



Technical Information

DATE: September 2, 2014 MODEL: RDD-1580

Main Software Upgrade Instructions

The RDD-1580 has two separate software modules: main software and front USB software. The instructions below detail the procedure to update the main software.

The procedure to update the main software is accomplished with the use of the Rotel YModem Upgrade Manager computer communications program.

This software is only for the RDD-1580. Rotel does not take any responsibility for loss of information or problems resulting from a failed download. Units that fail after a download may be returned to Rotel for attention under warranty.

Items needed for upgrade:

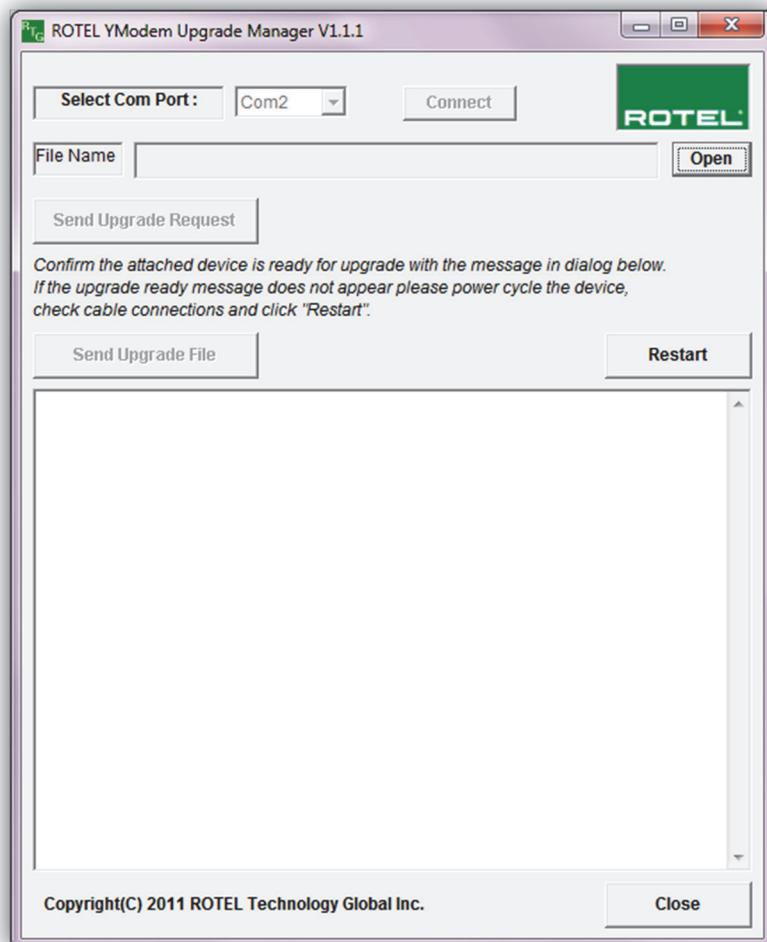
- Windows-compatible PC with serial port connection, or USB-to-serial adapter.
- Straight through RS232 cable with DB-9 terminations.
- Upgrade software and YModem download program.

Rotel YModem Upgrade Manager Program Installation

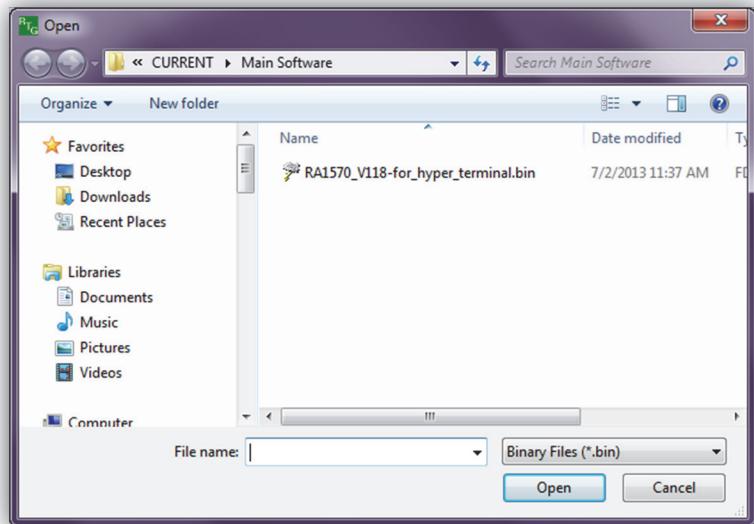
1. Download and save the YModem update files from Rotel to a folder on the PC. Make note of where the files are saved. (example: C:\Temp)
2. From the Windows Start Menu, choose "Run..."
3. When the run window opens, click Browse and locate the folder where the files were saved. Select the file named "Rotel YModem Setup.exe".
4. Hit OK to run the setup program.
5. Once setup is running, follow the prompts to install the program into the folder of your choice.
6. When installation is complete, please refer to the upgrade instructions on the following page.

Upgrade Procedure

1. Connect the RS232 cable between the unit and the computer.
2. Launch the Rotel YModem Upgrade Manager computer program. It should be located in the folder labeled "Rotel YModem Upgrade Manager".
3. Once the YModem program has launched, verify or adjust the settings to the following:
 - Port: COM1 (*or the appropriate COM port for your PC's serial connection – see the Troubleshooting section at the end of this document for more information on determining the correct COM port*)
4. Press "Connect" on the program. The Connect button should grey out, and the Open button should become selectable.

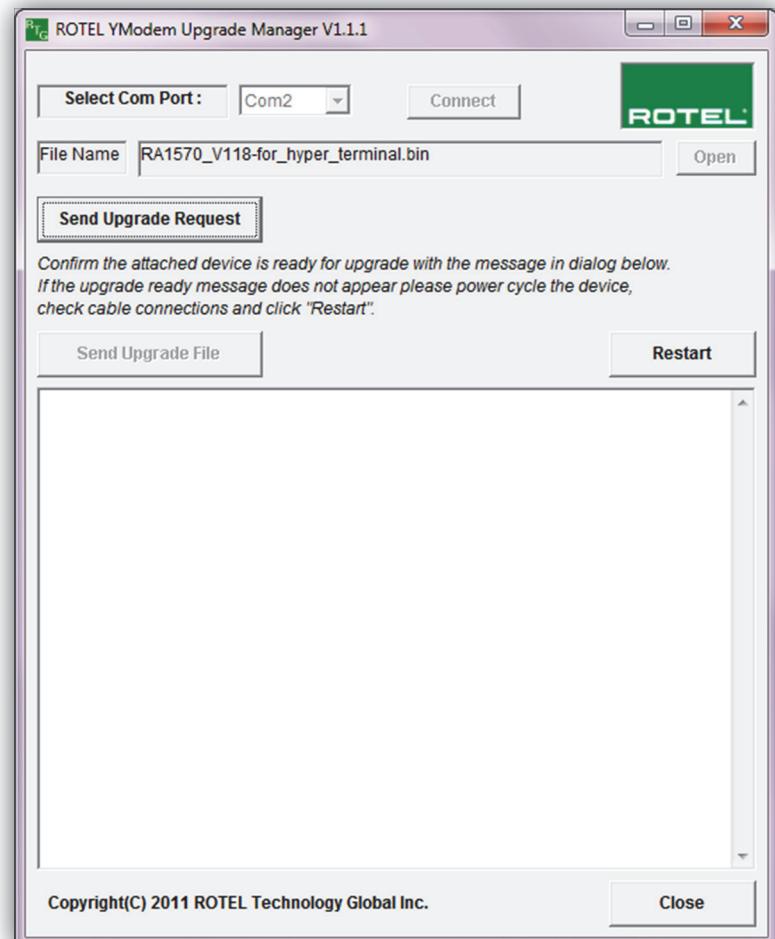


5. Click the “Open” button. A window will open to locate the software update bin file which was included with the upgrade files. Browse to the location on the computer where this file was saved, select the file and click OK.

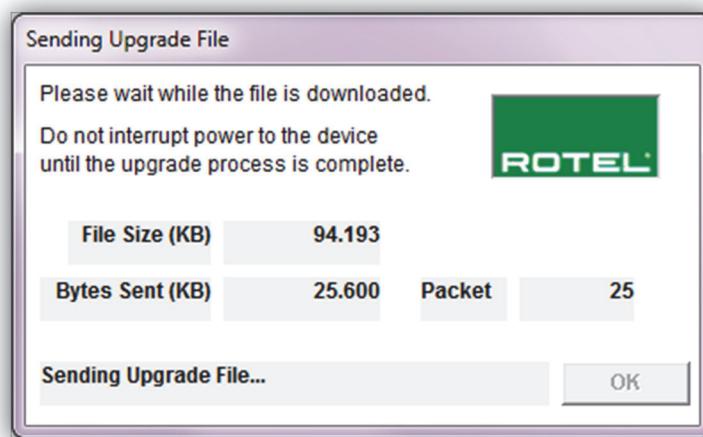


6. Once the file has been selected, click the “Send Upgrade Request” button.

The front panel display of the unit should turn off and some text should appear in the window of the YModem program.



7. Click the "Send Upgrade File" button to start the download. A file transfer window should appear as the file downloads to the unit.

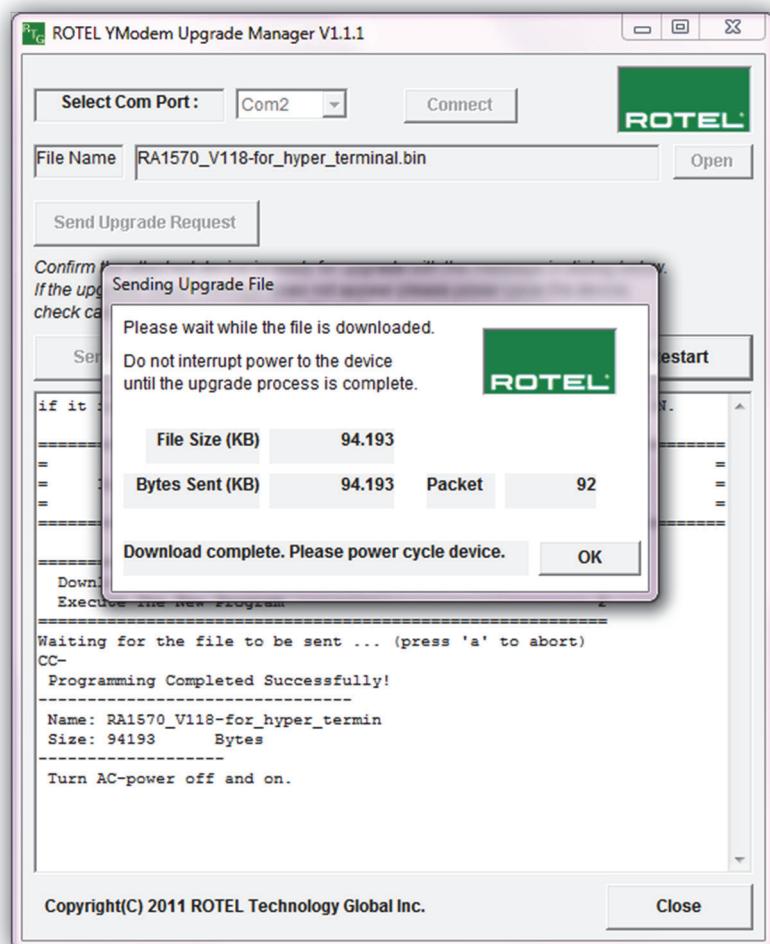


8. Once the transfer is complete the file transfer window will disappear, and the text in the file transfer window will indicate the programming has completed and to turn power cycle the device.

Press "OK" to close the file transfer window, and then press "Close" to close the YModem Upgrade Manager.

9. Unplug the RDD-1580, then power back on to complete the upgrade process.

If at any time the update is interrupted or failed, or the unit does not respond after upgrade, try the procedure again.



Troubleshooting

It is important when selecting the com port for updates and RS232 communication to be aware of what com port is being used on the PC for the upgrade, whether it be a built in serial port on the PC, or a USB to serial adapter. Selecting the incorrect com port in an update program or an RS232 terminal will result in communication errors.

Common YModem error messages from incorrect com port settings are:

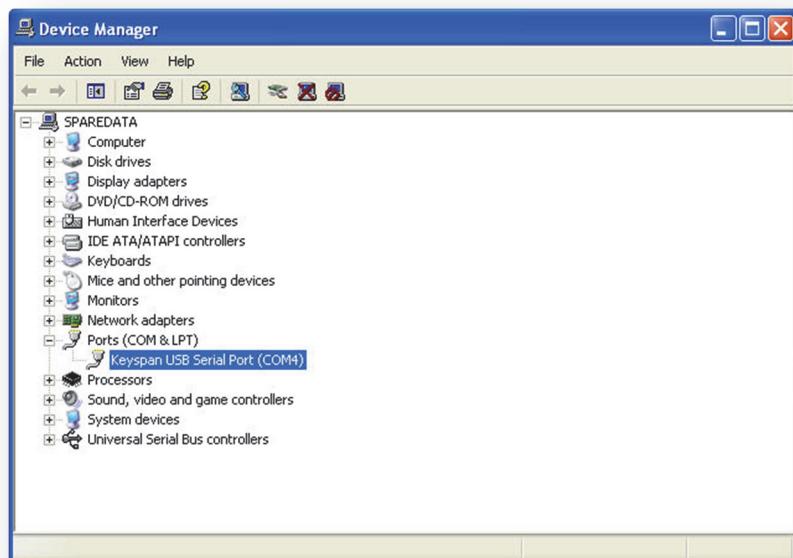
- **“Unable to connect. Please verify COM port information.”**

This error appears when selecting a com port that does not exist on the PC, or when the currently selected com port is in use by another program or device.

- **Solution:** Refer to the steps below for information on how to determine which com port the serial port is on, and how to change it if necessary. If the port is correct, close all open programs. Common programs that also use the serial port would be other terminal programs like HyperTerminal.

Use the following steps to confirm which com port the serial port or USB to Serial adapter has been installed to and if necessary, change it to a more suitable port.

1. From the desktop, right click on “My Computer”, and select Properties.
2. From the System Properties window, click on the Hardware tab, and select Device Manager.
3. From the Device Manager Window, look for the setting labeled Ports (COM & LPT), and click on the + to open this section. The USB to Serial adapter should be listed in this area, with the COM port in use listed in parenthesis next to it.



4. YModem allows selection of com ports 1-4 for updating. If the USB adapter has been installed to a port higher than com 4, the following steps can be used to change this.

Note: these instructions are for Keyspan USB to Serial adapters, other manufacturer's instruction may vary.

5. To remap the com port, from Device Manager right click on the USB to Serial adapter and select Properties.
6. From the properties window, click on Port Settings. Then click on Start Assistant to launch the Keyspan assistant program.



7. Once the Keyspan assistant program has launched, click on the Port Mapping tab. Towards the bottom of the window select the "COM port mapping for selected adapter port:" A drop down menu will list all of the available com ports on the computer in black, while those ports that are currently in use are grayed out. Select an available port, and close the assistant to save the changes.

