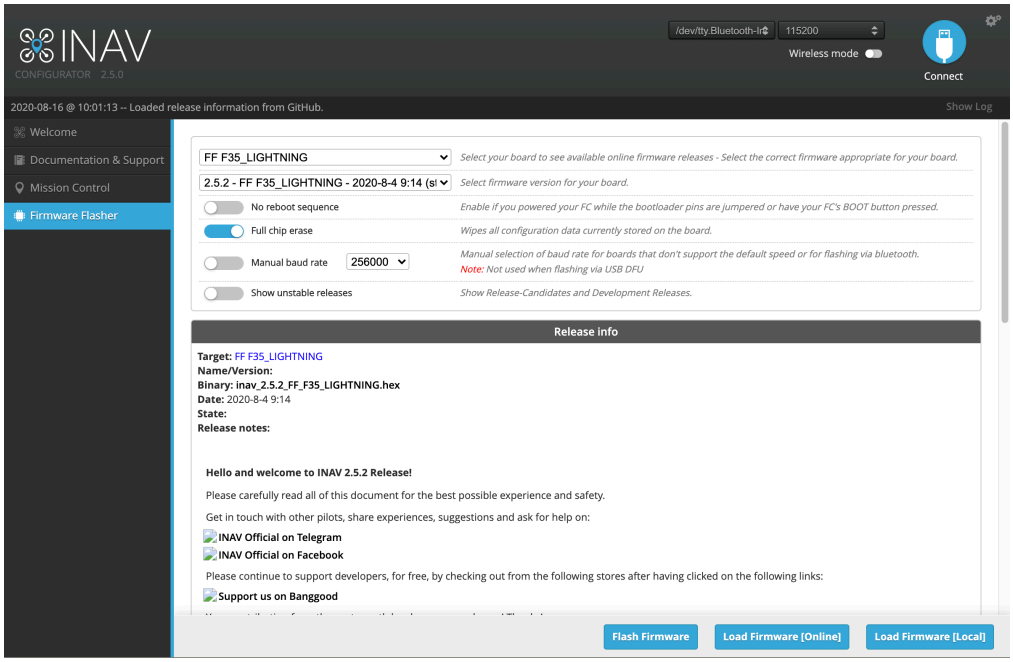
Update Firmware of F-35 Lightning FC

To perform a firmware upgrade perform the following steps (windows only):

1. Install relevant drivers on windows needed to upgrade the F-35 Lightning FC:
    a. Connect the F-35 Lightning with a USB cable to the computer
    b. Download and execute the ImpulseRC Driver Fixer Tool
2. Secure the current configuration by following the instructions on: NAV upgrade guide. In short:
    a. Use Inav Configurator to connect to the F-35 Lightning FC
    b. Go to the *CLI* menu and enter `diff all`
    c. Copy the results to a separate text file
    d. Manually perform the changes mentionned in the INAV upgrade guide
3. Execute the firmware update
    a. Press the *Disconnect* button in the Inav Configurator
    b. Go to the *Firmware Flasher* menu
    c. Select **FF F35_LIGHTNING** as board target
    d. Select latest firmware version
    e. Press the *Load Firmware* button
    f. Press the *Flash Firmware* button



4. Follow the instructions on INAV upgrade guide to restore the preserved and adjusted configuration from point 2. In short:
    a. Press the *Connect* button on the Inav Configurator. Once connected you should see the updated firmware version in the upper section.
    b. Go to the *CLI* menu
    c. Copy the adjusted settings from the text file mentionned in point 2 and paste them in the *CLI*
    d. If no errors occur the F-35 Lightning FC reboots itself

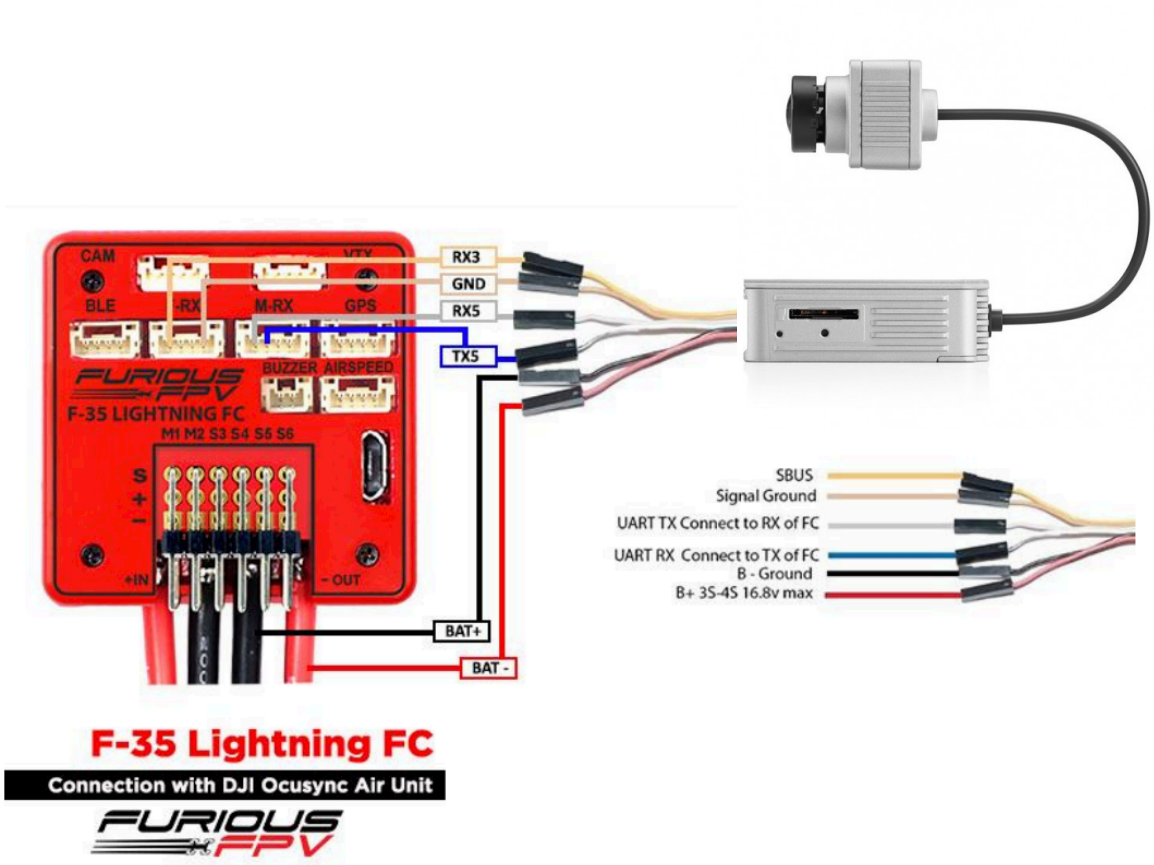
DJI Air Unit

Important notice: The DJI Air Unit requires at least version 2.4.x or higher of INav. By default F-35 Lightning FC is shipped with firmware version 1.9.1. Consequently a firmware update is required. Use the instructions above to perform a firmware version upgrade.

Once the firmware is updated the Air Unit can be configured.

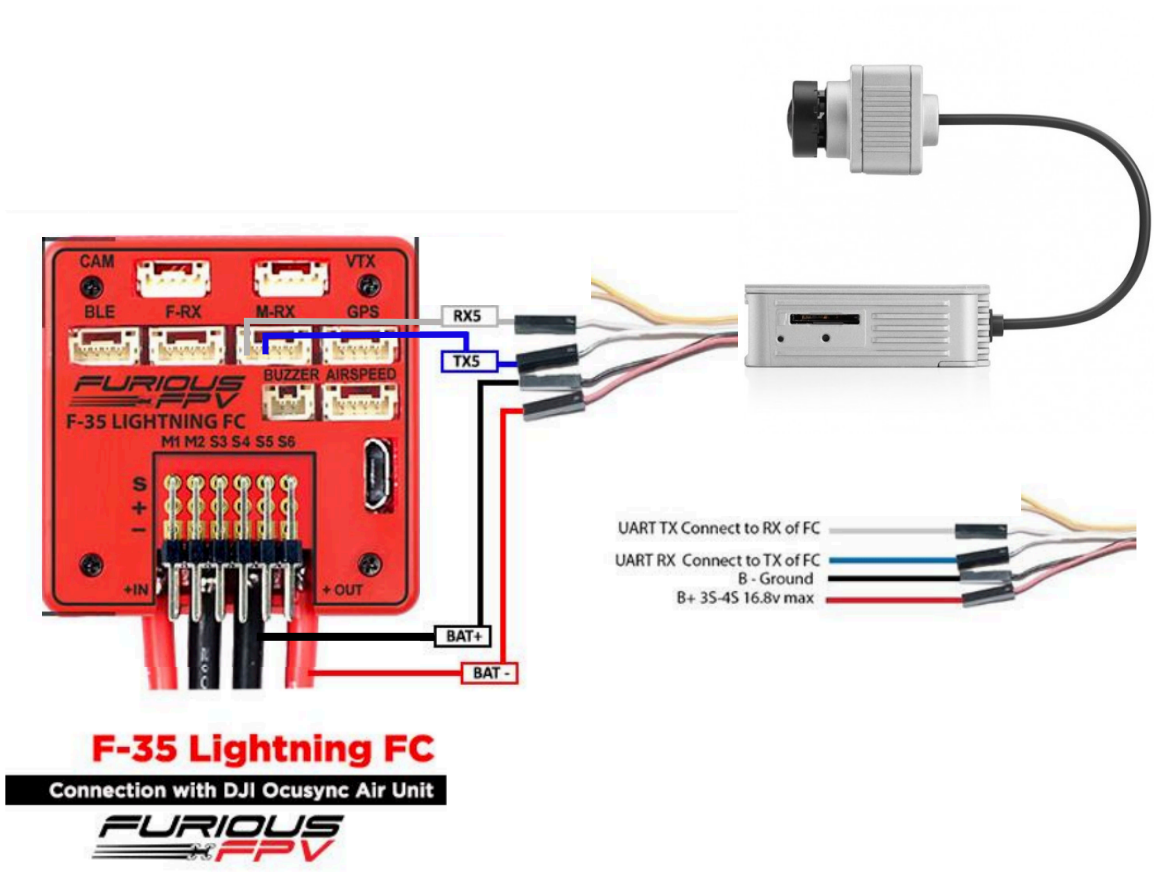
a) DJI Air Unit with Dji Remote Controller

Identifier	Data	Telemetry	RX	Sensors	Peripherals
USB VCP	MSP 115200	Disabled AUTO	Serial RX	Disabled 115200	Disabled 115200
UART1	MSP 115200	Disabled AUTO	Serial RX	Disabled 115200	Disabled 115200
UART2	MSP 115200	Disabled AUTO	Serial RX	GPS 57600	Disabled 115200
UART3	MSP 115200	Disabled AUTO	Serial RX	Disabled 115200	Disabled 115200
UART4	MSP 115200	Disabled AUTO	Serial RX	Disabled 115200	IRC Tramp 115200
UART5	MSP 115200	Disabled AUTO	Serial RX	Disabled 115200	DJI FPV VTX 115200
UART6	MSP 115200	SmartPort AUTO	Serial RX	Disabled 115200	Disabled 115200



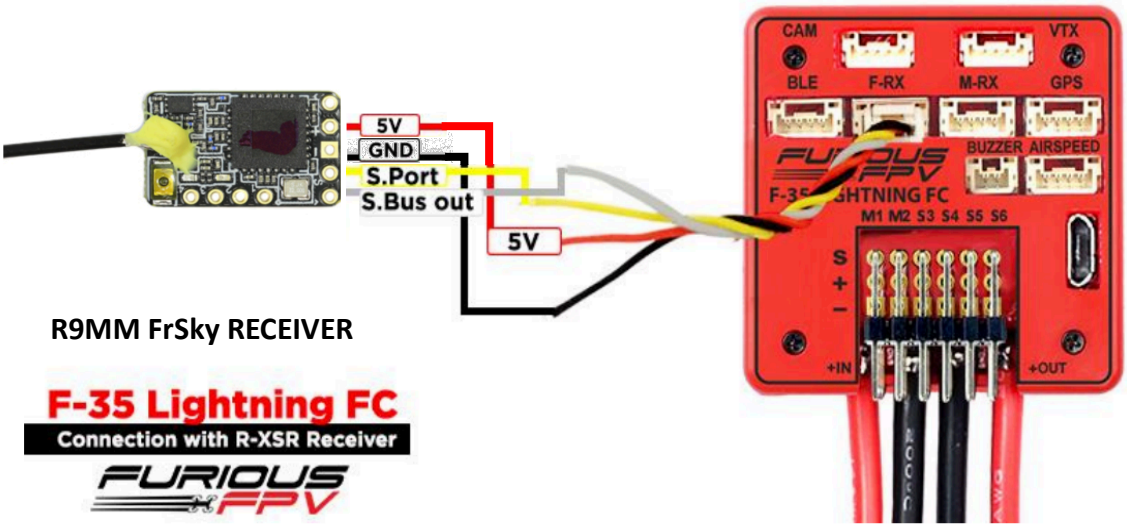
b) DJI Air Unit only

Identifier	Data	Telemetry	RX	Sensors	Peripherals
USB VCP	MSP 115200	Disabled AUTO	Serial RX	Disabled 115200	Disabled 115200
UART1	MSP 115200	Disabled AUTO	Serial RX	Disabled 115200	Disabled 115200
UART2	MSP 115200	Disabled AUTO	Serial RX	GPS 57600	Disabled 115200
UART3	MSP 115200	Disabled AUTO	Serial RX	Disabled 115200	Disabled 115200
UART4	MSP 115200	Disabled AUTO	Serial RX	Disabled 115200	IRC Tramp 115200
UART5	MSP 115200	Disabled AUTO	Serial RX	Disabled 115200	DJI FPV VTX 115200
UART6	MSP 115200	SmartPort AUTO	Serial RX	Disabled 115200	Disabled 115200



R9MM Receiver

Identifier	Data	Telemetry	RX	Sensors	Peripherals
USB VCP	MSP 115200	Disabled AUTO	Serial RX	Disabled 38400	Disabled 115200
UART1	MSP 19200	Disabled AUTO	Serial RX	Disabled 38400	Disabled 115200
UART2	MSP 115200	Disabled AUTO	Serial RX	Disabled 38400	Disabled 115200
UART3	MSP 115200	Disabled AUTO	Serial RX	Disabled 38400	Disabled 115200
UART4	MSP 115200	Disabled AUTO	Serial RX	Disabled 38400	Disabled 115200
UART5	MSP 115200	Disabled AUTO	Serial RX	Disabled 38400	Disabled 115200
UART6	MSP 115200	SmartPort AUTO	Serial RX	Disabled 38400	Disabled 115200



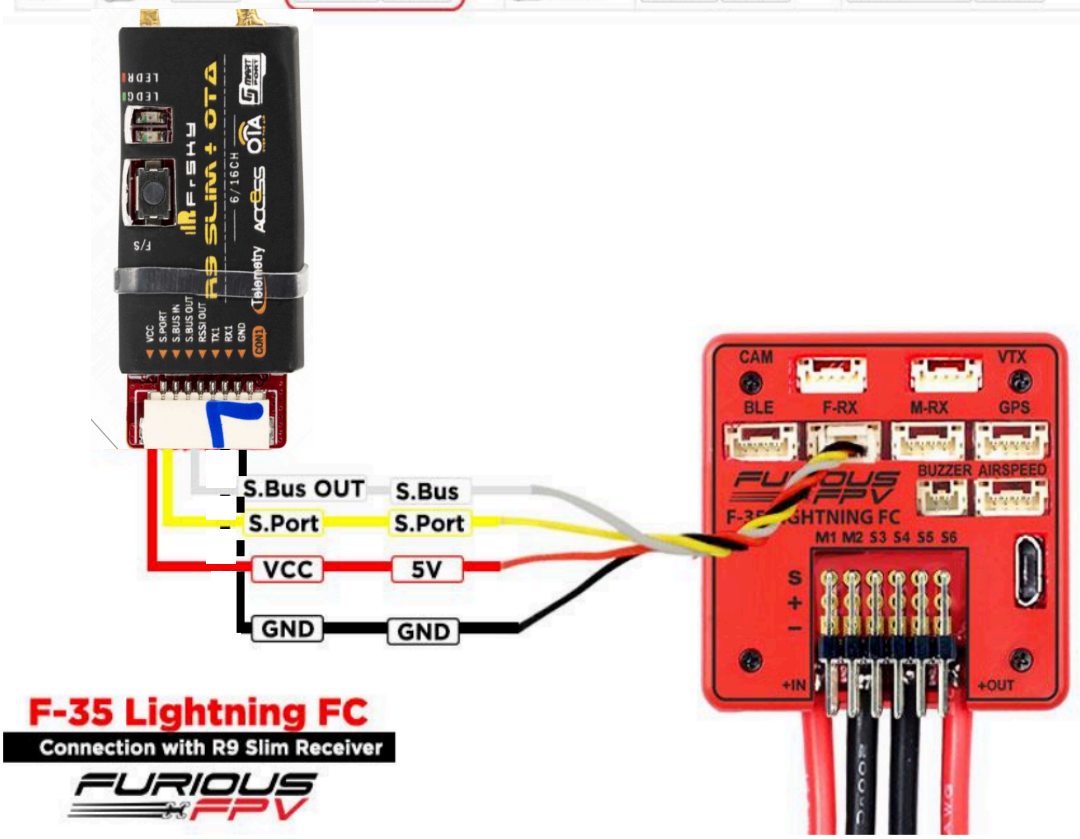
Important: For telemetry to work in the latest Inav version (tested with 2.5.x) you have to execute the following command in the CLI menu:

```
set telemetry_halfduplex = OFF
```

As of Inav version 2.5.x this option cannot be set in de User Interface (yet).

R9Slim+ Receiver

Identifier	Data	Telemetry	RX	Sensors	Peripherals
USB VCP	MSP 115200	Disabled AUTO	Serial RX	Disabled 38400	Disabled 115200
UART1	MSP 57600	Disabled AUTO	Serial RX	Disabled 38400	Disabled 115200
UART2	MSP 115200	Disabled AUTO	Serial RX	GPS 57600	Disabled 115200
UART3	MSP 115200	Disabled AUTO	Serial RX	Disabled 38400	Disabled 115200
UART4	MSP 115200	Disabled AUTO	Serial RX	Disabled 38400	IRC Tramp 115200
UART5	MSP 115200	Disabled AUTO	Serial RX	Disabled 38400	Disabled 115200
UART6	MSP 115200	SmartPort AUTO	Serial RX	Disabled 38400	Disabled 115200



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