# AUREON 5.1PCI

Manual (English)

Version: 6/5/2007

**CE Declaration** 

We:

TerraTec Electronic GmbH, Herrenpfad 38, D-41334 Nettetal, Germany

hereby declare that the product:

SoundSystem Aureon 5.1 PCI

to which this declaration refers is in compliance with the following standards or standardizing documents:

1. EN 55022

2. EN 50082-1

The following are the stipulated operating and environmental conditions for said compliance:

residential, business and commercial environments and small-company environments.

This declaration is based on:

Test report(s) of the EMC testing laboratory

H. Cler

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### Contents

Layout of the card
Hardware installation5
Installing the card5
Connecting a speaker system to your Aureon 5.1 PCI sound card7
Installing the drivers on current operating systems8
Installing the drivers and Control Panel (XP / Vista)8
The control panel for Windows Vista 32 and Vista 649
THE CLASSIC: Aureon 5.1 PCI Control Panel for Windows XP 3219
FAQ25
Support25

Dear Customer,

In the following Quick Reference Guide, replace "<CD>" with the drive letter assigned to your CD-ROM drive.

# Layout of the card



Listed from top to bottom:

- 1. Microphone In
- 2. Line In
- 3. Line Out 1 (Front) / Headphone Out
- 3. Line Out 2 (Rear)
- 3. Line Out 3 (Center / Sub)
- 4. Digital In
- 5. Digital Out

## Hardware installation

## Installing the card

Before installing the sound card in your computer, please note the details of your computer's configuration. Also refer to the manual of your computer and other expansion cards for their settings.

Please observe the following instructions to ensure a trouble-free installation.

If you are still having problems, please call our service hotline. The telephone number and operating hours of the hotline are on the included customer service card.

Start by making sure that nothing is missing:

- 1 PCI sound card TerraTec SoundSystem Aureon 5.1 PCI
- 1 installation and driver CD
- 1 registration card with the product serial number
- 1 customer service card.

Please fill out and return the registration card to us at your earliest convenience or register online at <u>http://www.terratec.net/register.htm</u>. This is important for support and hotline services.

#### Safety note.

Before opening the case, unplug the AC power cable from the wall socket as well as from the PC.

#### And here's what to do, step by step:

- Switch off your PC and all connected peripheral devices such as your printer and monitor. Leave the AC power cable connected for the time being, so that your computer is still grounded.
- Touch the metal chassis at the rear of the PC to ground and to discharge static. Now unplug the cord from the AC socket.
- Remove the cover from the case of your PC.
- Look for a free PCI expansion slot. (To ensure the optimal function of your Aureon 5.1 PCI, look for an expansion slot that is not immediately next to an already-installed card. Some cards, such as graphics cards, can send out signals that can interfere with the sound card.) Unscrew the screw that fastens the slot blanking plate and remove the plate.
- Carefully remove the sound card from its packaging and pick it up by the edges with one hand while your other hand is touching a metal part of the PC. This will ensure that your body is completely discharged of static electricity via your computer without charging the sound card. Do not touch the components of the card under any circumstances.
- Determine the function of port **(**):



- Align the holder at the rear of the sound card in the expansion slot in such a way that the card's gold connectors are directly in line with the slot's socket.
- Insert the card into the slot. You might have to press the card firmly into the slot to make good contact. Take care to ensure that the contacts are exactly in line. If they are not, you could do damage to the sound card or your computer's motherboard.
- Insert and tighten the screw from the slot blanking plate to secure the sound card in its slot.
- Reinstall the cover of your PC case.
- Connect your speakers or stereo system to the sound card.
- Reconnect the AC power cable as well as all other cables. Make sure that your speakers or HiFi system is set to low volume. Start your computer.

## Connecting a speaker system to your Aureon 5.1 PCI sound card

You can connect any commercially available active speaker system to your Aureon 5.1 PCI sound card.

Ensure that the front port is configured as "Line" using JP1.

Below is an illustration of the typical connection for a 6-channel (5.1) speaker system (the required 2x cinch [RCA] to 3.5 mm jack connecting cables are normally included with your speaker system, such as TerraTec HomeArena products).

To connect a 4-channel speaker system, use only the front and rear ports. For a 2 or 2.1channel speaker system, use only the front port of the sound card.



After installing the drivers and software, select the correct speaker configuration in the Aureon 5.1 PCI Control Panel (see the chapter on "The Aureon 5.1 PCI Control Panel").

## Installing the drivers on current operating systems

The current drivers are intended for the following operating systems:

- Windows XP 32
- Windows XP 64
- Windows Vista 32
- Windows Vista 64

## Installing the drivers and Control Panel (XP / Vista)

After the computer has been restarted, you're logged in as administrator and Windows XP / Vista detects the new hardware using the Add New Hardware Wizard, the following window displays.

Windows XP

Found New Hardware Wizard	Found New Hardware
Welcome to the Found New Hardware Wizard	Windows needs to install driver software for your Multimedia Audio Controller
This wizard helps you install software for:	and second and the second and the second s
Multimedia-audiocontroller  If your hardware came with an installation CD or floppy disk, insert it now.	Locate and install driver software (recommended) Windows will guide you through the process of installing driver software for your device.
What do you want the wizard to do?	Ask me again later Windows will ask again the next time you plug in your device or log on.
Instail the software automatically (Hecommended)  (instail from a list or specific location (Advanced)  Click Next to continue.	Don't show this message again for this device Your device will not function until you install driver software.
< <u>Back</u> <u>Next</u> > Cancel	Cancel

Insert the Aureon 5.1 PCI Software CD into your CD/DVD drive. If the installation wizard does not start automatically, run **<CD>:\Autorun.exe** manually.

In the installation wizard, first select your desired menu language and then click "Software Installation". Start the setup by clicking "AUREON 5.1 PCI".

Alternatively, you can also start "Setup.exe" manually from the folder **<CD:\Software\TerraTec.** Simply follow the instructions on the screen.

In the following dialog box, Windows Vista will inform you that the "Aureon 5.1 PCI" driver did not pass the "Windows Logo test". Click "Continue Anyway" and then "Finish" to complete the installation.

# The control panel for Windows Vista 32 and Vista 64

#### System input

This defines the number of channels that go directly to the sound card. Click the question mark to view more information.

Main Setting Effect Information		
System Input		
2 CH	- ?	File Type MP3 CD VCD Way WMA
2 CH		
4 CH		요
6 CH		
	i	
Output Mode		
Output Mode		Fon
Dutput Mode Analog Dutput		Toutput Device
Output Mode Analog Output 2 Speakers		For Dutput Device
Output Mode Analog Output 2 Speakers Digital Audio 48 KHz		Dutput Device
Output Mode Analog Output 2 Speakers Digital Audio 48 KHz G S/PDIF Output	•	Dutput Device
Output Mode Analog Output 2 Speakers Digital Audio 48 KHz S/PDJF Output PCM	• •	Dutput Device

#### Speakers

Set the speaker configuration you want to use here. Whenever you make a change, the 3D model of the speakers changes accordingly. This setting defines the number of analog outputs.

2 CH -	?	File Type MP3,CD,VCD,Wav,WMA.,
Output Mode		7 2 <b>6</b>
Analog Output		Output Device
6 Speakers -		
Headphone		
2 Speakers		
6 Speakers		
PCM		

#### PCM, sampling frequency and S/PDIF in/out loopback

You can enable "PCM" from the drop-down-menu for the S/PDIF output. You can also select the sampling frequency and S/PDIF in/out loopback. The S/PDIF loopback is a direct loopback of the signal from the S/PDIF input and brings the signal to the S/PDIF output.

Sampling frequency



 Warsostin Effect Viornation

 System Input

 2 CH

 Pie Type

 MP3, CD, VCD, Way, WMA,

 Output Mode

 Analog Output

 2 Speakers

 Digital Audio 44,1 KHz

 Pigital Audio 44,1 KHz

# Environment

You can use this menu to simulate sound effects. Have fun experimenting with different settings!

Main Setting Effect Information	
Environment	Equalizer

#### **Environment Size**

Select the size of the room in which you have set up the 5.1 speakers. This selection adjusts the volume to the room.

Main Setting Effect Information					
Environment	I	Equalizer			
More of Generic	options	20 dB 0 dB -20 dB 30	60 120	250 500 1K Frequency	2K 4K 8K 16K
Environment Size	::	D T Sot	efault reble t-Rock Rap er defined	Dance Live Jazz Classic	Bass Rock Metal Vocal

#### Equalizer

Using the integrated equalizer, you can increase or attenuate audio signals in 10 frequency bands to emphasize bass or treble.

Main Setting Effect Information			
Environment More options Generic •	Equalizer 20 dB 0 dB -20 dB 30 60 120	250 500 1K Frequency	2K 4K 8K 19K
Environment Size	Default Treble Soft-Rock Rap User defined	Dance Live Jazz Classic	Bass Rock Metal Vocal
			ОК

#### Information

The last tab displays general information about the application. It also allows you to choose whether or not to display the icon for starting the Control Panel in the taskbar.

lain Setting Effect Info	mation		
VS	how the audio configuration	i icon in the system tray	
	3D Audio Engine:	Xear3D CRL3D EAX2.0 A3D1.0	
	Audio CODEC :	CMI8738	
	Audio Driver Version :	5.12.01.0008.15.06	
	Audio Controller :	C-Media Audio Controller	
	DirectX Version :	DirectX 10.0	
	Tom Too Aum	an Control Parcel Vor 1.0.49.46	
	Copyright (C)	1994 - 2007 TerraTec GmbH	
	UF	L: www.terratec.net	

# The Control Panel for Windows XP 32 and XP 64

#### Speakers

Set the speaker configuration you want to use here. Each change is reflected in the 3D model of the speakers and the jack configuration. This setting defines the number of analog outputs.

🚟 Aureon 5.1 PCI	
Main Setting Mixer Effect Information	
Output Device	
🔞 🗛 Analog Output	
S/PDIF Output	Mail
Digital Audio 44.1 KHz 😽	
2CH_ЛЛД 44.1 KHz	
Audio Jack	]   / 🕒 🔪
Jack Configuration	
	S/BDIE Data Decoder
	<b>X</b> •
	ОК

#### The jacks

The jacks have the same colors as those on your physical sound card, as described on page 4.

1. Microphone input	Pink	
2. Line input	Blue	0
3. Line output 1 (front speakers) / headphone out- put	Green	0 0 0 0
3. Line output 2 (side/rear speakers)	Green	
3. Line output 3 (center speakers/subwoofer)	Green	
4. Digital input S/PDIF (Toslink)	Square /	
	Black	
5. Digital output S/PDIF (Toslink)	Square /	
	Black	

#### PCM, sampling frequency and S/PDIF in/out loopback

From the drop-down menu for the S/PDIF output, you can select the sampling frequency or S/PDIF in/out loopback. The S/PDIF loopback is a direct loopback of the signal from the S/PDIF input and brings the signal to the S/PDIF output.



#### Individual volume

Using the volume controller in the 3D image, you can configure the volume of each individual speaker separately.



#### Self-test

You can begin or end the speaker self-test using the play or stop button.



#### Master

You can adjust the volume of each individual input here. The master fader controls the sum of all inputs and gives you the ability to mute using the MUTE button or adjust the volume of the speakers using the faders.

器 Aureon 5.1 PCI	
Main Setting Mixer Effect Information	
Volume Wave SW Microp CD Aux Line In	
Synth Player	
SPDIF In Stereo Microp CD Aux Line In Wave Mix Player	
	ОК

Click the hammer next to the mute button to amplify (boost) the microphone signal. The boost function is explained on page **Fehler! Textmarke nicht definiert.**.

#### Record

In the "Record" window, you can set the signal source for a recording and its gain.

S/PDIF is a digital signal that does not allow gain control.

響 Aureon 5.1 PCI	
Main Setting Mixer Effect Information	
Voluli Balance Volume V	
RECONSTRUCTION OF Aux Line In Wave Mix Player CONTRACTOR OF CONTRACTOR OF CONTRACTOR CONTRACTOR OF CONTRACTOR OF CONTRACTOR CONTRACTOR OF CONTRACTOR OF CONT	
	ОК

Click the hammer next to the mute button to amplify (boost) the microphone signal. The boost function is explained on page **Fehler! Textmarke nicht definiert.**.

#### Environment

You can use this menu to simulate sound effects. Have fun experimenting with different settings!

🚟 Aureon 5.1 PCI	
Main Setting Mixer Effect Information	
Environment	Equalizer
More options       Generic       Generic       Connection       Padded cell       Room       Living room       Auditorium       Cave       Arena	20 dB 0 dB -20 dB 30 60 120 250 500 1K 2K 4K 6K 16K Frequency
Environment Siz Carpeted hallway Hallway Solution City Mountains Quarty Plain Parking lot Sewer pipe Blured Dizay Psychotic	Default Dance Bass Treble Live Rock Soft-Rock Jazz Metal Rap Classic Vocal User defined
	ОК

#### **Environment Size**

Select the size of the room in which you have set up the 5.1 speakers. This selection adjusts the volume to the room.

Main Setting Mixer Effect Information	
Environment More options Seneric	Equalizer
Environment Size	Default Dance Bass Treble Live Rock Soft-Rock Jazz Metal Rap Classic Vocal
	ОК

#### Equalizer

Using the integrated equalizer, you can increase or attenuate audio signals in 10 frequency bands to emphasize bass or treble.

Aureon 5.1 PCI	
Main Setting Mixer Effect Information	Equalizer 20 dB 0 dB -20 dB -20 dB 30 60 120 250 500 1K 2K 4K 8K 16K Frequency
Environment Size	Default Dance Bass Treble Live Rock Soft-Rock Jazz Metal Rap Classic Vocal User defined
	ОК

#### Information

The last tab displays general information about the application. It also allows you to choose whether or not to display the icon for starting the Control Panel in the taskbar.

ain Setting Mixer	Effect Information		
٦	Show the audio configurat	ion icon in the system tray	
	3D Audio Engine:	Xear3D CRL3D DS3D EAX2.0 A3D1.0	
	Audio CODEC :	CM18738	
	Audio Driver Version :	5.12.01.0008.15.06	
	Audio Controller :	C-Media Audio Controller	
	DirectX Version :	DirectX 8.1b	
	TerraTec Au Copuright (	reon Control Panel Ver.1.0.48.46	
	Copyngris (	JRL: www.terratec.net	

# THE CLASSIC: Aureon 5.1 PCI Control Panel for Windows XP 32

#### The classic

For all customers who are still using the old driver for Windows XP, following is an explanation of the Control Panel in Windows XP 32. The last version of the Control Panel is available from **www.TerraTec.net**.

#### Master

Here you can set the levels of the individual speakers. The sliders marked "Front" are likely to become worn by frequent use - you use them to control the volume of the two front speakers.

The master slider controls the total of all outputs and can also be silenced by pressing the MUTE button.

🛿 Aureon 5.1 Fun Mixer				<u>_   X</u>
Master Source	es <u>R</u> ecord Speake	ers <u>D</u> igital	Misc	
Master	Speaker Volumes			
				- 🗖 -
] = [] Mute	  	  	-	-

#### Sources

Here you can set the levels of the individual signal sources.



All signal sources can be muted by pressing the MUTE button. They will still be recorded if you have explicitly selected the source.

Adjust the position of the stereo image with the balance faders below the level faders.

#### Boost! button

This button is connected to the microphone input and can amplify the input signal up to 20 dB when it is activated.

#### Record

In the Record window you can set the signal source that you want to record and its volume. Press the "Mix" button to record all available sources simultaneously.



S/P-DIF is a digital signal that does not allow volume control.

#### Speakers

You can make the following settings here:



#### **Speaker Configuration**

Set the speaker configuration that you want use here.

You can activate every single speaker separately here to test them for correct wiring and function. If you click on a speaker to activate it, you will hear static from that speaker.

#### S/P-DIF Output

This button enables and disables the digital audio output.

The digital output can only be enabled in "Stereo Speaker" or "Headphone" mode.

#### Direct Sound Accelerator (Direct Sound Accel.)

You can set the Direct Sound hardware acceleration here. This setting should generally be set to maximum.

#### Virtual 5.1 Speakers and reverberation

Enable and select the Hall effect here.

#### Digital



#### Output:

Use the "Enable" button to enable or disable the digital output. The digital output can only be enabled in "Stereo Speaker" or "Headphone" mode.

You can also select the sampling frequency that you want to use.

Input:

#### LoopBack

This button loops the digital input to the digital output.

#### Monitor

The signal from the digital output is looped to the analog output here.

#### Validity Detection

When this is enabled, a check is made for a valid S/PDIF signal.

#### Copyright protection

If this field is enabled, the signal output at the digital output has a copy bit. This means that if you record a digital signal while copyright protection is enabled, no further recordings can be made from this signal.

Misc.



#### Presets

You can save the settings made in the control panel as profiles and load the profiles.

Misc.

#### Color Setup

You can set the colors of the control panel to your taste here.

#### Show Taskbar Icon

If this is enabled, the control panel icon of your sound card will be shown on the taskbar.

#### Language selection

The display language of the control panel can be changed with the drop-down menu.

#### About

This window shows the driver and control panel version installed on your computer.

## FAQ

The FAQ about the Aureon 5.1 PCI can also be easily shown via the Autostarter. Double-click **AUTORUN.EXE** in the root folder of the Aureon 5.1 PCI CD and select the "FAQ" menu item.

## Support

For more information on the TerraTec hotline, our BBS and Internet presence, please refer to the included customer service card.