

HiTEC | HS-805MG | Conversion to endless servo

Here we describe how you can convert a servo into an endless servo. After the conversion, the servo behaves like a combination of a speed controller and a gear motor, which can turn continuously to the left and right.

Attention: These are instructions that are intended as a basis for a conversion. Claims for damages of any kind are therefore excluded!

Unscrew all six Phillips screws and then carefully pull the gear cap off the servo housing.



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Then carefully pull all the gears off the axles until your servo looks like this. Store the gears dust-free on a clean surface.



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Now bring the potentiometer to the middle position and fix this position with a little glue.

You can also set an exact center position using your remote control. To do this, connect the servo to a free receiver channel and set the transmitter trim to the neutral or center position. In this way you generate a neutral pulse. Change the position of the potentiometer until the motor comes to a complete standstill and fix this position with a little glue.

For good lubrication, the existing grease should be carefully removed from the large gear and stored for later assembly.

Remove the ball bearing from the underside of the large final gear by pulling it gently. You can see the white driver of the potentiometer under the ball bearing, please remove this too.

Here already with the removed ball bearing:



Then remove the upper ball bearing as well.



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Now comes the real work: removing the pin from the large gear.

The easiest way to do this is with a Dremel or something similar, whereby the adjacent teeth of the gear should not be damaged.

If possible, the surface should be free of burrs after removing the tenon.



When you are done, thoroughly clean the cogwheel of any sawing or grinding residues.

Put the two ball bearings back on both sides of the large gear and reassemble the entire servo in reverse order.

Congratulations, you have successfully converted a servo into an endless servo! Now nothing stands in the way of your new mission - have fun!