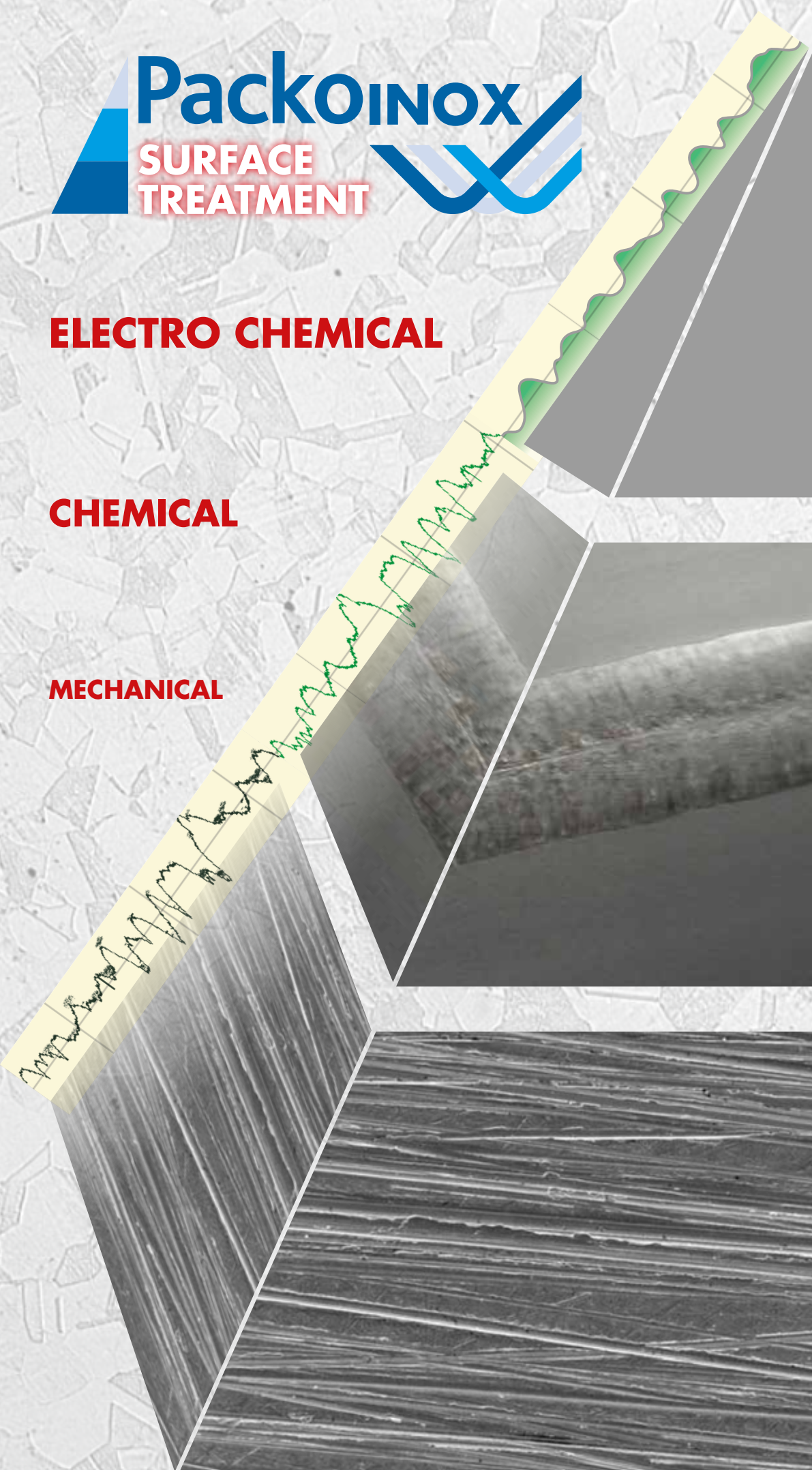




ELECTRO CHEMICAL

CHEMICAL

MECHANICAL



FINISHES FOR STAINLESS STEEL

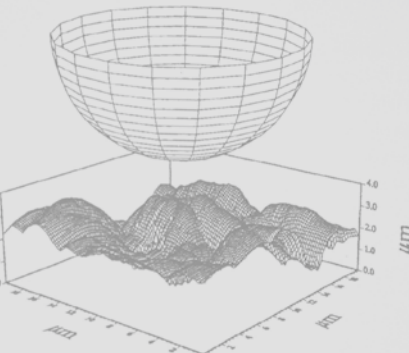
WWW.ELECTROPOLISH.BE

THE TREATMENT TRIANGLE

MECHANICAL TREATMENTS

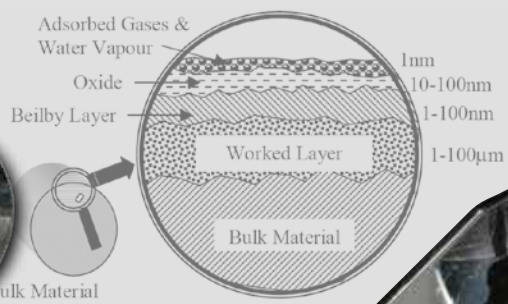
GRINDING - POLISHING AND BUFFING

Mechanical polishing is an abrading technique for improving the surface for decorative or functional purposes. Special mechanical polishing procedures are available for preparing metal surfaces for electro polishing in order to achieve the predefined roughness values.

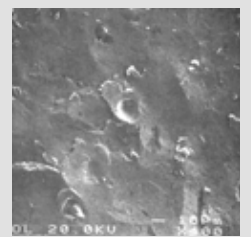


Measuring roughness parameters Ra, Rz, Rq.

Bead blasting is a cold working process which entails impacting the surface with shot (glass or ceramic particles) with force, sufficient to create plastic deformation. A dull surface with muffed defects is obtained. Localised surface tensions are transformed in a compressive residual stress layer promoting a higher fatigue strength.



Mirror finish: mechanically polishing with diamond based SS Polishing Compound to high lustre. Creates a smooth low roughness smeared surface with a high degree of image clarity.



CHEMICAL TREATMENTS

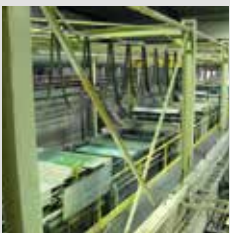
Treatment process where acids, bases and demineralized water reacting chemically with the surface material

- Chemical dissolution of rust
- Chemically removing welding discolorations
- Pickling according to international standards
- Passivation: post treatment transforming chromium to passive chromium oxide rich surface

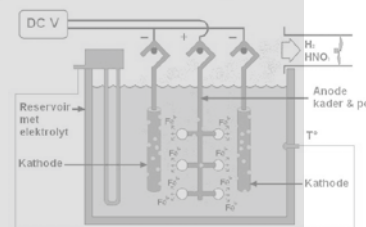


ELECTRO CHEMICAL FINISHES

The principle is using electricity to amplify and improve chemical reaction on the exposed anodic surface in order to erode (deburr), impoverish on iron (which dissolves more easy) and removing metallic and nonmetallic inclusions till the austenite structure and properties of the bulk metal are recovered. This aesthetic, smooth, easy to clean surface benefits from an optimised pitting corrosion potential.



- Distortion free process
- Micro-deburred surface with less friction
- Simultaneously deburrs as it polishes
- Applicable to objects of complex shape
- EHEDG, 3A, FDA,... compatible
- Reduces outgassing rates for vacuum applications
- UV resistant and durable
- Weldable after treatment
- Purified surface, no coating which can chip off
- Greatly reduces fouling, plugging, scaling and product buildup
- Reduces rouging
- Yields maximum corrosion resistance



HOW TO PROCEED ?

Treatments are applicable on cleaned Chromium Nickel Steel alloys (Stainless) (no nonmetallic soils such as paints, ink,...):

- new constructions
- used parts
- refurbished parts
- dimensions up to 2x2x10 m (transportable)
- from less than 1 kg up to more than 7T.



SEND US

A draft or photo with main dimensions - specify the zones to be treated - mention the material grade: (like AISI304 / DIN1.4301 or other) - locate places where the part can be fixed - indicate access holes.



Costs depend on surface - flush ability (for immersion processes) - cathode construction - material.

Short delivery times: 80% is to be treated within 5 working days.

Each part is quoted with a fixed price and gets if applicable some advice in order to achieve the best compromise between finish quality & cost.

Packo Inox nv is an SS only certified ISO 14001: 2004 and ISO 9001 company.

INNOVATIVE STAINLESS STEEL SURFACE SOLUTIONS... FOR CLEVER USERS

