

2-Hydroxyethyl Acrylate (HEA)

English alias: Hydroxyethyl acrylateHEA; 2 - (Acryloyloxy) ethanol;
2-Hydroxyethylester kyseliny akrylove; 2-hydroxyethylesterkyselinyakrylove;
2-Propenoicacid ; 2-hydroxyethylester; beta-Hydroxyethyl acrylate;
beta-hydroxyethylacrylate; Bisomer 2HEA; bisomer2hea; HEA

Characteristic Index

CAS No.: 818-61-1

EINECS No. 212 -454-9

Acrylic acid 2 - hydroxy ethyl Properties

Colorless liquid.

Molecular formula: C₅H₈O₃

Molecular Weight: 116.12

Quality and Index:

Appearance: colorless transparent liquid

Melting point: -60 °C & deg

Boiling point :90-92°C (1.6kPa) ,74-75°C (667Pa),

Refractive index :1.449-1.451

Bright spot: 99°C

Density: 1.106

Water solubility: soluble

Relative density: 1.1098 (20 / 4 °C),

Viscosity 5.34mPa · s (25°C). Miscible with water, soluble in common organic solvents. General inhibitor of goods containing hydroquinone monomethyl ether 400ppm.

Water solubility: soluble colorless liquid.



Storage Temperature:

Keep away from sources of ignition. Store in a cool place in the original container and protect from sunlight. Keep refrigerated. (Store below 4C.) Store in a tightly closed container. Store protected from moisture. Store protected from light.

Acute toxicity:

Oral - Rat LD50: 650 mg / kg

Extinguishing Media: Dry powder, foam, sand, carbon dioxide, water spray

Fire hazards:

Behavior in Fire: Containers may explode

Explosive hazardous characteristics:

Case of fire, combustible high fever. With strong oxidant chemical reaction can occur. Easy self-polymerization, the polymerization reaction with the abrupt rise of temperature increase. In case of high fever, increased pressure within containers, cracking and the risk of explosion.

Storage features:

Low temperature and dry air warehouses

Flammable hazardous characteristics:

Flammable; stimulate the release of thermal decomposition fumes

Health hazards:

Inhalation causes irritation of nose and throat. Contact with liquid irritates eyes and skin.

HEMA purposes:

Radiation curing systems for the reactive diluent and crosslinking agent, crosslinking agent may be used as resins, plastics, rubber modifiers, solvent-and emulsion-type acrylic adhesive cross-linking monomer, and the preparation of hot curing, light curing, adhesives, textile treatment agents

Acrylic acid 2 - hydroxy ethyl description:

07QTMFCD00002865AT1750000969853 water is harmful, even a small amount of product into the ground water would also be dangerous without proper governmental permits, not the material released to the environment 1, the hydrophobic parameter calculation reference value (XlogP): -0.22, hydrogen bond donor number: 13, H-bond acceptors: 34, number of rotatable bonds: 45, topological molecular polar surface area (TPSA): 46.56, the number of heavy atoms: 8 normal temperature and pressure stability, heat and light to avoid UV radiation oxides free radical initiator contacts stored in dry inert gas, to maintain the sealed container, stored in a cool, dry place

Acrylic acid 2 - hydroxy ethyl Generation

Acrylic acid and ethylene oxide in the catalyst and the inhibitor in the presence of the addition reaction of acrylic acid 2 - hydroxy ethyl ester crude product, after degassing, distillation products consumption of raw materials fixed: acrylic 710kg / t, ethylene oxide 485kg / t.

Package: 25kg / plastic barrel and 200kg / steel barrel with inner plastic or plastic barrel