_____

# Simian Pro
## Version 2.2
# Manual

| **Information** | **Validation Codes** | **Website** |
|---|---|---|
| info@bsiusa.com | codes@bsiusa.com | www.bsiusa.com |

| **Sales** | **Technical Support** |
|---|---|
| Phone: 541-338-8588 | 541-342-5250 |
| Fax: 541-338-8656 | |
| sales@bsiusa.com | support.bsiusa.com |

**Broadcast Software International**

909 International Way

Springfield, Oregon 97477 USA

3 August 2012 – Manual Revision 2.2.0P

# Table of Contents:

_____

In addition to the table of contents, we have included several other navigational aids in this manual. Special icons will alert you to items of particular significance:

A useful tip or cool feature.

Take note, be cautious, read carefully.

ALERT - Extreme caution.

# Quick Start

This section is designed for those of you who don't want to (or don't have the time to) read the full manual. We will go over the basics of how to make Simian play audio files, but we will go no further. If you'd like to learn more, you'll have to delve deeper into this fantastic manual.

## Quick Configuration

The Simian installation program will configure your computer with default settings and load a demonstration Program Log and sample audio onto your computer. As soon as you start Simian the demonstration is automatically loaded and runs continuously.

This Quick Configuration guide will provide an easy way to add more audio files to the demonstration – for details of how to configure the more advanced features of Simian, please read the relevant section of the manual.

Simian comes with a companion application, called SoundHound, which is usually automatically launched. If you look carefully in the System Tray, you'll see a little pair of binoculars – that's SoundHound!


Figure 0.1

SoundHound monitors specified folders on your hard-disk drive looking for new audio files. When it finds them, it extracts the Artist and Title information and automatically adds them to Simian's audio database.

By default, SoundHound is only monitoring the `c:\bsi32\audio` folder as shown here, which is where the demonstration audio is installed. Here's how to add your own folders to SoundHound by clicking the relevant icon.


Figure 0.2

 Add Folder

 Add Friendly Name

 Remove Folder

Clicking the **Add Folder** icon will allow you to browse your computer for folders containing audio files and add them one by one. When you have finished, you can minimize SoundHound (you need to leave the program running so it monitors the audio folders).

SoundHound may take a few moments to scan all your folders the first time and will add them all to the Audio Database…this will depend on the number of files. It should only take a couple of minutes at the most if you have 1,000 to 2,000 files – but will take considerably longer if you have more files.


Figure 0.3

Simian is designed to work comfortably with audio file amounts found at most radio stations. If you have tens of thousands of audio files, you should limit the number of files being monitored by SoundHound by storing them in different folders and only moving those files you are actually planning to use at the time into a monitored folder.

# Quick Playback

Now that SoundHound is monitoring these folders the files will appear in the Event Builder.

Event Builder is the section of Simian where all the Events that can be executed by Simian are listed. This includes the most common Audio Files and Macro Commands. Events can be executed in the Program Log, Scheduled Events, Trigger, HotKeys and Serial Sets.

You can start the Event Builder using the **CTRL-B** keyboard shortcut, **Tools | Event Builder** on the main menu, or by clicking the Event Builder icon.


Figure 0.4

If Event Builder doesn't start with the Audio tab displayed, click it so that your screen looks like Figure 0.5.

Scroll down the list to highlight different audio files, then using the **Drag From Here** area either drag and drop (holding the Left mouse button) to insert the new audio into your Program Log; or hold the Right button while dragging to replace the log item (overwrite).

By using the Windows **CTRL+CLICK** and **SHIFT+CLICK** shortcuts, you can select multiple files, or (within limits) groups of sequential files in just the same way you'd create / modify multiple file selections in Windows Explorer.

Notice that the Cue option is a **+** which means AutoStart. This causes events in the Program Log (or Virtual Carts) to play one after the other when in **Auto** (full automation) mode. The Cue column of the Program Log will also have the **+** sign displayed.
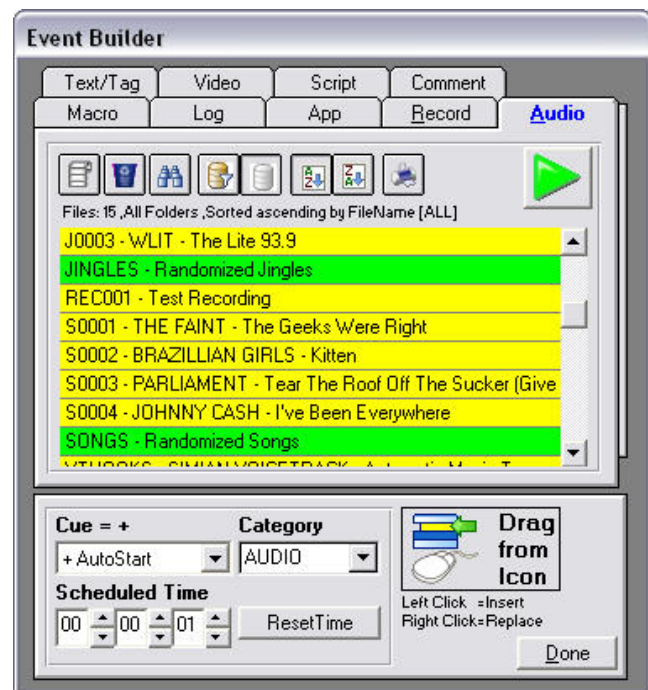

Figure 0.5

Once you have a selection of files in the Program Log, double-click the first Event to load the Play Decks, or click the **Make Next** button. When you're ready to go, just click the Play button at the bottom of the screen (as shown on the left in Figure 0.7).


Figure 0.6
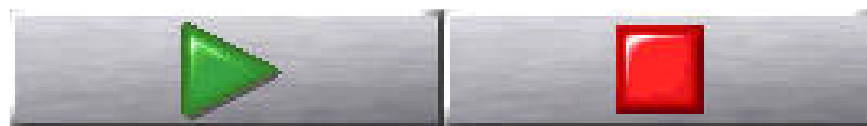

Figure 0.7

# CHAPTER 1: Introduction



Figure 1.1

Welcome to Simian. BSI is proud to introduce you to the latest generation of powerful, easy-to-use, professional broadcast software. Simian is truly a "radio station in a box" that can run your station unattended or handle the most ambitious operator-assisted tasks. It combines the best features of the most expensive systems with the flexibility of the Windows® PC environment to bring you affordable, high quality digital audio software.

Simian is designed to be an open, flexible system. This design makes Simian compatible with the other hardware and software you are likely to own. It doesn't require expensive black boxes, accessories or custom operating systems. If you're accustomed to Windows® software, you'll be comfortable moving around in Simian. This is because the developers at BSI are Microsoft Certified and have experience in either broadcast production or air studio environments. They designed the software to look and feel like a traditional radio station tool without straying too far from the tried and true standards of Windows® applications.

Simian's flexibility means more choices in the way you automate. Live-assist and manual modes give moment-by-moment control to the operator. In live-assist mode, the operator decides exactly what and when to automate as needed. Manual mode gives complete control to the operator at all times. Full Automation mode allows your radio station to run unattended whether the programming comes from your hard drive, a satellite content provider, or a mixture of the two.

Flexibility also means Simian can accept files from virtually any traffic and billing management or music scheduling system. Simian uses a variable import filter when reading files from other systems. In other words, as long as you can describe the way your incoming files look, Simian will be able to import them.

Simian has many other outstanding features -- true "cart" capability, HotKeys, external device control and direct integration with any audio editor just to name a few. With over 2500 successfully installed systems worldwide and a continually improving product, we're confident you'll be pleased with Simian.

We hope you enjoy your new software.

## Simian Features

Simian's best features are its ease of use, advanced technology and high versatility. Let's take a quick look at each of these features.

## Ease of Use

- Runs on Windows XP Pro or Windows 7 Professional 32bit.
- Drag-and-drop Program Log building and editing.
- Click-and-record on-screen Voice Track editing.
- Full satellite automation, audio-on-hard-drive automation, or live-assist operation.
- Free upgrades with a current Tech Care Plan.
- Wide-ranging technical support options with phone based Tech Care Plans and web based Ticket System.

## Advanced Technology

- True background and timed recording while playing.
- True "Triple-overlap" Voice Tracking with capable hardware.
- Variable segue and intro times for each cut.
- Label information can be embedded in audio files, no outside lists.
- True overlap and segue from many single sound cards.
- True "cart" capability (several audio cuts per cart).

## Versatility

- Run multiple instances of Simian on one PC for complete redundancy in multiple station environments.
- Launch and run other Windows programs.
- Controllable via console buttons or contact closures.
- Up to 32 relays to control external devices (tape machines, satellite receivers, even coffee makers ☺).
- Up to 32 incoming "Triggers" to accept control from the receiver, air board or other device.
- Serial communication with external devices.
- Programmable log import for compatibility with virtually any traffic and billing system.
- Support for unlimited number of broadcast networks.

## Other Simian Features:

- Three main playback decks
- Two record decks
- Mixer with user-defined labels
- Voice Track recording & advanced editing
- Automatic segue controls
- Dynamic HTML generation
- Time-shift recording
- Programmable serial port communication

# System Requirements

Although Simian will run on a variety of PC hardware platforms (we do not impose any restrictions) for peace of mind, we **strongly suggest** that you consider purchasing a fully configured system direct from BSI that is ready to operate out of the box (we can even pre-load a Music Library from our MusicStore for you).

These hardware configurations have been thoroughly tested with Simian and are known to work well when properly configured by BSI Technicians.  Most 'off-the-shelf' PCs will require careful configuration as Multimedia machines, rather than general office computers.

BSI systems are built using Dell computers and include a 3-year On-Site Warranty; or we can customize a 19" Rack Mounted solution for you using branded components that we have tried and tested.

If you decide to source your own hardware from other vendors then you will be responsible for any additional costs incurred to correctly configure your Hardware or Windows Operating System.   BSI Technical Support is limited to hardware or software that BSI has supplied and reserves the right to charge for configuration of third-party hardware / software that has been purchased elsewhere.


**Our recommended platform is:**

- Dell Optiplex GX780 Mid-Tower Computer configured with an Operating System hard drive and a large storage hard drive dedicated to audio files. (A 250Gb hard drive will store 5,000+ songs in Linear PCM format.  We do not advise monitoring more audio files than this at any one given time.)
- Intel Core2 Duo 2.4GHz or better
- Minimum 1GB RAM (2GB or more recommended)
- Windows XP Professional with SP3 or Windows 7 Professional 32bit (not 64bit)
- Professional AudioScience Audio Card with four playback devices and hardware mixer controls and metering - plus decoding of MPEG Layer 2, or MP3 audio on the audio card.  We publish the latest tested drivers on our web site.
- 17" or larger monitor running at 1024 x 768 or higher resolution (1280x1024 4:3 ratio or 1600x900 16:9 ratio or higher recommended)
- Optional dual-output video card
- Optional touch-screen
- Optimized for multi-media play out by BSI technicians, rather than 'appearance' or office applications.  BSI Technical Support does not cover the cost of configuring computer systems or other hardware not purchased by BSI.

Although Simian will run on lesser configurations, this is known be a good, stable platform that will run for extended periods of time.   Please check with BSI Sales for latest model specifications.  **We do not recommend running Simian on any server based operating System, including Windows 2003 or 2008, nor do we recommend or support 64bit operating systems.**

If you are sourcing your own computers & hardware, please ensure that all the hardware is fully compatible with the motherboard - and pay particular attention to memory and cooling.

We have put together a list of some of the major pitfalls to avoid:


- Any server based operating system (including Windows 2003 or 2008)
- Windows Vista (any type) is not supported.
- Any 64bit operating system.
- Celeron or AMD Processors – we prefer Genuine Intel (Core 2 Duo, Core i or Xeon) CPUs
- Non-Intel Chipsets (these have all proved troublesome in the past)
- Software RAID / SCSI / Emulated Drives - use PATA & SATA drives and hardware RAIDs when necessary.

_____

- 'Cheap' Memory - make sure you use a brand recommended by your motherboard manufacturer.
- Flimsy, thin cases with little RF shielding
- Consumer Grade Audio Cards (these almost always lack the features required for some of Simian's advanced operations and virtually none provide audio level metering or 100% compatible Windows Mixer control).

In general, we also recommend that for music-on-hard-drive stations, two PCs be used... one for the On Air Studio and the other for Production. While it's fine to do log-building and other basic Simian functions on the air machine, it is usually better to edit music files and do other resource-consuming tasks on a computer that isn't actually broadcasting.

# Contact Us:

| | |
|---|---|
| Home Page: | http://www.bsiusa.com |
| Support Page: | http://support.bsiusa.com |
| | |
| Info email: | info@bsiusa.com |
| The front desk: | (541) 338-8588 |
| Sales phone: | 1-888-274-8721 |
| Tech Support phone: | (541) 342-5250 |
| Validation Codes: | http://www.bsiusa.com/codes/ |

# Chapter 2: Overview

This section is intended to give you all of the information that you need before you set up Simian. It will cover a variety of "Gotchas" and other issues that will make the whole process go much more smoothly.

## Windows Issues

It has been said that the main strength of Simian is that it runs in Windows, just like any other application. It has also been said that the main weakness of Simian is that it runs in Windows, just like any other application. Simian is easy to use, and the interface has been designed to operate in ways that "radio people" will find familiar. However, when you make the decision to run your radio station on a computer, it becomes important that the people who set up and maintain that computer have an appropriate level of knowledge. It's usually pretty easy for the DJ's and operators to learn enough to operate Simian with a minimum of computer knowledge. However, just like you need a knowledgeable radio engineer to handle all of the electronics involved in this industry, you'll need a knowledgeable computer technician to handle the computers that have become invaluable to this industry.

Which flavor of Windows® is the best for Simian? There are a number of considerations when picking an operating system. To make things simple, we recommend Windows XP Pro with Service Pack 3, or Windows 7 Professional 32bit, as they have been tested by BSI and found to be stable and can run unattended without a reboot for longer periods of time. We do not recommend or support any Home/limited versions, or Ultimate/advanced versions of Windows for use with Simian as they either don't have full network functionality or they load on extra non-essential UI graphics functions. BSI also does not recommend or support any server or advanced server flavors of Windows.

## PC Management

Organizing your files well can make or break your success with Simian. Here are some of the most important considerations:

File names – BSI highly recommends that you use the old DOS 8.3 file naming convention. Most audio file formats have tagging information available directly in the file, so 100 character file names are not needed. Simian does a lot of file lookups and it takes much more time for your PC to look up "This_is_the_title_this_is_the_artist_this_is_the_album.wav" than to look up "71335.wav"

Working your on-air PC and your production PC into your existing network is very important to the future efficiency of your organization. Make sure that you read our section entitled "Networking Simian" before integrating your new PC's or setting up a new network.

You have complete control over where you put any files on your computer. In Simian on the Paths tab under Tools/Program Options you can completely control where Simian looks for the files that it needs and writes the files that it creates. For information on how to index audio files, check out the section on SoundHound.

Design your maintenance schedule now. It is important to have a schedule for rebooting, running scandisk, and defragmenting your hard drive. These operations take much less time if they are performed regularly.

Do not run antivirus software on your air machine. This is very important because in some situations antivirus software can cause audio break-up on-air. Our recommendation is to install your choice of antivirus applications on your production machine and run it, on a scheduled basis, from across the network. This leaves the on-air PC without the performance hit and file availability issues caused by antivirus software constantly scanning files.

## Your PC as Broadcast Equipment

Computers are often viewed as isolated devices much like any office machine, in that they can be protected against power transients by a simple protected power strip. However, when you make the commitment to install Simian and your entire library of music, commercials and station production packages, your computer suddenly becomes a major piece of critical broadcast equipment.

Normally, broadcast equipment is mounted in grounded metal racks, and the individual devices that sit on the rack are still separately bonded to a master station ground. This should also be done with the computers and any other computer-connected equipment. Since a typical computer does not usually have a specified bonding connection, you or your engineer should look for a convenient screw near the power supply that is firmly screwed into the metal chassis. A # 14 or larger wire should be run from there to the nearest equipment bonding (grounding) point.

You'll also want to use protected power strips to further isolate your system from interference or electrical problems. These can also protect external connections like the telephone line that is connected to your modem. By far, the best means of overall protection against serious electrical problems is to use an un-interruptible power supply (UPS). The proper type to use is the kind that continuously charges a battery. The battery then operates a power converter to provide power to the protected load (the computer and its equipment). Some UPS devices use fast switching to transfer the load from AC mains to converted battery power and therefore do not provide as much protection.

Another extremely important issue is adequate cooling and freedom of access. A reasonably dust free environment, off the floor with good air circulation is what you should seek. Remember as well, that in time of emergency or when certain support questions need to be answered, you may be asked to check the connections on the back of the machine. A good installation requires accessibility.

If you are in a building with the broadcast transmitter locally installed, you should consult with your engineer about possible 'special' protection that may be needed. This may include shielded network cables, choke protected telephone lines, ferrite beads on Trigger wires, physical screening or other specialized practices. Care should also be exercised with wire runs. For example, network and telephone cables should be run away from AC wiring. All audio wiring should be shielded and the shield appropriately grounded.

These simple procedures will not only make your station more reliable, but can save you time and money spent troubleshooting "ghost problems".

## Why Use Professional Sound Cards?

Professional Audio Cards are the most important investment that you can make to transform your high quality PC into a professional audio device. Professional audio cards provide the highest possible audio quality from your PC. Think of all of the efforts of all of the people in your organization, from the GM, to your talent, to your sales people… All of the efforts of all of these people flow through that one audio device. This alone is a great reason to step up to professional equipment. Quality audio devices also provide the functionality that you need to make your station sound the best! Here are a few examples of the types of features available with professional grade audio devices:

Multiple audio devices provide true overlap. Many single professional grade audio devices can perform triple overlap playback all by themselves!

Record while you're playing back. You can play back, record, or do both at once. With many of these cards you can record Rush Limbaugh while doing triple overlap. Try that on a consumer grade card.

Decompress and play back files with very little strain on your computer's processor. That's right, on-board decompression takes over the load so that your processor is free to handle other automation tasks.

It all boils down to one simple fact. You could run your radio station with that "pro" soundboard from Radio Shack, but you don't. So why run your million-dollar radio station with a consumer grade sound card?

## Production Issues

While Simian can be run on the air while you're doing production work, we cannot guarantee that the production features will not slow down the computer and affect on-air playback. Look at it this way; A few years ago it was not uncommon for a radio station to pay $3000 for a single cart machine. A production computer with a pro sound card can cost as little as $2000, and you can run Simian in Production Mode, which is much less expensive than Full Mode. Do the right thing for your business and your employees… Set up a production machine. You'll thank yourself later.

# Choosing Audio File Formats

One of the most common questions people ask when they're setting up Simian is "What audio file format should I use?". Unfortunately, the answer from Technical Support is that there is no single "right" file format. The reality is that you'll need to do some research. In the interest of making this question a little less daunting, we've gathered the information that you'll need to make an informed decision regarding your choice of file format.

## Considerations

The file formats listed here are the most commonly used in the Broadcast Industry. This is by no means an exhaustive list of file formats or compression schemes.

Simian can play any file format that Microsoft Windows® can play. You should use Windows Sound Recorder *(not Media Player)* to test a format. In short, if it'll play in Sound Recorder on a particular audio device, it'll play in Simian on that audio device *(an audio device is a sound card or part of a sound card)*.

## So, what is a file format anyway?

To truly understand file formats, we'll need to discuss the different properties of file formats in general. Let's go ahead and look at the properties of an audio file:

**Format**. Common Formats are PCM, ADPCM, and MPEG. The word "format" simply describes the method for keeping the audio information *(and the compression scheme, but we'll get to that later)*. Windows requires a Codec (*coder-decoder)* to play each type of file format. PCM is standard uncompressed windows audio.

**Bits-per-Sample.** Bits-per-sample refers to the amount of bits in each sample, or the *resolution* of the file. This sounds complicated, but boils down to this; An 8 bit file stores audio at 8 bits of computer memory

for each sample, or "snapshot" of the sound. A 16 bit file stores in 16 bit chunks, but provides a much finer resolution, which means more accurate representation of the original file. A 16 bit file will be larger, but will have better fidelity.  There are few occasions where you will want to use an 8-bit file.

**Sample Rate**. Sample rate refers to the number of samples per second. Once again, the higher the sample rate, the higher the fidelity, and the larger the file size. Typical sample rates are 44,100, 32,000, and 22,050

**Mono/Stereo**. Just like it sounds. Stereo files store data for two separate "channels" of audio. They are larger and are more realistic sounding than Mono files.

So, when you see a PCM, 44,100, 16 bit Stereo file, you know what all of it means. Oh, by the way, it may seem like a PCM, 44,100, 16 bit Stereo file would be twice as large as a PCM, 22.050, 8bit, Mono file. In fact, it's 8 times as large! Think of it this way:

<div align="center">

**Bits per Sample** \* **Sample Rate** \* **Number of Channels**

</div>

Now that we've cleared this up, let's take the next step and look at Compression. There are two main compression schemes used in the Broadcast Industry: MPEG and ADPCM

**ADPCM** is more easily edited than MPEG and has a fixed 4:1 compression ratio. ADPCM is supported natively within Windows and therefore can be played on almost any Windows system. ADPCM can be edited many times with little loss of resolution.

**MPEG, Layer 2 (MP2)** maintains slightly higher audio resolution and has a variable compression ratio. Classically, the compression ratio is set 5.56:1 for broadcast use. MP2 is generally considered the broadcast standard. However, it is not natively supported in Microsoft Windows and therefore you will need to purchase a proprietary codec to handle compression and decompression of the files when you want to play or record. Codecs can be installable software or can be "hard-wired" into a professional audio card. MPEG audio loses resolution each time it is edited.

**MPEG, Layer 3 (MP3)** has a much more variable compression ratio and has recently become much more popular in the Broadcast Industry.  As with MP2, you'll need a proprietary codec to code/decode MP3 files. This codec can be an installable software product or may be included within the logic chip on a professional audio device. Once again, MPEG audio loses resolution each time it is edited.

So how does this affect file size? Well, think of it this way:

<div align="center">

**Bits per Sample** \* **Sample Rate** \* **Number of Channels / (Compression Ratio)**

</div>

The trade-offs in sample rates/bits/channels are all about file size and fidelity. The better you want it to sound, the larger the file will be. It's really that simple.  The rule for compression formats is to choose one and stick to it. Mixing audio file formats *and especially sample rates* is a good way to cause audio break-up.

Which Format is right for you? Only you can decide…but now you have the facts you need to make an informed decision….


…the easy answer is that, for the highest quality, choose linear PCM, Stereo files sampled in 16 bits at 44.1 KHz.  This is the same quality as CDs.

# Simian Concepts and Terminology

Throughout this manual we are going to refer to certain "BSI-centric" terms and concepts. This section is intended as a primer to help you think about Simian from our angle. We fully cover all of these concepts later in the manual, but we hope that this section will help you understand how it all fits together before we hit you with the technical stuff.

## Events, Logs, Carts, and Sets

Simian, at its core, does two main things. It sequences through lists and references lists.

Each line in a list is an "**Event**", and each Event holds a particular set of instructions for Simian. Each element of an Event is known as an **Event Variable**. Event Variables include Cue, Number, Status, Scheduled Time, Actual Play Time, Length, Category, Name, and Description.

There are three types of lists in Simian. They are called "**Program Logs**", "**Carts**", and "**Sets**". Simian sequences through Logs and Carts, and it references Sets.

When Simian *references* a Set, it simply starts the Event that relates to the line item that has been selected. A good example of this is HotKeys. Simian allows you to set up 16 on-screen buttons to perform any type of Event that you'd like. These 16 buttons reference a Set with 16 event lines. To make button #3 start an Event, you drag that Event into line #3 of the HotKey Set. Now, when you click button #3, Simian references the HotKey Set and starts the Event that is assigned to HotKey #3.

When Simian *sequences* through a Program Log or a Cart, it uses the information in the Cue column of that Log or Cart (such as the main Program Log) to control the sequencing. There are a number of different "Cues" available. For now it's only important for you to know this: The first thing Simian does when it sequences down a Program Log or Cart and reaches an Event is to read the Cue column which causes Simian to start the Event, stop, or wait accordingly.

There are two types of sequenced Lists: the Program Log and Carts. The Program Log is the top-level list that holds all of the other Events. The Program Log takes up the center-left section of the main Simian interface. Carts are somewhat like mini-logs that run as Events within the Main Program Log. Carts emulate the old-fashioned tape-based carts that many of us used prior to the advent of digital audio. The main Program Log emulates old-fashioned play lists.

So, how do we get the Events into our Logs, Carts and Sets? We use the Event Builder to build Events, which you can then drag into your Program Logs, Carts, and Sets.

# The Event Builder in a Nutshell

The Event Builder is the tool that you use to create Events to put into Program Logs, Carts, and Sets. The Event Builder is the main tool used to manually build Program Logs. It can also provide access to the Info Editor where you can view, add and edit the label information for carts and audio files. Think of it as the 'Event construction kit'.

You can open the Event Builder in one of three ways:

- Select Tools/Event Builder.

- Press Ctrl+B.

- Click the Event Builder button at the bottom of the Program Log.

Events in the Program Log can be changed or inserted using the Event Builder. On opening the Event Builder
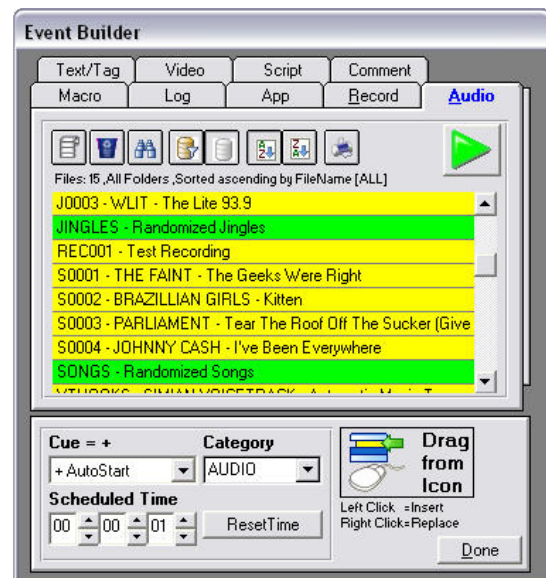
Figure 2.1

(Ctrl+B), you will see the Audio tab showing a list of the audio files that are available through SoundHound.  To add a file, just select it and drag from the **Drag From Here** spot into the Program Log, Cart, or Set.

You should also configure an Event's "Event Variables" such as the Cue, Category, and Scheduled Time before you drag it in. Different types of Events have different Event Variables. For instance, Macros have configuration string that must also be configured. Scheduled Times will not always apply to all Cues (such as AutoStart (+)). If the Scheduled Time does not affect a particular Event because of its Cue, the Program Log will still display the Scheduled Time that you set in the "Sched" column in the Program Log.

Look for more on Cues and how they work in Chapter 4.

# SoundHound in a Nutshell

It should come as no surprise that a digital automation system would need a way to keep track of all of the audio files that you keep on your computer. Simian uses a helper application called SoundHound. What SoundHound does, simply enough, is "index" files. This means that you tell SoundHound which folders your audio files are in, and it goes out and reads all of the information about those files, including the header information or tags. As it reads the files it creates a database. That database is where Simian gets its information about the audio files on your system.

Simian and SoundHound are actually two independent programs that live in a symbiotic relationship. Here's how it works:

SoundHound indexes the folders (i.e. reads through the files and gathers information about them) that you tell it to look at in the **Folders** field on the **Folders** tab within the SoundHound application. You can open SoundHound by double-clicking the black binocular icon in your system tray by your Windows clock.

Once SoundHound has indexed the files, it puts the gathered information in the Audio Database (the file name is audio.mdb). You'll find the Audio Database in the folder that is designated in the **Audio Database** field on the **Folders** tab in SoundHound.
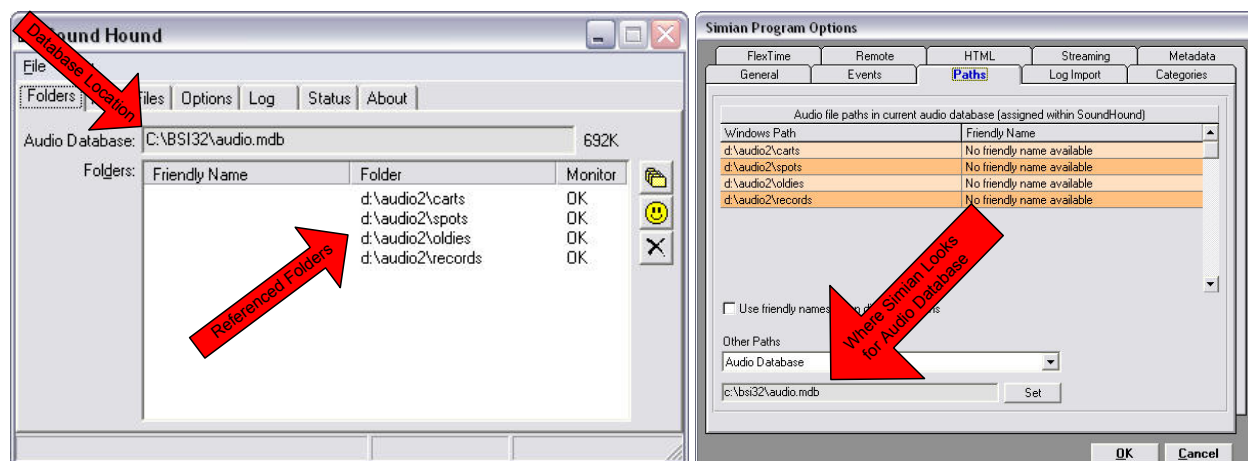


Figure 2.2
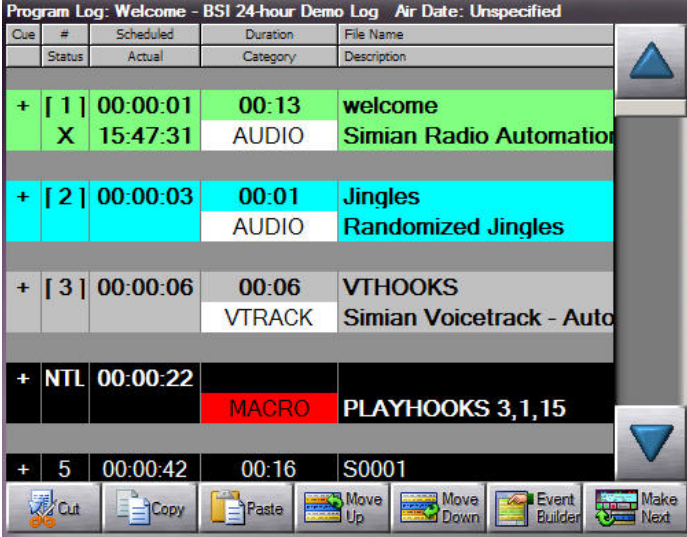
Simian then references the Audio Database whenever it needs to fill the Audio List. You tell Simian where to look for the audio.mdb in the **Other Paths** field on the **Paths** tab under **Tools/Program Options**.

Once Simian is looking in the proper place for the audio.mdb file that SoundHound has created, we have synergy (and files in the Audio List).

# The Welcome Log in a Nutshell

When you start Simian, it will automatically launch the "Welcome" Program Log shown to the right.

The Welcome log is designed to show Simian in action and to give you an example of a simple Program Log. It is important to remember that the Program Log emulates the play logs historically used in the Radio Industry. The Program Log is little more than a list of Events, each of which instructs Simian to perform an action. Simian then simply sequences through the Program Log one Event at a time. You can use the Welcome log as a template for the creation of your own Program Logs and as a test log for editing practice. Try adding Audio Events, Macro events, Cart Events, from the Event Builder (on the Tools menu). This will help familiarize you with the Event Builder as well.



Figure 2.3

You can edit Program Logs in many of the same ways as you would any Windows application. For example, clicking on an Event and pressing Ctrl+X, Ctrl+C or Ctrl+V. These shortcuts will cut, copy or paste the highlighted Event.  Right clicking on Events brings up additional menu options as well. Items can also be dragged around within the Program Log as well as into and out of the Program Log from other parts of Simian such as the Event Builder. Check out the "Using Program Logs" section in Chapter 4 for more information on using Program Logs.

Please do not delete the Welcome Log.  You may need it for testing, should you ever need assistance from our technical support team.

# The Asynchronous Deck in a Nutshell

Simian has a fourth playback deck that you can view by selecting Async/Show Asynchronous Deck from the main Simian menu bar. This deck plays all events that happen out of sequence as Simian moves through its Program Log. All Triggers (signals from a satellite receiver), HotKeys, Serial Events, Scheduled Events, and any Events with a Non-Sequential cue (N) play in the Asynchronous Deck. Events played in the "Async" deck play on their own, outside of the normal sequence of the three main playback decks.
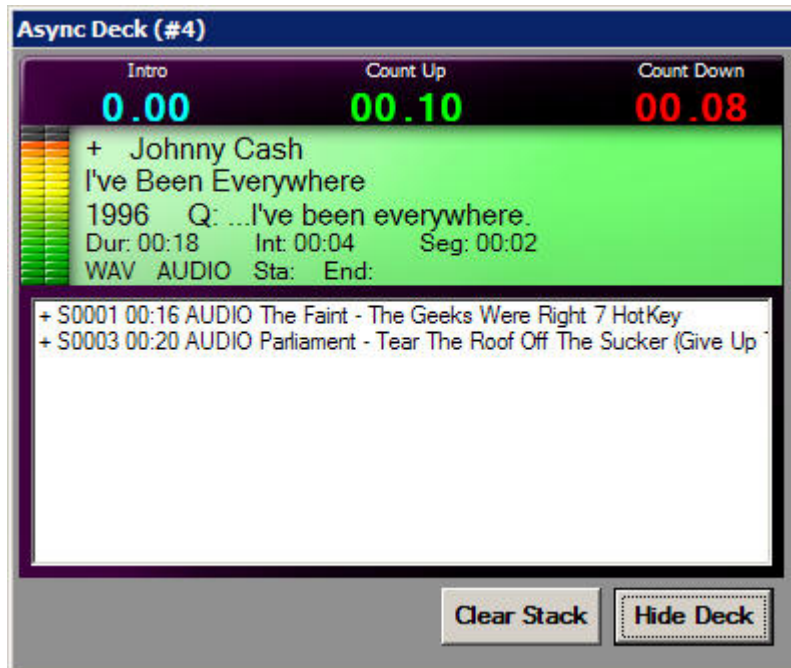


Figure 2.4

# Chapter 3: Setup & Configuration

## Before You Install Simian:

Verify that your computer is running properly and that it is properly connected to your network if you have one. A machine that is not running properly will not run Simian properly. Similarly, a machine that's having problems communicating across a network will not run Simian properly in a networked configuration.

Verify that all your peripherals are installed and configured in accordance with the manufacturer's specifications. Peripherals are any devices that attach to the computer and add functionality. Typical peripherals for a Simian machine are trigger/relay devices and professional quality sound cards.

Install Simian using the *full installation of the newest version* (available for free download on our support website and on CD-ROM for a nominal fee) then restart your computer.

Remember that Simian does not control the actual audio playback functions of your machine, but rather directs the Windows audio subsystem. Therefore, if you cannot play audio in the Windows Sound Recorder, you won't be able to play it in Simian. Windows Media Player is not a valid test for this subsystem, as it can use DirectSound to bypass certain functions that Simian needs to control pro audio cards.

# Installing Simian

## Considerations

Installing Simian is an easy task, and to make it easier, we'd like to point out a few things that you should take into consideration before installing the software.

1. Do you have a properly working audio card installed in your computer? Simian will not run without an audio device.

2. Does your computer meet or exceed our Recommended System Requirements? Not sure? Check out Chapter 1.

If both of these items are true, then it's time for us to install Simian. Simian installation is performed in several parts:

### Part 1: Shut Down Unneeded Processes

**Windows 2000/XP Pro/7 Pro 32bit**

1. Shut down all items running on your Task Bar and System Tray.

2. Move on to Part 2.

### Part 2: Installing the Sentinel Protection Driver

Simian's Validation Process utilizes a USB Hardware Key (shown left) which requires the 'Sentinel Protection' Windows Driver.

You should always ensure that you have the latest BSI-tested version of this driver, available on our 'Drivers' page, or from the BSI Install CD when purchasing a new product – **and that is it correctly configured**.

The following instructions are a step-by-step walk through of how to install and configure the Driver that will only take a few minutes. (This driver is NOT provided with the Simian demo download, nor required for the demo version).

Figure 3.1

### Part 3: Installing from the BSI Install CD

The BSI Install CD should automatically launch when inserted into your CD-ROM drive. If you have disabled that feature, double-click the **Install.exe** file on the CD.

You will then see the Application Selection window (see below). Choose "Sentinel Protection Installer – for BSI Dongles" (the first option from the dropdown list) and click **Install**.

Figure 3.2

## Part 4:  Download the Driver

If you do not have your BSI Install CD available, the latest BSI-tested version of the driver is also available for download on the 'Drivers' page at http://www.bsiusa.com

Save the .zip file to your hard-drive and extract it (Windows 2000 users will need to ensure that they have www.winzip.com installed to extract the file, Window XP has this functionality built in).

To install, double-click the .exe file that is extracted by the above process.

Note:  The following images may change as drivers / installers are updated and depend on the Operating System installed on your computer.

## Part 5:  Installing the Sentinel Protection Installer

After starting the Sentinel Protection Installer from the BSI Install CD, or by downloading from the internet, you can follow the on-screen prompts as shown below to complete the installation.
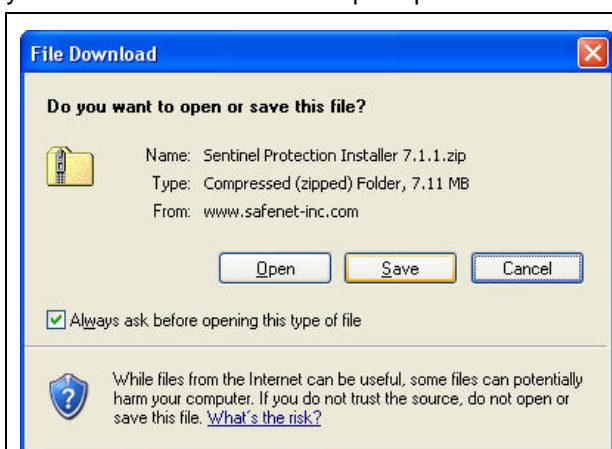
| | |
|---|---|
| Figure 3.3 | Figure 3.4 |
| Figure 3.5 | Figure 3.6 |
| Click **Next >** | Read & Accept, then click **Next >** |
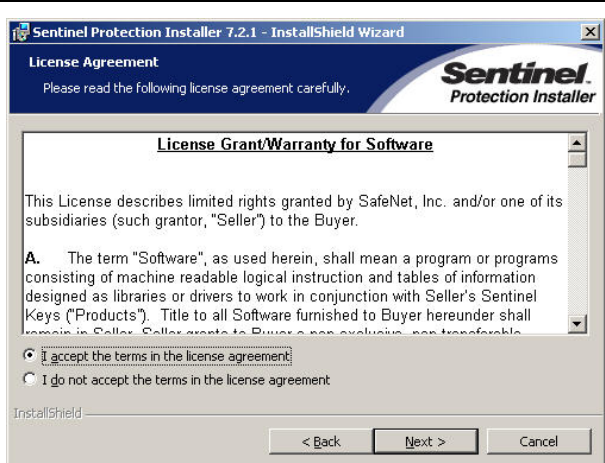
Figure 3.7

Select **Cu_stom** and then click **Next >**
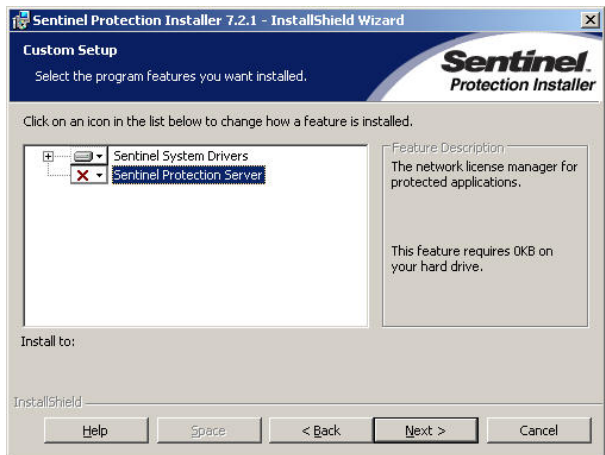


Figure 3.8

Disable 'Server' option and Click **Next >**
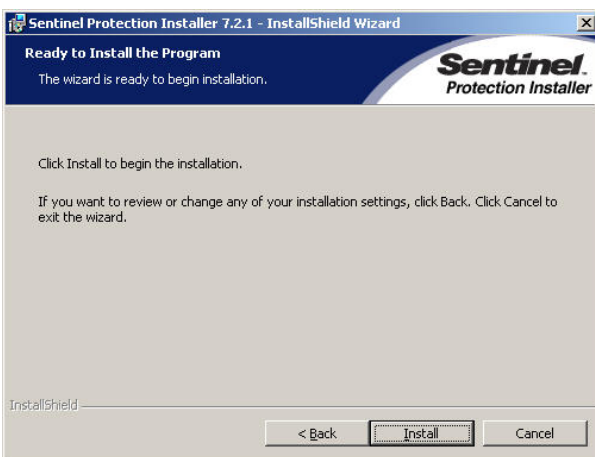


Figure 3.9

Click **Install**
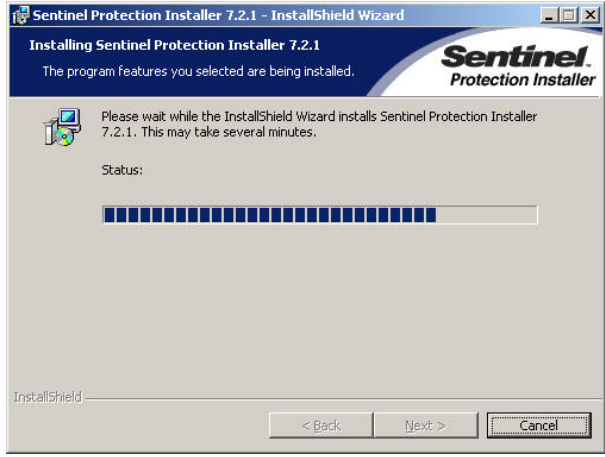


Figure 3.10

Click **Next >** when available

Click **Finish** when the InstallShield Wizard has completed the task (see below).

---

### Windows XP SP2 users only

If you did not select the 'Custom' option, or allowed the 'Sentinel Protection Server' to be installed, then customers using Windows XP Professional will usually see an additional "Windows XP detected!" window.

It is recommended to choose "**No**" at this prompt to continue because the BSI hardware key does not support the 'Protection Server' features of the driver.

The Sentinel Protection Installer will then finish copying files and you can click **Finish** when the InstallShield Wizard has Completed.
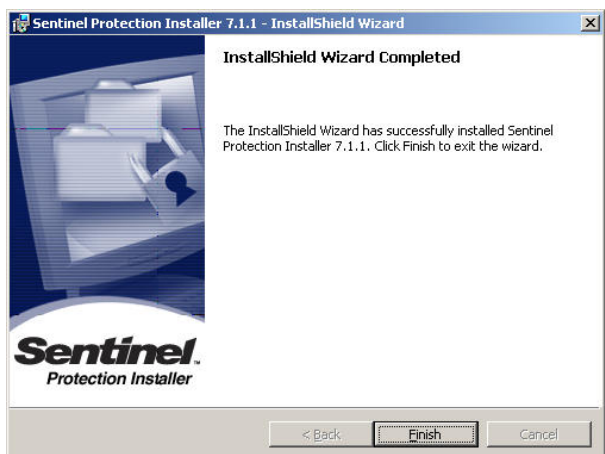


Figure 3.11

_____

If you are including Simian in your Windows Startup folder so that it automatically runs when Windows is booted, **it is recommended to change the Start-up Type of the Sentinel driver from Automatic to Boot.** (Otherwise, Windows XP waits until the user interface is loaded).



Figure 3.12

Right-Click My Computer and choose **Manage**. Highlight **Device Manager** and from the **View** menu, select "**Show hidden devices**."
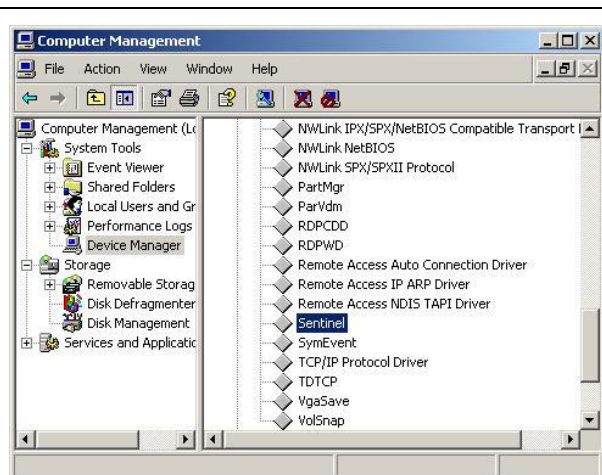


Figure 3.13

Expand the **Non-Plug and Play Drivers** section and search for "**Sentinel.**"    Right-Click it and choose **Properties**. (If you do not find an icon for Sentinel, reboot and repeat).
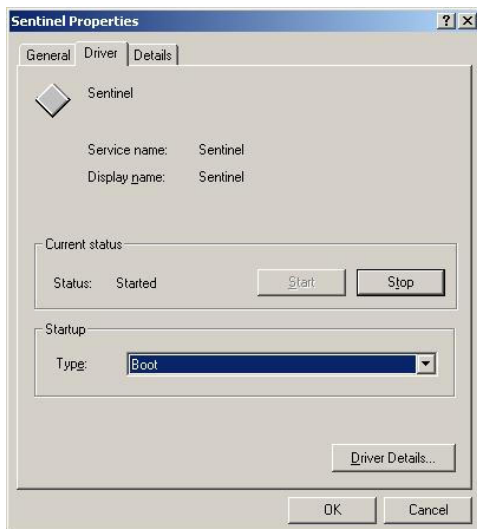


Figure 3.14

Go to the **Driver** tab and from the Startup **Type** choose **Boot** from the drop-down list and click OK.

You can now close the Computer Management window and it is recommended that you restart your computer.

**Part 6:  Install Simian**

You can install Simian from the BSI CD, or from a downloaded installer file. Both the CD and the download contain the same Simian_Setup.exe file.

1.  Start the Installer

    - If you downloaded the Simian_Setup.exe file, double-click it.

    - If you are using the BSI CD, simply put it in your CD ROM, wait for the BSI window to show up on your desktop, then select Simian and start the installation.

2. Click **Next** and you'll get to the License Agreement screen. You'll have to click the radio button that says "I accept the terms in the license agreement", and then click **Next** to continue with the installation.

3. In the Customer Information screen, you will be asked for your **User Name** and **Organization**. Just enter your information and click **Next**.

4. The Setup Type screen will allow you to select between **Full**, **Update**, or **WaveStation** setup.

   - **Full** Installation will install Simian and wipe out any settings from previous installs. Use this setting for a new installation of Simian.

   - **Update** is used for upgrading Simian. It will preserve Program Options and Hardware Options settings from a previous Simian installation.

   - **WaveStation** is for our customers who are migrating from the WaveStation product. This installation will seek out the old WaveStation Program Options and migrate them to Simian automatically.

   Click **Next**

5. The Select Options screen allows you to specifically install components that Simian needs to run on different platforms. The rule of thumb here is that if you're unsure… Install it. It is *very* rare for any of these components to interfere with Windows or other software. Select what you'd like here and click **Next**.

6. The Shortcut Folder screen allows you to change the name of the folder in which Simian will show up under Start/Programs. Once you have the name the way you'd like it, click **Next**.

7. The Ready to Install screen allows you to review your installation choices and start the installation. Make sure that you like what you see here and click **Next**.

8. The Windows installer will automatically install Simian and bring you to the final screen, which will let you know that installation has completed successfully.  Just click **Finish** to finish the installation.

### Part 7:  Restarting Your Computer

Once you have finished the installation process, restart your computer to make sure that everything registers properly. This is not necessary, but is always good practice whenever you install software of any kind.

_____

## **Validating Simian**

Simian is protected by security hardware and validation codes that allow for limited testing of the software prior to purchase.  These security measures are disabled when you purchase and validate the software. In demonstration mode, Simian will run for one hour and then shut down automatically. This functionality is designed to let you download and try out Simian before purchase.

When you purchase Simian, you are shipped a small hardware key. To validate Simian, simply plug the hardware key in one of your computer's USB ports. When the hardware key is installed, Simian will need a validation code. You'll find it on a piece of paper in the blue folder included with your hardware key.  Once you've located your validation key, simply go to Help/Register and fill in the required information.

It's really that simple. Plug in the hardware key, then go to Register on the Help menu and enter the Validation Code, and Simian is ready to go. The same process applies when you move Simian to a new computer.

Simian can be validated for three different modes. These different modes correspond to the three different types of licenses available. Let's take a look:

- Full Mode allows you to run a single copy of Simian on the air and a single instance of Production Mode (with nine sessions) on the same computer.


Figure 3.15

- Production Mode allows you to run a single copy of Simian in Production Mode with up to nine sessions on any computer.

- Multi Mode allows you to run multiple copies of Simian in Full Mode and/or Production mode on one computer, and up to nine production sessions for each instance of Production Mode.

If you lose your validation code, you'll need to visit the **Validation Codes** page of www.bsiusa.com and enter your:

- Customer ID number

- Version number

- Serial Number

- The name under which Simian was purchased

We normally return validation codes within 1 hour during business hours. The required information can always be found by going to the **Help** menu and choosing **Register**.


Figure 3.16

_____

# Configuring SoundHound

Simian and SoundHound are actually two independent programs that live in a symbiotic relationship. Here's how it works:
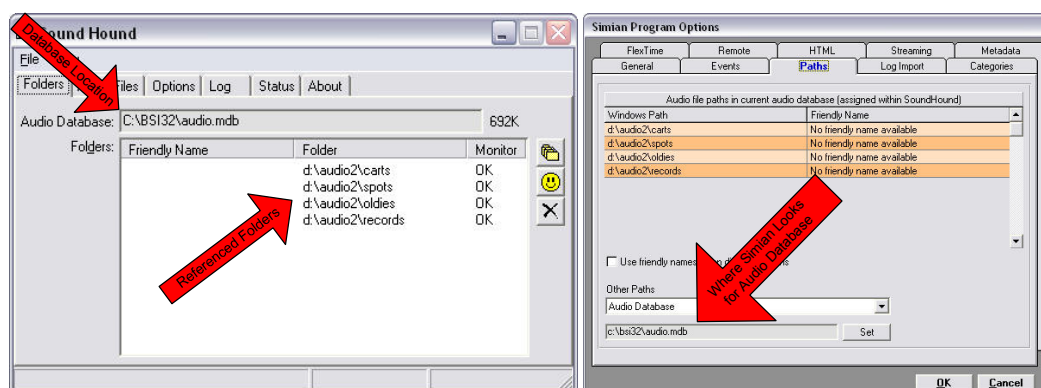


Figure 3.16

SoundHound indexes the folders (i.e. reads through the files and gathers information about them) that you tell it to look at in the **Folders** field:

Once it has indexed the files, it puts the gathered information in the Audio Database (the file name is audio.mdb). You'll find the Audio Database in the folder that is designated in the **Audio Database** field on the **Folders** tab in SoundHound.

Simian then references the Audio Database to fill the Audio List. You tell Simian where to look for the audio.mdb in the **Other Paths** field on the **Paths** tab under **Tools/Program Options.**

Once Simian is looking in the proper place for the audio.mdb file that SoundHound is creating, we have synergy (and files in the Audio List).


## SoundHound and Path Configuration

Whenever Simian is running in normal mode, SoundHound will also be running by default. Open SoundHound by double-clicking the binoculars symbol in your Systray.



To add a folder to the Folders list, click the **Folders** tab, then use the **Add a folder** button to add all the new paths to all of the folders that contain the audio files that you want to reference in Simian. This will take a few moments as SoundHound adds each file to the audio database. You can click the **Audio**



Figure 3.17

**Files** tab to view the information from your new database when it is finished loading the file names. If you have a large audio collection, and SoundHound seems to take a long time to perform the initial inventory, you can also select **High Priority** in the **Options** tab. This option is intended for times when you need to index a large audio collection. High Priority mode is not intended for day-to-day use.

SoundHound's file management capability is more efficient and more accurate than previous methods. This is because it records every file change automatically to a central database, which is shared by
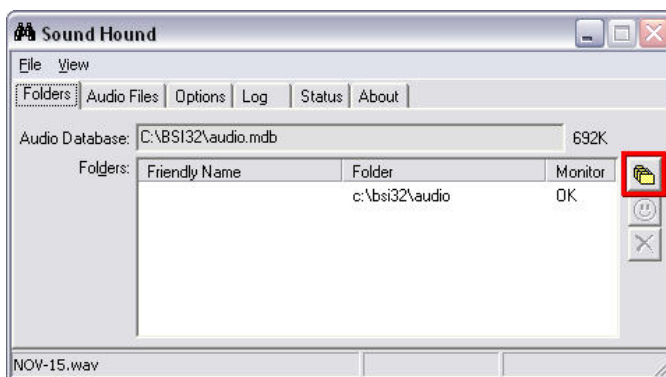
Simian and other BSI software. Changes are made in the background while your programs are running, and SoundHound always receives a lower resource priority than any application that is playing audio so that it will not interfere with on-air playback.

Because SoundHound automatically records any changes made to files within its specified directories, no manual updating or refreshing is necessary. This is true only as long as SoundHound is running in the background when you are creating, editing or deleting audio files. If it is not, you will want to refresh SoundHound manually the next time you start it.

SoundHound contains six tabbed windows: Folders, Audio Files, Options, Log, Status, and About. The next section describes each tab and option so that you can decide which options are right for your configuration.

## Folders

The Folders window is on top when you open SoundHound, and shows your audio database path and the paths of any music folders you have added. The audio database is named audio.mdb. SoundHound will always create the audio.mdb file in the same folder as the SoundHound executable file (sndhound.exe). You can, however, put SoundHound anywhere that you want on your computer. You'll just need to let Simian know where to look for the audio database. You can do this on the Paths tab of the Simian Program Options dialog box (under the Tools menu).
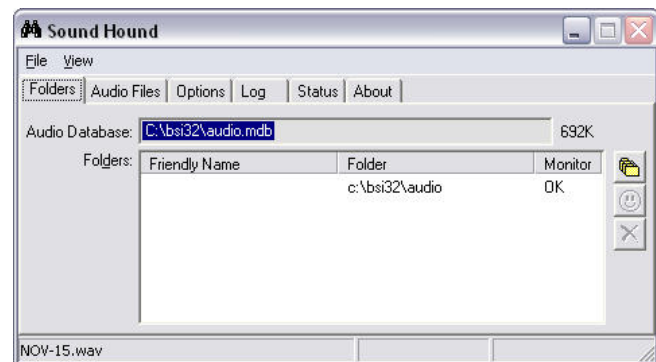

Figure 3.18

**DO NOT PUT THE SOUNDHOUND PROGRAM IN THE SAME FOLDER AS AUDIO FILES!** The SoundHound program file is sndhound.exe. Putting this file in a folder that SoundHound is indexing will create a loop where SoundHound will refresh constantly -- each message to refresh will cause a write to the Audio.mdb, which will cause a message to refresh, and so on.

Below the Audio Database path is a list of all your music folders. This is where SoundHound searches for audio files to index. All the audio files found in the folders listed here are indexed and added to your audio database. The buttons to the right let you add a folder, create a friendly name for the path (the smiley face icon), or remove a folder. This friendly name is the *only* place you want to be using long names with special characters such as apostrophes.

### Audio Files

The Audio Files tab allows you to see a list of the audio files that are currently indexed. You can also refresh that list, cancel a refresh, and see if you have any duplicate files. You'll also find a small window with statistics such as how many of what kind of audio files you have.

### Options

Manual mode can be used when you want SoundHound to run, but you don't want it to constantly refresh files that have changed. For example, if you are making a lot of changes and just want to update SoundHound at the end, you might use it in Manual mode until you are ready to switch it back to normal mode.

With High Priority unchecked (the default setting), SoundHound lowers itself to a very low processor priority and introduces wait states when manipulating files. Choosing High Priority causes SoundHound to run at the same (normal) priority as other applications on the system (like Simian). The High Priority setting is designed for situations where you are refreshing very large numbers of audio files and you want your computer to make that operation its main priority. This setting can cause audio break-up if you run it while Simian is on-air.

Auto refresh is available for use when you are using files across a network. SoundHound will only automatically update files that are changed locally. If someone is changing files across a network and SoundHound needs to see these changes, you may want to use the auto refresh option to schedule refreshes regularly.

Compacting your database is very important, especially when you are working in Live-Assist mode, where many changes are being made to files and carts within your audio database. Compact at Startup removes all previously deleted files from your audio database. When you delete a file from your audio database, it disappears but isn't permanently removed until the database is compacted. Auto Compact does the same thing automatically, while letting you manage the frequency.

We recommend compacting at startup and also once a day (as a scheduled event). The drawback to compacting too frequently is that it takes a minute or so and you cannot access your files through Audio List while a compact is in progress. Try a few different settings to determine what works best for you.

In some advanced configurations, you may want to use an INI file to hold path information instead of the Windows Registry. For example, if you are managing a cluster of stations that are sharing a single database. The INI file can be used to store your paths so they can be updated for several stations simultaneously.

You can use the Hide File List option to hide the file list on the Audio Files tab in SoundHound. This option allows the SoundHound interface to react more quickly on slower computers.

The Notification filter allows you to control when SoundHound will update a file's entry in the audio database. The Name option will cause an update whenever a file's name changes and/or whenever a file is added or deleted. The Attributes option will cause an update whenever a file's attributes (such as read-only or archive) are changed. The Size option will cause an update whenever a file's size changes. Finally, the Last Modified feature will cause an update whenever a file's modified date or time changes as it is seen in the file's Properties dialog box.

## Log

SoundHound's Log tab shows you a log of its operations. You can come here to read logs and set parameters on how they are created and kept.

## Status

The Status tab displays internal statistic information in case there should ever be a problem. This tab is designed to help our Technical Support department expedite resolution of SoundHound issues.

## About BSI

This tab gives you information about the version of SoundHound you are running and a link to the BSI web site.

## SoundHound Menus

There are two menu choices in SoundHound – File and View. The File menu lets you compact and repair your database, save and read configuration files, or exit. The View menu allows you to view each of the window tabs.

# Simian Options

To open the Simian Options windows choose Tools/Program Options or Tools/Hardware Options from the menu in the main menu bar.  You can switch between different sets of options in both windows by clicking on the tabs near the top of the windows.

Review the options in each tab, and make any changes you wish to the default settings.  For example, if you are doing production work, you may want to deselect "HotKeys visible at startup" in the General tab.

The configuration options you select are saved when you click "Done".  Different sets of configuration settings cannot be saved, except when using Sessions in Production Mode.

A full overview of each option is available in Chapter 6.

# Production Mode

Production Mode is a simple way to have all of the production functionality that you need at a much lower cost than a second copy of Simian. In Production Mode, the three main playback decks, the record decks, and all automation features are disabled, but you can still create, modify, and verify Program Logs. You can also use the VoiceTrack Editor and listen to Audio Events through the audition device.

To run Simian in Production Mode, you'll need to purchase a Production Mode license. When your hardware key arrives, just install Simian and validate it according to the instructions in the "Validating Simian" section earlier in this chapter.

## Production Sessions

What if you work in a cluster operation where you have multiple air machines running multiple stations in the same location? Wouldn't it be nice to have one production machine instead of one for each station? Even better… Wouldn't it be great to have that production machine hold all of the different settings for each of those machines so that you could switch between them easily? Well, if all of your machines are networked, you can. Here's an example:

Let's say that you have a cluster with three on-air computers and a Production machine. We'll call them AIR1, AIR2, AIR3, and PROD1.

Now, let's say that you want to edit tomorrow's Program Logs for AIR1. You'd go into Program Options and tell Simian to look across the network at AIR1 for its Audio Database, Program Logs folder, and any other folders that you may need. You do your editing, and then you need to make all of those changes again to edit Program Logs on AIR2, then again for AIR3. The next day, you're making all of those changes again. Now imagine that your cluster has seven stations instead of three…

This is why we designed Simian so that you can choose between up to nine individual *sessions*. Sessions allow you to have nine different sets of Simian production configurations (including different paths, audio databases, and Options settings) to do production work for up to nine different air machines without needing to change all of your options every time you want to do production work for a different station.

To run multiple sessions of production mode, use the File/Change Session menu item to switch between different sessions. Each session will hold its own set of Program Options. The Station ID for each session will even show up next to the session number in the Change Session menu.

To make life even easier, you can also set up different shortcuts for each session right on your computer's desktop. Just add the /session:2 switch to the Target field for the shortcut. Here's a quick walk-through:

1. Create or select a Windows shortcut to Simian.

2. Right-click on the icon and choose the Properties option.

3. Select the Shortcut tab.

4. In the Target field, you'll see the path to the Simian executable file, for example, c:\bsi32\simian.exe. Add "/session:6" (without the quotes, with the appropriate session number) after the path. The whole line will then read:

**C:\bsi32\simian.exe /session:5**

Click OK and launch Simian from the newly modified shortcut.

# Networking Simian

In response to changes to the way in which Microsoft Networking has evolved (since Windows 98 and the original Simian release), BSI has changed the recommended setup for networked Simian workstations.

It's very important to understand what the changes mean, why they are needed and how to correctly network Simian computers.

## What Changed?

Firstly, beginning with Windows 2000, any operation to a UNC path (i.e. \\air\c\bsi32\audio) is routed via the Windows Network, even if that UNC path points to the local machine. Thus, even though the machine could be playing the audio locally, it actually passes via the Networking Layer of the Windows operating system.

This effects performance in Windows XP and Windows 7 (and also Windows Server 2003 and 2008, though Simian has not been designed to run on Windows 2003 or any other 'server' based operating system).

With Windows 2000 and later, there's the added problem of a 'NetBios' limit which prevents more than 8 folders being automatically monitored by Simian's SoundHound application.

And with Windows XP Professional and later, all networking is shut down if the Network Card loses a connection (to the local switch, has a cable error, or is connected via a cross-over cable to a Production machine that is rebooted). So, even if the UNC paths point to a local hard drive on the air machine, it no longer has access to those files.

When the program was first released, networking Simian involved setting up UNC paths across an Air and Production machine. Clearly with the newer operating systems this will cause huge problems sooner or later.

The following pages outline the recommended setup for a basic network of Simian computers which has been well tested and proven to provide a trouble-free, robust solution, with the added advantage of redundancy.

Customized multi-station and production workstations on a single network are outside the scope of the level of support we can offer in this recommendation; this is where the skills of a Network Administrator come into play. However, by understanding the reasoning behind the recommended Network, the principles can be adapted to suit different customized solutions.

When finished with this guide, you will be able to completely remove Network Connections from the Air computer and it will continue without error.

Also, in the unlikely event that the Air machine fails, the Production machine is ready to pick-up instantly, with its own backup copy of audio files.

## Summary of Changes

The changes in Networking Setup and Configuration (from the original recommendation) can be summarized as follows.

- Each computer maintains an exact copy of the audio files
- Each computer runs a copy of SoundHound to index new files
- Each computer plays the audio files from its local hard drive
- The Production Computer references the Air computer's Program Logs across the network so that the Air log can be edited 'live'
- A backup copy of the Air computer's Program Log(s) is maintained on the Production Computer
- Two Simian sessions are setup on the Production Computer.  One for normal network operation and a second 'local' session using the local copy of the Program Log files.  (In both cases, a backup copy of the audio files is stored on the Production Machine locally)

## Hard Drive Setup

While not strictly 'Networking' your hard drive configuration will determine your network settings.

For best performance (both with and without a Network) use a dedicated (hard-disk) drive for your audio files or at least partition your hard-drive.  This also allows you to format your drive or partition and re-install Windows without affecting your audio files.

If you currently use a single hard-drive and do not have a separate partition for your audio files, we strongly suggest purchasing a utility such as Partition Magic 8 from Symantec software: http://www.partitionmagic.com/partitionmagic/

Following these recommendations, you should have a **C:\** and **D:\** drive (if you have a CD-ROM installed, this may by default be installed as drive **D:\**).

To change this and ensure your two drives (or partitions) are installed as  **C:\** and **D:\**, go to **Control Panel | Administrator Tasks, Computer Management | Disk Management** and change the letter of your CD drive first of all (away from **D:\** and then setup your audio drive or partition as **D:\**).
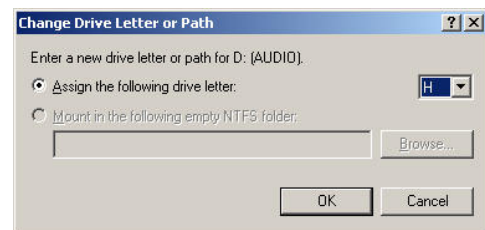
Figure 3.19

From the **My Computer** window, we re-label the drives "**System**" and "**Audio**" for clarity.

## TCP/IP Settings

In the examples below we are using two Computers '**Air**' and '**Production**' which already have their hard drives shared to other Network users.  (If you have multiple machines, you can call them Air1, Production1, Air2, Production2 etc)

You should always consult with your Network Administrator or IT Manager before adding or changing network settings and/or Network Computers as there may be an impact elsewhere on your Network. Special consideration must be given to the IP address of each computer on your Network, which must be unique.

The following generic Network settings will ensure a basic connection between two machines providing that these IP addresses are not being used elsewhere on the Network.

Many modern computers are capable of network speeds of 1Gbs (rather than 100 Mbs or the much older 10 Mbs) though they do require the correct cabling to connect the Network together; and when using more than two computers, the correct hardware too.

You may refer to this piece of hardware as a HUB, but the correct equipment is a Network SWITCH.  A switch ensures that signals between two computers are only transmitted between those two computers,

_____

whereas a HUB broadcasts that information to all computers. (Therefore, using a switch will ensure that high-volume data transfers between two computers do not affect other machines on your network).

We favor brand name switches (Netgear, Linksys, D Link etc), preferably in metal enclosures with internal power supplies as these are less prone to RF interference.

When using a switch, all computers are connected to the Switch (usually located centrally) in a 'star' configuration.

In a very simple setup, an Air/Production pair of computers can be connected 'back to back' with a simple cross-over Network Cable without the need for a switch.

If you are utilizing a 1Gbs connection (with or without a switch) we urge you to ensure that your cable is rated for that speed of Network (see our Network Cabling guide for connection details and cabling advice).

To access the Network Properties, right-click `My Network Places` and select `Properties`. Right-click your LAN card and select `Properties`. You should see a box similar to the one on the next page. Select `Internet Protocol (TCP/IP)` and click `Properties.`
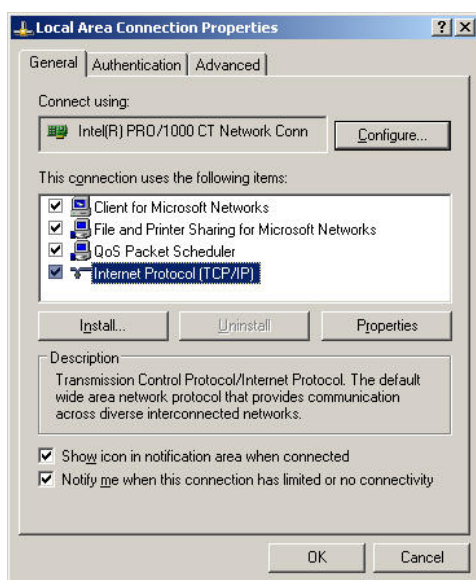

Figure 3.19
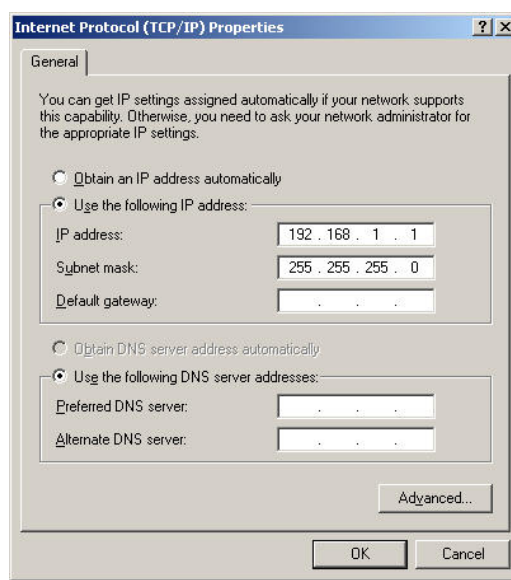

Figure 3.20

As previously stated, every computer on the same network must have a unique IP address. Larger networks may include a DHCP server so that each computer can `Obtain an IP address automatically` each time it starts (which can result in your computer having a different IP address each time). In the example above, we have setup the settings manually with a static IP address and we recommend that you do the same as there are advantages in so doing.

Your Network will generally be either DHCP or Static IP, though some advanced configurations can mix the two. In our example, we're going to setup Static IP addresses manually on a closed Network of just the Air and Production machine. The actual numbers we use in the examples will almost certainly already be in use in most Networks.

Enter the IP address of `192.168.1.1` for the Air machine and `192.168.1.2` for the Production machine. If you add more machines (or those IP addresses are already in use on your Network), use `192.168.1.3, 192.168.1.4` etc. up to `192.168.1.254` with the subnet mask `255.255.255.0` for all machines.

The `192.168.x.x` range is a special number range for internal networks. You may also use `10.0.0.x` as a numbering scheme, but every computer on your Network MUST have a unique IP address.

In our example, the Network is not connected to an Internet Gateway or Router (which would usually have a DHCP server) so there is no Default Gateway to enter and that can be left blank as can the DNS server addresses. You will normally need to 'populate' these DNS server addresses when requiring

access to the Internet (for Windows updates / FTP / Weather info etc). There are no generic settings here, the information must come from your Network Advisor.

Networking is a specialized skill. The details provided here are a starting point only and will work for almost all Simian users. But for more flexibility, Internet sharing, Remote Access etc – you need to contact a Network Specialist.

## Install & Configure Simian for Networking

If you have not already done so, install Simian using the default program path (`C:\bsi32`).

(Optionally) Create the following folders:

       `C:\bsi32\triggers`

       `C:\bsi32\serial`

       `C:\bsi32\hotkeys`

       `C:\bsi32\scheduled`

These folders are for storing sets of Triggers, Hotkeys, Serials and Scheduled Events and generally make things much easier to manage as otherwise these files could get muddled up in `c:\bsi32`.

Now, on the D:\ drive create the following folders:

    `D:\archive;`      `D:\audio;`      `D:\audio\carts;`     `D:\audio\effects;`
    `D:\audio\jingles;`  `D:\audio\recordings;`  `D:\audio\songs;`  `D:\audio\spots;`
    `D:\audio\vtracks`

You can modify the list of audio folders to match your own needs but we do suggest that you maintain a `\carts` folder for any virtual carts; `\vtracks` for voice-tracks and `\recordings` for Simian's record decks to save to.

Using dedicated folders for these files prevents them being mixed with your main audio library and prevents unnecessary audio database updates.

**IMPORTANT: NO AUDIO SHOULD BE STORED IN D:\AUDIO ITSELF (THIS WOULD CREATE A NESTED FOLDER) ONLY SAVE AUDIO IN THE SUB-FOLDERS.** Nested folders cause continuous database updates leading to Database Bloat (where the audio.mdb file becomes so large that the performance of Simian will suffer).

Now, in `Tools | Program Options`, ensure that the `Use SoundHound` box has a tick in it on both the Air and Production machines. Your screen should look something like that of Figure 3.21.
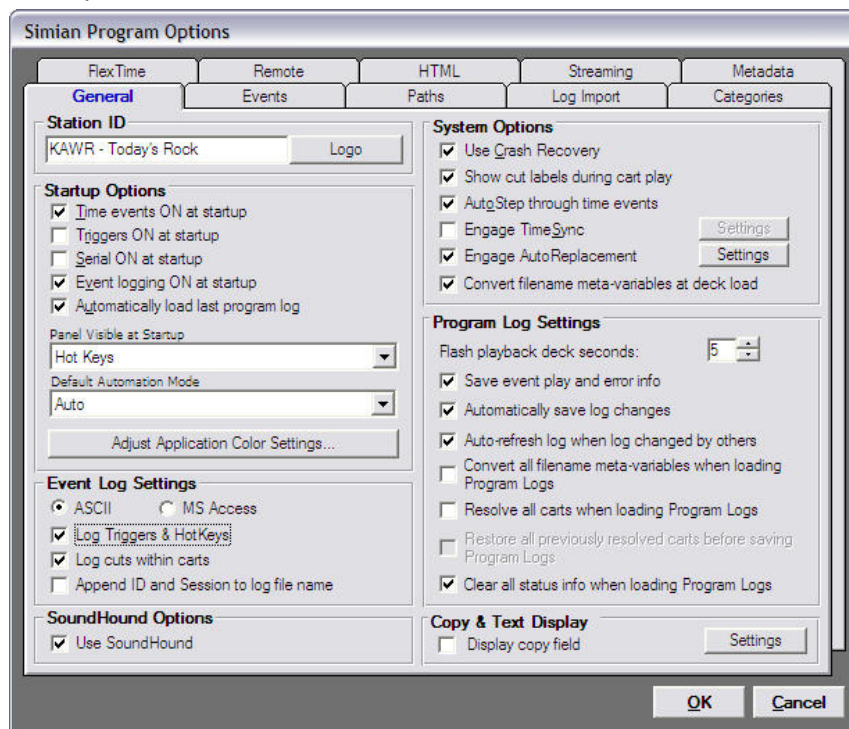


Figure 3.21

Click **Done** when finished and then shut down and restart Simian to make sure all the changes take effect.  This ensures that each computer runs its own copy of SoundHound and maintains its own audio database.  We now have to configure SoundHound to monitor the local computer's hard drive.

When Simian restarts you'll also see a pair of binoculars in the System Tray next to the clock (see page 9 for images and more details).  Double-click these to view SoundHound.

Use the **Add Folder** button to add  `D:\audio\carts`; then repeat the process for `D:\audio\effects`;  `D:\audio\jingles`;  `D:\audio\recordings`;  `D:\audio\songs`; `D:\audio\spots`;  and finally `D:\audio\vtracks`.

It's also a good idea to give these folders a **friendly** name.  To do this, highlight each of the folders in SoundHound and click the 'Smiley Face' – you can use descriptions like '**Voice Tracks**' for your `d:\audio\vtracks`  folder; and '**Sound Effects/Production Elements**' for your effects folder etc.

Try and avoid the ampersand (&) and other punctuation marks in the friendly description as these may not be displayed correctly.

Once finished, there may be a flurry of disk-activity as the **audio.mdb** database is created and updated by SoundHound.  Thereafter, SoundHound will only refresh a folder in which there has been a change.

_____

## Setting Up Paths

From `Tools | Program Options` select the `Paths` tab. From the drop down box at the bottom of the screen select the following options and set the correct paths for them:

`Record Decks` and `Voice Track` (Select the 'Recordings' and 'Vtracks folders from the top list and click the '`Set`' button). It's also a good idea to chose the '`Show Friendly Paths`' option as this displays the 'friendly' names for the paths instead of the full windows path.

For Triggers, Serial and Scheduled event sets, you'll need to click `set` and browse to the `c:\bsi32\triggers`, `serial` and `scheduled` folders that you setup.

On the Air machine, you'll point Program Logs to `c:\bsi32\logs` and Hotkeys to `c:\bsi32\hotkeys`.

As the Production machine will operate either as a Network machine or as a stand-alone Local machine in its own right (as a backup to Air), we need to take a few more steps.

This is very easily done using Simian Sessions as different sessions maintain their own paths and other unique settings.

Start by creating two Simian Desktop Shortcuts and name one '`Simian – Network`' and the other '`Simian – Local`'

Right-click each of the shortcuts and look at the `Properties` for the `Target` as shown in the diagram below. To create Session 1 we simply add `/session:1` and for Session 2 we just add `/session:2` as shown in the diagram below.
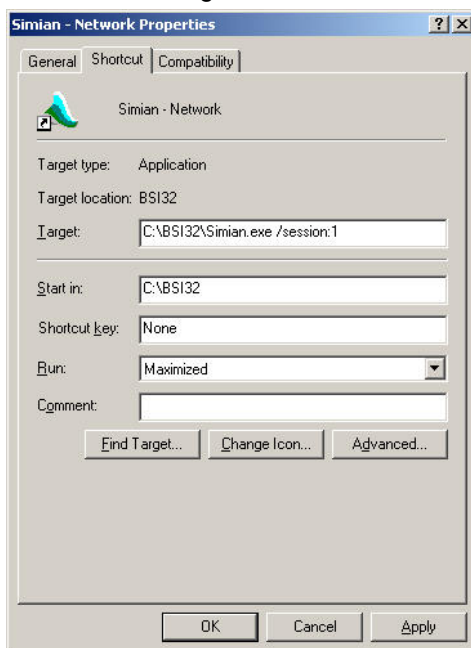


Figure 3.22

We suggest using Session 1 as your `Simian – Network` and Session 2 as your `Simian – Local`.

Startup '`Simian – Local`' by clicking the Desktop Icon you just created. Go through and adjust all your Simian settings as per your Air machine (you may wish to add a reminder that this is a LOCAL Simian setting in the Station ID field of `Tools |Program Options`)

There are different ways of reaching the other session of Simian, the easiest being clicking the appropriate Desktop Shortcut.

However, if Simian is already running, you can select `File | Session` and select the appropriate session (in this case 1 for `Simian – Network`).

The Network settings for Simian on the Production machine are identical to the local settings, except that in `Tools | Program Options | Paths` – the `Program Logs` should look at the Air machine across the Network (usually `\\air\c\bsi32\logs`) so that you can edit the 'live' Air log from your Production machine in real-time.

Optionally, you may wish to edit the Air Hotkeys from the Production room, in which case set up the path to the Hotkeys folder as `\\air\c\bsi32\hotkeys`

## Synchronizing Audio Files and Program Logs

The final part of the set up is synchronizing the audio across the two machines (mirroring) and maintaining a copy of the Air program logs on your Production computer.

This is a simple task using Second Copy 2000 software (www.secondcopy.com) which should be installed and run on the Production Computer only.

Second Copy 2000 synchronizes audio (including file deletions) on both machines with any deleted audio going in to `d:\archive` 'just in case!'

Please refer to our separate document on how to configure Second Copy 2000 – it's a five minute task to mirror audio files across two machines.

Once you have configured your Network and Mirroring your audio files, then no matter what happens on your Network, the Air machine will continue playing audio from its local drive.

In the unlikely event that the Air machine fails, the Production Computer can pick up immediately by starting the '`Simian - Local`' session and opening the current program log (which Second Copy 2000 has copied automatically into the `c:\bsi32\logs` folder).

## Conclusion

- The Production computer is now a 'Hot Swap' backup machine
- All audio is now being played (and recorded) onto the local hard drives of each machine and is therefore unaffected by Network performance or failure
- Audio is mirrored across the two machines, each with its own copy of the entire music library so there is a constantly maintained full backup in case of drive or PC failure
- Potentially more than 8 folders can be used in SoundHound – though we recommend keeping it at around that level.

## Alternative Network Methods

The following are alternative solutions that can be applied to the Production Computer, though are more limited than the previous solution. They may be more suitable in multi-station or custom configurations where it is not possible or desirable to keep multiple copies of audio libraries.

As alternative methods these suggestions are only suitable in specific circumstances. They are **NOT** the recommended method of Networking Simian for most users and are offered for information only. If your station needs to implement one of these alternative solutions, you should also be consulting a Network Specialist too.

### Drive Mapping

If you do not want to Mirror your audio across a Network, or have limited hard-drive space on your Production Computer (a 250Gb drive holds 5,000[+] songs and we do not recommend using more than this number of audio files) you can 'map' a Network Drive to `d:\` on the Production computer so that it can see the audio across the Network.

As SoundHound cannot receive notifications across a Network that files have been changed, you must then ensure that the path to the audio database is set to:


`\\air\c\bsi32\audio.mdb`


... and that you **DO NOT** run SoundHound locally.

The Air machine will continue to play audio from its local hard drive, without being affected by network performance as it is not using UNC paths. As the Air database references local `d:\audio` paths, when the Production computer has this drive mapped to its `d:\` letter, it'll also see the audio files (but will be affected by Network Performance and there is no longer a backup of audio files and therefore not 'Hot Standby'.

**Subst**

**SUBST** is a legacy DOS command that can be used to automatically assign one drive letter and path (including a network path) to another.

For example, **SUBST d: \\air\d\** would create a **d:\** drive on the local machine which had all the information in the Air machine's **d:\** drive. (The drive must not have existed on the local machine prior to running **SUBST**).

As SoundHound cannot receive notifications across a Network that files have been changed (even when the drive letter is mapped), you must then ensure that the path to the audio database is set to **\\air\c\bsi32\audio.mdb**) and that you **DO NOT** run SoundHound locally.

The Air machine will continue to play audio from its local hard drive, without being affected by network performance as it is not using UNC paths. As the Air database references local **d:\audio** paths, when the Production computer has this drive mapped to its **d:\** letter, it'll also see the audio files (but will be affected by Network Performance and there is no longer a backup of audio files and therefore no 'Hot Standby').

As each session of Simian can run different applications when it starts (and ends) you can create multiple sessions using different SUBST commands to communicate to multiple stations on the same network; when you close each session you run the **/D** switch to disconnect the SUBST drive, thus leaving the drive letter free for the next session.

# "Live Update" in Simian

## Overview:

Simian can allow you to update Program Logs from your Air or Production machine and have the changes appear in both places in "real time". To do this, Simian uses a combination of three options from the General tab under Tools/Program Options. Let's look at each option individually, and then see how they work together:

**Save event play and error info -** This function causes Simian to save the log each time the information in the Status column changes.

**Automatically Save Log Changes -** This function causes Simian to automatically save the log any time a change is made by the user.

**Auto-refresh log when log changed by others** - This function causes Simian to sense when the log is saved and refresh the log to show the changes.

How does all of this allow our fearless Simian power users to see each other's changes in real-time? Think about it like this. We have a situation where both the Air and Production studios have the same Program Log open for different reasons such as last-minute spot insertion (something that never happens… right?). The Traffic Manager (sitting in the Production Studio where talent just wrapped up) opens the Program Log that's currently on-air from across the LAN and replaces a PSA with the new spot. Simian automatically saves the log changes. The air machine automatically senses the change and refreshes the Air studio's log. Boom… Both people see the changes immediately and effortlessly. This pretty well explains the usage of Automatically Save Log Changes and Auto-refresh log when log changed by others. So what does Save event play and error info do for us?

Let's take a look at it. When the air machine successfully plays a file, it puts an "X" in the Status column of the log. When Simian does this it automatically saves the log changes, and the production machine auto-refreshes the log when it is changed. In short, the Traffic Manager can see the X's appear on the production machine as each file is played on the air machine.

There's one thing to remember (isn't there always?). To work properly, both studios need to use the same audio file and audio database paths so that the air studio can see the actual audio files that were added in the production studio. Otherwise, the Jock and the Traffic Manager will both end up seeing "E" where "X" should be. You can find instructions on setting this up under the "Networking Simian" section.

_____

# Configuring Triggers

## Trigger Setup

Simian now has many more options for General Purpose Input/Output (GPI/O) than ever before. In Simian, we refer to General Purpose Input as "Triggers". Due to the many different possible configurations, please refer to the proper documentation for your GPI/O device or our Support Website (which can be found at http://www.bsiusa.com/support) for

instructions on installing your GPI/O device.

## Trigger Configuration in Simian

Once your GPI device is installed and tested, you need to set up Simian to talk to it. Simply go to the Hardware tab in the Simian Hardware Options window.

Figure 3.23

All that you need to do is select your type of GPI device from the drop-down list. Make sure that Triggers are turned on (check the Status Bar at the bottom of the main Simian window), and test. When you simulate a Relay closure on the originating piece of equipment (such as the satellite receiver), the appropriate Trigger number should light up green.

You can also use the numbers to test Triggers internally within Simian. If you want to simulate Trigger 1 coming in, simply click on the number 1 and Simian will react accordingly.

If you need to share your incoming Triggers with other instances of Simian on your local network (or even on the same machine, if you are using Multi-Instance Simian), you can enable the Forward Triggers to IP Address option and input the IP address and Port number you would like to forward your triggers to. When you receive a trigger from your hardware device, Simian will respond as you have programmed it, and it will also inform the computer at the IP address and port you have specified that a trigger was received.

Conversely, if you want another instance of Simian to send you triggers, enable the Accept Forwarded IP Triggers on Port option (and also configure the other machine to forward its triggers). You will also need to set up your hardware options for the same settings as the instance of Simian that actually has the trigger hardware connected that is sending you its triggers. Now you can set up Trigger Sets and your instance of Simian will react to incoming triggers just as if you actually had the other Simian instance's hardware connected to your machine.

> When you are configuring the Hardware Settings in Simian to Accept Forwarded IP Triggers, you don't need to have any actual hardware trigger devices connected on your local instance of Simian. You may receive warning messages regarding setting up your local hardware and it's connection (especially with hardware that uses Serial communication), but they can be ignored since you won't be using the hardware device locally.

Should you need to log the time, function, and trigger number of your incoming triggers, the **Generate Incoming Trigger Log** option is available. With this option enabled, a text based log file will be generated in the C:\BSI32\Trigger Logs\ folder with a file name of Trigger_Log_[Date].txt .

_____

# Configuring Relays

## Relay Device Installation

Simian now has many more options for General Purpose Input/Output (GPIO) than ever before. In Simian, we refer to General Purpose Output as "Relays". Due to the many different possible configurations, please refer to the proper documentation for your GPI/O device, or our Support Website (http://www.bsiusa.com/support) for instructions on installing your GPI/O device.

## Relay Setup

Once your General Purpose Output (GPO) device is installed and tested, you need to set up Simian to talk to it. Simply go to the Hardware tab in the Simian Hardware Options window.
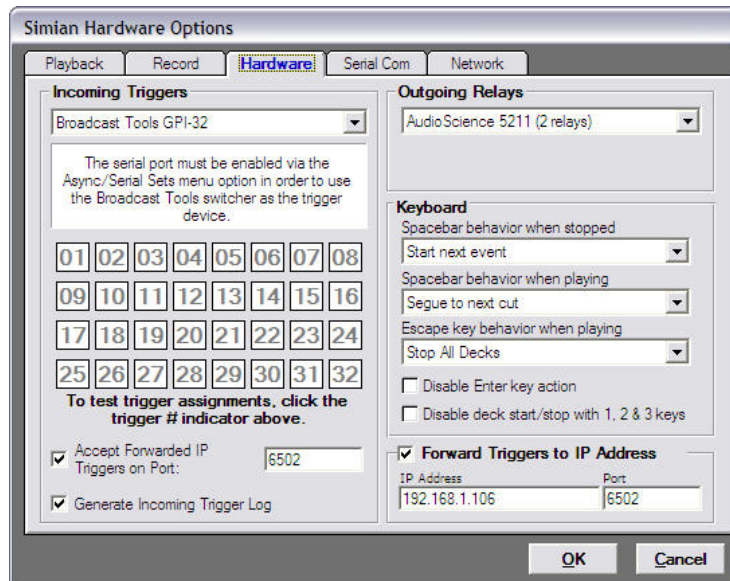
All that you need to do is select your type of Relay(GPO) device from Switcher drop-down list, and test.

To test Relays, close the Simian Hardware Options window, go to the Tools menu in the main Simian window, and select Relay Rack. The Relay Rack option will not appear on the Tools menu unless you have a Relay Device selected in the Switcher Drop-down list (on the Hardware Tab in the Simian Hardware Options dialog box).

The Relay Rack window allows you to test your Relays. Just click the appropriate number and listen for the click or watch for the reaction of the device that's connected to the Relay. You can also turn all Relays on or off here. You'll also notice that if you click on one of the buttons with the right mouse button it will cause the button to "lock" down. Just click the button again to release it.
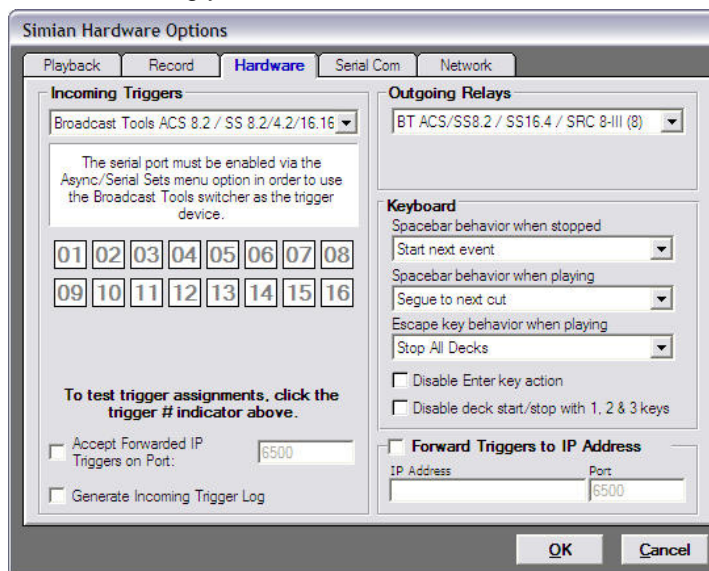


Figure 3.24
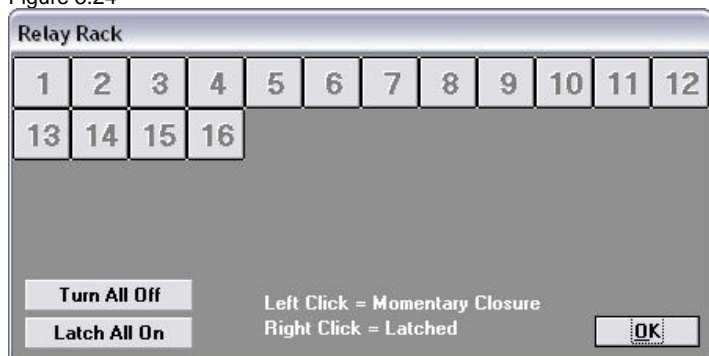


Figure 3.25

# Configuring Serial Communication

## Programming Serials

Information can be both sent to and received from external devices using your serial port.  Use the Serial window (under Async/Serials/Edit Sets on the main Simian menu bar) to define the character string(s) you want to listen for.  To enter a string, choose Edit/Insert Event and a window will open that asks, "What string do you want to watch for?" After you assign a string, a line will appear in the Serial Set that you can then fill normally from the Event Builder.  You can also use the SERIAL macro command (in the Event Builder) to send strings such as "xyz" and "*120" to other devices. These macros go right in the Program Log and can be cued like any other Event.

_____

## Serial Configuration in Simian

For Simian to communicate with a peripheral via the serial port, you'll need to configure a number of different options that may be required by your particular peripheral. Start by going to Tools/Hardware Options and selecting the Serial Comm tab.

The information needed to set up serial communications options is available from your peripheral's manufacturer.
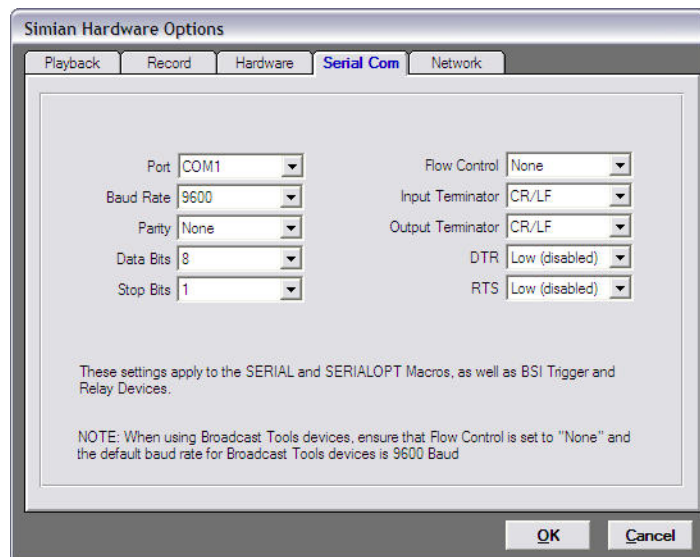


Figure 3.26

**Port** — Choose your preferred communication port setting. Valid options are COM1 through COM4.

**Baud Rate** — Choose the baud rate. Valid rates range from 300 to 28,800.

**Parity** — Choose the parity setting. This is the method of byte validation. Valid options are Even, Odd, Mark, or Space.

**Data Bits** — Choose the data bit transfer rate. Valid options are 4 through 8.

**Stop Bits** — Choose the stop bit rate. Valid options are 1, 1.5 and 2.

**Flow Control** — Choose the flow control setting. Valid options are Hardware, None, XOn/XOff, as well as Both Hardware and XOn/XOff.

**Input Terminator** — Choose CR (Carriage Return), LF (Line Feed), or CR/LF.

**Output Terminator** — Choose CR, LF or CR/LF.

**DTR** — This is a non-standard hardware-level option that is sometimes required by an external device. Normally set for Low (disabled).

**RTS** — This is a non-standard hardware-level option that is sometimes required by an external device. Normally set for Low (disabled).

> You can turn Serial Communications on when Simian starts up by selecting the "Serial ON at startup" option on the General tab under Tools/Program Options.

> You can turn Serial Communications on and off by clicking the serial port item on Simian's status bar at the bottom of the main interface.

> To verify Serial Communications functions, you can go to Help/Spyglass and select the Serial Port tab. Here you can send strings and monitor the serial port.

# Configuring Network Options

The network tab allows you to configure the host settings to allow connections to the **Simian Gateway** and configure **MetaData Control** to allow you to have Simian perform trigger-like actions based on received MetaData (IE: data from an automation system, or other TCP/UDP based data source). There are also **Incoming IP Address Filters** available, should you want to limit connections to only certain incoming IP addresses. For more info on the Simian Gateway and Simian Remote applications, see their respective manuals for instructions on setup and usage.
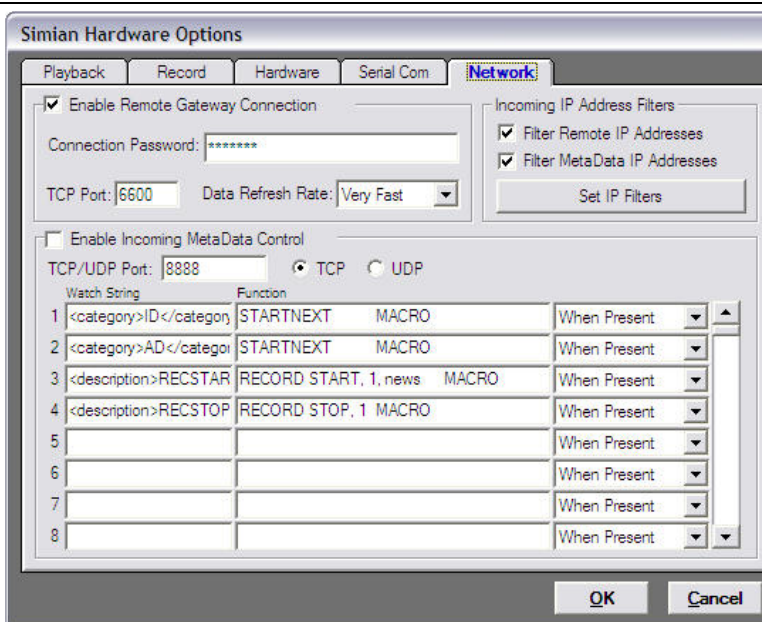


Figure 3.27

## Enabling Remote Gateway Connection

This section is used to configure your settings for use with the Simian Gateway application to allow Simian Remote clients to connect to and control your Simian 2.2 Pro host. The **Connection Password** field allows you to set up a password which the Simian Gateway must use to log in to your Simian 2.2 Pro host (it is not necessarily the same password your remote users will use to login to the Simian Gateway from the Simian Remote clients).

The number entered into the **TCP Port** field determines what TCP/IP port your Simian 2.2 Pro host will listen to for Simian Gateway connections. By default, Simian 2.2 Pro will listen to port 6500 for a Simian Gateway connection.

The **Data Refresh Rate** drop-down allows you to set how often the Simian 2.2 Pro Host will send update information, including the VU meter state, the deck labels, the application labels, Hot Key statuses, and Mixer statuses. This setting does not effect the reaction speed of asynchronus functions like clicking on the play or stop buttons, just the refresh rate of the data types mentioned above.

## Incoming IP Address Filters

If the IP addresses of your remote clients or MetaData sources are static, you can set up Incoming IP Address filtering. With this option enabled, WaveCart will only allow incoming connections from the IP addresses specified, and reject all others.

You can enable or disable IP filtering for either the remote clients, or the meta-data control functions.

To add your desired IP addresses to the filter, click on the **Set IP Filters** button and the window at right will appear. Enter your desired IP addresses into the fields, then click Done. NOTE: wild cards are not allowed, the IP addresses entered must be the full, valid IP address.
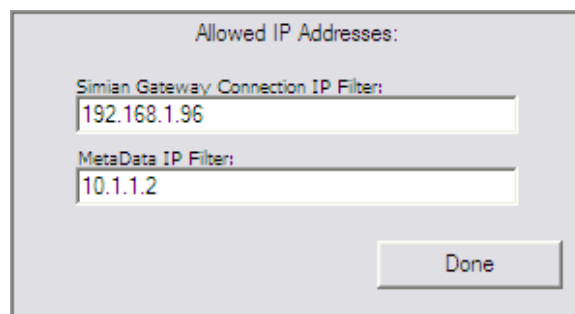


Figure 3.28

## Incoming MetaData Control

The **Incoming MetaData Control** function allows you to set up Simian to be controlled by TCP or UDP data sources. With this option enabled and configured, Simian will listen to the desired port for specific "watch strings", and take the specified actions when a watch string is found in the data stream.

The list of watch strings is processed in sequential order from top to bottom, so you can implement simple logic functions by inserting MACROS, or a comment with the description of "STOPPROCESSING" if you want no subsequent metadata commands to be processed along with the **When Present/When Not Present** function modifier.

To configure a Watch String, type the text string (a "string" is a word or sentence of alpha/numeric text) into an available Watch String field, then use Event Builder to create a n event you want Simian to perform when that string is encountered. You can reverse the logic of the watch string by setting the function modifier to **When Not Present**, rather than **When Present**, so that the function is performed when the Watch String specified is not found in a metadata stream.

# Configuring Categories

Events have a lot of different characteristics. Most of these, such as Name and Description, are self-explanatory. Categories, on the other hand, are a little different. So, what do Categories do? They tell Simian how to handle an Event. Should the Event be played in a deck or read as a Macro? Simian reads the Category of the Event to find out how to handle that Event. Simian has 11 Categories by default, but you can also make your own. Why would you want to make your own? Let's say that you wanted to have a way to easily see all of the commercials in your Program Log. You could use a file-naming scheme and look down the Name column in the Program Log, but wouldn't it be easier if they had a label, and maybe showed up in a different color? You can easily do these things by creating custom Categories.

Let's take a look at the Categories tab of the Simian Options window. The first thing you'll notice is a list of Categories that are split into columns labeled Code, Type, and Description.



Figure 3.29

- The Code is a simple description. You can assign any code that you want to any Type. For instance, you can create a code called "Spots" for all of your commercials. The Code is what shows up in the Category column of your Program Log so you'll be able to easily pick out your commercials in the Program Log.

- The Type describes how Simian is going to handle events that are assigned a particular category. If a category of Type "Log" is assigned to an audio event, the Event will error when played. In short, if you want Simian to recognize an event as if it is a macro, instead of trying to play it as an Audio Event, you'll need to make sure that the category that is assigned to that macro has Type of "Macro" and not "Audio".

- The Description is an easy way for you to show a simple description for your category in the Categories tab of the Simian Program Options window.
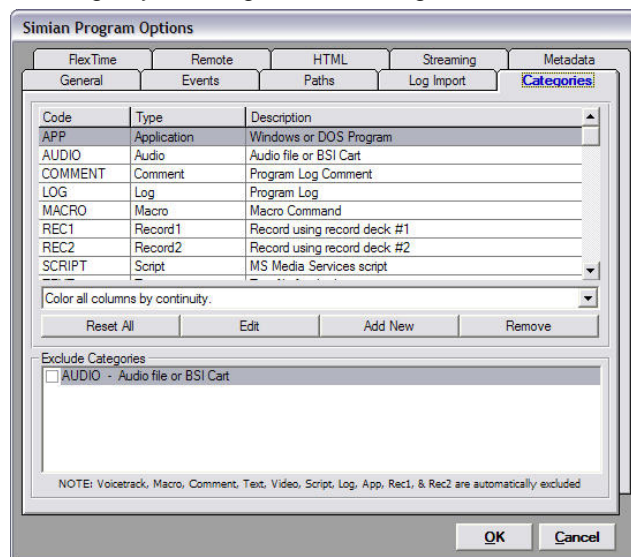
For instance, if you want to have the Code of "PSA" show up in the Category column of the Program Log for all of your Events that are PSA's, just follow these simple steps; Click the Add New button, enter "PSA" into the Letter Code field, select Audio from the Type Drop-down, and enter "Public Service Announcements" in the Description field.
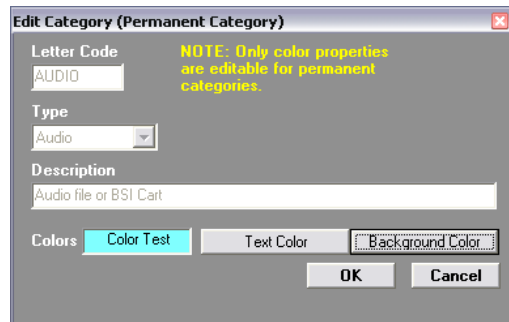


Figure 3.30

You'll also notice that in the Create New Category dialog box, you can assign a Text Color and a Background Color. This allows you to set up all of your PSA's with a red background and blue writing (or whatever you'd like). This works in conjunction with the drop-down list near the bottom of the Categories tab of the Simian Options window. That drop-down allows you to control how Simian goes about displaying custom category colors in its Program Log. Let's take a look:

- **Color all columns by continuity** – Disregards Category colors. It uses the standard Simian scheme of coloring events in groups that will play together.
- **Color category column by category, others by continuity** – Allows you to keep the standard Simian log coloring scheme, but still see Category colors in the Category column of the Program Log.
- **Color all columns by category** – Allows you to disregard the standard Simian coloring scheme so that the entire Event is colored according to the Category color.

So, we've created a new Category called PSA. Now when we go into the Event Builder to build our PSA Events, we will see PSA available in the Category drop-down. We'll be able to see "PSA" in the category column of the log, and we can even change the colors of all of our PSA Events.

Now, there is one potential problem with Categories that you need to be aware of. If you create a custom category, assign it a Type, and then assign that category to the wrong kind of Event, the Event will error. For example, if you were to create a category with a Type of "Macro" and then apply that category to an audio file Event, Simian would try to run that Event as a macro. The Event would then fail, turn red in the Program Log, and Simian would move on down the log. In short, a Category's Type needs to match the kind of Event to which you plan to assign that Category.

### Exclude Categories

If you are using the HTML Generator, Stream Encoding data, Metadata, or the IFEXCLUDED macro, you can configure the Exclude Categories so that data from categories of your choosing is ignored. This means that if you don't want to output data from Station IDs or Spots, you could add categories for them, then enable them in the Exclude Categories and their data won't be sent via HTML, Stream, or Metadata.

# Configuring Windows© Media Encoder Services

If you are streaming your audio using the Windows Media Encoder 9, Simian can automatically start up your encoder when Simian starts, and also send artist and title data when each audio cut starts. To enable WMES within Simian, you must first set up a profile in Windows Media Encoder 9 and save the profile to a known directory. In Simian, enable the "Enable WMES Functionality" option in the Program Options|Streaming tab and select your WME profile in the "WME File Name" field.

If you would like Simian to automatically start the Windows Media Encoder with your saved profile, place a check in the "Initialize WMES Encoder on startup" option. To send artist and title metadata, enable the "Default Text Script Command" option.

If you want to change the text that is sent to the Windows Media Encoder, you can modify the text in the field below the "Default Text Script Command" option. All the metatags available in the Configuring Streaming (HTTP call) Output section below also apply here.

# Configuring Streaming (HTTP call) Output

Simian can send artist, title, file length (among other fields) data to your internet stream encoder by HTTP calls when a new audio file starts playing from your program log. In addition to allowing you to set up custom HTTP output profiles, there are pre-configured profiles for ShoutCast, IceCast, and SimpleCast.

To configure ShoutCast, IceCast, or SimpleCast, enable the profile by clicking on the checkbox to the left of the corresponding profile. Enter the IP address or URL to your encoder, then a colon, and finally the port number your encoder is monitoring into the URL/Port field (see Figure 3.31 for an example). You may need to consult your encoder's settings, your stream service provider, IT person, or the encoder's manual for the URL and port number info.
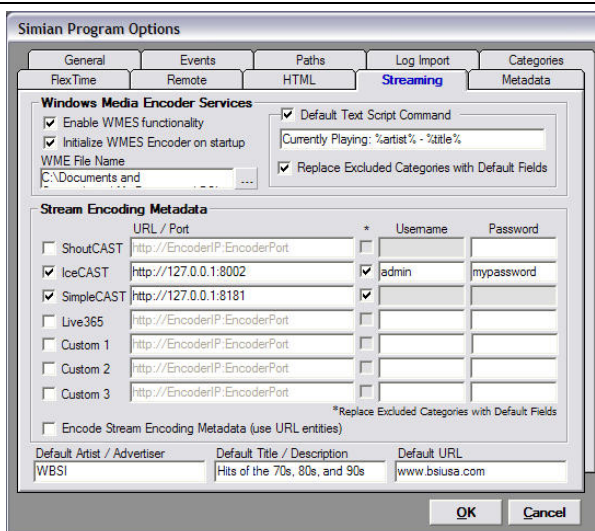
Figure 3.31

To have invalid URL characters encoded as their "escape character" counterpart, enable the **Encode Stream Encoding Metadata (use URL entities)** option. For example, spaces will be replaced by "%20" when this option is enabled.

To configure other services – such as Live365, or others – that do not have a preconfigured HTTP output

profile, there are two steps:

1. Enter the IP address/URL and port number required to access your stream encoder into one of the three Custom profiles' URL/Port field.

2. Modify the corresponding entry in the "Encoder Data.ini" file contained in C:\BSI32\ for the remainder of the URL required by your stream encoder.

To create your custom URL string, Meta Variables can be used to represent the data fields from your audio tracks. Meta Variables are replaced at run-time with the actual data from the audio track that is playing. Below is a list of the available Meta Variables.

- %ARTIST%                      Artist/Advertiser field
- %TITLE%                       Title Description field
- %ALBUM%                       Album field
- %CATEGORY%                    Category field *(see note regarding SimpleCast)
- %LENGTHMILS%                  Audio file duration in milliseconds
- %LENGTHSECONDS%               Audio file duration in seconds
- %LENGTH%                      Audio file duration in mm:ss
- %FILENAME%                    Physical filename of audio file
- %PASSWORD%                    Password entered in the corresponding HTTP output profile
- %USERNAME%                    Username entered in the corresponding HTTP output profile
- %URL%                         URL field
- %PUBLISHER%                   Publisher field
- %COMPOSER%                    Composer field
- %GENRE%                       Genre field
- %YEAR%                        Year field
- %COMMENTS%                    Comments field
- %STATIONID%                   Station ID field
- %COPY%                        Copy field
- %COPYRIGHT%                   Copyright field
- %DESC%                        Description field
- %PROGRAMLOG%                  Program Log file name
- %ALBUMARTFILENAME%            File name of currently displayed station logo or album art

Example:

http://192.168.1.90:8888 along with the username and/or password (if required by your stream encoder) would be entered in the **Custom 1** field on the **Streaming** tab of Simian's **Program Options.**

/?user=%username%&pass=%password%&artist=%artist%&title=%title%&image=%URL% would be entered after the "Custom1=" line in the EncoderData.ini file.

---

\***SimpleCast** uses single letter categories of "S", "A", "P", "J", and "I" to represent Song, Advertisement, ID, Commercial, etc. For the SimpleCast profile only, Simian will automatically convert the following common full word categories to the corresponding single letter categories before outputting the HTTP data:

| Category Name as entered in Simian | Character replacement before sending to SimpleCast |
|---|---|
| "Audio" | S |
| "Ad", "Advertisement", "Comm", "Commercial" | A |
| "ID", "Station ID" | I |
| "Promo", "PSA" | P |
| "Jingle" | J |

This is done so that you can leave categories in Simian as the easier to work with whole word categories while retaining SimpleCast's category functionality. Note that only the specifically listed categories above are automatically translated. All other categories are passed through as given.

---

# Configuring Metadata (PAD, UDP/TCP) Output

Should you have the need to output artist, title, category, etc. data to an RDS, Stream Encoder, or other device via UDP or TCP, Simian offers Metadata output functionality (commonly referred to as PAD data). Before using this function, you must create a template file. The Metadata function utilizes a user-created template to structure the output data. The Metadata output uses the same field tags as the HTML generator, so all the same fields are available.

There are also two built-in templates to work with Orban Optimod and Omnia AXE encoders. Simply enable either of these options and set your IP address and Port number (which need to match your configuration in your Optimod or AXE device's setup).

## Creating a Metadata Template

To create a Metadata template, you will need an ASCII text editor (such as Notepad, which is included with your Windows operating system). Use the Meta variables from the table below to build your your PAD output file (see Figure 3.32 for an example, %ARTIST%, %TITLE%, and %URL% are meta-variables used).

- %ARTIST%              Artist/Advertiser field
- %TITLE%               Title Description field
- %ALBUM%               Album field
- %CATEGORY%            Category field *(see note regarding SimpleCast)
- %LENGTHMILS%          Audio file duration in milliseconds
- %LENGTHSECONDS%       Audio file duration in seconds
- %LENGTH%              Audio file duration in mm:ss
- %FILENAME%            Physical filename of audio file
- %PASSWORD%            Password entered in the corresponding HTTP output profile
- %USERNAME%            Username entered in the corresponding HTTP output profile
- %URL%                 URL field
- %PUBLISHER%           Publisher field
- %COMPOSER%            Composer field
- %GENRE%               Genre field
- %YEAR%                Year field
- %COMMENTS%            Comments field
- %STATIONID%           Station ID field
- %COPY%                Copy field
- %COPYRIGHT%           Copyright field
- %DESC%                Description field
- %PROGRAMLOG%          Program Log file name
- %ALBUMARTFILENAME%    File name of currently displayed station logo or album art

Example:

| Template: | Merged Output: |
|---|---|
|  |  |
| Figure 3.32: PAD template before song data is merged | Figure 3.33: PAD Output file after song data is merged (output is sent via UDP/TCP, not merged to a file. This is for example only) |

## Configuring Metadata Settings

After you have created your template file as outlined above, you will need to configure Simian's Metadata options to utilize your file and let Simian know where and how it is to send your data.

**Template File Name** – click on the "…" **Browse Button** to browse to, and select your PAD data template file (these usually have an .xml extension). There are also two built-in templates for use with Orban Optimod and Omnia AXE available.

**IP Address** – Enter the IP address or URL to your encoder (or other device) that you want to send your PAD data to.

**Port** – Enter the port your encoder (or other device) is monitoring for PAD data.

**UDP / TCP selection** – Select the communication type, either UDP or TCP. Note that TCP can cause delay/timeout issues if the address and port specified are not accessable.

**Use Exclude Categories** – If you would like to exclude data from categories of your choosing, enable this option after configuring the Exclude Categories on the Categories tab.

Figure 3.34

# Configuring Mixers
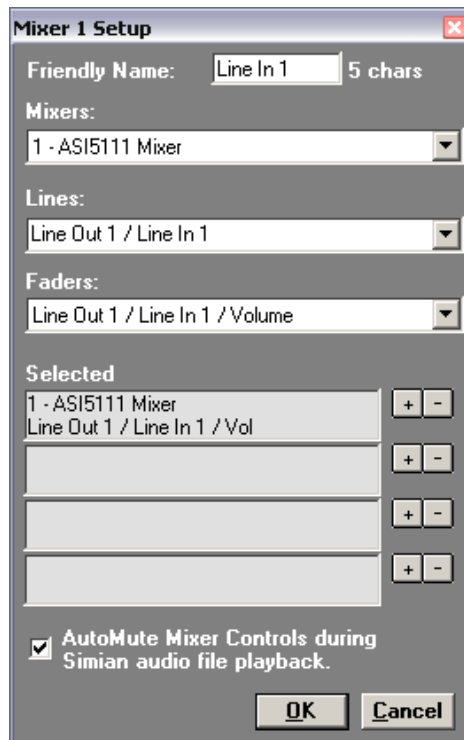
Simian has 16 on-screen mixers. To see them, click the Mixers button near the bottom-right of the main Simian interface. You can assign up to four individual audio devices to each mixer (most consumer grade cards have one audio device, while professional cards often have many). You can then use the mixer slider on the Mixers Panel to directly control those devices. To assign an audio device to a mixer, just click the button under the slider. You'll see the dialog box to the right:

Now, let's look at these options individually:

**Friendly Name** – You can call the mixer anything that you want up to 5 characters. Whatever you type in this text box will display on the button under the mixer in the Mixers Panel.

**Mixers** – Let's say that you have an AudioScience 4334 card and a standard SoundBlaster card installed in your computer. This option would allow you to select the individual card that you want to control with this mixer.

**Lines** – Your sound card will have a number of different lines (volume controls) available to control different devices, inputs, or outputs. You can select any of the lines here. Generally, only input lines are assigned to Simian's mixers, as the play device mixers are automatically assigned by Simian. You can find a great deal of information on mixer setup on our website. Just check out  www.bsiusa.com/support.

Figure 3.35

**Faders** – Audio devices often have more than one fader. This drop-down allows you to select which of the faders that you want to control on an individual device.

**Selected Controls** – Once you have selected your fader, just click the "+" button next to one of the Selected Controls lines to add your configuration to the list. You can control up to four faders with each mixer by adding them to the list. This is handy for multiple-device audio cards.

**AutoMute controls during audio file playback.** – If you want to automatically mute this mixer whenever the playback devices become active, you can select this option. This is handy for people who use pass-through to control a satellite feed.

# Configuring Spyglass

The SpyGlass dialog box can be found under Help/SpyGlass Diagnostics. It is a great tool for troubleshooting and testing. Let's look at the available options:

## Status Tab

The Status tab shows file use and performance information. This information is usually used by our Tech Support Team to gather certain information that is not available elsewhere. You'll notice two buttons toward the bottom.

The Expanded Simian Information button will open your text editor and create a SpyGlass File. These files help our Tech Support people help you. They may ask for them if you should ever need to call. The button simply opens your text editor and fills it with information that you can save and send to our Tech Support Team.

The Windows System Information button opens the Windows System Information application where you can save a snapshot of your system configuration. Our Tech Support people may also request this file if you should ever need to call them.

## Times/Debug Tab

The **Times** field displays the current status of the Timed Events in your Program Log and how Simian's audio engine is working with them, if they have been played or not, etc.  The Debug field displays any status messages (innocuous or not) being generated by Simian's audio engine.

## Playback Decks Tab

Shows the current status of all of the interactions between Simian and your audio card for each of the three playback decks.

## Expert Tab

The Expert tab provides information on system variables and a few options. The Audio Interface settings are second-level options designed to be implemented with the assistance of BSI Technical Support, or people with the word "Engineer" in their job title.

## Serial Port Tab

Here you can see the serial port status, as well as what's coming in through the Serial Port. You can also send messages directly out to the Serial Port. This tab is great for setting up serial devices such as the Broadcast Tools SS8.2 audio switcher.

# Configuring Security Options

The first time that you select Security (under the Window menu on the main Simian menu bar), it will ask you for a password. Make sure that you hold on to the password, as there's no way to retrieve it.

The first thing that you'll notice across the top of the Simian Security window is the User Name drop-down list, and three buttons. These controls allow you to create different users and give each of them different security settings. The settings on all four tabs change for each user that you define. Let's look at each of these individually…

**User Name** – This drop-down list holds a list of all of the users that you've defined.
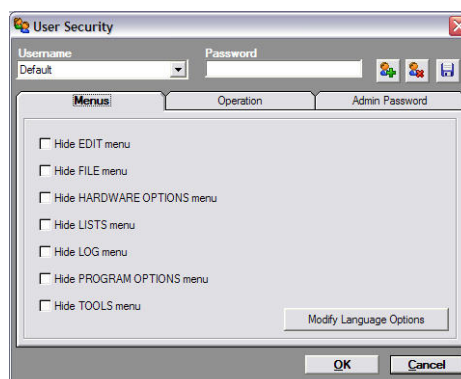

Figure 3.36

**Add New User** – This button allows you to define new users and add them to the User Name list.

**Delete This User** – Lets you delete the selected User Name from the drop-down list.

**Save User's Settings** – If you make changes on the four tabs, click this button to apply them to the selected user.

## Menus Tab

Here you can hide any of the menus on the main Simian menu bar.

**Modify Language Options** – To access Simian's Language Editor, click on this button.  You will then be able to modify any text in Simian to your own custom language or wording.

## Operation Tab

Enables you to set limits on several of the functions of Simian and keep users from shutting Simian down, and/or from running multiple instances of Simian.

**Allow only one instance of Simian** – If Simian is already open, another instance can not be opened.

**Prevent Simian Shutdown** – Simian can not be closed from the File menu or the Windows "X" button in the upper right corner of Simian.

**Disable EXITSIMIAN macro** – Simian will ignore the EXITSIMIAN macro so Simian can't exit via macro.

**Track program log editing** – This option causes Simian to create a log file (Leyymmdd.txt) in the Logs folder (by default c:\bsi32\logs). This file will give the time and nature of all Program Log edits.

**Prevent program log editing** – Prevents users from editing the Program Log.

**Verify program log date for time events** – Prevents Time Events from playing if the Program Log goes out of date.

**Prevent replay of events** – This option prevents Simian from playing any Events with information in the Status column.

**Lock the main window's status bar buttons** – Locks the Time Events, Serial port, Event Log, but not the Audio List buttons on the status bar.

## Admin Password Tab

Go here to change the password to enter the Simian Security window.

# Configuring the VoiceTrack Editor

Voice Tracking is pretty intensive work for your computer. We highly advise doing your Voice Tracking on your production machine.

Voice Tracking requires four separate audio devices, three devices for playback and one record device. This is where your professional grade production audio card really shines.

Before you can use the VoiceTrack Editor, you must set up the VoiceTrack audio devices in the Tools/Hardware Options/Playback screen.

The Voice Track Editor Assignments area allows you to select which audio devices you'd like to use to play back VoiceTrack Cut #1, VoiceTrack Track, and VoiceTrack Cut #2. These three settings correspond to the three main rows in the VoiceTrack Editor Panel.

To configure the record device for the VoiceTrack Track, you'll want to go to Tools/Hardware Options/Record, click the VoiceTrack Record radio button, and then designate the record device that you'd like to use.

Finally, if you want Simian to be able to play back your VoiceTracks, you'll need to make sure that you're recording to a folder that SoundHound is indexing. You designate this setting under Tools/Program Options/Paths.

Just select VoiceTrack default record from the Other Paths drop-down list and click the Set button to designate the folder. You'll notice a list of the folders that are currently indexed by SoundHound at the top of the Paths tab.
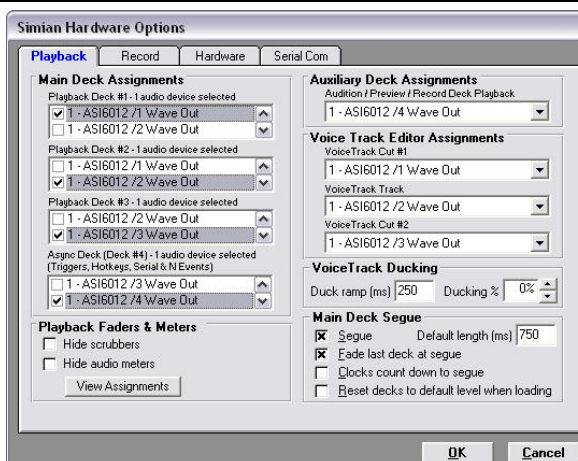


Figure 3.37
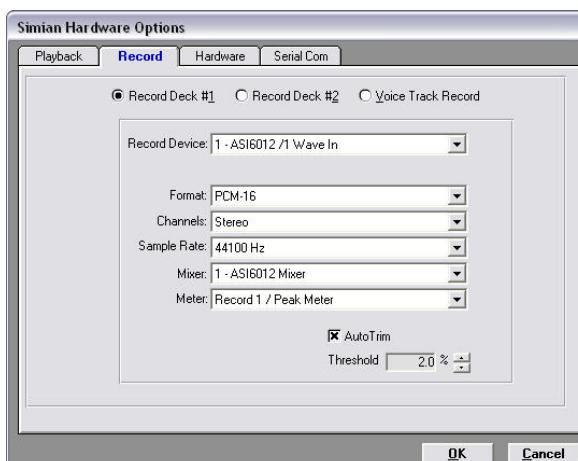


Figure 3.38
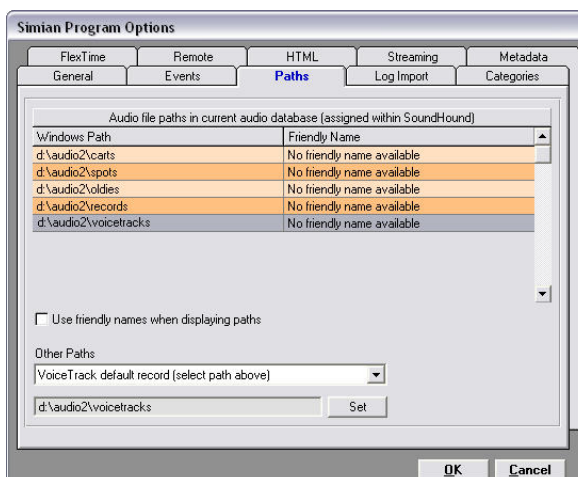


Figure 3.39

# Configuring Crash Recovery

Crash Recovery is a feature of Simian that will help you get back on the air quickly and automatically after a power outage. It's no replacement for an un-interruptible power supply (UPS), but for the station on a budget, it will get Simian running again as soon as the power comes back on. It'll even take you back to the same spot in a long file that was playing when the lights went out.

To set up Crash Recovery:

1. Go to **Tools/Program Options** and select the **General** tab.

2. Put a check mark in Use Crash Recovery.

3. Close the Simian Options Window, then close Simian.

4. Find the simian.exe file and put a shortcut to it in your Windows Startup folder.

5. Configure Windows to bypass any login screens at startup.

That's all there is to it. Now you'll be able to automatically return to the place where you left off whenever the power company fails you.

# Configuring AutoReplace

AutoReplace will help you keep your Program Log "on time" by replacing any failed Audio Events with another Audio Event of similar length. Events can fail for a number of reasons such as missing audio files, or incorrect spelling of audio file names in a particular Event. AutoReplace can also replace out of date files for you, so that you'll never have to worry about airing that big Christmas Eve sale spot on the 26th. To configure AutoReplace, just follow these steps:

1. Go to **Tools/Program Options** and select the **General** tab.

2. Select **Engage AutoReplacement** and click the **Settings** button.

3. At the top of the AutoReplacement dialog box are two options. **Replace Missing Items** and **Replace Out-Of-Date Items**. If you'd like to replace missing items such as missing audio files, select the first option. If you'd like to replace out of date Events, the second option is for you.

4. The bottom section of the AutoReplacement window allows you to select four audio files and four time ranges. Simply set your time ranges and drag Events in from the Event Builder. Feel free to use Carts as AutoReplace replacement Events.

5. Click Done and you're all set!

# Configuring TimeSync

TimeSync is a feature that allows you to synchronize your system clock with a satellite network using Triggers. Basically you're allowing a window of system clock time where Simian will listen for a Trigger to come down, and then reset the system clock to the designated time when the Trigger comes in. Here are some simple instructions:

1. Go to **Tools/Program Options** and select the **General** tab.

2. Select **Engage TimeSync** and click the **Settings** button.

3. Set the TimeSync Time to the time that you expect to receive the Trigger.

4. Set the window larger than the amount of time that your computer typically gets "off time" from the network.

5. Select the Trigger that you want to listen for.

6. Click OK and test.

For instance, we tell Simian that a Trigger normally comes in at 13:02, the Trigger to watch for is number 2, and we want to monitor that trigger for two minutes. Now Simian will listen for two minutes, starting at 13:01 computer time for the Trigger. When the Trigger comes in, Simian will set the system clock to 13:02 so you'll be TimeSynced up with the network.

# Chapter 4 Operation

## Learning the Simian Interface



Figure 4.1

When Simian opens, you can see the main window – if it doesn't look quite like the example above, click the 'Audio List is Visible' option on the bottom right of your screen.

The Simian interface has a lot of the familiar Windows® features such as a Title Bar and menus across the top.

The middle area, however, has "BSI-specific" features. This chapter covers all the elements but will focus on the BSI-specific items; the three Main Playback Decks, the Program Log, and the Tool Panels.

We recommend taking the time to familiarize yourself with the interface. Learn where the basic configuration options are (in the Tools menu and the Window/Security menu). Learn how to open Sets (Memorized Events Sets, Trigger Sets, HotKey Sets), and how to drag events into them from the Event Builder. You'll also want to check out the shortcut keys (Ctrl+B for Event Builder for example) and right-click menus to move quickly around the program.

### Menus

Menu selections can be made by clicking on the menu title or by pressing the first letter of the menu name along with the ALT key on the PC keyboard. To open the File menu, press ALT+F. The sub-menu items can then be activated by clicking on their names or by pressing the letter that is underlined in the sub-menu name.

## Time & Date

Figure 4.2

The first thing below the menus at the top of the Simian main window are the time and date indicators. You can click on them to change their format.

Clicking the time toggles between 12-hour to 24-hour time. Clicking the date indicator will toggle from an extended "January 1, 2000" type display to a shorter "1/1/00" display. You can further modify the way the Time and Date are displayed in the "Regional Settings" icon of the Windows Control Panel. Simian uses the Windows settings as the template for the time and date displays. Just right-click the time or date to bring up these settings.

Simian will also display temperature and weather information in this bar if you've opened the weather dialog box and updated current conditions. Click CTRL+W to open the weather dialog box.

## Playback Decks
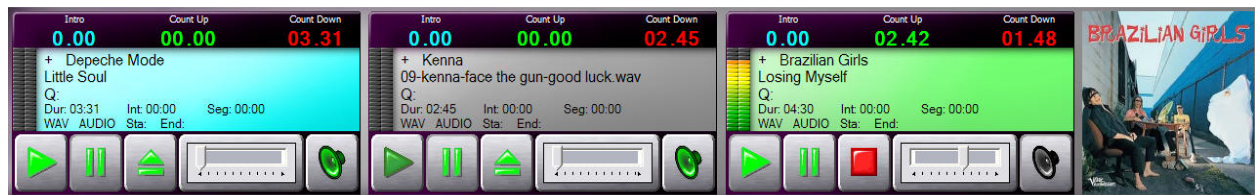


Figure 4.3

Simian has three playback decks toward the top of the program. Events are cycled through the decks from left to right as Simian sequences through the Program Log. All Events in the Program log except for Non-Sequential Events cycle through the Playback Decks. Each deck is made up of a few different parts. Let's look at them individually:

**Clocks** – The three clocks, Intro, Count Up, and Count Down show you, respectively, the time left before the Intro Tone in the Audio Event, the count up from the beginning of the Audio Event, and the count down to the end of the Audio Event. You can configure the decks to count down to the segue tone in the Audio Event by selecting the Clocks count down to segue option under Tools/Hardware Options/Playback.

**VU Meters** – The VU meters are standard meters telling you the audio levels for the device assigned to that particular deck. You can hide the VU Meters by selecting Hide audio meters under Tools/Hardware Options/Playback.
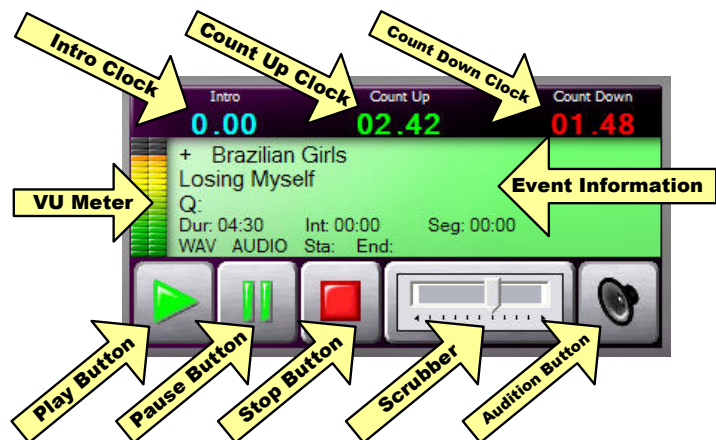


Figure 4.4

**Play** – The play button on a deck will start playback of that specific deck.

**Pause** – Pressing this button pauses playback for that deck.

**Stop/Eject** – When it looks like a stop button, it stops what's playing in the deck. When it looks like an eject button, it ejects the Event that's currently loaded and loads the next available Event (NTL) in the Program Log.

**Scrubber** – You can scrub through your Audio Events here. You'll also notice a little white coloring toward the beginning and the end of the blue area under the slider control. The white is the area before

the Intro Tone and after the Secondary Tone. Scrubbers are hidden by default. You can turn them on under Tools/Program Options/Playback.

**Audition** – This button allows you to play Audio Events in the deck through your audition speakers. If you click it, it turns red. This tells you that you're using the audition speakers. If you click it again, it turns green and whatever's playing goes out over the air.

**Event Information** – This area shows you all of the pertinent information about the Event that's loaded into the deck. The information changes based on the type of Event. Macro Events will show different info than Audio Events, etc.

## Program Log

Simian's Program Log is its own version of the standard radio industry program log. Simian simply sequences down the log and plays Events. It may stop, start, or jump forward based on information in the Cue column. You'll find much more useful information on Program Logs a little later in this chapter.


Figure 4.5

## Audio List

The Audio List holds a list of the files that are currently available in your Audio Database. This database is created by SoundHound, which is covered completely in Chapter 4. The Audio List can be hidden using the right-hand button on the Status bar.


Figure 4.6

## Tool Panels

As we move down, we come to the Tool Panels area. Here you will see one of four Panels. You select your panels using the five buttons at the bottom-left of the main Simian window (see the **Bottom Buttons** section on the next page). Let's look at each one individually:

### Record Panel


Figure 4.7

> The Record Panel has two Record Decks that you can use to manually record audio. You'll find instructions on recording audio a little later in this section.

### HotKeys Panel



Figure 4.8

HotKeys are a simple interface to push a button and play a sound. We'll go over their usage a little later in this section.

### VoiceTrack Panel
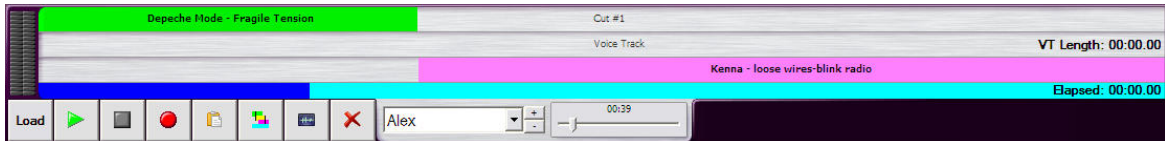


Figure 4.9

The VoiceTrack Panel holds the VoiceTrack Editor. Here you can easily create great-sounding Voice Tracks with a simple-to-use interface. For all of the details, check out the Using The VoiceTrack Editor section a little later in this chapter.

### Mixer Panel
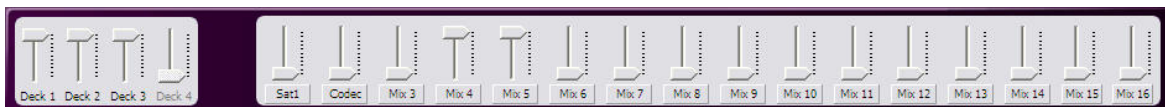


Figure 4.10

The Mixer Panel has two parts. On the left are sliders for Simian's four playback decks. On the right are 16 configurable mixers. Check out the Using Mixers section of this chapter and the Configuring Mixers section of Chapter 3 for more information.

## Bottom Buttons



Figure 4.11

Simian has a row of buttons at the bottom of its main window. These buttons allow you to select the active Tool Panel (or hide the Tool Panel with the **Extend Log** button), play and stop all playback decks, and change the Automation Mode. The Automation Mode button changes color. Green for Full automation (displayed as 'Auto', as shown), yellow for Live Assist, and red for Automation Off (displayed as 'Off').

## Status Bar



Figure 4.12

At the very bottom of the main Simian window is the Status Bar. The Status Bar gives you information on the current state of Time Events, Triggers, and the Event Log. You can also hide and view the audio list. This allows you to see the Program Log more easily during times when the Audio List is not needed. There is a security setting to disable all of these buttons except the Audio List button, so if these buttons stop working, ask your system administrator.

# Using Program Logs

Simian's Program Log is its own version of the standard radio industry program log. Simian simply sequences down the log and plays Events. It may stop, start, or jump forward based on the data in the Cue column.

Different kinds of Events cause Simian to do different things. An Audio Event may play a song, while a DECKFADE Macro Event could change the volume of one of the three main play decks. Basically, anything that takes up a line in a Program Log is an Event.

Events have Cues, which cause Simian to play differently. For instance, if Simian sequences down to an Event that has an AutoStart Cue (+ in the Cue column), it will automatically play that Event. On the other hand, if Simian sequences down to an Event that has a Manual Cue (Cue column empty), it will stop and wait for some other reason to start. Those other reasons could be a Start Next Macro Event that's played based on a HotKey, a Trigger, or from a press of the spacebar.

Let's page over and take a look at the different parts of the Program Log:

At the top, you'll see the name of the Program Log and the Air Date. To the right is Runtime & Position Info. You can turn Runtime & Position Info on and off under the Log menu. You can also set an Air Date for the log by clicking on the Program Log name or the Air Date. Lastly, you can turn the Runtime & Position Info off by deselecting its option under the Log menu.

Below the Runtime & Position info, you'll see the Column Titles. These simply point out the different bits of information in the individual Events. You can show and hide them by right-clicking the Program Log and selecting Show Column Titles.



Figure 4.13

The buttons across the bottom are pretty self-explanatory, but let's go through them:

**Cut** – Cuts the selected Event out of the Program Log and places its data onto the Windows Clipboard for later use.

**Copy** – Places a copy of the selected Event on the Windows Clipboard for later use.

**Paste** – Pastes an Event from the Windows Clipboard into the Program Log below the selected Event. This will only work if an Event has been Cut or Copied.

**Move Up** – Moves the selected Event up in the Program Log.

**Move Down** – Moves the selected Event down in the Program log.

**Event Builder** – Displays the Event Builder interface.

**Make Next** – Loads the selected Event into the next available Play Deck.

You can also right-click the Program Log and get this menu:

Edit Info
Edit Audio
Edit Cue / Scheduled Time
Edit Filename

Undo

Cut
Copy
Paste
Quick Insert

Make Next
Toggle AutoStart
Clear Status
Set Runtime Start

Event Builder

✔ Show Column Titles

Change Font
Change Row Height
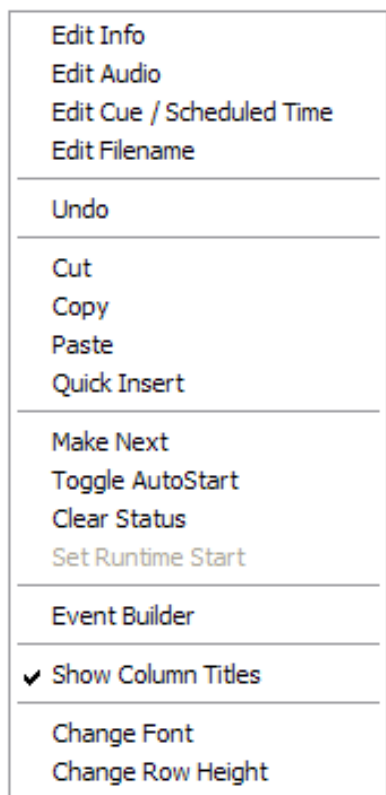
Figure 4.14

**Edit Info** – Opens the BSI Info Editor for the selected Event.

**Edit Audio** – Opens the selected Audio Event's audio file in the selected audio editor. You define your audio editor under Tools/Program Options/Paths.

**Edit Cue / Scheduled Time** – Opens a window that allows you to modify the scheduled time and cue type of the currently selected item in the program log.

**Edit Filename** – Opens a window that allows you to modify the file name of the currently selected item in the program log

**Undo** – Reverses your last action

**Cut, Copy, Paste** – These work just like their corresponding buttons at the bottom of the Program Log.

**Quick Insert** – Allows you to quickly type in the file name for an audio file. It will be automatically assigned to an Audio Event and inserted into the Program Log below the selected Event.

**Make Next** – Cues up the selected Event to play next.

**Toggle AutoStart** – Will toggle the selected Event's Cue information between AutoStart and Manual.

**Clear Status** – Clears the information in the Status column for the selected Event.

**Set Runtime Start** – Starts the Runtime & Position info at the time it is clicked.

**Set Runtime Start** – Starts the Runtime & Position info at the time it is clicked.

**Event Builder** – Works just like its corresponding button at the bottom of the Program Log.

**Show Column Titles** – Shows or hides the column headers in the Program Log.

**Change Font** – Allows you to change the font displayed in the Program Log and the Audio List.

**Change Row Height** – Allows you to change the height of each row in the program log.

# Creating Program Logs

There are several ways to create Program Logs.  If you are not using a traffic or music scheduling system, you will probably create your Program Logs from scratch using the Event Builder.  If you are using traffic and/or music scheduling software, you will be importing "raw" logs from those systems and then editing them in Simian.

The Event Builder is the tool that you will use to manually build and edit all your Program Logs (and any other lists, such as HotKey Sets) in Simian.  The basic strategy for building your lists is to simply open Event Builder, configure the Events with the options provided, set the Event Variables, then drag and drop Events from the Event Builder "Drag From Here" spot into the place in the Program Log where you want them to go. Once you have all your Events in your Program Log, you can drag them around or cut and paste them using familiar Windows Cut, Copy and Paste commands.

To chain one Program Log to the next, you can add a "Log" event to the bottom of your log that calls the next Program Log. When Simian sequences down the Program Log to a Log Event it will load that Program Log and start it according to the cue of the first Event in the new Program Log.

## Manually Creating a New Program Log

To start a new log from scratch:

1. Select **File/New Program Log**.

2. Select **Tools/Event Builder**.

3. Select an Audio Event from the list on the Audio tab of the Event Builder.

4. Set its Event Variables. These are the Cue, Category, and Scheduled Time. In this situation the Cue will be AutoStart, The Category will be Audio and the Scheduled Time will be 00:00:00, as we are not configuring this Event to be a Timed Event.

5. Drag from the **Drag From Here** spot into the Program Log.

6. Repeat steps 3-5, using different types of Events until you have a working Program Log.

Audio Events are just one type of Event, and we used them here as an example because they are easy to configure. Once your Events are listed in the Program Log, you can cut and paste them from one line to another or use your mouse to drag and drop them into different places.

## Manually Editing Program Logs

There are several different ways to manually edit a Program Log in Simian.  You can insert Events, modify Events, move Events, and delete Events. You can even change an Event's Cue by pushing a single button.

To change the Cue of a highlighted Event, press the appropriate Cue symbol key on the number pad or keyboard. For example, you can change many events to AutoStart at once by highlighting them and tapping the "+" key.

You can cut, copy, paste, or delete Events by using the right-click menu, the buttons at the bottom of the Program Log, or by using the standard Windows Hot Keys:

To cut events press Ctrl + X

To copy events press Ctrl + C

To paste events press Ctrl + V

To delete events press the Delete key

_____

You can cut, copy or delete multiple events by holding the SHIFT or CTRL keys to select many Events at once. Click on the first Event you want to select, then press and hold the SHIFT key. Click on the last Event you want. The entire range in between will be highlighted. Or click on the first event you want, hold the CTRL key, and select Events out of sequence. Now you can cut or copy the whole range. You can also paste the entire range into the current Program Log, Memorized Events window, or any other list item.

> You can use the "quick insert" function to insert an Audio Event in your Program Log if you know the filename. Press Ctrl-Q or right-click on the program log where you want to insert the Event and choose "Quick Insert" from the pop-up menu.

### Saving Changes to Program Logs

To save any changes you've made to a program log, select File/Save. To give it a new name, select File/Save As, type a new name, and click OK.

To change the description or other properties of a Program Log, click on the Properties button in the Save As dialog box, make the desired changes, and click OK.

### Calculating Run Times

Simian will calculate the run time for a selected group of Events. To do this, go to the **Log** menu and choose **Display Runtime & Position Info**. The information will appear on the right at the top of the Program Log. For Example, if you highlight Events five through nine, (5 to 9) will appear and the calculated run time will appear next to it. To the right of this figure is the number of the currently highlighted Event and the total number of Events in the log.

## Verifying Program Logs
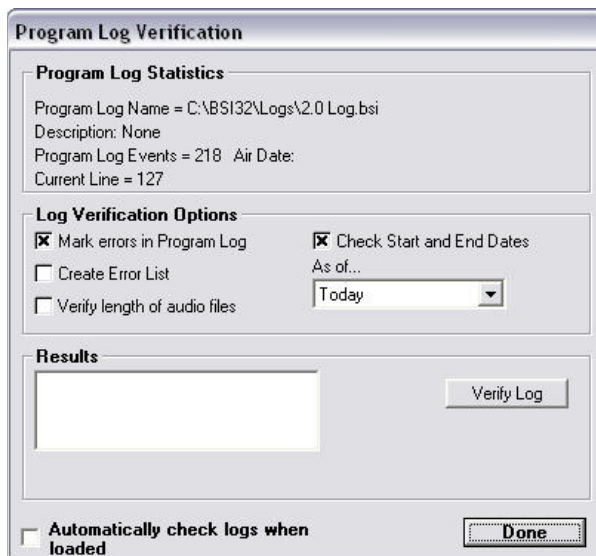


Figure 4.15

You can check a Program Log at any time for errors using the Program Log Verification routine. This will help you identify any Event whose associated file might be missing (wave files, text files, Program Logs, and carts). Select Log/Verify Program Log from the menu bar. This will give you Program Log statistics, verification options and a window to view the error log results. These are each described below:

### Program Log Statistics

Extended information about the current program log is available in the top of the Program Log Verification window. This includes the program log Name, its Description, the total number of Events and the current line (the line currently highlighted).

### Log Verification Options

In the middle portion of the window you can choose your verification options. These include Mark Errors in Program Log, Create Error List, Verify Length of Audio Files and Check Start and End Dates as of a certain date. Simian can check Start and End dates relatively, meaning what would be early or late as of a future date. For example, if it's Friday and you are checking Monday's log, any spots that don't start until Sunday will be flagged as being out of date, which won't be true on Monday. Simian allows you to check the log as of Monday, meaning it will know that the Sunday spots will be valid as of Monday. This also works with spots that will expire before a certain day. You can check the log "as of" any date up to a week in the future.

### Results

If you select Create Error List, Simian will review the currently loaded Program Log for errors then generate an error list that you can view on-screen or print.  You can go back and review the results of the most recent error check by selecting View Error List.

### Automatically check logs when loaded

This option will cause Simian to automatically check for missing/expired events in your Program Log whenever Simian loads one (When opening a log, when a log is loaded with the CHAIN macro, or if Simian has been configured to, when Simian starts and loads the last log).

## Chaining Logs

In most fully automated situations, you will want Simian to automatically load up and start the next day's Program Log to create a continuous chain of logs.  The CHAIN macro in conjunction with the Scheduled Events functionality of Simian is used to accomplish this.  Follow the steps below to implement the CHAIN macro in your own setup.

| | |
|---|---|
| First, go to the **Async** menu and choose **Show Scheduled Events**.<br><br>The Scheduled Events window will appear as shown at right. | <br>Figure 4.16 |
| Open Event Builder either by clicking on the **Event Builder** icon, or by going to the **Tools** menu in the main Simian window and choosing **Event Builder**.<br><br>Once in the Event Builder, go to the **Macro** tab and choose "CHAIN" from the **Macro name** dropdown list. | <br>Figure 4.17 |
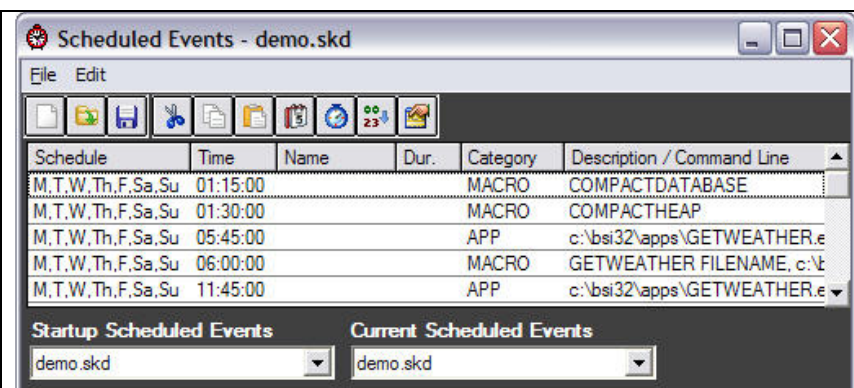
Click your mouse cursor into the **Macro name** dropdown. Move the cursor to the end of the word "CHAIN", add a space, then add the name of your program log. The CHAIN macro has the ability to use *meta variables* to represent the file name. This means that it can dynamically find your program log based on the current day or date using the following codes:

%W   [the first three letters of the day, Ex: Mon, Tue]
%M   [two digits representing the month]
%D   [two digits representing the day]
%Y   [two digits representing the year]
%Z   [four digits representing the year]
%X   ["WKD" on weekdays, "SAT" on Saturdays, and "SUN" on Sundays]

Therefore, if your program logs are named with the date that log is going to air, your CHAIN macro should be entered as shown.
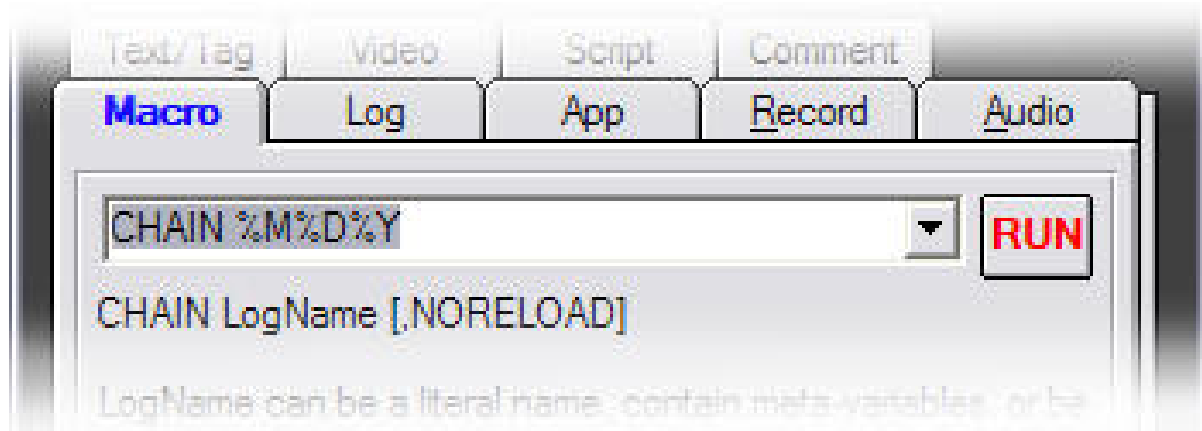


<div align="center">Figure 4.18</div>

Now you are ready to add your CHAIN macro to your Scheduled Events.

Click and drag from the **Drag From Here** icon and drop it onto the **Scheduled Events** window.
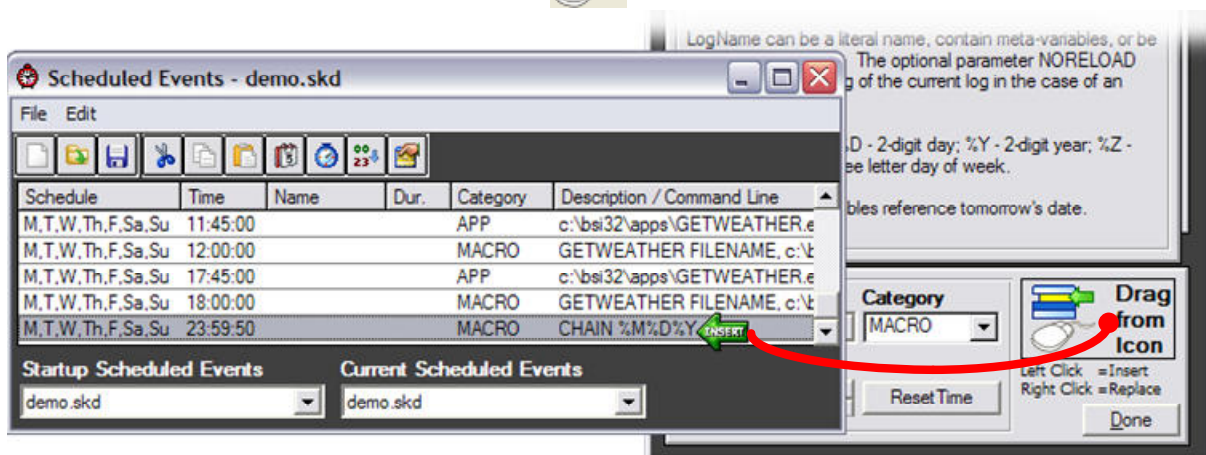


Figure 4.19

| | |
|---|---|
| Now that the event has been added, we need to set the days and time it is to occur.<br><br>To set the days, highlight the CHAIN event added to the Scheduled Events window in the last step. Click on the **Set Event Schedule** icon ![icon]. <br><br>The window shown at right will appear. In most cases you will want to CHAIN your logs every day, so click on the **Every Day** button, then click **OK**. | <br>Figure 4.20 |
| Make sure the CHAIN event is still highlighted. To set the time the event will occur, click on the **Set Event Time** icon ![icon].<br><br>The CHAIN macro should be set to 23:59:50 under most circumstances. Because the *meta variables* always reference *tomorrow's* date, running the CHAIN macro before midnight will load up the next day's log to be ready to play at the top of the hour.<br><br>After setting the time, click on the **Set** button. | <br>Figure 4.21 |
| You are now done adding the CHAIN event to your Scheduled Events. Make sure to save your Scheduled Events set. Just as importantly, make sure you set your saved Scheduled Events set as the set Simian is currently using, and also that it is the set automatically loaded when Simian starts by setting the **Startup Scheduled Events** and **Current Scheduled Events** dropdowns to your saved set before closing the Scheduled Events window. | <br>Figure 4.22 |
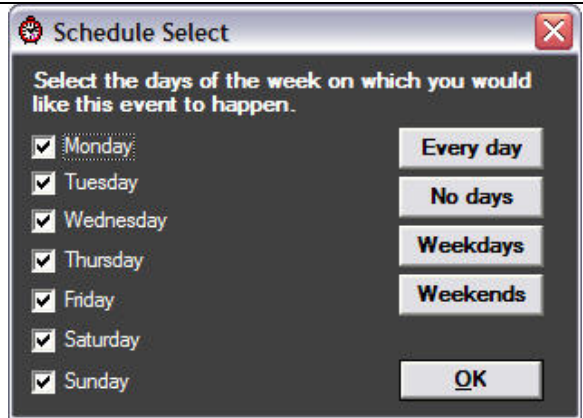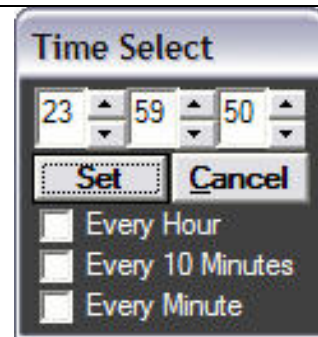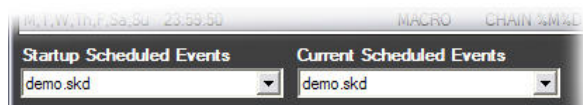
## Importing and Merging Logs

### Considerations

All scheduling software exports either a *character delimited* or *position dependent* text file regardless of the three-character filename extension.

Simian simply reads these files to find the columns and then rearranges the columns.

### Let's talk about text…

Text files are very simple containers that hold c*haracters. Characters* are letters, numbers, punctuation marks, Symbols, etc. Basically, *characters* are anything that take up one "placeholder" in a text file such as "A" "8" "#" "+" " " or even "☺"

Program Logs are saved as text files, but with a special character to represent the separation between the different 'pieces' of data.  There aren't really any scheduling programs out there that export "smiley delimited" text files, but the point is that the delimiting character is a unique character that separates the information and that won't be used within the text (this means that comma or apostrophe delimited might not be a good choice if you use those characters in your Artist Names and Titles.  Also note that "#" or "+" delimited would be a bad choice of delimiting character because those characters are both used to represent cue types in Simian.  Most commonly used delimiting characters are "|" or the [tab] key).

So, we've got our text file with a bunch of *characters* all in rows.  Now it's time to talk about a couple other terms; *Records* and *Columns.* For our use, *records* are individual horizontal lines in the text file. *Columns*, however are a little more complicated. In its simplest form, *column* means information in a stack, but how do we split up groups of *records* into *columns*?

There are two different ways; *Character Delimitation* and *Position Dependence*. We'll examine each one individually.

In a *character delimited* text file, the individual *record* has a particular *character* inserted into it to *delimit* it into columns. Here's an example of a *comma delimited* text file:

```
Column1,Column2,Column3,Column4
Column1,Column2,Column3,Column4
```

In a *position dependent* text file, the *records* are split into *columns* based on the number of character placeholders (counted from the left). Any information that falls within the number of placeholders belongs in that *column.* Here's an example of a *position dependent* text file where each *column* is ten *characters* wide:

```
Column1   Column2   Column3   Column4
Column1   Column2   Column3   Column4
[   4 Columns = 40 placeholders    ]
```

In a *position dependent* text file, each *column* can be a different *length* or number of characters. Here's an example of four *columns* that have *lengths* of 3, 5, 7, and 9 characters:

```
 + info name   address
[3][ 5 ][  7  ][   9   ]
```

### Let's Tie It In:

Now that we understand the difference between a *character delimited* and *position dependent* text files, let's look at the process for setting up the import filters for each type of text file. The first thing that we need to find out is what kind of text file your individual scheduling software creates. There are two ways to do this. You can call up the manufacturer of the scheduling software and ask (if you do, and if it's character delimited, make sure that you find out the delimiting character as well) or you can simply open the file in a text editor such as WordPad and use your newfound knowledge to discern the nature of the file yourself! Once you know, you can move down to the appropriate section of this area and continue from there…

_____

**Character Delimited:**
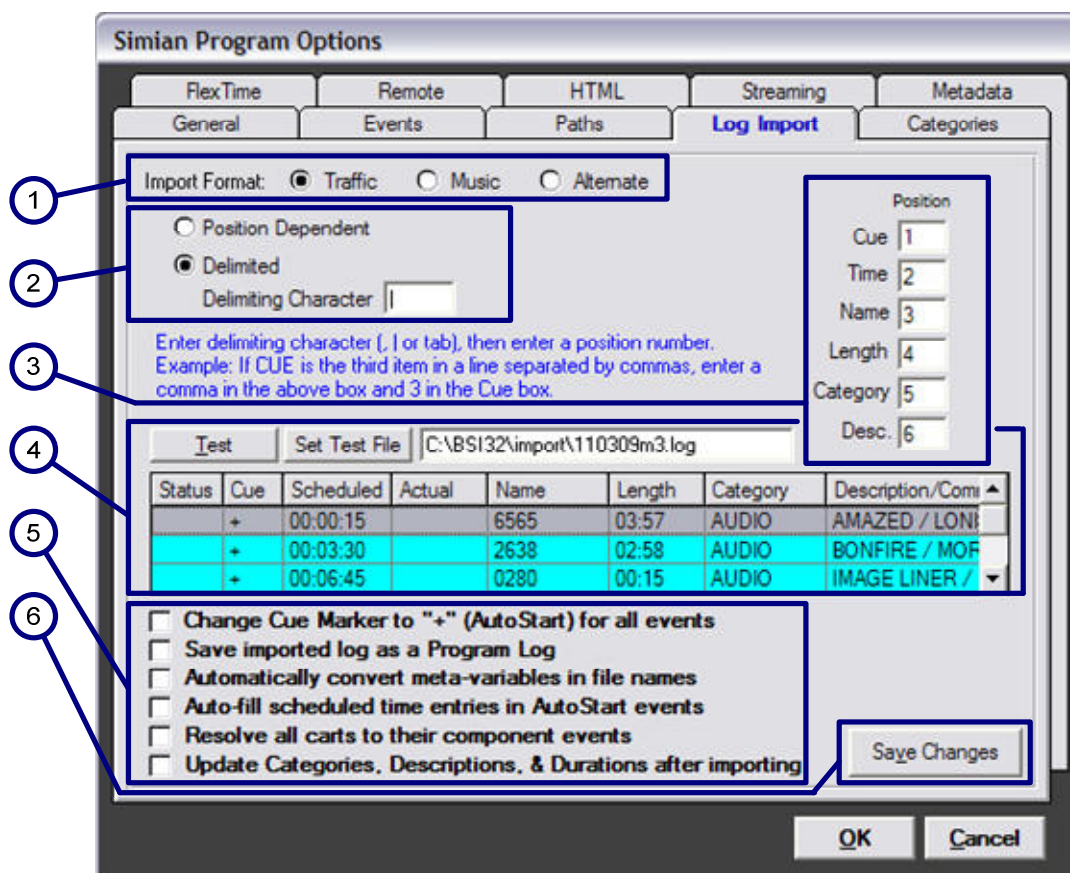


Figure 4.23

So, you've ferreted out the nature of your text file, but after analyzing it with the previous instructions, it looks like it is bar delimited (the character "|"). Now we can go about setting up the filter appropriately. When you open the **Log Import** tab under **Tools/Program Options** in Simian, it looks like this:

Let's look at each section of the **Log Import** tab one at a time:

1. Import Format: These three radio buttons allow you to choose between three completely different import formats. All of the other import settings change based on which format you choose here.

2. This section allows you to set up the import filter to accept either a Position Dependent or character Delimited text file. If you choose Delimited, it will also allow you to choose the delimiting character.

3. This is where the rubber meets the road. If we look at the Simian interface, then your text file, it will become very apparent that our columns are probably not in the same order. Let's look at an example of a "real life" scheduler log:

```
00:03:00|+|1460|FORTUNATE SON|CREEDENCE|AUDIO|00:00

00:06:00|+|1266|TAKE IT EASY|EAGLES|AUDIO|03:25

00:09:00|+|8030|JUST LIKE STARTING OVER|JOHN LENNON|AUDIO|04:50

00:12:00|+|1083|BROWN SUGAR|ROLLING STON|AUDIO|03:44

00:15:00|+|1172|I SHOT THE SHERIFF|ERIC CLAPTON|AUDIO|00:00

00:18:00|+|1318|AINT THAT PECULIAR|MARVIN GAYE|AUDIO|03:57

00:21:00|+|1634|BOOGIE SHOES|K C AND THE|AUDIO| 02:09

00:24:00|+|1213|SUPERSTITION|STEVIE WONDE|AUDIO|04:22
```

Now, let's have a look at this… Sure looks like the **Cue** information is in the second column. In this case, we'd put a "2" in the **Cue** text box. It's that simple! If there's information in the text file that Simian doesn't ask for, feel free to omit it. If there's information that Simian asks for, but the text file doesn't have it, don't worry, Simian doesn't always need all of the information that it asks for. Here are a couple common examples:

The log doesn't include information for the **Category** for all or some of the records. If the information in the **Category** field is missing, Simian will automatically assume that the **Category** is "Audio". In this situation, if the Event is not an audio file it will error.

Length is used only for log verification, and is unimportant during actual playback.

Description is optional for all events other than Macros.

Time is only important for sorting and for Timed Events.

4.  This ominous looking little area is there to keep you from having to go back and forth between the main Simian interface and the **Log Import** tab. You'll notice that the columns correspond to those in the main Simian Program Log. The reason for this is that you use this area to open and test a text file to make sure that the settings in section 3 are correct. Once they line up properly here, you'll never need to use this section again. Simply use the **Set Test File** button to open the text file, and then use the **Test** button to test the file as you make changes to section 3. Once you have things the way that you want them, just click the Save Changes button to save the import format.

5.  Section Five contains several optional check box options to automatically perform several tasks at the end of the import process.  They include:

    a.  **Change Cue Marker to "+" (AutoStart) for all events** – Puts a "+" in the cue column for every Event (replacing any other cue that may or may not have been in the original import file). This is used mostly by music-on-hard drive stations whose scheduler logs don't include cue information.

    b.  **Save imported log as a Program Log** – Saves the imported file as a program log using the same name as the original import file.

    c.  **Automatically convert meta-variables in file names** – Converts date meta variables contained in the Filename column to today's date.

    d.  **Auto-fill scheduled time entries in AutoStart events** – Rebuilds scheduled time entries in the Scheduled column for all AutoStart cued events based on the timed events' and manual start events' scheduled times.

    e.  **Resolve all carts to their component events** – Removes carts from the program log and replaces them with their component events (e.g. if a cart is specified in your program log which contains three AutoStart events, that cart will be replaced by the three events in the program log).

    f.  **Update Categories, Descriptions, & Durations after importing** – Refreshes the named columns with the current data obtained from your audio database.

6.  The **Save Changes** button simply saves the changes that you've made to this particular Import Format.

_____

### Position Dependent

Well, now. You've looked at your text file and found that it's position dependent. In this case, when you go to **Tools/Program Options** and select the **Log Import** tab, you'll want to select **Position Dependent** (in box 2) right away. Once you have, the interface will look like this:
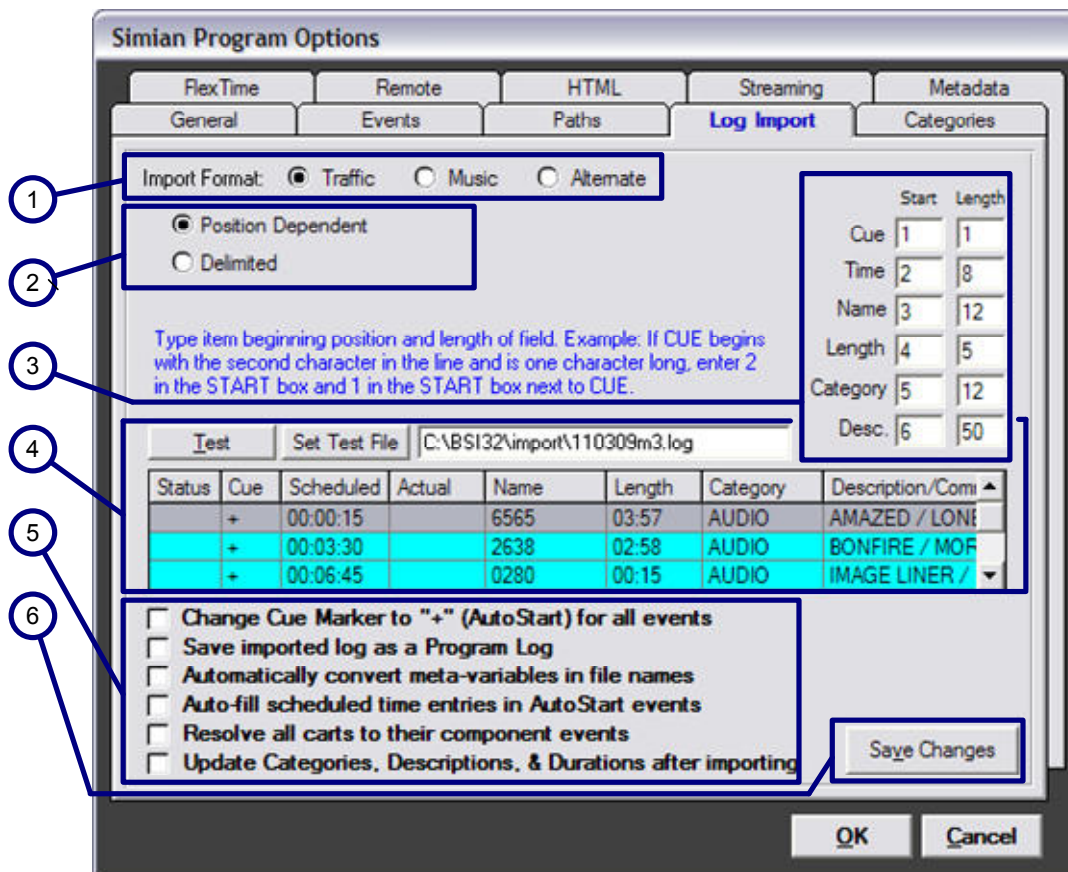


Figure 4.24

Let's look at each section of the **Log Import** tab one at a time:

1. **Import Format:** These three radio buttons allow you to choose between three completely different import formats. All of the other import settings change based on which format you choose here.

2. This section allows you to set up the import filter to accept either a **Position Dependent** or character **Delimited** text file. If you choose **Delimited**, it will also allow you to choose the delimiting character.

3. Here's the heart and soul of this dialog box. If we look at the Simian interface, then at your text file, it will become very apparent that our *columns* are probably not in the same order. Let's look at an example of a "real life" log:

```
00:09:00+8030    JUST LIKE STARTING OVERJOHN LENNON AUDIO 04:50
00:12:00+1083    BROWN SUGAR          ROLLING STONAUDIO 03:44
00:15:00+1172    I SHOT THE SHERIFF   ERIC CLAPTONAUDIO 00:00
00:18:00+1318    AINT THAT PECULIAR   MARVIN GAYE AUDIO 03:57
00:21:00+1634    BOOGIE SHOES         K C AND THE AUDIO 02:09
00:24:00+1213    SUPERSTITION         STEVIE WONDEAUDIO 04:22
00:27:00+1015    SON OF A SON OF A SA  JIMMY BUFFETAUDIO 03:17
[   8  ]1[   8  ][         23          ][   12   ][ 6 ][ 5 ]
[----------------------63 Placeholders---------------------]
```

Let's have a look at this. Using the knowledge that we picked up earlier, it looks like the cue starts on *placeholder* 9 and is one character long. Therefore, we enter a 9 and a 1 (respectively) in the boxes after **Cue**. It's really that simple! If there's information in the text file that Simian doesn't ask for, feel free to omit it. If there's information that Simian asks for, but the text file doesn't have it, don't worry, Simian doesn't always need all of the information that it asks for. Here are a couple common examples:

The log doesn't include information for the **Category** for all or some of the records. If the information in the **Category** field is missing, Simian will automatically assume that the **Category** is "Audio".

Length is used only for log verification and is unimportant during actual playback.

Description is optional for all events other than Macros.

Time is only important for sorting and for Timed Events.

4. This area is there to keep you from having to go back and forth between the main Simian interface and the **Log Import** tab. You'll notice that the columns correspond to those in the Program Log. The reason for this is that you use this area to open and test a text file to make sure that the settings in section 3 are correct. Once they line up properly here, you'll never need to use this section again. Simply use the **Set Test File** button to open the text file, then use the **Test** button to test the file as you make changes to section 3. Once you're done, use the Save Changes button to save your import format.

5. Section Five contains several optional check box options to automatically perform several tasks at the end of the import process. They include:

   a. **Change Cue Marker to "+" (AutoStart) for all events** – Puts a "+" in the cue column for every Event (replacing any other cue that may or may not have been in the original import file). This is used mostly by music-on-hard drive stations whose scheduler logs don't include cue information.

   b. **Save imported log as a Program Log** – Saves the imported file as a program log using the same name as the original import file.

   c. **Automatically convert meta-variables in file names** – Converts date meta variables contained in the Filename column to today's date.

   d. **Auto-fill scheduled time entries in AutoStart events** – Rebuilds scheduled time entries in the Scheduled column for all AutoStart cued events based on the timed events' and manual start events' scheduled times.

   e. **Resolve all carts to their component events** – Removes carts from the program log and replaces them with their component events (e.g. if a cart is specified in your program log which contains three AutoStart events, that cart will be replaced by the three events in the program log).

   f. **Update Categories, Descriptions, & Durations after importing** – Refreshes the named columns with the current data obtained from your audio database.

6. The **Save Changes** button simply saves the changes that you've made to this particular **Import Format**.

**Implementation:**

So, once you've got your filters set up, how do you use them? Just go under the **File** menu in the main Simian interface and select **Import**, then select the format that you want to use (remember area 1?).

Where'd the file go? For Simian to see the files, they need to be put in the folder that you designate under **Tools/Program Options/Paths.** You can designate the location for the **Log Import** folder (the folder where the "raw" text files go) and the **Program Logs** folder (the folder where the .bsi logs are created when you import your log) under the **Other Paths** drop-down list.

So, why the two folders? When you import your file, Simian reads the "raw" text file from the **Log import** folder and uses that information to create the .bsi file in the Program Logs folder.

# Using the Audio List

The Audio List holds a list of the files that are currently available in your Audio Database. This database is created by SoundHound, which is covered completely in its sections of this manual.

At the top of the Audio List, you'll see information on how many files are currently in the Audio Database and how they are sorted or filtered. Below that, you'll see a list of audio files and carts. These can be made into Audio Events by simply dragging them from the Audio List into the Program Log. If you right-click on the Audio List, you'll get options to show the details of the audio files in the list and change the default Cue used when you click on the Add button.

At the bottom of the Audio List there's a set of buttons. Let's look at each of these individually:



Figure 4.25

**Add** – This button will add the selected audio file into the Program Log as an Audio Event directly underneath the selected Event. If you'd like to change the default Cue for items that you add to the Program Log using the Add button, simply right-click on the Audio List and select Default Event Cue, then AutoStep or Manual.

**Filter** – Opens the Filter audio list dialog box, which will let you filter the items in the Audio List down to a subset so that you can easily find what you're looking for. Want to single out all of your audio files with an Artist/Advertiser tag of "Aerosmith"? Here's the place to do it.

**Sort By** – Allows you to quickly sort your Audio List by most of the major Audio Tags. Want to put the Audio List in order by Year? Here's the feature you're looking for.

**Folders** – Allows you to select any single folder that SoundHound is currently indexing. Want to only look at items in your "spots" folder? Simply select it from the list.

**Z-A** – Sorts your Audio List alphabetically according to file name, ascending or descending. In other words, from A-Z or from Z-A.

**Find** – Helps you quickly find an audio file in the Audio List. When you click on the Find button, the Audio List will change to look like what you see at the right. You can use the buttons at the top to automatically find files alphabetically or type in a search string. The 0-9 button will change the letters to numbers. Click the Find button at the bottom a second time to return to the normal Audio List interface.

**Audition** – This button will look like a play or stop button depending on whether or not you are using it. It plays the selected file in the Audio List through your Audition Device.



Figure 4.26

# Using Event Logs
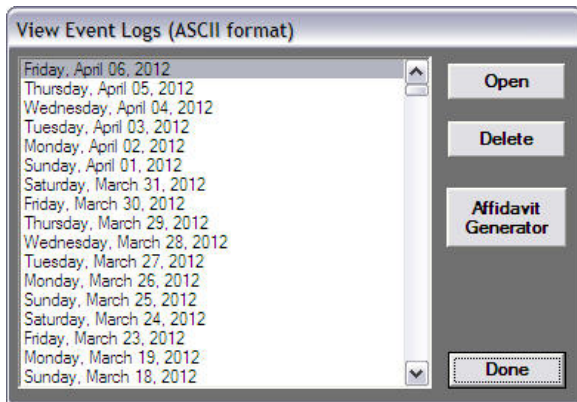


Figure 4.27



Figure 4.28

If you selected the **Event logging on** at startup option on the General tab of the Simian Program Options window, Simian keeps a record of all the events that happened that day in a file.

The file will be named that day's date and will be created in the program log folder for your review at a later time. The file names are six characters long followed by the "lst" or "mdb" extension (You can choose ASCII or MS Access database format on the General tab as well). For example: the events on Saturday, September 16, 2001 would be kept in a file called 010916.lst or 010916.mdb in the program log folder. You also have an option to add the station ID and session number to the file name under Tools/Program Options on the General tab. This helps avoid overwriting files in multi-station installations.

To open an Event Log, just select Log/View Event Logs from the menu bar, then select your Event Log and click Open. You can print an Event Log by selecting File/Print from the Event Log dialog box.

Event Logs are often used for creating As Run lists for reconciliation.

# Using the Affidavit Report Generator
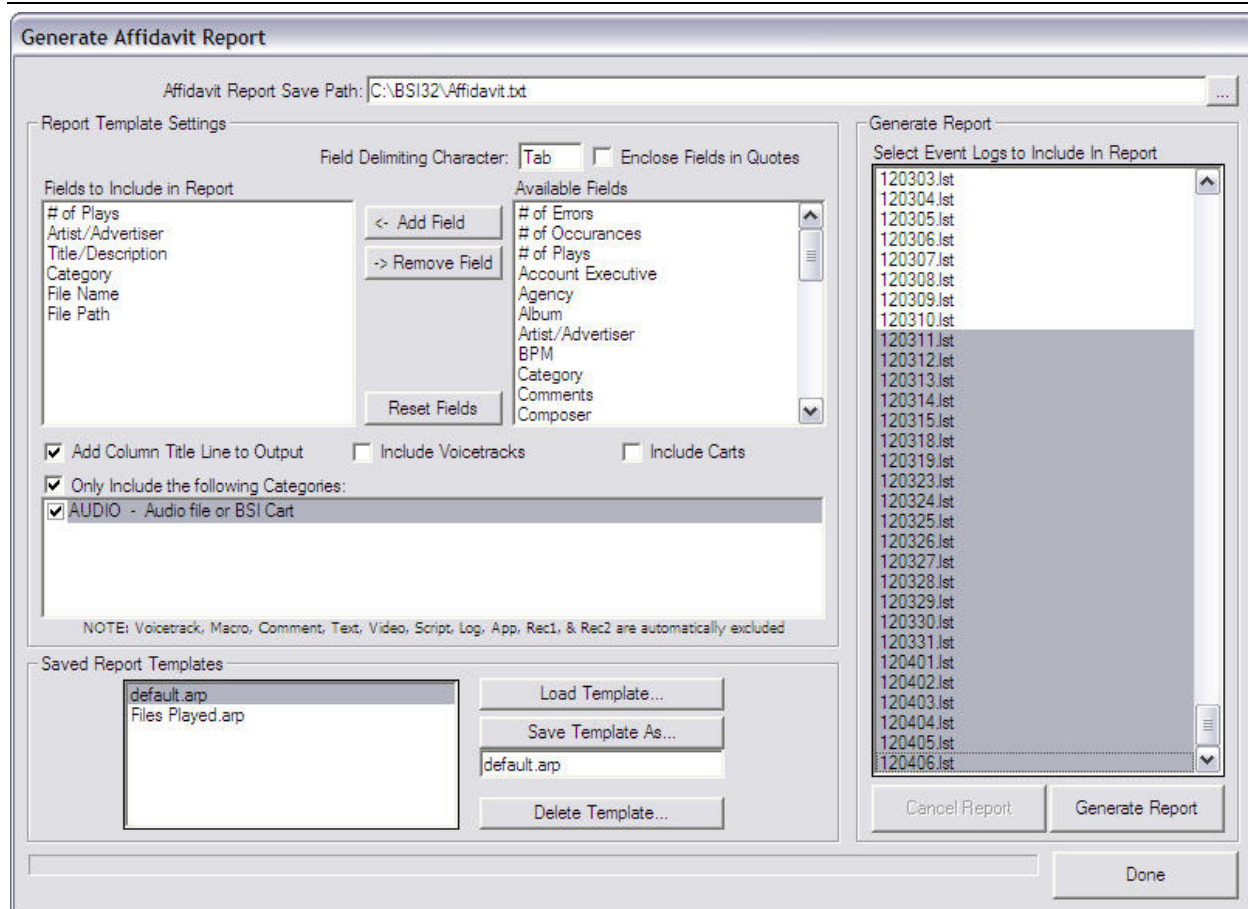


Figure 4.29

The Affidavit Report Generator allows you to output a delimited text report based on the Event Logs that have been created above (see above for information on Event Logs). You can choose a range of multiple event logs and the Affidavit Report Generator will open each Event Log, extrapolate the data, and add it to the report. You can customize which fields will be included with the report, and the output format. The reports that are generated can be imported into spreadsheet programs, such as Microsoft Excel, or Open Office Calc.

To access the Affidavit Report Generator, open the **Log** menu in Simian's main user interface and choose **View Event Logs**. In the **View Event Logs** window (as shown in figure 4.27), click on the **Affidavit Generator** button and you will be presented with the window shown above.

You must select your delimiting character for your report. The most common being either the TAB, or comma. To set the TAB character as your delimiting character, simply type the word "Tab" into the **Delimiting Character** field. To use a comma, simply type a single comma into the field. If you want each field to be enclosed within quotes, place a check box into the **Enclose Fields in Quotes** check box. These settings are usually determined by the application you will be importing the report into, so you may need to check which import options are available in your destination application to determine which settings you will need to set here.

The default.arp report template is shown above, but you can customize the template by selecting the fields you want included with your template. To add a field to your template, highlight your desired field in the **Available Fields** list, then click on the **Add Field** button. The field will be added to the **Fields to Include in Report** list. The column order of your report is determined by the sort order of the **Fields to Include in Report** list, so if you wish to change the sort order, remove fields by highlighting them in the

**Fields to Include in Report** list and clicking on the **Remove Fields** button, or click on the **Remove Fields** button to remove all the selected fields from the list and re-add the fields in your desired order.

You can have the report include the field names as the first line in the report template by enabling the **Add Column Title Line to Output** option.

By default, Voicetracks and Carts are not included in the analysis of the Affidavit Report.  You can include either of these file types by enabling the **Include Voicetracks** or **Include Carts** options.

If you only want your report to include audio files of specific categories, you can enable the **Only Include the Following Categories** option.  The audio file categories you have created within Simian are displayed in this list.  Place a check mark next to each category you want to include in your report and remove the checks next to the categories you don't want.

You can save the template you've created with a new name by typing a file name into the text field below the **Save Template As…** button, then clicking on that button.  You can also save your template settings over top of a previously saved template by highlighting a template name in the list to the left and clicking on the **Save Template As…** button.  If you want to load a previously saved template, you can highlight the template name in the list at the left and click on the **Load Template…** button.  You can also delete previously created template files by highlighting the desired template name and clicking on the **Delete Template…** button.

Once you have satisfactorily set up your report template, you are ready to generate a report.  First, you need to set an output filename and path by clicking on the **…** button to the right of the **Affidavit Report Save Path** field at the top of the window.  You will be presented with a save dialog box where you can select your desired folder and give your output file a file name.  Next, you will need to select at least one Event Log from the **Select Event Logs To Include In Report** list.  You can click and drag on the list, or Ctrl+Click or Shift+Click to manually select multiple event logs.  Once you are ready to run your report, click on the **Generate Report** button.  The event log analysis and report generating process can be a pretty heafty one depending on how many event logs you've included in your report, so this process can potentially take a while.  The progress bar at the bottom of the window displays the progress and will display what step of the process it is in.  Should you desire to cancel the process while it is running, click on the **Cancel Report** button and the analysis and generation process will be canceled.

# Using the Event Builder



Figure 4.30

The Event Builder is the main tool used in manual Program Log production work in Simian. It is your best tool for manually building Events, editing Program Logs and all other list items such as carts, HotKey Sets and Trigger Sets. It can also provide access to the Info Editor where you can view, add and edit the label information for carts and WAV files.

You can open the Event Builder in one of three ways:

- Select Tools/Event Builder.

- Press Ctrl+B.

Click the Event Builder button at the bottom of the Program Log. Events in the Program Log can be edited or created using the Event Builder. On opening the Event Builder, you will see the Audio tab, which shows you a list of files available in your Audio Database. To add an Audio Event, just click on an item in the list, set the Event Variables and drag from the **Drag From Here** spot into the Program Log. You'll notice that on different tabs you'll have the ability to change different Event Variables. One example is on the Macro tab, where you can edit the text string that will go into the Description Event Variable. Which Event Variables are available for editing depends on the type of Event that you are building.

The bottom section of all of the tabs on the Event Builder are the same. It includes the following Event Variables:

## Cue

The Cue variable corresponds directly the Cue column in the Program Log. It holds information on how an Event starts. For Instance, the "+" or "AutoStart" cue causes the item to play automatically as soon as Simian sequences down to it. Individual cues have many different uses. Let's take a look at each one individually:

**Manual Start (no symbol)** -- When the Program Log sequences down to a manual Event, it will load that Event into the next available deck and then stop.

**AutoStart (+)** -- When the Program Log sequences down to an AutoStart Event, the Event will load into the next available deck and start automatically.

**Time Immediate (@)** -- A Time Immediate Event will not wait for Simian to sequence down to it. If the Scheduled Time for a Time Immediate Event comes about before the Program Log reaches it, Simian will stop whatever it is doing and immediately jump down and start the Time Immediate Event.

If Simian sequences down to a Time Immediate Event before its Scheduled Time, then Simian's behavior is dependent upon an option on the General tab of the Simian Program Options window. That option is called "AutoStep through time events".

If AutoStep through timed events is on, and Simian sequences down to a Time Immediate Event prior to its Scheduled Time, Simian will step through the Time Immediate Event as if it had an AutoStart cue .

If AutoStep through timed events is off and Simian sequences down to a Time Immediate Event prior to its Scheduled Time, Simian will load the Time Immediate Event, but then wait to start the Event until the scheduled time occurs.

When you choose to make an event a Timed Event by assigning the Time Immediate, Time Next or Non Sequential cue, you must configure the Scheduled Time Event Variable in the Event Builder.

**Time Next (#)** -- A Time Next Event will not wait for Simian to sequence down to it. If the Scheduled Time for a Time Next Event comes about before the Program Log reaches it, Simian will finish the currently playing event, then jump down and start the Time Next Event.

If Simian sequences down to a Time Next event before its Scheduled Time, then Simian's behavior is dependent upon an option on the General tab of the Simian Program Options window. That option is called "AutoStep through time events".

If AutoStep through timed events is on and Simian sequences down to a Time Next Event prior to its Scheduled Time, then Simian will step through the Time Next Event as if it had an AutoStart cue.

If AutoStep through timed Events is off, and Simian sequences down to a Time Next Event prior to its Scheduled Time, Simian will load the Time Next Event, but then wait to start the Event until the scheduled time occurs.

When you choose to make an event a Timed Event by assigning the Time Immediate, Time Next or Non Sequential cue, you must configure the Scheduled Time Event Variable in the Event Builder.

**Back Fill (!)** – The Back Fill cue will cause Simian to change the pitch of the Events leading up to it in order to make sure that the Back Fill Event plays at its scheduled time. Check out Chapter 4 for more information on Back Time.

**Non-Sequential (N)** -- Non-Sequential Events are usually non-audio Events you want to initiate at a certain time, but aren't related to the current Program Log. They are typically added *after* the last Event in the log. For example, a File Backup Event or a Satellite feed that you want to record and play later might be used as a non-sequential timed Event. Non-Sequential Timed Events will occur at the time set by the Scheduled Time Event Variable. Non-Sequential Events play in the Asynchronous Deck.



> Non-sequential Events are for the most part obsolete due to the fact that Simian has gained a new function called Scheduled Events (Under the Async menu). Non-sequential events have been retained to protect backward compatibility. They may be removed from future versions of Simian, so it is a good idea not to use this cue type in new logs.

## Category

The Category drop-down list allows you to assign a category to your Event. Categories are fully explained in Chapter 3.

## Scheduled Time

Scheduled Time is normally used to assign a time for a Time Event to play. You can, however, assign a Scheduled Time to any Event.

_____

## The Audio Tab
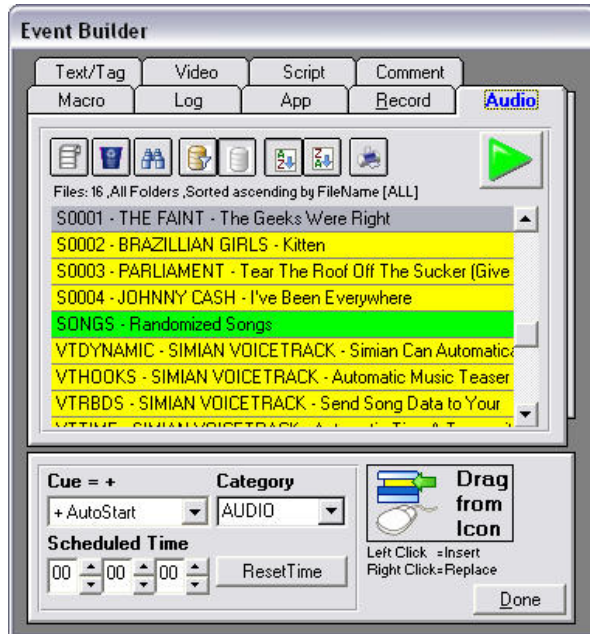


Figure 4.31

The Audio tab of the Event Builder is basically a way for you to sort, filter, and select audio files and carts so that you can create Audio Events and move them into the Program Log, a cart, or any other list that you'd like. This is also the best place to create carts.

**Audio Tab Toolbar**



Figure 4.32

Let's look at each button on the Audio Tab Toolbar, one at a time:

**New Cart** – creates a new cart that you can then configure. Carts are a kind of "mini log" that you can run inside of the main Program Log. They are designed to emulate the old-fashioned tape carts used in Radio for years. With their ability to add macros, they become a very powerful tool. Check out the section on Carts in chapter 4.

**Delete Selected Items** – Permanently deletes any items that you have selected in your Audio List from the hard drive.

**Search** – Allows you to search the items in the Audio List for a particular phrase.

**Filter** – This button opens the Filter audio list dialog box. Here you can look at a subset of the Audio List by filtering out items based on many different criteria.

**Remove Filter** – After you've filtered and want to see all of the Audio List again, press this button.

**Sort A to Z** – This will put the Audio List in alphabetical order from A to Z.

**Sort Z to A** – This will put the Audio List in reverse alphabetical order from Z to A.

 You can filter and then sort, or sort and then filter.

**Print Audio List** – Will print the current Audio List to any printing device that is properly installed in Windows. Printed lists will reflect sorting and filtering.

**Audition** – Press this button to play any selected file. The file will play through the audio device that is assigned to the Audition/Preview deck on the Playback tab of the Simian Options window. When an audition is playing, the button will change to a stop button.

_____

## The Audio List

The Audio List displays a list of audio files. Its contents will vary depending on how you sort and filter the list. You can double click on a cart or WAV file to open it up in the Info Editor window.  You can have multiple carts and WAV file view windows open at one time. If you right-click on a file in the Audio List, you can choose several options from the menu that appears, including:



Figure 4.33

**Edit info** - opens Info Editor so you can change the audio label

**Edit audio** - launches your audio editor

**Delete file** – Deletes the file from your hard drive

**Sort By** - lists files in ascending or descending order, by file name, title/description, category, start or end date, length, artist/advertiser, year, album or genre

**Folders** - Show all paths or just one specific folder

**Refresh** – Refreshes the selected folder or set of folders.

**Print current list** – Prints the current audio list to any available printing device

**Show Details** – displays full WAV file label in file window

**Change list font** – Allows you to change the font in the Audio List


## The Record Tab
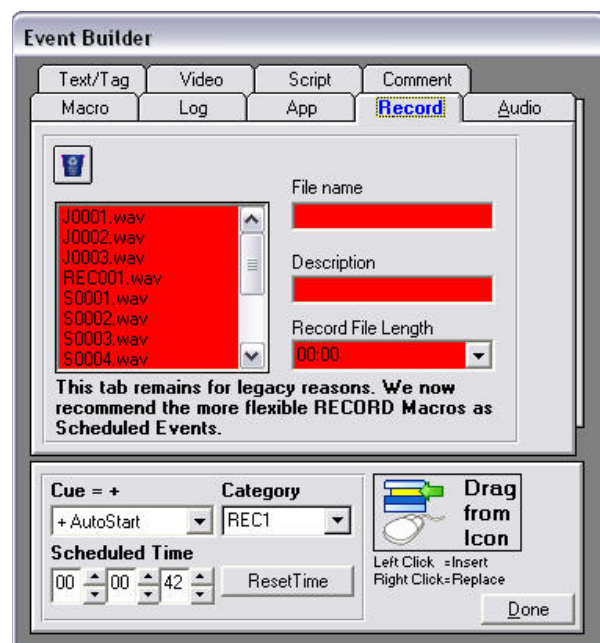


Figure 4.34

The Record Tab is designed to help you create Record Events. This gives you the freedom to schedule your recordings, start your recordings based on triggers, or start and stop them using any of the other features of Simian.

On the top-left, you'll see a list of the items that are stored under the folder that you have designated as Record Deck #1 default record in the Other Paths drop-down list on the Paths tab under Tools/Program Options.

You can delete files from the list (and permanently from the hard drive) by selecting them and using the button with the black x.

To the right, you'll see text boxes where you can manually fill a **File Name** and **Description** for the audio file that your Record Event will create.

The **Record File Length** drop-down list will allow you to select a length for your Record Event.

Here are some considerations when dealing with Record Events:

Remember that in order to play back files later; you'll want to make sure that that deck is recording into a folder which is indexed by SoundHound, and therefore available to Simian. You can set the destination folders for your record decks under **Tools/Program Options/Paths**.

Remember that you are choosing one of the *two* record decks to handle your record Event. Make sure that the record deck that you choose is set up correctly on the Paths tab in the Simian Program Options window.

_____

You'll need to manually set the record input volume level on your audio card.  If the record volume is set to zero, Simian will record only silence.  You'll want to open your audio card's mixer to set the record input level. If you need help, give your audio card manufacturer a call.

Remember to set the Record Length by selecting one of the preset times in the "Record File Length" pull down list or type in a length in the 00:00 format (minutes: seconds).

Make sure that you set the Cue.  The default Cue is Manual.  You can also select Auto Start or one of the time modes, which will require you to enter a specific time.

## The App Tab
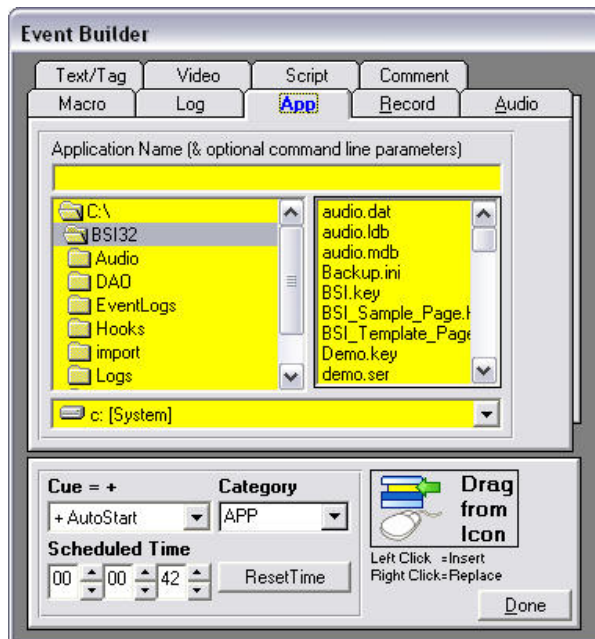


Figure 4.35

The Applications (App) tab allows you to start any executable file available to your computer as an Application Event. What this means is that if you wanted to, you could launch Microsoft Word as an Event in Simian. This function is really powerful because you can use it to run all different kinds of applications and batch files by setting them up as Events in Simian.

Simply select the executable file from the list, set the other Event Variables, and drag your new Application Event into your Program Log.

## The Log Tab
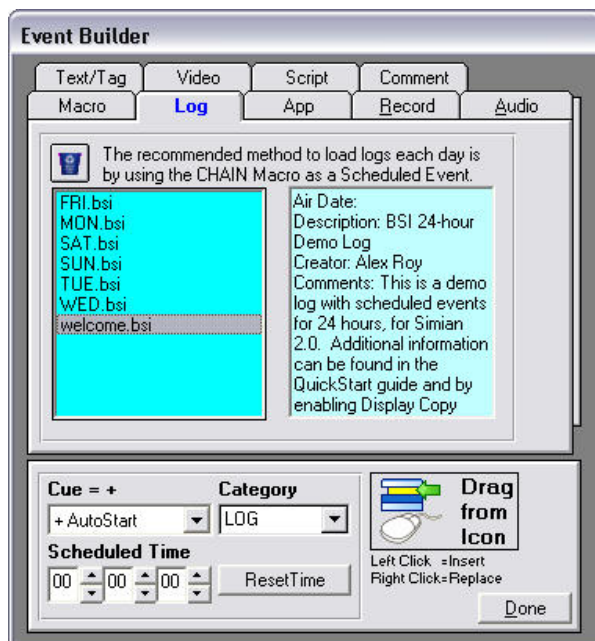


Figure 4.36

Log Events allow you to load another Program Log as an Event. This means that at any point in your Program Log, you can have Simian start another Program Log automatically. We call this "Chaining" logs.  Just select the Program Log that you want, set up the Event's variables, and drag it into the currently loaded Event Log. Remember that for Program Logs to show up in the list on the Log tab, the Program Log files must be in the folder that you designate for Program Logs on the Paths tab of the Simian Program Options window. There's also a big black X button that allows you to delete any selected logs from the list, which deletes them permanently from the hard drive.

You may also want to check out the CHAIN macro. It can help you better integrate your scheduling software with Simian's Program Log chaining functionality. See the Available Macros section of chapter 6 for more information.

## The Macro Tab
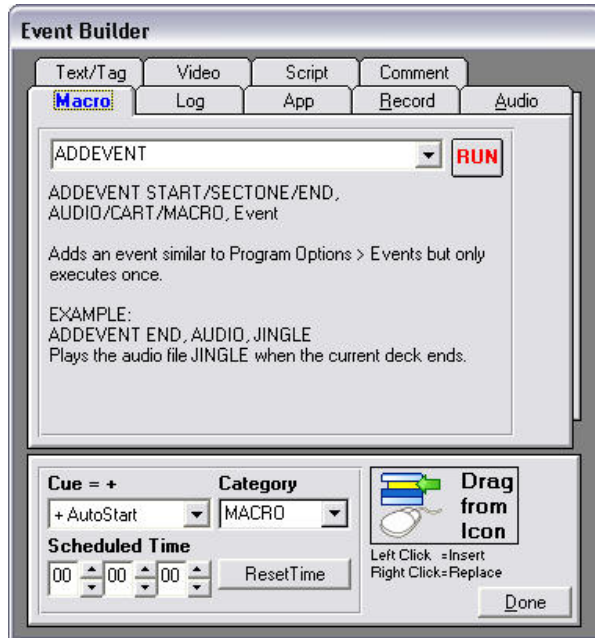


Figure 4.37

Simian has a number of macros available that allow you to automate all sorts of things such as control of peripherals via the serial port, fade decks, start & stop decks, etc. You'll want to check out all of the different macros, and their descriptions, which are available a little later in this very chapter. For now, just know that if you want to manually insert Macro Events in your log, you'll do it from the Macro tab in the Event Builder. Simply set up the Event Variables, including the text string, and then drag your Macro Event into your Program Log just like any other Event.

Unfortunately for you computer geeks out there, you cannot create macros in Simian using VBA or the like. You can however, create any application that you want and run it as an APP Event (see **The App Tab** section on the previous page). You'll find a visual reference for all of the available macros in the Appendix.

## Text/Tag Tab
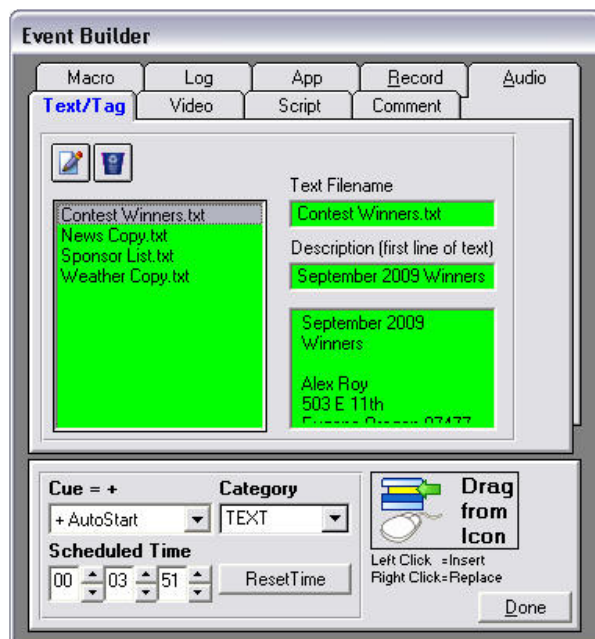


Figure 4.38

Text Events are useful because you can put text in front of your DJ any time you want. Just create a text file using Notepad or the like, then put it in the folder that you designate for text files on the Paths tab of the Simian Program Options window. Once your text files are in that folder, they'll show up in the list on the Text/Tag tab of the Event Builder. All you need to do at that point is select the file, add a Description if you'd like, set up your other Event Variables and drag in your Text Event.

## Video Tab
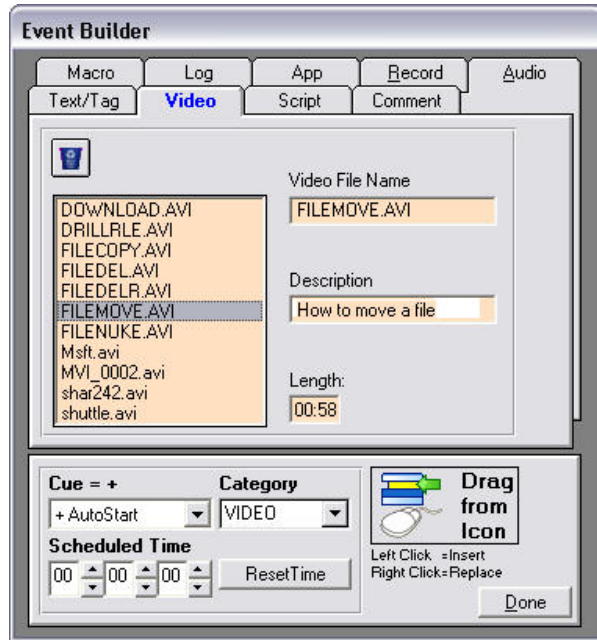


Figure 4.39

You can set a video as an Event and it will show on the screen on the on-air computer. Just put the video file in the folder that you designate for video files on the Paths tab of the Simian Options window. Once the video is in that folder, it will show up in the list on the Video tab of the Event Builder. Once that's done, all that you have to do is select it, set your Event Variables, and drag your new Video Event into your Program Log.

## Script Tab
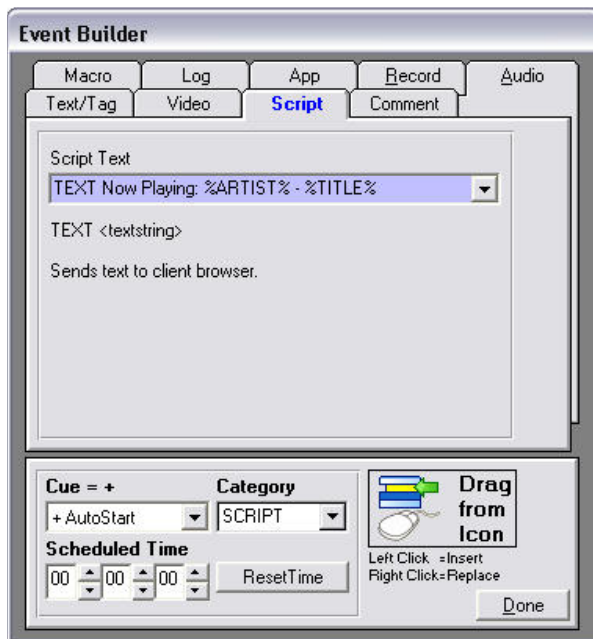


Figure 4.40

If you're using Simian for Internet broadcasting using the Microsoft Media Services encoder, then this tab's for you. First, go to the Internet tab of the Simian Program Options window, enable MSMS functionality, and designate your .WME file. Once that is done, you can send any one of the scripts available on the Script tab to the encoder. Just select your script, set your Event Variables, and drag in your Script Event.

## Comment Tab



Figure 4.41

If you want to put an Event in your Program Log that does absolutely nothing more than exist as an Event in the Program log, then the Comment Event is the Event that you're looking for.

You can assign any cue to a comment Event and it will do nothing when it is started. This is a good way to put "information only" lines in your Program Log.

Comment Events are also a good way to keep yourself time-aligned. Just set a Comment Event as a Timed Event (Time Immediate or Time Next) and Simian will jump to that Comment Event (which does nothing) at the scheduled time.

You can also keep your comments in the drop-down list for later use by clicking the Memorize comment button. The Delete from memory button allows you to clear entries from the dropdown list.

_____

# Using the Info Editor

The BSI Info Editor is actually a separate application that is installed with Simian. This allows you to launch the Info Editor from within BSI applications and from within Windows right-click menu:

- Right-click any file in any List Item in most BSI products, then select Edit Info.

- Right-click any audio file in any folder in Windows, then select Edit Info.

The Info Editor allows you to add internal tagging information to your audio files. This allows you to keep all of the information about an audio file directly within the file. That's right, the information that you enter here is embedded in the header of the actual audio file. Just about anywhere you port the file, you'll be able to use the information that you add to the file.

The Info Editor has five tabs to allow you to enter a multitude of data.  Let's look at them individually:

## The Description/Tones Tab
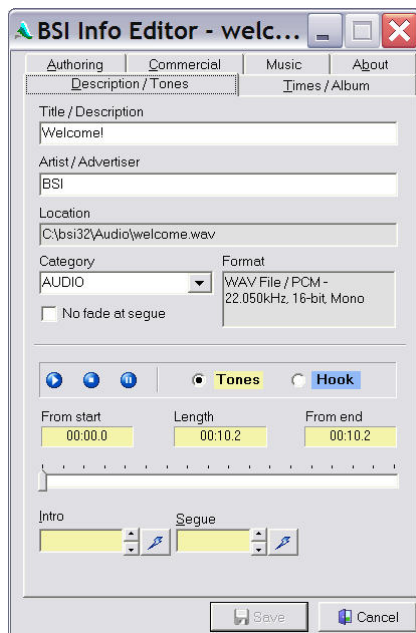


Figure 4.42

**Title/Description** – Here you can enter the name of your audio file.

**Artist/Advertiser** – Here you can enter the name for the creator of the file.

**Location** – Shows you where the file is stored on your hard drive.

**Category** – You can assign a category to a file so that it will always display the correct category in the Audio List and Event Builder.

**Format** – allows you to view the file attributes of your file.

**No fade at segue** – This option will assure that the file will never fade out at the end no matter what settings are configured in Simian. Great for spots.

**Play/Stop/Pause** – These buttons allow you to preview your file right inside of the Info Editor. This makes setting Tones much easier.

**Tones/Hook** – When you set Tones, you can set both regular Intro and Secondary Tones. You can also set Hook Tones for use with Simian's Hook Cart functionality.

**From Start** – Allows you to see how far the slider is from the beginning of the file during playback.

**Length** – Shows you the length of the file.

**From End** – Allows you to see how far the slider is from the end of the file during playback.

**Slider** – the Slider control allows you to scrub through the song during playback. Secondly, you can see the Tones or Hook within the Slider. Just look for white space on both ends of the blue bar under the Slider. The white at the beginning is your Intro and the white at the end is your Segue.

**Intro** – Visible when **Tones** is selected – This button allows you to set the Intro Tone for the audio file, while the time window allows you to see exactly where the tone is set.

**Segue** – Visible when **Tones** is selected – This button allows you to set the Secondary Tone for the audio file, while the time window allows you to see exactly where the Secondary Tone is set.

**Hook Start** – Visible when Hook is selected – Here you can set the start for the "hook" for the audio file.

**Hook End** – Visible when **Tones** is selected – Here you can set the end for the audio file's "hook".

## The Times/Album Tab



Figure 4.43

**Start Date/End Date** – If you designate a start and end date for your files, Simian can use its AutoReplace feature to replace them if they are out of date.

**Album** – Type in the album name here.

**Year** – Holds the year info for the file.

**Genre** – Holds the genre info for the file.

**Track#** – Holds the track info for the file.


## The Authoring Tab



Figure 4.44

**Producer** – Holds the producer info for the file.

**Talent** – Holds the talent info for the file.

**Composer** – Holds the composer info for the file.

**Publisher** – Holds the publisher info for the file.

**Copyright** – Holds the copyright info for the file.

**Comments** – Holds any comment information that you would like to include in the file.

_____

## The Commercial Tab


Figure 4.45

**OutCue** – Holds the OutCue info for the file.

**Agency** – Holds the agency info for the file.

**Account Executive/Sales Person** – Holds account exec and sales person info.

**Copy** – Holds information that you'd like to add to the file. This tag can be displayed in a text box within Simian any time the file is played. Just select Tools/Program Options/General and put a check in the Display Copy Field option.

**URL** – You can associate a URL with each file and then send that URL to the Dynamic HTML Page, or the MS Encoder.

## The Music Tab


Figure 4.46

**Key** – Holds the key in which the cut was performed.

**End** – Holds information on how the cut ends.

**Energy** – Another common descriptor for audio cuts.

**Texture** – Helps you sort your cuts by audience.

**Tempo** – Holds the tempo in which the cut was performed.

**Beats Per Minute** – Holds the BPM info for the file.

### The About Tab


Figure 4.47

The About tab gives you the version of the Info Editor that you're using, as well as a link to our website and some information on the versions of supporting .dll files.

The really important thing on this tab is the **Output device for audition**. This device allows you to select which audio device you'd like to use for playback while you're tagging files.

If you'd like you can force your computer to use the Windows CODEC instead of any on-soundcard CODECs that you may have. Just click Force use of ACM CODEC.

You'll also find a link to our website here.

# Using Carts

Carts are kind of like mini-Program Logs. They're a list of Events that are sequenced through based on their Cue. The difference here is that Simian will not stop when it sequences to a Manual Event in a Cart. Instead, it will move on to the next item in the Program Log. The other big difference between Carts and Program Logs is that Carts mark Events when they've been played. This means that if you put three Manual Events in a Cart, the Cart will play a different one, in order, every time that the Cart is played in the Program Log. If you use AutoStart Events in a Cart, they will sequence within the Cart. Therefore, you can create alternating groups of Manual and AutoStart Events to play a different group of Events every time the Cart rolls around in the Program Log.
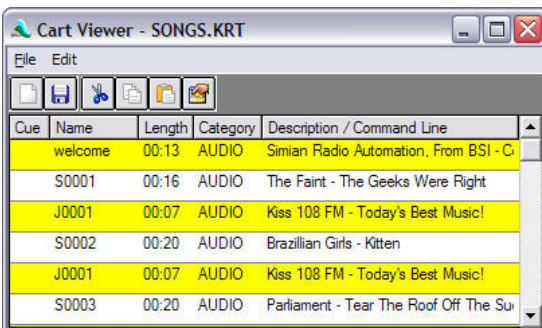

Figure 4.48

This Cart will play Welcome the first time the Cart is played, J0001 the second time the Cart is played, S0002 the third time, and so on.

Figure 4.49

This Cart will play all of the Events every time it is played.
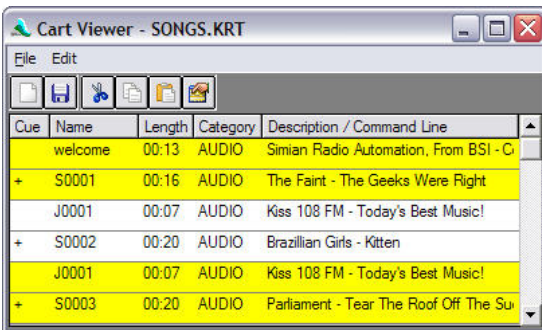

Figure 4.50

This Cart will play two Events each time it is played.

You can also randomize Carts. If you randomize a Cart, Simian will randomly pick an Event from the Cart, play it, and then mark it as "played". Simian will repeat this process each time the Cart is played until all of the Events within the Cart have been played. Simian will then clear all of the "played" flags in the Cart and start over the next time the Cart Event is played. It is important to remember that there is a chance that the last Event to be played in a cart could be picked randomly to be the first Event played after the "played" flags have been cleared, and therefore play twice in two consecutive instances of the Cart Event. The best way to avoid this is to put many Events in your Cart and/or put Cart Events within Cart Events.

That's right you can "nest" Carts. Let's say that you have a set of clients… A burger joint, a car dealership, and a hotel. Each of the clients has three spots that they want to play, in rotation, during the top of the hour break. In this situation you could create three Carts with the spots for each client in each Cart, then add all three of those Carts to another Cart. Now you only need to add the one "top of the hour clients" Cart to your Program Log. You could also use Cueing and Randomization in any of those Carts to ensure that you end up with just the kind of spot rotation that you want.

You can put almost any kind of Event in a Cart. Macros and Audio Events can often be mixed together in a Cart to create a special tool. Check out the **Carts As Tools** section a little later in this chapter for more info.


## Creating and Editing Carts

To build a new cart:
1. Click Tools/Event Builder.
2. Click the New Cart icon ⬚. This will open the Cart Viewer window.
3. In the Event Builder, select your event, set up your Event Variables and drag and drop your Event from the Drag From Here spot into the Cart Viewer window.
4. Set up the Cue information for your Events. Make sure that the first Event in a Cart is never Cued with the AutoStep Cue. This could cause an endless loop.
5. Click File/Save As and give the cart a name.
6. Close the cart.

_____

### Editing Audio Events in Carts
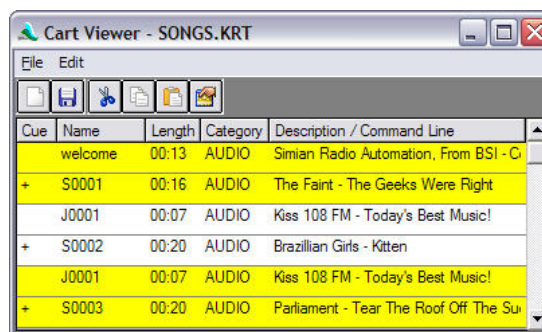
If you want to edit the Tagging Info for an audio file from within a Cart, simply right-click the Event in the Cart and select Event Builder. The Event Builder will pop up with the Audio Event file already highlighted. You can then double-click it to edit it right there.

### Cart Properties

You can open the Cart Properties dialog box by Selecting File/Properties in the Cart Viewer window. Here you can add Title/Description, Artist/Advertiser, OutCue, Producer, Comment, Agency, Account/Sales, and Talent information as well as set a Category, average length, and start/end dates. You can also select the Randomize option here. Average Length and Start/End dates are used with the AutoReplace feature so that you can replace an out of date Cart with another item of a similar length.

## Carts as Tools

Carts can have a large number of audio Events inside. The Events can be auto-sequenced (given the AutoStart cue, which means they are played automatically). You can have multiple sets of auto-sequenced Events in a single cart. This is useful if you have a situation where you need to group a single Event with many other events. For example, if you have a news feature that you play several times a day, and it has several sponsors, you can have the news feature Event in the cart multiple times, each time sandwiched between different sponsors' commercial Events. A cart with that setup might look like the figure above-right.



Figure 4.51

As you can see, the 90 second Paul Harvey Event is listed three times, with different commercial Events following each time. The plus signs next to the commercial Events mean the same thing as they do on the main Simian program log. That Event will be played automatically after the previous Event.

Therefore, each time the Paul Harvey Event plays, it will be followed by a different commercial Event. The first time the cart is played, you will hear the 90updat.wav and the renegade.wav. The second time the cart is played, you will hear the 90updat.wav and the wct001.wav. The third time, you will hear the 90updat.wav and the rotation.wav. The fourth time, it will return to the top and play the first pair of files.

If you want a particular cut to be the "next" one played when the cart is called up in Simian, check the "Make Next" selection in the Edit menu of the Cart Viewer window or double click on the Event, which will then turn gray.

## SmartCarts

Smart Carts allow you to exercise some very limited scheduling control without the use of scheduling software. That said, it's important for us to state that Smart Carts are not designed replace your scheduling software. This feature simply allows you to control the days and times when Events within Carts will be allowed to play. This is done by using Simian's AutoReplace feature together with the Start/End date tags which are embedded in audio files by the BSI Info Editor. All of that said, let's take a look at how Smart Carts work.

**PLEASE NOTE THAT SMART CARTS DO NOT SUPPORT THE USE OF THE AUTOSTART CUE MARKER AS THIS COULD CAUSE A CART WITH NO VALID OPTIONAL AUDIO EVENT TO LOOP CONTINUSLY.**

_____

**Turning On Smart Carts**

For Smart Carts to work the first thing that you need to do is turn on Simian's AutoReplacement feature. Just follow these steps:

1. Go to the General tab under Tools | Program Options and put an "x" in the box next to Engage AutoReplacement.

2. Click the Settings button next to the words "Engage AutoReplacement"

3. Put an "x" in the box next to "Replace Out-Of-Date Items"

4. Click Done in the AutoReplacement dialog box and in the Program Options window

5. If you add Events to the fields in the Auto Replacement dialog box, those Events will be used to replace Smart Carts that have no valid Events.

**Using Smart Carts**

To limit the airplay of an Audio Event, simply open that Audio Event in the BSI Info Editor (right-click and select Edit Info), switch to the Times/Album tab and fill out the start and end dates and/or times (or the Time Window). There are four ways to fill out these fields:

1. Filling out only the Start & End dates will only allow the Audio Event to play on the days in the range specified. Do this to have the Audio Event play only on the 13th-17th of the month.

2. Filling out only the Time Window fields will allow an Audio Event to play between the two times regardless of the date. Do this if you want the Audio Event to play only between 17:00 and 03:00 with no date limit.

3. Filling out the Start & End dates and the Start & End times will allow the Audio Event to play only from a certain time on a certain date to another time on a different date. Do this when you want the Audio Event to play between 17:00 on the 13th and 08:00 on the 17th.

4. Filling out the Start & End dates and the Time Window will allow the Audio Event to play between the Time Window times only on the dates between the Start & End dates. Do this if you want the Audio Event to play between 9:00 am and 5:00 pm from the 12th to the 18th.

If you'd like more information on Smart Carts, check out our Support Website. Just go to support.bsiusa.com and visit or Knowledge Base.

# Using Macros

Macro Events are among the most powerful features of Simian.  With Macros, you can control many advanced functions such as—among others—adjusting the auxiliary and primary volume settings of your system, creating programmed fades, commanding a record deck, FTP'ing files, and setting your system time.

Simian Macros are more like meta commands than what other products call Macros (such as in Microsoft products).  The Simian Macro functionality cannot be used to record keystrokes or be assigned to scripts. Macros can be fired from the Program Log, a Cart, a Trigger command, Scheduled Events or a HotKey.

To use a Macro:

Think about what you want to do and then identify the macro that fits your need.  You can view all available macros in Chapter 6 of this manual or on the Macro tab of the Event Builder. Most macros have required parameters that must also be entered following the command name.

Locate the place in your Program Log, Trigger Set, Cart, or other Set where you would like to insert the Macro.

Open the Event Builder window, select the Macro tab and choose the Macro you want from the pull down option list.

Enter the appropriate parameters according to the example given in the text below the command.

To move the Macro Event into place, simply set the Event Variables and drag your completed Macro Event into your Program Log (or other List Item) from the "Drag from here" spot.

> The structure of some Macro commands can be quite complex.  Take your time creating them and double-check your work.  If you use the same Macro over and over, it may be a good idea to store it in the Memorized Events List.  This will allow you to copy or drag and drop it into the Program Log without having to retype it every time.

## Definitions & Parameters

Macro names are shown in all caps.  Some Macros are simply one-word commands, such as SPACEBAR, which simulates pressing the spacebar.  Others need further instructions from you to run properly. These instructions are called parameters and are described in the examples after each macro.

Some parameters are required and some are optional.  The format and order of the parameters is very important and should be entered after the macro name and separated by commas without spaces. Required parameters are enclosed in angle brackets < >.  Optional parameters are enclosed in curly brackets { }.  Some parameters have only a few possible values. These choices, such as "1", "2", "3" or "ALL" for possible Deck Numbers are shown in parentheses and are separated by a forward slash /.

For a full list of Simian's macros and their usage with syntax, refer to the **Macros** section of the **Appendix**.

# Using HotKeys

HotKeys are the 16 buttons located on the HotKey Panel at the bottom of the main Simian window. You can view HotKeys by clicking the HotKeys button at the bottom-right corner of the main window.



Figure 4.52

Simply put, you click a HotKey, or push its corresponding F-key and the Event that is loaded in that Hotkey plays through your async deck (the F-keys work even when the HotKeys panel is not visible). You can add Events to HotKeys by dragging them from the Event Builder or Audio List directly onto the HotKey where you want them. Once you've added your Events to your HotKeys, you'll probably want to save the set so that you can use it later. This is done from the right-click menu. Just right-click on a HotKey to clear that key, save the set, open the HotKey set editor, or change the current HotKey set. You can also scroll through the available HotKey sets by using the two buttons at the bottom-left hand corner of your screen. Finally, you can view the HotKeys panel and/or open the HotKey editor from the Async menu. The HotKey editor can be used to add or edit HotKey sets just like any other Simian list item. You can also set the current and startup HotKey set from the HotKey editor.

# Using Mixers

**Control between one and four faders** – in the Mixer Setup dialog box, you can assign up to four individual faders to the same Simian mixer. Check out Chapter 3 for information on how to set up your Mixers.

**Controlling the mixers** – You can control the individual mixers manually by sliding the sliders in the Record Decks/Mixers panel, or you can use the MIXFADE or MIXVOLUME macros to automate the process.

When you view the mixers, Simian constantly has to watch to see if the levels move and then update the positions of the sliders. This eats up more than its fair share of system resources, so we usually recommend that you leave this panel hidden unless you're actually using the controls.

_____

# Recording

Make sure that you have read and understand the Audio File Formats section of Chapter 2 before beginning recording projects for on-air use.

## Using Record Decks

The recording function in Simian is designed for use with long-form files, such as network programs. Simian will record these programs in the background while you are using other functions including audio playback. However, if your system is not equipped with a multi-sample-rate pro audio card (such as the AudioScience 6000 series audio cards), only one play/record sample rate can be used at a time. This means all your playback audio must be at the same sample rate (also keep in mind that a stereo file is twice the sample rate of a mono file) and format, or the recording must not be completed before can play back files.

Most commercial production and song recording is done with a separate audio editing application such as Adobe Audition or Syntrillium's Cool Edit applications. The recording function (via the Record Decks) within Simian is designed for recording only and not for production.

If you are using Simian to record a long-form program, follow these steps:

Make sure the record decks are visible by clicking the Record button at the bottom-left of the main Simian Window.

Make sure your audio system devices are properly set in the Tools/Program Options/Record tab.

Check the record path. You can configure Simian's record decks to automatically record to any folder that you want by modifying the record deck paths on the Paths tab in the Simian Program Options window. Make sure that you are creating the file in a location where you can find it later.

If the default record path is not set to one of the folders indexed by SoundHound, Simian will be unable to locate the files when it needs to play them back.

Set the record input volume on your audio card.  If the record volume is not set properly, Simian will record only silence.  This is not a Simian function; it is a function of your audio card and its mixer.  Consult your audio card's manual for instructions on how to set up the record input volume for your audio card.

Click the Record As (Save) button on the deck you want to use.

Enter a file name and click Save.

Click Record to begin.

Click Stop when you are finished.

Click Play to preview your recording.

You can abandon recording by clicking the Stop button (blue square) or by pressing the Esc (Escape) key.

The Record Tab in the Simian Options window also lets you choose the default audio file-sampling rate, number of channels (stereo or mono), and sample size. Always use your standard file format and sample rate when recording. Don't have a standard file format? Check out the Choosing Audio File Formats section of Chapter 2.

## Recording (Automated)

Recording can be done manually via the Record Decks (as described in a previous section) or automatically via a Record Event or the RECORD Macro.   In either case, you'll want to schedule your recordings by using Simian's Scheduled Events feature. This will keep your recordings from interfering with your Program Log.

Make sure that your record decks are configured properly. Verify settings on the Record tab of the Simian Hardware Options window and verify that the record decks are configured to record into the proper folder. This can be done on the Paths tab of the Simian Program Options window. You must select a folder which is indexed by SoundHound if you want to play back files in Simian.

- Verify that the mixer for your sound card is properly configured. If the line-in volume is set to 0 in your sound card's mixer, Simian will end up recording silence.
- Open the Event Builder and configure a Record Event or the RECORD Macro Event.
- Select Show Scheduled Events from the Async menu in the main Simian window.
- Set the Event Variables and/or Macro parameters in the Event Builder and drag your Record Event or RECORD Macro Event into the Scheduled Events Window.
- Set the Event Schedule and the Event Time in the Scheduled Events window, then make sure that the correct Event Schedule is loaded at the time that you want the recording to happen.

## Time-Shift Recording

One of Simian's most powerful features is time-shift recording.  This means that a file can actually be played *while it is still being recorded*.

Time-shift recording allows you to start recording a network program via satellite, for example, and begin playing it back on schedule even if the file is still open and recording at the "other end".  Previously, you would have had to wait for the entire recording process to finish, close the file, and then reopen it and play it back.  This would often disrupt schedules unnecessarily.  Time-shift recording gives you the freedom to schedule your clock as you'd like. This is just another way for Simian to make your life easier.

# Using The VoiceTrack Editor

To open the VoiceTrack Panel, click the VoiceTrack button at the lower-right corner of the main Simian window.
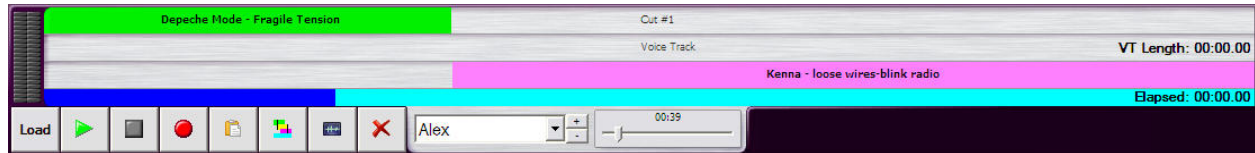


Figure 4.53

Let's look at each piece of the Voice Track Editor individually:

## Tracks
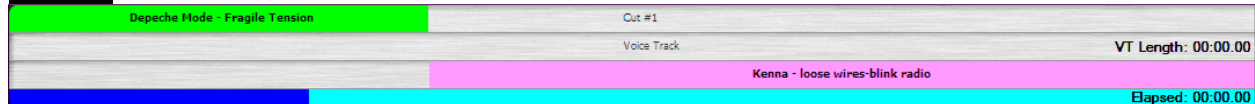


Figure 4.54

At the top of the Voice Track Editor, you'll see three "Tracks". These three tracks are designated as Cut1, VoiceTrack, and Cut2. Cut1 and Cut2 can only play back files. The VoiceTrack track can record and play back audio files.

The intent behind the VoiceTrack Editor is for you to put two consecutive audio events from the Program Log in the Cut1 and Cut2 Tracks, then record your voice on the VoiceTrack Track. Once your voice is recorded, you can slide the three tracks over and under each other (*if you have appropriate audio hardware*) and line up the cross-over points of the audio files just as you'd like. You can then paste that recording of your voice into the Program Log and it will always line up correctly with the other two tracks without modifying the other two tracks in any way. This is done by adding special tones to the VoiceTrack file which is recorded in the VoiceTrack Track.

Below the three tracks you'll see a time line (the two segment line shown in blue in Figure 4.54). The dark blue portion of the line is the current playback position. While playing or recording, the dark blue portion of the time-line will progress from left to right, showing you what position playback is currently in for each audio file.

Directly to the right, you'll see a set of VU meters. Here you can see the level of your recording.

## Tool Bar



Figure 4.55

Below the three tracks and timeline are the Voice Track Editor's transport controls. The **Load** button allows you to quickly load Audio Events from the Program Log. Just select an Audio Event in the Program Log and click the **Load** button. Simian will automatically load that Audio Event and the one that follows it into the Cut1 and Cut2 tracks. Now you can simply start recording your VoiceTrack.

Next, you'll see standard play, stop, and record buttons. These control the Record and Playback functions of the Voice Track Editor.

To the right of the record controls are the Paste/Save/Save As button, the AutoSet button, the Edit Audio File button, and the Delete button. The Paste/Save/Save As button will change its function (and icon image) based on if you are creating a new Voice Track, or re-editing one that has already been pasted into the log. For a new Voice Track, it'll paste the file into the program log (Paste function) with a default file name, or if you hold down the SHIFT key while clicking it, it'll prompt you to enter a file name of your choosing for you to enter a custom file name, then it'll paste the Voice Track into the log. On the other hand, if you have re-loaded a previously saved voice track into the editor, the button will work as a Save button, saving your changes to the audio file, but not re-pasting a second copy into the program log.

_____

To the right of the buttons you'll see the Artist drop-down with its "+" and "-" buttons. Use the buttons to add names to the drop-down, then you can select the names and have them automatically added to the Voice Track File Tag.  The name chosen from this drop down will be used to tag the voice track with the talent that recorded the voice track and is displayed in the program log on the voice track line item's description.

Finally, all the way to the right, you'll see the Time scope slider and time window. This is kind of like a zoom control. You can increase the Time Scope to see and hear more of all three files (but sacrifice precision in the display) or decrease it to see and hear less in the Tracks (but get greater precision in placing the cross-over points).  It is best to keep the time scope as small as possible, while also allowing you enough time to comfortably record your voice track so that you have the most precision in setting your cross-over points, while still having enough time displayed to give you enough recording length.

When the Voice Track Editor Panel is active, the space bar and other keyboard shortcuts are controlled by the Voice Track Editor.  We do not recommend leaving the Voice Track Editor visible while you are on-air since it changes many familiar keyboard shortcuts while visible.  In other words, when you are not using the Voice Track Editor, it is good practice to switch to a different view, such as the Extend Log view.

## Quick Voice Tracking

Voice Tracking can be done quickly and easily using keyboard shortcuts.  The spacebar will not segue the main decks while the Voice Track Editor is open – it is "taken over" by the editor for its own purposes when you are recording Voice Tracks.

Highlight the first of two songs in your Program Log that need a Voice Track between them.

Press Q to QuickLoad the cuts from the Program Log into the editor.

Press R to start playback of the first cut.

Press R to start VoiceTrack record.

Press Spacebar to start the next cut (you can do this at any time).

Press R to stop VoiceTrack record.

Press R to end playback.

Press Spacebar to playback the whole sequence once you've recorded your voice track.

Press V to paste VoiceTrack to the program log.

You can also use the buttons.  The red circle is the record button. It is the main control for VoiceTrack recording.  Clicking this button performs four functions in order:

Starts playback of Cut #1.

Starts VoiceTrack record.

Stops VoiceTrack record.

Stops playback of Cut #1 & Cut #2.

**Don't forget to save the VoiceTrack to the program log when you are finished!

# Using Pitch Shift

Simian can now change the pitch of Audio Events as it plays them. This feature allows you to automatically change the pitch as well as manually change the pitch of a particular Event on the fly. You can also scale the length of your audio without altering the pitch if you have an AudioScience 6XXX series soundcard. Scaling works just like pitch shifting once the **Utilize Time Scaling (TSX)** feature is enabled.

## Automatic Pitch Shifting

Simian can automatically Pitch Shift Audio Events based on their Category. You set up these preferences on the FlexTime tab of the Simian Program Options window (under Tools/Program Options). Simply select **Enable Pitch Shifting** from the drop-down list. You will then be able to select each Audio type Category and set its individual Pitch Shift.

You'll notice that when you Pitch Shift an Audio Event, the Playback Decks will display the amount in their upper-left corners. The clocks will also change to reflect the new length of the Audio Event.

## Manual Pitch Shifting

To manually Pitch Shift a particular audio Event, simply right-click on the deck in which it is loaded, then select **Pitch Shift**, and then the percentage. Simian will automatically play that Audio Event at that speed. If the Event is already playing, then Simian will Pitch Shift from that point.

Just like automatic Pitch Shifting, manual Pitch Shifting will cause the Play Decks to display the amount of shift in their upper-left corners. The clocks will also change to reflect the new length of the Audio Event.
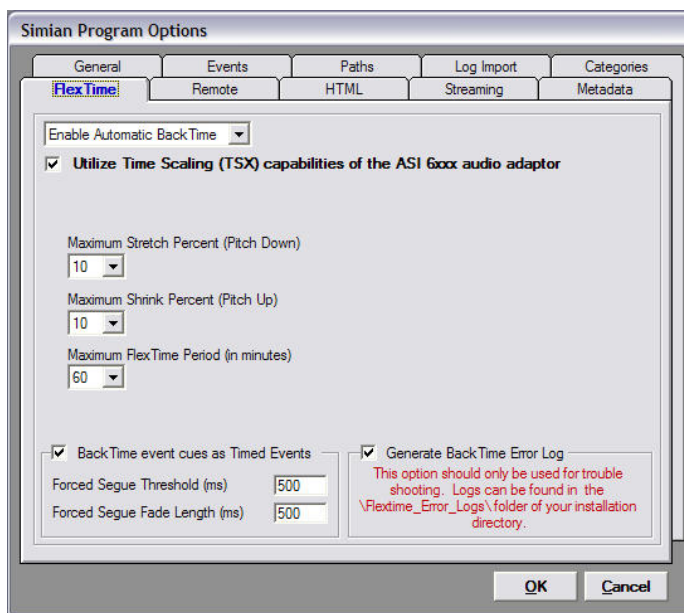


Figure 4.56
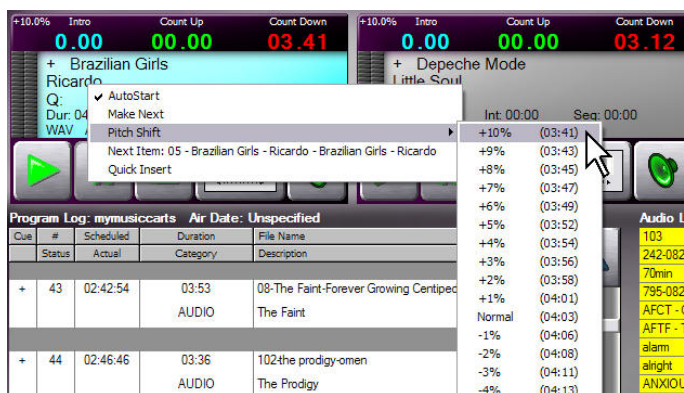


Figure 4.57

You can use automatic Pitch Shifting or Back Time, but not both at the same time.

# Using BackTime

BackTime allows you to time portions of your Program Log up to the minute. This is done by Pitch Shifting or scaling all of the songs before that time by the necessary amount to have the Back Timed Event start at a particular time. Scaling allows you to shrink or expand the length of audio files without altering their pitch. Scaling is only available with the AudioScience 6XXX series of sound cards. Simply create an Event with a Cue of "!" and set its scheduled time to the time that you want it to play. Simian will automatically Pitch the preceding Audio Events so that the "!" Event starts at the exact time that it is scheduled.

The FlexTime tab of the Simian Program Options dialog box allows you to set your configuration options for Back Time. Just bring up the tab and select Enable Automatic BackTime from the drop-down list. Here you'll find three settings:
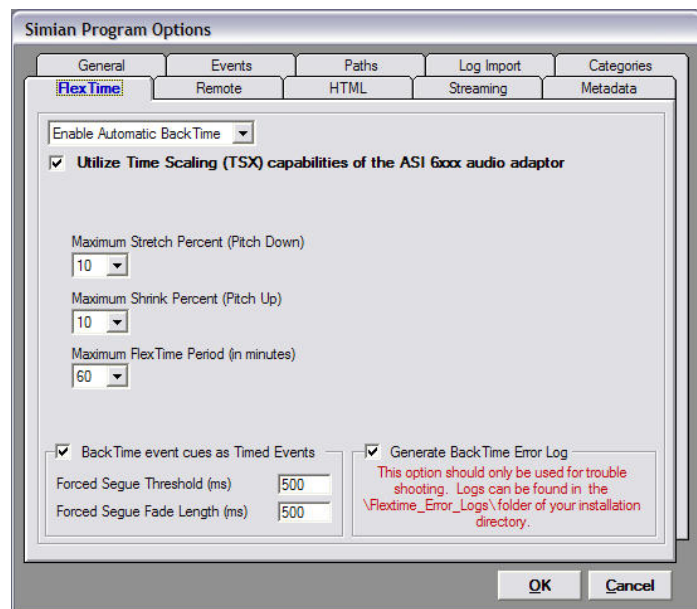
Figure 4.58

**Maximum Stretch (Pitch Down)** – This drop-down list allows you to select the maximum percentage that Simian will pitch shift negatively. This will allow you to keep your music from sounding like James Earl Jones.

**Maximum Stretch (Pitch Up)** – This drop-down list allows you to select the maximum percentage that Simian will pitch shift positively. This will allow you to keep your music from sounding like Alvin and the Chipmunks.

**Maximum FlexTime Period** – This drop-down list allows you to set the time window that Simian will use to pitch Audio Events to get to the Event with the "!" cue.

This may seem a little complicated at first, but it works like this; If you set both the maximum stretches to 4% and the maximum period to 60 minutes, Simian will start 60 minutes out from the scheduled time for the "!" cued Event and pitch shift as much as 4% either way to make sure that the "!" cued Event will start exactly at its scheduled time.

You can also display the length of file runtime (DR) remaining to the next BackTime (!) Cue, the actual computer clock time remaining until the next BackTime Cue (TTM), and Simian will even do the math for you so that you can see the difference! Just select "Display BackTime to Mark" from the Log menu.


# Using Memorized Events

Sometimes, you'll have a more involved Macro Event with many specific parameters, or a particular Audio Event that you want to add to the Program Log very often. To save time, we have Memorized Events Sets. Simply drag an Event into the Memorized Events window and you'll have your very own "quick list" for commonly used Events.

You can even have different sets for different people, or for whatever reason you'd like. Just use the Save As item under the File menu in the Memorized Events window. You'll then be able to open any Set that you'd like to use.

# Using Scheduled Events

Let's say that you want an Event that has little or nothing to do with the currently running Program Log to start at a particular time. A couple good examples might be a recording Event that creates an audio file that will not be played back until later, or maybe you want to send that Relay Macro Event to start the coffee at exactly 06:00. What's the best way to do this? With Scheduled Events, of course. All you have to do is go to Async | Show Scheduled Events, drag your Events into the Scheduled Events List, then give them a schedule and a time using the buttons on the toolbar. The time can use wild cards (the "#" character) to create Scheduled Event items that run every hour, every 10 minutes, every minute, or any combination of the three (you could schedule an event to run every minute during the 12:00:00 hour if you wanted).

You can even have different sets for different days, day parts, or people. Just use the Save As item under the File menu in the Scheduled Events window. You can then use the drop-down selectors to establish the current set and which set loads automatically when Simian starts.

You can also automatically change the Scheduled Events Set by using the LOADSCHEDULED Macro.

# Using Relays (GPO)

Relays are started in Simian using the RELAY Macro Event. To automate the Relay process, simply configure the RELAY Macro in the Event Builder and drag it into the Program Log, or any other list item such as HotKey or Scheduled Event Sets. To fire Relays manually, you can use the Relay Rack window under the Tools menu.

# Using Triggers (GPI)

Once you have your General Purpose Input (GPI) device set up and working, all you need to do is go to the Async menu and select Triggers, then Edit Sets. This will bring up the Triggers window. Here you can drag Events into lines that correspond to Triggers.

You can also save multiple Trigger Sets that can be changed automatically using the LOADTRIGGERS Macro. What this means is that you can start your day with Trigger Set "A" loaded and have Trigger #1 play a spot, then later in the day use the LOADTRIGGERS macro to change the Trigger set to set "B" and have Trigger #1 launch a RECORD macro.

You'll notice two drop-down lists at the bottom of the Triggers window. You can use these to define the current Trigger Set and define which Trigger Set launches automatically when Simian starts.

Remember that Triggers will not work if Triggers are OFF in Simian's Status bar. You can control the "Trigger state" of Simian with the Triggers On at Startup option on the General tab of the Simian Program Options window (on the Tools menu). You can also turn Triggers on and off using the TRIGGERS Macro or use Async/Triggers/Enabled to turn Triggers on and off. The most common way to turn Triggers on and off is by using the "Triggers are" item on the status bar. Just click it on or off.

You can also simulate incoming Triggers by using the TRIGGER Macro. The TRIGGER Macro will simulate whichever Trigger it is configured to fire.

If you need a log of the triggers received (for troubleshooting or other purposes), a trigger log can be generated. In the Hardware Options of Simian, on the Hardware tab, there is a check box for **Generate Incoming Trigger Log**. When this option is enabled a text log will be generated in the C:\BSI32\Trigger Logs\ folder with a file name of Trigger_Log_[DATE].txt (where [DATE] is the date the log was recorded).

# Using Serial Communications

You can set Simian to "listen" for text strings from the serial port or send text strings through the serial port. To do either, you'll need to configure the options on the Serial Comm tab of the Simian Options window (Tools/Hardware/Options). These settings are dependent on the peripheral device with which you are trying to communicate. You can get information on which settings are needed from the device's manufacturer.

To send text strings, use the SERIAL Macro. Just set it up according to the instructions on the Macro tab of the Event Builder. Once you have set up the macro's parameters, you can set the rest of the Event Variables and drag the Event into your Program Log. When the Event is started, the string will be sent to the serial port.

To receive strings, you'll need to set up a Serial Set. To do this, go to the Async menu and select Serials, then Edit Sets. You can then go to Edit/Insert Event. You'll be asked for the string that you'd like Simian to listen for. You will then get a line in the Serial Set so that you can drag in any Event. When Simian "hears" that string on the serial port, it will start the assigned Event.

Remember that you can save more than one Serial Set. Just go to File/Save As in the Serial window. This will allow you to have pre-made serial sets for different day parts. You can even use the drop-down selectors at the bottom of the Serial window to set the current serial set and which serial set loads when Simian starts up.

You can manually turn Serial Communications on and off under Async/Serials/Enabled and you can also set Serial Communications to start up automatically (or not) when Simian starts up. Just use the Serial ON at Startup option on the General tab of the Simian Program Options window. To quickly turn serial communications on and off, just click the "Serial port is" item on Simian's status bar.

# Using Automation Modes

## Full Automation

Content can come from your local hard drive or from an outside source such as a satellite receiver. Let's look at a couple examples…

### Audio on Hard Drive Automation

Audio on Hard Drive means your digital audio files are kept on your PC hard drive so that everything Simian plays is locally stored.  Simian reads the Program Log off the hard drive and automatically sequences through Events based on their Cue. Proof of performance logs can be generated for later review by turning on Event Logging. Event Logging is controlled by settings on the General tab of the Simian Program Options window. To open the Simian Program Options window, simply select Options, then Program Options on the Tools menu in the main Simian window.

### Satellite Automation

Simian can use a number of hardware peripherals to control satellite audio. With the proper hardware, Simian can accept Triggers from the satellite receiver and interact with the receiver (or other peripherals) via the serial port or contact closure, as well as directly control the internal mixers of most audio cards.

## Live-Assist

If you want to completely control the start of every event while live on the air, you can use Live Assist mode, which will load all of your decks automatically. Just press the space bar to play an Event, talk live, press the space bar to play an Event, talk, and so on. You can use Carts to have blocks of commercials play between Events in the Program Log. HotKeys are another function of Simian that are great for Live Assist use. Want to punch a short laugh track while you're talking? Just hit a HotKey.

## Automation OFF

With Automation OFF (or in MANUAL mode – the two are the same), Simian will do nothing for you automatically. You will have to load the decks and start them manually if you want to play Events.

# Using Dynamic HTML Pages

To post your play list on the World Wide Web, you need a browser and Internet access. If you don't have Internet access yet, you can still play with this feature and have a page displayed to anyone who's on your computer network or intranet.

We're assuming you don't have FrontPage or any other fancy html editor. If you do, this will be even easier.

Simian has two HTML page generators. Each HTML page generator requires a source (or template) page, and a destination page. Simian recreates the destination page every time a playback deck starts playing a new audio file using the template page. Therefore, you should only edit the template page as the destination page will be overwritten the next time a playback deck starts. The destination page is constantly deleted and rewritten automatically.

The BSI_Sample_Page.htm and BSI_Templage_Page.htm files included with Simian are intended as demo pages – we hope you will be creative and edit these or make your own custom pages!

To use a Dynamic HTML Page generator, simply follow these instructions:

1. Go to **Tools/Program Options**, and then go to the **HTML** tab

2. Enable either the **Dynamic HTML 1** or the **Dynamic HTML 2** options to "turn on" one of the HTML generators

3. Select "C:\BSI32\BSI_Sample_Page.htm" or "C:\BSI32\BSI_Template_Page.htm" for the **Template (Source) Filename** field by clicking on the [...] button

4. Manually type "C:\BSI32\BSI_Destination_Page.htm" into the **Destination File Name** field (you'll have to manually type this path/filename because the file won't exist)

5. Close the Simian Program Options dialog box.

6. Start Playback of your Program Log

7. Go to the Help menu and choose Dynamic HTML Page (or go to C:\BSI32 and double-click BSI_Destination_Page.htm). This will open the destination page in your default Internet browser.

Watch the Destination page and as you play events from your program log. Notice how the Dynamic HTML Page reloads with the information of the currently playing song.

Now, go get the person who writes your web page, because we're going to go Web Geek for a little while…

_____

## Dynamic HTML Pages For The Web Geek:

The Dynamic HTML function of Simian is similar to a mail merge…except that it is merges the information of the currently playing events into an HTML template file. You do not need to keep the Dynamic HTML Page in its current form. In fact, we'd rather have you customize it. Therefore we're going to give you the lowdown on how it works.

If you open Simian and go to Tools/Program Options, then select the HTML tab. You'll see a set of options for Dynamic HTML.

**Dynamic HTML 1 / 2** – Turns on the Dynamic HTML generators for either of two templates.

**Template (Source) Filename** – Simian writes the Template file and then automatically copies it to the Destination file. You'll want to edit the Template.

Figure 4.59

**Destination (Output) Filename** – This file is automatically overwritten with the Template file information. You'll want to put this file on your local web server.

**Automatically FTP HTML file** – To upload your HTML file to an FTP site each time your HTML page is updated, enable this option. Click on the **FTP Settings…** button and you will be presented with the window shown in figure 4.50 so you can configure your FTP server's settings.
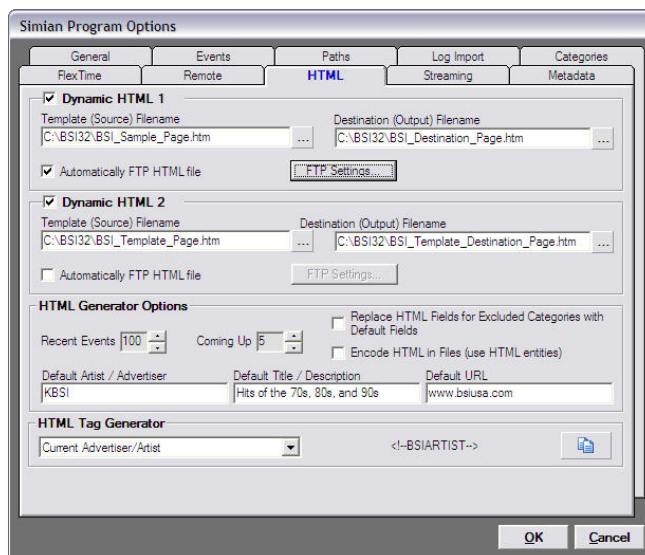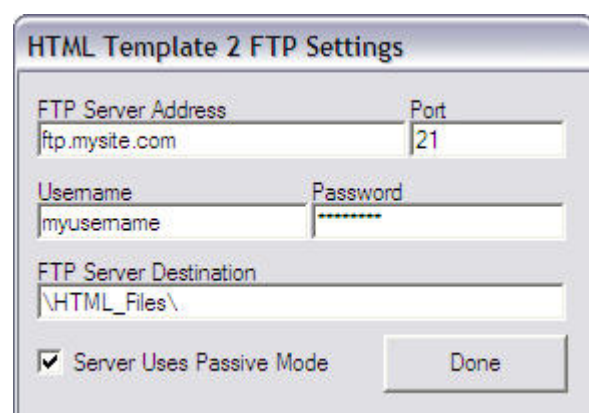
You will need to enter your FTP server's URL or IP address into the **FTP Server Address** field, and the port your FTP server is using (default is 21 for FTP servers). The Username and Password for your FTP account will need to be entered into the corresponding fields as well. The FTP Server Destination field is the directory your HTML page will be placed into. You can leave this field with only a back-slash if you want the file uploaded into the root directory of your account, or you can enter a relative path if you want the HTML page uploaded into a sub-folder on the server. If your FTP server uses Passive Mode to transfer files, place a check box into the **Server Uses Passive Mode** check box, otherwise, leave the option unchecked.

Figure 4.50

If you are unsure of weather your FTP server uses passive mode or not, you can try it both ways. If uploading your file fails while this option is unchecked, try again while it checked. You won't hurt anything by trying either mode, your upload may just fail if the option doesn't match your server's mode.

**Default URL** – You can associate a URL with the different audio files so that you can set up spots to link to their advertisers. You define the URL in the audio file tag for the audio file. If no URL is specified, Simian will use this URL.

**Default Artist / Advertiser** – If the current event does not have an artist entered in its tagging info, the text entered in this field will be used instead.

**Default Title / Description** – If the current event does not have a title entered in its tagging info, the text entered in this field will be used instead.

_____

**Exclude Categories** – To keep Simian from sending tags for certain kinds of Events, enable this option and configure the Exclude Categories settings on the Categories tab.

**Recent Events / Coming Up** – These set the number of items coming up and those recently played that will be written when you use the Recent and Coming Up tags.

**Encode HTML in Files** – Replace special characters with corresponding "escape characters" to properly conform to HTML standards.

**HTML Tag Generator** – This is the bread and butter for the web developer. You can select tags from the drop-down, click the Copy Tag to clipboard button, and then paste your tags into your code.

The tags available are:

- Current Artist/Advertiser
- Current Description/Title
- Current Event
- Current File Name
- Current Album
- Current Category
- Current Comments
- Current Composer
- Current Copy
- Current Copyright
- Current Duration
- Current Genre
- Current Publisher
- Current / Default URL

- Current Item Year
- Current Album Art File Name
- Coming Up Events
- Coming Up File Names
- Coming Up Time
- Coming Up Date
- Recent Events
- Recent Events – Short
- Recent File Names
- Station ID
- Weather Information
- Weather Availability
- Weather Time

- Weather City
- Weather Temp
- Weather Conditions
- Weather Wind
- Weather Pressure
- Weather Humidity
- Weather Visibility
- Next Album
- Next Artist
- Next Description/Title
- Next Event Sched. Time

Now that we've gone over the controls, let's go over how this works. Simian reads the Template file and looks for its proprietary tags. It then replaces those tags with the appropriate information from the currently playing audio file. It then copies the file over top of the previous Destination file. This means that you can edit the existing Template page, or create a new one and drop in the tags from the HTML Tag Generator.

If you do not have a web server in-house and use a service provider, you will need to upload the destination file each time the template file is updated.  You can use the **FTP Macro** in conjunction with the **"When a Main Deck Starts"** field on the **Events Tab** in Simian's **Program Options** or any of a number of third-party FTP applications that can automatically transfer your file when a change is detected.

# Using Keyboard Shortcuts

| | |
|---|---|
| 1, 2 or 3 | Plays Deck 1, 2 or 3 (if option is enabled) |
| Ctrl + A | Select all |
| Ctrl + B | Opens Event Builder |
| Ctrl + C | Copy |
| Ctrl + D | Edit Audio File |
| Ctrl + E | Opens selected file with Info Editor |
| Ctrl + F | Find phrase in the Program Log |
| Ctrl + G | Go to Current Event in the Event Log |
| Ctrl + H | Selects HotKey Panel |
| Ctrl + M | Make Next |
| Ctrl + N | New Program Log |
| Ctrl + O | Open new Program Log |
| Ctrl + P | Print |
| Ctrl + Q | Quick Insert |
| Ctrl + R | New Cart |
| Ctrl + S | Save |
| Ctrl + T | Selects Voice Track Panel |
| Ctrl + V | Paste |
| Ctrl + X | Cut |
| Ctrl + Y | Displays the Async Deck (Deck #4) |
| Ctrl + Z | Undo |
| Ctrl + F3 | Find Again |
| Ctrl + W | Opens the Simian Weather dialog box |
| Shift + Ctrl + F2 | Launches Speedy if installed |
| Shift + Ctrl + F3 | Launches Stinger if installed |
| Shift + Ctrl + F4 | Launches TimeShift if installed |
| Shift + Ctrl + F6 | Launches WaveCart if installed |
| Shift + Ctrl + C | Opens the Program Log's Edit Cue/Scheduled Time dialog |
| Return | Make current selection next to play |
| Space | Segue, play next (Depends on Program Options) |
| FKeys | Hotkeys |
| Esc | Stop all decks |
| + | Toggles a selected Event's Cue between manual and "+" |
| ! | Toggles a selected Event's Cue between manual and "!" |
| # | Toggles a selected Event's Cue between manual and "#" |
| @ | Toggles a selected Event's Cue between manual and "@" |

## **VoiceTrack Keyboard Shortcuts**

"A"          Autoset

"P"          Play

"Q"          Quick Reload

"R"          Playback, Record, Start 2$^{nd}$ Cut (see Voice Track Session – Sequence below)

"V"          Paste

"X"          Clear

"Esc"        Reset, Set all tracks


Voice Track Session  -  Sequence:

R (or H) – Starts Playback

R (or J) – Starts Recording

[optional] SPACEBAR, Starts next song

R (or K) – Stops Recording

R (or L) – Stops Sequence

# Chapter 5 Troubleshooting

## Optimizing Windows®

When using Windows, there is little that you can do to optimize the actual Microsoft release of the operating system. Unfortunately many computer manufacturers decide that the original version of Windows isn't good enough, and they add programs that run all of the time… Whether you want them to or not. These types of programs can affect Simian's on-air performance. Always try to use the cleanest Windows installation possible.

Also, some normal common-sense computer practices need to be avoided for the on-air Simian computer. Try to avoid programs that constantly run in the background, such as the Task Scheduler or any Anti-Virus programs on your on-air machine unless it's one that we've tested and can mask our system and audio files. Otherwise, these background programs can cause many problems such as audio skipping, system lock-ups and program crashes when used in conjunction with Simian. Any situation where the automatic protection features of an antiviral program are constantly scanning files is bad news for your air machine.

Try to avoid hard drive Power Management functions. These settings are in your BIOS, as well as in your Control Panel/Power Management folder. You may need to call the technical support section of your computer manufacturer to assist you with this. In the Control Panel, make your Settings for Always On power scheme say **Never** for hard drives.

Because Simian is graphics-intensive, it's best to minimize the fancy Windows tricks like mouse trails, icon animations, etc. Do this by going to the Control Panel/Display/Effects tab and disabling **Show window contents while dragging** and **Animate windows, menus and lists**.

Turn off Windows Sounds. In Control Panel/Sounds/Schemes, select No Sounds. This is important so you don't get unwanted beeps and tinkling from Windows on the air!

Don't use wallpaper. Every time you move something on the desktop, Windows has to redraw every pixel of the wallpaper graphic. This surprisingly simple thing can really slow your system down. Right-click your desktop, choose properties, then (None) for Wallpaper.

## Installation Problems

If an installation fails, or Simian will not launch after a power failure or similar traumatic experience, please call our Technical Support Team. They will be more than happy to lend you a hand. The following clean reinstallation instructions are for the computer expert who knows that a clean reinstallation is needed, or as a guide for when Tech Support says it's time to clean reinstall.

Reinstallation should be one of the last troubleshooting steps, not the first. If you cleanly reinstall Simian, you will have to reconfigure most of the options in SoundHound and Simian. You will need to re-enter your validation code after a clean reinstall.

 Do not attempt the following step unless you are a knowledgeable computer expert. Always backup your Registry files before attempting to edit the registry.

Instructions:

1. Download the newest full install of Simian.
2. Shut down any applications that are running on the Taskbar, including Simian.
3. Shut down SoundHound manually if it is still running.
4. Remove Simian from the Add & Remove Programs Control Panel.
5. Verify that the following files have been removed from the **C:\windows\system** folder (Win98) or the **C:\winnt\system32** folder (Win 2000/XP):

- BsiGeode.dll

- BsiNet32.dll

- BsiUtl232.dll

- BsiUtl32.dll

- Extract32.dll

- HolyGrl32.dll

- mmbsi32.dll

- Sx32w.dll

- wavinfo32.dll

6. Verify that the following files have been removed from the **C:\bsi32** folder:

- simian.exe

- sndhound.exe

- audio.mdb

7. Search the Windows Registry for the word "Simian" (no quotes), and remove any Keys (not just Values) that refer to it. Make sure to search repeatedly (F3) until you see a message that says "Finished searching through the registry":
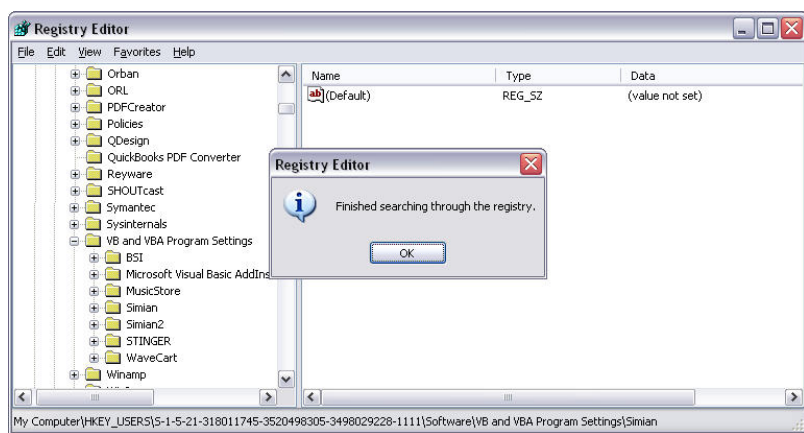


Figure 5.1

8. Close the Registry Editor and restart your computer.

9. Shut down any TSR's other than Explorer and Systray.

10. Install the newest version of Simian.

11. Restart your computer.

12. Launch Simian.

13. Make sure your dongle is installed and enter your Validation Code.

14. Reconfigure Simian and SoundHound.

# Random Problems

Errors that seem to occur sporadically and that are difficult to reproduce may indicate a DLL conflict or a corrupt audio database (audio.mdb).  Try deleting your audio.mdb and letting SoundHound recreate it.

Also, verify that you have only one copy of each of the following DLLs and that they are all in your c:\Windows\System (C:\WINNT\System32 for NT based machines) folder and no other.

- BsiGeode.dll
- BsiNet32.dll
- BsiUtl232.dll
- BsiUtl32.dll
- Extract32.dll
- HolyGrl32.dll
- mmbsi32.dll
- Sx32w.dll
- wavinfo32.dll

Each computer with BSI software installed should have only <u>one</u> copy of these files. They should all be in the c:\windows\system folder (C:\winnt\system32 on Windows 2000). Use the **Find Files** feature under the **Start** button to confirm that you have only one copy of the files and that they are in the right place.

Using long file names for your audio files can also lead to errors that appear random.  Make sure you are not using long file names or long folder names (keep with the 8.3 file naming convention). In addition, make sure that you do not have apostrophes or other special characters in these names.

Finally, random errors can be caused by conflicting hardware.  Have your PC technician check your device manager for hardware and IRQ conflicts.

# Sound Problems

## Windows® Sound Problems

You must determine whether the sound problem occurs in the Windows Audio Subsystem or in Simian *before* troubleshooting.  Beginning your tests in Windows will help you isolate the problem.  Use the Windows Sound Recorder (not Media Player) to test it. If the problem happens in Windows Sound Recorder, you'll want to troubleshoot the playback process, not the individual BSI application.  Skip to the "Simian Sound Problems" section if you can play your files properly in Sound Recorder. Otherwise, start with "Basic Sound Troubleshooting".

## Basic Sound Troubleshooting:

**Check the Audio connections** – If the soundcard's outputs aren't connected correctly, no sound can come from the card.

**Check the volume level** – Check the playback volumes in Windows' mixer, the soundcard's mixer application, and the external monitor or audio console.

**Start with the basics** – Can you play an uncompressed .wav file in Windows Sound Recorder? If you can't then Simian will be unable to play audio files as well.

## Simian Sound Problems

Two of the more common sound problems relating to Simian are audio breakup and skipping.  Skipping audio means that parts of songs are actually dropping out and therefore not being played.  Audio breakup is something different – breakup is when nothing is lost but there are pauses where there shouldn't be. Breakup occurs when there is a drain on system resources and your audio card or processor is not getting access to all the resources they require.  The solution to this is to stop doing any non-essential

activities (such as production work on the on-air machine), then remove all background applications, virus-checkers, task schedulers, or anything else that will take up system resources (stuff like Unreal Tournament running in the background).

Skipping audio can happen when you are using a consumer-grade soundcard and trying to segue (which most of these cards don't support). These cards may appear to support multiple audio streams, but there is a difference in the way they do this compared with professional audio cards. Professional cards have controls programmed into them, which allow Simian to control what audio passes through a specific channel. Consumer-grade cards simply take all the streams and control them internally without allowing Simian to control segues or overlapping. This means the card is in control and not the automation software. This can lead to audio skipping. The problem is that it's impossible to tell what will happen at any given time. That's why professional cards are so essential for professional sounding overlap.

## Troubleshooting Triggers

There are several things to check if your Triggers are not working properly:

- Make sure that Triggers are ON (look at the Status Bar at the bottom of the main Simian Window).
- Check that the proper Trigger Set is active (go to Async/Triggers/Edit Sets and look at which Set is selected in the Current Triggers box at the bottom right of the window). Choose the correct Set if it is not already selected.
- Verify that the correct Trigger Events are associated with the correct Trigger number in the Trigger Set.
- Go to Tools/Hardware Options/Hardware and verify that the appropriate GPI/O device is selected.
- While on the Hardware tab, try clicking on the Trigger number. If the number lights up and you get the expected result, Simian's Trigger functionality is working properly.
- Check whether the Trigger number you're testing lights up when the appropriate Relay is closed. This will tell you if the Trigger interface with your GPI/O device is working properly.
- Turn on the **Generate Incoming Trigger Log** option on the Hardware tab in Simian's Hardware Options window to record if/when your expected triggers are being received.

If these steps fail, contact technical support. We understand that this functionality can be complicated in some situations, and we'll be more than happy to lend a hand.

## Troubleshooting Relays

The first thing that you can do to verify that Relays are working properly is to open the Relay Rack dialog box (Tools/Relay Rack) and click one of the numbered relays. If you hear the familiar click of a relay closing on your Switcher device, then you know that Simian is communicating properly with the device. If this fails, try the software that comes with the device. You should be able to test it there. If that works, call BSI Technical Support. If that fails, call the tech support department for the device manufacturer.

## Troubleshooting Serial Communications

Troubleshooting Serial Communications is much easier with the Serial Port tab of the Spyglass window. Just go to Help/Spyglass Diagnostics and select the Serial Port tab. Here you can send strings and monitor the serial port.

# Technical Support

BSI offers different Tech Care Plans to reflect the different levels of technical support required by individual users.

Simian Lite does not include any support plan, but 6 months of Web-Based Support Tickets are included from the date of purchase.

Everyone has access to our web based user forum & knowledge base. Customers can choose between our GOLD and PLATINUM Tech Care Plans for additional support.

| | PLATINUM | Gold | FREE |
|---|---|---|---|
| **24/7 <u>Off-Air Emergency</u> Telephone Support** Page our on-call engineer and receive a rapid response in under 60 minutes[1] | ✔ | ✘ | ✘ |
| **Premium Telephone Support** Obtain a prompt telephone response[2] normal weekdays between 6am and 6pm Pacific from our own Tech Support staff for all BSI supplied hardware and software. (We do not use third-party or overseas call centers). | ✔ | ✔ | ✘ |
| **Web-Based Support Tickets** to urgent Support Tickets submitted normal weekdays between 6am and 6pm Pacific | ✔ 60 minute response[1] | ✔ Same day response[1] | ✘ |
| **Remote Login Support** Free remote PC Login for BSI software related tech support issues | ✔ | ✘ | ✘ |
| **FREE <u>BSI</u> Software Upgrade Protection** Free upgrades for each purchased BSI software for which a Tech Care Plan applies | ✔ | ✔ | ✘ |
| **FREE Simian Prod to Air Mode Upgrade[3]** Activates main Play Decks on Prod Machine for backup (simulates AIR machine) | ✔ | ✘ | ✘ |
| **System Check & Configuration** In the event of technical issues, we will remotely log in and check your PC and software configuration for any hardware or software purchased through BSI | ✔ | ✘ | ✘ |
| **BSI User Forum** 20,000 tips & tricks available 24/7 or enlist the help of other BSI users | ✔ | ✔ | ✔ |
| **Validation Codes** Replacement validation codes for all your purchased versions of BSI applications. | ✔ | ✔ | ✔ |
| **<u>BSI</u> Utility & Driver Updates** Free Tested and Certified Updates | ✔ | ✔ | ✔ |

_____

## PLATINUM Tech Care Plan - $1299 per year

All Simian Pro customers are automatically enrolled in the **PLATINUM** Technical Care Plan for the first 12 months from date of purchase. The Tech Care Plan is then optional, and renewable annually throughout the life of the software.

## Gold Tech Care Plan - $999 per year

Many of the same features of the Platinum Tech Care Plan (does not include 24-hour Off-Air Emergency support, among others, see above chart for more info) for $300 less than the Platinum Tech Care Plan.  The Tech Care Plan is optional, and renewable annually throughout the life of the software.

## Non-Automation product support plan - $299 per year

Gold level support for our non-automation products including Stinger, WaveCart, SkimmerPlus, and Speedy is available for $299 per year.

## Notes:

1Under 60 minutes is target response time for Platinum TCP, Same-Day response time for Gold TCP, during normal business hours. Internal monitoring ensures that we work closely to achieve these targets.

2On the rare occasion that all our technicians are busy, we will provide a prompt call-back (domestic US only) - we **DO NOT** leave you holding in a queue and calls are routed directly to our tech staff at our facility in Springfield, OR. We do not use overseas call centers.

3Limit of one Prod to Air upgrade per FULL mode license purchased for the duration a Platinum Tech Care Plan is valid. Upgrade is designed to be used for backup or training purposes only.

## A La Carte Training & Support - from $199 per incident

Customers requiring telephone support and / or additional training and who do not have a current Tech Care Plan, or who do not have a Platinum Tech Care Plan and need assistance outside of normal business hours, can purchase A La Carte
NOTE: purchasing A La Carte support does not qualify purchaser for free software version upgrades.

## Training Sessions

pre-booked training sessions from $99 per hour.
NOTE: purchasing A La Carte support does not qualify purchaser for free software version upgrades.

## Program Log Building - $299

Having trouble building your Program Log; need help with your Scheduled Record Events for Time Shifting; just added a new satellite show or flipped formats and not sure what you need to do in your Program Log?

Now, help is at hand from the experts at BSI. We'll spend time helping you create your Program Log ensuring that it is running smoothly and that you understand what's going on!

Our custom Program Log building costs $99 per hour, with a minimum 3-hour booking. Additional hours charged at $99 / hour.

**IMPORTANT: Prices published here were effective at the time of this manual's original printing.  Prices are subject to change at any time.  For current valid pricing, please visit http://www.bsiusa.com.**

**IMPORTANT: Prices published here are per machine for single users. Radio Groups with multiple machines requiring Tech Support Plans for more than one computer and / or users should contact BSI sales for special pricing based on the number of computers and users to support and the level of support required.**

# Technical Support or Training?

BSI has two sections designed specifically to assist you; Technical Support and Training. While they are both here to help you out, their backgrounds and goals are a bit different. Let's take a look at each:

## Tech Support

Our Technical Support department is made up of hardcore computer people who work hard to fix problems with BSI software. They're here for you when BSI software is not functioning properly to help you get your software (and sometimes hardware) up and running properly. These people can tweak Simian and shuffle IRQ's with the best of them. When BSI software is broken, contact Tech Support.

## Training

Our Training department is made up of Radio Engineers who work hard to help you integrate your BSI software into your radio station. These people know about things like ferrite beads, grounding, and scheduling software. When you need help building a Program Log, or wiring your Triggers, Contact our Training section to set up an appointment.


## Customer Assistance Contact info

| | |
|---|---|
| Technical Support Phone Number: | (541) 342-5250 |
| Technical Support Email: | support@bsiusa.com |
| Technical Support on the Web | www.bsiusa.com/support |
| Training Section Phone Number : | (888) 274-8721 |

# Chapter 6: Reference

## Menus

### File Menu

**New Program Log [Ctrl+N] —** Creates a new blank Program Log.

**Open [Ctrl+O] —** Opens the "Open Log" dialog box that automatically shows you all logs available in the folder that you indicated for Program Logs in the paths tab of the Program Options dialog box.

**Save [Ctrl+S]** — Saves changes to the current Program Log.

**Save As** — Opens the "Save Program Log" file window, which allows you to save the log and rename it if you'd like.  This is very useful if you are building template logs.  You can save the same log under different day names and then change only the particular elements that are different for each day.

**Import** :

> **Use Traffic Format —** Allows you to import a raw text log into Simian using the Traffic settings that you choose on the Log Import tab of Simian's Program Options window.

Figure 6.1

> **Use Music Format —** Allows you to import a raw text log into Simian using the Music settings that you choose on the Log Import tab of Simian's Program Options window.

> **Use Alternate Format —** Allows you to import a raw text log into Simian using the Alternate settings that you choose on the Log Import tab of Simian's Program Options window.

> **Sort Log by Scheduled Time —** Sorts current program log by scheduled time.

**Print:**

> **To a File —** Prints current log to an ASCII text file.

> **To a Printer [Ctrl+P] —** Prints current log to the default printer.

**Properties** — Displays current log info including Air Date, Title, Description, Creator and Comments.

**Change Session** — Shows the various sessions you are set up to run from this machine (available as a faster alternative to the "session" switch previously used on the icon command).  The current session in use will display a check mark to the left of its entry in this menu.

**Exit** — Exits Simian.

### Edit Menu

**Undo [Ctrl+Z]** – This works just like the Undo feature in many other popular software applications. It simply reverses your previous action(s).

**Cut [Ctrl+X]** — Cuts the currently highlighted line in the current program log and holds it in memory for pasting into another section of the program log or other window.

**Copy [Ctrl+C]** — Copies the currently highlighted line in the current program log and holds it in memory for pasting into another section of the program log or list window, such as the Cart Viewer.
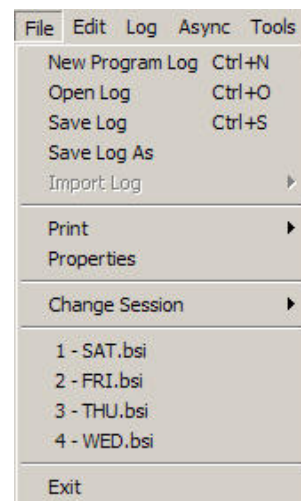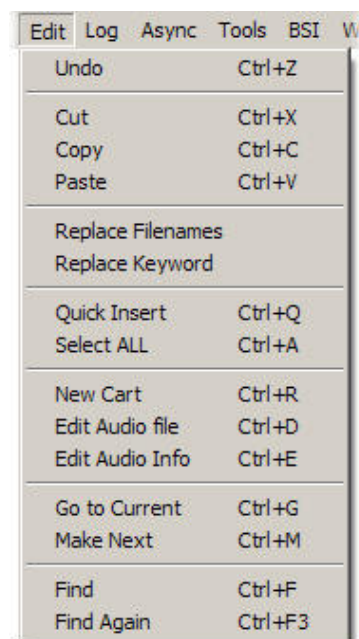
Figure 6.2

_____

**Paste [Ctrl+V]** — Pastes the line held in memory to the line following the currently highlighted line in the current program log.

**Replace Filenames** – Finds all entries in the program of a specified file name with a second specified file name.

**Replace Keyword** – If you want to change text in your log by searching by keywords in the various columns, use this option.  You will be presented with a dialog box with many search and replace options.

**Quick Insert [Ctrl+Q]** — Pops open a window where you can type the name of a file in your audio database. Just type in the file name and go!

**Select All [Ctrl+A]** — Selects all lines in the current program log for copying or deleting.

**Audio File [Ctrl+D]** — Whenever you have an audio event highlighted, you can select this item to open the audio editor that you indicate on the Paths tab of the Simian Options window.

**Edit Audio Info [Ctrl+E]** — Whenever you have an audio event highlighted, this item will open the Info Editor that contains audio and cart file-tagging information.

**Go to Current [Ctrl+G]** — If you're working on the log a couple hundred Events down from the Event that Simian is currently playing, you can use this feature to automatically zoom the Program Log back to the current Event.

**Make Next** —Schedules the currently highlighted item in the current program log as the next item to play.

**Find [Ctrl+F]** — Searches the current program log for any occurrence of the specified text.

**Find Again [Ctrl+F3]** — Continues most recent search in the program log.

## Log Menu

**Automation** — Switches automation modes. You can select **Off/Manual**, **Live Assist** [Ctrl+L], or **Auto** from the sub menu that pops up. You can also click the Automation button on the status bar to perform this function.

**Time Events** — Turns time events ON and OFF. This can also be accomplished by clicking on the Time Events indicator on the Status Bar at the bottom of the main Simian window.

**Verify Program Log** — Opens the Program Log Verification window which provides you with a means to find and correct errors prior to running the log.  This is where you can verify the existence of all audio files in the current program log, check start and end dates and verify audio file length.  You can also choose to create an error list, which you can print out for later reference.
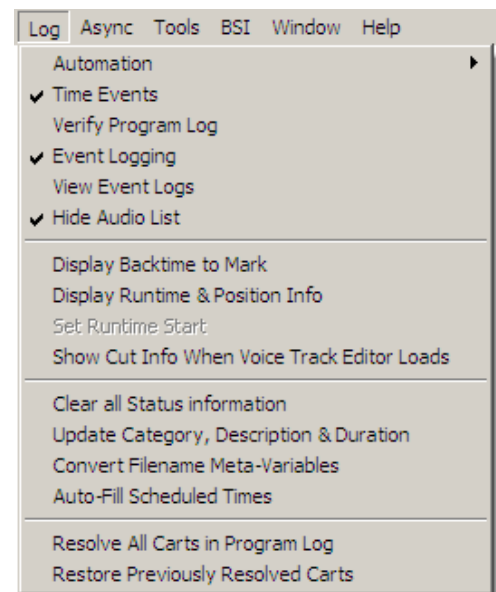
Figure 6.2

**Event Logging** — Toggles event logging ON and OFF.  This can also be accomplished by clicking on the Event Log indicator on the Status Bar at the bottom of the main Simian window. The Event Log is a record of the actual as-run broadcast day.

**View Event Logs** — Opens the View Event Logs window where you can edit, delete or open an Event Log.

**Hide Audio List** – Hides the Audio List

**Show Cut Info When Voice Track Editor Loads** – If you would like to see some of the meta-data of the audio files you are going to record Voice Tracks for, enable this option.  When you load the Voice Track Editor while this option is enabled, a window will pop up displaying several of the common meta-data fields for both Cut #1 and Cut #2 loaded into the Voice Track Editor.

_____

**Display RunTime & Position Info** — Shows the run time calculations on the program log properties bar. You can disable this option on slower machines to conserve system resources.

**Display BackTime to Mark** – Shows the length of file runtime (DR) remaining to the next BackTime (!) Cue, the actual computer clock time remaining until the next BackTime Cue (TTM), and Simian will even do the math for you so that you can see the difference!

> You can display RunTime & Position Info or BackTime to Mark info, but not both.

**Set Run Time Start** — Sets the starting event for the start from which subsequent time calculations will be referenced.

**Clear all status information** — Clears the Status column of the log.

**Update Category, Descriptions, & Duration** – Updates the information of each audio file or cart in the Description, Category, and Duration fields of the Program Log. Information is pulled from the Audio Database.

**Convert Filename Meta-Variables in Program Log** – Converts all date meta-variables found in the Filename column of the Program Log to the current date.

**Auto-Fill Scheduled Times in Current Program Log** – Rebuilds the scheduled times for all AutoStart events in the program log based on the timed events and file lengths of the events in the Program Log.

**Resolve All Carts in Current Program Log** – Carts will be removed from the program log and replaced with their component events.

**Restore Previously Resolved Carts** – Removes previously resolved cart elements from the current Program Log and restores the original cart events.

## Async Menu

**HotKeys** – Allows you to display the HotKeys Tool Panel or edit HotKeys Sets.

**Serials** – Allows you to enable and disable serial functionality. You can also edit Serial Sets here.

**Triggers** – Allows you to enable and disable serial functionality. You can also edit Trigger Sets here.
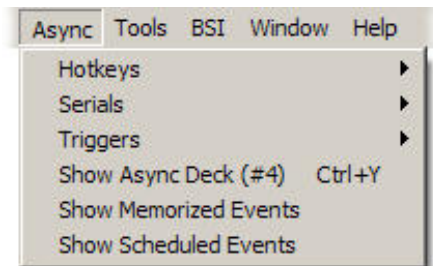
Figure 6.3

**Show Memorized Events** – Opens the Memorized Events window.

**Show Scheduled Events** – Opens the Scheduled Events window.

**Show Asynchronous Deck [Ctrl+Y]** – Opens the Asynchronous deck interface.

## Tools Menu

**Audio Editor** — Launches the audio editor that you select on the Paths tab of the Simian Options window.

**Event Builder [Ctrl+B]** — Opens the Event Builder window. The Event Builder is covered in Chapter 4.

**Relay Rack** – This menu item only appears if you have selected a Switcher device on the Hardware tab under Tools/Hardware Options. It allows you to open the Relay Rack dialog box which allows you to manually control your relay device.

**Text Editor** — Launches Notepad for your enjoyment.

**Weather Info [CTRL+W]** — Launches the weather information screen.

**Manual Metadata** – To open the Manual Metadata window, click on this option. This window allows you to manually output HTML/HTTP/TCP/UDP/Serial data for audio not played from Simian.

**Hide Main Decks** – Hides the main decks at the top of Simian's user interface and extends the Program Log in their place.

**Extend Program Log** – Extends the program log to the full length of the screen, covering up the Record, HotKeys, VoiceTrack, and Mixers tabs at the bottom of Simian's user interface.

Figure 6.4

**Record Decks** – Displays the Record Deck Tab at the bottom of Simian's user interface.

**HotKeys** – Displays the HotKeys Tab at the bottom of Simian's user interface.

**VoiceTrack** – Displays the VoiceTrack Editor Tab at the bottom of Simian's user interface.

**Mixers** – Displays the Mixers Tab at the bottom of Simian's user interface.

**Program Options** — Opens the Simian Program Options window, where you can set up options for Simian. See the Configuration section for details.

**Hardware Options** – Opens the Simian Hardware Options window, where you can set up options for your hardware peripherals. See the Configuration section for details.

## WMES Menu

(Windows Media Encoder Services) This menu is only available if you have selected the Enable WMES functionality feature on the **Streaming** tab of the Simian Program Options window. You must have Windows Media Encoder 9 installed to use this feature.
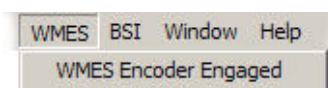
Figure 6.5

**WMES Encoder Engaged** – You can engage and disengage the Windows Media Encoder here.

## BSI Menu

Allows you to quickly switch to other installed BSI products.
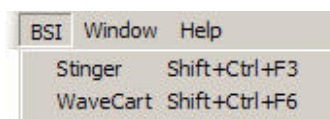
Figure 6.6

## Window Menu

**Auto Adjust Log Display** – Re-sets the column widths of the Program Log to their default widths.

**Enable Full-Screen Mode** – This option causes the familiar Windows window border to disappear and Simian will be maximized to the full size of the screen.

**Save Window Position** — Saves the current position and size of the main Simian window so that when you close and reopen Simian, it will look just like you left it.
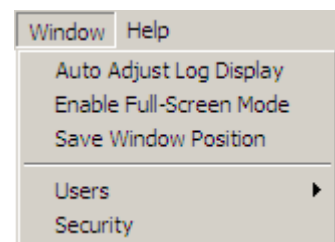
Figure 6.7

**Users** – Allows you to switch between different users. When you change users you will be asked for that user's password.

**Security** — Opens the Simian Security window where administrators can control access to certain Simian features. The Simian Security window will ask you for a password the first time it is accessed, and will not re-open without that password.

## Help Menu

**Help Contents** — Opens the Simian help system.

**Release Notes** — Opens your browser and opens the Simian release notes web page.

**Check for updates** – Opens your browser and goes to the Simian Updates web page.

**Tips & Tricks** — Opens the Simian Tips window and gives the option to show tips at startup.

**Technical Support** — Opens the Technical Support information dialog box that provides support times, phone numbers and email addresses.

**SpyGlass Diagnostics** — Opens the SpyGlass window, which gives you access to all kinds of useful information for Simian setup and troubleshooting.

**Register** – Allows you to register your copy of Simian.
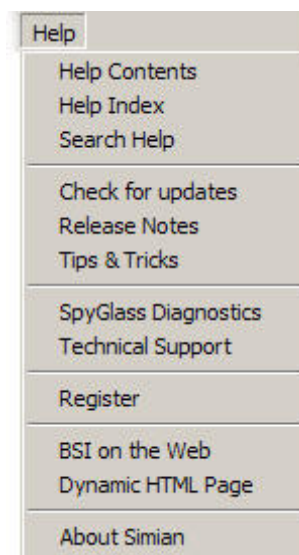
Figure 6.8

**BSI on the Web** — Allows you to directly access a great deal of useful information on the BSI Website directly from Simian. This is a great way to get to these resources:

**Dynamic HTML Page** – This option will only show if Dynamic HTML Generator 1 is turned on.  Clicking this option will open your destination html page in your system's default browser.

**About Simian** – This is the standard Windows "about this application" window. You can use this to check the version of Simian that you're using, as well as view the license agreement.

_____

# Simian Program Options

The following screen shots illustrate typical default settings suitable for most Simian users. These settings are stored in the Windows Registry, which is **unique for every different Windows user**. For that reason (and because Simian needs read/write access to the registry and other parts of Windows) we suggest limiting User Accounts to a single Simian user with Administrator Privileges.

## Tools | Program Options - General
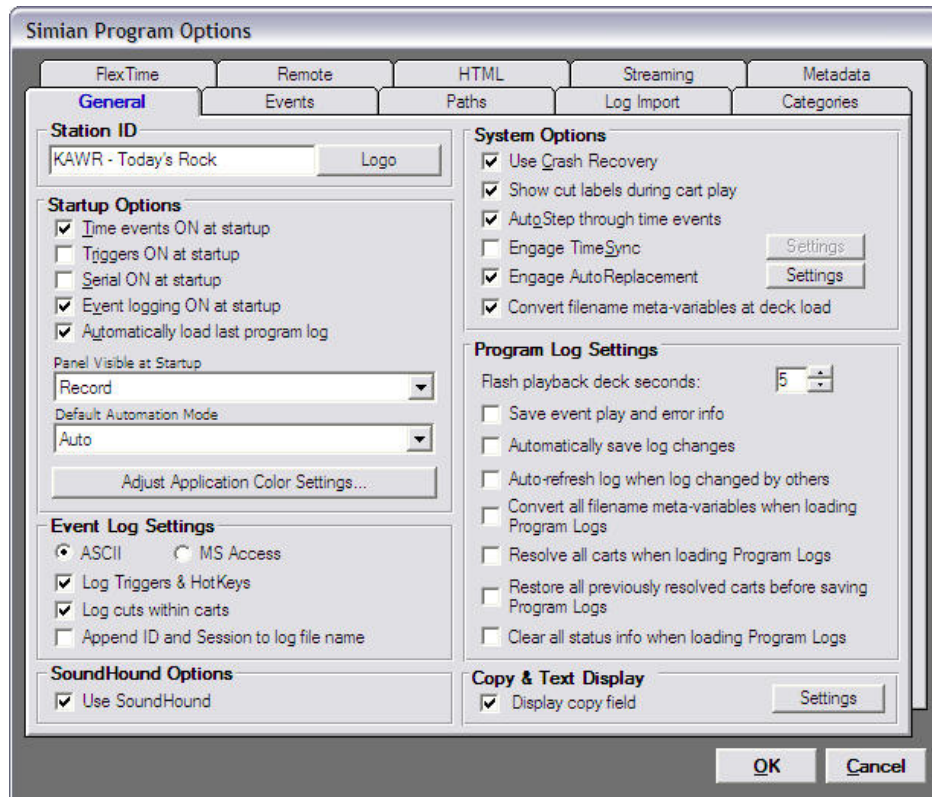


Figure 6.9

**Station ID** – This field allows you to personalize the title bar of the Simian program and provide an on screen reference to the station which is useful when viewing multiple desktops using Remote Desktop Connections; or different Simian sessions (as on the Production Machines).



Figure 6.10

The station ID appears in Simian's title bar, above the time (and weather if using the **GETWEATHER** Macro).

_____

**Station Logo** – Clicking on this button allows you to display (or hide) a station logo to the right of the three main playback decks. Clicking on the **Logo** button will make the Logo Settings window appear as shown in figure 6.10b.

To display a station logo, place a check in the **Show Station Logo** option. A BSI logo will show by default, but you can change this to your own custom logo by clicking on the **Select Station Logo** button and browsing to and opening your own custom .jpg, .gif, or .bmp file. The logo will be displayed in full size as a native 176x176 size. Your screen resolution must be at least 1280 pixels wide for the logo to be able to display full size (otherwise it'll shrink it to fit in the space available).

The station logo can be set to execute macro or audio file by dragging an event from the event builder to the logo, or to the **Left-Click Event** field in the Station Logo Setup window. When the currently playing audio file

Figure 6.10b: The Station Logo Setup window

has a URL saved in the URL field tag, right clicking on the station logo will open the associated web page.

You can choose to display the Album Art of the currently playing audio file by placing a check in the **Show Album Art** option. With this option and the **Show Station Logo** option enabled, Simian will search for and display any image file that has a file name that matches either [Artist].jpg, [Artist].gif, [Artist].bmp or [Artist]-[Album].jpg, [Artist]-[Album].gif, or [Artist]-[Album].bmp. Again, the native full size image that Simian will display is 176x176. Anything other than that size will be stretched/squeezed to fit these dimensions.

> It is recommended to use .jpg or .gif files if you plan on using the Album Art/Station Logo with the Dynamic HTML function's <!--BSIALBUMARTFILENAME--> field tag and the Stream Encoding and Metadata function's %ALBUMARTFILENAME% meta-variables since those file types are appropriate for use on the web.

**Startup Options**

**Time events ON at startup** – Simian will respond to Timed Events in the Program Log and Scheduled Events. If not selected, Simian will ignore all Timed Events in Scheduled Events and the Program Log, including BackTime, Non-Sequential and Timed Next events.

**Triggers ON at startup –** Simian will respond to the currently loaded Triggers set. (The actual trigger set loaded at start-up is configured in **Async | Triggers | Edit Sets)**

**Serial ON at Startup –** Simian will 'listen' to the default Serial Port and respond to any **Watch Strings** set up in the currently loaded Serial Sets

**Event logging ON at startup** – events within Simian are logged to a file that can be viewed from **Logs | View Event Logs**

**Automatically load last program log –** If Simian was shut down with a Program Log loaded, this option will automatically load the last Program Log when Simian restarts.

**Adjust Application Color Settings** – This button opens a dialog box that allows you to select a background color for Simian's user interface and pop-up windows. You can also set a background wallpaper image by enabling the **Image** option and clicking on the **Browse** button to choose a .jpg, .gif, or .bmp file. The file you select will be displayed behind the controls on Simian's main user interface. The image will be displayed at its native size, so if the image is smaller than the dimensions of your current screen resolution it will not fill the entire window. On the other hand, if the image is larger than your current resolution, only the portion of the image that fits the screen will be displayed.

This window also allows you to change the colors of the fonts on the main UI window, the Program Log lines and fonts, Event Builder's file type line and font colors, and Cart Editor line and font colors.
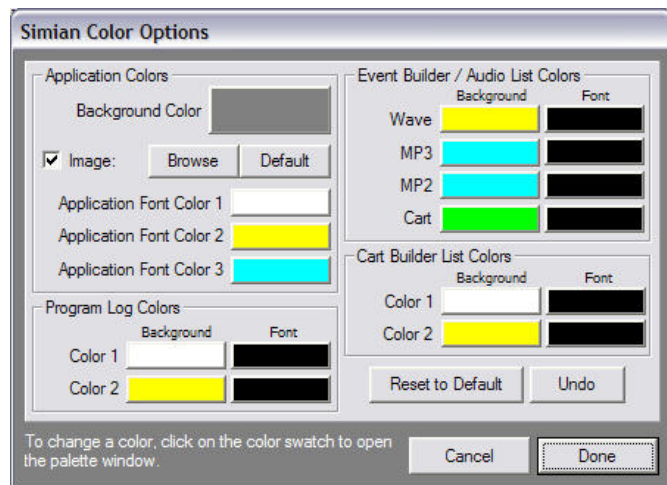

## Event Log Settings

Each time an audio file or Virtual Cart is played, Simian will log the details in either a plain **ASCII** text log-file (that can be read with any text editor including Windows Notepad, or imported into Microsoft Excel) or in **MS Access format** allowing users with Microsoft Access to customize their own reports. Simian will display either format.

**Log Triggers & HotKeys –** Triggers and HotKey Events will be added to the Event Logs, which is useful for debugging and when multiple events are 'fired' from Trigger inputs.

**Log cuts within carts** – rather than just log the Virtual Cart, Simian will add the actual Event within the cart to the Event Log.

**Append ID and Session to log file name** – the default file name for the Event Log is the Year, Month and Day with an .lst extension. Appending the ID to the log file name will add the station call letters at the end of the filename. This may be useful where Event Logs are being transferred to a central computer for review.


## System Options

**Use Crash Recovery –** Simian keeps track of the Program Log position and current audio file so that, in the unlikely event that the computer crashes, it can resume playback from the same point when the computer is rebooted and Simian is placed in the Startup group. Using this option uses more computer resources and unless you are experiencing problems, we suggest that you leave this option un-checked.

**Show cut labels during cart play** – will display the Event inside a virtual cart (in the play decks) rather than just the cart label itself.

**AutoStep through time events** – Instead of waiting for an Event's Scheduled Time, Simian will play the Event as soon as it is reached. By default, this option is NOT selected and Simian will wait until the Scheduled Time before executing the event. (**Timed Immediate** and **Timed Next** events are otherwise unaffected by this option).

**Engage TimeSync** – Simian will synchronize your computer clock with an incoming Trigger (typically a Network Time Sync from your Satellite provider). Any other event associated with that Trigger is unaffected.
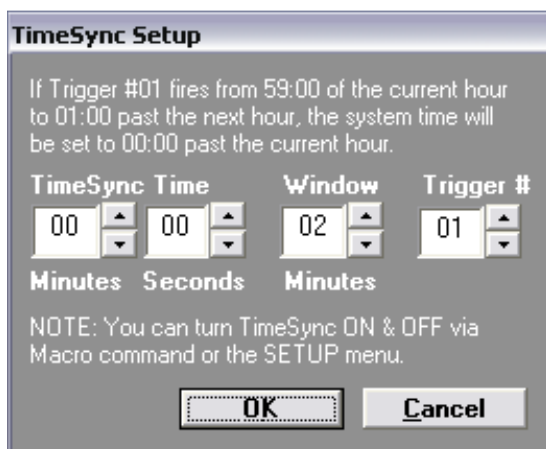
Figure 6.11

**TIP:** **Ensure that the Windows option to 'synchronize with an Internet Time Server' is turned off at all times.** When left on, we've seen the computer clock mysteriously change an hour at a time.

**TIP:** It is best to avoid resetting system time around midnight (or at a time when an event is scheduled to play). If the clock was running a second or so fast at midnight and is moved back, your commands to load the following days log could operate incorrectly, or possibly even twice.

**Engage AutoReplacement** – Although Simian allows you to verify program logs, there are occasions where a file is not available. Using this option will substitute a missing file with a file of your choice. Typically, the replacement file will be a Virtual Cart with a randomized selection of audio files (for example PSAs, or jingles).

In the example at right, we have used **Event Builder** to drag and drop and assign the **30sec Spots** Virtual Cart that will replace missing items up to 45 seconds in duration. Virtual Carts **60sec Spots** and **2min Spots** are used to replace material of corresponding lengths.

Typically, your third-party Traffic and Music Scheduling software will ensure that Out-Of-Date items are not played, so this box is left un-ticked unless you are using **SmartCarts**.

**Convert Filename Meta-Variables at Deck Load** – When an item is loaded into a playback deck from the program log, the filename will be searched for date meta-variables and converted to the current date. The following meta-variables can be used:


Figure 6.12

%M – Two-digit date for today's date
  %+1M to %+9M – For 1 to 9 days after today
  %-1M to %-9M – For 1 to 9 days before today

%D – Two-digit date for today's date
  %+1D to %+9D – For 1 to 9 days after today
  %-1D to %-9D – For 1 to 9 days before today

%Y – Two-digit year for today's date
  %+1Y to %+9Y – For 1 to 9 days after today
  %-1Y to %-9Y – For 1 to 9 days before today

%Z – Four-digit year for today's date
  %+1Z to %+9Z – For 1 to 9 days after today
  %-1Z to %-9Z – For 1 to 9 days before today

**Program Log Settings**

**Save event play and error info** – Simian updates the Program Log play **Status** and **Actual** time columns as each item in the log is reached. An **X** in the status column indicates that the log item occurred as expected, while an **E** (usually with the entire line marked red) indicates that there was an error. Simian can save this event play and error info with the program log (useful for diagnostics), otherwise do not check this option.

Figure 6.13

**Automatically save log changes** – selecting this option will automatically save the program log each time an item is changed (added, deleted, or moved) rather than using **File | Save**.

**Auto-refresh log when log changed by others –** when using a production computer to modify the on air program log, selecting this option will ensure that the on air log is updated to reflect the changes made by the other user.

**Flash playback deck seconds** – Simian's main playback decks will flash red towards the end of an audio cut to act as a visual warning. This setting effects how long before the end of a cut that the deck will start flashing.

**Convert all filename meta-variables when loading Program Logs** – When a program log is loaded, any date meta-variables contained in the Filename column will be converted to the current date.

**Resolve all carts when loading Program Logs** – When a program log is loaded, carts will be removed from the program log and replaced with their component events.

**Restore all previously resolved carts before saving Program Logs** – Removes previously resolved cart elements and restores the original cart events before saving the Program Log.

**Clear all status info when loading Program Logs** – When a Program Log is loaded, this option will cause all status info (the Status and Actual Time columns) of all the items in the Program Log to be cleared. This option is useful if you re-use your Program Logs since any Time-Cued items in a Program Log that have been marked as played will not be executed again.

**Copy & Text Display**

**Display copy field –** select this option to display the **copy** field embedded inside an audio file.

**Set Font & Colors** – choose the font and color for the **copy** display and for any **text** events in the program log.

## Tools | Program Options – Categories

Simian can deal with a number of different events, rather than just audio. These events are sub-divided into a series of different categories which can be customized with different colors.

With the popular CBSI/Wicks scheduling software for example, all events in the traffic log are hard-coded to a category called WAV which doesn't currently exist in Simian and must be added.

This can be setup from **Tools | Program Options | Categories**.
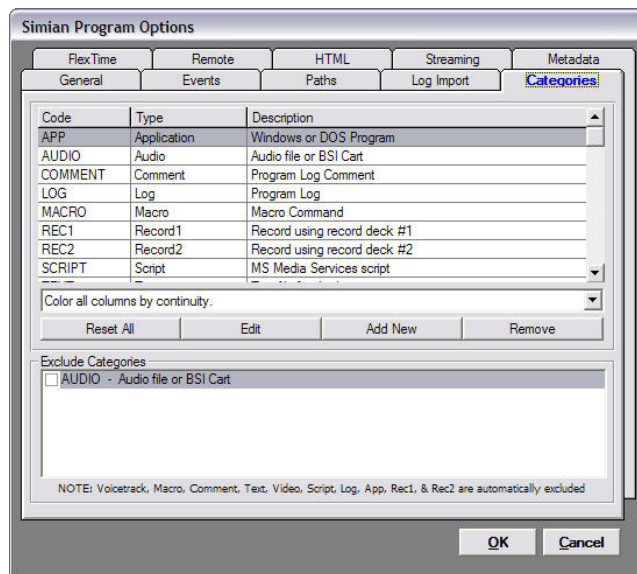


Figure 6.14

Select **Add New** (as shown in Figure 6.6) to display the **Create New Category** window as shown in Figure 6.7. In the example, we've added the WAV category using "WAV" as the **Letter Code** and Audio as the **Type** of category. The **Description** is optional, as are the Text and Background Colors.
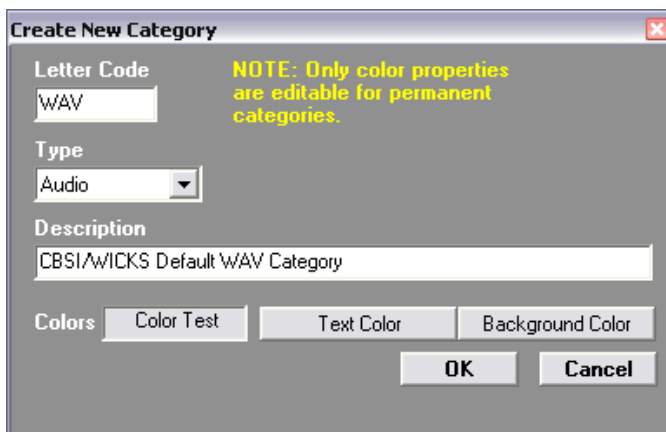

Figure 6.15

**Exclude Categories** are used with Simian's HTML Page generator, Stream Encoding data generator, and Metadata generator. Each custom category you create, along with the default Audio category will be shown on this list. Checking one of the categories will prevent that category of events from being added to the HTML, Stream Encoding, and Metadata being generated (when the specific output type has its Use Exclude Categories option enabled).

## Tools | Program Options – Paths

Audio file paths are setup in the SoundHound application as described elsewhere but are also displayed in the **Paths** tab of the Program Options. From here you can also choose to display these paths as **Friendly Names** within Simian.


Figure 6.16

**The following paths are also setup from within this section of the Program Options:**

**Audio database** – This is where Simian will look for the database of audio files. For Air machines, this will be c:\bsi32\audio.mdb. For production machines, this will be the UNC path to the audio database on the on air computer (for example \\air\c\bsi32\audio.mdb).
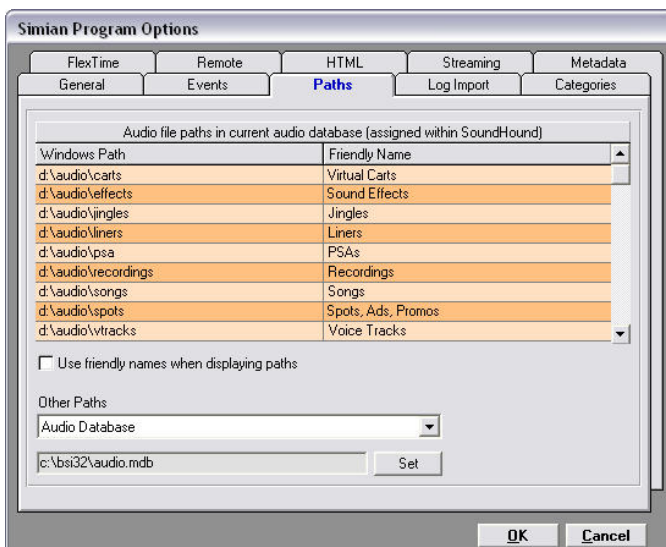
**Audio editor** - This is the path to your third-party editor. When using Adobe Audition, this is typically C:\Program Files\Adobe\Audition 1.5\Audition.exe, C:\Program Files\Adobe\Audition 2.0\Audition.exe, or C:\Program Files\Adobe\Audition 3.0\Audition.exe depending on your version of Adobe Audition.

**Program Logs** – This is where Simian will look for the Program Logs. For Air machines, this will be c:\bsi32\logs. For production machines, this will be the UNC path to the Log folder on the on air computer (for example \\air\c\bsi32\logs).

**Log import** – When using **File | Import Log** Simian will look inside this folder for the traffic log from CBSI/Wicks (or Music Schedule Log etc)

**Text files** – Folder for text documents that Simian will display (see **Event Builder | Text / Tag** feature).

**Record Deck #1 default record (select path above) –** path for storing recordings made using Simian Record Deck #1 (default is D:\AUDIO\RECORDINGS)

**Record Deck #2 default record (select path above) -** path for storing recordings made using Simian Record Deck #2 (default is D:\AUDIO\RECORDINGS)

**Voice Track default record (select path above)** – path for storing recordings made using Simian Voice Track record (default is D:\AUDIO\VTRACKS)

**Video files** – Using the built-in capability to play video files, Simian will look inside this folder for the video files. (default c:\bsi32\video)

**Trigger Sets** – default c:\bsi32\triggers

**HotKeys Sets** – default c:\bsi32\hotkeys

**Serial Sets** – default c:\bsi32\serial

**Scheduled Event Sets** – default c:\bsi32\scheduled

The example in Figure 6.17 shows an alternative structure for the paths layout, prefixing each folder name with the station call letters. This can be useful in multi-station clusters, though we prefer to rename the audio folders audio1, audio2, audio3 for consistency.
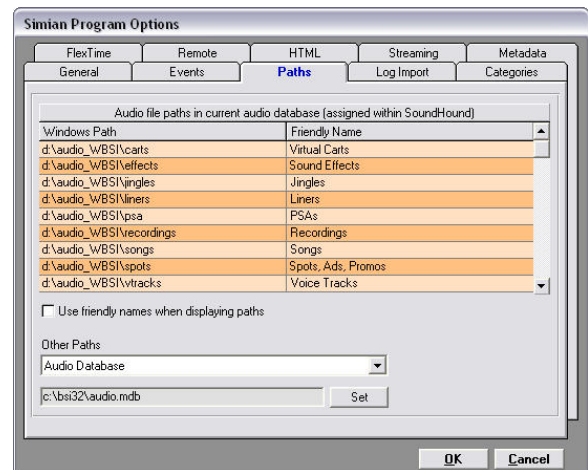


Figure 6.17

---

**IMPORTANT NOTE:** In the example above, we have added the station name to the default folder name. This is useful when running a network of multiple stations, so that production computers can synchronize copies of the audio libraries for different machines on the network. We have used the station call letters here as an example for clarity, you may wish to use FM/AM or 1/2/3 etc.

---

## Tools | Program Options – Events

This tab is used to configure events that you would like to execute when Simian starts, exits, or when the main decks start, segue or unload events.

Any event can be added to each event type which can be created with the Event Builder. This includes Audio files, Macros, or even Carts that contain multiple events.
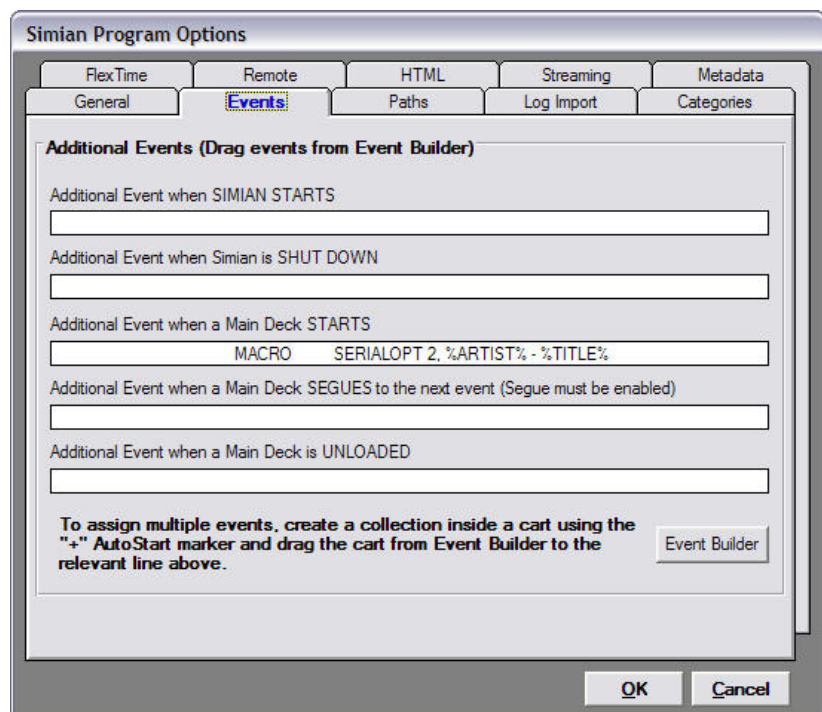


Figure 6.18

## Tools | Program Options – Log Import

Configuration of import settings is performed on this tab. For more indepth information about how to configure these settings, see the section titled **Importing and Merging Logs**.
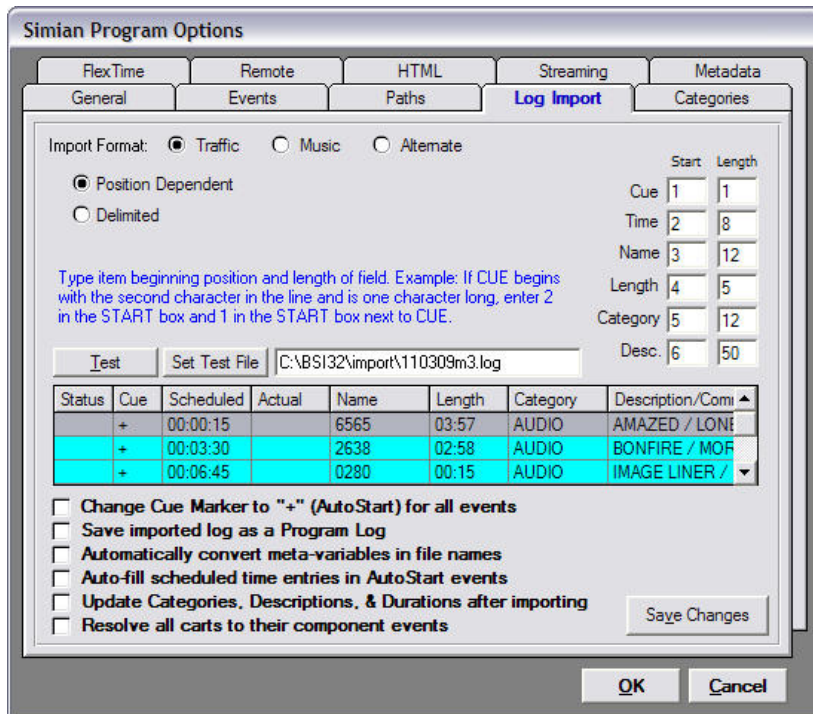


Figure 6.19

## Tools | Program Options – FlexTime

The FlexTime tab allows you to configure PitchShift and Automatic BackTime settings. For more information on what the available functions do, see the section titled **Using PitchShift** and **Using BackTime**.

The **BackTime event cues as Timed Events** option allows you to have Simian treat BackTime cued events as timed events.

The **Generate BackTime Error Log** option will create a text file called FlexTime_Error_Log.txt in your Simian install directory and log any reasons an error was encountered when trying to automatically BackTime your log, such as there was more audio than could be squeezed into the given amount of time given the maximum shrink percent configured.
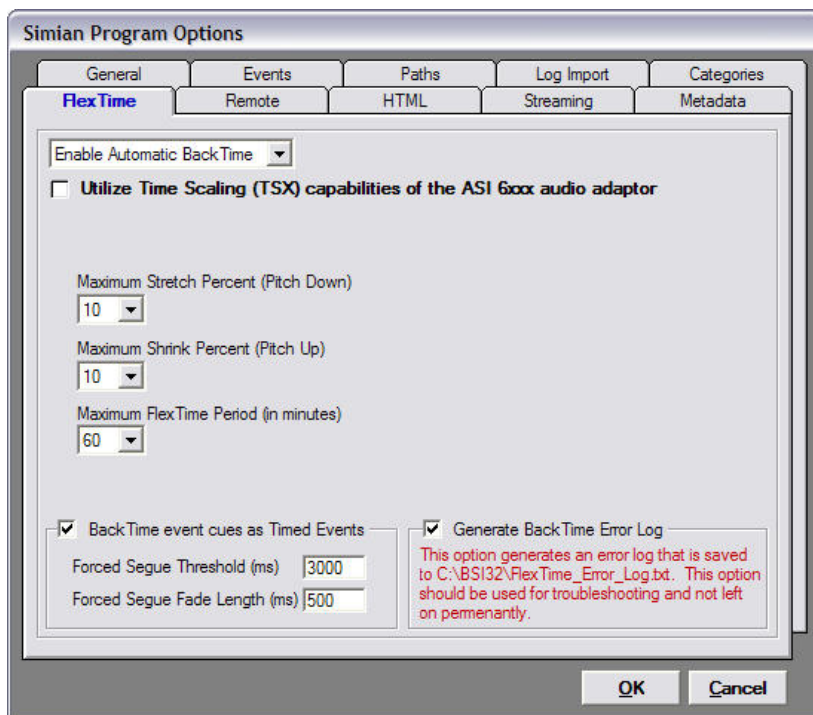


Figure 6.20

## Tools | Program Options – Remote

The Remote tab allows you to configure Simian to use the Windows Registry to store its settings (the default), or to use an .ini file.

The Windows Registry is preferred as it is quicker and allows for user rights management via Windows. Ini files allow users with limited access rights to still be able to use Simian and still save preferences.

The WebConnect section will only be displayed for users who have WebConnect installed on their machines, though the WebConnect product was discontinued by BSI several years ago.
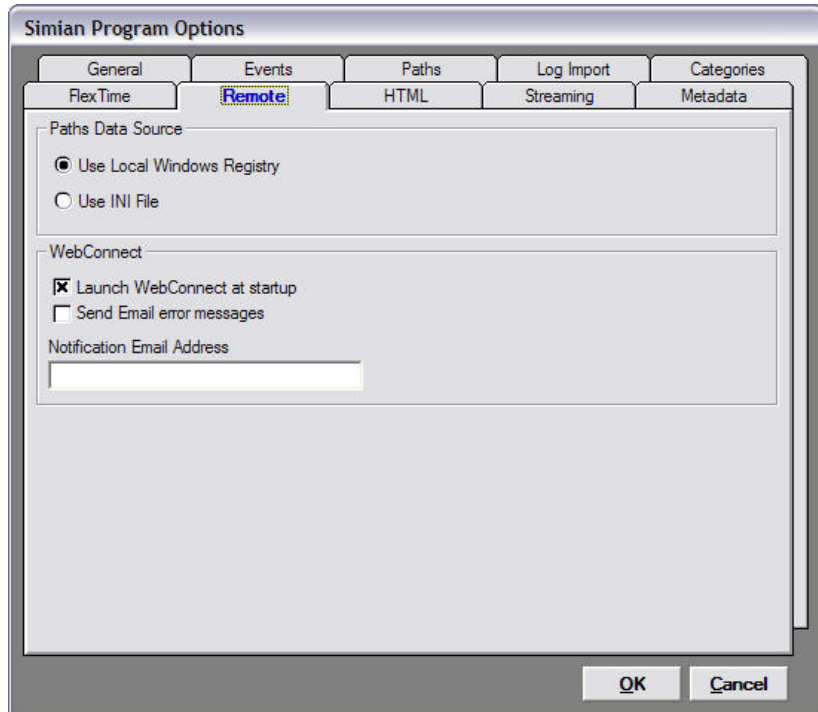
Figure 6.21

## Tools | Program Options – HTML

Configure your HTML generator options here.  For more info on how to set this up, see the section titled **Using Dynamic HTML Pages**.
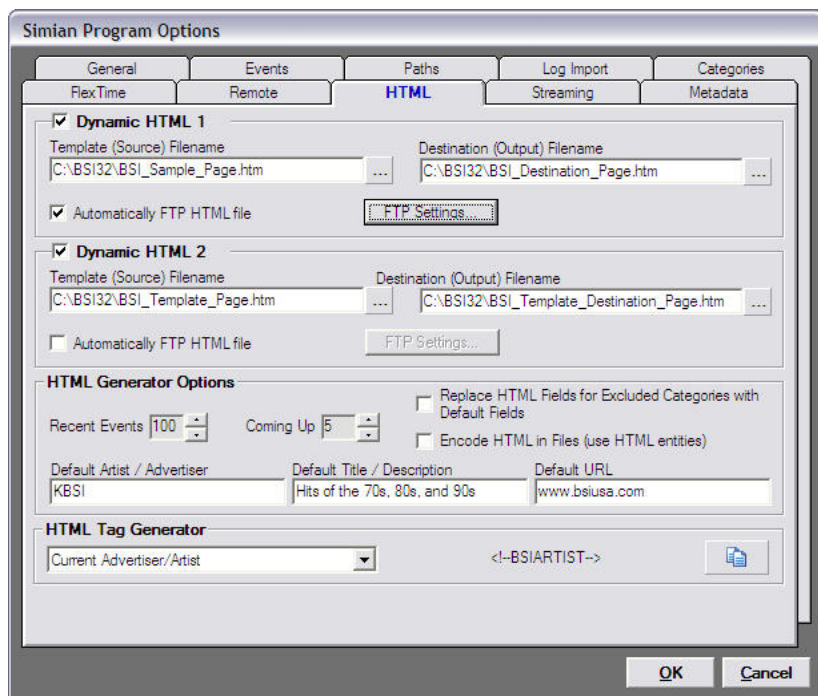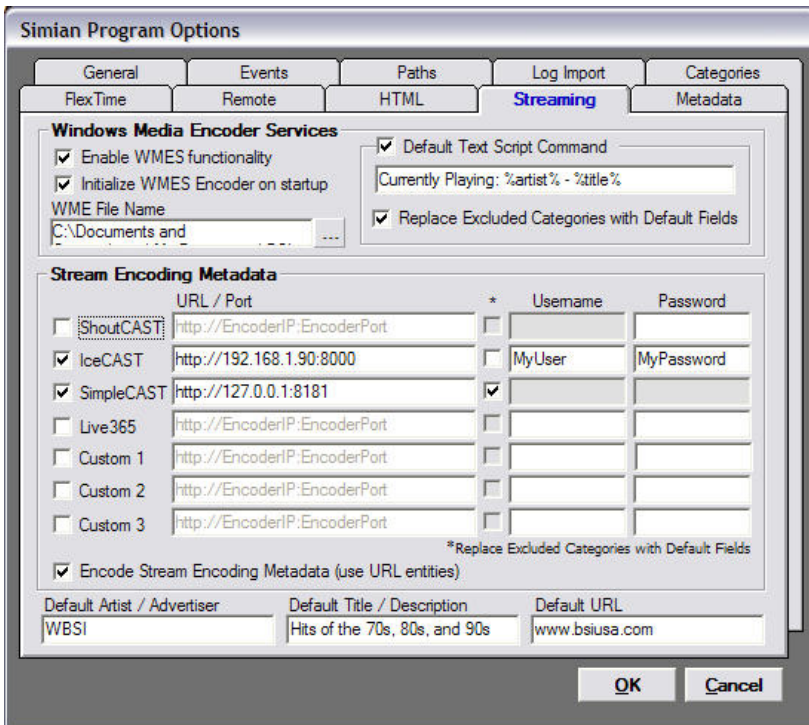
Figure 6.22

## Tools | Program Options – Streaming

Configuration of output data to your stream encoder via HTTP calls, along with output data configuration for Windows Media Encoder Services is performed here. For more info on how to configure these settings, see the section titled **Configuring Streaming (HTTP Call) Output**.



Figure 6.23

## Tools | Program Options – Metadata

Configuring the output of PAD data to your stream encoder, RDS, HD Transmitter, or other hardware via UDP or TCP output is performed here. For more info on how to configure these settings, see the section titled **Configuring Metadata (PAD, UDP/TCP) Output**.



Figure 6.24

# Simian Hardware Options

The Simian Hardware Options Window allows you to set up all of the options that you'll need to interface with your computer's expansion boards and peripherals. You'll find these options under Tools/Hardware Options.

## Playback Tab

These settings are dependent on the kind of audio card(s) you have installed in your system. Some Simian functions require a professional audio device.

**Main Deck Assignments** – This area allows you to select which audio devices you would like to assign to your four playback decks. You have the option of assigning all available devices to each individual deck or splitting them up as you see fit. If you have multiple professional grade audio cards, it's usually best to have the decks alternate between devices on different cards.

**Playback Faders & Meters** – In this area you can choose to hide the audio meters that appear



Figure 6.25

next to the three main playback decks and control your fader assignments. Configuring custom assignments is a very complex task, and we highly suggest contacting our Training Department before utilizing this feature. Turning off meters is a good way to conserve system resources on slower computers. You can also hide the audio scrubber sliders on the main playback decks here.

**Auxiliary Deck Assignments** – This is the device to be used when you audition or preview an audio file in the Play Decks, Event Builder or Info Editor. That is, when you listen to a cut on a separate or auxiliary channel (connected to studio monitors) while another event is being played on-air.

**Voice Track Editor Assignments** – These are the assignments that will be used when you are producing your Voice Tracks, not when you're actually playing them in the log. During playback in the Program Log, the regular settings for the main decks are used.  To play Voice Tracks in the Voice Track Editor, you'll need to assign audio devices to play back the three tracks. You'll need three devices so that you can overlap audio. The three drop-down lists correspond directly to those three tracks.

**Voice Track Ducking** – The **Duck Ramp** and **Ducking %** features allow you to control the length and percentage at which the background track(s) are ducked when the VoiceTrack is played back.

**Main Deck Segue** – allows you to turn the segue feature on and off, fade the last deck at segue, have your clocks count down to segue, reset decks to default volume level when they load and control the default segue length. The default segue length is disregarded if your audio files have intro and secondary tones. The default segue length also defines the length of segues that are started by pressing the space bar.

_____
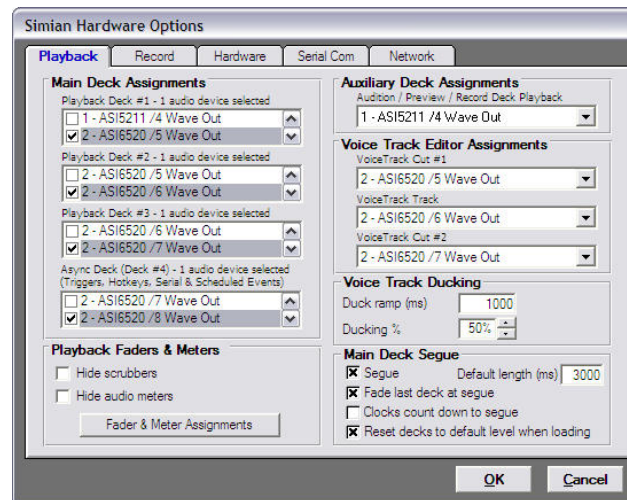
## Record Tab

Recording settings for both the record decks and the Voice Track recorder are located in the Record tab of the Tools/Hardware Options window. Just select the radio button for the device that you'd like to configure. The record decks in Simian are designed for use with long-form files such as network programs. For commercial production or song recording, you'll want to use your audio editor.

Both record decks and the Voice Track Record function need to be mapped to specific devices on a specific audio card so that you can make sure that you're recording on the same device that you have hooked up to your audio source. You also need to specify the formats for your recordings. The options vary depending on the capabilities of your installed soundcards. Once again, a professional grade sound card will give you the most options and highest quality.
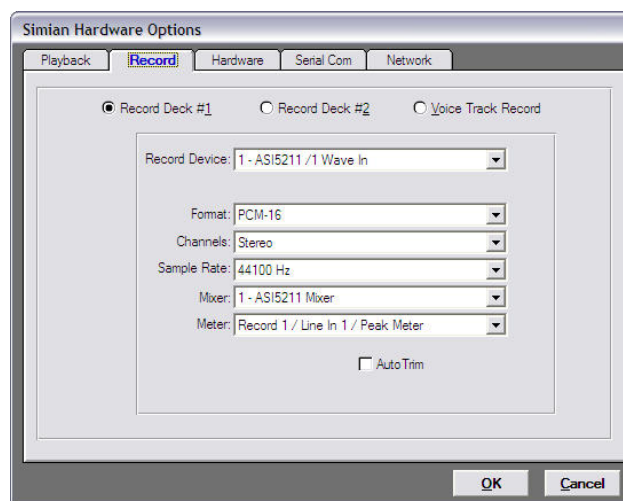
Figure 6.26

## Hardware Tab

This tab allows you to configure the way that Simian interacts with Switcher Kits, Triggers Kits and the keyboard.

**Incoming Triggers** – You can define and test Triggers here. For more information, check out the Configuring Triggers section in Chapter 3.

**Accept Forwarded IP Triggers** – If you want your instance of Simian to respond to a trigger device that another copy of Simian is physically connected to, enable this option and enter the port that other instance of Simian is sending IP triggers to.

**Forward Triggers to IP Address** – This function is the opposite side of the above **Accept Forwarded IP Triggers** function. With this option enabled, any trigger your instance of Simian receives will also be forwarded to the entered IP address and port.
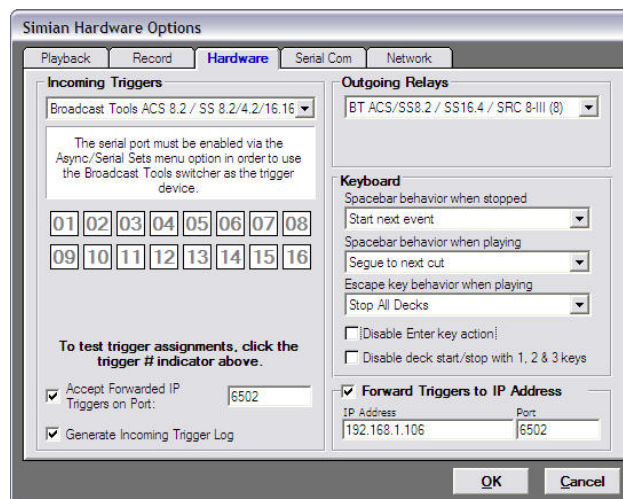
Figure 6.27

**Generate Incoming Trigger Log** – To log all incoming triggers in a text log, enable this option. Logs are generated into the Trigger Logs folder in C:\BSI32\ with a file name of Trigger_Log_[DATE].txt (where [DATE] is the date that log was generated).

**Switcher** – You can define your Switcher (GPI) device here.

**Keyboard** – Here you can define how Simian will react to common keyboard inputs, including the spacebar and escape key. Check out the Configuring Relays section of chapter 3 for more information.

**Disable Enter key action** – Simply disables your Enter key.

## Serial Com Tab

Information can be both sent to and received from external devices using your serial port. Use the **Serial** window (under **Async/Serials/Edit Sets** on the main Simian menu bar) to define the character string(s) you want to listen for. To enter a string, choose Edit/Insert Event and a window will open that asks, "What string do you want to watch for?" You can also use the SERIAL macro command (in the Event Builder) to send commands such as "START" and "STOP" to other devices. These macros go right in the log and can be cued like any other event.

The information needed to set up serial communications on this tab is available from your peripheral's manufacturer. Here's a quick overview:
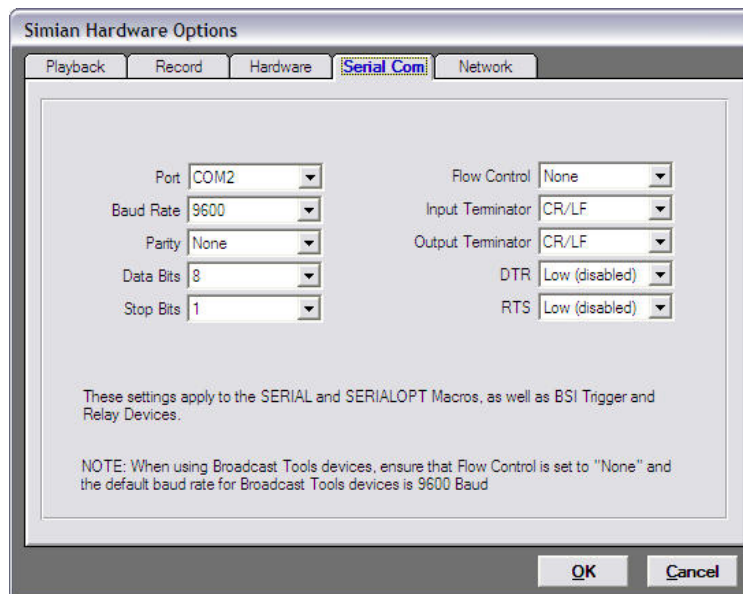
Figure 6.28

**Port** — Choose your preferred communication port setting. Valid options are COM1 through COM4.

**Baud Rate** — Choose the baud rate. Valid rates range from 300 to 28,800.

**Parity** — Choose the parity setting. This is the method of byte validation. Valid options are Even, Odd, Mark, or Space.

**Data Bits** — Choose the data bit transfer rate. Valid options are 4 through 8.

**Stop Bits** — Choose the stop bit rate. Valid options are 1, 1.5 and 2.

**Flow Control** — Choose the flow control setting. Valid options are Hardware, None, XOn/XOff, and Both Hardware and XOn/XOff.

**Input Terminator** — Choose CR (Carriage Return), LF (Line Feed), or CR/LF.

**Output Terminator** — Choose CR, LF or CR/LF.

**DTR** — This is a non-standard hardware-level option that is sometimes required by an external device. This option is normally set for Low (Disabled).

**RTS** — This is a non-standard hardware-level option that is sometimes required by an external device. This option is normally set for Low (Disabled).

## Network Tab

The Network tab contains options to configure a connection to a Simian Gateway to allow the Simian Remote for PC and the Simian Remote for iPad to connect to your Simian system. It also contains the settings for Incoming TCP/IP or UDP Meta-Data Control, which allows Simian to be controlled by text information, such as PAD data, to control your instance of Simian, such as when you want to replace Station IDs or advertisements based on meta data received from another instance of Simian, or other automation system.

### Enabling The Remote Gateway Connection

The Simian Gateway application requires a connection to your instance of Simian via TCP/IP. You must configure and enable these settings before the Simian Gateway will be able to connect to your instance of Simian. The Simian Gateway is the remote connection management application that Simian Remote applications connect through. Simian Remote clients can not connect directly to an instance of Simian, they must connect through the Simian Gateway application.

To configure the Remote Gateway Connection settings, click on the **Enable Remote Gateway Connection** option so that the fields become available for modification.

The **Connection Password** is the password your instance of Simian will require for a Simian Gateway application to connect (this is NOT the password the remote users will use to connect through the Simian Gateway).

The **TCP Port** field needs a valid, available port number between 1024 and 65,535 for the Simian Gateway to connect to. This port will not be the port the Simian Remote clients connect to.

The **Data Refresh Rate** dropdown determines the playback deck update cycle speed from Simian to the Simian



Figure 6.29

Gateway. If you are running the Simian Gateway application on the same system as Simian, you can usually set this dropdown to Fast or Very Fast. If you are running the Simian Gateway on a separate machine, you can experiment with the speed based on your network speed and how much of your network's bandwidth you want to use (on a gigabit network, even the Very Fast option is a very small percentage of your network's bandwidth).
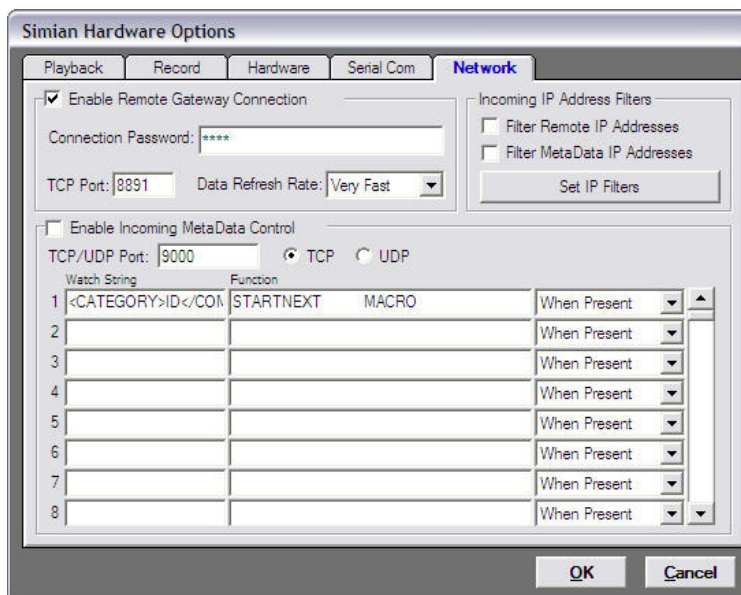
### Enabling Incoming MetaData Control

Incoming MetaData control is equivalent in concept to Simian's hardware based GPI triggers, except that it responds to ASCII text received via TCP/IP or UDP. There are 30 available "Watch Strings", which are the text keywords (or key-sentences, if you will) that Simian will watch for and react as you desire. You can set Simian to perform any macro, audio file, or any other type of event when it detects your keyword.

To enter a Watch String, simply type your required text into the Watch String field for an available event line. To assign a function to that watch string, create your desired event in the Event Builder and then drag and drop it into the Function field.

You can switch the logic of your watch string by setting the When Present/When Not Present dropdown for your watch string event.

### Incoming IP Address Filters

If your Simian system(s) and/or MetaData servers are set up with static IP addresses, you can enable the Incoming IP Address Filter function. You can configure specific IP addresses that Simian will allow to open a connection with so that non-authorized IP address will not be allowed to connect. Simply enable the filter type you want to engage, then click on the **Set IP Filters** button. You will be presented with a window to enter your allowed IP addresses. Note that the IP addresses are exact-match only, no wild cards are available.

# Weather Information
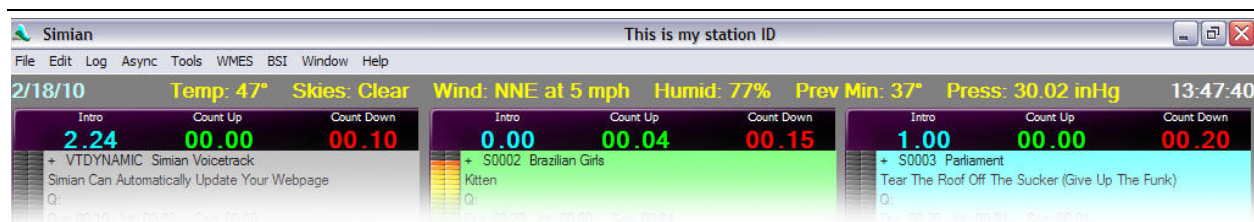


Figure 6.30

The Weather Information window displays the current conditions (as obtained from www.wunderground.com) and the weather forecast (as obtained from www.noaa.gov). To view this window, go to the Tools menu and choose Weather Info, or you can press Ctrl + W on your keyboard, or

you can also click on the weather info display at the top of Simian's main user interface (as shown above the main playback decks in Figure 6.30) if the weather conditions have previously been obtained. You will be presented with the window shown in Figure 6.31.

To get your own current conditions, enter your Zip/Postal code or IATA/ICAO Airport Code (for those not in the United States) and click on the Update Weather button. Not only will the Current Conditions window be populated with your current conditions, but the area above the main playback decks on Simian's main user interface will show the weather conditions. You can use the GETWEATHER macro to update your current weather
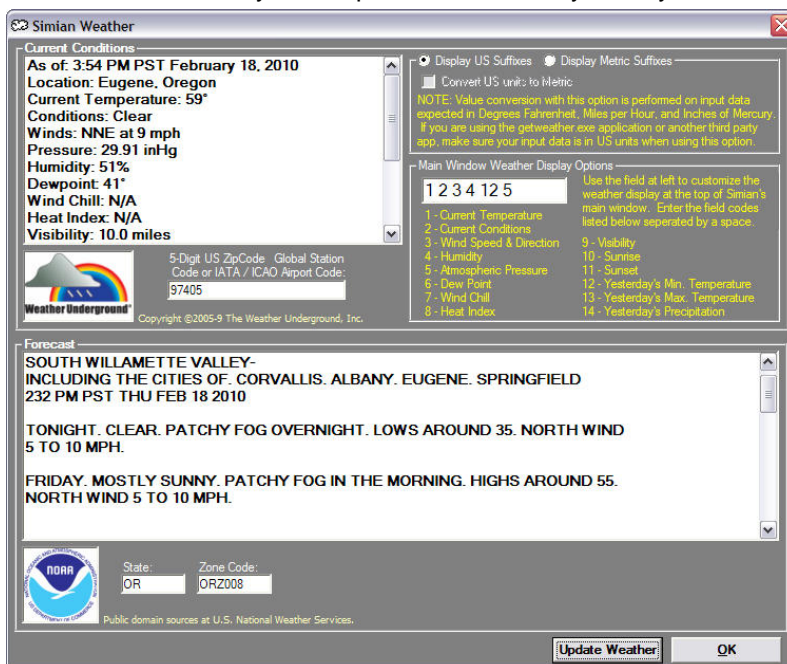


Figure 6.31

conditions as well…and if you put that macro in the Scheduled Events, you can schedule it to update your weather every-so-often to keep the weather info current.

If you do not use US/English units, there are several options available to show Metric units and/or convert US/English data to Metric data.

If you are getting the weather data (obtained from www.wunderground.com) by clicking on the **Update Weather** button or using the GETWEATHER [ZIPCODE] macro with a zip code/postal code or GETWEATHER STATION, [STATIONCODE] option, it will be in US/English units. To convert this data to Metric data and also display Metric unit suffixes, use the **Display Metric Suffixes** option and also enable the **Convert US units to Metric** option. The next time you update the weather data, it'll be in metric units.

If you are using the GETWEATHER FILENAME, [FILE PATH] macro to get data from your own .ini file which is already in Metric units, use the **Display Metric Suffixes** option (with the **Convert US units to Metric** option disabled) to show kph/hPa/kilometers rather than mph/inHg/miles.

The **Main Window Weather Display Options** section allows you to select what data Simian's main user interface weather display will show, and in what order. The text field allows you to type in the weather field codes, each separated by a single space. For example: If you want Current Temperature, Current Conditions, Wind Speed & Direction, Yesterday's Minimum Temperature, and Yesterdays Maximum Temperature to be displayed, you could enter "1 2 3 12 13" into the field, and the next time you update your weather information it'll be displayed that way at the top of Simian's user interface.

To display **Forecast** information, you will need to enter your state (only available for US areas) abbreviation, and your area's **Zone Code** (which can be obtained using the **Weather Zone Code Finder** utility available in the Free Utilities section of www.bsiusa.com) into the corresponding fields in the Weather Info window and clicking on the Update Weather button. The GETFORECAST [ZONECODE] macro can also be used to update your forecast information.

## Manual Metadata



Figure 6.32: The Manual Metadata window allows you to manually output HTML/HTTP/TCP/UDP/Serial data for events that don't originate from automation.

For users who would like meta data to show up on their Dynamic HTML page or be sent via the Metadata(TCP/UDP output), Stream Encoder data (HTTP call data), or serial data, and be logged to the Event Logs, the Manual Metadata window is available. This function is perfect for stations that have morning talk shows, non-automation music shows (the music source might be vinyl, or live music, for instance), donation shows, among others.

### Setup

Dynamic HTML, Metadata, and Stream Encoding output uses the same configuration as has been set up in the HTML, Metadata, and Streaming tabs of Simian's Hardware Options.

Serial data output is configured by clicking on the **Configure Serial Output** button. If you are using a SERIAL macro to output meta data to a serial based RDS encoder or other device, you can use your same serial command here. The same meta-variables used with the SERIAL macro are used here.

Each field in the Manual Metadata window can be set to a default. The default entry for each field will be used if that field is left blank when the **Send Data Now** button is clicked. To set your default fields, type text into the desired fields for your default entries and click on the **Set Current as Default** button. All entries will replace the current default entries as their defaults. To erase all default entries, click on the **Reset Defaults** button.

If you would like the data you send to be included in your Event Logs, enable the **Add Sent Data to the Event Log** option. This is useful for stations that play non-automation music that they need to log for licensing purposes.

### Usage

To output data, simply enter the data you wish to send into the available fields and click on the **Send Data Now** button. Your data will be sent out your configured Dynamic HTML page(s), Metadata (TCP/UDP data), Stream Encoder (HTTP Call) output, and Serial output.

If you have Simian configured to show Album Art, the Manual Metadata function will try to find any matching album art picture files based on the Artist and Album data you entered. If it does not find any Album Art, it'll show your station logo instead.

To clear all the fields, click on the **Clear Fields** button.

# Language Editor



6.33: The Language Editor allows you to modify any menu name, text, description, or error message from its default English.

For non-English Simian users, the Language Editor is offered.  You can change the text on any button, label, menu, description, error message, etc..

## Setup

To access the Language Editor, go to the Window menu in Simian and choose Security.  You will be prompted to log in before being able to access the User Security window.  On the Menus tab of the User Security window, click on the Modify Language Options button.  You will be presented with the window shown in Figure 6.33 above.

The Language Editor is organized with tabs for each major section, and a general tab for lesser sections. You will notice that some fields have a grey background.  This indicates that a particular field is repeated in multiple screens.  Editing an entry in one of these fields will also update any of the repeated fields by that same name.

On the General tab, you can choose to use the default English entries (without effecting your customizations), or use your Custom Language Options.  The **Reset All Fields to Default** button will erase all customized fields and reset them back to their default English entries.

# Appendix

## Macros

Macro commands are among the most powerful features of Simian which allow you to easily control many of Simian's functions automatically.

Unlike Macros in other programs (that work by making you 'record' different sequences of keystrokes), Simian uses a series of different 'keywords' to control various aspects of your automation system. Thus, the process is much easier to understand and operate – especially as the keywords are available from a drop down list box!

Once you've entered any required options or parameters to the end of the Macro Keyword (typically, these are separated by commas), the completed Macro Command Line can easily be 'drag and dropped' from Event Builder and added to the Program Log, Scheduled Events, Triggers, Serial Sets, HotKeys, or placed within Carts in exactly the same way as you'd add audio events to a Cart.

If you're already a Macro expert, then there's no need to scroll through the drop-down list box, you can simply write your Macro Command Line into the box then drag and drop it. (This is also the only way to enter any 'hidden' Macros that do not appear in the drop down list).

The Macros are listed on the 'Macro' tab of Event Builder and are described more fully in the following pages of this manual.

> Although easy to use, some Macros can use several different optional parameters. If you find that you are using the same Macro repeatedly, or would like to give the Macro a clearer description, we suggest that you create a Virtual Cart and enter the Macro into the cart. The Macro will run in the same way but the Virtual Cart allows you to assign a more meaningful description of what you're using the Macro for. The Virtual Cart can then be easily drag and dropped wherever it's needed.

In the following pages, the **MACRO NAME** is shown in **BOLD CAPITALS**.

Any additional *COMPULSORY COMMANDS* or *PARAMETERS* are shown in *UPPER CASE ITALICS*. If the COMMANDS and/or PARAMETERS are optional, they will be contained within *[SQUARE BRACKETS]*.

Required customer parameters are shown in `lower case italics`

Multiple options are *separated / by / slashes*

Where you need to enter additional information about the Macro, details are usually separated by a comma symbol ','.

Don't worry if that sounds a little complicated, we've added Examples and Descriptions for all the Macros available and useful **TIPS** on how to get the most out of each of the Macros too.

As Macro documentation and examples are currently under review, please check that you have the latest version of this document:

*(Simian 2.1 Pro Macros – Doc Rev 2.1.1)*

### ADDEVENT

Allows you to add a (one off) event to the program log at the Sec Tone or End of the currently playing deck, or when the next deck Starts playing. The Additional Event can be an audio file, virtual cart or Macro command.

The ADDEVENT Macro would normally be assigned to an incoming trigger.

*(Continued next page)*

_____

**SYNTAX**

ADDEVENT *SECTONE/END/START, AUDIO/CART/MACRO, command*

**EXAMPLES**

**ADDEVENT** *SECTONE, MACRO, RELAY 1,100*

Your EAS unit sends an alert pulse to an incoming trigger, but rather than interrupt programming immediately, you play the announcement at the end of the audio playing by sending a relay command to your EAS unit.

**ADDEVENT** *SECTONE, CART, GO2_GAME*

To insert a Live Game report from a remote location using the CircuitWerkes DR-10, first you dial into your DR-10 and send a trigger pulse to Simian. A cart (GO2_GAME) is assigned to that trigger, containing the following sequence to play a jingle and put the DR-10 to air.

**AUTOMATION** *ASSIST*
+ *jingle.wav*
+ **MIXVOLUME** *1,100*

On a second trigger pulse from the DR-10, you'd have another cart to restart automation

+ **MIXVOLUME** *1,0*
+ **AUTOMATION** *FULL*
+ **STARTNEXT**

## ALLSTOP

The equivalent of pressing an 'Emergency Stop' button - use with care!

If AUTOMATION is ON, then Simian will step to the next event to play.

**SYNTAX & EXAMPLE**

ALLSTOP        (no variables necessary)

## AUTOMATION

Selects the different Automation modes (has the same effect as pressing the Automation mode button.

**SYNTAX**

**AUTOMATION** *OFF / ASSIST / FULL*

**EXAMPLES**

**AUTOMATION** *OFF*

Turns off automation

**AUTOMATION** *FULL*

Selects FULL automation mode

**AUTOMATION** *ASSIST*

**TIP**

You can assign the different AUTOMATION macros to different hotkeys (to save having to cycle through the opens using the automation mode button).

Add an **AUTOMATION** *FULL* Macro as a scheduled event at the end of your live programming to ensure your automation system runs while the station is unattended.

_____

_____

## CHAIN

Loads a new Program Log with optional meta-variables to automatically work out the next day's log.

CHAIN replaces the older LOG Macro as it is more versatile and can be run as a scheduled event once a day rather than being added to every Program Log.

### SYNTAX

> **CHAIN** *LogName [,NORELOAD] [,DefaultLogName]*

The *LogName* can be the full name of your log (excluding the .bsi extension) or for more versatility can contain any of the following meta-variables which Simian will substitute for the correct values each time the macro is run. If there is an error loading the specified log, the CHAIN macro will attempt to open the log "Default.bsi" if it exists in your log directory. **ALL VARIABLES ARE BASED ON THE FOLLOWING DAY'S DATE WHEN CURRENT SYSTEM TIME IS BETWEEN NOON AND MIDNIGHT, AND TODAY'S DATE WHEN CURRENT SYSTEM TIME IS BETWEEN MIDNIGHT AND NOON.**

| | |
|---|---|
| *%M* – 2 digit month | *%W* – 3 letter day of week |
| *%D* – 2 digit day | *%T* – for DATE based on MMDDYY |
| *%Y* – 2 digit year | *%X* – Converts to "WKD" on weekdays, "SAT" on |
| *%Z* – 4 digit year | Saturdays, and "SUN" on Sundays. |

*NORELOAD* – This optional parameter prevents the current log being reloaded in case of error

*DefaultLogName* – This optional parameter will load a specified default program log (meta variables can be used) if the log specified by LogName can not be loaded. If the log specified by DefaultLogName can't be loaded, "Default.bsi" will be loaded.

### EXAMPLES

> **CHAIN** *%W, MyDefault*

Loads tomorrow's program log based on the 3 letter day of the week (i.e. mon.bsi, tue.bsi, wed.bsi, thu.bsi, fri.bsi, sat.bsi, sun.bsi). If that log can't be found, the log "MyDefault.bsi" will be loaded.

> **CHAIN** *%D%M%Y, NORELOAD, MyDefault*

Loads tomorrow's program log based on the Day, Month and Year (i.e. *060205.bsi*, *060305.bsi* etc.). If that log can't be found, the log "MyDefault.bsi" will be loaded.

You can also add a prefix or suffix to the variables (or even in the middle). If you have multiple stations you might use:

> **CHAIN** *FM%D%M%Z, NORELOAD*

> **CHAIN** *AM%D%M%Z, NORELOAD*

> **CHAIN** *KBSI%D%M%Z, NORELOAD*

> **CHAIN** *KUGN%D%M%Z, NORELOAD*

This will load program logs for tomorrow based on the format *FM06022005.bsi*, *AM0602005.bsi*, *KBSI0602005.bsi* and *KUGN0602005.bsi*

In the above four examples, there is a 4 digit year because we used the *%Z* variable).

**TIP**

Enter the **CHAIN** Macro as a Scheduled Event once only. It is most commonly run at 23:59:50 every night. Depending on the time of day, it will either load the log for tomorrow (when the macro is run between noon and midnight), or today (when the macro is run between midnight and noon). Set once and forget

_____

_____

## CLEARSTATUS

Clears all status information in the currently loaded Program Log (the X or E in the Status column and the time from the Actual Time column). This allows previously used Program Logs to execute timed events again where the Save Event Play & Error Info setting would have marked them as already played.

**SYNTAX & EXAMPLE**

**CLEARSTATUS**          (no variables necessary)

## COMPACTDATABASE

Refreshes and rebuilds the audio database (usually *c:\bsi32\audio.mdb*). This will reduce the size of the database if there have been a high number of refreshes since the last COMPACTDATABASE which will help to improve access speed.

**SYNTAX & EXAMPLE**

**COMPACTDATABASE**          (no variables required)

**TIP**

Run once a day as a Scheduled Event. This is best done during a quiet automated period as the Event Builder is not available for a short time while the Macro is running.

## COMPACTHEAP

Attempts to free up unused memory which reduces Windows total memory usage and enables Simian to run longer between reboots.

**SYNTAX & EXAMPLE**

**COMPACTHEAP**          (no variables required)

**TIP**

Schedule the COMPACTHEAP Macro to run once a day (as a Scheduled Event).

## COUNTDOWN

Performs a countdown in the Play Deck as if an audio file was being played(does not effect triggers, hotkeys, or other asynchronous events). Can be canceled by the ESCAPE key or STOP button. Useful for keeping track of satellite broadcast segments.

**SYNTAX**

**COUNTDOWN** *Seconds*

**EXAMPLE**

**COUNTDOWN** 120

Will cause the deck to count down for 120 seconds.

NOTE: While a countdown is greater than 3600 seconds (1 hour), the display resolution of the clock is in hours and minutes

---

_____

## DECKFADE

Fades up or down the specified play deck(s) over a specified period of time.

### SYNTAX

**DECKFADE** *DECK#/ALL/CURRENT,  START%/CURRENT,  END%,  MS,  UNLOAD/STOP,*
*[RETURN]*                (this command is all typed on one line but is split here to show the options)

*DECK#* - the play deck number, *ALL* (all 3 play decks) or *CURRENT* (the currently playing deck).

*START%* - the start volume level.  Usually you will enter *CURRENT* for the current volume, but you can specify a fade to start anywhere from 100 to 0 (full volume to mute)

*END%* - the end volume level.  Usually 0 being mute, but fades can go up as well as down to any value between 0 and 100.

*MS* – duration of fade in milliseconds

*UNLOAD* – unloads the deck that was playing

*STOP* – stops the deck that was playing

*RETURN – this optional parameter returns the volume level to the original value.*

### EXAMPLES

**DECKFADE** *ALL,  100,0,5000,UNLOAD,RETURN*

**DECKFADE** *CURRENT,  CURRENT,0,20000,STOP,RETURN*

## DECKVOLUME

Sets the volume level of the specified play deck.

### SYNTAX

**DECKVOLUME** *#,%*

*#* - the play deck # (*1*, *2* or *3*), *CURRENT*, *NEXT* or *LAST*

*%* - the volume level where 100 is full and 0 is mute

### EXAMPLES

**DECKVOLUME** *1,80*

**DECKVOLUME** *NEXT,50*

**DECKVOLUME** *CURRENT,80*

**DECKVOLUME** *CURRENT,100*

### TIP

Using this Macro in a cart is an easy way to have a HOTKEY automatically 'duck' the level of the currently playing deck.

**DECKVOLUME** *CURRENT,80*

+ *filename*

+ **DECKVOLUME** *ALL, 100*

_____

## DELAYEXECUTE

Delays the execution of a macro or audio file for a specified length of time.

### SYNTAX

**DELAYEXECUTE** [ATTIME], Time, Category, Filename/Macro Description

When the ATTIME variable is included, the Time variable is a specific time on the clock (IE: 12:00:00 will execute the specified event at noon regardless of when the DELAYEXECUTE macro is actually run.).

With the ATTIME variable omitted, the Time variable is a *length* of time (eg: 3:00 will delay the execution of the specified event for three minutes from when the DELAYEXECUTE macro is run).

The Category variable can be either AUDIO to execute audio files, or MACRO to run a macro.

The Filename/Macro Description variable will be the file name of an audio file (without path or file extension) if the Category variable was specified as AUDIO, or it will be a full MACRO description (with that macro's particular variables) if the Category variable was specified as MACRO.

### EXAMPLES

**DELAYEXECUTE** 3:00*, MACRO, RECORD START, 1, NEWS1, 5:00*

The RECORD macro specifies that a 5 minute recording will start on record deck 1 and will be given a file name of "NEWS1". Since this macro is "stacked" behind the DELAYEXECUTE macro, and it specifies 3:00 (without the ATTIME variable), the recording won't start until three minutes have elapsed from the time the DELAYEXECUTE macro is executed.

**DELAYEXECUTE** ATTIME, 13:00:00, MACRO, CHAIN ballgame

When the above macro is run, since the ATTIME variable is included, the Time variable is interpreted as a specific time on the clock (as opposed to a delay amount), so the CHAIN macro that is "stacked" behind it will be run at noon, which will load a program log called "ballgame".

#### TIP

Use this macro to delay the start of a multi-part record until the end of a break when you only have start-of-break closures provided by your satellite show's originator or execute any macro you want to run after a specified delay.

## ENTERKEY

Duplicates the behavior of the keyboard ENTER key. This Macro should only be used in Trigger, Hotkey and Serial sets (never in the main program log).

In LIVE ASSIST mode this would load the currently highlighted event into a deck.

In FULL AUTOMATION mode this would load the currently highlighted event into a deck and start playing it.

### SYNTAX & EXAMPLE

**ENTERKEY**    (no variables required)

## EXITSIMIAN

Exits the Simian application, and also allows you to save changes to the log and engage the Crash Recovery feature so that Simian will open up and start playing at the same point in the program log.

*(Continued next page)*

_____

_____

> **EXITSIMIAN** *[RECOVER] [,SAVE/DONTSAVE]*

With no variables included, the EXITSIMIAN macro behaves in the exact same manner as going to the File menu and choosing Exit. If changes have been made to the Program Log and not saved, you will be prompted to save changes.

The RECOVER optional variable will engage Crash Recovery if it has been enabled in your Program Options configuration. This means that the next time you open Simian, it will load the previously open Program Log, and also start playing at the last position in the Program Log.

Including the optional SAVE variable will save any changes made to the log before exiting Simian, and it will also suppress any Save or Exit pop-up confirmations before exiting. The DONTSAVE optional variable can be used instead of the SAVE variable, and will discard all changes to the currently open Program Log before exiting.

**EXAMPLES**

> **EXITSIMIAN**

> **EXITSIMIAN** *DONTSAVE*

> **EXITSIMIAN** *RECOVER, SAVE*

## FILECOPY

Copies a Source File to a Destination

**SYNTAX**

> **FILECOPY** *SourceFileName, DestinationFileName*

Filenames must include the full path to the file

The *SourceFileName* and *DestinationFileName* variables can be a full path as entered, or for more versatility can contain any of the following meta-variables which Simian will substitute for the correct values each time the macro is run. **ALL VARIABLES ARE BASED ON THE CURRENT DAY'S DATE**

| | |
|---|---|
| %DDD% - three letter day of week | [Ex: Mon, Tue, Wed, Thu, Fri, Sat, Sun] |
| %MM% - month | [Ex: 01=January, 02=February, etc.] |
| %DD% - day | [Ex: 01 through 31] |
| %YY% - two-digit year | [Ex: 08 for 2008] |
| %YYYY% - four-digit year | [Ex: 2008, 2009, 2010, etc.] |
| %HH% - current hour | [24 hour cycle, Ex: 23 for 11:00pm] |

%TODAY% - returns date in the following format mmddyy
%TOMORROW% - returns tomorrow's date in the following format mmddyy
%TIME% - returns the current time of the start of the recording  (EX: 22:30:45)
%TIME% - returns the current time of the start of the recording  (EX: 22:30:45)

**EXAMPLES**

> **FILECOPY** *D:\AUDIO\SPOTS\%DDD%.wav, D:\AUDIO\SPOTS\today.wav*

> **FILECOPY** *C:\BSI32\TIMES\header1.wav, C:\BSI32\TIMES\header.wav*

**TIP**

Can be used to automatically 'update' a spot or other audio event automatically (from scheduled events, or as an event within a cart) or to change the `c:\bsi32\times\header.wav` file to have a different introduction each time **SAYTIME** is used.

_____

_____

## FILEDELETE

Deletes a specified filename

**SYNTAX**

**FILEDELETE** *FileName*

FileName must include the full path to the file

The *FileName variable* can be a full path as entered, or for more versatility can contain any of the following meta-variables which Simian will substitute for the correct values each time the macro is run. **ALL VARIABLES ARE BASED ON THE CURRENT DAY'S DATE**

| | |
|---|---|
| %DDD% - three letter day of week | [Ex: Mon, Tue, Wed, Thu, Fri, Sat, Sun] |
| %MM% - month | [Ex:  01=January, 02=February, etc.] |
| %DD% - day | [Ex: 01 through 31] |
| %YY% - two-digit year | [Ex: 08 for 2008] |
| %YYYY% - four-digit year | [Ex: 2008, 2009, 2010, etc.] |
| %HH% - current hour | [24 hour cycle, Ex: 23 for 11:00pm] |

%TODAY% - returns date in the following format mmddyy
%TOMORROW% - returns tomorrow's date in the following format mmddyy
%TIME% - returns the current time of the start of the recording  (EX: 22:30:45)

**EXAMPLES**

**FILEDELETE** *D:\AUDIO\SPOTS\WEEKEND.WAV*

**FILEDELETE** *D:\AUDIO\LINERS\PROMO07.WAV*

## FILLSCHEDULEDTIMES

Rebuilds the times listed in the Scheduled column of the program log based on any timed events, and the lengths of the events in the program log.

**SYNTAX**

**FILLSCHEDULEDTIMES**

## FLEXTIME

Sets the current FlexTime mode, using the parameters setup in:

**Tools | Program Options | FlexTime**

**SYNTAX**

**FLEXTIME** *OFF/PITCH/BACKTIME*

**EXAMPLES**

**FLEXTIME** *OFF*

**FLEXTIME** *PITCH*

**FLEXTIME** *BACKTIME*

## FTP

Connects to remote FTP server and performs the FTP GET or PUT functions.

NOTE:  This macro's functionality has changed from previous versions of Simian.  Simian no longer requires separate CONNECT, GET/PUT, and DISCONNECT macros.  Only a single macro of the new style is required to upload or download files.  The older style of FTP macros will

*(Continued next page)*

_____

_____

not be covered here since it is now recommended to use the new FTP macro style since it automatically takes care of all the connect/wait/transfer/wait/disconnect "leg-work" for you.

**SYNTAX**

---

**FTP** *[GET/PUT], Server, Port, Account, Password, Local File Path, Remote File Path [, PASSIVE]*

---

The *Local File Path* and *Remote File Path* variables can be a full path as entered, or for more versatility can contain any of the following meta-variables which Simian will substitute for the correct values each time the macro is run. **ALL VARIABLES ARE BASED ON THE CURRENT DAY'S DATE**

%DDD% - three letter day of week       [Ex: Mon, Tue, Wed, Thu, Fri, Sat, Sun]
%MM% - month                           [Ex:  01=January, 02=February, etc.]
%DD% - day                             [Ex: 01 through 31]
%YY% - two-digit year                  [Ex: 08 for 2008]
%YYYY% - four-digit year               [Ex: 2008, 2009, 2010, etc.]
%HH% - current hour                    [24 hour cycle, Ex: 23 for 11:00pm]
%TODAY% - returns date in the following format mmddyy
%TOMORROW% - returns tomorrow's date in the following format mmddyy
%TIME% - returns the current time of the start of the recording  (EX: 22:30:45)

**EXAMPLES**

---

**FTP** *PUT,    ftp.mysite.com,    21,    myuser,    mypassword, c:\bsi32\webpage.html, /public_html/nowplaying.htm, PASSIVE*

---

The above macro will connect to ftp://ftp.mysite.com, on port 21 (the default FTP port) and log in with a username of "myuser" and password of "mypassword".  The file "webpage.html" from the C:\bsi32 folder will be uploaded into the root directory for the user in the subfolder /public_html/ and named as "nowplaying.htm".  Since the PASSIVE command is included, the FTP server will be connected to in Passive mode.

---

**FTP** *GET,    ftp.mysite.com,    21,    myuser,    mypassword d:\audio\vtracks\forecast.mp3, /audio/weather/midday.mp3*

---

This version of the FTP macro will connect to ftp://ftp.mysite.com on port 21 (again, the default FTP connection port) and log in with the username "myuser" and password "mypassword.  The file "midday.mp3" from the user's subfolder /audio/weather/ will be downloaded and saved into the "d:\audio\vtracks\" folder and named "forecast.mp3".   Since there is no command for "PASSIVE" at the end of this macro, the FTP server will be connected to in standard mode.

## GETFORECAST

Retrieves the current US NOAA weather service forecast for your zone area and displays the forecast in the Weather Windows (CTRL-W).  (Use the BSI ZoneFinder utility to discover your local zone area).

NOTE:  This macro requires Port 80 open, so make sure to set your firewall/router accordingly.

**SYNTAX**

---
**GETFORECAST** *State, Zone*
---

*State* your two letter State code (i.e. *OR*)

*Zone* your four character NOAA Zone area (i.e. *ORZ001*)

**EXAMPLE**

---
**GETFORECAST** *OR, ORZ001*
---

_____

## GETWEATHER

Retrieves the current weather conditions for your ZipCode, Airport or International Weather Station code from Weather Underground.

NOTE: This macro requires Port 80 open, with access to www.wunderground.com, so set your firewall/router accordingly.

Simian will also receive the weather conditions from a local file, allowing customers to write interfaces between local weather stations to write the local information and have Simian use it.

### SYNTAX

**GETWEATHER** *ZIPCODE*

**GETWEATHER** *[ZIPCODE,] ZIPCODE*

**GETWEATHER** *STATION, STATIONCODE*

**GETWEATHER** *FILENAME, FILENAME*

*Zipcode* is your five digit Zipcode or three digit Airport code

*Stationcode* is the Global Weather Station Code used by Weather Underground. To obtain these codes, visit **http://www.wunderground.com/auto/raw/global** and drill down to your Country and City (note that Global Stations are not updated as frequently as domestic US weather stations). Then note the code at the end of the Weather Forecast URL.

*Filename* is the path and filename to a local .ini file containing the following information:

```
[Weather]
Temp=83
Conditions=Sunny
Visibility=10.5
Winds=WNW at 2
Pressure=29.95
Humidity=60%
Dewpoint=71
Time=9:00 AM PST October 4, 2005
City=Springfield
State=Oregon
```

### EXAMPLES

**GETWEATHER** *97477*

**GETWEATHER** *ZIPCODE, 90210*

**GETWEATHER** *STATION, 08373*

**GETWEATHER** *FILENAME,* c:\bsi32\weather.ini

#### TIP

In the event that Windows encounters a Network error, either locally or with the Internet Connection, while attempting to retrieve the weather information, Simian may be given a lower operating priority as Windows diverts resources to obtaining the weather. To prevent this having a detrimental effect on Simian we now provide a GETWEATHER application which will write the weather to c:\bsi32\weather.ini, from where Simian can read it. GETWEATHER.exe can be run hourly as a Scheduled 'APP' event without affecting Simian

_____

_____

## GOTO

Moves to a specified position in the program log based on scheduled time or the description field of a **COMMENT** Macro and makes that event 'next to play'. The optional *NOW* parameter has the same effect as a timed immediate event.

**SYNTAX**

**GOTO** *TIME, hh:mm:ss/CURRENT, [NOW]* or

**GOTO** *label, [NOW]*

**EXAMPLES**

**GOTO** *TIME, 06:00:00, NOW*

Moves the program log to the first event with a scheduled time at or after 6am. This Macro will have no effect if there are no Scheduled times entered in the Program Log.

**GOTO** *TIME, CURRENT, NOW*

Moves the program log to the first event with a scheduled time at or after the time at which the Macro was executed. (This Macro can be used to advance the log to the current time of day when first opened.)

**GOTO** *rockshow, NOW*

**GOTO** *end-of-game, NOW*

Moves the program log to the line that says *REM rockshow* or *REM end-of-game*

## HOTKEY

Plays a specified HotKey (never run this Macro FROM a HotKey).

**SYNTAX**

**HOTKEY** *HOTKEY#*

**EXAMPLE**

**HOTKEY** *5*

Plays HotKey # 5 of the currently loaded HotKey set.

## HTMLTEXT

Allows you to dynamically replace user defined tags in the HTML template file with user defined text in the HTML destination file without having to edit the entire page.

Tags are entered in the template file as `<!--usertag-->` and are thus in a static position.

**SYNTAX**

**HTMLTEXT** *usertag, usertext*

**NOTE:** Since Simian uses the comma to parse macro meta variables, if you desire to use a comma in the *usertext,* the HTML code for a comma ("&#44", without the quotes) must be used instead so that it is parsed correctly.

*(Continued next page)*

_____

**HTMLTEXT** *usertag, My Text To Replace The Tag*

Replaces <!--usertag--> in the template HTML file with 'My Text To Replace The Tag' in the destination HTML file

**HTMLTEXT** *othertag, Text To Replace Other Tag&#44 including a comma*

Replaces <!--anothertag--> in the template HTML file with 'My Text To Replace Another Tag' in the destination HTML file

**HTMLTEXT** *usertag* or **HTMLTEXT** *anothertag*

clears the replaced tag in the destination HTML file

### TIPS

To illustrate the possibilities, the following examples are extreme!

Add <!--alarm--> to your template HTML file.  Then, wire your station's intruder (or other) alarm to one of Simian's incoming triggers with the following Macro assigned to that trigger.

**HTMLTEXT** <!--alarm-->, *<B>Our building has been broken into&#44  please dial 911</B>*
**HTMLTEXT** <!--alarm-->, *<B>We apologize for the dead-air&#44  please page our engineer on xxx-xxxx to fix the problem</B>*

Or, you could add <!--jockinfo--> to your template HTML file and allow your staff to alter that line of text on the web site.  For example:

**HTMLTEXT** *<!--jockinfo-->, <I>Call me now for a chance to win!</I>*

## HTTPOUT

Outputs a user created HTTP request.  This macro will NOT open a web page, as no browser is opened.

This macro is used in conjunction (or instead of) the built in Streaming Metadata function to send static HTTP request type data.  This macro could be used to update your stream encoder or RDS with info for a live show or satellite show where audio file song and title data isn't available.

### SYNTAX

**HTTPOUT** *urlstring*

### EXAMPLE

**HTTPOUT** *http://192.168.1.90:8001/admin.cgi/metadata?pass= mypass&mode=updinfo&song=KBSI%20-%20 Morning%20Show*

**NOTE:** Some devices/encoders require encoded HTML, this means that codes are used instead of some characters.  For SPACE, type in %20 and for COMMA use &#44.

**NOTE:** The HTTPOUT macro does not use the %PASSWORD% or %USERNAME% meta variables, for this reason, if your string requires a password or username it must be entered literally into the URL used.

_____

_____

## IFNOTEXCLUDED

If the event currently playing in one of the three main playback decks of Simian is not a member of an excluded category (see Exclude Categories), the audio file, Macro, or Application will be run as normal. If the currently playing event is a member of an excluded category, the event specified in this macro will be ignored. If nothing is playing, this macro will run the specified event as normal. If more than one of the main decks is currently playing, the deck last started will be used for the exclude category.

### SYNTAX

**IFNOTEXCLUDED** *[Event Type], Command/Filename*

**Event Type** is an optional parameter and ca be AUDIO for audio file names, MACRO for macro commands, or APPLICATION for executable names (with full path specified). If it is not included, the event Command/Filename is assumed to be an audio file name.

### EXAMPLES

**IFNOTEXCLUDED** *myaudiofile*

This would play the audio file "myaudiofile.wav" (or .mp3) in the async deck if the currently playing audio file was not an excluded category.

**IFNOTEXCLUDED** *MACRO, SERIALOPT 2, %ARTIST% – %TITLE%*

The above example would run the SERIALOPT macro if the currently playing deck's audio file was not a member of the Exclude Categories. This particular macro is very useful for outputting meta-data to an RDS or HD exciter when each log item starts when the macro is placed into the **Additional Event when a Main Deck STARTS** line on the Events tab of Simian's Program Options.

**IFNOTEXCLUDED** *APPLICATION, C:\Program Files\ My Program\myexe.exe*

The executable "myexe.exe" will be run if the currently playing audio file in Simian's main decks is not a member of the Exclude Categories.

## IGNOREINTRO

Toggles automatic "Intro WalkOver" protection option in Spyglass Diagnostic's Expert tab.

### SYNTAX

**IGNOREINGRO** *on/off*

### EXAMPLES

**IGNOREINTRO** *on*

Intro protection is disabled, intro lengths are ignored. Playback always starts at the Segue marker.

**IGNOREINTRO** *off*

Protection is enabled and playback of the next deck will be held until the time left of the event ending is less than the intro time of the next event.

## IMPORTLOG

Imports an ASCII text file using the default Traffic Log Import filter and creates and loads the file as a Program Log if that options has been selected in the Import Filter. Simian can dynamically generate the filename using the meta variables listed below. (See also the **SORTLOGBYTIME** Macro).

*(Continued next page)*

_____

_____

You can also specify the Log Import Filter to use, by adding the optional MUSIC, TRAFFIC or ALTERNATE parameter after the filename.

**SYNTAX**

> **IMPORTLOG** *FILENAME.EXT,*[TRAFFIC/MUSIC/ALTERNATE]

*TRAFFIC/MUSIC/ALTERNATE* – selects the Import filter to use (default is Traffic)

*FILENAME.EXT* – is the full filename including file extension of the ASCII file to import (usually .log, .txt etc). By default, this file should be in the c:\bsi32\import folder.

The *filename* can include any of the following meta-variables which Simian will substitute for the correct values each time the macro is run. **ALL VARIABLES ARE BASED ON THE FOLLOWING DAY'S DATE**

| | |
|---|---|
| %DDD% - three letter day of week | [Ex: Mon, Tue, Wed, Thu, Fri, Sat, Sun] |
| %MM% - month | [Ex: 01=January, 02=February, etc.] |
| %DD% - day | [Ex: 01 through 31] |
| %YY% - two-digit year | [Ex: 08 for 2008] |
| %YYYY% - four-digit year | [Ex: 2008, 2009, 2010, etc.] |
| %HH% - current hour | [24 hour cycle, Ex: 23 for 11:00pm] |

%TODAY% - returns date in the following format mmddyy

%TOMORROW% - returns tomorrow's date in the following format mmddyy

%TIME% - returns the current time of the start of the recording  (EX: 22:30:45)

**EXAMPLES**

> **IMPORTLOG** *filename.txt*

Imports a log called filename.txt using the Traffic format

> **IMPORTLOG** *filename.log, MUSIC*

Imports a log called *filename.log* using the *Music* format

> **IMPORTLOG** *spots.txt, TRAFFIC*

Imports a log called *spots.txt* using the *Traffic* format

> **IMPORTLOG** *%W.txt*

Imports a log for tomorrow based on the 3 letter day of the week (i.e. mon.txt, tue.txt, wed.txt, thu.txt, fri.txt, sat.txt, sun.txt)

> **IMPORTLOG** *%D%M%Y.log*

Imports a log based on the Day, Month and Year (i.e. *060205.log*, *060305.logi* etc.)

> **IMPORTLOG** *KBSI%W.log*

Imports a log for tomorrow, based on the filename KBSI followed by the three letter day of the week (i.e. KBSIWED.log)

## INSERTLOG

Inserts another specified Program Log into the current Program Log.

**SYNTAX**

> **INSERTLOG** *logname*

The *logname variable* can be a full name as entered, or for more versatility can contain any of the following meta-variables which Simian will substitute for the correct values each time the macro is run. **ALL VARIABLES ARE BASED ON THE CURRENT DAY'S DATE**

*(Continued next page)*

_____

%DDD% - three letter day of week          [Ex: Mon, Tue, Wed, Thu, Fri, Sat, Sun]
%MM% - month          [Ex:  01=January, 02=February, etc.]
%DD% - day          [Ex: 01 through 31]
%YY% - two-digit year          [Ex: 08 for 2008]
%YYYY% - four-digit year          [Ex: 2008, 2009, 2010, etc.]
%HH% - current hour          [24 hour cycle, Ex: 23 for 11:00pm]
%TODAY% - returns date in the following format mmddyy
%TOMORROW% - returns tomorrow's date in the following format mmddyy
%TIME% - returns the current time of the start of the recording  (EX: 22:30:45)

## EXAMPLE

**INSERTLOG** *newshour*

Inserts the *newshour.bsi* log into the current Program Log

### TIP

There are a number of potential uses for this Macro, for example – calling a '*rain stopped play*' log during a ball game; pre-compiling a magazine program (or news sequence) on a remote machine and importing that log into the Program Log when it's ready to air.

## LOADHOTKEYS

Loads a specified HotKey set and uses this set as the current set

## SYNTAX

**LOADHOTKEYS** *setname*

## EXAMPLES

**LOADHOTKEYS** *amdrive*

**LOADHOTKEYS** *overnight*

**TIP:**  To have a blank HotKey set, create a blank set entitled *none* and use the following: **LOADHOTKEYS** *none*

## LOADSERIAL

Loads a specified Serial set and uses this set as the current set (or unloads all sets using the NONE parameter).

## SYNTAX

**LOADSERIAL** *setname/NONE*

## EXAMPLES

**LOADSERIAL** *amdrive*

**LOADSERIAL** *overnight*

**LOADSERIAL** *NONE*

_____

## LOADTRIGGERS

Loads a specified Triggers set and uses this set as the current set (or unloads all sets using the NONE parameter).

**SYNTAX**

**LOADTRIGGERS** *setname/NONE*

**EXAMPLES**

**LOADTRIGGERS** *amdrive*

**LOADTRIGGERS** *overnight*

**LOADTRIGGERS** *NONE*

## LOADSCHEDULED

Loads a specified Scheduled Events set and uses this set as the current set (or unloads all sets using the NONE parameter).

**SYNTAX**

**LOADSCHEDULED** *setname/NONE*

**EXAMPLES**

**LOADSCHEDULED** *amdrive*

**LOADSCHEDULED** *overnight*

**LOADSCHEDULED** *NONE*

## LOG

Although it will still work, the LOG Macro has largely been replaced by the more versatile CHAIN Macro and we advise all customers to adopt **CHAIN** (as a Scheduled Event) instead of using the older **LOG** Macro in the Program Log.  The **LOG** Macro loads a specified Program Log or generates a new one.  Never run the **LOG** Macro as a timed immediate event.

**SYNTAX**

**LOG** *LOAD/NEW logname*

The *logname* can be a full name as entered, or for more versatility can contain any of the following meta-variables which Simian will substitute for the correct values each time the macro is run.  **ALL VARIABLES ARE BASED ON THE CURRENT DAY'S DATE**

%TODAY% - returns date in the following format mmddyy
%TOMORROW% - returns tomorrow's date in the following format mmddyy

**EXAMPLES**

**LOG** *LOAD welcome*

Loads c:\bsi32\logs\welcome.bsi

**LOG** *NEW*

Creates a new untitled Program Log (it is not possible to give a new log a name until events have been added to the log)

_____

## METADATA

Enables or disables automatic output of Metadata (AKA: PAD, UDP, or TCP data) as per the settings on the Metadata tab of Simian's Program Options.

**SYNTAX**

**METADATA** *on/off*

**EXAMPLES**

**METADATA** *on*

Enables UDP/TCP Metadata output if it is configured.

**METADATA** *off*

Disables UDP/TCP Metadata output.

## MIXFADE

Fades (up or down) the specified Mix# for the specified duration. This Macro requires an audio card with a hardware mixer.

**SYNTAX**

**MIXFADE** *MIX#, START%, END%, MS, [STOP], [WAIT]*

*Mix#* - the Mix# to fade (from 1 to 16)

*Start%* - the start volume level (from 100 to 0)

*End%* - the end volume level (from 0 to 100)

*MS* – the duration of the fade in milliseconds

*STOP* – this optional parameter will stop and unload any playing decks

*WAIT* – this optional parameter waits until the end of the fade before going to the next event

**EXAMPLES**

**MIXFADE** 1,0,100,5000

Fades Mix1 from 0% (muted) to 100% (full) over 5,000ms

**MIXFADE** 1,100,5000

Fades Mix1 from 100% to 0% (full to muted) over 5,000ms

**MIXFADE** 2,80,10,10000, STOP, WAIT

Fades Mix2 from 80%-10% over 10 seconds. Unloads any decks that were playing and then once the fade has finished starts the next event in the Program Log (if in full Automation). This sort of fade won't be very common but shows the flexibility available.

**TIP**

Use the **MIXFADE** Macro to opt in and out of satellite fed programming for a smooth fade in or out, especially where the network is using filler music and you are rejoining slightly early; or you are joining a program already in progress.

_____

## MIXVOLUME

Sets the specified Mix# to the specified volume

**SYNTAX**

**MIXVOLUME** `#, Volume%` or

**MIXVOLUME** `#, ON/OFF`

**EXAMPLES**

**MIXVOLUME** `1, 100`

**MIXVOLUME** `2, 0`

Sets Mix1 volume to 100% (full) and Mix2 volume to 0% (muted)

**MIXVOLUME** `1, OFF`

Prevents Mix1 being controlled by subsequent **MIXVOLUME** *1* Macros (until **MIXVOLUME** *1, OFF* is executed)

## PAUSE

Pauses events for the specified number of seconds (though will not prevent a trigger or hotkey from starting audio).  Can be used in the main Program Log or within a Cart.

**SYNTAX**

**PAUSE** `seconds`

**EXAMPLE**

**PAUSE** `120`     Causes the next event to be delayed by 120 seconds (2 minutes)

**PAUSE** `1.5`     Causes the next event to be delayed by 1.5 seconds

**TIP:** Use a **PAUSE** *1* Macro when sending multiple commands to some external serial devices which do not allow commands to be sent one after the other.

## PLAYASYNC

Plays the specified audio file (or Cart) in the Async Deck (Deck #4)

**SYNTAX**

**PLAYASYNC** `filename`

**EXAMPLE**

**PLAYASYNC** `filler`

Plays *filler.wav* or *filler.krt* out of the Async Deck

**TIP:** When coupled with a **DECKVOLUME** *4* Macro, PLAYASYNC can be used for filler music (catch-up music) by setting the volume of the deck to 0 prior to starting the stop set.  At the end of the stop set, a DECKFADE 4,0,100,3000 will fade up the already playing ASYNC deck.

The same feature can be used to 'dip' in and out of a long-form recording to play audio from the main program log.

_____

## PLAYDECK

Plays the specified (or Next) play deck.  This Macro should NOT be used in the Program Log.

**SYNTAX**

**PLAYDECK** `Deck#/NEXT`

**EXAMPLES**

**PLAYDECK** `1`

**PLAYDECK** `2`

**PLAYDECK** `3`

## PLAYHOOKS

PLAYHOOKS allows you to 'forward sell' your hour by playing the hook portion of the songs that are coming up.

The sequence automatically adds *c:\bsi32\hooks\header.wav* and ends with *c:\bsi32\hooks\tail.wav*.  If a *c:\bsi32\hooks\zinger.wav* exists, this will be played in between the HOOKS of each song.

Before each file's hook is added, Simian will look in C:\BSI32\Hooks\Artists\ for a filename of a .wav file with the name of the artist of the hook.  This allows you to record announcements for each of your artist names and they will automatically be placed in your PLAYHOOKS playback.

If no HOOK is marked within the song, the first few seconds of the song will be played instead.

A threshold parameter safeguards against spots or jingles being played (all file lengths below that threshold are ignored).

NOTE: All the files in *c:\bsi32\hooks* must be exactly the same audio format as your songs.

**SYNTAX**

**PLAYHOOKS** `Events, Jump, Threshold`

*Events* – the total number of events in the Program Log to play

*Jump* – the number of events to jump before playing the next hook

*Threshold* – only adds events greater than the specified threshold

**EXAMPLE**

**PLAYHOOKS** `4, 3, 61`

Plays the hooks of *4* songs, jumping *3* songs each time and only playing files that are longer than *61* seconds

**TIP**

By using the **FILECOPY** Macro, you can change the header.wav and tail.wav to add more variety to the **PLAYHOOKS** announcements.

_____

## RECORD

Controls recording (and playback) of Simian's two built-in Record decks. Recordings are made into the default record paths setup in **Tools | Program Options | Paths**

### SYNTAX

**RECORD** *START/STOP, DECK#, filename, duration, [description]*

**RECORD** *PLAYSTART/PLAYSTOP, DECK#, [filename]*

*START/STOP* – controls recording of the *DECK#* specified (1 or 2)

*PLAYSTART/PLAYSTOP* – controls playback of the *DECK#* specified (1 or 2)

*filename* – the 8.3 filename for the recording (or optionally to playback)

*duration* – the length of the record. A duration of '0' continues recording until the **RECORD** *STOP, DECK#* Macro is executed.

*description* – allows you to 'tag' a recording with a Title Description

The *filename* and *description* can be a full name as entered, or for more versatility can contain any of the following meta-variables which Simian will substitute for the correct values each time the macro is run. **ALL VARIABLES ARE BASED ON THE CURRENT DAY'S DATE**

%DDD% - Three letter day of the week     [Ex: Mon, Tue, Wed, Thu, Fri, Sat, Sun]
%MM% or %M - Two-digit month     [Ex: 01=January, 02=February, etc.]
%DD% or %D - Two-digit day of the month     [Ex: 01 through 31]
%YY% or %Y - Two-digit year     [Ex: 08 for 2008]
%YYYY% or %Z - Four-digit year     [Ex: 2008, 2009, 2010, etc.]
%HH% - current hour     [Ex: 24 hour cycle, Ex: 23 for 11:00pm]
%TODAY% - returns date in the following format mmddyy
%TOMORROW% - returns tomorrow's date in the following format mmddyy
%TIME% - returns the current time of the start of the recording [Ex: 22:30:45]

### EXAMPLES

**RECORD** *START, 1, 0600news, 180, 6am News*

Records 0600news.wav in record deck #1 for 3 minutes with the Title Description '6am News'

**RECORD** *START, 2, rockshow%TODAY%, 0, Rock Show for %TODAY%*

Records rockshow012808.wav in record deck #2 with the Title Description 'Rock Show for 012808'

**RECORD** *STOP, 2*

Stops Record Deck #1

**RECORD** *PLAYSTART, 1*

Plays back the last file recorded and still loaded in Record Deck #1

**RECORD** *PLAYSTOP, 2*

Stops playback in Record Deck #2 (Note that RECORD STOP,2 would have the same effect)

*(Continued next page)*

**RECORD** *PLAYSTART, 1, filename.wav*

Plays back *filename.wav* in Record Deck #1

**TIP:** RECORD Macros are best run from the Scheduled Events rather than the main program log. Recordings will overwrite files with the same filename automatically, so the same filenames can be used repeatedly for the daily events.

RECORD Macros can also be stacked in a cart to record a program from a satellite network in response to the incoming triggers for local breaks. This is useful for time-shifting programs.

In the example below, the satellite network sends a trigger for a 3 minute, 2 minute, then 1 minute break. We use that trigger to start the same cart which sequences through the following commands (the first recording is usually started as a timed event, but the breaks are 'floating'):

---

**RECORD** *STOP, 1*

**+ PAUSE** *180*

**+ RECORD** *START, 1, part_2, 0, Program Part 2*

**RECORD** *STOP, 1*

**+ PAUSE** *120*

**+ RECORD** *START, 1, part_3, 0, Program Part 3*

**RECORD** *STOP, 1*

**+ PAUSE** *60*

**+ RECORD** *….etc*

---

## RECORDSOURCE

Selects a record source for the Audio Science Sound Card either by using the Card #, or the Sound Card being used by the specified Record Deck.

### SYNTAX

**RECORDSOURCE** *CARD/DECK, DEVICE#, SOURCE#*

*CARD* - selects the specified source on the specified Sound Card

*DECK* - selects the specified source on the Sound Card being used by the specified Record Deck

*DEVICE#* - either the Sound Card or Record Deck

*SOURCE#* - the Sound Card input number

### EXAMPLES

**RECORDSOURCE** *CARD, 1, 2*

Selects Line Input 2 for Sound Card 1

**RECORDSOURCE** DECK, *2, 3*

Selects Line Input 3 for the Sound Card being used by Record Deck 2

**RECORDSOURCE** *DECK, 1, 2*

Selects Record Input 2 for Record Deck 1

_____

## RELAY

Controls an optional external relay

### SYNTAX

**RELAY** *#, ON/OFF/MS*

### EXAMPLE

**RELAY** *1, ON*

Turns Relay 1 ON

**RELAY** *2, OFF*

Turns Relay 2 OFF

**RELAY** *3, 500*

Closes Relay 3 for 500ms (1/2 a second) and then opens Relay 3

**TIP:** Durations of up to 30000ms (30 seconds) can be used. For longer durations, use the RELAY #, ON and RELAY #, OFF command as Scheduled Events or in the Program Log.

The number of relays available will depend on the external equipment being used.

## REM

Remark or Comment in the Program Log which otherwise does nothing when in Automation Mode. (In Live Assist mode, you will need to manually advance this item).

REM Macros are great ways of making the Program Log easier to navigate and read.

### SYNTAX

**REM** *description*

### EXAMPLES

**REM** *This is the 6am Hour*

**REM** *Insert 3 Minutes of Local Spots Here*

**REM** *Put on coffee pot for morning guy*

**REM** *Time Marker for 13:45*

**REM** *ENDOFGAME*

### TIPS

Use a **REM** Macro as a timed event to align each hour correctly

Use a meaningful description as an aid to navigate the log or as a reminder

Use a short description, or label, to use as a place marker for the **GOTO** Macro (**GOTO** *ENDOFGAME* would advance the Program Log to **REM** *ENDOFGAME*)

## RESENDDECKDATA

Use this macro to resend the data for the Stream Encoder HTTP Call output, the TCP/UDP Metadata, and Dynamic HTML outputs.

### SYNTAX & EXAMPLE

**RESENDDECKDATA**          (no variables required)

_____

_____

## RESETASYNC

Resets the Async Deck, clearing any items currently playing or queued (stacked) to play.

### SYNTAX & EXAMPLE

**RESETASYNC**          (no variables required)


## RESETCART

Resets the 'next to play' marker inside a Virtual Cart to the first item in the cart. This is useful when using Virtual Carts for complicated sequences where it's essential that the cart is at the first item before being used.

### SYNTAX

**RESETCART** *cartname*

### EXAMPLE

**RESETCART** *kk_rec*

Resets the *kk_rec.krt* file and makes the first item in the cart the next to play

## RESOLVECARTS

Removes carts from the program log and replaces them with their component elements. This macro allows you to resolve all the carts in the Program Log, a specific line item in the Program Log, a range of items in the Program Log, or all the carts between the currently playing item and the next BACKTIME cued item in the Program Log.

Cart randomization or sequential order is respected when resolving carts (as configured in each cart), and time windows and start and end dates/times are respected when resolving carts.

If AutoStart cued items are included in your carts (e.g. your cart plays more than one event each time it is played), lines will be added to your program log to include them.

### SYNTAX

**RESOLVECARTS** *[LOG#/CURRENT/NEXT/ALL/BACKTIME/REMOVE]*
*[,LOG#/CURRENT/LAST]*

*LOG#* is the index number of a line item in the Program Log

*CURRENT* is the currently loaded item in the Program Log (or line item of the next to play deck if Simian is actively playing)

*NEXT* is the line item in the program log of the next main deck to play.

*ALL* specifies all the items in the program log

*BACKTIME* will resolve all carts from the current item in the program log to the next BackTime (!) cued event in the program log

*LAST* is the last item in the program log

*REMOVE* will remove all previously resolved cart events from your Program Log and restore the original cart events.

*(Continued next page)*

_____

**EXAMPLE**

**RESOLVECARTS**

Resolves all carts in the program log (the same as specifying ALL as a variable). If Simian is currently playing, carts will only be resolved below the currently playing item in the program log.

**RESOLVECARTS** *BACKTIME*

Resolves all the carts between the currently playing item (or next to play item) and the next BackTime (!) cued event in the Program Log.

**RESOLVECARTS** *55, LAST*

Resolves all carts between line 55 and the end of the Program Log

**RESOLVECARTS** *REMOVE*

Removes all events in the program log which originated from resolved carts and restores the carts they replaced.

## SAVELOG

Saves any changes to the currently opened Program Log (will not save a Program Log with no existing filename)

**SYNTAX & EXAMPLE**

**SAVELOG**                    (no variables required)

## SAYTEMP

Plays a sequence of audio files to announce the current temperature (as previously obtained using the GETWEATHER Macro)

First to play is *c:\bsi32\times\temps\temp.wav*, followed by *xx.wav* where xx is the current temperature (if the temperature is below freezing, Simian will look for a file called *–xx.wav*), .x.wav (where .x is the tenths of a degree, this is optional and does not need to be included if you do not want tenths of a degree included with your announcement) and finally *degrees.wav.*

**SYNTAX & EXAMPLE**

**SAYTEMP**                    (no variables required)

**TIPS**

Take some extra time to record alternative *temp.wav* files and rotate these using randomized FILECOPY Macros from within a cart. This will give you a different intro each time the SAYTEMP Macro is used.

Record the temperature value and the word 'degrees' in the same *xx.wav* file (or *-xx.wav* files!) for a smoother sound and then either optionally delete the *degrees.wav* file or use randomized versions of the *degrees.wav* file to have different 'back-sells' to the weather forecast.

If you don't have time to record all the temperatures, copy the same file between *70.wav and 79.wav* and say 'between 70 and 80 degrees today'

Omit the *temp.wav* file and use the xx.wav file to say 'looks like we're in for a cold one tonight with temperatures down somewhere between minus 5 and minus 10 degrees'

With a little time, care and thought, you can sound really live even when you're not there!

_____

## SAYTIME

Announces the current time (and optionally, the current temperature too)

*c:\bsi32\times\header.wav* is played first, followed by *c:\bsi32\times\hours\hh.wav* and finally *c:\bsi32\times\minutes\mm.wav* where *hh* is the current hour and *mm* is the current minute.

### SYNTAX

**SAYTIME** *[/TEMP]*

### EXAMPLES

**SAYTIME**

Announces the current time

**SAYTIME** */TEMP*

Announces the current time and temperature (providing the GETWEATHER Macro has been executed)

### TIPS

Use a series of FILECOPY commands in a randomized cart to change the header.wav file to rotate the time announce intros.

## SEGUE

Enable or disable Simian's Segue function with this macro.  Should you have a need to have Segue enabled during part of your day and disabled at another (for instance, music as part of your day and talk for another) you can use this macro from your Program Log or Scheduled Events set.  The optional segueMS variable allows you to change the default segue time as well.

### SYNTAX

**SEGUE** *on/off, [segueMS]*

### EXAMPLES

**SEGUE** *on*

Enables Segue functionality along with default segue time as it was previously set

**SEGUE** *on, 1000*

Enables Segue functionality, and sets the default Segue time to 1000 milliseconds (one second)

**SEGUE** off

Disables all Segue functionality.  All audio files will play in their entirety before the next audio file in the program log is allowed to start.

## SERIAL

Sends the specified text to the Serial Port.  The text could be a command to an external serial device (to control it) or data to be displayed on a billboard or with an RDS/RBDS encoder.

### SYNTAX

**SERIAL** *usertext*

The usertext may be replaced or combined with the following meta-variables
*%ARTIST%* - the Artist tag data of the currently playing audio
*%TITLE%* - the Title tag data of the currently playing audio

*(Continued next page)*

_____

%DESC% - the description field in the Program Log (typically Artist and Title)

%ALBUM% - the Album tag data of the currently playing song

%GENRE% - the Genre tag data of the currently playing song

%YEAR% - the Year tag data of the currently playing song

%URL% - the URL tag data of the currently playing song

%PLAYDECK% - the currently playing Deck #

%LENGTH% - the length of the currently playing audio

%LENGTHMILS% - the length of the currently playing audio in milliseconds

%LENGTHSECONDS% - the length of the currently playing audio in seconds (with decimals)

%CATEGORY% - the category of the currently playing audio

%COPY% - the text from the COPY field of the currently playing audio

%COPYRIGHT% - the text from the COPYRIGHT field of the currently playing audio

%COMPOSER% - the text from the COMPOSER field of the currently playing audio

%CURTIME% - the current time in hhmmss format

%CURDATE% - the current date in mmddyy format

%PUBLISHER% - the text from the PUBLISHER field of the currently playing audio

%COMMENTS% - the text from the COMMENTS field of the currently playing audio

%SEGTIME% - the segue time of the currently playing audio

%STATIONID% - the STATION ID text from Simian's Program Options

%PROGRAMLOG% - the name of the currently loaded Program Log

%WEATHERTEMP% - the current temperature obtained with the GETWEATHER macro

%CAPS% - causes all text for the SERIAL macro to be set to upper case

## EXAMPLES

SERIAL *hello world*

Sends the text 'hello world' to the serial port

SERIAL *Now Playing – %ARTIST% – %TITLE% Duration: %LENGTH%*

Sends 'Now Playing' followed by the current Artist – Title 'Duration:' and finally the length of the audio

SERIAL *\*0011*

Control sequence of ASCII characters to activate a function on an external serial device

## TIP

When used in conjunction with Serial Sets, the SERIAL Macro can control another Simian machine (for streaming spot substitution, or split announcements etc.)

## SERIALOPT

Sends the specified text to a secondary Serial Port (separate than the serial port configured within Simian and used with the SERIAL macro above).  The text could be a command to an external serial device (to control it) or data to be displayed on a billboard or with an RDS/RBDS encoder.

## SYNTAX

SERIALOPT *portnumber, usertext*

The *portnumber* is the Com Port number for the data to be sent on.  NOTE: The port specified can not be the same port as is selected in Simian's Hardware Options as this port will already be in use.

The usertext may be replaced or combined with the same meta-variables as are available in the SERIAL macro listed above.

*(Continued next page)*

_____

**SERIALOPT** `3, hello world`

Sends the text 'hello world' to the Com 3 serial port

**SERIALOPT** `2, Now Playing – %ARTIST% – %TITLE% Duration: %LENGTH%`

Sends 'Now Playing' followed by the current Artist – Title 'Duration:' and finally the length of the audio to Com Port 2

**SERIALOPT** `4, *0011`

Sends the control sequence of ASCII characters to activate a function on an external serial device to Com Port .

## SERIALPORT

Enables or disables output of serial data. This macro is useful when using your serial port to output metadata to your RDS encoder or other device and you would like no output during commercial breaks. Place this macro at the start and end of your breaks to turn off and back on serial data output.

NOTE: This macro completely disables the serial comm port as configured in Simian. If you are using a serial device for trigger/relay/audio switching, that device will be ignored while the serial port is turned off. Use this macro with care.

**SYNTAX**

**SERIALPORT** `on/off`

**EXAMPLES**

**SERIALPORT** `on`

Turns the serial port on

**SERIALPORT** `off`

Turns the serial port off

## SERIALRESET

Resets the main Serial Port. While SERIALOPT Macros open and close the serial ports, the main Serial Port remains open all the time. This macro closes and re-opens the main Serial Port to reset it.

**SYNTAX & EXAMPLE**

**SERIALRESET**          (no variables required)

## SETTIME

Sets the computer clock to the specified time. (Note that this requires certain Windows permission rights that are not normally available to 'restricted' or 'limited' users).

**SYNTAX**

**SETTIME** `HH:MM:SS`

`HH` - hour in 24 hour military time

`MM` – minutes

`SS` – seconds

*(Continued next page)*

_____

_____

**EXAMPLE**

**SETTIME** *23:00:00*

**SETTIME** *06:15:30*

## SHOWEATHER

Displays the Weather information window (the same as pressing CTRL-W)

Both a GETFORECAST and GETWEATHER Macro must have been executed previously to fully populate the weather window.

**SYNTAX & EXAMPLE**

**SHOWWEATHER**          (no variables required)

## SORTLOGBYTIME

Sorts the current Program Log based on the times in the Scheduled Time column.

Typically, this Macro is used when Importing a Music and Traffic Log from different scheduling software, to create one continuous chronological log.

**SYNTAX & EXAMPLE**

**SORTLOGBYTIME**          (no variables required)

## SOUNDHOUND

Toggles SoundHound refresh mode

**SYNTAX**

**SOUNDHOUND** *Manual/Auto*

**EXAMPLES**

**SOUNDHOUND** Manual

SoundHound must be refreshed manually to update the audio database

**SOUNDHOUND** Auto

SoundHound will refresh the database automatically

## SPACEBAR

Has the same effect as pressing the computer's SPACEBAR (which usually starts, or segues the next event).  This Macro should NOT be used in the Program Log.

**SYNTAX & EXAMPLE**

**SPACEBAR**          (no variables required)

## SPY

This Macro adds a specified text string to the Spyglass diagnostic output and is a useful tool for testing and debugging Program Logs, Carts and Triggers etc.

**SYNTAX**

**SPY** *textstring*

**EXAMPLES**

**SPY** *Trigger #7 Received*

**SPY** *Sports.krt has reached last item in cart*

_____

## STARTNEXT

If the Play Decks are idle, the **STARTNEXT** Macro will start the next event in the Program Log. Since this macro only has an effect when the Play Decks are already playing audio, using the STARTNEXT macro with a trigger from your satellite receiver, inadvertently doubled closures will have no effect.  This Macro should NOT be used in the Program Log.

### SYNTAX & EXAMPLE

**STARTNEXT**          (no variables required)

## STOPDECK

Stops the specified play deck.  This Macro should NOT be used in the Program Log.

### SYNTAX

**STOPDECK** `DECK#/CURRENT`

### EXAMPLES

**STOPDECK** *2*

Stops Play Deck 2 (if playing)

**STOPDECK** *CURRENT*

Stops the currently playing deck

## STREAMDATA

Enables or disables automatic output of Streaming Data (AKA: HTTP request data) as per the settings on the Streaming tab of Simian's Program Options.

### SYNTAX

**STREAMDATA** *on/off*

### EXAMPLES

**STREAMDATA** *on*

Enables HTTP request data output if it is configured.

**STREAMDATA** *off*

Disables HTTP request data output.

## TCPOUT

Sends text data to a port on the specified IP address via a TCP connection.

### SYNTAX

**TCPOUT** *IP Address, Port, Text*

### EXAMPLES

**TCPOUT** *192.168.0.90, 8000, Artist=%ARTIST% Title=%TITLE%*

Would send the text string "Artist=The Faint Title=The Geeks Were Right" to 192.168.0.90:8000 via TCP connection if the currently playing item in Simian's main decks was The Geeks Were Right by The Faint.

_____

## TIMEDBLOCKSTART

Uses FlexTime settings to force the following block of audio events listed in the Program Log to run for the specified duration. (Useful for ensuring that a stop set runs for exactly 2 minutes when the production department has made some 31 and 28 second commercials!)

A **TIMEDBLOCKEND** Macro is required at the end of the block.

As exact audio duration of an item in a cart is not known ahead of time, Simian is unable to utilize this feature using Carts.

**SYNTAX**

**TIMEDBLOCKSTART** *MM:SS*

*MM:SS* is the desired length of the block in minutes and seconds

**EXAMPLE**

**TIMEDBLOCKSTART** *03:00*

Forces the next block of events to run for exactly 3 minutes

## TIMEDBLOCKEND

Marks the end of the timed block of events (see **TIMEDBLOCKSTART**)

**SYNTAX & EXAMPLE**

**TIMEDBLOCKEND**          (no variables required)

## TIMEEVENTS

Turns on or off timed and other automatic events

**SYNTAX**

**TIMEEVENTS** *ON/OFF*

**EXAMPLES**

**TIMEEVENTS** *ON*

Turns Scheduled Events on as well as any time-cued events in your program log.

**TIMEEVENTS** *OFF*

Turns Scheduled Events off as well as any time-cued events in your program log.

## TIMESYNC

Turns on or off the TimeSync feature according to the options specified in **Tools | Program Options | General | Engage TimeSync | Settings**

**SYNTAX**

**TIMESYNC** *ON/OFF*

**EXAMPLES**

**TIMESYNC** *ON*

Turns Simian's trigger-based time synchronization function on.

**TIMESYNC** *OFF*

Turns Simian's trigger-based time synchronization function off.

_____

## TOPMOST

This Macro returns Windows 'focus' to Simian (makes Simian the Topmost program).

Occasionally, other programs on the computer or certain tasks in Simian can remove 'focus' from Simian. When this happens, the Space Bar and other Keyboard commands are passed to the program in 'focus' rather than Simian.

'Focus' is returned to Simian each time the **TOPMOST** Macro is executed.

### SYNTAX & EXAMPLE

**TOPMOST**            (no variables required)

## TRIGGERS

Turns on or off incoming Triggers. This may be desirable during live assist programming so that contact closures from your satellite receiver do not trigger Simian (though this is better handled with different Trigger Sets)

### SYNTAX

**TRIGGERS** *ON/OFF*

### EXAMPLES

**TRIGGERS** *ON*

Enables Simian's trigger functionality.

**TRIGGERS** *OFF*

Disables Simian's trigger functionality; all received triggers are ignored.

## TRIGGER

Activates the specified trigger of the currently loaded set. (The Macro is ignored if no Trigger Set is loaded)

### SYNTAX

**TRIGGER** *#*

The # of triggers available will be determined by the Trigger Interface fitted.

### EXAMPLE

**TRIGGER** *5*

Executes the event you have configured in trigger 5 of the currently loaded trigger set.

## TRIMFILE

Trim silence from the start and end of a specified Wave or Mpeg2 file. The silence threshold is user selectable in percent: 0% is complete silence while 100% is maximum volume. Tenths of a percent are allowed with the threshold variable, and the Meta Variables utilized in FILECOPY and FILEDELETE macros can be used in the FileName path.

### SYNTAX

**TRIMFILE** *FileName, Threshold*

*(Continued next page)*

_____

**EXAMPLES**

**TRIMFILE** *D:\Audio1\ContentDepot\PMB%M%D%Y.wav, 1.5%*

If today's date was September 16, 2009, this would open the file "PMB091609.wav" located in the directory D:\Audio1\ContentDepot\ and trim the front until a sample of 1.5% of maximum volume was found, and trim the end of the file from the last instance of 1.5% of maximum volume was found to the end of the file.

**TRIMFILE** *C:\BSI32\Audio\My Audio File.wav, 3*

As per above, this would trim the file "My Audio File.wav" found in C:\BSI32\Audio\ and trim the front and back silence with a threshold of 3%.

NOTE:  The percent symbol ("%") is optional, including or omitting it will have no effect.

## UDPOUT

Sends text data to a port on the specified IP address via a UDP connection.

**SYNTAX**

**UDPOUT** *IP Address, Port, Text*

**EXAMPLES**

**UDPOUT** *192.168.0.90, 8000, Artist=%ARTIST% Title=%TITLE%*

Would send the text string "Artist=The Faint Title=The Geeks Were Right" to 192.168.0.90:8000 via UDP connection if the currently playing item in Simian's main decks was The Geeks Were Right by The Faint.

## UPDATEDATABASE

Updates the entire audio database immediately (this may take some time if you have a large audio library)

If Event Builder is open, you'll notice it scroll to the top of the list when the update is complete.

**SYNTAX & EXAMPLE**

**UPDATEDATABASE**          (no variables required)

## UPDATEDESCRIPTIONS

Use this macro to automatically update the loaded program log with the current Category, Description, and Duration of all the audio files referenced therein.  This is useful for stations that use pre-recorded segments from third parties (such as from Content Depot or AMB-OS devices) and would like the descriptions in their program log updated with the actual descriptions from the audio files.

This macro performs the same function as the **Update Category, Descriptions, & Duration** option on the **Log** menu in Simian.

Run this macro from your Scheduled Events after your program is loaded or after a segment is transferred/recorded.

**SYNTAX & EXAMPLE**

**UPDATEDESCRIPTIONS**          (no variables required)

# Contact Information

| | |
|---|---|
| Headquarters: | Broadcast Software International<br>909 International Way<br>Springfield, Oregon  97477<br>USA<br>Email: info@bsiusa.com |
| Sales: | 1.888.274.8721<br>541.338.8588<br>Email: sales@bsiusa.com |
| Technical Support: | 541.342.5250<br>Support Center: http://support.bsiusa.com |
| Training | 541.338.8588 |
| Validation Codes: | Visit http://www.bsiusa.com/codes to submit a validation code request. |
| Fax: | 541.338.8656 |
| Web Site: | www.bsiusa.com |

## Other Products From BSI and Our Partners

**Music Store**—BSI now offers over 45,000 songs in a wide variety of digital formats. Contact Sales for information on titles, formats and pricing.

**Natural Log—**Traffic and Billing system from Natural Software. Offers traffic, billing, reporting, data backup/restore capabilities, account receivable and payables and end of month closing features. Natural Log can handle two stations within a single billing environment and an unlimited number of separately billed stations.

**Natural Music**—Music Scheduling system from Natural Software. Gives you substantial control over your playlist. The single keystroke interface lets you move through the program quickly and easily. You can schedule up to 99 different music categories by day part and separation. Tempo and style information can be used to design a unique sound for your station.

**SkimmerPlus** -- Easy Audio Logging and Skimmer. SkimmerPlus can record in linear PCM and compressed audio file formats at the same time. Includes web playback module and built-in web server for easy access to recorded audio.

**Speedy**—Automated CD-to-PC dubbing. The recording system automatically dubs, names and tags files each song for you. Transfer one, several or all tracks easily and audition songs before dubbing if desired.

**Stinger**—Instant Audio Player that gives you fast, easy access to your sound effects, liners, beds and bits. Up to 288 audio cuts can be instantly available for playback in Stinger and each audio cut has its own on-screen description and button which can be color-coded. Supports drag and drop manipulation.

**WaveCart**—On-screen "cart machine" that displays up to ten decks audio files and giving you instantaneous, crystal clear playback. WaveCart supports spot rotation and it can also play more than one spot at a time.

# Vendor Contact Information

**AudioScience, Inc.**

Manufacturers of audio cards recommended by BSI.

Phone: 302-324-5333          Fax: 302-235-7110                    www.audioscience.com


**Broadcast Tools**

Manufacturers of trigger and relay devices and audio switching devices used with BSI software.

Phone: 360-854-9559          Fax: 866-783-1742                    www.broadcasttools.com/


**Natural Broadcast Systems**

Manufacturers of Natural Music and Natural Log software.

Phone: 210-349-5808          Fax: 210-344-7567                    www.nat-soft.com


# Legal Information

**Limited Warranty**

Broadcast Software International warrants that all disks provided are free from defects in material and workmanship, assuming normal use, for a period of 15 days from the date of purchase.

Broadcast Software International warrants that the program will perform in substantial compliance with the documentation supplied with the software product.  If a significant defect in the product is found, the Purchaser may return the product for a refund.  In no event will such a refund exceed the purchase price of the product.

EXCEPT AS PROVIDED ABOVE, BROADCAST SOFTWARE INTERNATIONAL DISCLAIMS ALL WARRANTIES, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE, WITH RESPECT TO THE PRODUCT.  SHOULD THE PROGRAM PROVE DEFECTIVE, THE PURCHASER ASSUMES THE RISK OF PAYING THE ENTIRE COST OF ALL NECESSARY SERVICING, REPAIR, OR CORRECTION AND ANY INCIDENTAL OR CONSEQUENTIAL DAMAGES.  IN NO EVENT WILL BROADCAST SOFTWARE INTERNATIONAL BE LIABLE FOR ANY DAMAGES WHATSOEVER (INCLUDING WITHOUT LIMITATION DAMAGES FOR LOSS OF BUSINESS PROFITS, BUSINESS INTERRUPTION, LOSS OF BUSINESS INFORMATION AND THE LIKE) ARISING OUT OF THE USE, OR THE INABILITY TO USE, THIS PRODUCT EVEN IF BROADCAST SOFTWARE INTERNATIONAL HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

Possession and/or use of this product for more than 24 hours constitutes your acceptance of this agreement and subjects you to its contents.

# GLOSSARY

**Adobe Audition (formerly CoolEdit)**

A software application used for audio production/editing that can be launched from within Simian. It is a digital audio recorder and editor that allows you to manipulate your audio files. It includes numerous special effects modules and can mix up to 128 tracks together using just about any sound card.

**Amplitude**

Relates to sound waves. Technically, it is the difference between the highest point and zero point of a wave. On a wave form display, a low amplitude, quiet wave would be one that would vary much less (up and down), while a louder waveform would vary more.

**AudioScience**

A supplier of high quality audio cards. Most AudioScience audio cards support the features required for a fully realized Simian system.

**APP** (Application)

A software program or executable. A file with an ".exe" or ".bat" extension.

**Asynchronous Deck**

An additional playback deck in Simian (also known as deck #4), which plays asynchronous audio events such as those activated by a HotKey or Trigger. This deck allows you to monitor events that are not listed as a scheduled event in the log. Display or hide the asynchronous deck using the Async menu.

**Automation**

The replacement of manual tasks by computerized methods.

**AutoMute**

A feature used in satellite automation. It mutes the mixer during WAV file playback so you don't need to use Relays to "kill" network audio.

**AutoStep**

A menu command that tells Simian to automatically continue to the next line after it has finished playing or executing the current event creating a "stream" or "chain" of events. If AutoStep is "ON" for an event, a "+" mark will be displayed in the "Cue" column. AutoStep can be activated by highlighting an event and hitting the "+" key on your keyboard or by selecting the Auto Start option in the Event Builder for the selected event.

**Auxiliary**

Supplementary equipment or features that provide additional capabilities to a basic system. Examples of Auxiliary equipment in Simian are the "Triggers" or "audition" path (channel) assigned to your sound card (audio device).

**BPM (Beats Per Minute)**

Beats per minute is a way of measuring a song's tempo. It is usually based on a segment of a song and is not necessarily the average of the entire song. To measure the BPM, open the song in Adobe Audition. Highlight an area that has one bar, which can be just a small sample that repeats itself throughout the music (if you looped this bar it would make a long beat -- this is how you know you have selected a bar). Now make sure it runs smoothly, meaning it doesn't cut any part of the beat off. When you do this go to Edit > Edit Tempo. With just one bar selected, click Extract. This will change the BPM box at the bottom. You just have to make sure you select the right section, which would just be one repeating section of music throughout your audio.

_____

### Cart

A list of two or more audio events to be played in a virtual loop (AutoStart Cart), or played signally (a Randomized Cart or a SmartCart), which are associated with a single Event name (cart number). For example, if an advertiser had two audio segments (spots) they wanted to run alternately (in a 50/50 rotation), you would enter both "cuts" in a Simian Cart event and they would play alternately. Carts in Simian are data lists that contain the names of WAV files, not the actual audio data. Because of this, multiple carts can include the same audio file without taking up additional hard drive space. These files can be recognized by the extension .KRT. For example, a cart called TEST would actually be a file named TEST.KRT.

### Category

A type specification assigned to all events in a program log. A means of grouping a collection of similar files. 11 categories in Simian are predefined. They are App, Audio, Comment, Log, Macro, Rec1, Rec2, Script, Text, Video and Vtrack.

### Channel

A path in an audio circuit. It can refer to an incoming stream or input, an output, a recording channel or path, playback channel, preview channel, etc.

### Computer Boards (Now Measurement Computing)

A supplier of digital audio equipment, now known as Measurement Computing Corporation. BSI uses Computer Boards as their main vendor for hardware such as the Input/Output card that lets your PC interface with external devices such as a Satellite receiver or tape recorder.

### Configuration Settings

Simian's program options that can be modified by the user. Configuration settings tell Simian where to look for files, what settings to turn on automatically at startup and what hardware is installed, among other things. They are settings that vary depending on a user's individual requirements and system. Configuration settings are found in the Tools menu.

### Cool Edit

Audio Editing software application which was sold to Adobe©. See: Adobe Audition

### Crash Recovery

A Simian option that, when activated, keeps a copy of the current log in case of a power outage. The log can be reloaded as it was last displayed before the interruption. Simian must be placed in your Windows Startup folder and Event Logging must be ON for recovery to take place. This feature uses extra CPU resources and is only recommended when necessary (for example, if power outages are frequent or expected).

### Cue

An indicator. In Simian, it is the column in the program log area that shows you how the event (song, command, etc.) is going to behave when its time has come. A cue is also an indicator that tells you where you are within a particular song. For example the "outcue" for a song would be the last few words sung—indicating to the jock that the song is ending. To "cue up" a song means to make sure it's properly set before it's aired. This requires a special "auditioning" circuit or channel on your audio card so you can "preview" sound on one channel while another one is used for broadcasting.

### Cut

A song.

### Device

A device can be part of a professional audio card (a multi-device sound card lets you playback more than one file at a time) or it can be any machine or component that attaches to a computer, such as a printer, disk drive, mouse, etc.

_____

### DirectSound

Microsoft Windows 98/2000/NT/XP include an audio capability called DirectSound. Simian, WaveCart and STINGER support DirectSound, but DirectSound is very limited in its capabilities. With the exception of STINGER, DirectSound should be used for test and demonstration purposes only. It is not stable or efficient enough for long-term on-air or other professional use. DirectSound was developed by Microsoft as part of its DirectX gaming technology. It is meant to allow for the playback of short overlapping, non-compressed audio files during game play. It was not designed for and is not reliable enough to use for professional automation playback.

### Dongle

A small hardware device that attaches to a computer and holds validation information. Simian cannot be run full-time without a dongle.

### Driver (Device Driver)

A file or program that allows your peripheral devices (non-essential hardware) to communicate with your operating system software. It contains the precise machine language required to perform the functions requested by software applications.

### Duplex playback/record audio card

Duplex playback audio cards have two or more channels instead of one for your digital audio to play through. This means you can do two things at once in terms of playing or recording sound. For example, it provides you with the ability to overlap spots or songs, creating seamless segues.

### Editor Mode

See Production Mode.

### End Date

The last valid date a particular audio file is scheduled to be used.

### Event

An entry in a program log or List Item. Different types of Events are Application, Text/Tag, Audio, Macro, Recording, NetShow Scripts, Program Logs, and Video.

### Event Variables

A number of variables which can be configured in the bottom section of the Event Builder. They include Cue, Category, and Scheduled Time.

### Fade

A gradual increase or decrease in volume levels.

### Frequency

The number of complete sound wave repetitions (cycles) in a given time period. Sound waves and the electrical signals that represent sound waves in an audio circuit range from a frequency of about 20 to 20,000 repetitions per second. The frequency of a wave determines the pitch we perceive, and is measured in cycles per second, or Hertz (Hz).

### GPI/O

General Purpose Input/Output. These devices are used to create and respond to electrical contact closures. They correspond directly to Simian's Trigger and Relay (Switcher) functionality.

### Hertz

The unit of measurement for frequency of oscillation of a sound wave, equal to 1 cycle per second. Abbreviated Hz. KHz is the abbreviation for kilohertz, or 1000 Hertz.

### Hooks

A hook is a segment of an audio cut that contains the most familiar refrain. It is comparable to a movie trailer or preview. Hooks are set like tones in the Info Editor. By marking hooks in your songs, you can then add them to a "hooks cart" to play as a preview of upcoming music.

### HotKeys

Shortcut keys. HotKeys give live-assist operators (disk jockeys, news people, etc.) the ability to instantly fire pre-programmed functions, including playing audio files, loading Program Logs, displaying text files, and launching applications. A HotKey can launch any Simian Event.

### I/O Card (Expansion board)

An I/O or Input/Output card is a printed circuit board that plugs into a "port" in your PC and extends the computer's ability to control another peripheral device. In other words, it allows you to communicate with other equipment like satellites, tape recorders and most importantly, the coffee machine. All the boards (cards) that plug into a personal computer's bus are expansion boards, such as display adapters, disk controllers and sound cards (audio adaptors).

### Intro Time

The "Intro" or Introduction time is useful for Disk Jockeys who want to "talk up" a song. It is the length of time before the first vocal or music bridge in a song.

### Liner

Details given by a Disk Jockey on-air.

### Log

See Program Log.

### List item

Any of a number of Simian interfaces such as Carts and Sets. These are simply lists of Events.

### Live-Assist

The combination of manual and computerized operation of software.

### Macros

Commands with user-defined parameters that lets you control functions such as adjusting the auxiliary and WAV volume of your system, creating programmed fades and setting your system time. They differ from macros used in other Windows applications in that Simian macros are not scripts (a recorded series of keystrokes assigned to a single shortcut key), but rather execute single meta commands with user-defined parameters. Simian macros are preset and users cannot create new ones at this time.

### Memorized Events

Events that have been added to the Memorized Events window list. This window stores frequently used events, which is especially useful for macro or Trigger commands that can be complex or tedious to enter repeatedly.

### Mixer

A tool used to combine various audio signals into a common output. The Simian mixer is designed specifically to let you control the input and output audio volume levels of your system.

### Mono

A single digital audio channel (as opposed to stereo).

### Natural Log

Traffic and Billing system from Natural Software. Offers traffic, billing, reporting, data backup/restore capabilities, account receivable and payables and end of month closing features. Natural Log can handle two stations within a single billing environment as well as an unlimited number of separately billed clients.

## Natural Music

Music scheduling system from Natural Software.  Gives you substantial control over your music play list.  The single keystroke interface lets you move through the program quickly and easily.  You can schedule up to 99 different music categories by daypart and separation.  Tempo and style information can be used to design a unique sound for your station.

## Measurement Computing

A supplier of digital control equipment.  BSI uses Measurement Computing hardware for hardware such as the Input/Output card that lets your PC interface with external devices such as a Satellite receiver or tape recorder (AKA: GPIO).

## MSMS (NetShow)

A Microsoft application and platform for streaming compressed audio/video over the Internet and Intranets.

## Non-Sequential Start

An option used to start events that you want to execute at a certain time, but aren't related to the scheduled events in the current program log.  For example, if you want to record a program from a satellite feed at a certain time. Instead of putting a specific Event in the log, you can just put a non-sequential at the very end of the log and give it a "Non-Sequential Start" Cue in the Event Builder. Non-Sequential events are now independently executed using the Simian Scheduler.

## Overlap (Double, Triple)

Playing multiple audio files at the same time.  A double overlap means two files can be heard, a triple means three files can be heard.  This capability requires that you have multiple audio playback devices available simultaneously.

## Peripheral Device

Any hardware device connected to a computer (CPU), such as a monitor, keyboard, printer, disk, tape, graphics tablet, scanner, joystick, paddle and mouse.

## Production Mode

An inexpensive way to have a second copy of Simian to use for production tasks.  This is provided so users can edit logs and carts remotely.  Everything will work in this mode except for automated audio playback from the Main Decks.  Check out the Session section of Chapter 3 for more information.

## Program Log

A list of items to be played by Simian in chronological order.  The log is displayed on the left of the Main Window.  Entries, or items in the log are called Events.

## Relay Rack (Switcher)

The circuit board and rack-mount box in a Switcher Kit.

## Sampling (Digitizing)

The process of converting an analog to digital signal is known as digitizing or sampling.  With audio, the analog waveform is chopped into a number of slices per second.  At each slice, the amplitude is measured and rounded to the nearest available value.  The more chops per second (sampling rate) and the finer the values assignable to the amplitude (dynamic range), the better the representation of the original.

## Sample Rate

The rate at which the data in an analog audio signal is measured to form a digital representation of the sound wave.  In a computer, it is impossible to work with an infinite amount of data, which is what would be required if a continuous wave were to be represented digitally inside the machine, so at every possible instant in time we would have the measured value of the waveform at that instant.  For this reason, it is necessary to sample sound wave data.  Sampling means breaking a wave at various intervals and using

a single measured value to represent all the values in each interval.  By dividing the waveform like this, one second of audio can now be represented by a finite number of values.  The sample rate is the number of measurements taken per one second of audio.

### SayTime

Accessory software that allows Simian to say the time of day.  SayTime is customizable for your own voices and the time statement can include a station header (WKRP News time is…).  There is also a macro command with the format SAYTIME.

### SayTemp

Accessory software that allows Simian to actually speak the current temperature.  SayTemp is customizable for your own voices and the time statement can include a header (Current temperature in Cincinnati is…).

### Sectone

"Sectone" or "Sec Tone" is a broadcast term related to the use of magnetic tape cartridges or carts.  Sectone is short for secondary tone and indicates the point, or cue, near the end of a song where it's OK to begin playing the next event.  It is the starting point of the "Segue".

### Segue

A transition between two audio segments.  The segue length is the time during which two consecutive audio segments overlap or are played simultaneously.  The sectone setting determines the segue length.

### Sound

When objects vibrate or collide, they produce an excitation of the molecules in the surrounding air.  If the resulting vibrations are within a certain frequency range, we sense it in our eardrums as a change in air pressure.  Our brain then interprets this as sound.  Sound waves move in all directions outward from the original disturbance like the ripples created from a stone dropped in a pool of water.

When sound is recorded through a microphone, the changes in air pressure cause the microphone's diaphragm to move in a similar way to that of the eardrum.  These minute movements are then converted into changes in electrical signals.  All sound cards generally produce sound in this way, only in reverse.  They create or play back sound waves.  The changes in voltage are then amplified, causing the loudspeaker to vibrate, which in turn cause air pressure changes which are interpreted by humans as sound.

The frequency range of vibrations felt by humans is between 20 and 20,000 cycles per second.  This gives us the sensation of pitch, harmonics, tone and overtones.  Frequency is measured in Hertz (Hz).  One Hertz is one wave repetition or cycle per second.

### Sound Card

The expansion board in your PC that enables it to play or record digital audio files.  The modern PC sound card contains several hardware systems relating to the production and capture of audio. The main systems capture and replay digital audio.  Sound waves from these systems are produced  by playing a digitized (or sampled) sound.

The digital audio section of a sound card consists of a matched pair of  digital-to-analogue (DAC) and analogue-to-digital (ADC) converters and a programmable sample rate generator.  The computer reads the sample data to or from the converters.

### SoundHound

An application that manages your audio file database.  It sits on your Windows taskbar and can be accessed by double-clicking the binoculars icon.  Auto launch and exit functions for SoundHound are in the Tools/Hardware Options menu in the Playback tab.

### Speedy (BSI Product)

Automated CD-to-PC dubbing.  The recording system automatically dubs, names and tags each song for you.  Transfer one, several or all tracks easily.  Audition songs before dubbing if desired.  Speedy does not dub faster than normal dubbing -- it automates the process.

### Spot

A commercial or advertisement.

### Start Date

The first scheduled date for use of an audio file.

### Stereo

Two channels playing spatially related audio signals.

### Stinger (BSI Product)

Instant Audio Player that gives you fast, easy access to your sound effects, liners, beds and bits.  Up to 288 audio cuts can be instantly available for playback in Stinger and each has its own on-screen description and button which can be color-coded.  Supports drag and drop manipulation.

### Streaming Audio

Audio transmission over a data network. The term implies a one-way transmission to the listener, in which both the client and server cooperate for uninterrupted sound. The client side buffers a few seconds of audio data before it starts sending it to the speakers, which compensates for momentary delays in packet delivery.

### Switcher

A General Purpose Output device that creates contact closures via the RELAY macro in Simian.

An electronic signal is sent from Simian to an external device such as a tape recorder or satellite.  Switches are sent through a special device on an audio card or specific purpose I/O card.  Depending on the input hardware you install, up to 24 Triggers can be programmed to launch various events.  The settings for the Triggers can be saved as sets.  The sets can be changed via the program log so that Simian can perform different functions with different sets loaded.  This is very useful for stations that use more than one broadcast network.

### Switcher Kit

A BSI product that includes the hardware, software and drivers necessary to control external devices through Simian.  The kit includes an I/O card, a circuit board with 24 external Relays to switch external audio and control lines and all the necessary cables and software.  Switcher commands can be executed via the program log, a HotKey or Trigger.

### Tag

A live "add-on" to a commercial spot.  A piece of text typically read by a Jock after a generic commercial which customizes the ad by giving additional local or specialized information.

### Time Events

Includes "Timed Start Immediate",  "Timed Start Next", and "Timed Non-Sequential" events.  These will occur at the time set in the time box (in 24-hour time) regardless of whether something is already playing or not.  Time events are indicated by an "@", "#", or "N" sign in the "Cue" column of the program log. The scheduled time is indicated in the "Scheduled" column.  Start Next events are similar to Timed Start events, except that they will allow currently playing audio file to finish before they start.

### Time-Shift Recording

A new feature of Simian that allows you to record and playback a file simultaneously.  This means you can start recording a network program (via satellite for example) and begin playing it back on-air at a scheduled time even though the program is still recording at the other end of the file.  Previously, you

would have to wait for the entire recording process to complete, close the file, and then reopen it and play it back. This would often disrupt schedules unnecessarily.

### TimeSync

A macro command which turns time synchronization on or off. Example: TIMESYNC ON would tell Simian to look for a time synchronization Trigger according to the TimeSync settings established in Tools/Program Options on the General tab.

### Traffic System

A software system used to manage commercial scheduling and billing functions.

### Triggers

An electronic signal from an external source such as a satellite that is received and interpreted by Simian. Triggers are received through the PC game port or a special I/O card.

### Trigger Kit

The BSI Triggers Kit provides Simian with 24 incoming "Triggers" to respond to external contact closures from satellite receivers, audio mixers, tape decks and other equipment. The kit includes an I/O card with resistors installed, a connection cable, a MINI-37 terminal board and software drivers as well as the installation and wiring documentation for the kit.

### Voice Track

A digital audio segment of a voice recording associated with one or more songs (cuts). A Voice Track can serve as an introduction to a cut (also called "talking up" or making an "intro"), as an announcement after the cut has played (a "back announcement") or as a "bridge" which gives information about what has just played and also what is coming up next.

### Wave file

A standard sound (audio) file in Microsoft Windows. Wave files have the file extension WAV.

### WaveCart (BSI Product)

On-screen "cart machine" that displays up to ten decks full of audio files and gives you instantaneous, crystal clear playback. WaveCart supports spot rotation and can also play more than one spot at a time.

# Index