

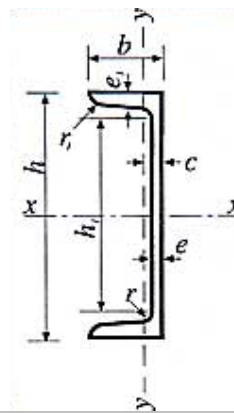
## VIGAS UPN

Perfil europeo normal en "U"

ASTM Designation A36

Tolerancias dimensionales E.N. 10024, 10034, 10056

Calidades del acero norma E.N. 10025 S 275JR



UPN	Dimensiones (mm)						Sección A cm <sup>2</sup>	Peso P Kg/m	Referido al eje x-x				Referido al eje y-y		
	h	b	e	e <sub>1</sub> =r	r <sub>1</sub>	h <sub>1</sub>			I <sub>x</sub> cm <sup>4</sup>	S <sub>x</sub> cm <sup>3</sup>	R <sub>x</sub> cm	c	I <sub>y</sub> cm <sup>4</sup>	S <sub>y</sub> cm <sup>3</sup>	R <sub>y</sub> cm
80	80	45	6.0	8.0	4.00	46	11.0	8.64	106	26.5	3.10	1.45	19.4	6.36	1.33
100	100	50	6.0	8.5	4.50	64	13.5	10.6	206	41.2	3.91	1.55	29.3	8.49	1.47
120	120	55	7.0	9.0	4.50	82	17.0	13.4	364	60.7	4.62	1.60	43.2	11.10	1.59
140	140	60	7.0	10.0	5.00	98	20.4	16.0	605	86.4	5.45	1.75	62.7	14.80	1.75
160	160	65	7.5	10.5	5.50	115	24.0	18.8	925	116.0	6.21	1.84	85.3	18.30	1.89
180	180	70	8.0	11.0	5.50	133	28.0	22.0	1350	150.0	6.95	1.92	114.0	22.40	2.02
200	200	75	8.5	11.5	6.00	151	32.2	25.3	1910	191.0	7.70	2.01	148.0	27.00	2.14
220	220	80	9.0	12.5	6.50	167	37.4	29.4	2690	245.0	8.48	2.14	197.0	33.60	2.30
240	240	85	9.5	13.0	6.50	184	42.3	33.2	3600	300.0	9.22	2.23	248.0	39.60	2.42
260	260	90	10.0	14.0	7.00	200	48.3	37.9	4820	371.0	9.99	2.36	317.0	42.70	2.56
280	280	95	10.0	15.0	7.50	216	53.3	41.8	6280	448.0	10.90	2.53	399.0	57.20	2.74
300	300	100	10.0	16.0	8.00	232	58.8	46.2	8030	535.0	11.70	2.70	495.0	67.80	2.90
320	320	100	14.0	17.5	8.75	246	75.8	59.5	10870	679.0	12.10	2.60	597.0	80.60	2.81
350	350	100	14.0	16.0	8.00	282	77.3	60.6	12840	734.0	12.90	2.40	570.0	75.00	2.72
380	380	102	13.5	16.0	8.00	313	80.4	63.1	15760	829.0	14.00	2.38	615.0	78.70	2.77
400	400	110	14.0	18.0	9.00	324	91.5	71.8	20350	1020.0	14.90	2.65	846.0	102.00	3.04

A= Area de la sección

I= Momento de Inercia

W= Modulo Resistente

i= Radio de giro=  $\sqrt{I/A}$