

wipcool[®]
FEELING FOR MORE



 **YouTube**
Scan us for more details
www.wipcool.com

Focus on Air Conditioning's
Drainage, Maintenance & Installation



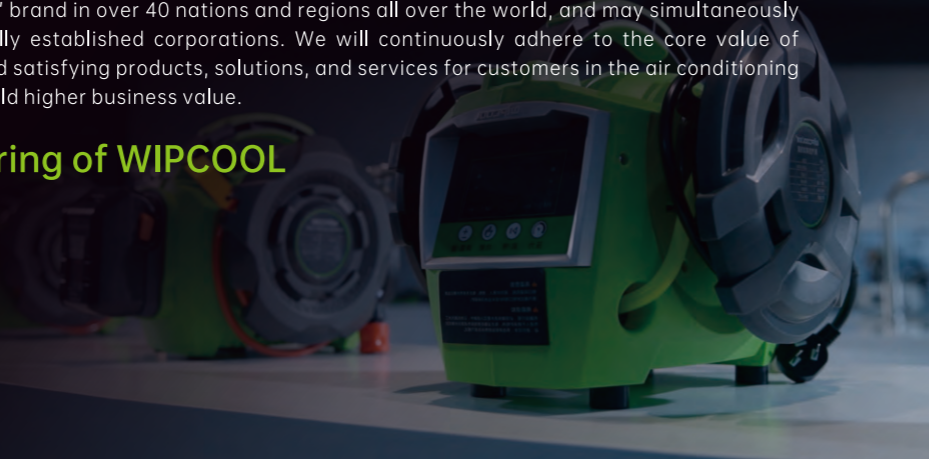


ABOUT

WIPCOOL is a national high-tech enterprise that focuses on providing customers with products in the air conditioning drainage, maintenance, and installation field with ongoing technological innovation and professional manufacturing quality. In the past ten years of development, with a sharp focus, we captured the practical needs of customers, provided instant responses to customer requirements, and founded three major business units by integrating condensate management, HVAC system maintenance, and HVAC tools&equipment with accumulate innovation technology and remarkable expertise. With the smart integration of these 3 units, WIPCOOL will provide customers with one-stop products and services of "FEELING FOR MORE" in the air conditioning service field.

By insisting on innovation and professional manufacturing, and with ten years of development, WIPCOOL has retained a good reputation and a high market share in the fields of air conditioning drainage, maintenance, and installation. We have established a product sales channel with the proprietary "WIPCOOL" brand in over 40 nations and regions all over the world, and may simultaneously offer products and services for several internationally established corporations. We will continuously adhere to the core value of "FEELING FOR MORE" to develop more professional and satisfying products, solutions, and services for customers in the air conditioning service field and extend a hand to our customers to build higher business value.

"FEELING FOR MORE"-Persevering of WIPCOOL



🕒 **2011**

Start from condensate pump
Wall mounted,Mini split,Tank pump

🕒 **2013**

Enlarge product range
Refrigeration oil charging pump

🕒 **2015**

Enlarge product range
AC cleaning machine

🕒 **2018**

Implement "WIPCOOL" Brand Improving
(Condensate pump,oil charging pump
AC cleaning machine's 2nd VERSION)

Enlarge product range
(HVAC/R tools and equipment)

🕒 **2020**

Re-program product range and divided into
3 product business units
Complete the "STAR" products in each unit.

CONDENSATE MANAGEMENT P11-22

- A, Condensate pump**
- P11 Wall-mounted condensate pump
 - P12 Split condensate pump
 - P13 Mini split condensate pump
 - P14 Corner condensate pump
 - P15 Tank condensate pump
 - P18 Supermarket condensate pump
 - P19 Condensate atomization pump



- B, Accessories**
- P21 Intelligent level controller
 - P22 Floating-ball condensate trap
 - P22 Condensate drain tubing

HVAC SYSTEM MAINTENANCE P27-38

- A/C Cleaning Machine**
- P27 High pressure cleaning machine
 - P28 Steam cleaning machine
 - P29 Integrated coil cleaning machine
 - P31 Portable coil cleaning machine
 - P32 A/C cleaning cover



- Chiller Tube Cleaner**
- P33 Portable Chiller Tube Cleaner



- Disinfecting Cleaning**
- P35 Cordless Electrostatic Sprayer

- Refrigeration Oil Charging Pump**
- P37 Manual Oil Charging Pump
 - P38 Electric Oil Charging Pump



HVAC TOOLS&EQUIPMENT P39-62

- A, Vacuum pump**
- P43 S series vacuum pump
 - P44 F series vacuum pump
 - P45 R32 vacuum pump
 - P46 Battery vacuum pump
 - P47 Dual-power vacuum pump

- B, Accessories**
- P49 Vacuum pump oil
 - P49 Tool box
 - P50 Battery converter
 - P50 Battery adapter

- C, Refrigeration tools**
- P51 Manifold gauge kits
 - P52 Single manifold gauge
 - P53 Refrigerant charging hose

- D, Tubing tools**
- P54 Tube bender
 - P55 Manual R410A flaring tool
 - P56 2 in 1 R410A flaring tool
 - P57 Tube cutter
 - P59 Tube expander kits
 - P61 Ratchet wrench
 - P61 Tube deburrer
 - P62 Pinch off locking plier
 - P62 Tube Piercing Plier

CONDENSATE MANAGEMENT-BE SAFE DRAINAGE

PIONEER SERIES

Condensate pump

A condensate pump is a specific type of pump used to pump the condensate (water) produced in a heating or cooling, refrigeration, condensing boiler furnace, or steam system.

In HVAC or refrigeration process, the water that condensate has to be drained from the system. The condensation process usually occurred when the air passes through the cold evaporator coil during the cooling process.

As a result, the moisture that accumulate on the coil then drip down into the drain pan that is placed underneath the coils.

Some systems are able to use the gravitational force to flow the water that accumulate on the drain pan. However, there are many instances when the air conditioning systems require to use a condensate pump to get the water out to prevent the water from dripping onto the floor or in the attic.

WIPCOOL condensate pump has the characteristics of high discharge head, big flow rate, low noise and remote horizontal output drainage. It is specially designed for all kinds of air conditioning system with high reliable and durable, easy to install and maintain.

• Mini Pumps

WIPCOOL has become one of the global leaders in condensate pumps. Supplied the most complete and high performance range of pumps in the worldwide.

Our mini pumps have the compact size but with maximum power. Equipped by brush-less motor, probe sensor(P18/36 even used dual-sensor) with silent and durable operation, long service life.

• Tank Pumps

WIPCOOL focus on innovation and has created a market leading range of tank pumps, designed to suit a diverse array of applications.

With reliability as the key decision criteria, the tank pumps are designed to perform even under the most challenging of applications.

• Supermarket Pumps

WIPCOOL supermarket condensate pump applied the compact design, Ideal for cold produce display cabinets in supermarkets and convenience stores. Specially suitable to handle condensate from supermarket refrigerated display cabinets, it is extremely easy to install and maintain. Built-in high level safety switch which will either enable the plant to be switched off or sound an alarm in the event of a pump failure.

Condensate trap

Typically, HVAC equipment is fitted with "U" traps that require water, within a condensate pipe to prevent gas and pest from entering or leaving the unit. But at other times, the traps dry out allowing gas or pest to escape or enter the HVAC equipment.

WIPCOOL condensate trap used ball-valve structure, different with the "U" trap can not play its role of water seal in dry season, The float responds to condensate flow. The snap-fit design is easy to disassemble, clean and maintain, it provides end user with a fresh and clean indoor air.

Intelligent level controller

Refrigeration equipment and dehumidification equipment that lack a built-in liquid level controller often cause condensate drainage failures and property damage due to condensate pipe blockage, because of the equipment cannot be cut off in the first time, and the equipment continues to produce the condensate, then it make the ceiling, furniture soaked.

WIPCOOL intelligent level controller has a built-in smart chip to avoid property damage which caused by drainage failures. It can fully use of the built-in safety switch of WIPCOOL condensate pump, to cut off the power supply of the refrigeration equipment automatically. The appearance is exquisite, the wiring is simple, it is the best companion of the drainage pump.



HOW TO CHOOSE A PROPER CONDENSATE PUMP

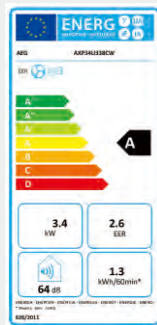
Identifying air-conditioning unit type

As there are varieties of pump models available for different unit types such as split, ducted, floor mounted, cassettes, etc., it is very important to identify the type of cooling system while choosing the suitable condensate pump.



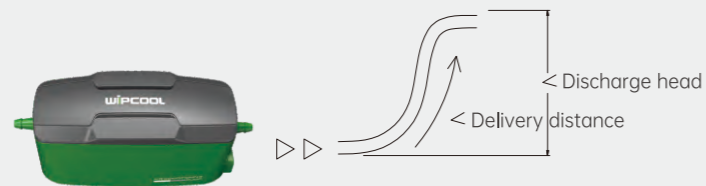
Cooling capacity of the air-conditioner

The AC cooling capacity (often represented in kWh and can be found in your AC specifications) is needed to estimate the amount of condensate discharged per hour (1kWh cooling load will generate about 0.4-0.8L/h). ACs with larger cooling capacities tend to generate more condensate than regular ones.



The discharge head

Figure out the lift requirement for the pump by identifying where the pump will be mounted and where the discharge point will be. Condensate flow will decrease in accordance with the height it must travel until maximum, or "shut-off" lift is reached. Select a pump with a maximum lift rating that is suitable for your application.



Climate

Along with cooling capacity, location and climate also play a big role in measuring the amount of condensate. The discharge quantity can differ significantly between dry and humid climates. For example, the quantity of condensate in humid climates can double that of dry climates. Therefore, you need a higher performance pump for humid climatic conditions.

WIPCOOL CONDENSATE PUMP'S SELECTION

Model	Max. unit output	Applicable A/C	Applicable place	Discharge head (Max)
P18	30,000Btu/h	Split unit, Floor mounted unit	Smaller commercial and domestic units in quiet environments	10m
P36	45,000Bth/h			
P16	30,000Btu/h	Ducted units; Floor standing & Chassis units; High wall split systems		
P32	45,000Bth/h			
P12	30,000Bth/h			
P12C	30,000Bth/h	High wall split systems		
P180	300,000Bth/h	Floor mounted unit; Dehumidifiers; Ice makers; Air handling units (AHUs)	Large commercial units	4.5m
P380	500,000Bth/h			6.8m
P580	500,000Bth/h			12m
P120S	300,000Bth/h	Single and multiple refrigeration units; Cold store cabinets	Cold stores, Supermarkets	30m
P360S	500,000Bth/h			36m

Cooling capacity conversion
 1Btu/h=0.2931W, 1W=3.412Btu/h
 1USRT=3.517kW, 1kW=0.28434USRT

Wall-Mounted Condensate Pump P18 P36

Dual Guarantee, High Security

- High performance brushless motor, strong power
- Level gauge installed, ensure the accurate installation
- Dual-control system, improve durability
- Built-in LED provide visual operating feedback



Instructions



Features



Dual-control system(probe&float)



Buzzer fault alarm

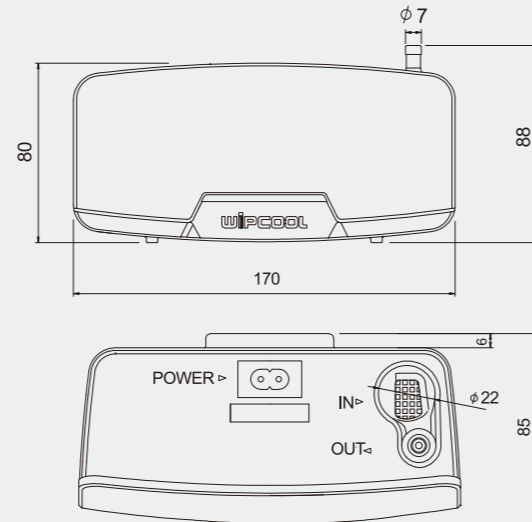


Led running light



Easy access to installment

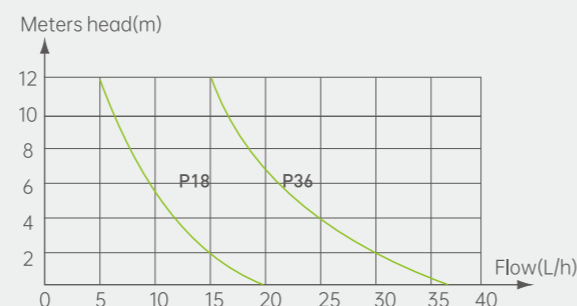
Dimensions



Technical Data :

Model	P18	P36
Voltage	100V-230V~/50-60Hz	
Discharge Head(Max.)	10m(33ft)	
Flow Rate(Max.)	18L/h(4.8GPH)	36L/h(9.6GPH)
Tank Capacity	150ml	
Mini Splits up to	30,000btu/hr	45,000btu/hr
Sound Level at 1m	19dB(A)	21dB(A)
Ambient Temp.	0°C~50°C	

Flow Rate



Mini Condensate Pump P16 P32

Silent Running, Reliable and Durable

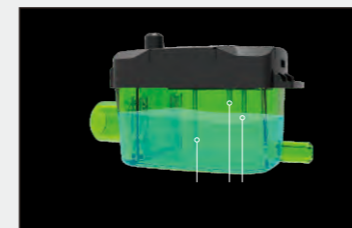
- Super quiet design, Unequaled operating sound level
- Built-in safty switch, improve reliability
- Exquisite&compact design, Suitable for different spaces
- Built-in LEDs provide visual operating feedback



Instructions



Features



3 level sensor technology



Split structure, flexible installation

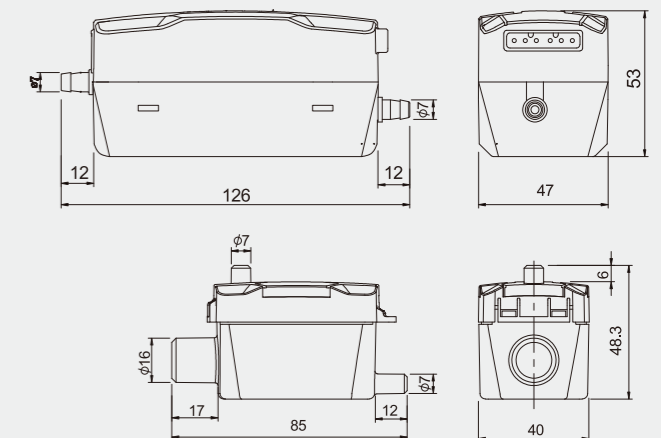


Led running light



Built-in safty switch

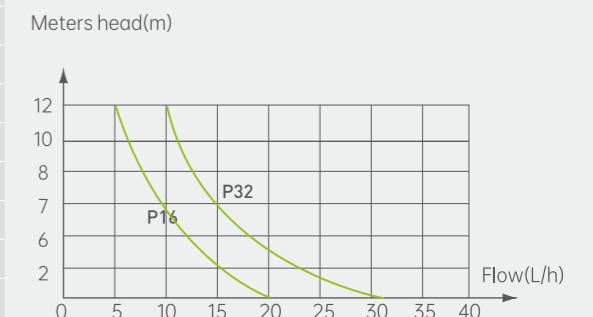
Dimensions



Technical Data :

Model	P16	P32
Voltage	100V-230V~/50-60Hz	
Suction lift(Max.)	2m(6.5ft)	
Discharge Head(Max.)	10m(33ft)	
Flow Rate(Max.)	16L/h(4.2GPH)	32L/h(8.5GPH)
Tank Capacity	35ml	
Mini Splits up to	30,000btu/hr	45,000btu/hr
Sound Level at 1m	19dB(A)	21dB(A)
Ambient Temp.	0°C~50°C	

Flow Rate



Mini Condensate Pump

P12

**Compact and Flexible,
Silent and Durable**

- Compact ,flexible installation
- Quick- connect , convenient maintenance
- Unique motor balance technology, reduce vibration
- High quality denoise design, better user experience

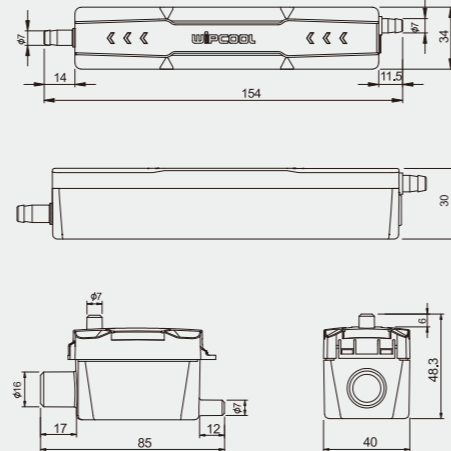
Instructions



Can be installed inside of A/C



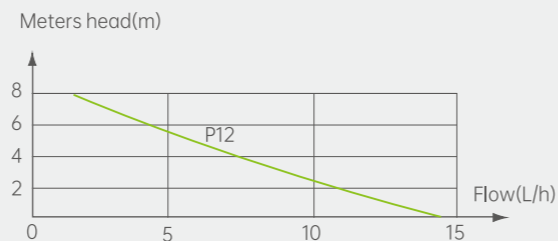
Dimensions



Technical Data :

Model	P12
Voltage	100V-230V~/ 50-60Hz
Suction Lift(Max.)	2m(6.5ft)
Discharge Head(Max.)	7m(23ft)
Flow Rate(Max.)	12L/h(3.2GPH)
Tank Capacity	35 ml
Mini Splits up to	30,000btu/hr
Sound Level at 1m	19dB(A)
Ambient Temp.	0°C~50°C

Flow Rate



Corner Condensate Pump

P12C

**Reliable and Durable
Silence Running**

- Integral design, compact
- Connect the socket quickly, easy maintenance
- Easy installation
- Quiet and no vibration

Instructions



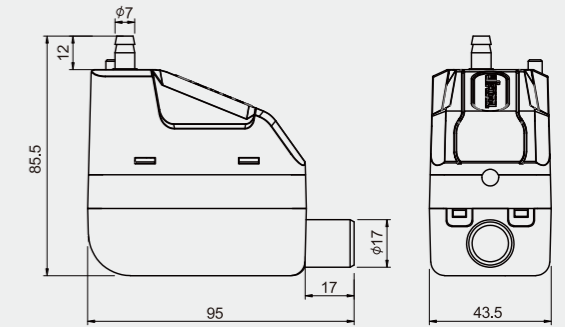
Can be installed on right side



Can be installed on left side



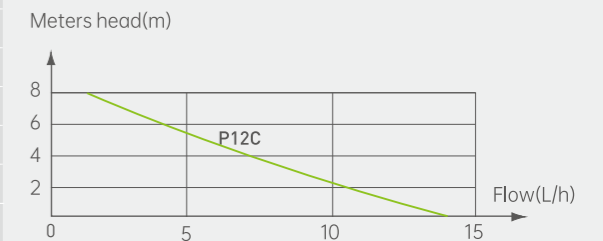
Dimensions



Technical Data :

Model	P12C
Voltage	100V-230V~/ 50-60Hz
Discharge Head(Max.)	7m(23ft)
Flow Rate(Max.)	12L/h(3.2GPH)
Tank Capacity	45 ml
Mini Splits up to	30,000btu/hr
Sound Level at 1m	19dB(A)
Ambient Temp.	0°C~50°C

Flow Rate



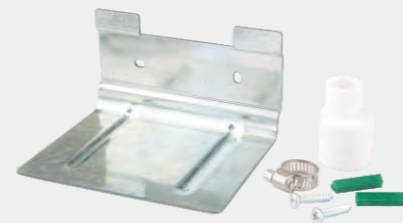
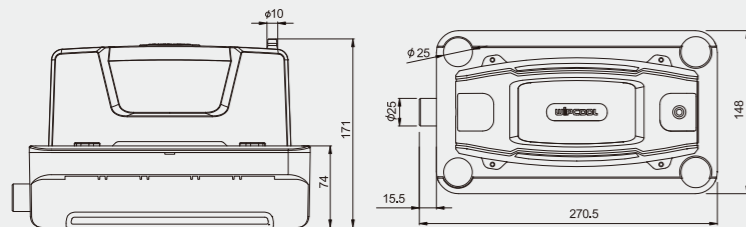
Tank Condensate Pump P180

Reliable Operation
Simple Maintenance

- Floatless structure, free maintenance for long time work
- Automatic reset thermal protection, longer service life
- Forced air cooling, ensure stable running
- Anti-backflow design, improve the safety



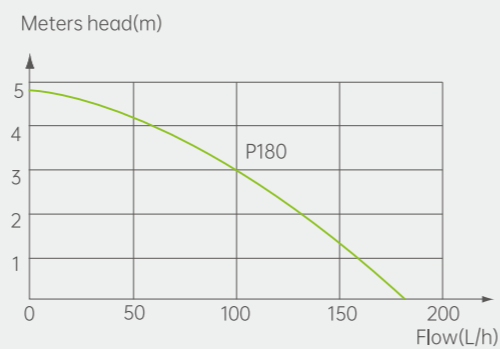
Dimensions



Instructions



Flow Rate



Technical Data :

Model	P180	Tank Capacity	1.8 L
Voltage	230V~/50-60Hz or 100-120V~/50-60Hz	Sound Level at 1m	48dB(A)
Discharge Head(Max.)	4.5m(15ft)	Ambient Temp.	0°C~50°C
Flow Rate(Max.)	180L/h(48GPH)	Power Consumption	60W

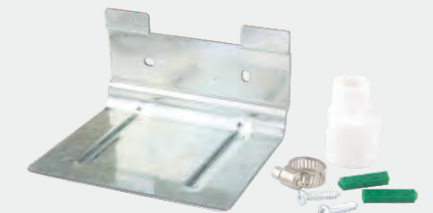
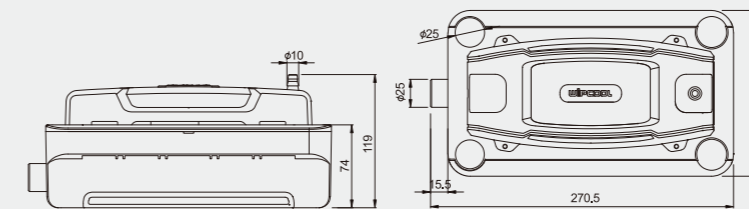
Tank Condensate Pump P380

Higher Discharge Head
Convenient Installation

- Buckle type fixed structure, easy installation
- 5 inlets for optional, easy to use
- Buzzer fault alarm, improve the safety
- Low profile for limited spaces



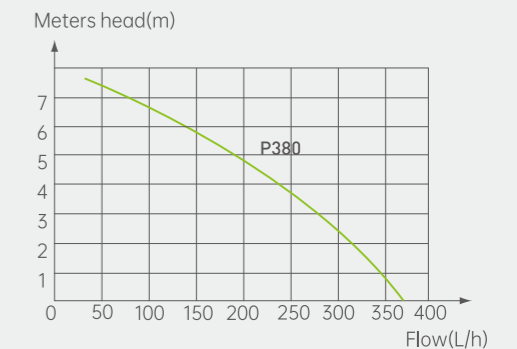
Dimensions



Instructions



Flow Rate



Technical Data :

Model	P380	Tank Capacity	1.8L
Voltage	100V-230V~/50-60Hz	Sound Level at 1m	28dB(A)
Discharge Head(Max.)	6.8m(22ft)	Ambient Temp.	0°C~50°C
Flow Rate(Max.)	380L/h(100GPH)	Power Consumption	20W

Tank Condensate Pump

Ultra-high Lift, Super Big Flow

- Super performance(12M lift,580L/h flowrate)
- Forced air cooling , ensure stable running
- Anti-backflow design, improve the safety
- Float-less structure, free maintenance for long time work



P580

Supermarket Condensate Pump

Special Desgin, Simple Installation

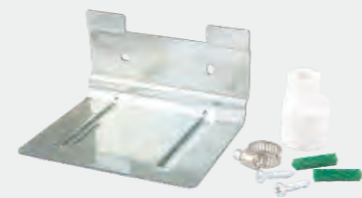
- Made of stainless steel case with 3L large reservoir
- Ideal for cold produce display cabinets in supermarkets and convenience stores
- Low profile (69mm height) for extremely easy to install and maintain.
- Built of heat resistant material, suitable for handling 70°C high temperature water



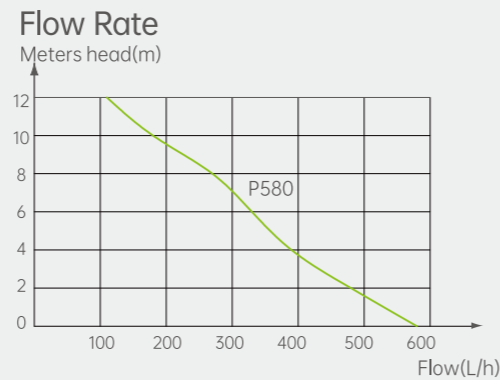
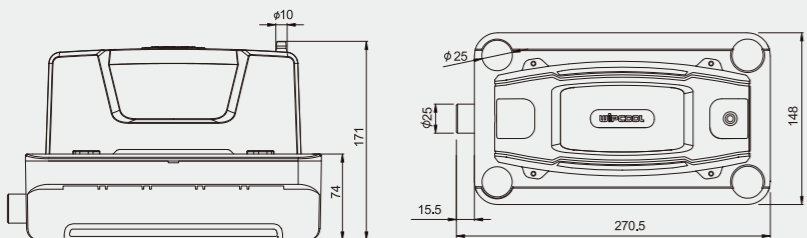
P120S

Condensate Pump

Instructions



Dimensions



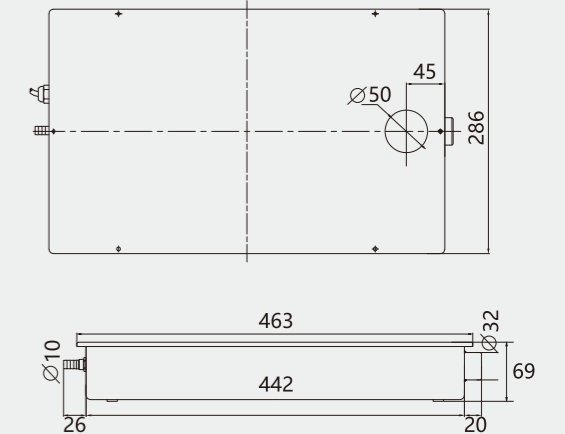
Technical Data :

Model	P580	Tank Capacity	1.8 L
Voltage	230V~/50-60Hz or 100-120V~/50-60Hz	Sound Level at 1m	60dB(A)
Discharge Head(Max.)	12m(40ft)	Ambient Temp.	0°C~50°C
Flow Rate(Max.)	580L/h(153GPH)	Power Consumption	85W

Instructions



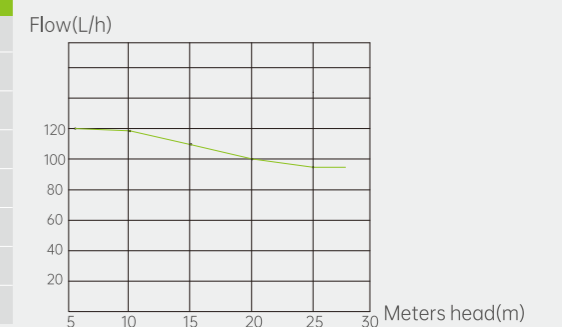
Dimensions



Technical Data :

Model	P120S
Voltage	230V~/50-60Hz or 100-120V~/50-60Hz
Discharge Head(Max.)	30m(98ft)
Flow Rate(Max.)	120L/h(32GPH)
Tank Capacity	3L
Sound Level at 1m	40~62dB(A)
Water Temp.	Max 75°C
Power	30W

Flow Rate



Supermarket Condensate Pump P360S

Lightweight Design, Reliable & Durable

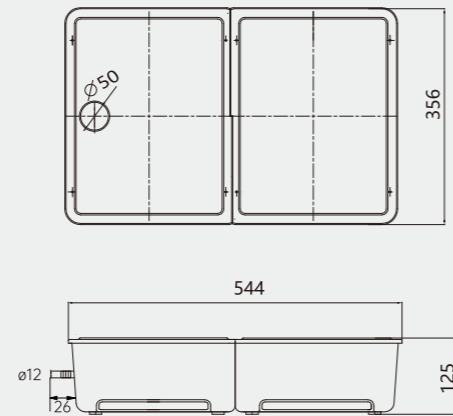
- Made of robust plastic, effectively pumps away defrost water and filters debris.
- Ideal for cold produce display cabinets in supermarkets and convenience stores
- Built-in high level safety switch which will either enable the plant to be switched off or sound an alarm in the event of a pump failure.



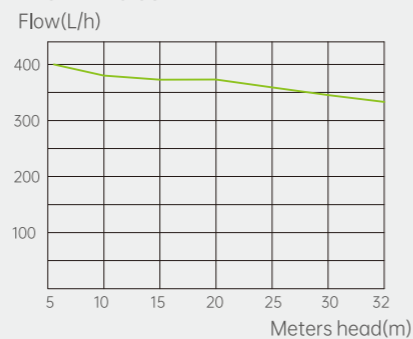
Instructions



Dimensions



Flow Rate



Technical Data :

Model	P360S
Voltage	230V~/50-60Hz or 100-120V~/50-60Hz
Discharge Head(Max.)	36m(118ft)
Flow Rate(Max.)	360L/h(95GPH)
Tank Capacity	11L
Sound Level at 1m	60dB(A)
Water Temp.	0-40°C
Power	80W

Condensate Atomization Pump P15J

Create Wealth From Waste Energy Saving & CO2 Emission

- Stop condensate water's dripping and free of condensate pipe's installation
- Increased the heat rejection by water evaporation absorbs a lot of heat
- Enhanced refrigeration effect of the system obviously, saving the energy



Integrated usage



Interchangeable



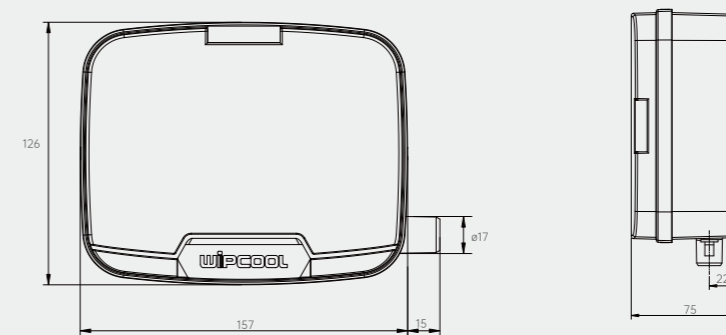
Split usage



Instructions



Dimensions



Technical Data :

Model:	P15J	Tank Capacity:	35ml
Voltage:	230V~/50-60Hz 100-120V~/50-60Hz	Mini Splits up to:	30,000btu/hr
Flow Rate(Max.):	15L/h(2 nozzles)	Sound Level at 1m:	55dB(A)
Pressure:	7bar	Power:	35W
Suction lift(Max.):	1.5m(5ft)	Ambient Temp:	0°C-50°C

Intelligent Level Controller Intelligent, Security

- Built in indicator - provide visual operating feedback
- Sensitive control - cut off power supply automatically in case of drainage failure
- Easy to install - Suitable for all WIPCOOL condensate pumps which have built-in safety switch



PLC-1

Instructions



Normal drainage status

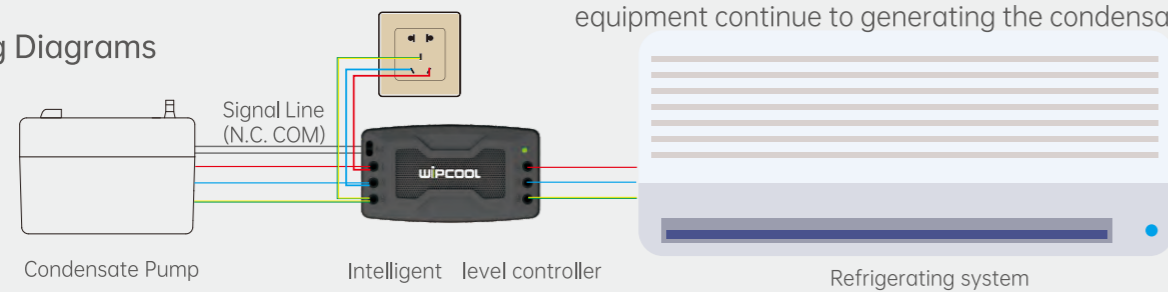
All devices are working normally



Failure drainage status

Output was cut off when water reaches alarm level to trigger safety switch, To prevent refrigeration equipment continue to generating the condensate water

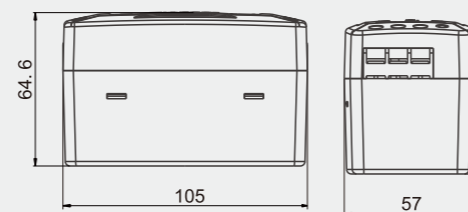
Wiring Diagrams



Technical Data :

Model	PLC-1
Power of applicable equipment (Max.)	3000W
Max Carry Current	16A

Dimensions

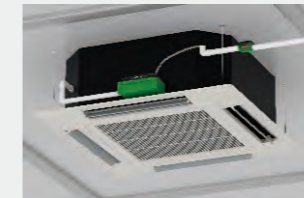


Floating-ball Condensate Trap Smooth drainage, Enjoy fresh air

- Lightweight design, easy to install
- Anti blockage, prevent smelly & insect-resistant
- Controlled by floating ball valve, Suitable for all seasons
- No need to inject water when it is dry
- Buckle design, easy to maintain and clean

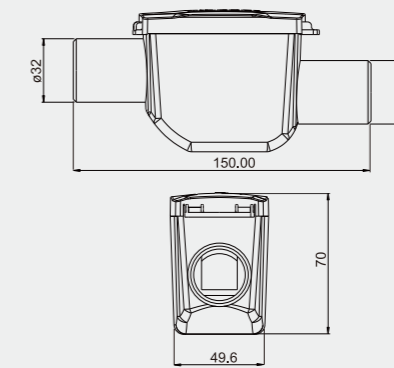


Installed in drainage pipe



Used with condensate pump

Dimensions



Technical Data :

Model	PT-25
Inner diameter	ø25
Outer diameter	ø32
Negative pressure	1200Pa
Gross weight	115g

Condensate Drain Tubing

Flexible, durable and non toxic



DT-1
PVC tubing



DT-2
PVC tubing



DT-3
Insulation tubing

Technical Data :

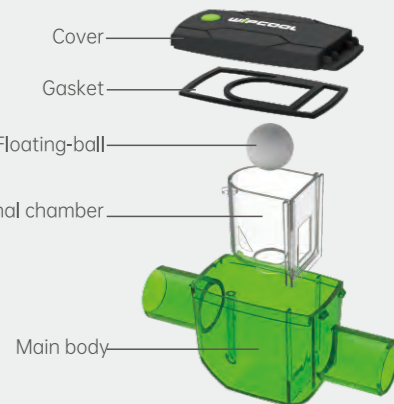
Model	DT-1	DT-2	DT-3
Material	PVC	PVC	PVC+PE
Size	ø6mm x ø9mm	ø8mm x ø12mm	ø6mm x ø9mm
Length	100m	100m	50m

PT-25



Anti-dew device

Exploded figure



Main body

DT-1/2/3



HVAC SYSTEM MAINTENANCE-BE EFFICIENT MAINTAIN COMPACT SERIES

●Coil Cleaning Machine

Dirty Evaporator Coils:

UP TO
40%
Reduced Cooling
Capacity

UP TO
35%
Dropped Energy
Efficiency

Dirty Condenser Coils:

UP TO
40%
Reduced Cooling
Capacity

UP TO
60%
Dropped Energy
Efficiency

Condenser and evaporator coils are an integral part to HVAC systems.

The below 3 aspects will depend on having clean coils.

1,Maximum heat transfer is dependent on having clean coils!

In addition to energy consumption, other by products impact your coils. Acid formation can occur under these conditions, leading to lubricant breakdown and ultimately equipment failure. Cooling air passing through the coils contains dust, dirt, pollen, moisture and other contaminants clogging the coils promoting the growth of organisms and thereby generating odors throughout an occupied space.

2,System longevity is dependent on having clean coils!

In addition, the evaporator coil and its condensate pan can become fouled with pollen, mold spores and other bio contaminants and can have an adverse effect on indoor air quality. With all the moisture around the evaporator coil, it can become a breeding ground for bacteria and mold.

3,Indoor air quality is dependent on having clean coils!

Clean coils the right way. While any attempt to clean coils on a consistent basis can be applauded, there are right ways and wrong ways of cleaning. Cleaning the wrong way can actually do more harm than good.

Different with pump sprays (low pressure and flow and not very effective in penetrating most coils beds) and pressure washers (uses pressure that's too high and damages fins), WIPCOOL can supply you a full range of cleaning machines which have balanced pressure and water volume that's safe on coils, pressure range from 2BAR (30PSI) to 40 BAR (580PSI), provide you with AC power and Lithium battery power. And supply you with cool water, hot water and steam cleaning mode, to meet the cleaning needs of different occasions.

ROBUST SERIES

●Oil Charing Pump

Where the refrigerant is essential for the cooling properties of a refrigeration system, the refrigeration oil is crucial for the correct functioning of the compressor. It mainly plays four roles: lubrication, sealing, cooling and energy regulation.

1,Lubrication

Lubricants for refrigeration compressors reduce friction and prevent wear, so as to extend the service life of the compressor.

2,Sealing

The refrigeration oil plays a sealing role in the compressor, which makes the piston and cylinder face in the compressor and the rotating bearings achieve the sealing effect, so as to prevent the refrigerant leakage.

3,Cooling

The refrigeration oil can take away the heat generated in the working process and keep the moving parts of the compressor at a lower temperature, so as to improve the efficiency and reliability of the compressor.

4,Energy regulation

For the compressor with energy regulating mechanism, the oil pressure of refrigeration oil can be used as the power of energy regulating mechanism.

So the correct use and timely replacement of refrigerate oil will have a great impact on the service life and refrigeration effect of the compressor.

The WPCOOL "Robust series" oil charging pump is developed for widely types of refrigeration compressor, represented by the electric oil charging pump series, which solves the charging problem of large flow under large back pressure, saves labor and improves efficiency. At the same time, Considering the high viscosity of refrigeration oil in winter, We firstly developed an unlimited electric charging series for all kinds refrigeration oil in Worldwide.



HOW TO CHOOSE A PROPER CLEANING MACHINE

Make the regular cleaning with cleaning equipment, especially for condenser and evaporator, is one of the fastest and safest ways to ensure that the equipment operates with the highest efficiency and keep the indoor air healthy and clean. The following 2 points should be considered when choosing a cleaning machine

1, Pressure

As the different equipment need the different pressure to clean, such as domestic split A/C, Central A/C, Commercial & Industrial Central A/C.

As a general rule, the cleaning of domestic unit is relatively simple, the cleaning pressure for outdoor unit should be a little higher than indoor unit, so you can choose Dual-pressure cleaning machine(3-10bar).

The cleaning of commercial equipment is more complicated. Cleaning pressure for indoor unit just need about 10bar(140PSI), But when you clean the outdoor unit, the thick coils is hard to effective cleaning, because you should adjust the pressure according the different thickness of outdoor coils, so a cleaning machine with variable pressure is necessary. You should choose a Adjustable high pressure cleaning machine.

2, Working place

Considering that some outdoor unit installed on rooftop without power socket. It is hard to find the AC power source. As the energy density of lithium batteries has come a long way in the past few decades with the progress of technology, and working time is also getting longer and longer, so a portable, cordless cleaning machine is necessary.

WIPCOOL CLEANING MACHINE'S SELECTION

Model	Pressure	Type	Power
C10	5/10bar	Indoor-outdoor unit(Domestic), Indoor unit(commercial)	AC Power
C10B	5/10bar	Indoor-outdoor unit(Domestic), Indoor unit(commercial)	Li-ion battery
C10BW	5/10bar	Indoor-outdoor unit(Domestic), Indoor unit(commercial)	Li-ion battery
C30S	6bar(Steam)	Indoor unit	AC Power
C40T	10-40bar	Indoor-outdoor unit (Domestic, Commercial)	AC Power

HOW TO CHOOSE A PROPER OIL CHARGING PUMP

Following points should be considered when you choose a refrigeration oil charging pump

1, System's back pressure

When the system is under back pressure, the greater of back pressure that the oil pump can overcome, the more time and effort will be saved when charging. Therefore, the maximum back pressure that can be overcome must be considered when selecting an oil charging pump.

2, Flowrate

The flow rate of a oil charging pump is usually expressed in liters/hour, so the time to charge is directly related to the flow rate. Therefore, it is necessary to select a suitable pump according to the amount of oil marked on the compressor and how many units need to charge.

3, Viscosity

Viscosity is a main performance index of refrigeration oil. Different refrigerants have different requirements for viscosity. At the same time, the viscosity of the refrigerating oil changes greatly with the temperature. The lower the temperature, the greater the viscosity. Therefore, the characteristics of the added refrigeration oil and the ambient temperature must be fully considered when selecting the oil charging pump.

WIPCOOL OIL CHARGING PUMP'S SELECTION

Model	Max overcome pressure	Flowrate	Viscosity
R1	10bar(145psi)	50ml/stoke	68
R2	15bar(218psi)	75ml/stoke	68
R4	16bar(232psi)	150L/h	100
R6	25bar(362psi)	350L/h	100

Remarks: If it is a new unit or an overhauled unit, the oil filling amount is indicated on the unit nameplate. If it is just change oil, follow the principle of charging as much as it is released.

Model	xxxxxxxx		
Cooling capacity	454kW	Voltage	3PHASE,380V,50Hz
Power Input	84.9kW	Running current	154A
Power factor	87%	Comp output	2X45kW
Refrigerant	R134a /140kg	Design press(Hi/Lo)	H1.59,L0.87Mpa
Ref oil	FVC68D/22L	Air tight test press(Hi/Lo)	H1.59,L0.87Mpa
MFG No.	XXXX	Unit weight	3650kg
Production license No.	XXXXXXXXXX		

← UNIT LABEL

REFRIGERATION OIL'S SELECTION (For reference only)

Viscosity	Domestic air conditioning unit (Compressor)		Commercial central air conditioning, industrial refrigeration equipment(Compressor)			
	Piston	Rotary	Centrifugal	Piston	Screw	Scroll
32	√	√	√	√		
46	√	√	√	√		
68		√	√	√	√	√
100			√		√	√

Adjustable High Pressure Cleaning Machine

Variable pressure, Professional Cleaning

- **Self-intake function**
pump water from buckets or storage tanks
- **Quick connection**
All accessories are easy to install and disassemble
- **Integrated storage**
All accessories are stored orderly to avoid omission
- **Overhead pressure gauge**
Easy to read the exact pressure.
- **Pressure adjust knob**
Adjust pressure to meet different cleaning requirements
- **Ceramic-coated pistons**
Long service life , sturdy and reliable



C40T



Overhead pressure gauge Pressure adjust knob Ceramic-coated pistons



Technical Data :

Model	C40T
Voltage	230V~/50-60Hz or 100-120V/50-60Hz
Working Pressure	10-40bar
Flow Rate(Max.)	6L/min
Motor Power	750W
Weight	8.0kg
Water Pipe	2m inlet hose, 7m outlet Hose

Steam Cleaning Machine

Strong Steam, Ultimate Clean

C30S

- Hot steam with high pressure, Pure physical sterilization
- 5 Cleaning modes selection to meet the different cleaning requirements
- Humanized configuration with LCD touch display and voice reminder
- Remote control Intelligent spray gun, convenient operation with high efficient
- Drum pump body structure, freely and quickly storage inlet and outlet pipes
- Ozone disinfection, safe and efficient sterilization



LCD touch pad



Intelligent remote control spray gun



90° bent spray nozzle(35cm)



Nylon brush



Long steam nozzle(10cm)



220° rotational spray nozzle(26cm)

Technical Data :

	C30S	
Model	C30S	
Voltage	230V~/50-60Hz	100-120V~/50-60Hz
Power(Max.)	3300W	2000W
Flow Rate(Max.)	3L/min	3L/min
Working Pressure(Max.)	3~6bar	3~6bar
Suction Lift(Max.)	1.5m	1.5m
Steam Temp.	130~150°C	120~130°C
Water Outlet Temp.(Max.)	60~85°C	50~75°C
Water Pipe	2m Inlet hose,4m Outlet hose	2m Inlet hose,4m Outlet hose



C10BW

Integrated coil cleaning machine

Integrated Solution
Mobile Cleaning



C10BW



Integrated coil cleaning machine
Integrated Solution
Mobile Cleaning

The integrated coil cleaning machine C10BW is ideal for cleaning in locations where water and power may be inaccessible.

It is powered by AC power or 18V lithium battery, and has 6 battery adapters(optional) for your choice, you can use your own batteries if your battery compatible any one in these 6 adapters.

In addition, this machine give you a full integrated coil cleaning solution. A 18L clean water tank with a 2L chemical tank. And trolley case design bring with a excellent mobility. A optional back strap can completely liberate your both hands to carry the cleaning machine and climb the ladder to a specific jobsite (such as attic, roof, etc).So it can be used for just about any coil cleaning application.

Different from the traditional high pressure cleaning machine and low pressure sprayer. The machine is special design and safety for HVAC coils, provide two cleaning pressure. It can be selected between 5bar/10bar according the different cleaning occasions, give you the cleanest coils you ever had!



Cleaning Machine

- 1 Excellent mobility**
Equipped with wheels and push handle
 - 2 Integrated Solution**
18L clean water tank with 2L chemical tank
 - 3 2 Power for choice**
AC powered
Battery converter(Optional)
 - 4 Excellent mobility**
Also available with a back strap for ultimate portability.
- 18V Li-ion powered Battery Adapters(Optional)**
6 Adapters for choice
Perfect fit for 6 brands of batteries
- Bosch, Makita, Panasonic, Milwaukee, DeWalt, Worx



Accessories :



Technical Data :

Voltage	18V(AEG/RIDGID interface)	Water Tank	18L
Pressure	5/10 bar(Dual)	Chemical tank	2L
Flow Rate(Max.)	4L/min	Outlet hose	5m
Reference running time	50-120mins(4.0AhLi-ion battery)	Dimensions	412*282*568
Reference charging time	210mins(4.0AhLi-ion battery)	Weight(dry)	6.6kg(w/o battery)
Remarks	Due to the strict transportation terms, we can not include any Li-ion battery, you can choose our battery adapters for use your local batteries		

Portable Coil Cleaning Machine C10/C10B

Dual Pressure Cleaning Professional & Efficient

- Reel structure, free to release and retract the inlet and outlet hose
- Two pressure optional, meet the different cleaning requirement
- Built-in pressure controller, suspend automatically
- Medium pressure cleaning is safe for coils to avoid damage



Battery converter(Optional)
BC-18 see P50



Battery adapter(Optional)

For details, see P50
6 Adapters for choice, Perfect fit for 6 brands of batteries
(Adapter is available separately)

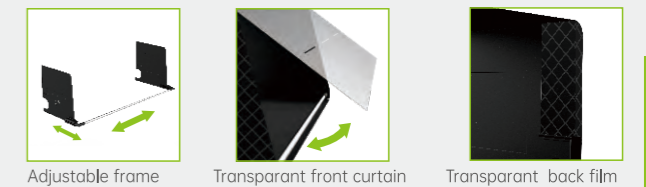


Technical Data :		
Model	C10	C10B
Voltage	230V~/50-60Hz or 100-120V~/50-60Hz	18V(AEG/RIDGID interface)
Working Pressure	5/10 bar(Dual)	5/10 bar(Dual)
Flow Rate (Max.)	4L/min	4L/min
Motor Power	80W	80W
Weight	3.7kg	3.7kg(w/o battery)
Inlet hose	2.5m	2.5m
Outlet hose	5.0m	5.0m
Reference running time(C10B)		50-120mins (4.0Ah Li-ion battery)
Reference charging time(C10B)		210mins(4.0Ah Li-ion battery)
Remarks	For C10B, Due to the strict transportation terms, we can not include any Li-ion battery, you can choose our battery adapters for use your local batteries	

Split A/C Cleaning Cover CSC-1

Full Protection, Easy Installation

- Made of artificial PU grade waterproof sealing strip with tight stitches
- Soft, sturdy, waterproof, corrosion resistant and durable
- The adjustable frame can change the length and suit for different split air conditioners
- Transparent front curtain can see coils' cleanliness clearly and prevents splashing
- 4 small back transparent films in the back of the A/C prevents walls from splashing



Technical Data :

Model	Size(mm)
CSC-1	H:280*W:280*L700-1000(adjustable)

Ceiling A/C Cleaning Cover CSC-2

- Widened collection surface, fully catch the waste water during cleaning
- Integrated connection design, make the assemble and disassemble easily
- Whole piece of waterproof fabric cloth to avoid any water leakage
- Come with a stretched suspension plate, free to adjust cover height easily



Technical Data:

Model	Size	Outlet hose
CSC-2	125cm	3m



CT370

Chiller Tube Cleaner
Compact Size
Portable&Durable



Chiller Tube Cleaner
Compact design
Portable&Durable

CT370 is a professional tool for Chiller tube cleaning, featured with rugged and dependable. Special for HVAC maintenance technicians and contractors.

This compact tube cleaner kit includes everything you need for better tube cleaning, plus all the innovative features you expect. Integrated flush, self priming function, 860 RPM shaft rotation, quick connect shaft and brushes and all at half the size of our traditional tube cleaners.

The wheels and telescopic handle make it easy to transport between locations. An integrated storage compartment provides a handy location to keep all your accessories together in between uses, so they're always to hand when you need them, Bring you the ultimate experience in portability.

- 1 Patented Tech**
Quick-connect structure make the brushes changes quickly and easily
- 2 Excellent mobility**
Equiped with wheels and push handle
- 3 Integrated storage**
A full set of brushes be stored in main body.
- 4 Self-priming Function**
Pump water from buckets or storage tanks.
- 5 Reliable&Durable**
Forced air cooling,keep the long time of stable operation

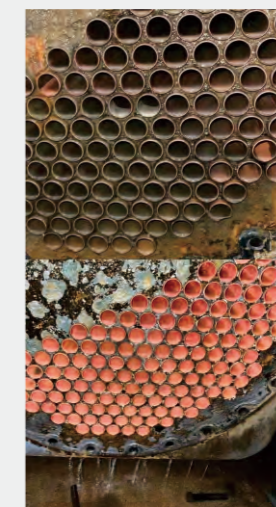
Technical Data :

Model	CT370
Voltage	230V~/50-60Hz 100-120V~/50-60Hz
Input Power	370W
Shaft Speed	860r/min
Shaft Length	7.6m
Cord Length	4m
Shaft Size	12mm
Brushes	18pcs(2boxes) (1/2", 9/16", 5/8", 11/16", 3/4", 13/16", 7/8", 15/16", 1")*2
Brushes Size	1/2"-1"
Weight	24kg
Dimensions	465*275*528mm
Remarks	6mm Flexible shaft(7.6m) which cover the brush sizes from (1/4", 5/16", 3/8", 7/16") can be ordered separately.

CT370



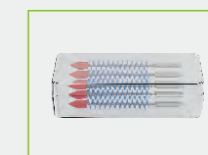
Chiller Tube Cleaning



Before

After

Accessories :



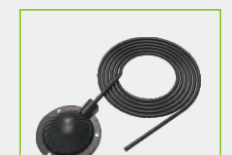
Brushes



2 m inlet hose



Flexible shaft



Foot switch



ES140

Cordless Electrostatic Backpack Sprayer
Professional
Fast&Efficient



Cordless Electrostatic Backpack Sprayer
Professional
Fast&Efficient

The ES140 electrostatic cordless sprayer is the choice of cleaning professionals for disinfecting and sanitizing large areas quickly and efficiently. The 16L backpack sprayer holds enough disinfectant to cover up to 2,000 square meter on a single tank, while giving you up to 4 hour of spraying on a single battery(4.0Ah) charge.

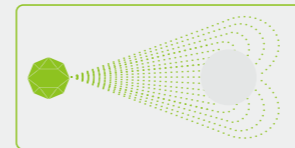
The product is based on a simple physical principle: same electric charges repel each other, opposite electric charges attract each other. Through the built-in electrostatic generator, each sprayed particle is positively charged. Because the positively charged particles repel each other, so the coverage is wider and the effect of spraying on the object surface is more uniform.

In addition, since most objects have negative or neutral electric charges on their surfaces, They will attract these positive electric charges, create a mutual adsorption effect, and so it is can easily cover the backs of hard-to-reach objects, completing the job efficiently and quickly.

It can be used across a range of industries, from air travel, hospitals, hotel to schools,restaurants, and etc.

1 Electrostatic charge generator

Providing a thin, even spray pattern on all surfaces



Electrostatic cordless sprayer



Normal Sprayer

2 16L tank

Allowing you to coat up to 2000 sq. m in one tank

3 18V Li-ion powered

Cordless convenience allows for effortless movement room to room



Bosch Makita Panasonic Milwaukee DeWalt Worx

Battery adapter(Optional)

For details, see P50.

6 Adapters for choice, Perfect fit for 6 brands of batteries (Adapter is available separately)

ES140



Disinfecting Cleaning

Technical Data :

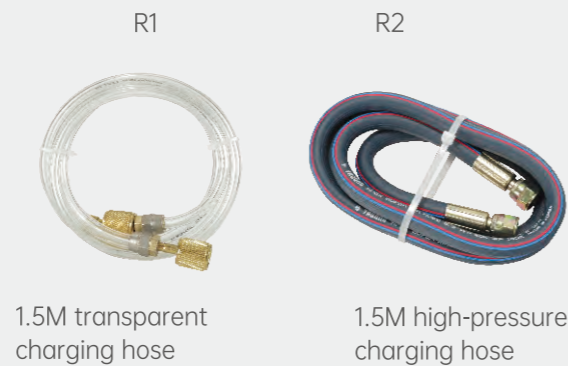
Model	ES140	Reference Running time	150mins(2.0Ah)
Voltage	18V(AEG/RIDGID interface]		260mins(4.0Ah)
Optimum Spray Distance	0.8-2m	Reference Charging time	120mins(2.0Ah)
Tank Capacity	16L		240mins(4.0Ah)
Nozzle Spray Sizes	140 micron		
Flow Rate(Max.)	500ml/min		
Remarks	Due to the strict transportation terms, we can not include any Li-ion battery, you can choose our battery adapters for use your local batteries		

Manual Refrigeration Oil Charging Pump

Pressurized Charging Reliable And Durable

R1 R2

- Compatible with all refrigeration oil types
- Applied stainless steel materials, reliable and durable
- Pumps oil into the system without shutting down for charging
- Anti-backflow structure, ensure system safety during charging
- Special design, ensure to connect the different size of oil bottles



1.5M transparent charging hose

1.5M high-pressure charging hose

Electric Refrigeration Oil Charging Pump

Strong Power Easy Charging

R4 R6

- Strong power, easy charging under large back pressure
- Patent mechanism, ensure easy charging under low temperature
- Configured of pressure relief protection, ensure safety operation
- Built-in thermal protection device, effectively prevent overloading



Technical Data :

Model	R1	R2
Max. Pump To Against Pressure	10bar (145psi)	15bar (218psi)
Max. Pump Rate Per Stroke	50ml	75ml
Applicable Oil Bottle Size	All sizes	
Hose Connect	1/4" SAE	1/4" & 3/8" SAE
Outlet hose	1.5m Charging Hose	1.5m HP Charging Hose
Packing	Blister	Carton

Technical Data :

Model	R4	R6
Voltage	230V~/50-60Hz or 100-120V~/50-60Hz	
Motor Power	1/3HP	3/4HP
Pump to Against Pressure(Max.)	16bar (232psi)	25bar (362psi)
Flow Rate(Max.)	150L/h	350L/h
Hose Connect	1/4" & 3/8" SAE	

HVAC/R TOOLS&EQUIPMENT-BE EASY TO USE

Due to years of deep technical accumulation of refrigeration tools&equipment and unceasing exploration of high technologies, and the initial intention of " helping users to complete air-conditioning service work efficient, WIPCOOL has launched highly differentiation product.

F&S SERIES

● Vacuum Pump

In a refrigerant system, only the refrigerant and oil should be circulating. During servicing or after many years of operation, the air may enter the system. The air from the atmosphere that enters the system include oxygen, nitrogen and moisture. These unwanted components will cause:

Rise in head pressure causing higher discharge temperatures and compression ratios. Efficiency of the system is reduced. Acids are produced in the refrigerant causing chemical reaction resulting in electroplating and damage to the motor insulation. Once the insulation in the compressor motor breaks down, short circuit will happen hence damaging the compressor. The compressor is one of the highest equipment cost in the system. Acids also cause corrosion to the metal parts over time. Sludge is formed by a combination of oil, acid and moisture in the system. It will cause improper operation to the filter drier, strainers and expansion device over a period of time.

WIPCOOL vacuum pump applied the patented technology and reduce the risk of oil leakage when pump was side down during the operation. Integrated cylinder structure, Lightweight design, Easy to carry.

S series vacuum pump applied concise design with high-cost performance, equipped with PA12 high strength engineering plastic transparent oil tank. Clearly view condition of oil and the "heart" working.

F series vacuum pump is equipped with built-in solenoid valve and overhead vacuum gauge as standard, bringing a new experience. There even has R32 series vacuum pump, applied with high efficiency brush-less motor, non-spark design, durable and reliable.

HEAVY-DUTY SERIES

● Tubing Tools

Tubing tools is a special kind of tool for the installation and maintenance of refrigeration system. So it must be reliable and durable, and the processed products must be accurate to avoid repeated invalid operations.

WIPCOOL introduces lightweight 2 in 1 flaring tool, tube cutters with standard spare blade inside, titanium coated tube deburring tool, high strength pinch off locking plier and recovery puncture pliers. Fully consider the needs of end users for high quality and durable tubing tools.

MASTER SERIES

● Manifold Gauges

A manifold gauge is a pressure-checking system. They are one of the most basic HVAC tools, and can be used as both a diagnostic and service tool.

In diagnostics, a manifold gauge tells an HVAC technician if the system is operating correctly, or if there is a problem within the system that needs to be addressed.

When used as a service tool, a manifold gauge can be used to release moisture and sludge, and remove contaminated refrigerants from the system.

WIPCOOL manifold gauges applied highly efficient ball valve to control on/off, oil-filled gauge with shock-proof, built-in solar LED lights. Unique shape, easy to use and accurate reading.



HOW TO CHOOSE A PROPER VACUUM PUMP

The A/C refrigeration vacuum pump is one of the most important tools an engineer will use during their role, as it is a key player when carrying out maintenance on air conditioning units. So the following points should be considered when you select a vacuum pump.

1, System's Refrigerant

Different refrigerant needs the relevant vacuum pump (you can find the refrigerant on the equipment's specification label).

Outdoor Model	KFR-35W-F117(Outdoor Unit)
Refrigerant	R22/880g
Weight	32KGS
Outdoor Unit Resistance Class	IPX4
Power Source	5.6A
Rated Current	1190W
Rated Input	220V~/50Hz
Excessive Operating Pressure(discharge)	2.6MPa
Excessive Operating Pressure(suction)	2.6MPa

For these air conditioning units which used with R410A refrigerant, if the vacuum pump oil be sucked to system, the refrigerant will be led to contamination and destruction, then caused the deteriorations, so it will be a huge impact on the cooling efficiencies and service life of the equipment.

2, Determining The Flow Rate Required(CFM,L/min)

When ascertaining what vacuum pump needs to be used, it's important to determine the CFM rating required for a job. This is more commonly known in some countries as the LPM, Liters per minute. A pump with higher CFM rating will help you get to full vacuum quicker. But Higher CFM does NOT mean better vacuum, only faster evacuation.

3, Working Place

Considering that some outdoor unit installed on rooftop without power socket. It is hard to get the AC power source. As the energy density of lithium batteries has come a long way in the past few decades with the progress of technology, and working time is also getting longer and longer. So a portable, cordless vacuum pump is necessary.

4, Ultimate Vacuum Level

The density of the gas in the vacuum state is usually represented by 'vacuum degree'. The smaller figures means higher vacuum degree. It usually appears as Microns(Pa).

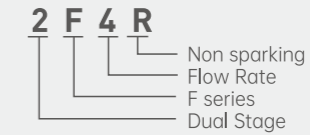
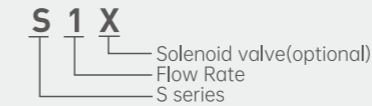
As the name implies, a dual-stage rotary vane vacuum pump contains two stages of pumping in a single assembly. One is a low vacuum stage while the other is a mated high vacuum stage. So a dual-stage rotary vacuum pump is able to produce the better vacuums than single-stage. The central air conditioning unit, cooling store need better vacuum degree, so Dual-stage vacuum pump is the best choice.

WIPCOOL VACUUM PUMP'S SELECTION

WIPCOOL vacuum pumps are divided into S series and F series

S series equipped with transparent oil tank, lightweight & portable, highly cost-effective.

F series equipped with built-in solenoid valve and overhead vacuum meter as standard, there even has lithium battery, dual power, R32 vacuum pump for your choice, which provides the ultimate user experience.



Model	Flow Rate(CFM)	Vacuum degree(Microns)	Refrigerant	Power source
S1-S2	2-4	150	A1	AC
F1	1.5	150	A1	AC
F2R-F5R	5-11	150	A1,A2,A2L	AC
2F0,2F1	1.5-2.5	15	A1	AC
2F0R-2F5R	1.5-11	15	A1,A2,A2L	AC
F1BK	1.5	150	A1	Dual power(AC/Li-ion)
F2BRK	5	150	A1,A2,A2L	Dual power(AC/Li-ion)
2F1BRK,2F2BRK	2.5-5	15	A1,A2,A2L	Dual power(AC/Li-ion)

Side note:

Safety grade of refrigerant

The safety of refrigerants mainly refers to the toxicity, flammability and explosiveness.

It usually represented by A, B, C plus 1, 2, 3, A1 represents the safest, and C3 represents most dangerous

	Low Toxicity	Moderate Toxicity	High Toxicity
High flammable	A3	B3	C3
Mildly flammable	A2	B2	C2
Non flammable	A1	B1	C1

The normal refrigerants' grade as below for reference:

A1: R11, R12, R22, R23, R124, R125, R134a, R410a, R500, R502, R718

A2: R142b, R152a, R406a, R411a, R411b, R412a, R413a, R415b, R418a, R419a, R512a

A2L: R143a, R32, R1234yf, R1234ze(E)

Vacuum pump

S1 S1.5 S2

Clear·The "HEART" Is Beating

- **Patent structure**
Reduces oil leakage risk
- **Clear oil tank**
Clearly view condition of oil and system
- **One-way valve**
Preventing vacuum oil backflow to system
- **Solenoid valve(S1X/1.5X/2X,Optional)**
100% Preventing vacuum oil backflow to system



R410A Vacuum Pump

F1 F1.5
2F0 2F1

Vacuumping Quickly

- Patented anti-dumping design to avoid oil leakage
- Overhead vacuum gauge, compact and easy to operate
- Built-in solenoid valve to prevent backflow to system
- Integral cylinder structure to improve reliability
- No oil injection and less oil mist, prolonging oil service life
- New motor technology, lightweight and easy to carry



Technical Data :			
Model	S1	S1.5	S2
Voltage	230V~/50-60Hz or 100-120V~/50-60Hz		
Ultimate Vacuum	150 microns		
Input Power	1/4HP	1/4HP	1/3HP
Flow Rate (Max.)	2CFM 57L/min	3CFM 85 L/min	4CFM 113 L/min
Oil Capacity	230ml	210ml	200ml
Weight	3.3kg	3.4kg	3.6kg
Dimension	266x121x194		
Inlet Port	1/4"SAE		

Technical Data :				
Model	F1	F1.5	2F0	2F1
Voltage	230V~/50-60Hz or 100-120V~/50-60Hz			
Ultimate Vacuum	150 microns		15 microns	
Input Power	1/4HP	1/4HP	1/4HP	1/4HP
Flow Rate (Max.)	1.5CFM 42 L/min	3CFM 85 L/min	1.5CFM 42 L/min	2.5CFM 71 L/min
Oil Capacity	370ml	330ml	280ml	280ml
Weight	4.2kg	4.5kg	4.7kg	4.7kg
Dimension	309x113x198		309x113x198	
Inlet Port	1/4"SAE			

R32 Vacuum Pump

Light Weight Fast Vacuuming

- Patented anti-dumping technology reduces oil leakage risk
- Top-set vacuum gauge, compact design and easy to operate
- Built-in solenoid valve to prevent backflow to system
- Non-sparking design, suitable for use with R32 and other new refrigerants
- No oil injection and less oil mist, prolonging oil life
- Brush-less motor technology, More than **25% Lighter**

F2R-F5R
2F0R-2F5R



Single Stage R32 Vacuum Pump

Technical Data :

Model	F2R	F3R	F4R	F5R
Voltage	230V~/50-60Hz or 100-120V~/50-60Hz			
Ultimate Vacuum	150 microns			
Input Power	1/3HP	1/2HP	3/4HP	1HP
Flow Rate (Max.)	5CFM 142 L/min	7CFM 198 L/min	9CFM 255 L/min	11CFM 312 L/min
Oil Capacity	580ml	560ml	690ml	670ml
Weight	5.5kg	5.7kg	8.5kg	8.7kg
Dimension	339x130x225	339x130x225	365x147x242	365x147x242
Inlet Port	1/4"&3/8"SAE	1/4"&3/8"SAE	1/4"&3/8"SAE	1/4"&3/8"SAE

Dual Stage R32 Vacuum Pump

Technical Data :

Model	2F0R	2F1R	2F1.5R	2F2R	2F3R	2F4R	2F5R
Voltage	230V~/50-60Hz or 100-120V~/50-60Hz						
Ultimate Vacuum	15 microns						
Input Power	1/4HP	1/4HP	1/3HP	1/2HP	3/4HP	1HP	1HP
Flow Rate (Max.)	1.5CFM 42 L/min	2.5CFM 71 L/min	3CFM 85 L/min	5CFM 142L/min	7CFM 198 L/min	9CFM 255L/min	11CFM 312L/min
Oil Capacity	280ml	280ml	480ml	450ml	520ml	500ml	480ml
Weight	4.2kg	4.2kg	6.2kg	6.5kg	9.8kg	10kg	10.2kg
Dimension	309x113x198	309x113x198	339x130x225	339x130x225	365x147x242	365x147x242	365x147x242
Inlet Port	1/4"SAE	1/4"SAE	1/4"&3/8"SAE	1/4"&3/8"SAE	1/4"&3/8"SAE	1/4"&3/8"SAE	1/4"&3/8"SAE

Cordless Vacuum Pump

Li-ion Battery Power Portable Evacuation

- High performance lithium battery power, convenient to use
- Patented anti-dumping design to avoid oil leakage
- Overhead vacuum gauge, easy to read
- Built-in solenoid valve to prevent oil backflow to system
- Integral cylinder structure to improve reliability
- No oil injection and less oil mist, prolong oil service life



Battery adapter(Optional)

BA1-6

For details, see P50
6 Adapters for choice, Perfect fit for 6 brands of batteries
(Adapter is available separately)



Be used with AC power

Battery Converters(Optional)



BC-18, See P50
Applied on
F1B, 2F0B/2F0BR,
2F1B/2F1BR

BC-18P, See P50
Applied on
F2BR, 2F2BR

F1B 2F0B 2F1B
F2BR 2F2BR



Technical Data :

Model	F1B	2F0B	2F0BR	2F1B	2F1BR	F2BR	2F2BR
Voltage	DC18V(AEG/ RIDGID interface)						
Ultimate Vacuum	150 micron	15 microns			150 microns		15 microns
Input Power	1/4HP	1/4HP	1/4HP	1/4HP	1/4HP	1/3HP	1/2HP
Flow Rate (Max.)	1.5CFM 42 L/min	1.5CFM 42 L/min	1.5CFM 42 L/min	2.5CFM 71 L/min	2.5CFM 71 L/min	5CFM 142L/min	
Oil Capacity	370ml	280ml	280ml	280ml	280ml	580ml	450ml
Weight	4.2kg	4.5kg	4.0kg	4.5kg	4.0kg	5.5kg	6.5kg
Dimension	309x113x198	309x113x198	309x113x198	309x113x198	309x113x198	339x130x225	339x130x225
Reference running time	45mins(4.0AhLi-ion battery)					40mins(4.0AhLi-ion battery)	
Reference charging time	210mins(4.0AhLi-ion battery)					210mins(4.0AhLi-ion battery)	
Remarks	Due to the strict transportation terms, we can not include any Li-ion battery, you can choose our battery adapters for use your local batteries						

Lithium/AC Dual Power Vacuum Pump

F1BK F2BRK
2F1BRK 2F2BRK

Dual Power Freely Switch

- Never suffer from low battery anxiety
- Freely switch between AC power and battery power
- Avoiding any downtime on the jobsite



Lithium battery is full
Enjoy the convenient
of cordless



Lithium battery is low
Start corded use for
unlimited runtime



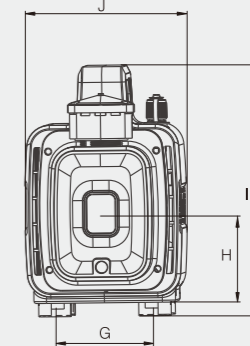
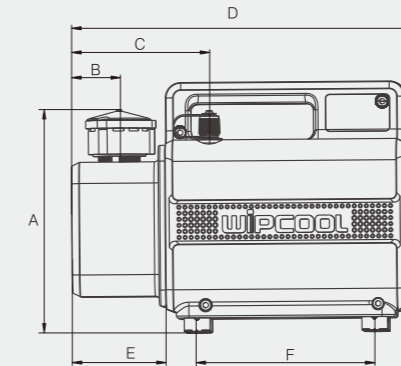
Battery adapter(2 free from the 6)
6 Adapters for choice, Perfect fit for 6 brands of batteries

AC POWER SUPPLY PLUGS

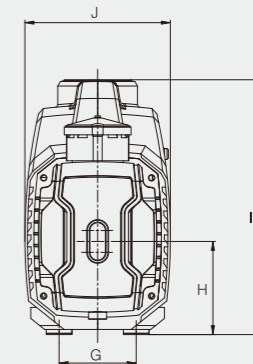
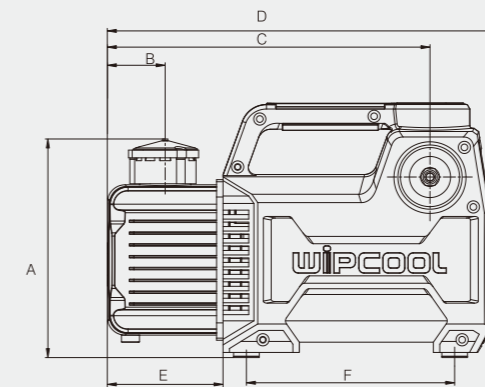


Model	Description
W01	Israel plug
W02	China plug
W03	Australia plug
W04	South africa plug
W05	Europe plug
W06	America plug
W07	Britain plug
W08	Japan plug
W09	Italy plug
W10	Argentina plug
W11	Brazil plug
W12	South Korea Plug

S series



F series



Technical Data :

	Model	F1BK	2F1BRK	F2BRK	2F2BRK
Lithium/AC Dual Power Vacuum Pump	Voltage	18V(AEG/RIDGID) interface			
	Flow Rate(Max.)	1.5CFM 42 L/min	2.5CFM 71 L/min	5CFM 142 L/min	
	Ultimate vacuum	150microns	15microns	150microns	15microns
Include:	Tool box, Vacuum pump, Battery Adapter(2 free from the 6 adapters), Battery converter				
Reference running time	45mins(4.0AhLi-ion battery)		40mins(4.0AhLi-ion battery)		
Reference charging time	210mins(4.0AhLi-ion battery)		210mins(4.0AhLi-ion battery)		
Remarks	Due to the strict transportation terms, we can not include any Li-ion battery, you can choose our battery adapters for use your local batteries				

Technical Data :

Model	A	B	C	D	E	F	G	H	I	J
S1 S1.5 S2	145	36	107	266	73	138	70	69	194	121
F1 F1.5 2F0(R) 2F1(R)	175	45	250	309	90	162	60	73	200	115
F2R F3R 2F1.5R 2F2R	195	45	280	339	110	165	70	87	225	130
F4R F5R 2F3R 2F4R 2F5R	211	50	300	365	115	190	70	97	242	147

Vacuum Pump Oil Perfect Maintenance



WPO-1

Technical Data :

Model	WPO-1
Kinematic Viscosity(40°C)	41.4-50.6mm ² /s
Viscosity Index	100
Flash Point	225°C
Pour Point	-10°C
Oil Type	Mineral Oil

Tool box Portbale & Heavy duty

- High quality pp plastic, thickened box, strong anti-fall
- Pad eye lock, enables to lock the toolbox.Ensure safety.
- Non-slip handle,comfortable to grip,durable and portable



TB-1 TB-2

TECHNICAL DATA :

Model	TB-1	TB-2
Material	PP	PP
Interior dimensions	L400×W200×H198mm	L460×W250×H230mm
Thickness	3.5mm	3.5mm
Weight(empty)	2.31 kg	3.09 kg
Waterproof	Yes	Yes
Dustproof	Yes	Yes

Corded Battery Converter Corded Power Unlimited Running

- Never suffer from low battery anxiety
- Converts cordless device into corded use for unlimited runtime
- Compatible with WIPCOOL 18V cordless device



Technical Data :

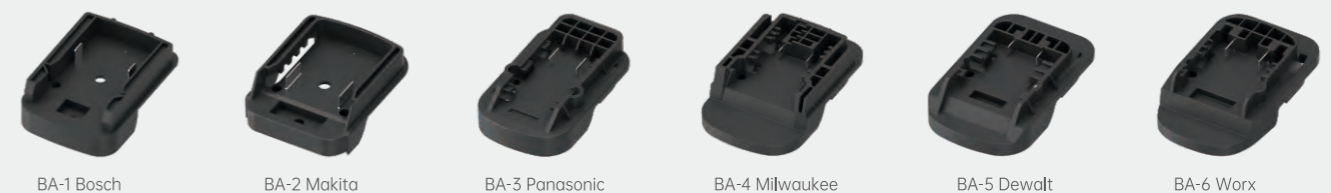
Mode	BC-18	BC-18P
Input	230V~/50-60Hz	230V~/50-60Hz
Output	18V	18V
Power(Max)	150W	200W
Cord Length	1.5m	1.5m

BC-18 BC-18P



Battery Adapter Multiple choice Convenient Usage

- Suitable for professional and daily use.Easy to install and use.
- Convert AEG /RIDGID Interface to different battery for unlimited usage



Technical Data :

Model	BA-1	BA-2	BA-3	BA-4	BA-5	BA-6
Suitable	Bosch	Makita	Panasonic	Milwaukee	Dewalt	Worx
Size(mm)	120×76×32	107×76×28	129×79×32	124×79×34	124×79×31	120×76×32

BA-1~BA-6

Manifold Gauge Kits

(Suit for R22,R410A,R32)

Solar Led Shockproof

- Oil-filled, Class 1.6 accuracy gauges, Pulse/vibration free
- Extra large sight glass to view refrigerant movement
- Built-in led light with solar cell, suitable for dark working conditions
- Ball valve handle, efficient and convenient operation



MG-2K

Single Manifold Gauge

(Suit for R22,R410A,R32)

Solar Led Shockproof

- Oil-filled, Class 1.6 accuracy gauges, Pulse/vibration free
- Extra large sight glass to view refrigerant movement
- Built-in led light with solar cell, suitable for dark working conditions
- Ball valve handle, efficient and convenient operation



MG-1L MG-1H

Technical Data :

Model	MG-2K
Gauge Scale	R22 R410A R32
Diameter	ø50
Pressure	-30inHg-500psi / -30inHg-800psi
Accessories	Set of 3 RYB refrigeration hoses, 2XAdapters(5/16"-1/4")
Packing	Tool bag

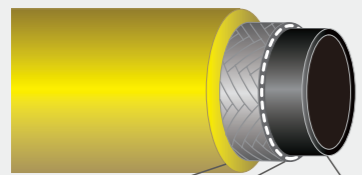
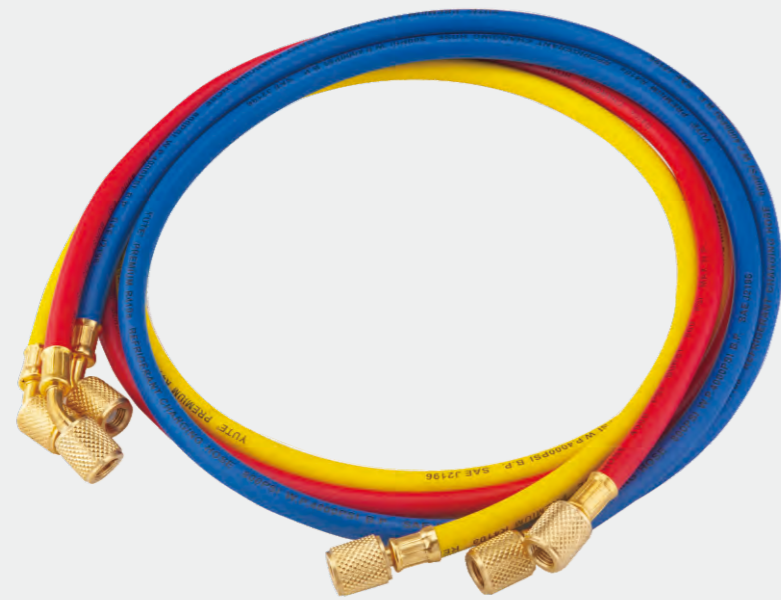
Technical Data :

Model	MG-1L	MG-1H
Gauge Scale	R22 R410A R32	R22 R410A R32
Diameter	ø50	ø50
Pressure	-30inHg-500PSI	-30inHg-800PSI
Accessories	~	~
Packing	Blister	Blister

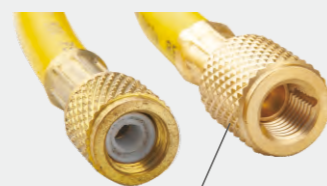
Refrigerant Charging Hose

High Strength Corrosion Resistance

- 3 layer reinforce tube, Safty use with no leakage
- Rated for 800 PSI working pressure
- Suitable for high pressure refrigerants R410A/R32, etc



Protective layer Reinforced layer Anti-seeping layer



Thicker brass knob, Easy screwing

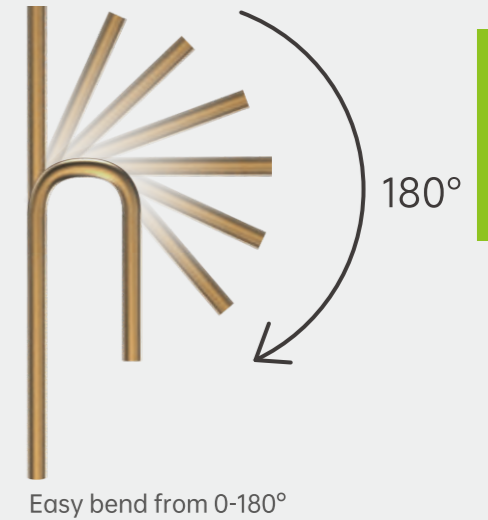
MRH-1



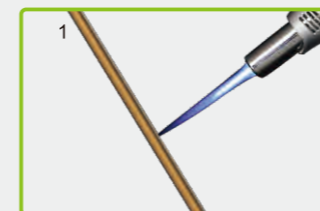
3-in-1 Lever Tube Bender

Light&Portable

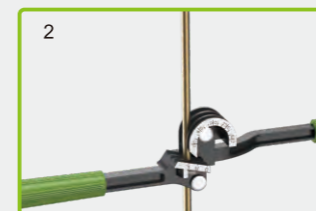
- The pipe has no impressions, scratches and deformation after bending.
- Over-molded handle grip reduces hand fatigue and won't slip or twist.
- Made of high quality die-cast aluminum, strong and durable for long time use.



Easy bend from 0-180°



Please use a burner to heat a hard copper, then start the bending



Open the tube bender and insert the copper tube



Bending from 0-180°



Complete the bending

Technical Data :

Model	Color	Length	Working Pressure(Max.)	Burst Pressure(Max.)	Fittings
MRH-1	Set of 3	150cm	800psi	4000psi	1/4"-1/4"(Y) 1/4"-5/16"(R) 1/4"-5/16"(B)

Technical Data :

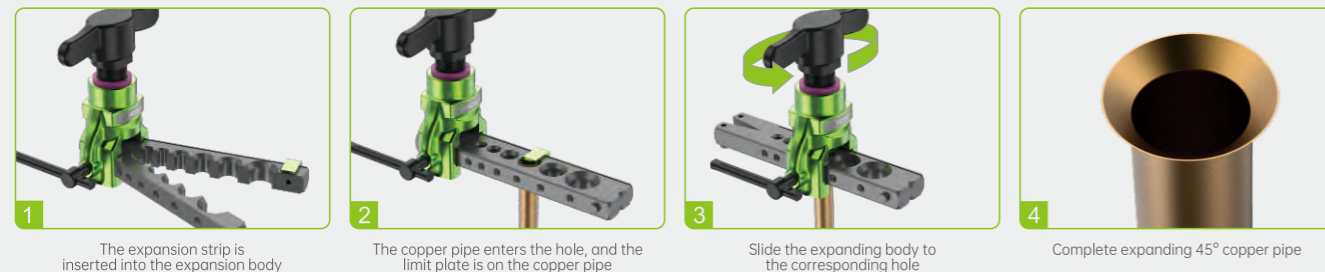
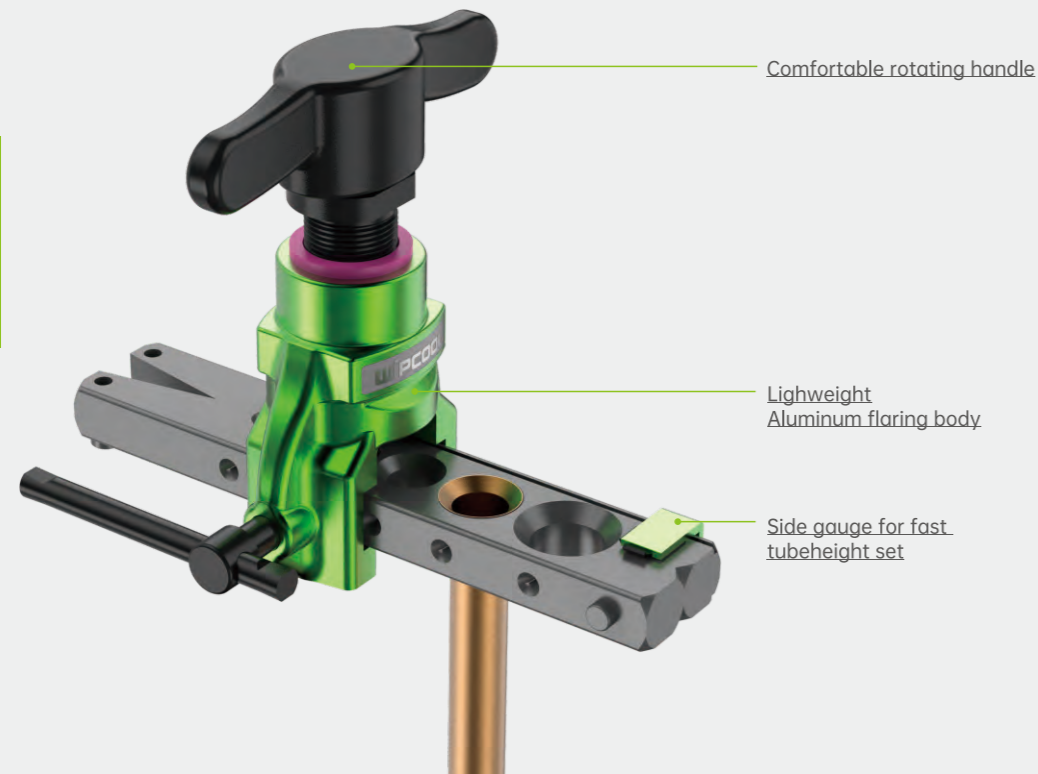
Model	HB-3	HB-3M
Tubing O.D.	1/4", 5/16", 3/8"	6, 8, 10mm

R410A Manual Flaring Tool

EF-2

Lightweight Precise Flaring

- Special design for R410A system, also fit for usual tubing
- Aluminum body- 50% lighter than steel designs
- Slide gauge sets the tube to the exact position



TECHNICAL DATA :

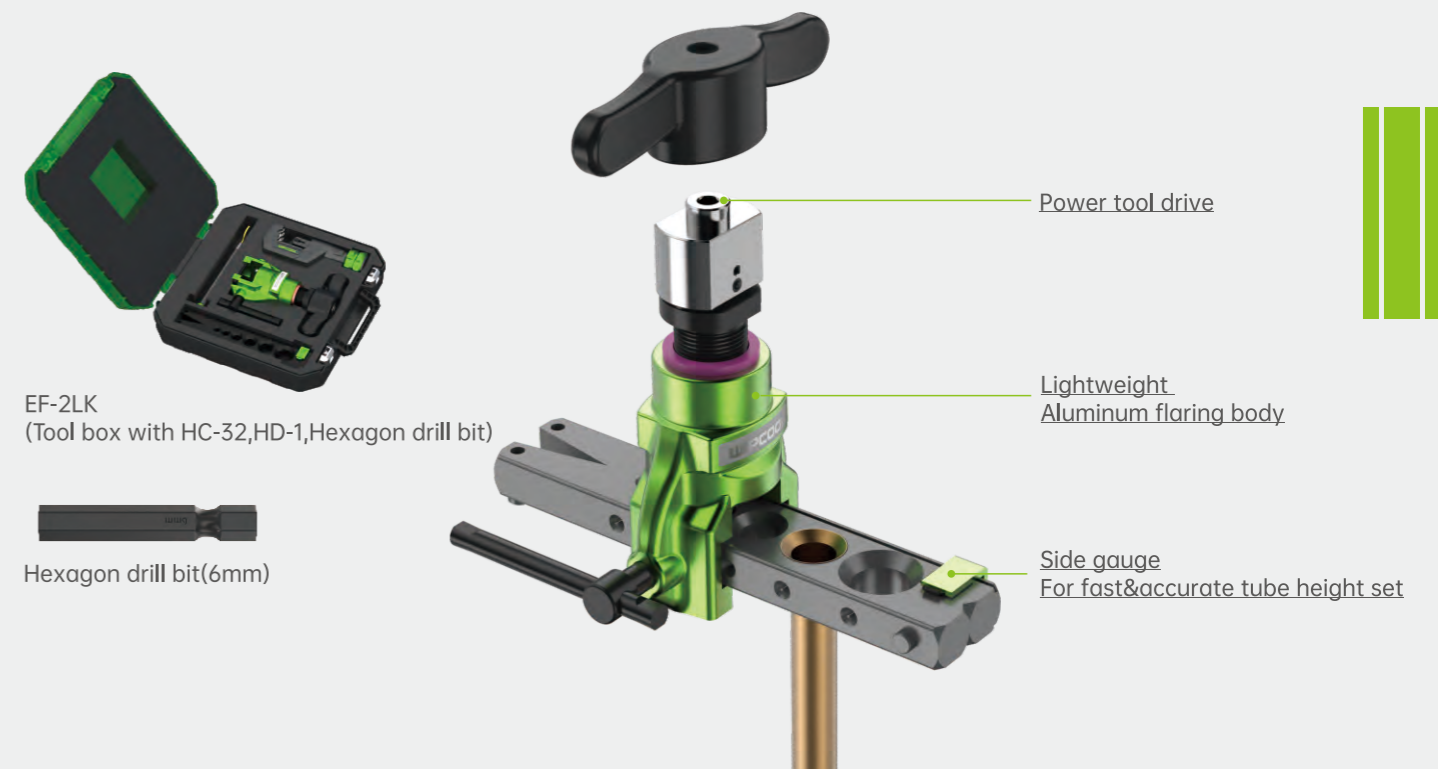
Model	O.D Tube	Accessories	Packing
EF-2	1/4" 5/16" 3/8" 1/2" 5/8" 3/4"	/	Blister

R410A 2-in-1 Flaring Tool

EF-2L

Manual and Power Drive Fast&Precise Flaring

- Power drive design, used with power tools for quickly flaring.
- Special design for R410A system, also fit for usual tubing
- Aluminum body- 50% lighter than steel designs
- Slide gauge sets the tube to the exact position
- Reduces the amount of time to create a precise flare



Technical Data :

Model	O.D Tube	Accessories	Packing
EF-2L		/	Blister
EF-2LK	1/4" 5/16" 3/8" 1/2" 5/8" 3/4"	HC-32,HD-1, Hexagon drill bit(6mm)	Toolbox



Tube Cutter

HC-19/32/54

Spring Mechanism Fast&safe cutting

- The Spring design prevents the crush of soft tubes(HC-32,HC-54).
- Made from wear-resistant steel blades ensures a durable and sturdy usage
- The rollers and the blade utilize ball bearings for smoother action.
- Stable roller tracking system keeps tube from threading
- An additional blade comes with the tool and be stored in the knob



HC-19
Built-in spare blade



HC-32
Built-in spare blade



HC-54
Built-in spare blade



Spring Mechanism
(HC-32/54)



Stable grooved rollers
tracking system



An additional blade
stored in the knob



Sharp, wear-resistant
steel blades



1 Fasten



2 Rotate



3 Fasten again



4 Rotate Again

Technical Data :

Model	HC-19	HC-32	HC-54
Tubing O.D.	1/8"~3/4"	3/16" ~1-1/4"	1/4" ~2-1/8"
	3~19mm	4~32mm	6~54mm



HE-7/11

Lever Tube Expander Kit

- ⚙️ Leverage Design
- 📦 Light & Portable
- 🔧 Wide Application



Lever Tube Expander Kit

HE-7/HE-11

- High-quality aluminum alloy body, lightweight and durable. portable size make it easy to store and carry.
- Long lever torque and soft rubber wrapped handle make the tube expander easy to operation.
- Widely used for HVAC, refrigerators, automobiles, hydraulic and pneumatic systems maintenance, etc.



HE-7



HE-11

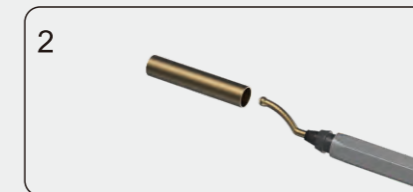


Tools

Scope of application: For soft and copper / aluminum pipes.



1 Cut the tube



2 Deburr the tube



3 Prepare the tube to be expanded by heating it.



4 Place the appropriate expander head onto the expander.



5 Open the expander's handle to 90° and insert the tube onto the expander head.



6 Press the handle down to expand the tube, allowing it to be connected with out fittings.

Technical Data :

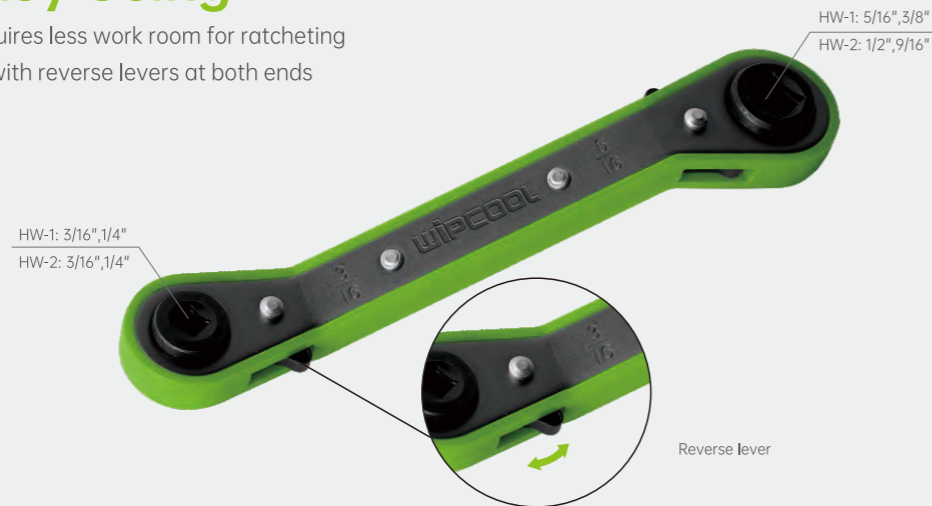
Model	O.D Tube	Accessories	Packing
HE-7	3/8", 1/2", 5/8", 3/4", 7/8", 1", 1-1/8"	HC-32, HD-1	Toolbox
HE-11	3/8", 1/2", 5/8", 3/4", 7/8", 1", 1-1/8", 1-1/4", 1-3/8", 1-1/2"	HC-54, HD-1	

Ratchet Wrench

Flexible, Easy Using

HW-1 HW-2

- With 25° angulation, requires less work room for ratcheting
- Quick ratcheting action with reverse levers at both ends



Technical Data :

Model	HW-1	HW-2
Size	1/4", 3/8" & 3/16", 5/16"	1/4", 3/16" & 9/16", 1/2"

Tube Deburrer

Titanium-coated Sharp&Durable

HD-1 HD-2

- Premium anodizing painted aluminum alloy handle, comfortable to grip
- Flexibly 360° degree rotated blade, fast deburring of edges, tubes and sheets
- Quality tempered high speed steel blades,
- Titanium-coated surface, wear-resistant, long service life



More smoothly deburrer



Get the spare blade by opening cover



Technical Data :

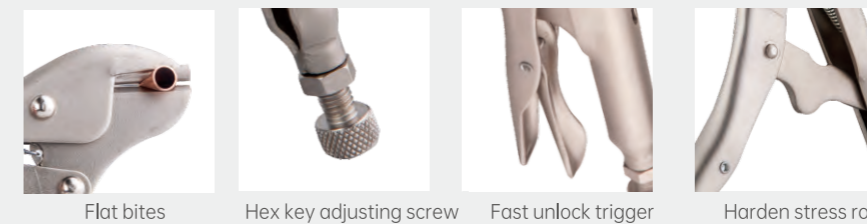
Model	HD-1	HD-2
Configuration	2 Normal Blades	1 Countersink Blade +1 Normal Blade
Packing	Blister	Blister

Pinch Off Locking Plier

Strong Bite Perfect Sealing

HL-1

- High-grade heat-treated alloy steel for maximum toughness and durability
- Hex key adjusting screw, Easy access to the right locking size
- Fast unlock trigger, easy access to controller release



Technical Data :

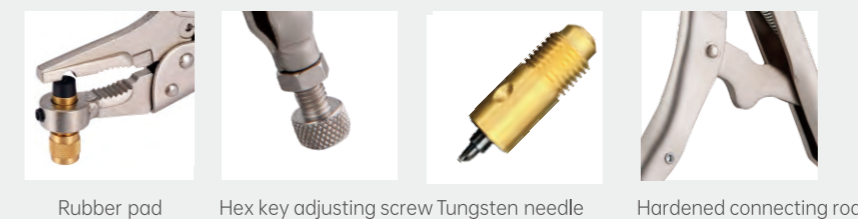
Model	Length	Width	Suitable Size	Weight
HL-1	193mm	58mm	1/8"-3/8"(3-10mm)	0.4kg

Tube Piercing Plier

Sharp&Durable

HP-1

- High hardness needle, forged with alloy tungsten steel
- Designed to quickly lock on to and pierce refrigerant tube
- Puncture the refrigeration tube and recover the old refrigerant instantly.
- Manufactured from high-grade heat-treated alloy steel for durability.



Technical Data :

Model	Length	Width	Suitable Size	Weight
HP-1	200mm	58mm	4-8mm	0.4kg