

## HONSBERG - FF SERIES FLOW SWITCH

### Piston

FF-015GR012

0,4..12 l/min, G $\frac{1}{2}$ , 200 bar, Normally open

- Switching Range 0,4..90 l/min H<sub>2</sub>O
- Water (oils on request)
- G $\frac{1}{4}$  up to G1 $\frac{1}{2}$
- Bronze, brass, stainless steel, ferrite & NBR
- Pressure range from 16 bar up to 200 bar



### Product description

The Honsberg FF series flow switch is a simple unit which indicates when a specific flow rate has been achieved. The basic operation of the switch is when the volume flow raises a piston (fitted with a magnet) out from a valve seat which is against a spring force and when the specified flow rate is achieved the piston actuates an hermetically separated reed switch. The FF is designed for horizontal inwards flow; switching head not recommended underneath; other installation positions are possible; the installation position affects the switching point and range.

\*The switch point must always be specified/factory-set item

- Adjusted switching value
- Highly reproducible
- Insensitive to dirt
- Adjustment for oil or gas
- Special values

\*The switch point must always be specified/factory-set item

- Specify direction of flow, medium, and switching point.
- For oils, state viscosity, temperature and designation (e.g. ISO VG 68) (enquire about range).
- For gases, state pressure (relative or absolute), temperature and medium (e.g. air) (enquire about range).

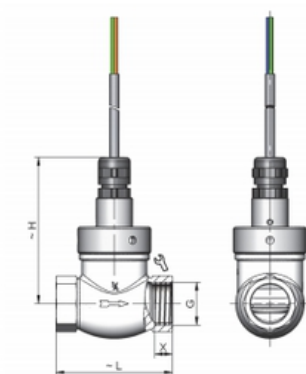
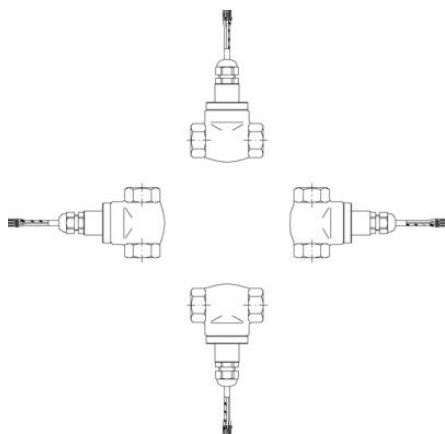
### Installation

- Include straight calming section of 5 x DN in inlet and outlet.
- If the media are dirty, install a filter (use magnetic filter for ferritic components).
- It must be ensured that the values given for voltage, current, and power are not exceeded.
- When switched on, a load must be connected in series. The electrical details apply to ohmic loads. Capacitive, inductive and lamp loads must be operated using a protective circuit.
- Standard: horizontal inwards flow; switching head not recommended underneath; other installation positions are possible; the installation position affects the switching point and range.

;

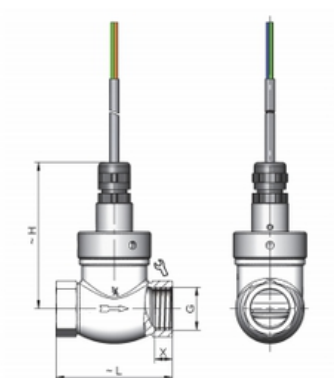
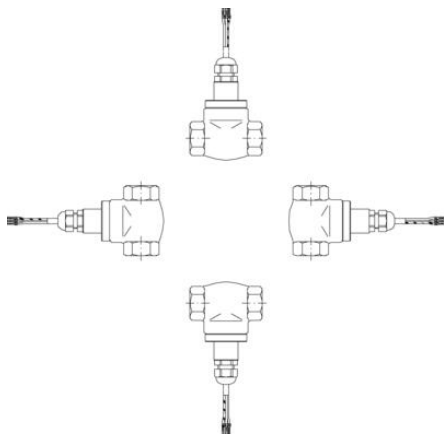
### Specifications

<b>Accuracy</b>	± 3% of reading value, but at least ± 0.3 l / min
<b>Connection</b>	Internal thread, G ½ "
<b>Contact Rating Max</b>	50
<b>Electrical Connection</b>	1.5 m fused cable
<b>Flow Max l/min Double</b>	20
<b>Flow Range Max</b>	12
<b>Flow Range Min</b>	0.4
<b>Function</b>	Flask, reed contact
<b>IP Class</b>	IP65
<b>Material Bolt</b>	Stainless steel 303
<b>Material of body</b>	Nickel-plated brass
<b>Material of connection</b>	Bronze
<b>Material of seals</b>	NBR
<b>Materials Spring</b>	Stainless steel 301
<b>Pressure drop</b>	Approx. 0.4 bar at maximum flow
<b>Pressure Range Max</b>	200
<b>Temperature range of media to</b>	110
<b>Type of flow component</b>	Flow Switches
<b>Weight</b>	0.6
<b>Viscosity Max</b>	1
<b>Voltage AC max</b>	230



G	Types	L	H	SW	X	Weight kg
G ¼	FF-008GR...	68	80	29	12	0.6
G ½	FF-010GR...					
G ½	FF-015GR...				13	
G ¾	FF-020GR...	73	90	32	11	0.7
G 1	FF-025GR...	87		41	14	1.0
G 1¼	FF-032GR...	98	95	52		1.5
G 1½	FF-040GR...	113	95	59		2.0

<b>Wiring</b>	normally open (n.o.) no. 0.212	
	optionally, normally closed no. 0.214 (not all adjustment ranges are possible, please enquire)	



G	Types	L	H	SW	X	Weight kg
G 1/4	FF-008GR...	68	80	29	12	0.6
G 3/8	FF-010GR...				13	
G 1/2	FF-015GR...					
G 3/4	FF-020GR...	73	90	32	11	0.7
G 1	FF-025GR...	87		41	14	1.0
G 1 1/4	FF-032GR...	98	95	52		1.5
G 1 1/2	FF-040GR...	113	95	59		2.0

<b>Wiring</b>	normally open (n.o.) no. 0.212	
	optionally, normally closed no. 0.214 (not all adjustment ranges are possible, please enquire)	