



Series  
SFI-100, SFI-300, SFI-350,  
SFI-360, SFI-400, SFI-700

# MIDWEST Sight Flow Indicators

Inexpensive Protection for Expensive Equipment and Systems

Flow



Patent No. 5,103,757

Midwest Sight Flow Indicators are manufactured of quality materials and safety tested to assure long, dependable service at economical prices. Available in window viewing style in the 100 and 300 Series and tube viewing style in the 400 and 700 Series with connection choices of female NPT, BSPP, or BSPT threaded and flanged. Series 700 has impeller and internal wipers for cleaning sight tube, which is perfect for fluids with suspended solids. Just rotate the glass tube and restore full 360° visibility without disrupting the flow.

#### Models

- 100 - Single window with impeller
- 300 - Double window with impeller
- 350 - Double window with no indicator
- 360 - Double window with flapper
- 400 - Tube type with no indicator
- 700 - Tube type with impeller and internal wipers to clean glass tube

#### Sight Flow Indicator Dimensions and Weight

| Model Number | Body Size       | Length       | Depth      | Height         | Flange Diameter | Viewing Area Diameter | Weight lbs (kg) |
|--------------|-----------------|--------------|------------|----------------|-----------------|-----------------------|-----------------|
| 100 Series   | 1/4, 3/8        | 3.000 (76)   | 1.813 (46) | 2.125 (54)     | -               | -                     | 1.1 (0.5)       |
|              | 1/2, 3/4        | 4.000 (102)  | 2.250 (57) | 2.563 (65)     | -               | -                     | 1.5 (0.7)       |
|              | 1, 1-1/4        | 4.375 (111)  | 2.563 (65) | 2.625 (67)     | -               | -                     | 2.7 (1.2)       |
|              | 1-1/2, 2        | 5.688 (144)  | 3.250 (83) | 3.625 (83)     | -               | -                     | 5.5 (2.5)       |
| 300 Series   | 1/4, 3/8        | 3.063 (78)   | 2.250 (57) | 2.125 (54)     | -               | -                     | 1.7 (0.8)       |
|              | 1/2, 3/4        | 4.063 (103)  | 2.750 (70) | 2.563 (65)     | -               | -                     | 2.6 (1.2)       |
|              | 1, 1-1/4        | 4.375 (111)  | 3.125 (79) | 2.563 (65)     | -               | -                     | 3.0 (1.4)       |
|              | 1-1/2, 2        | 5.500 (140)  | 3.688 (93) | 4.063 (103)    | -               | -                     | 7.0 (3.2)       |
| 700 Series   | 1/4, 3/8        | 2.750 (70)   | -          | 1.500 (38)     | -               | -                     | 0.9 (0.4)       |
|              | 1/2, 3/4        | 3.688 (94)   | -          | 2.250 (57)     | -               | -                     | 2.4 (1.1)       |
|              | 1, 1-1/4, 1-1/2 | 4.875 (124)  | -          | 2.750 (70)     | -               | -                     | 5.1 (2.3)       |
|              |                 |              |            | (across flats) |                 |                       |                 |
| 400 Series   | 1/2             | 4.500 (144)  | -          | -              | 3.500 (89)      | 1.500 (38)            | 3.8 (1.7)       |
|              | 3/4             | 5.125 (130)  | -          | -              | 3.875 (98)      | 1.750 (44)            | 4.8 (2.2)       |
|              | 1               | 5.625 (143)  | -          | -              | 4.250 (108)     | 2.000 (51)            | 6.2 (2.8)       |
|              | 1-1/4           | 5.750 (146)  | -          | -              | 4.625 (117)     | 2.000 (51)            | 7.6 (3.5)       |
|              | 1-1/2           | 5.875 (149)  | -          | -              | 5.000 (127)     | 2.500 (64)            | 8.7 (4.0)       |
|              | 2               | 6.125 (156)  | -          | -              | 6.000 (152)     | 3.000 (76)            | 13 (6.0)        |
| 400F Series  | 1               | 5.000 (127)  | -          | -              | 4.250 (108)     | 2.000 (51)            | 7 (3.2)         |
|              | 1-1/4           | 5.125 (130)  | -          | -              | 4.625 (117)     | 2.000 (51)            | 8 (3.6)         |
|              | 1-1/2           | 5.250 (133)  | -          | -              | 5.000 (127)     | 2.500 (64)            | 12 (5.4)        |
|              | 2               | 5.370 (137)  | -          | -              | 6.000 (152)     | 3.000 (76)            | 14 (6.4)        |
| 300F Series  | 1               | 5.750 (146)  | -          | -              | 7.500 (191)     | 4.000 (102)           | 23 (10.4)       |
|              | 2               | 6.375 (162)  | -          | -              | 9.000 (229)     | 5.000 (127)           | 31 (14.1)       |
|              | 3               | 8.875 (225)  | -          | -              | 7.500 (191)     | 3.000 (76)            | 38 (17)         |
|              | 4               | 10.250 (260) | -          | -              | 9.000 (229)     | 4.000 (102)           | 56 (25)         |
| 300F Series  | 1-1/2           | 6.375 (162)  | -          | -              | 5.000 (127)     | 2.313 (58)            | 12 (95.5)       |
|              | 2               | 6.500 (165)  | -          | -              | 6.000 (152)     | 2.313 (58)            | 16 (7.5)        |
|              | 3               | 8.875 (225)  | -          | -              | 7.500 (191)     | 3.000 (76)            | 38 (17)         |
|              | 4               | 10.250 (260) | -          | -              | 9.000 (229)     | 4.000 (102)           | 56 (25)         |
| 300F Series  | 6               | 12.500 (318) | -          | -              | 11.000 (279)    | 6.000 (152)           | 120 (55)        |

Dimensions are in inches (mm)

| Sight Flow Indicator  |       |       |       |        |        |
|---|-------|-------|-------|--------|--------|
| Size  | 100   | 300   | 300SS | 350    | 350SS  |
| 1/4"  |       |       |       |        |        |
| 3/8"  |       |       |       |        |        |
| 1/2"  |       |       |       |        |        |
| 3/4"  |       |       |       |        |        |
| 1"  |       |       |       |        |        |
| 1-1/4"  |       |       |       |        |        |
| 1-1/2"  |       |       |       |        |        |
| 2"  |       |       |       |        |        |
| Options: 316SS impeller for 100, 300, 300SS for 1/4", 3/8"; for 1/2" to 1-1/4"; for 1-1/2", 2" MP option on 100 and 300 |       |       |       |        |        |
| Size  | 360   | 360SS | 700   | 700SS  |        |
| 1/4"  |       |       |       |        |        |
| 3/8"  |       |       |       |        |        |
| 1/2"  |       |       |       |        |        |
| 3/4"  |       |       |       |        |        |
| 1"  |       |       |       |        |        |
| 1-1/4"  |       |       |       |        |        |
| 1-1/2"  |       |       |       |        |        |
| 2"  |       |       |       |        |        |
| Options: 316 SS flapper for 360 BSPP or BSPT threads for 700 and 700SS  |       |       |       |        |        |
| Size  | 400CI | 400SS | 400F  | 350FCS | 350FSS |
| 1/2"  |       |       |       |        |        |
| 3/4"  |       |       |       |        |        |
| 1"  |       |       |       |        |        |
| 1-1/4"  |       |       |       |        |        |
| 1-1/2"  |       |       |       |        |        |
| 2"  |       |       |       |        |        |
| 3"  |       |       |       |        |        |
| 4"  |       |       |       |        |        |
| 6"  |       |       |       |        |        |

Contact Factory for options not shown.

**SFI-100 & SFI-300 SERIES**  
Window Style with Threaded Connections

**SPECIFICATIONS**

**Service:** Compatible gases and liquids.  
**Wetted Materials:** Window: Tempered glass. Body: Bronze or 316 SS.  
 Gasket: Buna-N, Fluoroelastomer, or PTFE. Indicator: ABS or 316 SS  
 impeller (100 and 300), 304 SS or 316 SS Flapper (360).  
**Temperature Limit:** 200°F (93°C).  
**Pressure Limit:** 125 psig (8.62 bar), 150 psig (10.34 bar) on "MP"  
 Models.  
**Connections:** Threaded.

| Example          | SFI | 300                      | SS       | 2  | G2   | SFI-300SS-2-G2 Sight Flow Indicator; double window, temper glass, Fluoroelastomer gaskets, 316SS body, ABS impeller, 2 inch female NPT connections.  |
|------------------|-----|--------------------------|----------|--|--|--|
| Model Designator | SFI |                          |          |  |  | Sight flow indicator, tempered glass standard, Buna-N gaskets standard, female NPT connections standard.   |
| Body Style       |     | 100<br>300<br>350<br>360 |          |  |  | Single window, bronze body, ABS Impeller<br>Double window, bronze body, ABS Impeller<br>Double window, bronze body, no moving indicator<br>Double window, bronze body, 304SS flapper   |
| Body Options     |     |                          | SS<br>MP |  |  | 316SS body option for 300, 350, 360<br>150 psig maximum pressure option,<br>includes Fluoroelastomer gaskets   |
| Body Size        |     |                          |          | 1/4<br>3/8<br>1/2<br>3/4<br>1<br>1-1/4<br>1-1/2<br>2 |  | 1/4 inch connection size<br>3/8 inch connection size<br>1/2 inch connection size<br>3/4 inch connection size<br>1 inch connection size<br>1-1/4 inch connection size<br>1-1/2 inch connection size<br>2 inch connection size   |
| Options          |     |                          |          |  | W2<br>G1<br>G2<br>S2<br>S3<br>I1<br>I2<br>I3<br>F1<br>BSPT<br>BSPP | Plexiglass window<br>PTFE gasket<br>Fluoroelastomer gasket<br>316SS Shaft (Not on 350 Model)<br>Monel Shaft (Not on 350 Model)<br>ABS impeller with bronze bushing (Not on 350, 360)<br>316SS impeller (Not on 350, 360)<br>No impeller (100 only)<br>316SS Flapper (360 only)<br>BSPT threads<br>BSPP threads |

(Maximum flow on impeller models: 5FPS with liquids, 5000 FPM with gases)

**SFI-300F SERIES**  
Window Style with Flanged Connections

**SPECIFICATIONS**

**Service:** Compatible gases and liquids.  
**Wetted Materials:** Window: Tempered glass. Body: Carbon Steel or 316 SS.  
 Gasket: Buna-N, Fluoroelastomer, or PTFE. Indicator: 316 SS Flapper (360).  
**Temperature Limit:** 200°F (93°C).  
**Pressure Limit:** 150 psig (10.34 bar).  
**Connections:** Flanged.

| Example          | SFI | 360FSS                               | 1-1/2                     | G1       | SFI-360FSS-1-1/2-G1 Sight Flow Indicator; double window, tempered glass, PTFE gasket, 316SS body, 304SS flapper, 1-1/2 inch raised face flange connections  |
|------------------|-----|--------------------------------------|---------------------------|----------|---|
| Model Designator | SFI |                                      |                           |          | Sight flow indicator, double window, tempered glass, Buna-N gaskets standard, raised face flange connections  |
| Body Style       |     | 350FCS<br>350FSS<br>360FCS<br>360FSS |                           |          | Carbon steel body, no moving indicator<br>316SS body, no moving 316SS indicator<br>Carbon steel body, 316SS flapper<br>316SS body, 316SS flapper  |
| Body Size        |     |                                      | 1-1/2<br>2<br>3<br>4<br>6 |          | 1-1/2 inch raised face flange connection size<br>2 inch raised face flange connection size<br>3 inch raised face flange connection size<br>4 inch raised face flange connection size<br>6 inch raised face flange connection size |
| Options          |     |                                      |                           | G1<br>G2 | PTFE gasket<br>Fluoroelastomer gasket   |

**SFI-700 SERIES**  
Tube Style with Threaded Connections

**SPECIFICATIONS**

**Service:** Compatible gases and liquids.  
**Wetted Materials:** Tube: Tempered Borosilicate. Body: Brass or 316 SS.  
 Gasket: Fluoroelastomer. Indicator: Acetal.  
**Temperature Limit:** 212°F (100°C).  
**Pressure Limit:** 230 psig (15.86 bar).  
**Connections:** Threaded.

| Example          | SFI | 700SS        | 1-1/2   |              | SFI-700SS-1-1/2 Sight Flow Indicator; tube type with 8 blade Acetal impeller and integral wipers to clean tube interior, tempered borosilicate tube, Fluoroelastomer gaskets, 316SS body, 1-1/2 inch female NPT connections   |
|------------------|-----|--------------|---|--------------|---|
| Model Designator | SFI |              |   |              | Sight flow indicator, tube type with 8 blade Acetal impeller and integral wipers to clean tube interior, tempered borosilicate tube, Fluoroelastomer gaskets  |
| Body Style       |     | 700<br>700SS |   |              | Brass body<br>316SS body  |
| Body Size        |     |              | 1/4<br>3/8<br>1/2<br>3/4<br>1<br>1-1/4<br>1-1/2 |              | 1/4 inch female NPT connection size<br>3/8 inch female NPT connection size<br>1/2 inch female NPT connection size<br>3/4 inch female NPT connection size<br>1 inch female NPT connection size<br>1-1/4 inch female NPT connection size<br>1-1/2 inch female NPT connection size |
| Options          |     |              |   | BSPT<br>BSPP | BSPT threads<br>BSPP threads  |

**SFI-400 SERIES**  
Tube Style with Threaded or Flanged Connections

**SPECIFICATIONS**

**Service:** Compatible gases and liquids.  
**Wetted Materials:** Tube: Borosilicate. Body: Cast Iron or 316 SS.  
 Gasket: PTFE.  
**Temperature Limit:** 200°F (93°C).  
**Pressure Limit:** 50 psig (3.45 bar).  
**Connections:** Threaded or Flanged.

| Example          | SFI | 400                    | 1-1/2  |  | SFI-400SS-1-1/2 Sight Flow Indicator; tube type, borosilicate tube, PTFE gaskets, 316SS body, 1-1/2 inch female NPT connections  |
|------------------|-----|------------------------|--|--|--|
| Model Designator | SFI |                        |  |  | Sight flow indicator, tube type, borosilicate tube, PTFE gaskets   |
| Body Style       |     | 400CI<br>400SS<br>400F |  |  | Female NPT connections, cast iron body (only for 1 through 2 inch sizes)<br>Female NPT connections, 316SS body<br>Raised face flange connection, 316SS body (only for 1 inch and up sizes)                               |
| Body Size        |     |                        | 1/2<br>3/4<br>1<br>1-1/4<br>1-1/2<br>2<br>3<br>4 |  | 1/2 inch connection size<br>3/4 inch connection size<br>1 inch connection size<br>1-1/4 inch connection size<br>1-1/2 inch connection size<br>2 inch connection size<br>3 inch connection size<br>4 inch connection size |

(Best for use in vertical pipelines where there are no mechanical strains)

FLOW