Remote Switch for 10Micron Mounts

#245 5030

Manual/Tutorial Version 1.0
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A 10Micron GM mount can be switched on and off remotely via the external switching device *expert net control 2104*. For this, the 3-pin stereo jack (8) EXT SWITCH is connected in parallel with its two front contacts (stereo left and right, without ground) to the ON / OFF switch (3). This is a so-called rocker switch which is only closed for the duration of pressing the rocker (approx. 3s).

The *expert net control 2104* switching module must be operated as a rocker switch. It must close the contact for one to three seconds, but not continuously: Switch on – wait for 3s – switch off. The mount is now switched on. Same procedure for switching off the mount: Switch on – wait for 3s – switch off.

**Switching device *expert net control 2104*: connection and startup**

1. Switch off the mount manually at control box (3) by using the ON/OFF switch.

2. Wait for the red LED (2) to turn off. This can take up to 30s.

3. Disconnect the mount from the power supply (pull the plug).

4. Plug the jack plug of *expert net control 2104* switching device into the jack socket EXT: SWITCH (8) of the control box.

5. Connect the supplied 12V power supply to *expert net control 2104*.

6. Use the network cable to connect *expert net control 2104* to your LAN network, your home network router or a network switch.

7. Reconnect the mount with the 12V power supply.

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**Note:** The rocker switch on the control box of the mount is out of operation after plugging in the jack plug of the switching module. Manual operation of the mount is nevertheless possible by pulling out the plug and plugging it in again after a few seconds.
8. **Software Installation:** Open *Tools/GBL_Conf/gbconf_v2.7.7.exe* (CD).

9. Launch *GBL Conf.exe*. The device *expert net control 2104* will appear in the left window.
10. **Network settings:** If you have set the **TCP / IP Settings by DHCP** check box, DHCP assigns a free IP address to the device for example 192.168.178.23. A fixed IP address is to be preferred to a newly assigned one, because the switch module can be addressed immediately with every web browser.

11. Open a web browser and enter the assigned IP address: **192.168.178.23**. The web interface displays **192.168.178.23/ov.htm**. This address can be defined as a bookmark in the web browser so that the switch module is automatically found the next time the browser is called.

12. **To turn on the mount:** Press On - wait for three seconds - press Off. The mount will boot, which is indicated in the keypad display by **Connecting ...**. Previously you must have defined that the Virtual Keypad should connect after startup (**AutoConnect**).
13. As soon as the mount is connected, Virtual Keypad can be used in the usual way to control the mount. Be careful to slew the mount to your pre-defined park position if you wish to end your observing session.

14. **Switching off the mount:** Press On - wait three seconds - press Off. Now the mount is disconnected.

15. **Note:** Prior to restarting, the red LED of the control box must have been extinguished. Since you cannot see from afar, you should wait about 30s until you switch on again.

16. **Batchmode:** Instead of manually pressing ON / OFF in the CONTROL PANEL and waiting for three seconds, you can define a batch mode. Pressing OK automatically activates the switching module for three seconds. This batchmode is used for both switching on and off.

![Batchmode Setup](image)

**Important note:**
The same sequence is called for both switching on and off the mount: On - wait three seconds - Off.
Control by Smartphone App

"Gude Control" is an app for the platforms Android (Google Play) and Apple (App Store iTunes)

https://itunes.apple.com/de/app/gude-control/id788698645?mt=8#

Installation and control on a Samsung smartphone (Android):

1. Assign an IP address to the expert net control 2104 switching module.
2. Your smartphone must be connected to your WLAN router.
3. Download the "Gude Control" App and install (Google Play Store)
4. Launch the App and enter the IP address
5. Settings: Enable Switching
6. Pressing the ON button turns on the mount.
   After approx. 3 seconds, press OFF. The mount remains switched on.
6. BM "Batchmode". After pressing BM, enter the time interval (up to 3s), then press OK.

For both modes - manual or batchmode (BM) - the following applies:

-> The mount turns on, if it was switched off before.
-> The mount turns off when it was switched on before.