

Type OCULAR & Type ZIRKULAR

Sightglass and tubular sightglass

- very good visual control
- high corrosion resistance

DN 15 - 250 / PN 10 - 25
NPS ½ - 4 / Class 150 - 300

Design characteristics

- T_{max} 220°C / 280°C (OCULAR)
- T_{max} 180°C (ZIRKULAR)

Options (OCULAR)

- heating jacket
- connection for sightglass flushing
- glass-to-metal fused sightglass acc. to DIN 7079
- body in special materials

| Materials | |
|---------------|--------------|
| Body | Sightglass |
| 1.4408 / CF8M | borosilicate |



Type OCULAR
with entry nozzle for turbulences



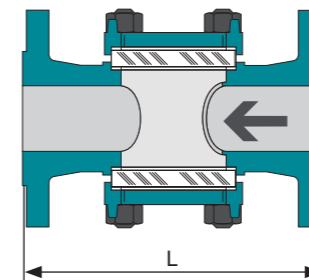
Type ZIRKULAR
with smooth full bore design

Type OCULAR & Type ZIRKULAR

Technical information

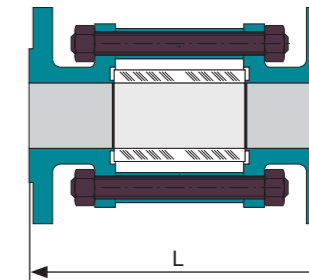
Type OCULAR

T_{max} 280°C



Type ZIRKULAR

T_{max} 180°C



| | DIN 11869, EN 558 | | | | | | DIN 11869, EN 558 | | | |
|-------------------|-------------------|----------------------|-----------------------------------------------|----------------------------------------------------|--------|-------------------|-------------------|----------------------|-----------------------------------------------|--------|
| | DN | PN ^{***} | Standard p _{max} [bar] ^{**} | High Pressure p _{max} [bar] ^{**} | L [mm] | | DN | PN ^{***} | Standard p _{max} [bar] ^{**} | L [mm] |
| DIN 11869, EN 558 | 15 | 10-40 | 40 | 40 | 130 | DIN 11869, EN 558 | 15 | 16 | 15,8 | 130 |
| | 20 | 10-40 | * | * | 150 | | 20 | 16 | 13,5 | 150 |
| | 25 | 10-40 | 25 | 40 | 160 | | 25 | 16 | 11,2 | 160 |
| | 32 | 10-40 | * | * | 180 | | 32 | 16 | 8,7 | 180 |
| | 40 | 10-40 | 16 | 40 | 200 | | 40 | 16 | 11,9 | 200 |
| | 50 | 10-40 | 16 | 40 | 230 | | 50 | 10 | 9,0 | 230 |
| | 65 | 10-40 | * | * | 290 | | 65 | 10 | 7,7 | 290 |
| | 80 | 10-40 | 16 | 40 | 310 | | 80 | 10 | 6,2 | 310 |
| | 100 | 10-40 | 16 | 25 | 350 | | 100 | 10 | 4,8 | 350 |
| | 150 | 10-40 | 16 | - | 480 | | 150 | 10 | 4,8 | 350 |
| 200 | 10-40 | * | * | 600 | 200 | 10 | * | * | | |
| 250 | 10-40 | * | * | 730 | 250 | 10 | * | * | | |
| ASME B16.10 | NPS | Class ^{***} | Standard p _{max} [bar] ^{**} | High Pressure p _{max} [bar] ^{**} | L [mm] | ASME B16.10 | NPS | Class ^{***} | Standard p _{max} [bar] ^{**} | L [mm] |
| | 1 | 150 / 300 | 25 | 40 | 160 | | 1 | 150 / 300 | 11,2 | 160 |
| | 1½ | 150 / 300 | 16 | 40 | 200 | | 1½ | 150 / 300 | 11,9 | 200 |
| | 2 | 150 / 300 | 16 | 40 | 230 | | 2 | 150 / 300 | 9,0 | 230 |
| | 3 | 150 / 300 | 16 | 40 | 310 | | 3 | 150 / 300 | 6,2 | 310 |
| | 4 | 150 / 300 | 16 | 25 | 350 | | 4 | 150 / 300 | 4,8 | 350 |
| | 6 | 150 / 300 | 16 | - | 480 | | 6 | 150 / 300 | * | * |
| | 8 | 150 / 300 | * | * | 600 | | 8 | 150 / 300 | * | * |
| | 10 | 150 / 300 | * | * | 730 | | 10 | 150 / 300 | * | * |

*) on request

***) maximal pressure for standard design / high pressure design

****) higher pressure load on request

Order Example: F-2-OCULAR-DN100-PN10-1.4408-220

F = flange, 2 = two-way, OCULAR = type, DN100 = nominal size, PN10 = nominal pressure, 1.4408 = body material, 220 = T_{MAX}