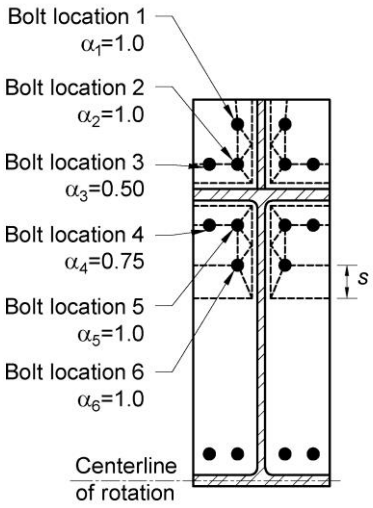
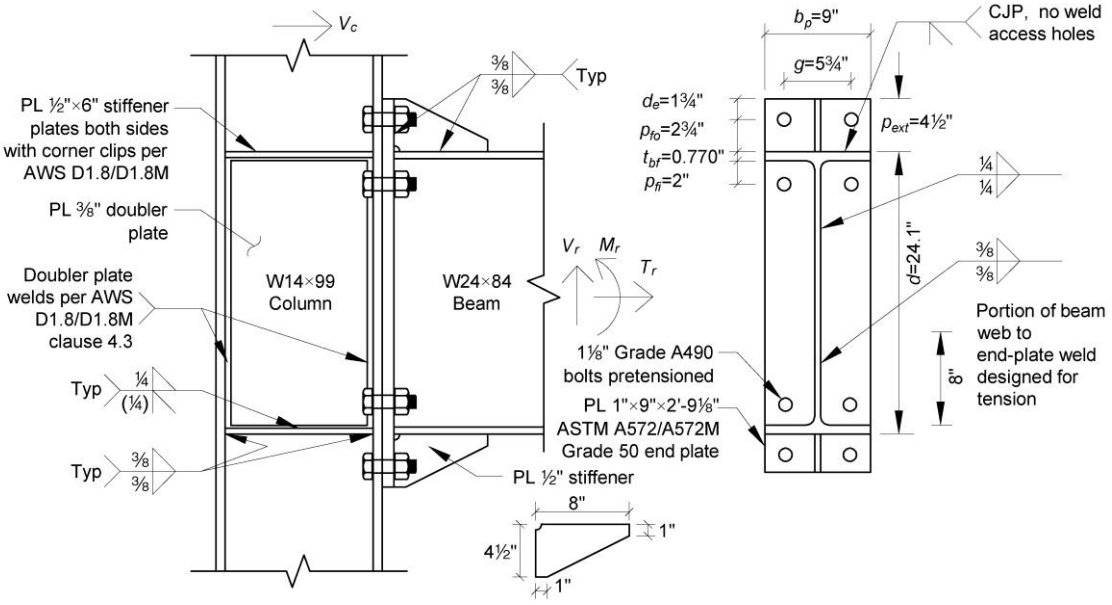
Revisions and Errata List
AISC Steel Design Guide 39, 1st Edition, 1st printing (Printed Copy)
November 25, 2024

The following list represents corrections made to the first printing (dated 2023) of the first edition of AISC Design Guide 39, *End-Plate Moment Connections.*

Page(s)	Item
vi	The page number for Example 5.3-3 should be revised to 153. The page number for Example 5.3-6 should be revised to 174.
121	The yield-line mechanism figure in Table 5-18 includes two erroneous yield lines and should be revised to:



137 Figure 5-11 should be revised to include full-depth stiffener plates and a shortened web doubler plate in the column panel zone:



138 Delete "h/t_{bw} = 45.9" from the beam geometric properties.
Add "$k_{1,c}$ = 1-7/16 in." to the column geometric properties.
Add "h/t_{cw} = 23.5" to the column geometric properties.

147 On the first line below the LRFD/ASD box, "partial-depth" web stiffeners" should be revised to "web stiffeners".

148 On the first line below the first LRFD/ASD box, "partial-depth column web stiffener plates" should be revised to "column web stiffener plates".
On the first line below the second LRFD/ASD box, "partial-depth column web stiffener plates" should be revised to "column web stiffener plates".
On the second line below the third LRFD/ASD box, "partial-depth column web stiffener plates" should be revised to "column web stiffener plates".

149 The discussion and calculations for the stiffener plate clip should be revised to the following:

> "The stiffener plate must be clipped because of the column flange-to-web fillet. To satisfy the requirements of AWS D1.8/D1.8M clause 4.1, the clip adjacent to the column flange, $clip_f$, must extend past the flange-to-web fillet, but not by more than 1/2 in. Therefore, a 1-3/8 in. clip is used."

$$clip_{f,min} = k_{1,c} - t_w/2$$
$$= 1\text{7/16 in.} - (0.485 \text{ in.})/2$$
$$= 1.20 \text{ in.} < clip_f = 1\text{3/8 in.} \quad \textbf{o.k.}$$
$$clip_{f,max} = k_{1,c} - t_w/2 + \text{½ in.}$$
$$= 1\text{7/16 in.} - (0.485 \text{ in.})/2 + \text{½ in.}$$
$$= 1.70 \text{ in.} > clip_f = 1\text{3/8 in.} \quad \textbf{o.k.}$$

150 On the first line below the first LRFD/ASD box, "partial-depth column web stiffener plates" should be revised to "column web stiffener plates".

The stiffener plate to flange weld length equation should be revised to "$l_{wt} = b_s - clip_f$" (not $l_{wt} = l_{stiff} - clip$).

The discussion and calculations for the stiffener plate to column web weld should be revised to the following:

> "Check that the 1/4 in. stiffener plate-to-column web fillet welds and single-bevel-groove welds shown in Figure 5-11 are satisfactory. The required strength is 100 kips (LRFD) and 68 kips (ASD). The stiffener plate must be clipped because of the column flange-to-web fillet. To satisfy the requirements of AWS D1.8/D1.8M clause 4.1, the clip adjacent to the column web, $clip_w$, must extend 1-1/2 in. past the k_{det} dimension. Therefore, a 2-13/16 in. clip is used."

$$clip_{w,min} = k_{det,c} - t_{cf} + 1\text{½ in.}$$
$$= 2\text{1/16 in.} - 0.780 \text{ in.} + 1\text{½ in.}$$
$$= 2.78 \text{ in.} < clip_w = 2\text{13/16 in.} \quad \textbf{o.k.}$$

$$l_{wv} = d_c - 2t_{cf} - 2clip_w$$
$$= 14.2 \text{ in.} - 2(0.780 \text{ in.}) - 2(2\,13/16 \text{ in.})$$
$$= 7.02 \text{ in.}$$

$$R_n = (2 \text{ welds})0.60F_{EXX}\frac{t_{weld}}{\sqrt{2}} l_{wv}\left(1.0 + 0.5\sin^{1.5}\theta\right) + (2 \text{ welds})0.60F_{EXX}S_{PJP}l_{wv}$$
$$= (2 \text{ welds})0.60(70 \text{ ksi})\left(\frac{¼ \text{ in.}}{\sqrt{2}}\right)(7.02 \text{ in.})\left(1.0 + 0.5\sin^{1.5} 0°\right)$$
$$+ (2 \text{ welds})0.60(70 \text{ ksi})(¼ \text{ in.})(7.02 \text{ in.})$$
$$= 252 \text{ kips}$$

(from *Spec*. Eq. J2-4)

LRFD	ASD
$\phi R_n = 0.75(252 \text{ kips})$ $= 189 \text{ kips} \geq T_{u,stiff} = 100 \text{ kips}$ **o.k.**	$\frac{R_n}{\Omega} = \frac{252 \text{ kips}}{2.00}$ $= 126 \text{ kips} \geq T_{a,stiff} = 68.0 \text{ kips}$ **o.k.**

151 The shear rupture strength calculations should be revised to the following:

$$V_{nw} = 0.60F_u A_{nv}$$
$$= (2 \text{ stiffeners})0.60F_u l_{wv} t_s$$
$$= (2 \text{ stiffeners})0.60(65 \text{ ksi})(7.02 \text{ in.})(½ \text{ in.})$$
$$= 274 \text{ kips}$$

(*Spec.* Eq. J4-4)

LRFD	ASD
$\phi R_n = 0.75(274 \text{ kips})$ $= 206 \text{ kips} \geq T_{u,stiff} = 100 \text{ kips}$ **o.k.**	$\frac{R_n}{\Omega} = \frac{274 \text{ kips}}{2.00}$ $= 137 \text{ kips} \geq T_{a,stiff} = 68.0 \text{ kips}$ **o.k.**

On the third line below the first LRFD/ASD box, “plates” should be revised to “plate” and “web double-sided fillet welds” should be revised to “web welds”.

152 The column web width-to-thickness check should be revised to:

$$\frac{h}{t_{cw}} = 23.5 \leq 61.2 \quad \textbf{o.k.}$$

On the second line of the *Panel Zone to Column Web Welds* section, “fillet welds” should be revised to “single-bevel-groove welds”.

149 to 185 To accommodate the preceding revisions to Example 5.3-2, the contents of pages 149 to 185 have been shifted forward by up to one page.

315 Figure B-14 should be revised to include full-depth stiffener plates and a shortened web doubler plate in the column panel zone: