EXCEL POWER GENERATORS

DIESEL GENERATOR SET

INSTRUCTION MANUAL



Read this material before using this product. Failure to do so can result in serious injury.Save This Manual.

This manual provides important information on proper operation & maintenance. Every effort has been made to ensure the accuracy of this manual. These instructions are not meant to cover every possible condition and situation that may occur. We reserve the right to change this product at any time without prior notice.

IF THERE IS ANY QUESTION ABOUT A CONDITION BEING SAFE OR UNSAFE, DO NOT OPERATE THIS PRODUCT!

INTRODUCTION

Dear Customers,

Thank you for purchasing soundproof diesel generator. This manual must be read and understood prior to operating the generator.

SAVE THIS MANUAL. Keep this manual for the safety warning and precautions, assembly, operating, inspection, maintenance and cleaning procedures. With proper use and maintenance, this generator will bring years of satisfying service.

line technology is constantly expanding with new models.

products are characterized by ergonomic design; ensure the convenience of its use, smart design, high performance. In endless pursuit of integrity and profession with the spirit of innovation and excellence, shows you the best power solution, guides you to new life experience.

Due to changes in the technical specification, the content of this manual may not fully comply with.

We reserve the right to make changes in a construction of individual parts without prior notice.

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Diesel Generator Set

Model	XLD9500Q	XLD9500QT	XLD13000Q
Phase	Single-Phase	Single&Three-Phase	Single-Phase
Rated Frequency	50Hz	50Hz	50Hz
Rated Rotation Speed(rpm)	3000	3000	3000
Max Power(kW)	6.5	6.5	11
Rated Power(kW)	6.0	6.0	10.0
Power Factor(cosf)	1.0	1.0	1.0
Rated voltage	230V	230/400V	230V
Excitation Mode	AVR Brush or self-excitation Brushless		
Noise Level Db(A)@ 7m(0 load-Full Load)	75-80		84-86
Structure Model	Sound Proof with Canopy		Sound Proof with Canopy
Engine Model	192		2V88B
Displacement	498		870
Engine Type	1-Cylinder, 4-Stroke, Air Cooled, Direct Injection, Diesel Engine		2-Cylinder, 4-Stroke, Air Cooled
Starting system	Electric Starting		
Fuel Type	0#(Summer),-10#(Winter) Diesel Oil		
Lube	SAE10W30(Above CD Grade)		
Low Oil Pressure Alarm System	Yes		
Dimension[mm] (LxWxH)	965x570x910		1310x710x910

RECOGNIZE SAFETY SYMBOLS, WORDS AND LABELS

What You Need to Know About Safety Instructions

Warning and Important Safety Instructions appearing in this manual are not meant to cover all possible conditions and situations that may occur. Common sense, caution and care must be exercised when operating or cleaning tools and equipment.

Always contact your dealer, distributor, service agent or manufacturer about problems or conditions you do not understand.



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.

⚠ DANGER — DANGER indicates an imminently hazardous situation which, if not avoided, will result in death or serious injury.

⚠ WARNING — WARNING indicates a potentially hazardous situation which, if not avoided, could result in death or serious injury.

⚠ CAUTION — CAUTION indicates a potentially hazardous situation which, if not avoided, may result in minor or moderate injury.

CAUTION — CAUTION used without the safety alert symbol indicates a potentially hazardous situation which, if not avoided, may result in property damage.

Add Diesel Fuel ONLY (DO NOT ADD GASOLINE)

USE THIS GENERATOR ONLY OUTDOORS IN NON-CONFINED AREAS. DO NOT SECURE THE GENERATOR WITH A CHAIN OR ROPE, AS THIS WILL MAKE IT DIFFICULT TO MOVE IN AN EMERGENCY.

STOP!

⚠ DANGER

Carbon Monoxide Gas: When in operation, the exhaust from this generator contains poisonous carbon monoxide gas. Carbon monoxide gas is both odorless and colorless AND may be present even if you do not see or smell gas. Breathing this poison gas can lead to headaches, dizziness, drowsiness, loss of consciousness and eventually death.

• USE THIS GENERATOR ONLY OUTDOORS IN NON-CONFINED AREAS. DO NOT SECURE THE GENERATOR WITH A CHAIN OR ROPE, AS THIS WILL MAKE IT DIFFICULT TO MOVE IN AN EMERGENCY.

• Keep at least several feet of clearance on all sides to allow proper ventilation for this generator.

⚠ WARNING

Chemicals: The exhaust from this generator contains chemicals known to cause cancer, birth defects, or other reproductive harm.

⚠ WARNING

Flammable Fuel: This generator may emit highly flammable and explosive fuel vapors, which can cause severe burns or even death. A nearby open flame can lead to an explosion even if not directly in contact with fuel.

• Do not operate this generator near open flame.

• Do not smoke near this generator.

• Always operate this generator on a firm, level surface.

Diesel Fuel is highly flammable and explosive. Handling fuel can result in serious injury or burns.

• Always shut down this generator before refueling. Refuel in a well-ventilated area. Keep heat, sparks and flame away while refueling and away from the location where diesel fuel is stored. Never refuel indoors where diesel fuel fumes may reach flames and/or sparks.

• Allow this generator to cool for at least 2 minutes before removing the fuel tank cap. Loosen the cap slowly to relieve pressure in the fuel tank. Avoid spilling fuel.

• Do not fill the fuel tank above the upper limit line. Diesel fuel may expand during operation. Do not fill to the top of the tank.

• Always check for spilled diesel fuel and immediately wipe it up before starting this generator.

• Empty the fuel tank before storing or transporting this generator.

• Always handle fuel outdoors.

• Before transporting, turn the fuel valve to the “OFF” position.

⚠ DANGER

Powerful Voltage: This generator produces powerful voltage, which can result in electrocution.

• ALWAYS ground this generator before using it. (See “Ground the Generator” section in this manual).

• Only electrical devices should be plugged into this generator, either directly or with an extension cord. NEVER connect a building electrical system to this generator without a qualified electrician. Such connections must isolate generator power from utility power and comply with local electrical laws and codes. Failure to comply can create a back feed into utility lines creating an electrocution hazard, which may result in serious injury or death to utility workers. Such a back feed may cause this generator to explode, burn and create fires when utility power is restored.

• Use a ground fault circuit interrupter (GFCI) in highly conductive areas such as metal decking or steel work. GFCIs are available in-line with some extension cords.

• Do not use this generator in wet conditions (rain, snow, active sprinkler system, wet hands, etc.). Always keep this generator dry and operate it with dry hands.

• Do not touch bare wires or outlets (receptacles).

• Do not allow children or non-qualified persons to operate this generator.

⚠ DANGER

High Temperatures: This generator produces heat when in operation. Temperatures near the exhaust can exceed 150 Degrees Fahrenheit (65 Degrees Celsius).

- Do not touch hot surfaces. Observe all warning placards on this generator denoting hot surfaces.
- Allow this generator to cool for several minutes after use before touching the engine, muffler or other areas that are hot during operation and before storing indoors.
- Hot exhaust may ignite some materials. Keep flammable materials away from this generator.
- Keep at least several feet of clearance on all sides of this generator during operation. Do not enclose this generator in any structure.

⚠ CAUTION

Usage: Misuse of this generator can damage it or shorten its life.

- Use this generator only for its intended purpose.
- Operate this generator only on a dry, level surface. Do not secure the generator with a chain or rope, which would prevent it from being moved in an emergency.
- Allow this generator to run for several minutes before connecting any electrical devices.
- Promptly turn off any malfunctioning devices and disconnect them.
- Do not operate an excessive number of electrical devices in excess of the wattage capacity of this generator.
- Do not turn on electrical devices until *after* they are connected to this generator.
- Turn off all connected electrical devices before stopping this generator.

⚠ CAUTION

Usage: Prolonged exposure to high noise levels can be hazardous to hearing. Always wear ANSI-approved hearing protection when operating or working around the generator when it is running.

CAUTION

Usage: This generator is not intended to power sensitive electronic equipment such as TVs, DVD players, stereos, desktop computers or laptop computers without the use of an appropriate line conditioner and/or surge protector (both not included). Sensitive electronic equipment should be operated on approved inverter type generators or pure sine wave generators. For additional information consult the devices operation manual or contact your local authorized service center.

⚠ WARNING

Usage: Avoid the use of extension cords if possible. If you choose to use them, be sure they are sized adequately to handle the flow of electricity. An undersized cord can overheat, short out and cause a fire.

⚠ CAUTION

Usage: Do not use fuel stabilizers with this generator, doing so could cause damage to the generator, or decrease the fuel and operating efficiency of the generator. You may choose to add a fuel conditioner to oxygenate the fuel and to help it run more efficiently.

⚠ WARNING

USE THIS GENERATOR ONLY OUTDOORS IN NON-CONFINED AREAS. DO NOT SECURE THE GENERATOR WITH A CHAIN OR ROPE, AS THIS WILL MAKE IT DIFFICULT TO MOVE IN AN EMERGENCY.

⚠ WARNING

The engine exhaust from this product contains chemicals known to the State of California to cause cancer, birth defects or other reproductive harm.

⚠ DANGER

EXHAUST CONTAINS POISONOUS CARBON MONOXIDE GAS THAT CAN BUILD UP TO DANGEROUS LEVELS IN CLOSED AREAS. BREATHING CARBON MONOXIDE CAN CAUSE UNCONSCIOUSNESS OR DEATH. Never run the generator in a closed or even partly closed area where people may be present.

⚠ WARNING

DIESEL IS HIGHLY FLAMMABLE AND EXPLOSIVE. YOU COULD BE BURNED OR SERIOUSLY INJURED IF THE GASOLINE IS IGNITED. Before refueling, stop the engine and keep heat, sparks and flame away. Handle fuel only outdoors. Do not fill the fuel tank above the upper limit line. Wipe up spills immediately.

⚠ WARNING

IMPROPER CONNECTIONS TO A BUILDING CAN ALLOW ELECTRICAL CURRENT TO BACKFEED INTO UTILITY LINES, CREATING AN ELECTROCUTION HAZARD. Connections to a building must isolate generator power from utility power and comply with all applicable laws and electrical codes.

In addition to the previously described safety information,familiarize yourself with all safety and hazard placards on this generator.

⚠ DANGER POISONOUS GAS

Generator exhaust contains toxic carbon monoxide gas. Breathing exhaust can cause loss of consciousness and shortness of breath. NEVER operate generator in poorly ventilated areas.

⚠ WARNING

Risk of electric shock. Do not remove cover. No user serviceable parts inside. Refer servicing to qualified service personnel.

⚠ WARNING! RISK OF ELECTRIC SHOCK

This generator produces high voltage.

Always ground properly before use.
Do not connect to any building electrical system.
Never use in rainy or wet conditions.
Never touch bare wires or receptacles.
Never allow children or non-qualified person to operate.



⚠ CAUTION!HOT EXHAUST

DO NOT TOUCH

⚠

CAUTION!
HIGH TEMPERATURE
DO NOT TOUCH

⚠ DANGER

Using a generator indoors WILL KILL YOU IN MINUTES.
Exhaust contains carbon monoxide, a poison gas you cannot see or smell.

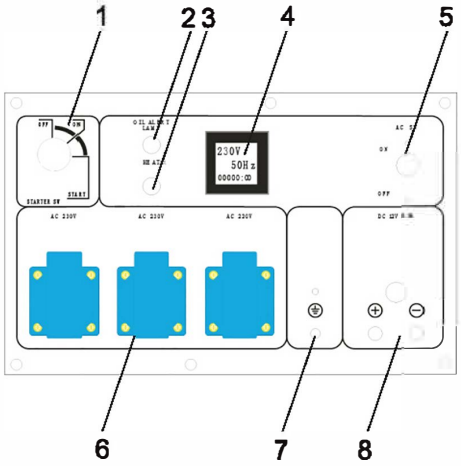
NEVER use in the home or in partly enclosed areas such as garages.

ONLY use outdoors and far from open windows, doors, and vents.

⚠WARNING

USE THIS GENERATOR ONLY OUTDOORS IN NON-CONFINED AREAS. DO NOT SECURE THE GENERATOR WITH A CHAIN OR ROPE, AS THIS WILL MAKE IT DIFFICULT TO MOVE IN AN EMERGENCY.

GENERATOR COMPONENTS





1) Electric Start Switch
2) Oil Alert Lamp
3) Air Heater
4) Digital Hour-Volt-Frequency Meter
5) Residual Current Device
6) Outlets
7) Ground Terminal
8) DC 12V/8. 3A
9) Fuel Gauge
10) Fuel Cap
11) Muffler Panel Cover

PREPARING THE GENERATOR FOR USE

STOP!

The following section describes the required steps for preparing this generator for use. Failure to correctly perform these steps can damage this generator and/or shorten its life.

If this generator is being used for the first time, the following few steps are required to prepare it for operation:

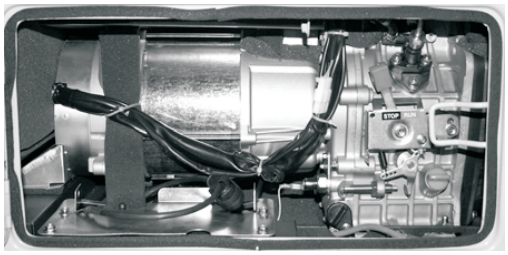
Step 1 - Add Oil, Then Add Diesel Fuel

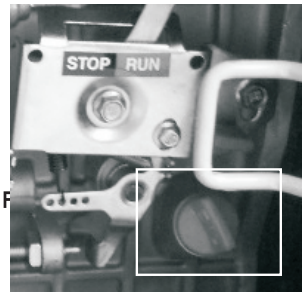
This generator requires engine oil to function. Engine oil is a major factor affecting engine performance and service life. When new from the package, this generator contains no oil in the engine crankcase. The correct quantity of oil is equal to the oil capacity of the engine crankcase. Add the correct quantity of oil before operating this generator for the first time.

Oil Type Recommended	SAE 20W-40 Diesel Grade

To add oil:

1. Confirm that this generator is on a level surface.
2. Open the Oil Access Panel as illustrated in Figure 1 and Figure 2.
3. Using a funnel, add high detergent motor oil to fill the engine crankcase to the correct quantity as stated above. SAE 20W-40 Diesel Grade oil is recommended. When the engine crankcase is full, the oil level should reach the lower lip of the oil fill opening.
4. Replace the oil filler/dipstick cap and close the oil access panel.





⚠WARNING

Diesel Fuel and fumes are highly flammable and explosive. Handling fuel can result in serious injury or burns.
Do not fill the fuel tank near a heat, sparks or an open flame. Keep fuel away from appliance pilot lights, barbecues, electric appliances, power tools, etc. Do not overfill the fuel tank. Always check for fuel spills and immediately wipe them up. Spilled fuel is a fire hazard.

To add diesel fuel, use only FRESH, DIESEL FUEL:

1. Confirm that this generator is on a level surface.
2. Unscrew fuel tank cap and set aside. (NOTE: The fuel tank cap may be tight and difficult to unscrew.)
3. Slowly add fresh, diesel fuel to the fuel tank. Be careful not to fill the fuel tank above the upper limit line.

NOTE: Because diesel fuel can expand, do not fill the fuel tank to the very top.

4. Securely tighten the fuel tank cap and immediately wipe up any spilled fuel with a dry cloth.

Fuel Type	Diesel Fuel

Step 2 - Ground the Generator

⚠WARNING

Failure to properly ground this generator can result in electrocution.

Ground this generator by tightening the grounding nut against a grounding wire (Figure 3), found on the front of the battery. A No. 12 AWG stranded copper wire is generally an acceptable grounding wire. The other end of this grounding wire should be connected to a copper or brass-grounding rod that is driven into the earth.

Grounding codes can vary by location. Contact a local electrician for information on grounding regulations for your area.

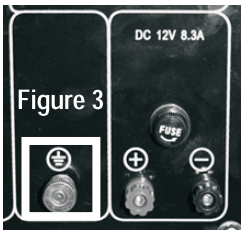


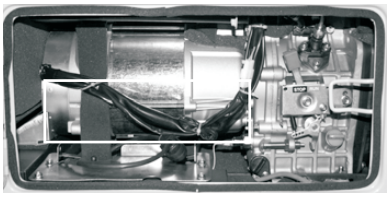
Figure 3

Step 3 – Install Battery (If not included)

This generator requires a battery to start. The generator does not come equipped from the factory with a battery.

A 12 Volt motorcycle battery no larger than 7 3/4" L x 5 1/4" H x 7 ¼" W, with a 300 Minimum CCA (Cold Cranking Amps). Comparable brands/models are Husky: GT-X or Interstate: SP-35. These are not the only brands compatible with this generator. Any brand with similar specs may be used. The battery may be smaller in size, and have a higher CCA.****Brands/model numbers can change, this information is intended as a guide only, if your sparkplug needs to be replaced, please visit your local auto parts store for their recommendation.**

The battery case is located behind the metal plate under the electrical panel. Install the battery by using the two cables (one red and the other black) that were included in the packaging, or are attached to the generator.


Step 3 Battery Location

Disconnect all electrical loads from this generator before changing the battery.

1. Attach the end of the red cable to the positive/red terminal on the battery.
2. Attach the end of the black cable to the negative/black terminal on the battery.
3. Bolt the battery to the battery plate.

STARTING THE GENERATOR

STOP!

Before starting this generator, confirm that all the steps in the section titled, "Preparing the Generator for Use," of this manual have been correctly completed. If unsure about how to perform any of these steps

Figure 6A



If the generator has been used before, always check the oil level and diesel fuel level.
Always check that the battery is secure and the generator has been grounded.

To start this generator:

1.Confirm that there are no electrical devices connected to this generator.
2.Confirm that this generator is properly grounded. (See "Ground the Generator")
Move Circuit breaker to ON position. (Figure 6A)
3.Set the engine Run switch to the "Run" position (Figure 6B).
4.Insert Key and turn it to the start position. (Figure 6C).
5.If the engine fails to start, repeat step 6. NOTE: After repeated attempts, consult the Troubleshooting Guide before attempting again. (You may need to open top panel and push down on Decompression Lever.)
6.Allow this generator to run for several minutes before connecting any electrical devices.

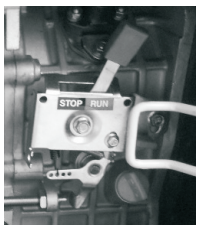


Figure 6B



Figure 6C

Choke Rod The choke is used to provide an enriched fuel mixture when starting a cold engine. It can be opened and closed by operating the choke rod manually. Pull the rod out toward CLOSED to enrich the mixture for cold starting.

USING THE GENERATOR

⚠ CAUTION

Connect only electrical devices that are in good working order. Faulty devices or power cords present the risk of electrical shock. Immediately turn off and disconnect any device that commences to operate abnormally, sluggish or abruptly stops. Determine if the problem was the device or the rated load capacity of this generator has been exceeded.

⚠ WARNING

• USE THIS GENERATOR ONLY OUTDOORS IN NON-CONFINED AREAS. DO NOT SECURE THE GENERATOR WITH A CHAIN OR ROPE, AS THIS WILL MAKE IT DIFFICULT TO MOVE IN AN EMERGENCY.
• KEEP AT LEAST SEVERALFEET OF CLEARANCE ON ALL SIDES TO ALLOW PROPER VENTILATION FOR THIS GENERATOR.

After the engine has been running for several minutes, electrical devices may be connected to this generator.

AC Usage

Electrical devices running on AC current may be connected according to their wattage requirements.
The rated (running) wattage corresponds to the maximum wattage a generator can output on a continuous basis.

The *surge wattage* corresponds to the maximum amount of power a generator can output for a short time. Many electrical devices, such as a refrigerator, require short bursts of extra power for starting and stopping fan motors, etc., in addition to their listed rated wattage. Motorized devices typically require more than their rated wattage for startup. The surge wattage ability of a generator allows for this extra power requirement.

The total running wattage requirement of the electrical devices connected to a generator should not exceed the rated wattage of the generator itself. To calculate the total wattage requirement of the electrical devices to be connected, look up the rated (running) wattage of each device and add these numbers together to find the total wattage that all of the devices together will draw from the generator. If the total wattage of the selected devices exceeds the rated wattage of the generator, DO NOT connect all of the devices. Select a combination of the electrical devices that will have a total wattage less than or equal to the rated wattage for the generator.

⚠ CAUTION

This generator can run at its surge wattage capacity for only a short time. Connect electrical devices requiring a rated (running) wattage equal to or less than the rated wattage of this generator. Never connect devices requiring a rated wattage equal to the surge wattage of a generator.

Electrical Device	Rated (Running) Watts	Additional Surge Watts
air compressor (1 - 1/2 HP)	2500	2500
airless sprayer (1/3 HP)	600	1200
coffee maker	1500	0
computer w/17 inch monitor	800	0
deep freezer	500	500
electric drill (1/2 HP)	1000	1000
furnace fan blower (1/2 HP)	800	1300
hot plate	2500	0
microwave oven (1000 watt)	1000	0
quartz halogen work light	1000	0
refrigerator/freezer (18 Cu. Ft.)	800	1600
saw - circular (7 1/4 inch)	1500	1500
stereo receiver	450	0
electric stove - single element	1500	0
sump pump	800	1200
television (27 inch color)	500	0
well water pump (1/3 HP)	1000	2000
window air conditioner (10000 BTU)	1200	1800
window fan	300	600

A device's rated (running) wattage should be listed somewhere on the device itself and/or in its manual. If the wattage specification for a device is not available, the wattage can be calculated by multiplying the Voltage requirement (230 or 400) by the Amperage drawn.

Or, the wattage required by a device can be estimated by using the following chart. The chart provides only estimates and it is better to know the exact wattage of each electrical device to be powered by this generator.

Watts = Volts x Amperes

Connect electrical devices to this generator according to the following procedure:

Allow the engine to run for several minutes after it has been started.

Confirm that the electrical device is switched off prior to plugging it into this generator.

NOTE: Plug appliances into the correct outlet. Connect standard 230 Volt, single phase, 50 Hz loads to the 230 Volt outlet. Connect 12 Volt, DC loads to the 12 Volt outlet.

Turn on the connected electrical devices beginning with the device with the highest rated wattage requirement and then each additional device with the next lower rated wattage requirement.

⚠ CAUTION

Do not connect 60Hz to this generator.

DC Usage

⚠ CAUTION

The DC terminal is only for recharging 12 Volt automotive-type batteries. Do not connect any other device to this outlet.

⚠ CAUTION

Use this generator only for recharging 12 Volt batteries. NEVER attempt to jumpstart a car with this generator.

⚠ DANGER

Failing to use the correct procedure can cause a battery to explode, seriously injuring anyone nearby. Keep heat, sparks, flame and smoking materials away from the battery.

To connect 12 Volt batteries to the DC outlet:

1. Connect one charging wire to the positive terminal of the battery and the other charging wire to the negative terminal of the battery.
2. Connect the free end of the positive wire to the positive side of the outlet on this generator.
3. Carefully connect the free end of the negative wire to the negative side of the outlet on this generator.
4. Start this generator.
5. When disconnecting, always disconnect the wires from this generator first to avoid a spark.

⚠ DANGER

Storage batteries emit highly explosive hydrogen gas when charged.
Batteries also contain acid, which can cause severe chemical burns.

- Do not allow open flames or cigarettes nearby for several minutes after charging a battery.
- Always wear protective goggles and rubber gloves when charging a battery.
  - If battery acid gets on the skin, flush with water.
  - If battery acid gets in the eyes, flush with water and immediately call a physician.
  - If battery acid is swallowed, drink large quantities of milk and immediately call a physician.

⚠ DANGER

Do not secure the generator with a chain or rope, which would prevent it from being moved in an emergency.