

# Uploading Firmware with SNUpload.exe

## Introduction

All SandNet devices support up-load of new application firmware over the network connection. The up-load utility and the latest firmware can be found in the download section of our website:

[www.sandsys.com/software](http://www.sandsys.com/software)

The files are packed in a .ZIP archive that maintains the integrity of the downloaded files. The archive may also include release notes or user documentation such as this. To open the archive, right-click on the filename and select “Extract All...” The upload utility file for device firmware upgrades is SNUpload.exe. It requires no installation process and will run under Windows XP, Windows Vista, or Windows 7 & 8.

The firmware file name for SandNet type devices will be in the format “ABC-X\_X\_X\_X.dli”, X\_X\_X\_X being the version number e.g. 2\_1\_2\_11. The ABC indicates that the firmware is for the AAA, BBB and CCC services of devices. Note that earlier versions of firmware may have been designed to run on a specific device and will have a different prefix. As of version 2.1.2.0, the same firmware image is used for both the SandBox AAA and SandPort AAA devices. As of version 2.1.2.8, the same firmware image is used for AAA, BBB and CCC devices.

Confirm that the firmware you want to upload is correct for your device and extracted from the .ZIP archive to the PC.

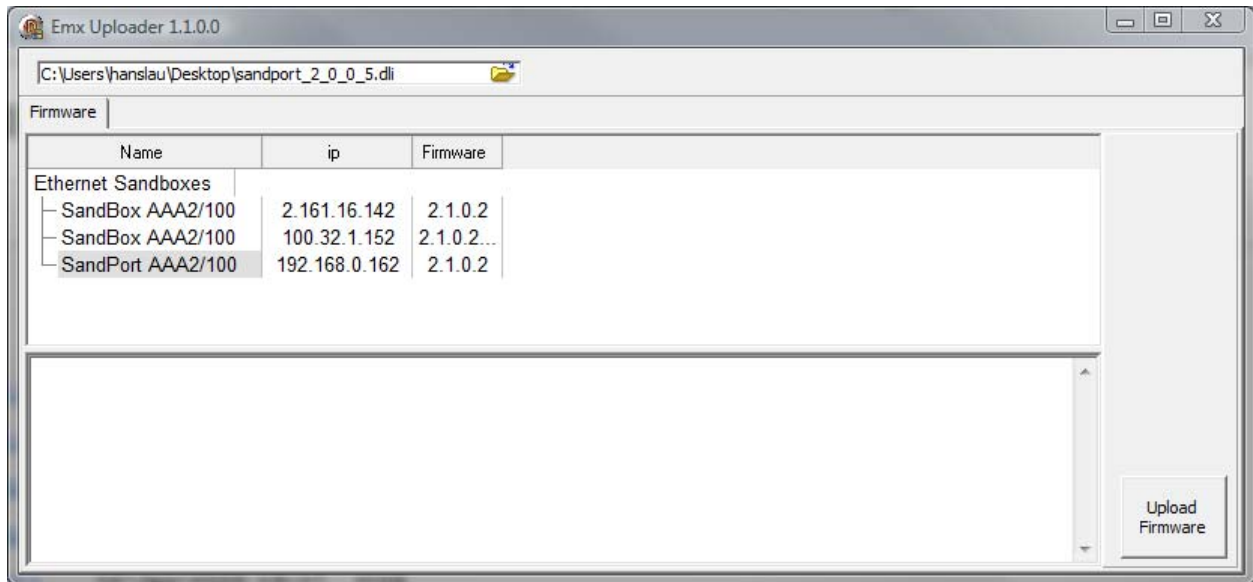
The PC running the SNUpload.exe application and the SandNet devices must be on the same local network and be in the same IP address range (aka “subnet”).

It is advisable to perform the firmware upload process with minimal other network traffic.

## Operation

Running the upload utility will bring up a window with a file select field at the top, and below that a list of all SandNet devices found on the network. The list will include the device user name, the IP address, the MAC address, and the current firmware version for each device.

[ Continued on page 2 ]



Note that even though the device was discovered, it may not be on the same local IP subnet as the PC. In the example above, each device is in a different IP range and it is doubtful that the update tool would be able to apply the firmware to all of the listed devices. The easiest way to make sure all devices are on the same network as the PC is to set the devices to use DHCP to automatically assign IP addresses. See the Sand Device Browser user manual for more information about using DHCP.

Click on the file icon in the file select field to bring up the open file dialog. Browse and select the desired firmware file and then click the OK button. This should bring the selected file name and path into the file select field. Note that the upload application cannot see firmware that is packed inside the .ZIP archive. You must extract the files in the archive as described on page 1.

Click on the SandNet device you want to upload the firmware to so that the background of one of its fields is dark gray; then click the “Upload Firmware” button. This must be done one-at-a-time for each device.

The lower window of the up-load utility will display in detail the ongoing process until it has finished. At that point the SAND device will light up it’s LEDs in sequence, reboot, and after a few seconds will restart with the new firmware.

If there was a problem reading the file or it was corrupted during the transfer, the device will reboot to the previous firmware, or indicate the error on the LEDs. If the problem persists, please contact us for possible remedies.