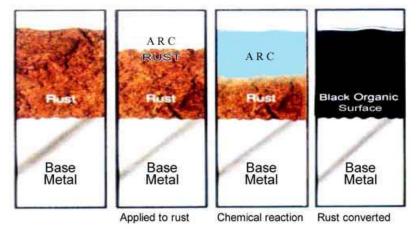


## **ANTI-RUST COATING**

## "ARC" is unique patented white organic copolymer latex

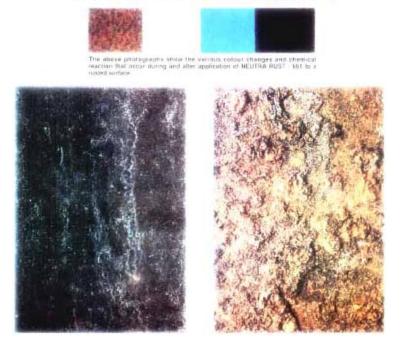
The ferrous surface to be converted on contact to a black, complex organic iron compound by the unique deoxygenating agent incorporated in the **ARC**.

- Acid and lead free
- Complete corrosion control
- must be applied to rusted ferrous metals



The above illustration shows a cross-section of rusted metal before, during and after treatment with ARC

EXTREMELY LOW PERMEABILITY FACTOR: 20-25g/m2/25j/m/day



Heavier the rust, darker the final color.

**Remark:** Do not remove all the rust from the surface, **ARC** needs the rust to carry out a complete conversion process.



#### **Procedures**

 Clean the surface thoroughly. This is to remove any surface salts r chemicals. Do not remove rust from the treating surface. In case of flake rust, scrap away and then clean by water. For surface having grease or oil, use water-based degreaser first, agitate, leave for a while and then wash off.



- 2. Remove any water puddles by dry cloth.
- 3. Use roller, brush or sprayer, apply **ARC** on the surface.
- 4. If there were small blisters on the surface, brush a second time before **ARC** gets dry.
- 5. **ARC** will dry up around 30 minutes depending on the temperature and humidity. The dry colour is black and the blisters will be gone.
- 6. Apply a second coat. The second coat should be 90 degrees normal to the previous coat a cross match method.
- 7. Leave the surface completely dry before installing topcoat.

#### Remarks:

- 1. For harsh environment such as marine, chemical etc., it is recommended to install one more coat.
- 2. **ARC** is compatible to almost all kinds of topcoat. For outdoor applications, it is recommended to select a topcoat which can stand for the UV lights. By then the anti-corrosion system can last more than five years.
- Any existing paint/coating surface in which they are still intact, you may just paint over the surface by ARC. For peeled paint/coating, scrap the peeled portions first, clean and apply ARC.
- 4. It is strongly recommended to apply **ARC** to a small test patch first. This is the method to work out the number of coats and the quantity required for the entire treating area.

#### STIR WELL BEFORE USE. No dilution is needed.

### **TEMPERATURE RANGE, USE AND STORAGE**

• ARC should not be applied to cold metal below 5 °C or hot metal above 40 °C, but will withstand temperature between -40°C and 60°C when dry hard.



- Store between 5 °C and 35 °C. Not to be continuously used or stored at recommended temperature extremes.
- Shelf life 12 months (+/- 2) after opening.
- Replace cap after use. Use in adequate ventilation. Gloves and goggles are recommended. Do not store in direct sunlight.

#### **DRYING TIMES - Each coat**

- Touch dry summer 15 minutes, winter 45 minutes.
- Between coats summer and winter 12 hours.
- If possible protects from rain during drying.



#### **CLEANING BRUSHES/SPILLAGE**

Use a detergent water wash and rinse with water or industrial solvents.

## ARC MUST NOT BE SWALLOWED.

- If swallowed, wash out mouth with milk or water and give milk or water to drink.
  If in any doubt as to effectiveness of treatment, obtain medical attention immediately. Harmful by inhalation treat symptomatically.
- Eyes splashes to the eyes should be removed by washing with eyewash solution or water for at least 10 minutes.
- Skin splashes should be washed off with water and soap as soon as possible.

# KEEP OUT OF REACH OF CHILDREN, SLIGHT IRRITANT.

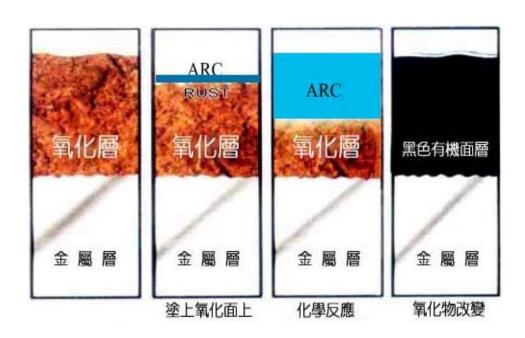
### NON-HARDOUS, NON-COMBUSTIBLE and DRY FILM IS FIRE RETARDANT.

Since we have no control over the working conditions, materials involved and the circumstances under which the purchaser stores, handles or uses this material, we make no warranty or condition, either express or implied, with respect to this material, or its fitness for any purpose or the results to be obtained from its use. If the purchaser does not accept the goods on these terms, they are to be returned at once, unopened.



# 鐵 銹 轉 換 器 (ARC)

需 塗 於 己 生 銹 的 金 屬 表 面 , 方 可 發 生 化 學 作 用 , 樣 其 達 致 永 久 的 防 銹 。



# 產品簡介

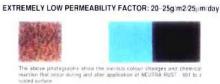
ARC是已獲專利的一種獨特的白色有機共聚物懸浮液,比重是 1.18 克/升在正常情況下,它會在鐵銹面乾後,通過化學作用,在 3 0 分鐘內將鐵銹轉換成一種黑色的不粘敷設物,形成一種獨立的復合鐵/鐵氧化物/有機化合物,從而對被處理過的表面形成一個完全保護層。ARC這種連續的化學反應與金屬的每層界面形成一種化學聯系,中和及通過化學作用轉換鐵銹。

這種黑色的化合物己完全中和,可被用作底漆,無需進一步處理。可用於標準或合成樹脂漆,油性漆,二合一漆或瀝青,柏油漆,包括云母鐵氧化物漆。ARC的毒性極低,且不含磷酸和鉛,故此名爲「綠色」抗銹轉換器。



## 優點

- 不含酸和鉛
- 塗於含鐵的氧化金屬表面
- 不用打鋼砂或擦砂紙
- 完全控制再生銹的機會







## 化學變化過程

ARC用於易銹蝕的含鐵金屬表面。被防護的含鐵金屬表面經ARC鐵銹轉換器組合出的獨特的游離氧制劑與一種黑色的、復雜的有機鐵化合物相互作用。這種防腐蝕機制是利用表面所有水份和氧氣消耗於整個化學過程中而製成的。同時,一種特別的共聚物懸浮液,加上39%的固體物,乾了後就形成對氧氣和水份的隔離層。使處理面不會再銹蝕下去。

# 使用方法

- 1. 處理金屬表面之前,須將表面油脂清除(例如使用Neutra Clean)及鋼絲刷輕刷,以除去那些鬆懈的微粒及灰塵。
- 2. 噴或塗的方式使用ARC。
- 3. 生銹的表面所形成的黑色化合物保護層則無需清洗或鈍化。
- 4. 根據鐵銹的密度,可使用兩層或更多層的ARC。ARC可保留此黑色保護層,或在其面上加多一層漆。
- 5. 完成。

不要完全除去生銹表面,只簡單地除去寬鬆的銹即可。



## 現有的銹蝕控制系統劣處

現有的銹蝕控制系統只能局部成功,因為它們不能有效地對付含鐵金屬腐蝕的三個基本因素:表面污染物的清除,從金屬表面徹底清除水份和氧原及在處理過的表面用不可滲透的薄膜加以防護。



## 原理

新形成的鐵銹是化學反應後的氧化鐵氫氧化物(Fe(OH)3)或與氧氣(空氣)及水份反應後的鐵。根據暴露程度的不同,鐵可與氧氣結合形成各種化合物。其中一種是磁鐵礦 magnetite (Fe3O4)或氧化亞鐵(Fersoferric oxide)結合,形成一種有機氧化鐵合成物。其性質與磁鐵礦相近,已被鈍化。ARC的這種在塗料系統中形成的化學反應是持續的。

## 技術數據

合成物	含有螯合物的共聚物懸浮液
外觀	顏色 - 乳白色、米色溶液;氣味淡。應用後會發生化學反應, 變成果綠色,並變乾成黑色的,半光澤性的底 漆。
重量	5 公升= 6 公斤 1 美加侖 = 10 磅
粘稠度	600 - 900 CPS - Brookfield No. 7 @ 25°C
固體物含量	固體量 = 39%
比重	1.2
pH 値	1.0 - 2.0
閃燃點	58°C (134°F) - ATSM D-93 Pensky Martens Closed Cup.
不可燃性	乾的薄膜是具有火燄阻延性 BS 467 第7部分第一級(1987)測試合格
毒性	低於 2000 mg/kg,會沾污皮膚 ,可立即清洗去
儲存方法	在 5°C (40°F)與 30oC (86°F)之間,不得冷凍。使用前先搖動
保質期	12 個月(開瓶後)



粘著度	在生銹的鋼面 GtO 上畫交叉陰影線,會少於 5%被除去。
滲透性	20 - 25 gm/m²/25μm/day
化學抵抗力	對濺出的酸與鹼均可抵抗。對與芳香族溶劑長久接觸,不具抵抗力。與溶劑長久接觸將引起復原性的變軟。
施工溫度	不適宜露點以下的冷金屬或 40oC (105oF)以上的熱金屬。 在 -50oC (-60oF)至 50oC(112oF)之間連續使用,會達到最好保護效果。

# 平均覆蓋率: 視表面狀況而定(硬度、光滑度或銹層深度等)

1 公升	塗一層,可用於 75 - 100 micron 厚的濕薄膜上,覆蓋至 10 -12 米 2,產生 24 - 40 micron 厚的乾薄膜。
1美加侖	覆蓋 480 平方英尺@乾薄膜 1MIL(千分之一英寸)厚
噴塗須知	在 30:1 的氣泵上,噴咀尺寸為 11 thou
	GFG 加入空氣@60 磅/平方英寸或加壓
乾透時間	每層塗料(大概)接觸面乾一般在十五至四十五分鐘之間,視溫度及相對濕度而定
	中間層乾 - 接觸面乾後 1 小時。在乾的過程中避免被雨水破壞
	在一些特別地區,如水池、地下室等,高濕度及低溫會延長乾透時間,欲加快乾透過程,須有持續的暖空氣流通。