

# SoundSaver

## Quick Start Guide

Version 1.0

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+1-707-782-1865

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+1-707-782-1865

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US: 1-800-775-BIAS (2427)

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SoundSaver uses TagLib (<http://developer.kde.org/~wheeler/taglib.html>), LAME ([www.mp3dev.org](http://www.mp3dev.org)), and libsndfile, released under the GNU Lesser General Public License, either version 2.1 or optionally version 3 (<http://www.gnu.org/copyleft/lesser.html>).

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## Credits

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### Quick Start Guide:

Zac Wheatcroft

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# Chapter 1:

## Introducing SoundSaver

### Welcome!

Thank you for purchasing BIAS SoundSaver!

SoundSaver is the simplest way to digitally record and clean up your old records and tapes – and create high-quality digital files for use in iTunes, portable media players, or for burning to audio CD.

SoundSaver uses the same acclaimed digital audio technology found in BIAS' professional recording, editing, processing, and mastering tools. You've probably heard many songs and sound effects on CDs, on the radio, and in your favorite movies – that were created using BIAS audio software.

SoundSaver packages this advanced technology in a very easy-to-use application, that's simple enough for anyone to use and achieve amazing results.

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### SoundSaver Features:

- Records audio from your tape deck or turntable\* through your computer's built-in audio input – or through many popular third-party sound cards and audio interfaces.
- Manual and automatic input level control
- Adjustable output level control
- High-precision input level meters
- Record monitoring (listen while you record)
- Record timer lets you record for a specified amount of time
- Insert Markers during recording
- Append to current recording
- High-precision audio waveform display with integrated timeline
- Adjustable waveform zoom level
- Simple transport controls (Play/Pause, Previous Track, Next Track, etc.)
- High-precision counter display (Hours:Minutes:Seconds:Milliseconds)
- “One-click” broadband noise reduction/removal with “Learn” function – allows automatic noise reduction/removal
- 50 & 60 Hz hum reduction/removal
- Rumble reduction/removal
- “Preserve Voice” – specialized filtering for voice-based media files
- Click & Crackle reduction/removal
- Audio enhancement allows tone enhancement when working with degraded media sources, such as old audio or video cassettes or vinyl records
- Automatic track definition – cuts recordings into tracks based on audio level, ideal for working with recordings of typical commercially produced records and tapes with clearly defined gaps between tracks
- Manual track definition – cuts recordings into tracks manually – perfect for working with continuous-play DJ mixes, live concerts, or classical music

- Opens AIFF, WAV, and SoundSaver Project files
- ID3 metadata tags for MP3 file export
- Export finished projects as individual MP3 tracks, export tracks to iTunes, export uncompressed WAV files for burning audio CDs, or as SoundSaver projects for later editing/transfer to another computer
- Integrated localized tool tips



*Non-USB turntables require use of a phono pre-amp.*

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## Who is SoundSaver designed for?

SoundSaver is designed for anyone who wishes to quickly and easily record their records and tapes into a digital format – and clean up clicks, crackles, pops, broadband noise, and hum.

SoundSaver's advanced technology and simple user interface make this process easy enough for anyone with basic computer skills to convert their analog media into a digital format.

With its few intuitive controls, you can learn how to use SoundSaver in just a few minutes – and you'll quickly see why SoundSaver is perfect for anyone!

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## Minimum System Requirements

Your computer must meet certain minimum performance requirements in order to use SoundSaver.

### **Mac:**

- G4, G5, or Intel-based Mac ( $\geq$  1 GHz processor recommended)
- Mac OS X v.10.4.11, 10.5.8, and 10.6.4 or later
- 1.25 GB RAM
- 25 MB available disk space

### **Windows:**

- Intel CPU (P4 or greater), or AMD Athlon CPU, with SSE instructions ( $\geq$  1.5 GHz processor recommended)
- Windows 7, Vista, or XP (SP3)
- 2 GB RAM for Windows 7 or Vista; 1 GB RAM for XP
- 55 MB available disk space

### **Both:**

- Hard drive with 8 ms (or faster) access time
- 10 MB/minute available disk space for recordings
- QuickTime 7 or greater (for opening certain file types, such as MP3)

For the most up-to-date info, please visit:

<http://www.bias-inc.com/soundsaver/>

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## About Your Quick Start Guide

SoundSaver is designed to be simple and intuitive. This guide is designed to help you set up and use SoundSaver as quickly as possible.

This Quick Start Guide assumes that you are familiar with standard Mac and/or Windows operating techniques, including:

- Setting up, starting, and using your computer
- Installing & authorizing software
- Choosing commands from menus
- Double-clicking, selecting, shift-selecting, and dragging with the mouse
- Opening, copying, saving, and deleting files
- Opening, closing, scrolling, moving, re-sizing, and selecting windows



If you don't know how to perform these tasks, please refer to the documentation that was included with your computer, and spend a little time learning about your operating system before going any further. This will make using SoundSaver much easier and more enjoyable.

The sections in your SoundSaver Quick Start Guide are arranged in the order in which you would typically perform tasks to remove unwanted noise from your media.

- Chapter 1 introduces you to SoundSaver and explains some of the requirements for using it
- Chapter 2 explains how to install, register, and authorize SoundSaver
- Chapter 3 explains the various features in SoundSaver and how they are used to record and edit audio, how to reduce/remove noise, and how to export a finished product
- Appendix 1 includes a list of SoundSaver keyboard shortcuts

A tutorial video is also available on the BIAS website:

<http://www.bias-inc.com>



*Look for important tips and notes whenever you see this exclamation mark!*

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## Conclusion

Now that you know a little about SoundSaver, proceed to the next section to learn how to install and authorize your software.

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# Chapter 2: Installation, Registration, and Authorization

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## Installing SoundSaver

SoundSaver's auto-installer software makes installation very easy. The steps below will guide you through the process.

### Your complete SoundSaver system consists of:

- CD-ROM installer
- Serial number
- Authorization File



*Before you install SoundSaver, please check the Minimum System Requirements on Page 8.*

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### To install SoundSaver on a Mac:

1. If you are using any virus protection software, turn it off or temporarily remove it, and restart your Mac.
2. Insert the SoundSaver installer CD-ROM into your CD-ROM drive – when its icon appears on your computer's desktop, double-click to open it and start the installer.
3. The Installer will prompt you about running a program to determine if SoundSaver can be installed – click Continue when this appears.
4. When the Installer dialog appears, click the Continue button.
5. Read the Software License Agreement – then click the Continue button to proceed.
6. Click the Agree button if you agree to the terms of the Software License Agreement.

7. Select the hard drive/volume on which you wish to install SoundSaver, and click the Continue button.
8. Click the Install/Upgrade button (depending on the configuration of your user account, you may need to enter your account password. If prompted for your password, enter it and click the OK button. If you do not know your account password, please contact your system administrator for assistance).
9. When the installation is complete, a message will appear indicating that the installation was successful. Click the Close button to quit the Installer.



*Be sure to turn back on any virus protection software you may have disabled during installation!*

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### What SoundSaver installs on Mac systems:

The SoundSaver installer places a number of files on your computer. The files and install location are described below:

#### SoundSaver Application

The SoundSaver application is placed into your system's Applications folder:

/Mac HD/Applications/

## Documentation

An electronic (PDF format) version of the SoundSaver User's Guide, and a Read Me file with late-breaking information are both installed into:

/Mac HD/Library/Documentation/BIAS/SoundSaver/

### BIAS Authorization Manager

The BIAS Authorization Manager is an application that allows you to authorize and deauthorize your BIAS software. It is installed into your Applications folder:

/Mac HD/Applications/

#### **To install SoundSaver on a Windows PC:**

1. If you are using any virus-protection software, turn it off or temporarily remove it, and restart your computer.
2. Insert the SoundSaver Installer CD-ROM in your CD-ROM drive. If the SoundSaver Setup program does not automatically launch, double-click the Install SoundSaver icon.
3. When the InstallShield Wizard for BIAS SoundSaver appears, click the Next button.
4. Read the Software License Agreement, and then click the "I accept the terms in the license agreement" radio button to continue with installation.
5. To install SoundSaver into the default directory (recommended), click the Next button (Vista users – skip this step).
6. In the Setup Type dialog, choose the Typical option (Vista users choose the Complete option), and click the Next button.
7. In the Select Program Folder dialog, click the Next button to continue with installation.
8. In the Ready to Install dialog, click the Next button to continue with installation.
9. When you are finished installing, click Finish to exit the installer.



*Be sure to turn back on any virus protection software you may have disabled during installation!*

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## What SoundSaver Installs on Windows Systems:

The SoundSaver installer places a number of files on your computer. The files and install location are described below:

### SoundSaver Application

The SoundSaver application is placed into:

\Program Files\BIAS\BIAS SoundSaver\

### Documentation

An electronic (PDF format) version of the SoundSaver Quick Start Guide, and a Read Me file with late-breaking information are both installed into:

\Program Files\BIAS\BIAS SoundSaver\

### BIAS Authorization Manager

The BIAS Authorization Manager is an application that allows you to authorize and deauthorize your BIAS software. It is installed into:

\Program Files\BIAS\

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## Registration & Authorization

SoundSaver must be authorized to work on your computer. You must register SoundSaver with BIAS in order to authorize it. BIAS offers two methods to authorize your computer – though registering and authorizing via the internet with the computer on which SoundSaver will be run is by far the fastest and easiest method. Both methods are outlined below.

## Serial Number-Based Authorization System

SoundSaver's standard authorization system consists of the following components:

- **BIAS Authorization Manager** – A simple application for managing BIAS software licenses.
- **Serial Number** – Located on Owner's Certificate.
- **Registration Account** – Your registration and authorization information on the BIAS Server.
- **Authorization Request File** – A file transferred from your computer to the BIAS server, which adds the computer you are authorizing to your BIAS Registration Account.
- **Authorization File** – A file transferred from the BIAS server to your computer, which authorizes it to run SoundSaver.

**The registration/authorization process provides the following services:**

- Registers your software with BIAS – making you eligible for technical support and product updates.
- Authorizes your computer so it can run SoundSaver. You may authorize up to two computers for use with SoundSaver – for example, a studio or office computer, and a laptop for home or mobile use.

Keep in mind that for each license of SoundSaver – the software may only be used by one user, on one computer system at a time. If you have used both of your authorizations, and need to authorize a new computer, you will need to first de-authorize one of the authorized computers before you are issued a new authorization for the new computer.

### About Registration, Authorization, and Trial Modes:

When SoundSaver is first launched, you will be prompted to either authorize it or run it in trial mode. For full functionality, authorize it with the included serial number.



Your serial number is located on the included Owner's Certificate – or in the electronic receipt for a downloaded purchase.

### Requirements for Registration & Authorization:

1. SoundSaver must be installed.
2. Your serial number must be available. Depending on how you obtained SoundSaver, the serial number will be provided in various ways:
  - In new retail or upgrade packages – on the Owner's Certificate
  - In downloaded purchases – in an email receipt from BIAS
  - When bundled with another product – in the accompanying materials for the product the BIAS software is bundled with. Check with the manufacturer of the product the BIAS software is bundled with for more information.
3. A computer with internet access must be available.

### To Register & Authorize SoundSaver on a computer with internet access:

1. Launch SoundSaver – when first launched on an unauthorized computer, you will be prompted to authorize it or run it in Trial mode. Click the "Authorize" button to continue to the BIAS Authorization Manager – you will need to enter an administrator password to proceed.
2. Select the product you wish to authorize, and enter your serial number and email address.



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*If you use more than one email address, be sure to make a note of which one you registered with – this will make managing your BIAS Registration Account faster and simpler in the future.*

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3. Click the “Authorize” button. SoundSaver is now authorized – click the “Done” button to exit the BIAS Authorization Manager.



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*If the computer on which you plan to run SoundSaver does not have internet access, you may use another computer to aid in the authorization process – see the following section for directions on how to do so.*

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**To Register & Authorize SoundSaver on a computer without internet access:**

1. Launch SoundSaver – when first launched on an unauthorized computer, you will be prompted to authorize it or run it in trial mode. Click the “Authorize” button to continue to the BIAS Authorization Manager – you will need to enter an administrator password to proceed.
2. Select the product you wish to authorize, then enter your serial number and email address.
3. Click the “Alternate Authorization” button.
4. In the Alternate Authorization dialog, click the “Generate Authorization Request” button to generate an Authorization Request File.
5. Transfer the Authorization Request File that is generated to a computer with internet access (via LAN, CD-ROM, flash drive, iPod, etc.).
6. After transferring the Authorization Request File to the internet-equipped computer, double-click the Authorization Request File – doing so will automatically open your web browser, transmit the Authorization Request File to the BIAS server, and download your Authorization File to the computer’s default download directory.
7. Locate the downloaded folder containing the Authorization File (called “X\_ BIAS SoundSaver”),

and transfer it back to the host computer on which it will be used.

8. In the BIAS Authorization Manager’s Alternate Authorization dialog, go directly to the “To Finalize the Alternate Authorization Process” section and click the “Open Authorization File” button.
9. Locate the Authorization File that was transferred back to the host computer in Step 7, and click the “Open” button. SoundSaver is now authorized – click the “Done” button to exit the BIAS Authorization Manager.



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*If you do not have internet access on any computer, please contact BIAS for assistance at:*

*US Toll-Free: 1-800-775-2427  
International: +1-707-782-1866*

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**The BIAS Authorization Manager can be found in the following location, should you later need to deauthorize or reauthorize SoundSaver:**

- **Mac Systems** – Applications/BIAS Authorization Manager
- **Windows Systems** – \Program Files\BIAS\BIAS Authorization Manager\BIAS Authorization Manager.exe

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## Deauthorizing a Computer

If you need to de-authorize a particular computer that will no longer be used to run SoundSaver, you can do so by following the steps below. The computer running SoundSaver must be connected to the internet in order to deauthorize it.

**To De-Authorize a Computer:**

1. Launch the BIAS Authorization Manager from your hard drive (or launch the BIAS Authorization Manager program from your installer CD-ROM).

2. In the BIAS Authorization Manager, select the product you wish to de-authorize – the serial number and email address used to authorize that product will be automatically recalled and will appear in the Serial Number and Email Address fields.
  3. Click the Deauthorize button.
  4. Click the Deauthorize button to confirm the deauthorization process – the Deauthorization Successful dialog appears.
  5. Click the OK button – then click the Done button in the BIAS Authorization Manager.
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## Conclusion

Now that you have installed, registered, and authorized SoundSaver, please proceed to the next chapter to learn about using it.

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# Chapter 3: Using SoundSaver

## Introduction

This chapter explains how to use SoundSaver to record and clean up your LPs and cassettes, and how to deliver them in a variety of digital formats, including MP3, iTunes Export, uncompressed WAV for burning CDs, and SoundSaver Project files.

## Workflow Overview

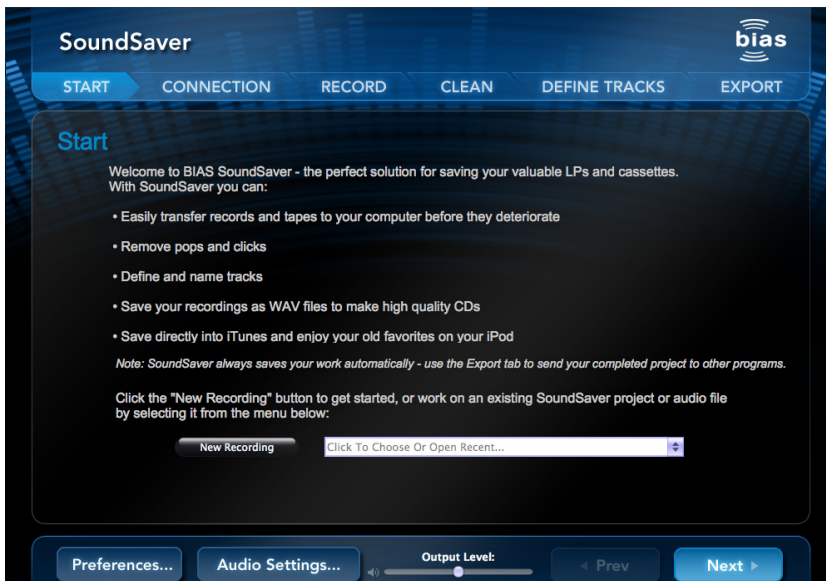
SoundSaver is designed to be very easy to use –here's a brief overview of how it works. In the Start page, you choose whether you'll be making a new recording, or opening up an existing audio recording (or SoundSaver project) to work on. If you're making a new recording, you'll move to the Connection page, which guides you

through physically connecting your audio source to your computer, and configuring the audio input level.



*If you plan to open and work with an existing recording or SoundSaver project, you can move directly to the Clean page – or if your recording does not require cleaning, you can move directly to the Define Tracks page.*

Once the connection is made between your audio source and computer, move to the Record page, where you can begin recording audio. A number of recording



*In the Start page, you can choose to make a new recording, or open an existing recording or SoundSaver project file.*

options are available, such as setting a Record Timer, monitoring your recording as your record, etc. When finished recording, move along to the Clean page if you wish to clean up unwanted clicks, crackles, pops, hum, rumble, or hiss. Once your recording has been cleaned, the Define Tracks page lets you cut a long recording into separate tracks, and add track, artist, and album names. Finally, the Export page gives you options to create high resolution WAV files for burning to audio CD, or compressed MP3 files to use in portable media players, or send your tracks directly into your iTunes library, where they can be converted into any file format that iTunes supports. SoundSaver project files can also be exported for editing on another computer, or as a backup.

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## Getting Started in the Start Page

Once you've installed and authorized SoundSaver – it's time to get started recording! When you first launch SoundSaver, you'll see the Start page, which allows you to either start a new recording project, or open an existing audio file or SoundSaver project for further editing. We'll cover making a new recording here.



*If you're opening an existing audio file or SoundSaver project, you'll probably want to skip ahead to the "Cleaning Up Your Files" section.*

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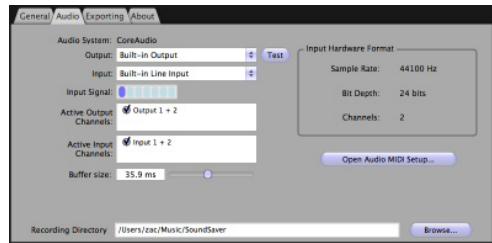
## Audio Settings

Before we actually start recording, we'll need to set some audio settings, in order to route the audio signal from your source into SoundSaver.

### To Make Audio Settings:

1. Click the Audio Settings button at the bottom of the page.
2. In the Audio Preferences tab, select the audio hardware device(s) you would like to use for audio input and output.

3. Click OK to exit the Audio Preferences.



*The most common settings will be for using your computer's built-in audio input and output. The only reason to change these settings is if you are using a third-party internal sound card, external audio interface, or recording from a USB turntable or cassette deck.*

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Continue along to the Connection Page to learn about making audio connections between your audio source (i.e., tape deck, turntable, etc.).



*To move between SoundSaver's pages, you can either click on the page heading at the top of the interface, or press Shift-Left Arrow (Previous Page), or Shift-Right Arrow (Next Page). Keyboard shortcuts for all commands/features are listed in Appendix 1.*



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## Connecting with the Connection Page

Now that we've configured the proper audio inputs and outputs for your computer, it's time to connect your audio source, and record some audio into SoundSaver.

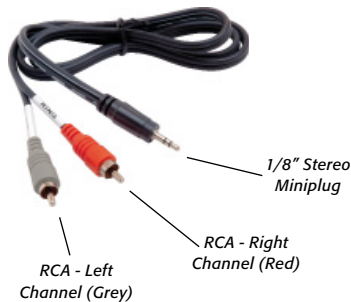
### Common Audio Source Connections

The audio sources you will use will have either fixed or variable output levels. Fixed output level sources

include those with “Line Out”, or “Record Out” connections, or USB turntables and cassette decks. A typical variable output level source is the headphone output on a portable audio device, such as a cassette player or boom-box.

### Line-level Audio Sources

The connections for the most common audio sources are shown in the connection diagram that can be opened from the Connection page. Typically, an audio source will have a connection labeled “Line Out” or “Record Out”, which uses the common red and white (sometimes red and black or grey) RCA plugs found on most home stereo and video equipment.



*RCA --> 1/8" Stereo miniplug is the most common cable used to connect a stereo system to a computer (left channel is usually colored black, white or grey/right channel is usually red or orange).*



*Not all audio sources will feature RCA outputs! Depending on your equipment, you may need to use adapters to convert RCA to 1/4", or RCA to 1/8", 1/4" to 1/8", etc. This is especially true when recording from variable-level audio sources.*

### Variable-level Audio Sources

Variable output level audio sources include the headphone output of most portable tape players, boom-boxes, memo recorders, iPods, iPhones, etc. These types of audio sources are the most likely to require use of an audio adapter to physically connect to your computer.

In addition, variable output level audio sources require a bit more setup when configuring SoundSaver's

recording input level. Since the source has a variable output level, and SoundSaver has its own variable input level, it's important to set the proper output level on the source, and the proper input level in SoundSaver. An output level of about 70 – 75% is a good starting point for your source. (See the section: Setting SoundSaver's Audio Input Level, later in this chapter).

### USB Audio Sources

USB turntables and cassette decks also feature a fixed output level, so it's not necessary to configure their output levels.



*Some USB sources may also offer analog "Line Out" connections. When used this way, they should be set up as fixed Line level audio sources.*

## Your Computer's Audio Hardware

On the other end of the audio connection chain is the computer – the way you connect audio sources to it will vary depending on what type of audio hardware is used.

Audio hardware in a computer is responsible for taking in an analog audio signal from the source, and converting it into a digital format that can be stored on the computer's hard drive.

The most common form of audio hardware in a computer is built-in, which usually uses 1/8" stereo mini-jack connections for both audio input and output.

Other types of audio hardware include internal sound cards, PC/Express slot sound cards, or USB or FireWire interfaces. This type of audio hardware contains the audio input connections to which your audio source connects. Then, the digitized audio signal is sent to the computer via the sound card itself, or through a USB or FireWire cable – depending on the audio hardware used.

Audio hardware is also used to play back sounds from your computer. For playback, the hardware converts



The Connection page helps you connect your audio source to your computer, and to set an optimal recording level.

the digitized audio on your hard drive back to analog, and this is routed to your speakers or headphones. This is known as audio output.

### Built-in Audio Hardware

If you are using built-in audio hardware in your computer, chances are it will be in the form of a 1/8" stereo mini-jack for both audio input and output. Some desktop computers with more advanced built-in audio hardware may also feature RCA jacks.

### Third-party PCI, PC/Express Card Audio Hardware

This form of audio hardware is usually added into a computer system to upgrade its audio recording and playback capabilities. These can be in the form of PCI, PCIe, etc. sound cards which are installed internally on desktop computers, or as small cards that slide into the PC or Express card slots commonly found on laptop computers. Some audio hardware in this category will not feature audio connections directly on the card itself, but instead in a "breakout box" that connects to the card using a separate cable.

### USB & FireWire Audio Hardware

This type of audio hardware usually takes the form of a small box with various audio input and output connections, which is connected to the computer via a USB or FireWire cable.

## Making Audio Connections

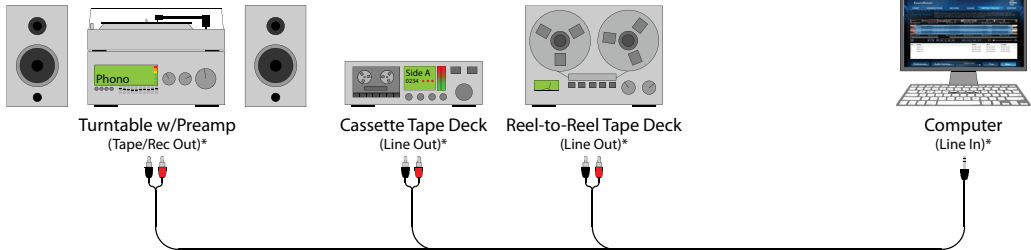
Now that you have a little background in the wide variety of audio hardware and connections, it's time to physically connect your audio source to your computer, and then start recording!

#### To connect your audio source to your computer:

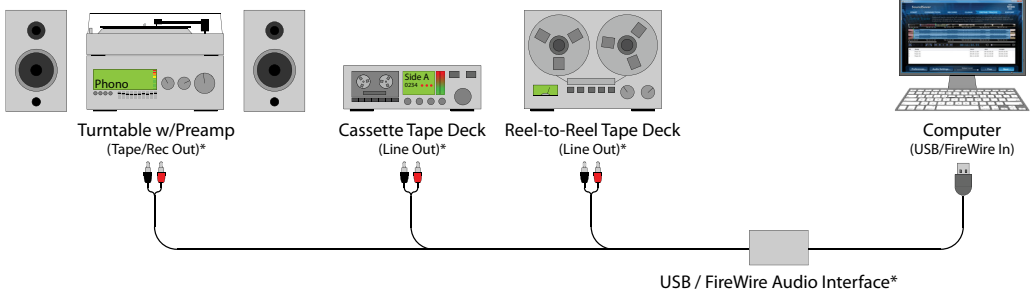
1. Locate your audio source's output(s).
2. Connect the appropriate type of audio cable to the output connection.
3. Locate your computer's audio input(s).
4. Connect the audio cable to the computer's input.

# Common Audio Connections

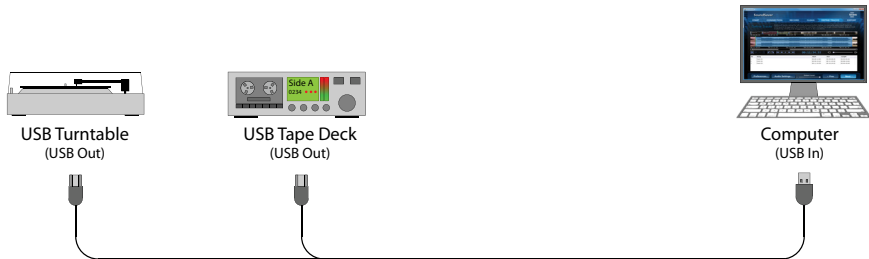
## Connections with built-in audio input or internal sound card



## Connections with USB or FireWire audio interface



## Connections with USB turntable or tape deck



\*Note that depending on your stereo system and computer hardware, you may need to use audio adapters (i.e., RCA --> 1/8", RCA --> 1/4", 1/4" --> 1/8", etc. to make the proper connections.



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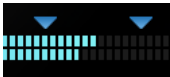
You may need to use adapters to make the connection – visit your local electronics or home stereo/theatre store if you need to purchase adapters.

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## Setting SoundSaver's Audio Input Level

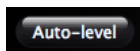
Now that you've physically connected your audio source to your computer, there's just one more thing to do before we start recording – setting SoundSaver's audio input level, so that the audio signal it records isn't too quiet or too loud. This can be done automatically or manually.

With an ideal input level, the loudest parts of the audio source material should register between the two blue triangles located just above SoundSaver's Input Level Meters.



### To Set SoundSaver's Audio Input Level Automatically:

1. Play the loudest part of your audio source.
2. Click the Auto-level button in the Connection page – SoundSaver “listens” for audio input and sets the ideal recording level automatically.



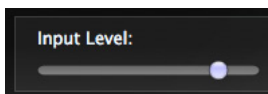
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Windows XP does not support the Auto-level feature – nor do all audio hardware devices.

---

### To Set SoundSaver's Audio Input Level Manually:

1. Play the loudest part of your audio source.



2. Adjust the Input Level slider in the Connection page until the loudest part of the audio source material registers between the two blue triangles located just above SoundSaver's Input Level Meters.



---

If recording from a variable output level device, be sure to set its output level to about 70 – 75% as a starting point, and then adjusting SoundSaver's input level as described above. You may need to fine-tune the device's output level, but this should be a good starting point.

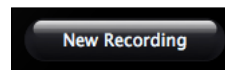
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## Making Your First Recording

Now that we've connected your audio source to your computer, and configured input and output levels, we can move on to SoundSaver's Record page – it's time to make a recording!

### Making a Recording:

1. Click the New Recording button in the Record page.
2. Name your recording, and choose a location to save it.
3. Start your audio source.
4. Click the Record button.



---

If the input signal level is too high, you will see the red “clip” indicators at the right end of the meters illuminate. This means that the signal is causing digital distortion. Check/lower your recording level, and start the recording over.

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In the Record page, you can record audio, set a record timer, monitor audio as you record it, add track markers, and correct speed for 78 RPM records recorded on 33 or 45 RPM turntables.

## Stopping or Pausing a Recording

Stopping or pausing a recording works the same way, using the Stop/Pause button found in SoundSaver's Record page. You'll need to stop recording in order to move on to the Clean page. Pausing recordings is useful when you need to flip a record or cassette to record the other side.



*The Record button turns into the Stop/Pause button while recording, and vice-versa.*

### To Stop or Pause a Recording:

- Click the Stop/Pause button.



### To Resume Recording:

- Click the Append button.



### To Delete a Recording:

- Click the Stop/Pause button.
- Click the Trash Can button.



## Recording Options

There are a number of useful recording options – you can use the Record Timer to record for a particular length of time – or add markers to identify song start and end point, or other areas of interest in a recording.

### Record Timer

The Record Timer allows you to record for a specified amount of time. This is useful if you need to record program material of a particular length, such one side of a 90-minute tape, or one side of an LP. The Record Timer offers several settings, in different increments.



### To Use the Record Timer:

1. Click the Record For menu, and choose the number of minutes you'd like to record – or simply type a value into the box.
2. Click the Record button – recording stops automatically after the selected amount of time.



*Note that you can reset the Record Timer when a recording is paused (or while recording). This is useful if you are simply pausing the recording to flip your record or tape, and would like to set the Record Timer to record the second side.*

### Monitoring a Recording

When recording, you can choose to monitor (listen) to the recording while it's taking place – or if you prefer you can turn this option off. When monitoring, the audio signal that is recorded into SoundSaver is simultaneously played out of the currently selected output device (i.e., the computer's speakers, external speakers, headphones, etc.).



*It's a good idea to turn down SoundSaver's Output Level slider when turning Monitoring on or off!*

### Adding Markers to a Recording

The Mark Track feature allows you to drop markers into the recorded digital file. Markers are used in the audio waveform display to show the Start or End of a track. Adding markers during recording is optional; they can always be added later in the editing process. However, adding them during recording is handy, and makes later editing go faster, as it's easier to find songs or other points of interest in a recording.

### Standard Mode

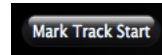
When using standard mode, clicking the Mark Track Start button adds a Track Start marker to that location in the recording. Once you click the Track Start button to create a Start Track marker, the same button becomes the Mark Track End button, and clicking it creates a Track End marker in a recording.

### To Add Markers to a Recording:

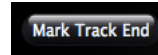
1. Start a recording.
2. Make sure the "Contiguous" checkbox is unchecked.



3. Click the Mark Track Start button to add a Track Start marker.



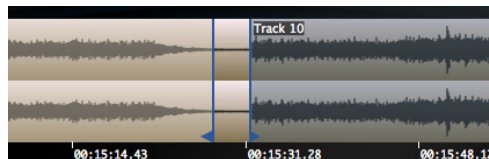
4. Click the Mark Track End button to add a Track End marker.



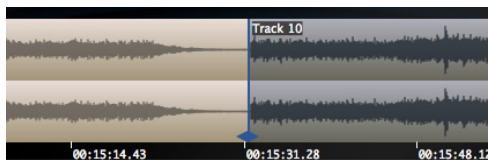
5. Repeat to create markers for additional tracks.



*Think of Track Start and Track End markers as the beginning and end of a CD track or MP3, as these will eventually define the start and end points of the individual files you export or burn to CD.*



Example of discontinuous markers (not back-to-back)



Example of contiguous markers (back-to-back)



## Contiguous Mode (Back-to-back)

Contiguous mode is designed for adding back-to-back Track Start and End markers to continuous-play DJ mixes, classical music recordings, live concerts, etc.

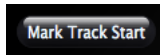
When using Contiguous mode, clicking the Mark Track Start button defines both the end of the current track, and the start of the next one – at the exact same location in the recording.

### To Add Contiguous (Back-to-back) Markers to a Recording:

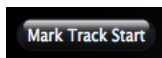
1. Start a recording – make sure the “Contiguous” checkbox is checked.



2. Click the Mark Track Start button to add a Track Start marker.



3. Click the Mark Track Start button again to add a Track End marker for the current track, and a Track Start marker for the next track simultaneously.



4. Repeat to create markers for additional tracks.



*The first click defines just the start of the first track, and the last click defines just the end of the last track – all intermediary clicks define the end of one track and beginning of the next track simultaneously.*

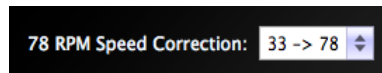
When contiguous track markers are used, the final files exported from SoundSaver will play seamlessly, with no gaps or pauses between them (unless the program material located between a track’s Start and End markers contains silence), and allow the listener to navigate from track to track.



*For example, some music players add a two second pause between songs. With contiguous track markers, the final exported tracks will play back-to-back. If a track contains silence, such as a very long fade out at the end of a song, that will be audible.*

## Adjusting Speed for 78 RPM Records

When recording 78 RPM records on a turntable that only features 33 or 45 RPM playback speeds, you can use this function to automatically adjust recording, so that the final digitized product plays back at the correct speed.



### To Adjust Speed in Recording of a 78 RPM Record:

1. Make a recording of your 78 RPM record.
2. Before exiting the Record page, select the appropriate speed correction for your recording (i.e., if you were recording at 33 RPM, select the 33 --> 78 option – if you were recording at 45 RPM, select the 45 --> 78 option).



*If you monitor a recording of a 78 RPM record played at 33 or 45 RPM, it’s normal for it to sound “too slow”. It will play back at the correct speed after processing with SoundSaver’s 33/45 --> 78 RPM speed correction.*

## Cleaning a Recording

With SoundSaver, you can clean up clicks, crackles, pops, hiss, electrical hum, and rumble – and make your final product sound like a brand-new CD! SoundSaver’s built-in cleaning uses the same advanced technology as BIAS’ professional studio noise reduction tools.

Once you’ve made a recording, just move on to the Clean page to begin cleaning it.



The Clean page is where you can remove unwanted noise from your recordings – SoundSaver can remove clicks, crackles, pops, hiss, hum, and rumble, all of which are commonly found in recordings made from records and cassettes.

## Navigation

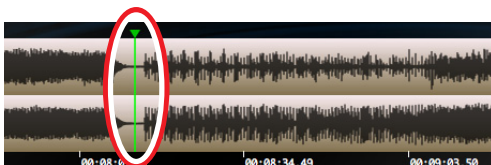
As you clean your tracks, it's important to know how to get around. SoundSaver's transport controls and audio waveform make navigation intuitive and fast.



*The navigation controls described below are also found in the Define Tracks page, and operate identically.*

## Audio Waveform & Overview

SoundSaver's audio waveform offers an easy way to navigate to a particular location in a recording. The included timeline displays the recording time at various intervals.



SoundSaver's audio waveform display, with playhead highlighted

When zoomed out all the way, the main audio waveform display also displays the entire recording and offers immediate access to any part of it. When you need additional detail (for learning noise, etc.) you can zoom in.

Clicking on the waveform at the desired location moves the playhead to that location. If audio is playing when the waveform or overview is clicked, audio will continue playing when the playhead jumps to a new location.

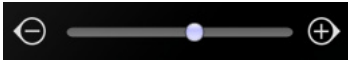
When zoomed in, the audio waveform's horizontal scroll bars and arrows become active, and offer another handy way to navigate the audio waveform.

### To Zoom In for a Closer View of the Audio Waveform:

- Place playhead in the location you would like to zoom in on, and move the zoom slider right to zoom-in in large increments

or:

- Click the + button on the right side of the zoom slider to zoom-in in smaller increments (or press ⌘-Right Arrow (Mac), Ctrl-Shift-Right Arrow (Windows)).



#### To Zoom Out for a Wider View of the Audio Waveform:

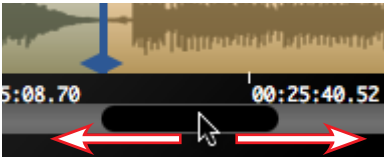
- Move the zoom slider left to zoom-out in larger increments

or:

- Click the – button on the left side of the zoom slider to zoom-out in smaller increments (or press ⌘-Left Arrow (Mac), Ctrl-Shift-Left Arrow (Windows)).

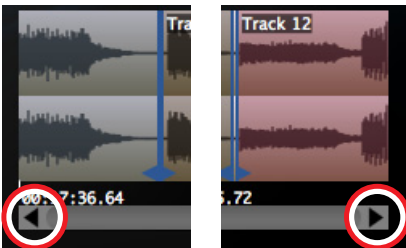
#### To Navigate using the Scroll Bar/ Arrows:

- Click and drag the Scroll Bar left or right to move the audio waveform in larger increments.



or:

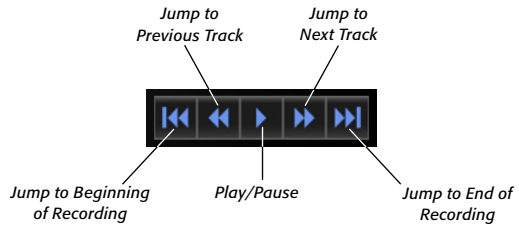
- Click the left or right Scroll Arrows to move the audio waveform in smaller increments.



*Scrolling is not available when zoomed all the way out.*

### Transport Controls & Counter Display

SoundSaver's transport controls work much like those on a CD player, hardware or software music player, and many other familiar media playback devices. They allow you to start and stop playback and move from track to track.



The Counter Display shows the elapsed time and corresponds to the playhead's position in a recording.

00:28:31.20

#### To Start or Stop Playback:

- Click the Play/Pause button – if playback is stopped, it will start – if playback is active, it will stop. (Spacebar)

#### To Move to the Next Track:

- Click the Jump to Next Track button. (Right Arrow)

#### To Move to the Previous Track:

- Click the Jump to Previous Track button. (Left Arrow)

#### To Move to the Beginning of the Recording:

- Click the Jump to Start of Recording button. (Press Return twice)

#### To Move to the End of the Recording:

- Click the Jump to End of Recording button.

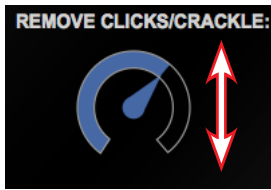
### Removing Clicks, Crackles, and Pops from Vinyl Records

When it comes to removing the clicks, crackles, and pops that are commonly found in recordings of vinyl records, it couldn't be easier! A single control lets you dial in exactly how much to remove.

#### To Remove Clicks, Crackles, and Pops from a Recording:

1. Play your recording.
2. Adjust Remove Clicks/Crackle dial until clicks,

crackles, and pops are gone – use the lowest setting that eliminates the clicks/crackles.

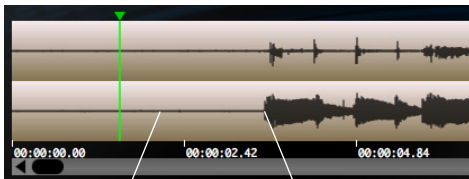


## Removing Tape Hiss and Vinyl Surface Noise

Eliminating pesky tape hiss and vinyl surface noise (also known as “broadband” noise) is very easy with SoundSaver, with just a few clicks. The key to successful noise reduction is where in a recording you use the Learn Noise function. The Learn Noise function identifies the frequencies that make up the tape hiss or surface noise, and eliminates them, leaving behind only the audio content you want. Once these frequencies have been identified, you can apply a variable amount of noise reduction.

### To Remove Tape Hiss or Surface Noise from a Recording:

1. Locate an area in your recording that contains just the unwanted noise.



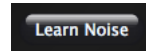
Area that contains just unwanted noise

Beginning of desired audio content

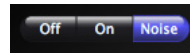


*Usually the first few seconds of a recording – the cassette’s leader, or first few revolutions of a record – are the ideal places to “learn noise”. In other cases, if there is a pause of a few seconds between two tracks, that’s also a good place to “learn noise”. In some cases it may be helpful to use the horizontal zoom controls to get a closer look at the audio waveform when locating an area to learn noise.*

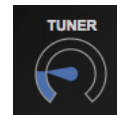
2. Start playback at the beginning of the area containing the noise only.
3. Click the Learn Noise button.



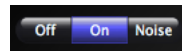
4. Play an area of the recording that contains the audio content you’re trying to clean up (i.e. voice, music, etc.)
5. Click the Noise button, and play an area of the desired content.



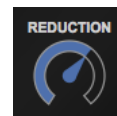
6. Adjust the Tuner dial until you hear just the unwanted noise.



7. Click the On button, and continue playing the desired audio content.



8. Adjust the Reduction dial until the unwanted noise is gone – use the lowest possible setting that successfully eliminates it.



## Removing Low-frequency Hum and Rumble

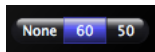
Occasionally recordings may contain low-frequency noises called hum and rumble. Hum is generally caused by poor electrical grounding in a turntable, but can also be caused by bad audio cables (in the recording studio that originally produced the LP or cassette, or in the stereo system you use to play them back), or by an A/C ground loop in an electrical circuit.

Rumble is an even lower frequency noise, and is sometimes found in recordings of vinyl records. Rumble is the result of the turntable's motor creating a low-frequency noise that's picked up as a vibration through the turntable's needle.

These are the easiest types of unwanted noise to diagnose and clean up, though it's important to note that not every recording will contain them. Use these filters only when you actually hear hum or rumble.

#### To Remove Hum from a Recording:

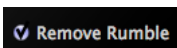
- Play your recording – if it contains hum, click the 60 or 50 button.



*Hum is most commonly found at either 50 or 60 Hertz (Hz) – and which you might find in your recordings will depend on the electrical current used in your part of the world. For example, recordings made in North America (that contain hum) will always contain 60 Hz hum, and recordings made in Europe will always contain 50 Hz hum. If you're not sure which settings to use to clean up the hum in your recording, it's pretty simple – one will work, and the other won't!*

#### To Remove Rumble from a Recording:

- Play your recording – if it contains very-low-frequency rumble, click Remove Rumble checkbox.

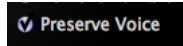


### Preserving Voice

If your recording contains just voice, and no other music or audio, you can use the Preserve Voice filter to automatically eliminate unwanted noise that's outside of the frequency range of the human voice.

#### To Preserve Voice in a Voice-only Recording:

- Play your voice-only recording, and click the Preserve Voice checkbox.



### Applying Enhancement to Bring Old Recordings Back to Life

Many old records and tapes may have been played a million times, and are just worn out. When this old media is recorded into SoundSaver, you can use the Enhance feature to boost high and low frequencies, and breathe a little life back into these recordings. Enhance restores frequencies to make bass and drums sound deep and loud, and adds sparkle to cymbals, guitars, voices, and other instruments/sounds.

#### To Enhance a Recording:

- Play your recording made from an old, worn out analog source, and adjust the Enhance dial until you are happy with the sound and level of enhancement.



### Applying Cleaning Settings

Once you're happy with your cleaning/enhancement settings, be sure to apply them!

#### To Apply Cleaning/Enhancement Settings:

- Click the Apply button.





In the Define Tracks page, you can cut up a long recording into separate tracks, and add track, artist, and album info – either manually or automatically.

With audio enhancement there is no right or wrong setting! Audio enhancement is a personal preference – some will prefer more and others less – just make adjustments until you are happy with the sound!



In this section you'll learn how to easily cut up a recording into separate tracks. With the tools in SoundSaver's Define Tracks page, you can cut recordings into tracks automatically or manually.

## Cutting a Recording into Tracks

Up to this point, your entire recording is essentially one very long track, even though you may have recorded multiple songs (or other types of separate “tracks”). While you can export the entire recording as a single track, this can lead to problems when burned to audio CD, or exported to your iPod, etc.

If such a recording is played back as a CD or on an iPod, it will sound the same as the original recording in terms of content – the problem is how do you navigate to the next (or previous) track? The only way to do it in one long continuous track is to hold down a Fast-Forward or Rewind button, which can take several minutes to get to the right part of the recording.

Note that if you added markers during recording, they will appear in the Define Tracks page. These markers can be moved or deleted just like track markers that are created in the Define Tracks page – for example if a track marker added during recording is not in quite the right location, it can be nudged into the right spot in the Define Tracks page.



## Creating Tracks Automatically

SoundSaver's automatic track creation works best with recordings of typical commercially-produced records and tapes, in which there are clearly defined breaks or gaps between the various tracks. With this kind of audio content, SoundSaver detects the difference

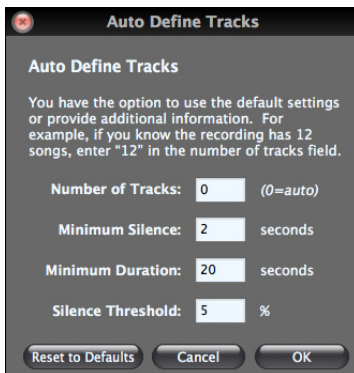
between the silent areas between tracks, and the louder audio content, and creates track markers automatically.

#### To Define Tracks Automatically:

1. Record new audio content or open an existing audio file.
2. Navigate to the Define Tracks page.
3. Click the Automatically Define Tracks button.  
[⌘-Shift-D (Mac), Ctrl-Shift-D (Windows)]



4. Make desired settings in the Auto Define Tracks window, and click the OK button to automatically define tracks in your recording.



*It is highly recommended to first work with the default settings, which should work very well for creating tracks in recordings of most commercially produced records and tapes.*

### Options for Automatically Defining Tracks

The Auto Define Tracks window's default settings work very well for creating tracks accurately in recordings of most commercially produced records and tapes. To give even more flexibility and control, the Auto Define Tracks settings can be adjusted for even better track detection accuracy.

#### Number of Tracks

If you know the number of tracks in the original analog recording, enter it in the Number of Tracks field. If you don't know the number of tracks in the original recording, we suggest first using the default "0" value.

#### Minimum Silence

If the recording you are working with contains two second gaps between each song, start with the default value of "2" in this field. If the gaps between songs vary in length, enter the value of the shortest gap in the entire recording.

#### Minimum Duration

SoundSaver needs information about the length of each song in order to accurately divide a long recording into individual songs.

The Minimum Duration field tells Auto Define Tracks how long the shortest track in a recording is, and helps ensure that track markers are placed in the correct location in the audio waveform – that is, a Track Start marker just before a song starts, and a Track End marker just after a song ends – even if the audio level falls below the threshold value set in the Silence Threshold field (see next section).

If a recording you are working with contains songs that are all approximately 4-5 minutes long, a good value to enter in this field would be 240 seconds (4 minutes).

#### Silence Threshold

This field controls the threshold level between audio material you wish to define as a track and the gaps between it. As this value is changed, Auto Define Tracks becomes more or less sensitive to "silence".

For example, if you've working with a recording from a cassette, the gaps will typically contain hiss or other noise that is not completely silent, but has a significantly lower amplitude level than the program material that you are trying to isolate into tracks. By changing the Silence Threshold, you can make the judgment as to what should be silence, even if it does contain some low level audio such as tape hiss, or other background noise.



---

*Users who prefer more control can also use manual track creation when working with recordings of commercially produced records and tapes with well-defined gaps between the tracks.*

---

## Creating Tracks Manually

While SoundSaver's automatic track defining capability is ideal for working with recordings of most typical records and tapes, there are some cases in which it's better to create tracks manually.

For example, in a commercially-produced DJ mix, live concert, or classical music recording, there are separate tracks. These are arranged back-to-back, with no spaces between them. This means that if you listen from beginning to end, it sounds as if it's one long track, but since there are actually separate tracks, you can jump to the next or previous track.

To create this same arrangement, manual track definition must be used, as there would be no silent gaps between tracks for SoundSaver to detect – track markers must be placed manually at the appropriate locations.



---

*Dropping in markers (in Contiguous mode) during recording is essentially the same as adding them later in the Define Tracks page – though it can save a little time as they are added in real-time at the correct locations.*

---

### To Define Tracks Manually:

1. Record new audio content or open an existing audio file.
2. Select the portion of the waveform you would like to define as a track by clicking and dragging over the waveform using your mouse.
3. Click the Define Selection as New Track button. [⌘-D (Mac), Ctrl-D (Windows)]



4. Repeat until you have the desired number of tracks.

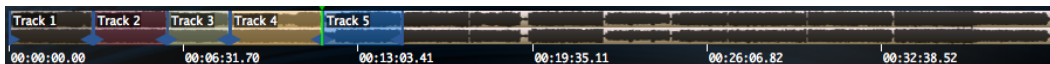
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## Editing Tracks

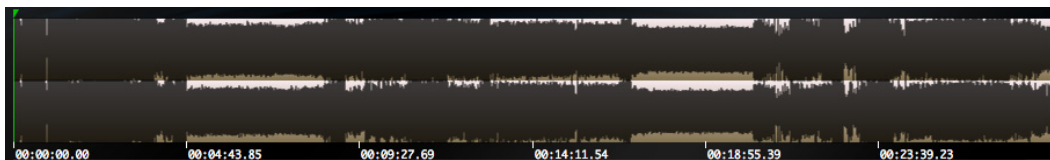
There will be times when you need to delete or modify your track lengths, positions, names, etc. SoundSaver offers completely non-destructive editing, making track editing very easy.

## Navigation Using the Waveform Overview

In addition to the Transport controls, Main Waveform Display, and Scroll Bars/Arrows (described earlier in the “Cleaning a Recording” section), the Define Tracks page also includes a waveform overview for navigation and reference. The waveform overview is a miniature version of the audio waveform for the entire recording,



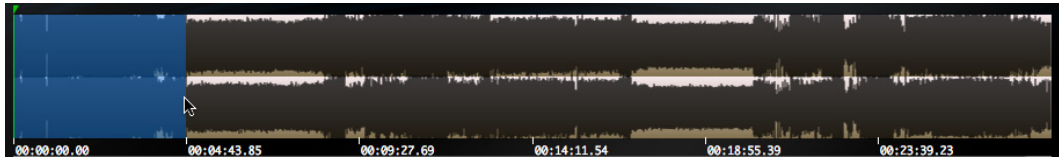
*The miniature Waveform Overview appears above the main waveform – and offers a quick way to navigate to any location in a recording.*



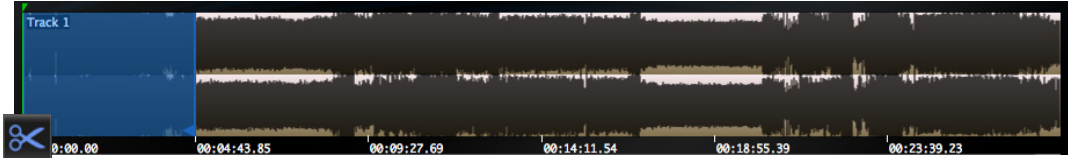
*DJ mixes (shown above), live concerts, and some classical music recordings may not have clearly defined gaps between the tracks. For these types of recordings, placing contiguous (back-to-back) track markers manually is the best approach.*



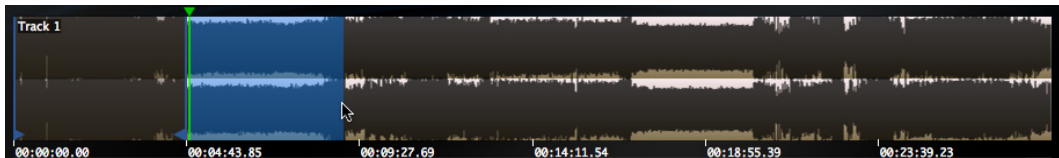
## Creating Tracks Manually



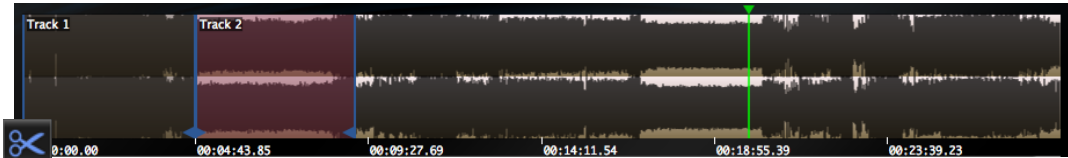
Select the portion of the waveform you would like to define as a track by clicking and dragging over the waveform with your mouse...



Click the Define Track button (single scissor icon) to define the first selected area as a track...



Select the portion of the waveform you would like to define as the second track. If you select starting near the end of the first track, SoundSaver automatically snaps the selection to the end of the first track, so there is no gap between the tracks, which ensures continuous gap-free playback (unless there is silence contained between the track's Start and End markers).



Click the Define Track button (single scissor icon) to define the second selected area as a track, and so on...

making it easy to jump directly to any location in the entire recording.

When you need additional detail for accurate Track marker placement, etc. you can zoom in for detail, and still retain the ability to jump to any location in the recording using the overview. Simply clicking in the waveform or overview at the desired location moves the playhead to that location.

### Undo/Redo

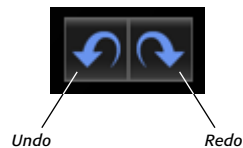
SoundSaver's Undo/Redo function is the most basic editing tool, which allows you to undo or redo a series of actions.

#### To Undo an Action:

- Click the Undo button.

#### To Redo an Action:

- Click the Redo button.



### Deleting Tracks

Deleting a track (or several tracks) in SoundSaver is very simple. There are a variety of reason to delete

tracks: Perhaps you made a mistake creating the track; maybe auto-define tracks added an extra track where it shouldn't have, etc.

**To Delete a Track):**

1. In the Track List, select the track(s) you wish to delete – or double-click between the track's Start and End markers to select it.

Song	Start	End
Beds Are Burning	00:00:00.48	00:04:12
Put Down That Weapon	00:04:12.16	00:08:36
Dreamworld	00:08:36.01	00:12:23
Arctic World	00:12:23.68	00:16:26

2. Click the Trash Can button (or press the Delete/Backspace) key on your keyboard).



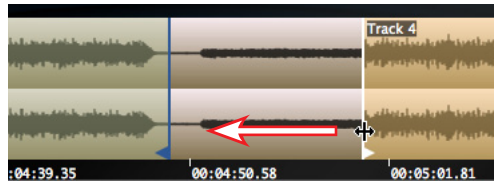
**Adjusting Track Markers/Changing the Length of a Track**

Understanding how to adjust Track markers is perhaps the most important editing skill when it comes to working with SoundSaver. At some point you're bound to create a track that starts too late, or ends too soon, and will need to have its markers moved so as to include all of the desired audio content.

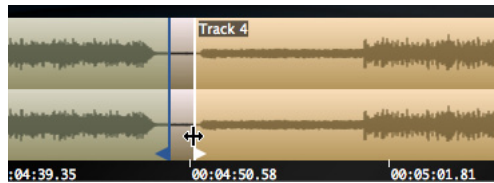
Individual Track Start and End markers can be moved independently, and contiguous (back-to-back) Track markers can be moved simultaneously, keeping their back-to-back positioning, which is crucial for continuous-play program material like DJ mixes or live concert recordings.

**To Adjust a Track Marker's Position/Change the Length of a Track:**

1. Position your mouse cursor over the top or bottom part of the Track marker you wish to move – the mouse cursor will turn into a double arrow, and the marker becomes highlighted in white, indicating it can be moved.



2. Click and drag the highlighted marker to the desired position in the audio waveform.



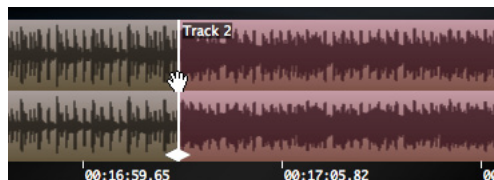
*By default, Track Start or End Markers will snap to the position of the playhead when they are moved close to it. Holding down the Control key while moving a marker temporarily disables snapping.*


**To Adjust the Position of Contiguous Track Markers:**


1. Position your mouse cursor over the middle part of the contiguous Track markers you wish to move – the mouse cursor icon turns into a hand, and the markers become highlighted in white, indicating they can be moved.



2. Click and drag the highlighted marker to the desired position in the audio waveform.



 You may want to zoom in for a closer view of the audio waveform for the most accurate marker placement!

 Internet access is required for automatic metadata retrieval.

### Naming Tracks

#### To Name/Re-name a Track:

1. In the Track List, single-click a selected track name, or double-click an unselected track name – the existing (or default) track name becomes editable.

ID	Song
1	Track 1
2	Track 2

2. Enter the desired name, and press the Return/Enter key on your keyboard.

ID	Song
1	My Favorite Track
2	Track 2
3	Track 3

### Track Metadata (ID3 Tags)

SoundSaver allows you to add metadata that is exported with each track – when exporting as MP3 files, or to your iTunes library. This means that you can enter the track name, artist, album, composer, genre, and album year once in SoundSaver, and that information will also appear in iTunes and your iPod – or other ID3-compatible hardware and software music players.

 Metadata is not supported with WAV file export!

Metadata can be entered manually or automatically. Automatic metadata entry uses the online MusicBrainz library, which contains album, artist, and track name listings for thousands of – but not all – popular recordings.

#### To Add Track Metadata Manually:

1. In the Track List, select a track.
2. Click the ID3 button. [⌘-I (Mac), Ctrl-I (Windows)]



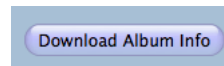
3. Enter desired metadata.



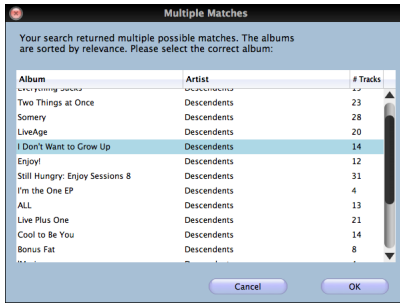
4. Click the OK button.
5. Repeat for additional tracks.

#### To Add Track Metadata Automatically:

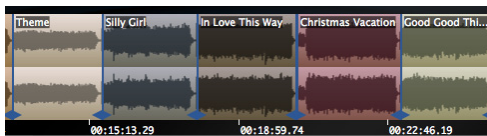
1. In the Track List, select a track.
2. Click the ID3 button. [⌘-I (Mac), Ctrl-I (Windows)]
3. In the Edit Track Metadata window, enter the artist or album name, and click the Download Album Info button...




...if a match is found, SoundSaver will retrieve the track, artist, album, and album year information automatically. If multiple matches are found, you will be prompted to choose the appropriate listing.



4. Click the OK button – SoundSaver automatically names the tracks!



You can also Shift-click or -Click (Mac)/Ctrl-click (Windows) to select multiple tracks and set common metadata such as artist or album name all at once.



When retrieving metadata, it's important to have the correct number of tracks defined, so that the metadata is applied to the correct tracks! If you do not have the correct number of tracks, SoundSaver will retrieve a partial list of metadata, for the tracks you do have.



A common cause for this is when two songs run together, with no clearly defined break between them. If you used defined tracks automatically, it's likely that SoundSaver would not have detected two such songs as being separate songs, and would have instead defined them as a single, long track containing both songs. In this situation, you simply need to manually adjust the track's markers and create another track – then attempt to retrieve metadata again.

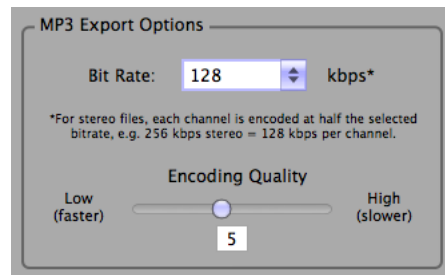
## Exporting Your Finished Product

It's the moment you've been waiting for – exporting your creation so you can enjoy listening to it in its new cleaned up digital format.

SoundSaver includes options to export directly to MP3 and WAV files, as well as to your iTunes library, and as a SoundSaver Project file, which can be transferred to another computer, or used for later editing.

### MP3 Export Options

Choosing MP3 as the output file format creates compressed MP3 files suitable for use in many hardware and software music players. The bit-rate and quality of the files can be adjusted in the SoundSaver Preferences Panel > Exporting Tab.



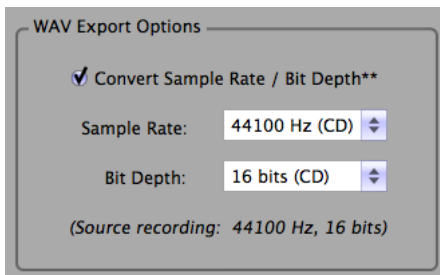
Choosing the MP3 export option creates MP3 files using SoundSaver's built-in MP3 encoding, which uses the LAME MP3 encoder. You can also choose to create MP3s by using the iTunes export option, and choosing the iTunes MP3 encoder in SoundSaver's Exporting Preferences > iTunes Export Options. This uses the Fraunhofer encoder. Some people prefer the sound of MP3s created with the LAME encoder, while others prefer those made with iTunes' Fraunhofer encoder.



The Export page includes options for exporting popular digital audio file formats, including MP3, WAV – or export directly into your iTunes library.

## WAV Export Options

Selecting WAV as the output format creates high quality uncompressed files which are ideal for burning to audio CD – or transferring into another audio or video application.



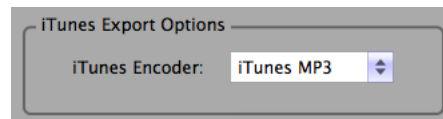
### Convert Sample Rate/Bit-depth

This preference allows the sample rate and bit-depth of the exported files can be adjusted. This means that you can record and clean/edit at a higher resolution,

such as 24-bit/96 kHz, and then deliver WAV files suitable for burning to audio CD (16-bit/44.1 kHz) – as well as other common sample rates and bit-depths. When this option is turned off, exported WAV files will have the same format as what was originally recorded (i.e., whatever input format was shown in the Audio Preferences > Input Hardware Format.

## iTunes Export Options

Choosing iTunes as the export option means files exported from SoundSaver will be sent into your iTunes library – however, selecting the actual file format that they will be delivered in must be set in the Exporting Preferences > iTunes Export Options.



Since iTunes' built-in encoders allow files to be imported as AAC, AIFF, Apple Lossless, MP3, or WAV

– choosing iTunes as an export option opens the door for SoundSaver to deliver any of these file formats into iTunes.



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*This SoundSaver preference simply sets the desired file format. To change the bit-rate, quality, etc. you must open the iTunes General Preferences > Import Settings.*

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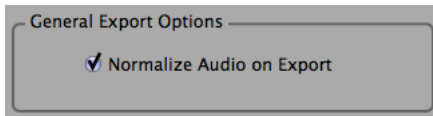
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*You can use iTunes to burn an audio CD.*

---

## General Export Options

SoundSaver features the following general export options.



### Normalize Audio on Export

When active, this preference normalizes the audio level of the tracks that are exported from SoundSaver. Normalization is the process of raising the audio level as high as possible without introducing digital clipping/distortion.

## Customizing SoundSaver

SoundSaver features a number of customizable preferences that allow you to fine-tune it to best suit your workflow. The default settings are carefully designed to work best in most situation – you may wish to work with the defaults before modifying preferences. Preference options are described below.

### To Access SoundSaver Preferences:

1. Click the Preferences button in the lower left of the SoundSaver interface.
2. Click the tab that contains the preferences you wish to customize (i.e., General, Audio, Exporting, etc.).



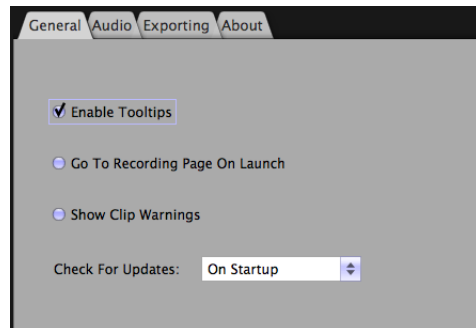
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*SoundSaver's Audio Preferences can also be accessed directly by clicking the Audio Settings button in the lower part of the SoundSaver interface.*

---

## General Preferences

SoundSaver's General Preferences include the following items.



### Enable Tooltips

When active, floating tooltips appear over interface controls, with useful tips and information about what the control is, and how it works. Tooltips are great for beginners just learning how to use SoundSaver.

### Go to Recording Page On Launch

When active, SoundSaver opens with the Record Page visible. This is ideal for those who have already configured the connection between their audio source and computer, and wish to quickly jump into recording.

## Show Clip Warnings

When active, a dialog will appear when SoundSaver detects a “clipped”, or distorted audio input level, which is the result of having too high of an input level. Digital clipping sounds very unpleasant, and is not something you would want to hear in your finished product. This option is useful for those just getting started with digital recording.



*Note that even if Show Clip Warnings is disabled, the clip indicators at the far right of the Input Level Meters are still active, and light up in red for a few seconds when they detect a clipped signal.*

## Check for Updates

The Check for Updates preference allows you to set SoundSaver to automatically check for updates. If an update is available, SoundSaver will prompt you to download it.

## Audio Preferences

The Audio Preferences allow you to set which channels on your computer’s audio hardware are used for audio input and output, and the recording format and location.

## Audio System

Displays the current audio system in use, not user selectable.

## Output

Use this menu to select the audio hardware device that will be used for audio output from your computer. (i.e., playback from SoundSaver on your computer to your speakers or headphones).

## Input

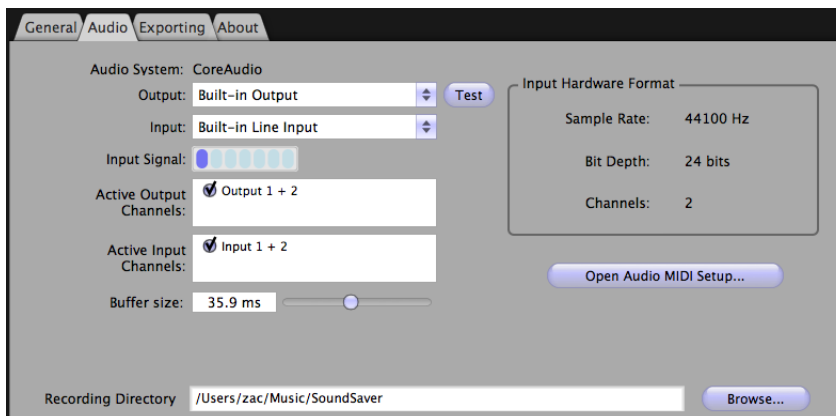
Use this menu to select the audio hardware device that will be used for audio input (i.e., recording audio from your source into SoundSaver on your computer).

## Active Output Channels

Use this menu to configure which channels on the selected audio hardware device should be used for audio output (i.e., playback from SoundSaver to your speakers/headphones).

## Active Input Channels

Use this menu to configure which channels on the selected audio hardware device should be used for audio input (i.e., recording audio from your source into SoundSaver on your computer).



---

*Note that with most audio hardware interfaces, there will only be one set of stereo inputs and outputs, and the only options you will see are Output 1+2 and Input 1+2. Advanced audio hardware may feature more input and outputs, in which case you must tell SoundSaver which of the inputs/outputs are actually connected to your recording source and playback system.*

---



## Buffer Size

The Buffer Size Preference controls the size of the “chunks” of digital audio that are captured by your computer’s audio hardware device during recording, and read from it during playback. The default setting should work well for most computers. Generally speaking, lower buffer sizes are best for very fast systems, and higher sizes are best for older, slower systems.

## Recording Directory

This preference controls the default directory that SoundSaver will record into. This setting should work fine for most users. It’s recommended that you change this only if you need to record to a specific directory.



*If you do change the Recording Directory preference, be sure that your user account has disk write permissions for the directory you select.*

---

## Input Hardware Format

While the actual Input Hardware Format (i.e., number of channels, bit-depth, and sample rate) is not something you set directly with SoundSaver itself (this is set in the Audio MIDI Setup Utility (Mac), or Sound Control Panel (Windows), this display conveniently shows you the current settings.

### To change format settings:

1. Click the Open Audio MIDI Setup button (Mac), or Open Sound Control Panel button (Windows).

2. Check your computer’s documentation for details on how to set the audio input format.

## Exporting Preferences

SoundSaver’s Exporting Preferences include items such as MP3, WAV, iTunes, and General Export options.

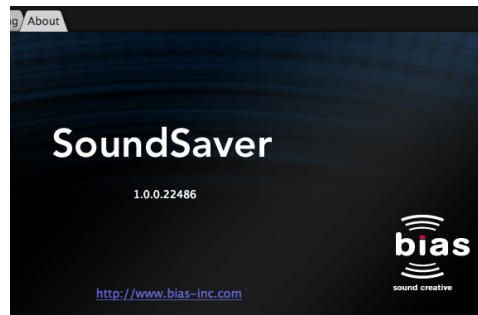


*These preferences are covered in the previous section – Exporting your Finished Product.*

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## About Screen

The About screen displays the SoundSaver version number, along with a link to the BIAS website, where you can get technical support for SoundSaver, watch a tutorial video, and learn about other BIAS products.



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## Conclusion

You should now be familiar with how to use SoundSaver. Enjoy digitizing your old records and tapes!

A tutorial video, and technical support resources are available on the BIAS website:

<http://www.bias-inc.com>



# Appendix 1: Keyboard Shortcuts

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## Mac

<b><i>Keyboard Shortcut</i></b>	<b><i>Equivalent Command</i></b>
Spacebar	Play/Pause
Return (2x)	Jump to start of recording
Left Arrow	Jump to previous track
Right Arrow	Jump to next track
⌘-D	Define track
⌘-Shift-D	Auto-define tracks
⌘-I	Edit Track Info (ID3 metadata)
⌘-Left Arrow	Zoom waveform out
⌘-Right Arrow	Zoom waveform in
⌘-Shift-Left Arrow	Zoom waveform out full
⌘-Shift-Right Arrow	Zoom waveform in full
Shift + Left Arrow	Navigate to previous page
Shift + Right Arrow	Navigate to next page

## Windows

<b><i>Keyboard Shortcut</i></b>	<b><i>Equivalent Command</i></b>
Spacebar	Play/Pause
Return (2x)	Jump to start of recording
Left Arrow	Jump to previous track
Right Arrow	Jump to next track
Ctrl-D	Define track
Ctrl-Shift-D	Auto-define tracks
Ctrl-I	Edit Track Info (ID3 metadata)
Ctrl-Left Arrow	Zoom waveform out
Ctrl-Right Arrow	Zoom waveform in
Ctrl-Shift-Left Arrow	Zoom waveform out full
Ctrl-Shift-Right Arrow	Zoom waveform in full
Shift + Left Arrow	Navigate to previous page
Shift + Right Arrow	Navigate to next page

