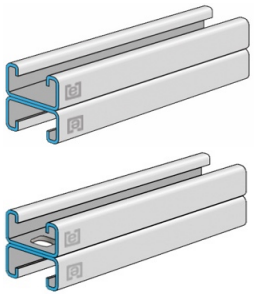
METAL FRAMING CHANNEL

Cold Formed Strut

19449 Progress Dr. • Strongsville • OH • 44149 • PH: 440-878-1199

ES5202T3 STANDARD, ES5202T3EH SLOTTED

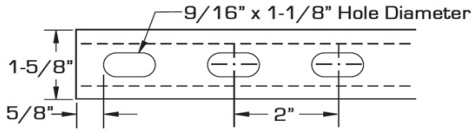
1-5/8" x 1-5/8"
12 Gauge
Part No.: ES5202T3 **Weight:** 262lbs /100 Ft.
Part No.: ES5202T3EH **Weight:** 240lbs /100 Ft.



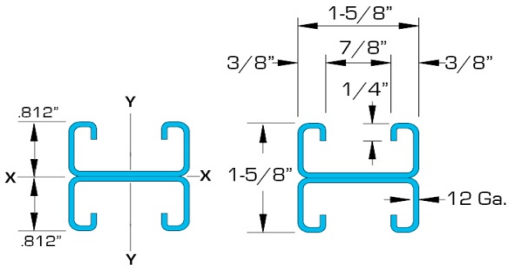
ORDER BY: Part Number, Finish, Length

Material: ASTM A-653 LOW CARBON STEEL

Finish:
PL - Plain
PG90 - Pre-Galvanized Grade 90
PG60 - Pre-Galvanized Grade 60
HG - Hot Dipped Galvanized



Length : 10'
(feet) 20'



ELEMENTS OF SECTION - ES5202T3 & ES5202T3EH						
Area of Section	X-X Axis			Y-Y Axis		
	Moment of Inertia ($Inch^4$)	Section Modulus ($Inch^3$)	Radius of Gyration (Inch)	Moment of Inertia ($Inch^4$)	Section Modulus ($Inch^3$)	Radius of Gyration (Inch)
0.77	0.146	0.18	0.436	0.277	0.340	0.599

BEAM LOADING ES5202T3 & ES5202T3EH						
Span (inch)	Lateral Bracing Load Reduction Factors	Maximum Allowable Uniform Load (lbs)	Deflection at Uniform Load (lbs)	Uniform Loading Deflection		
				Span/180 (lbs)	Span/240 (lbs)	Span/360 (lbs)
24	1.00	1,510	0.06	1,510	1,510	1,510
36	1.00	1,010	0.14	1,010	1,010	710
48	1.00	760	0.25	760	600	400
60	1.00	610	0.40	510	380	260
72	0.97	500	0.56	360	270	180
84	0.95	430	0.77	260	200	130
96	0.92	380	1.01	200	150	100
108	0.90	340	1.29	160	120	80
120	0.87	300	1.56	130	100	60
144	0.83	250	2.25	90	70	40
168	0.78	220	3.14	70	50	NR
192	0.73	190	4.05	50	NR	NR
216	0.68	170	5.16	NR	NR	NR
240	0.63	150	6.24	NR	NR	NR

This load table is based on a solid channel section.
For concentrated load at center of span, divide uniform load by 2 and multiply corresponding deflection by 0.8.
Loads include weight of channel, which must be deducted.
Loads must be multiplied by the applicable unbraced factor located in the blue column in the chart above.
For Pierced Channels, reduce beam load values as follows: ES5202T3EH 15%

COLUMN LOADING ES5202T3 & ES5202T3EH					
Unbraced Height (inches)	Maximum Allowable Load at Slot Face (lbs)	Maximum Column Load Applied at C. G.			
		K=0.65 (lbs)	K=0.80 (lbs)	K=1.0 (lbs)	K=1.2 (lbs)
24	4,140	16,490	15,980	14,970	13,810
36	3,980	15,100	13,810	11,910	9,940
48	3,730	13,190	11,260	8,650	6,270
60	3,390	11,090	8,650	5,780	4,010
72	2,950	8,970	6,270	4,010	2,790
84	2,510	6,980	4,610	2,950	**
96	2,130	5,340	3,530	**	**
108	1,820	4,220	2,790	**	**
120	**	3,420	**	**	**

** $\frac{KL}{r}$>200

Column loads are for allowable axial loads and must be reduced for eccentric loading.