## Motor and clutch test for DU-DD1-12

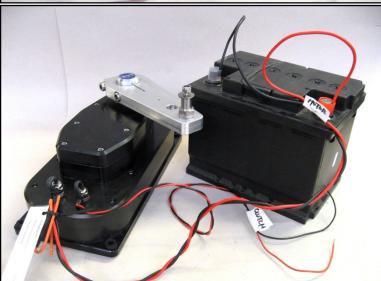


## 1) Clutch test

Dismount the drive unit's cables (disconnect 4 cables, 2 cables thin for clutch, 2 cables thick for motor)

Connect 12v directly to the clutch cables (2 thin cables, 1 black and 1 red) Put the red clutch cable on +12v, and the black clutch cable on -12v. You should hear a "click sound" from the drive, this is the clutch engaging. Try turning the steering wheel. It should be locked by the drive

Try disconnecting and connect again several times to be sure the clutch engage correctly. When the clutch is disconnected, the steering wheel should turn easily, as when the autopilot is disconnected.

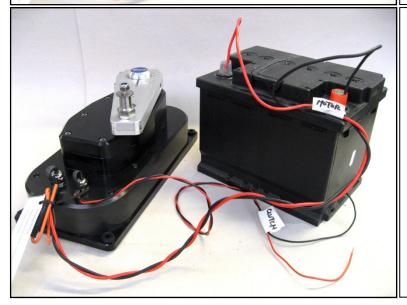


## 2) Motor test

Disconnect the clutch cables before testing the motor.

Connect 12v directly to the motor cables (2 thick cables, 1 black and 1 red) Put the red motor cable on +12v, and the black motor cable on -12v

You should be able to hear the motor run.



## 3) Motor test in reverse.

Now connect 12v, to the motor cables, opposite as before (2 thick cables, 1 black and 1 red) put the red motor cable on -12v, and the black motor cable on +12v

Now the motor should turn the opposite direction as before

If this test is working, the drive is functional.

NB: Do not test the motor and clutch at the same time. This can damage the steering system if it rotates to the end stop.