Πίνακας 12-1(α): Ιδιότητες χαλύβων κατασκευών

Χάλυβες Κατασκευών

Euronorm	Germany	UK	USA	France								
EN10025	**Din 17100**	**BS4360**	**ASTM**	**NFA 35-501**	**%C**	**%Mn**	**%Si**	**%S**	**%P**	**Yield min**	**Tensile**	
S185	St33		A283B	A33								
S235		40A	A283C		0.22max	1.60 max	0.50 max	.050 max	.050 max	185	310/540	
S235JR	St37-2	40B	A283C-A		0.17max	1.40max	-	0.045	0.045	235	360/510	
S235JO	St37-3 U	40C		E 24-2	0.17max	1.40max	-	0.04	0.04	235	360/510	
S235J2G3	St37-3 N	40D		E24-4	0.17max	1.40max	-	0.035	0.035	235	360/510	
S275		43A			0.25max	1.60 max	0.50 max	.050 max	.050 max	275	430/580	
S275JR	St44-2	43B	A283D-A		0.21max	1.50max	-	0.045max	0.045max	275	430/580	
S275JO	St44-3 U	43C	A578Gr70	E28-3	0.18max	1.50max	-	0.040max	0.040max	275	430/580	
S355		50A	A572Gr50		0.23max	1.60max	0.50max	0.050max	0.050max	355	490/630	
S355JR		50B	-		0.23max	1.60max	0.55max	0.045max	0.045max	355	490/630	
S355JO	St52-3 U	50C	A441		0.22max	1.60 max	0.60 max	0.40 max	0.040 max	355	490/630	
S355J2G3	St 52-3 N	50D			0.20max	1.60max	0.55max	0.035max	0.035max	355	490/630	
S355J2G4					0.20max	1.60max	0.55max	0.035max	0.035max	355	490/630	

Χάλυβες Υψηλής Αντοχής

Euronorm	Germany	UK	USA	France								
EN 10149-2	**SEW 092**	**BS1449**		**NFA 36-231**	**%C**	**%Mn**	**%Si**	**%S**	**%P**	**Yield min**	**Tensile**	**V**
S315MC	QSTE340 TM	40/30	045XLF	E315D	0.12max	1.30max	0.50max	0.020max	0.025max	315	390/510	0.20max
S355MC	QSTE380 TM	43/35	050XLF	E355D	0.12max	1.50max	0.50max	0.020max	0.025max	355	430/550	0.20max
S420MC	QSTE420 TM	46/40	060XLF	E420D	0.12max	1.60max	0.50max	0.015max	0.025max	420	480/620	0.20max
S460MC	QSTE460 TM	50/45	-	-	0.12max	1.60max	0.50max	0.015max	0.025max	460	520/670	0.20max
S315MC	-	40F30	-	E315D	0.12max	1.30max	0.50max	0.015max	0.025max	315		0.20max
S355MC	-	40F35	-	E355D	0.12max	1.50max	0.50max	0.015max	0.025max	355		0.20max
-	-	46F40	-	-	0.12max	1.50max	0.50max	0.015max	0.025max	355		0.20max
S420MC	QSTE420 TM	-	-	E420D	0.12max	1.60max	0.50max	0.015max	0.025max	420		0.20max
S460MC	QSTE460 TM	-	Gr65	-	0.12max	1.60max	0.50max	0.015max	0.025max	460		0.20max
S500MC	QSTE500 TM	E490D	070XLK	-	0.12max	1.70max	0.50max	0.015max	0.025max	500	550/700	0.20max
S550MC	QSTE550 TM	-	080XLK	-	0.12max	1.80max	0.50max	0.015max	0.025max	550	600/760	0.20max

BS EN 10025: 1993							BS4360: 1986					
				Impact Energy (J°C)							Impact Energy (J°C)	
				Nominal Thickness							Nominal Thickness	
Grade	Tensile Strength	Min Yield Strength at 16mm N/mm²	Max Thk for Specified Yield N/mm²	Temp °C	<150mm -1	>150mm <250mm -1	Grade	Tensile Strength >3mm N/mm²	Min Yield Strength at 16mm N/mm²	Max Thk for Specified Yield N/mm² (2)	Temp °C	<100mm -3
S185 (4)	290/510	185	25	-	-	-	-	-	-	-	-	-
S235 (5)	340/470	235	250	-	-	-	40A	340/500	235	150	-	-
S235JR (4)	340/470	235	25	20	27	-	-	-	-	-	-	-
S235JRG1 (4)	340/470	235	25	+20 (6)	27	-	-	-	-	-	-	-
S235JRG2	340/470	235	250	+20 (6)	27	23	40B	340/500	235	150	+20 (6)	27
S235JO	340/470	235	250	0	27	23	40C	340/500	235	150	0	27
S235J2G3	340/470	235	250	-20	27	23	40D	340/500	235	150	-20	27
S235J2G4	340/470	235	250	-20	27	23	40D	340/500	235	150	-20	27
S275 (5)	410/560	275	250	-	-	-	43A	430/580	275	150	-	-
S275JR	410/560	275	250	+20 (6)	27	23	43B	430/580	275	150	+20 (6)	27
S275JO	410/560	275	250	0	27	23	43C	430/580	275	150	0	27
S275J2G3	410/560	275	250	-20	27	23	43D	430/580	275	150	-20	27
S275J2G4	410/560	275	250	-20	27	23	43D	430/580	275	150	-20	27
S355 (5)	490/630	355	250	-	-	-	50A	490/640	355	150	-	-
S355JR	490/630	355	250	+20 (6)	27	23	50B	490/640	355	150	+20 (6)	27
S355JO	490/630	355	250	0	27	23	50C	490/640	355	150	0	27
S355J2G3	490/630	355	250	-20	27	23	50D	490/640	355	150	-20	27
S355J2G4	490/630	355	250	-20	27	23	50D	490/640	355	150	-20	27
S355K2G3	490/630	355	250	-20	40	33	50DD	490/640	355	150	-30	27
S355K2G4	490/630	355	250	-20	40	33	50DD	490/640	355	150	-30	27
E295	470/610	295	250	-	-	-	-	-	-	-	-	-
E335	570/710	335	250	-	-	-	-	-	-	-	-	-