Telex Communications, Inc.

# PRO AUDIO GROUP

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PRO AUDIO GROUP

**ISSUE 5** 



To more fully serve customers and clients, EV has redefined the ethos of its technical services group to include more hands-on, in-the-field assistance. Besides offering traditionally strong technical phone support, the group recently introduced the SoundAdvice program - which includes design assistance and suggestions for individual products and applications, in addition to sophisticated room and cluster modeling/measurement capabilities.

IN-THE-FIELD ASSISTANCE

Technical services group director and Pro Sound loudspeaker product manager, Jim Tassey, points out his role and the future of the program: "I am very excited about the direction we are headed. My assigned task was to establish the staff, equipment and data needed by our customers to better apply our products in their 'real worlds'. This gives the group the opportunity to maintain the historical support provided by our brands, which is more than simply publishing data sheets and manuals. Our job is to uphold the philosophical ideals of the pro sound industry -- to analyze, teach and continually learn. The combined strengths and resources of this company have managed to maintain a prioritized, ethical focus on assisting the customer, and in my old-fashioned attitude, that is the best sales tool we can provide for ourselves, customers and end users. This industry has always shared unconditionally with me, and I look forward to the opportunity afforded us with this group to return and pass on the tradition."

Traditionally, the Electro-Voice name has been associated with strong technical support services, and customers have relied on access to these services. However, Tassey is quick to identify the functions of the technical services group as more than simply providing technical support after the sale for products. In addition to the basic product information provided by the already reputable department, the technical services group also offers application support and sound system design assistance."With all the new product introductions rolling out of the company, there is an even greater need for more stringent customer service and technical expertise from the factory,"

Lots of important information to help you navigate the landscape of professional audio products and services worldwide.

The group has also grown to include acoustic technicians whose responsibilities include taking anechoic measurements of multi-box systems. Customers can also be provided processor presets determined most appropriate for given box configurations (e.g., amplitude shadings, frequency shading, time off-set concepts, optimum protection, etc.) With the accessibility of a standardized technical support form on the new and improved EV web site, request numbers are growing exponentially as users become acquainted with the site.

SoundAdvice technical support specialists function as information coordinators specialists who collate information for the customer — a necessary addition to the total EV marketing effort.

continued on page 2

#### **JANUARY 2001**

#### Page One:

• Telex Pro Audio Group Revitalizes Technical Services: SoundAdvice Provides In-the-Field Assistance

#### Page Two:

· Employee Focus: Wired and Wireless Product Management

#### Page Three:

• EV Product of the Month: Cobalt™ Microphones

#### Page Four:

• Telex Product of the Month: AudioCom™ Instantaneous Auto-Reset™ Technology

#### Page Five:

- EV Web Site Update
- ROW: Telex Represented in Argentina
- Artist Endorsement Update: P.O.D.

#### Page Six:

• Engineering Q & A: Steve Jakowski on Speakers



L to R: Jeff Johnson, Robert Deyarmond, Darin Stephenson, Jim Tassey, Kent Peterson

#### Continued from page 1: Telex Pro Audio Group Revitalizes Technical Services: SoundAdvice Provides In-the-Field Assistance

From providing basic product information to sound system design assistance for foreign arena installations, all calls are expeditiously routed to the appropriate experts. Engineering research and design information (electrical, mechanical and acoustical) are at the group's immediate

disposal and the specialists within the group are able to distill this engineering information into practical usage criteria. By providing valuebased services, the technical services group helps ensure the highest return and profitability of EV products. "If we are able to teach the contractor how to use our gear profitably, they successfully and willingly use our gear" says Tassey. "That's why the technical services division was created to augment the marketing division's efforts. This group is responsible for

handling any 'in-the-field' customer-related issue from product requests to training to application issues." Ultimately, this follows in the tradition of EV.

Look for additional newsworthy items from the EV Technical Services Group/ SoundAdvice in the near future. To contact SoundAdvice technical support, please call their new number, 1-(866) 78AUDIO.

#### EMPLOYEE FOCUS: WIRED MICROPHONES PRODUCT MANAGEMENT



Jerry Falk

Jerry Falk, product manager for wired microphones, has been with the Telex Pro Audio Group for just over a year. However, Falk's experience as a product and marketing manager in other industries exceeds

15 years. At Telex, Falk's primary role is to manage the development of new products and revisions to existing models in order to maximize sales and profits. Falk works directly with dealers, their customers and the internal sales force in order to identify potential new products or model enhancements that offer the best potential to increase our market share, sales review and ultimately the profitability of microphone products. Falk also works directly with the engineering group to design products that meet customer requirements, as well as meeting with the manufacturing and materials group to decide the best way to produce the products. Falk's relationship with the sales force involves the pricing, promotions and marketing communications to ensure that the product is launched correctly.

Falk feels that one of the characteristic strengths of Telex is the company's brand equity: "Our portfolio of respected brand names gives us the ability to offer the customer a wide variety of sound reinforcement products not matched by any of our competitors," remarks Falk, "and recent hiring of key industry people from other leading manufacturers will give us the ability to compete with new products and programs better than ever."

Over the last year, Falk has been instrumental in the conception, planning and launch of Cobalt microphones. "Cobalt," says Falk, "is the first major product that I've headed for the Telex Pro Audio Group, and I'm very, very excited about the potential here. Designed to provide the advantages of neodymium magnet structures in a lower cost product line, the feel, look and sound of these microphones are at such fantastic prices that they will become one of the best microphone values in the market."

With regards to sales representatives and dealers, Falk believes it is his job to support them to the utmost degree: "We need to continue to work as partners in each other's businesses. It's a mutual exchange of information that results in having the right products and programs to maximize sales for all involved in the distribution chain."

Dave Egenberger, product category manager, wireless microphones, has been employed with Telex for four months. Prior to his position at Telex, Egenberger spent nine years in the telephone headset industry with a company that grew from \$9 million to \$120 million a year. "We went through four mergers and combined three product lines, which gives me a unique perspective on the Telex/EV situation," remarks Egenberger.

Egenberger, who began his career as an electrical engineer, and moved through stints as continuation engineer, senior product marketing manager, quality manager, OEM sales manager and brand manager brings vast experience to his position at Telex.

To his credit, Egenberger's past accomplishments include being awarded several Presidents Club awards for exceeding sales as a sales manager, an "Employee of the Year" award for merging two product lines and departments, and a special Presidents Award for leading an ISO 9002 certification effort.



Dave Egenberger

As an employee of Telex Egenberger's main responsibility is the P&L for the wireless product line, including all of the EV/Telex wireless microphones, SoundMate, ENG, and police wireless products. Among other

duties, Egenberger supports and nurtures the management of product development projects, promotion, technical support/ training, product development planning and product launches.

"The strength of Telex is the diversity of products and brands and the way we are set up to take advantage of them. Telex Pro Audio Group is a great example. With strong brands like EV, Midas, Telex, and Klark Teknik, we have a complete line of pro audio products and the collective marketing, engineering and manufacturing resources of Telex Communications to take them into the future. We are stronger than any of the brands would be individually."

Thanks to Jerry and Dave and all wired and wireless microphone support staff at Telex Pro Audio for their excellent work and commitment to excellence!

## EV (ELECTRO-VOICE®) INTRODUCES NEW COBALT<sup>TM</sup> PROFESSIONAL MICROPHONES

Coinciding with Winter NAMM 2001 in Anaheim, EV (Electro-Voice\*) is launching Cobalt, a new line of professional microphones clearly designed with musicians in mind. A perfect blend of today's aesthetics, high performance and durability, Cobalt microphones offer excellent vocal intelligibility, EV's radical neodymium-based magnet structure, exceptional feedback rejection at high SPLs, low handling noise, extended frequency and controlled proximity effect.

EV's Cobalt vocal and instrument microphones provide professional-quality performance at a price that working musicians can afford. Whether you're a lead vocalist or miking an antique dobro, a vintage guitar amp, brass or percussion, Cobalt microphones keep your tone "intact."

Additionally, all Cobalt microphones come packaged in EV's unique, rugged carrying case and gig bag — perfect for the rigors of the road. Cobalt styling also adds to the production of any concert or performance.

EV Cobalt vocal and instrument microphones set a new standard for performance and value.

#### Co9 Premium Vocal Microphone:

The Co9 is destined to become a favorite among vocalists across musical genres. Regardless of the live performance application, sound technicians and engineers will feel confident with this mic. A slight bass roll-off and accentuated mid range make this a superb, world-class sound transducer.

Key product features include a dynamic neodymium element, cardioid polar pattern for superior feedback rejection and acoustic isolation with a frequency response of 50Hz – 18kHz. The sensitivity is –50.0 dBV.

#### Co7 Crossroad Vocal Mic:

Whether you're traveling on tour or getting serious in the studio, the Co7 is the perfect choice for the performer who wants hassle free sound. In high volume situations or under the critical demands of today's recording studios, the Co7 performs without the feedback problems of competitive models. Built to the same standards as EV's N/DYM\* microphones, this mic's low handling noise and versatility also make it ideal in critical acoustic settings.

Key product features include a dynamic neodymium element, cardioid polar pattern for superior feedback rejection and acoustic isolation and a frequency response of 50Hz – 18kHz. The sensitivity is –50.0 dBV.

#### Co5 Classic Vocal Mic

Designed for the performer who prefers a careful balance of highs, midrange and bass, the Co5 offers exceptional vocal intelligibility with controlled proximity effect. Got the blues? Pull out your harp. With the Co5 you get clarity and powerwhen you want it. This dynamic cardioid microphone with neodymium magnet structure, a frequency response of 50Hz – 15 KHz, sensitivity of –51.0 dBV and low-Z balance of 600 Ohms, is all rock 'n' roll.

#### The Co4 Instrument Microphone

The Co4 is the newest addition to the Cobalt line. It was designed to yield outstanding performance in applications requiring the miking of acoustic and electric instruments, as well as vocal performances.

The Co4 uses a dynamic neodymium element with a cardioid pattern — excellent for stage or studio – providing a frequency response of 50Hz – 18KHz with a sensitivity of –51.0 dBV. The Co4 also features a unique "floating head" construction. The Co4 capsule is encased in a die cast zinc inner housing that is shock mounted inside an outer zinc housing. This gives the Co4 tremendous durability combined with superb shock isolation. Yet, the Co4 maintains a small profile that makes it perfect for tight miking applications such as drum kits.

Excellent for stage or studio, the Co4's versatility will make it a "must have" in any microphone mix.





For more information on Cobalt microphones please contact www.electrovoice.com

### TELEX PRODUCT OF THE MONTH: AUDIOCOM™ INSTANTANEOUS AUTO-RESET™ TECHNOLOGY

#### AudioCom™ Instantaneous Auto-Reset™ Technology

Auto-resetting power supplies have long been a blessing and curse for the intercom world. In one respect, the ability of a power supply to automatically recover from being shut down in a short circuit or other fault condition is the holy grail of the communications world. It saves the user from having to go to the power supply and manually reset the device, a process that can be impractical especially in live applications. On the other side of the coin, up until now, the method used by manufacturers to perform this function has been less than fail-safe. In many documented instances, power supplies that have remained under fault conditions for extended periods (i.e., overnight) have melted down leaving virtually nothing of any value.

In the past, power supplies with auto-reset have depended heavily on the built-in thermo-protection of voltage regulator devices. When a short is applied across the power supply the extremely low impedance on the line causes a large amount of current to be drawn from the supply. This large current drain generates excessive heat that far exceeds the dissipation ability of the voltage regulator. This causes the built-in thermo-protection of the regulator to shut down the device; however, when the temperature of the regulator falls below the threshold of the thermal protection, the device is turned back on. If the fault condition has been removed and current drain is normal, then life is good, and things are back to normal. If, however, the short still exists, excessive current is drawn again and the whole process repeats itself.

Always looking for an opportunity to turn lemons into lemonade, intercom manufacturers faced with this design flaw called it "Automatic Reset" and deemed it a feature. It did indeed solve the problem of having to manually reset the power supply after a fault condition,

but it did so at an enormous price. The damage done to power supplies in intercom systems with this "feature" was tremendous.

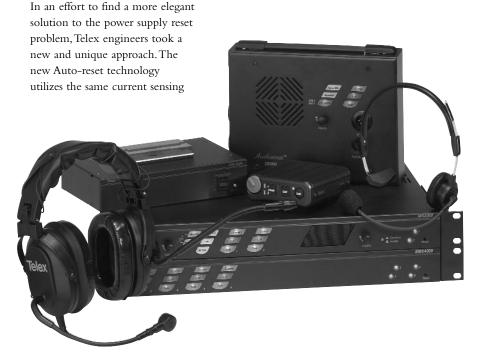
In many cases, power provided from the affected multi-channel supply feeding non-shorted intercom channels was also removed taking down critical communications links that should have otherwise been completely unaffected. In addition to the power supplies, in many cases this situation created fire hazards. Surely this was not the answer to the Automatic Reset dilemma.

AudioCom's answer was simply to omit the auto-reset design. The consensus was that user and equipment safety should come first. Existing AudioCom power supplies have current-sensing circuitry that detects line shorts, shutting down the power to the affected intercom channel. Currently, a user must then manually reset the power supply via a front panel button. Offering the highest level of reliability over both the short and long term, this system is extremely safe. Unfortunately, it is not always convenient and/or practical to send someone to the power supply during a production or event.

safety and reliability, but adds an intelligent circuit to dynamically monitor the line and instantaneously reset power upon fault removal. This intelligent circuitry does not just turn the power back on to see if it draws excessive current, it actively and continuously evaluates the line condition using advanced comparator circuits, and when safe, it instantaneously restores power to the affected intercom channel. The whole process of restoring power after the fault condition is removed takes less than 500 milliseconds.

as the existing system to ensure the utmost

By using readily available off-the-shelf components to create this innovative new Auto-Reset technology, Telex engineers have raised the bar of power supply performance and safety to whole new level. All future AudioCom power supplies will be fitted with this new technology. Users and facility managers can rest assured that regardless of conditions down-line from the power supply, AudioCom's Auto-Reset technology will ensure a safe and immediate return of intercom power when the fault is removed.



Electro Voice *REP LOCATOR* 

#### EV WEB SITE UPDATE

As a continuation in the conceptual, functional and aesthetic design of the EV web site, dealers, contractors and end users are now able to access new areas of interest:

• **OEM** – Complete archives of all products currently available to other manufacturers. In addition to full product descriptions, the area also features thumbnail images, specifications, engineering data sheets and contact information.

- Rep/Dealer Locator Designed to be user-friendly, the locator has full rep/dealer search capabilities for any location in the U.S. A color-coded map clearly denotes sales rep territories as well as a full contact list replete with phone, e-mail, address and other contact information.
- New Cobalt™ Wired Microphones Area -The "New Products" task bar now links the browser with a complete section on EV's newest wired microphone product offering - Cobalt™. Engineering data sheets are

available online for all current Cobalt models — the Co4, Co5, Co7 and Co9. Given the product's amazing specs, unique packaging and unbelievable price point, this is definitely a "must see"!

#### · New Press Releases

Please look forward to a fleshed-out "About EV" area and continued work on the highresolution graphics archive for dealers in our Trades Only area.

#### Telex Represented in Argentina

ROW Telefe Argentina, the second largest television network in Argentina, has purchased a Zeus 24 x 24 matrix, in addition to keypanels, IFB, wireless intercom and other components to outfit the studio used for the production of the Argentine version of the SURVIVOR show.

Telex RTS is represented in Argentina by ARS Technologies in Buenos Aires.



#### STRAIGHT OUTTA SOUTHTOWN: P.O.D. ENDORSES ELECTRO-VOICE® MICROPHONES

Over the last year, P.O.D. (Payable on Death) has become a media favorite - from Spin to Rolling Stone - the band has ridden a recent tidal wave of success. P.O.D's blend of metal, hip-hop, reggae, and latin sounds reflects the cultural diversity of the band's home, Southtown, located just 4 miles north of the Tijuana border. Thus, their sound is more than the bubblegum that has become associated with "SoCal" in the past few years - simply, these guys lay it down, hard and dirty.

Stage cohorts of fellow EV® endorsees Hed PE, Slayer, and Limp Bizkit, as well as Ozzy Osbourne and other Ozzfest 2000 performers, P.O.D. does not believe in segregating themselves from the roughest of the rough merely because they hold Christian convictions. Concerning the band's beliefs, the Chicago Tribune trumpeted "P.O.D. Is Into God, With Tact."

Nevertheless, controversy has engulfed the band, largely because of its contribution to soundtrack efforts for Hollywood films Blair Witch 2 and Little Nicky. The band sees it differently - ultimately, not as selling out to a secular industry, but as a chance to reach out to those unfamiliar with Christian music, let alone the Christian message.

The band's newest release, The Fundamental Elements of Southtown, has already reached platinum, the band occupying a king-of-themountain position on both Christian and Billboard radio charts. P.O.D. also holds the unique status of being the third band to hit No.1 on MTV's "Total Request Live." Wallpapered across America via MTV from Cribs to "Rock the Vote" and a recent appearance on "The Tonight Show with Jay Leno" — the band's popularity continues to grow. According to the band's monitors engineer, Michael Mordente, P.O.D's often lauded, excellent live sound can be attributed in part to the sound reproduction quality of EV® microphones.

Mordente's experience as an engineer spans nearly a decade, and having worked with the likes of Duran Duran, Jagged Edge, Monday Night Football and ICP, Mordente's experience speaks for itself. His choice of EV® microphones is based on extensive tour and studio experience with performers who demand the industry's finest sounding equipment; equally so, given the extremes of P.O.D's music, rugged and dependable equipment is a necessity — enter EV® N/DYM® wired and wireless and RE series condenser microphones.

On stage, P.O.D. is currently using EV wired and wireless microphones to great success in a variety of applications. Among their choice of EV mics, P.O.D. has been using the NRSCU-N7, N/D868 and RE200, characteristically known for their outstanding vocal clarity, ultra-low handling noise, minimal proximity effect and ultra-high output. For live performances, Sonny Sandoval, the band's lead vocalist, replaced a more expensive competitive wireless with the NRSCU-N7 (features the N/D767a element). Of the NRSCU-N7 handheld wireless, Mordente remarks, "Sonny really likes the grip, which is ergonomically designed and user-friendly. Also, the shape of the mic naturally deters cupping. And when Sonny first picked up the mic he used it in the correct position. Another thing, Sonny tends to crowd surf - he gets right out there - and the idea of handing him a spare mic will not work. With the NRSCU-N7, the dependability is there, not to mention drop-out free operation. We tried a lot of mics out, but chose EV because it blew everything else out of the water! The gain provided by the NRSCU-N7 wireless handheld gave Mike plenty of headroom to work throughout their sets each night."

continued on page 6

#### Continued from page 5: P.O.D. Endorses Electro-Voice® Microphones

P.O.D's drummer, Wuv, is equally thrilled with EV's RE-200, which he's been using on hi-hat and cymbals. Mordente explains, "I was blown away. The condenser stays isolated on the hi-hat without any bleed from other instruments — it captures a crisp, clear

cymbal sound and rejects external noise. Given the stage volume, it also provided superb sound in Wuv's in-ear monitors."

In addition, the N/D868 has been used exclusively on the kick drum and bass rig, which provides the kind of tight, extended low-frequency response P.O.D's sound demands. "The N/D868 has the kind of beef and dependability we need. It's great for capturing a crisp attack and the meat without unnecessary EQ. Unlike other mics, you don't have to worry about the N/D868 element popping - it's totally dependable. Used in conjunction with a standard direct set-up the N/D868 provided excellent bass presence in the monitors. This made Traa [P.O.D. bassist] very happy."

#### Engineering Q & A: Steve Jakowski on Speakers

A question I am often asked by various musician friends is "What should I look for when I go speaker shopping?" to which my usual reply is something like "Well, what do you plan to use it for?" After several minutes of discussion I am usually able to recommend the Electro-Voice product most suited for the intended application, and off he goes to you, the local EV dealer, to listen and (we hope) make a purchase. The next question is: What happens when he gets to your store?

We all know what "Point-Of-Sale" is. Every manufacturer goes to great pains to entice the buyer to choose a particular product right there, in the store, on the spot, which typically means five to ten feet away at ear level and dead-on-axis. There are some cheap, poorly built and woefully inadequate speakers out there that actually sound very good five feet away on-axis, but I certainly wouldn't want to use one on a job, and I most definitely wouldn't want to have my ears subjected to one for hours on end! That's where you come in. Show them how to look beyond the point-of-sale at what really counts in Real World Performance.

Pattern Control. Call it coverage, if you will. EV rewrote the book on pattern control in the early '70s with our Constant Directivity Horn technology. To illustrate this, play something with good clean vocals or

crisp acoustic guitar. Start on-axis about ten feet away if you can, and slowly move to the side. Hear it change? That's the laws of physics working, but notice how the EV speaker sounds more even, and changes less, all the way out to its rated coverage angle. Now, if possible, walk away from the speaker and stroll around the store. Notice how the music stays crisp and intelligible over a larger area when playing on the EV. In a stereo mix or DI application that means that more of the audience will actually be able to hear both sides of the PA and therefore enjoy the whole show, not just one side of it. Remind the customer that most of the audience is ALWAYS off-axis.

Equalization. You can't "fix" a poor speaker with an EQ.Yes, you may get it to sound great on-axis, but now you have exaggerated the off-axis problems, and if you EQ it for off-axis response, chances are you are going to hurt the poor souls who happen to be standing in front of it! (I know I wouldn't be for long!) Remember: a 3 dB increase is a small but noticeable difference in level, but to achieve it requires twice the amplifier power. 3 dB more means you have to double it again, and so on. In other words, to actually get the full 12 dB of boost of a typical EQ requires 16 times more amplifier power. At low level or in a dorm room this isn't a problem, but in the real world (as in real LOUD) this drives the amplifier into clipping, which

hurts both ears and loudspeakers (except for guitar players, who don't seem to notice or mind, but they're a different sort anyway). Remind the customer to start with a speaker that sounds good to begin with. A speaker that needs little or no EQ not only sounds the best, it will also last the longest.

Cost vs Value. Remind the customer that the cheapest price, the "deal of a lifetime", and the "big year end blowout" is nothing but a big waste of money if the item purchased doesn't do what it was purchased to do. Buying on price alone always leads to dissatisfaction because, in the end, You Get What You Pay For. At Electro-Voice, we aren't concerned with being the cheapest. What we are concerned with is VALUE.

EV products are, without exception, the best value in their class. From the incomparable X-Line™ and X-Array<sup>™</sup> all the way down to the little Sx-80, from the Midas Heritage and XL-4 to the workhorse PSX series, Xi, FRi and FRX permanent install systems, EV microphones, signal processors and power amplifiers and Klark Teknik electronics; the best value per dollar is right here!

So, all you dealers and contractors, display your EV signs and logos with pride. We've been making audio history since 1927, but, like the song says: "You ain't seen nothin' yet!"

Steve Jakowski, Project Engineer Electro-Voice Research and Development

USA Canada Switzerland Germany France Australia Hong Kong Japan Singapore Mexico

Latin America

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