

Design Properties

EWS #1 DF Dry-Use

$F_b=1,250$ psi ⁽³⁾, $F_v=265$ psi, $E=1.5 \times 10^6$ psi, $F_{cp}=560$ psi

Width	Depth (in)	Weight (lbf / ft)	Maximum Resistive Shear (lbf)			Maximum Resistive Moment (ft-lbf)			EI (10 ⁶ in ² -lb)
			100%	115%	125%	100%	115%	125%	
3½"	9¼	7.9	5,720	6,578	7,149	5,199	5,979	6,499	346
	9½	8.1	5,874	6,755	7,343	5,484	6,307	6,855	375
	11¼	9.6	6,956	8,000	8,695	7,690	8,844	9,613	623
	11½	10.1	7,343	8,444	9,178	8,569	9,854	10,711	733
	14	11.9	8,657	9,955	10,821	11,910	13,696	14,887	1,201
	16	13.6	9,893	11,377	12,367	13,689	15,742	17,111	1,792
	18	15.3	11,130	12,800	13,913	17,325	19,924	21,656	2,552
5½"	9¼	12.4	8,988	10,336	11,235	8,170	9,396	10,213	544
	9½	12.7	9,231	10,615	11,539	8,618	9,910	10,772	589
	11¼	15.0	10,931	12,571	13,664	12,085	13,898	15,106	979
	11½	15.9	11,539	13,269	14,423	13,465	15,485	16,831	1,151
	14	18.7	13,603	15,644	17,004	18,715	21,523	23,394	1,887
	16	21.4	15,547	17,879	19,433	21,511	24,738	26,889	2,816
	18	24.1	17,490	20,114	21,863	27,225	31,309	34,031	4,010
6¾"	9¼	15.2	11,031	12,685	13,788	10,027	11,531	12,534	668
	9½	15.6	11,329	13,028	14,161	10,576	12,163	13,220	723
	11¼	18.5	13,416	15,428	16,770	14,832	17,056	18,539	1,201
	11½	19.5	14,161	16,285	17,701	16,525	19,004	20,657	1,413
	14	23.0	16,695	19,199	20,869	22,969	26,414	28,711	2,315
	16	26.3	19,080	21,942	23,850	26,400	30,360	33,000	3,456
	18	29.5	21,465	24,685	26,831	33,413	38,424	41,766	4,921

Notes for X-Rim Design Properties:

(1) Beam weight is assumed to be 35 pcf

(2) Maximum resistive moment shall be adjusted by the volume factor based on NDS-15

(3) 16" and deeper $F_b=1,100$ psi