# **USER MANUAL I CYCWAGEN**



Product Overview	01
In the Box	02
Installing Instructions	03
Charging Instructions	80
Riding Modes	09
Display and Buttons	10
For Your Safety	14
Battery Maintenance	14
Cleaning ·····	16
Storage	17
End-of-Life Disposal ·····	17
Parameters	18
Warranty ·····	19
Contact Us	. 19

# 1. Product Overview



# 2. In the Box









M8 Hex Wrench (8mm) x1 M6 Hex Wrench (6mm) x1 M5 Hex Wrench (5mm) x1 M4 Hex Wrench (4mm) x1



Combination Wrench (15mm x 15mm) x2

Double Open-End Wrench (8mm x 10mm) x1

# 3. Installing Instructions

### **Before Installation**

- Please read this manual thoroughly and follow its instructions.
- Do not install the battery or start the computer until the bike is fully installed.
- Make sure all parts are intact.
- If you have any questions or can't find the information you need in the manual, please contact us via email at support@cycrown.com

### 3.1 Install the center stand

• Take out the center stand from the package.



• Align the screw holes of the center stand to the enter stand mounting holes on the bike frame. Tighten the bolt with the hex wrench.







**Note:** Make sure the chain is between the center stand legs after installing the center stand, as shown in the picture.

### 3.2 Install the handlebar

• Insert the telescope stem into the handlepost.



• Fold up the handlepost and close the latch.



• Adjust the handlebar to make it vertical to the front wheel. Close the quick release clamp.





### 3.3 Assemble and install the front wheel

• Take out the front wheel from the package.



• Lower the front fork onto the front wheel. Install the safety washer, round washer, and nut on the axle in the order from the wheel hub to outward. Ensure the safety washers hook the dropouts before tightening the nuts on two sides.



• Check if the wheel is fully seated in the dropouts.

# 3.4 Install the front light and front fender

• Use a hex key to remove the bolt pre-mounted on the arch.



• Pass the bolt through the gasket, light bracket, and fender bracket. Then re-tighten the bolt to the arch with a hex key.





• Install the front fender stay on the front fork legs.





# 3.5 Install the pedals

• Identify the 'R' and "L' marks on the pedals.



• Tighten the pedals with hands at first. Turn the right pedal clockwise and the left pedal counterclockwise.









• Then tighten the pedals with the provided wrench.

# 3.6 Install the passenger footrests



• Remove the bolts from the frame.

• Refer to the picture below to distinguish the left and right footrests.



• Tighten the bolts with the supplied wrench.





### 3.7 Install the saddle

• Open the seatpost clamp below the saddle. Pull up or push down the saddle to adjust heights.



• Close the clamp to fasten the seatpost in place. Do not install the seat with the safety line higher than the clamp.



# 3.8 Battery & Key Positions

(Before riding, familiarize yourself with the battery lock switch and charging port.)



- When the key is in position 1, the battery is locked to the frame. The key can be removed. And you can ride the bike.
- When the key is in position 2, the battery is in unlocked status. You can remove the battery from the frame. To prevent accidents, do make sure the battery in lock status (key in position 1) before moving or riding the bike.

### 3.9 Remove the battery

(For your convenience, the battery is designed by CYCROWN to be removable.)



**Attention!** When removing or installing the batteries, be careful not to drop or damage the batteries.

To **remove the battery** under the down tube, turn the key clockwise to the unlock position (position 2). The battery is unlocked but will not fall off. You need to hold the battery with one hand and press the battery release switch to remove the battery from the frame.



When **installing the battery** under the down tube, insert the battery by aligning the battery terminals. After hearing a click, the battery is locked securely.



To **remove the battery** under the seat, flip up the seat first. Turn the key counterclockwise to the unlock position (position 2), and you can pull the battery out slowly.





When **installing the battery** under the seat, flip up the seat first, turn the key counterclockwise to the unlock position (position 2), insert the battery by aligning the battery terminals, and then turn the key clockwise to the position 1 to lock the battery.





# 4. Charging Instructions

# 4.1 Charging with batteries in the bike



• Open the rubber cover of the charging port (left side of the bike).



- Make sure to turn off the power of the bike.
- Insert the DC connector of the charger into the charging port on the bike.
- Insert the AC plug of the charger into the wall outlet. It will start charging with red LED indicator light on the charger. Once the battery is fully charged, the indicator light will turn green.
- After charging, unplug the charger from the power socket first, and then remove the DC output connector from the charging port on the bike.

# 4.2 Charging with batteries out of the bike

(Also, you can charge the battery after it is removed from the bike.)





- Make sure to turn off the power of the bike.
- •Turn the key to the unlocked position to remove the battey. (Refer to the battery removal instructions mentioned previously for detailed information).
- •Place the batteries on a flat and safe surface. Insert the DC connector of the charger into the charging port on the battery.
- •Insert the AC plug of the charger into the wall outlet. It will start charging with red LED indicator light on the charger. Once the battery is fully charged, the indicator light will turn green.
- •After charging, unplug the charger from the power socket first, and then remove the DC output connector from the charging port on the battery.

# 5. Riding Modes



Speed Modes	Full Throttle	Pedal Assist
0	×	×
1-5	<b>~</b>	<b>✓</b>
Display OFF	×	×

### Thumb throttle

Turn on the E-bike and the smart display and you can switch the speed from 1 to 5 by pressing the thumb throttle.

### **PAS**

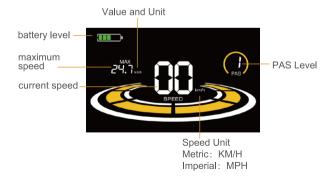
Turn on the E-bike and the smart display and you can pedal the E-bike with 1-5 PAS level by pressing the + or - button.

### **Pedal**

Turn off the E-bike and the smart display and you can pedal the E-bike like a normal bike

- Before riding, fully charge the battery and make sure the battery lock switch is in locked position.
- Press and hold the power button for 2 seconds to power on the electric bike.
- The top speed is 28 mph (45 km/h).
- Switch top speeds by pressing the + or buttons and the shifter levers.
- Stop: Release the throttle and squeeze the brake lever to slow the front and rear wheels.

# 6. Display and Buttons



# 6. Display and Buttons



Power Button



### **Buttons**

There are five buttons on the operation unit corresponding to the YL90T computer: Power on/off button, button, button, button, button, Switch button.

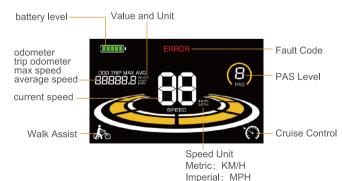
### Power/+/- Buttons

- Press to switch speed modes from 1 to 5
- Hold for about 2 seconds to power on/off the E-bike
- Press to switch speed modes from 5 to 1



- Front Ligh/Taillight/Turn Signals/Horn Buttons.
- Press up to turn on the front light and taillight. Press down to turn off the front light and taillight.
- Push left to turn on the left turn signal and push right to turn on the right turn signal. Push to the middle position to turn off turn signals.
- Press or hold to activate the horn.

# **Display Information**



# **Basic operations**

#### 1. Power on/off

After holding , the display and the controller connects to power supply and starts to work. In the power-on state, press and hold the power button to turn off the power of the bike. In the shutdown state, the display will not be powered by the battery, and the leakage current is less than 1uA.

 $\triangle$  If the e-bike is not used for over 10 minutes, the computer will automatically shut down.

#### 2. Select ODO/TRIP/MAX/AVG

After the display is turned on, the default display information is current speed (mph) and odometer (mile). Press to switch between odometer (mile), trip odometer (mile), top speed (mph), and average speed (mph).

#### 3. Walk mode (walk assist)

Press and hold — for walk mode. The e-bike will travel at a constant speed of 6km/h and there is a not the display. Press — again and the e-bike will stop power output and return to the state before walk mode.

riangle Only use the walk mode when you are walking the bike. Never use the walk mode in riding.

### 4. Turn on/off LCD backlight

Press to turn on/off the LCD backlight.

#### 5. Select PAS levels

Press or to adjust the PAS levels, thereby changing the output power of the motor.

### 6. Battery level

The battery levels are displayed in the form of 5 bars. When the battery level is full, there are 5 bars. When the battery is undervoltage, the outer border of the battery icon will flash, indicating that it needs to be charged immediately.

#### 7. Fault code

When the electronic control system fails, the computer will automatically display the error code. For the definition of the detailed error code, see Attached Table 1.

Mhen an error code appears on the display, please troubleshoot in time, the electric bike will not be able to work normally after a fault occurs.

# **Customize settings**

In the power-on state, when the speed is 0 on the display

- (1) Hold and for over 2 sec to enter the selection interface of parameter setting items;
- (2) Press or hold  $\blacksquare$  or  $\blacksquare$  to switch the setting items and then press  $\blacksquare$  to enter parameter selecting status;
- (3) Press or hold the **H** or **b** button to quickly select the parameters;
- (4) Press 👔 to save the setting and return to the selection interface of parameter setting items;
- (5) Press 1 to save the setting and quit the selection interface of parameter setting items;

# **Customizable parameters:**

### 1. Backlight brightness setting

01P stands for the backlight brightness setting item. Parameters 01, 02 and 03 are available (1 for the darkest, 2 for the standard brightness, and 3 for the brightest.)

Press to enter parameter selecting status. Press the to select between 01, 02, and 03. Press to save the setting and return to the selection interface of parameter setting items;

### 2. Select between the imperial and metric system

02P stands for the imperial and metric system setting item: 00 for metric and 01 for imperial.

Press it to enter parameter selecting status. Press button to select between 00 and 01. Press to save the setting and return to the selection interface of parameter setting items;

#### 3. Reset total travel distance

03P stands for total travel distance resetting. Select 01 to reset the total travel distance. Select 00 and no settings will be changed.

Press **i** to enter parameter selecting status. Press **f** or **c** to select between 00 and 01. Press **i** to save the setting and return to the selection interface of parameter setting items;

If 01 is selected, press to confirm, and ---- CLP will appear on the display for a period of time and it will automatically start resetting the total travel distance. After resetting, it will automatically exit and return to the selection interface of parameter setting items.

### 4. Controller cruise control setting

04P stands for the controller cruise control setting. Choose the following: 00 o disble and 01 o enable.

Press to enter parameter selecting status. Press to button to select between 00 and 01. Press to save the setting and return to the selection interface of parameter setting items;

# Other operations

### 1. Reset trip odometer

The computer can record trip distance and total travel distance. The trip odometer will not be automatically reset after the computer is turned off and you need to reset it manually. The odometer does not support resetting. The trip odometer resetting steps are as follows:

When the speed is 0 on the main interface, hold and for at least 2 seconds to reset the trip odometer. The main interface will flash once during the resetting process.

Attached Table 1: Fault code names and definitions

Fault codes of YL-01 and YL-02 protocols				
Name	Fault	Name	Fault	
E001	controller fault	E004	throttle fault	
E002	communication fault	E005	brake lever fault	
E003	Hall sensor fault	E006	motor phase loss fault	

### 7. For Your Safety

For safe riding, please read the following information carefully. Before riding, be sure to check that your brakes are working normally.

### **Before Your First Ride**

- Check whether the quick-release screws and seat are firm and whether the brakes are effective.
- Check the seat, gears, and tire pressure. Proper tire pressure can avoid flat tires and improve performance, including distance traveled per inflation.
- Check the handlebar and screws at least once a week.
- Performing the above routine checks before and after each ride can help you keep your bike at peak performance and spot potential problems before they become safety hazards.

# **Check by Bike Mechanics Every 6 Months**

• Bikes require regular maintenance. Take your bike to your local bike shop twice a year for tuning. Critical components should be inspected frequently and be repaired and adjusted by an experienced mechanic.

### **Notice**

- Wear an approved helmet and other protective equipment to reduce any possible injury.
- Helmets can reduce serious head injuries by 85%.
- Elbow pads can reduce elbow injuries by 82%.
- Knee pads can reduce knee injuries by 32%.

# ⚠ Warning

- To avoid accidental movement while waiting at a traffic light, set the speed mode to zero, or apply brakes.
- When riding, make sure your feet are always on the pedals and your hands on the handlebars. It is dangerous to take your feet off the pedals in riding.
- Never ride the electric bike for dangerous actions. Failure to exercise good judgment or heed the above warning increases the risk of serious injury and, in rare cases, death.
- Make sure the battery is fully charged, especially for long trips.
- For your own safety and the safety of others, obey the speed limit, ride at a speed you are comfortable with, and be prepared to stop at any time.
- Keep a safe distance from other riders to avoid collisions.
- Be aware of your surroundings and avoid obstacles and unsafe surfaces.
- Ride in the open and flat. Try to avoid slopes or places with many pedestrians.
- Do not ride at high speeds, on uneven terrains, in bad weather or in other unsafe conditions.
- Never use the electric bike for anything that could cause personal injury or property damage.
- Ride e-bikes only where permitted. You must obey local laws and be courteous to pedestrians.

# 8. Battery Maintenance

A well-maintained battery performs well even after high mileage. Charge the battery after each ride to prevent the battery from draining from a full charge. Batteries perform best when used at room temperature (70°F [22°C]). However, using it at temperatures below 32°F (0°C) will degrade performance. In general, at -4°F (-20°C), battery performance drops to half of that at 70°F (22°C). When the temperature rises, battery life will resume.

### Refer to local laws and regulations regarding battery recycling and/or disposal.

Under normal circumstances, a fully charged battery can hold power for 90 days in standby mode. Remember to charge the battery after each use. Draining the battery may cause permanent damage to the battery. Electronics inside the battery record the charge and discharge of the battery. Damages due to over-discharge or over-discharge are not covered by the warranty.

### **Notice**

- Do not perform any maintenance while the e-bike is powered on or charged.
- Store or charge the battery within the temperature range of 20°C-25°C / 68°F-77°F. Do not pierce the battery.
- Do not attempt to disassemble the battery to avoid fire.
- When the ambient temperature exceeds the maximum operating temperature (see instruction manual), do not ride the bike.
- Temperature will limit maximum power/torque. Otherwise, personal injury or property damage may occur.

# 9. Cleaning

Before cleaning, make sure the power is turned off and the charging cable is unplugged. Otherwise, you may damage the electronic components. Proper cleaning of your e-bike can guarantee a longer lifespan and a smoother ride.

- Wipe the outer body of the e-bike with a soft and dry microfiber cloth.
- Check around the wheel to make sure there are no foreign objects. The design of this electric bike makes wheel maintenance easy.
- The e-Bike has IPX4 water resistance, which means it can withstand splashes, However, don't submerge the e-Bike in water,

### Note

- ⚠ Do not use alcohol, gasoline, acetone, or other corrosive/volatile solvents to clean the bike. These substances can damage the exterior and the internal structure of the bike.
- ⚠ Do not allow water and liquids to enter the electric parts or the battery of the e-bike.

### 10. Storage

The bike should be fully charged before storage to prevent the battery from being over-discharged after long-term storage. If the electric bike is to be stored for more than a month, discharge and charge the battery at least once a month.

### **Notice**

- Do not store the electric bike outdoors for extended periods of time. Exposure to sunlight and extreme temperatures (both hot and cold) accelerates the aging process of plastic parts and can reduce battery life.
- Store in a cool dry place.
- Do not store it in dusty environments as damage may occur over time. Cover the bike to prevent dust.

### 11. End-of-Life Disposal

- This product cannot be disposed of by incineration, landfilling or mixing with household waste. Improper handling of the battery in this product may cause the battery to heat, rupture, or ignite, which could result in serious injury. The substances inside the battery pose a chemical risk to the environment. The end-of-life disposal recommendation for any CYCROWN product is to dispose of the entire device at an e-waste recycling center or through an e-waste recycling center, project or facility.
- Local regulations and laws related to the recycling and disposal of lithium-ion batteries and/or products containing lithium-ion batteries vary by national, state, and local government. In order to properly dispose of batteries and/or products containing batteries, you must check the laws and regulations that correspond to where you live.
- It is the user's responsibility to properly dispose of waste equipment in accordance with local regulations and laws. For additional information on disposing of batteries and electronics or electronic waste, Please contact your local waste management office or household waste disposal service.

# 12. Parameters

Item	Parameters	
Model Name	Cycwagen	
Net Weight	87.1LBS / 39.5KG	
Product Dimensions	78*27.6*51.2IN / 198*70*130CM	
Package Dimensions	67.5*12.6*30.1IN / 171.5*32*76.5CM	
Max. Incline	11° (rider weighs 220.4 LBS / 100KG)	
Max. Capacity	440 LBS / 200 KG	
Max. Speed	28 MPH / 45 KM/H	
Range	100-120 MILES	
Motor	1000W	
Battery Voltage	48V 10.4+15.6Ah	
Charge Voltage	100-240V/2.5A	
Wheel Size	20 IN	
Charge Time	8-9 Hours	
Water Resistance	IPX4	
Storage Temperature	20°C-25°C / 68°F-77°F	
Operating Temperature	-4°F-140°F /-20°C~60°C	
Charging Temperature	32°F-104°F / 0°C-40°C	
Warranty	1 Year Limited	

# 13. Warranty

### **Dear Customer**

Thank you for purchasing our foldable lithium battery bicycle! After purchasing our products, please provide correct, complete, and true personal information and fill in the warranty card to ensure that you receive high-quality service. For products that meet the warranty conditions, free maintenance is provided. We make the following commitments:

- 1. You can receive warranty service with the warranty card. The serial number on the bike body must match the serial number on the warranty card. If you can't provide proof of the repair date, Then the factory date or the order date will be the start date of the warranty and we will confirm if it is still within the repair date.
- 2. From the date of sale to the warranty expiration day, If there is a performance failure caused by non-human damage, once confirmed, our company promises to repair it free of charge. If the performance failure caused by man-made damage, once confirmed, our company will carry out paid maintenance.

### **Warranty Disclaimer**

The following situations are not covered by the warranty service, and you need to pay the relevant service fees. beware:

- 1. Total riding distance is over 100 Kilometers.
- 2. Any damage caused by not following the instructions for use of the electric bike.
- 3. Lost or changed electric bike number.

### **Warranty Disclaimer**

- 4. Product damage caused by accidental factors or improper use, such as mechanical damage, breakage, and serious impact on the product, oxidation, etc.
- 5. Overload, over obstacles (Including but not limited to bottom pedals, falls, etc.), or damage caused by extreme conditions.
- 6. Any damage caused by abnormal storage conditions or electrical resistance, such as fire, immersion, high temperature, and earthquake.
- 7. Loss of wearing parts, such as packaging materials and various technical materials.
- 8. Other failures or damages not caused by product design, technology, manufacturing, quality, or other issues.
- 9. Not purchased from the CYCROWN online store.

### 14. Contact Us

If you have issues with riding, maintenance and safety, or faults/failures with the CYCROWN Cycwagen electric bike, please contact us.

www.cycrown.com



