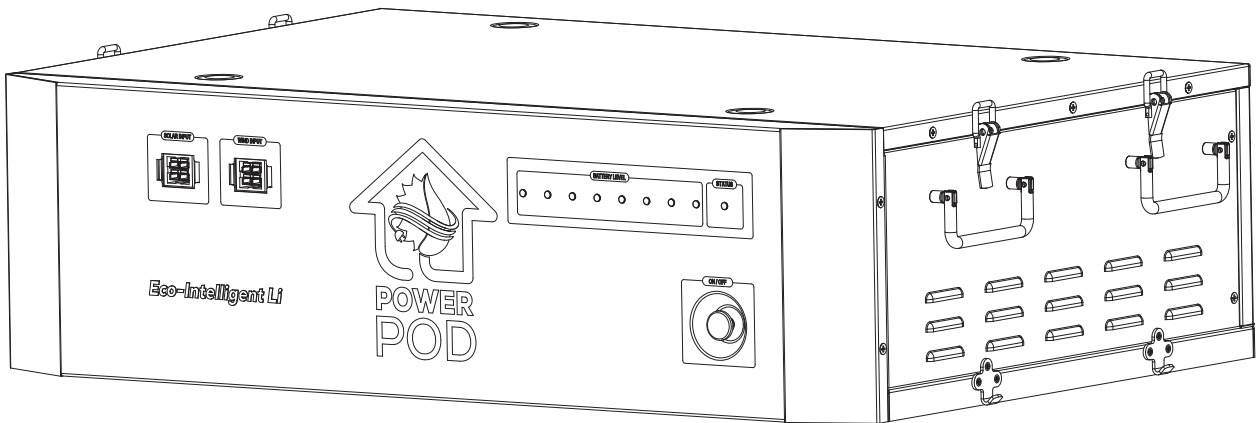


Nature's Generator Powerhouse Lithium Power Pod

User Manual



Nature's Generator Powerhouse Lithium Power Pod

Contents

Important Safety Instructions	1
- Warning	1
- Caution	2
Introduction	3
- Unpack Your Nature's Generator Powerhouse Lithium Power Pod	3
- Get to Know Your Nature's Generator Powerhouse Lithium Power Pod	4
Using Your Nature's Generator Powerhouse Lithium Power Pod	6
- How to Place Your Nature's Generator Powerhouse Lithium Power Pod	6
- How to Use Your Nature's Generator Powerhouse Lithium Power Pod	10
- How to Recharge Your Nature's Generator Powerhouse Lithium Power Pod	10
- How to Maintain and Store Your Nature's Generator Powerhouse Lithium Power Pod ..	13
Troubleshooting	14
Technical Specifications	15
Limited Warranty	16

Important Safety Instructions

1. Read these instructions.
2. Keep this user manual in a safe and accessible place.
3. Take note of all warnings.
4. Follow all instructions.
5. Do not use this equipment near water or expose it to the rain..
6. Do not block any ventilation openings.
7. Do not use near flammable gases or fumes or other apparatus that produce a large amount of heat.
8. Only use attachments/accessories approved by the manufacturer.
9. Only use with the wheels and handles approved by manufacturer, or sold with product. Use cautiously when moving with the wheels and handles to avoid tip-over injury.
10. Refer all servicing to qualified service personnel. Servicing is required when the equipment has been damaged in any way, such as power-supply cord or plug is damaged, liquid has been spilled or objects have fallen into the equipment, the equipment has been exposed to rain or moisture, has been dropped, or does not operate normally.
11. The equipment should not be exposed to dripping or splashing, and no objects filled with liquids, such as drinking glasses or vases, should be placed on the equipment.
12. If there is battery electrolyte leakage, avoid contact with your skin or eyes. Wash your body with clean water immediately and visit a doctor, if necessary, in the event your body touches electrolyte leakage.
13. Prevent this equipment from experiencing mechanical vibration, collision, punctures, and strong impact -- it may reduce the performance or cause fire hazard.

Warning

Electric Hazard

Do not burn or incinerate this item. This item may explode, causing property damage or personal injury. Do not use near flammable gases or fumes or other apparatus that produces large amounts of heat.

Energy and burn hazard

Nature's Generator Powerhouse Lithium Power Pod has lithium batteries, which can present a risk of burn or fire hazard from high current because of short-circuit.

Replacement parts

When replacement parts are required, make sure that the service technician uses replacement parts specified by the manufacturer that have the same characteristics as the original part. Unauthorized substitutions may result in fire, electric shock, personal injury, or other hazards.

No reverse polarity connection

Nature's Generator Powerhouse Lithium Power Pod has built-in reverse connection protection – however, if you forcibly press the On/Off button or activate the battery in another nonapproved manner it may damage the equipment or cause fire hazard.

No short circuit connection

Nature's Generator Powerhouse Lithium Power Pod has built-in short circuit protection – however, if you forcibly press On/Off button or reconnect the battery in another nonapproved manner, it may damage the equipment or cause fire hazard.

No series connection

Nature's Generator Powerhouse Lithium Power Pod can be connected in parallel only. Series connection will trigger Nature's Generator Powerhouse Lithium Power Pod into protection mode. Series connection outside of the protection range will damage the equipment or cause fire hazard.

Caution

Damage Requiring Service

Stop using the Nature's Generator Powerhouse Lithium Power Pod and refer servicing to qualified service personnel under the following conditions:

- If liquid has been spilled or objects have fallen into your Nature's Generator Powerhouse Lithium Power Pod.
- If your Nature's Generator Powerhouse Lithium Power Pod has been exposed to rain or water.
- If your Nature's Generator Powerhouse Lithium Power Pod has been dropped or damaged in any way.
- When your Nature's Generator Powerhouse Lithium Power Pod exhibits a distinct change in performance.

Cold Weather

Cold temperatures can impact Nature's Generator Powerhouse Lithium Power Pod performance. If you are in area that will be consistently below freezing, we recommend keeping your Nature's Generator Powerhouse Lithium Power Pod in an insulated location.

Recycling and Disposal

Your Nature's Generator Powerhouse Lithium Power Pod may contain materials that are regulated for environmental reasons.

Your Nature's Generator Powerhouse Lithium Power Pod also contains materials that can be recycled and reused. To help protect the environment, contact your local authorities for information about disposal or recycling and about finding a recycler in your area before you dispose of your Nature's Generator Powerhouse Lithium Power Pod.

Safety Check

After completing any service or repair to this device, ask the service technician to perform routine safety checks to determine that your Nature's Generator Powerhouse Lithium Power Pod is in correct operating condition.

Servicing

These servicing instructions are for use by qualified service personnel only. To reduce the risk of electric shock do not perform any servicing, other than that contained in the operating instructions, unless you are qualified to do so.

Gas Composition

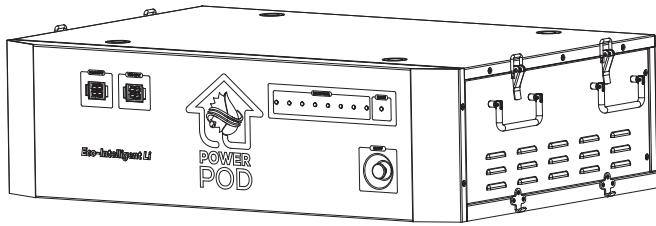
Nature's Generator Powerhouse Lithium Power Pod is an enclosed battery system and will not release any gases under normal operations. But if the equipment is severely misused, such as being burned, the equipment may result in electrolyte leakage and produce CO₂, CO, N₂ and etc.

Introduction

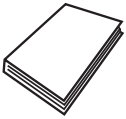
Congratulations on your new Nature's Generator Powerhouse Lithium Power Pod, a state-of-art Eco-intelligent Li battery expansion to your Nature's Generator Powerhouse. Nature's Generator Powerhouse Lithium Power Pod can work with Nature's Generator Powerhouse or Nature's Generator Powerhouse Power Pod or or another Nature's Generator Powerhouse Lithium Power Pod.

Unpacking Your Nature's Generator Powerhouse Lithium Power Pod

1. Nature's Generator Powerhouse Lithium Power Pod

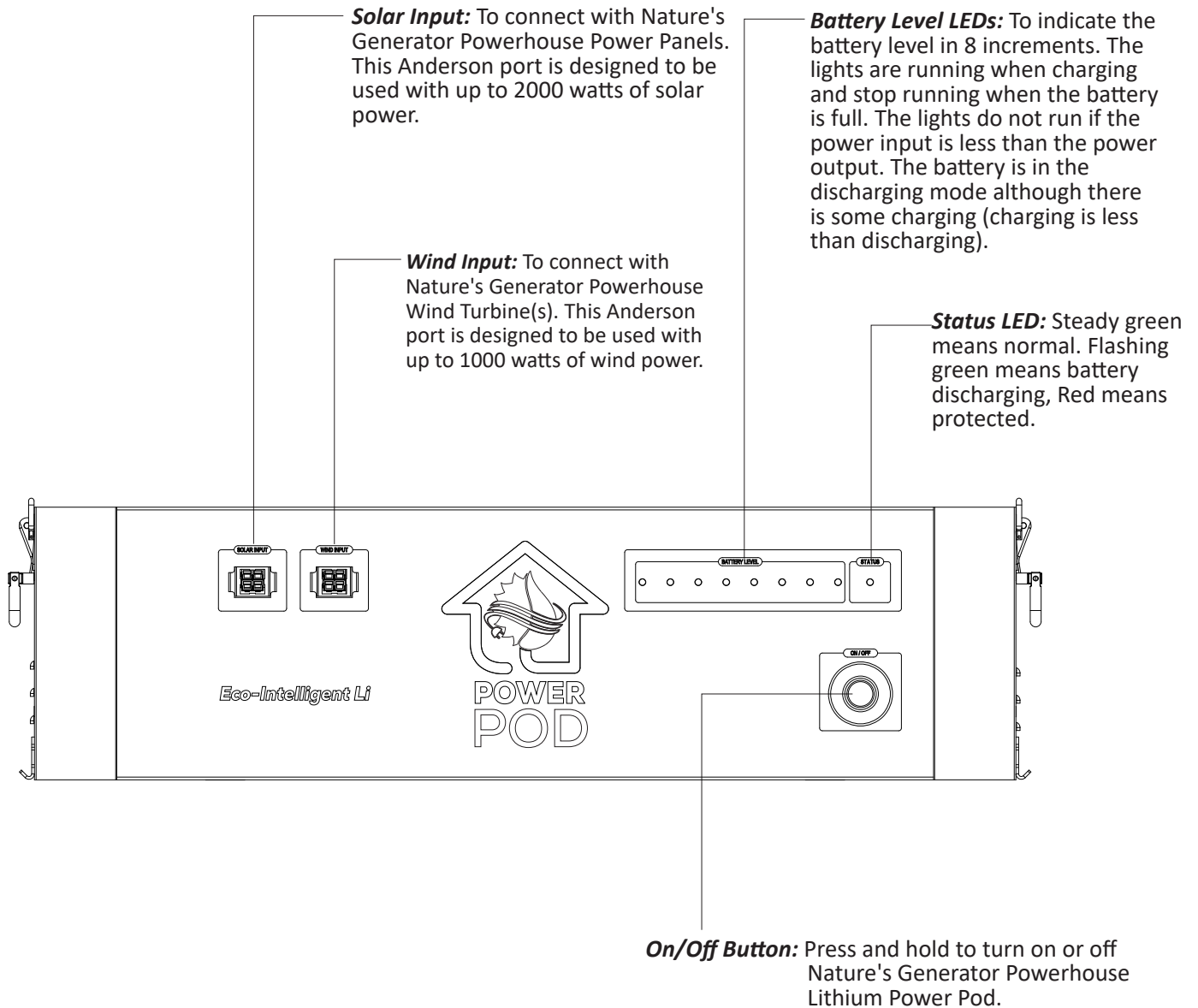


2. This User Guide

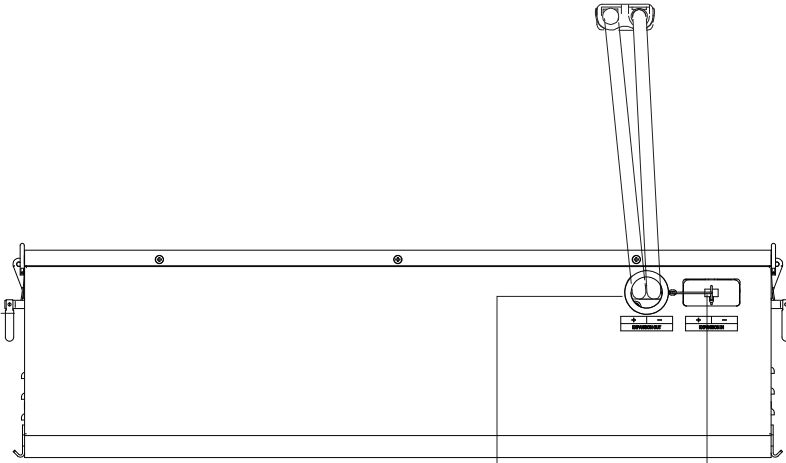


Get to Know Your Nature's Generator Powerhouse Lithium Power Pod

Front Panel



Back Panel



EXPANSION IN Port: This port allows Daisy Chain connections. Use this in port to connect another Nature's Generator Powerhouse Power Pod or Nature's Generator Powerhouse Lithium Power Pod.

EXPANSION OUT Cable: This cable allows Daisy Chain connections. Use this cable to connect Nature's Generator Powerhouse or Nature's Generator Powerhouse Power Pod or Nature's Generator Powerhouse Lithium Power Pod.

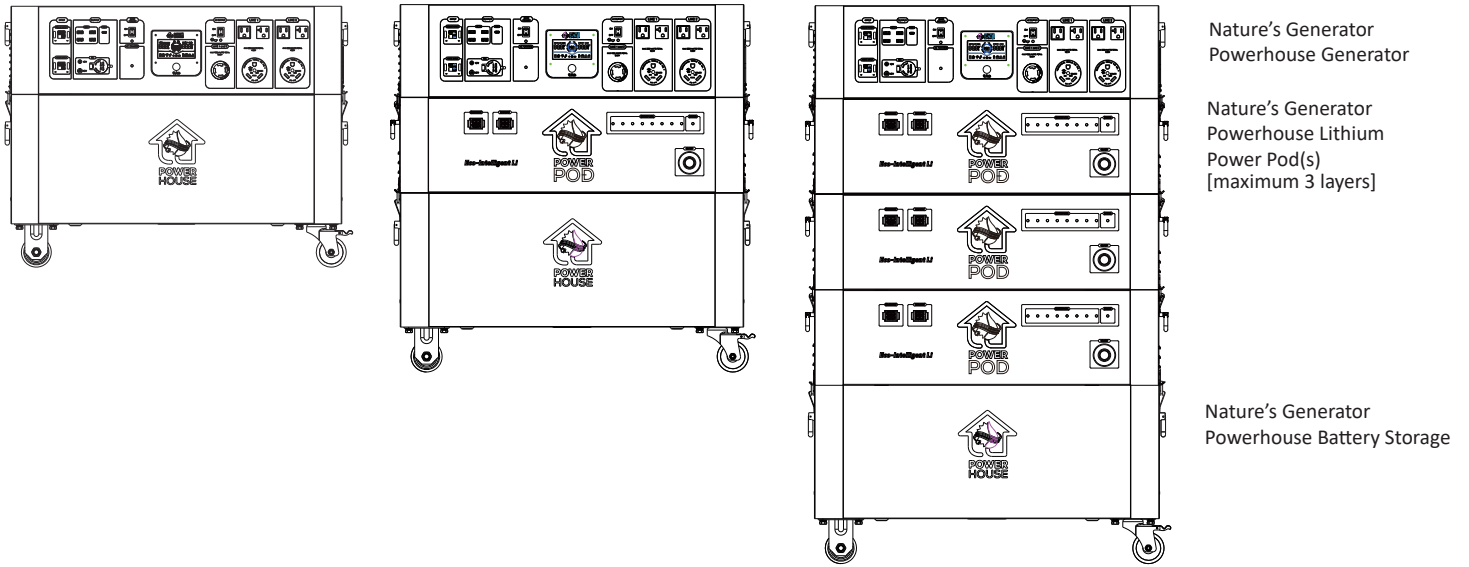
Note: Battery maximum instantaneous current is 120A.

Using Your Nature's Generator Powerhouse Lithium Power Pod

How to Place Your Nature's Generator Powerhouse Lithium Power Pod

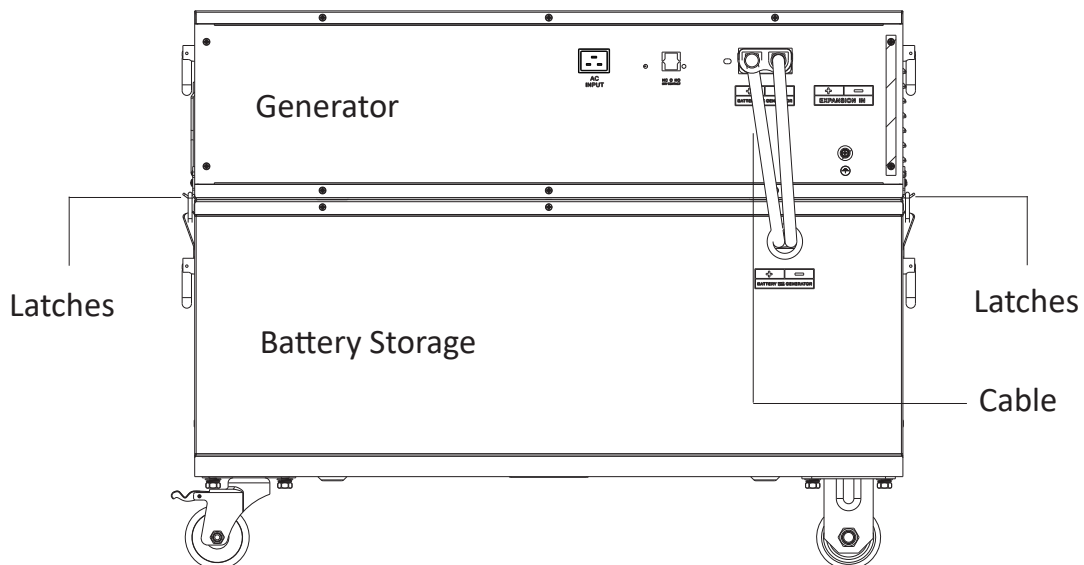
There are two options to place your Nature's Generator Powerhouse Lithium Power Pod with your Nature's Generator Powerhouse. If the ground is uneven or sloping, please add the shim(s) under the product to keep your system leveled.

Option 1: In between Nature's Generator Powerhouse Generator and Nature's Generator Battery Storage.

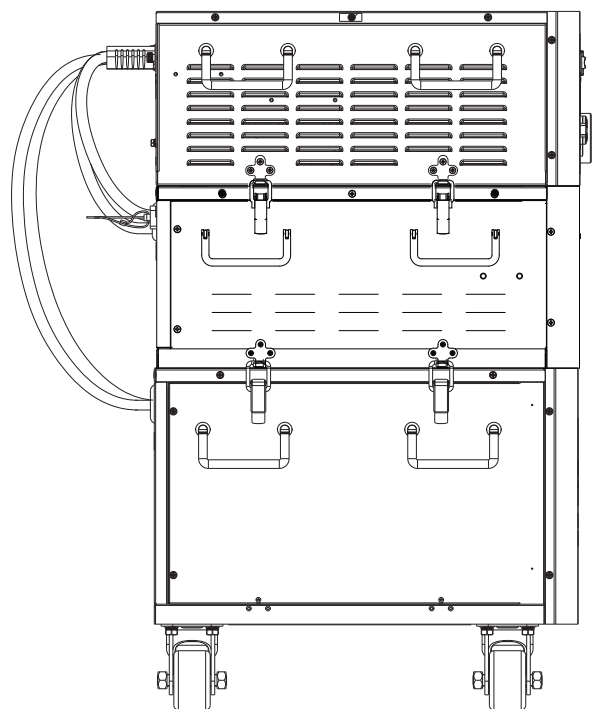
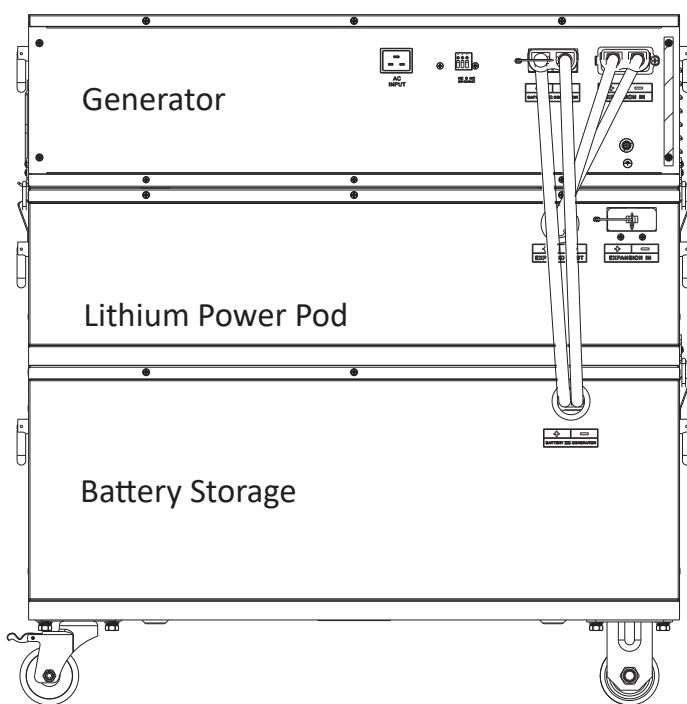


Steps:

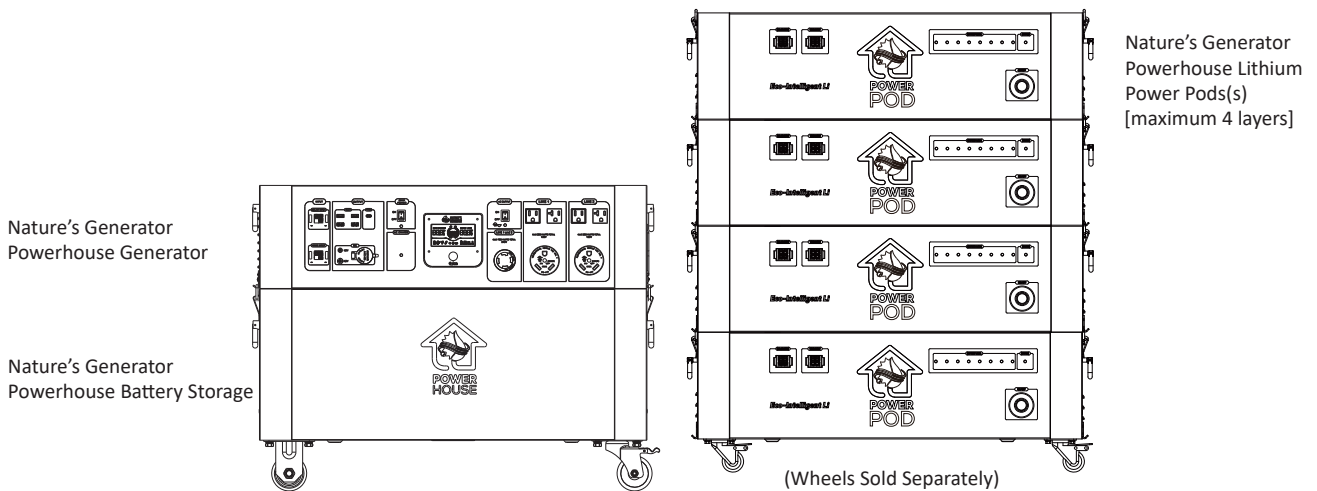
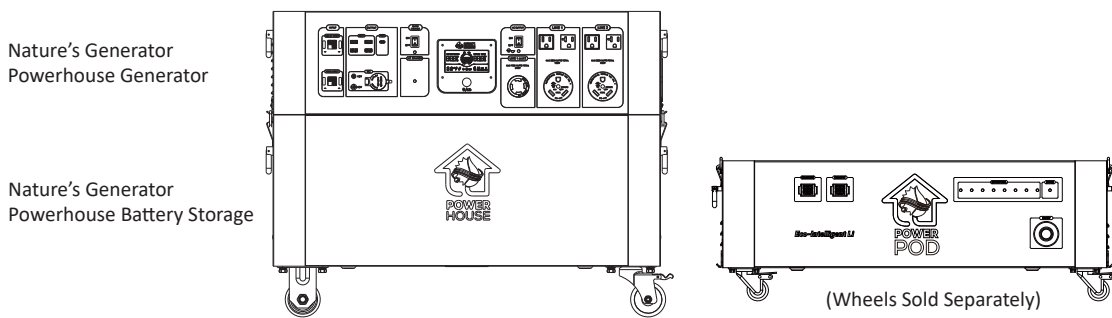
1. Unlock the latches on the sides of Nature's Generator Powerhouse and unplug the expansion cable of Nature's Generator Powerhouse Battery Storage.



2. Remove Nature's Generator Powerhouse Generator from the top of Nature's Generator Powerhouse Battery Storage.
3. Place Nature's Generator Powerhouse Lithium Power Pod(s) on the top of the Nature's Generator Powerhouse Battery Storage.
4. Place Nature's Generator Powerhouse Generator on the top of Nature's Generator Powerhouse Lithium Power Pod(s).
5. Lock the latches on both sides.
6. Connect the expansion cable from Nature's Generator Powerhouse Battery Storage to the Battery=Generator Port on the back of Nature's Generator Powerhouse Generator.
7. Connect the expansion cable from Nature's Generator Powerhouse Lithium Power Pod to the Expansion In Port on the back of Nature's Generator Powerhouse Generator. Check to ensure the Expansion (chain link) Icon is illuminated on the display of Nature's Generator Powerhouse to indicate Nature's Generator Powerhouse Lithium Power Pod is connected.



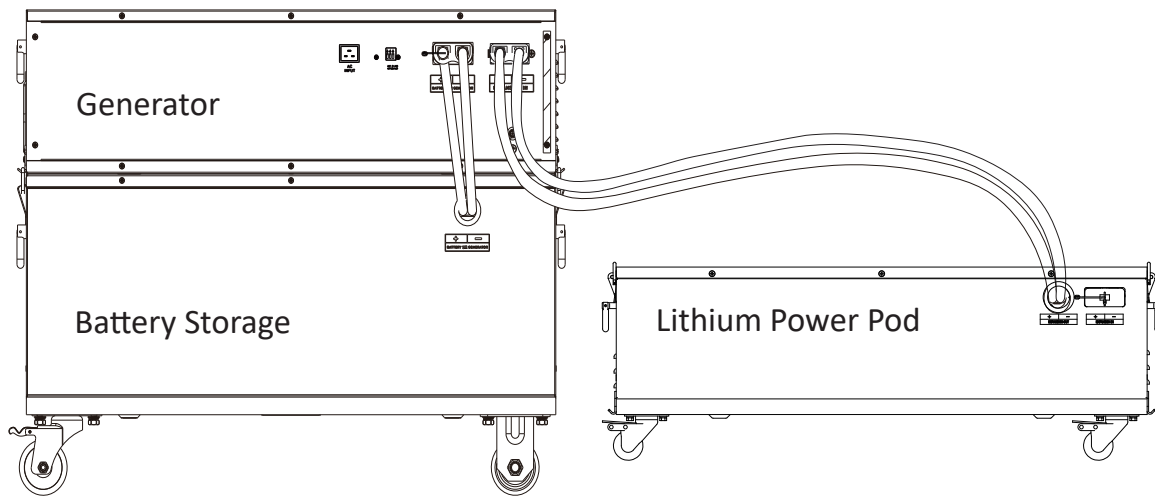
Option 2: On the side of Nature's Generator Powerhouse



Steps:

1. Place Nature's Generator Powerhouse Lithium Power Pod on one side of Nature's Generator Powerhouse.
2. You can purchase the wheels for Nature's Generator Powerhouse Lithium Power Pod separately and install the wheels on the bottom of Nature's Generator Powerhouse Lithium Power Pod for better mobility. Visit Naturesgenerator.com for more information about the wheels.

3. Connect the expansion cable from Nature's Generator Powerhouse Lithium Power Pod to the Expansion In Port on the back of Nature's Generator Powerhouse Generator. Check to ensure the Expansion (chain link) Icon is illuminated on the display of Nature's Generator Powerhouse to indicate Nature's Generator Powerhouse Lithium Power Pod is connected.



After you connect your Nature's Generator Powerhouse Lithium Power Pod to your Nature's Generator Powerhouse, you will experience an increased run time of approximately 200% by adding one Nature's Generator Powerhouse Lithium Power Pod, approximately 300% by adding two Nature's Generator Powerhouse Lithium Power Pods and 400% by adding three Nature's Generator Powerhouse Lithium Power Pods.

How to Use Your Nature's Generator Powerhouse Lithium Power Pod

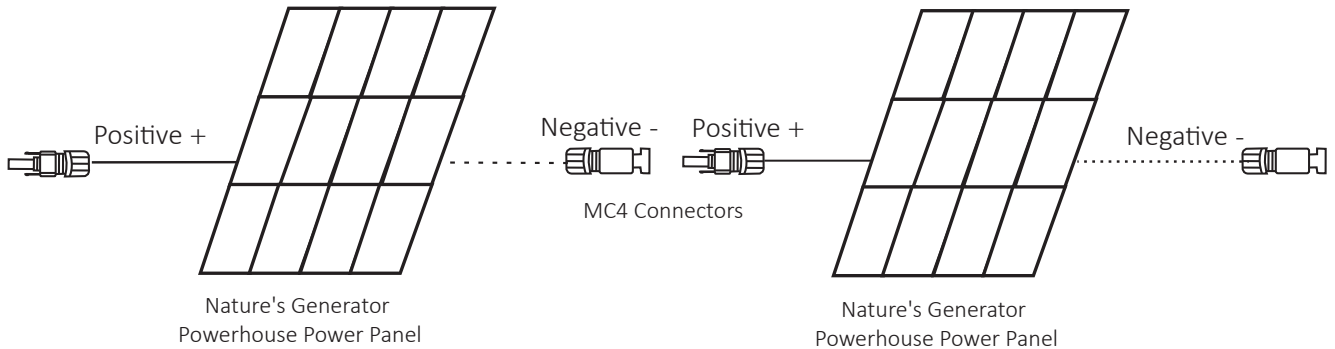
1. Press and hold the On/Off button to turn on the battery. The battery will run a self-check before it shows the battery level and status. It might take up to 15 seconds to turn on the battery.
2. Press and hold the On/Off button again to turn off the battery. The battery will run a self-check before it shuts down. The battery level LEDs will be turned off.

The battery will be turned off automatically after no power is drawn for 24 hours.

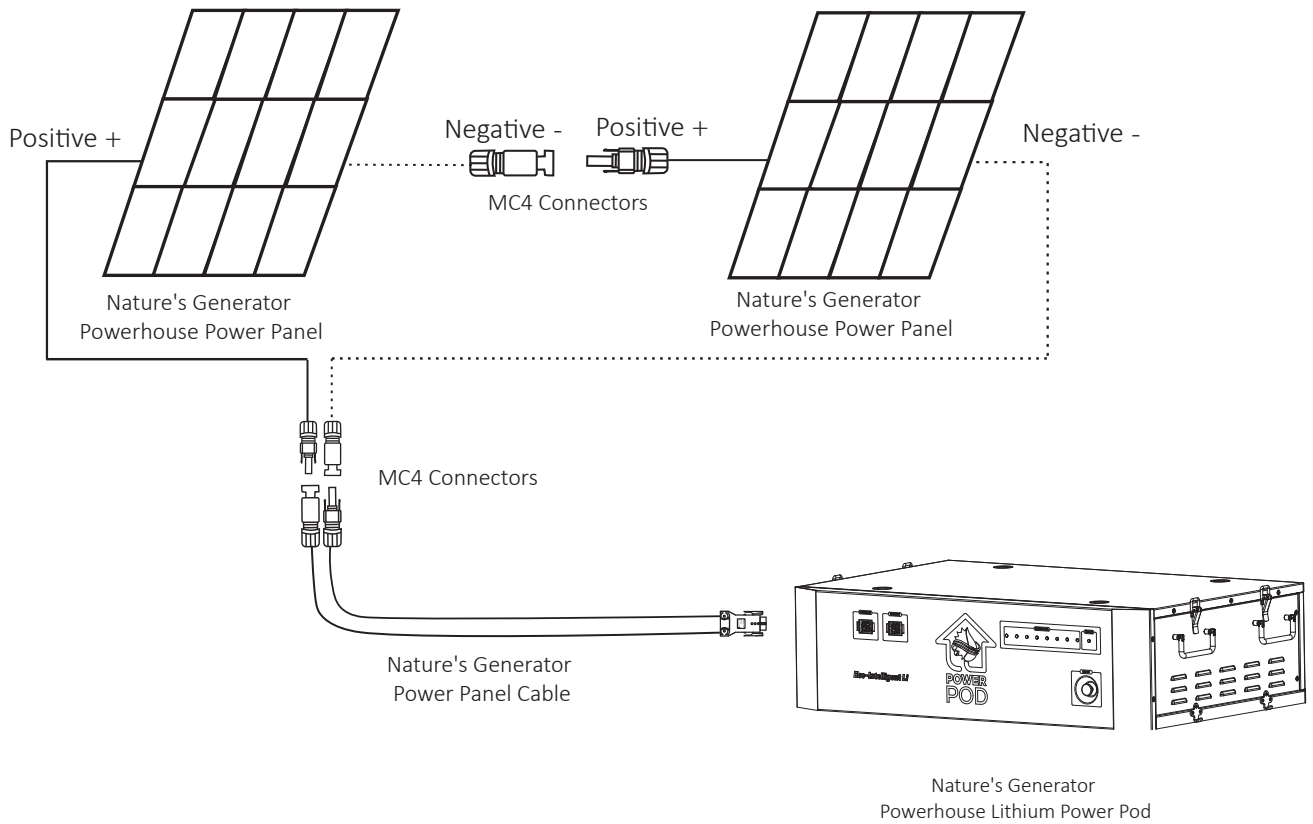
How to Recharge Your Nature's Generator Powerhouse Lithium Power Pod

Recharging from Nature's Generator Powerhouse Power Panels (sold separately):

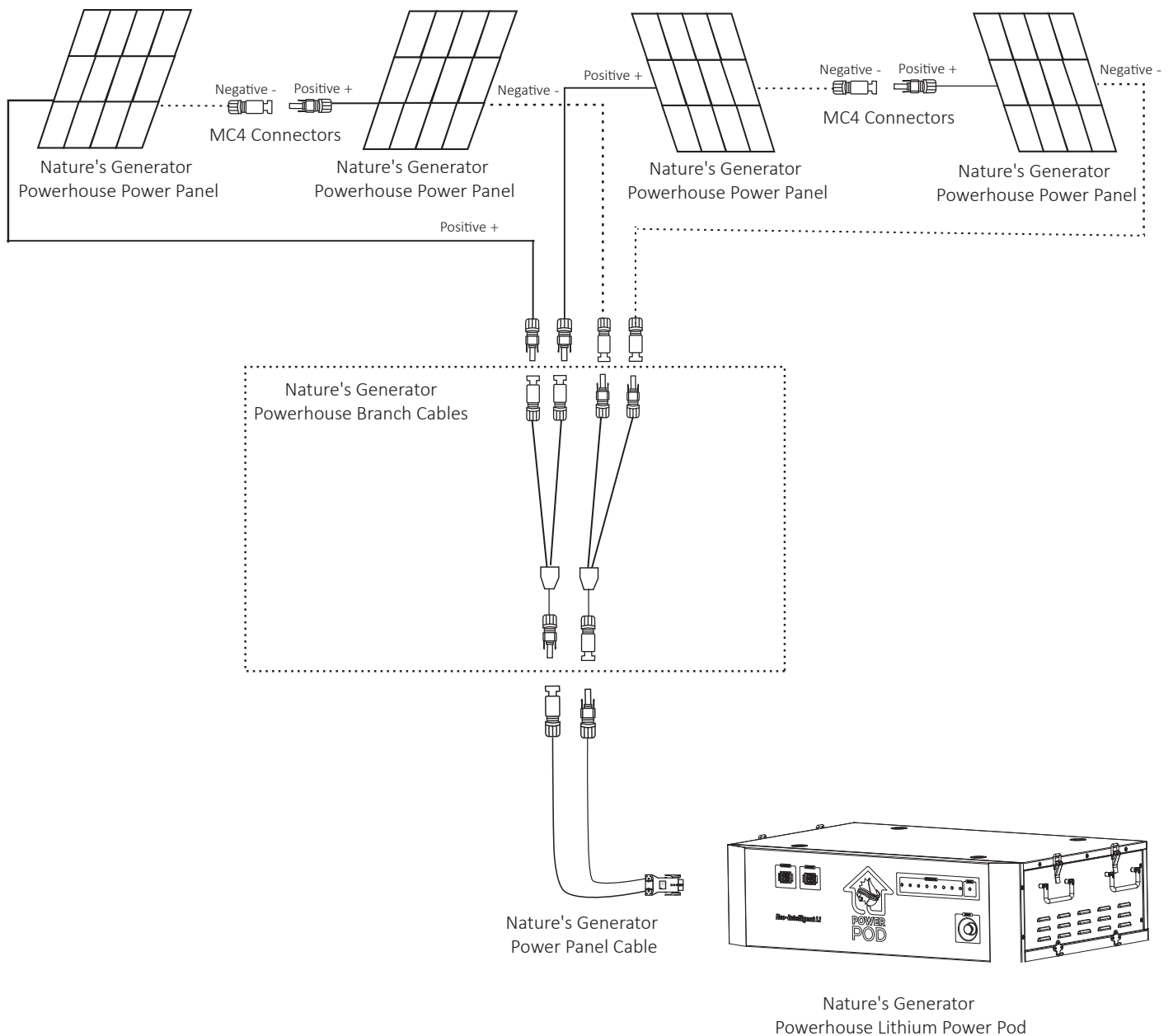
1. Place your Nature's Generator Powerhouse Power Panels where they will get as much direct sunlight as possible. While direct sunlight is always preferred, the power panels will also send a small amount of charge to your Powerhouse during hazy or overcast sky conditions.
2. Connect two Nature's Generator Powerhouse Power Panels in series.



3. Connect the MC4 connectors of your Power Panel Cable to the remaining MC4 connectors on the Nature's Generator Powerhouse Power Panels. A minimum of two serial connected Nature's Generator Powerhouse Power Panels are needed to recharge Nature's Generator Powerhouse Lithium Power Pod.



4. Insert Power Panel Cable plug into Solar Input port on the front of your Nature's Generator Powerhouse Lithium Power Pod. You will know it is recharging when the battery level LEDs are running, The LEDs do not run when the battery is full or there is not enough power input from Nature's Generator Powerhouse Power Panels to handle the power output. The battery is in the discharging mode although there is some charging (charging is less than discharging).
5. It usually takes about 8 to 15 hours to recharge the Nature's Generator Powerhouse Lithium Power Pod if using two Nature's Generator Powerhouse Power Panels. The recharging time, of course, also depends on the temperature and the strength of the sunlight.
6. To increase the recharging speed, you can connect the two serial connected Nature's Generator Powerhouse Power Panels in parallel connection. The Solar Input port can handle up to 2000 watts of solar power. Visit Naturesgenerator.com for more information about Nature's Generator Powerhouse Power Panels.



Recharging from the Nature's Generator Powerhouse Wind Turbine (sold separately):

1. Place your Nature's Generator Powerhouse Wind Turbine where it will get sufficient wind.
2. Follow the manual of Nature's Generator Powerhouse Wind Turbine to set up the wind turbine.
3. Insert the wind turbine cable connector into Wind Input port on the front of your Nature's Generator Powerhouse Lithium Power Pod. You will know it is recharging when the battery level LEDs are running, The LEDs do not run when the battery is full or there is not enough power input from Nature's Generator Powerhouse Wind Turbine to handle the power output. The battery is in the discharging mode although there is some charging (charging is less than discharging). The recharging speed depends on the strength of the wind.
4. To increase the recharging speed, connect another Nature's Generator Powerhouse Wind Turbine by the dual charger controller. The Wind Input port can handle up to 1000 watts of wind power. Visit Naturesgenerator.com for more information about Nature's Generator Powerhouse Wind Turbine.

Recharging from Nature's Generator Powerhouse

1. Connect Nature's Generator Powerhouse Lithium Power Pod to Nature's Generator Powerhouse by the expansion cable.
2. When Nature's Generator Powerhouse is being recharged by solar, wind or wall, Nature's Generator Powerhouse Lithium Power Pod will be recharged at the same time.

How to Maintain and Store Your Nature's Generator Powerhouse Lithium Power Pod

Recharge your Nature's Generator Powerhouse Lithium Power Pod once every six months and store it in a ventilated, cool and dry location. This keeps the battery healthy and prolongs its life. Failure to maintain Nature's Generator Powerhouse Lithium Power Pod by these steps can result in battery damage which will void the product warranty.

Clean your Nature's Generator Powerhouse Lithium Power Pod with a soft, lint-free cloth. If your Nature's Generator Powerhouse Lithium Power Pod is very dirty, moisten a soft, lint-free cloth in a weak detergent solution, squeeze the excess moisture from the cloth, then wipe Nature's Generator Powerhouse Lithium Power Pod with the cloth, followed by a clean dry cloth to wipe down you Nature's Generator Powerhouse Lithium Power Pod.

Troubleshooting

My Nature's Generator Powerhouse Lithium Power Pod won't charge when I connect my solar panel to it.

Please follow these steps.

1. If you are not using Nature's Generator Powerhouse Power Panels, make sure the solar panels have similar characteristics.
2. Make sure the solar panels are pointed directly toward the sun. It is preferred to position the solar panels facing south. The solar panels may produce little or no power if they are positioned in the shade.
3. Make sure two Nature's Generator Powerhouse Power Panels are connected in series. One Power Panel alone cannot charge Nature's Generator Powerhouse Lithium Power Pod.
4. Check the cable connection on your Nature's Generator Powerhouse Lithium Power Pod and make sure it is properly connected.
5. If battery level LEDs light up, but are not running, it means Nature's Generator Powerhouse Lithium Power Pod is being fully charged by the solar panels or that the solar panels do not have enough power input to handle the power output from Nature's Generator Powerhouse Lithium Power Pod.
6. Use the same setup to connect to the Solar Input port on Nature's Generator Powerhouse. If it does not work either, check the solar panel configuration again.
7. Only when the charging current is more than 0.5A and lasts longer than 3 seconds, Nature's Generator Powerhouse Lithium Power Pod can recognize the charging.

My Nature's Generator Powerhouse Lithium Power Pod won't charge when I connect my wind turbine to it.

Please follow these steps.

1. If you are not using Nature's Generator Powerhouse Wind Turbine, make sure the wind turbine has similar characteristics.
2. Make sure there is sufficient wind that spins the wind turbine fast enough. The wind turbine must spin fast enough to generate higher voltage than Nature's Generator Powerhouse Lithium Power Pod before the wind turbine can charge Nature's Generator Powerhouse Lithium Power Pod.
3. Check the cable connection on your Nature's Generator Powerhouse Lithium Power Pod and make sure it is properly connected.
4. Use the same setup to connect to the Wind Input port on Nature's Generator Powerhouse. If it does not work either, check the wind turbine connection again.
5. Only when the charging current is more than 0.5A and lasts longer than 3 seconds, Nature's Generator Powerhouse Lithium Power Pod can recognize the charging.

Technical Specifications

Battery:

Type: Eco-Intelligent Lithium Iron Phosphate (LiFePO4)
Capacity: 48V 100Ah (4800Wh)
Self-discharge: Recommend to recharge every 6 months

Ports:

Expansion Cable: 43 inch

Charges:

Solar Charger: 2000watt
Wind Charger: 1000watt
Battery Level LED lights: 8 LED lights

Protections:

Over Charge Protection
Over Current Protection
Over Discharging Protection
Short Circuit Protection
Auto Battery Balancing
Double Shield Protection
Reverse Polarity Protection
Temperature Protection

General:

Dimensions [W*D*H]: 28.3 x 18.3 x 8.0 inches (720*466*200mm)
Working Temperature (Charge): 32 ~ 113 °F (0~45 °C)
Working Temperature (Discharge): 14 ~ 113 °F (-10~45 °C)
Storage Temperature: 32 ~ 104 °F (0~40 °C)
Weight: 139 lbs (63 kg)

Limited Warranty

One Year Limited Warranty

Natures Generator Inc. warrants to you, the original purchaser of this new product, that the product shall be free of defects in the original manufacture of the material or workmanship for a period of one (1) year from the original date of your purchase of the product ("Warranty Period"). This product must be purchased from an authorized dealer and packaged with this warranty statement. This warranty does not cover refurbished product.

What does this Warranty Cover?

During the Warranty Period, if the original manufacture of the material or workmanship of the product is determined to be defective by an authorized dealer, Natures Generator Inc. will (at its sole option): (1) repair the product with new or rebuilt parts; or (2) replace the product at no charge with new or rebuilt comparable products or parts. Products and parts replaced under this warranty become the property of Nature's Generator and are not returned to you. If service of products or parts are required after the Warranty Period expires, you must pay all labor and parts charges. This warranty lasts as long as you own your product during the Warranty Period. Warranty coverage terminates if you sell or otherwise transfer the product.

How to Obtain Warranty Service?

Please call 1-800-975-7909 Monday through Friday, 9:00AM to 5:00PM PST. You will be provided with a Return Merchandise Authorization (RMA) number and return instructions. Send product to:

Nature's Generator Inc.
3233 Mission Oaks Blvd., Suite N
Camarillo, CA 93012

Please include the RMA number prominently displayed on the shipping box and include your name, phone number and address with the product inside the box.

Where is the Warranty Valid?

This warranty is valid only to the original purchaser of the product in North America (United States, Canada).

What does the Warranty not Cover?

This warranty does not cover:

- Cosmetic damage
- Damage due to force majeure, such as lightning strikes, fire, flood, etc..
- Accident
- Misuse
- Abuse
- Negligence
- Commercial use
- Modification of any part of the product
- Damage due to incorrect operation or maintenance
- Connection to an incorrect voltage supply
- Attempted repair by anyone other than a facility authorized by Natures Generator Inc. to service the product
- Products sold as is or with all faults
- Consumables, such as batteries
- Products where the factory applied serial number has been altered or removed

REPAIR REPLACEMENT AS PROVIDED UNDER THIS WARRANTY IS YOUR EXCLUSIVE REMEDY. NATURES GENERATOR INC. SHALL NOT BE LIABLE FOR ANY INCIDENTAL OR CONSEQUENTIAL DAMAGES FOR THE BREACH OF ANY EXPRESS OR IMPLIED WARRANTY ON THIS PRODUCT, INCLUDING, BUT NOT LIMITED TO LOST DATA, LOSS OF USE OF YOUR PRODUCT, LOST BUSINESS OR LOST PROFITS. NATURES GENERATOR INC. PRODUCTS MAKES NO OTHER EXPRESS WARRANTIES WITH RESPECT TO THE PRODUCT, ALL EXPRESS AND IMPLIED WARRANTIES FOR THE PRODUCT, INCLUDING, BUT NOT LIMITED TO, ANY IMPLIED WARRANTIES OF AND CONDITIONS OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE, ARE LIMITED IN DURATION TO THE WARRANTY PERIOD SET FORTH ABOVE AND NO WARRANTIES, WHETHER EXPRESS OR IMPLIED, WILL APPLY AFTER THE WARRANTY PERIOD. SOME STATES, PROVINCES AND JURISDICTIONS DO NOT ALLOW LIMITATIONS ON HOW LONG AN IMPLIED WARRANTY LASTS, SO THE ABOVE LIMITATION MAY NOT APPLY TO YOU. THIS WARRANTY GIVES YOU SPECIFIC LEGAL RIGHTS, AND YOU MAY ALSO HAVE OTHER RIGHTS, WHICH VARY FROM STATE TO STATE OR PROVINCE TO PROVINCE.

Contact Natures Generator Inc:

For customer service please call 1-800-975-7909

Natures Generator Inc.

3233 Mission Oaks Blvd., Suite N

Camarillo, CA 93012

