PREMIER INDUSTRIES

AO 2.0 SERIES

Air Operated, Normally Open/Closed
Valves



Premier AO 2.0 Series Air Operated Valves are available in both normally open and normally closed configurations for use with gas or hydraulic media. The AO 2.0 Series is rated for inlet pressures up to 10000 PSIG (689.5 BAR), and (Cv) 2.0.

Offered in a wide range of process pressures, porting configurations, and materials, Premier AO valves were designed with the flexibility to integrate seamlessly into your application.

Optional accessories such as solenoid valves, indicator switches, and gauges are available.

FEATURES

- 10000 PSIG (689.5 BAR) max inlet pressure
- Cv 2.0
- Actuation pressure: 90–110 psig
- Optional solenoid valve actuator
- Robust design for long cycle life
- Customize and optimize to meet your unique requirement *(contact Premier)*

SOME APPLICATIONS WILL REQUIRE A CUSTOM SOLUTION.
CONTACT PREMIER INDUSTRIES TO REQUEST A MODIFICATION OR A CUSTOM DESIGN.

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SPECIFICATIONS

- **MAXIMUM INLET PRESSURE :**
  - 10000 PSIG / 689.5 BAR
- **ACTUATION PRESSURE RANGE:**
  - 90-110 PSIG / 6.2-7.6 BAR
- **FLOW (Cv):**
  - 2.0

MATERIALS OF CONSTRUCTION

PROCESS SIDE WETTED:

- **BODY/INSERT/STEM MATERIAL OPTIONS**:
  - 316 Stainless Steel
  - Monel® 400
  - C693 ECO Brass
- **MAIN VALVE SEAT:**
  - See selection table on page 5
- **O-RING SEAL OPTIONS**:
  - Buna-N
  - Viton-A
  - EPDM
  - FFKM
  - Polyurethane
  - Low Temp Buna-N
  - Low Temp Viton
- **LUBRICANT**:
  - Krytox 240AC *(standard)*
  - Molykote 44 medium lubricant *(special mod)*

ACTUATOR SIDE WETTED:

- **PISTON:**
  - 303 Stainless Steel
- **PLUG:**
  - 303 Stainless Steel
- **BONNET:**
  - 303 Stainless Steel

NON-WETTED:

- **BACK-UP RINGS**:
  - PTFE
  - PEEK®
  - Selected o-ring material

PORTING

- **INLET & OUTLET OPTIONS**:
  - 1/2" FNPT, SAE (AS5202-08)
  - 3/8" FNPT, SAE (AS5202-06)
  - 9/16" Medium Pressure
  - 1" SAE (AS5202-16)
- **ACTUATION PORT:**
  - 1/8" FNPT
  - 1/4" SAE (AS5202-04)

OPTIONS

- Private label
- Solenoid valve, P/N: 50-13337
- Indicator switch, P/N: 70-00434
- Gauges

Monel® is a registered trademark of Specialty Metals Corporation

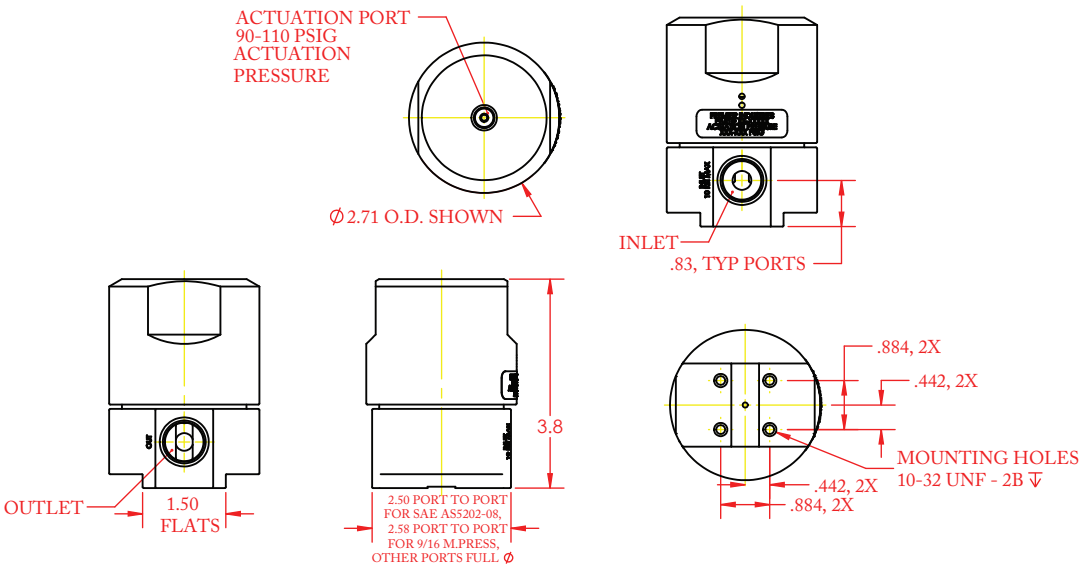
Vespel® is a registered trademark of E.I.duPont de Nemours and Company.

PEEK® is a registered trademark of Victrex PLC

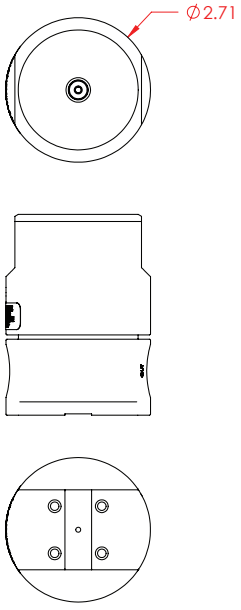
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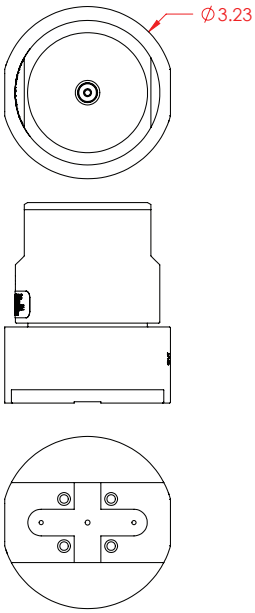
PART NUMBER: 70-00379-X-XX-31



OD REFERENCE CONFIGURATIONS:
70-00379-X-XX-1X (1/2 (F)NPT)
70-00379-X-XX-2X (3/8 (F)NPT)
70-00379-X-XX-3X (SAE AS5202-08)
70-00379-X-XX-5X (SAE AS5202-06)



OD REFERENCE CONFIGURATIONS:
70-00379-X-XX-4X (9/16 MED. PRESS.)
70-00379-X-XX-6X (9/16 MED. PRESS INLET AND SAE AS5202-08)

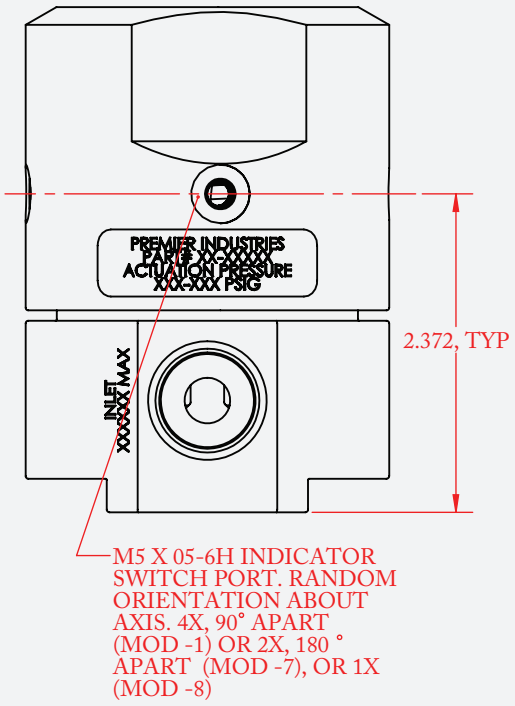


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INDICATOR SWITCH PORT MOD REFERENCE:

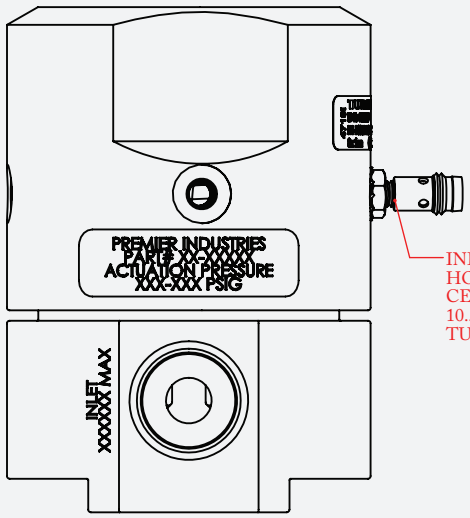
70-00379-X-XX-XX-**1** (4X SWITCH PORTS)
70-00379-X-XX-XX-**7** (2X SWITCH PORTS)
70-00379-X-XX-XX-**8** (1X SWITCH PORT)



INDICATOR SWITCH MOD REFERENCE:

70-00379-X-XX-XX-**S**

INDICATOR SWITCHES CAN BE ORDERED SEPARATELY.
P/N: 70-00434



INDICATOR SWITCH NOTES:

DUE TO SHIPPING DAMAGE CONCERNS, THE INDICATOR SWITCH WILL SHIP WITH THE AO VALVES BUT NOT INSTALLED.

CONTACT TURK FOR MORE INFORMATION ON THE SWITCH.
TURK SWITCH PART# BI1-EG05K-AP6X-V1331

INSTRUCTION FOR CUSTOMER INSTALLATION:

1. SCREW NUT ONTO SWITCH ALL THE WAY ON, SLIDE ON LOCK WASHER
2. APPLY 90-110 PSIG TO THE AO VALVE LOADER (PROCESS PRESSURE IS NOT REQUIRED.)
3. GENTLY SCREW SWITCH INTO A SWITCH PORT UNTIL CONTACT OCCURS, THEN BACK OFF 1 TO 1.5 FULL TURNS. WRENCH SNUG NUT AGAINST AO VALVE.
4. APPLY POWER TO THE SWITCH. SWITCH LED SHOULD TURN ON.
5. RELIEVE ALL PRESSURE TO THE LOADER, CONFIRM THAT SWITCH LED TURNS OFF.
6. CYCLE THE LOADER ONE MORE TIME TO ENSURE LED TURNS ON/OFF.

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PART #	-	1	-	2	3	-	4	5	-	MODS
70-00379	-		-			-			-	

Cv 2.0, 10000 PSIG MAX INLET
VESPEL SP-1 SEAT *(STANDARD)*

1	TYPE
1	NORMALLY OPEN
2	NORMALLY CLOSED
2	**BODY/INSERT/STEM MATERIAL**
2	316 STAINLESS STEEL
3	C693 ECO BRASS [1]
5	MONEL®
3	**O-RING MATERIAL** *BACKUP RING MATERIAL*
1	BUNA-N
2	VITON-A®
3	EPDM
4	FFKM *(CONTACT PREMIER FOR PRICING)*
5	POLYURETHANE
6	LOW-TEMP BUNA
L	LOW-TEMP VITON

[1] FOR OXYGEN APPLICATIONS SEE O2 AO 2.0 SERIES P/N 70-00469 OR 70-00635

4	PROCESS PORTS
1	1/2" FNPT
2	3/8" FNPT
3	1/2" SAE (AS5202-08)
4	9/16" MEDIUM PRESSURE
5	3/8" SAE (AS5202-06)
6	9/16" MP INLET AND 1/2" SAE AS5202 OUTLET
7	1" SAE (AS5202-16)
5	**ACTUATION PORT**
1	1/8" FNPT
2	1/4" SAE (AS5202-04)

VITON® IS A REGISTERED TRADEMARK OF E.I.DUPONT DE NEMOURS AND COMPANY.

MONEL® IS A REGISTERED TRADEMARK OF SPECIALTY METALS CORPORATION

[2] VALVES ORDERED WITH BOTH NORMALLY OPEN AND PTFE SEAT MODIFIER MAY NOT HAVE SWITCH/SWITCH PORT MODIFIERS.

CONSULT PREMIER INDUSTRIES IF ORDERING SPECIAL MODS, OR IF UNLISTED CONFIGURATIONS ARE REQUIRED. ADD ALL MODS TO END OF PART# (EX. 70-00379-1-12-41-1)

SPECIAL MODS**	
BLANK	NONE
1	4X INDICATOR SWITCH PORTS SEE PAGE 4 [2]
2	SOLENOID VALVE, 24V FLYING LEADS
3	GAUGE PORTS (1/4" FNPT STANDARD) 
4	MOLYKOTE 44 MEDIUM LUBRICANT
5	CLEAN WETTED PARTS TO CGA G4.1
Q	CLEANED AND HANDLED PER PI WI617
7	2X INDICATOR SWITCH PORTS SEE PAGE 4 [2]
8	1X INDICATOR SWITCH PORT SEE PAGE 4 [2]
9	PTFE SEAT (DERATES VALVE TO 3000 PSIG) [2]
P	PEEK 1000 SEAT MATERIAL
C	IEST-STD-CC1246 200R4 CLEANING
V	VESPEL SP-21 SEAT
A	AUXILLARY INLET PORT (SIZE/TYPE MATCHES PROCESS PORTS.) 
B	AUXILLARY 1/2" SAE AS5202 INLET PORT 
N	PCTFE SEAT (DERATES VALVE TO 6000 PSIG)
T	ANTI-VIBRATION GLAND ASSEMBLY (MEDIUM PRESSURE PORTS ONLY)
S	INDICATOR SWITCH (SWITCH SHIPS UNINSTALLED)
D	SOLENOID VALVE, 24V SPADE TERMINALS AS5202 ACTUATION PORT ONLY