kester® Technical Data Sheet

RF771 Rework Flux
Water-Soluble Electronic-Grade

Product Description

Kester RF771 is a medium viscosity, water-soluble flux designed for electronic component rework and repair applications. RF771 has a gel-like consistency and is easily applied by syringe dispensing. RF771 can be precisely dispensed onto a specific area that needs flux. After being dispensed, RF771 stays in place until soldering occurs. Traditional problems experienced with controlling the application of water-soluble liquid fluxes are eliminated. RF771 has excellent performance in applications that require a flux having good thermal stability such as surface mount component repair. RF771 is the ideal choice for QFP or BGA semi-automated rework operations. In addition, RF771 is well suited for use with through-hole repair operations where solder fountain or controlled solder reservoir is being used for selective component removal and repair. Residues that remain on surfaces after soldering are easily removed with hot water. RF771 can be used in combination with Kester water-soluble cored wire solders and water-soluble solder pastes, as well as water-soluble liquid fluxes, to provide the complete water-soluble soldering connection.

Performance Characteristics:

- Compatible with HM531 Solder Paste
- High thermal stability
- Leaves bright/shiny solder joints after reflow
- Classified as ORM0 per J-STD-004

RoHS Compliance

This product meets the requirements of the Restriction of Hazardous Substances (RoHS) Directive, 2015/863 for the stated banned substances.

Physical Properties

Viscosity (typical): 285 poise
Malcom Viscometer @ 10rpm and 25°C

Acid Number (typical): 42.0 mg KOH/g of flux
Tested to J-STD-004, IPC-TM-650, Method 2.3.13

Reliability Properties

Copper Mirror Corrosion: High
Tested to J-STD-004, IPC-TM-650, Method 2.3.32

Corrosion Test: High
Tested to J-STD-004, IPC-TM-650, Method 2.6.15

Silver Chromate: Pass
Tested to J-STD-004, IPC-TM-650, Method 2.3.33

Chloride and Bromides: None Detected
Tested to J-STD-004, IPC-TM-650, Method 2.3.35

Fluorides by Spot Test: Pass
Tested to J-STD-004, IPC-TM-650, Method 2.3.35.1

Surface Insulation Resistivity (SIR), IPC (Typical): Pass
Tested to J-STD-004, IPC-TM-650, Method 2.6.3.3

	Blank	RF771
Day 1	$1.7*10^{10}$ Ω	$3.1*10^{8}$ Ω
Day 4	$1.0*10^{10}$ Ω	$4.4*10^{8}$ Ω
Day 7	$9.2*10^{9}$ Ω	$9.2*10^{8}$ Ω

World Headquarters: 800 West Thorndale Avenue, Itasca, Illinois, 60143 USA
Phone: (+1) 630 616-4000 ▪ Email: customerservice@kester.com ▪ Website: www.kester.com

Cleaning

RF771 is a water-soluble flux and the residues must be removed. The recommended method of removing flux residues is in a batch washer or in-line cleaner, using de-ionized or soft water. The recommended washing temperature is 54-66°C (130-150°F).

Storage, Handling and Shelf Life

Shelf life is 1 year from the date of manufacture when stored between 15-32°C (60-90°F).

Health and Safety

This product, during handling or use, may be hazardous to your health or the environment. Read the Safety Data Sheet and warning label before using this product.

World Headquarters: 800 West Thorndale Avenue, Itasca, Illinois, 60143 USA
Phone: (+1) 630 616-4000 ▪ Email: customerservice@kester.com ▪ Website: www.kester.com