

duopower



Portable Power Station
2160Wh 2400W

Instruction

P2400 (DP-P2400A/B/C/D)
P2400 Pro(DP-P2400E/F/G/H)
P2400 Pro+(DP-P2400J/K/L/M)
P2400 Pro Max(DP-P2400N/P/Q/R)

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Introduction

Dear user, thank you for choosing DP's products. In order for you to further understand the product, please read this manual carefully before use. Wishing you a pleasant experience!

Safety instruction

Warning

- This product contains lithium batteries, and disassembly, violent impact, and squeezing are prohibited.
- It is strictly prohibited to put this product into fire or use it under high temperature or short circuit conditions.
- It is strictly prohibited to insert other objects or fingers into this product or use sharp objects to puncture this product, in order to avoid abnormal use or short circuits that may cause product damage, and in severe cases, may lead to explosion hazards.
- If this product accidentally falls into the water, it should be placed in a safe and open area and immediately moved away until it dries naturally. After drying, do not continue to use and dispose of properly according to the instructions in this manual.
- Due to the special nature of the product (built-in battery, capable of discharging high voltage, etc.), please keep the product out of reach of children and pets. Special populations should use it under the protection of a guardian.

Safety use

- Do not put heavy objects on the product.
- Please use this product in a dry and well ventilated environment. When using, please ensure that the heat dissipation holes of this product are unobstructed.
- It is strictly prohibited to keep this product close to heat sources or ignition sources, such as microwaves, pressure cookers, heating furnaces, etc. If the product catches fire, please use fire extinguishing equipment as soon as possible.
- Do not allow this product to come into contact with any liquids, and do not use this product in rain or other damp environments.
- After the product is subjected to strong impacts or falls, do not continue to use it and dispose of it properly according to the instructions in this manual.
- Do not use this product in environments with strong static electricity or strong magnetic fields.
- When not in use, please remove the power cord and all external devices of the product; When removing the power cord, hold the plug and unplug it, do not directly pull the power cord body.
- Do not use unofficially designated components or accessories. If you need to repair the product or replace accessories, please contact "Duopower" customer service.
- It is strictly prohibited to use damaged power cords to connect this product.
- Please use according to the working environment temperature specified in this product.

Transportation and storage

- Please store this product in a room temperature and dry environment.
- It is strictly prohibited to mix, store or transport this product with metal objects (glasses, watches, metal necklaces, hair clips, etc.).
- If you need to ship this product through logistics, please discharge the battery to 20%-30% first.
- This product cannot be carried on board, please comply with the relevant regulations of civil aviation transportation.

Maintenance

- If you do not use this product for a long time, please charge and discharge it at least every 3 months (discharge to 30% first, then charge to 60%) to ensure battery health.
- Before storing this product, please check the remaining battery level. If there is a low battery prompt, please charge it first. Otherwise, long-term low battery storage may cause damage to the product battery.
- Please store this product at the optimal storage environment temperature specified in this manual (20-25 °C).
- If there is dirt on the interface of this product, please use a dry cloth to clean it. Do not use chemical or spray type cleaners.

Abandoned

- Please follow the local laws and regulations on battery recycling and disposal when disposing of this product. It is strictly prohibited to dispose of it in ordinary trash cans.
- Please make sure to completely discharge the battery of this product before disposing of it in the designated battery recycling bin.
- If the battery cannot be fully discharged due to the malfunction of this product itself, a professional battery recycling company should be contacted for further treatment.

Important note

The following devices or scenarios require extremely high reliability and safety, please do not use the UPS function of the product.

- Medical equipment that directly affects life safety.
- Equipment that may cause personal injury (such as airplanes, ships, railways, elevators, etc.).
- Data storage devices:

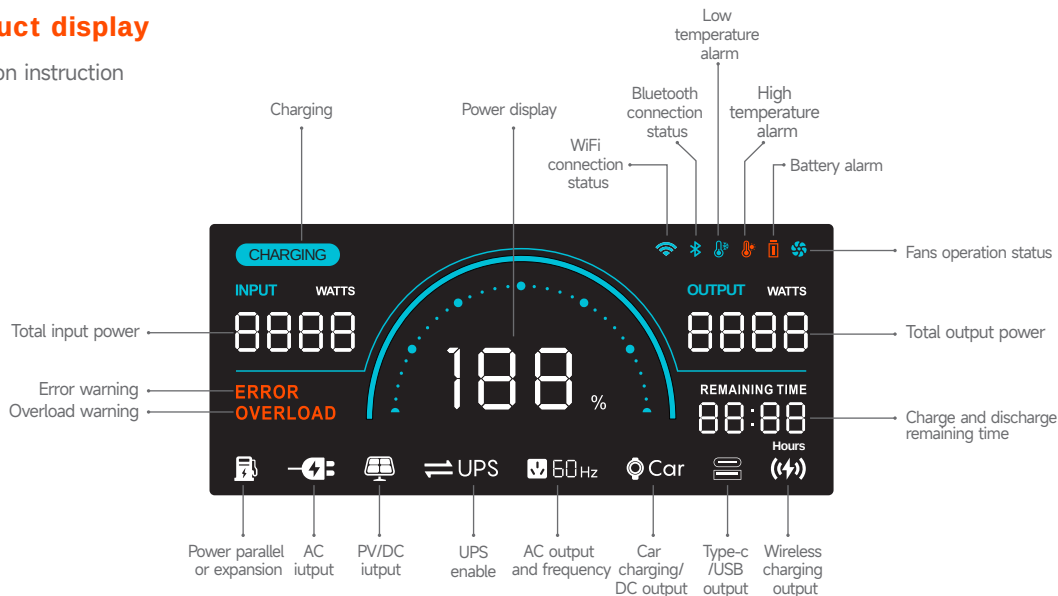
This product is not suitable for any high-risk activities, such as activities where equipment failure can directly lead to death, personal injury, significant property damage, or activities that affect the operation of medical or life support equipment. DP expressly denies any express or implied warranties regarding the suitability of high-risk activities, and any such use constitutes misuse of the product.

Disclaimers

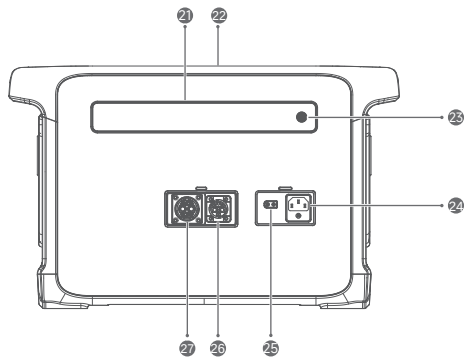
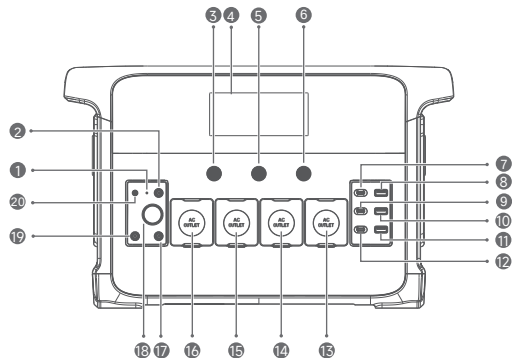
Before use, please carefully read this manual and use this product correctly according to all safety instructions in this article, especially the relevant precautions. Please be sure to follow them. Please keep it safe for future reference after reading. Within the scope permitted by law, our company shall not be responsible for product damage, personal injury, property damage, etc. caused directly or indirectly by improper use. Subject to compliance with laws and regulations, our company has the final right to interpret this manual and other related documents of this product. Any updates, revisions, or terminations are subject to no further notice, but you can view them online through the "Duopower" app or visit us at <http://www.duopowersolutions.com/> Download.

Product display

LCD icon instruction



Appearance and function instruction



- ① Motherboard reset
- ② DC5525 24V output
- ③ DC switch
- ④ LCD display
- ⑤ AC switch
- ⑥ USB switch
- ⑦ USB-C1 output
- ⑧ USB-A1 output
- ⑨ USB-C2 output
- ⑩ USB-A2 output
- ⑪ USB-A3 output
- ⑫ USB-C3 output
- ⑬ AC-4 output
- ⑭ AC-3 output
- ⑮ AC-2 output
- ⑯ AC-1 output
- ⑰ DC5521 12V output
- ⑱ Car charging 12V output

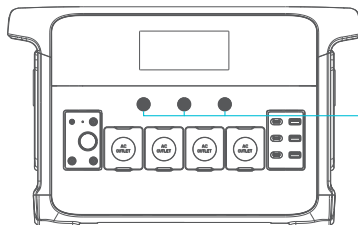
- ⑲ DC5521 12V output
- ⑳ IOT reset (IoT models only)
- ㉑ LED lighting
- ㉒ Wireless charging (yes ☒ no ☐)
- ㉓ LED lighting switch
- ㉔ AC electricity charging input
- ㉕ Solar(DC) charging input
- ㉖ Power combine port (P2400 ☒ P2400Pro ☒ P2400Pro+ ☒ P2400Pro Max ☒)
- ㉗ Power Pack Port (P2400 ☒ P2400Pro ☒ P2400Pro+ ☒ P2400Pro Max ☒)

Product parameter

Basic Parameter		
Product size	47.9x28.5x30.0(cm)	
Product weight	≈25kg	
Battery rated capacity	2160Wh, 45Ah/48V	
Input Parameter		
AC input	100-120V~ 50/60Hz 15A Max(Bypass+charging total current)	
Solar charging input	12-60V/25A 1200W Max	
Car charging input	12/24V 8.5A Max	
Output Parameter		
AC output(Bypass)(X4)	100-120V~ 50/60Hz 2400W Max(Sine Wave)	
USB-A1 output	5V/3A , 9V/2A , 12V/1.5A , 18W Max	
USB-C1 output	5V/3A , 9V/3A , 12V/3A , 15V/3A , 20V/5A, 28V/5A 140W Max	
USB-A2 output	5V/3A , 9V/3A , 12V/2A , 20V/1.4A 28W Max	two port output at the same time: 5V=3A
USB-C2 output	5V/3A , 9V/3A , 12V/2A , 15V/3A , 20V/5A 100W Max	
USB-A3 output	5V/3A , 9V/2A , 12V/1.5A , 18W Max	two port output at the same time: 5V=3A
USB-C3 output	5V/3A , 9V/3A , 12V/2.5A , 30W Max	
Cigarette lighte output	12V/10A 120W Max	
DC5521 output(X2)	Single port 12V/5A(Ciaarette lighter port + DC5521x2 output at the same time 120W Max)	
DC5525 output(X1)	24V/5A 120W Max	
Total power	2400W Max (AC+DC)	
Work Temperature		
Discharging temperature	-10°C-40°C	
Charging temperature	0°C-40°C	

Supply power or charging for devices

Power on/off



X1

Power on: any key,click to power on



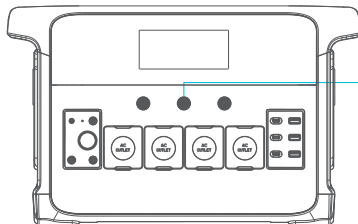
3S

Power off: Hold down any key for more than 3S to turn off the power

Notice:

When turned on, if there is no operation within one minute, the display screen will turn off. At this time, click any key again to wake up the display screen. If no input or output devices are connected within three minutes, the power will automatically shut down and enter sleep mode. After entering sleep mode, click any key in USB Power, DC Power, AC Power, or LED Power to wake up.

Use AC output



X1

In standby mode, click on turn on and then click on turn off again



3S

Press and hold the button for more than 3 seconds to turn off the power

Using car charging, DC5521 (12V) , DC5525 (24V) , wireless charging output



X1

In standby mode, click on turn on and then click on turn off again



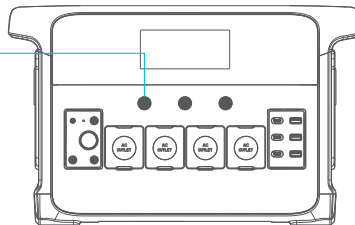
X2

In the power on state, double-click to enable DC micro current mode , turn it on after success, the indicator light on the DC Power button will flash State, click again to exit micro current.



3S

Press and hold the button for more than 3 seconds to turn off the power



Use USB and Type-c output



X1

In standby mode, click on turn on and then click on turn off again



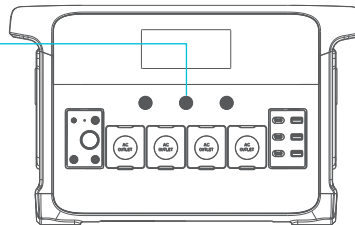
X2

In the power on state, double-click to enable USB micro current mode , turn it on after success, the indicator light on the USB Power button will flash State, click again to exit micro current.



3S

Press and hold the button for more than 3 seconds to turn off the power



Charging for P2400

Safety warning

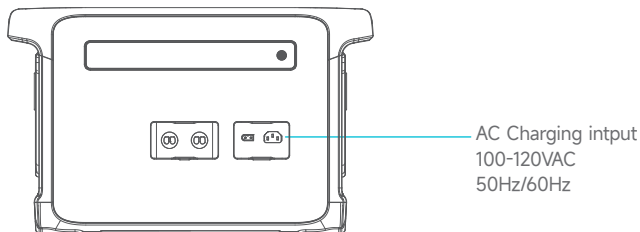
- Before charging, please confirm whether the output parameters of the charging device meet the charging input parameters of this product.
- Please use original or safety certified power cords that meet the charging specifications of this product.
- When charging, please ensure that the product is well ventilated and free of flammable materials.

Important notice

- Before first use, please fully charge this product.
- To ensure charging safety, if the input current exceeds the overcurrent protection value during charging, this product will automatically trigger the overcurrent protection function. The charging AC protection switch will pop up. After the overcurrent is eliminated, press the button again to resume charging.
- If the product indicates low battery, please charge it in a timely manner, otherwise it is easy to cause the product to be under voltage locked and unable to be used.

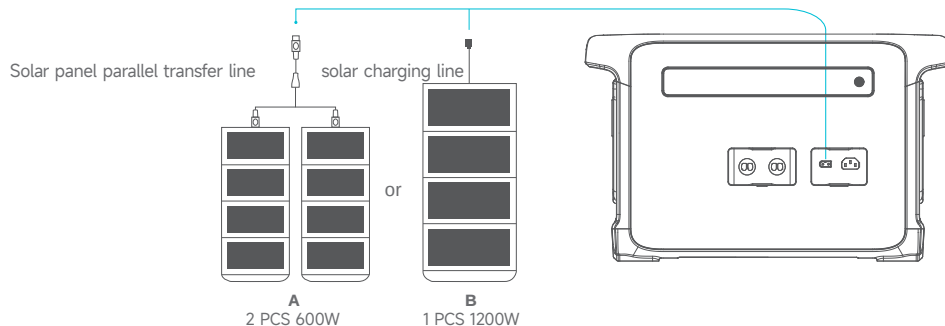
Use AC input

When this product uses mains charging, the flash charging function is enabled by default, supporting a maximum of 1600W charging



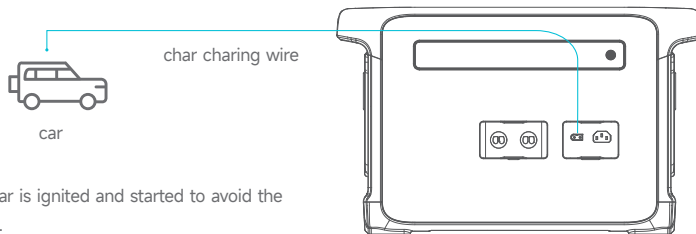
Use solar panel input

When using solar charging for this product, the charging voltage range is 12V-60V, the maximum current is 25A, and the maximum power is 1200W.



Use car charging input

When using the car cigarette lighter for charging, this product intelligently recognizes the status of the charger, with a maximum charging current of 8.5A.

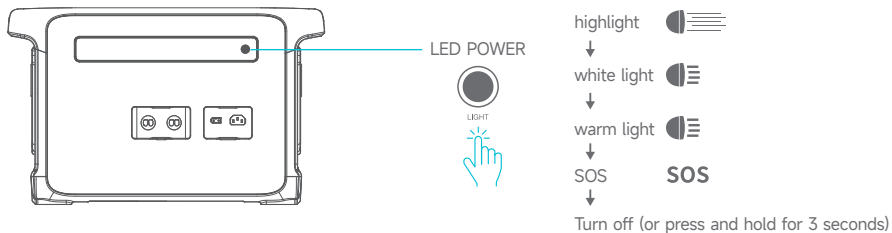


Notice

- Please connect the charging after the car is ignited and started to avoid the battery running low and unable to start.
- Please ensure that the car's cigarette lighter and onboard charging cable are connected properly.

LED instruction

In standby mode, you can switch between five states by pressing the button: "High light ->White light ->Warm light ->SOS ->Off".



Combine function instruction

Use Duopower's special cable to combine two unit of P2400Pro(P2400Pro Max),then power and capacity will be double.

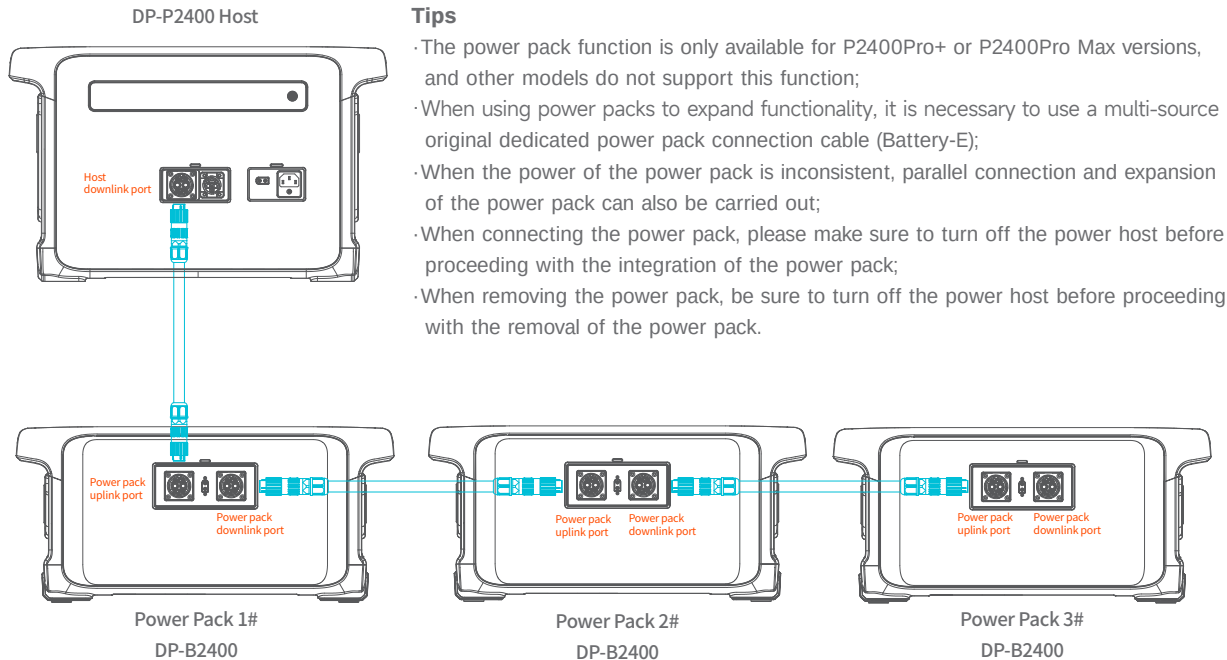


Nitice

- Power combine function only limited being used for P2400Pro(P2400Pro Max) version,and only between P2400Pro(P2400Pro Max) to connect. P2400(P2400Pro+) version cannot support this function.Only can use Duopower's special cable(Power-C).
- When AC charging,combine function will be stopped automotively,and power combine function will be stopped also.

Instructions for using the battery pack

By using a DP dedicated external battery parallel line, two P2400Pro+ or P2400Pro Max can be connected in parallel with the power pack to achieve capacity expansion requirements, with a maximum of 1 (host)+4 (power pack) (10800Wh Max).



Work mode instruction

Mode	Instruction	Setting
Standard mode	No button operation within 1 minute after startup, the display screen will turn off; If no device is connected within 3 minutes, the product will automatically shut down.	The default working mode of the product
USB micro current mode	After turning on the device, double-click the USB POWER button, and the USB and TYPE-C output ports will enter a long open state. At this time, low current devices such as Bluetooth earphones and smartwatches can be charged, and the indicator light on the USB POWER button will be flashing.	When turned on, double-click the USB POWER key to turn it on, then click the USB POWER key to exit this mode
DC micro current mode	After turning on, double-click the DC POWER button, and the DC and wireless charging output ports will enter a long open state. At this time, you can charge low current products such as Bluetooth earphones and smartwatches with wireless charging function; Or provide power to small current devices powered by DC 12V. At the same time, the indicator light on the DC POWER key will be flashing.	When turned on, double-click the DC POWER button to turn it on, and click the DC POWER button to exit this mode

Special function instruction

Remaining range

When the battery level is less than 5%, it will be automatically triggered. At this time, the AC output ports will be forcibly closed and cannot be discharged externally. The DC and USB (TYPE-C) output, and LED lighting (SOS) will not be affected.

When the battery level is less than 3%, it will be automatically triggered. At this time, the DC output ports will be forcibly closed and cannot be discharged externally. The USB (TYPE-C) output and LED lighting (SOS) will not be affected.

When the battery level is less than 1%, it will be automatically triggered. At this time, all output ports of AC, DC, and USB (TYPE-C) will be forcibly closed and cannot be discharged externally. LED lighting (SOS) will not be affected.

When the remaining power is $\geq 5\%$ after charging, the power will automatically exit the remaining battery life mode.

Notice:

- The purpose of this function is to retain excess charge when the power supply is discharged to low power, so that communication products such as mobile phones can be charged in emergency situations, while ensuring the normal use of LED lighting and SOS distress function.
- After using this function, the remaining charge of the power supply will be completely consumed. Please charge it in a timely manner, otherwise it is very easy to cause the power supply to be locked and unable to use due to deep discharge, and even damage the battery.

Intelligent charging

To ensure safe use, this product will automatically enable adaptive charging power during charging, and adjust the charging power in real-time based on the current battery level and temperature, with a maximum of 1600W.

Reset settings

When the product crashes or malfunctions, use a paper clip, phone card reader, or other small needle like object to push it into the small hole of the reset button, trigger the reset button, and reset the power supply. Note: This function is only necessary when the product experiences downtime or malfunctions, and should be used with caution under normal circumstances.

Normal problems

Question: What device can the AC output port of the product be connected to?

Answer: The rated power of the AC output port of this product is 2400W, which can supply power to the vast majority of civilian electrical products. However, before use, it is recommended that you confirm the power size of the equipment and ensure that the sum of the power of all load devices is less than the rated power.

Question: Can device charge and discharge at the same time?

Answer: Sure. When using this function, the power of the electrical equipment should not exceed the rated output power of this product.

Question: How do I know how long the product can be powered?

Answer: After the device is connected, the display screen will show the expected remaining usage time; This time is calculated based on the actual power of the connected device, the remaining power of this product, and other numerical values; If the actual power of the connected device is high and the remaining power is low, then the power supply time is short.

Question: Is there a sound of the fan rotating during product use?

Answer: This sound is mainly generated by the rotation of the internal cooling fan of the product, which is a normal phenomenon; To ensure the safety of product use, when the charging and discharging power is high, the internal cooling fan will be turned on to cool down the product.

Question: Why does the product run out of battery even if it is not used over time?

Answer: The product itself also has standby self consumption power consumption, and long-term non use can also deplete the battery. Therefore, we suggest that when the product is not used for a long time, it should be charged at least every 3 months to 50-60%.

Fault display and handling

LED fault icon display	fault instruction	solve method
OVERLOAD	AC output or total output overload alarm	After removing all external devices from the product, restart the product. If the fault prompt persists after restarting, please stop using this product immediately and contact after-sales service.
ERROR	USB output short circuit, overload errors alarm.	After removing all USB external devices from the product, restart the product. If the fault prompt persists after restarting, please stop using this product immediately and contact after-sales service.
	output short circuit, overload,reverse connection or reverse charging errors alarm	Check for any incorrect operation of reverse connection or reverse charging, and remove all DC external devices from the product before restarting. If the fault prompt persists after restarting, please stop using this product immediately and contact after-sales service.
	AC output overload,short cuicuit errors alarm	Check if there is any overload or short circuit abnormality in the AC output electrical equipment. Remove all AC external devices from the product and restart it. If the fault prompt still persists after restarting, please stop using this product immediately and contact after-sales service.
	DC input overload, overcurrent protection alarm	Check if the DC charging input voltage exceeds the allowable range of the product. After removing the DC charging input device, restart the product. If the fault prompt persists after restarting, please stop using this product immediately and contact after-sales service.
	low power of battery and error alarm	battery level of this product is less than 5%. If so, please charge it promptly; If not, please suspend the use of this product and contact after-sales service.
	low temperature alarm	Please pause the charging and discharging of this product and move it to the working environment temperature required in this manual for a period of time until the fault prompt disappears before using it again.
	High temperature alarm	Please pause the charging and discharging of this product and move it to the working environment temperature required in this manual for a period of time until the fault prompt disappears before using it again.

Notice: If there is an unresolved malfunction, please contact the after-sales service.

IMPORTANT SAFETY INSTRUCTIONS

INSTRUCTIONS PERTAINING TO RISK OF FIRE, ELECTRIC SHOCK, OR INJURY TO PERSONS.

1. WARNING – When using this product, basic precautions should always be followed, including the following:

- Read all the instructions before using the product.
 - To reduce the risk of injury, close supervision is necessary when the product is used near children.
 - Do not put fingers or hands into the product.
 - Use of an attachment not recommended or sold by power pack manufacturer may result in a risk of fire, electric shock, or injury to persons.
 - To reduce risk of damage to the electric plug and cord, pull the plug rather than the cord when disconnecting the power pack.
 - Do not use a battery pack or appliance that is damaged or modified. Damaged or modified batteries may exhibit unpredictable behavior resulting in fire, explosion or risk of injury.
 - Do not operate the power pack with a damaged cord or plug, or a damaged output cable.
 - Do not disassemble the power pack, take it to a qualified service person when service or repair is required. Incorrect reassembly may result in a risk of fire or electric shock.
 - To reduce the risk of electric shock, unplug the power pack from the outlet before attempting any instructed servicing.
- j) WARNING – RISK OF EXPLOSIVE GASES.

1) To reduce risk of battery explosion, follow these instructions and those published by battery manufacturer and manufacturer of any equipment you intend to use in vicinity of the battery. Review cautionary marking on these products and on engine.

k) PERSONAL PRECAUTIONS

- Have plenty of fresh water and soap nearby in case battery acid contacts skin, clothing, or eyes.
- Wear complete eye protection and clothing protection. Avoid touching eyes while working near battery.
- If battery acid contacts skin or clothing, wash immediately with soap and water. If acid enters eye, immediately flood eye with running cold water for at least 10 minutes and get medical attention immediately.



DuoPower warranty policy

Thank you for choosing DuoPower products. In the event of any non-human damage or performance failure during product use, you will enjoy DuoPower's "three guarantees" service commitment of "repair, return, and replacement" (referred to as "three guarantees")

To protect your rights, please keep the three guarantees certificate and the invoice issued properly after purchasing DuoPower products. The warranty period of the product will be calculated from the date you receive the product (hereinafter referred to as "receipt"), and the warranty period of the product is 2 years.

Three guarantees service content

- Within 7 days from the date of receipt, if the received goods are in good condition, the product's packaging and accessories are complete, and there is no human damage to the performance faults, the payment can be refunded in full at the invoice price, or replaced with products of the same model and specifications, or repaired for free.
- Within the 8th to 15th day from the date of receipt, if there is any performance failure of the product caused by human damage, it can be replaced with products of the same model and specification. Product replacement is the responsibility of the seller.
- Within the validity period of the three guarantees, if the product cannot be used normally after two product replacements, after confirmation by DuoPower testing, you can choose to repair or replace products of the same model and specification with the valid replacement record provided by the seller in the three guarantee certificate. Product replacement is the responsibility of the seller.

How to obtain the three guarantees service

In order to protect your legitimate rights and interests, you enjoy the Three Guarantees service at the DuoPower seller.

When you request the three guarantees service, you must provide:

- Original copies of purchased products;
- Original invoice or proof of purchase record from the seller when purchasing the product;
- Effective Three Guarantees Certificate.



Situations that do not fall within the scope of warranty services

- The product has exceeded the warranty period;
- Without proof of three guarantees and valid invoices, and unable to prove that the purchased product is within the validity period of the three guarantees;
- The warranty certificate does not match the product model identification or has been altered;
- Damage caused by failure to use, maintain, and upkeep in accordance with the requirements of the user manual, or the use of non original parts;
- Unauthorized maintenance, modification, misuse, collision, drop, squeezing, liquid ingress, corrosion;
- Tearing, altering, or making it impossible to recognize product labels, seals, and serial numbers (SN);
- Damage caused by force majeure such as floods, fires, earthquakes, lightning strikes, etc;
- Defects caused by normal wear and tear or aging of the product.

Paid service guarantee

If the product does not meet the warranty conditions and requires a fee, DuoPower will calculate the appropriate repair fee based on the cost of parts and labor, and provide you with a repair quotation. After obtaining your consent and paying the fee, we will provide repair services for your product.

This policy is formulated strictly in accordance with the Consumer Rights Protection Law and the Product Quality Law of the People's Republic of China.

Warranty Card

Product Name and Model		serial number	
User Name		Purchase date	
Contact phone number		Delivery date	
Contact address (including postal code)		Invoice number	
Seller Name			
Seller address (including postal code)			
Seller's phone number			

*The above information is to be filled out by the seller

- 4) NEVER smoke or allow a spark or flame in vicinity of battery or engine.
- 5) Be extra cautious to reduce risk of dropping a metal tool onto battery. It might spark or short-circuit battery or other electrical part that may cause explosion.

l) When charging the internal battery, work in a well ventilated area and do not restrict ventilation in any way.

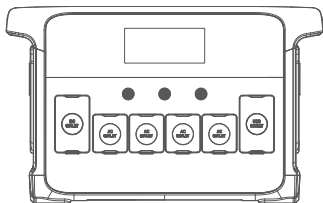
m) Under abusive conditions, liquid may be ejected from the battery; avoid contact. If contact accidentally occurs, flush with water. If liquid contacts eyes, additionally seek medical help. Liquid ejected from the battery may cause irritation or burns.

n) Do not expose a power pack to fire or excessive temperature. Exposure to fire or temperature above 130°C may cause explosion. The temperature of 130°C can be replaced by the temperature of 265°F.

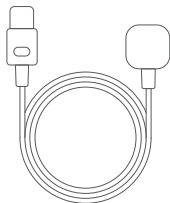
o) Have servicing performed by a qualified repair person using only identical replacement parts. This will ensure that the safety of the product is maintained.



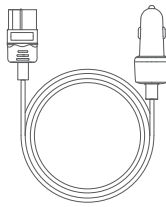
Package List



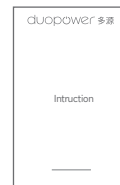
2400W
Portable Power Station ×1



AC
charger cable ×1



Car
charger cable ×1



Intruction x1
warranty ×1

FCC Caution:

This device complies with part 15 of the FCC Rules. Operation is subject to the following two conditions:

- (1) this device may not cause harmful interference,
- (2) this device must accept any interference received, including interference that may cause undesired operation.

Any changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate the equipment.

NOTE: This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation.

If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the receiving antenna.
- Increase the separation between the equipment and receiver.
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- Consult the dealer or an experienced radio/TV technician for help.

To maintain compliance with FCC's RF Exposure guidelines, This equipment should be installed and operated with minimum distance 20cm between the radiator and your body: Use only the supplied antenna.



New energy, New life, New future!

Ningbo DuoPower New Energy Electrical Technology CO.,LTD
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www.duopowersolutions.com

The data mentioned in this specification are from DuoPower laboratories.

Actual use may vary slightly due to environmental factors, methods, equipment specifications, etc. Please refer to actual use for accuracy.