

AES Regions and Sections Meeting for Student Sections

AES Education Chair John Krivit meets with student chapter officers and faculty advisors to offer new ideas for revitalizing your student chapter.

Those who seek to start a student chapter on their campus are also encouraged to attend.

Think of this as our version of the popular Regions and Sections Meeting at the AES conventions.

Active Listening

Using the control room monitors, we'll listen to and discuss what's really happening in the music presented. Starting with balances, moving on to tones, theories on how those tones are achieved, and effects and processing. I plan to have examples from different eras, and styles. The session will be very interactive, encouraging people to react, and question what they hear.

The Analog Listening Lounge

Sponsored by Gotham Audio LLC, the Lounge features an array of vintage home playback equipment, with a recently expanded variety of interesting pre-recorded tapes, LP's and CD/SACD reissues for your informed listening pleasure.

It also showcases historical literature and catalogs from the archives of Gotham Audio and The Bedford Consultancy along with a display of Gotham Audio Cables.

Lewis Frisch (Gotham Audio, The Bedford Consultancy) will informally discuss many interesting aspects of recordings from the 1950's, 1960's and early 1970's, demonstrating how these sounded when played back through some of the modestly priced integrated systems, amps and speakers that were common in apartments, college dorm rooms, and middle class homes during the 60's and 70's.

Experience what it was like to hear this music on some of the equipment that defined good audio for the discerning listening audience during the years when High Fidelity and Stereo entered mainstream popular culture. You may be surprised by what you hear!

Audio-4-Video/DSLR

In this session we will cover how to get good audio for video using mics, boom poles, field mixers and other gear. We will explore the hierarchy of mic techniques, putting mics on actors (hiding them), using boom poles, Single system vs. Dual system recording, Getting audio into the camera, wireless hops, etc.

Audio Power Amplifiers-Bob Cordell

This presentation will cover the design and application of audio power amplifiers, including selected topics from Bob Cordell's new book *Designing Audio Power Amplifiers*. Time will be available for a question/answer period. Topics will

include:

- power amplifier design basics
- amplifier power ratings
- factors affecting sound quality
- balanced and bridged amplifiers
- heat generation and fans
- class H amplifiers
- class D amplifiers

Blumlein Did What? Revisiting the Acoustic Obstacle Recording Technique

Early stereophonic experimentation conducted by Alan Dower Blumlein is often misunderstood. Microphone techniques bearing his name were actually derived from his work by other engineers after his untimely death. However, a close reading of a British patent awarded to Blumlein in 1932 reveals a truly unique approach to stereo recording that has never been fully replicated. In this presentation, I outline the fundamental concepts of Blumlein's acoustic obstacle recording technique and build a case for further experimentation in both stereo and multichannel applications.

Breaking into the Industry, from Intern to Working

There is much to consider when beginning your journey in the World of Audio. Where to move? Who to work for? How to survive? This panel will talk about ways to stay flexible, easy ways to meet people, start working and how to keep learning.

Build your online audio portfolio

As hard copies of media diminish, so do the credits and liner notes. While artists have their name on music tracks, engineers, producers and studio owners risk losing their hard earned credits. Using free cloud based tools such as Weebly and Soundcloud, workshop attendees will start building their online web portfolios to establish their brand and showcase their skills and past work to future employers and clients. Attendees should have access to at least one past piece of work; either on CD, MP3 or accessible via the web.

Concert System Equalization and Alignment

Join Doug Fowler for an overview of concert system equalization and alignment, including multi-channel averaging and subwoofer alignment to main systems

Control The World with the Artist Series

Take deep, hands-on control of your favorite audio and video applications with Artist Control—a compact control surface with unmatched integration and programmability that acts and feels like a physical extension of your software. Speed up and enhance your workflow with functionality far beyond what a

mouse and keyboard can provide, so you can focus on being creative.

Artist Control features EUCON (Extended User Control), a high-speed open control protocol that has been adopted by many of the world's leading software developers. Pro Tools, Media Composer, Apple Logic, Apple Final Cut Pro, Steinberg Cubase, and many other applications support EUCON™, giving you highly responsive control over almost all software functions. You gain high-resolution, high-speed control over almost all software functions, and a tightly connected "software as hardware" experience.

Creating Your Own Opportunities in the World of Audio

John Krivit and Barry Marshall offer some successful guerilla marketing techniques for matriculating into the audio industry. Because "one size does not fit all," stop by to explore the strategies that will work for you!

The Basics of Digital Audio

Digital audio workstations are now ubiquitous in recording studios, for many of us it is hard to imagine working without the incredible flexibility they give us for manipulating sound. But this flexibility comes with a price, in as many ways as you can manipulate sound within a workstation, we can also mangle it resulting in distorted and poor quality audio. Just as a thorough understanding of signal flow is required to maintain quality in an analog signal chain, an understanding of digital audio theory is necessary to insure quality in a digital audio workstation. This tutorial will cover the basics of digital audio from sampling and quantization to signal flow within digital audio workstations. The presentation will include frequent demonstrations allowing participants to hear the effects of digitization and will not include any complex mathematics.

Digital Asset Management for Recording Engineers

How many times have you opened an old recording session and wondered which was the master session file, or if the vocal edit you're listening to is actually the correct one? How many times have you had to hunt down missing files or have you ever lost a recording because of hard drive failure or accidental erasure? The common use of digital audio workstations means that the recording engineer now has become an IT professional and often spends as much time managing data as recording music. This workshop will address the subject of best practices for the creation, storage, and preservation of digital audio recordings and will present scalable solutions for managing digital audio data for the recording engineer and small studio.

Digital Mics

Learn about Sennheiser and Neumann's digital microphone technology through an interactive hands-on workshop. This workshop will show how these digital mics work, what makes them different and the various applications they can be

used for. We'll also listen and compare them with some of their analog counterparts to hear differences and similarities with live musicians in the studio.

The iPod Generation: The Audio Artifacts the Consumer Is Listening To

After a brief introduction to the psychoacoustic principles exploited by data compression (critical bands, minimum audition thresholds, simultaneous masking, and temporal masking), and a brief introduction to the capabilities and limitations imposed by the various components of encoders (frequency lines, windowing, temporal accuracy, compression considerations<CBR versus VBR, bit rates, and stereo modes), common artifacts produced by various encoders will be presented as audio, RTA, or waveform graph examples (stereo image changes, loss of bandwidth, pre and post echoes, double speak, ringing, bass fuzziness, flattening of dynamics, phase shift, "swirlies," frequency content and noise addition, musical content removed and noise added, and the results of more and less adaptive encodings). The presentation will focus on the artifacts created by a variety of current and common music download and dissemination formats.

Do-It-Yourself Acoustics

Principles of recording space acoustics will be explored through specific studio examples. Participants will get to see measurements and hear recordings of specific acoustical changes to recording spaces. Connections will be made between planning recordings, measuring spaces, and hearing the differences.

This information will then be applied to the construction of free standing absorbers/diffusers useful for changing the sounds of rooms as well as being used as gobos. This session will not cover room construction but rather methods of getting the most out of the room you have.

Drum miking techniques

This session is targeted toward the live and studio engineer looking to get an effective drum sound. I approach this in several ways depending on the location. I start with a single mic than keep adding mics until the entire kit is miked. It allows the students to hear the effect of adding each mic to the set.

Film / Capture through Post covers the role of the sound professional for film. Sound begins on set by capturing and maintaining the reality that appears in front of the camera. It then undergoes a shaping process in post that may totally change or reinvent that reality. We will talk about "sound" planning: working with the script, music, sound design, dialogue recording and ADR to create a reality that matches and enhances the content on screen. Important issues of equipment, budget and time constraints, and team dynamics will also be addressed. The final phase will tackle the layering/mixing of sound to recreate and enhance reality, the ultimate job of a sound designer / editor /

mixer. This panel is composed of three professionals whose diverse experiences should bring about a great discussion addressing this broad topic.

5.1 Made Easy!

The proper alignment of a 5.1 playback system (using my designed laser guided system). How you want to present the music or concert in Surround. Methods of capture both in studio and on remote recording sessions. Use of the 5.1 sound field at mix time. Playback of recordings done in 5.1, from simple 'studio-in-the-box' devices to full blown high resolution DAW 24/96 equipment.

5.1 Set-Up

Let's discuss the proper surround sound set-up and take an overview of the different Surround Sound Systems

- Ø How and why you put speakers in different locations
- Ø Why are there 7 approved Blu Ray formats?
- Ø Dolby Versus DTS
- Ø 10.1 ????
- Ø Upmixing and Downmixing
- Ø Broadcast Surround
- Ø Where can you use Surround Technology?

Forget NORAD, Here is Ultimate Command Center

The Fusion is a high-performance consoles, best of both worlds—a dedicated, expandable DSP engine and complete EUCON Hybrid control in one console, enabling you to gain deep tactile control over multiple external DAW channels, as well as the console's own DSP channels, simultaneously, with more mixing power under your fingertips

Future of Audio Recording

Let's explore where the industry is going. What can we expect?

Getting it Right Before the Downbeat

Producers and Engineers. How to prepare and guess what the does and don't are in a recording session. Learn about preparing for the best and worst. Learn about who and when you need to book and prepare a checklist and outline for a professional session. Don't be caught unprepared or unprofessional.

Its All About Control....

Open yourself to the possibilities. Pro Tools 9 redefines the world's most popular, most advanced music and audio production platform with a completely re-architected, open version of Pro Tools software, giving you what you asked for—and so much more.

Work with an audio interface—or without. Create bigger, better-sounding mixes with more tracks, Automatic Delay Compensation, and other pro features included as standard. Open your workflow to projects created in other audio and video software—and to the entire Avid Artist Series and the S5 Fusion console/controller line. With Pro Tools 9, you can compose, record, sequence, edit, and mix the way you want—in more ways than ever.

Late Night Recording with Mark Rubel and Friends:

Big Fun, as Mark Rubel, Chris Mara, Greg Norman, Jonathan Pines and other friends collaborate on recording a band, demonstrating and explaining a host of creative and useful recording techniques.

Live Sound & Recording: Big Band Jazz On a Budget

A presentation of the techniques and technologies used to record various jazz/big bands in various situations, including the Kansas City Jazz Orchestra (a professional big band in KC), community concert series events, and the educational institution market. Not-for-profit usually means limited budgets. The evolution of the sound systems needed, recording technologies and techniques employed, and audio examples (good and bad) will be presented. Producing great sound while using systems designed around a realistic budget, specific performance venues, and limited logistic and personnel resources will be discussed.

Live Studio Session Nashville

Come discuss, participate, and work with producers, engineers, and artists in a simulated Nashville recording session. Volunteers will be asked to put their knowledge to the test as we work a typical session in Nashville. We will have the benefit of stopping and starting to point out scenarios that future producers and engineers might face in a fast paced recording environment. Come see if you can keep up and cut it in Music City.

Make it sparkle/Make it shine – An advanced look at effects

Without any supplemental plug-in packages, DAW's such as Pro Tools offer a plethora of opportunities to create special production moments in a mix. This workshop will start with the methodology basics of applying time-based effects such as reverb and delay within a mix. Advanced effect techniques include ADT (automatic double tracking), the multiple uses for distortion, reverse reverb effects, and stutter edits. Finally, the creative uses of automation on effects and effects ends will be explored.

Microphones: How They Work and How to Apply Them

This presentation will cover different types of microphones used in studio and live situations. Topics include how each type (dynamic, ribbon, condenser) generate sound, polar patterns and directionality, balanced vs. unbalanced lines, phantom power, etc. I will also dissect what the specs mean: frequency response, sensitivity, max SPL, etc.

Production Workshop: (formerly "Late Night Analog")

Music production without a net: Musician/Producer/Engineers Dr. David Burdick, Mark Rubel, Tony SanFilippo and Tommy Wiggins will write, record and produce a song on the spot- audience participation is required!

The First Producer? Phil Spector and the Legacy of the Svengali Producer

While not the first producer to be credited on a record (Jerry Leiber and Mike Stoller did it first on Atco in 1956) Phil Spector invented the role as many of us know it. Starting his own hugely successful label, Philles, he produced 25 hits in the five years between 1961 and 1966 before "retiring" at 26! He then came back (in a burst of controversy) to produce The Beatles swan song, *Let It Be* in 1970.

He was instrumental in the success of the solo careers of both John Lennon and George Harrison, producing the singles "Instant Karma", "Power to the People" and "Happy Xmas (War is Over)" and *The Plastic Ono Band* and *Imagine* albums for Lennon and *All Things Must Pass* and *The Concert For Bangladesh* for Harrison.

Spector also produced the greatest Christmas album of all time, *A Christmas Gift for You from Philles Records*, as well as the most commercially successful album by The Ramones, *End of the Century*.

Barry Marshall will present a lecture on Phil Spector's legendary "Wall of Sound". He will show how Spector developed the role of the producer as "Svengali" with artists like the Ronettes, the Crystals and the Righteous Brothers becoming nearly interchangeable vocal puppets, and then how he adapted his style and approach to work collaboratively with powerful "persona" artists like John Lennon and George Harrison.

Introduction to Pro Tools

Designed for the beginner audio student, this introductory workshop takes attendees through the powerful features found in the most popular DAW. Topics covered will include setting up and recording the first sounds, overdubbing and cue mixes, understanding the powerful editing features found within the program, and ultimately combining multiple sounds to create the final mix. Additional topics include digital recording basics (i.e. headroom, sample rate, bit depth, etc), the importance of communication in a recording session and effectively backing up projects.

Records That Made Me Want to Record for a Living:

The idea for this panel originated with Craig Schumacher at the much-missed Tape Op Conferences. At the end of an intensive weekend of exploring the audio arts, it's wonderful to focus on what it's all about for most of us: the music. Each participant will talk about a record that inspired them and made them aware of the possibilities. Records will be played. Questions will be asked, and philosophies articulated. Souls will be searched.

Room and Speaker Acoustics 101

- Ø Where do you put your speaker?
- Ø What are room modes and how do you correct for them?
- Ø What makes a good loudspeaker for a studio?
- Ø How do you test a speaker?
- Ø How can I fix the acoustics in my studio without breaking the bank?

Slick, Trick & It Will Blow Your Mind - Processing

What elevates Fusion above other mixing systems is EUCON Hybrid. With the EUCON control protocol, you can take deep, tightly integrated tactile control of an application over high-speed Ethernet—Pro Tools 9, Logic Pro, Pyramix, Nuendo, Digital Performer, and other DAWs all directly support EUCON. With EUCON Hybrid, included with S5 Fusion, you get extended console control capabilities—beyond the dedicated DSP cards—to the outside world, bringing DAW tracks from multiple workstations onto the console surface for mixing. You can select, place, and control tracks on the Fusion surface from any DAW running the EUCON Client Application on your network. Position tracks anywhere you want on the surface. You can even place multiple tracks from separate DAWs in any order on the surface, simultaneously, next to the S5 Fusion DSP channels. You can then save these channel placements as Layouts for easy access and organization—for example, you can have one Layout for DSP channels, one for Pro Tools, and one with combinations from multiple DAWs. This greatly extends the capability of the console, enabling you to access DAW tracks that would otherwise be available only as traditional playback sources. With EUCON Hybrid, it's now possible to have direct, high-speed access to any of these tracks, their plug-ins, and metering.

Solution Beyond Limits

Though it resembles and functions like a traditional analog surface, the Fusion control surface gives you more power and flexibility to mix faster and easier than ever. You can customize the surface for your project needs—from 8–56 channel strips. Each channel strip includes a multiformat, motorized fader, as well as eight touch-sensitive knobs for EQ, filter, compressor, expander/gate, Aux sends, and pan control, that you can also use to control DAW functions, including

adjusting TDM, VST, and Audio Units plug-in parameters. Gain complete control of your mix using the master module and one that houses a display for the eMix software and twin joysticks. And with the high-resolution screens, you have instant visual feedback on your metering, track info, routing, and more.

Sound Design for Broadcast and Film

The purpose of this presentation is to explore, analyze and discuss the approach and application of sound design across a variety of mediums. An insight into the thought as well as technical process behind working with the voice, selecting and placing music and sound design strategically. How may this process vary for different mediums? What is the end result supposed to accomplish? Getting the message across clearly, creating maximum impact in minimum time. We will begin with creation of aural landscapes for radio, and move on to bringing 3D graphics to life. We will discuss how to work within and around the music, as well as literal sound design/effect placement or enhancement for television and film.

Sound Design for Theatre

The theatre profession loves creativity and collaboration often allowing more creative freedom and earlier input than in other areas of sound design. Find out about what is possible in this field in a discussion with two professionals. Hint: its a lot more than crickets. This session will cover information of interest to system designers, soundscape creators, and composers.

Studio Protocols and Procedures

Beyond signal flow and gear - How to succeed in the studio/servicing the client - What it takes to land that job and keep it. This panel will cover what is really the most important aspect of a successful career in recording: understanding how to interact successfully with the people in the studio and on the production team and be an asset to the recording session and studio. Of course, knowing signal flow, ProTools, mic technique, dynamics, etc. is essential; after that it's about servicing the client. Knowing how to run the gear isn't enough. Learn how to be the person clients request and why.

Sunday Morning Story Time:

One of the best reasons to be involved in the craziness of show business is the resulting anecdotes. It's no holds barred, hilarious, outrageous and mostly true stories from this group of rock 'n roll raconteurs!

Vintage Gear Addicts:

Attend this semi-annual meeting, where fiendish aficionados tell tales of vintage gear hunts and discoveries, talk about what "vintage" means, whether and why it may be better, where to find it, and how to evaluate and maintain it. They'll

discuss what might become future classics, and so much more. Various rarities and oddities will be shown and demonstrated- and even, given away!

Wacky Tracking:

The dynamic duo of Chris Mara and Mark Rubel present a shameless and dazzling display of outlandish and bizarre recording techniques, featuring Tony SanFilippo at the drums.

Women in Audio

This panel will explore what was it like for women in the industry in the past and how have things changed. How can women move forward in the industry? These issues were identified decades ago, why haven't they all been resolved?