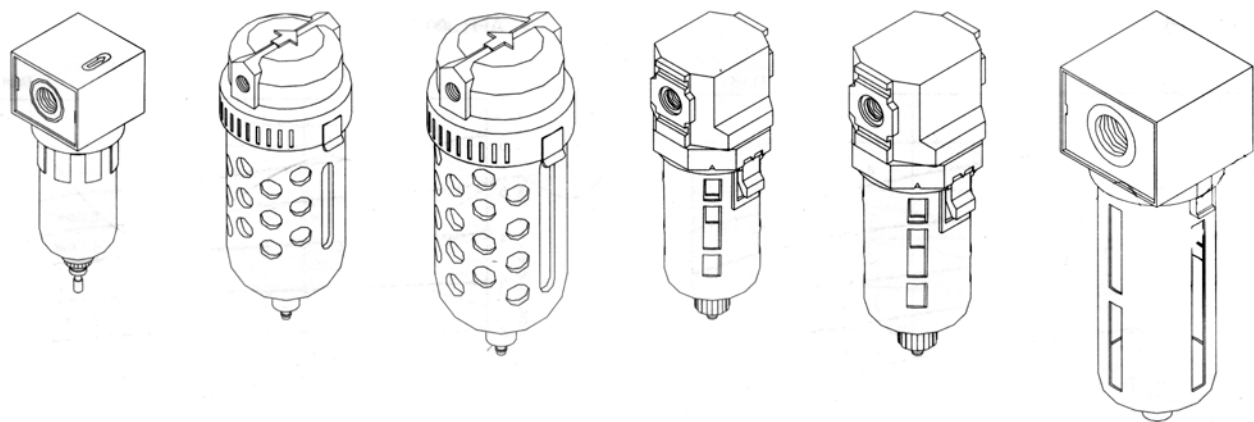




Operating Information



AF200-8		AF320-8	AF320-10	AF420-15
Port size (PT)	1/4"	1/4"	3/8"	1/2"
Working pressure	0.5 ~ 8.5(bar)			
Working temperature	0 - 60 °C			
Filtration	5µm(option : 40µm)			

* For 40µm filter element add "-40" to end number, (example : AF 300-8-AD40-40)

Ordering Information

AF320

Type	
200	Mini semi-modular type
320	Junior modular type
420	Junior modular type

- 10 -

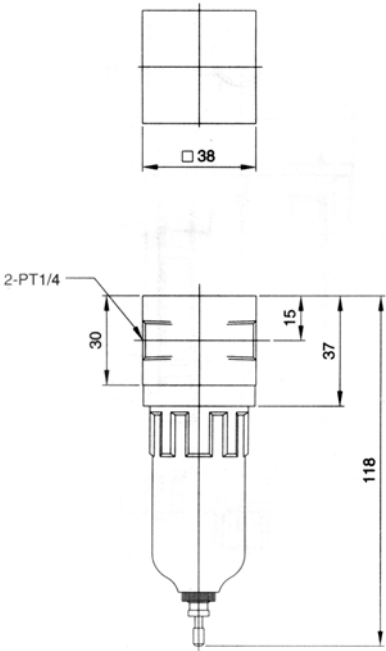
Port size(PT)	
8	1/4" (200,300,320 type only)
10	3/8" (300,320 type only)
15	1/2" (400,420 type only)

AD40

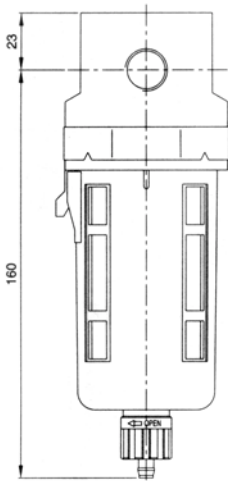
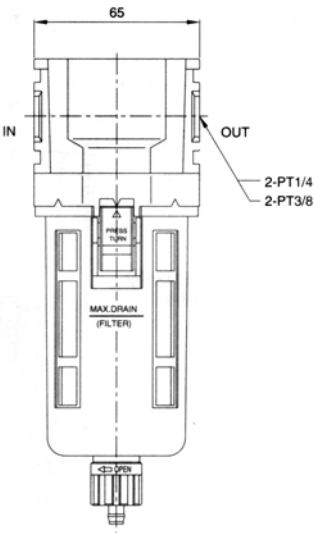
Auto drain	
AD 20	200 type only
AD 40	300,400, 320, 420, 600 type only

Dimensions, Filter

AF200-8



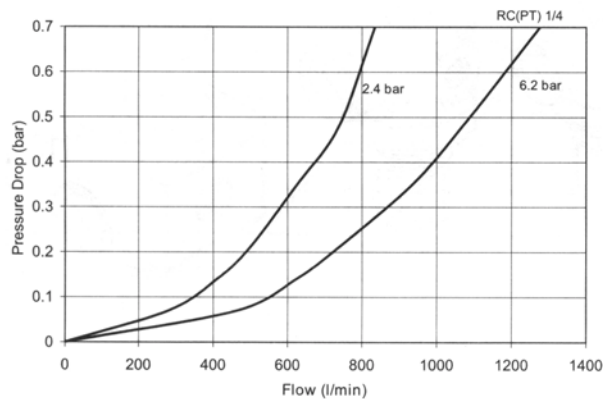
AF320-8, 10



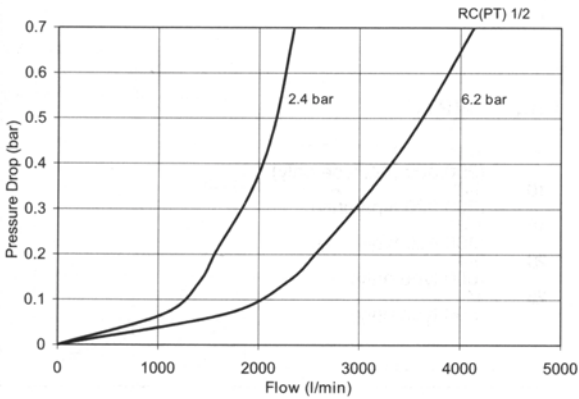
Flow characteristics, Filter

(at 7 bar inlet)

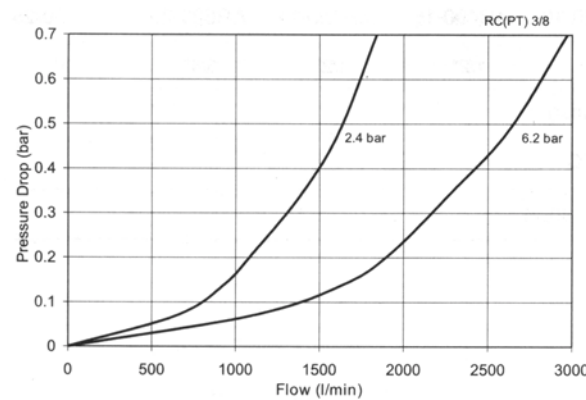
• AF 200-8



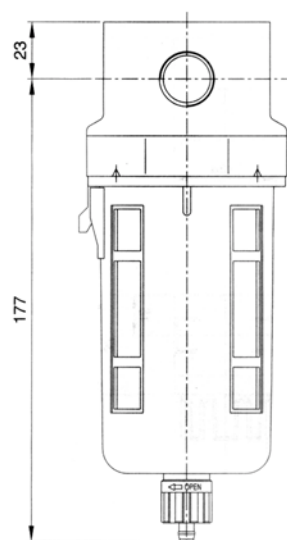
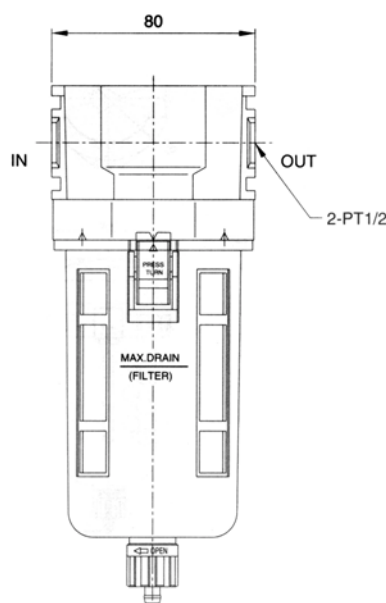
• AF 420-15

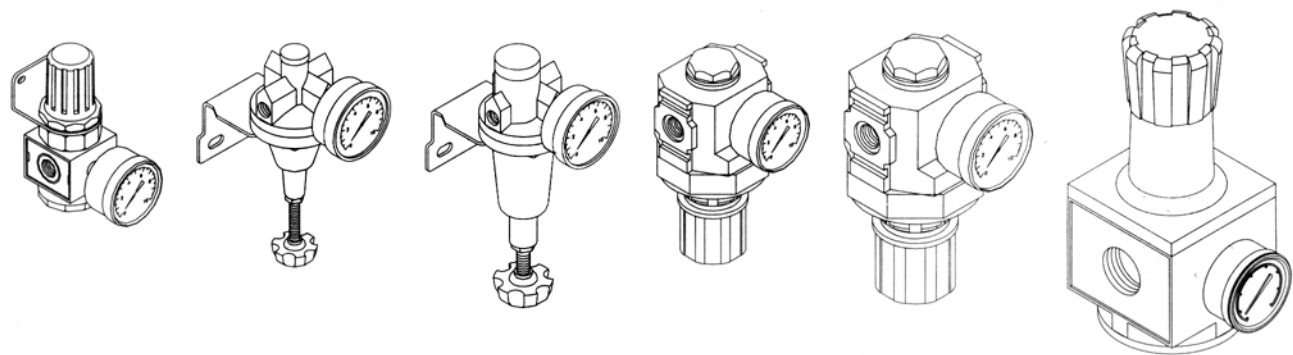


• AF 320-10

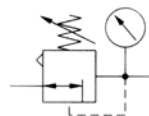


AF420-15





Operating Information



	AR200-8	AR320-8	AR320-10	AR420-15
Port size (PT)	1/4"	1/4"	3/8"	1/2"
Working pressure	0.5 ~ 8.5(bar)			
Working temperature	0 - 60 °C			
Filtration	5 μ m(option : 40 μ m)			

Ordering Information

AR320

Type

200	Mini semi-modular type
320	nipple connection type
420	Junior modular type
	Junior modular type

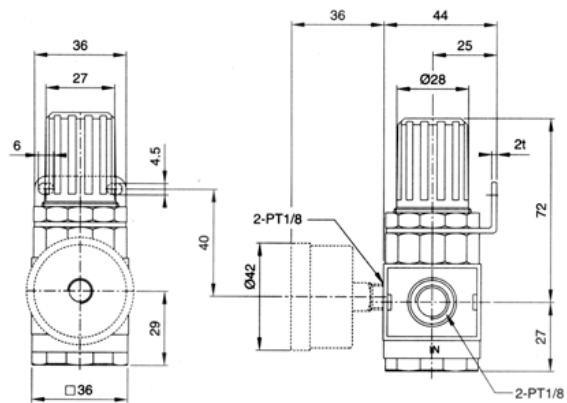
-

10

Port size(PT)

8	1/4" (200,300,320 type only)
10	3/8" (300,320 type only)
15	1/2" (400,420 type only)
20	3/4" (600 type only)
25	1" (600 type only)

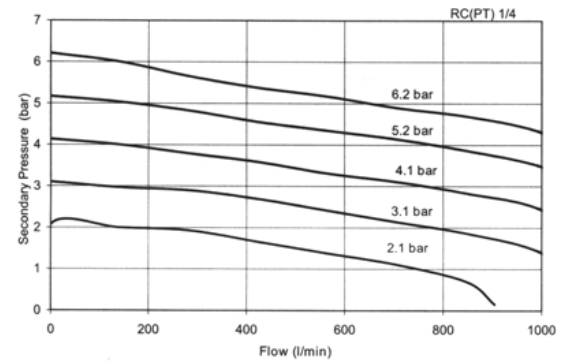
• AR 200-8



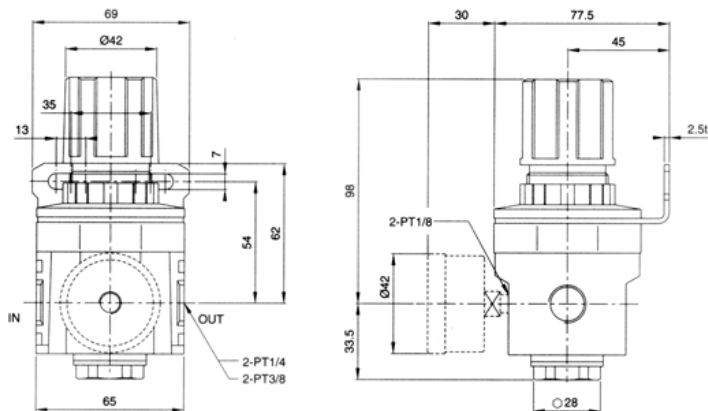
Flow characteristics, regulator

(at 7 bar inlet)

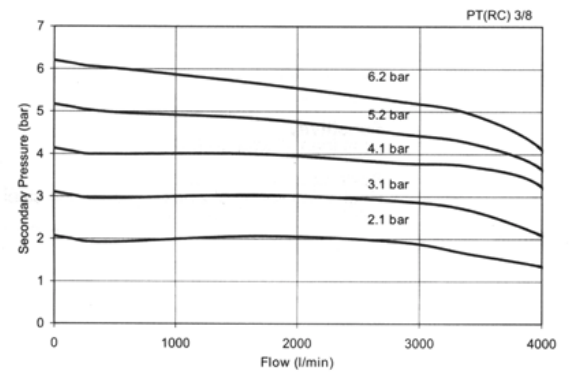
• AR 200-8



• AR 320-8, 10

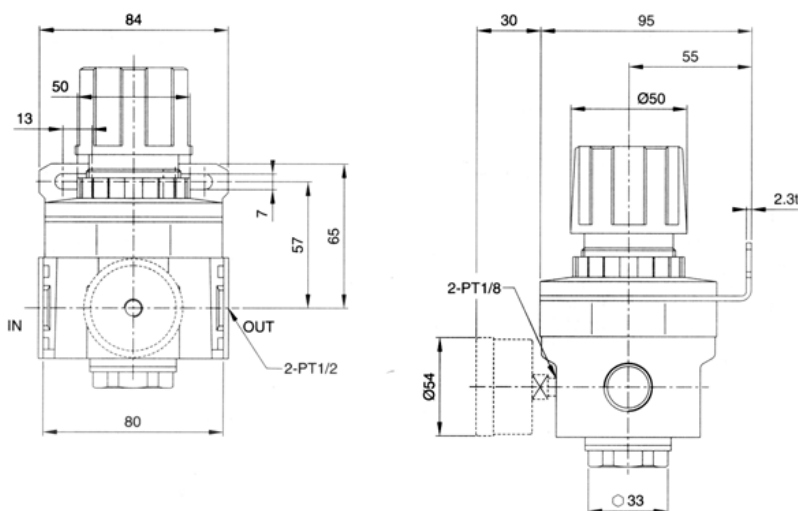


• AR320-10

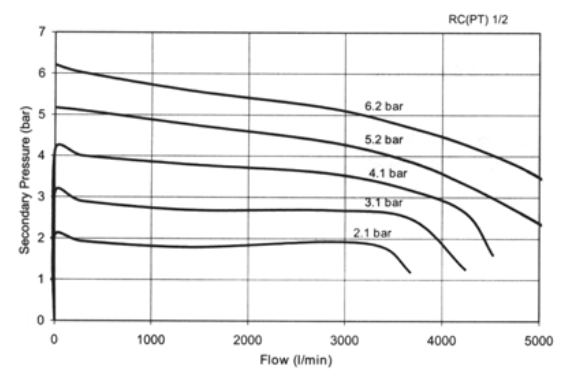


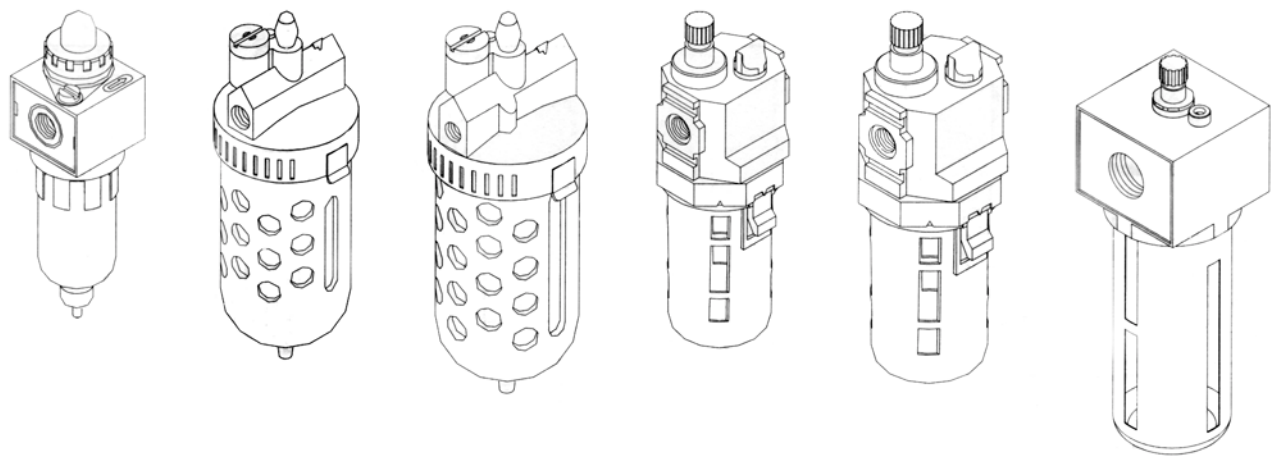
Dimensions, Regulator

• AR 420-15



• AR 420-15





Operating Information



	AL200-8	AL320-8	AL320-10	AL420-15
Port size (PT)	1/4"	1/4"	3/8"	1/2"
Working pressure	0.5 ~ 8.5(bar)			
Working temperature	0 - 60 °C			
Filtration	5 μ m(option : 40 μ m)			

Ordering Information

AL320

-

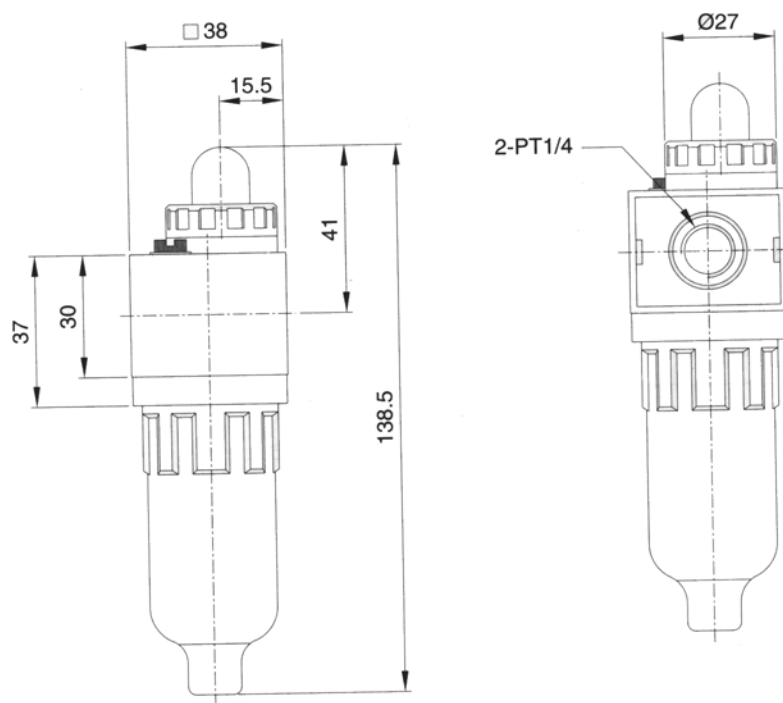
10

Type	
200	Mini semi-modular type
300	Junior nipple connection type
400	Junior nipple connection type
320	Junior modular type
420	Junior modular type
600	Maxi semi-modular type

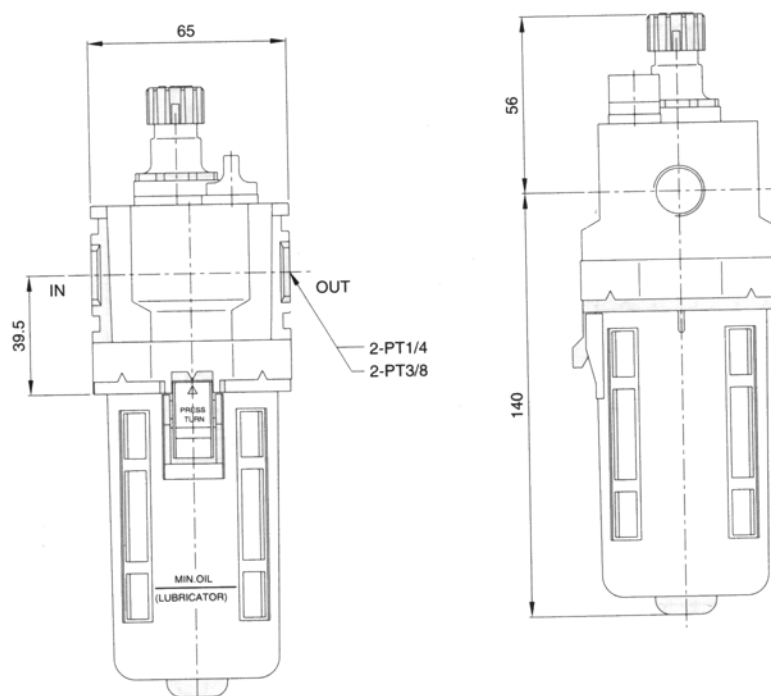
Port size(PT)	
8	1/4" (200,300,320 type only)
10	3/8" (300,320 type only)
15	1/2" (400,420 type only)
20	3/4" (600 type only)
25	1" (600 type only)

Dimensions, Lubricator

• AL 200-8



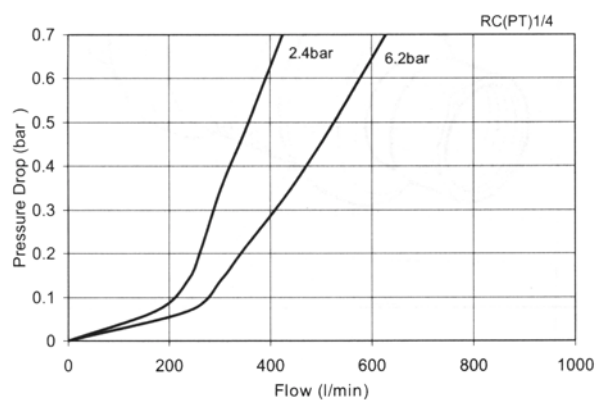
• AL320-8, 10



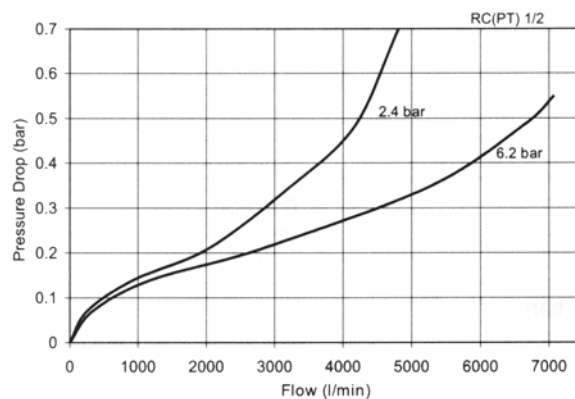
Flow characteristics, lubricator

(at 7 bar inlet)

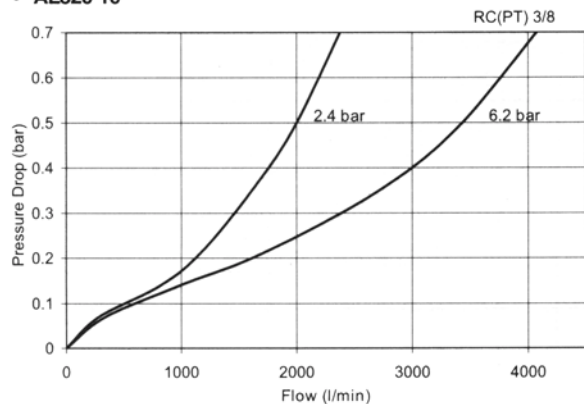
• AL 200-8



• AL420-15

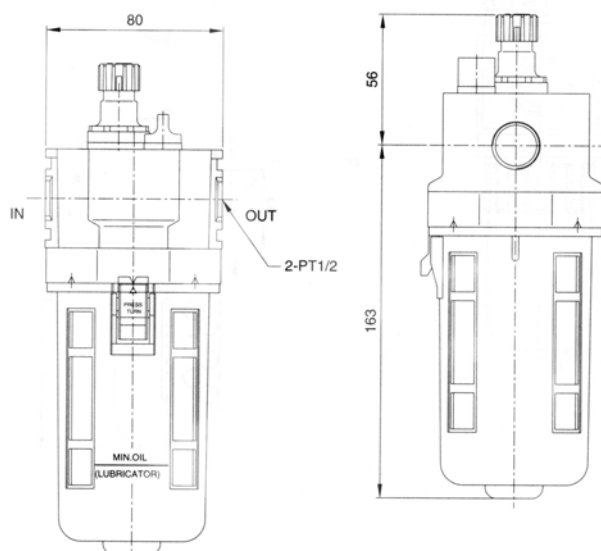


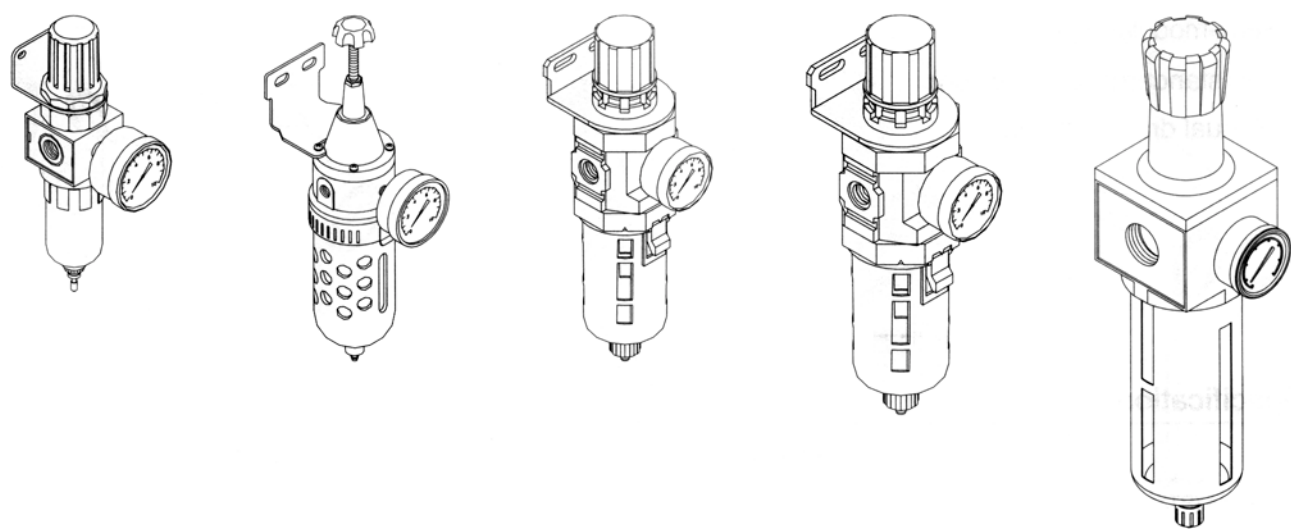
• AL320-10



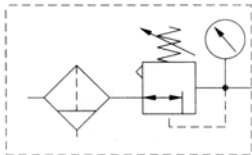
Dimensions, Lubricator

• AL420-15





Operating Information



	AFR200-8	AFR320-8	AFR320-10	AFR420-15
Port size (PT)	1/4"	1/4"	3/8"	1/2"
Working pressure	0.5 ~ 8.5(bar)			
Working temperature	0 - 60 °C			
Filtration	5µm(option : 40µm)			

* For 40µm filter element add "-40" to end number, (example : AFR 200-8-AD20 -40)

Ordering Information

AFR320

-

10

-

AD40

-

40

Type

200Mini semi-modular type

320Junior modular type

420Junior modular type

Port size(PT)

81/4" (200,300,320 type only)

151/2" (420 type only)

Element

4040µm element

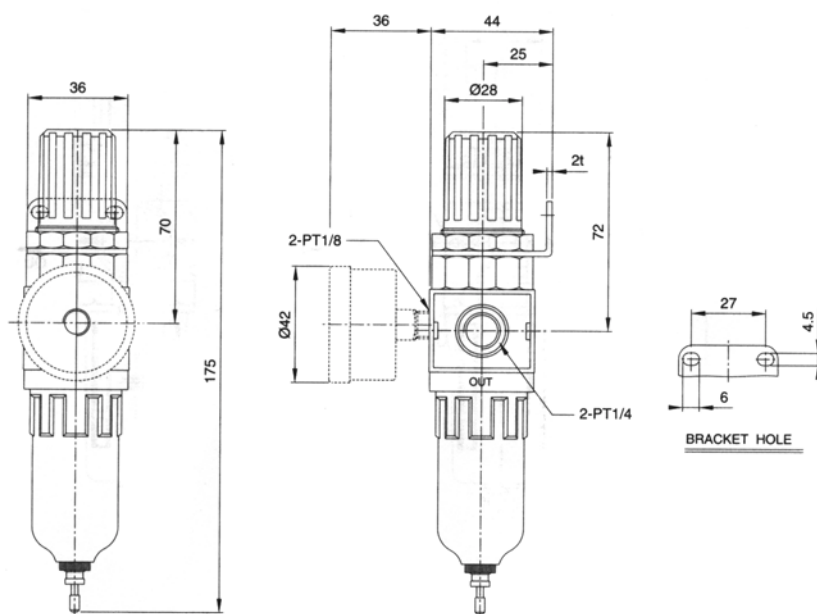
Auto drain

AD20200 type only

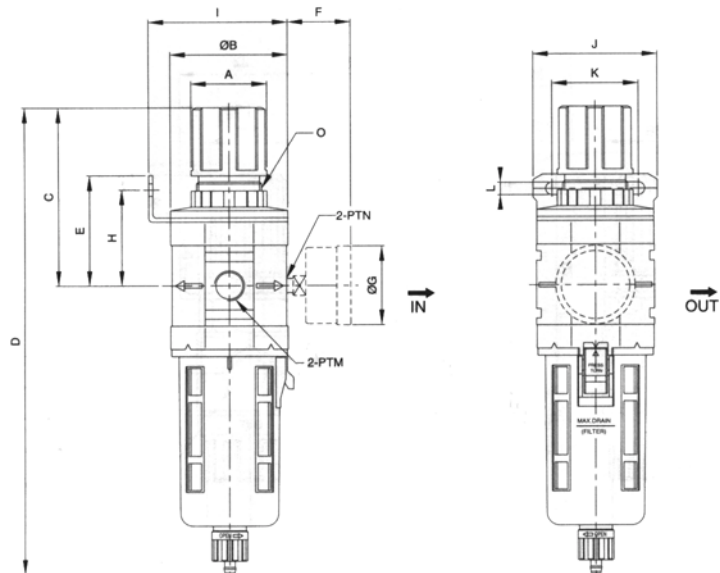
AD40320, 420,

Dimensions, Filter & Regulator

AFR200-8



AFR320-8, 10/AFR420-15

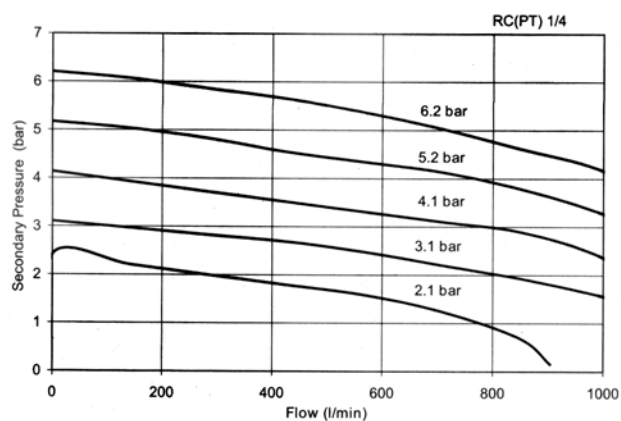


MODEL	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O
AFR320	42	65	98	258	61.5	30	45	53.5	77	69	48	7	1/4 3/8	1/8	M36xP1.5
AFR420	50	80	110	289	65	35	54	57	94.5	84	63	7	1/2	1/4	M42xP1.5

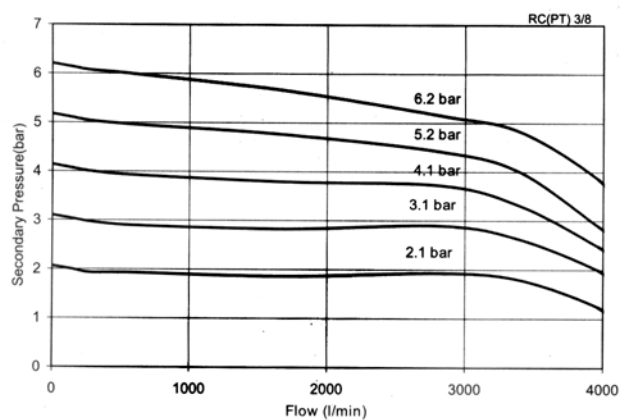
Flow characteristics, filter & regulator

(at 7 bar inlet)

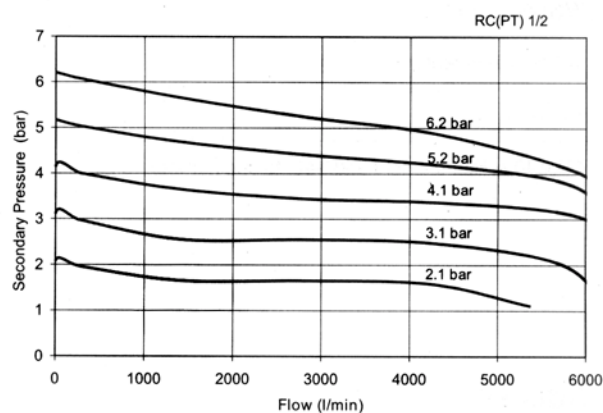
• AFR 200-8



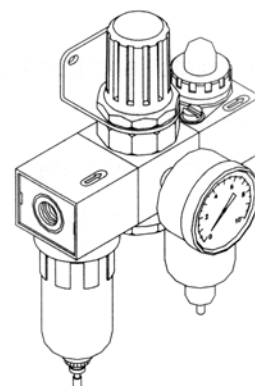
• AFR 320-10



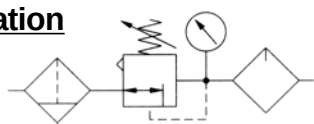
• AFR 420-15



- Filter, Regulator and Lubricator combination
- Semi-modular type
- 5 μm (standard), 40 μm (option)
- Manual drain, auto drain



Operating Information



	AU200-8
Port size(PT)	1/4"
Working pressure	0.5 ~ 8.5(bar)
Working temperature	0 ~ 60 °C
Filtration	5 μm (option : 40 μm)
Max.flow rate	l/min (for flow rate characteristic chart see page 4-29)

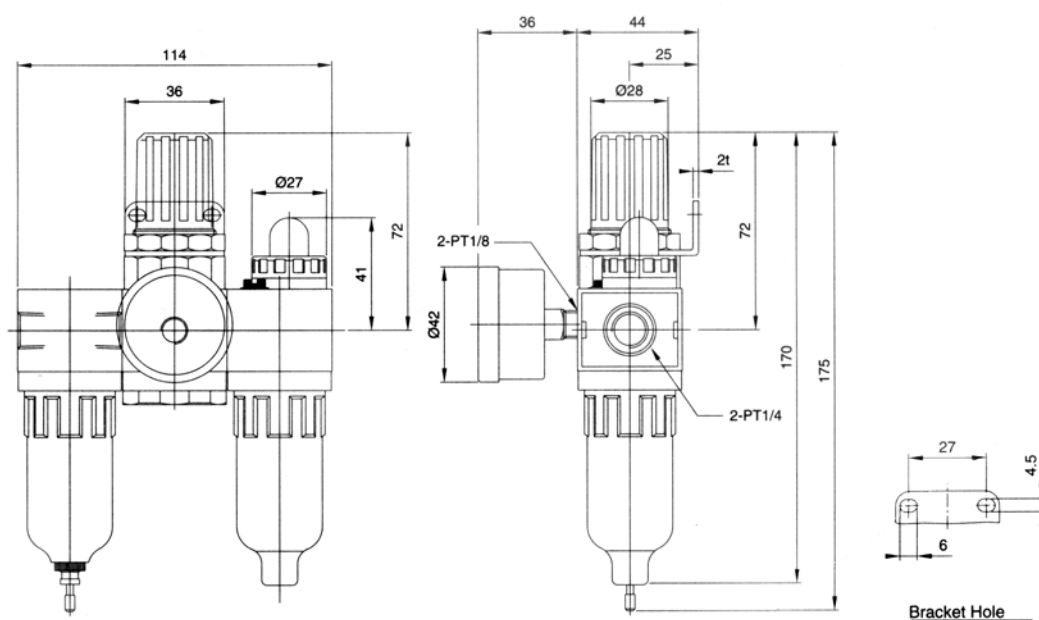
Ordering Information

AU 200 - 8 : Manual drain

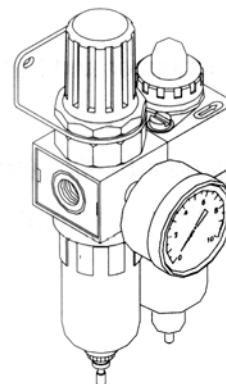
AU 200 - 8 - AD20 : Auto drain

*For 40 μm filter element add "-40" to end number, (example : AU200-8-AD20-40)

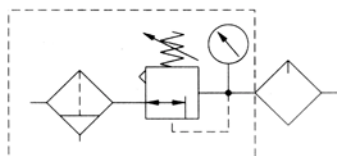
Dimensions



- Filter Regulator and Lubricator combination
- Semi-modular type
- 5 μm (standard), 40 μm (option)
- Manual drain, auto drain



Operating Information



	AU210-8
Port size(PT)	1/4"
Working pressure	0.5 ~ 8.5(bar)
Working temperature	0 ~ 60 °C
Filtration	5 μm (option : 40 μm)
Max.flow rate	l/min (for flow rate characteristic chart see page 4-29)

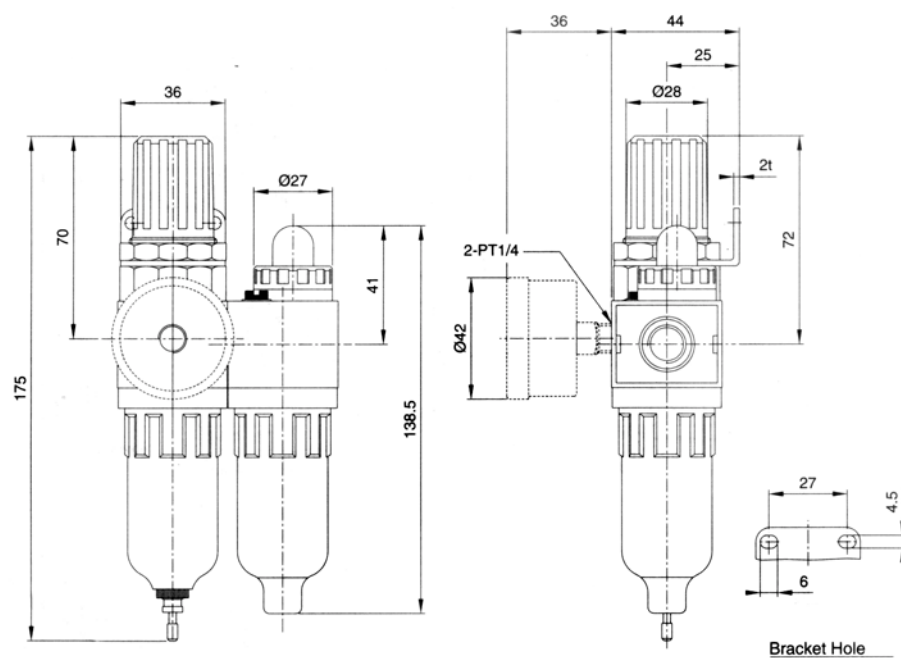
Ordering Information

AU 210 - 8 : Manual drain

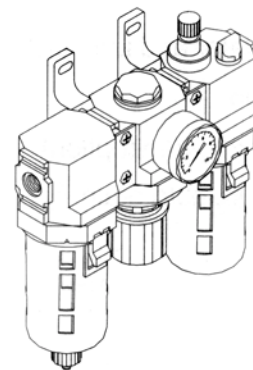
AU 210 -8 - AD20 : Auto drain

*For 40 μm filter element add "-40" to end number, (example : AU210-8-AD20-40)

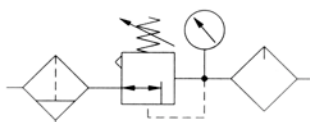
Dimensions



- Filter, Regulator and Lubricator combination
- Modular type
- 5 μ m(standard), 40 μ m(option)
- Manual drain, auto drain



Operating Information



	AU320-8	AU320-10
Port size (PT)	1/4"	3/8"
Working pressure	0.5 ~ 8.5 (bar)	
Working temperature	0 - 60 °C	
Filtration	5 μ m(option : 40 μ m)	
Max. flow rate	l/min (for flow rate characteristic chart see page 4-29)	

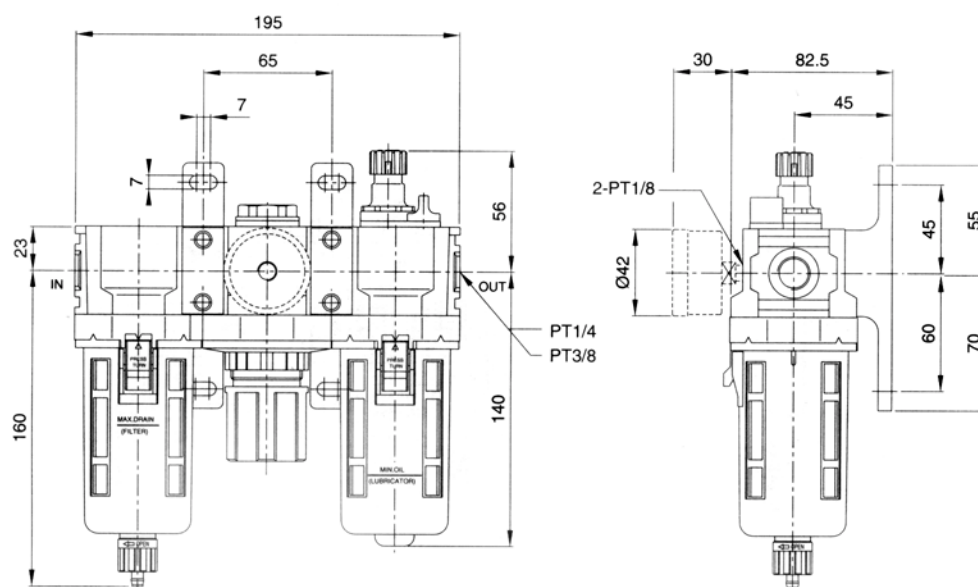
Ordering Information

AU 320-8, AU 320-10 : Manual drain

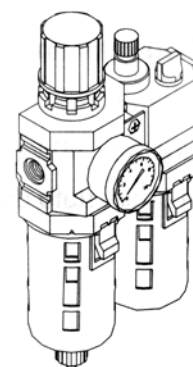
AU 320-8-AD40 , AU 320-10-AD40 : Auto drain

* For 40 μ m filter element add "-40" to end number, (example : AU320-8-AD40-40)

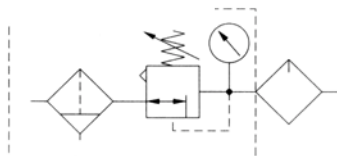
Dimensions



- Filter-Regulator and Lubricator combination
- Modular type
- 5 μ m(standard), 40 μ m(option)
- Manual drain, auto drain



Operating Information



	AU321-8	AU321-10
Port size (PT)	1/4"	3/8"
Working pressure	0.5 ~ 8.5 (bar)	
Working temperature	0 - 60 °C	
Filtration	5 μ m(option : 40 μ m)	
Max. flow rate	l/min (for flow rate characteristic chart see page 4-29)	

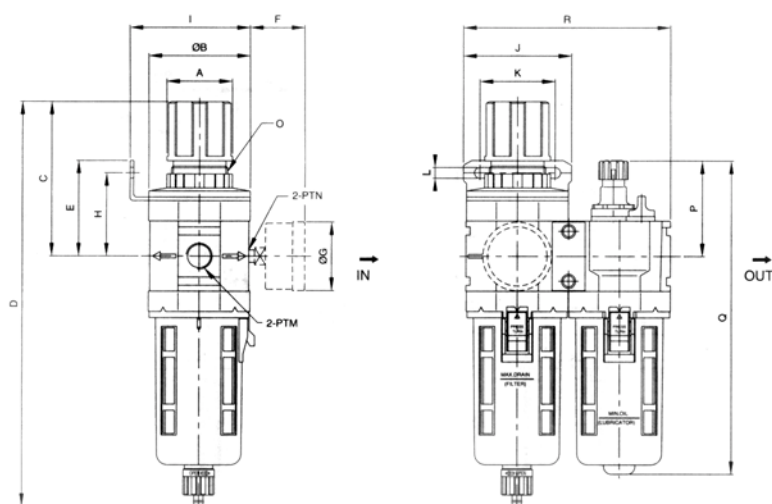
Ordering Information

AU 321-8, AU 321-10 : Manual drain

AU 321-8-AD40 , AU 321-10-AD40 : Auto drain

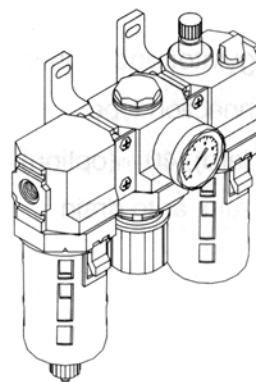
* For 40 μ m filter element add "-40" to end number, (example : AU321-8-AD40-40)

Dimensions

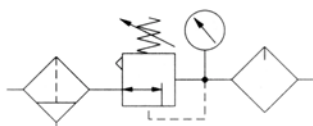


MODEL	A	ØB	C	D	E	F	ØG	H	I	J	K	L	M	N	O	P	Q	R
AU321	42	65	98	258	61.5	30	45	53.5	77	69	48	7	1/4 3/8	1/8	M36xP1.5	56	196	132

- Filter, Regulator and Lubricator combination
- Modular type
- 5 μ m(standard), 40 μ m(option)
- Manual drain, auto drain



Operating Information

**AU420-15**

Port size (PT)	1/2"
Working pressure	0.5 ~ 8.5 (bar)
Working temperature	0 - 60 °C
Filtration	5 μ m(option : 40 μ m)
Max. flow rate	l/min (for flow rate characteristic chart see page 4-29)

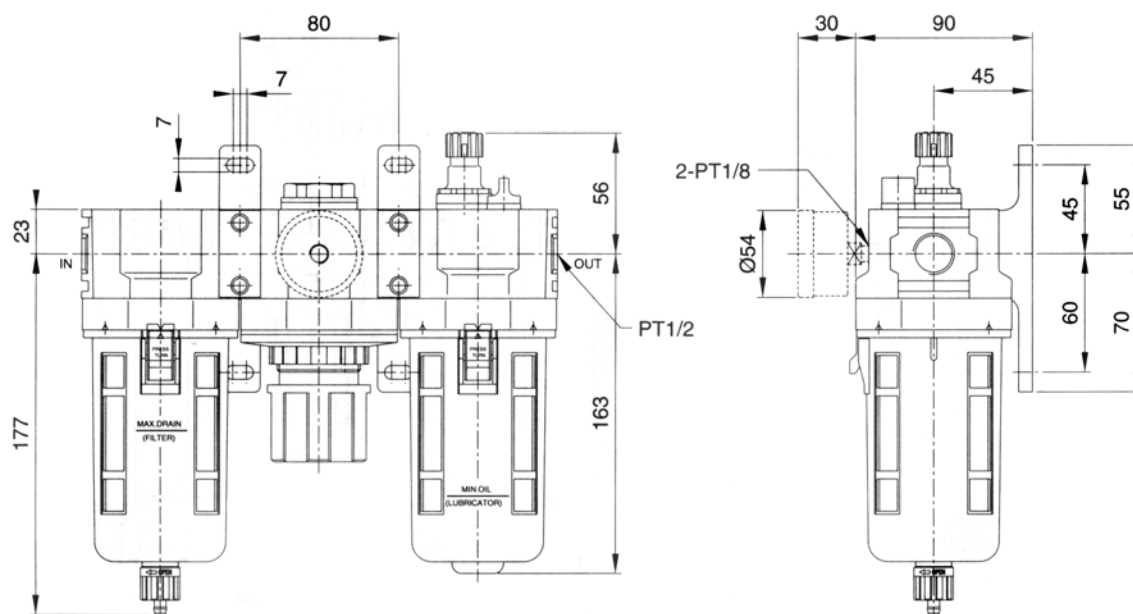
Ordering Information

AU 420-15 : Manual drain

AU 420-15-AD40 : Auto drain

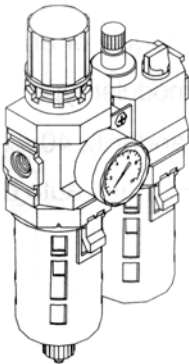
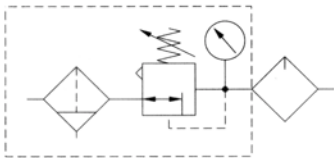
* For 40 μ m filter element add "-40" to end number, (example : AU420-15-AD40-40)

Dimensions



- Filter-Regulator and Lubricator combination
- Modular type
- 5µm(standard), 40µm(option)
- Manual drain, auto drain

Operating Information



AU421-15	
Port size (PT)	1/2"
Working pressure	0.5 ~ 8.5 (bar)
Working temperature	0 - 60 °C
Filtration	5µm(option : 40µm)
Max. flow rate	l/min (for flow rate characteristic chart see page 4-29)

Ordering Information

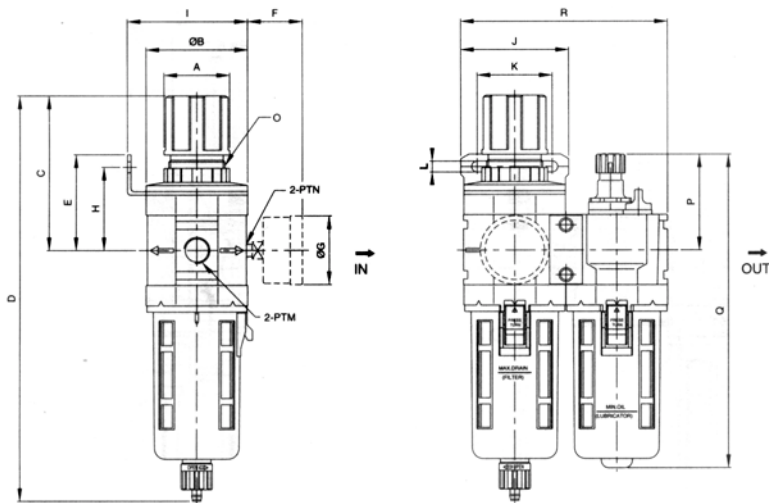
AU 421-15 : Manual drain

AU 421-15-AD40 : Auto drain

* For 40µm filter element add "-40" to end number, (example : AU421-15-AD40-40)

Dimensions

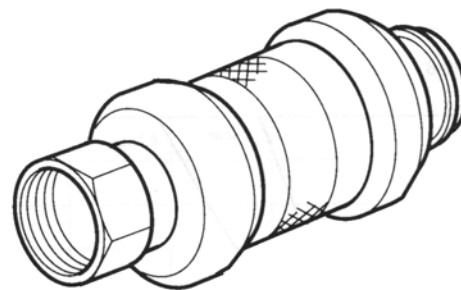
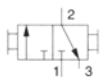
31



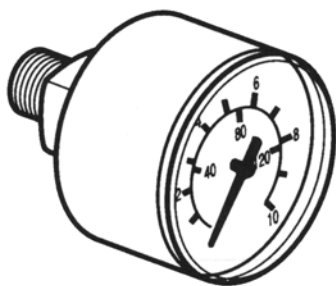
MODEL	A	ØB	C	D	E	F	ØG	H	I	J	K	L	M	N	O	P	Q	R
AU421	50	80	110	289	65	35	54	57	94.5	84	63	7	1/2	1/4	M42xP1.5	56	219	163

Sliding sleeve valve 9721 9005

- Linear sleeve operated 3/2 valve
- Simple airline isolation
- Compact
- Minimum space for valve operation

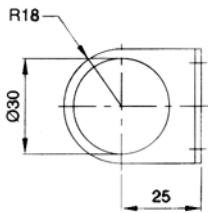
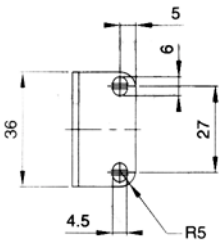
**Operating Information****Specification**

Order code	9721 9005-60	9721 9005-61	9721 9005-62	9721 9005-63
Connection	G1/8"	G1/4"	G3/8"	G1/2"
Working pressure	Max. 40 (bar)			
Working temperature	-20 - 100 °C			
Material	Valve body	Brass		
	Seals	Nitrile		

Gauge GAD-40, GAD-50**Specification**

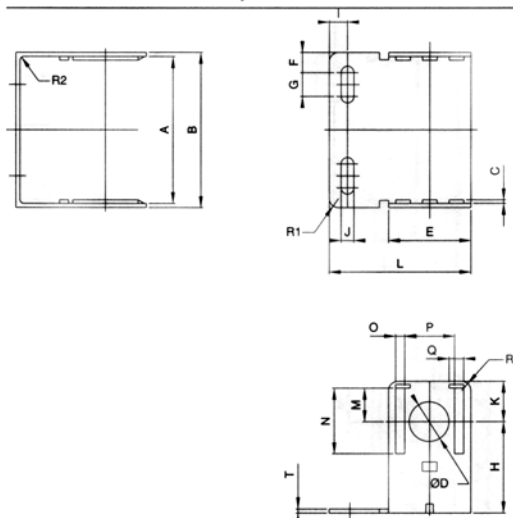
Order code	GAD-40	GAD-50
Connection(PT)	1/8"	1/4"
Pressure	0 - 10 (bar)	
Applicable Air Preparation System	AFR200, AR200, AFR320, AR320	AFR420, AR420

Bracket BKL200



Order code	Applicable air preparation systems
BKL200	AU200, AFR200, AR200

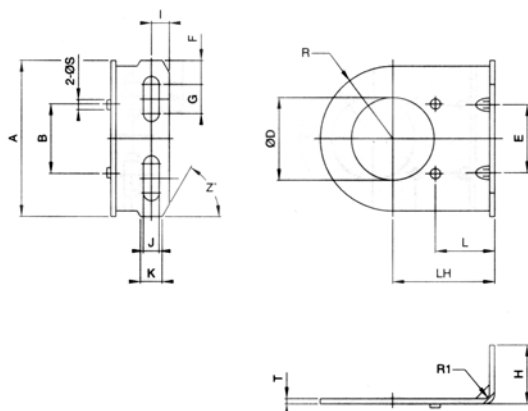


Bracket BKL320, BKL420

Order code	Applicable air preparation systems
BKL320	AFR320, AR320
BKL420	AFR420, AR420

MODEL	A	B	ØD	E	F	G	H	I	J	K
BKL320	65.5	30.7	2	4.5	10.5	13	26	10	7	22
BKL420	80	36.8	2	4.5	10.5	13	26	10	7	22

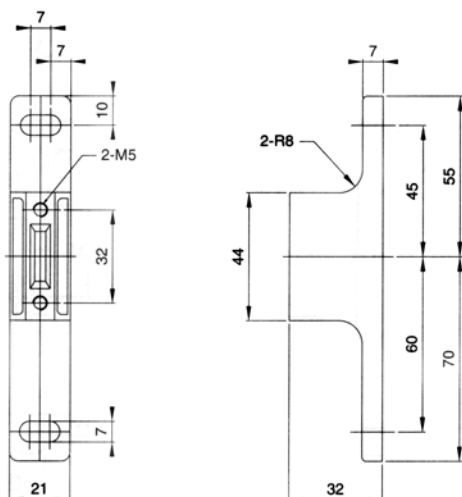
MODEL	L	M	N	O	P	Q	R	R1	R2	T
BKL320	77.5	18.3	36	5	27.2	8	4	5	2	2.3
BKL420	77.5	18.3	36	5	27.2	8	5	5	2	2.3

Bracket BKC320, BKC420

Order code	Applicable air preparation systems
BKC320	AFR320, AF320, AR320, AL320
BKC420	AFR420, AF420, AR420, AL420

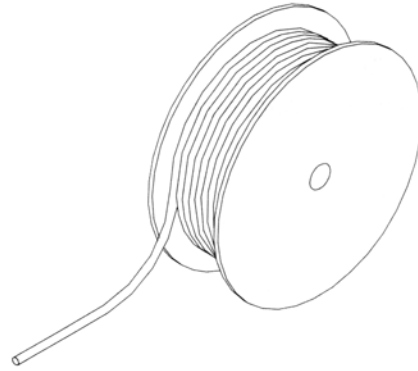
MODEL	A	B	ØD	E	F	G	H	I	J	K
BKC320	69	30.7	36.5	30	10.5	13	26	8	7	10
BKC420	84	36.8	42.5	40	10.5	13	26	8	7	10

MODEL	L	LH	R	R1	ØS	T	Z*
BKC320	26.2	45	32	2	4.5	2.3	60
BKC420	33.3	55	39.5	2	4	2.3	60

Bracket BKU320, BKU321, BKU420, BKU421

Order code	Applicable air preparation systems
BKU320	AU320
BKU321	AU321
BKU420	AU420
BKU421	AU421

- Polyurethane tubing
- Wide choice of colours



Operating Information

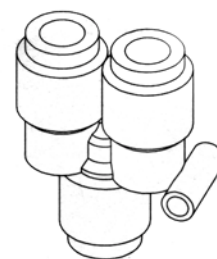
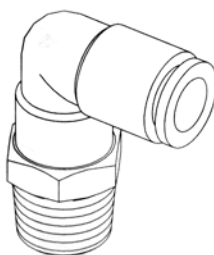
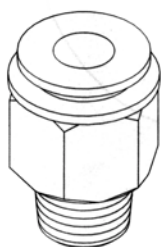
Material	Polyurethane	
Colour	Main colour : blue, black,	Option : yellow, green, red, white

Order number	Max. pressure at 20 (kg/cm ²)	Working pressure at 20 (kg/cm ²)	Weight (g/m)
PHHU-4X2	23	5	11.00
PHHU-6X4	23	5	19.00
PHHU-8X5	23	5	37.00
PHHU-10X6.5	23	5	55.00
PHHU-12X8	23	5	76.00

Ordering Information

Order number	Outside(mm)	Inside(mm)	Thickness(mm)
PHHU-4X2	4.00	2.00	1.00
PHHU-6X4	6.00	4.00	1.00
PHHU-8X5	8.00	5.00	1.50
PHHU-10X6.5	10.00	6.50	1.75
PHHU-12X8	12.00	8.00	2.00

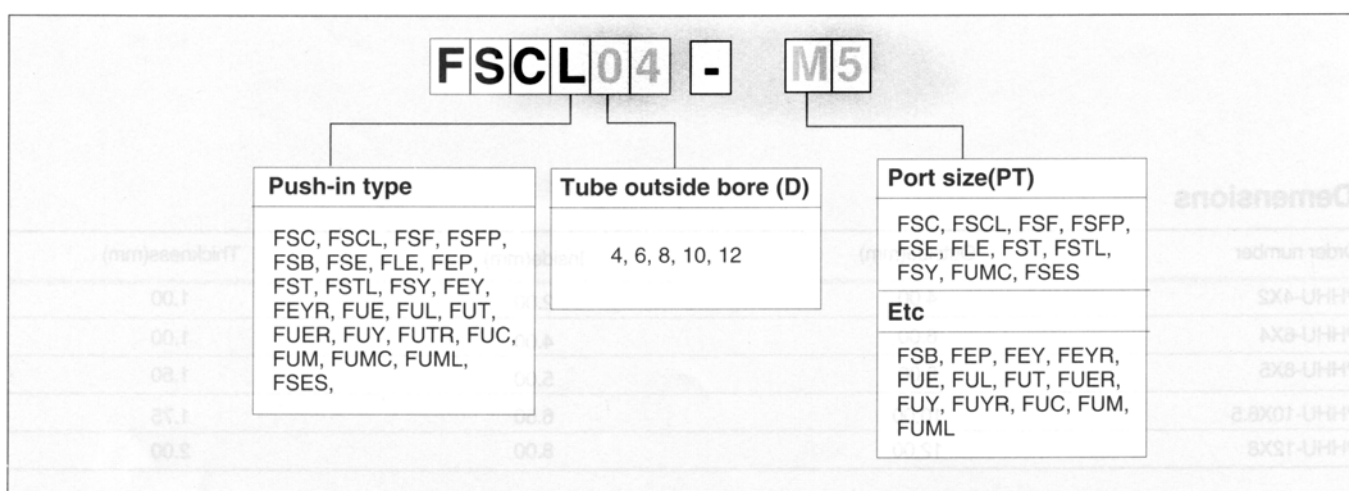
- One touch fitting
- Light weight and compact size



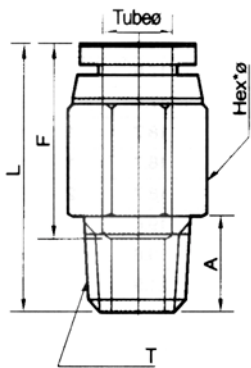
Operating Information

Max. pressure	12 bar
Max. working pressure	9.9 bar
Working temperature	5 ~ 60 °C
Fluid	Compressed air
Applied tube material	Nylon, Polyurathan
Tube outside bore	4, 6, 8, 10, 12

Ordering Information

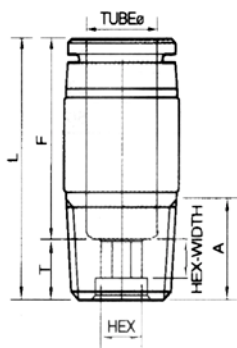


Male connector FSC



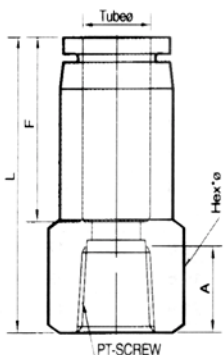
Order code	Apply tube dia(Ø)	(T) M-Screw PT-Screw	L(mm)	A(mm)	(F) Tube insert depth(mm)	Hexagon Ø (mm)
FSC04-M5	4	M5x0.8P	21.9	4.6	15.9	10 x 11.5
FSC04-1/8	4	PT1/8	21.6	8	15.9	10 x 11.5
FSC04-1/4	4	PT1/4	20.6	10	15.9	14 x 16.1
FSC06-M5	6	M5x0.8P	23.6	4.6	16.5	10 x 11.5
FSC06-1/8	6	PT1/8	22.2	8	16.5	12 x 13.8
FSC06-1/4	6	PT1/4	21	10	16.5	14 x 16.1
FSC06-3/8	6	PT3/8	22	11	16.5	17 x 18.5
FSC08-1/8	8	PT1/8	27.5	8	17.7	12x 13.0
FSC08-1/4	8	PT1/4	25.5	10	17.7	14 x 15.4
FSC08-3/8	8	PT3/8	23	11	17.7	17x 18.5
FSC08-1/2	8	PT1/2	29.7	14	17.7	22 x 24.5
FSC10-1/8	10	PT1/8	28.7	8	18.6	12 x 13.0
FSC10-1/4	10	PT1/4	30.7	10	18.6	14 x 15.4
FSC10-3/8	10	PT3/8	24.7	11	18.6	17 x 18.5
FSC10-1/2	10	PT1/2	29.7	14	18.6	22 x 24.5
FSC12-1/4	12	PT1/4	32.8	10	20.9	14 x 15.4
FSC12-3/8	12	PT3/8	29.8	11	20.9	17 x 18.5
FSC12-1/2	12	PT1/2	29.8	14	20.9	22 x 24.5

Male connector FSCL



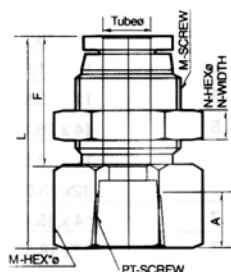
Order code	Apply tube dia(Ø)	(T) M-Screw PT-Screw	L(mm)	A(mm)	(F) Tube insert depth(mm)	Hexagon Ø (mm)	Hexagon width(mm)
FSCL04-M5	4	M5x0.8P	21.8	4.6	15.9	02x2.31	3.8
FSCL04-1/8	4	PT1/8	20.4	8	15.9	03x3.46	3
FSCL04-1/4	4	PT1/4	20.4	10	15.9	03x3.46	3
FSCL06-M5	6	M5x0.8P	22.6	4.6	16.5	02x2.31	4
FSCL06-1/8	6	PT1/8	21.8	8	16.5	04x4.62	3.3
FSCL06-1/4	6	PT1/4	22.5	10	16.5	04x4.62	4
FSCL06-3/8	6	PT3/8	22.5	11	16.5	04x4.62	4
FSCL08-1/8	8	PT1/8	27	8	17.7	04x4.62	6.3
FSCL08-1/4	8	PT1/4	25	10	17.7	06x6.93	4.3
FSCL08-3/8	8	PT3/8	25	11	17.7	06x6.93	4.3
FSCL08-1/2	8	PT1/2	25	14	17.7	06x6.93	4.3
FSCL10-1/8	10	PT1/8	27	8	18.6	05x5.77	6.3
FSCL10-1/4	10	PT1/4	26.6	10	18.6	06x6.93	5
FSCL10-3/8	10	PT3/8	26.6	11	18.6	06x6.93	5
FSCL10-1/2	10	PT1/2	26.6	14	18.6	06x6.93	5
FSCL12-1/4	12	PT1/4	32.4	10	20.9	06x6.93	6.5
FSCL12-3/8	12	PT3/8	32.4	11	20.9	08x9.24	6.5
FSCL12-1/2	12	PT1/2	32.4	14	20.9	08x9.24	6.5

Female connector FSF



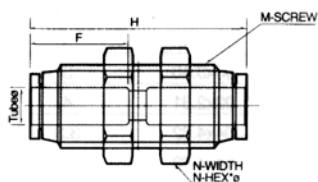
Order code	Apply tube dia(Ø)	PT-screw	L(mm)	A(mm)	(F) Tube insert Depth(mm)	Hexagon Ø (mm)
FSF04-1/8	4	PT1/8	26.7	9	15.9	12 x 13.0
FSF04-1/4	4	PT1/4	28.7	11	15.9	14 x 15.4
FSF06-1/8	6	PT1/8	27.3	9	16.5	12 x 13.0
FSF06-1/4	6	PT1/4	29.3	11	16.5	14 x 15.4
FSF06-3/8	6	PT3/8	30.2	12	16.5	17 x 18.5
FSF08-1/8	8	PT1/8	28.5	9	17.7	12 x 13.0
FSF08-1/4	8	PT1/4	30.5	11	17.7	14 x 15.4
FSF08-3/8	8	PT3/8	31.5	12	17.7	17 x 18.5
FSF10-1/8	10	PT1/8	31.4	9	18.6	12 x 13.0
FSF10-1/4	10	PT1/4	31.5	11	18.6	14 x 15.4
FSF10-3/8	10	PT3/8	32.4	12	18.6	17 x 18.5
FSF12-1/4	12	PT1/4	34.7	11	20.9	14 x 15.4
FSF12-3/8	12	PT3/8	34.7	12	20.9	17 x 18.5
FSF12-1/2	12	PT1/2	36.7	14	20.9	22 x 24.5

Female connector FSFP



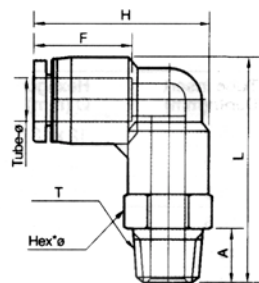
Order code	Apply tube dia(Ø)	PT-screw	L (mm)	N-width (mm)	M-screw (mm)	A (mm)	Hexagon NO.(mm)	(F) Tube insert depth(mm)	Hexagon mØ.(mm)
FSFP04-1/8	4	PT1/8	26.7	5	M12 x 1.0P	9	14 x 16.1	16.8	14 x 16.1
FSFP06-1/8	6	PT1/8	28.3	5	M14 x 1.0P	9	17 x 19.6	17.6	17 x 19.6
FSFP06-1/4	6	PT1/4	30.3	5	M14 x 1.0P	11	17 x 19.6	17.6	17 x 19.6
FSFP08-1/8	8	PT1/8	29.5	5	M16 x 1.0P	9	19 x 21.9	18.7	19 x 21.9
FSFP08-1/4	8	PT1/4	31.5	5	M16 x 1.0P	11	19 x 21.9	18.7	19 x 21.9
FSFP08-3/8	8	PT3/8	32.5	5	M16 x 1.0P	12	19 x 21.9	18.7	22 x 25.4
FSFP10-1/4	10	PT1/4	32.4	5	M20 x 1.0P	11	24 x 27.7	19.6	24 x 27.7
FSFP10-3/8	10	PT3/8	33.4	5	M20 x 1.0P	12	24 x 27.7	19.6	24 x 27.7
FSFP12-1/4	12	PT1/4	37.9	5	M22 x 1.0P	11	26 x 30.0	21.9	24 x 27.7
FSFP12-3/8	12	PT3/8	37.9	5	M22 x 1.0P	12	26 x 30.0	21.9	24 x 27.7
FSFP12-1/2	12	PT1/2	39.9	5	M22 x 1.0P	14	26 x 30.0	21.9	24 x 27.7

Bulkhead equal union FSB



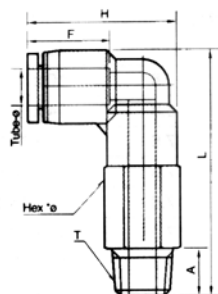
Order code	Apply tube dia(Ø)	H(mm)	(F) Tube insert depth(mm)	M-screw	N-width (n-hex x Ø)
FSB04	4	29.8	16.3	M12 x 10P	5(14 x 16.1)
FSB06	6	33	17.6	M14 x 10P	5(17 x 19.6)
FSB08	8	35.4	18.7	M16 x 10P	5(19 x 21.9)
FSB10	10	37.8	19.6	M20 x 10P	5(24 x 27.7)
FSB12	12	47.4	21.9	M22 x 10P	5(26 x 30.0)

Male elbow swivel 90° FSE



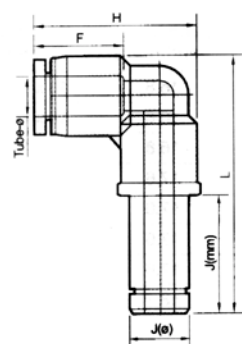
Order code	Apply tube dia(Ø)	(T) M-screw pt-screw	L(mm)	H(mm)	A(mm)	(F) Tube insert depth(mm)	Hexagon mØ.(mm)
FSE04-M5	4	M5 x 0.8P	27.25	23.8	4.6	16.8	10 x 11.0
FSE04-1/8	4	PT1/8	29.75	23.8	8	16.8	10 x 11.0
FSE04-1/4	4	PT1/4	31.75	23.8	10	16.8	14 x 15.4
FSE06-M5	6	M5 x 0.8P	30.25	26.5	4.6	17.6	10 x 11.0
FSE06-1/8	6	PT1/8	32.75	26.5	8	17.6	12 x 13.0
FSE06-1/4	6	PT1/4	35.75	26.5	10	17.6	14 x 15.4
FSE06-3/8	6	PT3/8	36.75	26.5	11	17.6	17 x 18.5
FSE08-1/8	8	PT1/8	35.15	29.7	8	18.7	12 x 13.0
FSE08-1/4	8	PT1/4	38.15	29.7	10	18.7	14 x 15.4
FSE08-3/8	8	PT3/8	39.15	29.7	11	18.7	17 x 18.5
FSE08-1/2	8	PT1/2	42.15	29.7	14	18.7	22 x 24.5
FSE10-1/8	10	PT1/8	37.25	32.1	8	19.6	12 x 13.0
FSE10-1/4	10	PT1/4	40.25	32.1	10	19.6	14 x 15.4
FSE10-3/8	10	PT3/8	41.25	32.1	11	19.6	17 x 18.5
FSE10-1/2	10	PT1/2	44.25	32.1	14	19.6	22 x 24.5
FSE12-1/4	12	PT1/4	44.65	36.9	10	21.9	14 x 15.4
FSE12-3/8	12	PT3/8	45.65	36.9	11	21.9	17 x 18.5
FSE12-1/2	12	PT1/2	48.65	36.9	14	21.9	22 x 24.5

Long elbow FLE



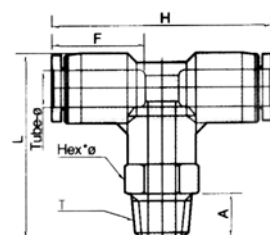
Order code	Apply tube dia(Ø)	(T) M-screw PT-screw	L(mm)	H(mm)	A(mm)	(F) Tube insert depth(mm)	Hexagon Ø.(mm)
FLE04-M5	4	M5 x 0.8P	38.75	23.8	4.6	16.8	10 x 11.0
FLE04-1/8	4	PT1/8	40.75	23.8	8	16.8	10 x 11.0
FLE04-1/4	4	PT1/4	42.75	23.8	10	16.8	14 x 15.4
FLE06-M5	6	M5 x 0.8P	44.25	26.5	4.6	17.6	10 x 11.0
FLE06-1/8	6	PT1/8	46.25	26.5	8	17.6	12 x 13.0
FLE06-1/4	6	PT1/4	48.25	26.5	10	17.6	14 x 15.4
FLE06-3/8	6	PT3/8	49.25	26.5	11	17.6	17 x 18.5
FLE08-1/8	8	PT1/8	51.15	29.7	8	18.7	12 x 13.0
FLE08-1/4	8	PT1/4	53.15	29.7	10	18.7	14 x 15.4
FLE08-3/8	8	PT3/8	54.15	29.7	11	18.7	17 x 18.5
FLE08-1/2	8	PT1/2	57.15	29.7	14	18.7	22 x 24.5
FLE10-1/8	10	PT1/8	48.45	32.1	8	19.6	12 x 13.0
FLE10-1/4	10	PT1/4	50.45	32.1	10	19.6	14 x 15.4
FLE10-3/8	10	PT3/8	51.45	32.1	11	19.6	17 x 18.5
FLE10-1/2	10	PT1/2	54.45	32.1	14	19.6	22 x 24.5
FLE12-1/4	12	PT1/4	66.15	36.9	10	21.9	14 x 15.4
FLE12-3/8	12	PT3/8	67.15	36.9	11	21.9	17 x 18.5
FLE12-1/2	12	PT1/2	70.15	36.9	14	21.9	22 x 24.5

Plug-in elbow FEP



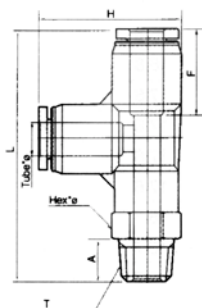
Order code	Apply tube dia(Ø)	J(mm)	J(Ø)	L(mm)	H(mm)	(F) Tube insert depth(mm)
FEP04	4	20.5	4	39.2	23.8	16.8
FEP06	6	23	6	44.7	26.5	17.6
FEP08	8	26.5	8	50.6	28.4	18.7
FEP10	10	29	10	55.2	32.1	19.6
FEP12	12	33.3	12	63.9	36.9	21.9

Male branch tee swivel FST



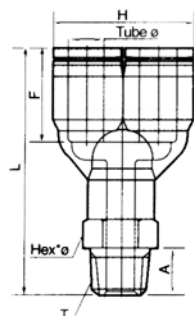
Order code	Apply tube dia(Ø)	(T) M-screw PT-screw	L(mm)	H(mm)	A(mm)	(F) Tube insert depth(mm)	Hexagon mØ.(mm)
FST04-M5	4	M5 x 0.8P	27.25	37.6	4.6	16.8	10 x 11.5
FST04-1/8	4	PT1/8	29.75	37.6	8	16.8	10 x 11.5
FST04-1/4	4	PT1/4	31.75	37.6	10	16.8	14 x 16.1
FST06-M5	6	M5 x 0.8P	30.25	41	4.6	17.6	10 x 11.5
FST06-1/8	6	PT1/8	32.75	41	8	17.6	12 x 13.8
FST06-1/4	6	PT1/4	35.75	41	10	17.6	14 x 16.1
FST06-3/8	6	PT3/8	36.75	41	11	17.6	17 x 19.6
FST08-1/8	8	PT1/8	35.25	44.4	8	18.7	12 x 13.8
FST08-1/4	8	PT1/4	38.25	44.4	10	18.7	14 x 16.1
FST08-3/8	8	PT3/8	39.25	44.4	11	18.7	17 x 19.6
FST08-1/2	8	PT1/2	42.25	44.4	14	18.7	22 x 25.4
FST10-1/8	10	PT1/8	37.25	47.2	8	19.6	12 x 13.8
FST10-1/4	10	PT1/4	40.25	47.2	10	19.6	14 x 16.1
FST10-3/8	10	PT3/8	41.25	47.2	11	19.6	17 x 19.6
FST10-1/2	10	PT1/2	44.25	47.2	14	19.6	22 x 25.4
FST12-1/4	12	PT1/4	44.65	54.8	10	21.9	14 x 16.1
FST12-3/8	12	PT3/8	45.65	54.8	11	21.9	17 x 19.6
FST12-1/2	12	PT1/2	48.65	54.8	14	21.9	22 x 25.4

Male branch tee swivel FSTL



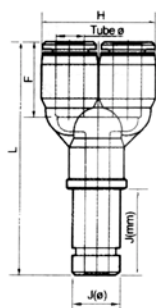
Order code	Apply tube dia(Ø)	(T) M-screw PT-screw	L(mm)	H(mm)	A(mm)	(F) Tube insert depth(mm)	Hexagon Ø.(mm)
FSTL04-M5	4	M5 x 0.3P	42.3	25.1	4.6	16.8	10 x 11.5
FSTL04-1/8	4	PT1/8	45.3	25.1	8	16.8	10 x 11.5
FSTL04-1/4	4	PT1/4	48.3	25.1	10	16.8	14 x 16.1
FSTL06-M5	6	M5 x 0.8P	46.1	28.1	4.6	17.6	10 x 11.5
FSTL06-1/8	6	PT1/8	48.6	28.1	8	17.6	12 x 13.8
FSTL06-1/4	6	PT1/4	51.2	28.1	10	17.6	14 x 16.1
FSTL06-3/8	6	PT3/8	52.2	28.1	11	17.6	17 x 19.6
FSTL08-1/8	8	PT1/8	52.2	30.9	8	18.7	12 x 13.8
FSTL08-1/4	8	PT1/4	55.2	30.9	10	18.7	14 x 16.1
FSTL08-3/8	8	PT3/8	56.2	30.9	11	18.7	17 x 19.6
FSTL08-1/2	8	PT1/2	59.2	30.9	14	18.7	22 x 25.4
FSTL10-1/8	10	PT1/8	55.6	34.6	8	19.6	12 x 13.8
FSTL10-1/4	10	PT1/4	58.6	34.6	10	19.6	14 x 16.1
FSTL10-3/8	10	PT3/8	59.6	34.6	11	19.6	17 x 19.6
FSTL10-1/2	10	PT1/2	62.6	34.6	14	19.6	22 x 25.4
FSTL12-1/4	12	PT1/4	64.8	40.3	10	21.9	14 x 16.1
FSTL12-3/8	12	PT3/8	65.8	40.3	11	21.9	17 x 19.6
FSTL12-1/2	12	PT1/2	68.8	40.3	14	21.9	22 x 25.4

Union Y male connector FSY



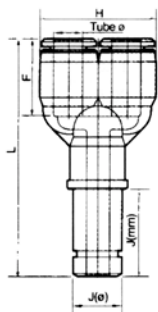
Order code	Apply tube dia(Ø)	(T) M-screw PT-screw	L(mm)	H(mm)	A(mm)	(F) Tube insert depth(mm)	Hexagon Ø.(mm)
FSY04-M5	4	M5 x 0.8P	34.8	21	4.6	16.8	10 x 11.5
FSY04-1/8	4	PT1/8	41.3	21	8	16.8	10 x 11.5
FSY04-1/4	4	PT1/4	42.3	21	10	16.8	14 x 16.1
FSY06-M5	6	M5 x 0.8P	41.6	25	4.6	17.6	10 x 11.5
FSY06-1/8	6	PT1/8	44.1	25	8	17.6	12 x 13.8
FSY06-1/4	6	PT1/4	47.1	25	10	17.6	14 x 16.1
FSY06-3/8	6	PT3/8	48.1	25	11	17.6	17 x 19.6
FSY08-1/8	8	PT1/8	45.5	29	8	18.7	12 x 13.8
FSY08-1/4	8	PT1/4	48.5	29	10	18.7	14 x 16.1
FSY08-3/8	8	PT3/8	48.5	29	11	18.7	17 x 19.6
FSY08-1/2	8	PT1/2	52.5	29	14	18.7	22 x 25.4
FSY10-1/8	10	PT1/8	49.2	35	8	19.6	12 x 13.8
FSY10-1/4	10	PT1/4	52.2	35	10	19.6	14 x 16.1
FSY10-3/8	10	PT3/8	53.2	35	11	19.6	17 x 19.6
FSY10-1/2	10	PT1/2	56.2	35	14	19.6	22 x 25.4
FSY12-1/4	12	PT1/4	54.5	41	10	21.9	14 x 16.1
FSY12-3/8	12	PT3/8	55.4	41	11	21.9	17 x 19.6
FSY12-1/2	12	PT1/2	58.4	41	14	21.9	22 x 25.4

Plug-in Y connector FEY



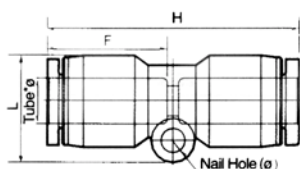
Order code	Apply tube dia(Ø)	J(mm)	J(Ø)	L(mm)	H(mm)	(F) Tube insert depth(mm)
FEY04	4	20.5	4	56.7	21	16.8
FEY06	6	23	6	61.1	25	17.6
FEY08	8	26.5	8	67.4	29	18.7
FEY10	10	29	10	74	35	19.6
FEY12	12	33.3	12	83.6	41	21.9

Plug-in Y connector FEYR



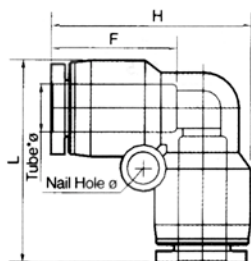
Order code	Apply tube dia(Ø)	J(mm)	J(Ø)	L(mm)	H(mm)	(F) Tube insert depth(mm)
FEYR0604	4	23	6	56.2	21	17.6
FEYR0806	6	26.5	8	61	25	18.7
FEYR1008	8	29	10	69.1	29	19.6
FEYR1210	10	33.3	12	76.7	35	21.9

Equal union FUE



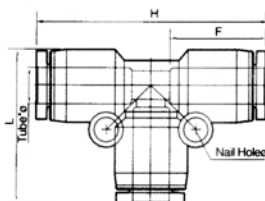
Order code	Apply tube dia(Ø)	H(mm)	L(mm)	Nail hole(Ø)	(F) Tube insert depth(mm)
FUE04	4	34.6	12.75	3.3	16.8
FUE06	6	36.8	14.75	3.3	17.6
FUE08	8	39.4	19.85	4.3	18.7
FUE10	10	43.2	20	4.3	19.6
FUE12	12	47.8	23.3	4.3	21.9

Union elbow FUL



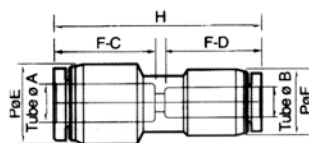
Order code	Apply tube dia(Ø)	H(mm)	L(mm)	Nail hole(Ø)	(F) Tube insert depth(mm)
FUL04	4	36.6	24.2	3.3	16.8
FUL06	6	41.8	27.5	3.3	17.6
FUL08	8	44.9	30.65	4.3	18.7
FUL10	10	48.2	34.05	4.3	19.6
FUL12	12	56.8	39.85	4.3	21.9

Union tee FUT



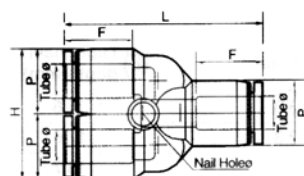
Order code	Apply tube dia(Ø)	H(mm)	L(mm)	Nail hole(Ø)	(F) Tube insert depth(mm)
FUT04	4	36.6	24.2	3.3	16.8
FUT06	6	41.8	27.5	3.3	17.6
FUT08	8	44.9	30.65	4.3	18.7
FUT10	10	48.2	34.05	4.3	19.6
FUT12	12	56.8	39.85	4.3	21.9

Equal union reducer FUER



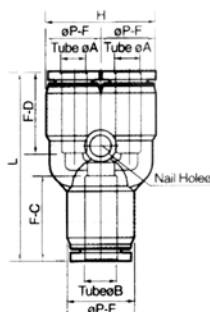
Order code	Apply tube		H(mm)	(F) Tube insert depth(mm)		ØP	
	A(Ø)	B(Ø)		F-C	F-D	E(Ø)	F(Ø)
FUER06-04	6	4	36.6	17.6	16.8	12.5	10.5
FUER08-06	8	6	37.6	18.7	17.6	14.5	12.5
FUER10-08	10	8	41	19.6	18.7	17.5	14.5
FUER12-10	12	10	44	21.9	19.6	20.5	17.5

Union Y connector FUY



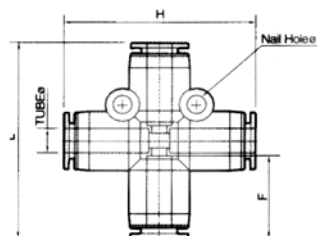
Order code	Apply tube dia(Ø)	H(mm)	L(mm)	(F) Tube insert depth(mm)	ØP	Nail hole(Ø)
FUY04	4	21	37.1	16.8	10.5	3.3
FUY06	6	25	40.2	17.6	12.5	3.3
FUY08	8	29	43.4	18.7	14.5	4.3
FUY10	10	35	47.7	19.6	17.5	4.3
FUY12	12	41	53.3	21.9	20.5	4.3

Union Y connector reducer FUYR



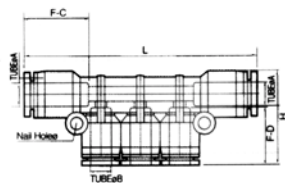
Order code	Apply tube		L(mm)	H(mm)	(F) Tube insert depth(mm)		ØP		Nail hole Ø
	A(Ø)	B(Ø)			F-C(mm)	F-D(mm)	E(Ø)	F(Ø)	
FUYR06-04	6	4	37.9	21	17.6	16.8	12.5	10.5	3.3
FUYR08-06	8	6	41.3	25	18.7	17.6	14.5	12.5	4.3
FUYR10-08	10	8	43.3	29	19.6	18.7	17.5	14.5	4.3
FUYR12-10	12	10	46.5	35	21.9	19.6	20.5	17.5	4.3

Union cross FUC



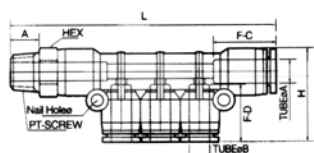
Order code	Apply tube dia(Ø)	Nail hole(Ø)	H(mm)	L(mm)	(F) Tube insert depth(mm)
FUC04	4	3.3	36.6	37.9	16.8
FUC06	6	3.3	41.8	42.5	17.6
FUC09	8	4.3	44.9	46.8	18.7
FUC10	10	4.3	48.2	50.5	19.6
FUC12	12	4.3	54.8	57.2	21.9

Union manifold connector FUM



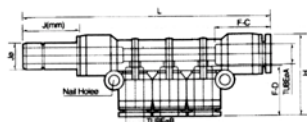
Order code	Apply tube dia(A)Ø	In-dia(B)Ø	Nail hole(Ø)	H(mm)	L(mm)	(F) Tube insert F-C(mm)	Depth(mm) F-D(mm)
FUM06-04	6	4	3.3	24.2	63.7	17.6	16.8
FUM08-04	8	4	4.3	28.5	65.7	18.7	16.8
FUM08-06	8	6	4.3	34	71.7	18.7	17.6
FUM10-06	10	6	4.3	32	78.1	19.6	17.6
FUM10-08	10	8	4.3	34.5	83.4	19.6	18.7

Union manifold connector FUMC



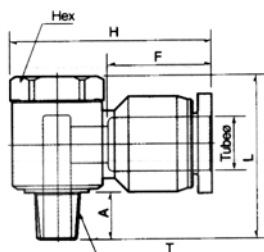
Order code	Apply tube dia(A)Ø	In-dia(B)Ø	Nail hole (Ø)	H (mm)	L (mm)	(F) Tube insert F-C(mm)	Depth(mm) F-D(mm)	A (mm)	PT -screw	Hexagon (Ø)
FUMC0614-1/8	6	4	3.3	24.2	72.3	17.6	16.8	8	1/8	12x13.8
FUMC0804-1/4	8	4	4.3	28.5	77.2	18.7	16.8	10	1/4	17x19.6
FUMC0806-1/4	8	6	4.3	34	84.4	18.7	17.6	10	1/4	17x19.6
FUMC1008-3/8	10	8	4.3	34.5	91	19.6	18.7	11	3/8	22x25.4

Union manifold connector FUML



Order code	Apply tube dia(A)Ø	In-dia(B)Ø	Nail hole Ø	H(mm)	L(mm)	(F) Tube insert F-C(mm)	Depth(mm) F-D(mm)	J(mm)	J(Ø)
FUML0604	6	4	3.3	24.2	84.3	17.6	16.8	25	6
FUML0804	8	4	4.3	28.5	89.5	18.7	16.8	28.5	8
FUML0806	8	6	4.3	34	95.5	18.7	17.6	28.5	8
FUML1008	10	8	4.3	34.5	109.7	19.6	18.7	31	10

Male elbow FSES



Order code	Apply tube dia(Ø)	(T) M-screw PT-screw	L(mm)	H(mm)	A(mm)	(F) Tube insert depth(mm)	Hexagon Ø(mm)
FSES04-M5	4	M5 x 0.8P	22.1	26.6	4.6	16.8	8 x 9.24
FSES04-1/8	4	PT1/8	32.4	31.5	8	16.8	14 x 16.8
FSES06-M5	6	M5 x 0.8P	22.1	27.2	4.6	17.6	8x 9.24
FSES06-1/8	6	PT1/8	32.4	32.4	8	17.6	14 x 16.8
FSES06-1/4	6	PT1/4	35.3	35.6	10	17.6	17 x 19.6
FSES08-1/8	8	PT1/8	32.4	39.2	8	18.7	14 x 16.8
FSES08-1/4	8	PT1/4	35.3	37.7	10	18.7	17 x 19.6
FSES08-3/8	8	PT3/8	39.7	42.7	11	18.7	21 x 24.2
FSES10-1/4	10	PT1/4	35.3	42.5	10	19.6	17 x 19.6
FSES10-3/8	10	PT3/8	39.7	43.6	11	19.6	21 x 24.2
FSES10-1/2	10	PT1/2	47.8	45.6	14	19.6	24 x 27.7
FSES12-3/8	12	PT3/8	39.7	45.9	11	21.9	21 x 24.2
FSES12-1/2	12	PT1/2	47.8	48.3	14	21.9	24 x 27.7