



EDR Field Config – Centurion

Preceding Steps

1. The module should be installed in the panel and wired, see the EDR Installation guide for Centurion.
2. The Centurion communication settings should be verified. This is under MISCELLANEOUS SETUP.
 - a. Ctrl Port 2 Mode should be set to “RS485”
 - b. Ctrl Port 2 Baud Rate should be set to “9600”

1. Check for existing config

Check the drawing number for the panel against any known configuration folders, and if it has already been made then those files can be used for this unit. In this case, note the file location and skip to step 6.

2. Getting Input Channel List

Make a list of the analog inputs and thermocouples. Additionally, find the “Event list” from the Murphy programming document.

3. Copy default files

On a computer, make a copy of the three files for the blank Centurion configuration into a new folder for this unit.

4. Update Shutdown Code Table

Opening the new folder for the unit configs, open the EMIT_TEL_ShutdownCodes file.

Edit each row so that the event number matches the value in the Murphy programming document under “Event list”.



| CLASS | TYPE | DESCRIPTION (20 CHARS MAX) | EVENT NUMBER |
|-------|----------|----------------------------|--------------|
| | | NO FAULT DETECTED | 40191 = 0 |
| A | ESD | PANEL EMERGENCY STOP | 40191 = 1 |
| A | Fault SD | SPARE DI02 SHUTDOWN | 40191 = 2 |
| A | Fault SD | SPARE DI03 SHUTDOWN | 40191 = 3 |
| B1 | Fault SD | LUBE NO FLOW | 40191 = 4 |
| B1 | Fault SD | SPARE DI05 SHUTDOWN | 40191 = 5 |
| A | Fault SD | LO COMPRESS OIL LVL | 40191 = 6 |
| A | Fault SD | LO ENGINE OIL LEVEL | 40191 = 7 |
| A | Fault SD | LO ENG JACKETWTR LVL | 40191 = 8 |
| A | Fault SD | SPARE DI09 SHUTDOWN | 40191 = 9 |



| | A | B | C | D |
|----|--|--------------------------|---|---|
| 1 | Instructions: Specify one register below that can be used to | | | |
| 2 | | | | |
| 3 | Code regis | 40191 | | |
| 4 | Slave ID: | 1 | | |
| 5 | | | | |
| 6 | Register vs Description | | | |
| 7 | 0 | No Fault Detected | | |
| 8 | 1 | Emergency stop | | |
| 9 | 2 | Spare DI02 Shutdown | | |
| 10 | 3 | Spare DI03 Shutdown | | |
| 11 | 4 | Lube No fLow | | |
| 12 | 5 | Spare DI05 Shutdown | | |
| 13 | 6 | Lo Compressor Oil Lvl | | |
| 14 | 7 | Lo Engine Oil Lvl | | |
| 15 | 8 | Lo Engine Jacket Wtr Lvl | | |
| 16 | 9 | Spare DI09 Shutdown | | |

Make sure to use “save” (not save as) so that the file stays a “csv” file.

5. Updating the Modbus Master Table

Open the copied table EMIT_TEL_ModbusMasterTable, and check for data tags on the first column that match sensor names in the Analog Input or Temperature Input list. For each sensor that is an analog input, change the target register to [40124 + AI number] and the target ID as “1”. For each sensor that is a temperature input, change the target register to [40150 + temp input number].

Example: If suction pressure is on channel AI-5, then for the suction pressure row put the register as $40124+5 = 40129$.

For any unused / not present sensor, leave the register as “0”.

6. Uploading the Config Files

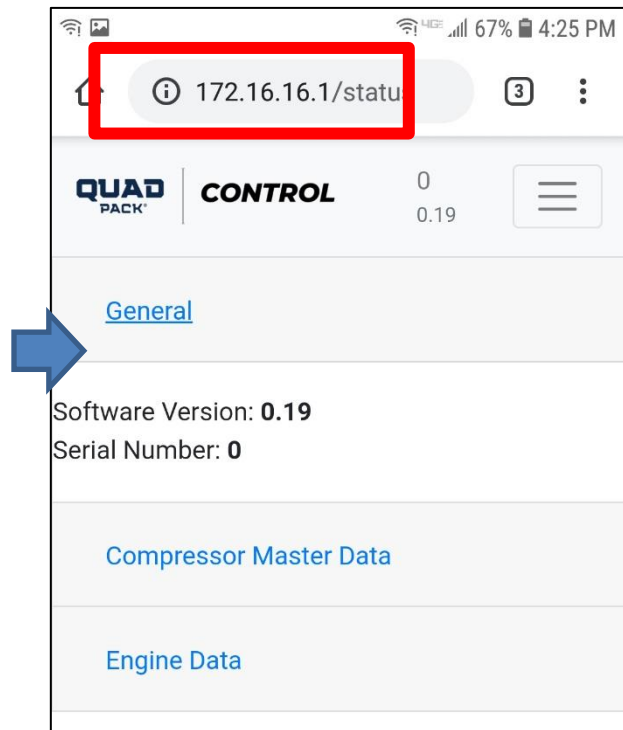
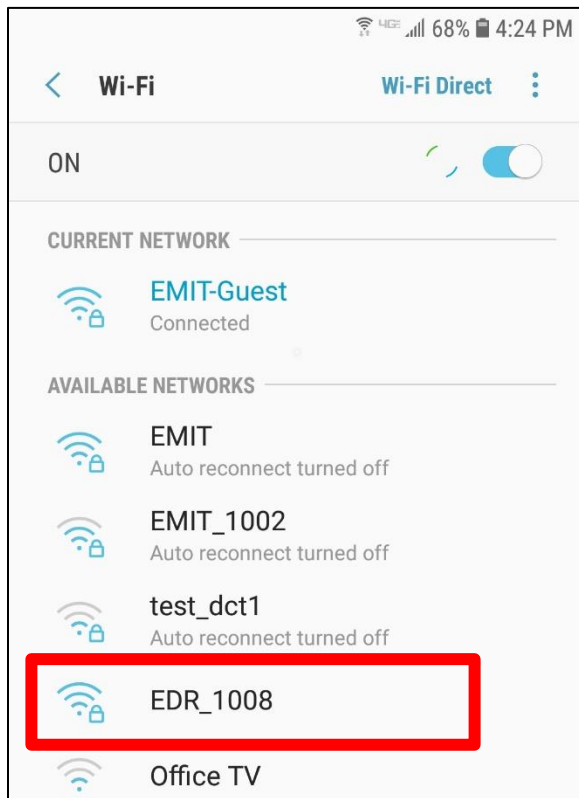
Once the two files are ready (the 3rd file EMIT_TEL_RunStatusTable does not need to be edited) connect your computer to the EDR wifi console using these steps.

Connecting

Check your target device's Wi-Fi settings for a network called "EDR_xxxx", where xxxx is the serial number of the Data Relay. Connect to this network and enter the password 'emitemit'.

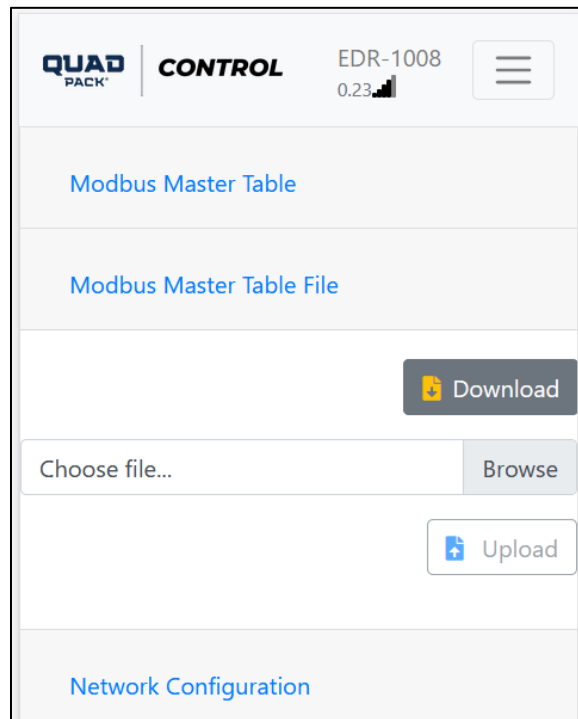
Note: There will be no internet access while you are connected to the network. It is recommended that you turn auto reconnect off.

Once connected, open a web browser and type <http://172.16.16.1/>. This will bring up the Data Relay console.



Uploading the Files

On the Modbus Master tab, go to the “Modbus Master Table File” dropdown, browse for the new master table file, and select “Upload”.



Choose file location

Under the network configuration dropdown set the baud rate to 9600 and make sure “Use Serial” is checked.

On the Alerts Tab, go to the “Table Configuration Files” dropdown and upload the fault code and run status table. (Note that the run status table is the same for all Centurions so it didn’t have to be changed from the default file).

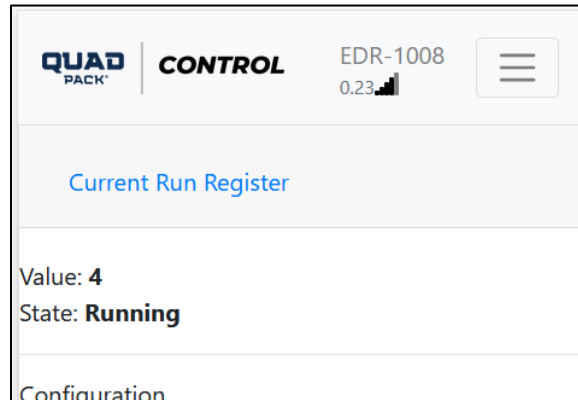
Checking the Config

On the Alerts tab, open the dropdown for “Current Run Register” and “Current Fault Register”. Both should show some valid state other than TIMEOUT.



Technical Briefs

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If the values are not reading, it is likely because the Modbus A/B are swapped, the baud rate is not correct on the EDR or Centurion, or the Centurion node ID is not set to 1.