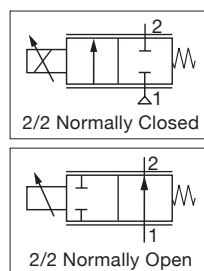


# ASCO™ MINIATURE SOLENOID VALVES

## PROPORTIONAL VALVES, MINIATURE PIEZOTRONIC

**SERIES  
630**

- Miniature, ultra-low power consumption (0.004 W), almost no heat dissipation
- Pad mounting proportional mini piezo-valves available with single subbase M5
- Variable flow, proportional to the control signal
- No wearing parts: practically unlimited service life
- No inductive peaks when switching: no circuit protection necessary
- Valves do not require a minimum operating pressure
- The solenoid valves satisfy all relevant EC directives
- Typical applications include:
  - Gas Chromatography
  - Mass Flow Controllers
  - Dental Equipment
  - Blood Pressure Monitoring



Fluids*	Temperature Range	Seal Materials*
Air or Inert Gases <sup>1</sup>	0 °C to 60 °C (32 °F to 140 °F)	NBR

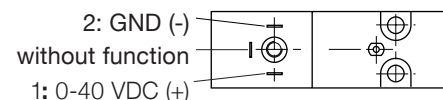
\* Ensure that the compatibility of the materials in contact with the fluids is verified.  
<sup>1</sup> Filtration: 5µm, unlubricated, condensate free, dew point -10 °C

General Valve Information	
Body	PPS
Others	Piezo Ceramics, Brass, Aluminum

Electrical Characteristics	
Coil Insulation Class	F
Connector	Spade plug or cable 6-7mm (0.24-0.28in)
Connector Specification	DIN 43650, 9.4mm, form C or 2 leads outlet 28 AWG, length 1m (39.4in)
Electrical Safety	IEC 335
Electrical Enclosure Protection	Molded IP65 (EN 60529)
Voltage Regulation	0 – 40 VDC
Flow Regulation Characteristics	Hysteresis < 10% to 15%

### ELECTRICAL CONNECTION (Polarized piezo valve)

Version with spade plug connection:



Version with 2 leads:  
 red wire: +  
 black wire: -

Holding Current	Power Ratings			Ambient Temperature Ranges	Type <sup>2</sup>
	Inrush	Holding	Hot/Cold		
mA	VA	VA	W	°C (°F)	
< 100	-	-	-	0 to 60 (32 to 140)	01-02

<sup>2</sup> Refer to the dimensional drawings on the following page

Specifications											
Connection	Flow Coefficient		Operating Pressure bar (psi)			Holding Power	Catalog Number				
							without manual operator		with impulse manual operator		
	Kv (m3/h)	Cv	min.	max. air		W	connector	leads	connector	leads	
<b>2/2 NC - Normally Closed</b>											
Pad Mounting	0.005	0.006	0	-	8	-	0.004	63000075	63000035	63000079	63000039
	0.007	0.008	0	-	4	-	0.004	63000076	63000036	63000080	63000040
<b>2/2 NO - Normally Open</b>											
Pad Mounting	0.005	0.006	0	-	8	-	0.004	63000077	63000037	63000081	63000041
	0.007	0.008	0	-	4	-	0.004	63000078	63000038	63000082	63000042

Subbases <sup>3</sup>				
Connection	Mounting Type	Description	Catalog Number	
			aluminum	brass
M5	individual mounting	M5 lateral connection	88263002	30300001

<sup>3</sup> Multiple subbases available upon request

00018GB-2019/R01

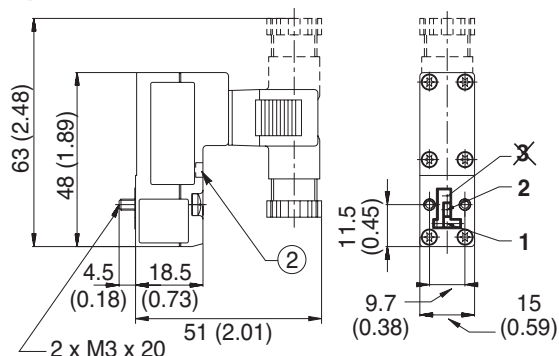
## Dimensions: mm (inches)

### Type 01

IEC 335/DIN 43650  
IP65



63000075/76/77/78/79/80/81/82

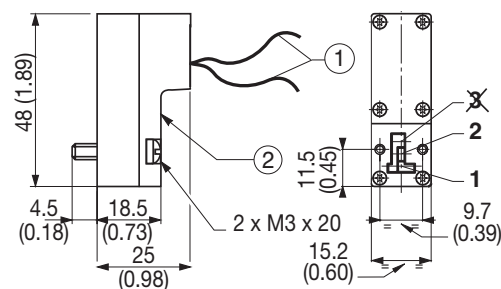


### Type 02

IEC 335  
IP65

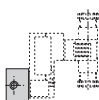


63000035/36/37/38/39/40/41/42

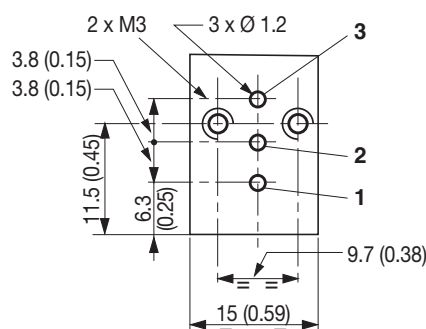
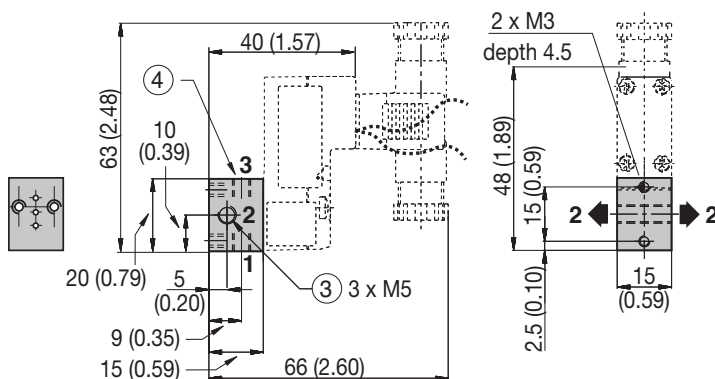


**Single Subbase M5**  
Aluminum or brass

88263002 - 30300001



**Subbase Mounting Pattern**  
ISO 15218/CNOMO  
E06.36.120N, size 15



- ① 2 leads 28 AWG, length: 1m (39.4in)
- ② Manual operator location
- ③ Outlet (2) can be connected on the left or on the right of subbase; close the unused port with a Ø M5 plug (supplied)
- ④ Port (3) not used (to be provided with protection)

Type	Catalog Number	Weight
		kg
01	63000075/76/77/78/79/80/81/82	0.040
02	63000035/36/37/38/39/40/41/42	0.032
-	88263002	0.012
-	30300001	0.034

## Options

- Plug with cable length of 2m (78.8in)

## Installation

- The solenoid valves can be mounted in any position without affecting operation
- Mounting on single subbases
- Unlike the on/off type, the proportional version is not equipped with electronics. Please check for correct polarity when connecting the valve. The piezo element will be damaged if the polarity of the connections is inversed. The control system of the user must be used for charging and discharging.

**Important Note: The peak current must be limited by series resistor greater than 30 ohms**