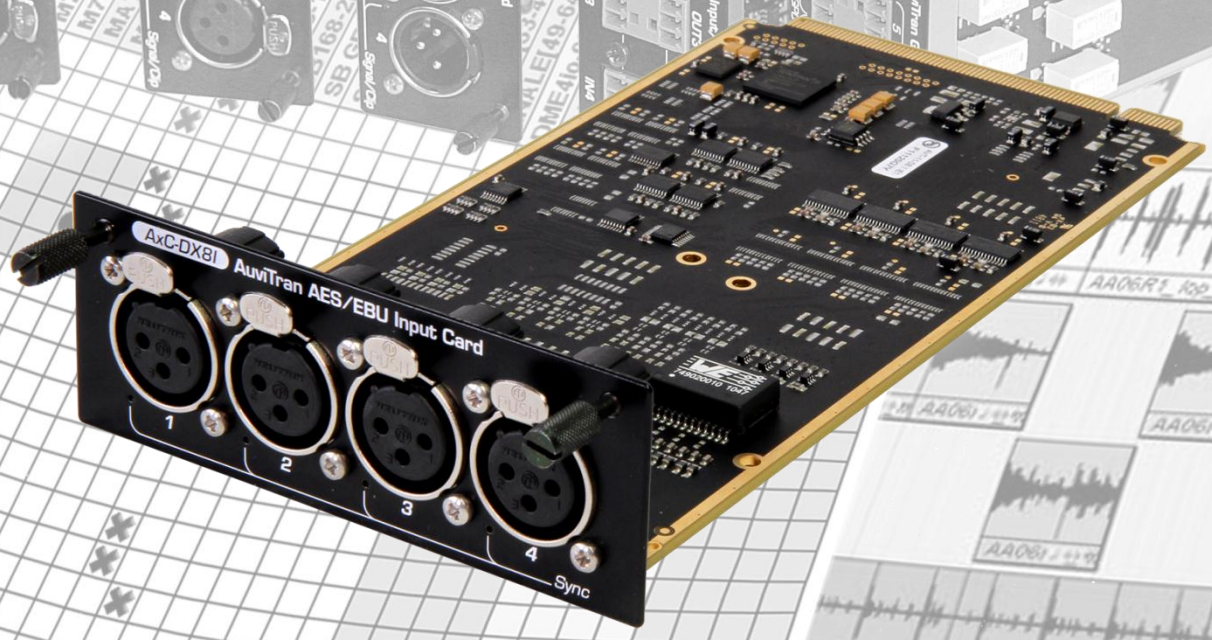
AuviTran

AuviTran Audio ToolBox

AxC-DX8I

Instruction Manual

AES/EBU 4x Stereo Digital Input Card



for Audio ToolBox Platform

Version 1.1

WARNING

Always follow the basic precautions listed below to avoid the possibility of serious injury or even death from electrical shock, short-circuiting, damages, fire or other hazards. These precautions include, but are not limited to, the following:

PRECAUTIONS

- Do not apply excessive pressure on connectors or any other part of the board. Do not touch the metallic sharp parts (pins) of the product.
- This product is electrostatic sensitive; make sure you check this before touching or using it.
- The disconnect devices of the Audio ToolBox unit are the appliance inlet of the auxiliary power supply and the appliance inlet on the rear side of the unit. These must be easily reachable.
- To prevent electric shock, unplug the unit before handling. The achievement of other operations not mentioned in this document is prohibited. Repairs can be performed only by a technician trained and qualified.
- Each connection must be Safety Extra Low Voltage kind (SELV), and must stay inside buildings.

LIMITATION OF LIABILITY

In no case and in no way, the provider of this Product (AuviTran, the distributor or reseller, or any other party acting as provider) shall be liable and sued to court for damage, either direct or indirect, caused by and to the user of the board and which would result from an improper installation or misuse of the Product. “Misuse” and “improper installation” mean installation and use not corresponding to the instructions of this manual.

Please note that graphics given in this manual (drawings and schemes) are only examples and shall not be taken for a real vision of your own equipment configuration.

AuviTran is constantly working on the improvement of the products. For that purpose, the products functionalities are bound to change and be upgraded without notice. Please read carefully the User’s manual as the new functionalities will be described therein.

TRADEMARKS

All trademarks listed in this manual are the exclusive property of their respective owners. They are respected “as is” by AuviTran. Any use of these trademarks must receive prior approval of their respective owners. For any question, please contact the trademark’s owner directly.

COPYRIGHT

The information in this manual is protected by copyright. Therefore, reproduction, distribution of whole or part of this manual is strictly forbidden without the prior written agreement of AuviTran.

AUVITRAN WEBSITE / MORE INFORMATION

Please visit our website for any question of further inquiry concerning our product range. Updates will also be posted when available.

http://www.auvitran.com

PACKAGE CONTAINS

- 1 AxC-DX8I card + Thumbscrews

TABLE OF CONTENTS

PRECAUTIONS 2
LIMITATION OF LIABILITY 3
TRADEMARKS 3
COPYRIGHT 3
AUVITRAN WEBSITE / MORE INFORMATION 3
PACKAGE CONTAINS 3
1 WELCOME! 5
2 OVERVIEW 5
3 TECHNICAL SPECIFICATIONS 6
4 FRONT PANEL / WIRING 7
5 CARD INSERTION / EXTRACTION 7
6 SOFTWARE REMOTE CONTROL 8
1-1 DEVICE CONTROL 8
1-2 DEVICE SETUP 9
7 FREQUENTLY ASKED QUESTION 10

1 WELCOME!

Thank you for purchasing AuviTran's Audio Toolbox AxC-DX8I extension card. We hope you will enjoy using it.

You will find herewith the necessary instructions to use your product. Please read them carefully as misuse of this device might cause serious damage to you and your environment.

2 Overview

AxC-DX8I card provides AES/EBU digital inputs interfaces to the AuviTran Audio ToolBox platform.

AxC-DX8I features four stereo AES/EBU digital inputs on XLR connectors. All inputs can be individually used with on board high precision "SRC" (Sample Rate Converter) for solving multi sampling rate input frequencies and synchronisation issues.

Combined with other AuviTran Audio ToolBox cards, the AxC-DX8I card opens exciting possibilities to the professional audio systems:

- EtherSound – AES/EBU converter
- MADI – AES/EBU converter…
- DANTE– AES/EBU converter…

3 Technical Specifications

General	
Size	200 mm x 100 mm x 40 mm – Format AuviTran Audio ToolBox platform cards
Power Supply	+12V / +3.3V Through AuviTran Audio ToolBox backplane
Storage: Temp / Humidity	- 5°C to 70°C / 0% to 95% (non-condensing)
Operating: Temp / Humidity	0 °C to 50°C / 5% to 90% (non-condensing)
Connectors	4 x female XLR connectors for the AxC-DX8I card

AxC-DX8I Audio Inputs	
Number of inputs	4 Stereo AES/EBU digital inputs routed through the AuviTran Audio ToolBox backplane from the other cards

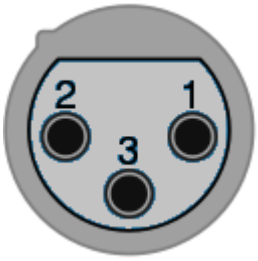
AxC-DX8I - Audio Inputs Specifications	
Sampling Frequency	44.1 kHz / 48 kHz
Sampling resolution	24 bits
Input Impedance	110Ω
Input Specification	AES Transformer balanced on XLR Female connectors
Clock Synchro Sources	All AES Inputs
SRC Sample Rate Converter	Asynchronous SRC available on each input (individually on / off)
SRC Specifications	-140dB THD+N / Frequency Range 8 kHz - 192 kHz

Control and Monitoring Environment	
Audio ToolBox platform	AxC-DX8I is a card designed for the AuviTran Audio ToolBox platform
AVS-ESMonitor	AVS-ESMonitor enables to remotely set, control and monitor an EtherSound network and provides enhanced control pages to manage the AxC-DX8I specific parameters.
OS Supported	Windows 8 / Seven / Vista / XP for 32 or 64 bit versions

4 FRONT PANEL / Wiring

AxC-DX8I front panel with 4 XLR female

XLR 3 Female Connector



1 = Ground
2 = Hot Pin (+)
3 = Cold Pin (-)

5 CARD Insertion / Extraction

Please refer to AuviTran Audio Toolbox AVBx3 or AVBX7 rack user's manual in order to known how to insert/extract your card properly.

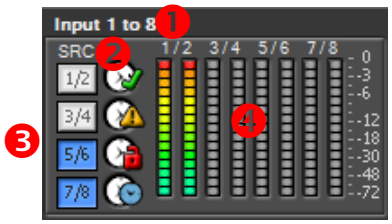
6 Software Remote Control

1-1 Device control

AuviTran's **AVS ESMonitor** software allows you to remote control your Audio Toolbox device, and thus your AxC-DX8I. For general AVBx3 or AVBx7 rack remote control features, please refer to AuviTran Audio Toolbox AVBx3 or AVBx7 rack user's manual.

AxC-DX8I control interface

Each block of 4 stereo input channels has its own parameters that can be set individually:



Channel setup

❶ Channel setup indicator

❷ AES input status:

Unlock
Lock but not synced
Lock and synced
Lock and SRC active

❸ SRC status:

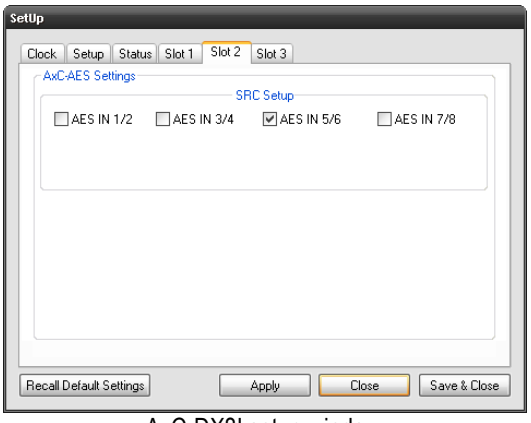
ON
OFF

❹ Channel meter (dBFS scale)

NOTE : If AES input clock is selected as clock master and SRC is selected on the same AES Input, in this case, as system is synchronous to this input, SRC is not necessary and so, it is bypassed. (but SRC remains selected)

1-2 Device setup

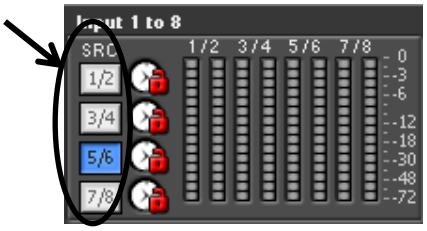
Advanced parameters for AxC-DX8I device can be defined using dedicated setup window:



AxC-DX8I setup window

SRC Setup can be set ON (Checked) /OFF (Unchecked) for each stereo AES input. In sample window above, only AES Input 5/6 has SRC set to ON.

SRC can also be enabled / disabled by clicking on the SRC status button



7 Frequently Asked Question

- AVS-ESMonitor how to use rotary control?

Rotary control layout

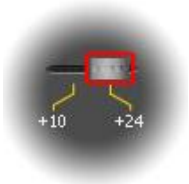
Rotary control is designed to be easily controlled with a mouse. First way to interact with control is to left-click on control center and:

- Move the mouse while holding click to the top-right corner (red arrow) to increase value.
- Move the mouse while holding click to the bottom-left corner (blue arrow) to decrease value.
- Other mouse movement will have no action.

Second way to interact with the control is to place mouse over and

- Use the mouse-wheel up and down to respectively increase or decrease value more precisely.

- AVS-ESMonitor how to use slide control?



Slider control layout

Slider control is designed to be intuitively controlled with a mouse. Place mouse cursor over knob (red zone), left click and while holding mouse clicked, slide to desired value and released left click.