

### Description

EW 6616 is a two-part soft epoxy adhesive. It is ideal for potting sensors that require to withstand critical thermal shock conditions.

### Features

- Recommended substrates: glass, aluminum, stainless steel, PC and PCB
- Soft and flexible
- Excellent resistance against moisture, thermal shock and mechanical stress

### Uncured Properties

<b>Chemical Type</b>	Epoxy
<b>Appearance</b>	
Part A	Black
Part B	Grey
<b>Viscosity @ 25°C [mPa·s]</b>	
Brookfield DV2T, spindle 14# @ 20rpm	
Part A	10,750
Part B	9,700
Mixed	10,000
<b>Mix Ratio A:B</b>	
By Volume	1:1
<b>Specific Gravity [g/cm<sup>3</sup>]</b>	
Part A	1.55
Part B	1.40
<b>Shelf Life @ 10-28°C [months]</b>	6

### Curing Conditions

<b>Setting Time [mins]</b>	90
@ 25°C (30g adhesive mixed)	
<b>Full Strength</b>	
@ 25°C [days]	6
@ 100°C [hrs]	2
@ 120°C [hrs]	1

### Cured Properties

<b>Hardness [Shore D]</b>	45
ASTM D2240	
<b>Shear Strength [MPa]</b>	> 5
Al/Al	
ASTM D1002	
<b>Elongation at Break [%]</b>	> 3
ASTM D638	
<b>Surface Resistivity [ohm·cm]</b>	>1.0x10 <sup>14</sup>
ASTM D257	
<b>Volume Resistivity [ohm·cm]</b>	>1.0x10 <sup>14</sup>
ASTM D257	
<b>Dielectric Strength [V/mil]</b>	300
ASTM D149	

### Directions for Use

#### 1. Surface Treatment

Surfaces to be bonded should be free of dust, oil, grease or any other contaminants in order to achieve a reproducible bond. For slightly contaminated surfaces, it is sufficient to wipe with isopropanol or ethanol. Substrates with a low surface energy (e.g. polyethylene, polypropylene, Teflon) need to be pre-treated physically (e.g. atmospheric plasma or corona) in order to achieve sufficient adhesion.

#### 2. Application

Products are supplied ready for use. Depending on package type, they can be dosed manually, semi-automatically or fully-automatically with a dosage apparatus. With automatic dispensing using a cartridge, the adhesive is conveyed via pressure and a piston rod to a dispense valve. With bottles, the adhesive is conveyed using a pump.

After application, it is recommended that the two substrates be adjoined immediately as it is possible the curing process will begin with select products under ambient conditions.

3. Suggested working temperature range is -40 to 150°C.

### Storage

Maximum shelf life may be obtained when product is stored in a cool, dry location at a temperature between **10°C to 28°C**.

TO PREVENT CONTAMINATION OF UNUSED PRODUCT, DO NOT RETURN ANY PRODUCT TO ITS ORIGINAL CONTAINER.

### Materials Handling

Refer to the Material Safety Data Sheet (MSDS) for this product.

#### *Disclaimer*

*The information provided here including the recommendations for use and application of the product is based on internal laboratory test conditions and should only be used as a reference. CollTech does not assume responsibility for the test or performance results obtained by the user. It is the responsibility of the user to perform their own evaluations to confirm whether this product is suitable for their application.*