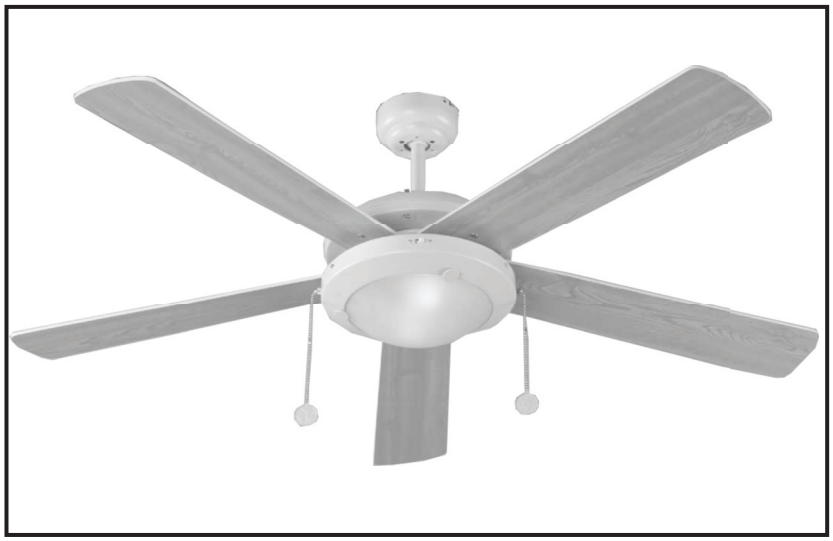
REVOLUTIONS BY Hunter

Owner's Manual



# Solaris Ceiling Fan

Models 21685 21687 21688 21689

- **Assembly & Installation**
- **Operation**

| | |
|---|---|
| Product: | Ceiling Fan |
| Trademark: | Revolutions |
| Quantity: | 1 Piece |
| Electrical Rating: | 120 V ~ 60 Hz 200 W |

NOM

44276-01 r021813

# CONGRATULATIONS!

You have chosen the best. Your new Revolutions ceiling fan will provide you with many years of comfort and satisfaction.

# TABLE OF CONTENTS


Safety Tips ..... 2
Unpacking Your Fan ..... 3
Tools and Materials Required ..... 3
Electrical Outlet Box ..... 4
Install Mounting Bracket ..... 4
Installing the Fan ..... 5
Select Type of Installation ..... 5
Hang Down Style ..... 5
Hugger Style ..... 6
Electrical Connections ..... 7
Blade Attachment ..... 8
Light Fixture Installation ..... 8
Operation ..... 9
Trouble Shooting ..... 10
Maintenance ..... 10

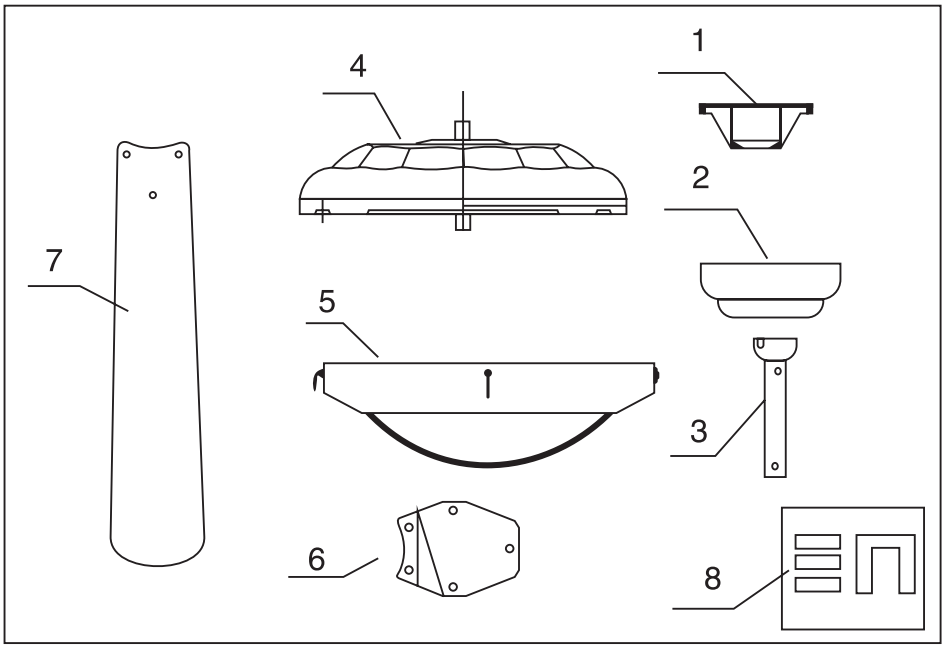
# SAFETY TIPS

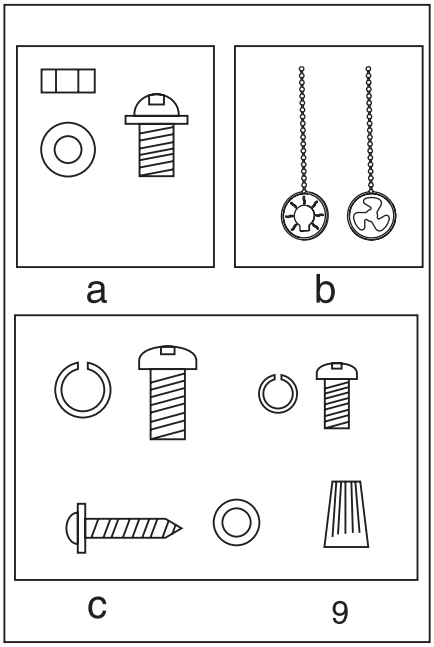
1. To avoid possible electric shock, turn off the electricity at the main fuse box or circuit panel before you begin the fan installation or before servicing the fan or installing accessories.
2. Read all instructions and safety information carefully before installing your fan and save these instructions.
3. Make sure all electrical connections comply with local codes or ordinances and the National Electrical Code. If you are unfamiliar with electric wiring,please use a qualified and licensed electrician.
4. Make sure you have a location selected for your fan that allow clear space for the blades to rotate, and at least seven (7) feet of clearance between the floor and the fan blade tips. The fan should be mounted at least thirty (30) inches from walls or other upright structures.
5. **WARNING**: The outlet box and ceiling support joist used must be securely mounted,and capable of supporting at least 50 pounds.To reduce the risk of fire,electric shock or personal injury,mount to the outlet box marked acceptable for fan supported and use mounting screws provided with the outlet box.The box must be supported directly by the building structure.
6. **WARNING**: To reduce the risk of fire, electric shock or personal injury, mount to outlet box marked " acceptable for fan support" and use mounting screws provided with the outlet box, most outlet boxes commonly used for the support of lighting fixtures are not acceptable for fan support and may need to be replaced. Consult a qualified electrician if in doubt.
7. Electrical diagrams are for reference only. Light kits that are not packed with the fan must be NOM listed and marked suitable for use with the model fan you are installing. Switches must be NOM general use switches. Refer to the instructions packaged with the light kits and switches for proper assembly.
8. After installation is complete,check that all connections are absolutely secure.
9. After making electrical connections, spliced conductors should be turned upward and pushed carefully up into outlet box. The wires should be spread apart with the grounded conductor and the equipment-grounding conductor on one side of the outlet box.
10. **WARNING**: To reduce the risk of electrical shock and fire, do not use this fan with any solid-state fan speed control device,or rheostat.
11. Do not operate the reverse switch until the fan has come to a complete stop.
12. Do not insert anything into the fan blades while they are rotating.
13. **WARNING**: To reduce the risk of personal injury do not bend the blade brackets (also referred to as "flanges") during assembly or after installation. Do not insert objects in the path of the blades.
14. To avoid personal injury or damage to the fan and other items,be cautio s when working around or cleaning the fan.
15. Do not use water or detergants when cleaning the fan or fan blades. A dry dust cloth or lightly dampened cloth will be suitable for most cleaning.

**NOTE**: The important safety precautions and instructions appearing in the manual are not meant to cover all possible conditions and situations that may occur. It must be understood that common sense and caution are necessary factors in the installation and operation of this fan

# UNPACKING YOUR FAN

1. Unpack your fan and check the contents. Do not discard the carton. If warranty replacement or repair is ever necessary,the fan should be returned in original packaging. Remove all parts and hardware. Do not lay motor housing on its side; the decorative casing may shift.
2. Examine all parts. You should have the following:



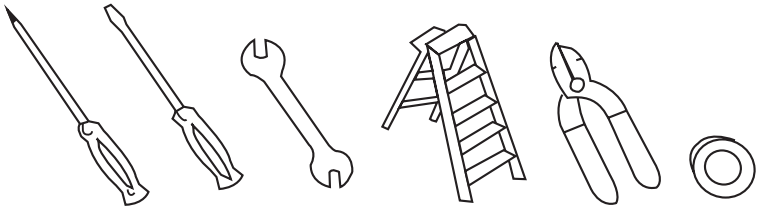




1. Mounting Bracket
2. Canopy
3. Downrod
4. Fan housing, Motor, and Switch Housing
5. Light kit
6. Blade Arms
7. Blade
8. Balance kit
9. Parts Pack Containing:
   a) Blade attachment hardware(blade screws,nut and washers for each blade)
   b) Pull Chain/ Fob
   c) Mounting bracket hardware (extra screw and washer, wire nut, extra motor screw and washer).

Some Revolutions fan models will have slightly different parts than shown here, depending upon the model. Basic installation procedures are similar for all fan models.

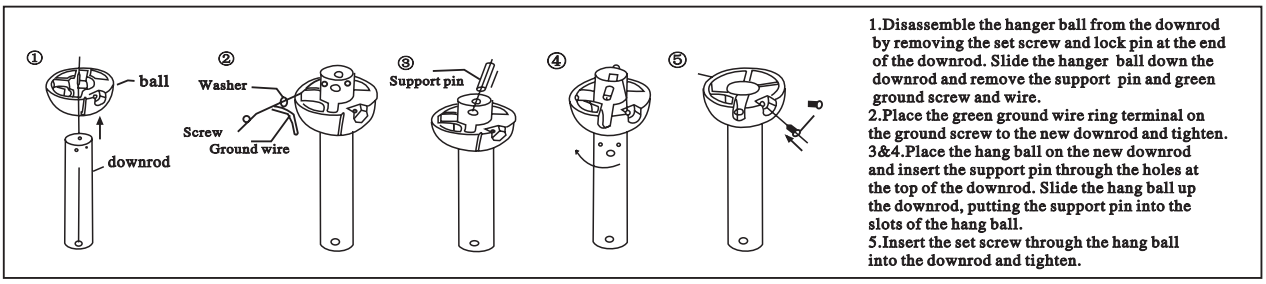
# TOOLS AND MATERIALS REQUIRED

* Phillips screw driver
* Flat Head screw driver
* Adjustable pliers or wrench
* Step Ladder
* Wire cutter
* Electrical tape



# ELECTRICAL OUTLET BOX

1.If there is an existing outlet box, ensure it is NOM listed and clearly marked "Suitable for Fan Support" If not, it must be replaced with an approved one.
2.Secure the outlet box (or make sure the existing box is secured) directly to the building structure.Use appropriate fasteners and building materials. Wood joist and outlet box must be able to support a minimum of 50 pounds.
3.Figures 1,2,and 3 are examples of different ways to mount the outlet box in different situations. A longer downrod may be required in sloped ceiling situations to maintain proper blade clearance.
4.To hang the fan in locations where no ceiling joist is available, a hanger support bar may be required(Fig.4)




1.Disassemble the hanger ball from the downrod by removing the set screw and lock pin at the end of the downrod. Slide the hanger ball down the downrod and remove the support pin and green ground screw and wire.
2.Place the green ground wire ring terminal on the ground screw to the new downrod and tighten.
3&4.Place the hang ball on the new downrod and insert the support pin through the holes at the top of the downrod. Slide the hang ball up the downrod, putting the support pin into the slots of the hang ball.
5.Insert the set screw through the hang ball into the downrod and tighten.

Fig.1

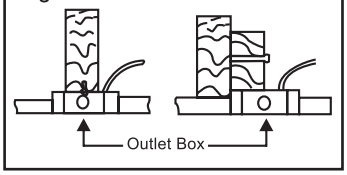



Fig.2

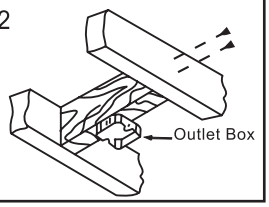



Fig.3

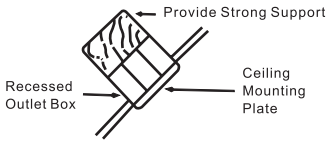
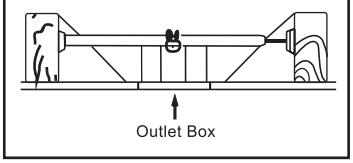



Fig.4




# INSTALL MOUNTING BRACKET

1.To avoid possible electrical shock, be sure electricity is turned off at the main power panel before wiring.All wiring must be in accordance with National and Local Electrical Codes, and the ceiling fan must be grounded as a precaution against possible electrical shock.
2.Use mounting hardware.

METHOD A
Attach mounting bracket to outlet box using screws provided with the outlet box (Fig. 5a) Install rubber washers in between the ceiling and mounting bracket to reduce vibration.

METHOD B
The mounting bracket can also be installed to the wooden structure of the ceiling joist with two wood screws provided. (Fig.5b)

Fig.5a

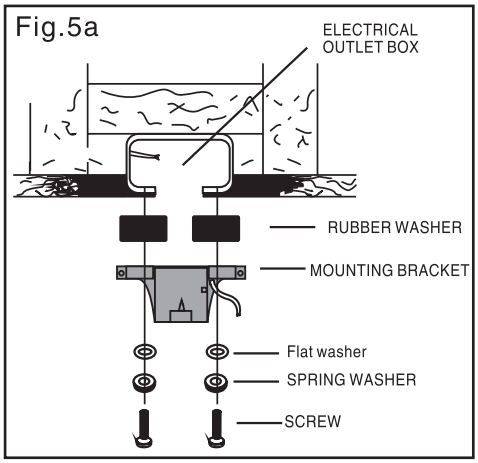
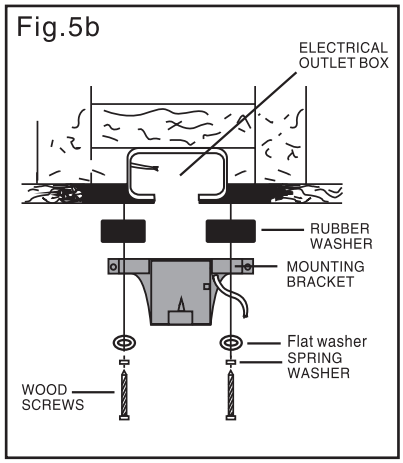



Fig.5b




**CAUTION:**Electrical box must be wired to NOM general use wall switch. To reduce the risk of injury, turn off power at wall switch or main fuse or circuit breaker before attempting installation or servicing.

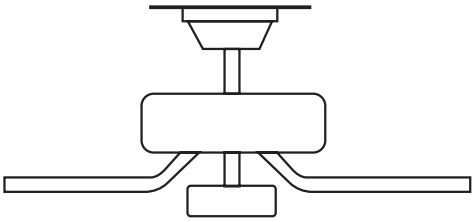
**WARNING:**To avoid fire or shock,follow all wiring instructions carefully. Any electrical work not described in these instructions should be done or approved by a licensed electrician.

**WARNING:**To reduce the risk of fire,Electric shock, or personal injury,mount to outlet box marked acceptable for fan support and use mounting screws provided with the outlet box. Most outlet boxes commonly used for the support of lighting fixtures are not acceptable for fan support and may need to be replaced.Consult a qualified electrician if in doubt.

# INSTALLING THE FAN

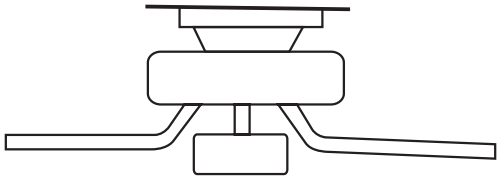
## SELECT TYPE OF INSTALLATION

### HANG DOWN



This method is preferred if the ceiling is sloped or vaulted,or if ceiling is extra high, requiring the use of a downrod.

### HUGGER



This method is preferred if maximum headroom is required. The ceiling must be horizontal not sloped.

**WARNING:** The fan must be hung with at least 7' of clearance from floor to blades.

## HANG DOWN STYLE

1. Slide the canopy onto the downrod (Fig. 6). Thread the power leads from the fan through the canopy and downrod. Take care not to pull excessively on power wires. Damage and loose connections could result from any abnormal pressure on these wires. Set downrod into yoke. Rotate until the holes match. Be careful not to damage wiring. Insert connector pin through the holes (Fig. 6A and 6B). Secure the pin by inserting the stop pin through the connector pin.

Fig. 6

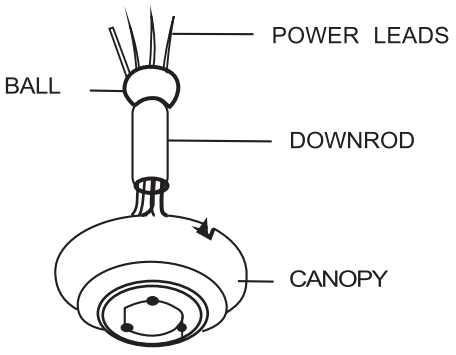



Fig. 6A

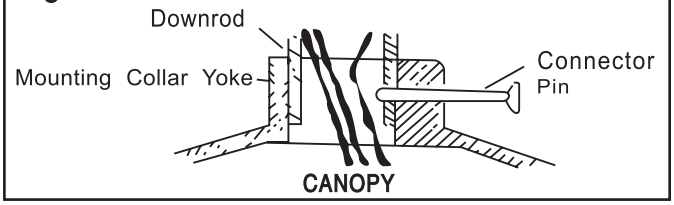
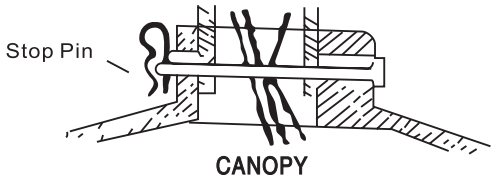



Fig. 6B




**WARNING :** Do not force connector pin through downrod.Use of force could cause damage to wires inside.Make sure the stop pin is properly engaged to prevent it from falling out. Failure to properly install locking pin as noted could result in fan loosening and possibly falling.

2. Tighten the two downrod setscrews. Some models have locknuts for the setscrew to ensure the setscrew is fully seated against the downrod. It is necessary to back off the locknut until it contacts the setscrew head prior to tightening the setscrew. When the setscrew is tightened against the downrod, the locknut should then be tightened against the connector yoke. Repeat for both (Fig. 7).
3. Tighten the motor setscrew. Check the strength of the connection (pre-tightened at the factory) by holding the motor housing in position and turning the downrod counter clockwise. If this connection slips, retighten the motor setscrew and locknut. Follow the same procedure mentioned above for the downrod setscrews.
4. Install ball into hanger bracket opening. The tab opposite of the hanger bracket opening should fit in slot on ball (Fig. 8).
5. Make wire connections (refer to section titled "Electrical Connections").
6. Slide the canopy up and fasten to the hanger bracket with the four screws provided.

**WARNING: To avoid damaging the blade arms and blades, do not install either until the fan is fastened to the ceiling. To avoid motor shift, handle fan by downrod or switch housing only.**

Fig.7

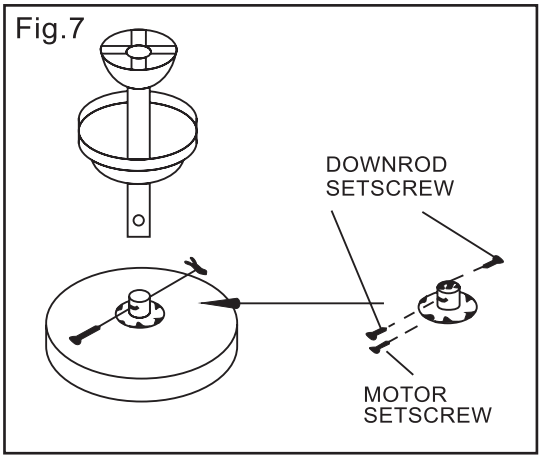
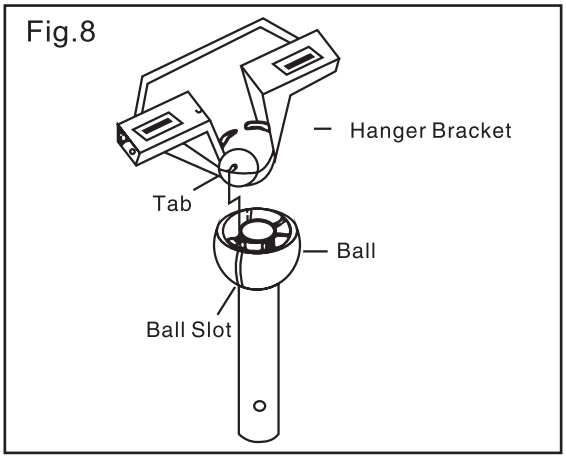



Fig.8




# HUGGER STYLE

1. Fasten the canopy directly to the top of the fan motor housing with the three screws provided. (The downrod and ball are not used for this installation). (Fig. 9A) If a metal ring washer with three holes is provided, use it to install the canopy.
2. Hang the canopy (with the fan motor housing attached) from the tab on the hanger bracket (Fig. 9B). This will allow you to make the electrical connections without having to hold the fan up.
3. Make the wire connections (refer to section titled "Electrical Connections").
4. Put two screws in the hanger bracket, leaving them partially out (Fig. 9C).
5. Place the canopy up on the hanger bracket by inserting the slotted opening of the canopy on the screws (Fig. 9D).
6. Insert the remaining screws through the remaining canopy holes and tighten all four screws.

**WARNING: Failure to completely tighten the screws in step 1 could result in fan loosening and possibly falling.**

Fig.9A

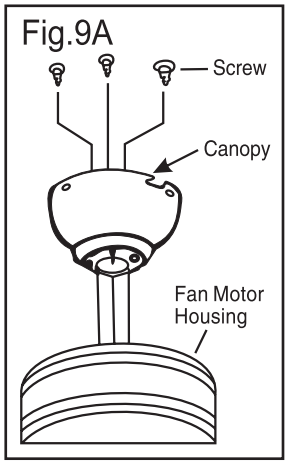



Fig. 9B

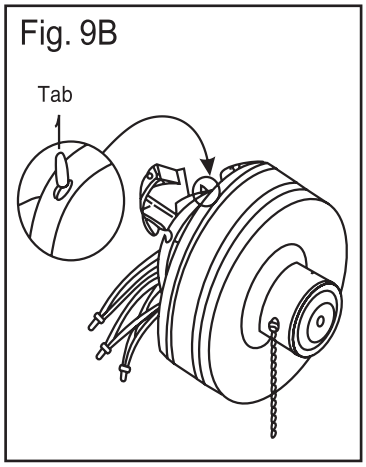



Fig.9C

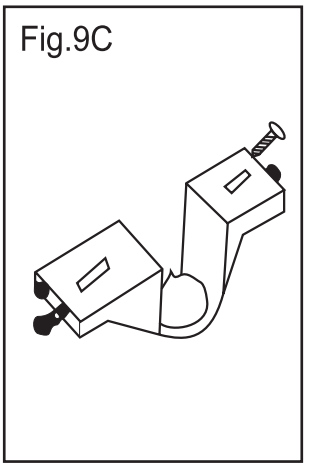
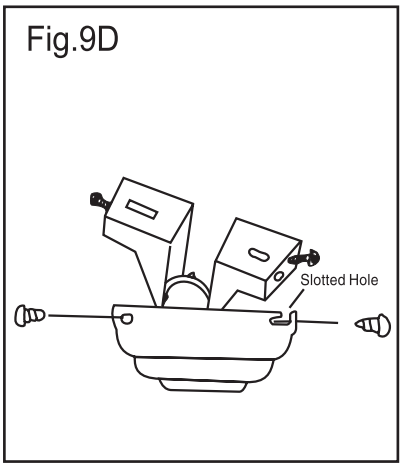


Fig.9D



# ELECTRICAL CONNECTIONS

1. Four wires are connected to the top of the fan.
   Black: "Hot" Power for the fan
   Blue: "Hot" Power for the Light
   White: "Common" For the fan and light
   Green: Ground Wire
2. If fan and light are to be connected to the same circuit , the black and blue wires should be connected together to the black wire in the ceiling using a wire nut to make the connection. If a light kit is not being installed, the blue wire should be left unconnected.
3. The white wire from the fan should be connected to the white wire in the ceiling, using a wire nut to make the connection.
4. The green wire from the fan should be connected to the ground wire in the ceiling, using a wire nut to make the connection.
5. Tuck your completed wiring back up into the electrical box.

Fig. 10A

Fan controlled by pull chain switch.
Light controlled by chain switch on light.

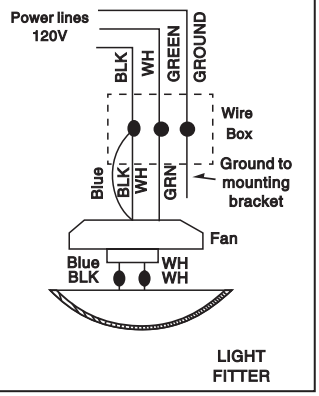



Fig. 10B

Light controlled from wall switch.
Fan controlled by chain switch

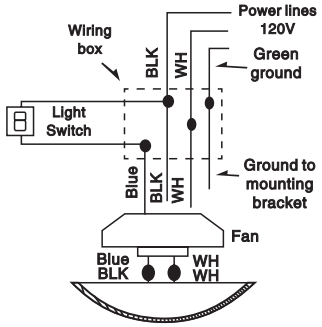
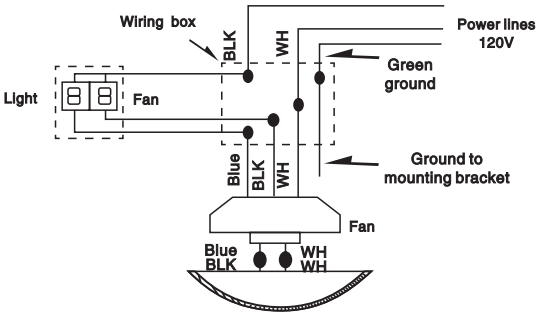



Fig. 10C

Fan and light controlled by independent wall switches.




**WARNING:** To avoid possible electrical shock, be sure electricity is turned off at the main fuse box before wiring.

**NOTE:** If you are not sure the electrical box and fan are grounded, contact a licensed Electrician for advice. They must be grounded for safe operation.

**WARNING:** Each wire nut (wire connector) supplied with this fan is designed to accept up to one 12 gauge house wire and two wire from the fan. If you have larger than 12 gauge house wiring or more than one house wire to connect to the fan wiring, consult an Electrician for the proper size wire nut to use.

**WARNING:** Check to see that all connections are tight, and that no bare wire is visible at the wire nuts.

# BLADE INSTALLATION

**Attach blade brackets to blades using the blade bracket screws (1), metal washers (2), fabric washers (3), and nuts (4) provided. (Fig.11)**
**Check the motor for plastic shipping stabilizer tabs (1), and remove them if they are present. Attach blade assembly to motor using the noise-dampening motor gaskets (2). And motor screws provided. Tighten screws securely. (Fig.11B)**

Fig. 11

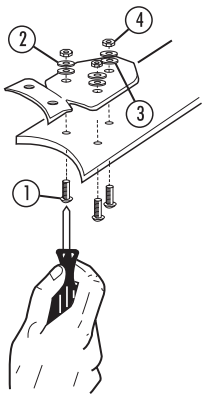
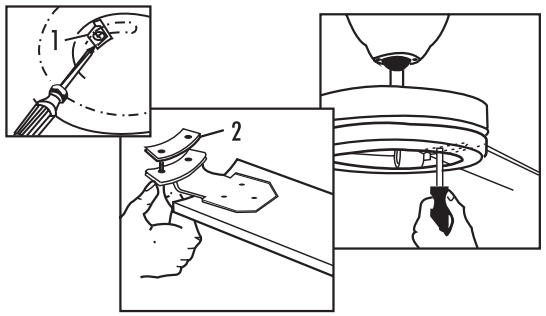



Fig. 11B




# LIGHT FIXTURE INSTALLATION

Attach the blue wire plug from the fan to the black wire plug from the light kit. Attach the white wire plug from the fan to the white wire plug from the light kit. Attach the light kit to the switch housing using three small screws provided (Fig. 12).
Install light bulbs (not included). Slide fan pull chain through hole in glass bowl and metal cap (Fig. 12B).

Fig. 12

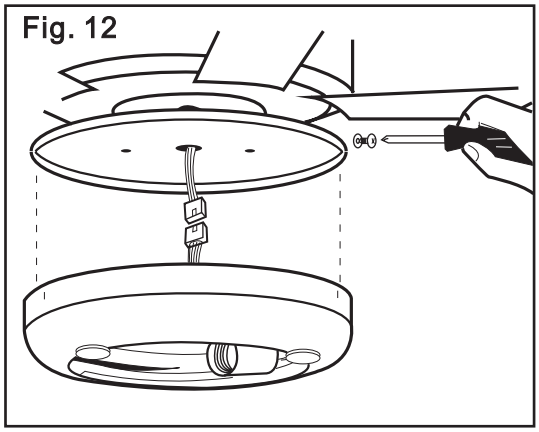


Fig. 12B

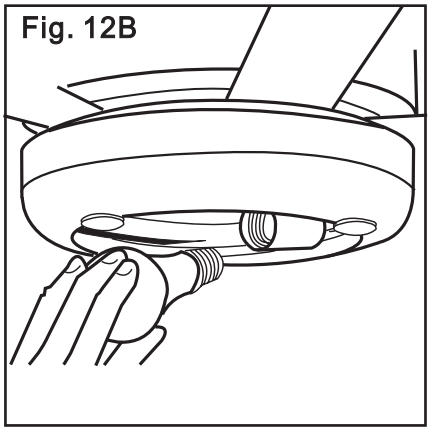
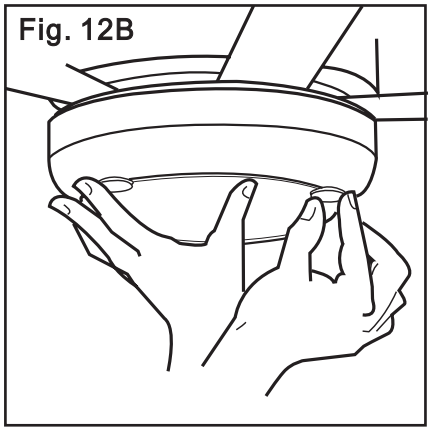
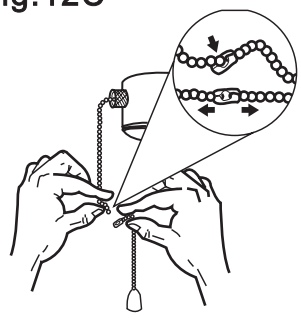


Fig. 12B



Assemble decorative fob and extension chains from hardware bag to the fan pull chains by inserting end of chain into chain coupling. Confirm chains are held by lightly pulling both chains in coupling (Fig. 12C).

Fig.12C

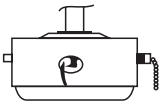


# OPERATION

1. Restore electrical power by turning on the electricity at the main fuse box.
2. Turn on the wall switch.
3. Your fan has 2 controls on the switch housing.

SPEED CONTROL
Pull Chain Switch
(tug gently)

Pull Speed
1 High
2 Medium
3 Low
4 Off



DIRECTION CONTROL
Reverse Slide Switch
(up and down)

Up for upward air flow to circulate air upward Down for downward air flow for a cooling effect.

Turn the fan off and let the blades stop before changing setting of reverse slide switch. Your ceiling fan is a sensible choice to cool as well as help you warm your living area. You will have a reduction in both heating and cooling costs by regular use of your fan. In summer, put the reverse switch in the forward position so air is blown down, producing a cooling breeze. In winter, reverse the fan so an upward air flow will push warm air off the ceiling and balance the temperature in the room. In winter, run the fan at a lower speed than in the summer.

Fig.13

**WARM WEATHER-FORWARD**
Air Flow Direction-Downward

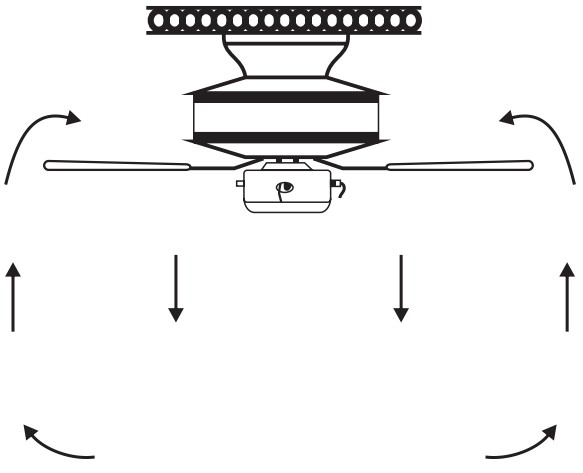
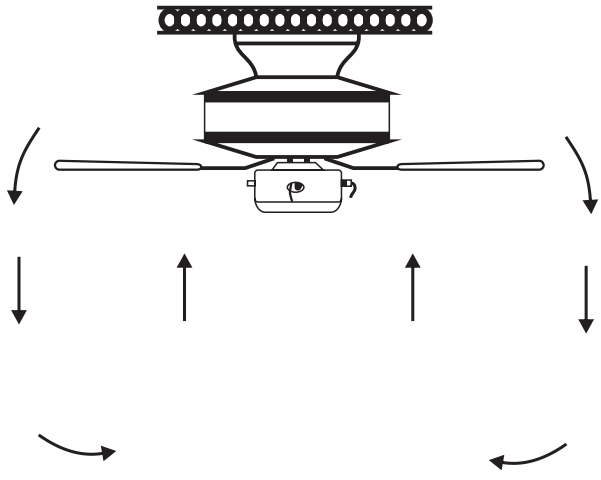


Fig.14

**COOL WEATHER-REVERSE**
Air Flow Direction-Upward



# TROUBLE SHOOTING

**FAN WILL NOT START:**

1.Check all fuses or circuit breakers. Replace if missing.
2.Turn off electrical power and check all wire connections to fan and in switch housing.

**FAN IS NOISY:**

1.Use of standard light rheostat or continuously variable fan speed wall control will always cause harmonic distortions, or a humming noise. Many fan motors do not work quietly with solid state variable controls. If a quiet wall control is desired, use only 3-speed NOM approved wall controls.
2.Always allow a few days " break in " time for any new fan at medium or high speed. Try todiagnose the exact location of the noise by listening carefully from several sides (Blades, Motor, Light Kit, etc ...). Fan noise can come from a light kit.
3.Make sure all screws in the fan assembly and light kit are tight and properly threaded.If not, back out and retighten. Tighten these screws at least once a year because they may loosen slowly over time and cause a clicking noise.
4.Make sure the light kit is securely fastened to the fan and all glass screws are finger tightened only. Do not tighten with pliers or a screw driver.
5.Make sure mounting bracket is installed snugly to junction box.
6.Make sure wire nuts in switch housing or canopy are not rattling against each other or against wall of housing. Wrap with electrical tape if necessary.
7.Make sure the canopy is not touching the ceiling.
8.Assure that the screws fastening blade Arm to motor are tight and the lock washers provided for that purpose have been used.

**FAN TURNS BUT DOES NOT MOVE MUCH AIR:**

1.The fan may be running in reverse, so air is directed upward.
2.The room may contain items that obstruct the air flow.
3.The fan may be too small for size of the room.

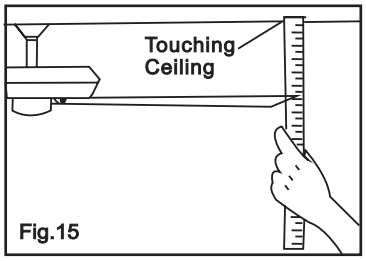


Fig.15

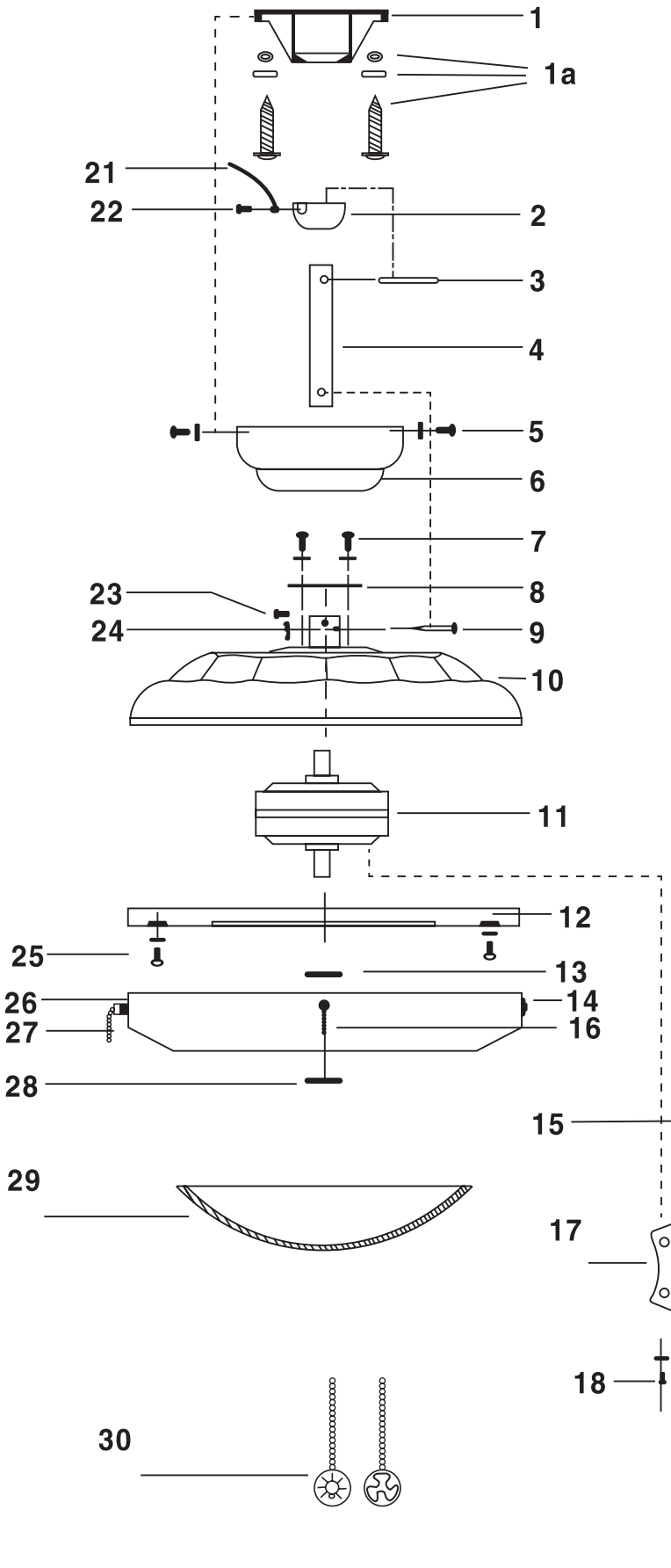
**FAN SHAKES OR WOBBLES:**

1.A small amount of movement is considered acceptable and should not be considered a defect.
2.Make sure mounting bracket is tight at junction box/ceiling with no movement at all. Tighten screws if necessary.
3.Make sure all screws holding the blades to the blade arm and blade arm to motor are tight. Make sure ligt kit/glass screws are tight.
4.Some fan movement is normal. However,interchanging an adjacent (side-by-side) blade pair may redistribute the weight and result in smooth operation.
5.Most fan wobble problems are caused when blade levels are unequal. Check this level by selecting a point on the ceiling above the tip of one of the blades. Measure this distance as shown in Figure 15. Measurements deviation should always be within 1/8". Rotate the fan until the next blade is positioned for measurement. Repeat for each blade.

# MAINTENANCE

1.The fan's natural movements may cause some connections to loosen. A clicking or rattling noise is a certain sign of loosening screws. Check the support connections, brackets, and blade attachments twice a year, and tighten all screws as necessary. Make sure all screws attaching the glass to the fitter on the light kit are finger tight. Do not use a screw driver or pliers to tighten glass screws.
2.Clean your fan periodically. Use only a cloth dampened with a mild detergent solution. Never use solvents. Dust with a soft cloth or brush. Metal finishes are finished with a lacquer to prevent tarnishing
3.You will never need to oil your fan. Its permanently sealed bearings will provide silent,trouble free operation for many years.
4.Make sure the power is turned off at the main fuse or circuit panel before you attempt any repairs.

# Revolutions 52" Solaris Indoor Ceiling Fan




| PART# | DESCRIPTION | QTY |
|---|---|---|
| 1 | Mounting bracker | 1 |
| 1a | Wooden screws, spring washer,flat washer | 2 |
| 2 | Ball | 1 |
| 3 | Pin | 1 |
| 4 | Downrod | 1 |
| 5 | Screws | 4 |
| 6 | Canopy | 1 |
| 7 | Screws | 3 |
| 8 | Reinforce plate | 1 |
| 9 | Pin | 1 |
| 10 | Upper housing | 1 |
| 11 | Motor | 1 |
| 12 | Lower housing | 1 |
| 13 | Nut | 1 |
| 14 | Reverse switch | 1 |
| 15 | Nut & Washers | 15 |
| 16 | Pull chain switch | 1 |
| 17 | Blade arms | 5 |
| 18 | Screws | 10 |
| 19 | Screws | 15 |
| 20 | Blades | 5 |
| 21 | Ground wire | 1 |
| 22 | Screw | 1 |
| 23 | Screw | 1 |
| 24 | Lock pin | 1 |
| 25 | Screws | 4 |
| 26 | Light housing | 1 |
| 27 | Pull chain switch | 1 |
| 28 | Nut | 1 |
| 29 | Glass shade | 1 |
| 30 | Fobs | 2 |