ROVAL Superior anti-corrosion paint

Equivalent anti-corrosion performance to hot-dip galvanizing

Anti-corrosion protection for steel
- Steel frame
- Solar panel

Restoration of galvanized surfaces
- Cut surfaces
- Non-plated parts

An alternative to hot-dip galvanizing
- Large parts
- Weak parts that are easily deformed under high temperatures

Renovation of galvanized surfaces
- Steel towers
- Mechanical parking lots

Applications
- Large structures
- Bolt connections
- Sign post foundations
- Welds
- End faces
- Lighting towers
- Pipes
- Steel gates
- Greenhouses
- Gratings

Before

After

Cold Galvanizing Compound
ROVAL
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Cold Galvanizing Compound

Equivalent anti-corrosion performance to hot-dip galvanizing.

ROVAL

Zinc Content
96%

Color Sample
Color: Gray

Finishes in a color similar to hot-dip galvanizing.

Silver Zinc Rich

RS

ROVAL SILVER

Zinc Content
83%

Color Sample
Color: Silver

Perfect Color Matching Metallic Spray
(No anti-corrosion effect)

MC

420ml Aerosol
Coverage: 3m²

Gray coating touch-up

Topcoat for ROVAL

420ml Aerosol

Before

After

Repair with ROVAL

Apply MC for color matching

Volume
420ml Aerosol
2.5kg
10kg
25kg

Theoretical coverage
0.5m²
5m²
20m²
50m²

Volume
420ml Aerosol
1.5kg
7kg
20kg

Theoretical coverage
0.4m²
3m²
14m²
40m²

Cold Galvanizing Compound

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Before

After

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Apply MC for color matching
**Features**  
Ready-to-use single liquid type

<table>
<thead>
<tr>
<th>Features</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Dilution</td>
<td>Dilution is unnecessary so painting is very easy.</td>
</tr>
<tr>
<td>No troublesome</td>
<td>No troublesome work, like mixing two liquids.</td>
</tr>
<tr>
<td>Aerosol product</td>
<td>Aerosol product lineup.</td>
</tr>
</tbody>
</table>

**Application methods**

<table>
<thead>
<tr>
<th>Method</th>
<th>Description</th>
</tr>
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<tbody>
<tr>
<td>Brush</td>
<td>ROVAL has to be applied DIRECTLY to metal surfaces.</td>
</tr>
<tr>
<td>Roller</td>
<td>Necessary steps ROVAL has to be applied DIRECTLY to metal surfaces.</td>
</tr>
<tr>
<td>Conventional/Air-less spray</td>
<td>Necessary steps ROVAL has to be applied DIRECTLY to metal surfaces.</td>
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</table>

**Necessary steps**

- **ROVAL has to be applied DIRECTLY to metal surfaces.**  
The direct contact between the zinc and the metal surface will result in cathodic reaction.

**Prohibited steps**

- **Never use primers.**  
Primer will compromise the performance of Roval products.

**3 important points**

<table>
<thead>
<tr>
<th>Point</th>
<th>Description</th>
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</table>
| 1     | **Surface preparation**  
Prepare the metal surface by sandblasting or with appropriate power tools.  
Remove all contamination on the surface such as moisture, oil, mil scale, rust, and old paint. |
| 2     | **Adequate agitation of product**  
Agitate the products well to obtain uniform density.  
*Only when the product thickens, use aromatic thinner such as Xylene. (Within 5% of paint weight)* |
| 3     | **Sufficient film thickness**  
Apply two coats. (Each coat: 40μm)  
Total dry film thickness = more than 80μm  
Do not spread the paint too thin.  
Anti-corrosion performance is proportional to dry film thickness.  
Coating interval: 30~60min |

**Wrong application**

- Applying product to rusted surfaces  
- Applying product to painted surfaces
Miyakojima Island is located in the far southern part of Japan, with roughly the same latitude as Florida, U.S.A. The Island is surrounded by a lot of deteriorating factors such as high temperature, high humidity, strong sunshine, and a salt-rich atmosphere.

**From normal paint to ROVAL**

<table>
<thead>
<tr>
<th>Before exposure</th>
<th>After 12 months</th>
</tr>
</thead>
<tbody>
<tr>
<td>Normal paint</td>
<td>ROVAL</td>
</tr>
<tr>
<td>After 7 years</td>
<td>ROVAL Silver</td>
</tr>
<tr>
<td>Rust everywhere</td>
<td>No rust</td>
</tr>
</tbody>
</table>

ROVAL has been certified to have equivalent anti-corrosion performance as hot-dip galvanizing by the Council for Construction Technology Review and Certification in Japan.

**Color weathering of ROVAL products**

- **ROVAL**
  - Before exposure
  - After 12 months

- **ROVAL SILVER**
  - Before exposure
  - After 12 months

- **Cold Galvanizing ROVAL Method**
  - ROVAL CORPORATION (Japan)
  - SHANGHAI ROVAL ZINC RICH PAINT CORPORATION
  - ROVAL (SHANGHAI) SALES & TRADING CORPORATION

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**Certified anti-corrosion performance**

- **JIS anti-corrosion paint + Phtalic topcoat**
  - Before exposure
  - After 36 months

- **Hot-dip galvanizing**
  - Before exposure
  - After 36 months

- **ROVAL**
  - Before exposure
  - After 36 months

- **ROVAL**
  - Before exposure
  - After 36 months

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