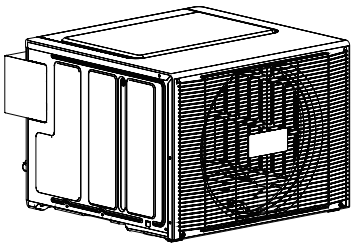
AIR CONDITIONER

OUTDOOR UNIT

INSTALLATION MANUAL

For authorized service personnel only.

PART No.9387693034-03



Installation must be performed in accordance with the requirement of NEC and CEC by authorized personnel only.

Contents

English

Français

Español

1. SAFETY PRECAUTIONS

1.1. IMPORTANT! Read before starting

This air conditioning system meets strict safety and operating standards.
As the installer or service person, it is an important part of your job to install or service the system so it operates safely and efficiently.

For safe installation and trouble-free operation, you must:

- Carefully read this instruction booklet before beginning.
- Follow each installation or repair step exactly as shown.
- Observe all local, state, and national electrical codes.
- Pay close attention to all warning and caution notices given in this manual.

WARNING: This symbol refers to a hazard or unsafe practice which can result in severe personal injury or death.

CAUTION: This symbol refers to a hazard or unsafe practice which can result in personal injury and the potential for product or property damage.

- Hazard alerting symbols

Electrical

Safety/alert

If Necessary, Get Help

These instructions are all you need for most installation sites and maintenance conditions. If you require help for a special problem, contact our sales/service outlet or your certified dealer for additional instructions.

In Case of Improper Installation

The manufacturer shall in no way be responsible for improper installation or maintenance service, including failure to follow the instructions in this document.

1.2. Special precautions

When Wiring

ELECTRICAL SHOCK CAN CAUSE SEVERE PERSONAL INJURY OR DEATH. ONLY A QUALIFIED, EXPERIENCED ELECTRICIAN SHOULD ATTEMPT TO WIRE THIS SYSTEM.

- Do not supply power to the unit until all wiring and tubing are completed or reconnected and checked.
- Highly dangerous electrical voltages are used in this system. Carefully refer to the wiring diagram and these instructions when wiring. Improper connections and inadequate grounding (earthing) can cause accidental injury or death.
- Ground (earth) the unit following local electrical codes.
- Connect all wiring tightly. Loose wiring may cause overheating at connection points and a possible fire hazard.

When Transporting

Be careful when picking up and moving the indoor and outdoor units. Get a partner to help, and bend your knees when lifting to reduce strain on your back. Sharp edges or thin aluminum fins on the air conditioner can cut your fingers.

When Installing...

...In a Ceiling or Wall

Make sure the ceiling/wall is strong enough to hold the unit's weight. It may be necessary to construct a strong wood or metal frame to provide added support.

...In a Room

Properly insulate any tubing run inside a room to prevent "sweating" that can cause dripping and water damage to walls and floors.

...In Moist or Uneven Locations

Use a raised concrete pad or concrete blocks to provide a solid, level foundation for the outdoor unit. This prevents water damage and abnormal vibration.

...In an Area with High Winds

Securely anchor the outdoor unit down with bolts and a metal frame.
Provide a suitable air baffle.

...In a Snowy Area (for Heat Pump-type Systems)

Install the outdoor unit on a raised platform that is higher than drifting snow.

When Connecting Refrigerant Tubing

- Keep all tubing runs as short as possible.
- Use the flare method for connecting tubing.
- Apply refrigerant lubricant to the matching surfaces of the flare and union tubes before connecting them, then tighten the nut with a torque wrench for a leak-free connection.
- Check carefully for leaks before opening the refrigerant valves.

NOTE:

Depending on the system type, liquid and gas lines may be either narrow or wide. Therefore, to avoid confusion the refrigerant tubing for your particular model is specified as either "small" or "large" rather than as "liquid" or "gas".

When Servicing

- Turn the power OFF at the main circuit breaker panel before opening the unit to check or repair electrical parts and wiring.
- Keep your fingers and clothing away from any moving parts.
- Clean up the site after you finish, remembering to check that no metal scraps or bits of wiring have been left inside the unit being serviced.
- After installation, explain correct operation to the customer, using the operation manual.

⚠ WARNING

- To avoid getting an electric shock, never touch the electrical components soon after the power supply has been turned off. After turning off the power, always wait 10 minutes or more before you touch the electrical components.
- Installation of this product must be done by experienced service technicians or professional installers only in accordance with this manual. Installation by non-professional or improper installation of the product might cause serious accidents such as injury, water leakage, electric shock, or fire. If the product is installed in disregard of the instructions in this manual, it will void the manufacturer's warranty.
- Do not turn on the power until all work has been completed. Turning on the power before the work is completed can cause serious accidents such as an electric shock or a fire.
- If refrigerant leaks when you are working, ventilate the area. If the leaking refrigerant is exposed to a direct flame, it may produce a toxic gas.
- Installation must be performed in accordance with regulations, codes, or standards for electrical wiring and equipment in each country, region, or the installation place.
- Do not use this equipment with air or any other unspecified refrigerant in the refrigerant lines. Excess pressure can cause a rupture.
- During installation, make sure that the refrigerant pipe is attached firmly before you run the compressor. Do not operate the compressor under the condition of refrigerant piping not attached properly with 2-way or 3-way valve open. This may cause abnormal pressure in the refrigeration cycle that leads to rupture and even injury.
- When installing or relocating the air conditioner, do not mix gases other than the specified refrigerant (R410A) to enter the refrigerant cycle.
  If air or other gas enters the refrigerant cycle, the pressure inside the cycle will rise to an abnormally high value and cause rupture, injury, etc.
- For appropriate working of the air conditioner, install it as written in this manual.
- To connect indoor unit and outdoor unit, or indoor unit and branch box, use air conditioner piping and cables available through your local distributor. This manual describes proper connections using such installation set.
- Do not modify power cable, use extension cable or branch wiring. Improper use may cause electric shock or fire by poor connection, insufficient insulation or over current.
- Do not purge the air with refrigerants but use a vacuum pump to vacuum the installation.
- There is no extra refrigerant in the outdoor unit for air purging.
- Do not use means to accelerate the defrosting process or to clean, other than those recommended by the manufacturer.
- The appliance shall be stored in a room without continuously operating ignition sources (for example: open flames, an operating gas appliance or an operating electric heater.)
- Do not pierce or burn.
- Be aware that refrigerants may not contain an outdoor.
- Using the same vacuum pump for different refrigerants may damage the vacuum pump or the unit.
- Use a clean gauge manifold, vacuum pump and charging hose for R410A exclusively.
- Do not modify this unit, such as opening a hole in the cabinet.
- During the pump-down operation, make sure that the compressor is turned off before you remove the refrigerant piping.
  Do not remove the connection pipe while the compressor is in operation with 2 way or 3 way valve open. This may cause abnormal pressure in the refrigeration cycle that leads to rupture and even injury.
- Children should be monitored to ensure they do not play with the device.
- This appliance is not intended for use by persons (including children) with reduced physical, sensory or mental capabilities, or lack of experience and knowledge, unless they have been given supervision or instruction concerning use of the appliance by a person responsible for their safety. Children should be supervised to ensure that they do not play with the appliance.
- Cancer and Reproductive Harm - www.P65Warnings.ca.gov.

⚠ CAUTION

- This unit must be installed by qualified personnel with a capacity certification of handling refrigerant fluids. Refer to regulation and laws in use on installation place.
- Install the unit by following local codes and regulations in force at the place of installation, and the instructions provided by the manufacturer.
- This unit is part of a set constituting an air conditioner. The unit must not be installed alone or be installed with non-authorized device by the manufacturer.
- When installing pipes shorter than 6 ft (2 m), sound of the outdoor unit will be transferred to the indoor unit, which will cause large operating sound or some abnormal sound.
- To protect the persons, ground (earth) the unit correctly, and use the power cable combined with an Earth Leakage Circuit Breaker (ELCB).
- The units are not explosion proof, and therefore should not be installed in explosive atmosphere.
- This unit contains no user-serviceable parts. Always consult experienced service technicians for repairing.
- When moving or relocating the air conditioner, consult experienced service technicians for disconnection and reinstallation of the unit.
- Do not touch the aluminum fins of heat exchanger built-in the indoor or outdoor unit to avoid personal injury when you install or maintain the unit.
- Do not place any other electrical products or household belongings under indoor unit or outdoor unit. Condensation dripping from the unit might get them wet, and may cause damage or malfunction of your property.

2. PRODUCT SPECIFICATION

- This product is manufactured to metric units and tolerances. United States customary units are provided for reference only. In cases where exact dimensions and tolerances are required, always refer to metric units.

2.1. Installation tools

⚠ WARNING

- To install a unit that uses R410A refrigerant, use dedicated tools and piping materials that have been manufactured specifically for R410A use. Because the pressure of R410A refrigerant is approximately 1.6 times higher than R22, failure to use dedicated piping material or improper installation can cause rupture or injury. Furthermore, it can cause serious accidents such as water leakage, electric shock, or fire.

Tool name	Change from R22 to R410A
Gauge manifold	Pressure is high and cannot be measured with a conventional (R22) gauge. To prevent erroneous mixing of other refrigerants, the diameter of each port has been changed. It is recommended to use gauge with seals -0.1 to 5.3 MPa (-1 to 53 bar) for high pressure. -0.1 to 3.8 MPa (-1 to 38 bar) for low pressure.
Charge hose	To increase pressure resistance, the hose material and base size were changed.(R410A)
Vacuum pump	A conventional vacuum pump can be used by installing a vacuum pump adapter. (Use of a vacuum pump with a series motor is prohibited.)
Gas leakage detector	Special gas leakage detector for HFC refrigerant R410A.

■ Copper pipes

It is necessary to use seamless copper pipes and it is desirable that the amount of residual oil is less than 0.0014 oz/33 ft (40 mg/10 m). Do not use copper pipes having a collapsed, deformed or discolored portion (especially on the interior surface). Otherwise, the expansion value or capillary tube may become blocked with contaminants.
As an air conditioner using R410A incurs pressure higher than when using R22, it is necessary to choose adequate materials.
Thicknesses of copper pipes used with R410A are as shown in table.
Never use copper pipes thinner than those indicated in the table even if they are available on the market.

Thicknesses of Annealed Copper Pipes

Nominal diameter (in)	Outer diameter (mm)	Thickness [in(mm)]
1/4	6.35	0.031 (0.80)
3/8	9.52	

2.2. Power

⚠ WARNING

- Always use a special branch circuit and install a special receptacle to supply power to the room air conditioner.
- Use a circuit breaker and receptacle matched to the capacity of the air conditioner.
- Install a leakage circuit breaker in accordance with the related laws and regulations and electric company standards.
- The circuit breaker is installed in the permanent wiring. Always use a circuit that can trip all the poles of the wiring and has an isolation distance of at least 1/8 in (3 mm) between the contacts of each pole.

⚠ CAUTION

- The power source capacity must be the sum of the air conditioner current and the current of other electrical appliances. When the current contracted capacity is insufficient, change the contracted capacity.
- When the voltage is low and the air conditioner is difficult to start, contact the power company the voltage raised.

2.3. Electric requirement

⚠ CAUTION

- Be sure to install a breaker of the specified capacity.
- Regulation of breaker differs from each locality, refer in accordance with local rules.

Voltage rating	1 ø 208/230 V (60 Hz)
Operating range	187-253 V

■ **Cable specification**

Cable	Type	Remarks
Power supply cable	Follow local electrical codes (Equivalent to 14 AWG)	2 cable + Ground (Earth), 1 ø 208/230 V
Connection cable	Refer to the installation manual of the indoor unit for the connection cable specifications.	

- Select the correct cable type and size according to the country or region's regulations.
- Max. wire length: Set a length so that the voltage drop is less than 2%. Increase the wire diameter when the wire length is long.

■ **Breaker specification**

CAUTION		
Outdoor unit capacity	MINIMUM CIRCUIT AMPACITY	MAX.CKT.BKR. (MAXIMUM CIRCUIT BREAKER)
9	12.5 A	15 A
12	12.5 A	15 A

- Before starting work check that power is not being supplied to all poles of the indoor unit and outdoor unit.
- Install all electrical works in accordance to the national wiring regulations.
- Install the circuit breaker with a contact gap of at least 1/8 in (3 mm) in all poles nearby the units.
- Install the circuit breaker nearby the units.

2.4. Pipe length

	Maximum length	Maximum height (between indoor and outdoor)
Pipe length	24 ft (7.5 m)	9 ft (3 m)

CAUTION

- If the units are further apart than the maximum length of the piping is specified, correct operation can not be guaranteed.
- Do not install the outdoor unit above the indoor unit.

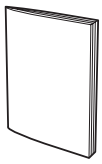
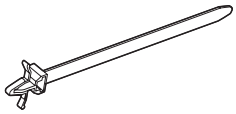
The outdoor unit with the refrigerant removed from the packaging is sealed.
(Indoor unit, the refrigerant is not sealed.)

2.5. Operating range

	Cooling mode Dry mode	Heating mode
Outdoor temperature	14.0 to 115.0 °F	5.0 to 75.0 °F

2.6. Accessories

The following installation accessories are supplied.
Use them as required.

Name and Shape	Qty
Installation manual (This manual) 	1
Cable tie with clip 	2
Cable tie (use with the sleeve (optional)) 	1

One set of following parts are necessary installation of this product.

Name			
Connection pipe assembly	Decorative tape	Saddle	Tapping screws
Connection cable	Vinyl tape	Drain hose	Sealant
Wall pipe	Wall cap	Anchor bolt (M8) 4 pcs	Anchor nut (M8) 4 pcs

3. SELECTING THE MOUNTING POSITION

- Decide the mounting position with the customer as follows.
- Do not set to a place where there is oily smoke, oil is used in the factory, the unit can contact sea breeze, sulfide gases will be generated in the hot spring area, corrosive gases will be generated, animal may urine on the unit and ammonia will be generated and a dusty place.

3.1. Outdoor unit

(1) If possible, do not install the unit where it will be exposed to direct sunlight. (If necessary, Install a blind that does not interfere with the air flow.)
(2) Do not install the unit where a strong wind blows or where it is very dusty.
(3) Do not install in an area that has heat sources, vapors, or the risk of leakage or accumulation of flammable gas.
(4) Do not install the unit where people pass.
(5) Take you neighbors into consideration so that they are not disturbed by air blowing into their windows or by noise.
(6) Provide the space shown in figure so that the airflow is not blocked. Also for efficient operation, leave open three of the four directions front, rear, and both sides.
(7) Install the unit where keep away more than 9 ft (3 m) from the antenna of TV set and Radio.
(8) Outdoor unit should be set to a place where both drainage and itself will not be affected when heating.

WARNING

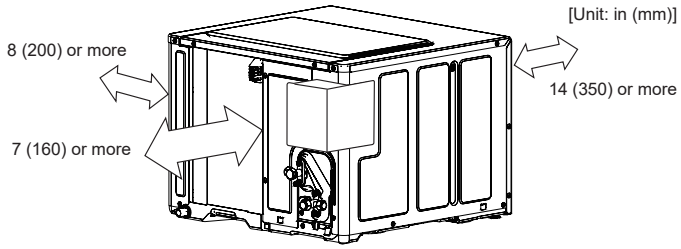
- Install at a place that can withstand the weight of the outdoor units and install positively so that the units will not topple or fall.

CAUTION

- Do not install where there is the danger of combustible gas leakage.
- Do not install near heat sources.
- If children may approach the unit, take preventive measures so that they cannot reach the unit.

4. INSTALLATION DIAGRAM

Provide the space shown in the following figure so that the air flow is not blocked. Also for efficient operation, leave open three of the four directions front, rear, and both sides. For service work, provide the surrounding space as much as possible.



5. INSTALLATION

5.1. Outdoor unit installation

- Set the unit on a strong stand such as thing made of concrete blocks to minimize shock and vibration.
- Do not set the unit directly on the ground because it will cause trouble.

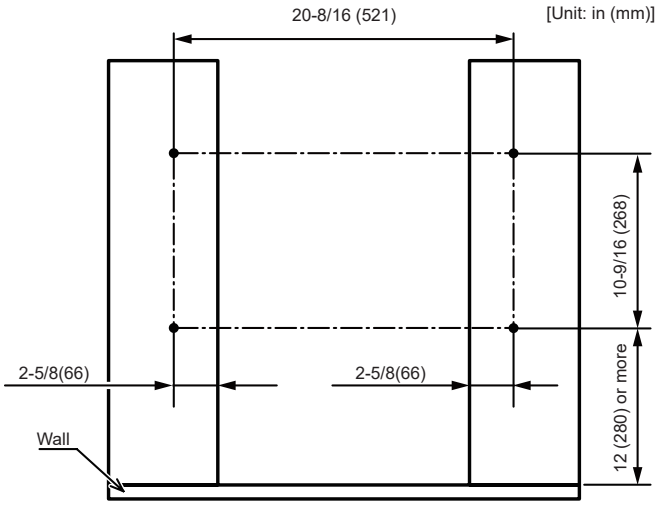
WARNING

- Install the unit where it will not be tilted by more than 5°.
- When installing the outdoor unit where it may exposed to strong wind, fasten it securely.
- Unit mounting a flat and horizontal place.
- Check if the anchor bolt and anchor nut installation positions have a concrete compression strength of at least 200kg/cm^2.
  Do not use a position weaker than this.
- When installing the outdoor unit where it may exposed to strong wind, fasten it securely.
- Do not set the unit directly on the ground because it will cause trouble.
- When installing the air condition near the coast, or where rust is easily generated, do not use the coupling parts supplied. Use all salt-resistant coupling parts.
- When working at a high place, the unit, parts, tools, etc. may be dropped. Take countermeasures against dropping of such a articles.

Install the outdoor unit by using the following two patterns of installation.

■ **Pattern 1: Installed with Base Bracket (optional Base Bracket Kit)**

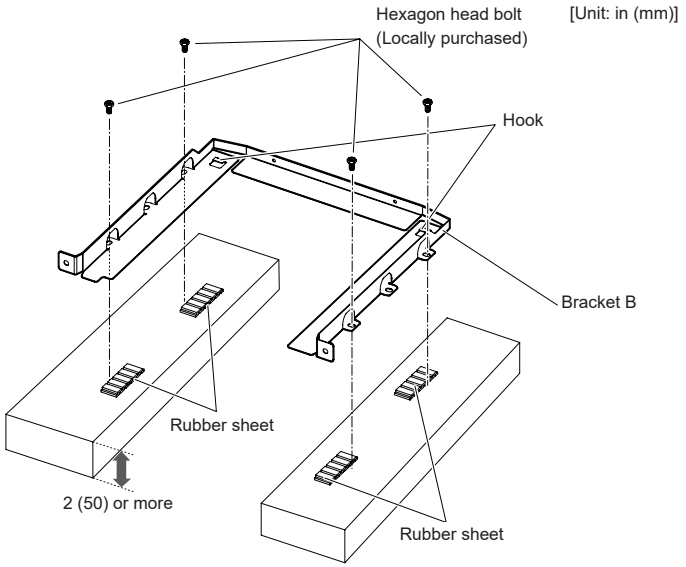
(1) Drill mounting holes for the anchor bolts and anchor nuts at a flat place. (If the unit is not installed at a flat place, drain will be difficult.)
Insert the anchor bolts and anchor nuts into the holes.



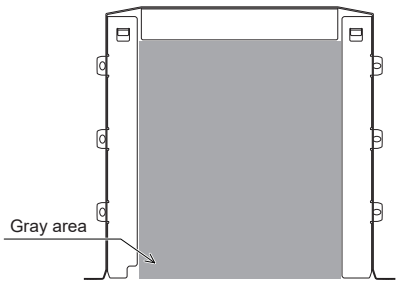
(2) Fasten Bracket B with the anchor bolts.

For stable operation, install the outdoor unit on a raised stand or rack at or above the anticipated snow depth for the region (at least 2 in [50 mm] above the ground).

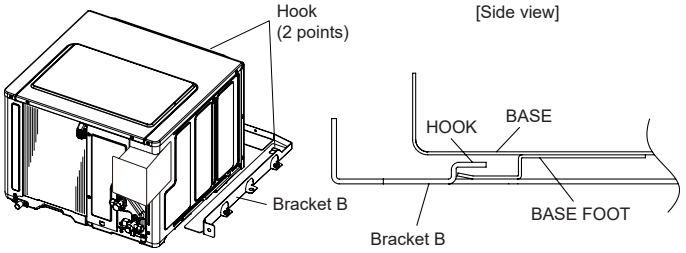
The inside of Bracket B (the gray area) should be an open area to prevent drain water from accumulating. Accumulated water will transform to ice at low ambient conditions and may damage the equipment.



[Top view]

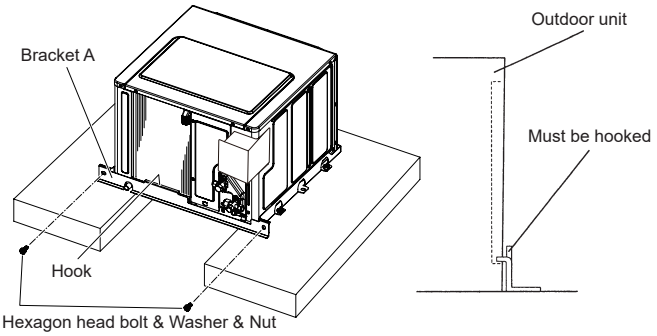


(3) Install the outdoor unit. At this time, check that the outdoor unit is not floating at the Bracket B hook.



(4) Fasten Bracket A and Bracket B with Hexagon head bolt and washer.

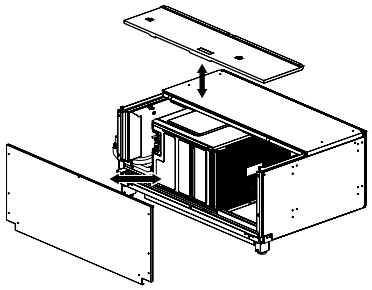
[Rear side]



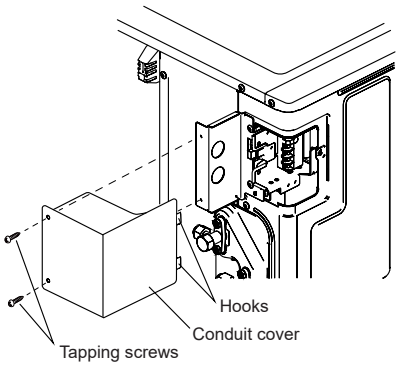
If the unit is installed in a region that is exposed to high winds, freezing conditions, freezing rain, snow fall or heavy snow accumulation, take appropriate measures to protect it from those elements.
The installation of snow hoods and drift prevention fencing is recommended when blowing and drifting snow is common to the region.

■ **Pattern 2: Installed with sleeves (optional UTZ-WUZA-C, UTZ-WUZB-C)**

For detailed installation method, refer to the installation manual of the sleeve (optional).



5.2. Switch cover removal



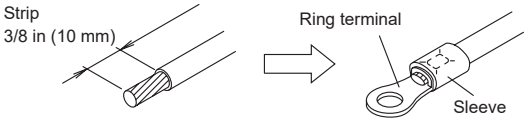
Switch cover removal
(1) Remove the tapping screws(x2).
(2) Pull forward the conduit cover.

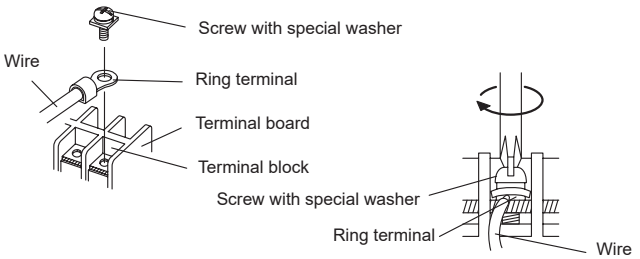
Installing the Switch cover
After inserting the two hooks of conduit cover, and then tighten the tapping screws.

5.3. How to connect the wire to the terminals

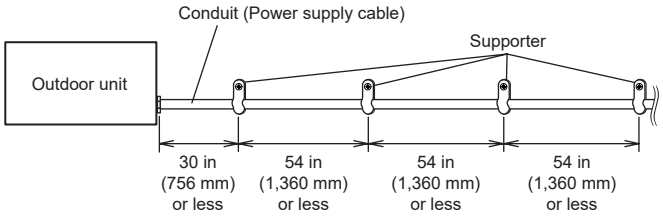
(1) Use ring terminals with insulating sleeves as shown in the figure below to connect to the wire.
(2) Securely crimp the ring terminals to the wires using an appropriate tool so that the wires do not come loose.
(3) Use the specified wires, connect them securely, and fasten them so that there is no stress placed on the terminals.
(4) Use an appropriate screwdriver to tighten the terminal screws. Do not use a screwdriver that is too small, otherwise, the screw heads may be damaged and prevent the screws from being properly tightened.
(5) Do not tighten the terminal screws too much, otherwise, the screws may break.
(6) See the table below for the terminal screw tightening torques.

Tightening torque [lbs·in (N·m)]	
M3.5 screw	7.0 to 8.8 (0.8 to 1.0)
M4 screw	10.6 to 15.9 (1.2 to 1.8)
M5 screw	17.7 to 26.5 (2.0 to 3.0)





(7) Fix the conduit with the supporters as shown below.



⚠ CAUTION

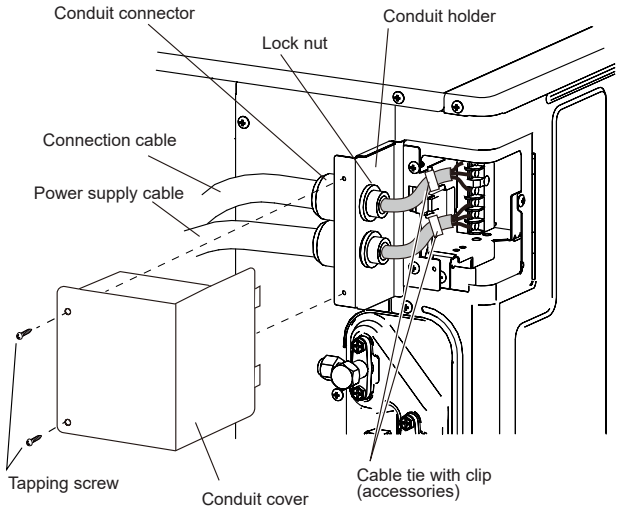
- Match the terminal block numbers and connection cable colors with those of the outdoor unit or branch box. Incorrect wiring may cause a fire.
- Connect the connection cables firmly to the terminal block. Imperfect installation may cause a fire.
- When fixing the connection cable with the cable clamp, always fasten the cable at the plastic jacket portion, but not at the insulator portion. If the insulator is chafed, electric leakage may occur.
- Do not use an earth screw for an external connector. Only use for interconnection between two units.

5.4. Outdoor unit wiring

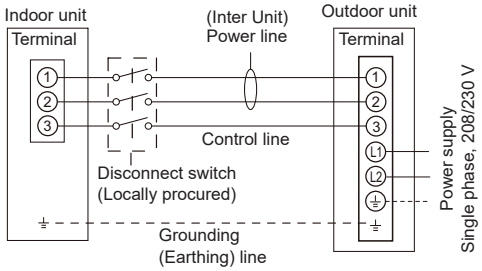
■ Conduit installation

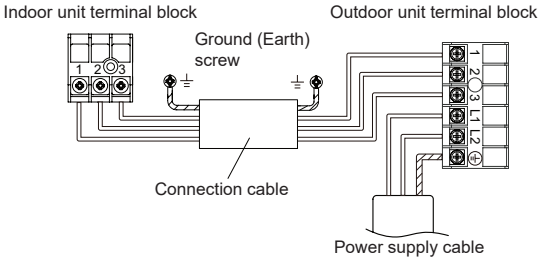
(1) Remove the tapping screws, then remove the conduit cover.
(2) Fasten the connection cable and power supply cable to the conduit holder using the lock nut.
(3) Connect conneciton cable and power supply cable to the terminal block.
(4) Fasten the connection cable and power supply cable with cable tie with clips.
(5) Use the tapping screws to install the conduit cover.

NOTE:
- Connector trade size for this unit is 1/2 inch. The connector can be bought at a hard ware store.



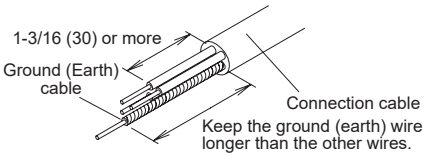
■ Connection diagrams





■ Connection cable preparation

[Unit: in (mm)]

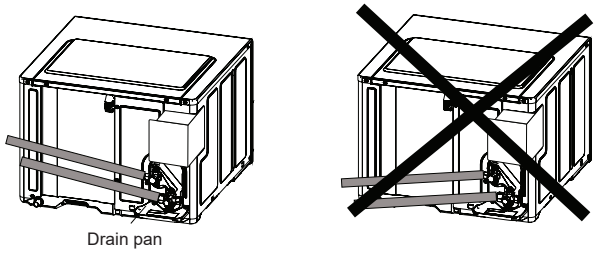


5.5. Connecting the piping

■ Connection

(1) Install the outdoor unit wall cap (supplied with the optional installation set or procured at the site) to the wall pipe.
(2) Connect the outdoor unit and indoor unit piping.
(3) After matching the center of the flare surface and tightening the nut hand tight, tighten the nut to the specified tightening torque with a torque wrench. (Table 1)

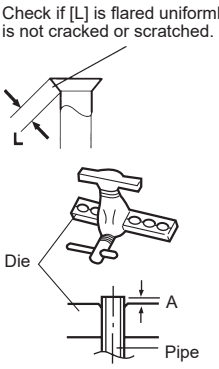
NOTES: Connection pipes should be attached diagonally upward (not parallel) to ensure that the drain water is collected in the drain pan.



■ **Flaring**

(1) Cut the connection pipe to the necessary length with a pipe cutter.
(2) Hold the pipe downward so that cuttings will not enter the pipe and remove the burrs.
(3) Insert the flare nut onto the pipe and flare the pipe with a flaring tool.

Insert the flare nut (always use the flare nut attached to the indoor and outdoor units respectively) onto the pipe and perform the flare processing with a flare tool.
Use the special R410A flare tool, or the R22 flare tool.
When using the conventional flare tool, always use an allowance adjustment gauge and secure the A dimension shown in table 2.



■ **Bending pipes**

(1) When bending the pipe, be careful not to crush it.
(2) To prevent breaking of the pipe, avoid sharp bends.
Bend the pipe with a radius of curvature of 2-3/8 in (70 mm) or over.
(3) If the copper pipe is bend the pipe or pulled to often, it will become stiff. Do not bend the pipes more than three times at one place.

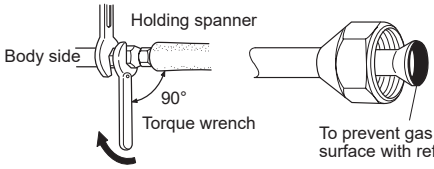


Table 1 Flare nut tightening torque

Flare nut [in (mm)]	Tightening torque [lbf·ft. (N·m)]
1/4 (6.35) dia.	11.8 to 13.3 (16 to 18)
3/8 (9.52) dia.	23.6 to 31.0 (32 to 42)

Table 2 Pipe outside diameter

Pipe outside diameter [in (mm)]	Dimension A [in (mm)]
	Flare tool for R410A, clutch type
ø 1/4 (6.35)	0 to 0.020 (0 to 0.5)
ø 3/8 (9.52)	

⚠ CAUTION

- Fasten a flare nut with a torque wrench as instructed in this manual. If fastened too tight, the flare nut may be broken after a long period of time and cause a leakage of refrigerant.

5.6. Air purge

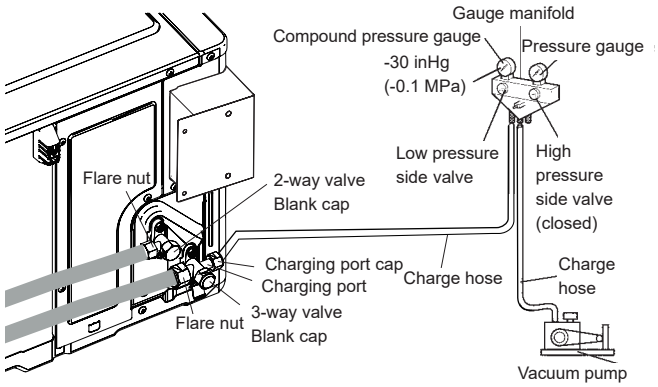
Always use a vacuum pump to purge the air.
Refrigerant for purging the air is not charged in the outdoor unit at the factory.

Close the high pressure side valve of the gauge manifold fully and do not operate it during the following work.

⚠ CAUTION

- Refrigerant must not be discharged into atmosphere.
- After connecting the piping, check the joints for gas leakage with gas leak detector.

(1) Check if the piping connections are secure.
(2) Check that the stems of 2-way valve and 3-way valve are closed fully.
(3) Connect the gauge manifold charge hose to the charging port of the 3-way valve (side with the projection for pushing in the valve core).
(4) Open the low pressure side valve of the gauge manifold fully.
(5) Operate the vacuum pump and start pump down.
(6) Slowly loosen the flare nut of the 3-way valve and check if air enters, then retighten the flare nut.
(When the flare nut is loosened the operating sound of the vacuum pump changes and the reading of the compound pressure gauge goes from minus to zero.)
(7) Pump down the system for at least 15 minutes, then check if the compound pressure gauge reads -30 inHg (-0.1 MPa).
(8) At the end of pump down, close the low pressure side gauge of the gauge manifold fully and stop the vacuum pump.
(9) Slowly loosen the valve stem of the 3-way valve. When the compound pressure gauge reading reaches 0.1-0.2 MPa, retighten the valve stem and disconnect the charge hose from the 3-way valve charging port.
(If the stem of the 3-way valve is opened fully before the charge hose is disconnected, it may be difficult to disconnect the charge hose.)
(10) Fully open the valve stems of the 2-way valve and 3-way valve using a hexagon wrench. (After the valve stem begins to turn, turn it with a torque of less than 2.9 N • m until it stops turning.)
(11) Firmly tighten the 2-way valve and 3-way valve blank cap and the charging port cap.



Blank cap [in (mm)]	Tightening torque [lbf·ft (N·m)]
1/4 (6.35)	14.8 to 18.4 (20 to 25)
3/8 (9.52)	14.8 to 18.4 (20 to 25)
Charging port cap	9.2 to 11.8 (12.5 to 16)

6. TEST RUN

- Perform test operation and check items below.
- For the test operation method, refer to the operating manual.
- The outdoor unit, may not operate, depending on the room temperature. In this case, keep on pressing the MANUAL AUTO button of the indoor unit for more than 10 seconds. The operation indicator lamp and timer indicator lamp will begin to flash simultaneously during cooling test run. Then, heating test run will begin in about three minutes when HEAT is selected by the remote control operation. (Please follow the operating manual for remote control operation.)
- To end test operation, keep on pressing the MANUAL AUTO button of the indoor unit for more than 3 seconds.
(When the air conditioner is run by pressing the MANUAL AUTO button, the OPERATION indicator lamp and TIMER indicator lamp of the indoor unit will simultaneously flash slowly.)

OUTDOOR UNIT

(1) Is there any abnormal noise and vibration during operation?
(2) Will noise, wind, or drain water from the unit disturb the neighbors?
(3) Is there any gas leakage?

7. PUMP DOWN

PUMP DOWN OPERATION (FORCED COOLING OPERATION)

To avoid discharging refrigerant into the atmosphere at the time of relocation or disposal, recover refrigerant by doing the forced cooling operation according to the following procedure.

(1) Conduct preliminary operation for 5 to 10 minutes using the forced cooling operation. Start the forced cooling operation. Keep on pressing the MANUAL AUTO button of the indoor unit for more than 10 seconds. The operation indicator lamp and timer indicator lamp will begin to flash simultaneously during test run. (The forced cooling operation cannot start if the MANUAL AUTO button is not kept on pressing for more than 10 seconds.)
(2) Close the valve stem of 2-way valve completely.
(3) Continue the forced cooling operation for 2 to 3 minutes, then close all the valve stems on the 3-way valves
(4) Stop the operation.
• Press the START/STOP button of the remote controller to stop the operation.
• Press the MANUAL AUTO button when stopping the operation from the indoor unit side.
(It is not necessary to press down for more than 10 seconds.)

⚠ CAUTION

- Please check the refrigerant circuit for any leaks before starting the pump down operation.
- Do not proceed with the pump down operation if there is no refrigerant left in the circuit due to bent or broken piping
- During the pump down operation, be sure to turn off the compressor before removing the refrigerant piping.