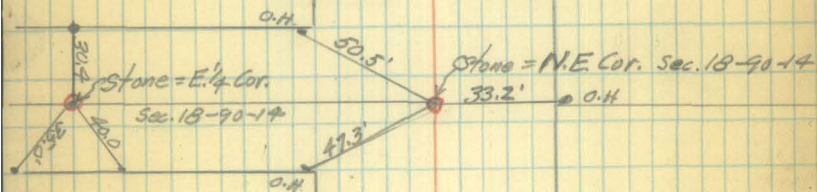
C. 1.95 Inlet @ fence.

95.45

Gr. W. end of collector tile.

Sec. 7-90-14

Sec. 8-90-14

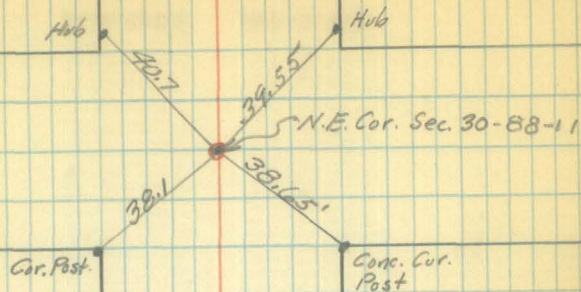


Sec. 18-90-14

Sec. 17-90-14

Sec. 19-88-11

Sec. 20-88-11



Sec. 30-88-11

Sec. 29-88-11



Sec. 23-89-11
Barclay Twp.

$$\dot{z} \leftarrow +$$

Cor. Post 2

Stevens Post

Iron Bar 7

525.0

232.5'

[illegible]

33

22

Iron Bur

525:01

33

56

Clayton Gravel Pit.

Iron Bar,

525.01

Wren Bar

Bar = 100 ft. Cor
N.W. - N.W. 1/4
Sec. 28 - 59-1

Split Fences & set Iron
Bar — after digging
and finding nothing
Also dug & found
nothing at E & Cor.
& N.E. Cor. of Sec.

N.



School

Cor. Post.

46.0'

I.B. sta. 106+13.2

55.7

H.L. Pole

Nail in
Pine Tree

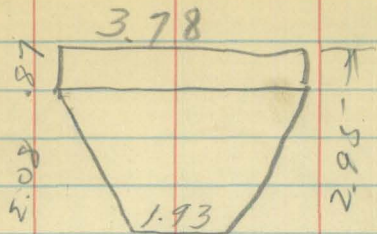
116.57
m
495.0

6 495'

70+48.3

75+43.3

International # 8



Long 6.87

63.48 = 2.35 yards.

20800

$$\begin{array}{r} 1 \\ 365 \\ \hline 2920 \\ 365 \\ \hline 4570 \end{array}$$