

THE MAY 1938

25^c

RADIO INDEX

The All-wave Radio Log



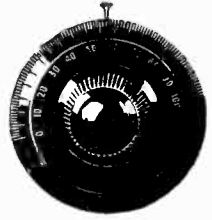
Short Wave List Showing
Names and Addresses, Location, Slogans,
And Schedules of all Stations
Amateur Stations Heard

No. 119

MAY 1, 1938



RADIO INDEX



Reg. U. S. Patent Office

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Publisher

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FOURTEENTH YEAR

NUMBER 119

CONTENTS

Cover Girl—Shirley Lloyd, NBC Singer

	PAGE
A Decade of Shortwave Broadcasting	2
Station News	4
Special Frequency Checks	5
The Monthly DX Forum, <i>by Carleton Lord</i>	6
Solving Radio's Many Problems, <i>by B. Francis Dashiell</i>	14
Five Years of German Broadcasting	21
Broadcasting in Bulgaria, <i>by Douglas E. Manke</i>	22
For Shortwave Fans	24
The Stamp Corner, <i>by David Brockton Browne</i>	29
Across the Editor's Desk	30
As The Latins Dance, <i>by Samuel A. Meyer, Jr.</i>	32
Universal DX Club Corner, <i>by "Pooky"</i>	34
Scanning the Amateur Bands, <i>by B. L. Ahman, Jr.</i>	37
Amateur Calls Heard	38
Frequency Check Schedule, <i>FCC Tests</i>	40
The Month's Changes in Station Data	42

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A DECADE of Shortwave Broadcasting

● ● ● TI4NRH Celebrates

ON MAY 4, 1928, in the city of Heredia, in Costa Rica, a man threw a switch which put into operation a tiny radio transmitter, but little did he think at the time that he was giving life to a voice that was soon to become famous in nearly every part of the world. This little pile of radio apparatus was called "NRH," and its voice was but seven and one half watts weak, not even strong enough to light the smallest electric light bulb.

Hoping to provide entertainment for the people in his own land and the surrounding countries of Nicaragua and Panama, the operator waited until KDKA had signed off for the night, tuned NRH to the forty meter band, and broadcast a few phonograph records. For ten nights he did this, without receiving a single comment, but finally, on the eleventh day, he received a letter, dated May 11, from an American army officer stationed at Gatun, in the Canal Zone. This report was the first of nearly ten thousand which have been received by this station.

NRH was the fifth station to broadcast programs on shortwaves, being preceded only by the experimental broadcasters in Hilversum, Netherlands; Chelmsford, England; Schenectady, N. Y.; and Pittsburgh, Pa. As far as we know, NRH is the only broadcaster to be heard on every continent with but seven and one half watts of power.

The Friendliest Station

Now known as TI4NRH, this broadcaster has grown to a lusty 500 watts. As the power of TI4NRH has grown, so has the size of its



Columbia's new time signal, which is tuned to the precise standard pitch of "A", vibrates in tune as Jane Pickens sings a duet with it. The man striking it is the Old Maestro Ben Bernie. This tubular chime was constructed especially for CBS for use in sounding its daily time signals to coordinate the various stations of the coast-to-coast network.

audience and the number of its friends. Today the operator, Sr. Amando Cespedes Marin, enjoys the distinction of being the most friendly broadcaster in the world, and he still broadcasts, as he says, "just for the fun of it." In an article specially written for RADEX, Sr. Cespedes wrote, in June, 1933,

"It is all love down here and fun, therefore we all make merrymen, and when Miss Cespedes speaks, we laugh and when my boy plays the piano we applause and when the music is pretty I whistle. I am just beginning to live. And radio is my

plaything. The NRH has been a friend and it ever will be, because she does not carry paid up advertising, but that of his owner announcing his gospel of Friendship . . ."

The May Celebrations

During May of this year, Sr. Cespedes is celebrating his Tenth Anniversary of non-commercial broadcasting. Each day during May he will dedicate his program to friends who were among his original listeners, and to radio clubs and magazines. He requests reports on these transmissions, and especially appreciates receiving reports by air mail. Instead of sending an International Reply Coupon, listeners are urged to send ten cents in coin or in unused stamps. Reply Coupons are of no use to him as he has free use of the mails. In return for reports, listeners will receive a large diploma, 11 by 16 inches in size, and lithographed in three colors.

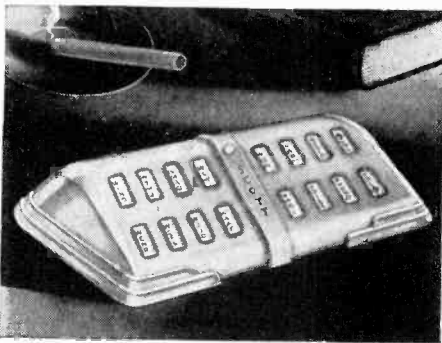
The address is Sr. Amando Cespedes Marin, Apartado 40, Heredia, Costa Rica.

The schedule of special broadcasts by days is given at the end of this article. Special attention is invited, however, to the transmission of May 25, which will be dedicated to RADEX and to its Editor, who has been an NRH listener for eight years.

The Dedications by Days

1. To Costa Rica, the Land of Peace.
2. To Heredia, the city of flowers and coffee trees.
3. To *The Society of Wireless Pioneers* and Mr. Michael Michelson, Minneapolis, Minn.
4. Commemorating the first NRH broadcast, May 4, 1928, with 7½ watts power.
5. To *Radio News and Short Wave Radio*, and Laurence M. Cockaday.
6. To The United States of America.

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Address

City State

STUDIOS: CHICAGO, NEW YORK, LOS ANGELES, LONDON



7. To the *Chicago Short Wave Radio Club*, and its president, Mr. Harold Wright, of Chicago, Ill.
8. To the Catholic Church and Mons. Dr. Carlos Borge, Domestic Prelate to Pope Pius XI.
9. To Mr. Joseph Brown Sessions of Bristol, Conn., a friend who has written an airmail letter to Sr. Cespedes every week for the past ten years.
10. To the *International Short Wave Club*, and its president, Mr. Arthur J. Green, of E. Liverpool, Ohio.
11. To Sr. Juan Bautista Carapaica, and Sr. Ivan Mathias de Pool, of Caracas, Venezuela.
12. To the *Short Wave League* and Mr. Hugo Gernsback.
13. To the New Zealand shortwave radio clubs and Mr. A. B. McDonough of Wellington.
14. To Mr. Charles Hughes, secretary of the *Chicago Short Wave Radio Club*.
15. To the *Universal DX Club*, and its president, Alfred J. Stansfield, of Oradell, N. J.
16. To radio station KDKA, Pittsburgh, Pa.
17. To Mr. Arthur Dorr and Mr. Wallace Dean, of Hartford, Conn.
18. To the *International DX'ers Alliance*, and its president, Mr. Charles Morrison, of Bloomington, Ill.
19. To the *Radio Signal Survey League*, and *All Wave Radio*.
20. To Mr. Jacob H. Borofsky of Boston, Mass.
21. To Mr. William H. Reeks, and his sister, Miss Edith Reeks, of Chicago, Ill.
22. To the *Quixote Radio Club* and Mr. E. J. Shields, of Santa Barbara, Calif.
23. To the *Club de Ondas Cortas, Radio-Guia*, and Sr. Pedro Acosta Diaz, of Havana, Cuba.
24. To the Newark News Radio Club, and its president, Mr. Irving R. Potts, of Newark, N. J.
25. To RADEX and Page Taylor, of Cleveland, Ohio.
26. To the *Globe Circlers' DX Club* and Raphael Geller, of the Bronx, N. Y.
27. To the *British Short Wave League* and *World Radio*, of London, England.
28. To the Philatelic Society of Costa Rica, San Jose.
29. To the *American Radio Relay League* and *QST*.
30. To the Radio Manufacturer's Association of the United States.
31. To radio station WGY at Schenectady, N. Y.

Station News

Station WIND, Gary, Ind., has received special experimental authority to transmit facsimile on its regular frequency of 560 kcs, with one kilowatt, from midnight until 6 am, EST.

In Portland, Ore., station KGW has special permission to broadcast facsimile, from midnight until 6 am, PST, on 620 kcs with one kilowatt.

The commission canceled its former order which denied a construction permit to Paul R. Heitmeyer, and, in conformity with a mandate of the United States Court of Appeals, reopened the proceedings for further consideration. The application is for a construction permit for a new station for Cheyenne, Wyo., to transmit on 1210 kcs. with 100 watts nights, 250 watts days, unlimited time.

The FCC Examiners have recommended that construction permits be granted to the following applicants: *Cumberland Broadcasting Co. of Fayetteville, N. C., for new station*

Special Frequency Checks

THE Commercial Radio Equipment Co. of Kansas City, Mo., makes special frequency measurements for a number of radio stations which are not checked on the regular government tests.

By courtesy of Herbert Steinmetz, Engineer in Charge of Frequency Measurements, we present herewith a complete, revised schedule of stations serviced on after-midnight monitoring schedules.

The time shown in this tabulation is all a.m., in Eastern Standard.

Station	Frequency	Location	Schedule
KTSA	550	San Antonio, Tex.	1st Mon. of the month, 1-1:15.
WPAY	1370	Portsmouth, Ohio	1st Mon. of month, 4-4:30.
WRR	1280	Dallas, Tex.	1st and 3rd Tues., 1-1:30.
KLAH	1210	Carlsbad, N. Mex.	1st Tues., 4-4:30.
KAND	1310	Corsicana, Tex.	1st Tues., 4-5.
KWOS	1310	Jefferson City, Mo.	1st Wed., 2-2:30.
KWBG	1420	Hutchinson, Kans.	1st and 3rd Wed., 6:30-7.
KNOW	1500	Austin, Texas	1st Thurs., 1:45-2:15.
WACO	1420	Waco, Texas	1st Fri., 1:45-2:15.
KIUN	1420	Pecos, Texas	1st Fri., 2:30-3.
KAWM	1500	Gallup, N. Mex.	Every Thurs. except the 2nd of month, 4-5.
KEUB	1420	Price, Utah	1st Sat., 2-2:30.
KGFI	1500	Brownsville, Tex.	1st Sat., 2-2:30.
KSAL	1500	Salina, Kans.	1st Sat., 2:30-3.
KTEM	1370	Temple, Tex.	On the 5th of every month, 3-3:30.
WGRC	1370	New Albany, Ind.	On the 6th of every month, 3:30-4.
KVGB	1370	Great Bend, Kans.	On the 7th of every month, 3-3:30.
WPAD	1420	Paducah, Ky.	On the 7th of every month, 3-3:30.
WHEF	1500	Kosciusko, Miss.	2nd Tues., 2:30-3.
WJAG	1060	Norfolk, Nebr.	2nd Fri., 1:30-2.
KPOF	880	Denver, Colo.	2nd Fri., 2:15-2:45.
WCAZ	1070	Carthage, Ill.	2nd Sat., 3:30-4.
KGFW	1310	Kearney, Nebr.	On the 15th and 29th of every month, 2-2:30.
WLAP	1420	Lexington, Ky.	Last Fri. of the month, 2-2:30.
KADA	1200	Ada, Okla.	On the 25th of every month, 2:45-3:15.
KBIX	1500	Muskogee, Okla.	4th Sat., 5-5:15.
WBBZ	1200	Ponca City, Okla.	On the 29th of every month, 6-6:30.
WSUI	880	Iowa City, Iowa	On the Wed. morning preceding the 1st Sat. of every month, 1:30-2:30.

to operate on 1340 kcs, 250 watts, daytime only.

Thomas J. Watson, Endicott, N. Y., new station to use 1240 kcs with 100 watts.

Hampden-Hampshire Corp., Holyoke, Mass., new station to work on 1240 kcs, 500 watts nights, 1 kw days, unlimited time.

Sam Houston Broadcasting Association, Huntsville, Texas, a new station to use 1500 kcs, 100 watts days.

Martin R. O'Brien, Aurora, Ill., a new station to use 1250 kcs, 250 watts days.

Carl Latenser, Atchison, Kans., new station for 1240 kcs, 100 watts days.

Floyd A. Parton, San Jose, Calif., to use 1170 kcs, 250 watts days.

The SWL Trading Post

Names and addresses are printed in this column only on receipt of a written promise that every letter will be answered. If an exchange of SWL cards is desired, the request must be made on the writer's own SWL card.

J. I. Vaught, Box 1424, New Orleans, La. (SWL cards).

Phillip Wharton, Box 413, Waterford, Ont. (Correspondence from West Indies and Mexico).

Kenneth Munn, 419 W. Granite, Albuquerque, N. Mex. (Correspondence).

Stanley B. La Rue, 309 S. Bedford Drive, Beverly Hills, Calif. (SWL cards).

The Monthly DX FORUM

● ● ● By CARLETON LORD

OF ALL the divisions in a well-organized radio club, the Courtesy Programs Committee stands in a unique position. Although entrusted with the important task of satisfying the fundamental needs of the average DXer, the CPC periodically is the target for an avalanche of neatly-tossed brickbats.

A few years ago, CPC members were enjoying boom times. Virtually every request for a special program was granted, and many stations responded with a whole series covering an entire winter. Some of the larger clubs were obliged to devote a full page of each bulletin to list the weekly DX Calendar, and it was not unusual for a club to boast of from five hundred to a thousand programs in a winter season.

But while CPCers dished up specials like the proverbial hotcakes and club officials basked in the sunshine of all this publicity, even then an occasional scallion floated CPCward. It was pointed out that committeemen, in a mad race for club prestige, were forgetting the prime purpose for their activity—that of enabling a DXer to log and verify a needed broadcaster.

Instead of concentrating on a diversified line-up of seldom-heard stations, the clubs appeared to be engaged in a wild scramble to see which CPC could line up the most programs from September to May of a given year—and the committee which scheduled a thousand programs apparently was more efficient than one which could claim but five hundred.

While it was most complimentary for a station to dedicate a broadcast to a group of DXers, it was ques-



Ray Heatherton, popular baritone of stage and radio, sings the hit tunes that bring back memories, on the "Among Your Souvenirs" program heard over the CBS network on Mondays at 7:30 pm EDT. This is a new all-request program featuring the orchestra of Freddie Rich.

tioned whether there was a need to have the program repeated every few weeks during the winter months. It was pointed out that, with few exceptions, the average DXer would require no more than one or two cracks at any given station—provided, of course, that he really wanted to add another verie to his collection. Therefore, it was asked, why expect a station to continue its dedications throughout the DX season?

Besides taxing the facilities of the stations concerned, the DXer was obliged to carry a heavy burden. By all rules of the game, the members of each club were expected to report on every program dedicated

to that club, and thank-you cards were in order when veries were not required. It seemed to be asking a good deal of a listener to ask him to send off five hundred or more reports merely to uphold the honor of his club, and yet there was little else he could do under the circumstances.

Thus it was suggested that clubs put a little more stress on *Quality* and forget about *Quantity*. Let the primary objective of a CPC be to provide programs which DXers needed for verification purposes, and go easy on the idea of repeated dedications from the same stations.

Specials Decrease

More recently CPC activities have slackened off. Whether as the result of past criticism or for other reasons, the radio clubs are listing fewer dedicatory programs than at any time in the past six or seven years. The current season will probably hit a new low in the total number of broadcasts scheduled by the various organizations.

Perhaps CPCers are finding it increasingly difficult to persuade stations to come back on the air after midnight for a special program. It is not unlikely that many broadcasters have become discouraged by the poor response to previous specials, while others glance at the lineup of all-nighters and decide that it is impossible to get out to an appreciable audience.

It is possible that some committeemen have come to realize the evils of too many programs and are going slow in their efforts to arrange specials. It is also likely that present-day CPC's lack the energetic program-arrangers of a few years ago, with the result that the decreasing array of dedicatory broadcasts may be attributed to lack of efficiency on the part of the committee itself.

Whatever the reason—and it may well be a combination of all these

factors—there is no doubt but what courtesy programs have suffered during the past season. And although the defense in *Quantity* might well be applauded, there has been a corresponding decline in *Quality*—and that isn't so good for DXing.

Quality Suffers

"The DX game has been hurt by the CPC muddle of the past three years," points out J. W. DeRosa, 1721 Frederick St., East St. Louis, Ill. "I am amused by the constant bickering about the dedication of a program to a certain DX club. The Plumfp DX Club will secure dedications from twenty stations which are on for the monthly FCC frequency checks, and then they will rave on end about this feat. Is this the idea of courtesy programs?"

"When I was on this committee for the NNRC, it was our aim to secure programs from stations which usually were not found testing after midnight. We thought of the members who lacked certain stations and whose logs would benefit from an opportunity to hear a special broadcast. Securing dedications from stations which are on every month is no feat, nor is it beneficial to anyone in particular.

"Here is an example of what I think should be the idea behind courtesy programs work. HIX in Santo Domingo had never been on the air after 10 p.m. in its entire history. Its New York agent wanted sixty dollars an hour for a DX program. NNRC said a DX from them was out of the question. There is no such word in my vocabulary. By diplomatic measure, I secured a two-hour DX program from HIX gratis. This was the first time they had ever been on the air after midnight, the first time they had broadcast to a North American audience. I could go on indefinitely about the rare stations, both in the West In-

dies and in the United States, which I sold on the idea of DX programs when all DX clubs said it was impossible!

"Some say that in the 'old days' stations were more responsive. Bosh! Take the case of WSPR at Springfield, Mass. They operate on 1140 kcs. daytime, so, what with KVOO and WAPI, their signals never reached the Middle West. They are monitored on their regular schedule, so they have no frequency check. Yet they never broadcast a dedicatory program. Two months ago I wrote their president, Quincy Brackett, and received a courteous reply, although a DX broadcast was out of the question due to conditions beyond their control. The spirit of DX was there, but other factors were a handicap. Not to be discouraged, I again wrote Mr. Brackett, outlining many details which I thought would gain my objective—a DX program. A month later their Chief Engineer wrote that they would be glad to DX for Middle Western listeners, and asked my advice on hours and dates. To me, that proves conclusively that stations are DX-minded if approached in the right manner."

Readers Report

Despite static, all-nighters and interference, Radexers continue to reach out and drag in varied assortments of new stations. Old Man Winter appears to have been kind to those who patrol the midnight air lanes, for the reports of the past few months have been as complete and as enthusiastic as any in past seasons.

"Despite the heavy QRN," reports Stanley LaRue, 309 S. Bedford Dr., Beverly Hills, Calif., "I have had some very surprising results in the past week. A few of the TP's have been coming through with unbelievable volume. 3YA has shown a QSA4-R8 signal, while my best catch

is the Australian 6GF on 720 kcs.

"Just this morning I had a run of Japanese stations between 5 and 6 a.m., EST. My results were JOIK, 815 kcys., QSA5-R8; JOHK, 770 kcys., QSA4-R5; JOK1, 590 kcys., QSA5-R6; JOAK2, 870 kcys., QSA5-R8; and JOBK1, 690 kcys., QSA4-R5. Shortly before 6 a.m., EST, I was listening on 850, beside XERA, and was very surprised to hear XLIQ in Hangchow, China. This was during a fade on XERA and XLIQ pushed through for about ten minutes before they faded out and XERA faded in."

"The Aussies and Zedders have been coming through very well for quite some time," advises Hilding Gustafson, 2228 Sixth St., Rockford, Ill. "1YA is heard here nearly every morning and at times their signals reach a peak of QSA5-R8. Next best among the Zedders are 4YA, 2YA, and 2ZB. 3ZB on 1430 is also good at times and seems to be better than 3YA, although of less power. 2NR is without a doubt the best of the Aussies. They really come through with a sock. Almost as good are 4QN, 3WV, 2BL and sometimes 2CR.

"My best catch so far this last month was 2BE, using only 100 watts. My best verified Aussies are 4MK, 4TO, 3UZ, 3KZ, 2KO, 2HD and 2KY. Altogether I have heard 34 stations from down under, and have verified from 23 Aussies and four Zedders. Of the eight stations in Sydney, Australia, I have verified seven and hope to land the other this Spring.

"Of the TA's I have verified an even dozen, the best being EAJ15 which was heard and verified at 4 p.m. Of the TA's verified, five are in France, two in Spain, two in Germany, and one each in Portugal, Italy and Northern Ireland.

"My best verified SA's are CB138, PRE8 and PRF3. I use a Grunow

11-tube receiver and am well satisfied with it."

With a foreign log like that, a DXer would be pretty hard to please if he wasn't well satisfied with his receiver.

"Since I started to DX on my 4-tube Lafayette receiver on October 2nd, 1936," greets Warren E. Winkley, Hughson, Calif., "I have logged 457 stations in the United States, Alaska, Puerto Rico and Hawaii. On the Pacific Slope, I have heard 112 of the 121 stations in existence, 120 of the 140 in the West Central region, 127 of the 194 in the Middle West, and 58 of the 169 along the Atlantic Seaboard. Thus my total of 457 represents 63.6% of the 724 stations in this country."

"I am now using a 5-tube Silver-tone for broadcast band reception," supplies Jack Welsh, Kingston, Ill. "It is nine inches long, seven inches high, and five inches wide. With a 60-foot single-wire antenna, I have been able to hear such stations as KGB, KIRO, XEMO, XELO, WNEL, KWYO, KRGV, WPRO, KLZ, KFKA, WSPR and WTAW. Think this is pretty good on such a small set."

Reception Fine

"Just a few lines to let you know of the wonderful results I have been having since last October," writes Raymond W. Sahlbach, 4708-A S. Compton St., St. Louis, Mo. "Commencing with the frequency checks of that month, I have been busy verifying every station I could hear. At present, the verified list stands at the 300 mark, including Hawaii and Puerto Rico. Reports are out to 1YA, LR1 and HJ3ABE right now and, believe it or not, those three are the first foreign BCB stations I have heard in nine years of DXing! All states are represented in my log by at least one verified station, with the exception of Maine, Nevada and Delaware. Nevada will be eliminated from that group when and if

they verify my report of November 27th. My receiver is an 8-tube Zenith Model S-154 and I use a 60-foot Zenith doublet antenna, directional SE by NW."

"Last September I bought a 4-tube General Electric receiver," relates Lloyd G. Neily, Aylesford, N. S., "and to date I have logged 121 stations. In January I decided to verify my catches, and since then have reported to 46 stations, of which 23 have verified. They include stations in Cuba and Mexico as well as the United States and Canada.

"A couple of weeks ago a Halifax paper announced that VAS, Glace Bay, N. S., would soon become a member of the Canadian Broadcasting Corp. They are now constructing new studios. The C.B.C. is now building a new 50-KW station here in the Maritimes and expect to have it completed this year."

"I started off with the bite of the DX bug in September of 1936," admits Ed. Hirsch, 188-01 Locust Ave., St. Albans, L. I., N. Y., "and I can't seem to shake it off. At present I have a log of some 420 stations, but only a meager bunch of 235 verifications. My best catches, with most of them verified, are CHNC, CFCY, ZNS, HAT4, KGU, KWSC, KXYZ, WNAX, KGGM, KOB, KOH, KFVS, KGLO, KBTM and KOY. Heard but not verified are KOL, CFAC, KFPY, XEWW and KYA. My receiver is a 1936 Monarch and I wouldn't change it for anything!"

Answers S.O.S.

"In a recent issue Alfred Razzando, Fayette City, Pa., asks about a station on 1100 keys," declares Clifford Drain, 617 Camden St., Parkersburg, W. Va. "Well, that is definitely XEL, Mexico City. Have also heard XEDF, XEBG and XEBX announcing on 810, so he can take his pick of them.

"After reporting to XEN, Mexico City, for three or four years, I

finally received a verie. They claim that they want reports now, so the boys may feel safe to write to them. During recent early morning hours, XELZ, Mexico City, has been heard on 1370 keys. Down on 1080 I have heard HJ1ABB, Barranquilla, Colombia, on two consecutive Sunday mornings. The station announced in English occasionally. Another Colombian station has been heard on 1390 keys., but I haven't been able to get their call or location."

Another answer to an S.O.S. comes from E. Leisering, Jr., 782 E. 32nd St., Brooklyn, N. Y., who writes: "Lewis Hill asked in the March RADEX about a South American heard on 1220 keys. While I wasn't DXing on the morning of December 21st, I have heard PRA9, Rio de Janeiro, several times on that frequency. That's probably his station. Robert Handforth writes that he has heard stations in all but six states. I am wondering if he's heard New Mexico, as that is the only one which I haven't been able to hit. Possibly some one can give me a tip on when to listen for KOB."

"Station WOMI, Owensboro, Ky., is now operating on 1500 keys with 100 watts night and 250 watts day power," relates William T. Hiad, 1315 Hathaway St., that city. "It is a local station, not affiliated with any network."

Station Schedules

"Station WRVA operates weekdays from 7 a.m. to midnight except Fridays, when they stay on until 2 a.m., EST," contributes James R. Fitzgerald, Jr., RFD 4, Richmond, Va. "The Sunday schedule is from 8 a.m. to midnight. They have been recommended by the FCC examiner for a boost in power to 50 kilowatts. WMBG operates weekdays from 7 a.m. to midnight and on Sundays signs on an hour later. WRNL is on from 6:30 a.m. to local sunset, although an FCC examiner has rec-

ommended unlimited time and 1000 watts power. WTRD operates weekdays from 7 a.m. to 1 a.m. and on Sundays from 8 a.m. to midnight."

"Station WBRK, Pittsfield, Mass., 1310 keys., came on the air for the first time at 11 a.m. on February 20th," reports Gilbert L. Harris, North Adams, Mass. "Their regular schedule is now 7 a.m. to 1 a.m. Harold Thomas is the owner and operator."

"The Milwaukee Journal station, WTMJ, signs off at 1:30 a.m., EST, daily except Saturday, when it is on until 4 a.m.," postcards Harry Stackhouse, 36 E. Main St., Penn's Grove, N. J. "They are trying to get an increase of night power to 5 KW and the Secretary of the FCC advises me that the application has been designated for hearing."

"WBAX is now on full time," supplies Henry J. Leinbach, Jr., 40 W. Main St., Nanticoke, Pa. "As a very complete surprise, at least to me, they have joined the Mutual Network. At present I am using an old 1928 8-tube Stewart-Warner receiver. Since November 15, 1937, I have heard 322 stations, mostly through the aid of FCC tests. I hope to get about a hundred more on the frequency checks."

"I see you have Owen Sound listed for a new station on 1370 keys.," notes Clarence Wakefield, Warton, Ont. "I live only 20 miles from there. They are not on the air at the present time and I don't know anything about them."

Station Changes

"A number of changes have taken place down in Mexico," advises Bill Cunningham, 528 N. Marengo Ave., Pasadena, Calif. "New stations are XEAI, Mexico City, 1250 keys., 500 watts; XEAZ, Zacatecas, Zac., 1230 keys., 200 watts; XEBP, Durango, Dgo., 1150 keys., 250 watts; XEBU, Chihuahua, Chih., 1200 keys., 50 watts; XEFM, Leon, Gto., 1160

keys., 20 watts; XEFQ, Cananea, Son., 1010 keys., 50 watts; XEME, Merida, Yuc., 1249 keys., 50 watts; and XEXX, Mexico City, on 1170 keys., 1000 watts. Other changes find XEXS, Mexico City, on 1310 with 100 watts, XEYO on 610 keys., XEXE in Texcoco instead of Mexico City, XEXB with 250 watts, XEBS and XEAP on 1340 keys., XEAS with 100 watts, XEPN with 50 KW, XERA with 180 KW, and XENT with 50 KW. Not included in the latest government list and probably deleted are XEAD, XEAY, XEJB, XEFJ and XEXC."

"A number of changes continue to keep the broadcast band interesting," observes Alan I. Breen, 68 Pine Hill Terrace, Dunedin, N. Z. "In this country, the only change found 2ZR becoming a unit of the National Broadcasting Service and changing call to 2YN. Its frequency remains the same, 920 keys. Over in Australia, there have been a number of frequency changes. 2AD, Armidale, changed from 1080 to 1130; 2KA, Katoomba, from 1160 to 780; 4BU, Bundaberg, from 1480 to 1330; 4RO, Rockhampton, from 1330 to 1080; 4MK, Mackay, from 1080 to 1390; and 4TP, Townsville, from 1160 to 780. The second National station at Brisbane, 4QR, came on the air on January 7th, using 940 keys. and 500 watts power. Reception of 3ZR, Greymouth, has suffered considerably here in Dunedin. FFZ, Shanghai, on 1440 keys. seems to have increased its power quite a bit. Its opening at 7:30 a.m., EST, is heard very well."

Planning a DX Corner

While nearly every DXer would like to have a room or even a corner where he can give undivided attention to his dialing, few of us are able to boast of more than a chair in front of the family radio. Too often wives and mothers are unable to sympathize with plans which will

turn a presentable living room into a DXer's paradise.

The chances are that most of us have been influenced by pictures of the nooks and corners which the amateurs are proud to call their "shacks." We see the impressive arrays of panels and racks, the professional-looking receivers and transmitters, the displays of cards from fellow-amateurs around the world—and we start to visualize what we could do with a DX corner of our own.

We picture a small room up in the attic or down in the basement. In one corner we put the receiver or, if more ambitious, we plan a table on which in all their glory will rest a battery of communications models. There probably will be a desk from which reports will be sent out to a great many stations all over the world. Distributed about the room will be many comfortable chairs. The floor will be covered with the kind of a rug which absorbs cigarette ashes. The walls will be covered with the better verifications. And on the door will be a "No Admittance" sign—and woe to the unsympathetic female who dares invade this *sanctum sanctorum*.

But with things being as they are with most of us, the chances are that these dreams will be our closest approach to this bit of paradise. Even if we are lucky enough to have a second receiver which wasn't appropriated by the rest of the family, it probably wouldn't be any good for DX reception. And if by some freak of fortune the extra radio did know what to do with a weak signal, we wouldn't have a place to put it. Which automatically would write *finis* to the dream of the DX Corner.

One exception to prove this rule is George Nahas, 147 Seeley St., Brooklyn, N. Y., who is our idea of a mighty fortunate fellow.



Bobby Breen and Deanna Durbin, two of Eddie Cantor's brilliant young stars, seem to be amused with the lyrics of a new song during their rehearsal. They are heard with Cantor on a new series, heard currently on Mondays at 7:30 and 10:30 pm EDST on the CBS.

"I have just commenced," he writes, "to make a listening post which will be a honey! It will contain everything that DXers usually dream about. There will be three super receivers—one short wave set, one all-wave set, and a straight broadcast band receiver. I am planning a central mass antenna control, which will give me a choice of at least six different aerials. Separate panels on the wall will be mounted with my prize cards and letters from short wave and broadcast band stations. The listening post will be completed by next September (I hope) and will cost approximately five hundred dollars."

What Is a Verie?

"Last December," relates Harold G. Graeme (no address given), "I purchased a new radio and became interested in DXing and collecting veries. At the time I knew nothing

about either of these, and according to things I have read, do not know much more now.

"For instance, in the February RADEX Carroll H. Weyrich said that he started to monitor Daventry because they refused to verify. What does he or anyone else consider a verie from Daventry? Recently I sent them a report and received a card which read:

"The British Broadcasting Corporation acknowledges with many thanks receipt of your report on reception of the transmissions from the Empire Broadcasting Station, Broadcasting House, London.

"Maybe I am wrong, but I consider this a verification from Daventry. Do you?"

It is likely that most DXers will agree that BBC's Daventry card is not a verification, isn't intended to be one, isn't generally accepted as such.

In the lingo of the DXer, a verie is a statement to the effect that a listener actually heard a given station at a certain time. It is issued when a listener's report has been checked with a log of what was broadcast. It confirms that the report is correct, thus verifies the reception. Nominally the report is checked by a station employee with the station's own record, although advocates of the monitoring services contend that another listener is competent to compare a report with his own log.

But regardless of the source of the verie, the card or letter should state definitely that *reception is verified*, that *the report is correct*, that *the report coincides with the station log*, or otherwise *confirm reception*. Without these or other phrases of similar meaning, no card or letter may be accepted as a real verification.

It is true that, in lieu of official Daventry veries, some DXers are accepting the BBC cards of acknowledgment as confirmations. It is also

true that these cards are sent out to anybody who reports reception, regardless of whether program details are given.

Some veries from stations are good, some are bad, but the Davenport card as issued by the BBC can hardly be classified as any kind of a verie, must of necessity be considered as just another card for a heterogeneous collection of souvenirs.

A Good Verie

An idea of what may be classed as a *good verie* is submitted by E. M. Vickers, Box 121, Coral Gables, Fla., who writes:

"During the past month I received a verie which means much to me, since I really earned it. Early this year I wrote one of the Eastern 50-kilowatters for a verification, and in due course one of their mimeographed 'stock' cards arrived. A few days later, their Technical Supervisor wrote me about an interference problem with some foreign station on their frequency. He asked me to listen in and report to them if I was able to identify the offending station. They seemed to think it was a Cuban. So I checked their frequency for some time, sent them a report on what I heard. As an afterthought, I asked if I might have a verification typed on one of their letterheads. Last week along came their acknowledgment of my report and the desired verie. Naturally I am going to prize that one highly."

As Count de Veries remarked a few issues back, incidents such as this make the collecting of veries a most enjoyable part of DXing. Not always do the best catches or the most distant stations provide the most prized veries.

"Conditions on the broadcast band have been fairly good here," announces John J. Oskay, RFD 1, Box 85-V, Piscatawaytown, New Brunswick, N. J., "although I have experi-

enced some freakish reception. Between February 20th and 23rd found West Coast stations coming in the best in recent years. Little KWJJ pushed through at R7 and the big 50-KW stations were R9. KGU and KGMB showed excellent signals. From Down Under, 1YA, 2YA, 4YA, and 3GI were heard most any morning. As early as 8 p.m., EST, on February 22nd, the West Coast was pounding in. KOA was R7, KNX R6, KFI R4 and KSL R7. And from the South, practically every station shown in that special list in the March RADEX could be heard. CMBC was coming in at R6, while WRC was not heard at all. On 1110, CM CJ was heard R7 and there wasn't a trace of WRVA. And during the daytime, WCSH rides over the local WAAT at 3 p.m., showing an R6 against the R3 of the latter. Some fun, eh?"

Heh! Heh! Heh!

I'm glad someone else thought the Brinkley episode was funny," chuckles John T. Crabtree, 203 Santa Fe Ave., Santa Fe, N. M. "I thought it was one of the richest ever, and I'm just kid enough to relish anything I can get on that old boy! Thanks for mentioning 'The Broken Record,' and in return I'll give you a continuity slip which I think is a honey. One of the stock quotations on the Manhattan Merry-Go-Round program is this line: 'During the past few years, *thousands of people have turned to powder.*' That has been pulled so often that I'm surprised that someone hasn't mentioned it before."

"While reading the February RADEX," writes Harry Stackhouse, M. V. Hauraki, c/o Wm. Diamond, Terminal Island, Calif., "I noticed a reference to ZJV, Suva, Fiji. I used to live there and regularly visit the islands every trip. ZJV operates on 920 kcs., although it some-

(Please turn to page 35)

Solving RADIO'S Many Problems

• • • By B. FRANCIS DASHIELL

IOWN a Midwest radio and would like to know if this speaker could be used with the 1938 18 and 20-tube sets; also, if I can connect it to my 11-tube Hallicrafter radio—a Super-Sky-Rider. What is the technical difference between the Dynamic, Permanent Magnet, and Electro-dynamic types of loud speakers?

The speaker used by Midwest is a dynamic speaker and cannot well be adapted to some other radio set unless that receiver utilizes the same number and type output tubes and has the same resistances and voltages. It is difficult, therefore, to match up one speaker with some other set, and we do not so recommend.

Loud speakers are of two general types—the magnetic and the electro-dynamic, or the dynamic as it is widely designated. The magnetic type consists of a fixed permanent horseshoe-shaped steel magnet of excellent lasting qualities. The dynamic loud speaker has a similar magnet, but is of the electro type since its magnetic strength is derived from the current that flows in the coils around the soft iron core.

In the magnetic type the magnet is stationary, but the cone or diaphragm is moved by a pivoted armature that is actuated by the variations in the magnetic field created by a coil of fine wire wrapped around the pole pieces in the same manner as a telephone receiver. The magnetic type of speaker is used largely in battery operated sets where low output current only is available.

The dynamic or electro dynamic speaker has a powerful field mag-

net that is created by a heavy current that flows through its field coil. Often this field coil is utilized as a choke coil for the power filter unit, and this is why one speaker seldom can be fitted into the circuit from a different type of receiver. The dynamic speaker, because of this great strength, reproduces tones very nicely and with intense volume. The actual sound is created by the cone that is actuated by a fine coil of wire suspended between the magnetic poles. Currents flowing through this coil from the output of the set, that is, from the transformer, cause the coil to change its position, and, therefore, vibrate in unison with variations of audio current. This coil is called the voice coil. Such speakers are used on a. c. or all electric sets.

There is still another speaker called the permanent magnet dynamic type. It is similar to the dynamic speaker, described in the paragraph above, for it has a voice coil, but the magnet is a permanent steel magnet like the one used in the magnetic type of loud speaker. The fact it has a voice coil permits it to have nicer tone, and therefore, the speaker is used in small a.c. and automobile loud speakers. Its troubles may be the same as any large dynamic speaker, as far as its voice coil and suspension arrangement are concerned, but, in addition, the strength of the permanent field magnet may become weakened and ruin the speaker.

Loud speakers, as a rule, may be easily repaired when they become defective. If a speaker is in trouble your serviceman can substitute a universal speaker that can be made to match any radio set for the test

period. When a speaker fails to operate it may be due to a loose or broken connection from the power unit to the field magnet or from the output tube and transformer to the voice coil. Then, too, a broken wire in the windings will render the speaker inoperative. If a screwdriver, when held close to the magnet poles, pulls and vibrates rapidly, that is proof that the magnet and field coil operate as they should. Most speaker trouble is due to distortion and rattle. This is due to the voice coil not being centered properly. Hum that comes to speakers is due to poor filtering in the power unit or trouble in the voice coil. Most speakers have this hum reducing element built in. But it usually will be found, in the dynamic speaker, that the voice coil will be off center and rubbing on one of the poles. Or one of the wires (flexible) to this coil is scraping or dragging. If the cone has warped or broken open at its seam, it will not center and the coil will rub or chatter. In any event the coil must be recentered in the pole gap. Often it is better to procure a new cone and voice coil assembly than to attempt repairs to the old one.

Wave Traps

Could you please explain to me how a wave trap operates and how I might make one or purchase a ready-made kit? I have an 8-tube Majestic, model 50, and I feel that a wave trap may help at the points where the set is not sufficiently selective.

The Majestic model 50 has had a very good record for sensitivity and selectivity. Sometimes the r-f and oscillator circuits need aligning and adjusting. New tubes, when required, are a great help. But trouble from nearby amateur, cw, and commercial broadcasting stations, in the form of interference, will appear.

Wave traps are designed to eliminate this form of interference. A wave trap usually consists of a completely shielded coil or resonant circuit that is connected in series with the antenna. It is possible to insert two or more traps, of different degrees of r-f resistance or impedance, so as to eliminate interference from more than one station. The wave trap has a small variable condenser connected across its ends, and by this means it is possible to tune the circuit against the interfering signal. Then, if there is still another station interfering, a second tuning of the condenser will eliminate it. The size of the coil depends upon the wave length of the interfering station.

Traps may be purchased as cheaply as they can be made, and are much more effective since they are well shielded and built compactly. Iron cores usually are used and adjustment is simple. The Miller trap, for instance, can be tuned with a tiny knob on top so that the interfering signal will be at a minimum. Their dual trap has two tuning adjustments and is very selective. This trap may be used with either a single-wire or a doublet type of antenna. A number of good traps may be purchased from the leading radio supply houses, and all are equally reliable.

Knight Receiver

I have a Knight 8-tube set, and I am wondering whether it is good enough for DXing. Perhaps I should have a pre-selector to go with it so as to get greater distances. What do you think of this idea, and do the distributors of the set also have these pre-selectors?

The Knight 8-tube receiver is a very good type of set and should bring in distant stations with ease. However, the fact that a set is excellent for DXing means that it must have a sufficient number of

tubes together with good selectivity and sensitivity. A set with 12 tubes will do more DXing than a set with 6 or 8 tubes as a rule, although frequently the larger set provides more volume and better tone but little more in the way of signal amplification or r-f sensitivity. We think that an 8-tube set will do very well if carefully handled at times when distant signals can be received.

A pre-selector is of value, of course, for it provides more r-f amplification and, therefore, will amplify weak signals from the antenna before they are passed into the radio receiver. The Allied Radio Co., from which you purchased the Knight radio advises that they carry a line of several pre-selectors and kits, some of them being inexpensive. These units can be attached to the Knight radio receivers and will cover the broadcast or the short-wave bands.

Double Reception

I have a Croydon 5-tube set which brings in code right on top of the short wave stations and makes reception very difficult. The short wave stations that come on the 49 meter band repeat at 5100 kcs; also, the same is true with the 75 meter band. The amateurs seem to repeat again at 3000 kcs. I have noticed the same trouble on the broadcast band, but it is not very bad there. I had the set tuned by a local service man. He checked the r-f circuit, but the set does the same thing again.

First, the fact that you hear code mixed in with the voice signals on the short wave does not indicate that there is some trouble. Code and phone signals are squeezed in all over the short-wave spectrum, but usually grouped in individual types of signals. For instance, you have a short-wave amateur band, and then at either side of it you will find code signals. Often, how-

ever, some code signals will spill over into a phone band. On the other hand, code may be due to repeat signals at several points on different harmonics.

Double reception occurs when especially strong signals enter the r-f circuit of a receiver and set up some form of combination between the signal frequency and the i-f of the set. About the only solution is to have the receiver carefully aligned and tuned so that unwanted signals cannot enter the r-f circuit. If the fault is due to the receiver and cannot well be corrected, we suggest the use of one or more good wave traps. The April, 1938, issue of RADEX, explained at length image frequency and how to cure it. Your attention is referred to this answer in that issue.

Ancient Receiver

I have a one-tube Unico battery set that uses a 199 type tube. Can you tell me what battery to use with this set, and can I make a short-wave receiver out of it?

We regret that a circuit of this set is not available to us. Because of this, we cannot tell you exactly how to convert it for short waves, but usually if a portion of the winding of the coil is removed, it will permit the set to respond to lower wave lengths. Try removing a few turns from the coil that connects to the grid of the tube, and you will find that the set tunes to lower waves and eventually will get down to the police, aviation and higher wave amateurs. Of course, real short waves and DXing, will be out of the question.

The set uses a type 199 dry-cell tube which requires 3.0 volts on the filament and consumes 0.06 amperes an hour. A maximum of 90 volts is used on the plate with the headphones or speaker in series. However, a plate voltage of 45 is about the average potential applied on one-tube sets. A 45-volt B battery,

and an A battery composed of two dry cells in series, will be sufficient.

Atwater Kent 60

I have an Atwater Kent 60 receiver, and have wondered if a pre-selector will help it work better. I have a diagram of a single tube pre-selector that employs a single 2A7 tube for first detector and oscillator combined. What do you think of this?

The Atwater Kent 60 is an old model that uses eight tubes. Since it already is a tuned-radio-frequency receiver, the use of a single-tube pre-selector will add still another tube of radio-frequency amplification. This will not help the set to an appreciable extent, nor will it improve the selectivity, for a tuned-radio-frequency receiver is very selective. There is no use adding radio-frequency amplification beyond a sensible limit, and your set is sufficiently covered in this respect. We recommend, instead, a careful checking for neutralization and alignment and voltages on the tubes. Replace old tubes, condensers and resistors if doubtful, and you should do almost as well as any new set of equal sensitivity.

Grid Connection

My Silvertone is giving some trouble, and when I place a finger gently on the top of each grid cap of the 6K7G and 6L7G tubes I can triple the volume of sound. This makes me feel that I am not getting all the power that I should from this set. The 6K7G tube will give a noise when the set is playing and the volume will drop. By twisting the cap on this tube the volume will come back again. I use a Silvertone all-wave doublet and a good ground. Do you think this is a good DX set, or is it a simple trouble that can be remedied?

The Silvertone receivers are very good, and any trouble you are experiencing may be due to some

easily remedied defect. This set, if it has more than 6 tubes, should bring in foreign stations and provide much DX entertainment. Less than six tubes in a set is not considered satisfactory as far as sensitivity and good volume and tone are concerned with distant stations in DX work or foreign reception.

When you touch one of the caps on the grid top of a tube you automatically provide an increase in capacity, something that is missing from the normal operation of the set. Touching the grid, if anything, should reduce the volume or cause oscillations noises and tone changes. The fact that the normal capacity of the grid circuit of a tube has become altered to such an extent proves that the tube itself may be defective or some condenser or circuit feeding it has failed. First, try testing the tubes in question. The cap may be loose or the internal wire leading to it broken or disconnected. The external wire to the grid cap connection from one of the grid coils of either the i-f or r-f transformers may be broken or shorted in some way. All these possibilities must be checked. A good serviceman is fitted to do this work quickly and inexpensively, and we suggest that you call upon one. All voltages for the plate, grid bias, screens, etc., of the tubes in question must be carefully checked.

If you wish, however, to have the service experts of the Sears Roebuck Company, from which you purchased this set new, pass an opinion or make the repairs, we suggest you write them at Department 657, 925 South Homan Street, Chicago, Ill., and outline your trouble.

Light Switches

I seem to pick up a lot of static on my Westinghouse WR-23 whenever a light switch is turned on or off. There is a click in the set. It also occurs when the telephone

dial is operated. I have an inverted L. antenna, and the ground wire is 12 feet long attached to a water pipe. Can you help me?

It is natural for any radio to respond to the tiny electric impulses or static sent out whenever an electric switch is turned on or off. The making and breaking of an electric circuit is accompanied by a small spark. This spark is a generator of radio waves—the train being heard as a single click. If the electric wire—one side—is grounded to the water pipe that is also a radio ground, it may be likely that you are receiving the static through this circuit. But, since the radio is operated on the house wiring circuit the impulses are sent out from the switch along the wires and they reach the radio in this way. Also, the waves carry through the air for short distances, and your antenna, leadin, or the wires of the set itself, if not perfectly shielded, pick up the impulses.

In cases like this, the use of a doublet antenna with the twisted, noise-elimination leadin, and a noise filter in the a. c. connection, may prove beneficial. The removal of your ground wire to another point or an outside ground would be in order also. See the April, 1938, issue of RADEX, for an article on grounds and noises of this kind.

Power Line Hum

Can a high line of 33,000 volts be installed so that it will not cause a continuous roar or hum in nearby radio sets? In the past month such a line was erected near me, and all radios have gone bad. My set is a new G. E. 4-band receiver, but the road is so bad on the long waves that reception is impossible day or night. On the short waves it is not so bad, but very objectional. Is there anything I can do to get away from this noise?

Any high tension line is surrounded by an electro-magnetic field. This

is because the wire carries alternating current of very high voltage. This field extends out for some distance, according to the power, and 33,000 volts is sufficient to range far away along two belts paralleling the power line. All radio sets within these belts, on either side of the line, are affected. The noise that is heard, is a humming roar having a frequency equal to the frequency of the current being carried. Also, high-potential leakage over insulators or during wet weather, is very noisy. On wet, dark nights, this discharge can be seen as a blue glow or corona. The direct action of the field, other than the discharge noise, is that of inducing a faint alternating current in adjacent antennas, leadins, radio receivers, ground wires and even the pipes within a house to which the radio is attached.

Since this interference is entering the house by so many paths it is a difficult problem to attack. If a doublet antenna is used, place it as far back away from the wires as possible, and point it directly toward the power line. A long antenna leadin can be used with doublets, if the doublet is placed far back. The leadin will not pick up noise, so all you will get will come through the top of the antenna. Your local trouble will be in the a. c. line and the ground. It is possible to use a shielded ground wire run direct to an outside ground and not to the water pipes. A noise filter in the a. c. electric line will be beneficial too. The set that you own is a good one and well shielded, and there is nothing more that can be done to it. This form of interference is hard to eliminate, and all of the above suggestions are, therefore, in the nature of experiments. They should, however, lessen the trouble, but we doubt whether it can be eliminated entirely. It is just one of those unfortunate situations.

Ship-Board Radio

I use one of the small A. C.-D. C. radio receivers on board a large ocean-going vessel. I get generator noise and other static. Have tried using filters, but to no avail. Is there any way to stop this nuisance so the radio can be used with pleasure?

Direct current, such as is used on ship-board, is noisy. The generators have commutators and brushes, and all this gives irregularities to the current. And, since the a.c.-d.c. set is small with a simple filtering circuit, the hum and ripple noise is apt to enter and ruin reception. Also, you have d. c. noises from motors and other machines on board. A good noise filter is usually supposed to filter out this noise, and we suggest that a larger one be utilized than has been used. All this, however, runs up the expense of using a small radio.

It occurs to us that perhaps an automobile radio, operated on a storage battery kept charged by the d. c. supply of the ship, might be less noisy. A good antenna, with a noise-eliminating lead-in is quite necessary, and if it is a doublet, no ground wire will be needed. The ground, as a rule, on board ship, is noisy. You can use an a. c. receiver, with a converter and this would prevent generator noise from entering directly into the radio. Such units are expensive. As long as you use the a.c.-d.c. set we believe the trouble will exist because of the type of circuit and filtering system used. Reception on ships means that a receiver is placed in a compact electrical city where every known form of interference exists. Yet, on the other hand, large receivers operate on the passenger vessels and provide excellent entertainment. These, as a rule, will be found to have satisfactory filtering circuits in the power units.

Change To Battery

I have a Scott a. c. receiver that I would like to change to a battery set so it can be used in summer camp where there is no electricity. Are there any newer tubes that can be substituted for the older so batteries will operate them?

The difficulties in changing an a. c. set to battery operation are many. First, tubes that match the characteristics of those now used in the set must be found. It is impossible exactly to do this. Then, provision for B voltage must be made so all parts receive the proper potential. Of course, if you wish to sacrifice tone, it might be possible to make this change. Type 32S can be used in place of 24As. Different sockets are needed, and the plate and grid potentials must be altered. No cathode connection is used. Or a type 1A4 may be used. In place of the 27s you can use 30s. And in



Eve March is one of radio's youngest newcomers. She came to the NBC microphone via the Kleig lights and cameras of Hollywood a little more than a year ago. She is heard on NBC daytime dramas.

place of the 45s use type 33s. All these are two volt tubes of low amperage drain.

The connections to the present transformer must be removed and proper leads arranged to go from plates to the various B battery terminals. Many resistors and present connections must be changed so that the proper potentials are applied to the various tube elements. The power unit of the set must, therefore, be dismantled. The speaker, which is electro-dynamic, must be replaced with a smaller magnetic or permanent magnet type. From the foregoing you can see what a task is involved in making the change, and we have mentioned these things because we feel we ought to discourage you as well as the many of our readers who will write us in a similar vein. While the job can be done as outlined, careful adjusting and tracking of the oscillator circuit must be watched, and, considering everything, the study and expense is not worth the effort involved.

Bicycle Radio

I am interested in obtaining a radio for a bicycle and to be installed on the carrier over the rear wheel. Is there any make you can recommend for this purpose?

You have an interesting question and perhaps some of our readers already have solved it—for bicycles or motorcycles. We do not know of any suitable set made for the purpose, but it is possible to install a small auto radio on your bicycle. The main difficulty is the battery, but a small 6-volt storage battery will keep it running for a few days—over a week end, at least. Even four dry cells connected in series will run it a day or so while on a run. A small vertical antenna will be sufficient. Radios of this type have been placed on motor cycles, and many police departments have so equipped their traffic cycles. The

problem of battery is, of course, the thing that will give the most concern.

A. V. C. On Clinton

My set is small, but powerful. It is a Clinton 250, and I would like to know if I can install A. V. C. so as to stop the fading. I would like to know the I-F of the set, and what size variable condenser it uses.

There is no type of a. v. c. that we can recommend installing in this set as such additions seldom prove satisfactory. There are many factors to consider when making this change. We do not have this circuit available, but suggest that you write direct to the manufacturer—Clinton Mfg. Co., 1217-19 West Washington Blvd., Chicago, Ill., for the information desired.

Patterson Radio 16

I have a Patterson radio No. 16 that I recently purchased second hand. Where can I procure a circuit diagram? Every time I turn the tone control I get a scratchy noise and the R meter jumps around. There is a knob—R. F. Gain—and I don't know what it is for. Can you help me?

The Patterson Radio Co., 1320 So. Los Angeles St., Los Angeles, Calif., is the maker of your set, and you should be able to get a diagram from them. As to the tone control, we think it defective and in need of replacing. The radio-frequency gain knob, is just what it says. It increases the r-f amplification on weak or distant signals, but is turned down on local and strong signals since it also increases the noise level and static in proportion to the amount of "gain" or amplification in the radio frequency amplification circuit of the receiver.

An FCC Examiner has recommended the grant of construction permits for new stations in Jacksonville, Ill., and in Charleston, S. C.

Five Years of GERMAN Broadcasting

"THIS is Germany calling on **DJA.**" This announcement, with the substitution of different call letters, has become a familiar call to all radio listeners of the world. There is no place on earth, from the glacial fields of Alaska to the sun-drenched shores of Tahiti, where they have not been heard at least once. It is now five years that these announcements, and the programs they introduced, have resounded from corner to corner of the globe. Usually five years do not mean much in the life of a great institution, and normally an anniversary of this sort passes unnoticed, but in the sphere of broadcasting, five years mean a lot. This holds particularly true of shortwave broadcasting, where development and progress are still in their prime, and every day may bring something new.

The German shortwave station began its service from Zeesen, a little village in the neighborhood of Berlin, on April 1, 1935. There had been previous shortwave broadcasts from there, but they were experimental only, and quite insufficient to provide a satisfactory service. The old wooden tower and its round antenna are still to be seen as one of the relics of Zeesen.

On April 1st, 1933, directional aeriels were introduced at Zeesen, and special programs designed for shortwave listeners only. At first only one aerial, directed to North America, was set into operation, with a daily program of two hours duration. It became an instantaneous success, and subsequently new aeriels were installed. The power of the transmitter at this time was only 4 kilowatts, but soon thereafter it was raised to 7 kilowatts.

Directional aeriels for Africa were

inaugurated on Feb. 1 of 1934, and on the next day the South American beam was put into use. Feb. 3rd marked the inauguration of the East Asia service on a directional basis.

Two more directional services followed in 1935; on January 1st for South Asia, and on May 1st for Central America.

The increase in power from 7 to 40 kilowatts was made on August 1st, 1936, to better serve the listening world with news of the Olympic Games.

The German station heartily appreciates, and always acknowledges, reports from its listeners. They have on file now well over 100,000 letters from their auditors, as well as photographs, souvenirs, and other tokens of friendship sent to them. In return, the station always acknowledges with a card, or sometimes a letter, and frequently they send booklets, travel literature, Christmas cards, phonograph records, and program folios. Their advance program sheets are mailed free of charge to any listener who requests them.

The German stations are operating as we go to press, on the following transmission schedule:

For North America

DJB	15200 kcs	Sunday, 11:10 am to 12:25 pm
DJB	15200 kcs	4:50 pm to 10:45 pm
DJD	11770 kcs	4:50 pm to 10:45 pm
DJL	15110 kcs	8:00 am to 9:00 am

For Asia

DJA	9560 kcs	12:05 am to 11:00 am
DJB	15200 kcs	12:05 am to 11:00 am
DJE	17760 kcs	12:05 am to 5:50 am
DJE	17760 kcs	8:10 am to 10:00 am
DJQ	15280 kcs	12:05 am to 5:50 am
DJQ	15280 kcs	8:10 am to 10:00 am
DJS	21450 kcs	12:05 am to 11:00 am

For Africa

DJC	6020 kcs	10:40 am to 4:25 pm
DJD	11770 kcs	10:40 am to 4:25 pm

DJL 15110 kcs Midnight to 2:00 am
 DJL 15110 kcs 10:40 am to 4:25 pm
 DJL 15110 kcs Sundays, 6:00 to 8:00 am

For Central America

DJA 9560 kcs 4:50 pm to 10:45 pm
 DJR 15340 kcs 8:00 am to 9:00 am
 DJR 15340 kcs 4:50 pm to 10:45 pm

For South America

DJE 17760 kcs 6:00 am to 8:00 am
 DJE 17760 kcs Sunday, 11:10 am to
 12:25 pm
 DJN 9540 kcs 4:50 pm to 10:45 pm
 DJO 11800 kcs 7:15 pm to 10:50 pm
 DJQ 15280 kcs 6:00 am to 8:00 am
 DJQ 15280 kcs Sunday, 11:10 am to
 12:25 pm
 DJQ 15280 kcs 4:50 pm to 10:45 pm

Broadcasting in BULGARIA

• • • By Douglas E. Manke

A NEW superpower radio station has recently started to broadcast regular programs from Sofia, with 100 kilowatts of power, making its powerful voice heard in all parts of Bulgaria, where highly adverse topographical conditions make reception so difficult.

Broadcasting in Bulgaria was started by a small group of fans, who, in 1929, secured authorization to set up a small experimental station. Through donations they were able to secure a tiny studio, were given an ancient transmitter by the Post Office Department, and piece by piece acquired the rest of the necessary equipment, building two 30-meter aerial towers themselves. Transmissions were started in 1929 with 300 watts power, and later raised to 1500 watts.

In 1934 broadcasting became a state monopoly with the Minister of Posts and Communications having administrative control, and the "Institute of Social Reform" exercising political control. Program expenses are defrayed by the sale of

a weekly radio magazine, and by contributions from listeners. Due to the scarcity of funds, program organizers have to rely greatly on phonograph records, and to take commercial announcements. The number of Bulgarian listeners is estimated at not more than 12,000, which is about two per cent of the population. Receiving sets are taxed as follows: one tube sets, 200 leva per year; two tubes, 400 leva; three or more tubes, 500 leva. The leva is worth about one and a half cents.

In 1936 two low power transmitters were put into service in Varna on the Black Sea, and in Stara-Zagora, but even these could not cover the whole country. The new station is more advantageously located. It is on a plateau about 60 miles southeast of Sofia. The transmitter, the most modern and powerful in that part of Europe, was built by the German firm of Telefunken.

The Bulgarian radio stations are listed below:

850 kcs., Sofia, 100 kilowatts
 1276 kcs., Varna, 2 kilowatts
 1402 kcs., Stara-Zagora, 2 kilowatts.

Card Swappers

WILLIAM C. BUCHANAN sends us a list of Australian and New Zealand radio listeners who wish to exchange SWL cards with fans in this country. RADEX can assume no responsibility, however, for failure of any of these listeners to make an exchange, since we do not have their requests for exchanges in our files.

Australia

F. Dubbo, City Road, Beenleigh, Qsld.

Vincent H. Leonard, 72 Shuldy Park Road, Kenmore E4, Vic.

J. Burke, Lyster St., Coff's Harbor, N.S.W.

B. Hewerdine, Barolin St., Bundaberg, Qsld.

W. Simms, 112 Lincoln St., Perth, W. A.

N. Churchward, 392 Alice St., Maryborough, Qsld.

C. J. R. Howard, 219 Ellena St., Maryborough, Qsld.

C. J. Wegert, Gladstone, Qsld.

H. G. Rogers, 28 Edward St., N. Geelong, Vic.

A. T. Ashman, "Ebenezer," Napier St., Eaglehawk, Vic.

E. J. Bailey, 709 Macarthur St., Ballarat, Vic.

G. M. Anselme, 16 Hartley St., Rozelle, Sydney, N.S.W.

Mrs. G. M. Anselme, same as above.

J. Mildenhall, Byron Bay, N.S.W.

A. D. Evans, 12 Dudley St., Brighton, S5, Vic.

C. Watts, Poole St., Bowen, Qsld.

Lyle Schulte, c/o Miss E. Charter, 14 MacAuley St., Cooparoo SE2, Brisbane, Qsld.

Roy Kennedy, 21 Brown St., Adelaide, S. A.

New Zealand

J. A. Kennedy, Box 101, Grey-mouth.

N. Mancer, 22 Rangatikei St., Wanganui East.

R. Weir, 41 Islington St., Dunedin, NE1.

C. McClure, 164 Clyde St., Island Bay, Wellington.

J. D. MacLean, 77 Kingsley St., Sydenham, S1, Christchurch.

J. M. Flower, Tauvanga.

C. O. Pepperel, Rahotu, Taranaki.

C. Alsop, Midhurst, Taranaki.

T. Teehan, 6 London St., Dannevirke, Hawkes Bay.

Victor Hugo, Fire Station, Ponsonby Road, Auckland.

L. Oxenham, 6 Glendaver St., Berhampore, Wellington S1.

W. T. Choppen, 4 Marston Road, Timaru.

A. MacJennett, 135 Constable St., S1, South Wellington.

Fred Bluett, c/o T. A. Patterson, Kiore, Taranaki.

R. O. Soughton, Martinborough.

C. E. Foote, 24 Muripara Ave., Pt.-Chevalier, Auckland.

J. J. Green, c/o A745 Greenlane Road, Remuera, Se2.

V. Donnelly, Pollen St., Thames.

C. Lloyd, 33 Wynward Road, Mt. Eden, C3, Auckland.

A. H. Henson, 116 Roker St., Christchurch, SW1.

A. J. Chapman, 145 Liddell St., Invercargill.

E. G. Stowell, 28 Memorial, Timaru.

Bob J. Wright, Box 33, Martinborough, Wairarapa.

G. K. MacDonald, 52 Bordesley St., Linwood, Christchurch.

J. R. Monson, 7 Hill St., Dunedin.

A. C. Mildenhall, Main Road, Green Island, Otago.

C. O'Connor, Rakaia, Canterbury, S. I.

Fred Lanyon, 142 Olliviers Road, Christchurch.

W. D. MacComb, 1 Merani St., Devonport, Auckland.

G. Bogue, 40 Haywood St., Dunedin SW1.

J. Lunn, 67 Fox St., Dunedin, S1.

K. Brown, 732 High St., Lower Hutt, Wellington.

R. T. Neal, 41 Plymouth St., Wanganui.

Bob Russell, Taupo Road, Taumarunui.

J. E. A. Sanderson, 8 Grove St., Mussellburgh, Dunedin.

Reginald Kirk, Makirikiri, Wanganui.

Station OK1MPT, Praha, the original Czechoslovakia s.w. station, has been resumed. It works on 5145 kcs. on Fridays from 4:40 to 5 pm, and on Saturdays from 4:25 to 5:30 pm.

For SHORTWAVE Tuners

Argentina

LSX, the original Argentine experimental station, has returned to the air and is heard testing frequently, in the evenings, on 10350 kcs. Two new stations are also heard in parallel with LSX irregularly; LSC on 7940, and LSB on 13950 kcs. (Velasco, RX25 N. Y., RX91 Ohio)

Australia

Reception of Australian stations is picking up, and warm summer mornings should help to increase their strength at least a couple more "R's". VK2ME on 9590 is heard best near 5 am on Sundays, the signal at this time being R4-6 in volume. VK3ME on 9510 is also at its best near 5 am, with R7-8 signals. VLR on 9580 kcs is also heard at R8 strength between 5 and 5:30 am, EST. (RX25 N. Y.)

Belgium

The Brussels station, ORK on 10330 kcs, is heard between 2:45 and 3 pm, at which time news is broadcast in French. The station signs off at 3 o'clock with the Belgian National Anthem, "La Brabaconne." (RX25 N. Y.)

Brazil

The best Brazilian station at this time, PSH on 10220 kcs, is still coming through but not as well as a few months ago. PSH announces in English, Spanish, German, Portuguese, French and Italian. The call letters are keyed, "Peter-Samuel-Harris." (RX98 Tenn, RX110 Venezuela)

Bulgaria

One has to stay up into the early morning hours to get good reception from Bulgaria, for the best time to tune is from 2 until 5 am, EST, on Sundays. Fine music, beautifully played, makes up the pro-

grams. LZA on 14920 kcs, in Sofia, is the station, and the complete schedule is, daily, 5 to 6:30 am, 11:30 am to 3 pm, and on Sundays, 2 am to 5 pm. (RX93 N. Y.)

Cocos Islands

Although in the amateur band, station ZC2OP, in the Cocos Islands, will prove to be a very interesting catch. It is on 14440 kcs, on the high frequency side of the 20-meter band. This station is operated by a group of treasure hunters, and can be identified by the call "ZC2—Oceanic Boat Pedro calling." Although powered only with a battery giving 30 watts input to the transmitter, it can be heard almost regularly nights. (RX93 N. Y.)

There are at least two Cocos Islands. One group is in the Pacific Ocean, and owned by Costa Rica. The other group is in the Indian Ocean, north of the Andaman Islands, off the coast of the Malay Peninsula. The prefix ZC2—is assigned to those islands in the Indian Ocean. It is believed, however, that ZC2OP, is actually located in the Costa Rican possession and the call sign is wrongfully used.

Colombia

Sr. Julio A. Sanchez T., of Santa Marta, states that the correct call letters of his station are HJ1ABJ, "La Voz de Santa Marta." HJ1ABJ transmits on 4760 kcs daily from 11:30 am to 2 pm, and from 5:30 to 10:30 pm, EST. All reports will be acknowledged on receipt of a reply coupon. (RX42 Calif.)

HJ1ABP on 9618 kcs seems to have added more power, because on several mornings their signals were so strong that they caused interference with ZRK on 9606 kcs, resulting in a terrific heterodyne. (RX25 N. Y.)

The war office station HKV, at Bogota, silent for a long time, is reported back on the air. This station transmits on approximately 8700 kcs, near 7 pm on irregular nights. (RX85 Ohio)

Czechoslovakia

The best of the Prague stations at this time is OLR3A on 9550 kcs, although OLR4A on 11840 kcs is very good. OLR3A can be heard on Wednesday afternoons between 4:30 and 4:45 pm, EST, at which time they broadcast news in English. (RX25 N. Y., RX33 Kans.)

France

The new French Colonial station at Essarts can now be heard in any part of the country, judging by reports received. It is heard on 11885 kcs near 6 pm, and also from 7 to 10 am. Reported also on 15100 kcs from 3 to 4 pm, with a news broadcast in English at 3:15, and on 15245 kcs near 4 pm. (RX33 Kans. RX51 Mass., RX91 Ohio, RX101 Mass., RX109 Tex.)

Guatemala

The new broadcaster, TGQA (6440 kcs) at Quezaltenango, operates with 200 watts, and uses the slogan, "La Voz de Quezaltenango." TGQA relays TGA on 1450 kcs, Mondays through Fridays from 9 to 11 pm, on Saturdays from 9 pm to 1 am, and on Sundays from 1 to 3 pm. Reports should be addressed to the Director of Electrical Communications at Guatemala City. Return postage is not necessary. (RX91 Ohio, RX93 N. Y.)

India

The Delhi, India station heard on 9590 is VUD2. This is but one of a new array of transmitters in Delhi. The others, with their frequencies and schedules, follow:

VUD, 6085 kcs, daily 10:30 pm to midnight, and 2-4 am, EST.

VUD3, 11870 kcs, not on the air yet.

VUE3, 15160 kcs, not on the air



Jackie Heller, NBC singing "midget of the mike," and his wife, Ruth Greeley, photographer's model and former Earl Carroll stage beauty.

yet. (RX93 N. Y.)

We understand, unofficially, that the frequency 6085 kcs, is available to all the Indian shortwave stations. In addition to Delhi, there are transmitters at Calcutta and Bombay.

For a rare catch, listeners are invited to try for this one. No call letters are known, but the location is Mysore Palace, in Mysore, and it transmits on approximately 6590 kcs. It was heard only once, near 7 am, EST. (RX93 N. Y.)

Indo-China

"Radio Philco," at Saigon, is reported on 6240 kcs from 8:30 to 9:30 am, EST. A listener in Vancouver, B. C., states that it is heard with QSA5 quality. (RX21 Wash.)

Japan

"I have just received my verification from JZJ, Tokyo. From it were learned the following facts concerning Japan's stations. The address is Overseas Section, Nippon Hoso Kyokai (Broadcasting Corporation of Japan), Atagoyama, Shiba-Ku,

Tokyo. The verification is on a four page form. On the first side is a splendid view of the transmitters which send these powerful signals to the United States and the rest of the world. On the second page we have the verification, and a statement that the Corporation will furnish a monthly copy of their forthcoming programs to anyone who fills out and returns the enclosed questionnaire. On page three is the schedule, and page four is printed in Japanese." (RX93 N. Y.)

Telephone stations JVN on 10660 and JVM on 10740 kcs can be heard between 4:45 and 5:15 am, EST. When engaged in telephony, their signal is "wobulated." (RX25 N. Y., RX91 Ohio)

Jugo Slavia

A card received from the Belgrade shortwave station reads, "We thank you for your report of our broadcast. This was one of our special broadcasts for Yugoslavs in the U.S.A., which, until the completion of our more powerful transmitter, is also relayed from Berlin, on which wavelength you picked it up. As it is, however, quite possible for listeners in the USA to listen in to our programs on our normal wavelength of 49.18 meters or 6100 kilocycles, we shall send you in future our regular illustrated program of transmissions." (RX86 Mass.)

Martinique

Two Martinique stations are on the air. "Radio Martinique" is the better of the two. It is on 9700 kcs, and broadcasts some nights as late as 11 pm. "Radio Fort de France" was off the air for a while, but is now heard again, between 8 and 9 o'clock at night, on 9350 kcs. (Velasco, RX99 N. Y.)

Mexico

The Universidad de Mexico, located at Justo Sierra No. 16, Mexico City, D. F., is on the air with its new 1500 watt Collins transmitter,

on 9600 kcs. The call is XEYU, and when on regular schedule it will relay XEXX, a broadcast band station on 1170 kcs. The schedule of transmissions will be daily from 3:30 to 4:30 pm, and from 8 pm to midnight, EST. It is expected that announcements will be in Spanish, English and French. Reports will be acknowledged for a reply coupon. (Velasco)

XEWI is temporarily off the air because the transmitter is being rebuilt for 400 watts power. (Velasco)

The "bootleg" station on 7090 kcs has left the air, according to our Mexican informant, but he expects it to reappear on some other frequency.

Panama

HP5I on 11895 kcs, at Aguadulce, Panama, signs on and off with the selection "El Tambor de la Alegria." They will verify in return for five cents in unused USA stamps. Their transmission hours are from 7:30 to 9:30 pm, EST. The address is "La Voz del Interior."

Pitcairn Isle

Pitcairn Island, in the south Pacific, is now heard through station VR6AY. This is really an amateur station, transmitting on 14346 kcs. The transmitter was donated to the residents of the island by several American radio manufacturers. When it first went on the air it bore the call letters VR6A, but shortly after the letter "Y" was added. VR6AY operates with a power input of from 60 to 75 watts, and is heard very well in every part of North America, in the early morning hours. This station is reported by several listeners in this month's Amateur Calls Heard column, and also by RX21, Wash., RX22 Ohio, RX57 Ill., RX85 Ohio, RX93 N. Y., and RX112 Pa.

Portugal

There is a new station in Lisbon known as "Radio Renascena." It is

also called "Emisora Catolica Portuguesa," and the address is Rua Cappello 5. Radio Renascena transmits on 5980 kcs with a power of 250 watts, daily from 3 to 5 pm, and on Sundays and Thursdays from 6:30 to 7:30 am.

St. Kitts

The St. Kitts station VP2LO, transmitting on 6380 kcs with 500 watts, is sometimes heard as late as midnight, EST. (Velasco, RX52 N. Y.)

Spain

"Radio Malaga," in the 20-meter amateur band, transmits war news in Spanish between 7 and 9 pm, and sometimes even later. The frequency is 14440 kcs. (Velasco)

EAR, now announcing as "The Voice of Republican Spain," broadcasts on 9480 kcs from 7:30 to 8 pm, and from 8:30 to 9 pm. (RX51 Mass., RX100 Ohio, RX105 Ohio)

Sweden

A letter from the Swedish short-wave station includes full information on the three stations they operate. The transmitter at Motala uses two frequencies, SBO on 6065 and SBP on 11705 kcs, and the station at Stockholm, SM5SX, employs 15155 kcs. Five hundred watts power is used on all frequencies, but the operators expect to increase the power soon, and to put directional aerials into use. Their programs close with the Swedish national anthem. The address to which reports should be sent is Telegrafverket Tjanstebrev Nr. 5, Stockholm.

Switzerland

The League of Nations station, HBO on 11402 kcs, now broadcasts on Sundays from 7 to 7:45 pm, EST. This program is for North America. (RX73 Ohio, RX93 N. Y.)

U. S. S. R.

RKI on 7520 kcs, Moscow, broadcasts news and music daily from 7 to 9 pm. (RX100 Ohio) The Russian

stations send attractively illustrated magazines to most of those who report to them.

A strange Russian station has been heard on 6035 kcs, and it is not RV59 at Moscow. It broadcasts the same programs as RAN on 9595 and RNE on 12000 kcs, but it announces as "Radio Moscow" in lieu of call letters. (RX37 D. C.)

United States

W2XGB at Hicksville, N. Y., broadcasts on frequencies of 8655 and 17310 kcs, in the afternoons until 5 o'clock, and conducts tests with W9XDH at Elgin, Ill. (RX37 D. C.)

W9XDH at Elgin, Ill., employs the frequency of 12862.5 kcs. The address of both these stations is Press Wireless, Inc., Box 296, Hicksville, N. Y. Verifications are printed on a photograph of the station, and they also send a picture of the control room. (RX37 D. C., RX51 Mass., RX73 Ohio, RX101 Mass., RX109 Tex.)

W2XE has made a change in its schedule. It is now broadcasting as follows:

6120 kcs, daily 11 pm to midnight
11830 kcs, daily 6:30 to 11 pm.
15370 kcs, weekdays from 1 to 6 pm, and on Saturdays and Sundays from 2:30 to 6 pm.
21520 kcs, weekdays from 7:30 to 10 am, and on Saturdays and Sundays from 8 to 10 pm.

Some strange stations have been heard, and information concerning them is requested. They are KTGR1, KTGR2, WAMC, WWMA and WYYA. (RX33 Kans.)

Venezuela

The Caracas city police station, YV5PC, works on 2466 kcs, and is owned by the Federal District Government. This station transmits at regular times during the day, as follows:

12:30 am to 6:30 am, general calls to all branches of the police department.

6:45 am, reading of the day's program.

7:00 am, unclaimed letters and telegrams.

11:00 am, news.

12:30 pm, general call to all branches.

4:30 pm, news.

6:30 pm, general call to all branches.

Station signals are given every fifteen minutes, and police announcements every half hour. The news broadcasts include news of all the police departments and from the head office. Local events are also broadcast, as well as stories of the activities of the Office of Investigation of the Criminological Section. (RX108 Calif.)

Apex

Cleveland's ultra high frequency broadcasting station is now on the air on Wednesdays, from noon until midnight. It is W8XNT, on 38600 kcs; programs of WHK are relayed. (RX85 Ohio)

Ships

The S. S. Normandie, FNSK, was heard broadcasting a program to Rocky Point. The frequency of 13210 kcs was used, and at the time of the broadcast it was announced that the liner was 750 miles out to sea, en route to Rio de Janeiro. (RX107 Maine)

The Reporters

RX21—Anthony C. Tarr, Seattle, Wash.
RX22—Jack Siringer, Lakewood, Ohio
RX25—George Nahas, Brooklyn, N. Y.
RX33—Carl Martin, Atchison, Kans.
RX37—David Hill, Washington, D. C.
RX42—Stanley LaRue, Beverly Hills, Calif.
RX51—Gilbert Harris, North Adams, Mass.



Looking fresh as a daisy is Vivian Fridell, who is Mary Noble in "Backstage Wife," and it all seems very appropriate with the coming of spring. She has played the leading part in this show since it started two years ago. "Backstage Wife" is broadcast at 11:15 am EDST on Mondays through Fridays over the Red network.

RX52—Samuel A. Meyer, Jr., Rochester, N. Y.
RX73—Helen Lind, Lakewood, Ohio
RX85—J. E. Gardner, Cleveland, Ohio
RX86—Matthew Lashner, Lawrence, Mass.
RX91—Ralph Heath, Peninsula, Ohio
RX93—E. Leisering, Jr., Brooklyn, N. Y.
RX98—E. N. Massey, Sweetwater, Tenn.
RX99—Ed. Hirsch, St. Albans, N. Y.
RX100—Eleanor O'Neill, Cleveland, Ohio
RX101—Robt. Kingsbury, Orange, Mass.
RX105—John Ziegler, Shaker Heights, Ohio
RX107—Philip Craig, Waterville, Maine
RX108—Douglas E. Manke, Oakland, Calif.

- RX109—Pat Webb, San Antonio, Texas
RX110—Walter Th. Kammann, Caracas, Venezuela
RX112—Geo. Kline, Jr., Williamsport, Pa.

The Stamp Corner

● ● ● By David Brockton Browne

FOREMOST in the philatelic news this month is the announcement by Postmaster General James A. Farley of a complete revision of designs on the regular issue of *United States* postage stamps effective during the present calendar year. The present series, which will be replaced, has been in use since 1922-23.

The portraits of all deceased Presidents of the United States are to be presented in the new series. Twelve presidents, never before honored by postal issues are included. They are Presidents John Adams, John Quincy Adams, Martin Van Buren, William Henry Harrison, John Tyler, James Polk, Millard Fillmore, Franklin Pierce, James Buchanan, Andrew Johnson, Chester A. Arthur, and Calvin Coolidge.

In addition to the portraits of the presidents, two other well-known Americans are to appear in the series, namely, Benjamin Franklin, father of our nation's postal system, and Martha Washington, wife of the first president.

Six new values, not now in use, will be issued to fill existing regular postal needs. They are 4½c, 16c, 18c, 19c, 21c, and 24c. No definite date nor location of issuance has been announced, at this writing, but we presume that the series will commence about the middle of May, with Washington, D. C., the favored first day city. The stamps will be released in installments, a few each month until completed. Further information will be in-

cluded in future issues of RADEX as soon as official announcements are made.

There are 31 stamps scheduled in the series, and it will be noted that the presidents appear chronologically in order of their term of office. A complete list of denominations and corresponding portraits follows.

½c Franklin, 1c Washington, 1½c Martha Washington, 2c John Adams, 3c Jefferson, 4c Madison, 4½c Monroe, 5c John Quincy Adams, 6c Jackson, 7c Van Buren, 8c William Henry Harrison, 9c Tyler, 10c Polk, 11c Taylor, 12c Fillmore, 13c Pierce, 14c Buchanan, 15c Lincoln, 16c Johnson, 17c Grant, 18c Hayes, 19c Garfield, 20c Arthur, 21c Cleveland, 24c Benjamin Harrison, 25c McKinley, 30c Theodore Roosevelt, 50c Taft, \$1 Wilson, \$2 Harding, and \$5 Coolidge.

At least two commemoratives are scheduled to appear during the early summer. The 150th anniversary of the ratification of the Constitution will be memorialized on June 21, while the long awaited Delaware Tercentenary stamp is unofficially announced for either June 27 or 29. The denominations will probably be 3c in each case. First day of issue cities are tentative as yet.

Foreign New Issues

Following the example of other British colonies, *British Guiana* has replaced the King George V postal issues with a pictorial series for the reign of King George VI. They are: 1c green (ploughing rice), 2c slate purple (Kaieteur Falls), 4c black and rose (map of South America), 6c deep ultramarine (shooting fish), 24c deep green (sugar cane punts), 48c orange yellow (forest road), 60c brown (log rolling), 96c purple brown (Sir Walter Raleigh) and \$1.00 purple (Botanical Gardens).

Postage and airmail sets of

Italian East Africa have replaced the former individual issues of *Ethiopia*, *Eritrea*, and *Italian Somaliland*, which have been merged in this recently established geographical division, 20 different values comprise the regular postage set while 13 stamps have been issued for airmail and air express service.

New Zealand recently brought forth a ½d. green stamp with a full face portrait of King George VI in full uniform. Other values in the dominion's new Georgian series are promised for the near future.

Japan has added a new stamp, of a denomination not used before, to the regular postage series. The value is 14 sen, red purple, and pictures a native shrine in the Flowery Kingdom.

Radio and Stamps

Continuing with our discussion of stamps that may be obtained to form a collection around the theme "Radio and Electricity," we journey first to Egypt, the land of the Pyramids where we add three stamps to our collection.

Honoring the International Communications Conference, which met in Cairo, in January, 1938 a set of three values; 5 M red brown, 15 M dull purple, and 20 M bright blue, were issued. The same design is used on each stamp and shows a wireless mast and aerials, telegraph wires, and the ever popular pyramids and Sphinx.

Australia joins our growing list with two stamps released in 1936 in commemoration of the linking of Australia and Tasmania by wireless telephone. The design portrays the Goddess Aphrodite symbolically joining the cables between Australia and Tasmania. Values are 2d red and 3d dark blue.

In support of a sanitarium for government telephone, telegraph, and postal employes, *Bulgaria* issued three semi-postal stamps in 1935, of 1 L chocolate and red

orange, 1 L emerald green and indigo, and 5 L red brown and indigo, denominations. A view of the sanitarium forms the central portion of each stamp with wireless towers and telegraph masts used in panels on each side.

Commemorating the 250th anniversary of the death of the famous inventor, Otto von Guericke, *Germany* issued a single 6 pf. stamp, dark green, in 1936 with the inventor's portrait. von Guericke (1602-1686) is remembered as the inventor of the first electric machine, as well as for his origination of the air-pump.

Next month "The Stamp Corner" will continue discussing stamps related to radio, electricity, and wireless. In the meantime, if you have any problems, questions, or suggestions regarding stamp or cover collecting be sure and send them to your Stamp Editor in care of RADEX, who is always glad to be of service to RADEX large family of readers. Good luck!

Across the EDITOR'S Desk

THERE are only three Special DX Programs to list this month. The most important of the three is the one arranged by station 3AK of Maribyrnong, Australia. 3AK will broadcast on April 24, from 6:45 to 7:30 am, EST, on a frequency of 1500 kilocycles, with 250 watts power. Reports will be verified by Mr. G. D. Hutchins of 10 Ordnance Quarters, Maribyrnong, W3, Vic., Australia. This program will be dedicated to members of the International DXer's Alliance, and the Canadian DX Relay.

The Before Breakfast DX Club of Beverly Hills, Calif., has arranged with KIDO of Boise, Idaho, to transmit a series of special programs.

These broadcasts will be heard on a frequency of 1350 kcs. from 2 until 3 am, EST, on the mornings of May 1, June 5, July 3 and August 7.

The Carlsbad, N. Mex., station, KLAH on 1210 kcs., broadcasts on the first Tuesday of every month, at 5am, EST, and on the second Tuesday of every month, at 5:10 am, EST.

Vertical Aerials Again

The vertical aerial described in RADEX for February, 1938, brings amusement to one of our readers, in addition to the good reception it affords. He states it has attracted so much attention that passers-by generally look up at the "queer contraption," erected on top of his two-story house, and become so engrossed in studying it that many of them wander off the sidewalk and into various kinds of trouble. For example, one man was looking up at the aerial and, unmindful of his direction, almost swallowed his pipe against a telephone pole, and a fair damsel walked into a puddle of water before realizing that she was wandering from the straight and narrow path.

In building this aerial, the reader, Arthur Armstrong, 55 Beacon Court, Brooklyn, N. Y., changed the specifications a little. He purchased four poles, sixteen feet long and 1½ inches square, and banded them together with metal bands one inch wide. He also put small eyelets up and down the inside of the poles to keep the wires taut and to prevent them from "humming" in the wind.

Writing Letters

We wonder if you have ever written a letter to someone you heard on the radio and enjoyed. We know it must be disappointing to an entertainer or a speaker to call at the station for his mail, and to find only a few letters from his listeners, when he knows, and the station

knows, that he has done a fine and entertaining broadcast. Most of those who speak over the radio have no visible audience, so the only response to their efforts is the letters they receive from listeners.

As an entertainer's popularity is measured by his "fan mail," his listeners should write to the stations if they wish to insure the continuance of the broadcasts. Many fine programs have been allowed to drop because of the failure of listeners to respond.

Empire Broadcasting

The Empire Broadcasting Service from Daventry is now over five years old, and the British Broadcasting Corporation has just issued some comparative statistics showing the growth of the service from December, 1932, to December, 1937.

In 1932 there were only two transmitters in use, operating on four frequencies, and now there are six transmitters which work on sixteen frequencies. During these five years the staff of the Empire department has grown from five persons to sixty-five, and the broadcasting hours have been increased from ten hours per day to approximately eighteen hours per day.

Although broadcasting is now nearly thirty years old, the greatest strides, especially on the short-waves, have been made in the past five years. Previous to 1932, short-wave broadcasting was purely experimental. In 1938 we are tempted to say that the art is "perfected," although it is still far from perfect.

Ancient History

It seems logical to assume that in the next five years we shall find facsimile in rather general use, television will have come out into the open, and there will be less interference between stations, on the shortwaves as well as on the broadcast band. This writer refuses to prognosticate further than this, however, because the possibilities for

improvement and extension of service are unlimited. We prefer to delve into some ancient history and find out just how long we have been in arriving at our present state of perfection.

Radio as we know it is now 41 years old. It was in 1887 that Prof. Hertz discovered "invisible light beams" and transmitted impulses through the ether. The beams were so unsteady, though, that they were suitable only for transmission of code signals.

Following his invention of the three element vacuum tube, Dr. Lee De Forest first conceived the idea of broadcasting the sound of the human voice, and in 1908 he built several transmitters to be used by the United States Navy.

The first record we have of music being broadcast was in 1909, when the transmitter on board the flagship of Admiral Evans' round the world fleet was used to broadcast music to the other ships in the fleet.

The first broadcasting station was built by Dr. De Forest and installed on top of the Terminal Building in New York City, and the first broadcasts from this location occurred in the month of January, in 1910. Some of the stars who were heard over this station were Enrico Caruso, Mme. Mazarin and Emmy Destinn, of the Metropolitan Opera Company.

Vaughan De Leath, whom many of our readers still remember, broadcast for Dr. De Forest even before the memorable Caruso broadcast of January 13.

The oldest DXer on record is a Mr. Davis, who listened to the first Vaughan De Leath program when he was stationed at the Brooklyn Navy Yard. Mr. Davis later became affiliated with the Tropical Radio Corporation of Boston, Mass., operators of commercial radio stations throughout the Central and South

America. If he is still DXing, he is the oldest DXer in the world.

Down in Wellington, New Zealand, there is a man by the name of A. P. Morrison who has been tuning continuously for 21 years, no doubt the world's record for steady DXing.

If any of our readers can add to this sketchy history of early DXing we shall appreciate it greatly. We shall be particularly interested in knowing who was the first to verify reception of a broadcast.

As the LATINS Dance

● ● ● By Samuel A. Meyer

THE rhythm of some of the dances heard from Latin-American stations sounds strange to our swing-strained ears, and although the tunes seem to invite us to dance, our feet, well enough educated in the Suzie-Q and the shag, do not seem to be able to execute a pattern suitable to the rhythm of the criolla, the conga or the yaravi. Nevertheless, the music is enchanting and, if we know the names of the dances enjoyed below the Rio Grande, we can at least use this knowledge to advantage when making out reception reports for the stations.

It is not easy to make out a report for a Spanish-speaking station if one does not know the names of the selections played. It is possible, however, if one listens carefully to the announcements, to hear the name of the type of selection to follow, and this information is acceptable to those who have the task of checking transmission logs against reports. For example, an announcer might say ". . . ahora, tenemos mucho gusto en tocarles el huapango 'El Caballo Palomo.'" The word "huapango," if familiar to the listener, would stand out well



Tim and Irene, comedy team, are in the line-up of the new NBC network show, "Royal Crown Review," that is heard on Fridays at 9 pm, EDST. Others in the cast include George Olsen and his orchestra, Fredda Gibson as soloist, the Golden Gate Quartette, and the veteran Graham McNamee as master of ceremonies.

enough for him to be able to state that a huapango had been played at that time.

The Spanish word for a song is a "cancion," and a march is a "marzo." Fox trots are usually called "fox," a waltz is a "vals," and a dance is a "baile."

Two types of dances that are frequently heard are really Spanish. These are the Castillian fandango, and the habanera, which actually originated in Havana, Cuba. The Argentine tango and the Cuban rumba are now nearly universal, but the other dances mentioned in this review are practically unknown outside their countries of origin.

The names of some typical selections, available on phonograph records, are given in parentheses, in the compilation following.

Cuba

Son ("Suavecito")

Bolero Son ("Adela")
 Pregon ("El Manicero")
 Rumba ("Cachita")
 Conga ("Alegre Conga")
 Punto
 Danzon
 Danzonete

Puerto Rico

Bolero ("Capullito de Aleli")

Mexico

Corrido ("La Cucaracha")
 Huapango ("El Caballo Palomo")
 Son Huasteco ("Cielito Lindo Huasteco")

Paso Doble ("Valencia")

Colombia

Pasillo ("Verdes son Tus Ojos")

Bambuco ("A Orillas del Magdalena")

Ecuador

Yaravi ("Cayambe")

Sanjuanito ("Al pie del Capuli")

Fox Incaico ("Recuerdos del Chimborazo")

Pasacalle ("Cholita Linda")

Pasillo ("Oyeme")

Peru

Yaravi

Huaino

Marinera

Tondero

Bolivia

Cueca

Zamacueca

Chile

Tonada

Argentina

Tango ("Adios Muchachos")

Ranchera

Brazil

Zamba

Venezuela

Joropo ("Aragueno") (usually sung by two male singers).

Jota

A license has been granted for a new station for Bayamo, Cuba. It will be CMKL, on 990 kcs.

Universal DX

Club Corner

● ● ● By "Pooky"



BEFORE presenting this month's prize-winning letter, "Pooky" would like to take this opportunity to offer a word of commendation to the West Coast hams who, as usual in time of emergency, offered their time and equipment to the flood sufferers in the Los Angeles area during the recent catastrophe. "Pooky" himself heard one dramatic incident while listening on 75-meter 'phone early one morning. A ham in Oregon had a wife and three children, not to mention a valuable house, on the banks of a swollen river in Los Angeles. He had tried unsuccessfully to reach them by telephone and telegraph and finally, in desperation, turned to his ham transmitter of rather modest power. A "CQ" brought an answer from a kilowatt 'phone in Pendleton, Oregon. In a choked voice, he outlined his plight. "Don't worry", came the reassuring response, and a call was sent to the Los Angeles area where contact was made with another ham on the outskirts of the city. This operator had no telephone, and he had been out in the flood all day long and received a thorough soaking. Nothing daunted, he contacted another station in the Los Angeles area. Practically the entire West Coast waited with bated breath for word of the isolated family. Finally came the voice calling

the anxious husband and father: "Your wife reports she and the children are all well, and she has received ten telephone calls in the past fifteen minutes from SWL's who have been listening to this conversation!"

This month's prize letter comes from Paul M. Dillingham, Box 76, Luseland, Saskatchewan. Paul writes: "I first began DX-ing in the late Spring of 1935. I had been messing around for a couple of winters and getting what I have since found out to be some good stuff which, by the way, I would like to get now. At that time, Charles Hesterman was writing some notes in the Saskatoon *Daily Star*, giving tips on stations to look for. Well, I started chasing them and I got results, logging stations in Argentina, Australia, China, Japan, and New Zealand, just as he said would be done. Mind you, I did not know a thing at that time about the hobby of writing for veries, so when I was getting these catches I made no reports, and the worst of it is that since then I have had very poor success with that class of reception. LR-5 is one of the best that I now have, and I will never forget that broadcast of the Lincoln Marriage on Feb. 12, 1935. I have a veri for that—their big diploma. No doubt there are lots of them, but no one thinks more of it than I do. But nowadays I sit at the dials for hours with no results. However, some day those DX stations will come back, and when they do I will be there ready for them."

That's the spirit, Paul! This is a game requiring patience, and plenty of it. We know you'll succeed some day, and here's wishing you the best of luck!

Now, RADEX-ers, that's just a sample of the many subjects you can choose from. So sit down now and write your letter, and if it's printed you will be awarded one of the prizes listed in the last September RADEX.

DX Forum

(Continued from page 13)

times slides down to 910. Its power is given as 400 watts in the New Zealand Radio Call Book, but we in Fiji were always under the impression that the power was 500 watts. It is operated by the Fiji Broadcasting Co., which also owns VPD2 on 9.54 megs. The company is affiliated with the A.W.A. of Australasia. ZJV's operating hours are 6 to 9 a.m., GMT.

"If you would like a picture of the studio building, I'll take a snap next time I'm through there. My ship travels around New Zealand, Australia, the Pacific Islands, and the West Coast of North America."

RADEX would indeed be pleased to have a picture of ZJV and is indebted to Junior Engineer Stackhouse for his kind offer. And that is an idea for other RADEXers who happen near stations in any part of the world.

The shortwave lists will be completed in the June issue. A few stations, taken from the June installment of the lists, are shown below:

11718	CR7BH	Lourenco Marques, Port. East Africa. 200 w. (B). Add: Grenio dos Radiofilos da Colonia de Mocambique. Caixa 594. Hrs: Sun. 5:30-7 a.m. Other days 4:30-6:30 a.m.
11810	2RO4	Rome, Italy. 25 kw. (B). "Radio Roma-Napoli." Ann: usually by lady. s/o: two nat'l anthems, "Giovinezza" and "Marchia Reale." Add: EIAR, Via Montello 5. Hrs: 5 a.m.-12:20 p.m.
12000	RNE	Moscow, U.S.S.R. 20 kw. (B). Programs in Czech, Dutch, Eng, Fr, Ger, Hungarian, Ru, Sp, Swedish. Int: Kremlin chimes on even hours s/o: "Internationale." Add: Solhanka 12.
12862	W9XDH	Elgin, Ill. (Ex). Press Wireless, Inc.
12870	VVS	Mingaladon, Burma. 1500 w. (C). Add: Mingaladon Radio, 15th Mile, Prome Road, near Rangoon.



Richard Himer, dance band maestro, co-stars with Lou Holtz, Ted Husing, Kay Thompson and her trio, and Agnes Moorehead, in the new variety program "The Monday Night Show," heard over the CBS at 8 pm on Mondays.

Radio in Guiana Jungle

RADIO may be old stuff in the United States, but the citizens in the interior of British Guiana still do not understand it, according to Orison Hungerford, operator of the Terry-Holden Expedition station VP3THE, who relayed a series of programs from the tropical jungle to the National Broadcasting Company networks.

"Our camp was some 600 miles up the Essequibo and Rupahuni rivers," said Hungerford on his arrival in New York City yesterday, "and after we set up the radio shack we began to receive visitors. For a couple of weeks the most faithful of these were a group of Wai-wai Indians, who came to inspect the radio equipment and everything else we had. These Indians, who came decked out in their finest paints, must be the

most curious people in the world. They didn't steal anything, but they did inspect everything around the radio shack. If there was something they didn't understand they'd simply break out in loud laughter. It took radio to make them serious.

"The ringleader of these Wai-wai Indians was a tall, handsome fellow. One night when we were working and our visitors were all gathered around I put the earphones on this fellow's head. Blank amazement. His eyes moved first to left, then to right. I took the phones off a minute and he still stood there. All this time there was never a word except those he heard through the earphones. He gave one final look around the shack and then turned on his heel and walked out. All the rest followed in silence. And that was the last we saw of our Wai-wai friends. They're probably walking yet.

"Then there was a little girl who came with her mother. She listened to the strange noises coming out of our receiver while we were talking to NBC in New York. She looked first under the table, then up at the ceiling to find out where the voice was coming from. Then she went outside and looked up at the roof. All of a sudden there was a loud wail. The only way we could stop her was to let her manipulate the dials. It finally dawned on her that the voice was coming out of the radio apparatus."

The greatest curse of tropical radio, according to Hungerford, was the insect. The nightly yield of electrocuted bugs averaged one quart. "A bee short-circuited a switch one night and almost put me off the air," he said. "On another occasion a particularly vicious wasp hit me in the side. My yell was probably heard coast-to-coast from the depths of the Guiana jungle.

"Probably no one knows how close we came to not keeping our date for

a New Year's broadcast. The motor driving our generator stopped just before we were due to go on the air. It was raining as it rains only in the tropics. So we rushed out to fix it, dressed only in pajamas. Of course we were soaked, but we kept our date with the NBC audience. This was at night, when it gets cold even in the jungle. Neil MacMillan, my fellow operator, took the microphone. He was shivering from the cold, so I dug my fingers into his shoulder to keep him from knocking the microphone off the table. And all this time he was talking about 120 degrees in the shade."

Disaster nearly ended the pair's jungle adventure, however, when food began to spoil and supplies ran low.

Early in the year Hungerford and MacMillan were already on short rations and in February they set out for Georgetown, getting such food as they could on the way—a can of milk here, turtle eggs on the banks of the Essequibo and a bit of flour from such white men as they encountered. They were always conscious of the fact that another explorer had died only 150 miles from Georgetown under similar circumstances. When they reached an outpost of the colonial police Hungerford declared the building looked like the Waldorf-Astoria and the Ritz rolled into one.

Transmission conditions, he added, were excellent, and he even had a long conversation with the MacGregor Expedition in Greenland, another of the NBC expedition program sources. Although he spent some seven months, including 158 days in the interior of British Guiana, and suffered from hunger and bad food, the young engineer is ready for another such trip. In fact, he has one planned down to the last ounce of salt.

Scanning the AMATEUR BANDS

● ● ● By B. L. Ahman, Jr.

For some good reason, the 20-meter band has decided to play "good boy" at last. Real DX is the order of the day now. For instance, one night's dialing brought in VR6AY (ex VR6A), operated by Andrew Young, on Pitcairn Island, in the South Pacific. According to Alfred Razzando of Fayette City, Pa., Mr. Young requests SWL's to enclose New Zealand postage when sending for verification cards.

VR6AY is on the high-frequency side of the band, and comes in, in the east, with an R9, QSA5 signal, any time after 8:30 p.m., and continuing until the wee small hours. Other reports on VR6A and VR6AY were received from Edward R. Danielson and Jack Welsh.

On the same night that we heard VR6AY, we also logged OZ9Q (LF), at R9, QSA5, between 8:15 and 11 p.m.; GI5QX (LF); EI6G (LF) and YR5AA (LF). Many English and French stations were heard as well, but the few aforementioned were the prizes.

EA8AF was heard reading war news slowly with an R9 signal. This station is a Rueda Del Oeste member, so if you are a member you will get a QSL for your reports.

From G. L. Harris of North Adams, Mass., we have a report on a new Nicaraguan amateur. It is YN3DG, owned by Dennis Gallo, Leon, Nicaragua. It is reported after 10 p.m., with an R5 to 7 signal. Potential verification possibilities are not known.

Alan I. Breen of Dunedin, New Zealand, advises us that four stations have been licensed to operate 20 meter 'phone in New Zealand. They are ZL1KJ in Auckland, ZL2BI in Wellington, and ZL4FK and

ZL4FW, both in Dunedin. These stations work in the American 'phone band, and all employ 100 watts power. Transmission hours are limited to the hours of midnight until 7 a.m., local time, which will be, during our summer months, from 7:30 a.m. until 2:30 p.m.

ZL1KJ came on the air on 'phone on December 11, 1937, and worked all continents within six hours. For his first 42 hours of operating, he received 157 reports from Australia, so now he is beginning to wonder what his American mail will be like when it comes in.

Jack Siringer of Lakewood, Ohio, has heard ZL2BI, near 7 a.m. EST.

Mr. Breen of Dunedin also reports VK4HN at Port Moresby, Papua, which is heard on the high frequency side of the American band.

An amusing conversation was recently heard from Havana. One CO-station was talking to a W-, and stated that he was on 14084 kcs, but his crystal was cut for 14120 kcs. Otherwise, he thought he was doing all right. What difference do a few kilocycles make, anyway?

For our overseas readers, here is a news tip furnished by E. R. Sherman, Jr., No. Attleboro, Mass. He says that W4OC of Durham, N. C., is definitely set against SWL's. So, save your IRC's and send them to the other W- stations.

Addresses

We list below the call letters, the frequency and the address when known of every amateur station mentioned in these columns. Addresses will not be repeated, however, so readers are urged to keep these columns for future reference.

(The letters LF, MF and HF in parentheses following the call letters of stations mentioned in this column indicate the Low Frequency, Middle Frequency and High Frequency portions of the 20 meter amateur band. Low Frequency stations are those on frequencies between 14,000 and 14,100. Middle Frequencies are from 14,100 through 14,300. High

Frequencies are from 14.300 through 14.400. No attempt is made to show exact frequencies as they vary so greatly).

ARSVP was incorrectly listed last month as FR8VP. The correct address is ARSVP, Rene Fritsch, i/c Communications T-4 Station, Box 107, via Homs, Syria.

EI6G, Charles McCarthy, St. Clare's Ave., Cork, Eire. (LF).

GI5QX, J. N. Smith, Ben Venuto, Hawthornden Drive, Belmont, Belfast, Northern Ireland. (LF).

HB9BL, W. Steinmann, Hegfeldstrasse 49, Oberwinterthur, Switzerland.

VK4HN, H. G. Nicholson, Paga Hill, Port Moresby, Papua, (H.F.).

VR6AY, Andrew Young, Pitcairn Island. (HF).

YN3DG, Dennis Gallo, Leon, Nicaragua. (HF).

YR5AA, Ing. Paul Popescu Maleesti, Str. Carol Davila, 89, Bucharest, Roumania. (LF).

ZL1KJ, R. S. Harvey, 9 Pah Ave., Epsom, Auckland, S3, New Zealand.

ZL2BL, C. G. Liddell, 16 Lerwick Terrace, Lyall Bay, Wellington, E3, New Zealand.

ZL4FK, Dr. R. B. Dodds, 110 St. David St., Dunedin, New Zealand.

ZL4FW, R. D. Phillips, 60 Royal Terrace, Dunedin, New Zealand.

Amateur

CALLS HEARD

The names and addresses of persons reporting stations shown in this list are indicated by small letters following the call signs. Key to the small letters is given at the end of the column.

Canadian and United States calls heard are listed here only when reported by listeners not resident in North America. Cuban calls are not listed when heard by listeners

in United States or Cuba.

28 Megacycles—Ten Meters
Heard by (w): EI9D; G6DH.

Heard by (z): CN8AV; G-: 2ZV; 5BM; 5LJ; 6AG; 6BW; 6CO; 6GX; 6WU; 8GX; 8SA; H17G; K4FAY; K6MUV; LU4EL; ON4FE; ON4PA; VP6YB; VP9R; TV5AA; YV5AK.

14 Megacycles—Twenty Meters

A-C

AC3KX (t); AR8VP (gm); CE-: 2BR (a); 3AA (f); 3BH (p); 3DW (a); CN-: 2UA (t); 8AI (u); 8AJ (x); 8AN (o); 8AV (afmuz); 8MA (g); 8MU (mt); CO-: 2EG (x); 2GL (x); 2JJ (x); 2JV (x); 2KL (x); 2LH (x); 2MT (x); 2PG (x); 2RA (x); 2RC (x); 2RH (x); 2WZ (x); 5EO (x); 6OM (x); 7BC (x); 7CJ (x); 7CX (gx); 7UP (g); 8BC (x); 8JK (x); 8RQ (x); 8YB (x); CT-: 1AY (o); 1EA (t); 1GQ (fgotw); 1JW (u); 1QH (g); CX2AK (df); CX2AU (g).

F-F

EA3SI (g); EA9AH (dot); EI-: 2L (f); 3J (fos); 6G (u); 8M (uw); ES1E (r); ESSD (jtu); FA-: 3HC (p); 8BT (g); 8HC (w); F-: 3CT (t); 3DN (t); 3DO (t); 3DR (p); 3GR (jlmor); 3HL (ot); 3HM (dymo); 3KH (fm); 3LW (hu); 3LX (o); 3MF (m); 8BT (s); 8DC (st); 8DL (os); 8GF (t); 8GR (fx); 8KI (hou); 8QD (hgotw); 8UE (mo); 8WE (m); 8XL (t); 8XN (hot); 8ZF (t).

G

GI-: 2CC (dgotu); 2CP (t); 5QX (gou); GM-: 2DI (u); 2UU (fjmoru); 3BD (g); 5MW (ou); 5ST (u); 6RV (f); 6WD (fhp); 8RJ (hu); GW6JW (u); GW8CT (m); G-: 2AI (fhmot); 2AK (or); 2AV (p); 2CU (o); 2DV (o); 2EL (r); 2FC (f); 2HV (s); 2MF (f); 2OT (n); 2PL (or); 2PR (o); 2PU (jot); 2RX (o); 2TR (hs); 2TU (i); 2UT (jmos); 2VB (t); 2VT (h); 2VY (o); 2XV (mor); 2XY (ao); 2ZU (m); 2ZV (f); 3DO (u); 5BJ (hx); 5BM (t); 5DR (m); 5DT (fo); 5GB (t); 5GL (l); 5JO (hu); 5KH (adh); 5KV (r); 5LU (fhox); 5ML (adhfox); 5NA (o); 5NI (htx); 5OV (j); 5PP (dot); 5QN (hjmotx); 5RV (hmo); 5TP (h); 5TZ (f); 5WH (ah); 5XT (o); 5YV (hmo); 5ZG (jort); 5ZJ (ow); 6AB (t); 6AG (dftwx); 6AZ (x); 6BL (d); 6BW (ghotx); 6BX (t); 6CL (ow); 6CZ (t); 6DD (f); 6DL (fho); 6DT (mot); 6DW (t); 6FJ (a); 6FS (m); 6GF (tx); 6GO (f); 6GW (t); 6HV (o); 6IA (tu); 6JF (fhotw); 6JL (s); 6JQ (gt); 6KL (fmo); 6LA (dt); 6LJ (d); 6LK (adhjmot); 6LL (t); 6ML (hot); 6MR (t); 6NF (u); 6NJ (t); 6NL (h); 6NY (r); 6OA (t); 6RG (t); 6RX (t); 6SF (o); 6TZ (dt); 6UX (d); 6VK (h); 6VP (d); 6WX (dfhosx); 6WY (m); 6XR (dfhtw); 6YX (o); 8AU (f); 8BI (os); 8BS (o); 8BX (mo); 8IG (h); 8IT (w); 8KZ (m); 8MA (hmost); 8MF (uw); 8MI (o); 8MX (ou); 8OG (af); 8QH (m); 8SB (o); 8WV (f).

H

HB-: 9BG (h); 9BJ (o); 9BL (o); 9BR (h); HC-: 1FG (losz); 1JB (ahlmox); 1JW (owu); IHL-: 2B (ahlx); 2LD (w); 2PB (u); 2X (au); 4AS (af); 5PA (ahotwxy); HI-: 2W (dfox); 3N (adhlowx); 3W (o); 4F (o); 5A (k); 5X (adhox); 7G (x); 7I (ao); 7L (d); 7N (a); HK-: 1BG (h); 1DG (dfx); 1GC (x);

1JC (x); 1JN (h); 1PA (a); 3ER (w);
3JA (alx); 3JB (k); 3LDC (ehlmuax);
5OBC (d); HP1A (d); HP1JB (k); HR5C
(uwa).

I-J-K

IITKM (w); J2NF (p); J2NS (g); KA-:
1ME (k); 1MG (k); 1ZL (k); 2OB (u);
K4-: DDH (jotux); EIL (o); EJJ (lpx);
EMG (u); ENT (aju); ENY (puax); EVC
(l); EXP (d); EXU (o); FAY (owxy);
SA (o); K6-: BJJ (k); BMC (k); BNR
(ajhklmvox); CMC (k); GAS (ahloA);
KGA (kyA); KMB (kmqx); KPS (k);
LKN (gh); MTE (hky); MUL (t); MXM
(akxA); MZK (uw); NZQ (deklq); OFW
(y); OJI (A); OQE (hkoqA); OQP (v);
PMB (h); YAL (u).

L-N

LA-: 1F (psu); 1G (u); 1L (m); 6N (j);
LU-: 1BA (k); 1DA (flax); 1DJ (dk);
1EA (k); 1HI (o); 1JC (f); 1QA (f);
2BG (do); 2DA (l); 2RX (v); 3AQ (f);
3EJ (f); 4BH (f); 4CZ (adf); 4DC (v);
4KA (f); 5CZ (v); 5JA (f); 7AG (l);
7BK (a); 8AB (x); 8DR (z); 9BV (dm);
9PA (u); Malaga (u); NY2AE (lz).

O-P

OA-: 4AF (a); 4AL (lov); 4R (afoz);
ON-: 4AZ (o); 4BG (jmo); 4BV (t);
4CC (m); 4MJ (mosu); 4MU (j); 4VK
(ow); OQ5AA (a); OZ9Q (u); PA-: OBE
(jo); OEO (mx); OMQ (hjmoruw);
OMZ (huA); OUN (pA); PY-: 1CK (dt);
1FR (a); 2AK (av); 2BA (u); 2JC (o);
3AK (a); 4BL (m); 5AQ (f).

S-T

SM-: 5SD (fru); 6WL (u); 7YA (hu);
SP1DC (p); SP2HH (u); SS3X (t); SU-:
1CH (aqtuw); 1KA (t); 1KG (tu); 1RD
(w); SV1KE (tuw); SV1NK (t); TG5
(u); TG9AA (d); TI-: 2AV (x); 2FG
(x); 2HD (a); 2HP (fmpz); 2HR (a);
2KP (t); 2RC (akx); 6G (p).

V

VE-: 1BE (k); 1DC (g); 1FG (k); 1FX
(k); 2CA (g); 2EE (g); 2KX (g); 3AHA
(g); 3CI (g); 3IX (g); 4MO (k); 4YO
(g); 5ABD (g); 5AM (g); 5APM (g);
5BF (g); 5CC (g); 5OT (g); VK-: 2ABD
(k); 2ACO (u); 2ADA (u); 2ADE (oy);
2ADT (m); 2AFO (g); 2AFQ (g); 2AGU
(m); 2AHA (i); 2AO (m); 2AS (u);
2BQ (mA); 2CE (g); 2CP (y); 2DK (A);
2GU (flmz); 2HF (koz); 2HJ (m); 2HV
(m); 2IL (x); 2JH (m); 2JU (agi); 2JV
(m); 2LZ (m); 2MX (u); 2NO (m); 2NY
(m); 2OQ (hu); 2RQ (p); 2UC (mo);
2UY (k); 2VC (o); 2VV (kA); 3BI (m);
3BZ (moq); 3DQ (x); 3GD (k); 3GG
(m); 3HJ (y); 3JR (s); 3KX (o); 3LA
(m); 3MX (fm); 3NG (f); NP (fiA);
3NT (ag); 3PL (i); 3PO (k); 3MC (k);
3TH (u); 3TR (f); 3WA (hkmou); 3WD
(m); 3XJ (kmoy); 3XP (i); 3ZB (m);
3ZL (mix); 3ZX (o); 3ZZ (agmq); 4EC
(mq); 4CG (tu); 4JU (m); 4X (iu);
4KL (u); 4VD (mq); 5CN (u); 5WD
(uA); VO-: 1A (w); 1C (w); 1DQ (z);
1I (o); 1P (o); 1R (A); 1T (x); 1X
(ow); 1Y (owx); 2N (x); 2Z (x); 3Z
(f); 4A (u); 6D (adflortux); 6J (fou);
VP-: 1BA (agu); 1DA (x); 2DA (au);
3XYZ (u); 4GA (adghuz); 4TH (u); 5PZ
(u); 6AR (o); 6FO (z); 6MR (adfoxz);
6TR (ahox); 6YB (owx); 7NA (uax); 9G
(uwax); 9L (uwa); 9R (uipix); VRIAN
(u); VR6A (bdmqu); VR8AY (puA);
VU2CQ (u).

W

1AVG, 1BNQ, 1IMP, 2HCW, 2IGE, 4EIS,
5FGP, 6LFD, 6MZD, 7AYD, 7BME,
8DSN, 8EXX, 8MRR, 9QAS, 9VSO (All
heard by g).
WIOXAB (adknowxA).

X-Y

XE-: 1BC (x); 1BT (d); 1F (k); 1FF
(dl); 1GK (kx); 1GS (k); 1H (z); 1S
(k); 2AC (k); 2BJ (dkl); 2CY (kx); 2F
(n); 2GS (k); 2HD (dfkx); 2HR (n);
2IY (ll); 2JK (k); 2SY (k); 3AR (z);
3BA (x); YI2BA (t); YN-: 1HS (u);
1OP (hA); 3DG (dA); YR5AA (u); YV-:
1AA (wz); 1AB (l); 1AC (o); 1AG (z);
1AP (ehmoyz); 1AQ (ahklotuwxyz); 4AA
(achlmaz); 4AB (acovz); 4AN (a); 4AO
(vwxz); 4AX (u); 5AB (ao); 5ABA (ox);
5ABF (ckovz); 5ABQ (aco); 5ABY
(acfhklopwxz); 5AD (ah); 5AG (jmo);
5AK (o); 5AM (c); 5AN (afx); 5AQ
(ak); 5AZ (acovxz).

Z

ZE1JR (uw); ZL2BI (u); ZP1LB (s);
ZP2AC (u); ZS-: 1AX (z); 1B (w); 2N
(z); 2X (ow); 3F (z); 5M (z); 6AA (l);
6AJ (hwz); 6S (u); ZT1R (u); ZU5J
(l); ZU5Z (z); ZU6AJ (x); ZU6P (z).

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3:50-4:05	WGAR	1450	Cleveland, Ohio
	WOLS	1200	Florence, S. C.
3:55-4:10	WCOL	1210	Columbus, Ohio
	WLAK	1310	Lakeland, Fla.
4:00-4:15	WCAZ	1070	Carthage, Ill.
	WQBC	1360	Vicksburg, Miss.
4:05-4:20	WJBO	1120	Baton Rouge, La.
	WSMK	1380	Dayton, Ohio
4:10-4:25	WOMT	1210	Manitowoc, Wis.
	WTAL	1310	Tallahassee, Fla.
4:15-4:30	WNEL	1290	San Juan, P. R.
	WOSU	570	Columbus, Ohio
4:20-4:35	WDZ	1020	Tuscola, Ill.
	WMSD	1420	Muscle Shoals, Ala.
4:25-4:40	WGTM	1310	Wilson, N. C.
	WHBU	1210	Anderson, Ind.
4:30-4:45	WJBW	1200	New Orleans, La.
	WKBN	570	Youngstown, Ohio
4:35-4:50	WGPC	1420	Albany, Ga.
	WNAD	1010	Norman, Okla.
	WXYZ	1240	Detroit, Mich.
4:40-4:55	KOVC	1500	Valley City, N. D.
	WTAX	1210	Springfield, Ill.
	WTJS	1310	Jackson, Tenn.
4:45-5:00	KLCN	1290	Blytheville, Ark.
	WMBR	1370	Jacksonville, Fla.
	WMPC	1200	Lapeer, Mich.
4:50-5:05	KGCA	1270	Decorah, Iowa
4:55-5:10	KOCA	1210	Kilgore, Texas
	KVOL	1310	Lafayette, La.
5:00-5:15	KBIN	1500	Muskogee, Okla.
	WBNO	1200	New Orleans, La.
5:05-5:20	KPAC	1260	Port Arthur, Tex.
5:10-5:25	KANS	1210	Wichita, Kans.
	WROL	1310	Knoxville, Tenn.
5:15-5:30	KMLB	1200	Monroe, La.
	KTRH	1290	Houston, Texas
5:20-5:35	KLPM	1240	Minot, N. D.
5:25-5:40	KVSO	1210	Ardmore, Okla.
5:30-5:45	KWLC	1270	Decorah, Iowa
5:35-5:50	KTSM	1310	El Paso, Texas
5:40-5:55	KWTN	1210	Watertown, S. D.
5:45-6:00	WLB	1250	Minneapolis, Minn.
5:50-6:05	KOBH	1370	Rapid City, S. D.
5:55-6:10	KPPA	1210	Helena, Mont.
6:00-6:15	KIT	1250	Yakima, Wash.
6:05-6:20	KGBU	900	Ketchikan, Alaska
6:10-6:25	KFJI	1210	Klamath Falls, Ore.
6:15-6:30	KGEZ	1310	Kalispell, Mont.
6:20-6:35	KGVO	1260	Missoula, Mont.
6:25-6:40	KGY	1210	Olympia, Wash.
6:30-6:45	KXRO	1310	Aberdeen, Wash.
6:35-6:50	KGCX	1450	Wolf Point, Mont.
6:40-6:55	KFIO	1120	Spokane, Wash.
6:45-7:00	KINY	1310	Juneau, Alaska
6:50-7:05	KFQD	780	Anchorage, Alaska
6:55-7:10	KRLC	1390	Lewiston, Idaho

The MONTH'S CHANGES in Station Data

NEW

600	XFOJ	Camaguey, Cuba.
1080	CMJQ	Zacatecas, Zac.
1230	XEAZ	Tijuana, B. Cts.
1320	XEAU	Denton, Tex.
1420	KDNT	Harwell V. Shepard Beaumont, Tex. Beaumont Brdstg. Assn.
1500	KPAB	Laredo, Tex. Mervel M. Valentine
	KVNU	Logan, Utah. Cache Valley Brdstg. Co.

FREQUENCY

1305	TGI	Guatemala City, Guat., from 1510
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LOCATION

620	WFLA	Tampa, Fla., from Clearwater
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NETWORK

900	KSEI	Pocatello, Idaho, new NBC
1210	WBAX	Wilkes Barre, Pa., new MBS
1240	KTFI	Twitu Falls, Idaho, new NBC

bers, until a permanent meeting place can be arranged. All DXers in the Cleveland area are invited to join. Call RADEX, Lakewood 8667, for further details.



Kay Thompson and her trio are featured on the new show known as "Monday Night Show," heard on the CBS on Mondays at 8 pm, EDST.

ELEVEN radio fans met at the home of Jack Siringer on April 3, and voted unanimously to form a radio club, to be known as the CLEVELAND RADIO CLUB. The following were elected temporary officers:

President, Herbert Tucker; Vice-President, Arthur J. Parfitt; Secretary, Jack Siringer.

The group decided to hold meetings on the first Sunday of every month, at the homes of various mem-

The SHORTWAVE STATIONS of the WORLD

Shortwave List Copyright 1938 by Page Taylor

In this index of the shortwave stations of the world, only stations which use voice are listed.

Frequencies are given in kilocycles per second. To change to megacycles, place a decimal point three digits to the left.

The studio locations are shown, and the location of the transmitter, when different from the studios, follows in parentheses.

Power is shown in watts, unless kilowatts (kw) is mentioned.

Following the power value, the symbols in parentheses indicate the type of station, as follows:

A—Airway	Em—Emergency
B—Broadcast	F—Forestry
C—Commercial	LH—Lighthouse
Phone	P—Police
CG—Coast Guard	R—Relay
E—Experimental	SS—Ship Phone

The word DRIFTS indicates that the

station is in the habit of shifting from its assigned frequency.

Abbreviations for identification aids are—Int. (Interval signal); s/o (sign-off); Ann (announcements); Add (Address); Hrs (Hours).

Du—Dutch	Jap—Japanese
Eng—English	Port—Portuguese
Fr—French	Ru—Russian
Ger—German	Sp—Spanish
It—Italian	

Unconfirmed stations, those under construction, and stations operating off their assigned frequencies, are given in *italics*.

***Asterisks indicate that the complete list of stations is given in another index.

All stations listed will verify for return postage unless otherwise noted. Return postage can be sent to foreign countries in the form of International Reply Coupons, available at any post office for nine cents each. (X) means the station will not verify.

3500 to 4000	AMATEURS		
4002 CT2AJ	Ponta Delgada, Azores (B)		
4098 WND	(X) Hialeah, Fla. 400. (C). Phones Bermuda.		
4107 HCJB	Quito, Ecuador. 1000. (B). "Broadcasting Provincial." Add: Clarence W. Jones, Casilla 691. Hrs: Daily exc. Mon., 7- 8:15 a.m.; 11:30 a.m.-2:30 p.m.; 4:45-10:15 p.m.		
4110 ****	Trans-Western Airlines		
4123 ****	Southern Airlines		
4135 KBAY	Ogden, Utah. (F)		
KBAZ	Ogden, Utah. (F)		
4178 WOO	(X) Ocean Gate, N. J. 20 kw. (SS)		(SS). Add: Furness-Bermuda Lines.
4230 HRX4	La Lima, Honduras. (C)		4413 British Ships. Work with GBC and WOO. Add: International Marine Radio, Conneaut House, 63 Aldwych, London WC2. GBZW S. S. "Beregnaria." GDJL S. S. "Homerie." GFVW S. S. "Majestic." GLRZ S. S. "Aquitania." GMBJ S. S. "Empire of Britain" French Ships. Work WOO. Add: French Lines, Pier 57, Hudson River, NYC. FNSM S. S. "Paris" FNTQ S. S. "De de France" German Ships. Work DAF and WOO. Add: North German Lloyd, Pier 42, North River, Morton St., NYC. DDBR S. S. "Berlin" DDCP S. S. "Cap Polonia" DDFF S. S. "Reliance" DDFT S. S. "Oceana" German Ships. Work DAF and WOO. Add: Hamburg America Lines, Pier 86, North River, W. 46th St., NYC. DHAO S. S. "Hansa" DHEY S. S. "Deutschland" DHJZ S. S. "Hamburg" DHRL S. S. "New York" German Ships. Add: North German Lloyd, Pier 4, Foot of 58th St., Brooklyn, N. Y. DOAH S. S. "Bremen" DOALS. S. "Europa" 4420 ZMBJ T. S. S. "Awatea." 300 w. (SS). Add: Union S. S. Co. of New Zealand, Ltd., Auckland. 4430 VQJP S. S. "Queen of Bermuda." (SS). Works WOO and ZFA. Add: Furness-Bermuda Lines. 4436 VDO Vancouver, B.C.400.(C).Add: North-West Telephone Co., 768 Seymour St.
4230	..... Italian Ships; Phone IAC and WOO; Add: Italian Lines, 1 State St., New York, N. Y. IBEJ S. S. "Conte Rosso" IBGI S. S. "Conte Verde" IBLI S. S. "Conte di Savoia" ICEJ S. S. "Rex"		
4295 WTDV	CharlotteAmalie, Virgin Islands. 250. (Em)		
WTDW	St. Croix, V. I. 250. (Em)		
WTDX	St. John, V. I. 250. (Em)		
4335 ****	United Airlines		
4355 VFN	Montreal, P. Q. (A). Dominion Skyways, Ltd.		
4390 FNSK	S. S. "Normandie." (SS). Works Paris. French Lines, Pier 88, Foot of 48th St., NYC.		
NAA	Arlington, Va. Time signals at 9:55 a.m. and 9:55 p.m.		
4410 FNSK	S. S. "Normandie." (SS). Works WOO. See 4390 kcs. for Add.		
WIEA	S. S. "Manhattan." 400. (SS). Add: Pier 59, North River, NYC.		
4412 VQJM	S. S. "Monarch of Bermuda."		

4465	CFA2	Drummondville, P. Q. (C). Canadian Marconi Co., Box 1690, Montreal, P. Q.	5000	TFL WWV	Reykjavik, Iceland Beltsville, Md. 1 kw. Standard frequency transmissions Tues., Wed., Fri., 2:30-3:30 p.m. Add: Nat'l Bureau of Standards, Washington, D. C.
4500	CZ5K	Shaboygama, P. Q. (A). Dominion Skyways, Ltd.			
4512	ZFS	Nassau, Bahamas. (C). Works WNC. Add: Supt. of Telegraphs, Central Bay St., Nassau, N. P.	5003	HICT	Guayaquil, Ecuador. (B). "Radio Telefonica"
4550	WDN	(X) Rocky Point, N. Y. (C)	5025	ZFA	(X) Hamilton, Bermuda. 1500 w. (C)
4600	HC2ET	(X) Guayaquil, Ecuador. (B). Int: 12 chimes.	5033	WDI	(X) Ocean Gate, N. J. 20 kw. (C)
4610	KBAI	Juneau, Alaska. (F)	5043	****	Braniff Airlines
	KBEN	Juneau, Alaska. (F)	5077	WCN	(X) Lawrenceville, N. J. (C)
	KBEO	Juneau, Alaska. (F)	5123	****	United Airlines
	KBEP	Juneau, Alaska. (F)	5138	KALY	Egavik, Alaska. 25 w. (C). R. B. Julian. Hrs: days
	KMYA	Patrol Boat "Forester." (F)			Utopia Creek, Aaa. 40 w. (C). L. McGee. Hrs: days
4650	****	Braniff Airlines		KAMX	Kalskag, Aaa. 20 w. (C). Fred H. Whiteher. Hrs: days
4690	****	American Airlines			Alatna, Aaa. 20 w. (C). Sam Dubin. Hrs: days
4736	HJ6ABC	Ibague, Colombia. (B)		KANR	Folger, Aaa. 40 w. (C). Odtin Strandberg.
4740	****	Southern Airlines	5165	****	Pan American Airways
4745	****	Southern Airlines			Pacific Alaska Airways
4753	WOO	(X) Ocean Gate, N. J. 20 kw. (SS)	5207	KAEW	Kabul, Afghanistan (C)
4755	CFU	Rosland, B. C. (C). Consolidated Mining & Smelting Co., Ltd.	5207	KAJJ	Umnak, Alaska. (C)
4760	HJ1ABJ	Santa Marta, Colombia. 50w. (B). "La Voz de Santa Marta." Owner: Julio A. Sanchez T. Hrs: 11:30 a.m.-2 p.m.; 5:30-10:30 p.m.		KAQP	Atka, Aaa. (C)
4780	HJ1ABB	Barranquilla, Colombia. 300w. (B). "La Voz de Barranq." Relays HJ1ABA. Int: 3 chimes. Add: Apto. 715	5310	****	Unalaska, Aaa. (C)
4787	HJ7ABC	Cucuta, Colombia. 250 w. (B). "La Voz de Cucuta."	5330	HLR6	Southern Airlines
4797	W9XAM	Elgin, Ill. Time signals at 8:55, 9:55 and 10:55 a.m. and 12:55 p.m. daily exc. Sunday.	5375	****	La Lima, Honduras. (C)
4800	HJ1ABE	Cartagena, Colombia. (B). Add: Apto. 31. Hrs: 7 a.m.-1:30 p.m.; 4-11 p.m.	5378	****	Pacific Alaska Airways
4810	YDE2	Solo, Java, N.E.I. 100 w. (B). A NITROM station.	5405	****	Pan American Airways
4820	GDW	Rugby, Gt. Britain. (C). Works NYCights Add: G.P.O. (Radio Section), Armour House, St. Martin's le Grand, London EC1	5415	PMY	Northwest Airlines
4840	HJ3ABD	Bogota, Colombia. (Barrio Olaya). 1 kw. (B). s/o: "Para ti Rio Rita." and nat'l anthem. Add: Colombia Broadcasting, Apto. 509. Hrs: 9 a.m.-2 p.m.; 6 p.m.-midnight.	5480	XTL	Pan American Airways
4860	CYS	Schumaker, Ont. (A). Dominion Skyways, Ltd.	5500	TJ6HH	Bandoeng, Java, N.E.I. 450 w. (B). Add: Bandoengsche Radio Vereeniging. Hrs: 5:30-10 a.m.
	CZ5K	Shaboygama, P. Q. (A). D.S.L.	5573	****	Hankow, China. (C)
	CZ5L	Mud Lake, Ont. (A). D.S.L.	5583	****	San Ramon, Costa Rica. 200 w.
	CZ5M	Rouyn, P. Q. (A). D.S.L.	5593	****	United Air Lines
	CZ2W	St. Felicien, P. Q. (A). D.S.L.	5603	****	United Airlines
	VOWM	Northwest River, Labrador. (A). Newfoundland Skyways, Ltd.	5613	****	United Airlines
4865	VDO	Vancouver, B. C. 400 w. (C). North-West Telephone Co., 768 Seymour St.	5632	****	American Airlines
4880	HJ4ABP	Medellin, Colombia. 2500 w. (B). "Emisora Philco." Relays HJ4ABQ. Hrs: 6-11 p.m.	5653	****	American Airlines
4900	HJ3ABH	Bogota, Colombia. 1200 w. (B). "La Voz de la Victor." s/o: "Russian Lullaby." Add: Almacenes Victor, Apto. 565. Hrs: 6-11 p.m.	5663	****	American Airlines
4918	****	American Airlines	5673	****	Southern Airlines
4938	****	Trans Western Airlines	5683	****	Trans Western Airlines
4948	****	Trans Western Airlines	5693	****	Braniff Airlines
4953	****	Trans Western Airlines	5708	****	Pacific Alaska Airways
4968	****	Trans Western Airlines	5710	TGS	Trans Western Airlines
4975	GBC	Rugby, Gt. Britain. 5 kw. (SS). Add: See GDW 4820 kes.	5730	JVV	Southern Airlines
			5730	JVV	Guatemala City, Guat. 200 w. (B)
			5730	JVV	Nazaki, Japan. 10kw. (C). Add: Kokusai Denwa Kaisha, Osaka Bldg., Tokyo
			5735	HC1PM	Quito, Ecuador. (B). "El Palomar" Add: J. Leonardo Ponce, Apto. 664. Hrs: Sat. 9-11 p.m.
			5755	YV2RA	San Cristobal, Venez. 1 kw. (B). "La Voz del Tachira" or "La Emisora de Fidelidad Real." Relays YV1RB. s/o: "El Capitan March." Add: Apto. 37. Hrs: 11:30 a.m.-12:30 p.m.; 5:45-9:30 p.m.
			5758	YNOP	Managua, Nicaragua. (B). "Radiodifusora Bayer." Hrs: 8-9:30 p.m. Unused USA stamps for verification.
			5770	TG25	Mobile in Guatemala. (C)
			5790	JVU	Nazaki, Japan. 10 kw. (C). Add: JVV on 5730 kes.
			5800	YV6RC	Caracas, Venez. 1 kw. (B). "Radio Caracas." Relays YV5RA. s/o: "March 1BC." Add: Apto. 2009. Hrs: Sun.,

		8:30-11:30 a.m.; 3:30-9:30 p.m. Weekdays, 6:30 a.m.-10:30 p.m.			
5815	TIGPHE	San Jose, Costa Rica			
5820	CEC	Santiago, Chile. (La Granja). Add: Cia. Internacional de Radio, Casilla 16-D.		5975	OAX4P Huancayo, Peru. 250 w. (B). "Radio Andina Junin." Add: J. Alberto Maduano, Cuzco 25.
5825	TIGPH and TINGP-3	San Jose, Costa Rica. (B). "Alma Tica." Add: Apto 800.		5997	CS2WD Lisbon, Portugal. (B). "Radio Renscena."
5830	TDD	Shinkio, Manchukuo. 20 kw. (C) Manchukuo Telephone & Tele- graph Co.		6000	CXA2 Montevideo, Uruguay. (Say- go). 5 kw. (B). Add: Cia. de Radiopublicidad Continental, J. C. Gomez 1431. Hrs: 10 a.m.- 10 p.m. RV69 Moscow, U.S.S.R. XEBT Mexico City, D. F. 500 w. (B). Int: cuckoo. s/o: "Liebes- traume." Add: El Buen Tono, S. A., Apto 79-44. Hrs: 10 a.m.- midut.
5850	WOB YV1RB	(X) Lawrenceville, N. J. (C) Maracaibo, Venez. (Las Delici- as). 300 w. (B). "Ecos del Zulia." Relays YV1RA. Int: gong and xylophone. s/o: "Strike Up the Band." Add: Apto. 37. Hrs: Sun., 8:30 a.m.- 2 p.m.; 3:30-9:30 p.m. Weekdays 5:45-9:45 a.m.; 10:30 a.m.-1:45 p.m.; 3:30-10:45 p.m.			Tananarive, Madagascar Alderney, Channel Islands. Add: Alderney Radio, Ltd.
5855	HI1J	San Pedro de Macoris, D. R. 40 w. (B) Add: Fausto M. Donas- toro, Apto. 204.		6005	CFCX Montreal, P. Q. 75 w. (B). Relays CFCF. Add: Canadian Marconi Co., Ltd., 1231 St. Catherine St., Montreal. Hrs: 7 a.m.-midnight.
5875	HRN	Tegucigalpa, Honduras. 500 w. (B). "La Voz de Honduras." Int: notes from nat'l anthem. s/o: "Goodnight Waltz." Ann: Eng., Sp. Hrs: 7-10:30 p.m.			HP5K Colon, Panama. (B). "La Voz de la Victor." Add: Apto 33. Hrs: 6-11 p.m. VE9DN Montreal, P. Q. (Drummondville). 6 kw. (B). Relays CFCF. Add: See CFCX above.
5880	IUA ZEA	Addis Ababa, Ethiopia. (C) Salisbury, Southern Rhodesia. (C). Add: Box 792, G.P.O.			XZ1GY Rangoon, Burma. Add: 15th Mile Promote Road.
5885	HI9B	Santiago de los Caballeros, D. R. 200 w. (B). "Broadcasting Hotel Mercedes." s/o: Nat'l anthem. Add: Apto 95. Hrs: 11:45 a.m.- 2:15 p.m.; 4:45-7:45 p.m.		6007	ZRH Pretoria, Union of So. Africa. (Roberts Heights). 5 kw. (B). Opens: bugle call. Ann: "Johan- nesburg calling." Add: So. African Broadcastg. Corp., Box 4559, Johannesburg. Hrs: Sat. 10 a.m.-4:45 p.m. Sun. 8 a.m.- noon; 12:15-3:15 p.m. Other days 10 a.m.-4 p.m.
5888	**** **** ****	American Airlines Braniff Airlines North West Airlines		6010	CJXC Sydney, N. S. 1 kw. (B). Relays CJCB. Add: Eastern Broad- casters, Ltd., Radio Bldg.
5890	JIC	Taihoku, Taiwan. (C) Saiton, French Indo-China. (B)			COCO Havana, Cuba. 2500 w. (B). Relays CMCK. Add: Luis Casas R., Box 98. Hrs: 4-10 p.m.
5895	YV3RA	Barquisimeto, Venez. (B). "La Voz de Lara." Relays YV3RB. Hrs: 6-10 p.m.			OLR2A Prague, Czechoslovakia. (Pode- brady). 35 kw. (B).
5900	ZNB	Mafeking, Bechuanaland. 250 w. (C). 6-7 a.m.; 1-2:30 p.m.			PRA8 Recife (Pernambuco) Brazil. 5 kw. (B). "A Vox do Norte." Int: time signal at noon and 7 p.m. Brazil Time. s/o: Nat'l anthem. Ann: Eng., Port. Add: Radio Club do Pernambuco, Avenida Cruz Cabuga 394. Hrs: 9 a.m.-noon; 1-3 p.m.; 4-9 p.m. Saiton, French Indo-China. (B)
5905	TILS	San Jose, Costa Rica. (B). Add: Apto. 3		6015	HI3U Santiago de los Caballeros, D. R. 125 w. (B). "La Voz del Comer- cio." s/o: "Maria la O" on or- gan, and nat'l anthem. Add: Moises Franco y Franco, Apto 23. Hrs: 7:15-8:45 a.m.; 11:45 a.m.-1:45 p.m.; 4:45-6:45 p.m.
5915	YV4RH	Valencia, Venez. (B). "Radio Valencia." Relays YV4RE. Hrs: 5 p.m.-1 a.m.			HJ3ABX Bogota, Colombia. 1 kw. (B). "La Voz de Colombia." Int: notes from nat'l anthem. s/o: "Indian Love Call." Add: Apto 2665. Hrs: Sun., noon- 1:30 p.m.; 6-11 p.m. Weekdays, 10:30 a.m.-2 p.m.; 5:30-11 p.m. Mexico City, D. F. 400 w. (B). Add: Institucion Mundial de la V. I., Mina 56.
5925	HH2S	Port-au-Prince, Haiti. (B). Add: Societe Haitienne de Radio- diffusion, Boite Postal 103. Hrs: 7-10 p.m.			XEWI Berlin, Germany. (Zeesen). 50 kw. (B). Int: music box tune (Ueb' immer Treu und Redlich- keit—Ever be true and honest). s/o: "Horst Wessel Lied" and "Deutschlandlied." Add;
5935	YV1RL	Maracaibo, Venez. 300 w. (B). "Radio Popular." Relays YV1RE. s/o: "National Em- blem March." Ann: Eng. Sp. Add: Sr. Jose A. Higuera M, Apto. 247. Hrs: 5-10:30 p.m.		6020	DJC Mexico City, D. F. 400 w. (B). Add: Institucion Mundial de la V. I., Mina 56.
5940	PJCI	Willemstad, Curacao, Nether- land Antilles. 150 w. (B). "Ra- dio Curon." Add: Curacaosebe Radio Vereeniging, Emmastad. Hrs: 6:35-8:35 p.m.			
5945	TG2X	Guatemala City, Guat. 200 w. (B). "Policia Nacional." Add: Ministerio de Fomento. Verifies FREE.			
5969	HVJ	Vatican City. 15 kw. (B). Int: ticking of clock. Ann: "Lau- datur Jesus Christus." Add: Pontificia Accademia Della Scienze, Roma-Castina Pio IV. Shinkio, Manchukuo. (C). Manchukuo Telegraph & Tele- phone Co.			
5970	TDF				

		Reichs - Rundfunkgesellschaft, Haus des Rundfunk, Masurenallee, Berlin-Charlottenburg 9. Hrs: 10:40 a.m.-12:30 p.m.			
6022	XEUW	Veraeruz, Ver. 20 w. (B). DRIFTS. Verifies for 3c USA stamp. "El Eco de Sotavento desde Veraeruz." s/o: "La Golondrina." Add: Av. Independencia 98. Hrs: 8 a.m.-midnt. Panama City, Panama. 100 w. (B). "Estacion Radiodifusora Miramar." Add: Aptdo 910. Hrs: 5-10 p.m.	VP3MR	Georgetown, Br. Gulana. 150 w. (B). "The Voice of Gulana." Add: 16 Robb and Hineks Sts. Hrs: 7:45-10:15 a.m.; 4:45-8:45 p.m.	
6030	HP5B		YV1RD	Maracaibo, Venez. (B). "Radio difusora Maracaibo." Relays YV1RE. Hrs: 7 p.m.-midnt.	
	OLR2B	Praque, Czecho. (Podebrady). 35 kw. (B)	6072	OER2	Vienna, Austria. 1500 w. (B). Hrs: weekdays 9 a.m.-5 p.m.
	VE9BJ	St. John, N. B. 50 w. (B). Add: N. B. Brdestg. Co., Ltd., Admiral Beatty Hotel.	6075	XECU	Guadalajara, Jal. 250 w. (B). "Estacion del Viajero del Mundo." Opens: "Humoresque" on organ. Int: train whistle. s/o: "Adios, Marquita Linda." Add: Union Nacional de Industria y Comercio, Av. Hidalgo 579. Hrs: 9 a.m.-11 p.m.
	XEBQ	Macatlan, Sin. 100 w. (B). "La Voz del Pacifico." Int: 4 chimes. s/o: "Luxemburg March." Add: Aptdo 95.	6080	DJM	Berlin, Germany. (Zeesen). 50 kw. (B). For particulars see DJC on 6020 kes.
6040	W1XAL	Boston, Mass. 20 kw. (B). "Dedicated to Enlightenment." Add: Educational Director, University Club.		VE9CS	Vancouver, B. C. 10 w. (B). Relays CKFC. Add: Standard Brdestg. System, Ltd., 1001 Stock Exchange Bldg. Hrs: 2 p.m.-midnt.
	W4XB	Miami, Fla. 5 kw. (B). Relays W1OD.		W9XAA	Chicago, Ill. 20 kw. (B). "The Voice of Labor." Relays NBC-WCFB. s/o: in Eng., Fr., Ger., Norwegian, Polish, Ru. Sp. Add: Chicago Federation of Labor, 666 Lake Shore Drive.
	YDA	Tandjong Priok, Java, N.E.I. 10 kw. (B). s/o: "End of a Perfect Day."		XEWV	Mexico City, D. F.
		Paris, France. (Essarts). (B). "Radio Coloniale."		ZHJ	Penang, Federated Malay States
6042	HJ1ABG	Barranquilla, Colombia. 150 w. (B). "Emisora Atlantico." Add: Aptdo 445. Hrs: 11 a.m.-11 p.m.	6082	OAX4Z	Lima, Peru. 10 kw. (B). "Radio Nacional." Relays OAX4A. s/o: Nat'l anthem. Add: Peruvian Gov't., Av. Petit-Thouars 447. Hrs: 7-11:30 p.m.
6044	ZP14	Villarica, Paraguay. Hrs: 5-6 p.m.		XECU	Guadalajara, Jal. Assigned 6075
6045	XETW	Tampico, Tams. 100 w. Relays XEFW. Add: Flores Martinez, Francisco L. Madero 204 Ote. Hrs: Sun. 10 a.m.-4 p.m. Weekdays 10 a.m.-10 p.m.		ZHO	Singapore, St. Settlements.
6050	GSA	London, Gt. Britaln. (Daventry). 20 kw. (B) "A for Aerial." Int: Bow Bells: time signal from Greenwich on even hours; Big Ben strikes hours, irregularly, preceded by Westminster Chimes. s/o: "God Save The King." Add: British Broadcasting Corp., London W1.	6090	CRCX	Toronto, Ont. (Howmanville). 1 kw. (B). Relays CBC. Add: Canadian Brdestg. Corp., 805 Davenport Rd. Hrs: 7:45 a.m.-5 p.m.
	HLJ6ABA	Pereira, Colombia. (B). "La Voz de Pereira."		HJ6AHC	Ibague, Colombia. "Ecos de Combeima."
6060	VQ7LO	Nairobi, Kenya. (B). Cable & Wireless, Ltd., Box 777.		XEBF	Jalapa, Ver. 100 w. (B). Add: Pedro Coronel Aburto, Insurgentes 34. Hrs: 10 a.m.-11 p.m.
	W3XAU	Philadelphia, Pa. (Newtown Square). 10 kw. (B). Relays CBS-WCAU. Add: WCAU Brdestg. Co., 1622 Chestnut St. Hrs: 8-11 p.m.		ZHW2	Hong Kong. 2400 w. Add: Box 300
	W8XAL	Cincinnati, Ohio. (Mason). 10 kw. (B). Relays NBC-WLW. Add: Crosley Radio Corp., 1329 Arlington St. Hrs: Daily 11 p.m.-2 a.m. Sun., 8 a.m.-8 p.m. Weekdays, 6 a.m.-8 p.m.	6095	ZJH ZGE	Nazaki, Japan. (C). Kuala Lumpur, Fed. Malay States. (B).
6065	HP5F SBO	Colon, Panama. (B). Stockholm, Sweden. (Motala). 500 w. (B). s/o: Nat'l anthem. Add: Klipheuvet Tjanstebrev Nr. 5. Hrs: 1:30-5 p.m.	6097	ZRJ	Johannesburg, Union of So. Africa. (Maralsburg). 200 w. (B). Opens: bugle call. Ann: "Johannesburg calling." Add: South African Brdestg. Corp., Box 4559, Johannesburg.
	XEXR	Mexico City, D. F. 100 w. (B). Secretaria de Educacion Publica, Argentina y L. G. Obregon		ZRK	Cape Town, Union of So. Africa. (Klipheuvet). 5 kw. (B). See ZRJ above for more data. Hrs: Sun. noon-3 p.m. Weekdays, noon-4 p.m.
6070	CFRX	Toronto, Ont. 1 kw. (B). Relays CFRB. Add: Rogers Radio Brdestg. Co., Ltd., 37 Bloor St., W. Hrs: 10 a.m.-11 p.m.	6100	W3XAL	New York, N. Y. (Bound Brook, N. J.). 35 kw. (B). Ann: Eng., Fr., Ger., It., Sp. s/o: "Star Spangled Banner." Add: NBC, Rockefeller Plaza, NYC. Hrs: Sat., Sun., 6 p.m.-1 a.m. Other days, 7 p.m.-1 a.m.
	HJ3ABF	Bogota, Colombia. 50 w. (B). "La Voz de Bogota." Some-			

W9XF	Chicago, Ill. (Downers Grove). 10 kw. (B). Relays NBC-WENR. s/o: Eng, Fr, Ger, It, Jap, Ru, Sp, Swedish. Add: Audience Mail Dept., NBC, Inc., Merchandise Mart. Hrs: Sat. 1:05-2 a.m.; 4-5:30 p.m. Sun. 1-5:45 p.m. Other days 1:05-2 a.m.; 4-5:45 p.m.		
YUA	Belgrade, Jugoslavia. 1 kw. "Radio Beograd." Add: Bureau Central de Presse, Poste Emetteur a Ondes Courtes. Hrs: noon-5 p.m.		
6108	HJ6ABB	Manizales, Colombia. "Radio Manizales." Hrs: 6 p.m.-midnt.	
6110	GSL	London, Gt. Britain. (Daventry) "L for Liberty." See GSA 6050 kes for more data. Hrs: 9:20-11:20 p.m.	
	YEB	Ottawa, Ont. 100 w. Portable	
	VUC	Calcutta, India. (B).	
	NEGW	Mexico City, D. F. 250 w. (B). Add: Jose G. Carza Fox, San Juan de Letran 81.	
6115	OLR2C	Prague, Czecho. 35 kw. (B).	
	XEUZ	Mexico City, D. F. Assigned 6150	
6120	W2XE	New York, N. Y. (Wayne, N. J.). 10 kw. (B). Relays CBS-WABC. s/o: "Star Spangled Banner." Add: Columbia Brdcast. Sys., 485 Madison Ave., NYC.	
	YDA5	Bandoeng, Java, N.E.I. 1500 w. (B). Add: N. V. Nederlandsche Indische Radio Omroep Moutchappij, Tegalleghah 23.	
6122	HJ5ABX	Bogota, Colombia Assigned 6015	
	OAX6A	Arequipa, Peru. 100 w. (B). "Radio Arequipa." Add: Eduardo L. Caceres, Muzoz Najar 141.	
6125	HP5H	Panama City, Panama. (B).	
6128	OAX7A	Cuzco, Peru. 100 w. Add: Carlos Lizarraga Fisher, Montero 43	
6130	COCD	Havana, Cuba. 350 w. (B). "La Voz del Aire." Relays CMCD. Int: 4 chimes. s/o: "Goodnight Waltz." Add: Hotel Palace, Calle 25 y G, Vedado. Hrs: 5 p.m.-1 a.m.	
	LKJ	Oslo, Norway (Jeloy). (B). Hrs: 11:30 a.m.-5:30 p.m.	
	VE9HX	Halifax, N.S. 500 w. (B). Relays CBC-CHNS. Add: Maritime Brdcast. Co., Ltd., Box 998. Hrs: 5-11 p.m.	
	XEUZ	Mexico City, D. F. 100 w. (B). Add: Partido Nacional Revolucionario. Adc: 5 de Mayo 21. Hrs: 10 a.m.-2 a.m.	
6132	VP3BG	Georgetown, Br. Guiana. (B).	
6133	XEXA	Mexico City, D. F. 100 w. (B). Add: Secretaria de Educacion Publica, Argentina y L. G. Obregon	
6137	CR7AA	Lourenco Marques, Port. East Africa. (B). Ann: Eng, Port. Add: Caixa Postal 594. Hrs: Sun. 6-9 a.m. Weekdays 5-7 a.m.	
6140	W8XK	(X) Pittsburgh, Pa. (Saxonyburg). 40 kw. (B). Relays NBC-KDKA. Add: Westinghouse Electric & Mfg. Co., Grant Bldg. Hrs: 11 p.m.-1 a.m.	
6145	RJ4ABE	Medellin, Colombia. 1 kw. (B). "La Voz de Antioquia." Relays HJ1ABK. Int: 3 chimes. Hrs: 6-10:30 p.m.	
6147	ZEB	Bulawayo, Southern Rhodesia. (C). Add: Box 792, G.P.O., Salisbury. Hrs: Sun. 3-5 a.m.	
6150	CJRO	Winnipeg, Man. (Middlechurch).	
	CSL	2 kw. (B). Add: James Richardson & Sons, Ltd., 157 Royal Alexandra Hotel. Hrs: 6 p.m.-midnt.	
	H15N	Lisbon, Portugal. (B). Moca, D. R. 100 w. (B). "La Voz de Moca." Int: 5 strokes on gong. s/o: nat'l anthem. Add: Calle Saucedo 72. Hrs: 6:15-7:45 a.m.; 11:45 a.m.-1:45 p.m.; 5:45-7:45 p.m.	
	VPB	Colombo, Ceylon. 300 w. (B). Add: Central Telegraph Office. Hrs: Sun. 7-11:30 a.m. Weekdays 6:30 a.m.-12:30 p.m.	
	ZRD	Durban, U. of So. Africa. 10 w. (B). For details see ZRJ on 6097 kes.	
6158	YV5RD	Caracas, Venez. (B). "Radio-difusora Venezuela." Relays YV5RB. Hrs: 10:30 a.m.-1:30 p.m.; 3:30-10 p.m.	
6174	XEXA	Mexico City, D. F. (B). Relays XEXM. s/o: "March of The Toys." Add: Departamento Autonomo de Prensa Publicidad (DAP1). Hrs: 8:30 a.m.-midnt.	
6180	TG2	Guatemala City, Guat. (B). Add: Director General of Electrical Communications, Verifies FREE. Santiago de los Caballeros, D. R. 50 w. (B). "La Voz del Yaque." Add: Rafael Western. Hrs: weekdays 8-10 p.m.	
6190	H1JA	Santiago de Cuba. 50 w. (B). "Ask for Bacardi." Relays CMKG. Add: Srce. Grau y Caminero, Aptdo 137. Hrs: Daily exc Sat., 9 a.m.-11 p.m.	
	XEXS	Mexico City, D. F. 100 w. (B). Add: Departamento de Salubridad Publica.	
6205	YV1RI	Coro, Venezuela. 150 w. (B). "La Voz de Coro." Owner: Roger Leyba. Hrs: 5-10 p.m.	
6206	H18Q	Trujillo, D. R. 200 w. (B). "La Voz de la Phileo." Int: gong. s/o: nat'l anthem. Add: Av. Wenceslao Alvarez No. 3. Hrs: Sun. 6-10 p.m. Weekdays 8:30 a.m.-noon; 2:30-5 p.m.	
6210	TG2	Guatemala City, Guat. Assigned 6180	
6225	YV1RG	Valera, Venez. (B). "Radio Valera." Owner: J. L. Febres Jelambi. Hrs: 5:30-7:30 p.m.	
6235	H1RD	La Ceiba, Honduras. 250 w. (B). "La Voz de Atlantida." Hrs: 8-11 p.m.	
6243	H1N	Trujillo, D. R. 740 w. (B). "Broadcasting Nacional." s/o: nat'l anthem. Add: Frank Hatton, Dominican Gov't., Carle Arzobispo Nerino 79. Hrs: Weekdays. noon-2:30 p.m.; 5:45-10 p.m.	
6250	YV5RJ	Caracas, Venez. (B). "La Voz de la Esfera." Relays YV5RI. Add: Suegart y Cia., Box 1908. Hrs: 10 a.m.-10 p.m.	
6270	YV5RP	Caracas, Venez. 1200 w. (B). "La Voz de Phileo." Relays YV5RQ. Add: Aptdo 508. Hrs: 7 a.m.-1:30 p.m.; 3:30-9:30 p.m.	
6280	H1G	Trujillo, D. R. 150 w. (B). "La Opinion." s/o: nat'l anthem. Add: Andres Cordiero Puello, Santiago Rodriguez No. 12. Hrs: Weekdays 7-9 a.m.; noon-2:30 p.m.; 4-9 p.m.	
6282	COMB	Santi-Spiritus, Cuba. 150 w.	

		(B). Relays CMHB. Add: V. E. Weiss u O. Ramirez, Aptdo 85. Hrs: 9-11 p.m.	6479	H18A	Trujillo, D. R. (B). "Fa Doc en el Aire."
6295	OAX4G	Lima, Peru. 400 w. (B). "Radio Grellaud." Relays OAX4B. Add: Roberto Grellaud y Cia., Sen Abancaz 915-23. Hrs: 7-9:30p.m.	6485	H11L	Santiago de los Caballeros, D. R. (B). "Emisora Nacional." Add: El Diario, Calle Presidente Trujillo 97. Hrs: 6:30-8 a.m.; 5:30-7 p.m.; 8-9 p.m.
6300	YV4RD	Maracay, Venez. (B). "La Voz de Aragua." Relays YV4RG. Owner: Luis y Victor Croquer. Hrs: 5-11 p.m.	6490	****	North West Airlines
6310	H1Z	Trujillo, D. R. 100 w. (B). Add: Calle Duarte 68. Hrs: Sun. 11:40 a.m.-2:40 p.m. Weekdays 11:10 a.m.-2:10 p.m.; 4:40-9:40 p.m.	6500	J2AA	Tokyo, Japan. (Haneda Aldrome). (A).
6312	ZP14	Y'Uarrica, Paraguay. 1 kw. (B). "Radio Cultura." Hrs: 11 a.m.-5 p.m.		H1L	Trujillo, D. R. 50 w. (B).
6330	COCW	Havana, Cuba. (B). Relays CMW. "La Voz de las Antillas." Add: Paseo de Marti 105. Hrs: 7 a.m.-midnt.		YV1RM	Maracaibo, Venez. (B). "Radio-difusora Maracaibo." Relays YV1RN.
6335	OAX1A	Chiclayo, Peru. 200 w. (B). "La Voz de Chiclayo." s/o: "Good-night Waltz." Add: Carlos J. Montjoy, Casilla 9. Hrs: Sat., 8 p.m.-midnt. Daily 8-11 p.m.	6508	.....	Tetuan, Sp. Morocco. (B). "Radio Guardia Civil."
6340	H1IX	Trujillo, D. R. 500 w. (B). Relays H1X. Add: J. R. Saladin. Hrs: Tues., Fri., 8-10 p.m.	6510	****	Trans Western Airlines
6357	HRP1	San Pedro Sula, Honduras. (C)	6520	YV4RB	Vaencia, Venez. (B). "La Voz de Carabobo." Relays YV4RA. Int: chimes, then short piano selection, then chimes. Owner: Sres. Hermann y Williams Degwitz. Hrs: 5-10 p.m.
6360	YV1RH	Maracaibo, Venezuela. (La Arriaza). 350 w. (B). "Ondas del Lago." Relays YV1RF. Int: notes from "Jealousy." Add: Nicolas Vale Quintero, Aptdo 261. Hrs: Sun., 8:30 a.m.-2:30 p.m. Weekdays, 6:15-7:15 a.m.; 11 a.m.-1:30 p.m.; 4-11 p.m.	6530	****	Trans Western Airlines
6375	YV5RF	Caracas, Venez. (B). "Ecos del Caribe." Relays YV5RE. Add: Estudios America, Aptdo 963. Hrs: 11:30 a.m.-10 p.m.	6540	YV6RB	Bolivar, Venez. 200 w. (B). "Ecos del Orinoco." Relays YV6RA. Int: bell. s/o: "Sin Nombre." a one-step. Add: Enrique Torres Valencia, Aptdo 34. Hrs: 10:30 a.m.-noon; 7-9:30 p.m. <i>San Jose, Costa Rica</i>
6384	VP2LO	Basseterre, St. Kitts. 500 w. (B) Opens: "Rule Britannia." s/o: "God Save The King." Add: P. O. Box 88. Hrs: 1-4:45 p.m. daily.	6550	TIRCC	American Airlines
6385	W09	Caracas, Venezuela. (B). "Ondas Populares." Relays YV5RG. Add: Aptdo. 1931.	6555	H14D	Trujillo, D. R. 25 w. (B). "La Voz de Quisqueya" Hrs: 5-8 p.m.
6400	YV5RH	Caracas, Venezuela. (B). "Ondas Populares." Relays YV5RG. Add: Aptdo. 1931.	6560	****	American Airlines
6410	T1PG	San Jose, Costa Rica. 1 kw. (B). "La Voz de la Victoria." Ann: Eng. Sp. s/o: "Good Night Sweetheart." Add: Perry Gilton, Aptdo 224. Hrs: 6-10:30 p.m.	6570	****	Pacific Alaska Airways
6416	YV6RC	Bolivar, Venezuela. (B). "Radio Bolivar."	6575	HC1VT	Pan American Airways
6420	H1IS	Santiago de los Caballeros, D. R. 20 w. (B). "La Voz de la Hispaniola." Hrs: 6-11 p.m.	6580	****	Pan American Airways
	TGQA	Quezaltenango, Guat. (B). Add: Director General of Electrical Communications. Verifies FRELE. Hrs: 8-10 p.m.	6590	COCU	Havana, Cuba. (B). Add: Estrada Palma 25, Vibora. Hrs: Sun. 7 p.m.-midnt. Weekdays 7 p.m.-1 a.m.
6425	OAX4K	Lima, Peru. 200 w. (B). "Radio Gotucochea." Relays OAX4E. Add: Ing. Juan P. Gotucochea, Ocona 158	6600	****	Southern Airlines
	W2XGH	Hicksville, N. Y. 5 kw. (E). Press Wireless, Inc.	6610	YNLG	Managua, Nicaragua. 1 kw. (B). "Ruben Darlo." Opens: 3 bugle calls and a march. s/o: Afternoons, "Thl We Meet Again." Evenings, "Good Night, Ladies." Add: 5a Calle Noroeste No. 207. Hrs: 8-10 a.m.; 1-3 p.m.; 6 p.m.-midnt.
	W3XL	New York, N. Y. (Bound Brook, N. J.). 100 kw. (E). Add: NBC, Rockefeller Plaza, NYC.	6622	PRADO	Riobamba, Ecuador. (B). "Estacion El Prado." Add: Fabrica de Tejidos de El Prado, Aptdo 98. Hrs: Thurs., 9-11 p.m.
6450	H14V	San Francisco de Macoris, D. R. 25 w. (B). "La Voz de la Marina." Hrs: 2:40-4:40 p.m.; 7:10-9:10 p.m.	6630	H1T	Trujillo, D. R. 200 w. (B). "La Voz de la RCA-Victor." Int: bells. s/o: Nat'l anthem. Add: A. L. Pichardo, Aptdo 1105. Hrs: Sun. 10:45 p.m.-1:45 a.m. Weekdays, 5:45-8:45 p.m.
6465	YV3RD	Barquisimeto, Venez. (B). "La Voz de Lara." Ann: Eng, Fr, It, Sp.	6660	WOGK	Yacht "Mako." 100 w. (SS). Thorne Donnelley
			6662	WXH	Ketchikan, Alaska. (C).
			6668	HC2RL	Guayaquil, Ecuador. 200 w. (B). "Quinta Piedad." Int: "Hello, America." s/o: Nat'l anthem. Add: Dr. Roberto Levi, Casilla 759. Hrs: Sun. 5:30-7:30 p.m. Tues., 9-11 p.m.
			6672	YVQ	Maracay, Venezuela. (C).
			6675	HBQ	Geneva, Switzerland (Prangins). (B). "Radio Nations." Add:

		Information Section, League of Nations.	7565	KWY	(X) Dixon, Calif. (C).
6690	TIEP	San Jose, Costa Rica. (B). "La Voz de Isthmo." Add: Eduardo Pinto Hernandez, Aptdo 257. Hrs: 4-11 p.m.	7570	WDJ	(X) Ocean Gate, N. J. 2 kw. (C). Shinkio, Manchukuo. (C). Manchukuo Telegraph & Telephone Co.
6700	TIVL	San Jose, Costa Rica	7610	KWX	(X) Dixon, Calif. 40 kw. (C).
6710	KEF	(X) Bolinas, Calif. (C).	7620	IUB	Addis Ababa, Ethiopia. (C).
6720	PMH	Bandoeng, Java, N.E.I. 1500 w. Rossland, B. C. (C). Consolidated Mining & Smelting Co. La Romana, D. R. (B). "La Voz de la Feria." Hrs: 5:45-8 p.m.	7700	TYC2	Ste. Assise, France. (SS). Add: L'ingenieur en Chef, Directeurs de Service de la Telegraphie sans Fil, 5 Rue Froidevaux (14e) Paris.
6730	HI3C			****	Airways
6755	WOA	(X) Lawrenceville, N. J. (C).	7715	KKE	(X) Bolinas, Calif. 40 kw. (C).
6762	TDA	Shinkio, Manchukuo. 20 kw. (C). Manchukuo Telegraph & Telephone Co., Ltd.	7750	CMA5	Havana, Cuba. (C).
6780	HIH	San Pedro de Macoris, D. R. 150 w. (B). "La Voz de Higuanamo." Owner: Sr. Domingo Dominguez.	7797	HBP	Geneva, Switzerland. (Prangins) 20 kw. (B). "Radio Nations." Add: Information Section, League of Nations.
6800	HI7P	Trujillo, D. R. 25 w. (B). DRIFTS. "Diario del Comercio." s/o: "Lempira" on Marimba. Add: Calle Jose Reyes 35. Hrs: Sun. 10-11 a.m. Weekdays 1-3 p.m.; 7-9 p.m.	7870	HCIRB	Quito, Ecuador. (B). "La Voz de Quito." Hrs: 8:30-11:30 p.m. Palembang, Sumatra, N.E.I. (C). Add: 4th Telegraph and Telephone District. Hrs: Phones Java 8:30 p.m.-7 a.m.
	PZH	Paramaribo, Surinam	7894	YSD	San Salvador, E. S. (B). "Radio Nacional." Relays YSS. Add: Director General de Telegrafos, Telefonos y Radio Nacionales. Hrs: 9-10:30 p.m.
6845	KEN	(X) Bolinas, Calif. (C).	7901	LSL1	Buenos Aires, Argentina. (C). Add: Cia. Internacional de Radio, S. A., Defensa 143.
6850	T10W	Puerto Limon, Costa Rica. 400 w. (B). Owner: Otto F. Wimmer. Hrs: Sun. 4-5 p.m. Weekdays noon-1 p.m.	7920	GDP	Rugby, Gt. Britain. (C). Add: General Post Office, (Radio Section), Armour House, St. Martin's le Grand, London EC1.
6860	KEL	(X) Bolinas, Calif. (C).	7968	HSJ	Bangkok, Siam. (C). Add: Post and Telegraph Dept. Shanghai, China. (C).
6890	KER	(X) Bolinas, Calif. (C).	7977	XGL	(X) Lawrenceville, N. J. 20 kw. (C).
6905	GDS	Rugby, Gt. Britain. 15 kw. (C). Add: Engineer-in-Chief, G.P.O., Armour House, St. Martin's le Grand, London EC1.	8050	WXA	Juneau, Alaska. (C).
6915	XBA	Tacubaya, D. F. (C). Servicio Meteorologico Mexicano.	8070	KAEW	Umnak, Alaska. (C).
6950	GBY	Rugby, Gt. Britain. (C). See GDS 6905 kes for more data		KAJJ	Atka, Aaa. (C).
7000	PZH	Paramaribo, Surinam		KAQF	Unalaska, Aaa. (C).
7000	to			****	Airways
7300	AMATEURS		8075	WEZ	(N) Rocky Point, N. Y. (C).
7090	FO8AA	Papeete, Tahiti. 200 w. (B). Owner: Radio Club Oceanien. Hrs: Tues., Fri., 11 p.m.-midnt.	8095	VLK	Sydney, Australia. (C).
7200	YNAM	Managua, Nicaragua. (B). Unused USA stamps for veries. "La Voz del Pacifico." Hrs: 8 p.m.-midnt.	8130	****	North West Airlines
7300	VIG	Port Moresby, Papua. (B). Relays 4PM.	8220	****	Pacific Alaska Airways
7380	XECR	Mexico City, D. F. 20 kw. (B). Ann: Eng. Sp. Add: Secretaria de Relaciones Exteriores. Hrs: Sun. 6-8 p.m.	8543	IBG1	Pan American Airways
.....		Paris, France. (B). "Radio Liberte."	8560	WOO	S. S. "Conte Verde." (SS). Add: Italian Lines, 1 State St., NYC.
7500	.....	Salamanca, Spain. "Radio Nacional"	8580	YNPR	(X) Ocean Gate, N. J. 20 kw. (SS).
7510	JVP	Tokyo, Japan. (Nazaki). 50 kw. (B). Ann: Chirese, Eng, Fr, Ger, Jap, Port. Sp. s/o: "Kimagayo." nat'l anthem. Add: Nippon Hoso Kyokai, Overseas Section, Broadcasting Corp. of Japan, Atago-Yama, Tokyo. Hrs: 2:30-4 p.m.	8600	HC1EC	Managua, Nicaragua. 500 w (B). Unused USA stamps for veries. "Radio Pilot" Hrs: 1:30-2:30 p.m.; 8-10 p.m.
7520	KKH	(X) Kahuku, Hawaii. 10 kw. (C).	8600	HPP4	Quito, Ecuador. (B).
	RKI	Moscow, U.S.S.R. (B and C). Hrs: Daily 7-9 p.m.	8620	WVD	Panama City, Panama. (C). Seattle, Wash. (C). Alaskan Telephone Co., 517 Federal Office Bldg.
7532	HJA3	Bogota, Colombia. (C).	8630	VOWQ	Northwest River, Labrador. (A). Newfoundland Skyways, Ltd.
7555	WOZ	(X) Lawrenceville, N. J. 20 kw. (C).	8640	HJ4ABU	Medellin, Colombia. (B). Add: Universidad de Antioquia
			8665	COJK	Caraguez, Cuba. 2400 w. (B). "Radio Zenith." Relays CMJK. Add: Finlay 3. Hrs: 6 p.m.-1 a.m.
			8680	GBC	Rugby, Gt. Britain. (SS). Add: See GDP on 7920.
			8690	VWZ	Kirkee, Poona, India. 10 kw. (C). Add: Indian Radio & Cable Communications Co., Poona 6.
			8710	KBB	(X) Manila, Philippine Isl. (C).
			8730	GCI	Rugby, Gt. Britain. (C). Add: See GDP on 7920.

8740	WXV	Fairbanks, Alaska. (C).	9040	TYA2	Pontoise, France. 10 kw. (C). Add: See TYC2 on 7700.
8770	ICEJ	S. S. "Rev." (SS). Add: Italian Lines, 1 State St., NYC.	9045	VWY	Kirkee, Poona, India. See VWZ on 8690.
8798	HKV	Bogota, Colombia. (E). Ministry of War.	9050	NPO	Cavite, Philippine Islands. Time signals at 5:55 p.m. EST.
8810	FNSK	S. S. "Normandie." (SS). French Lines, pier 88, North River, Foot of W. 48th St., NYC.	9080	XTK	Linkow, China. (C).
	IBLI	S. S. "Conte di Savoia." (SS). Add: Italian Lines, 1 State St., NYC.	9100	COCA	Havana, Cuba. (H). DRIFTS. Relays CMCA. Add: Testar y Gonzales, Box 3488.
8820	HCJB	Quito, Ecuador. 1 kw. (B). "La Voz de los Andes." Add: Clarence W. Jones, Casilla 691. Hrs: Daily exe. Mon., 7-8:15 a.m.; 11:30-2:30 p.m.; 4:45-10:15 p.m.	9125	HAT4	Budapest, Hungary (Szeke- sfehervar). 20 kw. (B). "Justice for Hungary." Ann: usually by lady. In Eng., Fr., Hungarian. s/o: Nat'l anthem. "Isten ad meg a Magyar!" (Lord Bless the Hungarian). Add: Radiolabor, Kiserleti Allomas, Gyallut 22, Budapest IX. Hrs: Sun., Wed., 7-8 p.m.; Sat., 6-7 p.m.
	WOGK	Yacht "Mako" 100 w. (SS). Thorne Donnelley.	9168	YVR	Maracay, Venezuela. (C).
8830	.....	British Ships. Work with GBC and WOO. Add: International Marine Radio, Conneaut House, 63 Aldwych, London WC2.	9180	HC1GQ	Quito, Ecuador (Nariz del Diablo). (B). s/o: "Blue Danube Waltz." Add: Aptdo 159. Hrs: Mon., Wed., Sat., 9-10:30 p.m.
		GBTT R.M.S. "Queen Mary." GBZW S.S. "Berenzaria" GDJL S.S. "Homerio" GFWV S.S. "Majestic" GLRZ S.S. "Aguatania" GMBJ S.S. "Empress of Bri- tain"		ZSR	Kiliphevel, Union of So. Africa. (C). Add: Overseas Commu- nications of So. Africa, Ltd., Box 962, Cape Town.
		French Ships. Work WOO. Add: French Lines, Pier 57, Hudson River, NYC.	9200	COBX	Havana, Cuba. (B). DRIFTS. Relays CMBX. Add: Alberto Alvarez, San Miguel 194.
		FNSK S.S. "Normandie" FNSM S.S. "Paris" FNTQ S.S. "Ile de France" Furness-Bermuda Lines	9250	HC2CW	Guayaquil, Ecuador. (B). "Ondas del Pacifico." Add: Aptdo. 1166.
		VQJM S.S. "Monarch of Ber- muda" VQJP S.S. "Queen of Bermu- da"		NAA	Arlington, Va. Time signals at 9:55 a.m. and 9:55 p.m. EST.
		German Ships. Work DAF and WOO. Add: North German Lloyd, Pier 42, North River, Morton St., NYC.	9280	GCB	Rugby, Gt. Britain. 15 kw. (C). Add: See GDP on 7920.
		DDBR S.S. "Berlin" DDCP S.S. "Cap Polonia" DDFF S.S. "Reliance" DDFT S.S. "Oceana" DHDL S.S. "Cap Arcona"		NGU	Shanghai, China. (C)
		German ships. Work DAF and WOO. Add: Hamburg American Lines, Pier 86, North River, W. 46th St., NYC.	9285	XPC	Shanghai, China. (C)
		DHAO S.S. "Hansa" DHEY S.S. "Deutschland" DHJZ S.S. "Hamburg" DHRLS S.S. "New York"	9300	HIG	Trujillo, D. R. 250 w. (B). "La Opinion." s/o: Nat'l anthem. Add: Andres Cordero Puello, Santiago Rodriguez 12. Hrs: Weekdays noon-12:30 p.m.; 4- 9 p.m.
		German Ships. Add: North German Lloyd, Pier 4, Foot of 58th St., Brooklyn, N. Y.	9300	NTC	Shanghai, China. (C)
		DOAIS S.S. "Brennen" DOAI S.S. "Europa"		YNGU	Managua, Nicaragua. 50 w. (B). "Alma Nica." Int: 1 stroke on gong. Opens: "Sesqui-Centennial Exposition March." s/o: Nat'l anthem. Add: Aptdo 295. Hrs: weekdays noon-2 p.m.; 5-6 p.m.
8840	ZMBJ	T. S. S. "Awatea." (SS). Add: Union Steamship Co. of N. Z., Auckland.	9310	****	Always
8850	FNSK	S. S. "Normandie." See 8830 kes.	9330	OAN4J	Lima, Peru. Assigned 9590
8960	TPZ	Alger, Algiers. (C). Address reports to Directeur du Service de la Telegraphie sans fil, 5 rue Froidveaux, Paris.	9345	IBL	Geneva, Switzerland. (Pran- gins). "Radio Nations." Add: Information Section, League of Nations.
9010	KEJ	(X). Bolinas, Calif. (C).	9350	HC1ETC	Quito, Ecuador. (B).
9020	GCS	Rugby, Gt. Britain. 15 kw. (C). Add: See GDP on 7920.		HSBPJ	Bangkok, Siam. (B). Ann: Eng., Fr., Siamese. Int: 3 chimes. Add: Post and Telegraph Dept. Canton, China. (C). Add: Chinese Government Radio Administration, Sussoon House, Jinkee Road, Shanghai.
9030	COBZ	Havana, Cuba. (B). DRIFTS. "Radio Salas." Relays CMBZ. Add: Aptdo. 866.		XTR	Fort de France, Martinique. (B). "Radio Fort de France."
9038	VWY	Kirkee, Poona, India. See VWZ on 8690.	9355	WNK	(X) Hialeah, Fla. (C).
			9363	COBC	Havana, Cuba. (B). DRIFTS. "El Progreso Cubano." Relays CMBC. Add: Av. Monte 139, or, Aptdo 132.
			9415	PJC2	Willemsstad, Curacao. (B). "Radio Curom." Add: Cura- caosche Radio Vereniging, Em- mastaad. Hrs: Sun. 10:30 a.m.- 12:30 p.m.

PLV	Bandoeng, Java, N.E.I. 80 kw. (C). Add: Governments Radiodienst.			rez y Aristizabal. Hrs: 8-11 a.m.; 6-10 p.m.
9425 NAA	Arlington, Va. Time signals at 12:55, 1:55, 2:55, 3:55, 7:55, and 11:55 a.m., and 1:55, 3:55, 5:55, 6:55 and 11:55 p.m.		OAX4J	Lima, Peru. 500 w. (B). "La Voz de Lima." Relays OAX41. Opens: "Broadway Rhythm." Int: 3 chimes. s/o: "Whistler and His Dog." Ann: Eng, Fr, Ger, Sp. Add: Radio Internacional, Inc., Aptdo 1166. Hrs: noon-3 p.m.; 5-11 p.m.
9428 COCH	Havana, Cuba 150 w. (B). Add: General Electric Co. of Cuba, No. 2 "B" St., Vedado. Hrs: 7 a.m.-1 a.m.		OFZ	Copenhagen, Denmark (Skamlebaek). 6 kw. (B). Add: Mail and Telegraph Dept., Technical Division, Statsradiofonien, 32 Bernstorffsgade. Hrs: 2-6:40 p.m.
9445 HC2RA	Guayaquil, Ecuador. (B). "La Voz de Alma." Hrs: Sun. 4-10 p.m. Daily 9-10 p.m.		XEDQ	Guadalajara, Jal. 500 w. (B). "Hablando a los continentes desde Guadalajara." Relays XED. Int: 4 chimes s/o: "Jarabe Tapatio." Add: Radio Fonografica de Guadalajara, S. A., Aptdo. 197. Hrs: noon-4:30 p.m.; 8 p.m.-midnt.
9448 WES	(X) Rocky Point, N. Y. (C).		YSH	San Salvador, E. S. (B). Relays YSS.
9450 HC2ODA	Guayaquil, Ecuador. (B). "La Voz del aire." Hrs: 9-10 p.m.			Paris, France. (B). "Radio Liberte." Add: 10 Ave. de la Liberte, Becou, Courbevoie, France
9460 ICK	Trlpoli. 2 kw. (C).		5923 ZRH	Pretoria, Union of So. Africa. (Roberts Heights). 5 kw. (B). Opens: bugle call. Ann: "Johannesburg calling." Add: South African Broadcasting Corp., Box 4559, Johannesburg. Hrs: Sun. 3:30-4:30 a.m. or 4-5 a.m. Daily exc. Sun., 5-7:30 a.m.; 11:45 p.m.-12:45 a.m.
WKJ	(X) New Brunswick, N. J. (C).		9525 ZBW3	Hong Kong 2500 w. (B). Add: Hong Kong Brcdstg. Committee, Box 200.
9470 PJCI	Willemstad, Curacao. 150 w. (B). "Radio Curon." Add: Curaeosche Radio Vereeniging Hrs: Sun. 10:30 a.m.-12:30 p.m. (X) Rocky Point, N. Y. (C).		9530 LKC	Jeloy, Norway. 1 kw. (B). Hrs: 5-8 a.m.
WET	(X) Rocky Point, N. Y. (C).		W2XAF	Schenectady, N. Y. 40 kw. (B). "The Voice of Electricity." Relays NBC-WGY. Opens: electrical discharge of 10 million volts of man-made lightning. Add: General Electric Co. Hrs: Sat. noon-midnt. Other days 4 p.m.-midnt.
9475 EAH	Madrid, Spain. (C).		W6XBE	Belmont, Calif. 20 kw. (B). Add: General Electric Co.
9480 FAR	Madrid, Spain. 20 kw. (B). "La Voz de Espana." Add: Medinaceli 6. Hrs: 7:30-8 p.m.; 8:30-9 p.m.		9535 JZI	Tokyo, Japan. (Nazaki). 50 kw. (B). Ann: Chinese, Eng, Fr, Ger, Jap, Port, Sp. s/o: "Kimagayo," nat'l anthem. Add: Nippon Hoso Kyokai, Overseas Section, Broadcasting Corp. of Japan, Atago-Yama, Tokyo. Hrs: 2:30-4 p.m.; 4:30-5:30 p.m. Suva, Fiji 2 kw. (B). Add: Amakamated Wireless (A/sia) Ltd. Hrs: 5:30-7 a.m.
KES	(X) Bolinas, Calif. (C).		9540 DJN	Berlin, Germany. (Zeesen). 50 kw. (B). Int: music box tune. s/o: "Forst Wessel Lied" and "Deutschlandlied." Add: Reichs-Rundfunk-Gesellschaft, Haus des Rundfunks, Maurenuale, Berlin-Charlottenburg 9. Hrs: 4:50-10:45 p.m.
9490 XTV	Canton, China. (C).		9550 OLR3A	Prague, Czechoslovakia. (Podebrady). 35 kw. (B). Int: trumpet tune from "New World Symphony." Add: Fochova Tr. 16, Praha XII. Hrs: Mon., Tues., 4:40-5 p.m.
9500 HJ1ABE	Cartagena, Colombia. (B). "La Voz de los Laboratorios Fuentes." Add: Aptdo 31.		W2XAD	Schenectady, N. Y. 50 kw. (B). General Electric Co. Hrs: 7:30 p.m.-midnt.
XEWW	Mexico City, D. F. 10 kw. (B). "La Voz de la America Latina desde Mexico." Relays XEW. Add: Aptdo 2516. Hrs: 8:55 a.m.-midnt.			
XGW	Shanghai, China			
9501 PRF5	Rio de Janeiro, Brazil. 60 kw. (B). "A Voz do Brasil." Add: Cia. Internacional do Brasil, Box 709.			
9504 OLR3B	Prague, Czechoslovakia. 35 kw. (B).			
9510 CXA8	Colonla, Uruguay. 2500 w. (B). "Real de San Carlos." Relays LR3 of Buenos Aires. Add: Real de San Carlos, Colonia. Hrs: 6 a.m.-10 p.m.			
GSB	London, Gt. Britain. (Davenport). 20 kw. (B). "B for Broadcasting." Int: Bow Bells; Greenwich time signal on even hours; Big Ben strikes hours irregularly, preceded by Westminster Chimes. s/o: "God Save The King." Add: British Brcdstg. Corp., London W1. Hrs: 2-4:15 a.m.; 12:20-4 p.m. 4:15-6 p.m.; 6-8:30 p.m.; 9:20-11:20 p.m.			
HJU	Buenaventura Colombia. 1 kw. (B). "La Voz del Pacifico." s/o: "Palmyra March." Add: National Railroads of Colombia.			
H88PJ	Bangkok, Slam. (B). Opening and interval sigs: 3 ascending chimes. Ann: Eng, Fr, Siamese. Add: Colonel Phra Aram, Post and Telegraph Dept. Hrs: Mon., Thurs., 8-10 a.m.			
VK3ME	Melbourne, Australia. (Braybank). 5 kw. (B). Add: Amalgamated Wireless (A/sia) Ltd., Box 1272L, Elizabeth St. P. O. Hrs: Weekdays 4-7 a.m.			
9520 HJ6ABH	Armenia, Colombia. 1 kw. (B). "La Voz de Armenia." Relays HJ6ABN. Add: Hoyos, Gutler-			

XEFT	Veracruz, Ver. 20 w. (B). "La Voz de Veracruz." Relays XETF. s/o: "Vais Poetico." Add: Av. Independencia 28. Hrs: 10:30 a.m.-4:30 p.m.; 7:30 p.m.-12:30 a.m.	XEYU	Mexico City, D. F. 1500 w. (B). Relays NEXX. Ann: Eng, Fr, Sp. Add: Universidad Nacional de Mexico, Justo Sierra No. 16, Mexico City. Hrs: 3:30-4:30 p.m.; 8 p.m.-midnt.
.....	Paris, France. (Essarts). (B). "Radio Coloniale."	9605 HP5J	Panama City, Panama. 1 kw. (B). "La Voz de Panama." Add: Manuel Diaz Doce, Aptdo 867. Hrs: 6:30-11 p.m.
9560 DJA	Berlin, Germany. (Zeesen). 50 kw. (B). See DJN on 9540. Hrs: 12:05-11 a.m.; 4:50-10:45 p.m.	9606 ZRK	Cape Town, Union of So. Africa. (Klipheuve). 5 kw. (B). See ZRH on 9523 kes for details. Hrs: Best time 11:45 p.m. to 12:45 a.m.
YDB	Sourabaya, Java, N.E.I. 1 kw. (B).	9618 HJ1ABP	Cartagena, Colombia. 750 w. (B). "Radio Cartagena." Add: Aptdo 37. Hrs: 6-10 p.m.
9562 OAX4T	Lima, Peru. 10 kw. (B). "Radio Nacional." Relays OAX4A. Add: Peruvian Gov't., Av. Petit Thouars 447. Hrs: 11:30 a.m.-1:30 p.m.	9630 HJ7ABD	Bucaramanga, Colombia. (B). "Radio Bucaramanga." s/o: "La Guabina." Add: Radio Bucaramanga, Inc., Aptdo 34. Hrs: Sun. 7:30-9:30 p.m. Weekdays 11 a.m.-1 p.m.; 6-11 p.m. Rome, Italy. 25 kw. (B). "Radio Roma-Napoli." Ann: usually by a lady. s/o: two nat'l anthems, "Glovinazza" and "Marcha Reale." Add: Ente Italiano per le Audizioni Radiofoniche, Via Montello 5. Hrs: 12:20 p.m.-9 p.m.
9565 VUB	Bombay, India. 4500 w. (B). Add: All India Radio, Irwin House, Sprott Road, Ballard Estate.	9635 2R03	Itabashi, Taiwan. (B). Relays JPAK. Add: Kokusai Denwa Kaisha, Chureki Gai, Shinchiku, Taiwan. Hrs: 6-8:30 a.m.
9570 KZRM	Manila, Philippine Isl. Add: Erlanger & Galinger, Inc., Regina Bldg., David St. (X) Boston, Mass. (Mills). 10 kw. (B). Relays NBC-WBZ-WBZA. Add: Westinghouse Elec. & Mfg. Co. Hrs: Sun. 8 a.m.-1 a.m. Other days 6 a.m.-1 a.m.	9645 H113W	Port-au-Prince, Haiti. 30 w. (B). Add: C. Ricardo Widmaier, Box A-117. Hrs: 7-8 p.m.
W1XK	(X) Boston, Mass. (Mills). 10 kw. (B). Relays NBC-WBZ-WBZA. Add: Westinghouse Elec. & Mfg. Co. Hrs: Sun. 8 a.m.-1 a.m. Other days 6 a.m.-1 a.m.	9650 CS2WA	Lisbon, Portugal. 2 kw. (B). "Radio Coloniale." Int: 3 cuckoos. Add: Senhor Abilio Nunes dos Santos, Jr., Av. Antonio Augusto d'Avilar 136. Hrs: Tues., Thurs., Sat. 4-7 p.m.
9580 W8XK GSC	(X) Pittsburgh, Pa. Not used now. London, Gt. Britain (Daventry) 20 kw. (B). "C" for Corporation. See GSB on 9510 kes. Hrs: 4:15-6 p.m.; 6-8:30 p.m.; 9:20-11:20 p.m.	9660 CR6AA	Lobito, Angola, Port. West Africa. 500 w. (B). Add: Box 103. Hrs: Wed., Sat., 2:45-4:45 p.m.
VLR	Melbourne, Australia (Lyndhurst). Hrs: 1-9:45 a.m.	LRN	Buenos Aires, Argentina. 5 kw. (B). "Radio El Mundo." Relays LRI. Add: Calle Maipu 555. Hrs: 10:30 a.m.-12:30 a.m.
9590 PCJ	Hulzen, Netherlands. 20 kw. (B). Ann: Du, Eng, Fr, Ger, Malay, Port, Sp s/o: Nat'l anthem. Add: Philips Omroep Holland Indie, Emmasingel 29, Eindhoven. Hrs: Sun. 2-3 p.m.; 7-9 p.m. Tues., 1:45-3:30 p.m. Wed. 7-9:30 p.m.	9670 TI4NRH	Heredia, Costa Rica. 500 w. (B). "The Voice of Costa Rica." Add: Amando Cespedes Marin, Aptdo 40. Hrs: Tues., Thurs., Sat., 9-10 p.m. Sun., 7-8 a.m. Send ten cents for veri.
VK2ME	Sydney, Australia. (Pennent Hills). 20 kw. (B). Int: laughing call of the kookaburra. Add: Amalgamated Wireless, (A/sia) Ltd., 47 York St. Hrs: Sun., 1-3 a.m.; 5-11 a.m.	9675 DZA	Berlin, Germany. (Zeesen). (E).
VK6ME	Perth, Australia. 5 kw. (B). Add: Amalgamated Wireless, (A/sia) Ltd. Hrs: Daily exe Sun. 4-6 a.m.	9685 TGWA	Guatemala City, Guat. 10 kw. (B). "Radio Nacional." Relays TGW. Add: Ministerio de Fomento. Verifies FREE.
VUD2	Delhi, India. (B). Heard 9:30 p.m.-midnt.	9700	Fort de France, Martinique. 200 w. (B). "Radio Martinique." Ann: Eng, Fr, Ger. s/o: "Marseillaise." Add: Poste Seri, Boite 136. Hrs: 6:45-7:45 and irregular.
W4XE	New York, N. Y. (Wayne, N. J.) Philadelphia, Pa. (Newtown Square). 10 kw. (B). Relays CBS-WCAU. Add: WCAU Brcdstg. Co., 1622 Chestnut St. Hrs: noon-8 p.m.; 11 p.m.-midnt.	9750 COCQ	Havana, Cuba. (B). DRIFTS. "de la RCA-Victor." Relays CMQ. s/o: "Siboney." Add: Calle 25 No. 225, Vedado. (X) Ocean Gate, N. J. 20 kw. (C). (X) Lawrenceville, N. J. (C).
W8XAL	Cincinnati, Ohio. (Mason). 10 kw. (B).	WDL	Havana, Cuba. (B). DRIFTS. "Radio Columbia."
9595 HBL	Geneva, Switzerland. (Prangins). 18 kw. (B). "Radio Nations." Add: Information Section, League of Nations.	WOF	Rome, Italy. (E).
RAN	Moscow, U.S.S.R. (B). Add: Radio Center, Solanka 12/ Hrs: 7-9:15 p.m.	9775 COCM	Havana, Cuba. (B). DRIFTS. "Radio Columbia."
ZHO	Singapore, Straits Settlements, Santiago de Chile. (B). "Radio Difusora Pdot." s/o: "Rhapsody in Blue." Add: Compania Internacional de Radio, Castilla 16-D. Hrs: 6-7:30 p.m.	9830 IRF	Rome, Italy. (E).
9600 CB960			

WHAT'S ON THE AIR TONIGHT

Fill in the calls and frequencies of the stations through which you best receive the network programs. You can then turn quickly to the one that has the feature you want.

Network	Stations
Canadian (CBC)	
Columbia (C)	
Mutual (M)	
National Red (R)	
National Blue (B)	

Time: ED Eastern Daylight; E Eastern; C Central; M Mountain

While these programs are correct at the time of going to press, changes are made frequently.

MONDAY

ED-6:30 p.m., E-5:30, C-4:30, M-3:30

C — **Boake Carter**

KDAL KFAB KFH KGKO KGLO
 KLRK KMBC KMOX KNOW KOMA
 KRLL KRNT KSCJ KTRH KTSK
 KTUL KWKH WABC WACO WADC
 WAPI WBBM WBIG WBNS WBT
 WCAU WCAU WCCO WCIS WDAE
 WDBJ WDRO WDOD WDRC WEEI
 WEOA WFAM WFBL WFBM WGAR
 WGST WHAS WHFC WHIO WHP
 WIBW WISN WJAS WJR WKBW
 WJSV WKBH WKBN WKBW WKRC
 WLAC WMBD WMBR WNAX
 WNOX WOC WOKO WORC WPRO
 WQAM WREC WRVA WTAQ WWL
 WWVA

ED-6:45 p.m., E-5:45, C-4:45, M-3:45

B — **Lowell Thomas**

CRCT KDKA WBAL WBZ WBZA
 WFLA WIOD WJAX WJZ WLW
 WMAL WOOD WRVA WSYR WTAM
 WXYZ

C — **Lum and Abner**

KFAB KMBC KMOX KNOW KOMA
 KRLL KRNT KTRH KTSK KTUL
 WABC WBBM WBNS WBT WCAU
 WCAU WCOA WDAE WDBJ WDRC
 WEEI WFBL WFBM WGAR WGST
 WHAS WHFC WHIO WJR WJSV
 WKBW WKRC WLAC WMBR WOKO
 WPRO WQAM WREC WRVA

ED-7:00 p.m., E-6:00, C-5:00, M-4:00

C — **Entertainment; Jack Fulton**

WABC WADC WBT WCAU WCAU
 WDRC WEAN WEEI WFBL WGR
 WHFC WHK WJAS WJR WJSV
 WKRC WOKO WSPD WTOC WWVA

R — **Amos 'n' Andy**

KSD KSTP KYW WBN WCAE
 WCSH WEAF WFBR WGY WHO
 WJAR WLW WNAC WRC WTAG
 WTAM WTIC WWJ

ED-7:15 p.m., E-6:15, C-5:15, M-4:15

R — **Uncle Ezra's Radio Station**

KARK KFJR KGBX KGNC KPCR
 KSTP KTBS KTHS KVOO KYW
 WBAF WBN WCAE WCKY WCOL
 WCSH WDAF WDAY WFAE WFCB
 WFAA WFBF WGBF WGY WHO
 WIBA WIRE WJAR WKY WMAQ
 WNAC WOAI WOOD WOV WRC
 WTAG WTAM WTIC WTMJ

ED-7:30 p.m., E-6:30, C-5:30, M-4:30

C — **Eddie Cantor; Deanna Durbin**

KDAL KFAB KFH KGKO KGLO
 KLRK KMBC KMOX KNOW KOMA
 KRLL KRNT KSCJ KTRH KTSK
 KTUL KWKH WABC WADC WALA
 WBBM WCCO WBNS WBT WCAU
 WCAU WCCO WCIS WDAE WDBJ
 WDRO WDNC WDOD WDRC WEEI
 WEOA WFAM WFBL WGAR WGBI
 WGR WGST WHAS WHFC WHIO
 WHLB WHP WIBW WIBX WISN
 WJAS WJNO WJR WKSX WKBH
 WKBN WKRC WLAC WLZ WMAS
 WMBD WMBR WMFG WMMN
 WNAX WNEF WNBX WNOX WOC
 WOKO WORC WPRO WQAM WREC
 WRVA WSEA WTAQ WTOC WWL

M — **The Lone Ranger**

WFH. WNEF WSYR WOR WXYZ

ED-8:00 p.m., E-7:00, C-6:00, M-5:00

C — **Monday Night Show**

KDAL KGLO KLRK KMOX WABC
 WADC WBRK WCAU WCCO WDRC
 WEEI WFBL WGAR WGR WHLB
 WJAS WJR WKRC WLZ WMAS
 WMFG WNAX WNBX WOC WOKO
 WORC WPRO

R — **Burns and Allen**

CRCT KYW WBN WCAE WCSC
 WCSH WEAF WFBR WFLA WGY
 WHO WIOD WIRE WIS WJAR
 WJAX WLW WMAQ WNAC WPTF
 WRC WRVA WSOC WTAG WTAM
 WTAR WTIC WWJ

ED-8:30 p.m., E-7:30, C-6:30, M-5:30

C — **Pick and Pat**

KFAB KMBC WABC WADC WBBM
 WBT WCAU WCAU WDRC WEAN
 WFBL WGR WGST WHFC WHK
 WHIP WCCO WJAS WJR WJSV
 WKRC WLZ WMAS WNAC WOKO
 WORC WSPD

R — **Voice of Firestone**

CFCF CRCT KFJR KPCR KSD
 KSTP KTBS KVOO KYW WAVE
 WBN WCAE WCSC WCHS WDAF
 WDAY WFAE WFCB WEEI WFAA
 WFCB WFBF WFLA WGY WHO
 WIBA WIOD WIRE WIS WJAR
 WJAX WJDX WKY WMAQ WMC
 WOAI WOW WPTF WRC WRVA
 WBS WSM WSMB WSOC WTAG
 WTAM WTAR WTIC WTMJ WWJ
 WWNC

B — **Those We Love**

KDKA KDYL KFI KHQ KOA KOIL
 KOMO KPO KSO KWK WABY

WBAL WBZ WBZA WCKY WEAN
 WEBR WFIL WHAM WHK WIBA
 WICC WJZ WLS WMAL WMT
 WREN WSPD WSYR WTAR WXYZ

ED-8:45 p.m., E-7:45, C-6:45, M-5:45

C — **Boake Carter**

KFPY KGAR KIRO KLZ KNX
 KOIN KOY KSFO KSL KVI KVOR

ED-9:00 p.m., E-8:00, C-7:00, M-6:00

B — **Philadelphia Symphony**

KFEL KGO KSO KVOD KWK
 KXYZ WBAL WBZ WBZA WEAN
 WEBR WENR WFIL WHAM WJTN
 WJZ WLS WMAI WREN WRD
 WSPD WSYR WTCN WXYZ

C — **Lux Radio Theater**

CFRB CKC KFAB KFH KFPY
 KLRK KLZ KMBC KMOX KNOW
 KNX KOH KOIN KOL KOMA
 KRLL KRNT KFSO KSL KTRH
 KTSK KTUL KVI WABC WADC
 WBBM WBNS WBRW WBT WCAU
 WCCO WDAE WDBJ WDRC WEEI
 WFBI WFBM WGAR WGST WHAS
 WHFC WHIO WIBX WISN WJAS
 WJR WJSV WKBW WRC WLAC
 WMAS WMBD WNAX WOKO WORC
 WPRO WQAM WREC WRVA WWL
 Also on Canadian Network

B — **Phil Spitalny's Girl Orchestra**

CBL CBM KDYL KFI KGHK KGIR
 KGC KHQ KIDO KOA KOMO KPO
 KPRC KSD KSEI KSTP KTR
 KVOO KYW WAVE WBN WBRW
 WCAE WCSH WDAF WDEL WFAF
 WFAA WFBF WFLA WGY WHO
 WIBA WIOD WIRE WIS WJAR
 WJAX WKY WLW WMAQ WMC
 WNC WNAC WOAI WOW WPTF
 WRC WSB WSM WSMC WSPC
 WTAG WTAM WTAR WTIC WTMJ
 WWJ

ED-10:00 p.m., E-9:00, C-8:00, M-7:00

R — **Contented Program**

CFCF CRCT KDYL KFI KGW KHQ
 KOA KOMO KPO KPCR KSD KYW
 WBN WCAE WCSH WDAF WFAF
 WEEI WFBF WFLA WGY WHO
 WIOD WIS WJAR WJAX WKY
 WMAQ WMC WOAI WOW WPTF
 WRC WRVA WSB WSM WTAG
 WTAM WTAR WTIC WWJ WWNC
 Also on Canadian Network

B — **Warden Lewis E. Laves**

KDKA KECA KFSO KGA KGO

MONDAY (Continued)

KJR KLO KOIL KSO KVOD KWK WBAL WBZ WBZA WCKY WEAN WEBC WENR WFIL WHAM WIKK WICC WJZ WMAL WMT WOWO WREN WSPD WSYR WTCN WXYZ

C — Wayne King and Orchestra
KDB KERN KFAB KFBK KFPY KFRG KGB KHJ KLZ KMBC KMJ KMOX KOIN KOL KRNT KSL KVI KWG WAAB WABC WADC WBBM WBNS WBT WCAO WCAU WCCO WDRC WEAN WFHL WFBM WHAF WIKK WIBW WJAS WJR WJSV WKBW WKRC WOKO WSPD WWL

ED-10:30 p.m., E-9:30, C-8:30, M-7:30
C — Eddie Cantor; Deanna Durbin
KFPY KGAR KIRO KLZ KNN KOIN KOY KSFQ KSL KVI WFBM
R — Burns and Allen
KARK KDYL KFBK KFI KFYZ KFBK KGHK KGR KGNC KGO KGW KHQ KML KOA KOMO KPO KPRC KSD KSTP KTAR KTBS KVOO KWG WAVE WDAF WDAY WEEB WFAA WIHA WJDX WKY WMC WOAI WOW WSB WSMB WTMJ

M — The Lone Ranger
KDB KDON KPRC KFPM KGB KGDM KHJ KPMC KVOE KXO
Available also to West Coast Section

ED-11:00 p.m., E-10:00, C-9:00, M-8:00
C — Entertainment; Jack Fulton
KERN KFAB KFBK KFPY KFRG KGB KHJ KLRA KLZ KMBC KMOX KOIN KOL KOMA KRLD KRNT KSL KTRH KTSK KVI WBBM WBRG WCCO WFBM WGST WLAC WREC WWL

R — Amos 'n' Andy
KDYL KERN KFBK KFI KGW KHQ KML KOA KOMO KPO KPRC KSD KWG WDAF WFAA WHO WIRE WKY WMAQ WMC WOAI WOV WSB WSM WSMB

ED-11:30 p.m., E-10:30, C-9:30, M-8:30
C — Pick and Pat
KFPY KGKO KLRA KLZ KMOX KNN KOIN KOL KOMA KRLD KRNT KSCJ KSFQ KSL KTUL KVI KWKH WACO WBRG WCCO WFBM WHAS WLAC WREC

TUESDAY

ED-6:30 p.m., E-5:30, C-4:30, M-3:30
C — Boake Carter. See Monday

ED-6:45 p.m., E-5:45, C-4:45, M-3:45
B — Lowell Thomas. See Monday

ED-7:00 p.m., E-6:00, C-5:00, M-4:00
C — Jack Fulton. See Monday
R — Amos 'n' Andy. See Monday
B — Easy Aces

KDKA KDYL KFI KGW KHQ KOA KOIL KOMO KPO KSO KWK WBAL WBZ WBZA WCKY WENR WFIL WGAR WHAM WHIO WIRE WJZ WMAL WMT WSYR WXYZ

ED-7:15 p.m., E-6:15, C-5:15, M-4:15
C — Geo. McCall, Hollywood Talk
KFAB KFH KLRA KMOX KNOW KOMA KRLD KRNT KTRH KTSK KWKH WABC WADC WBBM WBNS WBT WCAO WCAU WCCO WCHS WDAE WDBO WDOO WDRC WEEI WFBL WGAR WGBL WGST WHAS WHEC WHIO WIBW WISN WJAS

WJR WJSV WKRC WLAC WMAS WMBR WOC WOKO WORC WPRO WQAM WREC WRVA WWL

ED-7:30 p.m., E-6:30, C-5:30, M-4:30
C — Helen Menken, Drama
KFAB KFPY KIRO KLZ KMBC KMOX KNN KOIN KRNT KSFQ KSL KVI WABC WBBM WCAO WCAU WDRC WEEI WFBL WGAR WGR WHAS WREC WHIO WJAS WJR WJSV WKRC WOKO WORC WPRO

B — Dorothy Thompson; News
WBAL WBZ WBZA WENR WHAM WJZ WJSV

ED-8:00 p.m., E-7:00, C-6:00, M-5:00
R — Johnny with Russ Morgan
KFYR KPRC KSD KSTP KTBS KTHS KVOO KYW WAVE WBAP WBBM WCAE WCHS WDAF WDAY WEAFF WEEB WFFF WFLA WGY WHO WIHA WIOD WIS WJAR WJAX WJDX WKY WLW WMAQ WMC WNAC WOW WPTF WRV WRYA WSB WSM WSMB WSOB WSUN WTG WTAM WTRT WTIC WTMJ WWJ WWNC

C — Edward Robinson; Claire Trevor
CRM CFRB KFAB KFH KFPY KIRO KLRA KLZ KMBC KMOX KNOW KNN KOIN KOMA KRLD KRNT KSCJ KTRH KTSK KTRH KTSK KTUL KVI WABC WADC WBBM WBNS WBRG WBT WCAO WCAU WCCO WDAE WDJR WDRC WEEI WFBL WFBM WGAR WGR WGST WHAS WHEC WHIO WIBX WISN WJAS WJR WJSV WKRC WLAC WMAS WMBD WNAX WOKO WORC WPRO WQAM WREC WRVA WWL
Also on Canadian Network

ED-8:30 p.m., E-7:30, C-6:30, M-5:30
C — Al Jolson; Parkyakarkus
CFRB CRM KFAB KFH KLRA KMBC KMOX KNOW KOMA KRLD KRNT KTRH KTSK KTUL WABC WADC WBBM WBNS WBRG WBT WCAO WCAU WCCO WDAE WDBJ WDRC WEEI WFBL WFBM WGAR WGR WGST WHAS WHEC WHIO WIBX WISN WJAS WJR WJSV WKRC WLAC WMAS WMBD WNAX WOKO WORC WPRO WQAM WREC WRVA WWL
Also on Canadian Network

R — Wayne King and Orchestra
KFYR KPRC KSD KSTP KTBS KVOO KYW WAVE WBAP WBBM WCAE WCKY WCHS WDAF WDAY WEAFF WEEB WFFF WFLA WGY WHO WIHA WIOD WIS WJAR WJDX WKY WMAQ WMC WOAI WOW WRC WSB WSM WSMB WTG WTAM WTRT WTIC WTMJ WWJ

ED-8:45 p.m., E-7:45, C-6:45, M-5:45
C — Boake Carter. See Monday

ED-9:00 p.m., E-8:00, C-7:00, M-6:00
C — Al Pearce and Gang
CFRB CKAK KFAB KFH KGKO KLRA KMBC KMOX KOMA KRLD KRNT KSCJ KTRH KTSK KTUL KWKH WABC WACO WADC WALA WBBM WBGH WBNS WBRG WBT WCAO WCAU WCCO WDAE WDBJ WDBO WDNOC WDOO WDRC WEAN WFBL WFBM WFAE WGST WHAS WHEC WHIK WHIP WIBW WIBX

WICC WISN WJAS WJR WJSV WKBH WKBW WKBW WKRC WLAC WLWB WMSB WMBD WMBG WMBR WMNN WNAC WNAX WNEF WNOX WOC WOKO WORC WOV WQV WQAM WREC WSBT WSPA WSJS WSPD WTOG WWL

R — Vox Pop; Sidewalk Interviews
KSD KYW WBBN WCAE WCKY WCHS WDAF WEAFF WEEI WFFF WGY WHO WIRE WJAR WMAQ WOW WRC WTG WTAM WTRT WWJ

B — Horace Heidt Orchestra
KANS KDKA KFI KFSB KGA KGO KGW KJR KLO KOIL KPRC KSO KTHS KVOD KWK WAVE WBAL WBAP WBZ WBZA WEAN WEBR WFIL WFLA WHAM WHK WICC WIOD WIS WJAX WJZ WKY WLS WLW WMAL WMC WMT WOAI WPTF WREN WSB WSM WSMB WSOB WSPD WSUN WSYR WTRT WTCN WXYZ

ED-9:30 p.m., E-8:30, C-7:30, M-6:30
C — Benny Goodman's Orchestra
KFAB KFH KFPY KGKO KIRO KLRA KLZ KMBC KMOX KNOW KNN KOIN KOMA KOY KRLD KRNT KSCJ KSFQ KSL KTRH KTRH KTSK KTUL KVI KVOR KWKH WABC WACO WADC WALA WBBM WBGH WBNS WBRG WBT WCAO WCAU WCCO WCHS WDAE WDBJ WDBO WDNOC WDOO WDRC WEEI WFBL WFBM WGAR WGST WHAS WHEC WHIO WHP WIBW WIBX WISN WJAS WJR WJSV WKBH WKBW WKBW WKRC WLAC WLWB WMAS WMBD WMBR WNAX WNEF WNOX WOC WOKO WORC WPG WPRO WQAM WREC WRVA WSBT WSPA WSJS WTOG WWL

R — Fibber McGee and Molly
CFRC CRCT KDYL KFI KGHK KGW KHQ KOA KOMO KPO KPRC KSD KSTP KTAR KTBS KVOO KYW WAVE WBAP WBBM WCAE WCOL WCSB WCHS WDAF WDEL WEAFF WEEB WFFF WFLA WGY WHO WIHA WIOD WIRE WIS WJAR WJAX WKY WMAQ WMBG WMC WNAC WOAI WOOD WOW WRC WSB WSM WSMB WSOB WTG WTAM WTRT WTIC WTMJ WWJ

ED-10:00 p.m., E-9:00, C-8:00, M-7:00
C — Time To Shine
Station list not available.

ED-10:30 p.m., E-9:30, C-8:30, M-7:30
R — Jimmy Fidler Hollywood Gossip
KDYL KFI KGW KHQ KOA KOMO KPO KSD KTAR KYW WBBN WCAE WCHS WDAF WEAFF WFFF WGY WHO WJAR WLW WMAQ WRC WOOD WOW WRC WTG WTAM WTRT WWJ

ED-10:45 p.m., E-9:45, C-8:45, M-7:45
R — Dale Carnegie; Winning Friends
KDYL KFI KGW KHQ KOA KOMO KPO KSD KSTP KYW WBBN WCAE WCHS WDAF WDEL WEAFF WFFF WGY WHO WIRE WJAR WLW WMAQ WTNAC WOV WRC WTG WTAM WTRT WWJ

ED-11:00 p.m., E-10:00, C-9:00, M-8:00
R — Amos 'n' Andy. See Monday

TUESDAY (Continued)

ED-11:15 p.m., E-10:15, C-9:15, M-8:15
C — **Geo. McCall, Hollywood Talk**
KFPY KIRO KLZ KMBC KNX
KOLN KSFO KSL KVI

ED-11:30 p.m., E-10:30, C-9:30, M-8:30
C — **Al Jolson; Parkyakarkus**
KFPY KLZ KNX KOLN KOL KSFO
KSL KVI
Also on Canadian Network

ED-Midn't., E-11:00, C-10:00, M-9:00
C — **Al Pearce and Gang**
KFBB KFPY KGVO KLZ KNX
KOH KOIN KOL KOY KSFO KSL
KVI KFOR

WEDNESDAY

ED-6:30 p.m., E-5:30, C-4:30, M-3:30
C — **Boake Carter, see Monday**

ED-6:45 p.m., E-5:45, C-4:45, M-3:45
B — **Lowell Thomas, see Monday**
C — **Lum and Abner, see Monday**

ED-7:00 p.m., E-6:00, C-5:00, M-4:00
C — **Jack Fulton, see Monday**
R — **Amos 'n' Andy, see Monday**
B — **Easy Aces, see Tuesday**

ED-7:15 p.m., E-6:15, C-5:15, M-4:15
R — **Uncle Ezra, see Monday**

ED-7:30 p.m., E-6:30, C-5:30, M-4:30
M — **Lone Ranger, see Mon.**

ED-7:45 p.m., E-6:45, C-5:45, M-4:45
R — **"Cheer Up"; Henry Burbig**
KYW WEAF WENR WTAM

ED-8:00 p.m., E-7:00, C-6:00, M-5:00
C — **Cavalcade of America**
KDB KERN KFAB KFBK KFPY
KPRC KGB KHJ KLZ KMBC KMJ
KMOX KOIN KOL KRLD KRNT
KSL KVI KWG WABC WBBM
WBNS WCAU WCCO WDRC WEAN
WFBL WFBM WGR WHAS WHC
WHK WJAS WJR WJSV WKRC
WLAC WMBG WNAC WOKO WTOC
WVL

R — One Man's Family
KDYL KFI KFYR KGW KHQ KOA
KOMO KPO KPRC KSD KSTP
KTAR KTBS KTBS KVOO KYW
WAPI WAVE WBAP WBEN WCAE
WCBS WDAF WDAY WEAF WECB
WEEI WFAA WFBR WFLA WGY
WHO WIBA WIOD WIS WJAR
WJAX WJDX WKY WLW WMAQ
WMC WOAI WOW WPTF WRC
WRVA WSB WSM WSMB WSOB
WSUN WTAG WTAM WTAR WTIC
WTMJ WWJ WWCN
Also on Canadian Network

ED-8:30 p.m., E-7:30, C-6:30, M-5:30
C — **Ben Bernie; Lew Lehr**
KDAL KFAB KFBB KFH KFPY
KGAR KGKO KGLO KIRO KLR
KLZ KMBC KMOX KNOW KNX
KOH KOIN KOMA KOY KRLD
KRNT KSCJ KSFO KSL KTRH
KTSa KTUL KVI KFOR KWKH
WABC WACO WALA WBBM WBIG
WBNS WBT WCAO WCAU WCCO
WCHS WCOA WCOB WDAE WDBJ
WDBO WDNC WDOD WDRC WEEI
WEOA WFBL WFBM WGR WGBI
WGST WHAS WHEC WHIO WHLB
WHP WIBW WIBX WISN WJAS
WJNO WJR WJSV WKBB WKBH
WKWB WKRC WLAC WLBZ WMAS

WMBD WMBR WMFG WMMN
WNAX WNBK WNBX WNOX WOC
WOKO WORC WPG WPRO WQAM
WREC WRVA WSBT WSFA WSJS
WTAR WTOC WWL

B — Harriet Parsons
KDKA KECA KFEL KFSO KGA
KGO KJR KLO KOIL KSO KWK
WBAL WBZ WBZA WCKY WVA
WEBR WFIL WIAM WIHk WICC
WJZ WLS WMAL WMT WOWO
WREN WSPD WSYR WNYZ

R — Tommy Dorsey Orchestra
KDYL KFI KGW KHQ KOA KOMO
KPO KPRC KSD KSTP KTBS KYW
WAVE WBEN WBRC WCAE WCBS
WDAF WDEL WEAF WFAA WFBR
WFLA WGY WHO WIOD WIRE
WIS WJAR WJAX WKY WLW
WMAQ WMBG WMC WNAC WOOD
WOW WPTF WRC WSB WSM
WSMB WSUN WTAG WTAM WTAR
WTIC WWJ WWCN

ED-8:45 p.m., E-7:45, C-6:45, M-5:45
C — **Boake Carter, see Monday**

ED-9:00 p.m., E-8:00, C-7:00, M-6:00
C — **Chesterfield; Andre Kostelanetz**
KDB KERN KFAB KFBK KFH
KFPY KPRC KGB KGKO KGBM
KHJ KLKA KLZ KMBC KMJ KMOX
KOH KOIN KOL KOMA KRLD
KRNT KSCJ KSL KTRH KTSa
KTUL KVI KFOR KWG KWKH
WABC WACO WADC WALA WBBM
WBIG WBNS WBRC WBT WCAO
WCAU WCCO WCOA WDAE WDBG
WDBO WDNC WDOD WDRC WEAN
WFBL WFBM WFAA WGST WHAS
WHEC WHK WHJ WIBW WIBX
WICC WISN WJAS WJR WJSV
WKBB WKRC WKRC WLAC WLBZ
WMAS WMBD WMBG WMBR
WNAC WNAX WNBK WNOX WOC
WOKO WORC WOWO WPG WQAM
WREC WSFA WSJS WSPD WTOC
WVL

R — Town Hall Tonight
KFIY KPRC KSD KSTP KTBS
KTHS KVOO KYW WAVE WBEN
WCAE WCBS WDAF WDAY WEAF
WECB WEEI WFAA WFBR WFLA
WGY WHO WIBA WIOD WIS WJAR
WJAX WJDX WKY WLW WMAQ
WMC WOAI WOW WPTF WRC
WSM WSMB WSOB WTAG WTAM
WTAR WTIC WTMJ WWJ WWCN

ED-10:00 p.m., E-9:00, C-8:00, M-7:00
C — **Crime Crusade; Phil Lord**
KDB KERN KFAB KFBK KFH
KFPY KPRC KGB KHJ KIRA KLZ
KMBC KMJ KMOX KOIN KOL
KOMM KRLD KRNT KSL KTRH
KTSa KTUL KVI KWG KWKH
WABC WACO WBBM WBNS WBRC
WBT WCAO WCAU WCOB WDAE
WDBJ WDBO WDRC WEEI WEOA
WFBL WFBM WGR WGR WGST
WHAS WHEC WHIO WHP WIBW
WISN WJAS WJR WJSV WKBB
WKRC WLAC WLBZ WMBD WMBR
WNAX WNOX WOC WOKO WORC
WPRO WQAM WRVA WREC WSFA
WTAG WWL

R — Kay Kyser Orchestra
KARK KDYL KERN KFBK KFI
KFIY KGBX KGHL KGIR KGNC
KGU KGW KHQ KIDO KMJ KOA
KOB KOMO KPO KPRC KSD KSEI
KSTP KTAR KTBS KTHS KTSM
KWG KYW WAVE WBEN WBRC

WCAE WCBS WCSH WDAF WDAY
WDEL WEAF WECB WFAA WFCB
WFBM WFEA WFLA WGL WGY
WHO WIBA WIOD WIRE WIS
WJAR WJAX WJDX WKY WLW
WMAQ WMBG WMC WNAC WOAI
WOOD WORK WOW WPTF WRC
WSB WSM WSMB WSOB WSUN
WTAG WTAM WTAR WTIC WTMJ
WWJ WWCN

ED-10:30 p.m., E-9:30, C-8:30, M-7:30
C — **It Can Be Done**
KFAB KMBC KMOX KRNT WABC
WBBM WBNS WCAU WCHS WDRC
WEEI WFBL WFBM WHAS WHEC
WHIO WIBX WJAS WJR WKWB
WMAS WNBK WOC WOKO WORC
WPRO

M — Lone Ranger, see Mon.

ED-11:00 p.m., E-10:00, C-9:00, M-8:00
C — **Jack Fulton, see Monday**
R — **Amos 'n' Andy, see Monday**

ED-11:30 p.m., E-10:30, C-9:30, M-8:30
C — **Ben Bernie; Lew Lehr**
KARM KFBB KFPY KGAR KIRO
KLZ KNX KOH KOIN KOMA KOY
KSFO KSL KVI

THURSDAY

ED-6:30 p.m., E-5:30, C-4:30, M-3:30
C — **Boake Carter, see Monday**

ED-6:45 p.m., E-5:45, C-4:45, M-3:45
B — **Lowell Thomas, see Monday**

ED-7:00 p.m., E-6:00, C-5:00, M-4:00
C — **Jack Fulton, see Monday**
R — **Amos 'n' Andy, see Monday**
B — **Easy Aces, see Tuesday**

ED-7:15 p.m., E-6:15, C-5:15, M-4:15
C — **Geo. McCall, see Tues.**

ED-7:30 p.m., E-6:30, C-5:30, M-4:30
C — **"We, The People,"**
KFAB KMBC KMOX KNOW KOMA
KRLD KRNT KSCJ KTRH KTSa
KTUL WABC WBBM WBNS WCAO
WCAU WCCO WDAE WDBO WDRC
WEEI WFLB WGR WGR WHAS
WHEC WHIO WHP WIBX WISN
WJAS WJR WJSV WKRC WMBD
WMBR WOC WOKO WPRO WQAM

ED-8:00 p.m., E-7:00, C-6:00, M-5:00
C — **Kate Smith; Jack Miller**
CFBK CRCM KDAL KFAB KFH
KGRG KIRA KMBC KMOX KNOW
KOMM KRLD KRNT KSCJ KTRH
KTSa KTUL KWKH WABC WACO
WADC WBBM WBNS WBRC WBT
WCAO WCAU WCOB WDAE WDBJ
WDBO WDOD WDRC WEEI WEOA
WFBL WFBM WGR WGR WGST
WHAS WHEC WHIO WHP WIBW
WISN WJAS WJR WJSV WKBB
WKRC WLAC WLBZ WMBD WMBR
WNAX WNOX WOC WOKO WORC
WPRO WQAM WRVA WREC WSFA
WTAG WWL

R — Rudy Vallee's Variety Hour
CFBC CRCT KDYL KFI KFYR
KGW KHQ KOA KOMO KPO KSD
KSTP KTAR KYW WBEN WCAE
WCBS WDAF WDAY WEAF WECB
WEEI WFBM WGY WHO WJAR
WLW WMAQ WOW WRC WTAM
WTIC WTMJ WWJ

THURSDAY (Continued)

B — The March of Time

KDKA KECA KERN KFBK KFEL
KPSD KGA KGO KJR KLO KMJ
KOIL KSO KWG KWK KXYZ
WABY WAGA WBAL WBSZ WBZA
WKCY WOOL WOSC WDSU WFEAN
WEBR WFIL WHAM WHIK WICC
WJZ WLS WMAL WMP'S WMT
WREN WSPD WSYR WXYZ

ED-8:45 p.m., E-7:45, C-6:45, M-5:45
C — Boake Carter, see Monday

ED-9:00 p.m., E-8:00, C-7:00, M-6:00

C — Major Bowes' Amateurs
CFRB CKAC KDB KERN KFAB
KFBK KFH KFPY KFRC KGB
KGKO KLRA KLZ KMBC KJJ
KMOX KOIN KOL KOMA KRLD
KRNT KSCJ KSL KTRH KTSa
KTUL KVI KVOR KWG KWKH
WABC WACO WADC WALA WBBM
WBIG WBNS WBRC WBT WCAO
WCAU WCCO WCOA WDAE WDBJ
WDBO WDNC WDDO WDRC WEAN
WFBL WFBM WFEA WGST WHAS
WHCC WHK WHP WJBW WJBX
WICC WISN WJAS WJR WJSV
WKBN WKBW WKRC WLAC WLBY
WMAS WMBD WMBG WMBR
WMNN WNAC WNAX WOC WOKO
WORC WOWO WPG WQAM WREC
WSFA WSJS WSPD WTOC WWL

R — MGM Program

CRCT KDYL KERN KFBK KFI
KFYR KGHJ KGR IR GNOC KGF
KMJ KOA KOMO KPO KPRC KSD
KSTP KTBS KWG KYW WAPI
WAYE WRAP WBEW WCAE WCSH
WDAF WDAY WDEB WEBR WFLA
WGY WHO WIBA WIOD WIS WJAR
WJAX WJDX WKY WLW WMAQ
WMBG WMC WNAC WOAI WOOD
WOW WPTF WRC WSB WSM
WSNH WSOE WSUN WTAG WTAM
WTAR WTIC WTMJ WWJ WWNC

ED-10:00 p.m., E-9:00, C-8:00, M-7:00

R — Bob Burns; Bing Crosby
CFPC CRCT KDYL KFI KFYR
KGW KHQ KOA KOMO KPO KPRC
KSD KSTP KTAR KTBS KTIS
KVOO KYW WAVE WHAP WBEW
WCAE WCSH WDAF WDAY WEAF
WBCB WEHI WFBW WFLA WGY
WHO WIBA WIOD WIS WJAR
WJAX WJDX WKY WLW WMAQ
WMBG WMC WNAC WOAI WOOD
WOW WPTF WRC WSB WSM
WSNH WSOE WSUN WTAG WTAM
WTAR WTIC WTMJ WWJ WWNC
Also on Canadian Network

ED-11:00 p.m., E-10:00, C-9:00, M-8:00

C — Jack Fulton, see Monday
R — Amos 'n' Andy, see Monday

ED-11:15 p.m., E-10:15, C-9:15, M-8:15

C — Kate Smith; Jack Miller
KFBK KFPY KGO KIRO KLZ
KNX KOIN KOY KSFQ KSL KVI
KVOR

FRIDAY

ED-6:30 p.m., E-5:30, C-4:30, M-3:30
C — Boake Carter, see Monday

ED-6:45 p.m., E-5:45, C-4:45, M-3:45

B — Lowell Thomas, see Monday
C — Lum and Abner, see Monday

ED-7:00 p.m., E-6:00, C-5:00, M-4:00

C — Jack Fulton, see Monday
R — Amos 'n' Andy, see Monday

ED-7:15 p.m., E-6:15, C-5:15, M-4:15

R — Uncle Ezra, see Monday

ED-7:30 p.m., E-6:30, C-5:30, M-4:30

M — Lone Ranger, see Mon.

ED-7:45 p.m., E-6:45, C-5:45, M-4:45

C — Boake Carter, see Monday

ED-8:00 p.m., E-7:00, C-6:00, M-5:00

R — Cities Service Concert
CRCT CFYR KOA KPRC KSD
KSTP KTBS KTIS KVOO KYW
WBAF WBEW WCAE WCSH WDAF
WDAY WEAF WBCB WEHI WFAA
WFBW WGY WHO WIBA WIOD
WJAR WKY WMAQ WOAI WOW
WRC WRVA WSAI WTAG WTAM
WTIC WTMJ WWJ

ED-8:30 p.m., E-7:30, C-6:30, M-5:30

C — Paul Whiteman; Deems Taylor
KFAB KFH KGKO KLRA KMBC
KMOX KOMA KRLD KRNT KSCJ
KTBS KTSa KTUL KWKH WABC
WACO WADC WALA WBBM WBIG
WBNS WBRC WBT WCAO WCAU
WCCO WCOA WDAE WDBJ WDBO
WDNC WDDO WDRC WEHI WFBL
WFBM WFEA WGR WGST WHAS
WHCC WHIO WHK WHP WJBW
WJBX WISN WJAS WJR WJSV
WKBN WKRC WLAC WLBY WMAS
WMBD WMBG WMBR WMNN
WNAX WNBW WNOX WOC WOKO
WORC WOWO WPG WPRO WQAM
WREC WSFA WSJS WSPD WTOC
WWL

B — Death Valley Days

KDKA KDYL KFI KGW KHQ KOIL
KOMO KPO KSO KWK WBAL WBZ
WBZA WFIL WGAR WHAM WJZ
WLS WLW WMAL WMT WREN
WSYR WXYZ

ED-8:45 p.m., E-7:45, C-6:45, M-5:45

C — Boake Carter, see Monday

ED-9:00 p.m., E-8:00, C-7:00, M-6:00

B — Royal Crown Revue
KDKA KFEL KLO KOIL KPRC
KSO KTAR KTBS KVOO KWK
WABY WAVE WBAL WBRC WBZ
WBZA WCSB WEAN WBCB WEBR
WFAA WFCB WFIL WFLA WHAM
WHK WICC WIOD WIS WJAX
WJDX WJZ WKY WLS WLW WMAL
WMC WMT WOAI WOW WPTF
WREN WROL WRTD WSB WSM
WSNB WSOE WSPD WSUN WSYR
WTAR WTGN WWNO WXYZ

C — Hollywood Hotel

CFRB CKAC KDR KERN KFAB
KFBK KFH KFPY KFRC KGB
KIJ KLRA KLZ KMBC KMJ KNOX
KOIN KOL KOMA KILD KRNT
KSCJ KSL KTRH KTSa KTUL KVI
KVOR KWG KWKH WABC WADC
WBBM WBNS WBRC WBT WCAO
WCAU WCCO WDAE WDBJ WDBO
WDRG WEAN WFBL WFBM WFEA
WGST WHAS WHCC WHK WHP
WIBW WIBX WICC WJAS WJR
WJSV WKBW WKRC WLAC WLBY
WMAS WMBD WMBG WMBR
WNAC WNAX WNOX WOKO WORC
WPG WQAM WREC WSPD WWL
Also on Canadian Network

R — Frank Munn; Abe Lyman
KSD KYW WBEW WCAE WCSH
WDAF WEAF WEHI WEBR WGY
WJAR WLW WMAQ WOW WRC
WTAG WTAM WWJ

ED-10:30 p.m., E-9:30, C-8:30, M-7:30

R — True Story Court
KSD KYW WBEW WCAE WCSH
WEAF WEHI WEBR WGY WHO
WHIO WJAR WMAQ WOW WRC
WTAG WTAM WTIC WWJ

ED-10:00 p.m., E-9:00, C-8:00, M-7:00

C — Alice Cornett; Reed Kennedy
KDAL KFAB KFBR KFH KFPY
KGKO KGLO KGVO KRLA KLZ
KMOX KNOW KNX KOH KOIN
KOL KOMA KOY KRLD KRNT
KSCJ KSFQ KSL KTRH KTSa
KTUL KVI KVOR KWKH WABC
WACO WADC WALA WBBM WBIG
WBNS WBRC WBT WCAO WCAU
WCCO WCHS WCOA WCCO WDAE
WDBJ WDBO WDNC WDDO WDRG
WEHI WEOA WFBL WFBM WGAR
WGBI WGST WHAS WHCC WHIO
WHP WIBW WIBX WISN WJAS
WJNO WJR WJSV WKBW WKBW
WKRC WLAC WLBY WMAS WMBD
WMBR WMNN WNBW WNOX WOC
WOKO WORC WPAR WPG WPRO
WQAM WREC WRVA WSPD WSFA
WSJS WTOC WWL

CBC — Canada 1938

CFB CBL CBM CHO CHR CWB
CFC CFCE CFCH CFEN CFEO
CFYQ CFJC CFNB CFNL CFQC
CHAB CHNS CHRS CHSL CHWK
CJAT CJCA CJCB CJIC CJKL
CJOC CRBI CKCK CKCW CKGB
CKOY CKOC CKPR CKSO CKX
CKY

R — First Nighter; Drama

KDYL KFI KFYR KGW KHQ KOA
KOMO KPO KPRC KSD KSTP
KTBS KTIS KYW WAVE WBEW
WCAE WCSH WDAF WDAY WEAF
WBCB WEHI WFAA WFBW WFLA
WGY WHO WIBA WIOD WIS WJAR
WJAX WJDX WKY WLW WMAQ
WMC WPTF WRC WRVA WSB
WSM WSMB WSOE WTAG WTAM
WTAR WTIC WTMJ WWJ WWNC

ED-10:30 p.m., E-9:30, C-8:30, M-7:30

M — Lone Ranger, see Mon.

R — Jimmy Fidler

KDYL KFI KGW KHQ KOA KOMO
KPO KSD KSTP KYW WBEW
WCAE WCSH WDAF WDEL WEAF
WFBW WGY WIBA WIRE WJAR
WLW WMAQ WNAC WOW WRC
WTAG WTAM WTIC WTMJ WWJ

ED-10:45 p.m., E-9:45, C-8:45, M-7:45

R — Dorothy Thompson — News
KDYL KFI KGW KHQ KOA KOMO
KPO KSD KSTP KYW WBEW WCAE
WCSH WDAF WDEL WEAF WFBW
WGY WIRE WJAR WLW WMAQ
WNAC WOW WRC WTAG WTAM
WTIC WWJ

ED-11:00 p.m., E-10:00, C-9:00, M-8:00

C — Jack Fulton, see Monday
R — Amos 'n' Andy, see Monday

ED-11:15 p.m., E-10:15, C-9:15, M-8:15

C — Boake Carter, see Monday

FRIDAY (Continued)

ED-11:30 p.m., E-10:30, C-9:30, M-8:30
C — Paul Whiteman; Deems Taylor
KFBB KFPY KGAR KGMB KGVO
KIRO KLZ KNX KOH KOIN KOY
KSFO KSL KVI KVOR

ED-Midn't., E-11:00, C-10:00, M-9:00
CBC — Northern Messenger
To Mideast and Western Networks

SATURDAY

ED-7:00 p.m., E-6:00, C-5:00, M-4:00
C — Saturday Night Swing Club
Available to Columbia Network

ED-7:30 p.m., E-6:30, C-5:30, M-4:30
C — Carborundum Band
KFAB KMBC KMOX WABC WBBM
WBST WCAO WCAU WCCO WEEI
WFBL WGR WGR WHAS WJAS
WJR WKRC WPRO

B — Uncle Jim's Question Bee
KDKA WBZ WBZA WGY WHK
WJZ WMAQ

ED-8:00 p.m., E-7:00, C-6:00, M-5:00
R — "Believe-it-or-not." Ripley
KANS KDYL KFYR KGNC KOA
KPRC KSD KSTP KYW WAPI
WAYE WBAP WBEW WCAE WCHS
WDAF WDAY WDEL WFAF WIBC
WFBC WFBZ WGY WHO WIBA
WIRE WJAR WKY WLW WMAQ
WMBG WNAZ WNC WOA1 WOOD
WOW WPTF WRC WSB WSMB
WSOC WSPD WTAG WTAM WTAR
WTIC WTMJ WWJ

ED-8:30 p.m., E-7:30, C-6:30, M-5:30
C — Johnny Presents Russ Morgan
KFAB KFH KMBC KMOX KRNT
WABC WADC WBBM WBG WBS
WBT WCAO WCAU WCCO WDAE
WDRC WEEI WFBL WFBM WGR
WGST WHAS WHEC WHIO WHK
WHF WISN WJAS WJR WJSV
WKAC WMBD WMBG WNBZ WOC
WOKO WPRO WSBT WWVA

ED-9:00 p.m., E-8:00, C-7:00, M-6:00
C — Prof. Quiz
KDB KERN KFAB KFBB KFPY
KPRC KGB KHJ KLRA KLZ KMBC
KNJ KMOX KOIN KOL KOMA
KRLD KRNT KSL KTRH KTSa
KVI KWG WABC WBBM WBNS
WBT WCAO WCAU WCCO WDAE
WDBO WDRC WEAN WFBL WFBM
WJAS WJR WJSV WKWB WKRC
WMBR WOKO WQAM WREC WSPD
WWL

B — National Barn Dance
KDKA KOIL KPRC KSO KTBS
KTIS KWK WABY WAPI WAYE
WBAL WBAP WBZ WBZA WFBL
WFLA WHK WHAM WHIO WIOD WIS
WIS WJAX WJDX WJZ WKY WLS
WMAL WMC WMT WOA1 WPTF
WREN WRVA WSB WSMB
WSOC WSN WSYR WTAR WVMC
WXYZ

ED-9:30 p.m., E-8:30, C-7:30, M-6:30
C — Saturday Night Serenade
KFAB KFH KFPY KGKO KLRA
KLZ KMBC KMOX KNOW KNX

KOIN KOL KOMA KRLD KSFO
KTRH KTSa KTUL KVI KWKH
WALA WBBM WBG WBNS WBRZ
WBT WCAO WCAU WCOA WDAE
WDBO WDOD WEEI WFBM WFBM
WGAR WGST WHAS WHEC WJAS
WJR WJSV WKWB WLAC WMBD
WMBR WMMN WNOX WOC WQAM
WREC WRVA WSEA WTOC WWL
WWVA

ED-10:00 p.m., E-9:00, C-8:00, M-7:00
C — Your Hit Parade
KERN KFAB KFBB KFH KFPY
KPRC KGB KGKO KGMB KHJ
KLRA KLZ KMBC KMJ KMOX
KOH KOIN KOL KOMA KRLD
KRNT KSCJ KSL KTRH KTSa
KTUL KVI KVOR KWG KWKH
WABC WACO WADC WALA WBBM
WBG WBNS WBRZ WBT WCAO
WCAU WCCO WCOA WDAE WDBJ
WDBO WDNC WDOD WDRC WEAN
WFBL WFBM WFEA WGST WHAS
WHEC WHK WHF WIBW WIBX
WICC WISN WJAS WJR WJSV
WKWB WKRC WLAC WLZ WMAS
WMBD WMBG WMBR WNAZ
WNAZ WNOX WOC WOKO WORC
WPG WQAM WREC WSBT WSEA
WSJS WSPD WTOC WWL WWVA

ED-11:00 p.m., E-10:00, C-9:00, M-8:00
B — National Barn Dance
KDYL KFI KFSB KFYR KGHL
KGIR KGU KGW KHQ KOA KOMO
KPO KSTP KTAR WDAY WIBC
WIBA WLW WTMJ

ED-11:30 p.m., E-10:30, C-9:30, M-8:30
C — Johnny Presents Russ Morgan
KFBB KFPY KGVO KIRO KLZ
KNX KOIN KSFO KSL KVI KVR

ED-Midn't., E-11:00, C-10:00, M-9:00
C — Professor Quiz
KFBB KFPY KIRO KNX KOH
KOIN KOY KSFO KSL KVI

R — "Believe-It-Or-Not." Ripley
KERN KFBB KFI KGW KHQ KMJ
KOMO KPO KWG

SUNDAY

ED-11:30 a.m., E-10:30, C-9:30, M-8:30

C — Major Bowes' "Family"
CFRB KERN KFAB KFBB KFBB
KFH KFPY KPRC KGB KGVO
KMBC KOH KOL KRLD KSL KTRH
KTSa KVI KVOR KWG KWKH
WABC WACO WADC WALA WBNS
WBRZ WCAO WCCO WDAE WDBJ
WDBO WDNC WESG WFBL WFEA
WHAS WHK WIBX WJAS WJR
WKRC WLZ WMBD WMBR
WMMN WOC WOKO WORC WPG
WQAM WSBT WSJS WSPD WTOC

ED-12:30 p.m., E-11:30 a.m., C-10:30, M-9:30

C — Salt Lake Tabernacle Choir
CFRB KFAB KFBB KFBB KFH
KFPY KPRC KGB KLZ KOH KOL
KRLD KSL KTRH KTSa KVI KVOR
KWG WABC WACO WADC WALA
WBG WBNS WBRZ WCAO WCCO
WDAE WDBJ WDBO WESG WFBL

WFEA WGR WHAS WICC WJAS
WJR WKRC WLBC WMBR WMMN
WOC WOKO WOC WQAM WSBT
WSJS WSPD WTOC

ED-1:00 p.m., E-Noon, C-11:00 a.m., M-10:00

C — Church of the Air
KFBB KFH KFPY KPRC KGB
KHJ KMOX KOH KOL KOMA KRLD
KRNT KSCJ KSL KTRH KTSa KVI
KVOR KWG WABC WALA WBNS
WBT WCAO WCCO WDAE WDBJ
WDBO WDRC WESG WFBM WFBM
WGR WHAS WHF WIBX WJAS
WJSV WKBN WKRC WLAC WLZ
WMBR WNBZ WOC WOKO WORC
WPG WQAM WREC WSBT WSJS
WSPD WTOC WWVA

ED-2:00 p.m., E-1:00, C-Noon, M-11:00 a.m.

B — Magic Key of RCA
CFPC CRCT KDKA KDYL KFI
KPYR KGU KGW KHQ KOA KOIL
KOMO KPO KPRC KSO KSTP KTBS
KTHS KVBO KWK WAPI WAVE
WBAL WBZ WBZ WCKY WDAY
WIBC WENR WFAA WFIL WFLA
WGR WHAM WHIO WIBA WIOD
WIRE WIS WJAX WJDX WJZ WKY
WMAL WMC WMT WOA1 WPTF
WREN WRVA WSB WSMB
WSOC WSYR WTAR WTMJ WVMC
WXYZ

ED-2:30 p.m., E-1:30, C-12:30, M-11:30 a.m.

C — Jean Hersholt. "Dr. Christian."
CFRB KFAB KFH KMBC KMOX
KNOW KOMA KRLD KRNT KSCJ
KTRH KTSa KWKH WABC WADC
WBBM WBNS WBRZ WBT WCAO
WCAU WCCO WCHS WDAE WDBO
WDRC WEEI WFBL WFBM WGR
WGST WHAS WHEC WHIO WHF
WIBW WJAS WJR WJSV WKWB
WKRC WLAC WLZ WMAS WMBR
WOKO WORC WPRO WQAM WREC
WRVA WWL

ED-3:00 p.m., E-2:00, C-1:00, M-Noon

C — N. Y. Philharmonic
CFRB CKAC KFAB KFBB KFH
KGKO KGVO KLRA KLZ KMBC
KMOX KNOW KOL KRLD KSCJ
KSL KTRH KTSa KWKH WABC
WADC WALA WBNS WBT WCAO
WCCO WCHS WDAE WDBJ WDBO
WDBO WEEI WESG WFBM WFBM
WHAS WHK WHF WIBW WIBX
WJAS WJR WJSV WKWB WBSN
WKWB WKRC WLAC WLZ WMAS
WMBD WMBG WMBR WMMN
WNBZ WOC WOKO WORC WPAR
WPRO WQAM WSBT WSJS WTAQ
WTOC WWL

Also on Canadian Network

R — The Radio News Reel
KSD KSTP KYW WBEW WCAE
WCHS WDAF WDEL WFAF WFBZ
WGY WHO WIRE WJAR WMAQ
WNAZ WOW WRV WSAI WTAG
WTAM WTIC WWJ

ED-4:30 p.m., E-3:30, C-2:30, M-1:30

R — The World Is Yours; Drama
Available to Red Network

SUNDAY (Continued)

ED-5:00 p.m., E-4:00, C-3:00, M-2:30
C — Magazine of the Air

CFRB CKAC KFAB KFPY KLZ
KMBC KMOX KNOW KNX KOIN
KOL KOMA KRLD KRNT KSFQ
KSL KTRH KTSR KTUL KVI
WABC WADC WBBM WBNS WCAO
WCAU WCCO WDAE WDRC WEEI
WGAR WGR WGST WHAS WHIEC
WHIO WJAS WJR WJSV WKRC
WMBR WOKO WORC WQAM WWL

R — Marion Talley

KDYL KFI KGW KHQ KOA KOMO
KPO KSTP KYW WBBN WCAE
WCOL WCSH WDAF WDEL WDFW
WDFB WFBY WGY WHO WIBA
WIRE WJAR WMAQ WNBC WOOD
WOW WRC WSAI WTAG WTAM
WTIC WTMJ WWJ

ED-5:30 p.m., E-4:30, C-3:30, M-2:30
C — Guy Lombardo and Orchestra

KFH KMBC KMOX KOMA KTUL
WAAB WABC WBNS WCAO WCAU
WDRC WEAN WFBL WFBM WGR
WHAS WHIEC WHK WIBX WICC
WJR WJSV WMAZ WOKO WORC
WSPD WVVVA

B — Smiling Ed McConnell

KANS KDKA KECA KERN KEX
KFBK KFSB KFYR KGA KGIR
KGO KJR KLO KMJ KOIL KSO
KTAR KWG KWK WAVE WBAL
WBZ WBZA WKY WCOL WDAY
WDSU WEAN WFCB WEBR WENR
WFIL WHAM WHK WICC WJZ
WMAL WMT WREN WRDZ WSM
WSPD WSYR WTCN WXYZ

R — Mickey Mouse Theater

KANS KDYL KFI KGNC KGW
KHQ KOA KOMO KPO KPRC KSD
KSTP KYVO KYW WAVE WBAP
WBBN WBRC WCAE WCSI WBZ
WDEL WDFW WFCB WFBY WFLA
WGY WHO WIBA WIOD WIRE
WIS WJAR WJAX WKY WLW
WMAQ WMBG WMC WNBC WOAI
WOOD WOW WPTF WRC WSB
WSM WSMB WSUN WTAG WTAM
WTAR WTIC WTMJ WWJ

ED-5:00 p.m., E-5:00, C-4:00, M-3:00
C — Joe Penner; Gene Austin

KFAB KFPY KGLO KLZ KMBC
KMOX KNOW KNX KOIN KOL
KOM A KRLD KRNT KSFQ KSL
KTRH KTSR KVI WABC WBBM
WBNS WBRC WBT WCAO WCAU
WCCO WDAE WDBO WDRC WEEI
WFBL WFBM WGR WGST WHAS
WHIEC WJAS WJR WJSV WKBW
WKRC WOKO WORC WPRO WQAM
WREX WRYA

M — George Jessel; Tommy Tucker
To entire MBS and Michigan Net-
works

ED-6:30 p.m., E-5:30, C-4:30, M-3:30
R — A Tale of Today
WBBN WDFW WGY WJAR WMAQ
WOW WRC WTAM

ED-7:00 p.m., E-6:00, C-5:00, M-4:00
R — Jack Benny; Mary Livingstone

KSD KYA KYW WBBN WCAE
WCSI WDAF WDFW WFBY WGY
WHO WJAR WLW WMAQ WNBC
WOW WRC WTAG WTAM WTIC
WWJ

Also on Canadian Network

ED-7:30 p.m., E-6:30, C-5:30, M-4:30
C — Phil Baker; Oscar Bradley

KLRA KLZ KRLD KTRH KTSR
KTUL KWKH WABC WACO WADC
WALA WBIG WBNS WBRC WBT
WCAO WCAU WCOA WDAE WDBJ
WDBO WDNC WDOB WDRC WEAN
WFBL WFBM WFEA WGR WGST
WHAS WHIEC WHK WIP WIBX
WICC WJAS WJR WJSV WKBN
WKRC WLAC WLZ WMAS WMBR
WNAC WNOX WOKO WORC WQAM
WREX WSBT WSEA WSJS WSMK
WSPD WTOC WWL WVVVA

B — Ozzie Nelson; Harriet Hilliard

KARK KDKA KECA KFEL KEX
KFSB KFYR KGA KGO KJR KLO
KOIL KPRC KSO KSTP KTAR
KTBS KTHS KVOO KWK WABY
WAPI WAVE WBAL WBAP WBZ
WBZA WBYZ WCOL WDAY WEAN
WFCB WEBR WFIL WFLA WHAM
WHK WIBA WICC WIOD WIS
WJAX WJDX WJZ WKY WLBZ
WLS WMAL WMC WMT WOAI
WPTF WREN WRDZ WSB WSM
WSMB WSOZ WSUN WSYR WTAR
WTMJ WVMC WXYZ

ED-8:00 p.m., E-7:00, C-6:00, M-5:00

R — Don Ameche; Edgar Bergen

CFBC CRCT KDYL KFI KFYR
KGW KHQ KOA KOMO KPO KPRC
KSD KSTP KTAR KTBS KVOO
KJY WAVE WBBN WCAE WCSI
WDAF WDAY WDFW WFCB WFLA
WFBY WFLA WGY WHO WIBA
WIOD WIRE WIS WJAR WJAX
WJDX WKY WLW WMAQ WMC
WNAC WOAI WOW WPTF WRC
WRYA WSB WSM WSMB WSOZ
WSUN WTAG WTAM WTAR WTIC
WTMJ WWJ WVMC

Also on Canadian Network

ED-8:30 p.m., E-7:30, C-6:30, M-5:30

M — Hawaii Calls

To full network and CBC French
Network

ED-9:00 p.m., E-8:00, C-7:00, M-6:00

C — Ford Concert

CFBC CKAC KDB KERN KFAB
KFBK KFH KFPY KPRC KQB
KGKO KILJ KLRA KLZ KMBC
KML KMOX KOH KOIN KOL KOMA
KRLD KRNT KSCJ KSL KTRH
KTSR KTUL KVI KVOR KWG
KWKH WABC WACO WADC WALA
WBBM WABC WBNS WBRC WBT
WCAO WCAU WCOO WCOA WDAE
WDBJ WDBO WDNC WDOB WDRC
WEAN WFBL WFBM WFLA WGR
WGST WHAS WHIEC WHK WIP
WIBY WJAX WICC WISN WJAX
WJR WJSV WKBN WKRC WLAC
WLZ WMAS WMBD WMBR WNBC
WNAC WOC WOKO WORC WQAM
WREX WSBT WSEA WSJS WSPD
WTOC WWL WVVVA

B — Tyrone Power; Drama

KDKA KECA KFSB KGA KGH
KGIR KGO KJR KLO KOIL KSO
KTAR KWK WHAL WBZ WBZA
WFCB WEBR WREN WFIL WGR
WHAM WICC WJZ WLW WMAL
WMT WREN WSYR WXYZ

R — Manhattan Merry-Go-Round

CFBC CRCT KDYL KFI KFYR KGW
KHQ KOA KOMO KPO KPRC KSD
KSTP KTBS KTHS KYW WAVE

WBBN WCAE WCKY WCSI WDAF
WDAY WDFW WDFW WEEI WFAA
WFBY WFLA WGY WHO WIBA
WIOD WIRE WIS WJAR WJAX
WJDX WKY WMAQ WMC WOAI
WOW WPTF WRC WRYA WSB
WSM WSMB WSOZ WTAG WTAM
WTAR WTIC WTMJ WWJ WVMC

ED-9:30 p.m., E-8:30, C-7:30, M-6:30

R — Album of Familiar Music

CFBC CRCT KDYL KFI KFYR
KGW KHQ KOA KOMO KPO KPRC
KSD KSTP KTBS KYW WAPI
WAVE WBBN WCAE WCSI WDAF
WDAY WDFW WDFW WEEI WFAA
WFBY WFLA WGY WHO WIBA
WIOD WIS WJAR WJAX WJDX
WKY WMAQ WMC WOAI WOW
WPTF WRC WRYA WSAI WSB
WSM WSMB WSOZ WTAG WTAM
WTAR WTMJ WWJ WVMC

B — Walter Winchell

KDKA KECA KEX KFSB KGA
KGLH KGIR KGO KJR KLO KOIL
KSO KTAR KWK WHAL WBZ
WBZA WENR WFIL WGR WHAM
WJZ WLW WMAL WMT WREN
WSYR WXYZ

ED-9:45 p.m., E-8:45, C-7:45, M-6:45

B — Irene Rich, Drama

KDKA KOIL KSO KWK WBAL
WBZ WBZA WCKY WEAN WEBR
WENR WFIL WHAM WHK WICC
WJZ WMAL WMT WREN WSPD
WSYR WTCN WXYZ

ED-10:00 p.m., E-9:00, C-8:00, M-7:00

R — Rising Musical Stars

KDYL KFI KGBN KGW KHQ KOA
KPO KPRC KSD KSTP KTAR KTBS
KTHS KYW WAVE WBAP WBBN
WCAE WCSI WDAF WDFW WFBY
WFLA WGY WHO WIBA WIOD
WIRE WIS WJAR WJAX WJDX
WKY WMAQ WMC WNBC WOAI
WOOD WOW WPTF WRC WRYA
WSB WSM WSMB WSOZ WTAG
WTAM WTAR WTIC WTMJ WWJ
WVMC

ED-10:30 p.m., E-9:30, C-8:30, M-7:30

B — Tyrone Power; Drama

KARK KPRC KTBS WAPI WAVE
WBAP WJDX WKY WMC WOAI
WSB WSM WSMB

ED-11:00 p.m., E-10:00, C-9:00, M-8:00

B — Irene Rich, Drama

KECA KERN KEN KFBK KFSB
KGA KGO KJR KLO KMJ KVOD
KWG WAPI WAVE WJDX WMC
WSB WSM WSMB

ED-11:15 p.m., E-10:15, C-9:15, M-8:15

B — Walter Winchell

KDYL KFI KFSB KGH
KGW KHQ KOA KOMO KPO KPRC
KTAR KTBS KTHS WAPI WAVE
WBAP WJDX WKY WMC WOAI
WSB WSM WSMB

ED-11:30 p.m., E-10:30, C-9:30, M-8:30

R — Jack Benny-Mary Livingstone

KDYL KERN KFBK KFI KFSB
KGLH KGIR KGU KGW KHQ
KIDO KMJ KOA KOMO KPO KTAR
KWG

CLASSIFIED INDEX TO CHAIN PROGRAMS

Time in Eastern Daylight

C—Columbia; R—National (Red); B—National (Blue); M—Mutual

COMEDY

Fred Allen, 9:00 p.m. Wed., Red
Phil Baker, 7:30 p.m. Sun., CBS
Jack Benny-Mary Livingstone, 7 and 11:30 p.m. Sun., Red

Edgar Bergen-Charlie McCarthy, 8 p.m. Sun., Red
Fannie Brice, 9 p.m. Thurs., Red
Henry Burbig, 7:45 p.m. Wed., Red
Bob Burns, 10:00 p.m. Thurs., Red
Burns and Allen, 8 and 10:30 p.m., Mon., Red
Eddie Cantor, 7:30 and 10:30 p.m. Mon., CBS
Arlene Harris, 9 and 12 p.m. Tues., CBS
George Jessel, 6:00 p.m. Sun., MBS
Al Jolson, 8:30 and 11:30 p.m. Tues., CBS
Lew Lehr, 8:30 and 11:30 p.m. Wed., CBS
Parkyakarkus, 8:30 and 11:30 p.m. Tues., CBS
Al Pearce, 9 and 12 p.m. Tues., CBS
Joe Penner, 8:00 p.m. Sun., CBS
Joe Rines, 5:30 p.m. Sun., Red

CONCERTS

Frank Black, 2:00 p.m. Sun., Blue
Ford Sunday Evening Hour, 9:00 p.m. Sun., CBS
Andre Kostelanetz, 9:00 p.m. Wed., CBS
N. Y. Philharmonic, 3:00 p.m. Sun., CBS
Philadelphia Symphony, 9:00 p.m. Sun., Blue

DANCE BANDS

Robert Armbruster, 8:00 p.m. Sun., Red
Ben Bernie, 8:30 and 11:30 p.m. Wed., CBS
Oscar Bradley, 7:30 p.m. Sun., CBS
Don Donnie, 9 p.m. Sun., Red
Tommy Dorsey, 8:30 p.m. Wed., Red
Edgar Fairchild, 7:30 and 10:30 p.m. Mon., CBS
Jan Garber, 8 and 10:30 p.m. Mon., Red
Al Goodman, 10:00 p.m. Sat., CBS
Benny Goodman, 9:30 p.m. Tues., CBS
Gustav Haenschen, 9:30 p.m. Sun., Red; 10:00 p.m. Fri., CBS
Phil Harris, 7 and 11:30 p.m. Sun., Red
Horace Heidt, 9:00 p.m. Tues., Blue
Richard Himber, 8 p.m. Mon., CBS
Carl Hoff, 9 and 12 p.m. Tues., CBS
Carl Hohengarten, 7 and 11 p.m. Mon. thru Fri., CBS
Hal Kemp, 10 p.m. Tues., CBS
Wayne King, 8:30 p.m. Tues., Red; 10 p.m. Mon., CBS

Benny Kreuger, 8:30 p.m. Mon., CBS
Kay Kyser, 10 p.m. Wed., Red
Guy Lombardo, 5:30 p.m. Sun., CBS
Abe Lyman, 9:00 p.m. Fri., Red
Frankie Masters, 10:30 p.m. Wed., CBS
Jack Miller, 8 and 11:15 p.m. Thurs., CBS
Billy Mills, 9:30 p.m. Tues., Red
Russ Morgan, 8:30 and 11:30 p.m. Sat., CBS; 8:00 p.m. Tues., Red
Ozzie Nelson, 7:30 p.m. Sun., Blue
Raymond Paige, 9:00 p.m. Fri., CBS
Ben Pollack, 6 and 11 p.m. Sun., CBS
B. A. Rolfe, 8:00 and 12:00 p.m. Sat., Red
Seymour Simons, 8:30 p.m. Sun., CBS
Harry Sosnik, 9 and 10:30 p.m. Sun., Blue
Phil Spitalny, 9 p.m. Mon., Red
Johnny Trotter, 10:00 p.m. Thurs., Red
Tommy Tucker, 6:00 p.m. Sun., MBS
Rudy Vallee, 8:00 p.m. Thurs., Red
Peter Van Steeden, 9:00 p.m. Mon., Red
Don Voorhees, 8:00 p.m. Wed., CBS
Mark Warnow, 7:30 and 10:30 p.m. Thurs., CBS; 5 p.m. Sun., CBS
Paul Whiteman, 8:30 and 11:30 Fri., CBS

Meredith Willson, 9:00 p.m. Thurs., Red
Victor Young, 8:30 and 11:30 p.m. Tues., CBS

DIALOG

Amos 'n' Andy, 7:00 and 11:00 p.m. Mon. through Fri., Red
Easy Aces, 7:00 p.m. Tues., Wed., Thurs., Blue
Fibber McGee and Molly, 9:30 p.m. Tues., Red
Lun and Abner, 6:45 p.m. Mon., Wed., Fri., CBS
Pick and Pat, 8:30 and 11:30 p.m. Mon., CBS
Stroud Twins, 8:00 p.m. Sun., Red
Tim and Irene, 9 p.m. Fri., Blue

DRAMA

Don Ameche, 8 p.m. Sun., Red
Campana's First Nighter, 10:00 p.m. Fri., Red
Death Valley Days, 8:30 p.m. Fri., Blue
Gang Busters, 10:00 p.m. Wed., CBS
Eddie Guest, 10:30 p.m. Wed., CBS
Jean Hersholt, 2:30 p.m. Sun., CBS
Hollywood Hotel, 9:00 p.m. Fri., CBS
Hollywood Playhouse, 9:00 and 11:30 p.m. Sun., Blue
Lone Ranger, 7:30 and 10:30 p.m. Mon., Wed., Fri., MBS
Lux Radio Theater, 9:00 p.m. Mon., CBS
Helen Menken, 7:30 p.m. Tues., CBS
One Man's Family, 8:00 p.m. Wed., Red
Tyrone Power, 9:00 and 10:00 p.m. Sun., Blue
Irene Rich, 9:45 and 11:00 p.m. Sun., Blue
Edward G. Robinson, 8:00 p.m. Tues., CBS
A Tale of Today, 6:30 p.m. Sun., Red
Those We Love, 8:30 p.m. Mon., Blue
Claire Trevor, 8:00 p.m. Tues., CBS
We, The People, 7:30 and 10:30 p.m. Thurs., CBS

POPULAR PROGRAMS

American Album of Familiar Music, 9:30 p.m. Sun., Red
Believe It Or Not, 8:00 and 12:00 p.m. Sat., Red
Major Bowes' Amateurs, 9:00 p.m. Thurs., CBS
Major Bowes' Family, 11:30 a.m. Sun., CBS
Carborundum Band, 7:30 p.m. Sat., CBS
Cavalcade of America, 8:00 p.m. Wed., CBS
Chase and Sanborn Hour, 8:00 p.m. Sun., Red
Cheer Up, America, 7:45 p.m. Wed., Red
Cities Service Concert, 8:00 p.m. Fri., Red
Contented Program, 10:00 p.m. Mon., Red
Death Valley Days, 8:30 p.m. Fri., Blue
Gang Busters, 10:00 p.m. Wed., CBS
Jack Haley's Variety Show, 8:30 p.m. Sat., Red
Hawaii Calls, 8:30 p.m. Sun., MBS
Hour of Charm, 9 p.m. Mon., Red
How To Win Friends and Influence People, 10:45 p.m. Tues., Red
It Can Be Done, 10:30 p.m. Wed., CBS
Jello Program, 7:00 and 11:30 p.m. Sun., Red
Johnny Presents—, 8:00 p.m. Tues., Red; 8:30 and 11:30 p.m. Sat., CBS
Just Entertainment, 7 and 11 p.m. Mon. thru Fri., CBS
Kraft Music Hall, 10:00 p.m. Thurs., Red
Warden Lawes, 10:00 p.m. Mon., Blue
Magazine of the Air, 5 p.m. Sun., CBS
Magic Key of RCA, 2:00 p.m. Sun., Blue
Manhattan Merry-Go-Round, 9:00 p.m., Sun., Red
March of Time, 8:00 p.m. Thurs., Blue
MGM Program, 9:00 p.m. Thurs., Red
Mickey Mouse Theater, 5:30 p.m. Sun., Red
Monday Night Show, 8 p.m. Mon., CBS
National Barn Dance, 9:00 and 11:00 p.m. Sat., Blue
Northern Messenger, 11:00 p.m. Sat., CBC
Jack Oakie's College, 9:30 p.m. Tues., CBS

Professor Quiz, 9:00 and 12:00 p.m. Sat., CBS
 Radio News Reel, 3:00 p.m. Sun., Red
 Royal Crown Revue, 9 p.m. Fri., Blue
 Salt Lake City Tabernacle, 12:30 p.m. Sun., CBS
 Saturday Night Serenade, 9:30 p.m. Sat., CBS
 Saturday Night Swing Club, 7:00 p.m. Sat., CBS
 Kate Smith Hour, 8:00 and 11:15 p.m. Thurs., CBS
 Songshop, 10:00 p.m. Fri., CBS
 Station E-Z-R-A, 7:15 p.m. Mon., Wed., Fri., Red
 Swing School, 10:00 p.m. Tues., CBS
 Time To Shine, 10 p.m. Tues., CBS
 Town Hall Tonight, 9:00 p.m. Wed., Red
 True Story Court, 9:30 p.m. Fri., Red
 Uncle Jim's Question Bee, 7:30 p.m. Sat., Blue
 Vick's Open House, 7:00 p.m. Sun., CBS
 Voice of Firestone, 8:30 p.m. Mon., Red
 Vox Pop, 9:00 p.m. Tues., Red
 Waltz Time, 9:00 p.m. Fri., Red
 Watch the Fun go By, 9:00 and 12:00 p.m. Tues., CBS
 We, The People, 7:30 p.m. Thurs., CBS
 Your Hit Parade, 10:00 p.m. Sat., CBS

SINGERS

Stuart Allen, 10:00 p.m. Sat., CBS
 Gene Austin, 6:00 p.m. Sun., CBS
 Kenny Baker, 7:00 and 11:30 p.m. Sun., Red
 Henry Burr, 9:00 and 11:00 p.m. Sat., Blue
 Rachel Carlay, 9:00 p.m. Sun., Red
 John Carter, 8 p.m. Sun., Red
 Buddy Clark, 8:30 and 11:30 p.m. Wed., CBS
 Alice Cornett, 10:00 p.m. Fri., CBS
 Richard Crooks, 8:30 p.m. Mon., Red
 Bing Crosby, 10:00 p.m. Thurs., Red
 Jean Dickenson, 9:30 p.m. Sun., Red
 Deanna Durbin, 7:30 and 10:30 p.m. Mon., CBS
 Mary Eastman, 9:30 p.m. Sat., CBS
 Jack Fulton, 7:00 and 11:00 p.m. Mon. through Fri., CBS
 Paula Gayle, 6 and 11 p.m. Sun., CBS
 Freda Gibson, 10:00 p.m. Sat., CBS; 9 p.m. Fri., Blue
 Harriet Hilliard, 7:30 p.m. Sun., Blue
 Al Jolson, 8:30 and 11:30 p.m. Tues., CBS
 Alan Jones, 9 p.m. Thurs., Red
 Reed Kennedy, 10:00 p.m. Fri., CBS
 Dorothy Lamour, 8:00 p.m. Sun., Red
 Frances Langford, 9:00 p.m. Fri., CBS
 Pierre Le Kreun, 9:00 p.m. Sun., Red
 Lullaby Lady, 10:00 p.m. Mon., Red
 Lulu Belle, 9:00 and 11:00 p.m. Sat., Blue
 Smiling Ed McConnell, 5:30 p.m. Sun., Blue
 Lucille Manners, 8:00 p.m. Fri., Red
 Tony Martin, 8:00 and 10:30 p.m. Mon., Red
 Frank Munn, 9:30 p.m. Sun., Red; 9:00 p.m. Fri., Red
 Frank Parker, 9 p.m. Fri., CBS
 Jane Pickens, 8:30 and 11:30 p.m. Wed., CBS
 Martha Raye, 8:30 and 11:30 p.m. Tues., CBS
 Kate Smith, 8:00 and 11:15 p.m. Thurs., CBS
 Margaret Speaks, 8:30 p.m. Mon., Red
 Marion Talley, 5:00 p.m. Sun., Red
 Kay Thompson, 8 p.m. Mon., CBS

TALKS

Dale Carnegie, 10:45 p.m. Tues., Red
 Boake Carter, 6:30 and 8:45 p.m. daily, CBS
 Jimmy Fidler, 10:30 p.m. Tues., Fri., Red
 Gabriel Heatter, 7:30 and 10:30 p.m. Thurs., CBS
 John B. Kennedy, 8:00 p.m. Sun., Blue
 Geo. McCall, 7:15 and 11:15 p.m. Tues., Thurs., CBS
 Harriet Parsons, 8:30 p.m. Wed., Blue
 Robert L. Ripley, 8:00 and 12:00 p.m. Sat., Red
 Deems Taylor, 9:00 p.m. Wed., CBS; 8:30 and 11:30 p.m. Fri., CBS
 Lowell Thomas, 6:45 p.m. Mon. through Fri., Blue
 Dorothy Thompson, 10:45 p.m. Fri., Red; 7:30 p.m. Tues., Blue
 Walter Winchell, 9:30 and 11:15 p.m. Sun., Blue

KYW's New Home

Official opening of KYW's new

ultra-modern home at 1619 Walnut Street, to be known as Philadelphia's Radio Center, will be held the week of May 16.

Previously scheduled for last November, the opening has been postponed because of the contractor's inability to receive essential construction materials, but at the present rate of applying the finishing touches, and barring unforeseen delays, the \$600,000 air-conditioned structure will be dedicated and opened for public inspection, with appropriate ceremony by the middle of May.

Save for the ground floor store area, the entire structure will be devoted to the broadcasting activities of KYW, which has rapidly outgrown the present cramped quarters on Chestnut Street. The new Radio Center will not only permit greater efficiency in daily operations; it also provides room for future expansion.

Two full floors, the fifth and sixth, have been reserved for television. According to Mr. Joy, no television equipment has been ordered, but present plans call for its installation no sooner than RCA and NBC have perfected their experimental equipment and received licenses and allocations from the Government.

"As regards television," said Mr. Joy, "KYW is fortunately situated. We happen to be at the terminus of the coaxial cable line which goes to New York, where the National Broadcasting Company has its television studios."

All the room units designed for broadcasting purposes are patterned after the system of studio suspension used so successfully by NBC in its Radio City headquarters. The studios are completely isolated shells protected against shocks and vibrations by an elaborate system of springs.

NORTH AMERICAN B. C. STATIONS BY FREQUENCIES

KEY TO SYMBOLS

As shown in the Index by
Frequencies and Dial Numbers

Frequency is given in kilocycles; wave lengths in meters. Night power is shown in watts in third column. Daytime power is shown in parentheses in fourth column in kilowatts, thus (.25) indicating 250 watts. Some stations outside the United States use a "split frequency." Their exact frequency is shown in fourth column.

<p>Second Column Symbols</p> <p>a Verifies reception for return postage.</p> <p>b Verifies only occasionally.</p> <p>c Does not verify.</p> <p>d Verification 10c; letter 25c.</p> <p>h Sends own station stamp for 10c.</p> <p>i Sends own station stamp for 5c.</p> <p>j Sends own station stamp for postage.</p> <p>k Has no stamps.</p> <p>m Verifies for 5c.</p>	<p>n Weather or time only.</p> <p>z No information available.</p> <p>Fourth Column Symbols</p> <p>B National "Blue" network.</p> <p>C Columbia network.</p> <p>D Day time only.</p> <p>Dn Day time with occasional evening hours.</p> <p>F Canadian Brdcastg. Corp.</p> <p>M Mutual Brdcastg. Sys.</p> <p>N National "Red" and "Blue" networks.</p> <p>P Has construction permit only.</p>	<p>R National "Red" network.</p> <p>S Sunday only.</p> <p>Sy Synchronized.</p> <p>X Has permit to increase power.</p> <p>Y Has permit to change location.</p> <p>Z Has permit to change frequency.</p> <p>a-b-c. Small letters show stations using same transmitter.</p> <p>1-2-3. Figures denote stations sharing time.</p> <p>.... No information.</p>
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The sign-on and sign-off time of stations is shown in Eastern Standard Time. "ss" means "sunset."

540 kcys. (555.2)

CJRM	ak	1000	F	Regina, Sask.	-9:30 am—1:30 am
ZNS	ak	400	....	Nassau, Bahamas	-1:30 pm—9:30 pm

550 kcys. (545.1)

CFNB	ak	500	F (1)	Fredericton, N. B.	-7:00 am—11:00 pm
KFUO	ak	500	2 (1)	St. Louis, Mo.	-8:00 am—Midnight
KFYR	ak	1000	N (5)	Bismarck, N. Dak.	-8:00 am—1:00 am
KOAC	ak	1000	....	Corvallis, Ore.	-Noon—Midnight
KSD	ak	1000	2R (5)	St. Louis, Mo.	
KTSA	ak	1000	C (5)	San Antonio, Tex.	
WDEV	ak	500	D	Waterbury, Vt.	
WGR	ak	1000	C (5)	Buffalo, N. Y.	-7:00 am—midnight
WKRC	ak	1000	C (5)	Cincinnati, Ohio	-6:30 am—....
WSVA	ak	500	D	Harrisonburg, Va.	
XEFC	ak	100	....	Merida, Yuc.	

560 kcys. (535.4)

KFDM	ak	500	(1) N	Beaumont, Texas	-8:30 am—2:00 am
KLZ	ak	1000	C (5)	Denver, Colo.	-10:00 am—4:00 am
KSFO	ak	1000	C (5)	San Francisco, Cal.	-6:00 am—....
KWTO	ak	5000	D	Springfield, Mo.	-7:00 am—midnight
WFIL	ak	1000	BM	Philadelphia, Pa.	-6:00 am—4:00 am
WIND	ak	1000	(5)	Gary, Ind.	-7:00 am—midnight
WIS	ak	1000	N (5)	Columbia, S. C.	-6:00 am—midnight
WOAM	ak	1000	C	Miami, Fla.	

570 kcys. (526.0)

CMCY	ak	5000	X	Havana, Cuba	-9:00 am—3:00 am
KGKO	ak	250	CXY(1)	Wichita Falls, Tex.	
KMTR	ak	1000	....	Los Angeles, Calif.	
KVI	ak	1000	C (5)	Tacoma, Wash.	
WKBN	ak	500	CI	Youngstown, Ohio	
WMCA	ak	1000	....	New York, N. Y.	
WNAX	ak	1000	C (5)	Yankton, S. Dak.	-6:45 am—....
WOSU	ak	750	1 (1)	Columbus, Ohio	-9:00 am—11:00 pm
WSYR	ak	1000	B (WSYU)	Syracuse, N. Y.	-7:00 am—1:00 am
WWNC	ak	1000	N	Asheville, N. C.	-7:30 am—1:00 am

580 kcys. (516.9)

CFPR	ak	50	....	Prince Rupert, B. C.	-8:00 am—midnight
CHRC	ak	100	....	Quebec, P. Q.	-8:00 am—midnight
CKCL	ak	100	F	Toronto, Ont.	-8:00 am—midnight
CKUA	ak	500	F	Edmonton, Alta.	
KMJ	ak	1000	N	Fresno, Calif.	-10:00 am—3:00 am

NORTH AMERICAN B. C. STATIONS BY FREQUENCIES

KSAC	ak	500	2 (1)	Manhattan, Kans.	—10:30 am—6:30 pm
WGSB	ak	500	C (1)	Charleston, W. Va.	
WDBO	ak	1000	C (5)	Orlando, Fla.	—7:00 am—midnight
WIBW	ak	1000	2C (5)	Topeka, Kans.	—5:00 am—
WILB	ak	1000	D	Urbana, Ill.	—9:00 am—ss
WTAG	ak	1000	R	Worcester, Mass.	—7:30 am—1:00 am
XELO	ak	10000	.....	Tijuana, B. Cfa.	—
XEMU	z	250	.....	Piedras Negras, Coah.	—

590 kcys. (508.2)

KHQ	ak	1000	R (5)	Spokane, Wash.	
WEEL	ak	1000	C (5)	Boston, Mass.	—6:45 am—
WKZO	ak	1000	BDX	Kalamazoo, Mich.	
WOW	ak	1000	R (5)	Omaha, Nebr.	—7:00 am—3:30 am

600 kcys. (499.7)

CFCF	ak	500	BF	Montreal, P. Q.	
CJOR	ak	500	.....	Vancouver, B. C.	—7:45 am—1:00 am
CMQ	ak	25000	.....	Havana, Cuba	
FQN	ad	250	609	St. Pierre, Miquelon	—
KFSD	ak	1000	B	San Diego, Calif.	
WCAO	ak	500	C (1)	Baltimore, Md.	
WICC	ak	500	BM (1)	Bridgeport, Conn.	—6:00 am—1:00 am
WMT	ak	1000	BM (5)	Cedar Rapids, Iowa	—6:30 am—1:00 am
WREC	ak	1000	C (5)	Memphis, Tenn.	—7:30 am—1:00 am
XEOJ	z	.....	.....	.....	.....
XET	ak	5000	.....	Monterrey, N. L.	—

610 kcys. (491.5)

KFRC	c	1000	M (5)	San Francisco, Cal.	
WGLE	ak	500	DM	Cleveland, Ohio.	—6:45 am—ss
WDAF	ak	1000	R (5)	Kansas City, Mo.	—7:30 am—1:00 am
WIOD	ak	1000	N(WMBF)	Miami, Fla.	
WIP	ak	1000	.....	Philadelphia, Pa.	—7:00 am—1:00 am
XEXM	z	500	2	Mexico City, D. F.	—
XEYO	z	500	2	Mexico City, D. F.	—

620 kcys. (483.6)

KGW	ak	1000	R (5)	Portland, Ore.	—9:00 am—2:00 am
KTRAR	ak	1000	N	Phoenix, Ariz.	—9:00 am—1:15 am
TIFP	z	2000	625	San Jose, Costa Rica	—
WFLA	ak	1000	Na (5)	Tampa, Fla.	—7:00 am—1:00 am
WHJB	ak	250	CD	Greensburg, Pa.	—8:00 am—5:00 pm
WLBZ	ak	500	CM (1)	Bangor, Maine	
WSUN	ak	1000	Na (5)	St. Petersburg, Fla.	—7:00 am—1:00 am
WTMJ	ak	1000	N (5)	Milwaukee, Wis.	—7:15 am—1:30 am

630 kcys. (475.9)

CFCO	ak	100	F	Chatham, Ont.	—8:00 am—10:30 pm
CFCY	ak	1000	F	Charlottetown, P.E.I.	—9:00 am—11:00 pm
CJRC	ak	500	F (1)	Winnipeg, Man.	—8:30 am—2:00 am
CKOV	ak	100	F	Kelowna, B. C.	—11:00 am—1:30 am
CMCD	ak	250	.....	Havana, Cuba	—10:00 am—1:30 am
KFRU	ak	500	I (1)	Columbia, Mo.	—7:00 am—9:30 pm
KGFX	ak	200	D	Pierre, S. Dak.	
WGBF	ak	500	N1 (1)	Evansville, Ind.	
WMAL	ak	250	B (.5)	Washington, D. C.	—6:30 am—2:00 am
WPRO	ak	500	C (1)	Providence, R. I.	—7:00 am—1:00 am
XEZ	z	500	.....	Merida, Yuc.	—
.....	z	10000	P	Havana, Cuba	—

640 kcys. (468.5)

KFI	ak	50000	R	Los Angeles, Calif.	—9:45 am—3:00 am
WGAN	z	500	DP	Portland, Maine	
WHKC	ak	500	.....	Columbus, Ohio	—6:30 am—8:15 pm
WOI	ak	5000	D	Ames, Iowa	
XEBX	z	250	.....	Sabinas, Coah.	
YSS	ak	500	.....	San Salvador, E. S.	

650 kcys. (461.3)

TIX	z	1000	.....	San Jose, C. R.	
WSM	ak	50000	MN	Nashville, Tenn.	—7:30 am—1:00 am

NORTH AMERICAN B. C. STATIONS BY FREQUENCIES

660 kcys. (454.3)

WAAW	ak	500	D	Omaha, Nebr.	-7:00 am—ss
WEAF	ak	50000	R	New York, N. Y.	-7:30 am—1:00 am
XEAL	z	1000	.....	Mexico City, D. F.	
XEAO	ak	250	Mexicali, B. Cfa.	

670 kcys. (447.5)

WMAQ	ak	50000	R	Chicago, Ill.	-7:00 am—1:00 am
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680 kcys. (440.9)

CMBQ	z	5000	P	Havana, Cuba	
CMCG	ak	1000	Havana, Cuba	-7:00 am—midnight
KFEQ	ak	2500	D	St. Joseph, Mo.	-7:00 am—ss
KPO	ak	50000	R	San Francisco, Cal.	-11:00 am—3:00 am
VAS	akn	2000	685	Glace Bay, N. S.	
VOWR	ck	500	681	St. John's, Nfld.	
WLAW	z	1000	D	Lawrence, Mass.	
WPTF	ak	1000	N (5)	Raleigh, N. C.	-6:30 am—11:00 pm

690 kcys. (434.5)

CFRB	ak	10000	C	Toronto, Ont.	-8:00 am—midnight
CJ CJ	ak	100	F	Calgary, Alta.	-9:30 am—1:00 am

700 kcys. (428.3)

WLW	ak	50000	MN (W8XO)	Cincinnati, O.	-5:45 am—1:30 am
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710 kcys. (422.3)

KIRO	ak	1000	C	Seattle, Wash.	-9:00 am—5:00 am
KMPC	ak	500	Beverly Hills, Calif.	-9:00 am—4:00 am
WOR	ak	50000	M	Newark, N. J.	-.....—2:00 am

720 kcys. (416.4)

CMK	ak	3000	.....	Havana, Cuba	
WGN	ak	50000	M	Chicago, Ill.	
XEH	ak	250	.....	Monterrey, N. L.	-10:00 am—9:00 pm

730 kcys. (410.7)

CFPL	ak	100	F	London, Ont.	-9:00 am—3:00 am
CJCA	ak	1000	F	Edmonton, Alta.	-9:00 am—2:00 am
CKAC	ak	5000	C	Montreal, P. Q.	-7:30 am—1:00 am
CKPR	ak	100	F	Fort William, Ont.	-9:00 am—11:00 pm
CMCL	z	10000	P	Havana, Cuba	
XEPN	ak	100000	.....	Piedras Negras, Coah.	-5:45 am—.....
XERB	z	100000	.....	Rosarito Bch., B. Cfa.	

740 kcys. (405.2)

KMMJ	ak	1000	D	Clay Center, Nebr.	-6:00 am—.....
KTRB	ak	250	D	Modesto, Calif.	-9:00 am—8:30 pm
WHEB	ak	250	D	Portsmouth, N. H.	
WSB	ak	50000	R	Atlanta, Ga.	-6:55 am—1:00 am

750 kcys. (399.8)

CMBL	z	2500	.....	Havana, Cuba	-8:00 am—12:15 am
KGU	aj	2500	N	Honolulu, Hawaii	-11:30 am—4:30 am
WJR	ak	50000	C	Detroit, Mich.	-5:45 am—2:00 am
XEAA	ak	200	Mexicali, B. Cfa.	
XEAM	z	25	Matamoros, Tams.	

760 kcys. (394.5)

CMHX	ak	200	Cienfuegos, Cuba	
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NORTH AMERICAN B. C. STATIONS BY FREQUENCIES

KXA	ak	250	(.5)X	Seattle, Wash.	—6:00 pm
WBAL	ak	2500	BMSy	Baltimore, Md.	—9:00 pm—1:00 am
WEW	ak	1000	D	St. Louis, Mo.	—8:00 am—ss
WJZ	ak	50000	BSy	New York, N. Y.	—7:30 am—1:00 am
XEOK	ak	2500		Tijuana, B. Cfa.	—All night station

770 kcys. (389.4)

CMBF	z	10000		Havana, Cuba	
KFAB	ak	10000	CSy	Lincoln, Nebr.	—7:00 am—1:00 am
WBBM	ak	50000	CSy	Chicago, Ill.	

780 kcys. (384.4)

CHIWK	dk	100	F	Chilliwack, B. C.	—11:00 am—1:15 am
CKSO	ak	1000	F	Sudbury, Ont.	—9:00 am—midnight
CMJK	ak	250		Camaguey, Cuba	—11:00 am—10:00 pm
KEHE	ak	1000	(5)	Los Angeles, Calif.	
KFDY	ak	1000	D	Brookings, S. Dak.	—1:30 pm—3 pm
KFQD	ck	250		Anchorage, Alaska	—11:00 pm—5:00 am
KGHL	ak	1000	N (5)	Billings, Mont.	—10:00 am—1:00 am
KWLK	z	250	DP	Longview, Wash.	
WEAN	ak	1000	BM (5)	Providence, R. I.	—6:00 am—
WMC	ak	1000	R (5)	Memphis, Tenn.	—7:45 am—1:00 am
WTAR	ak	1000	N	Norfolk, Va.	
XEN	ak	1000		Mexico City, D. F.	

790 kcys. (379.5)

CMGH	ak	500		Matanzas, Cuba	—10:00 am—3:00 am
KGO	ak	7500	B	San Francisco, Cal.	—7:00 am—1:00 am
KOAM	z	1000	DN	Pittsburg, Kans.	
WGY	ak	50000	R	Schenectady, N. Y.	—7:00 am—1:00 am

800 kcys. (374.8)

HIX	ak	800		Trujillo, D. R.	
WBAP	ak	50000	Na	Fort Worth, Texas	—6:45 am—midnight
WFAA	ak	50000	Na	Dallas, Texas	—9:00 am—12:30 am
WTBO	ak	250	D	Cumberland, Md.	—8:30 am—ss

810 kcys. (370.2)

CMCF	ak	600	X	Havana, Cuba	
WCCO	ak	50000	C	Minneapolis, Minn.	—7:30 am—1:00 am
WNYC	ak	1000	D	New York, N. Y.	—7:00 am—7:00 pm
XEBZ	ad	100		Mexico City, D. F.	—
XEDF	z	100		Nuevo Laredo, Tams.	—11:00 am—8:15 pm

820 kcys. (365.6)

CMHW	ak	100		Santa Clara, Cuba	
WHAS	ak	50000	C	Louisville, Ky.	—6:45 am—
XEBG	z	1000		Tijuana, B. Cfa.	

830 kcys. (361.2)

CMJX	ak	500		Camaguey, Cuba	—9:00 am—11:30 pm
KOA	ak	50000	R	Denver, Colo.	—9:00 am—2:00 am
WEU	ak	1000	D	Reading, Pa.	—8:00 am—5:00 pm
WHDH	ak	1000	Dn	Boston, Mass.	
WRUF	ak	5000	Dn	Gainesville, Fla.	—7:00 am—6:30 pm

840 kcys. (356.9)

CHL	ak	50000	F	Toronto, Ont.	
CFQC	ak	1000	F	Saskatoon, Sask.	
VOGY	ak	400		St. John's, Nfld.	
XERA	ck	250000		Villa Acuna, Coah.	—All night station

850 kcys. (352.7)

CMCM	ak			Havana, Cuba	—8:00 am—midnight
KIEV	ak	250	D	Glendale, Calif.	
WESG	ak	1000	CD	Elmira, N. Y.	—7:30 am—6:00 pm

NORTH AMERICAN B. C. STATIONS BY FREQUENCIES

WKAR	ak	1000	D	E. Lansing, Mich.	-7:00 am-5:00 pm
WWL	ak	10000	CX	New Orleans, La.	-6:30 am-1:00 am

860 keys. (348.6)

WABC	ak	50000	C (WBOQ)	New York, N. Y.	-7:30 am-1:00 am
WHB	ak	1000	DM	Kansas City, Mo.	
XEMO	ak	5000	.....	Tijuana, B. Cfa.	-9:45 am-3:00 am
XENC	z	50	.....	Mexico City, D. F.	

870 keys. (344.6)

WENR	ak	50000	Ba	Chicago, Ill.	-Noon-midnight
WLS	ak	50000	Ba	Chicago, Ill.	-6:30 am-3:00 pm
XEFB	ak	200	.....	Monterrey, N. L.	
XEJW	z	500	.....	Mexico City, D. F.	

880 keys. (340.7)

CBO	ak	1000	F	Ottawa, Ont.	-10:30 am-midnight
CFJC	ak	1000	F	Kamloops, B. C.	-12:30 pm-1:15 am
CMW	ak	1400	X	Havana, Cuba	-7:00 am-midnight
KFKK	ak	500	2M (1)	Greeley, Colo.	-7:30 am-1:00 am
KLX	ak	1000	.....	Oakland, Calif.	-10:30 am-2:30 am
KPOF	ak	1000	2	Denver, Colo.	
TIEP	ak	1000	.....	San Jose, Costa Rica	
WGOC	ak	500	CX (1)	Meridian, Miss.	-12:30 pm-10:30 pm
WGBI	ak	500	CI (1)	Scranton, Pa.	-12:30 pm-10:00 pm
WQAN	ak	500	1 (1)	Scranton, Pa.	-6:30 am-ss
WRNL	ak	500	D	Richmond, Va.	-10:00 am-11:00 pm
WSUI	ak	500	(1)	Iowa City, Iowa	

890 keys. (336.9)

KARK	ak	500	N (1)	Little Rock, Ark.	-7:00 am-1:00 am
KFNF	ak	500	2 (1)X	Shenandoah, Iowa	-6:30 am-1:00 am
KFPY	ak	1000	C (5)	Spokane, Wash.	-9:50 am-3:00 am
KUSD	ak	500	2	Vermillion, S. Dak.	
WBAA	ak	500	(1)	W. Lafayette, Ind.	-Noon-6:00 pm
WGST	ak	1000	C (5)	Atlanta, Ga.	
WJAR	ak	1000	R (5)	Providence, R. I.	-7:30 am-1:00 am
WMMN	ak	500	C (1)X	Fairmont, W. Va.	-7:00 am-1:00 am
XEK	ak	100	.....	Mexico City, D. F.	.....
XEW	ak	50000	.....	Mexico City, D. F.	

900 keys. (333.1)

KGBU	ak	500	X	Ketchikan, Alaska	.....-4:00 am
KHJ	ak	1000	M (5)	Los Angeles, Calif.	-9:30 am-1:00 am
KSEI	ak	250	(1)N	Pocatello, Idaho	-7:00 am-1:00 am
WBEN	ak	1000	R (5)	Buffalo, N. Y.	-6:00 am-ss
WELI	ak	500	D	New Haven, Conn.	-6:30 am-ss
WFMD	ak	500	D	Frederick, Md.	-6:45 am-1:00 am
WJAX	ak	1000	N (5)	Jacksonville, Fla.	-7:45 am-1:00 am
WKY	ak	1000	N (5)	Oklahoma City, Ok.	-9:00 am-5:00 pm
WLBL	ak	5000	D	Stevens Point, Wis.	-8:00 am-5:45 pm
WTAD	ak	1000	D	Quincy, Ill.	

910 keys. (329.6)

GBF	ak	50000	FN	Montreal, P. O.	.....-1:00 am
CKY	ak	15000	F	Winnipeg, Man.	-8:30 am-1:00 am
CJAT	ak	1000	F	Trail, B. C.	-10:00 am-2:00 am
XENT	ak	150000	.....	Nuevo Laredo, Tams.	

920 keys. (325.9)

CMX	ak	1000	X	Havana, Cuba	-8:00 am-1:00 am
KFEL	ak	500	Ma	Denver, Colo.	-8:00 am-2:30 am
KOMO	ak	1000	R (5)	Seattle, Wash.	
KPRC	ak	1000	R (5)	Houston, Texas	
KVOD	ak	500	Ba	Denver, Colo.	
WAAF	ak	1000	D	Chicago, Ill.	-6:00 am-ss
WORL	ak	500	D	Boston, Mass.	
WPEN	ak	1000	2	Philadelphia, Pa.	

NORTH AMERICAN B. C. STATIONS BY FREQUENCIES

WRAX	ak	1000	2	Philadelphia, Pa.	—.....
WSPA	ak	1000	D	Spartanburg, S. C.	
WWJ	ak	5000	R	Detroit, Mich.	—6:00 am—.....

930 keys. (322.4)

CFAC	ak	1000	F	Calgary, Alta.	—9:00 am—2:00 am
CFCH	ak	100	F	North Bay, Ont.	
CFCL	ak	100	.....	Prescott, Ont.	—7:00 am—10:00 pm
CHNS	ak	1000	F	Halifax, N. S.	—7:30 am—11:00 pm
CKPC	ak	100	F	Brantford, Ont.	
KMA	ak	1000	(5)	Shenandoah, Iowa	—6:00 am—.....
KROW	ak	1000	.....	Oakland, Calif.	—9:00 am—5:00 am
WBRC	ak	1000	R(5)	Birmingham, Ala.	—8:00 am—12:30 am
WDBJ	ak	1000	C(5)	Roanoke, Va.	—7:00 am—midnight
XEBH	ak	500	.....	Hermosillo, Son.	—1:00 pm—midnight

940 keys. (319.0)

KOIN	ak	1000	C(5)	Portland, Ore.	
VOAS	ak	100	.....	St. John's, Nfld.	
WAAT	ak	500	D	Jersey City, N. J.	—6:30 am—6:00 pm
WAVE	ak	1000	N	Louisville, Ky.	—8:00—1:00 am
WCSH	ak	1000	R(2.5)	Portland, Maine	—8:00 am—midnight
WDAY	ak	1000	N(5)	Fargo, N. Dak.	—6:00 am—1:00 am
WHA	ak	5000	D	Madison, Wis.	—9:00 am—5:30 pm
WICA	ak	250	D	Ashtabula, Ohio	
XEFO	ak	5000	.....	Mexico City, D. F.	

950 keys. (315.6)

CJOC	ak	100	F	Lethbridge, Alta.	—9:00 am—1:00 am
CMBC	z	10000	.....	Havana, Cuba	—6:55 am—midnight
CRCK	ak	1000	F	Quebec, P. Q.	
KFWB	ak	1000	(5)	Hollywood, Calif.	—9:30 am—4:00 am
KMBC	ak	1000	C(5)	Kansas City, Mo.	—6:55 am—1:00 am
WIAL	z	500	DP	Saginaw, Mich.	
WRC	ak	500	RX(1)	Washington, D. C.	—6:00 am—.....

960 keys. (312.3)

CFRN	ak	100	F	Edmonton, Alta.	—9:30 am—2:00 am
CHNC	ak	1000	F	New Carlisle, P. Q.	—7:30 am—11:00 pm
CMKS	z	.....	.....	Guantanamo, Cuba	
CRCY	ck	100	F	Toronto, Ont.	
XEAW	c	100000	.....	Reynosa, Tams.	—5:45 am—.....

970 keys. (309.1)

CMBY	z	150	.....	Havana, Cuba	—8:55 am—11:00 pm
KJR	ak	5000	B	Seattle, Wash.	
WCFL	ak	5000	N	Chicago, Ill.	
WIBG	ak	100	D	Glenside, Pa.	

980 keys. (306.0)

KDKA	bk	50000	B	Pittsburgh, Pa.	
XEAC	ak	1000	.....	Tijuana, B. Cfa.	
XEFC	z	250	z	Nuevo Laredo, Tams.	

990 keys. (302.8)

WBZ	ak	50000	BSy	Boston, Mass.	—6:00 am—1:00 am
WBZA	ak	1000	BSy	Springfield, Mass.	—6:00 am—1:00 am
XEAF	ak	750	.....	Nogales, Son.	
XES	ak	250	.....	Tampico, Tams.	

1000 keys. (299.8)

CMBZ	ak	500	(1) X	Havana, Cuba	—7:45 am—midnight
KFVD	ak	1000	Dn	Los Angeles, Calif.	—9:00 am—8:15 pm
VOCM	z	200	1006	St. John's, Nfld.	

NORTH AMERICAN B. C. STATIONS BY FREQUENCIES

WHO ak 50000 R Des Moines, Iowa —8:00 am—2:00 am
 XEBI ak 25 Aguascalientes, Ags.

1010 kcys. (296.9)

CHML ak 100 F Hamilton, Ont. —8:00 am—midnight
 CKCD ak 100 1 Vancouver, B. C.
 CKCK ak 1000 F Regina, Sask. —9:30 am—2:00 am
 CKCO ak 100 F Ottawa, Ont. —Noon—11:30 pm
 CKIC ak 50 Wolfville, N. S.
 CKWX ak 100 1 Vancouver, B. C. —Noon—4:00 am
 CMJA ak 300 Camaguey, Cuba
 KGGF ak 1000 2M Coffeyville, Kans.
 KQW ak 1000 M San Jose, Calif. —9:30 am—3:00 am
 WHN ak 1000 (5) New York, N. Y. —7:00 am—1:00 am
 WNAD ak 1000 2 Norman, Okla. —3:00 pm—10:15 pm
 WNOX ak 1000 C (5) Knoxville, Tenn. —6:30 am—2:00 am
 XEFO ak 50 Cananea, Son.
 XEU ak 250 Veracruz, Ver. —8:00 am—1:00 am

1020 kcys. (293.9)

KYW ak 10000 R Philadelphia, Pa. —7:05 am—10:00 pm
 WDZ ak 250 D Tuscola, Ill. —7:00 am—6:00 pm
 XEJ ak 1000 Juarez, Chih.

1030 kcys. (291.1)

CFCN ak 10000 F Calgary, Alta. —9:00 am—1:30 am
 CJBR z 1000 F Rimouski, P. Q.
 CKLW ak 5000 M Windsor, Ont. —6:00 am—4:00 am
 CMCK z Havana, Cuba
 XEB ak 10000 Mexico City, D. F. —10:00 am—12:15 am

1040 kcys. (288.3)

KRLD ak 10000 C Dallas, Texas —7:00 am—1:00 am
 KWJJ ak 500 Portland, Ore. —All night station
 KYOS bk 250 D Merced, Calif.
 WTIC ah 50000 R Hartford, Conn. —6:00 am—....

1050 kcys. (285.5)

CBM ak 5000 F Montreal, P. Q.
 CMKD ak 250 Santiago, Cuba
 HIT z 50 Trujillo, D. R.
 KFBI ak 5000 Dn Abilene, Kans. —7:00 am—7:45 pm
 KNX ak 50000 C Los Angeles, Calif. —9:30 am—3:15 am
 WEAU z 1000 D Eau Claire, Wis.
 WGVA z 1000 DP Indianapolis, Ind.

1060 kcys. (282.8)

KTHS ak 10000 N Hot Springs, Ark. —9:00 am—ss
 VOAC z 40 1065 St. John's, Nfld.
 WBAL ak 10000 BM Baltimore, Md. —6:00 am—9:00 pm
 WJAG ak 1000 D Norfolk, Nebr. —7:30 am—ss
 W3XJ z 100 P College Park, Md. —Midnight to 6:00 am

1070 kcys. (280.2)

CMBX ak 500 Havana, Cuba
 CMHA z 50 Sagua la Grande, Cuba
 KJBS ak 500 San Francisco, Calif. —All night station
 WCAZ ak 100 D Carthage, Ill.
 WTAM ak 50000 R Cleveland, Ohio —6:00 am—midnight

1080 kcys. (277.6)

CMJQ z 200 Camaguey, Cuba
 WBT ak 50000 C Charlotte, N. C. —6:30 am—midnight
 WCBD ak 5000 Dnl Chicago, Ill.
 WMBI ak 5000 Dnl Chicago, Ill.
 XEBA z 20 Guzman, Jal.
 XEBK ak 100 Nuevo Laredo, Tams.
 XEDP ak 500 Mexico City, D. F.

NORTH AMERICAN B. C. STATIONS BY FREQUENCIES

1090 kcys. (275.1)

KMOX ak 5000 C St. Louis, Mo. — 6:30 am—1:00 am

1100 kcys. (272.6)

CBR ak 5000 F Vancouver, B. C.
KGDM ak 1000 DM Stockton, Calif. — 9:00 am—ss
KWKH ak 10000 C Shreveport, La. — 7:30 am—1:00 am
WBIL ak 5000 1 New York, N. Y.
WPG ak 5000 C1 Atlantic City, N. J.
XEL z 250 Mexico City, D. F.

1110 kcys. (270.1)

CMCJ ak 500 X Havana, Cuba
KSOO ak 2500 DnNX Sioux Falls, S. Dak. — 7:00 am—6:45 pm
WRVA ak 5000 CM Richmond, Va. — 7:00 am—midnight

1120 kcys. (267.7)

CHLP ak 100 F Montreal, P. O. — 9:00 am—11:00 pm
CHSJ ak 500 F (1) St. John, N. B. — 5:00 am—midnight
CKOC ak 500 F (1) Hamilton, Ont.
CKX ak 1000 F Brandon, Man.
CMGF ak 250 Matanzas, Cuba.
CMKM ak 200 Manzanillo, Cuba. — 8:00 am—10:00 pm
CRFO ak 100 F Chicoutimi, P. Q.
KFIO ak 100 D Spokane, Wash.
KFSG ak 500 a (2,5) Los Angeles, Calif.
KRKD ak 500 a (2,5) Los Angeles, Calif. — 9:00 am—3:00 am
KRSC ak 250 Seattle, Wash. — All night station
KTBC z 1000 DP Austin, Texas
WGOP ak 500 D Boston, Mass. — 8:00 am—4:00 pm
WDEL ak 250 R (5) Wilmington, Del. — 9:00 am—11:00 pm
WISN ak 250 C (1) Milwaukee, Wis. — 8:00 am—1:00 am
WJBO ak 500 B Baton Rouge, La. — 7:45 pm—1:00 am
WTAW ak 500 College Sta., Tex.

1130 kcys. (265.3)

CMJI ak 150 Ciego de Avila, Cuba — Noon—10:00 pm
KSL ak 5000 C Salt Lake City, Ut. — 8:30 am—3:00 am
WJJD ak 20000 Dn Chicago, Ill. — 6:45 am—6:45 pm
WOV ak 1000 D New York, N. Y.
XEJP z 100 Mexico City, D. F.

1140 kcys. (263.0)

CMCW dk 500 Havana, Cuba
KVOO ak 25000 N1 Tulsa, Okla. — 6:55 am—
WAPI ak 5000 C1 Birmingham, Ala.
WSPR ak 500 DM Springfield, Mass. — 7:00 am—5:45 pm

1150 kcys. (260.7)

CMJF z 200 Camaguey, Cuba
WHAM ak 50000 B Rochester, N. Y. — 6:30 am—midnight
XEBP z 250 Durango, Dgo.
XEC ak 100 Tijuana, B. Gra.
XEDW z 20 Minatitlan, Ver.

1160 kcys. (258.5)

CMHJ ak 175 Cienfuegos, Cuba
CMKG z Santiago, Cuba
WOWO ak 10000 B1 Fort Wayne, Ind.
WWVA ak 5000 C1 Wheeling, W. Va. — 6:00 am—
XEAS ak 50 Saltillo, Coah.
XED ak 2500 Guadalajara, Jal. — Noon—midnight
XEFM z 20 Leon, Gto.
XEP ak 500 Juarez, Chih. — 9:00 am—2:00 am

NORTH AMERICAN B. C. STATIONS BY FREQUENCIES

1170 keys. (256.3)

CMBS	ak	150	X	Havana, Cuba	-8:00 am—midnight
WCAU	ak	50000	C	Philadelphia, Pa.	-6:00 am—1:00 am
XEXX	z	1000		Mexico City, D. F.	

1180 keys. (254.1)

CMJO	ak	50		Ciego de Avila, Cuba	
KEX	ak	5000	B2	Portland, Ore.	
KOB	ak	10000	N2	Albuquerque, N. M.	-1:00 pm—11:00 pm
WDGY	ak	1000	CDn(5)	Minneapolis, Minn.	
WINS	ak	1000		New York, N. Y.	
WMAZ	ak	1000	C(5)	Macon, Ga.	-6:45 pm—7:00 pm
XEFA	z	500		Tacuba, D. F.	

1190 keys. (252.0)

CMKX	z			Santiago, Cuba	
KTKG	ak	250	D	Visalia, Calif.	
VONF	ak	500	1195	St. John's, Nfld.	
WATR	ak	100	DXZ	Waterbury, Conn.	
WOAI	ak	50000	N	San Antonio, Tex.	-7:30 am—12:30 am
WSAZ	ak	1000		Huntington, W. Va.	-6:00 am—7:00 pm

1200 keys. (249.9)

CFGP	z	100		Grande Prairie, Alta.	
CHAB	ak	100	F	Moose Jaw, Sask.	-9:00 am—12:30 am
CKNX	dk	100		Wingham, Ont.	-11:00 am—1:00 am
CKTB	ak	100	F	St. Catharines, Ont.	-9:30 am—11:30 pm
CMCO	ad	250		Havana, Cuba	
KADA	ak	100	DM	Ada, Okla.	
KBTM	ak	100	D	Jonesboro, Ark.	
KDNC	z	100	(.25) P	Lewistown, Mont.	
KELO	z	100	N	Sioux Falls, S. Dak.	
KFJB	ak	100	(.25)	Marshalltown, Ia.	-7:00 am—10:00 pm
KFXD	ak	100	(.25)	Nampa, Idaho	-8:00 am—11:00 pm
KFXJ	ak	100	(.25)	Grand Junc., Colo.	
KGCI	z	100	DP	Coeur d'Alene, Idaho	
KGDE	c	100	(.25)	Fergus Falls, Minn.	-8:00 am—10:00 pm
KGEK	ak	100		Sterling, Colo.	
KGFI	ak	100		Los Angeles, Calif.	-24 hours daily
KGHI	ak	100	(.25)	Little Rock, Ark.	-8:30 am—11:00 pm
KGVL	z	100	DP	Greenville, Texas	
KMLB	ak	100	(.25)	Monroe, La.	
KOOS	ak	100	(.25)	Marsh field, Ore.	-10:00 am—7:45 pm
KSUN	ak	100	(.25)	Lowell, Ariz.	-11:00 am—midnight
KVCV	ak	100		Redding, Calif.	
KVEC	ak	250	D	San Luis Obispo, Calif.	
KVOS	dk	100	M	Bellingham, Wash.	
KWG	ak	100		Stockton, Calif.	-10:00 am—3:00 am
KWNO	z	250	D	Winona, Minn.	
WABI	ak	100	(.25)	Bangor, Maine	
WAIM	ak	100	C	Anderson, S. C.	-6:00 am—10:00 pm
WAYX	ak	100	(.25)	Waycross, Ga.	
WBBZ	ak	100	M (.25)	Ponca City, Okla.	-8:00 am—10:00 pm
WBHP	ak	100		Huntsville, Ala.	
WBNO	ak	100	2	New Orleans, La.	-1:00 pm to midnight
WCAT	ak	100	D	Rapid City, S. Dak.	-Noon—2:00 pm
WCAX	ak	100	(.25)	Burlington, Vt.	
WCLO	ak	100	(.25)	Janesville, Wis.	
WCPO	ak	100	(.25)	Cincinnati, Ohio	-7:00 am—11:30 pm
WDSM	z	100	P	Superior, Wis.	
WEST	ak	100	3 (.25)	Easton, Pa.	
WFAM	ak	100	4	South Bend, Ind.	
WFTC	ak	100	(.25)	Kinston, N. C.	
WHBC	ak	100	(.25)	Canton, Ohio	
WHBY	ak	100	(.25)	Green Bay, Wis.	
WIBX	ak	100	C (.25)	Utica, N. Y.	-5:30 am—1:00 am
WIL	ak	100	(.25)	St. Louis, Mo.	
WJBC	ak	100	5 (.25)	Bloomington, Ill.	-4:00 pm—8:30 pm
WJBL	ak	100	5	Decatur, Ill.	
WJBW	ak	100	2	New Orleans, La.	-All night station
WJNO	ak	100	C (.25)	W. Palm Beach, Fla.	-7:00 am—11:00 pm
WJRD	ak	250	D	Tuscaloosa, Ala.	
WKBO	ak	100	3 (.25)	Harrisburg, Pa.	-8:00 am—11:00 pm
WLVA	ak	100	(.25)	Lynchburg, Va.	-7:00 am—11:00 pm
WMFR	ak	100	D	High Point, N. C.	
WMPC	ak	100	(.25)	Lapeer, Mich.	

NORTH AMERICAN B. C. STATIONS BY FREQUENCIES

WOLS	z	100	D	Florence, S. C.	
WRBL	ak	100	(.25)	Columbus, Ga.	—8:00 am—10:30 pm
WSAL	z	250	D	Salisbury, Md.	
WTHT	ak	100	M	Hartford, Conn.	—7:00 am—4:15 pm
WTOL	z	100	DP	Toledo, Ohio	
WWAE	ak	100	8	Hammond, Ind.	
XEBU	z	50	.....	Chihuahua, Chih.	.....

1210 keys. (247.8)

CHLT	z	100	.....	Sherbrooke, P. Q.	
CJCS	ak	50	.....	Stratford, Ont.	—8:00 am—9:00 pm
CJCU	z	50	.....	Aklavik, N.W.T.	
CKBI	ak	100	F	Prince Albert, Sask.	—9:45 am—1:00 am
CKCH	ak	100	F	Hull, P. Q.	—8:00 am—11:00 pm
CKMC	ak	50	.....	Cobalt, Ont.	
CMHI	ak	150	.....	Santa Clara, Cuba	
KALB	ak	100	(.25)	Alexandria, La.	—7:00 am—
KANS	ak	100	N	Wichita, Kans.	—7:30 am—midnight
KASA	c	100	.....	Elk City, Okla.	—7:00 am—8:00 pm
KDLR	ak	100	.....	Devils Lake, N. D.	—7:30 am—9:30 pm
KDON	z	100	M	Monterey, Calif.	
KFJI	ak	100	.....	Klamath Falls, Ore.	
KFOR	ak	100	CM(.25)	Lincoln, Nebr.	—8:00 am—11:15 pm
KFPW	ak	100	.....	Fort Smith, Ark.	
KFVS	ak	100	5(.25)	Cape Girardeau, Mo.	
KFXM	ak	100	M2	San Bernardino, Cal.	—9:00 am—3:00 am
KGLO	z	100	C(.25)	Mason City, Iowa	
KGY	ak	100	M	Olympia, Wash.	
KHBG	z	100	D	Okmulgee, Okla.	
KIUL	ak	100	.....	Garden City, Kans.	—8:00 am—10:00 pm
KLAH	ak	100	.....	Carlsbad, N. Mex.	
KOCA	ak	100	(.25)	Kilgore, Texas	
KPPA	z	100	(.25)	Helena, Mont.	
KPPC	ak	100	2	Pasadena, Calif.	—10:00 am—12:30 am
KROY	ak	100	CD	Sacramento, Calif.	
KVSO	ak	100	M(.25)	Ardmore, Okla.	—8:00 am—11:00 pm
KWTFN	ak	100	.....	Watertown, S. Dak.	
WALR	ak	100	.....	Zanesville, Ohio	—7:00 am—9:00 pm
WBAX	ak	100	M	Wilkes-Barre, Pa.	
WBBL	ak	100	S	Richmond, Va.	—Sun, 11:00 am—9:15 pm
WBLY	ak	100	D	Lima, Ohio	—6:00 am—5:15 pm
WBRB	ak	100	3	Red Bank, N. J.	
WCOL	ak	100	N	Columbus, Ohio	—7:00 am—11:00 pm
WCRW	ak	100	4	Chicago, Ill.	—11:00 am—7:00 pm
WEBQ	ak	100	5(.25)	Harrisburg, Ill.	
WEDC	ak	100	4	Chicago, Ill.	
WFAS	ak	100	3	White Plains, N. Y.	
WFOY	ak	100	(.25)	St. Augustine, Fla.	
WGBB	ak	100	3	Freeport, N. Y.	
WGCM	ak	100	(.25)	Gulfport, Miss.	
WGNV	ak	100	3	Newburgh, N. Y.	—7:30 am—midnight
WGRM	ak	100	.....	Grenada, Miss.	
WHAI	z	250	DP	Greenfield, Mass.	
WHBF	ak	100	(.25)	Rock Island, Ill.	—7:00 am—1:05 am
WHBU	ak	100	(.25)	Anderson, Ind.	
WIBU	ak	100	(.25)	Poynette, Wis.	
WJBY	ak	100	(.25)	Gadsden, Ala.	—8:00 am—10:30 pm
WJEJ	ak	50	Dn(.1)	Hagerstown, Md.	
WJIM	z	100	(.25)	Lansing, Mich.	—7:15 am—12:30 am
WJTN	ak	100	B(.25)	Jamestown, N. Y.	
WJW	ak	100	(.25)	Akron, Ohio	—8:00 am—10:30 pm
WKOK	ak	100	.....	Sanbury, Pa.	—6:00 am—midnight
WLMU	z	100	P(.25)	Middlesboro, Ky.	
WMFG	ak	100	(.25)	Hibbing, Minn.	—7:30 am—10:00 pm
WOMT	ak	100	.....	Manitowoc, Wis.	
WPAX	ak	100	D	Thomasville, Ga.	—8:00 am—6:00 pm
WSAY	z	100	D	Rochester, N. Y.	—7:00 am—4:30 pm
WSBC	ak	100	4(.25)	Chicago, Ill.	—6:00 am—midnight
WSIX	ak	100	(.25)	Nashville, Tenn.	—7:00 am—1:00 am
WSNJ	z	100	D	Bridgeton, N. J.	
WSOC	ak	100	N(.25)	Charlotte, N. C.	—7:00 am—midnight
WTAX	ak	100	.....	Springfield, Ill.	
XEAT	ak	250	.....	Parral, Chih.	—11:00 am—9:00 pm
XEE	ak	50	.....	Durango, Dgo.	
XEFV	ak	100	.....	Juarez, Chih.	
XETH	ak	100	.....	Puebla, Pue.	

NORTH AMERICAN B. C. STATIONS BY FREQUENCIES

1220 keys. (245.8)

CMJE	z	50	.....	Camaguey, Cuba	
KFKU	ak	1000	a (5)	Lawrence, Kans.	-3:30 pm-7:30 pm
KTMS	z	500	B	Santa Barbara, Cal.	
KTW	ak	1000	S2	Seattle, Wash.	
KWSC	ak	1000	2 (5)	Pullman, Wash.	-9:45 am-12:30 am
WCAD	ak	500	D	Canton, N. Y.	-12:30 pm-4:00 pm
WCAG	ak	1000	MR (5)	Pittsburgh, Pa.	-7:00 am-2:30 am
WDAE	ak	1000	C (5)	Tampa, Fla.	-7:30 am-midn't.
WREN	ak	1000	Ba(5)	Lawrence, Kans.	-8:00 am-7:00 pm
XEBL	z	50	.....	Mazatlan, Sin.	
XEDA	z	200	.....	Gral. Anaya, D. F.	
XETF	ak	12	.....	Veracruz, Ver.	-11:00 am-1:00 am

1230 keys. (243.8)

CMCB	z	150	.....	Havana, Cuba	-8:00 am-11:00 pm
KGBX	ak	500	N	Springfield, Mo.	
KGGM	ak	1000	.....	Albuquerque, N. M.	-9:30 am-11:30 pm
KYA	ak	1000	(5)	San Francisco, Cal.	
WFBM	ak	1000	C (5)	Indianapolis, Ind.	-7:30 am-1:00 am
WNAC	ak	1000	R (5)	Boston, Mass.	-6:00 am-1:00 am
XEAZ	z	200	.....	Zacatecas, Zac.	
XEG	z	250	.....	Monterrey, N. L.	-----

1240 keys. (241.8)

CJCB	ak	1000	F	Sydney, N. S.	-7:00 am-11:00 pm
CMHB	z	50	.....	Sancti Spiritus, Cuba	
KGCU	ak	250	1	Mandan, N. Dak.	
KLPM	ak	250	1XZ	Minot, N. Dak.	
KTAT	ak	1000	M	Fort Worth, Texas	
KTFI	ak	1000	.....	Twin Falls, Idaho	
WKAQ	ak	1000	.....	San Juan, P. R.	-6:00 am-9:30 pm
WXYZ	ak	1000	B	Detroit, Mich.	
XEKL	z	500	.....	Leon, Guan.	
XELA	z	50	.....	Saltillo, Coah.	
XEME	z	50	.....	Merida, Yuc.	-----

1250 keys. (239.9)

CMCK	ak	150	.....	Santiago, Cuba	
HRN	c	50	.....	Tegucigalpa, Hond.	
KFOX	ak	1000	.....	Long Beach, Calif.	
KIT	ak	250	M (5)	Yakima, Wash.	
KXOK	z	1000	P	St. Louis, Mo.	
WAIR	ak	250	D	Winst.-Salem, N. C.	-6:00 am-ss
WCAL	ah	1000	2 XZ	Northfield, Minn.	
WDSU	ak	1000	B	New Orleans, La.	-7:00 am-midnight
WHBI	ak	1000	a (2.5)	Newark, N. J.	
WLB	ak	1000	2XZ	Minneapolis, Minn.	
WNEW	ak	1000	a (2.5)	New York, N. Y.	-All night station
WTCN	ak	1000	B (5)	Minneapolis, Minn.	-7:00 am-midnight
XEAI	z	500	.....	Mexico City, D. F.	-----
XEXH	z	250	.....	San Luis Pot., S.L.P.	

1260 keys. (238.0)

CMBD	ak	500	2X	Havana, Cuba	-7:00 am-midnight
CMC	z	150	2	Havana, Cuba	-8:00 am-midnight
KGVO	ak	1000	C	Missoula, Mont.	-9:00 am-1:00 am
KHSL	ak	250	.....	Chico, Calif.	
KOIL	ak	1000	BM(5)	Omaha, Nebr.	-6:00 am-.....
KPAC	ak	500	D	Port Arthur, Texas	-6:00 am-5:45 pm
KRGV	ak	1000	N	Weslaco, Texas	-8:00 am-11:00 pm
KUOA	ak	5000	D	Siloam Spgs., Ark.	
KVOA	ak	1000	.....	Tucson, Ariz.	
WHIO	ak	1000	C (5)	Dayton, Ohio	-6:00 am-1:00 am
WNBX	ak	500	CM(1)	Springfield, Vt.	
WTOC	ak	1000	C	Savannah, Ga.	-7:00 am-midnight

1270 keys. (236.1)

GMHD	dk	250	.....	Caibarien, Cuba	
KGCA	ak	100	2D	Decorah, Iowa	-8:45 am-3:30 pm
KOL	ak	1000	M (5)	Seattle, Wash.	
KVOR	ak	1000	C	Colo. Springs, Colo.	-9:00 am-1:00 am
KWLC	ak	100	2D	Decorah, Iowa	-9:30 am-5:30 pm

NORTH AMERICAN B. C. STATIONS BY FREQUENCIES

WASH	ak	500	DaN	Grd. Rpd., Mich.	—6:30 am—midnight
WFBR	ak	500	R (1)	Baltimore, Md.	—7:00 am—midnight
WJDX	ak	1000	R (5)	Jackson, Miss.	
WOOD	ak	500	Na	Gd. Rapids, Mich.	—7:00 am—midnight
XEXB	ak	250	.....	Jalapa, Ver.	
XEXE	z	17	.....	Texcoco, D. F.	

1280 keys. (234.2)

CMKO	z	.....	.....	Holguin, Cuba	
KFBB	ak	1000	G (5)	Great Falls, Mont.	
KLS	ak	250	.....	Oakland, Calif.	
WCAM	ak	500	I	Camden, N. J.	
WCAP	ak	500	I	Asbury Park, N. J.	
WDOD	ak	1000	C (5)	Chattanooga, Tenn.	—7:30 am—12:30 am
WIBA	ak	1000	N (5)	Madison, Wis.	
WORC	ak	500	C	Worcester, Mass.	—8:00 am—midnight
WRR	ak	500	M	Dallas, Texas	—8:00 am—midnight
WTNJ	ak	500	I	Trenton, N. J.	
XEMX	z	100	.....	Mexico City, D. F.	

1290 keys. (232.4)

CMCU	ak	500	.....	Havana, Cuba	—6:55 am—1:00 am
KDYL	ak	1000	RX	Salt Lake City, Ut.	—8:00 am—3:00 am
KLCN	ak	100	D	Blytheville, Ark.	
KTRH	ak	1000	C (5)	Houston, Texas	
WEBC	ak	1000	N (5)	Duluth, Minn.	—8:00 am—1:00 am
WJAS	ak	1000	C (5)	Pittsburgh, Pa.	—7:30 am—12:30 am
WNBZ	ak	100	D	Saranac Lake, N. Y.	—9:30 am—ss
WNEL	ak	1000	(2.5)	San Juan, P. R.	—5:45 am—11:30 pm

1300 keys. (230.6)

HI7P	ak	25	.....	Trujillo, D. R.	
KALE	ak	1000	M	Portland, Ore.	
KFAC	ak	1000	.....	Los Angeles, Calif.	—All night station
KFH	ak	1000	C (5)	Wichita, Kans.	
TG1	ak	.....	1305	Guatemala City, Guat.	
WBRR	ak	1000	I	Brooklyn, N. Y.	
WEVD	ak	1000	I	New York, N. Y.	
WFAB	ak	1000	I	New York, N. Y.	
WFBC	ak	1000	N (5)	Greenville, S. C.	
WHAZ	ak	1000	I	Troy, N. Y.	—6:00 pm—midnight
WHBL	ak	250	.....	Sheboygan, Wis.	

1310 keys. (228.9)

CHCK	ak	50	.....	Charlottetown, P.E.I.	
CJKL	ak	100	F	North Bay, Ont.	
CJLS	ak	100	.....	Yarmouth, N. S.	
CKCV	ak	100	F	Quebec, P. Q.	—7:55 am—11:30 pm
KAND	z	100	D	Corsicana, Tex.	
KARM	ak	100	C	Fresno, Calif.	
KCKN	ak	100	.....	Kansas City, Kans.	
KCRJ	ak	100	(.25)	Jerome, Ariz.	
KFPL	dk	100	(.25)	Dublin, Texas	—7:00 am—10:45 pm
KFXR	ak	100	(.25)	Okla. City, Okla.	—8:00 am—midnight
KFYO	ak	100	(.25)	Lubbock, Texas	—8:00 am—10:15 pm
KGEZ	ak	100	.....	Kalispell, Mont.	—9:00 am—11:00 pm
KGFW	ak	100	.....	Kearney, Nebr.	—7:00 am—10:00 pm
KHUB	ak	250	D	Watsonville, Calif.	
KINY	ak	100	XZ	Juneau, Alaska	
KPDN	ak	100	D	Pampa, Texas	
KRBA	z	100	DP	Lufkin, Texas	
KRMD	ak	100	(.25)	Shreveport, La.	
KROC	ak	100	(.25)	Rochester, Minn.	—7:00 am—12:15 am
KROA	ak	100	.....	Santa Fe, N. Mex.	
KRRV	z	250	D	Sherman, Texas	
KRSO	ak	250	D	Santa Rosa, Calif.	—11:00 am—9:00 pm
KSUB	ak	100	.....	Cedar City, Utah	
KTSM	ak	100	N(.25)	El Paso, Texas	—8:30 am—1:00 am
KVOL	ak	100	.....	Lafayette, La.	—7:00 am—ss
KVOX	z	100	(.25)	Moorhead, Minn.	
KWOC	z	100	DP	Poplar Bluff, Mo.	—.....
KWOS	z	100	D	Jefferson City, Mo.	—10:00 am—2:00 am
KXRO	ak	100	M(.25)	Aberdeen, Wash.	—8:00 am—8:00 pm
WAML	ak	100	(.25)	Laurel, Miss.	—10:30 am—5:30 pm
WBE0	ak	100	D	Marquette, Mich.	

NORTH AMERICAN B. C. STATIONS BY FREQUENCIES

WBOW	ak	100	N (.25)	Terre Haute, Ind.	-7:00 am—midnight
WBRE	ak	100	N	Wilkes-Barre, Pa.	
WBRK	z	100	C (.25)	Pittsfield, Mass.	-7:00 am—1:00 am
WCLS	ak	100		Joliet, Ill.	-8:00 am—9:30 pm
WCMI	ak	100	(.25)	Ashland, Ky.	-6:00 am—11:30 pm
WDAH	ak	100	S (.25)	El Paso, Texas	-11:30 am—10:30 pm (Sun. only)
WEBR	ak	100	B (.25)	Buffalo, N. Y.	-7:00 am—midnight
WEMP	ak	100	D	Milwaukee, Wis.	-7:30 am—ss
WEXL	ak	50		Royal Oak, Mich.	-8:00 am—4:00 am
WFBG	ak	100	3	Altoona, Pa.	-7:00 am—10:30 pm
WFDF	ak	100		Flint, Mich.	-6:00 am—midnight
WGAU	z	100	(.25)	Athens, Ga.	
WGH	ak	100	(.25)	Newport News, Va.	-7:00 am—midnight
WGTM	z	100	D	Wilson, N. C.	
WHAT	ak	100	4	Philadelphia, Pa.	
WJAC	ak	100	3 (.25)	Johnstown, Pa.	
WLAK	z	100		Lakeland, Fla.	
WLBC	ak	100	(.25)	Muncie, Ind.	-7:00 am—midnight
WLNH	ak	100	M	Laconia, N. H.	
WMBO	ak	100		Auburn, N. Y.	
WMFF	ak	100	(.25)	Plattsburg, N. Y.	
WNBH	ak	100	M (.25)	New Bedford, Mass.	-7:30 am—11:15 pm
WOL	ak	1000	MZ	Washington, D. C.	
WRAW	ak	100		Reading, Pa.	-7:00 am—11:00 pm
WROL	ak	100	N (.25)	Knoxville, Tenn.	
WSAJ	ak	100		Grove City, Pa.	
WSGN	ak	100	B (.25)	Birmingham, Ala.	-8:00 am—midnight
WSJS	ak	100	C	Winston-Salem, N. C.	-8:00 am—10:00 pm
WTAL	ak	100	(.25)	Tallahassee, Fla.	-8:00 am—midnight
WTEL	ak	100	4	Philadelphia, Pa.	-8:00 am—midnight
WTJS	ak	100	(.25)	Jackson, Tenn.	
WTRC	ak	100	(.25)	Elkhart, Ind.	-7:00 am—10:30 pm
XEAG	z	10		Cordoba, Ver.	
XEBO	z	25		Irapuato, Guan.	
XEFW	ak	300		Tampico, Tams.	-11:00 am—10:00 pm
XETB	ak	125		Torreón, Coah.	
XEX	ak	125		Monterrey, N. L.	
XEXS	z	100		Mexico City, D. F.	—.....

1320 kcys. (227.1)

CMOX	ak	200		Havana, Cuba	
KGHF	ak	500	B	Pueblo, Colo.	-9:00 am—1:00 am
KGMB	ak	1000	C M	Honolulu, Hawaii	-1:30 am—6:00 pm
KID	ak	500	(1)	Idaho Falls, Idaho	
KRNT	ak	1000	C (5)	Des Moines, Iowa	-6:00 am—1:00 am
WADC	ak	1000	C	Akron, Ohio	-7:00 am—1:00 am
WORK	ak	1000	N	York, Pa.	-8:00 am—10:00 pm
WSMB	ak	1000	R	New Orleans, La.	
XEAU	z			Tijuana, B. Cfa.	

1330 kcys. (225.4)

CMHK	z	250		Cruces, Cuba	
KGB	ak	1000	M	San Diego, Calif.	-10:00 am—4:00 am
KMO	ak	1000	M	Tacoma, Wash.	-9:00 am—3:00 am
KRIS	z	500	N	Corpus Christi, Tex.	
KSCJ	ak	1000	C (5)	Sioux City, Iowa	-7:00 am—1:00 am
WDRC	ak	1000	C (5)	Hartford, Conn.	-7:00 am—midnight
WSAI	ak	1000	MN (5)	Cincinnati, Ohio	-7:00 am—1:00 am
WTAQ	ak	1000	C	Green Bay, Wis.	

1340 kcys. (223.7)

CMAB	z	300		Pinar del Rio, Cuba	
CMJL	z	75		Camaguey, Cuba	
KDTH	z	500	DP	Dubuque, Iowa	
KGDY	ak	250	D	Huron, S. Dak.	-10:00 am—1:00 am
KGIR	ak	1000	N (2.5)	Butte, Mont.	
KGNO	ak	250		Dodge City, Kans.	-8:30 am—midnight
WCOA	ak	500	C (1)	Pensacola, Fla.	
WFEA	ak	500	MN (1)	Manchester, N. H.	-6:30 am—1:00 am
WSPD	ak	1000	B (5)	Toledo, Ohio	-6:30 am—.....
XEAP	z	50		Obregon, Son.	—.....
XEBS	z	200		Mexico City, D. F.	—.....
XEDH	z	200		Villa Acuna, Coah.	—.....
XEXD	z	350		Jalapa, Ver.	—.....

1350 kcys. (222.1)

CMCA	ak	450	X	Havana, Cuba	
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NORTH AMERICAN B. C. STATIONS BY FREQUENCIES

CMKW	z		Santiago, Cuba	
KIDO	ak	1000	N (2.5) Boise, Idaho	-9:00 am-2:00 am
KWK	ak	1000	BM(5) St. Louis, Mo.	-6:30 am-1:00 am
WAWZ	ak	500	I (1) Zarephath, N. J.	-6:00 am-.....
WBXN	ak	1000	I New York, N. Y.	
WMBG	ak	500	R Richmond, Va.	-7:00 am-midnight

1360 keys. (220.4)

CMJH	dk	50	.....	Ciego de Avila, Cuba	
KCRC	ak	250	M	Enid, Okla.	-8:00 am-11:00 pm
KGER	ak	1000	.....	Long Beach, Calif.	
WCSC	ak	500	N (1)	Charleston, S. C.	-7:00 am-midnight
WFBL	ak	1000	C (5)	Syracuse, N. Y.	-7:00 am-1:00 am
WGES	ak	500	I (1)	Chicago, Ill.	-8:00 am-9:00 pm
WQBC	ak	1000	D	Vicksburg, Miss.	
WSBT	ak	500	I	South Bend, Ind.	

1370 keys. (218.8)

CFAR	z	100	.....	Flin Flon, Man.	
CKCW	ak	100	F	Moncton, N. B.	
CMGE	ak	150	.....	Cardenas, Cuba	-10:00 am-10:30 pm
KAST	ak	100	D	Astoria, Ore.	-11:00 am-8:30 pm
KCMO	ak	100	.....	Kansas City, Mo.	-7:00 am-2:00 am
KEEN	ak	100	3	Seattle, Wash.	-3:00 pm-1:00 am
KELD	z	100	.....	El Dorado, Ark.	
KERN	ak	100	N	Bakersfield, Calif.	-11:00 am-3:00 am
KFGQ	ak	100	D	Boone, Iowa	-7:00 am-2:00 pm
KFJZ	ak	100	(.25)	Fort Worth, Texas	-7:30 am-midnight
KFRO	ak	250	D	Longview, Texas	-7:00 am-ss
KGAR	ak	100	C (.25)	Tucson, Arizona	
KGFL	ak	100	4	Roswell, N. Mex.	
KGKL	ak	100	(.25)	San Angelo, Texas	
KICA	ak	100	4	Clovis, N. Mex.	-9:00 am-11:00 pm
KIUP	ak	100	.....	Durango, Colo.	-10:00 am-11:00 pm
KLUF	ak	100	.....	Galveston, Texas	-9:00 am-midnight
KMAC	ak	100	5 (.25)	San Antonio, Tex.	-8:00 am-9:00 pm
KOBH	ak	100	(.25)	Rapid City, S. Dak.	-8:00 am-midnight
KOKO	ak	100	.....	La Junta, Colo.	-8:00 am-11:30 pm
KONO	ak	100	5	San Antonio, Tex.	-7:00 am-11:00 pm
KRE	ak	100	(.25)	Berkeley, Calif.	-24 hours daily
KRKO	ak	50	3	Everett, Wash.	
KRMC	z	100	(.25)	Jamestown, N. D.	
KSLM	ak	100	M	Salem, Ore.	-10:00 am-1:00 am
KTEM	ak	250	D	Temple, Texas	
KTOK	bk	100	M	Oklahoma City, Ok.	
KUJ	ak	100	.....	Walla Walla, Wash.	-9:30 am-1:00 am
KVGB	z	100	.....	Great Bend, Kans.	
KVRS	z	100	(.25)P	Rock Springs, Wyo.	
KWYO	ak	100	(.25)	Sheridan, Wyo.	-9:00 am-midnight
WABY	ak	100	B(.25)	Albany, N. Y.	-7:00 am-midnight
WAGF	ak	250	D	Dothan, Ala.	-9:00 am-ss
WATL	ak	100	(.25)	Atlanta, Ga.	-7:00 am-1:00 am
WBLC	ak	100	.....	Clarksburg, W. Va.	-6:00 am-.....
WBNY	ak	100	2 (.25)	Buffalo, N. Y.	-7:30 am-midnight
WBTM	ak	100	(.25)	Danville, Va.	-7:00 am-10:00 pm
WCBM	ak	100	(.25)	Baltimore, Md.	
WDAS	ak	100	(.25)	Philadelphia, Pa.	-8:00 am-midnight
WDWS	ak	100	D	Champaign, Ill.	
WEOA	ak	100	C(.25)	Evansville, Ind.	
WFOR	ak	100	N	Hattiesburg, Miss.	-8:00 am-9:00 pm
WGL	ak	100	D	Fort Wayne, Ind.	
WGRC	ak	250	D	New Albany, Ind.	
WHBQ	ak	100	.....	Memphis, Tenn.	-8:00 am-11:30 pm
WHDF	ak	100	(.25)	Calumet, Mich.	-10:30 am-6:30 pm
WHLB	ak	100	C(.25)	Virginia, Minn.	
WIBM	ak	100	(.25)	Jackson, Mich.	-6:30 am-12:30 am
WLLH	ak	100	Sy	Lawrence, Mass.	-7:30 am-midnight
WLLH	ak	100	MSy(.25)	Lowell, Mass.	-7:30 am-midnight
WMBR	ak	100	C(.25)	Jacksonville, Fla.	-7:30 am-midnight
WMFD	ak	100	D	Wilmington, N. C.	
WMFO	ak	100	D	Decatur, Ala.	-8:00 am-6:30 pm
WMIN	ak	100	(.25)	St. Paul, Minn.	-7:00 am-1:00 am
WOC	ak	100	C(.25)	Davenport, Iowa	-7:00 am-1:00 am
WPAY	ak	100	.....	Portsmouth, Ohio	-7:00 am-10:15 pm
WPRA	z	100	(.25)	Mayaguez, P. R.	
WRAC	ak	100	(.25)	Williamsport, Pa.	
WRDO	ak	100	M	Augusta, Maine	-8:00 am-11:15 pm
WRJN	ak	100	(.25)	Racine, Wis.	-8:25 am-midnight

NORTH AMERICAN B. C. STATIONS BY FREQUENCIES

WSAU	ak	100		Wausau, Wis.	-7:00 am—11:15 pm
WSVS	ak	50	2D	Buffalo, N. Y.	
XECZ	z	100		San L. Pot., S.L.P.	
XEI	ak	125		Morelia, Mich.	
XELZ	z	100		Mexico City, D. F.	
		2	100	Owen Sound, Ont.	

1380 keys. (217.3)

CMCR	z			Havana, Cuba	
CMCX	z	150		Havana, Cuba	-9:00 am—11:00 pm
KOH	ak	500	C	Reno, Nevada	-11:00 am—3:00 am
KOV	ak	500	C1	Pittsburgh, Pa.	-7:00 am—10:00 pm
WALA	ak	500	C (1)	Mobile, Ala.	-8:30 am—midnight
WKBH	ak	1000	C	La Crosse, Wis.	
WNBC	ak	250	D	New Britain, Conn.	-7:00 am—ss
WSMK	ak	200	C1	Dayton, Ohio	-6:00 am—

1390 keys. (215.7)

CJGX	ak	100	F	Yorkton, Sask.	-8:30 am—12:30 am
CMJC	z	150		Camaguey, Cuba	
KLRA	ak	1000	C (5)	Little Rock, Ark.	
KOY	ak	1000	C	Phoenix, Ariz.	-9:00 am—12:15 am
KRLC	ak	250		Lewiston, Idaho	
WHK	ak	1000	BM (2.5)	Cleveland, Ohio	-6:30 am—midnight
WQDM	dk	1000	D	St. Albans, Vt.	

1400 keys. (214.2)

CMGC	ad	150		Matanzas, Cuba	-8:00 am—11:00 pm
CKKR	z	100		Santiago, Cuba	
KHBC	ak	250	CM	Hilo, T. H.	
KLO	ak	500	B	Ogden, Utah	-9:30 am—1:30 am
KTUL	ak	500	C (1)	Tulsa, Okla.	
WARD	ak	500	2	Brooklyn, N. Y.	
WBBC	ak	500	2 (1)	Brooklyn, N. Y.	
WHDL	ak	250	D	Olean, N. Y.	
WIRE	ak	1000	MR (5)	Indianapolis, Ind.	-7:30 am—1:00 am
WLTH	ak	500	2	Brooklyn, N. Y.	
WVFW	ak	500	2	Brooklyn, N. Y.	

1410 keys. (212.6)

CKFC	ak	50	5	Vancouver, B. C.	
CKMO	ak	100	5	Vancouver, B. C.	
CMCO	ak	5000		Havana, Cuba	
KFJM	ak	500	(1)	Grand Forks, N. D.	
KGNC	ak	1000	(2.5) N	Amarillo, Texas	
KMED	ck	250	N	Medford, Ore.	
WAAB	ak	500	M (1)	Boston, Mass.	-24 hours daily
WBCM	ak	500	(1)	Bay City, Mich.	-9:00 am—12:30 am
WHIS	ak	500	(1)	Bluefield, W. Va.	-5:00 am—
WROK	ak	500	(1)	Rockford, Ill.	-7:30 am—midnight
WSFA	ak	500	C (1)	Montgomery, Ala.	-7:30 am—midnight

1420 keys. (211.1)

CHLN	z	100		Three Rivers, P. O.	
CKGB	ak	100	F	North Bay, Ont.	-11:00 am—11:30 pm
KABC	ak	100	(.25)	San Antonio, Texas	-7:00 am—12:15 am
KABR	ak	100	XZ	Aberdeen, S. D.	
KATE	ak	250	D	Albert Lea, Minn.	-7:30 am—ss
KBFS	ak	100	4	Portland, Ore.	-2:00 pm—8:00 pm
KCMC	ak	100	(.25)	Texarkana, Tex.	
KDNT	z	100	DP	Denton, Tex.	
KEUB	ak	100		Price, Utah	-9:30 am—midnight
KFAM	z	100	P	St. Cloud, Minn.	
KPIZ	ak	100		Fond du Lac, Wis.	
KGFF	ak	100	(.25) M	Shawnee, Okla.	-8:00 am—10:00 pm
KGGC	ak	100		San Francisco, Cal.	
KGIW	ak	100	1	Alamosa, Colo.	-9:30 am—10:30 pm
KIDW	ak	100	1	Lamar, Colo.	-9:00 am—8:00 pm
KIUN	ak	100		Pecos, Texas	-8:00 am—10:00 pm
KLBM	z	100	(.25) P	La Grande, Ore.	
KNET	ak	100	D	Palestine, Texas	
KORE	ak	100	M	Eugene, Ore.	
KRBC	ak	100	(.25)	Abilene, Texas	-8:00 am—10:00 pm
KRIC	z	100	P	Beaumont, Tex.	
KRLH	ak	100	D	Midland, Texas	
KTRI	z	100	(.25) P	Sioux City, Iowa	

NORTH AMERICAN B. C. STATIONS BY FREQUENCIES

KUMA	ak	100	....	Yuma, Ariz.	
KWBG	ak	100	....	Hutchinson, Kans.	
KXL	ak	100	4 (.25)	Portland, Ore.	—All night station
WACO	ak	100	C	Waco, Texas	
WAGM	ak	100	....	Presque Isle, Me.	—11:00 am—7:00 pm
WAPO	ak	100	(.25)	Chattanooga, Tenn.	—7:00 am—7:00 pm
WAZL	ak	100	2	Hazleton, Pa.	—9:00 am—10:00 pm
WCBS	ak	100	(.25)	Springfield, Ill.	—8:00 am—11:00 pm
WCHV	ak	100	3 (.25)	Charlottesville, Va.	—7:00 am—midnight
WEED	ak	100	3 (.25)	Rocky Mount, N. C.	
WELL	ak	100	....	Battle Creek, Mich.	—7:30 am—midnight
WGPC	ak	100	....	Albany, Ga.	
WHFC	ak	100	(.25)	Cicero, Ill.	—7:00 am—1:00 am
WILM	aj	100	2	Wilmington, Del.	
WJMS	ak	100	....	Ironwood, Mich.	
WLAP	ak	100	(.25)	Lexington, Ky.	
WLEU	ak	100	(.25) B	Erie, Pa.	
WMAS	ak	100	C (.25)	Springfield, Mass.	—7:00 am—midnight
WMBC	ak	100	(.25)	Detroit, Mich.	—7:30 am—midnight
WMBH	ak	100	(.25)	Joplin, Mo.	
WMBX	ak	250	D	Uniontown, Pa.	—6:00 am—6:00 pm
WMFJ	ak	100	....	Daytona Bch., Fla.	
WMSD	ak	100	....	Sheffield, Ala.	—8:00 am—11:00 pm
WNSY	z	100	(.25) P	Watertown, N. Y.	
WPAD	ak	100	(.25)	Paducah, Ky.	—7:00 am—midnight
WPAR	ak	100	C	Parkersburg, W. V.	
WPRP	z	100	(.25)	Ponce, Puerto Rico	
.....	z	100	....	Kenora, Ont.	

1430 keys. (209.7)

CMJP	ak	75	....	Moron, Cuba	
KECA	ak	1000	(5) B	Los Angeles, Cal.	—10:00 am—3:00 am
KGNF	ak	1000	D	North Platte, Neb.	—8:00 am—6:15 pm
KSO	ak	500	BM (2.5)	Des Moines, Iowa	
WBNS	ak	500	C (1) X	Columbus, Ohio	—6:30 am—
WHEC	ak	500	C (1)	Rochester, N. Y.	—7:00 am—midnight
WHP	ak	500	C (1)	Harrisburg, Pa.	—6:30 am—midnight
WMPX	ak	500	(1) B	Memphis, Tenn.	
WOKO	ak	500	C (1)	Albany, N. Y.	—8:00 am—1:00 am

1440 keys. (208.2)

CMOA	z	150	....	Havana, Cuba	
KDFN	ak	500	....	Casper, Wyo.	
KELA	ak	500	M	Centralia, Wash.	
KXYZ	ak	1000	B	Houston, Texas	—24 hours daily
WBIG	ak	1000	C	Greensboro, N. C.	—6:30 am—11:30 pm
WCBA	aj	500	a	Allentown, Pa.	—6:30 am—11:30 pm
WMBD	ak	1000	C(5)	Peoria, Ill.	—7:00 am—midnight
WSAN	aj	500	Na	Allentown, Pa.	—1:00 pm—11:30 pm
XEFI	ak	250	....	Chihuahua, Chih.	

1450 keys. (206.8)

CFCT	ak	500	....	Victoria, B. C.	—10:45 am—12:15 am
CHGS	ak	50	F	Summerside, P.E.I.	—6:30 am—10:00 pm
CMHM	z	100	....	Cienfuegos, Cuba	
KGCX	ak	1000	....	Wolf Point, Mont.	
KIEM	ak	500	M(1)	Eureka, Calif.	—10:00 am—1:00 am
KTBS	ak	1000	N	Shreveport, La.	—7:30 am—1:00 am
WAGA	ak	500	B (1)	Atlanta, Ga.	
WGAR	ak	500	C (1)	Cleveland, Ohio	—6:30 am—midnight
WHOM	ak	250	....	Jersey City, N. J.	—7:00 am—midnight
WSAR	ak	1000	M	Fall River, Mass.	
XEF	ak	100	....	Juarez, Chih.	

1460 keys. (205.4)

CMKF	z	250	....	Holguin, Cuba	
KSTP	ak	10000	R (25)	St. Paul, Minn.	—7:00 am—2:00 am
WJSV	ak	10000	C	Washington, D. C.	

1470 keys. (204.0)

KGA	ak	5000	BM	Spokane, Wash.	
WLAC	ak	5000	C	Nashville, Tenn.	

1480 keys. (202.6)

KOMA	ak	5000	C	Oklahoma City, Ok.	—7:30 am—1:00 am
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NORTH AMERICAN B. C. STATIONS BY FREQUENCIES

WHIP z 5000 D Hammond, Ind. —7:30 am—5:30 pm
 WKBW ak 5000 C Buffalo, N. Y. —8:00 am—1:00 am

1490 keys. (201.2)

KFBK ak 5000 N X Sacramento, Calif.
 WCKY ak 10000 N Covington, Ky. —7:00 am—midnight

1500 keys. (199.9)

CJIC ak 100 S. S. Marie, Ont. —10:00 am—10:00 pm
 KAWM z 100 Gallup, N. Mex.
 KBIX ak 100 M Muskogee, Okla. —8:00 am—11:00 pm
 KBST z 100 Big Spring, Texas
 KDAL ak 100 C Duluth, Minn.
 KDB ak 100 M(.25) Santa Barbara, Cal.
 KGFI ak 100 (.25) Brownsville, Tex.
 KGGK ak 100 (.25) Tyler, Texas
 KGKY ak 100 (.25) Scottsbluff, Neb. —8:30 am—11:00 pm
 KNEL ak 250 D Brady, Texas —8:00 am—6:00 pm
 KNOW ak 100 C Austin, Texas
 KOTN ak 100 D Pine Bluff, Ark. —8:00 am—ss
 KOVC ak 100 (.25) Valley City, N. D. —8:00 am—10:00 pm
 KPAB z 100 (.25) P Laredo, Texas
 KPLC ak 100 (.25) Lake Charles, La.
 KPLT z 250 D Paris, Texas
 KPQ ak 100M(.25) Wenatchee, Wash.
 KRNR ak 100M(.25) Roseburg, Ore.
 KROD ak 100 P El Paso, Texas
 KSAL ak 100 (.25) Salina, Kans.
 KUTA z 100 P Salt Lake City, Ut.
 KVNU z 100 P Logan, Utah
 KVOE ak 100 M Santa Ana, Calif. —Noon to 2:00 am
 KWWE z 100 DP Hobbs, N. Mex.
 KXO ak 100 El Centro, Calif. —11:00 am—midnight
 KYSM z 100 (.25)P Mankato, Minn.
 WGNW ak 100 1(.25) Brooklyn, N. Y. —9:00 am—midnight
 WDNC ak 100 C Durham, N. C. —7:30 am—12:30 am
 WGAL ak 100 (.25) Lancaster, Pa.
 WGIL z 250 DP Galesburg, Ill.
 WHBB ak 100 Selma, Ala. —7:30 am—ss
 WHEF ak 100 (.25) Kosciusko, Miss. —7:30 am—10:00 pm
 WJBK ak 100 (.25) Detroit, Mich. —24 hours daily
 WKAT z 100 Miami Beach, Fla.
 WKBB ak 100 (.25) C Y E. Dubuque, Ill.
 WKBV ak 100 (.25) Richmond, Ind.
 WKBZ ak 100 (.25) Muskegon, Mich. —7:00 am—10:00 pm
 WKEU ak 100 D Griffin, Ga.
 WMBQ ak 100 1 Brooklyn, N. Y.
 WMEX ak 100 (.25) Boston, Mass.
 WNBK ak 100 C(.25) Binghamton, N. Y.
 WNLC ak 100 DM New London, Conn.
 WOMI ak 100 (.25) Owensboro, Ky. —6:00 am—midnight
 WOPI ak 100 Bristol, Tenn. —7:00 am—10:30 pm
 WRDW ak 100 C(.25) Augusta, Ga. —7:00 am—9:00 pm
 WRGA ak 100 (.25) Rome, Ga. —8:00 am—11:00 pm
 WRIT z 100 B Richmond, Va. —7:00 am—1:00 am
 WSYB ak 100 Rutland, Vt. —10:00 am—9:00 pm
 WTMV ak 100 (.25) E. St. Louis, Ill.
 WWRL ak 100 1(.25) Woodside, N. Y. —8:00 am—midnight
 WWSW ak 100 (.25) Pittsburgh, Pa.

1510 keys. (198.6)

CFRC ak 100 F Kingston, Ont. —Noon—11:00 pm
 CKCR ak 100 Waterloo, Ont. —8:00 am—11:00 pm

1520 keys. (197.3)

TCW ak 1000 Guatemala City, Guat.

1530 keys. (196.0)

KXBY ak 1000 Kansas City, Mo. —8:00 am—3:30 am
 IGW ak 1000 Guatemala City, Guat.
 WBRY ak 1000 M Waterbury, Conn. —8:00 am—midnight

1550 keys. (193.4)

KPMC ak 1000 M Bakersfield, Calif. —10:00 am—2:00 am
 WQXR ak 1000 New York, N. Y. —10:00 am—9:15 pm

NORTH AMERICAN B. C. STATIONS BY LOCATIONS

Frequency in kilocycles in second column. Night power in watts in third column. Net work affiliations in fourth column. C Columbia, R National Red, B National Blue, N National Red and Blue. F Canadian, M Mutual.

ALABAMA Birmingham WAPI 1140 5000 C WBRC 930 1000 R WSGN 1310 100 B Decatur WMFO 1370 100 Dothan WAGF 1370 250 Gadsden WJBY 1210 100 Huntsville WBHP 1200 100 Mobile WALA 1380 500 C Montgomery WSFA 1410 500 C Selma WHBB 1500 100 Sheffield WMSD 1420 100 Tuscaloosa WJRD 1200 250	Pine Bluff KOTN 1500 100 Siloam Springs KUOA 1260 5000 <hr/> CALIFORNIA <hr/> Bakersfield KERN 1370 100 N KPMC 1550 1000 M Berkeley KRE 1370 100 Beverly Hills KMPC 710 500 Chico KHSL 1260 250 El Centro KXO 1500 100 Eureka KIEM 1450 500 M Fresno KARM 1310 100 C KMJ 580 1000 N Glendale KIEV 850 250 Hollywood KFVB 950 1000 Long Beach KFOX 1250 1000 KGER 1360 1000 Los Angeles KECA 1430 1000 B KEHE 780 1000 KFAC 1300 1000 KFI 640 50000 R KFSG 1120 500 KFVD 1000 1000 KGFJ 1200 100 KHJ 900 1000 M KMTR 570 1000 KNX 1050 50000 C KRKD 1120 500 Merced KYOS 1040 250 Modesto KTRB 740 250 Monterey KDON 1210 100 M Oakland KLS 1280 250 KLX 880 1000 KROW 930 1000 Pasadena KPCC 1210 100 Redding KVCV 1200 100 Sacramento KFBK 1490 5000 N KROY 1210 100 C San Bernardino KFYM 1210 100 M San Diego KFSD 600 1000 B KGB 1330 1000 M San Francisco KFRC 610 1000 M KGGC 1420 100 KGO 790 7500 B KJBS 1070 500 KPO 680 50000 R	KFSO 560 1000 C KYA 1230 1000 San Jose KQW 1010 1000 M San Luis Obispo KVEC 1200 250 Santa Ana KVOE 1500 100 M Santa Barbara KDB 1500 100 M KTMS 1220 500 B Santa Rosa KSRO 1310 250 Stockton KGDM 1100 1000 M KWG 1200 100 N Visalia KTKC 1190 250 Watsonville KHUB 1310 250 <hr/> COLORADO <hr/> Alamosa KGIW 1420 100 Colorado Springs KFOR 1270 1000 C Denver KFEL 920 500 M KLZ 560 1000 C KOA 830 50000 R KPOF 880 1000 KVOD 920 500 B Durango KIUP 1370 100 Grand Junction KFXJ 1200 100 Greeley KFKA 880 500 M La Junta KOKO 1370 100 Lamar KIDW 1420 100 Pueblo KGHF 1320 500 B Sterling KGEK 1200 100	DELAWARE Wilmington WDEL 1120 250 R WILM 1420 100 <hr/> DISTRICT OF COLUMBIA <hr/> Washington WJSV 1460 10000 C WMAL 630 250 B WOL 1310 1000 M WRC 950 500 R <hr/> FLORIDA <hr/> Daytona Beach WMEF 1420 100 Gainesville WRUF 830 5000 Jacksonville WJAX 900 1000 N WMBR 1370 100 C Lakeland WLAK 1310 100 Miami WIOD 610 1000 N WMBF 610 1000 WOAM 560 1000 C Miami Beach WKAT 1500 100 Orlando WDBO 580 1000 C Pensacola WCOA 1340 500 C St. Augustine WFOY 1210 100 St. Petersburg WSUN 620 1000 N Tallahassee WTAL 1310 100 Tampa WDAE 1220 1000 C WFLA 620 1000 N West Palm Beach WJNO 1200 100 C <hr/> GEORGIA <hr/> Albany WGPC 1420 100 Athens WGAU 1310 100 Atlanta WAGA 1450 500 B WATL 1370 100 WCST 890 1000 C WSB 740 50000 R Augusta WRDW 1500 100 C Columbus WRBL 1200 100 Griffin WKEU 1500 100 Macon WMAZ 1180 1000 C Rome WRGA 1500 100 Savannah WTOG 1260 1000 C
ALASKA Anchorage KFOD 780 250 Juneau KINY 1310 100 Ketchikan KGBU 900 500	ARIZONA Jerome KCRJ 1310 100 Lowell KSUN 1200 100 Phoenix KOY 1390 1000 C KTAR 620 1000 N Tucson KGAR 1370 100 C KVOA 1260 1000 Yuma KUMA 1420 100	ARKANSAS Blytheville KLCN 1290 100 El Dorado KELD 1370 100 Fort Smith KFPW 1210 100 Hot Springs KTHS 1060 10000 N Jonesboro KBTM 1200 100 Little Rock KARK 890 500 N KGHJ 1200 100 KLRA 1390 1000 C	

NORTH AMERICAN B. C. STATIONS BY LOCATIONS

Thomasville WPAX 1210 100	Rockford WROK 1410 500	Marshalltown KFJB 1200 100	Lake Charles KPLC 1500 100
Waycross WAYX 1200 100	Rock Island WHBF 1210 100	Mason City KGLO 1210 100 C	Monroe KMLB 1200 100
HAWAII			
Hilo KHBC 1400 250M	Springfield WCBS 1420 100	Shenandoah KFNF 890 500	New Orleans WBNO 1200 100
Honolulu KGMB 1320 1000 C	WTAX 1210 100	KMA 930 1000	WDSU 1250 1000 B
KGU 750 2500 N	Tuscola WDZ 1020 250	Sioux City KSCJ 1330 1000 C	WJBW 1200 100
IDAHO			
Boise KIDO 1350 1000 N	Urbana WILL 580 1000	KTRI 1420 100 C	WSMB 1320 1000 R
Coeur d'Alene KGCJ 1200 100	KANSAS		
Idaho Falls KID 1320 500	Abilene KFBI 1050 5000	Coffeyville KGGF 1010 1000M	Shreveport KRMD 1310 100
Lewiston KRLC 1390 250	Anderson WHBU 1210 100	Dodge City KGNO 1340 250	KTBS 1450 1000 N
Nampa KFXD 1200 100	Elkhart WTRC 1310 100	Garden City KIUL 1210 100	KWKH 1100 10000 C
Pocatello KSEI 900 250 N	Evansville WEOA 1370 100 C	Great Bend KVGB 1370 100	MAINE
Twin Falls KTFI 1240 1000 N	WGBF 630 500 N	Hutchinson KWBG 1420 100	Augusta WRDO 1370 100M
ILLINOIS			
Bloomington WJBC 1200 100	Fort Wayne WGL 1370 100 N	Kansas City KCKN 1310 100	Bangor WABI 1200 100
Carthage WCAZ 1070 100	WOWO 1160 10000 B	Lawrence KFKU 1220 1000	WLBZ 620 500 C
Champaign WDWS 1370 100	Gary WIND 560 1000	WREN 1220 1000 B	Portland WGSW 940 1000 R
Chicago WAAF 920 1000	Hammond WHIP 1480 5000	Manhattan KSAC 580 500	WGAN 640 500
WBBM 770 50000 C	WVAE 1200 100	Pittsburg KOAM 790 1000 N	Presque Isle WAGM 1420 100
WGBD 1080 5000	Indianapolis WFBM 1230 1000 C	Salina KSAL 1500 100	MARYLAND
WGFL 970 5000 N	WCGA 1050 1000	Topeka WIBW 580 1000 C	Baltimore WBAL 760 2500 B
WGRW 1210 100	WIRE 1400 1000 R	Wichita KANS 1210 100 B	WBAL 1960 10000 B
WEDC 1210 100	Muncie WLBC 1310 100	KFH 1300 1000 C	WCAO 600 500 C
WENR 870 50000 B	New Albany WGRC 1370 250	KENTUCKY	
WGES 1360 500	Richmond WKIV 1500 100	Ashland WCM1 1310 100	WCBM 1370 100
WGN 720 50000M	South Bend WFAM 1200 100	Covington WCKY 1490 10000 N	WFBR 1270 500 R
WJJD 1130 20000	WBSB 1360 500	Lexington WLAP 1420 100	College Park W3XJ 1060 100
WLS 870 50000 R	Terre Haute WBOW 1310 100 N	Louisville WAVE 940 1000 N	Cumberland WTBO 800 250
WMAO 670 50000 R	West Lafayette WBAA 890 500	WHAS 820 50000 C	Frederick WFMD 900 500
WMBI 1080 5000	IOWA		
WSBC 1210 100	Ames WOI 640 5000	Middlesboro WLMU 1210 100	Hagerstown WJEJ 1210 50
Cicero WHFC 1420 100	Boone KFGQ 1370 100	Owensboro WOMI 1500 100	Salisbury WSAL 1200 250
Decatur WJBL 1200 100	Cedar Rapids WMT 600 1000 B	Paducah WPAD 1420 100	MASSACHUSETTS
East Dubuque WKBB 1500 100 C	Davenport WOC 1370 100 C	Louisiana KALB 1210 100	Boston WAAB 1410 500M
East St. Louis WTMV 1500 100	Decorah KGCA 1270 100	Baton Rouge WJBO 1120 500 B	WBZ 990 50000 B
Galesburg WGIL 1500 250	KWLC 1270 100	Lafayette KVOL 1310 100	WCOP 1120 500
Harrisburg WEBQ 1210 100	Des Moines KRNT 1320 1000 C	LOUISIANA	
Joliet WCLS 1310 100	KSO 1430 500 B	Alexandria KALB 1210 100	WEEL 590 1000 C
Peoria WMBD 1440 1000 C	WHIO 1000 50000 R	Baton Rouge WJBO 1120 500 B	WHDH 830 1000
Quincy WTAD 900 1000	Dubuque KDTH 1340 500	Lafayette KVOL 1310 100	WMEX 1500 100
	Iowa City WSUI 880 500		WNAC 1230 1000 R
			WORL 920 500 R
			Fall River WSAR 1450 1000M
			Greenfield WHAI 1210 250
			Lawrence WLAW 680 1000
			WLEH 1370 100
			Lowell WLLH 1370 100M
			New Bedford WNBH 1310 100M
			Pittsfield WBRK 1310 100 C

NORTH AMERICAN B. C. STATIONS BY LOCATIONS

Springfield WBZA 990 1000 B WMAS 1420 100 C WSPR 1140 500 M Worcester WORC 1280 500 C WTAG 580 1000 R	St. Paul KSTP 1460 10000 R WMIN 1370 100 Virginia WHLB 1370 100 C Winona KWNO 1200 250	Wolf Point KGCX 1450 1000	Gallup KAWM 1500 100 Hobbs KWEW 1500 100 Roswell KGFL 1370 100 Santa Fe KRQA 1310 100
MICHIGAN	MISSISSIPPI	NEBRASKA	NEW YORK
Battle Creek WELL 1420 100 Bay City WBCM 1410 500 Calumet WHDF 1370 100 Detroit WJBK 1500 100 WJR 750 50000 C WMBC 1420 100 WWJ 920 5000 R WXYZ 1240 1000 B East Lansing WKAR 850 1000 Flint WFDF 1310 100 Grand Rapids WASH 1270 500 N WOOD 1270 500 N Ironwood WJMS 1420 100 Jackson WIBM 1370 100 Kalamazoo WKZO 590 1000 B Lansing WJIM 1210 100 Lapeer WMPG 1200 100 Marquette WBEO 1310 100 Muskegon WKBZ 1500 100 Royal Oak WEXL 1310 50 Saginaw WHAL 950 500	Grenada WGRM 1210 100 Gulfport WGCM 1210 100 Hattiesburg WFOR 1370 100 Jackson WJDX 1270 1000 R Kosciusko WHEF 1500 100 Laurel WAML 1310 100 Meridian WCOC 880 500 C Vicksburg WQBC 1360 1000	Clay Center KMMJ 740 1000 Kearney KGFV 1310 100 Lincoln KFAB 770 10000 C KFOR 1210 100 C Norfolk WJAG 1060 1000 North Platte KGNF 1430 1000 Omaha KOIL 1260 1000 B WAAW 660 500 WOW 590 1000 R Scottsbluff KGGY 1500 100	Albany WABY 1370 100 WOKO 1430 500 C Auburn WMBQ 1310 100 Binghamton WBNF 1500 100 C Brooklyn WARD 1400 500 WBBC 1400 500 WBBR 1300 1000 WCNW 1500 100 WLTH 1400 500 WMBQ 1500 100 WVFW 1400 500 Buffalo WBEN 900 1000 R WBNI 1370 100 WBRR 1310 100 B WGR 550 1000 C WKBW 1480 5000 C WSVS 1370 50 Canton WCAD 1220 500 Elmira WESG 850 1000 C Freeport WGBB 1210 100 Jamestown WJTN 1210 100 B Newburgh WGNV 1210 100 New York WABC 860 50000 C WBIL 1100 5000 WBNX 1350 1000 WBOQ 860 50000 R WEAF 660 50000 R WEVD 1300 1000 WFAB 1300 1000 WHN 1010 1000 WINS 1180 1000 WJZ 760 50000 B WMCA 570 1000 WNEW 1250 1000 WNYC 810 1000 WOV 1130 1000 WQXR 1550 1000 Olean WHDL 1400 250 Plattsburg WMFF 1310 100 Rochester WHAM 1150 50000 B WHFC 1430 500 C WSAY 1210 100 Saranac Lake WNBZ 1290 100 Schenectady WGY 790 50000 R Syracuse WFBL 1360 1000 C WSYR 570 1000 B
MINNESOTA	MISSOURI	NEVADA	
Albert Lea KATE 1420 250 Duluth KDAL 1500 100 C WEBC 1290 1000 N Fergus Falls KGDE 1200 100 Hibbing WMFG 1210 100 Mankato KYSM 1500 100 Minneapolis WCCO 810 50000 C WDGY 1180 1000 C WLB 1250 1000 WTCN 1250 1000 B Moorhead KVOX 1310 100 Northfield WCAL 1250 1000 Rochester KRCC 1310 100 St. Cloud KFAM 1420 100	Cape Girardeau KFVS 1210 100 Columbia KFRU 630 500 Jefferson City KWOS 1310 100 Joplin WMBII 1420 100 Kansas City KCMO 1370 100 KMBC 950 1000 C KXBY 1530 1000 WDAF 610 1000 R WHB 860 1000 M Poplar Bluff KWOC 1310 100 St. Joseph KFEQ 680 2500 St. Louis KFUO 550 500 KMOX 1090 50000 C KSD 550 1000 R KWK 1350 1000 B KXOK 1250 1000 WEW 760 1000 WIL 1200 100 Springfield KGBX 1230 500 N KWTO 560 5000	Reno KOH 1380 500 C	
	MISSOURI	NEW HAMPSHIRE	
	MONTANA	NEW JERSEY	
	Billings KGHL 780 1000 N Butte KGIR 1340 1000 N Great Falls KFBB 1280 1000 C Helena KPFA 1210 100 Kalispell KGEZ 1310 100 Lewistown KDNC 1200 100 Missoula KGVO 1260 1000 C	Asbury Park WCAP 1280 500 Atlantic City WPG 1100 5000 C Bridgeton WSNJ 1210 100 Camden WCAM 1280 500 Jersey City WAAT 940 500 WHOM 1450 250 Newark WHBI 1250 1000 WOR 710 50000 M Red Bank WBRB 1210 100 Trenton WTNJ 1280 500 Whippany W3XDD 50000 Zarephath WAWZ 1350 500	
		NEW MEXICO	
		Albuquerque KGGM 1230 1000 KOB 1180 10000 N Carlsbad KLAH 1210 100 Clovis KICA 1370 100	

NORTH AMERICAN B. C. STATIONS BY LOCATIONS

<p>Troy WHAZ 1300 1000</p> <p>Utica WIBX 1200 100 C</p> <p>Watertown WNNY 1420 100</p> <p>White Plains WFAS 1210 100</p> <p>Woodside WWRL 1500 100</p>	<p>WSAI 1330 1000 N WX80 700 500000</p> <p>Cleveland WCLE 610 500 M WGAR 1450 500 C WHK 1390 1000 B WTAM 1070 50000 R</p> <p>Columbus WBNS 1430 500 C WCOL 1210 100 N WHKC 640 500 WOSU 570 750</p> <p>Dayton WHTO 1260 1000 C WSMK 1380 200 C</p> <p>Lima WBLY 1210 100</p> <p>Portsmouth WPAY 1370 100</p> <p>Toledo WSPD 1340 1000 B WTOL 1200 100</p> <p>Youngstown WKBN 570 500 C</p> <p>Zanesville WALR 1210 100</p>	<p>Portland KALE 1300 1000 M KBPS 1420 100 KEX 1180 5000 B KGW 620 1000 R KOIN 940 1000 C KWJJ 1040 500 KXL 1420 100</p> <p>Roseburg KRNK 1500 100 M</p> <p>Salem KSLM 1370 100 M</p>	<p>York WORK 1320 1000 N</p>
PUERTO RICO			
<p>Mayaguez WPRA 1370 100</p> <p>Ponce WPRP 1420 100</p> <p>San Juan WKAQ 1040 1000 WNEL 1290 1000</p>			
RHODE ISLAND			
<p>Providence WEAN 780 1000 M WJAR 890 1000 R WPRO 630 500 C</p>			
SOUTH CAROLINA			
<p>Anderson WAIM 1200 100 C</p> <p>Charleston WCSC 1360 500 N</p> <p>Columbia WIS 560 1000 N</p> <p>Florence WOLS 1200 100</p> <p>Greenville WFBC 1300 1000 N</p> <p>Spartanburg WSPA 920 1000</p>			
SOUTH DAKOTA			
<p>Aberdeen KABR 1420 100</p> <p>Brookings KFBY 780 1000</p> <p>Huron KGDY 1340 250</p> <p>Pierre KGFX 630 200</p> <p>Rapid City KOBH 1370 100</p> <p>WCAT 1200 100</p> <p>Sioux Falls KELO 1200 100 N</p> <p>KSOO 1110 2500 N</p> <p>Vermillion KUSD 890 500</p> <p>Watertown KWTN 1210 100</p> <p>Yankton WNAX 570 1000 C</p>			
TENNESSEE			
<p>Bristol WOPI 1500 100</p> <p>Chattanooga WAPO 1420 100 WDOD 1280 1000 C</p> <p>Jackson WTJS 1310 100</p> <p>Knoxville WNOX 1010 1000 C WROL 1310 100 N</p> <p>Memphis WHBO 1370 100 WMC 780 1000 R WMPS 1430 500 B WREC 600 1000 C</p>			
PENNSYLVANIA			
<p>Allentown WCBA 1440 500 WSAN 1440 500 N</p> <p>Altoona WFBG 1310 100</p> <p>Easton WEST 1200 100</p> <p>Erie WLEU 1420 100 B</p> <p>Glenside WIBG 970 100</p> <p>Greensburg WHJB 620 250 C</p> <p>Grove City WSAJ 1310 100</p> <p>Harrisburg WHP 1430 500 C WKBO 1200 100</p> <p>Hazleton WAZL 1420 100</p> <p>Johnstown WJAC 1310 100</p> <p>Lancaster WGAL 1500 100</p> <p>Philadelphia KYW 1020 10000 R WCAU 1170 50000 C WDAS 1370 100 WFIL 560 1000 B WHAT 1310 100 WIP 610 1000 WPEN 920 1000 WRAX 920 1000 WTEL 1310 100</p> <p>Pittsburgh KDKA 980 50000 B KQV 1380 500 C WCAE 1220 1000 R WJAS 1290 1000 C WWSW 1500 100</p> <p>Reading WEEU 830 1000 WRAW 1310 100</p> <p>Scranton WGBI 880 500 WQAN 880 500</p> <p>Sunbury WKOK 1210 100</p> <p>Uniontown WMBS 1420 250</p> <p>Wilkes-Barre WBAX 1210 100 M WBRE 1310 100 N</p> <p>Williamsport WRAK 1370 100</p>			
OKLAHOMA			
<p>Ada KADA 1200 100 M</p> <p>Ardmore KVSO 1210 100 M</p> <p>Elk City KASA 1210 100</p> <p>Enid KERC 1360 250 M</p> <p>Muskogee KBIX 1500 100 M</p> <p>Norman WNAD 1010 1000</p> <p>Oklahoma City KFXR 1310 100 KOMA 1480 5000 C KTOK 1370 100 M WKY 900 1000 N</p> <p>Okmulgee KHBG 1210 100</p> <p>Ponca City WBBZ 1200 100 M</p> <p>Shawnee KGGF 1420 100 M</p> <p>Tulsa KTUL 1400 500 C KVOO 1140 25000 N</p>			
OREGON			
<p>Astoria KAST 1370 100</p> <p>Corvallis KOAC 550 1000</p> <p>Eugene KORE 1420 100 M</p> <p>Klamath Falls KFJI 1210 100</p> <p>La Grande KLEB 1420 100</p> <p>Marshfield KOOS 1200 100</p> <p>Medford KMED 1410 250 N</p>			
NORTH CAROLINA			
<p>Asheville WWNC 570 1000 N</p> <p>Charlotte WBT 1080 50000 C WSOC 1210 100 N</p> <p>Durham WDNC 1500 100 C</p> <p>Greensboro WBIG 1440 1000 C</p> <p>High Point WMFR 1200 100</p> <p>Kinston WFTC 1200 100</p> <p>Raleigh WPTF 680 1000 N</p> <p>Rocky Mount WEED 1420 100</p> <p>Wilmington WMFD 1370 100</p> <p>Wilson WGTM 1310 100</p> <p>Winston-Salem WAIR 1250 250 WSJS 1310 100 C</p>			
NORTH DAKOTA			
<p>Bismarck KFYR 550 1000 N</p> <p>Devils Lake KDLR 1210 100</p> <p>Fargo WDAY 940 1000 N</p> <p>Grand Forks KFJM 1410 500</p> <p>Jamestown KRMC 1370 100</p> <p>Mandan KGCU 1240 250</p> <p>Minot KLPM 1240 250</p> <p>Valley City KOVC 1500 100</p>			
OHIO			
<p>Akron WADC 1320 1000 C WJW 1210 100</p> <p>Ashtabula WICA 940 250</p> <p>Canton WHBC 1200 100</p> <p>Cincinnati WCPO 1200 100 WKRC 550 1000 C WLW 700 500000 N</p>			

NORTH AMERICAN B. C. STATIONS BY LOCATIONS

Nashville WLAC 1470 5000 C WSIX 1210 100 WSM 650 50000 N	San Angelo KGKL 1370 100 San Antonio KABC 1420 100 KMAC 1370 100 KONO 1370 100 KTSA 550 1000 C WAOI 1190 50000 N Sherman KRRV 1310 250 Temple KTEM 1370 250 Texarkana KCMC 1420 100 Tyler KGKB 1500 100 Waco WACO 1420 100 C Weslaco KRGV 1260 1000 N Wichita Falls KGKO 570 250 C	Bellingham KVOS 1200 100M Centralia KELA 1440 500M Everett KRKO 1370 50 Longview KWLK 780 250 Olympia KGY 1210 100M Pullman KWSC 1220 1000 Seattle KEEN 1370 100 KIRO 710 1000 C KJR 970 5000 B KOL 1270 1000M KOMO 920 1000 R KRSC 1120 250 KTW 1220 1000 KXA 760 250 Spokane KFIO 1120 100 KFPY 890 1000 C KGA 1470 5000 B KHQ 590 1000 R Tacoma KMO 1330 1000M KVI 570 1000 C Walla Walla KUJ 1370 100 Wenatchee KPO 1500 100M Yakima KIT 1250 250M	WISN 1120 250 C WTMJ 620 1000 N Poyette WIBU 1210 100 Racine WRJN 1370 100 Shebogan WHBL 1300 250 Stevens Point WJBL 900 5000 Superior WDSM 1200 100 Wausau WSAU 1370 100
TEXAS	UTAH	WEST VIRGINIA	WYOMING
Abilene KRBC 1420 100 Amarillo KGNC 1410 1000 N Austin KNOW 1500 100 C KTBC 1120 1000 Beaumont KFDM 560 500 N KRIC 1420 100 Big Spring KBST 1500 100 Brady KNEL 1500 250 Brownsville KGFI 1500 100 College Station WTAW 1120 500 Corpus Christi KRIS 1330 500 N Corsicana KAND 1310 100 Dallas KRLD 1040 10000 C WFAA 800 50000 N WRR 1280 500M Denton KDNT 1420 100 Dublin KEPL 1310 100 El Paso KR0D 1500 100 KTSM 1310 100 N WDAH 1310 100 Fort Worth KFJZ 1370 100 KJAT 1240 1000M WBAP 800 50000 N Galveston KLUF 1370 100 Greenville KGVL 1200 100 Houston KPRC 920 1000 R KTRH 1290 1000 C KXYZ 1440 1000 B Kilgore KOCA 1210 100 Laredo KPAB 1500 100 Longview KFRO 1370 250 Lubbock KFYO 1310 100 Lufkin KRBA 1310 100 Midland KRLH 1420 100 Palestine KNET 1420 100 Pampa KPDN 1310 100 Paris KPLT 1500 250 Pecos KIUN 1420 100 Port Arthur KPAC 1260 500	Cedar City KSUB 1310 100 Logan KVNJ 1500 100 Ogden KLO 1400 500 B Price KEUB 1420 100 Salt Lake City KDYL 1290 1000 R KSL 1130 50000 C KUTA 1500 100	Bluefield WHIS 1410 500 Charleston WCHS 580 500 C Clarksburg WBLK 1370 100 Fairmont WMMN 890 500 C Huntington WSAZ 1190 1000 Parkersburg WPAR 1420 100 C Wheeling WWVA 1160 5000 C	Casper KDFN 1440 500 Rock Springs KVR5 1370 100 Sheridan KWYO 1370 100
	VERMONT	WISCONSIN	BAHAMAS
	Burlington WCAX 1200 100 Rutland WSYB 1500 100 St. Albans WQDM 1390 1000 Springfield WNBX 1260 500 C Waterbury WDEV 550 500	Eau Claire WEAU 1050 1000 Fond du Lac KFIZ 1420 100 Green Bay WBHY 1200 100 WTAQ 1330 1000 C Janesville WCLO 1200 100 LaCrosse WKBH 1380 1000 C Madison WHA 940 5000 WIBA 1280 1000 N Manitowoc WOMT 1210 100 Milwaukee WEMP 1310 100	Nassau ZNS 540 400
	VIRGINIA		CANADA
	Charlottesville WCHV 1420 100 Danville WBTM 1370 100 Harrisonburg WSVA 550 500 Lynchburg WLVA 1200 100 Newport News WGH 1310 100 Norfolk WTAR 780 1000 N Richmond WUBL 1210 100 WMBG 1350 500 R WRNL 880 500 WRTE 1500 100 B WRVA 1110 5000 C Roanoke WDBJ 930 1000 C		ALBERTA
	WASHINGTON		Calgary CFAC 930 1000 F CFCN 1030 10000 F CJ CJ 690 100 F Edmonton CFRN 960 100 F CJCA 730 1000 F CKUA 580 500 F Grande Prairie CFGP 1200 100 Lethbridge CJOC 950 100 F
	Aberdeen KXRO 1310 100M		BRIT. COLUMBIA
			Chilliwack CHWK 780 100 F Kamloops CFJC 880 1000 F Kelowna CKOV 630 100 F Prince Rupert CFPR 580 50 Trail CJAT 910 1000 F Vancouver CBR 1100 5000 F CJOR 600 500 CKCD 1010 100 CKFC 1410 50 CKMO 1410 100 CKWX 1010 100 Victoria CFCT 1450 500
			MANITOBA
			Brandon CKX 1120 1000 F Flin Flon CFAR 1370 100

NORTH AMERICAN B. C. STATIONS BY LOCATIONS

<p>Winnipeg CJRC 630 500 F CKY 910 15000 F</p> <p>NEW BRUNSWICK</p> <p>Fredericton CFNB 550 500 F Moncton CKCW 1370 100 F St. John GHSJ 1120 500 F</p> <p>N. W. TERRITORY</p> <p>Aklavik CJCU 1210 50</p> <p>NOVA SCOTIA</p> <p>Glace Bay VAS 685 2000 Halifax CHNS 930 1000 F Sydney CJCB 1240 1000 F Wolfville CKIK 1010 50 Yarmouth CJLS 1310 100</p> <p>ONTARIO</p> <p>Brantford CKPC 930 100 F Chatham CFCO 630 100 F Cobalt CKMC 1210 50 Fort William CKPR 730 100 F Hamilton CHML 1010 100 F CKOC 1120 500 F Kenora 1420 100 Kingston CFRC 1510 100 F London CFPL 730 100 F North Bay CFHC 930 100 F CJKL 1310 100 CKGB 1420 100 Ottawa CBO 880 1000 F CKCO 1010 100 F Owen Sound 1370 100 Prescott CFCL 930 100 St. Catharines CKTB 1200 100 F Sault Ste. Marie CJIC 1500 100 Stratford CJCS 1210 50 Sudbury CKSO 780 1000 F Toronto CBL 840 50000 F CFRB 690 10000 C CKCL 580 100 F CRCY 960 100 F Waterloo CKCR 1510 100</p>	<p>Windsor CKLW 1030 5000 F Wingham GKNX 1200 100</p> <p>PRINCE EDWARD ISLAND</p> <p>Charlottetown CFGY 630 1000 F CHCK 1310 50 Summerside CHGS 1450 50 F</p> <p>QUEBEC</p> <p>Chicoutimi CRCS 620 100 F Hull CKKH 1210 100 F Montreal CBF 910 50000 N CBM 1050 5000 F CFCF 600 500 B CHLP 1120 100 F CKAC 730 5000 C New Carlisle CHNC 960 1000 F Quebec CHRC 580 100 CKCV 1310 100 F CRCK 950 1000 F Rimouski CJBR 1030 1000 F Sherbrooke CHLT 1210 100 Three Rivers CHLN 1420 100</p> <p>SASKATCHEWAN</p> <p>Moose Jaw CHAB 1200 100 F Prince Albert CKBI 1210 100 F Regina CJRM 540 1000 F CKCK 1010 1000 F Saskatoon CFQC 840 1000 F Yorkton CJGX 1390 100 F</p>	<p>Ciego de Avila CMJH 1360 50 CMJI 1130 150 CMJO 1180 50</p> <p>Cienfuegos CMHJ 1160 175 CMHM 1450 100 CMHX 760 200</p> <p>Cruces CMHK 1330 250</p> <p>Guantanamo CMKS 960</p> <p>Havana CMBC 950 10000 CMBD 1260 500 CMBF 770 10000 CMBL 750 2500 CMBO 680 5000 CMBS 1170 150 CMBX 1070 500 CMBY 970 150 CMBZ 1000 500 CMC 1260 150 CMCA 1350 450 CMCB 1230 150 CMCD 630 250 CMCF 810 600 CMCG 680 1000 CMCJ 1110 500 CMCK 1030 CMCL 730 10000 CMCM 850 CMCO 1200 250 CMCQ 1410 5000 CMCR 1380 CMCU 1290 500 CMCW 1140 500 CMCX 1380 150 CMCY 570 5000 CMK 720 3000 CMOA 1440 150 CMOX 1320 200 CMQ 600 25000 CMW 880 1400 CMX 920 1000 630 10000</p> <p>Holguin CMFK 1460 250 CMKO 1280</p> <p>Manzanillo CMKM 1120 200</p> <p>Matanzas CMGC 1400 150 CMGF 1120 250 CMGH 790 500</p> <p>Moron CMJP 1430 75</p> <p>Pinar del Rio CMAB 1340 300</p> <p>Sagua la Grande CMHA 1070 50</p> <p>Sancti Spiritus CMHB 1240 50</p> <p>Santa Clara CMHI 1210 150 CMHW 820 100</p> <p>Santiago CMKC 1250 150 CMKD 1050 250 CMKG 1160 CMKR 1400 100 CMKW 1350</p>	<p>DOMINICAN REPUBLIC</p> <p>Trujillo HIT 1050 50 HIX 800 800 HI7P 1300 25</p> <p>EL SALVADOR</p> <p>San Salvador YSS 640 500</p> <p>GUATEMALA</p> <p>Guatemala City TGW 1520 1000 TGI 1305</p> <p>HONDURAS</p> <p>Tegucigalpa HRN 1250 50</p> <p>MEXICO</p> <p>AGUASCALIENTES</p> <p>Aguascalientes XEBI 1000 25</p> <p>BAJA CALIFORNIA</p> <p>Mexicali XEAA 750 200 XEAO 660 250</p> <p>Rosarito Beach XERB 730 100000</p> <p>Tijuana XEAC 980 1000 XEAU 1320 XEBG 820 1000 XEC 1150 100 XELO 580 10000 XEMO 860 5000 XEOK 760 2500</p> <p>CHIHUAHUA</p> <p>Chihuahua XEBU 1200 50 XEFI 1440 250</p> <p>Juarez XEFV 1210 100 XEF 1450 100 XEJ 1020 1000 XEP 1160 500 Parral XEAT 1210 250</p> <p>COAHUILA</p> <p>Piedras Negras XEMU 580 250 XEPN 730 100000</p> <p>Sabinas XEBX 640 250</p> <p>Saltillo XEAS 1160 100 XELA 1240 50</p> <p>Torreón XETB 1310 125</p> <p>Villa Acuna XEDH 1340 200 XERA 840 250000</p> <p>D. F.</p> <p>Gral. Anaya XEDA 1220 200</p>
<p>COSTA RICA</p> <p>San Jose TIEP 880 1000 TIPG 625 2000 TIX 650 1000</p>			
<p>CUBA</p> <p>Caibarien CMHD 1270 250</p> <p>Camaguey CMJA 1010 300 CMJC 1390 150 CMJE 1220 50 CMJF 1150 200 CMJK 780 250 CMJL 1340 75 CMJQ 1080 200 CMJX 830 500 Cardenas CMGE 1370 150</p>			

NORTH AMERICAN B. C. STATIONS BY LOCATIONS

<p>Mexico City</p> <p>XEAI 1250 500 XEAL 660 1000 XEB 1030 10000 XEBB 1340 200 XEBZ 810 100 XEDP 1080 500 XEFO 940 5000 XEJP 1130 100 XEJW 870 500 XEK 890 100 XEL 1100 250 XELZ 1370 100 XEMX 1280 100 XEN 780 1000 XENC 860 50 XEW 890 50000 XEXM 610 500 XEXS 1310 100 XEXX 1170 1000 XEYO 610 500</p> <p>Tacuba XEFA 1180 500</p> <p>Texcoco XEZE 1270 17</p> <p style="text-align: center;">DURANGO</p> <p>Durango XEBP 1150 250 XEE 1210 50</p> <p style="text-align: center;">GUANAJUATO</p> <p>Irapuato XEBO 1310 25</p>	<p>Leon XEEM 1160 20 XEKL 1240 500</p> <p style="text-align: center;">JALISCO</p> <p>Guadalajara XED 1160 2500</p> <p>Guzman XEBA 1080 20</p> <p style="text-align: center;">MICHOACAN</p> <p>Morelia XEI 1370 125</p> <p style="text-align: center;">NUEVO LEON</p> <p>Monterrey XEFB 870 200 XEG 1230 250 XEH 720 250 XET 600 5000 XEX 1310 125</p> <p style="text-align: center;">PUEBLA</p> <p>Puebla XETH 1210 100</p> <p style="text-align: center;">SAN LUIS POTOSI</p> <p>San Luis Potosi XECZ 1370 100 XEXH 1250 250</p>	<p style="text-align: center;">SINALOA</p> <p>Mazatlan XEBL 1220 50</p> <p style="text-align: center;">SONORA</p> <p>Cananea XEFO 1010 50</p> <p>Hermosillo XEBH 930 500</p> <p>Nogales XEAF 990 750</p> <p>Obregon XEAP 1340 50</p> <p style="text-align: center;">TAMAULIPAS</p> <p>Matamoros XEAM 750 25</p> <p>Nuevo Laredo XEBK 1080 100 XEDF 810 100 XEFE 980 250 XENT 910 150000</p> <p>Reynosa XEAW 960 100000</p> <p>Tampico XEFW 1310 300 XES 990 250</p>	<p style="text-align: center;">VERACRUZ</p> <p>Cordoba XEAG 1310 10</p> <p>Jalapa XEXB 1270 250 XEXD 1340 350</p> <p>Minatitlan XEDW 1150 20</p> <p>Veracruz XETF 1220 12 XEU 1010 250</p> <p style="text-align: center;">YUCATAN</p> <p>Merida XEFC 550 100 XEME 1240 50 XEZ 630 500</p> <p style="text-align: center;">ZACATECAS</p> <p>Zacatecas XEAZ 1230 200</p> <p style="text-align: center;">MIQUELON</p> <p>St. Pierre FQN 609 250</p> <p style="text-align: center;">NEWFOUNDLAND</p> <p>St. John's VOAC 1065 40 VOAS 940 100 VOCM 1006 200 VOGY 840 400 VONF 1195 500 VOWR 681 500</p>
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NORTH AMERICAN B. C. STATIONS BY CALLS

<p>CBF 910 50000 Montreal, P. Q.</p> <p>CBL 840 50000 Toronto, Ont.</p> <p>CBM 1050 5000 Montreal, P. Q.</p> <p>CBO 880 1000 Ottawa, Ont.</p> <p>CBR 1100 5000 Vancouver, B. C.</p> <p>CFAC 930 1000 Calgary, Alta.</p> <p>CFAR 1370 100 Flin Flon, Man.</p> <p>CFCF 600 500 Montreal, Que.</p> <p>CFCH 930 100 North Bay, Ont.</p> <p>CFCN 1030 10000 Calgary, Alta.</p> <p>CFCO 630 100 Chatham, Ont.</p> <p>CFCT 1450 500 Victoria, B. C.</p> <p>CFCY 630 1000 Charlottetown, P.E.I.</p> <p>CFGP 1200 100 Grande Prairie, Alta.</p> <p>CFJC 880 1000 Kamloops, B. C.</p> <p>CFLC 930 100 Prescott, Ont.</p>	<p>CFNB 550 500 Fredericton, N. B.</p> <p>CFPL 730 100 London, Ont.</p> <p>CFPR 580 50 Prince Rupert, B. C.</p> <p>CFQC 840 1000 Saskatoon, Sask.</p> <p>CFRB 690 10000 Toronto, Ont.</p> <p>CFRC 1510 100 Kingston, Ont.</p> <p>CFRN 960 100 Edmonton, Alta.</p> <p>CHAB 1200 100 Moose Jaw, Sask.</p> <p>CHCK 1310 50 Charlottetown, P.E.I.</p> <p>CHGS 1450 50 Summerside, P.E.I.</p> <p>CHLN 1420 100 Three Rivers, P. Q.</p> <p>CHLP 1120 100 Montreal, Que.</p> <p>CHLT 1210 100 Sherbrooke, P. Q.</p> <p>CHML 1010 100 Hamilton, Ont.</p> <p>CHNC 960 1000 New Carlisle, Que.</p> <p>CHNS 930 1000 Halifax, N. S.</p> <p>CHRC 580 100 Quebec, Que.</p>	<p>CHSJ 1120 500 St. John, N. B.</p> <p>CHWK 780 100 Chilliwack, B. C.</p> <p>CJAT 910 1000 Trail, B. C.</p> <p>CJBR 1030 1000 Rimouski, P. Q.</p> <p>CJCA 730 1000 Edmonton, Alta.</p> <p>CJCB 1240 1000 Sydney, N. S.</p> <p>CJ CJ 680 100 Calgary, Alta.</p> <p>CJCS 1210 50 Stratford, Ont.</p> <p>CJCU 1210 50 Aklavik, N. W. T.</p> <p>CJGX 1390 100 Yorkton, Sask.</p> <p>CJIC 1500 100 S. Ste. Marie, Ont.</p> <p>CJKL 1310 100 North Bay, Ont.</p> <p>CJLS 1310 100 Yarmouth, N. S.</p> <p>CJOC 950 100 Lethbridge, Alta.</p> <p>CJOR 600 500 Vancouver, B. C.</p> <p>CJRC 630 500 Winnipeg, Man.</p> <p>CJRM 540 1000 Regina, Sask.</p>
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NORTH AMERICAN B. C. STATIONS BY CALLS

CKAC 730 Montreal, Que.	5000	CMBY 970 Havana, Cuba	150	CMJH 1360 Ciego de Avila, Cuba	50
CKBI 1210 Prince Albert, Sask.	100	CMBZ 1000 Havana, Cuba	500	CMJI 1130 Ciego de Avila, Cuba	150
CKCD 1010 Vancouver, B. C.	100	CMC 1260 Havana, Cuba	150	CMJK 780 Camaguey, Cuba	250
CKCH 1210 Hull, Que.	100	CMCA 1350 Havana, Cuba	450	CMJO 1180 Ciego de Avila, Cuba	50
CKCK 1010 Regina, Sask.	1000	CMCB 1230 Havana, Cuba	150	CMJP 1430 Camaguey, Cuba	75
CKCL 580 Toronto, Ont.	100	CMCD 630 Havana, Cuba	250	CMJQ 1080 Camaguey, Cuba	200
CKCO 1010 Ottawa, Ont.	100	CMCF 810 Havana, Cuba	600	CMJW 1340 Camaguey, Cuba	300
CKCR 1510 Waterloo, Ont.	100	CMCG 680 Havana, Cuba	1000	CMJX 830 Camaguey, Cuba	500
CKCV 1310 Quebec, Que.	100	CMCJ 1110 Havana, Cuba	500	CMK 720 Havana, Cuba	3000
CKCW 1370 Moncton, N. B.	100	CMCK 1030 Havana, Cuba	5000	CMKC 1250 Santiago, Cuba	150
CKFC 1410 Vancouver, B. C.	50	CMCL 730 Havana, Cuba	10000	CMKD 1050 Santiago, Cuba	250
CKGB 1420 North Bay, Ont.	100	CMCM 850 Havana, Cuba	....	CMKF 1460 Hoguin, Cuba	250
CKIC 1010 Wolfville, N. S.	50	CMCO 1200 Havana, Cuba	250	CMKG 1160 Santiago, Cuba	....
CKLW 1030 Windsor, Ont.	5000	CMCQ 1410 Havana, Cuba	5000	CKML 990 Bayamo, Cuba	...
CKMC 1210 Cobait, Ont.	50	CMCR 1380 Havana, Cuba	....	CKMK 1120 Manzanillo, Cuba	200
CKMO 1410 Vancouver, B. C.	100	CMCU 1290 Havana, Cuba	500	CMKO 1280 Hoguin, Cuba	....
CKNX 1200 Wingham, Ont.	100	CMCW 1140 Havana, Cuba	500	CKMR 1400 Santiago, Cuba	100
CKOC 1120 Hamilton, Ont.	500	CMCX 1380 Havana, Cuba	150	CKMS 960 Guantanamo, Cuba	....
CKOV 630 Kelowna, B. C.	100	CMCY 570 Havana, Cuba	5000	CKMW 1350 Santiago, Cuba	....
CKPC 930 Brantford, Ont.	100	CMGC 1400 Matanzas, Cuba	150	CKMX 1190 Santiago, Cuba	....
CKPR 730 Fort William, Ont.	100	CMGE 1370 Cardenas, Cuba	150	CMOA 1440 Havana, Cuba	150
CKSO 780 Sudbury, Ont.	1000	CMGF 1120 Matanzas, Cuba	250	CMOX 1320 Havana, Cuba	200
CKTE 1200 St. Catharines, Ont.	100	CMGH 790 Matanzas, Cuba	500	CMQ 600 Havana, Cuba	25000
CKUA 580 Edmonton, Alta.	500	CMHA 1070 Sagua la Grande, Cuba	50	CMW 880 Havana, Cuba	1400
CKWX 1010 Vancouver, B. C.	100	CMHB 1240 Sancti Spiritus, Cuba	50	CMX 920 Havana, Cuba	1000
CKX 1120 Brandon, Man.	1000	CMHD 1270 Caibarien, Cuba	250	CRCK 950 Quebec, Que.	1000
CKY 910 Winnipeg, Man.	15000	CMHI 1210 Santa Clara, Cuba	150	CRCS 1120 Chicotimi, Que.	100
CMAB 1340 Pinar del Rio, Cuba	300	CMHJ 1160 Cienfuegos, Cuba	175	CRCY 960 Toronto, Ont.	100
CMBC 950 Havana, Cuba	10000	CMHK 1330 Cruces, Cuba	250	FQN 609 St. Pierre, Miquelon	250
CMBD 1260 Havana, Cuba	500	CMHM 1450 Cienfuegos, Cuba	180	HIT 1050 Trujillo, D. R.	50
CMBF 770 Havana, Cuba	10000	CMHW 820 Santa Clara, Cuba	100	HIX 800 Trujillo, D. R.	800
CMBL 750 Havana, Cuba	2500	CMHX 760 Cienfuegos, Cuba	200	HITP 1300 Trujillo, D. R.	25
CMBQ 680 Havana, Cuba	5000	CMJA 1010 Camaguey, Cuba	300	HRN 1250 Tekucicgalpa, Honduras	50
CMBS 1170 Havana, Cuba	150	CMJC 1390 Camaguey, Cuba	150	KABC 1420 San Antonio, Texas	100
CMBX 1070 Havana, Cuba	500	CMJE 1220 Camaguey, Cuba	50	KABR 1420 Aberdeen, S. Dak.	100
		CMJF 1150 Camaguey, Cuba	200	KADA 1200 Ada, Okla.	100

NORTH AMERICAN B. C. STATIONS BY CALLS

KALB 1210	100	KERN 1370	100	KFSG 1120	500
Alexandria, La.		Bakersfield, Calif.		Los Angeles, Calif.	
KALE 1300	1000	KEUB 1420	100	KFUO 550	500
Portland, Ore.		Price, Utah		St. Louis, Mo.	
KAND 1310	100	KEX 1180	5000	KFVD 1000	1000
Corsicana, Texas		Portland, Ore.		Los Angeles, Calif.	
KANS 1210	100	KFAB 770	10000	KFVS 1210	100
Wichita, Kans.		Lincoln, Neb.		Cape Girardeau, Mo.	
KARK 890	500	KFAC 1300	1000	KFWB 950	1000
Little Rock, Ark.		Los Angeles, Calif.		Hollywood, Calif.	
KARM 1310	100	KFAM 1420	100	KFXD 1200	100
Fresno, Calif.		St. Cloud, Minn.		Nampa, Idaho	
KASA 1210	100	KFBB 1280	1000	KFXJ 1200	100
Elk City, Okla.		Great Falls, Mont.		Grand Junction, Colo.	
KAST 1370	100	KFBI 1050	5000	KFXM 1210	100
Astoria, Ore.		Abilene, Kans.		San Bernardino, Calif.	
KATE 1420	250	KFBK 1490	5000	KFXR 1310	100
Albert Lea, Minn.		Sacramento, Calif.		Oklahoma City, Okla.	
KAWM 1500	100	KFDM 560	500	KFYO 1310	100
Gallup, N. Mex.		Beaumont, Texas		Lubbock, Texas	
KBIX 1500	100	KFDY 780	1000	KFYR 550	1000
Muskogee, Okla.		Brookings, S. D.		Bismarck, N. D.	
KBPS 1420	100	KFEL 920	500	KGA 1470	5000
Portland, Ore.		Denver, Colo.		Spokane, Wash.	
KBST 1500	100	KFEQ 680	2500	KGAR 1370	100
Big Spring, Texas		St. Joseph, Mo.		Tucson, Ariz.	
KBTM 1200	100	KFGQ 1370	100	KGB 1330	1000
Jonesboro, Ark.		Boone, Iowa		San Diego, Calif.	
KCKN 1310	100	KFH 1300	1000	KGBU 900	500
Kansas City, Kans.		Wichita, Kans.		Ketchikan, Alaska	
KCMC 1420	100	KFI 640	50000	KGBX 1230	500
Texarkana, Texas		Los Angeles, Calif.		Springfield, Mo.	
KCMO 1370	100	KFIO 1120	100	KGCA 1270	100
Kansas City, Mo.		Spokane, Wash.		Decorah, Iowa	
KCRC 1360	250	KFIZ 1420	100	KGCI 1200	100
Enid, Okla.		Fond du Lac, Wis.		Coeur d'Alene, Idaho	
KCRJ 1310	100	KFJB 1200	100	KGCU 1240	250
Jerome, Ariz.		Marshalltown, Iowa		Mandan, N. D.	
KDAL 1500	100	KFJI 1210	100	KGCX 1450	1000
Duluth, Minn.		Klamath Falls, Ore.		Wolf Point, Mont.	
KDB 1500	100	KFJM 1410	500	KGDE 1200	100
Santa Barbara, Calif.		Grand Forks, N. D.		Fergus Falls, Minn.	
KDFN 1440	500	KFJZ 1370	100	KGDM 1100	1000
Casper, Wyo.		Fort Worth, Texas		Stockton, Calif.	
KDKA 980	50000	KFKA 880	500	KGDY 1340	250
Pittsburgh, Pa.		Greeley, Colo.		Huron, S. D.	
KDLR 1210	100	KFKU 1220	1000	KGEK 1200	100
Devils Lake, N. D.		Lawrence, Kans.		Sterling, Colo.	
KDNC 1200	100	KFNF 890	500	KGER 1360	1000
Lewistown, Mont.		Shenandoah, Iowa		Long Beach, Calif.	
KDNT 1420	100	KFOR 1210	100	KGEZ 1310	100
Denton, Texas		Lincoln, Neb.		Kalispell, Mont.	
KDON 1210	100	KFOX 1250	1000	KGFF 1420	100
Monterey, Calif.		Long Beach, Calif.		Shawnee, Okla.	
KDTH 1340	500	KFPL 1310	100	KGFI 1500	100
Dubuque, Iowa		Dublin, Texas		Brownsville, Tex.	
KDYL 1290	1000	KFPW 1210	100	KGFI 1200	100
Salt Lake City, Utah		Fort Smith, Ark.		Los Angeles, Calif.	
KECA 1430	1000	KFPY 890	1000	KGFL 1370	100
Los Angeles, Calif.		Spokane, Wash.		Roswell, N. M.	
KEEN 1370	100	KFQD 780	250	KGFW 1310	100
Seattle, Wash.		Anchorage, Alaska		Kearney, Neb.	
KEHE 780	1000	KFRC 610	1000	KGFX 630	200
Los Angeles, Calif.		San Francisco, Calif.		Pierre, S. D.	
KELA 1440	500	KFRD 1370	250	KGCC 1420	100
Centralia, Wash.		Longview, Texas		San Francisco, Calif.	
KELD 1370	100	KFRU 630	500	KGGF 1010	1000
El Dorado, Ark.		Columbia, Mo.		Coffeyville, Kans.	
KELO 1200	100	KFSD 600	1000	KGGM 1230	1000
Sioux Falls, S. Dak.		San Diego, Calif.		Albuquerque, N. M.	

NORTH AMERICAN B. C. STATIONS BY CALLS

KGHF 1320	500	KIUL 1210	100	KOCA 1218	100
Pueblo, Colo.		Garden City, Kans.		Kilgore, Texas	
KGHI 1200	100	KIUN 1420	100	KOH 1380	500
Little Rock, Ark.		Pecos, Texas		Reno, Nev.	
KGHL 780	1000	KIUP 1370	100	KOIL 1260	1000
Billings, Mont.		Durango, Colo.		Omaha, Neb.	
KGIR 1340	1000	KJBS 1070	500	KOIN 940	1000
Butte, Mont.		San Francisco, Calif.		Portland, Ore.	
KGIW 1420	100	KJR 970	5000	KOKO 1370	100
Alamosa, Colo.		Seattle, Wash.		La Junta, Colo.	
KGKB 1500	100	KLAH 1210	100	KOL 1270	1000
Tyler, Texas		Carlsbad, N. Mex.		Seattle, Wash.	
KGKL 1370	100	KLBM 1420	100	KOMA 1480	5000
San Angelo, Texas		La Grande, Ore.		Oklahoma City, Okla.	
KGKO 570	250	KLCN 1290	100	KOMO 920	1000
Wichita Falls, Texas		Blytheville, Ark.		Seattle, Wash.	
KGKY 1500	100	KLO 1400	500	KONO 1370	100
Scottsbluff, Neb.		Ogden, Utah		San Antonio, Texas	
KGLO 1210	100	KLPM 1240	250	KOOS 1200	100
Mason City, Iowa		Minot, N. D.		Marshfield, Ore.	
KGMB 1320	1000	KLRA 1390	1000	KORE 1420	100
Honolulu, T. H.		Little Rock, Ark.		Eugene, Ore.	
KGNC 1410	1000	KLS 1280	250	KOTN 1500	100
Amarillo, Texas		Oakland, Calif.		Pine Bluff, Ark.	
KGNF 1430	1000	KLUF 1370	100	KOVC 1500	100
North Platte, Neb.		Galveston, Texas		Valley City, N. Dak.	
KGNO 1340	250	KLX 880	1000	KOY 1390	1000
Dodge City, Kans.		Oakland, Calif.		Phoenix, Ariz.	
KGQ 790	7500	KLZ 560	1000	KPAB 1500	100
San Francisco, Calif.		Denver, Colo.		Laredo, Texas	
KGU 750	2500	KMA 930	1000	KPAC 1260	500
Honolulu, T. H.		Shenandoah, Iowa		Port Arthur, Texas	
KGVL 1200	100	KMAC 1370	100	KPDN 1310	100
Greenville, Texas		San Antonio, Texas		Pampa, Texas	
KGVO 1260	1000	KMBC 950	1000	KPFA 1210	100
Missoula, Mont.		Kansas City, Mo.		Helena, Mont.	
KGW 620	1000	KMED 1410	250	KPLC 1500	100
Portland, Ore.		Medford, Ore.		Lake Charles, La.	
KGY 1210	100	KMJ 580	1000	KPLT 1500	100
Olympia, Wash.		Fresno, Calif.		Paris, Texas	
KHBC 1400	250	KMLB 1200	100	KPMC 1550	1000
Hilo, T. H.		Monroe, La.		Bakersfield, Calif.	
KHBG 1210	100	KMMJ 740	1000	KPO 680	50000
Okmulgee, Okla.		Clay Center, Neb.		San Francisco, Calif.	
KHJ 900	1000	KMO 1330	1000	KPOF 880	1000
Los Angeles, Calif.		Tacoma, Wash.		Denver, Colo.	
KHQ 590	1000	KMOX 1090	50000	KPPC 1210	100
Spokane, Wash.		St. Louis, Mo.		Pasadena, Calif.	
KHSL 1260	250	KMPC 710	500	KPQ 1500	100
Chico, Calif.		Beverly Hills, Calif.		Wenatchee, Wash.	
KHUB 1310	250	KMTR 570	1000	KPRC 920	1000
Watsonville, Calif.		Los Angeles, Calif.		Houston, Texas	
KICA 1370	100	KNEL 1500	250	KQV 1380	500
Clovis, N. M.		Brady, Texas		Pittsburgh, Pa.	
KID 1320	500	KNET 1420	100	KQW 1010	1000
Idaho Falls, Idaho		Palestine, Texas		San Jose, Calif.	
KIDO 1350	1000	KNOW 1500	100	KRBA 1310	100
Boise, Idaho		Austin, Texas		Lufkin, Texas	
KIDW 1420	100	KNX 1050	50000	KRBC 1420	100
Lamar, Colo.		Los Angeles, Calif.		Ablene, Texas	
KIEM 1450	500	KOA 830	50000	KRE 1370	100
Eureka, Calif.		Denver, Colo.		Berkeley, Calif.	
KIEV 850	250	KOAC 550	1000	KRGV 1260	1000
Glendale, Calif.		Corvallis, Ore.		Weslaco, Texas	
KINY 1310	100	KOAM 790	1000	KRIC 1420	100
Juneau, Alaska		Pittsburg, Kans.		Beaumont, Texas	
KIRO 710	1000	KOB 1180	10000	KRIS 1330	500
Seattle, Wash.		Albuquerque, N. M.		Corpus Christi, Tex.	
KIT 1250	250	KOBH 1370	100	KRKD 1120	500
Yakima, Wash.		Rapid City, S. Dak.		Los Angeles, Calif.	

NORTH AMERICAN B. C. STATIONS BY CALLS

KRKO 1370	50	KTTH 1060	10000	KWK 1350	1000
Everett, Wash.		Hot Springs, Ark.		St. Louis, Mo.	
KRLC 1390	250	KTCC 1190	250	KWKH 1100	10000
Lewiston, Idaho		Vlsalia, Calif.		Shreveport, La.	
KRLD 1040	10000	KTMS 1220	500	KWLC 1270	100
Dallas, Texas		Santa Barbara, Calif.		Decorah, Iowa	
KRLH 1420	100	KTOK 1370	100	KWLK 780	250
Midland, Texas		Oklahoma City, Okla.		Longview, Wash.	
KRMC 1370	100	KTRB 740	250	KWNO 1200	250
Jamestown, N. Dak.		Modesto, Calif.		Winona, Minn.	
KRMD 1310	100	KTRH 1290	1000	KWOC 1310	100
Shreveport, La.		Houston, Texas		Poplar Bluff, Mo.	
KRNR 1500	100	KTRI 1420	100	KWOS 1310	100
Roseburg, Ore.		Sloux City, Iowa		Jefferson City, Mo.	
KRNT 1320	1000	KTSA 550	1000	KWSC 1220	1000
Des Moines, Iowa		San Antonio, Texas		Pullman, Wash.	
KROC 1310	100	KTSM 1310	100	KWTN 1210	100
Rochester, Minn.		El Paso, Texas		Watertown, S. Dak.	
KROD 1500	100	KTUL 1400	500	KWTO 560	5000
El Paso, Texas		Tulsa, Okla.		Springfield, Mo.	
KROW 930	1000	KTW 1220	1000	KWYO 1370	100
Oakland, Calif.		Seattle, Wash.		Sheridan, Wyo.	
KROY 1210	100	KUJ 1370	100	KXA 760	250
Sacramento, Calif.		Walla Walla, Wash.		Seattle, Wash.	
KRQA 1310	100	KUMA 1420	100	KXBY 1530	1000
Santa Fe, N. Mex.		Yuma, Ariz.		Kansas City, Mo.	
KRRV 1310	250	KUOA 1260	5000	KXL 1420	100
Sherman, Texas		Siloam Springs, Ark.		Portland, Ore.	
KRSC 1120	250	KUSD 890	500	KXO 1500	100
Seattle, Wash.		Vermillion, S. Dak.		El Centro, Calif.	
KSAC 580	500	KUTA 1500	100	KXOK 1250	1000
Manhattan, Kans.		Salt Lake City, Utah		St. Louis, Mo.	
KSAL 1500	100	KVCV 1200	100	KXRO 1310	100
Salina, Kans.		Redding, Calif.		Aberdeen, Wash.	
KSCJ 1330	1000	KVEC 1200	250	KXYZ 1440	1000
Sioux City, Iowa		San Luis Obispo, Cal.		Houston, Texas	
KSD 550	1000	KVGB 1370	100	KYA 1230	1000
St. Louis, Mo.		Great Bend, Kans.		San Francisco, Calif.	
KSEI 900	250	KVI 570	1000	KYOS 1040	250
Pocatello, Idaho		Tacoma, Wash.		Merced, Calif.	
KSFO 560	1000	KVNU 1500	100	KYSM 1500	100
San Francisco, Calif.		Logan, Utah		Mankato, Minn.	
KSL 1130	50000	KVOA 1260	1000	KYW 1020	10000
Salt Lake City, Utah		Tucson, Ariz.		Philadelphia, Pa.	
KSLM 1370	100	KVOD 920	500	TGW 1520	1000
Salem, Ore.		Denver, Colo.		Guatemala City, Guat.	
KSO 1430	500	KVOE 1500	100	TGI 1305	1000
Des Moines, Iowa		Santa Ana, Calif.		Guatemala City, Guat.	
KSOO 1110	2500	KVOL 1310	100	TIEP 880	1000
Sioux Falls, S. Dak.		Lafayette, La.		San Jose, Costa Rica	
KSRO 1310	250	KVOO 1140	25000	TIPG 625	2000
Santa Rosa, Calif.		Tulsa, Okla.		San Jose, Costa Rica	
KSTP 1460	10000	KVOR 1270	1000	TIX 650	1000
St. Paul, Minn.		Colorado Springs, Colo.		San Jose, Costa Rica	
KSUB 1310	100	KVOS 1200	100	VAS 685	2000
Cedar City, Utah		Bellingham, Wash.		Glace Bay, N. S.	
KSUN 1200	100	KVOX 1310	100	VOAC 1065	40
Lowell, Ariz.		Moorhead, Minn.		St. John's, Nfld.	
KTAR 620	1000	KVRS 1370	100	VOAS 940	100
Phoenix, Ariz.		Rock Springs, Wyo.		St. John's, Nfld.	
KTAT 1240	1000	KVSO 1210	100	VOCM 1006	200
Fort Worth, Texas		Ardmore, Okla.		St. John's, Nfld.	
KTBC 1120	1000	KWBG 1420	100	VOGY 840	400
Austin, Texas		Hutchinson, Kans.		St. John's, Nfld.	
KTBS 1450	1000	KWEW 1500	100	VONF 1195	500
Shreveport, La.		Hobbs, N. Mex.		St. John's, Nfld.	
KTEM 1370	250	KWG 1200	100	VOWR 681	500
Temple, Texas		Stockton, Calif.		St. John's, Nfld.	
KTFI 1240	1000	KWJJ 1040	500	WAAB 1410	500
Twin Falls, Idaho		Portland, Ore.		Boston, Mass.	

NORTH AMERICAN B. C. STATIONS BY CALLS

WAAF 920 Chicago, Ill.	1000	WBBZ 1200 Ponca City, Okla.	100	WCBD 1080 Chicago, Ill.	5000
WAAT 940 Jersey City, N. J.	500	WBCM 1410 Bay City, Mich.	500	WCBM 1370 Baltimore, Md.	100
WAAW 660 Omaha, Neb.	500	WBEN 900 Buffalo, N. Y.	1000	WCBS 1420 Springfield, Ill.	100
WABC 860 New York, N. Y.	50000	WBEO 1310 Marquette, Mich.	100	WCCO 810 Minneapolis, Minn.	50000
WABI 1200 Bangor, Maine	100	WBHP 1200 Huntsville, Ala.	100	WCFL 970 Chicago, Ill.	5000
WABY 1370 Albany, N. Y.	100	WBIG 1440 Greensboro, N. C.	1000	WCHS 580 Charleston, W. Va.	500
WACO 1420 Waco, Texas	100	WBIL 1100 New York, N. Y.	5000	WCHV 1420 Charlottesville, Va.	100
WADC 1320 Akron, Ohio	1000	WBLK 1370 Clarksburg, W. Va.	100	WCKY 1490 Covington, Ky.	10000
WAGA 1450 Atlanta, Ga.	500	WBLY 1210 Lima, Ohio	100	WCLE 610 Cleveland, Ohio	500
WAGF 1370 Dothan, Ala.	250	WBNO 1200 New Orleans, La.	100	WCLO 1200 Janesville, Wis.	100
WAGM 1420 Presque Isle, Me.	100	WBNS 1430 Columbus, Ohio	500	WCLS 1310 Joliet, Ill.	100
WAIM 1200 Anderson, S. C.	100	WBNX 1350 New York, N. Y.	1000	WCMI 1310 Ashland, Ky.	100
WAIR 1250 Winston-Salem, N. C.	250	WBNY 1370 Buffalo, N. Y.	100	WCN 1500 Brooklyn, N. Y.	100
WALA 1380 Mobile, Ala.	500	WBOQ 860 New York, N. Y.	50000	WCOA 1340 Pensacola, Fla.	500
WALR 1210 Zanesville, Ohio	100	WBOV 1310 Terre Haute, Ind.	100	WCOC 880 Meridian, Miss.	500
WAML 1310 Laurel, Miss.	100	WBRB 1210 Red Bank, N. J.	100	WCOL 1210 Columbus, Ohio	100
WAPI 1140 Birmingham, Ala.	5000	WBRC 930 Birmingham, Ala.	1000	WCOP 1120 Boston, Mass.	500
WAPD 1420 Chattanooga, Tenn.	100	WBRE 1310 Wilkes-Barre, Pa.	100	WCPD 1200 Cincinnati, Ohio	100
WARD 1400 Brooklyn, N. Y.	500	WBRK 1310 Pittsfield, Mass.	100	WCRW 1210 Chicago, Ill.	100
WASH 1270 Grand Rapids, Mich.	500	WBRY 1530 Waterbury, Conn.	1000	WCSC 1360 Charleston, S. C.	500
WATL 1370 Atlanta, Ga.	100	WBT 1080 Charlotte, N. C.	50000	WCSH 940 Portland, Me.	1000
WATR 1190 Waterbury, Conn.	100	WBTM 1370 Danville, Va.	100	WDAE 1220 Tampa, Fla.	1000
WAVE 940 Louisville, Ky.	1000	WBZ 990 Boston, Mass.	50000	WDAF 610 Kansas City, Mo.	1000
WAWZ 1350 Zarephath, N. J.	500	WBZA 990 Springfield, Mass.	1000	WDAH 1310 El Paso, Texas	100
WAYX 1200 Waycross, Ga.	100	WCAD 1220 Cariton, N. Y.	500	WDA 1370 Philadelphia, Pa.	100
WAZL 1420 Hazleton, Pa.	100	WCAE 1220 Pittsburgh, Pa.	1000	WDAY 940 Fargo, N. Dak.	1000
WBAA 890 West Lafayette, Ind.	500	WCAL 1250 Northfield, Minn.	1000	WDBJ 930 Roanoke, Va.	1000
WBAL 760 Baltimore, Md.	2500	WCAM 1280 Camden, N. J.	500	WDBO 580 Orlando, Fla.	1000
WBAL 1060 Baltimore, Md.	10000	WCAO 600 Baltimore, Md.	500	WDEL 1120 Wilmington, Del.	250
WBAP 800 Fort Worth, Texas	50000	WCAP 1280 Asbury Park, N. J.	500	WDEV 550 Waterbury, Vt.	500
WBAX 1210 Wilkes-Barre, Pa.	100	WCAT 1200 Rapid City, S. Dak.	100	WDGY 1180 Minneapolis, Minn.	1000
WBBC 1400 Brooklyn, N. Y.	500	WCAU 1170 Philadelphia, Pa.	50000	WDNC 1590 Durham, N. C.	100
WBBL 1210 Richmond, Va.	100	WCAX 1200 Burlington, Vt.	100	WDDO 1280 Chattanooga, Tenn.	1000
WBMM 770 Chicago, Ill.	50000	WCAZ 1070 Carthage, Ill.	100	WDRC 1330 Hartford, Conn.	1000
WBRR 1390 Brooklyn, N. Y.	1000	WCBA 1440 Allentown, Pa.	500	WDSM 1200 Superior, Wis.	100

NORTH AMERICAN B. C. STATIONS BY CALLS

WDSU 1250 New Orleans, La.	1000	WFIL 560 Philadelphia, Pa.	1000	WHB 860 Kansas City, Mo.	1000
WDWS 1370 Champaign, Ill.	100	WFLA 620 Tampa, Fla.	1000	WHBB 1500 Selma, Ala.	100
WDZ 1020 Tuscola, Ill.	250	WFMD 900 Frederick, Md.	500	WHBC 1200 Canton, Ohio	100
WEAF 660 New York, N. Y.	50000	WFOR 1370 Hattiesburg, Miss.	100	WHBF 1210 Rock Island, Ill.	100
WEAN 780 Providence, R. I.	1000	WFOY 1210 St. Augustine, Fla.	100	WHBI 1250 Newark, N. J.	1000
WEAU 1050 Eau Claire, Wis.	1000	WFTC 1200 Kinston, N. C.	100	WHBL 1300 Sheboygan, Wis.	250
WEBC 1290 Duluth, Minn.	1000	WGAL 1500 Lancaster, Pa.	100	WHBQ 1370 Memphis, Tenn.	100
WEBQ 1210 Harrisburg, Ill.	100	WGAN 640 Portland, Me.	500	WHBU 1210 Anderson, Ind.	100
WEBR 1310 Buffalo, N. Y.	100	WGAR 1450 Cleveland, Ohio	500	WHBY 1200 Green Bay, Wis.	100
WEDC 1210 Chicago, Ill.	100	WGAUJ 1310 Athens, Ga.	100	WHDF 1370 Calumet, Mich.	100
WEED 1420 Rocky Mount, N. C.	100	WGBB 1210 Freeport, N. Y.	100	WHDH 830 Boston, Mass.	1000
WEEL 590 Boston, Mass.	1000	WGBF 630 Evansville, Ind.	500	WHDL 1400 Olean, N. Y.	250
WEUU 830 Reading, Pa.	1000	WGBI 880 Scranton, Pa.	500	WHEB 740 Portsmouth, N. H.	250
WELI 900 New Haven, Conn.	500	WGCM 1210 Gulfport, Miss.	100	WHEC 1430 Rochester, N. Y.	500
WELL 1420 Battle Creek, Mich.	100	WGES 1360 Chicago, Ill.	500	WHEF 1500 Kosciusko, Miss.	100
WEMP 1310 Milwaukee, Wis.	100	WGH 1310 Newport News, Va.	100	WHFC 1420 Cicero, Ill.	100
WENR 870 Chicago, Ill.	50000	WGIL 1500 Galesburg, Ill.	250	WHIO 1260 Dayton, Ohio	1000
WEOA 1370 Evansville, Ind.	100	WGL 1370 Fort Wayne, Ind.	100	WHIP 1480 Hammond, Ind.	5000
WESG 850 Elmira, N. Y.	1000	WGN 720 Chicago, Ill.	50000	WHIS 1410 Bluefield, W. Va.	500
WEST 1200 Easton, Pa.	100	WGNV 1210 Newburgh, N. Y.	100	WHJB 620 Greensburg, Pa.	250
WEVD 1300 New York, N. Y.	1000	WGPC 1420 Albany, Ga.	100	WHK 1390 Cleveland, Ohio	1000
WEW 760 St. Louis, Mo.	1000	WGR 550 Buffalo, N. Y.	1000	WHKC 840 Columbus, Ohio	500
WEXL 1310 Royal Oak, Mich.	50	WGRC 1370 New Albany, Ind.	250	WHLB 1370 Virginia, Minn.	100
WFAA 800 Dallas, Texas	50000	WGRM 1210 Grenada, Miss.	100	WHN 1010 New York, N. Y.	1000
WFAB 1300 New York, N. Y.	1000	WGST 890 Atlanta, Ga.	1000	WHO 1000 Des Moines, Iowa	50000
WFAM 1200 South Bend, Ind.	100	WGTM 1310 Wilson, N. C.	100	WHOM 1450 Jersey City, N. J.	250
WFAS 1210 White Plains, N. Y.	100	WGVA 1050 Indianapolis, Ind.	1000	WHP 1430 Harrisburg, Pa.	500
WFBC 1300 Greenville, S. C.	1000	WGY 790 Schenectady, N. Y.	50000	WIBA 1280 Madison, Wis.	1000
WFBG 1310 Altoona, Pa.	100	WHA 940 Madison, Wis.	5000	WIBG 970 Glenside, Pa.	100
WFBL 1360 Syracuse, N. Y.	1000	WHAJ 1210 Greenfield, Mass.	250	WIBM 1370 Jackson, Mich.	100
WFBM 1230 Indianapolis, Ind.	1000	WHAL 950 Saginaw, Mich.	500	WIBU 1210 Poynette, Wis.	100
WFBR 1270 Baltimore, Md.	500	WHAM 1150 Rochester, N. Y.	50000	WIBW 580 Topeka, Kans.	1000
WFDF 1310 Flint, Mich.	100	WHAS 820 Louisville, Ky.	50000	WIBX 1200 Utica, N. Y.	100
WFEA 1340 Manchester, N. H.	500	WHAT 1310 Philadelphia, Pa.	100	WICA 940 Ashtabula, Ohio	250
		WHAZ 1300 Troy, N. Y.	1000		

NORTH AMERICAN B. C. STATIONS BY CALLS

WICC 600	500	WKAQ 1240	1000	WMAS 1420	100
Bridgeport, Conn.		San Juan, P. R.		Springfield, Mass.	
WIL 1200	100	WKAR 850	1000	WMAZ 1180	1000
St. Louis, Mo.		East Lansing, Mich.		Macon, Ga.	
WILL 580	1000	WKAT 1500	100	WMBC 1420	100
Urbana, Ill.		Miami Beach, Fla.		Detroit, Mich.	
WILM 1420	100	WKBB 1500	100	WMBD 1440	1000
Wilmington, Del.		East Dubuque, Ill.		Peoria, Ill.	
WIND 560	1000	WKBH 1380	1000	WMBF 610	1000
Gary, Ind.		LaCrosse, Wis.		Miami, Fla.	
WINS 1180	1000	WKBN 570	500	WMBG 1350	500
New York, N. Y.		Youngstown, Ohio		Richmond, Va.	
WIOD 610	1000	WKBO 1200	100	WMBH 1420	100
Miami, Fla.		Harrisburg, Pa.		Joplin, Mo.	
WIP 610	1000	WKBV 1500	100	WMBI 1080	5000
Philadelphia, Pa.		Richmond, Ind.		Chicago, Ill.	
WIRE 1400	1000	WKBW 1480	5000	WMOB 1310	100
Indianapolis, Ind.		Buffalo, N. Y.		Auburn, N. Y.	
WIS 560	1000	WKBZ 1500	100	WMBQ 1500	100
Columbia, S. C.		Muskegon, Mich.		Brooklyn, N. Y.	
WISN 1120	250	WKBU 1500	100	WMBR 1370	100
Milwaukee, Wis.		Griffin, Ga.		Jacksonville, Fla.	
WJAC 1310	100	WKOK 1210	100	WMBS 1420	250
Johnstown, Pa.		Sunbury, Pa.		Uniontown, Pa.	
WJAG 1060	1000	WKRC 550	1000	WMC 780	1000
Norfolk, Neb.		Cincinnati, Ohio		Memphis, Tenn.	
WJAR 890	1000	WKY 900	1000	WMCA 570	1000
Providence, R. I.		Oklahoma City, Okla.		New York, N. Y.	
WJAS 1290	1000	WKZO 590	1000	WMEX 1500	100
Pittsburgh, Pa.		Kalamazoo, Mich.		Boston, Mass.	
WJAX 900	1000	WLAC 1470	5000	WMFD 1370	100
Jacksonville, Fla.		Nashville, Tenn.		Wilmington, N. C.	
WJBC 1200	100	WLAK 1310	100	WMFF 1310	100
Bloomington, Ill.		Lakeland, Fla.		Plattsburg, N. Y.	
WJBK 1500	100	WLAP 1420	100	WMFG 1210	100
Detroit, Mich.		Lexington, Ky.		Hibbing, Minn.	
WJBL 1200	100	WLAW 680	1000	WMFJ 1420	100
Decatur, Ill.		Lawrence, Mass.		Daytona Beach, Fla.	
WJBO 1120	500	WLB 1250	1000	WMFO 1370	100
Baton Rouge, La.		Minneapolis, Minn.		Decatur, Ala.	
WJBW 1200	100	WLBC 1210	100	WMFR 1200	100
New Orleans, La.		Muncie, Ind.		High Point, N. C.	
WJBY 1210	100	WLBL 900	5000	WMIN 1370	100
Gadsden, Ala.		Stevens Point, Wis.		St. Paul, Minn.	
WJDX 1270	1000	WLBZ 620	500	WMMN 890	500
Jackson, Miss.		Bangor, Me.		Fairmont, W. Va.	
WJEJ 1210	50	WLEU 1420	100	WMPC 1200	100
Hagerstown, Md.		Erie, Pa.		Lapeer, Mich.	
WJIM 1210	100	WLLH 1370	100	WMPS 1430	500
Lansing, Mich.		Lawrence, Mass.		Memphis, Tenn.	
WJJD 1130	20000	WLLH 1370	100	WMSD 1420	100
Chicago, Ill.		Lowell, Mass.		Sheffield, Ala.	
WJMS 1420	100	WLMU 1210	100	WMT 600	1000
Ironwood, Mich.		Middlesboro, Ky.		Cedar Rapids, Iowa	
WJNO 1200	100	WLNH 1310	100	WNAC 1230	1000
W. Palm Beach, Fla.		Laconia, N. H.		Boston, Mass.	
WJR 750	50000	WLS 870	50000	WNAD 1010	1000
Detroit, Mich.		Chicago, Ill.		Norman, Okla.	
WJRD 1200	250	WLTH 1400	500	WNAX 570	1000
Tuscaloosa, Ala.		Brooklyn, N. Y.		Yankton, S. D.	
WJSV 1460	10000	WLVA 1200	100	WNBC 1380	250
Washington, D. C.		Lynchburg, Va.		New Britain, Conn.	
WJTN 1210	100	WLW 700	500000	WNBF 1500	100
Jamestown, N. Y.		Cincinnati, Ohio		Binghamton, N. Y.	
WJW 1210	100	WMAL 630	250	WNBH 1310	100
Akron, Ohio		Washington, D. C.		New Bedford, Mass.	
WJZ 760	50000	WMAQ 670	50000	WNBX 1260	500
New York, N. Y.		Chicago, Ill.		Springfield, Vt.	

NORTH AMERICAN B. C. STATIONS BY CALLS

WNBZ 1290 100	WPTF 680 1000	WSFA 1410 500
Saranac Lake, N. Y.	Raleigh, N. C.	Montgomery, Ala.
WNEL 1290 1000	WQAM 560 1000	WSGN 1310 100
San Juan, P. R.	Miami, Fla.	Birmingham, Ala.
WNEW 1250 1000	WQAN 880 500	WSIX 1210 100
New York, N. Y.	Scranton, Pa.	Nashville, Tenn.
WNLC 1500 100	WQBC 1360 1000	WSJS 1310 100
New London, Conn.	Vicksburg, Miss.	Winston-Salem, N. C.
WNNY 1420 100	WQDM 1390 1000	WSM 650 50000
Watertown, N. Y.	St. Albans, Vt.	Nashville, Tenn.
WNOX 1010 1000	WQXR 1550 1000	WSMB 1320 1000
Knoxville, Tenn.	New York, N. Y.	New Orleans, La.
WNYC 810 1000	WRAC 1370 100	WSMK 1380 200
New York, N. Y.	Williamsport, Pa.	Dayton, Ohio
WOAI 1190 50000	WRAP 1310 100	WSNJ 1210 100
San Antonio, Texas	Reading, Pa.	Bridgeton, N. J.
WOC 1370 100	WRAX 920 1000	WSOC 1210 100
Davenport, Iowa	Philadelphia, Pa.	Charlotte, N. C.
WOI 640 5000	WRBL 1200 100	WSPA 920 1000
Ames, Iowa	Columbus, Ga.	Spartanburg, S. C.
WOKO 1430 500	WRC 950 1000	WSPD 1340 1000
Albany, N. Y.	Washington, D. C.	Toledo, Ohio
WOL 1310 1000	WRDO 1370 100	WSPR 1140 500
Washington, D. C.	Augusta, Me.	Springfield, Mass.
WOLS 1200 100	WRDW 1500 100	WSUI 880 500
Florence, S. C.	Augusta, Ga.	Iowa City, Iowa
WOMI 1500 100	WREC 600 1000	WSUN 620 1000
Owensboro, Ky.	Memphis, Tenn.	St. Petersburg, Fla.
WOMT 1210 100	WREN 1220 1000	WSVA 550 500
Manitowoc, Wis.	Lawrence, Kans.	Harrisonburg, Va.
WOOD 1270 500	WRGA 1500 100	WSVS 1370 50
Grand Rapids, Mich.	Rome, Ga.	Buffalo, N. Y.
WOPI 1500 100	WRJN 1370 100	WSYB 1500 100
Bristol, Tenn.	Racine, Wis.	Rutland, Vt.
WOR 710 50000	WRNL 880 500	WSYR 570 1000
Newark, N. J.	Richmond, Va.	Syracuse, N. Y.
WORC 1280 500	WROK 1410 500	WTAD 900 1000
Worcester, Mass.	Rockford, Ill.	Quincy, Ill.
WORK 1320 1000	WROL 1310 100	WTAG 580 1000
York, Pa.	Knoxville, Tenn.	Worcester, Mass.
WORL 920 500	WRR 1280 500	WTAL 1310 100
Boston, Mass.	Dallas, Texas	Tallahassee, Fla.
WOSU 570 750	WRTD 1500 100	WTAM 1070 50000
Columbus, Ohio	Richmond, Va.	Cleveland, Ohio
WOV 1130 1000	WRUF 830 5000	WTAQ 1330 1000
New York, N. Y.	Gainesville, Fla.	Green Bay, Wis.
WOW 590 1000	WRVA 1110 5000	WTAR 780 1000
Omaha, Neb.	Richmond, Va.	Norfolk, Va.
WOWO 1160 10000	WSAI 1330 1000	WTAW 1120 500
Fort Wayne, Ind.	Cincinnati, Ohio	College Station, Tex.
WPAD 1420 100	WSAJ 1310 100	WTAX 1210 100
Paducah, Ky.	Grove City, Pa.	Springfield, Ill.
WPAR 1420 100	WSAL 1200 250	WTBO 800 250
Parkersburg, W. Va.	Salisbury, Md.	Cumberland, Md.
WPAX 1210 100	WSAN 1440 500	WTCN 1250 1000
Thomasville, Ga.	Allentown, Pa.	Minneapolis, Minn.
WPAY 1370 100	WSAR 1450 1000	WTEL 1310 100
Portsmouth, Ohio	Fall River, Mass.	Philadelphia, Pa.
WPEN 920 1000	WSAU 1370 100	WTHH 1200 100
Philadelphia, Pa.	Wausau, Wis.	Hartford, Conn.
WPG 1100 5000	WSAY 1210 100	WTIC 1040 50000
Atlantic City, N. J.	Rochester, N. Y.	Hartford, Conn.
WPRA 1370 100	WSAZ 1190 1000	WTJS 1310 100
Mayaguez, P. R.	Huntington, W. Va.	Jackson, Tenn.
WPRO 630 500	WSB 740 50000	WTMJ 620 1000
Providence, R. I.	Atlanta, Ga.	Milwaukee, Wis.
WPRP 1420 100	WSBC 1210 100	WTMV 1500 100
Ponce, P. R.	Chicago, Ill.	Fast St. Louis, Ill.
	WSBT 1360 500	
	South Bend, Ind.	

NORTH AMERICAN B. C. STATIONS BY CALLS

WTNJ 1280	500	XEBL 1220	50	XEL 1100	250
Trenton, N. J.		Mazatlan, Sin.		Mexico City, D. F.	
WTOC 1260	1000	XEBO 1310	25	XELA 1240	50
Savannah, Ga.		Irapuato, Guan.		Saltillo, Coah.	
WTOL 1200	100	XEBP 1150	250	XELO 580	10000
Toledo, Ohio		Durango, Dgo.		Tijuana, B. Cfa.	
WTRC 1310	100	XEBS 1340	200	XELZ 1370	100
Elkhart, Ind.		Mexico City, D. F.		Mexico City, D.F.	
WVWF 1400	500	XEBU 1200	50	XEMO 860	5000
Brooklyn, N. Y.		Chihuahua, Chih.		Tijuana, L. C.	
WWAE 1200	100	XEBX 640	250	XEMU 580	250
Hammond, Ind.		Sabinas, Coah.		Piedras Negras, Coah.	
WWJ 920	5000	XEBZ 810	100	XEMX 1280	100
Detroit, Mich.		Mexico City, D. F.		Mexico City, D. F.	
WWL 850	10000	XEC 1150	100	XEN 780	1000
New Orleans, La.		Tijuana, L. C.		Mexico City, D. F.	
WWNC 570	1000	XECZ 1370	100	XENC 860	50
Asheville, N. C.		San Luis Potosi, S.L.P.		Mexico City, D. F.	
WWRL 1500	100	XED 1160	2500	XENT 910	150000
Woodside, N. Y.		Guadalajara, Jal.		Nuevo Laredo, Tams.	
WWSW 1500	100	XEDA 1220	200	XEOJ .....	.....
Pittsburgh, Pa.		Gra. Anaya, D. F.		XEOK 760	2500
WWVA 1160	5000	XEDF 810	100	Tijuana, L. C.	
Wheeling, W. Va.		Nuevo Laredo, Tams.		XEP 1160	500
WXYZ 1240	1000	XEDH 1340	200	Juarez, Chih.	
Detroit, Mich.		Villa Acuna, Coah.		XEPN 730	100000
W3XDD	50000	XEDP 1080	500	Piedras Negras, Coah.	
Whippany, N. J.		Mexico City, D. F.		XERA 840	250000
W3XJ 1060	100	XEDW 1150	20	Villa Acuna, Coah.	
College Park, Md.		Minattlan, Ver.		XERB 730	100000
W8XO 700	500000	XEE 1210	50	Rosarito Beach, B. Cfa.	
Cincinnati, Ohio		Durango, Dgo.		XES 990	250
XEAA 750	200	XEF 1450	100	Tampico, Tams.	
Mexicali, B. C.		Juarez, Chih.		XET 600	5000
XEAC 980	1000	XEFA 1180	500	Monterrey, N. L.	
Tijuana, L. C.		Tacuba, D. F.		XETB 1310	125
XEAF 990	750	XEFB 870	200	Torreón, Coah.	
Nogales, Son.		Monterrey, N. L.		XETF 1220	12
XEAG 1310	10	XEFC 550	100	Veracruz, Ver.	
Cordoba, Ver.		Merida, Yuc.		XETH 1210	100
XEAI 1250	500	XEFE 980	250	Puebla, Pue.	
Mexico City, D. F.		Nuevo Laredo, Tams.		XEU 1010	250
XEAL 660	1000	XEFI 1440	250	Veracruz, Ver.	
Mexico City, D. F.		Chihuahua, Chih.		XEW 890	50000
XEAM 750	25	XEFM 1160	20	Mexico City, D. F.	
Matamoros, Tams.		Leon, Gto.		XEX 1310	125
XEAO 660	250	XEFO 940	5000	Monterrey, N. L.	
Mexicali, B. C.		Mexico City, D. F.		XEXB 1270	250
XEAP 1340	50	XEFQ 1010	50	Jalapa, Ver.	
Obregon, Son.		Cananea, Son.		XEXD 1340	350
XEAS 1160	100	XEFV 1210	100	Jalapa, Ver.	
Saltillo, Coah.		Juarez, Chih.		XEXE 1270	17
XEAT 1210	250	XEFW 1310	300	Texcoco, D. F.	
Parral, Chih.		Tampico, Tams.		XEXH 1250	250
XEAU 1320	.....	XEG 1230	250	San Luis Potosi, S.L.P.	
Tijuana, B. Cfa.		Monterrey, N. L.		XEXM 610	500
XEAW 960	100000	XEH 720	250	Mexico City, D. F.	
Reynosa, Tams.		Monterrey, N. L.		XEXS 1310	100
XEB 1030	10000	XEI 1370	125	Mexico City, D. F.	
Mexico City, D. F.		Morelia, Mich.		XEXX 1170	1000
XEBA 1080	20	XEJ 1020	1000	Mexico City, D. F.	
Guzman, Jal.		Juarez, Chih.		XEYO 610	500
XEBG 820	1000	XEJP 1130	100	Mexico City, D. F.	
Tijuana, B. Cfa.		Mexico City, D. F.		XEZ 630	500
XEBH 930	500	XEJW 870	500	Merida, Yuc.	
Hermosillo, Sonora		Mexico City, D. F.		ZNS 540	400
XEBI 1000	25	XEK 890	100	Nassau, Bahamas	
Aguascalientes, Aga.		Mexico City, D. F.		YSS 640	500
XEBK 1080	100	XEKL 1240	500	San Salvador, E. S.	
Neuvo Laredo, Tams.		Leon, Guan.			

At DEADLINE . . .

THE International Telecommunications Conference at Cairo has set aside the band 4775 to 4895 kilocycles for broadcasting in tropical America, and the band 4835 to 4965 kilocycles for broadcasting in tropical regions in other parts of the world.

From the Postmaster General's Department at Melbourne, we learn of the following changes in Australian station data:

4VL in Charleville, Qsld., has moved from 1430 to 570 kcs.

7QT in Queenstown, Tas. has moved from 900 to 680 kcs.

4TO in Townsville, Qsld., has changed from 1160 to 780 kcs.

3UL in Warragul, Vic. moved from 1000 to 900 kcs.

7EX, a new station, for Launceston, Tas., to work on 1000 kcs with 500 watts power.

4RO, Rockhampton, Qsld., moved from 1330 to 1080 kcs.

2AD, Armidale, NSW, changed from 1080 to 1130 kcs.

A new station in Young, NSW, was assigned the letters 2LF. It works on 1330 kcs with one hundred watts.

4BU in Bundaberg, Qsld., moved from 1480 to 1330 kcs.

5SE, Mount Gambier, S. A., moved from 1340 to 1370 kcs.

4MK in Mackay, Qsld., changed from 1080 to 1390 kcs.

7DY is a new station on 1400 kcs with 100 watts. Its location has been variously given as Burnie, Devonport and Derby.

2WL in Wollongong, NSW, increased power from 200 to 500 watts. It works on 1430 kcs.

KPFA in Helena, Mont., 1210 kcs, has become an outlet for the National Red and Blue Networks.

Time Conversion Table

The time given in our indices is Eastern Standard by the 24-hour clock.

EST 24-hr. Clock	EST	CST	MST	PST	GMT
0000	Midn't	11 pm	10 pm	9 pm	0500
0100	1 am	Midn't	11 pm	10 pm	0600
0200	2 am	1 am	Midn't	11 pm	0700
0300	3 am	2 am	1 am	Midn't	0800
0400	4 am	3 am	2 am	1 am	0900
0500	5 am	4 am	3 am	2 am	1000
0600	6 am	5 am	4 am	3 am	1100
0700	7 am	6 am	5 am	4 am	1200
0800	8 am	7 am	6 am	5 am	1300
0900	9 am	8 am	7 am	6 am	1400
1000	10 am	9 am	8 am	7 am	1500
1100	11 am	10 am	9 am	8 am	1600
1200	Noon	11 am	10 am	9 am	1700
1300	1 pm	Noon	11 am	10 am	1800
1400	2 pm	1 pm	Noon	11 am	1900
1500	3 pm	2 pm	1 pm	Noon	2000
1600	4 pm	3 pm	2 pm	1 pm	2100
1700	5 pm	4 pm	3 pm	2 pm	2200
1800	6 pm	5 pm	4 pm	3 pm	2300
1900	7 pm	6 pm	5 pm	4 pm	2400
2000	8 pm	7 pm	6 pm	5 pm	0100
2100	9 pm	8 pm	7 pm	6 pm	0200
2200	10 pm	9 pm	8 pm	7 pm	0300
2300	11 pm	10 pm	9 pm	8 pm	0400
2400	Midn't	11 pm	10 pm	9 pm	0500

For times throughout the entire world consult the RADEX Time Converter.

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QUICK INDEX TO STATION DATA

North American Broadcast

By Frequencies	May '38, p. 62
By Locations	May '38, p. 79
By Calls	May '38, p. 85
Frequency Checks	May '38, p. 40
Names of Owners	Oct. '37, p. 63
Owners' Addresses	Dec. '37, p. 63

Time on the Air May '38, p. 62

Shortwaves

Broadcasters, with Time on Air	May '38, p. 43
North American Police	Apr. '38, p. 47
Owners and Addresses	May '38, p. 43
By Locations	Apr. '37, p. 61
By Calls	Apr. '37, p. 65

Foreign Broadcast

By Frequencies	Dec. '36, p. 43
By Locations	Dec. '36, p. 52
By Calls	Dec. '36, p. 57
Asia	Feb. '38, p. 46
Oceania	Jan. '38, p. 47
South America	May '37, p. 50
Europe	June '37, p. 49

Long Waves

By Frequencies	Apr. '36, p. 49
By Locations	Apr. '36, p. 51
By Calls	Apr. '36, p. 52

Miscellaneous

Radio Codes Explained	Oct. '37, p. 3
Choosing a Radio	Sept. '37, p. 3
Roster of DX Clubs	Nov. '37, p. 58
NBC Network Stations	Feb. '38, p. 49
Columbia Network Stations	Mar. '38, p. 47
Mutual Network Stations	Feb. '37, p. 16
Canadian Network Stations	Mar. '37, p. 49

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**J. E. SMITH,
President
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(Please write plainly.)

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