Zephyr Xstream update information (for version 3.8.3r) November, 2007

The following information applies to Zephyr Xstream units currently running a software version ending with "r" or "b" (Livewire capable units). If your Xstream is running a software version ending in "p" or "i" please download appropriate software and instructions from the Telos website for your unit.

Zephyr Xstream's software is stored on a re-programmable memory. To update your unit you will connect using a web browser. If you have never connected to your Xstream using a web browser, then please consult the manual. We advise you to contact Telos Customer Support (have your current software version and Serial number when you call) to discuss whether the latest version would better meet your needs.

I Downloading the software package.

First you must obtain the new software package. If this was emailed to you by customer support then simply save the file to your local hard drive using your email client. *Be sure to note where you saved the file,* as you will need to know this in section III, below.

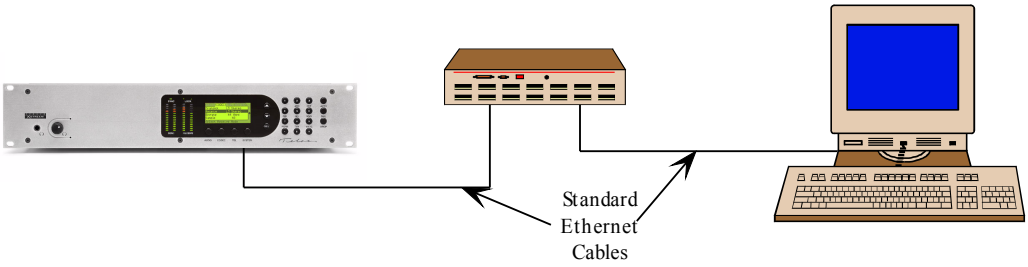
If you did not receive the file by email, you can download it from the Telos web site. Go to www.telos-systems.com . Click on "Support", then "downloads". Next click on the link for "Zephyr Xstream (update from "r" or "b" version)". Your browser will open a standard "save file" dialogue box. Choose a location to save the file and save it. *Be sure to note where you saved the file* as you will need to know this in section III, below.

II Connecting to the Xstream's web pages

Connections and Configuration

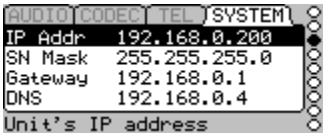
If you have never connected to your Xstream via web browser, you may need to make some connections and perform the following configuration steps:

1. Connect the computer to be used for the update and the Zephyr Xstream to the same Ethernet network. The following diagram shows the usual connections. Note that a direct connection between the Xstream and the computer may be made, if the appropriate Ethernet "Crossover" cable is used. See *Appendix 5* of the Xstream User's Manual for details on that cable.



2. Program the following information into your Zephyr Xstream. Ask your network administrator if you need help.

3. Press the <*SYSTEM*> button three times. You will see a screen that looks similar to the following:



Enter the following information in this menu:

IP Address–
The IP address for this unit. As with any computer on an IP network, the Xstream must have an IP address before it can be used over the network.

SN Mask–
The subnet mask is to determine the size of your local network. All packets addressed to a destination outside this local area are sent to the gateway node entered in the next selection. Normally you should enter 255.255.255.0 here.

4. Start the web browse on your computer and enter http://109.876.543.210/ (substitute the IP address of your Xstream) on your browser.

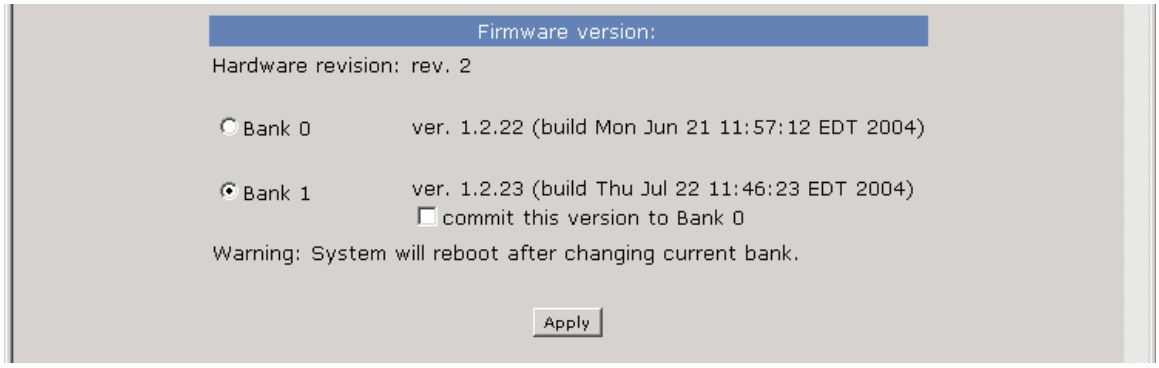
5. You will need to login in when prompted. For user name, enter `"user"`. Then for "password" type: `"Telos <Enter>"` (if this does not work use `"<Enter>"` alone).

The Xstream's HTML browser interface has been tested with the following browsers (others will probably work as well).

- Firefox (Windows) 1.01
- Internet Explorer (Windows) versions: 5.00, 5.5, and 6.0

III Saving, managing, and updating Xstream's software

Once you have logged into your Xstream's web page, you can manage your Xstream's software. First click on the *System Parameters* Button. You will see a screen with the lower half similar to the following:



The Xstream has the ability to hold 2 versions, one in "Bank 0" and the other in "Bank 1". New software is always downloaded to bank 1.

Saving Bank 1 Software

Software is always downloaded to bank 1 (the secondary bank). Downloading software (see below) will overwrite the software currently in this bank, if any. If you wish to save the software currently residing in bank 1, you can save it by moving it to bank 1 as follows:

1. Click on the *Commit this version to Bank 0* box (see below).
2. Click on *Apply*. The node will now reboot.

IMPORTANT! The node will reboot after you click *Apply* if you change the software version selected. This will result in loss of audio. In addition, this will reset your browser connection and you will need to reconnect.

Downloading new software

NOTE: The time to update a unit is somewhat variable, and in rare cases, *updating can take as long as 40 minutes!* While updating, power should not be removed, nor the unit reset, until at least an hour has been spent on waiting for the update to complete.

A new software version can be downloaded into bank 1 as follows:

1. Go to the Telos web site: www.telos-systems.com and download the desired software update to your computer (this should be the computer that you will use to access the node's web page) by clicking on the link. Your local computer operating system should display a prompt to permit you to choose

where you wish to locate the downloaded file. You can choose any convenient location, just be sure to note the drive and location where the file is to be saved.

3. Open a web browser and connect to the Xstream to be updated. At the bottom of the page, there should be a text field with a Browse... button next to it. If there is not, but there is a checkbox saying "commit this version to bank 0", check it and click *Apply* before continuing

4. Enter the complete path and file name for the software file (e.g. the file downloaded form the Telos site), or click on the *Browse* button to locate the file. Once the proper path and filename are displayed, click on *Open* to download the file to the Xstream. This will take at least several minutes, and up to 40 minutes, as stated above. Please be patient.

5. After a period of time, the page will refresh, giving you the current installation status of the update. Due to the nature of the update, the zxs2 web server may stop responding to your browser's requests. **This is normal.**

   If your browser reports that it cannot locate the server, or the server is not responding, **click on the location bar and hit enter**. ***Do not click refresh,*** as this will try to send the update package to the zxs2 again, starting the whole update process anew. If your browser warns you that it must resend a form submission, click cancel. You can always return to the software update status page by entering <IP address>/cgi-bin/cgi_sys in your browser's location bar (e.g. 192.168.0.233/cgi-bin/cgi_sys).

6. When the update is complete, the unit will reboot with the new software enabled. You will now this has happened if the Xstream's splash screen is displayed on the front panel LCD.

2. f you wish to return to your old software for whatever reason, go back to the *System Parameters* page (see above), click the radio button next to the bank featuring the desired software version, and click apply. Your zxs2 will reboot using the requested software.

   IMPORTANT! The Xstream will reboot after you click *Apply* when changing between software versions. This will result in loss of audio. In addition, this will reset your browser connection and will need to reconnect.

CUSTOMERS
UPPORT
BULLETIN

Telos Zephyr Xstream Software Release Notes

For 100 Base-T (Livewire enabled) hardware

Many users inquire what features are new in the latest firmware release. The following Release Notes show the improvements and features added with each significant release.

3.1.1r
August 2006
Initial release for 100 Base-T hardware

3.1.13b
August 2006
Beta version

- Updated to latest Axia Livewire components
- Added multicast TTL selection via command line parameter 'ipstreamttl'
- Fixed stuck 'disconnecting' state when disconnected non-existant call

3.2.13r
September 2006
Production Version

- Updated flash write and erase routines
- Fix rare small buffer leak in ISDN stack

3.3.0r
September 2006
Production Version

- Restore Factory Defaults now works as intended
- Fixed variable misassignments in mixer version

Zephyr Xstream Update Instructions

3.4.1r
January, 2007
Production Version

- Support for new versions of audio boards
- HTTP interface works with Internet Explorer
- HTTP form result pages may be refreshed safely, without resubmitting forms
- Level meters on mixer audio status screen correctly labeled
- Updated command-line interface to be compatible with Zephyr Remote
- rs232 menu option changes serial bitrate
    - Please note that some startup messages are still sent at 19200 before the application loads
- Swapped application and kernel telnet server ports:
    - Application command line is on default telnet port, 23
    - Kernel interface is now on port 24

3.4.4r
March 2007
Production version

- Remove +6dB gain on older mixer boards introduced in 3.4.1r
- Updating OS password via web page sets new password correctly

3.8.3r
November 2007
Production Version

- Transparent rs232 works with binary data
    - Eliminated stray/random characters when booting in transparent rs232 (see app note)
    - Transparent rs232 supports sustained data at 9600 bps
- Panic dials always dial, even if a call must be disconnected first
- Reset to factory defaults resets more, including system passwords and IP address
- RTP streaming enhancements:
    - Streams automatically reconnect on boot if last disconnect was not clean
    - Streams automatically reconnect after network failure
- Redial of last ISDN call in case of power failure is more reliable
- Rollover to ISDN on v.35 failure is more reliable
- Reduce screen flicker when changing menus
- Various cosmetic fixes and enhancements to HTTP interface
- Submitting forms on autodial web page without select an item no longer corrupts list
- Fixed occasional wrong audio channel assignment in G.722
- Updated INS-64 redial rules to match current standards