

JUMO GmbH & Co. KG

Delivery address: Mackenrodtstraße 14
36039 Fulda, Germany
Postal address: 36035 Fulda, Germany
Phone: +49 661 6003-0
Fax: +49 661 6003-607
E-mail: mail@jumo.net
Internet: www.jumo.net

JUMO Instrument Co. Ltd.

JUMO House
Temple Bank, Riverway
Harlow, Essex CM20 2DY, UK
Phone: +44 1279 635533
Fax: +44 1279 635262
E-mail: sales@jumo.co.uk
Internet: www.jumo.co.uk

JUMO Process Control, Inc.

6733 Myers Road
East Syracuse, NY 13057, USA
Phone: 315-437-5866
1-800-554-5866
Fax: 315-437-5860
E-mail: info.us@jumo.net
Internet: www.jumousa.com



JUMO DELOS SI

Precision pressure transmitter with switching contacts and display

Application

- Food & pharma
- CIP/SIP systems
- Machine and system construction
- Air conditioning and refrigeration system construction

Brief description

The JUMO DELOS SI high-precision, electronic pressure switch with analog output meets technical requirements relevant to hygiene. In a readily cleanable design and with a front-flush, seal-free measuring system, it is specifically geared to hygienic process safety standards and has been engineered and certified in compliance with EHEDG guidelines. The nominal measuring ranges set at the factory extend from 400 mbar to 60 bar. They can be rescaled in the ratio 1:4, allowing the user to perform several measurement tasks with just one measuring instrument. The following output variants are available, depending on the application: 1× PNP or 2× PNP switching outputs or 1× PNP switching output and an analog output signal. The process pressure is visualized by a large, positively lit LC display, which changes from an amber color to red, as an alarm function, if the nominal measuring range is exceeded (6.25 % according to NAMUR). Configuration can simply be performed on the measuring instrument, or by using the more convenient setup program. The enclosure can be rotated +/-160° to make it easier to read, and the display can be rotated 180° for overhead mounting. A high-temperature variant is available for hot media up to 200 °C (CIP and SIP cleaning systems).



Type 405052

Customer benefits

- **Process safety**
An hygienic design, with parts in contact with the medium made from stainless steel. The system has no dead zones, which prevents microbial contamination and ensures maximum process safety for hygienic processes.
- **Uncomplicated and time-saving**
Save time with easy, local measuring instrument configuration or configuration via a more convenient setup program.
- **Flexible**
The enclosure can be turned +/-160° and the display rotated 180° for user-friendly and individual alignment of the measuring instrument for optimum readability, configuration and electrical installation in any mounting position, as well as for running an auto-zero function.

Key features

- Linearity from 0.1 % of FS
- Sclaing of measuring range 1:4
- Large, brilliant two-color display with alarm function
- Time-saving and simple configuration on the instrument or via a more convenient setup program
- Flexible mounting variance by rotating the display (180°), followed by auto zeroing
- Enclosure can be turned (+/-160°) to improve readability
- Option for increased medium temperature up to 200 °C (SIP and CIP capability)

Approval/approval marks (see Technical Data)



JUMO GmbH & Co. KG
 Delivery address: Mackenrodtstraße 14
 36039 Fulda, Germany
 Postal address: 36035 Fulda, Germany
 Phone: +49 661 6003-0
 Fax: +49 661 6003-607
 E-mail: mail@jumo.net
 Internet: www.jumo.net

JUMO Instrument Co. Ltd.
 JUMO House
 Temple Bank, Riverway
 Harlow, Essex CM20 2DY, UK
 Phone: +44 1279 635533
 Fax: +44 1279 635262
 E-mail: sales@jumo.co.uk
 Internet: www.jumo.co.uk

JUMO Process Control, Inc.
 6733 Myers Road
 East Syracuse, NY 13057, USA
 Phone: 315-437-5866
 1-800-554-5866
 Fax: 315-437-5860
 E-mail: info.us@jumo.net
 Internet: www.jumousa.com



Technical data

General information

Reference conditions	DIN 16086 and DIN EN 60770
Sensor system	Silicium sensor with stainless steel separating diaphragm
Pressure transfer means	Synthetic oil (silicon oil), FDA-compliant oil
Permissible load changes	> 10 million
Location	
Mounting position	Any
Position-dependent zero point offset	Device standing upright, process connection on bottom
Basic type 000 standard	≤ 1 mbar
Basic type 004 high-temperature design	≤ 10 mbar
Display	Positively lit display
Alignment	Display can be rotated 180° via software Enclosure rotatable ±160° (use the combination tool supplied)
Size	Display field 16 × 26 mm, font size 7 mm, 2× 4-digit
Color	Normal operation: amber-colored
Switching state display	K1, K2
Measuring unit	mbar, bar, kPa, MPa, psi, %
Operation	
Local	Via control element under the screw plug with combination tool or 0.5 × 3 screwdriver or 2AF hex key
Setup interface	Pin 5 of the M12 × 1 round plug

Input

Relative pressure	Nominal measuring ranges start at 0 bar.						
Nominal measuring range	0.4	1	4	10	25	60	bar
Overload capacity ^a	1.6	4	16	40	100	240	
Bursting pressure	2	5	20	50	125	300	
Nominal measuring range	-0.4 to +0.4	-1 to +1	-1 to +3	-1 to +9	-1 to +24		bar
Overload capacity ^a	1.6	4	16	40	100		
Bursting pressure	2	5	20	50	125		
Absolute pressure	Nominal measuring ranges start at 0 bar.						
Nominal measuring range	0.4	1	4	10	25	60	bar
Overload capacity ^a	1.6	4	16	40	100	240	
Bursting pressure	2	5	20	50	125	300	

^a All measuring ranges can be overloaded to -1 bar (vacuum-proof).

Outputs

All analog outputs in 3-wire technology/Switching outputs: open collector, PNP switching

Analog output	
Current	
Output 475	4 to 20 mA (and 1× PNP switching output)
Output 476	0 to 20 mA (and 1× PNP switching output)
Voltage	
Output 477	0 to 10 V (and 1× PNP switching output)
Step response time (analog input)	
T ₉₀	≤ 100 ms
Switching output	
Output 470, 475, 476 or 477	1× PNP switching output

JUMO GmbH & Co. KG
 Delivery address: Mackenrodtstraße 14
 36039 Fulda, Germany
 Postal address: 36035 Fulda, Germany
 Phone: +49 661 6003-0
 Fax: +49 661 6003-607
 E-mail: mail@jumo.net
 Internet: www.jumo.net

JUMO Instrument Co. Ltd.
 JUMO House
 Temple Bank, Riverway
 Harlow, Essex CM20 2DY, UK
 Phone: +44 1279 635533
 Fax: +44 1279 635262
 E-mail: sales@jumo.co.uk
 Internet: www.jumo.co.uk

JUMO Process Control, Inc.
 6733 Myers Road
 East Syracuse, NY 13057, USA
 Phone: 315-437-5866
 1-800-554-5866
 Fax: 315-437-5860
 E-mail: info.us@jumo.net
 Internet: www.jumousa.com



Output 471	2× PNP switching outputs
Switching type	Break contact/make contact
Switching function	Window/hysteresis
Switching capacity	
Voltage drop from U_B	PNP ≤ 2 V
Contact rating	ON ≤ 250 mA/OFF ≤ 1 mA
Switching cycles	> 10 million
Response time	≤ 20 ms
Short-circuit proof	Yes
Current load check	
Pulse period	2 s; T_{ON} 40 ms
Periodic protective circuit with overcurrent	f = 0.5 Hz Display: Err3 switching output K 1, Err4 switching output K 2
Setting range	
Analog output	Measurement range scaling (turn down) 1:4
Switching output	
Switching point	Configurable in the nominal measuring range (> reset point)
Reset point	Configurable in the nominal measuring range (< switching point)
Hysteresis	Configurable in the nominal measuring range
Input damping	0 to 99.99 s
Input delay	0 to 99.99 s
Burden	
Current	
4 to 20 mA, three-wire	$R_L \leq (U_B - 6.5 \text{ V}) \div 0.022 \text{ A } (\Omega)$
0 to 20 mA, three-wire	$R_L \leq (U_B - 6.5 \text{ V}) \div 0.022 \text{ A } (\Omega)$
Voltage	
DC 0 to 10 V, three-wire	$R_L \geq 10 \text{ K}\Omega$

Mechanical properties

Process connection	
Material	Stainless steel 316L
Surface	$R_a \leq 0.8 \mu\text{m}$
Process seal	All flange connections are welded and therefore have no seals!
Process connection 521, 523, 571, 576, 652	FPM as standard
Process connection 575	FPM as standard, O-ring at front; FDA-compliant
Process connection 997 JUMO PEKA	FPM, VMQ, silicon EPDM; FDA-compliant, options see data sheet 409711
Measuring diaphragm	
Material	Stainless steel 316L
Surface	$R_a \leq 0.8 \mu\text{m}$
Enclosure	
Material	Stainless steel 316L
Surface	$R_a \leq 0.8 \mu\text{m}$
Threaded sleeve M12 × 1	Stainless steel 316L
Enclosure seal	VMQ silicon; FDA-compliant
Display	PA (polyamide)
Control element screw plug	
Material	Aluminum 3.2315
Surface	Eloxal coating
Seal	VMQ silicon; FDA-compliant
Weight	200 g with process connection 504, (G 1/2)

JUMO GmbH & Co. KG
 Delivery address: Mackenrodtstraße 14
 36039 Fulda, Germany
 Postal address: 36035 Fulda, Germany
 Phone: +49 661 6003-0
 Fax: +49 661 6003-607
 E-mail: mail@jumo.net
 Internet: www.jumo.net

JUMO Instrument Co. Ltd.
 JUMO House
 Temple Bank, Riverway
 Harlow, Essex CM20 2DY, UK
 Phone: +44 1279 635533
 Fax: +44 1279 635262
 E-mail: sales@jumo.co.uk
 Internet: www.jumo.co.uk

JUMO Process Control, Inc.
 6733 Myers Road
 East Syracuse, NY 13057, USA
 Phone: 315-437-5866
 1-800-554-5866
 Fax: 315-437-5860
 E-mail: info.us@jumo.net
 Internet: www.jumousa.com



Ambient conditions

Permissible temperatures	
Medium	-25 to +100 °C (135 °C max 1 hour/day; no function here)
For basic type extension 004	-25 to +200 °C
Environment	-25 to +75 °C
Ambient temperature -50 °C	Restricted function: stationary use only, danger of broken cable, display does not function
Storage	-40 to +85 °C
Permissible relative humidity	
In operation	100 % rel. humidity, including condensation of instrument outer sleeve
Storage	90 % rel. humidity, no condensation
Permissible mechanical loading	
Vibration resistance ^a	20 g, 10 to 2000 Hz
Shock resistance ^b	50 g for 11 ms/100 g for 1 ms
Electromagnetic compatibility	With 4-pin connecting cable and grounded enclosure only!
Interference emission ^c	Class B
Interference immunity ^c	Industrial requirements
Protection ^d	IP67

^a IEC 60068-2-6

^b IEC 60068-2-27

^c IEC 61326-2-3

^d EN 60529 (with suitable mating piece when connected)

Accuracy

Relative pressure	Nominal measuring ranges start at 0 bar.						
	0.4	1	4	10	25	60	bar
Nominal measuring range							
Linearity^a	0.15	0.15	0.1	0.1	0.1	0.1	% of FS of NMR
Accuracy at +20 °C ^b	0.35	0.3	0.25	0.25	0.25	0.25	% of FS of NMR
Accuracy at -20 to +75 °C ^c	0.7	0.6	0.5	0.5	0.5	0.5	% of FS of NMR
Nominal measuring range	-0.4 to +0.4	-1 to +1	-1 to +3	-1 to +9	-1 to +24		bar
Linearity^a	0.15	0.15	0.1	0.1	0.1		% of FS of NMR
Accuracy at +20 °C ^b	0.35	0.3	0.25	0.25	0.25		% of FS of NMR
Accuracy at -20 to +75 °C ^c	0.7	0.6	0.5	0.5	0.5		% of FS of NMR
Absolute pressure	Nominal measuring range start at 0 bar.						
Nominal measuring range	0.4	1	4	10	25	60	bar
Linearity^a	0.15	0.15	0.1	0.1	0.1	0.1	% of FS of NMR
Accuracy at +20 °C ^b	0.35	0.3	0.25	0.25	0.25	0.25	% of FS of NMR
Accuracy at -20 to +75 °C ^c	0.7	0.6	0.5	0.5	0.5	0.5	% of FS of NMR
Long-term stability ^d	0.2% with reference conditions as per EN 61298-1						

^a Linearity based on limit point setting

^b Includes: linearity, hysteresis, repeatability, deviation from initial and final values of measuring range

^c Includes: linearity, hysteresis, repeatability, deviation from initial and final values of measuring range, thermal effect on initial value of measuring range and span

^d EN 61298-1

JUMO GmbH & Co. KG

Delivery address: Mackenrodtstraße 14
36039 Fulda, Germany
Postal address: 36035 Fulda, Germany
Phone: +49 661 6003-0
Fax: +49 661 6003-607
E-mail: mail@jumo.net
Internet: www.jumo.net

JUMO Instrument Co. Ltd.

JUMO House
Temple Bank, Riverway
Harlow, Essex CM20 2DY, UK
Phone: +44 1279 635533
Fax: +44 1279 635262
E-mail: sales@jumo.co.uk
Internet: www.jumo.co.uk

JUMO Process Control, Inc.

6733 Myers Road
East Syracuse, NY 13057, USA
Phone: 315-437-5866
1-800-554-5866
Fax: 315-437-5860
E-mail: info.us@jumo.net
Internet: www.jumousa.com

**Auxiliary power**

Voltage supply U_B^a 0 to 20 mA, three-wire, output 476 4 to 20 mA, three-wire, output 475 0 to 10 V, three-wire, output 477 Less than the permitted voltage supply	Nominal voltage DC 24 V DC 12 to 30 V DC 12 to 30 V DC 14 to 30 V Display Err 5
More than the maximum voltage supply > DC 34 V	The specified properties are no longer met.
Reverse polarity protection	YES
Power consumption	≤ 45 mA without load, ≤ 545 mA with load 2× PNP
Electrical connection	Round plug M12 × 1, 4-pin, A-coded (for assignment see "Connection diagram")
Circuit	SELV

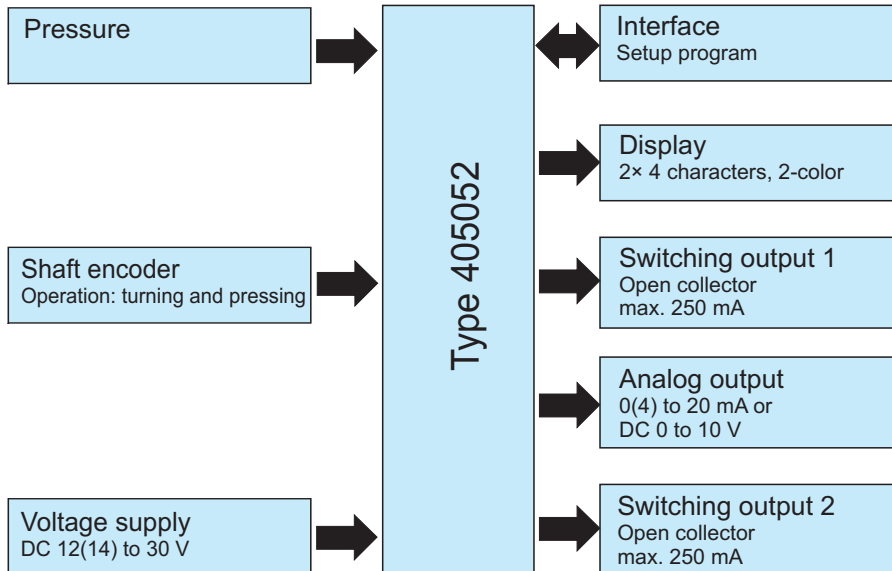
^a Residual ripple: Peak voltages must not exceed or fall below the values specified for the voltage supply!

Approval/marks of conformity

Mark of conformity	Testing laboratory	Certificate/ Certification number	Test basis	Valid for
EHEDG	TUM MAK	No. 03/2006	Document No. 8	Process connection 997 JUMO PEKA



Block diagram



Connection diagram

Output 470		Output 471		Output 475 - 477	
1 PNP switching output		2 PNP switching outputs		1 PNP switching output + 1 analog output	
Voltage supply		Voltage supply		Voltage supply	
1 L+	DC 12(14) to 30 V	1 L+	DC 12(14) to 30 V	1 L+	DC 12(14) to 30 V
3 L-	(GND)	3 L-	(GND)	3 L-	(GND)
Output		Output		Output	
4 K1	Highside open collector max. 250 mA	2 K2	Highside open collector max. 250 mA	2 analog	0(4) to 20 mA/0 to 10 V
2	nc	4 K1		4 K1	Highside open collector max. 250 mA
5	Interface	5	Interface	5	Interface

Color assignment: M12 × 1 round plug

1 bn	Brown	4 bk	Black
2 wh	White	5 gy	Gray
3 bu	Blue		

The color assignment applies **only** to A-coded standard cables.

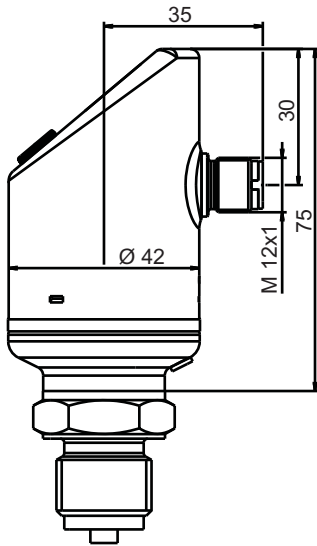
JUMO GmbH & Co. KG
 Delivery address: Mackenrodtstraße 14
 36039 Fulda, Germany
 Postal address: 36035 Fulda, Germany
 Phone: +49 661 6003-0
 Fax: +49 661 6003-607
 E-mail: mail@jumo.net
 Internet: www.jumo.net

JUMO Instrument Co. Ltd.
 JUMO House
 Temple Bank, Riverway
 Harlow, Essex CM20 2DY, UK
 Phone: +44 1279 635533
 Fax: +44 1279 635262
 E-mail: sales@jumo.co.uk
 Internet: www.jumo.co.uk

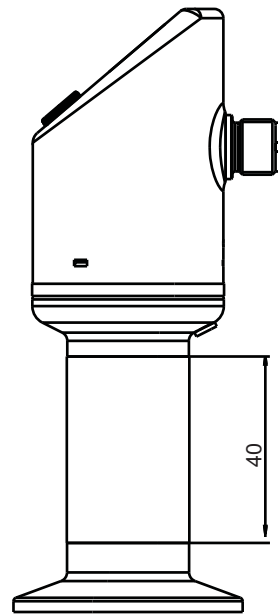
JUMO Process Control, Inc.
 6733 Myers Road
 East Syracuse, NY 13057, USA
 Phone: 315-437-5866
 1-800-554-5866
 Fax: 315-437-5860
 E-mail: info.us@jumo.net
 Internet: www.jumousa.com



Dimensions



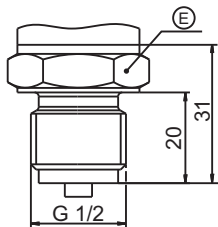
Type 405052/000-...



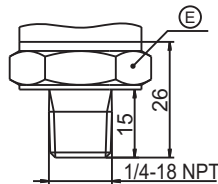
Type 405052/004-...

Process connections, not front-flush

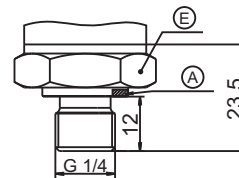
504



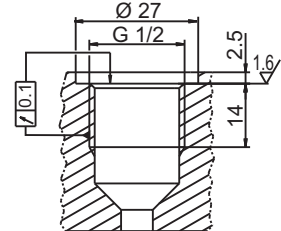
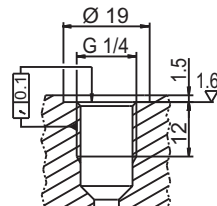
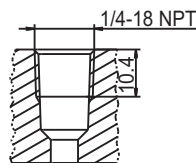
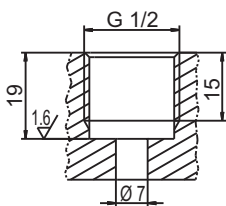
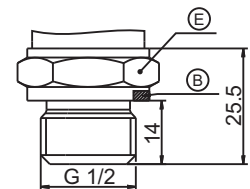
511



521



523



A = Profile seal DN G 1/4
 B = Profile seal DN G 1/2
 E = 27 AF

JUMO GmbH & Co. KG
 Delivery address: Mackenrodtstraße 14
 36039 Fulda, Germany
 Postal address: 36035 Fulda, Germany
 Phone: +49 661 6003-0
 Fax: +49 661 6003-607
 E-mail: mail@jumo.net
 Internet: www.jumo.net

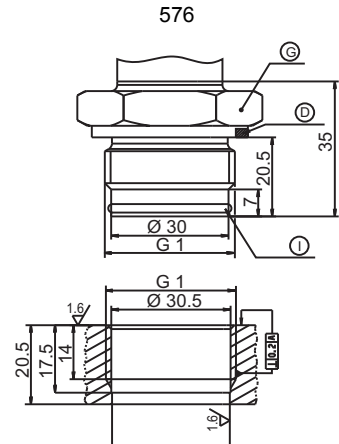
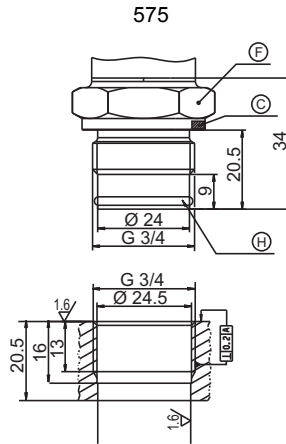
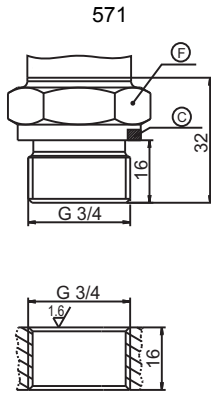
JUMO Instrument Co. Ltd.
 JUMO House
 Temple Bank, Riverway
 Harlow, Essex CM20 2DY, UK
 Phone: +44 1279 635533
 Fax: +44 1279 635262
 E-mail: sales@jumo.co.uk
 Internet: www.jumo.co.uk

JUMO Process Control, Inc.
 6733 Myers Road
 East Syracuse, NY 13057, USA
 Phone: 315-437-5866
 1-800-554-5866
 Fax: 315-437-5860
 E-mail: info.us@jumo.net
 Internet: www.jumousa.com



Dimensions

Process connections, front-flush

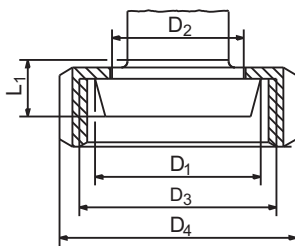


- C = Profile seal DN G 3/4
- D = Profile seal DN G 1
- F = 32 AF

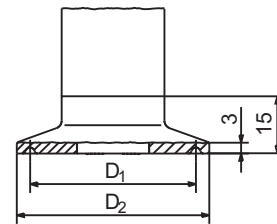
- G = 41 AF
- H = O-ring 20.35 × 1.78
- I = O-ring 26.7 × 1.78

- J = O-ring 29.82 × 2.62

603 to 607

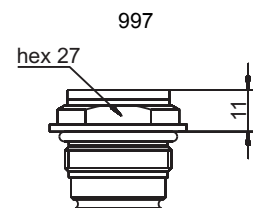
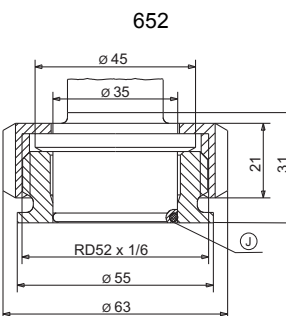
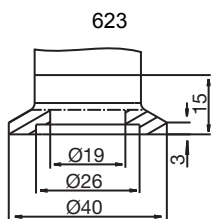


612 to 616



Process connection	DN	Ø D ₁	Ø D ₂	Ø D ₃	Ø D ₄	L ₁
603	20	36.5	30	RD 44 × 1/6	54	13
604	25	44	35	RD 52 × 1/6	63	15
606	40	56	48	RD 65 × 1/6	78	15
607	50	68.5	61	RD 78 × 1/6	92	16

Process connection	DN DIN 32676	DN (inch)	Nominal size ISO 2852	Ø D ₁	Ø D ₂
612	20 15		12	27.5	34
			12.7		
			17.2		
			21.3		
613	25 32 40	1?? 1.5??	25	43.5	50.5
			33.7		
			38		
616	50	2??	40	56.5	64
			51		



Process connection for adapter system certified by EHDEGJUMO PEKA (see data sheet 409711)

JUMO GmbH & Co. KG

Delivery address: Mackenrodtstraße 14
36039 Fulda, Germany
Postal address: 36035 Fulda, Germany
Phone: +49 661 6003-0
Fax: +49 661 6003-607
E-mail: mail@jumo.net
Internet: www.jumo.net

JUMO Instrument Co. Ltd.

JUMO House
Temple Bank, Riverway
Harlow, Essex CM20 2DY, UK
Phone: +44 1279 635533
Fax: +44 1279 635262
E-mail: sales@jumo.co.uk
Internet: www.jumo.co.uk

JUMO Process Control, Inc.

6733 Myers Road
East Syracuse, NY 13057, USA
Phone: 315-437-5866
1-800-554-5866
Fax: 315-437-5860
E-mail: info.us@jumo.net
Internet: www.jumousa.com



Order details

(1) Basic type	
405052/000	JUMO DELOS SI - Precision pressure transmitter with switching contacts and display ^a
405052/004	JUMO DELOS SI - Precision pressure transmitter with switching contacts and display for increased measuring material temperatures up to 200 °C ^b
405052/999	JUMO DELOS SI - Precision pressure transmitter with switching contacts and display, special version
(2) Input	
447	-400 to +400 mbar relative pressure
449	-1 to +1 bar relative pressure
452	0 to 400 mbar relative pressure
454	0 to 1 bar relative pressure
457	0 to 4 bar relative pressure
459	0 to 10 bar relative pressure
461	0 to 25 bar relative pressure
463	0 to 60 bar relative pressure
481	-1 to +3 bar relative pressure
483	-1 to +9 bar relative pressure
485	-1 to +24 bar relative pressure
486	0 to 400 mbar absolute pressure
488	0 to 1 bar absolute pressure
491	0 to 4 bar absolute pressure
493	0 to 10 bar absolute pressure
495	0 to 25 bar absolute pressure
(3) Output	
470	1× PNP switching output
471	2× PNP switching outputs
475	1× PNP switching output and 1× analog output 4 to 20 mA ^c
476	1× PNP switching output and 1× analog output 0 to 20 mA ^c
477	1× PNP switching output and 1× analog output 0 to 10 V ^c
(4) Process connection	
504	G 1/2 EN 837
511	1/4-18 NPT EN 837
521	G 1/4 DIN 3852-11
523	G 1/2 DIN 3852-11
571	G 3/4 front-flush EN ISO 228-1
575	G 3/4 front-flush with 2-way seal
576	G 1 front-flush with 2-way seal
603	Taper socket with union nut DN 20 DIN 11851 (dairy screw connection) ^d
604	Taper socket with union nut DN 25 DIN 11851 (dairy screw connection) ^d
606	Taper socket with union nut DN 40 DIN 11851 (dairy screw connection) ^d
607	Taper socket with union nut DN 50 DIN 11851 (dairy screw connection) ^d
612	Clamp DN 10, 15, 20 DIN 32676
613	Clamp DN 25, 32, 40 DIN 32676
616	Clamp DN 50 DIN 32676, 2" ISO 2852
619	Clamp DN 15 DIN 32676, 3/4" ISO 2852
623	Small flange DN 25 DIN 28403
652	Tank connection with grooved union nut DN 25 ^e
997	JUMO PEKA with EHEDG approval ^f
998	Suitable for connection to diaphragm seal
(5) Process connection material	
20	CrNi (stainless steel)

JUMO GmbH & Co. KG
 Delivery address: Mackenrodtstraße 14
 36039 Fulda, Germany
 Postal address: 36035 Fulda, Germany
 Phone: +49 661 6003-0
 Fax: +49 661 6003-607
 E-mail: mail@jumo.net
 Internet: www.jumo.net

JUMO Instrument Co. Ltd.
 JUMO House
 Temple Bank, Riverway
 Harlow, Essex CM20 2DY, UK
 Phone: +44 1279 635533
 Fax: +44 1279 635262
 E-mail: sales@jumo.co.uk
 Internet: www.jumo.co.uk

JUMO Process Control, Inc.
 6733 Myers Road
 East Syracuse, NY 13057, USA
 Phone: 315-437-5866
 1-800-554-5866
 Fax: 315-437-5860
 E-mail: info.us@jumo.net
 Internet: www.jumousa.com



(6) Electrical connection	
36	Round plug M12 × 1
(7) Measuring system filling medium	
01	Silicon oil
12	FDA-compliant oil
(8) Extra codes	
000	None
100	Customized setting (specify required setting in plain text)
452	Parts in contact with the medium are electropolished, surface roughness Ra ≤ 0.8 µm
591	Throttle in pressure channel
624	Free of oil and grease
691	Improved humidity/vibration protection

- ^a This JUMO product is licensed under United States and Canadian patents. Purchasers of the JUMO product outside of the United States and Canada should advise JUMO of any planned sales of products incorporating the JUMO product into the United States and Canada.
- ^b Measuring devices for increased measuring material temperatures can only be delivered with process connection 571, 575, 576, 603, 604, 606, 607, 612, 613, 623, 652, 997.
- ^c Factory setting - the analog output can be freely configured.
- ^d Union nut is included in delivery.
- ^e Welding socket, seal and groove union nut are included in delivery.
- ^f For suitable process connection adapters, see data sheet 409711.

Order code (1) (2) (3) (4) (5) (6) (7) (8)
 [] - [] - [] - [] - [] - [] - [] / []
Order example 405052/000 - 459 - 471 - 504 - 20 - 36 - 01 / 000

Stock versions

Delivery in 3 working days after receipt of order

Type	Version	Sales no.
405052/000-459-475-504-20-36-01/000	0 to 10 bar rel., 1× PNP switching output and 4 to 20 mA, G 1/2	00520630
405052/000-449-475-504-20-36-01/000	-1 to +1 bar rel., 1× PNP switching output and 4 to 20 mA, G 1/2	00523317
405052/000-454-475-504-20-36-01/000	0 to 1 bar rel., 1× PNP switching output and 4 to 20 mA, G 1/2	00527029
405052/004-491-475-504-20-36-01/000	Increased measuring material temperature, 0 to 4 bar abs., 1× PNP switching output and 4 to 20 mA, G 3/4	00527725
405052/000-457-475-504-20-36-01/000	0 to 4 bar rel., 1× PNP switching output and 4 to 20 mA, G 1/2	00528156
405052/000-452-475-504-20-36-01/000	0 to 400 mbar rel., 1× PNP switching output and 4 to 20 mA, G 1/2	00528746
405052/000-461-475-504-20-36-01/000	0 to 25 bar rel., 1× PNP switching output and 4 to 20 mA, G 1/2	00528994
405052/000-452-475-997-20-36-01/000	0 to 400 mbar rel., 1× PNP switching output and 4 to 20 mA, JUMO PEKA	00530067
405052/000-483-475-997-20-36-01/000	-1 to +9 bar rel., 1× PNP switching output and 4 to 20 mA, JUMO PEKA	00533816

Accessories

Article	Sales no.
PC interface cable including USB/TTL converter ^a	00456352
Y transmitter cable, 5 pole ^a	00507861
Combination tool	00526614
Cable connector, straight, 4 pole, M12 × 1, 2 m PVC cable	00404585
Cable connector, angled, 4 pole, M12 × 1, 2 m PVC cable	00409334
Cable socket, 5 pole, M12 × 1, straight, without connecting cable, assembly by customer	00419130
Measuring device holder for wall and 2" pipe	00597711
CD-setup program ^a	00522384

^a The setup program can only be used for configuration in conjunction with these accessories.