

INTRODUCTION

EBECRYL® 160 is a trifunctional diluting oligomer which polymerizes when exposed to sources of free radicals. It is compatible with a wide range of acrylated resins. Cured films containing EBECRYL® 160 provide more flexibility than TMPTA while retaining hardness, abrasion resistance and high gloss properties.

PERFORMANCE HIGHLIGHTS

EBECRYL® 160 is characterized by:

- Low viscosity
- High acrylate functionality
- Light colour
- Low irritancy

UV/EB cured products based on EBECRYL® 160 are characterized by the following performance properties:

- Good cure response
- Good flexibility while retaining hardness
- Improved adhesion
- Good abrasion resistance

The actual properties of UV/EB cured products also depend on the selection of the other formulation components, such as reactive diluent(s), additives and photo initiators.

SUGGESTED APPLICATIONS

EBECRYL® 160 is a reactive diluent compatible with a wide range of acrylated resins used in radiation curing applications. Hardness, abrasion resistance, and high gloss properties make EBECRYL® 160 popular for overprint varnishes, inks and coatings.

TYPICAL VALUE

Appearance	clear liquid
Höppler viscosity at 25 °C, mPa.s	80
Colour, Apha	max. 60
Acid value, mg KOH/g	max. 1

PHYSICAL PROPERTIES

Density, g/cm ³	1.09
Molecular weight, theoretical	450
Functionality, theoretical	3
Theoretical formula weight	428

PRECAUTION

The following is a summary of the precautions to be taken when handling this product. Please refer to the Safety Data Sheet for further details.

The toxicological properties of this material have not been fully determined. Products of this type can be expected to be eye and skin irritant and have the potential to cause sensitization or other allergic responses. Appropriate precautions should be taken to avoid eye and skin contact and to avoid inhalation of the aerosols or vapours.

Consult the relevant Safety Data Sheet for appropriate handling procedures and protective equipment prior to using this or any other material referred to in this bulletin.

See Safety Data Sheet for emergency and first aid procedures.

STORAGE AND HANDLING

Care should be taken not to expose radiation curable products to temperatures exceeding 40°C for prolonged periods or to direct sunlight. This might cause uncontrollable polymerization of the product with generation of heat.

Storage and handling should be in stainless steel, amber glass, amber polyethylene or baked phenolic lined containers. Do not store this material under an oxygen free atmosphere. Use dry air to displace material removed from the container. This material should not be stored for more than 2 years.

STATUTORY LABELING

For Statutory Labeling information, please refer to Safety Data