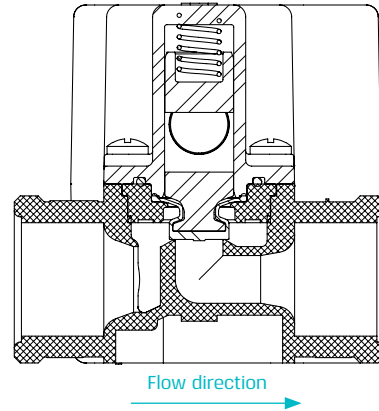


# ISOLATED/FERTILIZER SOLENOIDS



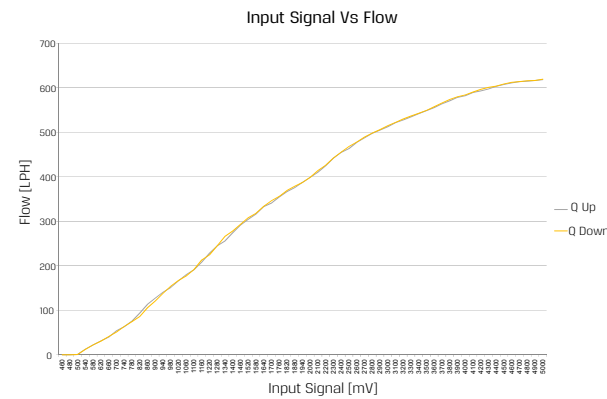
GEM-CPR | Precise Isolated Proportional 2 Way NC



## Technical Data

|                                       |   |
|---------------------------------------|---|
| Function                              | 2 Way NC (with back-up battery)   |
| Ports size                            | 1/2" BSP & NPT  |
| Orifice size                          | 8mm (Up to 600 l/hour)  |
| Pressure range                        | <ul style="list-style-type: none"> <li>Vacuum applications : (-) - 0 Bar</li> <li>Pressure applications : 0 - (+) Bar</li> </ul> *For other pressures, please consult our technical sales department  |
| Temperature range                     | Fluid : -10° to 45°C (no freezing)<br>Ambient : -10°C to 45°C   |
| Materials                             | <b>In contact with media :</b><br>Valve body :<br><ul style="list-style-type: none"> <li>Standard : PVC (UV Protection)</li> <li>Optional : According to customer demand or application (e.g Stainless steel)</li> </ul> Diaphragm & seals : FKM, EPDM<br><br><b>Not in contact with media :</b><br>Operator housing : PP (UV protection)<br>Manual override : Acetal (Manual override is standard) |
| Media                                 | <ul style="list-style-type: none"> <li>Liquids &amp; Gases</li> </ul> *Please consult our technical sales department for a specific media<br><ul style="list-style-type: none"> <li>Application examples :                             <ul style="list-style-type: none"> <li>Irrigation fertilizing systems</li> <li>Medical devices</li> </ul> </li> </ul>  |
| Control signal                        | 0-5V or 4-20mA  |
| Valve stroke resolution               | < 0.01mm  |
| Valve stroke accuracy                 | < ± 0.01 mm   |
| Full stroke duration                  | 0.6 sec, each direction   |
| Current consumption                   | <ul style="list-style-type: none"> <li>Standby Mode (Holding position): 25 [mA]</li> <li>Active Control Mode: Up to 120 [mA]</li> <li>Full Open/Close Mode (starting current): Up to 600 [mA]</li> </ul>  |
| Supply voltage                        | 12-24 [V] ±5% AC (50 or 60Hz) Or 12-24[V] ±10% DC<br>*For other supply voltages, please consult our technical sales department<br>*Current and voltage spikes protections might be required. Please consult our technical sales department  |
| Connection                            | 5 wires cable (3m length) :<br><ul style="list-style-type: none"> <li>Black &amp; red : Supply voltage (polarity is not restricted)</li> <li>Green : 0-5 V analog control signal</li> <li>Blue : 4-20 mA analog control signal</li> <li>Yellow : Analog control signal common</li> </ul>  |
| Recommended control signal resolution | Voltage : 20 mV   Current : 0.064 mA  |
| Standard / Certification              | <b>CE</b><br><ul style="list-style-type: none"> <li>EMC : EN55011 Group 1 - Class A   EN61000-6-1 CFR 47 FCC Class A</li> <li>SAFETY : IEC/EN61010-1</li> </ul>   |
| Standard protection class             | IP67  |

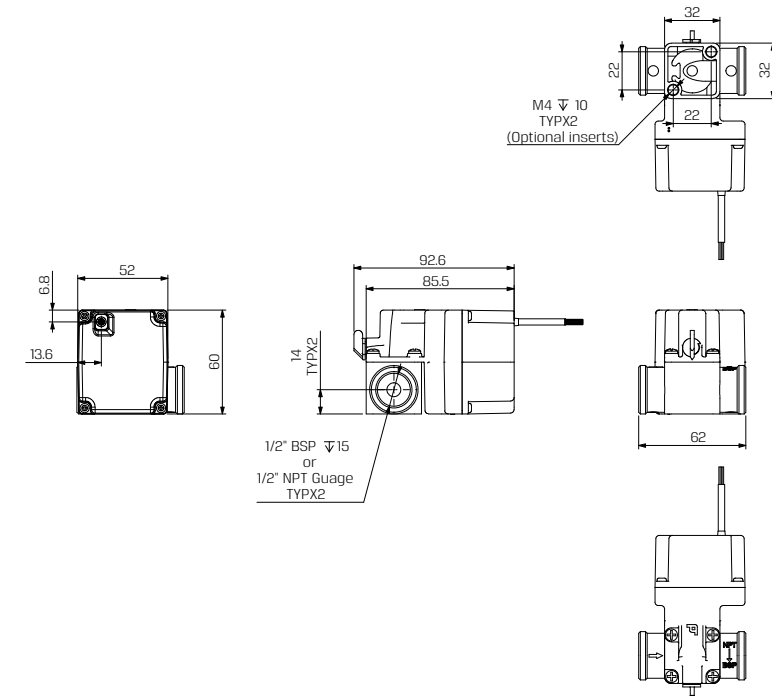
## Typical performance graph



Media : Water  
 $\Delta p$  : 0.9 [bar]  
 Temp : 20°C

GEM-CPR | Precise Isolated Proportional 2 Way NC

## Dimensions



## How to Order

| GEM-CPR  | PORT | FUNCTION | PRESSURE                  | SEALS  | MANUAL OVERRIDE | CONTROL SIGNAL | VOLTAGE     |
|----------|------|----------|---------------------------|--------|-----------------|----------------|-------------|
| 1/2" BSP | 40   | 2W NC 1  | Vacuum 1                  | FKM V  | Plastic 1       | 0-5 V 1        | 12-24 VDC 1 |
| 1/2" NPT | 41   |          | Pressure <sup>(1)</sup> 2 | EPDM E |                 | 4-20 mA 2      | 12-24 VAC 2 |

Example : GEM-CPR-4011E1-11

Precise Isolated proportional valve, 1/2" BSP, 2W NC, Vacuum, EPDM seals, plastic manual override with 0-5V control signal, 12-24VDC

GEM-CPR - 40 1 1 E 1 1 1

(1) Maximum inlet pressure : 1 bar

\*Please specify the working pressure range when placing an order

\* To order valves manufactured according to your specific requirements, please contact our technical sales department