

# PuriStar<sup>®</sup> R9-12

## Lead Oxide on Alumina Extrudates

**BASF PuriStar R9-12 is a cylindrical adsorbent for removing arsine and sulfur compounds from hydrocarbon streams in the presence of hydrogen or multiple unsaturated components.**

BASF PuriStar R9-12 is an adsorbent consisting of lead oxide on a proprietary cylindrical carrier with a nominal diameter of 3 mm.

BASF will stop offering this material and only material on stock is still available. Please contact BASF for further details.

### Product Applications

R9-12 is used for the removal of trace levels of arsine and sulfur from gaseous or liquid petrochemical feedstocks and process streams.

R9-12 is applicable for the purification of hydrogen rich gases (e.g. cracked gases), where other metal oxides cannot be used due their reactivity toward the hydrogen present in the gas stream.

Because R9-12 does not promote polymer formation, it is especially suitable for streams containing acetylenes or dienes, which tend to foul other types of guard beds materials. R9-12 is excellent for C2 or C3 guard beds in steam crackers.

Process and composition dependent, temperatures between ambient and up to 60 – 80°C (140 – 175°F) are possible. The catalyst itself is stable up to 350°C (660°F).

Before using the material, a drying step is recommended. Please contact BASF for further details.

### Alternative Products

An alternative product based on lead oxide and offered by BASF is E 315 available as spheres with a nominal diameter of 1/8" (approx. 3.2 mm)

Newer alternatives are combinations of

- PuriStar R9-PAR S3
- PuriStar R9-SR S3

Details on these products can be found in the respective product data sheets. Please contact BASF for further details.

### Typical Properties

#### Chemical

PbO, wt. %	18 - 22
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#### Physical

Bulk Density, kg/l	0,65
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Knife Edge Hardness, N	Min. 40
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### Packaging (Typical)

- 1150 l Flexible IBC with 650 kg net per packaging

### Shipping Point

- DeMeern, The Netherlands

## About Us

BASF's Catalysts division is the world's leading supplier of environmental and process catalysts. The group offers exceptional expertise in the development of technologies that protect the air we breathe, produce the fuels that power our world and ensure efficient production of a wide variety of chemicals, plastics and other products, including advanced battery materials. By leveraging our industry-leading R&D platforms, passion for innovation and deep knowledge of precious and base metals, BASF's Catalysts division develops unique, proprietary solutions that drive customer success.

**BASF - We create chemistry**

### Americas

BASF Corporation  
25 Middlesex/Essex Turnpike  
Iselin, New Jersey, 08830, USA  
Tel : +1-732-205-5000  
Fax: +1-732-205-7725  
Email: [catalysts-america@basf.com](mailto:catalysts-america@basf.com)

### Asia Pacific

BASF (China) Company Limited  
300 Jiang Xin Sha Road,  
Pudong, Shanghai 200137  
P.R. China  
Tel: +86-21-2039 2549  
Fax: +86-21-2039 4800-2549  
Email: [catalysts-asia@basf.com](mailto:catalysts-asia@basf.com)

### Europe, Middle East, Africa

BASF De Meern BV Catalysts  
The Netherlands  
Tel: +31-30-666 9437  
Email: [catalysts-europe@basf.com](mailto:catalysts-europe@basf.com)

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