

NOVA™ APR2511

Maleic Anhydride Modified Polyethylene for Steel Composite Pipe

CHARACTERISTICS

- **Advanced adhesion to substrates**
- **Excellent adhesive durability**
- **Maintain polyethylene property**
- **Compatible with polyethylene and good processibility**

APPLICATIONS

- **Advanced adhesive resin for steel composited co-extrusion pipe**
- **Co-extrusion of polyethylene with steel and other plastic materials, which need a chemical resistance. Especially, multi-layer pipe as oil and gas pipe application**

Description

NOVA™ APR2511 is especially suitable for multi-layer steel pipe coating systems. Polyethylene based adhesive resin developed by TWO H Chem, NOVA™ APR2511 has easy processability, advanced adhesion strength and long durability.

| Property | Test Method | Unit | Test Value |
|---------------------------------------|---|--------------------|------------|
| Melt Index (190℃ / 2.16kg) | ISO 1133 ASTM D1238 | g/10 min | 5.0 |
| Density | ISO 1183-3 ASTM D1505 | g/cm ³ | 0.930 |
| Melting Point (DSC) | ISO 3146 ASTM D3418 | ℃ | 124 |
| Vicat Softening Point | ASTM D1525 | ℃ | 102 |
| Brittleness Temperature | ASTM D746 | ℃ | < -70 |
| Tensile Strength | ASTM D638 | kg/cm ² | 250 |
| Elongation | ASTM D638 | % | > 600 |
| Adhesion Strength (to Steel Plate) | TWO H Method | kg/2.5cm | > 20 |
| Visual Appearance | Naturally White Pellet | | |
| Packaging | 25 Kg PP Woven Kraft Paper Bag / PE Inner Bag 500 Kg Flecon Bag / PE Inner Bag | | |

The product described herein is manufactured by TWO H Chem Ltd. NOVA™ is a trademark of TWO H Chem Ltd. The above data and results obtained are average values from laboratory testing and are not to be construed as specifications.

Safety and Handling Considerations

Material Safety Data (MSD) sheets for are available from TWO H Chem Ltd. and its distributors. MSD sheets are provided to help customers satisfy their own handling, safety, and disposal needs, and those that may be required by locally applicable health and safety regulations, such as OSHA (U.S.A.), or WHMIS (Canada). MSD sheets are updated regularly; therefore, please request and review the most current MSD sheets before handling or using any product. All users of our products are urged to retain and use the MSDS. The following comments apply only to materials which are used unmodified and processed according to good manufacturing practices; additives, processing aids or other materials used in formulating, fabrication and/or finishing steps have their own safe-use profile and must be investigated separately.

NOTICE REGARDING PROHIBITED USE RESTRICTIONS: TWO H Chem Ltd. and its distributors do not recommend and will not knowingly provide any of its products, including samples, for use as: Components of, or packaging for, tobacco products; Components of products where the end product is intended for human or animal consumption; In any application that is intended for any internal contact with human body fluids or body tissues; As a critical component in any medical device that supports or sustains human life; In any product that is designed specifically for ingestion or internal use by pregnant women; and in any application designed specifically to promote or interfere with human reproduction.

Disclaimer: No freedom from any patent owned by TWO H Chem Ltd. or others is to be inferred. Because use conditions and applicable laws may differ from one location to another and may change with time, the Customer is responsible for determining whether products and the information in this document are appropriate for Customer's use and for ensuring that Customer's workplace and disposal practices are in compliance with applicable laws and other governmental enactments. TWO H Chem Ltd. and its distributors assumes no obligation or liability for the information in this document. TWO H Chem Ltd. and its distributors do not guarantee testing accuracy and will make no guarantee of product performance, safety or suitability for an application, either expressed or implied, when used alone or in combination with other products or materials. TWO H Chem and its distributors assumes no obligation or liability for any advice furnished and/or damage or injury sustained as a result of the use of its products. **NO WARRANTIES ARE GIVEN; ALL IMPLIED WARRANTIES OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR USE ARE EXPRESSLY EXCLUDED.**

Issue date : February 03, 2012 (Legislate)

Revision date : April 14, 2020 (3rd)