



1. INSTALL DELINEATORS EVERY 32'(9.8m). SEE DETAIL C. DO NOT INSTALL A DELINEATOR ON POSTS THAT ARE GREATER THAN 12'(3.7m) FROM THE EDGE OF SHOULDER. IN INSTANCES WHERE THE POST SPACING DOES NOT COINCIDE WITH THE ABOVE DIMENSION, THE DELINEATORS SHOULD BE INSTALLED ON THE NEAREST POST. THE DELINEATOR SPACING SHALL REMAIN CONSISTENT THROUGHOUT THE RUN OF RAILING REGARDLESS OF CHANGES FROM ONE SYSTEM TO ANOTHER. DO NOT DELINEATE POSTS IN THE INTERMEDIATE ANCHORAGE SECTION, TYPICAL APPROACH OR TERMINAL SECTION.
2. FOR ARRANGEMENT OF SPRING CABLE ASSEMBLIES (COMPENSATING DEVICES) AND TURNBUCKLE CABLE END ASSEMBLIES, THE FOLLOWING CRITERIA SHALL APPLY: (SEE STANDARD SHEET HW-918.01b FOR DETAILS)
 - LENGTH OF CABLE RUNS UP TO 1000'(305m) - USE COMPENSATING DEVICE (DETAIL F) ON ONE END, AND TURNBUCKLE CABLE END ASSEMBLY (DETAIL H) ON THE OTHER END OF EACH INDIVIDUAL CABLE.
 - LENGTH OF CABLE RUNS 1000'(305m) TO 2000'(610m) - USE COMPENSATING DEVICE (DETAIL F) ON THE ENDS OF EACH INDIVIDUAL CABLE.
 - LENGTH OF CABLE RUNS OVER 2000'(610m) - START NEW STRETCH BY INTERLACING AT LAST PARALLEL POST (SEE TYPICAL INTERMEDIATE SECTION DETAIL). PRIOR TO FINAL ACCEPTANCE BY THE STATE AND DEPENDING ON THE TEMPERATURE AT THE TIME OF ADJUSTMENTS, THE FOLLOWING TABLE SHALL BE USED TO TIGHTEN THE TURNBUCKLES:

TEMPERATURE (DEGREES FARENHEIT)					
120° TO 100°	79° TO 60°	59° TO 40°	39° TO 20°	19° TO 0°	1° TO -20°
SPRING COMPRESSION FROM UNLOADED POSITION IN EACH SPRING = STANDARD SPRING LENGTH					
1" (25)	1½" (38)	2" (51)	2½" (64)	3" (76)	4" (102)

3. ALTERNATIVE DESIGNS FOR A COMBINATION OR SINGLE UNIT COMPENSATING DEVICE AND TURNBUCKLE ASSEMBLY MAY BE SUBMITTED FOR APPROVAL.
4. AT ALL LOCATIONS WHERE THE CABLE IS CONNECTED TO A CABLE SOCKET WITH A WEDGE TYPE CONNECTION, ONE WIRE OF THE WIRE ROPE SHALL BE CRIMPED OVER THE BASE OF THE WEDGE TO HOLD IT FIRMLY IN PLACE.
5. BOLT HOLES AS SHOWN IN DETAIL A ARE FOR USE AS FOLLOWS:
 3-3/8" (10) DIA. HOLES FOR HOOK BOLTS AND 2-3/8" (10) DIA. DELINEATOR MOUNTING HOLES FOR EACH DIRECTION OF TRAFFIC. HOLES SHOWN SOLID ARE FOR INSTALLATIONS TO THE RIGHT OF TRAFFIC FLOW. ONE 5/8" (16) DIA. HOLE (AS REQUIRED FOR METAL BEAM RAIL) IS ACCEPTABLE.
6. ON ROADWAYS WITH DESIGN SPEED $\geq$ 45 MPH (72kph) THE MINIMUM LENGTH OF THREE CABLE GUIDE RAILING, EXCLUDING ANCHOR SECTIONS IS 248'(75.6m). ON ROADWAYS WITH DESIGN SPEEDS $<$ 45 MPH (72kph) THE MINIMUM LENGTH OF THREE CABLE GUIDERAIL EXCLUDING ANCHOR SECTIONS IS 156'(47.55) WITH AN 8' POST SPACING. WHEN SYSTEM 2 IS REQUIRED, EITHER THE ENTIRE RUN OF RAIL SHALL BE INSTALLED USING A SINGLE SYSTEM OR A 248'(75.6m) MINIMUM LENGTH OF THE SYSTEM SHALL BE PROVIDED.
7. WHEN STAGGERING CABLE SPLICES, PROVIDE A MINIMUM OF 20'(6.1m) BETWEEN ANY PAIR. PROVIDE A MINIMUM OF 100'(30.5m) BETWEEN CABLE SPLICES ON THE SAME CABLE.



TABLE A	
RADIUS OF CURVE	POST SPACING
R > 720' (219m)	16'(4877)
R ≤ 720' (219m) BUT ≥ 440' (134m)	8'(2438)
R < 440' (134m)	DO NOT INSTALL

TABLE B		
TYPE OF SYSTEM	POST SPACING	DEFLECTION
STANDARD SYSTEM 2	16'(4877) 8'(2438)	12'(3658) 8'(2438)

NOTE: DEFLECTION DISTANCE IS BASED ON IMPACT SPEEDS OF 63mph(101kph).

ALL METRIC DIMENSIONS ARE IN MILLIMETERS (mm) UNLESS OTHERWISE NOTED.

1	1/12	NEW END ANCHOR	-	THE INFORMATION, INCLUDING ESTIMATED QUANTITIES OF WORK, SHOWN ON THESE SHEETS IS BASED ON LIMITED INVESTIGATIONS BY THE STATE AND IS IN NO WAY WARRANTED TO INDICATE THE CONDITIONS OF ACTUAL QUANTITIES OF WORK WHICH WILL BE REQUIRED.	NOT TO SCALE	STATE OF CONNECTICUT DEPARTMENT OF TRANSPORTATION  Filename: CTDOT-HIGHWAY-STD2013.dgn Model: 76 - HW-918_01a	SUBMITTED BY:	NAME/DATE/TIME:	CTDOT STANDARD SHEET OFFICE OF ENGINEERING	STANDARD SHEET TITLE: THREE CABLE GUIDERAIL (I-BEAM POSTS) SHEET 1	STANDARD SHEET NO.: HW-918_01a
2	7/13	REVISE CABLE SPACE ,HEIGHT, AND CURVATURE POST SPACING	-				APPROVED BY:	NAME/DATE/TIME:			
-	-	-	-								
-	-	-	-								
-	-	-	-								
REV.	DATE	REVISION	DESCRIPTION	Plotted Date: 7/12/2013							