### Datasheet

# Suction cup BXF90P Polyurethane 60, G1/4" male with mesh filter

#### Article number: 0207745



- Special designed friction cup with multi bellows for oily metal sheets. Suitable for application where great level compensation is needed such as de-stacking sheets from magazines (press-line) and picking car body parts from racks.
- Very low vacuum level needed to fully compress the extra-long bellows causes the cup not to push away parts from position.
- The "BXF" design is suitable for flat as well as uneven/curved surfaces.
- Internal friction pattern on the lip can withstand high shear forces, typically 3-5 times more than corresponding conventional suction cups.
- Best choice if > 0.1g/m2 press oil is used on the sheet but also a great choice for dry metal sheets.
- DURAFLEX® is a material that features the elasticity of rubber and wear resistance of polyurethane. The material has a fantastic elastic memory, even after hundreds of thousand cycles.

l'echnical data		
Description	Unit	Value
Suction cup shape	-	Bellows
Application	-	Oily sheet metal
Suction cup design	-	Round
Characteristics	-	Oily sheet metal
Material	-	Polyurethane (PU)
Weight, min.	g	138.7
Suction cup model	-	BXF
Volume	cm³	180
Height	mm	77.9
Outer diameter, min.	mm	90
Outer diameter, actuated	mm	92.3
Fitting size	-	1/4"
Fitting option	-	Filter mesh
Fitting style	-	Male
Fitting type	-	G-thread
Material	-	AI
Suction cup model	-	BXF90P Dry metal sheet
Movement, vertical max.	mm	49.9
Curve radius, min.	mm	160
Suction cup model	-	BXF90P Oily metal sheet
Movement, vertical max.	mm	49.9
Curve radius, min.	mm	160

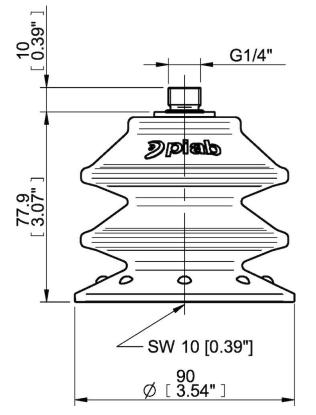
#### **Performance - Lifting forces**

BXF90P Dry metal sheet	Vertical (N)	Parallel (N)		
60 -kPa	169	84		
90 -kPa	231	92		
BXF90P Oily metal sheet				
60 -kPa	168	92		
90 -kPa	225	103		

#### **Technical data**

Material				
Name	Polyurethane (PU60)			
Colour	Orange			
Temperature, min.   °C	10			
Temperature max.   °C	50			
Hardness   °Shore A	60			
Material resistance				
Alcohol	n/a			
Concentrated acids	Fair			
Ethanol	Fair			
Hydrolysis	Fair			
Methanol	Poor			
Oil	Excellent			
Oxidation	Poor			
Petrol	Fair			
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]  $\pm$  3°C [5.5°F]).

•Standard atmosphere (101.3 [29.9 inHg]  $\pm$  1.0 kPa [0.3 inHg]).

•Relative humidity 20-70%.

•Compressed air quality, DIN ISO 8573-1 class 4.