

# Product Data Sheet

## SIDISTAR® R320

### 1. Product Description

SIDISTAR® R320 is a specially designed light-coloured process modifier consisting of spherical, submicron particles of amorphous silicon dioxide. The nature of the product allows excellent dispersion of these particles in the elastomer matrix. This leads to improved dispersion of all compound ingredients and a better flow, allowing higher extrusion speeds and smoother surface of the end product. The product is supplied in a densified, free flowing, form.

### 2. Application

SIDISTAR® R320 has been designed for usage in rubber compounds. Areas of use include flame retardant cable compounds; anti-vibration parts; hoses; roofing membranes; conveyor belts etc.

### 3. Packing

The product is available in big bags as well as in LDPE small bags.

| Description                             | Big Bags                                     | Small Bags                                 |
|---|--|--|
| Bags on pallet                          | 1 big bag                                    | 40 small bags                              |
| Net weight 1 bag                        | 600 kg                                       | 20 kg                                      |
| Net weight on pallet                    | 600 kg (1223 lb)                             | 800 kg (1764 lb)                           |
| Gross weight                            | 620 kg (11367 lb)                            | 820 kg (1808 lb)                           |
| Bag dimensions (L x W x H)              | 106 x 106 x 142 cm (41.7 x 41.7 x 55.9 in)   | 73 x 46 x 20 cm (28.7 x 18.1 x 7.9 in)     |
| Discharge spout                         | Ø: 42 cm (16.5 in)<br>Length 70 cm (27.6 in) |  |
| Bag material                            | Coated woven polypropylene fabric            | LDPE bag                                   |
| Cover / protection                      | LDPE shrink hood                             | LDPE shrink hood                           |
| Pallet                                  | Fumigated wood                               | Fumigated wood                             |
| Pallet dimensions incl bags (L x W x H) | 105 x 105 x 143 cm (41.3 x 41.3 x 56.3 in)   | 114 x 114 x 156 cm (44.8 x 44.8 x 61.4 in) |

### 4. Storage Conditions

The product is recommended to be stored in a covered dry place, protected from direct UV light. Recommended storage temperature between +5 °C and +40 °C (+45 °F and +104 °F). It's important that the minimum temperature is > 5 °C (9 °F) above the dew point. Recommended relative humidity < 85 %.

### 5. Shelf Life

We recommend that the product should be used within 2 years from production date.

### 6. Health, Safety and Environment

The product safety information, as well as REACH information, can be found on our website: [www.sidistar.com](http://www.sidistar.com).

### 7. Additional Information and contact

For further information about SIDISTAR®, a contact list can be found on our webpage [www.sidistar.com](http://www.sidistar.com). You are also welcome to send your questions to us by email: [info@sidistar.com](mailto:info@sidistar.com)

### 8. Test Methods

Material data given in this product specification refer to analysis according to Elkem internal standard test methods, which are available upon request.

### 9. Version / Updates

The information on this product specification may be subject to change. Please check our website [www.sidistar.com](http://www.sidistar.com), for latest updates, and discard all older versions.

SIDISTAR® is a registered trademark of Elkem ASA.

This product data sheet is property of Elkem ASA and may not without its written permission be used, copied or made available to others. The receiver is responsible for any misuse.

Revised April 2020 © Copyright Elkem ASA

# SIDISTAR®

THE INORGANIC POLYMER ADDITIVE

# SIDISTAR<sup>®</sup> R320

## 10. Physical Data and Chemical Properties

| Properties   | Test Method | Unit              | Limits:     |
|--|-------------|-------------------|-------------|
| SiO <sub>2</sub> ( <i>Silicon dioxide, amorphous</i> ) | ESM-LAB-18  | %                 | 96.0 – 99.0 |
| C ( <i>Carbon</i> )                                    | ESM-LAB-05  | %                 | ≤ 0,20      |
| Fe <sub>2</sub> O <sub>3</sub> ( <i>Iron oxide</i> )   | ESM-LAB-17  | %                 | ≤ 0.25      |
| Cu ( <i>Copper</i> )                                   | ESM-LAB-17  | ppm               | ≤ 100       |
| Mn ( <i>Manganese</i> )                                | ESM-LAB-17  | ppm               | ≤ 300       |
| H <sub>2</sub> O ( <i>Moisture, when packed</i> )      | ESM-LAB-02  | %                 | ≤ 0.8       |
| Loss on Ignition (L.O.I.) @ 950 °C                     | ESM-LAB-03  | %                 | ≤ 0.60      |
| pH-value ( <i>fresh</i> )                              | ESM-LAB-10  |                   | 6.5 – 8.5   |
| Bulk Density ( <i>when packed</i> )                    | ESM-LAB-08  | kg/m <sup>3</sup> | 400 - 700   |

### Other Properties

(*measured on undensified material*)

Specific surface area (BET)

m<sup>2</sup>/g

18 - 25

Median particle size

µm

0.15

Specific Gravity

g/cm<sup>3</sup>

2.2

### Typical Values\*\*

\*\* Typical values are for indicational use only, values are not part of Elkem Silicon Materials standard analysis.

SIDISTAR<sup>®</sup> is a registered trademark of Elkem ASA.

This product data sheet is property of Elkem ASA and may not without its written permission be used, copied or made available to others. The receiver is responsible for any misuse.

Revised April 2020 © Copyright Elkem ASA

**SIDISTAR<sup>®</sup>**

THE INORGANIC POLYMER ADDITIVE