New Super Receivers to Understand Our FM Test Reports

Bernstein Discusses His JFK Mass

Peter G. Davis Reviews the Album

David Hamilton Reviews the Press Reaction

Miles Kreuger Reviews On the Town

Dale Harris Reviews Bernstein's Rosenkavalier Recording
THE FISHER PHILOSOPHY OF EQUIPMENT DESIGN. PART 2.

FACING REALITY IN FM RECEPTION.
This is the second of a new series of ads about the major conceptual differences between Fisher components and other makes. It is not necessary to have read the first ad before reading this one, but see footnote in italics below.

In 1956, Fisher introduced a relatively simple but meticulously engineered FM-mono tuner that literally swept the audio world. Now strictly a collector's item, the vacuum-tube operated FM-90X was so far ahead of its time in FM performance that it quickly established Fisher as the RF (radio frequency) sophisticate among high fidelity manufacturers.

Dozens of models later, our RF reputation continues, and we attribute it to our unrelenting realism on the subject. We never lost sight of the late Major Armstrong's original reason for pioneering FM, which was to make the airwaves as perfect a medium for transmitting an audio signal as a straight wire. No noise, no distortion, no loss of highs or lows, no compression of dynamics. He provided the essential technology to achieve this, but some of his principles did not escape corruption in the course of the years. We at Fisher believe, however, that it is totally unrealistic to cut corners in FM design, since the result will be something not much superior to AM—which is back where we started decades ago.

According to the Fisher philosophy of the "balanced component," all design elements affecting basic sound quality must be treated without the slightest compromise, even in low-priced equipment. Nonessential performance factors and convenience features must then be maximized in proportion to the price, each to the proper degree, neglecting none and exaggerating none. Let us see how this approach affects the circuit stages (Fig. 1) in the FM sections of Fisher components.

1. The antenna is possibly the most important single factor affecting FM performance, but luckily in an average signal area you will need nothing more elaborate than the simple wire dipole antenna (Fig. 2) included with every piece of Fisher FM equipment. It even has a rather sophisticated little matching stub for a perfect impedance match into any Fisher RF stage. In a weak signal area you may still need a roof antenna.

2. The "front end" (which includes the RF and mixer stages) must, to begin with, present a really good impedance match to the antenna, otherwise only part of the RF energy captured by the antenna will be utilized. (Not every manufacturer pays attention to this.) The front end must also be so low in inherent noise that it will handle an FM signal of only a few microvolts and, at the same time, so resistant to overload that it will handle several hundred thousand or in some cases even one million microvolts (one full volt—and it does happen!). Fisher front ends meet all these requirements, thanks to the use of dual-gate MOSFET's with AGC (automatic gain control) or a local/distant switch.

3. The IF stage (or IF strip) is where the selectivity of the set is largely determined, although the RF stage has some influence on this. Selectivity is the ability to separate two adjacent stations on the dial when one is considerably stronger than the other. All Fisher FM sections are required to meet a very stringent standard in this respect, regardless of price. The later stages of the IF strip are where most of the limiting takes place, i.e. the elimination of AM-type noise, hash and distortion. This is also a non-negotiable performance factor at Fisher, since AM interference is intolerable even in the output of an inexpensive FM receiver.

4. The detector stage is where the FM signal becomes an audio signal, and the criteria here are phase linearity and low audio distortion. Fisher uses the same reliable ratio detector in the least and most expensive models. For FM stereo, there is simply nothing that works better.

5. The multiplex (MPX) stage takes the encoded stereo signal from the detector and decodes it into left and right signals. Currently there are a number of rival circuits for high-quality applications, but one is clearly the best and Fisher does not use any other. It is called the time-division multiplex circuit and it is superior in left-right separation, noise suppression, low distortion and stability, which are the chief criteria in a decoder.

It is these basic design considerations that assure clean, noise-free, undistorted FM reception even with the lowest-priced Fisher receiver or compact. Of course, the more advanced models will have somewhat higher sensitivity and selectivity, so that they will pull in a larger number of stations with the same antenna. They will also provide certain other refinements appreciated by the audio enthusiast (see Fig. 3). But, given a minimal signal level and a suitable antenna, any piece of Fisher FM equipment is essentially a straight wire to the studio. As a balanced component should be.

Fig. 1. Block diagram of the circuit stages in the path of an FM signal.

Fig. 2. The Fisher wire dipole antenna, with impedance matching stub.

Fig. 3. The top of the line: 4-channel Fisher 801 receiver featuring electronic FM tuning without moving parts for effortless accuracy, plus wireless remote tuning for the ultimate in convenience.

FISHER
We invented high fidelity.

The next ad in this series will explore in detail how the Fisher design philosophy applies to amplifiers and amplification. Many others will follow.

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We invented high fidelity.
Playing records with some cartridges is like listening to Isaac Stern play half a violin.

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So, there's a lack of definition in the reproduction of violins, as well as clarinets, oboes, pianos, the organ and other instruments which depend on the overtones and harmonics in the upper frequency range for a complete tonal picture.

The Pickering XV-15 cartridge delivers 100% music power 100% of the time. Which is why we call it "The 100% Music Power Cartridge." At 100% Music Power, all the instruments are distinct and clear, because the XV-15's have no music-robbing output drop anywhere in the entire audio spectrum. It makes an enormous difference!

Pickering XV-15 stereo cartridges are priced from $29.95 to $65.00, and there's one to fit anything you play records with. For more information write: Pickering & Co., Inc., 101 Sunnyside Blvd., Plainview, Long Island, New York 11803.

Cartridge power does this to the instruments:
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Pickering. The 100% music power cartridge.
"for those who can hear the difference"
All Pickering cartridges are designed for use with all 2 and 4-channel matrix derived compatible systems.
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CIRCLE 57 ON READER-SERVICE CARD
Why I Cry

In last December's issue I mentioned that tears had at times come to my eyes at the moment in Fidelio when Leonore reveals herself as the wife of Florestan. Several people have asked me whether the statement was in fact true and not merely a case of misplaced rhetoric. Let me then confess—it was true. I'm a crier, the Jack Paar of HF. I must point out however that I have never even been moved at that moment during a live performance of Fidelio—only by recordings. Perhaps it's because the acting is always so ludicrous that it detracts from the glorious revelation.

At any rate, the question of my tender tear ducts made me ponder why indeed I do cry at particular aesthetic moments. I tried to recall similar lachrymatory experiences, and the first that came to mind was another opera, and a comic opera at that: Die Meistersinger. I remember choking up at the point where Hans Sachs whacks David to promote him from apprentice to journeyman. Here it was a live performance, with Paul Schoeffler as Sachs, but the moment, touching rather than melodramatic, doesn't call for overacting. Even musical comedies have brought me to tears: when the raucous school band in The Music Man produces, in the ears of the parents, splendid music; when Professor Higgins reacts to Eliza's first correct pronunciation of "The rain in Spain"; when the children in The Sound of Music grasp the idea of solfeggio in "Do—a dead deer...." Then I recalled a revival of Chaplin's City Lights, my first silent film. Prepared for boredom (I only went because in my adolescent circle it was the thing to do) I was overcome with laughter. But at the end, when the once blind flower girl hands the tramp a rose and realizes from the familiar touch of his hand that it was she who had been her savior—well, I've always kept a little flame of hate alive for the theater manager who sub-titularly turned up the house lights to expose all the faces that, like mine, were dripping.

Who really cries these days while reading the Bible? I do—when Joseph recognizes his brothers who have come to plead for food in Egypt. (Joseph goes off to another room to cry over before he can return to talk with them.)

In The Miracle Worker, when the young Helen Keller realized that the wet stuff coming from the pump was "wa-wa," my own wa-wa spouted from my eyes. I choked up at the point in Chaim Potok's The Promise when, after two books in which they were theological antagonists (The Chosen is the first book), Danny's father finally meets Reuven's father and embraces him. I cried during the film Born Free, when the lioness Elsa brought her cubs to visit her former masters. I even lose control when Dorothy returns to Aunt Em from Oz and when Disney's Pinocchio becomes a real boy.

Among strictly musical stimuli to my tears, I recall the last movement of Bach's Sixth Brandenburg Concerto, the entrance of the voices on "Et in terra pacem" in his B minor Mass, the beginning of the violin/viola cadenza in the slow movement of Mozart's 'Sinfonia concertante', the entrance of the second theme in Schubert's C major Quintet, Hansel and Gretel's Prayer, and the finale of Der Rosenkavalier. It is not the drama of these last two that gets me, but the music, simply female voices singing mainly in thirds and sixths, with a cornucopia of nonharmonic clashes.

You have probably already sensed the common ingredient in these episodes. It is that rare commodity, enlightenment—that expansion of the spirit that comes from sudden realization and awareness of something felt to be important. It can be a flower girl's awareness of the beauty of a tramp—or rather my awareness of her humanity. It can be the realization that a lioness remembers her former human environment with affection; that a Master Singer appreciates his apprentice; that a deaf-and-blind child awakens to the meaning of words; that a fanatic rabbi's humanity transcends his theology; or that a puppet achieving boyhood will not necessarily have achieved grace.

The musical moments are less vicarious, more first-hand. Here I am personally made aware of a mysterious sequence turning into a vocal fugue, that one note is blossoming into a beautiful theme; or that such an obvious technique as female voices singing mainly in thirds and sixths, with a cornucopia of nonharmonic clashes, can produce such gorgeous music. I don't need to see the reactions of somebody else on page, stage, or screen to feel these extraordinary moments.

It is obvious that my most moving aesthetic experiences are those that enlighten me, that educate my soul.

Next month we will enlighten you on more mundane matters: TAPE CARTRIDGES AND CASSETTES—CAPABILITIES AND PITFALLS as well as Tchaikovsky's "NEW" PIANO CONCERTO and THE BEST-Kept SECRETS—WHO PLAYS WHAT CADENZAS?

Don't cry.

L.M.
We enjoy telling you how each aspect of the 12 year basic research program on sound reproduction contributed to the unconventional features found in the Bose 901 and 501 DIRECT/REFLECTING® loudspeakers.* We also take pride in quoting from the unprecedented series of rave reviews because to us they are like awards won for the best design.†

However, it is important to realize that the research and the reviews are of only academic interest unless the speakers really are audibly superior. It is equally important to realize that YOU are in every sense the ultimate judge, for you are the one who lives with the sound you choose.

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P.S. If you already own expensive speakers, many dealers will lend you a pair of BOSE 901's for an A-B in your living room, where the acoustics are generally far superior to those of the speaker-lined showroom.

* Copies of the Audio Engineering Society paper, 'ON THE DESIGN, MEASUREMENT AND EVALUATION OF LOUDSPEAKERS', by Dr. A. G. Bose, are available from the Bose Corp. for fifty cents.

† For copies of the reviews, circle our number on your reader service card.

You can hear the difference now.

Unless they're audibly superior it's all academic.

The BOSE 901 and BOSE 501 are covered by patent rights, issued and pending.
An infinite choice of speeds.

The variable control Lenco manual turntables offer an infinite selection of speed—a continuous sweep from 30 to 86 rpm. At the standard 16-2/3, 33-1/3, 45 or 78.26 rpm, there are click stops that can be precisely set or adjusted at any time.

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And at everyone of these speeds, Swiss precision takes over. For example, the Lenco L-75’s sleekly polished transcription tonearm shares many design concepts (such as gravity-controlled anti-skating, hydraulic cueing, and precision, knife-edge bearings) with arms costing more alone than the entire L-75 arm and turntable unit. And the dynamically balanced 8.8 lb. turntable reduces rumble, wow and flutter to inaudibility.

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Lenco turntables from Benjamin

Prices subject to change without notice.

CIRCLE 51 ON READER-SERVICE CARD

Letters

Wordless Music

Ted Meyer’s letter in your November 1971 issue thoroughly delighted me; here I’ve been reading and enjoying esoterica when I thought I was merely interested in good classical music!

He says that the records you review “usually are of no interest whatever [italics his own] to the majority of HIGH FIDELITY’s readers.” Before he presumed that his powers of intuitions were so great, he should have considered, perhaps, the “grave deterioration of the types of records reviewed” have been accompanied by a corresponding deterioration of the types of people who read HIGH FIDELITY.

I am not entirely unsympathetic to your complaint. Mr. Meyer, but I find your presumptions about the interests of this magazine’s readers quite bold and bit distasteful.

Dennis Chiappella
San Francisco, Calif.

I rarely become angry over a single letter out of the abundance I read. But Mr. Ted Meyer’s letter is not like any other I have ever read. Either this man is completely ignorant of other people’s tastes or he is just stark mad.

I will admit I have just started reading HIGH FIDELITY in the last couple of years, so I can give no opinion on the alleged deterioration of reviews. However, with the high caliber of reviews that have appeared since I have been reading it, my selection of a particular record will depend 70% to 80% on the review of it in HIGH FIDELITY. I have found your magazine to be the best in its field for both listeners and performers. Obviously, Mr. Meyer doesn’t agree with what I listen to. I was surprised that he even knows who Furtwangler was (Or does he?)

He goes on to list composers one supposedly cares about. Brant, Cram, Druckman, and Henze were all indited. Admittedly, they might not be important composers yet (save Henze), but I and many of my friends find all of them to be superior to the type of composers Mr. Meyers probably likes. We are thankful to you for taking an objective interest in them.

Then Mr. Meyer made just about the most stupid remark I have heard all year: “Who in heck cares about [Nicolas] Slonimsky? Never heard of him.” This was enough to prove to me that the man is plain ignorant. I and many others, I am sure, acknowledge Mr. Slonimsky to be one of the greatest composers of the twentieth century.

I completely disagree with the last paragraph of his letter. The type of people who read HIGH FIDELITY are not reading them for what they are now. I am completely satisfied with them and don’t wish to change. Mr. Meyer, I suggest, would probably be more happy with any of the flood of teen magazines now available.

Eugene Frazier
Sacramento, Calif.

Reader Ted Meyer’s letter [“Who Needs Furt- wangler.” November 1971] is partly right. There are many, many reviews that I agree would merit a mere “So what.” Obviously, however, Mr. Meyer has no idea of the economics of the record industry. He seems to be unaware of the fact that “names” like Furtwangler sell, even if it’s the ninety-ninth version of the work in question.

While I may go along with some of his choices for oblivion, I would draw the line at: say, Giobnon or Henze. I dare say, “Who in heck cares about Slonimsky? Never heard of him.” betrays a rudeness born of profound ignorance.

For his edification, suffice it to say that Nicolas Slonimsky, as a celebrated conductor from Boston, introduced to European audiences in the early Thirties a first taste of American music by composers like Ives, Varese, and many more. A recording of some of these historical “firsts” has just been issued by us, with the kind collaboration of CBS. We hope this tribute will partly repay Mr. Slonimsky for his pioneering work.

Greene Cornfield
Orion Records
Los Angeles, Calif.

For further information about Mr. Slonimsky and his contributions to American music, see review on page 88B.

The Ives Memos

I read the Ives Memos [October 1971] with the greatest fascination. I was struck by the remarkable consistency of his musical and verbal styles. I daresay, however, that Ives will never be put forth as “America’s greatest writer,” but perhaps this is only a reflection of Bernard Shaw’s remark that it’s far easier to write good music than good prose.

A number of things puzzle me considerably, however. Limitless self-esteem is not usually thought of as a Yankee trait, but Ives’s amour propre easily exceeds anything I’ve ever seen in print, from the preening self-congratulation of the title to the last word. A certain smugness about one’s own ignorance is sometimes regarded as a Yankee trait, but Ives has a liberal store of it; to be sure, he is only scoring off critics who accused him of being familiar with the works of Schoenberg and other foreigners, and he may be overcompensating his position. Self-congratulation is hardly called for, I think, in matters of this kind, even from an Old Yankee iconoclast.

More puzzling still, Ives seemingly had no historical perspective. His remarks on Beethoven, for instance—who bores him because he wrote relentlessly tonal music—are hardly a distinguished contribution to criticism, not in the least because it’s such a truism (I would rather have criticism tell me things I didn’t already know). Poor Beethoven. It reminds me of the undergraduate who wrote in a paper that “poor Shakespeare” did the best he could, not knowing Freudian psychology.

Finally, the Yankee iconoclast’s preoccupation with virility (his own) and other people’s effeminacy is both petrifyingly boring and highly distasteful. It tolls like a knell through the entire selection printed by HIGH FIDELITY, if this is representative of the work as a whole, it would seem to be something of a morbid obsession. I will leave it to his biographers and archivists to say how the Iveses can out of it. Fortunately, for Ives, ibor, rant, intimated self-esteem, hate, and spite have little to do with music. Wagner and others have
One of the most compelling reasons for buying a Revox is the sounds it doesn’t make.

No spurious pops or clicks. No waverering, fluttering tones. No distracting hum. And best of all, virtually noise-free electronics.

Take our new A77 Mk III for example. We manufacture it to such close tolerances and with such exacting attention to detail, that it is generally regarded as one of the quietest tape recorders ever made.

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And that’s where our new Revox A77/Dolby B recorder comes in.

By now, the virtues of the Dolby Noise Reduction system are too well known to require any elaboration on our part.

Suffice it to say, for all practical purposes the last major stumbling block to quality, noise-free recording has finally been eliminated.

Listening to tapes on the new Revox/Dolby B is a revelatory experience. Tape hiss is virtually non-existent. The music seems to emerge from a background of velvety silence. And at 3-3/4 i.p.s. the absence of extraneous noise is truly startling.

But no mere description of the Revox/Dolby B can adequately convey the experience awaiting you the first time you listen to a tape made on this remarkable machine.

Your nearest Revox dealer will be delighted to audition the Quietest Revox for you. Once you’ve heard it, you’ll understand why we say...

Revox delivers what all the rest only promise.
Pioneer's two ways

Pioneer simplifies your decision to enter the stunningly new world of quadraphonic sound, whether you now own a stereo system or are just starting out.

The new Pioneer QX-8000 is the most versatile 4-channel receiver available. Boasting a powerful 180 watts (IHF at 4 ohms), it's capable of reproducing crystal clear quadraphonic sound employing any of the three viable systems—the authentic discrete, the room-encompassing matrix, the ambient reverberations of phase shift. And it achieves this using your present collection of 2-channel stereo records, tapes, FM radio, and the new 4-channel tapes and cartridges.

In addition, it's a complete control center for a conventional 2-channel stereo system. It's really got it all!

The QX-8000 ensures your pinpoint reception with its sensitive 2.2 microvolt FM tuner; FM separation is better than 36dB at 1000 Hz.

And as all Pioneer units, the QX-8000 has an array of practical features including: pushbutton matrix and phase shift; FM muting to eliminate interstation noise; high and low filters; tape monitoring; balance controls; indicator lights for "speakers in operation"; dual inputs for phono, tape and auxiliary; two headphone jacks for front and rear channels.

The QX-8000 is the last word in quadraphonic sound. With the excellence of the QX-8000 you deserve dual by speakers. A pair of Pioneer CS-4400 3-way, 3-speaker systems backed up with twin Pioneer CS-44 2-way, 2-speaker systems would be ideal, (shown above)

If you prefer individual components, investigate Pioneer's new 4-channel models: QA-800 Integrated Amplifier; QC-800 Preamp/Power Amplifier; OM-800 Power Amplifier. But that's another story.
to quad sound.

or renew.

In adapting your present 2-channel stereo system to brilliant quadraphonic sound, here's the easiest and most effective way. Pioneer's new QL-600 Quaclubile Amplifier. With two additional speakers, it's all you need to create 4-channel sound from your own LP records, pre-recorded tapes, or FM tuner. The key is Pioneer's unique quaclubizer. It provides both matrix and phase shift quadraphonic sound by simply turning a click-stop dial on the front panel. Another click and true, discrete 4-channel is yours when pre-recorded 4-channel tapes or cartridges are used. Of course, you can still reproduce 2-channel stereo. The QL-600 is universal; it can be used with any make 2-channel stereo receiver or tuner/amplifier system.

Don't confuse the QL-600 with the many non-amplifying "black box" 4-channel decoders available. The QL-600 incorporates twin power amplifiers to drive middle to high efficiency speakers to high levels providing 10 watts RMS of each channel driven, 44 watts L-R (8 ohms) to each speaker, there's enough power to spare for another set of speakers in a rear location. Further, with the QL-600 you never need critical power from your front speakers as the "black boxes." Other features: 4 large, easy-to-read lighted level meters; separate controls for each channel; master volume control for simultaneous adjustment of all four channels.

And while you're upgrading, hear Pioneer's new low-priced CS-E550 2-way, 2-speaker system. It complements the QL-600 beautifully.

No matter which way you go — new or renew, get a complete Pioneer quadraphonic demonstration at any Pioneer franchised dealer. You'll be amazed at how little it costs.

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West: 13300 S. Estre la Ave., Los Angeles, California 90248
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The only record playback system engineered for cartridges that can track as low as 0.1 gram.

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Troubadour 598 playback system $199.95. Walnut finish base and plexiglass cover combination $34.95. 990 arm also available separately $74.95.

For a free color catalogue, write: Empire Scientific Corp., 1055 Stewart Ave., Garden City, N.Y. 11530.

already proved that it is possible to be a detestable man and a great artist.

Andrew Stihler
Madison, Wis.

The Case for Schreker

Re George Weaver's letter about the absence of Franz Schreker's music from record catalogues (November 1971). It is hard to understand why this important composer has been forgotten to such a degree that even his name is seldom mentioned in books on contemporary music history. The fact is that in the 1920s Schreker was the most influential musician of and in Germany, not only because of his official position as director of the Berliner Hochschule für Musik (once held by Joachim) but mainly because of the successes of his operas, principally Der ferne Klang and Der Schatzgräber, which together with the operas of Strauss were part of the permanent repertoire of most German opera houses at the time. The eminent musicologist Paul Bekker compared Schreker (who wrote all his own librettos) to Wagner, and hailed him as the direct successor of the Master of Bayreuth. His Der ferne Klang was written before Salome and had it been performed before Strauss's opera, Schreker probably would have been known as the innovator of post-Wagnerian opera. Instead, during the 1930s he was condemned by Hitler's regime. His characters were very, very far from the "true German" ones, his music impressionistic, sensuous, and daring. He was forced to resign his position at the Hochschule and performances of his operas and orchestral works were forbidden (although he was not Jewish), and when he died only twenty-five people had the courage to attend his funeral.

I was admitted to Schreker's composition class in 1922, along with Ernst Pepping, Jerzy Finelberg, and Ignace Strasfogel (among his previous pupils were such men as Ernst Krenek, Alois Haba, Karol Rathaus, and Jascha Horenstein). We all had ample opportunity to become closely acquainted with Schreker's music, and to admire him as a teacher.

Antin Rudnytsky
Toms River, N.J.

Thank you so much for publishing George Weaver's kind letter about my father, Franz Schreker, which was brought to my attention during a visit to the United States.

Mr. Weaver, however, is in error in one respect: Franz Schreker was once represented on gramophone records, at least in Europe. He personally conducted Der Gerburtstag der Infantin with the Berlin Philharmonic in 1928 for Polydor. I know of at least one U.S. radio station (WNIB in Chicago) that apparently has these records and plays them from time to time; so you see, Franz Schreker is not entirely unknown to North American music lovers!

Your readers may be interested to know that there is currently a revival of interest in my father's music, with many famous artists involved. European broadcasters, including the BBC, occasionally rebroadcast the 1970 Vienna Radio production of Der Schatzgräber under Robert Hegel's distinguished direction, and such renowned singers as Evelyn Lear and Thomas Stewart appeared in the Hamburg Radio broadcasting of Die Gezeichneten. Schreker's instrumental music, especially the Kammer symphonie and the...
Sousa lives in the new Altec Segovia

If you're going to listen to Sousa, it should sound like Sousa. Oom-pa, oom-pa, oom-pa-pa. It should be so real that you can reach over and nudge the tuba player when he gets out of step.

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Romantic Suite, are broadcast often in Europe. The Hamburg Radio production of Der ferne Klang has been broadcast all over the world.

In 1958, the Internationale Franz Schreker Gesellschaft was founded in East Berlin, while at the same time a Franz Schreker Exhibition was held in West Berlin. Honorary members of the former have included Bruno Walter and the widows of Mahler, Schoenberg, and Berg, among others.

American music lovers who might want to learn more about Franz Schreker and his works may be interested in my book, El Caso Schreker, published by Editorial Talia in Buenos Aires. Unfortunately, it is only available in Spanish, my adopted language.

Composer Alois Hába, one of my father's most celebrated pupils, has written the following words about him: "In our time, when a new cultural impulse is awakening, it is of the greatest importance to perform the operatic creations of Schreker. We need the artistic collaboration of men like him in order to clarify and reform the problems of humanity."

Haidy Schreker-Bures Argentina

Concerning George R. Weaver's letter in which he discusses the music of Franz Schreker, I can inform him that this composer's music has been recorded. The records, however, have been out of print for many years. Once available were: Little Suite for Chamber Orchestra (Polydor PD 24972/3), Der Geburtstag der Internationalen (Polydor PD 66549/51), an aria from Der ferne Klang (Parlophone P 9105), orchestral excerpts from Der Shackgräber (Polydor PD 65924/5 and PD 65912), and an aria from the same opera (PD 65736). All are conducted by the composer.

Those of us who have had access to his music find that Max Graf's description of Schreker's unique orchestral "sound" is no exaggeration. In its exoticism, unreality, and sensuality, the music is fascinating and, once heard, is not easily forgotten. Some of the operas and orchestral music of Schreker are well worth reviving.

Schreker's life was no less unreal than his music. As the founder of the Philharmonic Chorus in Vienna, he premiered Schoenberg's Gurrelieder and pioneered the music of Darius, Kräne, Syzmanski, Cyril Scott, and others. As director of the Berliner Hochschule für Musik, he hired such faculty members as Schnabel, Feuermann, Flesch, and Hinde-mith. By 1924 his operas had been performed over 200 times throughout Europe. When he died in 1934, he was almost forgotten by the musical world.

Herbert C. Pendergast
Arlington, Va.

Classical Truffles

Having somehow missed the Petzel letter in the August 1971 issue, I looked it up after reading the letters referring to it in the November issue. It is both laughable and sad that a young person, the product of today's schools, should be so ignorant of his cultural past as to characterize the music of Mozart and Beethoven as "dainty chamber music" (such dainty chamber creations as Don Giovanni, Fidelio, the Ninth Symphony, I suppose).

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CIRCLE 62 ON READER-SERVICE CARD
critic had better know what went before or omit mentioning it, whether he ultimately emerges as an authority on rock, Webern, Penderecki or Moog.

And "truffles" indeed! Webster defines "truffles" as "any of a number of related fleshy, edible, potato-shaped fungi that grow underground." Did Mr. Petzel, in referring to this music as truffles, mean to say that Mozart and Beethoven were voices of the underground of their time? Clyde D. Williams Baltimore, Md.

Chuck Petzel's letter was a fairly common mixture of insight, arrogance, and ignorance. I am familiar with many rock groups of the Sixties (including all the ones that Mr. Petzel mentioned), and I too find this music exciting, creative, and rewarding. And, true, anyone with "ten bucks and a phonograph and earphones" can experience it. There are still things you can't buy though, one being an open mind. If you could, Mr. Petzel might run out and buy Verdi's La Forza del destino. He'd find it a relevant opera by an Italian nationalist (in the best sense of the word) that differs from Tommy mainly by being better music.

One objection sure to be raised against this idea is that Verdi's opera is in Italian, while Tommys is in English. If Mr. Petzel had objected on these grounds I could understand, though not buy, his argument. Instead he chooses to pit the symphonies, an almost purely instrumental form, against rock, an almost exclusively vocal form. It is significant that not much rock is instrumental! Why? Well, in the words of rock critic John Gamble: "Without the words most rock isn't worth talking about." But Beethoven is worth talking about! When Mr. Petzel refers to Beethoven as writing in "truffles," he is either speaking from massive ignorance or monumental insensitivity. The first movement of the Beethoven Fifth is angrier and more revolutionary than anything rock has produced. This is not intended to be a put-down of the music of the '50s, which might even be called music than the '50s and as much as any era of popular music. Rather it is a put-down of those who glorify this music to the exclusion of all other music, and when they do so they are acting primarily out of prejudice and ignorance. Hiram R. Fry Columbus, Ohio

Collector's Plain

In all my happy years as a reader of your magazine I cannot recall ever having seen a truly candid discussion of a major consumer problem: the pains and perils of buying and selling records in the so-called Collector's Market.

Suddenly confronted with a staggering mass of unbudgeted bills, I conceived the painful emergency measure of offering some of my rarer disc treasures for sale. The basis for this decision was a lengthy price list I had recently received from a well-known New York dealer who specializes in, among other things, in deleted show, soundtrack, and "personality" recordings. Using his lists and recent Schwann catalogues as guides, I selected from my library a total of 175 thoroughly deleted (some for fifteen years or more) discs in these categories. All the records were in very fine to truly mint condition. Each one was a painful amputation—but financial need cut deeper. I spent many hours checking out all the discs for any minor defects and preparing a lengthy descriptive list, which I posted for a bid to this same dealer. When his answer came, it almost sent me to the doctor to pile up more bills.

After eliminating fourteen discs he did not want, he offered to purchase the balance of 143 deleted LPs for the total sum of $175, out of which I was to pay all packing and shipping costs. In short, I was to receive only a few cents over $1.00 per LP (I had paid as much as $25 for some)—scarcely one-fifth of their original in-press list cost. To get some notion of the scope of the inequity, consider the prices which the dealer is now asking for a small cross section of the records that were on my list: By the Beautiful Sea, $100; Chocolate Soldier (two discs), $50; Greenwillow, $100; Ben Franklin in Paris, $30; Sunsong, $30; A Tree Grows in Brooklyn, $30; Ariza, $25; Kwamina, $25; and Tenderison, $20. With the sale of these ten discs alone, the dealer would double his preferrer investment, leaving him a mere 133 rare LPs on which to make his additional fortune. And where does this leave the poor collector who has carefully gathered and preserved these treasures through all the years? Should we think that what prices the dealer would have put upon some of my records which were too rare to make an appearance on his most recent price list? Never mind, I did not even dignify his offer with an answer; but I can imagine many who would be either too ill-informed or too desperate to resist almost any offer.

Actually, it was naive of me not to be better

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High Fidelity Magazine

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<td>Less than 1% at 90 dB, 80 Hz to 20 kHz</td>
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<td>Controlled dispersion pattern to provide 160° dispersion as well as center fill</td>
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prepared, considering another experience of just a year earlier. At that time I had offered my last thirty-two rare 78-rpm vocal treasures (a few rather badly worn) and a large batch of duplicate pressings of the now fairly rare Metropolitan Opera Record Club LP sets (all mint)—in exchange for "private" LP opera discs and LP vocal reissues which are a specialty of another major New York dealer. For these (packed to a fare-thee-well and posted safely at great expense) I received a Sixty Dollar Credit Memorandum. Although I knew that this represented a very small actual cash outlay on the part of the dealer. I was satisfied since the LPs I ordered in return were immediately for illustrative purposes. But getting those that I really needed urgently and immediately for illustrative purposes. But getting my exchange order became quite another matter; in fact it took five increasingly outraged letters and four months before I finally received all that was due me.

Against this background, and having had nothing but satisfactory experiences in dealing with British record specialists, I turned my eyes to Canada. I had received a tantalizing sample list from a Toronto dealer in out-of-print and imported rarities; so I sent in my check for a one-year subscription to several of his lists. In time, by saving pennies, I amassed a fairly large order and went through the Canadian's confirmation and payment ritual. All except one of the discs paid for fell under the rubric, "unless indicated otherwise, all LPs are new, unplayed ...." so I felt somewhat confident that the premium prices I was paying were not utterly unjustified.

A month later, however, when the records finally beat their way through customs and arrived, I was appalled—although I am really not an unusually fussy record buyer. All were covered with grime, grooves for twenty-two and fourteen revolutions, even skipping grooves on route. I promptly wrote a fully explanatory letter, requesting permission to return this wildly defective set for exchange credit. Now, five months later, I am still waiting for a response of any kind, and apparently to demonstrate that the consumer has no rights whatsoever. The dealer has stopped sending me the catalogues for which I had paid in advance.

To those who have been more fortunate than I, or those who have been intelligent enough to limit their experience to dealers (and there are some) of impeccable fairness, integrity, and responsibility, the above may add up only to a case of paranoia on my part. But, alas, I fear that I am not the only victim of misrepresentation, greed, and callous indifference on the part of some members of the collectors' marketplace. I hope that this will encourage other readers to write, whether pro or con, to help illuminate this darker side of the record collectors' world.

John P. Collins
Seattle, Wash.

Middlemen, who ply the world's second oldest profession, have always had customers on both sides of the fence at their mercy, taking from one at a pittance and offering to the other at a tidy profit. The rules of this economic game are simple: The more esoteric the commodity, the more a middleman can get away with—a supplier to a grocery store, for instance, is likely to be slightly more scrupulous than a dealer in rare recordings simply because the competition is keener. Until that unlikely day when Mr. Collins and collectors in a similar position can band together to form the International Record Collectors' Society, members can ...
New Heathkit AR-1500 stereo receiver...the critics say it all:

"...the most powerful and sensitive receiver we have ever measured..." — Julian Hirsch — Stereo Review

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Mr. Hirsch goes on to say:

"The FM tuner section of the AR-1500 was outstandingly sensitive. We measured the IHF sensitivity at 1.4 microvolts, and the limiting curve was the steadiest we have ever measured... The FM frequency response was literally perfectly flat from 30 to 15,000 Hz. Image rejection was over 100 dB (our measurement limit)..."

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"...all input levels can be matched and set for the most effective use of the loudness compensation. This valuable feature is rarely found on high-fidelity receivers and amplifiers...

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"...it significantly bettered Heath’s conservative specifications..."

"Into 8-ohm loads, with both channels driven, the continuous power at clipping level was 81.5 watts per channel. Into 4 ohms it was 133 watts per channel, and even with 16-ohm loads the receiver delivered 46.5 watts per channel. Needless to say, the AR-1500 can drive any speaker we know of, and with power to spare...

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"Virtualy all the circuit boards plug into sockets, which are hinged so that boards can be swung out for testing or servicing without shutting off the receiver. An 'extender' cable permits any part of the receiver to be operated 'in the clear'... even the entire power-transistor and heat-sink assembly! The 245-page manual has extensive tests charts that show all voltage and resistance measurements in key circuits as they should appear on the receiver's built-in test meter...

"With their well-known thoroughness, Heath has left little to the builder's imagination, and has assumed no electronic training or knowledge on his part. The separate packaging of all parts for each circuit board subassembly is a major boon...

"In sound quality and ease of operation, and in overall suitability for its intended use, one could not expect more from any high-fidelity component."

From the pages of Audio Magazine: "...the AR-1500 outperforms the near-perfect AR-15 in almost every important specification..."

"The FM front end features six tuned circuits and utilizes three FETs, while the AM RF section has two dual-gate MOSFETs (for RF and mixer stages) and an FET oscillator stage. The AM IF section features a 12-pole LC filter and a broad band detector. The FM IF section is worthy of special comment. Three IC stages are used and there are two 5-pole LC filters...

"...IFH FM sensitivity... turned out to be 1.5 uV as opposed to the 1.8 uV claimed. Furthermore, it was identical at 90 MHz and 106 MHz (the IFH spec requires a statement only for IFH sensitivity at 98 MHz but we always measure this important spec at three points on the dial). Notice that at just over 2 microvolts of input signal S/N has already reached 50 dB. Ultimate S/N measured was 66 dB and consisted of small hum components rather than any residual noise. THD in mono measured 0.25%, exactly twice as good as claimed! Stereo THD was identical, at 0.25% which is quite a feat..."

"...the separation of the multiplex section of the AR-1500 reaches about 45 dB at mid-band and is still 32 dB at 50 Hz and 25 dB at 10 kHz (Can your phono cartridge do as well?)...

"The real surprise came when we spent some time listening to AM... This new AM design is superb. We still have one classical music station that has some simultaneous broadcasting on its AM and FM outlets and that gave us a good opportunity to A-B between the AM and FM performance of the AR-1500. There was some high-frequency roll-off to be sure, but BOTH signals were virtually noise-free and we were hard pressed to detect more THD from the AM than from the FM equivalent. Given AM circuits like this (and a bit of care on the part of broadcasters), AM may not be as dead as FM advocates would have us believe!

"Rated distortion [0.24%] is reached at a [continuous] power output of 77.5 watts per channel with 8 ohm loads (both channels driven). At rated output (60 watts per channel) THD was a mere 0.1% and at lower power levels there was never a tendency for the THD to 'creep up' again, which indicates the virtually complete absence of any 'crossover distortion' components. No so-called 'transistor sound' from this receiver, you can be sure. We tried to measure IM distortion but kept getting readings of 0.05% no matter what we did. Since that happens to be the 'limit' of our test equipment and since the rated IM stated by Heath is 'less than 0.1%' at all power levels up to rated power output there isn't much more we can say except that, again, the unit is better than the specification — we just don't know how much better...

"As for the amplifiers and preamplifier sections, we just couldn't hear them — and that's a commendation. All we heard was program material (plus some speaker coloration, regrettably) unumbered by audible distortion, noise, hum or any other of the multitude of afflictions which beset some high fidelity stereo installations...

"As always, construction instructions are lucid enough for the inexperienced kit-builder and there is enough technical and theoretical information to satisfy even the most knowledgeable audio/RF engineer.

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See and hear the new AR-1500 at your nearest Heathkit Electronic Center... order direct from the coupon below... or send for your free Heathkit catalog.
Earn with Stern

LONDON

I arrived at the EMI studios in St. John's Wood last November for one of the most star-studded recording sessions that CBS has devised in London for some years. Since the red light was on, I listened through the heavy door of the control room. I was slightly disconcerted when the murmur of music plainly told me that I was not listening to Mozart's great Sinfonia Concertante, which Isaac Stern was due to record with Daniel Barenboim and the English Chamber Orchestra, and with Pinchas Zukerman, fellow violinist and former Stern protegé, doing a stint on the viola. Nor did it sound like Stamitz' Sinfonia Concertante, the work chosen as a coupling—though in all honesty I am not exactly familiar with that piece. The take ended, the light went off, and I walked in to find not a CBS session at all, but one for EMI with Suvi Raj Grubb in charge instead of CBS's Paul Myers. True, Barenboim was the conductor and the English Chamber Orchestra was in the studio, but the music they played was by Antonín Dvořák—his Serenade for Strings.

"Earn with Stern" was the great virtuoso's slogan during the Mozart/Stamitz sessions, which had already been completed in three sessions instead of the scheduled four. Zukerman had astounded everyone with the richness of his viola tone (he uses an instrument once owned by the late Boris Kroyt of the Budapest Quartet), not to mention his virtuosity. Barenboim, as ever, was wonderfully agile in his conducting. But everyone agreed that it had been Stern who had made the sessions effervesce. At the start there had been a moment's delay as they tried to screw the pitch up with the aid of a tuning fork. "When that thing gets up to 443," said Stern, "sell!"

But all this I learned later by report. At the present session Grubb and his team were helping Barenboim polish off two more movements of the Dvořák. This is a recording that is being made piecemeal, almost by stealth. Last July Barenboim taped the first and third movements after completing the Mozart symphony sessions ahead of time. This CBS-turned-EMI session provided two more movements—the second and fifth. Grubb and Barenboim are now quite confident that the fourth movement can with "no problem at all" be fitted in, when at the beginning of the year Barenboim records the two more entries in his Mozart piano concerto cycle, K. 482 and K. 491.

Only that morning, Grubb reported, his wife had asked him when his next session was due. "Not until the 25th," he told her, "but Danny's around, and you can never tell." When later that morning the phone rang, he was perfectly prepared for the news that CBS's Mozart and Stamitz had been dispatched in record time, and a whole spare session would be available for EMI's Dvořák. Barenboim now plans to couple the String Serenade with the same composer's Wind Serenade, but that, he admits, may have to be allocated regular sessions. One of the problems of such a sudden switch from eighteenth-century baroque music to Dvořák was that the players might have found it hard to adjust, but by now they know Barenboim so well that the transition was smooth. It was at the 1969 Edinburgh Festival at the time when Russia invaded Czechoslovakia that Barenboim chose as an encore the first movement of the String Serenade—"by the Czech composer, Dvořák," as he said in his spoken announcement. After that recording the work became an emotional debt of honor.

Other sessions which Grubb has supervised lately have included a baroque recital by Dietrich Fischer-Dieskau with Jean-Pierre Rampal on the flute and Robert Veyron-Lacroix at the harpsichord. That went in hand with a live concert at the Royal Festival Hall by the same performers. Also recorded were the two Wieniawski Violin Concertos with lizthak Perlman as soloist and Seiji Ozawa conducting. There was a problem getting a score of the rare First Concerto, but as happens so often the BBC Library found the rarity in its archives and kindly lent it.

Previn and Nevsky. My other EMI session was at Kingsway Hall, where André Previn with the London Symphony Orchestra and LSO Choir was also following up a concert performance with a recording. This time it was Prokofiev's cantata Alexander Nevsky, and the main problem lay in persuading a very English choir—arguably the best in the country but still very English—to give a fair imitation of Russian tone. The choirmaster, Arthur Oldham, is a stickler for discipline, and if anyone could prompt the required transformation it was he. At every recording session, not just those for Nevsky, he insists on his choir members arriving a quarter of an hour early. They then rattle the ears of everyone as they run through Oldham's special voice exercises: first getting higher and higher, then going down to the basement and pushing their chest tones as hard as possible.

The result, as recording manager Christopher Bishop noted happily, is that well before the first take of the session the whole choir is warmed up. There are no wasted takes because of thin tone. Previn was also full of admiration. At one point in the third movement, he wanted the chorus to quietly simulate the sound of a bell tolling, four syllables in each bar. He explained carefully, but the result was still wrong. Arthur Oldham then chimed in. "The color isn't dark enough," he said. "Too much voice and not enough breath." At once the result was exactly what Previn had conceived. "Why can't they do it for me?" he asked in mock irritation.

Delius and Liszt. Christopher Bishop was also the recording manager for EMI's new compact disc recording of Delius' rare opera A Village Romeo and Juliet. Fine as the old Beecham performance was, it was originally done on 78s. One main problem about redoing so delicate and evocative a work was to find a conductor who, if he could hardly rival Beecham, would at least handle the music with affection. In Meredith Davies, who recorded the Delius Requiem for EMI, the firm feels it has the right answer, and the vocal cast is strong.
People who listen to records for a living are the best ones to ask about turntables.

Most people who decide they want components turn to a friend who knows something about components. And if the friend happens to be someone who reviews recordings, that's even better.

Record reviewers must select their equipment with great care, since they must listen with great care. To such things as the interpretation of the artist. To the recording and microphone techniques. And to the quality of the record surface itself.

All this is why the professional listeners select their turntables so carefully.

What most serious listeners know.

Professional listeners know that what they hear (or don't hear) often depends on the turntable.

After all, the turntable is the one component that actually handles records, spinning them on a platter and tracking their impressionable grooves with the unyielding hardness of a diamond. And the professional realizes that much depends on how well all this is done.

Which is why most record reviewers listen to their records on a Dual.

They know that a record on a Dual will rotate at precisely the right speed, to give precisely the right pitch. (If a record happens to be off-pitch, a Dual can compensate for it.)

They know that a Dual tonearm will let the most sensitive stylus track the wildest curves ever impressed on a record groove, and not leave a trace of its passage.

And they know that a Dual will perform smoothly, quietly and reliably year after year after year. Despite all the precision built into a Dual, they know it's one turntable that doesn't have to be handled with undue concern. (Even if the tonearm is locked when play is started, or if the tonearm is restrained in mid-air while cycling, no damage will result.)

If you'd like to know more.

A few examples of Dual precision engineering are shown in the illustration at the right. But if you would like to know what several independent test labs say about Dual, we'll send you complete reprints of their reports. Plus a reprint of an article from a leading music magazine that tells you what to look for in record playing equipment.

Better yet, just visit your franchised United Audio dealer and ask for a demonstration.

You'll find Dual automatic turntables priced from $99.50 to $175.00, including our new Integrated Module, complete with base, dust cover and magnetic cartridge at $119.50.

These may seem expensive at first, but not when you consider your present and future investment in records. And now that you know what the professional listeners know, doesn't it make sense to own what they own?

Typical examples of Dual precision that preserves and brings out the best in stereo records. A) Twin-"ring gimbal suspension that lets tonearm pivot like a gyroscope for total freedom and perfect balance in tracking. B) Special control that lets stylus track at perfect angle in single play and at center of stack in multiple play. C) Tracking force is applied at pivot, maintaining perfect dynamic balance of tonearm. D) Separate anti-skating calibrations for elliptical and conical stylus are provided, as each type skates differently. E) Tonearm counterbalance is elastically damped and has vernier adjustment with click-stops for convenience in changing cartridges.


FEBRUARY 1972

CIRCLE 27 ON READER-SERVICE CARD
Elizabeth Harwood and Robert Tear as the young lovers, John Shirley-Quirk as the Dark Fiddler, and Noel Mangin and Benjamin Luxon (chosen for their sharp contrast of tone) as the two opposing fathers. Beecham's old orchestra, the Royal Philharmonic, accompanied.

For Philips, Bernard Haitink has been finishing off his cycle of the Liszt symphonic poems with the London Philharmonic Orchestra. The session I attended at Walthamstow Assembly Rooms was for one of the two longest symphonic poems, Ideale, which lasts nearly half an hour. Things had gone so well that the second session started well before time, and Haitink, now that he is immersed in Liszt, finds that he enjoys the pieces more than he expected.

It was not his idea originally to record the cycle, but he feels that this music with its strange mixture of revolutionary imagination and more obvious qualities certainly belongs on record. He gave me my clue. These were violist Karen Phillips: Only the sixth concerto was recorded. But the first musicians I saw gave me my clue. These were violinist Walter Trampler and his violinist wife, Karen Phillips: Only the sixth concerto involves two solo violins. It also involves two gambas, a harpsichord, a bass, and two cellos. And that is all: Unlike all the others, there is no string ensemble complement. Hence No. 6 is the easiest to record.

But one would never have gleaned this from viewing the multilegged spider-net work of mikes dangling overhead. There were, in fact, individual mikes for each of the instruments, a situation obtaining for all six concertos. With every instrument recorded onto its own track—in effect, recorded separately—Columbia is in the happy situation, at mixing time, of being able to balance the parts in any way they desire. This eliminates the problem of imbalance between the sonorities of old and modern instruments.

There is a danger, though, of "spillage"—of one instrument's sound traveling over into a neighboring instrument's track. Most of this danger is averted through use of highly directional mikes. Sometimes, though, additional precautions must be taken. On this evening that meant a barricade in front of the big, booming bass fiddle.

Producer Steve Paul and I discussed another aspect of these performances—the employment of old instruments. "We used authentic instruments wherever possible," he explained, "and whenever we could find players. We use old oboes and bassoons for the first concerto, for instance—and wood flutes for the fifth, and old gambas for the sixth. Sometimes, though, the instruments just weren't to be found—especially short-neck violins."

Newman, wearing a blue turtle-neck jersey, maintained a marvelous equanimity throughout the evening. About the instrument situation he seemed perfectly...
Some Pertinent Information on the Smaller Advent Loudspeaker

The original Advent Loudspeaker was designed to equal or surpass the audible performance of any speaker system used in the home, regardless of price. Its reviews, reprints of which we will be happy to send for the asking, indicate how well that objective was met.

The Smaller Advent Loudspeaker has the same audible performance, except that it will not play as loud. Since the original system was and is an unusual bargain at $116*, the newer and smaller system, at $70*, obviously deserves a full description to the prospective buyer. Accordingly, the following questions and answers:

What Is It For, and Just How Good Is It?
The Smaller Advent Loudspeaker is meant to make it possible to buy a complete stereo system in the $400 range, for use in an average living room under the usual listening conditions, that will provide the kind of sound quality associated with the most expensive stereo systems. Specifically, it exceeds the frequency bandpass and freedom from distortion of most far more expensive speakers, and provides the final, lowest octave of bass offered by only a handful of the most expensive speakers—and by none in or near its own price class. It is intended for use with any of the several sufficiently powerful present receivers in the $200-$250 price range (from Kenwood, Marantz, Pioneer, Sansui, Scott, Sherwood, Sony and others) that will deliver 18-25 watts per channel of continuous power into 4 ohms.

How Does It Do What It Does?
The overall sound quality of the original Advent Loudspeaker was achieved in a smaller and less expensive speaker through careful, unmysterious design that gives up some of the efficiency and maximum total loudness of the original, and through the choice of a 4-ohm voice coil impedance that draws about one-third more effective power (from present solid-state equipment) than an 8-ohm design.

A further reason for its lower cost was the selection of a walnut-finish vinyl cabinet of simple design.

Who Should Be Interested In It?
Anyone, we believe, who has a living room of average size (about 2000-3000 cubic feet) and no reason to play music at thunderingly loud levels under normal conditions. The speaker’s maximum sound level is considerable (and well beyond what would be considered tolerable in most homes), but not as great as our larger and more expensive system’s.

It’s worth making clear that there is no real advantage in buying an expensive super-high-powered receiver or amplifier to drive the system, since the speaker is so exactly tailored to the power capabilities of moderately-priced equipment—with which it will sound as expensive as you please. But it’s also worth stressing that the moderately-priced equipment for which the speaker was designed may not do the trick in the usual store (big, sound-absorbent, and full of people) where it’s demonstrated. If a good receiver in the $200-$250 range sounds strained trying to drive the speaker in a show room, it is still likely to be more than ample at home. Higher-priced equipment probably will have an audible advantage only in the showroom.

Any Special Considerations?
Nothing special is needed to use the Smaller Advent Loudspeaker in standard stereo or four-channel hookups. Because it is a 4-ohm design, we suggest you use a 3-ohm, 5-10 watt resistor (from your dealer or free from Advent) in the speaker line when you intend to use more than one speaker per channel at a time—as in a household where main and extension speakers are used simultaneously. The resistor will prevent the combined impedance from dropping below the 4-ohm optimum.

Where Can I Hear It?
If you don’t know where to find the nearest Advent dealer, please write us at the address below. And let us know if you would like more information before going to look and listen.

Thank you.

Advent Corporation, 195 Albany Street, Cambridge, Massachusetts 02139.

* Slightly higher in some parts of the country.
Newman, who delights in the recordings of Wilhelm Furtwängler (an odd taste for a baroque specialist), defended his heavy application of rubato to Bach performances. "If you read the descriptions written in Bach's time, by Italian violinists, you come across such statements as, 'He plays the effect of the music,' or 'He plays expressively.' That can only mean rubato. And then if you apply Schenkerian analysis, you come up with the important compositional devices. My approach is to apply rubato wherever there are compositional devices, in order to highlight them, such as in cadences, at the beginnings and ends of cadences, at the beginnings and ends of sequences, or where the suspensions are very poignant. At these points I like to set them off with rhythmic freedom and with added ornaments."

As for the actual recording of No. 6, rarely have I seen a session proceed more smoothly. The only old instruments here were the two gambas, and they were having no problems whatever. But before the evening was over, I had a chance to see what Newman had been talking about. For once No. 6 was out of the way, all attention reverted to having yet another go at certain portions of No. 2 which involved a devilish little device called the piccolo trumpet. Bach demands that the trumpet soar ever upward, until at the climax, it hits a couple of very high Gs. It's a difficult feat, and Columbia's trumpeter had come to grief with them in the previous sessions. Now he was back to try again.

He sat alone in the studio while the engineers played the portions needing repair. One of the beauties of their sixteen-track system allowed them to provide a music-minus-one situation. The track containing the defective trumpet portion was simply removed. The remaining tracks were played back within the studio and the trumpeter could once again play his part while the engineers recorded him. It was an ingenious solution. But the little trumpet's resident demon proved unexpectedly stubborn. He was not about to be exorcised by this shabby technological strategem.

Bravely, determinedly, the trumpeter replayed his parts—and always those stratospheric Gs eluded him. As the minute hand drew closer to the 11 p.m. deadline, Steve Paul and engineer Stan Tonkel exchanged worried glances. The Brandenburg project was threatening to end not with a bang, but with a squeak!

"How about having Elisabeth Schwarzkopf come in and sing the notes?" said a wag in the control room. Steve Paul had another idea, which he relayed to the trumpeter through the studio mike: "Maybe we could run the tape at half speed, and have you play an octave lower." The trumpeter grimaced. "Let's keep some integrity in this." "But why not?" Anthony Newman seconded. "If it works, I'm willing!"

Stan Tonkel looked dubious. "You can't tell what it'll do to the timbre."

"We'll try it," Steve Paul decided, "as an experiment. It can't do any harm."

And so the tape speed was reduced, and the player adjusted his pitch and tempo accordingly. By this time, the musicians had crowded into the control booth, looking on with fascinated amusement. They were young for the most part, and each in his own way was rooting for both trumpeter and engineers. There were no cries of indignation against this resort to electronic trickery. They were pros, and the pros' first rule is, "If it works use it."

It didn't work. At the playback there was a chorus of giggles. "Sounds like a chipmunk," said Steve Paul. They tried another tactic: play the take in which the trumpeter had almost made it and "give it a shot." that is to increase the speed until the tone rested dead center.

That didn't work either. What worked, ultimately, was human persistence and the trumpeter's stiff upper lip. On a final take he made it. "Bingo!" exclaimed an engineer.

Jack Hiemenz
JENSEN'S MODEL 1.
IT'S WHAT HAPPENS WHEN YOU CROSS A WOOFER AND A TWEETER.

Model 1 may be a strange combination, but there's nothing odd about the way it sounds. We built a two element, full range speaker system, with an 8" dual cone driver. Model 1 gives you the best performance per dollar on the market. At $30, it's a terrific bargain.

Model 1 also has the exclusive features that our more expensive systems have. Like Total Energy Response. The speaker design concept that gives you a fuller, richer sound than you'll find on any comparably priced system.

The trademarked Flexair suspension that produces a clearer, more realistic sound.

A 5 year parts and labor warranty that's the best in the field.

And an incredibly lifelike, eminently practical walnut grained vinyl covering.

And specifications like these: Power Rating - 30 watts. Frequency Range - 40-18,000 Hz. Crossover - 6,000 Hz mechanical. Dispersion - 120.

Treat yourself to something unusual. Good performance at an incredibly low price. Ask your hi-fi dealer for a demonstration.
If you've hesitated about making the switch to four channel because of the complications posed by rear speaker placement, relax.

We've got the answer. It's our ADC 404A.

The choice of leading testing organizations for two channel systems, this unobtrusive, high quality, low cost speaker is also the perfect solution to the biggest hang up in four channel sound reproduction.

The ultra-compact ADC 404A (11¾" x 7¾" x 8¾") provides the clean, uncolored, well balanced sound normally associated with far larger and more costly systems.

Best of all, its small size and light weight enormously simplify placement problems. Just place a pair on a back wall and almost before you can say four channel, you're hearing it.

And once you've heard the 404A, we think you'll agree that with ADC bringing up the rear, you're way ahead.

Manufacturers suggested retail price $50.

Audio Dynamics Corporation
Pickett District Road, New Milford, Conn. 06776

CIRCLE 9 ON READER-SERVICE CARD

60 YEARS AGO

Rumor has it that the members of the Metropolitan Opera orchestra have gone on strike, refusing to play under Toscanini. It was reported that the fiery Italian maestro had insulted two orchestra members, and a spokesman for the orchestra stated emphatically that "there will be no compromise until Mr. Toscanini takes off his hat and swears by Bacchus, Jupiter, and Venus" that he will refrain from such actions in the future.

World-famous soprano Maria Gay (Mrs. Giovanni Zanetello) has been elected as the only woman member of the Boston City Club, which comprises some 3,000 business and professional men of Greater Boston. The law regarding feminine invasion of the club was violated for the first time in its history last week when Mme. Gay and members of the Boston Opera Club gave a concert in the club rooms.

Early in the morning of February 5, Chevalier T. Typaldo-Forestis, the Greek consul, and Dr. Fortoni, a Venetian, engaged in a duel on the outskirts of Venice. Four shots were fired, but there were no casualties. Cause of the dispute was a heated discussion of the relative merits of Pietro Mascagni's Tosca and a "prolific source of trouble during its existence." Their argument became so intolerable that both men felt that there was no alternative but "to settle the dispute on the field of honor." When their seconds felt that honor had indeed been satisfied, the two men refused to shake hands, but faced each other, bowed, and parted.

40 YEARS AGO

The Music Division of the Library of Congress has just acquired the original, complete holograph score of Johann Sebastian Bach's cantata Es ist das Heil uns kommen her. This is the first Bach manuscript of any importance to reach the Library. It was sold by the widow of well-known Berlin musicologist, Dr. Wolfheim. Few manuscripts in the United States match this one in extent and rarity. Purchase price was not disclosed, but gifts from the Friends of Music in the Library of Congress and the Beethoven Association of New York supplemented the resources of the Library to buy the manuscript.

20 YEARS AGO

A discography of "Beethoven on Records," including 230 recordings of 119 works—the complete recordings to date—appears in the Spring, 1952 issue of HF.

With Tosca as its first operatic undertaking, we find that "Westminster, with its technical ability" has produced a recording "so transparent and realistic in its smallest details and its loudest interjections and the sense of theatrical presence ... so skillfully maintained that ... the grandeur of the engineering feat is ... properly emphasized... ."

The Audio-Master Corporation now offers a vast catalogue of instant background music. Do you need one minute and twenty-six seconds of Relentless Energy (backed by one minute and twenty seconds of Hidden Power)? Or if that sounds too vigorous, you might try disc number 268, which will supply you with three minutes of Seduction, with one and a half minutes of Good Old Times, plus one and a half minutes of Peaceful Finale.

Scientists, mathematicians, and philosophers all live longer than musicians, says Dr. Jacob Kwalwasser in a recent study of the life span of the professional musician. "Musicians and poets are inclined to live rather stormy lives, whereas mathematicians and philosophers are men of naturally quiet habits," noted Dr. Kwalwasser.

Lawrence Tibbett and Peter Ibbetson seem unable to get along. Last year during a performance of the Deems Taylor opera, Mr. Tibbett cut his hand badly when breaking the window to call for help in the struggle with Peter. At a recent performance, a piece of pointed glass fell on the baritone's foot, piercing his shoe and severing a vein in his instep. First aid was administered on stage and the singer was able to go home. Dr. Kwalwasser seems to have a point.

The audience at Carnegie Hall the other afternoon "gasped with astonishment and pleasure at the sight of young Yehudi Menuhin ... wearing long trousers for the first time. His artistic growth too has been steady and healthy. There is evidence of a strong personality ... almost ready to go its own artistic way."
The new ADC-XLM

Superb performance.
Lowest mass.
Unbeatable price.
And it's guaranteed for 10 years.

If you're like most audiophiles, you've probably spent a great deal of time, effort and money looking for the "perfect" cartridge.

We know what you've been through. After all, we've been through it ourselves.

That's why we're especially enthusiastic about our newest cartridge, the ADC-XLM. It does everything a well designed cartridge should do. It may not be perfect, but we don't know of any that are better, and few that even come close.

Now, we'd like to tell you why.

The lighter, the better.

To begin with, it is generally agreed that the first consideration in choosing a cartridge should be low mass. And as you may have guessed by now, the LM in our model designation stands for low mass.

Not only is the overall weight of the ADC-XLM extremely low, but the mass of the all-important moving system (the stylus assembly) is lower than that of any other cartridge.

Translated into performance, this means effortless tracking at lighter pressures with less distortion.

In fact, used in a well designed, low mass tone arm, the XLM will track better at 0.4 gram than most cartridges at one gram or more.

A new solution for an old problem.

One of the thorniest problems confronting a cartridge designer is how to get rid of the high frequency resonances common to all cartridge systems.

Over the years, various remedies have been tried with only moderate success. Often the cure was worse than the disease.

Now, thanks to a little bit of original thinking, ADC has come up with a very effective solution to the problem. We use the electromagnetic forces generated within the cartridge itself to damp out these troublesome resonances. We call this self-correcting process, "Controlled Electrodynamic Damping;" or C.E.D. for short.

And if it seems a little complicated, just think of C.E.D. as a more effective way of achieving lower distortion and superior tracking, as well as extending frequency response.

Naturally, there's much more to the new ADC-XLM, like our unique induced magnet system, but let's save that for later.

Guaranteed reliability plus.

At ADC we've always felt that reliability was just as important as any technical specification. That's why we now guarantee every ADC-XLM, exclusive of stylus, for a full ten years. But this unprecedented guarantee involves something more than just an assurance of quality. It is also an expression of our conviction that the performance of this cartridge is so outstanding that it is not likely to be surpassed within the foreseeable future.

And something more.

In addition to the superb ADC-XLM, there is also a new low mass ADC-VLM, which is recommended for use in record players requiring tracking pressures of more than one gram. The cartridge body is identical for both units, and so is the guarantee. Only the stylus assemblies are different. Thus you can start out modestly and move up to the finest and still protect your investment.

But no matter which low mass ADC you choose, you can be certain that they share the same outstanding characteristics...superb tracking, very low distortion and exceptionally smooth and extended frequency response.

*We guarantee (to the original purchaser) this ADC cartridge, exclusive of stylus assembly, to be free of manufacturing defects for a ten year period from the date of factory shipment. During that time, should a defect occur, the unit will be repaired or replaced (at our option) without cost. The enclosed guarantee card must be filled out and returned to us within ten days of purchase, otherwise this guarantee will not apply. The guarantee does not cover damage caused by accident or mishandling. To obtain service under the guarantee, simply mail the unit to our Customer Service Department.
I tape mostly from FM, AM (some talk shows when there are interesting guests), TV, and old records and am in need of a new deck. The professional qualities of the Revox and the Teac decks have impressed me, but I have a number of tapes at 1½ ips and wouldn't be able to play them. The Ferrograph has the slow speed and a variable bias control, which looks like a good idea, but it also has pressure pads. I thought they disappeared on all but the cheaper decks years ago. Don't they cause the heads to wear badly?—Arnold Greer, Jackson Heights, N.Y.

On averages, pressure pads do tend to increase head wear, though not to the disastrous extent your question implies if the deck is properly engineered. In the Ferrograph the pressure pads also contribute to a feature that may be of value in your kind of recording. Their damping action makes the startup from pause especially efficient, without the tendency to "bounce" briefly until the tensioning system settles down. You will notice the difference only if you start-on very tight cues-following an announcement or in piecing together music interrupted by the break between record sides, for example. Also, on a false start—for instance when you release the pause control at the end of a commercial only to find that you are recording a second, unexpected commercial—the Ferrograph and Revox decks can be recued more easily than the Teacs.

What ever happened to the idea of wireless headphones? I thought they were supposed to be on the market by now.—Leonard Aldrich, Smithtown, N.Y.

They were—and they may yet be. The problem has revolved around the wireless link. The usual approach is to use a pair (for stereo) of FM transmitters at the amplifier, and FM receivers in the headset. The radio transmission level must be kept low to meet FCC requirements, but not so low that it is plagued by interference. Apparently none of the companies that have talked of selling wireless headphones in the past has made it to market with the original designs. Two new ones have been announced recently, however: the Freedom Fone FF = 1 from Superex, and a wireless link—called the Lost Cord (!), for use with any stereo headset—from a California corporation by the name of Concept Plus. We plan to take a careful look at both as soon as samples are available.

I had heard that "cobalt-doped" recording tapes proved to be a big bust, I see that 3M is making cobalt-doped Scotch High Energy tape for cassettes. In 3M's ads in your own magazine, High Energy is called "cobalt energized." Is there a difference?—F. L. Monk, Pittsburgh, Pa.

Yes and no. "Cobalt energized" is just fancy advertisingese for "cobalt doped." The 3M people may dislike the word doped in the context of modern technology it means "intentionally infused with small amounts of a certain impurity in order to obtain a specific property in the admixture"), and it has been used to characterize earlier tape formulations that were, indeed, something of a bust. The first cobalt-doped tapes tended to lose a lot of information—to erase themselves in effect—under physical stress: during repeated windings for example. 3M says it has found a way of having the virtues of cobalt doping (improvements in signal-to-noise and frequency response) without its disadvantages and doesn't want High Energy to suffer from the poor reputation of earlier products. Hence the change in term, though the basic principle remains the same.

KEF is, I believe, one of the largest manufacturers of loudspeakers in England. Their reports I've seen on their top models have been quite impressive. But in the many issues of High Fidelity I've read over the past few years I have never seen an equipment report on KEF. Why not?—E. S. B. Holmes, Ottawa, Canada.

KEF enjoys a good reputation internationally, but not correspondingly good distribution in this country. If our readers were generally able to get the products through regular dealer channels you would find KEF reviews in our pages.

How can I get rid of the squeaky sound I hear when I play stereo tapes that have not been used for a long time? I have wound and rewound them repeatedly, but that does not help.—Isadore M. Bernstein, Chicago, Ill.

There are two possible causes: so-called scrape flutter and mechanical friction in the recorder parts themselves. The latter is easier to spot. If you turn off the speakers while a "squeaky" tape is playing you may find that a rotating part (an idler or perhaps the pinch roller) is making a similar noise. Its roughness of motion can be transmitted mechanically to the tape and, in effect, modulate the tones "read" by the playback head, producing raucous sounds in the output. A drop of oil at the bearing of the offending part should solve this type of problem. Scrape flutter is caused by unlubricated tape passing over a fixed guide in the tape path and produces similar problems. Add-on tape-lubrication products have been marketed in the past, but their use is a pretty iffy matter. It's easy to get too much lubrication on the tape, causing it to slip at the capstan. Often a tape that produces excessive friction on the guides of one unit will behave itself on another. If scrape flutter is the culprit (it often is), we'd suggest borrowing another deck and, if necessary, making copies of your old tapes on new, properly lubricated tape.

I recently bought a Teac 6010SL tape deck. Is there any audible difference between low-noise high-output tapes when used on this machine? That is, can I use Scotch 2245 SV tapes in a Sony SLH, or BASF Superchangeable, or should I stick to a single brand?—Paul S. Y. Wong, Albany, Ore.

You may find some audible difference between these tapes—or even between different batches of tape. Most recorder manufacturers (and even most engineers, for that matter) recommend that you decide on a single brand and type of tape and stay with it. Only by knowing just how it behaves will you be able to predict exactly what it will do (or won't do) when you make a recording. And only on the basis of this kind of familiarity can you confidently say that you are now dissatisfied. Otherwise the improvement—even if it is substantial in theory—is likely to be of little real benefit.

Lafayette says the LR-1500TA receiver is rated at 240 watts ± 1 dB. The Marantz 2245 is advertised as 90 watts rms, both channels driven. How can I compare the power output of these two models?—L. D. Crow, Jackson, Miss.

When we tested the previous version of the Lafayette, the LR-1500T, it checked out at 220 watts ± 1 dB Lafayette's methods—only slightly lower than the 1500TA's rating. The Marantz rating is for 8-ohm loads, making it the equivalent of 45 watts per channel. Therefore it appears that—on the basis of manufacturers' ratings and without reference to distortion factors—the Marantz comes in at about 5 watts more per channel, expressed in what we would consider to be the usual terms.

Add another classic to your library from Sony/Superscope ... the bookshelf-size Sony model 640 three-motor three-head stereo tape deck.

Get all of these outstanding Sony features in the model 640: beautifully compact, beautifully priced ($349.95) three-motor tape deck on the market today.

Three Motors. One precisely controls tape speed and two provide ultra-fast rewind and fast-forward modes for optimum tape handling ease.

Three Heads. Separate erase, record and play heads give better frequency response and also provide for tape/source monitoring, allowing you to check the quality of a recording while in progress.

Built-in Sound-on-Sound and Echo. Switching networks on the front panel facilitate professional echo and multiple sound-on-sound recording without requiring external patch cords and mixer.

Mic/Line Mixing. Dual concentric level controls regulate the record levels of microphone and line inputs independently also allowing simultaneous mix and record.

Two Large Illuminated VU Meters—calibrated to NAB standards.

Plus Lever Action Solenoid Controls.

Also ask about the Sony 650 (two-track: $475.00, Quarter-track: $449.95) & Sony 850 ($795.00) at your Sony/Superscope dealer.

After all, when it comes to tape recorders Sony wrote the book.

SONY

SUPERSCOPE

You never heard it so good®
Discrete Quadraphonic Discs: A Resounding "Maybe"

News isn't always what it seems to be. Frequently the press is called together to witness a "major breakthrough" that, as it turns out, can't be made to work; less frequently we are shown a "possibility" that actually is a big step forward.

A recent press conference sponsored jointly by RCA, Panasonic, and JVC is hard to evaluate in either of these terms. It was officially called a "capability demonstration" of the CD-4 discrete quadraphonic disc system originally developed by JVC. It has been common knowledge within the industry for some time that JVC had shown early versions of the system to RCA's engineering staff and received favorable comments on its potential. But it also had been made clear that the CD-4 discs would be marketed (by JVC) only in Japan within the immediate future and that RCA was making no commitment to the system.

The inclusion of Panasonic among the sponsors was genuine news. Both Panasonic and RCA are saying that the full channel separation of the CD-4 discs makes them intrinsically preferable to the necessarily compromised separation of the various matrixed quadraphonic discs (using Electro-Voice, Sansui, or CBS processing equipment) and that CD-4 is the way the record industry must go if it is to go quadraphonic at all.

Further, Panasonic has added its considerable research facilities at the parent company (Matsushita) in Japan to those available for development work on discrete four-channel records. And development ap-

Do We Really Want Another Type of Tape Cartridge?

Readers of our latest new-products feature (October 1971) may have been shocked to note that, just when the tape field seemed finally to have settled on three permanent formats (open-reel, cassette, and eight-track cartridge), two new cartridge designs were being proposed. The first was the Cartrette, produced by the Faraday Corporation of Tecumseh, Michigan—successor to Ortronics, whose short-lived cartridge design of some five years ago contributed at least one salient feature to the Cartrette. The other is the Hipac cartridge, developed by a group of Japanese software and hardware manufacturers headed by Pioneer.

The Cartrette measures 2 by 2 by ¼ inches and contains a continuous loop of tape the same width as that in a cassette. The 0.021-inch track width of cassettes and eight-track cartridges is retained. A total of four tracks will fill the tape width, yielding two stereo pairs or a single four-channel recording. Maximum playing time for the quadraphonic recording will be 20 minutes; for stereo it will be 40 minutes, in two 20-minute passes.

Those times seem rather short by contrast to cassettes or eight-track cartridges, but Faraday says that the pop-singles field is one it hopes to see cultivated by Cartrettes—which, it points out, can be sold by vending machines to reduce the pilferage problems encountered by vendors of such small-bulk items. Prepared for this market, Cartrettes might take the place of the discontinued Playtapes.

The Hipac cartridge is literally a scaled-down version (2¼ by 3½ inches) of the eight-track cartridge. In the process of miniaturization its tape width has been reduced to that of cassette tape and its eight tracks to four—again retaining the track width used both in the stereo cassette and the eight-track cartridge.

One striking difference about the Hipac cartridge is that its developers are suggesting it may be used at either 3¼ ips (like the eight-track original) or 1½ ips (like a cassette). The stereo cartridges will play for one hour at the slower speed, 30 minutes at 3¼. Either way, two passes ("programs") are needed to play the entire cartridge. Quadraphonic cartridges would be perfectly possible, of course. They presumably would play all the way through in one pass, cutting running times in half. In other words, one LP album would fit on the new cartridge at 3¼ ips in stereo or at 1½ ips in four-channel sound. With a shorter tape loop, the cartridge also might be used for quadraphonic hit singles at 3¼, so Hipac, like the Cartrette, could be made to fill the Playtapes void.

The Hipac name, incidentally, will not be used here; what it might be called in the U.S. is anybody's guess. While Hipac hardware and software already are on the Japanese market, American representatives of the system recently have emphasized that no plans are afoot for extension of the marketing area; and the Cartrette has yet to receive any public enthusiasm from American recording companies. Meanwhile, between foreign exchange rates (and presidential excise surcharges) and quadrophonics, the convenience-tape industry here has all the problems it can cope with for the time being.
Ecstasy. At a price that
won't cause too much agony.

Before the ecstasy of listening to your new stereo
equipment comes, alas, the agony of shopping for
it—the frustration of wanting this feature, and
that spec, and finding that your budget won't
quite cover it.

Sony has something to ease the pain. The STR-
6036. An FM Stereo/AM-FM receiver for the man
with a small room, a small budget, but big ears
nonetheless.

It's an inexpensive receiver that doesn't sacri-
fice performance, specifications, control flexibil-
yty, sound quality, or even looks.

What it does sacrifice, of course, is just a bit of
power. The STR-6036 de-

livers 50 clean watts of
IHF dynamic power at 4
ohms*. That's quite enough
to drive even most low-effi-
cyency "bookshelf" speakers,
even if it's not enough to
rival the power company.

or to let you bust your buttons bragging about it.

The tuner, though, makes no concessions: It has
a sensitive, overload-proof FET front end. And
ceramic i.f. filters that increase selectivity and
never need realignment. Plus a tuning meter for
both AM and FM.

The controls have all the flexibility you'd expect
from Sony: tape monitor, main/remote speaker
selector, switchable loudness, even front-panel
microphone input jacks.

And the control feel is typical Sony, too—firm,
silky-smooth and positive. So the pleasure begins
at your fingertips, even before your ears can start
enjoying. Your pleasure
will deepen to ecstasy when
you hear the low price. As
will your dealer's when
you buy one. Sony Corpo-
ration of America, 47-47
Van Dam Street, Long
Island City, N.Y. 11101.

*IHF standard constant supply method.
pears to be progressing apace. Earlier CD-4 discs had been limited to about twenty minutes of music per side. Among the official statements made at the press conference was one claiming equal capacity with no compromise in signal-to-noise performance with respect to conventional stereo discs.

Like all quadraphonic discs proposed to date, the CD-4 variety is said to be compatible with stereo equipment—meaning that even inexpensive stereo record players will reproduce all the music in the recording, whether the sound derives from the front channels or the back. Even greater compatibility is claimed for the CD-4 discs, in fact, since matrixed discs can suffer some cancellation between channels when played in mono. None of that is news, however; the arguments for and against CD-4 discs have had considerable airing in past months.

To emphasize the firmness of their conviction that discrete, rather than matrixed, discs are the way to the quadraphonic future, both Panasonic and JVC demonstrated shiny new equipment to play them on. The JVC models lean heavily on the component concept: a separate CD-4 "demodulator" plus several receivers and amplifiers either with built-in demodulators or for use with the separate model. The Panasonic group tends more toward the compact-music-system format, though it also includes components. Both companies have phono cartridges: a semiconductor model from Panasonic, a magnetic from JVC.

When it comes to delivery dates and prices, however, things begin to get a little vague. Some of the JVC equipment already can be bought in Japan of course; Panasonic is saying that its models will be available on the American market in a month or two. But RCA says it will market the discs only when they become "fully compatible"—that is, when nonquadraphonic equipment won't compromise subsequent quadraphonic playback—thus indicating that more development is needed before that is true.

The main thrust of the press conference, then, appears to be a point that the participants seemed loath to express in so many words: "Tell your readers to wait for CD-4 before they buy any four-channel disc equipment." The air is full of such admonitions these days, and our readers can hold their collective breaths only so long. But there it is—the CD-4 system is moving forward, and two important companies now are willing to stand publicly with JVC on its behalf.

**Nagra’s Stereo Model—At Last**

Stefan Kudelski cannot be described as a hasty man. As the many admirers of Nagra professional portable tape recorders know, he is in the habit of turning out just so many units a year; if you want a Nagra, you may have to wait your turn. Nonetheless the Nagra name has become as much a byword among recordists—particularly those involved in on-location movie work—as Lotus or Hasselblad in their respective fields.

Some three years ago we first heard that Mr. Kudelski was preparing a stereo version of the Nagra. It has been in preparation ever since. Now Nagra Magnetic Recorders, Inc., the American representative for the Swiss firm, assures us that by the time you read this the Nagra Stereo will be available in this country. The Nagra IV S D-3, a model without movie sync, will sell for $1,856.

**equipment in the news**

**Kenwood Quadrix amp encodes quadraphonics**

Kenwood has entered the four-channel field with the KA-8044 Quadrix integrated amplifier. The preamplifier-control section includes circuitry for decoding matrixed four-channel records and simulating quadraphonic effects from stereo material. In addition it will encode quadraphonic sources so that they can be recorded on conventional stereo recorders and played back quadraphonically through the Quadrix circuitry. The unit sells for about $300.

**Speaker systems from Quadraflex**

The Model 66, shown here, is one of six loudspeaker systems announced by Quadraflex Industries of Emeryville, California. The Model 66 is a three-way system with a 12-inch woofer, L-C crossover, and dual controls. It sells for $139.95. The company presently markets its products primarily on the West Coast.

Continued on page 38
The same Shure development group that created the Super Track V-15 Type II Improved cartridge has perfected a reliable, simple, low-cost stylus force gauge that meets the needs of the dedicated discophile. It's designed to operate in the ½ to 3 gram range, and is accurate within 1/10th of a gram in the critical ½ to 1½ gram range—the force most widely used with today's better turntables and cartridges. It will enable you to accurately adjust the tracking force for maximum trackability while protecting all your records.

Cost? Only $4.95—just about the price of one good stereo disc.

Shure Brothers Inc.,
222 Hartrey Ave., Evanston, Ill. 60204.
What's music to some people's ears just doesn't make it for others.

If you prefer Beethoven or the Beatles to birds, live and let live with Koss Stereophones.

You'll hear your favorite music the way it was meant to be heard. Uncolored, full-range sound. Minus the room reflections that plague even the finest speaker systems. And minus the natural sounds of your environment, whatever it may be.

Koss makes a stereophone just right for you. The best that money can buy is the ESP-9 Electrostatic Stereophone. It surpasses the range of the best loud speaker systems. Delivers incredibly smooth, distortion-free sound over the entire audible spectrum of ten octaves.

Rated “superb” by High Fidelity Magazine is the PRO-4AA Professional Dynamic Stereophone. With an uncolored response two full octaves beyond the range of ordinary dynamics. And an extended linear bass response below audibility.

For the complete story on these and other Koss Stereophones, write for our free full-color catalog, c/o Virginia Lamm, Dept. HF-5.

In the meantime your Stereo Dealer or Department Store can let you hear the Sound of Koss... from $19.95 to $150.
Here's your FREE HIGH FIDELITY "at home" shopping service!

It's easy! All you do is use the Reader Service card at right. HIGH FIDELITY's Reader Service Department will take it from there. It's as simple as 1, 2, 3!

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MUSICAL AMERICA adds a new dimension to HIGH FIDELITY—and to your enjoyment of music. Use the postage-free card to start copies coming your way regularly.

(MUSICAL AMERICA is available only by subscription... and only with HIGH FIDELITY. It is not sold on newsstands. Another important reason for you to use the subscription card now.)
Sherwood’s brilliant new SEL-300 Digital Readout Tuner faces laboratory scrutiny at Audio Magazine. To say they liked it is the understatement of the year.

"The new Sherwood SEL-300 Tuner is truly the embodiment of ‘an idea whose time has come.’ It provided us with a whole new series of performance features which cannot, for the moment, be compared with any similar units."

They’re talking about our exclusive "Le Gendre" 12 pole toroid filter yielding an alternate channel selectivity in excess of -85 dB. FM sensitivity of 1.5 µv (IHF). An exclusive FET sideband variable hush control. And the industry’s lowest distortion.

Audio puts it this way: "...sensitivity figures are unequivocally the best we have checked to date and selectivity characteristics were so good we were able to tune in several channels which were only 200 kHz removed from strong, local stations."

And: "The stereo separation characteristics are seen to be every bit as good as FCC transmitter requirements."

Our features are as exciting as our engineering. Digital readout tubes have a life of 100,000 hours. There are multipath outputs for an oscilloscope. Headphone jack with built-in amp. A 3 year parts and labor warranty. And adaptability to both conventional and discrete four channel systems.

As Audio says, "talk about non-obsolescence!"

For the serious FM listener this means you can confidently own the finest tuner on the market today. The Sherwood SEL-300 is one tuner that passed its test. With flying colors.

Sherwood Electronic Laboratories, 4300 N. California, Chicago, Ill. 60618.

Sherwood sounds expensive
Technically, our new SQ four-channel system has 4 basic advantages.

Sony SQ
A new stereo/quadraphonic system, delivers four distinct sound channels from a compatible SQ record. It also offers four distinct advantages over all the other four-channel "matrix" systems.

Advantage #1:
Greatest stereo separation, front and rear.
Your present stereo system probably can maintain 40 db or so of separation between left and right channels. Maintaining this full left-to-right separation, in both the front and rear pairs of channels, is one of the major achievements of the SQ system.

Advantage #2:
Simple logic that lets soloists stay soloists.
When a single instrument is playing, all you want to hear is that instrument, even in four-channel. A pure matrix decoder— even the matrix at the heart of SQ— can't reproduce a solo instrument without a softer, phantom soloist in other channels. But by adding a logic circuit, these phantom signals can be diminished or eliminated, sharpening your sense of the soloist's position.

So far, though, only Sony's SQD-1000 and SQA-200 decoders have this logic enhancement. Because SQ's unique encoding (which shows up on records as a double-helical modulation of the groove) makes simple logic circuits practical.

Advantage #3:
Total omnidirectional fidelity.
A musician plays no softer when he's behind you or to one side. With SQ he doesn't sound as if he did. No matter where in the 360° quadrathonic circle the musician sits, he will be heard at exactly the same volume as if he were sitting in front of you. And that's true whether you're listening to the SQ record in four-channel or just playing it on a stereo system without an SQ decoder.

Advantage #4:
Equipment by Sony.
Sony offers you a choice of two SQ adapters. For the more demanding, there's a new SQD-1000 decoder. Its logic circuit enhances front-back separation by up to 6 db, so that front-center soloists (or rear ones, for that matter), stand out more clearly. The SQD-1000 lets you listen to four-channel sound from SQ records, or to discrete four-channel tapes on auxiliary players. It also lets you listen to normal stereo, or to stereo broadcasts and recordings enhanced with SQ ambience. Just plug the SQD-1000 into your tape monitor jacks (the SQD-1000 has its own), and add your choice of rear-channel amplifier and speakers.

If you want to get into SQ with a more modest investment, add Sony's new SQA-200 SQ decoder/amplifier to your system. It has all the SQD-1000's features (except the four-channel master volume control). But because the SQA-200 has a stereo amplifier built in, it saves you the expense of an extra amplifier for your rear channels.

Hear SQ at your Sony dealer. Or write Sony Corporation of America, 47-47 Van Dam Street, Long Island City, N.Y. 11101. *A trademark of CBS, Inc.
Musically, it's starting out with 52.

Columbia Records
Popular
- Lynn Anderson, Rose Garden
- Blood, Sweat and Tears II
- Johnny Cash at San Quentin
- Chase
- Ray Conniff, Love Story
- Al Cooper, Mike Bloomfield & Steve Stills, Super session
- Miles Davis, Bitches Brew
- Bob Dylan, Nashville Skyline
- Percy Faith, Romeo and Juliet
- James Brown, Proud Mary
- Ray Stevens, Greatest Hits
- Ray Price, For the Good Times
- Jim Nabors, Help Me Make It Through the Night
- No, No, Nanette, Original Cast
- Poco, Deliverin'
- Ray Price, For the Good Times
- Raiders, Indian Reservation
- Santana, Abraxas
- Sly and the Family Stone, Greatest Hits
- Ray Stevens, Greatest Hits
- Barbara Streisand, Stoney End
- Ten Years After, A Space in Time
- Andy Williams, Love Story
- Tammy Wynette, We Sure Can Love Each Other

Classical
- Bach, Switched-On Bach (Carlos)
- Bernstein, Mass (Bernstein, Original Kennedy Center Cast)
- R. Strauss, Also Sprach Zarathustra (Bernstein, N.Y. Philharmonic)
- Morton Subotnick, Touch
- Verdi, Requiem (Bernstein, Arroyo, Veasey, Domingo, Raimondi, London Symphony)

Vanguard Records
Popular
- Joan Baez, Blessed are...
- Larry Coryell, At the Village Gate
- Country Joe and the Fish, From Haught-Ashbury to Woodstock (2 LP)
- Buffy Sainte-Marie, Moonsong

Classical
- "P.D.O. Bach."
- The Stoned Guest (Schickele)
- Berlioz, Requiem (Abbravel, Utah)
- Handel's Messiah (Price, Minton, Young, Diaz, Somary, English Chamber Orch.)
- Mahler, Symphony No. 3 (Abbravel, Utah)
- Mozart, Divertimenti K287/138 (Blum, English Chamber Orch.)
- Tchaikovsky Symphony No. 4 (Stokowski, American Symphony)
- Tchaikovsky, Serenade Op. 48;
- Prokofiev, Classical Symphony;
- Arensky, Variations (Somary, English Chamber Orch.)
- The Virtuoso Trumpet of Martin Beringbaum (Somary, English Chamber Orch.)

Ampex Records
Popular
- Anita Kerr Singers Grow to Know Me
- Anita Kerr Singers with Royal Philharmonic, A Christmas Story
- Bob Hinkle, Ollie Moggus
- Melting Pot, Fire Burn and Cauldron Bubble
- Mason Profitt, Last Night I had the Strangest Dream
- Purdie, Original Cast
- Chris Williamson
- Rome Philharmonic, Classical Movie Themes
Stereo FM/AM tuner from Pioneer

The Pioneer TX-800 is designed with an eye to the problems caused by the cluttered urban FM signal maze. The unit uses an FET front end plus three integrated circuits and three ceramic filters in the IF stage for image rejection rated at more than 80 dB and spurious-signal rejection of more than 90 dB, according to U.S. Pioneer. There are separate output level controls for AM and FM sections, plus outputs for oscilloscope evaluation of multipath interference. The tuner is priced at $199.95, excluding applicable surcharges.

David Clark and the Red Baron

You even get a Maltese cross decal with the Clark/300 Red Baron stereo-headphone, new from David Clark Co. Inc. The set is listed for a frequency range of 20 to 17,000 Hz and a sensitivity of 105 dB per earpiece for a 1-milliwatt input at 1 kHz. Rated impedance is 8 ohms. A 10-foot coiled cord with molded plug is included in the $21 price.

Hitachi amplifier offers some extras

Hitachi's IA-1000, billed as "a sound studio," combines the functions of control amplifier and sound mixer. A front-panel mike input and twin VU meters allow mike-mixing with other signal sources. Other features include stepped tone controls and inputs for three phono cartridges (through two front-panel switch positions), tuner, and two aux as well as tape deck. There are outputs for headphone and two pairs of speakers. The amplifier (rated at 140 watts IHF) and preamp section can be operated separately. The IA-1000 lists at $319.95 in an aluminum-bronze housing accented by rosewood side panels.

Low-cost Realistic condenser mike

In announcing its omnidirectional Realistic electret condenser microphone, Radio Shack claims response from 30 to 15,000 Hz. The mike is said to operate for more than 10,000 hours on a single AA penlite cell and can be used with high- or low-impedance recorder or mixer inputs. The $24.95 price includes a desk stand, floor stand adapter, and removable windscreen.

Low-cost Mikado receiver

For the budget-minded, Mikado Electronics has produced the Model 1500, a stereo FM/AM receiver rated at 18 watts continuous output per channel with 8-ohm loads. The unit includes stereo indicator and FM tuning meter, tape monitor connections, and inputs for phono and aux. It is priced at $159.95 in a case with hand-oiled walnut finish.
Approved for 4-channel

Empire’s top of the line cartridges now feature new high performance parameters designed for 4-channel capability. With even greater frequency response and compliance than ever before, these cartridges will track at forces so low they barely touch your records.

999VE/X Professional—Recommended tracking force ¼ to 1¼ grams. List price $79.95.

1000ZE/X Measurement Standard—Tracks as low as .1 gram in laboratory playback arms. List price $99.95.

Each 1000ZE/X and 999VE/X cartridge is individually adjusted to have a flat frequency response within ± 1 dB from 20-20,000 Hz. Stereo separation is better than 35 dB at 1 Hz and remains 25 dB or better all the way out to 20,000 Hz. Overall frequency response is a phenomenal 4-40,000 Hz. There are no electrical or mechanical peaks and total 1M distortion at the standard 3.54 cm/sec groove velocity does not exceed .05% at any frequency within the full spectrum. Uses a .2 x .7 hand polished miniature diamond for exceptionally low mass.

Empire cartridges are enthusiastically acclaimed by the experts; for example:

Stereo Review Magazine who tested 13 different cartridges rated the 999VE tops in lightweight tracking ability.

Hi Fi Sound Magazine called the 999VE “a real hi-fi masterpiece . . . a remarkable cartridge unlikely to wear out discs any more rapidly than a feather held lightly against the spinning groove.”

High Fidelity Magazine said of the 1000ZE “the sound is superb. The performance data among the very best.”

Records and Recording Magazine stated emphatically that the 999VE stereo cartridge is “a design that encourages a hi fi purist to clap his hands with joy.”

FM Guide wrote “…using the 1000ZE. It works beautifully . . . giving great results.”

Audio Magazine observing a remarkable 35 dB stereo spread between left and right channels in the 999VE said “Outstanding square waves. Tops in separation.”

Popular Science Magazine picked the 999VE hands down as the cartridge for “the stereo system I wish I owned” designed by Electronic Editor Ronald M. Benrey.

X designates newest improved version.

For further details write: Empire Scientific Corp., 1055 Stewart Avenue, Garden City, N. Y. 11530.
It really comes alive...

It would be silly to ask if you dig real live sound. Of course you do. The same holds true for quality — for things that are really made, and really perform.

Our objective in developing the B-301 (Tempo 1) was to give you the best, most lifelike sound obtainable, in a well-engineered, well-constructed bookshelf system. The fact that performance fully met expectations, and that we could furnish full-fledged BOZAK construction quality for a modest price, were the real measures of its success.

The BOZAK B-301 is a three-way system based on a long-throw, high-compliance bass driver with a solid low-bass response. The high-compliance midrange unit with its well-damped aluminum cone was developed especially for this loudspeaker system: its clear definition, or transient response, is remarkable and we know of no other that can equal it. The latest version of the BOZAK high-frequency driver, originally introduced over twenty years ago, is highly regarded for its wide dispersion and silky-smooth response. All three drivers are of standard BOZAK quality — sturdily constructed, with generous magnet structures and unique BOZAK-made cones assembled on solid cast frames.

You will have to compare this speaker system to really appreciate it. And its price is very modest — especially for a real BOZAK!

the facts:
Bass Speaker: 12" high-compliance, long-throw/Midrange: 4½", with 2¾" damped aluminum cone on high-compliance suspension/Treble: 2", with foam-damped diaphragm and wide dispersion/Crossovers: 1200 and 3600 Hz/Frequency Response: 40-20,000 Hz/Impedance: 8 Ohms/Power Handling: 40 Watts/Program average/Acoustical-Environmental Switch: 3-position/Enclosure: oiled walnut, 14½" x 23½" x 11½" deep/Grille: snap-out/Weight: 40 pounds.

Bozak, Darien, Connecticut 06820
Overseas Export by Elpa Marketing Industries Inc., New Hyde Park, New York, 11040, USA
New Name in Recorders


Comment: This is the first time we've tested any equipment bearing the Akai name, though much of the Roberts line over the years has been made by Akai. The GX-220D therefore held few major surprises, but it did present a number of differences by comparison to most of the familiar Roberts models.

It is powered by a synchronous capstan motor delivering transport speeds of 7 ½, 3 ¾, and 1 ¼ ips (plus two reel motors). It will play tapes in either direction and record in the forward direction. The speed-change switch is on the top plate between the two reel platters, whose spindles are equipped with captive twist-to-lock hold-downs so that the deck can be used either horizontally or vertically.

When it is vertical, the four-digit index counter is at the top center. Below the reel platters are the head cover and main controls. Following the tape path from left to right the main elements are the left tension idler, which doubles as the main direction-change sensor; the erase, record, and playback heads; a secondary direction-change sensor; the capstan and pinch roller; the left tension arm; two lever controls, one for play/record, the other for fast forward or rewind; and a pause control consisting of a locking slider and a release button. Below the pinch roller is the record-interlock safety button; between the lever controls is a switch that converts the unit's automatic-stop system (activated by loss of tension when the tape runs out, breaks, or jams) into an automatic-shutoff system.

Below the head cover are three pushbuttons that control mode: mono on tracks 1 and 4, stereo, and mono on tracks 3 and 2. To their right, over the VU meters, are buttons that select the direction of play and allow manual reversing of the tape, and between them is the recording pilot light. Farther to the right is the equalization switch. It must be set manually to correspond with the speed-selector setting. At the far right is the power on/off button.

At the center of the bottom panel are the VU meters. To their left are the left-channel recording level control, the monitor (source/tape) switch, and the headphone jack. To their right are the right-channel recording level control, bias switch (marked S.R.T., for Akai's own Super Range Tape, a low-noise formulation marketed in Japan), a sound-on-sound switch button, and inputs for left and right microphones. Inserting plugs into these jacks automatically disconnects the line inputs.

On the back of the unit are phono connections for line inputs and outputs plus a DIN-style input/output socket and level switch (high/low) for use with the DIN connector. Also on the back panel are a fuseholder; a voltage-conversion plug capable of handling line current of 100, 110, 200, 220, or 240 volts; and one of the two adjustments for converting between 60-Hz and 50-Hz line current. (The other is on the top plate near the speed switch.)

At first encounter the threading system of the GX-220D seems somewhat more complex than it need be. With a little practice we got the hang of it, though it is not among the simplest or fastest handling of designs. Fortunately, the automatic-reverse system...
minimizes the amount of threading you must do. If you’re threading the unit for the first time, you will notice certain buzzing or clicking noises. The sounds are caused by removing tension from the right tension arm, which then triggers an automatic system to activate the pause control. It is this automatic system that makes the noises.

At first we were unsure why Akai had built such a system into the unit, but a little work with the automatic shutoff explained all. When the latter is tripped at the end of a tape, the pinch roller is released and the power turned off—but not the power switch or the play lever.

Without the automatic pause, future rethreading would turn the power back on and reactivate the drive system before you were ready for it. Instead, you will find the drive in pause and must press the release button when you’re ready to play the tape. Only then will the power turn on again. (You also must check that the unit was not left set for recording, since it would still be in the record mode when the power returns). The pause control also is interlocked with the fast-wind lever; when either fast-wind mode is activated the pause automatically is released.

With the pause locked in place and the deck set for the playback mode, the playback head remains live and the tape in contact with it—permitting precise cueing of the tape and facilitating tape editing. The head cover slips off its mounting studs, making the heads visible and accessible (preferably with the deck in the horizontal position), further simplifying tape editing.

The record and playback heads are Akai’s new glass and crystal ferrite type, credited with several desirable properties: extremely long life, freedom from the usual

Akai GX-220D Tape Deck Additional Data

<table>
<thead>
<tr>
<th>Speed accuracy</th>
<th>7½ ips</th>
<th>105 VAC: 0.97% slow</th>
<th>120 VAC: 0.97% slow</th>
<th>127 VAC: 0.97% slow</th>
</tr>
</thead>
<tbody>
<tr>
<td>3½ ips</td>
<td>105 VAC: 1.1% slow</td>
<td>120 VAC: 1.1% slow</td>
<td>127 VAC: 1.1% slow</td>
<td></td>
</tr>
<tr>
<td>1½ ips</td>
<td>105 VAC: 0.8% slow</td>
<td>120 VAC: 0.8% slow</td>
<td>127 VAC: 0.8% slow</td>
<td></td>
</tr>
<tr>
<td>Wow and flutter</td>
<td>7½ ips</td>
<td>playback: 0.08%</td>
<td>record/playback: 0.10%</td>
<td></td>
</tr>
<tr>
<td></td>
<td>3½ ips</td>
<td>playback: 0.09%</td>
<td>record/playback: 0.12%</td>
<td></td>
</tr>
<tr>
<td></td>
<td>1½ ips</td>
<td>record/playback: 0.18%</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Rewind time, 7-in. 1,800-ft reel</td>
<td>1 min. 33 sec.</td>
<td></td>
<td></td>
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</tr>
<tr>
<td>Fast-forward time, same reel</td>
<td>1 min. 30 sec.</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>S/N ratio (ref. 0 VU)</td>
<td>playback L ch: 50 dB</td>
<td>R ch: 49 dB</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>record/playback L ch: 48 dB</td>
<td>R ch: 47 dB</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Erasure (400 Hz at normal level)</td>
<td>56.5 dB</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Crosstalk (at 400 Hz)</td>
<td>record left, playback right</td>
<td>48 dB</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>record right, playback left</td>
<td>49 dB</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Sensitivity (for 0-VU recording level)</td>
<td>line input L ch: 50 mV</td>
<td>R ch: 57 mV</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>mike input L ch: 0.25 mV</td>
<td>R ch: 0.28 mV</td>
<td></td>
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<tr>
<td></td>
<td>DIN high input L ch: 50 mV</td>
<td>R ch: 57 mV</td>
<td></td>
<td></td>
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<tr>
<td></td>
<td>DIN low input L ch: 7.8 mV</td>
<td>R ch: 9.0 mV</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Accuracy, built-in meters</td>
<td>L ch: 1 dB low</td>
<td>R ch: 0.5 dB low</td>
<td></td>
<td></td>
</tr>
<tr>
<td>IM distortion (record/play, -10 VU)</td>
<td>7½ ips</td>
<td>L ch: 2.0%</td>
<td>R ch: 1.7%</td>
<td></td>
</tr>
<tr>
<td></td>
<td>3½ ips</td>
<td>L ch: 3.0%</td>
<td>R ch: 2.5%</td>
<td></td>
</tr>
<tr>
<td></td>
<td>1½ ips</td>
<td>L ch: 4.0%</td>
<td>R ch: 4.0%</td>
<td></td>
</tr>
<tr>
<td>Maximum output (preamp or line, 0 VU)</td>
<td>L ch: 1.05 V</td>
<td>R ch: 1.15 V</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
tendency to collect dust and oxide particles, and a "focused" gap field that achieves much the same end as Akai's older Crossfield design in resolving short-wavelength (high-frequency) signals. Lab frequency tests discussed below will tell the story on the last claim. On the basis of visual evidence and dropout tests with a continuous-tone signal, the heads do seem to stay unusually clean.

The erase and record heads are fixed; the playback head is mounted in a heavy shield (to minimize hum), which is raised or lowered when the direction of play is changed. Since the upper gap contacts Track 1 (the left channel) in the forward direction of tape travel and Track 2 (the right channel) in the reverse direction, while the lower gap similarly moves from right to left channels, the leads must be switched at the same time or the channels would be reversed during reverse direction playback.

If the automatic-reverse system is to trip when the tape is moving in the forward direction, you must place a short length of conductive foil on the back (base side) of the tape at the appropriate spot. The foil then shorts out the two halves of the left tension arm and activates the reversing cycle. For continuous back-and-forth reversing you can also add foil to the front (oxide side) of the tape, but at the head end of the tape. When this foil reaches the sensor next to the playback head, tape direction will change once again—this time from reverse back to forward. The entire reversing cycle takes about five seconds at any transport speed.

Now to the lab data. The record-playback readings at 7½ ips are indeed very good, being down no more than 3 dB at any frequency within the audible range. At 3½ they also are comparatively good, though the curves begin to slope off at around 10 kHz, the 3-dB points in the left and right channels are out at 15 kHz and 13 kHz respectively. At 1½ ips the curves show predictiable deterioration. Still it's a useful speed to have if you tape speech, old records or broadcast transcriptions, or other material containing a limited frequency range. For that purpose the Akai's response is entirely adequate and typical of the better open-reel decks equipped for use at the slow speed—which many aren't.

Tape speed is unaffected by changes in line voltage—a feature one would expect with a hysteresis capstan motor. Motion stability figures (wow and flutter) are very good, staying below 0.2 per cent even in the record/playback measurement at 1½ ips.

At close to 50 dB, the signal-to-noise ratios measured are appropriate for a recorder in the Akai's price class. Distortion figures are good—particularly those for harmonic distortion, which show very little tendency to rise at the frequency extremes.

These tests all were made with Scotch 203 (Dynamag) tape—the closest readily available equivalent to Akai's S.R.T., according to the company. The S.R.T. button was kept in the "on" position of course. This combination of recorder and tape achieves performance that, in terms of frequency response and motion stability, will stand comparison to more expensive recorders, even some that are without the automatic-reverse feature of the GX-220D. While its controls and features are somewhat more complex than average, they are not difficult to master. The sum total is a deck of better-than-average value in terms of flexibility and performance.

CIRCLE 143 ON READER-SERVICE CARD

A Middle-Priced Receiver Kit from Heath


Comment: The AR-19 is not Heath's least expensive receiver kit, but it is the least expensive among the models that have appeared in the "new" line—that is, since the AR-15 appeared about three years ago. Not surprisingly it outclasses previous kits in the middle price bracket and even, in some respects, typical wired receivers selling for about $100 more.

The AR-19 is well planned and well engineered, and the experienced kit builder who assembled the AR-19 for us reported that it should not prove overly tedious even for the novice builder. There's a minimum of chassis wiring, which eliminates the cramped wiring conditions you usually encounter in a receiver; the use of eight printed-circuit boards keeps the wiring even in these areas fairly simple and straightforward. Servicing and checkout procedures are simplified by this approach.

For the neophyte the kit includes Heath's kit-builder's guide book, which covers various aspects of construction in general: soldering techniques, the type of solder and soldering iron to use, the identification of components and component values, the mounting of components to printed-circuit boards, and so forth. It's well worth the few minutes it takes to read. Each circuit
Heath AR-19 Receiver Additional Data

Tuner Section

<table>
<thead>
<tr>
<th>Parameter</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Capture ratio</td>
<td>2.0 dB</td>
</tr>
<tr>
<td>S/N ratio</td>
<td>68.5 dB</td>
</tr>
<tr>
<td>IM distortion</td>
<td>0.3%</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Frequency (Hz)</th>
<th>Mono THD</th>
<th>L ch THD</th>
<th>R ch THD</th>
</tr>
</thead>
<tbody>
<tr>
<td>80 Hz</td>
<td>0.52%</td>
<td>0.72%</td>
<td>0.54%</td>
</tr>
<tr>
<td>1 kHz</td>
<td>0.16%</td>
<td>0.81%</td>
<td>1.0%</td>
</tr>
<tr>
<td>10 kHz</td>
<td>0.20%</td>
<td>2.8%</td>
<td>3.4%</td>
</tr>
<tr>
<td>19-kHz pilot</td>
<td></td>
<td>-65 dB</td>
<td></td>
</tr>
<tr>
<td>38-kHz subcarrier</td>
<td></td>
<td>-65.5 dB</td>
<td></td>
</tr>
</tbody>
</table>

Amplifier Section

<table>
<thead>
<tr>
<th>Parameter</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Damping factor</td>
<td>46</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Source</th>
<th>Sensitivity</th>
<th>S/N ratio</th>
</tr>
</thead>
<tbody>
<tr>
<td>phono</td>
<td>8.4 mV</td>
<td>65 dB</td>
</tr>
<tr>
<td>tape</td>
<td>188 mV</td>
<td>78 dB</td>
</tr>
<tr>
<td>aux</td>
<td>188 mV</td>
<td>78 dB</td>
</tr>
</tbody>
</table>
board should be inspected before you begin work on that particular section of the receiver. Also, be sure to check all parts against the parts list.

We found that our control preamplifier circuit board was faulty. The etching was not complete in some areas of the board. By looking at the X-ray diagram in the back of the construction manual it was a simple task to cut away the unwanted portions of foil with a knife. A missing part in this section was easily obtained—by a note to Heath. Such occurrences as these are rare in our experience with this manufacturer.

Installation of the subassemblies on the metal chassis was found to be very convenient. The three main wire harnesses that interconnect the subassemblies keep working areas neat and spacious; only the wiring and installation of switches on the front of the chassis gets a little more difficult, due primarily to the small size of the switches and the number of wires which must be connected to them. All that is needed for a perfect job is care and patience. You may encounter similar difficulty in stringing the dial cord, due to the closeness of the parts and the need to get proper tension on the cord.

Any problems in wiring should show up in the initial checkout once construction is completed. By using the signal-strength meter in the unit itself it is possible to make circuit checks on all the boards before they are installed in the chassis. These tests make it reasonably certain that no damage will result when the unit is turned on. Voltage checks (still using the AR-19's own meter) are performed as each circuit board is plugged into the main chassis. Any deviation from the voltage chart indicates a problem, and a second chart will give you an idea where the problem may lie. Our kit builder did not, however, detect through this technique a wiring mistake he made. Only when he returned the kit to Heath because of a malfunction was the error spotted, along with an off-value resistor.

The AR-19 took approximately twenty-four hours to build. This figure will vary depending on the individual builder’s skills. The adjusting and initial testing took an additional two and a half hours.

Now let’s have a look at the finished unit. The blackout dial has two tuning meters: center-of-channel for FM and signal-strength for both AM and FM. There also is a stereo indicator that lights up when the FM section is tuned to a multiplex broadcast. (We found this indicator to be somewhat oversensitive, responding to interstation noise as well as to a subcarrier. When the AR-19 is tuned to an acceptable signal, however, the indicator lights only for legitimate stereo.)

Just below the dial panel are four sliders: bass, treble, balance, and volume. And below them are two ranks of pushbuttons. The left group controls input selection and mode: phono, tape, AM, FM, aux, tape monitor, and mono/stereo. Note that “tape” and “tape monitor” represent separate inputs, allowing dubbing from one deck to another with simultaneous output monitoring if the unit used for recording has a monitor head. The second group of buttons control tone (defeating tone-control setting for “flat” response), loudness/volume, FM interstation muting, high-bend (to reduce noise in receiving weak stereo stations), speaker pair 1, speaker pair 2, and AC power. At the lower right of the front panel is the headphone jack, which is live at all times. There is no high or low filter.

At the back of the unit, in a niche at one end are the usual connection pairs: tape-recording output, tape-monitor input, tape input, aux input, phone input. Above them are screw terminals for AM long-wire antenna, 300-ohm FM antenna, 75-ohm coaxial FM antenna, and ground. To one side of the antenna terminals is Heath’s extendible built-in AM antenna, which can be oriented in a variety of ways (even at right angles to the back panel of the receiver) for best reception. When it’s not in use it folds down against the back of the unit.

To the left of the antenna are the speaker connections: screw terminals for two stereo pairs of speakers. A switch next to the remote-speaker terminals converts them for center-channel use by combining signals from both channels and feeding them to one of the two remote “hot” terminals. This novel and eminently practical arrangement gives the user the option of either left and right speakers plus a center-fill speaker in a single room, or a stereo pair of speakers in each of two rooms. Beyond the speaker terminals are a pair of convenience outlets (one switched, one unswitched) and the fuse holder.

The amplifier section, while no powerhouse, performed beautifully in lab tests. Both harmonic and intermodulation distortion readings are under 0.1% over most of the operating range, with typical readings running half that figure or better. Both power and distortion figures easily exceed specifications except in using 4-ohm speakers, where Heath’s IM rating is reached a little shy of a full 20 watts per channel. Heath’s ratings in general proved to be on the conservative side.

The tuner section reaches 30 dB of quieting (and therefore its IHF sensitivity rating) at 1.9 microvolts for all test frequencies—an excellent mark, and one seldom achieved across the whole dial—and distortion readings remain good even in stereo reception. As signal strength increases the quieting curve descends fairly gradually, reaching a plateau of quieting at -44 dB for an input of about 50 microvolts. This quieting prevails for most signals out to the limit of testing except for an improvement to a best-case reading of -47 dB for inputs in the neighborhood of 1,000 microvolts.

The gradual slope of the quieting curve doubtless contributed to the disappointing results we encountered in our FM-cable test: Of forty-six stations received, about twenty-five were judged good enough for long-term listening and recording. It should be pointed out that in typical suburban locations the signal strengths encountered are likely to be close to the 1,000-microvolt figure at which the tuner section displayed its best performance.

AM reception is unusually clear. Heath—no doubt as a result of long experience in catering to the needs of short-wave listeners, among others—appears to have taken more than average pains with this portion of the design.

All told, the AR-19 combines a low-distortion amplifier section, a well-thought-out though not overly elaborate control section, a fair FM section, and an excellent AM section. The importance of the built-in trouble-shooting system should not be minimized by any builder who is not already equipped with his own test-instrument setup. It can save both time and money when troubles occur after the receiver is in service. We did have more trouble with our sample than we have come to expect from Heath products, but since it had to be shipped back and forth several times to Heath and CBS Labs before testing was complete, our experience should not be taken as typical. And Heath, as always, was prompt and co-operative in helping to rectify the difficulties.

CIRCLE 142 ON READER-SERVICE CARD
Citation Speaker
Offers Omni Sound, Wide Response


Comment: The newest audio component in H-K's premium Citation line is the Model Thirteen speaker system, which takes its place alongside other recent Citation equipment (the Model Eleven preamp reviewed here in March 1971 and Model Twelve power amp reviewed in September 1970) as superior audio gear of interest to stereo perfectionists. The new reproducer offers wide-range, balanced, smooth, unciled response plus the virtue of multidirectional sound spread. A floor-standing model, it presents a neat appearance in a walnut enclosure that is topped by a sloping grille from which its six speakers radiate in an "up and over" pattern.

The bass range is handled by three 7-inch low-frequency drivers loaded by a twin-chambered enclosure that terminates in a pair of mesh-covered openings at the rear. In manufacture, the two chambers are tuned an octave apart so that adequate loading is maintained in both the mid-bass and deep-bass regions. The signal is crossed over via an internal network to a midrange dome speaker. Nominal frequency dividing is 2,500 Hz, and the crossover rate is 6 dB per octave. The midrange unit rolls off at about 9,000 Hz while a pair of dome tweeters are crossed over at about 7,500 Hz. The transi-
dome speaker. Nominal frequency dividing is 2,500 Hz, an octave apart so that adequate loading is maintained
the rear. In manufacture, the two chambers are tuned
that terminates in a pair of mesh-covered openings at
quency drivers loaded by a twin-chambered enclosure
over" pattern.
behind which its six speakers radiate in an "up and

A floor-standing model, it presents a neat appearance in a walnut enclosure that is topped by a sloping grille from behind which its six speakers radiate in an "up and over" pattern.

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mplished with some deliberate overlap in the interest of smooth response. The network includes shunting choke coils to protect the midrange and tweeter elements from damage due to excessive power surges at very low frequencies; additional protection for the Thirteen is pro-
vided by a fuse accessible on the rear panel, a speaker-

system feature we have advocated for years. Also on
the rear are the input terminals (color-coded binding
posts that may be used with banana plugs or ordinary
stripped leads), and a pair of continuously variable con-
trols for adjusting relative output levels of middles and
highs. These are designed as attenuators: in their max-
imum or fully clockwise position they permit the speaker
system to respond "as is," while rotating them from
maximum introduces roll-off. The Thirteen, as a con-
sequence of its design, has a rated impedance of 6
ohms, which in lab tests proved to be just about on the
noise. Actual measured impedance above the charac-
teristic bass peak was 6.3 ohms. There is another rise
above 16 ohms at 1,000 Hz; then impedance slopes
off to about 4 ohms at 4,500 Hz, continuing near 4 ohms
to beyond 20,000 Hz. The only important thing to re-
member in this context is that a pair of Thirteens (or one
Thirteen and a 4-ohm-impedance system) connected
to the same output terminals of an amplifier or receiver
will present a net load of under 4 ohms, which for some
solid-state sets may be a little too low. Check your
owner's manual on this point.

The Thirteen's response is extremely wide and smooth,
clocked as within plus or minus 5.25 dB from 40 to
20,000 Hz. This was measured with the rear controls set
to their indicated "flat" positions. Decreasing the setting
of the midrange control to its minimum position attenu-
ates the midrange response steeply from about 1,250
Hz, reaching maximum attenuation of 16 dB at 1,850 Hz,
but then offering normal response again at 2,600 Hz.
Decreasing the setting of the high-frequency control
has an effect over more of the total response range; with
that control at its minimum setting, attenuation starts at
800 Hz and varies from about 3 to 10 dB over most of the
range up to 10 kHz, from which frequency there is little
effect out to 20,000 Hz. In listening tests we tended to
agree with the manufacturer's recommendation about
leaving both controls at their indicated "flat" settings (no attenuation) at least when using the Thirteens in a
fairly large room. In a smaller room we found it more

![Graph](image-url)

Citation Thirteen

<table>
<thead>
<tr>
<th>Output Level (dB)</th>
<th>80 Hz (%)</th>
<th>300 Hz (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>70</td>
<td>0.5</td>
<td>0.18</td>
</tr>
<tr>
<td>75</td>
<td>0.75</td>
<td>0.35</td>
</tr>
<tr>
<td>80</td>
<td>1.5</td>
<td>0.67</td>
</tr>
<tr>
<td>85</td>
<td>2.5</td>
<td>1.11</td>
</tr>
<tr>
<td>90</td>
<td>4.2</td>
<td>1.83</td>
</tr>
<tr>
<td>95</td>
<td>7.2</td>
<td>2.62</td>
</tr>
<tr>
<td>100</td>
<td>8.5</td>
<td>2.12</td>
</tr>
<tr>
<td>105</td>
<td>10.5</td>
<td>2.5</td>
</tr>
</tbody>
</table>

*Distortion data is taken on all tested speakers until distortion exceeds 10 per cent level, or the speaker produces the spurious output known as buzzing, whichever occurs first.
agreeable to back off the highs control just a trifle. Our listening tests also confirmed the measurements for the wide-range response of the Thirteen as well as its claims for omnidirectional sound spread. The low end doubled in the region between 36 and 45 Hz, but smoothed out below 35 Hz, rolling off gradually with fundamental bass evident to about 25 Hz. Above 45 Hz we detected no roughness or audible peaks and dips for the entire audible range. Dispersion was excellent, with no signs of directivity to well beyond 10,000 Hz. Indeed, it was not audible range. Dispersion was excellent, with no signs of directivity to well beyond 10,000 Hz. Indeed, it was not until about 16,000 Hz that our listeners reported becoming aware of any "beaming" and it was at this frequency that they also reported a slope toward inaudibility. White noise response sounded smooth, very widely dispersed, and had minimal coloration effects.

Of moderate efficiency, the Thirteen needed 11 watts of input power to produce an output of 94 dB. It could not be driven into significant distortion with steady-state power input of 100 watts and it did just as well with pulse power peaks of up to 600 watts, at which level the measured output was 112.8 dB. This data indicates excellent dynamic range as well as the Thirteen's usability with any good amplifier on the market.

Handling musical material, the Thirteen provides a sense of effortless, transparent reproduction. A pair furnishes an excellent stereo image that remains firm and perceptible from all about the listening room. We feel that the Thirteen—which has been designed in the "Citation tradition" of natural, uncolored, honest sound reproduction—ample fills its design aims. The best speaker system Harman-Kardon has yet produced, it merits serious audition by the stereo system owner seeking the best.

CIRCLE 144 ON READER-SERVICE CARD

Attractive Low-cost Amplifier From Lafayette


Comment: The LA-125B may be considered as a companion piece to the LT-725A tuner reviewed in our January issue. Like the tuner, this amplifier is compact, attractive and unassuming in styling, and basically a good performer.

Across the top of the front panel are six rotary controls. At the left is a rather unusual monitor / mode switch with positions for left mono, right mono, combined mono (L + R), stereo, and three tape-monitor modes: stereo, left, and right. Next is the main selector with positions for aux, tuner, phono, and mike. The mike position also is marked with a musical symbol to suggest the use of these inputs with electric guitars or similar instruments. The center pair of knobs control bass and treble respectively, using a clutch design allowing individual regulation of the two channels. Next is a volume control that, having two independent knob sections, doubles as a balance control. Some users might have preferred a clutch in the volume control as well; careless adjustment tends to alter the volume in one channel more than in the other. Finally there is the speaker switch: main, main-plus-remote, remote, and headphones only.

Along the bottom of the front panel are an output jack for tape recording (paralleling the back-panel connections), separate left and right mike (or instrument) input jacks, pushbutton switches for low filter, high filter, and "A" and "B" loudness selectors. The A loudness action is closest to theoretical loudness compensation since at low volume levels it boosts both a broad area of the bass response and a narrower band in the extreme highs; the B compensation affects the bass only. Beyond these switches are the headphone jack (live at all times), pilot light, and on/off power switch.

On the back panel are three fuse holders (one for the main power supply and one for each amplifier channel) and two convenience outlets (one switched, one unswitched). In the center are the screw terminals for the four pairs of speakers, then the input and output connections to a tape deck followed by those for the other inputs: aux, ceramic phono, magnetic phono, low-level tuner, and high-level tuner. The tuner inputs are paralleled internally through appropriate "pad" resistors. The two phono inputs cannot be used simultaneously; insertion of plugs into the magnetic-phono jacks automatically disconnects the ceramic-phono inputs. To the right of the jack panel is the phono sensitivity switch.

Obviously the LA-125B offers more switching and input/output options than one would expect in a low cost unit. Lab tests confirmed that it does well for an amplifier in this class though it is not nearly as powerful as Lafayette's 160-watt music power rating might at first lead you to believe. The 32-watt-per-channel continuous-power rating is more like it; but even at this power level harmonic distortion, while good over most of the frequency range, exceeds the unit's 1% rating at the extreme frequencies. At slightly lower power levels, however, distortion improves; and it remains good even at extremely low output levels.

The noise figures in the lab report show the amplifier to perform well: The S/N ratios for the high-level inputs all are 80 dB or better—a range that one might associate with much more expensive equipment. The worst-case noise reading was measured using the ceramic phono input with the sensitivity switch in the
First test reports on the Zero 100
by the industry's leading reviewers

Brief excerpts reprinted below. Let us send you the full reports.

**HIGH FIDELITY** Sept. 1971
Altogether, this new arm strikes us as an excellent piece of engineering; it probably is the best arm yet offered as an integral part of an automatic player. Operation is simple, quiet, and reliable. All told, we feel that Garrard has come up with a real winner in the Zero 100. Even without the tangent-tracking feature of the arm, this would be an excellent machine at a competitive price. With the novel (and effective) arm, the Zero 100 becomes a very desirable "superchanger" with, of course, manual options.

**AUDIO** July. 1971
The Zero-100 performed just about as we expected after reading the specifications. Wow measured 0.08 per cent—that is in the band from 0.5 to 6 Hz. Flutter, in the band from 6 to 250 Hz, measured 0.03 per cent, both of which are excellent. Thus, the Garrard Zero 100 is certainly the finest in a long line of automatic turntables which have been around for over 50 years. We think you will like it.

**The GRAMOPHONE** August, 1971
Reproduction quality was excellent with no detectable wow, flutter or rumble under stringent listening conditions. End of side distortion, which is always a possibility with pivoted arms, was virtually absent, due no doubt to the tangential tracking arm.

**HI-FI** Fall, 1971
One could go on cataloguing the virtues of the Zero 100 indefinitely.

**Popular Electronics** August, 1971
Our lab measurements essentially confirmed the claims made by Garrard for the Zero 100. We used a special protractor with an angular resolution of about 0.5°, and the observed tracking error was always less than this detectable amount. The tracking force calibration was accurate, within 0.1 gram over its full range. The Garrard Zero 100 operated smoothly and without any mechanical "bugs."

**Stereo Review** July. 1971
Indeed, everything worked smoothly, quietly, and just as it was meant to. If there were any "bugs" in the Zero 100, we didn't find them. Garrard's Zero 100, in basic performance, easily ranks with the finest automatic turntables on the market. Its novel arm—which really works as claimed—and its other unique design features suggest that a great deal of development time, plus sheer imagination, went into its creation. In our view, the results were well worth the effort.

**RECORDING STATEN** Sept. 16, 1971
This unit has every imaginable gadget and gewgaw one might possibly desire, and it works. And considering how much it does, and how well it does it, at 190 bucks it doesn't even seem expensive. The changer has so much in it that an analysis of its innards is almost a case study in record player design.

A genuine step upward in automatic turntables

**GARRARD ZERO 100**

The only automatic turntable with Zero Tracking Error

$189.50

less base and cartridge
**POWER OUTPUT DATA**

- **CHANNELS INDIVIDUALLY**
  - Left at clipping: 32.0 watts at 0.29% THD
  - Left for 1.0% THD: 35.7 watts
  - Right at clipping: 32.0 watts at 0.19% THD
  - Right for 1.0% THD: 35.7 watts

- **CHANNELS SIMULTANEOUSLY**
  - Left at clipping: 28.1 watts for 0.08% THD
  - Right at clipping: 28.1 watts for 0.06% THD

**POWER BANDWIDTH**

- For 1.0% THD; 0 dB = 32 watts
- 10 Hz to 40 kHz

**FREQUENCY RESPONSE**

- (1 watt output)
  - +0.25, -3.0 dB below 10 Hz to 43 kHz

---

**PREAMP & CONTROL CHARACTERISTICS**

- RIAA equalization: 3 -1 dB, 20 Hz to 20 kHz
- Bass boost
- Bass cut
- Treble boost
- Treble cut
- A contour
- B contour
- High filter
- Tone controls
- Filters
- Loudness compensation

---

**Lafayette LA-125B Amplifier Additional Data**

<table>
<thead>
<tr>
<th>Component</th>
<th>Sensitivity</th>
<th>S/N ratio</th>
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</thead>
<tbody>
<tr>
<td>Mag phono, high</td>
<td>2.2 mV</td>
<td>59 dB</td>
</tr>
<tr>
<td>Mag phono, low</td>
<td>6.6 mV</td>
<td>67 dB</td>
</tr>
<tr>
<td>Cer phono, high</td>
<td>85 mV</td>
<td>57 dB</td>
</tr>
<tr>
<td>Cer phono, low</td>
<td>255 mV</td>
<td>66 dB</td>
</tr>
<tr>
<td>Mike</td>
<td>6.5 mV</td>
<td>73 dB</td>
</tr>
<tr>
<td>Tuner, high</td>
<td>750 mV</td>
<td>81 dB</td>
</tr>
<tr>
<td>Tuner, low</td>
<td>125 mV</td>
<td>81 dB</td>
</tr>
<tr>
<td>Tape monitor</td>
<td>525 mV</td>
<td>85 dB</td>
</tr>
<tr>
<td>Aux</td>
<td>260 mV</td>
<td>80.5 dB</td>
</tr>
</tbody>
</table>

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**Crown IC-150: Correction, Please**

Readers of our test report (December 1971) on the Crown International IC-150 may have noted a discrepancy between the harmonic-distortion curves in the graph and the numerical readout immediately under them. The curve showed distortion, as measured in the lab, to lie in the neighborhood of 0.015% to 0.020% over most of the frequency range, with only the slightest rise at the extreme high end—in other words, superb performance. The numerical readout, however, gave maximum distortion as 0.27% in the left channel and 0.32% in the right channel, which is merely good. The decimal point is misplaced in these figures, which should have read 0.027% and 0.032% respectively.

One point that should be made explicit about the IC-150's IM and THD readings—is that they are not only extraordinary on their own terms, but that they require use of the lab's test equipment at the limits of its capabilities. When we're dealing in thousandths of a per cent of distortion, for example, even the room temperature or atmospheric moisture can make a difference in the precise numbers that the readings will produce. So while the numbers shown in the report are in fact those read during lab tests, they cannot be accepted with the absolutism that one would normally expect. Perhaps a fairer way of indicating actual performance might be “0.01% or better” IM distortion, for example, rather than simply “0.01%”—particularly since as performance approaches the residual noise and distortion of the test equipment itself, readings tend to be higher (poorer) than actual values. This is, however, largely quibbling. By any standards equipment in this class is superb—and extremely rare.
The latest all-in-ones boast more features than even separate components.

IT'S A TUNER . . . It's a preamp . . . It's a power amp . . . it's a super receiver! This latest achievement of continuing audio evolution not only offers better performance than its forebears but a combination of features and versatility that rival, or in some instances surpass, that of completely separate components. It's still true, of course, that for the ultimate in performance and reliability, the audio perfectionist will select separate tuner, preamp, and power amp. But we are now witnessing the emergence of super receivers, premium units that make serious attempts at meeting and surpassing the performance of separate components. Some of the 1972 models have even taken the innovative lead away from the separates in terms of functional versatility and application.

Remember the early Sixties? You were ready for the very best stereo system. Once you'd settled on a pair of speakers, a two-channel tape deck, and the top manual turntable with the latest stereo pickup, it was time to consider the electronics. Which power amp should I combine with what preamp, and is this the tuner I want? Or should I buy one of those new “three-in-ones” (only later to be called receivers). If there was any question on the last choice, it was quickly answered by a glance at the specifications. One of the premium receivers advertised a mere 22 watts per channel, and produced about eight times as much distortion as the best separate components, which could deliver up to 80 watts. The receiver was filled with tubes that would generate enough heat to warm your hi-fi nook in the winter—and enough to degrade the equipment's performance as time went by. The price: $400.

But you'd have paid twice that for the best tuner, preamplifier, and amplifier on the market—a combination that would deliver 80 watts of power, distortion levels of only 0.1%, and essentially flat frequency response from 20 to more than 20,000 Hz (then known as cycles per second).

If these specifications don't excite us today, it's because they now are typical of many $300 middle-of-the-road receivers. You can buy 250 watts and more per channel in separate amplifiers from such companies as Crown International, Marantz, McIntosh, and Phase Linear. But the real transformation has occurred in the stereo receiver, of which there are now more than three dozen models whose performance characteristics not only match or exceed the finest specs of the early Sixties, but (thanks to their functions and features) do things we never dreamed of at that time.

Dazzling though they may be, these new features—new types of tone controls and tuning systems, front-panel convenience jacks, quadraphonic switching and amplification, and the rest—aren't all that make the super receivers super, however. Some models that achieve the best performance specifications are also among the least elaborate in terms of features. And of course our concept of special features is changing all the time: Today's luxurious extra may be commonplace tomorrow—or it may have fallen by the wayside. For these reasons there is no single model that embodies all the attributes of the super receiver; and there probably never will be.

The receivers represented on the accompanying table are culled from among the top models on the market today, plus a few that are just appearing or are expected in the near future. We'll go over their features one by one to see what all the shouting is about.
Most are conventional stereo models (indicated as two-channel in the first column); a few are quadraphonic (four-channel). This poses certain problems of nomenclature in making a tabular comparison, but we'll try to sort them out as we go.

The FM tuner section uses some of the most sophisticated design techniques available in home audio today. Some improve the quality of reception itself; others contribute to the ease or precision with which the tuner may be made to do its job.

**Tuning meters.** Two are common—one for signal strength, the other to indicate center-of-channel. When a station is imperfectly tuned, the latter meter also shows in which direction the dial must be moved to effect an improvement.

**Station Indicator.** Some models use an indicator that lights up when the station is precisely tuned, duplicating that function of a center-of-channel meter. The QSI receiver shows only the tuned frequency on its digital readout. When tuning is imprecise a plus or a minus will light to indicate the needed correction.

**Oscilloscope.** For the listener who wants information about multipath interference in the incoming signal, as well as signal strength and channel centering, some sets include a "scope," which also can be used to display such information as audio channel separation.

**Digital readout.** Also making inroads is this computer-style numerical indication of the frequency to which the set is tuned, replacing the conventional dial. The concept originated with crystal-controlled channel switching, where a continuous dial made no sense in a tuner that could only be set for discrete frequencies. Digital readout can also be used with conventional condenser tuning, however, or with differential frequency-counter tuning, as in the QSI receiver.

**Scan Tuning.** Automation has come to the basic function of tuning, with a choice including continuous advance until the tuner encounters a sufficiently strong signal (or a stereo signal only), advance across the dial one channel at a time for selection of weak stations, and movement across the dial in one or both directions. This development is based on the use of solid-state varactors to replace the mechanically variable capacitor of conventional tuners, though a motor drive can also be used with a tuning capacitor to achieve similar results.

**Number of preset stations.** Varactors have also made possible preset, pushbutton tuning of individual stations, similar in function to the pushbuttons on car radios. Several manufacturers now offer this feature on some models.

Adding to the increasing versatility of the modern stereo receiver is the proliferation of inputs and switching options in the preamp section.

**Number of phono inputs.** Our listing includes only individually selectable inputs, though duplicate jacks are sometimes offered for the same switch position and are intended for two different types of pickups—magnetic and ceramic for example.

**High-level inputs.** Inputs (or input pairs, since basically we're discussing stereo sound) in this group would include tape, tape monitor, aux, and extra jacks—to mention the most common designations. In some quadraphonic equipment, and for some uses, a single selector position will handle two stereo inputs. For example, one stereo pair may be connected to the front-channel aux jacks, and another to those for the back channels. You would then use the front/back controls elsewhere in the unit to select between the two. Where such operation is possible we have counted the inputs as separate stereo pairs.

**Number of tape monitors.** Today's receivers show the results of the tape explosion. In addition to monitor switches there may be independent selector positions for tape playback. Receivers with monitor switches and connections for two or more tape decks make the process of transferring from one tape format to another a relatively simple and logical affair. In quadraphonic equipment the switching may specifically allow choice of front or back pairs independently.

**Front-panel tape connections.** Another big plus for the recordist, since such connections simplify hooking up equipment that is not normally part of the system. The jacks usually parallel those on the back panel. Often both input and output for an outboard tape recorder or deck are provided, but some models listed may have output only or input only.

**Number of front-panel mike inputs.** Monaural operation is indicated by a single input; two means stereo.

**Other front-panel inputs.** Joining the other front-panel features on some models are auxiliary inputs. These can, of course, be used for any high-level source including an extra tape playback unit.

**Mike mixing.** Another innovation in the latest models is this provision for mixing live input with signals from at least one other program source.

**Built-in reverb.** The control is used to increase the sense of space in the sound. It also may be used to simulate "ambience" effects in imitation of quadraphonic sound.

**Built-in rhythm synthesizer.** One model now offers this electronic unit, which creates rhythm patterns as accompaniment to live music.

Features formerly found only in professional equipment are making possible extremely flexible control over equalization and signal "contouring." A variety of methods are used.

**Number of tone-control frequency bands.** Bass and treble are the familiar pair. But making a comeback is the midrange or "presence" control. Other models divide the frequency spectrum into as many as five
## THE SUPER RECEIVERS

| MANUFACTURER AND MODEL               | No. of Channels | No. of Meters | Center-Tune Indicator | Oscilloscope | Digital Readout | Scan Tuning | No. of Preset Stations | No. of Phono Inputs | No. of Stereo High-Level Inputs | No. of Tape Monitor Positions | Front-Panel Tape Connections | No. of Front-Panel Mute Connections | Other Front-Panel Inputs | Front Inputs | Rear Inputs | mike inputs | Built-In Reverberation |
|--------------------------------------|-----------------|---------------|-----------------------|--------------|-----------------|-------------|------------------------|---------------------|--------------------------|-------------------------------|-------------------------------|-------------------------------|-------------------------------|--------------|-------------|-------------|-------------|----------------------|
| AR Receiver                          | 2               | 1             | 0                     | 1            | 2              | 1           | 0                      | (B)                  | (B)                       |                               |                               |                               |                               | (B)          | (B)         | (B)         | (B)         | (B)                  |
| Altec Lansing 714A                   | 2               | 2             | 0                     | 2            | 2              | 1           | 0                      | (B)                  | (B)                       |                               |                               |                               |                               | (B)          | (B)         | (B)         | (B)         | (B)                  |
| Benjamin R 4x40                       | 4               | 2             | ●                     | 0            | 1              | 5*          | 1                      | 0                    | (B)                       |                               |                               |                               |                               | (B)          | (B)         | (B)         | (B)         | (B)                  |
| British Industries BIC/Lux 71/2R      | 2               | 1             | ●                     | 3            | 2              | 3           | 1                      | ●                   | (B)                       |                               |                               |                               |                               | (B)          | (B)         | (B)         | (B)         | (B)                  |
| Fisher 500-TX                         | 2               | 1             | ●                     | 4            | 1              | 3           | 2                      | 0                    |                           |                               |                               |                               |                               | (B)          | (B)         | (B)         | (B)         | (B)                  |
| Fisher 701                            | 4               | 1             | ●                     | 0            | 1              | 6*          | 2*                     | 0                    |                           |                               |                               |                               |                               | (B)          | (B)         | (B)         | (B)         | (B)                  |
| Harman-Kardon 930                     | 2               | 2             | 0                     | 2            | 4              | 2           | 0                      | (B)                  | (B)                       |                               |                               |                               |                               | (B)          | (B)         | (B)         | (B)         | (B)                  |
| Heath AR-1500 (kit)                   | 2               | 2             | 0                     | 1            | 3              | 1           | 0                      | (B)                  | (B)                       |                               |                               |                               |                               | (B)          | (B)         | (B)         | (B)         | (B)                  |
| JVC 5444                              | 4               | 1             | ●                     | 0            | 2              | 8*          | 2*                     | ●                   | (B)                       |                               |                               |                               |                               | (B)          | (B)         | (B)         | (B)         | (B)                  |
| JVC 5550                              | 2               | 2             | 0                     | 1            | 2              | 2           | 2                      | (B)                  |                           |                               |                               |                               |                               | (B)          | (B)         | (B)         | (B)         | (B)                  |
| Kenwood KR-6170                       | 2               | 1             | ●                     | 0            | 2              | 5           | 2                      | ●                   | (2)                       |                               |                               |                               |                               | (2)          | (2)         | (2)         | (2)         | (2)                  |
| Kenwood KR-7070A                      | 2               | 1             | ●                     | 0            | 2              | 3           | 2                      | ●                   | (2)                       |                               |                               |                               |                               | (B)          | (B)         | (B)         | (B)         | (B)                  |
| Marantz 19                            | 2               | 0             | ●                     | 0            | 2              | 4           | 1                      | ●                   | (B)                       |                               |                               |                               |                               | (B)          | (B)         | (B)         | (B)         | (B)                  |
| Marantz 2270                          | 2               | 2             | 0                     | 2            | 4              | 2           | 0                      | (B)                  | (B)                       |                               |                               |                               |                               | (B)          | (B)         | (B)         | (B)         | (B)                  |
| McIntosh MAC 1900                     | Information Not Available from Manufacturer | | | | | | | | | | | | | | |
| Nikko STA 1101                        | 2               | 1             | 0                     | 1            | 2              | 1           | 2                      | (B)                  | (B)                       |                               |                               |                               |                               | (B)          | (B)         | (B)         | (B)         | (B)                  |
| Panasonic SA-6500                     | 2               | 2             | 0                     | 2            | 2              | 1           | 0                      | (B)                  |                           |                               |                               |                               |                               | (B)          | (B)         | (B)         | (B)         | (B)                  |
| Pioneer SX-2500                       | 2               | 2             | ●                     | 0            | 2              | 4           | 2                      | (B)                  |                           |                               |                               |                               |                               | (B)          | (B)         | (B)         | (B)         | (B)                  |
| Quadracast QSI 4100                   | 4               | 0             | ●                     | (7)          | 2              | 3           | 1                      | (7)                  | (7)                       |                               |                               |                               |                               | (7)          | (7)         | (7)         | (7)         | (7)                  |
| Sansui Eight                          | 2               | 2             | 0                     | 2            | 3              | 2           | ●                      | (B)                  |                           |                               |                               |                               |                               | (B)          | (B)         | (B)         | (B)         | (B)                  |
| Sansui QR-6500                        | 4               | 2             | 0                     | 2            | 7              | 3*          | ●                      | (B)                  |                           |                               |                               |                               |                               | (B)          | (B)         | (B)         | (B)         | (B)                  |
| SAE Mark V                           | 2               | 0             | ●                     | 0            | 2              | 3(7)        | 1           | 0                      | (B)                  |                           |                               |                               |                               | (B)          | (B)         | (B)         | (B)         | (B)                  |
| Scott 444                             | 4               | 2             | 0                     | 2            | 4              | 1           | 0                      | (B)                  |                           |                               |                               |                               |                               | (B)          | (B)         | (B)         | (B)         | (B)                  |
| Scott 477                             | 2               | 2             | 0                     | 2            | 2              | 1           | ●                      | (B)                  |                           |                               |                               |                               |                               | (B)          | (B)         | (B)         | (B)         | (B)                  |
| Sherwood SEL-200                      | 2               | 2             | 0                     | 1            | 2              | 1           | ●                      | (B)                  |                           |                               |                               |                               |                               | (B)          | (B)         | (B)         | (B)         | (B)                  |
| Sony STR-6200F                       | 2               | 2             | 0                     | 2            | 4              | 1           | 0                      | (B)                  |                           |                               |                               |                               |                               | (B)          | (B)         | (B)         | (B)         | (B)                  |
| Standard Radio SR-4500                | 2               | 2             | 0                     | 2            | 3              | 1           | ●                      | (5)                  |                           |                               |                               |                               |                               | (5)          | (5)         | (5)         | (5)         | (5)                  |

(1) Undecided by manufacturer at press time.

* Number shown represents maximum practical for stereo signals with front and back connections used as separate stereo pairs. See text.

(B) With some stereo speaker hookups, back-channel level controls can be used for this purpose.
Extra features to be found in some of today's top models

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<tr>
<th>Built-in Rhythm Synthesizer</th>
<th>No. of Tone Control Frequency Bands</th>
<th>Stepped Tone Controls</th>
<th>Variable-Turnover Controls</th>
<th>Special Equalization Controls</th>
<th>TONE AND EQUALIZATION CONTROLS</th>
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(1) This model has a built-in room equalizer.
(2) Stereo guitar input plus foot-switch jack.
(3) Multistation switch for special contouring.
(4) Two-position presence switch.
(5) High-level "Aux" input.
(6) Price includes optional remote-control unit.
segments, allowing you to solve relatively complex problems posed by poor room acoustics or poorly equalized program material. With separate, calibrated sliders for each band you can return to a predetermined setting each time you play a particular record.

**Stepped tone controls.** The continuously variable “pot” of conventional tone controls may be replaced by fixed resistors for discrete increments of boost or attenuation. Exact repeatability of settings is one of the advantages claimed for this type of control, originally found only on professional equipment.

**Variable-turnover tone controls.** Further flexibility in tone controls is possible with units incorporating this concept. Conventional tone controls merely raise or lower response in a given frequency band; these move the band up or down the frequency scale.

**Special equalization controls.** A footnote for each of these listings indicates the special function performed in the individual model.

Receivers equipped with scan tuning often allow the option of remote controls. Tuning is not all you can alter from the comfort of your easy chair, however; extension units may have provision for adjustment of volume levels or—in one case—quadraphonic balance.

The power amplifier section of the stereo receiver has not been ignored in the development of the super receiver.

**Pre-out, main-in.** That’s a common designation for the back-panel jumpers between the preamp and amplifier sections of the receiver. Removing the jumpers will allow completely separate operation of the two. This “interrupt” feature is convenient if you wish to insert another component—a room equalizer or bi-amping system for example—between the preamp and the amplifier. Tape-monitor connections generally can be used for such purposes, but for taping you then would have to use a monitor switch on the outboard equipment instead of that on the receiver.

**Number of headphone outputs.** Several of the quadraphonic units include separate front and rear headphone jacks. They are counted here as two jacks since they generally can be used for two stereo headsets at the same time on the same stereo program material when the mode selector is switched from quadraphonic to stereo.

**Headphone volume control.** A few models have a level control that permits adjustment of headphone volume without resetting loudspeaker volume.

**Number of speaker pairs.** Provision for additional pairs of speakers has come a long way since the first remote hookups. Most new units permit more than one pair of speakers to be hooked up on each channel without any side effects of mismatch, overload or instability. Again, back and front pairs are counted separately in quadraphonic equipment though practical considerations may limit the number of pairs that can be used effectively this way. Similarly stereo equipment with outputs for three pairs of speakers don’t always permit use of all three simultaneously.

**Remote-speaker volume control.** A few of the new models allow you to adjust the level of extension speakers without altering the level in the main listening room. Again quadraphonic equipment generally can be used in this way on stereo program material by connecting the main speakers to the front terminals and the remote pair to the back terminals—using a separate channel of amplifica-
The Kenwood KR-6170 (above) is something of a specialist, with built-in rhythm generator, front-panel guitar and mike inputs, timer, reverb, and other features of particular interest to the electronic musician. It also features a special contouring control. The BIC/Lux 71/2R (upper right) solves contouring problems with a combination of tone controls whose turnover frequency can be varied and a built-in room equalizer. The JVC 5550 features that company's multiple-slider SEA (for sound-effects amplifier) tone-control/equalizer system.

The prices shown on the table are in round figures based on manufacturers' list prices, without allowances for import surcharges or currency revaluations, or for retailer discounting. As you'll see, the prices range from about $400 to $1,500—a wide spread. There also is a wide spread in the features offered and in the performance standards to which the units are designed of course. The evolution in audio products continues, and there always are some surprises around the corner. Bang & Olufsen recently introduced a receiver (the $300 Beomaster 3000-2) with pretune buttons for six FM stations, for example, while the new Fisher 390 has five. A suggestion of things to come, or merely extreme cases of the present (and perhaps temporary) interest in convenience tuning? Only time will tell.

Two other models should be mentioned as raising similar questions. The Kenwood KR-6170 is designed with unusual attention to the needs of amateur music-makers. It has inputs for mikes and guitars (two of each) plus a reverb circuit and an electronic "rhythm section"—enough features to allow a single performer to make recordings as an entire combo. If the musician succumbs to his own lullabye, a built-in timer will turn off the whole system. Obviously the concept is quite different from that of any other receiver on the market and appeals to a specialized audience.

Even more innovative—in terms of performance characteristics as well as features—is the QSI (QuadraCast Systems, Inc.) 4100. In particular, its power-amplifier circuits are encapsulated modules that QSI plans to offer to other manufacturers as well, and at lower power ratings in addition to the 100-watt version used in the QSI 4100. It's just possible that mass-produced modules of this sort will make high-performance, high-power amplifiers a standard feature of future receivers.
How to Understand Our FM Test Reports

If you're really interested in high fidelity equipment you're sure to see all manner of technical graphics that purport to tell you how a given piece of equipment behaves. But how much does it really tell you? When you look at our test reports, do you consider the graphs that go with them as just so much window dressing? If so, it's a pity; you're passing up detailed and specific information that can help you make a buying decision—information that complements and expands the written word.

Just as a skier gets to know the little ins and outs of familiar ski slopes, characterizing them in his own mind in terms of the sort of enjoyment (or problems) they afford, so the slopes and bumps of our test curves have their own character and their own meaning. Each tuner or receiver we test—like each new ski slope—has its own particular behavior pattern, being not only better or worse than the last one but also different in subtle ways that, once you come to recognize the basic patterns, can afford visible clues to the way the equipment will behave in your home. My purpose, then, will be to construct a sort of buyers' Baedeker to help you distinguish between the spectacular and the pedestrian, between the wonderful and the worrisome, in High Fidelity's FM tuner report graphs.

**Tuner IHF FM Sensitivity Curve**

This most important of tuner graphs tells much about the sensitivity, or station-pulling ability of a given tuner. Just examine the sample graph and follow the letters, from A to K.

A. The horizontal axis of the graph has, as part of its title, the term RF input. The FM antenna of your tuner or receiver is in the direct path of incoming radio waves of every type and description. A properly designed and oriented antenna responds mainly to FM RF (radio-frequency) signals, though it also will pick up stray radiation that can be heard as noise—particularly what is known as interstation noise. The RF signals, originally in the form of radiated energy, are converted by the antenna into a voltage. Its frequency will be anywhere from 88,000,000 to 108,000,000 Hz (88 to 108 MHz, the M standing for mega- or million). Another important characteristic of this signal is ...

B. Its minute voltage. The signal at the antenna terminals is, in fact, a very small fraction of a volt. The closer you are to a radio station, or the greater its transmitter power, the greater the voltage reaching your antenna terminals. In distant locations, say 50 or 60 miles from a station, you may have only a few microvolts (millionths of a volt, abbreviated µV) at your antenna terminals. If you are very near an FM transmitter, your antenna may be hit by much higher voltages. The way your FM tuner or receiver responds to signals over a typical range—up to 50,000 microvolts (50 kµV, as our graph would express it), or 0.05 volts—is what is being conveyed by the graph we are examining, and is measured on ...

C. The vertical axis of our graph. This axis is calibrated in dB: decibels, the standard units of relative strength in signals and sound alike. Unlike most other scales of measurement, dB can only be used if it is related to some reference (e.g., "That woman is shouting at least 10 dB louder than her husband is"). In our graph, the reference (0 dB) is understood to be the level of the loudest signals to be found in the desired radio program itself. What we are showing is that certain undesirable sounds are so many dB lower than our full program level for a given RF input of a certain number of microvolts. Some of the undesirable sounds that we'd like to be much lower in intensity than the desired program include ...

D. Hum—the residual low-frequency sound you hear at the power-line frequency (usually 60 Hz, in the United States) or multiples thereof. It arises not from any radio reception limitation on the part of the tuner, but rather because the power supply built into the tuner utilizes this frequency to create the necessary direct current supply voltages for the tubes and/or transistors in your equipment. A well-filtered and well-designed power supply will add little residual hum to what you hear. A poorly designed one will contribute audible hum, especially annoying during program pauses when the music or other program sound isn't there to mask it. Another unwanted sound present in a tuner or
receiver—and one more directly related to signal strength—is...

E. Noise—the frying, crackling, hissing sound you hear when tuning between stations (unless you have an automatic muting control) and, more seriously though at lower volume levels, when listening to particularly weak stations. FM, by reputation, is said to be noise-free and static-free and, for all practical purposes, this is true. It's just that some tuners are more noise-free than others. Another glance at our curve shows that as the signal strength (number of microvolts) becomes greater, the noise gets lower (more dB below the reference level) until we are not audibly conscious of the minute amounts left. In measuring a tuner, the final objectionable sound we'd like to have as low as possible is...

F. Distortion, or the introduction of spurious harmonics of original program tones. Thus, if a pure tone of 440 Hz (A above middle C) is sent out over the air by an FM station, and you hear it together with small amounts of 880 Hz and 1,320 Hz at levels totaling about 3% of that for the desired 400 Hz, the program is said to contain 3% harmonic distortion. Distortion too will tend to decrease with increasing signal strength owing to certain technical characteristics of FM receiver performance which need not concern us here. By taking into account the ability of the tuner or receiver to reject all these unwanted sounds even for very weak RF inputs, we come to the best known of tuner specifications...

G. IHF Sensitivity. Simply stated, the IHF (for Institute of High Fidelity, which devised this specification) sensitivity of a given tuner or receiver is the number of microvolts of RF signal necessary to reduce the unwanted sounds previously discussed to a level 30 dB lower than the program itself. More specifically, the sum of all three—hum, noise, and distortion—must be 30 dB lower than the program peaks themselves. When they are, we have a usable signal, one that can be tolerated and listened to, though the unwanted sounds will still be clearly discernible. In the example, the sensitivity curve crosses the -30-dB line at 1.8 microvolts so 1.8 µV is the tuner's IHF sensitivity rating.

If you are uncomfortable with the expression “30 dB” and would rather think of percentages, here's a handy rule of thumb. When one voltage is 6 dB less than another, it's half as much. When it is 10 dB less than another voltage, it's approximately one third as much. (This rule holds true for voltages, with which we are dealing here—not for power, with which we would be dealing in testing, say, a power amplifier.) So -30 dB is one third of one third of one third, or, if you work it out exactly, very nearly 3 per cent. The input signal strength necessary to reduce total hum, noise, and distortion to 3 per cent of the peak program level (or to "quiet" it by 30 dB) won't necessarily be the same at all points on the FM dial. That's why the chart also shows you...

H. Sensitivity at the extreme frequencies of 90 and 106 MHz. Good thing it does, too! Notice that in this case the IHF sensitivity at 106 MHz is 2.5 microvolts—not quite as good as it is at the "official" IHF frequency of 98 MHz. So if we simply say that this tuner design delivers a sensitivity of 1.8 microvolts we're not telling the whole story. Nor do sensitivity ratings themselves tell the whole story of
course. Since hum, noise, and distortion still are clearly audible at ~30 dB, the IHF rating point, we will want to know...

I. The slope of the sensitivity curve as input voltages are raised. Ideally it should be steep, so that it reaches really good performance (say lower than ~40 dB) as quickly as possible. The curve in our example is quite good in this respect. If the “knee” of the curve is very rounded—some actually have a pronounced “ski jump” near the bottom—you will need stronger input signals before you can get the tuner to receive them at its quietest. That performance will be achieved when the curve reaches...

J. Maximum quieting: that is, the lowest point in its downward travel and therefore its ultimate or lowest hum, noise, and distortion. In our example you will see that it is about 46 dB below our program reference. Applying our previous rule of thumb, you will find that ~46 dB is the equivalent of one half of one per cent. In most tuner or receiver designs, the curve tends to continue “on the level” from this point to the maximum RF strength used in the test, and our FM tuner or receiver test reports often will refer to...

K. Quieting at 1,000 (1K) microvolts, a signal strength typical of, say, reception in suburban homes. At this input strength, noise is usually much, much lower than the curve would indicate and doesn’t figure in the total at all. And the hum in any decent tuner or receiver will be better than 46 dB down to begin with. So all that is left is residual distortion—in this example, 0.5%. Therefore you see that, indirectly, this graph tells another important fact: The best harmonic distortion attainable at any signal strength with this product is 0.5%—which is only fair, by the way.

Harmonic Distortion and S/N

The graph we have been discussing relates to total hum, noise, and distortion, and we use the word “quieting” to describe the tuner’s ability to suppress these unwanted sounds. In communications work, however, that term more accurately describes the unit’s ability to suppress radio-frequency noise only—the whooshing sound you hear between stations on the dial—and some high fidelity manufacturers bring this terminology over into component specifications. Their quieting curves or ratings therefore show the relationship between the peak signal levels and the noise levels only, ignoring distortion in particular. When this is done, the quieting curve therefore extends correspondingly farther down below the 0-dB line.

In High Fidelity’s test reports this information can be found among the “Additional Data” listings as the S/N (signal-to-noise) ratio. The difference between our S/N-ratio measurement and a strict maximum-quieting measurement is that the former includes electronic noise generated within the tuner, while theoretically a quieting measurement does not. Since even a quieting measurement must be made through the tuner, however, it normally will be basically the same as our S/N measurement and the two figures should be similar.

We also show separate figures for THD alone. The report therefore shows you a curve representing the combination of noise and harmonic distortion plus separate figures for both fidelity-deterrents alone.

The THD figures are listed for three program-signal frequencies: 80 Hz in the deep bass, 1 kHz at the middle of the audio band, and 10 kHz near the top of the tuner’s range in the high treble. Tests are made with the unit receiving a mono signal and then for each channel of a stereo signal. In each of these tests the distortion typically will be greater at the extreme frequencies than it is at 1 kHz. And almost invariably the distortion in the stereo mode will exceed that in mono due to the extra circuitry that multiplexed signals must pass through.

These three sets of numbers—those derived from the sensitivity or quieting curve, the S/N ratio, and the distortion measurements—are closely related of course. By using our rule of thumb you can tell what their correlation is. For instance the additional-data box in the report on the tuner used in our sensitivity-curve example might show these figures:

<table>
<thead>
<tr>
<th>S/N ratio</th>
<th>63 dB</th>
</tr>
</thead>
<tbody>
<tr>
<td>THD</td>
<td>Mono</td>
</tr>
<tr>
<td>80 Hz</td>
<td>0.61%</td>
</tr>
<tr>
<td>1 kHz</td>
<td>0.47%</td>
</tr>
<tr>
<td>10 kHz</td>
<td>0.97%</td>
</tr>
</tbody>
</table>

Now think back. Our rule of thumb had determined that residual harmonic distortion in the tuner was the limiting factor in the descent of the sensitivity curve and pegged that distortion at about 0.5%. And here we see that figure confirmed: The distortion of a mono signal (used to prepare the sensitivity curve) is indeed very close to 0.5% at 1 kHz. You can see too how it varies at other frequencies and what happens when you receive a stereo station. And the S/N ratio (63 dB) is considerably better than the maximum quieting (46 dB) of the sensitivity curve, confirming that distortion, rather than noise, is the major contributor to limiting the curve’s downward swing.
**FM Response Curves**

The first graph told us about FM performance in terms of what we don’t want to hear: hum, noise, and distortion. Frequency response curves tell us about what we do want to hear: the program. There are three response curves in all. One shows us how the tuner responds to mono programs, the other two show us the two channels of a stereo program. Included on this same graph are two more curves that deal with something else we don’t want to hear—the signal from one channel that “leaks” through to the other in listening to stereo. Again we will follow a sample graph step by step from A to I. The basic calibration of the curves is in terms of...

**A. Frequency in Hz.** The lower frequencies are to the left, higher frequencies to the right. The lowest audible frequency is considered to be 20 Hz (alternations per second) and the highest perceptible treble tone is considered to be 20,000 Hz (20 kHz). Interestingly, though FM transmission standards for both mono and stereo do not quite cover this entire range (usually being limited to 50 Hz to 15 kHz), equipment such as tuners and receivers frequently are measured over the entire audio range. *High Fidelity* carries its tuner-response graphs only to 15 kHz, however, since there is no useful information above this frequency. The vertical axis of this graph, once again, represents...

**B. Response in dB.** This time the reference point is full audio signal at 1 kHz. That is, the maximum level that is produced by a 1-kHz tone in the program is arbitrarily defined as 0 dB, and maximum levels at all other frequencies are compared to this reference. Note that in this graph two vertical scales are used—one for mono measurements and one for stereo. This is simply a matter of convenience, for if only one 0 dB reference were used for all the curves, they would probably fall on top of each other and be more difficult to read. The top curve represents...

**C. Mono frequency response.** Here a solid line extends from 20 Hz (at the left) to 15 kHz (toward the right). In an ideal tuner, this line would be perfectly straight. In other words, there should be no variation in response from the reference 0 dB line at any frequency. In practice, however...
D. The actual response is seen to vary somewhat from the ideal, and its range of variation is summarized in the statement "± 1.5 dB, 20 Hz to 15 kHz." This means that at no frequency between the end points mentioned does the response depart from 0 dB by more than 1.5 dB in either direction. To find the response relative to 0 dB at any specific frequency, of course, you need only examine that point on the response curve itself. Now look at the curves for...

E. Stereo frequency response. There are two outputs to be considered—the left channel and the right channel—so curves are plotted for each separately wherever they do not turn out to be identical. In our sample graph, the right-channel output (dotted curve) tends to be attenuated ("rolls off" slightly) at the very-low-frequency end of the graph and also has slightly more output than the left channel at frequencies between about 250 and 400 Hz. The differences are quite small and are probably due to tolerances of components used in the two channels. There is, however, a more apparent difference between channels in the...

F. Channel-separation curves. Simply stated, channel separation means the ability of the left output to reject purely right-channel information and the complementary ability of the right output to reject what should be strictly left-channel program material. The nature of the multiplex broadcasting technique (and practical electronic equipment) is such that 30 dB of separation is all that the Federal Communications Commission requires of stereo FM broadcasters. That degree of separation must be maintained at all audio program frequencies, however. Most FM tuners can preserve separation at better than 30 dB at mid-frequencies but may not do so well at the extremes. Once again...

G. Left-channel output measured for channel separation (when only right-channel information is transmitted) is represented by the solid line, while...

H. Right-channel output (when only left-channel information is transmitted) is represented by the dotted line. The curves in our sample graph are fairly typical, so let’s examine them in some detail. Rarely, if ever, do manufacturers publish curves showing separation at all listening frequencies, generally preferring some simple statement like: "Stereo separation better than 35 dB at 1 kHz." As you examine the lower curves you begin to see why. This tuner has over 35 dB of separation in both left and right channels at this mid-frequency point—even better than minimum standards set up for broadcast stations. But as I say, the separation is hardest to maintain at the extreme frequencies. It actually decreases to only about 12 dB in the right channel at the bass end. In order to provide an adequate numerical characterization of these curves, there are...

I. Two sets of separation figures. The first group of numbers characterizes midrange separation in each channel—giving, in this case, the frequency range over which each channel maintains 30 dB or more of separation. The second covers a broader portion of the frequency range to suggest over-all performance. In our example, the 20-dB separation is specified, and you will note that in both channels it covers virtually all of the audible range that would be needed for most program material. The difference in separation between the two channels should not disturb you; it is characteristic of most stereo FM circuits, even when the output frequency-response curves are practically identical in the two channels. Separation requirements for good stereo are not nearly as severe as you might suspect. Most listeners find that a separation of as little as 10 dB can give a credible stereo illusion. It is well established too that extremely low frequencies contribute little to so-called stereo directional effect, and high frequencies (above, say, 8 kHz) are also of questionable importance when it comes to the stereo illusion. Thus the separation—or rather, lack of it—at extreme frequencies in our example should not be considered as an indication that it is inferior equipment.

The graphs discussed in the foregoing article can be analyzed as shown here using the principles outlined in the article itself. Note that on the sensitivity graph we have added a curve for noise factors alone and show both the "quieting" in dB (on the left) and its equivalent percentages (on the right). Similar information can be extracted from the graphs in all our tuner test reports.
There are definite advantages to both simulated and true 4-Channel stereo.
That’s why we put both in this receiver.

Because so much is being written and said about 4-channel these days, and because so many people are wondering which to buy and what they’re going to get when they do, JVC is about to set the record straight.

**True 4-Channel.**
True 4-channel, known as the discrete system, is sound coming from four distinct and separate sources.
Right now there are very few true 4-channel program sources, but it is expected that the next few years will see an increasing demand for true 4-channel equipment, 4-channel records, tapes and cartridges.
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Simulated 4-channel simply means the ability to take 2-channel tapes, records and FM broadcasts and play them in the new 4-dimensional format.
This is done by picking up reverberation and "indirect" sound in 2-channel sources and converting it into 4-dimensional sound to closely approximate the “sound field” as it existed originally.
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**Why we put both in our receiver.**
At JVC we realize that anyone considering buying a receiver these days is faced with the problem of deciding whether to buy 2-channel equipment or 4-channel equipment.
JVC’s 4-channel receiver Model 5444 is the ideal answer.
It contains a quality simulated system that allows you to continue to enjoy all the tapes and records you presently own and a highly advanced discrete system that lets you play discrete 4-channel program sources.
Besides offering you both systems in one receiver, JVC also offers you on this unit their exclusive patented Sound Effect Amplifiers which allow you the kind of sound control no other home system has.
With SEA you can create new sounds, adjust for the acoustics of your room and control the difficult mid-ranges.
Another advantage of this receiver is a BTL circuit that allows you to convert the 50 watts from each of its 4 channels and use it as a powerful 100 watt 2-channel receiver.
We’ve also incorporated into this unique receiver a linear dial scale and a bull’s eye tuner to make sure you get perfect reception on its FM/AM radio, and optional remote control which gives you complete control over each of the 4 channels.
There’s even FM muting, front and rear monitoring, and a 4-channel headphone output. And the entire system comes in a handsome mahogany case so you can show it off even when you’re not playing it.
And, if you decide to go into 4-channel equipment, JVC is the only company that will be in the position to offer you a complete line including reel to reel, cassette and cartridge tape recorders, receivers, preamplifiers, amplifiers, record players and more.
So if you’re thinking of investing in 4-channel equipment, think of the company that’s a leader in the field, JVC. The company that can give you both the most advanced true 4-channel and simulated 4-channel. In one unit.

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A simple guide to all existing and proposed
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Four separate control and power amp channels.

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The four channels of information are processed to retain full separation throughout, from the microphones right up to your four speakers.

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Every type of playback available on any conventional 2-channel stereo receiver of any design.
Music as Furniture

Modern music, according to one viewpoint, is a visual art.

Much contemporary music, it seems to me, is more analogous to art objects than it is to "music." As composers get further away from the traditional idea of notes in sequence, their scores more closely resemble visual art—witness the book Notations which presents scores by 269 composers, few of whom use traditional means.

Let's look at (or listen to) a few recorded examples.

Steve Reich's Come Out (Odyssey 32 16 0160) is one of the more fascinating works on record. It contains not one note of "music," but only the voice of a nineteen-year-old boy saying "Come out to show them." It is repeated and repeated on two channels, and as channel two moves ahead of channel one, these five words become indistinguishable, but the words' sounds are made to exist all at once—together, separately, in succession, simultaneously.

Reich describes his piece as "a sort of canon or round," and critic Paul Hume has tried to justify it as "music" by comparing it to a Bach fugue, with subject, countersubject, augmentation, stretto, etc. Here Hume falls into the error of defining art by past art, whereas art is always in the process of redefining itself.

In some ways the structure of Come Out is analogous to canonic music, but the effect is the opposite. A fugue or canon concentrates the listener's attention and leads him. Come Out diffuses the attention and, as Reich notes, "Finally, at any given moment, it is open to the listener as to which pattern within the pattern he hears."

What is Come Out then? I think of the composition as the aural equivalent of op art, which takes lines and shapes and spaces and puts them together in a way that allows us to see what isn't there—it affects our eyes as Come Out affects our ears.

Another example—Robert Rauschenberg made a series of white paintings characterized by John Cage as "airports for shadows and dust." Cage acknowledges that they came before his all-silent 4'33" for Performer. In this "composition" the listener can hear all the ambient sounds of the moment, which Cage considers part of all music.

Gordon Mumma's Mesa (Odyssey 32 160 158), written for Merce Cunningham's dance Place, shows us modern music as another sort of visual art.

Myron Bennett is the producer of "Music of Our Time" for Station WGUC, Cincinnati. Although he refers to himself as an "amateur" composer he has had his electronic music compositions performed publicly.
It has no choreographic intent. Cunningham's dances take place while the music is heard and the stage setting is seen; but the music, stage setting, and costumes are not intended to accompany the dance, merely to co-exist with it. *Mesa* is a series of tones electronically altered, and the sounds, slow and harsh, without any traditional musical relationship, are more closely akin to noise than to music. *Mesa*, then, if seen as an analogy to stage setting, as a series of flats shifting about, is more easily heard and understood if one does not try to relate it to traditional Western music.

In Pauline Oliveros' *I of IV* (Odyssey 32 16 0160) tape delays of varying durations are applied to a series of electronic sounds so that they reappear as immediate echoes and delayed repeats. The contours of the tones thus combine with other contours to form new shapes. The visual equivalents would be reflections and changing, shifting perspectives—a mobile.

The idea of modern music as visual art even works with some music that behaves as music (traditionally) should. Terry Riley's *In C* (Columbia MS 7178) is music and is performed by any number of instruments playing fifty-three figures, as written. It has a beginning, a middle, and an end. It does what "music" does. But since each figure is repeated as often as each player chooses, three or five or ten different players are playing that many different notes at any moment. While the momentary impression is somewhat like the op art of *Come Out*, the over-all effect is definitely tonal music—it is, after all, in C.

But does the analogy between music and visual art really hold up? As noted before, a piece of traditional music has a beginning, a middle, and an end. It happens in time. A painting or piece of sculpture has no time element—even a mobile can be looked at for a moment, an hour, or a lifetime. Music happens, a painting is there. In traditional music, the composer plots a path of musical events. In visual art, everything is presented at once, and the viewer can start anywhere, go anywhere or nowhere, notice everything or nothing.

But many of the works described have everything in common with visual art except that they are for the ears, not the eyes. They present their ideas as a plotless whole, and allow the listener to hear what he wants at any given point.

John Cage's works provide many examples of this basic idea and, in fact, Cage's scores have been exhibited in an art gallery. Moreover, the concept of music not having a beginning or an end can be found in several places in Cage's book *Silence*.

In most of his later works Cage took up the new idea that the method of performance should be up to the performer. His scores do not provide the performer with a picture, but with a camera: The performer must shoot the picture.

And in some cases, where Cage is his own realizer, the art form becomes something entirely different. In *HPSCHD* (Nonesuch 71224), as done...
at the Assembly Hall in Urbana, Illinois, the vast building was filled with sight and sound: Seven independently playing electronically amplified harpsichords and fifty-two independent tape recorders playing computer-programmed sounds provided art for the ears while the eyes feasted on the sights produced by sixty-four slide and twelve motion picture projectors. Again, in Variations VII, done in New York in 1964, sounds from all over the city were fed into the hall on telephone lines and by other electronic means as they occurred. (The composition determined when each of the sources would be heard, but the sounds themselves were random.) As Cage explains it, “The idea was to cast nets around the city and as far beyond as practical to catch sounds actually in the environment just as one would catch fish in a net.”

As musicians use tones, as sculptors use shape, as dancers use movement, Cage uses the means of long-distance communication. Perhaps he is organizing the first tribal dances in the global village.

If the idea of art objects made of sound has any validity, I think there are some considerations besides those of how to listen to it. For instance, how to use it.

Erik Satie suggested the idea of “furniture music”—music that exists in a room, as furniture does.

“I think of it,” wrote Satie, “as melodious, softening the noises of the knives and forks, not dominating them, not imposing itself. It would fill up those heavy silences that sometimes fall between friends dining together. It would spare them the trouble of paying attention to their own banal remarks. And at the same time it would neutralize the street noises which so indiscreetly enter into the play of conversation. To make such music would be to respond to a need.” Muzak was created to fill this same need, but I doubt it is what Satie had in mind.

Other composers have written music to accompany exhibitions of other arts (Pousseur, Trois visages de Liege [Columbia, MS 7051]); some have created works in which music co-exists with other arts. And the phrase “sound environment” is used to describe an art form fairly recent in origin.

Why not use this music, or these sound-made-art objects, as we use paintings and sculpture—in public places? The sounds of Oliveros’ I of IV could issue from speakers next to the Miro mural—the fountain could play Mumma’s Mesa.

And in your home, perhaps each room could have its own sound decor, along with the furniture, wallpaper, and nicely framed reproductions.

Ah, yes, Madam, in the parlor, you will have light blue, early American, and Subotnik—for the dining area white walls, Mediterranean pecan, and Bo Nilsson, and for the bedroom, may I suggest Morton Feldman?
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We built the new ELAC/ Miracord 660H for people like Dick Sugar; people who want or need the highest quality in a turntable, and who want that quality to endure. So the new 660H has everything Dick Sugar bought his old 10H's for—plus all the improvements we've made since we built the 10H.

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What impresses him most about Miracord though, is reliability: "In the seven years I've had mine, I've had to replace styli, idler wheels and a few minor parts. But I've never had to send them to the shop. And my next turntables will certainly be Miracords—just like the ones before these were."

The ELAC/Miracord 660H. $139.50, less base and cartridge. Another quality product from Benjamin. ELAC Division/Benjamin Electronic Sound Corp., Farmingdale, N.Y. 11735/a division of Instrument Systems Corp.

Also available in Canada.
Leonard Bernstein Discusses His Mass with High Fidelity

HIGH FIDELITY: What prompted you to write Mass, and how did its unusual formal organization develop?

LEONARD BERNSTEIN: That's leading with a clout; I hardly know where to begin. I've always wanted to compose a service of one sort or another, and I toyed with ecumenical services that would combine elements from various religions and sects, of ancient or tribal beliefs, but it never all came together in my mind until Jacqueline Onassis asked me to write a piece dedicated to her late husband. I suppose part of the reason that the Catholic Mass became the spinal structure—unconsciously, perhaps—must have had something to do with the Kennedys. But besides that, I've always had a deep interest in Catholicism in all its aspects, its similarities and dissimilarities to Judaism as well as to other religions. The Mass is also an extremely dramatic event in itself—it even suggests a theater work. I became particularly interested in Catholicism during the Papacy of John XXIII, when it really seemed that the Catholic Church was taking the lead in certain movements: towards justice, equality, and all the things we dream about and try to work for but never quite know how to achieve. That was altogether too brief a Papacy, but it left a mark that began to be carried forward in many ways by other Catholic groups—one got the feeling that a new vitality was stirring among Catholic clergy.

H.F.: But Mass also has a strong Old Testament flavor to it—the questioning, even nudging, of God that one never finds in Catholic doctrine.

L.B.: Several people have told me that they thought Mass was a "Jewish" work, and I know what they mean. The questioning of God is a time-honored Jewish tradition, based upon the intimacy with God which Jews have always felt, especially in the diaspora, in exile, in ghetto living—because that's all they had, you see. Without a real earthly life their existence centered around religion and religious observances; and of course the center of all this was God. I can imagine people in the Russian or the Polish ghetto, for example, who justifiably did not consider themselves citizens of either Russia or Poland, who felt the only real authority to whom they were beholden was God himself. It must have inspired a special relationship to God; the kind of "Ich-Du" relationship that Martin Buber talks about. I guess this is typically Jewish and perhaps goes back, as you say, to the Old Testament in its quality. There's a good deal of personal questioning of God there—even back talks; all those reluctant prophets who said, "Oh! But why me? I stutter" or "I'm shy; I'm not a leader: why pick on me?"

H.F.: Were you consciously working for this flavor? Is that why you didn't write a conventional Mass with a Latin text?

L.B.: I wouldn't say that's the reason. In the first place, I'm not really entitled to write a Latin Mass, nor was I considering a strictly religious work, although in a sense Mass turned out to be every bit as religious as my Kaddish Symphony, except that Mass is a theater work. You see what I mean by the difference? I consider both Kaddish and Mass as essentially religious statements, but not as works to be performed in the context of organized religion—that is, within a house of worship or on religious occasions.

H.F.: Would you feel that the music of Mass represents a plateau or summation of your compositional work to date?

L.B.: I think so. Yes; I feel it's a work I've been writing all my life. But in a way that's true of anybody's latest work, if it's a major one. I mean, one could easily make out a case that Beethoven's Opus 101 is a summation of everything he had written up to that point, and the same for Opus 102.

H.F.: There are so many different kinds of musical styles in Mass. Did their juxtaposition pose problems for you as the work progressed?

L.B.: Occasionally I worried as I was working on Mass that the eclecticism of the work might militate against it. As a matter of fact, I remember one day when I played over the first five minutes and thought: "Good Lord! There are so many body blows from so many different directions; have I destroyed the piece before it's barely begun, in the first five minutes?" And yet I knew that that was the essence of the work, the eclecticism of it;
it had to be. But it had to be very carefully handled, so that the eclecticism worked positively and not negatively, as a pastiche. And because the stylistic variety was applied so consciously, I can’t judge the work: I’m much too close to it to know whether Mass is a good piece or a bad piece. All that I can judge are the reactions to it: that is, the reactions of audiences and the cast. And I already knew in rehearsal, even before we had done it in front of an audience, that the eclecticism was working. It’s a matter of timing, which is very difficult, and a matter of making certain key moments work. If they don’t work, then neither the next five minutes nor the next hour will work. By “key moments” I mean those moments where there is a sense of shock, where the eclecticism is most apparent. Someone told me that, for him, Mass was two hours of constant shocks, surprises that were always surprising and never became predictable after a certain point: “Oh, yes; I see what he’s going to do now; he’s going to switch on me and do the following predictably surprising thing.” But, actually, I never used these “surprises” for their sheer shock value; they all came from somewhere very deep. And this, I feel, is the essence of the work’s eclecticism.

H.F.: Can you tell us who the Celebrant is?

L.B.: No, I can’t. As a matter of fact, I’m so confused at this point from reading about him that I don’t really know what I originally intended. I’ve read that he’s everything from Everyman to Christ himself; from simply “a priest” to a representative of Youth. I guess I can say what I originally thought him to be. I never thought of him as a “character”; the Celebrant, for me, was always that element in every person without which you cannot live, without which you cannot get from day to day, cannot put one foot in front of the other. He represents the quality that makes you go on living. I suppose this can be defined partly by the word “faith,” partly by the word “hope,” partly by the word “anticipation.” And because of the various things that this element, or character, or whatever you want to call him, undergoes, he is rendered useless—he is destroyed. Which simply means that people have destroyed that thing in themselves on which they depend for their sense of life and their ability to live in a positive sense; and that’s why the entire cast becomes literally immobilized on stage. There are 160 people sitting there, none of whom can breathe, make a move, or take the next step in life because of the fraction that has occurred. There has been a fraction of many things: of the vessels, of the psyche of this quasi-character, and of faith itself. And at that point, everyone has to look very, very deep into himself to find that very thing that he has destroyed.

H.F.: What is it that finally heals them?

L.B.: The act of finding it, each one, in himself. In other words, you cannot have a relationship with another person unless you have some kind of relationship with yourself, and with that indefinable “divine” element in yourself that we’ve been talking about—the quality the Celebrant possessed before he became priestly, gorgeously clad, powerful. In other words, one has to rediscover it on the simplest level. Having rediscovered it, one is then able to move a muscle, the blood begins to flow again, you can draw breath; and once able to do that, you can move that muscle towards someone else, reach out, take someone’s hand, and make a relationship. You can then reach out and relate to several people and, ultimately, to society. But the main thing is that it must begin inside you. It mustn’t come from exteriorization. And that’s what happens during that paralyzed silence. It’s one of the greatest efforts that anybody can make, and I can’t think of anything in theater that’s quite like it: that unbearable, seemingly interminable silence, in which no one, either on stage or in the audience, can move or breathe or do anything until that first flute note sounds.

H.F.: The response to Mass has ranged from extravagant praise to critical scorn. Did you expect the reaction to be quite so intense?

L.B.: It was a surprise—the intensity, as you say, as well as the range. Actually, the unfavorable reaction was extremely small and came from half a dozen critics in New York. But, to read Il Messaggero from Rome, or the Neue Zürcher Zeitung, or the Mannheimer Whatever-it-is, or the London Times, or papers from Chicago, Houston, or anywhere, the reviews have been more than favorable. And often they do not even read like reviews: They’ve been like prayers of gratitude, of thanks, of deep appreciation. I’ve been sent copies of sermons that have been preached about it, which are really remarkable. The most intense reactions have come from Catholics, and I was worried about the possibility of offending Catholics—the last thing in the world I wanted to do, especially since
the Kennedy family was highly involved. But far from being offended, they were terribly moved. As a matter of fact, Senator and Mrs. Kennedy kept coming to rehearsals and previews; they must have seen it I don't know how many times, and were more and more moved each time. Priests have come to me after performances and said things that were so moving I'm embarrassed to repeat them. There have been some negative responses: "You have desecrated our Holy Mass," and so on. But these have been very, very few, to my amazement, because I did expect, especially from certain kinds of rigidly dogmatic Catholics, that sort of reaction, even picketing and I don't know what. But nothing like that did happen.

If you read Commonweal or other major Catholic publications, there were mainly perceptive appreciations of the work. And this is true not only of Church fathers and Jesuits but of nuns and Protestant ministers and Episcopal bishops and rabbis. I'm touched by the reaction of the religious community—the whole religious community. And there was an atmosphere about the whole thing that was also surprising to me in the sense that the audiences all seemed to have that kind of reaction too. In other words, when they waited for me outside, it wasn't to say "Congratulations" or "Bravo, maestro" or any of the usual things, but "Thank you"; and it was more often than not an embrace and not a handshake.

H.F.: A great deal has been made of the sheer size of Mass, especially in its Kennedy Center production. How do you envision future performances?

L.B.: I'm not entirely convinced that Mass's proper dimensions will necessarily dictate the involvement of two hundred-plus people. It did turn out that way in this particular production because the house we were dedicating happened to be an opera house, but I'm not sure that it's a work that belongs in an opera house. I haven't had time to think really objectively about it, but my instinct tells me that it's a work that can operate in various dimensions. I can see it with four musicians, or with eighty; I can see it being done in a high school auditorium, as well as in a normal theater. It would, of course, require reorchestration and some reconception.

H.F.: Are there any definite performances scheduled in the near future?

L.B.: I've said "no" to everything for awhile, until some objectivity is reached. There won't be any performance this winter in New York, in spite of the many requests for it from all departments of the Broadway theater, including the Radio City Music Hall. The only "yes" has been given to the Vienna Staatsoper, which will produce it next season. Right now Mass is having a cooling-off period. And it's a shame because, naturally, I would love a lot of people to see the work, to hear it, and to experience it. But somehow I know it's right to wait until one can recognize the true dimensions of the piece. And maybe the true dimensions of the piece are those of the Kennedy Center. I don't know. Maybe an integral part of the work is its "mass" aspect.

H.F.: How did the performers react to their parts?

L.B.: One of the great experiences of Mass, for me, was watching the stage musicians become day by day more and more involved in the work. For example, during the Meditations, when the Celebrant said "Let us pray," and the pit orchestra would play the meditation, I found the stage musicians extremely moving to watch. Some of them would be weeping openly. They were never directed to assume any physical attitudes of prayer or meditation; they were left to their own devices, and it was extraordinary what happened. This was true of the whole cast. I have never seen in the theater such expressions of love among so many people who were working together, twenty-four hours a day, over a period of weeks—and you know the frictions that always arise in circumstances like that. There was never anything like that. There was just a constant increase in affection and patience and devotion to one another and to the work—a sense of love permeating the whole atmosphere. In a way, they took possession of the thing; they took it away from me and made it their piece.

I know it all sounds very sentimental, and the sort of "love-in" atmosphere has been soiled and desecrated again by the cynical press, but they have no understanding of what really went on. It was a kind of love-in, and it's very hard for some people to believe that, that's all—especially those people of the press who are more inclined to believe in fakery, show-biz tactics, or whatever. Unfortunately, that's a reflection of their own feelings or lack of feelings. If they talked to anybody who was involved in the performance, any string player or percussion player or choir member or boy-choir member, to say nothing of the principals and the dancers, I think that they would find they were wrong.
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The Religious Composer

Mass—few creative acts in recent times take so many risks and achieve so much

by Peter G. Davis

TO ECHO LEONARD BERNSTEIN elsewhere in this issue, I hardly know where to begin. Having seen Mass at the Kennedy Center premiere last fall and now after listening to Columbia's recording of that production, I find it difficult to focus on any one aspect of such a rich and highly complex work. On one level Mass is a brilliant piece of theatrical entertainment—the original dramatic conception, the dazzling musical variety, and the sheer creative exuberance of it all literally leaves one's head spinning. But there is a great deal more operative here than smooth show-biz glitter, and aside from the deeper emotional responses provoked by the piece's spiritual tone (and most of Bernstein's major works are of a religious nature), Mass functions as an extremely sophisticated, carefully controlled musical entity that repays close scrutiny. This element was rather overlooked in the critical brouhaha following the Washington performances, and it seems to me worth emphasizing in the brief description of the work that follows.

The essential structure is that of the Roman Mass as sung and played by a choir and a pit orchestra. To this Bernstein has troped in several elements that both elaborate and comment upon the Latin text and give the work a specific dramatic direction; these include—on stage—a blues band, rock band, street chorus, and a Celebrant. The Celebrant is the central figure and we first meet him, after an introductory four-part Kyrie (on quadraphonic tape), simply dressed, strumming a guitar, singing a "simple song" of disarming lyrical beauty in praise of God. In fact, these opening three sections (Devotions before Mass, First and Second Introit) paint a scene of happiness, faith, peace, and primal innocence with a "Swingle-Singers" bell chorus, a high-stepping street band second Kyrie as the Celebrant frisks with the choir boys and receives his first investiture, and a Bachian chorale for the entire congregation.

Clouds start gathering as the Confession begins. The ominous Confiteor erupts with 12-note harmonic violence after the choral/chordal onslaught, a slightly sinister row appears as a swinging trio for guitars and finger snaps at "Mea culpa." Two blues songs, one heavy and the other easy, interrupt the choir: Sung by soloists from the on-stage street chorus, these lyrics are riddled with doubt, confusion, and cynicism. How naturally Bernstein takes the thematic and rhythmic material of the "serious" portions of the score here and weaves them into his idiomatic "popular" style; but this is the kind of technical prestidigitation that gives Mass its formal glue and keeps the dizzying eclecticism from getting out of hand.

An orchestral Meditation for strings, organ, and percussion lets us digest the disturbing Confession before the equally unsettling Gloria—the songs here show how "glorious" contemporary high living takes the true glory out of life. A second Meditation follows and the depression deepens—this music is based on a halting theme from the choral movement of Beethoven's Ninth Symphony, a stumbling, tonality-less (eleven non-repeating
high fidelity magazine

still seems to me that there has been a widespread failure to understand just what Bernstein was up to in Mass, regardless of whether the review was pro or con.

On one level—a very simple one—there is the question of genre, of style. When Don McDonagh (Financial Times, London) referred to "Leonard Bernstein's setting of the traditional Roman Catholic Mass," he confuses the issue: one might, with equal accuracy, describe the Grail notes sequence that Beethoven wrote to highlight the words, "Ihr strirzt nieder, Millionen?" (Have you been cast down, 0 multitudes?)

The Epistle juxtaposes quotes from the Apostles with contemporary "letters"—from a boy leaving home, a young girl writing of her imprisoned husband. This ties in with the Gospel-Sermon, a song of corrosive mor- dancy telling of man's arrogance as he twists the word of the Lord to his own devices ("God made us the boss, God gave us the cross, We turned it into a sword. To spread the word of the Lord, We use His holy decrees, To do whatever we please. And it was goddam good!").

A pounding 12-note row for chorus opens the Credo and again the four Non-Credo, defiance-of-God rock songs groove cunningly out of the intervals of the recurring rondolike row. Those initial descending fifths, for example, are transformed into an obsessive ostinato for Fender bass at "Et homo factus est" ("You, God, chose to become a man, To pay the earth a small social call"). and, in their inverted form, dominate the vocal line of "World Without End." a breathlessly restless vision of our planet mindlessly spinning in space. This sequence and the ominous De profundis leave the Celebrant shaken, but he restores the remnants of his faith by singing The Lord's Prayer, picking out the accompaniment on the piano with one finger. "I will go on." he sings and makes a final effort by leading the bright Sanctus, but the entire ensemble overwhelms him with a brutal Agnus Dei (based on the Confiteor strophe, "I don't know"). which reaches peak intensity as the chorus viciously demands "Dona nobis pacem" ("give us peace").

The Celebrant snaps at the climax of this orgiastic cacophony. He destroys the sacramental symbols, tears off his vestiture, bubbles vacantly. Everything is fractured: the spirit, its physical symbols, the Mass itself, the text, the music. This fragmented recapitulation is perhaps the most extraordinary moment in Mass: it draws upon all the important musical themes heard previously, until the Celebrant distills his despair into a moving dirge set to the poignant strains of the first Meditation. He then disappears. A solo flute eventually breaks the agonized silence with a shy three-note figure—we have heard this before: it opened the Kyrie and pops up constantly throughout Mass as a reminder of faith and hope. One by one the choristers and musicians join in the final Communion with a healing, reaffirming Lauda.

"Honesty" is usually a rather meaningless word as applied to a piece of music, but I can't help being impressed by Mass's unabashed two-fold sincerity. As a composer, Bernstein has worked with many styles and he could have adopted any one of them for Mass; instead he chose the hard way, gathered everything together, and forged a pliant unity from what might have been chaotic diversity. Emotionally, too, Bernstein has left himself wide open—Mass's very candor makes it extremely vulnerable and a sitting duck for the cynical. This is a work that stakes everything. I can think of few creative acts in recent times that take so many risks and achieve so much.

Columbia's recording is a faithful replica of the Washington production in almost all particulars and the spirit of the piece comes across vividly. Of course, in a work where the visual element plays such an important role—it has been virtually composed into the score—something is lost; even so, Mass makes an impressive impact on purely aural terms. Each soloist is superb, most particularly Alan Titus, whose plaintively sweet high baritone and dramatic projection makes the Celebrant an arresting and touchingly human figure. As a recording the results are a shade disappointing and more should have been done to adapt the work to the phonographic medium. Since Columbia only allotted a bare six days to record the entire production—and in two cities (Washington and New York) at that—this was clearly impossible. It's a smooth enough job, but unimaginative considering the possibilities for stage movement and acoustical variety, while the pretaped passages (evidently simply spliced into the recording) are apt to sound a trifle tinny. These are more flaws of omission than commission, and the vitality—of Mass and its talented performers—remains unquenchable.


Mass and the Press by David Hamilton

Since I did not hear Leonard Bernstein's Mass at the Kennedy Center until near the end of its two-week run, I had by then been amply supplied, both at first hand and by word-of-mouth accounts of reviews, with the impressions of others. The prevailing comment could be summed up in one word, "hodgepodge," and although subsequent reading of a wide selection of reviews suggests that this is an exaggeration of what was said, it still seems to me that there has been a widespread failure to understand just what Bernstein was up to in Mass, regardless of whether the review was pro or con.

On one level—a very simple one—there is the question of category, of genre. When Don McDonagh (Financial Times, London) refers to "Leonard Bernstein's setting of the traditional Roman Catholic Mass," he confuses the issue: one might, with equal accuracy, describe the Grail Scene in Parsifal as "Wagner's setting of the traditional Protestant Communion service." The texts of the Roman liturgy—including, it should be noted, far more than the five sections of the Ordinary (Kyrie, Gloria, Credo, Sanctus, Agnus Dei) that are comprised in most "classical" settings of the Mass for liturgical or concert purposes—are used by Bernstein as part of a dramatic action that includes the performance of a (formally incomplete) service, but it is the service as ritual rather than the Mass as a musical form that concerns him.

He pretty thoroughly abjures the long tradition leading from Machaut through Bach, Beethoven, and beyond, with its variety of precedents for treatment of this text: for example, the Credo text is mechanically ground out by the choir, articulated only by the interruptions of the street chorus, with none of the special musical
emphasis usually placed on the profession of belief in the central mysteries of Incarnation, Crucifixion, and Resurrection. One is slightly reminded of Beethoven's slurring-over of the jawbreaking Latin of the third section of the text (" Et in spiritum sanctum"), but whereas Beethoven was expressing his lack of interest in this particular aspect of dogma (and also compressing the verbal material to conform to the exigencies of musical time scale), Bernstein seems to be characterizing the entire Credo and focusing dramatically on those statements that present-day man finds, at the least, problematic.

**Mass** is, then, not "a Mass." It is not really useful to call it a "troped Mass," either, as Don Heckman (reviewing the recording in the *New York Times*) suggests—again because it is confessedly and pre-eminent a theater work. The modern paradigm of the troped mass is, of course, the Brühen War *Requiem*, which not only has no visual component but internally and explicitly acknowledges the tradition established in the Requiems of Mozart, Berlioz, and Verdi, despite its interpolation of nonliturgical texts.

Equally unhelpful, on the other hand, is the designation of Mass as a "musical" (e.g., Robert Craft in the *New York Review of Books*, among others); aside from the implied continuation—"musical comedy"—this term suggests dialogue interspersed with songs, while Mass is completely composed. To be sure, it contains songs that are in some way comparable to those in, say, *West Side Story* and *Hair*, but these are incidental to a larger musical structure. After all Papageno's *Volkslieder* numbers in *The Magic Flute* do not make that any the less an opera (or, to be pedantic, a *Singspiel*). Myself, I would call Mass an opera, although I note that the composer assiduously avoids the term; at the least, however, it is technically correct—what else would you call an extended theatrical work in which virtually all of the text is sung?—and it does suggest the work's obvious elaboration and craftsmanship.

Now let's get back to that idea of "hodgepodge"—or "wild melange," in Harold Schonberg's term (*New York Times*). Hardly anyone writing on Mass seems to have considered the possibility that Bernstein was using stylistic variety for a conscious purpose. Let alone that he is passing back and forth among his diverse materials or combining them, although I could wish for more effort at achieving continuity from one "number" to the next, where the reliance on a spoken "Let us pray" or the like is disappointing; if there were fewer hiatuses earlier on, the final great silence after the Celebrant's mad scene would be even more effective. But to anyone who thinks this is just a string of songs, I recommend the exercise of tracing the two ascending fourths of the "Lauda" motive (and the seventh they add up to) throughout the score, or an exploration of the musical puns that match the verbal ones in the *Fraction* (which title is itself a pun).

One searches in vain through the reviews for acknowledgment of this aspect of Bernstein's craftsmanship—although obviously reviewers writing under the pressure of same-night deadlines were at a disadvantage with respect to finer details. Much easier to discern are the sources of Bernstein's eclecticism, although some of the lists reached a bit far: I don't really hear any "raga" (Schonberg) or any musical reminiscence of Berio's *Sinfonia* (Martin Bernheimer, in the *Los Angeles Times*), while the universal horror at the reminiscences of Orff overlooks the possibility that this may have been purposive, designed to evoke certain (unpleasant) associations. After all, if you are going to write a piece in which stylistic eclecticism is the governing idea, you are inevitably going to use a lot of known styles; what matters is what you do with them. For the record, the most accurate list of Bernstein's stylistic backgrounds that I have seen was Michael Steinberg's, in the *Boston Globe*: "Stravinsky's *Les Noces* right at the beginning and several times thereafter; blues; spirituals; rock; jazz; Broadway; Renaissance a cappella; Anglican; Mahler; Copland western."

Steinberg also comments on the non-Latin texts, referring to their "diction of painful banality," and others called attention to this as well (how much you heard evidently depended upon where you sat in relation to the speakers; the amplification of the voices at the performance was often obfuscating). Especially on the recording, where these texts come through very clearly, they seem to me to be the weakest aspect of Mass—and I am unable to convince myself that this banality of diction is purposive; there may be a lot of rock songs with corny lyrics, but this is not a necessary characteristic of the idiom, and just as Bernstein has written intriguing and sophisticated rock music, so he and Stephen Schwartz should have come up with compatible lyrics.

At least they didn't write the line one writer quoted (and from which he developed an entire trope of contemporary significance): "Haven't you ever seen an acid head before?" (for "acid head," read "accident!"). And, in case you read somewhere (the *New York Times* or *Opera News*, for example) that at the work's climax the Celebrant "destroys the Cross," don't worry—that was no Cross but a monstrance, a sort of reliquary used for rec- temporary significance): "Haven't you ever seen an acid head before?" (for "acid head," read "accident!"). And, in case you read somewhere (the *New York Times* or *Opera News*, for example) that at the work's climax the Celebrant "destroys the Cross," don't worry—that was no Cross but a monstrance, a sort of reliquary used for the display of the Host, and the action here involves a rejection not of Christ's Passion but of the second-remove symbolic apparatus of Catholic ritual. Such misunderstandings, natural enough under the circumstances of the premiere, tend to vitiate the interpretations and evaluations of *Mass* that are based on them.

What about the "message"? Harold Schonberg put it
fairly accurately: "What the world needs, says the Mass, along with Ludwig van Beethoven about 150 years ago, is the brotherhood of man." Later on, he questions the value of this: "... love and the brotherhood of man will not solve our problems. Better housing, jobs for everybody, and adherence to the Bill of Rights will do a lot more." Perhaps—but are the idealistic and the pragmatic so mutually exclusive? As I write this, some people out in Forest Hills are demonstrating, in a fairly unbrotherly way, against housing for poor people, and there are a few unions around the country who behave rather unfraternally when it comes to job opportunities for minority groups. Doubtless brotherly love isn't enough, but its opposite is one of the problems we have to contend with. If Mass gets that message across to a few people, it will have achieved something. And was Beethoven wasting his time in the Ninth Symphony?

There remains the question of taste—is Mass a piece of slick Broadway hokum, or a sincere expression of a crisis of faith? I can't answer that for you, because it is a question of taste, although masquerading as a question of fact; all those words are value-loaded. To me it asks its questions clearly, and it asks them with music as well as with words, in some hundred minutes of never-boring inventiveness. That in itself is quite an achievement—there aren't many pieces that long these days, and most of them are padded and/or boring—and I am full of respect for it, even granting some obvious weaknesses. "Original," in some conventional sense, it may not be—but anyone can kill musical time with previously unheard sounds. Mass is rather an original conception, and worth meeting on its own terms; it does not merit dismissal on the basis of someone else's hurried first hearing. Hear it yourself—better still, see it if you can.

WITH THIS RECORDING Leonard Bernstein's Viennese triumphs may be said to achieve a climax. What Columbia has done is to accord more or less permanent landmark status to the most successful single production at the Staatsoper since Herbert von Karajan walked out in 1964. A notable fact of performing history has now become a perennial experience. Henceforth it will be possible to find out what it was in April 1968 that provoked such adulation, such scenes of enthusiasm, what caused the Viennese to act as though at long last they had rediscovered a musical savior.

Vienna, though it loves its singers, has always accorded pride of place to the conductor. The history of the Staatsoper can be adumbrated by listing names like Mahler, Strauss, Schalk, Krauss, Weingartner, Walter, Böhm, and Karajan. A great deal of the house's latter-day woes can be traced to its lack of a first-rate music director. Bernstein's Falstaff in 1966 was the first sign that the post-Karajan decline in standards could be halted. At a time when Vienna seemed to have lost the knack of artistic success, Bernstein showed them that the great days could be revived.

Enormously successful as the Falstaff was, however, it was eclipsed two years later by the Rosenkavalier. Whereas Falstaff is a great opera, Der Rosenkavalier (for all that its composer was Bavarian) is a part of the national consciousness. Like The Adventures of Huckleberry Finn for us Americans its importance transcends culture. Der Rosenkavalier has helped to shape the Austrian identity. Originally, during the years immediately preceding the outbreak of war in 1914, the opera awakened nostalgia for a more glamorous and exciting society than people took their own to be. Now, after two world wars, Der Rosenkavalier seems to us like a glimpse of a completely vanished civilization—ironically enough, especially that of the halcyon time before World War I. For the Austrians, stripped of power and confidence, a nation of skiers, opera-goers, and tourist-welcomers, the work is a perpetual reminder of the glorious past, of what things were like when times were good.

The Viennese, in particular, are conservative, not to say retrogressive. Having initially given Der Rosenkavalier a scathing critical reception ("... a hullabaloo... unworthy... Ochs is a cesspool Don Giovanni... it should be called 'A Comedy Against Music'") they now regard it as a necessary antidote to the present.

Der Rosenkavalier—
a landmark of performing history becomes a perennial experience.

by Dale Harris
All the more wonder that Bernstein was able to sweep every-thing before him. Despite inevitable objections that no "outsider" could understand the work's character, its mixture of affection and irony, Bernstein gave the audience (and most of the critics) exactly what they had so often sought in vain after Karajan's departure: an evening of such superlative music-making that they felt they were hearing a familiar work with newly fashioned ears. In addition, Bernstein brought so much love, so much enthusiasm to his conducting that he seemed to be anticipating the Viennese sense of identification with this opera. He became the hero of the hour, the restorer at a single blow of the Staatsoper's fortunes.

In every essential respect this recording is a recapitulation of the Staatsoper production. Of the soloists only the Sophie, the Faninal, and the Italian Singer are new. Most of the bit players are as they were. The orchestra and chorus are the same. The result is an irreplaceable sense of common purpose which no ad hoc recording can ever display. Everybody knows what he is up to and is thoroughly in his part. The Marschallin's levee and the final riot at the inn are, curiously enough, not the last word in musical accuracy or hair-trigger timing; they are, instead, brimming with animation and character, like a Hogarth come to life. It is in places like these that Bernstein's genius for large-scale effects really tells. The absolute mastery he shows over his forces gives an incomparable brio and confidence to all the ensembles—from the tricky passage for the Marschallin's four footmen at the end of Act I, to the scene in Act II where Ochs's servants rampage through Fannal's house, or the tumult that follows upon Octavian's wounding of Ochs. The same confidence can be felt throughout the entire performance. The attack and variety are constantly astonishing.

In Vienna the parlando sections in which the opera abounds were remarkably spontaneous in effect. Everything seemed to flow in response to the text and the action. Bernstein's subtle use of rubato created a feeling of complete naturalness; it was as though Marschallin, Octavian, Sophie, Ochs, and Faninal all conceived their lines at the moment of uttering them. In the interim between performance and recording some of this naturalness has evaporated. What was once buoyant now on occasion sounds studied, what was easy often sounds slow. It may be that the recording studio has inhibited Bernstein, it may be that his first thoughts on the opera were better. Whatever the reason, it is hard not to feel that the work has been immobilized during some of the exchanges between the Marschallin and Octavian in Act I, or in the Presentation of the Silver Rose. In this respect the rival Solti recording (London) is preferable. Solti keeps everything moving. There is a mercurial flow to his performance that counteracts the heavyhandedness of some of the Strauss-Hofmannsthal effects. Solti seems to have listened to the Marschallin: "Leicht muss man sein, mit leichtem Herz und leichten Händen"—one must take things lightly, with a light heart and a light touch. Bernstein is no less capable of this kind of conversational ease (e.g., the Octavian/Sophie exchange after the rose has been presented), but he chooses not to employ it so consistently.

The reason, I think, is that Bernstein is after something very different. Solti's Rosenkavalier is a thoroughly satisfying performance: swift, ebullient, graceful, tender, a recording to live with during all seasons. Bernstein cuts deeper. There is nothing in Solti as ravishing as Bernstein's handling of Octavian's shy plea to Sophie in Act III, nothing as rhythmically fulfilling as Bernstein's rubato when the Marschallin broaches the subject of a Rose Bearer to Ochs in Act I. The great moments, in any case, are by and large extraordinary: the monologues in Act I certainly, the waltz for Ochs at the end of Act II, the trio in Act III. The latter is almost a paradigm of Bernstein's methods here. He begins very slowly, with what seems unconscionable gravity, and without significantly varying the tempo he gradually begins to build, in rhythm, in dynamics, in orchestral coloration, so that at the climax, supported by a prominently emphasized trumpet, the voices ring out with incomparable expressive power.

For many it will seem perverse to concentrate thus on the conductor at the expense of the Marschallin, but there can be little doubt of Bernstein's ascendancy in this venture. Christa Ludwig is a fine Princess von Werdenberg, passionate, understanding, and above all, womanly. Her gift for expressivity has never been more evident. She has the ability to color her voice so that the varying moods of the Marschallin are vividly projected. Some of her effects are unforgettable: the smile as she begins to converse with Octavian in Act I, her melancholy introspection after the departure of Ochs, her courage and nobility in Act III as she repeats the phrase "Heut oder Morgen oder den überrächten Tag." Against this must be placed a vocal timbre whose mezzo coloration makes for less gracefulness, more heaviness, than are ideal in this role (it should never be forgotten that the first Marschallin, Margarete Siems, was a high soprano who created Zerbinetta a year later), and several moments of dubious intonation. Her voice shows an occasional tendency to sharpen toward the top of the staff and this spoils several climactic passages—for example, the long-held G on "Rose" at the end of Act I.

Whatever reservations there are about Ludwig, however, fade into nothingness beside the performance of Gwyneth Jones as Octavian. Jones begins badly; she continues badly; she ends badly. She now sings, especially in the upper-middle range, with real laboriousness. The opening exchanges with the Marschallin are strained and only rarely accurately pitched. Many of her sustained notes have a disconcertingly hooty sound that makes her ensemble singing unpleasant to hear. It would be invidious to speak of characterization, of vocal coloration, or of verbal subtlety in circumstances of this sort. Jones has enough to do simply to stay afloat. She is a sad example of too-soon exploited talent. In Rosenkavalier she seems to be floundering in the wreckage of what should have been a fine career.

As part compensation for Jones, perhaps, the Sophie of Lucia Popp is superb. Popp has a high, flexible light soprano with a wonderfully placed top register and the ability to sing with ease pianissimos above the staff. Her combination of absolute vocal security and radiance of tone creates an exhilarating effect in this music. She also has a feeling for the text and a sense of the young girl's character.

Walter Berry's Ochs is a very successful portrayal. He avoids all the obvious pitfalls, the various vulgarities that have crept in over the years. Berry seems to have taken to heart Strauss's assertion that Ochs is a rustic beau rather than a proletarian lout. But in so doing Berry has lost touch with some of the essential earthiness
of the character. Unlike Manfred Jungwirth (London) he doesn't relish his lines enough; he is too well mannered to enjoy himself sufficiently. Berry sings the part infinitely better than Jungwirth. Berry's low E in Act II is magnificent, the high E flat on "Heu" in Act I superb. All that is missing is adequate relish.

Placido Domingo's Italian Singer is a luxurious adornment for the cast, though the music suits him less well than one might have expected. Moreover, he is a little careless in fitting his words to the notes.

The Vienna Philharmonic plays with love and skill. In this opera they are incomparable. The string tone is especially warm and rich, the woodwinds and horns marvelously deft—as indeed they are for Solti. The new recording, however, is less successful. There is a great deal of presence but at times the singers sound too closely miked. On the other hand, all the effects of depth are brilliant: the levee, the fracas at the inn. Particularly wonderful are the distant voices crying "Ro-fra-nó" in Act II before Octavian's arrival, and the ravishing waltzes overheard from the assignation chamber.

Bernstein's only real rival is Solti. The Angel recording sounds sonically dated now and except for Ludwig's Octavian the performance hasn't withstood the ravages of time very well. The Richmond set is a mono recording. With its glorious Octavian and superb aristocratic conducting by Erich Kleiber it is, none the less, indispensable.

For a satisfying over-all view of the opera Solti is probably preferable to Bernstein. Apart from anything else, he presents the score absolutely complete, whereas Bernstein (like Karajan) annoyingly observes all the usual stage cuts. What makes the Bernstein worth cherishing, however, is the depth of feeling he finds in the work. It was to this quality above all that Vienna responded. In his performance on disc there are also, passages of such eloquence and insight as to make one feel one has never heard the music before.

**Strauss, R.: Der Rosenkavalier. Gwyneth Jones (s), Octavian; Luca Popp (s), Sophie; Emmy Loose (s), Marianne Leitmetzen, Christa Ludwig (ms), Marschallin; Margarita Lilowa (ms), Annina; Placido Domingo (t), A Singer; Murray Dickie (t), Valzacchi; Erwald Alchberger (t), Fandan's Major Domo; Mario Guggia (t), Animal Vendor; Walter Berry (b), Ochs; Ernst Gutstein (b), Fandan; Harald Proghof (b), Marschallin's Major Domo; Herbert Lackner (bs), Police Commissioner; Ljubomir Pantscheff (bs), A Notary; Vienna State Opera Chorus, Vienna Philharmonic Orchestra, Leonard Bernstein, cond. Columbia M4X 30652, $24.98 (four discs).**

by Miles Kreuger

**The Broadway Composer**

DURING World War II, the rest of the world may have been going to hell, but New York City was paradise. The economic blight of the depression was a thing of the past, and New Yorkers, eager to forget war stories that filled the airwaves and newspapers, indulged with greater frenzy than ever in tasting all that the great city had to offer.

All the architectural landmarks that have since been reduced to rubble were still standing in all their majesty. Public museums were still free, and the Museum of Modern Art cost only thirty-five cents for adults and fourteen cents for children. The Empire and Ziegfeld theaters were still active. The Metropolitan Opera House retained its great musical heritage on Broadway and Thirty-ninth Street, and Radio City's Center Theatre was still the home of extravagant ice shows. Times Square movie palaces like the Roxy, Loew's State, and Capitol were offering live stage shows along with a movie, newsreel, and cartoon for under a dollar in the mornings. And all the big-name bands and top vocalists could be heard amid the bobbysoxers' squeals of ecstasy at the Paramount if you didn't mind waiting in line for an hour or two. Jazz, ranging from Basin Street to boogie-woogie to bebop, was the specialty of the
such detail that it evokes an almost philosophic attitude toward its subject matter. This rare experience in commercial theater can occur only when composer, librettist, director, choreographer, and all the other creators involved become as one. Thus two of On the Town’s creators who go largely uncredited on this album deserve mention: Jerome Robbins, who developed the choreography for his ballet Fancy Free into the over-all scenario for the musical, and George Abbott, sage veteran director who helped Broadway newcomers Leonard Bernstein, Betty Comden, and Adolph Green fashion their first show with economy and structural impact.

Comden and Green, father Knickerbocker’s most devoted Boswells, have not only penned lyrics that range from the witty to the incredibly wistful, but their libretto has the tidy, cyclic construction and taut concision of the finest farces. From Plautus to The Italian Straw Hat to On the Town, the construction of the chase-farce is the same. A situation is established in which a normal sense of order has been unbalanced (in this case the arrival of the sailors). There is a disruption of normal activities wherever the protagonists go, simply by the nature of their being there. Events grow wilder and increasingly out of control until order is entirely upturned (the frenzy at Coney Island). Then having been righted, normality once again resumes (the return to the ship). Like a piece of music in which a theme is established, developed, and then resolved, On the Town is drawn with clean design; and to alter even one word of dialogue or lyrics or a note of music is to weaken the pattern.

When the show first opened on December 28, 1944, a fashionably tardy Christmas present for theatergoers, it somewhat preceded the trend of original cast recording. Decca issued a 78-rpm album containing a handful of selections by Nancy Walker, Comden and Green, and Mary Martin (who was not in the cast). Somewhat more interesting was RCA Victor’s album of ballet music, conducted by Leonard Bernstein, with vocal assists by the Robert Shaw Chorale. The Victor album used the pit orchestra and the original Bernstein/Hershy Kay instrumentation to capture the feeling of some of the dance interludes. But a satisfactory album of this remarkable work was still in the future. When MGM filmed On the Town in 1949, many of Leonard Bernstein’s melodies were replaced by those composed by Roger Edens, with new lyrics by Comden and Green. Gene Kelly, Frank Sinatra, and Jules Munshin played the sailors and Vera-Ellen, Betty Garrett, and Ann Miller their girls. An MGM sound track album was announced, but perhaps because of contractual difficulties in wringing Sinatra away from Columbia, not even a single from the film score was issued. In 1959, English Columbia fairly successfully re-created the film score with new singers whose voices were picked to match those of the movie stars. This is the only album on which the Edens songs appear. Harold Lang, William Hickey, and Joe Bova were the sailors in an Up to her place; the earthy taxi driver virtually drags the most innocent of the sailors’ Up to her place; and the aspiring ballerina expresses herself in dance. Even the transition from comic gaiety and the exuberance of new-found romance to the melancholy of imminent departure is conveyed through music.

Nancy Walker, one of Broadway’s most inexplicably neglected comic originals, is in splendid form singing Swing for Your Supper from The Boys from Syracuse will note composed for the score except the overture. So much music was recorded in fact that not all of it could fit on a single LP. Two songs, I Understand sung by George Gaynes in the brief role of Pitkin and Do Do Re Do sung by a group of girls at Carnegie Hall, had to be deleted from the final album. Handsomely packaged with a booklet containing many photos of the original show, On the Town was a recorded delight, with excellent sound and stereo separation. Although this set is still momentarily available, Columbia, inspired by the current Broadway revival, has remastered and reissued the album. This new packaging is somewhat more modest and the vinyl disc a great deal thinner, but fans of show music will be overjoyed to discover that Columbia has restored one of the two long lost numbers. For the first time, Do Do Re Do can be heard on discs. Those familiar with Steve Sonheim’s You Can Drive a Person Crazy from Company and Rodgers and Hart’s Sing for Your Supper from The Boys from Syracuse will discover that all three are cut from similar cloth, as swirly, close-harmony ditties performed by small female vocal groups. Reputedly, Bernstein himself asked Columbia to delete Pitkin’s song, although the company had planned to include that too on the current reissue. The additional material has been made possible by Columbia’s advanced techniques in variable-pitch cutting, which were not developed quite as far a decade ago. In an age in which long-playing records are growing shorter and shorter, it is of considerable comfort to be able to report that the album of On the Town runs just a few seconds short of an hour, a generous portion for the money.

From the joyous, propulsive opening number, New York, New York, the score sets a galloping pace that can be felt on records even without seeing the show. Each sailor establishes his individual personality at once by the choice of things he wants to experience in his few hours in town. Similarly, each of the girls is given her moment to express herself in song. The lady anthropologist sings of how she loses her capacity to reason and gets Carried Away; the earthy taxi driver virtually drags the most innocent of the sailors up to her place; and the aspiring ballerina expresses herself in dance. Even the transition from comic gaiety and the exuberance of new-found romance to the melancholy of imminent departure is conveyed through music.

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Nancy Walker, one of Broadway’s most inexplicably neglected comic originals, is in splendid form singing the tunes from her best Broadway show. Her show-stopping I Can Cook Too, a catalogue of her own virtues, and Come Up To My Place spring to life with spontaneous good humor. The refreshing ballads are capably sung by John Reardon, whose formally trained voice lends an air of legitimacy to the largely comic proceedings. Yet Comden and Green prove once again that they are the supreme interpreters of their own songs.

Except for a reference in the lyrics to New York’s air as “sweet,” the score is entirely undated and just as vital as it was when it first burst across the boards of the Adelphi Theatre over a quarter of a century ago.

**ON THE TOWN**

*Book and Lyrics by Comden and Green; Music by Leonard Bernstein; orchestrations by Hershy Kay and Leonard Bernstein. Nancy Walker, Betty Comden, Adolph Green, Cris Alexander, John Reardon, and George Gaynes, vocals: orchestra, Leonard Bernstein, cond Columbia S 31005, $5.98 (from Columbia OS 2028, 1961).*
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The one exception Albright allows is Messiaen, whom he credits with "radicalizing" the approach to organ writing and spurring the interest of many present-day composers. And it does seem that the last few years have seen the appearance—and acceptance—of a greater number of composers and performers interested in new music for the organ. Surprising though it may seem, within just the last couple of years there have been quite a few new publications of music for various combinations of organ, electronic tape, voices, strobe lights, etc. by composers like Daniel Pinkham, Richard Felciano, Donald Erb, and others; these works, I am told, are selling quite well to churches all around the country. Clearly an audience already exists, and seems to be growing.

William Albright represents on these two records by four major works. At the risk of oversimplification. Albright's chief interest in each piece is to exploit thoroughly the vast tonal or color possibilities of the organ, and in this attempt he frankly acknowledges his debt to Messiaen. This means, of course, that very broad tessitura and dynamic extremes are explored, often in very rapid succession, as are contrasts in articulation and punctuation. Fortunately Albright manages to avoid most of the gimmicky "effects" that are so tempting and easy to achieve even by a novice at a modern organ console.

The instrument used on both these recordings, and apparently the one for which Albright's pieces were written, is the huge four-manual Aeolian-Skinner in the Hill Auditorium at the University of Michigan. Albright maintains that the pieces can be performed equally well on many different instruments, including "mechanical action, neobaroque installations," but he seems to me that much of the essence of the compositions depends on the electromechanical appurtenances of the large romantic organ: especially two enclosed divisions for the often rapid dynamic dotting, and a large number of combination pistons for the many rapid stop changes. Albright's own spectacular gifts as a performer contribute much to the success of these pieces whose extreme technical demands would surely intimidate many a lesser organist.

The Bolcom piece, Black Host, is an altogether different affair—unusual, fantastically exciting and ultimately very moving. I instantly fell in love with it, as has everyone I could play it for. The piece resembles a collage, but with a very clear and easy-to-follow thread unifying the entire work. It opens with some heavy, dissonant, and widely spaced chords followed by some light, fast, and skittish music which eventually leads to a terribly serious, tonal though twisted passacaglia or terry music which eventually leads to a terribly serious, tonal though twisted passacaglia. Here, if we cared to, we could easily imagine some kind of bizarre black Sabbath rite described in the accompanying notes. After a few lines of largely improvised tolling of tubular chimes, the organ slips into an incredibly spirited 1920's two-stop organ. It is generally suspected that all of Bach's harpsichord concertos are keyboard transcriptions of earlier (usually) violin concertos, and in many cases the originals are as well known as the transcriptions. The D minor concerto for two violins, S. 1043 on this record, for instance, is the earlier form of another C minor concerto for two harpsichords, S. 1062. In the opinion of Franz Giegling, and others perhaps, the S. 1060 concerto is a reworking of the lost concerto for violin, oboe, and strings, and he offers herewith his reconstruction of the postulated concerto. Bach's keyboard transcriptions were always made in a key one step lower than the string original; thus, Mr. Giegling's choice of the key of D minor for his reconstruction. I need say no more than that his work is entirely convincing.
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C.F.G.

BACH: Two-Part Inventions, S. 772 (complete); Three-Part Inventions, S. 801: in C; in C minor; in E flat; in G minor; in A minor; in B flat; in B minor; Concerto in D after Vivaldi, S. 972. Wanda Landowska, harpsichord. RCA Victor LM 2389, 1959.

This is a re-release of the two-part and three-part inventions recorded by Landowska and previously issued in a memorial album shortly after her death in 1959. She was in the process of recording all the three-part inventions at the time of her death (the two-part had already been completed), but unfortunately was able to finish only seven of them. This explains the inclusion of Bach's transcription for harpsichord of Vivaldi's D major Concerto, originally for violin and orchestra and one of the Estro Armonico. (On the earlier disc this side was filled out with a short talk by Madame Landowska on the two-part inventions, this part of the liner notes.)

Landowska's reading of these pieces holds up very well, seeming as fresh today as ever. The rhythmic aspect of her performances may well bother some purists, but her flexible approach is always done with such naturalness and genuine musicality that one never has an impression of willful distortion. It is beautiful Bach, clearly defined polyphonically, subtly varied in registration, and shaped with a flowing forward motion giving the lines an almost vocal quality. She was clearly one of the handful of really significant performers of the first half of the century, one who did perhaps as much as anyone to shape our attitude toward the performance of baroque music. It is good to have this disc (reissued, praise be, in its pure mono state) back again.

R.P.M.

BERNSTEIN: Mass. Soloists; various choruses and instrumentalists, Leonard Bernstein, cond. For a feature review of this recording, see page 73.

BOLCOM: Black Host (1967) for Organ, Percussion, and Tape—See Albright: Organbook II (1971) for Organ and Tape.

BRITTEN: Owen Wingrave. Sylvia Fisher (s), Miss Wingrave; Jennifer Vyvyan (s); Mrs. Julian, Heather Harper (s), Mrs. Coyle, Janet Baker (ms), Kate Julian; Peter Pears (t). Sir Philip Wingrave and Narrator; Nigel Douglas (t), Lechner; Benjamin Luxon (d), Owen Wingrave, John Shirley-Quirk (b), Mr. Coyle; Wandsworth Boy's Choir; English Chamber Orchestra, Benjamin Britten, cond. London OSA 1291, $11.96 (two discs).

Like every new Britten work since War Requiem, Owen Wingrave was acclaimed by the British press after its televised premiere last May as an article inscribed on the holy tablets and handed down from heaven—surely there must be a mean between the uncritical adulation Britten receives at home and the rather offhand treatment accorded him in this country. Owen Wingrave is unlikely to put any pressure on the composer's weaker operas, and I Wholeheartedly respond to Peter Grimes, Albert Herring, Billy Budd, and The Turn of the Screw.

The problem certainly has nothing to do with the opera's television origins. Britten and his librettist, Myfanwy Piper, have used the medium smoothly, if with no great imaginative originality, and the BBC production of last May was quite brilliantly carried off. It's the very stuff of the libretto that seems to me at fault. Henry James's short story is sketchy in itself and although the characters and events have been fleshed out considerably, there is still not enough meat here. Owen's refusal to follow the Wingrave soldiering tradition is all very well and his conflict with the family, both the living and the dead, carries the kernel of a real drama. But everything functions in a vacuum: We never know exactly what Owen stands for—his pacifism, only vaguely defined, is backed by little more than flowery and none too convincing rhetoric. After a while he merely becomes an obstinate, slightly priggish bore and almost as...
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unsympathetic as his relatives. As gustily and meaninglessly as war strikes us today, one can't help wondering where England would have been in 1940 had the Wingraves taken charge. I don't wish to sound like a red-necked militarist; the point is that Britten's antiraw gesture within the dated context of this opera is embarrassingly feebly.

If Owen fails as a forceful protagonist, his relatives remain merely a parcel of incredible one-dimensional caricatures: Each one of them—Owen's grandfather Sir Philip, his battle-axe aunt, his insane Kate, and his hysterical mother—present a single personality trait that is hammered at with tiresome persistence. True, Kate shows signs that she does have some slight regard for Owen shortly before gaoling him to his death in the "haunted room"; but after being built up as the most vicious bitch since Miss Davis' heyday, her sudden reversal carries little conviction. Oddly enough, only Owen's tutor and his wife. Mr. and Mrs. Coyle, emerge as believable characters, probably because they have a real dilemma, wedged directly between two implacable forces.

Britten's score has its points of interest. The formal design is as immaculate as anything he has written (Donald Mitchell's lucidly perceptive analysis in the libretto booklet goes into this at some length), and the soundstage of the fifty-piece orchestra is predictably brilliant. But nowhere do I feel a spark of passionate identification with the drama—it's difficult to believe that Britten's feelings were ever actively engaged except on an extremely objective level. The subject of Owen Wingrave contains all the familiar Britten themes of pacifism, lost innocence, and the individual pitted against an unsympathetic environment, but in this case they do not seem to have elicited a deep response.

With two exceptions, the cast—all well-known members of the composer's musical family—is magnificent. No one today composes with such an grasp of individual vocal character and potential as Britten, and each singer has obviously been handed tailor-made music. The lemons are Sylvia Fisher, much too far over the hill to deal with Miss Wingrave's dramatic utterances, and Nigel Douglas, whose strained tenor makes some most unpleasant noises as Leechmere. Owen's harrebrained fellow student, Janet Baker's coolly poised mezzo (Kate), Benjamin Luxon's sympathetic fellow student. Nigel Douglas, whose strangled tenor makes some most unpleasant noises as Leechmere, Owen's harrerbrained fellow student. Janet Baker's coolly poised mezzo (Kate), Benjamin Luxon's sympathetic fellow student. Nigel Douglas, whose strangled tenor makes some most unpleasant noises as Leechmere, Owen's harrebrained fellow student. Janet Baker's coolly poised mezzo (Kate), Benjamin Luxon's sympathetic fellow student. Nigel Douglas, whose strangled tenor makes some most unpleasant noises as Leechmere, Owen's harrebrained fellow student. Janet Baker's coolly poised mezzo (Kate), Benjamin Luxon's sympathetic fellow student. Nigel Douglas, whose strangled tenor makes some most unpleasant noises as Leechmere, Owen's harrebrained fellow student. Janet Baker's coolly poised mezzo (Kate), Benjamin Luxon's sympathetic fellow student. Nigel Douglas, whose strangled tenor makes some most unpleasant noises as Leechmere, Owen's harrebrained fellow student. Janet Baker's coolly poised mezzo (Kate), Benjamin Luxon's sympathetic fellow student. Nigel Douglas, whose strangled tenor makes some most unpleasant noises as Leechmere, Owen's harrebrained fellow student. Janet Baker's coolly poised mezzo (Kate), Benjamin Luxon's sympathetic fellow student. Nigel Douglas, whose strangled tenor makes some most unpleasant noises as Leechmere, Owen's harrebrained fellow student. Janet Baker's coolly poised mezzo (Kate), Benjamin Luxon's sympathetic fellow student. Nigel Douglas, whose strangled tenor makes some most unpleasant noises as Leechmere, Owen's harrebrained fellow student. Janet Baker's coolly poised mezzo (Kate), Benjamin Luxon's sympathetic fellow student. Nigel Douglas, whose strangled tenor makes some most unpleasant noises as Leechmere, Owen's harrebrained fellow student. Janet Baker's coolly poised mezzo (Kate), Benjamin Luxon's sympathetic fellow student. Nigel Douglas, whose strangled tenor makes some most unpleasant noises as Leechmere, Owen's harrebrained fellow student. Janet Baker's coolly poised mezzo (Kate), Benjamin Luxon's sympathetic fellow student. Nigel Douglas, whose strangled tenor makes some most unpleasant noises as Leechmere, Owen's harrebrained fellow student. Janet Baker's coolly poised mezzo (Kate), Benjamin Luxon's sympathetic fellow student. Nigel Douglas, whose strangled tenor makes some most unpleasant noises as Leechmere, Owen's harrebrained fellow student. Janet Baker's coolly poised mezzo (Kate), Benjamin Luxon's sympathetic fellow student. Nigel Douglas, whose strangled tenor makes some most unpleasant noises as Leechmere, Owen's harrebrained fellow student. Janet Baker's coolly poised mezzo (Kate), Benjamin Luxon's sympathetic fellow student. Nigel Douglas, whose strangled tenor makes some most unpleasant noises as Leechmere, Owen's harrebrained fellow student. Janet Baker's coolly poised mezzo (Kate), Benjamin Luxon's sympathetic fellow student. Nigel Douglas, whose strangled tenor makes some most unpleasant noises as Leechmere, Owen's harrebrained fellow student. Janet Baker's coolly poised mezzo (Kate), Benjamin Luxon's sympathetic fellow student. Nigel Douglas, whose strangled tenor makes some most unpleasant noises as Leechmere, Owen's harrebrained fellow student. Janet Baker's coolly poised mezzo (Kate), Benjamin Luxon's symp...
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**The Elusive Michelangeli**

by Harris Goldsmith

Considering his eminence in pianistic annals, Arturo Benedetti Michelangeli has made remarkably few recordings. An unstimting perfectionist and something of an eccentric as well, this legendary artist lives in a state of semi-reclusiveness, giving lessons to a few chosen students and playing concerts when the whim hits him (he has undoubtedly canceled at least as many performance appearances as he has made). A new Michelangeli recording, thus, is always news and this time the headlines go to DGG, who has, by hook or by crook, managed to sign the pianist in question to a long-term contract. Quite understandably they are proud of their catch and have lost no time in making the first results available to the record-buying public.

I might add that you might want to investigate the bait before you swallow hook, line, and sinker—as it happens, one of the offerings is an economic outrage I am, of course speaking of the Beethoven release. An entire 12-inch disc devoted to but one early Beethoven sonata and selling at top $6.98 price to boot is a proposition that I, personally, find offensive. Does the company really believe that Michelangeli is worth twice as much as Kempff? Or is this just a bitter example of the arrogant cynicism recently displayed by RCA when they issued a new Heifetz record with less than thirty minutes of music?

Be that as it may, Michelangeli as a Beethovenian is not my cup of tea. His rendition of the great Op. 7 sonata is, to be sure, remarkable as sheer pianism. The painstakingly detailed and ultra-clarity of partwriting are amazing and provocative. Inner lines emerge from the fabric with a spatial immediacy, the result of endless hours of drudgery and experimentation. Yet is it really desirable for each strand of sound to come forth in glorious technicolor? Must every detail unsuitably pounce upon the unsuspecting listener like a fierce panther upon its prey? And certainly, Michelangeli's tempos are all wrong. His slow, creeping account of the first movement of Op. 2, No. 3, which I heard recently on a private reel tape, is repeated here in the first movement of Op. 7. The music becomes icy, static, and listless where it should plunge forward relentlessly. Another specific that turns me off is the way this pianist calculatingly introduces an extravagant, sentimentally languishing rubato. This post-mortem introduction of cosmetic "expressiveness" creates the image of the master embalmer at work. The slow-movement tempo, unlike that of the first, is right on, but once again the musical impulse, the continuity of pulse, is missing. The phrasing is clipped, stilted, and perfunctory. The Minuet—which Kempff makes so lovely, lilting, and Schubertian—is languid and lovelessly formalistic while the final Ronde is put into deep freeze. If you like your Beethoven picked in formaldehyde, Michelangeli is your man.

In the realm of Rachmaninoff and the French Impressionists, though, Michelangeli is a giant. His disc with the Debussy Images and Children's Corner belongs in every extency piano collection. The sheer and clarity of the playing are as noticeable here as in the Beethoven—and far, far more appropriate. Even the inevitable idiosyncratic Michelangeli whines are happily absorbed by this music. The Images are particularly ravishing. Michelangeli's Poissons d'or are large, aristocratic creatures: his bell tolls through the leaves with ghostly impact: and his wheel spins and churns with unbroken momentum in Mouvement. The control of the pedaling gives all sorts of half tints while never obscuring the brilliant clarity and structure of the pianism. In the Children's Corner some might prefer a lighter, more fanciful hand. Dr. Gradus is pretty fearsome in the present performance (it sounds more like a top-to-bottom traversal of the Empire State Building rather than a tour of the keyboard). The Little Shepherd, as Michelangeli depicts him, seems to have forsaken the wooden flute for a resplendent trombone. Golling does his Cakewalk with some decidedly fancy stepping (and wide extremes of tempo). Charm, in a word, is lacking, but brilliance and imagination never are. The engineering brilliantly captures this player's thunderous dynamic range and color clarity. I hope that DGG will now be able to persuade Michelangeli to record his inimitable version of Ravel's Gaspard de la nuit.


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by Alfred Frankenstein

Nicolas Slonimsky's Historic Premieres

The title is quite just. These recorded premieres did make musical history for my entire generation, their importance in forming a taste for modern music cannot be exaggerated. That, at least, is true of the four bits of recorded incunabula that have been transcribed onto the first side of the present release.

This side contains Slonimsky's recording of Varèse's Ionisation, the Barn Dance and In the Night, both by Charles Ives, and Carl Ruggles' Lilacs. These were the first recordings of avant-garde American music ever issued. They came out in the early Thirties, and I seem to recall that they were practically the only recordings of avant-garde American music we had for years. We all played them over and over again; they formed the modernist musical horizon for the college crowd I traveled with--and for many a similar college crowd--and they were among the staples of my teaching when I joined the music faculty at the University of Chicago nearly forty years ago.

Ionisation came out on a 10-inch, 78-rpm Columbia record. The Ives and Ruggles pieces were among the first, if not the very first, of the New Music Quarterly Recordings: 12-inch, 78-rpm discs which Henry Cowell issued through Altec Lansing and New Music Edition four times each year.

All four compositions have since been recorded several times by modern techniques, and one does not advise the purchase of this re-release for their musical significance. Their significance lies in discographic rather than musical history; they are records of old records and are to be listened to as such. Too bad that Ives, with his lively sense of acoustical antiquity, couldn't have found some way to incorporate them as such into a new work, as he incorporated many other paramusical devices into his scores.

All these recordings were done with pickup orchestras in New York. The Varèse is not so bad, partly because Columbia dealt with all the professional recording company and because Slonimsky got hold of some very good musicians to assist him in recording this famous percussive piece. The interpretation is not the liveliest in the world, yet you know the music is there. The Ives and Ruggles, however, squeak faintly through a thick smog of old-time needle scratch, and it is apparent that in the Barn Dance, at least, the instrumentation is the vaguest idea of what they were up to. This was not Slonimsky's fault; even with the best conductor in the world, an idiom as new as Ives's was then was surely have passed the understanding of an ad-hoc assembly of players.

In the 1940s there was an office of Inter-American Affairs in Washington, directed by Nelson Rockefeller, which ran up a cultural razzle-dazzle involving concerts, recordings, and publications of various kinds about the contemporary composers of South America. Their music wasn't very good, but it wasn't bad either, and since the whole thing had to do with international relations and the war and keeping the Nazis at bay, we all smiled and said, "How nice," and took it in stride, while from the point of view of the North American musicians who were involved, it was better than working, as the old saying goes.

Slonimsky was at the heart of this business and even wrote a book about it. The second side of his new Orion disc is a reprint of a 1941 Columbia release containing seven short South American things--six songs and one violin piece--by six different composers: Carlos Pedrell, Alfonso Broqua, O. Lorenzo Fernandez, Francisco Mignone, Jacobo Fischer, and André Sás. All are light and folksy; some exploit that thin, wistful sonority which today would be called the Andean sound; all the songs are performed by Olga Averino, Slonimsky accompanying, with captivating charm and spirit: and except for the wail of Alfredo San Malo's violin in the final piece, the recording does not show its age.

Orion lists the seven pieces of Side 2 in order on the label but there is no list of them on the jacket--if you want to know where you are, you either have to copy the list from the label or lift the needle after every hand. In this case neither activity is really worth the trouble, but in other cases such editorial carelessness is annoying.


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Buxtehude: Cantatas: Mein Herz ist bereit; O Gottes Stadt, Herr, ich lasse dich nicht; Ich suche des Nachts. Helen Donath, soprano; Theo Altmeyer, tenor; Jakob Stampli, bass; Bach Collegium of Stuttgart, Helmuth Rilling, cond. Nonesuch H 71256. $2.98.


Buxtehude cantata recordings are of sufficient rarity that each new addition to the discography is something of an event; for two to appear simultaneously might even be considered a trend. In any case, both these new recordings, though they represent very different approaches to the music, have much to recommend them and make a very interesting comparison.

Except for the one chorale cantata (Mit Fried und Freud on the Archive disc) all these works are for solo voices and instruments, and all the soloists are at least very good—often superb. Edith Mathis. Archive’s soprano, is the most dramatically effective of the lot, imparting real meaning and feeling to everything she does. Tenor Friedrich Melzer also on Archive, rates special mention for his virtuosic handling of the countertenor part. The other soloists, though, are consistently satisfying as well, and I have no reservations in praising them all.

The real differences between the two discs result from the respective conductors’ opposite viewpoints. Hans-Martin Linde, who is much better known as a flutist than conductor, leads a small, highly polished group of string players, and his technical difficulties and ensemble imperfections don’t exist. The only trouble is, they sound awfully prissy most of the time. They rarely play faster than moderato or louder than mezzo forte, as if their fiddles were made of egg shells and would shatter if any strain were applied. In addition to this deliberate and cautious playing, Linde apparently has insisted that his players give identical weight to each note of a moving, melismatic passage in the style that used to pass for the “pure baroque manner.” It’s all very clean and articulate, but also lacks rhythmic verve or intensity most of the time; this approach does not wear very well through two complete record sides.

If I have any complaints about Rilling’s performances on the Nonesuch disc, it’s that he goes too far in the other extreme. No pussyfooting purist, Rilling encourages the broad gesture, the dramatic moment, and the rich vibrant tone. His string players (a larger group than Linde’s) use full bows and plenty of vibrato and Rilling doesn’t worry himself with details of precise tempo relationships and the like. These are not ideal performances either, but they are considerably more engaging than Linde’s somewhat fussy and anemic readings.

Because of the special charms of all these works, I really recommend both records in spite of my reservations about each. Buxtehude’s cantatas of course exerted a strong influence on Bach’s early cantatas, but even

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if no Bach had followed, these works deserve a much broader audience than they now have.

C.F.G.

**Byrd:** First Pavan and Galliard; Hughie Ashton's Ground; Sixth Pavan and Galliard; Voluntary; Sellinger's Round. **Gibbons:** Fantasia in C; Allemande or Italian Ground; Lord Salisbury Pavan and Galliard. Glenn Gould. piano. Columbia M 30825. $5.98

I first heard Glenn Gould play William Byrd fifteen years ago. Hunched at the piano and lost in a private world of his own, he communicated a personal feeling about the music that was most affecting. At the time I was very moved. Today I find my feelings have changed somewhat and this recording is a bit of a disappointment. Perhaps it is because Gould is no longer there commanding my attention by his personal magnetism, perhaps it is because there is too much introspection for too long, perhaps these are not all very interesting pieces. It is hard to tell. Gould still approaches the music in a highly individual way and he is far too musical a person to be ignored, but he could certainly have made it easier for us all.

The repertoire on this disc was written for the virginals, a singularly inexpressive keyboard instrument popular at the time of Queen Elizabeth I. Gould of course plays the pieces on the piano which, as far as I'm concerned, is just fine if you can do it. He can. The trouble with most early music one hears on the piano is that the pianists cannot make it sound on the heavier action without being muddy. Now Gould is a magnificent technician. He can play staccato running passages and crisply styled ornaments so brilliantly that one would never imagine they were not designed for the piano.

There is probably no one in the world who can make polyphonic lines sound clearer on a keyboard instrument. And one cannot possibly accuse him of overdoing dynamic changes or using pianistic tricks; if anything he keeps within boundaries which are too strict.

Some of the sections are most satisfying, the rousing rhythms of Gibbons' Italian Ground for example, but the brilliancy of the Lord Salisbury Galliard. But for the most part Gould has chosen to give readings which are so private as to be almost in comprehensible. At some point in the metaphorical liner notes, the pianist refers to "a solitary B flat" appearing near the end of Sellinger's Round which, he claims, foretells a whole new era. This I think is symptomatic of the problem.

Gould is so deeply concerned with some kind of obscure aesthetic meaning in each piece that he loses sight of the purpose for which they were written; namely, to entertain. The long strings of cumulative variations which comprise works like Sellinger's Round and Hughie Ashton's Ground are virtuoso pieces that can build to exciting heights and end in a torrent of sound—let's say Elizabethan standards. Gould, on the other hand, often goes off in some private reverie getting quieter and quieter until I for one lose interest. The Lord Salisbury Pavane is slow as to be almost inaudible; Byrd's sprightly Voluntary closes on a very down note. How much more fun the record would be if Gould could only relax and dash off a stunner or two to bring us back or wake us up as the case may be. Keyboard artists of 1600 were virtuosos who didn't mind showing off. I wish Gould had done as much justice to this part of their character as he does to their musical inventiveness and originality.

S.T.S.

**Debussy:** Images pour orchestre: No. 1. Gigue; No. 2, Ibéria; No. 3, Rondes de printemps. Prélude à l'après-midi d'un faune. Boston Symphony Orchestra, Michael Tilson Thomas, cond. Deutsche Grammophon 2530 145. $6.98. Tape. £3.30. $18.7. $6.98

These are without doubt very good performances and would be entirely recommendable were it not for the existence of Boulez' even better versions. A great deal of the difference is in matters of orchestral balance and clarity, and one could cite a number of specific examples where the individual instruments carrying a line are more subtly blended by the French conductor and the textures therefore more transparently realized. In *Gigue*, Boulez' rhythms are marginally snappier, and he maintains a basic impetus under the overlapping tempos at the juncture of Ibéria's last two movements that seems to me far more effective than Thomas' virtual dead stop. One detail of playing in the Boston performance is particularly good, however: the little phrase for violins just before No. 59 in the last movement of Ibéria marked *un peu maigre* (a bit derivative) is spelled out with great wit and precision of character.

The recorded sound too lacks the clarity of Boulez', with a certain cavernous quality particularly deleterious to the flute tone in the
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**FAUVE,** which is otherwise a firm, smoothly transitioned reading. Incidental note: Thomas plays the three *Imagier* in the published order, with the fill-up at the end, while Boulez devotes one side to *Ibéria*, with Gigues. *Rondes de printemps*, and his filler (the *Dances sacré et profane*) on the other. In short, good, distinctive, and personal performances (I heard them with great pleasure in the concert hall last year), but not quite as good as the recorded competition.

D.H.

**DELUIS:** *Brigg Fair,* A Song Before Sunrise; *Marche-Caprice,* On Hearing the First Cuckoo in Spring; *Summer Night on the River;* Sleigh Ride, *Fenimore and Gerda*; Intermezzo. Royal Philharmonic Orchestra, Sir Thomas Beecham, cond. Seraphim S 60185, $2.98 (from Capitol SG 7116, 1960).

Perhaps the most appropriate way to welcome this collection of Delius pieces back into the catalogue would be to gather together a few fellow admirers of Sir Thomas Beecham and lead them in a rendition of the commercial carol once popular throughout England: "Hark! The herald angels sing!" Beecham's pills are just the thing! Two for man and one for child. *Peace on earth and mercy mild.* The pills in question, of course, were the liver capsules upon which the Beecham family fortune was built and inasmuch as the wealth they passed on to him proved therapeutic both to his career and to Delius*, the *laudato* to liver can reasonably be raised.

Sir Thomas lived into the stereo period and this recording contains some of the finest examples of his peculiar but effective conducting ever captured on disc. I listen to *Brigg Fair* for a test—Seraphim's remastering is sharp in detail and clear while still amply suggesting the impressionism *gouache* that Sir Thomas laid on this kind of music. In contrast with other Delius champions, Sir Thomas holds rather aloof from *Brigg Fair* and does not sentimentalize its rusticities. Barbirolli's final recording of the same work is, by contrast, heavily accented, thick in texture, and dawdling in pace. The Beecham touch in the other familiar pieces on the disc also gives them the nostalgic *lament* that has come to mean Delius to some listeners.

For those whose Delius collecting is not obsessive, the disc offers a fair sampling of the composer's work, early and late. Only a Beecham could make one listen twice to the 1888 items, *Marche-Caprice* and *Sleigh Ride,* but he certainly can, and this new pressing no doubt will soon be as worn as the old one. Here's to Beecham's pills. D.J.

**DONIZETTI:** *L'Elisir d'amore.* Joan Sutherland (s), Adina, Mura Casula (rs), Gianetto Luciano Pavarotti (t), Nemorino; Dominic Cassa (b), Belcore; Spiro Malas (bs), Dulcimara; The Ambrosian Singers, English Chamber Orchestra, Richard Bonynge, cond. London OSA 13101, $17.96 (three discs).

Most people are likely to be attracted to this set by the name of Sutherland. Her enthusiasm will not be disappointed. What they will find in addition is a superb Nemorino in Luciano Pavarotti, and no less important, a very winning account of the music from Richard Bonynge. In many ways this is the liveliest *L'Elisir* on disc. Whatever other limitations he may have as a conductor, Bonynge understands the period and gives the music the impetus it needs to come alive for contemporary audiences. Possibly his expertise in the ballet music of the same period (well represented on records, incidentally) has given him the appropriate lightness and sense of propulsion. Nothing is either ponderous or impatiently hurried. For once the score spares us, a feeling of good humor, of simple pleasure, emanates from the music. An important contributory factor is the opening of all the traditional performing cuts, as well as the restoration of the so-called *reprises* (at least for the soprano) of *Brigo.* The result is musically more spacious, but also more varied and therefore more effervescent.

All the other recordings are, by comparison, heavily cut, though the first London set loses so much of the ambience of the original that there is in fact an improvement on this second set. Even so, a complete recording in this form is hard to find. The question of the meaning of the opera remains open and will probably be decided largely by the London set of 1972. The Beecham version, however, does not end with the traditional *Credo* but with the ensembles, a change that was not made until 1931 when Beecham conducted it. But with performance that, until now, could be found only in machines exceeding $3000.

One of Bonynge's most important restitutions is an enchanting solo for Adina, "*Nel dolce incanto,*" after her duet with Nemorino in the final scene. This is the high point of Sutherland's performance—the voice here is open, free, and fleet. She shows an amplitude and flexibility that no other Adina on records can match. Elsewhere we are faced with the now-familiar tally: on the one hand a covering, inappropriately melancholy vocal coloration, poor enunciation of the text, occasional rhythmic sluggishness; on the other hand, brilliantly easy fioriture, radiantly free tone. But once we move above the staff, a sense of limitless reserves.

In this recording an extra minus and plus can be added: There is a slight but noticeable weakness in Sutherland's legato singing; there is also (doubtless because of the presence of Delius) an absence of the smoothness that affects her noncomic assumptions. But there is little surliness or wit. Her less vocally well-endowed rivals, Hilde Gueden (London I), Rosanna Carteri (Seraphim), and Mirella Freni (Angel) are preferable, though none really sings beautifully enough to fill out the contours of such music as "*Chiudi all'aura.*"

Luciano Pavarotti's Nemorino is a great success. Though his top notes have lost that astonishing refinement of a year or two back (his first B flat in the Italian Singer's aria from the London *Rosenkavalier* is like a burst of sunshine), the voice is actually in fine shape. The quality is more than he has since become. His later version (Angel) is predictably flatter, slower, stodgier. The venerable Tullio Serafin (Seraphim) is much more commuted, yet his view of Donizetti (like Gavazzeni's on the old Cetra recording with Nozzi and Theophilus) is more dispassionate than he was. Seraphim's *L'elisir* is not as richly textured as the Beecham, and its musical line is not quite as long as Delius but it is more buoyant and has a little more grace. The former is the better recording of the two for its finer detail, more convincing performance of the music. But the Beecham version is much better than the Beecham version.

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brings to “Ah! te soi io vedo” (Side 2). “Una furtiva lagrima” is well-sung, though one day Pavarotti will doubtless bring more light and shade to his big lyrical moments.

The rest of Bonyng’s cast is several cuts below this standard. Dominick Cossa, the Belcore, has a serviceable baritone, but neither the swagger nor the particular that the role requires. The declaration Belcore makes of his qualifications, “Son Galante e son sargiense,” goes for little. Either Panerai (Serafim) or Capecchi (London) are distinctly preferable. qualifications, “Son Galante e son sargiense,” goes for little. Either Panerai (Serafim) or Capecchi (London) are distinctly preferable in this role.

Spirito Malas as Dulcamara is even less at ease. He is a conscientious singer, but he simply cannot get his voice around the music with the necessary relish—nor, for that matter, can he get his tongue around the patter. His big scene, “Udite, o rustici!” makes no effect because Malas doesn’t know what to offer beyond the most elementary comic effects.

The outrageousness of Dulcamara has to be projected with more skill, more full-hearted energy, than this Capecchi (Angel) is a bit overripe in this role for my taste, Taddei (Serafim) a bit subdued. Corena (London), the firm-voiced, self-controlled Corena of several years back, is the best of all—a splendid buffo characterization of a loveable rogue.

Even with drawbacks the new London is worth getting. Its assets—the restorations in the score, Pavarotti, some of Sutherland, and especially the leadership of Bonyng—tend to carry the performance over the lapses. In sum, there is a lot of musical pleasure in this set.

D.S.I.

GABRIELI: G. Jubilate Deo (8 part); Magnificat; Surrexit Christus; Nunc Dimittis; Angelus ad Pastores; Regina Coeli; Jubilate Deo (10 part). E. Power Biggs, organ; Gregg Smith Singers. Texas Boys’ Choir; Edward Tari Brass Ensemble; Vittorio Negri, cond. Columbia M 30937, $5.98 Tape. • MA 30937. $6.98. • MT 30937. $6.98.

One of the most illuminating “insider’s” accounts of a novel recording project that ever appeared in this journal was John McClure’s wry saga [February 1965] of Columbia’s first audio odyssey to the Basilica of San Marco in Venice where Giovanni Gabrieli had been organist-composer for some twenty-seven years back (1637-1704), June 30, 1637-1704). The present fourth release ("The Glory of Venice") in the series returns to the vocal-and-instrumental format of the first one, and paired with impressive fervent 12-part double-choir Angelus ad Pastores (prefaced, as are two other motets, by a brief organ intonation) and the exciting 10-part Jubilate Deo. It may be niggling to complain that the earlier 8-part Jubilate Deo is soicky-thick-walled (even allowing for the difficulties in achieving lucidity in so reverberant surroundings), that some high-register vocal passages in the 14-part triple-choir Nunc Dimittis are unpleasantly shrill, and that Negri’s readings are often more romantically expressive than most musicologists will deem stylistically appropriate.

But there are more serious grounds for complaining about the lack of source-citations and the liner notes and indeed any detailed comment on the music itself—omissions not entirely compensated by the helpful inclusion of the Latin and English texts.

Since the disc and tape editions actually have been released simultaneously, it’s possible to note here that the cassette version—thanks to the fabulous technical progress of the last year or two—is practically a sonic spitting image of the disc in every respect save that of surface noise, and that, in Dolbyized playback, is very slight and velvety smooth. The 8-track cartridge edition is also very close technically, but it is characterized by more, or at least coarser-grounded, surface noise—a meaningless defect, however, in carbone listening.

K.D.D.

GIBBONS: Fantasy in C. Allemande or Italian Ground; Lord Salisbury Pavan and Galliard—See Byrd: First Pavan and Galliard, Hugue Ashton’s Ground; Sixth Pavan and Galliard, Voluntary, Sellinger’s Round.


Ormandy’s earlier “Hallelujah!” Handelian spectacular was for Columbia where he collaborated with the Mormon Tabernacle Choir. In that correspondence he praised the potential (yet as he described it, at some sacrifice in sound) that RCA falls back on instruments alone, and since poor Handel lacked all knowledge of both stereoism and post-Strausian instrumentation, the Philadelphia house-orchestra, Arthur Harris, has been called in—not to remedy the deficiencies of RCA but at least to “modernize” their scoring. Well, Harris is a very clever arranger/transcriber, as he demonstrated earlier and more extensively in the 1965 Philadelphia “Holiday for Orchestra” (Columbia MS 6757), he probably does as well as anyone could in rescuing a number of the best-known oratorio choruses. But the predominantly nonlegato brass and woodwind playing gets pretty tiresome even for wind-fanciers’ ears, and only the lightest, least pretentious examples—"For Unto Us a Child is Born" from Messiah and the first part

High Fidelity Magazine
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of "See, the Conquering Hero Comes" from Judas Macabæus—come off really well. Then, when it comes to rescoring the instrumental works, Ormandy's only transcription of thePassacaglia Symphony from Messiah, suffers from fatal sonic bloat; and if Harris' "Cuckoo and the Nightingale" movement from the Organ Concerto in F is acceptable, his reworkings of five movements from the Water Music offer no competition at all to the once-popular, six-movement Sir Hamilton Harry suite. In any case, the tablet of George Frederic has itself long ago forgot more about scoring-subtleties than any present-day arranger will ever learn.

For the rest, the orchestral playing itself is of Philadelphian sumptuousness despite the conductor's frequent heavy-handedness, and it is powerfully and lucidly recorded in the not especially warm acoustical ambience of the Scottish Rite Cathedral in Philadelphia. There are purportedly luminous liner notes in the form of Charles B. Yuli's imaginative interview with Handel following his star-studded attendance on the "Hallelujah" recording session. The composer's heirs, if any are still around, should sue for misrepresentation and defamation of character.

R. D. D.

B

HAYDN: Symphonies: No. 49, in F minor (La Passione), No. 50, in C, No. 51, in B flat, No. 52, in C minor, No. 53, in D (L'Imperiale), No. 54, in G, No. 55, in E flat (Der Schuldmeister), No. 56, in C. Philharmonia Hungarica, Antal Dorati, cond. London Stereo Treasury STS 15127/30, $11.92 (four discs).

The trouble with the Haydn middle symphonies is that there are the Haydn late symphonies, and traditionally they have dominated the scene. They shouldn't. The span of these eight scores is 1768–80. No. 49 comes from the same year as No. 26, but Nos. 50–56 are all grouped around 1771–74 (with the exception of No. 53 which, again, is misnumbered) This is from an artist's great period following the opening of Esterhaza and he was truly flourishing. Every one of these scores would be a major work had they been written by one or another of his contemporaries. More than half of them are gilt-edge, major Haydn. Moreover, this volume of the Dorati series falls squarely in an area of Schwann where not one are still around, should sue for misrepresentation and defamation of character.

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In its first two years with Solti (and a contract with London) the Chicago orchestra has diligently searched for the perfect recording room. The ultimate solution has probably been found in Vienna, where the Mahler Eighth was recorded in the Sofiensaal last
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In all, the only thing the CAD5 doesn't have in common with higher-priced decks is their higher prices. As Popular Electronics pointed out, the CAD5 is "a lot of recorder for $229.95." Which isn't quite correct. The CAD5 now costs only $199.95.

That's perhaps the one CAD5 feature that isn't very advanced.

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CIRCLE 38 ON READER-SERVICE CARD
August. But that's a long way to go to make a record, and for its second group of sessions in the United States the orchestra went 150 miles south of Chicago to the Great Hall of the Krannert Center for the Performing Arts at the University of Illinois in Champaign-Urbana. Even this type of commutation costs enough to give record-makers pause. But the fact must be faced; it's worth it. The Mahler Seventh, presented here, has a clarity and refinement in detail that surpass the best efforts possible on location in Chicago itself.

What is important to appreciate in this album is that you grasp the essential perspective. The engineers place you not on the stage but about midway back in a hall of 2,100 seats. This means that if you want strong presence you must not be afraid to turn up the gain. And the louder it gets, the more wild and woolly and wonderful this Mahler Seventh becomes!

R.C.M.

**Haitink's “Astonishing Re-creation” of Mahler's Mighty Eighth Symphony**

by Robert C. Marsh

**MENDELSSOHN: Symphony for String Orchestra.** No. 4, in F minor. Concento for Violin and Strings, in D minor. Roberto Michelucci, violin; L'Orchestra, Philips 6500 099, $5.98.

This recording is aptly titled "The Young Mendelssohn": He wrote the concerto at thirteen, the symphony at fourteen. Both are

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**MENDELSSOHN: Symphony No. 8, in E flat (Symphony of a Thousand).** Ileana Cotrubas, Heather Harper, and Hanneke van Bork, sopranos; Birgit Finila and Marianne Dieleman, altos; William Cochran, tenor; Hermann Prey, baritone; Hans Sotin, bass; Collegium Musicum Amstelodomensae, Toonkunstkoor van Amsterdam, De Stem des Volks van Amsterdam; Kinderkoor St. Willibrord & Amstelodamense; Kinderkoor St. Willibrord & Prius X (Amsterdam). Concentgeburgew Orchestra, Bernard Haitink, cond. Philips 6700 049, $11.96 (two discs).

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Rectilinear III
youthful to the point of immaturity, and their heady adolescent exuberance does not quite make up for the lack of depth. Michelucci, who composed twelve string symphonies, they were presumably intended for performance at his family home musicales. They were neglected for many years, to be rediscovered only in the 1950s.

The first movement of No. 1 begins with an almost impossibly dull adagio, leading into a rather watered-down Beethovenian allegro distinguished mainly by frenzied figuration. The second movement, a rollicking scherzo substituted Scherzando is a vast improvement: Although a shade repetitious, it is still pleasant to hear. The real significance of the central Allegro, characterized by unexpected harmonic variety and complexity. Its only flaw is a lack of clear direction; it meanders a bit. Following is a gay minuet, leading to a complicated contrapuntal finale. Despite its technical expertise, the pointless scrambling figuration and incessant repetition that marred the first movement are only too evident.

On the whole, the concerto is the more interesting work. Like the symphony, it becomes stronger as it goes along. The first movement is basically bland in spite of its attempts at excitement and variety; the last two movements, however, can stand on their own merit with no excuses made for youthfulness. The Andante is lyrical and expressive, with especially beautiful material given to the solo. As in the symphony's Adagio, unusual harmonic progressions lend depth. The finale, an energetic and forceful one, has none of the previously noted problems of redundancy or conventionality. The solo part, incidentally, has the same kind of rapid, agitated melody as in the same movement of the great E minor concerto.

I Musici gives both works a fine performance. Although mainly known for their recordings of baroque and twentieth-century music, the group is clearly just as much at home in this early romantic style. Roberto Michelucci especially stands out with his excellent solo playing. They are to be commended, finally, for bringing these works to the attention of the record-buying public. Both, despite their flaws, are fascinating glimpses into the early development of a great composer.

PUCCINI: II Tabarro. Leontyne Price (s), Giorgetta; Oraia Dominguez (ms): Frugola; Placido Domingo (t), Luigi; Piero de Palma (t), Tinca; Philip Langridge (t), Song Vendor; Stierili Milnes (b), Michele; Robert El Hage (bs), Talpa; John Noble (b), Servant to Macbeth and First Assassin; Chorus of the Vienna State Opera; Vienna Philharmonic Orchestra. Leonard Bernstein, cond. RCA Red Seal LSC 322C.

Opera recordings don't come much flatter than this pale performance of Puccini's brilliant one-acter. Leinsdorf is the chief culprit. After a promising beginning—the composer's superbly atmospheric, craftily orchestrated picture of hard living on the Seine unfolds with lovely instrumental detail—the orchestral playing settles into poked-faced, desiccated, enervating routine. II Tabarro is a masterful study of suffocated passion and violence, but there is no tension at all to Leinsdorf's bland reading; the eruptions, when they come, seem only to embarrass him. The strings never dig into the music, the climactic moments make no impact, dynamic/rhythmic contrasts are ironed out, and the melodic line remains shapelessly literal. One wonders why a conductor of Leinsdorf's stature would accept an assignment for which he clearly has no sympathy.

Leontyne Price follows suit all too willingly with a prim, stately, oratorio-like Giorgetta. Part of the problem is purely vocal. The act's center of gravity is low; here Price's voice sounds unnaturally puffed up, and consequently the conversational throwaways early in the opera move awkwardly. Later her voice opens somewhat (a lovely soft high C on "malinconia" in her aria—an unusual touch but quite appropriate) and there are effective moments. On the whole, though, she seems completely out of touch with this earthy character.

The two men are better. I'd prefer a Luigi with more ringing metal than Domingo, but he phrases sensitively and shows some understanding of the man's dilemma. Milnes makes a sturdy Michele, firmly sung and broadly conceived (as on London's recording the first version of his aria is included as a bonus filler). Talpa and Tinca are fine, Oraia Dominguez contributes a shaky Frugola. RCA's muted, presentless sonics complement the over-all lethargy. The rival London edition is preferable on all counts. although the ancient rough-and-ready Cetra set (now on Everest) still best captures the smoldering flavor of this taut melodrama.

P.G.D.

STRAUSS, R.: Der Rosenkavalier. Gwyneth Jones, Lucia Popp, Christa Ludwig, Walter Berry; Chorus of the Vienna State Opera; Vienna Philharmonic Orchestra. Leonard Bernstein. For a feature review of this recording, see page 76.

VERDI: Macbeth. Elena Soulioti (s), Lady Macbeth; Helen Lawrence (v), Gentlewoman; Luciano Pavarotti (t), Macbeth; Raymond Myers (b), Doctor; John Noble (b), Servant to Macbeth and First Assassin; Nicolai Ghiaurov (bs), Banquo, Ambrosian Opera Chorus; London Philharmonic Orchestra, Lamberto Gardelli, cond. London OSA 13102, $17.94 (three discs).

A strange recording. Listening through the first time is an unsettling experience—one hardly knows from one measure to the next what to expect from this Macbeth and his Lady. The second time is possibly even worse because one does not yet know what to expect. I Musici gives both works a fine performance. Roberto Michelucci especially stands out with his excellent solo playing. They are to be commended, finally, for bringing these works to the attention of the record-buying public. Both, despite their flaws, are fascinating glimpses into the early development of a great composer.

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CIRCLE 3 ON READER-SERVICE CARD
The exasperating thing about Ravi Shankar's interesting, wildly eclectic, fairly sincere, kitschy, something for everyone, beautifully performed, plummy recorded, curate's egg of a concerto for sitar and orchestra is that, critically, one can't merely take it or leave it alone.

If it were simply a question of its surface musical merits or demerits, the piece might easily be written off, not without some affection, as another star vehicle composed by the virtuoso for himself, no better nor worse than the genre's average. It will please many, annoy quite a few, I doubt that other sitarists will take it up, with its Indian miniatures surrounding Previn in his Prince Valiant looking coy and old the album is total camp; my copy has clicks and whooshes in spots, but good resonant sound: the liner notes are very poor, and so on.

No, what is disturbing is that the meaning of the concerto cannot be found inside it but around it, where few may look. It is more likely to draw unto itself all of the usual stereotyped responses which such a hybrid invites. From Hindustan and Rockistan, through Yale, to the vultures' eyrie of ethnomusicology, this kind of synthesis stimulates musty nostalgia, this kind of synthesis stimulates musty nostalgia, rigidity in discipline--flourished, inside India and out. It is everywhere apparent.

All told, it behooves us then to approach warily, trying first to identify what is being done before concluding (or not concluding) whether it has been done well. For all that the concerto will become "popular"--and it will, for Shankar and Previn mean something!--the dilemma remains: Musically this is present-ently a concerto without an audience.

This summer the Department of Western Music of the University of Delhi (founded some years ago by a Great American Foundation Favoring Education--the acronym is GAFFE) closed, its passing unmourned and virtually unnoticed by the musical scene of which it had never been an integral part.

Oriental Flesh, Occidental Bones

Ravi Shankar and André Previn in the former's Sitar Concerto.

by William Kay Archer

Symbolic, that. Proper European music has never really taken hold in India, even as a minority music, despite some surprising partisans and even though its covert influence is everywhere apparent.

The reason: Under the fascist assault as might be said in Hindi) are very too many. British chariness, casse, money, self-indulgent nationalism, egoistic insularity, the incautious adulation of outsiders all played their parts. Above all, as is the way in India, identification with European music was symbolically associated with other things: caste, community, ideology. What might be laudable for Zubin Mehta, a Bombay Parsi, is near traitorous for Nirad Chaudhuri, India's finest writer, but also a puksa Bengali.

Meanwhile almost as if in vindication, the magnificent luxuriance of classical Indian music--free in pitch, free in notation, rigorouss in discipline--flourished, inside India and out, like the banyan tree.

Thus the surface. Underneath, of course, necessity and curiosity and practicality had long been driling. Even the greatest of Usadi, Alauddin Khan, Ali Akbar's and Ravi Shankar's teacher and guru--unto whom the concerto is dedicated--said to play for awhile in Lobo's Portuguese Band to see what this other music was like, and he did not come away unscathed. He was not unrepresentative.

More pragmatically, the purveyors of purely commercial music--particularly but not solely movie music: the ubiquitous filmi-geet--had to respond to new social demands for more music and more novelty. One can make much or little of the Bombay filmi and the extraordinary muddle of Bombay musical life, but more than the Calcutta Symphony, say, or the grudging programs of All India Radio, it has been the great funnel of "European" music--not at all "proper"--into the ordinary Indian ear. Under the Bombay assault, quickly joined by Madras, abetted by new instruments and lots of other things, the public ear had inexorably to alter, adjust, synthesize, however unconsciously. At more intellectual levels, for more intellectual reasons, a parallel process was under way, and new thoughts about the relationships within art began to ferment.

Not surprisingly in this ferment Pandit Ravi Shankar played an important role. He is too easily bracketed with Ali Akbar Khan; the differences are more important. One surely is the influence of Uday Shankar, who despite the liner's fulsome attribution to Ravi alone, opened the way in the West for Indian music and dance, and brought resonances back with him.

Ravi Shankar is more cosmopolitan. His own traditional work is, I think, less massive and imaginative than Ali Akbar's, less gritty, less powerful: but this also indicates a more flexible, Catholic, freer mind at play. For some time Ravi's music has shown greater receptivity to outside influence, more sense of strain inside the conventional, boudoir, more concern for new patterns and new forms: think of the Pather Panchali suite and the duets with Menuhin. He has been less willing to stand forth purely as a representative Indian musician, notwithstanding his manifest Indianness, Bengaliness even. He has asserted himself as an autonomous musician, and even his fiercest detractors concede the musical and technical abilities to sustain such a posture. The commission for a concerto from the LSO was thus logical for them and for him.

But for which audience was it logical? For some putative Indian audience outside of the occidental tradition the mishmash of "influences" with which the work is cluttered will not be identifiable. (An extremely popular filmi-geet a couple of years ago was taken, lock, stock, and G minor barrel, from the first theme of the Mozart No. 40. But who knew?) The identification of such influences per se isn't very important--they are well mixed with plenty of authentic Shankar--but so very many of them are, inside of the tradition, upsetting. I could not rid myself of the feeling that the apat (so designated) of the first movement, with all its pastoralisms and wienerwald-isms, was some kind of musical joke, like the opening of Dohnanyi's Variations On a Nursery Tune. But another part of me insists it just couldn't be.

The concerto, as a concerto, is formally confused. The effort to follow the pattern of exploration of a raga, rather than a more formal development, results in a kind of interplay in which the thread of the musical idea gets split, with neither strand making its point very clearly. How build the ambiguous excitement of eluding the main beat when it is already noted? Whenever the sitar gets
of perceiving incongruities as incongruous, provocative. There of course would be no way novel, fresh, appealing; no more strange than not be troublesome in India.

In other words, the tension inherent in the Indian system is diminished, but so is the characteristic European tension. The orchestra defers one way; the sitar and pseudotabla that might have been beautiful becomes merely pretty, like the dialogue between sitar and bassoon in the first movement (but would the spontaneous impulse be!)?

In the end it seems to me—but is this not further evidence of the lack of availability of an Indian audience—that the joins are incomplete, that pitch and orchestra dominate, sruti becomes only portamento, and the West wins. The concerto becomes—like Cowell's thirteenth Symphony with which it has not a resemblance. If Dvóřák updated as it were, by which succulent exotic oriental flesh is wadded onto what we have left: its reminiscences could not be reminiscent. If that way. In that case too it is a more important work than I make it out to be. The final question of whether it is an Indian concerto remains open...and important.

So this is, nervously, an interim report, and we are left with the useful Scots verdict: not proven. The question of universal musical tradition will resolve itself in time; it is merely a matter of technology. But the problem of aesthetic perspective is not at all so deterministic. It will be with us more and more, and more and more urgently. Looking back at this pleasant concerto, we may yet come to see its main value as having forced the issue.

SHANKAR: Concerto for Sitar and Orchestra. Ravi Shankar, sitar; London Symphony Orchestra, André Previn, cond. Angel S 36806. $5.98.

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Continued from page 104

murdered the King. The three arias, however, are clumsily handled. In "La fave langue," for instance, the voiceovers make the first two bars simply to get into focus before attention can be paid to the shape of the phrase—and of course by then it's too late. One could go on, but why bother. It seems that this once promising singer will never take herself in hand to iron out the vocal flaws or give serious thought to a consistent interpretive approach.

Fischer-Dieskau presents the opposite side of the coin: a real intelligence at work without sufficient means to see him through to the logical conclusion of his intentions. There is little sustained lyrical work for Macbeth in this opera and the attenuated quality of Dieskau's baritone is so taxed in the dramatic ariosos that even the pitches become suspect. His best singing comes in "Viva, rispetto, amore" where he can concentrate on the line. Most of the time, though—in the Dagger Monologue and the confrontation of Banquo's ghost especially—the voice is uneven and takes on its own life, leaving the listener to grips with the part in sheer vocal terms.

Without satisfactory protagonists any performance of Macbeth is pretty much of a loss. Ghatrour and Pavarotti are fine on the whole, the former a bit light of voice for Banquo's dark-hued aria, the latter rather less breath in his mournful aria. Gardelli's conducting is neat and efficient—occasionally more than that in the apparition scene where the orchestra makes impressive capital of Verdi's imaginative scoring—and there is considerable rhythm thrust and bite to the playing. Schippers was even better on the old London set but that conductor's irresponsible abridgement of the score and Nilsson's unidiomatic Lady Macbeth are serious liabilities. The current performance is note-complete (the 1865 Paris edition), including the interesting ballet music omitted in RCA's Victrola version from the Met. That recording may not be perfect in all respects, but it is still the Macbeth to have.

F.G.D.

VIVALDI: Concerto for Violin, Strings, and Continuo, in A minor, Op. 3, No. 6 (P. 1) See Bach: Concerto for Two Violins, Strings, and Continuo, S. 1043

recitals and miscellany

"CONTEMPORARY MUSIC FROM JAPAN, VOL. 1: WORKS FOR MARIMBA." Keiko Abe, marimba; Takami Takeda, piano, Cedric CE 31051, $3.98

Every now and then a musician of exceptional talent will specialize in an offbeat instrument and thereby create a literature and a tradition where none had previously existed. Such a musician is Keiko Abe, who brings the marimba into the company of major solo instruments.

Miss Abe is a fast girl with the mallets, but that's not what it's all about; her technique is the servant of genuine and very impressive musicality, and she has a range of nuance and color which I, for one, didn't dream the marimba could produce. She makes a fine art out of the contrast between the surface percussion of hammer on wood and the fruity, resonant tone that resides in the wood itself; and by using very soft mallets she can produce an ethereal, highly plianious that is all tone and one of the most beautiful sounds you are ever likely to hear.

Miss Abe's record contains five written for her by contemporary Japanese composers. All are and all are exceptionally beautiful. Akira Miyoshi's "Torse I" and "Conversation" the coloristic possibilities of the solo marimba to the limit, yet with wonderful taste, restraint, and shapeliness. The same composer's Concerto for Marimba and Strings (recorded with the New Music Orchestra. Hiroshi Wakaunai conducting) is much more dramatic; but the dramatic high point of the disc is an excerpt from Minoru Miki's Concerto for Marimba and Orchestra; one regrets that the entire work is not there.

Teruyuki Noda's Quintet for Marimba, Three Flutes, and Continuo (Ryu Noguchi, Akira Miyamoto, and Hiroshi Kosumi, flutes; Masahiko Tanaka, continuo) is a three-movement serenade and a terrific virtuoso piece for all concerned; those flutes and bass are as good as the star. Last of all is the set's most remarkable piece of color music. Maki Ishi's Marimba Piece with Two Percussionists, wherein the marimba—and all its effects—is played off against a multitude of other percussion sounds, tuned and untuned, to the vast delight of the musical ear.

Percussion instruments always record sensationally well, and this disc is no exception to the rule. But along with the sound is some extraordinary music: superbly performed.

A.F.

The title of this disc, "Prima Donna in Vienna," seems to hold out the promise of a cohesive musical portrait, but the results are distinctly miscellaneous, not to say random. Pilar Lorengar hardly has the stylistic variety to do justice to so wide-ranging a program. She is a straightforward singer, solid and musical, but without any special illumination or specificity to bring to her roles. None of these bands really awakens a desire to listen a second time. In addition, although Lorengar has a healthy instrument with an attractive timbre and a strong, gleaming top, her singing is fatally marred by excessive vibrato. This is not merely a matter of taste. In the Countess' aria from Figaro, for example, it's almost impossible to differentiate the cadential trill from the fluttery notes that precede it. Agathe's aria from Freischütz demands more clarity of contour, something much closer to instrumental precision, in order to make its appropriate, chastely lyrical effect. The Arabella-Zdenka dueet requires the two sopranos to entwine in flights of rapturous sound, without a more finely drawn line the result is very diffuse. The general impression of interlively impression makes Lorengar's performances sound unfinished, even at times insecure. The downward cadenza in the introduction to the Freischütz aria is a distressing case in point.

However, the faster the music the more in command Lorengar appears. The Beethoven, the Kalman, the Johann Strauss all go with a sweep that carries a certain conviction. On the other hand, there isn't enough lightness in any of this music. Marzellen comes across as very mature; the various operetta heroines are rather charmless. The style here is too big and overbearing, and the music seems unnaturally inflated. The conductor, like Lorengar, keeps the operetta excerpts moving vigorously, though he makes the Korngold piece (a traditional, but nevertheless curious, arrangement for soprano solo of a soprano-tenor colloquy) sound ponderous. A somewhat fullsome jacket note compares Lorengar to Rethberg, Lemnitz, and Grümmer. It would be hard to think of three sopranos who, in their prime, sang with greater fineness of line. A leaflet of texts and translations is provided.

D.S.H.

The flamboyant Soviet virtuoso, Timofey Doksitscher, appears to better effect in contemporary Russian works than in his Biber/Hummel/Haydn program of just over a year ago. He is stylistically less of a fish out of water, while his flabby bravura and often rather vulgar tonal qualities are less inappropriate here, especially in the lively but coarse-grained concerto by Aleksander Arutyunian (b. 1920, a year before Doksitscher himself). The Concerto-Poem by Vladimir Kryukov (b. 1902) is a highly romantic, atmospheric work in a nineteenth-century idiom, while the more ambitious, mostly jaunty but often mightily slapdash concerto by Moshe Vainberg (b. 1919) demonstrates that he is more familiar with twentieth-century styles—up to the 20s and 30s at least. All three works are performed with obvious relish by the orchestral players as well as by the extratour soloist, and all three are brilliantly recorded. R.D.D.


The gem of this record is a bracing performance of Grieg's Holberg Suite by the Hungarian Chamber Orchestra. The sound of the strings is bright and clear, the sections well balanced, and the ensemble impeccably precise (listen, for instance, to the trills). Tátrai's leadership has the requisite combination of grace and rhythmic life. Obviously this is no ad hoc group. The performances on Side 2, played by members of the Hungarian Symphony, are good. But hardly up to the Hungarian standard. Nor can the music stand up alongside Grieg. Both Sibelius and Elgar write in a seacharina salon style here, and Springer's direction hardly tightens the texture. P.H.

HAYDN: Symphonies: No. 48, in C ("Maria Theresa"); No. 70, in D, English Chamber Orchestra, Raymond Leppard, cond. Philips 6501 194, $5.98.

Just one thing is seriously the matter with Leppard's Haydn series for Philips and that is that each disc costs slightly less than half the price of a volume in Dorati's Haydn edition for Stereo Treasury. Except that a Dorati volume is four records, eight symphonies, and a decidedly better value. Thus Leppard here gives us a fine performance of No. 70. But Dorati's (his Vol. I) is equally fine, possibly better, and hence a much more attractive buy. And although Leppard has no difficulty reminding us what a grand and glorious work No. 48 is, one assumes that presently Dorati will bring it to us (along with Nos. 41-47). What we have here is premium-grade Haydn at appropriate prices for people who want a few of the symphonies but not all. On that basis this is a fine choice musically. Bargain hunters will look elsewhere. R.C.M.


Anybody whose violin music is recorded by Jaime and Ruth Laredo is in tremendous luck. A more distinguished ensemble you are not going to hear, nor more beautiful, vital, and eloquent violin playing. If Mrs. Laredo is her husband's lead in the sonata, it would be the odd thing to say. Both these works were commissioned by the McKim Fund of the Library of Congress. Both are on the conservative side so far as idiom is concerned, but both are strong on their own merit. Especially Laderman's Duo is the dramatic piece, full of surges and surges in power of the harshest kind. Siegmeister's sonata is the lyric piece, with long lines, elegant tunes, serenity, and poise. The recording is a bit on the wiry side. A.F.


If balletomanes and Tchaikovsky fans disapprove of two-sided suites drawn from the great Tchaikovsky ballets, they will vigorously reject still scantier singlesided samplings. But Von Karajan and his fans long have been satisfied with the present couplings—first in an Angel mono release; then in the 1960 Angel stereo S 35750 with the Philharmonia Orchestra and the 1965 London stereo CS 6452, both of which are still in print. Now, for DGG, the mixture is as before—at least as far as the faultily controlled but largely graceless 'concert' (rather than ballets) read-now completely unsatisfactory, technically, even the very considerable merits of the earlier recordings are impressively surpassed. Strongly as I object to the piecemeal programming and the lack of interpretative sensitivity here, I must admit that as a source of sheerly magnificent sound this disc is masterfully self-sufficient. R.D.D.


A cornucopia of little sweets concentrating heavily on those with an Elizabethan flavor. Nothing is very new here in terms of repertoire, but each of the madrigals and part songs is a jewel in itself and all together they make a pretty package. Joseph Liebling leads twenty-four singers from the Oakland Symphony Chorus in a series of stylish renditions that should please the newcomer and the connoisseur alike. S.T.S.

"THE MUSIC OF WILLIAM GRANT STILL." Louis Kaufman, violin; Annette Kaufman, piano. Orion ORS 7152, $5.98.

This is a collection of little encore pieces, tasteful, tuneful, and triest: the fact that three of them are gathered under one title and called a Suite for Violin and Piano doesn't make them any the less encore pieces than the other five selections on the disc. They are all very beautifully played by a well-known Southern California team. Detailed listing of the pieces is not called for. All were written about a quarter of a century ago, and the recording sounds as if it were made at that time, too. A.F.


Münchinger leads the Vienna Philharmonic in thoroughly musical and orchestrally sumptuous performances of five early Romantic overtures of real interest but relatively infrequent performance. Those who fear that such a miscellaneous collection of music offers little pleasure in sequentual listening can be assured that this well-chosen group offers a very satisfying succession of enjoyable music. Recording is up to top standards, making this disc very attractive at the low price. However, my review copy was badly warped at the outer edge of the record. P.H.
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the lighter side

reviewed by
MORGAN AMES
R. D. DARRELL
HENRY EDWARDS
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This second collection of tracks from older albums released by The Who contains several songs previously unobtainable in the U.S. (Substitute, I'm a Boy, and Anyway, Anyhow, Anywhere) and a number of Who classics (I Can't Explain, My Generation, Pinball Wizard, I Can See For Miles). Substitute and My Generation are the original studio versions. Since many of these are old songs, the LP has the ring of 1964 British hard rock.

The Kids Are Alright resembles the Beatles' All My Loving. Pictures of Lily also has that early British, lively-but-well-scrubbed appeal. In general, there is little similarity between the big-noise Who of today, and the rockers of the mid-Sixties. It's a collector's item and, due to the engineering of the time, rather sounds it. The album leaves one with the impression that it relates to today's rock in the same way Son House relates to the current slick blues bands. "Meaty Beaty Big and Bouncy" is an exciting rock album, but one that makes you feel you are listening to the rock of antiquity, if not the rock of ages.

M.J.

Van Morrison—dazzling range.

Van Morrison has always been a barometer of his emotional well-being, and it is rewarding to find that his themes now deal with a man who feels love and is much the stronger for it. Morrison's strained, harsh voice is, however, much better suited to the anguish and despair that permeated his previous work, which inspired globs of compulsive identification from a growing number of fanatically devoted fans. As usual, the composer's range is dazzling. There are jazz songs and country tunes, rhythm-and-blues sounds and basic rock progressions. Some numbers switch styles midstream; a firm discipline prevails over it all. Two selections find Morrison at his very best. The title song is one of the most gorgeous love songs I have heard in quite a while. Tupelo Honey not only declares Morrison's devotion to the woman he loves but also states his determination to defend that love against any difficulty the world may present. The song possesses a thoroughly haunting melody, and the simile of the title, in which Morrison compares his love to the sweetness of a bee's honey, is both lovely and refreshingly sentimental. The fetching folk tune, I Want to Roo You, is a genuinely old-fashioned song of courting, and is an amazingly lighthearted endeavor from the usually agonal Mr. Morrison.

Morrison devotees have every right to be delighted by this new album. It is, after all, the composer/performer's best work. Casual listeners and newcomers to Morrison may have difficulty dealing with his unyielding introspection and his grating voice. Van Morrison may finally be experiencing sunny days, but only intermittently does his music have "charms to soothe the savage breast."

H.E.


On May 9, 1971, the Broadway cast of Hair and the musical's composer, Galt MacDermot, took to the Cathedral Church of St. John the Divine in New York City to celebrate, in a most unusual way, the third anniversary of Hair's Broadway production. MacDermot had composed a five-number rock Mass (Sanctus & Benedictus qui venit, Agnus Dei, Kyrie, and The Lord's Prayer), and everyone had chosen this occasion to perform it, and almost all of the songs from Hair as well. During the church service the company sang Aquarius at the Interot and a medley of Hair tunes including the title song at the Offertory. Other significant pop gestures were made during the church service.

This "original cast" album features, in addition to the Hair personnel, the Cathedral church choir, Canon West representing the church, and Dr. Harvey Cox of the Harvard Divinity School. It proves that MacDermot's ecclesiastical music sounds just like his Hair score.

Hair aficionados will probably enjoy hearing their favorite songs reprised on this album. But except for a powerfully rocked The Lord's Prayer, this particular example of the Rock-and-Religion phenomenon is extremely lightweight, more show business and easily obtained publicity than almost anything else.

M.J.

SLY & THE FAMILY STONE: There's A Riot Goin' On. Luv n' Hight, Poet, Family Affair, Spaced Cowboy, Thank You For Talkin' to Me Africa; six more. Epic/KT 30986, $5.98. Tape: • ER 30986, $6.98; • EA 30986, $6.98; • ET 30986, $6.98.

Here's the first album of new songs in two years from the group that caused a bit of a revolution in soul with their bouncy, ebullient rhythm section. Two years ago Sly (Sylvester Stewart) was writing melodies and, occasionally, lyrics one could hear without chokimg. Now only the rhythm section remains. Melodies are nonexistent or inconsequential. Lyrics are almost totally irrelevant, unintelligible, or old-fashioned dumb. Only Family Affair comes close, but not very, to the old music. I am not a great admirer of the Jackson Five, but can easily suggest them as an alternative. If this is all that Sly & Family Stone can come up with in two years, it's clear there's not much hope for them in the future.

M.J.

Mickey Newbury: Frisco Mabel Joy. Mickey Newbury, vocals, unidentified arr. The Future's Not What It Used To Be: You're Not My Same Sweet Baby; Remember the Good; eight more. Elektra EKS 74107, $4.98. Tape: • ET 84107, $6.98; • TC 54107, $6.98.

I first heard Mickey Newbury on the car radio singing what turned out to be an alternative to the An American Trilogy (included in this album). Reaction Continued on page 116
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Those who thought that Fiddler on the Roof and its poverty-stricken, God-fearing dairyman, Tevye, were strictly Broadway babies need not have worried. Fiddler has traveled far, and it has traveled well.

Now seven years old, it is the longest-running musical in Broadway history as well as Broadway's third longest-running production of any kind. Fiddler has been produced in thirty-two countries including the United States and has been translated into eighteen languages. Thus far, sixty-one different 'official' albums of the score have appeared, eighteen of them original cast recordings of various productions. No one has counted, catalogued, or tracked down all of the unofficial recordings. In Norway alone there are three different ten-inch discs, each capturing three different local productions. Not surprisingly, the musical play was made into a nine-million-dollar film.

The first actor that one sees in the role of Hamlet usually creates an image of Hamlet that lasts through one's lifetime. Zero Mostel, the world's first musical-comedy Tevye, does the same thing for this role. A successful musical is a unique combination of show business know-how, corn, and genius. Fiddler and Zero have all three. With one foot in Tsarist Russia's village of Anatevka and the other in Shakespeare's world of Hamlet, it is natural that Tevye be compared to Hamlet. Both are of the same ilk, Tevye a tattered, while Isak Graziani's orchestrations and razzmatazz. RCA's Broadway-cast rendition, and the Bock-Harnick songs, a happy marriage of wryness and true skepticism that none of the other Tevyes have. It is the kind of performance that elicits admiration but provides no emotional charge. The other London cast members are perfunctory--professional but not at all exciting.

Along the way, Hershel Bernardi, the third Broadway Tevye (the others, besides Mostel, were Luther Adler, Harry Goz, Gerry Garrett, Paul Lipson, and Jan Peerce now playing the part), recorded his own album of ten selections from the score. The recording includes When the Messiah Comes which appears on no other easily available recording, and the lyric to the Fiddler on the Roof theme which is not sung in the production itself. Bernardi possesses a great deal of dignity, and brings a healthy respect for the score's musical values to his interpretation. It is an earnest endeavor which includes briefly spoken passages from the play's text, but is almost defeated by a set of fruitless arrangements that almost render the score sterile.

Stanley Black's arrangements do not help his Fiddler recording either. Black uses his familiar camp symphonic style, and the results are ludicrous. The conductor/arranger has cast Robert Merrill in the role of Tevye. Merrill's overpowering baritone lends great excitement to the show's production numbers but is too large for the ballads. The singer does, however, bring an admirable sense of characterization to the part. Merrill's co-star, Molly Picon, is a joy. Her responses to Merrill during Do You Love Me?, the Tevye/Golde duet of reminiscence, are comic perfection. This album contains a gratuitous narration, a dramatic excerpt from the musical's libretto entitled Tevye's Monologue, and a set of superlatively trained voices in supporting roles, as well as Stanley Black's high-blown, highfaltifying arrangements.

United Artists' two-record soundtrack recording is not better than the Broadway album, but it certainly is bigger. Everything has been elaborated, and the album includes lengthy background music to accompany a number of the extended dance sequences. The sounds of the fiddler on the roof are provided on these discs by nothing less than Isaac Stern's violin. Topol seems to have more stature in this version, and bloated as it may be, the album still preserves a great deal of the charm and sentiment of the original. In addition it finally dispels the rumor that Dustin Hoffman had been selected to play Tevye in the film version of Fiddler on the Roof.

The twelve Bock-Harnick songs that form the score to Fiddler on the Roof obviously have the loneliness and vitality to survive these many translations and interpretations. L'chayim, Bock and Harnick! L'chayim, Fiddler on the Roof!

Seven Recordings Compared

FIDDLER ON THE ROOF. Topol and the cast in the film's leading role.

FIDDLER ON THE ROOF. Topol and the original Broadway cast. RCA Victor LSO 1093, $6.98. Tape: OJS 1005, $7.95 (two discs).


FIDDLER ON THE ROOF. Robert Merrill and the Israeli cast. Columbia OS 3050, $5.98.

FIDDLER ON THE ROOF. Shmuel Rudenski and the German cast. London SW 99470, $4.98.

FIDDLER ON THE ROOF. Ten songs from the musical sung by Hershel Bernardi. Harmony KH 30757, $1.89.

FIDDLER ON THE ROOF. Topol and the London cast. Columbia SX 30742, $4.98.


FIDDLER ON THE ROOF. Topol and the cast of the motion picture soundtrack. United Artists UAS 10900, $5.98 (two discs). Tape: U 3049, $6.98; OJS K 9049, $6.98.

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February 1972
Continued from page 112

from both front and back seats of the car was, "Who is that, turn it up," so powerful was the feeling in Newbury's singing.

Thirty-one-year-old Mickey Newbury is part of the new breed of songwriter/singer emanating from Nashville, along with others such as Kris Kristofferson, Jerry Reed, etc. Biographical information indicates that Newbury, despite two previous albums and this, his first for Elektra, still thinks of himself first as a songwriter and later as a singer. He's entitled—considering the success of some of his songs (Sweet Memories or Just Dropped By to See What Condition My Condition Was In). While Newbury is an able songwriter, his most immediate impact occurs in his singing—warmly musical, simple, and painfully sincere.

The album says, "All selections composed by Mickey Newbury," which is undoubtedly accurate for all except the above-mentioned truck, American Trilogy. For this Newbury rightfully receives the arranging credit, but not the composition title. It is a beautifully woven medley of three famous songs, Dixie, Battle Hymn of the Republic, and All My Trials Lord. Neither the song titles nor their composers are identified on the album. It reminds me of the time I saw a songbook in which Randy Sparks took credit for composing such songs as On Top of Old Smoky and Black Girl.

While we're at it, I might add that no one bothered to give the album's arranger credit, simple though his contribution may be. This is not the first time Elektra has neglected the point. The only identification given is "The Nashphilharmonic." Presumably this indicates the Nashville-based string players used on the date.

For all that, this is a first-rate album and Mickey Newbury is one of the most moving young singer/songwriters on the scene. American Trilogy alone is worth the price of the album. M.A.

CAT STEVENS: Teaser and the Firecat. Cat Stevens, vocals, guitar, and keyboards; Alun Davies, guitar; Larry Steele, bass and congas; Gerry Conway and Harvey Burns, drums; Andreas Tousmazis and Angelos Hatzipavlis, bouzoukia, Del Newman, strings. The Wind, Rubylove, If I Laugh, Changes IV, How Can I Tell You; live more. A&M SP 4313, $5.98. Tape: BT 4313, $6.98. CS 4313, $6.98.

Here is one of pop music's truly distinguished triple-threat men. Cat Stevens sings with crisp distinction; he plays a pulsating acoustic guitar; he writes songs that are bound to become textbook examples of the pop form practiced to perfection. He also has taste, intelligence, sensitivity, and a point of view. Needless to say, his is a well-deserved success. "Teaser and the Firecat," his third LP on A&M, contains ten more titles from the composer's burgeoning catalogue of distinctive song achievements.

Naturally Stevens' subjects and ideas stem from within, but he honors his materials with proper respect to form until he creates statements that have precision and clarity. The artist simply refuses to use his medium to provide a platform for personal whining.

All of the album's musical values are subordinate to Stevens' lyric thrust. Much attention, however, is paid to rhythmic patterns. Melody may be scarce, but a subtly defined rhythm punctuates even the ballads. The rhythm becomes especially infectious in Rubylove, a lifting love song with an authentic Greek flavor, bouzoukia gleefully included. The song even has a verse in Greek, undoubtedly a reflection of the fact that Stevens, London-born, is half Greek on his father's side. The song would do Manos Hadjidakis proud.

Stevens' greatest rhythmic emphasis is saved for those songs that reflect his unembarrassed optimism. In Changes IV he raspily demands that people live in the present because each new day must be better than the day that has just passed. Peace Train amplifies this notion by announcing the imminent arrival of a vehicle of goodness that will enable everyone to "come and join the living" in a world of togetherness and light.

The techniques that Stevens uses to further his humanistic message include the imaginative and whimsical use of language. "Bitter-blue" is the name he gives to the person who might reject him even after he has done everything a man might possibly do to give his life a sense of purpose. "Moon shadow" is the spiritual substance that will sustain him even if he loses every one of his tangible belongings, up to and including the limbs of his own body.

In true contemporary fashion, Stevens uses film devices in his writing. The verses seem to cut from one unrelated perception to the next, often the result of a facile mind that has just the slightest tendency to be slick. Stevens, however, is enough of a craftsman to return to a chorus guaranteeing that the major point of each song remains clear.

A Cat Stevens song is a very special thing. Cat Stevens is a very special artist. H.E.

UNCLE DIRTY: The Uncle Dirty Primer. Uncle Dirty, narrator. Make Me Laugh; Education; Mescaline; others. Elektra EKS 74097, $4.98.

Uncle Dirty is one of the few really funny comedians to emerge in recent months. Coming from the Greenwich Village coffee-house circuit, his material largely concerns hip life, what it's like to be a freak and so on. Mescaline is a tour de force about his first drug experience in Newark in the early 1950s; other random material includes a take-off on oil slicks, where he envisions a "Coke slick" in the Pa.
cific which results in pimply mermaids and causes sharks' teeth to fall out. "The Uncle Dirty Primer" wears much better under repeated listenings than most comedy albums.

M.J.

**David Blue:** Stories. David Blue, guitar, piano, and vocals, vocal and instrumental accompaniment. Looking for a Friend, Another One Like Me, House of Changing Faces, Marianne, Come On John. three more. Asylum SD 5052, $4.98.

David Blue started his folksinger career as David Cohen; then became David Blue; then S. David Cohen; and now, apparently, David Blue again. If Engelbert Humperdinck were to do this it would take the music business years to recover.

Blue is a mild, mellow singer, using his low range tentatively, cautiously, more to intone phrases than to sing them. Such a style requires hard work on the song lyrics. How Much Is That Doggie In the Window just doesn't sing well that way. This is the fault of the LP. While it sounds nice and relaxing, ultimately attention is drawn to words that are inconclusive and inconsequential. The overall tone seems to be one of despair, loneliness, and the longing for something better. There are two songs that refer to drugs, and another, Marianne, seems to refer to Leonard Cohen's So Long, Marianne. But while a general theme (despair) is established, it is not developed in a particularly original manner: and though the singing is nice, there are no outstanding melodies. "Stories" isn't a bad record, but that's not good enough.

M.J.

**On the Town.** Nancy Walker, Betty Comden, Adolph Green, Cris Alexander, John Reardon, George Gaynes; Leonard Bernstein, cond. For a feature review of this recording, see page 78.

200 Motels. Original motion picture soundtrack recording. Mothers of Invention. After the film's opening, most people agreed that it was the Mothers' ultimate creative expression. They also agreed that the movie was awful.

Before its debut, rumor had it that 200 Motels was the ultimate creative expression of Frank Zappa and his band of musical maniacs, the Mothers of Invention. After the film's opening, most people agreed that it was the Mothers' ultimate creative expression. They also agreed that the movie was awful.

The Mothers have always flaunted their grotesqueness. Willing to satirize or parody almost anything, they've done their best to be outrageous. Occasionally, to prove they are not merely a wild-eyed rock-and-roll band, they've trotted out a classical selection and proceeded to play and/or demolish it. Hostile...
funky, and anarchistic, the Mothers have frequently set their sights too low and have been sophomoric rather than deadly. 200 Motels is their thirteenth album and they are essentially doing the same things they did when they first recorded in 1966. The only new addition is an increased air of desperation.

This desperation poisons the nonsensical pandemonium which is the Mothers' feature-length film debut. One can only sympathize with the members of the Royal Philharmonic who saw away futilely at the Zappa score while the Mothers' grab-bag of shenanigans threatens to overwhelm them.

The two-record soundtrack album captures the really inventive moments in the film, and also further illustrates the film's faults. Zappa has composed some terrific songs. Daddy, Daddy is a solid rock number; Mystery Roach is another driving tune; Centennial is an apt tribute to middle America, and the score's overture and finale are hilarious comments on movie musicals and grand opera.

The album has eighty-three minutes of Zappa's music. But most of the music is banal, repetitive filler. The Mothers will endure. They are a tough bunch. They also have loads of talent, too much to waste on any more of this adolescent drivel.

I sincerely hope that they decide to grow up.

H.E.

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**Jazz**

**ARTHUR "BIG BOY" CRUDUP:** The Father of Country Blues. Arthur Crudup, vocals and guitar, various supporting musicians. Mean Old Frisco Blues; Rock Me Mamma; That's All Right; thirteen more. RCA Victor LP 573, $5.98 (mono only).

**LIL GREEN:** Romance in the Dark. Lil Green, vocals; various supporting musicians. Romance in the Dark, Why Don't You Do Right; Country Boy Blues; thirteen more. RCA Victor LP 574, $5.98 (mono only).

**LIONEL HAMPTON:** Stompology, Vol. 1. Lionel Hampton, vibraphone, piano, drums, and vocals; various small groups. On the Sunny Side of the Street; Buzzin' Round with the Bee; Join' the Vibe; twelve more. RCA Victor LP 575, $5.98 (mono only).

**HOT LIPS PAGE:** Feelin' High and Happy. Hot Lips Page, trumpet and vocals; various small groups. Skidluggery; Rock It for Me; Thirsty Mama Blues; thirteen more. RCA Victor LP 576, $5.98 (mono only).

**WASHBOARD SAM:** Feeling Lowdown. Washboard Sam, vocals and washboard; various supporting musicians. Brown and Yellow Woman Blues; I've Been Treated Wrong; I Get the Blues at Bedtime; thirteen more. RCA Victor LP 577, $5.98 (mono only).

**SWING, VOL. 1.** Gene Krupa's Swing Band: Una Mae Carlisle with Lester Young's Orchestra. Jam Session at Victor; Frankie Newton's Orchestra. Esquire All-Americans; Chubby Jackson's Jacksonville Seven. RCA Victor LP 578, $5.98 (mono only).

RCA Victor has thought better of its decision to drop the invaluable Vintage reissue series. After a hiatus of a couple of years, the series has been reinstated and with Don Schlitten as producer has started off again with six releases—three jazz discs and three blues. The jazz list is headed by Lionel Hampton's "Stompology," a set of his studio group sessions made in 1937. Most of them have been reissued from time to time on LP, but if the current release is any indication, this may be the first time that the whole series will be released in order. The disc is made up of Hampton's first four sessions as a leader, using groups that include Johnny Hodges, Cootie Williams, Jess Stacy, and Zige Eelman. These are some of the best small-group swing recordings ever made. There is not a dud in the set and it reaches exceptional heights on Sunny Side of the Street with a gorgeous Hodges solo, and the remarkable Buzzin' Round with the Bee on which Jess Stacy demonstrates how a pianist can drive a bunch of horns.

"Swing, Vol. 1." is a miscellany of small swing groups plus four songs by Una Mae Carlisle. These cuts gain a place in jazz annals because Lester Young leads the supporting band, taking a couple of beautifully Lesterian solos and twining them around Miss Carlisle's voice in much the same way that he did with Billie Holiday. There are also three pieces by Frankie Newton who had a trumpet style in the '30s that was as distinctive and personal as Lester Young's on saxophone. Of the three new Vintage jazz releases, the weakest is the set by Hot Lips Page, because Page was an excellent trumpeter and singer although he was, unfortunately, rarely shown to good advantage on records. The material and surroundings are relatively drab through most of this set but Page manages to penetrate the murk whenever he gets a clear field.

The three blues discs also break down to two excellent sets and one of limited interest. The Lil Green collection is a revelation for those who were not around when these records came out in the Forties. Miss Green had in-
"Big lto." Crudup was really the last of the great country singers rather than "the father of rock-and-roll," as the record's tagline puts it (this is based on his purported influence on Elvis Presley). Now, a quarter of a century after these records were made, they hold up remarkably well. Crudup gave each of his songs an individuality of interpretation and a vitality that managed to overcome the relative sameness that descends on an LP made up of single 78-rpm blues records. Washboard Sam did not have Crudup's range as a performer or an equally effective tenor saxophone. The six Galper originals that make up this disc frequently use a sighing, singing ensemble blend that floats airily over a rhythm section that is pouring out patterns of busy, slyly enveloping musical situations. And when it was recorded on this disc, for example, seems a completely new and com-
plete realization. And when it was recorded after the disc has been played through.

HAL GALPER: The Guerilla Band. Hal Galper, electric piano; Randy Brecker, trumpet, electric trumpet solo and Galper uses his electric piano as something more than an electronic tinkie. J.S.W.

GATO BARBIERI: Fenix. Gato Barbieri, tenor saxophone; Lonnie Liston Smith, piano and electric piano; Joe Beck, electric guitar; Ron Carter, electric bass; Na Na, birimbau and congas; Gene Golden, conga and bongos; Lonnie White, drums. Tupac Amaru; Carnavalito; Bahia; three more. Flying Dutchman 10144, $5.95.

This disc must be considered as an interim report on Gato Barbieri, who seems well on his way to becoming the first major saxophone star of the Seventies. Barbieri, an Argentinian, has been heard on records and in person in the U.S. since 1965 when he was brought here by Don Cherry. Through this association Barbieri became identified with the grate-and-squeal school of avant-garde saxophonists. But then, two or three years ago, he realized that his musical roots really lay in the music of Argentina, Brazil, and Colombia. He returned to South America and spent months there re-acquainting himself with that music.

These studies combined with his jazz background have opened up Barbieri's playing, enabling him to produce a singing, melodic attack in which his naturally grainy tone can give meaning to the kind of harsh passages that once seemed to be simply thrown in gratuitously. There are times on this disc when he and his group sound very much like Mahlers's band of the late Forties when Charlie Parker, Flip Phillips, and Brew Moore were featured with it. And the shadow of John Coltrane hovers over much of Barbieri's playing.

But this record, made in April 1971, does not fully represent Barbieri as heard live a mere six months later when the kind of music he plays on the disc had been further refined and developed and his group was creating massively enveloping musical situations. Bahia on this disc, for example, seems a completely finished realization. And when it was recorded may have been. But since that recording session, Barbieri has developed the piece to such an extent that this recorded version represents little more than part of a magnificently bravura performance. You can figure something really happening when a musician's recordings can't keep up with his growth.

J.S.W.
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in brief

Ben Sidran: Feel Your Groove. Capitol ST 825, $5.98.

A Ph.D. in American Studies (University of Sussex), Sidran began to play piano for the Steve Miller and Rolling Stones recordings, and attracted attention in that department. His debut album is an unusually attractive blend of jazz and hard rock and is eminently recommendable.

Little Richard: King of Rock and Roll. Reprise RS 6462, $4.98.

A combination Little Richard propaganda campaign ("I am the Georgia Peach") and hard rock. The rock is magnificent, but the outrageous nature of his propaganda fades after a few listenings. Okay, we know you're the Georgia Peach. Stop talking and play.

The Chambers Brothers: Greatest Hits. Columbia C 30871, $4.98. Tape: Ca 30871, $6.98; CT 30871, $6.98.

Time is not dealing kindly with the Chambers Brothers. Once a high-energy favorite, the band's music now merely conjures up pleasant memories of 1967 when going to a discotheque was the thing to do.


Some familiar traditional folksongs from one of the few families still singing them. This album consists of songs recorded in 1971, including Roll in My Sweet Baby's Arms; The Cuckoo; and Travellin' Man. It's kind of refreshing to hear someone sing about train wrecks and gamblers instead of motorcycle accidents and dope dealers.

Earl Scruggs: His Family and Friends. Columbia C 30584, $4.98. Tape: Ca 30584, $6.98.

This album is a thoroughly attractive selection of musical and spoken excerpts from an NET TV special about the life and times of the fabled five-string banjoist. Among those who join Scruggs are Joan Baez, the Byrds, and Bob Dylan.

John Prine: Atlantic SD 8296, $4.98.

John Prine has already been heralded as the new Bob Dylan. Kris Kristofferson even suggests as much on the album liner notes. Prine's songs show flashes of insight, but the composer seems to confine himself primarily to making simplistic statements about such subjects as drug addiction and the Vietnam war. Experience could help him develop a richer set of perceptions and a more distinctive singing style. The wrong kind of attention now would not be to his best advantage.


Bridget St. John is an authentic English gentlewoman. Her songs are intelligent, delicate, graceful. Unfortunately her voice does not match, being rather sluggish and unmusical like her melodies. A for poetry; C-plus for musicality. But maybe you'll get used to the blend.
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CASH FOR UNWANTED STEREO LPS AND PRERECORDED TAPES. Reder, 81 Forshay Road, Monsey, New York 10952.
All-Beef Baroqueburgers. Probably no musical fare can be more substantially satisfying than Bach’s best, but there are strongly contradictory opinions on how it should be prepared. The once-dominant romantic (highly seasoned) method still has persuasive appeal for many, yet a planer, more historically authentic treatment is increasingly acknowledged nowadays to be far closer to Bach’s own intentions and the customs of his time. So it is rare indeed to find a current presentation of the Brandenburg Concertos that can please both “romantic” and “purist” tastes—but the new version by Benjamin Britten and the English Chamber Orchestra does just that.

Britten uses modern rather than old instruments (except for the harpsichord part superbly realized by Philip Ledger), a relatively large ensemble (except for a chamber-sized Third Concerto), and a far from austere interpretative expressivity. Yet his performance is so infectiously high-spirited, it captures so much of Bach’s illuminating energy and gusto, and avoids so scrupulously any really serious idomatic anachronisms that even strict purists must find it irresistibly invigorating. Moreover, it is sonically one of the best-balanced, robustly yet warmly recorded Bachian masterpieces available to date. And while the present two-cassette edition is inexplicably non-Dolbyized, the relatively slight surface noise is mostly submerged in the sweeping torrents of the music itself (London/Ampex D 10223, $14.95: notes-booklet on postcard request).

A century before Bach and thus more influenced by Renaissance taste ideals, Giovanni Gabrieli was one of the great prophets of present-day stereosim in his panoramic works written for antiphonal vocal and instrumental ensembles located in the widely spaced choir lofts of the highly reverberant Basilica of San Marco in Venice. Hence the special audiophile appeal of Columbia’s recordings made in the Basilica itself with the Gregg Smith Singers, Texas Boys’ Choir, organist Buggs, and the Tarr Brass Ensemble under Vittorio Negri’s direction. “The Glory of Venice” program, fourth in this series, is every bit as thrilling-musically, sonically, acoustically—as its predecessors. But in its Dolbyized cassette edition it makes me eat my earlier words. In June 1970 I asserted that “no cartridge or cassette reproduction could possibly approach the grandeur of interior playback of the ... 7½-ips open-reel edition” of Vol. 3 in this series. The far technological advances of just the last year now make that “impossibility” an actuality (Columbia MT 30937 cassette; MA 30937 8-track cartridge, $6.98 each).

Returning to the High Baroque, it is the novel, well-varied musical appeal rather than the sensational sound that primarily distinguishes Vol. 2 of the Richard Bonyng/English Chamber Orchestra series of Handel Overtures and Sinfonias (London/Ampex M 10243 Dolbyized cassette, $6.95; also L 80243 7½-ips reel, $7.95). The first-rate orchestral playing (embodying somewhat overzealous “period” double-dotted and embellishments) is vividly but sometimes a bit too intensely recorded, and while the cassette processing is admirable for its minimization of surface noise, it is less so for some intrusions of adjacent channel spill-over, usually uncommon in the cassette format. But what incomparable music! The very titles fire one’s imagination: Serenata, Julius Caesar, Farnamonda, Judas Maccabaeus, Aemus, Deidamia, Scipione, Radamisto, Belshazzar. And even Handel himself never has been more exuberantly exhilarating than in the last two of these in particular. (But this Vol. 2 reminds us that we haven’t yet had a taping, in any format, of Vol. 1 released in disc form a few years ago.)

Vanguard Revisited. In recent years there’s been practically nothing (outside of a couple of Astrostereo anthology reels) in the way of new tape releases under the Vanguard/Bach Guild/Everyman labels which hallmarkmed so many outstanding works in the earlier open-reel repertory. Hence it’s good to have (as the next best thing) a batch of cartridge-and-cassette reissue collections, even under the now meaningless “Best of...” rubric. Issued as double-play tape equivalents of corresponding “twofer” disc sets, these two are bargains at the standard “single”-length price—but it’s disappointing to find that each of the examples I’ve heard so far meanly omits one of the disc-version selections listed on the barely legible cover.

Nevertheless, there still remains a wealth of fine music in first-rate, if not always very recent, recordings. I haven’t yet heard the “Best of Bach” and “Best of the Virtuoso Instrumentalists” programs, and have heard the Haydn, Mozart, and Stokowski programs only in their 8-track cartridge editions (there are also cassette versions), which are by no means ideally edited. Even in carbone listening some of the long waits between selections are annoying and there’s an inexcusably jarring movement break in the fine Mozart Piano Concerto, K. 271 with Brendel as soloist. The cassette editions undoubtedly are preferable, yet I tend to forget my nagging cartridge complaints in the joy of traveling with such old friends as the Wolflike Military and Janigro Farewell Haydn symphonies; the Grillers’ Rider Haydn Quartet, Prohaska’s Mozart Jupiter Symphony; Stokowski’s Mozart Serenade for thirteen wind instruments (minus two of its seven movements), Thomson Plow That Broke the Plains, and Stravinsky L’Histoire du Soldat Suite, to mention only the major works included here (Vanguard/Ampex 8-track cartridges: Haydn M 8703/4, Mozart M 8705/6, Stokowski M 8707/8: $6.95 each).

Waiting for Werther. And it’s been a considerable wait for Angel’s acclaimed first stereo version of Massenet’s second most popular opera (Manon of course is the best liked). Werther was delayed over a year and a half before achieving tape release and then more months went by before I finally received a review copy of Angel/Ampex G 3736, two 7½-ips reels, $19.95; libretto included. But it was well worth waiting for: even for listeners like me who must scant intellectual respect for Massenet but must respect themselves emotionally susceptible to his sensuously beguiling charm. In any case, Victoria de los Angeles’ Charlotte bewitches us as completely as she does Werther, while in the title role Nicolai Gedda sings as beautifully as he ever has on records (if in more Italianate than Gallic style). The rest of the cast is authentically French, as are the chorus, the Orchestre de Paris (in its first operatic appearance), and conductor Georges Prêtre—still in first-rate form, as are the engineers, with notably rich if sometimes overdense recording, and the Ampex processors.

Then for the innumerable fans of Victoria de los Angeles herself, there’s a delectable encore in the form of a “Spanish Folk Song Recital” (Angel/Ampex L 36716, 7½-ips reel, $7.95; text leaflet included). The featured item is a set of thirteen folksongs collected and arranged with piano accompaniment by the poet Federico Garcia Lorca; but perhaps even more valuable is a set of ten Sephardic songs arranged by Manuel Valis with flute and guitar accompaniments. And there is curious fascination in two unfamiliar relatively early songs by Manuel de Falla: Psyché and Soneto a Córdoba with accompaniments featuring the harp—alone in the latter song, with flute and string trio in the former. Unfortunately, the immaculate recording is marred by some slight pre-echoes and reverse channel spill-overs.
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