Magnet Coating and Plating Comparisons

Coating	Description	Application	Standard Thickness	Autoclave (96H)	85C/85%(500H)	Salt Spray (240H)
Nickel	Silver white, ductile, semibright metal Radius on edges	Electrolytically Deposited Barrel or Rack	0.0004"-0.0020"	Pass Pass Pass	Pass Pass Pass	>48 H >48 H >48 H
Zinc	Silver white lustrious bright metal Radius on egdes	Electrolytically Deposited Barrel or Rack	0.0004"-0.0015"	96 H 96 H >24H	500 H 500 H >330 H	>48 H >48 H >48 H
Epoxy	Epoxy/Urethane Black or Gray color Radius on edges	Immersion Elecrodeposition Sprayed	0.0006"-0.0010"	96 H 96 H	Pass Pass	>24 H >24 H
Phosphate	Iron Phosphate barrier coating colorless	Dip	25-40 mg/ft^2	<24 H <24 H <24 H	<24 H <24 H <24 H	<24 H <24 H <24 H

- Phosphate treament should not be considered for long term corrosion protection.
- Nickel and Zinc have certain limitations when magnets are to be glued onto a substrate.
- Magnets should be tumbled to achieve a radius on all egdes before plating.

Above data is for general reference purposes only. Customers are advised to test their magnetic materials for corrosion protection based on their specific requirments and circumstances.