

# BE

## PORTABLE GAS GENERATOR



User Manual  
BE-12000ER

**BEPOWEREQUIPMENT**

**.COM**



**Introduction**

4 Using the Operators Manual

**Product Identification**

5 Generator

5 Engine

**Safety**

6 Safety Rules

6 Hazard Symbols and Meanings

9 Ground Fault Circuit Interrupter Protection

11 Important Safety Instructions

**Glossary**

13 Glossary

**Generator Components**

14 12000ER Component Chart

15 Spare Parts List

17 Sockets

**Features**

18 Features

**Operation**

19 Unit Grounding

**Starting the Generator**

19 Filling Oil

20 Oil Specification Chart

20 Filling Fuel

21 Turn On The Fuel Valve Lever

21 Close The Choke Valve

21 Start The Generator

22 Start The Generator Recoil Start

22 Open The Choke Valve

23 Connect To Load



**Stopping the Generator**

23 Disconnect Load

23 Turn Off The Engine Switch

24 Close The Fuel Valve Lever

**Storage**

24 Drain The Fuel

24 Protective Treatment

**Transporting**

25 Transporting

**Accessories**

26 Accessory Installation

26 Two-Wheel Short Axle

**Maintenance**

27 Maintenance Chart

28 Replace Engine Oil

28 Clean Air Cleaner

29 Clean The Fuel Valve Lever Sediment Cup

29 Clean The Spark Plug

30 Valve Clearance

**Troubleshooting**

31 Troubleshooting Chart

32 Troubleshooting Analysis

**Diagrams**

33 Electrical Schematic Diagram 1

34 Electrical Schematic Diagram 2



**Attention: Read through the complete manual prior to the initial use of your generator.**

### **Using the Operator's manual**

The operating manual is an important part of your generator. It should be read thoroughly before initial use, and referred to often to make sure adequate safety and service concerns are being addressed.

Reading the owner's manual thoroughly will help avoid any personal injury or damage to your machine. By knowing how best to operate this machine you will be better positioned to show others who may also operate the unit.

This manual contains information for the complete range of BE generators, and was written to take you from the safety requirements to the operating functions of your machine. You can refer back to the manual at any time to help troubleshoot any specific operating functions, so store it with the machine at all times.

### **Record Identification Numbers**

#### **Generator**

If you need to contact an Authorized Dealer or Customer Service line (1-866-850-6662) for information on servicing, always provide the product model and identification numbers.

You will need to locate the model and serial number for the machine and record the information in the places provided below.

#### **Date of Purchase:**

#### **Dealer Name:**

#### **Dealer Phone:**

### **Product Identification Numbers**

#### **Model Number:**

#### **Serial Number:**

## Save these Instructions

### SAFETY RULES




This is the safety alert symbol. It is used to alert you to potential personal injury hazards. Obey all safety messages that follow this symbol to avoid possible injury or death.



The safety alert symbol (▲) is used with a signal word (DANGER, CAUTION, WARNING), a pictorial and/or a safety message to alert you to hazards.

|   |
|---|
| <b>DANGER</b> indicates a hazard which, if not avoided, will result in death or serious injury.   |
| <b>WARNING</b> indicates a hazard which, if not avoided, could result in death or serious injury.   |
| <b>CAUTION</b> indicates a hazard which, if not avoided, might result in minor or moderate injury.  |
| <b>NOTICE</b> indicates a situation that could result in equipment damage. Follow safety messages to avoid or reduce the risk of injury or death. |

### HAZARD SYMBOLS AND MEANINGS

|   |   |   |   |
|---|---|---|---|
|  |  |  |  |
| EXPLOSION   | FIRE  | BURNING   | ELECTRIC SHOCK  |
|  |  |  |   |
| TOXIC FUMES   | KICKBACK  | READ MANUAL   |   |

| <b>▲ WARNING</b>   |   |
|--|---|
|   | Generator exhaust contains carbon monoxide, a poisonous gas that can kill you.<br>You CANNOT smell or see this gas. |
| <ul style="list-style-type: none"> <li>▪ Use the generator outdoors, away from open windows, vents, or doors that could allow the carbon monoxide gas to come indoors. Keep the generator at least 1 meter (3 feet) away from any structure or building during use.</li> <li>▪ NEVER use a generator indoors, including in homes, garages, basements, crawl spaces, and other enclosed or partially-enclosed areas, even with ventilation. Opening doors and windows or using fans will not prevent carbon monoxide build-up in the home.</li> <li>▪ NEVER use a generator in enclosed or partially-enclosed spaces. Generators can produce high levels of carbon monoxide very quickly. When you use a portable generator, remember that you cannot smell or see carbon monoxide. Even if you can't smell exhaust fumes, you may still be exposed to carbon monoxide.</li> <li>▪ NEVER operate the generator in an explosive atmosphere, near combustible materials or where ventilation is not sufficient to carry away exhaust fumes. Exhaust fumes can cause serious injury or death.</li> <li>▪ If you start to feel sick, dizzy, or weak while using a generator, get to fresh air RIGHT AWAY. DO NOT DELAY. The carbon monoxide from generators can rapidly lead to full incapacitation and death.</li> <li>▪ If you experience serious symptoms, get medical attention immediately. Inform medical staff that carbon monoxide poisoning is suspected. If you experienced symptoms while indoors, have someone call the fire department to determine when it is safe to re-enter the building.</li> </ul> |   |

|  |   |
|--|---|
| <b>⚠ WARNING</b>   |   |
| <br>   | <p>Fuel and its vapors are extremely flammable and explosive.</p> <p>Fire or explosion can cause severe burns or death.</p> |
| <p><b>When Adding or Draining Fuel</b></p> <ul style="list-style-type: none"> <li>▪ Observe all safety regulations for the safe handling of fuel. Handle fuel in safety containers. If the container does not have a spout, use a funnel.</li> <li>▪ Do not overfill the fuel tank, leave room for the fuel to expand.</li> <li>▪ Do not refill fuel tank while the engine is running. Before refueling the generator, turn it off and let it cool down. Gasoline spilled on hot engine parts could ignite.</li> <li>▪ Fill the tank only on an area of bare ground. While fueling the tank, keep heat, sparks and open flame away. Carefully clean up any spilled fuel before starting engine.</li> <li>▪ Always fill fuel tank in an area with plenty of ventilation to avoid inhaling dangerous fumes.</li> <li>▪ NEVER store fuel for your generator in the home. Gasoline, propane, kerosene, and other flammable liquids should be stored outside of living areas in properly-labeled, non-glass safety containers. Do not store them near a fuel-burning appliance, such as a natural gas water heater in a garage. If the fuel is spilled or the container is not sealed properly, invisible vapors from the fuel can travel along the ground and can be ignited by the appliance's pilot light or by arcing from electric switches in the appliance.</li> </ul> |   |

**WARNING:** This product can expose you to chemicals including lead, which is known to the State of California to cause cancer and birth defects or other reproductive harm. For more information, go to [www.P65Warnings.ca.gov](http://www.P65Warnings.ca.gov). Wash hands after handling.

**GROUND FAULT CIRCUIT INTERRUPTER PROTECTION**

These generators are equipped with a GFCI (Ground Fault Circuit Interrupters) 120V duplex receptacles for protection against the hazards of electrical shock from defective attachments such as, tools, cords, and cables.



|  |
|--|
| <b>⚠ WARNING</b>   |
| <p>The GFCI may not function unless the generator is properly grounded. Follow the correct procedure specified in the section labeled <b>GROUNDING INSTRUCTIONS</b>.</p> |

A GFCI is a device that interrupts electricity from either the utility or generator by means of a special type of circuit breaker that determines if a current flow to the ground occurs.



A GFCI can be used only with generators that have the neutral wire internally bonded to the frame, and the frame properly grounded to the earth. A GFCI will not work on generators that do not have the neutral wire bonded to the frame, or on generators which have not been properly grounded. All BE generators have internally bonded ground wires.

**THERE IS A PERMANENT CONDUCTOR BETWEEN THE GENERATOR (STATOR WINDING) AND THE FRAME.**

This product has been designed with internal grounding or floating bonded neutral. If it should malfunction or breakdown, grounding provides a path of least resistance for electric current to reduce the risk of electric shock.

|  <b>DANGER</b>   |  |
|---|--|
|    | <p>Improper grounding can result in a risk of electrocution. Check with a qualified electrician for your local requirements if you are in doubt as to whether the unit is properly grounded.</p> |
| <p>This generator is equipped with a grounding terminal for added protection. Using the ground path from the generator to an external ground source as instructed in the section labeled "Grounding Instructions" in the Preparation section of this manual can be necessary. Please consult a qualified electrician for local regulations.</p> <p>The generator is a potential source of electrical shock if not kept dry. Keep the generator dry and do not use in rain or wet conditions. To protect from moisture, operate it on a dry surface under an open, canopy-like structure. Dry your hands if wet before touching the generator.</p> <p>Plug appliances directly into the generator. Or, use a heavy duty, outdoor-rated extension cord that is rated (in watts or amps) at least equal to the sum of the connected appliance loads. Check that the entire cord is free of cuts or tears and that the plug has all three prongs, especially a grounding pin.</p> <p>NEVER try to power the house wiring by plugging the generator into a wall outlet, a practice known as "back feeding". This is an extremely dangerous practice that presents an electrocution risk to utility workers and neighbors served by the same utility transformer. It also bypasses some of the built-in household circuit protection devices.</p> <p>If you must connect the generator to the house wiring to power appliances, have a qualified electrician install the appropriate equipment in accordance with local electrical codes.</p> |  |

### IMPORTANT SAFETY INSTRUCTIONS

|  <b>WARNING</b> |  |
|--|--|
|                 | <p>To reduce the risk of injury, read this operator's manual completely before using.</p> <p>When using this product, the following basic precautions should always be followed.</p> |

- Do not enclose the generator or cover it. The generator may become overheated if it is enclosed. If generator has been covered to protect it from the weather during non use, be sure to remove it and keep it well away from the area during generator use.
- Operate the generator on a level surface. It is not necessary to prepare a special foundation for the generator. However, the generator will vibrate on an irregular surface, so choose a level place.
 

If the generator is tilted or moved during operation, fuel may spill and/or the generator may tip over, causing a hazardous situation.

Proper lubrication cannot be expected if the generator is operated on a steep incline or slope. In such a case, piston seizure may occur even if the oil is above the upper level.
- Pay attention to the wiring or extension cords from the generator to the connected device. If the wire is under the generator or in contact with vibrating part, it may break and possibly cause a fire, generator burnout, or electric shock hazard. Replace damaged or worn cords immediately.
- Do not operate in rain, in wet or damp conditions, or with wet hands. The operator may suffer severe electric shock if the generator is wet due to rain or snow. If wet, wipe and dry it well before starting. Do not pour water directly over the generator, nor wash it with water.
- Be extremely careful that all necessary electrical grounding procedures are followed during each and every use. Failure to do so can be fatal.
- DO NOT smoke while charging a battery. The battery emits flammable hydrogen gas, which can explode if exposed to electric arcing or open flame. Keep the area well ventilated and keep open flames / sparks away when charging a battery.
- The engine becomes extremely hot during and for some time after operation. Keep combustible materials well away from generator area. Be very careful not to touch any parts of the hot engine especially the muffler area or serious burns may result.

- Keep children and all bystanders at a safe distance from work area.
- It is absolutely essential that you know the safe and proper use of the power tool or appliance that you intend to use. All operators must read, understand and follow the tool / appliance owners manual. Tool and appliance applications and limitations must be understood. Follow all directions given on labels and warnings. Keep all instruction manuals and literature in a safe place for future reference.
- Use only "LISTED" extension cords. When a tool or appliance is used outdoors, use only extension cords marked "For Outdoor Use". Extension cords, when not in use should be stored in a dry and well ventilated area.
- Always switch off generator's AC circuit breaker and disconnect tools or appliances when not in use, before servicing, adjusting, or installing accessories and attachments.
- Make sure the engine is stopped before starting any maintenance, servicing or repair.

NOTE: Make sure maintenance and repair of the generator are performed by properly trained personnel only.

**SAVE THESE INSTRUCTIONS**

**Glossary**

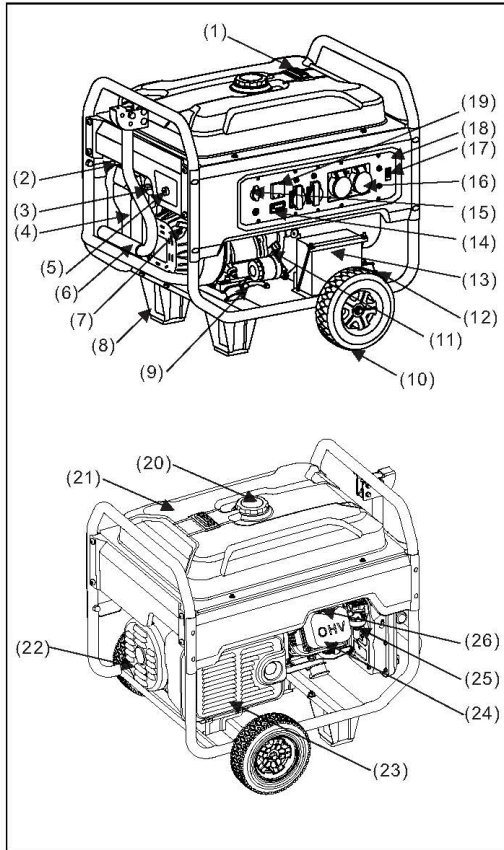
Following symbols are quoted on the machine or in this manual. Please understand their meaning, which will make your operation easier and safer.

| SYMBOL | NAME                   | MEANING  |
|--------|------------------------|--|
| V      | Volt                   | Voltage  |
| A      | Ampere                 | Current  |
| Hz     | Hertz                  | Frequency (1Hz=60 r/min)                               |
| W      | Watt                   | Power  |
| RPM    | Revolutions per Minute | Engine Speed   |
| PF     | Power Factor           | Load transfer efficiency                               |
| G1     | Performance Rate       | Generator output power performance rate meat ISO8528G1 |



Read this operator's manual and safety rules before operating your generator.

### BE-12000ER 12000WATT



- 1) Fuel Gauge
- 2) Chock Valve
- 3) Fuel Valve Lever
- 4) Air Cleaner
- 5) Engine Switch
- 6) Handrail Pipe
- 7) Starter Grip
- 8) Foot
- 9) Oil Drain Bolt
- 10) Wheel
- 11) Oil Filler Cap
- 12) Ground Terminal
- 13) Battery
- 14) Timer
- 15) DC Output
- 16) AC Output
- 17) AC Circuit Breaker
- 18) Panel Seat
- 19) Voltmeter
- 20) Fuel Tank Cap
- 21) Fuel Tank
- 22) Cover, Generator End
- 23) Muffler
- 24) Cylinder Head
- 25) Carburetor
- 26) Spark Plug

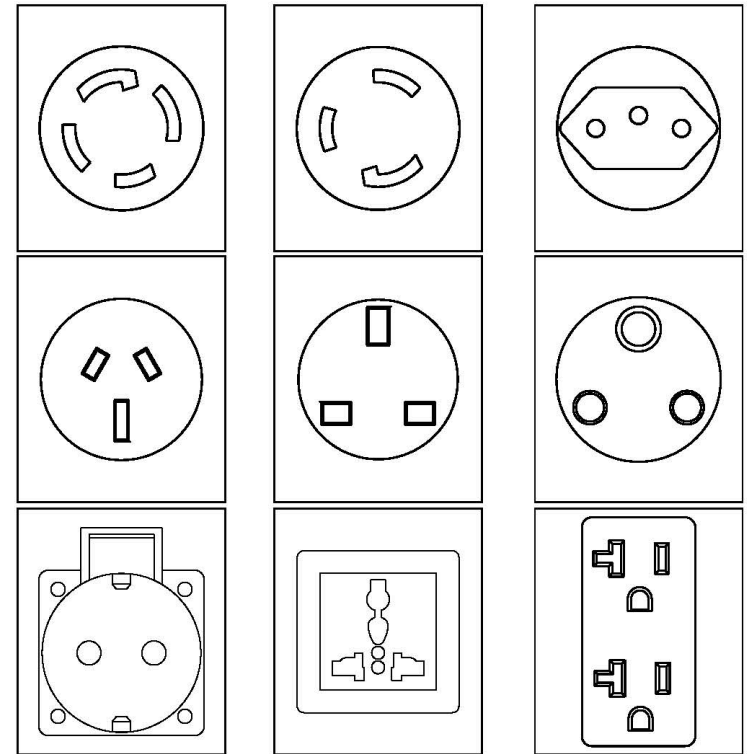
### SPARE PARTS LIST

|                    |   |
|--------------------|---|
| Fuel Tank          | It is used to hold fuel, gasoline is allowed only.  |
| Fuel Tank Cap      | Screw the fuel injection port in use and do not open it in equipment operation.   |
| Fuel Gauge         | It is to indicate fuel level in the fuel tank.  |
| AC Output          | AC output socket provides the power supply. Please refer to models parameter table for its rated power. Load of each socket cannot exceed its rated current and total power of electric device cannot surpass rated power of the generator. Do not start up several electric devices simultaneously, but switch on another one after stable operation of one electric device. |
| AC Circuit Breaker | It will break to protect the electric device when current is too heavy.   |
| Output Indicator   | It is to indicate power supply status. The indicate will brighten up when the equipment operation.  |
| DC Output          | The output DC is 12V with maximum of 8.3A. It is only used for automotive battery charging with rated 12V. Pay attention to connecting the positive and negative electrode correctly.   |
| Engine Switch      | It is to start up (applicable to electrical starting only) and switch off the engine. Turn to the off state in non use.   |
| Wheel (optional)   | It is for moving the generator in a short time.   |
| Battery            | It is for starting up the generator. In case of non use for three months, charge it.  |
| Oil Filler Cap     | It is for measurement of engine's oil level. Make sure engine's oil level is between MIN and MAX in the dipstick of oil filler cap before use. Oil can be added after removing the oil filler cap,  |
| Oil Drain Bolt     | Unscrew this bolt when replacing the engine oil. Drain out the old engine oil and dispose of it properly according to local laws, avoiding damage to the environment.   |
| Foot               | It is to support the generator.   |

|                    |   |
|--------------------|---|
| Grounding Terminal | It is to make the generator realize safe grounding. As to the grounding method, refer to the Page 19. Make sure unobstructed grounding before use.  |
| Handrail Pipe      | After lifted up, the pipe, with self-locking structure, can be used to move the generator.  |
| Starter Grip       | It is to start up the engine. For the method, refer to Page 22.   |
| Air Cleaner        | It is to filter air and remove impurities in the air entering cylinder. As to the maintenance method, refer to Page 30.   |
| Fuel Switch        | It is to control fuel's entering into the engine via the fuel tank. During non use of the generator, leave the switch off.  |
| Chock Valve        | It is to control air flow into the cylinder when starting up the engine. As to the operating method, refer to Page 22.  |
| Muffler            | It is to eliminate noise during equipment operation, and discharge high temperature exhaust of engine's combustion. Do not touch it to avoid burning.   |
| Timer              | The Timer records the running time of the generator. Press conversion key to convert between cumulative timing and single timing. The Timer will prompt to change the engine oil at 20 hours for the first time and then prompt every 100 hours; and will prompt to clean the air cleaner every 50 hours. |

**SOCKETS**

Sockets can be following patterns according to relevant regulations in various areas:



|  |
|--|
| <b>⚠ WARNING</b>   |
| When the rated current from one socket output is more than the socket's nominal rated current, you should simultaneously use two or more sockets for power output. |

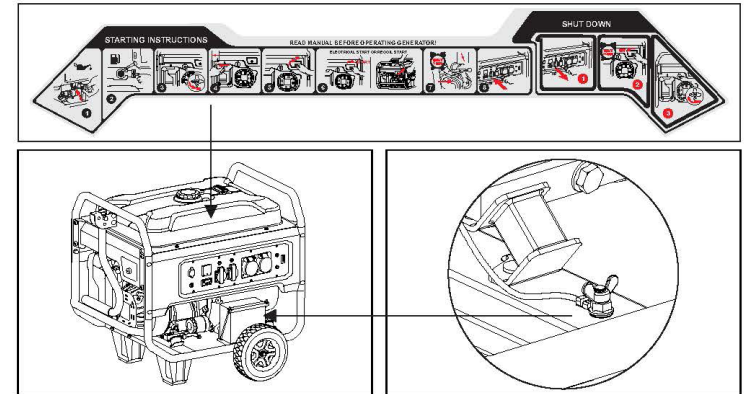
### Features

|   |  |
|---|--|
| <b>MODEL</b>  | <b>BE-12000ER</b>                              |
| <b>AC OUTPUT</b>  |  |
| Frequency   | 60Hz   |
| Voltage   | 120/240V                                       |
| Rated Power (W)   | 9500   |
| Max. Power (W)  | 12000  |
| <b>ENGINE</b>   |  |
| Specification   | Single cylinder, forced air cooling, 4 strokes |
| Rpm   | 3600r/min                                      |
| Fuel  | Gasoline                                       |
| Engine Oil Capacity   | 0.42 Gal / 1.6L                                |
| Spark Plug Type   | F7TC/F7RTC (N9YC/RN9YC)                        |
| Spark Plug Clearance  | 0.7 mm   |
| Valve Clearance (inlet/outlet)  | 0.05/0.07 mm                                   |
| Igniting Mode   | T.C.I.   |
| Starting Mode   | Recoil start/Electric start                    |
| Displacement  | 622cc  |
| <b>WEIGHT</b> (only for reference)  |  |
| Net Weight  | 315lb/143kg                                    |
| <b>OVERALL DIMENSIONS</b> (excluding packing box)                                   |  |
| L x W x H (mm)  | 800 x 620 x 650                                |
| Capacity of Fuel Tank   | 12 Gal / 48L                                   |
| <b>NOISE</b> (according to European Directive 2000/14/EC with amendment 2005/88/EC) |  |
| Measured Sound Pressure Level   | 78 dB (A)                                      |
| Measured Sound Power Level  | 98 dB (A)                                      |
| Uncertainty   | 2 dB (A)                                       |
| Guaranteed Sound Power Level  | 100 dB (A)                                     |

### Operation

#### UNIT GROUNDING

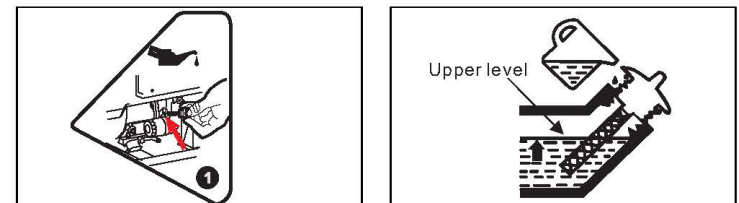
Shift the machine outdoors, use wire of no less than 2.5mm to make the machine and grounding terminal connected to the ground. One end of the wire is pressed below the butterfly nut of the unit, screwed up tightly, and the other end is connected with the metal rod shape article (such as the iron nail and the opener), and inserted into soil.



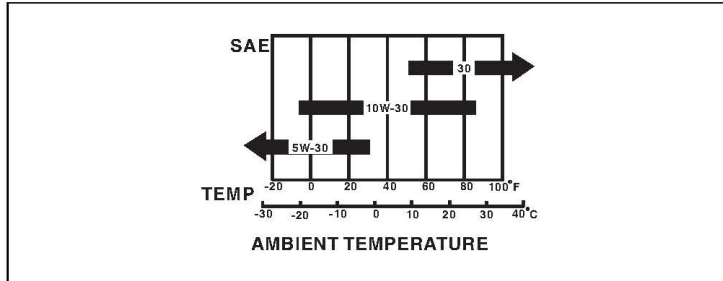
#### Starting the Generator

##### FILLING OIL

Remove the oil filler cap fill oil of proper model As to dosage refer to Page 18 Use the funnel for filling in case of careless spilling clean the ground to avoid slipping.

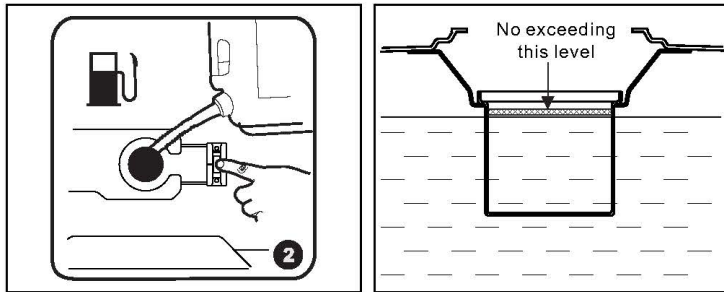


### OIL SPECIFICATION TABLE



### FILLING FUEL

Open the fuel tank cap and fill gasoline, the fuel leveler's position will display gasoline mass in the fuel tank and take care the maximum fuel position shall not exceed the inner strainer of the tank when filling.

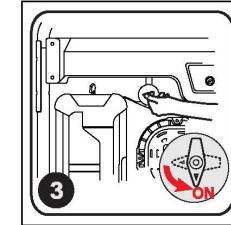


### ⚠ WARNING

When the rated current from one socket output is more than the socket's nominal rated current, you should simultaneously use two or more sockets for power output.

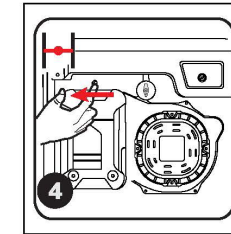
### TURN ON THE FUEL VALVE LEVER

Turn the fuel valve lever to ON and let the fuel flow into the carburetor.



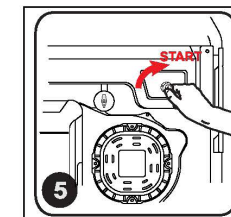
### CLOSE THE CHOKE VALVE

When the unit is in cold state move the choke valve to the full closed position and half closed position in thermal state. If the generator unit is not started for two times in succession move the choke valve to the open position and then to operate the switch or hand pull starter.



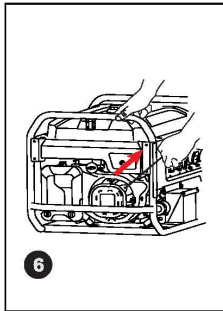
### START THE GENERATOR

Press it to START if its electrical start state then generator can be started. In order to extend the service life of the storage battery, do not press on the switch for more than 3 seconds and the interval between two pressings should be longer than 10 seconds.



### START THE GENERATOR RECOIL START

Start via the pull wire: Pull the wire gently to connect the disc to the starting bowl inside the unit. Pull the wire out in an instant action and the generator unit will be started after doing this twice. If it is not started please conduct the above operation with the choke valve.



#### **⚠ WARNING**

It may be causing the dangers of injury by the sudden change of rotation direction of the engine during operating the recoil starter.

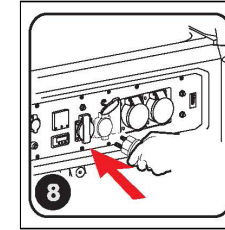
### OPEN THE CHOKE VALVE

After starting, let the unit run without load for 5 seconds and then turn on the choke valve switch.



### CONNECT TO LOAD

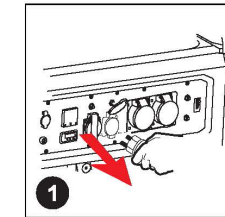
Access electric equipment and turn the circuit breaker to ON Please note that when several loads are used at the same time do not access the next one unless the former one is running normally The total power of the loads should not exceed the rated power of the unit.



### Stopping the Generator

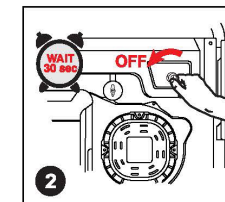
#### DISCONNECT LOAD

Disconnect the electric equipment from the control panel of the generator.



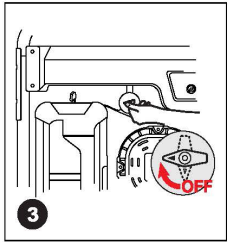
#### TURN OFF THE ENGINE SWITCH

After 30 seconds of no load running turn off the engine switch and the generator unit will be shut down immediately.



### CLOSE THE FUEL VALVE LEVER

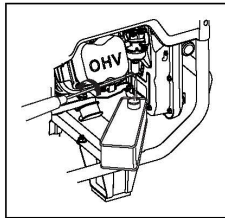
Turn off the fuel valve lever after the shutdown of the unit.



### Storage

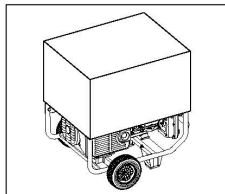
#### DRAIN THE FUEL

Remove the oil draining bolt of the carburetor and drain the fuel from the fuel tank and carburetor. Then tighten the oil draining bolt again if the fuel is not drained the fuel will evaporate and flow into the air and the residues may block the carburetor.



#### PROTECTIVE TREATMENT

The unit should be stored in a clean and dry place and should be protected from rain and high temperature. Shield the unit with paper box or plastic bag to prevent dust from entering the unit.



### Transporting

To prevent fuel spillage when transporting or during temporary storage, the generator should be secured upright in its normal operating position, with the engine switch OFF. The fuel valve lever should be turned OFF.

#### WARNING

- Do not overfill the tank.
- Do not operate the generator while it is on a vehicle. Take the generator off the vehicle and use it in a well ventilated place.
- Avoid a place exposed to direct sunlight when putting the generator on a vehicle. If the generator is left in an enclosed vehicle for many hours, high temperature inside the vehicle could cause fuel to vaporize resulting in a possible explosion.
- Do not drive on a rough road for an extended period with the generator on board. If you must transport the generator on a rough road, drain the fuel from the generator beforehand.

#### NOTICE

- To transport the generator, hold the holding part (shaded areas in Fig.1).
- Take care not to drop or strike the generator when transporting.
- Do not place heavy objects on the generator.
- When transporting the generator by loading it on to a vehicle, secure to the generator frame as shown (see fig.2).

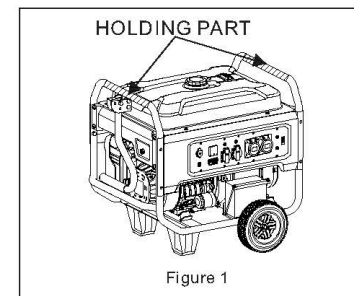


Figure 1

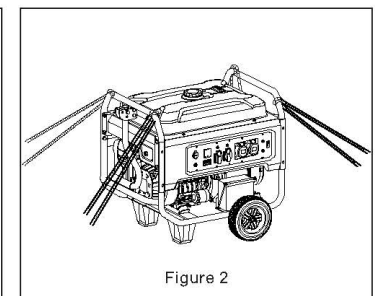


Figure 2

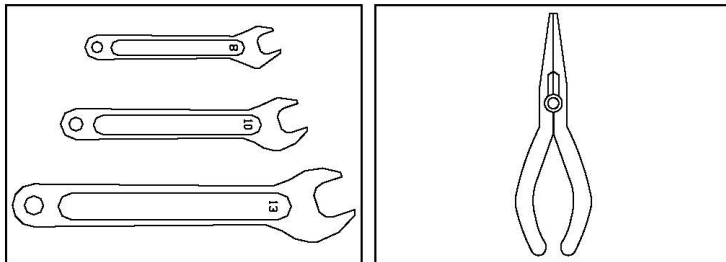
### Accessories

#### ACCESSORY INSTALLATION

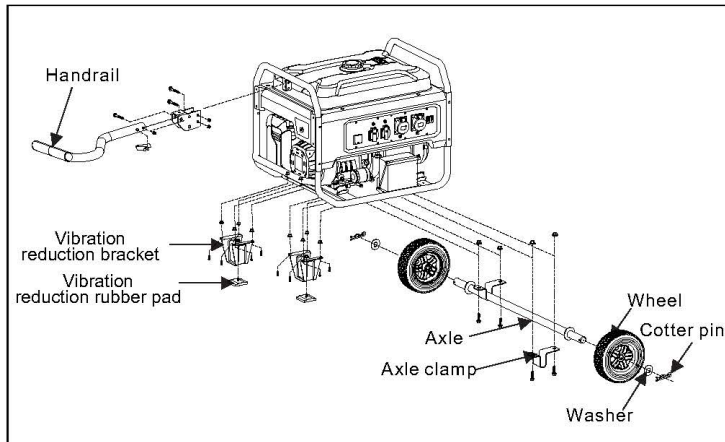
You can install the wheel assemblies for the convenience of moving the unit

You may need to prepare the following equipment before the installation.

According to the different model configurations there are several kinds of wheels Please install the handrail vibration reduction bracket and wheel on the base plate and tighten the bolt as shown in the following picture.



#### TWO-WHEEL SHORT AXLE



### Maintenance

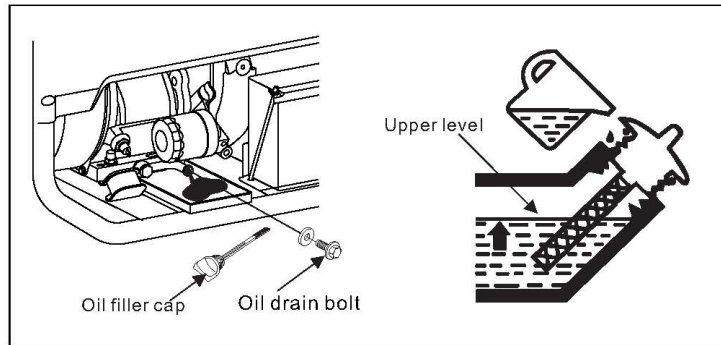
#### MAINTENANCE CHART

| Regular Maintenance Schedule |                        | Per Use             | First 20hrs or 1 Month (3) | Every 50hrs or 3 Months (3) | Every 100hrs or 6 Months (3) | Every 300hrs or each Year (3) |
|------------------------------|------------------------|---------------------|----------------------------|-----------------------------|------------------------------|-------------------------------|
| Engine Oil (SAE 10W30)       | Inspect the oil level  | X                   |                            |                             |                              |                               |
|                              | Replace oil and filter |                     | X                          |                             | X                            |                               |
| Air Cleaner                  | Inspect                | X                   |                            |                             |                              |                               |
|                              | Clean                  |                     |                            | X (1)                       |                              |                               |
| Fuel Switch Sediment cup     | Clean                  |                     |                            |                             | X                            |                               |
| Spark Plug                   | Clean                  |                     |                            |                             | X                            | Replace                       |
| Valve Clearance              | Readjust               |                     |                            |                             |                              | X (2)                         |
| Cylinder Head                | Wash                   | Every 300 Hours (2) |                            |                             |                              |                               |
| Fuel Tank and Strainer       | Wash                   | Every 2 Years (2)   |                            |                             |                              |                               |
| Fuel Tube                    | Replace                | Every 2 Years (2)   |                            |                             |                              |                               |

- (1) Maintenance should be conducted frequently if the unit is used in dusty places.
- (2) Maintenance should be conducted by the franchised dealer.
- (3) When the unit is used frequently please conduct the maintenance according to the above mentioned intervals so as to ensure the long term usage of the generator.

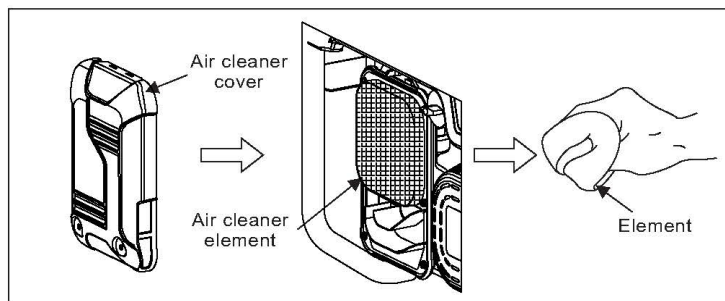
### REPLACE ENGINE OIL

Remove the oil draining bolt and drain the long time stored oil. Tighten the oil draining bolt and twist off the oil dipstick. Fill in appropriate amount of oil via the oil dipstick and keep the oil level between MIN and MAX.

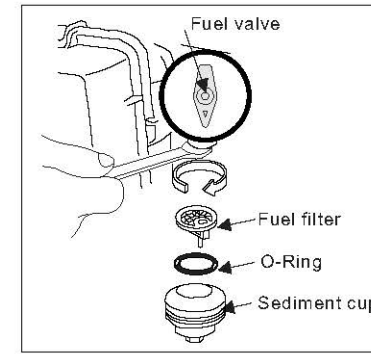


### CLEAN AIR CLEANER

- 1) Remove the clip of the air cleaner cover and open it.
- 2) Inspect the air cleaner element and ensure that it is sound and clean.
- 3) If the foam cleaner element is dirty, spray some household cleaning agent onto the cleaner element. Scrub it for several minutes and rinse it with warm water. If the cleaner element is damaged, please replace a new one.



### CLEAN THE FUEL VALVE LEVER SEDIMENT CUP

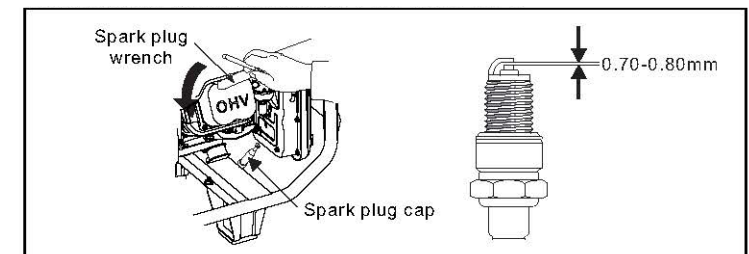


1. Close the fuel valve and remove the sediment bowl. Take out the O-type seal ring and strainer.
2. Clean the sediment bowl, O-type seal ring and strainer with incombustible or high-flash solvent.
3. Reinstall the O-type seal ring and strainer, and tighten the sediment bowl.
4. Open the fuel valve and inspect for leakage.

### CLEAN THE SPARK PLUG

- 1) Remove the spark plug cap.
- 2) Clean the spark plug base.
- 3) Remove the spark plug with the spark plug socket spanner.
- 4) Inspect the spark plug insulator visually for damage. If it is damaged, replace a new one.
- 5) Measure the spark plug gap with a gap gauge. Twist the side electrode to adjust the gap. The gap should be kept between 0.70 and 0.80mm.
- 6) Inspect if the washer of the spark plug is in good condition.
- 7) Reinstall the spark plug and tighten it with the spark plug socket spanner. Press down the washer of the spark plug and place the spark plug cap.

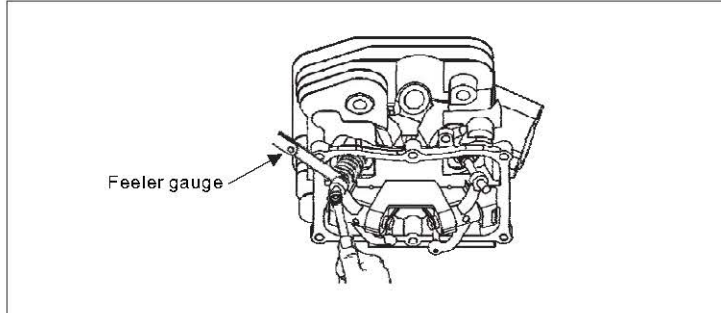
Recommended spark plug models: F7RTC and F7TC



### VALVE CLEARANCE

Remove the cylinder head cover and measure the valve clearance with the feeler gauge. The clearances are 0.03~0.05mm for the inlet valve and 0.05~0.07mm for the outlet valve.

(should be conducted by a professional person)



### Troubleshooting

#### TROUBLESHOOTING CHART

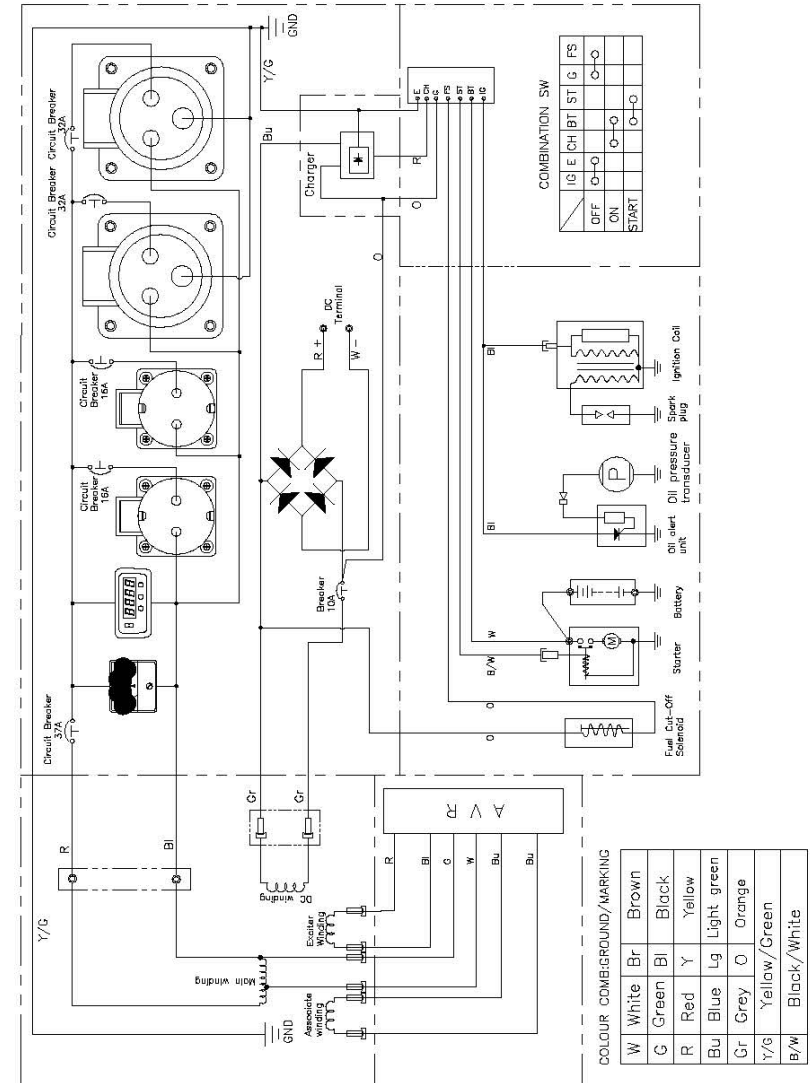
| PROBLEM                         | CAUSE  | CORRECTION   |
|---------------------------------|--|--|
| The generator can not start     | No fuel                                      | Fill the oil tank with gasoline                        |
|                                 | The oil switch is not turned on              | Turn the oil switch to ON                              |
|                                 | The oil switch is blocked                    | Clean the oil cup (refer to page 27)                   |
|                                 | No engine oil or the engine oil level is low | Add oil  |
|                                 | The shutdown switch is turned off            | Turn the switch to the "on" position                   |
|                                 | The spark plug fails                         | Clean or replace the spark plug (refer to page 27)     |
| No power output                 | The circuit breaker is not connected         | Turn the circuit breaker to the "on" position          |
|                                 | The plug is poorly contacted                 | Replace a socket                                       |
| Vibration while operation       | The choke position is incorrect              | Move the choke to the "on" position                    |
| Vibration while operation       | The temperature of the engine is too low     | Let the engine run at empty load for more than 10 mins |
|                                 | The fuel oil is contaminated                 | Replace clean oil                                      |
| The generator emits black smoke | The air filter is dirty                      | Clean the filter element of the air filter             |
|                                 | The load is too high                         | Reduce load to the rated limit                         |
| The generator emits blue smoke  | The engine oil is too much                   | Drain some oil   |
|                                 | The engine oil type is incorrect             | Choose appropriate engine oil type (refer to page 27)  |
| The power decreases             | The spark plug fails                         | Clean or replace the spark plug (refer to page 27)     |
|                                 | The valve clearance is out of limits         | Adjust the valve clearance (refer to page 30)          |

### TROUBLESHOOTING ANALYSIS

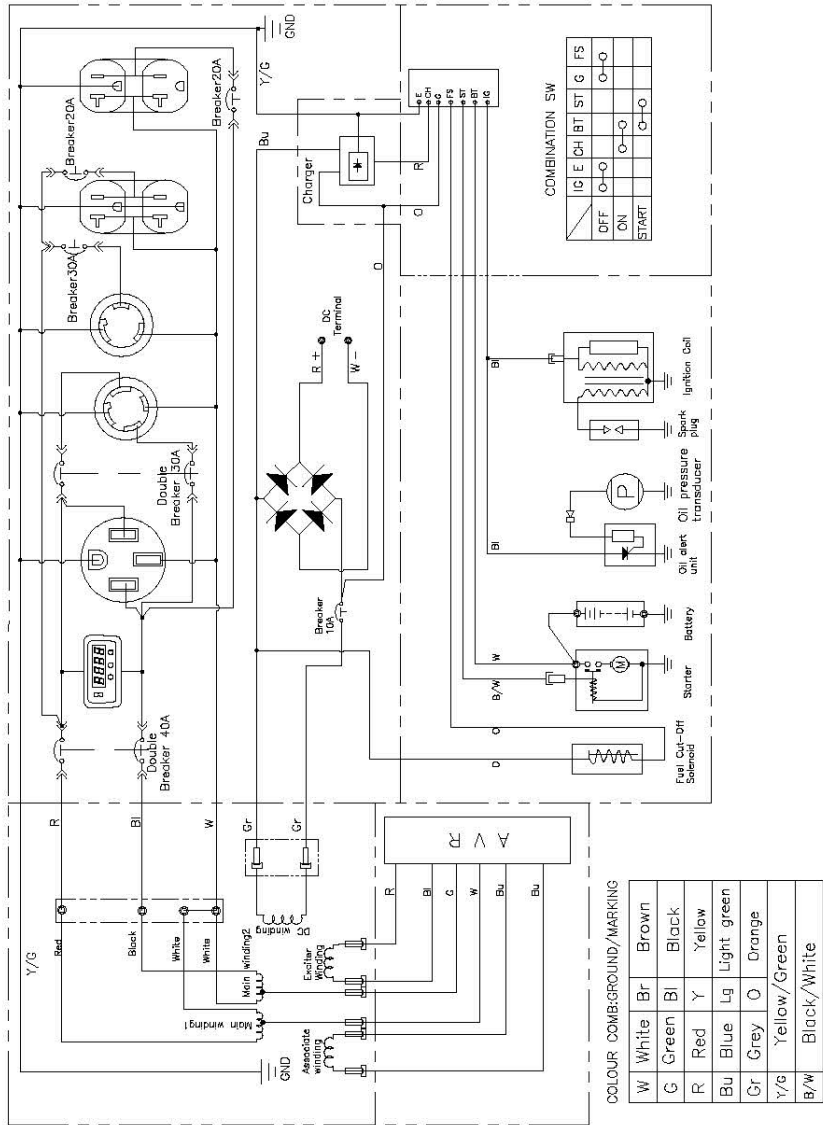
- The environmental requirements of the generator:
- Suitable temperature: -15°-40°.
- Suitable humidity: lower than 95%.
- Suitable altitude under 1,000 meters it should be used with lower power in districts higher than 1,000 meters. .
- The generator set can only be loaded to the rated power under the specified environment conditions. If the environment conditions are inconsistent with the above standards or if the cooling conditions of the engine and generator set are defective for example when running in limited areas it is necessary to reduce the power. It is also necessary to reduce the power when the temperature altitude and relative humidity exceed the standards.
- If there is no problem with the conditions above please turn to the nearby dealer or after sales service center for consulting.

### Electrical Schematic Diagram

#### ELECTRICAL SCHEMATIC DIAGRAM 1 50HZ 230V



### ELECTRICAL SCHEMATIC DIAGRAM 2 60HZ 120V/240V



# BE

**THE POWER YOU NEED.**

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If you need assistance with the assembly  
or operation of your Generator please call

**1-866-850-6662**