

**Plate – PL****Coil Plate - CPL****GENERAL DESCRIPTION**

Hot-rolled structural product with minimum yield strength of 350MPa, good ductility and good weldability.

**TYPICAL USES**

- Structural members
- Roll forming applications
- Brake press forming applications
- Galvanising applications

**FEATURES & BENEFITS**

- Guaranteed minimum strength levels
- Excellent weldability
- Good formability
- Excellent for galvanising applications

**WARNINGS**

- This material should be used in conjunction with the appropriate design and welding standards.
- An untrimmed (Mill) edge may contain minor surface discontinuities as a result of the rolling process. It is recommended that customers satisfy themselves that the edge is suitable for the application.

**NORMAL / OPTIONAL SUPPLY CONDITIONS**

	Normal	Optional
Thickness Range	1.5mm – 12.7mm	
Width Range	910mm – 1550mm	
Length Range	1200mm – 9000mm	
Surface Finish	Hot-rolled	
Edge Condition	Untrimmed (Mill Edge)	Trimmed
Tolerances	AS/NZS 1365: 1996	
Flatness	Class A	
Certification	BlueScope Steel – Analysis and Mechanical tests	

Optional supply conditions may be subject to dimensional restrictions.

Australia 1800 800 789

**Plate – PL**
**Coil Plate - CPL**
**CHEMICAL COMPOSITION**

Element	Guaranteed Maximum %	Typical %			
		1.5mm – 3.2mm	>3.2mm – 5.5mm	>5.5mm – 8mm	>8mm – 12.7mm
Carbon	0.20	0.15	0.09	0.08	0.08
Silicon	0.030*	0.004	0.004	0.010	0.2
Manganese	1.60	0.75	0.55	1.3	1.3
Phosphorus	0.040	0.015	0.015	0.015	0.015
Sulfur	0.030	0.010	0.010	0.010	0.010
Aluminium	0.10	0.030	0.030	0.030	0.035
Micro Alloy (Niobium)**	0.15	-	0.030	0.018	0.030
Micro Alloy (Titanium)		-	-	0.013	0.013
CEQ (IIW)	0.44	0.28	0.19	0.31	0.31

All values shown refer to the relevant Australian Standard unless otherwise stated.

$$CEQ(IIW) = C + \frac{Mn}{6} + \frac{(Cr + Mo + V)}{5} + \frac{(Cu + Ni)}{15}$$

\* Values refer to the BlueScope Steel internal standard, where the AS/NZS 1594 guaranteed maximum % is 0.35

\*\* Niobium + Vanadium + Titanium = 0.15% Max

**MECHANICAL PROPERTIES**

Tensile Properties (Longitudinal)	Guaranteed Minimum	Typical %			
		1.5mm – 3.2mm	>3.2mm – 5mm	>5mm – 5.5mm	>5.5mm – 12.7mm
Yield Strength (MPa)	350	360 – 480			
Tensile Strength (MPa)	430	460 - 550			
Elong. (%) on 80mm	16	20 – 32			
Elong. (%) on 80mm	20		24 - 34		
Elong. (%) on 200mm	15				19 – 30
180° Bend (Transverse)	2t	1t			
180° Bend (Transverse)	3t	1t			

**DIMENSIONS**

Width Range (mm)	Thickness Range (mm)	Length Range (mm)
910 – 1550	1.5 – 12.7	1200 - 9000

Not all thickness and width combinations are available.

**WELDABILITY GROUP**

WTIA Group
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Refer to WTIA Technical Note 1 or AS/NZS 1554.1

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