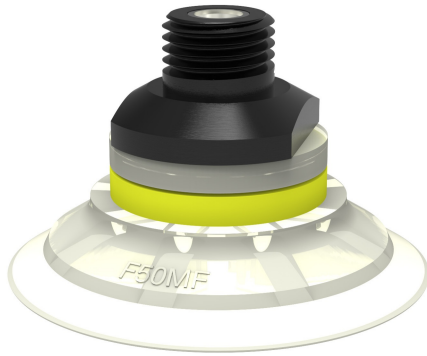


## Suction cup F50MF Thermoelastic polyurethane, 1/4" NPT male, with mesh filter

Item number: F50MF.40.05AC



- **Mark-Free Material.** Made from special thermoelastic polyurethane (TPU), these cups leave no marks or traces on handled objects, ensuring perfect surface integrity for glass, metal, and other sensitive materials.
- **Ideal for Flat Surfaces.** Engineered specifically for flat objects, the F-MF cups provide excellent stability and minimal inherent movement during handling.
- **The design delivers a strong, stable grip** with minimal deformation, making them reliable for precise positioning and parallel lifting.
- **Available in multiple sizes** from 15 to 50 mm, the series covers a broad range of application needs, from small to large flat objects.
- **The material withstands a wide temperature range** and resists common chemicals, making the cups suitable for demanding industrial environments
- **Recommended when the lifting force is parallel** to the surface of the object.

### Technical data

Description	Unit	Value
Suction cup shape	-	Flat
Suction cup design	-	Round
Characteristics (for filtering)	-	Mark free
Material	-	TPE
Weight, min.	oz	0.35
Suction cup model	-	F-MF
Volume	in <sup>3</sup>	0.61
Height	in	1.28
Outer diameter, min.	in	2.087
Fitting size	-	1/4"
Fitting option	-	Filter mesh
Fitting style	-	Male
Fitting type	-	NPT-thread
Suction cup model	-	F50MF
Movement, vertical max.	in	0.087
Curve radius, min.	in	3.74

### Performance - Lifting forces

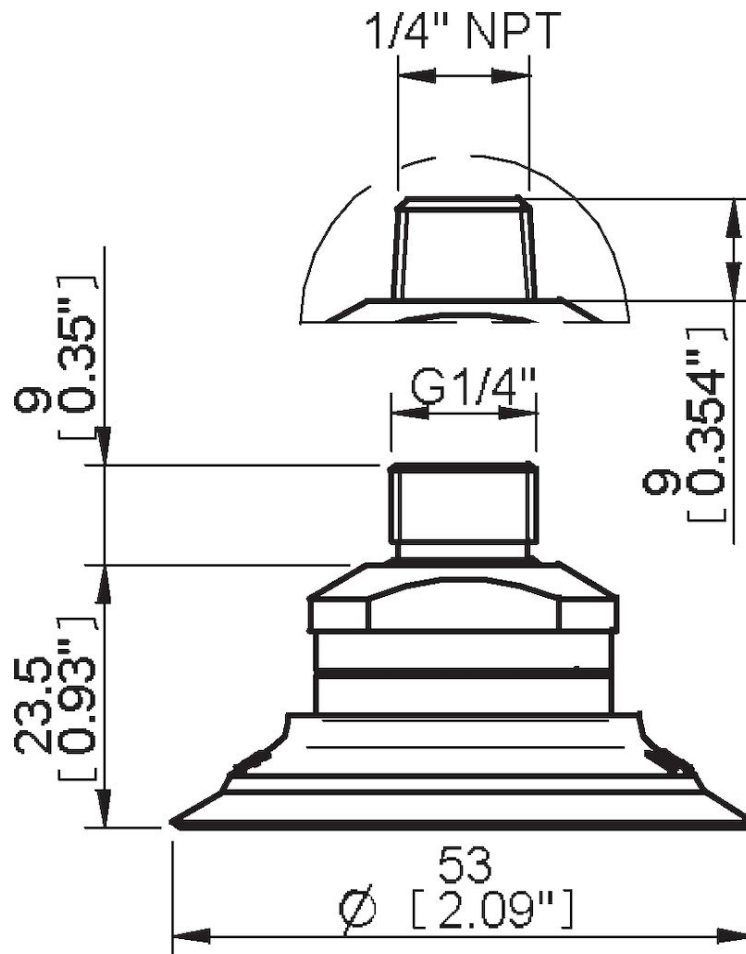
F50MF	Vertical (lb)	Parallel (lb)
5.91 -inHg	5.51	6.97
17.72 -inHg	20.68	18.43
26.58 -inHg	31.7	24.055

Material	
Name	TPE-U
Color	Black
Temperature, min.   °F	-4
Temperature max.   °F	176
Hardness   °Shore A	81

### Material resistance

Alcohol	Good
Concentrated acids	Poor
Ethanol	Not applicable
Hydrolysis	Poor
Methanol	Not applicable
Oil	Excellent
Oxidation	Good
Gasoline	Poor
Wear resistance	Excellent
Weather and ozone	Excellent

### Dimensional drawings



Values specified in this data sheet are tested at (unless otherwise stated):

- Room temperature (20°C [68°F] ± 3°C [5.5°F]).
- Standard atmosphere (101.3 [29.9 inHg] ± 1.0 kPa [0.3 inHg]).
- Relative humidity 20-70%.
- Compressed air quality, DIN ISO 8573-1 class 4.

**Accessories**

05AF | Fitting 5x1/8" NPSF female, 50  
05AG | Fitting 1/8" NPSF female, 50, with mesh filter  
05CA | Fitting 1/8" NPSF female, 50, PA  
05AA | Fitting 1/8" NPSF female, 50  
05AD | Fitting G3/8" male, 50, with mesh filter  
05AE | Fitting 3/8" NPT male, with mesh filter  
05AB | Fitting G1/4" male, 50, with mesh filter  
05DA | Fitting 1/8" NPSF female, 50, with dual flow control valve  
05DB | Fitting G1/4" male, with dual flow control valve  
05DC | Fitting 1/4" NPT male, with dual flow control valve  
05DD | Fitting G3/8" male, 50, with mesh filter and dual flow control valve  
05DE | Fitting 3/8" NPT male, with dual flow control valve  
05DF | Fitting 5x1/8" NPSF female, 50, with dual flow control valve

**Spare parts**

F50MF.40 | Suction cup F50MF Thermoelastic polyurethane  
05AC | Fitting 1/4" NPT male, with mesh filter