

# Power & Start-Up Faults

Diagnosing a CEMOTO bike that will not power on, or that powers on but will not run.

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## Symptom: nothing happens when I turn it on

The display does not illuminate and there is no response.

## Check in this order

### 1. Battery charge and connection

- Confirm the battery has charge. A deeply discharged battery will not power the system.
- Remove and reseal the battery in its compartment. Confirm it is fully latched and locked.
- Check the battery terminals and the main connector for corrosion, looseness or heat discoloration.

### 2. Fuses and master switch

- Check any accessible fuse in the main power path.
- Confirm the power / ignition switch is actually in the ON position and operates with a positive click.

### 3. Wiring to the controller

- Check that all cables are **firmly plugged into the controller**. This is the first thing the owner manual asks you to verify.
- Inspect the main connector between the battery and the controller. Unplug it and look for burned or discolored pins.

### 4. Display cable

- Check the display connector at the back of the panel and at the controller end.

### 5. Voltage check

- With a multimeter, check battery pack voltage at the output terminals. Compare it against the nominal voltage for your model (48V or 72V).
- A pack reading far below nominal on a "charged" battery indicates a failed cell group or a BMS protection event.

“ If the pack voltage is normal at the battery but absent at the controller, the fault is in the wiring, fuse or switch between them.

**Video:** *CEMOTO Won't Turn On? What Would You Check First?* — see [Technical Guides](#).

# Symptom: display turns on, but the bike will not move

This is the most common "fault" reported, and it is usually not a fault at all.

## 1. The bike is in 0 gear

On the D-series, turning the electric door lock on makes the instrument light up and display **0 gear**. **In this state, the vehicle does not work.** The throttle is inactive by design.

**Solution:** press the "+" **key** to switch to a gear above 1. The throttle becomes active.

## 2. Brake lever is engaged or dragging

The brake lever cuts motor power. If the lever is not returning fully — because of a stiff cable, a damaged lever, or an incorrectly adjusted brake — the controller may see a permanent brake signal and refuse to drive.

**Solution:** confirm the lever returns fully under its own spring pressure, and check the brake lever sensor. A permanent brake signal may also present as **E02 Brake Error** — see [Display & Error Codes](#).

## 3. Throttle fault

If the controller detects an invalid throttle signal, it will not drive and may display **E08 Throttle Error**.

**Solution:** see [Throttle & Controls](#).

## 4. Kickstand or safety interlock

Some configurations include an interlock that prevents drive with the stand down. Raise the stand fully.

## 5. Mode / parameter setting

Check drive mode parameter **P10**. If it is set to  (power drive only), the handlebar throttle is **invalid** and the bike only responds to the power gear assist. Set to  (electric drive) or  (coexist) as appropriate for your riding style. See [Display & Settings](#).

# Symptom: it starts, then cuts out almost immediately

| Likely cause                | What to check                                                                                                                                                              |
|-----------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Low battery under load      | Voltage sags under load. Charge fully and retest; a pack that reads normal at rest but collapses under load has a failing cell group.                                      |
| Loose connector             | Vibration opens a marginal connection. Reseat every connector in the power path, especially the battery main connector and motor phase wires.                              |
| Over-current protection     | If the controller trips under hard acceleration, the current limit ( <b>P14</b> ) may be set too high for the configuration, or there may be a short in the motor circuit. |
| Over-temperature protection | The controller derates or cuts when hot. Check the controller housing is not blocked and the fins are clean.                                                               |

# Symptom: intermittent power loss

Intermittent faults almost always trace to a connection.

1. **Unplug and inspect every connector** in the power and motor path. Look for: loose fit, corrosion (green or white deposits), water ingress, burned or discolored pins, and partially withdrawn pins.
2. **Check the harness for chafing** where it passes the steering head, the swing arm pivot and any frame edge.
3. **Check the battery latch.** A battery that is not fully seated can lose contact over bumps.
4. **Flex test.** With the bike stationary and powered on, gently move the handlebar lock to lock and bounce the rear suspension while watching the display for flicker. A flicker localizes the fault to the harness in that region.

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# Overload protection

CEMOTO bikes protect against overload. If the bike is loaded beyond its rated maximum, electrical components can be damaged — plastic parts may deform from high temperature, or the fuse socket may be damaged by heat. **Overload damage is not covered by warranty.**

| Model       | Maximum load    |
|-------------|-----------------|
| D02 Classic | 287 lb          |
| D03 Pro     | ~265 lb         |
| D02 Track   | 265 lb (120 kg) |
| D03 Beast   | 287 lb          |

If the bike cuts out repeatedly under load, confirm the total weight (rider + gear + anything carried) is within the limit.

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# Safety: cut the power if there is an electrical fault

The owner manual is explicit: **cut off the power if there is a problem with the electrical parts.** Do not continue riding a bike with a suspected electrical fault. Do not open sealed electrical components — they are not user-serviceable, and opening them voids the warranty on those parts.

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# Related pages

- [Display & Error Codes](#)
- [Charging Faults](#)
- [Motor & Controller Faults](#)
- [Throttle & Controls](#)
- [Contact & Support](#)

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Revision #11

Created 2026-09-22 01:59:51 UTC by Cemoto

Updated 2026-09-22 04:53:28 UTC by Cemoto