AB

Miniature electropilots U2

Direct intervention electropilots with poppet valve system and bottom cushioned seals
- Assembly on sub-base
- Threaded connections on the body
- CNOMO interface
- Orientable coil (360°) separated from mechanical part
- Versions: 2/2 3/2 - NC NO
- Original Univer SPEED modular sub-base

TECHNICAL CHARACTERISTICS

Ambient temperature	-10 ÷ +50 °C			
Fluid temperature	max +95 °C			
Fluid	filtered air 10 µm, lubricated or not			
	(upon request other fluids can be used)			
Commutation system	direct intervention poppet valve system with cushioned seals			
Ways/Positions	**2/2 NC, 3/2 NC, 3/2 NO**[(a)]			
Pressure	**2/2, 3/2 NC** = 0 ÷ 10			
	3/2 NO = 3 ÷ 10			
Control	electric			
Return	mechanical spring			
Connections	on sub-base or with threaded connections on the body			
	sub-base	**G 1/8**	**M5**	**CNOMO**
Nominal Ø (mm)	2,1 ÷ 2,4	2,1 ÷ 2,4	1,6 ÷ 6	2,1 ÷ 2,4
Nominal flow rate (Nl/min)	92 ÷ 150	100 ÷ 155	95 ÷ 650	92 ÷ 110

CONSTRUCTIVE CHARACTERISTICS

Materials	see features below

ELECTRIC CHARACTERISTICS

Series	U2
Coil	DB
Power consumption	11W (DC) - 10 VA (AC)
Connector	AM 5111
Voltage	12 V DC - 24 V DC - 24 V AC - 110 V AC - 230 V AC

For other electric features see section **"Accessories>Coils"**

(a) = Mechanical part designed to keep the air supply always from the body
(Useful in case of assembly of more NC-NO pilots in series to have a unique supply port)

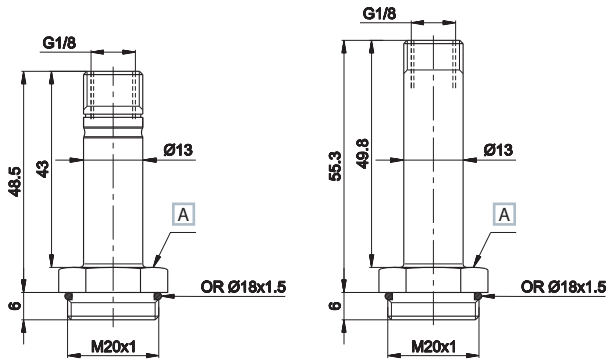
U2 Sleeves - with moving core

Material:	
sleeve	treated brass
cores and springs	stainless steel
seals	nitrile rubber

	Exhaust Ø	Pressure	Weight	Part no.
	mm	bar	Kg	
3/2 NO	2,4	3÷10	0,060	**AB-0600**
3/2 NC	2,4	0÷10	0,060	**AB-0613**
2/2 NC (a)	-	0÷10	0,060	**AB-0640**
2/2 NC	-	0÷10	0,070	**AB-0643**

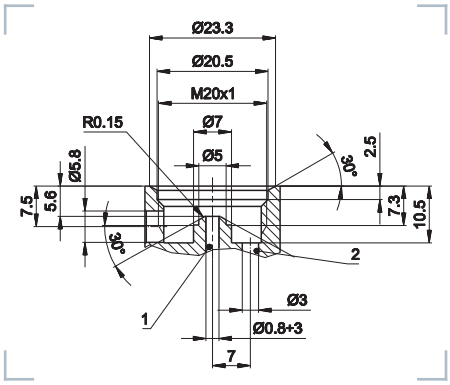
Upon request viton seals and stainless steel sleeves (only NC options)

■ NC ■ NO



A Wrench 22

■ Detail of machining

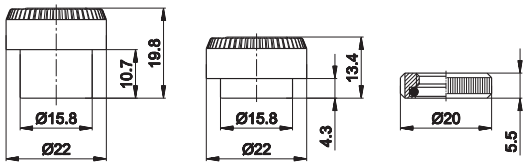


1 = Supply port
2 = Use

Locking rings for coils on sleeves

Version	Suitable for sleeves	Material	Coil	Part no.
1 = radial exhausts	3/2 NC	technopolymer	U2	**AM-5212A**
2 = radial exhausts	3/2 NO	technopolymer	U2	**AM-5214A**
3 = open exhausts	2/2 NC	brass	U2	**AM-5212B**

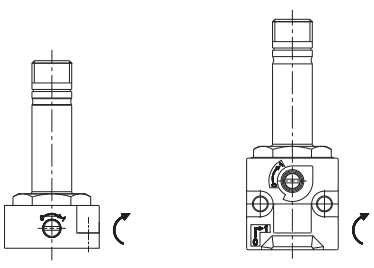
In order to convey exhausts, use version 3



1 2 3

Standard manual overrides with electropilots

Functionig	Suitable for sleeves	Symbol/Part no.
1 = with 2 position screw	all NC U2 electropilots that can use manual override	⊖
2 = with impulse 1-2 position screw	only CNOMO NC U2 electropilots	⊖
3 = with button with tool	only CNOMO NC U2 electropilots	→
4 = with button, 1 position	U2 NO 3/2 electropilots	**AM-5203**(b)



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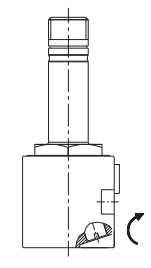

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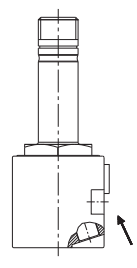

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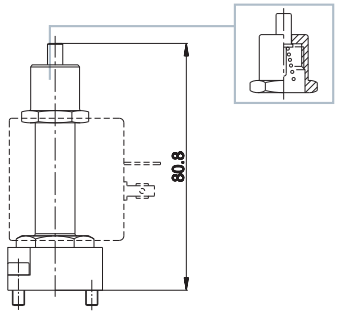


4

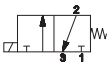
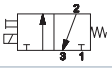
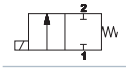
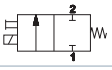
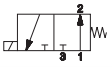
(a) = Suitable for sub-bases with diameter from 3 ÷ 6

(b) = Mounted on the 3/2 NO sleeve

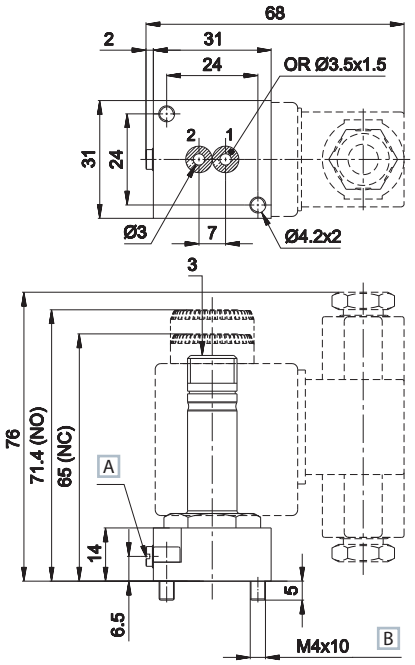
⊖ = with 2 position screw
→ = with button with tool

U2 **2/2 - 3/2** Electropilot for assembling on sub-base

Material:	
valve body	zamak
sleeve	treated brass
core and spring	stainless steel
seals	nitrile rubber
Weight (Kg):	0,125

	Symbol	Ø (d) mm	Flow rate (Nl/min) 1→2	2→3	Times (ms) En.	De-en.	Manual override	Part no.
3/2 NC		2,4	150	160	13	10	—	**AB-0681**
3/2 NC		2,4	150	160	13	10	⊖	**AB-0687**
2/2 NC		2,1	130	-	13	-	—	**AB-0722**
2/2 NC		2,1	130	-	13	-	⊖	**AB-0728**
3/2 NO (c)		2,4	92	148	14	10	(e)	**AB-0685**

Sub-base: SPEED U2. Available upon request: stainless steel sleeve - other inner diameters.

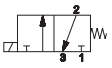
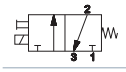
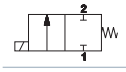
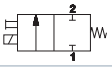
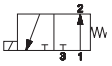


A Manual override
B ISO 4762

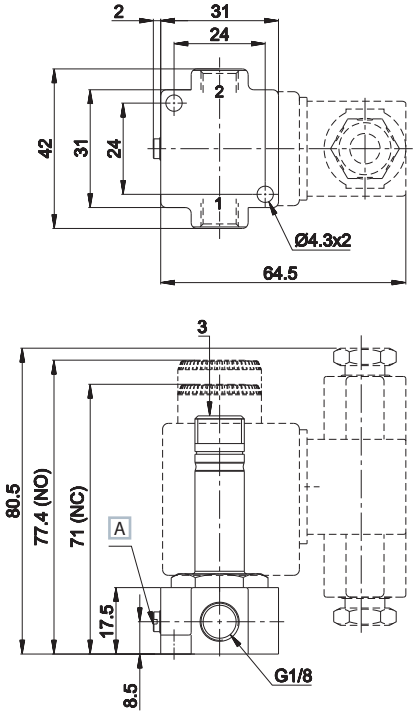
1 = Supply port
2 = Use
3 = Exhaust

U2 **2/2 - 3/2** G1/8 Electropilot

Material:	
valve body	zamak
sleeve	treated brass
core and spring	stainless steel
seals	nitrile rubber
Weight (Kg):	0,145

	Symbol	Ø (d) mm	Flow rate (Nl/min) 1→2	2→3	Times (ms) En.	De-en.	Manual override	Part no.
3/2 NC		2,4	155	210	13	10	—	**AB-0751**
3/2 NC		2,4	155	210	13	10	⊖	**AB-0757**
2/2 NC		2,1	155	-	12	-	—	**AB-0765**
2/2 NC		2,1	155	-	12	-	⊖	**AB-0771**
3/2 NO (c)		2,4	100	150	14	11	(e)	**AB-0755**

Available upon request: stainless steel sleeve - other inner diameters.



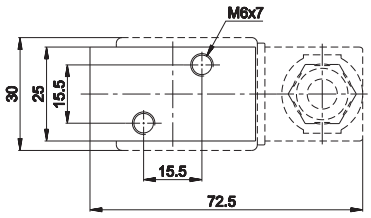
A Manual override

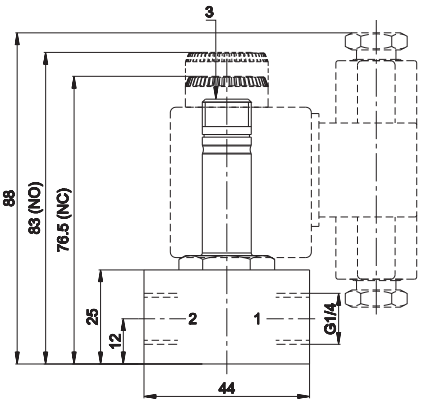
1 = Supply port
2 = Use
3 = Exhaust

(c) = close the exhaust of the 3/2 NO electropilot to get the 2/2 NO one. (d) = the Ø shown on the 3/2 valves refers to the exhhaust. ⊖ = with 2 position screw.
(e) = manual override on AM-5203 ring nut

Electropiltots are supplied without coil, connector and locking ring

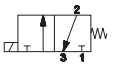
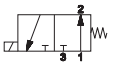
U2 **3/2** G1/4 Electropilot





Material:	
valve body	brass\
sleeve	treated brass
core and spring	stainless steel
seals	nitrile rubber

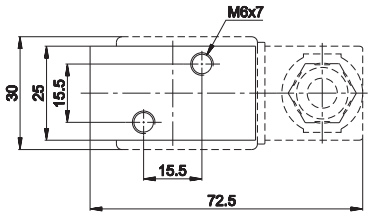
Weight (Kg):	0,225

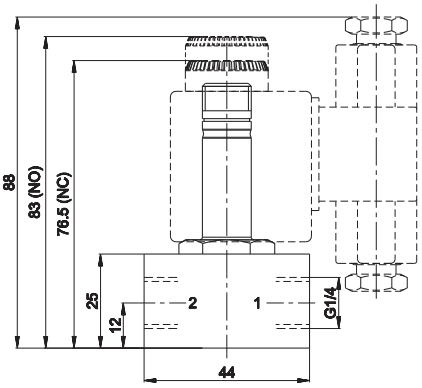
	Symbol	Ø (d) mm	Flow rate (Nl/min) 1→2	2→3	Times (ms) Ecc.	Dis.	Manual override	Part no.
3/2 NC		2,1	200	210	13	11	—	**AB-0822**
3/2 NO (c)		2,1	95	160	12	10	(e)	**AB-0819**

Suitable for use with non-aggressive liquids. Upon request: stainless steel body and sleeve.

1 = Supply port
2 = Use
3 = Exhaust

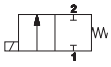
U2 **2/2** G1/4 Electropilot





Material:	
valve body	brass
sleeve	treated brass
core and spring	stainless steel
seals	nitrile rubber

Weight (Kg):	0,220

	Symbol	Ø (d) mm	Flow rate (Nl/min)	Pressure bar	Times (ms) En.	De-en	Part no.
2/2 NC		1,6	108	0÷30	6	-	**AB-0824**
		2	165	0÷20	9	-	**AB-0825**
		2,4	210	0÷15	11	-	**AB-0826**
		3	280	0÷10	12	-	**AB-0827**
		3,5	350	0÷9	-	10	**AB-0828**
		4	450	0÷8	-	13	**AB-0829**
		4,5	500	0÷7	-	13	**AB-0830**
		5	550	0÷6,5	-	16	**AB-0831**
		5,5	600	0÷6	-	21	**AB-0832**
		6	650	0÷5	-	29	**AB-0833**

Suitable for use with non-aggressive liquids.

1 = Supply port
2 = Use

Coil U2 - 17 VA

Voltage
24V AC - 50/60 Hz **DB-0607**
110V AC - 50/60 Hz **DB-0608**
220V AC - 50/60 Hz **DB-0610**

(c) = close the exhaust of the 3/2 NO electropilot to get the 2/2 NO one. (d) = the Ø shown on the 3/2 valves refers to the exhhaust. ⊖ = with 2 position screw.
(e) = manual override on AM-5203 ring nut

Electropiltots are supplied without coil, connector and locking ring

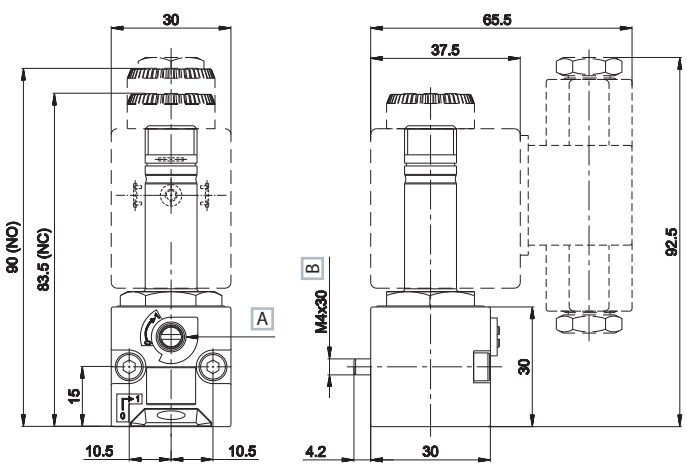
U2 CNOMO **2/2 - 3/2** Electropilot for mounting on sub-bases SPEED U2

Material:	
valve body	technopolymer
sleeve	treated brass
core and spring	stainless steel
seals	nitrile rubber

Weight (Kg):	0,155

Symbol	Ø (d)	Flow rate (Nl/min)		Times (ms)		Manual	Part no.
	mm	1→2	2→3	En.	De-en.	override	
3/2 NC	2,4	110	170	13	12	⊖	**AB-0885**
2/2 NC	2,1	115	-	12	-	⊖	**AB-0886**
3/2 NO (c)	2,4	92	148	13	10	(e)	**AB-0888**

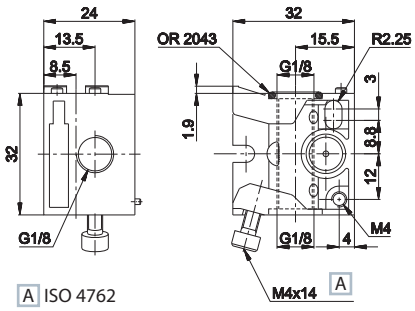
Sub-base: SPEED U2. Available upon request: brass valve body (without manual override). Zamak valve body. Stainless steel sleeve - other inner diameters.



A Override manual
B ISO 4762

1 = Supply port
2 = Use
3 = Exhausts

Modular sub-base SPEED series U2 G1/8



A ISO 4762

Electropilot	Connections	Material	Weight	Part no.
			kg	
U2 for base	G 1/8	zamak	0,075	**AB-0900**

Advantages
The original UNIVER "Speed" series was realized to solve some operational problems

- Possibility of defining the number of sube-bases at the moment of use
- Possibility of freely increasing or reducing the number of elements
- Quick assembly with special screw (built-in) standard supplied
- Reduction of stock holding
- Easy technical intervention

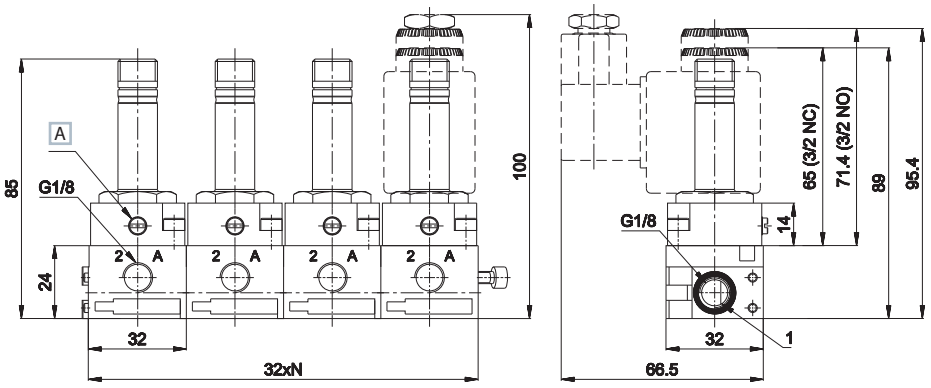
Air supply is rotated by 90° in comparison with side consumption
Standard (built-in) screw and O-Ring

When assembling the manifold, put the bases on a flat surface and tighten the screw until the manifold is perfecty aligned.

(c) = close the exhaust of the 3/2 NO electropilot to get the 2/2 NO one (d) = the Ø shown on the 3/2 valves refers to the exhhaust ⊖ = with 2 position screw
(e) = manual override on ring nut AM-5203

Electropiltots are supplied without coil, connector and locking ring

U2 **G1/8** Sub-base

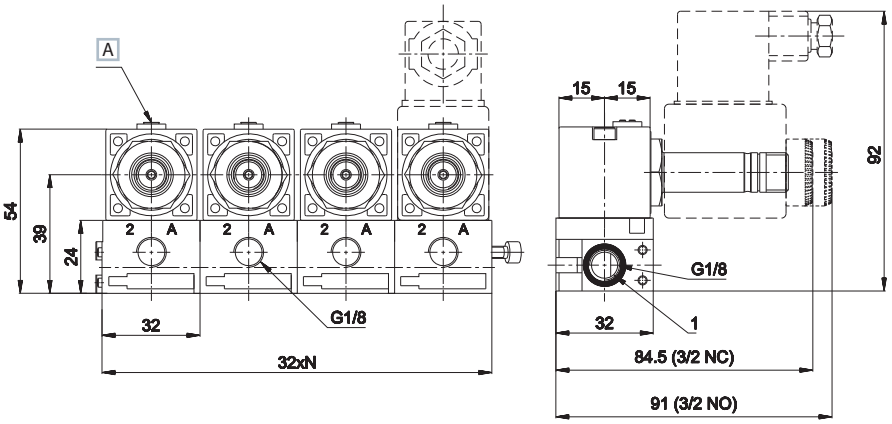


A Manual override

1 = Supply port
2 - A = Use

N = Number of valve position

U2 **G1/8 CNOMO** Sub-base



A Manual override

1 = Supply port
2 - A = Use

N = Number of valve position