

# ABRAZO<sup>®</sup> 450 Data Sheet

**ABRAZO<sup>®</sup> 450 is a roller quenched steel, combining excellent wear resistance, high strength and durability.**

## Chemical composition

Thickness* (mm)	C (%)	Si (%)	Mn (%)	S (%)	P (%)	Cr (%)	Mo (%)	Ni (%)	B (%)
12 ≤ t ≤ 50	max. 0.25	0.50	1.50	0.010	0.025	1.50	0.70	1.50	0.005

\* Other gauges available by agreement.

## ABRAZO<sup>®</sup> 450 is offered with the following CEV:

Thickness (mm)	Maximum ladle CEV* (%)
12 ≤ t ≤ 50	0.66

\* Other maximum CEV available by agreement.

## Mechanical properties

ABRAZO<sup>®</sup> 450 is routinely subject to hardness testing only. Any additional testing is by special arrangement.

Thickness (mm)	Minimum hardness (H <sub>BN</sub> )	Typical hardness (H <sub>BN</sub> )
12 ≤ t ≤ 50	415	450

Typical mechanical properties for 25mm thick plate.

Yield strength (MPa)	Tensile strength (MPa)	Proportional elongation (%)	Average impact energy*
1200	1450	10	27 J@ -40°C

Testing in accordance with BS EN ISO 6892, BS EN 10045 and BS EN ISO 6506.

\* Longitudinal charpy V notch, 2mm sub-surface.

## Dimensions

ABRAZO® 450 is available in thicknesses 12mm to 50mm. Width and length availability is given in table 4 of the Plate products range of sizes brochure.

## Tolerances

The manufacturing tolerances for ABRAZO® 450 are in compliance with EN10029:1991.

Surface quality of ABRAZO® 450 is compliant with EN10163:2004 class A subclass 1.

Other tolerances are available by agreement.

## Supply Condition

Quenched or Quenched and Tempered at the discretion of the supplier.

Not suitable for any hot forming operations and should not be heated above 200°C.

## Further Information

For any queries regarding product application, metallurgy or mechanical properties please contact our Technical Advisory Service +44 (0) 1724 402106 or email: [plates.technical@corusgroup.com](mailto:plates.technical@corusgroup.com)

All other enquiries may be directed to your account team, or contact us using the details below.

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