

NOVEMBER 1983 • \$1.50

# Stereo Review

**Guide to Exotic Speaker Systems**

**Answers to Compact Disc Questions**

**Exploding the Myth of Concert Hall Realism**

## Equipment Test Reports

- Mirage SM-.4/Subwoofer Speaker System
- J.C. Penney MCS 3285 AM/FM Receiver
- Akai GX-R6 Cassette Deck
- Sennheiser MS 100 Headphones
- Infinity RS6 Speaker System

## Plus:

Pioneer KE-7200  
Car Stereo

## Disc Specials

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McLaughlin/Di Meola/De Lucia  
Rossini's *The Barber of Seville*  
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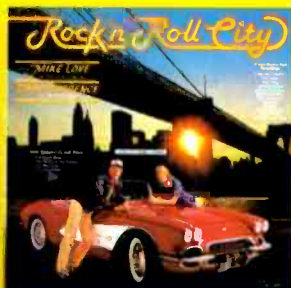
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# Stereo Review

(ISSN 0039-1220)

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1983

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COVER Design by Borys Patchowsky; photo by Geoff Rosengarten. See pages 34 and 40 for test reports on the Mirage Subwoofer and the Akai GX-R6 cassette deck.

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# To eliminate the major flaws of cone-shaped speakers we created speakers without a cone. Technics Honeycomb Disc Speakers.

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But perhaps best of all, the price of all this technology is remarkably modest.

Hear how eliminating the speaker cone can add to your music. Experience the startling fidelity of Honeycomb Disc Speakers from Technics.



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CIRCLE NO. 6 ON READER SERVICE CARD

# Bulletin

Edited by Christie Barter and Gordon Sell

● **BIG MOVE AFOOT:** Warner Communications Inc., whose subsidiaries include the Warner Bros., Elektra/Asylum, and Atlantic labels, and the European parent companies of the PolyGram group, which includes Polydor, Mercury, London, Philips, and Deutsche Grammophon, are discussing a "restructuring of their interests in recorded music." Under the proposed setup WCI would be a partner in two joint ventures--an American company 80% owned by WCI and a Warner/PolyGram company, for all countries outside the United States, 50% owned by WCI. The deal would also put the Warner/PolyGram block ahead of CBS as the largest in the business in the U.S., a position that CBS can certainly be expected to challenge. One rumor around the industry has it that CBS is talking to EMI.

● **COMPACT DISCS FROM EMI** are expected to reach the American market early in 1984. Classics on Angel will include the Debussy Images conducted by André Previn (Angel's first-ever digital recording) and two discs with violinist Anne-Sophie Mutter in Mozart and Bach concertos. Among the pop performers represented on Capitol CD's will be Pink Floyd ("Dark Side of the Moon"), Cliff Richardson (an as yet untitled new album), and David Bowie ("Let's Dance"). The first release will consist of twenty CD's, ten on Angel and ten on Capitol.

● **THE ROLLING STONES**, after more than a dozen years with Atlantic Records, are leaving that label and signing with CBS. The worldwide, long-term deal will reportedly earn the Stones about \$25 million for a minimum of four records. CBS will also ultimately acquire rights to the twelve albums the band recorded for Atlantic.

● **TECH NOTES:** A "unidirectional auto-reverse cassette deck" is the way that Nakamichi is describing a product the company will introduce this fall. The deck uses a pop-out turntable that flips the tape around and realigns it with the heads....General Motors and

Sumitomo, a Japanese banking and industrial company, are independently trying to develop magnets made of neodymium-iron alloy that would be much more powerful than conventional ferric magnets but no more expensive to produce. These are expected to have applications for loudspeakers, phono cartridges, and perhaps tape heads.... Blaupunkt has expanded its ARI traffic information system to Philadelphia.... The FCC has ordered the Harris Corp. to stop selling its AM stereo exciter because it is different from the one that the agency approved a year ago. Stations using the Harris exciters will have to go back to mono.

● **SUMMER'S DOUBLE HEADERS:** In August the Recording Industry Association of America certified three albums for both gold and platinum awards--the Police's "Synchronicity" on A&M, Loverboy's "Keep It Up" on Columbia, and the RSO/PolyGram soundtrack album from the summer's hit movie Stayin' Alive. The Police also received a gold single award, their first, for Every Breath You Take, the hit single from the "Synchronicity" album.

● **"THE NEW MEDIA BIBLE"** is a filmed dramatization of the Bible, narrated by Alexander Scourby, that is being distributed by RCA on video discs. Already released is "The Story of Joseph." Two volumes devoted to "The Gospel According to St. Luke" follow during this pre-Christmas season.

● **DELCO ELECTRONICS** has announced that sales of the Delco/Bose car stereo system for GM luxury cars have been double their projections. Of the Corvettes sold, 78% have the system; the figure is 25% for Cadillac Seattles, 20% for Toronados and Eldorados, and 14% for Buick Rivieras. Look for the system to be available in a wider range of 1984 models.

● **HAPPY BIRTHDAY** this month to Joni Mitchell (November 7) and Randy Newman (November 28). Both were born in the same year, 1943.

# Speaking My Piece

By William Livingstone

With TDK representatives  
Kim Sato (left),  
Masatsugu Funakoshi,  
and Tak Koyama



## THE ASTUTE BUYER

**D**URING my student years at the University of Copenhagen, I spent a spring holiday in Paris. Being in that cultural capital for the first time was very exciting, and after visiting as many museums as possible, I bought a picture as a souvenir of the city. It was a modestly priced etching of a cat by Jonny Friedlaender, a young German printmaker.

When I completed my studies in Europe and came home, I discovered that Friedlaender's cat had been included in an exhibition at the St. Louis Art Museum and in his first one-man show in New York, where the remaining copies of the etching were on sale for twice what I had paid in Paris. It made me feel like an astute collector, and I've been buying pictures ever since.

My budget for acquisitions has not rivaled that of the Museum of Modern Art, but actually we have some of the same things, MOMA and I. It gave me a little thrill to learn that the museum had acquired David Hockney's etching *Jungle Boy* at the same time I did, back in 1969 when you could still buy a Hockney print for under \$100.

Besides the pride of ownership of works of museum quality, Friedlaender's cat and Hockney's *Jungle Boy* have rewarded me aesthetically every time I have looked at them. And recently it dawned on me that much of the pleasure I have derived from my small collection has been the fun of shopping at galleries I know well and buying pictures from dealers I respect and trust.

The shape of my collection has been most influenced by three dealers in particular. While doing business with them over a period of years, I have learned a lot from them. They have advised me well, have guided me gently and patiently, and have prevented me from making serious mistakes of taste or judgment. I now think of them as

friends and value my relationship with them as much as I value the pictures I've bought from them.

There are parallels between collecting art and buying audio equipment. Aside from the artistic value of the music that hi-fi reproduces, there is an aesthetic pleasure in owning and operating well-designed technological products. And think of the pride that owners of certain Bang and Olufsen turntables and tape decks must have felt when those units were added to the Museum of Modern Art's design collection.

But just as some people are shy about going into an art gallery and pricing a picture, many others are inhibited about shopping at audio salons. They are bewildered by the number of products available and feel insecure about decibels, watts, and prices. The atmosphere of some salons intimidates them, and they fear that they will be thought stupid and will be cheated there.

Some audio salons depend on snob appeal just as some art galleries do. They are selling image as much as equipment, and there's nothing wrong with that, just as there is nothing wrong with your buying equipment at a department store or discount center if you happen to feel more comfortable in those less pretentious surroundings.

But there are many dealers in consumer electronics whose advice and guidance can be very valuable to you, and knowing one or two can increase the pleasure you derive from your interests in audio.

Wherever you choose to buy equipment, the more you know about it, the more likely you are to make satisfactory purchases and to enjoy the process of buying. If our monthly columns, feature articles, test reports, and record reviews succeed in making you feel like an informed consumer and an astute buyer, we will have served you well. □

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Telephone: (03) 586-0165, 545-3908

Circulation Office  
P.O. Box 2771, Boulder, Colorado 80302

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# Letters

## Room Acoustics

● High praise is in order for Robert Berkovitz for his simple and well-written article on "Sound and Your Listening Room" in September. It was easily digestible without being pabulum. Seconds, please.

PAUL BURMEISTER  
Madison, Wis.

## Personal Portables

● Myron Berger's September article on "Choosing a Personal Portable" mentions an issue that deserves greater public attention than it has received. Measurements indicate that some personal portables are easily capable of producing sound-pressure levels in the ear canal as high as 115 dB. The most commonly used government regulation on noise exposure allows workers in regulated industries to experience such levels for no more than fifteen minutes per day, five days per week. There are large individual differences in susceptibility to noise-induced hearing loss, but the evidence

indicates that for everyone the risk increases with the level and duration of exposure. People who care about preserving their hearing—and surely the readers of STEREO REVIEW appreciate the value of this precious sense—ought to be cautious about exposure to intense sounds.

DENNIS MCFADDEN  
Austin, Tex.

## Elton John

● Commercial success does not always imply musical quality and talent. With Elton John it does. In his September review, Mark Peel describes John's new album, "Too Low for Zero," as "self-satisfied and tepid rock." Mr. Peel, if this album is tepid, any music you consider exciting must assuredly register on the Richter scale. As for "self-satisfied," I would hope that any artist's music would satisfy himself. Mr. Peel describes the performance as "the usual." It is John's usual. His usual is spectacular.

CHARLES L. SNOW  
Monroe, Ga.

## Video Coverage

● I would like to thank STEREO REVIEW for reporting on video recorders. I've read the argument that audio magazines should stick to audio topics, but I think that separating audio from video will be an increasing problem in the future.

P. M. WARDELL  
Portland, Ore.

● I was particularly pleased to read William Livingstone's article on Pioneer LaserDiscs in September's "New Software" section. I hope that STEREO REVIEW will be even more helpful in this area in the future.

Since I have a LaserDisc player, I was dismayed to read about the Metropolitan Opera's negotiations with RCA. I hope that this does not mean that their offerings would not be available on LaserDiscs, which I think are better than the RCA video discs. Most video cassettes are issued in both Beta and VHS formats. Do you have any more information about this?

ANDY EVANS  
Cleveland, Ohio

*The Met has made no public announcement, but it is expected that the material will be licensed for both of the video-disc systems.*

## Speaker Cables

● Laurence Greenhill's article on speaker cables in the August issue has to be one of



# WHAT YOU SEE IS WHAT YOU'LL HEAR.

the best articles on stereo equipment I have ever read. As a former subscriber to one of the "underground" audio magazines, I am aware of their constant claims to do more thorough testing and run less biased articles than such magazines as STEREO REVIEW. In my opinion, however, no underground magazine has ever published anything that comes close to Mr. Greenhill's article. The care he took to guarantee that human biases would not enter into the evaluations was most interesting. His use of double-blind testing and statistical analysis gives ample weight to the conclusions.

The burden is now on the undergrounds to duplicate or surpass Mr. Greenhill's methodology in order to regain credibility. I will choose a scientific experiment over an uncontrolled listening test any day.

BRUCE F. WOLLENBERG  
Albany, N.Y.

● So what if you have discovered that 16-gauge zip cord equals the performance of Monster Cable under certain questionable conditions? Laurence Greenhill's test methods leave too much room for error.

RAY L. KIMBER  
Ogden, Utah

*We think that Laurence Greenhill's speaker-cable tests were conducted in the most scientific manner possible. If the "incredible" improvements claimed for most of the exotic cables are real, we'd like to see some proof. STEREO REVIEW will even help to develop the proof. If anyone can devise a*

*practicable, scientifically controlled test setup that can reveal these supposed sonic differences, we will be happy to sponsor the experiment and publish the results.*

● Laurence Greenhill states that his testing project "was unable to validate the sonic benefits claimed for exotic speaker cables. . . ." He should have said that the project was unable to validate the sonic benefits claimed for eight of the eleven participants and was able to validate them for two participants. Otherwise his remains a statistician's conclusion—a statistician being defined as someone who was drowned in a lake with an average depth of one foot.

GILBERTO REGULES  
Montevideo, Uruguay

● Bravo! for the test of audiophile speaker cables in August. It was very interesting and useful for the "rational-end" music listener. Keep up the good work.

RAÚL I. L. HERNANDEZ  
Guadalajara, Mexico

● For a number of years I've been tempted to buy Monster Cable in the belief that I was "missing something" without it. My gratitude to STEREO REVIEW for the evaluation in the August issue, which confirmed my suspicion that I probably wouldn't notice any improvement with it in my system (which is fairly high in quality).

Audiophiles are vulnerable to hype from manufacturers of audio gear. It is relatively easy to detect differences in the sound of

many components, but it is very difficult to determine whether the *different* sound is really *better* sound.

THOMAS G. TITUS  
Louisville, Ky.

## Compact Disc Players

● Thank you for *comparing* several brands of equipment in one article (July's report on eleven Compact Disc players) and presenting the lab-test results in tables. I hope STEREO REVIEW will take the same approach with other categories of products, such as high-end speaker systems.

MICHEL G. BOUGON  
State College, Pa.

● I'm certain that everyone has seen the new CD players, and a lot of people have bought them. For those of us who can't afford or just don't want one, could you please lay off on the reviews? If you've seen one of these machines, you've seen 'em all, especially if you can't have one.

MIKE SLATER  
Nappanee, Ind.

## Correction

● Last month's Classical Music "News Briefs" incorrectly stated that Shirley Verrett is alternating with Jessye Norman in the roles of Dido and Cassandra in the Metropolitan Opera's production of *Les Troyens* by Berlioz. Norman's co-star this season is Tatiana Troyanos.



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CIRCLE NO. 4 ON READER SERVICE CARD

# "...Jensen has gone far beyond any other company in developing the first totally integrated audio/video system."

Video Review, March 1983

The experts who write for the leading home entertainment magazines don't just know video, they live it. That's why we want you to know what they think about Jensen Audio + Video™ Components.

## THE RECEIVER

**"Amazingly well thought out... its flexibility and provisions for future expansion put it in a class by itself."** *High Fidelity*, June 1983

That's what they said about the AVS-1500™ Audio + Video Receiver, the only electronic component which can provide access to every form of audio or video entertainment. It incorporates an AM/FM tuner, 133 channel cable-ready video tuner and 50 watt per channel stereo amplifier. (50 watts per channel continuous output power, minimum RMS into 8 ohms, with no more than .05% total harmonic distortion.) Performance is further enhanced by such features as DNR™ noise reduction system, simulcast tuning circuitry, micro-processor controlled switching and completely independent headphone circuitry. A wireless remote control is standard equipment, of course.

## THE MONITOR

**"We strongly suggest you see the AVS-3250 monitor in operation."**

*Video*, April 1983

The 430 lines of horizontal resolution stem from Jensen's LumaChromic™

high resolution picture circuitry which also provides superior color transient suppression, full bandwidth flat luminance signal and improved chrominance signal. The result is a picture of startling clarity and realism which is easily distinguished from ordinary television.

## THE SPEAKERS

**"State of the art loudspeaker technology and design."**

*Sight & Sound Marketing*, September 1982

The magnets in conventional high fidelity speakers distort television pictures so as to be unrecognizable. Jensen AVS-5250 speakers have specially designed and shielded magnets. The result is the first high fidelity speaker designed for video applications. The sound that video programming has always deserved is now possible.

## THE SYSTEM

**"... a rare combination of good taste, good engineering and functional design."** *Stereo Review*, January 1983

The real beauty of Jensen Audio + Video Components is in how they work together. Incredible sound. Unprecedented picture. Total control

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Once you see a Jensen demonstration, you'll see why *Video Review* said "Its features and flexibility will... be copied by many manufacturers who want to cater to the needs of those videophiles who appreciate superb sound reproduction."

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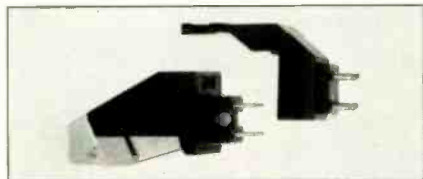
CIRCLE NO. 5 ON READER SERVICE CARD

# New Products

## Latest Audio Equipment and Accessories

### ADC's New Line of P-Mount Cartridges

□ All the cartridges in ADC's PSX series include a mounting adaptor enabling them to be installed in standard as well as P-mount tone arms. The four models in the series use ADC's high-output induced-magnet transduction system and have a one-



point cantilever suspension system that is said to provide better definition and balance while lowering distortion.

The top-of-the-line PSX-40 (shown) has a rated output voltage of 3.5 millivolts at a 5-cm/s groove velocity at 1,000 Hz. Channel balance is within 1.5 dB, and channel separation is greater than 28 dB. Frequency response is given as 20 to 24,000 Hz  $\pm$  1.5 dB. Compliance is  $35 \times 10^{-6}$  centimeters per dyne. Recommended tracking force is  $1.25 \pm 0.2$  grams. Recommended load is 47,000 ohms and 150 picofarads. Cartridge weight is the standard 5.9 grams for P-mount units (7.2 grams with adaptor). The elliptical stylus is 0.2 x 0.7 mil and is mounted on a titanium tapered-tube cantilever. Price: \$135. Other PSX models are priced from \$110 to \$60.

Circle 120 on reader service card

### B&W's Budget-Priced "Digital Monitor" Speakers

□ The B&W DM110 (left) and DM220 (right) "Digital Monitor" speaker systems are high-sensitivity units intended for use



### Technics Second-Generation CD Player



□ The SL-P8 digital Compact Disc player from Technics features random-access cueing, wireless remote control, and many other convenience features for a relatively low cost. The front-loading player has a motor-driven slide-out disc compartment. The unit's search functions permit fine cueing with audible playback at three times normal speed for the first 3 seconds after the keys are pushed, after which the player switches to thirty times normal speed for coarse cueing. Index points on certain discs are directly accessible using the player's SKIP key as well as through the programming functions. Those functions include the ability to play a thirty-two-selection sequence of tracks. Selections can be programmed according to track number, elapsed time (in minutes and seconds) from the start of the disc, or index number. An AUTO-MUSIC SCAN function

allows the user to sample the first 10 seconds of each track on the disc. A large fluorescent display shows the total number of tracks, the track being played, and the programmed track numbers if the programming functions are activated. A numerical readout shows track number, elapsed or remaining time, and index-point data.

Three new large-scale integrated circuits for digital decoding have been incorporated into the SL-P8. They use the Technics Ultra Super Decoding Algorithm, which is said to offer improved error correction and concealment. Other audio features include a pitch control with a range of  $\pm 6$  per cent and a front-panel headphone jack with volume control. The remote control handles all primary player functions. Price: \$800.

Circle 122 on reader service card

by the consumer who wishes to reproduce the full dynamic range of digital program sources without purchasing a high-power amplifier. A pair of the larger DM220's is rated to produce peak listening levels higher than 115 dB sound-pressure level (SPL) in a 3,530-cubic-foot room. Both systems are rated for less than 3 per cent second-harmonic distortion and less than 0.5 per cent third-harmonic distortion.

The smaller DM110 is a two-way system with a vented enclosure. The 8-inch woofer crosses over at 3,000 Hz to a 1-inch dome tweeter by a fourth-order network. Rated sensitivity is 91 dB SPL at 1 meter with a 1-watt input into 8 ohms. Frequency response is given as 70 to 20,000 Hz  $\pm$  3 dB. Recommended amplifier power is 10 to 50 watts per channel. Dimensions are 19 $\frac{1}{4}$  x 10 $\frac{1}{4}$  x 9 $\frac{3}{4}$  inches; weight is 18 $\frac{1}{2}$  pounds.

A three-way sealed system, the DM220 employs a 1-inch dome tweeter and two 8-inch drivers. One of the latter serves as a lower-bass driver while the other handles the upper bass and the midrange. Sensitivity is given as 90 dB SPL at 1 meter with a 1-watt input into 8 ohms. Frequency response is 53 to 20,000 Hz  $\pm$  3 dB. Recom-

mended amplifier power ranges from 10 to 75 watts per channel. The cabinet measures 26 $\frac{3}{4}$  x 11 $\frac{1}{2}$  x 12 $\frac{1}{2}$  inches.

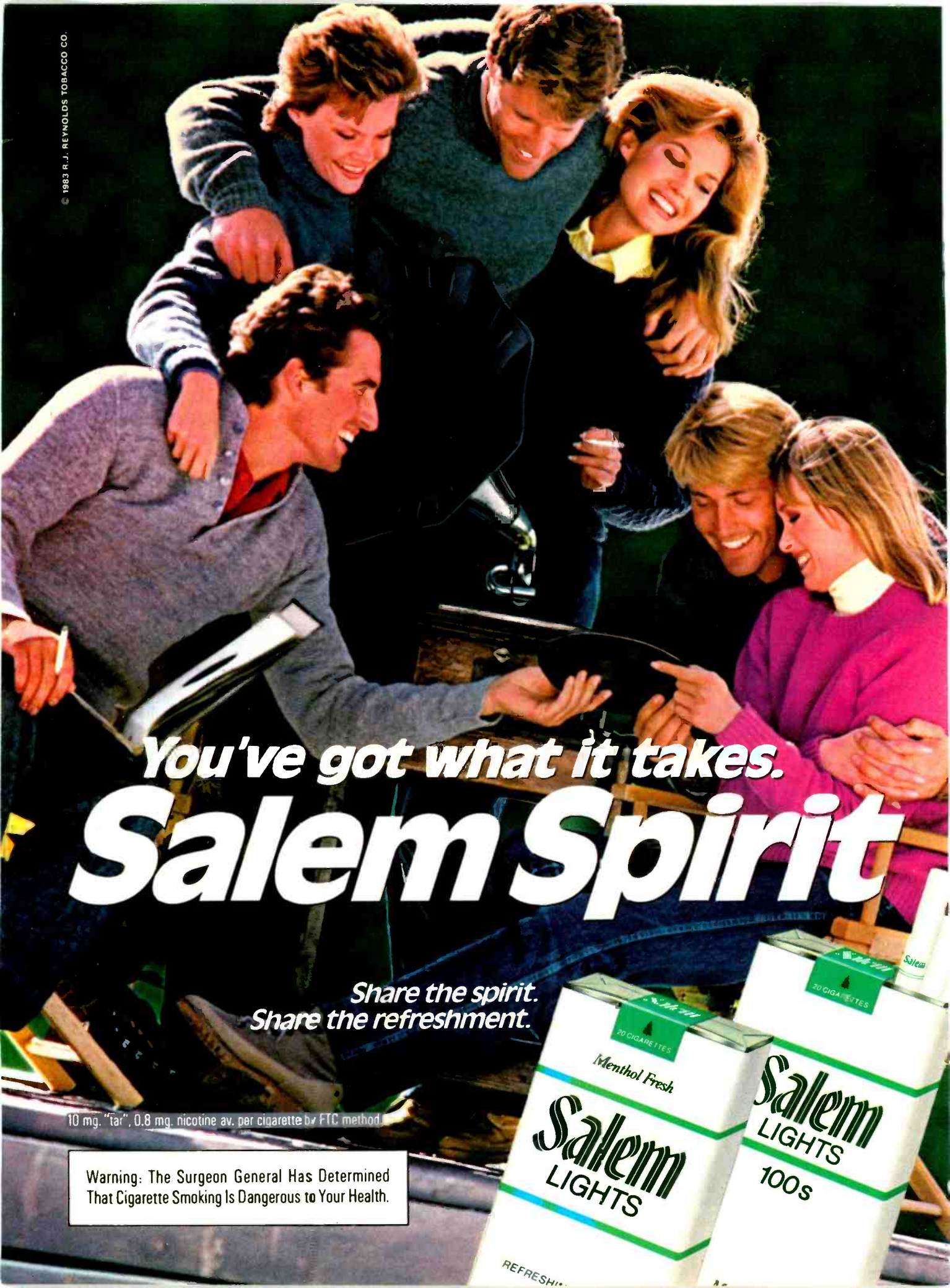
Both speakers are available in simulated American walnut or black-ash veneers with removable grilles in brown or gray, respectively. Matching speaker stands are also available. Price per speaker: DM110, \$149; DM220, \$249. Anglo-American Audio Co., Inc., Dept. SR, 1200 Markham Road, Scarborough, Ontario, Canada M1H 3C3.

Circle 121 on reader service card

### Portable Beta Hi-Fi VCR from Sanyo

□ Sanyo's VCR7300 Beta-format stereo video-cassette recorder includes the Beta Hi-Fi system for recording high-fidelity audio on video tape along with a picture. The recorder uses standard 1/2-inch Beta-format video cassettes; no special tape formulations are required. To maintain compatibility with all existing Beta VCR's and tapes, the unit also has a fixed audio head.

Other features of the VCR7300 include a



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# New Products

built-in 105-channel cable-ready TV tuner with twelve programmable station presets, a seven-day/single-event timer with easy-to-



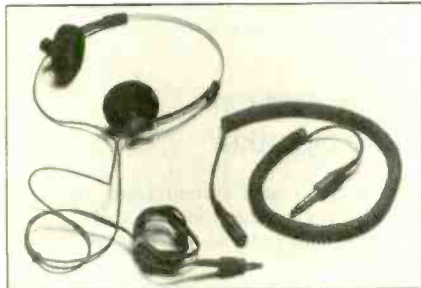
read clock display, an eight-function wired remote control, and a removable a.c. power pack. Transport controls include high-speed Beta-scan picture search at seven times normal playing speed and a memory-rewind feature. Audio-only recording is possible without a video signal input; maximum recording time is 5 hours using an L-830 cassette.

Beta Hi-Fi specifications include a frequency response of 20 to 20,000 Hz with harmonic distortion of less than 0.3 per cent. Dynamic range is better than 80 dB. Wow-and-flutter is less than 0.005 per cent (wrms). Dimensions are 14½ x 10⅝ x 16⅞ inches; weight is 15 pounds (with battery). Price: \$999.95.

Circle 123 on reader service card

## NAD's High-Performance Lightweight Headphones

□ The NAD Model 830 headphone's compact size, light weight, and miniature phone plug make it a good match with personal portable stereo radios and tape players. The drivers in each earpiece have the low impedance and high sensitivity needed to obtain



undistorted high-volume sound from the small amplifiers in compact battery-operated players. The cable is the right length to serve as an antenna for shirt-pocket FM radios.

The NAD 830 is also said to provide the

broad bandwidth, wide dynamic range, low coloration, and transparent sound quality ordinarily found only in costly, full-sized headphones designed for home use. According to NAD, the bass response of the Model 830 extends a full octave deeper than that of any other lightweight model, yet the headphones are completely free of boomy mid-bass resonances. For home use the NAD 830 is supplied with a coiled extension/adaptor cord terminating in a ¼-inch phone plug.

Frequency response is given as 15 to 25,000 Hz, total harmonic distortion as 0.5 per cent at 1,000 Hz at a 100-dB sound-pressure level, and sensitivity as 100-dB SPL with a 0.5-volt input of pink noise. Nominal impedance is 75 ohms, minimum 50 ohms. The earpieces use 16-micrometer polyester-film diaphragms and high-temperature copper-clad aluminum voice coils with self-supporting windings. The magnets are made of high-energy samarium-cobalt with focused gaps for low flux leakage. The headphones weigh 1¾ ounces, 4¼ ounces with the extension/adaptor. Price: \$55.

Circle 124 on reader service card

## Niles Device Adds Automatic Shutoff

□ Niles Audio's MM-1 Music Minder is an automatic monitoring and shut-off device that electronically "listens" to an audio system. When a record or tape ends, the unit starts a 5-minute countdown. If play-



back of another record or tape isn't started within that period, the Music Minder automatically shuts off the system. There is also a 60-minute timer mode. The box connects to a system via a tape-monitor loop and will switch up to 1,200 watts of a.c. power. Price: \$99.95. Niles Audio Corp., Dept. SR, P.O. Box 160818, Miami, Fla. 33116.

Circle 125 on reader service card

## Two-Way Speaker from Fourier Systems

□ The Fourier 8 speaker from Fourier Systems was designed to be a state-of-the-art system within the limits set by size and its two-way driver configuration. It has an 8-inch polypropylene-cone woofer and a 1-inch soft-dome tweeter in a Thiele/Small-aligned B<sub>4</sub> vented box with an internal volume of 1.3 cubic feet. A computer was used to help design the crossover, and the program included the electromechanical characteristics of the drivers. To optimize the transition between woofer and tweeter, the crossover has 24-dB-per-octave slopes.

Frequency response is given as "essential-

ly flat from 41 Hz to 20 kHz on axis." The impedance is 4 ohms (±1.5 ohms) at all frequencies above 125 Hz and is essentially



resistive in behavior. Sensitivity is 90 dB sound-pressure level at 1 meter with a 1-watt input. Maximum power-handling capacity is 200 watts per channel. The cabinet is walnut veneered on all sides except the back, and it has four beveled, non-diffractive front edges and a removable black foam grille. Optional stands are available that give the speaker a slight backward tilt to improve the alignment of the drivers for "optimum coherence" at ear level. Dimensions are 22 x 11½ x 12⅞ inches. Price: \$799 per pair. Fourier Systems, Inc., Dept. SR, 540 Nepperhan Avenue, Yonkers, N.Y. 10701.

Circle 126 on reader service card

## Fuji Cassettes For Car Stereo

□ Fuji's GT-1 normal-bias cassettes are specifically designed to perform well under the environmental rigors of car use: temperature extremes, vibration, and sound absorption. The cassette shells are made of ABS resin, which can withstand temperatures of up to 230° F (110° C). According to Fuji, ordinary tape stock has a degree of molecular stress that makes the tape con-



tract at high temperatures, but this stress has been minimized in the GT-1 tapes, which are said to run smoothly over a wide temperature range. The magnetic coating of ordinary cassettes is said to soften at high temperatures, resulting in a deterioration of the tape motion and an increase in modulation noise. The magnetic layer in the GT-1 tapes uses a heavy-duty binder formulation that has increased chemical stability at extremely high temperatures.

To counter vibration effects, the cassettes have dual-spring pressure pads designed to maintain proper tape-to-head contact by following subtle misorientations of the head

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## New Products

caused by car vibrations. A newly developed pad holder exerts a firmer pressure and keeps the pad aligned properly even under conditions of high temperature and humidity. To reduce the chance of jamming, the shells of the GT-1 cassettes have special tape guides to prevent the tape from looping in the wrong direction. Head-cleaning leader tape is also provided.

To combat the loss of high-frequency sounds in the car environment, the tape's magnetic layer has a denser and more even distribution of particles. High-frequency response is stated as +11 dB at 15,000 Hz compared to a standard normal-bias tape. Other magnetic specifications include an intrinsic coercivity of 380 oersteds, retentivity of 1,400 gauss, and bias noise of -60 dB. Other convenience features for automotive use include an asymmetrical shell so that the two sides look different, a concave identification letter for side A and a convex one for side B, knurled edges on the short sides of the shell to provide a firm grip for insertion or extraction of the cassette, and a large tape window with an easy-to-read tape-remaining scale. Prices: C-46, \$5.55; C-60, \$6.20; C-90, \$8.65.

Circle 127 on reader service card

### Innotec's Small Three-Way Speaker

□ The ITC 1 speaker system from Innovative Techniques Corp. has a 5¼-inch Bextrene cone woofer designed for high performance in the upper bass and lower midrange. The vented system has a sixth-order alignment; an external processor, called a



Bass Distortion Reducer (BDR), supplies the modest boost in the bass (6 dB at 50 Hz) required by the alignment and limits the passband of the signal to that of the speaker by reducing the input signal 18 dB per octave below 50 Hz. According to Innotec, this band limitation reduces doppler distortion significantly and increases the speaker's power-handling capacity.

The system's other two drivers, a 1½-inch dome midrange/lower-high-frequency driver and a 1-inch upper-high-frequency driver, are designed to operate in the ranges where their response is most linear, making them capable of high output with low dis-

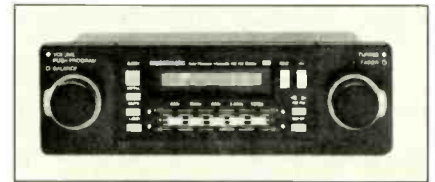
ortion. The crossover uses 200-volt Mylar capacitors and 16-gauge air-core chokes. Midrange and tweeter controls facilitate adjusting the ITC 1 to a wide range of room acoustics.

Overall system frequency response is given as 50 to 18,000 Hz ± 3 dB in half-space anechoic conditions (typical response is 55 to 17,000 Hz ± 1.5 dB). Sensitivity is rated as 86 dB sound-pressure level with a 1-watt input at 1 meter. Power requirements range from a minimum of 20 watts in small- to average-sized listening rooms at low to moderate volume levels to a minimum of 100 watts in large listening rooms at moderate to high levels. Nominal system impedance is 8 ohms. Crossover frequencies are 1,000 and 7,500 Hz. Dimensions are 7¼ x 12¼ x 8 inches for the speaker, 7⅞ x 2¼ x 4¼ inches for the BDR. The speakers weigh 16 pounds each. Price per pair, with the BDR: \$780 on the East Coast, \$795 on the West Coast. Innovative Techniques Corp., Dept. SR, 314 Central Avenue, Pt. Pleasant Beach, N.J. 08742.

Circle 128 on reader service card

### Sparkomatic Car Stereo Has Built-In Equalizer

□ Capable of delivering 45 watts into a speaker load with 10 per cent total harmonic distortion, the Sparkomatic SR 307 car stereo cassette player/AM/FM receiver



er incorporates a five-band equalizer centered at 60, 250, 1,000, 3,500, and 10,000 Hz. There is also a DNR (Dynamic Noise Reduction) circuit for lower noise in tape playback and radio reception. Other features include balance and fader controls for four-way speaker adjustments and light-touch controls for FM muting, mono/stereo listening, and loudness compensation. The auto-reverse cassette deck has a switch to select metal/chrome or normal playback equalization and locking fast-forward/rewind. Specifications include a frequency response of 20 to 20,000 Hz and a 4-microvolt FM sensitivity. Dimensions are 7 x 1⅞ x 5⅞ inches. Price: \$189.95. Sparkomatic Corp., Dept. SR, Milford, Pa. 18337.

Circle 129 on reader service card

### JBL's Add-On Bass Speaker

□ The B380 bass system from JBL has many of the styling and performance features first introduced in the company's B460 system. The more compact B380 covers the same frequency spectrum (25 to 70 Hz) and incorporates a 15-inch driver with a 4-inch ribbon-wire voice coil in a vented enclosure for high power-handling capability and low distortion. Maximum recommended amplifier power is 600 watts.

(Continued on page 16)





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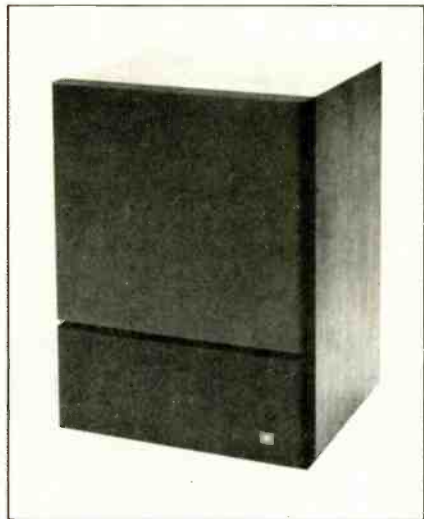


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# New Products

Crossover frequency is 63 Hz. Impedance is 8 ohms.

Use of the B380 in a biamplified speaker system is said to reduce intermodulation distortion substantially in the main speak-



ers and amplifiers and to produce a noticeably purer midrange sound. The optional BX63 dividing/summing network employs a passive high-pass crossover for the main speakers while sending an actively summed bass-only signal to the B380. Finished in oiled American black walnut, the heavily braced enclosure of the B380 can be placed either horizontally or vertically. A platform that elevates the system 1 inch from the floor is included. Cabinet dimensions are 27 1/2 x 20 3/4 x 17 inches. Prices: B380, \$495; BX63, \$225.

Circle 130 on reader service card

## Car Spectrum Analyzer From Fujitsu Ten

□ Displaying the distribution of music frequencies over six bands (125, 400, 1,000, 2,000, 4,000, and 8,000 Hz). Fujitsu Ten's Q1-201 spectrum analyzer for car stereo



systems covers a dynamic range of more than 31 dB (from +10 to -20 dB) with ten-point, three-color LED displays. There is a level switch to match the display to the output of other components in the car. The

Q1-201 measures 4 3/4 x 3 5/16 x 2 7/32 inches and weighs 2/3 pound. Price: \$104.95. Fujitsu Ten Corp. of America, Dept. SR, 19281 Pacific Gateway Drive, Torrance, Calif. 90502.

Circle 131 on reader service card

## Two ADS Auto Power Amplifiers

□ ADS's P80 and P120 (shown) automotive power amplifiers offer substantial power capabilities in relatively small-sized units. The manufacturer ascribes the efficiency of the amplifiers to the design of their power supplies, which employ a load-sensing feedback control system that continuously monitors power requirements and adjusts the output of the internal voltage converter accordingly. This system is said to reduce power consumption by 20 per cent or more. The cast-aluminum chassis with its integral heat-sink fins also helps to dissipate performance-limiting heat. The amplifiers are said to perform well with 2-ohm loads.

Installation is said to be eased by the amplifiers' small size and the design of their input and output connections. The speaker connectors have high-current spring-loaded terminals that can accommodate even heavy-duty speaker cable. The power connectors are screw-clamp terminal blocks that can handle up to 10-gauge wire. The inputs (phono jacks) have selectable sensitivity and impedance to ensure correct matching with either preamplifier or speaker outputs from a car receiver/player. Pow-



er may be switched remotely from a dashboard control or a receiver's on/off switch.

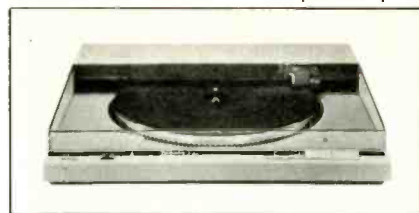
The P80 measures 11 1/4 x 2 x 6 1/8 inches and weighs 6 pounds. Its rated output is 40 watts per channel into 4-ohm loads with less than 0.1 per cent total harmonic distortion (THD) from 20 to 20,000 Hz, 30 watts per channel with less than 0.3 per cent THD into 2 ohms, and 35 watts into 8 ohms with less than 0.06 per cent THD. The top-of-the-line P120 is rated to deliver 60 watts per channel into 4-ohm loads with less than 0.1 per cent THD from 20 to 20,000 Hz. Its 2- and 8-ohm ratings are 40 and 50 watts, respectively, with THD of 0.3 and 0.06 per cent. The unit can be operated in a mono bridged mode for 90 watts into 4-ohm loads with less than 0.3 per cent THD. Although the P120 is the same size as the P80, it weighs 6 3/8 pounds. Prices: P80, \$259; P120, \$329.

Circle 132 on reader service card

## Technics Linear-Tracking Belt-Drive Turntable

□ The first Technics turntable with both linear tracking and a  $\pm 6$  per cent pitch control, the full-sized, belt-driven SL-BL3 has features normally found only on more ex-

pensive models. It can automatically determine the disc size and correct platter speed



(a manual override is included). To prevent accidental damage, the stylus will not lower when there is no disc on the platter. Control features include forward and backward search, auto-stop, auto-return, oil-damped cueing, and side repeat. All controls are located outside the dust cover at the front of the unit. Horizontal and vertical tone-arm friction are reduced by a new four-point gimbal suspension system. The tone arm takes P-mount plug-in cartridges. The platter is driven by a d.c. servomotor.

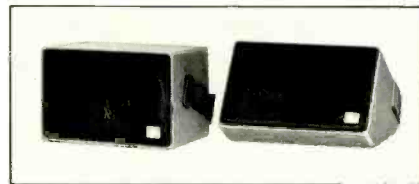
Wow-and-flutter is specified as 0.045 per cent (wrms) or  $\pm 0.06$  per cent (DIN-peak). Rumble is given as -70 dB (DIN-B). Dimensions are 16 1/16 x 3 1/2 x 13 3/8 inches; weight is 9 3/4 pounds. Price: \$185.

Circle 133 on reader service card

## Surface-Mount Car/Home Speakers from Pyle

□ Pyle Industries' first surface-mounting loudspeakers, the Horizon HS100A and HS150P, are designed for use in cars, vans, recreational vehicles, etc. as well as in offices or homes. The speakers have die-cast aluminum enclosures lined with vibration-damping materials. The HS100A (left) has a bracket that allows mounting on auto rear decks or in other mobile applications.

Both minispeaker systems are equipped with a deep-excursion 4-inch woofer, a 1-inch compression-loaded dome tweeter, and a crossover network with 12-dB-per-octave slopes. The woofer has a chemically treated polyurethane-foam surround and a high-temperature, four-layer voice coil de-



signed for increased heat dissipation and high power-handling capability. The speakers are rated for a maximum of 55 watts per channel with a frequency response of 50 to 20,000 Hz. Impedance is 4 ohms. Prices per pair: HS100A, \$230; HS150P, \$215. Pyle Industries, Inc., Dept. SR, 501 Center Street, Huntington, Ind. 46750.

Circle 134 on reader service card

## Panasonic Car Stereo Has dbx Noise Reduction

□ In addition to a dbx tape noise-reduction decoder, Panasonic's CQ-S793 car receiver/cassette player incorporates a MOSFET tuner front-end section, a multistage automatic gain control in the AM section, sepa-

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## New Products

rate bass and treble controls, and impulse-noise quieting. The tuner has four station



presets. The cassette player can be switched for metal, chrome-type, or normal-bias tapes. Price: \$280.

Circle 135 on reader service card

### Hitachi Introduces Four Turntables

Hitachi's HT-L303 (shown) is a two-speed turntable with d.c. servo speed control of its die-cast platter. It features feather-touch control of program repeat and arm cueing plus automatic disc-size/speed selection. The linear-tracking arm takes



P-mount cartridges. Wow-and-flutter is given as 0.045 per cent (wrms) and signal-to-noise ratio (S/N) as 70 dB (DIN-B). The unit measures  $17\frac{1}{8} \times 3\frac{1}{4} \times 12\frac{5}{8}$  inches and weighs 8 pounds, 13 ounces. The HT-L33 is a "record-jacket-size" version of the same turntable that is only  $12\frac{5}{8}$  inches square. Price for both models is \$180.

With a Uinitorque direct-drive motor, the semi-automatic HT-2 has a 78 dB S/N with 0.025 per cent wow-and-flutter (wrms). The unit has a straight low-mass pivoted tone arm, front-panel controls, and slim-line styling. Price: \$130. The HT-1, another semi-automatic turntable, is a belt-drive unit that also has front-panel controls and a straight tone arm. Price: \$90.

Circle 136 on reader service card

NOTE: All product descriptions and specifications quoted in these columns are based on materials supplied by the manufacturers, who will respond directly to reader requests for further information.

Domestic inflation and fluctuations in the value of the dollar overseas affect the price of merchandise imported into this country. Please be aware that prices quoted in this issue are therefore subject to change.

# The \$7 FM Stereo Masterpiece



**Thunderingly vibrant, larger than life, brilliant FM stereo sound will engulf you as you put on the stereophones of this state of the art personal FM stereo. It's all yours for just \$7. But, there's a catch.**

It's no Hong Kong cheapie. Your FM stereo sound will explode with life.

In a market flooded with Hong Kong look-a-likes, this incredible Japanese crafted personal FM stereo from MGT, (the super tweak auto-stereo company), was simply too expensively built for the market during the last recession.

So, DAK was able to buy (steal) all 64,000 of these audiophile quality personal FM stereos for cold hard cash.

Each is complete with super feather-weight headphones, leatherette carrying case and two standard AAA batteries. You get everything for just \$7, but don't forget, there's a catch.

#### MICRO-SIZE/MAGNIFICENT SOUND

MGT has produced an FM tuning circuit of incredible quality using three 16 pin integrated circuits. For those of you who are electronic nuts as I am, even the resistors are gold banded 5% prime as used in only the very finest equipment.

So, you'll have the finest circuit and the best components to give you remarkably drift free ultra clean FM stereo sound.

Most fine stereo equipment is designed to be lovingly placed on a shelf and never moved. Obviously, this isn't a practical way to listen when you're walking your dog, jogging or mowing the lawn.

So, whether you're working in your office with the Stereo Sports unobtrusively sitting in your shirt pocket, skiing down a fast slope, or just lying on your backyard hammock, you'll have massively powerful, breathtakingly crisp, FM stereo music anywhere.

#### CHALLENGE YOUR HOME STEREO

This tiny FM receiver (it's only about the size of a standard cassette), will easily slip in your shirt pocket, yet it's so powerful it can challenge your home stereo.

So, here's our challenge. Start at 88MHz on the bottom of the FM dial. And, station by station, compare the reception to your current home stereo.

You're sure to leave virtually any other personal stereo of any size in the dust, and MGT's dramatically alive FM stereo sound will even give a top of the line home FM tuner a run for its money.

#### TECHNOLOGY PLUS

Everything is automated. An extra large LED shows when the circuit automatically switches to stereo reception. And, there's no on/off button. Just plugging in the headset turns it on and off.

The headphone cable becomes a sensitive FM antenna. The leatherette case attaches to your belt. And, there's a wrist strap to make it easy to carry.

But, frankly it's the smaller than shirt pocket size and the incredibly pure sound that make this an audiophile's delight.

MGT made the Stereo Sports in both high-tech black, or white with blue accents. Whichever you choose, it's backed by MGT's standard limited warranty.

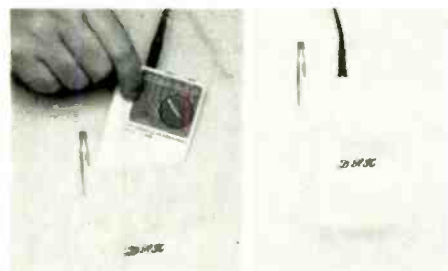
#### THE CATCH

Frankly we are losing our shirts on the FM stereo masterpiece, but we're looking for audiophiles who use cassettes.

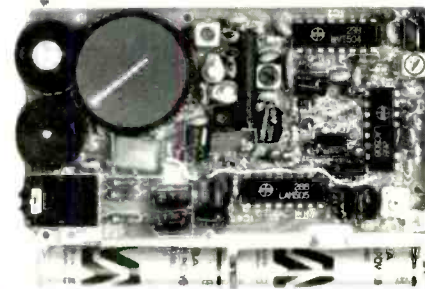
If you buy top name TDK and Maxell cassettes, you probably pay \$3.50 to \$4.50 each for a 90 minute cassette.

We want you to try DAK's new Gold Label MLX ultra high energy, normal bias cassettes. Not at \$4.50 or even at \$3.50, but at a factory direct price of just \$2.49 each for a 90 minute cassette.

We challenge you to compare the frequency response, dynamic range and signal to noise ratio of our new Gold Label MLX to Maxell UDXL or TDK SA. If they win, we'll not only give you back



Shirt pocket size and massive, earthshaking sound are now made possible in this audiophile quality FM personal stereo. 3 integrated circuits and gold banded 5% prime resistors make your FM stereo come alive.



your money, we'll give you a free gift for your trouble. And, DAK's come with a deluxe hard plastic box, index insert card and a limited one year warranty.

#### WHY, YOU MAY BE ASKING?

You're very valuable to us in the form of future business. Over 330,000 customers have responded to bonuses like this. We find most of you keep buying once you've tried our cassettes and our prices; and that's a worthwhile gamble.

#### NOT A BAD CATCH

DAK manufactures a cassette with no problems and great sound. We've been hot on the heels of the frequency responses of Maxell and TDK. The tape we made last year had a great frequency response up to 14,000hz.

Now, our new Gold Label MLX is second to none. We have a frequency response to 19,500hz and we'll go head to head against any tape on the market.

#### TRY NEW DAK MLX90 CASSETTES RISK FREE

To get the audiophile quality FM Stereo Sports complete with headphones, case and batteries for just \$7, try 10 MLX 90 minute high energy cassettes. If you're not 100% satisfied, return only 9 of the 10 cassettes and the Stereo Sports in its original box within 30 days for a refund. The 10th cassette is a gift for your time.

To order your 10 Gold Label MLX 90 minute DAK cassettes and get the fabulous Stereo Sports FM Personal Stereo for only \$7 with your credit card, call toll free, or send your check for \$24.90 for the 10 tapes, plus \$7 for the Stereo Sports, and \$3 for postage and handling for each group. CA res add 6% sales tax.

Use Order Number 9711 for High-Tech Black or Order Number 9712 for White with Blue accents.

You'll have massive 20hz to 20,000hz audiophile FM sound from the Stereo Sports, and great audiophile sound from DAK's MLX 90 minute cassettes.



83SR

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For credit card orders call 24 hours a day 7 days a week  
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Here's a minor miracle:

## Sensible Sound, Stereophile and Stereo Review actually like the same amplifier!



### Ours.

(And for the same reasons.)

If you're familiar with the "underground" publications, such as *Sensible Sound* and *Stereophile*, you know that they have very strong opinions about audio components and how they should sound. They have a choice selection of adjectives to make their opinions unmistakably clear, and are quite blunt when they compare one brand and model with another.

Recently, these two publications reviewed the TransMos 150 power amplifier, and we wanted to quote from their reports. Especially the parts describing it as the best choice over one of the best-selling amplifiers in the industry, and as sounding better than another highly-regarded amplifier that costs three times as much as ours.

But their policies require the entire review to be quoted, or nothing. *Stereo Review*, which also reviewed our amplifier, does allow quotes, but we resisted the temptation.

Instead, we've reprinted all three reviews in their entirety, and they're yours for the asking. If you telephone or write to us directly, we'll respond by return mail, and let you know where you can hear what these audio experts heard.

And you'll be able to quote them any way you like.



670 Airport Blvd., Ann Arbor, MI 48104 313-769-5522

"Only the music remains"

## Tape Talk

By Craig Stark



### Overshooting Dolby

**Q.** *When I play prerecorded cassettes that have been Dolby-B encoded, I find that their signal peaks register 3 dB higher on my meters than the Dolby calibration mark, which is at 0 dB. Does this mean my deck's meters are miscalibrated? Or was the prerecorded tape produced on better equipment that can safely record at higher levels than mine?*

STUART GRIGGS  
Lake Charles, La.

**A.** Actually, both your suggested explanations, though plausible, are mistaken. The official Dolby-B cassette level (200 nanowebers/meter) is not intended to represent the maximum undistorted signal level that you (or a commercial duplicating plant) can put on a tape. Strictly speaking, it is an arbitrarily defined level intended only for the adjustment of the Dolby-B encoder and decoder inside your deck. If you were to play a standard Dolby-level calibration cassette on your machine, the chances are that its signal would register right at the Dolby marking on your deck's meters.

The confusion arises because, like many fine recorders today, your deck has its 0-dB marking at the Dolby level. This is an entirely reasonable practice *provided* that only occasional signal peaks are allowed to run a few decibels higher. The amount of leeway (or "headroom") allowed between an indicated 0-dB level and the onset of serious distortion varies from one deck model to another (it is always mentioned in Hirsch-Houck Labs test reports). In any case, however, 3 dB above Dolby level (that is, about 285 nWb/m) for occasional peaks is certainly safe. Moreover, so far from their being produced on "better" equipment, I have found that most commercially recorded cassettes are sonically inferior to those I can make myself at home.

### Head-Burnout Myth

**Q.** *Recently a repairman told me never to use chromium-dioxide or metal tapes on car decks that do not provide bias/equalization switches for these tape types*

*because over a period of time the tapes would "burn the heads out," making the music sound progressively "bassier." Since I use chrome-equivalent tapes extensively for both my car system and my portable, I'm worried. Is he right?*

GARY MAK  
Calgary, Alberta

**A.** Your repairman is ill informed. In the first place, the playback signal from any kind of tape is so low in level (a couple of millivolts) that it can't "burn out" any tape head. Furthermore, if you ever did burn out a head (for instance, if you plugged it directly into a power-line socket), you wouldn't get "progressively bassier" music, you'd get none at all. A burned-out tape head will produce no more output than a burned-out light bulb, and for the same reason.

It is true that inexpensive soft-permalloy heads of the kind often used in car systems and personal portables are much more susceptible to head wear than are the hard-permalloy, Senalloy, and ferrite varieties found in home decks. As an inexpensive head wears, its gap tends to widen, and as the gap widens high-frequency losses increase. This may be what your repairman was trying to say. At cassette-tape speed and tape-to-head pressure, however, I have seen *no* evidence to suggest that one tape type is more abrasive than another. So, enjoy your tapes—all of them—and tell your repairman to stop spreading rubbish.

### Taping Abroad

**Q.** *Will the d.c. motors of a tape deck run at the right speed and without damage from 50- as well as 60-Hz a.c. power lines? Can my U.S.-standard (110 volts) deck be used in Europe (220 volts) and in England (240 volts) with a suitable step-down transformer?*

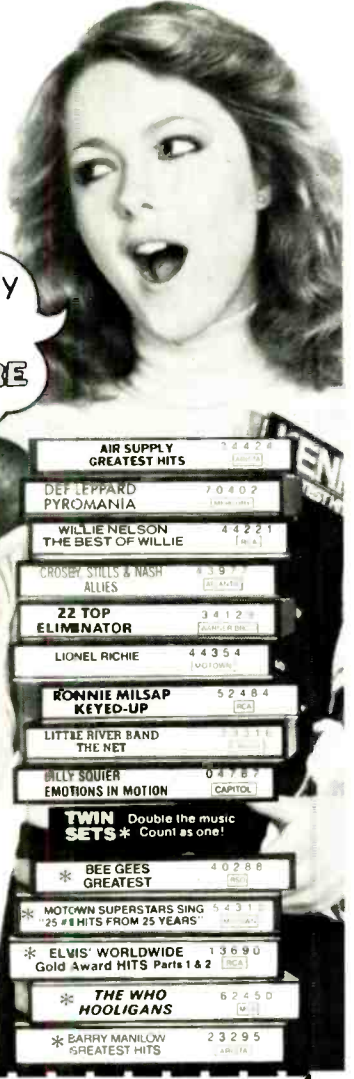
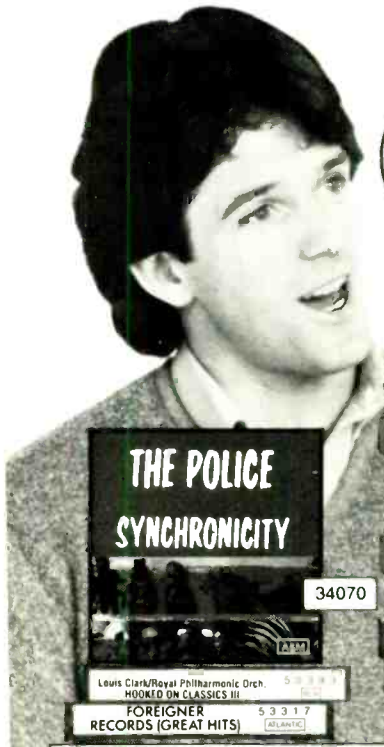
STEVEN R. GROBE  
Fayetteville, N.C.

**A.** Direct-current (d.c.) cassette-deck motors will operate perfectly normally at either power-line frequency. In components with d.c. motors an internal power  
(Continued on page 24)

What a deal! The **RCA MUSIC SERVICE** gives you **4 TAPES or RECORDS FOR THE PRICE OF ONE!**

**YEAH**, but then you have to buy a whole lot more, **RIGHT?**

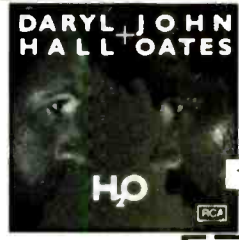
**WRONG!** You actually get **4** for the price of one!  
**WITH NOTHING MORE TO BUY EVER!**



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- DAVID BOWIE LET'S DANCE 53730
- RICK SPRINGFIELD LIVING IN OZ 53844
- OAK RIDGE BOYS GREATEST HITS 44417
- DIANA ROSS ROSS 53501
- STYX KILROY WAS HERE 34356
- COMMODORES ALL THE GREAT HITS 13622
- LEWIS CLARK/ROYAL PHILHARMONIC ORCH. HOOKED ON CLASSICS III 53337
- FOREIGNER RECORDS (GREAT HITS) 53317

- ALABAMA THE CLOSER YOU GET 13563
- "FLASHDANCE" ORIGINAL SOUNDTRACK 33912
- NEIL DIAMOND THE JAZZ SINGER 32877
- THE KINNS STATE OF CONFUSION 54222
- SYLVIA SNAPSHOTS 14523
- QUARTERFLASH TAKE ANOTHER PICTURE 11113
- PAT BENATAR GET NERVOUS 14616
- A FLOCK OF SEAGULLS LISTEN 33905

- AIR SUPPLY GREATEST HITS 34424
- DEF LEPPARD PYROMANIA 70402
- WILLIE NELSON THE BEST OF WILLIE 44221
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Start with **3** tapes or records for only **1¢** plus postage and handling with Club membership.  
Buy just **1** smash hit in one year's time.  
Enjoy **4** tapes or records for the price of one.  
**Nothing more to buy...EVER!**

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- Kenny Rogers: Gt. Hits 50019
  - Alabama: Mtn. Music 60229
  - Duran Duran: Rio 63452
  - B. Manilow: Here Comes Night 54146
  - Fleetwood Mac: Mirage 04802
  - Elton John: Too Low Zero 10196
  - Waylon: It's Only Rock 44193
  - Bernstein: Beethoven Overtures 05416
  - Led Zeppelin: Code 33759
  - Bob Seger: Night Moves 43584
  - Dolly Parton: Burlap/Satin 44133
  - Music from "Revenge Of Jedi" 50352
  - Asia 04729
  - Hall & Oates: Private Eyes 34524
  - John Cougar: American Fool 40331
  - Canadian Brass: Gt. Hits 73493
  - H. Williams, Jr.: Gt. Hits 34553
  - Chris Cross: Another Page 34400
  - Abba: Gt. Hits 13682
  - Rush: Signals 04831
  - Stray Cats: Built For Speed 04788
  - J. Galway: Pachelbel Canon 34542
  - Best Of The Beach Boys 23946
  - Staller Bros.: Today 33753
  - Van Halen: Diver Down 44205
  - Best Best Merle Haggard 33505
  - Eagles: Gt. Hits V. 2 63318
  - Juice Newton: Quiet Lies 23412
  - Anne Murray: Gt. Hits 63530
  - Chicago 16 04760
  - Alabama: Feels So Right 53632
  - Triumph: Never Surrender 53938
  - Little River Band: Gt. Hits 53429
  - Billy Squier: Don't Say No 54318
  - J. Geils Band: Showtime 13346
  - Bellamy Bros.: Gt. Hits 04770
  - Hooked On Swing 04722
  - Oak Ridge Boys: Bobbie Sue 64212
  - Pat Benatar: Crimes of Passion 53331
  - Hall & Oates: Volcs 34045
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Start Now with 3 Hit Albums for 1¢! Yes, pick any 3 records, or 8-track tapes, or cassettes...for just 1¢. Then agree to buy only 1 more hit at regular Club prices (usually \$8.98 to \$9.98) ...and take up to one full year to do it...with nothing more to buy ever! That's 4 smash hits for the price of one!

**No Further Obligation whatsoever!** It's all up to you! You buy what you want...when you want to. This is one record and tape offer that really is different. And you pocket the savings!

**Exciting "Members-Only" Benefits.** Once you enroll, you'll receive your subscription to our exclusive music magazine, MEDLEY. Each issue is crammed with hundreds of hit tapes and records—many as low as \$2.98 to \$3.98—plus your featured "Selection of the Month" in your favorite category. In all, you'll have 19 convenient, shop-at-home opportunities a year.

**It's Easy to Get Your Favorite Hits!** If you want the "Selection of the Month," do nothing. It will be sent to you automatically. If you want other selections, or none: just indicate your preference on the card always provided...and mail it back to us by the date specified. You'll always have at least 10 days to decide. But if you don't, you may return your "Selection of the Month" at our expense for full credit. As a member in good standing, send no money when you order, we'll bill you later. A postage and handling charge is added to each shipment.

**FREE 10-Day No-Risk Offer!** Listen to your 3 big hits for a full 10 days. If not satisfied, return them for a prompt refund. You risk nothing! So don't delay. Pick your hits, write the code numbers in the boxes on the right, and mail today!

Send back this coupon...today!

**1** MAIL TO: RCA MUSIC SERVICE, P.O. BOX RCA 1, INDIANAPOLIS, IN 46291

I enclose 1¢. Please accept my trial membership in the RCA Music Service and send me the 3 hits I've indicated here under the terms outlined in this advertisement. I agree to buy just 1 more hit at regular Music Service prices in 1 year's time—after which I may cancel my membership. (A postage and handling charge is added to each shipment.)

**2** SEND MY SELECTIONS ON (check one only):  
 Cassettes  Records  8-Track Tapes

**3** I am most interested in the following type of music—but I am always free to choose from every category (check one only):  
 1  Easy Listening (Instrumental/Vocal Moods) 2  Country  
 3  Hard Rock 4  Pop/Soul Rock 5  Classical

**4** RUSH ME THESE 3 SELECTIONS (indicate by number)  
 [ ] [ ] [ ]

**5**  Mr.  Mrs.  Miss (Please Print)  
 Address \_\_\_\_\_  
 City \_\_\_\_\_  
 State \_\_\_\_\_ Zip \_\_\_\_\_  
 Telephone (Area Code) \_\_\_\_\_

**6** Have you bought anything else by mail in  
 last 6 months  year  never

T-KB YV

RCA Music Service reserves the right to request additional information or reject any application. Limited to new members, continental U.S.A. only; one membership per family. Local taxes, if any, will be added.

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—Reese Haggott,  
Executive VP/General Manager  
Alpine Electronics of America

Anyone who knows audio will tell you there's something special about the way Alpine Car Audio and Luxman High Fidelity products perform. And in the way they look. And even a difference in the way their controls feel when you touch them.

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# SOLUTION.

**Dear Bob Carver,**

I bought a tuner four weeks before you introduced your TX-11 tuner. Now that I've read the AUDIO, STEREO REVIEW and HIGH FIDELITY reviews and have heard a demo at my audio dealer, I could kick myself. Couldn't you please put that special FM noise reduction circuit into an add-on unit? By the way, I have the C-4000 with Sonic Holography and your M-1 5t and I love them.

"Pleading in Suburbia"

**Dear Bob Carver,**

I am satisfied with my present receiver except when I try to listen to FM. The stations in this city are fantastic but the noise from multipath interference makes stereo listening almost impossible for me. However several friends of my cousin have your TX-11 tuner and they get beautiful stereo FM reception. Is it possible for you to build your special FM circuit as a separate device so receiver owners can benefit from your technology too?

"Hoping in Manhattan"

**Dear "Pleading" and "Hoping,"**

I just did it! The Carver TXI-11, Asymmetrical Charge-Coupled FM Decoder, designed to be used in the stereo mode of any FM tuner or receiver, will give you a 20 dB improvement of the stereo quieting (that's 10 times quieter!) and a 10 dB improvement in multipath noise reduction. And you'll still have fully separated stereo FM reception with space, depth and ambience.

Both my TX-11 and TXI-11 use the Asymmetrical Charge-Coupled FM Decoder circuitry which very significantly reduces the multipath noise and distant station hiss to which FM stereo is extremely vulnerable.

To get virtually noise-free stereo FM, simply connect the TXI-11 between your tuner and pre-amp or through the tape monitor/external processor loop of your existing system.

Good listening!



Bob Carver



TXI-11

**CARVER**

POWERFUL

MUSICAL

ACCURATE

For information, please write to: Carver Corporation  
P.O. Box 664, Woodinville, WA 98072

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supply converts the alternating current from the wall socket into direct current, which is used both by the motors and by any transistor circuits in the unit. Many cassette decks I have tested do not even need an external step-down transformer. Such decks are marked on the back "50/60 Hz, 110/220/240 volts"; usually there is a small recessed switch to select among the recommended line voltages. In other cases, however, transformer taps inside the unit have to be changed by a technician, and you may need a power-plug adaptor. When no internal provision is made for a change to European power lines, a step-down transformer rated to handle the total current you intend to draw from it will suffice.

My only concern would be for equipment marked "60 Hz," not "50/60 Hz." This may indicate that the power transformer for the component's internal power supply would overheat when used with a 50-Hz outlet. If any of your equipment is so marked, you should check with the manufacturer before assuming that all you'll need for European operation is the external step-down transformer.

## Headroom Margin

**Q.** Now that almost all cassette decks use peak-reading instead of VU meters for showing record levels, why should there be any "headroom margin" between 0 dB and the 3 per cent distortion point used for measuring signal-to-noise ratios?

GARY WINTHROP  
Cambridge, Mass.

**A.** There are a couple of reasons for this. First, many people are so accustomed to getting away with "cheating" a little in recording (running slightly "into the red") that they find the practice of using 0 dB as a true maximum as hard to adhere to as the 55-mph highway speed limit. Second, it often happens that when you set up for a recording, the actual maximum levels you will encounter are unknown, so when you try to judge a suitable recording level for 0 dB, you may miss by a bit. Since tape distortion above the 3 per cent point rises very rapidly, it's best to allow a little margin for error.

Finally, except for a few deluxe machines, the signal shown on the record-level indicators is the input to the recording amplifier, *not* that amplifier's output to the recording head. In the recording amplifier the signal gets a very large treble boost (equalization)—on the order of 10 dB at 10 kHz and 20 dB at 20 kHz. High-frequency signal components that are well below 0 dB at the input may thus be well above it when they reach the tape, thus causing saturation. Decks that meter *after* the record equalization more accurately show the true level being fed to the tape, and such decks have traditionally set their 0-dB point at the level of maximum acceptable distortion. □

*Because the number of questions we receive each month is greater than we can reply to individually, only those letters selected for use in this column can be answered. Sorry!*



# 3-D Sound

*New microphone developed by a brain surgeon uses same technology as your ear to produce startling audio.*

*The Sound Grabber® plugs into any cassette recorder to produce a sound you'll have to hear to believe.*

Humans see in 3-D. It's primarily because we have two eyes. But we might not realize that we also hear in 3-D too. Here's how.

Two ears help. With two ears we can hear in stereo and determine where the sound is coming from. But our ears can do much more. Scientists have discovered that when sound hits a surface, a "pressure zone" is created a few thousandths of an inch above that surface. Our ears transmit that pressure to the brain through the eardrum.

## NEW MICROPHONE

A new microphone has just been announced that simulates the human ear. Called the Sound Grabber®, it uses pressure sensitive membranes to capture the same 3-D stereo effect we actually experience through our ears. And it does it with just one microphone.

The Sound Grabber® uses "pressure zone" technology to pick up both distant and close sounds with such clarity and depth that you'll be startled when you hear your first recording.

The implications are enormous. Suddenly every recorder you now own will record with dramatically greater quality and clarity. And that's regardless of the quality of your recording tape or how much money you paid for your previous microphone.

## DICTATE LETTERS

You can dictate letters, while the Sound Grabber® lays on your desk, with better quality than holding a conventional mike to your face. In our tests, we mounted the Sound Grabber® at one end of our conference room and recorded the voices of six people so clearly that you'd think there was a microphone in front of each person.

We recorded music at a concert with such realism that it sounded like a professional live recording. And we were able to record a classroom lecture without the echo effect and less of the annoying sounds made by the recorder itself.

The Sound Grabber® will plug into 95 percent of all cassette or microcassette recorders with its standard plug, however a special adapter plug is supplied to fit most of the units not covered by the standard plug.

You can then hold the Sound Grabber® in your hand, put it in your shirt pocket or just plain leave it out of the way taped onto a wall somewhere in your room.

## SOUNDS HIT SURFACE

Sound hits the Sound Grabber® surface and a pressure zone is created a few thousandths of an inch above the surface. By sensing the fluctuations in this pressure through a pressure calibrated membrane and then converting them into electronic impulses, the sound will transfer in its purest form and in its proper phase relationship.

Conventional microphones can't match the human ear because sound is rather complex. For example, the sound that bounces off walls before it hits a microphone is called indirect sound and is usually out of phase with direct sound. This causes the echo effect we often hear in our recordings.

You can actually eliminate this problem in a sound absorbing recording studio with very expensive microphones and sound mixing electronics—but what about in your office, conference room or class? That's what is so beautiful about the Sound Grabber®.

## PHASE RELATIONSHIP

The Sound Grabber® takes all the sounds present in a room, places them into a proper phase relationship and eliminates the problems of the conventional microphone. The end result is enhanced sound with more depth, deeper tones, and greater clarity while maintaining a life-like presence that can only be described as 3-D sound.

The Sound Grabber® has a 3½" x 4" plate onto which the pressure-sensitive membrane capsule is mounted. The 7" long handle also contains its own power source—a single AA-cell battery which drives its built-in amplifier. There's also a very generous 10-foot long cable which lets you mount the Sound Grabber® practically anywhere.

The Sound Grabber® is manufactured by Crown Corporation, one of the leading manufacturers of equipment for the recording industry. Crown also makes a \$350 pressure zone microphone designed strictly for record-

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The Sound Grabber® was the end result of several engineering developments in the mid 70's. Recently, a brain surgeon who was also an electrical engineer, took the technology to its ultimate direction—into a product that has simulated the human ear and that we feel will affect the recording of sound more dramatically than any new development in audio since digital recording.

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We urge you to test the Sound Grabber® against any microphone regardless of price. See how one simple device can improve the quality of your recordings and enhance the utility of your recording devices.

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But don't just take our word for it. Order one during our 30-day free trial. Test it with your recording equipment using the cheapest recording tape you can find. If your recordings don't sound better than they've ever sounded before and if you aren't amazed at the results, return the Sound Grabber® for a prompt and courteous refund. Sound technology is about to go through a revolution. Order your Sound Grabber® and see why at no obligation, today.

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CIRCLE NO. 10 ON READER SERVICE CARD

# Audio Q. and A.

By Larry Klein



## Audio Specs for Video

**Q.** *I'm considering purchasing one of those new component TV systems and intend to wire the sound through my current hi-fi system. Are there any audio specs I should look for in a video system to guarantee audiophile sound? And are these specs usually available in the literature?*

ROBERT C. BRYANT  
San Francisco, Calif.

**A.** It's safe to say that today's major-manufacturer video components all have audio specifications adequate to the task of delivering reasonable-quality sound, and generally the specs will be found in the manufacturer's literature. But as for "audiophile sound," forget it for now. The audio quality of TV broadcasts is seldom as good as that of FM—which in turn is almost never as good as tapes and records played at home. True, I've heard a number of excellent-sounding LaserDiscs played through a Pioneer component video system, but even in those cases I would say the quality fell slightly short of "audiophile sound." At the moment, the sonic limitations of component video systems originate in the broadcasts and the soundtracks of the software rather than in the circuits of the hardware. But the coming stereo TV broadcasting and the new VHS and Beta Hi-Fi systems will, I hope, change all that in the next year or so.

## Mono Patio Speaker

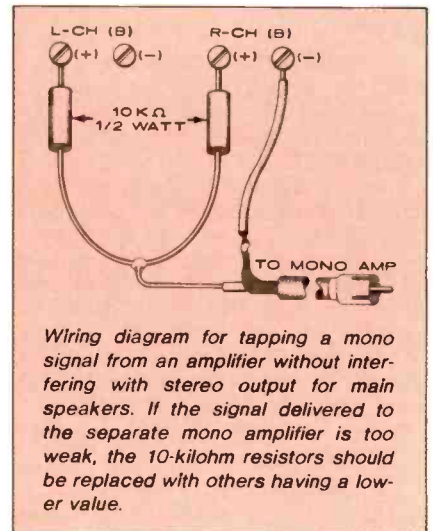
**Q.** *Is it possible to connect a single speaker to the B outputs of my stereo amplifier and pick up both channels of the stereo signal? I want to have music on my patio, where the stereo effect is not important.*

W. H. GRANGER  
Decatur, Ga.

**A.** Assuming that you don't want to hear stereo elsewhere at the same time you have mono on your patio, all you need do is connect the patio speaker to your amplifier's right- or left-channel B output and switch the amplifier to mono. The other channel can be left on but unloaded. If that

makes you uneasy, you can always rotate the balance control to cut off the signal to the channel without the speaker.

If you want mono on your patio plus stereo in your listening room, the necessary setup is more complicated. You'll need to isolate the stereo channels electronically and then mix them in phase. The isolation is necessary to prevent mixdown to mono of your main stereo signal. As shown in the accompanying diagram, you will have to tap off the signal from each channel using isolating resistors and then feed the mixed signal to a separate mono amplifier. Considering everything, however, I would suggest that you resign yourself to running two



Wiring diagram for tapping a mono signal from an amplifier without interfering with stereo output for main speakers. If the signal delivered to the separate mono amplifier is too weak, the 10-kilohm resistors should be replaced with others having a lower value.

pairs of leads to your patio and settling for stereo—particularly since an extra speaker may cost less than a mono amplifier! If necessary you can always move the two patio speakers close enough to each other to provide a mono effect.

## EQ Location

**Q.** *Since I plan to buy a graphic equalizer soon, I would like to know whether I should put the equalizer "between" my turntable and open-reel deck for equalizing record copies. Or should I use the equalizer*

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Maxell XL I-S and XL II-S are the ultimate ferric oxide cassette tapes. Precision engineered to bring you a significant improvement in dynamic range.

XL I-S provides exceptionally smooth linear performance characteristics with high resolution of sound and lower distortion.

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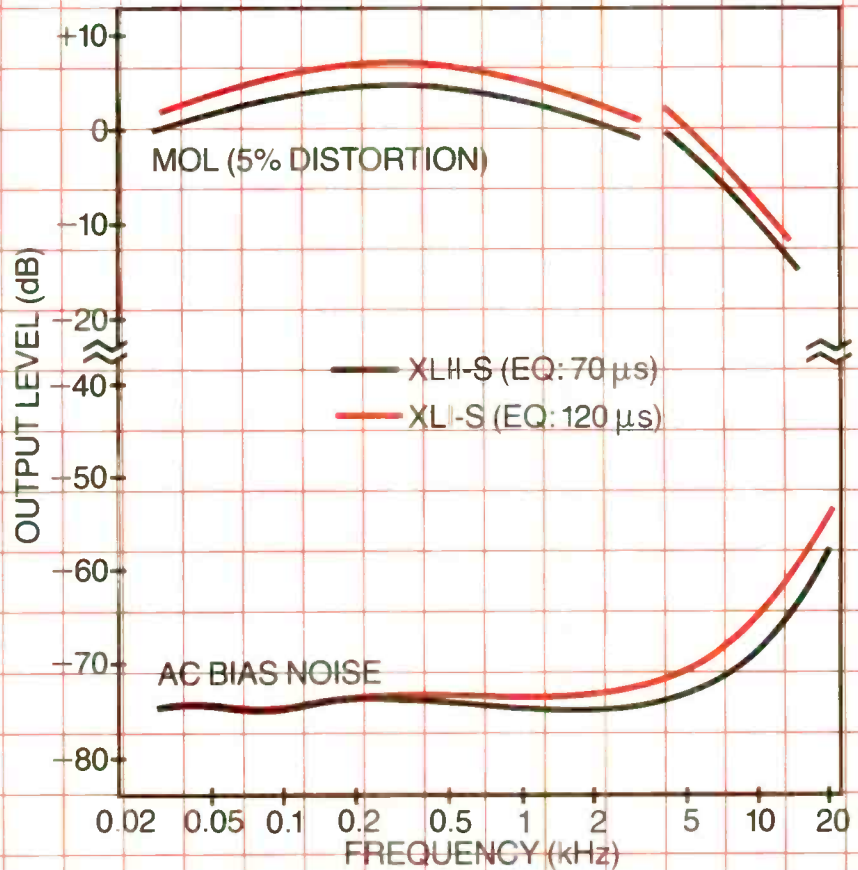
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Files. In the meantime, we suggest you listen to them.

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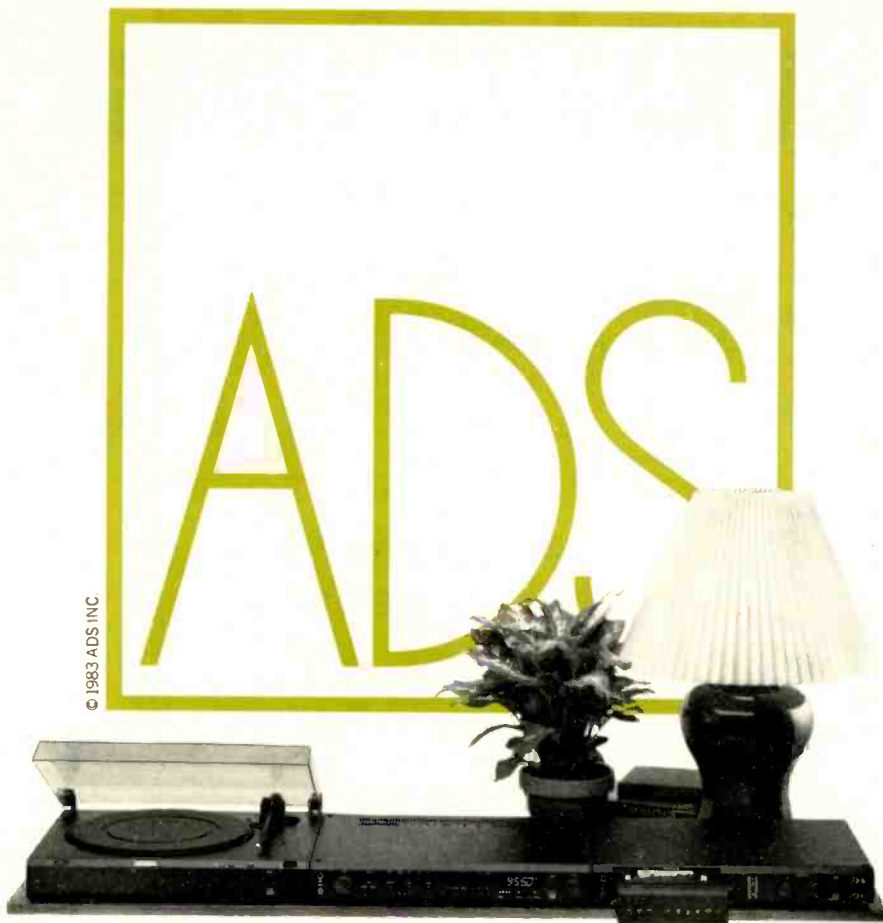
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CIRCLE NO. 27 ON READER SERVICE CARD



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## A music lover's guide to home improvement.

Once upon a time serious stereo was a big investment.

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to control the speakers only? Is it possible to use two separate equalizers to do this?

DAVID L. WORDEN  
Miami, Fla.

**A.** It's possible, but it's not necessary. All the better equalizers have a switch that inserts the equalizer in the path to the tape recorder *or* in the path to the speakers. Since there is no agreed-upon standard name for the switch, you'll have to check the manufacturer's literature to make sure that the function is present in the equalizer you are considering. One caution: *excessive* equalization applied to a tape or a speaker can cause overload distortion. When equalizing a tape copy, it's best to do a trial run first and listen for a sort of gritty distortion or momentary loss of signal. Both these symptoms are caused by excessive signal boost: the distortion is a result of tape saturation at high frequencies, and the loss of signal (blocking) is a result of amplifier overload at low frequencies.

## Component Durability

**Q.** I have read numerous test reports on receivers and would be able to make a choice except for one factor: I can't find a reliable answer to the question of durability. I'm looking for something more specific than the usual "well-constructed" generalities found in the test reports of most hi-fi publications. Any suggestions?

MICHAEL PIERCE  
Chicago, Ill.

**A.** Unfortunately, I can't provide a reliable answer to your durability question—or, for that matter, a durable answer to the reliability question, which reappears regularly in my mailbox.

Among my hi-fi-related past occupations were a five-year stint as a factory troubleshooter and technical correspondent for a kit company and several years of free-lance hi-fi servicing. Despite all that, I've never felt that I (or anyone else) could examine a reasonably well-designed piece of electronic gear and make an educated guess about its potential for breakdown. By "reasonably well-designed," I mean a product that operates well within the voltage, current, and temperature limitations of its internal components and has undergone an adequate "burn-in" at the factory. Almost all manufacturers put newly constructed components through a 24-hour electrical-stress cycle. The purpose is to precipitate any tendency to early failure—it's called infant mortality—in the equipment. Reasonable manufacturers would much rather have their equipment fail in a heat rack at the factory than in the dealer's store or the customer's home.

The laboratory test procedures used by Hirsch-Houck Labs also stress amplifiers and receivers to a much greater degree than normal home use. If an amplifier survives the normal test-bench procedures, neither a physical examination nor further specific testing is likely to provide additional data about its probable durability in home use. So when the phrase "well constructed" appears in a test report, it is best to take it as an aesthetic reaction rather than a technical judgment. □

**\$89 CLOSE-OUT**



# Sound Detonator Plus

**Make your stereo system's sound explode with life. Improve the sound quality by 30 to 50%. Plus, you'll add tape dubbing too with this limited BSR \$89 close-out.**

It's like night and day. Crashing cymbals, the depth of a string bass, more trumpets or more voice will come bursting forth from your stereo at your command.

You'll make your music so vibrant that it will virtually knock your socks off when you use this professional quality 10 band stereo Sound Detonator Plus Equalizer.

It has a frequency response from 5hz to 100,000hz  $\pm$  1 db. BSR, the ADC equalizer people, make this super equalizer and back it with a 2 year limited warranty. Our \$89 close-out price is just a fraction of its true \$249 retail value.

### CAN YOUR STEREO SOUND BETTER?

Incredibly better. Equalizers are different from regular bass and treble controls. And, 10 band EQs are the best.

Bass controls turn up the entire low end as well as the low mid-range, making the sound muddy and heavy. With an equalizer, you simply pick the exact frequencies you want to enhance.

You can boost the low-bass at 31hz, 62hz and/or 125hz, and the mid-bass at 250hz and 500hz to animate specific areas of the musical spectrum.

And, when you boost the part of the bass you like, you don't disturb the mid-range frequencies and make your favorite singer sound like he has a sore throat.

The high frequencies really determine the clarity and brilliance of your music.

You can boost the mid-range and highs at 1,000hz, 2,000hz, 4,000hz, 8,000hz and 16,000hz. So, you can bring crashing cymbals to life at 16,000hz while at the same time you cut tape hiss or annoying record scratches at 8000hz.

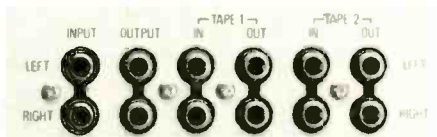
You can also boost or cut specific mid-range frequency areas to add or subtract vocal, trumpets, guitars or whatever instrument ranges you prefer.

### GREAT FOR 2 TAPE DECKS

You can push a button and transfer all the equalization power to the inputs of two tape decks. So, if you have a cassette deck in your car or a personal stereo that you wear, now you can pre-equalize your cassettes as you record them.

Now you can get all the dramatically enhanced sound wherever you are. This

is an especially great feature for bass starved portables and high-end starved car stereos to make them come alive.



And, look at this. There are two tape inputs and outputs, so you can dub from tape deck A to B, or make two tapes at once with or without equalization.

### EASY HOOK UP

Use your tape monitor circuit, but don't lose it. Now your one tape monitor circuit lets you connect two tape decks.

Just plug the equalizer into the tape 'in' and 'out' jacks on your receiver. We even supply the cables.

As you listen to your records, FM or 'aux', any time you push the tape monitor switch on your receiver you'll hear your music jump to life.

The output from your receiver is always fed directly to your tape decks for recording, and with the touch of a button, you can choose to send equalized or non-equalized signal to your recorders.

When you want to listen to a tape deck, just press a tape monitor button on the equalizer and your tape deck will work exactly as it did before. Except, that now you can choose to listen with or without equalization and you can dub.

You won't be listening to any distortion or hum. The Sound Detonator Plus has a 95db signal to noise ratio and total harmonic distortion of just 0.018%

Once you've set your equalizer controls, switch it in and out of the system. You'll hear such an explosive improvement in sound, you'll think you've added thousands of dollars of new equipment.

### WHY A CLOSE-OUT?

Last year DAK closed out over 18,000 of BSR's 7 band equalizers because BSR had decided to only sell equalizers under their ADC name and they still had some left with the BSR name on them.

Well, as Detroit comes out with new cars each year, ADC comes out with new equalizers. We got them to supply us

with just 15,000 of last year's model before they shut down for the new one.

They had already paid for all the tooling, all the research and design, so we were able to buy these for less than half the normal price, for cold hard cash.

So, you can go to any HiFi store and buy this year's design in an ADC equalizer made by the parent company BSR, or you can get this \$249 value BSR equalizer while our limited supply lasts, for \$89.

### THE FINAL FACTS

There are 20 slide controls, each with a bright LED to clearly show its position. Each control will add or subtract up to 12db. (That's a 24db range!)

There are separate sound detonation slide controls for each channel at 31hz, 62hz, 125hz, 250hz, 500hz, 1,000hz, 2,000hz, 4,000hz, 8,000hz, and 16,000hz.

LED VU meters with  $\pm$  0.5db accuracy show levels for each channel. It is 17" wide, 6 1/2" deep and 4 1/2" tall.

### PUT LIFE INTO YOUR MUSIC RISK FREE

Prepare for a shock the first time you switch in this equalizer. Instruments you never heard in your music will emerge and bring a lifelike sound that will envelop you and revolutionize your stereo system.

If your system doesn't spring to life, simply return the equalizer within 30 days in its original box for a refund.

To order your Sound Detonator Plus Tape Dubbing BSR 110X 10 Band Stereo Frequency Equalizer risk free with your credit card, call toll free or send your check not for ADC's \$249 value, but for only \$89 plus \$7 for postage and handling. Order No. 9724. CA res add 6% tax.

Wake up the sound in your stereo. Your sound will explode with life as you detonate each frequency band with new musical life. And now you'll be in control of two tape decks as an added plus.

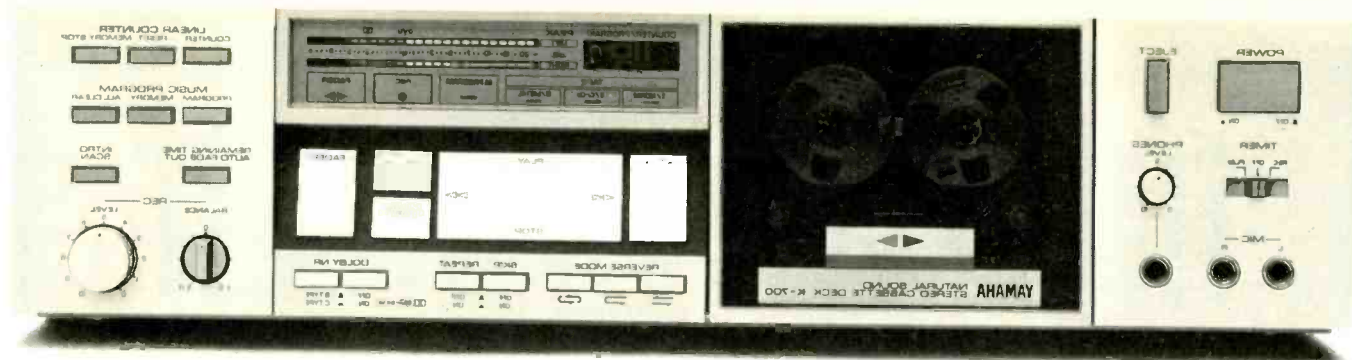


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But that's just the beginning of the K-700's convenience. During recording, the K-700 counts down remaining tape time, automatically fades out at the end of the tape, then automatically fades back in after the tape is reversed and continues recording. Another fader button allows professional sounding fade-ins or fade-outs at any point during recording. You can also preprogram up to 15 selections to be recorded or played back in any order.

Then there's Intro Scan, Search, Blank Skip, Repeat, Auto Source Change, Auto Tape Selector, Dolby\* B and C, Real-time Digital Counter, and an optional remote control unit.

How much for all this? Much less than you'd expect to pay for this much deck. The K-700. It's all true. Find out at your Yamaha dealer. Or write for complete information: Yamaha Electronics Corporation, USA, P.O. Box 6660, Buena Park, CA 90622.

\*Dolby is a registered trademark of Dolby Labs, Inc.



# Technical Talk

By Julian D. Hirsch



## The Myth of Concert-Hall Realism

**F**ROM the earliest days of music recording, claims have been made of sound reproduction so natural that it could not be told from the live original. Today's sophisticated listeners are understandably amused that such a claim was made for primitive acoustic cylinder and disc recordings, yet we still eagerly follow current developments hoping for some technological breakthrough that will finally bring us "concert-hall realism."

Is it possible that we are as prone to self-delusion as the discophiles and cylindrophiles of the first quarter of this century? I believe that many of us are—that transporting the acoustic environment of the concert hall to our homes is probably no more attainable than the science-fiction dream of faster-than-light travel.

Anyone who has listened with an open mind as well as open ears to live concert-hall performances and to recordings of such performances played over *any* home music system, no matter how costly or advanced, must realize that these are totally different experiences. No one with normal (let alone superior) hearing can close his eyes, listen to a recorded reproduction of an orchestral work, and believe that he is hearing what he would have heard in the concert hall. This is not, however, to denigrate the current state of sound recording or reproduction technology. They are not the same as "the real thing," but in some ways they can be even better.

The problem, as I see it, is one of *scale*. A full orchestra in a large concert hall creates a sound field around a listener radically un-

like anything that can be generated in a normal living room. Most of the sound reaching any listener in a concert hall has been reflected several times from a room boundary (wall, ceiling, floor) or other surface. The direct sound—the first arrival from any single source to the listener's ears—constitutes a very small fraction of the total audible sound energy. These first arrivals play a key role in the localization of a sound source but otherwise have a relatively small part in the total listening experience. In the case of an orchestral performance, the sound source (the entire orchestra) is rather large, subtending a considerable angle as viewed from any good listening position. And it is formed of many individual sources whose outputs combine linearly (without distortion) to form a single complex sound field surrounding each listener. (Actually, slightly different fields surround each ear of each listener.)

To have an exact—I prefer to call it "fac-simile"—reproduction of a performance, one that is indistinguishable from the original, it would be necessary to re-create the same sound field around the listener as he would have experienced in the concert hall. But that sound field is different at every seat in the hall, and it also varies according to the performers' placements, the size and distribution of the audience throughout the hall, the room's temperature and humidity, and no doubt a few other factors. For the sake of discussion, however, let us assume that we have standardized the home listening conditions to match those of an original concert-hall performance.

Now, the sonic output of each instrument in the orchestra radiates in various directions according to that instrument's polar characteristics. Some sound energy may be absorbed by other, nearby players, and most of the rest of the instrument's acoustic output will be variously reflected, diffracted or partially absorbed by *everything* in the vicinity: the floor, back wall, and wings of the stage; the proscenium (if any); the walls, floors, and ceiling of the auditorium; and the audience itself. These reflections will generally be multiple, so that most of the sound energy emitted by each instrument goes through numerous modifications before finally impinging on a particular person's eardrums sometime after the arrival of the relatively small amount of direct sound. The degree of reflection or absorption at every part of this process is a function of frequency, with higher frequencies typically being absorbed or scattered more than lower ones.

Each reflected sound, which has to travel a longer path than the direct sound, is more or less delayed en route to the listener. Since sound travels slightly faster than 1,000 feet per second, delays between first arrivals and subsequent reflections range from a couple of milliseconds to as much as 30 to 50 milliseconds or more. The longer-delayed sounds have considerably attenuated high frequencies, but they still contribute powerfully to the total ambience.

When you consider that in a concert hall the sound of each instrument in, say, a hundred-piece orchestra undergoes a *separate* and *unique* modification before being

### Tested This Month

Mirage SM-4/Subwoofer Speaker System • Akai GX-R6 Cassette Deck  
Sennheiser MS 100 Headphones • Infinity RS6 Speaker System  
J.C. Penney MCS Series A Model 3285 AM/FM Receiver

heard and that what we finally hear is the sum of all the contributing sources, can you doubt the impossibility of creating the same result in a different room? For one thing, the recording microphones do not pick up what is heard by any person in the audience. They are normally placed much closer to the sound sources than any listener would wish to be. This is done in order to capture a larger portion of the direct sound, which is necessary to create a believable balance between direct and reverberant sounds in home playback. A basically "unrealistic" recording process is used to generate a more realistic result.

Now let us move to our listening room, measuring perhaps 15 by 25 by 8 feet and with acoustic properties totally unlike those of the concert hall. The sound sources are (usually) two speakers at one end of the room, radiating mostly forward but with an irregular polar response that is almost certainly unlike that of any instrument in the orchestra or of the orchestra as a whole. There will still be the unavoidable reflections from room surfaces, but the resulting delays are much shorter than those in a large concert hall. Typically, they might be in the range of 2 to 30 milliseconds. No longer do we have one hundred different sound sources, each with a unique combination of directional properties, absorption, and reflection delays. Each of the two channels in the stereo program may contain virtually all the frequencies that were present in the original program, but their time relationships in the recording were determined by the placement of the recording microphones and the mixdown of a multimike pickup. There is no way that this playback signal can reproduce any part of the original sound field in your listening room (which itself adds its own different reflections, absorptions, and resonances).

Furthermore, in a normal home listening room the proportion of direct to reflected sound is much higher than it would be in a concert hall. Since we are closer to the speakers to begin with than most listeners are to the orchestra in a concert hall, we find that the perceived sound level varies rapidly as we change the speaker-to-listener distance, unlike the relatively constant level in most seats in a good auditorium. Speakers that direct some or all of their sound in different directions are less subject to this effect, but in every case there is a real difference from the concert-hall situation. We have all noticed at live performances that although the softest passages may be clearly audible, the loudest ones remain tolerable; they do not cause the audience to flinch or cover their ears. Try that at home, preferably using a wide-dynamic-range source such as a digital Compact Disc, and you may find that a *fortissimo* causes you to reach for the volume control to turn it down. The actual sound-pressure levels at your eardrums may be virtually the same in both the live and the recorded performances, but their subjective effects are very different. This is, I believe, because of the very different acoustic properties of concert halls and home listening rooms. Most LP recordings meant to be heard in the home have had their dynamic range restricted, by either musical or electronic methods, to minimize this effect.

One way to restore some of the character of a concert hall to home listening is to play a recording through additional signal channels that drive speakers along the sides or rear of the room with multiple delays comparable to those created in the original environment. The time-delay devices that appeared several years ago were designed to do this, and each of them succeed in some respects but fail in others. Although at their

best some of them can greatly enhance the realism of home sound, it is easy to misadjust them and create an unnatural echo effect. Another problem is that no two pieces of recorded music require exactly the same type of enhancement for optimum results, so that the inevitable compromise adjustments all too often fail to deliver a believable sound. I suspect that no affordable number of delay channels would be able to supply "concert-hall" sound. The problem is probably too complex to be completely solved by after-the-fact electronic manipulation, but a good time-delay system is certainly a big step in the right direction.

Ironically, it is possible to come extremely close to a subjective re-creation of the concert-hall environment, but the price is too high, not in dollars but in listening convenience. Listening through headphones to a binaural recording (one made using a pair of microphones built into a dummy head) can sonically transport the listener to the exact spot where the recording was made. Although there is no clear sense of front-back location and the listener has to keep his head in a fixed orientation for the best results, binaural recording and reproduction can nevertheless convey an incredibly realistic illusion of sonic space. (A binaural recording played through loudspeakers, however, sounds nearly monophonic.) I had hoped that the popularity of personal cassette players might induce recording companies to issue binaural tapes, but apparently this is not to be. Perhaps the dissociation of the listener's sense of hearing from his physical environment would have been too dangerous!

As a factor in the problem of reproducing sound realistically, scale refers not only to how the size of one listening environment relates to another but also to how the size of the performing group (and the sound level it produces in a typical performing environment) relates to the size of the listening environment. Chamber music was meant to be heard in an intimate environment, of course, and would hardly be appropriate to a large outdoor stadium, while the opposite is true for an orchestra or brass band. My experience suggests it is possible to achieve facsimile reproduction of small ensembles—if the recordings are correctly made and the listening environments are appropriately scaled.

In the earlier years of the high-fidelity industry, several speaker manufacturers gave public "live-vs.-recorded" concerts to demonstrate the accuracy of their products. Some were more successful than others, but it is important to realize that this was not quite the same "concert-hall realism" we have been discussing. The key to success in such a feat is to avoid "double reverberation": the recording must be made in the most nearly anechoic environment possible so that in playback only the acoustics of the listening room affect the sound as heard. The most successful such demonstrations that I heard were those given by Acoustic Research some twenty to twenty-five years ago, in which a string quartet was the live sound source and a tape of the same quartet made out of doors was the recorded source. With the playback speakers placed close to the performers in the demonstration room



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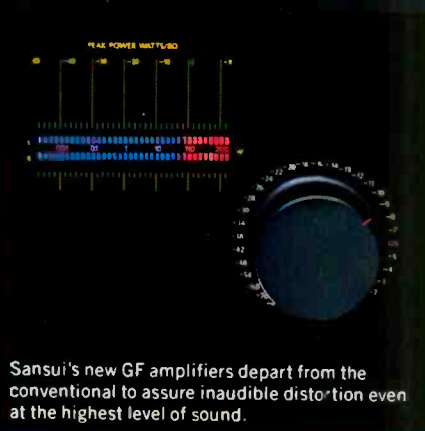
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\*AU-D77X—110 watts, 0.0028% THD; AU-D11 II—130 watts, 0.0025% THD.  
Minimum RMS, both channels driven into 8 ohms, from 10-20kHz.  
CIRCLE NO. 44 ON READER SERVICE CARD

and with the transitions carefully chosen, it was usually impossible to detect the switch from the live performance to the recording of the same music.

A short time earlier (in 1955), I was involved in a somewhat similar effort, in which a recording of a pipe organ in a church was compared with a live performance (obviously, in the same location). The double-reverberation problem was handled by placing the recording microphones next to the organ pipes and the playback speakers in as close as possible to the same positions. The results were impressive, but any hopes that such a re-creation could be achieved at home were dashed by hearing the tape played back in a normal room. It sounded almost totally "dead" and made for quite unpleasant listening.

My conclusion from all this is that recordings meant to be heard through loudspeakers in a normal home environment can never give even a reasonable facsimile of a live performance. Conversely, a recording that can give facsimile reproduction of a musical source in its own normal acoustical setting is almost certain to be unsatisfying for home listening. I suggested near the start of this discussion that our current recording technology is capable of surpassing live music in some respects, and for me this helps soften the realization that we can never achieve our impossible dream of packing the Boston Symphony Orchestra into our living rooms, even with the aid of digital technology and a music system worth a king's ransom. For example, are you as annoyed as I am by the chorus of coughs and

barks that punctuate the quieter moments of so many concerts, the constant rustling of programs, or the conversation of people who view the concert hall as a place for social chitchat with the music as a pleasant background? You don't have to put up with that with a good recording. Have you ever wished to rehear a piece of music, or a portion of it, right away but found the orchestra unwilling to oblige? Do you sometimes find it inconvenient to leave your home to attend a concert? All of these capabilities, and more, are at your fingertips with records and tapes, and the technical quality of today's recordings is—at least potentially—as nearly perfect as many of us could hope for. I suggest, then, that you consider live and recorded music as two different media and enjoy the best of both. □

## Equipment Test Reports

Hirsch-Houck Laboratories: Julian D. Hirsch and Craig Stark



Mirage SM-4/Subwoofer Speaker System

**I**N recent years "three-piece" speaker systems have begun to reappear (they enjoyed a brief popularity in the early days of stereo but soon disappeared from the market). The concept is attractive: two small, unobtrusive "satellite" speakers, placed for best imaging and handling most of the audi-

ble frequency range, together with a bass module (sometimes called a subwoofer) that can be placed almost anywhere in the room. We have tested several such systems and have found them to give generally very good results.

The Canadian-built Mirage SM-4/Sub-

woofer combination is the latest three-piece system to come to us for evaluation. The SM-4 is a small acoustic-suspension bookshelf speaker with a 6-inch woofer and a 3/4-inch dome tweeter. The crossover frequency is not specified, but our measurements suggest that it is between 2,500 and

Photos by Roy Schneider

3,000 Hz. The tweeter faces a small plastic cone whose purpose is apparently to improve the polar dispersion, and it is surrounded by a ring of felt to smooth its high-frequency response. The Mirage SM-.4 has no balance controls. A pair of binding posts 3/4 inch apart are set into its rear surface.

The Mirage Subwoofer is a fairly large box containing two acoustically and electrically isolated 10-inch acoustic-suspension woofers (in other words, a stereo pair) and a crossover network that matches it to any of several small Mirage speakers, including the SM-.4. It can also be used with other brands of satellite speakers. Electrical separation of the two drivers is somewhat unusual, the traditional approach being to sum the low frequencies of both channels for reproduction by a single driver. The woofers are on the ends of the box near its bottom edge. The enclosure is finished on all sides, and the manufacturer states that, if required for better bass balance, the box can be turned over to increase the distance from the woofer cones to the floor.

The internal crossover of the Mirage Subwoofer is at 300 Hz. An array of binding posts set into one of its larger surfaces provides for connecting the driving amplifier and routes the signals above 300 Hz to the satellites. Separate sets of connectors are provided for either the Mirage SM-.4 or SM-1 speakers and for the SM-.5. A toggle switch marked INCREASE and DECREASE adjusts the level of the woofer output relative to that of the satellites. It is also possible to use biamplication to match the Subwoofer to other speakers whose characteristics may not match those of the bass module.

The Mirage SM-.4/Subwoofer system is rated to handle up to 200 watts per channel of program material, and a minimum amplifier rating of 20 watts per channel is recommended. System impedance is quoted in conjunction with which satellites are used; with the SM-.4's the system is rated at 6 ohms with the bass switch set for INCREASE and at 10 ohms with it set for DECREASE.

As with most similar three-piece systems, the Mirage components give best results with the satellites on stands that place them at ear level, a foot or two from the wall, and spaced slightly wider apart than the distance from them to the listeners. Mirage offers optional wooden stands for this purpose. The SM-.4 speaker is 16 inches high, 10 inches wide, and 6 3/4 inches deep, and it weighs 11 3/4 pounds. The Subwoofer is 25 1/2 inches long, 15 1/2 inches wide, and 19 inches high. It weighs about 80 pounds. The Model T-4 stands are 28 inches high and are finished in black to match the cloth grille of the SM-.4 speaker. The Subwoofer's grilles are dark brown and beveled on the end next to the top of the cabinet; they can be turned over if the Subwoofer is operated in an inverted position. Prices: SM-.4, \$199 per pair in walnut-grain vinyl finish, \$259 per pair in genuine oak veneer; the Subwoofer, \$399 finished in walnut-grain vinyl, \$529 in oak veneer; T-4 stands, \$50 a pair. Mirage Acoustics, Dept. SR, 1361 Huntingwood Drive, Unit Seven, Scarborough, Ontario, Canada M1S 3J1.

● **Laboratory Measurements.** Most of our measurements were made separately for the

Mirage SM-.4 and the Subwoofer, although the room response was measured with them operating as a system. The 6-inch woofer of the SM-.4 developed its maximum output at about 100 Hz, falling off at 12 dB per octave below 70 Hz. With increasing frequency, the output fell off very smoothly to the vicinity of 1,000 Hz, above which it leveled off and was very flat (with minor irregularities) up to 10,000 Hz, rising to its mid-range level at 16,000 Hz and dropping off slightly at 20,000 Hz. From 700 to 20,000 Hz, the output of the Mirage SM-.4 varied only  $\pm 2$  dB, which is excellent performance for any speaker. Its output variation, including the close-miked woofer response, was  $\pm 4$  dB from 50 to 20,000 Hz.

The wide response was confirmed by the IQS FFT quasi-anechoic response measurement, which showed the Mirage SM-.4 to be flat within  $\pm 4$  dB up to 19,000 Hz on the speaker axis. In fact, the tweeter output remained strong well beyond 20,000 Hz. The SM-.4 had excellent dispersion; over a  $\pm 45$ -degree angle in the horizontal plane the output varied by no more than  $\pm 6$  dB over the full audio frequency range.

The impedance of the Mirage SM-.4 reached its minimum of 4 ohms at 20 and 200 Hz, with a peak of 20 ohms at its 75-Hz woofer resonance. The speaker sensitivity was 87.5 dB at 1 meter with a 2.83-volt driving signal. The SM-.4 had excellent phase characteristics, with a group delay variation of less than  $\pm 0.3$  millisecond up to 20,000 Hz.

The Mirage Subwoofer had its maximum output at 60 to 70 Hz. The output was 5 dB below that maximum at the 300-Hz nominal crossover frequency, and it fell off rapidly above 300 Hz to about 30 dB below average bass level at 800 Hz. We made no separate sensitivity measurement for the Subwoofer, but its distortion was measured with a constant input of 3.76 volts (the value required to develop a 90-dB sound-pressure level at 1 meter from the SM-.4 satellite). The Subwoofer's distortion was very low, rising gently from 0.3 per cent at 100 Hz to 0.93 per cent at 50 Hz and 1.63 per cent at 40 Hz. These are exceptionally low distortion readings for any speaker, but the

Subwoofer's lower frequency limit was apparently just below 40 Hz, since its distortion increased to 10 per cent at 35 Hz and 18 per cent at 30 Hz.

The system impedance (Mirage SM-.4 and Subwoofer combined) reached a minimum of 4 ohms at 700 Hz (and at 85 Hz in the INCREASE position of the Subwoofer switch). Above 1,000 Hz, the impedance was generally in the 6- to 10-ohm range. The major effect of the bass-level switch occurred between 50 and 300 Hz; when the switch was in the DECREASE position, system impedance was 8 ohms or higher from 20 to 250 Hz, and it dipped significantly below 8 ohms only between 400 and 1,500 Hz.


Forming a composite frequency-response curve for the combination of the Mirage SM-.4 and the Subwoofer was difficult because of the physical separation between the two units and the many uncontrolled placement variables that could affect their combined performance in different rooms. The bass level switch shifted the woofer output by about 5 dB. In our room, a preference for one setting or the other was often a function of the program material, although the DECREASE setting generally gave a better balance between bass and midrange levels. We would estimate the typical overall system response to be about  $\pm 5$  dB from 30 to 20,000 Hz; using the INCREASE setting would not extend the lower frequency limit significantly, but it would give additional emphasis to the midbass.

● **Comment.** Heard by themselves, the Mirage SM-.4 speakers are open, clean speakers with a trace of brightness, especially in comparison with our reference speakers. We soon became accustomed to this brightness and accepted it as the norm, however, so that it made the reference speakers sound a trifle dull! (Actually, most of us soon became accustomed to the sound characteristics of our systems and—assuming they are reasonably good—tend to judge others by comparison to what is a familiar sound.) Counterbalancing the slight brightness at the top end is the relatively boom-free and uncolored lower midrange of the SM-.4, which makes it a very pleasant sounding





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speaker by itself (especially so in view of its low price).

Adding the Subwoofer makes the system much more muscular and solid-sounding. A clean, strong bass output down to 40 Hz is all most of us ever need to give a sensation of "all there" sound, and the Mirage three-piece system certainly provides that. It seems to us, however, that the "Subwoofer" designation is here applied to what could more accurately be called a "bass module." In our view, any speaker that operates much

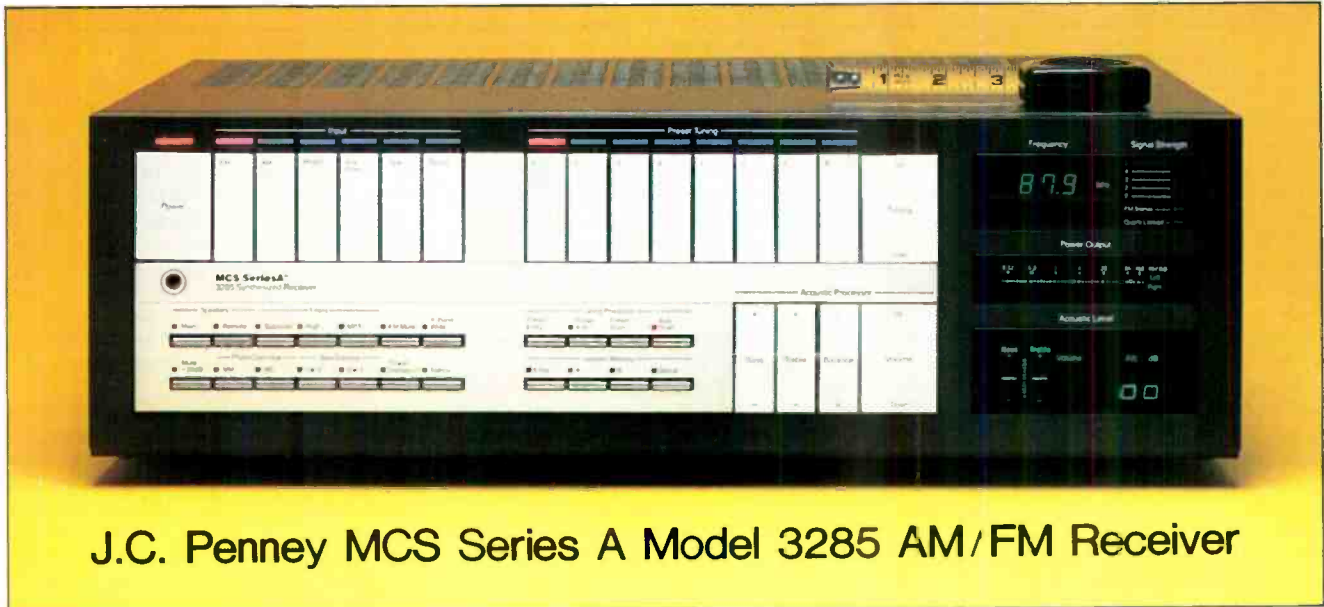
above 60 Hz can hardly be called a "subwoofer," and the Mirage Subwoofer goes up to 300 Hz. This is indeed a small point, but the lower frequency limit of this entire system is within the range achieved by many fairly compact speakers on their own. The Subwoofer does not at all extend below a "normal" woofer's range, though its distortion level at lower frequencies is admirably low.

Terminological nit-picking aside, the Mirage SM-.4/Subwoofer combination is an

attractive and versatile speaker system at a reasonable price. As with any speaker, it is difficult to make any accurate predictions of how it will perform in an arbitrary room environment, but its three-piece configuration should give the user much more flexibility in speaker placement and in many cases better overall results than might be achieved with two conventional speakers.

—Julian D. Hirsch

Circle 140 on reader service card



## J.C. Penney MCS Series A Model 3285 AM/FM Receiver

**T**HE current leader of the J.C. Penney MCS audio component series is the Model 3285, a digital-synthesis AM/FM stereo receiver rated to deliver up to 85 watts per channel into 8-ohm loads from 20 to 20,000 Hz with less than 0.005 per cent total harmonic distortion. Its front panel has *no* knobs or sliders. All functions are controlled by momentary-contact pushbuttons or large rectangular pushplates. The settings are indicated either by adjacent red LED's or on one of the fluorescent display panels at the right of the controls.

The receiver's dominant visual feature is its satin-silver-finished control panel, which occupies about 75 per cent of the front. There are a power switch, six program input selectors, and eight station-preset controls, each of which can be used for either an AM or an FM station. In addition, the entire group of presets can be switched to access a second bank of eight channels, for a total of sixteen AM or FM presets. The program sources include FM, AM, phono (for either an MC or MM cartridge), and two tape recorders.

Pressing the TUNE button causes the tuned frequency to change up or down, according to which end is pressed. Like many other digital-synthesis receivers, the Model 3285 can be set for auto scan (in either direction) when its tuning button is pressed momentarily; scanning stops only when a signal of sufficient strength is encountered.

Otherwise, the tuning advances by a single increment (0.2 MHz for FM, 10 kHz for AM) with each touch of the button or at a rapid rate while the button is held in.

The lower left portion of the control panel contains fourteen small buttons for such functions as the output connections (either MAIN or REMOTE speakers), audio filters (SUBSONIC and HIGH), an FM-multiplex filter, FM mute, i.f. bandwidth (WIDE or NARROW), and stereo or mono mode selection. Other buttons mute the audio by 20 dB, select the MM or MC phono input, interconnect tape decks for dubbing from either one to the other, and change the scale of the fluorescent output-power display.

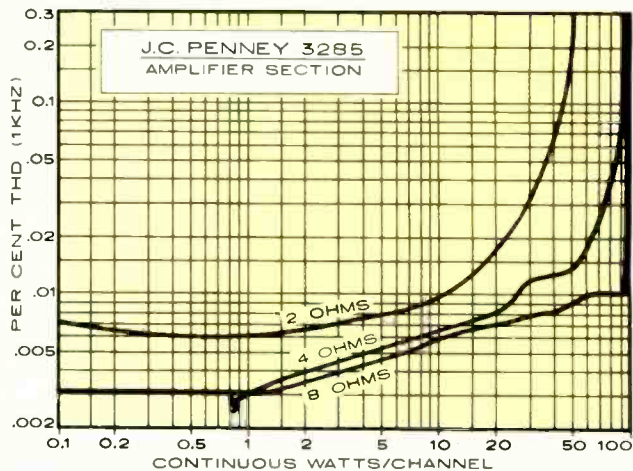
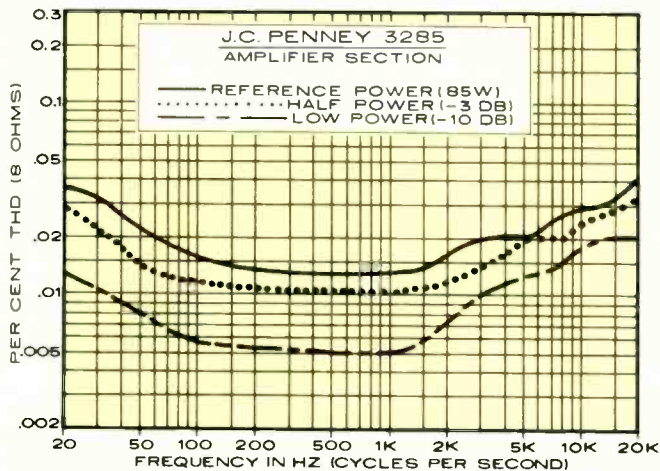
Another group of similar small buttons controls the various memory functions of the receiver. The tuning-processor buttons are used to enter a frequency into memory, to select memory banks Nos. 1-8 or 9-16, and to activate either the AUTO SCAN or PRESET SCAN mode. The latter mode causes the receiver to step through all the preset channels, playing each for 5 seconds and moving on unless the corresponding preset button is pressed. There is also an ACOUSTIC MEMORY system in the Model 3285 that stores the settings of the filters and tone controls for subsequent recall at the touch of a button. There are two ACOUSTIC MEMORY buttons, designated A and B, permitting instant recall of either of two sets of tone-control/filter settings. A DEFEAT button disengages

the filters and returns the tone controls to their flat settings.

Completing the front-panel controls are pushplates (like the tuning and input selectors) for the bass and treble tone controls, the balance control, and volume. Pressing one end of any of these controls causes its corresponding function to change up or down in small discrete steps similar to the detented steps of a typical knob-operated control.

The right quarter of the panel is devoted to the displays, which (together with the LED's associated with the various controls) give a clear, unambiguous indication of the receiver's operating status. At the top is a frequency readout using blue-white fluorescent numerals about 3/8 inch high. Five red lights show signal strength, and below them are an indicator for stereo FM broadcasts and one marked QUARTZ LOCKED, which shows that a station has been acquired and is tuned correctly.

In the center of the display group is the power-output readout, calibrated for each channel over a range of 0.02 to 150 watts into 8 ohms. The power-scale button multiplies these calibrations by 0.1 for increased display resolution at lower listening levels. At the bottom are the volume and tone readouts. The volume setting is shown both as a two-digit value of attenuation, reading in decibels from 0 (maximum volume) to 79 (the minimum audible volume setting), and



as an illuminated bar graph. There is also a "volume-off" position in which the readout shows two half-size zeros.

The tone- and balance-control settings are shown as illuminated vertical (tone-control) and horizontal (balance) bar graphs, each centered on a "flat" or "balanced" point. Each touch of one of these controls adds one more bar to its display; holding the pushplate in causes the function to increase or decrease in steps to its limit.

Except for the silver control panel, the exterior of the receiver is finished in very dark gray. The only front-panel feature other than the controls and indicators is a stereo headphone jack. The rear apron contains the usual input and output jacks, binding posts for connecting two pairs of speakers, and binding posts for FM and AM antennas (there is a hinged and pivoted AM ferrite-rod antenna). One of the two a.c. convenience outlets is switched.

The J.C. Penney Model 3285 is 19 inches wide, 15 inches deep, and 5<sup>3</sup>/<sub>4</sub> inches high, and it weighs about 30 pounds. Price: \$599.95. It is available at J.C. Penney stores nationwide.

● **Laboratory Measurements.** The Model 3285 is a rather large and heavy receiver, and its effective convection cooling—with air entering through the bottom grille, passing over the heat-sink fins, and exiting through the top-plate grille—kept the exte-

rior at comfortable temperatures during our tests. Driving 8-ohm loads at 1,000 Hz, the amplifier outputs clipped at 100 watts per channel for a clipping headroom of 0.71 dB. The output into 4 ohms was almost the same, 98 watts per channel, and into 2-ohm loads the power output at clipping was 50 watts per channel. The short-term (dynamic) power output was 125 watts into 8 ohms, 116 watts into 4 ohms, and 58 watts into 2 ohms, for an 8-ohm dynamic headroom of 1.67 dB.

At 1,000 Hz (8 ohms) the distortion was 0.003 per cent from 0.1 to 1 watt output, rising gently to 0.008 per cent at 40 watts and 0.011 per cent at 100 watts. The 4-ohm distortion was only slightly higher, from 0.003 per cent at 1 watt to 0.008 per cent at 20 watts and 0.05 per cent at 85 watts. Even 2-ohm operation did not increase the distortion significantly; it ranged from 0.007 per cent at 0.1 watt to 0.018 per cent at 20 watts and 0.071 per cent at 40 watts.

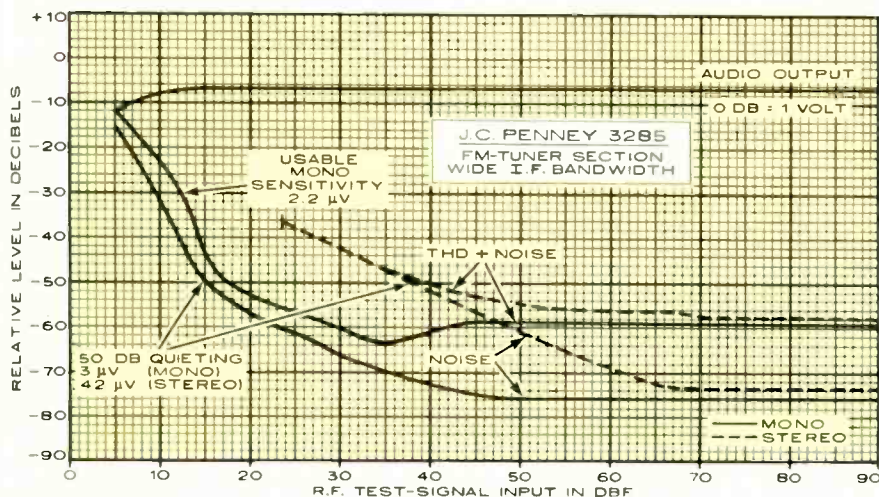
The 8-ohm distortion at the rated 85 watts output was less than 0.02 per cent over most of the midrange (from 50 to 5,000 Hz), reaching 0.036 per cent at 20 Hz and 0.04 per cent at 20,000 Hz. The distortion curves at half and one-tenth power were similar in shape but with lower values. At about 8 watts (-10 dB) output, for example, the distortion was between 0.005 and 0.02 per cent over the entire audio range.

The sensitivity of the amplifier for a 1-watt reference output was 16.5 millivolts (mV) for aux and 0.23 mV for phono (MM). The signal-to-noise ratio (S/N) was the same for both inputs, a very good 83 dB (A-weighted). The MC sensitivity was about ten times higher than the MM sensitivity. The phono (MM) overload input was between 131 and 157 mV over the 20- to 20,000-Hz range. The MM input termination was 47,000 ohms, shunted by a capacitance of 100 picofarads.

At input frequencies of 18,000 and 19,000 Hz the IHF IM (intermodulation) distortion was very low, with a second-order component at 1,000 Hz that was 95 dB below 85 watts. The third-order components at 17,000 and 20,000 Hz were each 90 dB below the rated power. The amplifier's slew factor was greater than 25 (our measurement limit), and it was stable with various reactive loads. When we tried to drive a high-level 10,000-Hz square wave into a low-impedance reactive load, the internal protective relay always shut down the amplifier before any damage could occur. Operation was restored automatically when the signal was reduced or removed.

The tone controls had reasonable characteristics, although the midrange level was shifted by several decibels when both controls were set to their extremes (about ±12 dB for the bass and ±10 dB for the treble). The frequency response was extremely flat (less than 0.2 dB overall variation from 20 to 20,000 Hz) when the tone controls were set to their middle positions. The subsonic filter reduced the response by about 2.5 dB at 20 Hz. The high filter cut the response by 3 dB at 4,500 Hz, with a 6-dB-per-octave slope at higher frequencies. The phono equalization was nearly perfect, within 0.1 dB of the ideal RIAA response from 20 to 10,000 Hz and down only 0.5 dB at 20,000 Hz. It was completely unaffected by cartridge inductance.

Since many FM-tuner performance parameters are affected by i.f. bandwidth, we measured the FM section using both wide and narrow bandwidth settings. The mono usable sensitivity was 12 dBf (2.2 microvolts, or μV) in wide and 11 dB (2 μV) in narrow. In the wide-band mode the stereo threshold was 23.3 dBf (8 μV), but in the narrow-band mode it was only 12.4 dBf (2.3 μV). The more important 50-dB quieting





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sensitivity was almost the same for both conditions: wide-band, 15 dBf (3  $\mu$ V) for mono and 37.7 dBf (42  $\mu$ V) for stereo; narrow-band, 13.8 dBf (2.7  $\mu$ V) for mono and 36.6 dBf (37  $\mu$ V) for stereo.

At an input level of 65 dBf (1,000  $\mu$ V), the tuner distortion was 0.11 per cent for mono and 0.15 per cent for stereo with the wide i.f. bandwidth, and with the narrow bandwidth the distortion readings were 0.135 and 0.2 per cent, respectively. The noise level in the tuner output was not affected significantly by the i.f. bandwidth, measuring -76 dB for mono in either the wide or narrow mode. In stereo the noise was either -72.5 dB (wide) or -70 dB (narrow). When we measured the IHF IM distortion of the tuner, which was typical of most good tuners we have measured in this way (using modulating frequencies of 14,000 and 15,000 Hz), the distortion components in the narrow-band mode were typically about 4 to 5 dB higher than in the wide-band mode (though they were negligible in either case).

The stereo FM frequency response was flat within  $\pm 0.5$  dB from 30 to 10,000 Hz, rising to +1.5 dB at 15,000 Hz (despite this high-frequency rise, the 19-kHz pilot carrier was suppressed to a safely low -65 dB). The stereo channel separation was unusually uniform, measuring between 38 and 41 dB over the full 30- to 15,000-Hz range in the wide-band mode and between 30 and

33 dB over that same range in the narrow-band mode.

As expected, the capture ratio was affected by the i.f. bandwidth. In wide-band it was a very good 1 dB at 45 dBf (100  $\mu$ V), and it was 2 dB with the narrow bandwidth. The respective AM-rejection measurements were 55 and 60 dB. Naturally, selectivity was very much a function of bandwidth, with alternate-channel measurements of 77 dB and 49 dB for narrow- and wide-band conditions, respectively. Adjacent-channel readings were 7 and 4.3 dB, respectively. The FM image rejection was 76 dB. The muting and stereo-threshold signal levels were approximately the same. The FM-tuner hum level was -63.5 dB (predominantly at 60 Hz). The AM-tuner frequency response was down 6 dB (from the relatively flat midrange level) at 26 and 2,350 Hz.

● *Comment.* Clearly, the J.C. Penney Model 3285 is a lot of receiver, with almost every control or operating feature one could desire (loudness compensation was just about the only noticeable omission, and most people would hardly miss it, especially with the memory tone controls). More to the point, everything on the receiver worked just as it was meant to. We experienced absolutely no bugs or quirks in either its measurement or its operation. Although we usually make no mention of the fact, since it is a function of our test setup and has no

bearing on a product's suitability for home system use, most receivers and amplifiers exhibit some degree of instability under certain test conditions where we require simultaneous access to the input and output circuits. This can greatly complicate the measurement process. It was gratifying to find no trace of this effect during our testing of the Model 3285.

The performance measurement figures speak for themselves—this is a first-rate receiver. It is distinguished from its peers largely by its knobless control design. We have seen this tried before, usually with some sacrifice of either performance or convenience, but this receiver was every bit as easy to use as any with conventional controls. And the excellent circuit-status display gives an accurate visual depiction of the actual settings of the controls.

Over the past several years we have tested several J.C. Penney receivers, and it is interesting that all of them have been very competent performers, hardly what we would expect from a mass-market retailer that does not specifically court audio enthusiasts. We have also noted a growing sophistication in the design of each new generation of Penney receivers. The Model 3285 takes another sizable step in the same direction, and it is quite attractively priced as well.

—Julian D. Hirsch

Circle 141 on reader service card



Akai GX-R6 Cassette Deck

**A**KAI'S GX-R6 cassette deck is a two-head dual-capstan model with bidirectional (auto-reverse) recording and playback capabilities, both Dolby-B and Dolby-C noise reduction, a variety of rapid-scan program-locating functions, and an electronically regulated record-level control. While there are a number of ways to play or record both sides of a cassette, Akai has chosen to use a rotating head mechanism in the GX-R6.

The more common approach in designing an auto-reverse deck is to use four-channel heads that are wired so that the deck's electronics are switched appropriately between the two pairs of head elements. But with such designs any electrical differences between the two sets of head channels can introduce small performance variations between the two tape-travel directions.

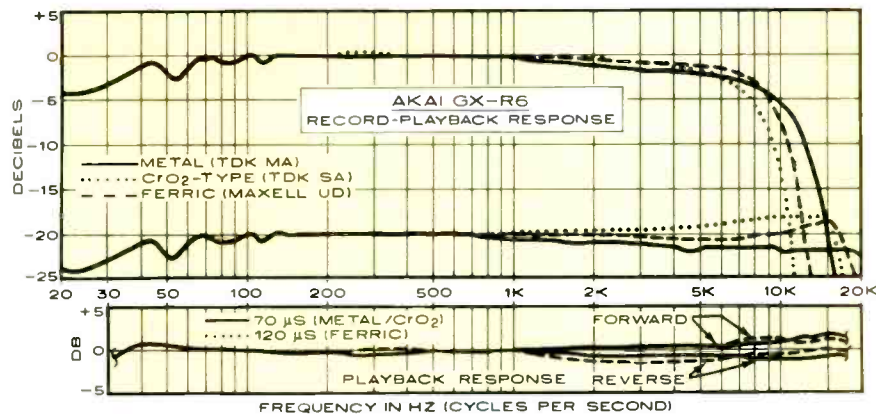
In contrast, the GX-R6 has one set of two-channel record/playback and erase heads mounted on the end of a vertical drum that can be rotated by a d.c. motor. A small ceramic block mounted on the rim of the drum limits the heads' travel to a 180-degree arc by stopping against an azimuth-adjustment screw (one for each direction); the block is held there under pressure until the tape direction is reversed.

Despite the evident precision of Akai's rotation mechanism, we had misgivings that proper azimuth alignment could be maintained over time by any system that involved any head movement. These doubts subsided, however, when our tests showed no change in azimuth alignment after automatically cycling the mechanism some two thousand times. The "Twin-Field Super

GX" record/playback head itself is made of crystal ferrite and actually contains separate gaps for recording and playback, though these cannot be used simultaneously as in a three-head deck.

The GX-R6 uses conventional cassette-well tape loading, and the wide window in the door and the interior illumination of the well allow inspection of the cassette label and tape packs. The door is removable for head cleaning and demagnetizing. As is increasingly common today, tape type (ferric, high-bias, or metal) is detected by cutouts in the back of the cassette shell; the settings cannot be manually overridden.

A single electronically governed d.c. motor drives both the capstans and the reel hubs. The transport mechanism is solenoid operated by flat pushplates, and the tape



The upper curves indicate overall record-playback response at the manufacturer's indicated 0-dB recording level using the tapes designated on the graph. In the center are the same measurements recorded at -20 dB relative to the upper curves, a level conventionally used for tape-deck frequency-response measurements. Bottom curves show playback response from calibrated test tapes and indicate performances with prerecorded tapes.

counter has a four-digit fluorescent display. A second fluorescent display, with twelve elements per channel, is used as a peak-reading record and playback level indicator. It is calibrated from -20 to +8 dB; the Dolby marking is at +3 dB, which puts the 0-dB indication at a rather conservative level for today's tapes.

Akai's electronic recording-level control uses a large flat rocker switch to raise or lower the recording level in fixed, 2-dB increments (3- to 5-dB increments for the lowest four settings). A third fluorescent display, with eight segments, shows the relative setting of the control. A memory back-up mechanism retains the last adjusted recording level after the deck's power is turned off, and the entirely electronic system is said to be highly reliable and free from wear and aging problems.

Additional front-panel controls include pushbuttons to select the Dolby noise-reduction system, for a multiplex FM filter, for one-way, two-way, or continuous-loop operation, for auto muting (inserting a 4-second pause between selections), and for the various automatic program-locating modes. These modes include BLANK SEARCH, INTRO SCAN, program locate and play (IPLS), and a handy RECORD CANCEL feature that returns you to where you began recording and leaves the deck in record-pause mode. A timer switch with the usual features and a playback-level slide control (which also affects headphone volume) are included. The jacks for headphones and two microphone connections are concealed behind a door on the front panel.

The rear panel contains the standard input/output connectors and a jack for either a wired or wireless remote-control accessory. Overall, the Akai GX-R6 measures 17 7/8 inches wide, 11 inches deep, and 4 1/8 inches high, and it weighs a little over 10 pounds. Price: \$399.95. The infrared remote-control system shown costs \$115. Akai America, Ltd., Dept. SR, 800 West Artesia Boulevard, Compton, Calif. 90024.

● **Laboratory Measurements.** As the accompanying graph indicates, the playback frequency response of the GX-R6 was very

flat for both 120-microsecond (ferric) and 70-microsecond (CrO<sub>2</sub> and metal) equalizations, showing only a slight high-end rise in the forward direction and a very slight treble loss in reverse. The overall difference between the two directions was only about 2 dB, which we did not find audible with program material.

Our sample was factory adjusted for use with Maxell UD, TDK SA, and TDK MA tapes, and we used these for our measurements, though most other premium-quality tapes would have given about the same performance. Because the same heads and electronics are used, in the 0- and -20-dB overall record-playback response graphs the tracings for the forward and reverse directions proved to be identical. Our sample of the deck was apparently somewhat over-biased for metal tape, leading to less-extended high-frequency performance than should be obtainable. At the -20-dB level both Maxell UD and TDK SA showed a slight (2-dB) rise in high-end response (though this was not audible), and the -3-dB points for UD and SA were at 18.2 and

17 kHz, respectively. For TDK MA this point was above the 20-kHz limit of our chart recorder.

With an indicated 0-dB input at 315 Hz, third-harmonic distortion was only 0.3 per cent for Maxell UD and TDK SA, 0.5 per cent for TDK MA. These are unusually low distortion levels for a nominally maximum input level and are mainly a result of the deck's conservative 0-dB indication, 3 dB below Dolby level. Referred to Akai's 0-dB indication, the 3 per cent distortion point was +7.7, +8.6, and +8.2 dB for UD, SA, and MA, respectively; the latter two figures are higher than the maximum value displayable on the deck's record-level indicator. Referred instead to the IEC 0-dB level (250 nWb/m), the overload margins were 3.8 dB less, as they theoretically should be. The unweighted signal-to-noise ratio (S/N) without Dolby noise reduction measured 54.2 dB (Maxell UD), 57.4 dB (TDK SA), and 57.3 dB (TDK MA). (Again, since the figures for the two tape directions measured within 0.2 to 0.3 dB of each other, the values presented here are averages.) The respective S/N's with Dolby-B and IEC A-weighting were 68.6, 70.7, and 71.3 dB. With Dolby-C the IEC A-weighted readings improved to 74.8 dB (UD), 77.7 dB (SA), and 78 dB (MA).

Wow-and-flutter measured 0.046 per cent wrms in the forward direction, 0.054 per cent in reverse. The figures were 0.084 per cent (forward) and 0.092 (reverse) using the more stringent DIN peak-weighted scale. At -20 dB the maximum Dolby tracking error was 2 dB with Dolby-B and 3 dB with Dolby-C; there was much less mistacking at -30 dB. We measured speed accuracy on two samples of the GX-R6. One unit was within 0.2 per cent of the nominal 1 7/8 ips, and the second was fast by 1.4 per cent. Input sensitivity for a 0-dB indication was 77 millivolts (mV) for the line inputs and 2.4 mV at the microphone jacks. The microphone overload point was 0.33 volt.

● **Comment.** The Akai GX-R6 has much to recommend it. It reverses very rapidly (in



about 1 second), whether manually or automatically at the end of a tape (a semi-clear leader is required since the detector is photoelectric). The use of the same head elements ensures near-identical performance in both tape directions. We found the sound of prerecorded tapes to be good, especially for the price of the GX-R6. The bass was not quite as solid nor the treble as transparently clear as with our reference machine, but our reference deck costs about three times as much as the GX-R6.

Record-playback sound quality was also very creditable. Because the GX-R6 be-

comes like a two-head deck, despite its separate record- and playback-head gaps, direct A/B comparisons between input and output are almost impossible to make. Nevertheless, we would judge its ability to dub musical material without undue degradation to be essentially equivalent to that of other decks in its price class.

The incrementally variable record-level control sometimes cannot be set to the precise recording level one wants. Moreover, in our test sample at least, each change of level during a recording is audible as such and is accompanied by a slight click that is itself

occasionally audible on the finished tape. There is also no way to correct for a channel imbalance in the program source. Apart from this control, however, we found the GX-R6 very easy to use.

In sum, for those who need a moderately priced cassette deck that performs well, is easy to use, and has many convenient automatic-search features as well as a very quick auto-reverse mechanism, the Akai GX-R6 is an excellent choice.

—Craig Stark

Circle 142 on reader service card



## Sennheiser MS 100 Headphones

**A**LTHOUGH Sennheiser calls the new MS 100 stereo headphones an "Inside-Out" model, this does not imply any unique physical construction. Rather, it emphasizes the dual-purpose design of these phones, which are equally suited for use with a home music system ("inside") or with a personal portable cassette player or radio ("outside").

The MS 100 (the "miniStar" marking on the headband gives a clue to the origin of *that* nomenclature) employs the Open-Aire technology that has long been a feature of Sennheiser phones. Each earpiece is vented to the outside on its rear surface in addition to the direct inward coupling to the ear. The earpieces rest very lightly on the ears with acoustically transparent yellow foam cushions. The cushions are removable, and a spare, less flashy gray pair is included with each set of phones. A lightweight, adjustable metal-spring headband connects the two earpieces and rests lightly on the wearer's head. The MS 100 weighs a mere 1.4 ounces, and its integral lightweight parallel-conductor 4-foot cable is fitted with a standard stereo miniphone plug that fits any personal portable unit.

For "inside" use the MS 100 comes with a 6-foot extension cable. A stereo miniphone jack at one end accepts the phones' fitted plug, and the other end is terminated in a full-size 1/4-inch phone plug compatible with most home amplifiers, receivers, CD players, and cassette decks.

The manufacturer's ratings of the Sennheiser MS 100 list its frequency response as 20 to 20,000 Hz (no tolerance given), impedance as 42 ohms, sensitivity as 96 dB nominal sound-pressure level (SPL) at 1,000 Hz (no drive level given), and distortion as 1 per cent (measurement conditions not stated). Price: \$85. Sennheiser Electronic Corp., Dept. SR, 10 West 37th Street, New York, N.Y. 10018.

● **Laboratory Measurements.** The Sennheiser MS 100 phones were tested on a standard headphone coupler. A drive level of 1 volt and a sweeping sine wave with a one-tenth-octave "warble" were used for the frequency-response measurement. The resulting frequency-response curve was impressively flat and smooth (for a headphone). The midrange response (at a very

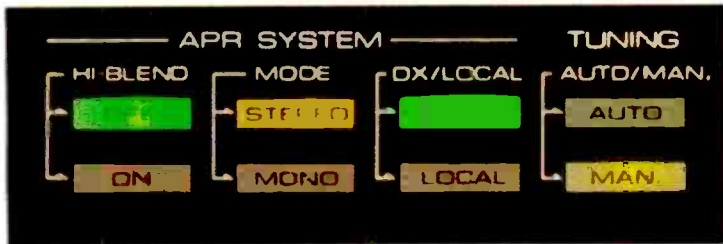
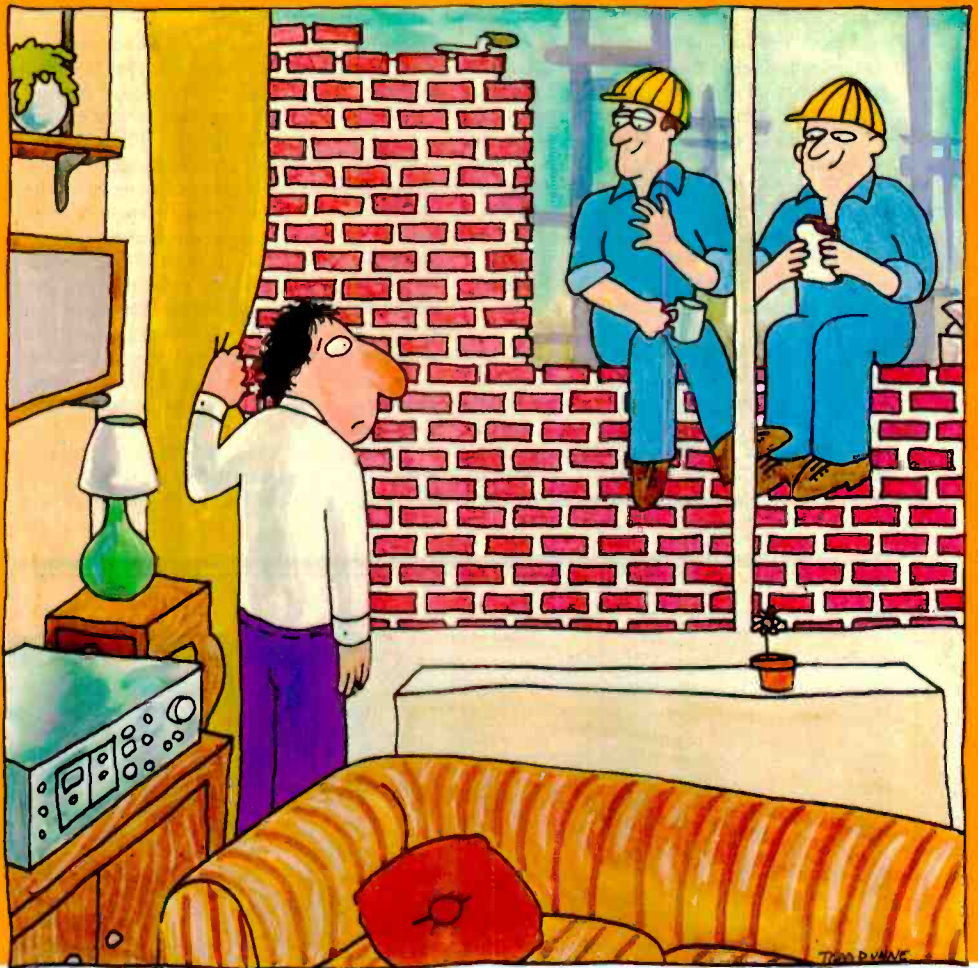
loud 110 dB SPL) was almost perfectly flat from about 500 to 1,200 Hz. The output rose gently to about +4 dB at 150 Hz and fell off at 9 dB per octave below 100 Hz, reaching -18 dB (referred to the midrange output) at 20 Hz.

There was a 7-dB peak centered at 2,600 Hz, with minor response irregularities between 3,000 and 12,000 Hz, above which the output dropped off rapidly. The overall variation of only 7.5 dB from 85 to 12,000 Hz represents excellent uniformity for a headphone (peak-to-peak variations of 20 dB or more are common in high-frequency coupler measurements).

The impedance of each earpiece was 40 ohms over most of the audio range, with peaks of 50 ohms at 130 Hz and 52 ohms at 20,000 Hz. The harmonic distortion of the headphone output was measured at 100 and 1,000 Hz with input levels between 0.1 and 3 volts (corresponding to midrange sound-pressure levels from 90 to 120 dB). At 1,000 Hz the distortion was lost in the measurement system's noise levels for outputs below 100 dB. It was 0.16 per cent at 100 dB and rose smoothly to 0.26 per cent at 120 dB. As

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expected, the low-frequency (100-Hz) distortion was higher because of the intrinsic nonlinearity of the greater diaphragm excursions. It varied from 1.6 per cent at 90 dB to 17.8 per cent at 120 dB.

We also measured the headphone response with the impulse driving signal of our IQS FFT analyzer, largely to confirm the sweeping-sine-wave response measurements. The results were essentially similar, with the peak at 2,600 Hz being the most prominent departure from flatness.

● **Comment.** We have been favorably impressed by the sound quality of several supra-aural lightweight headphones we have used, and the Sennheiser MS 100 is unquestionably one of the finest of those we have tested. Its quality was apparent from first hearing and was further confirmed by our

measurements. The overall smoothness of its acoustic response surpasses that of many full-size circumaural headphones, a few expensive electret or electrostatic models being the principal exceptions. The acknowledged limitations of any supra-aural phone in the bass region apply, of course, to the MS 100, but it is interesting to note that its sound gives no sense of thinness or lack of bass. No doubt this is due in part to its observed attenuation of the extreme high frequencies, since a balanced frequency response is always more pleasing than one that extends far into either the low-frequency or high-frequency range without a corresponding extension at the other end of the spectrum.

The sound of the MS 100 has virtually none of the unpleasant colorations that afflict many phones. The 2,600-Hz emphasis

was not audible as a balance coloration, although it may have contributed to the feeling of immediacy and contact with the sound source that one experiences with these phones. We found them completely acceptable for use with a home music system, and their sensitivity leaves no doubt that they will deliver equally satisfying results with a portable tape player or receiver. The high sensitivity of the MS 100 implies an ability to develop very high listening levels from even the low-power output of a typical portable player. We would caution, however, against indiscriminately playing these phones at their maximum levels. Prolonged listening at the highest levels these phones can develop could be dangerous to your hearing.

—Julian D. Hirsch

Circle 143 on reader service card



Infinity RS6 Speaker System

**M**UCH of the advanced technology employed in the \$35,000 Infinity Reference Standard speaker system has now been applied to the more affordable speakers in Infinity's Reference Standard series, of which the RS6 is the least expensive floor-standing model. The RS6 is a compact three-way speaker that measures 22 inches high, 13½ inches wide, and 10 inches deep and weighs about 28 pounds. The vertical front edges of the cabinet, veneered in oak, are curved to reduce diffraction effects that can modify a speaker's polar response.

The drivers of the Infinity RS6 are all somewhat unconventional. The 8-inch woofer, operating in a sealed enclosure, has a cone of clear polypropylene, said to be superior to paper in its high stiffness, low mass, and resistance to temperature and humidity changes. At 600 Hz there is a crossover to a "Polydome" midrange driver, a 2-inch-diameter polypropylene dome driven at its outer circumference by a voice coil of the same diameter. This driver is said to derive the same benefits as the woofer does from its polypropylene construction. A per-

forated metal grille just behind the transparent dome protects it from damage caused by external physical pressure without affecting its forward radiation. The second crossover, at 4,000 Hz, is to an electromagnetic induction tweeter, or EMIT, which employs a planar plastic diaphragm, with extremely low mass, on which a rectangular pattern of conductors is deposited. The diaphragm is mounted in a powerful magnetic field generated by samarium cobalt magnets. It radiates sound through four vertical slits in a metal plate.

The three drivers of the Infinity RS6 are mounted in a vertical line. A black cloth grille, retained by plastic snaps, covers the front of the speaker. Although the RS6 is meant to be operated vertically, it can also be mounted horizontally on a shelf. In this position, the tweeter can be rotated (after removing the four mounting screws with a screwdriver) by 90 degrees to preserve its wide horizontal dispersion. For floor mounting, it is suggested that the speakers be raised slightly from the floor and tilted back so that the tweeters point toward the listener's ear level. Infinity manufactures an optional 8½-inch-high wooden pedestal base for that purpose. Twin binding-post connectors, spaced ¾ inch apart, are recessed into the rear of the cabinet, together with a fuse holder and small knobs for the continuously variable tweeter and midrange level adjustments. The RS6, which is recommended for use with amplifiers rated between 35 and 100 watts per channel, has a rated nominal impedance of 4 to 8 ohms and a rated frequency response of 45 Hz to 32 kHz,  $\pm 3$  dB. The price of the Infinity RS6 is \$259. Infinity Systems, Inc., Dept. SR, 7930 Deering Avenue, Canoga Park, Calif. 91304.

● **Laboratory Measurements.** We used the Infinity RS6 speakers on their pedestals for both testing and listening. The speakers were positioned about 2 feet from the wall behind them, and the midrange and tweeter level controls were set to maximum. The averaged room response curve was, for the most part, very flat and smooth. It did, however, show a 6-dB midrange dip, between 500 and 1,000 Hz. This measurement was made with the microphone near the rear of the room, some 12 feet from the speakers, and very similar effects were noted on both speakers (in a normal stereo configuration, but measured singly).

The FFT (quasi-anechoic) frequency response, measured 1 meter from the front of the speaker, showed a midrange drop of about the same magnitude, but at 1,500 Hz. It also yielded the widest, flattest frequency response we have yet measured from a speaker, varying about  $\pm 4$  dB from 180 Hz (the lowest frequency of this particular measurement) to 27,000 Hz. From 12,000 to 25,000 Hz, the output varied only  $\pm 1$  dB (2 dB overall)! Even at 45 degrees off the speaker's axis, the response did not change significantly below 15,000 Hz (except for a single narrow dip in the 5,000- to 6,000-Hz region).

The closed-miked woofer response reached a maximum at 100 Hz, about 4 dB higher than the plateau from 250 to 450 Hz, and dropped off rapidly above 500 Hz, presumably due to the crossover network. The low-frequency response fell at 12 dB per octave below 70 Hz. When we spliced this curve to the middle- and high-frequency room response curve, the combination showed the midrange dip mentioned earlier. Close-miked FFT measurements of the midrange driver response showed a drop below 1,000 Hz, suggesting that the dip might be a real one caused by a crossover gap. We could not hear the gap as such, and its importance on our response plots was exaggerated by the extraordinary smoothness of the

speaker's response over the rest of its operating frequency range. Because of the limitations inherent in combining a room response measurement with an essentially anechoic measurement, the composite frequency response was not as flat as would have been expected from our FFT measurements. Even so, its  $\pm 6.5$ -dB variation from 30 to 20,000 Hz is certainly creditable performance for any speaker.

The midrange level control affected the output between 1,000 and 3,000 Hz, with a maximum reduction of about 6 dB. The tweeter control range was about 7 dB, starting at about 6,000 or 7,000 Hz. The flattest response (and best sound, to our ears) was obtained with both controls at maximum. The speaker's phase-shift characteristics were excellent, with a group-delay variation of less than 0.2 millisecond from 1,000 to 20,000 Hz.

The sensitivity of the Infinity RS6 was about average for a compact system operating in a sealed enclosure. Its acoustic output in the midrange was 87.5 dB at a 1-meter distance with an input of 2.83 volts. The woofer distortion was measured with a constant input of 3.76 volts, corresponding to a midrange output of 90 dB. It measured between 1.5 and 2.5 per cent from 100 to 48 Hz, increasing to 7.5 per cent at 40 Hz and 20 per cent at 30 Hz. The system impedance dipped to 4 ohms between 100 and 150 Hz, and it reached its minimum of 3 ohms at 2,200 Hz, with peaks of 20 ohms at 50 Hz and 30 ohms at 750 Hz. We would consider this to be a 4-ohm system from the standpoint of amplifier loading.

● **Comment.** The Infinity RS6 sounded every bit as good as it measured, with a smoothness, transparency, and overall clarity that seemed almost inconsistent with its modest price. The midrange "hole" was never audible to us. However, the smooth, widely dispersed output of its tweeter was audible: there was an overall sense of air and space surrounding the music that was clearly discernible in A-B comparisons against other very fine speakers whose tweeters lacked the dispersion and extremely wide-range response of the EMIT radiator. It was interesting to observe the improved high-frequency clarity, probably attributable to the extended high-frequency response of the tweeter, in A-B comparisons with some other loudspeakers whose highs were flat to 15,000 Hz but fell off at higher frequencies.

In its literature, Infinity makes a point of the spatial qualities of the Reference Standard speakers. We must agree that, for whatever reason (probably a combination of several factors), the RS6 produced a strikingly open sound stage in our listening room. We listened to a number of digital Compact Discs with these speakers, and the combination was a happy one.

The Infinity RS6 represents, in our view, an exceptional combination of tasteful styling and superior performance at a bargain price. There are many good speakers in its price class, but in sound quality this one seems to be a pace setter.

—Julian D. Hirsch

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# Car Stereo

By Christopher Greenleaf and Julian D. Hirsch



PIONEER KE-7200

**P**IONEER'S KE-7200 is an in-dash digital-synthesis AM/FM receiver with an auto-reverse cassette player and a digital clock. Its integral power amplifier can handle one pair of 4-ohm speakers. There are no line-level outputs for an external power amplifier, but a booster amplifier can be used if desired.

The tuner has two groups of FM presets and one of AM presets, each with five memories. A ring concentric with the tuning knob is used to select the band, which is indicated by an LED display. Rocking the tuning knob to the right or left changes the AM frequency up or down in 10-kHz steps and the FM frequency in 0.2-MHz steps. Pushing the knob in causes the tuner to begin scanning, with each receivable station being heard for 5 seconds before the tuner moves on to the next. Scanning stops when the knob is pressed again or rocked right or left for manual tuning or if a station-preset button is pressed.

The KE-7200 has a local-station scan function (LOC.S) that limits scanning to stations with strong, clear signals. In our road tests in the New York area, pressing the LOC.S button more or less halved the number of FM stations scanned, and there were about a third as many AM stations. (Tuner sensitivity was not affected.) A MONO button selects either mono or automatic stereo/mono-blend FM reception. In the automatic mode, a strong-signal stereo broadcast will be played with full channel separation and a stereo-display LED (marked ST) will light up on the readout panel (which doubles as the fold-down cassette-well door), but weaker signals will cause the separation to be gradually decreased until mono is reached under poor reception conditions. (The MONO button does not affect tape playback.) The tuner is turned on or off by pushing the volume knob.

As with most car stereo units, the KE-7200's cassette player is turned on whenever a cassette tape is inserted. Punching both fast-wind buttons at the same time ejects

the cassette and resumes tuner operation unless the tuner is switched off. There is a Music Search (MS) function that can be used in either tape direction; it quickly locates recorded selections on the tape during fast winding, stops the tape motion, and begins normal playback. Lightly tapping either fast-wind button disengages the other.

There are LED indicators in the selector buttons for Music Search, Dolby-B noise reduction (for tapes only), and 70-microsecond tape equalization. The indicators light up when the buttons are depressed, though the one for Music Search does so only when both it and a fast-wind button are depressed. Another button with its own LED indicators reverses the direction of tape motion. Reverse play also occurs automatically at the end of a cassette.

Pressing the CLOCK button causes the time to be displayed on the tuner readout. Setting the time requires using a pointed object (a pen or pencil) to hold down sepa-

rate hour and minute buttons; a brief pressure advances the readings by one digit, and sustained pressure causes rapid advancement until the button is released.

The bass and treble knobs are on the same shaft as the volume knob, which also controls balance (pull and turn) and, as already noted, tuner on/off. There is also a loudness-compensation button. The KE-7200 has a power-antenna lead; any automatic antenna hooked up to it will be raised when the tuner is switched on and lowered when the tuner goes off. The tape player's pinch-roller is automatically disengaged when the car's ignition is turned off, preventing possible damage if a cassette is left in place. Price: \$379.95.

## Lab Tests

The KE-7200's tuning section is one of Pioneer's series of automobile "Supertuners," which are said to have exceptional sensitivity and resistance to various forms of FM noise and interference. The measured performance of the KE-7200 lived up to that promise in just about every important respect. Only its capture ratio was disappointing, measuring 5.1 dB with a 65-dBf (500-microvolt, or  $\mu\text{V}$ ) input. The sensitivity, however, was indeed excellent, as were all the other tuner characteristics (see the accompanying box for our full results). It was not possible to measure the KE-7200's exact alternate-channel selectivity, since it exceeded 98 dB—a truly remarkable figure for any FM tuner, even for home use, let alone in a car. The adjacent-channel selectivity was an impressive 17 dB.

The AM frequency response, as often happens, was very narrow, with the output down 6 dB from its midrange maximum at 85 and 1,700 Hz. We found that the normal signal threshold for FM auto-scan was about 41 dBf (30  $\mu\text{V}$ ), and in the local mode it was 63 dBf (400  $\mu\text{V}$ ).

The tape player's frequency response was very good, with less difference in high-frequency response between the two tape directions than we usually find in auto-reverse players. In fact, the difference was negligible if not inaudible. Flutter was slightly higher near the end of a cassette than at the beginning, but even the worst-

## Hirsch-Houck Lab Measurements

FM mono usable sensitivity (75-ohm input): 12.8 dBf (1.2  $\mu\text{V}$ )  
Mono 50-dB quieting sensitivity (75-ohm input): 18.6 dBf (2.2  $\mu\text{V}$ )  
Stereo 50-dB quieting sensitivity (75-ohm input): 22.1 dBf (3.5  $\mu\text{V}$ )  
Tuner signal-to-noise ratio at 65 dBf: mono, 65 dB; stereo, 61 dB  
Tuner distortion at 65 dBf: mono, 0.36 per cent; stereo, 0.37 per cent  
FM frequency response: 48 to 15,000 Hz —3 dB  
Stereo separation at 100, 1,000, and 10,000 Hz: 33.5, 37.5, and 26.5 dB  
Capture ratio at 65 dBf: 5.1 dB  
AM rejection at 65 dBf: 62 dB  
Alternate-channel selectivity: 98 dB  
Adjacent-channel selectivity: 17 dB  
Image rejection: 69 dB  
AM frequency response: 85 to 1,700 Hz  
Tape-playback frequency response (standard BASF test tapes, —3-dB limits):

120- $\mu\text{s}$  EQ—50 to 16,000 Hz forward, 55 to 16,000 Hz reverse; 70- $\mu\text{s}$  EQ—50 to 14,500 Hz forward, 48 to 18,000 Hz reverse.  
Tape signal-to-noise ratio (referred to 250 nWb/m at 315 Hz): 120- $\mu\text{s}$  EQ—51.5 dB unweighted, 60 dB with Dolby-B, CCIR/ARM weighting; 70- $\mu\text{s}$  EQ—52.5 dB unweighted, 61 dB with Dolby-B, CCIR/ARM weighting  
Flutter: at start of cassette,  $\pm 0.22$  per cent CCIR weighted peak, 0.13 per cent JIS weighted; at end of cassette,  $\pm 0.25$  per cent CCIR weighted peak, 0.15 per cent JIS weighted  
Tape speed accuracy: exact at start of cassette, +0.6 per cent at end  
Fast-rewind time for C-60 cassette: 104 seconds  
Tone-control range: +9.5, —11.5 dB at 100 Hz; +10, —11 dB at 10,000 Hz  
Amplifier power output into 4 ohms at clipping (measured at 1,000 Hz): 4.52 watts per channel



case readings of 0.15 per cent wrms (JIS weighting) and  $\pm 0.25$  per cent weighted-peak (CCIR) were typical of most car stereo transports. The tape speed was exactly correct at the start of a cassette and about 0.6 per cent fast at the end.

The audio power output was 4.52 watts into 4 ohms at the clipping point (1,000 Hz). The low-frequency response and power capabilities of the radio were considerably below the middle- and high-frequency values, but the unit was still capable of delivering 2.3 watts at 20 Hz. Since all measurements were made through the FM-tuner section, the audio distortion could not be measured accurately, but the total harmonic distortion (using 25 per cent FM modulation at 1,000 Hz) was around 0.33 per cent up to more than 2 watts, 0.47 per cent at 4 watts, and only 0.65 per cent at 4.2 watts, just before clipping occurred.

Our bench tests left us with very positive feelings toward the Pioneer KE-7200. This is a nicely engineered car stereo with genuinely good performance in all important areas and a minimum of unnecessary or difficult-to-use extra features. Obviously, if you want to drive four or more speakers or be heard several blocks away, the KE-7200 is not for you unless you add a booster amplifier. But for those users (probably a majority) who consider an automotive sound system as basically a source of clear, undistorted music while driving, the KE-7200 should do the job admirably. —J.H.

### Road Tests

Hot on the heels of what I suspect is New York City's only pothole repair crew, my Volvo and I explored the terrain around the Brooklyn Navy Yard in search of new places to test the KE-7200's tape transport. It didn't take long to find some.

The tape player resisted vertical shocks well enough to play piano and organ music with little more than a slight stutter or warble. Horizontal shocks, however, such as those I encountered when I hit a pothole with one wheel or had the left and right tires riding on different types of bad surfaces, did generate slight burbles. On the other hand, the transport had no trouble handling my favorite old C-120 test tape—a length that manufacturers recommend *never* using in a car player. The deck has a mechanism to take up tape slack as soon as a cassette is loaded; it worked very well.

The loudness control was so different from the bass and treble controls in audible effect that I was able to make fairly subtle adjustments in tone quality by using them all in different combinations. I was unable to alter the upper-midrange region (an octave or so above 2,000 Hz) because the treble control affected only the high treble and the loudness contour's effect did not extend that high up. The latter control has no real treble shaping and only slightly boosts the lower midrange and mid-bass, but it does provide a substantial low-bass boost.

The amplifier generated enough power for most music at moderate volume levels, but it was unable to provide clean sound at high volume in music with a lot of bass or complex textures (such as Romantic organ works, some nineteenth-century choral music, and an energetically performed Prokofiev piano sonata). This limitation was un-

fortunate at highway speeds because the high level of road and car noise—admittedly in part the fault of my car, not the quietest vehicle one can drive—masked much of the music when I played it at volumes the amplifier could handle. In any case, with less demanding music and driving conditions, the unit produced sound that was invariably rich and well balanced.

It was pleasant for a change not to be greeted by a din from the radio whenever I changed a cassette—provided I remembered to leave the tuner switched off. But doing that is easier than remembering to turn the volume down at the end of each cassette, which you have to do with many other units. The tuner's FM performance was very good in strong reception areas. Even the FM "Bermuda Triangle" near the Empire State Building (from which most of the city's FM stations broadcast) failed to produce cross-modulation effects, in which a station turns up in several different spots on the dial. Once a station had been tuned in, I noticed no intrusions from adjacent frequencies.

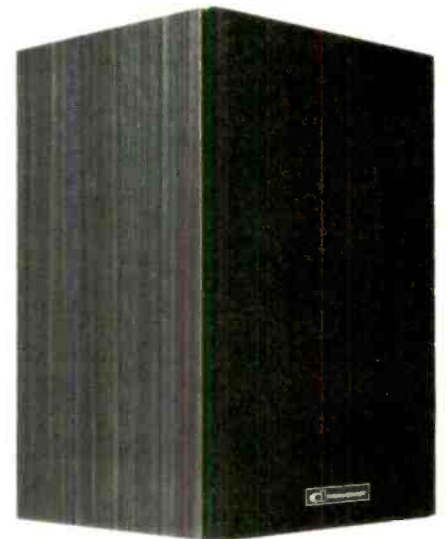
Long-distance FM reception on a trip into the Adirondack Mountains upstate was generally quite good. I was glad to have a separate MONO button, though the automatic high-blend circuit worked smoothly and effectively. In the city, however, multipath conditions made it pleasanter to listen to weaker signals in consistent mono than irregular stereo. Pioneer's Supertuner III circuitry not only pulled in more stations than I expected to be able to get, but it allowed them to be heard with minimal interference from electrical hash in the air or in my car's wiring. Even shorting a spark-plug lead against the engine block did not produce a great deal of interference.

AM reception is always noisier than FM, but the AM sound from the KE-7200 remained generally listenable, and voices emerged clearly from any noise. AM scanning was another matter. Except when I used the LOCs function to limit scanning to strong signals, about every fourth or fifth AM frequency at which the tuner stopped was a mix of different distant and unreceivable stations. Pressing the LOCs button eliminated the problem.

The KE-7200 is an attractive unit that is easy and convenient to use. The two slightly terraced rows of function and preset buttons allow unusually easy selection without much chance of punching the wrong button, and the various controls have enough resistance to pressure that it would be hard to engage one accidentally. All the LED indicators and the frequency/time display are clearly visible from any reasonable angle and bright enough to be legible in all but direct sunlight.

The faceplate is full of controls yet seems uncluttered. I missed having some form of noise reduction for tuner listening, and I would certainly want to add a booster amplifier to help in playing complex music loudly enough to be heard over highway noise. Otherwise, the Pioneer KE-7200 is a smoothly operating car stereo that is handy to use and offers exceptionally listenable FM reception even under very adverse conditions. Ten FM presets is more than I need at present, but the capabilities of this Pioneer Supertuner could easily change my listening habits! —C.G.

# The high end is now just 18" high.



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# Installation of the Month



**T**HE starting points for Stephen C. Mestler's good-looking, practical audio installation were his large collection of records and tapes, his elaborate stereo component system, and an unsightly waist-high concrete wall between his kitchen and living room. A co-pilot for Pan Am based in south Florida, Mestler combined his hobbyist's skills in furniture building and electronics to construct both the attractive cedar cabinetry for his system and much of the equipment it holds.

The installation consists of four modules mounted on top of the old dividing wall. Horizontal two-by-four's bolted to the concrete divider provide firm anchors for 6-inch-wide cedar planks that cover the wall and the spaces between the modules, running from floor to ceiling on both sides to create a fully paneled room divider as well as a home entertainment center. The vertical side panels of each module are grooved to hold the shelves securely, and each shelf is reinforced front and back with 1/4-inch threaded horizontal rods to help support the weight of the records or equip-

ment. The lower half of the leftmost module has a swing-out door with built-in cassette storage slots. Additional storage space for cassettes and accessory paraphernalia is provided inside.

Mestler's components are mostly Heath-kit models, selected because he is impressed by their quality and reliability and because he could build them himself. The electronic-component rack in the rightmost module contains a Heath AJ-1600 tuner, AP-1800 preamplifier, AD-1701 graphic output indicator, AD-1702 electronic crossover, and AA-1600 and AA-1800 power amplifiers, together with a dbx Model 224 noise-reduction system. The other equipment module contains a Sony TC-758 open-reel tape deck, a Nakamichi LX-5 cassette deck, and a Philips Model 212 turntable with an Audio-Technica AT31 moving-coil cartridge. There are rear access panels for the equipment on the back of the room divider, and there is a built-in light for the turntable. The main loudspeakers for the system are three-way Heath AS-1321's together with

separately amplified AS-1320 subwoofers. A pair of Heath AS-1383 speakers are used in another room.

Mestler's other leisure-time interests include building and flying radio-controlled model airplanes, but, he says, "Music is first." While he and his wife mostly like rock and jazz, they are "just beginning to appreciate" classical music as well.

Although Mestler's installation required considerable advance planning, he confesses that on one point his foresight was inadequate—already his record collection has outgrown the allotted space (it always does!), leaving another construction project to be undertaken in the near future.

—Craig Stark

**I**s your system an Installation of the Month? To find out whether it is, send a clear snapshot and a brief description of its components to STEREO REVIEW, Dept. IOTM, One Park Avenue, New York, N.Y. 10016.

# One Step Closer to Perfection

The Ohm Walsh 2 is the "Speaker of the Year."  
The new Ohm Walsh 4 is even better.

Over 4,000 acknowledged experts chose the Ohm Walsh 2 as "The Speaker of the Year" in Audio Video International's 1982 Hi-Fi Grand Prix Competition. How could anyone make a better speaker than one that is "among the best speakers we have ever heard, *regardless of price*" (The Complete Buyers Guide to Speaker/Hifi Equipment), or that has received more rave reviews than any new speaker in the last 10 years? That question is answered by the new Ohm Walsh 4.

## Here's What We Did

**1** We reproduced the sound quality the New York Times described as "a spacious acoustic ambience with precise stereo imaging creating a 'reach-out-and-touch-it' realism that this listener has rarely experienced . . ."

**2** We gave it the ability to play louder. The new Ohm Walsh 4 can handle 500 watts rms of music. It can reproduce a full orchestra at live levels in a normal listening room, flawlessly. It also can handle the new digital audio discs, effortlessly.

**3** We made it play deeper. The Ohm Walsh 4 can reproduce over half an octave deeper bass. At 30 Hz the 4's put out 10 times as much volume as the superb 2's. Maybe only one record out of a hundred demands this—but the 4's are ready whenever you are. They let you physically *feel* the impact of a bass drum or timpani. An unusual luxury, but it's there.

**4** We gave it more control range, so you can better match your own listening room to your musical taste. While most high-end speakers do have a high frequency control, the Ohm Walsh 2 has both a high frequency control and an

additional Sub Bass Activator control to balance bass output—something no other speaker has ever had. The new Ohm Walsh 4 goes one better. We added a truly exciting and unique control called "perspective." This allows you to change your 'seat' in the audience from up front to in the rear—matching your taste, your music, your room and your state of mind.

**5** We made the Ohm Walsh 4 even more convenient to live with. They come built with casters for easy placement or movement. Moreover, our three ambience controls are placed within easy reach on the rear. The speakers are tall enough (40") not be blocked by most chairs and sofas but small enough (only 12½" square at the top) to be inconspicuous in most rooms. They come in five finishes (all genuine wood veneer) to match your furniture.

## Here's How We Did It

We used the same unique, patented technology as in the Ohm Walsh 2. The main transducer is in the shape of a conical pyramid, inverted like an upside down ice cream cone. This driver is driven full range and by its very nature gives perfect dispersion, so you can still sit anywhere in your room and hear everything correctly. Our patented design mates this driver to a tiny super-tweeter supplementing the highest octave. They are in time and phase alignment at all listening positions. This perfect alignment is what

prompted The Washingtonian to say ". . . the Walsh 2s are among the best 'imaging' speakers at any price, which means they create the original setting in which the music was recorded—Evoking the broad expanse of an orchestra or the compact spacing of a jazz combo, for example." The inverted driver and cabinet of the Ohm Walsh 4 are much bigger, which allows it to handle more power and go deeper.

## Now You Have A Choice

Either the Ohm Walsh 2 speakers which ". . . certainly must be rated a 'best buy'" (Audio), "The fact that a pair sells for well under a thousand dollars is, in our opinion, nothing short of a sonic miracle." (The Complete Buyers Guide to Speaker/Hifi Equipment), or the more expensive new Ohm Walsh 4, with both the luxury of extended bass and the ability to be played louder. In either case, you will get the sound Popular Mechanics has said, ". . . meets the ultimate audio test: It makes you unaware of its presence. You feel there's nothing between you and the music." One step closer to perfection.

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Specifications	Ohm Walsh 2	Ohm Walsh 4
Frequency Response	45Hz to 16kHz ± 4 dB	32Hz to 17kHz ± 4dB
Size	32½" tall x 9¼" x 9¼" at top, 11½" x 11½" at bottom	40" tall x 12½" x 12½" at top, 15½" x 15½" at bottom
Weight	29 lbs.	63 lbs.
Efficiency	87dB at 1 meter with a 2.83 volt input and all controls at maximum	87dB at 1 meter with a 2.83 volt input and all controls at maximum
Finish	Genuine wood veneer, walnut and oak standard. Scandinavian rosewood and black or white lacquer on oak finishes available on special order.	Genuine wood veneer, walnut and oak standard. Scandinavian rosewood and black or white lacquer on oak finishes available on special order.
Inputs	Press connectors accepting "banana plugs" or bare wire up to 12 gauge	Press connectors accepting "banana plugs" or bare wire up to 12 gauge
Controls	2 — low and high frequency each with 3 positions	3 — low, high and perspective each with 3 positions
Power requirement on Music	30 watts minimum/120 watts maximum	50 watts minimum/500 watts maximum
Impedance	4/4 ohms	4/4 ohms
Price per Pair	\$750 — Standard finish \$950 — Special order finish	\$1500 — Standard finish \$1750 — Special order finish

# A Guide to Exotic Loudspeakers

By Ralph Hodges

**E**VERYBODY knows what loudspeakers look like, of course. The proverbial man on the street could easily pick out a loudspeaker from an assortment of such other household items as folding screens, smoke detectors, and TV antennas. Or could he?

In fact, probably not always. There are on the market today loudspeakers that look like all of the above and like other things as well. They're not, as a rule, to be found at Radio Shack or even Pacific Stereo stores. You have to go to the hushed, well-padded salons where audio is pursued with religious fervor—and where your Visa or MasterCard credit line won't be enough no matter how much your bank likes you.

As for why anyone would build a speaker that doesn't look like a speaker, there are as many explanations as there are different principles. But the real reason these devices don't look like speakers is because they're not meant to *sound* like speakers. They're meant to sound like "the real thing"—or at least what their designers think the real thing sounds like, which is, of course, a subjective matter, sometimes highly so. Nevertheless, most listeners would agree that many of these exotic speakers sound very good, either because the principle itself is intrinsically good (it's unusual to hear a really rotten-sounding electrostatic speaker, for example) or because the engineer's talents have successfully wrestled a difficult design concept into reality for the sake of some superiority it is believed to possess. So let's consider some of the varieties.

## Electrostatics

Electrostatic loudspeakers are virtually as old as high fidelity itself. In

fact, over the years they have *defined* "high fidelity" for many speaker designers, in that they have tried to make their conventional speakers sound like electrostatics. And, when you examine the idea behind them, it does indeed seem to be a pretty good way to design a speaker.

Take a very thin sheet of some lightweight conductive material (coated Mylar film is used as often as not), mount it like a painting in an insulating frame, and sandwich the frame between two conductive, perforated plates or wire grids to form a wafer that is quite thin in cross section but fairly broad in surface area. If appropriate d.c. polarizing voltages are applied to various elements of this wafer (usually about 1,000 volts or so to the thin conductive film and 0 volts to both grids), the flimsy sheet in the middle will snap to attention and stand stiffly between the two outer elements. If the polarizing voltages on the elements are then modulated by a high-voltage audio signal, electrostatic forces will cause the sheet to move back and forth, becoming an effectively rigid but very low-mass acoustic diaphragm that will generate sound—very clear and low-distortion sound as a rule. This is a push-pull electrostatic speaker, the aristocrat of the breed (see Figure 1).

There are several practical disadvantages to this approach. One is that the single diaphragm's dimensions are larger than most audio wavelengths, and as a result electrostatic speakers tend to be very directional in a way that is immediately apparent to listeners. To get around this effect, it was a common practice in the past to use small electrostatic elements for higher frequencies and larger ones for lower frequencies. The trend today, however, seems

to be to employ arrays of identically sized electrostatic elements and to live with the directionality, or else to aim the separate elements so that they create a spread—even an omnidirectional spread—of sound. The Quad ESL-63 takes still another approach by driving its diaphragm not as a rigid piston but as an array of concentric rings, with the drive signal delayed so that the inner rings “speak” first, the outer ones progressively later. The intent is to generate a nondirectional hemispherical wavefront. Whether it actually does so or not, the Quad ESL-63’s sonic image is like that of no other electrostatic speaker I have yet heard.

The other side of the same coin is that at *low* frequencies (long audio wavelengths) most electrostatic speakers are not really directional at all. Since the radiation from the back of the speaker is equivalent to that from the front, but out of phase with it, and the back radiation is not enclosed, there is considerable acoustic cancellation of low-frequency energy. Moreover, since the diaphragm’s excursions must be kept small, it doesn’t generate all that much bass anyway. One way around this limitation is to use a conventional woofer for the bass, which some people find satisfactory and others don’t. Another way is to make the electrostatic speaker very big. Acoustat’s Model Eight, built to show that electrostatics

can be both loud and bassy, is 8 feet high and 3 feet wide.

There are a few electrical drawbacks as well. Electrically, an electrostatic speaker is a capacitor; it responds to voltage, not current. But a voltage source is precisely what many transistor amplifiers don’t think of themselves as being. Furthermore, the polarizing voltages must be rather high (hundreds or thousands of volts). The usual arrangement is a boosting-transformer coupling between amplifier and speakers together with a separate power supply for the speakers that must also be connected to an a.c. wall outlet.

These high voltages within an electrostatic element, in turn, can break down the insulating properties of air when the speaker is driven hard, causing an unpleasant-sounding and unhealthy spark to pass between diaphragm and plates. Materials technology has helped with this problem, and designers such as those behind the Dayton Wright electrostatics have gone as far as to seal the elements in envelopes of inert gas with much better (electrical) insulation characteristics than ordinary air.

These warts notwithstanding, however, electrostatics have always had untiring appeal for serious listeners, and there has always been an electrostatic speaker on the market for those who wanted to buy one.

## Film-Diaphragm Speakers

“Film-diaphragm” speakers? This nomenclature is, as far as I know, of my own invention, so if it elicits a few blank looks from audio dealers, don’t be surprised. In any case, I use the term “film-diaphragm” to refer to a loudspeaker that resembles an electrostatic speaker acoustically but resembles a conventional dynamic device electrically. In fact, a film-diaphragm design may present a pleasanter load to the driving amplifier than a typical dynamic speaker does since, for the most part, there aren’t any of the mechanical resonances that show up in a dynamic’s electrical impedance curve.

To build a film-diaphragm speaker, take the same sort of diaphragm material used for an electrostatic, but instead of a continuous conductive coating, apply what amounts to a zig-zag voice-coil pattern (using thin wire or metal foil) to one side (see Figure 2). Then replace the electrostatic’s perforated “stator” plates with rows of permanent bar magnets. And there you have it. It looks like an electrostatic, and it usually sounds something like one, but it plugs directly into your amplifier without intervening transformer circuitry, and it *doesn’t* have to be plugged into a wall socket.

While small film-diaphragm drivers

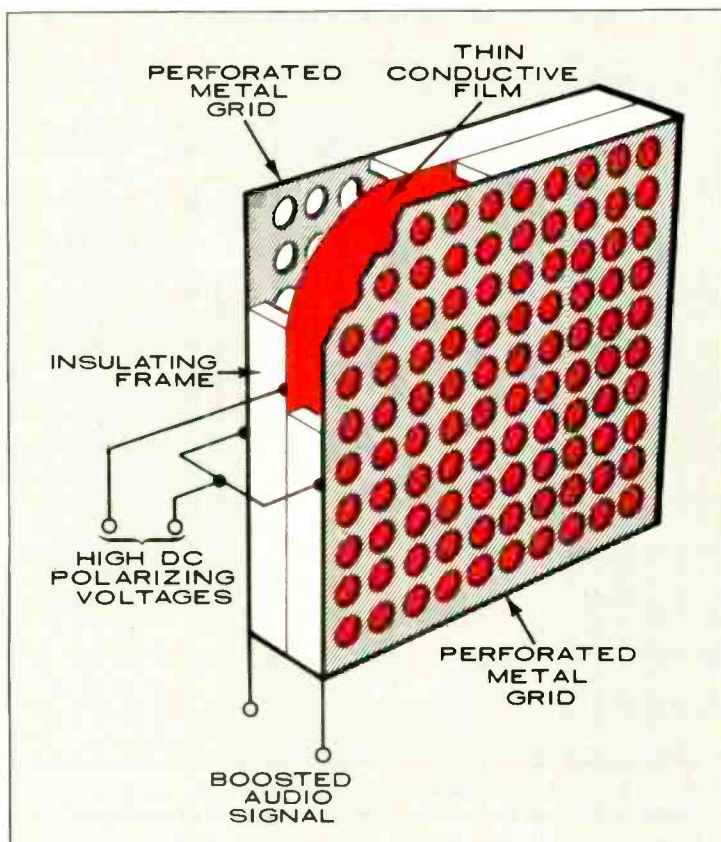
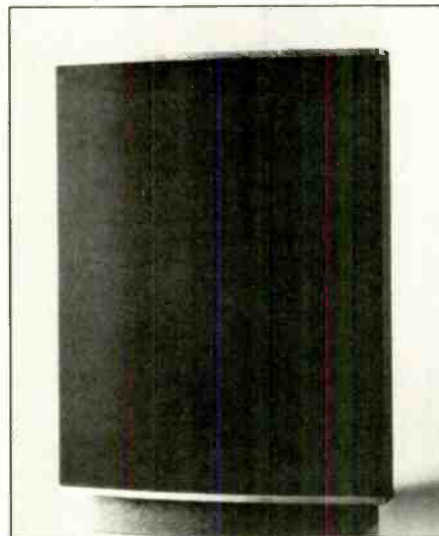


Figure 1. In a typical electrostatic speaker, the thin, conductive film that is the diaphragm receives a high direct-current polarizing voltage. An audio signal, boosted in voltage level, is applied to metal grids on either side of the film, causing electrostatic forces to push and pull the diaphragm, generating sound.



The Quad ESL-63 electrostatic speaker



are used extensively as tweeters and midranges in the Infinity line of speaker systems, for many years Magnepan has pushed the concept of full-range film-diaphragm systems. The trouble with full-range designs has principally been that the diaphragms are so large that the "voice coils" add appreciable mass, impairing performance at the highest frequencies. And, of course, they share the acoustical drawbacks of full-range electrostatics. Yet such speakers are still much beloved by many, often for good reason.

As a variant on the film-diaphragm theme, take your film, apply the "voice coil" in an up-and-down zig-zag pattern, and then fold the whole works into accordion-like pleats. If the surrounding magnetic field is appropriately oriented, an audio signal will cause the pleats at front and back to open and close alternately, generating acoustic energy not by pushing and pulling air but by exerting a sort of bellows action on it (see Figure 3). This is the principle of the so-called Heil Air-Motion Transformer (AMT), which was used extensively for higher-frequency drivers by ESS until that company went into eclipse. Now, with new financing, ESS seems likely to emerge again, and the Heil AMT with it. (AMT woofers

have also been developed, but, although they retain the bellows mode of operation, their drive principle is basically the same as that of dynamic speakers.)

## Ribbon Speakers

Another veteran of the earliest days of hi-fi, the ribbon driver is essentially a film-diaphragm speaker with the metallic-foil diaphragm itself serving as the "voice coil" (see Figure 4). Traditionally delicate, expensive, and hard to get much out of, ribbons have recently benefited a great deal from materials technology, and, whereas formerly only a ribbon tweeter was even thinkable, we may now see some full-range ribbon systems. The first seems to be a three-way all-ribbon system from Apogee Acoustics that has already impressed many audiophiles.

The earliest ribbon tweeters were small-diaphragm affairs, often horn-loaded for acoustical efficiency and transformer-coupled to the amplifier. Several companies later brought the art along significantly, but apparently the big breakthrough didn't come until 1980, when Magnepan filed a patent that resulted in a ribbon tweeter with a diaphragm only one ten-thousandth of an inch thick, less than an inch wide, and 5 feet long! Used vertically, the device becomes a line-source radiator with close-to-perfect lateral omnidirectionality. It is driven directly by the amplifier and is said to be able to toler-

ate a continuous 200-watt pink-noise signal above 4,000 Hz. More recently, using similar design techniques, VMPS demonstrated a ribbon diaphragm backed with polyester film that is said to sound good—and powerful—down to 300 Hz. The Magnepan device will first be used to take over the top end of the manufacturer's film-diaphragm systems (measurements show it to have flat response out beyond 40,000 Hz), but the company has been talking seriously about a full-range ribbon system, and it seems clear that VMPS and others are headed in the same direction. The result could be some exceptional loudspeakers that are very "amplifier-



The ESS amt II speaker with Heil tweeter

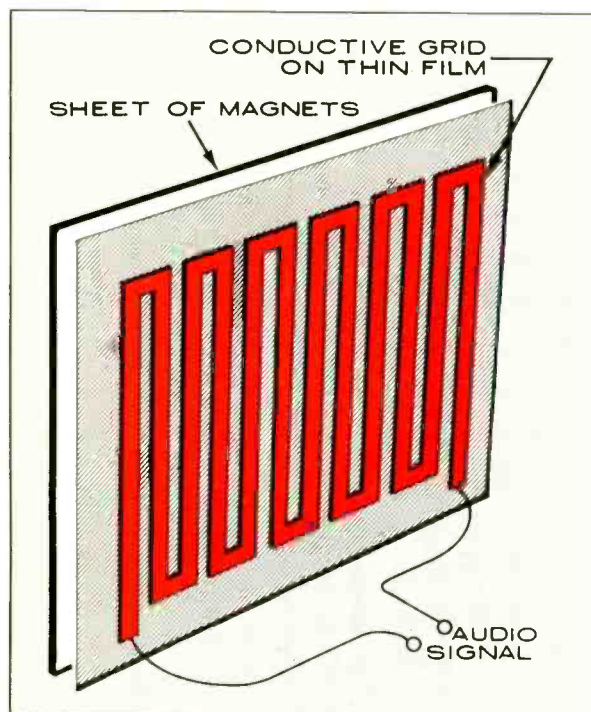


Figure 2. A film-diaphragm speaker has a voice "coil" that is spread out over the diaphragm's surface. The magnets can be on one or both sides.

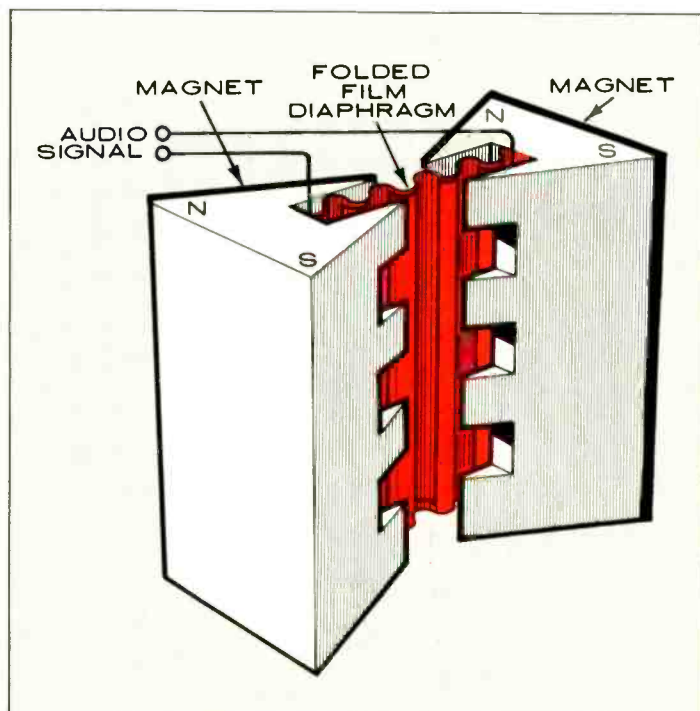


Figure 3. The Heil Air Motion Transformer "squeezes" the air caught in the pleats of a folded film diaphragm that is suspended between the north (N) and south (S) poles of two magnets.

# Magic Baloney

*You'll love the way we hated the Magic Stat thermostat until an amazing thing happened.*

*It had no digital readout, an ugly case and a stupid name. It almost made us sick.*

You're probably expecting our typical sales pitch, but get ready for a shock. For instead of trying to tell you what a great product the Magic Stat thermostat is, we're going to tear it apart. Unmercifully.

When we first saw the Magic Stat, we took one look at the name and went "Yuck." We took one look at the plastic case and said "How cheap looking." And when we looked for the digital readout, it had none. So before the salesman even showed us how it worked, we were totally turned off.

## REAL LOSER

So there it was—at first blush a real loser. But wait, we did find one good feature—a feature that led us to a discovery. The Magic Stat installs in a few minutes and no serviceman is required. Thermostat wires in your wall follow standard color codes. So when you install Magic Stat, you attach the red wire to the red location and the white to the white. That's playschool stuff. And it's safe. Conventional thermostats installed over the past 20 years are generally only 24 volts, so you can either turn off the power or work with the "live" wires without fear.

## OK, LET'S TEST IT

The Magic Stat installation was so easy that the least we could do was test it. And that's when we made an incredible discovery. We discovered that the Magic Stat was probably the most consumer-oriented, technologically-advanced and most sophisticated thermostat ever developed on the face of this earth and in our galaxy for all times ever. What made us switch from hating the thing to loving it? Read the following.

The Magic Stat has six setback settings per day and a seven day program. That means that you could set it for 70° when you get up in the morning, drop the temperature to 54° when you go to work, raise it to 68° when you return for dinner, raise it up to 72° after dinner as you watch TV and then drop it down to 62° when you go to sleep. Count them—five settings with one to spare.

In one day the Magic Stat is programmed for the whole week and for the weeks to come. If you want a different schedule for weekends, you can individually program the thermostat for those days, too. "Big deal," you might think. "What's so great about that?" Read on.

You set most electronic setback thermo-

stats to the time you want the furnace to go on in the morning, so when you wake up, your room is once again warm. But what if one morning it's bitter cold outside and the next morning it's much warmer? This means that setting your furnace to go on at the same time may, on one morning, leave you cold and on the next morning cause you to waste energy by warming up your house too soon.

By golly, the Magic Stat has everybody beat on this one too. Throughout the night it senses and computes the drop in temperature and the time it will take to get your room to your exact wake up temperature. So if you want to wake up at 7 AM to 70 degrees—that's the temperature you'll wake up to every time. Because it's a patented concept, no other thermostat has this feature. But wait. There is also a patent on the setting feature.

## SIMPLE TO SET

To set the thermostat, you press just one button. A small LED light scans the temperature scale until you reach your desired temperature and then you release the button. You change the temperature naturally, throughout the day, up to six times. The unit responds and remembers that exact living pattern. The present temperature is displayed by a glowing red LED on the scale.

The system also computes the ideal length the furnace should stay on to keep the temperature within a range of plus or minus one and one-half degrees. A battery backup lets you keep your stored program in its memory so power outages as long as eight hours won't let your unit forget. And if something happens and your power is out for a few days, the unit will automatically maintain 68 degrees when the power is restored.

Quite frankly, we were so impressed with the unit, its ease of installation and setting plus its many energy-saving features, we seriously considered advertising it until we realized that our customers would probably not want to trust their future comfort to a product called Magic Stat. What if something went wrong with the unit? How substantial was this Magic Stat outfit? Remember, a thermostat is something you live with as long as you live in your home, and they're supposed to last ages. After all, your comfort depends on it.

Well, we did our homework. We found the company to be a sound, well-financed or-

ganization. They have been in business for several years, and they back their products with a three-year limited warranty. In addition, the company has a policy of buying back your unit in one year if you haven't saved its full cost in energy savings. We were satisfied with the company, the people, the product, its incredible features, the company's commitment to the product and above all, the energy savings.

We are so impressed now with the Magic Stat that we're going to make buying one irresistible. Buy one from us for only \$79. Install it yourself in a few minutes or hire a handyman to install it.

Or order the new deluxe unit for \$99 with the exact same features as the regular model, but with a beautiful new case.

Then enjoy the savings this next winter. Not only will you save up to 30% on your heating bills, but you're eligible for the 15% energy tax credit. Then if you're not absolutely in love with this product one year later, return it to JS&A. You'll get all your money back and you can reinstall your old thermostat.

## REALIZE SAVINGS

But we're counting on a few things. First, you will realize an energy savings and a comfort that will far surpass what you are currently experiencing. Secondly, you probably will sleep better breathing cooler air yet wake up to just the right temperature.

Beauty is only skin deep and a name doesn't really mean that much. But we sure wish those guys at Magic Stat would have named their unit something more impressive. Maybe something like Twinkle Temp.

To order, credit card holders call toll free and ask for product by number below or send check plus \$4 delivery for each unit ordered.

Magic Stat (0040SR)	\$79
Deluxe Magic Stat (0041SR)	99

# JS&A

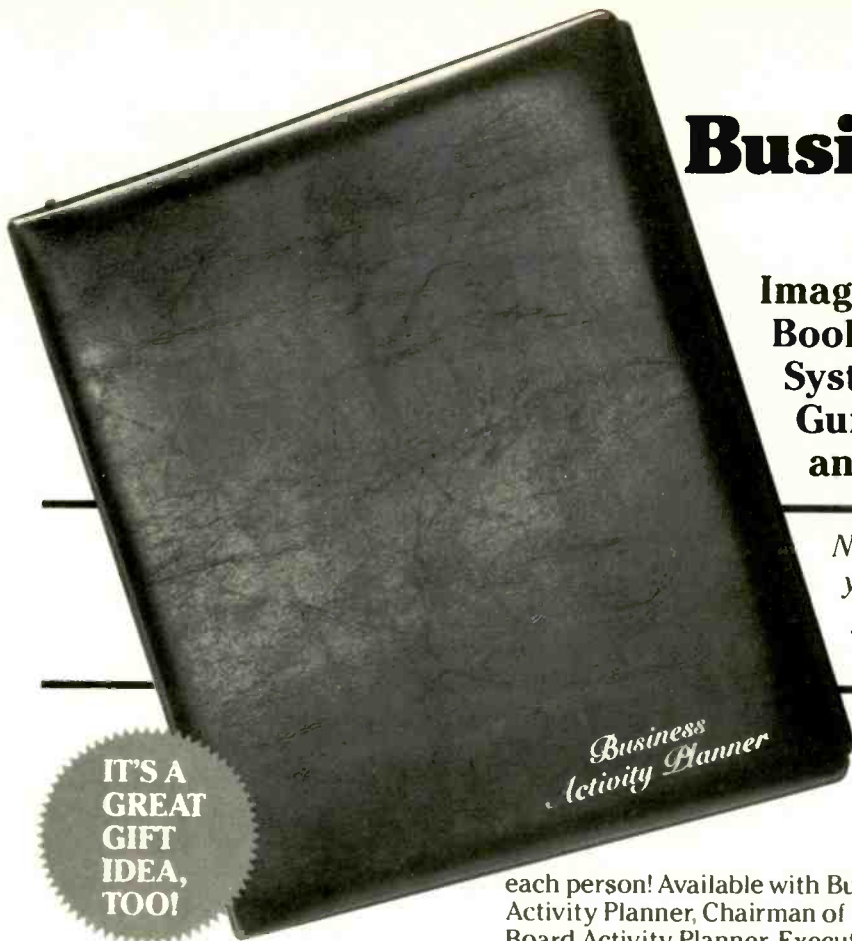
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friendly," but it's a little early to be sure.

Incidentally, over the past five years a number of speaker systems with "ribbon" tweeters have appeared at comparatively moderate price levels. These are not, however, pure ribbons but rather film-diaphragm devices with laminated metal-foil diaphragms, and they pay a consequent penalty in moving mass. These drivers are also called "leaf" tweeters, which is probably as good a name for them as any.

### No-Diaphragm Speakers

The first no-diaphragm speaker to capture a sizable following was marketed in the United States as the Ionovac tweeter, and although its manufacture ceased decades ago, enthusiasts still cling to existing ones with unquenchable passion. The principle of the Ionovac was to ionize the air at the throat of a short horn. Electromagnetic fields can move ionized air, and if such a field is modulated by an audio signal, you'll get sound with no moving mechanical parts at all (see Figure 5).

Nothing replaced the Ionovac for quite a few years until a company called Plasmatronics introduced a large and expensive system with a conventional woofer together with an air-ionizing driver for most of the upper register. Compared with the Ionovac, the

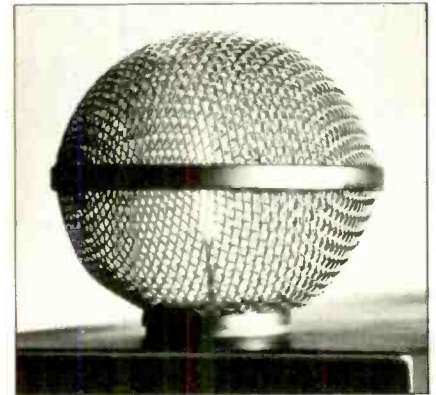
Plasmatronics driver is a powerful device that can get well down into the midrange and really shout it out. The air in the vicinity of the driver element is heavily ionized—to the point of bright incandescence—with the result that you see a fist-sized gaseous shape that glows vividly in a darkened room. There is space in the back of the speaker system for a tank of helium, a stream of which is bled into the quartz "plasma chamber" during operation. The function of the helium is not public knowledge, but some have guessed that it is there to control the rather high temperatures that tend to build up in the chamber. The Plasmatronics company has kept a low profile during the last few years, but reliable word has it that the speaker is obtainable through a limited number of dealers.

Perhaps an even more lineal descendent of the Ionovac is the Magnat tweeter developed in West Germany. This device is not horn-loaded but instead stands free for omnidirectional radiation with its element enclosed in what looks much like the grid of a ball-type microphone. Although I have seen it, I have not heard the tweeter, and neither has anyone else I've spoken to. Dahlquist has been keen to distribute it in the U.S., but there is some uncertainty as to when and for how much.

The latest no-diaphragm loudspeaker, an "ion-cloud" reproducer, is an after-hours project of Threshold president Nelson Pass. When first seen (and heard), last January at the Winter Consumer Electronics Show, it was a see-through grid of wires that ionized

and audio-modulated any air in its vicinity. When last seen, in June at the Summer CES, it was a see-through grid of metal tubing that ionized, expelled, and audio-modulated a sheet of argon gas. Why the change in gases? Well, the Pass prototype works at fairly ordinary temperatures, and with plenty of high voltages creeping around a lot of the ionized oxygen in the air gets the opportunity to form ozone, which is not a welcome byproduct. Argon, on the other hand, is inert and won't form anything but argon whether it's ionized or not. A tank of argon is said to provide about thirty hours of listening at the adequate but not extremely loud levels the speaker is now capable of.

Although very low bass cannot be had from the ion-cloud system, Pass sees it as a full-range device. But he will not yet say whether he is ready to consider it a commercial product. His only statement on the matter is, "I think its



The Magnat ion tweeter

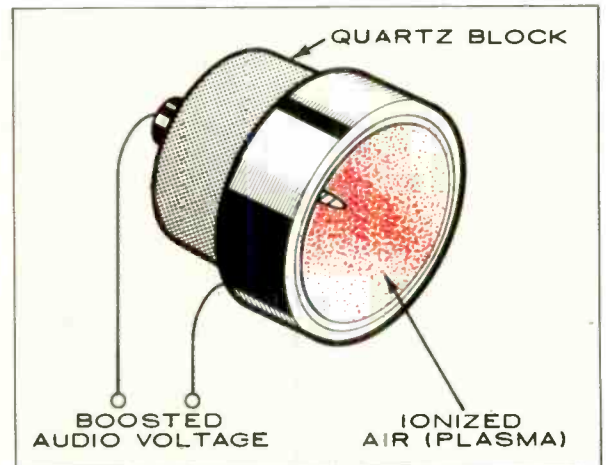
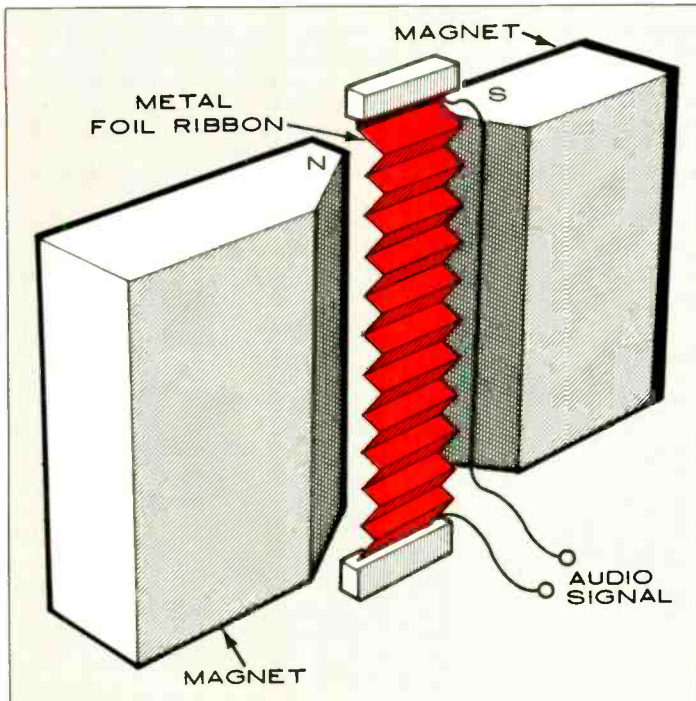


Figure 5 (above). In an ion-cloud speaker, very high voltages created by a radio-frequency oscillator ionize a cloud of gas (plasma), particles of which move according to audio-signal modulations of the oscillator level.

Figure 4 (left). A ribbon speaker is just a metal film suspended between opposite magnetic poles.



sound is very interesting, and I'd like to have a pair for myself."

I could be the victim of some journalist's perverse sense of humor, but several years ago I saw, in an English hi-fi magazine, a write-up on a loudspeaker that would seem to qualify as being digital, complete with a photo and favorable comment on the sound quality. It consisted of a flat baffle board on which

had been mounted a spiral of numerous solenoids, each with a little diaphragm attached. In the manner of solenoids, these behaved purely as electromechanical switches. When activated, they plopped forward; when de-activated, they plopped back, with no subtleties of motion in between. A complex control program governed the number of solenoids fired (corresponding to instantaneous waveform amplitude) and the rate at which the firings took place (corresponding to sampling rate). The reporter seemed mildly surprised that such a contraption could work at all (as

who wouldn't be?) but was gratified that most who had heard it reacted approvingly. So far as I know, after this single mention in the English press, the device utterly disappeared.

Could such a thing work? Don't ask me (but see David Ranada's discussion in the box below). I wouldn't be too astonished if such a mechanism were able to reproduce a recognizable tune amidst a welter of spurious "somethings." But as for high fidelity . . . ? So keep the faith, but beware of men in snappy suits selling stock in digital-speaker companies. □

## Digital Loudspeakers?

**D**IRECT conversion of a digital audio signal into sound waves is not only possible, but devices to do exactly that were fabricated and tested back in 1979 by scientists at Bell Laboratories. Yes, folks, the research and development organization that brought us the transistor, negative feedback in amplifiers, the condenser microphone, information theory (one of the cornerstones of both computer science and digital audio), and the first stereophonic recordings made in this country has already experimented with four-, five-, and six-bit digital-audio transducers designed for telephone earpieces (called "receivers" in telephone-company jargon).

The principle behind the Bell devices is really rather simple. Let's take a four-bit example. Imagine a collection of three electrostatic or film-diaphragm drivers, the smallest being a 1-inch square. The rest have surface areas in binary proportion, so the next larger diaphragm has a surface area of 2 square inches and the largest one an area of 4 square inches. To use these drivers as a direct digital transducer, simply connect each diaphragm to the appropriate bit in each digital word. For example, for the digital word 1110 only the largest and second-largest drivers would move, as commanded by the two rightmost 1's. (The leftmost digit determines which *direction* the diaphragms are to move in—let's say that 1 means outward, 0 inward.) For the digital word 0011, only the smallest two diaphragms move; they both snap inward. It's crucial to realize that each diaphragm moves the same distance inward or outward each time it is activated. Continuous variations in the resulting air pressure are produced by differing combinations of different-sized diaphragms being activated very rapidly. The amount of air displaced with each change of digital word is proportional to the numerical magnitude (in binary notation) of that word. Since the digital words are fed to the array at the rate of many thousands per second (at what is called the sampling rate), the acoustical

waveform emitted by the array of drivers is exactly what you'd expect from a loudspeaker: air-pressure variations in proportion to the audio signal.

Dr. James L. Flanagan and his colleagues at Bell Labs used an "electret" diaphragm segmented into binary-weighted surface areas for their experiments (see photo). Electret transducers are essentially electrostatic drivers in which the necessary polarizing voltages are frozen into the diaphragm material. They too are an invention of Bell Labs. The audible results "compare favorably with the conventional electrical D/A [digital-to-analog] conversion [scheme]," to quote the November 1980 issue of the *Bell System Technical Journal*.

But what's good for Ma Bell, or what's left of her after the coming dismemberment, may not be good for the average music listener. After all, when was the last time you heard a phone call with high-fidelity sound? While Dr. Flanagan speculates that modest-sized loudspeakers might be successfully fabricated as direct-converting digital transducers, there are some remaining design problems. For example, if the smallest element of a sixteen-bit direct-converting driver were only

1 millimeter in diameter, the largest element ( $2^{15}$  times bigger—the sixteenth bit determines the direction of diaphragm movement) would be 181 millimeters wide, or about 7 inches. This is hardly a practical size for a headphone. As a loudspeaker, the device would require large diaphragm excursions for high sound levels. And it would also generate considerable amounts of ultrasonic energy; if this were not filtered out by a special grille or baffle assembly, as in the Bell Labs devices, it could cause considerable consternation to household pets, not to mention passing bats and porpoises.

Why build a digital loudspeaker in the first place? Assuming the basic design problems can be worked out—and there are other techniques besides segmented diaphragms for making digital drivers—a digital loudspeaker could have very low distortion. In theory at least, the distortion it would add to the signal could be hundreds of times less than that added by typical dynamic loudspeakers. Moreover, a direct-converting digital loudspeaker would not need power-absorbing crossover networks and thus could be a relatively efficient transducer, requiring little power to produce high sound-pressure levels. Finally, if the necessary all-digital computations take place, a digital speaker could have a "user definable" frequency response and directionality characteristic.

—David Ranada

Bell's prototype four-bit (top) and six-bit (bottom right) digital transducers for telephones used all-acoustic "desampling" filters (pieces at bottom left).



Photo courtesy Bell Laboratories

# Thunder Lizard Mistake Plus

Earlier this year we offered a 15" BSR speaker system with the wrong tweeter at a close-out price. Now, here's a super improved version of the same speaker for the exact same close-out price.

It was a mistake. Somebody goofed and put the wrong tweeter in 3500 of BSR's best 15" 3-way speaker systems.

## THUNDER LIZARDS

BSR's salesman referred to the speakers as Thunder Lizards because the 15" acoustic suspension bass driver is so powerfully dramatic that it can literally recreate the power of an earthquake or explosion in your living room.

Unfortunately, without the brilliant and powerful exponential horn tweeter, the bass simply overwhelmed the highs and so the name Thunder Lizard was born.

But, DAK came to the rescue. We not only bought all 3500 of the speakers, we bought the exponential horn tweeters that BSR had left out and let our customers install the correct tweeter themselves. The highs and lows this system created were nothing short of awesome.

## BUT, THERE'S A PROBLEM

We thought we'd have enough speakers for the rest of the year, but we sold over 3300 in just our Spring Catalogs. So, we went back to BSR and tried to buy more of the speakers. But, they only sold us the first batch at a close-out price because they had put in the wrong tweeters and didn't know what to do with them.

BSR said that luckily they didn't make mistakes very often and the only other 'problem' they had was an inventory of 6000 too many super tweak 8" midrange drivers with an exotic polypropylene cone they used for an expensive BSR tower system.

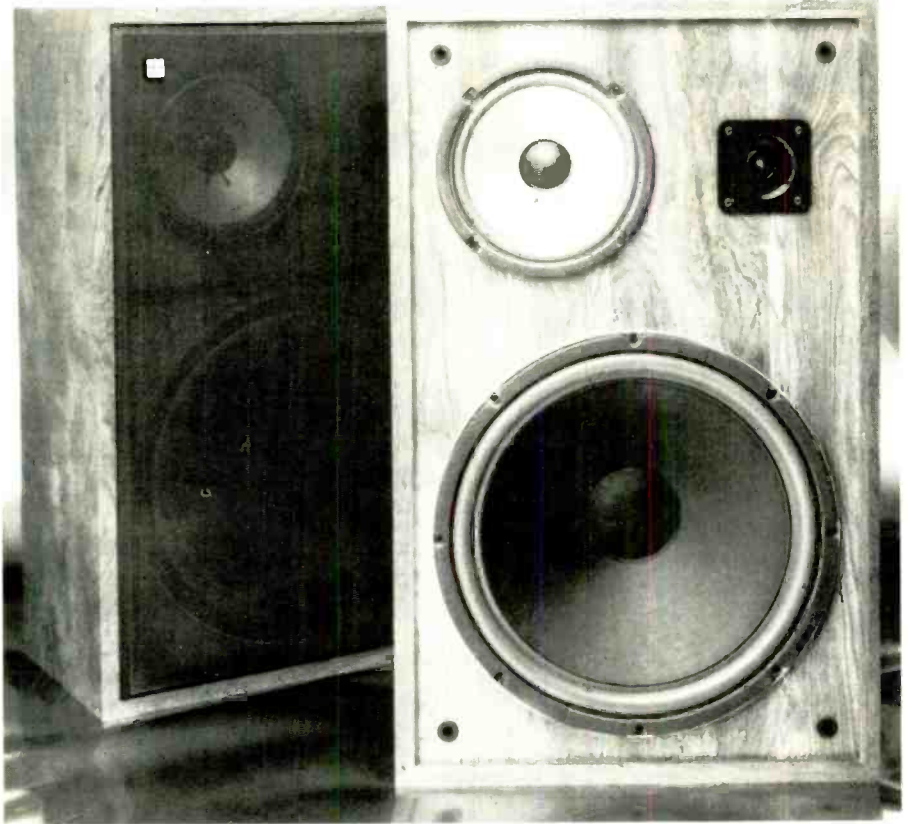
## LOOK NO FURTHER

Well, to make a long story short, we got BSR to replace the plain paper 5" midrange in the Thunder Lizard Mistake with the new exotic 8" polypropylene midrange driver. And, they put the correct tweeter in for us too.

So, for exactly the same close-out price, we have 6000 speaker systems that produce a kaleidoscopic panorama of sound that is nothing sort of incredible. You're in for an earthshaking, bone jarring musical experience.

The exponential horn tweeter gives you startling dramatic highs to 20Khz. You won't just hear cymbal crashes, you will experience them. The highs are simply brilliant. Plus, a brilliance control lets you decide just how powerful you want the highs to be.

The bass, all the way down to 20hz is reproduced with thundering accuracy by



the pride of the BSR line, a 15" acoustic suspension bass driver. The lows seem to have life of their own.

You'll hear string basses emerge that you never knew were in your recordings. Just a bass drum is an experience.

And finally, the midrange from 1000hz to 4000hz is flawlessly reproduced by the newest development in high-tech speakers. Instead of using paper, polypropylene is used.

Its characteristics give incredible purity to the entire midrange. It's much more accurate than a paper midrange.

And, it's a perfect match for the dramatic thundering bass and startling highs these speaker systems produce. There's a presence control that lets you adjust the midrange level to suit your taste.

## GREAT LOOKS AND GREAT SOUND

The beautifully crafted wood-grain appearance cabinet is 29" tall, 13" wide and 10 1/2" deep. It comes with a beautiful removable real cloth speaker grill.

BSR backs this system with a 2 year limited warranty, and speaking of protection, the tweeter is fuse protected. The system can handle 180 watts peak, 90 watts continuous and requires 15 watts.

## NEVER AGAIN?

BSR says that this is it. When these 6000 speakers are gone, there'll be no more. They say they have no more mistakes and no more extra speakers.

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If for any reason you're not 100% overwhelmed by these speaker systems, simply return them to DAK in their original boxes within 30 days for a refund.

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# Answers to Your Compact Disc Questions

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By David Ranada

**E**VERY new audio technology is bound to create unanswered questions among interested audiophiles. Back issues of *STEREO REVIEW* show that when stereo hit the scene in the late 1950's, readers were at least as confused about it as they seem to be about the Compact Disc system today. To help lower the overall confusion level I will try to answer here some of the most common questions about the CD system. If you have any other burning technical questions about CD's or digital audio in general, send them to Stereo Review, Dept. CDQA, One Park Avenue, New York, N.Y. 10016. We cannot promise to respond to individual readers, but we do intend to answer frequently asked questions in future issues.

**W**hat are the main sonic advantages of the CD system? Low noise, low distortion at all recorded levels, wide and very flat frequency response, and absolute speed stability. Secondary advantages include substantial sonic immunity of the discs to damage from handling and repeated playing.

**W**here does a CD player plug into a system? Into the phono input? Definitely *not* into the phono input. Use a line-level input (aux, tuner, tape-monitor, or an external-processor loop).

**W**hy are Compact Discs compact? The small CD's are easier to manufacture than larger discs would be. In their present size—a shade less than 4¾ inches in diameter—they require smaller machines and less raw material and energy in manufacturing, and they will fit better in future portable and automotive players. They also hold just the right amount of music. Sony once demonstrated a 12-inch digital audio disc that could hold fourteen hours of music, but what would you put on such a disc? And how much would you have to charge for it?

**S**hould Compact Discs be stored vertically or horizontally? It doesn't seem to matter as long as the discs are stored in their original protective "jewel boxes." In future years, budget-priced CD's may come in cardboard slipcases. These will probably have to be stored so that there are no excessive stresses placed on the discs (bending a disc too far may ruin it).

**W**ill a CD player bought today play the longer discs of the future? Yes. Longer playing times will come from recording discs closer to the outside edge.

**W**hat is the maximum playing time of a Compact Disc? Approximately 75 minutes. ▶

# Answers

**Why aren't all of them that long?** Most program material—derived from the master tapes for LP's—is less than one hour in total playing time. Also, the number of manufacturing defects per disc is proportional to its surface area: the less surface area a program takes up, the less likely a disc will have fatal defects. CD playing times are still (relatively) short, possibly so as to increase the yield of usable discs.

**What are current production yields?** Roughly 70 per cent of all CD's pressed are completely playable. Worldwide production in 1983 will total some 12.4 million discs of 850 titles, and next year total CD production will be more than 40 million. But these are still low numbers when you consider that one smash-hit LP easily sells 5 million copies in the U.S. alone.

**Why does a CD play from the center of the disc to the outside edge?** There are two main reasons, one historical, the other practical. The standard diameter for CD's was decided on fairly late in the game, and designing a system that played from the inside out permitted prototype work to proceed even though the final disc size was not yet known. The practical reason is that a Compact Disc—at least for the time being with some pressing methods—is more likely to have molding problems close to its edge than close to its center hole. Starting the program at the center thus increases disc yield.

**Why does a Compact Disc slow down as it plays?** At the start of play (from the inside), a CD spins at about 500 rpm; near the end of a CD lasting an hour or more, the speed has fallen to about 200 rpm. This steady decrease in speed is necessary to keep constant the rate at which the disc's information-bearing pits pass over the scanning laser, and the purpose of a constant rate is to maximize the playing time. A constant-speed disc would have to contain pits that were unnecessarily large (long) near the outside of the disc as compared with the minimum pit size that the laser-optical system can resolve. Therefore, having the disc slow down as it plays increases the information density on the playing surface to its maximum.

**Why do some Compact Discs sound so different from their analog equivalents?** It is incorrect to assume that the same master tape used to cut an analog disc master is used to make the Compact Disc version. In the case of multi-track analog master tapes of popular music, it is possible that different mix-downs were used to cut the analog and digital discs. It is also common practice for pop artists or record producers present at an analog-disc cutting session to tell the cutting engineer to process the sound in many different ways (equalization, compression, limiting, adding reverberation, etc.). If the same processing is not done when the Compact Disc is mastered, it is unlikely that the CD will sound like the LP.

**Why do some CD's sound so bad?** Mainly because the master tapes used to make them also sound bad. Many master tapes are made to give the best results with analog discs played on inexpensive, inferior equipment. For decades record producers used the requirements of "console stereos" to guide them in their choices at the recording session. It may take just as long to convince them that average listeners are much better at discerning sound quality than they used to be and that the sound quality of the average component system has risen above that obtainable in many studio monitoring rooms.

**What are index points? How are they used?** Index points are special cueing locations that are encoded on the disc during a piece of music. For instance, index points might be used to mark out the exposition, development, and recapitulation of a symphony's first movement. They can be used as optional cueing points by certain CD players (look for an INDEX button or numerical INDEX display). It seems that only some discs made in Japan have index points, though I've been told that PolyGram will add index points to some of its early classical releases when they receive new press runs.

**Are players affected by their position of operation?** All that I've tried are not, as long as you don't try to turn them over while a disc is playing—though some will even take that in stride. It may be inconvenient, however, to operate certain players in any but their intended orientations, mainly because the discs may keep falling out when you try to load them. Slightly banked or tilted shelving should have no effect.

**Is the laser in a CD player dangerous?** No. The semiconductor lasers used in CD players have very low-power beams that automatically diverge as they leave the laser, unlike the laser "death beams" of science-fiction writers. As the Philips literature says, "It is impossible to concentrate the total beam energy into the eye at a single moment, which would be the most likely source of danger." In all the CD players I have examined, the laser is turned on only when a disc has been inserted and is spinning. Both the cover/door and the disc itself form effective barriers for the laser emissions.

*"I'm so sorry, sir. We opened our new digital Compact Disc department just two days ago, and we seem to have misplaced it. But if you'll leave your telephone number, we'll call you the minute we find it."*





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## Answers

**D**oes the laser burn out? How often will it need to be replaced? How much will it cost? Yes, semiconductor lasers will eventually fail. Five thousand hours of "on" time seems to be the most often quoted average lifetime of CD-player lasers. Lifetimes of more than 10,000 hours have been reported for some semiconductor lasers, and work on longer-lived devices is progressing. Replacement of the laser assembly (you can't replace just the laser) might cost around \$100 to \$120 for parts and labor. There is at least one positive aspect to laser replacement: failure is likely to be sudden, leaving no doubt that something is wrong. There will be none of the kind of gradually increasing distortion or gradually increasing irreversible record wear that you get with analog cartridges and their styli.

**W**hat is error correction? The process by which a CD player, using data stored on the record along with the audio signal, detects and exactly corrects (if possible) any erroneous data received by the laser circuits.

**W**hat is error concealment? The process by which a CD player, if a section of the data stream contains too many errors to correct, calculates reasonable substitutes for the erroneous data using correct data as the basis for numerical interpolations.

**W**hat is digital filtering? All CD players require some sort of very-sharp-cutoff low-pass (high-cut) filter at their output to remove ultrasonic components generated by the sampling process in recording. The filters can operate on the audio signal either after it has been converted from digital to analog form (using analog filters made of resistors, capacitors, op amps, etc.) or before it gets converted to an analog voltage—while it is still in digital form. In the latter case the digital low-pass filter is really a special-purpose computer that calculates the effect of an ideal low-pass filter on the signal and sends the results of the calculations to be converted into an audio voltage.

**D**oes digital filtering offer any advantages? Yes, at least in theory if not always in practice. Since a digital filter operates with numbers that are encoded in the physical construction of an integrated circuit, it is not sensitive to temperature drifts the way analog filters can be. Digital filters are also more consistent in their frequency response since the numbers don't change from chip to chip, whereas individual resistor and capacitor values always vary around a statistical mean. And digital filters can be made phase-linear at high frequencies, unlike most analog filters used in CD players, but it has yet to be demonstrated to me that there is any *audible* virtue in phase linearity at frequencies of more than a few thousand hertz.

Digital filters have one other advantage I have not yet seen mentioned in the CD technical literature: they permit variable-pitch CD players. The cut-off frequency of the type of digital filters used in CD players is dependent on the sampling rate of the system. Slowing down CD playback lowers the apparent sampling rate, and a digital filter will track the change and continue to provide effective filtering as playback pitch is varied.

**I**n what ways can a CD pressing be defective? Ideally, all unplayably defective CD's would be caught at the factory level and never reach the consumer. Practically, however, it is not possible to catch all defective CD's before they are sold.

Common manufacturing defects include air bubbles in the substrate, inclusions (particles caught in the substrate), scratches or pinholes on the signal surface made before the protective lacquer layer was applied, scratches on the outer surfaces of the disc, misaligned center holes, and burrs around the center hole. Other possible defects include a pebbly "orange peel" on the outer surfaces and an optical effect called "birefringence"; both change the path of the laser beam as it enters and leaves the disc.

**H**ow can you tell if a CD is defective? If a CD player has trouble playing a disc (it skips, gets "stuck," emits bursts of clicks, etc.), the problem is with only that disc if the player can play a known nondefective disc successfully. Usually when a disc is defective or damaged enough to create audible problems there will also be a visible problem with the pressing. Check for any visible disc defects (you might want to use a small magnifying glass). Look for particles within the disc, scratches or bumps on the inner reflective signal surface, and roughness, abrasion, or long or deep scratches on the outer surface of the disc. Also make sure that the disc isn't warped. Any of these problem-causing defects—if they aren't due to careless handling—are reasonable justifications for returning a disc.

**W**hy do some CD players cope with damaged or defective discs better than others? The tracking of a Compact Disc involves the complex interaction of analog and digital electronic systems as well as the interaction of an electromechanical/electro-optical device (the laser pickup) with the Compact Disc itself. Whether disc damage or defects become audible depends to a great extent on how large the damaged area is and on what disc surface it is located. Any player will have much more trouble with manufacturing damage on the inner signal surface than with an equivalent-sized damaged area on the outer surface of the disc.

Successful tracking also depends on exactly where the scanning laser is positioned over the pit track when the defect passes it. This is why some defects may be audible only sometimes, even on the same player. The design and factory adjustment of the tracking servos is also important: if they let the laser drift in relation to the pit track, a passing defect may throw off the tracking circuitry so that the error-concealment capabilities of the machine are exceeded.

Even though the mathematical equations characterizing the CD system's error-correction scheme have been standardized, there exist various ways of going about solving them. They are not all equivalent. Some machines' "correction algorithms" and laser-servo circuits are better at coping with small but closely spaced defects, while others might be more adept at dealing with rather large-scale but widely separated damage. □





## Where Do You Stand on Stereo?

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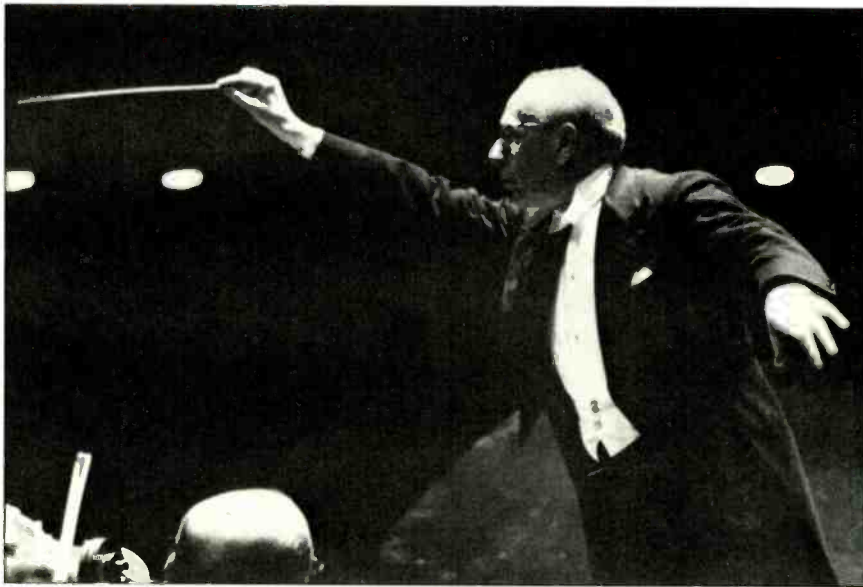
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# The Basic Repertoire

By Richard Freed



Conductor George Szell (photo courtesy Epic Records)

**F**OR some years critic Richard Freed, a contributing editor of *STEREO REVIEW*, has listened to all available recordings of the nearly two hundred symphonic works that form the essential core of orchestral programs and classical record collections, selecting those versions he considered the best. We have published his choices in a pamphlet, which we have updated annually, and we are now publishing his selections of the best current recordings of the *Basic Repertoire* in a regular series in the magazine. If you want the pamphlet, the most recent updating (1982) is available for \$1 (check or money order) and a stamped (40¢) self-addressed No. 10 envelope; send to *Basic Repertoire*, P.O. Box 506, Murray Hill Station, New York, N.Y. 10156.

All the selections are two-channel analog stereo discs unless otherwise indicated by one of our usual symbols: ● for a digitally mastered analog disc, © for a digital Compact Disc, © for a stereo cassette, and, in a few instances, ⊗ for a mono recording.

□ **HAYDN: Trumpet Concerto in E-flat Major.** Maurice André's two latest recordings of this work head an impressive list—with Theodore Guschlbauer conducting the Bamberg Symphony on Musical Heritage Society (MHS 1299, © MHC 2112) or RCA (CRL2-7002) or Erato (STU 70652), and with Jesús López-Cobos and the London Philharmonic on Angel (S-37513, © 4XS-37513). Of the several other fine versions, the one in which Gerard Schwarz does double duty as both soloist and conductor is the richest sounding (Delos ● DMS 3001).

□ **HAYDN: Symphony No. 88, in G Major.** The economical recordings by Fritz Reiner (RCA Victrola VICS-1366) and Antal Dorati (London STS 15442 or in STS 15229/

34) are crisp in the fast movements, mellow in the largo, and thoroughly inside the music. Colin Davis's recording, with his brisk slow movement, is the choice on cassette (Philips © 7300 534).

□ **HAYDN: Symphony No. 94, in G Major ("Surprise").** George Szell's witty, elegant performance is the most satisfying of all, and it is paired with a magnificent one of No. 93 (CBS MY 37761, © MYT 37761). Colin Davis's version is somewhat less persuasive but richly recorded (Philips ● 6514 192, © 7337 192), and those by Eugen Jochum (DG 2720 091) and Antal Dorati (London STS 15319/24) are easy to take in their respective sets of all twelve of Haydn's London symphonies. This work also gets an appealing performance in Herbert von Karajan's otherwise coolish new digital set of the twelve (DG ● 2741 015).

□ **HAYDN: Symphony No. 100, in G Major ("Military").** Jochum gives a splendid account of this work in his economical six-disc set (DG 2720 091), as Dorati does in his (London STS 15319/24), but Neville Marriner's crisp, stylish version (Philips 9500 225, © 7300 543) is more brightly recorded.

□ **HAYDN: Symphony No. 101, in D Major ("The Clock").** Colin Davis's reading is quite good, and his overside No. 102 is outstanding (Philips 9500 679, © 7300 774). Reiner's version is also good, and the companion work, No. 95, on his budget-priced disc is perhaps even more attractive (RCA AGL1-1275). Dorati and Jochum are once again more than satisfactory in their six-disc sets.

□ **HAYDN: Symphony No. 104, in D Major ("London").** Jochum projects this work

as the grand summing-up of Haydn's achievement as a symphonist (DG 2530 525 or in 2720 091). Dorati is also at his very best in this work (London STS 15324, © STS5 15324, or in his set). No other current version seems quite as convincing as these.

□ **HINDEMITH: Mathis der Maler, Symphony.** Eugene Ormandy's third recording of this work is illumined by proprietary fervor and authority (CBS MS 6562). Jascha Horenstein's version, available again as an import on Unicorn-Kanchana (RHS 312, © UKC 312), is similarly deeply felt and more smoothly recorded.

□ **HOLST: The Planets.** The astounding improvement in the sonic quality of the Walter Susskind/Saint Louis Symphony recording on the recent InSync cassette (© C-4103) commands new respect for the performance itself. Of the late Sir Adrian Boult's five authoritative recordings of this work, the next to last one is the best, but get the imported EMI disc (ASD 2301). Karajan's remake is a knockout sonically and very persuasive musically (DG ● 2532 019, © 3302 019, © 400 028-2). Alexander Gibson (Digitech ● ABRD-1010; Musical Heritage Society ● MHS 4514, © MHC 6514) and Seiji Ozawa (Philips 9500 782, © 7300 856) are nearly as compelling, and both the MHS Gibson and the reissued Ormandy (RCA AGL1-3885, © AGK1-3885) are great buys.

□ **KODÁLY: Háry János Suite.** Eugene Ormandy, who made the first recording of this suite some fifty years ago, remains the clear choice in his latest remake (RCA ARL1-1325). The recent Hungarian recording under János Ferencsik is agreeable, if not dazzling (Hungaroton SLPX-12190, © MK-12190).

□ **LALO: Symphonie Espagnole.** Itzhak Perlman, with Daniel Barenboim conducting, plays all five movements irresistibly (DG ● 2532 011, © 3302 011, © 400 032-2). The magical Szeryng/Hendl recording is good to have again in RCA's economical Victrola cassette series (© ALK1-4642). Other fine versions: Kyung-Wha Chung/Dutoit (London ● LDR 71029, © LDR5 71029), Stern/Ormandy (CBS MY 37811, © MYT 37811), Zukerman/Mehta (CBS M 35132, © MT 35132).

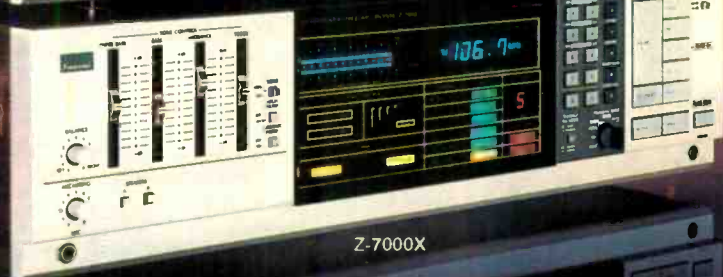
□ **LISZT: Piano Concertos No. 1, in E-flat Major, and No. 2, in A Major.** Lazar Berman, with Carlo Maria Giulini conducting, is superb in these concertos (DG 2530 770, © 3300 770). Alfred Brendel, with Bernard Haitink, is nearly as compelling, and his disc, by interrupting Concerto No. 1 for turnover after its first movement, includes the *Totentanz* as well (Philips 6500 374, © 7300 229). Also in the running: Sviatoslav Richter with Kiril Kondrashin (Philips 835 474) and Jorge Bolet with David Zinman (Vox Cum Laude VCL-9001, © VCS-9001).

□ **LISZT: Les Préludes.** Three of the most effective performances are on DG: Karajan's, in a superb Liszt package (DG Privilege 2535 110, © 3335 110), Ferenc Fricsay's in the same mid-price series (2535 406, © 3335 406), and Daniel Barenboim's

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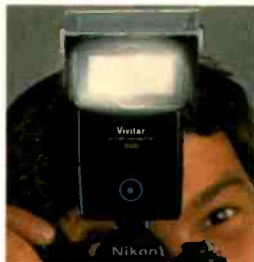
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full-price disc (2531 054, © 3301 054). Sir Adrian Boult's version is solid and well-balanced (Quintessence PMC-7050, © PAC-7050), Sir Georg Solti's more galvanic and brilliantly recorded (London CS 7084, © CS5 7084).

□ **MAHLER: *Das Lied von der Erde***. The incomparable recording by Bruno Walter and the Vienna Philharmonic with Kathleen Ferrier and Julius Patzak is gone again, as are some choice stereo recordings. Walter's stereo remake with Mildred Miller and Ernst Haefliger is a fine buy (Odyssey Y 30043, © YT 30043). The sumptuously recorded Karajan version, with Christa Ludwig and René Kollo (DG 2531 179, © 3301 179), is less persuasive than Otto Klemperer's with Ludwig and Fritz Wunderlich (Angel SB-3704), but the latter is gratuitously expensive in its two-disc, three-sided format.

□ **MAHLER: *Symphony No. 1, in D Major***. The most poetic and convincing performances are those conducted by Rafael Kubelik (DG Privilege 2535 172, © 3335 172), Jascha Horenstein (Unicorn-Kanchana RHS 301, © UKC 301), and Klaus Tennstedt (Angel S-37508, © 4XS-37508). Somewhat less distinctive, but powerfully felt and handsomely recorded, are Haitink's remake (Philips 6500 342, © 7300 397) and the recordings by Ozawa (DG 2530 993, © 3300 993) and Abbado (DG 2532 020, © 3302 020, © 400 033-2).

□ **MAHLER: *Symphony No. 2, in C Minor ("Resurrection")***. The more I hear the recent recording conducted by Václav Neumann (Pro Arte 2PAL-2011, © 2PAC-2011), surely the finest part of his Mahler cycle, the shorter my list becomes; few other conductors have realized the simple joy that Neumann transmits in the finale. The recordings by Maurice Abravanel (Vanguard Cardinal VCS-10003/04) and Rafael Kubelik (DG Privilege 2726 062, © 3372 062) are also uncommonly convincing and fine buys too. Zubin Mehta's version, with the Vienna Philharmonic, is gorgeously recorded and quite satisfying in its conventional approach (London CSA 2242, © CSA5 2242).

□ **MAHLER: *Symphony No. 4, in G Major***. Two Czech conductors—Kubelik, with Elsie Morison as soloist (DG Privilege 2535 119, © 3335 119), and Neumann, with Magdaléna Hajóssyová (Pro Arte PAL-1068, © PAC-1068)—let the music glow with unforced natural radiance, as does Tennstedt in his stunning new recording with Lucia Popp (Angel DS-37954, © 4XS-37954), which has a reasonable claim to the very top position on a pretty distinguished list. Szell's recording with Judith Raskin is meticulously detailed and communicative (CBS MY 37225, © MYT 37225), and the old Walter/Desi Halban version retains its unique appeal (Odyssey 32 16 0026). The relatively plush-sounding, grand-scaled Karajan reading, with Edith Mathis (DG 2531 205, © 3301 205), is impressive if a bit less endearing.

□ **MAHLER: *Symphony No. 5 in C-sharp Minor***. Kubelik strikes me as being more "inside" this music than any other conduc-

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tor recorded in stereo, and his set has the advantage of including Dietrich Fischer-Dieskau's remake of the *Lieder eines Fahrenden Gesellen* (DG Privilege 2726 064, © 3372 064). Karajan's intensity and his orchestra's gorgeous playing are persuasive too (DG 2707 081, © 3370 006), as is Tennstedt's expansively lyrical approach (Angel SZB-3883, © 4Z2S-3883).

□ **MAHLER: *Symphony No. 9, in D Major*.** Until Kubelik's magnificent version reappears, the most convincing is Karajan's (DG 2707 125, © 3370 038), followed closely by those of James Levine (RCA ARL2-3461, © ARK2-3461) and Tennstedt (Angel SZB-3899, © 4Z2S-3899). Walter's budget-priced stereo remake still exudes authority, affection, and all-around conviction (Odyssey Y2 30308).

□ **MENDELSSOHN: *Violin Concerto in E Minor*.** Choose your favorite fiddler or the coupling that appeals to you most, and you won't be disappointed. Heifetz and Munch sound better than ever in RCA's new half-speed remastering (ARPI-4567, © ARE1-4567). Stern and Ozawa are stunning on Compact Disc as well as in the other formats (CBS ◉ IM 37204, © IMT 37204, © MK 37204). The recordings by Milstein and Abbado (DG 2530 359), Grumiaux and Krenz (Philips 6500 465, © 7300 248), and Suk and Ančerl (Quintessence PMC-7098, © P4C-7098) complete my own select handful.

□ **MENDELSSOHN: *A Midsummer Night's Dream*.** Peter Maag's much-admired nearly complete recording hardly shows its age, and it's a great buy (London STS 15084, © STS5 15084). Eugene Ormandy offers an even fuller selection, richer sound, and the superb Judith Blegen and Frederica von Stade in the vocal numbers (RCA ARL1-2084, © ARK1-2084).

□ **MENDELSSOHN: *Symphony No. 3, in A Minor ("Scottish")*.** That elegant Mendelssohnian, Peter Magg, has given us an outstandingly fresh account of this work, preceded by a similarly stunning one of *Fingal's Cave* (London STS 15091, © STS5-15091). Riccardo Chailly is nearly a match for him, and his version is more richly recorded—but also more expensive (Philips 6769 042, © 7699 128).

□ **MENDELSSOHN: *Symphony No. 4, in A Major ("Italian")*.** Leonard Bernstein's remake with the Israel Philharmonic is one of the very best and includes the first-movement repeat (DG 2531 097, © 3301 097). Other fine alternatives include those by Kurt Masur, in his four-disc set of all five Mendelssohn symphonies (Vanguard VCS-10133/36), André Previn on RCA (AGL1-2703, © AGK1-2703), and Klaus Tennstedt (Angel ◉ DS-37760, © 4ZS-37760) as well as Charles Munch's economical cassette reissue (RCA © ALK1-4465).

□ **MILHAUD: *La Création du monde*.** Bernstein's Paris remake, packaged with *Le Boeuf sur le toit* and some of the *Saudades do Brasil*, is stunning (Angel S-37442, © 4XS-37442). Milhaud's own remake, also with *Le Boeuf* (Nonesuch H-71122), is almost as fetching. □



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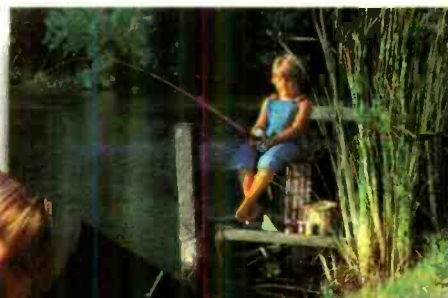
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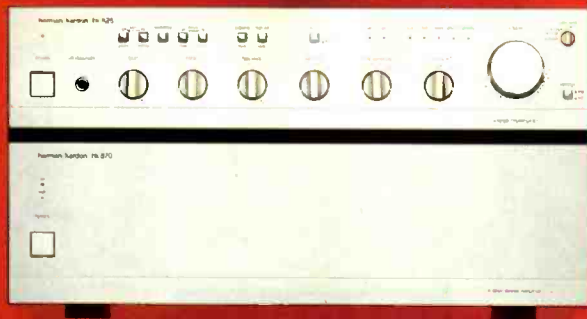
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# Best of the Month

Stereo Review's Selection of Recordings of Special Merit

## Rossini's *Barber* Gets An Ebullient Reading Under Neville Marriner

HERE is good news for admirers of what is, in all likelihood, the best *opera buffa* ever written: finally, after several near misses and outright failures in recent years, we have a recorded *Il barbiere di Siviglia* that refuses to surrender its comic ebullience to humorless scholarship. Astonishingly, this Philips release is virtually an all-British accomplishment; the one Italian singer in the cast adds relatively little to it.

This appears to be conductor Neville Marriner's first recorded opera, but he has come to it after recording reams of Rossini overtures in which he displayed

a mastery of the style. Here he secures crisp orchestral playing, full of sensitive nuances and all kinds of clearly pointed textural niceties. Some of his tempo choices could be questioned, such as the "Buona sera" ensemble (a shade too fast) or Berta's aria (a mite too slow), but the overall pacing is alive and theatrical and bears comparison with the best on records (the previous sets by Vittorio Gui and Alceo Galliera lead the pack).

Thomas Allen is an engaging Figaro with a bouncy presence and a firm voice that he uses with imagination—he is an

Agnes Baltsa (*Rosina*) and Thomas Allen (*Figaro*)



Clive Barak/Philips Records

altogether welcome sight on the relatively bleak baritone horizon. The Rosina of Agnes Baltsa suggests more determination than innate charm, but the total mix is rather entertaining and is enlivened by a good sense of comedy, to say nothing of vocal excellence. Francisco Araiza (Almaviva) sails fearlessly through Rossini's florid writing, including the oft-omitted "*Cessa di più resistere*." It is a dispensable aria, but it's worth restoring in such a clearly articulated rendition as this one.

Robert Lloyd is an expert and properly unctuous Basilio, if vocally unspectacular. Domenico Trimarchi's voice is downright insignificant, but he manages Bartolo's patter with agility and holds up his end of the comedy very well (with "castrato" sounds in the "*Caffariello*" aria, among other notable effects). Sally Burgess, a new name to me, contributes a solid Berta.

The production has some excellent touches: the prominently captured guitar in the introduction to "*Ecco ridente*," the perky fortepiano contributions of Nicholas Kramer in the recitatives and in the introduction to the Lesson Scene, and the booming bass drum in the tempest music. On the other hand, Figaro's entrance in the Act I finale should have been more vividly "staged." As is often the case with non-Italian singers, some recitatives are rattled off too mechanically, and Allen and Lloyd do not always observe the double consonants. But, with all that, this is the best *Barber* to come along in some twenty years. —George Jellinek

**ROSSINI: *Il barbiere di Siviglia*.** Thomas Allen (baritone), Figaro; Agnes Baltsa (mezzo-soprano), Rosina; Francisco Araiza (tenor), Almaviva; Domenico Trimarchi (baritone), Bartolo; Robert Lloyd (bass), Basilio; Sally Burgess (mezzo-soprano), Berta; others. Ambrosian Opera Chorus; Academy of St. Martin-in-the-Fields, Neville Marriner cond. PHILIPS 6769 100 three discs \$38.94, © 7654 100 \$38.94.

## Singer / Songwriter Guy Clark Makes New Country Classics

**G**UY CLARK'S music is my idea of what country music should be like and very rarely is. An amalgam of Texas styles ranging from progressive Austin country-folk to traditional Western swing to Mexican mariachi, it is both squarely derivative and ingeniously original. And his lyrics, while romantic, manage (sometimes humorously) to balance raw sentimentality with hard-eyed looks at the tender-tough underside of the human soul. Usually they draw sharp, detailed portraits of the wasted lives and dreams of back-alley, bottom-window characters, and, more often than not, they're about trying tests of moral fortitude and dignity. Sometimes they merely celebrate the simple pains and pleasures of life, but always with honesty and integrity.

Clark has kicked around Texas and Nashville for a good while now, and although he's never cultivated mass appeal (other artists have always had more success with his songs than he has), he's long been considered one of the best of the new breed of country songwriters. Anyone not familiar with Clark's work (*Heartbroke*, *New Cut Road*, *Desperadoes Waiting for a Train*, *L.A. Freeway*, *Let Him Roll*, *A Nickel for the Fiddler*) will understand why he's so well regarded after listening to his new album, "*Better Days*," produced by his old friend and fellow Texan Rodney Crowell.

As far back as I can remember, each of Clark's albums has yielded at least two progressive-country classics, and each song has had a modesty of scope, an economy of language, and a minimum of fuss. There may be as many as *four* new classics on "*Better Days*," counting the wistful title song and the sea-faring *Blowin' Like a Bandit*, but perhaps the two that reach the head and heart fastest are the whimsical *Homegrown Tomatoes* and the plaintive *The Randall Knife*. The former—half delightful novelty song and half gleeful paean to culinary ecstasy—is guaranteed to produce a wry smile if not a shuttle run to the nearest tomato patch. But *The Randall Knife*, an exquisitely crafted tale about a boy and his father and the small things that both bind them and keep them apart, is the sort of nugget that buries itself in the back of your brain and lurches forward at the most inopportune, emotion-

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Graham Parker: positively inspirational

al moments. If this one doesn't get you, son, you must not be breathing.

Producer Crowell has taken a gentle hand to this project. He lets Clark drawl on naturally with that voice of his that sounds like a friendly wind rustling through dry sagebrush, and he adds just enough instrumentation to Clark's acoustic guitar to help ease his songs onto the commercial charts and to move them along where they need to go musically. Together Clark and Crowell have come up with what is, for me anyway, the finest album to come out of Nashville this year—and one of the best to come out of country music, period.

—Alanna Nash

**GUY CLARK: *Better Days*.** Guy Clark (vocals, guitars); Vince Gill, Gary Nicholson, Reggie Young (guitars); Emory Gordy (bass); Larrie Londin (drums); Hank DeVito (steel); Tony Brown (keyboards); Johnny Gimble (fiddle, mandolin); Rodney Crowell, Paul Kennerley (back-up vocals). *Blowin' Like a Bandit; Better Days; Homegrown Tomatoes; Supply and Demand; The Randall Knife; The Carpenter; Uncertain Texas; No Deal; Tears; Fool in the Mirror.* WARNER BROS. 23880-1 \$8.98, © 23880-4 \$8.98.

## Graham Parker Returns To His Peak Form in "The Real Macaw"

**G**RAHAM PARKER'S records since the defection of his back-up band, the Rumour, have had their moments, but by and large it's seemed as if the fight had gone out of him. Parker, who used to rail at the world more convincingly than just about anybody else in rock, increasingly resembled a fading heavyweight champ—like Muhammed Ali in the days when he was battling sumo wrestlers and third-rate palookas. What he was doing didn't seem to matter much.

Parker's new album, "The Real Macaw," shows very nearly a return to his peak form, and it's a pleasure to hear him work again. There's a sense of something important at stake. His new back-up players breathe fire in a way that the superstar sessioneers on the last two albums seemed unwilling to. They don't really sound like the Rumour (although guitarist Brinsley Schwarz used to belong to that band),

but they give the same exhilarating feeling of being just about to careen out of control.

For his part, Parker has written a set of intelligent, unsentimental, adult love songs that are among the most well crafted and believable of his career, and he gives a vocal performance that is nothing less than extraordinary. The depth of feeling, the maturity and subtlety of phrasing, and the easy bravado of it all are close to breathtaking. This music is older and wiser than the stuff that brought Parker to our attention initially. He isn't quite the angry young man any more that he was on "Squeezing Out Sparks." But his songs here offer conclusive proof that growing up need not mean selling out or slackening, and for my money that makes them positively inspirational. I am more than a little curious about what Parker will do next to top them.

Picks to click: the gorgeous, warm-hearted, and reflective *Life Gets Better* and the enigmatic, voodoo-tinged near-instrumental (*Too Late*) *The Smart Bomb*, which begins like a remake for the Eighties of *I Heard It Through the Grapevine* and then veers off into some impressive dance-floor territory of its own. Welcome back, champ.

—Steve Simels

**GRAHAM PARKER: *The Real Macaw*.** Graham Parker (vocals); Brinsley Schwarz (guitar); George Small (keyboards); Kevin Jenkins (bass); Gilson Lavis (drums). *Just Like a Man; You Can't Take Love for Granted; Glass Jaw; Passive Resistance; Sounds Like Chains; Life Gets Better; A Miracle a Minute; Beyond a Joke; Last Couple on the Dance Floor; Anniversary; (Too Late) The Smart Bomb.* ARISTA AL8-8023 \$8.98, © AC8-8023 \$8.98.

## Ivo Pogorelich: Irresistible Imagination and Sweep In Ravel and Prokofiev

**T**HE young Yugoslavian pianist Ivo Pogorelich came to international attention in 1980 by *not* winning a big prize in the Chopin Competition in Warsaw. Martha Argerich resigned from the jury in protest, and Pogorelich's career was made. He soon went to Munich to record for Deutsche Grammophon, producing a Chopin recital record followed in short order by a Beethoven/Schumann package.

Deutsche Grammophon has now released a third album by Pogorelich, coupling Ravel's *Gaspard de la nuit*

## Best of the Month

Recent selections  
you might have missed

### POPULAR

- **Joan Baez: *Very Early Joan***. VANGUARD VSD-79446/7. "... a spellbinding album by one of the most influential... popular artists of our time." (August)
- **Local Hero**. WARNER BROS. 23827-1. "A beautiful, powerfully exciting film soundtrack by Mark Knopfler." (September)
- **Susannah McCorkle: *The People That You Never Get to Love***. INNER CITY IC 1151. "Wonderful songs, wonderful singing." (September)
- **Lou Reed: *Legendary Hearts***. RCA AFL1-4568. "Passionate and inspiring rock-and-roll." (July)
- **Mitch Ryder: *Never Kick a Sleeping Dog***. RIVA RVL 7503. "... a nearly perfect comeback album." (October)
- **Carlos Santana: *Havana Moon***. COLUMBIA FC 38642. "Soulful, fresh, and personal." (August)
- **Simon & Bard Group: *Tear It Up***. FLYING FISH FF 262. "Sophisticated music played with feeling." (July)
- **Mel Tillis: *After All This Time***. MCA MCA-5378. "... one of country music's real vocal masters." (July)
- **Deniece Williams: *I'm So Proud***. COLUMBIA FC 38622. "... a showcase for 'the songbird of soul.'" (October)
- **ZZ Top: *Eliminator***. WARNER BROS. 23774-1. "Hard-rocking, low-riding, sleazy, and funny." (August)

### CLASSICAL

- **Beethoven: *String Quartets Nos. 12-16; Grosse Fuge***. RCA ARL4-4509. "The Cleveland Quartet caps its Beethoven series with another winner." (October)
- **Brahms: *Vocal Ensembles***. DEUTSCHE GRAMMOPHON 2740 280. "Clear, natural singing, marvelous sound." (September)
- **Fauré: *Songs***. ANGEL DS-37893. "A prize selection... from Frederica von Stade." (October)
- **Mozart: *Piano Concertos Nos. 20 and 27***. LONDON CS 7251. "Elegant, passionate, and committed performances from Sir Clifford Curzon..." (August)
- **Mozart: *Opera Arias***. PHILIPS 6514 319. "Marvelous music, gorgeous singing by Kiri Te Kanawa." (July)
- **Mozart: *Symphonies Nos. 31, 35, 38, 40, and 41***. L'OISEAU-LYRE D172DA. "... some of the finest Mozart playing around." (September)
- **Rachmaninoff: *Symphony No. 3; The Isle of the Dead***. DEUTSCHE GRAMMOPHON 2532 065. "Definitive interpretations by Lorin Maazel, stunning digital sound." (July)
- **Schubert: *Piano Sonata in B-flat Major***. HYPERION A66004. "... an exceptional realization of a great work." (August)



Ivo Pogorelich: a striking balance of intensity and subtlety

with Prokofiev's Sixth Piano Sonata, and it is likely to be much less controversial than the pianist's previous DG recordings. It is, in fact, simply irresistible in its imaginativeness and sweep. The Warsaw jury did award Pogorelich a minor prize for "exceptionally original pianistic talent," and that is what is stunningly in evidence here.

In the Ravel cycle Pogorelich seems to have limited his range of colors to varying shades of gray, only occasionally permitting a glimmer of some brighter hue, but the balance of intensity and subtlety is very striking, as it is also in the Prokofiev. The evocative *Ondine* becomes, in Pogorelich's treatment, shattering in its very coolness. In *Scarbo* he finds a terror that goes much deeper than surface excitement, and the dark motionlessness he achieves in *Le Gibet* is downright hair-raising.

As for the Prokofiev Sixth, Pogorelich's recording is the third to come along this year. Only a few months ago, in the July issue of STEREO REVIEW, I welcomed two very powerful recordings of this sonata, which, as I noted then, has generally been in the shadow of the more popular Seventh and more or less ignored by the big-name pianists. Hence it came as no surprise that those two recordings were by young and relatively unknown artists, James Boyk (Performance PR-3) and Peter Donohoe (Angel DS-38010). Pogorelich's is perhaps more sweepingly persuasive than either of them.

The Prokofiev Sixth Sonata has apparently been a specialty of Pogorelich's for some time (an earlier recording of it that he made in Yugoslavia before his Warsaw experience is about to be issued here by Vox), and the intensity he brings to bear in its presentation is manifest more in terms of subtle inflection and an unimaginable range of colors than of raw power. The opening pages sound almost like Scriabin, and at no point is the music allowed to seem predictable. This is not virtuosity for its own sake, but nothing less than total involvement: the music is *alive* from start to finish, without a superfluous note or gesture anywhere, and it both demands and richly repays repeated hearings.

Pogorelich seems to have plunged far beneath the surface in both the Ravel and the Prokofiev, as if determined, without regard for technical challenges, to reach to the music's very core. There may be some disagreement on how close he has come, but there can be very little resistance, I think, to the unique and awesome splendor of these performances. Some listeners may find the sound tending toward brittleness. To my ear it is crisp and clear, and it projects the music effectively without getting in its way. —Richard Freed

**RAVEL: *Gaspard de la nuit*. PROKOFIEV: *Piano Sonata No. 6, in A Major, Op. 82***. Ivo Pogorelich (piano). DEUTSCHE GRAMMOPHON ● 2532 093 \$12.98, © 3302 093 \$12.98.

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# Classical Music

## News Briefs



Leiterwasser/Bayreuth Festival

**A**FTER many years as an RCA recording artist, conductor **James Levine** has gone over to Deutsche Grammophon. For starters at DG he has two major projects with the Vienna Philharmonic—a cycle of all of Mozart's violin concertos, with Itzhak Perlman, and a complete cycle of the Mozart symphonies.

As music director of the Metropolitan Opera, Levine will be especially visible this year and next while he guides that company through its centennial season. He was hailed for a number of conspicuous successes abroad this summer, notably at the Bayreuth Festival, where he conducted Wagner's *Parsifal*, and at Salzburg, where he conducted

Mozart's *The Magic Flute* and *Idomeneo* and Mahler's Seventh Symphony. (Earlier this year Levine's RCA recording of the Mahler work with the Chicago Symphony received one of STEREO REVIEW's Record of the Year Awards.)

Levine's television appearances for this season began in September when he teamed up with **Leontyne Price** for an "In Performance at the White House" program over the PBS network. His TV schedule also has him presiding over the Met's Centennial Gala telecasts October 22 and conducting the company's new production of Verdi's *Ernani* to be telecast by PBS on December 21. □

**R**OUGHLY equivalent to the U.S. Grammy award, the **Edison** is considered to be Holland's most prestigious honor in the field of recorded music. It says something for the scruples of the jury voting for the 1983 classical Edison awards that not one of the prizes went to a recording from Philips Records, which is based in Holland.

London/Decca won two Edisons, one for the recording of Brahms's First Piano Concerto played by **Vladimir Ashkenazy** and the Concertgebouw Orchestra under **Ber-**

**nard Haitink** and the other for Shostakovich's Twelfth Symphony by the same orchestra and conductor (which do happen to be Dutch).

Deutsche Grammophon also won two awards, one for the three-disc set of Handel's *Concerti Grossi*, Op. 6, by **Trevor Pinnock** and the English Concert, and one for an album of Stravinsky songs sung by **Phyllis Bryn-Julson**, **Robert Tear**, and others with accompaniment by **Pierre Boulez** and his Ensemble Intercontemporain. Telefunken received an award for its re-

recording of Mozart's *Prague* Symphony by the Concertgebouw conducted by **Nikolaus Harnoncourt**.

CBS Masterworks received two Edison awards as well. One went to an album of vocal and instrumental music of Schoenberg performed by the Boulez forces mentioned above (three discs, to be released here in 1984), the other to the late **Glenn Gould's** recording of Bach's *Goldberg* Variations, which has already won many other awards.

EMI/Angel won the only Edison given in the opera category. It went to the recording of Ravel's *L'Enfant et les sortilèges* by the London Symphony and vocal forces conducted by **André Previn**. □

**T**HIS year **Julian Bream** is celebrating his fiftieth birthday as well as his twenty-fifth year as an RCA recording artist. The eminent guitarist has nearly forty LP's to his credit on that label, the latest being a two-record addition to his Music of Spain series, available as an import.

The new anniversary set includes works written for the guitarist **Andrés Segovia**.

Bream's salute to that venerable master, and the ever-enduring *Concierto de Aranjuez* by Joaquín Rodrigo. This performance of the Rodrigo concerto, Bream's third in two decades, was recorded digitally with the newly formed Chamber Orchestra of Europe under the direction of John Eliot Gardiner.

Bream's fall tour of North America opens in San Juan, Puerto Rico, on October 26 and moves on through the Midwest to California. There, in Pasadena on November 9, he premieres a birthday piece written for him by the British composer Sir Michael Tippett called *The Blue Guitar*, after a poem by Wallace Stevens. Bream's final tour date is November 22, at Town Hall in New York. □

**A** COUPLE of years ago, when Angel Records released **Ransom Wilson's** album "Pleasure Songs for Flute," the arrangements for several of the folk songs included were credited to **Peter Beste-Chetwynd**, a character in Evelyn Waugh's novel *Decline and Fall*. We pretended not to notice.

Julian Bream (left) with actor Donald Sinden at RCA party



Doug McKenzie/PBS

This year Angel has released an album called "The Magic Panpipes of Mario Moreno." It includes James Last's song *The Lonely Shepherd*, which has been a hit for Romanian panflutist Zamfir on Philips Records. Of the nine other selections on Moreno's album six are credited to one E. Mergency. That's a little hard to ignore. From this album don't expect any hits to emerge. *W.L.*

LONDON RECORDS has announced a new price policy for its opera recordings. The suggested list price per disc on all of London's digital opera sets has been reduced from \$12.98 to \$10.98 and on analog sets from \$10.98 to \$9.98. The price reduction applies to LP's and cassettes and to all existing catalog titles as well as to new releases. Among the

latter are recordings of Janáček's *Jenufa* with Elisabeth Söderström and Lucia Popp and Boito's *Mefistofele* with Luciano Pavarotti and Montserrat Caballé. □

ONLY one copy of a new album by electronics whiz kid Jean-Michèle Jarre was manufactured, and the lacquer from which it was pressed was ceremoniously destroyed when that edition of one went up for auction in Paris this summer. The idea, according to Jarre, whose albums usually sell in the millions, was "to produce a single copy for a single buyer, just like a painting." The ironic title: "Music for Supermarkets." In the end the record went for \$9,000, half of which was used to cover expenses and the other half donated to UNICEF. □



Ronald Pickup as Verdi in *The Life of Verdi* on PBS

SOME of the top recording artists of the present and recent past are highlighted in six programs about *The Life of Verdi*, beginning on PBS on October 24 and running through November 28. Fea-

tured among the network's Great Performances this fall and made possible in part by Exxon, the Verdi series stars British actor Ronald Pickup as the composer. The narrator is Burt Lancaster. □

## Disc and Tape Reviews

By RICHARD FREED • DAVID HALL • GEORGE JELLINEK  
STODDARD LINCOLN • ERIC SALZMAN

**J. S. BACH: *Sonatas for Viola da Gamba and Harpsichord (BWV 1027-1029)*.** Yo-Yo Ma (cello); Kenneth Cooper (harpsichord). CBS ● IM 37794, © IMT 37794, no list price.

Performance: **Stylish**  
Recording: **Good**

**J. S. BACH: *Sonatas for Viola da Gamba and Harpsichord (BWV 1027-1029)*.** Nathaniel Rosen (cello); Anthony Newman (harpsichord). VOX CUM LAUDE VCL 9020 \$8.98, © VCS 9020 \$8.98.

Performance: **Square**  
Recording: **Good**

While it is possible to achieve a balanced sound in Bach's sonatas for violin and harpsichord and for flute and harpsichord using modern instruments, it is impossible to do so in the gamba sonatas using a modern cello. All you hear is the lush string sound with a frustrating tinkle in the background. If cellists insist on playing these works, let them use a piano for accompaniment so we poor listeners can at least hear both parts!

### Explanation of symbols:

- = digital-master analog LP
- Ⓢ = stereo cassette
- Ⓢ = digital Compact Disc
- Ⓢ = eight-track stereo cartridge
- Ⓢ = direct-to-disc recording
- Ⓢ = monophonic recording

The first listing is the one reviewed; other formats, if available, follow it.

That general criticism aside, of these two releases the one by Yo-Yo Ma and Kenneth Cooper is the less objectionable because Ma and Cooper play with some knowledge of Baroque style and keep things moving. The performances by Nathaniel Rosen and Anthony Newman, in contrast, are rather square and heavy-handed. *S.L.*

**BEETHOVEN: *Violin Concerto in D Major, Op. 61*.** Yehudi Menuhin (violin); Leipzig Gewandhaus Orchestra, Kurt Masur cond. ANGEL ● DS-37890 \$12.98, © 4XS-37890 \$12.98.

Performance:  
Recording:

Throughout the five-and-a-half decades since Yehudi Menuhin played the Beethoven Violin Concerto, at the age of eleven, with the old New York Symphony under Fritz Busch, it has been the concerto with which he has been most closely identified. He did not get around to recording it until after World War II, but then he made no fewer than four recordings of it by the time he turned fifty—two with Furtwängler in mono, a stereo version with Constantin Silvestri and the Vienna Philharmonic, and a later one with Otto Klemperer and the New Philharmonia. The orchestral contribution in this fifth effort is perhaps the most impressive of all, gloriously Beethovenian and enhanced by the rich digital recording.

That much said, it must be added that, for all the burnished Beethoven nobility and warmth—and both qualities are evident in abundance—only the first movement here is fully competitive with Menuhin's own

earlier recorded performances, not to mention those by Milstein, Heifetz, Suk, Grumiaux, Perlman, Stern, *et al.* The last two movements are taken so slowly here that momentum is barely sustained in the *Larghetto* and simply disappears in the finale. One can only wonder how this may have sounded to the performers themselves, both during the session and in playback. In any event, it came as a letdown after the real exaltation of the first movement, and I suspect most listeners would be put off by the total lack of exuberance.

Fortunately, two of Menuhin's earlier recordings of the Beethoven concerto are still available, and at about half the price of this new one. The second of the two with Furtwängler, recorded with the Philharmonia in 1953 (on Seraphim), is the one, I think, that gives us Menuhin's Beethoven at its overall best, with a more beguiling sweetness in his tone as well as a greater sense of momentum than we find in his newest recording. It is a superb statement of the work by any standards, and the sound is still more than respectable. *R.F.*

**BEETHOVEN: *Symphony No. 6, in F Major, Op. 68 ("Pastoral")*.** Y Chamber Symphony of New York, Gerard Schwarz cond. DELOS ● DMS 3017 \$17.98.

Performance: **Brisk and flowing**  
Recording: **Excellent**

As Gerard Schwarz indicates in his jacket notes for this album, Beethoven's First and his even-numbered symphonies gain much in clarity of texture and rhythmic liteness when performed by orchestral forces like



Nancy Crampton

## Happy Birthday, Elliott Carter

**E**LLIOTT CARTER composed his *Night Fantasies* in 1980 on a joint commission from the four pianists to whom he dedicated the score: Paul Jacobs, Gilbert Kalish, Ursula Oppens, and Charles Rosen. The first and last of these four are represented now with recordings of the work; Oppens probably will not be, since Jacobs credits her with "cheerful encouragement" during his session for Nonesuch, nor is Kalish likely to be, since Nonesuch is his label too. All four pianists have been associated with Carter's music for years. Carter coached Jacobs in the new work, was present at his recording sessions, and wrote a note for the record jacket, to which Jacobs appended one of his own; Rosen wrote his own notes. Both Rosen and Jacobs pair *Night Fantasies* with Carter's much earlier Piano Sonata (1945-1946), which they have both performed frequently.

According to Carter's brief description, *Night Fantasies* "is a piano piece of continuously changing moods, suggesting the fleeting thoughts and feelings that pass through the mind during a period of wakefulness at night. . . . I wanted to capture the fanciful, changeable quality of our inner life at a time when it is not dominated by

strong, directive intentions or desires—to capture the poetic moodiness that, in an earlier romantic context, we enjoy in works of Robert Schumann [such as] *Kreisleriana*, *Carnaval*, and *Davidstünderlertänze*."

Clearly, both of these recorded performances may be considered authoritative, even if neither can be called "definitive." Jacobs is somewhat more expansive—in both works—and Rosen a bit more tightly focused and analytical. Between the two of them, I feel there can be little left unsaid on either work, and both are vividly recorded. Everyone at all interested in the music of our time or music of American composers ought to have one or the other of these fine records, whose appearance together must constitute one of the more significant tributes to the composer on the occasion of his seventy-fifth birthday on December 11.

—Richard Freed

**CARTER: *Night Fantasies; Piano Sonata*.** Paul Jacobs (piano). NONESUCH ◉ D-79047 \$11.98, © D4-79047 \$11.98.

**CARTER: *Night Fantasies; Piano Sonata*.** Charles Rosen (piano). ETCETERA ETC 1008 \$10.98, © XTC 1008 \$10.98.

those current in Beethoven's day rather than by hundred-piece aggregations with doubled woodwinds. Neville Marriner with the Academy of St. Martin-in-the-Fields and Michael Tilson Thomas with the English Chamber Orchestra have given us such authentic-scale recordings of all but No. 8, and now Schwarz offers another of No. 6. Compared with Tilson Thomas's, this recording benefits most from the digital mastering and the fine acoustic surround of New York's Masonic Temple Auditorium.

Schwarz's *Pastoral* is almost manically

exuberant in the first movement. "Arrival in the Country," which is imbued with lovely flow and transparency in the brook scene (the concluding bird calls have a pristine freshness and clarity), and his peasant dancers in the third movement are limned with more than usual dynamic finesse. The depiction of the storm is not aimed at blowing out your speaker cones but rather toward elucidating the music's harmonic and textural substance. The ample impetus carries over very nicely into a splendidly flowing thanksgiving finale. *D.H.*

### RECORDING OF SPECIAL MERIT

**BRITTEN: *Our Hunting Fathers, Op. 8; Six Folk Song Arrangements*.** Elisabeth Söderström (soprano); Welsh National Opera Orchestra, Richard Armstrong cond. EMI/ANGEL ASD 4397 \$12.98, © TCC-ASD 4397 \$12.98 (from International Book & Record Distributors, 40-11 24th Street, Long Island City, N.Y. 11101).

Performance: **Very good**

Recording: **Excellent**

*Our Hunting Fathers* was written in 1936 by the twenty-three-year-old Benjamin Britten to poems by W. H. Auden, who was himself only six years older. It was conceived as a three-part orchestral song cycle, with prologue and epilogue, on the subject of man's treatment of (or cruelty toward) animals. Although it bears the opus number 8, Britten regarded it as his first mature work, his "real Opus 1." It is a flawed yet haunting and undeniably striking composition. Auden's poetry is frequently too oblique to make an immediate impact on the listener, and Britten's tendency toward the grotesque (a Shostakovich influence?) at times obscures his ultimate intentions. His command of the orchestra as an expressive tool, however, was already phenomenal. The record is worth hearing for that reason alone.

This highly unconventional cycle places enormous interpretive demands on the singer, and Elisabeth Söderström responds to them with her unique brand of commitment and an ever-alert imagination. On the reverse side she performs six totally uncontroversial and quite irresistible Britten folk-song arrangements in their quite unfamiliar orchestral settings. Again, the orchestrations are brilliant, and the singing is full of subtle insights and descriptive power. The excellent work of the Welsh orchestra is captured in lively and sharply detailed sound. *G.J.*

### RECORDING OF SPECIAL MERIT

**EKG: *Peer Gynt*.** Roland Hermant (baritone), Peer Gynt; Norma Sharp (soprano), Solveig; Janet Perry (soprano), Ingrid; Kari Lövaas (soprano), Redhead; Cornelia Wulkopf (contralto), Aase; Hans Hopf (tenor), Old Man; others. Chorus of the Bavarian Radio; Munich Radio Orchestra, Heinz Wallberg cond. ORFEO ◉ S 005823 F three discs \$41.94 (from Harmonia Mundi USA, 2351 Westwood Boulevard, Los Angeles, Calif. 90064).

Performance: **Good**

Recording: **Excellent**

Werner Ekg died at eighty-two earlier this year, just about the time his second opera, *Peer Gynt*, reached worldwide distribution through this recording, a project he supervised. Back in 1938, when the opera was introduced in Berlin, it was attacked by some Nazi zealots for its allegedly anti-regime tendencies, but Hitler saw it, liked it, and that was that.

Ibsen's *Peer Gynt*, like Goethe's *Faust*, which it resembles in several aspects, is a drama too monumental in dimensions to be treated operatically in its entirety. Edvard Grieg was certainly wise in limiting his treatment (1876) to incidental music, all



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the more so since the sweet, romantic music he wrote rarely represented the play's harsh, bitter spirit of rebellion. Egk's vision was not beclouded by that kind of romanticism, but, in his brave attempt to create an opera, he was forced to eliminate many of Ibsen's episodes and even invent a few others. The music is essentially conservative for the period, and quite eclectic: a bit of Richard Strauss, an indebtedness to Stravinsky in the many sharply rhythmic episodes, and echoes of Kurt Weill in the jazz-tinged, tawdry cabaret scenes (though Egk rarely favored the dry orchestral sounds of Stravinsky and Weill). The evocation of the Offenbach cancan in the Troll Scene seems more like purposeful parody than unconscious imitation. At times the music is quite melodious, for example in the poignant closing scene where, after a series of wild adventures, Peer finds serenity at the side of the faithful Solveig.

The opera is somewhat lopsided in its construction. The first act promises a great deal with its frantic introductory scene and its nightmarish vision of the troll kingdom. The brief second act, however, is something of a letdown. I was left wishing for more evidence of Peer's misdeeds, for offenses demonstrated rather than merely implied, to justify the rather effective scene of judgment and contrition in Act III. Just the same—and even allowing for a certain amount of rather obvious moralizing, somehow made even more explicit by the composer's own rhymed libretto—there is considerable theatrical imagination at work

here. Egk was a composer who had a knowledge of stagecraft, who could combine singing and pantomime to good effect, and who could write colorful orchestral interludes to bind his fast moving scenes together. In *Peer Gynt* he wrote a stageworthy and singable opera, which can't be said for more than a few written in the last fifty years.

Roland Hermann sings the title role, a tour de force if there ever was one, with a manic intensity. His baritone is powerful and wide-ranging, though the glottal attacks he employs seem manneristic. Three good sopranos are enlisted for the arduous vocal tasks assigned to the ladies in the hero's life—the abused Ingrid, the seductive Redhead, and the loyal Solveig—but the Aase is not as strong as she ought to be. In the role of the Old Man (really the Troll King and Peer's nemesis), the veteran Hans Hopf, born in 1916, is ideally cast: a robust tenor who *sounds* old. Heinz Wallberg and his Munich forces play with distinction, and the sound is magnificent. *G.J.*

#### RECORDING OF SPECIAL MERIT

**GRIEG: *Peer Gynt, Incidental Music, Op. 23***. Lucia Popp (soprano): Ambrosian Singers; Academy of St. Martin-in-the-Fields, Neville Marriner cond. ANGEL DS-37968 \$12.98, © 4XS-37968 \$12.98.

Performance: **Distinguished**  
Recording: **Brilliant**

The Unicorn-Kanchana two-disc recording of all thirty-two numbers of Grieg's *Peer*

*Gynt*, with Per Dreier conducting soloists, chorus, and orchestra, remains in a class by itself, but Neville Marriner here gives us the twelve familiar numbers in the two concert suites in proper dramatic order. One of the striking differences made by this arrangement is that the festive Prelude to Act I is followed by the Wedding March and then the abduction music in the Act II Prelude, in which the opening theme is transposed into a minor tonality. Marriner's reading of the first prelude is taut and brisk, and he avoids heavy-handedness in the Halvorsen orchestration of "Wedding Day at Troidhaugen" immediately following. The music of the abduction and lament is tensely dramatic, and the famous "In the Hall of the Mountain King" gets about the most vivid musical treatment and sound I've heard yet, with the Ambrosian Singers making a most barbaric impression. The grotesque "Dance of the Mountain King's Daughter" is highly graphic, and "Aase's Death," so often sentimentalized, here achieves an almost Tchaikovskian intensity at its climax.

The "Morning Mood" music is unclinging, for once, and the "Arabian Dance" takes on fresh life with the addition of chorus and soprano soloist. "Anitra's Dance" is grace itself, again without oversweetness. The storm music attendant on Peer Gynt's return usually sounds pretty ordinary, but Marriner gives it an additional measure of grit and spray. I leave to the last Lucia Popp's performance in the two songs of the long-waiting and long-suffering Solveig.

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#### RECORDING OF SPECIAL MERIT

**HANDEL: *The Triumph of Time and Truth*.** Gillian Fisher (soprano), Beauty; Emma Kirkby (soprano), Deceit; Charles Bret (countertenor), Counsel, or Truth; Ian Partridge (tenor), Pleasure; Stephen Varcoe (baritone), Time; London Handel Choir and Orchestra, Denys Darlow cond. HYPERION A66071/2 two discs \$27.96 (from Harmonia Mundi USA, 2351 Westwood Boulevard, Los Angeles, Calif. 90064).

Performance: **Sheer delight**  
Recording: **Excellent**

Originally written in Italy in 1707, expanded in 1737, translated into English and furnished with further additions in 1757 and 1758, Handel's *The Triumph of Time and Truth* draws on music from some twenty previous works. But this is no hodgepodge; Handel constantly reworked his material, finally producing a stylistically consistent piece filled with exquisitely delicate music. Being an allegory, the work lacks the drama of Handel's better-known oratorios and operas, but this is offset by the constant feeling of jaunty divertissement as Beauty is persuaded to abandon the ways of Pleasure and Deceit to take up the mirror of Time

and Truth. What could be dull moralizing is, surprisingly, sheer delight.

The performance too is delightful. The clear, delicate sounds of the old instruments and the singers' use of a light, natural manner of vocal production serve to remove us from earthly reality into a never-never world of fragile beauty spiced with witty observation. All the singers are excellent, but Stephen Varcoe as Time is particularly so with his flowing baritone, exquisite diction, and sense of style. Both the chorus and orchestra perform with clarity, and the reading is perfectly paced by conductor Denys Darlow. The music reveals a little-known facet of Handel's genius, and it's hard to imagine a better performance. *S.L.*

**HAYDN: *Symphony No. 84, in E-flat Major; Symphony No. 85, in D Major ("La Reine")*.** Berlin Philharmonic, Herbert von Karajan cond. DEUTSCHE GRAMMOPHON 2532 038 \$12.98, © 3302 038 \$12.98.

Performance: **Strong**  
Recording: **Excellent**

Despite the un-Classically large forces of the Berlin Philharmonic, these two Haydn symphonies, written for Paris, sound splendid in this recording. Herbert von Karajan's readings are rhythmically strong, well accentuated, and full of dynamic contrast. The minuets are on the slow side and perhaps rather too elegant, but the slow movements are beautifully poised and the finales are wonderfully spirited. This is some of Karajan's best Haydn. *S.L.*

#### RECORDING OF SPECIAL MERIT

**LISZT: *Hungarian Rhapsody No. 12, in C-sharp Minor; Liebestraum No. 3; Mephisto Waltz No. 1; Funérailles; Concert Paraphrase of Verdi's Rigoletto Quartet; La Campanella*.** Jorge Bolet (piano). LONDON ① LDR 71096 \$12.98, © LDR5 71096 \$12.98.

Performance: **Superb**  
Recording: **Transparently lifelike**

Jorge Bolet has already made several outstanding recordings of the music of Liszt, though not all of them are available now. This is his first to be recorded digitally, and it represents a departure from the "genre collections" of the past, such as the full disc of operatic transcriptions he recorded for RCA (LSC-3259, now deleted) and the more recent Oiseau-Lyre album of five concert studies (DSLO-41). Here we have sets of related works that are represented by a single item apiece. Thus, instead of a full program of Hungarian Rhapsodies, we have only No. 12, in a performance of commanding authority and incomparable freshness. The *Rigoletto Paraphrase* is the only operatic transcription—a little tighter in performance and much more vivid in its sound than the earlier recording on RCA. Similarly, only the best-known of the *Liebesträume* and the *Mephisto* pieces and the *Grandes études de Paganini* are included, while *Funérailles* represents the *Harmonies poétiques et religieuses*. This sort of programming works in a recital hall, and it

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works on records—particularly on this one, with Bolet so unarguably at the very top of his Lisztian form.

Although London has labeled the album "Virtuoso Liszt," there is no question here of virtuosity as an end in itself. *Funérailles* comes through as awesome, exalted, profoundly tragic, and altogether noble. Delicacy and poignancy are balanced against irruption in the *Mephisto Waltz*. And *La Campanella* demonstrates most pointedly that fastidiousness need not reduce excitement. The clarity of Bolet's playing can be especially well appreciated in London's transparently lifelike recording, which I would consider an indispensable one for lovers of this repertoire.

R.F.

#### RECORDING OF SPECIAL MERIT

**MAHLER: *Symphony No. 2, in C Minor ("Resurrection")***. Kathleen Ferrier (contralto); Jo Vincent (soprano); Concertgebouw Chorus and Orchestra, Otto Klemperer cond. DECCA © D264D 2 two discs \$17.98 (plus \$2.10 postage and handling, from Mode Record Service, P.O. Box 375, Kew Gardens, N.Y. 11415).

Performance: **Remarkable**  
Recording: **Surprisingly good**

Other than informing us that this recording was transferred from 78-rpm discs (not tape, surprisingly) of a July 12, 1951, broadcast performance from the Holland Festival, the album notes for this British Decca issue supply no explanation for its release more than thirty years after the event. But the extraordinary music making on these four sides, uniquely enhanced by the voices of legendary contralto Kathleen Ferrier and soprano Jo Vincent, who from the early 1930's was one of Holland's finest singers, in a certain sense makes further explanation superfluous.

"White hot" would be the most apt description of this performance of the Mahler *Resurrection* Symphony, done in the same year as Klemperer's Vienna studio recording for the first LP issue of the symphony (on Vox, still available as Turnabout THS 65087/8). The first movement is no solemn

*Totenfeier* ("Death Celebration") after the manner of Bruno Walter or Klaus Tennstedt. Tennstedt's reading takes almost twenty-five minutes, while Klemperer's is a ferocious Faustian struggle with destiny encompassed in the space of just under eighteen. The second-movement *Ländler*, in contrast, is handled with the utmost tenderness and a delightful touch of Mahlerian portamento at the right spots. The *St. Anthony* scherzo moves along at just the right pace, and Klemperer's use of portamento in the cellos lends an extra note of savage irony. The slow middle section is projected in an unusually lightheaded and transparent fashion.

Ferrier sings the famous *Urlicht* soprano solo with an intensity unmatched by any other performance I have heard on or off discs (Janet Baker's rapt interpretation for the Leonard Bernstein Ely Cathedral performance of 1974 is also of matchless quality, but in a different style). As in the first movement, the apocalyptic orchestral events of the finale move swiftly under Klemperer's direction. Solemnity is reserved for the choral utterances, which are done in superb fashion. Again Ferrier stands out in the great "O gläubige" solo, but Jo Vincent, rather than being eclipsed the way most sopranos are in this work, emerges with striking character. In the duet that precedes the final chorus, Vincent combines with Ferrier to produce a musical experience that is truly more than the sum of its parts.

For a 1951 public-performance recording, especially one taken from a 78-rpm disc, the sound is surprisingly good. As might be expected in a broadcast situation, the balances within the orchestra are sometimes less than perfect. Excessively prominent trumpets and overbearing timpani are among the more obvious faults, but Klemperer's musical message comes across with extraordinary vividness nonetheless. Orthodox Mahler in the end movements this is not, but taken on its own terms—and as an example of the value of public-performance recordings as documents of performance practices by major artists—this album is a very special contribution.

D.H.

#### RECORDING OF SPECIAL MERIT

**MENDELSSOHN: *Piano Trio No. 1, in D Minor, Op. 49; Piano Trio No. 2, in C Minor, Op. 66***. Kalichstein-Laredo-Robinson Trio. VOX CUM LAUDE Ⓢ D-VCL 9040 \$10.98, © D-VCS 9040 \$10.98.

Performance: **Endearing**  
Recording: **Rich and vivid**

There could hardly have been a happier choice for the debut recording of the Kalichstein-Laredo-Robinson Trio than Mendelssohn's piano trios. The music suits the players down to the ground and brings forth the sort of commitment that presents the most appealing image of a solid and permanent entity, a whole at least a bit greater than the sum of its parts. Pianist Joseph Kalichstein may not quite match Eugene Istomin's pearly elegance in the C Minor Trio (CBS M 35835), nor is Sharon Robinson's cello as eloquent as Leopold Rose's in the opening scherzo of the more familiar D Minor (*ibid.*) or as firmly present in the underpinning of that work's quicksilver scherzo. But Kalichstein brings an elegance of his own to delineate both the style and the very foundation of these performances, and that scherzo, which might well have been a scramble at the heady pace favored here, is one of the particularly impressive—and endearing—segments of the new release. It is as truly *leggiero* as it is *vivace*, the essence of that peculiar balance of spontaneity and fastidiousness that is Mendelssohn's alone.

Jaime Laredo's silky violin tone never fails him, even in the most fiery passages. But the individual playing, consistently on a very high level, is almost incidental to the stimulating sense of give-and-take that makes for the deepest pleasures in chamber music: the three players seem to be listening to and responding to each other with every collective breath. While I'd have liked a little more cello presence here and there, the balance between the three instruments is exceptionally natural, and the rich, vivid recording enhances the fine performances honestly.

R.F.

(Continued on page 84)

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## The Light Blues

**T**HE LIGHT BLUES consists of six male singers who met at King's College, Cambridge, a school whose musical traditions have been well represented on records. It is a splendid ensemble, and its new Hyperion album, "Tour de France," is distinguished by an imaginative choice of repertoire as well as by superb performances. The rich blend in Debussy's *Trois chansons de Charles d'Orléans* and the rhythmic acuity in Poulenc's folk-song settings, *Chansons françaises*, remarkable enough in their own right, would have meant little if the singers had not also shown the most assured French pronunciation and a total involvement with the meanings of the words. The five songs by Saint-Saëns that complete the disc (two of them settings of his

own texts) glow with the bright freshness of discovery. Listeners who think unaccompanied vocal ensembles are not for them may be happily surprised by the Light Blues. The recording itself is of demonstration class, and the surfaces are quiet enough to pass for a CD. —Richard Freed

**THE LIGHT BLUES:** *Tour de France*. Debussy: *Trois chansons de Charles d'Orléans*. Poulenc: *Chansons françaises*. Saint-Saëns: *Sérénade d'hiver*; *Les Fleurs et les arbres*, Op. 68, No. 2; *Les Marins de Kermor*, Op. 71, No. 1; *Calme des nuits*, Op. 68, No. 1; *Saltarelle*, Op. 74. The Light Blues. HYPERION ◉ A66059 \$13.98 (from Harmonia Mundi USA, 2351 Westwood Boulevard, Los Angeles, Calif. 90064).

**MOZART:** *Piano Concerto No. 9, in E-flat Major (K. 271)*; *Piano Concerto No. 17, in G Major (K. 453)*. Rudolf Serkin (piano); London Symphony Orchestra, Claudio Abbado cond. DEUTSCHE GRAMMOPHON ◉ 2532 060 \$12.98, © 3302 060 \$12.98.

Performance: **Undervitalized**  
Recording: **Generally good**

Some months ago the first installment in Rudolf Serkin's new Mozart concerto series with Claudio Abbado, a pairing of Nos. 12 and 20 (Deutsche Grammophon 2532 053), was given an enthusiastic welcome in these pages ("Best of the Month," February 1983). The way Serkin, then nearing the completion of his eightieth year, made every phrase glow with life made that disc welcome not only in its own right but as an implicit promise of what was to follow. That promise is not entirely fulfilled in the new

release of Nos. 9 and 17. The Concerto No. 9, the first of Mozart's truly great piano concertos and the true progenitor of the Romantic concerto as well, seems conspicuously deficient in the glowing vitality so abundant on Serkin's earlier DG disc and in his cherishable old CBS mono recording of the work with Alexander Schneider conducting. The central andantino, spun out to nearly sixteen minutes, does sustain the extra weight thus thrust upon it, but the outer movements are devitalized and devoid of sparkle and momentum, creating a context in which the minuet with variations inserted in the finale seems not merely poignant but virtually elegiac.

The G Major Concerto fares better, but again it is the slow movement that comes off best, and again Serkin's earlier version with Schneider (in this case a very bright stereo recording, also on CBS, paired with

an especially fetching account of No. 14 in E-flat) is more fully satisfying. It goes without saying that nothing this great musician offers is without value, but there is a great deal more pleasure to be had from his earlier recordings of both these works. Abbado, for his part, provides well-integrated accompaniments without contributing much in the way of impulse. The sound on both long sides—K. 271 here runs nearly thirty-nine minutes, K. 453 nearly thirty-three—is quite good, though the winds are not too well defined in the finale of the G Major Concerto. R.F.

### RECORDING OF SPECIAL MERIT

**MOZART:** *String Quartet No. 20, in D Major (K. 499)*; *String Quartet No. 21, in D Major (K. 575)*, Guarneri Quartet, RCA ARL1-4687 \$9.98, © ARK1-4687 \$9.98.

Performance: **Exceptionally sensitive**  
Recording: **Warm and bright**

All of Mozart's mature string quartets are marked by a certain contemplative quality, and those that came after the famous half-dozen dedicated to Haydn seem pervaded by a gentle sense of melancholy. This is reflected in the tempo markings of the two works on this disc: both first movements and one of the two finales are marked *allegretto* rather than *allegro* or anything more dashing. The opening of K. 575 as played here by the Guarneri Quartet may strike some listeners as extremely cautious—more of an *andantino* than an *allegretto*, perhaps—but you sense soon enough that it is not caution but subtly restrained passion that informs this movement and indeed the whole of both performances, which may well be the most completely satisfying the quartet has yet put on a record. (They were actually recorded some fifteen years ago, at the same time as a now-deleted disc of the last two Mozart quartets.) The slow movements are especially sensitive, and the recorded balance, slightly favoring the viola and cello, rather agreeably enhances the mellow "sunset" quality that suits these works so well. RCA's sound is appropriately warm and bright. R.F.

**MUSSORGSKY/RAVEL:** *Pictures at an Exhibition*. RAVEL: *Le Tombeau de Couperin*. Dallas Symphony Orchestra, Eduardo Mata cond. RCA ◉ ARK1-4573 \$12.98, © ARK1-4573 \$12.98.

Performance: **Very good**  
Recording: **Very good**

In some respects Eduardo Mata's treatment of the Mussorgsky/Ravel *Pictures* is almost idiosyncratic, yet one can sense a rationale. Mata seems intent on getting away from the usual virtuoso-showcase approach in order to give us a really vivid presentation of these musical-artistic images. He uses flexible tempos that, with a few exceptions, stay within reasonable musical parameters, and much of the time his approach works.

Among the more successful sections are "Gnomus" and "Tuileries," with the dialogue element in the latter especially well handled. On the other hand, the "Bydlo" oxcart sounds more like an overlaid sixteen-wheeler straining up a long grade. But the chicks are altogether delectable, and the solo trumpet in the "Two Jews" episode is

just wonderful. Mata shines too in the poignant lamentation in "Catacombs," and the silent background afforded by digital mastering allows the *tremolando* depicting the glowing skulls to be more than usually effective, as is the interesting use of *accelerando* at the opening of "The Hut on Fowls' Legs." Mata's opening for "The Great Gate at Kiev" is unexpected, stressing a dark tonal coloration in the brass to begin with, then switching on all the lights, so to speak, at the repetition. This may not be everyone's reading of the *Pictures*, but except for one or two miscalculations, it certainly held my interest.

While the Dallas Symphony is not generally accounted among the big-league orchestras, its account here of Ravel's delicately textured *Le Tombeau de Couperin* is highly creditable in every respect, notably in the Prélude and Menuet. The sound throughout is clean and full-bodied. *D.H.*

**POULENC:** *Sonata for Oboe and Piano; Trio for Oboe, Bassoon, and Piano; Sextet for Wind Quintet and Piano.* Ronald Roseman (oboe); Donald MacCourt (bassoon); New York Woodwind Quintet; Gilbert Kalish (piano). **NONESUCH** 1-79045 \$11.98, © 4-79045 \$11.98.

Performance: **Pollished**  
Recording: **Very good**

The idea of splitting a really brief work across the two sides of a disc is hard to accept in the sort of program offered here, which has Poulenc's fourteen-minute trio so

divided. Those who can accept the gratuitous sandwich will find handsome performances of all three works on this record, and of the trio in particular. Ronald Roseman brings a steadier, richer tone to the Oboe Sonata than Pierre Pierlot, whose recording with Jacques Février, made just after they gave the work's première, is on an earlier Nonesuch disc (H-71033); Roseman and Kalish also make a bit more of the outer movements' elegiac nature (the sonata, Poulenc's last major work, bears a dedication to the memory of Prokofiev). The much earlier sextet for piano and winds is less spontaneous-sounding here than in some earlier recordings, but it shows no lack of polish. The playing throughout this disc is first-rate, as is the sound. *R.F.*

**PROKOFIEV:** *Piano Sonata No. 6* (see **Best of the Month**, page 73)

**PROKOFIEV:** *Symphony No. 1, in D Major, Op. 25 ("Classical"); Lieutenant Kijé Suite, Op. 60; The Love for Three Oranges, Suite, Op. 33a.* London Philharmonic Orchestra, Enrique Bátiz cond. **ANGEL** DS-37960 \$12.98, © 4XS-37960 \$12.98.

Performance: **Brilliant**  
Recording: **Same**

These three popular Prokofiev works have understandably drawn the attention of virtuoso conductors and orchestras from Koussevitzky and Reiner to the present, and all three are currently available together on stereo discs by Eugene Ormandy and the

Philadelphia Orchestra and by Neville Marriner with the London Symphony, which puts Enrique Bátiz up against some stiff competition.

Bátiz's reading of the *Classical* Symphony strikes me as being somewhat studied and in the slow movement even staid. Only in the very neatly executed finale (with notable clarity of the inner textures) do we get any sense of the fun inherent in this music. The performances of the two suites go all out for brilliance and fine detail, with sometimes striking, sometimes disappointing results. I would have liked more savagery and drive in the infernal scene from *The Love for Three Oranges*, and I did expect a more extroverted treatment of the Troika movement from *Lieutenant Kijé*. On the other hand, it is in the *Kijé* suite that the sonics are most impressive. If you like to hear the extremes of the tonal spectrum with maximum transient impact, the "Wedding of Kijé" episode here is a treat.

In general, producer Brian Culverhouse has favored a very broad sonic picture; ultra-spacious and brilliant. It works well a good part of the time, but the sound also tends to blur in the full orchestral climaxes, hiding their busy inner workings. *D.H.*

**RACHMANINOFF:** *Rhapsody on a Theme of Paganini* (see **SAINT-SAËNS**)

**RAVEL:** *Gaspard de la nuit* (see **Best of the Month**, page 73)

(Continued on next page)

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## Mezzo Carolyn Watkinson

**M**Y only previous exposure to the young English mezzo Carolyn Watkinson was when I heard her singing the title role in the CBS recording of Handel's *Rinaldo* (M3 34592) a few years ago. I was impressed then, but on the strength of her new recital album on the enterprising Dutch Etcetera label, excellently recorded in concert at London's Wigmore Hall in November 1982, I can now see her as a worthy successor to Kathleen Ferrier and Janet Baker. Of those two illustrious predecessors, Watkinson is more reminiscent of the latter, since she lacks Ferrier's voluptuous contralto

timbre. She lacks very little else, however. Her tone is lovely and well centered, warmly vibrant and easy in extension. She enunciates clearly in all languages and knows how to color her phrases. Virtuoso effects per se are not sought here, but Watkinson's secure technique clears the way for natural-sounding and effortless interpretations.

The recital starts out auspiciously with three charming Bizet songs, all winners. (*Sérénade* turns out to be the brief tenor romance "De mon amie" from *The Pearl Fishers*, and it works just fine in this context.) The Brahms songs spring from the folkloric well; Watkinson builds *Von ewiger Liebe*, the best of the group, to a fine climax. The early Dvořák and Berg cycles form an interesting juxtaposition. The Dvořák set displays their composer's expected charm without too much special identity. The first three of the Berg songs, although in free tonality, pursue an inward and contemplative course and are sung here with sensitivity and absolute security as the artist tightens her vibrato to good expressive effect; the fourth song calls for a near *Sprechstimme*. The Ives group contains two audience-pleasing non-songs as well as the witty *Walking*, the sardonic *Grantchester*, and the wistful *Tom Sails Away*, with its poignant World War I sentiment. All are imaginatively done.

Carolyn Watkinson will go places, and when she does she should take her fine accompanist Tan Crone with her. For a live recital, the audience intrusion is minimal. In all, a very satisfying record.

—George Jellinek

**CAROLYN WATKINSON: Recital at Wigmore Hall.** Bizet: *Chanson d'avril; Sérénade; Les Adieux de l'hôtesse arabe.* Brahms: *Treue Liebe; Mädchenlied I and II; Das Mädchen spricht; Von ewiger Liebe.* Dvořák: *Four Songs, Op. 2.* Berg: *Four Songs, Op. 2.* Ives: *Walking; Grantchester; Tom Sails Away; The Cage; The Side-Show.* Trad: *The Water of Tyne.* Carolyn Watkinson (mezzo-soprano); Tan Crone (piano). ETCETERA ETC 1007 \$10.98, © XTC 1007 \$10.98.

**RAVEL: Le Tombeau de Couperin** (see MUSSORGSKY/RAVEL)

### RECORDING OF SPECIAL MERIT

**ROREM: The Nantucket Songs.** Phyllis Bryn-Julson (soprano); Ned Rorem (piano). *Women's Voices.* Katherine Ciesinski (mezzo-soprano); Ned Rorem (piano). COMPOSERS RECORDINGS, INC. SD 485 \$8.95.

Performance: **Authentic**  
Recording: **Very good**

These two song cycles have a great deal in common: both are miscellaneous collections of texts dealing with vastly different subjects and states of mind; neither has a dramatic or lyric thread except for the composer's own sensibility in arranging the texts and putting music to them. *Women's*

*Voices*, settings of poems by women ranging from Anne Boleyn to Christina Rossetti to Adrienne Rich, was written earlier, in 1975. The songs are more personal and inward in feeling than the *Nantucket Songs*, written in 1978-1979 for Phyllis Bryn-Julson on a commission from the Elisabeth Sprague Coolidge Foundation. The *Nantucket Songs* are, as Rorem says, in a more popular and entertaining vein—more emotional, he adds, than intellectual. But it is *Women's Voices* that seems to me more intensely emotional. The songs in the later cycle are more objectified, more "set," more shared. At any rate, both cycles are striking. Neither Rorem's so-called conservatism nor his Francophilism seems like a big issue any more. What carries now is the lyric quality of the settings.

Both performances are commendable, although I wish that gifted art singers like

these would develop a more informal, Americanized sound for music like this. It would make the texts more comprehensible and avoid that awful Mrs. Throttlebottom's Opera Recital character that creeps in when even the best of our trained vocalists use their Italo-German technique to sing English. The *Nantucket Songs* are heard in a recording of their première at the Library of Congress in 1979, and some of the excitement of that occasion comes through. The other recording, although quite beautiful, seems more studied. In both, Rorem himself is the excellent pianist. *E.S.*

**ROSSINI: Il barbiere di Siviglia** (see Best of the Month, page 69)

**SAINT-SAËNS: Piano Concerto No. 2, in G Minor, Op. 22.** **RACHMANINOFF: Rhapsody on a Theme of Paganini, Op. 43.** Bella Davidovich (piano); Concertgebouw Orchestra, Neeme Järvi cond. PHILIPS ● 6514 164 \$12.98. © 7337 164 \$12.98.

Performance: **Warmhearted**  
Recording: **Ultra-spacious**

If it's glitter you want, the recent Angel recording of the Saint-Saëns G Minor Concerto with Cécile Ousset and Simon Rattle still sweeps the field. Bella Davidovich and Neeme Järvi take a decidedly more expansive and freely romantic view of the score, which may appeal more to some tastes. It is in the ever-popular Rachmaninoff that the Philips team is truly in its element, responding all-out to the work's passionate, macabre, and capricious elements. The Concertgebouw Orchestra also seems to be more at one with this music. The recording of the solo piano is wonderfully rich and full-bodied, that of the orchestra a bit too reverberant for my taste. *D.H.*

**D. SCARLATTI** (orch. Avison): *Concerti Grossi: No. 5, in D Minor; No. 4, in A Minor; No. 11, in G Major; No. 8, in E Minor.* Jean-François Paillard Chamber Orchestra, Jean-François Paillard cond. ERATO STU 71510 \$10.98, © MCE 71510 \$10.98.

Performance: **Suave**  
Recording: **Fine**

Yes, that's Domenico, not Alessandro Scarlatti, and no, he did not actually write any concerti grossi. But the pragmatic eighteenth-century English composer Charles Avison wished that he had and remedied the lack by recycling a batch of the harpsichord sonatas. Avison chose his pieces well, and his orchestrations work. Indeed, I like the fugues better in Avison's versions than in the originals. Jean-François Paillard's chamber orchestra plays everything very smoothly, so smoothly that I would have preferred more contrast and rhythmic bite; even arranged for strings, Scarlatti is not all silk. *S.L.*

**SCHUBERT: Quartet No. 13, in A Minor, Op. 29 (D. 804); Quartet No. 12, in C Minor (D. 703).** Juilliard Quartet. CBS M 37287. © MT 37287, no list price.

Performance: **Elegiac**  
Recording: **Very good**

With this release the Juilliard Quartet completes its remake of all of Schubert's late



quartets—if one may speak of “late” works from a composer who died at the age of thirty-one. The Quartet No. 12, of course, is the single movement known as just that, by its German designation, “*Quartettsatz*”; in this case it is “*Quartettsatz plus Fragment*,” for here, for the first time on records, the familiar movement is followed by the forty-two measures Schubert sketched for a second movement he intended to follow it. There is a precedent for this, of sorts, in Max Goberman’s recording of the *Unfinished* Symphony with a similar fragment of the scherzo with which Schubert had intended to continue that work. There are some enchanting threads in this abortive andante, and it is intriguing to be able to hear the piece, but it really cannot affect the status of the *Quartettsatz* itself, or our response to it as an independent work. That piece is given an especially somber performance here.

The great Quartet in A Minor, with which Schubert launched his final trilogy in this category, also gets somber treatment from the Juilliard Quartet, but the mood is pervasively elegiac; it suits the music well enough, but I missed the lyrical sweetness that is so essential to the work’s character, and which one wants especially as counterbalance in a performance that so stresses the tragic element. On balance I prefer the A Minor by the Alban Berg Quartet, whose performance omits the first-movement repeat and thereby leaves room on the record for the entire G Minor Quartet, D. 173 (Telefunken 6.41882). But the Juilliard

performance is a fine one in its way, and it can be recommended to anyone wishing a second version or just an opportunity to hear the No. 12 fragment as far as it goes. The sound is very good indeed. *R.F.*

**SCHUMANN: *Fantasiestücke, Op. 12; Kinderszenen, Op. 15; Arabeske in C Major, Op. 18.*** Homero Francesch (piano). DEUTSCHE GRAMMOPHON 2530 644 \$10.98.

Performance: **One side superb**

Recording: **Exceptionally vivid**

This Schumann collection by Homero Francesch was recorded in or before 1977 but took until now to make its way here. The artist is a winner of the Prix Italia, the highest award international television has to offer. And one side is utterly bewitching. The *Kinderszenen* and *Arabeske* receive performances that reflect the most refreshing sort of straightforwardness: no clutter, no interpretive overlay, no contrived phony simplicity, but the real thing, and graced with the most admirable regard for tone production as well as a near-ideal balance of delicacy and vigor. The *Fantasiestücke* come off less successfully, I think, because Francesch seems so self-consciously determined to make an *event* of each of them—quite the opposite of his seemingly intuitive directness in the *Kinderszenen*. In Op. 12 everything is at least a little larger than life and overcharacterized, yet even here Francesch’s feeling for the clean line keeps the merely outsized from tumbling over into ob-

streperousness. If this side is a bit of a let-down, the performances of Op. 15 and 18 nevertheless identify Francesch as a Schumann player from whom we ought to hear more. The recording itself is exceptionally vivid. *R.F.*

**SHOSTAKOVICH: *Symphony No. 12, in D Minor (“1917: In Memory of Lenin”).*** Concertgebouw Orchestra, Bernard Haitink cond. LONDON ● LDR 71077 \$12.98, © LDR5 71077 \$12.98.

Performance: **Lyrical stress**

Recording: **Very fine**

Politically and geographically speaking, some musical works are intended for internal consumption only. We would hardly expect the Russians to respond wholeheartedly to Randall Thompson’s *Testament of Freedom*, on texts of Thomas Jefferson, or to Copland’s *A Lincoln Portrait*. So, likewise, is our situation regarding the various cantatas, oratorios, and the like written by major Scandinavian, Dutch, Swiss, and English composers for commemorative and ceremonial purposes. The same goes for a substantial portion of the output of Dmitri Shostakovich, including the *October* and *May Day* Symphonies (Nos. 1 and 2) and the two symphonies commemorating the revolutionary events of 1905 and 1917, the Symphonies Nos. 11 and 12, respectively.

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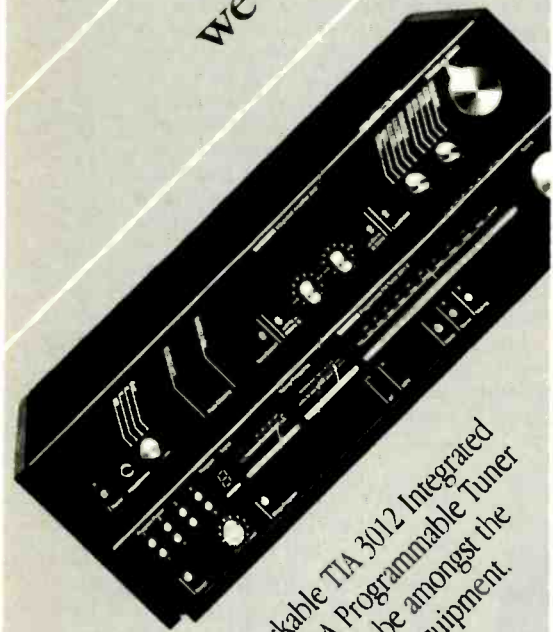
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national musical public. But if foreign listeners can't respond wholly to the content, it is still possible to appreciate the craft. Whereas the Eleventh interweaves popular revolutionary song throughout its more than one-hour length, the forty-minute Twelfth, played in four uninterrupted movements, is based largely on metamorphic treatment and outgrowths of its opening theme. For me this repetition gets a bit trying in the first movement, and its final pages seem insufferably bombastic. The slow movement, however, is imbued with a genuinely eloquent poetry. All four movements bear programmatic titles relating to the October Revolution, but I found listening to the music more interesting *without* the subtitles.

Bernard Haitink, the great Concertgebouw Orchestra, and the London Records production staff have clearly expended every effort to make a "digital spectacular" out of their new recording of the Shostakovich Twelfth, part of Haitink's complete cycle, and I have no doubt that sound buffs will find themselves with a real feast. Musically, it is interesting to compare this reading with the now-deleted Melodyia/Angel recording by the Leningrad Philharmonic under Yevgeny Mravinsky. Haitink in general aims for the lyrical substance of the score and adopts a somewhat slower pace, in the first movement particularly. Mravinsky, who conducted the world premiere in 1961, went all out for the drama, and the first-movement allegro in his recording simply beggars description in its virtuosic brilliance. Both records are musts for Shostakovich "true believers," but the Haitink is the choice for audiophiles. *D.H.*

**VERDI: *La Traviata*** (see Popular Discs and Tapes, page 118)

#### COLLECTIONS

**CHAMBER MUSIC SOCIETY OF LINCOLN CENTER: *Three Centuries of Chamber Music*.** J. S. Bach: *Concerto in C Minor for Oboe, Violin, and Strings (BWV 1060)*. Haydn: *String Trio in G Major, Op. 53, No. 1*. Moszkowski: *Suite in G Minor for Two Violins and Piano, Op. 71*. Fauré: *Sicilienne, Op. 78; Fantasy, Op. 79; Dolly, Op. 56*. Saint-Saëns: *Caprice on Danish and Russian Airs, Op. 79*. Carter: *Eight Etudes for Woodwind Quartet*. Paula Robison (flute); Leonard Arner (oboe); Gervase de Peyer (clarinet); Loren Glickman (bassoon); Charles Treger, Jamie Laredo, Hiroko Yajima, Romuald Tecco (violin); Walter Trampler (viola); Leslie Parnas (cello); Alvin Brehm (double bass); Charles Wadsworth, John Browning, Richard Goode (piano); Anthony Newman (harpsichord). MUSICAL HERITAGE SOCIETY 824704X two discs \$15.50. © MHC 226704W \$15.50 (plus \$1.95 shipping, from Musical Heritage Society, 14 Park Road, Tinton Falls, N.J. 07724).

Performance: **Good**  
Recording: **Good**

This is an attractive assortment, the kind of varied program the Chamber Music Society of Lincoln Center regularly offers in its concerts. The Bach concerto, in which oboist Leonard Arner and pianist Charles Treger are the soloists, is a reconstruction of the

first of the composer's two C Minor concertos for two clavers, and the Fauré *Sicilienne*, originally for cello, is played here by flutist Paula Robison with pianist Richard Goode in an unidentified arrangement. The Bach sounds a little wiry and less than ideally focused, perhaps because the performance itself tends to sound a bit square, but the others, by both CMS regulars and guests (including John Browning in Fauré's *Dolly*), are consistently good. The sound overall (except, as noted, in the Bach) is agreeably bright and well balanced. *R.F.*

#### RECORDING OF SPECIAL MERIT

**THE FITZWILLIAM VIRGINAL BOOK (excerpts).** Christopher Hogwood (organ, virginal, spinet, harpsichord). L'OISEAUX-LYRE D261D 2 two discs \$21.96.

Performance: **Excellent**  
Recording: **Crisp**

*The Fitzwilliam Virginal Book* is not only the greatest collection of Elizabethan keyboard music but probably one of the greatest collections of keyboard music ever. It includes pieces by the foremost English composers of the late sixteenth and early seventeenth centuries (Giles Farnaby, William Byrd, John Bull, and others), and it covers every known genre of the time. It also confirms the incredible technical prowess of the early English keyboard players. Christopher Hogwood's selections here range from light dances to intricate, contrapuntal fancies; it is an excellent sampling, and his use of four period instruments—an organ, a spinet, a virginal, and a harpsichord—reveals a rich variety of timbres. Hogwood is, of course, a master of all these instruments and equally at home at any one of them. His playing is always crisp and lucid, and he imparts a strong sense of character to each work. All told, this is a very fine introduction to a wonderful body of music. *S.L.*

#### RECORDING OF SPECIAL MERIT

**FRENCH DANCES AT VERSAILLES.** Rameau: *La Princesse de Navarre: Contredanse; Menuets 1 and 2; Divertissements 1 and 2; Tambourin; Musette; Passepied; Air. Dardanus; Tambourin*. F. Couperin: *Douzième concert royal: Four Movements*. Lully: *Alcidiane: L'Assemblée au tambour*. Marais: *Alcione: Air; Tambourin; Sarabande; Marche pour les matelots*. Rébel: *Les Eléments: Le Feu. Chaconne*. Anon.: *Branles et Bourrée de Monsieur Brular*. La Grande Ecurie et la Chambre du Roy, Jean-Claude Malgoire cond. CBS M 37822. © MT 37822, no list price.

Performance: **Exuberant**  
Recording: **Vivid**

Although the cluttered typography on the CBS liner makes it a little harder than it need be to figure out what's what, there is absolutely no other cause for anything but pleasure in this release. Jean-Claude Malgoire has chosen some of the most attractive examples of seventeenth-century French music in dance forms, and his ensemble performs them, on "original instruments," in a style that is not only "authentic" but downright infectious. Such sounds as the musette effect in the *Tambourin* from *Dardanus*,

which opens side two, and the viols in the Couperin *Lentement et pathétiquement* are ingratiating in their own right, but there is an abundance of exquisite melody too. The drum-filled fanfare of the *Premier divertissement* from *La Princesse de Navarre* might eventually challenge the famous Mouret fanfare associated with *Masterpiece Theatre*. The whole presentation is exuberant, joyous, affectionate, vividly recorded—and warmly recommended. R.F.

**JARMILA NOVOTNA: Songs and Arias.** Mozart: *Le nozze di Figaro: Non so più; Voi che sapete. Die Zauberflöte: Scenes* (with Helge Roswaenge, tenor; Willi Domgraf-Fassbaender, baritone; Alexander Kipnis, bass). Verdi: *La Traviata: Ah, fors'è lui . . . Sempre libera; Addio del passato.* Offenbach: *Les Contes d'Hoffmann: Scenes* (with Margaret Harshaw, mezzo-soprano; Raoul Jobin, tenor; Ezio Pinza, bass). Smetana: *The Bartered Bride: Ach jaky žal. Hubicka: Lark Song.* Dvořák: *Rusalka: O Lovely Moon; Mam zlate vlasky.* Fibich: *Poème.* Offenbach: *La belle Hélène: Paris's Song and Duet* (with Gerd Niemar, tenor). J. S. Bach/Gounod: *Ave Maria.* Anon.: *Fifteen Czechoslovak Folk Songs.* Jarmila Novotna (soprano); various orchestras. Bruno Walter, Arturo Toscanini, Ettore Panizza, Alfred Wallenstein, Erich Ortman, Alexander von Zemlinsky conds.; Arpad Sandor, Jan Masaryk, Gibner King (piano). PEARL Ⓞ GEMM 261/262 two discs \$13.98.

Performance: **Affecting**  
Recording: **Dated and variable**

Although Jarmila Novotna enjoyed a long (1925-1956) and very successful career on two continents, she made relatively few recordings. This set contains a good many interesting items from many sources, including Metropolitan Opera and other broadcasts as well as private recordings from the artist's own collection. Technically, the results range from fairly primitive, off-the-air sound to the satisfactory likeness of the 1940-ish Victor 78's, but the history-minded collector will find much to enjoy.

A beautiful sight on stage and a very good actress, Novotna was an elegant and sophisticated singer whose vocal presence was never overpowering but who had a gift of poetic communication and a way to touch the heart. That special melancholy quality is captured in her *Violetta*, *Antonia*, and *Marenka*, and in *Rusalka's* song to the moon (in a private recording dating from 1956). It also lends special enrichment to the group of beautiful folk songs she recorded with the ill-fated Jan Masaryk, first president of an independent Czechoslovakia, during World War II.

The list of Novotna's musical associates in this set is in itself impressive. Her soulful *Cherubino* is gently guided by Bruno Walter in a pair of Met broadcast snippets; her *Pamina*, a Salzburg souvenir of 1937, gets exceptional stimulus from Toscanini's unusually propulsive pacing; and the conductor of her *Fibich Poème* (the Czech original of what is known in English as *My Moonlight Madonna*) is the renowned Viennese composer Alexander von Zemlinsky.

Informative notes come with the set, an interesting and, for many, a nostalgic souvenir of a lovely artist. G.J.

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# Popular Music

## News Briefs

Photo courtesy BASF



Photo courtesy Ampex

Tape favorites: the Police (left) and country singer Sylvia (right, with producer Tom Collins)

**M**ANUFACTURERS of magnetic recording tape have every reason to love and honor successful musicians. When cassette sales of the A&M album "Synchronicity" by the rock group the Police hit a million, BASF Systems Corporation honored the Police with an award. "Synchronicity" was recorded on BASF Pro II pure chrome audio tape. The award, presented to the group after a concert in Boston, consisted of a plaque and racing jackets.

Since 1977, Ampex has presented its Golden Reel Award to any artist who has an album certified gold by the Recording Industry Association of America if the album in question was recorded on Ampex tape. The Ampex Golden Reel Award consists of \$1,000 to be donated to a charity of the artist's choice.

The Australian group Men at Work have just received a Golden Reel Award for their album "Business As Usual," which was recorded on Ampex Grand Master 456. The group specified that the award money be donated to the State Disaster Bushfire Appeal in Melbourne, where the album was recorded.

The country singer Sylvia received her first Golden Reel Award this year for her RCA

album "Just Sylvia," recorded on Ampex Grand Master 456 tape in Nashville. She donated her award money to Youth Town of Tennessee.

Ozzy Osbourne showed a strong set of teeth when he smiled with pleasure at receiving two Golden Reel Awards for his Jet albums "Blizzard of Ozz" and "Diary of a Madman," both recorded on Ampex 456 in England. Osbourne, who upset animal lovers a couple of years ago with publicity stunts that allegedly included biting off the head of a bird, divided his \$2,000 award between the New York and Los Angeles branches of the Society for the Prevention of Cruelty to Animals.

Since originating the Golden Reel Award, Ampex has given four hundred of them—and \$400,000 to charity. Other Golden Reelers of note this year have been Billy Joel, Paul McCartney, Journey, Rick Springfield, Al Jarreau, and Donna Summer. □

**T**HE blues guitarist and singer John Lee Hooker, known as the King of Boogie, received a National Heritage Fellowship as a master traditional artist in the Folk Arts Program of the National Endowment for the Arts. The

National Fellowships, now in their second year, include a cash award of \$5,000 for each recipient.

Singer Margaret Whiting, whose career spans four decades of American music, became the first recipient of the Roseland Hall of Fame Award for major contributions to ballroom music. The daughter of composer Richard Whiting (*Hooray for Hollywood, Ain't We Got Fun*), Miss Whiting was the first artist signed to a contract by Capitol Records. □

**B**EATLES TRACKS DISCOVERED: London's famous Abbey Road studios have yielded four never-before-heard recordings by the Beatles that, according to an EMI spokesman, may soon be released as singles. Capitol Records, the source of Beatles records in the U.S., however, has yet to assign a specific release date. One of the newly discovered tracks, *Leave My Kitten Alone*, was to have been issued in 1980 but was withdrawn when John Lennon was killed. . . . Lennon's last recordings will appear in an upcoming album, "Every Man Has a Woman," written entirely by his widow, Yoko Ono. Other performers on the LP include Roberta Flack, Carly Simon, the long-absent Harry Nilsson, and the Lennons' son, Sean, age seven, making his disc debut. □

**G**UITARIST Eric Clapton, whose latest album is "Money and Cigarettes," has come under fire (pardon the expression) from the head of a stop-smoking clinic. Grace Reinbold, who runs a clinic in Lansing, Michigan, has filed a complaint with the Federal Trade Commission against

Ozzy Osbourne with his two Golden Reel Awards



Photo courtesy Ampex

Clapton, Warner Bros. Records, and the R. J. Reynolds Company, which sponsored Clapton's most recent tour. Reinbold, who claims she "loves Clapton and has every album he ever made," is nonetheless offended by companies that sell "addictive products" and underwrite rock shows. "It makes it seem as though the performers are endorsing these products—products that do cause actual death." There's been no comment from Clapton on the matter. Maybe the Rolling Stones were on to something: their most recent tour was sponsored by Jovan, whose fragrance products are not addicting and leave the Stones smelling like a rose in the endorsement department. S.S.

**V**IDEO NOTES: Paul McCartney and Michael Jackson, who had a major hit single together last year (*The Girl Is Mine*), are considering another collaboration, this time designed for MTV. Ron Giraldi, the commercial director responsible for Jackson's spectacular *Beat It* video, has been

hobnobbing with the ex-Beatle, and since Jackson is slated as "guest artist" on Paul's new album, there is speculation that the duet will be filmed as well. . . . In related news, the great Richard Thompson has just completed principal photography for a video of one of the niftiest cuts on his recent "Hand of Kindness" album, *The Wrong Heartbeat*, which should be aired by the time you read this. The video is Thompson's first. S.S.

**T**HE German composer James Last, who has written such songs as *Games That Lovers Play* and *Love Must Be the Reason*, is also a band-leader. Records by the James Last Orchestra sell phenomenally well in Europe, although they are little known in the United States.

PolyGram Records hopes to change that with "Your Musical Zodiac," a series of twelve albums by Last and his orchestra. Each album is devoted to an astrological sign and contains music by composers or lyricists born under

that sign. The album for Scorpio (October 24 to November 21) contains selections by Gilbert Bécaud, Georges Bizet, Charles Fox, and Johann Strauss.

Whether popular or classical, the music sounds pretty much the same. It doesn't swing, and it doesn't rock, but it has the relentlessly cheerful sound of music you hear in elevators or at international airports. Don't knock that sound, though. Last has been awarded more than 150 gold albums worldwide, which means sales in excess of 60 million records. W.L.

**T**HE TIMES THEY ARE A-CHANGIN' AGAIN. A recent anti-MX-missile protest on the steps of the Capitol Building brought together an interesting mix of concerned citizens: Ted Kennedy, Tip O'Neil, former Orleans leader John Hall, and Grandmaster Flash and the Furious Five, the South Bronx rap group recently praised by *Time* magazine as "superfine." How did Flash and the Five get involved? According to Hall,



Grandmaster Flash

who organized the affair, "Bob Dylan, Bill Graham, and I were trying to think of people who'd be good for the event. Dylan wanted to find the musicians who stood for social commentary the way he used to in the Sixties. Then it suddenly hit us . . . Grandmaster Flash and the Furious Five." S.S.

## Disc and Tape Reviews

By CHRIS ALBERTSON • PHYL GARLAND • ALANNA NASH • MARK PEEL  
PETER REILLY • STEVE SIMELS • JOEL VANCE

### RECORDING OF SPECIAL MERIT

**THE ANIMALS: Ark.** The Animals (vocals and instrumentals); other musicians. *Loose Change; Love Is for All Time; My Favorite Enemy; Prisoner of the Light; Being There; Hard Times; The Night;* and six others. IRS 70037 \$8.98, © CS 70037 \$8.98.

Performance: **Sublime/ridiculous**  
Recording: **Very good**

This is not at all like the 1977 Animals reunion LP, which was an exercise in nostalgia, however wonderful; that record sounded so much like the Sixties' Animals that it could have been vault material. "Ark," on the other hand, is a thoroughly contemporary record, only vaguely blues-

inflected, which might be indistinguishable from any number of middling New Wave efforts were it not for the presence of lead singer Eric Burdon, who is, as always, an excessive, undisciplined, preposterous, and undeniably compelling figure, perhaps rock-and-roll's only genuine Holy Fool. Burdon yelps, indulges in self-aggrandizing asides, goes for notes he can't possibly hit, and does his best to blow out the microphones. Sometimes he even sings, and the songs here give him plenty of room to do all that and more. They're tacky and clumsy in the way *Sky Pilot* and *San Franciscan Nights* were, and they will probably sound just as dated in a few years. But there's a real person, however nutso, on display here, and while I do wish keyboard *maitre* Alan Price had been given a little more freedom to work out, this 1983 edition of Eric Burdon's performing personality is as entertainingly askew as ever. You couldn't ask for a better comeback album. S.S.

### RECORDING OF SPECIAL MERIT

**CAMEO: Style.** Cameo (vocals and instrumentals); vocal and instrumental accompaniment. *Aphrodisiac; This Life Is Not for Me; You're a Winner; Can't Help Falling in Love; Style;* and three others. ATLAN-

TA ARTISTS 811 072-1 M-1 \$8.98, © 422-811 072-4 M-1 \$8.98.

Performance: **Styllsh modern r-&-b**  
Recording: **Good**

What makes Cameo so special is its ability to create fresh, exciting sounds within a limited context. Although this male vocal quartet is ostensibly just another contemporary r-&-b group, they manage to escape being predictable. They eschew the omnipresent funk beat to use a walking bass line on *You're a Winner*, then turn around and bedazzle the listener with an updated version of the oldie *Can't Help Falling in Love with You*, highlighting it with scintillating group harmonies. If you're a nostalgia buff, this one track might make the whole album worthwhile—it works *that* well. And when Cameo decides to get down to basic hot dance rhythms, they're handled with finesse and cleverness, as on the title song, a humorous play on current fashion, and the hilarious *Slow Movin'*. This is dance music with class. P.G.

### RECORDING OF SPECIAL MERIT

**THE CARTER FAMILY: Breaking Tradition.** The Carter Family (vocals and instrumentals). *Yankee Don't Go Home; Wom-*

#### Explanation of symbols:

- Ⓛ = digital-master analog LP
- Ⓢ = stereo cassette
- ⓐ = digital Compact Disc
- Ⓢ = eight-track stereo cartridge
- Ⓛ = direct-to-disc recording
- Ⓜ = monophonic recording

The first listing is the one reviewed; other formats, if available, follow it.

**LACY J. DALTON: *Dream Baby*.** Lacy J. Dalton (vocals); vocal and instrumental accompaniment. *Dream Baby (How Long Must I Dream)*; *My Old Yellow Car*; *The Waltz That Time Forgot*; *Windin' Down*; and six others. COLUMBIA FC 38604, © FCT 38604, no list price.

Performance: **Stylish**  
Recording: **Very good**

Lacy J. Dalton's last couple of albums have been smorgasbord affairs, and some have weighed rather heavily on the stomach. Her new "Dream Baby" also serves up a buffet of tunes, ranging from the title song, a stylish remake of the Roy Orbison classic, to a smattering of Southern rock, a couple of snail-slow love ballads, a pair of sophisticated rock-and-roll numbers, and some ersatz r-&-b.

Because Dalton, whose appeal is both cerebral and carnal, is such an immensely talented writer/performer, I tend to set higher standards for her than I do for others, and some of this album disappoints me. Vocally, there are performances here that make your heart hop out into your hand. But she has chosen a couple of songs (the two fake r-&-b numbers by Troy Seals) that are simply beneath her talents, and she has written four others (with various collaborators) that come across as little more than high-class filler.

Still, there's enough muscle and sinew here to push this album to the forefront, mainly thanks to Dalton's sensational vocal styling. It only takes one listen to Keith Sykes's *Baby, You Can Rock with Me* or Rodney Crowell's *Baby, Better Start Turnin' 'Em Down* to know that Dalton is one of the most effective, and affecting, female singers working in any musical framework today. For the most part, Billy Sherrill's production is clinically clean. The guest singers, Charlie Daniels and Gail Davies (on *Baby, You Can Rock with Me* and *Dixie Devil*, respectively), seem buried and wasted, but there is some tasty instrumental work from Terry McMillan (on harmonica) and by several players in Dalton's own road band.

What really sticks in my mind from this album is the cover photo and the song it illustrates, Tom Schuyler's *My Old Yellow Car*. Dalton has often been able to reach the head and the heart at the same time, but perhaps never quite as successfully as with this song, a sentimental but deftly written paean to youth and innocence that will stir anyone who has ever driven a convertible down a dark, lonely highway on a late summer night. *A.N.*

**THE DOOBIE BROTHERS: *Farewell Tour*.** The Doobie Brothers (vocals and instrumentals). *Takin' It to the Streets*; *Jesus Is Just Alright*; *Minute by Minute*; *Can't Let It Get Away*; *Listen to the Music*; *Echoes of Love*; *What a Fool Believes*; and ten others. WARNER BROS. 23772-1G two discs \$11.98, © 23772-4 \$11.98, © 23772-9 \$11.98.

Performance: **Winded**  
Recording: **Excellent**

The Doobie Brothers may have been one of the best California pop bands of the Seven-

## Gus Hardin



RCA Records

**G**US HARDIN is a female singer with a raw, rough-hewn voice that bends your ear around double. Leon Russell, with whom Gus worked in her native Oklahoma, describes her as a combination of Tammy Wynette, Otis Redding, and a truck driver. I hear a little of that—especially the black overtones—but I also hear the raspy sensuality of Lacy J. Dalton, the catch-throated delivery of Tanya Tucker, and a vibrato that is alternately reminiscent of Buffy St. Marie and Stevie Nicks. In truth, though, Hardin has probably always sounded exactly like herself, and on her impressive solo debut mini-LP (six songs) on RCA, her voice positively eats away at the soul.

Two of the songs here, *After the Last Goodbye* and *If I Didn't Love You*, have already charted high, and producer Rick Hall has given Hardin a uniformly good mix of

country, pop, and blues. But he's also shaved off enough of her rough edges to ensure her acceptance in both mainstream pop and country. As a result, I get the feeling Hardin can wail a lot harder than she does here, and with a lot bluesier licks. That would probably scare the Levi's off about half the audience RCA hopes to reach, so for now I won't complain. Besides, compared with most of the sweet young things coming along today, Hardin is about as soothing as a dentist's drill—and that's high praise in my book. This one's going to be on my turntable a while. —Alanna Nash

**GUS HARDIN.** Gus Hardin (vocals); vocal and instrumental accompaniment. *Loving You Hurts*; *If I Didn't Love You*; *Since I Don't Have You*; *After the Last Goodbye*; *You Can Call Me Blue*; *I've Been Loving You Too Long*. RCA MHL1-8603 \$6.98.

*an's Touch*; *Jesus*; *Maybelle*; *Baby Ride Easy (Chuck the Chuckwagon)*; *Lovin' Me on His Mind*; *Will the Circle Be Unbroken*; and five others. AUDIOGRAPH 7783 \$7.98.

Performance: **Updated**  
Recording: **Good**

The younger generation of the famous Carter Family has been getting into the act for some time now, but this is the first album where they've really been featured. With the exception of banjo player Vicki Cook, all the members are really Carters, led by the late Mother Maybelle's daughters, Helen and Anita, and including Anita's daughter, Lori, and Helen's sons, David and Kevin. The material is a good mix of traditional and modern country and features some fine original songs by David, his older brother

Danny, and their mother, Helen Carter Jones. David, in particular, sounds as if the Allman Brothers have been a big influence, and his moving tribute to his grandmother Maybelle resembles Gregg Allman's *Multi-colored Lady*. It's a good song, but its impact pales against the family's rendition of Maybelle's signature song, *Will the Circle Be Unbroken*, which quivers with emotion and meaning.

The backing is smart, understated, and decidedly modern, and the vocals are spritely, distinct, and not—thank goodness—overly polished. It's a lovely little album, and a dandy way to break—and carry on—the tradition. *A.N.*

**GUY CLARK: *Better Days*** (see *Best of the Month*, page 70)



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ties, but their live farewell-tour album seems long overdue. Their last studio record came out three years ago, keyboardist Michael McDonald's solo album has been out for a year, and even guitarist Patrick Simmons's solo debut beat this double LP to the stands.

The main reason the set is overdue, though, is because the Doobies were on the skids long before they finally decided to call it quits. Michael McDonald's airy, double-bubble r-&-b often seemed schizophrenic alongside the Doobies' old street-band material, especially since his keyboards constantly challenged the group's longtime guitar-dominated sound, and in the end his material grew quirky and thin. There didn't

seem to be anything interesting going on elsewhere in the band either.

Like many two-record albums, "Farewell Tour" should have been cut back to one, since there's really only enough good material to fill two sides. If *Listen to the Music* comes across as one of the jiviest recordings ever issued, there are also definitive versions of several of the Doobies' other hits, including *Takin' It to the Streets* and *Black Water*. Overall, though, even an old friend can outstay his welcome, and "Farewell Tour" proves the Doobies did just that. *A.N.*

**ELECTRIC LIGHT ORCHESTRA:** *Secret Messages*. Electric Light Orchestra (vocals

and instrumentals). *Secret Messages; Loser Gone Wild; Bluebird; Take Me On and On; Four Little Diamonds*; and five others. JET QZ 38490, © QZT 38490, no list price.

Performance: **Empty calories**  
Recording: **Rich**

**NUTRITIONAL INFORMATION**

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**ARETHA FRANKLIN:** *Get It Right*. Aretha Franklin (vocals); instrumental and vocal accompaniment. *Pretender; I Wish It Would Rain; Giving In; When You Love Me Like That; Better Friends Than Lovers*; and three others. ARISTA AL8-8019 \$8.98, © AC8-8019 \$8.98.

Performance: **Vandrossalized**  
Recording: **Good**

I am generally an admirer of Luther Vandross, but he gets several demerits for the way he has wasted Aretha Franklin's talent on "Get It Right," her new Arista album. The songs and arrangements on side one are both muddled and trite, and Aretha's voice is so highly echo-chambered that one would think Vandross was unaware of her enormous talent. What he has done here is the sort of thing Dionne Warwick's meager voice calls for (Vandross is, in fact, producing a new Warwick album). Interestingly enough, only the Vandross tunes do Aretha a disservice; the other three fit her like a glove, especially *I Wish It Would Rain*, on which she did her own vocal arrangements. Anyone who has heard Aretha sing such numbers as *Spirit in the Dark*, *Ain't Nothin' Like the Real Thing*, *The Masquerade Is Over*, or—to go back almost twenty years—*Sweet Bitter Love*, knows what she can do when the tune and arrangement are right. Unfortunately, nothing on this album can compare with the best of her previous efforts, and that includes her recent Arista recordings. Aretha Franklin has awesome natural talent, and she needs to work with producers who are aware of that: Jerry Wexler and Arif Mardin are, Luther Vandross apparently is not. This is a decent pop-soul album, but it is a failure as an Aretha album. *C.A.*

**RECORDING OF SPECIAL MERIT**

**THE FUGS:** *Greatest Hits, Vol. 1*. The Fugs (vocals and instrumentals). *Frenzy; Doin' All Right; Dirty Old Man; Coming Down; Slum Goddess; Supergirl; Boobs a Lot*; and four others. PVC/JEM 8914 \$7.98.

Performance: **Sublime**  
Recording: **Primitive**

Talk about blasts from the past . . . I first encountered the music here during my long-ago undergraduate days, in its original incarnation on the old ESP label, and I can

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remember quite clearly almost wetting my pants with laughter. This was, and still is, some of the most hilariously incompetent, scabrously obscene stuff ever committed to vinyl. The Fugs (euphemism courtesy of Norman Mailer, if memory serves) were a ragtag collection of hippies and aging beatniks from the bowels of New York's East Village, and their recorded legacy, rescued from obscurity in this rerelease, proves pretty conclusively that the Sex Pistols were not, as some now seem to think, the first rock band to sit on the face of the Establishment. This stuff isn't for all tastes, of course, and some of the high-school sexism of the lyrics seems less liberating today than it once did. Still, this is about as close to a musical equivalent of Walt Whitman's "barbaric yawp" as you're likely to hear in the 1980's. S.S.

**LARRY GRAHAM: *Victory*.** Larry Graham (vocals, bass, drums, guitar, keyboards); vocal and instrumental accompaniment. *Just Call My Name; Don't Think Too Long; I Never Forgot Your Eyes; Movin' Inside Your Love; I'm Sick and Tired; I'd Rather Be Loving You*, and four others. WARNER BROS. 23878-1 \$8.98, © 23878-4 \$8.98.

Performance: **Entertaining**  
Recording: **Good**

Although his songs are strictly pop in their rhythm, instrumentation, and styling, Larry Graham is one of the few current singers to dip into the vocal tradition of the old-time crooners, especially Billy Eckstine. There is some echo of Eckstine's approach in the way Graham handles his voice, dipping down and scraping against the bottom of his low register to come up with a rounded, vibrato-laden note.

His newest album finds him in an upbeat romantic mood, crooning his way through a few selections but mostly bounding along with the spirit that might be expected of Sly Stone's former bassist and the one-time leader of the excellent power-soul group Graham Central Station. Nothing here is truly outstanding, but there are traces of humor and a touch of social commentary on *I'm Sick and Tired*, and Graham plays all those instruments impressively. In all, a skillfully assembled and consistently entertaining album. P.G.

**RECORDING OF SPECIAL MERIT**


**DAVID GRISMAN: *Dawg Jazz/Dawg Grass*.** David Grisman (mandolin, mandovola); Darol Anger (fiddle); Mike Marshall (fiddle, guitar, mandolin); Rob Wasserman (bass); Martin Taylor, Tony Rice (guitar); Jerry Douglas (dobro); Earl Scruggs (banjo); Tommy Newsome (alto saxophone, clarinet); Ed Shaughnessy (drums); Stéphane Grappelli (violin). *Fourteen Miles to Barstow; Dawggy Mountain Breakdown; Dawg Grass; Dawg Jazz; Steppin' with Stéphane; In a Sentimental Mood*; and four others. WARNER BROS. 23804-1 \$8.98, © 23804-4 \$8.98.

Performance: **Stunning**  
Recording: **Excellent**

You'd probably have to go as far back as Bill Monroe to find anyone who's had the influence on acoustic string-band music

that David Grisman has. Not only has Grisman, long recognized as a mandolin virtuoso, made significant progress in getting acoustic music on the commercial pop and jazz playlists, but he's developed an entirely new sound in acoustic string music—a two-mandolin hybrid of bluegrass, jazz, and swing that he calls Dawg Music. Suffice it to say, Dawg Music is not your average Grand Ole Opry pickin' and grinnin', although Grisman was a serious bluegrass picker for a number of years and says his use of the mandolin as a rhythm instrument was inspired by Bill Monroe. It is, rather, an intricate, sometimes improvisational form rooted in jazz but played on instruments normally thought of as bluegrass.

On Grisman's new Warner Brothers LP, we actually get two albums in one: a Dawg Jazz record on side one (with its own hilarious canine jacket photo), and a Dawg Grass album on side two (with equally hilarious jacket photo on the flip side). One cut on side one features the mandolin going Big Band with members of the Johnny Carson *Tonight Show* orchestra. Two other cuts continue Grisman's collaboration with jazz violinist Stéphane Grappelli, with Scottish guitarist Martin Taylor sitting in. Side two, the Dawg Grass program, features Grisman and crew going at it at breakneck speed, with special guests Earl Scruggs, Tony Rice, and Jerry "Flux"  
*(Continued on page 98)*



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Al Di Meola, John McLaughlin, and Paco De Lucia

## A Trio of Master Guitarists

IF I were forced to write a three-word review of the new Columbia album by John McLaughlin, Al Di Meola, and Paco De Lucia, I couldn't do better than to quote the title, "Passion, Grace & Fire." The third recorded collaboration of three of the most eminent jazz guitarists of the Eighties (though "jazz" is far too confining a term for the wide range of styles they play in) is both an exciting technical achievement and a powerful musical one.

McLaughlin, Di Meola, and De Lucia probably have more technique in their thirty fingers than do most thirty-piece orchestras, and the music on this album is designed to give free rein to that technique. The tunes are packed with intricate jaunts up and down the fretboard, doubled and even tripled with what amounts to superhu-

man precision, and violent yet razor-sharp attacks tempered by soft, lyrical passages. The Latin, blues, and Mediterranean-flavored melodies seem to take shape almost spontaneously, spun out just from the energy and inspiration the guitarists derive from playing together.

Far from being a show of speed-mongering, "Passion, Grace & Fire" is a work of substance and feeling. The musicians are obviously driven to excel by their regard for one another, but the music never sounds like dueling guitars. All three are sensitive and aware accompanists, and when each has a featured solo the other two invariably provide a pliant harmonic underpinning. Although McLaughlin's *Aspan* is probably the best composition, I was surprised at the consistently imaginative, varied, and taste-

ful pieces by Di Meola. A bonus is the outstanding stereo separation achieved by this digital recording.

Acoustic-guitar trio projects give every indication of becoming a regular outlet for McLaughlin, Di Meola, and De Lucia. This is not only their third album, but the three have toured together annually since 1980. If we're lucky, they'll continue to prove that superstar recording sessions can work.

—Mark Peel

**JOHN McLAUGHLIN, AL DI MEOLA, AND PACO DE LUCIA:** *Passion, Grace & Fire*. John McLaughlin, Al Di Meola, Paco De Lucia (guitars). *Aspan; Orient Blue Suite; Chiquito; Sichia; David; Passion, Grace & Fire*. COLUMBIA ● FC 38645, © FCT 38645. no list price.

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There is a new product manufactured in New Zealand that is selling very well. It's called the Woolrest—a bed pad made of thick wool. You simply place it over your mattress and then cover it with your bottom sheet as you normally do when you make your bed.

## SLEEP INDUCING

Sheep's wool has always had an outstanding reputation for keeping you warm in winter and cool in summer. That is why wool seat covers are so popular. But wool has another property known by New Zealanders for many years. Namely—wool induces sleep.

In New Zealand, for example, a way to cure insomnia was to cover yourself with a sheepskin rug. For some very unscientific reason, the hypnotic quality of the wool encouraged sleep. Counting sheep was another technique that was often recommended. But it was the development of the Woolrest bed pad that suddenly turned an old wive's tale into fact.

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Frank Thornton, a Seattle Washington dental technician, had trouble sleeping for six years. He purchased a Woolrest pad and has

been able to sleep through the entire night practically every night. According to Thornton, "I felt a sensation of buoyancy from the Woolrest. I have read in literature that a person sleeps more restfully with natural fibers surrounding their body." Thornton has already purchased seven Woolrest pads for his entire family.

There are hundreds of other testimonials we could mention from the thousands who have purchased them, but one thing is clear. Using a Woolrest pad you know that the rest of your life will be spent sleeping comfortably, with a minimum amount of sleeplessness. Certainly, there will be nights when it will be difficult to go to sleep. But with the Woolrest those nights will be fewer, shorter and without the tradeoff of taking sleep-inducing drugs.

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Douglas. In the end the Grass side pays bigger dividends, since the numbers—clever, buoyant, and light as a meringue—stick in the mind a bit longer. Both programs depart somewhat from what we've been used to from the ever-innovative Grisman, but they both leave the mind reeling and begging for more. Just goes to show, I guess, that you can teach an old dawg new tricks. *A.N.*

**MERLE HAGGARD AND LEONA WILIAMS:** *Heart to Heart.* Merle Haggard (vocals, guitar, fiddle); Leona Williams (vocals, guitar); vocal and instrumental accompaniment. *Heart to Heart Talk; Let's Pretend We're Not Married Tonight; You Can't Break the Chains of Love; We're*

*Strangers Again;* and six others. MERCURY 812 183-1 M-1 \$8.98, © 812 183-4 M-1 \$8.98.

Performance: **Quirky**  
Recording: **Okay**

Leona Williams and her husband, country superstar Merle Haggard, recorded this album early in 1983, and before the ink was even dry on the jacket, Williams had filed for legal separation and been awarded \$25,000 a month in temporary alimony. That raises the irony factor pretty high in a couple of the Haggards' original songs here (*Let's Pretend We're Not Married Tonight, We're Strangers Again*), but there are other reasons to look into this album, however

lightly. Haggard does his best Ernest Tubb and Lefty Frizzell imitations, and he serves up classic country harmony with Williams on the jaunty *Waitin' on the Good Life to Come*. And Williams, though overshadowed by her famous husband (on her own label), comes across as more than a passable country singer in the pure tradition, sounding quite a bit like a young Tammy Wynette. Ultimately, however, the album is disappointing on several levels. Neither Haggard nor Williams, a fine songwriter who wrote Haggard's recent single, *You Take Me for Granted*, contributes any songs that will still be around when the final divorce papers are served, and the rest of the material, some of it older than Roy Acuff, sounds more like B-sides than anything else. The album has its moments, to be sure, but the biggest problem is that nobody ever really gets down to it. *A.N.*

**DICK HAYMES:** *Imagination.* Dick Haymes (vocals); orchestra. *What's New; My Blue Heaven; Here in My Arms; Could Be; I Could Write a Book;* and nine others. AUDIOPHILE Ⓜ AP-79 \$7.98 (from Audiophile Records, 3008 Wadsworth Mill Place, Atlanta, Ga. 30032).

Performance: **Very good**  
Recording: **Good mono**

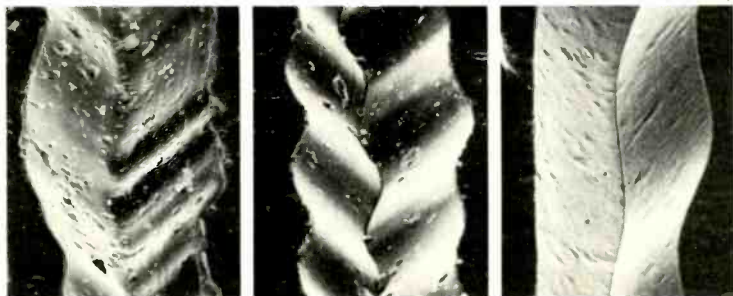
These fourteen songs that Dick Haymes recorded in 1949, with Carmen Dragon and his orchestra, and in 1952, with Al Lerner and his orchestra, demonstrate why Haymes was Frank Sinatra's only legitimate contemporary rival. Whereas Sinatra, at the time, projected an underdog street-kid *brío* mixed with out-front emotionalism, Haymes took a more mature vocal stance as an adult secure in his ability to make his points deftly and without undue dramatics. (His steady and professionally trained baritone voice had a good deal to do with this.) In casting terms, Sinatra was the romantic juvenile lead, Haymes the leading man. The highlights of this album are a suave, knowing performance of *I Could Write a Book*, a strong-voiced *Some Enchanted Evening*, and a flawless version of the Van Heusen/Burke oldie *Imagination*. Good listening, even today. *P.R.*

**JAY HOGGARD:** *Love Survives.* Jay Hoggard (vibraphone); other musicians. *Don't Quit; Pacific Vibes; Felice; Love Survives; As If in a Dream;* and two others. GRAMAVISION GR-8204 \$8.98.

Performance: **Jazz lion goes funk**  
Recording: **Satisfactory**

Although vibraphonist Jay Hoggard has been acclaimed as one of the most outstanding young jazz musicians in America, having recorded with such other young lions as saxophonist Chico Freeman and pianist Anthony Davis, he has stated in print his dream of making money, of acquiring the visibility and popularity of a Grover Washington, Jr. This album, his sixth as a leader, is his painfully obvious attempt to cross over from jazz into mass-market r-&-b. The first side is devoted to the lowest common denominators of funk. The sole selection on it remotely worthy of Hoggard's talent is *Pacific Vibes*, which uses the funk beat to underscore his facile improvisations on vibes, countered by John Blake's sassy violin.

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Hoggard is too much of a musician to release a whole album as banal as that first side, however, and he pulls himself up by his mallets for a second side with enough musical brilliance to salvage the set. He starts off in a modified Roy Ayers vein with a lilting rendition of Christopher Cross's *Sailing*, then eases into home turf with *As If in a Dream*, a ballad of shimmering, bell-like loveliness confirming the claim of some that Hoggard is the heir to the early Bobby Hutcherson sound. The last cut, *God Is Capable of Everything*, finds him in a pensive mood that recalls his background in the African Methodist Episcopal Zion Church. Choral comments effectively enhance his effusive statements on vibes. It's a shame that Hoggard is having such a terrible time making it in the jazz milieu, since he obviously has so much to offer. P.G.

**THE HUMAN LEAGUE: *Fascination*.** The Human League (vocals and instrumentals). (*Keep Feeling*) *Fascination*; *Mirror Man*; *Hard Times*; *I Love You Too Much*; and two others. A&M/VIRGIN SP-12501 \$6.98, © CS-12501 \$6.98.

Performance: **Miserable**  
Recording: **Okay**

I guess this release could have gone only one of two ways: it might have followed in the path of the Human League's brilliant *Don't You Want Me*, a song that managed to capture the rage and frustration that lie at the heart of sexism; or it could have been like the rest of "Dare," a bore. Well, I have bad news.

It's hard to understand how it could have taken the Human League so long (over a year) to come with up with these hokey vocal lines and obstreperous synthesizers. The title track sounds like a cereal jingle—except that anything this bad would almost certainly be killed before it saw the light of Saturday morning TV. And it's the *best* track on the record. This mini LP exemplifies all the worst qualities of bubblegum rock: a shaky command of instruments that confines the music to simple tunes, simple chords, and simple progressions, along with simple-minded lyrics (such as, "you remind me of gold"). Eminently dispensable. M.P.

**IAN HUNTER: *All of the Good Ones are Taken*.** Ian Hunter (vocals): vocal and instrumental accompaniment. *That Girl Is Rock 'n' Roll*; *Fun*; *Seeing Double*; *Every Step of the Way*; and six others. COLUMBIA FC 38628, © FCT 38628, no list price.

Performance: **Very good**  
Recording: **Good**

Ian Hunter has had several successful solo albums since his Mott the Hoople days. This one is successful on four of the ten cuts—a high score considering that most albums these days have a ratio of one wheat to nine chaff. Hunter concentrates on melody and pays close attention to arrangements. The proof of his efforts are the fast and slow versions of the title tune, both equally effective. On *Fun*, a satire on trying too hard to have a good time, there are references in the lyrics to two Little Richard classics (*Lucille* and *Ready Teddy*) along with an abrupt insert in the middle of the tune that cuts the manic tempo in half and has Hunter intoning homilies like a BBC

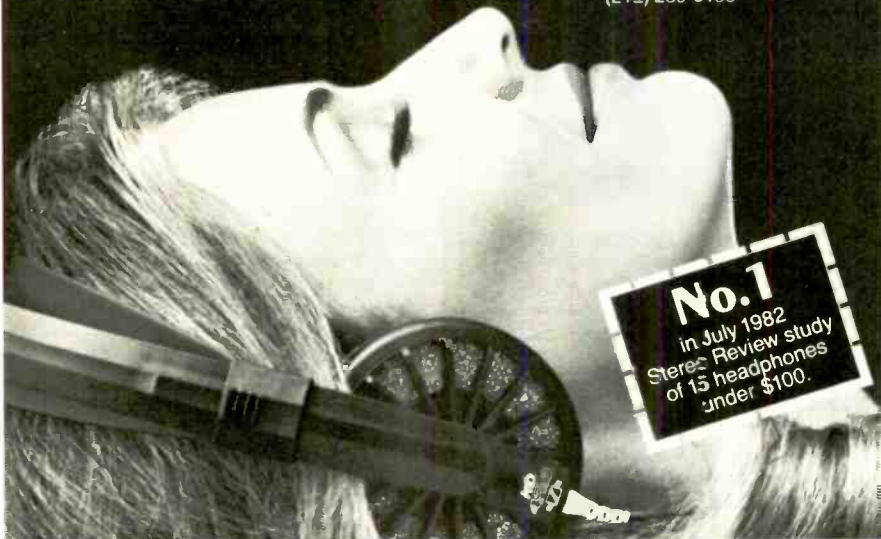
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announcer reading the weather report. *Speechless*, featuring an almost talked vocal, is a parody of punkers set to a chord progression spoofing a Rod Stewart-type wower single. That's the wheat. The rest is chaff, consisting of indulgent howls against war, politicians, and habitual TV-watching. But compared with most of the records we're getting now, this is an attractive, skillful album by a pro. *J.V.*

**PHYLLIS HYMAN: *Goddess of Love*.** Phyllis Hyman (vocals); vocal and instrumental accompaniment. *Riding the Tiger; Falling Star; Just Me and You; Your Move, My Heart; Let Somebody Love You*; and four others. ARISTA AL8-8021 \$8.98, © AC8-8021 \$8.98.

Performance: **Waste of talent**  
Recording: **Good**

In the mid-Seventies, Phyllis Hyman used to make frequent appearances at a club in my neighborhood. She had not made any records yet, and I doubt if she was known for many blocks around, but it was a joy to hear her in those days, and her following grew with each appearance. Then came fame, and with it such awful albums as "Goddess of Love." This Arista release succeeds—with a lot of help from Thom Bell and, especially, Narada Michael Walden—in making Hyman sound like a third-rate disco screamer. When you see that three members of the San Francisco 49'ers are used as a back-up group, you know that it's gimmick time. I have never heard so many worn-out hooks in one album, and there is not a moment here that does justice to Phyllis Hyman. She had better find a producer who respects her talent. *C.A.*

**THE ISLEY BROTHERS: *Between the Sheets*.** The Isley Brothers (vocals and instrumentals). *Choosey Lover; Touch Me; I Need Your Body; Between the Sheets; Let's Make Love Tonight; Slow Down Children*; and four others. T-NECK FZ 38674, © FZT 38674, no list price.

Performance: **Predictably pleasant**  
Recording: **Very good**

While the Isley Brothers explore no fresh ground here, they forage through familiar turf with a sure-footedness that guarantees track after track of carefully crafted soul sounds that seem more mellow than much of what is heard today. The first side is much better than the second, highlighted as it is by the hit title cut, *Between the Sheets*. It's a gently rocking, sensual excursion patterned unashamedly after Marvin Gaye's new super-sexy comeback posture, from the lead singer's high tenor cooing (pure Gaye) to the changes and instrumental backing, though those grunts and oomphs are the Isley's own. The other highlight is *Slow Down Children* on side two, an appealing dance tune with an urban-summer street theme and a few playful but utterly harmless jabs at the Reagan administration. Although the album as a whole tends to be predictable, it holds up well enough to make this musical journey a pleasant one. *P.G.*

**JOAN JETT AND THE BLACKHEARTS: *Album*.** Joan Jett (vocals, guitar); the Blackhearts (instrumentals). *Fake Friends; Handyman; Everyday People; I Love*

*Playin' with Fire; A Hundred Feet Away; Secret Love*; and five others. MCA MCA-5437 \$8.98, © MCAC-5437 \$8.98.

Performance: **Raunchy**  
Recording: **Acceptable**

Considering Joan Jett's reputation as a hard rocker, "Album" is disappointingly thin, a crude succession of stock three-chord riffs and inarticulate solos cut with not quite enough distortion to hide their ineptness. Along with the original songs, which sound as if the band had plugged in their guitars and let the tunes write themselves, are spirited but sloppy covers of *Everyday People* and *Tossin' and Turnin'*. But I guess such considerations are beside the point with music that is essentially aimed below the belt. *M.P.*

**KAJAGOOGOO: *White Feathers*.** Kajagoogoo (vocals and instrumentals). *Too Shy; Ooh to Be Ah; This Car Is Fast; Lies and Promises; Ergonomics; Hang On Now*; and four others. EMI/AMERICA ST-17094 \$8.98, © 4XT-17094 \$8.98.

Performance: **Good**  
Recording: **Good**

The nonsense name belies the shrewdness of this British quintet. Originally an avant-garde quartet named Art Nouveau, Kajagoogoo alternated as the Handstands for commercial bookings and brought in a new lead singer, Limahl, a former actor. Limahl's chutzpah led to an introduction to Duran Duran producer Nick Rhodes and then to a hit single, *Too Shy*. The group's showbiz sense is evident on this debut album; the lyrics are hoopla, the playing and singing laudevillian. It's meant to be entertaining, and it is. A bit silly, but fun. *J.V.*

**LOVERBOY: *Keep It Up*.** Loverboy (vocals and instrumentals). *Hot Girls in Love; Queen of the Broken Hearts; Meltdown; Chance of a Lifetime; Strike Zone*; and four others. COLUMBIA QC 38703, © QCT 38703, no list price.

Performance: **Good, but . . .**  
Recording: **Good**

Loverboy is the hottest thing in Canada and one of the hottest things here, actually selling millions of records in a time when the record business is soft. A hard-working, conscientious touring band that gives a good stage show, Loverboy works out its material and tests it on the road before audiences. But the transfer of this material to studio recordings doesn't work. The audience is missing, the ambience is missing, and the effect is lost. This should have been a live album. *J.V.*

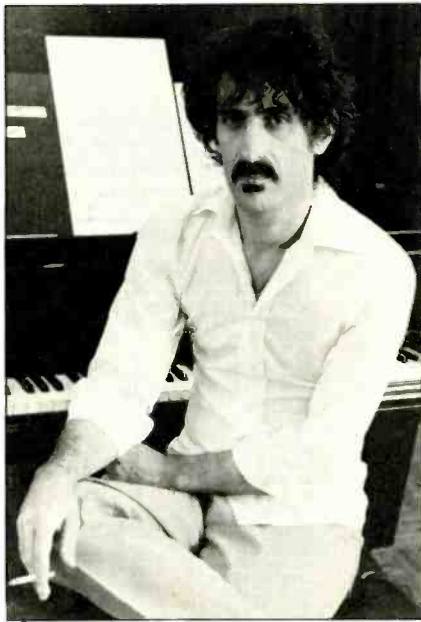
### RECORDING OF SPECIAL MERIT

**THE MANHATTANS: *Forever by Your Side*.** The Manhattan (vocals); instrumental accompaniment. *Crazy; Start All Over Again; Forever by Your Side; Just the Lonely Talking Again; Locked Up in Your Love*; and three others. COLUMBIA FC 38600, © FCT 38600, no list price.

Performance: **Sweetly sentimental**  
Recording: **Very good**

Maybe I'm old-fashioned, but I find few popular sounds more soothing than that of a





Chris Weller/Reims Ltd

## Zappa

OVER the years a number of major orchestras, including the Los Angeles and London Philharmonics, have performed the orchestral music of Frank Zappa. While this may have much to do with Zappa's personal persistence, as well as the near-bankrupt condition of twentieth-century serious composition in general, it's clear that, as rock musicians go, Zappa is an accomplished composer. A perceptive and critical student of music theory, he has developed a highly individual, identifiable style, in part a synthesis of the percussion-based techniques of Varèse and, to a lesser degree, Stravinsky, and in part a product of what Zappa freely admits are his own "warped sensibilities." His music is uniquely capable of eliciting terror or laughter, but it has absolutely no warmth.

The London Symphony's new album "Zappa, Volume 1," on Zappa's own Barking Pumpkin label, is the most lavish and flattering presentation of his orchestral music to date. It reveals his remarkable strengths as an arranger and scorer as well as his complete lack of interest in conventional melodic values—an unconcern that plagues much of contemporary music. The pieces here have no unifying structure (I don't care what's written in the score) that is discernible to the average—or above-average—ear. Rather, they are vast, linear expanses of sound, series of spliced-together patterns of notes that could conceivably be called melodies but instantly dissolve in a cacophony of horn blasts or drum rolls.

It turns out that Zappa is not exactly a wellspring of new ideas; many of these clipped themes have appeared, with minor differences, in some of his more ambitious earlier works, such as "200 Motels." These phrases are almost personal mannerisms for him. But, although Zappa may recycle

them from album to album, he never repeats any of them within a piece, so it's all but impossible to hold onto the music. Once it's passed, it's gone for good. The effect is deliberate, of course, but not particularly satisfying for the listener.

On the other hand, the *sounds* Zappa coaxes from an orchestra are fascinating. Because he's a tireless experimenter and a seasoned performer, he has a deep understanding of the capabilities of the instruments he writes for. He gets more interesting sounds from the string choir, for instance, than John Williams has ever managed, and no one else I know of can get the kind of attenuated, woozy sound from the brass that Zappa does. He exploits fully the menacing/hilarious duality of the woodwinds, and he is an unrivaled master in the use of percussion. It is on this level of sheer aural experience that "Zappa, Volume 1" succeeds best.

In his latest straight rock album, however, Zappa is simply insufferable. Never one to dodge the tough issues, on "The Man from Utopia" he mounts his soap box once again to tell us exactly what's wrong with our sick society: executive suites reeking with recreational drugs, corrupt labor-union bosses sealing deals with the Mafia, eighteen-year-old coeds who rediscover the word "no," after five years of voracious sex, just as the band rolls into town, and an alarming, widespread lack of interest in basic kitchen sanitation. Let me add a couple of things about this society that "The Man from Utopia" reminded me that I object to: self-righteous harpies who don't apply the same moral standards to a horny bass player as to teenage girls; and pompous, self-important artists who've forgotten what it's like to have an original idea.

Zappa may be the only person left who still thinks grade-B monster movies from the Fifties are a fresh subject for parody. This album could have been called "Blah blah blah," so shopworn and perfunctory are its themes. The only new wrinkle is Zappa's latest vocal mannerism—a droning, half-witted, atonal delivery that is, to put it plainly, unbearable. There are three fairly interesting instrumentals buried here, but the chances are exceedingly slim that you'll be able to endure the rest of the garbage to get to them. Zappa the serious composer leaves me uneasy, but Zappa the rocker just turns me off. —Mark Peel

**FRANK ZAPPA: *Zappa, Volume 1.*** London Symphony Orchestra, Kent Agano cond. *Sad Jane; Pedro's Dowry; Envelopes; Mo'n Herb's Vacation.* BARKING PUMPKIN ● FW 38820, © FWT 38820, no list price.

**FRANK ZAPPA: *The Man from Utopia.*** Frank Zappa (vocals, guitar, synthesizer, Lynn drum) (vocal and instrumental accompaniment. *Cocaine Decisions; The Dangerous Kitchen; Tink Walks Amok; The Radio Is Broken; Moggio; The Man from Utopia Meets Mary Lou; Stick Together; Sex; The Jazz Discharge Party Hats; We Are Not Alone.* BARKING PUMPKIN FW 38403, © FWT 38403, no list price.

vintage rhythm-'n'-blues group of men blending their voices in close harmony, especially if they are the sort of sharp professionals who pay close attention to each musical detail. The Manhattans are such a group of smoothies, and their latest recording finds them in a sweetly sentimental frame of mind. Admittedly, the pacing of this album might be considered geriatrically slow by younger r-&-b fans conditioned to the ever-present "party-party, get-down" themes that dominate today's top hits, but this is *real* soul music in the classic r-&-b tradition. For proof, just listen to the title track, which is as mellow and affecting as anything the Manhattans have cut in their nineteen years together. P.G.

**MARTHA AND THE MUFFINS: *Danse-parc.*** Martha and the Muffins (vocals and instrumentals); other musicians. *Danse-parc; Obedience; World Without Borders; Walking into Walls; Sins of Children;* and four others. RCA AFL1-4664 \$8.98. © AFK1-4664 \$8.98.

Performance: **Cute**  
Recording: **Excellent**

"Danseparc" is an odd record. Mostly, it's the usual art-school minimalist funk—lots of banal soul riffs played slightly out of kilter and overlaid with Eno-esque electronic effects. But there are real, even attractive, tunes lurking here and there, and there is a certain playfulness to the band's work that reminds me of Lindsey Buckingham's goofier touches on Fleetwood Mac's "Tusk." What's more, vocalist Martha Davis (when you can get over the fact that she sounds uncannily like Helen Reddy!) has a lot more personality than the singers you usually encounter in self-consciously modern bands like Polyrock. Ultimately, what Martha and the Muffins do is all pretty pretentious, I suppose, but somehow it's also kind of cute. As I said, an odd record. S.S.

**MEAT LOAF: *Midnight at the Lost and Found.*** Meat Loaf (vocals); vocal and instrumental accompaniment. *Razor's Edge; Wolf at Your Door; Keep Driving; The Promised Land; Fallen Angel;* and five others. EPIC/CLEVELAND INTERNATIONAL FE 38444, © FET 38444, no list price.

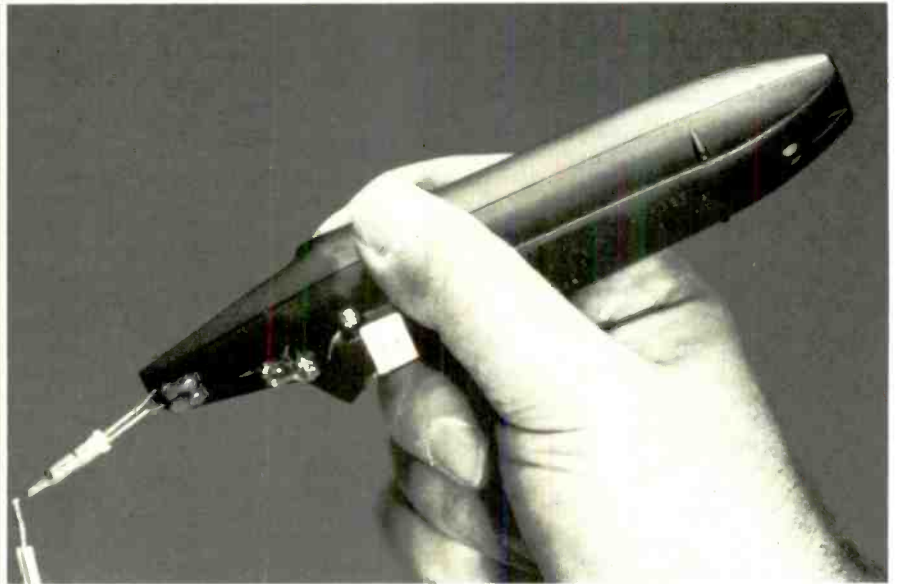
Performance: **Overbaked**  
Recording: **Fair**

Meat Loaf is a novelty act, and I find him quickly tiresome. His hambola delivery and tantrum vocal tones may provide vicarious release for kiddos in the hinterlands, but they're still vaudevillian, and his monotonous bellows and keenings (and Tom Dowd's noisy production) can't disguise the mediocrity of most of the songs here. Even Chuck Berry's *The Promised Land* is done in a way that removes all the momentum and humor of the original. The only time things jell is on *Priscilla*, where everyone is more or less restrained and the song—a funny character sketch of a budding bimbo—is allowed to breathe. Otherwise this is a suffocating album. J.V.

**GRAHAM PARKER: *The Real Macaw*** (see **Best of the Month**, page 73)

**PINK FLOYD: *Works.*** Pink Floyd (vocals and instrumentals). *One of These Days; Ar-*





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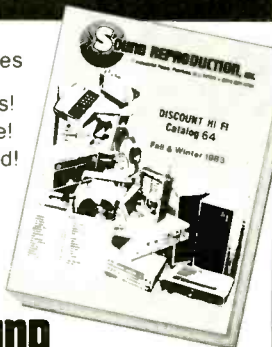
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old Layne; Fearless; Brain Damage; Eclipse; Set the Controls for the Heart of the Sun; and four others. CAPITOL ST-12276 \$8.98, © 4XT-12276 \$8.98.

Performance: **Psychedelic**  
Recording: **Archival**

"Works" dusts off six years of music recorded between 1967, when Pink Floyd emerged from London's "Spontaneous Underground" as Britain's answer to San Francisco psychedelia, and 1972, when the group released the monumental "Dark Side of the Moon." The difficulty in summing up Pink Floyd's best work from this period lies partly in the fact that it rarely took the form of a three-minute song. "Atom Heart Mother," "Umma Gumma," and "Mettle" all included extensive side-length experimental compositions, none of which are excerpted here. But the selections that are included are representative and probably largely unknown to most American fans under thirty. They include the band's first two singles, *Arnold Layne* (a psychedelic artifact about a transvestite that was banned from broadcast in the U.K.) and *See Emily Play* (another flower-power landmark and their first true smash). Both were written by Pink Floyd's founder, Syd Barrett, the odd, charismatic genius whose schizophrenia made it impossible for him to continue with the band after 1968. Barrett was both the creative inspiration for and the subject of much of Pink Floyd's subsequent work, particularly "Dark Side of the Moon," represented here by *Brain Damage* and *Eclipse*.

After Barrett's departure, the band moved from psychedelia to space. *One of These Days* (from "Mettle") typifies the hypnotic, repetitive electronics that characterized Pink Floyd's music from 1969-1972. Perhaps the most unusual—and certainly the funniest—piece on "Works" is *Several Species of Small Furry Animals Gathered Together in a Cave and Grooving with a Pict* (from "Umma Gumma"), a clever exercise in electronically augmented percussion that sounds like a rodent jam session fronted by an old Scotsman railing in an ancient dialect.

As a historical retrospective, "Works" is simply too short. The addition of edited sections of some of the longer compositions, plus the inclusion of such notably missing classics as *Astronomy Domine*, could easily have provided enough material for a two-record set. But it's not a bad sampler for the present generation of Pink Floyd converts whose experience with the group began with "The Wall." M.P.

**QUARTERFLASH: Take Another Picture.** Quarterflash (vocals and instrumentals). *Take Me to Heart; Take Another Picture; Shane; Eye to Eye; It Don't Move Me; Shakin' the Jinx*; and four others. GEFEN GHS 4011 \$8.98, © MSG 4011 \$8.98.

Performance: **Depressing**  
Recording: **Excellent**

I suppose this is a harmless enough artifact, but it's the kind of album that in my darker moments strikes me as a metaphor for everything that's wrong with the record business, maybe even the world. Oh, technically, it's just about perfect. Quarterflash sings and plays all the right notes, though it

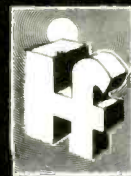
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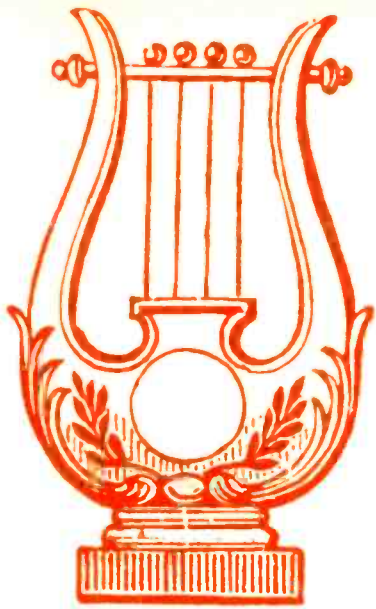
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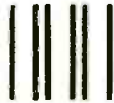
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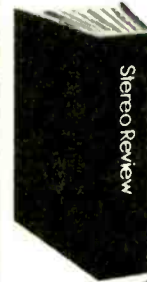


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should be noted that Rindy Ross, who fronts this collection of savvy pros, remains the least convincing sax player of the last twenty years. The production and engineering are state-of-the-art, and the songs, pure New Wave hack-work though they may be, are tuneful enough to be almost memorable. The problem is that, to paraphrase Raymond Chandler, this is music with a heart as big as an olive pit, the kind of stuff that can only be produced by people who have gone directly from music school to the recording studio without ever having passed through life. S.S.

**RENAISSANCE: Time-Line.** Renaissance (vocals and instrumentals); instrumental accompaniment. *Flight; Missing Persons; Chagrin Boulevard; Richard the IX; The Entertainer;* and five others. IRS SP 70033 \$8.98, © CS 70033 \$8.98.

Performance: **Floundering**  
Recording: **Okay**

The old Renaissance's dreamy fusion of folk, classical, and soft rock may not have been for everyone, but at least it was for *someone*. Renaissance has been reduced to a trio now, and its new sound—coarser, guitar-based arrangements, and harder rock rhythms—isn't for anyone, I'm afraid. John Taut's rhapsodic piano, which gave Renaissance its grandeur and created a more flattering environment for Annie Haslam's delicate, crystalline vocals, is sorely missed. In this updated context, Haslam's fragile voice flounders; she simply can't manage the

acrobatic phrasing this music demands. And what little remains of the old Renaissance—the occasional folk-like theme, for instance—sounds hokey in this setting. A disaster. M.P.

**LINDA RONSTADT AND THE NELSON RIDDLE ORCHESTRA: What's New.** Linda Ronstadt (vocals); the Nelson Riddle Orchestra. *I Don't Stand a Ghost of a Chance with You; What'll I Do; Crazy He Calls Me; Someone to Watch Over Me; What's New;* and four others. ASYLUM 1-60260 \$8.98, © 4-60260 \$8.98.

Performance: **Charming**  
Recording: **Splendid**

This is an interesting, and mostly successful, attempt by Linda Ronstadt and conductor-arranger Nelson Riddle to re-create the mood and feeling of top-of-the-line popular record making of the 1950's. It's more than a little reminiscent of the great Sinatra recordings of that period (Riddle collaborated on several of those also), particularly in its repertoire. Of the nine songs here, there isn't one that isn't a classic of its kind, immediately recognizable after a bar or two.

Ronstadt challenges some formidable predecessors in such songs as *I've Got a Crush on You, Someone to Watch Over Me, and Lover Man*. With Riddle's expert help she gives a series of musically accurate, professionally crafted, and totally charming performances. What they miss, of course, is the truly personal stamp that such artists as Lee Wiley, Gertrude Lawrence, and Billie

Holiday put on their historic performances of the same material. Nevertheless, "What's New" is an almost sinfully pleasing album. It goes down like a double-thick chocolate shake—and has just as little kick. Yet I can't imagine a pleasanter way of hanging on "hold" until American popular music comes up with something that is genuinely new. P.R.

**DIANA ROSS: Ross.** Diana Ross (vocals); vocal and instrumental accompaniment. *That's How You Start Over; Love Will Make It Right; You Do It; Pieces of Ice;* and four others. RCA AFL1-4677 \$8.98, © AFK1-4677 \$8.98.

Performance: **For the masses**  
Recording: **Good**

By now, the hype surrounding Diana Ross has become so dense that it is difficult to tell what her real talents are as a singer, performer, and actress. Her glittering performances before hundreds of thousands in stadiums and parks have transformed her into a legend not only bigger than life but, if possible, bigger than mere superstardom, that purely contemporary hyperthyroid American condition. Ross has, indeed, come a long way from the projects of Detroit. But scratch the layers of make-up, contrived publicity, and public posturing and you'll find an artist who has a legitimate claim to significance.

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*That's How You Start Over*, sizzling with gospelish insistence. It is followed by an equally wonderful selection, *Love Will Make It Right*, showcasing her slashingly sharp, brightly sassy soprano against a background of clustered vocal harmonies. But then she begins playing to the masses, trying to be everything to every fan, dipping into New Wave, grabbing up a few Ray Parker tunes (not his best), and employing a pastiche of rock techniques on *Pieces of Ice*, which, though musically undernourished, will probably be pumped up into a megahit.

I came away from this album with the feeling that the real Diana Ross is still there, somewhere behind her exploding mane of hair and her dazzling costumes, but that she has spread herself out in so many directions that her essential musical core has been weakened. This is an album that will appeal in part to many but not entirely to any. Maybe that's what superstardom is all about—touching all the bases and managing to turn long flies into home runs. *P.G.*

**SISTER SLEDGE: *Bet Cha Say That to All the Girls*.** Sister Sledge (vocals); vocal and instrumental accompaniment. *B.Y.O.B. (Bring Your Own Baby); Lifetime Lover; Once in Your Life; Shake Me Down; Dream On; Let Him Go;* and four others. COTILION 90069-1 \$8.98, © CS-90069-1 \$8.98.

Performance: **Some good moments**  
Recording: **Satisfactory**

I thought Sister Sledge had finally hit its stride with the release last year of "The Sisters," which was full of quality material that did justice to the appealing way they blend their high, light voices. The members of the winsome quartet produced that excellent set themselves and wrote much of the material. But with this new album, they have taken a step backward. George Duke, who seems to be spreading himself too thin, has done a so-so job as producer, cluttering the album with too many lackluster songs and warmed-over arrangements. The last three selections are the best, highlighted by the delightful *Bet Cha Say That to All the Girls*, with Al Jarreau stepping in to deliver a jive dude rap. The clever lines and quick interplay here help salvage a mainly mediocre album whose other high spots are a ballad called *Gotta Get Back to Love* and a bouncing *Thank You for the Party*. Otherwise, zilch. *P.G.*

**SYLVIA: *Snapshot*.** Sylvia (vocals); vocal and instrumental accompaniment. *Snapshot; Tonight I'm Gettin' Friendly with the Blues; Winter Heart; The Boy Gets Around; Jason; I Never Quite Got Back (From Loving You);* and four others. RCA AHL1-4672 \$8.98, © AHK1-4672 \$8.98.

Performance: **Crossover completed**  
Recording: **Good**

RCA Records and producer Tom Collins, who originally saw Sylvia as a cross between Crystal Gayle and Barbara Mandrell, now insist on packaging her as a modern-day bobby-soxer merrily wending her way through life in imaginary poodle skirts. Last winter, Sylvia scored big with a bouncy little pop tune called *Nobody* on which Collins exhausted every trendy production

effect imaginable. Now that song has been redone as the disgustingly cute *Snapshot*, and Collins has trotted out the same background singers to "ooh" and "aah" and chortle in all the same places as before. The result is that Sylvia is beginning to make her way over into the pop charts, but she's also beginning to sound as vapid as a Juicy Fruit jingle. The rest of the album is as overproduced as usual.

Sylvia's voice hasn't really matured yet, but she gets better every time out, and if Collins doesn't succeed in making her into a latter-day Lesley Gore, she'll probably be leading the Nashville pack one day. *A.N.*

**PAM TILLIS: *Above And Beyond the Doll of Cutey*.** Pam Tillis (vocals); orchestral accompaniment. *Never Be the Same; Killer Comfort; Make It Feel Better; Popular Girl;* and six others. WARNER BROS. 23871-1 \$8.98, © 23871-4 \$8.98.

Performance: **Okay**  
Recording: **Good**

Pam Tillis apparently prides herself on her way with words (you did catch the Spoonerism of the title, didn't you?), and that is something of a mistake—especially when she applies herself to furnishing the lyrics for such things as *Killer Comfort* and *Make It Feel Better*, neither of which makes much sense in any literal way. She is an energetic performer and does her best to pound her rather confusing messages home. Unfortunately, both her voice and the surrounding production seem to have found only one mode: LOUD. *P.R.*

**BIG JOE TURNER & ROOMFUL OF BLUES: *Blues Train*.** Big Joe Turner (vocals); Roomful of Blues (instrumentals); Dr. John (piano). *Crawdada Hole; Red Sails in the Sunset; I Want a Little Girl;* and six others. MUSE MR 5293 \$8.98.

Performance: **Good, but . . .**  
Recording: **Very good**

I greatly enjoy Joe Turner's recordings from the Fifties, and he was still in good form on the Pablo label reunion dates with the Count Basie band in the late Seventies. The present session is a bit disheartening, though. Turner's tone and volume are still robust, but his phrasing is mechanical. I don't think this is due to any retreat of his artistic powers but rather to age and—judging from the album photographs—illness. Still, he turns in a creditable performance.

Roomful of Blues is at its hottest backing him, and the group positively boils on the instrumentals *Jumpin' for Joe* and *Last Night*, a reprise of the old Mar-Kee's "Memphis Sound" strutter. Dr. John is on hand to provide rococo piano backing on *I Want a Little Girl*. *J.V.*

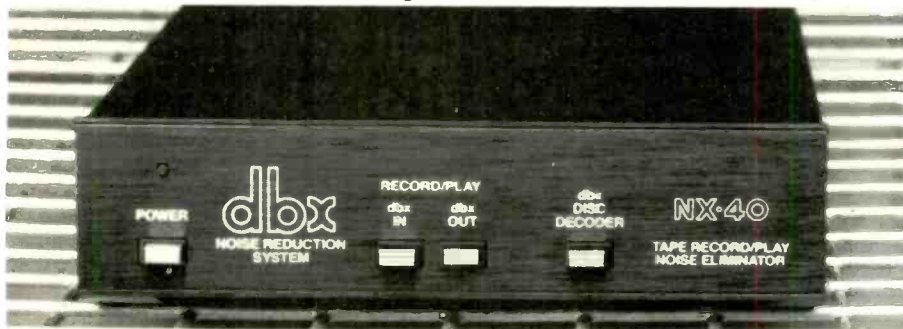
**BONNIE TYLER: *Faster Than the Speed of Night*.** Bonnie Tyler (vocals); instrumental accompaniment. *Have You Ever Seen the Rain?; It's a Jungle Out There; Tears; Take Me Back; Getting So Excited;* and four others. COLUMBIA BFC 38710, © BCT 38710. no list price.

Performance: **Okay**  
Recording: **Good**

Eons ago Bonnie Tyler had a chart hit titled *It's a Heartache*. Since then it's been rather

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It really works. It doesn't remove things like tape hiss and the like, but it does seem to remove 80 to 90% of all the clicks and pops on my records.



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## The Jazz of Bennie Wallace

**B**ENNIE WALLACE'S tenor saxophone has the sonority of Coleman Hawkins's, the smoothness of Ben Webster's, and the free spirit of Ornette Coleman's. In other words, Wallace consistently mirrors neither another player nor another era. Of course, no one is *wholly* original, and there is undeniably a comfortable familiarity about his playing, but Wallace's horn speaks in erudite tones that are as readily distinguished from other players as are the voices of Jimmy Stewart and Bette Davis from other actors. Sad to say, it is not often that we find a new jazz voice with such individual character, so there is reason to rejoice when one crops up. No, Bennie Wallace isn't someone who popped up yesterday, but, half a dozen albums notwithstanding, he is still relatively unknown in his own country. His albums are all on Enja, a European label.

The latest of these, "Big Jim's Tango," features Wallace with bassist David Holland and drummer Elvin Jones (Wallace al-

ways keeps good company), and it has just been imported from Germany by PolyGram. The program contains one Cole Porter tune, *My Heart Belongs to Daddy*, complemented by four of the leader's own. This repertoire gives Wallace a chance to show what a stylistic chameleon he is, but it really all boils down to an engaging, forceful Wallace style that is full of pleasant surprises. Jazz without surprises is pretty dull fare—if, indeed, it is jazz at all. Bennie Wallace plays jazz right down to the very marrow. Let's hope he soon gets due attention on this side of the pond as well.

—Chris Albertson

**BENNIE WALLACE:** *Big Jim's Tango*. Bennie Wallace (tenor saxophone); David Holland (bass); Elvin Jones (drums). *Big Jim Does the Tango for You*; *My Heart Belongs to Daddy*; *Green & Yellow*; *Monroe County Moon*; *The Free Will*. ENJA/POLYGRAM SPECIAL IMPORTS 4046 \$9.98.

quiet around the office of Tyler's accountant. This elaborate attempt to resuscitate her popularity arrives with the musical equivalent of tail-fins. Tyler endows everything with such frenetic energy that the material wilts around her like dead ferns. Things reach such a pitch on *It's A Jungle Out There* that I felt I was watching a musical version of an old Joan Crawford movie—you know, where she tells the D.A. that things are far from easy for a beautiful, sexy, good girl on her own. P.R.

### RECORDING OF SPECIAL MERIT

**STEVIE RAY VAUGHAN:** *Texas Flood*. Stevie Ray Vaughan (vocals, guitar); instrumental accompaniment. *Love Struck Baby*; *Pride and Joy*; *Texas Flood*; *Tell Me*; *Testify*; *Mary Had a Little Lamb*; and

four others. EPIC BFE 38734, © BET 38734, no list price.

Performance: **Classic**  
Recording: **Excellent**

On the eve of his massive worldwide tour, David Bowie dropped an unexpected bomb: his lead guitarist, Stevie Ray Vaughan, had quit over a money squabble. While a tour with Bowie might have been great for his career, it's hard to imagine how Vaughan, a master of rockabilly and electric blues guitar, would have fit into the antithetical environment of Bowie's cool, synthetic, modern-age theatrics. It's a moot question now. But this gritty, jumping, and altogether thrilling record is anything but moot.

As a display of rock guitar virtuosity, "Texas Flood" is brilliant. Like Johnny Winter, Vaughan has a heavy, muscular

technique, but Vaughan is a much cleaner player and never lapses into the slushy power riff's Winter leaned on when he'd run out of ideas. Vaughan's vocabulary is as much a product of Chicago and Memphis dialects as of Texas, ranging from energized Chuck Berry licks to stinging B. B. King boogie. And, like all the great blues masters, Vaughan can do more than bend a string. His husky, soulful vocals and straightforward tunes get to the heart of the blues in a persuasive, unshowy way, with feeling rather than flamboyance. The current blues revival is one of the healthiest phenomena in pop music today, a tonic for playlists bleached by the silicon sounds of synth. Stevie Ray Vaughan's "Texas Flood" injects that revival with enough juice to keep it going for a long time. M.P.

**LOUDON WAINWRIGHT III:** *Fame and Wealth*. Loudon Wainwright III (vocals, guitar); Richard Thompson (guitar, mandolin); other musicians. *Reader and Advisor*; *The Grammy Song*; *Dump the Dog*; *Thick + Thin*; *Revenge*; *Five Years Old*; and six others. ROUNDER 3076 \$7.98.

Performance: **Unsettling**  
Recording: **Excellent**

Loudon Wainwright's new album, as usual, contains a couple of instant laugh-riot classics. My favorite is *The Grammy Song*, a wry fantasy in which Loudon wins one, thanks the Lord and his producer (cf. Bob Dylan), and then gets his behind pinched by Debbie Harry. Other songs here are about as funny as a successful suicide. When Wainwright sings about *Revenge* you can tell he's only half kidding, and in *April Fool's Day Morn* he unloads a torrent of self-loathing that most of us less celebrated folk would probably save for our shrinks.

It's all impeccably crafted, to be sure. And musically Loudon's folkie minimalism is considerably enlivened by the presence of the incomparable Richard Thompson, who provides chilling electric guitar on *Reader and Advisor*. Still, "Fame and Wealth" makes for extremely uncomfortable listening overall. It's probably the most depressing comedy record of the year. S.S.

**NARADA MICHAEL WALDEN:** *Looking at You, Looking at Me*. Narada Michael Walden (vocals, drums, synthesizer); orchestra. *Shake It Off*; *Black Boy*; *Dream Maker*; *Tina*; *Burning Up*; *Reach Out (I'll Be There)*; and three others. ATLANTIC 80058-1 \$8.98, © CS-80058-1 \$8.98.

Performance: **Good**  
Recording: **Good**

Narada Michael Walden's new album is an extremely well-made piece of pop entertainment. Walden writes most of his own material, and his performances have variety, color, and an often extraordinary pace. His voice is emotional, street-direct, and capable of getting the slackest sort of banality, such as *Tina*, up on its feet and running. The best things here are a strong, part-rap, part-disco *Shake It Off* and the gritty title song, *Looking at You, Looking at Me*. Walden seems at his most natural and unstrained in *Dream Maker*, a ballad with an exceptionally heavy beat. The only problem I have with his work is its chameleon quality, which often robs it of conviction. P.R.



**JOE WALSH: *You Bought It—You Name It.*** Joe Walsh (vocals, guitar); instrumental accompaniment. *I Can Play That Rock & Roll; Here We Are Now; I.L.B.T.s; Space-Age Whiz Kid; Class of '65; Theme from Island Weirdos;* and four others. FULL MOON/WARNER BROS. 23884-1 \$8.98. © 23884-4 \$8.98, © 23884-9 \$8.98.

Performance: **Good**  
Recording: **Good**

If he'd never done anything else, ex-Eagle Joe Walsh would have earned a permanent place in pop-music history with his wonderfully wry, definitive statement on rock stardom, *Life's Been Good* from his 1978 "But Seriously, Folks . . ." album. Since then he's done a lot of good work but nothing quite so ingenious.

Now, on his debut album for Warner Brothers, the wittiest Walsh gets is on a little thing called *I.L.B.T.s*, which stands for "I love big tits." One stanza begins, "Well, they come in twos/Hard to choose" and degenerates from there. I have to admit it has its moments, though, as does the rest of the album. *I Can Play That Rock & Roll* demonstrates in part what made the Eagles so great, and *Space-Age Whiz Kid*, for all its trendiness in both subject matter (electronic video games) and treatment (sort of New Wave Neil Young), holds on to your ear for a while. In between, there's a stab at poignancy in *Class of '65*, a smattering of fake-reggae, a piece of neo-funk left over from an earlier phase in Walsh's career, and another instrumental to continue his "Themes from Island Weirdos." Not the greatest album in the world, maybe, but an interesting trip. *A.N.*

**TAMMY WYNETTE: *Even the Strong Get Lonely.*** Tammy Wynette (vocals); vocal and instrumental accompaniment. *Unwed Fathers; A Slightly Used Woman; Only the Strong Survive; Still in the Ring;* and six others. EPIC FE 38744, © FET 38744, no list price.

Performance: **Predictable**  
Recording: **Good**

Tammy Wynette is the quintessential long-suffering female country singer, and she's even got a two-hankie, "B"-movie personal life to match. Musically, though, she's been traveling the same narrow path for a long time. She just goes on recording the same album over and over, changing the one or two halfway decent songs that manage to sneak their way in. Husband George Richey, who produces her now that Tammy's split from mentor Billy Sherrill, wraps her up in arrangements that are about as pink and lacy as the frock she wears in the back cover photo, but the irrepressible trademark sob sounds as oiled and anguished as ever. *A.N.*

#### COLLECTION

#### RECORDING OF SPECIAL MERIT

**ATTACK OF THE KILLER B'S, VOL-UME 1.** Marshall Crenshaw: *You're My Favorite Waste of Time.* Pretenders: *In the Sticks.* The Blasters: *What Will Lucy Do?* Ramones: *Babysitter.* John Hiatt: *Take Time to Know Her.* Roxy Music: *Always Unknowing.* Talking Heads: *Love Goes to a*

*Building on Fire.* And five others. WARNER BROS. 23827-1 \$8.98, © 23827-4 \$8.98.

Performance: **Eclectic**  
Recording: **Varies**

Times are tough, all right. A few years ago, Warner Brothers would have been selling this record at a discount by mail as one of their loss leaders, and now they're so hard up it's on sale like a regular record. Well, no matter—this collection of B-sides, vault items, and other ephemera happens to be the most entertaining album I've heard all year. The standout track, for my money, is Marshall Crenshaw's *You're My Favorite Waste of Time*, a glorious Rundgrenesque ditty taped in Marshall's living room. But

there are lots of nifty things here: a great surf instrumental by the Pretenders; a German-language version of *Shock the Monkey*, in which Peter Gabriel proves that it is indeed possible to be soulful *auf Deutsch*; even the wonderful very-first-ever Talking Heads single, which, given the direction the Heads' music has veered in of late, sounds so pleasantly old-fashioned and conservative that it's hard to imagine anybody ever taking them for modernists. Stylistically it's a mishmash, with the Blasters' gritty r-&-b cheek by jowl with Roxy Music's languid electropop romanticism, but every cut here repays attentive listening. *S.S.*

(Continued on next page)



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# JAZZ



## RECORDING OF SPECIAL MERIT

**LAURINDO ALMEIDA AND CHARLIE BYRD:** *Latin Odyssey*. Laurindo Almeida, Charlie Byrd (guitars); Joe Byrd, Bob Magnusson (bass); Jeff Hamilton, Chuck Redd (drums). *Memory; Adios; El Gavilan; Estrellita; Gitanerias*; and five others. CONCORD JAZZ CJP-211 \$8.98.

Performance: **Just fine**  
Recording: **Good**

Laurindo Almeida and Charlie Byrd, two of the best guitarists in the business, combine their talents here for a lovely low-key, high-quality outing of mostly Latin music. *Memory* is the sole exception to the south-of-the-border repertoire, and it is magnificently performed in alternating choruses by Almeida and Byrd. For the remainder of the album these two modern-day masters meander through such standards as *Estrellita* and *Adios* with the silken grace and steely poise of twin matadors. The high point is

surely reached with a stunning performance of Lecuona's bravura *Gitanerias*. P.R.

## RECORDING OF SPECIAL MERIT

**BIG MAYBELLE:** *The Okeh Sessions*. Big Maybelle (vocals); vocal and instrumental accompaniment. *Just Want Your Love; So Good to My Baby; Gabbin' Blues; My Country Man; Jinny Mule; You'll Never Know; No More Trouble Out of Me; Hair Dressin' Women; One Monkey Don't Stop No Show; Ain't to Be Played With; Whole Lotta Shakin' Goin' On*; and eleven others. EPIC/OKEH © EG 38456 two discs, © EGT 38456, no list price.

Performance: **Sensational**  
Recording: **Good**

Billie Holiday gave the ultimate tribute to Big Maybelle when Holiday refused to follow Maybelle onstage at a Newark club, saying, "I ain't singing as long as someone like that is singing." Like Lady Day, Big Maybelle had enormous talent and a brilliant career that was destroyed by drug addiction. She was born around 1920 and made her first records in 1944 for the all-black rhythm-and-blues market. But her recording career took off with these 1952-1956 Okeh sessions, which represent the peak of her work except for some later recordings for Savoy.

If you haven't heard Big Maybelle before, you'll be struck by the power of her voice, by her phrasing, and by her child/woman sincerity. The programming on this two-

disc package is chronological, so nearly all the blues hollers wind up on one record and nearly all the more subtle ballads on the other. The arrangements are sometimes corny, but Maybelle is timeless. Instinctive about her music, she was tragically less so about her life; worn out by drugs and obesity, she died in 1972. Her last words were, "Thank God." J.V.

## RECORDING OF SPECIAL MERIT

**JACK DEJOHNETTE'S SPECIAL EDITION:** *Inflation Blues*. Jack DeJohnette (drums, clavinet, piano, vocals); Baikida Carroll (trumpet); Chico Freeman (reeds); John Purcell (flutes, reeds); Rufus Reid (bass). *Starburst; Ebony; Slowdown*; and two others. ECM ECM-23790 E \$9.98.

Performance: **Pungent**  
Recording: **Excellent**

Drummer Jack DeJohnette's Special Edition swirls around like fireworks and pops into glorious displays of colors and shapes. Every album brings different shapes, it seems, and I found myself growing very fond of the ones yielded by "Inflation Blues." Chico Freeman is on hand, which is always an asset, and fellow reed player John Purcell also leaves a lasting impression. Trumpeter Baikida Carroll—who is billed as "guest"—does dazzling things with a clarity of tone that could surely shatter Ella Fitzgerald's Memorex glass. The five compositions are the leader's, and they range from the raggedy (parts of *Slowdown*) to

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reggae (*Inflation Blues*, a bit of social commentary that painfully proves DeJohnette's inability to sing but otherwise has a certain island charm). Mainly, however, this is a fine eclectic stew far removed from ECM's frosty, antiseptic sound of old. C.A.

**JIMMY FORREST/MILES DAVIS: *Live at the Barrel*.** Miles Davis (trumpet); Jimmy Forrest (tenor saxophone); Charles Fox (piano); other musicians. *A Night in Tunisia; What's New;* and two others. PRESTIGE © P-7858 \$8.98.

Performance: **For collectors only**  
Recording: **Abysmal mono**

There ought to be a law requiring record companies to indicate when an album contains amateur recordings. I pity the consumer who, lured by the name of Miles Davis or Jimmy Forrest, buys a new Prestige release called "Live at the Barrel" and expects to enjoy decent sound. Yes, the music is of more than passing interest, but only to the dyed-in-the-wool bebop scholar or the collector whose ears have been hardened by much listening to noisy, unbalanced, and downright distorted recordings. These were made in a St. Louis club, the Barrel, around 1952, and they are bad even by that day's standards.

If you can stand the sound quality, by all means acquire this set, for it captures, however badly, a young, fiery Miles Davis and a remarkably agile Jimmy (*Night Train*) Forrest at an opportune moment. I don't know if the quality improves as the record

moves along, or if it is an adjustment my ears made, but I found this album more listenable as Forrest's tenor bopped ever so lightly through *Wee Dot*, the first cut on side two. The following number, however, is a funeral *What's New* that we could all have done without. C.A.

**JON HENDRICKS: *Cloudhurst*.** Jon Hendricks (vocals); Larry Vuckovich (piano); Isla Eckinger (bass); Kurt Bong (drums). *No More; I: Was a Dream; Here's That Rainy Day; Shiny Stockings; Jon's Mumbles; Watermelon Man;* and four others. ENJA 4032 \$9.98.

Performance: **Very good**  
Recording: **Very good**

Jon Hendricks—once part of the popular jazz vocal trio of Lambert, Hendricks, and Ross—is a formidable entertainer and a skilled lyricist who grafts words to jazz instrumentals. Like most American jazz performers, he has found a continuing audience in Europe and Japan to sustain him when things grow thin at home. This Enja album, released through PolyGram Classics, was recorded in a Munich night club, the Domicile, in early 1972.

Hendricks moves easily through his repertoire, which includes Hubert Laws's *No More*, Frank Foster's *Shiny Stockings*, Herbie Hancock's *Watermelon Man*, and Leroy Kirkland and Benny Harris's *Cloudhurst*. Some of his lyrical attachments are successful, others not. His own *Gimme That Wine* is wonderfully funny, as is *Jon's*

*Mumbles*, a satire on blues singers. Hendricks's voice is patchy, but his technique and experience allow him to bring off *Here's That Rainy Day* as the big "emotional" number of the set. His accompanists play as smoothly as a Rolls rides. His patter and laughter sometimes seem coldly professional, but after you've played as many clubs as he has, I guess you just want to do your set and go home. J.V.

#### RECORDING OF SPECIAL MERIT

**EARL KLUGH: *Low Ride*.** Earl Klugh (guitar, keyboards); instrumental accompaniment. *Back in Central Park; (If You Want to) Be My Love; Low Ride; Just Like Yesterday; Christina;* and three others. CAPITOL ST-12253 \$8.98, © 4XT-12253 \$8.98.

Performance: **Tasteful pop-jazz**  
Recording: **Very good**

Earl Klugh is regarded by some people as a once-refreshing jazz guitarist who has fallen into a rut of predictability, but he is still capable of producing albums that are exceptionally easy to listen to. Here again he presents an assortment of his own compositions, lightly Latin-flavored pieces with a trace of popular rhythms or a touch of folk feeling. All feature his crisp, tasteful acoustic guitar serving up engaging, if conservative, improvisations. A bonus is a pair of first-rate orchestral arrangements, by Johnny Mandel on *If You're Still in Love with Me* and by Clair Fischer on *Christina*, the



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loveliest selection of all. Perhaps this is little more than high-grade Muzak, but Klugh cannot be faulted for staking out a modest corner of the musical turf and managing it with cool finesse. *P.G.*

**BARBARA LEA, BOB DOROUGH, AND DICK SUDHALTER: Hoagy's Children.** Barbara Lea (vocals); Bob Dorough (piano, vocals); Richard Sudhalter (cornet, flugelhorn); other musicians. *Old Man Harlem; New Orleans; Riverboat Shuffle; Little Old Lady; Washboard Blues; Small Fry;* and seven others. AUDIOPHILE AP-165 \$7.98 (from Audiophile Records, 3008 Wadsworth Mill Place, Atlanta, Ga. 30032).

Performance: **Good-humored**

Recording: **Very good**

The edges of Bob Dorough's piano playing are a bit rough, and Dick Sudhalter's Bixian cornet playing tends to be on the egocentric side, but there is an undeniable charm in the grooves of "Hoagy's Children," which pays tribute to composer/singer/pianist Hoagy Carmichael. Much of that charm is found in the vocals, which are by Dorough and Barbara Lea, the other featured performer in what is essentially a night-club revue originally presented at Michael's Pub in New York. *C.A.*

**PAT LONGO'S SUPER BIG BAND: Billy May for President.** Pat Longo's Super Big Band (instrumentals); Frank Sinatra Jr. (vocals); other musicians. *Come What May; Missy; Joyful Junction; Sweet and Lovely; Midnight Sun; Poor Butterfly;* and five others. TOWNHALL \$9.98 (from Town-Hall Records, Box 5332, Santa Barbara, Calif. 93108).

Performance: **Enthusiastic**

Recording: **Good**

This album has been assembled by bandleader and saxophonist Pat Longo primarily as a tribute to the work of arranger Billy May. May provided the arrangements for five of the songs, including *Missy*, which was composed and performed by Frank Sinatra Jr. May was, of course, the arranger for many of Frank Sr.'s most famous albums, and his work for Frank Jr. gives the eerie impression that cloning is possible. Longo is a better-than-good sax player, and he's able to work up quite a bit of enthusiasm from band to band. This is a relaxed, good-humored session of nostalgic music making. *P.R.*

**MAINSTREAM: Steamin' Mainstream.** Glenn Zottola (trumpet, flugelhorn, alto saxophone); Harold Danko (piano); Rick Laird (bass); Butch Miles (drums, vocals). *Love for Sale; Ain't Misbehavin'; Silly Samba; Caravan; Lady Be Good;* and five others. DREAMSTREET DR 107 \$8.98 (from Dreamstreet Records, P.O. Box 193, Ho Ho Kus, N.J. 07423).

Performance: **Steamin' indeed**

Recording: **Fair remote**

Mainstream is a quartet of talented, experienced players whose music can best be described just that way: mainstream. The group's latest album release, "Steamin' Mainstream," consists of ten selections, most of them familiar, recorded in a Larchmont, New York, club almost two and a

half years ago. The audience obviously loved what it heard. What the record captures is a good forty-one minutes of smooth, very spirited jazz that ought to please anyone with an ear for improvisation. *C.A.*

**THE GLENN MILLER ORCHESTRA: In the Digital Mood.** The Glenn Miller Orchestra (instrumentals); Julius LaRosa, Mel Tormé, Marlene VerPlanck, Marty Nelson, Michael Mark (vocals). *Chattanooga Choo-Choo; The American Patrol; A String of Pearls; Moonlight Serenade; In the Mood;* and five others. GRP ● GRP-A-1002 \$8.98, © CP-1002 \$8.98, © GBT-1002 \$8.98 (from GRP Records, Inc., 555 West 57th Street, New York, N.Y. 10019).

Performance: **Clear reflections**

Recording: **Excellent**

Forty years have passed since a small plane carrying bandleader Glenn Miller disappeared somewhere between England and France. His was an enormously popular band, and it had a sound unlike any other. That sound was revived in 1956, when a new "authorized" Glenn Miller Orchestra was formed under the leadership of drummer Ray McKinley, the sideman who took over Miller's military band in 1943.

I'm not sure it is a good idea to give any band eternal life, and as Time-Life's fifteen-volume "The Swing Era" series proved a decade ago, re-creating the big-band classics can be disastrous. The fact is that the big bands of the Forties were very well recorded, and no matter how advanced the audio technology, a mechanical re-creation simply cannot compare with a good mono reissue of a spirited original performance.

"In the Digital Mood" applies digital recording technology to Glenn Miller's music, obviously, and the result is not at all offensive. Still, I have to say honestly that I get greater satisfaction from the original recordings, which are all currently available on RCA's Bluebird label. Here it is the sound that dazzles, and I am sure the promised CD version will be even more impressive. But no matter how sharp the image, a mirror is only a mirror. *C.A.*

**VAUGHN NARK: Cutting Through.** Vaughn Nark (trumpet); other musicians. *Runaway; Night in Tunisia; Line for Lyons; Counting Down;* and four others. LAVENHAM LVH8103 \$8.98 (from Lavenham Records, 10604 Democracy Lane, Potomac, Md. 20854).

Performance: **Dizzying**

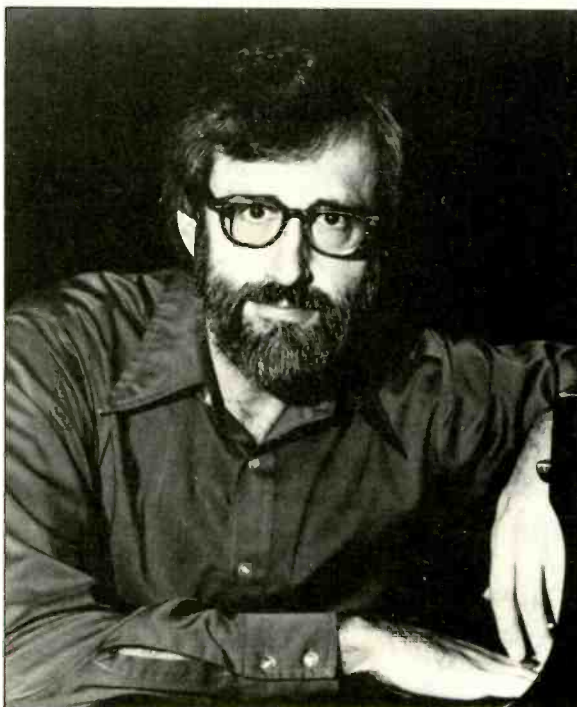
Recording: **Good**

Unless you live in the Washington, D.C., area, trumpeter Vaughn Nark's name is probably as unfamiliar to you as it was to me before I received "Cutting Through," his first album. You will recognize elements of his style, however, and I don't mean that in any derogatory sense. Nark, now in his mid-twenties, has been lead trumpeter with the Airmen of Note, a U.S. Air Force band, since 1978, but he could easily hold a similar position in the commercial musical world. He can scale a complex melodic line at any tempo with deceptive ease, and he has a way of effortlessly blowing his horn to dizzying heights. But dazzling technique is not Nark's only musical asset: he also has a



# Denny Zeitlin and Charlie Haden

Pianist  
Denny Zeitlin



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**P**IANIST Denny Zeitlin first came to my attention in 1964 when he made a Columbia album, "Flute Fever" (CS 8936), with flutist Jeremy Steig. A debut for both players, the release was as exciting a display of technical brilliance and imagination as I had ever heard on a first outing. When Zeitlin made his own Columbia album, "Cathexis" (CS 8982), shortly thereafter, it was equally impressive, and I expected to hear a great deal more from him. It was not to be, however, because Zeitlin was spending most of his time pursuing a career in psychiatry. Now this keyboard psychiatrist seems to be re-emerging on the jazz scene, and we are all the richer for it.

Bassist Charlie Haden has, of course, been on the scene for several years, recording profusely. If he has ever made a record that was less than fine, I cannot recall hearing it, but neither do I recollect one more thoroughly satisfying than "Time Remembers One Time Once," an ECM import that brilliantly captures a collaboration between him and Zeitlin at San Francisco's Keystone Korner in the summer of 1981. Zeit-

lin's playing still has the flash that so impressed me almost twenty years ago, but now there is also more substance, and the one-time George Russell student has found the perfect partner in Haden, whose playing has always been profound. Their nine musical conversations here are eminently accessible, yet thought-provoking and rife with intriguing nuances that are so subtle they may be overlooked until the second or third hearing. This is soft, gentle music, but it has a strong spine. I hope this is only the first of many such collaborations. If Denny Zeitlin performs another disappearance act, the loss will be far greater now than it was in the Sixties.

—Chris Albertson

**DENNY ZEITLIN AND CHARLIE HADEN: *Time Remembers One Time Once.*** Denny Zeitlin (piano); Charlie Haden (bass). *Chairman Mao; Bird Food; As Long as There's Music; Time Remembers One Time Once; Love for Sale; Ellen David; Satellite/How High the Moon; The Dolphin.* ECM/POLYGRAM SPECIAL IMPORTS ECM 1239 \$9.98.

commendable esthetic sense, and—as the cut *Alone* here demonstrates very well—he can write a pretty tune and play it even prettier. When he is not reminding us of Dizzy Gillespie, Nark is apt to slip into a mellow Chet Baker groove modulated with early Miles.

The Vaughn Nark Quintet heard on this album is a working unit that includes two of Nark's fellow Airmen of Note, reed player Peter BarenBregge and bassist Tom Williams, one former Airman, drummer Dave Palamar, and Stef Scaggiari, an impressive pianist who free-lances in the Washington area. They sound fine as they go their bop-pish way together.

C.A.

**KIM PARKER: *Good Girl.*** Kim Parker (vocals); Tommy Flanagan (piano); Jesper Lundgaard (bass); Ed Thigpen (drums). *Hooray; The Good Little Girl; How My Heart Sings; Close Enough for Love; Bijou (I'm Crazy for You);* and three others. SOUL NOTE/POLYGRAM CLASSICS SN 1063 \$9.98.

Performance: **Promising**  
Recording: **Good**

Kim Parker, stepdaughter of both Charlie Parker and Phil Woods, has a vocal and musical maturity that adds a great deal to her performances. Her voice has a streaky-amber quality, and her lyric readings, even

in such trivia as *Bijou (I'm Crazy for You)*, have a worldly touch of asperity. Although I could have done with a good deal more toughness of approach in almost everything here, Parker shows a very promising talent, and the Tommy Flanagan trio backs her up splendidly.

P.R.

**THE WIDESPREAD JAZZ ORCHESTRA: *Swing Is the Thing.*** The Widespread Jazz Orchestra (instrumentals). *Memphis Blues; King Porter Stomp; Knock Me a Kiss; Chelsea Bridge; Flyin' Home; Swingin' the Blues;* and four others. ADELPHI AD 5015 \$7.95.

Performance: **Zippy**  
Recording: **Very good**

This group used to call itself the Widespread Depression Orchestra, but I guess the real depression the country is in made them drop the term. Their new name, the Widespread Jazz Orchestra, and latest album, "Swing Is the Thing," indicate a more solid embrace of big-band swing.

There is, of course, an aura of re-creation about this sort of thing, but the WJO's efforts do not have the mausoleum lifelessness of many re-creations. Their strength is in live performances. Hearing them play *King Porter Stomp, Swingin' the Blues, or Chelsea Bridge* on a record can never match the experience of hearing the same tunes as recorded by Henderson, Basie, or Ellington, but hearing the Widespread Jazz Orchestra in person is another matter. Do try to catch the WJO live, but I'd recommend passing up this album for reissues of the original recordings.

C.A.

## RECORDING OF SPECIAL MERIT

**THE YELLOWJACKETS: *Mirage à Trois.*** The Yellowjackets (instrumentals). *I Got Rhythm; Claire's Song; Top Secret; Pass It On;* and four others. WARNER BROS. 23813-1 \$8.98. © 23813-4 \$8.98.

Performance: **Excellent**  
Recording: **Very good**

The Yellowjackets have charm, energy, and great chops—and the misfortune to be working in a jazz-funk groove that's already crowded with superstars. The longer jazz-funk is around, the harder it becomes for musicians to say something new with it, something that Chick Corea or Weather Report or David Sanborn hasn't said already. Russ Ferrante, the Yellowjackets' leader and keyboard player, does his best to stretch the limits of the genre's familiar rhythms and chord progressions. Sometimes he pulls it off, setting up intricate contrapuntal patterns by weaving lyrical themes and brisk variations among drummer Ricky Lawson's driving rhythms. But at other times all he can manage are a few gratuitous modulations and some tricks with mixing time signatures.

The inherent difficulty of trying to write original music in a genre that has begun to sound "canned" is underscored by the fact that the most interesting, energetic cut on the album is a bouncy, syncopated cover of *I Got Rhythm* by George and Ira Gershwin. Still, there's a lot more feeling than formula in "Mirage à Trois," and that more than makes up for whatever limitations the band labors under.

M.P.



## THEATER • FILMS

**CLUES TO A LIFE** (Alec Wilder). Original-cast recording. Christine Andreas, Keith David, Craig Lucas, D'Jamin Bartlett (vocals); orchestra. ORIGINAL CAST OC 8237 \$8.98 (from Original Cast Records, Box 496, Georgetown, Conn. 06829).

Performance: **Good**  
Recording: **Good**

This collection of Alec Wilder songs was produced as a revue called *Clues to a Life* by the Vineyard Theater, a small nonprofit arts center on the East Side of Manhattan. Barbara Zim and Elliot Weiss drew the show's text from Wilder's book *Letters I Never Mailed*. Wilder was one of America's most interesting and prolific songwriters, but he never wrote in any particular commercial form. This album is a pleasant tribute to his work, as modest and unassuming as the man himself was said to be. The highlights are performances of his *It's So Peaceful in the Country*, the poignant *I'll Be Around*, and the truly immortal *While We're Young*. P.R.

**OCTOPUSSY** (John Barry). Original-soundtrack recording. Rita Coolidge (vocal); orchestra, John Barry cond. A & M SP-4967 \$8.98, © CS-4967 \$8.98.

Performance: **Flashy fun**  
Recording: **Good**

John Barry's scores for the James Bond films have always boasted a heavy-duty flashiness of execution and a tongue-in-cheek wit in conception. This latest is no exception. One of Barry's most impressive attributes is his refusal simply to ape the screen action in his music. Instead, he finds a unifying mood or theme for whole segments of the movie. Unfortunately, in this case the song *All Time High*, written with Tim Rice and clearly aimed to be a chart hit, is no *Goldfinger*, and Rita Coolidge is no Shirley Bassey. P.R.

**RETURN OF THE JEDI** (John Williams). Original-soundtrack recording. London Symphony Orchestra, John Williams cond. RSO 811 767-1 Y-1 \$8.98.

Performance: **Good**  
Recording: **Excellent**

John Williams's hortatory scores for Steven Spielberg's and George Lucas's films are beginning to take on an intricate sameness: great patches of purple sound billowing up from the speakers, quiet moments that portend peril, and finales that verge on the celestial. Williams's work is highly effective in the theater, where it benefits from the wide-screen image and the mammoth Dolby surround sound. At home it seems more than a little predictable. But *Return of the Jedi* has made more money than all but a



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## On Your Toes

**T**HE surprise hit of the 1982-1983 Broadway season was the revival of Richard Rodgers and Lorenz Hart's *On Your Toes*. In the year of its initial staging, 1936, the big news was not the inventiveness, beauty, and wit of the score; blasé theatergoers of that Golden Age could count on new shows almost seasonally from Porter, Kern, Schwartz and Dietz, *et al.* No, the big news was the choreography of George Balanchine, in particular his sensational pop-ballet *Slaughter on Tenth Avenue*. Balanchine's spectacular crossover from classical dance to Broadway, and his success at it, made possible the later work of such choreographers as Agnes de Mille in the Forties and Jerome Robbins in the Fif-

ties. In that sense, *On Your Toes* is something of a landmark in the American musical theater.

In 1983, however, it is the melodic feast of Richard Rodgers's music and the *brut* sparkle of Lorenz Hart's lyrics that make the Polydor recording of the revival an entirely new joy. First, and most important, the orchestrations are as close to the 1936 originals as Hans Spialek could make them. The producer, Norman Newell, has played it straight and smart all the way, with the result that the orchestra never sounds rickety or cute but absolutely *right* for Hart's words and Rodgers's music.

Then there is the charming ease of the performances here, from Lara Teeter and Christine Andreas caroling *There's a Small Hotel* with a freshness and lack of pretension that make it sound brand new to Dina Merrill and George S. Irving, as heiress and international impresario, cozily deciding that rich really is better in *Too Good for the Average Man*. Andreas is heart-touching in the immortal *Glad to Be Unhappy*, and Teeter is translucent in *Quiet Night*. The big orchestral numbers are conducted by John Mauceri as if real people could actually dance to them on a real stage, not as if John Williams had dropped by with the Vienna Philharmonic.

But perhaps that is the most engaging aspect of this recording: everything seems to have been kept within human scale. Since Hart's lyrics are certainly about real people's real emotions and Rodgers's music never fails to touch human feelings without manipulating them, I would say that this performance of *On Your Toes* is a perfect match.

—Peter Reilly

**ON YOUR TOES (Richard Rodgers and Lorenz Hart).** Broadway-revival-cast recording. Lara Teeter, Dina Merrill, Christine Andreas, George S. Irving, others (vocals); orchestra, John Mauceri cond. POLYDOR 813 667-1 Y-1 \$10.98, © 813 667-4 Y-1 \$10.98.

few other films (among them its *Star Wars* predecessors), and there's no reason to suppose the soundtrack album won't be a smash hit as well. P.R.

**STAYING ALIVE.** Original-soundtrack recording. The Bee Gees, Cynthia Rhodes, Frank Stallone, Tommy Faragher, others (vocals and instrumentals). RSO 813 269 Y-1 \$8.98, © 422-813 269-4 Y-1 \$8.98.

Performance: **Overdone and empty**  
Recording: **Humongous**

*Staying Alive* is the hugely successful sequel to *Saturday Night Fever*. The film's major attractions seem to be Sylvester "Sly" Stallone's frenetic direction, its soapy underdog plot (it's really *Rocky Goes Broadway*), and the opportunity for teenyboppers to see John Travolta leap about in carefully torn shorts. The Bee Gees, who contributed a lively and evocative score for *Fever*, were hired to do the same thing for *Staying Alive*. Who knows? They might

have been *able* to do the same thing for this movie if Stallone hadn't been the director. Just as he took the original screenplay out of Norman Wexler's hands, Stallone also decided to add several songs to the score by none other than his brother, that internationally known chart-buster Frank Stallone. Brother Frank's contributions, which take up almost half of the recording, never rise much beyond the C-plus amateur level. Even the Bee Gees' efforts sound strangely dispirited and unprofessional, as if they had been sifted through some committee process. The result is an album in which everything is overdone, from conception to performance, apparently in an attempt to mask the basic emptiness. The production is gaudily humongous. P.R.

**LA TRAVIATA (Giuseppe Verdi).** Original-soundtrack recording. Teresa Stratas (soprano), Violetta Valéry, Plácido Domingo (tenor), Alfredo Germont; Cornell MacNeil (baritone), Giorgio Germont; Allan

Monk (baritone), Baron Douphol; others. Metropolitan Opera Chorus and Orchestra, James Levine cond. ELEKTRA 60267-1 two discs \$19.96, © 60267-4 \$19.96.

Performance: **Caveat emptor**  
Recording: **Good**

On the back cover of this set we read the following statement by conductor James Levine: "This recording reproduces the music track of the film exactly as it is heard in the movie theater. . . . The level adjustments and other technical characteristics of this music track produce an effect very different from a complete opera recording produced under studio conditions."

This is a warning, but it severely understates the case. I can understand that moviegoers wish to retain a souvenir of Franco Zeffirelli's cinematic achievement. But in so doing they will acquire a severely cut edition of the Verdi opera in which the principals are erratically miked in an artificial-sounding audio ambience that reflects credit to no one.

They will also acquire an inferior performance. However superbly Teresa Stratas may act the role (and her reading of Germont's letter is certainly worth hearing), the musical requirements are beyond her. Cornell MacNeil's Germont is a faded echo of what his singing used to be, and even the otherwise rock-solid Plácido Domingo sounds sharp and ill at ease in the first-act "*Libiamo*." Except for the firm Douphol of Allan Monk, the subsidiary singers (Metropolitan Opera regulars but not specifically identified on the jacket) are all below par.

James Levine's conducting is not without impressive moments, but it displays more rigidity and less precision than we remember it from happier occasions. In short, enjoy the movie but avoid the recording.

—George Jellinek

### RECORDING OF SPECIAL MERIT

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Performance: **Amusing**  
Recording: **Good**

*Upstairs at O'Neals* is an amusing, light-weight revue that was assembled and produced by Broadway composer Martin Charnin for O'Neals' restaurant in Manhattan and is still around at this writing. Charnin also contributed a couple of the songs, but most are by unknowns. There is some funny stuff here: *Cancun*, about an urban jerk who goes to that newly famous Mexican resort in search of cocaine and ends up in the arms of a female undercover narc; *Little H and Big G*, a retelling of the Hansel and Gretel legend as if it were one of those wispy little jazz operas so dear to the Gallic heart of Michel Legrand; and *Soap Operetta*, in which Gilbert and Sullivan are pinned to the mat. Perhaps the most hilarious track is *Mama's Turn*, in which the supposed mothers of the New York drama critics' fraternity offer *their* opinions about what's happening on the Broadway scene. If you live in or love New York City, this one is guaranteed to make you laugh out loud—a lot. P.R.







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Martha Swope, Shirley Herz & Associates

George Hearn as Albin as Zaza

## La Cage aux Folles

WHEN *La Cage aux Folles* opened on Broadway on a hot Sunday evening in August, it not only officially opened the new season; it was the new season's first runaway hit, and RCA's original-cast album was already in Manhattan record shops (it had been recorded ten days earlier). Based on a play by Jean Poiret that enjoyed a long run in Paris and that subsequently served as the basis for two enormously popular films, the musical version of *La Cage* is the product of a team of certifiable hit-makers—Harvey Fierstein (book), Jerry Herman (music and lyrics), and Arthur Laurents (staging).

Twenty minutes or so into the second act, John Weiner, playing Jean-Michel, the son of the night-club owner Georges (Gene Barry), blurts out the kind of line you might hear from anyone's kid, something like, "How about a little understanding and respect around here?" Whereupon Georges points across the stage, to where Albin (George Hearn), his lover of long standing and top banana at his club, is seated, and sings the first lines of the evening's third love song, *Look Over There*. The message is that this man has been a "mother" to Jean-Michel and has lavished more care, consideration, and love on him than he will ever get from anyone else in his life. It's a lovely song and a touching tribute.

It's also an old-fashioned song in a basically old-fashioned musical that is very much of today in that it speaks to and for a cross-cultural minority in a way that no previous Broadway musical has ever done. The relationship between Georges and Albin and, by extension, any human love relationship, is at the very core of what the show is all about, and the songs that Jerry Herman has written, some of his best, are at all times to the point—sometimes hauntingly tender, as in *Song on the Sand*, and sometimes militant, as in *I Am What I Am*.

The performances by Hearn and Barry

on the album are indeed committed; the few I heard during the recording session were done almost in a single take. Hearn's voice sounds a little gravelly, probably because of pre-opening fatigue, and Barry's baritone, thanks to the close miking, sounds a lot heartier than it does on stage. But the digital recording beautifully documents the heartfelt performances both of them will be giving eight times a week for a good while to come.

Most of the rest is delivered by the townspeople of St. Tropez on the French Riviera—where Georges's club, itself called *La Cage aux Folles*, is located—and by the ten men and two women who are the club's headliners, the "notorious and dangerous" Cagelles. In the theater there is a startling, amusing moment, shortly after the first-act curtain, when this line-up of feminine beauties suddenly bursts into song—predominantly in the baritone range. In the recording it sounds as though women's voices have been added, perhaps to make it all sound more Broadway-chorus-like. If so, it was a mistake. Another mistake, to my mind, was to tack on a reprise of the show's big, really Broadway-chorus-like, sure-to-be-enduring number, *The Best of Times*, at the very end of the record. The show itself ends most effectively with a repeat of *Song on the Sand*, which in a way is the show's theme song and probably its most memorable tune. Nothing needs to follow it.

Otherwise, though, this is a must-have recording for anyone who has seen or will ultimately see *La Cage aux Folles*. And that will probably be about half the population.

—Christie Barter

**LA CAGE AUX FOLLES (Jerry Herman).** Original-Broadway-cast album. George Hearn, Gene Barry, John Weiner, others (vocals); chorus and orchestra, Donald Pipkin cond. RCA ● HBC1-4824 \$9.98. © HBE1-4824 \$9.98.

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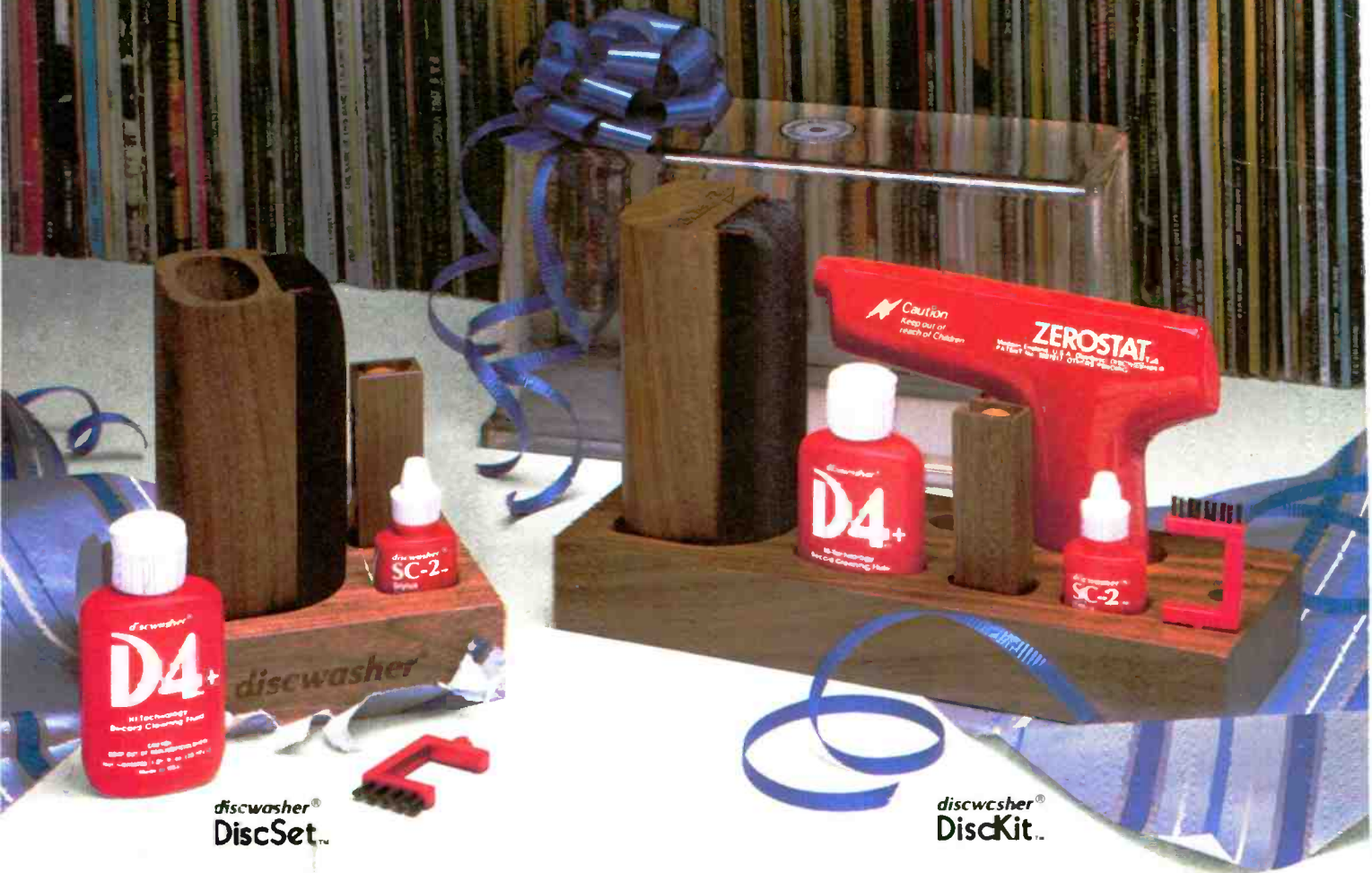
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