XP13500IHT

USER MANUAL



This manual provides information regarding the operation and maintenance of these products. We have made every effort to ensure the accuracy of the information in this manual. We reserve the right to change this product at any time without prior notice.

5800 Ontario Mills Pkwy
Ontario, CA 91764 USA
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Call our Customer Care Team Toll Free 8-5 PM PST Mon-Fri
844-DUROMAX

CONTENTS

1. **Introduction**
   - Introduction 6
   - General Safety Procedures 8
   - Carbon Monoxide Safety 12
   - Unit and Purchase Information 14

2. **Generator Components**
   - Generator Components 16
   - Package Contents 18

3. **Generator Setup**
   - Connect the Battery 20
   - Adding Oil 21
   - Adding Gasoline 22
   - Grounding the Generator 23
   - High Altitude Operation 23

4. **Starting the Generator**
   - Check the Oil 26
   - Check the Gas Level 27
   - Starting the Generator Using Gasoline 28
   - Starting the Generator Using Propane 30
   - Starting the Generator Using Natural Gas 34
   - Starting the Generator Using Recoil Start 38
   - Starting the Generator Using Remote Start 40

5. **Using the Generator**
   - AC Usage 44
   - Connecting the Generator to a Home 47
   - Connecting a Load to the Generator 48
   - Choosing the Right Power Cord 49
   - Using the Digital Multimeter 50
   - Low Idle Usage 51
   - Using the Battery Tender 52
   - Using the DC Output 53
   - Syncing the Remote 55

CONTENTS

6. **Stopping the Generator**
- Shutting Down the Generator On Gasoline 58
- Shutting Down the Generator On Propane 59
- Shutting Down the Generator On Natural Gas 60
- Shutting Down the Generator With the Remote 61

7. **Maintenance and Care**
- Maintenance Schedule 64
- Break-In Period 65
- Maintenance Log 65
- Checking the Oil 67
- Changing the Oil 68
- Cleaning the Air Filter 70
- Spark Plug Maintenance 73
- Emptying the Gas Tank 76
- Transporting the Generator 78
- Storing the Generator for Use Within 30 Days 79
- Storing the Generator for Longer than 30 Days 80
- Specifications 82

8. **Troubleshooting**
- Basic Troubleshooting 84

9. **Warranty** 88

10. **Contact Information** 91

For more information and resources on this model scan the QR code below to link to our website product information page.

DuroMax

THE DUROMAX WAY

The DuroMax Way is more than just a brand, it is our understanding and appreciation of just how important power can be to someone without it...



DUROMAX FOR HOME

Electricity in our home not only provides comfort but safety as well. From keeping the heat or A/C on to keeping our food cold, power is essential to our daily lives. Inevitability when disaster strikes and we are left without power for a prolonged period of time, our way of life is put at risk. This is by far the most critical time for reliable portable power.



DUROMAX FOR WORK

On the job site, portable power allows you the ability to get work done in remote locations when traditional power sources are usually unavailable. Equipment like table saws, sanders, and work lights are a necessity and portable power can play a critical role in getting a job done successfully and efficiently.



DUROMAX FOR PLAY

Camping outdoors in a remote location can get one in touch with nature and allow them to forget the stress of the day to day grind. Here portable power can provide comfort as well as safety. With portable power, you can keep your cell phone charged, light up your campsite, or even brew a cup of coffee, all while being miles from civilization.

The DuroMax Way is a commitment to excellence. This vision is focused on the quality, reliability, and durability of our products combined with outstanding customer service. We understand that having dependable power whenever and wherever you need it provides comfort, safety, and peace of mind. It is through this philosophy that DuroMax achieves our vision of...

POWERING EVERYONE...
ANYWHERE!

INTRODUCTION

DuroMax Power Equipment is headquartered in Ontario, California and is the industry's leader in Dual Fuel and Tri Fuel portable generator technology. In addition to a full assortment of portable generators ranging from digital inverters to large 28,000-watt generators that can power your whole home, their product line includes power stations, pressure washers, engines, pumps, and accessories.

The foundation of our company is built on quality, reliability, durability, and customer service. At DuroMax our vision is simple, we are committed to Powering Everyone... Anywhere!



Notice Regarding Emissions

Engines that are certified to comply with U.S. EPA emission regulations for SORE (Small Off-Road Equipment), are certified to operate on regular unleaded gasoline and may include the following emission control systems: (EM) Engine Modifications and (TWC) Three-Way Catalyst (if so equipped).

GENERAL SAFETY PROCEDURES



SAFETY ALERT SYMBOL

The safety alert symbol is used with one of the safety words (**DANGER**, **WARNING**, or **CAUTION**) to alert you of hazards. Please pay attention to these hazard notices both in this manual and on the engine.

Please familiarize yourself with the following safety symbols and words:

- **DANGER**: Indicates a hazard that will result in serious injury or death if instructions are not followed.
- **WARNING**: Indicates a strong possibility of causing serious injury or death if instructions are not followed.
- **CAUTION**: Indicates a possibility of personal injury or equipment damage if instructions are not followed.



DANGER: This generator produces poisonous carbon monoxide gas when running. This gas is both odorless and colorless. Even if you do not see or smell gas, carbon monoxide may still be present. Breathing this poison can lead to headaches, dizziness, drowsiness, and eventually death.

- Use outdoors ONLY in non-confined areas.
- Keep several feet of clearance on all sides to allow proper ventilation of the generator.



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



WARNING: This generator produces heat when running. Temperatures near exhaust can exceed 150°F (65°C).

- Do not touch hot surfaces. Pay attention to warning labels on the generator denoting hot parts of the machine.
- Allow generator to cool several minutes after use before touching engine or areas which heat during use.



WARNING: This generator may emit highly flammable and explosive gasoline 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 gasoline.

- Do not operate near an open flame.
- Do not smoke near the generator.
- Always operate on a firm, level surface.
- Always turn the generator off before refueling.
- Allow generator to cool for at least 2 minutes before removing the fuel cap. Loosen cap slowly to relieve pressure in the tank.
- Do not overfill the gas tank. Gas may expand during operation. Do not fill to the top of the tank.
- Always check for spilled gas before operating.
- Empty the gasoline tank before storing or transporting the generator.
- Before transporting, turn the fuel valve to the off position and disconnect the spark plug.



WARNING: This generator produces a powerful voltage, which can result in electrocution.

- ALWAYS ground the generator before using it (see the “Grounding the Generator” portion of the “PREPARING THE GENERATOR FOR USE section).
- The generator should only be plugged into electrical devices, either directly or with an extension cord. NEVER connect to a building electrical system without a qualified electrician. Such connections must comply with local electrical laws and codes. Failure to comply can create a back-flow of power, which may result in serious injury or death to utility workers.
- Use a ground fault circuit interrupter (GFCI) in highly conductive areas such as metal decking or steelwork. GFCIs are available in-line with some extension cords.
- Do not use uncovered in rainy or wet conditions.
- Do not touch bare wires or receptacles (outlets).
- Do not allow children or non-qualified persons to operate.

GENERAL SAFETY PROCEDURES (CONTINUED)

⚠WARNING

- **INGESTION HAZARD:** This product contains a button cell or coin battery
- **DEATH** or serious injury can occur if ingested
- A swallowed button cell or coin battery can cause **Internal Chemical Burns** in as little as **2 hours**
- **KEEP** new and used batteries **OUT OF REACH of CHILDREN**
- **Seek immediate medical attention** if a battery is suspected to be swallowed or inserted inside any part of the body



3V CR2032
3V CR2450
Non-Replaceable

1.Remove and immediately recycle or dispose of used batteries according to local regulations and keep away from children. DO NOT dispose of batteries in household trash or incinerate.
2.Even used batteries may cause severe injury or death.
3.Call a local poison control center for treatment information.
4.Non-rechargeable batteries are not to be recharged.
5.Do not force discharge, recharge, disassemble, heat above (manufacturer's specified temperature rating) or incinerate. Doing so may result in injury due to venting, leakage or explosion resulting in chemical burns.
6.Ensure the batteries are installed correctly according to polarity (+ and -).
7.Do not mix old and new batteries, brands or types of batteries, such as alkaline, carbon-zinc, or rechargeable batteries.
8.Remove and immediately recycle or dispose of batteries from equipment not used for an extended period of time according to local regulations.
9.Always completely secure the battery compartment. If the battery compartment does not close securely, stop using the product, remove the batteries, and keep them away from children.

In addition to the above safety notices, please familiarize yourself with the safety and hazard markings on the generator.



CARBON MONOXIDE SAFETY

Carbon Monoxide

Generators are convenient, but they can also be dangerous. All fuel-burning appliances and equipment release a poisonous gas called carbon monoxide.

Carbon monoxide (also known as CO) can be dangerous for humans and pets, even in small amounts, because it blocks oxygen from getting into your body. Carbon monoxide poisoning can lead to death in a very short time. It is odorless, tasteless and invisible, so you may be exposed without knowing it. That is why carbon monoxide is sometimes called “the silent killer.”

CO ALERT



Description

The DuroMax CO ALERT system was created to protect our customers and their families from dangerous carbon monoxide. Just like the detector for your home the CO ALERT tests the air for to keep you safe and healthy.



CO Detected

If dangerous carbon monoxide levels are detected:

- The indicator will light red.
- The engine will shutdown.
- The engine will not restart for 5 minutes.



Maintenance Required

If an error in the CO ALERT system is detected the indicator will light yellow. Please contact DuroMax service at 844-DUROMAX for assistance.



ALWAYS READ THE OWNER'S MANUAL FIRST

KNOW THE SYMPTOMS

- HEADACHE
- DIZZINESS
- NAUSEA
- FATIGUE
- SHORTNESS OF BREATH

IF YOU FEEL SYMPTOMS, LEAVE RIGHT AWAY

STAY ALERT WITH CARBON MONOXIDE DETECTORS

POINT FUMES AWAY FROM NEARBY PEOPLE

KEEP IT OUTSIDE AND AWAY FROM DOORS AND WINDOWS

PGMA
Portable Generator Manufacturers' Association

As the only safe way to use a portable generator, taking your generator outside is absolutely mandatory to keep your family safe from carbon monoxide. But there's even more you can do. By educating yourself about all carbon monoxide risks, you'll be better prepared to protect your family from this colorless, odorless threat. Visit **takeyourgeneratoroutside.com** for more information.

TAKE IT OUTSIDE™

CARBON MONOXIDE KILLS

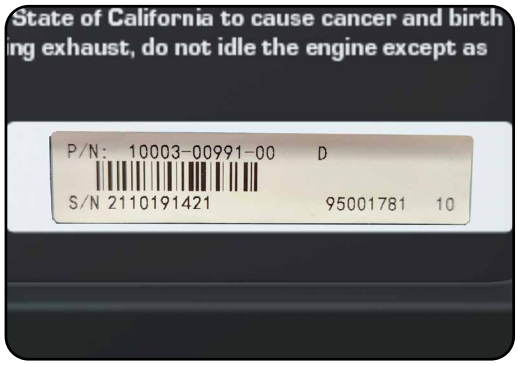
UNIT AND PURCHASE INFORMATION

Serial Number



Serial number

The serial number is located on the back of the generator and next to the wheel.



Serial number format

The serial number will be shown in two parts. The engine model, followed by the serial number.

Engine Model: _____

Serial Number: _____

STAPLE RECEIPT HERE

A purchase receipt may be necessary for warranty parts or service in the future. If you have a paper receipt, staple it here for easy reference.

If you purchased the unit online, save the email receipt where you can access it, and record your details here for convenience in the future.

Purchase Date: _____

Order Number: _____

Retailer Name: _____



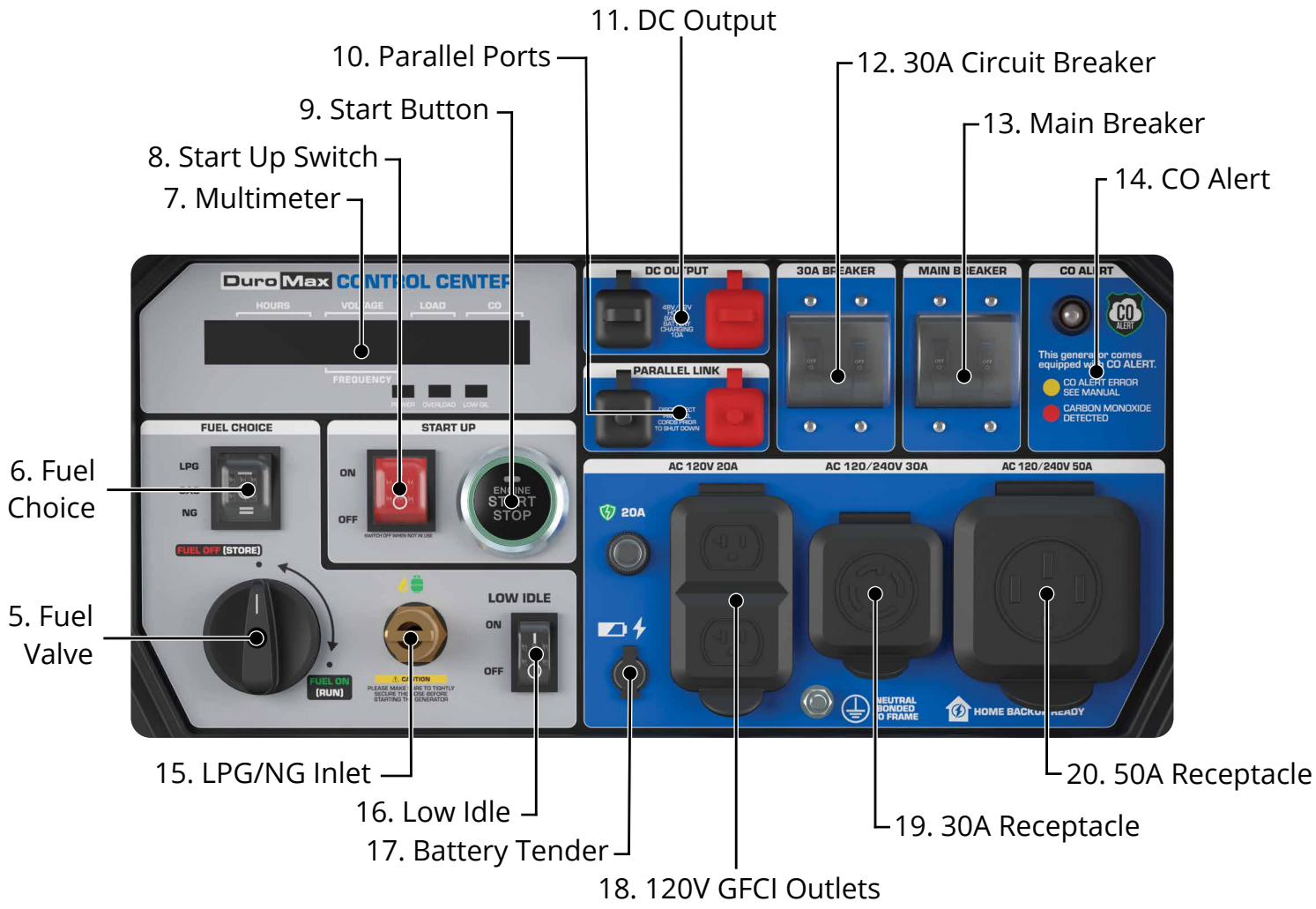
GENERATOR COMPONENTS

To help you get familiar with your new DuroMax generator, please see this component section for easy reference on all the generator's individual features.

GENERATOR COMPONENTS



1. **Handles** - Allow for easy steering during transportation.
2. **Power Panel** - Contains the start switch, plugs, meters, and circuit breakers.
3. **Fuel Tank and Gauge -** Indicates the amount of fuel in the gasoline tank.
4. **Wheels** - Solid wheels allow for easy transportation over any terrain.
5. **Fuel Valve** - ON/OFF valve that allows gasoline into the engine.
6. **Fuel Choice** - GAS/LPG/NG switch that changes the fuel into the engine.
7. **Multimeter** - Provides information of Hours Run, Voltage, Hertz, and Current Load on the generator measured in kW.
8. **Start Up Switch** - Allows power to the starter and panel. Prevents accidental starting.
9. **Start Button** - Starts and shuts down the generator.
10. **Parallel Ports** - Allow you to combine the output of two generators for maximum power.
12. **DC Output** - Allows you to charge your lithium ion 48V-58V batteries.



12. **30A Circuit Breaker** - Protects the 30A outlet from an overload or short circuit.
13. **Main Breaker** - Protects the full panel from an overload or short circuit.
14. **CO Alert** - Shuts down the engine in the event of CO buildup.
15. **LPG/NG Inlet** – Provides a regulated LPG/NG fuel supply to the engine.
16. **Low Idle** - Lowers the engine speed to match the load to save on fuel and reduce noise levels.
17. **Battery Tender** - Easily keep your battery charge when the generator is in storage by using the included battery tender.
18. **120V GFCI Receptacles** - Use to connect electrical devices that run 120 Volt, 60 Hz, single-phase, ac current (NEMA 5-20).
19. **30A Receptacle** - Use to connect electrical devices that run 120 or 240 Volt, 60 Hz, single-phase, AC current (NEMA L14-30).
20. **50A Receptacle** - Use to connect electrical devices that run 120 or 240 Volt, 60 Hz, single-phase, AC current (NEMA 14-50).

PACKAGE CONTENTS

Your generator comes with the items listed below. Please check to see that all of the following items are included with your generator.



Double Sided Screw Driver

Phillips and slot blade screwdriver used for generator maintenance.



Socket Wrench

An 8mm/10mm/12mm socket wrench used for generator maintenance.



Spark Plug Wrench

Used in spark plug maintenance, inspection, and installation.



Oil Funnel w/ Hose

Used to add oil to the generator without messy spills.



Battery Tender

Used to charge the battery when in storage



Remote Control

Used to remotely start the generator.



Propane Regulator w/ Hose

Used to provide a regulated propane supply to the propane inlet.



DC Output Wires

Used to charge 48-52V DC batteries.



Natural Gas Hose

Used to provide a natural gas supply to the natural gas inlet.



Electrical Tape

Used for generator installation and repairs.

- Note: Actual tools may differ in appearance or design from image shown.

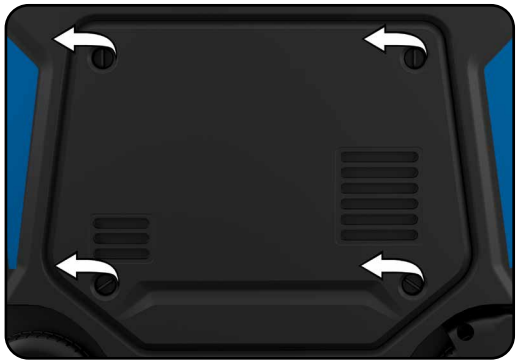


GENERATOR SETUP

Proper setup of your generator will get you going as soon as possible while making sure you and your equipment are safe and cared for.

GENERATOR SETUP (CONTINUED)

Step 1 - Connect the Battery



1. Remove maintenance cover

Remove the left hand maintenance cover by rotating each thumbscrew counter-clockwise to the unlock symbol and remove the maintenaince cover.



2. Locate the battery cables

Locate both ends of the quick connect battery cables near the battery. One side will be located to the side of the battery and the other will be connected to the top battery terminals. Route both battery ends forward to clip together.



3. Connect battery cables

Match the positive and negative cable ends, then clip both ends together.



4. Reinstall maintenance cover

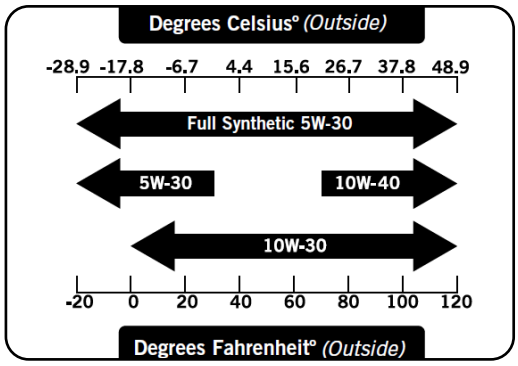
Replace the left hand maintenance cover ensuring all sides are fully seated and rotating the thumbscrews clockwise to the lock symbol to lock the maintenance cover in place.

Step 2 - Adding Oil

The generator requires engine oil to operate properly. The generator, when new from the package, contains no oil in the crankcase*. You must add the proper amount of oil before operating the generator for the first time. This amount is equal to the oil capacity of the engine crankcase:

Model Number	XP13500iHT
Engine Oil Capacity	50.7 fl. oz. (1.5 L)

WARNING: Do not apply engine oils with additives or 2-stroke gasoline engine oils; they don't have enough lubrication and may shorten the engine's service life.



Engine oil recommended: SAE 10W-30.
Viscosity varies with regions and temperatures. Choose your oil viscosity using the chart to the left.

* A small amount of oil from factory testing may be present on arrival.
* Synthetic oil may be used after the 8 hour initial break-in period. Using synthetic oil does not increase the recommended oil change interval. Full synthetic 5W-30 oil will aid in starting in cold temperatures <5°C (41°F).



Add oil

a. Make sure the generator is on a level surface.
b. Remove the Oil Fill cover
c. Unscrew the oil filler/dipstick cap from the engine.
d. Using a funnel, add the appropriate amount of oil into the crankcase. Check the dipstick and add oil as needed until the oil is to the end of the dipstick hash marks.
e. Replace the oil filler cap.



WARNING: DO NOT overfill the crankcase. This may damage the motor and shorten the overall life of your generator.

Step 3 - Adding Gasoline (Optional)



Add gasoline

a. Make sure the generator is on a level surface.

b. Unscrew gas cap and set aside (NOTE: the gas cap may be tight and hard to unscrew).

c. Slowly add unleaded gasoline to the fuel tank. Be careful not to overfill. The fuel gauge on the top of the gas tank indicates how much gasoline is in the generator gas tank.

d. Replace fuel cap and wipe up any spilled gasoline with a dry cloth.

Model Number	XP13500iHT
Gas Tank Capacity	8 US Gal. (30.3 L)



WARNING: Gas can expand. Do not fill the gas tank to the very top. Leave a minimum of 1 $^{1}/_{2}$“ open space. Gasoline and gas fumes are highly flammable. Do not fill the tank near an open flame. Always check for fuel spills.

IMPORTANT:

- To ensure that the generator runs smoothly use only FRESH, UNLEADED GAS WITH AN OCTANE RATING OF 87 OR HIGHER.
- Never use an oil/gasoline mixture. Never use old gas.
- Avoid getting dirt or water in the fuel tank.
- Gas can age in the tank and make it hard to start up the generator in the future.
- Never store generator for extended periods of time with fuel in the tank.

Step 4 - Grounding the Generator



Attach grounding wire

a. Ground the generator by tightening the grounding nut against a grounding wire.

b. Connect the other end to a copper or brass grounding rod that's driven into the earth.

A generally acceptable grounding wire is a No. 12 AWG (American Wire Gauge) stranded copper wire.

Grounding codes can vary by location. Please contact a local electrician to check the grounding regulations for your area.

Note: **If the generator is connected to a home, then it won't be necessary to attach the separate grounding wire and you can opt to use your home ground instead. Please see a certified electrician for further options with grounding your generator.**

WARNING: Failure to properly ground the generator can result in electrocution.

High Altitude Operation

At high altitudes, the standard carburetor air/fuel mixture will be too rich. The performance will decrease, and fuel consumption will increase. A very rich mixture will also foul the spark plug and cause hard starting. Operation at an altitude that differs from that at which this engine was certified, for extended periods of time, may increase emissions. High altitude performance can be improved by specific modifications to the carburetor. If you always operate your generator at altitudes above 3,000 feet (900 meters), have a dealer perform this carburetor modification. This engine, when operated at high altitude with the carburetor modifications for high altitude use, will meet each emission standard throughout its useful life. Even with carburetor modification, engine horsepower will decrease by about 3.5% for each 1,000-foot (300-meter) increase in altitude. The effect of altitude on horsepower will be greater than this if no carburetor modification is made.

When the carburetor has been modified for high altitude operation, the air/fuel mixture will be too lean for low altitude use. Operation at altitudes below 3,000 feet (900 meters) with a modified carburetor may cause the engine to overheat and result in serious engine damage.

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STARTING THE GENERATOR

If this is not your first time using the generator there are still steps you should take to prepare it for operation each time you use it.

IMPORTANT: At this point, you should be familiar with the procedures described in the first portion of this section entitled “GENERATOR SETUP” If you have not yet read this section, go back and read it now.

Step 1 - Check the Oil





Check the oil

The generator is equipped with an automatic shutoff to protect it from damage due to low oil. Nonetheless, you should check the oil level of the engine before each use to ensure that the engine crankcase has a sufficient amount.

To check the oil level:

a. Make sure the generator is on a level surface.

b. Remove the oil cover.

c. Unscrew the oil filler/dipstick cap.

d. With a dry cloth, wipe the oil off of the stick on the inside of the cap.

e. Insert the dipstick without screwing the stick back in. There should now be oil on the stick. If there is no oil on the stick, or oil only at the very end of the stick, you should add oil until you can see oil to the end of the hash marks on the dipstick.

f. Be sure to replace the cap when finished checking oil.

Model Number	XP13500iHT
Engine Oil Capacity	50.7 fl. oz. (1.5 L)

Step 2 - Check the Gas Level (Optional)



Check fuel level

If running the engine on gasoline, check to see that there is sufficient gasoline in the fuel tank. The fuel gauge on top of the tank will give a rough estimate of the gasoline level. The gauge will appear white then fill red as the tank is filled.

Note: Fuel gauge may not register with less than 1/3 fuel tank full.



WARNING: Gasoline and gasoline fumes are highly flammable.

- Do not fill the tank near an open flame.
- Always allow the engine to cool for several minutes before refueling.
- DO NOT overfill the fuel tank. Fuel expands when shaken or heated. ALWAYS leave $1^{1}/_{2}$“ space or more at the top of the tank.
- ALWAYS use fresh fuel or stabilized fuel. Old gasoline (older than 30 days) can cause permanent damage to the fuel system.
- Always check for fuel spills.

STARTING THE GENERATOR

Starting the Generator Using Gasoline



1. Select gasoline fuel

The fuel choice switch is located on the left side of the front power panel. Flip the switch up to middle position to select gasoline as a fuel source.



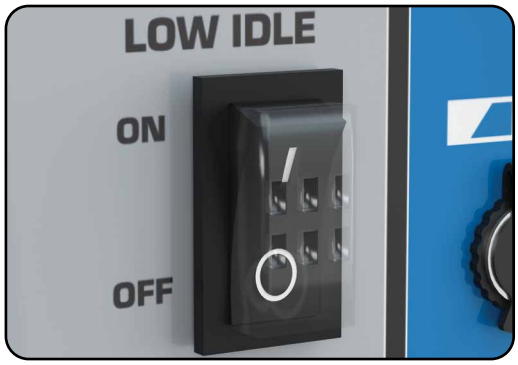
2. Turn gas valve ON

The gas valve is located the left hand side of the panel. Rotate the valve clockwise to the FUEL ON (RUN) position to turn on the fuel supply.



3. Shut main breaker OFF

The breaker is located on the top right of the front power panel. Flip the breaker down to prevent accidental load when starting the generator.



4. Turn low idle OFF

The low idle is located near the bottom center of the front power panel, next to the LPG/NG inlet. Flip the switch down to disable low idle when starting the generator.



5. Turn start switch ON

The start switch is located on the center left side of the front power panel next to the START button. Press the switch up to the ON position to allow the generator to start.



6. Press the START button

The START button is located near the center of the power panel. Press the button down for 1-3 seconds to start the generator.



7. Turn main breaker ON/Connect

The breaker is located in the top right of the front power panel. Flip the breaker up to allow the power to flow to the receptacles. Connect your devices to the receptacles on the front panel. Start with the largest loads first.

CAUTION: Disconnect all electrical loads from the generator before attempting to start!

STARTING THE GENERATOR (CONTINUED)

Starting the Generator Using Propane



1. Connect propane hose

The LPG/NG inlet is located near the bottom left of the front panel. Connect the propane hose to both the inlet and the propane tank. Open the propane tank.



2. Select LPG fuel

The fuel selector is located on the left side of the front power panel. Flip the switch up to select LPG as a fuel source.



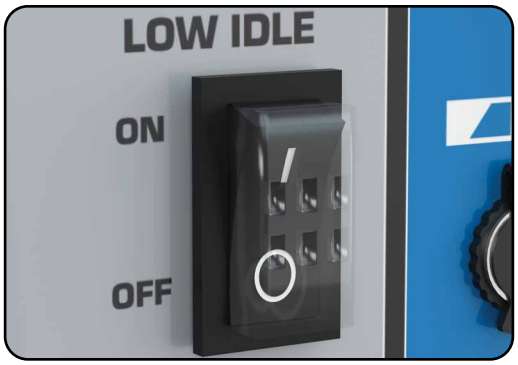
3. Turn gas valve ON

The gas valve is located the left hand side of the panel. Rotate the valve clockwise to the FUEL ON (RUN) position to turn on the fuel supply.



4. Turn main breaker OFF

The breaker is located on the top right of the front power panel. Flip the breaker down to prevent accidental load when starting the generator.



5. Turn low idle OFF

The low idle is located near the bottom center of the front power panel, next to the LPG/NG inlet. Flip the switch down to disable low idle when starting the generator.



6. Turn start switch ON

The start switch is located on the center left side of the front power panel next to the START button. Press the switch up to the ON position to allow the generator to start.



7. Press the START button

The START button is located near the center of the power panel. Press the button down for 1-3 seconds to start the generator.



8. Turn main breaker ON/Connect

The breaker is located in the top right of the front power panel. Flip the breaker up to allow the power to flow to the receptacles. Connect your devices to the receptacles on the front panel. Start with the largest loads first.

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Starting the Generator Using Propane (Continued)

WARNING: WHEN USING THE GENERATOR WITH LPG, MAKE SURE THERE IS NO POSSIBLE IGNITION SOURCE CLOSE TO THE GENERATOR.

1. Before using, make sure all of the LPG connectors and hoses are well connected and sealed.
2. Connect electrical devices to the generator ONLY after the engine runs smoothly. (There may be remnant gasoline in the carburetor; and this can cause unsteady engine performance for several minutes)
3. If the propane gas leaks, shut off the LPG supply first and then quickly unplug or turn off any electrical devices powered by the unit.
4. When stopping the engine, unplug or turn off any electrical devices, turn off the main circuit breaker and then turn off the LPG supply. After the engine has stopped turn the battery switch to the “OFF” position.

CAUTION: Disconnect all electrical loads from the generator before attempting to start!

Propane Requirements



CAUTION: Always use the provided propane hose and regulator supplied with your generator. Failure to use the supplied regulator can damage your generator and void your warranty.

Note: Required fuel pressure to provided propane hose and regulator at all load ranges needs to be a minimum of 3 PSI.

Model Number	XP13500iHT
Minimum Recommended Propane Tank Size	40 lbs.
BTU/Hr at Full Load	199,500 BTU/Hr

Starting the Generator Using Natural Gas



1. Connect natural gas hose

The LPG/NG inlet is located near the bottom left side of the front panel. Connect the natural gas hose to the LPG/NG inlet.



2. Select NG fuel

The fuel selector is located on the left side of the front power panel. Flip the switch down to select natural gas.



3. Turn gas valve ON

The gas valve is located the left hand side of the panel. Rotate the valve clockwise to the FUEL ON (RUN) position to turn on the fuel supply.



4. Turn main breaker OFF

The breaker is located on the top right of the front power panel. Flip the breaker down to prevent accidental load when starting the generator.



5. Connect to supply

Connect the quick connect on the hose to your natural gas supply and turn on your valve.



6. Turn low idle OFF

The low idle is located near the bottom center of the front power panel, next to the LPG/NG inlet. Flip the switch down to disable low idle when starting the generator.



7. Turn start switch ON

The start switch is located on the center left side of the front power panel next to the START button. Press the switch up to the ON position to allow the generator to start.



8. Press the START button

The START button is located near the center of the power panel. Press the button down for 1-3 seconds to start the generator.

Starting the Generator Using Natural Gas (Continued)



9. Turn main breaker ON/Connect

The breaker is located in the top right of the front power panel. Flip the breaker up to allow the power to flow to the receptacles. Connect your devices to the receptacles on the front panel. Start with the largest loads first.

WARNING: WHEN USING THE GENERATOR WITH NG, MAKE SURE THERE IS NO POSSIBLE IGNITION SOURCE CLOSE TO THE GENERATOR.

1. Before using, make sure all of the NG connectors and hoses are well connected and sealed.
2. Connect electrical devices to the generator ONLY after the engine runs smoothly. (There may be remnant gasoline in the carburetor; and this can cause unsteady engine performance for several minutes)
3. If the natural gas leaks, shut off the NG supply first and then quickly unplug or turn off any electrical devices powered by the unit.
4. When stopping the engine, unplug or turn off any electrical devices, turn off the main circuit breaker and then turn off the NG supply. After the engine has stopped turn the battery switch to the “OFF” position.

CAUTION: Disconnect all electrical loads from the generator before attempting to start!

Natural Gas Requirements



Installation

WARNING: Consult a licensed professional natural gas plumber for proper installation.

TO THE INSTALLER:

The generator will require at least a 1/2” quick connect to operate properly.

Note: Fuel pipe must be sized for full load. Required fuel pressure to generator fuel inlet at all load ranges 6.0 - 9.0 in. water column for Natural Gas. BTU Content: 225,000 BTU at full load.

- Install the fuel supply system according to NFPA 37 and other applicable fuel-gas codes.
- Before placing the generator into service, the fuel system lines must be properly purged and leak tested.
- NO leakage is permitted.
- DO NOT operate engine if smell of fuel is present.
- The piping material must conform to federal and local codes, be rigidly mounted, and be protected against vibration.
- Piping should be protected from physical damage, especially where it passes through flower beds, shrub beds, and other cultivated areas where damage can occur.
- For vapor fuels only: Where the formation of hydrates or ice is known to occur, piping should be protected against freezing. The termination of hard piping must include a sediment trap where condensate is not likely to freeze.
- A minimum of one accessible, approved manual shutoff valve shall be installed in the fuel supply line within 6 ft (180 cm) of the generator.
- You must install a manual fuel shut-off valve in the interior of the building.
- Where local conditions include earthquake, tornado, unstable ground, or flood hazards, special consideration shall be given to increase strength and flexibility of piping supports and connections.
- Piping must be of the correct size to maintain the required supply pressures and volume flow under varying generator load conditions with all gas appliances connected to the fuel system turned on and operating.
- Use a pipe sealant or joint compound approved for use with NG/LP on all threaded fittings to reduce the possibility of leakage.

NOTICE: Keep thread sealant out of the gas piping to prevent component part damage. Installed piping must be properly purged and leak tested, in accordance with applicable codes and standards.

Starting the Generator Using Recoil Start



1. Select fuel

Flip the fuel choice switch up to select LPG as a fuel source. Flip the switch to the middle position to select GAS. Flip the switch down to select NG as a fuel source. If LPG is used connect the LPG hose to the LPG/NG inlet and propane source. If NG is used connect the NG hose to the LPG/NG inlet and natural gas source.



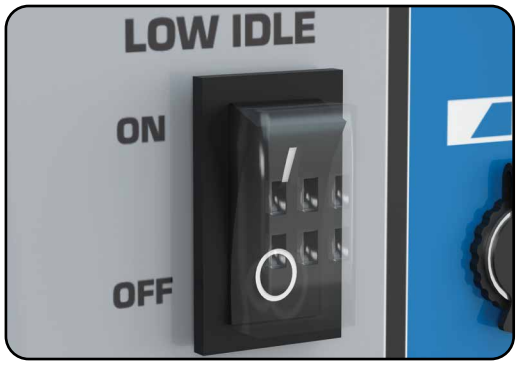
2. Turn gas valve ON

The gas valve is located the left hand side of the panel. Rotate the valve clockwise to the FUEL ON (RUN) position to turn on the fuel supply.



3. Shut main breaker OFF

The breaker is located on the top right of the front power panel. Flip the breaker down to prevent accidental load when starting the generator.



4. Turn low idle OFF

The low idle is located near the bottom center of the front power panel, next to the LPG/NG inlet. Flip the switch down to disable low idle when starting the generator.



5. Turn start switch ON

The start switch is located on the center left side of the front power panel next to the START button. Press the switch up to the ON position to allow the generator to start.



6. Pull the recoil start

The recoil start is located on the right hand maintenance cover of the generator. Pull the recoil handle slowly until resistance is felt, then quickly pull the recoil handle until fully extended.

CAUTION: Release the recoil handle only after the cord has retracted. Releasing the recoil handle while extended may cause harm to yourself or your equipment.



7. Turn main breaker ON/Connect

The breaker is located in the top right of the front power panel. Flip the breaker up to allow the power to flow to the receptacles. Connect your devices to the receptacles on the front panel. Start with the largest loads first.

Starting the Generator Using Remote Start



1. Select fuel

Flip the fuel choice switch up to select LPG as a fuel source. Flip the switch to the middle position to select GAS. Flip the switch down to select NG as a fuel source. If LPG is used connect the LPG hose to the LPG/NG inlet and propane source. If NG is used connect the NG hose to the LPG/NG inlet and natural gas source.



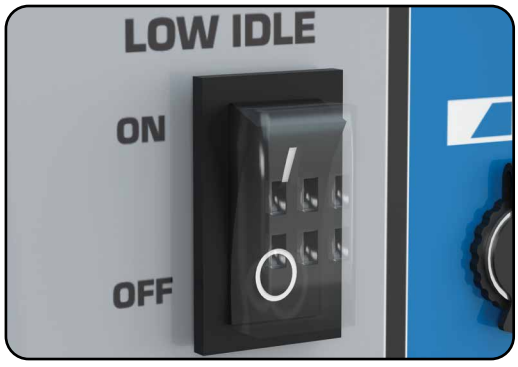
2. Turn gas valve ON

The gas valve is located the left hand side of the panel. Rotate the valve clockwise to the FUEL ON (RUN) position to turn on the fuel supply.



3. Turn main breaker ON

The breaker is located in the top right of the front power panel. Flip the breaker up to allow the power to flow to the receptacles.



4. Turn low idle OFF

The low idle is located near the bottom center of the front power panel, next to the LPG/NG inlet. Flip the switch down to disable low idle when starting the generator.



5. Turn start switch ON

The start switch is located on the center left side of the front power panel next to the START button. Press the switch up to the ON position to allow the generator to start.



6. Push the ON button

The remote start has two buttons, ON and OFF. Press the ON button start the generator.

DuroMax



USING THE GENERATOR

If this is not your first time using the generator, there are still steps you should take to prepare it for operation each time you use it.

IMPORTANT: At this point, you should be familiar with the procedures described in the first portion of this section entitled "GENERATOR SETUP"; if you have not yet read this section, go back and read it now.

AC Usage

- You may connect electrical devices running on AC current according to their wattage requirements.
- The chart below shows the rated and surge wattage of your generator according to its model number.
- The rated wattage corresponds to the maximum wattage the generator can output on a continuous basis.
- The surge wattage corresponds to the maximum amount of power the generator can output for a short period of time. Many electrical devices such as refrigerators require short bursts of extra power, in addition to the rated wattage listed by the device, to stop and start their motors. The surge wattage ability of the generator covers this extra power requirement.

Fuel Source	Rated (Running) Wattage	Surge (Peak) Wattage
Gasoline	10,500	13,500
Propane	10,000	12,750
Natural Gas	9,000	11,500

The total running wattage requirement of the electrical devices connected to the generator should not exceed the rated wattage of the generator itself. To calculate the total wattage requirement of the electrical devices you wish to connect, find the rated (or running) wattage of each device. This number should be listed somewhere on the device or in its instruction manual.

If you cannot find this wattage, you may calculate it by multiplying the Voltage requirement by the Amperage drawn: Watts = Volts x Amps. If these specifications are not available, you may estimate the Watts required by your device by using the chart on the next page.

Once you have found the rated wattage requirement of each electrical device, add these numbers to find the total rated wattage you wish to draw from the generator. If this number exceeds the rated wattage of the generator, DO NOT connect all these devices. Select a combination of electrical devices, which has a total rated wattage lower than or equal to the rated wattage of the generator.

Tool or Appliance	Rated (Running) Watts	Additional Surge Watts
Electric water heater (40 gal)	4000	0
Hot plate	2500	0
Radial arm saw	2000	2000
Electric stove	1500	0
Circular saw	1500	1500
Air compressor (1 HP)	1500	3000
Window air conditioner	1200	1800
Miter saw	1200	1800
Microwave	1000	2000
Well water pump	1000	1500
Reciprocating saw	960	1040
Sump pump	800	1200
Refrigerator freezer	800	1200
Furnace blower	800	1300
Computer	800	0
Electric drill	600	900
Television	500	0
Deep freezer	500	800
Garage door opener	480	600
Stereo	400	0
Box fan	300	600
Clock radio	300	0
Security system	180	0
DVD player	100	0
Common light bulb	75	0

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

NOTE: The above wattage figures are estimates only.
Try to check the wattage listed on your electrical devices before consulting this chart.


DuroMax
TRI FUEL
XP13500iHT
GASOLINE PROPANE NATURAL GAS

Connecting the Generator to a Home



Interlock kit

- Choose what circuits you want to run.
- Requires an electrician to install, but you have the flexibility of switching up your circuits depending on your power needs.
- More hands-on, and some electrical knowledge is needed so you don't overload the generator.



Transfer switch

- Automatically switches power over to your generator during an outage. Requires an electrician to install.
- Once you choose which circuits you want to power, you're locked into your configuration.



Extension cords

- The most straightforward and affordable option.
- Zero commitment, no installation needed: Simply plug in your appliances and go!
- Perfect for renters, RV/camping trips, and power on the job-site.

Connecting a Load to the Generator

NOTE: Be sure to attach devices to the correct receptacle (outlet).

- 120V devices can be directly connected to the 120V ONLY receptacles.
- 120V devices can be connected to the 120/240V receptacle using an appropriate adapter.
- 240V devices can ONLY be connected to the 240V receptacle.

CAUTION: Do not connect 50 Hz or 3-phase loads to the generator.



1. Plug in devices

Plug in devices to the appropriate receptacle. When using the generator, balance the load as closely as possible. Placing more load on one side of the circuit will reduce the breaker trip period.



2. Flip main breaker ON

Flip the circuit breaker up to the ON position to allow power to the receptacles.



3. Turn on connected devices

Start or turn on appliances, starting with the biggest loads first.

Choosing the Right Power Cord

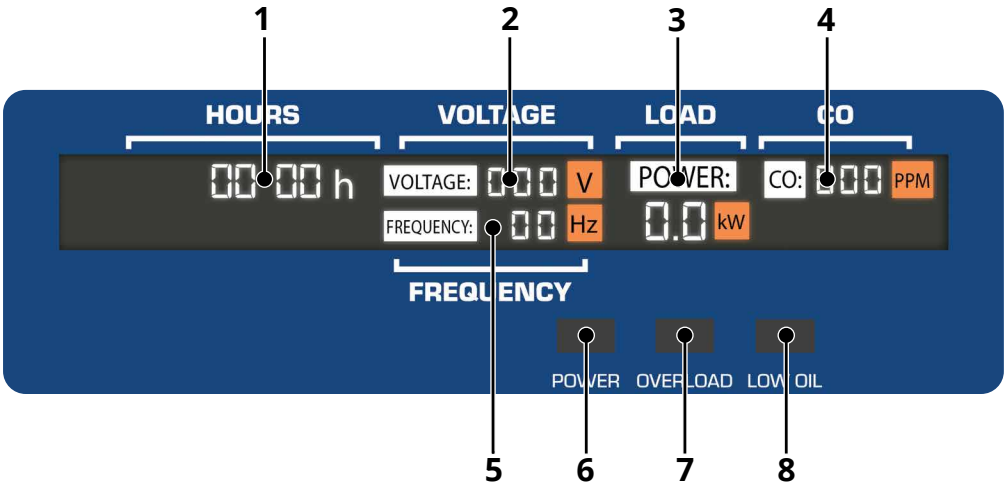
Long or thin cords can drain the power provided to an electrical device by the generator. When using such cords, allow for a slightly higher rated wattage requirement for the electrical device. See the table below for recommended cords based on the power requirement of the electrical device.

DEVICE REQUIREMENTS		WIRE GAUGE BY LENGTH (ft.)				
AMPS	**WATTS (120/240V)**	**10**	**25**	**50**	**100**	**150**
5	**600/1200**	18	16	14	12	10
10	**1200/2400**	16	14	12	12	10
15	**1800/3600**	14	14	12	12	10
20	**2400/4800**	12	12	12	10	10
25	**3000/6000**	12	10	10	10	8
30	**3600/7200**	10	10	10	8	NR
40	**4800/9600**	8	8	6	6	NR
50	**6000/12000**	6	6	6	NR	NR
***NR = NOT RECOMMENDED**		***Gauge based on twisted copper wire**				

From home back up to just running your electric edger and everything in-between DuroMax has the power cord for you. All DuroMax cords are 100% twisted copper wire for maximum life and reliability.

Length	**120V 15A**					**240V 30A**	**240V 50A**
	14 Gauge	**12 Gauge**		**10 Gauge**			**6 Gauge**
	Single Outlet	**Single Outlet**	**Triple Outlet**	**Single Outlet**	**Triple Outlet**	**L14-30P/ L14-30R**	**14-50P/ CS6364**
10 ft						XP3010GC	
15 ft							XP5015GC
25 ft	XPC14025A	XPC12025A	XPC12025C	XPC10025A	XPC10025C	XP3025GC	XP5025GC
50 ft			XPC12050C	XPC10050A	XPC10050C	XP3050GC	XP5050GC
100 ft		XPC12100A	XPC12100C	XPC10100A	XPC10100C		

Using the Digital Multimeter



1. **Runtime/Total Hours** - This portion of the display will automatically switch between the current runtime and total runtime hours of the unit.
2. **Voltage** - This portion of the display will show the voltage output of the generator.
3. **Load** - This portion of the display shows the current load output in kW.
4. **CO PPM** - This portion of the display shows the current CO content in the air measured in PPM.
5. **Frequency** - This portion of the display shows the frequency output of the generator.
6. **Power** - This light will illuminate green when the power is ready for use.
7. **Overload** - This light will illuminate a solid red if the generator is overloaded and after a short period of time the power will be shut off. To reset the power output after an overload the generator will need to be shut completely off and restarted. NOTE: Ensure the AC output is reduced if the generator is overloaded before restarting.
8. **Low Oil** - This light will illuminate a solid red if low oil is detected inside the generator. If this light illuminates add the proper amount of oil in the generator as shown in the “Add Oil” section on page 23.

Low Idle Usage



Low Idle

The low idle feature automatically lowers the RPM of the generator based on the current load to help conserve fuel and lower the noise of the generator.

Turn on the low idle for better fuel efficiency and to make the generator quieter.

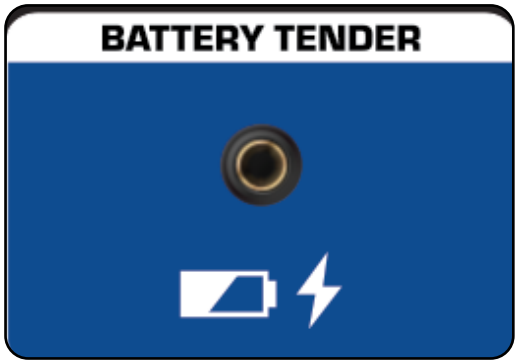
CAUTION: Some high surge items may not work correctly with low idle.

Using the Battery Tender



The generator battery can steadily lose charge during longer periods of storage. Plug the provided trickle charger in to ensure your battery is maintained and ready for use if needed.

CAUTION: Avoid allowing the 12V battery to drop below 11.6V of charge, this can cause permanent damage to the battery cells.



Connect the battery tender

a. The battery tender outlet is located to right the start switch. Connect the battery tender cord to the battery tender outlet.
b. Connect the other end of the battery tender to a standard 120V wall outlet.

Using the DC Output



The generator includes a high-power 58V DC output designed to charge 48V and 52V Home Energy Storage Systems (HESS). This port provides a constant “Bulk Charge” to quickly restore your battery bank and support your home during an outage.

NOTE: The power used on the DC output will be deducted from the total available AC power on the panel.

WARNING: PROFESSIONAL INSTALLATION RECOMMENDED, to ensure safety and protect the warranty, DuroMax recommends that all permanent battery backup connections be performed by a qualified electrician.

Automated Charging Compatibility

Charging safety is managed by the hardware in your system. This eliminates the need for the user to manually monitor the batteries during the charging cycle.

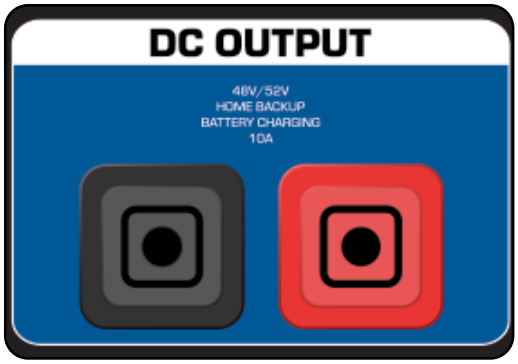
Battery System	Chemistry Type	Connection Requirement	How it Works
48V Lithium	LFP (LiFePO4)	Direct to Busbar	Your battery’s internal BMS handles the shut-off.
52V Lithium	NCM/Li-ion	Direct to Busbar	The 58V output provides a safe 95% charge for longer life.
48V Lead-Acid	SLA/AGM/GEL	External Controller	MANDATORY: The controller manages the “float” stage.

Direct Power Assist (LITHIUM ONLY)

If your lithium batteries are at a low state of charge, the XP28000iH provides immediate support to your system while running.

1. **Instant Power:** The generator will feed power directly to your home inverter to keep your appliances running while it simultaneously recharges your batteries.
2. **Continuous Support:** Even if your batteries are too low to run the house on their own, the generator’s DC output will keep the inverter energized.

Using the DC Output (Continued)



Connection Steps (Busbar Installation)

1. **Identify Busbars:** Locate the Positive (+) and Negative (-) bars in your system.
2. **Secure Eyelets:** Bolt the RED wire to the Positive (+) busbar. Bolt the BLACK wire to the Negative (-) busbar. Tighten all bolts securely.
3. **Plug into Panel:** Insert the heavy-duty plugs into the DC OUTPUT ports on the generator.
4. **Start System:** Start the generator. The system will automatically begin pushing power to your batteries and inverter.

DANGER: EXPLOSIVE GASES always charge batteries in a well-ventilated area. Batteries can release explosive gases during the charging process.

DANGER: VOLTAGE LIMIT DO NOT use this output for 12V, 24V, or 36V systems. Attempting to charge a lower-voltage battery will result in immediate battery destruction and potential explosion.

WARNING: REVERSE POLARITY never reverse the polarity. Ensure Red is to Positive (+) and Black is to Negative (-). Reversing these wires will cause immediate damage to the generator and your batteries.

CAUTION: CABLE TEMPERATURE charging cables may become warm during high-amperage use. Ensure cables are spread out and not coiled, bundled, or covered while in use.

CAUTION: EQUIPMENT DAMAGE you MUST use an external 48V Charge Controller when charging SLA, AGM, or GEL batteries. Connecting these batteries directly to the 58V DC Output will cause the batteries to overheat and “boil,” resulting in permanent battery failure.

Syncing the Remote



1. Flip start up switch ON

Flip the start up switch to the ON position to allow power to the panel.



2. Engage sync mode

Press the start button 5 times within 2 seconds. The start button turns red to indicate that it has entered the sync mode.



3. Press ON button on remote

Press the ON button on the remote control. The start button flashes once to indicate that the syncing is successful. If you have additional remote controls, press the ON button for each one to add to sync.



4. Disengage sync mode

After adding all desired remotes, press the start button 5 times within 2 seconds to disengage sync mode.



STOPPING THE GENERATOR

This section will cover the recommended shut off procedure for stopping the generator on various fuels.

STOPPING THE GENERATOR

Shutting Down the Generator On Gasoline



1. Flip the main breaker OFF

The breaker is located on the top right of the front power panel. Flip the breaker down to the OFF position.



2. Run the generator

Allow the generator to run for 3-5 minutes.



3. Turn the generator OFF

Hold the start button for 3 seconds to shut off the generator.



4. Flip start switch OFF

Flip the start switch to the OFF position.

Shutting Down the Generator On Propane



1. Turn OFF the main breaker

Move the main breaker to the OFF position.



2. Run the generator

Allow the generator to run for 3-5 minutes.



3. Flip start switch OFF

Hold the start button for 3 seconds to turn off the generator and flip the start switch to the OFF position.



4. Close the propane tank valve

Turn your propane tank valve to the CLOSE position.

STOPPING THE GENERATOR (CONTINUED)

Shutting Down the Generator On Natural Gas



1. Flip the main breaker OFF

The breaker is located on the top right of the front power panel. Flip the breaker down to the OFF position.



2. Run the generator

Allow the generator to run for 3-5 minutes.



3. Flip start switch OFF

Hold the start button for 3 seconds to turn off the generator and flip the start switch to the OFF position.



4. Shut off gas valve and turn off

Turn your gas valve to the OFF position and flip the battery switch OFF.

Shutting Down the Generator With the Remote



1. Turn OFF the main breaker

Move the main breaker to the OFF position.



2. Run the generator

Allow the generator to run for 3-5 minutes.



3. Hold the OFF button

Hold the OFF button to shut off the generator.



4. Flip start switch OFF

Flip the start switch to the OFF position.



MAINTENANCE AND CARE

Proper maintenance and storage of your generator are essential to ensure trouble-free use of your generator when you need it.

By following the maintenance and care requirements, you can keep your generator running smoothly and efficiently for years to come.

MAINTENANCE AND CARE

Proper routine maintenance of your generator is essential for safe, economical, and trouble-free operation. It will also help reduce air pollution.

WARNING: Improper maintenance, or failure to correct a problem before operation, can cause a malfunction in which you can be seriously injured or killed. Always follow the inspection, maintenance recommendations, and schedules in this instruction manual.

- Make sure the engine is off before you begin any maintenance or repairs.
- Let the engine and exhaust system cool before touching.
- To reduce the possibility of fire or explosion, be careful when working around gasoline. Use only a nonflammable solvent, not gasoline, to clean parts. Keep cigarettes, sparks, and flames away from all fuel-related parts.

Maintenance Schedule

Remember that this schedule is based on the assumption that your machine will be used for its designed purpose. Sustained high-load, high-temperature operation, or use in unusually wet or dusty conditions, will require more frequent service.

SERVICE	EVERY USE	1ST MO. OR 8 HRS. (BREAK IN)	EVERY 3 MO. OR 50 HRS. OF HEAVY USE	EVERY 6 MO. OR 100 HRS. OF NORMAL USE	EVERY 12 MO. OR 300 HRS.	EVERY 3 YRS. OR 500 HRS.
ENGINE OIL	*CHECK*	*CHANGE*	*CHANGE*	*CHANGE*		
AIR CLEANER	*CHECK*	*CHECK*	*CHANGE*	*CHANGE*		
SPARK PLUG			*CLEAN / ADJUST*	*CLEAN / ADJUST*		
SPARK ARRESTOR	*CHECK*				*CLEAN*	
IDLE SPEED					*CHECK / ADJUST*	
VALVE CLEARANCE					*CHECK / ADJUST*	
FUEL TUBE	*CHECK*				*CHECK / REPLACE*	
FUEL TANK / FILTER					*CLEAN*	
COMBUSTION CHAMBER						*CLEAN*

Break-In Period

As the best practice for any new combustion motor it's recommended to perform the break-in procedure as follows:

- Run the generator for the first 6-8 hours on conventional oil, then change the oil. After the break-in period synthetic oil may be used.
- During the break-in period of the first 6-8 hours keep the generator load under 50% for optimal results.
- Check and clean the air filter if necessary after the break-in period.

Maintenance Log

As a best practice it's recommended to keep a log of the generator hours and maintenance to ensure your generator is always operating to its full potential.

Date	Generator Hours	Maintenance Performed

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Checking the Oil





Check the oil

The generator is equipped with an automatic shutoff to protect it from damage due to low oil. Nonetheless, you should check the oil level of the engine before each use to ensure that the engine crankcase has a sufficient amount.

To check the oil level:

a. Make sure the generator is on a level surface.

b. Remove the oil cover.

c. Unscrew the oil filler/dipstick cap.

d. With a dry cloth, wipe the oil off of the stick on the inside of the cap.

e. Insert the dipstick without screwing the stick back in. There should now be oil on the stick. If there is no oil on the stick, or oil only at the very end of the stick, you should add oil until you can see oil to the end of the hash marks on the dipstick.

f. Be sure to replace the cap when finished checking oil.

Model Number	XP13500iHT
Engine Oil Capacity	50.7 fl. oz (1.5 L)

Changing the Oil



CAUTION: Worn out or dirty oil does not cool the generator properly and can lead to catastrophic engine damage.

In addition to regular oil changes, it is necessary to drain the oil from the crankcase if it has become contaminated with water or dirt.



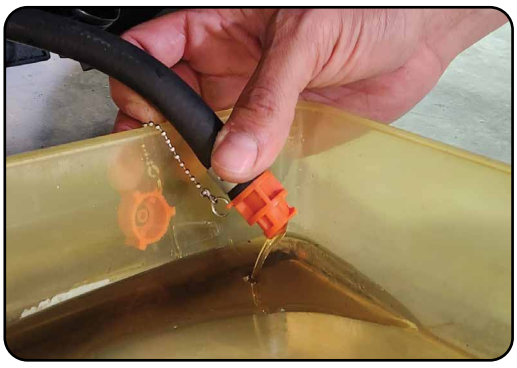
1. Remove maintenance cover

Remove the right hand maintenance cover by rotating each thumbscrew counter-clockwise to the unlock symbol and remove the maintenaince cover.



2. Locate oil drain hose

The oil drain hose will be located behind the maintenance cover toward the bottom. Pull the drain hose out to prepare to drain the oil.



3. Remove cap and drain oil

Place oil container under oil drain hose, then remove the oil drain hose cap and allow the generator to drain the oil into the oil container. Contact your local auto parts store for information on oil disposal.



4. Replace cap

Replace the oil drain cap and put drain hose back in the same location.



5. Add new oil

Remove oil cap and add new oil to engine, then replace oil cap. The engine takes 50.7 fl. oz. of oil.



6. Replace maintenance cover

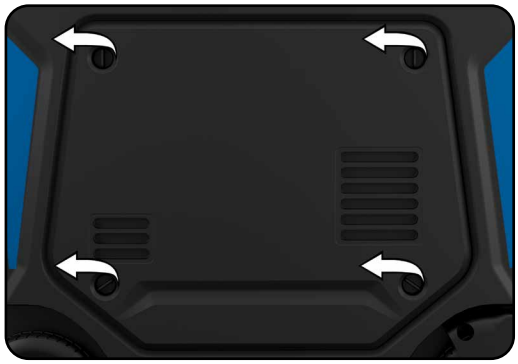
Replace the maintenance cover ensuring all sides are fully seated, then rotate the thumbscrews clockwise to the lock symbol to lock the maintenance cover in place.

Cleaning the Air Filter



Routine maintenance of the air cleaner helps maintain proper airflow to the carburetor. Check that the air cleaner is free of excessive dirt after every use.

CAUTION: Improper maintenance may cause less air to enter the engine or dirty air to enter the engine causing overheating and engine wear.



1. Remove maintenance cover

Remove the left hand maintenance cover by rotating each thumbscrew counter-clockwise to the unlock symbol and remove the maintenaince cover.



2. Remove air filter thumbscrew

The air filter is located on the lower right hand corner behind the left hand maintenance cover. Remove the air filter cover thumbscrew.



3. Remove air filter cover

Remove the air filter cover and sponge-like element from the casing.



4. Remove air filter element

Remove the spong-like air filter element from the air filter casing.



5. Wash cleaner element

Wash the sponge-like elements in household dish detergent and warm water.



6. Dry cleaner element

Pat dry on a dry cloth and allow the elements to dry completely.



7. Add engine oil to elements

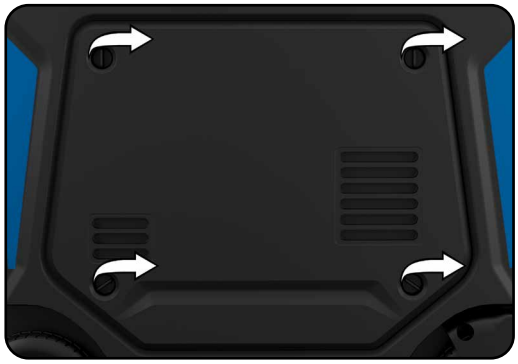
Soak the dry elements in a small amount of engine oil. Ring out any excess oil.

Cleaning the Air Filter (Continued)



8. Replace elements in casing

Replace the sponge-like elements in the air cleaner casing and replace the cover.



9. Reinstall maintenance cover

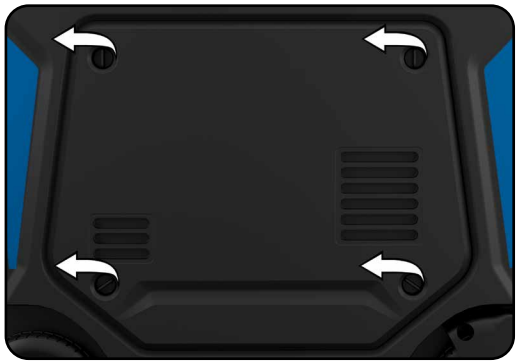
Replace the left hand maintenance cover ensuring all sides are fully seated and rotating the thumbscrews clockwise to the lock symbol to lock the maintenance cover in place.

Spark Plug Maintenance



The spark plug is important for proper engine operation. A good spark plug should be intact, free of deposits, and properly gapped.

CAUTION: Improper maintenance may cause reduced fuel economy, misfires, trouble starting, or damage to the spark plug threads.



1. Remove maintenance cover

Remove the left hand maintenance cover by rotating each thumbscrew counter-clockwise to the unlock symbol and remove the maintenaince cover.



2. Unscrew valve cover insulator

Remove the 4 screws around the black plastic valve insulator cover with a screwdriver.



3. Remove valve cover breather

Remove the valve cover breather hose leading inside the valve insulator cover.

Spark Plug Maintenance (Continued)



4. Remove valve cover insulator

Remove the black plastic valve cover insulator.



5. Remove spark plug cap

The spark plug cap is located above the OHV cover. Pull the spark plug cap off of the spark plug.



6. Remove spark plug

Unscrew the spark plug from the generator using the spark plug wrench included with this product.



7. Inspect spark plug/ Check gap

Visually inspect the spark plug. If it is cracked or chipped, discard and replace it with a new spark plug. We recommend using an NGK BPR6ES spark plug. Measure the plug gap with a gauge. The gap should be 0.7-0.8 mm (0.028-0.031 in).



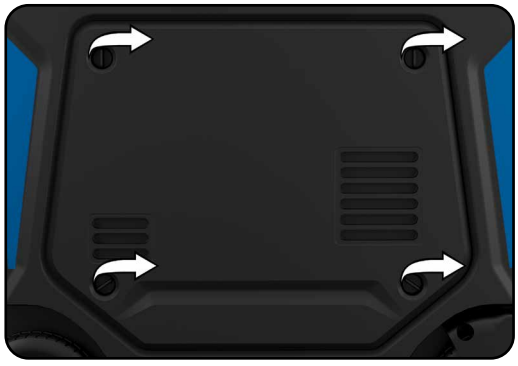
8. Clean and re-gap

If you are re-using the spark plug, use a wire brush to clean any dirt from around the spark plug base and then re-gap the spark plug.



9. Reassemble generator

Reinstall the spark plug, spark plug cap, valve cover insulator, and valve cover breather.



10. Reinstall maintenance cover

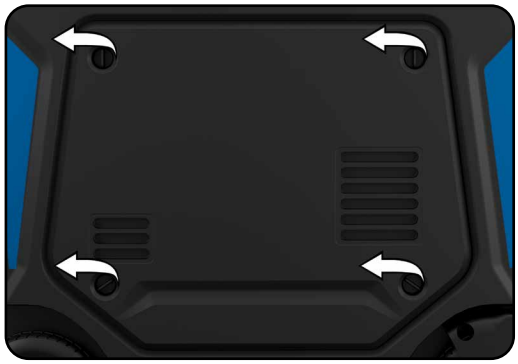
Replace the left hand maintenance cover ensuring all sides are fully seated and rotating the thumbscrews clockwise to the lock symbol to lock the maintenance cover in place.

Emptying the Gas Tank



If you have been using gasoline in your generator, before storing your generator for extended periods of time you should drain your generator fuel tank of gasoline.

CAUTION: Do not store fuel from one season to another. Gasoline sold at the pump today contains additives such as ethanol that even when stored properly may damage the fuel system components.



1. Remove maintenance cover

Remove the left hand maintenance cover by rotating each thumbscrew counter-clockwise to the unlock symbol and remove the maintenaince cover.



2. Locate carburetor drain hose

The carburetor drain hose will be located below the carburetor next to the OHV cover. Locate the carburetor drain hose to prepare for draining the generator.



3. Place drain hose into container

Place the carburetor drain hose into a suitable gasoline storage container to prepare for draining the gas tank.



4. Loosen carburetor drain screw

The drain screw will be located above the carburetor drain hose connection point of the carburetor. Loosen the drain screw with the provided screwdriver to allow the fuel to drain from the carburetor bowl.



5. Turn fuel valve ON

Turn the fuel valve clockwise to the FUEL ON position and allow the gas to fully drain from the gas tank. Once the fuel is fully drained turn the fuel valve counter-clockwise to the FUEL OFF position.



6. Tighten carburetor drain screw

Tighten the drain screw with the provided screwdriver to stop the flow of fuel from the carburetor bowl.



7. Reinstall maintenance cover

Replace the left hand maintenance cover ensuring all sides are fully seated and rotating the thumbscrews clockwise to the lock symbol to lock the maintenance cover in place.

Transporting the Generator



1. Empty the gas tank

Fully drain your gas tank as shown in “Emptying the Gas Tank” on page 76-77.



2. Disconnect the spark plug

Pull on spark plug cap to disconnect spark plug from ignition wire as shown in “Spark Plug Maintenance” steps 1-5 on page 73.

CAUTION: Do not obstruct any ventilation openings and keep the generator in a cool dry area.

CAUTION: Never place any type of storage cover on the generator while it is still hot.

Storing the Generator for Use Within 30 Days



1. Add fuel stabilizer to gas tank

Add fuel stabilizer to gas tank to help preserve gasoline for longer storage period.



2. Flip main breaker OFF and run

Turn OFF the main breaker and allow the generator to run for 3-5 minutes.



3. Turn fuel valve OFF and run dry

Turn fuel valve to OFF position and allow unit to run until it stalls out.



4. Flip start switch OFF/Store

Turn the start switch to the OFF position and store the generator.

CAUTION: Do not obstruct any ventilation openings and keep the generator in a cool dry area.

Storing the Generator for Longer Than 30 Days



1. Add fuel stabilizer to gas tank

Add fuel stabilizer to gas tank to help preserve gasoline for longer storage period.



2. Flip main breaker OFF and run

Turn OFF the main breaker and allow the generator to run for 3-5 minutes.



3. Turn fuel valve OFF and run dry

Turn fuel valve to OFF position and allow unit to run until it stalls out.



4. Empty the gas tank

Fully drain your gas tank as shown in “Emptying the Gas Tank” on page 76-77.



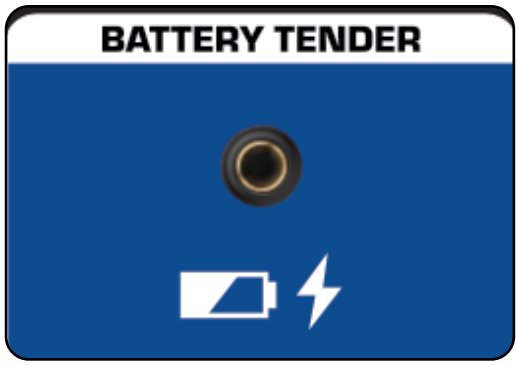
5. Remove spark plug

Remove spark plug as shown in “Spark Plug Maintenance” on page 73.



6. Add oil to cylinder

Add 2 tablespoons of 10W-30 motor oil directly into the spark plug hole on each side, and pull the recoil to lubricate cylinder. After lubricating cylinder reinstall the spark plug.



7. Connect the battery tender

Connect battery tender and leave plugged in to maintain the battery while in storage, as shown on “Using the Battery Tender” on page 52.

SPECIFICATIONS

Model Number	XP13500iHT
AC Rated Wattage (Gasoline)	10,500 W
AC Rated Wattage (Propane)	10,000 W
AC Rated Wattage (Natural Gas)	9,000 W
AC Surge Wattage (Gasoline)	13,500 W
AC Surge Wattage (Propane)	12,750 W
AC Surge Wattage (Natural Gas)	11,500 W
AC Rated Voltage	120/240V
Dimensions	32.3” L x 23.6” W x 27.4” H
Weight	233.4 lbs
Recommended Oil	10W-30
Engine Displacement	550 cc
Gasoline Capacity	8 gal. (30.3 L)
Oil Capacity	50.7 fl. oz. (1.5 L)
Engine Speed	3600 rpm
Bore	96 mm
Stroke	76 mm
Oil Cooling Type	Splash
Bearing Type	TM6307YA Deep Groove Ball Bearing
Cylinder Sleeve	Cast Iron
Fuel Delivery System	Carburetor
Valve Type	OHV
Engine Type	4-Stroke
Engine Cooling Type	Forced air
Run Time @ 25% (Gasoline)	19.9 hr.
Run Time @ 25% (Propane)	16.9 hr. (40 lb.)
Run Time @ 50% (Gasoline)	10.8 hr.
Run Time @ 50% (Propane)	9.2 hr. (40 lb.)
Starting Type	Electric/Recoil
Noise Level	66 dB @ 25% load
Neutral System	Bonded
AC Rated Frequency	60 Hz
AC Phase	Single
Winding Material	100% copper windings
Suggested Propane Tank Size	40 lbs. minimum



TROUBLESHOOTING

This section of the manual is to help you troubleshoot problems with your generator.

TROUBLESHOOTING

Mode	Description	Solution
Engine will not start.	Battery not charged.	Connect battery to battery charger and once fully charged try starting with battery.
	Engine switch is in the “OFF” position.	Turn engine switch to the “ON” position.
	Old gasoline or water in gasoline.	Drain entire fuel system and refill with fresh fuel. See page 76 for instructions on draining fuel.
	Generator is out of fuel.	Add gasoline or replace propane tank.
	Fuel valve is in the “OFF” position.	Rotate fuel valve to the “ON” position.
	Dirty or faulty spark plug.	Clean spark plug or replace. See page 74 for instructions on cleaning and replacing spark plug.
	Spark plug wire is loose.	Ensure the spark plug cap is secured on the spark plug.
	Generator is not level.	Move generator to a level surface.
	Oil is low.	Add add or change oil. See page 68 for changing oil.
	The generator is flooded with fuel.	Allow the generator to sit for 10 minutes before attempting to restart.
	CO Alert module has been tampered with or removed.	Reinstall the CO Alert module or contact technical support.
	Incorrect fuel selected on the fuel choice switch.	Flip the fuel choice switch to the correct position for the fuel being used.
	Not enough natural gas pressure or volume provide	Contact your local plumber or gas company for further assistance.

Mode	Description	Solution
Generator starts but runs roughly.	Spark arrestor dirty or clogged.	Clean the spark arrestor located in the muffler tailpipe.
	The air cleaner is dirty.	Clean or replace the air filter element. See page 70 for further instructions on cleaning or changing the air filter.
	Old gasoline or water in gasoline.	Drain entire fuel system and refill with fresh fuel. See page 76 for instructions on draining fuel.
	Not enough natural gas pressure or volume provided.	Contact your local plumber or gas company for further assistance.
	Propane tank is running empty or freezing.	Refill propane tank or upgade to a larger size tank.
Generator will not electric start.	Battery not charged.	Connect battery to battery charger and once fully charged try starting with battery.
	Battery not connected.	Ensure both halfs of the battery connector are fully connected. See page 20 for further details.
Generator shuts down while running.	CO Alert is triggering with a red illuminated light.	Move the generator to an open well ventilated location. Ensure exaust is pointed away from people or buildings. Make sure the generator is at least 5 feet away from any obstructions in the vacinity. Ensure the exhaust if facing down wind.
	CO Alert is triggering with a solid yellow illuminated light.	Contact technical support for further assistance.
	Generator is out of fuel.	Add gasoline or replace propane tank.
	Oil is low.	Add add or change oil. See page 68 for changing oil.
	Spark arrestor dirty or clogged.	Clean the spark arrestor located in the muffler tailpipe.

TROUBLESHOOTING (CONTINUED)

Mode	Description	Solution
Generator runs, but there is no electrical output	Main circuit breaker is in the “OFF” position.	Flip the main circuit breaker in the “ON” position.
	GFCI is tripped.	Reset the GFCI receptacles by pushing the TEST button in the center of the GFCI receptacles, then press the RESET button.
	Button breakers are tripped.	Reset the button breakers by pushing them.
	Wiring connection loose.	Inspect connected wires and ensure the connections are properly secured.
	Cord connection loose or bad.	Check that the connected cords are fully connected and replace cords if faulty or damaged.
	Overload illuminated.	If the generator overload light is illuminated, reduce the AC load on the generator; then, turn the generator “OFF” and back “ON” again to reset.
Generator runs, but does not support all electrical devices connected	Generator overloaded.	If the generator overload light is illuminated, reduce the AC load on the generator.
	Device connected to generator is bad.	Disconnect malfunctioning device.
	The air cleaner is dirty.	Clean or replace the air filter element. See page 70 for further instructions on cleaning or changing the air filter.

For other issues not listed, please contact our technical support department at:

844-DuroMax (844-387-6629) or Support@DuroMaxPower.com

WARRANTY

5-year Warranty

All DuroMax Power Equipment warrant the original purchasers to a 5-year Parts Warranty (Residential Use ONLY: Unusually heavy or commercial use is covered for a period of 1-year) in the event of failure due to defects in electrical or mechanical components. Freight on any items submitted for replacement or repair under the Warranty is the responsibility of the equipment owner. This warranty is non-transferable and only valid to the original purchaser.

Warranty Exclusions

The DuroMax Power Equipment warranty does not cover repairs or returns when the fault is: Normal Wear and Tear, Installation Use or Maintenance Services, Cosmetic defects, Accessories, Failures due to acts of God or Natural Disasters, or problems related to/from aftermarket or non-OEM parts.

Warranty Limitations

DuroMax Power Equipment does not claim or hold any obligation to loss of time, freight charges, use of the product, or any incidental damages from the use of this product. THIS WARRANTY IS IN LIEU OF ALL OTHER WARRANTIES, EXPRESSED OR IMPLIED.

YOUR WARRANTY RIGHTS AND OBLIGATIONS

The United States Environmental Protection Agency and DuroMax Power Equipment, are pleased to explain the emission control system warranty on your 2026/2027 model year small off-road engine/equipment. In the United States, new small off-road engine/equipments must be designed, built and equipped to meet stringent anti smog standards. DuroMax must warrant the emission control system on your small off-road engine/equipment for the periods of time listed below provided there has been no abuse, neglect or improper maintenance of your small off-road engine/equipment.

Where a warrantable condition exists, DuroMax will repair your small off-road engine/equipment at no cost to you including diagnosis, parts and labor.

MANUFACTURER'S WARRANTY COVERAGE:

This emissions control system is warranted for two years. If any emission-related part on your small off-road engine/equipment is defective, the part will be repaired or replaced by DuroMax.

OWNER'S WARRANTY RESPONSIBILITIES:

As the small off-road engine/equipment owner, you are responsible for the performance of the required maintenance listed in your owner's manual. DuroMax recommends that you retain all receipts covering maintenance on your small off-road engine/equipment, but DuroMax cannot deny warranty solely for the lack of receipts or for your failure to ensure the performance of all scheduled maintenance.

As the small off-road engine/equipment owner, you should however be aware that DuroMax may deny you warranty coverage if your small off-road engine/equipment or a part has failed due to abuse, neglect, improper maintenance or unapproved modifications.

If you have any questions regarding your warranty rights and responsibilities, you should contact DuroMax at 844-387-6629 or support@duromaxpower.com.

DEFECTS WARRANTY REQUIREMENTS:

(a) The warranty period begins on the date the engine/equipment is delivered to an ultimate purchaser.

(b) General Emissions Warranty Coverage. DuroMax warrants to the ultimate purchaser and each subsequent owner that the engine/equipment is:
(1) Designed, built, and equipped so as to conform with all applicable regulations adopted by the Environmental Protection Agency.

WARRANTY (CONTINUED)

(2) Free from defects in materials and workmanship that causes the failure of a warranted part for a period of two years.

(c) Warranty Parts for Exhaust Emission.
(1) Fuel System
(2) Air Induction System
(3) Ignition System

The following parts are also considered emission related components for exhaust emissions, if applicable
(1)Exhaust Gas Recirculation (EGR) System
(2) After treatment devices.
(3) Crankcase ventilation valves.
(4) Sensors.
(5) Electronic control units.

(d) Warranty Parts for Evaporative Emission include fuel tank, fuel cap, fuel line and fittings, carbon canister, vapor hoses. They may also include, if applicable, liquid/vapor separator, clamps, pressure relief valves, etc.

DuroMax will furnish with each new engine/equipment written instructions for the maintenance and use of the engine/equipment by the owner.

CUSTOMER SERVICE DEPARTMENT

DuroMax Power Equipment is committed to ensuring that our products perform when they need to. Our generators are your lifeline in the event of an emergency. Should you have any problems, please contact our customer service department:

DUROMAX POWER EQUIPMENT
5800 Ontario Mills Parkway
Ontario, CA 91764

Customer Service: 844-DuroMax
Customer Service Hours: 8-5 pm PST Mon-Fri

Website: DuroMaxPower.com
Email: customerservice@DuroMaxPower.com



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