

Revision 2 April 2013
This literature supersedes all previous issues.

GENERAL DESCRIPTION TRUECORE® steel is a hot-dipped zinc/aluminum alloy-coated structural steel with a regular blue tinted resin spangle surface and a guaranteed minimum yield strength of 550MPa with limited ductility.	TYPICAL USES Steel house frames and trusses where the product is not visible. For material selection advice, please contact your nearest BlueScope Sales office.	
	AUSTRALIAN STANDARD AS 1397	MALAYSIAN STANDARD MS 1196

DIMENSIONS: (For normal supply product)

Preferred base metal thickness (BMT), mm*	Strip width range, mm
0.45, 0.48, 0.50, 0.55	610 - 1219
0.60, 0.70, 0.75	610 - 1219
0.80, 0.90, 1.00, 1.20	610 - 1219

*Any other sizes may be available on request

MECHANICAL PROPERTIES

Steel base	Guaranteed (0.42mm) (> 0.60mm)		Typical* (0.42 mm thick)
Longitudinal tensile			
Yield strength, MPa	550 min	550 min	680 - 740
Tensile strength, MPa	550 min	550 min	680 - 740
Elong on 50 mm, %	—	2 min	1 - 6
Hardness, HR30T	—	—	75 - 85
180° transverse bend (L axis)	—	—	—

* Typical mechanical properties are based on aggregation of \bar{x} and 2SD performance.

CHEMICAL COMPOSITION OF STEEL BASE

Guaranteed maximum %	
Carbon (C)	0.20
Phosphorus (P)	0.04
Manganese (Mn)	1.20
Sulphur (S)	0.03
Typical %	
Carbon (C)	0.035 - 0.070
Phosphorus (P)	0.00 - 0.02
Manganese (Mn)	0.20 - 0.30
Sulphur (S)	0.00 - 0.02
Silicon (Si)	0.00 - 0.02
Aluminium (Al)	0.02 - 0.07
Nitrogen (N)	0.000 - 0.008

SUPPLY CONDITION

	Normal
Coating Class	AZ150
Surface Finish	Spangled
Surface Treatment	Passivated/ Resin Coated
Tolerance class AS/NZS 1365*	
Thickness	Class A
Width	Class A
Flatness	Class A

Branding

Branded

* The dimensional tolerances for thickness, width, flatness and camber shall be in accordance with the requirements of AS 1365.

FABRICATING PERFORMANCE

Method	Rating
Bending	2
Drawing	NR
Pressing	NR
Roll-forming	3
Welding	4*
Painting (pretreatment)	5

Where 1 = limited to 5 = excellent, or NR = not recommended

* Welding design must allow for some strength reduction near welds

Note: 1. Customers should use this product promptly (within 6 months) to avoid the possibility of storage related corrosion.
2. Rollforming mark does not affect the performance of TRUECORE® steel.

Please ensure you have the current data sheet for this product.