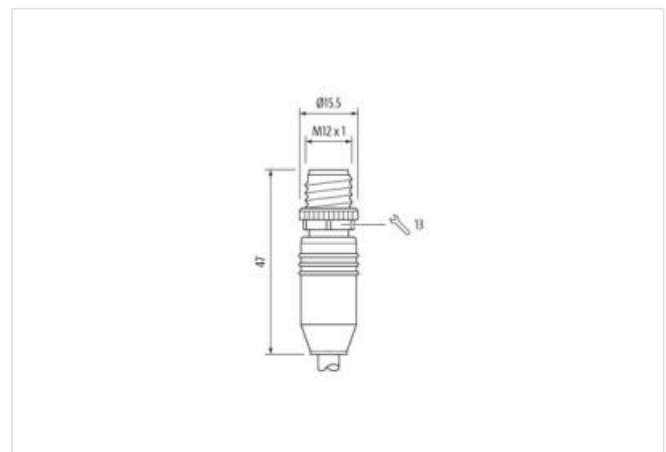
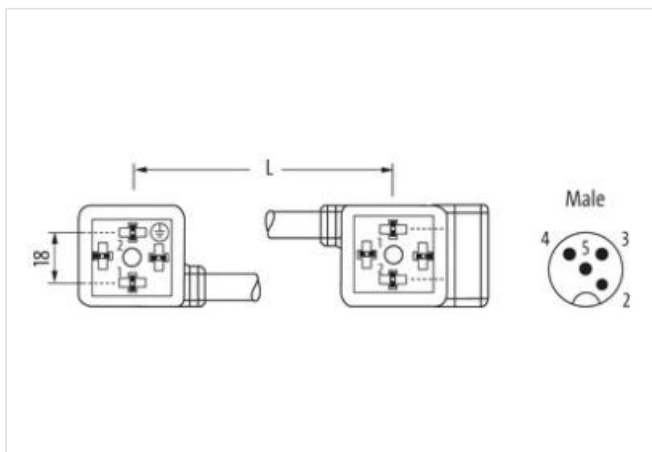
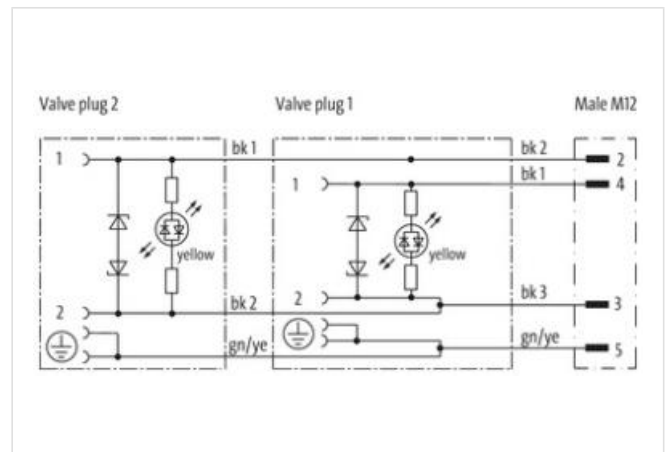
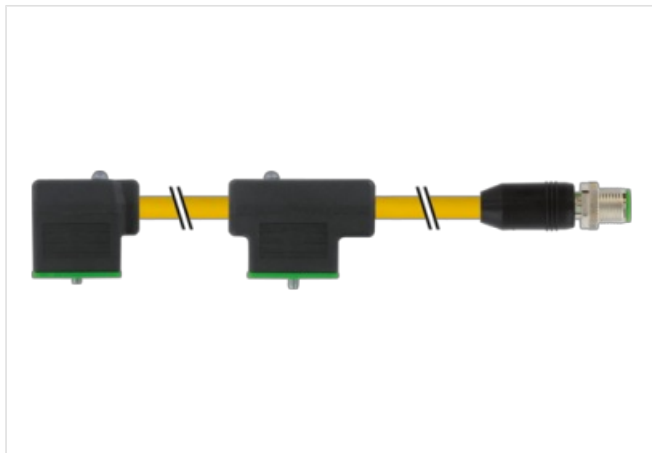


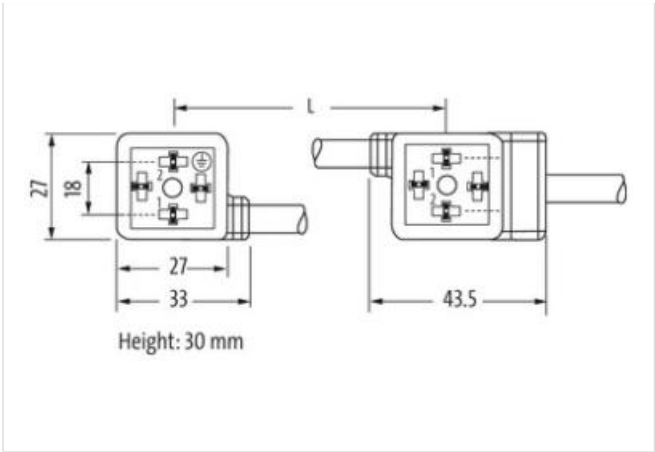
**M12 male 0° A-cod. / MSUD double valve A-18mm**

PUR 4x0.75 ye UL/CSA+drag ch. 4m

Form A (18 mm) – M12, connector at the rear  
 24 V AC  $\pm 20\%$  / DC  $\pm 25\%$   
 LED and suppression  
 Connection cable L = 150 mm  
 Bridged PE

Plastic housings with good resistance against chemicals and oils.  
 The resistance to aggressive media should be individually tested for your application. Further details on request.  
 Further cable lengths on request.

[Link to Product](#)**Illustration**



Product may differ from Image



|                                     |               |
|-------------------------------------|---------------|
| Cable length                        | 4 m           |
| Side 1                              |               |
| Family construction form            | MSUD A        |
| No. of poles                        | 3             |
| Degree of protection (EN IEC 60529) | IP67          |
| Side 2                              |               |
| Family construction form            | MSUD A        |
| No. of poles                        | 3             |
| Degree of protection (EN IEC 60529) | IP67          |
| Side 3                              |               |
| Family construction form            | M12           |
| Coding                              | A             |
| No. of poles                        | 4             |
| Degree of protection (EN IEC 60529) | IP67          |
| Commercial data                     |               |
| ECLASS-6.0                          | 27143423      |
| ECLASS-6.1                          | 27279218      |
| ECLASS-7.0                          | 27279218      |
| ECLASS-8.0                          | 27279218      |
| ECLASS-9.0                          | 27060312      |
| ECLASS-10.1                         | 27060312      |
| ECLASS-11.1                         | 27060312      |
| ECLASS-12.0                         | 27060312      |
| ETIM-5.0                            | EC001855      |
| customs tariff number               | 85444290      |
| GTIN                                | 4048879807647 |
| Packaging unit                      | 1             |
| Electrical data   Supply            |               |
| Operating voltage AC                | 24 V          |
| Operating voltage AC min.           | 19,2 V        |
| Operating voltage AC max.           | 28,8 V        |

|                           |       |
|---------------------------|-------|
| Operating voltage DC      | 24 V  |
| Operating voltage DC min. | 18 V  |
| Operating voltage DC max. | 30 V  |
| Current consumption max.  | 15 mA |

#### Installation | Connection

|                    |        |
|--------------------|--------|
| Tightening torque  | 0,6 Nm |
| Width across flats | SW 13  |

#### Device protection | Electrical

|                                     |         |
|-------------------------------------|---------|
| Degree of protection (EN IEC 60529) | IP67    |
| Pollution Degree                    | 3       |
| Rated surge voltage                 | 0,8 kV  |
| Material group (IEC 60664-1)        | I       |
| Additional suppressor               | Z-Diode |

#### Mechanical data | Material data

|                        |                  |
|------------------------|------------------|
| Locking screw coating  | nickel plated    |
| Locking material screw | Zinc die-casting |

#### Mechanical data | Mounting data

|                 |                   |
|-----------------|-------------------|
| Mounting method | inserted, screwed |
|-----------------|-------------------|

#### Important installation notes

|                        |                                                                                                                                                       |
|------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------|
| Note on strain relief  | Protect the connectors by suitable measures from mechanical loads, e.g. by the usage of cable ties.                                                   |
| Note on bending radius | <b>Attention:</b> Observe the permissible bending radii when laying cables, as the IP protection class can be endangered by excessive bending forces. |

#### Installation | Cable

|                                          |                                                                |
|------------------------------------------|----------------------------------------------------------------|
| wire arrangement                         | black 1, black 2, black 3, green-yellow                        |
| Cable identification                     | 037                                                            |
| Cable Type                               | 3                                                              |
| Printing color of wire insulation        | white (isolation black)                                        |
| Jacket Color                             | yellow                                                         |
| Type of Certificate                      | cURus                                                          |
| Amount stranding                         | 1                                                              |
| Stranding                                | 4 wires twisted                                                |
| wire arrangement                         | black 1, black 2, black 3, green-yellow                        |
| Cable weight                             | 69,3 g/m                                                       |
| Material jacket                          | PUR                                                            |
| Shore hardness jacket                    | 90 ± 5 Shore A                                                 |
| Freedom from ingredients (jacket)        | lead-free, cadmium-free, CFC-free, halogen-free, silicone-free |
| Outer-diameter (jacket)                  | 6,5 mm                                                         |
| Tolerance outer diameter (sheath)        | ± 5 %                                                          |
| Material wire insulation                 | PP                                                             |
| Amount wires                             | 4                                                              |
| Outer diameter insulation                | 1,85 mm                                                        |
| Outer diameter tolerance core insulation | ± 5 %                                                          |
| Shore hardness wire insulation           | 70 ± 5 Shore D                                                 |
| Ingredient freeness wire insulation      | lead-free, cadmium-free, CFC-free, halogen-free, silicone-free |
| Printing color of wire insulation        | white (isolation black)                                        |
| Amount strands (wire)                    | 42                                                             |
| Diameter of single wires                 | 0,15 mm                                                        |
| Conductor crosssection (wire)            | 0,75 mm²                                                       |
| Material conductor wire                  | Stranded copper wire, bare                                     |
| Conductor type (wire)                    | strand class 6                                                 |
| Nominal voltage AC max.                  | 300 V                                                          |
| Current load capacity (standard)         | to DIN VDE 0298-4                                              |

|                                                   |                                                      |
|---------------------------------------------------|------------------------------------------------------|
| Current load capacity min. wire                   | 9,6 A                                                |
| Electrical resistance line constant wire          | 26 Ω/km @ 20 °C                                      |
| AC withstand voltage (wire - wire)                | 2,5 kV @ 60 s                                        |
| Power frequency withstand voltage (wire - jacket) | 2,5 kV @ 60 s                                        |
| Min. operating temperature (static)               | -40 °C                                               |
| Max. operating temperature (fixed)                | 80 °C / 90 °C @ 10000 h Operation                    |
| Operating temperature min. (dynamic)              | -25 °C                                               |
| Operating temperature max. (dynamic)              | 80 °C / 90 °C @ 10000 h Operation                    |
| Flame resistance                                  | UL 1581 § 1100 FT2   IEC 60332-2-2   UL 1581 § 1090  |
| chemical resistance                               | Good, application-related testing                    |
| Gasoline resistance                               | Good, application-related testing                    |
| Oil resistance                                    | DIN EN 60811-404   Good, application-related testing |
| Bending radius (fixed)                            | 5 x Outer diameter                                   |
| Bending radius (dynamic)                          | 10 x Outer diameter                                  |
| No. of bending cycles (C-track)                   | 10 Mio. @ 25 °C                                      |
| Traversing distance (C-track)                     | 10 m @ 25 °C   horizontal                            |
| Travel speed (C-track)                            | 3 m/s @ 25 °C                                        |
| No. of torsion cycles                             | 2 Mio.                                               |
| Torsion stress                                    | ± 180 °/m                                            |
| Torsion speed                                     | 35 cycles/min                                        |