

RTV534LV

Description

RTV534LV is a two-component, room temperature cure silicone adhesive that features rapid tack free time, primerless adhesion to multiple substrates with extreme low temperature stability. This white material has a thick paste-consistency making it ideal for horizontal, vertical and overhead applications without sag. Every batch of RTV534LV meets or exceeds the stringent low outgassing requirements of the ASTM E-595 standard. RTV534LV is supplied in side-by-side cartridges or pail kits. Simply mix the base compound with the curing agent to form a tough, flexible silicone elastomeric rubber.

Key Features and Benefits

- Fast cure time at room temperature, no heat required
- Primerless adhesion to multiple substrates
- Rapid green strength build
- RTV534LV meets or exceeds ASTM E595 standard for low outgassing
- Non-sag paste
- Easy dispensability in convenient 10:1 mix ratio by volume
- Temperature ranges from -115°C (-175°F) up to 150°C (302°F)

Typical Physical Properties

Uncured Properties	NEW! RTV534A-LV	NEW! RTV534B-LV
Consistency	Paste	Paste
Color	White	White
Application Rate (g/min)	219	1080
Viscosity – RVF #7 @ 2rpm (cps)	820,000	-
Specific Gravity	1.39	1.20
TYPICAL CURED PROPERTIES		
Mix Ratio by volume	10:1	
Tack Free Time @ 25°C (77°F), mins	90	
Cure Time @ 25°C (77°F), hours [^]	24	
Mechanical:		
Tensile Strength, lb/in ²	275	
Elongation (%)	250	
Hardness, Shore A	35	
Thermal:		
Useful Temperature Range, °C (°F)	115°C (-175°F) up to 150°C (302°F)	
Coefficient of Expansion, cm/cm, °C (in/in, °F)	2.95 x 10 ⁻⁴ (1.64 x 10 ⁻⁴)	

^ Full Cure is recommended for 7 days at 25C/50%RH

Processing Recommendations

Mixing

RTV534LV is supplied in pre-weighed side-by-side cartridges allowing immediate use of the product without the need of manual or mechanical mixing. Dispensing instructions should be properly followed to ensure optimal properties and cure times are achieved.

RTV534LV is also supplied in larger packaging sizes. For these options, select a mixing container 4 to 5 times larger than the volume of RTV silicone rubber compound to be used. Weigh out the RTV silicone rubber base compound and add the appropriate amount of curing agent. 10:1 ratio by volume will provide a work time or pot life of 1-1.5 hours and a cure time of 4 hour.

Using clean tools, thoroughly mix the RTV base compound and the curing agent, scraping the sides and bottom of the container carefully to produce a homogeneous mixture. When using power mixers, avoid excessive speeds which could entrap large amounts of air or cause overheating of the mixture, resulting in shorter pot life.

Deaeration

Air entrapped during mixing should be removed to eliminate voids in the cured product. Expose the mixed material to a vacuum of 29 inches of mercury minimum (absolute pressure of 25mm). The material will expand, crest, and recede to about the original level as the bubbles break. Degassing is usually complete about two minutes after frothing ceases.

Curing

RTV534LV adhesive is designed to cure through in 90 minutes with full property development within 24 hours at room temperature (77 °F/25 °C) and 50% relative humidity. This system is sensitive to changes in heat and humidity and therefore variations in cure speed may be seen if one or both variables are changed.

Compatibility

RTV534LV adhesive will cure in contact with most clean and dry surfaces. Compatibility tests should be performed on all materials in contact with the uncured silicone, including painted surfaces.

Surface Preparation

The adhesive performance of any polymer system is highly dependent upon proper surface preparation. In order to maximize the adhesion of the RTV534LV adhesive, all parts should be as clean and dry as possible prior to the application of the silicone.

Patent Status

Nothing contained herein shall be construed to imply the nonexistence of any relevant patents or to constitute the permission, inducement or recommendation to practice any invention covered by any patent, without authority from the owner of the patent.

Product Safety, Handling and Storage

Customers should review the latest Safety Data Sheet (SDS) and label for product safety information, safe handling instructions, personal protective equipment if necessary, emergency service contact information,

and any special storage conditions required for safety. Momentive Performance Materials (MPM) maintains an around-the-clock emergency service for its products. SDS are available at www.momentive.com or, upon request, from any Momentive representative. For product storage and handling procedures to maintain the product quality within our stated specifications, please review Certificates of Analysis, which are available in the Order Center. Use of other materials in conjunction with Momentive products (for example, primers) may require additional precautions. Please review and follow the safety information provided by the manufacturer of such other materials.

Limitations

Customers must evaluate Momentive Performance Materials products and make their own determination as to fitness of use in their particular applications.

Contact Information

For product prices, availability, or order placement, contact our customer service at Momentive.com/CustomerService/

For literature and technical assistance, visit our website at: www.momentive.com

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