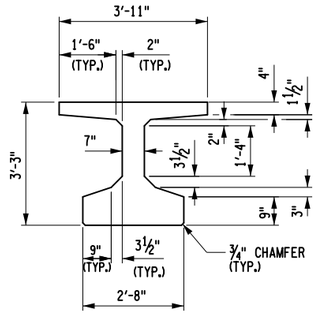
BD-PC14E



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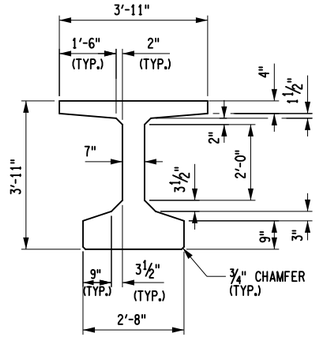

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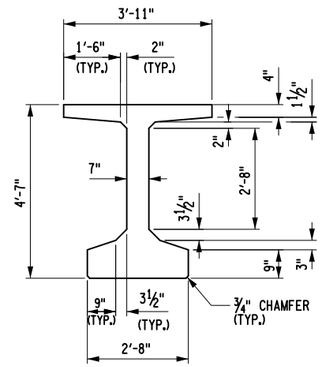

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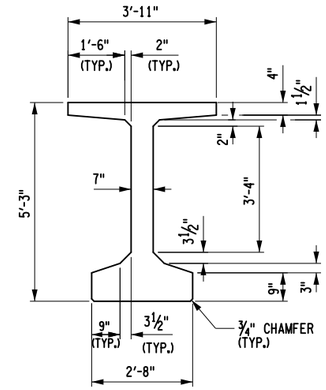

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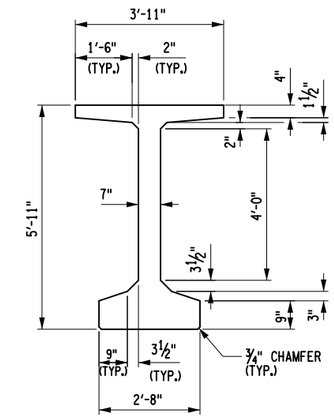

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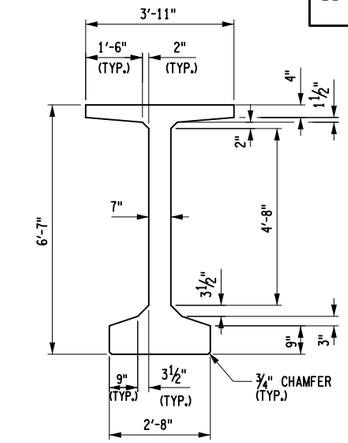

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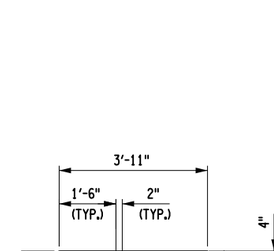
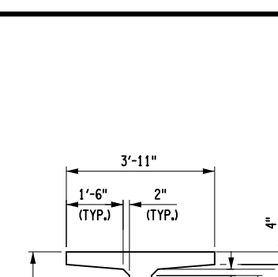


TYPE I BEAM



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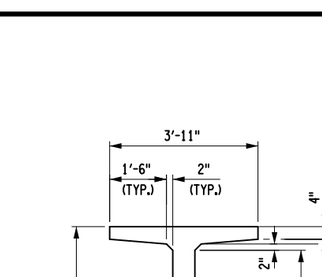
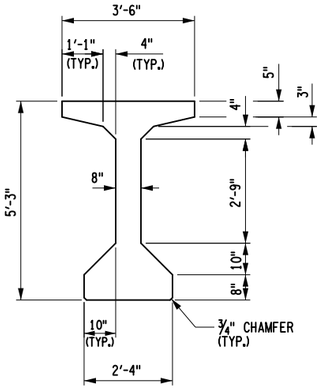
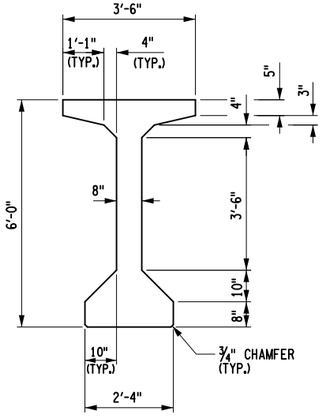


TYPE III BEAM

TYPE IV BEAM



TYPE V BEAM



TYPE VI BEAM

PCEF BULB TEE BEAM PROPERTIES				
BEAM TYPE	WEIGHT (k/ft.)	AREA ($in.^2$)	DISTANCE FROM C.G. TO BOTTOM (in.)	MOMENT OF INERTIA Ix ($in.^4$)
PCEF-39	0.787	755	18.77	148321
PCEF-47	0.845	811	22.39	239351
PCEF-55	0.903	867	26.05	356133
PCEF-63	0.962	923	29.76	500945
PCEF-71	1.020	979	33.50	674259
PCEF-79	1.078	1035	37.26	879241

AASHTO I BEAM PROPERTIES				
BEAM TYPE	WEIGHT (k/ft.)	AREA ($in.^2$)	DISTANCE FROM C.G. TO BOTTOM (in.)	MOMENT OF INERTIA Ix ($in.^4$)
I	0.288	276	12.59	22750
II	0.384	369	15.83	50980
III	0.583	560	20.27	125390
IV	0.822	789	24.73	260730
V	1.055	1013	31.96	521180
VI	1.130	1085	36.38	733320

The cross section of the 63-in-deep prestressed concrete bulb tee (PCEF-63). Based on a justification study the PCEF-63 was the best alternative and was used for all spans. Spans range in length from 65 to 132 ft.

DESIGNER NOTE:

CONSULT THE NYSDOT BRIDGE MANUAL FOR GUIDANCE REGARDING THE USE OF THE PCEF BULB TEE OR AASHTO I-BEAMS.

REVISED

ERRATA

NEW YORK STATE OF OPPORTUNITY. Department of Transportation
Office of Structures

PRESTRESSED CONCRETE
PCEF & AASHTO I-BEAM
TYPICAL SECTIONS

APPROVED: 02/17/17
ORIGINAL SIGNED BY
RICHARD MARCHIONE, P.E.
DEPUTY CHIEF ENGINEER
(STRUCTURES)

ISSUED UNDER EB 17-010
EFFECTIVE WITH THE
LETTING OF 09/01/17

FILE NAME = BD-PC14E.dgn
DATE/TIME = 28-FEB-2017 10:22