

**LIFAN
POWER
USA**

ENERGY STORM GENERATORS



ES4100(E)



ES5700(E)



ES8100(E)



ES2000



Operating Instructions and Owner's Manual

This Owners Manual is published in ENGLISH, SPANISH and FRENCH

PLEASE READ THIS MANUAL CAREFULLY BEFORE OPERATING YOUR NEW INVERTER
These Units are EPA-CSA-CARB CERTIFIED and are 50 STATE & CANADA COMPLIANT 06/01/2015



Operating Instructions And Owner's Manual

ENERGY STORM SERIES

ES2000
ES4100 (CA), ES4100E (CA),
ES5700 (CA), ES5700E (CA)
ES8100E (CA)

Record Purchase Here

Model # _____

Engine ID # _____
(Unique Identifier stamped on engine crankcase)

Date of Purchase _____

Purchase Location _____

**PLEASE KEEP AND READ THIS MANUAL CAREFULLY BEFORE
OPERATING YOUR NEW PORTABLE GENERATOR**

(CA) Indicates this unit is CARB Certified (California Compliant)
(E) Indicates this unit is equipped with Electric Start



**LIFAN
POWER
USA**



LIFAN

**LIFAN
POWER
USA**



**THANK YOU FOR YOUR PURCHASE
PLEASE READ!!!!**

**DO NOT RETURN
THIS PRODUCT TO THE STORE**

WE ARE HERE FOR YOU!

Call Customer Service Toll-Free 1-866-471-7464
Tech Help-Line Open from 9-5 at 866-471-7464 OPTION 2
or visit us online at www.lifanpowerusa.com

**NO DEVUELVA ESTE
PRODUCTO A LA TIENDA**

ESTAMOS AQUÍ PARA USTED!

Llame a nuestro equipo de Servicio al Cliente Línea Gratis 1-866-471-7464
Línea Técnico 866-471-7464 OPTION 2
o visite nuestra página en el internet www.lifanpowerusa.com

**NE PAS RETOURNER
CE PRODUIT AU MAGASIN**

NOUS SOMMES ICI POUR VOUS!

Communiquer avec Notre Équipe de Service à la Clientèle sans Frais au
1-866-471-7464 et 866-471-7464 OPTION 2
ou en ligne à www.lifanpowerusa.com

POWERED BY **LIFAN**

CSA-CA-EPA CERTIFIED

ENERGY STORM SERIES





PLEASE READ THE FOLLOWING INSTRUCTIONS!

1. Unit Shipped with “NO OIL” in Engine or where applicable pumps and/or accessories. Check and fill with proper oil as outlined in the Owner’s Manual for the respective product.

2. For repair under Warranty or questions concerning Warranty, DO NOT return this product to the Store where purchased. Follow the procedures as outlined in the “WARRANTY POLICY” and “WARRANTY REGISTRATION” in the Owner’s Manual. For any questions visit www.lifanpowerusa.com or call 1-866-471-7464 OPTION 1.

3. Read the “Owner’s Manual” prior to operating any equipment and familiarize yourself with the proper and safe operation of the equipment. If you have any questions visit www.lifanpowerusa.com or call 1-866-471-7464.

Energy Storm Models

				
ES680000E	ES4100	ES4100E	ES5700 (E)	ES8100E

(E) Indicates this unit is Equipped with Electric Start





Table of Contents

Preface	4
Product Specifications	5
Safety Instructions	6
Controls and Features	9
Voltage Regulator Switch	11
PRE-OPERATING INSTRUCTIONS	12
Assembly	14
Battery Specifications	15
Generator Setup	16
Operation of Generator	19
Storing the Unit	23
Maintenance	24
Troubleshooting/General Safety	29
Generator Wattage Reference Worksheet	32
Limited Warranty Policy	35
Wiring Diagrams	39
Spanish Version	44
French Version	64





Preface

Thank you for choosing LIFAN Power USA for your Power Equipment Needs. LIFAN Power USA prides itself on providing quality products at affordable pricing, creating the “Best Equipment Value on Today’s Market!”

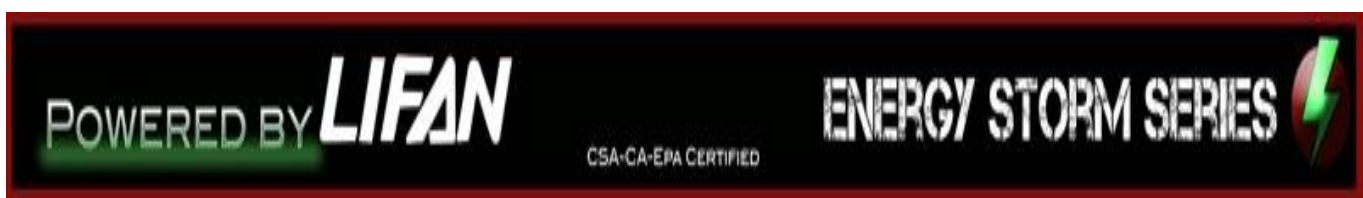
All LIFAN Power USA products are manufactured utilizing the latest technology. Built with quality components, your new Power Equipment Product will give you years of dependable service. Your unit, along with all of LIFAN Power USA products are designed, engineered, and manufactured with LIFAN’s Industrial Grade Gasoline Engine.

This Owner’s Manual will provide you with all of your needed information for your new Power Equipment Product, including Safe Operation and Maintenance of your unit. Please read this Owner’s Manual completely and carefully prior to operation. Keep this Owner’s Manual for assistance in the future, such as proper maintenance schedules and tips to prolong the life and effective use of your unit. If you require assistance, please visit our website (www.lifanpowerusa.com) or call toll free 866-471-7464 OPTION 2.

This Owner’s Manual contains information with respect to the newest products at the time of publication. Due to revision and modifications, the information noted in the Owner’s Manual might vary from the actual status. This Owner’s Manual is subject to change without notice. The copyright of this Owner’s Manual belongs to EquipSource, LLC. Any group or individual is forbidden to reprint or copy any of this Owner’s Manual without the written consent of EquipSource, LLC.

FOR ALL WARRANTY AND SERVICE RELATED ISSUES/QUESTIONS DO NOT RETURN YOUR UNIT TO THE STORE OR DEALER WHERE THE ITEM WAS PURCHASED.

FOR SERVICE VISIT LIFAN POWER USA’S WEBSITE (WWW.LIFANPOWERUSA.COM) OR CALL 1-866-471-7464 OPTION 2. WE WILL BE HAPPY TO HANDLE YOUR WARRANTY ISSUE OR DIRECT YOU TO THE NEAREST “AUTHORIZED SERVICE CENTER.”



ENERGY STORM PORTABLE GENERATORS

Model Size	ES2000	ES4100	ES4100E	ES5700	ES5700E	ES8100E
Voltage	120 / AC	120 / AC	120/240V AC & 12V DC	120/240V AC & 12V DC	120/240V AC & 12V DC	120/240V AC & 12V DC
AC Surge Output ¹	2000 Watts	4100 Watts	4100 Watts	5700 Watts	5700 Watts	8100 Watts
Rated AC Output ²	1600 Watts	3500 Watts	3500 Watts	5000 Watts	5000 Watts	7000 Watts
Maximum AC Amperage	12 amps @ 120V	26amps @ 120V	26amps @ 120V	40\5amps @ 120V	45amps @ 120V	62amps @ 120V
AC Cycle	60 Hertz	60 Hertz	60 Hertz	60 Hertz	60 Hertz	60 Hertz
Regulation	AVR ³	AVR ³	AVR ³	AVR ³	AVR ³	AVR ³
On/OFF - E-Start Switch	On/Off	On/Off	On/Off/Start	On/Off	On/Off/Start.	On/Off/Start
120V 20amp AC Receptacle	2 ea.	3 ea.	3 ea.	4 ea.	4 ea.	4 ea.
120 / 30 amp AC Receptacle 3 prong twist lock	N/A	1 ea.	1 ea.	1 ea.	1 ea.	1 ea.
120/240 AC 4 prong Receptacle	N/A	N/A	N/A	N/A	N/A	1 ea
Circuit Protection	Master Circuit Breaker	Master Circuit Breaker	Master Circuit Breaker	Master Circuit Breaker	Master Circuit Breaker	Master Circuit Breaker
Individual Circuit Protectors	1 ea. 20a	1 ea. 20a - 1 ea. 30a	1 ea. 20a - 1 ea. 30a	4 ea. 20a - 1 ea. 30a	4 ea. 20a - 1 ea. 30a	4 ea. 20a - 2 ea. 30a

ENGINE

Manufacturer	LIFAN	LIFAN	LIFAN	LIFAN	LIFAN	LIFAN
Model	LD152F-13111 Recoil	LF170F\13111 Recoil	LF170F\13111 Recoil	LF188F\13111	LF188FD\13111	LF190FD\13111
Maximum Horsepower	3 MHP	7MHP	7MHP	13MHP	13MHP	15MHP
Engine Displacement	97.7	212cc	212cc	388cc	388cc	420cc
Starting System	Recoil	Recoil	Recoil	Recoil	Recoil & Electric	Recoil & Electric
Fuel Tank Capacity	1 Gallon	4 Gallons	4 Gallons	6.5 Gallons	6.5 Gallons	6.5 Gallons
Fuel Tank Material	Rust Preventative Coated Steel	Rust Preventative Coated Steel	Rust Preventative Coated Steel	Rust Preventative Coated Steel	Rust Preventative Coated Steel	Rust Preventative Coated Steel
Fuel Gauge	No	Yes	Yes	Yes	Yes	Yes
Run Time (@ 50% Load)	8 hours	12 hours	12 hours	10 hours	10 hours	8 hours
Sound Level	63 decibels	65 decibels	65 decibels	75 decibels	75 decibels	75 decibels
Engine Type	4\Stroke OHV	4\Stroke OHV	4\Stroke OHV	4\Stroke OHV	4\Stroke OHV	4\Stroke OHV
Fuel Type	Automotive Grade Unleaded Gasoline	Automotive Grade Unleaded Gasoline	Automotive Grade Unleaded Gasoline	Automotive Grade Unleaded Gasoline	Automotive Grade Unleaded Gasoline	Automotive Grade Unleaded Gasoline
Fuel Compliance	10% Ethanol Mix	10% Ethanol Mix	10% Ethanol Mix	10% Ethanol Mix	10% Ethanol Mix	10% Ethanol Mix
Oil Type & Amount	SAE 10w30w20oz	SAE 10w30w20oz	SAE 10w30w20oz	SAE 10w30w32oz	SAE 10w30w32oz	SAE 10w30w32oz
Low Oil Shutoff Protection	Yes	Yes	Yes	Yes	Yes	Yes
CARB Certified	(IICA) Models Only	(IICA) Models Only	(IICA) Models Only	(IICA) Models Only	(IICA) Model Only	(IICA) Model Only

ACCESSORIES

Spark Plug Wrench	1 ea.	1 ea.	1 ea.	1 ea.	1 ea.	1 ea.
Mobility/Wheel Kit	N/A	N/A	All Models	All Models	All Models	All Models
Battery (not included)	Not Included	Not Included	See Battery Chart	Not Included	See Battery Chart	See Battery Chart

Comments

¹ = Temporary Power available for no more than 10 seconds

³ = Automatic Voltage Regulation

⁴ = Only (E) Models have Recoil & Electric Start



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.

For your safety read this manual carefully. Become familiar with the proper operation, care, and maintenance of your Lifan generator.

The safety and alert symbol (**A**) is used with a signal word (CAUTION, DANGER, WARNING), a pictorial and/or safety message to alert you to hazards. **CAUTION** indicates a hazard which, if not avoided could be harmful.



WARNING!

Running generator emits carbon monoxide an odorless, colorless, poison gas.

Breathing carbon monoxide can cause nausea or death!

Do not operate generator inside or under any buildings. Operating this generator inside the compartment of a recreational vehicle will likely result in death

WARNING!

The engine exhaust from this generator contains chemicals known to the state of California to cause birth defects, reproductive harm, and cancer.

Do not use this generator within the generator compartment of a recreational vehicle!



This generator does not meet U.S. Coast Guard Regulation 33CFR-183 and should not be used on marine applications. Use of this generator on marine applications could result in injury or death.

A

WARNING!



Rapid recoil of starter cord (kickback) may pull hand and arm forward toward engine at a rapid rate.

Broken bones, bruises, sprains, and Fractures may result.

- When starting engine, pull cord slowly until Tension is felt, then pull rapidly to avoid kickback.
- Never start or stop engine with electrical Devices plugged in and turned on. Doing so is hazardous and will damage generator.



Generator produces powerful voltage! Only a licensed electrician can safely Connect hookups. Failure to isolate generator from electrical grid can result in death to utility workers as well as Others.

- When using generator as backup power, notify Utility company. Use approved transfer equipment to isolate generator from electric utility.
- Do Not operate generator while exposed to Rain or other wet conditions.
- Do not handle generator when in contact with water.
- Do not contact bare wires or receptacles.
- Inspect all electrical cords for damage and Discontinue from use any damaged or excessively worn cords.
- Do not allow unqualified persons to operate or service generator.

Hazard Symbols and Meanings

Explosion	Fire	Electrical
Toxic Fumes	Hot surface or 1ms	Kickback





WARNING!

Fuel and its vapors are extremely flammable and explosive.

Fire or explosion can cause severe burns or death.

WHEN ADDING OR DRAINING FUEL

- Turn generator off and let it cool for at least three minutes before removing fuel cap. Loosen cap slowly in order to relieve pressure in the fuel tank.
- Fill or drain fuel tank outdoors. Do not excessively inhale fuel vapors.
- Keep away from open flames or sparks and other sources of ignition.
- Do NOT smoke while filling fuel tank.
- Do NOT overfill tank. Allow space for fuel expansion.

WHEN TRANSPORTING OR REPAIRING EQUIPMENT

- Transport generator with the fuel valve in the off position.
- Repair generator with the fuel tank empty or the fuel valve in the off position.
- Disconnect spark plug wire before transport or service.

WHEN STORING FUEL OR EQUIPMENT CONTAINING FUEL

- Store away from furnaces, stoves, water heaters, clothes dryers or other appliances that have pilot light or other ignition source because they can ignite fuel vapors.

WHEN STARTING EQUIPMENT

- Ensure spark plug, muffler, air cleaner, and fuel cap are in place.
- Do NOT crank engine with spark plug removed.
- If fuels spills, wait until it evaporates before starting engine.

WHEN OPERATING EQUIPMENT

- Do not choke carburetor to stop engine.
- Do not tip engine or equipment at an angle, which causes fuel to spill.
- This generator is not for use in marine applications.



CAUTION!

Excessively high operating speeds (engine revolutions) increase the risk of injury and damage to the generator. Excessively low speeds impose a heavy load and will damage generator.

- Do NOT adjust engine speed governor. Generator supplies correct voltage and frequency at designated speed.
- Modifying generator in any way may be dangerous and will void warranty.

POWERED BY **LIFAN**

CSA-CA-EPA CERTIFIED

ENERGY STORM SERIES





WARNING!

**While engine is running temperature may exceed 150°F (65°C).
Server burns may occur.**

Exhaust heat/gasses can ignite combustibles, structures or damage fuel tank causing a fire.

- Do NOT touch hot surfaces and do avoid exhaust gasses.
- Allow generator to cool before touching.
- Keep at least 7 ft. (183cm) clearance on all sides of generator including overhead clear.
- Reflective exhaust heat may damage fuel tank causing fire.
- Code of Federal Regulation(CFR) Title 36 Parks, Forests, and Public Property require equipment powered by an internal combustion engine to have a spark arrester, maintained in working order, complying to USDA Forest service standard 5100-1c or later revision. In the state of California a spark arrester is required under section 4442 of the California Public resources code.

WARNING!

Unintentional sparking can result in fire or electrical shock.



WHEN TESTING FOR ENGINE SPARK

- Do NOT check for spark with the spark plug removed.
- Use approved spark plug tester.

WHEN REPAIRING OR ADJUSTING GENERATOR

- Disconnect the spark plug wire from the spark plug and place the wire where it cannot contact spark plug.

CAUTION!

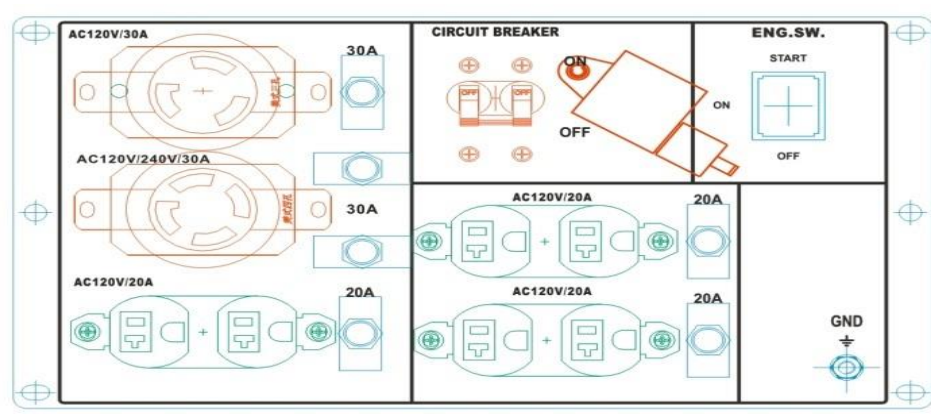
Improper use and care of this generator will cause damage and shorten its lifespan. Failure to follow these actions will void all warranties.

- Use generators only for appropriate and designated purposes.
- The dealer or customer helpline (1-866-471-7464) can instruct you on intended uses.
- Generator must be placed on a level surface.
- Do NOT expose generator to extreme conditions. Excessive dust, moisture, and corrosive vapors will damage unit.
- Cooling slots must be kept clear of debris.
- Do not connect improperly operating devices to generator.
- Shut off generator and take to a qualified service center if the generator fails to operate properly.

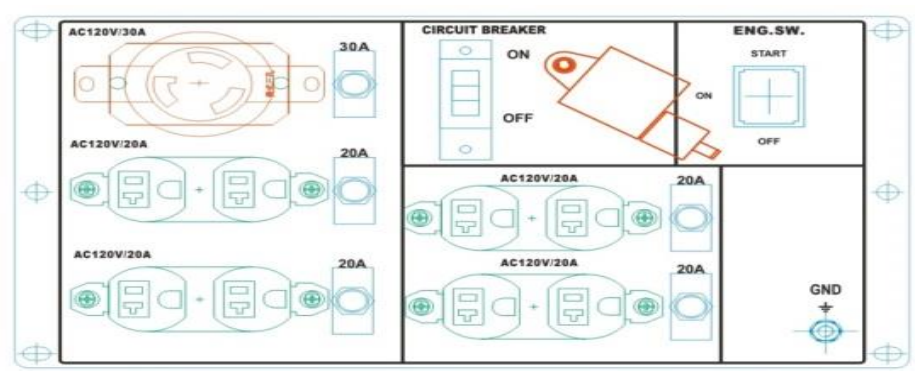




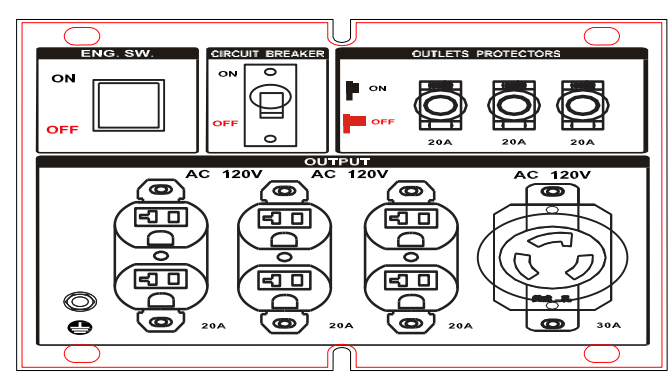
Controls and Features



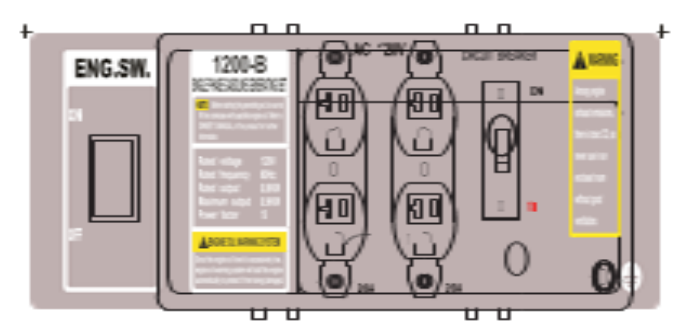
ES8100E



ES5700 and ES5700E



ES4100 and ES4100E



ES2200





Legend

1. **Fuel Level Sensor** – Displays Current Fuel Level
2. **Fuel Tank Cap** – Vented Fuel Cap Must be Properly Installed at all times during Operation
3. **Receptacle Panel** – See Product Specifications for Individual Model
4. **Double Pole Circuit Breaker (AC)** – Protects Receptacles & Generator from Overload
5. **Crankcase Oil Dipstick/Oil Fill Hole Cap** – Check/Fill Engine Oil
6. **On/Off Switch** – Rocker Style; Set to “ON” to start Engine & “OFF” to Shut Off Engine; Key Switch Model: Turn to “START” to Crank Engine & “OFF” to Shut Off Engine
7. **Crankcase Oil Drain Plug** – Remove to Drain Oil from Crankcase
8. **Recoil Starting Handle** – Pull Handle to Rotate Engine for Starting
9. **Fuel Cock (Valve)** – Turn to “OFF” to Terminate Fuel Delivery to Engine
10. **Air Cleaner** – Check Maintenance Schedule for Service Intervals
11. **Choke** –
5000 Watts & 8000 Watts Model: Before starting cold generator, pull the choke pin outward from generator to activate the choke lever. After allowing generator to run for a few seconds, push pin inward toward generator.
3500 Watts & 4000 Watts Model: Before starting cold generator, rotate the choke lever to the left until resistance is felt. After starting the generator, rotate the choke lever to the right to disengage.
12. **Earth Grounding Stud** – Always connect generator to an Earth Grounding Source. Consult Local Energy Jurisdiction for Code Requirements in your area.
13. **Muffler & Muffler Hood** – Exhaust muffler emits combustion gas from engine and lowers the noise level of the generator
14. **Valve Cover** – Cover for Overhead Valves designed to be removed periodically for valve adjustments.





Voltage Regulator

**LIFAN
POWER
USA**

AUTOMATIC VOLTAGE REGULATOR

"Constant Quality and Quantity of Voltage"

All Lifan Power USA ProSeries and EnergyStorm Generators are equipped with Automatic Voltage Regulators to ensure maximum protection for your appliances as well as your generator. By regulating the level of voltage in an alternating current (AC) system to a narrower range of output, the AVR protects any parts of your systems that might be damaged by surges or drops in voltage or power, particularly during the start-up of your appliances when the maximum voltage and power are required. The AVR ensures a constant quality and quantity of voltage is supplied to protect the appliances and system.

"Your Best "Value" on Today's Equipment Market"

All Energy Storm Generators are equipped with AVR to get maximum performance and power from your unit.

POWERED BY **LIFAN**

ENERGY STORM SERIES 

CSA-CA-EPA CERTIFIED



Pre-Operating Instructions: Assembly

Your LIFAN Power USA generator is packaged without fuel and oil. Some assembly is required before operating your LIFAN Power USA Generator.

For further assistance in assembling your generator please visit our website (www.lifanpowerusa.com) or call 1-866-471-7464 option 2, between the hours of 9am-5pm Monday-Friday.

BOX CONTENT:

- Generator
- Accessory Kit
 - 1 ea. --- Spark Plug Removal Tool
 - 1 ea. - Nema14-30 Male Twist Lock Plug
- Owner's Manual and Warranty Card
- Wheel Kit (All 6500W & 8000W Models; Only 3500W Electric Start Models)
 - 2 ea. - Never-Go-Flat Foam Filled Wheels
 - 2 ea. --- Heavy Duty Leg Supports (Shipped Stored Under Fuel Tank)
 - 1 ea. --- Axle
 - 2 ea. --- Folding Handle
 - Hardware Bag

UNPACKING THE GENERATOR:

1. Set the Carton on a Flat, Rigid Surface.
2. Remove All Contents from Carton EXCEPT Generator.
3. Open Box Completely by Cutting Each Corner from Top to Bottom.
4. Leave Generator on the Remainder of the box until Wheel Kit is installed.
5. Locate all Box Contents and Place them Beside the Generator. (Some Items may be Packed within the voids of the Generator itself)



Pre-Operating Instructions: Assembly

WHEEL KIT INSTALLATION:

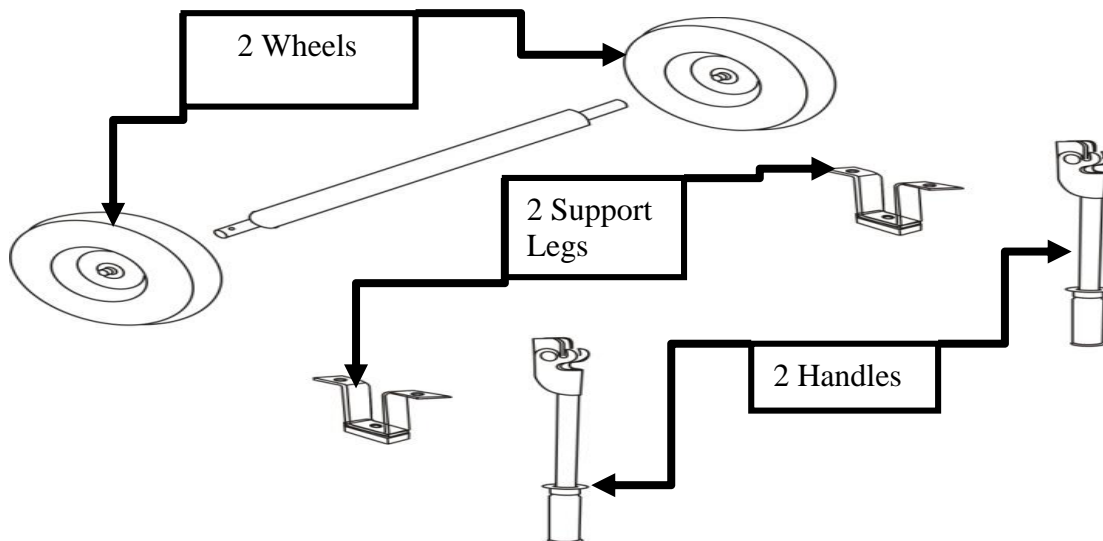
The Following Tools are needed to Install Wheel Kit:

- Safety Glasses
- 8mm-14mm Wrench Set
- 8mm-14mm Ratchet & Socket Set
- 17mm Ratchet & Socket

Wheel Kit Installation Directions:

NOTE: Install Wheel Kit BEFORE Filling the Generator with Fuel or Oil. Never Tip a Unit that contains Fuel or Oil.

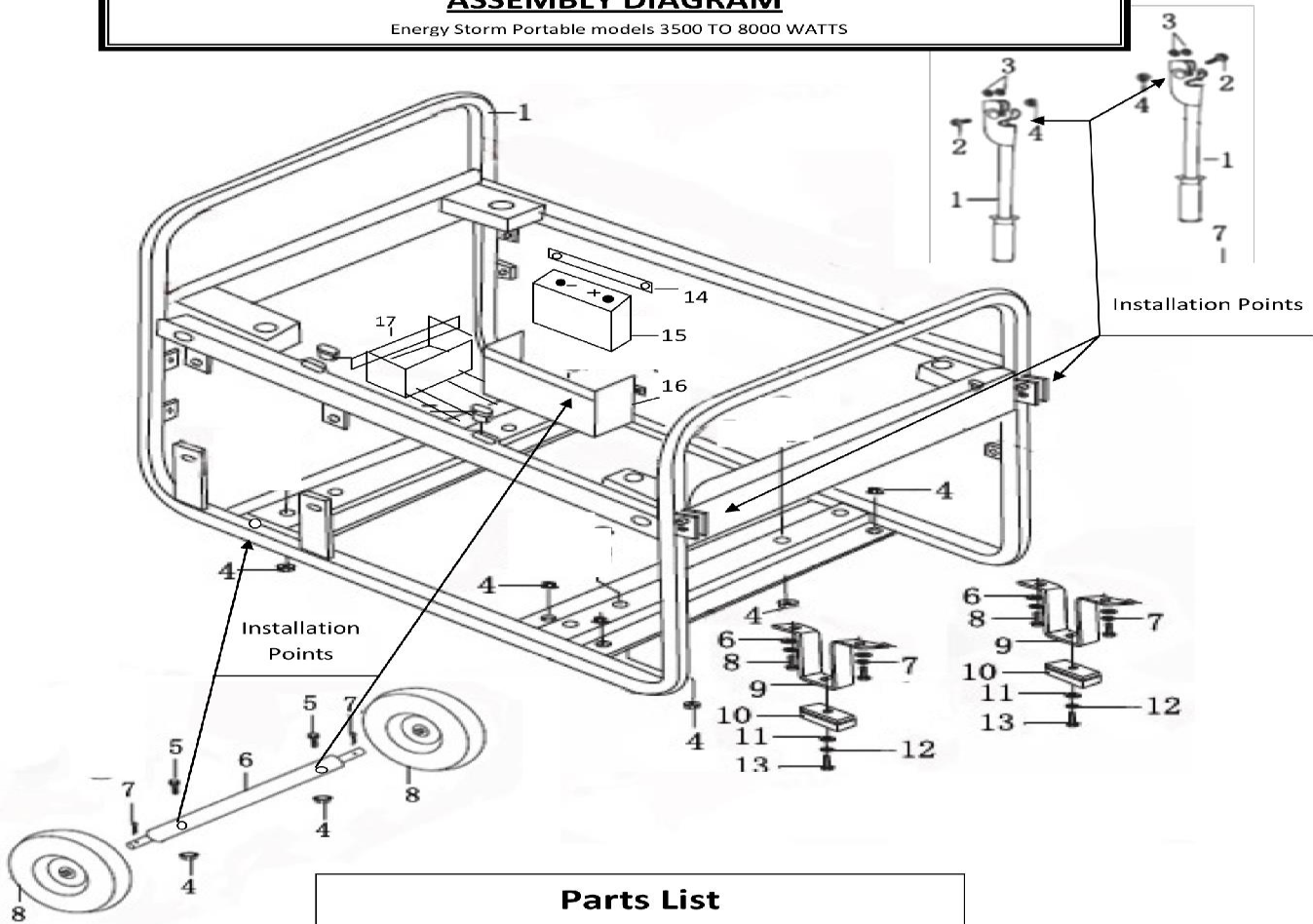
1. Tip Generator so Engine End is up.
2. Slide Axle through both Mounting Brackets.
3. Place a Wheel on both Sides as shown in "Assembly Diagram."
4. Securely Tighten Wheel nuts with the 17mm Socket.
5. Tip the Alternator End of the Generator up.
6. Place the Support Legs under the Frame Brace as shown in "Assembly Diagram."
7. Secure with the provided Cap Screws and Hex Nuts. Securely tighten using 12mm Ratchet and Socket.



Pre-Operating Instructions: Assembly

ASSEMBLY DIAGRAM

Energy Storm Portable models 3500 TO 8000 WATTS



Parts List

1.	Handle	2 pcs.	9	Front Leg	2 pcs
2.	Flange bolt 8mm × 45mm	2 pcs.	10	Leg Skid Pad	2 pcs
3.	Nylon Washers.8mm	4 pcs.	11	Flat washer 6mm	2 pcs
4.	Nut M8	12 pcs.	12	Spring washer 6mm	2 pcs
5.	Flange bolt 8mm × 60mm	2 pcs	13	Flange bolt 6mm × 16mm	2 pcs
6.	Axle	1 pc.	14	Battery hold down strap	1 pcs
7.	Cotter Pin	2 pcs	15	12 volt Battery (not included)	1 pc.
8.	Tire & Wheel Assembly	2 pcs	16	Battery Box 5000- 8000 watt models	
			17	Battery Box 3500 watt models	

⚠ CAUTION! Assemble generator before adding fuel or oil.





Pre-Operating Instructions: Battery Specifications

(Electric Start (E) Models Only)

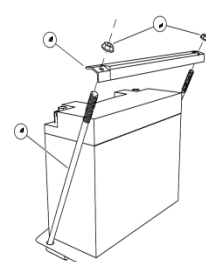
The Battery is NOT included with your Energy Storm Generator. These units require an Acid Cell Battery. This battery is used in many applications, such as lawnmowers, ATV's, motorcycles, etc. and can be found at many retailers and dealers including where you purchased this Power Equipment Product. Use the "Battery Specifications" chart below to attain the specifications of the necessary battery. Or, use the "Cross Reference Models" chart below to match up with the manufacturer's model number with the brand battery available at your local retailer.

BATTERY SPECIFICATIONS				
Generator Model	Length (inch)	Width (inch)	Amp (hrs)	DC Voltage (Volts)
ES4100E	5.25 in	3 in	10	12V
ES5700E	5.3125 in	3.1875 in	12	12V
ES8100E	5.3125 in	3.1875 in	12	12V

CROSS REFERENCE MODELS		
Generator Model	Manufacturer	Model Number
ES4100E	Super Start®	CB9B
ES5700E	Excide®	12N12A-4A-1
ES8100E	Excide®	12N12A-4A-1

Note: (-CA) or (E) Models have same Battery Specifications

	<h3>Warning</h3>
Follow all the battery manufactures' warnings for proper installing of your battery in order to prevent damage to personnel or equipment.	



1. Battery leads consist of a Red (hot) lead that connects to the (+) battery post and is connected to the (+) terminal on the starter solenoid and a Black lead which is connected to the (-) negative battery terminal and the frame mounting bolt.
2. Connect the Red (hot) terminal to the battery.
3. Connect the Black (negative) terminal to the battery.



Pre-Operating Instructions: Generator Setup

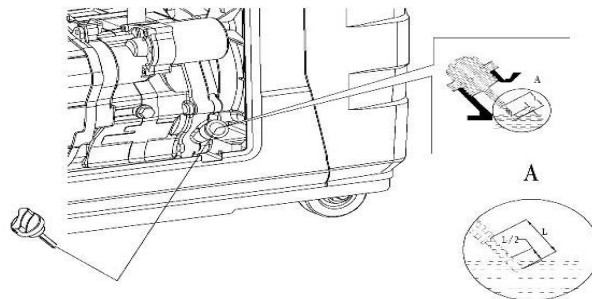
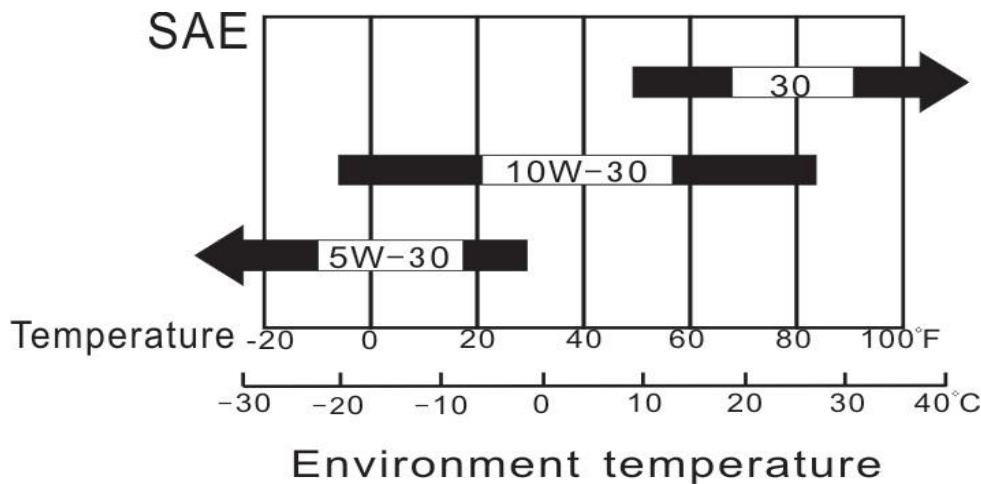
CAUTION: Any attempt to start the generator before it has been properly serviced may result in engine failure and void warranty.

ADD ENGINE OIL: Refer to the diagrams below.

1. Place generator on level surface.
2. Clean area around Oil Hole Dipstick/Plug & Unscrew Oil Hole Dipstick/Plug.
3. Fill with appropriate type and amount. Refer to Chart below for recommended oil type based on Environmental temperature.

NOTE: Refer to "Product Specifications" section for universal recommended oil type and oil amount.

4. Replace Oil Hole Dipstick/Plug and tighten securely.



Pre-Operating Instructions: Generator Setup

(Continued)



WARNING!



Fuel and its vapors are extremely flammable and explosive.



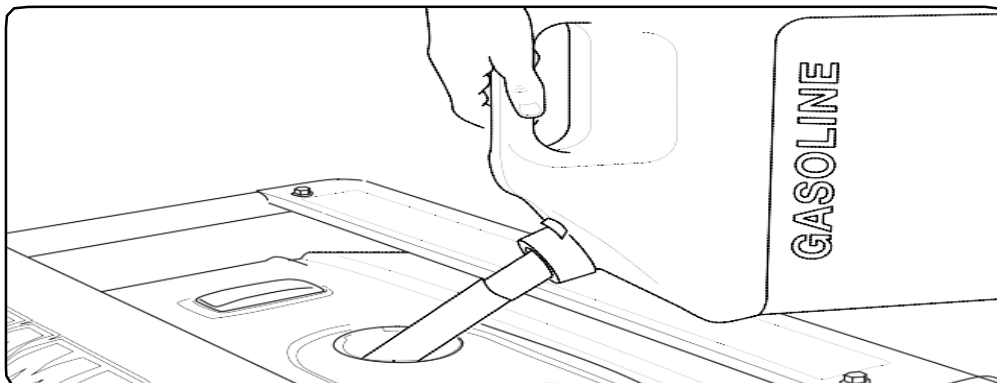
Fire or explosion can cause severe burns or death.

WHEN ADDING FUEL

- Turn generator off and let it cool for a minimum of three minutes before removing fuel cap. Turn and remove cap slowly in order to relieve residual tank pressure.
- Always fill the fuel tank with the unit outdoors.
- DO NOT overfill tank. Allow room for fuel expansion.
- Keep fuel away from sparks, open flames, heat, pilot lights, and other ignition sources.

ADD FUEL: Refer to Controls and Features section for diagrams.

1. Clean area around fuel cap, then remove fuel cap.
2. Pour fresh, clean regular automotive grade unleaded fuel with a minimum octane rating of 85 into fuel tank. Do NOT mix fuel with oil. Fuel must have ethanol blend of 10% or less. Pay close attention to the storage requirements of these fuels. Do NOT overfill fuel tank.
3. Install the fuel cap. Rotate the fuel cap clockwise until it is in its locked position. Wipe away any spilled fuel.





Pre-Operating Instructions: Generator Setup

CAUTION:

Alcohol-blended fuels (gasohol, ethanol, or methanol) will attract moisture, which leads to separation and formation of acids during storage. Acidic gas can damage the fuel system of an engine while in storage. To avoid engine problems, the fuel system should be treated with a fuel stabilizer or drained if the generator will not be started for thirty (30) days. If using a fuel stabilizer, follow the manufacturer's recommended instructions for use. Always use stabilizer with a full tank of gasoline.

Always drain old fuel and use fresh fuel before next use. If you do not use a fuel stabilizer, the fuel system must be drained and cleaned. Drain the fuel tank and start the engine, allowing it to run until all fuel lines and carburetor are drained of fuel.

Before restarting the carburetor the float bowl must be removed and cleaned of any debris.

NEVER use chemical solvents or cleaners in the fuel tank or damage may occur.

CHECK AIR CLEANER ELEMENT:

Refer to "Air Cleaner Maintenance" in the Maintenance section of this Owner's Manual to ensure Air Cleaner Element is in operable condition.

GROUNDING THE GENERATOR:

Refer to Controls and Features section.

Connect the Ground Terminal on the generator to an acceptable source of electrical ground, such as a copper-grounding stake, using copper electrical wire with a minimum diameter of 16 gauges.





Operation of Generator

HOW TO USE YOUR GENERATOR

WARNING!

Running generator gives off carbon monoxide gas. It is odorless, colorless, and highly toxic.

Breathing carbon monoxide gas can lead to fainting, nausea or may result in death.

- Only operate generator outdoors.
- Prevent exhaust gas from entering, through windows doors or ventilation intakes, any confined areas.
- DO NOT operate generator inside any enclosed or roofed areas. This includes the generator compartment of any recreational vehicle (RV).

STARTING THE ENGINE: Refer to the Controls and Features section.



CAUTION!

Never start or shutoff the generator with electrical loads connected and in the operational mode (on switch activated). Starting or shutting off the generator with electrical loads activated may result in damage to the generator.

1. Unplug all electrical loads from the generator.
2. Make sure the generator is in a level position.
3. Open the fuel cock by turning the fuel cock to the "ON" position.
4. For cold engine starts only: Pull the choke pin to the engaged position per the instruction label on the generator main frame.

PULL START (RECOIL) ONLY MODELS:

5. Place the On/Off switch in the "ON" (I) position.
6. Grasp starter handle and pull slowly until resistance is felt. Then pull the cord rapidly with a full arm stroke. Allow the rope to return slowly. Do NOT allow the rope to snap back against housing.
7. Once the engine runs for 3-5 seconds, push the choke pin in to disengage.

POWERED BY **LIFAN**

CSA-CA-EPA CERTIFIED

ENERGY STORM SERIES





Operation of Generator

HOW TO USE YOUR GENERATOR

ELECTRICT START MODELS:

5. For Electric Start Models, using provided key, turn the key switch to the “ON” position, for models with the rocker switch start, push the rocker switch to the “ON” position. Hold key switch in the “START” position or the rocker switch until engine starts or for NO MORE than 10 engine rotations. If the engine does NOT start, wait 15 seconds and repeat starting procedures.
6. Once the engine runs for 3-5 seconds, push the choke pin in to disengage.

NOTE (all models): If generator does not start within FIVE pulls, check the crankcase oil level. The engines “Low Oil Alarm System” may be activated and preventing the engine from starting.

CONNECTING ELECTRICAL LOADS:

1. Ensure engine is started before plugging in any electrical appliance.
2. Plug in desired 120 Volt loads to the 120 Volt U-Ground and 240 Volt loads to the 240 Volt receptacles on the LF8000E model. Always plug appliances into the generator with appliance in its “OFF” position.
3. Do NOT connect 240 Volt loads to the 120 Volt receptacles.
4. Only connects single-phase 60 Hertz loads.
5. **DO NOT OVERLOAD THE GENERATOR. FOLLOW THE PROVIDED “GENERATOR WATTAGE REFERENCE WORKSHEET” TO DETERMINE THE RUNNING AND STARTING WATTAGE OF YOUR EQUIPMENT REFER TO THE PRODUCT SPECIFICATIONS TO ENSURE YOUR GENERATOR WILL OPERATE THE DESIRED EQUIPMENT.**

NOTE: Use the running and starting wattage provided by the equipment manufacturer if available. If not available, use provided “Generator Wattage Reference Worksheet.”





Operation of Generator

HOW TO USE YOUR GENERATOR

LOW OIL ALARM SYSTEM:

This model is equipped with a Low Oil Alert System designed to avoid engine damage from insufficient oil in the crankcase. The Low Oil Alarm System will stop the engine automatically before the oil level in the crankcase drops below safe operating levels.

STOPPING THE GENERATOR:

Refer to Controls and Features section for diagram.

EMERGENCY SHUTDOWN

1. Turn the Fuel Valve to “OFF” position

NORMAL SHUTDOWN

1. Unplug all electrical loads or turn the main breaker to the “OFF” position.
2. In order to stabilize internal equipment temperatures, allow the engine to run for 3-5 minutes under no load.
3. If the generator will not be in use for more than 7 days, turn the fuel valve to the “OFF” position and allow the unit to run until the fuel in the carburetor is used and the engine shuts itself off.
4. Turn the ignition switch to the “OFF” position.
5. Allow unit to cool to ambient temperature before storage or transportation.
6. Always transport the generator with the fuel valve in the “OFF” position. Failure to do so will result in damage to the engine.

POWERED BY **LIFAN**

CSA-CA-EPA CERTIFIED

ENERGY STORM SERIES





Operation of Generator

HOW TO USE YOUR GENERATOR

USAGE IN HIGH ALTITUDE REGIONS:

In regions with high altitude, the standard carburetor produces overly dense combinations of fuel and air, which result in decreased engine performance and increased fuel consumption. To maintain high engine performance at high altitudes, install a high altitude carburetor main spray nozzle and re-adjust the adjusting screw for idle speed. For usage in regions with an altitude of over 4,527ft (1380m), contact your dealer to replace the standard carburetor and make needed adjustments in advance. Even with a proper high altitude carburetor spray nozzle installed in the engine, the power output of the engine will drop about 3.5% with every 1000ft (305m) increase in altitude. If the standard carburetor jets are not replaced and adjusted for usage in high altitude, the increased altitude effect will be even more severe.

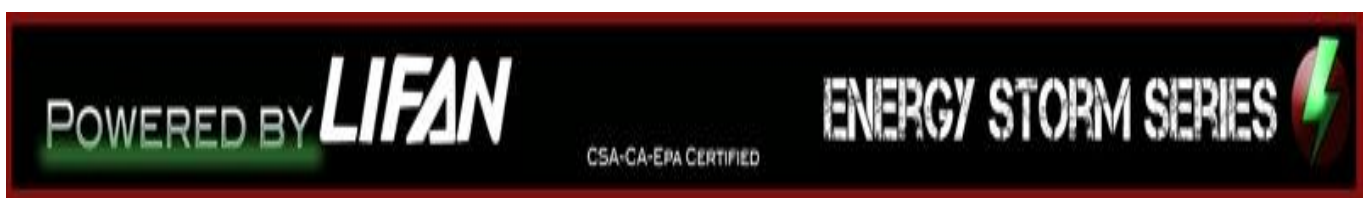
NOTE: Usage of the generator in regions with lower altitude than the high altitude carburetor spray nozzle is applicable, may result in decrease of engine performance. The engine may become overheated and over-lean combination of fuel and air produced may cause severe damage to the engine.

TRANSFER SWITCH CONNECTIONS - Only allow Professional Electricians

The Lifan EnergyStorm generator is wired with the neutral bonded to ground. If you are connecting your generator to a transfer switch, the electrician must first determine what type transfer switch is being used. Transfer switches for this equipment are either two-pole or three-pole types.

A two-pole transfer switch will not switch the neutral from the generator to the service panel. That means the generator will be grounded to the service panel. To use the generator with two-pole transfer switches, the electrician will need to change the neutral from bonded to floating.

This is done by removing the jumper wire that connects the alternator ground to the alternator neutral. Remove the jumper wire and retighten the connections. Keep the jumper wire with the owner's manual in case it is needed for future use when not connected to a transfer switch.



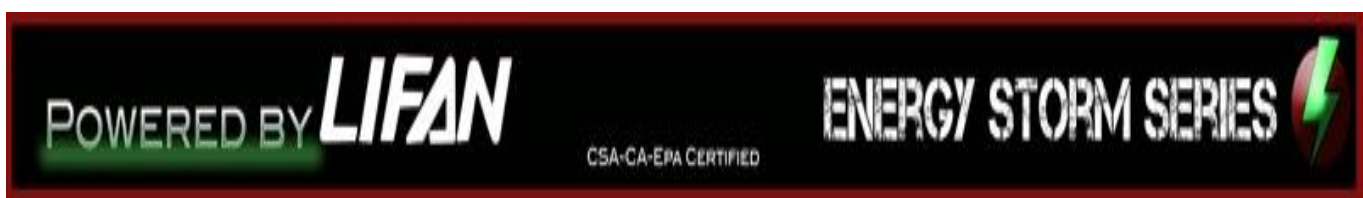


Storing the Unit

STORAGE

Before long term storage of your power equipment product, typically 30 days or more, perform the following:

1. Set the fuel cock (valve) to the “OFF” position.
2. Let the unit continue to run until it stops itself, burning all of the fuel in the fuel system.
3. Turn the ignition switch to the “OFF” position.
4. Drain the engine oil in accordance with the “Oil Change Procedures” in this Owner’s Manual’s Maintenance section. Do NOT re-fill with oil until ready to use again.
5. Remove the Spark Plug in accordance with the “Spark Plug Maintenance” in the Owner’s Manual’s Maintenance section. Spray a lubricant, such as WD40®, into the Spark Plug hole to lubricate the top of the piston and walls of the cylinder. Replace the Spark Plug.
6. Pull starter rope until resistance is felt. This will place the valves in the closed position.
7. Add the recommended amount of fuel stabilizer, in accordance with the amount recommended by the manufacturer of the fuel stabilizer, to the unused gasoline left in the fuel tank.
8. Place the unit in a clean, dry, and secure location.
9. Cover with “LIFAN Water Proof Generator Cover,” (Item Number LF100-69600 not included) or canvas/vinyl tarpaulin. Do NOT operate unit with cover installed.



Maintenance

MAINTENANCE SCHEDULE	
PROCEDURE	TIME
Engine Oil Check	Each Use
Replace Engine Oil	After Each 40 Hours of Use (For Initial Break in – After First (1 st) 10 Hours of Use
Air Cleaner Filter Check	Each Use
Air Cleaner Filter Replacement	When Needed or After Every 50 Hours of Use
Air Cleaner Wash	When Needed
Spark Plug	When necessary or within 100 hrs of run time
Valve Clearance	Check & Re-adjust annually or after 300 Hours of Use
Fuel Tank	Replace Every 3 Years Based on Condition

OIL CHANGE PROCEDURES: Refer to Controls and Feature section for diagram. **Periodic Maintenance of your engine oil should be performed after each 40 hours of use of you Power Equipment Product. Check your engine oil level prior to each use.**

1. Start your engine and let it warm up to get the oil warm and thinner. Turn the engine On/OFF switch to the “OFF” position. Turn Fuel Valve to the “OFF” position.
2. Remove the oil cap/dipstick by turning counter clockwise. Remove the oil drain plug located below the oil cap/dipstick utilizing the appropriate tools.

USE CAUTION: THE OIL MAY BE HOT.

3. Drain the engine oil into an approved receptacle and discard in accordance with all Federal and State Regulations. Never dump the used engine oil on the ground or into drains, only discard in an approved manner. Check with your local authorities to determine the regulations in your area.





Maintenance

WARNING! AVOID SPLASHING OF HOT OIL; IT CAN BURN YOU AND CAUSE SEVERE INJURY.

4. After oil is completely drained, replace oil drain plug and tighten with appropriate tools. Replace oil with the proper oil for your product. Refer to the Pre-Operating Instruction: Generator Setup section for exact fill requirements.

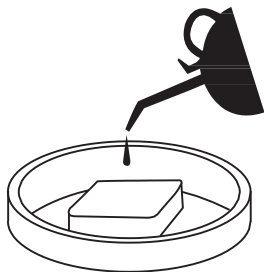
Always use your dipstick to check the oil level and only fill to the full mark on the dipstick. Never overfill the engine as this can cause damage to the unit and void warranty.

5. Replace the dipstick/oil cap on the engine.
6. Shake generator to ensure the float in the Oil Alert System is free.

PROPER MAINTENANCE OF THE UNIT WILL INCREASE THE LIFE OF YOUR PRODUCT. THE OIL MUST BE CHANGED ON A REGULAR BASIS FOR PROPER OPERATION, AND RELIABILITY AND TO ALSO MAINTAIN THE WARRANTY ON THIS PRODUCT.

AIR CLEANER MAINTENANCE:

1. Remove the clip (item 9 in "Air Cleaner A" below) or the wing nut (item 7 in "Air Cleaner B" below) to remove and check the air filter element.
2. For Sponge Type Air Filters, wash with soap and water when contaminated. Squeeze excess liquid from air filter element, and allow the air filter element to dry. lubricate with a few drops of oil. For Paper Type Air Filters, replace with the correct Air Filter for your unit. They are available at your dealer or from LIFAN Power USA. Order your filter by calling toll free 866-471-7464.



POWERED BY **LIFAN**

CSA-CA-EPA CERTIFIED

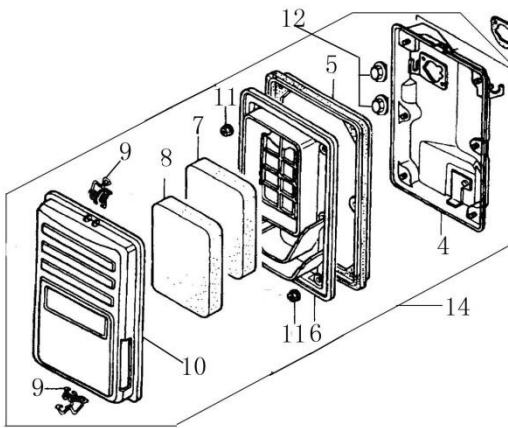
ENERGY STORM SERIES



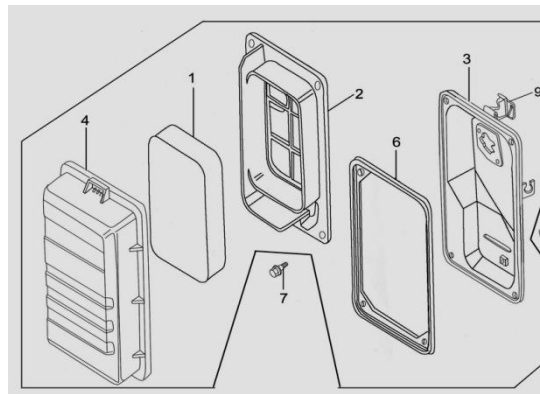


Maintenance

3. Re-Install the air filter element into the air filters housing.



Air Cleaner A



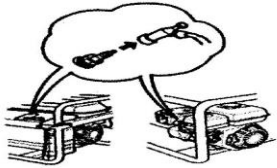
Air Cleaner



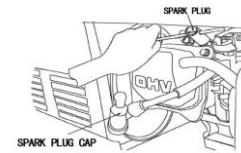
Maintenance

SPARK PLUG MAINTENANCE:

1. Remove Spark Plug Cap (refer to "Spark Plug Cap Removal" figure below.)
2. Remove Spark Plug with socket and handle supplied with your unit (refer to "Spark Plug Removal" figure below.)
3. Clean any carbon build-up around the Spark Plug.
4. Check the Spark Plug Gap and adjust if necessary. 0.30-inch gap.
5. Lubricate the threads of the Spark Plug with anti-seize compound or engine oil.
6. Re-install the Spark Plug and Spark Plug Cap.



Spark Plug Cap Removal



Spark Plug Removal

FUEL SYSTEM MAINTENANCE:

NOTE: Periodically you can get sediment or trash in your Carburetor Bowl. Use the following procedures to clean:

1. Turn the fuel cock (valve) to the "OFF" Position.
2. Remove the carburetor bowl by removing the mounting bolt located at the bottom of the bowl.
3. Dump out the old fuel and sediment into an approved container and clean carburetor bowl thoroughly.





Maintenance

FUEL SYSTEM MAINTENANCE (continued):

4. Fit a new rubber washer into place and re-attach fuel bowl to the carburetor. (refer to "Fuel Filter Element Assembly" diagram below.)



Fuel Filter Element Removal



Fuel Filter Element Assembly



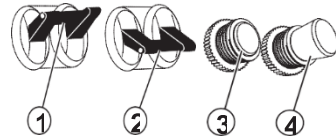


Troubleshooting

IF THE ENGINE WILL NOT START:

1. Check to ensure switches are in the "ON" position. (Both unit and engine)
2. Check engine oil level. Your unit possesses a Low Oil Alarm System that will not allow your engine to start if the oil is below safe operating levels. This feature is installed to increase the life of your engine and prevent engine damage. If oil level is low, fill to the full mark on dipstick. Refer to the Product Specifications for exact oil type and amounts.
3. Check the fuel level to insure adequate fuel. Add fuel if necessary.
4. Remove and inspect the spark plug for cleanliness and proper electrode gap. If needed, clean or replace the spark plug. Refer to Spark Plug Maintenance in the Maintenance section of the Owner's Manual for proper procedure.
5. If your unit will still NOT start after performing the above checks, call our customer hotline at LIFAN Power USA Toll Free 1-866-471-7464 OPTION 2.

NOTE: Periodically on the initial start-up or after the unit has been stored for a long period of time, the float for the "Low Oil Alarm System" will stick to the bottom of your oil pan. Locate the two (2) wires to the Low Oil Sensor Diode (refer to figure on the right) located on the side of the engine block. Unplug these wires and, **only after ensuring the engine is full of oil**, start the engine and allow to run until warm (normally 20 minutes, as this will heat the oil and release the float on the Low Oil Alert System). Then re-plug the wires to the terminals on the Low Oil Alarm Sending Uni



UNIT DOES NOT PROVIDE ELECTRICAL CURRENT:

1. Plug in a small appliance or tool to test.
2. Check if the AC (or DC) Circuit Breaker is in the "ON" position. If not, place in "ON" position. If equipped with a GFCI receptacle, re-set GFCI Breaker by pushing in the reset button in the middle of the GFCI's faceplate (this must be done with the engine running).
3. If your unit still does NOT produce electricity after performing the previous checks, call LIFAN Power USA at 1-866-471-7464, OPTION 2.

1.On 2.Off/Tripped 3.On 4.Off

UNIT DOES NOT PROVIDE ELECTRICAL CURRENT (continued):

1. If your unit still does NOT produce electricity after performing the previous checks, call LIFAN Power USA at 1-866-471-7464 OPTION2.



Generator Safety

1. Never operate gasoline engine powered products in any enclosed spaces, as they product deadly Carbon Monoxide Poisonous Gases.
2. Never hook a generator directly to your home circuit without the proper installation by a Licensed Electrician and without the proper power transfer devices.
3. Do NOT operate your power equipment in inclement weather such as rain, snow, and/or sleet.
4. Do NOT operate your power equipment within five (5) feet of any flammable materials.
5. When refueling the power equipment never smoke or refuel near any flame or ignition devices. Never refuel while the unit is running. If during the refueling process some fuel is spilled, always completely clean the fuel and allow sufficient drying time prior to re-starting the unit. Gasoline vapors ignite easily and are very dangerous.
6. Do NOT parallel connect this model. Generator cannot be combined with other electric wires or multiple socket boxes.
7. Do NOT lengthen the exhaust pipe or vent it with any extension.
8. Use SJ or SJO type extension cords if necessary.
9. Do not use extension cords exceeding: 16 Gauge, 200ft or 10 Gauge, 330ft.
10. NEVER ALLOW CHILDREN OR ANIMALS TO BE NEAR THIS EQUIPMENT DURING OPERATION. ONLY QUALIFIED PERSONS SHOULD OPERATE THIS EQUIPMENT. FOLLOW ALL GUIDELINES CONTAINED IN THIS OWNER'S MANUAL FOR THE SAFE OPERATION OF THIS EQUIPMENT.

 DANGER	 DANGER	 DANGER
Using a generator inside CAN KILL YOU IN MINUTES Generator exhaust contains carbon monoxide. This is a poison that you cannot see or smell.	L'utilisation d'une génératrice à l'intérieur PEUT VOUS TUER EN QUELQUES MINUTES. Les gaz d'échappement de la génératrice peuvent contenir du monoxyde de carbone, un poison que vous ne pouvez pas voir ni sentir.	El uso de un generador en el interior PUEDE MATARLO EN POCOS MINUTOS. El escape del generador contiene monóxido de carbono. Esto es tóxico y do debe verlo u olerlo.
 NEVER use inside a home or garage, EVEN IF doors and windows are open.  Only us OUTSIDE and far away from windows, doors, and vents	 NE JAMAIS utiliser à l'intérieur d'une maison ou d'un garage. MEME SI les portes et fenêtres sont ouvertes.  Utiliser uniquement à l'EXTERIEUR et loin des fenêtres, portes et ouvertures d'aération.	 NUNCA utilice dentro de una casa o un garaje, AÚN cuando las ventanas y las puertas estén abiertas  Utilice únicamente en el EXTERIOR y lejos de ventanas, puertas o rejillas de ventilación.
Avoid other generator hazards, READ MANUAL BEFORE USE		





Wattage Chart

GENERATOR WORKSHEET

	RUNNING WATTAGE REQUIREMENTS	ADDITIONAL STARTING WATTAGE REQUIREMENTS
HEATING/COOLING:		
Furnace Fan, gas or fuel oil furnace		
1/8 horsepower	300	500
1/6 horsepower	500	750
1/4 horsepower	600	1000
2/5 horsepower	700	1400
3/5 horsepower	875	2350
Central Air Conditioner		
10,000 BTU	1500	2200
20,000 BTU	2500	3300
24,000 BTU	3800	4950
32,000 BTU	5000	6500
40,000 BTU	6000	6700
HEATING/COOLING:		SUB-TOTAL:
KITCHEN		
Refrigerator, Average	600	2200
Dish Washer - Cool Dry	700	1400
Dish Washer - Hot Dry	1450	1400
Clothes Dryer - Gas	700	1800
Clothes Dryer - Electric	5750	1800
Microwave Oven, 750W	750	800
Washing Machine	750	2300
Coffee Maker	850	0
Toaster 2-slice	1100	0
Toaster 4-slice	1650	0
Electric Skillet	1500	0
Electric Range 6-in. element	1500	0
Electric Range 8-in. element	2100	0
Freezer	2500	2200
KITCHEN		SUB-TOTAL:
APPLIANCES		
Lights- Wattage	Actual:	
VCR	50	0
Heating Pad	65	0
Radio	100	0





Television - Color	300	0
Dehumidifier	400	0
Electric Blanket	400	0
Garage Door Opener - 1/4HP	550	1100
Garage Door Opener - 1/3HP	725	1400
Well Pump - 1/3 hp	750	1400
Well Pump - 1/2 hp	1000	2100
Sump Pump - 1/3 hp	800	1300
Sump Pump - 1/2 hp	1050	2150
Vacuum Cleaner - Standard	800	0
Vacuum Cleaner - Deluxe	1100	0
APPLIANCES		SUB-TOTAL:
COMMERCIAL PRODUCTS:		
1/4" Drill	300	300
Jigsaw	300	300
Electric Weed Trimmer	500	500
Router	1000	1000
Belt Sander	1000	1000
Disc Sander	1200	1200
Chain Saw	1200	1200
Worm Drive Saw	1560	3100
12" Concrete Cutter	1800	3600
7 1/4" Circular Saw	1500	3000
Disc Grinder	2000	4000
Air Compressor, Average	2000	4000
COMMERCIAL PRODUCTS:		SUB-TOTAL:





CONVERTING AMPS OR HORSEPOWER INTO WATTS

Watts = Amps x Volts

Running Watts* = Horsepower x 932 (for motors)**

- Add a 10% correction factor to your totals to help overcome this uncertainty.

If your customer plans to operate devices that use electric motors, list **both** the **starting** and **running requirements** of each.

- **Starting requirements** of some devices maybe significantly higher than their **running requirements**. This **higher demand** must be considered when estimating your power needs. Some small, universal motors — which do not draw a heavy starting load (drills, small saws, blenders, etc.) — require very little extra current for starting.

MOTOR/ DEVICE	STARTING WATTS	RUNNING WATTS
Motor A	2,600	850
Motor B	1,300	600
Motor C	1,000	750

NO ELECTRIC MOTORS

If your list *does not* include any devices that use electric motors, simply add the power (**running**) requirements of all the items on your list to obtain the maximum power needed.

DEVICE	WATTS
Electric Skillet	1,500
Light	100
Heating Pad	65
Total:	1,665






LIMITED WARRANTY POLICY

This warranty is limited to the following Lifan Power and Storm Series products that are distributed by the EquipSource LLC, dba LIFAN POWER USA, located at 2205 Industrial Park Road, Van Buren, AR 72956. Effective date is 4/20/2010.

LENGTH OF WARRANTY				
PRODUCTS COVERED	Residential Use**			Commercial/Rental***
	1 st Year	2 nd Year	3 rd Year	Warranty not to exceed 300 hrs. Or terms listed below.
Walk Behind Mowers	Full unit parts and labor	Full unit parts only	Engine: parts only	Full unit: 3 months parts and labor
Water Pumps	Full unit parts and labor	Full unit parts only	Engine: parts only	Full unit: 12 months parts and labor
Generators/Inverter Generators	Full unit parts and labor	Full unit parts only	Engine: parts only	Full unit: 12 months parts and labor
Pressure Washer Engines	Full unit parts and labor	Full unit parts only	Engine: parts only	Full unit: 12 months parts and labor
Pressure Washer Pumps*	Full unit parts and labor	NA	NA	Full unit: 12 months parts and labor
Gasoline Engines	Full unit parts and labor	Full unit parts only	Engine: parts only	Full unit: 12 months parts and labor
Gasoline Powered Welders	Full unit parts and labor	Full unit parts only	Engine: parts only	Full unit: 6 months parts and labor

* All Lifan Pressure Pro™ and Storm Series Pressure Storm™ pressure washers are equipped with Annovi Reverberi ™ high pressure water pumps which are covered by the manufactures 1 year limited warranty. Go to www.lifanpowerusa.com for details.

** Residential Use is defined as items that are for personal use.

*** Commercial/Rental use is defined as any usage for income producing or other business related uses.

In order to qualify for the limited warranty the product(s) must be purchased in North America from an authorized EquipSource, LLF d/b/a Lifan Power USA dealer or a dealer authorized by EquipSource to sell Lifan products. This warranty is non-transferable and applies only to the original purchaser. The supplied "Warranty Registration Card" must be completed and on file with American Warranty Service (at the supplied address), at the time that any warranty claim is made. The "Warranty Registration Card" must be submitted with a receipt of purchase which clearly states the date of purchase and where the purchase was made.

During the warranty period (stated above) Equipsource, LLC and/or American Warranty Service will repair or replace, at its' option, any part that is proven to be defective in material or workmanship under normal usage. Repairs and/or replacement will be made without charge for parts or labor. All parts found to be defective must be returned to EquipSource or American Warranty Service at our direction. Upon reception of the parts a judgment as to the validity of the warranty claim will be determined. All parts replaced under warranty or any replacement of the complete unit will be considered part of the original product and replacement of any product, and any warranty on those parts or replacement unit will coincide with the original warranty.

To obtain Warranty Service, call our Customer Service Hotline at 1-866-471-7464 and press 2 for Warranty Service at which time you will be transferred to the technicians at American Warranty Service. In lieu of this you may call directly to American Warranty Service at 888-926-4313 to be directly connected to a repair specialist. If your issue cannot be resolved through consultation with our customer service representatives, you will be directed to an Independent Service Center of your choice nearest your location. Any manufacture's Defects of your product will be repaired or replaced at no charge to you per our commitment. If the issue with your unit is not a Manufacture's Defect, you will be advised to make payment to the Service Center upon diagnosis of repairs which are not covered under the Manufacturer's Warranty Policy. In this case the end user is responsible for all shipping and handling charges associated with the exchange and as stated above the warranty will coincide with the date of the original purchased unit.





LIMITED WARRANTY POLICY

This warranty is not valid for products or parts affected or damaged by accident, collision, normal wear, fuel contamination, abuse, neglect, misuse, alteration and/or unsuitable use or unauthorized parts replacement. Mower decks and blades are specifically not warranted for impact or abrasive damage. Warranty becomes void if the customer fails to install, maintain, and/or operate the product in accordance with the instructions and recommended actions of Lifan set forth in the owner's manual. EquipSource, LLC disclaims any responsibility for time loss or loss of usage of the product, transportation, commercial loss, or any other incidental or consequential damage. Prior to any warranty service an approval code must be issued to the service center in order for the warranty claim to be valid. Any implied warranties are limited to the duration of this written limited warranty. This warranty gives you specific legal rights, and you may also have other rights, which may vary from state to state.

OWNER'S RESPONSIBILITY

To ensure trouble free warranty coverage it is important that you register your Lifan generator by phone at 1-866-471-7464, or by filling out and returning to Lifan Power USA the warranty registration card supplied with your generator. Registering your product

This confirms your warranty coverage and provides a direct link between you and Lifan Power USA if we find it necessary to contact you.

Your receipt for purchase including date, model and serial number must be maintained and registered to receive service from an Authorized Service Dealer for warranty service. Proof of purchase rests solely with you, the original purchaser.

You must demonstrate reasonable care and use, and follow preventive maintenance, storage, fuel and oil usage as prescribed in the operator's manual for your Lifan Power unit. For the warranty assistance from a Lifan Authorized Service Dealer nearest to you, call Lifan's automated phone at 1-866-471-4764 Option 2. Should you require assistance or have questions concerning Lifan Power USA Warranty Statement, you can contact us through the web at www.lifanpowerusa.com or call toll free 1-866-471-7464.

EXCLUSIONS

- Lifan Power Equipment that utilize non-Lifan replacement parts.
- Failure to perform "Periodic Maintenance" as required and specified in the supplied "Owner's Manual."
- Costs of normal maintenance and adjustments.
- Failures caused by any contaminated fuels, oils, or lack of proper oil levels.
- Repairs or diagnostics performed by individuals other than Lifan authorized dealers not authorized in writing by Lifan.
- Failures due to normal wear and tear, accident, misuse, abuse, negligence or improper use.
- As with all mechanical devices, the Lifan engines need periodic part(s) service and replacement to perform as designed. This warranty will not cover repair when normal use has exhausted the life of a part(s) or engine.
- Failures caused by any external cause or act of God, including but not limited to, collision, theft, vandalism, riot, war, fire, freezing, lightning, earth-quake, windstorm, hail, water, flood, tornado, or hurricane or any occurrence outside of normal use and activity .
- Damage related to any animal infestation to include rodent and/or insect infestation.
- Products that are modified or altered in a manner not authorized in writing by Lifan.
- Any incidental, consequential or indirect damages caused by defects in materials or workmanship, or any delay in repair or replacement of the defective part(s).
- Failure due to misapplication.
- Telephone, cellular phone, facsimile, internet access, or other communication expenses.
- Expenses related to "customer instruction" or troubleshooting where no manufacturing defect is found.
- Overnight freight or special shipping costs for replacement part(s).
- Overtime, holiday or emergency labor.
- Starting batteries, fuses, light bulbs and engine fluids.





DISCLAIMER OF IMPLIED WARRANTIES

This limited warranty is in lieu of all other expressed or implied warranties, including any warranty of the unit's fitness for any particular use and any implied warranty of MERCHANTABILITY otherwise applicable to Lifan Power Equipment and its affiliated companies shall not be liable for any special, incidental or consequential damage, including lost profits. There are no warranties extended other than as provided herein. This limited warranty may be modified only by Lifan Power USA. Any implied warranties allowed by law shall be limited in duration to the terms of the express warranty provided herein. Some states do not allow limitations on how long an implied warranty lasts, so the above limitation may not apply to you. Some states do not allow the exclusion or limitation of incidental or consequential damages, so the above limitation may not apply to you. This warranty gives you specific legal rights. You also have other rights from state to state. Lifan's ONLY LIABILITY SHALL BE THE REPAIR OR REPLACEMENT AS STATED ABOVE. IN NO EVENT SHALL LIFAN BE LIABLE FOR ANY INCIDENTAL OR CONSEQUENTIAL DAMAGES, EVEN IF SUCH DAMAGES ARE A DIRECT RESULT OF LIFAN'S NEGLIGENCE. Some states do not allow the exclusion or limitation of incidental or consequential damages, so the above limitation may not apply to you. This warranty gives you specific legal rights and you may also have other rights from state to state.

OWNER'S WARRANTY RESPONSIBILITIES:

As the outdoor equipment owner, you are responsible for performance of the required maintenance listed in your owner's manual. EquipSource, LLC d/b/a Lifan Power USA recommends that you retain all receipts covering maintenance on your outdoor equipment. Lifan Power USA will not deny your warranty coverage based solely on your lack of receipts for service however, the condition of the equipment upon arrival at the service center will determine the warrantable nature of the product.

As the outdoor equipment owner, you should however be aware that Lifan Power USA may deny your warranty coverage if your outdoor equipment or a part has failed due to abuse, neglect, or improper maintenance or unapproved modifications.

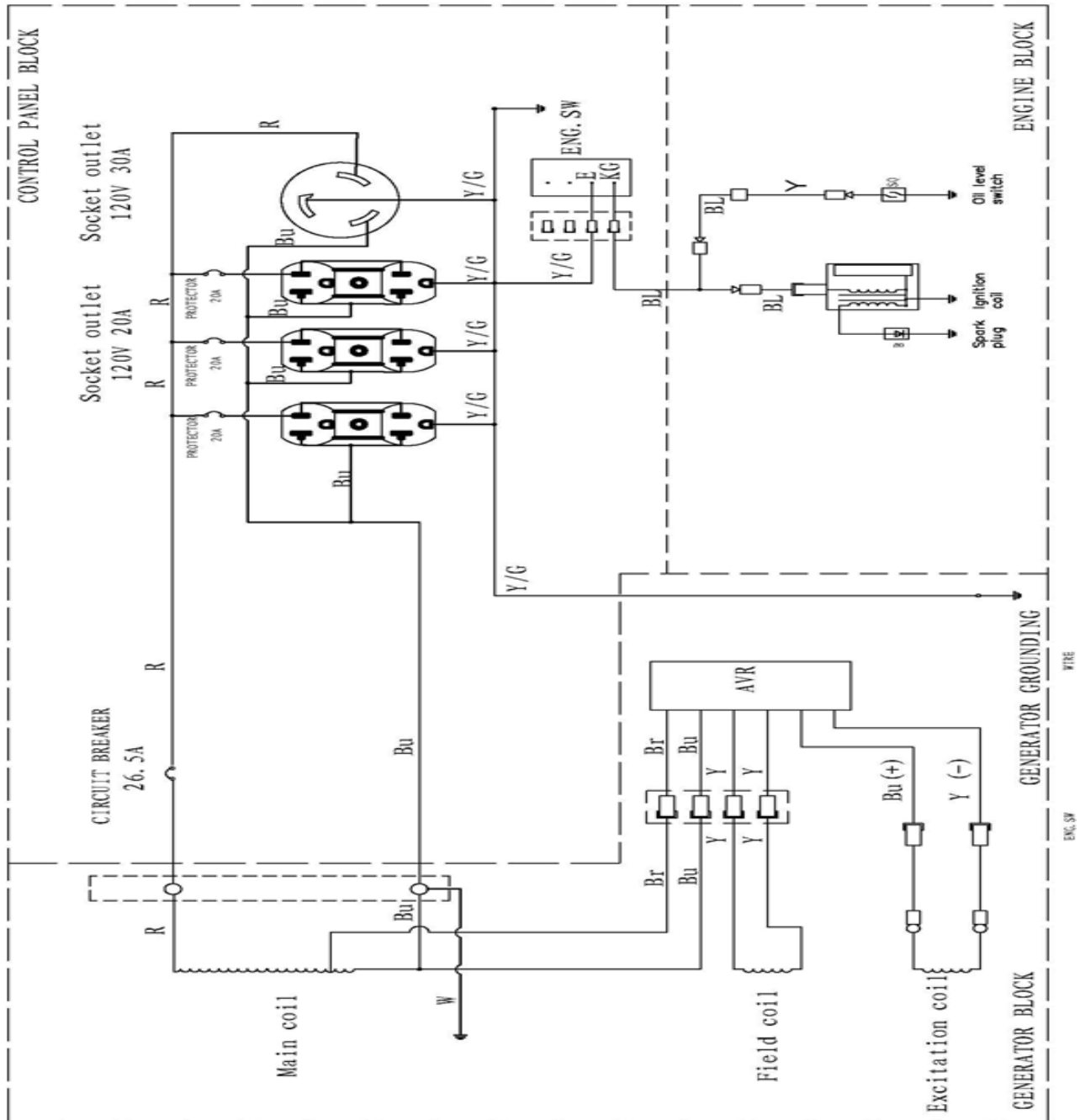
If you have any questions regarding your warranty rights and responsibilities, you should contact Lifan Power USA or American Warranty Service Representative at 1-866-471-7464 Option 2 Warranty and Service or at the following address Lifan Power USA, 2205 Industrial Park Road, Van Buren, AR 72956 or by contacting us through www.lifanpowerusa.com.

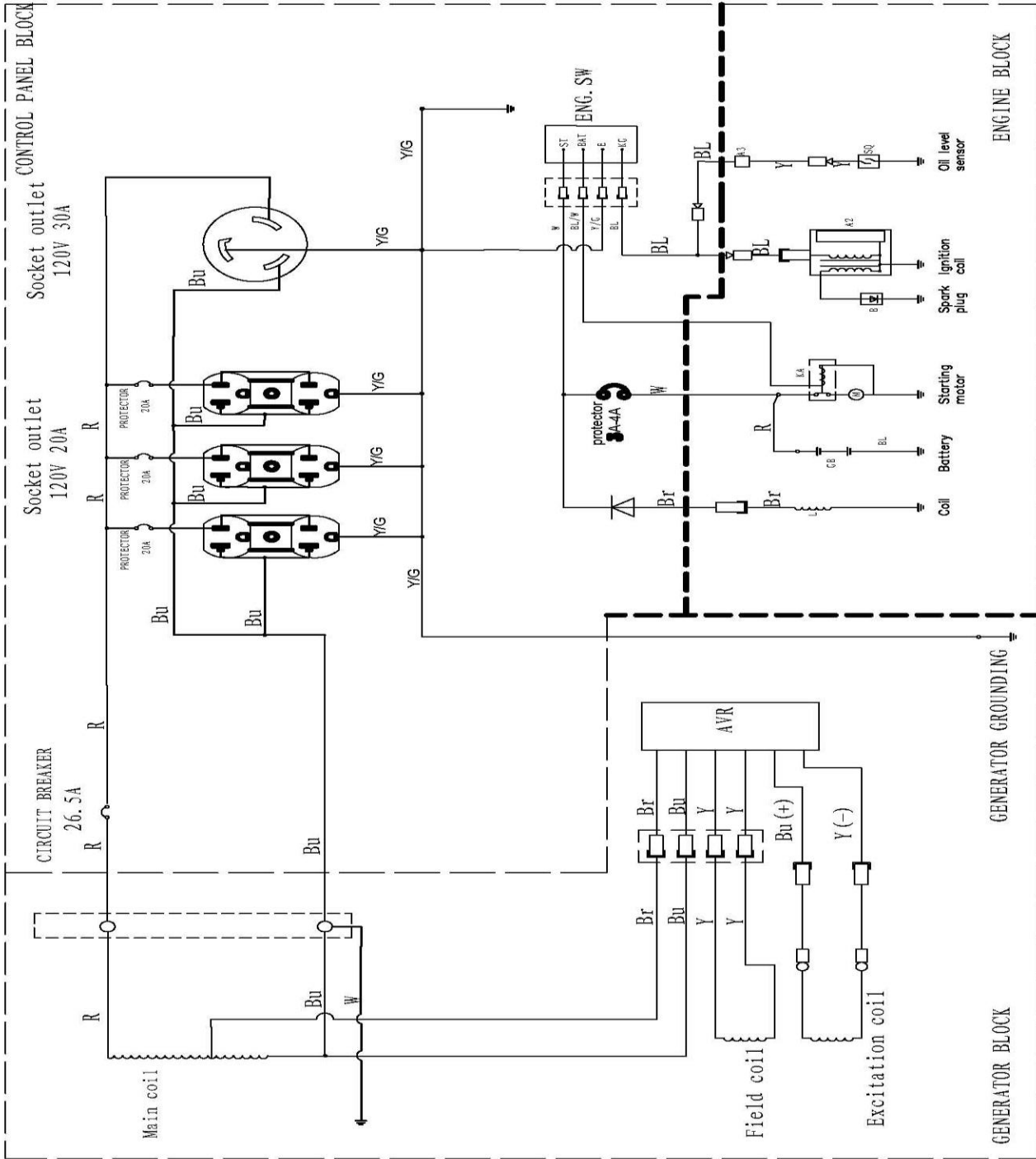
This warranty specifically excludes the use of any Lifan Power Equipment or Storm Series power equipment as the "Sole Source of Power" for "off the power grid applications" and this warranty will become null and void for units used for this purpose and manner. This warranty specifically excludes the use of any Lifan Power Equipment or Storm Series power equipment for the purpose of powering Life Support devices, Life Support appliances, Medical devices, and/or Medical appliances. EquipSource, LLC will not be held responsible for any damage due to the use of any Lifan or Storm Series power equipment for these purposes.



Wiring Diagram

ES4100 & ES4100E





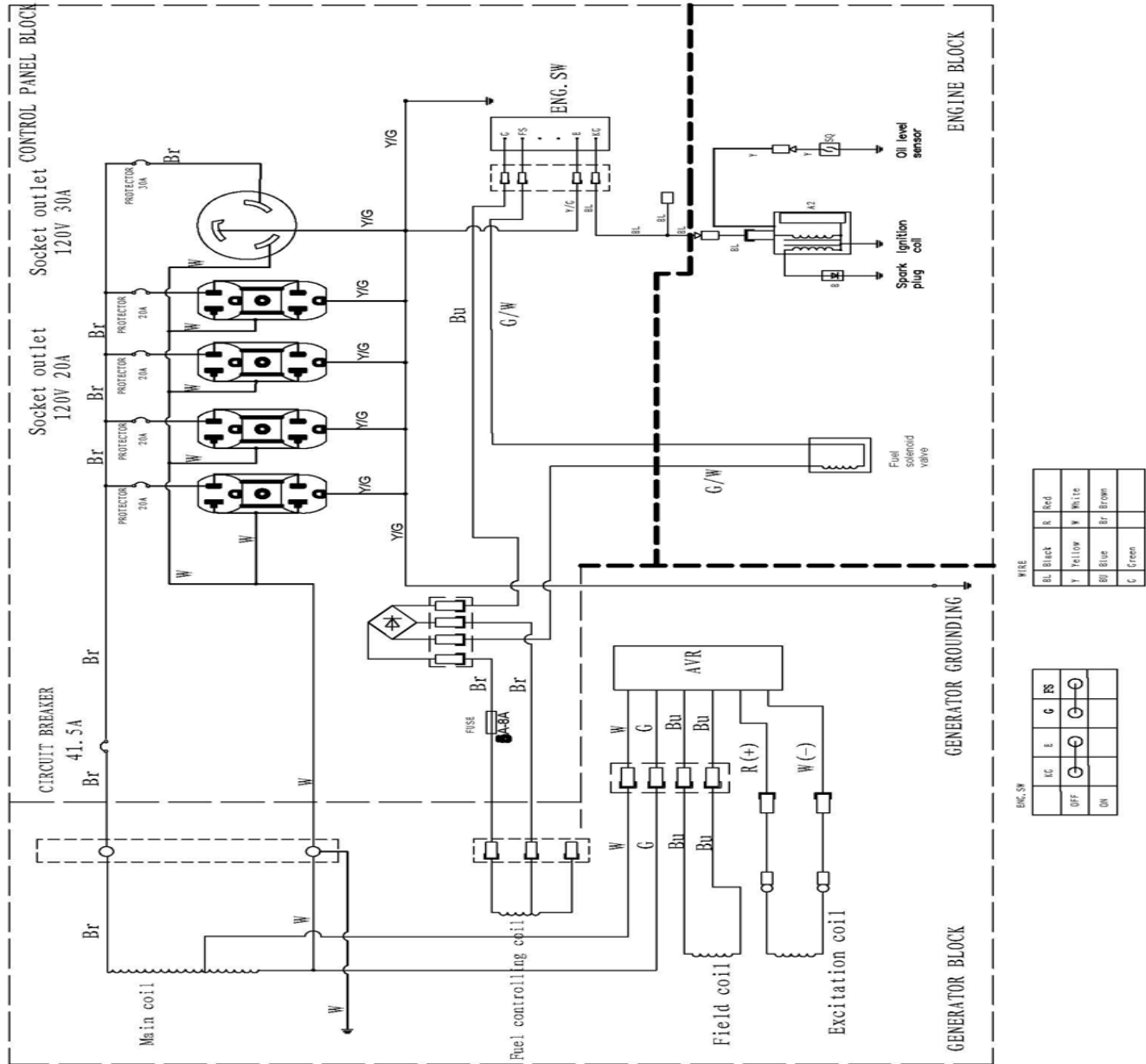
WIRE	Color
BL	Black
R	Red
Y	Yellow
W	White
BL	Blue
Br	Brown
C	Green

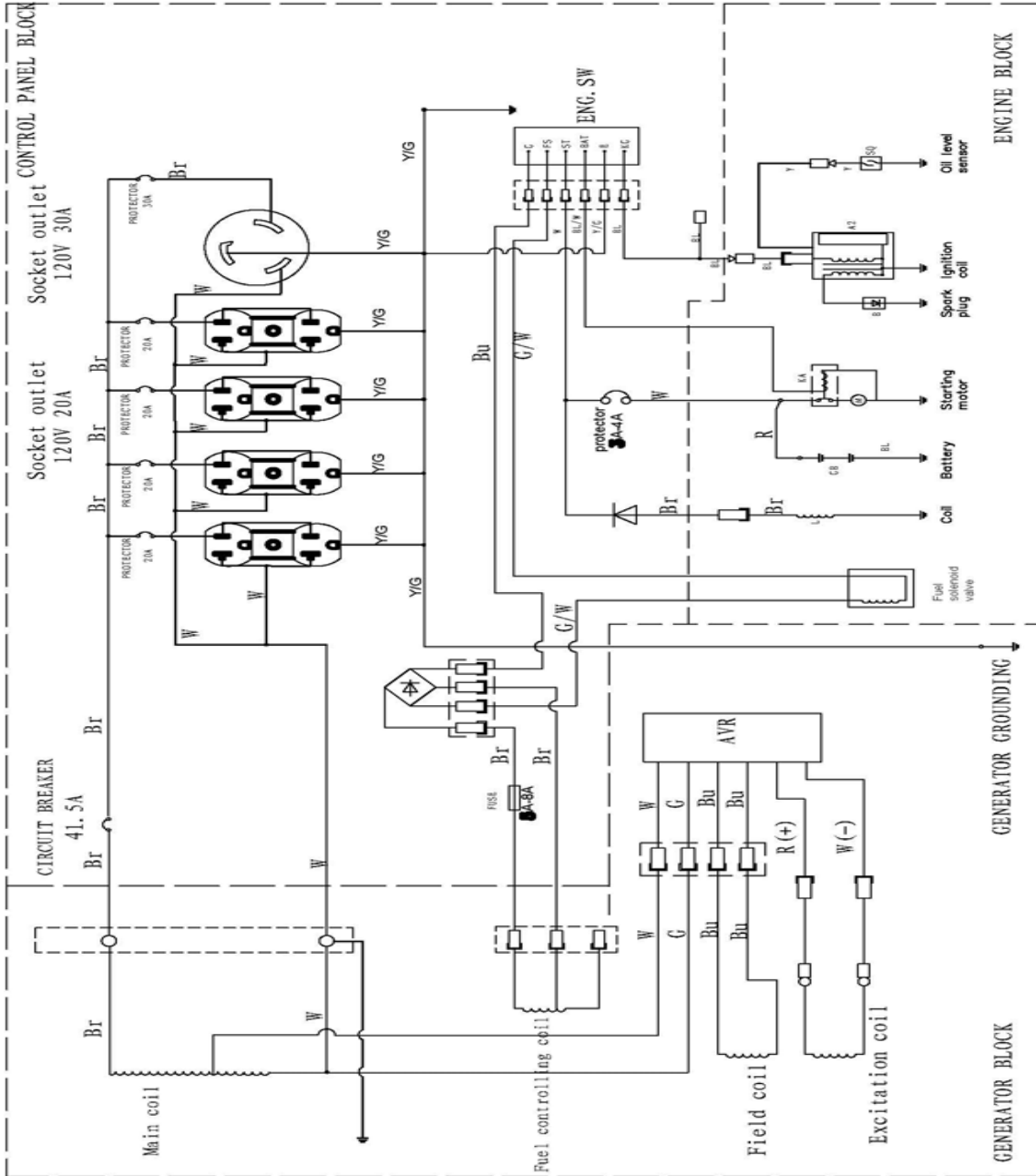
ENG. SW	IC	E	BAT	ST
OFF	⊖	⊖		
ON				
START				⊕



Wiring Diagram

ES5700 & ES5700E





WIRE

EL	Black	R	Red
Y	Yellow	W	White
Bu	Blue	Br	Brown
G	Green		

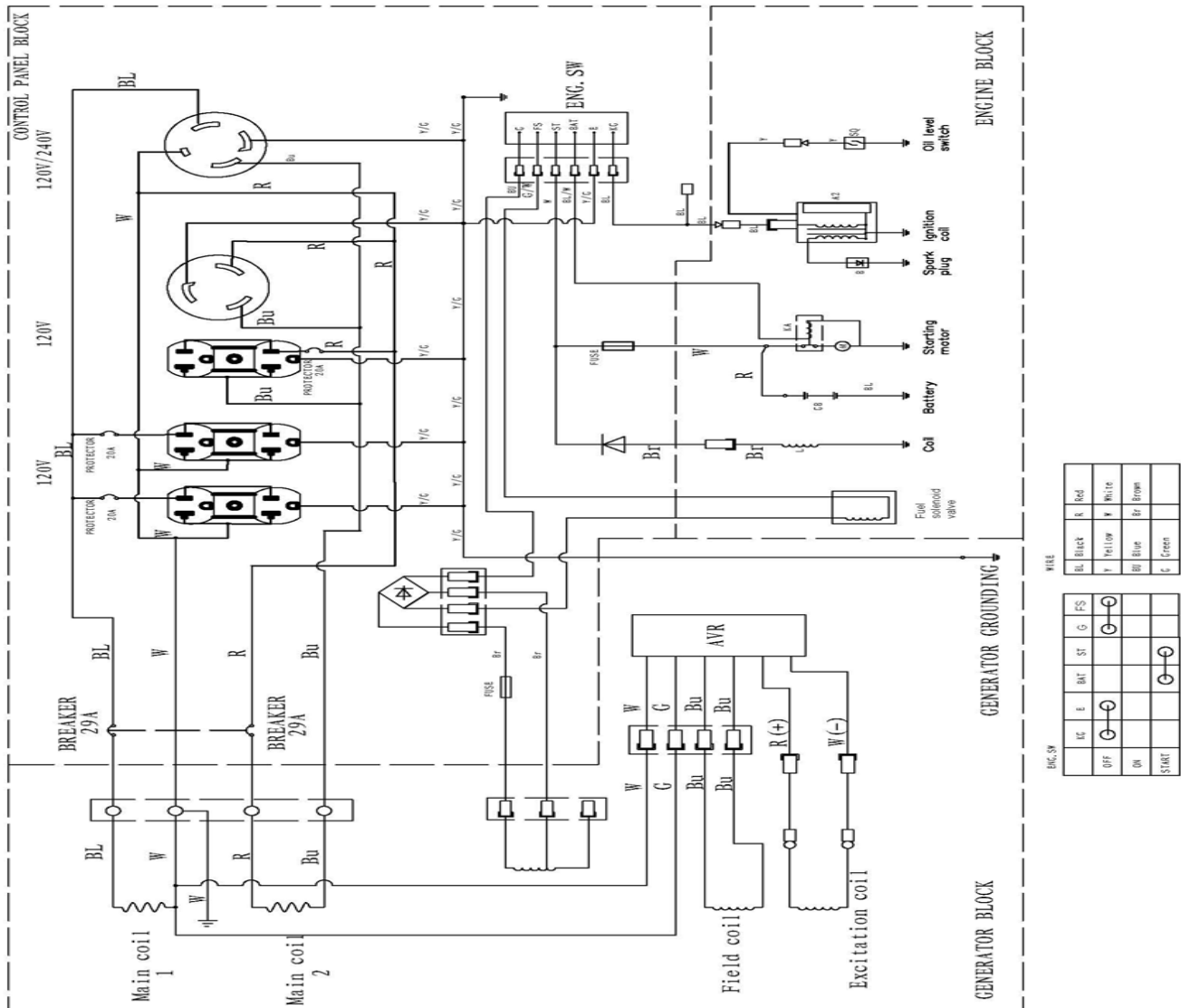
ENG. SW

EG	E	BAT	ST	G	PS
OFF	⊖	⊖		⊖	
ON					
START			⊖	⊖	

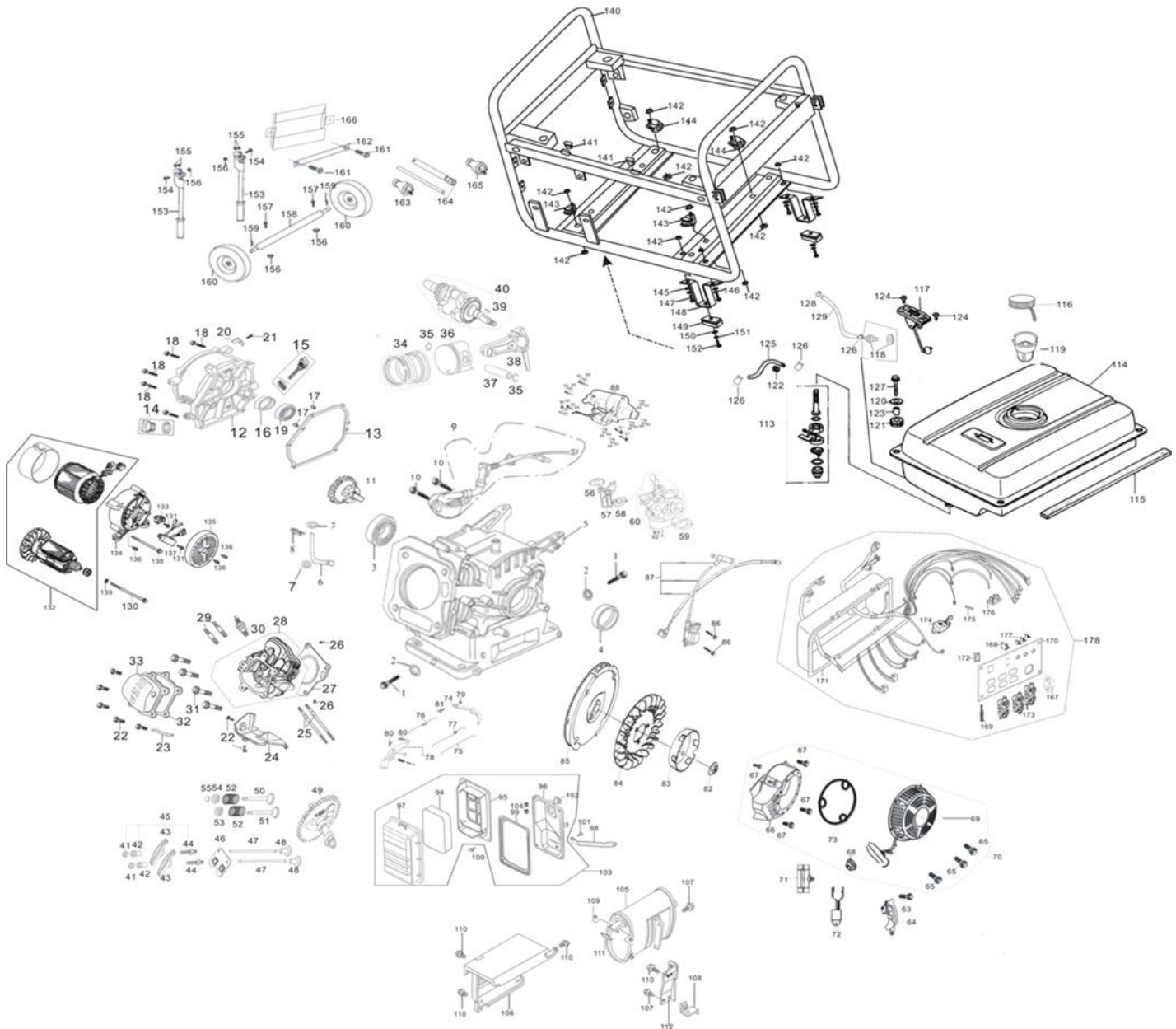


Wiring Diagram

ES8100E



Engine Exploded View & Parts ES4100 and ES4100E





Part	Code	Description	q' ty
1	11115-A0710-0001	Drain plug M10X15	2
2	11116-A0710-0001	Washer	2
3	T910-0001	Bearing 6205	1
4	11120-A0710-0002	Oil seal, crankshaft	1
5	11110-A0611-0001	Crankcase	1
6	26111-A0710-0001	Regulating sway bar	1
7	26113-A0710-0001	Washer	2
8	26112-A0710-0001	Split pin	1
9	27400-A0710-0002	Oil sensor	1
10	T152-0004	Bolt M6×14	2
11	25100-A0710-0004	Driven gear assy, regulator	1
12	11211-B9130-0001	Crankcase cover	1
13	11114-A0710-0001	Gasket, crankcase	1
14	15610-A0710-0001	Oil plug with Seal	1
15	15510-A0710-0001	Dipstick with seal	1
16	11120-A0710-0001	Oil seal , crankshaft	1
17	11113-A0710-0001	Set pin φ8×14	2
18	T151-0001	Bolt M8×32	6
19	T910-0001	Bearing 6205	1
20	11216-B9130-0001	Dust plate	1
21	T151-0002	Bolt M6×12	1
22	T152-0019	Bolt M6×12	6
23	19143-A0710-0001	Air duck	1
24	19121-A0721-0001	Lead wind cover	1
25	17218-A0710-0001	Stud M6×96	2
26	12117-A0710-0001	Set pin φ10×16	2
27	12120-A0720-0001	Gasket, cylinder head	1
28	12100-A0721-0004	Cylinder head Assy	1
29	18214-A0710-0001	Stud M8×34	2
30	27100-A0710-0001	Spark plug F6TC	1
31	12118-A0710-0001	Bolt	4
32	12212-A0721-0001	Gasket, cylinder head cover	1
33	12200-A0721-0001	Cylinder head cover Assy	1
34	13400-A0730-0001	Piston ring assy	1
35	13313-A0710-0001	Piston pin circlip	2
36	13311-A0720-0004	Piston	1
37	13312-A0710-0001	Piston pin	1
38	13120-A0710-0001	Shank	1
39	13112-A0710-0001	Woodruff key	1
40	13110-A0720-0002	Crankshaft assy	1
41	14314-A0710-0001	Lock nut	2
42	14312-A0710-0001	Sleeve	2
43	14311-A0710-0001	Valve rocker	2



44	14313-A0710-0001	Adjusting bolt for valve gap	2
45	14310-A0710-0001	Valve rocker assy	2
46	14220-A0710-0001	Pusher guide	1
47	14210-A0710-0001	Pusher	2
48	14315-A0720-0001	Tappet	2
49	14100-A0720-0005	Camshaft Assy	1
50	14412-A0710-0001	Exhaust valve	1
51	14411-A0710-0001	Intake valve	1
52	14414-A0710-0001	Valve spring	2
53	14413-A0710-0001	Spring seat, intake valve	1
54	14415-A0710-0001	Spring seat, exhaust valve	1
55	14416-A0710-0001	Cap	1
56	17219-A0710-0001	Inlet gasket	1
57	16120-A0710-0001	Connecting block	1
58	16113-A0710-0001	Carburetor gasket	1
59	17113-A0710-0001	Air cleaner gasket	1
60	16100-B9130-0001	Carburetor Assy	1
61	16244-A0720-0001	Main nozzle	1
62	16243-A0720-0001	Main je	1
63	T152-0033	Bolt M6×22	1
64	19300-A0710-0001	Crankcase side plate assy	1
65	T210-0005	Bolt M5×8	3
66	19211-A0714-0025	Fan hood assy	1
67	T152-0019	Bolt M6×12	4
68	19219-B9130-0001	Fan hood latex stop up	1
69	23200-A0710-0047	Recoil starter	1
70	23100-B9140-0030	Recoil starter assy	1
71	19313-A0710-0001	Plastic clip	1
72	27500-A0710-0001	Diode	1
73	23260-A0710-0001	Recoil spacer combination	1
74	26114-A0710-0001	Regulating arm	1
75	26115-A0710-0001	Pulling rod	1
76	26117-A0710-0001	Back spring	1
77	26118-A0710-0001	Fine regulating spring	1
78	26200-B9130-0001	Regulating mount	1
79	T152-0019	Nut M6	1
80	T152-0019	Bolt M6×12	2
81	26116-A0710-0001	Lock bolt	1
82	23317-A0710-0001	Nut M14×1.5	1
83	23316-A0710-0002	Starting flange	1
84	19111-A0710-0001	Flywheel fan	1
85	23300-A0714-0001	Flywheel	1
86	T152-0034	Screw M6×25	2
87	27200-A0710-0001	Ignition coil unit	1
88	24100-A0714-0001	Starting motor Assy	1
89	T411-0017	Washer, M4	9

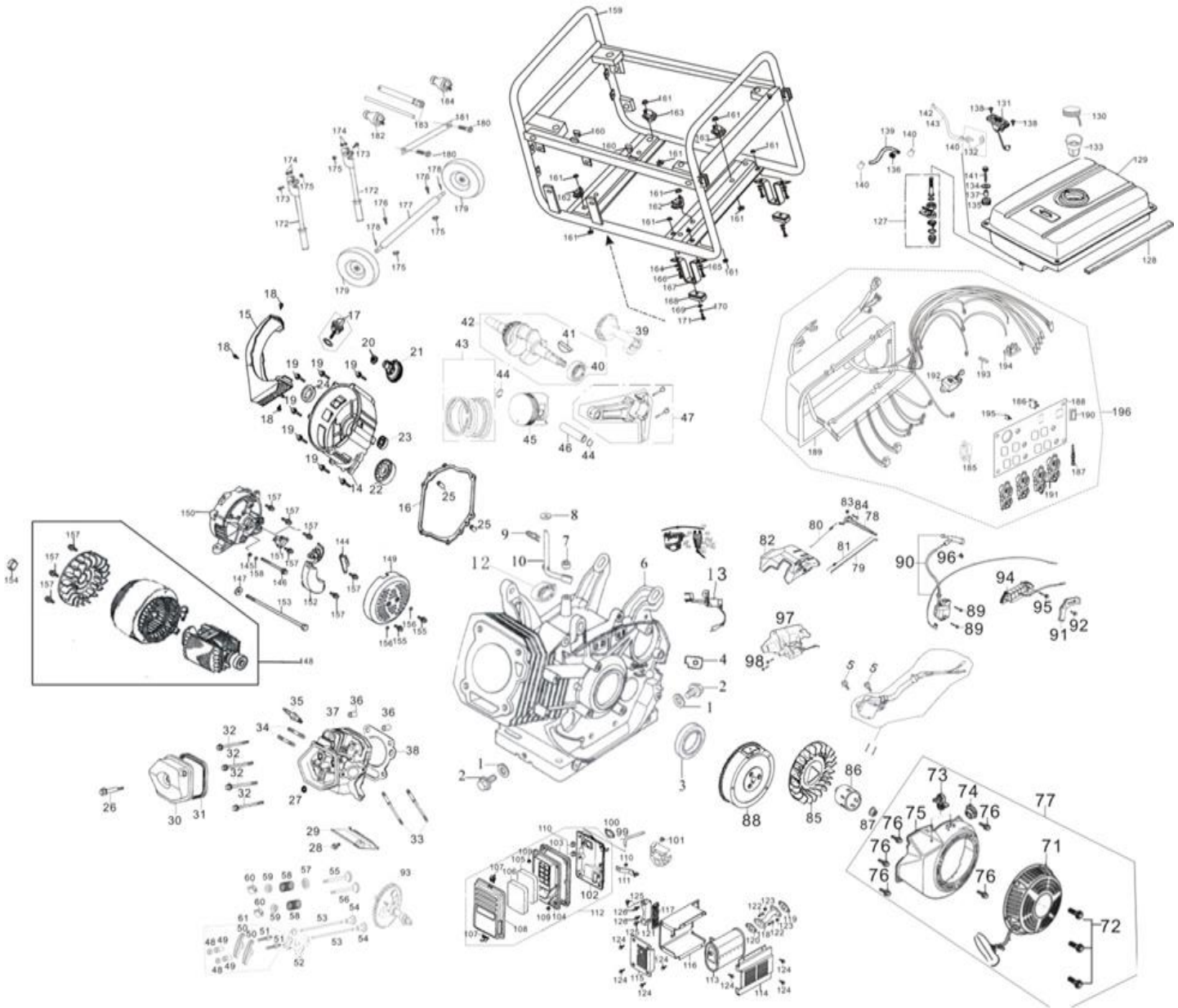


90	T311-0002	Nut, M6	2
91	T151-0008	Bolt, M8×35	2
92	T441-0005	Spring washer, 4	9
93	T210-0006	Screw, M4×14	7
94	17124-B9130-0002	Filter element	1
95	17125-B9130-0002	Retainer, filter element	1
96	17114-B9130-0002	Air cleaner case	1
97	17112-B9130-0002	Air cleaner cover	1
98	17233-B9130-0001	Air cleaner stay	1
99	17129-B9130-0001	Gasket	1
100	17117-A1310-0001	Bolt	4
101	T152-0019	Bolt M6×12	1
102	17140-B9130-0001	Hinge	2
103	17100-B9130-0006	Air cleaner Assy	1
104	T314-0001	Nut M6	2
105	18100-BC160-0005	Muffler liner	1
106	18130-B9130-0001	Muffler guard	1
107	T151-0005	Flange bolt M8×16	2
108	18150-B9130-0001	Muffler stay .	1
109	T310-0001	Nut M8	1
110	T152-0019	Flange bolt M6×12	6
111	18215-A0710-0001	Exhaust pipe gasket	2
112	18160-B9130-0001	Supporting plate	1
113	16640-B9130-0002	Fuel cock assy	1
114	16510-B9130-0073	Fuel tank	1
115	16912-B9130-0001	Stripe, fuel tank	1
116	16400-A0410-0002	Fuel filler cap comp.	1
117	16560-B9130-0001	Oil indicator assy	1
118	16557-A0710-0001		1
119	16610-A0710-0003	Fuel filler assy	1
120	16546-B9130-0001	Washer	4
121	16911-B9130-0001	Cushion	4
122	16626-BC130-0001	Vitta restrict	1
123	16914-B9130-0001	Bush	4
124	T211-0002	Screw M5×12	2
125	16621-BC130-0004	Outlet pipe (φ8.5× φ4.5×180)	1
126	16622-A0710-0002	Tube clip	3
127	T151-0003	Bolt M6×22 (Flange)	4
128	16622-A0710-0003	Tube clip	1
129	11513-B9130-0002	Vent pipe	1
130	31125-BC160-0001	Bolt M8×215	1
131	31153-B9130-0001	Bolt M5×12	3
132	31100-BB130-0025	Stator & rotor Assy	1
133	31130-B9130-0001	Brush Assy	1
134	31151-B9130-0001	Generator stay	1
135	31152-B9130-0002	Generator end cover	1

136	T152-0027	Bolt M5×50	2
137	31140-B9130-0001	Voltage regulator	1
138	31112-BF130-0001	Flange bolt M6×164	4
139	31126-B9130-0001	Plain washer	1
140	32100-BB140-0116	Frame	1
141	32412-B9130-0001	Rubber pad, frame	2
142	T311-0001	Nut M8	10
143	32420-B9130-0001	Cushion, frame A	2
144	32450-B9130-0001	Cushion, frame B	2
145	T411-0001	Plain washer	4
146	T441-0001	Plain washer	4
147	T151-0006	Flange bolt M8×25	4
148	32231-BB140-0006	Bracket	2
149	31523-BF140-0001	Bracket cushion	2
150	T411-0002	Plain washer Φ6	2
151	T441-0002	Plain washer Φ6	2
152	T151-0005	Flange bolt M8×16	2
153	32417-BC130-0001	Armrest	2
154	32139-BB140-0001	Flange bolt	2
155	31161-B9130-0001	Handle gasket	4
156	T311-0001	Nut M8	4
157	T151-0006	Flange bolt M8×25	8
158	31311-B9130-0002	Wheel axel,	1
159	31352-B9130-0002	Split pin	2
160	45420-B9130-0019	Wheel kit	2
161	T152-0019	Flange bolt M6×12	2
162	32433-B9140-0002	Battery box cover	1
163	31224-B9130-0006	Plug (30A)	2
164	92230-B9130-0001	Sparking plug wrench(short)	1
165	31247-B9130-0001	Plug	1
166	32416-BB140-0001	Battery box	1
167	31223-B9130-0010	3-prong twisted	1
168	31221-B9130-0054	Circuit protector,	1
169	31222-B9130-0001	Earth terminal set	1
170	31211-B9130-0131	Control panel front cover	1
171	31200-BG140-0141	Control panel back cover	1
172	31225-B9140-0001	gnition switch	1
173	31223-B9130-0008	3-prong twisted	4
174	35368-G1211-0001	Current transformer	1
175	31276-B9130-0001	Fuse case	3
176	31280-BC130-0001	Bridge ballast	1
177	31218-B9130-0002	protector	5
178	31200-BC170-0022	Control panel assembly	1



Engine Exploded View & Parts ES5700 and ES5700E





**LIFAN
POWER
USA**



**LIFAN
POWER
USA**

**Please Read this Owner's Manual Carefully before
Operating Your New Generator.**

**This Owner's Manual includes the
operation and maintenance of the
LF4100 (CA), LF4100E (CA),
LF5700 (CA), LF5700E (CA),
LF8000E (CA)**

**Thank you for purchasing our Energy Storm
generator!**

All information in this publication is based on the latest product information available at the time of approval for printing. We reserve the right to make changes at any time without notice and without incurring any obligation. The copyright of this manual belongs to EquipSource, LLC. No parts of this publication may be reproduced without the written permission of EquipSource, LLC. This manual should be considered a permanent part of the generator and should remain with it if is resold.

**For Product Support and Service
Visit Us at www.lifanpowerusa.com
Or Call Toll Free 1-866-471-7464**

POWERED BY LIFAN

CSA-CA-EPA CERTIFIED

ENERGY STORM SERIES





LIFAN Power USA is proud to offer it's extensive line of LIFAN Power Equipment!!!!
LIFAN Power USA is the sole distribution for LIFAN Power Equipment in the United States. LIFAN's unmatched investment in research and development ensures quality engines, generators, pressure washers, and water pumps at an extraordinary value. LIFAN continues to be an innovator and presently holds over 3,000 patents. Product performance has earned LIFAN the reputation of dependability and value in all their international markets.

LIFAN has been manufacturing and selling innovative and value driven products worldwide for over 15 years. LIFAN is distributed in over 100 countries. LIFAN is the largest privately owned company in China with sales over One-Billion Dollars annually and 14,000 employees. As the largest engine manufacturer in China, LIFAN builds more than five million small engines each year. This worldwide presence has been made possible by producing equipment that is durable, reliable, and rugged for any market.

LIFAN Power USA prides itself in standing behind all LIFAN products with our comprehensive warranty policy. LIFAN Power USA continues to offer the highest level of service and support in the industry. With proven performance and unmatched value, LIFAN Power Equipment will always keep you running.

All information in this publication is based on the latest product information available at the time of approval for printing. EquipSource, LLC reserves the right to make changes at any time without notice and without incurring any obligation. The copyright of this document belongs to EquipSource, LLC. No parts of this publication may be reproduced without the written permission of EquipSource, LLC.

For additional product information of any LIFAN Power Equipment, please visit us at our website - www.lifanpowerusa.com.

**LIFAN POWER USA
2205 Industrial Park Rd.
Van Buren, AR 72956
www.lifanpowerusa.com
866-471-7464**