

## Kalama® VITROFLEX® B Product Description

VITROFLEX B is a unique blend of dibenzoates specially tailored for the polysulfide market. This benzoate plasticizer is useful particularly in the B-side component of 2K polysulfide sealants. VITROFLEX B imparts good rheology for suspension stability of dispersed solids, elasticity, fast cure rates, and hardness development.

Other uses where VITROFLEX B may be useful include plastisol applications, such as plastisol inks, underbody coatings, and seam seals.

## Specifications

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|   |         |
|---|---------|
| Color, maximum, Gardner .....                                   | 2       |
| Acidity, acid no. max .....                                     | 1.5     |
| Hydroxyl Number, mg NaOH/g sample, max.....                     | 30      |
| Viscosity, Brookfield RVT, 20 RPMs at 25°C, cps and mPa·s ..... | 730-930 |

## Typical Properties

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|   |                        |
|---|------------------------|
| Acidity, acid no.....   | 0.8                    |
| Boiling point, 5 mmHg, °C .....                                 | 206                    |
| Boiling point, extrapolated to 760 mm Hg, °C.....               | 322                    |
| Color, Gardner .....  | 0                      |
| Density, ASTM D1475, 25°C, g/mL.....                            | 1.15                   |
| Density, ASTM D1475, 25°C, lbs/gal.....                         | 9.63                   |
| Flash point, ASTM D92, °C .....                                 | 232                    |
| Freeze point, °C.....   | <-20                   |
| Glass point, by DSC, °C.....                                    | 50                     |
| Hydroxyl Number (mg NaOH/g) .....                               | 25                     |
| Moisture content, % .....                                       | 0.06                   |
| Refractive index, 25°C .....                                    | 1.505                  |
| Solubility, in water, %.....                                    | 1.13                   |
| Solubility, water in, %.....                                    | 0.08                   |
| Surface tension, ASTM D1331, 25°C, dynes/cm .....               | 33                     |
| Specific gravity, 25/25°C .....                                 | 1.15                   |
| Vapor pressure, 25°C (extrapolated), mmHg .....                 | 4.6 x 10 <sup>-6</sup> |
| Viscosity, Brookfield RVT, 20 RPMs at 25°C, cps and mPa·s ..... | 834                    |
| Viscosity, kinematic, 25°C, cSt.....                            | 722                    |
| VOC, ASTM D2369, %.....   | 1.1                    |

## Regulatory Information

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### Global Inventories:

Kalama® VITROFLEX® and K-FLEX® plasticisers are included on or exempted from many global inventories. Please reference the product safety data sheet (SDS) for current global inventory status and other regulatory information. Current SDS's can be found on our website at [www.emeraldkalama.com](http://www.emeraldkalama.com) or can be requested from [product.compliance@emeraldmaterials.com](mailto:product.compliance@emeraldmaterials.com).

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*Emerald Kalama Chemical is a world-scale producer of a variety of benzoic acid, benzaldehyde, and derivatives, with production facilities in the U.S. and Europe. Products include benzoic acid, various benzoate and dibenzoate ester, alcohol and aldehyde derivatives for food and personal care preservatives, flavor and fragrance ingredients, plasticizers and industrial applications. Emerald Kalama Chemical is a division of Emerald Performance Materials, a manufacturer of additives and polymers that make products last longer, look, taste, smell, or perform better. The company has two business units, three operations and approximately 500 employees. For more information, please contact us.*

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| Revision Record Data |   |
|----------------------|---|
| Date                 | Description of change   |
| 19-07-2019           | Updated logo, trademark to Kalama® VITROFLEX®, formatting, website URL, and sales office contact information; changed spellings to UK English |
| 23-06-2021           | Updated logo, boilerplate, formatting, website URL, and sales office contact information; changed spellings to US English                     |
| 25-06-2021           | Changed "FDA Coverage" to "FDA CFR Listings"  |
| 15-7-2021            | Removed FDA Listings (as per July 2021 discussion w/Robert Campbell)  |
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