There are two clear tendencies in the HMI market: really complex displays even with color or Black and White or so simple remotes based on few non-intelligent buttons for basic e-bikes. What is the best? The answer is that depends on the profile and target of the e-bike. So if you could be able to add in your e-bike design with one smart remote control that could be able to be upgraded from a basic version to the most complex one with display, that will be the best option.

iWoc® is the new generation of Smart Remote Control for e-bikes that ebikemotion® has created for the OEM. iWoc® Remote includes 5 Buttons, 10 different functions, LED integrated to inform about status, function, battery, power, Bluetooth®, CAN, Serial... iWoc® punches above its weight.

In advance is possible to add a USB On-Wire unit to power the iWoc® if the power supply of the display bus is over 6V. It is possible to customize the protocol and signals to different requirements of the e-bike and it is fully compatible with the ebikemotion MOTOR SMART CONTROLLER based CAN protocol. If it is used in combination with our APP, user’s smartphone will turn into the display of the e-bike controlling also the APP by the iWoc® remote.

Target Applications:
- Control electric bicycles based on CAN BUS or SERIAL. Specially for:
  - Smart City e-bikes
  - Smart e-MTB
  - e-performance

Connection by Bluetooth® to APPs

Smart Control
e-bike Status
notification
ergonomic
Bluetooth®
communication

The iWoc® joystick is the full new generation of e-bike remote that includes Bluetooth® BLE, and it is designed to control directly e-bikes that implement CAN BUS as well as SERIAL communication buses based on RS-485 or UART. iWoc® is connected normally close to the position of the hand in the handlebar. The remote can establish direct communication with the motor controller using the display bus, totally substituting the display.

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EN 15194
DIN EN ISO 13849
According to Directive 2006/42/EC

Made with Automotive Quality Standards

Nagares SA, one of the most important Automotive Electronic Manufacturers of Spain and the R+D in GND (Valencia) is the responsible of the design, production and quality management of the ebikemotion® iWoc®.
**Product Features and Specifications**

- Power supply compatible 5 to 6V (check for more Volt.)
- Wireless Communication (Bluetooth® BLE).
- Number of Programmable buttons (5).
- 1 RGB Context LED Lights.
- 3 or 4 LED Lights for Power assist level.
- 4 or 3 LED Lights for Battery level.
- Available hardware versions (Bus communication):
  - CAN BUS compatible (High speed CAN).
  - RS-485 compatible.
  - UART compatible.
- EN 15194 - DIN EN ISO 13849 - According to Directive 2006/42/EG.
- 6 pin wire (2 BUS, 2 Power, 2 special signals)
- Symmetric and ergonomic design (right and left handle, up and down).
- Waterproof construction IP67.
- Customizable cover.
- Auto pairing and secure communication.
- Cycles of use for each button (250,000).
- Diameter of supported handlebar, from 22.2 / 26mm.
- Type of connection (depending of project and manufacturer. Standard by HIGO Micro B 6 Pin).

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**Dimensions Box:**
- Length: 53.5 mm
- Height: 58.2 mm
- Width: 47.1 mm

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**Side area is fully customizable**

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**iWoc® remote is designed to be placed in both sides of the handlebar and oriented to both sides attending your design necessities**

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more info: ebikemotion.com