

DATA SHEET - OPERATION MANUAL

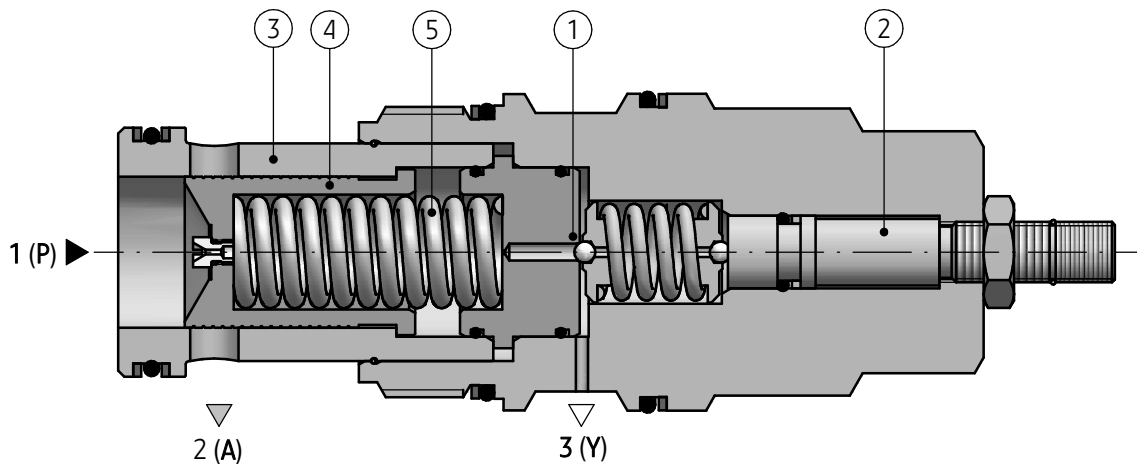
APPLICATION

The valve type **UZKS25...** is intended for turning on (connecting) of a system or a part of a system after reaching a pressure set at the pressure valve. It can be used as a pressure relief valve in systems, where there is a pressure in a drain channel **A**.



DESCRIPTION OF OPERATION

UZKS25 - 12/C



The main elements of the sequence cartridge valve type **UZKS25...** are: initial valve (1), valve setting (2), main valve - bushing (3), spool (4), spring (5). When there is no pressure at port **P**, the spool (4) remains in starting position, where the flow to the port **A** is shut off. When the pressure rises in the port **P** above the value set by the valve setting (2),

after overcoming the force of the spring (5), the spool (4) is moved and the flow to the part of the system connected to port **A** is open. The valve keeps the pressure in port **P** independently from pressure changes in the port **A** - up to the value set by using the valve setting (2). Port **Y** is connected with the tank.

TECHNICAL DATA

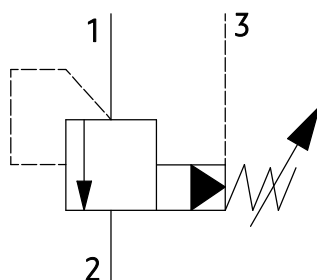
Hydraulic fluid	mineral oil	
Required fluid cleanliness class	ISO 4406 class 20/18/15	
Nominal fluid viscosity	37 mm ² /s at temperature 55 °C	
Viscosity range	2,8 up to 380 mm ² /s	
Fluid temperature range (in a tank)	recommended	40°C up to 55°C
	max	-20°C up to +70°C
Ambient temperature range	-20°C up to +70°C	
Max working pressure	35 MPa	
Max flow	450 dm ³ /min	
Max set pressure	version UZKS25.../C...	version UZKS25.../D...
	32 MPa	10 MPa
Min set pressure	0,9 MPa	0,2 MPa
Weight	1,5 kg	

INSTALLATION AND OPERATION REQUIREMENTS

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| <ol style="list-style-type: none"> 1. Only fully functional and operational valve can be used. 2. During the period of operation must be kept fluid viscosity acc. to requirements defined in this Data Sheet - Operation Manual 3. In order to ensure failure free and safe operation the following must be checked: <ul style="list-style-type: none"> • proper working of the valve • cleanliness of the hydraulic fluid 4. Due to heating of valve body to high temp., the valve shall be placed in such way to eliminate the risk of | <p>accidental contact with the valve body during operation or to apply suitable covers acc. to PN - EN ISO 13732 - 1 and PN - EN 4413</p> <ol style="list-style-type: none"> 5. In order to provide tightness of the valve connection to the hydraulic system, one should keep the dimensions of the sealing rings, tightening torques and work parameters of the valve, specified in this Data Sheet - Operation Manual. 6. A person that operates the valve must be thoroughly familiar with this Data Sheet - Operation Manual. |
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DIAGRAMS

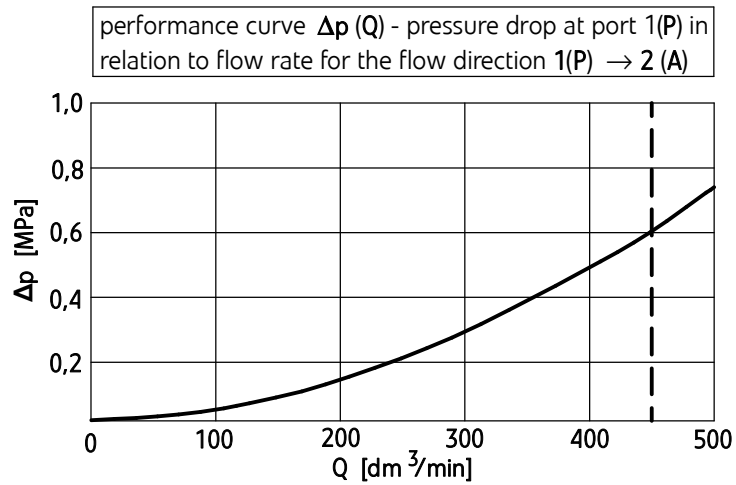
Graphic symbol for the UZKS25... valve



PERFORMANCE CURVES

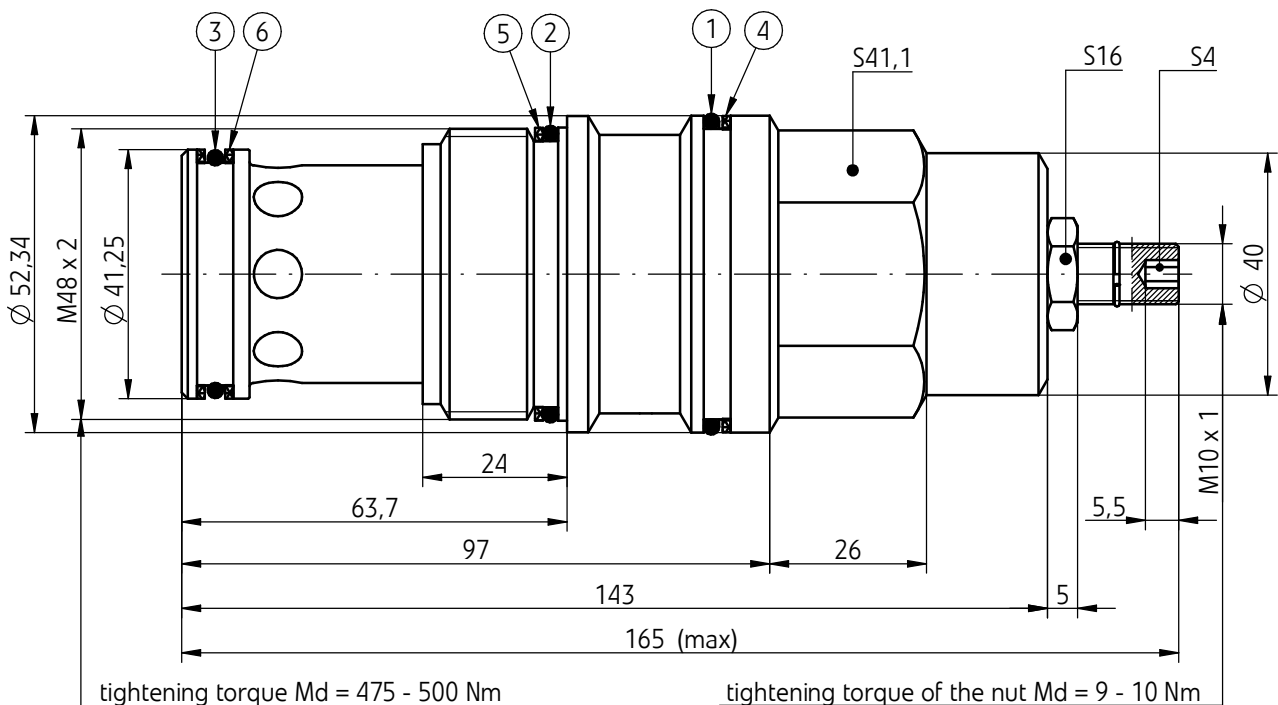
measured at oil viscosity $\nu = 41 \text{ mm}^2/\text{s}$ and temperature $t = 50^\circ\text{C}$

Flow resistance curve



OVERALL AND CONNECTION DIMENSIONS

valve type UZKS25...



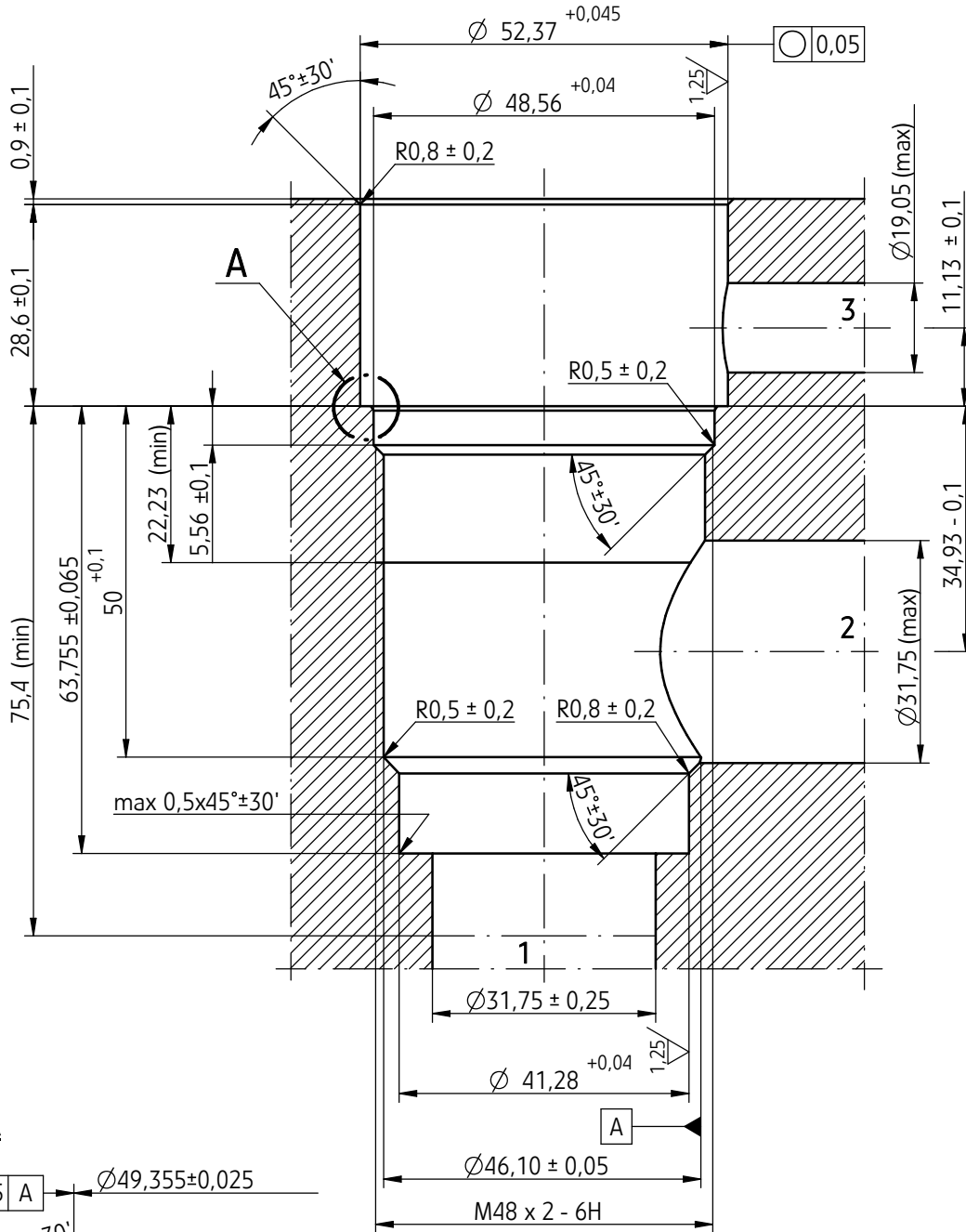
1 - Sealing ring o-ring 48 x 2,5	- pcs. 1/set
2 - Sealing ring o-ring 44 x 2,5	- pcs. 1/set
2 - Sealing ring o-ring 36 x 2,5	- pcs. 1/set
4 - Back-up ring 52,3 x 47,8 x 1,3	- pcs. 1/set
5 - Back-up ring 48,4 x 43,9 x 1,3	- pcs. 1/set
6 - Back-up ring 41,2 x 35,7 x 1,3	- pcs. 2/set

OVERALL AND CONNECTION DIMENSIONS

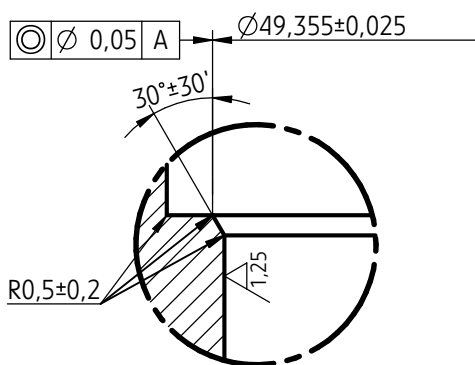
installation cavity

tightening torque $M_d = 475 - 500 \text{ Nm}$

⊙ 0,05 A - applied to all diameters of main hole and phase



detail A



HOW TO ORDER

UZKS	25	—	/			★
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Nominal size (NS) NS25	= 25
Series number (12-19) - connection and installation dimensions unchanged	= 1X
series 12	= 12
Control range from 0,9 up to 32 MPa	= C
from 0,2 up to 10 MPa	= D
Sealing NBR (for fluids on mineral oil base)	= no designation
FKM (for fluids on phosphate ester base)	= V
Further requirements in dear text (to be agreed with the manufacturer)	

NOTES:

The valve should be ordered according to the above coding.

The symbols in bold are the preferred versions available in short delivery time.

Coding example: UZKS 25 - 12/C

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