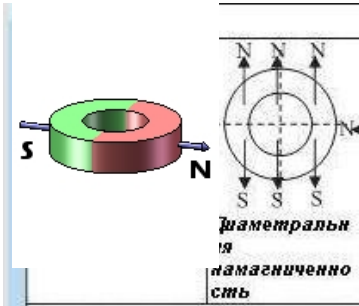


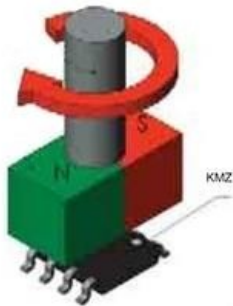
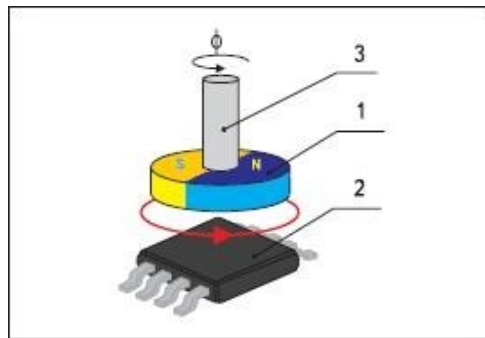


### Instructions for setting up a magnetoresistor (MagRez).

Connect the MagRes to the controller preferably with a microphone cable or any two-wire, shielded cable. In principle it is possible to do without the 'screen' just with three wires, but then you may get noise.



It is better (more convenient) to use ring magnets with DIAMETRAL magnetisation of 5 to 10mm in diameter.



Or take the magnets out of the CD-ROM (DVD), they are located near the lens. Other ones are possible, but these are tried and tested.

1. Mount the magnet on the mechanics with the magnet mounted on the mechanics axis as in the pictures above and check the voltage at the output of the magnet, if the voltage is not half (usually about 2.5 V) of the supply to the magnet, then rotate the magnet along the joystick axis until the output from the magnet is half of the supply voltage of the magnet. It is convenient to rotate the ring magnet on the axis by means of plastic clamps.

Take the magnet, tighten the clamp with all your might on the magnet and cut off the tail by pushing it into the lock. Now the magnet can be easily adjusted by pushing a toothpick into the lock (so that it is not magnetic).



2. Check whether the response is in the correct direction (e.g. joystest), if the axis is inverted, turn the magnet 180 degrees on the axis and proceed with step 1.

For the other axes, do the same for the other axes.

Then go into the system's Game Devices and calibrate the joystick.

When re-soldering the resistors on the MagRez board to change the maximum

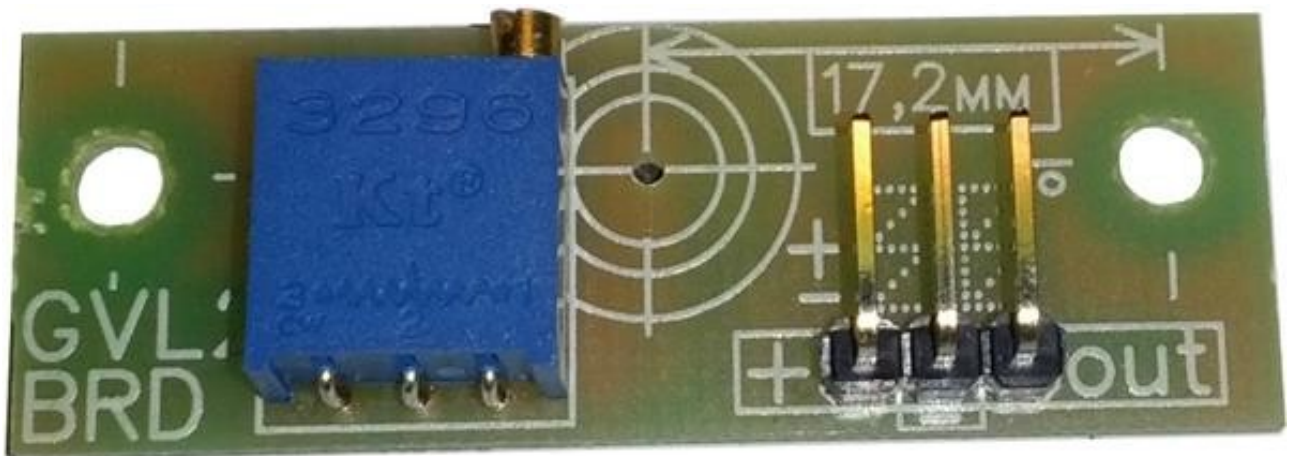
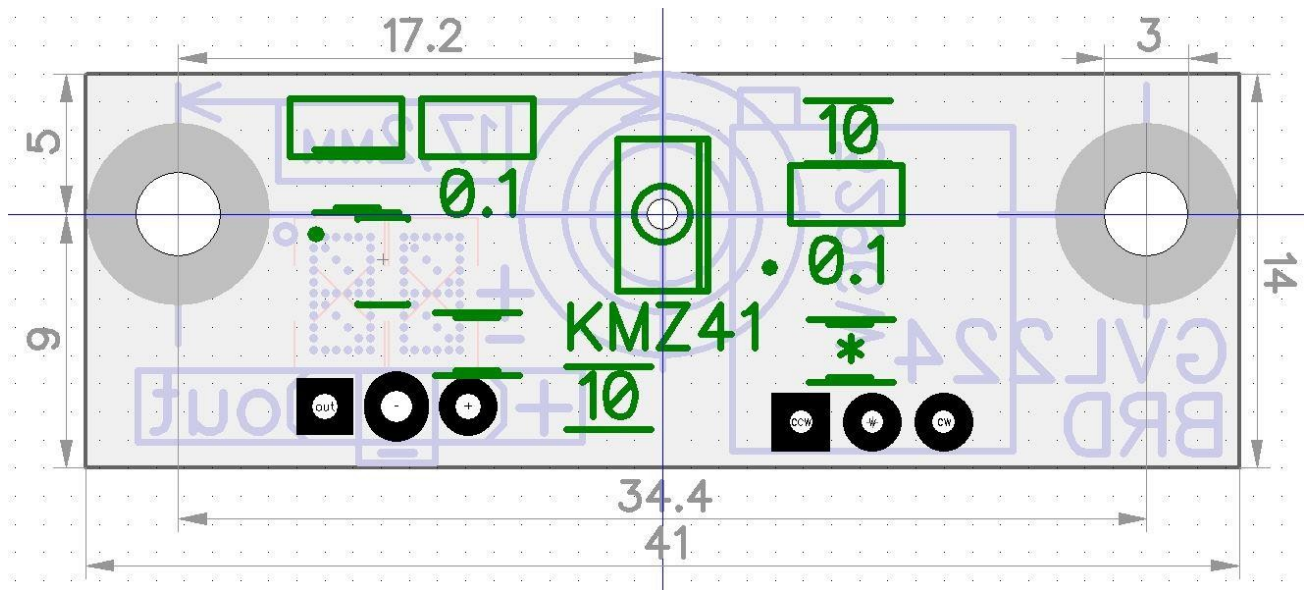
angles, a 'midpoint' adjustment procedure must be carried out.

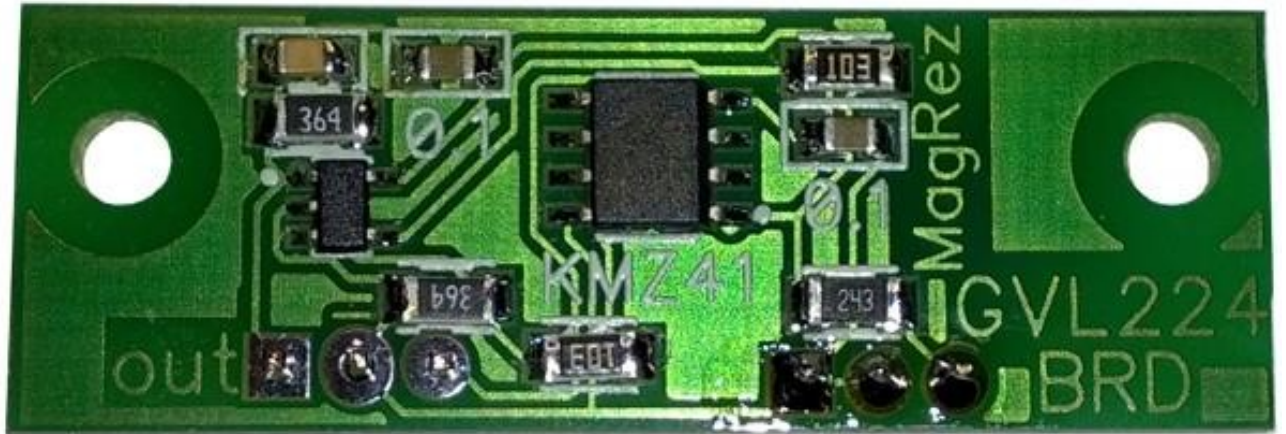
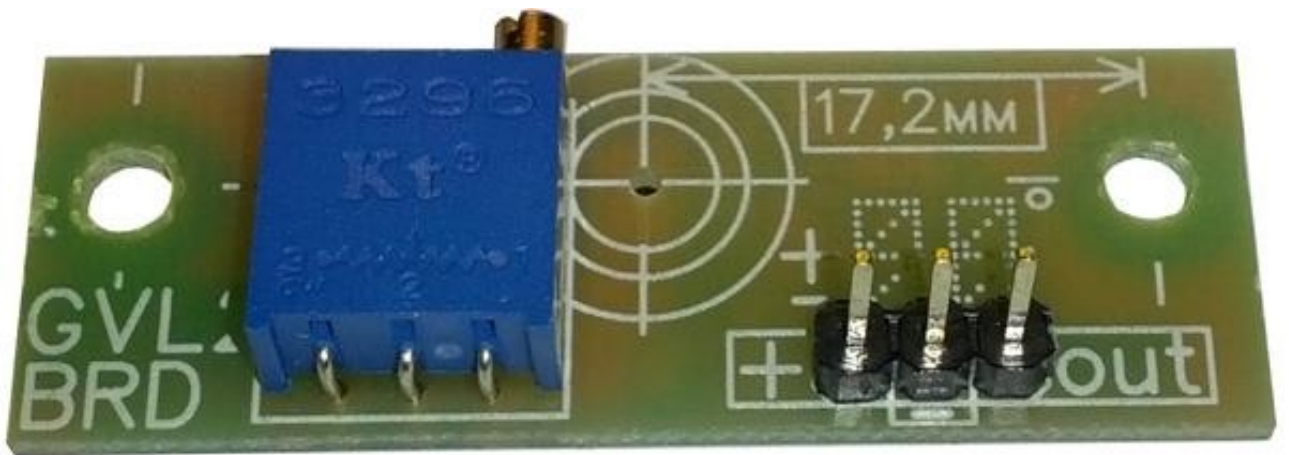
Connect the MagRez to the controller, connect the controller to the computer (without the magnet on the axis to be adjusted), do not place the MagRez itself on the mechanics or expose it to the magnetic field at this stage of adjustment.

Using a voltmeter (tester), measure voltage at the output from the MagRez (between "out" and "-" on the MagRez or between "in" and "-" on the controller), it should be equal to half of the voltage coming to the MagRez. If this is not the case, then turn the trimmer on the MagRez (the blue square thing, the direction of rotation is determined by testing) until we get half the voltage at the output of the MagRez (e.g. the MagRez supply is 5 volts, then the output from the MagRez should be about 2,5 volts).

A dielectric screwdriver (ceramic, plastic) should be used for tightening.

Photo by MagRez.





Video instruction on my channel <http://www.youtube.com/user/GVL224?feature=guide>  
Instruction made by - Goryansky Vitaly (GVL224) - V3.5.