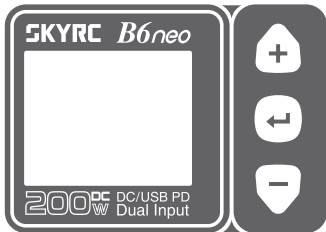


QUICK START GUIDE

B6neo

Smart Charger



Introduction

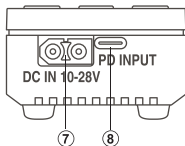
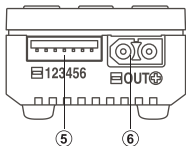
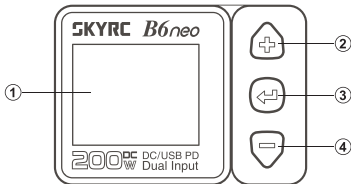
Thank you for your purchase of SkyRC B6neo smart balance charger.

B6neo supports most batteries in the RC industry despite its stylish, ultra-compact design. Within its tiny body, B6neo has a maximum output of 200W.

The meticulously designed interface and its powerful functions make it stands out from the crowd, leaving your choices out of the way.

- | | |
|---|--|
| ① LCD Display | ⑤ Balance port |
| ② scroll up, | ⑥ main port, DC output port, etc. |
| ③ confirm the choice, terminate the current program, enter into the setting, etc. | ⑦ DC Input, 10.0-28.0V/12A |
| ④ scroll down | ⑧ PD Input, must comply with PD3.0 specification |

Chart



Specifications

Item	Option	Specs
Input voltage	DC	10.0-28.0V
	PD3.0/QC	12.0-20.0V
Input current	DC	12A
	PD	5A
Max. output power	DC	200W
	PD	80W
Working mode	LiPo/LiFe/LiIon/LiHV	Balance CHG, Charge, Storage, Discharge
	NiMH/NiCd	Charge, Re-Peak, CYCLE_C_D, CYCLE_D_C, Discharge
	Pb	Normal, AGM Charge, Cold Charge, Discharge
	DC power supply	5.0-27.0V, 1.0-10.0A

Battery type/cells	LiPo/LiFe/Lilon/LiHV	1S-6S
	NIMH/NICd	1S-15S
	Pb	3S/6S
Charge current	LiPo/LiFe/Lilon/LiHV	0.2A-10.0A
	NiMH/NiCd	0.2A-10.0A
	Pb	0.2A-10.0A
Discharge current	Current	0.1A-2A
	Power	Max. 24W($\pm 10\%$) based on 6S(4.2V/cell)
Balance current	LiPo/LiFe/Lilon/LiHV	Max.500mA
Working Environment	Working Temperature	0°C/32°F ~ 40°C/104°F
	Working Humidity	5%~75%
Storage Environment	Storage Temperature	-10°C/14°F ~ 70°C/150°F
	Storage Humidity	5%~75%
Size	70x50x32mm	
Weight	82g	

Warning

B6neo is not intended for use by persons with reduced physical, sensory or mental capabilities, or lack of experience and knowledge, unless they have been given supervision or instruction concerning the use of the charger by a person responsible for their safety. Failure to exercise caution while using this product and comply with the following warnings could result in a product malfunction, electrical issues, excessive heat, FIRE, and ultimately injury and property damage.

-  Never leave charging batteries unattended during use.
-  Never charge batteries overnight.
-  Never attempt to charge dead, damaged, or wet battery packs.
-  Never attempt to charge a battery pack containing different types of batteries.
-  Never charge batteries in extremely hot or cold places or place in direct sunlight.
-  Never charge a battery if the cable has been pinched or shorted.
-  Never connect the charger if the power cord has been pinched or shorted.
-  Never attempt to dismantle the charger or use a damaged charger.
-  Never attach your charger to both a PD and a DC power source at the same time.

- ⚠ Always use the charger with the correct charging and discharging program.
- ⚠ Always use only rechargeable batteries designed for use with this type of charger.
- ⚠ Never use the charger on car seats, carpets, or similar surfaces.
- ⚠ Always operate the charger away from flammable and explosive materials.

Standard Battery Parameters

	LiPo	Lilon	LiFe	LiHV	MIMH	NiCd	Pb
Nominal voltage	3.7V/cell	3.6V/cell	3.3V/cell	3.8V/cell	1.2V/cell	1.2V/cell	2.0V/cell
Max. charge voltage	4.2V/cell	4.1V/cell	3.6V/cell	4.35V/cell	1.5V/cell	1.5V/cell	2.4V/cell
Storage voltage	3.8V/cell	3.7V/cell	3.3V/cell	3.85V/cell	N/A	N/A	N/A
Allowable fast charge current	≤1C	≤1C	≤4C	≤1C	1C-2C	1C-2C	≤0.4C
Min. discharge voltage	3.0-3.4V/ cell	2.9-3.3V/ cell	2.6-3.0V/ cell	3.1-3.5V/ cell	0.1-1.0V/ cell	0.1-1.0V/ cell	1.8V~2.0V/ cell

Select the correct operating procedure in accordance with the battery parameters. Incorrect settings may cause the battery to bum or even explode.



Operation

Quick start

You can power this device using chargers provided by consumer electronics such as smartphones, tablets, and laptops that comply with the USB Power Delivery 3.0 (PD3.0) specification. PD3.0 supports up to 100W of power transmission.

- **Connect the power supply, a warning notice pops up after B6neo starts up;**

DC input: 10.0-28.0V

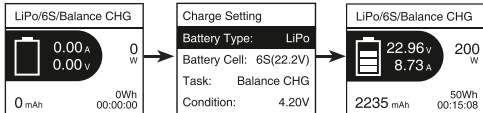
PD input: Comply with the USB Power Delivery 3.0

Following the warning interface, the PD input information will appear when the PD power is connected.

Press ENTER to enter the charging interface.

- **Press ENTER once to enter charging settings. Select the battery type, number of battery cells, and the program, and set the current and cut-off voltage.**

Start the program after setting up.



LiPo/LiFe/LiIon/LiHV

B6neo will be directed to the main interface after powering on. Press ENTER once to enter the charging settings.

- 1, Select the expected lithium battery type (LiPo/LiFe/LiIon/LiHV);
- 2, Select the number of battery cells from 1S to 6S correspondingly;

• Balance CHG/Charge

It is recommended to charge and discharge lithium batteries with balance charge mode.

- 3, Choose the Balance CHG or Charge mode; Balance CHG mode is highly recommended.
- 4, Adapt the cut-off voltage to the demand.
- 5, Adapt the charge or discharge current to the battery parameters.

Start the program after the setup completes.

• **Storage**

It is recommended to connect the balance port for storage.

3, Choose Storage mode.

4, Adapt the charging current and discharging current to the battery parameters.

Start the program after setting up.

• **Discharge**

It is recommended to connect the balance port for discharging.

3, Choose Discharge mode.

4, Adapt the cut-off voltage and discharging current to the battery parameters.

Start the program after setting up.

NiMH/NiCd

B6neo will be directed to the main interface after powering on. Press ENTER once to enter the charging settings.

1, Select NiMh or NiCd battery;

2, Select the number of battery cells from 1S to 15S correspondingly.

- **Charge**

- 3, Choose Charge mode.
- 4, Set the Delta voltage and charging current as per your requirements.

Start the program after setting up.

- **Re-Peak**

- 3, Choose Re-Peak mode.
- 4, Set the Delta voltage and charging current as per your requirements.
- 5, Set the resting time.

Start the program after setting up.

- **CYCLE_C_D & CYCLE_D_C**

- 3, Choose the CYCLE_C_D or CYCLE_D_C mode.
- 4, Set the Delta voltage, as well as the charging and discharging current.
- 5, Select the number of cycles.
- 6, Set the rest time appropriately.

Start the program after setting up.

- **Discharge**

- 3, Choose the Discharge mode.
- 4, Set the discharging current and voltage.

Start the program after setting up.

Pb

B6neo will be directed to the main interface after powering on. Press ENTER once to enter the charging settings.

- 1, Select Pb battery;
- 2, Select 3S or 6S battery;

- **Normal**

- 3, Choose the Normal charge mode.
- 4, Set the charging current.

Start the program after setting up.

- **AGM Charge & Cold Charge**

- 3, Choose AGM Charge or Code Charge mode.
- 4, Set the charging current.

Start the program after setting up.

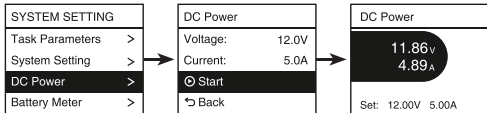
• Discharge

3, Set the discharging current and the cut-off voltage.

Start the program after setting up.

DC Output

- 1, Hold the ENTER button to access System Settings. Select DC Power and adjust the voltage and current accordingly.
- 2, After the setting completes, start to activate the function.
- 3, Connect the DC device after activating the power function



Voltage Measurement

B6neo can measure battery voltage and internal resistance without powering on. With the battery balance port connected to the charger balance port, the charger displays the single-cell battery voltage, total battery voltage, and total internal resistance.

Cell Voltage		V
①	4.195	④ 4.196
②	4.197	⑤ 4.198
③	4.206	⑥ 4.203
Σ: 25.19V		Δ: 26mV

Conformity Declaration

SkyRC B6neo satisfies all relevant and mandatory CE directives.

Liability Exclusion

This charger is designed and approved exclusively for use with the types of battery stated in this Instruction Manual. SkyRC accepts no liability of any kind If the charger Is used for any purpose other than that stated. We are unable to ensure that you follow the instructions supplied with the charger, and we have no control over the methods you employ for using, operating, and maintaining the device. For this reason, we are obliged to deny all liability for loss, damage, or costs that are incurred due to the incompetent or incorrect use and operation of our products, or which are connected with such operation In any way. Unless otherwise prescribed by law, our obligation to pay compensation, regardless of the legal argument employed, is limited to the invoice value of those SkyRC products which were Immediately and directly Involved In the event In which the damage occurred.

SKYRC

B6neo

Mini Smart Balance Charger



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FOR COMPLETE
INSTRUCTION MANUAL.

The manual is subject to change without notice;
please refer to our website for the latest version!

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