

The Scott News



Vol. 7

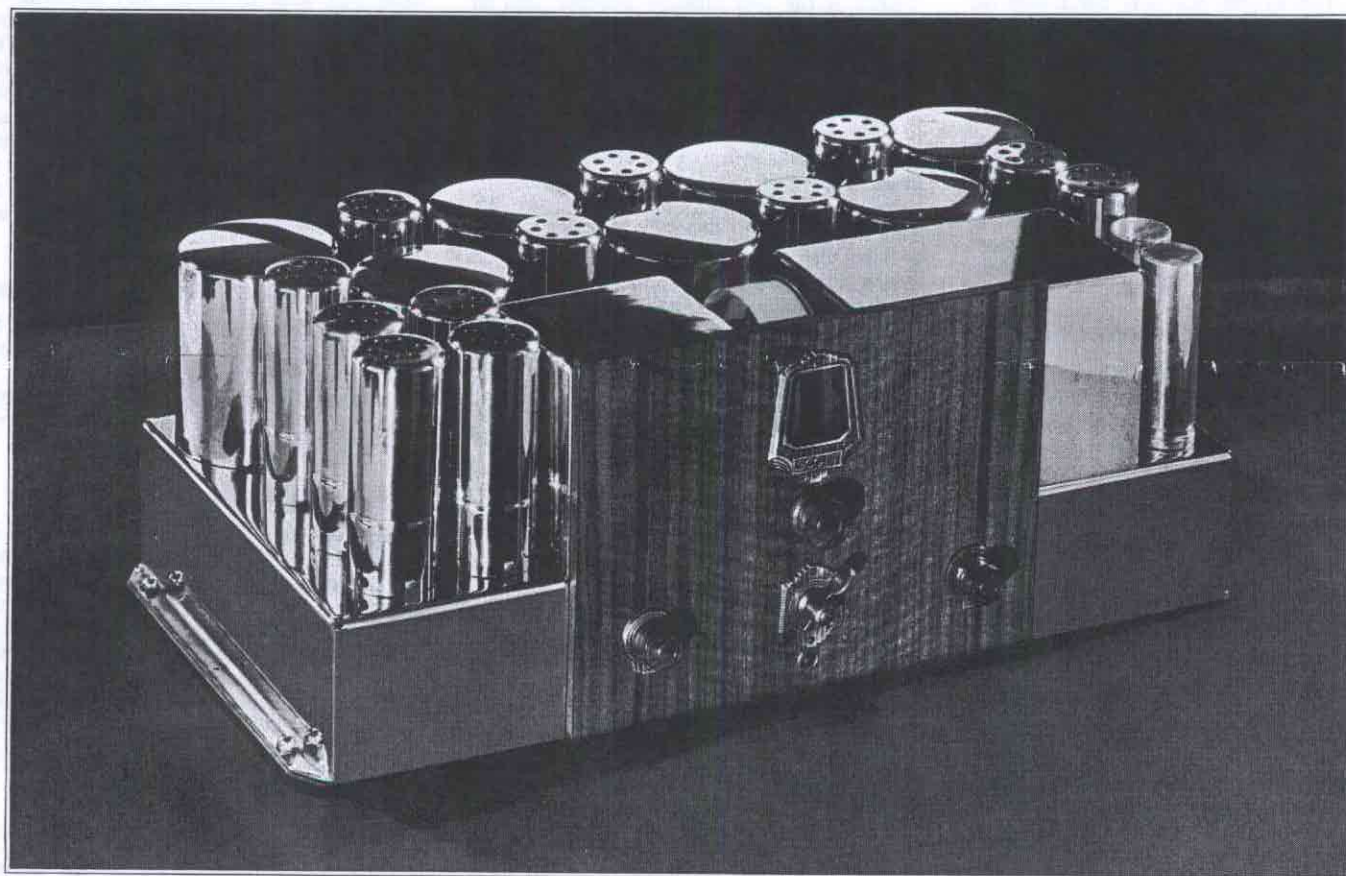
FEBRUARY, 1934

No. 1

THE SCOTT ALLWAVE FIFTEEN A SENSATIONAL RADIO RECEIVER

GUARANTEED—To outperform any other receiver in either a Laboratory or side by side reception test!

BECAUSE—It is built by more highly skilled technicians—With greater precision—From higher quality parts—Is more carefully adjusted and tested with Laboratory Precision Measuring Instruments—Is more accurately calibrated on all wave bands—And because all claims we make we are prepared to PROVE 100%!



THE SCOTT ALLWAVE FIFTEEN

WORLD'S FINEST RADIO RECEIVER

General Description

WE believe most prospective purchasers of a high class receiver are only interested in definite, clear and concise explanations of the various distinctive features incorporated in its design, and in the reason why these features make the receiver better than others, and not in mere printed statements or claims of superiority, unsupported by proof of these claims.

In the following pages you will find information on the new SCOTT ALLWAVE FIFTEEN, in which is described a number

of features which are not at the present time incorporated in any other radio receiver, but which we know, if history repeats itself, will be found in most of the "new" Allwave receivers in 1935. We make this definite statement on the basis of the fact that in a large number of the Allwave receivers recently introduced, you will find incorporated features which are now regarded as absolutely necessary, which were first developed in our laboratory and have been incorporated in the SCOTT ALLWAVE DELUXE for over a year.

All Tuning Controlled with Single Knob

The tuning of all stations, both on the short waves and broadcast band is accomplished by a single knob located directly below the dial. No trimmers are required to secure 10 KC selectivity on any wavelength.

Station Selection

All wave bands between 13 and 550 meters are completely covered (no gaps) by means of an exclusive mechanical coil changing device perfected in our Laboratory. (See page 10.) The small lever directly below the tuning knob enables you to select in a second, any one of the four different wave bands. This system not only eliminates the necessity for separate plug-in coils, but as an examination of the coil changing mechanism will show, it is actually more efficient than plug-in coils, because this design enables shorter leads to be used between the coils and tubes, than is possible with plug-in coils or the usual fixed coils used in conjunction with a tapped switch, thus eliminating the long leads which tend to introduce feed-back and oscillation, and a consequent reduction in the sensitivity of the receiver.

Wave Bands Covered

All wave lengths between 13 and 550 meters are covered by four wave bands, any one of which can instantly be switched in by means of the small lever located below the main tuning knob.

The first wave band covers the regular broadcast stations from 200 up to 550 meters, or 1500 to 540 KC.

The second wave band covers the wave lengths used by Police Stations, Airport Stations and Transmitters on Airplanes, and the 160 and 80 Meter Amateur Phone Bands. All of these stations have been made extremely easy to locate by printing directly on the dial, the section where their calls will be found.

The third wave band covers the wave lengths between 30 and 75 meters. On this band will be found the principal foreign short wave broadcast stations whose signals are heard during the late morning, afternoon and evening.

The fourth wave band covers all wave lengths from 13 to 30 meters, and on this

band will be found the foreign short wave broadcast stations whose signals are generally heard best during the morning hours.

At the present time GSH, Daventry, England, on 13.94 meters uses the lowest wave length of the foreign broadcast stations, so that the SCOTT ALLWAVE FIFTEEN has well within its wave length range every foreign short wave broadcast station transmitting today.

Dial Calibration

The frequencies of the four different wave bands are accurately calibrated directly on the dial, which is divided into four sections. This direct calibration is extremely accurate, not only for the broadcast band, but we believe the SCOTT ALLWAVE FIFTEEN is the first allwave receiver, and to the best of our knowledge, the only Allwave receiver, in which the calibration of the short wave bands is as accurate as that on the broadcast band.

This accurate calibration of the short wave bands, as well as that of the broadcast band has been made possible by the advanced circuit design incorporated in the new SCOTT ALLWAVE FIFTEEN, together with the extremely close limits to which all coils and condensers, etc., are kept, and finally their calibration by special laboratory equipment, the frequencies of which are correct within plus or minus five cycles in a million.

When it is realized that broadcast stations are separated by frequencies of 10 KC, or 10,000 cycles, it will be appreciated how accurate and precise is the calibrating equipment used, when its frequency is correct to within five cycles.

Visual Tuning

A Tuning Indicator is projected directly on the face of the tuning dial (this is an exclusive development of our laboratory) which shows when a station is tuned in perfectly. When a station is tuned in, simply turn up the volume control until the program comes in with desired volume.

By projecting the Tuning Indicator directly on the face of the tuning dial, the necessity for a separate dial for the Visual Tuner is eliminated, making it an easy matter, even for the very inexperienced tuner, to bring in a program perfectly.

Short Wave Station Locator

One of the difficulties experienced in tuning in short wave stations on the regular type of receiver is due to the fact that all short wave stations come in on a very small fraction of the dial, and until one has had considerable experience, it is difficult to locate short wave stations. To overcome this difficulty, a Short Wave Station Locator, or Beat Frequency Oscillator, is incorporated in the design of the new SCOTT ALLWAVE FIFTEEN.

To find a short wave station with the SCOTT ALLWAVE FIFTEEN, you simply press in the small black button which will be noted directly below the wave change switch lever. This closes a circuit, putting the Beat Frequency Oscillator into operation. Then you simply tune over the wave band you wish to cover, and immediately a short wave station is tuned in, it makes its presence known by a loud whistle. You then release the pressure on the button, which disconnects the Beat Frequency Oscillator, and immediately, if it is a broadcast station, in comes the music from the station. This makes it just as simple and easy to tune in short wave stations as it now is to tune in stations on the regular broadcast band.

Silent Tuning Between Stations

Any station may be tuned in silently by simply turning back the volume control, tuning in the station desired by means of the Visual Tuner, after which the volume control can be turned up to bring in programs with any desired volume.

Manual Control of Volume

Any desired degree of volume can be secured, from a whisper to the full volume of 11 watts if desired, without distortion, from even the most powerful local station, simply by turning the volume control knob located at the left of the wave change switch lever. In most regular types of receivers with any degree of sensitivity, distortion occurs when the volume is turned down to a low level on a powerful local.

Volume Automatically Controlled

Once the volume is set at the desired level, it is kept there automatically in the new SCOTT ALLWAVE FIFTEEN by the

perfected Automatic Volume Control system incorporated in its design, which holds the volume of signals from stations near and distant at a practically constant level.

Nothing is more annoying than to tune in a distant station and have the pleasure of your reception spoiled by the constant fading in and out of the signal. If the signal strength of a station weakens, the Automatic Volume Control takes hold instantly, automatically bringing up the sensitivity of the receiver. When, however, the strength of the signal suddenly increases, the Automatic Volume Control instantly and automatically reduces the Sensitivity of the receiver, so that the volume of the program from the station you are listening to is brought back to the volume you desire to listen at.

The Automatic Volume Control is valuable when tuning over the dial from one station to another, as it entirely eliminates the blasting or interference one generally receives without Automatic Volume Control, as when you tune from a distant station to a local one, the local station comes in with a deafening blast. With the perfected Automatic Volume Control System incorporated in the SCOTT ALLWAVE FIFTEEN you can set the volume at any desired point, then tune from the top to the bottom of the dial, and notice little difference between the volume of a local station, and another station perhaps thousands of miles away.

On the new SCOTT ALLWAVE FIFTEEN, you will find it fascinating to tune in a distant station, then watch the Tuning Indicator which is connected to the Automatic Volume Control System. You will notice the Indicator swaying gently to and fro across the dial as the strength of the signal from the distant station fades in and out, yet the program coming from your speaker remains at practically constant volume, giving you visual evidence of the way the Automatic Volume Control System instantly and automatically controls the sensitivity of the receiver, so that you may listen to a program at constant volume.

Static Control

The elimination of static has been the goal of Radio Engineers for many years. We do not claim that the Static Control we have developed will eliminate static 100%, but it does enable you, when static or electrical interference is bad, to so reduce the effect of it that it is possible to listen with pleasure to programs which, without the Static Controller, would have to be tuned out. This is accomplished by means of the small knob on the right hand side of the wave change switch lever. It makes the reception of distant stations much quieter and more pleasant to listen to than ever before, and is especially valuable in locations in the tropics where static is usually bad for several months of the year.

Tone

Here at the Scott Laboratory we believe the most important quality a radio receiver must have is TONE. While it is true a re-

ceiver must have Sensitivity sufficient to bring in far distant stations with loud speaker volume, and while it must have Selectivity fine enough to separate powerful locals and bring in low powered distant stations on adjacent channels, still, in our opinion, no receiver is worthy of a place in the home unless it will bring in the programs you desire to listen to so clearly and naturally, that when you turn your back to the speaker, the reproduction is so natural you find it difficult to believe that what you are listening to is coming from a radio receiver.

SCOTT RECEIVERS have always been noted for their very beautiful tone. However, constant research has enabled us in the SCOTT ALLWAVE FIFTEEN to produce an instrument that has even finer tone than any previous model we have ever built. When you are listening to a voice, you hear that voice so clearly and naturally, that if you close your eyes it is not a difficult task to imagine that the person is standing talking to you, face to face.

You will find when you are listening to an orchestra, that you will hear instruments in the lower and higher ranges that you have never before heard coming from the speaker of any radio receiver. You will hear violins, trumpets, cymbals and other instruments, just as naturally as you would hear them if the orchestra were in front of you. When you listen to a piano, you not only will hear the notes of the piano coming from your speaker as clearly as if the pianist were playing in your own room for you, but you will hear it so clearly and naturally that you can actually, at times, hear the thud of the felts on the hammers striking the piano strings. We believe we can say without fear of contradiction that the new SCOTT ALLWAVE FIFTEEN sets an entirely new standard in the reproduction of voice or instruments from a radio receiver.

Selectivity

In the last analysis, the final test of any receiver is its actual performance. Laboratory measurements and tests are very essential in the development of a receiver. In fact an instrument such as the new SCOTT ALLWAVE FIFTEEN could not possibly have been developed to its present high degree of efficiency without the use of not merely laboratory equipment, but the very finest and most precise laboratory instruments.

But the laboratory tests, fine as they are, are not, we believe, the thing that interests the purchaser of a radio receiver *so much as what it will do in his home.*

In our laboratory we have developed an R.F. and I.F. system by which we can secure practically any degree of selectivity. If necessary, we can supply an instrument that is nearly twice as selective as the new SCOTT ALLWAVE FIFTEEN, but such selectivity is unnecessary under present conditions, because broadcast stations are still separated from each other by 9 KC in Europe and by 10 KC in the United States. You will find in this new receiver that it is an easy matter to separate powerful local stations and bring in distant stations, sepa-

rated from your locals by these frequencies. Ten kilocycle separation is not a mere claim, it is an actual accomplished fact with the new SCOTT ALLWAVE FIFTEEN.

Sensitivity

To bring in distant broadcast stations requires great usable sensitivity. For example: A receiver may have fractional microvolt sensitivity, but if a large percentage of that sensitivity is noise created in the receiver itself, it may reduce the usable sensitivity anywhere from 25% to 75%. High sensitivity combined with a low noise level, is most difficult to attain, but in this new receiver you will find sensitivity, *usable sensitivity*, of such a high order that it is a simple matter to bring in stations thousands of miles distant, and listen to them with pleasure.

Actually, broadcast stations in England, France, Germany, Spain, South America and other countries in every corner of the globe, can be brought in so clearly, *every day in the week*, with such volume that you find it difficult to believe the program is not coming from a station only a few hundred miles away from you.

All Parts Guaranteed Against Defect for Five Years

The SCOTT ALLWAVE FIFTEEN is built from such high quality parts; the actual building of it is done by such highly skilled technicians; all units so impregnated and treated to protect them against the effects of moisture, and all adjustments so carefully made and permanently fixed that we believe no part of this receiver will ever break down.

Every SCOTT RECEIVER produced during the past four years has carried a Five Year Guarantee, and many hundreds of them have been in constant use for years, and are today still serving their owners and giving them perfect satisfaction in nearly every part of the world.

All Parts Protected to Withstand Climatic Changes

All coils are impregnated by a special process which assures that they will retain their characteristics and remain constant even in humid tropical climates. All audio transformers and chokes are hermetically sealed to prevent moisture entering and causing break-down in damp locations. The field coil of the Special SCOTT Speaker is treated with a moisture proof compound, and a damp proof cement is used on the speaker cone to assure continuous operation even under the most severe climatic conditions. All metal parts, including the chassis base, both on receiver and amplifier, the tube shields, coil shields, condenser covers, and even the parts under the chassis which cannot be seen, are chromium plated, which not only makes all of these metal parts rust proof, but insures that the receiver will preserve its beautiful finish for years, even when continuously exposed to the air.

TECHNICAL DESCRIPTION OF THE SCOTT ALLWAVE FIFTEEN

Brief Specifications:

Superhetrodyne—13 to 550 meters—15 Tubes—Pre-Selector stage using a triple grid super control type 58 tube—Mixer stage using triple grid super control type 58 tube—Oscillator using type 56 tube—Three stages of I.F. amplification with six tuned circuits, using three triple grid super control 58 type tubes—Second detector circuit using Wunderlich tube—Automatic Volume Control on *all* triple grid super control type 58 tubes—Three stages of Audio amplification using three type 56 tubes in first two stages and last stage push pull using two type 2A3 power tubes—Rectifier using one type 5Z3 tube—Beat Frequency Oscillator using one 56 type tube—Amplified tuning indicator using a type 56 tube into special Visual Tuning meter.

Pre-Selector Stage

The use of a pre-selector stage is now recognized as being absolutely necessary in a superhetrodyne receiver and has been very carefully engineered into the SCOTT ALLWAVE FIFTEEN, for only with its use will a superhetrodyne receiver be free from an annoying series of whistles as one tunes throughout the scale (known to the radio engineer as image frequency interference). In our pre-selector stage, we have very carefully determined for each one of the short wave bands, as well as the broadcast band, by precise laboratory measurements, the proper amount of coupling and the degree of sensitivity necessary for this preselection, to secure the reduction of side noise or image to the absolute minimum.

The Oscillator Circuit

In the oscillator circuit the type 56 tube is used, the characteristics of which make it more suitable for use as a short wave, as well as broadcast band oscillator, than any other type of tube. The oscillator circuit is coupled to the Mixer stage in such a way that it not only gives perfect modulation, but at the same time, by means of a special circuit developed in our research laboratory, automatically tracks or aligns it with the R.F. stage so that the two circuits can be operated by a single dial without loss of either sensitivity or selectivity from 13 up to 550 meters.

In addition to this feature we have perfected a method of adjusting the tracking or aligning of the circuits throughout every one of the various wave bands, which assures the user that the adjustment of a SCOTT RECEIVER will remain perfect indefinitely.

Oscillator Stability

A new development incorporated in the SCOTT ALLWAVE FIFTEEN is an oscillator circuit which entirely eliminates the "drifting" or "creeping" of stations when

first tuned in on the short wave bands. In this new receiver a station can be tuned in on the short waves as soon as it is switched on, and the stability of the oscillator is such, that even after the receiver has been operating an hour or more, no "drifting" of the signal will take place during this time. We believe this is a feature not found on any other ALLWAVE receiver being built today, except this new SCOTT ALLWAVE FIFTEEN.

The I.F. Amplifier

The sensitivity of a superhetrodyne receiver depends largely on the efficiency of the I.F. amplifier.

As mentioned previously, we have been designing and building nothing but superhetrodyne receivers for the past ten years, and over four years ago our research convinced us that the ideal frequency for an Allwave receiver lies between 465 and 470 KC. Until very recently, however, 90% of all superhetrodyne receivers used a frequency of 175 KC, and it is now very interesting to us to find that the great majority of receivers introduced during the past six months are now using this frequency, proving just once again the advanced circuit design incorporated in SCOTT RECEIVERS.

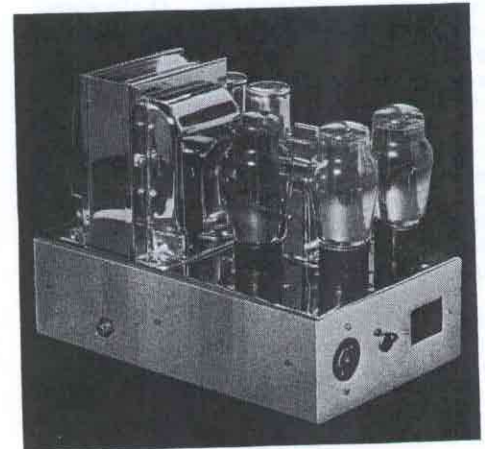
The design of the I.F. coupling unit is radically different to that employed in any other receiver, and consists of a highly developed tuned impedance coupled circuit in which the primary and the secondary of each stage is shielded from each other. Then each complete I.F. unit is also perfectly shielded from each other and from the other circuits in the receiver.

It is this system, which is many times more costly to incorporate than the usual I.F. amplifier, that enables us to make use of the full amplification or gain of the new triple grid control tubes, and is just another of the features that makes possible the consistent, dependable, enjoyable reception of foreign stations in every part of the world.

The Audio Amplifier

One of the surest ways of provoking discussion in a group of radio listeners is to have two or more sets compared for fidelity of reproduction. Hardly any two individuals have the same opinion on the same receiver, and those who agree on any one receiver being better than another, will advance totally different reasons for their preference.

This does not indicate that it is impossible to build a receiver which will please all. It rather indicates that in the average receiver the types of distortion are so many and varied in their characteristics, that in an endeavor to adjust one's self to the dis-



The Power Amplifier

tortion, various individuals react in various ways.

However, this same group, if seated in an auditorium listening to an orchestra, would probably all be unanimous in their approval or disapproval of its efforts. The answer, therefore, is very apparent, and that is to secure, in so far as is humanly possible, *absolute truthfulness of reproduction throughout the entire musical scale.*

We have spent a number of years of strenuous research on the attainment of absolute realism in the reproduction of voice and music. In the SCOTT ALLWAVE FIFTEEN you will find a new and highly developed audio system, with a very refreshing lack of boominess in the medium lows and in its place you will notice immediately when listening to the lows of the bass viol, the deep organ notes and the very low piano strings, that the tones are absolutely true and round yet *without any trace of boominess.* You will also notice at the other end of the scale, that the higher notes are likewise true in their character.

In the SCOTT ALLWAVE FIFTEEN the user will immediately appreciate the fact that the high notes in all their brilliance may be now enjoyed. This is in direct contrast to receivers which find it necessary to incorporate a "tone control" in order to eliminate raspy highs, caused by what we know, will soon prove to be obsolete circuit designs in audio amplifiers.

The circuit of the detector and first audio stage is very similar to that used in the finest broadcast stations. The second audio stage (two 56's) is coupled to the third audio stage (two 2A3's) in a special manner developed here in our own laboratory which we have found to be the only method which insures accurate reproduction at both ends of the scale, *together with absolute stability of the circuit and freedom from what is technically known as harmonic distortion.* The difference between this type of amplification and what has preceded it, will be immediately apparent to any music lover

as soon as the set is tuned to any good broadcast station.

Automatic Antenna Tuning

To secure extreme efficiency, the SCOTT ALLWAVE DELUXE was supplied with an external unit by which the antenna could be tuned to the frequency of the station being received. In the new SCOTT ALLWAVE FIFTEEN, *the tuning of the antenna is now accomplished automatically.* The circuit changes are automatically made when the wave change lever is switched to the different wave bands. This is a feature which is another exclusive development of our research laboratory and which we believe will unquestionably be widely copied by other designers of Allwave receivers in the near future, just as the circuit developed in our research laboratory for the automatic tracking of the oscillator and R.F. circuits is now being copied at the present time.

Automatic Volume Control

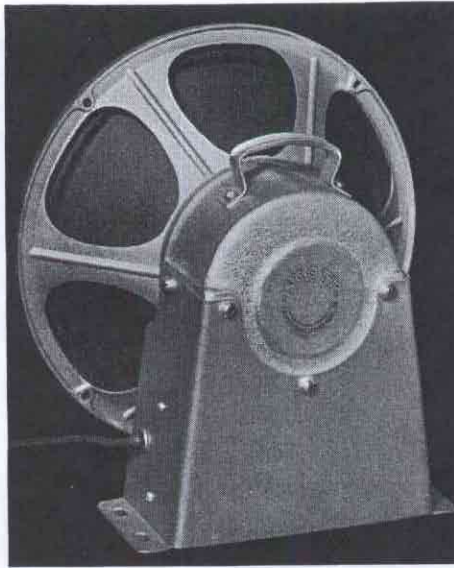
While Automatic Volume Control and Visual Tuning have been found on many receivers recently introduced, we believe it will be found on test, that while the majority of these systems operate on the broadcast band fairly well, their efficiency on the short wave band will be found to be limited. In the SCOTT ALLWAVE FIFTEEN, you will find incorporated an Automatic Volume Control system that keeps the volume of stations on the short wave band as steady as those on the broadcast band, and the Visual Indicator will also be found to give as positive an indication on the short waves, as it does on the broadcast band—a very important and highly desirable feature, especially for a radio owner who has had little experience in the tuning of short waves.

Microphonics Eliminated

We believe one of the outstanding developments incorporated in the SCOTT ALLWAVE FIFTEEN, is a feature that eliminates a trouble which has probably caused more white hairs to the radio engineer in his efforts to develop a short wave receiver, than any other single problem. For years we have studied this problem at the Scott Laboratory, but only during the past few months have we discovered how to eliminate it, thus making it possible to tune in stations even on the shortest wave lengths, without the annoying howl so often associated with the reception of short wave stations on the lower wave lengths.

The Scott Speaker

The remarkable tone quality of the new SCOTT ALLWAVE FIFTEEN is due in no small part to the special dynamic speaker which was developed from designs originating in our own research laboratory in conjunction with the engineers of one of the finest loud speaker manufacturers in the world. It is many times more costly to build than the regular type of dynamic speaker, but we believe the results secured amply justify this additional cost.



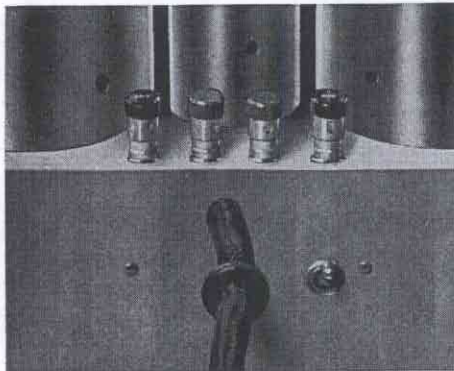
The Scott Speaker

The Scott Slow Motion Tuning Dial

No standard tuning dial could be found which was sufficiently accurate for this precision built instrument and the dial used on the SCOTT ALLWAVE FIFTEEN is one specially designed by our own experimental engineers and exclusively used in the Scott Receiver. It enables the tuner to secure micrometer adjustment in tuning. No cords or strings are used which invariably stretch in time, but a positive mechanical drive, with a very rigid mechanical construction is used, which eliminates every trace of back lash.

Equipped for Either Transmission Line Antenna or Straight Antenna

Another refinement that will be found in the SCOTT ALLWAVE FIFTEEN is connections for either a transmission line or straight line antenna. In locations adjacent to heavy automobile traffic or in business districts where there is interference from electrical equipment, the use of a shielded



Antenna Connections

antenna for the broadcast band, and a transposed transmission line type of antenna for reception on the short waves, is practically a necessity, if the quietest reception is to be secured. The SCOTT ALLWAVE FIFTEEN is, therefore, equipped with special

connections to which can be attached a tuned transmission type antenna for short waves, and a shielded antenna for the reception on the broadcast band. There are, however, no switches to operate each time you wish to change from the broadcast band to the short waves, or vice-versa, as this is done automatically when the wave change switch lever is operated on the front of the chassis.

Incidentally, the Scott Laboratories were the first to adapt the transmission type antenna to an Allwave receiver for the purpose of securing freedom from electrical interference on the short waves, another feature now copied and adopted and recommended as standard practice by most other manufacturers.

A small toggle switch is located just below the antenna connections at the back of the chassis. Where the receiver is to be operated in a residential location, free from electrical interference, the regular straight type antenna only is required, and the toggle switch is then left in the "up" position. When, however, it is necessary to use the two special antennae to overcome electrical interference, the toggle switch is left in the "down" position at the time of installing the set, and the transfer from one antenna to the other is taken care of automatically with the wave change switch lever.

Connections Provided for Phonograph or Microphone

Connections are provided on the back of the chassis to which can be attached either connections for a phonograph pick-up or a microphone.

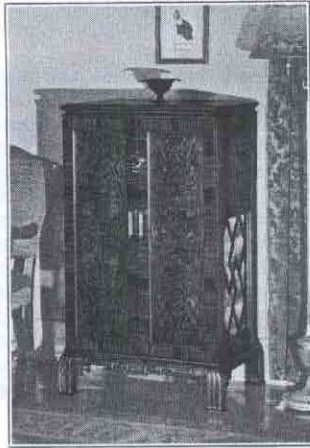
Headphone Operation

Occasionally an owner desires to listen in during the late evening or early morning hours and does not wish to disturb the other members of the family by the operation of the loud speaker. A headphone jack is, therefore, provided to which headphones can be connected, and reception listened to without disturbing other members of the family.

WHY FIFTEEN TUBES?

The SCOTT ALLWAVE FIFTEEN is equipped with fifteen tubes. *Every one of these fifteen tubes are required to secure the results accomplished with this receiver.* All of them are working at high efficiency, and the omission of any one tube would immediately reduce its performance. This explanation is given to answer the question which we feel sure will be in the minds of many of our readers. Scott Receivers are designed with one purpose only in view, and that is, to build the finest radio receiving instrument it is possible to build, for those who are looking for the maximum in radio performance.

The Roslyn

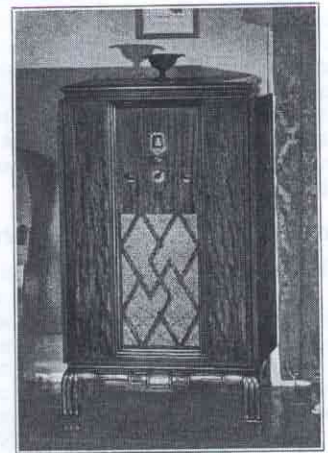


Side view of Roslyn Console, which gives perfect sound reproductions with closed doors.



Console

...A Revolutionary
New Design



With doors open The Roslyn is a conventional console with front speaker grill.

HERE is an entirely new type console, created for a special purpose.

In many fine homes the usual console is unsuitable because it does not harmonize with other furniture or fit in with the decorative scheme, being so obviously and obtrusively a "radio cabinet."

In such homes the Roslyn will be welcome. It conceals its actual purpose in the semblance of a beautiful closed bookcase or a china cabinet. Still more remarkable, it preserves that delightful, "un-radio-ish" appearance even when the marvelously-performing SCOTT RECEIVER which it contains is in operation.

Once a program is tuned in, the doors of the Roslyn may be closed and, although the room is filled with glorious music, it is extremely difficult to tell the source of the sound. No open doors, no exposed dials, no staring speaker grill—yet the sound reproduction is as fine and clear as though it came from a console of conventional type.

The fascinating secret of this effect is found in the slightly recessed speaker grill at the side of the Roslyn. Simple, isn't it? Yet, without revelation of the secret you might casually look upon the Roslyn a dozen times without realizing that it was a radio console. The clever way in which the side speaker grill is recessed makes it so unobtrusive as to be practically unnoticeable.

If you feel that the position of the speaker in the Roslyn—directing the sound to the side instead of to the front—in any way affects the tone, you may easily prove

the fallacy of this idea by a simple test with any conventional radio console.

Simply have someone stand at one side of a room with his back to the ordinary, conventional console. Then, turn the radio around so that the speaker grill faces to the side instead of directly toward the person with whom you are making the test. Tune in a program and allow the tester to listen. Then turn the receiver back so that the speaker is pointed directly toward the listener. After allowing the tester to hear the speaker in both positions, ask him to distinguish between the side-directed sounds, and those directed toward him. This simple experiment will quickly convince you beyond the shadow of a doubt that accurate determination of the directional source of radio reproduction is almost impossible.

We are so sure of the satisfactory sound reproduction qualities of the Roslyn with its speaker directed toward the side, that we guarantee its performance to satisfy or we will accept its return for refund of its entire cost. However, for those who insist, the speaker in the Roslyn may be installed facing the front, with regular speaker grill exposed by open doors when the receiver is in operation.

From the standpoint of furniture beauty, the Roslyn is one of the finest designs we have ever sponsored. It is made of Honduras mahogany, Brazilian and East Indian rosewood. Its base is hand carved, and doors are fitted with gold plated handles. Its height is 45 inches, width 26 inches, and depth 19 inches. A short description of its finish is given on page 10.

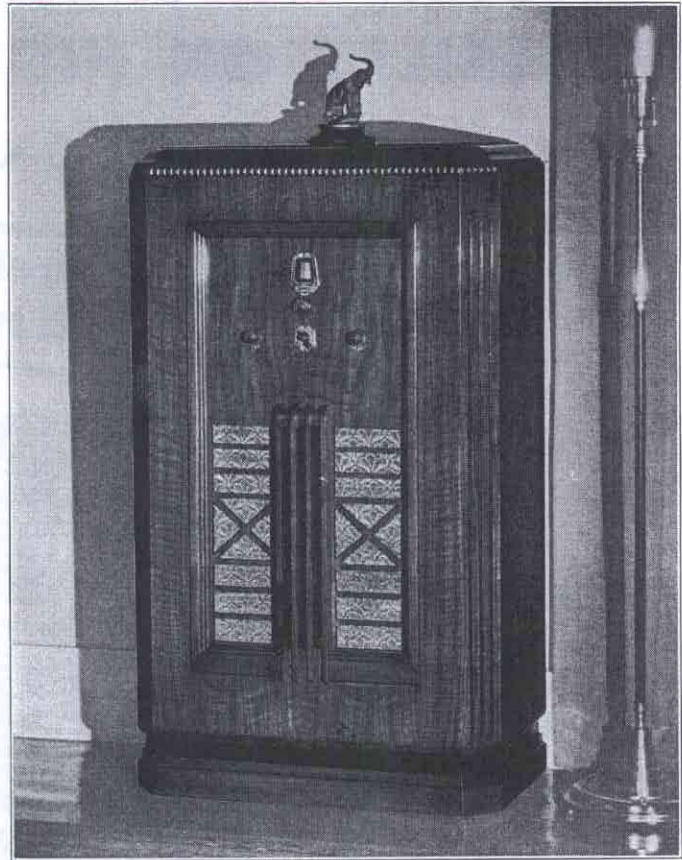
The Waverley Console

TO THE architects of Sweden, we are told, goes the honor of having introduced to the world the new school of modern, functional design which has so markedly influenced the architectural appearance of our larger cities.

And now this striking, beautifully rich simplicity of severe line and restrained decoration inspires the creation of a charming new SCOTT Console. The Waverley, authentically styled in the Swedish architectural mode, is a delightful specimen of cabinet craftsmanship.

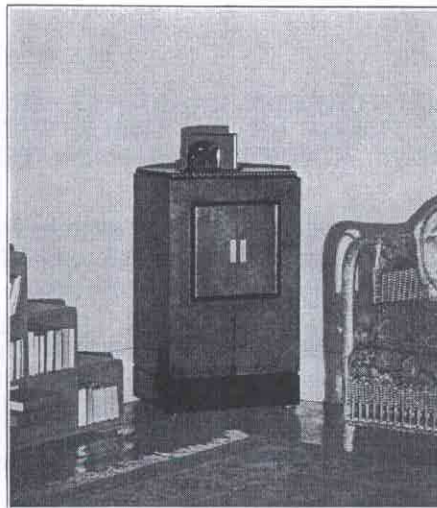
Solidly constructed to eliminate every trace of cabinet resonance so noticeable in cheaper grades of consoles, the Waverley has a tone chamber so ideally shaped and proportioned that its tonal reproduction is amazingly true, rich and colorful.

The Waverley is an impressive piece of furniture in figured and American walnut that will grace the finest home. It stands 45 inches high, is 27½ inches wide, and 15 inches deep.

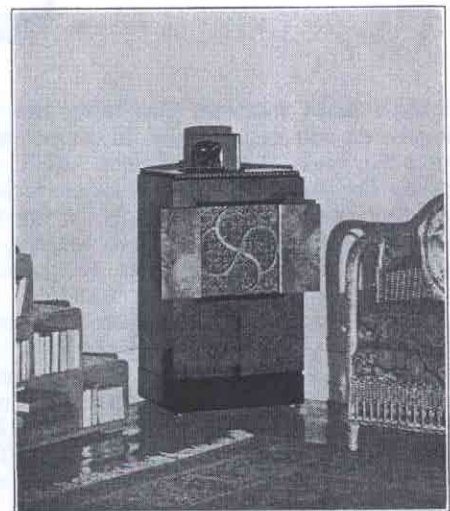


The Milton Console

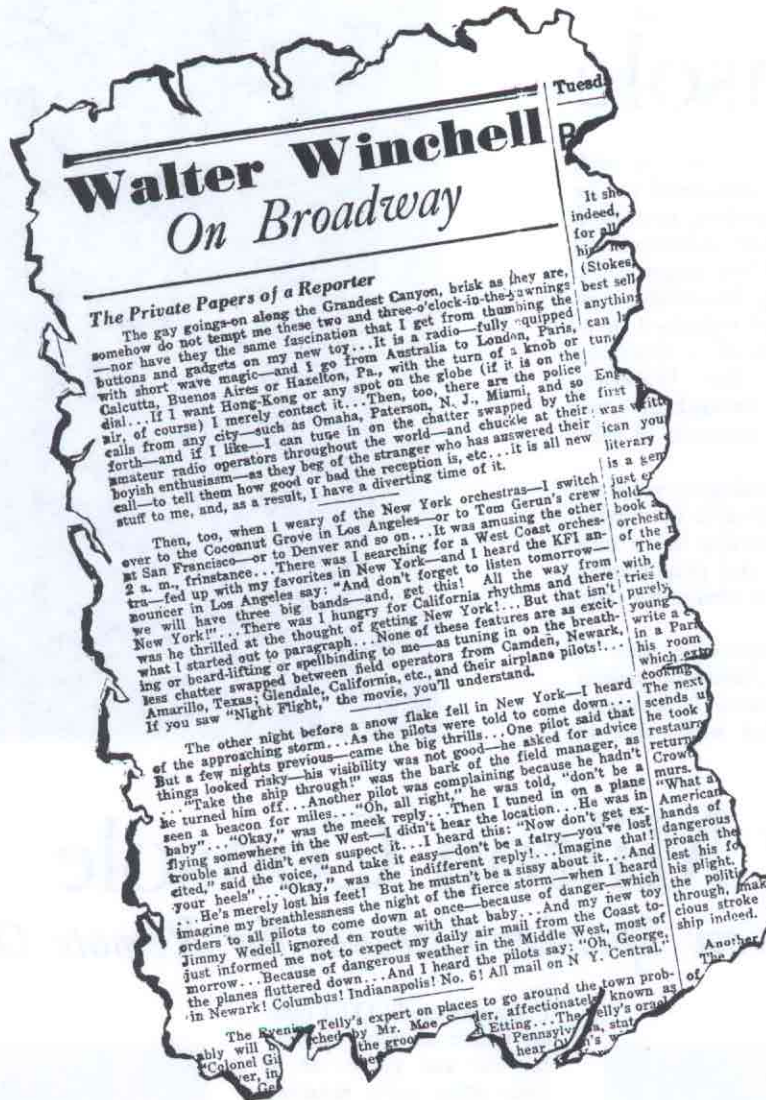
..... a New Speaker Cabinet for Remote Operation



FREQUENTLY SCOTT owners desire an extra speaker for the sun porch, or in some other room removed from the location of the receiver itself. To meet this need, we have designed the dainty Milton Speaker Console. With the doors closed it is a very fine piece of furniture, lending distinction to any room; with opened doors it brings radio entertainment from the receiver located in some distant portion of the house. Made of finely figured Laurel wood veneers, with catalin and gold door hardware, the Milton is 33 inches high, 20 inches wide, 21 inches deep.



WALTER WINCHELL TELLS WORLD OF THRILLS ON HIS SCOTT RECEIVER



WE CAN build receivers that bring the world to your home—we can describe the advanced engineering features that make them so efficient—BUT, when it comes to describing the thrills their reception gives Scott Owners—we must admit that Walter Winchell, the famous newspaper columnist can do the job better than we can, as shown by his column which appeared in over 150 newspapers in all parts of the United States on January 2nd.

We asked Mr. Winchell for permission to reprint his column which described the results he is obtaining on his SCOTT ALLWAVE DELUXE, for we believe it is one of the finest and most spontaneous tributes we have ever received. Like over 40% of our present owners of SCOTT RECEIVERS, Mr. Winchell first became interested in a SCOTT RECEIVER thru another Scott Owner, Mr. Ted Husing, ace announcer on the C.B.S. On December 5th we received the following wire from Mr. Husing:

"WALTER WINCHELL COLUMNIST NEW YORK DAILY MIRROR VERY MUCH IN-

TERESTED IN GETTING RADIO LIKE MINE WILL YOU PLEASE GET IN TOUCH WITH HIM DIRECT KINDEST REGARDS—TED HUSING"

A letter and literature describing the SCOTT ALLWAVE DELUXE was promptly sent to Mr. Winchell and on December 12th we received the following wire from him:

"MANY THANKS FOR YOUR LETTER PLEASE SEND ON THE RADIO AS DESCRIBED TO MY HOME AT CENTRAL PARK WEST NEW YORK AND THE BILL TO MY OFFICE AT THE DAILY MIRROR YOUR PROMPT ATTENTION IS APPRECIATED—WALTER WINCHELL"

The receiver was shipped, then on January 2nd, Mr. Winchell not only told us, but millions of readers of his column what he thought about his set.

A Radio Romance

in Which a Scott Receiver Plays a Part . . .



Miss Glen at Organ Console

IF YOU tune in to Station WENR in Chicago any Tuesday evening at 9:30 p. m. you will have the pleasure of listening to one of the most romantic broadcasts on the air, for there *is* real romance behind this broadcast!

The feature is Irma Glen's "Lovable Music." You will note that although it is an NBC feature, there is no commercial announcement made, because the sponsor of this program does not wish her name revealed.

For several years Miss Glen's solos on the organ have been enjoyed by thousands of listeners. Among these listeners was a lady who enjoyed Irma's playing more than any other feature she heard on the air. These broadcasts were scheduled for the morning, but this little lady wished to hear Miss Glen's playing at the time of the day she could enjoy it best—in the evening.

So she went to NBC and asked if Miss Glen's schedule could not be changed to the evening instead of during the morning. She was told that this was impossible—unless the time was paid for. Fortunately, this lover of music is in a position where she may satisfy her desires. She inquired of NBC the cost of broadcasting Miss Glen's program on the air during the evening. So for the past 21 months there has come over the air at 9:30 p. m. every Tuesday evening the lovely strains of the organ, as Miss Glen plays to her friend, who sits before her radio drinking in the entrancing melodies played just for her.

However, this anonymous sponsor, whose name is known

to a very limited circle, does not spend all of her time in Chicago. When the weather becomes severe she moves to her home in the South. At this home she had a radio receiver with which she had been perfectly satisfied. However, last Winter when she reached her Southern home and tried to pick up the signal of WENR, she found to her intense disappointment, that while she could receive the program, it did not come thru with the strength and clarity she desired.

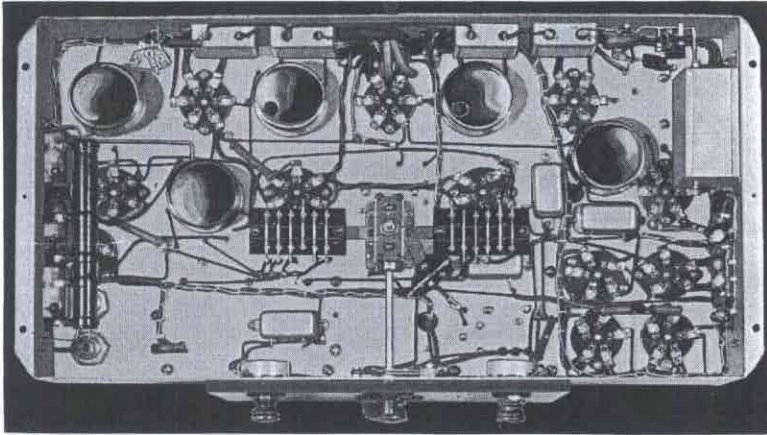
So back came the word to Miss Glen with the commission that she search the radio field and secure the very finest instrument it was possible to buy. Miss Glen conducted an intensive investigation. It is her secret just how many receivers she investigated and listened to before she finally decided the SCOTT RECEIVER was unquestionably the finest instrument it was possible to buy for her sponsor. So a SCOTT ALLWAVE DELUXE was shipped, and once again Miss Glen's friend was able to listen in to the organ melodies she loved.

And the sequel to this story took place during the World's Fair for one of the visitors we had the pleasure of welcoming to our Laboratory during this period was Miss Glen's sponsor. The object of her visit was to select a console for another SCOTT RECEIVER to install in her apartment in Chicago.

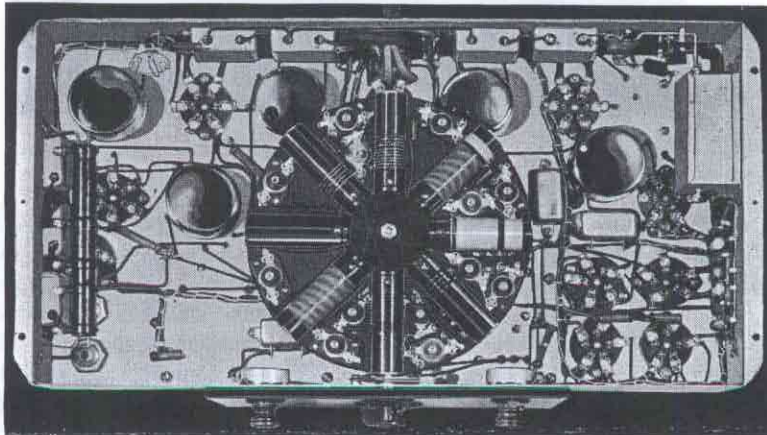
In addition to the special Tuesday broadcast, you can tune in Miss Glen on WMAQ Monday at 9:48 a. m.; 10:00 a. m. Tuesday, Thursday and Saturday and on Wednesday over KYW at 9:45 a. m.

A LOOK UNDER THE CHASSIS OF THE LABORATORY BUILT SCOTT ALLWAVE XV

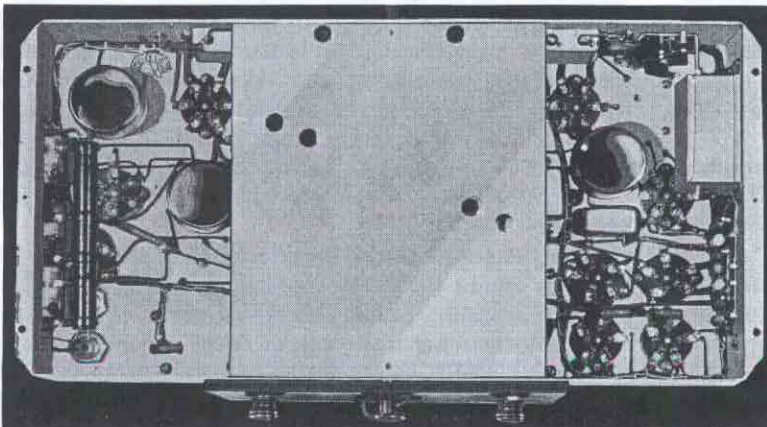
THE views below will give some slight idea of the workmanship and quality of a Scott Receiver. It is built in one of the most complete and fully equipped radio laboratories in the world and you are most cordially invited to visit us any time you come to Chicago, when it will be a pleasure to conduct you thru them and show you exactly how Scott Receivers are built and tested.



View Showing Mechanism of Coil Changing Switch, Condensers, Resistors, Wiring, etc.



View Showing Wave Band Coils in Position.



To Ensure Absolute Accuracy and Permanency of Adjustment and Calibration, a Special Sub-base Plate Is Used in Addition to Regular Heavy Plate Which Covers Entire Bottom of Chassis.

SCOTT CONSOLES BUILT AND FINISHED BY CRAFTSMEN

THE technique used in the construction and finishing of a Scott Custom Built Console follows an entirely different procedure to that employed in cabinets supplied with the regular commercial type of receiver.

The quality built into a Scott Console starts first with the woods and veneers, all of which are carefully selected. The men who build Scott Consoles are skilled furniture craftsmen in every sense of the word. All joints, dovetailing and veneering are made with the highest quality animal glue, instead of the cheaper vegetable or casing glues used on the cheaper grades of furniture which cost many times less than that of the best quality animal glue.

So that the beautiful finish of a Scott Console will remain unaltered by moisture or dampness during its years of service, the wood used is first given a special treatment with a secret process which makes the wood practically impervious to moisture. The real finishing of the cabinet commences by carefully sanding it with very fine sandpaper.

Where a console is to receive a dark finish, it is given a coat of water (not the cheaper oil) stain. When the stain is perfectly dry, a coat of filler is applied, after which the whole console is again carefully sanded.

The console now goes thru a drying period for several days, after which it is primed with three coats of pure white shellac, again being carefully sanded between each coat. After receiving these priming coats of shellac, the cabinet is again set aside for several days to allow these coats to dry thoroughly.

The priming thoroughly dried, the console is next given four coats of high quality clear lacquer, each coat being allowed to dry thoroughly. When the console receives the third coat of lacquer, it is first rubbed down with very fine pumice stone and oil, after which it is cleaned, then the fourth and final coat of lacquer is applied, after which it is again carefully rubbed down with pumice stone and oil, and given its final rubbing and polishing by an expert finisher. The result is a finish that will retain its luster and charm for many years to come. It is this finish that accounts for the smooth glass-like surface on a Scott Console, as compared to the dull, comparatively rough surface on the consoles supplied with the regular commercial type of receivers.

We believe we are not telling any secrets when we describe the finishing process on the consoles supplied with the regular commercial type receivers. They are first dipped in a bath of oil stain, then given one coat of shellac, and finally one coat of lacquer, after which they are ready for shipment to the customer.

REPORT SHOWING RECEPTION CONDITIONS DURING JANUARY

We want to thank, very sincerely, Mr. Braunhold of Chicago, Ill., Messrs. Bearman and Luttmann of New Brunswick, New Jersey, Mr. Stitzinger of Erie, Pennsylvania, and Mr. Van Auken, Livingston, Texas, for their very fine detailed reports of reception on their Scott Receivers during January. Their reports provide authentic information on the reception during the month which has just passed.

We should be very glad to receive similar reports from our owners in the Western States for publication in the future issues of the NEWS. These reports should be prepared along the same lines as that given below, showing not only the stations received, and the hours you receive them, but also what is just as important, the signal strength with which they were received.

COUNTRY	CITY	CALL	WAVE LENGTH		DELUXE DIAL	**SCHEDULE IN C. S. T.	SIGNAL STRENGTH									
			Meters	Megs.			Illinois				New Jersey				Pa.	Texas
							*1	2	3	4	1	2	3	4	4	4
Argentina	Buenos Aires	LSX	28.98	10.35	26	2-3 p.m.—7-8 p.m.	S	S	S	VS	—	—	—	—	S	S
Australia	Sydney	VK2ME	31.28	9.57	31	8-10 a.m.—3:30-7:30 a.m.	W	W	F	F	—	F	—	—	F	S
Australia	Melbourne	VK3ME	31.55	9.51	33	4-5:30 a.m. Wed. 4-6:00 a.m. Sat.	—	—	—	—	—	W	F	—	F	S
Bolivia	La Paz	CP5	49.30	6.08	77	5:30-7 p.m. 8-10:30 p.m.	F	F	F	—	—	—	—	—	S	—
Brazil	Rio de Janeiro	PSK	36.65	8.9	46	6-6:30 p.m.	F	S	S	VS	—	—	—	—	S	—
Colombia	Barranquilla	HJ1 ABB	46.51	6.43	68	5-9 p.m.	F	F	S	VS	—	—	—	—	S	—
Colombia	Bogota	HJ3 ABF	48.00	6.25	74	6-10 p.m.	F	F	G	S	—	—	—	—	S	—
Colombia	Cali	HJ5 ABD	47.00	6.38	69	6-9 p.m. Thur., Sat. Sun	F	F	—	G	—	—	—	—	F	S
Dom. Rep.	San Domingo	HIZ	47.50	6.32	69	3:40-4:40 p.m. Sat. 8:40-10:40 p.m. Sat	F	F	F	—	—	—	—	—	—	—
Ecuador	Guayaquil	HC2RL	45.00	6.67	67	4:45-6:45 p.m. Sun. 8:15-10:15 p.m. Tues.	S	S	S	VS	—	—	—	—	S	—
Ecuador	Riobamba	PRADO	45.31	6.62	68	8-10:30 p.m. Thur.	F	F	G	S	—	—	—	—	F	S
England	London	GSG	16.85	17.79	26	6-7:45 a.m.	F	F	F	G	—	—	—	—	F	S
England	London	GSE	25.25	11.86	13	6-7:45 a.m.—8-10 a.m.	F	S	S	VS	G	G	G	G	S	—
England	London	GSD	25.53	11.75	14	12:15-1:45 p.m.	G	F	S	VS	—	—	—	—	S	—
England	London	GSC	31.30	9.58	32	5-7 p.m.	F	F	G	G	G	G	G	S	S	—
England	London	GSB	31.55	9.51	33	8-12 a.m.—12:15-4:45 p.m.	G	S	G	VS	—	—	—	—	S	—
England	London	GSA	49.59	6.05	77	1:45-4:45 p.m. 5-7 p.m.—10-12 a.m.	S	S	S	S	G	G	G	G	S	—
France	Paris	Rad. Col.	19.68	15.25	66	7-10 a.m.	F	—	F	—	F	F	G	F	—	—
France	Paris	Rad. Col.	25.20	11.90	13	10:15 a.m.—1:15 p.m.	S	S	G	W	G	G	G	F	S	—
Germany	Berlin	DJB	19.73	15.20	67	7-10 p.m.	—	—	W	VS	—	—	—	—	—	VS
Germany	Berlin	DJD	25.51	11.76	14	7-10 p.m.	F	G	—	—	F	—	—	—	—	S
Germany	Berlin	DJA	31.38	9.57	32	3-7 p.m.	—	—	—	—	W	—	—	—	—	S
Germany	Berlin	DJC	49.83	6.02	78	7-10 p.m.	S	S	S	S	F	S	F	G	S	—
Germany	Berlin	KKH	39.89	7.52	54	9-9:30 p.m. Sat.	S	S	S	S	VS	—	—	—	—	F
Hawaii	Kauhuku	KKH	39.89	7.52	54	9-9:30 p.m. Sat.	S	S	S	S	VS	—	—	—	—	F
Holland	Huizen	PHI	25.57	11.73	14	6:30-10 a.m. exc. Tu. & Wed.	G	G	G	F	—	—	—	—	S	W
Italy	Rome	12RO	25.40	11.81	13	10:30-11:30 a.m. 12:15-5 p.m.	F	F	F	F	—	—	—	—	—	W
Mexico	Mexico City	XETE	31.23	9.60	32	Irregular	—	F	G	S	—	—	—	—	—	S
Morocco	Rabat	CNR	37.33	8.05	48	1:30-4 p.m. Sun.	G	G	G	F	—	—	—	—	S	—
Russia	Moscow	RNE	25.00	12.	12	7-8 a.m. Sun.	—	—	—	—	—	—	—	—	—	S
Russia	Moscow	REN	45.38	6.61	68	12-5 p.m.	—	—	—	—	—	—	—	—	—	S
Russia	Khabarovsk	RV15	70.65	4.25	18	2-8 a.m.	—	—	—	—	—	—	—	—	—	S
Spain	Madrid	EAQ	30.00	10.9	29	4:30-7 p.m. Daily	G	G	S	VS	—	—	—	—	S	—
Switzerland	Geneva	HBP	38.47	7.77	52	12-9 p.m. Sat.	S	S	S	G	—	—	—	—	S	—
Venezuela	Caracas	YV3BC	48.78	6.15	75	4:30-5:15 p.m. Sat.	G	S	S	VS	—	—	—	—	S	—
Venezuela	Caracas	YV1BC	49.08	6.11	76	3:30-8:30 p.m. 4:15-9 p.m.	G	S	S	VS	—	—	—	—	S	S

*The figures 1-2-3-4 under the States represent the first, second, third and fourth weeks in January.
SIGNAL STRENGTH: W—Weak—Can just identify. F—Fair—Can hear fairly well. G—Good—Good Volume.
S—Strong—Local station volume. VS—Very Strong—Extremely loud.

** To find E. S. T. add 1 Hour.
" " M. S. T. deduct 1 Hour.
" " P. S. T. deduct 2 Hours.

PERFORMANCE AND SERVICE GUARANTEES ON THE SCOTT ALLWAVE DELUXE RECEIVER

Our guarantee is backed by an organization that has been in business continuously for ten years, with thousands of satisfied customers, not only in America, but in all parts of the world. It means we are willing to allow you to prove to yourself in a competitive test, that the new SCOTT ALLWAVE FIFTEEN is actually the "World's Finest Radio Receiver."

GUARANTEED FOR FIVE YEARS

The SCOTT ALLWAVE FIFTEEN RECEIVER is guaranteed against defective parts for Five Years. Any unit of its construction (except tubes, which are guaranteed by the manufacturer) that becomes defective during this period will, on return to the Laboratory, be replaced free of charge either for parts, material or labor, provided such defect is not the result of misuse or tampering with the instrument.

SUPERIOR PERFORMANCE GUARANTEED IN YOUR HOME

Your order for a SCOTT ALLWAVE FIFTEEN RECEIVER will be accepted with the distinct understanding you are to be allowed thirty days after delivery in which to make comparative test against any other Allwave radio; both receivers to be tested with the same antenna on the same day or evening. If during this period the SCOTT ALLWAVE FIFTEEN does not demonstrate its superiority in your home by bringing in more stations—**from greater distances—with more volume—and better tone—**on both the short waves and the broadcast bands than any other receiver with which it is compared, you have the privilege of returning it (you to pay transportation costs) and the money you paid us will then be promptly refunded. It is agreed in the event the purchaser finds a receiver which he believes gives superior performance to the SCOTT ALLWAVE FIFTEEN RECEIVER, he will advise us of tests made.

The Scott News

Published Frequently at Chicago by
E. H. SCOTT RADIO LABORATORIES
Chicago

E. H. SCOTT, Editor

For the past ten years we have designed and built, in very limited numbers, nothing but very high quality, super-powerful superheterodyne receivers of advanced design, which are now in use in every major country (except Russia) in the civilized world. In many parts of the world our receivers are giving their owners radio reception for the *first* time, because in some of these locations, reception conditions are so poor that this is the *first* receiver that has had sufficient sensitivity, combined with

the all important feature of low noise level, that has made radio reception in these remote spots possible.

Many of my readers will remember the first Scott Receiver which was brought out in 1924, the now famous World's Record Super 8. In those early days, a receiver that would bring in stations even

2,000 miles away was considered a marvelous set. However, the World's Record Super 8 thrilled the whole radio world in 1924 by establishing Four World's Records for the reception of stations six to nine thousand miles distant—a reception record which was fully verified in every way.

During 1932 the SCOTT ALLWAVE established another World's Long Distance Record, which is fully verified, by the reception in Chicago of every program transmitted from station VK2ME, Sydney, Australia, 9,500 miles distant over a period of 12 consecutive months. Not only was a complete log made of every program, but from three to twenty 12" aluminum recordings were also made of each transmission. The logs and half of the records made of each program were sent to Australia so that the station could check and verify the reception.

During the same period, every program (except three) from station VK3ME, in Melbourne, Australia, was received, logged and recorded in the same manner as the programs from VK2ME, thus proving beyond all doubt that *the regular reception of foreign broadcast stations is a certainty, not simply a promise or a claim with a Scott Receiver.* A full detailed report of this reception record will be found in our "Proof" brochure.



E. H. Scott

Then again, during 1933 the SCOTT ALLWAVE DELUXE established another long distance reception record in conjunction with the Columbia Broadcasting System's station WBBM in Chicago. This station transmitted a program on 770 meters between the hours of 12:00 midnight and 2:00 a. m. every morning from Chicago, which was received and checked on a SCOTT ALLWAVE DELUXE installed in a cabin on the R.M.S. Maunganui on a voyage between San Francisco and Wellington, New Zealand. Each night during the voyage, the reception from WBBM was carefully logged, and the log checked during the reception by one of the officers of the ship. In addition to the log kept, a cabled report was sent each night to WBBM, giving some of the selections on the program so that each transmission could be identified, and also tell them how the program was received. These cables were read over the air each night from WBBM and were heard by many thousands of listeners in this country.

On the return journey to the United States, on the liner Mariposa, the reception from WBBM was again checked in the same way by the officers of this ship, and cabled reports were sent to WBBM, and again (with the exception of two programs which were spoiled by terrific static in the tropics) every program was received, once again giving proof that Scott Receivers can bring to their owners programs transmitted from stations from one side of the world to the other, not only on the short waves *but on the broadcast band as well.*

The SCOTT ALLWAVE FIFTEEN, a description of which is given in this copy of the NEWS, is not a new model in the strict sense. The SCOTT ALLWAVE DELUXE had incorporated in its design so many advanced features, that even today its design is far ahead of any other commercial receiver, and we know of no other receiver that can duplicate its performance.

The SCOTT ALLWAVE FIFTEEN, therefore, retains all of the features that have proved their efficiency and performance in the Deluxe model, together with a number of refinements which we have developed in our research laboratory during recent months, which still further strengthens the claim that the Scott is more than ever the World's Finest Receiver.

Here at the laboratory we are very proud of this new receiver. It is really a precision instrument, built by highly skilled technicians, the majority of whom have been in our employ continuously for a number of years and who have all been personally trained by our laboratory engineers.

It has been our pleasure during the year just past to conduct many hundreds of visitors thru our Laboratory, which is generally recognized in radio engineering circles, as one of the most complete and best equipped in the country, and it would be a pleasure if any of our readers visit the city of Chicago to have you visit us and see just how this fine instrument is built and tested.

AN INTERESTING LETTER

In the December issue of the SCOTT NEWS we printed the transmitting schedules of the principal short wave stations, and among these were given the schedules of the English stations.

I mentioned the fact that England comes in so strongly practically every day in the week, that hundreds of Scott Owners in all parts of the country kept accurate time in their homes by checking their watches daily with the chimes from Big Ben in London. When I wrote this I was not aware of just how accurate was the time received from Big Ben. One of our owners, Mr. A. N. Lump of Philadelphia, Pennsylvania, wrote me on this point. His letter is as follows:

"Dear Mr. Scott:

I just received your Scott News and would like to let you know that all the information in this booklet is very interesting and from my own observations, absolutely correct.

"In your report of the English stations you state that no doubt men all over the U. S. A. set their time with 'Big Ben.' In order to enlighten you on the accuracy of this clock I have here excerpts from a letter from E. Dent & Co., Ltd., in which is included a report from the Astronomer Royal's Annual Report. The error of the first blow of the hour for 12 months ending June 3rd, 1933, was as follows:

On 114 days the error was not greater than 0.2 second.

On 83 days the error was not greater than 0.3 to 0.5 second.

On 97 days the error was not greater than 0.6 to 1.0 second, and on only 9 days was the error greater than 1 second.

"This clock is not synchronized nor controlled with Greenwich or any other time-keeper.

"This information may be of some use to you for later issues of the Scott News, as well as very interesting.

(Signed) A. N. LUMP."

This letter was certainly interesting to me and I believe will also be of interest to other Scott Owners who tune in Big Ben.

Cordially yours,

