

# LOCTITE ABLESTIK CE 3513

November 2016

## PRODUCT DESCRIPTION

LOCTITE ABLESTIK CE 3513 provides the following product characteristics:

<b>Technology</b>	Epoxy
<b>Appearance</b>	Silver
<b>Product Benefits</b>	<ul style="list-style-type: none"> <li>Electrically conductive</li> <li>One component</li> <li>Low viscosity</li> <li>No bleed</li> <li>Good dispense behavior</li> <li>Fast cure at high temperatures</li> <li>Long shelf life at room temperature</li> <li>High bond strength</li> <li>Heat resistant after cure</li> </ul>
<b>Operating Temperature</b>	150°C
<b>Cure</b>	Heat cure
<b>Filler Type</b>	Silver
<b>Application</b>	Assembly

LOCTITE ABLESTIK CE 3513 adhesive is designed for use in automated assembly and in-line curing operations.

## TYPICAL PROPERTIES OF UNCURED MATERIAL

Viscosity, 10 rpm @ 25°C, mPa·s (cP)	40,000
Density, g/cm <sup>3</sup>	3
Pot life @ 18 to 25°C, days	>14
Shelf Life @ -40 to -18°C (from date of manufacture), 183 days	
Flash Point - See SDS	

## TYPICAL CURING PERFORMANCE Cure Schedule

### Convection Oven:

- 1 hour @ 100°C
- 45 minutes @ 120°C
- 20 minutes @ 150°C

### Hot Plate:

- 60 seconds maximum @ 180 to 190°C

Properties of the cured material will depend upon the cure schedule used. Low temperature cure will reduce electrical conductivity.

The above cure profile is a guideline recommendation. Cure conditions (time and temperature) may vary based on customers' experience and their application requirements, as well as customer curing equipment, oven loading and actual oven temperatures.

## TYPICAL PROPERTIES OF CURED MATERIAL

### Electrical Properties:

Volume Resistivity, ohms-cm:	
Cure @ 180°C	2×10 <sup>-4</sup>
Cure @ 100°C	1×10 <sup>-3</sup>

## TYPICAL PERFORMANCE OF CURED MATERIAL

### Miscellaneous:

Tensile Lap Shear Strength	N/mm <sup>2</sup>	12
	(psi)	(1,740)

## GENERAL INFORMATION

For safe handling information on this product, consult the Safety Data Sheet, (SDS).

### STORAGE:

Store product in the unopened container in a dry location. Storage information may be indicated on the product container labeling.

### Optimal Storage : -40 to -18 °C

Material removed from containers may be contaminated during use. Do not return product to the original container. Henkel Corporation cannot assume responsibility for product which has been contaminated or stored under conditions other than those previously indicated. If additional information is required, please contact your local Technical Service Center or Customer Service Representative.

### Conversions

$(^{\circ}\text{C} \times 1.8) + 32 = ^{\circ}\text{F}$   
 $\text{kV/mm} \times 25.4 = \text{V/mil}$   
 $\text{mm} / 25.4 = \text{inches}$   
 $\text{N} \times 0.225 = \text{lb}$   
 $\text{N/mm} \times 5.71 = \text{lb/in}$   
 $\text{psi} \times 145 = \text{N/mm}^2$   
 $\text{MPa} = \text{N/mm}^2$   
 $\text{N}\cdot\text{m} \times 8.851 = \text{lb}\cdot\text{in}$   
 $\text{N}\cdot\text{m} \times 0.738 = \text{lb}\cdot\text{ft}$   
 $\text{N}\cdot\text{mm} \times 0.142 = \text{oz}\cdot\text{in}$   
 $\text{mPa}\cdot\text{s} = \text{cP}$

### Disclaimer

#### Note:

The information provided in this Technical Data Sheet (TDS) including the recommendations for use and application of the product are based on our knowledge and experience of the product as at the date of this TDS. The product can have a variety of different applications as well as differing application and working conditions in your environment that are beyond our control. Henkel is, therefore, not liable for the suitability of our product for the production processes and conditions in respect of which you use them, as well as the intended applications and results. We strongly recommend that you carry out your own prior trials to confirm such suitability of our product.

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