Huba Control

Pressure transmitters

Differential pressure transmitters

Pressure switches

Vortex flow sensors

Pressure level transmitters



Pressure and flow

www.hubacontrol.com

Product overview

				PRESSURE				MEDIUM		
PRESSURE TRANS- MITTERS	PRESSURE RANGE	PAGE	Relative	Absolute	Differential	Air and neut- ral gases	Flammable gases	Liquids	Refrigerants	H2
400 OEM	0 10-100 mbar	8	~			~		~		
501 OEM	-1 0-60 bar	8	~	~		~		~		
503 OEM	0 2.5 - 52 bar	8	~			~		~		
505 OEM	0 4 - 16 bar	9	~			~		~		
506 OEM	-0.5 7 bar / 0 10 - 60 bar	9	~			~		~	~	
511 OEM	-1 0 - 600 bar	9	V	¥		~		~		
512	0 40 - 1000 bar	10	V			~		~		
515 OEM	-1 0 - 600 bar	10	~	~		~		~		
519	0 0.4 - 60 bar	10	V			~		~		
520	-1 9 bar / 0 2.5 - 1000 bar	11	V			~		~	~	
522	0 2.5 - 600 bar	11	~			~		~	~	
525	0 0.05 - 0.6 bar	11	V			~		~		
526	0 0.1 - 0.6 bar	12	V			~		~		
527	0 1 - 60 bar	12	V	~		~		~		
528	-1 0 - 60 bar	12	V	¥		~		~		
540	0 60 - 600 bar	13	V			~		~		
548	-1 0 - 40 bar	13	V			~		~		
550	0 40 - 600 bar	13	~			~		~		
555	0 40 - 900 bar	14	V							~
558	0 6 - 60 bar	14	~	~		~		~		
680	0 0.1 - 1000 bar	14	~	~		~		~		

DIFFERENTIAL PRESSURE TRANSMITTERS									
401 OEM	0 3 - 8 mbar	15	~		~	~			
402	0 3 - 50 mbar	15	~		~	~			
403 OEM	0 3 - 8 mbar	15	~		~	~	~		
450	-1.5 3 - 100 mbar	16	~		✓	~			
652	0 50 - 1000 mbar	16	~		~	~		~	
664	-5 5 mbar/ 0 5- 2000 mbar	16	~			~			
692	0 0.1 - 25 bar	17	~		✓	~		✓	
698	-5 5 mbar / 0 10000 mbar	17	~		~	~			
699	-1 1 mbar / 0 0.3 - 50 mbar	17	~		~	~			
699M	0 500 - 7000 Pa	18	V		✓	V			

PRESSURE LEVEL TRANS	MITTERS						
711	0 0.1 - 10 bar	18	V			✓	
712	0 0.3 - 3 bar	18	~	~		✓	
713	0 0.6 - 16 bar	19	~	~		✓	

ELECTRONIC PRES	SSURE SWITCHES						
521	0 2.5 - 600 bar	19	~		~	V	
529	-1 0 - 60 bar	19	~	~	~	~	

MECHANICAL PRESSURE SWITCHES									
604	0.2 50 mbar	20	~		~	~			
605 OEM	20 400 Pa	20	✓		~	~			
620/625	-900 6000 mbar	20	✓			~		✓	
630	6 5500 mbar	21	~		V	~		V	

FLOW SENSORS						
200 OEM	0.5 150 l/min	21			~	
210	0.5 150 l/min	21			✓	
212	0.5 150 l/min	22			✓	
230	1.8 150 l/min	22			✓	
235 OEM	0.9 240 l/min	22			✓	
236	0.9 240 l/min	23			✓	

DIGITAL INDICATING DEVI	CES					
801	-	23				

Huba Control - the fine difference

Components for measuring pressure and flow are our specialty

Since 1945, the name Huba Control has stood for exceptional quality, top performance and innovation. A claim that spurs and drives our dedicated employees to give their best for our customers every day. Today, as over 75 years ago, the customer and his needs are at the center of our activities.

The focus on pressure and flow measurement is the cornerstone of our success and allows us to develop innovative products and produce them using state-of-the-art manufacturing equipment. Our products are used in applications for process optimization in systems, machines and plants and make an important contribution to process reliability and energy efficiency.

ISO 9001 Certification IATF 16949 Certification

ISO 14001 Certification ISO 45001 Certification





The best under pressure

Individual and efficient solutions for every need



Individual and efficient solutions for highest demands. Sensor elements and fully calibrated, ready-to-use pressure transmitters, pressure switches and flow sensors are manufactured on state-of-the-art, highly automated production facilities. In-depth process knowledge and comprehensive control of our supply chain guarantee quality, flexibility and cost efficiency.

Our core competence is hybrid thick-film technology, which we have been refining and perfecting for over 30 years. This expertise allows us to manufacture sensor elements made of steel and ceramics, which have already proven themselves millions of times under the most difficult conditions. Long-term stable transmitters can thus be manufactured for even the finest pressures

in the Pascal range. For us, uncompromising customer proximity and individual consultation are the foundation of a partnership-based cooperation. We accompany our customers from the first product idea to the successful implementation.







Vortex Flow sensors

Flow measurement based on the Kármán vortex street





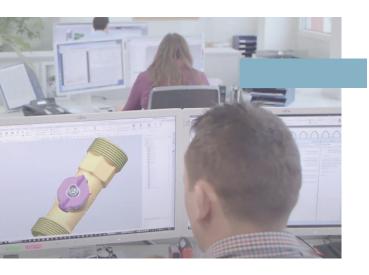
Pressure transmitter

An electrical transmitter for measuring pressure in liquids and gases

We make perfection measurable

Our innovation is your advantage

Quality, sustainability and the safety of our employees are the focus of our actions and thinking. An integrated, process-oriented management system creates the conditions for fulfilling this corporate policy.



«We can handle pressure.

1 mbar ... 1000 bar»

Motivated, entrepreneurial and professional employees are the most important basis for our success. This responsible and customer-oriented approach ensures the quality standards of our products and services.





Differential pressure transmitter

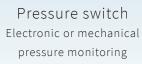
Used to measure pressure changes in

liquids and gases













Pressure level transmitter

Detection of liquid levels in tanks and containers



Markets and presence

The clear focus on pressure measurement technology allows the development of innovative products. A wide range of products meets the most diverse requirements for process optimisation in systems, machines and plants. Sales engineers at the headquarters in Switzerland, in our own

sales offices in Germany, France, Great Britain and the Netherlands, as well as specialist agencies spread all over the world, ensure optimal advice.

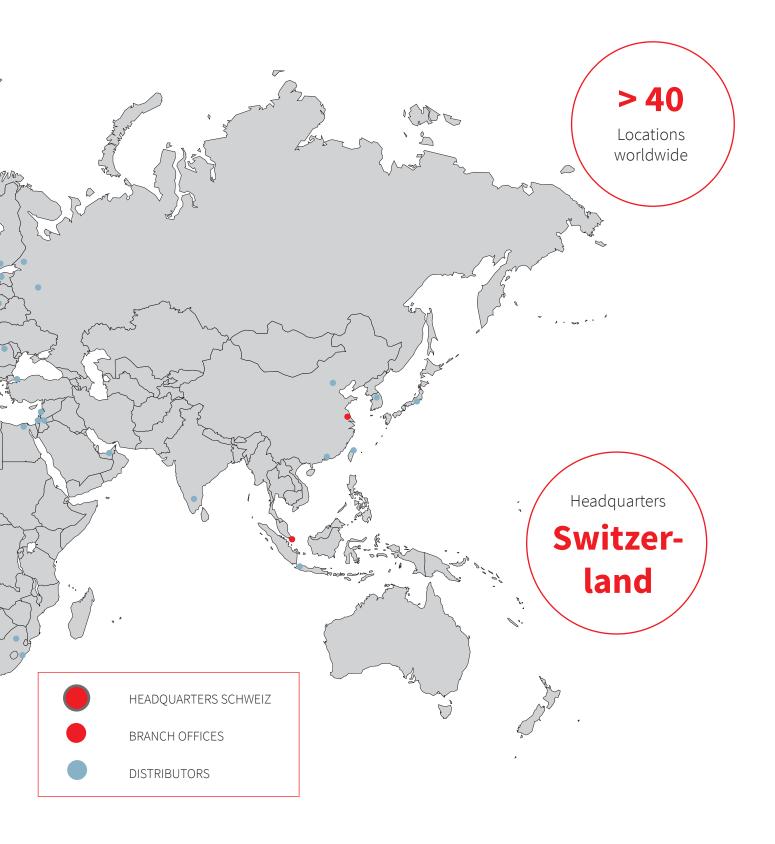
The target markets for Huba Control in the field of pressure and flow measurement technology are control and monito-



ring tasks for a wide range of industrial automation applications as well as special pressure transducers, components for gas wall heaters (GAS), heating, ventilation, air conditioning (HVAC) and the automotive industry.

Huba Control is the market leader in the sub-markets of gas

boilers and HVAC. 97% of the products are exported. More than 50 specialist agencies and our own sales engineers in Germany, France, England, Netherlands and the USA enable us to continuously expand our international presence.



PRESSURE LEVEL TRANSMITTER

TYPE 713

The pressure level transmitter type 713 is used for continuous fluid level measurement of ground and drinking water. The compact design allows the transmitter to be used in applications with restricted access as small as 3/4 inch i.d. pipe. As well as a current output the pressure level transmitter type 713 has been enhanced with energy efficient ratiometric and digital outputs making it ideal for battery powered applications.

MEDIUM

Fluides

PRESSURE RANGE

0 ... 0.6 - 16 bar

OUTPUT

4 ... 20 mA, ratiom. 10 ... 90%, 3000 ... 11000 Digits

ACCURACY

< 0.4% fs

ELECTRICAL CONNECTION

Cable in several lengths

- + Ceramic sensor Al₂O₃ 99.6%
- + Suitable for drinking water
- + Excellent linearity and long term stability
- + Applicable in 3/4 inch pipes
- + Available with temperature measurement

ELECTRONIC PRESSURE SWITCH



TYPE 521

The compact Type 521 pressure switch is based upon the Huba Control developed thick film technology where the pressure measuring cell is fully welded. Switching points set in the factory and are available both N/C and N/O function. Various electrical and pressure connections are available to suit given applications.

MEDIUM

Liquids and gases

PRESSURE RANGE

0...2.5 - 600 bar

UPPER SWITCHING POINT

8 ... 100% fs

LOWER SWITCHING POINT

5 ... 97% fs

ACCURACY

typ. < 0.3% fs

ELECTRICAL CONNECTION

Swift connector, M12x1

PRESSURE CONNECTION

Inside thread or outside thread

- Compact and rugged construction
- + Welded construction no elastomer seals
- Saving the customer time with the swift connector cable mounting system
- Wide choice of connections available

ELECTRONIC PRESSURE SWITCH



TYPE 529

The compact Type 529 pressure switch is based upon the Huba Control developed unique ceramic technology used for the last 20 years in millions of applications. Switching points set in the factory and are available both N/C and N/O function. Various electrical and pressure connections are available to suit given applications.

MEDIUM

Liquids and gases

PRESSURE RANGE

-1 ... 0 - 60 bar

UPPER SWITCHING POINT

8 ... 100% fs

LOWER SWITCHING POINT

5 ... 97% fs

ACCURACY

tvp. < 0.3% fs

ELECTRICAL CONNECTION

Swift connector, M12x1

PRESSURE CONNECTION

Inside thread or outside thread

- + Compact and rugged construction
- + Negligible temperature influence on accuracy
- Saving the customer time with the swift connector cable mounting system
- Wide choice of connections available







MECHANICAL PRESSURE SWITCH

TYPE 604

The Type 604 pressure switch is used as a Δp flow switch in ventilation ducts for the control of filters and fans, and in primary and secondary control systems for the control of air dampers. The 604 pressure monitoring switches are also ideally suited to protect heating coils from overheating and for monitoring industrial air cooling circuits.

MEDIUM

Air and neutral gases

PRESSURE RANGE

0.2 ... 50 mbar

ELECTRICAL CONNECTION

Screw terminals, flat connector 6.3 or 4.8 mm

PRESSURE CONNECTION

Hose connector Ø 6.2 mm or inside thread

- Easy to install
- Multi-layer gold plated contact
- + Combi-bracket for vertical or horizontal installatione
- + Cable strain relief integrated in PG11
- + Long-term stability of switching points through trapezoidal bead diaphragm

OEM MECHANICAL PRESSURE SWITCH

TYPE 605

Type 605 pressure switches are specially developed for use in gas fired heating systems. There are more than 40 million switches in use worldwide. Produced on a fully automated production line. High setting accuracy and repeatability, combined with excellent reliability characterise a quality of switch above the industry norm.

MEDIUM

Air and neutral gases

PRESSURE RANGE

20 ... 400 Pa

ELECTRICAL CONNECTION

Flat connector 6.3 or 4.8 mm

PRESSURE CONNECTION

Hose connector Ø 6.2 mm

- Fitting of the switch
 - · Fast mounting with snap bracket system
- + High contact strength (typically 10 cN) and self cleaning roll operation contact
 - Not susceptible to contact pollution

OEM MECHANICAL PRESSURE SWITCH



TYPE 620/625

Type 620 and 625 pressure switches, with 13 pressure ranges, are suitable for liquids and gases. Body materials are available in plastic, brass and aluminium, with a choice of NBR, FPM, EPDM and silicone diaphragms. Very high precision through finely tuned measurement stages and high long term stability. Rugged design and especially suitable for use in general industrial equipment construction, process technology and food automation.

MEDIUM

Liquids and neutral gases

PRESSURE RANGE

-900 ... 6000 mbar

ELECTRICAL CONNECTION

Screw terminals, Flat connector 6.3 mm

PRESSURE CONNECTION

Inside thread M5, hose connector Ø 6 mm, outside thread

- High accuracy by 13 ideally designed pressure range increments
- + Switching differences adjustable
- + Customer specific switching points adjustable in factory
- Rugged industrial switch with excellent Price / performance ratio







MECHANICAL PRESSURE SWITCH

TYPE 630

Differential pressure, vacuum and overpressure switches of Type 630 are suitable for monitoring neutral and slightly aggressive liquids and gases. Switching element isolated from medium. Ideal for use as flow monitor in sanitary piping / heating installations or for level monitoring in general process technology applications. Extremely rugged construction with high functionality due to 20 bar safety margin in both pressure chambers.

MEDIUM

Liquids and neutral gases

PRESSURE RANGE

6 ... 5500 mbar

ELECTRICAL CONNECTION

Screw terminals, Flat connector 6.3 mm

PRESSURE CONNECTION

Inside thread

Mounting bracket

- Repeatability up to $< \pm 0.4$ mbar
- + Funcionally simple, rugged mechanics with high operating reliability
- + High overpressure safety margin at both connections (P1 + P2) up to 10/20 bar

OEM FLOW SENSOR



TYPE 200

The flow sensor Type 200 is based on the Karman Vortex principle. You can choose between various versions. The Type 200 is available with or without temperature measurement. With no moving parts the flow sensor is not sensitive to debris, has marginal pressure loss and high accuracy.

MEDIUM

Fluides

FLOW RANGE

0.5 ... 150 l/min

NOMINAL DIAMETERS

DN 6 / 8 / 10 / 15 / 20 / 25

OUTPUT

Frequency output 12 ... 483 Hz

TEMP. MEASURMENT

NTC / PT1000

ELECTRICAL CONNECTION

Connector RAST 2.5, M12x1

TUBE CONNECTION

Plastic - connection copper tube

Plastic - outside thread

- + Low cost product with high levels of accuracy
- + Drinking water approval WRAS, KTW, W270, ACS
- + Wide application temperature range
- + Measuring element not sensitive to debris

FLOW SENSOR



TYPE 210

The flow sensor Type 210 is based on the Karman Vortex principle. In comparison to the OEM flow sensor (Type 200), the Type 210 is available with an increased range of power supply and output signals all with and without temperature measurement. With no moving parts the flow sensor is not sensitive to debris, has marginal pressure loss and high accuracy.

MEDIUM

Fluides

FLOW RANGE

0.5 ... 150 l/min

NOMINAL DIAMETERS

DN 6 / 8 / 10 / 15 / 20 / 25

OUTPUT

Frequency output 12 ... 483 Hz Analogue signal 0 ... 10 V, 4 ... 20 mA

TEMP. MEASURMENT

PT1000

ELECTRICAL CONNECTION

Connector M12x

TUBE CONNECTION

Plastic - connection copper tube

Plastic - outside thread

- + Flow measuring with voltage, current, pulse or frequency output
- + Drinking water approval WRAS, KTW, W270, ACS
- + Measuring element not sensitive to
- Temperature non-sensitive measuring principle0







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