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### 1 Identification of the substance / preparation and of the company

**Product:** Tenax®-J HTA40 E13  
Tenax®-E HTA40 E13

**Registration number:** not applicable

**Use:** filament yarn

**Identified use:** none

**Method of operation:** See product information.

**Company:** Toho Tenax Europe GmbH  
Kasinostr. 19-21  
42103 Wuppertal / GERMANY

**Phone:** +49 202 32-3435

**Fax:** +49 202 32-3303

**Homepage:** www.tohotenax-eu.com

**E-mail:** safety@tohotenax-eu.com

**Emergency phone:** +49 (0) 228-19240 (24h)

**Responsible:** safety@tohotenax-eu.com

### 2 Hazards identification

**Physico-chemical hazards:** See chapter 10.  
In the supplied form the product is not explosive at all ; however the build-up of fine dust can lead to a risk of dust explosions.

**Human health dangers:** See chapter 11.  
May produce an allergic reaction.

**Environmental hazards:** No particular hazards known.

**Other hazards:** none

**Hazard symbols:** none

**R-phrases:** May produce an allergic reaction.

### 3 Composition / Information on ingredients

0,1 - < 1%	Reaction product: bisphenol-A-(epichlorhydrin) Epoxy resin (number average molecular weight $\leq$ 700)
Xi-N, R36/38-43-51/53	CAS: 25068-38-6, EINECS/ELINCS: 500-033-5, EU-INDEX: 603-074-00-8, ECBnr:
> 95%	Carbon fiber on basis polyacrylonitrile (Carbon)
	CAS: 308063-67-4(7440-44-0), EINECS/ELINCS: Polymer (231-153-3), EU-INDEX: , ECBnr:

**Comment on component parts:** For the wording of the listed risk phrases refer to section 16.

### 4 First aid measures

**General information:** Change soaked clothing.

**Inhalation:** Ensure supply of fresh air.  
In the event of symptoms seek for medical treatment.

**Skin contact:** In case of contact with skin wash off immediately with soap and water.  
Consult a doctor if skin irritation persists.

**Eye contact:** In case of contact with eyes rinse thoroughly with plenty of water and seek medical advice.

**Ingestion:** Supply with medical care.  
Induce the patient to vomit of his own accord only if fully conscious.  
Rinse out mouth and give plenty of water to drink.

**Advice to doctor:** treat symptomatically

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### 5 Fire-fighting measures

**Suitable extinguishing media:** foam, dry powder, water spray jet, carbon dioxide

**Extinguishing media that must not be used:**

full water jet

**Special exposure hazards arising from the substance or preparation itself or combustion products:**

risk of formation of toxic pyrolysis products, carbon monoxide (CO), not combusted hydrocarbons

**Special protective equipment for firefighters:**

Do not inhale explosion and/or combustion gases.

Use self-contained breathing apparatus.

**Additional information:**

Fire residues and contaminated firefighting water must be disposed of in accordance within the local regulations.

### 6 Accidental release measures

**Personal precautions:** not applicable

**Environmental precautions:** not applicable

**Methods for cleaning up:** Take up mechanically.

Dispose of absorbed material in accordance within the regulations.

### 7 Handling and storage

**Advice on safe handling:** No special measures necessary if used correctly.

**Advice on protection against fire and explosion:**

Dust can form an explosive mixture with air.

Keep away from sources of ignition - refrain from smoking.

**Requirements for storage rooms and vessels:**

No special measures necessary.

**Advice on storage compatibility:** Do not store together with oxidizing agents.

**Further information on storage conditions:**

store in a dry place, recommended storage temperature: < 50 °C, relative humidity: < 85 %

### 8 Exposure controls / personal protection

**Additional advice on system design:**

Ensure adequate ventilation on workstation.

**Ingredients with occupational exposure limits to be monitored:**

> 95%

Carbon fiber on basis polyacrylonitrile (Carbon), 0,5mg/m<sup>3</sup>\*, General remarks: fibres/ml (respirable fibres)

\* WEL: Workplace exposure limit

**Respiratory protection:** short term: filter apparatus, filter P1

**Hand protection:** butyl rubber, > 120 min (EN 374)

**Eye protection:** safety glasses

**Skin protection:** light protective clothing

**General protective measures:** Avoid contact with eyes and skin.

Do not inhale dust.

**Hygiene measures:** Do not eat, drink, smoke or take drugs at work.

Wash hands before breaks and after work.

Use barrier skin cream.

**Delimitation and monitoring of the environmental exposition:**

not determined

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**9 Physical and chemical properties**

<b>Form:</b>	fibre
<b>Color:</b>	black
<b>Odor:</b>	odourless
<b>pH-value:</b>	not applicable
<b>pH-value [1%]:</b>	not applicable
<b>Boiling point [°C]:</b>	not applicable
<b>Flash point [°C]:</b>	not determined
<b>Flammability [°C]:</b>	not applicable
<b>Lower explosion limit:</b>	not applicable
<b>Upper explosion limit:</b>	not applicable
<b>Oxidizing properties:</b>	no
<b>Vapour pressure [kPa]:</b>	not applicable
<b>Density [g/ml]:</b>	1,7 - 2,0
<b>Density at [°C]:</b>	20
<b>Bulk density [kg/m³]:</b>	not applicable
<b>Solubility in water:</b>	immiscible
<b>Partition coefficient [n-octanol/water]:</b>	not determined
<b>Viscosity:</b>	not applicable
<b>Relative vapour density determined in air:</b>	not applicable
<b>Evaporation speed:</b>	not applicable
<b>Melting point [°C]:</b>	ca. 3500
<b>Autoignition temperature [°C]:</b>	not applicable
<b>Decomposition temperature:</b>	> 650 (in air), preparation > 290

**10 Stability and reactivity**

<b>Hazardous reactions:</b>	Reactions with strong oxidizing agents. Accumulation of fine dust may entail the risk of a dust explosion in the presence of air.
<b>Hazardous decomposition products:</b>	No hazardous decomposition products known.

**11 Toxicological information**

<b>Acute oral toxicity:</b>	not determined
<b>Acute dermal toxicity:</b>	not determined
<b>Acute inhalational toxicity:</b>	not determined
<b>Irritant effect on eye:</b>	not determined
<b>Irritant effect on skin:</b>	not determined
<b>Sensitization:</b>	not determined
<b>Subacute toxicity:</b>	not determined
<b>Chronic toxicity:</b>	not determined
<b>Mutagenicity:</b>	not determined
<b>Reproduction toxicity:</b>	not determined
<b>Carcinogenicity:</b>	not determined
<b>Experiences made in practice:</b>	Fiber abrasion can cause mechanical skin irritation. None fibres with diameter below 3 micrometers. The filament is not breathable (IARC).
<b>General remarks:</b>	Toxicological data are not available. The product was classified on the basis of the calculation procedure of the preparation directive.

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**12 Ecological information**

**Fish toxicity:** not determinated  
**Daphnia toxicity:** not determinated  
**Behaviour in environment compartments:**  
not determinated  
**Behaviour in sewage plant:** not applicable  
**Bacteria toxicity:** not determinated  
**Biological degradability:** not determinated  
**COD:** not determinated  
**BOD 5:** not determinated  
**AOX-advice:** not applicable  
**2006/11/EC:** none  
**General information:** Ecological data are not available.

**13 Disposal considerations**

**Product:** Coordinate disposal with the authorities if necessary.  
**Contaminated packaging:** Uncontaminated packaging may be taken for recycling.  
Packaging that cannot be cleaned should be disposed of as for product.  
**Waste no. (recommended):** 160304

**14 Transport information**

**Classification according to ADR:** NO DANGEROUS GOODS  
- **Classification Code:**  
- **Label:**  
  
- **ADR LQ**  
- **ADR 1.1.3.6 (8.6):** Transport category (tunnel restriction code): -  
  
**Classification according to IMDG:** NOT CLASSIFIED AS "DANGEROUS GOODS"  
- **EMS:**  
- **Label:**  
  
- **IMDG Limited Quantities:**  
  
**Classification according to IATA:** NOT CLASSIFIED AS "DANGEROUS GOODS"  
- **Label:**

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**15 Regulatory information**

<b>Exposure scenario:</b>	not determinated
<b>Chemical safety report:</b>	not determinated
<b>Labelling:</b>	The product is classified and labelled in accordance within EC-directives. All chemicals in this product are included on the "European Inventory of Existing Commercial Chemical Substances - EINECS or ELINCS".
<b>Hazard symbols:</b>	none
<b>Contains:</b>	Reaction product: bisphenol-A-(epichlorhydrin) Epoxy resin (number average molecular weight $\leq$ 700
<b>R-phrases:</b>	May produce an allergic reaction.
<b>S-phrases:</b>	none
<b>Special labelling:</b>	Contains epoxy-containing compounds. Observe manufacturer's instructions.
<b>Authorisation, TITEL VII:</b>	not applicable
<b>Restrictions, TITEL VIII:</b>	not applicable
<b>EEC-REGULATIONS:</b>	1967/548 (2008/58, 30. ATP/ 31. ATP); 1991/689 (2001/118); 1999/13; 2004/42; 648/2004; 1907/2006.
<b>TRANSPORT-REGULATIONS:</b>	DOT-Classification, ADR (2009); IMDG-Code (34. Amdt.); IATA-DGR (2009).
<b>NATIONAL REGULATIONS</b>	EH40/2005 Workplace exposure limits with amendments October 2007.

**16 Other informations**

<b>R-phrases (Chapter 03):</b>	R 36/38: Irritating to eyes and skin. R 43: May cause sensitisation by skin contact. R 51/53: Toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.
<b>Observe employment restrictions for people:</b>	no
<b>VOC (1999/13/CE):</b>	not applicable
<b>Customs Tariff:</b>	not determinated

Disclaimer: This information is based on our present knowledge. However, this shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

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