



Preparation unit——A、B Series

■ Production's series

F.R.L Combination: AC, BC Series 154 	FR.L Combination: AFC, BFC Series 156 	Filter & Regulator: AFR, BFR Series 158 
Filter: AF, BF Series 160 	Regulator: AR, BR Series 161 	Lubricator: AL, BL Series 163 
Regulator: SR Series 164 	Pressure gauge: GS, GF, GU Series 165 	Pressure controller: PK, AIS Series 166 



■ Installation and application

1. Check whether the components have been damaged during transportation before installing and using.
2. Pay attention to whether the flow direction of air (notice "→" direction) and thread type are correct.
3. Please notice whether installation condition accords with technical requirements (such as "working pressure" and "applied temperature range").
4. The medium used or installation environment shall be noticed. The matters with chlorine, carbon compound, aromatic compound and oxidizing acid and alkali shall be avoided to prevent the damage of bowl and oil bowl.
5. Regularly clean or change filter core. Lubricators and regulators shall be in descending order.
6. Keep dust away. The dust cover shall be installed in intake and outlet when the device is dismantled and stored.



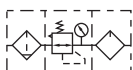
Preparation unit——F.R.L. combination

AIRTAC

AC、BC Series



Symbol



Product feature

1. The structure is delicate and compact, which is convenient for installation and application.
2. The pressed-in self-locking mechanism can prevent the abnormal movement of the set pressure caused by external interfere.
3. The pressure loss is low and the efficiency of water separating is high.
4. The quantity of oil dripping can be directly observed through transparent check-dome.
5. In addition to standard type, lower pressure type is optional (The highest adjustable pressure is 0.4MPa).

Specification

Model		AC1500	AC2000	BC2000	BC3000	BC4000
Fluid		Air				
Port size		1/8"	1/4"	1/4"	3/8"	1/2"
Filtering grade		40 μm or 5 μm				
Pressure range		Semi-auto and automatic drain:0.15~0.9MPa(20~130Psi)			Manual drain:0.05~0.9MPa(7~130Psi)	
Max. pressure		1.0MPa(145Psi)				
Proof pressure		1.5MPa(215Psi)				
Temperature range		-20~70℃				
Capacity of drain bowl		15CC		60CC		
Capacity of oil bowl		25CC		90CC		
Recommended		ISO VG 32 or equivalent				
Weight		700g		900g		
Constitute	Filter	AF1500	AF2000	BF2000	BF3000	BF4000
	Regulator	AR1500	AR2000	BR2000	BR3000	BR4000
	Lubricator	AL1500	AL2000	BL2000	BL3000	BL4000

Ordering code

AC 2000 M W □ P

Model

AC: A Series F.R.L. unit
BC: B Series F.R.L. unit

Port size

Series	Port size
AC	1500: 1/8"
	2000: 1/4"
BC	2000: 1/4"
	3000: 3/8"
	4000: 1/2"

Drain type

Series	Drain type
AC	Blank: Semi-auto drain M: Manual drain
BC	Blank: Semi-auto drain M: Manual drain A: Automatic drain

Thread type

P: PT
T: NPT
G: G

Scale

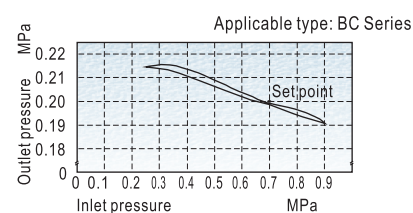
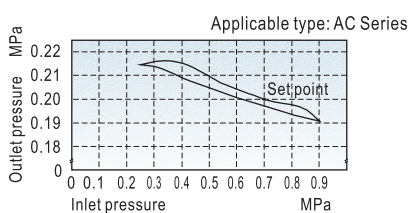
Blank: MPa
P: psi
B: bar
Z: Double scale (psi, kgf/cm²)

Filtering grade

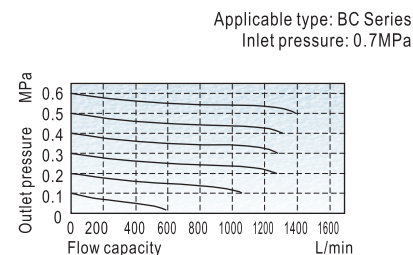
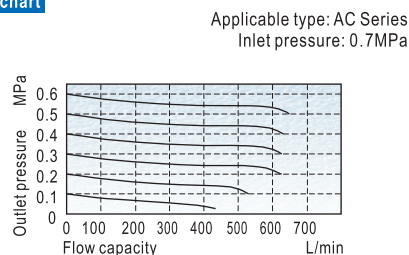
Blank: 40 μm
W: 5 μm

Pressure and feature of flow

Pressure chart



Flow chart



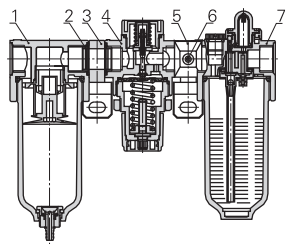
Preparation unit——F.R.L. combination



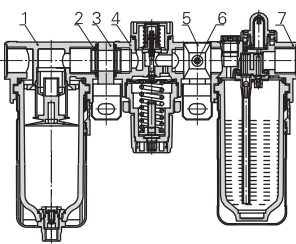
AC、BC Series

Inner structure

AC



BC



No.	Item	No.	Item
1	AF, BF Series filter	5	A, B Series fix kit
2	A, B Series gasket	6	Screw
3	A, B Series bracket	7	AL, BL Series lubricator
4	AR, BR Series regulator		

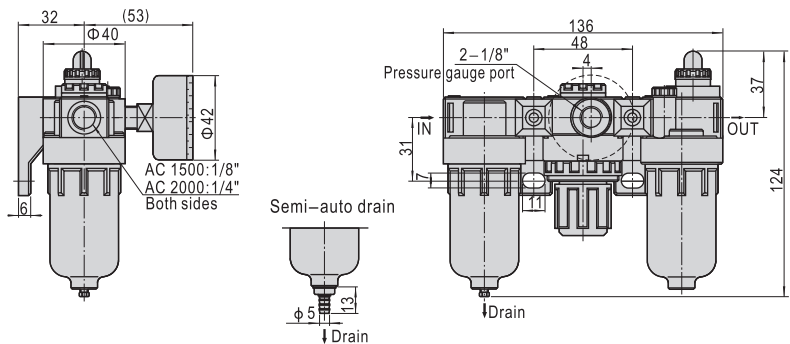
Selection of drain mode

A1500, 2000 Series		B2000, 3000, 4000 Series		
Manual drain	Semi-auto drain	Manual drain	Semi-auto drain	Automatic drain
	This semi-auto drain can also achieve the function of manual drain $\Phi 5$		 G1/8	 G1/8

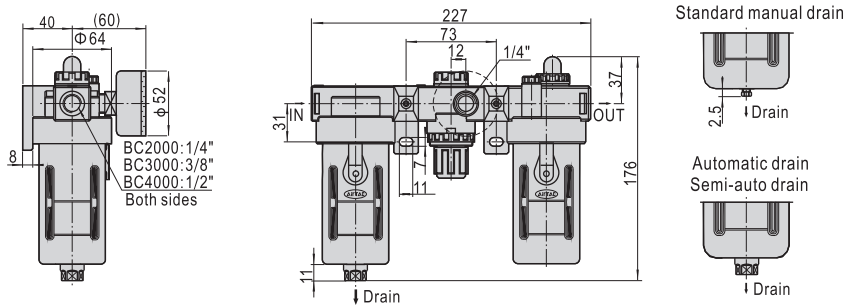


Dimensions

AC



BC



Preparation unit——F.R.L. combination

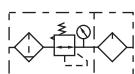
AirTAC

AFC、BFC Series



AFC
BFC

Symbol



Product feature

1. The structure is delicate and compact, which is convenient for installation and application.
2. The pressed-in self-locking mechanism can prevent the abnormal movement of the set pressure caused by external interfere.
3. The pressure loss is low and the efficiency of water separating is high.
4. The quantity of oil dripping can be directly observed through transparent check dome.
5. In addition to standard type, lower pressure type is optional (The highest adjustable pressure is 0.4MPa).

Specification

Model		AFC1500	AFC2000	BFC2000	BFC3000	BFC4000
Fluid		Air				
Port size		1/8"	1/4"	1/4"	3/8"	1/2"
Filtering grade		40 μm or 5 μm				
Pressure range		Semi-auto and automatic drain:0.15~0.9MPa(20~130Psi)			Manual drain:0.05~0.9MPa(7~130Psi)	
Max. pressure		1.0MPa(145Psi)				
Proof pressure		1.5MPa(215Psi)				
Temperature range		-20~70℃				
Capacity of drain bowl		15CC		60CC		
Capacity of oil bowl		25CC		90CC		
Recommended lubricant		ISO VG 32 or equivalent				
Weight		500g		700g		
Constitute	Filter-Regulator	AFR1500	AFR2000	BFR2000	BFR3000	BFR4000
	Lubricator	AL1500	AL2000	BL2000	BL3000	BL4000

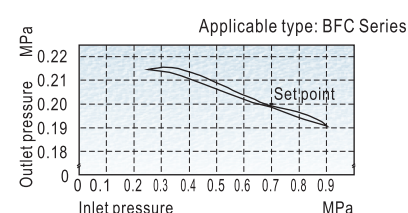
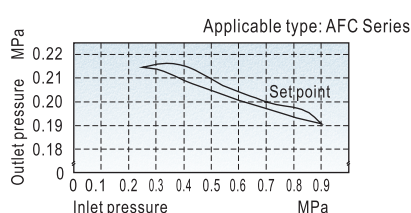
Ordering code

AFC 2000 M W □ P

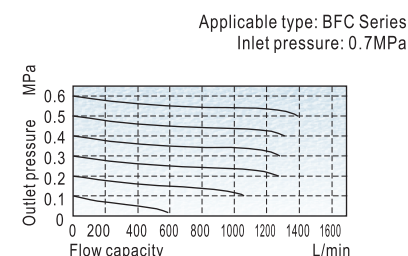
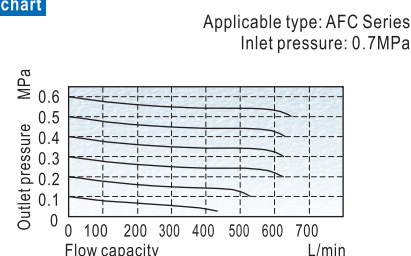
Model		Thread type	
AFC: A Series F.R.L unit		P: PT	
BFC: B Series F.R.L unit		T: NPT	
		G: G	
Port size		Scale	
Series	Port size	Blank: MPa	
AFC	1500: 1/8"	P: psi	
	2000: 1/4"	B: bar	
BFC	2000: 1/4"	Z: Double scale(psi、kgf/cm ²)	
	3000: 3/8"		
	4000: 1/2"		
Drain type		Filtering grade	
Series	Drain type	Blank: 40 μm	
AFC	Blank: Semi-auto drain	W: 5 μm	
	M: Manual drain		
BFC	Blank: Semi-auto drain		
	M: Manual drain		
	A: Automatic drain		

Pressure and feature of flow

Pressure chart



Flow chart



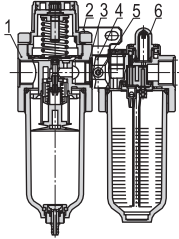
Preparation unit——F.R.L. combination

AFC、BFC Series

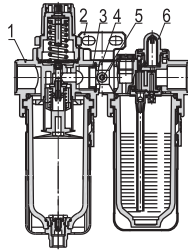


Inner structure

AFC



BFC



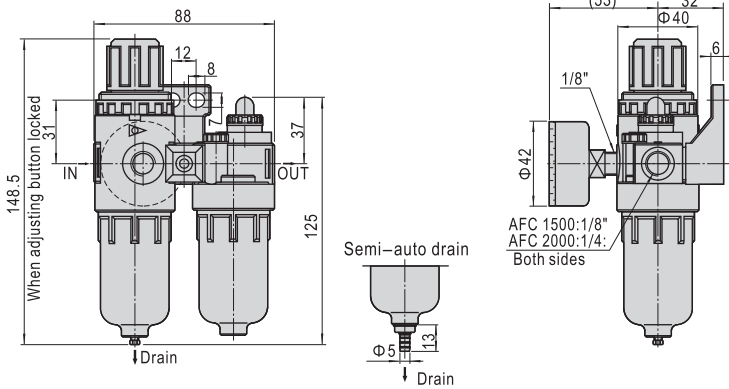
No.	Item
1	AFR, BFR Series filter & regulator
2	A, B Series bracket
3	A, B Series gasket
4	A, B Series fixed kit
5	Screw
6	AL, BL Series lubricator

Selection of drain mode

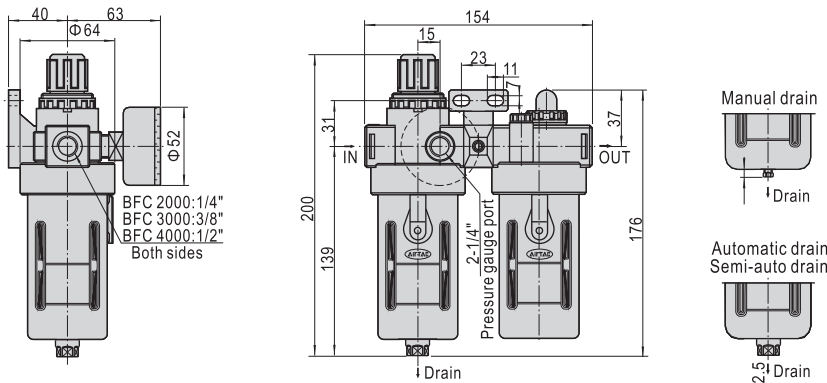
The drain modes of different series are different.
Pleaserefer to P 155 for details.

Dimensions

AFC



BFC



AFC BFC




Preparation unit——Filter & regulator

AirTAC

AFR、BFR Series



AFR
BFR

Specification

Model	AFR1500	AFR2000	BFR2000	BFR3000	BFR4000	
Fluid	Air					
Port size	1/8"	1/4"	1/4"	3/8"	1/2"	
Filtering grade	40 μ m or 5 μ m					
Pressure range	Semi-auto and automatic drain:0.15~0.9MPa(20~130Psi)			Manual drain:0.05~0.9MPa(7~130Psi)		
Max. pressure	1.0MPa(145Psi)					
Proof pressure	1.5MPa(215Psi)					
Temperature range	-20~70℃					
Capacity of drain bowl	15CC		60CC			
Weight	260g		400g			

Ordering code

AFR 2000 M W ☐ P

Model

AFR: A Series Filter & regulator
BFR: B Series Filter & regulator

Port size

Series	Port size
AFR	1500: 1/8"
	2000: 1/4"
BFR	2000: 1/4"
	3000: 3/8"
4000: 1/2"	

Thread type

P: PT
T: NPT
G: G

Scale

Blank: MPa
P: psi
B: bar
Z: Double scale(psi、kgf/cm²)

Drain type

Series	Drain type
AFR	Blank: Semi-auto drain
	M: Manual drain
BFR	Blank: Semi-auto drain
	M: Manual drain
A: Automatic drain	

Filtering grade

Blank: 40 μm
W: 5 μm

Symbol

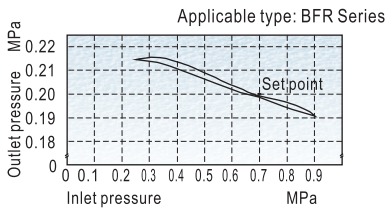
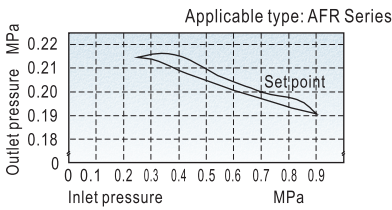


Product feature

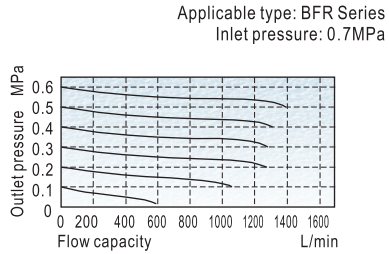
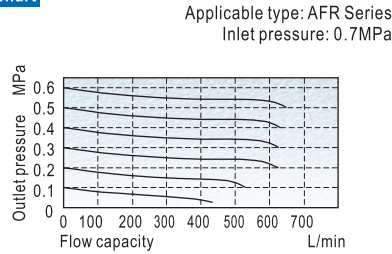
1. The structure is delicate and compact, which is convenient for installation and application.
2. The pressed-in self-locking mechanism can prevent the abnormal movement of the set pressure caused by external interfere.
3. The pressure loss is low and the efficiency of water separating is high;
4. In addition to standard type, lower pressure type is optional(The highest adjustable pressure is 0.4MPa).

Pressure and feature of flow

Pressure chart



Flow chart



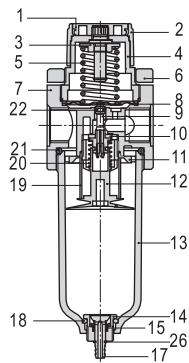
Preparation unit—Filter & regulator

AirTAC

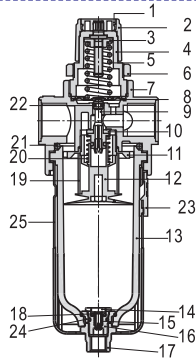
AFR、BFR Series

Inner structure and Material of major parts Dimensions

AFR

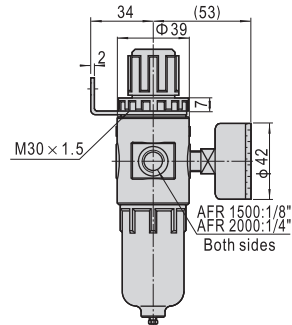


BFR

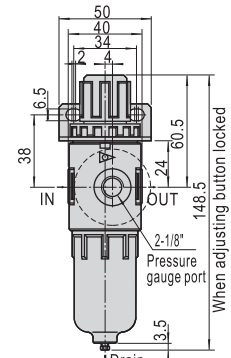
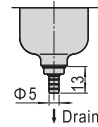


No.	Item	Material
1	Push button	POM
2	Adjusting button	POM
3	Adjusting nut	Steel
4	Adjusting seat	POM
5	Adjusting spring	SWC
6	Fixed ring	POM
7	Body	Aluminum alloy
8	Diaphragm	SUS304 & rubber
9	Balance needle	POM
10	needle gasket	Aluminum alloy & rubber
11	Air guider	POM
12	Umbrella baffle	POM
13	Drain bowl	PC
14	Drain kit	POM
15	Return spring	Stainless steel
16	Drain seat	POM
17	Drain pillar	POM
18	Drain O-ring	NBR
19	Filter element	5 μ m Makrolon fiber
		40 μ m Agglomerated by bronze grain
20	Return spring	Stainless steel
21	Drain bowl O-ring	NBR
22	Needle O-ring	NBR
23	Bowl guard switch	POM
24	Gasket	POM
25	Bowl guard	PA66
26	Clip	Spring steel

AFR

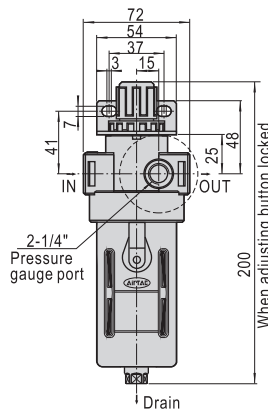
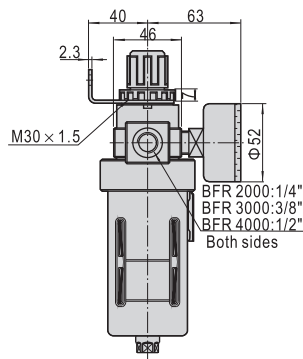


Semi-auto drain



When adjusting button locked

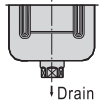
BFR



Manual drain



Automatic drain
Semi-auto drain



AFR
BFR

Selection of drain mode

The drain modes of different series are different.
Please refer to P 155 for details.



Preparation unit——Filter

AirTAC

AF、BF Series



Symbol



Product feature

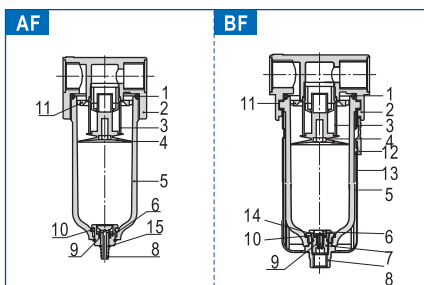
AF series

1. The structure is delicate and compact.
2. The pressure loss is low and the efficiency of water separating is high;
3. The filter precision includes 5 μ m and 40 μ m (optional);

BF series

1. The pressure loss is low and the efficiency of water separating is high.
2. The bowl has high-strength plastic shields outside, which is more safe and reliable to use.
3. The filter precision includes 5 μ m and 40 μ m (optional).

Inner structure and material of major parts



No.	Item	Material
1	Drain bowl O-ring	NBR
2	Body	Aluminum alloy
3	Filter element	5 μ m Makrolon fiber 40 μ m Agglomerated by bronze grain
4	Umbrella baffle	POM
5	Drain bowl	PC
6	Drain kit	POM
7	Drain seat	POM
8	Drain pillar	POM
9	Return spring	Stainless steel
10	Gasket	POM
11	Air guider	POM
12	Bowl guard switch	POM
13	Bowl guard	PA6
14	Drain seat O-ring	NBR
15	Clip	Spring steel

Selection of drain mode

The drain modes of different series are different.
Please refer to P155 for details.

Specification

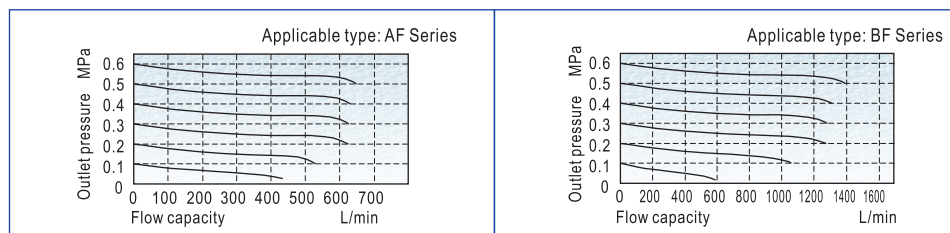
Model	AF1500	AF2000	BF2000	BF3000	BF4000
Fluid	Air				
Port size	1/8"	1/4"	1/4"	3/8"	1/2"
Filtering grade	40 μ m or 5 μ m				
Pressure range	Semi-auto and automatic drain: 0.15~0.9MPa(20~130Psi) Manual drain: 0.05~0.9MPa(7~130Psi)				
Proof pressure	1.5MPa(215Psi)				
Temperature range	-20~70°C				
Capacity of drain bowl	15CC		60CC		
Weight	140g		330g		

Ordering code

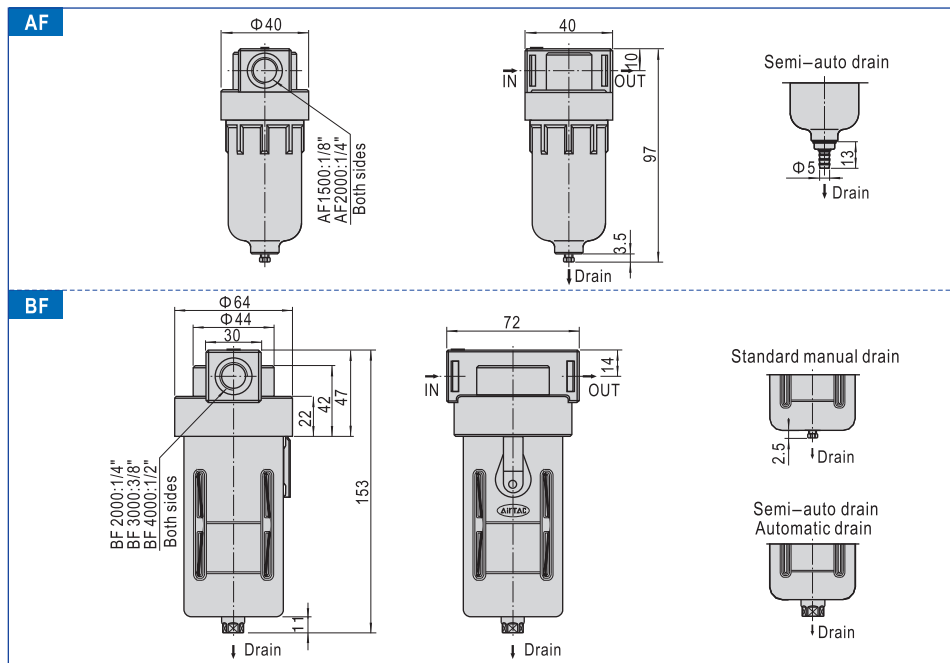
AF 2000 M W P

Model	Thread type	Filtering grade	Drain type
AF: A Series Filter BF: B Series Filter	P: PT T: NPT G: G	Blank: 40 μ m W: 5 μ m	Series Drain type AF Blank: Semi-auto drain M: Manual drain BF Blank: Semi-auto drain M: Manual drain A: Automatic drain

Flow chart



Dimensions



Preparation unit——Regulator

AirTAC

AR、BR Series

Specification

Model	Ar1500	AR2000	BR2000	BR3000	BR4000
Fluid	Air				
Port size	1/8"	1/4"	1/4"	3/8"	1/2"
Pressure range	0.05~0.9MPa(7~130Psi)				
Max. pressure	1.0MPa(145Psi)				
Proof pressure	1.5MPa(215Psi)				
Temperature range	-20~70℃				
Weight	200g		230g		

Ordering code

AR 2000 L □ P				
Model		Thread type		
AR: A Series Regulator		P: PT		
BR: B Series Regulator		T: NPT		
		G: G		
Port size		Scale		
Series	Port size	Blank: MPa		
AR	1500: 1/8"	P: psi		
	2000: 1/4"	B: bar		
BR	2000: 1/4"	Z: Double scale(psi、kgf/cm ²)		
	3000: 3/8"			
	4000: 1/2"			
Type code				
Blank: Standard(0.9MPa)				
L: Lower pressure(0.4MPa)				



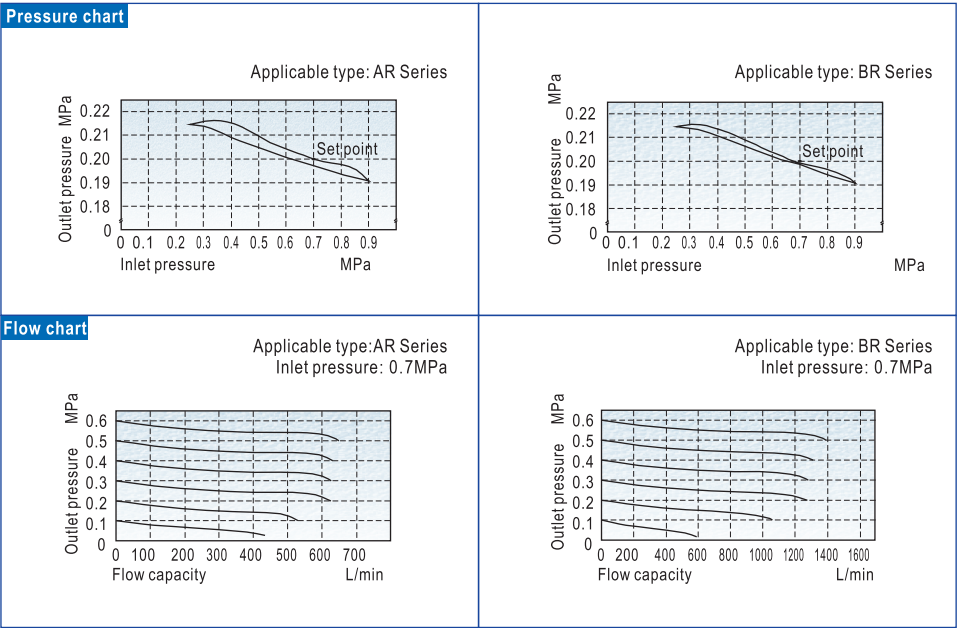
Symbol



Product feature

1. The structure is delicate and compact, which is convenient for installation and application.
2. The pressed-in self-locking mechanism can prevent the abnormal movement of the set pressure caused by external interfere.
3. In addition to standard type, lower pressure type is optional (The highest adjustable pressure is 0.4MPa).

Pressure and feature of flow



Preparation unit——Regulator



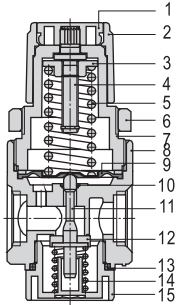
AR、BR Series

Inner structure and material of major parts

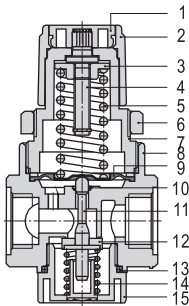
Dimensions



AR

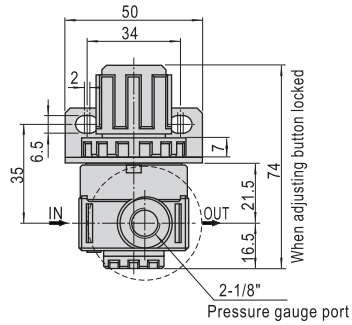
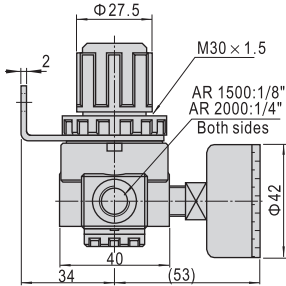


BR

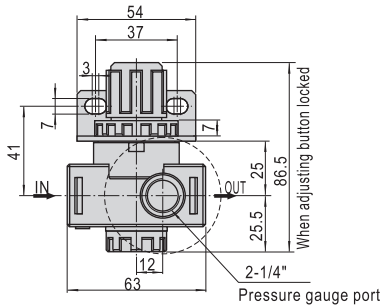
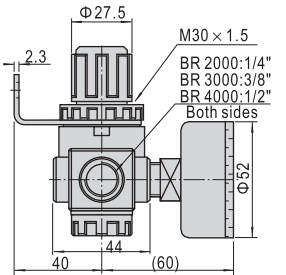


No.	Item	Material
1	Push button	POM
2	Adjusting button	POM
3	Adjusting nut	Steel
4	Adjusting pillar	Steel
5	Adjusting spring	SWC
6	Fixed ring	POM
7	Adjusting seat	POM
8	Body	Aluminum alloy
9	Diaphragm	SUS304 & rubber
10	Needle O-ring	NBR
11	Balance needle	POM
12	Needle gasket	Aluminum alloy & rubber
13	Cap O-ring	NBR
14	Return spring	Stainless steel
15	Regulator cap	POM

AR



BR



Preparation unit——Lubricator

AIRTAC

AL、BL Series

Specification

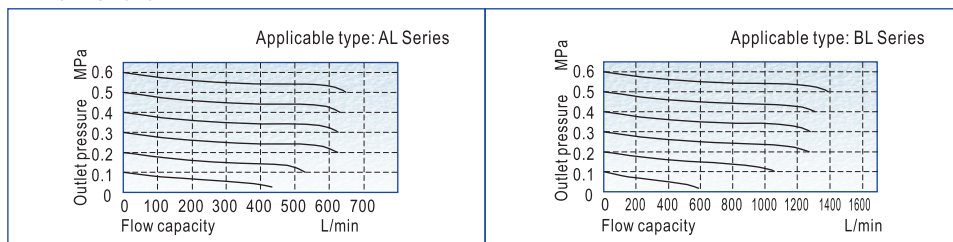
Model	AL1500	AL2000	BL2000	BL3000	BL4000
Fluid	Air				
Port size	1/8"	1/4"	1/4"	3/8"	1/2"
Pressure range	0.05~0.9MPa(7~130Psi)				
Proof pressure	1.5MPa(215Psi)				
Temperature range	-20~70℃				
Capacity of oil bowl	25CC		90CC		
Recommended	ISO VG 32 or equivalent				
Weight	170g		250g		

Ordering code

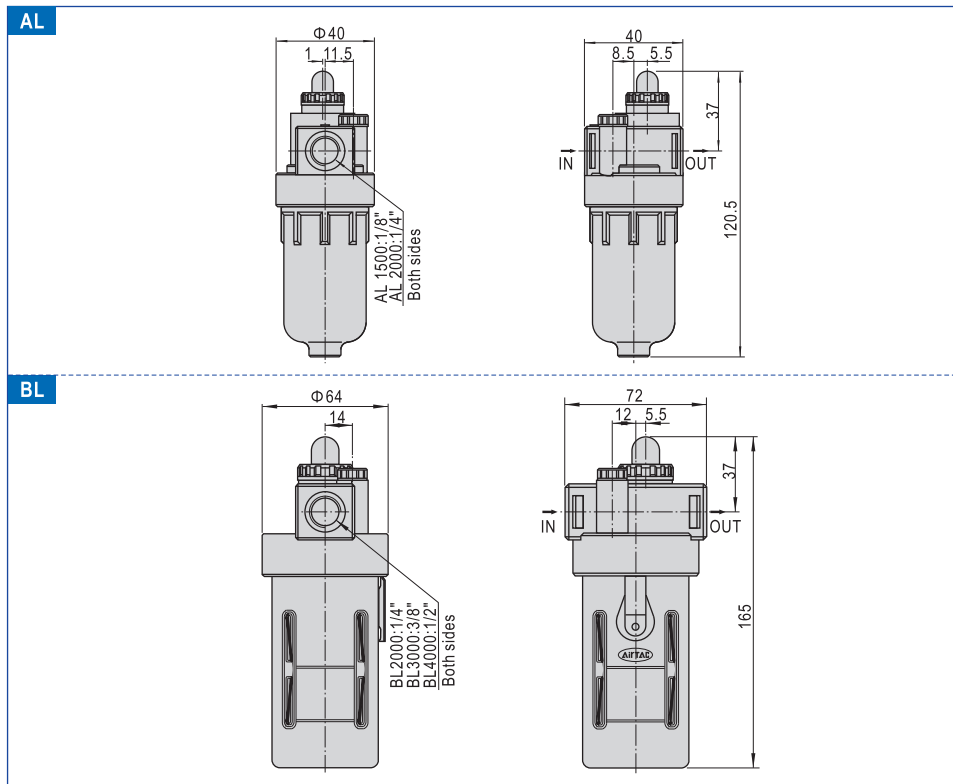
AL 2000 P

Model	Thread type	Port size
AL: A Series lubricator	P: PT	Series Port size
BL: B Series lubricator	T: NPT	AL 1500: 1/8"
	G: G	AL 2000: 1/4"
		BL 2000: 1/4"
		BL 3000: 3/8"
		BL 4000: 1/2"

Flow chart



Dimensions



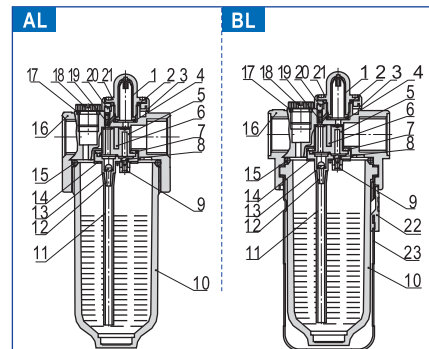
Symbol



Product feature

1. The structure is delicate and compact.
2. The quantity of oil dripping can be directly observed through transparent inspection sheet.
3. BL has high-strength plastic shields, which is more safe and reliable to use.
4. The pressure loss and the flow of miststart is low.

Inner structure and material of major parts



No.	Item	Material
1	Drip pipe	PC
2	Dripper O-ring	NBR
3	Oil adjusting dial	POM
4	Adjusting ring	NBR
5	Lubricator seat	POM
6	Partition	PU
7	Lubricator kit gasket	NBR
8	Adjustor	HDPE
9	Returnsp ring	Stainless steel
10	Oil bowl	PC
11	Sunk tube	PU
12	Lubricator kit	POM
13	Ball	Stainless steel
14	Lubricator fixed plate	SPCC
15	Oil bowl O-ring	NBR
16	Body	Aluminum alloy
17	Oil filling nut O-ring	NBR
18	Oil filling plug	Steel
19	Needle spring	Stainless steel
20	Injector pin	Bronze
21	Check-dome	PC
22	Bowl guard switch	POM
23	Bowl guard	PA6