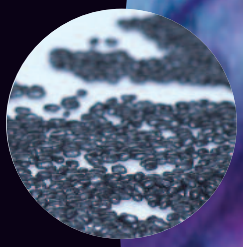
RHOPOINT
INSTRUMENTS



www.rhopointinstruments.com

MFFT™

Minimum Film Forming Temperature Bar

RHOPOINT
PAINTLAB+

- Paints and Coatings
- Adhesives

Rhopoint Instruments Limited
is a member of the
Rhopoint Group

MFFT™ Minimum Film Forming Temperature Bar

EASY TO OPERATE USING TOUCH SCREEN DISPLAY

The Rhopoint Minimum Film Forming Temperature Bar (MFFT) is used to determine the minimum film forming temperature and white point in paint and coatings such as water base coatings, polymer dispersions, synthetic latexes and emulsion.

The MFFT also tests adhesives temperature optimisation in such areas as coalescence of water-borne adhesives and minimum temperature for epoxy resin cure.

RHOPOINT PAINTLAB+

EASY TO OPERATE USING TOUCH SCREEN DISPLAY

PAINTS & COATINGS

The minimum film forming temperature of a paint or coating is the lowest temperature at which it will uniformly coalesce when laid on a substrate as a thin film. The standard test for determining this temperature involves using an MFFT, as specified by such standards as ASTM D 2354 and ISO 2115. The design of the Rhopoint instrument is based directly on these standards.

ADHESIVES

The MFFT of one-pack adhesives can be found in a similar way to paints and coatings. With two-pack adhesives, a strip of aluminium foil can be laid on the platen, to ease cleaning, before applying the adhesive. Two-pack adhesives do not show an MFFT, but the minimum cure temperature can be found by scraping the sample with a spatula.

DESIGN

The new MFFT benefits from an easy to use touch screen interface, digital MFFT temperature calculation and output to handy results labels. These additions to the trusted Rhopoint MFFT make the instrument easier to operate with improved certainty of results.

The temperature bar consists of a copper platen with an electronically imposed temperature gradient. Built in temperature sensors monitor the temperature across the platen, a graph of the gradient is displayed on the touch screen.

Purge gas is integrally dried, and flows over the platen via a sintered distribution block. The hinged perspex cover provides thermal and atmospheric insulation whilst allowing constant visual inspection of a test. A cursor is moved to indicate the identified MFFT point; the instrument calculates and displays the temperature in the required units.

The instrument can be supplied with an optional results label printer. Recorded values include the time and date of the test and identified minimum film forming temperature. The printed label can be attached to retained sample bottles or job sheets.

RUNNING

The desired temperature program is selected and the instrument allowed to reach thermal equilibrium. Tracks of wet test material are applied using a cube applicator, or spreader. Once the material has dried or cured the result is visually apparent.

STANDARD FEATURES

Standard model (MFFT–60) has seven temperature programs:

Program	0	1	2	3	4	5	6
Cool end (˚C)	-10	-5	0	5	15	23	33
Warm end (˚C)	8	13	18	23	33	50	60

Nickel plated copper platen.
75μm (0.003”) cube applicator.

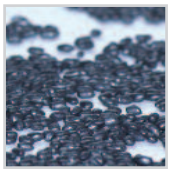
OPTIONS

Additional three temperature programs on extended range model (MFFT–90):

Program	7	8	9
Cool end (˚C)	43	53	63
Warm end (˚C)	70	80	90

APPLICATIONS

Paints



Resins

Adhesives

MFFT™ Minimum Film Forming Temperature Bar

RHOPOINT PAINTLAB PLUS

MFFT SPECIFICATIONS

Conforms to:	ASTM D 2354, ISO 2115,
Platen dimensions:	483mm × 235mm (L × W)
Air:	4 l min-1 @ 100 psig
Water:	Mains pressure; gravity drain inlet temperature <15°C
Mains:	110–120V AC or 220–240V AC
Order code:	MFFT-60 (-10 to 60˚C) MFFT-90 (-10 to 90˚C)
Dimensions:	350mm × 550mm × 610mm (H × W × D)
Weight:	38kg
Packed weight:	53.7kg
Packed dimensions:	590mm × 800mm × 690mm (H × W × D)
Commodity code:	9027 8017

INCLUDED ACCESSORIES

- Water connectors
- Air connector
- Cube applicator
- Spare silica gel
- Mains lead
- Manual

EXTRAS

FREE EXTENDED WARRANTY

SERVICE

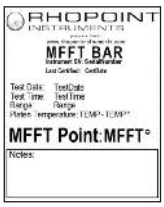
Fast and economic service via our global network of accredited service centres, please visit www.rhopointinstruments.com/support for detailed information.

OPTIONAL ACCESSORIES

- Chiller

  Required when the temperature of the water supply to the instrument is >20ºC higher than the target temperature at the cold end of the selected range.
  e.g. Range 0, -10ºC requires a water supply of no higher than 10ºC. If this cannot be supplied then the chiller is required.

- Label printer



Certificate no: FS 695372
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LOCAL AGENT

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RHOPOINT INSTRUMENTS

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