FOR PART 2 SEE STARK COUNTY STATE HIGHWAY PATROL DRIVE, MASSILLON DISTRICT HEADQUARTERS

FEDERAL SECTION	STATE	PROJECT	FISCAL YEAR
10	OHIO		1944

1/13

STARK COUNTY
S.H.69 SEC. MASSILLON(P
S.H.68 SEC. MASSILLON(P
S.H.71 SEC. MASSILLON(P

STATE OF OHIO
DEPARTMENT OF HIGHWAYS

MASSILLON-WOOSTER ROAD
S.H. 69 SEC. MASSILLON (PT.)
CANTON-MASSILLON ROAD
S.H. 68 SEC. MASSILLON (PT.)
AKRON-MASSILLON ROAD
S.H. 71 SEC. MASSILLON (PT.)
STARK COUNTY
CITY OF MASSILLON
PART I

CONVENTIONAL SIGNS

COUNTY LINE
TOWNSHIP LINE
CORPORATION LINE
CENTER LINE
STEAM RAILROAD

INDEX OF SHEETS

	SHEET No.
TITLE SHEET	1
TYPICAL SECTION & GENERAL NOTES	2
PLAN & PROFILE	3-12
GENERAL SUMMARY	13

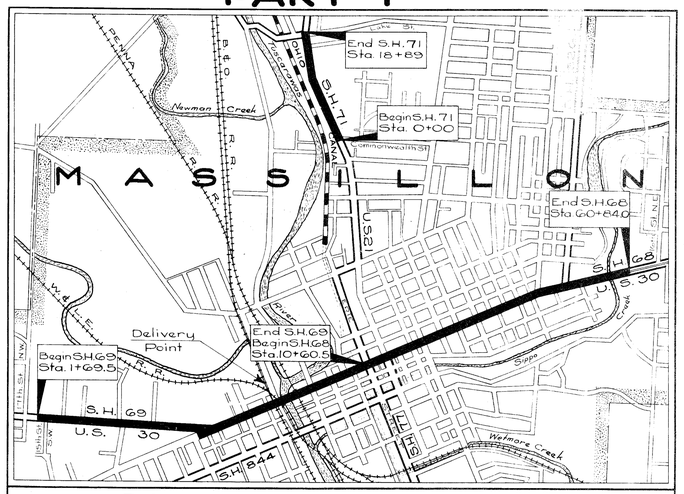
LINE DATA

S.H. 69 MASSILLON (PT.)
STA. 1+69.5 (BEGIN) TO STA. (43+31.0 = STA. 0-597.7) = 4161.5 L.F.
STA. 0-597.7 TO STA. 10+60.5 = 1658.2 L.F.
GROSS LENGTH 5,819.7 L.F.
DEDUCTIONS: RAILROADS AND BR. & APPROACHES
STA. 42+18 TO STA. 42+27 = 9 L.F. STA. 42+31.5 TO STA. 42+40.5 = 9 L.F.
STA. 42+90.8 TO STA. 42+99.8 = 9 L.F. STA. 0-597.7 TO STA. 0-283.4 = 314.3 L.F.
STA. 0-278.4 TO STA. 0-269.4 = 9 L.F. TOTAL DEDUCT = 350.3 L.F.
NET LENGTH S.H. 69-MASSILLON (PT.) 5,469.4 L.F.
OR 1.035 MILES

BEGIN S.H. 68-MASSILLON (PT.) STA. 10+60.5
END S.H. 68-MASSILLON (PT.) STA. 60+84.0
GROSS LENGTH 5,023.5 L.F.
ADDITIONS & DEDUCTIONS NONE
NET LENGTH S.H. 68-MASSILLON (PT.) 5,023.5 L.F.
OR 0.951 MILES

BEGIN S.H. 71-MASSILLON (PT.) STA. 0+00.0
END S.H. 71-MASSILLON (PT.) STA. 18+89.0
GROSS LENGTH 1,889.0 L.F.
ADDITIONS & DEDUCTIONS NONE
NET LENGTH S.H. 71-MASSILLON (PT.) 1,889.0 L.F.
OR .357 MILES

TOTAL NET LENGTH PROJECT 12,381.9 L.F.
OR 2.345 MILES



DELIVERY POINT - MASSILLON
AVERAGE HAUL - 0.7 MILE

LOCATION PLAN

Scale - 1" = 1200 Feet

PORTION TO BE IMPROVED
STATE HIGHWAYS
CITY STREETS

SCALES

PLAN	1" = 50'
PROFILE - HORIZONTAL	1" = 50'
PROFILE - VERTICAL	1" = 5'

The Standard Specifications of the State of Ohio, Department of Highways, including changes and Supplemental Specifications listed in the proposal shall govern this improvement.

I hereby approve these plans and declare that the making of this improvement will not require the closing to traffic of the highway.
See Traffic Note Sheet No. 2.

The Right of Way necessary for this improvement will be provided by the State of Ohio.

Approved _____
Date _____ Division Deputy Director

Approved _____
Date _____ Chief Engineer, Bureau of Maintenance

Approved _____
Date _____ Chief Engineer, Bureau of Bridges & R.R. Crossings

Approved _____
Date _____ Chief Engineer, Bureau of Location & Right of Way

Approved G. P. Hogue
Date 5-10-44 First Ass't. Director & Chief Engineer

Approved R. S. Stam
Date 5-10-44 Director of Highways

STANDARD DRAWINGS	
DRAWING No.	DATE
G-7.07	6-1-42

SUPPLEMENTAL SPECIFICATIONS	
SPECIFICATION No.	DATE
NONE	

FILE No.	
	STARK COUNTY S.H. 69, 68, & 71
	SEC. MASSILLON (PT.)
	DATE OF LETTING ..... 194..
	CONTRACT NO.

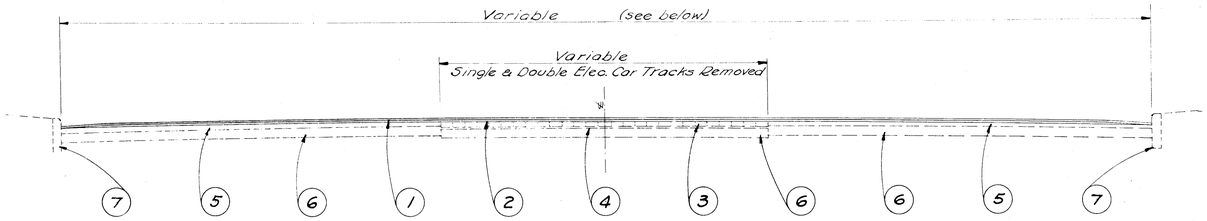
FED. RD. DIST. NO.	STATE	PROJECT	FISCAL YEAR	2/13
10	OHIO		1944	

STARK COUNTY
S.H.69-MASSILLON (PT)
S.H.68-MASSILLON (PT)
S.H.71-MASSILLON (PT)

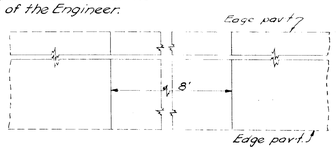
TYPICAL SECTION

TYPE T-35

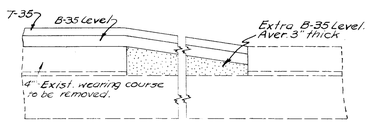
SCALE 1"=3'



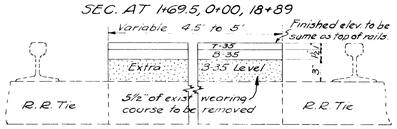
NOTE: Removal of existing wearing course to be performed by the city of Massillon at the direction of the Engineer.



TYPICAL PLAN



SEC. AT 1+69.5, 0+00, 18+89



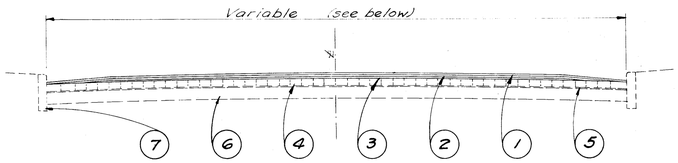
SEC. AT 42+30 & 0-280

DETAIL SHOWING TREATMENT OF EXISTING WEARING COURSE REMOVAL

NOT TO SCALE

1. T-35 1" Asphaltic Concrete Surface Course - Type "B"
2. B-35 1½" Min. Asphaltic Concrete Leveling Course
3. Existing 4" Brick Surface
4. Existing Cushion
5. Existing 3" Sheet Asphalt Surface
6. Existing 6" Concrete Base
7. Existing Curb

STATION			GROSS LENGTH	DEDUCT R.R.	NET LENGTH	AVER. WIDTH
0-283.4	to	0-269.4	14.0	9.0	5.0	64
0-269.4	to	0-200.0	69.4		69.4	65
0-200.0	to	22+40	2440.0		2440.0	66
22+40	to	25+90	350.0		350.0	62
25+90	to	57+34	3144.0		3144.0	50
57+34	to	58+00	66.0		66.0	51
58+00	to	59+00	100.0		100.0	53
59+00	to	60+84	184.0		184.0	55
				TOTAL	6358.4	S.H. 68 & S.H.69 (pt)

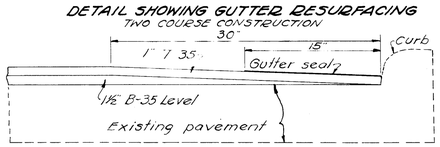


1. T-35 1" Asphaltic Concrete Surface Course - Type "B"
2. B-35 1" Asphaltic Concrete Leveling Course
3. B-35 ¾" Min. Asphaltic Concrete Leveling Course
4. Existing Brick Surface
5. Existing Cushion
6. Existing Concrete Base
7. Existing Curb

STATION			GROSS LENGTH	DEDUCT R.R.	NET LENGTH	AVER. WIDTH	
1+69.5	to	31+64	2994.5		2994.5	32	S.H.69
31+64	to	43+31	1167.0	27	1140.0	46	S.H.69
0+00	to	18+89	1889.0		1889.0	32	S.H.71
				TOTAL	6023.5		

DETAIL SHOWING GUTTER RESURFACING

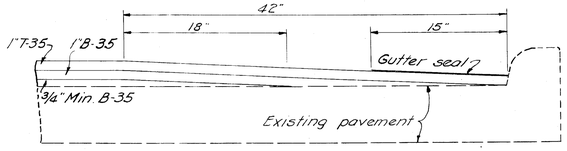
TWO COURSE CONSTRUCTION



NOTE: Special care shall be exercised during construction to obtain maximum compaction of bituminous concrete in all gutters.

DETAIL SHOWING GUTTER RESURFACING

THREE COURSE CONSTRUCTION



NOTE: Special care shall be exercised during construction to obtain maximum compaction of bituminous concrete in all gutters.

DEDUCTION FOR B-35

1" B-35 Level $[(\frac{2.0+0.0625}{2})\div 27]\times 2 = 0.0062 \times 6023.5 =$ 37.3 C.Y.

¾" min. B-35 $[(\frac{3.5+2.0}{2}\times 0.0625)\div 27]\times 2 = 0.0127 \times 6023.5 =$ 76.5 C.Y.

TOTAL 113.8 C.Y.

Deduction for B-35 $[(\frac{0.1250\times 2.5}{2})\div 27]\times 2 = 0.0116$ C.Y. per L.F.

$0.0116 \times 6348.9 = 73.6$ C.Y.

GENERAL NOTES

TRAFFIC:
Traffic shall be maintained at all times. The length of one way traffic zones shall be kept to a minimum consistent with the requirements of Sec. T-35.23. The item of "Maintaining traffic" shall include furnishing lights, signs, barricades and watchmen necessary to secure the flow of traffic twenty-four (24) hours daily.

PROFILE:
The profile of the proposed surface course shall be approximately 2½" and 2¾" above the existing pavement, as shown on the typical sections.

FILLING MAJOR DEPRESSIONS:
Major depressions in existing pavement shall be filled and compacted with bituminous concrete leveling material in advance of placing the regular leveling course. These depressions shall be filled in layers not to exceed 3" in depth when compacted.

RESETTING CASTINGS:
This item shall be performed after completion of the leveling course and prior to placing the surface course. Compaction of the material around castings inaccessable to rollers shall be in accordance with the requirements of Sec. T-50.21. The city of Massillon will adjust all castings to grade.

SEALING EXISTING EDGES
Vertical faces of existing work, such as castings, curbs, etc. against which the new bituminous concrete is to be placed, shall be painted or sealed with bituminous material in accordance with Sec. E-10.02. The cost of such operations and material shall be included in the price bid for bituminous concrete.

TIME INTERVAL BETWEEN PLACING LEVELING AND SURFACE COURSES:
In general no leveling course shall remain without being covered by surface course for more than 72 hours except in municipal construction where the time shall be determined by the Engineer on the basis of incidental construction items.

TREATMENT OF FEATHERED AREA:
Where directed the new surface course shall be feathered. The area upon which less than one (1) inch of surface course is to be placed shall be considered as the area to be feathered. A paint coat of the same bituminous material used in the mix shall be applied to this area before placing the bituminous concrete surface course. If no major area is indicated on the plans at a side approach, sufficient surface course is included to feather the main pavement two (2) feet laterally. The cost of such operation and material shall be included in the unit price bid for asphaltic concrete surface course.

RAILROAD CROSSING:
The new surface course shall be feathered to meet the rail grades if necessary.

GUTTER SEAL:
After placing and compacting the bituminous concrete surface course, the gutter surface shall be sealed with the same bituminous material contained in the mixture. Only enough material shall be applied to coat the surface for a distance of 15" from the curb or 24" wide for a "V" gutter. The material shall be applied by an approved method at a temperature of from 300 deg. F. to 350 deg. F. The cost of such operation and material shall be included in the price bid for bituminous concrete.

EDGE CONSTRUCTION WHERE NO SURFACE WIDENING IS REQUIRED:
No edge forms will be required on this project and the following construction procedure shall be followed wherever the thickness of the new bituminous leveling material requires more than one course. Each course of leveling material below the upper leveling course shall extend outside the edge of the existing pavement a distance equal to the vertical distance from the bottom of that course to the bottom of the upper leveling course.

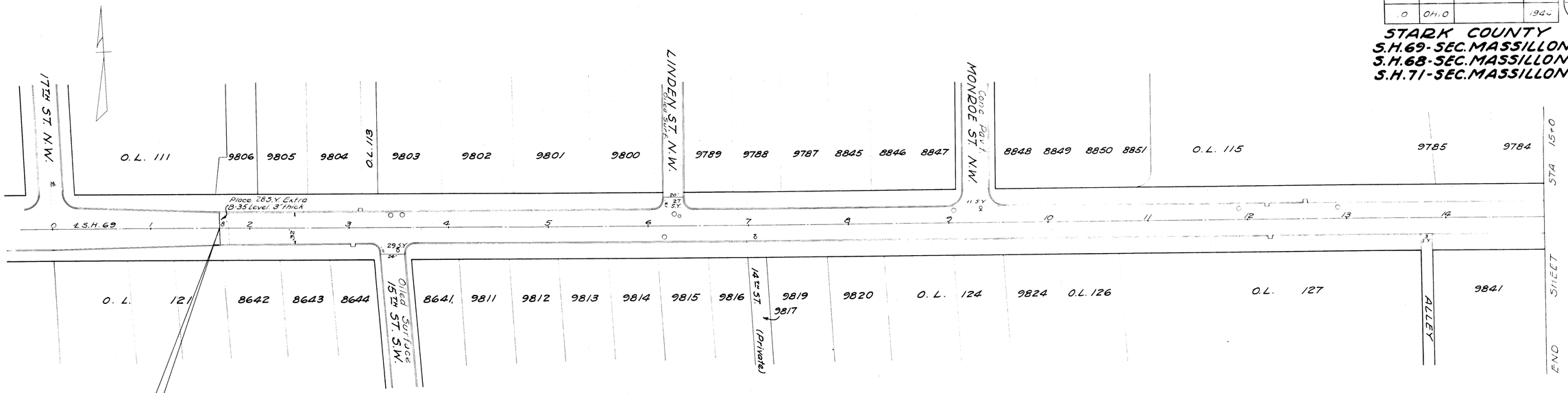
Prior to placing any leveling material outside the edge of the existing pavement, the area of the berm to be covered by the bituminous material shall be prepared in accordance with the requirements of the specifications and adjusted in elevation so that its surface, when compacted will coincide with the plane of the existing pavement surface.

F.B.J.

FED. RD. DIST. NO.	STATE	PROJECT	FISCAL YEAR
0	OH.0		1946

3/13

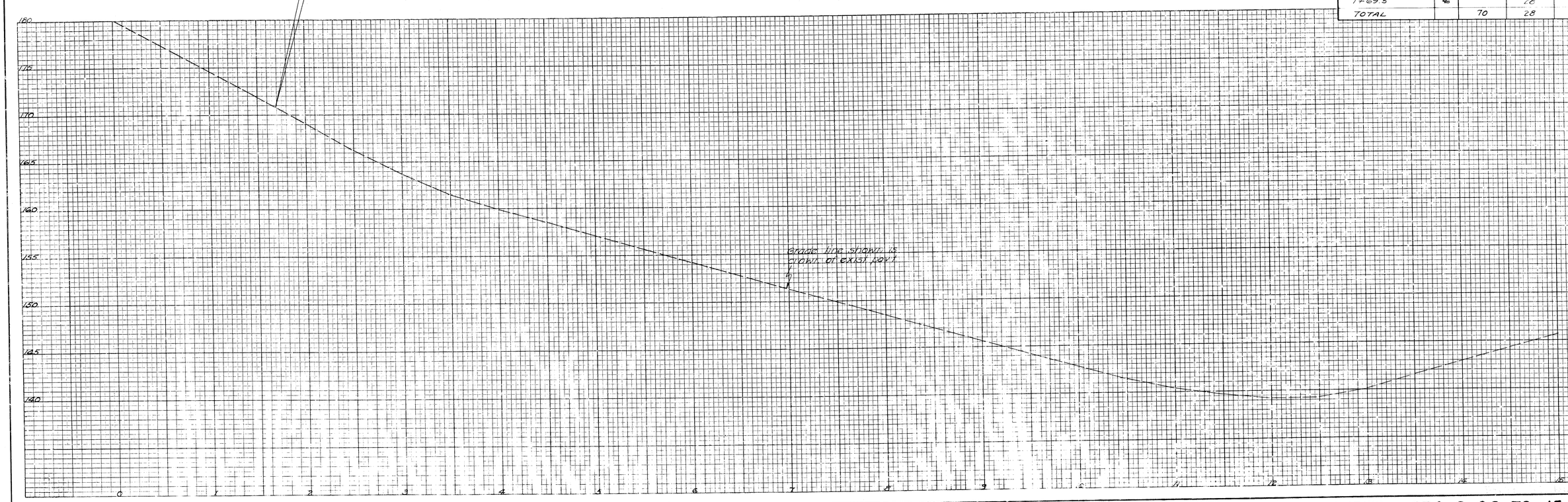
STARK COUNTY
S.H.69-SEC.MASSILLON (PT)
S.H.68-SEC.MASSILLON (PT)
S.H.71-SEC.MASSILLON (PT)



Begin Project
S.H. 69-Massillon (pt)
Sta. 1+69.5

LINCOLN WAY - WEST
U.S.R.30

EXTRA AREAS				
STREET	SIDE	1" T-35 S.Y.	3"-B.35 LEVEL S.Y.	
15TH ST	R	29		
LINDEN ST.	L	27		
MONROE ST	L	11		
ALLEY 13+80	R	3		
1+69.5	⊕		28	
TOTAL		70	28	

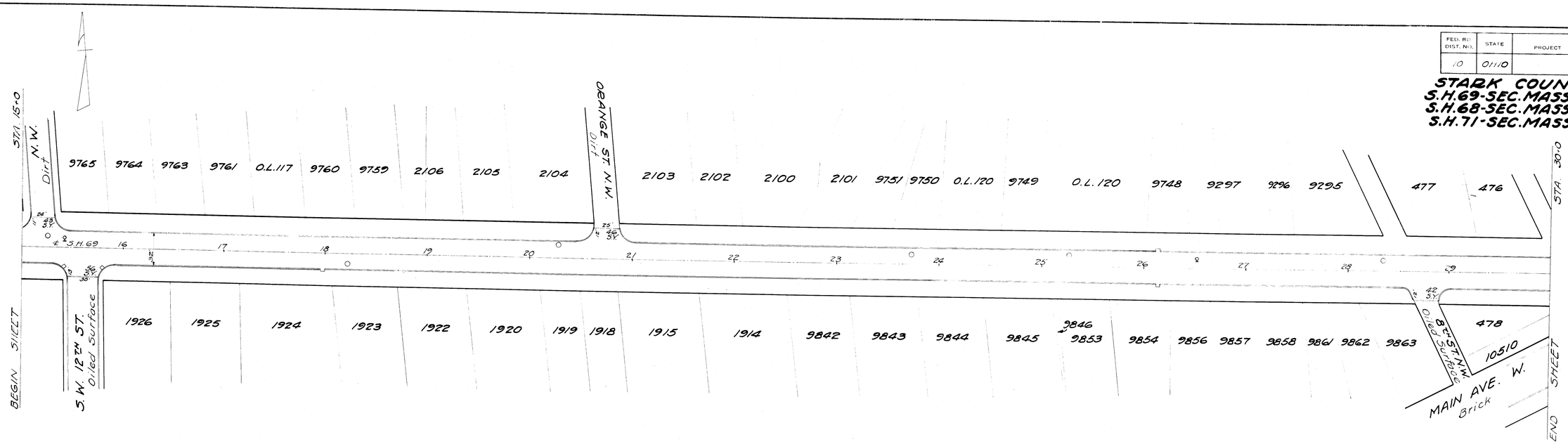


LINE SHEET— STA. 0+00 TO 15+0

FED. RD. DIST. NO.	STATE	PROJECT	FISCAL YEAR
10	01110		1944

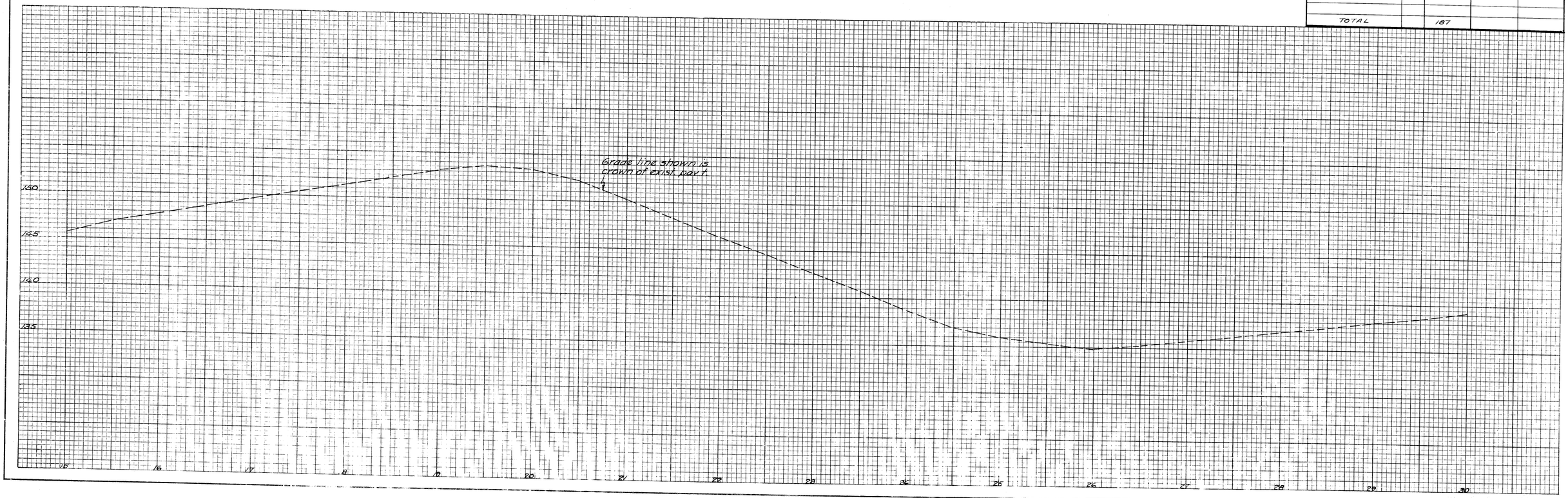
4
13

STARK COUNTY
S.H.69-SEC. MASSILLON (PT)
S.H.68-SEC. MASSILLON (PT)
S.H.71-SEC. MASSILLON (PT)



LINCOLN WAY - WEST
U.S.R. 30

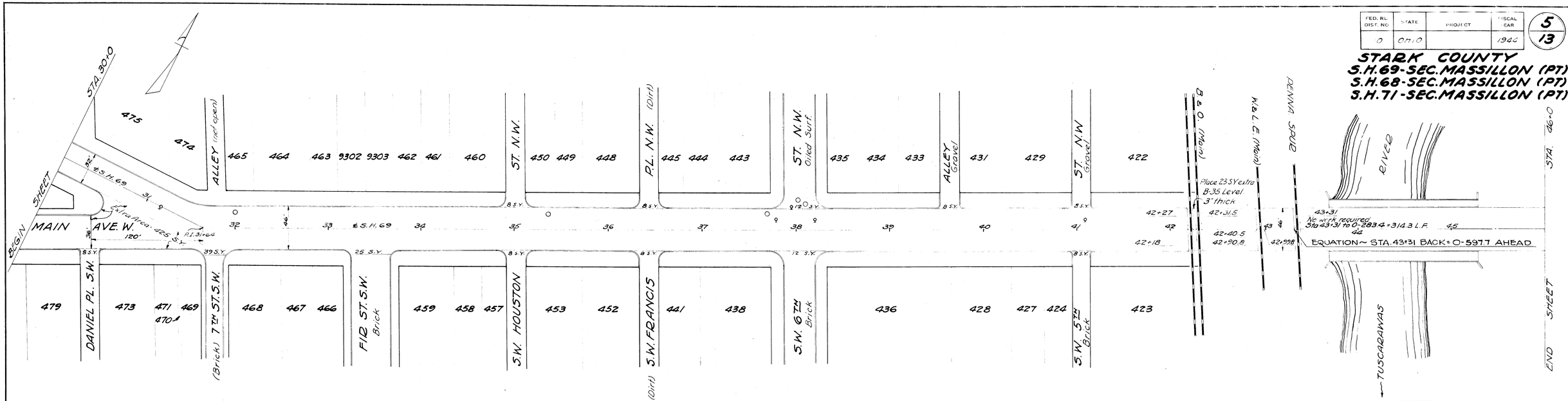
EXTRA AREAS				
STREET	SIDE	1" 7-35 S.Y.		
12TH ST.	L-R	99		
ORANGE ST.	L	46		
8TH ST.	R	42		
TOTAL		187		



FED. RL. DIST. NO.	STATE	PROJECT	FISCAL YEAR
0	OHIO		1946

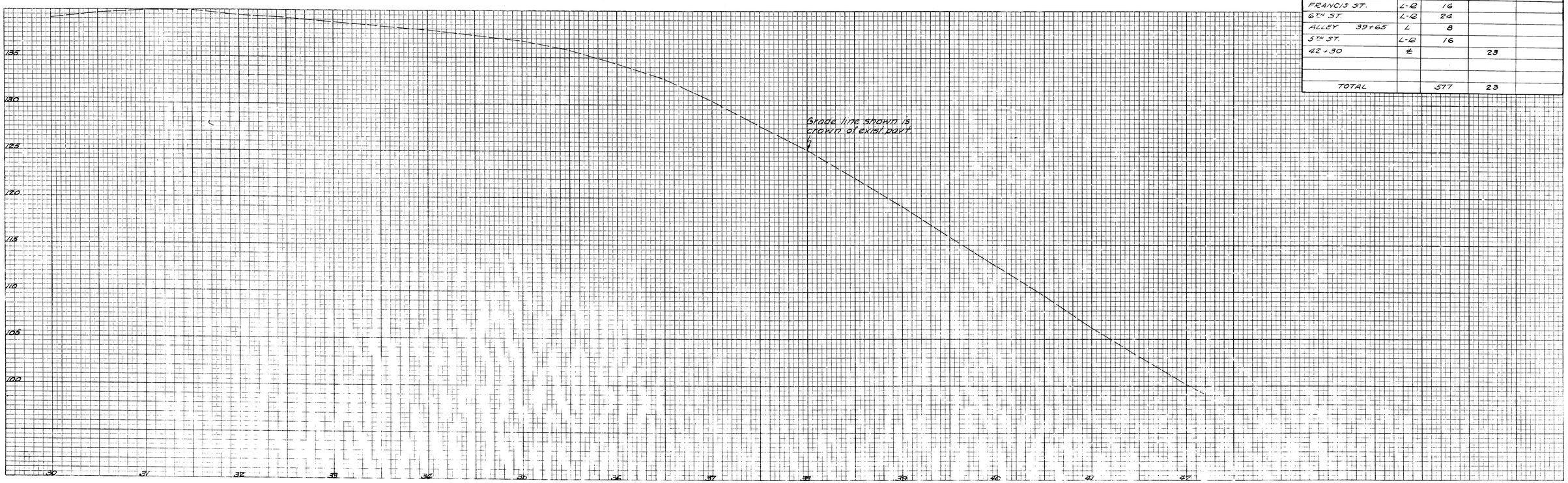
5
13

STARK COUNTY
S.H.69-SEC.MASSILLON (PT)
S.H.68-SEC.MASSILLON (PT)
S.H.71-SEC.MASSILLON (PT)



LINCOLN WAY - WEST
U.S.R. 30

EXTRA AREAS				
STREET	SIDE	1" T-35 S.Y.	3" B-35 LEVEL S.Y.	
MAIN ST.	R	425		
DANIEL PL.	R	8		
7TH ST.	R	39		
FIR ST.	R	25		
HOUSTON ST.	L-R	16		
FRANCIS ST.	L-R	16		
6TH ST.	L-R	24		
ALLEY 39+65	L	8		
5TH ST.	L-R	16		
42+30	℄		23	
TOTAL		577	23	

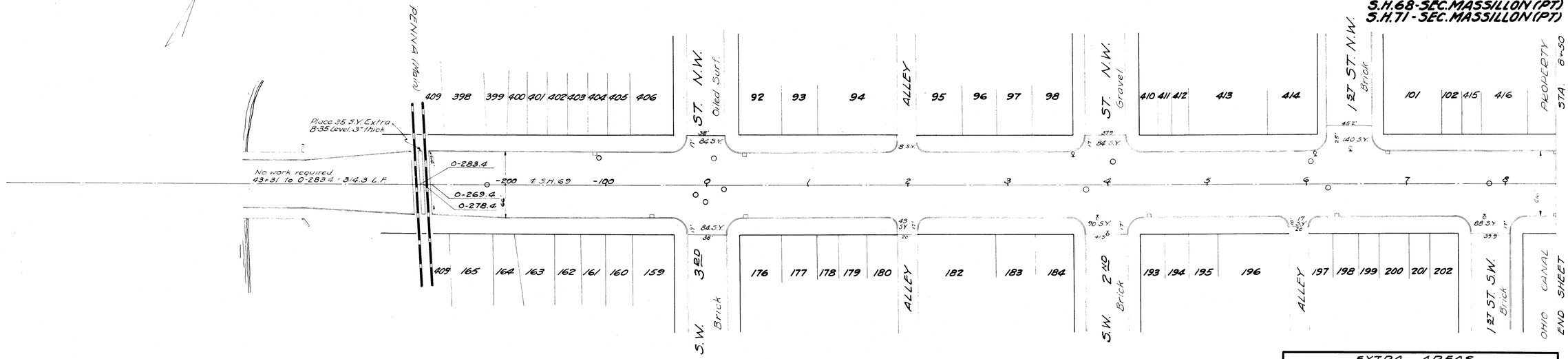


LINE SHEET — STA. 30+0 TO 43+31

FED. RD. DIST. NO.	STATE	PROJECT	FISCAL YEAR
10	01110		1942

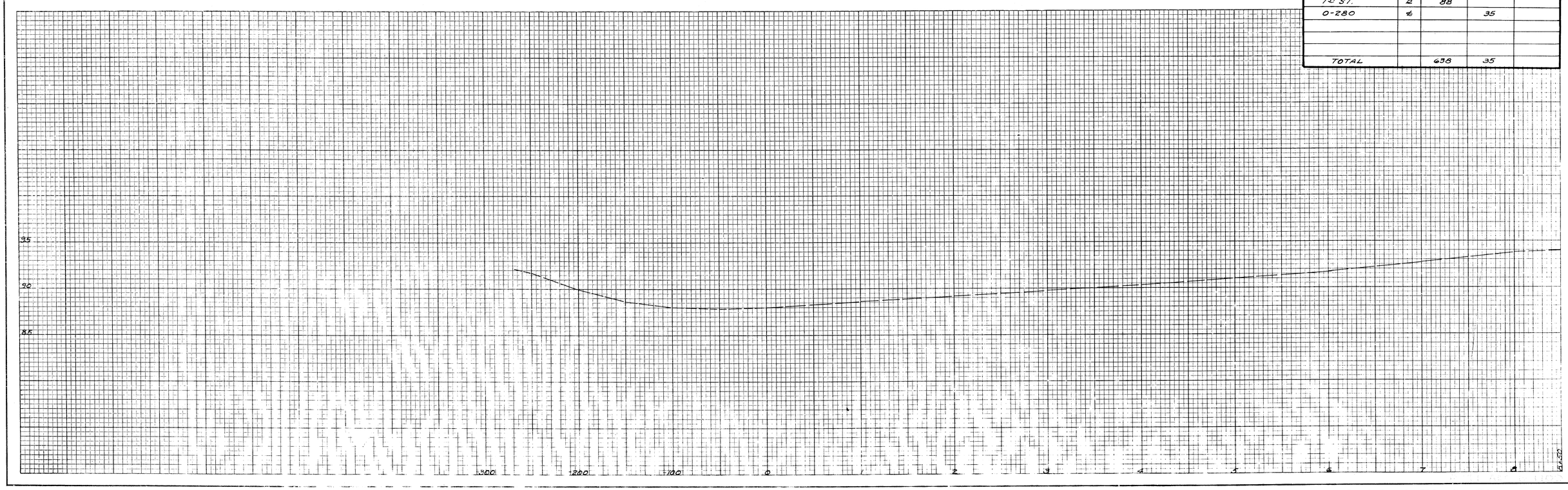
6
13

STARK COUNTY
S.H. 69-SEC. MASSILLON (PT)
S.H. 68-SEC. MASSILLON (PT)
S.H. 71-SEC. MASSILLON (PT)



LINCOLN WAY - WEST
U.S.R. 30

EXTRA AREAS				
STREET	SIDE	1"-T.35 S.Y.	3"B.35 LEVEL S.Y.	
3RD ST	L-R	168		
ALLEY 2+0	R	51		
2ND ST.	L-R	174		
ALLEY 6+0	R	17		
1ST ST.	L	140		
1ST ST.	R	88		
0-280	℄		35	
TOTAL		638	35	

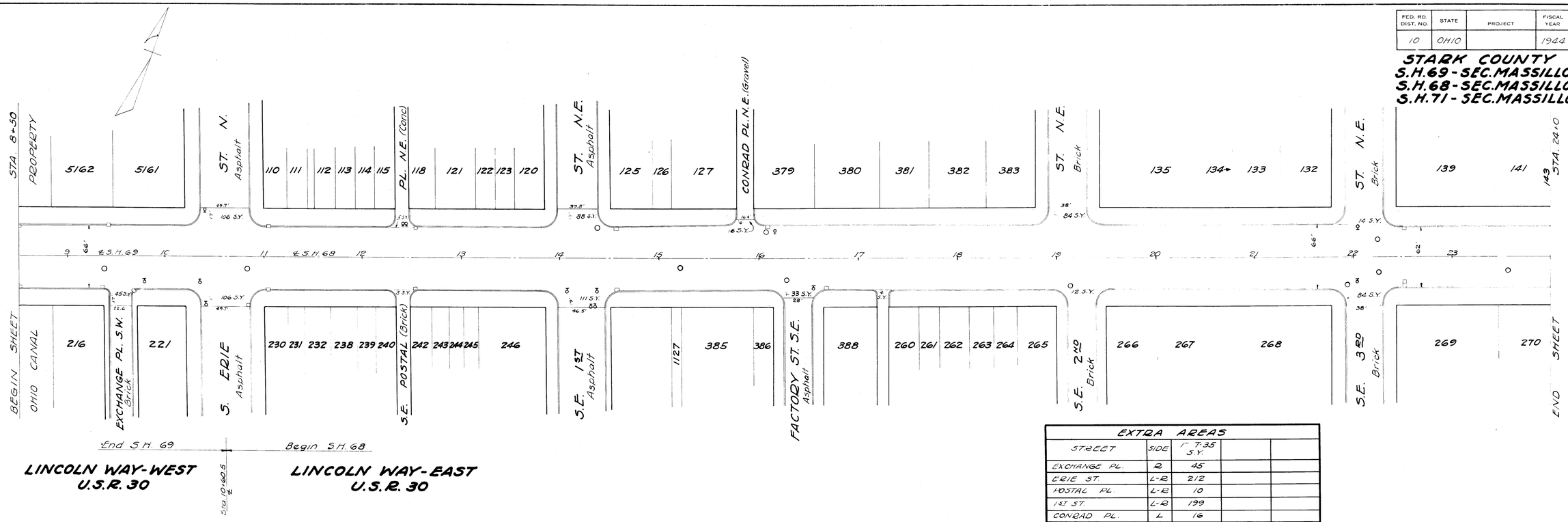


LINE SHEET- STA. 0-283.4 TO 8+50

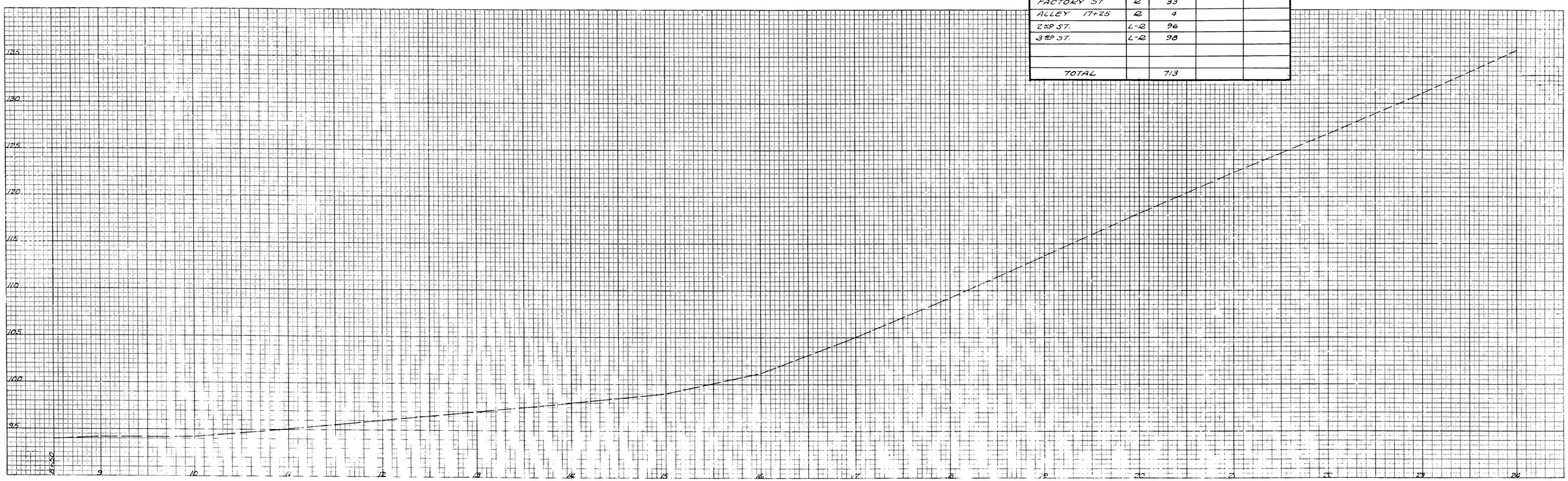
FED. RD. DIST. NO.	STATE	PROJECT	FISCAL YEAR
10	OHIO		1944

7
13

STARK COUNTY
S.H.69 - SEC. MASSILLON (PT.
S.H.68 - SEC. MASSILLON (PT.
S.H.71 - SEC. MASSILLON (PT.



EXTRA AREAS				
STREET	SIDE	1" T-35 S.Y.		
EXCHANGE PL.	R	45		
ERIE ST.	L-R	212		
POSTAL PL.	L-R	10		
1ST ST.	L-R	199		
CONRAD PL.	L	16		
FACTORY ST.	R	33		
ALLEY 17+25	R	4		
2ND ST.	L-R	96		
3RD ST.	L-R	98		
TOTAL		713		

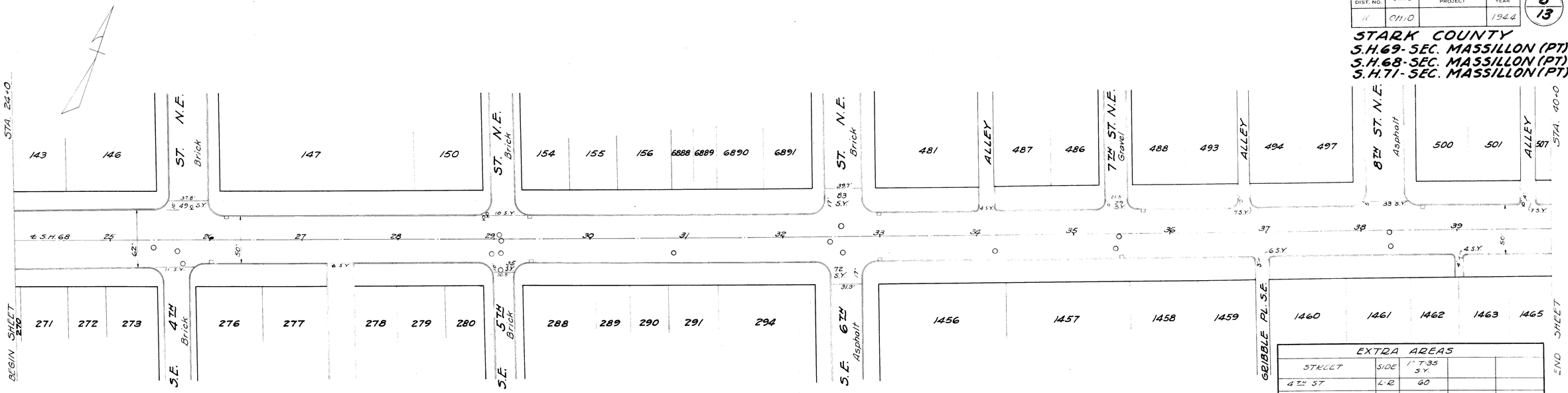


LINE SHEET — STA. 8+50 TO 24+0

FED. RD. DIST. NO.	STATE	PROJECT	FISCAL YEAR
16	OHIO		1944

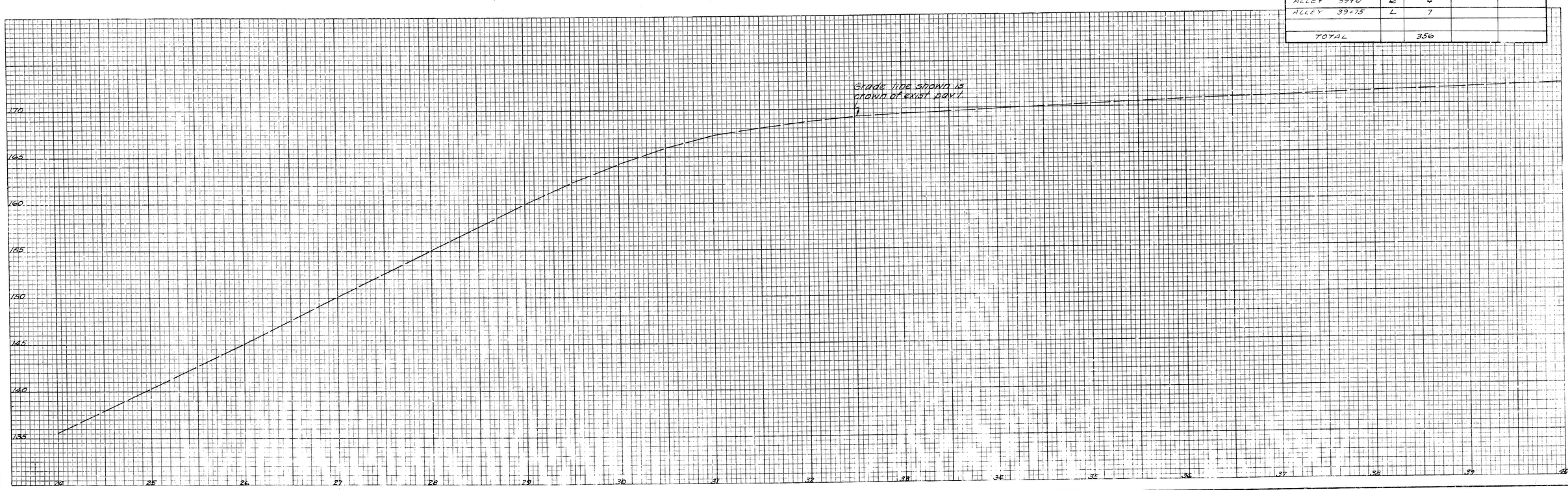
8/13

STARK COUNTY
S.H.69-SEC. MASSILLON (PT)
S.H.68-SEC. MASSILLON (PT)
S.H.71-SEC. MASSILLON (PT)



LINCOLN WAY-EAST
U.S.R.30

EXTRA AREAS				
STREET	SIDE	1" T-35 S.Y.		
4TH ST	L-R	60		
ALLEY 27+40	R	6		
5TH ST.	L-R	45		
6TH ST.	L-R	155		
ALLEY 34+10	L	4		
7TH ST.	L	29		
ALLEY 37+80	L	7		
GRIBBLE PL.	R	6		
8TH ST	L	33		
ALLEY 39+0	R	4		
ALLEY 39+75	L	7		
TOTAL		356		

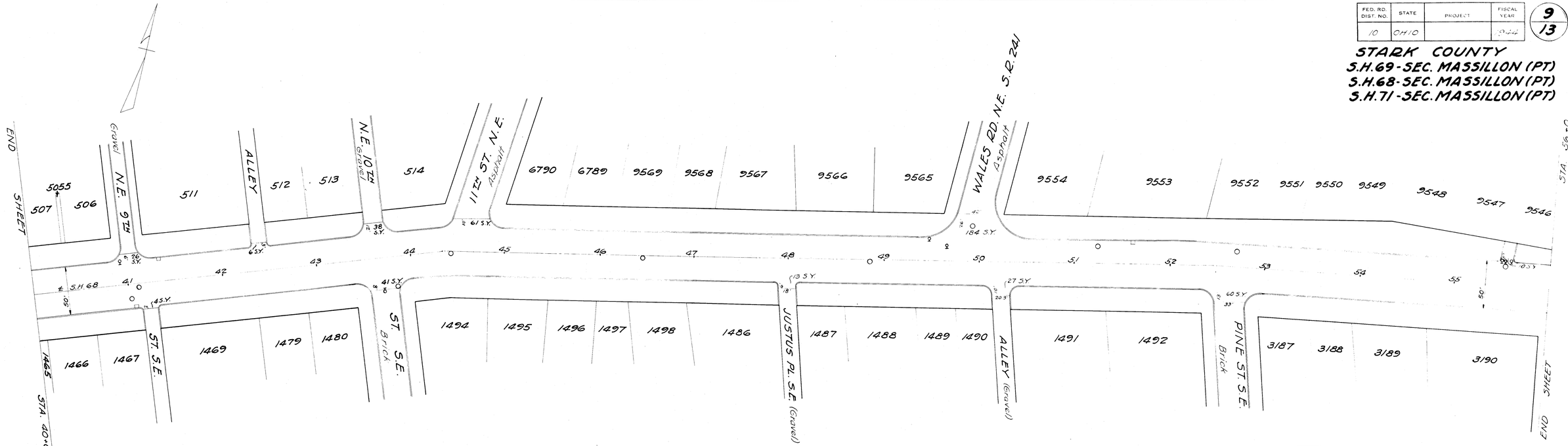


LINE SHEET — STA. 24+0 TO 40+0

FED. RD. DIST. NO.	STATE	PROJECT	FISCAL YEAR
10	OHIO		1944

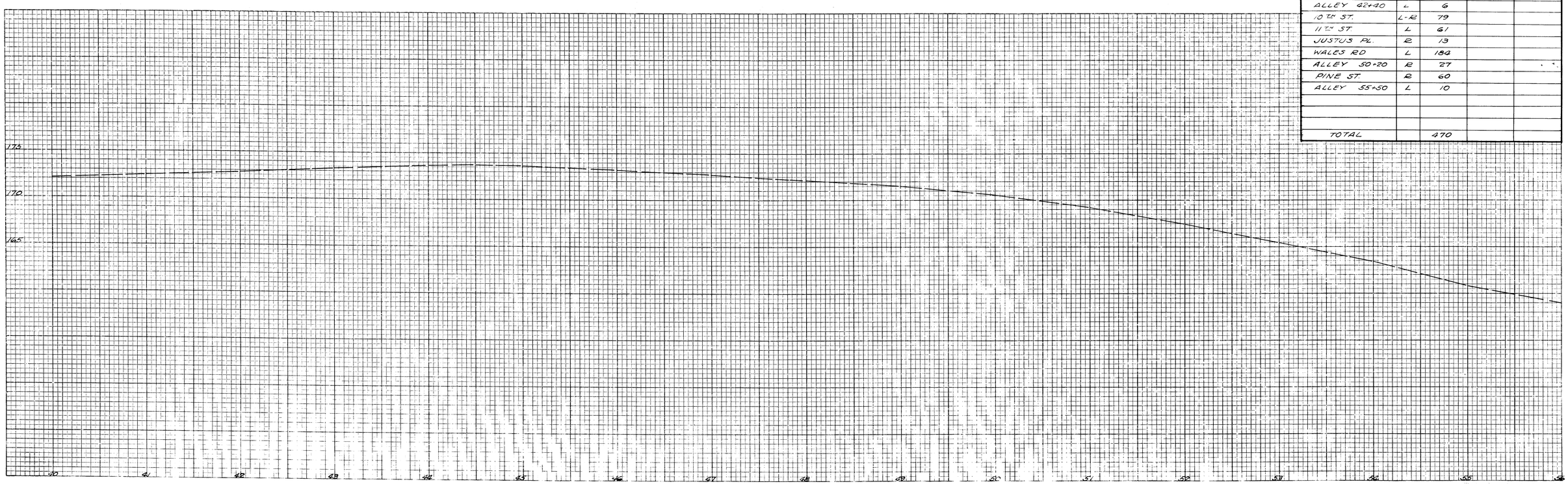
9
13

STARK COUNTY
S.H.69-SEC. MASSILLON (PT)
S.H.68-SEC. MASSILLON (PT)
S.H.71-SEC. MASSILLON (PT)



LINCOLN WAY-EAST
U.S.R. 30

EXTRA AREAS				
STREET	SIDE	1" T-35 S.Y.		
9TH ST.	L-R	30		
ALLEY 42+40	L	6		
10TH ST.	L-R	79		
11TH ST.	L	61		
JUSTUS PL.	R	13		
WALES RD	L	184		
ALLEY 50+20	R	27		
PINE ST.	R	60		
ALLEY 55+50	L	10		
TOTAL		470		

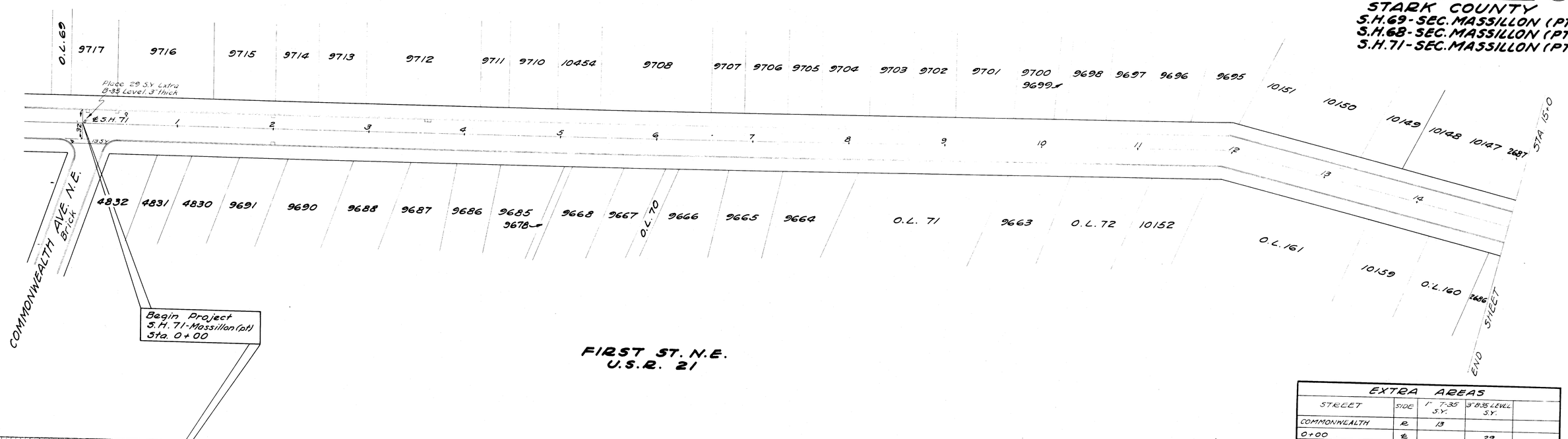


LINE SHEET — STA. 40+0 TO 56+0

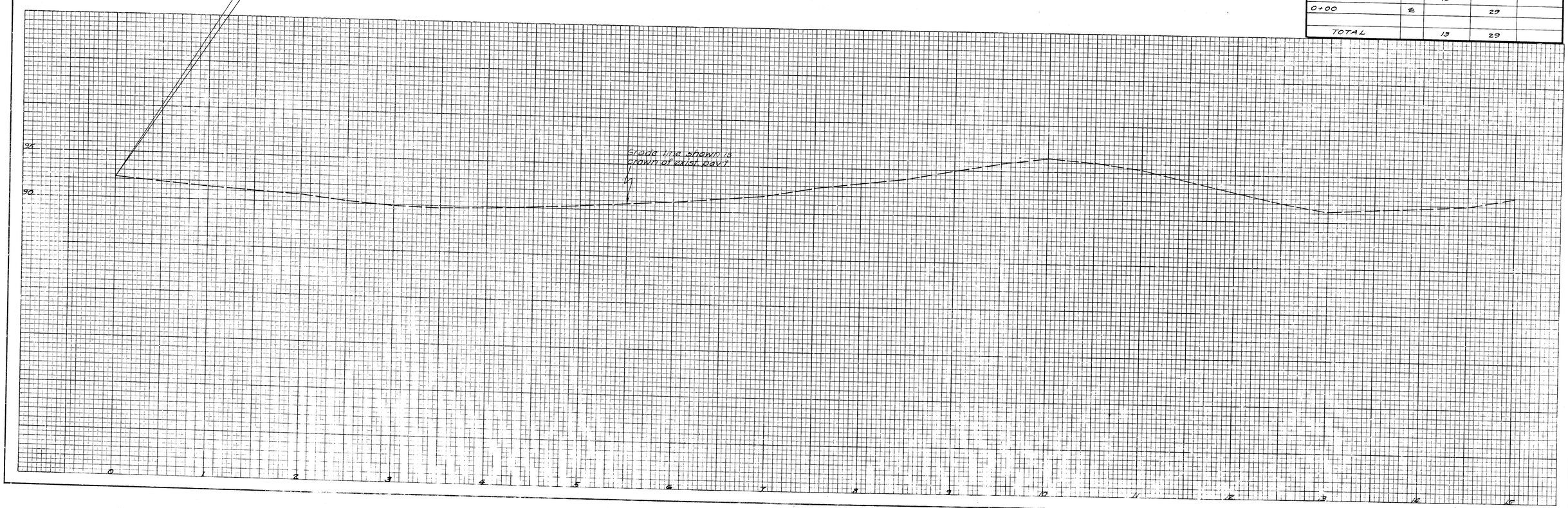
FED. RD. DIST. NO.	STATE	PROJECT	FISCAL YEAR
10	OH. 0		1966

11
13

STARK COUNTY
S.H.69-SEC. MASSILLON (PT)
S.H.68-SEC. MASSILLON (PT)
S.H.71-SEC. MASSILLON (PT)



EXTRA AREAS				
STREET	SIDE	1" T-35 S.Y.	3" B-35 LEVEL S.Y.	
COMMONWEALTH	R	13		
0+00	℄		29	
TOTAL		13	29	



FED. RD. DIST. NO.	STATE	PROJECT	FISCAL YEAR
10	OHIO		1944

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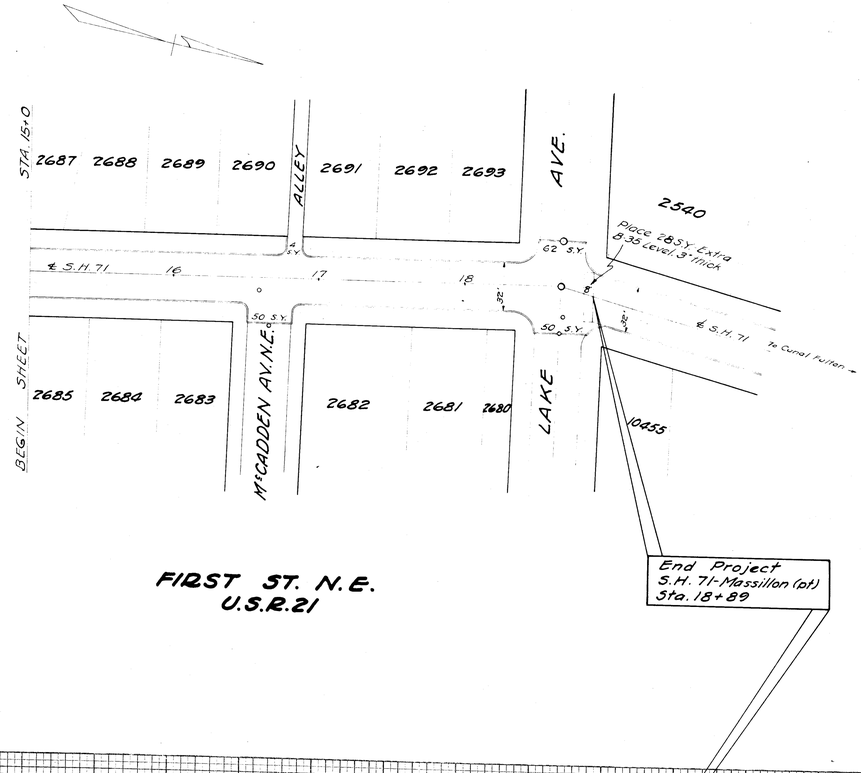
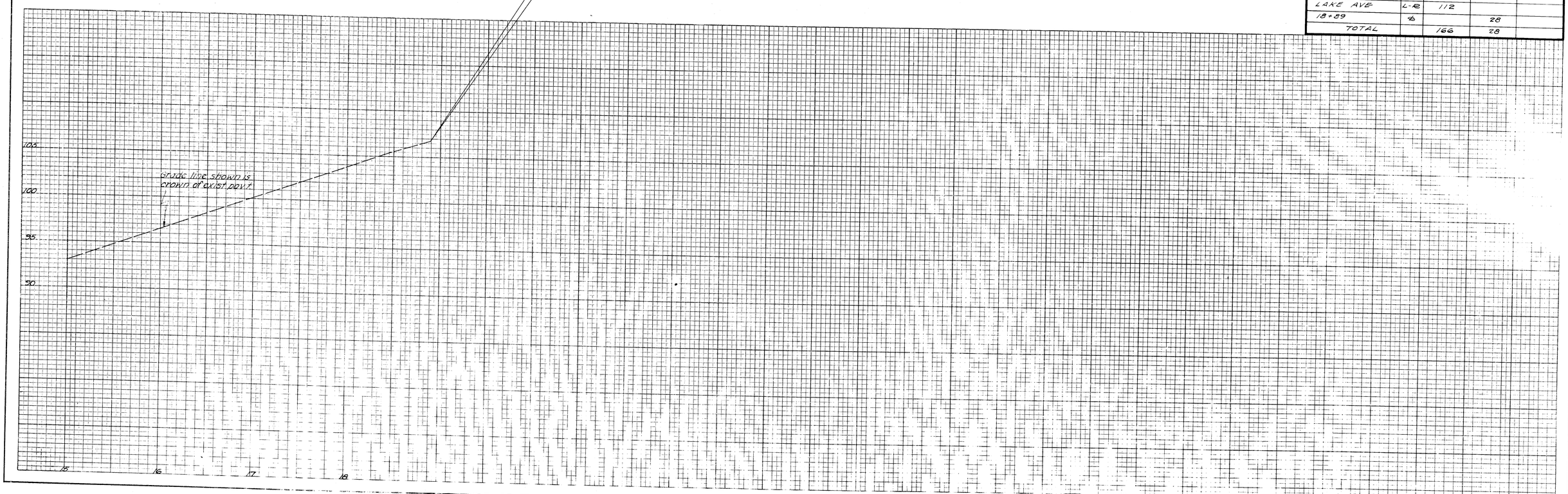
STARK COUNTY
S.H.69-SEC.MASSILLON (PT)
S.H.68-SEC.MASSILLON (PT)
S.H.71-SEC.MASSILLON (PT)



FIRST ST. N.E.
U.S.R.21

EXTRA AREAS				
STREET	SIDE	1" T. 35 S.Y.	3" 8.35 LEVEL S.Y.	
McCADDEN AVE	R	50		
ALLEY 16+85	L	4		
LAKE AVE	L-R	112		
18+89	℄		28	
TOTAL		166	28	



FED. RD. DIST. NO.	STATE	PROJECT	FISCAL YEAR
10	OHIO		1942

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STARK COUNTY
S.H.69 - SEC. MASSILLON (PT)
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CALCULATIONS

T-35 SURFACE COURSE – TYPE "B"

Column Nos. →		1	2	3	4	5	6	7
Station		NET LENGTH	AVERAGE WIDTH	PAVING AREA	SURFACE 1" THICK	EXTRA AREAS AV ½" THICK	EXTRA AREAS AV ½" THICK	TOTAL T-35
From	To	L.F.	L.F.	S.Y.	C.Y.	S.Y.	C.Y.	C.Y.
FORMULA →		From Sht. 2	From Sht. 2	1 x 2 ÷ 9	3 x 1/36	See Line Shts.	5 x 0.5/36	4 + 6
0-283.4	0-269.4	5.0	64	35.6	1.0			1.0
0-269.4	0-200.0	69.4	65	501.2	13.9			13.9
0-200.0	22+40	2440.0	66	17893.4	497.0	1351	18.8	515.8
22+40	25+90	350.0	62	2411.1	67.0	60	0.8	67.8
25+90	57+34	3144.0	50	17666.7	485.2	766	10.6	495.8
57+34	58+00	66.0	51	374.0	10.4			10.4
58+00	59+00	100.0	53	588.9	16.4			16.4
59+00	60+84	184.0	55	1124.4	31.2	16	0.2	31.4
1+69.5	31+64	2994.5	32	10647.1	295.8	257	3.6	299.4
31+64	43+31	1140.0	46	5826.7	161.8	577	8.0	169.8
0+00	18+89	1889.0	32	6716.4	186.6	179	2.5	189.1
SUB-TOTALS				63585.5	1766.3	3206	44.5	1810.8
ADDITIONS OR DEDUCTIONS								NONE
TOTAL T-35								1810.8

B-35 LEVELING COURSES

		8	9	10	11	12	13	14	15	16	17
		B-35 EXTRA LEVELING				3/4" MIN.	1½" MIN.	1" LEVEL.	EXTRA AREAS 3" THICK	EXTRA AREA 3" THICK	TOTAL B-35
		NET LENGTH L.F.	NET LENGTH MILES	CUBIC YARDS PER MILE	CU. YDS.	C.Y.	C.Y.	C.Y.	S.Y.	C.Y.	C.Y.
		See below	8-5280	Estimated	9 x 10	3 x 0.75/36	3 x 1.5/36	3 x 1/36	See Line Shts.	15 x 3/36	11+12+13+14+16
		* 0.0	0.000	0	0.0		1.5		35	2.9	4.4
		69.4	0.013	800	10.4		20.9				31.3
		2440.0	0.462	800	369.6		743.6				1115.2
		350.0	0.066	750	49.5		100.5				150.0
		3144.0	0.595	600	357.0		727.8				1084.8
		66.0	0.012	650	7.8		15.6				23.4
		100.0	0.018	650	11.7		24.5				36.2
		184.0	0.034	700	23.8		46.9				70.7
		*2986.5	0.565	250	141.3	221.8		295.8	28	2.3	661.2
		* 1135.5	0.215	375	80.6	121.4		161.9	23	1.9	365.8
		* 1873.0	0.354	250	88.5	139.9		186.6	57	4.8	419.8
SUB-TOTALS					1140.2	483.1	1683.3	644.3	143	11.9	3962.8
DEDUCTION FOR GUTTER (SHEET 2)							113.8 + 73.6				187.4
TOTAL B-35 LEVELING COURSE											3775.4

* Lengths of special treatment areas at Sta. 0-280, 1+69.5, 42+30, 0+00 and 18+89 are deducted for "extra leveling" calculations only. (see sheet 2)

RECAP. OF EXTRA AREAS

STATION FROM	STATION TO	SHEET No.	1" T-35 (½" AVER.) S.Y.	3" B-35 Level S.Y.
0-283.4	0-269.4	6		35
		TOTAL		35
0-200.0	22+40	6	638	
		7	713	
		TOTAL	1351	
22+40	25+90	8	60	
		TOTAL	60	
25+90	57+34	8	296	
		9	470	
		TOTAL	766	
59+00	60+84	10	16	
		TOTAL	16	
1+69.5	31+64	3	70	28
		4	187	
		TOTAL	257	28
31+64	43+31	5	577	23
		TOTAL	577	23
0+00	18+89	11	13	29
		12	166	28
		TOTAL	179	57
TOTAL EXTRA AREAS			3206	143

GENERAL SUMMARY

ITEM	DESCRIPTION	QUANTITY	UNIT
T-35	ASPHALTIC CONCRETE SURFACE COURSE - TYPE "B"	1811	C.Y.
B-35	ASPHALTIC CONCRETE LEVELING COURSE	3775	C.Y.

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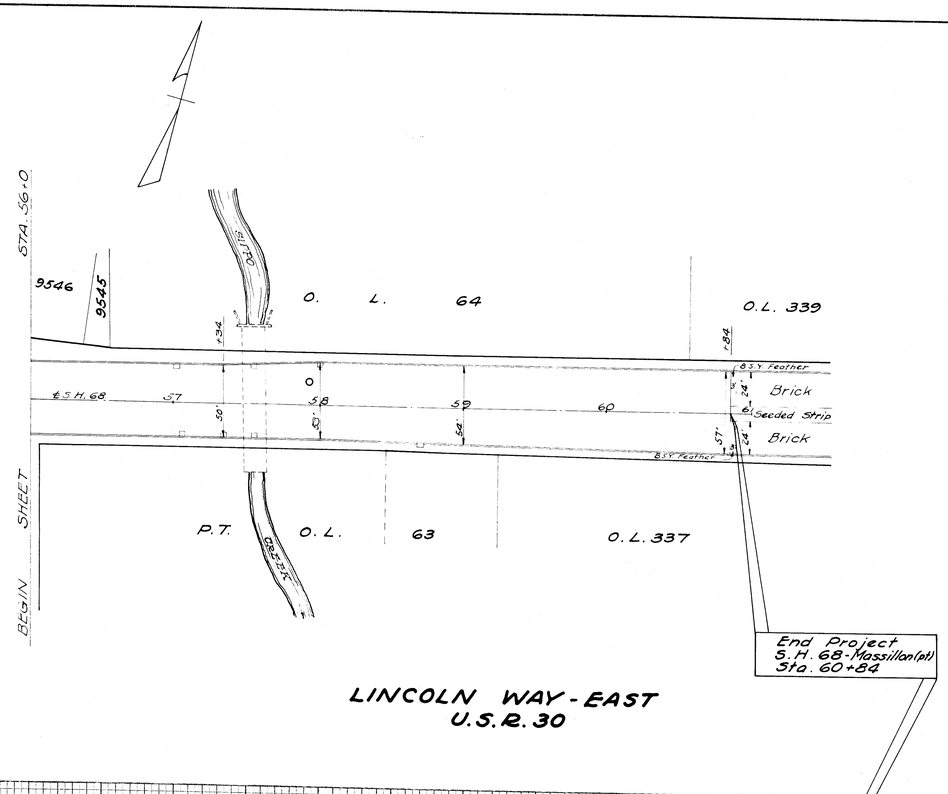
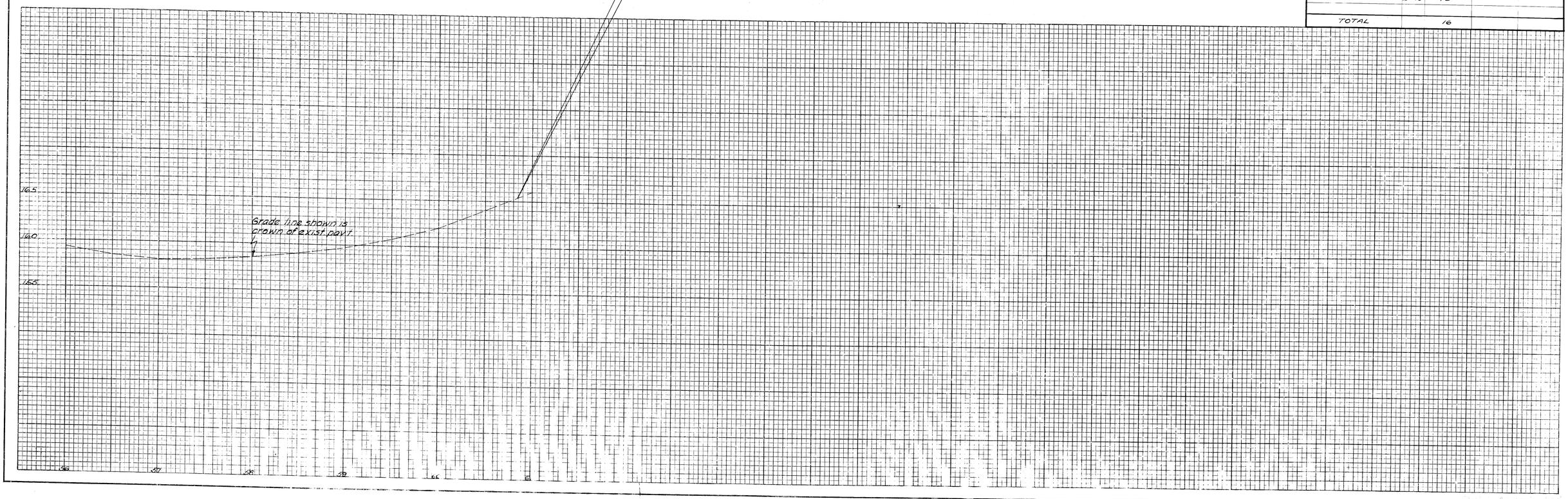
S.H.71-SEC. MASSILLON (PT.)



LINCOLN WAY-EAST
U.S.R. 30

EXTRA AREAS			
STREET	SIDE	1" T-35 S.Y.	
60+84	L-R	16	
TOTAL		16