DATASHEET QUARITE-N

PRODUCT OVERVIEW

Quarite N is a nickel-based superalloy well known for especially its high anti-corrosive capabilities. Quarite N is high resistant to many industrial chemicals and is able to withstand heavy thermal shocks and bending. This layer can be used for new components as well as repairs. The layer thickness may vary between a minimum of 225µm and a maximum well above 5000µm.

TYPICAL APPLICATIONS

Quarite N is a moderately priced laser clad layer for situations with high exposure to corrosion and moderate wear. Typical applications are hydraulic cylinders in an industrial, offshore or marine environment, components in the food processing industry and hot rolling equipment.

TECHNICAL SPECIFICATIONS	
Corrosion resistance (ISO 10289)	> 4200hrs, grade 10
Pitting resistance (PREN)	51
Wear resistance (ASTM65 volume loss)	82mm³
Impact resistance (# impacts@20 Joule)	> 5.000
Ductility	Very high
Micro hardness	310HV
Thermal shock resistance	Very high
Operating temperature to maintain properties	< 875 °C
Roughness	0,15 < Ra> 1,6 µm
Bonding strength	∞ (infinite; intermetallic bonding)
Porosity	0%
Heat affected zone	< 0,2mm
Topclad length measurement system	Optional

TOPCLAD
LASER CLADDING