Fed. Road Dist. No.	State	U.S.P.W. Proj. No.	Fiscal Year	Sheet No.	Total Sheets
9	Maine	NRM 257-A	(1935)	1	16

STATE OF MAINE
STATE HIGHWAY COMMISSION

PLAN AND PROFILE
STATE HIGHWAY "E"
AUGUSTA
KENNEBEC COUNTY
U. S. P. W. PROJECT NO. N. R. M. 257-A (1935)

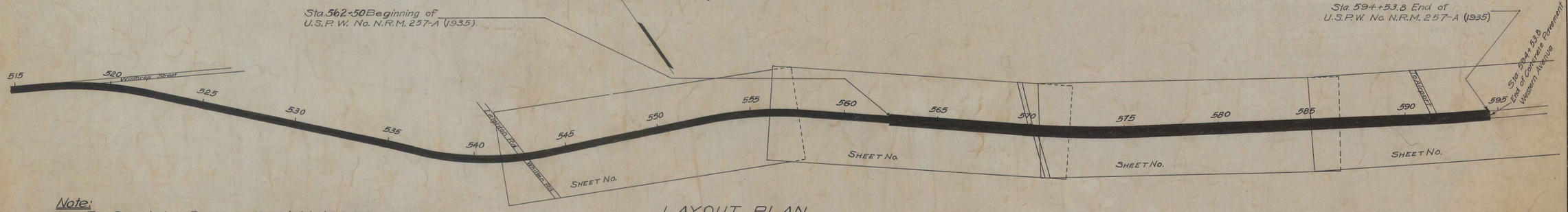
TOTAL LENGTH 0.606 MILES

SCALES
- PLAN 1 IN. = 50 FT.
- PROFILE HOR. 1 IN. = 50 FT.; VER. 1 IN. = 5 FT.
- CROSS SECTIONS 1 IN. = 5 FT.

CONVENTIONAL SIGNS

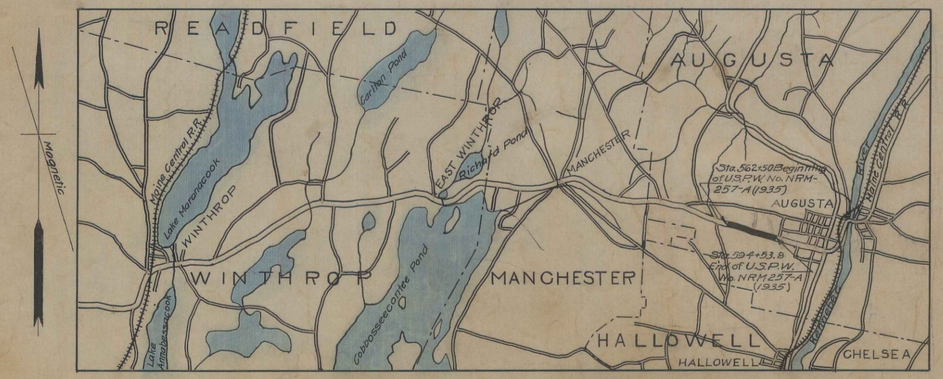
State or National Line		Survey Line	
County Line		Culvert	
Town Line		Drop Inlet	
Unfenced Property		Trolley Pole	
Fence		Power Pole	
Right of Way Line		Tel. Pole	
Traveled Way		Marsh	
Railroad		Trees	
Retaining Wall		Stone Wall	

INDEX OF SHEETS



LAYOUT PLAN
Scale 1 in. = 250 ft.

Note:
The Commission Reserves the right to increase or decrease the length of this project but in no event more than 25% of the originat contract amount.



A PORTION OF KENNEBEC COUNTY
Approx. Scale 1 in = 1 mile

Note:
All work contemplated under this contract to be governed by and in conformity with the specifications adopted March 21, 1932 with all subsequent approved revisions except as modified on these plans.

The above specifications wherein not in conformity with the Federal Governments Rules and regulations for work done under the National Recovery Act relative to the furnishing of all materials by the contractor or otherwise not in conformity therewith are hereby amended to meet said Rules and Regulations of the Federal Government.

APPROVED:
MAINE STATE HIGHWAY COMMISSION

Edward N. Hammond
CHAIRMAN

Paul E. Thurston

Thomas D. Bunny
CHIEF ENGINEER.

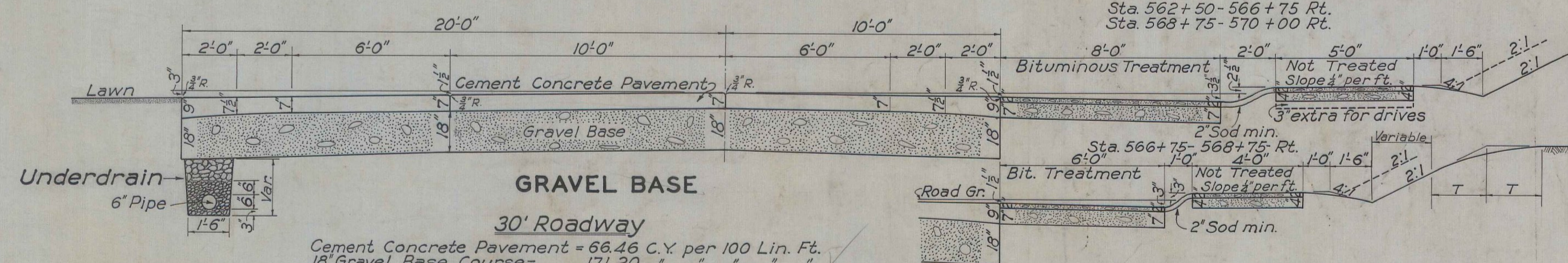
APPROVED:
U. S. BUREAU OF PUBLIC ROADS

[redacted]
DISTRICT ENGINEER

[redacted]
CHIEF ENGINEER

[redacted]
DIRECTOR.

CEMENT CONCRETE PAVEMENT



GRAVEL BASE

30' Roadway

Cement Concrete Pavement = 66.46 C.Y. per 100 Lin. Ft.
18" Gravel Base Course = 171.20 " " " " "

8' Shoulder

2" Gravel Surface Course = 4.94 C.Y. per 100 Lin. Ft.
7" Gravel Base Course = 17.28 " " " " "

5' Sidewalk

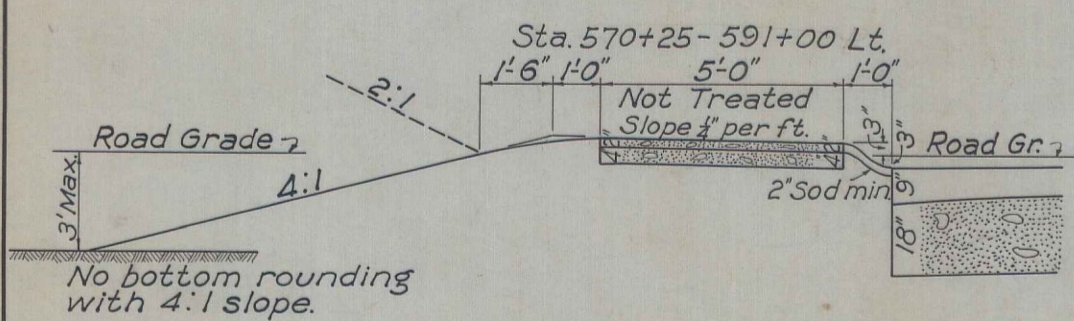
2" Gravel Surface Course = 3.09 C.Y. per 100 Lin. Ft.
4" Gravel Base Course = 6.17 " " " " "
7" " " " = 10.80 " " " " "

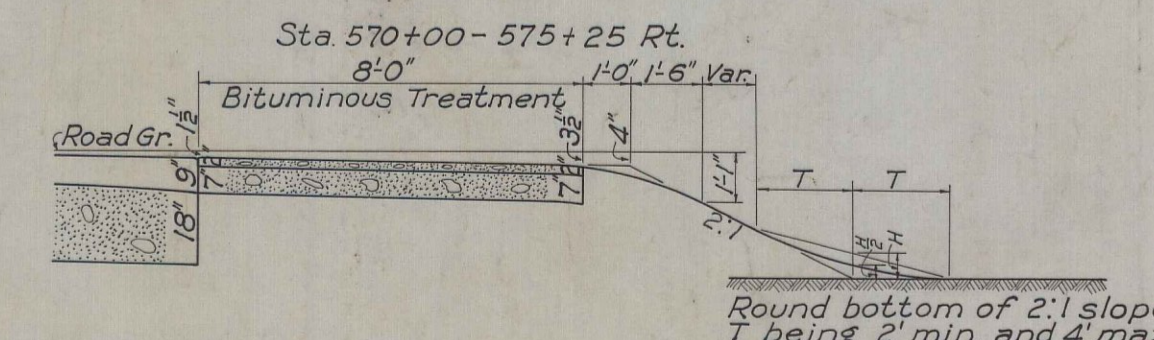
6' Shoulder

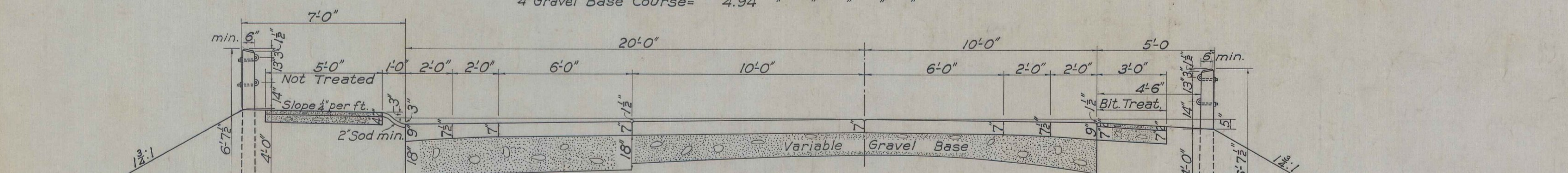
2" Gravel Surface Course = 3.71 C.Y. per 100 Lin. Ft.
7" Gravel Base Course = 12.96 " " " " "

4' Sidewalk

2" Gravel Surface Course = 2.47 C.Y. per 100 Lin. Ft.
4" Gravel Base Course = 4.94 " " " " "





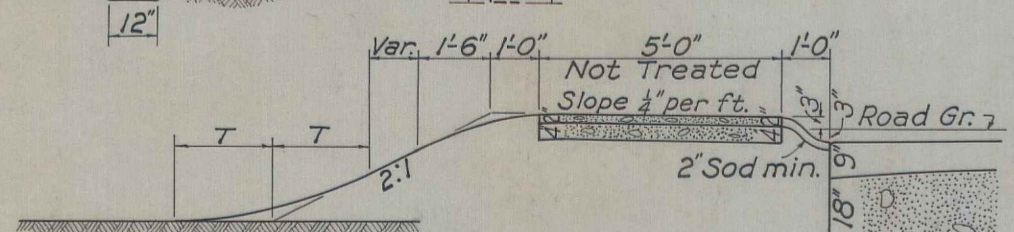


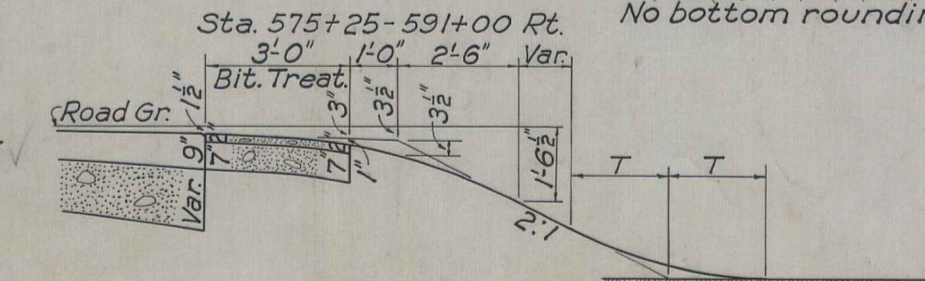
VARIABLE GRAVEL BASE & GUARD RAIL

Over old pavement only
Sta. 576+00 to Sta. 578+00
Sta. 581+50 to Sta. 591+00

Minimum depth of Variable Gravel Base = 2 inches.
Minimum depth of existing surface and base = 24 inches, except 18 inches for 200 feet.

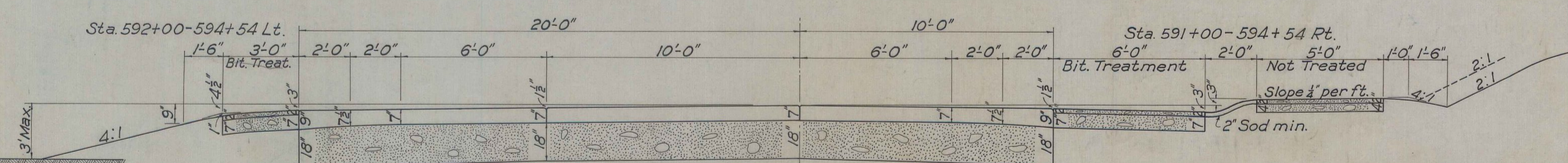
18" Gravel Base Course (under outside slab) = 57.82 C.Y. per 100 L.F.





3' Shoulder

2" Gravel Surface Course = 1.85 C.Y. per 100 Lin. Ft.
7" Gravel Base Course = 6.48 " " " " "



GRAVEL BASE

FED. ROAD DIST. NO.	STATE	U.S.P.W. PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
9	MAINE	N.R.M. 251-A (1935)		2	16

ESTIMATED QUANTITIES

ITEM	DESCRIPTION	QUANT.	UNIT
12-A	Earth Excavation	5,750	Cu.Yds.
12-B	Rock Excavation	10	Cu.Yds.
12-C	Trees Removed	5	Each
13	Excavation for Structures	750	Cu.Yds.
17-A	Common Borrow	500	Cu.Yds.
23	Gravel Base Course	5,550	Cu.Yds.
28	Gravel Surface Course	250	Cu.Yds.
33	Cement Concrete Pavement	2,155	Cu.Yds.
34	Placing Reinf. for Pavement	125,365	Lbs.
37-B	Class "B" Concrete	22	Cu.Yds.
38	Steel Reinf. for Conc. Structures	75	Lbs.
44-A	12" Reinf. Concrete Pipe	438	Lin.Ft.
44-B	15" Reinf. Concrete Pipe	368	Lin.Ft.
44-C	18" Reinf. Concrete Pipe	143	Lin.Ft.
44-D	24" Reinf. Concrete Pipe	56	Lin.Ft.
45-C	12" Vit. Clay Pipe	16	Lin.Ft.
45-D	15" Vit. Clay Pipe	24	Lin.Ft.
45-E	18" Vit. Clay Pipe	74	Lin.Ft.
46-A	Drop Inlets	7	Each
46-B	Catch Basins	7	Each
49	Tile Underdrain	200	Lin.Ft.
50	Cobble Stone Gutter	200	Sq.Yds.
52-A	Wire Cable Guard Rail	745	Lin.Ft.
52-B	Anchorages for W.C.G.R.	8	Each
53	Bituminous Treatment	1,170	Gals.
55	Furnishing & Placing Sod	500	Sq.Yds.

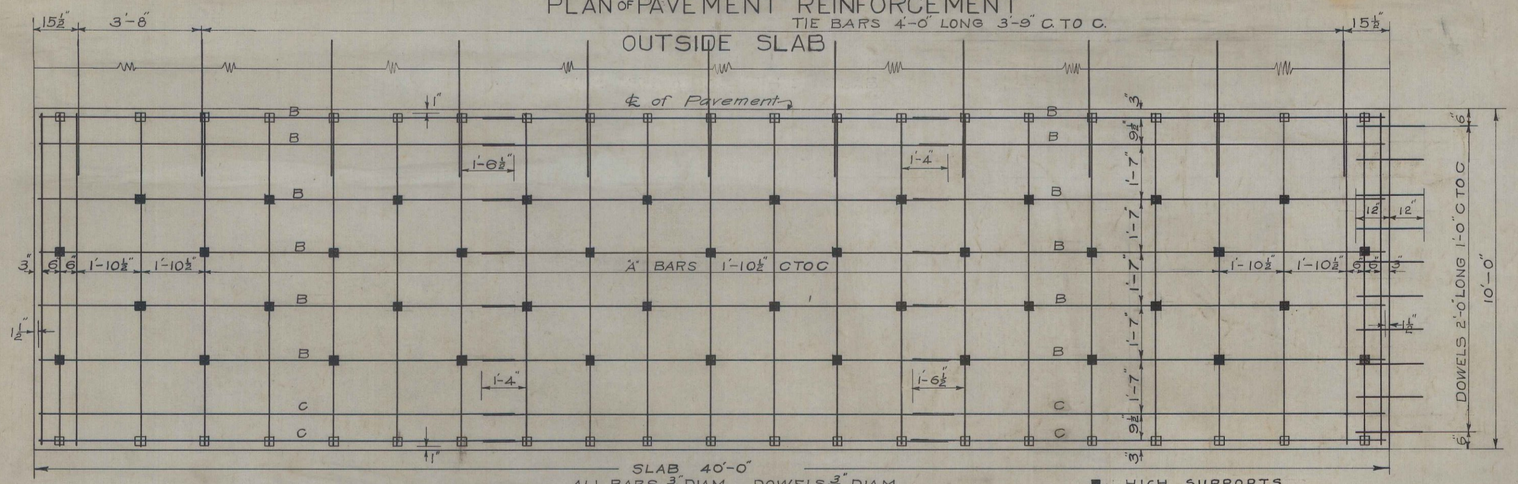
"E" Augusta

FED. ROAD DIST. NO.	STATE	U.S.P.W. FISCAL YEAR	SHEET NO.	TOTAL SHEETS
1	MAINE	N.R.M. 257-A (1935)	3	16

PLAN OF PAVEMENT REINFORCEMENT

TIE BARS 4'-0" LONG 3'-9" C. TO C.

OUTSIDE SLAB

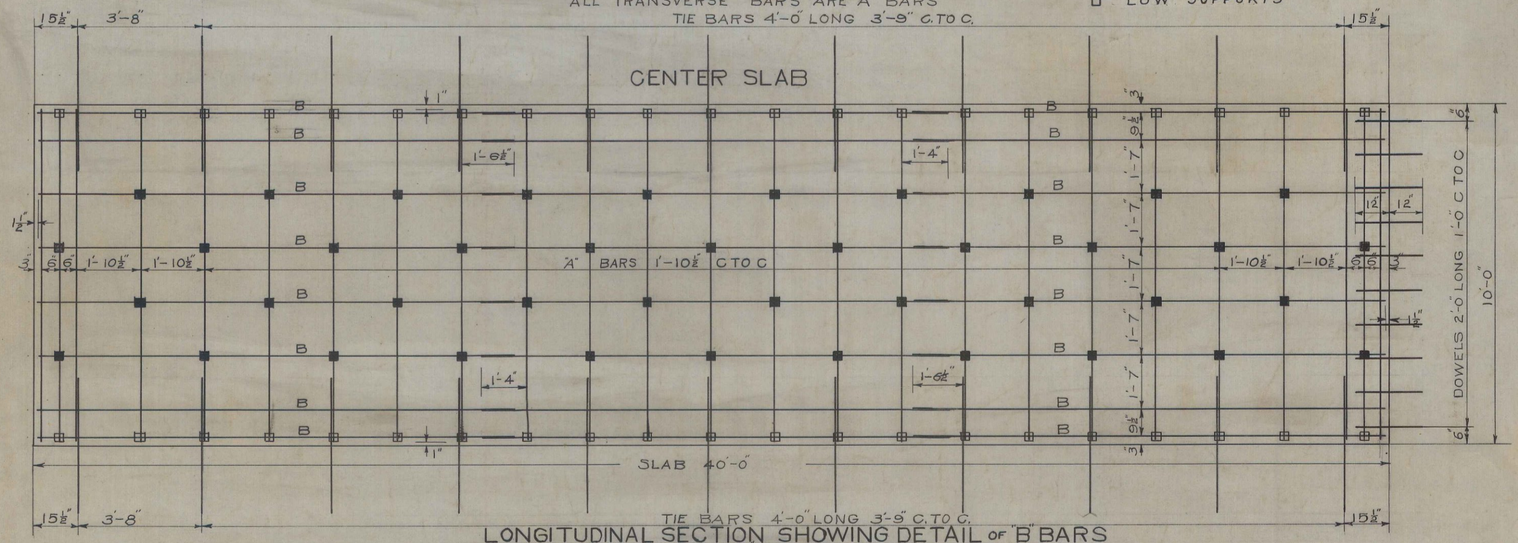


ALL BARS ⅜" DIAM. DOWELS ¾" DIAM.
ALL TRANSVERSE BARS ARE "A" BARS

■ HIGH SUPPORTS
□ LOW SUPPORTS

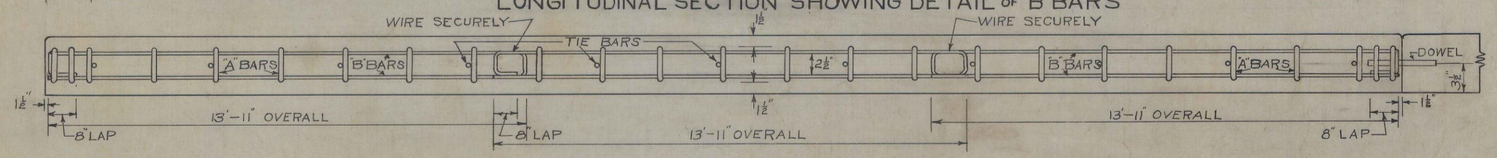
TIE BARS 4'-0" LONG 3'-9" C. TO C.

CENTER SLAB

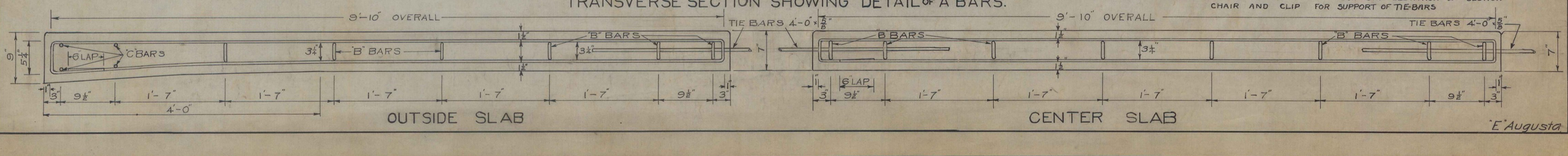


TIE BARS 4'-0" LONG 3'-9" C. TO C.

LONGITUDINAL SECTION SHOWING DETAIL OF "B" BARS

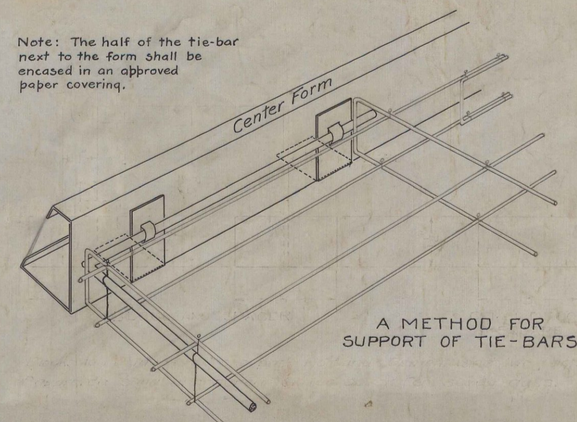


TRANSVERSE SECTION SHOWING DETAIL OF "A" BARS.



OUTSIDE SLAB — CENTER SLAB

Note: The half of the tie-bar next to the form shall be encased in an approved paper covering.



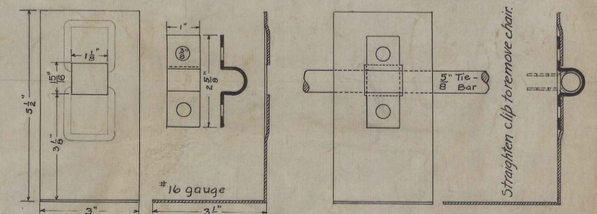
A METHOD FOR SUPPORT OF TIE-BARS

Other types of tie-bar supports may be used if approved by the Engineer.

Dowels must be accurately held in place perpendicular to the plane of the cross-section of the pavement. One half the dowel shall be coated with bituminous material sufficient to break the bond and provided with a 6" approved tight fitting metal cap which will allow an expansion of ¾ of an inch.

REINFORCING DATA

Bars ⅜ Diameter, Plain Steel = 0.376 Lbs. per Lin. Ft.
Dowels ¾ Diameter, Plain Steel = 1.502 Lbs. per Lin. Ft.
Tie Bars ⅝ Diameter Plain Steel = 1.043 Lbs. per Lin. Ft.
"A" Bars Bent 9'-10" overall. Lapped 6" and Wired.
"B" Bars Bent 13'-11" overall. Lapped 8" and Wired.
"C" Bars Straight 13'-11 long. Top and Bottom. Dowels 2'-0 long Tie Bars 4'-0 long
Each Outside 10'×40' Slab contains 25 "A" Bars, 18 "B" Bars, and 12 "C" Bars, made up in 3 sections. Center 10'×40' slab contains 25 "A" Bars, and 24 "B" Bars, made up in 3 sections. Each section to be securely wired before placing.
Each 10'×40' slab contains a minimum of 42 low supports and 42 high supports to support steel.
Total weight of steel incl. Bars, Dowels and Tie-Bars for a 20ft. width pavement 11.418 lbs per Sq. Yd.



DETAIL ELEVATION & SECTION CHAIR AND CLIP

ASSEMBLY ELEVATION & SECTION FOR SUPPORT OF TIE-BARS

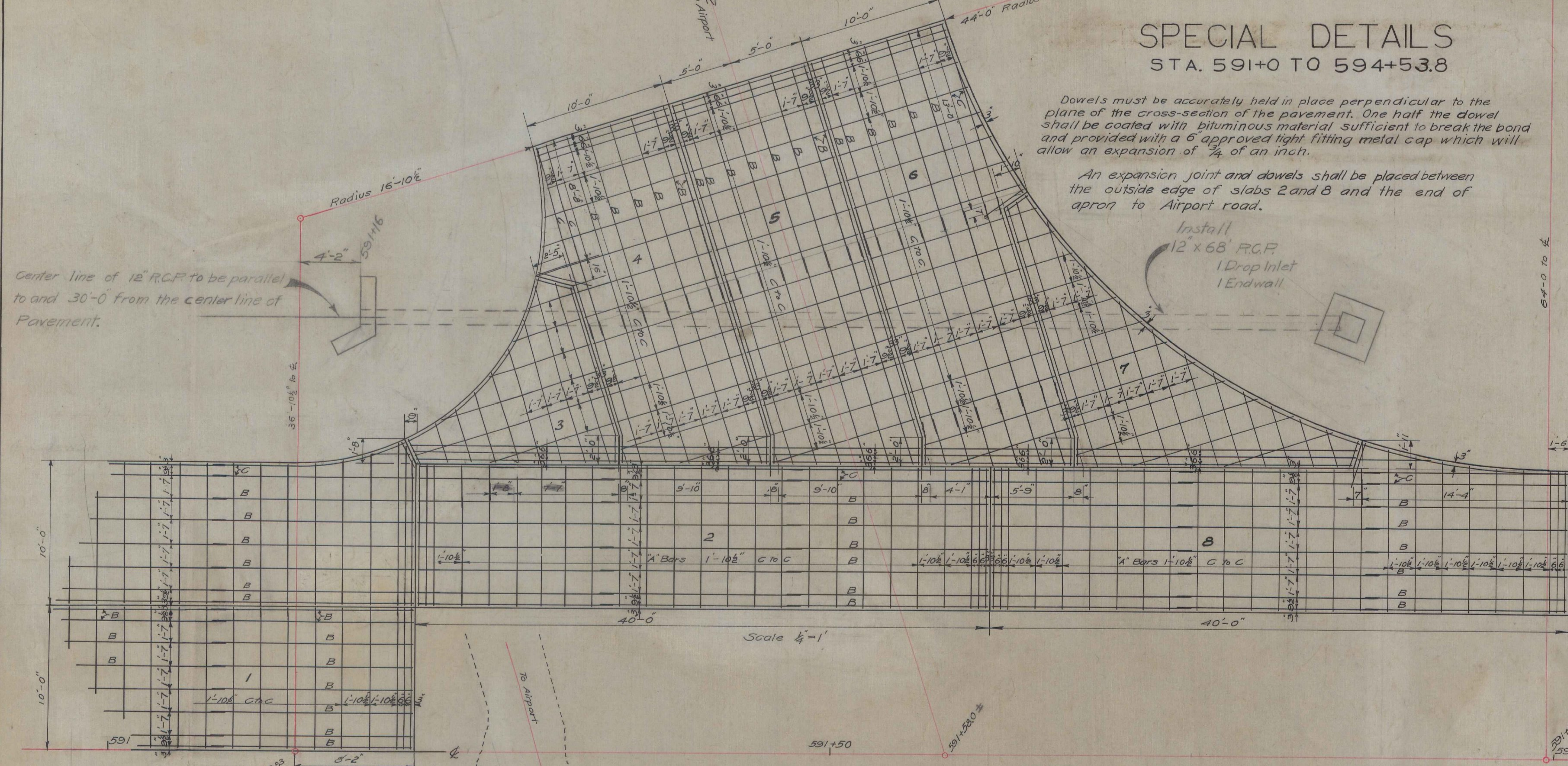
"E" Augusta

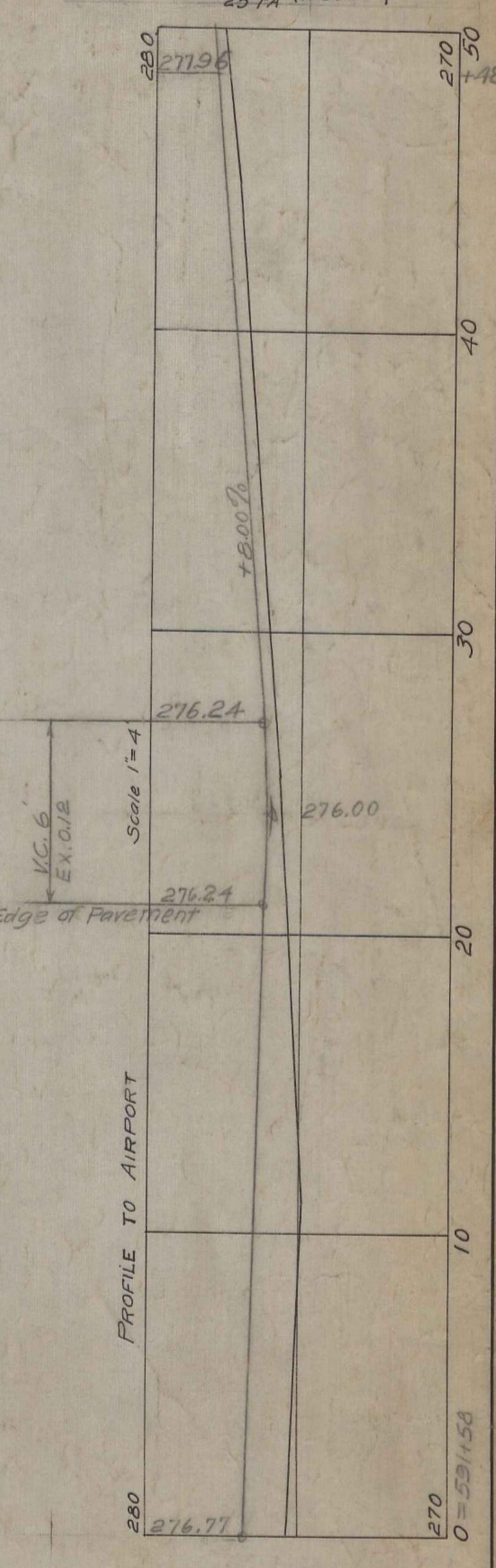
SPECIAL DETAILS

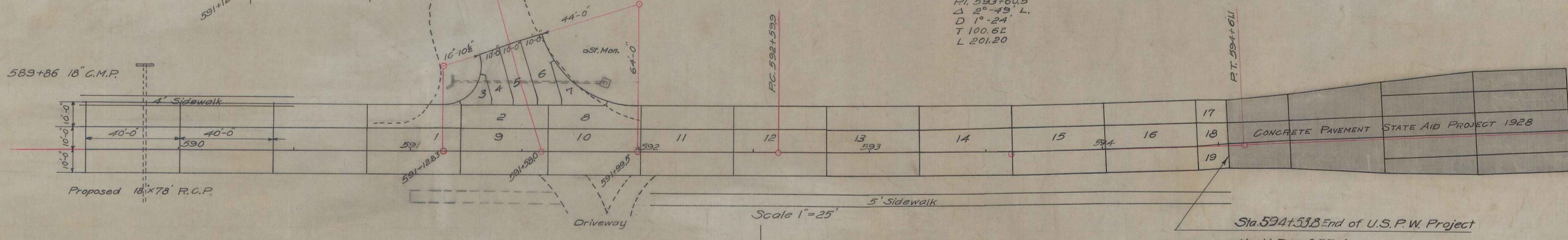
STA. 591+0 TO 594+53.8

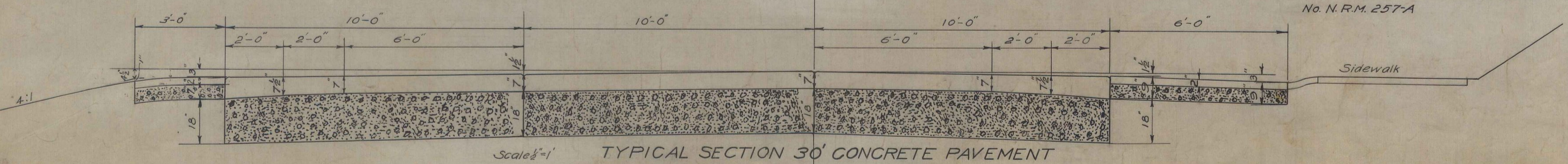
Dowels must be accurately held in place perpendicular to the plane of the cross-section of the pavement. One half the dowel shall be coated with bituminous material sufficient to break the bond and provided with a 6" approved light fitting metal cap which will allow an expansion of ¾ of an inch.

An expansion joint and dowels shall be placed between the outside edge of slabs 2 and 8 and the end of apron to Airport road.



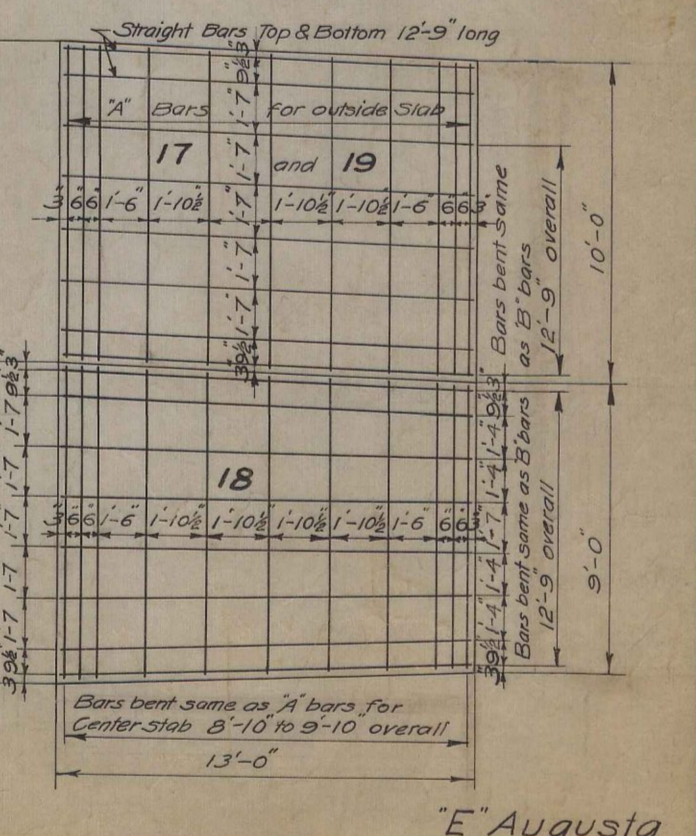






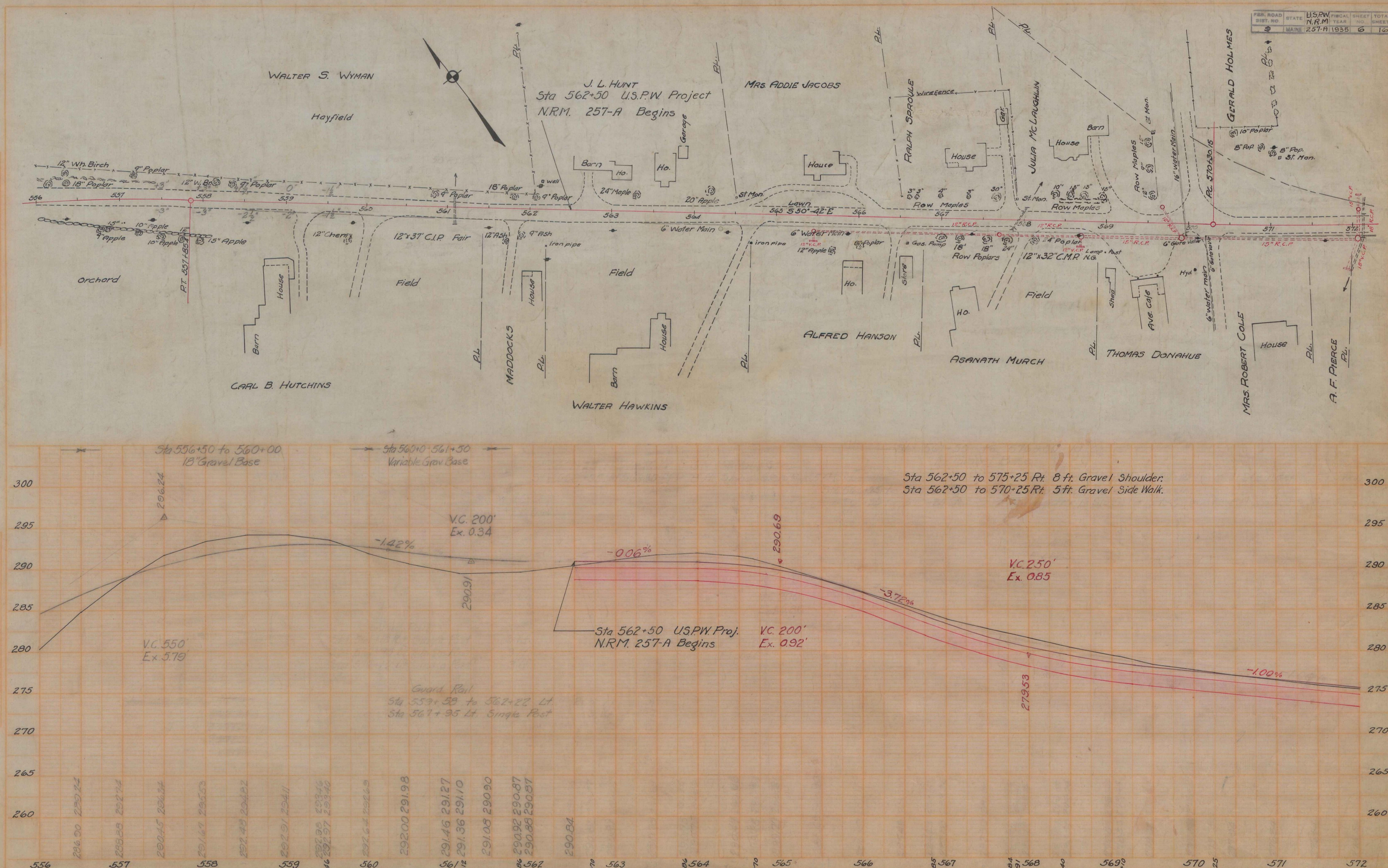
TYPICAL SECTION 30' CONCRETE PAVEMENT

30' Cement Concrete Pavement = 66.46 Cu.Yds. per 100 Lin. Ft.
18" Gravel Base = 171.20 Cu.Yds. per 100 Lin. Ft.



"E" Augusta

FED. ROAD DIST. NO.	STATE	U.S.P.W. N.R.M.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
9	MAINE	257-A	1935	6	16



FED. ROAD DIST. NO.	STATE	U.S.R.W. N.R.M.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
9	MAINE	257-A	1935	7	16

FLORENCE E. GOVE

GERALD HOLMES

Picket Fence

P.I. = 573+04.7
Δ = 6°-34' Lt.
D = 1°-12'
T = 273.92
L = 547.24
E = 7.8
R = 4775.0

P.C. 570+30.15

8" Poplar

8" Poplar St. Mon.

Old Elec. Rd. Bed

1½"x1' S.B.C. N.G.

20"x30' C.I.P.

15" Maple

30"

12" Map.

Shed

Ho.

ELMER FRAIN

P.T. 575+77.39

FRANK S. CARPENTER

Hayfield

2'x2'x50' S.B.C. N.G.

St. Mon.

Side walk - Old Elec. Rd. Bed

2'x2'x60' S.B.C. N.G.

1'x1'x16" W.B.C. N.G.

WILLIAM H. GANNETT

Hayfield

S 57°-16' E

15" Apple

18" Apple

14"x43" C.M.P. N.G.

12" Apple

6" Twin Apple

3-3" Apple

16" Water Main

C.B.

2-9" Willows

24"x100' Tile Good

Hayfield

MRS. ROBERT COLE

House

A.F. PIERCE

12"x40' C.M.P. N.G.

BASIL DAMREN

Ho.

Garage

MAYNARD GRILLEY

Shed

MRS. EDSON LOCKE

Ho.

W. H. GANNETT

Sta 570+50 to 594+54 Lt 5 ft. Gravel Side Walk

Guard Rail

Sta 575+25 Lt., 575+40 Rt. and 591+20 Lt. Single Posts.
Sta 577+70 to 578+58 Lt. Sta 581+30 to 584+10 Lt.
Sta 577+91 to 578+87 Rt. Sta 584+10 to 585+78 Rt.

-1.00%

272.04

V.C. 250'
Ex 0.62'

-2.99%

V.C. 300'
Ex 2.61'

+3.967%

246.71

275 270 265 260 255 250 245 240 235

571 572 573 574 575 576 577 578 579 580 581 582 583 584 585 586

"E" Augusta

FED. ROAD DIST. NO.	STATE	U.S.P.W. N.R.M.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
9	MAINE	257-A	1935	8	16