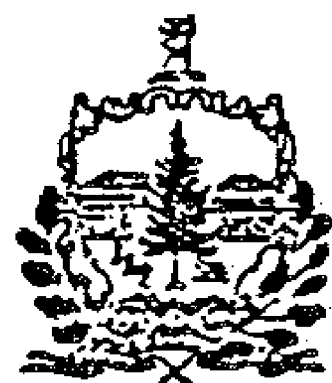


STATE OF VERMONT  
AGENCY OF TRANSPORTATION



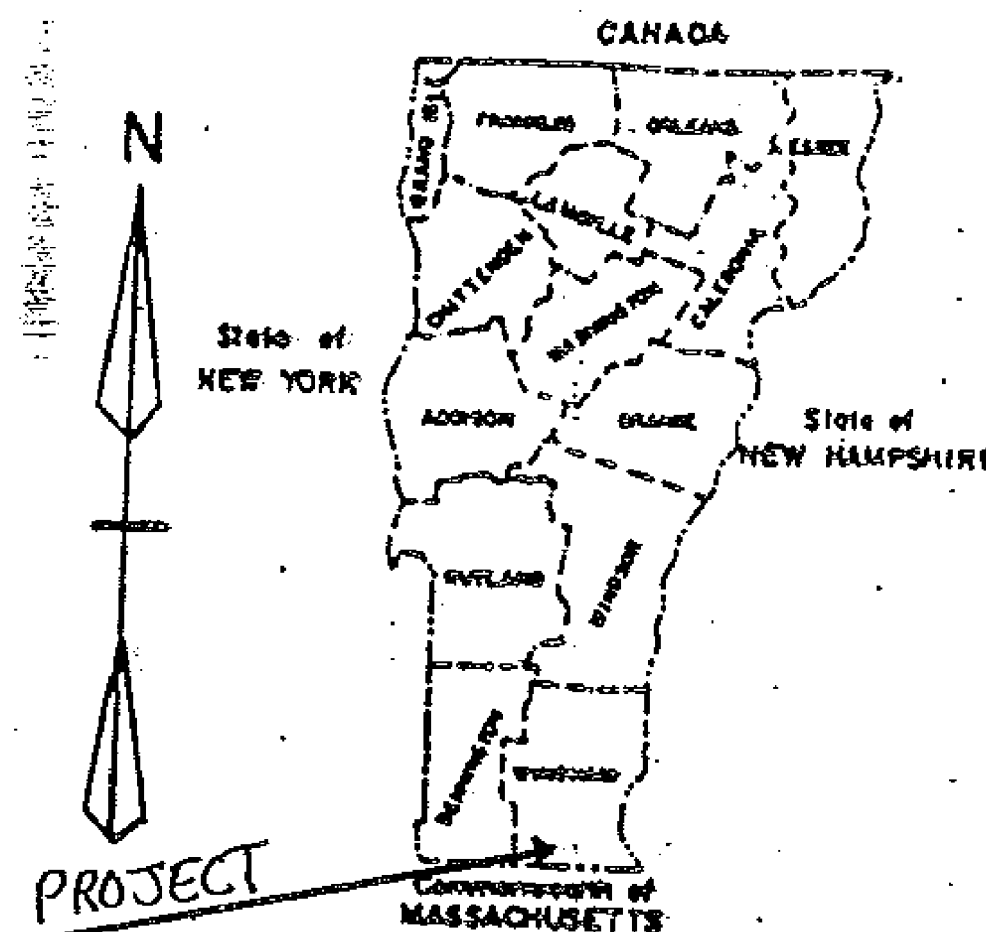
CONTRACT PLANS

THESE PLANS DO NOT REFLECT CHANGES MADE ON THE PROJECT AS "RECORD PLANS" WOULD.

PROPOSED IMPROVEMENT

RESURFACING PROJECT

TOWN OF: WILMINGTON  
 COUNTY OF: WINDHAM  
 ROUTE NO: VT. 9  
 ROUTE CLASS: FAP



PROJECT PROCESSED UNDER  
SECONDARY ROAD PLAN

Date DEC 9 1985

The Lane Construction Corporation  
Contractor

*[Signature]*  
Signature

Title

*[Signature]*  
Transportation Secretary's Signature

These plans are subject to such engineering changes as may be required by the Federal Highway Administration or the Director of Engineering and Construction.

Construction is to be carried on in accordance with these plans and the Standard Specifications for Highway and Bridge Construction dated March, 1976, as approved by the Federal Highway Administration on October 27, 1976 for use on this project, including all subsequent revisions and such revised specifications and special provisions as are incorporated in these plans.

SUBMITTED BY ORDER OF THE STATE TRANSPORTATION BOARD

APPROVED *[Signature]* DATE SEP 1  
DIRECTOR OF ENGINEERING AND CONSTRUCTION

DEPARTMENT OF TRANSPORTATION  
FEDERAL HIGHWAY ADMINISTRATION

APPROVED \_\_\_\_\_ DATE \_\_\_\_\_  
DIVISION ADMINISTRATOR

PROJECT NO. HMA 2644

SHEET 1 OF 18 SHEETS

SEE SHEET 2 FOR INDEX

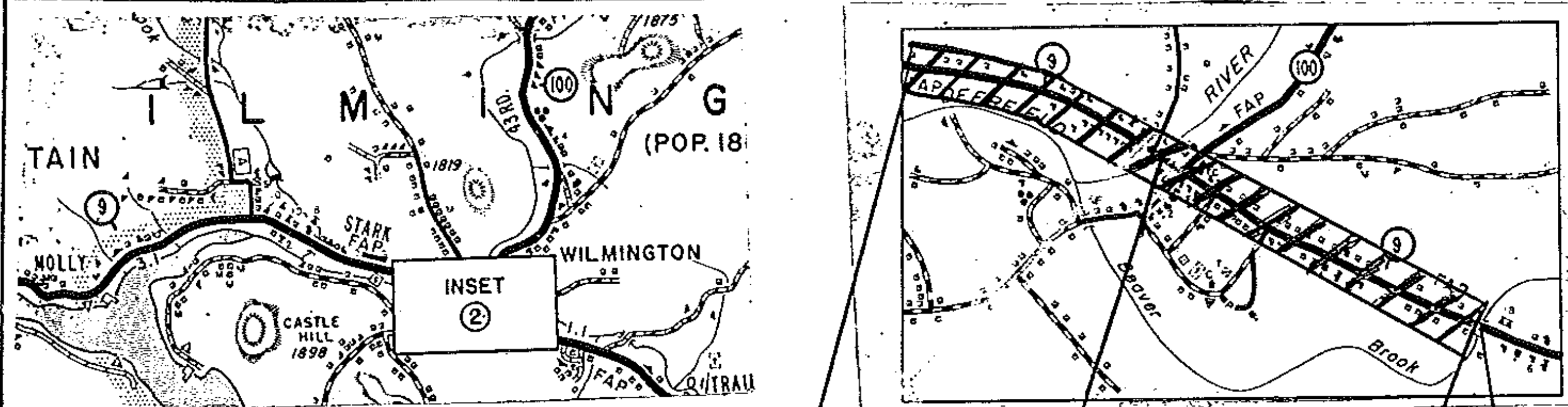
1335

# INDEX OF SHEETS

- 1. TITLE PAGE
- 2. INDEX OF SHEETS
- ~~3.~~ PROJECT DESCRIPTION AND LOCATION
- 4-5A TYPICAL SECTIONS AND DESIGN DATA
- 6-7 PROJECT LENGTHS AND ITEM QUANTITIES
- ~~8~~ MARKINGS FOR SIGNALIZED INTERSECTION
- ~~9~~ CROSSWALK MARKINGS AT INTERSECTIONS
- ~~10~~ PAVEMENT MARKING QUANTITIES
- ~~11~~ MAINLINE PAVEMENT MARKING AT INTERSECTING SIDE ROADS
- 12 GUIDELINES FOR MINIMUM INTERIM PAVEMENT MARKING IN CONSTRUCTION ZONES
- 13 APPLICATION NOTES

14.	STANDARD	SHEET	E-2	3-4-81R
15.	STANDARD	SHEET	E-4	3-4-81R
16.	STANDARD	SHEET	E-6	4-1-80R
17.	STANDARD	SHEET	E-8	6-15-83R
18.	STANDARD	SHEET	E-50	3-16-82R
19.				

# PROJECT DESCRIPTION AND LOCATION



MM 2.640  
BEGIN PROJECT

MM 3.460  
END PROJECT

MM 3.059  
BRIDGE # 31  
(PAVE WITH A  
THIN LAYER  
AS DIRECTED BY THE  
ENGINEER)



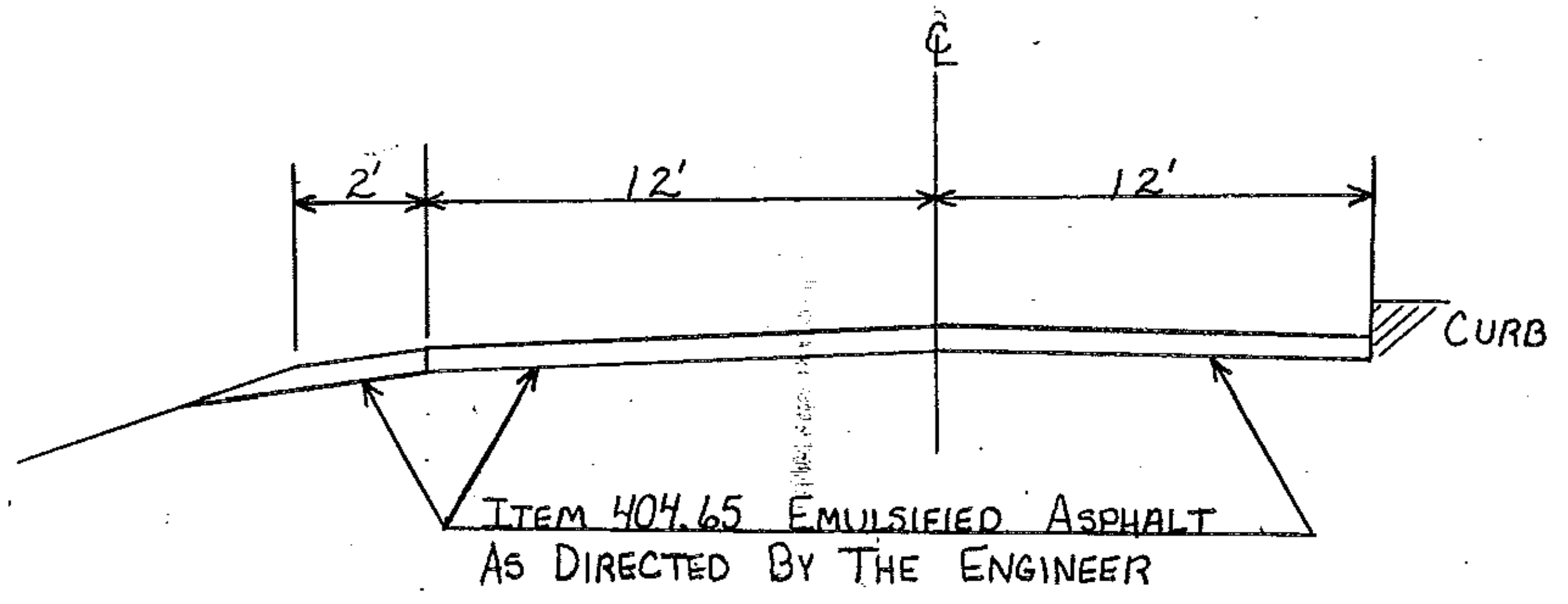
VT. 9 WILMINGTON, BEGINNING AT A POINT ON  
VT. 9 (MM 2.640) APPROXIMATELY 2366 FEET WEST OF  
THE JCT OF VT. 9 AND VT. 100 (NORTH) AND  
EXTENDING 0.820 MILES (4330 FEET) EASTERLY  
TO MM 3.460.

1982 ADT 6110  
V = 35

LENGTH : 0.820 MILES  
4330 FEET

# TYPICAL SECTIONS & DESIGN DATA

ITEM 406.25 BITUMINOUS CONCRETE PAVEMENT  
AS DIRECTED BY THE ENGINEER  
.75" WEARING COURSE, TYPE III



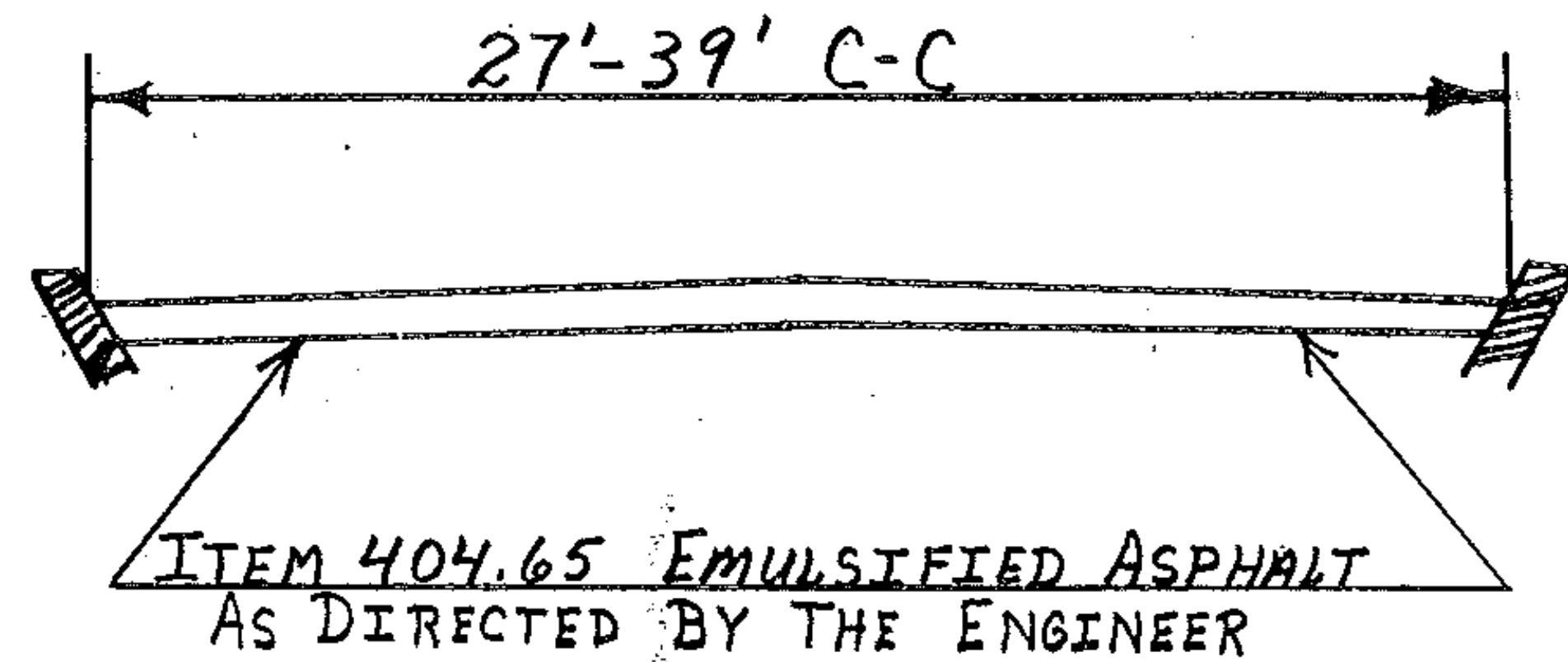
Vt. 9 MM. 2.640 ~ MM. 2.930

PROJECT WILMINGTON

NO. HMA 2644  
SHEET 4 OF 18

# TYPICAL SECTIONS & DESIGN DATA

ITEM 406.25- BITUMINOUS CONCRETE PAVEMENT  
 LEVELING COURSE, TYPE III OR IV (SEE TABLE BELOW)  
 AS DIRECTED BY THE ENGINEER  
 1.5" WEARING COURSE, TYPE III



DISTANCE	WIDTH	LEVEL - T/MI.
MM 2.930~3.040	30'	409
MM 3.040~3.088	39'	532
MM 3.088~3.207	27'	368
MM 3.207~3.230	26'	355
MM 3.330~3.460	26'	355

NOTE: DO NOT RAVE TO TOP OF CURB, TAPER SHOULDER DOWN,  
 AS DIRECTED BY THE ENGINEER.

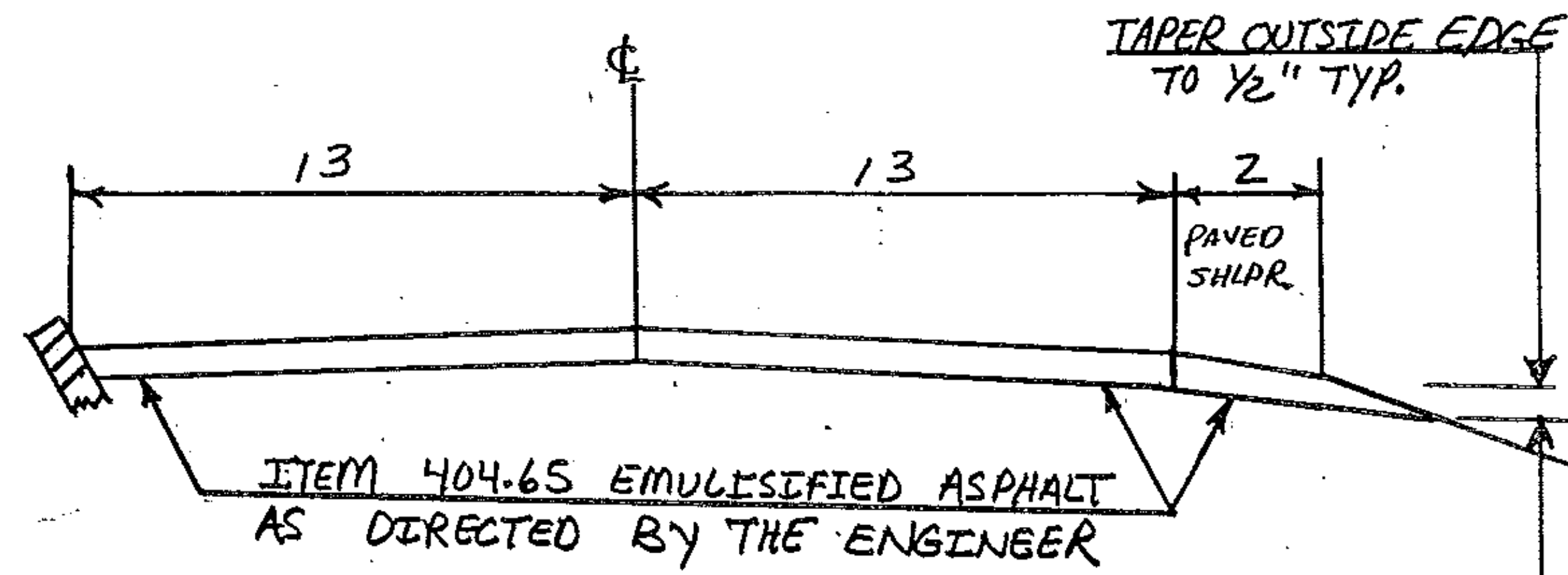
Note: Topsoil, Item 653.10 to be applied as directed by the Engineer.

PROJECT WILMINGTON

NO. HMA 2644  
 SHEET 5 OF 18

# TYPICAL SECTIONS & DESIGN DATA

ITEM 406.25 BITUMINOUS CONCRETE PAVEMENT  
LEVELING COURSE, TYPE III OR IV (355 TONS/MT.)  
AS DIRECTED BY THE ENGINEER  
1.5" WEARING COURSE, TYPE III



VT. 9 MM 3.230 ~ MM 3.330

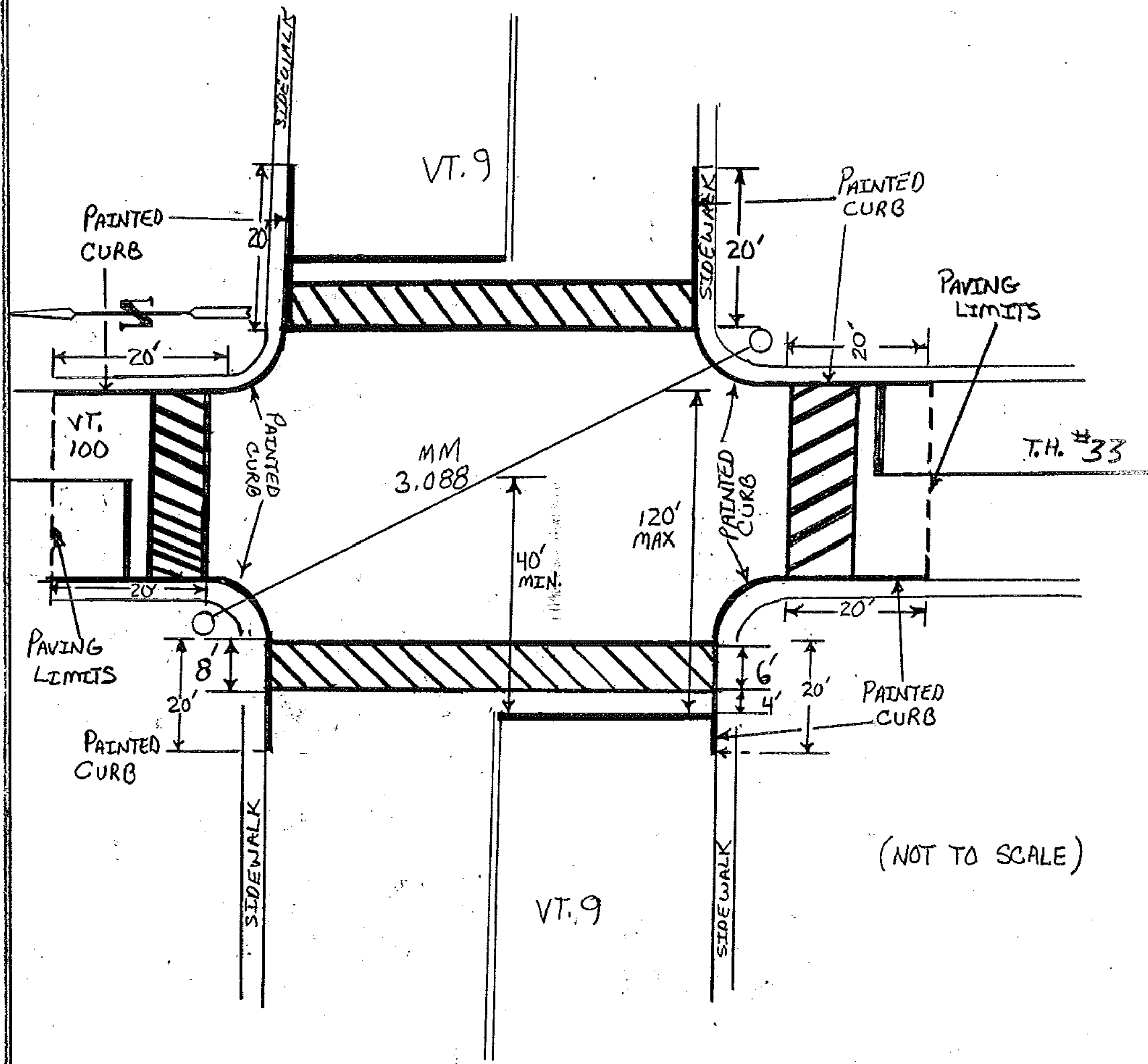
# PROJECT LENGTHS AND ITEM QUANTITIES

ITEM DESCRIPTION	ITEM NUMBER																REMARKS
	LENGTH	WIDTH	OVERLAY DEPTH	COLD PLANING BIT. CONC. PAVT.	GRAVEL SHOULDERS	GRAVEL SHOULDERS	EMULSIFIED ASPHALT	BITUMINOUS CONCRETE PAVEMENT	CHANGE ELEV. OF CB, DI, OR MI	ALL PURPOSE EXC. RENTAL, TYPE I	POWER BROOM RENTAL	UNIFORMED TRAFFIC OFFICERS	FLAGPERSONS	MOBILIZATION	TEMPORARY PAVEMENT	MARKING	
UNIT	FEET	FT	INCH	S.Y.	CY	TON	CWT	TON	EA	HR	HR	HR	HR	LS	LF		
MM 2.640~2.930	1531	26	3/4	-	-	-	6	184	5							No level Course	
MM 2.930~3.040	581	30	1 1/2				3	161	4	1						level @ 409 TIM	
								45									
MM 3.040~3.088	253	29	1 1/2				1	91	4	1						level @ 532 TIM	
								25									
MM 3.088~3.207	628	27	1 1/2				2	157	4	1						level @ 362 TIM	
								44									
MM 3.207~3.460	1336	26	1 1/2				5	322	5	1						level @ 355 TIM	
								90									
							1	49								SHOULDERS	
Project					50	85	1	50	10	1					10552		
Rounding							1	182							48		
TOTALS	4329				50	85	20	1300	22	10	5	50	50	1	10600		

PROJECT LENGTHS AND ITEM QUANTITIES

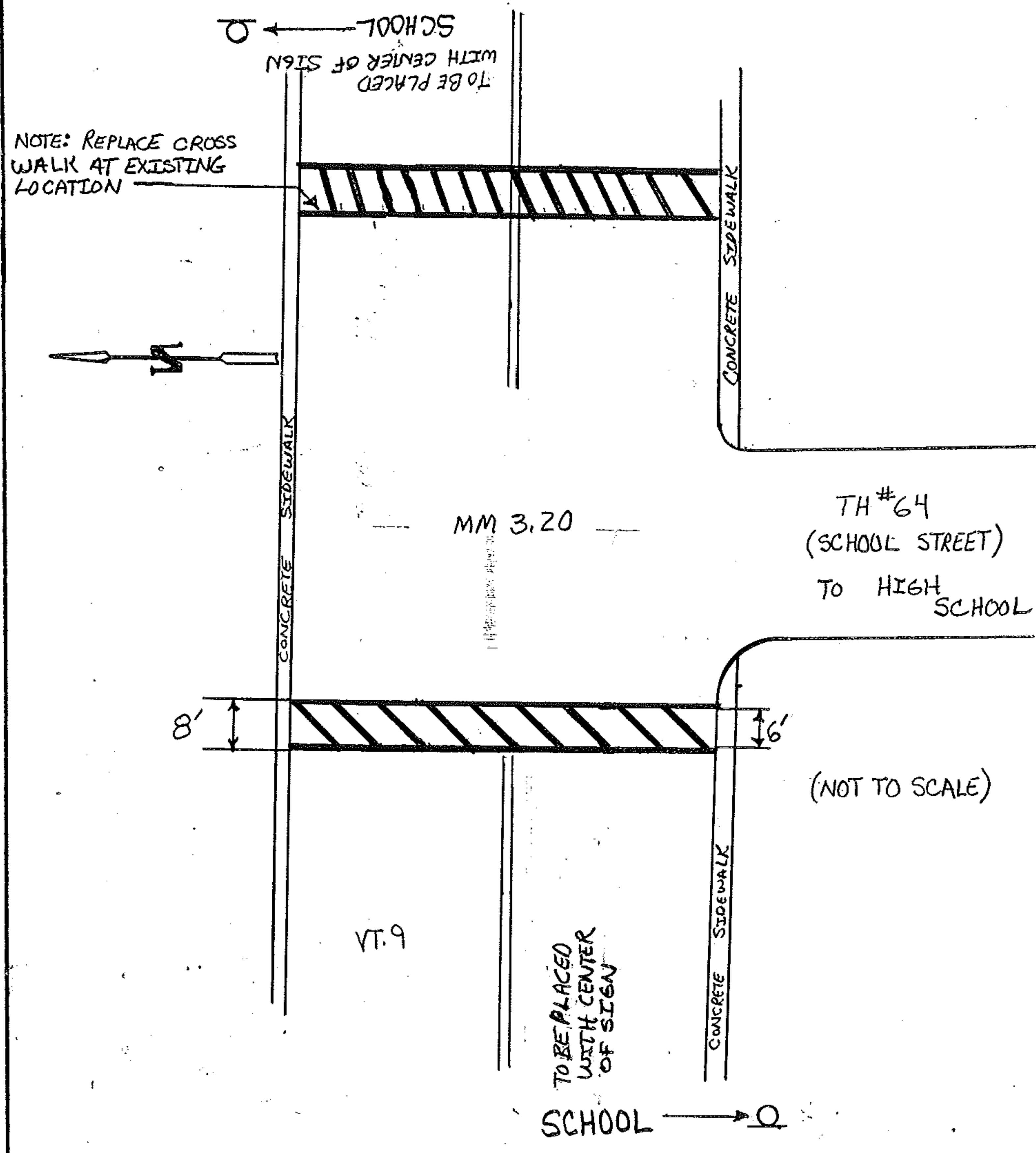
ITEM DESCRIPTION	DURABLE CROSSWALK MARKINGS W/ DIAGONAL LINES					DURABLE 24" STOP BAR		DURABLE LETTER IN WORD MARKINGS		TOPSOIL		PAINTED CURB	
	ITEM NO	646.63	646.64	646.66	653.10	646.21							
UNIT	LF.	LF.	EA.	C.Y.	LF								
LOCATION	WILMINGTON Vt. 9												
@ MM 3.08	39	20											
@ MM 3.09	27	14											
@ MM 3.19	26												
@ MM 3.13			6										"SCHOOL"
@ MM 3.27			6										"SCHOOL"
VT.100	24	12											
TH 33	26	14											
Vt. 9	28												
Vt. 100 - Vt. 9 & TH 33 INTERSECTION					180								TO BE PLACED IN EXISTING LOCATION
TOTAL	170	60	12	50	180								

MARKINGS FOR SIGNALIZED INTERSECTION

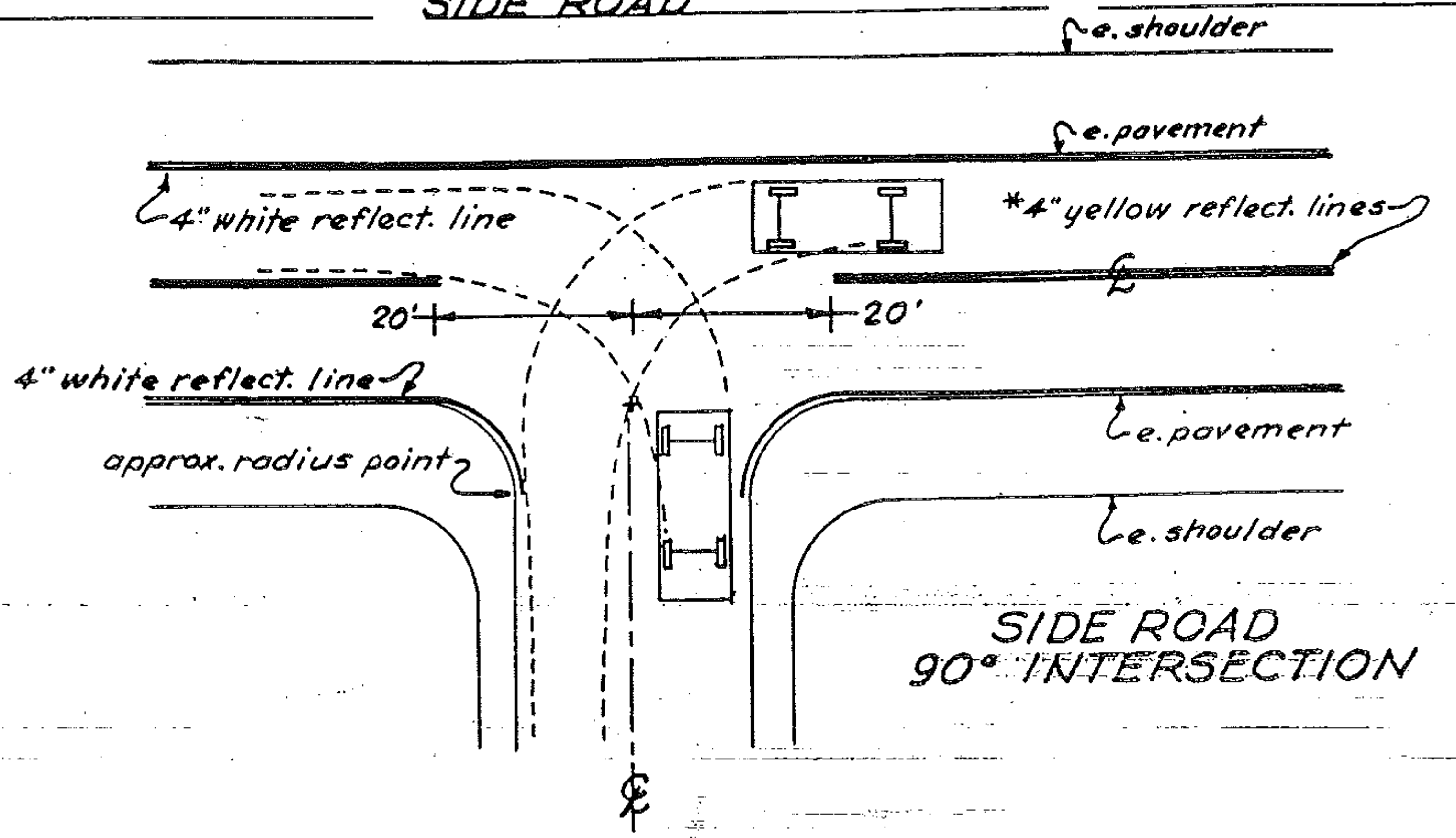


No. HMA 2644

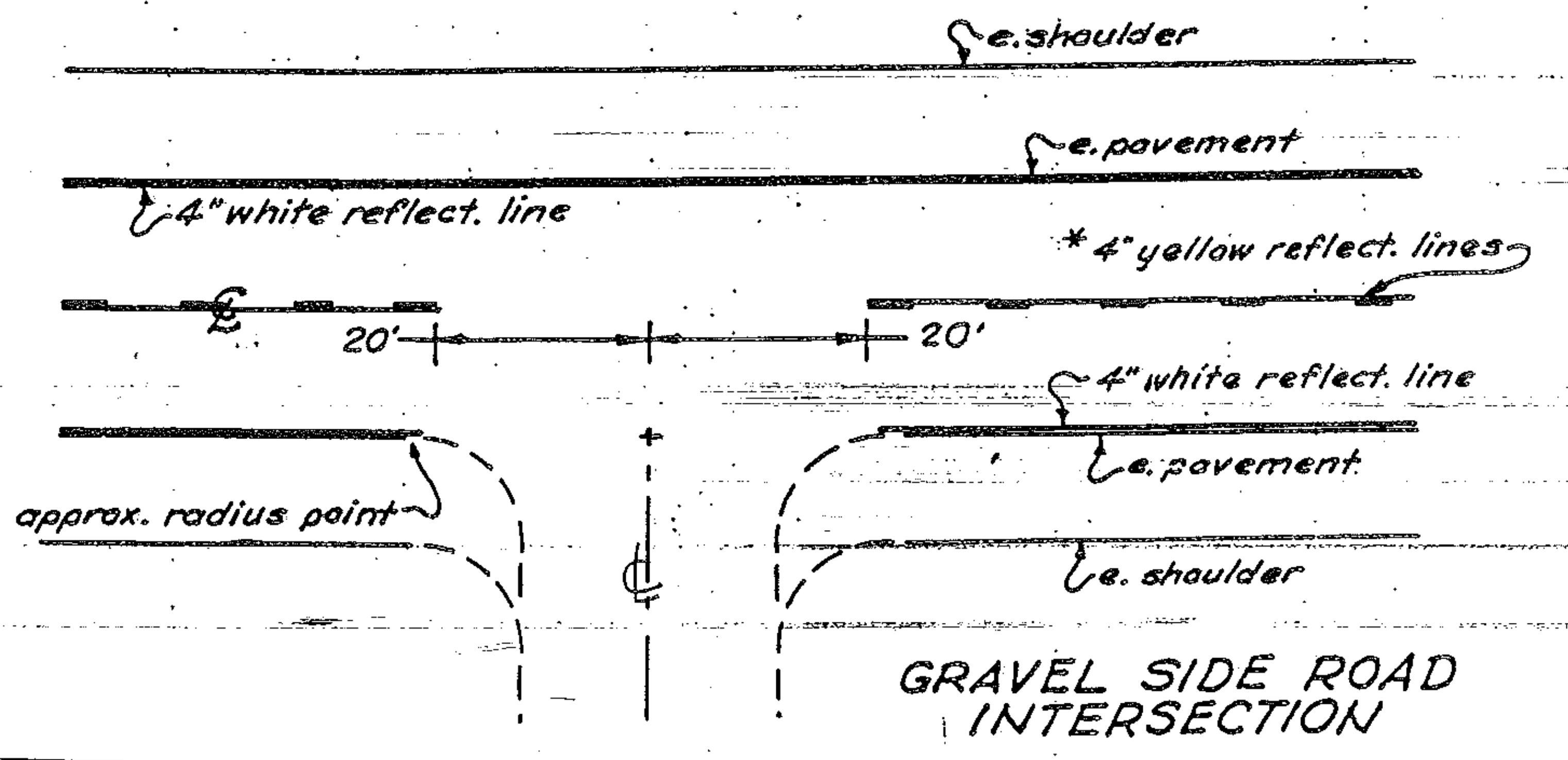
# CROSSWALK MARKINGS AT INTERSECTION







\* Centerline treatment shall consist of a minimum of 400 feet of solid line in advance of the intersection and shall be paired with either a solid or dashed line depending on sight distance availability in the opposing lane.



IN CONSTRUCTION ZONES

- A. CENTERLINE AND GORE AREA MARKINGS SHALL BE APPLIED AT THE END OF EACH WORKING DAY. THE FOLLOWING LAYOUT REQUIREMENTS SHALL BE MET:

NO PASSING BARRIER  
SOLID STRIPES.

DASHED LINE  
10-FOOT SOLID LINE WITH 30-FOOT GAP.

GORE AREA  
(GORE AREAS TO INCLUDE 8' CHANNELIZING LINE AND DASHED LINE)  
PER STANDARD SHEET E-50

- B. EDGE LINES  
WHEN SPECIFIED, EDGE LINES ARE NOT REQUIRED UNTIL COMPLETION OF THE PROJECT. ON INTERSTATE PROJECTS, TEMPORARY EDGE LINES SHOULD BE APPLIED WHERE TRAFFIC VOLUMES AND SPEEDS ARE HIGH AND DELAY OF SEVERAL DAYS IS ANTICIPATED.

- C. TEMPORARY MARKINGS MAY CONSIST OF PAINT, TAPE OR RAISED PAVEMENT MARKERS (RPM'S). THE TAPE SHALL BE A RETRO-REFLECTIVE FILM ON A CONFORMABLE METALLIC BACKING THAT CAN BE PAVED OVER. TAPE MAY BE USED ON THE FINAL SURFACE COURSE IF IT WILL NOT INTERFERE WITH THE FINAL MARKING APPLICATION. TEMPORARY TAPE MARKINGS WILL BE OFFSET AND REMOVED WHEN PROJECT IS FINISHED AND FINAL CENTERLINE PAINTED. THE TAPE SHALL BE THE TYPE THAT IS REMOVABLE INTACT AND NOT SEPERATE AT ANY TIME. THE RPM'S SHALL HAVE A SELF-ADHESIVE BACKING EASILY REMOVED BEFORE PAVING AND SHALL CONFORM TO THE FOLLOWING LAYOUT PATTERN:

NO PASSING BARRIER  
NO RPM'S ALLOWED.

DASHED LINE  
FOUR RETRO-REFLECTIVE RPM'S ON 3 1/2 FOOT CENTERS WITH A 30' GAP.

SOLID LINE - EDGE LINES  
INTERSTATE MEDIAN SIDE-RETRO-REFLECTIVE RPM'S ON 4 TO 5 FOOT CENTER.  
DRIVERS RIGHT SIDE-RPM'S NOT ALLOWED.

- D. ~~WHEN PAINT IS USED FOR TEMPORARY MARKING, AN ALTERNATE MATERIAL SUCH AS TAPE OR RPM'S SHALL BE ON HAND IN THE EVENT RAIN PREVENTS THE PAINT APPLICATION FROM BEING COMPLETED. ALL PAINT SHALL BE REFLECTORIZED.~~
- E. PAYMENT FOR PAINT AND TAPE SHALL BE COMPUTED ON A LINEAR FOOT BASIS AS IF PAINT WAS USED. PAYMENT FOR THE RPM'S SHALL BE COMPUTED AS IF AN EQUIVALENT PAINT LINE WAS USED. (FOR EXAMPLE, DASHED LINE PAID AS 10 FEET OF PAINT, SOLID LINE PAID AS THE TOTAL DISTANCE COVERED WITH THE MARKERS).
- F. PRIOR TO ACCEPTANCE, THE PAVEMENT MARKINGS SHALL BE COMPLETED FOR THE ENTIRE PROJECT BY THE CONTRACTOR AS DETAILED ON THE PLANS OR DIRECTED BY THE RESIDENT ENGINEER.

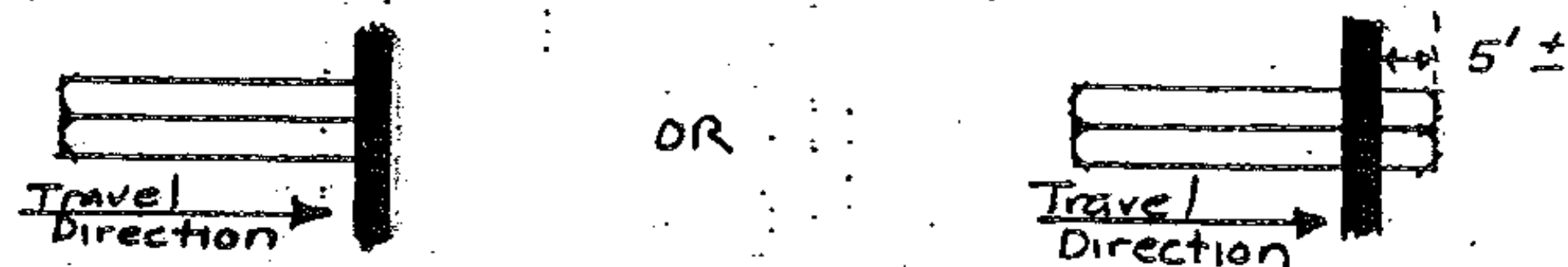
REVISED  
02/11/85

PROJECT WILMINGTON

NO. HMA 2644  
SHEET 12 OF 18

APPLICATION NOTES

1. Edge lines shall be placed 1'-0" from curb.
2. Lane widths based on available roadway width. Preference shall be given to thru lanes with a preferred width of 12'. Left and right turn lanes may be between 10'-12' in width.
3. Exclusive turn lanes (left or right) - Turn lane lanes shall be solid and extend back from the stopbar an adequate distance to store turning vehicles. Generally, the lane line will extend back to the point of full lane width. The edge line taper rate should be 15:1 (minimum). In urban areas an 80' minimum is required. In both rural and urban areas a 200' taper is desirable. An estimate of length required can be determined by dividing the average hourly turning volume by the number of cycles per hour. Multiply the result by 25' per vehicle and then multiply by 1.5 to 2.0. Existing geometry may restrict turn lane length.
4. Turn arrows shall be placed at the begin and end of the left or right turn lane and in the middle if the lane length exceeds 200'.
5. Turn arrows placed at the end of the lane with the stop bar shall be placed with a 4' gap between the stop bar and arrow.
6. There shall be a 4' gap between turn arrows and word markings.
7. When word markings are used at the beginning of a turn lane the markings shall begin at the start of the solid white lane line.
8. The word marking STOP shall be placed with a 4' gap between the marking and the stop bar.
9. Gore markings shown are only approximate. Marking shall be as detailed on Standard Sheet E-50.
10. Stopbars shall be located no closer than 40' from the nearest signal face and no further than 120' from the furthest face. At intersections where there are existing vehicle detector loops, care should be taken in locating the stop bar. In most cases the stopbar should be at or just behind the front edge of the loop.



If loop locations are not known, contact either the Maintenance Division or Traffic Design for information.

11. Dotted line extensions (lane lines and/or centerline) may be used at some intersections to emphasize turning paths.
12. When two line text is used for pavement markings (Signal Ahead, etc.) the two words shall read up and have a space of 32' between them. The corresponding sign shall be half way between the words.

PROJECT: WILMINGTON

No. HMA 2644  
SHEET 13 OF 18 SHEETS

Revision - 11/88  
Note 3 revised  
Notes 10&11 added  
Note 12 added 8/85