FEATURES

1 Light weight rechargeable LED headlamp.

2 TIR optics with flood beam.

3 DC plug sping cable design for two possiblity to use: Battery holder body rear to on head without bag , or move the body in bag.

4 Whole headlamp are strong and confortable.

5 Cool or neutral white LED version available.

6 IPX8 Water resistant, 2 Meters waterpoof.

7 Use 1 x CREE XHP50 LED, Light output of LED is 2300 lumens.

8 9 Selectable brightness levels from MIN to MAX and Emergency mode (Moonlight).

9 Smart components and especial auto designed provides multiple brightness settings , prevents over-heat (active temperature control), over discharge and wrong polarity of inserted battery protection.

10 Blinking 10 times to warning indication shows the battery level around 20% capacity.

11 Rubber sleeve holder and comfortable headband for reliable fixation.

12 Aircraft grade hard anodized aluminum alloy for lamp & battery holder.

13 Multi-Power source "5 in 1" is for different runtime activities : 1 x 18650 holder / 2 x 18650 holder(BA2842) / FEREI power pack BP2836B, BP4836B and BP6836B.

GENERAL USAGE

1 The light runs 1 piece 18650 with PCB Li-Ion battery or other 3.7V to 4.2V power bank /batteries pack.

2 Please fully recharge the battery before use.

3 Brightness level lighting modes:
- ①Minimum
- ②Medium
- ③Maximum
- ④Emergency mode: 5lm (Moonlight).

4 Customized brightness settings: customized brightness setting from LOW to MAX: 25lm / 50lm / 85lm / 150lm / 250lm / 450lm / 850lm / 1500lm, 8 levels brightness available in all modes except Emergency.

5 Operation: to turn on the light , press button switch rapidly or continuously to active or convert between lighting modes ①②③ With headlamp already on, press and hold on/off button switch to cycle through the customized brightness settings from MIN to MAX. When a desired brightness appears, simply release the switch. To turn off the headlamp, just press the switch again after staying at this customized brightness for over 3 seconds; But if less than 2 seconds, press the switch will be to get conversion between lighting modes ①②③. At the light off, Longer time press the button switch (over 2 seconds), the emergency mode turn on. To turn off the light, just press the button switch again.

6 Brightness memory: In either any lighting mode, the brightness could be memorized if staying for over 3 seconds. Next time you turn on the light again, the brightness starts from the memorized lighting mode/

DIAGRAM

ADJUSTMENT BUCKLE

BATTERY BOX (1 X 18650)

NYLON ELASTIC BAND

SWITCH

HEAD

LED

5.5 DC PLUG

ADJUSTABLE DIRECTION

brightness. If staying less than 2 seconds at any level brightness or mode, press the switch to get conversion to next brightness level.

7 Low battery warning: When the battery capacity gets very low (approx. 20%), the HL65 will emit 10 successive blinks in 8 seconds. This is a reminder that the battery should be recharged or replaced.

8 Reverse polarity protection: When a battery is inserted incorrectly,a special protection circuit will activate and automatically prevent operation to ensure the safety of the HL65 and its user.

9 Over discharge prevention: the light will switch off automatically in order to prevent damages to lithium battery and/or light done by over discharging (complete depletion of battery capacity).

Note: over discharging lithium batteries might cause the battery body to swell up and produce harmful gases. In order to avoid this, our product is equipped with low voltage circuit break to switch off the light when voltage is too low.

INSTALL / REMOVE AND RECHARGE THE BATTERY

①

②

③

④

1 Unscrew the flat cap of battery holder.

2 Put the battery with the correct polarity inside of battery holder.

3 Tighten the flat cap on the screw of battery holder.

4 Connect the DC plug of AC or DC charger with the DC jack of battery.

INSTALL AND CONNECT THE BATTERY HOLDER

⑤

5 Put the 18650 battery holder in to the silicon sleeve, as shown in the image above.

⑥

6 Connect the DC plug with DC jack of battery holder, and then clockwise to tighten the fixed DC connector, as shown in the image above.

MOUNT AND REMOVE HEADBAND

⑦

⑧

7 Use the longer headband (about 670mm) pass through each side hole of two silicon holder (lamp head and battery holder).

8 The longer headband fix on the adjustment buckle.

⑨

⑩

9 Longer piece headband mount finished.

10 User the shorter headband (about 430mm) pass

through each top hole of two silicon holder (lamp head and battery holder).

11 And the both side of shorter headband fix on each adjustment buckle.
12 The whole headbands (longer and shorter) mount finished.

INTELLIGENT TEMPERATURE CONTROL INSTRUCTIONS

This product is designed with a temperature control circuit.
The LED is a heating device that is sensitive to temperatures, especially high levels of power and brightness. High temperatures will easily damage or shorten the life of the LED.
Ferei designs its products with an intelligent temperature-control circuit. It measures the temperature within the LED filament. As the structure of the lamp differs, the thermal conductivity of the entire lamp is not the same. In general, the constant surface temperature of the lamp is 50º C to 60º C.
When it exceeds its programmed temperature, it will automatically reduce its power to cool down, and the brightness decreases by small steps.
After cooling-down (provided that battery voltage is sufficient) the power with brightness increases again. The process of improving its brightness is relatively discrete and will not produce a flashing effect.
This stepping goes cyclically to maintain the user's safety and the light's functionality. In conditions of good air-cooling the lamp delivers light without stepping down even in high levels brightness mode.
There are no preset timers for stepping, but real-time active temperature measurements, so the actual runtime of the lamp base on active temperature control to faster or slower battery discharge, may be slightly longer or shorter runtime than the lamp of data provided.

WARM TIPS

In order to avoid accidents, please pay attention to the following tips:
• Never use damaged, discolored or leaking batteries.
• Never use batteries with a damaged sleeve or foil covering.
• Always use 18650 battery with safety certificates.
• If the light gets unusually hot when in use, turn it off and check battery appearance.
• Never store the battery into the battery holder.
• Recharging is finished when the LED indicator turns to green.
• The battery remains at a normal temperature during recharging. If it gets unusual hot, stop recharging and take the battery out.

PRODUCT SPECIFICATIONS									
MODEL NAME	HL65								
LED	CREE XHP50 (COOL WHITE)								
ANSI/FSC	MAX	CUSTOMIZED SETTING							EMERGENCY MODE
LIGHT PER	100%	1.67%	3.3%	5.67%	10%	16.7%	30%	56.7%	0.33%
OUTPUT (LM)	1500	25	50	85	150	250	450	850	5
RUNTIME (INDOOR STATIC TESTING AT 28º C AT MAX OUTPUT)	1.2	52	24	16.8	12	7.8	3.5	2	294 (7D)
RANGE (M)	OVER 104 METERS								
MAXIMUM INTENSITY	2704 CD								
LED	CREE XHP50 (NEUTRAL WHITE)								
ANSI/FSC	MAX	CUSTOMIZED SETTING							EMERGENCY MODE
LIGHT PER	100%	1.67%	3.3%	5.67%	10%	16.7%	30%	56.7%	0.33%
OUTPUT (LM)	1400	23.4	42	79.4	140	234	420	793	5
RUNTIME (INDOOR STATIC TESTING AT 28º C AT MAX OUTPUT)	1.2	52	24	16.8	12	7.8	3.5	2	294 (7D)
RANGE (M)	OVER 101 METERS								
MAXIMUM INTENSITY	2704 CD								
WATERPROOF GRADE	IPX8								
ANTI DROP	2M								
DIMENSION	30 MM (HEAD DIAMETER)								
BATTERY	1 x 18650 / 2 x 18650 or BP28/BP4836B/BP6836B BATTERY PACK								
WEIGHT	80 G (EXCLUDING BATTERY)								
NOTE: THE ABOVE PARAMETERS WERE TESTED BY USING 1 X 3400MAH HIGH POWER CAPACITY BATTERY.									

• Do not dissemble the charger kit by yourself if the battery couldn't be recharged.
• The battery can be used at any time once being recharged. If it is left unused for long periods, it should be recharged for 4 hours every three months. After being charged they should be slightly discharged for 10-20 minutes before storage.
• Be sure to always recharge the battery in a safe place and do not leave unattended while charging.

MAINTENANCE

• Wipe the glass lens with a soft cloth at regular intervals to ensure maximum light transmittance (avoid using corrosive detergents).
• Ensure the cable plug and inside of the battery box remain free of dirt and debris.
• Unplug the cable from the battery box when unused for extended periods.

WARNING

• It is a lighting tool, not a toy. Keep it away from children.
• Should not be aimed directly at the eyes of humans or animals.

• Do not place the light face / lens down when turned on.
• The surface of the flashlight may become hot during extended use.
• Do not dismantle or dissemble any structural parts of the light, especially the seal parts.
• Dry the light surface with soft cloth immediately after exposure to water or any corrosive substance.
• Always remove batteries during long periods of inactivity (more than 30 days).
• Ferei reserves the right of interpretation of this manual.

Patented product, counterfeiting not allowed.