

Get maximum productivity from your tools

Atlas Copco air preparation units are designed to help you get maximum productivity from your tools. They ensure minimal pressure drop and thus minimum energy losses in the air distribution system, benefiting the environment and cutting your operating costs. The lifetimes of your tools will be extended by using air preparation units and with that comes lower repair costs and less downtime. A correct air installation ensures productivity and good total economy.

Filter – FIL

Water and dirt in your compressed air system will cause extensive corrosion damage and wear.

Productivity

Atlas Copco filters are equipped with a cyclone system. Using centrifugal force, this separates out a high percentage of the heavier solid water particles, while the filter ensures that the amount of dirt entering your tool is kept to a minimum. This means longer working cycles for the tools and minimum service time.

Regulator – REG

Atlas Copco regulators ensure optimal flow at the specific flow rates required by Atlas Copco tools, or any other pneumatic tools.

Energy efficiency

By installing a regulator you will ensure that there will not be any unnecessary consumption of compressed air. The regulators reduce a variable primary pressure to a practically constant secondary pressure with a minimum of pressure drop.

Productivity

The regulator will optimize the performance of your tool, ensure torque accuracy and boost productivity.

Lubricator – DIM

Atlas Copco oil lubricators ensure a long, efficient and trouble-free life for your pneumatic tools and components.

Productivity

The use of a lubricator will increase the power in vane motors by about 10-15%.

Energy efficiency

With the use of a lubricator you will prolong the lifetime of a vane motor up to three times and the motor will work much more efficiently, and with less friction.



Filter – FIL



Regulator – REG



Lubricator – DIM

Air preparation unit MINI-K's main application is to prepare the air for pneumatic components. MINI-K units have a 1/4" BSP connection thread, a composite housing made of polyamide 66 and the bowls are made of polycarbonate.

Working temperature

0°C to +50°C at 10 bar

Operating pressure

Inlet pressure 0-10 bar

Outlet pressure 0.5-8 bar

Standard filter

30 µm

Pressure gauge

1/8" BSP



Model	Economical air flow l/s	Maximum air flow l/s	Bowl	Filter condensate drainage	Max condensate capacity cm³	Max oil capacity cm³	Weight kg	Ordering No.
Filters								
MINI FIL 08K-B	12	30	Polycarbonate	Manual	12	-	0.1	9092 0000 01
Regulators								
MINI REG 08K	10	20	-	-	-	-	0.11	9092 0000 61
Lubricators								
MINI DIM 08K	9	23	Polycarbonate	-	-	35	0.09	9092 0000 91
Filter/regulator								
MINI F/R 08K	12	17	Polycarbonate	Manual	12	-	0.12	9092 0001 21
Filter/regulator+lubricator								
MINI F/RD 08K	9	14	Polycarbonate	Manual	12	35	0.32	9092 0001 51

NOTE: **Economical air flow:** 8 bar inlet pressure, 6.3 bar outlet pressure, 0.2 bar pressure drop.

Maximum air flow: 10 bar inlet pressure, 6.3 bar outlet pressure, 1 bar pressure drop.

All separate units, mounting brackets, assembly kits and pressure gauges need to be ordered separately. MINI-K F/RD unit is delivered complete with mounting bracket, assembly kit and pressure gauge.

Air preparation unit MINI-B's main application is to prepare the air for pneumatic components and tools with low air consumption. MINI-B has a 1/4" BSP connection thread and the housing is made of diecast zinc. The bowls are made of polycarbonate or the unit has metal bowls in zinc.

Working temperature

0°C to +50°C at 10 bar

Operating pressure

Inlet pressure 0-16 bar

Outlet pressure 0.5-8 bar

Standard filter

30 µm

Pressure gauge

1/8" BSP



Model	Economical air flow l/s	Maximum air flow l/s	Bowl	Filter condensate drainage	Max condensate capacity cm³	Max oil capacity cm³	Weight kg	Ordering No.
Filters								
MINI FIL 08B-B	12	24	Polycarbonate	Semi/automatic	22	-	0.25	9093 0032 11
MINI FIL 08B-C	12	24	Polycarbonate	Manual	22	-	0.25	9093 0032 41
MINI FIL 08B-D	13	24	Metal	Manual	22	-	0.25	9093 0032 71
Regulators								
MINI REG 08B	9	47.5	-	-	-	-	0.30	9093 0033 01
MINI REG 08B-LP	9	47.5	-	-	-	-	0.30	9093 0073 21
MINI REG 08P	8	47.5	-	-	-	-	0.30	9093 0000 31
Lubricators								
MINI DIM 08B	12	23	Polycarbonate	-	-	45	0.25	9093 0033 31
MINI DIM 08B-D	12	23	Metal	-	-	45	0.25	9093 0033 61
Filter/regulator								
MINI F/R 08B-B	9	38	Polycarbonate	Semi/automatic	22	-	0.35	9093 0033 91
MINI F/R 08B-C	9	38	Polycarbonate	Manual	22	-	0.35	9093 0034 21
Filter/regulator+lubricator								
MINI F/RD 08B-B	9	14.8	Polycarbonate	Semi/automatic	22	45	0.75	9093 0034 51
MINI F/RD 08B-C	9	14.8	Polycarbonate	Manual	22	45	0.75	9093 0034 81
Filter+regulator+lubricator								
MINI FRD 08B-B	9	13.8	Polycarbonate	Semi/automatic	22	45	0.95	9093 0062 11
MINI FRD 08B-C	9	13.8	Polycarbonate	Manual	22	45	0.95	9093 0062 41

NOTE: Economical air flow: 8 bar inlet pressure, 6.3 bar outlet pressure, 0.2 bar pressure drop.

Maximum air flow: 10 bar inlet pressure, 6.3 bar outlet pressure, 1 bar pressure drop.

All separate units, mounting brackets, assembly kits and pressure gauges need to be ordered separately. The MINI F/RD and FRD units are delivered complete with mounting bracket, assembly kit and pressure gauge.

The MIDI Optimizer is suitable for more than 90% of the Atlas Copco tool range and is the best choice for assembly tools, percussive tools, drills, nibblers and grinders up to Turbo. The MIDI Optimizer has a 1/2" BSP connection thread and a housing and bowl of high-tech polymer. The bowl has a highly chemical resistant polypropylene insert and the bowl is directly screwed to the housing for easy handling.

MIDI Optimizer self-regulating nano-lubricator

Adjusts automatically to the flow demand and ensures that the right amount of oil is supplied to the motor at all flow rates. This minimizes the lubrication needed. The nano oil mist, with a particle size of 200 nm, can be transported by the air stream up to 40 m. This means there is no oil in the hose and direct lubrication is not necessary. The lubricator can be refilled during operation. EP-versions are adjusted for use with impulse tools.



Working temperature

-40°C to +60°C at 10 bar
+2°C to +60°C at 10 bar for filters

NOTE: For dry compressed air, ice formation must be avoided.

Operating pressure

Inlet pressure 0-16 bar
Outlet pressure 0.5-8 bar
Outlet pressure, HP versions 0.5-16 bar

Standard filter

30 µm

Pressure gauge

1/4" BSP

Included in F/RD and FRD units

Model	Economical air flow l/s	Maximum air flow l/s	Bowl	Filter condensate drainage	Max condensate capacity cm³	Max oil capacity cm³	Weight kg	Ordering No.
Filters								
MIDI Optimizer FIL A	-	117	Polymer, plastic insert	Automatic	60	-	0.3	9093 0021 01
MIDI Optimizer FIL M/S	-	117	Polymer, plastic insert	Manual/semi auto	60	-	0.3	9093 0021 02
Regulators								
MIDI Optimizer REG	-	97	-	-	-	-	0.35	9093 0021 05
MIDI Optimizer REG LP	-	97	-	-	-	-	0.35	9093 0021 06
MIDI Optimizer REG HP	-	97	-	-	-	-	0.35	9093 0021 30
Lubricators								
MIDI Optimizer DIM	31	120	Polymer, plastic insert	-	-	90	0.3	9093 0021 10
MIDI Optimizer DIM EP	31	120	Polymer, plastic insert	-	-	90	0.3	9093 0021 33
Filter/regulator								
MIDI Optimizer F/R A	-	90	Polymer, plastic insert	Automatic	60	-	0.5	9093 0021 12
MIDI Optimizer F/R M/S	-	90	Polymer, plastic insert	Manual/semi auto	60	-	0.5	9093 0021 13
MIDI Optimizer F/R HP M/S	-	90	Polymer, plastic insert	Manual/semi auto	60	-	0.5	9093 0021 31
MIDI Optimizer F/R HP A	-	90	Polymer, plastic insert	Automatic	60	-	0.5	9093 0021 32
Filter/regulator+lubricator								
MIDI Optimizer F/RD A	31	55	Polymer, plastic insert	Automatic	60	90	1.0	9093 0021 16
MIDI Optimizer F/RD M/S	31	55	Polymer, plastic insert	Manual/semi auto	60	90	1.0	9093 0021 17
MIDI Optimizer F/RD A EP	31	55	Polymer, plastic insert	Automatic	60	90	1.0	9093 0021 35
MIDI Optimizer F/RD M/S EP	31	55	Polymer, plastic insert	Manual/semi auto	60	90	1.0	9093 0021 36
Filter+regulator+lubricator								
MIDI Optimizer FRD A	31	55	Polymer, plastic insert	Automatic	60	90	1.1	9093 0021 24
MIDI Optimizer FRD M/S	31	55	Polymer, plastic insert	Manual/semi auto	60	90	1.1	9093 0021 25

NOTE: **Economical air flow:** 8 bar inlet pressure, 6.3 bar outlet pressure, 0.2 bar pressure drop.

Maximum air flow: 10 bar inlet pressure, 6.3 bar outlet pressure, 1 bar pressure drop.

All separate units, mounting brackets, assembly kits and pressure gauges need to be ordered separately. The MIDI Optimizer F/RD and FRD units are delivered complete with mounting bracket, assembly kit and pressure gauge.

EP For pulse tools, lubricator adjusted for impulsing tools
A Automatic
M/S Manual/semi automatic
HP High pressure regulator
LP Lockable regulator

The MIDI Optimizer is suitable for more than 90% of the Atlas Copco tool range and is the best choice for assembly tools, percussive tools, drills, nibblers and grinders up to Turbo. The MIDI Optimizer has a 3/4" BSP connection thread and a housing and bowl of high-tech polymer. The bowl has a highly chemical resistant polypropylene insert and the bowl is directly screwed to the housing for easy handling.

MIDI Optimizer self-regulating nano-lubricator

Adjusts automatically to the flow demand and ensures that the right amount of oil is supplied to the motor at all flow rates. This minimizes the lubrication needed. The nano oil mist, with a particle size of 200 nm, can be transported by the air stream up to 40 m. This means there is no oil in the hose and direct lubrication is not necessary. The lubricator can be refilled during operation. EP-versions are adjusted for use with impulse tools.



Working temperature

-40°C to +60°C at 10 bar
+2°C to +60°C at 10 bar for filters

NOTE: For dry compressed air, ice formation must be avoided.

Operating pressure

Inlet pressure 0-16 bar
Outlet pressure 0.5-8 bar
Outlet pressure, HP versions 0.5-16 bar

Standard filter

30 µm

Pressure gauge

1/4" BSP
Included in F/RD and FRD units

Model	Economical air flow l/s	Maximum air flow l/s	Bowl	Filter condensate drainage	Max condensate capacity cm³	Max oil capacity cm³	Weight kg	Ordering No.
Filters								
MIDI Optimizer 3/4" FIL A	-	117	Polymer, plastic insert	Automatic	60	-	0.3	9093 0021 40
MIDI Optimizer 3/4" FIL M/S	-	117	Polymer, plastic insert	Manual/semi auto	60	-	0.3	9093 0021 41
Regulators								
MIDI Optimizer 3/4" REG	-	97	-	-	-	-	0.35	9093 0021 42
MIDI Optimizer 3/4" REG LP	-	97	-	-	-	-	0.35	9093 0021 43
MIDI Optimizer 3/4" REG HP	-	97	-	-	-	-	0.35	9093 0021 44
Lubricators								
MIDI Optimizer 3/4" DIM	31	120	Polymer, plastic insert	-	-	90	0.3	9093 0021 45
MIDI Optimizer 3/4" DIM EP	31	120	Polymer, plastic insert	-	-	90	0.3	9093 0021 54
Filter/regulator								
MIDI Optimizer 3/4" F/R A	-	90	Polymer, plastic insert	Automatic	60	-	0.5	9093 0021 46
MIDI Optimizer 3/4" F/R M/S	-	90	Polymer, plastic insert	Manual/semi auto	60	-	0.5	9093 0021 47
MIDI Optimizer 3/4" F/R M/S HP	-	90	Polymer, plastic insert	Manual/semi auto	60	-	0.5	9093 0021 48
MIDI Optimizer 3/4" F/R A HP	-	90	Polymer, plastic insert	Automatic	60	-	0.5	9093 0021 49
Filter/regulator+lubricator								
MIDI Optimizer 3/4" F/RD A	31	55	Polymer, plastic insert	Automatic	60	90	1.0	9093 0021 50
MIDI Optimizer 3/4" F/RD A EP	31	55	Polymer, plastic insert	Automatic	60	90	1.0	9093 0021 55
MIDI Optimizer 3/4" F/RD M/S	31	55	Polymer, plastic insert	Manual/semi auto	60	90	1.0	9093 0021 51
MIDI Optimizer 3/4" F/RD M/S EP	31	55	Polymer, plastic insert	Manual/semi auto	60	90	1.0	9093 0021 56
Filter+regulator+lubricator								
MIDI Optimizer 3/4" FRD A	31	55	Polymer, plastic insert	Automatic	60	90	1.1	9093 0021 52
MIDI Optimizer 3/4" FRD M/S	31	55	Polymer, plastic insert	Manual/semi auto	60	90	1.1	9093 0021 53

NOTE: **Economical air flow:** 8 bar inlet pressure, 6.3 bar outlet pressure, 0.2 bar pressure drop.

Maximum air flow: 10 bar inlet pressure, 6.3 bar outlet pressure, 1 bar pressure drop.

All separate units, mounting brackets, assembly kits and pressure gauges need to be ordered separately. The MIDI Optimizer F/RD and FRD units are delivered complete with mounting bracket, assembly kit and pressure gauge.

EP For pulse tools, lubricator adjusted for impulsing tools
A Automatic
M/S Manual/semi automatic
HP High pressure regulator
LP Lockable regulator

The high flow MAXI-B air preparation unit's main application is to prepare the air for pneumatic tools which are large air consumers when long distribution hoses and multi connectors are used. A good example is Atlas Copco Turbo grinders. The MAXI-B has a diecast zinc housing and aluminum bowls with polypropylene inserts and the bowl is directly screwed to the housing for easy handling.

Working temperature

-10°C to +50°C at 10 bar

NOTE: For dry compressed air, ice formation must be avoided.

Operating pressure

Inlet pressure 0-17.5 bar

Outlet pressure 0.5-12 bar

Standard filter

30 µm

Pressure gauge

1/4" BSP



Model	Economical air flow l/s	Maximum air flow l/s	Bowl	Filter condensate drainage	Max condensate capacity cm³	Max oil capacity cm³	Weight kg	Ordering No.
Filters								
MAXI FIL 25B-B	106	190 ^a	Metal	Semi/automatic	130	-	0.9	9093 0074 21
Regulators								
MAXI REG 25B	85	333	-	-	-	-	1.2	9093 0074 61
MAXI REG 25B-LP	85	333	-	-	-	-	1.2	9093 0074 81
Lubricators								
MAXI DIM 25B	87	295	Metal	-	-	500	0.8	9093 0075 21
Filter/regulator								
MAXI F/R 25B-B	84	316	Metal	Semi/automatic	130	-	1.5	9093 0075 51
Filter/regulator+lubricator								
MAXI F/RD 25B-B	82	244	Metal	Semi/automatic	130	500	2.8	9093 0075 81
MAXI FRD 25B-B	81	209	Metal	Semi/automatic	130	500	3.3	9093 0076 01

^a 8 bar inlet pressure, 1 bar pressure drop.

NOTE: **Economical air flow:** 8 bar inlet pressure, 6.3 bar outlet pressure, 0.2 bar pressure drop.

Maximum air flow: 10 bar inlet pressure, 6.3 bar outlet pressure, 1 bar pressure drop.

All separate units, mounting brackets, assembly kits and pressure gauges need to be ordered separately. The MAXI F/RD and FRD units are delivered complete with mounting bracket, assembly kit and pressure gauge.

Optional Accessories

Common accessories

Designation	Ordering No.			
	MINI-K	MINI-B	MIDI OPTIMIZER	MAXI-B
Mounting bracket kit	9090 1902 00	9092 0063 01	9093 0022 01	9093 0076 15
Assembly kit	9090 1901 90	9092 0062 71	9093 0022 02	9093 0076 31

Are included in combination units (FD, FTD, F/RD and FRD)

Common accessories have to be ordered separately for separate units.

Filter (FIL) accessories (30 µm filter element is included with all filters)

Designation	Ordering No.			
	MINI-K	MINI-B	MIDI OPTIMIZER	MAXI-B
Filter element				
30 µm	9090 1898 00	9092 0063 31	9093 0023 04	9093 0076 61
5 µm		9092 0063 61	9093 0023 05	9093 0076 71
Bowl guard		9092 0063 91		

Regulator (REG) accessories

Designation	Ordering No.			
	MINI-K	MINI-B	MIDI OPTIMIZER	MAXI-B
Pressure gauge				
0-10 bar				
Ø 40 mm	9090 1907 00	9090 1907 00		
Ø 50 mm		9090 1172 00	9090 2052 00	
Metal housing			9090 2052 01	
0-16 bar				
Ø 49 mm			9090 0239 00	9090 0239 00
Ø 50 mm		9090 1657 00		
Panel mounting pressure gauge				
0-10 bar				
Ø 50 mm		9090 1173 00	9090 1173 00	
0-16 bar				
Ø 63 mm				9093 0076 43
Key lock for regulator -LP		9092 0074 11	9092 0074 11	9092 0074 11

Pressure gauge 0-10 bar is included in the combination units (F/RD and FRD)

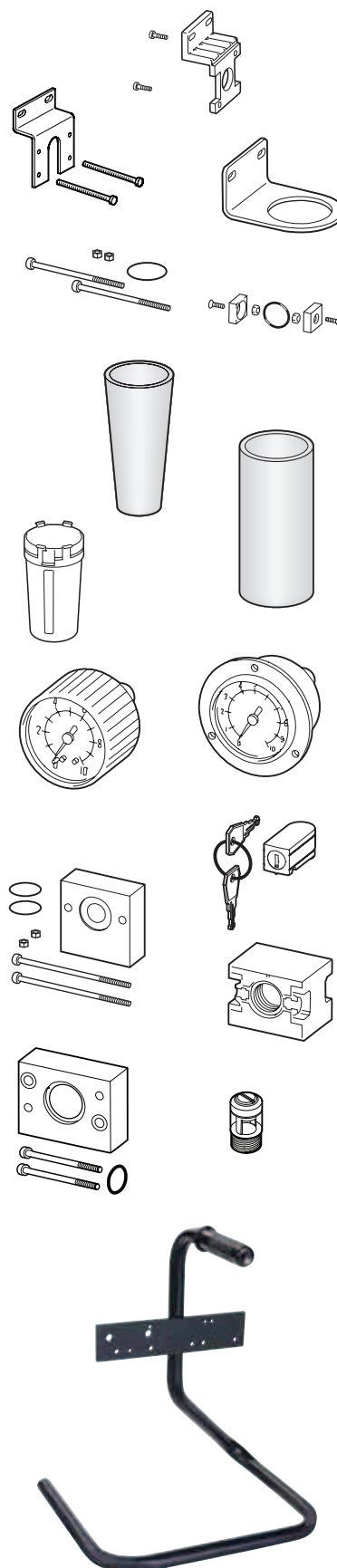
Pressure gauge has to be ordered separately for separate units.

Lubricator (DIM) accessories

Designation	Ordering No.			
	MINI-K	MINI-B	MIDI OPTIMIZER	MAXI-B
Air distribution block kit	9090 1900 90	9092 0064 51	9093 0022 03	9093 0076 41
Bowl guard		9092 0063 91		
Glass sight dome		9090 1121 00		9090 1873 00

FRL stand

Designation	Ordering No.
Suits all models	9090 2101 00



Optimizer air tool oil

Atlas Copco Optimizer air tool oil is a white, oil based lubricant for pneumatic tools. It has excellent antiwear properties and contains additives preventing oxidation and foaming. Optimizer air tool oil provides a better working environment, compared to conventional mist lubrication oils and is recommended when stringent demands are placed on the working environment.

- Provides a better working environment.
- Excellent antiwear properties.
- Minimizes wear on components.



Technical Data

Temperature range	-25°C to +70°C
Density at 15°C	869 kg/m ³
Viscosity at 40°C	22 mm ² /s
Pour point	-48°C
Flash point COC	>170°C

Model	Ordering No.
Optimizer 0.5 liter	9090 0000 02
Optimizer 1 liter	9090 0000 04
Optimizer 4 liter	9090 0000 06
Optimizer 10 liter	9090 0000 08