

DR-238G

DR-238G 由磷酸盐、钾盐、磷酸等组成。属中性除锈剂

DR-238G

Neutral Deruster and Descaler For Steel and Cast Iron

DR-238G is a unique and patented product, developed by Henkel Surface Technologies. DR-238G is an activated sequestrant system designed to remove rust and scale, both light and heavy, from iron and steel at a neutral pH of 6.0 to 7.0. It is a clear pale yellow liquid, suitable for virtually any application, particularly where low toxicity and corrosivity are vital. One intended application for DR-238G is for the reconditioning of auto parts such as cylinder blocks, brake master cylinders, brake shoes, and various engine components where rust and scale removal can be accomplished while staying within tight dimensional tolerance. The product works at room temperature, as well as at elevated temperatures up to 120°F (49°C), and it does not attack brass, copper, zinc, aluminum, etc.

DR-238G eliminates the danger of hydrogen embrittlement which is a normal problem with the use of pickle acids or rust removal. In the same sense, DR-238G can also be used to substitute for alkaline cyanide desmutting and descaling to eliminate the danger of dealing with cyanides and the high cost for its waste treatment.

EQUIPMENT RECOMMENDATIONS

300 Series stainless tanks and heating equipment are suitable for DR-238G.

OPERATING INSTRUCTIONS

Concentration: 5 to 20% by volume DR-238G

pH: 6.0 to 7.0 (optimum 6.5)
Temperature: Ambient to 120°F (49° C)
Time: Immersion from 10 to 30 minutes for light rust
Immersion from 4 to 6 hours for heavy rust

Typical light rust, for example is removed in the following manner:

Concentration: 5% by volume DR-238G
Temperature: Ambient to 120°F (50° C)
Time: 10 minutes at 120°F (50° C)
30 minutes at ambient

Each gallon of DR-238G used will dissolve up to one half pound of rust.

NOTE: During use, the pH of the DR-238G will tend to rise. When it reaches pH 7.0, it needs to be lowered to pH 6.5 by slow and careful addition of sulfuric acid. The DR-238G bath is considered to have reached its useful life when the solution becomes very viscous because of high dissolved iron content at which the bath must be dumped and recharged.

SOLUTION CONTROL

1. Pipette 50 mls of DR-238G bath sample into an Erlenmeyer flask.
2. Add 2 drops of Phenolphthalein indicator.
3. Add diluted Caustic Soda (1.0N Caustic is suitable) until purple.
4. Neutralize with 1.0N Sulfuric Acid until solution turns colorless.
5. Add 3 to 4 drops of Bromphenol blue indicator.
6. Titrate with 1.0N Sulfuric Acid to a yellow end point.
7. CALCULATIONS:

Titration ml x 1.2 = % by volume DR-238G

HEALTH AND SAFETY

Please consult the Material Safety Data Sheet for more details on the safe handling of this product.

PACKAGING

DR-238G is a clear yellow liquid packaged in 55 gallon non-returnable polyethylene drums.

STORAGE

DR-238G should be stored in original sealed containers in a cool, dry area away from alkaline materials. KEEP FROM FREEZING

DISPOSAL

Dispose of this product according to the local, state and federal regulations. Refer to Material Safety Data Sheet for specific disposal criteria relating to this product.