TECHNICAL DATA

DelNite Pro 625 ALLOY

DelNite Pro NICKEL-BASED ALLOYS are a family of austenitic nickel-chromium-based super alloys. DelNite Pro alloys are oxidation- and corrosion-resistant materials well suited for service in extreme environments subjected to pressure and heat. When heated, DelNite Pro forms a thick, stable, passivating oxide layer protecting the surface from further attack. DelNite Pro's high temperature strength is developed by solid solution strengthening or precipitation hardening, depending on the alloy. DelNite Pro alloys are typically used in high temperature applications.

DelNite Pro 625 is nickel-chromium-molybdenum alloy with an addition of niobium that acts with the molybdenum to stiffen the alloy's matrix and thereby provide high strength without a strengthening heat treatment. The alloy resists a wide range of severely corrosive environments and is especially resistant to pitting and crevice corrosion. Used in chemical processing, aerospace and marine engineering, pollution-control equipment, and nuclear reactors. Widely specified for use in seawater and contaminated seawater environments. Excellent high temperature oxidation and corrosion properties.

NOMINAL CHEMICAL COMPOSITION (MASS%)

ALLOY	Ni	Cr	Mo	Nb + Ta	Fe	Others
DelNite Pro 625	Bal.	21,5	9,0	3,7	< 1,0	Co, Si, C

PHYSICAL PROPERTIES

ALLOY	Hardness	Density	Melting Range
DelNite Pro 625	200 – 250 HV	~ 8,40 g/cm^3	1290 – 1350 °C

PRODUCT FORMS

Consumables for Cladding / Hardfacing and Additive Layer Manufacturing (ALM)					
Powder	PTA Cladding	Laser Cladding	HVOF Spraying	Plasma Spraying	ALM

Deloro Wear Solutions GmbH | Zur Bergpflege 51 – 53 | 56070 Koblenz | Germany
T +49 (0) 261 8088 0 | F +49 (0) 261 8088 35
Email us at: info@deloro.com | Visit us at: www.deloro.com