# \*Serving DX'ers since 1933\*

Volume 63, No. 7 - November 13, 1995 (ISSN 0737-1659)



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		CPC	Test Calendar	
	WVAM	1430	Nov. 13, 1995	0130-0200
	KNXN	1470	Nov. 13, 1995	0200-0230
	KATD	990	Nov. 13, 1995	0300-0330
	KLCL	1470	Nov. 20, 1995	0330-0400
	WDCS	1190	Nov. 20, 1995	0000-0030
	WOON	1240	Nov. 20, 1995	0100-0200
	KLCL	1470	Nov. 20, 1995	0330-0400
	WJYM	730	Nov. 27, 1995	0000-0030
ĺ	HCJB	690	Dec. 3, 1995	0100-0115
	WIXN	1460	Dec. 4, 1995	0130-0230
	WPWA	1590	Dec. 11, 1995	0000-0030
ļ	WGDN	1350	De. 17, 1995	0030-0100
ı	WCGW	770	Dec. 18, 1995	0100-0130
	WVLK	590	Dec. 18, 1995	0230-0300
	CKGY	1170	Dec. 30, 1995	0200-0400

WIXN-1460-1460 South College Avenue - Dixon, IL 61021 will conduct a DX test between 1:30 and 2:30 am EST Monday, December 4. The test will include voice IDs, test tones, TV themes, and Morse code ID's. The first 30 minutes of the test wll be run using a directional antenna pattern, and the last 30 minutes of the test will be run using a non-directional antenna pattern. Reception reports may be sent to: Mr. Mark Baker WB9YOE Chief Engineer. Arranged by J. D. Stephens for the IRCA CPC.

WGDN-1350-3601 West Woods Road-Gladwin, MI 48624 will conduct a DX test between 12:30 and 1:00 am EST on Sunday, December 17. The test will include Morse code ID's. Reception reports may be sent to Mr. Ralph Haines, Engineer. Arranged by J. D. Stephens for the IRCA CPC. WVLK-590 - P.O. Box 1559 - Lexington, KY 40592

will conduct a DX test between 2:30 and 3:00 am EST Monday, Dec. 18. The test will include tones. Morse code ID's and march music. Reception reports may be sent to: Mr. Tom Devine, CE. Arranged by J. D. Stephens for the IRCA CPC.

From the publisher ... John Quinn of WJDM-1660 called with info. Seems that they're not sure of their testing status and were to check with the FCC about testing before midnight. Otherwise, they'll continue to test after midnight. He added that he thought that WJDM would be able to stay on 1660 after the FCC ruled on CP's for the expanded band. And he confirmed that no call letters were included during the test broadcasts.

Stan Morss sent this tantalizing d clipped from a stamp magazine: "EKKO - Anyone recognize those letters? This is the name for the 'Verified Reception Stamps' that radio pioneers collected to prove that they heard far off stations in the early days of radio. I have a collection of over 700 different, many foreign (the earliest 1923), many in color and illustrated. A collection this large is exceedingly rare today. Price \$500 - much less than a dollar each. A real giveaway! Herman Herst, Jr. P. O. Box 1583 - Boca Raton, FL 33429-0494.

Catalogs ... John Hanz sent a copy of this one with a note: "Out of sight, out of mind!" It's "Vintage Manuals for Amateur, Audio, and Radio-Related Equipment" from "The Manual Man", Pete Markavage - 27 Walling St. - Sayreville, NY 08872-1818, 908-238-8964. A few sample prices: Drake R4: \$14; Hammarlund HQ-180A Operating, \$12; operating/service, \$20.50. And Universal Radio's "Book Bonanza Catalog" is out; contact them at 6830 Americana Pkwy. - Reynoldsburg, OH 48068-4113, 614-866-4267 (FAX 614-866-2339)

DXChange ... Jim Renfrew (716-458-8574) (to 10 pm) is selling a Hammarlund HQ-150, along with a Xerox copy of manual, originally purchased from Jim Herkimer in 1982. It's a big "boat anchor" receiver, coverage .54 - 31 MHz, with Q-multiplier and crystal phasing. He's selling because he has since acquired three other receivers! \$250 plus shipping ... and Quentin R. Davis WA9WME -1905 Blackiston Mill Road - Jeffersonville, IN 47130 is offering a Hammarlund HQ-180 for \$200.

#### DX Time Machine

From the pages of DX News:

50 years ago ... from the Nov. 17, 1945 DXN: Charles Boehnke, San Francisco, CA reported hearing Japanese stations on 690, 730, 830, and 870 kcs., while Grant Batson, Westfield, NY heard KTMS-1250 and KVAN-910 on November 7.

25 years ago ... from the Nov. 14, 1970 DXN: Musings editor Ernie Cooper mentioned, "We used to average about 35 Musings per issue just a couple of years ago. We are falling far short of that this season ...

10 years ago ... from the November 18, 1985 DXN: Wayne Heinen offered to computer-generate CPC test letters in return for stamps to offset the cost of the effort, and Chairman Neil Zank suggested sending in a list of stations with the stamps.

Jerry Starr c/o WHOT Radio 4040 Simon Road Youngstown, OH 44512-1320

Status changes in AM stations, supplied by the FCC and listeners

#### CALL LETTER CHANGES

Old call
1550 WMIR WI Lake Geneva WAUX

(This corrects a typo from Issue 6)

#### APPLICATIONS FOR NEW STATIONS

1560 TX Port Lavaca: 500 D1 (synchro for KGUL)

AM RADIO 800 Oklahoma's Quality Christian Voice

#### **GRANTS FOR NEW STATIONS**

1610 NM Farmington: 1000/1000 U1 1680 TN Bluff City: 400/400 U1

(These are both experimental licenses; neither can engage in actual broadcasting but may be heard with equipment testing)

#### APPLICATIONS FROM EXISTING FACILITIES

830 WWMO NC Eden: night power to 10000 watts, city of license to Kernersville, NC
1240 WJIM MI Lansing: powers to 890/890 watts
1600 KOKE TX Giddings: powers to 5000/500 watts, city of license to Pflugerville,
TX (CP for new station, not yet on the air)

#### **GRANTS TO EXISTING FACILITIES**

750 WNDZ IN Portage: power to 5000 watts
890 KGGN MO Gladstone: relocate transmitter site (CP for new station, granted in 1987 but has never been built, this action seems to indicate that this CP is still viable)

OTHE	RNESS		
670	KWNK	CA	Simi Valley: no longer relays XETRA
720	KFIR	OR	Sweet Home: CP for 1000/184 U1 is on (ex-1370)
1200	WMIW	SC	Atlantic Beach: CP for new station has expired, but licensee has requested a reinstatement so this CP is evidently still alive if reinstated
1300	WXPX	PA	West Hazelton: now relays WILK-980 Wilkes-Barre, PA along with WGBI-910 Scranton, PA
1340	KOLE	TX	Port Arthur: station is SILENT pending a sale
1350	WDZS	SC	Darlington: this is the correct call here, last issue we typo'd it as WDZC, a carry-over from a contribution about their relay of WANS, all other info was correct.
1370	*App	NV	Henderson: application for new station DENIED
	KTME	CA	Lompoc: station is SILENT
1420	WAOC	FL	St. Augustine: CP for 2180/250 U1 is on

THANKS:

Wayne Heinen, Ed Krejny, Mel Odrus and MSJ

73 and Good DX.

Demy & BKF

Jerry Starr & Buffalo K. Foonman



## Bruce Elving's FM Atlas ... 16th Edition

The world-famous guide which has served FM DX'ers for over 20 years is available from NRC Publications at the special price of \$18.00. NY orders, please add sales tax.

## Domestic DX Digest

West: Bill Hale billhale@micron.net
495 Creekview Drive · Meridian, 1D 83642-3241

East: Dave Braun DPHTIOA@Prodigy.com
863 Allabands Mill Road - Wyoming, DE 19934-9523

(Division line is between East and Central time zones)

DX Catches in the U. S. and Canada, with 24-br. ELT

#### DDXD-West

#### MEDIUM WAVE RAMBLINGS

- \* My apologies to Craig Barnes for omitting three of his loggings from those submitted for Issue 3. They appear herein, marked with a \*, to differentiate from his current loggings. I got 'em all this time Craig.
- \*Barry Wasylik sings the praises of his new JPS ANC-4 noise cancelling antenna. And he promises more details as the season progresses. Another new voice is heard from this issue in the person of Eric Cooper of Mission Viejo, California, whom we welcome! As you will see below, no fewer than four readers have responded to a couple of unIDs which appeared in Issue 4. Thanks to all.
- ◆Good ratings news, again, from Phoenix. In the Summer Arbitrons, here are the how the Medium Wave stations made out: In the #1 spot was KTAR-620 (News/Talk) with an 8.2, down from 8.9; KFYI-910 (Talk) ended up in 6th place with a 5.7 (5.1); #7 was KOY-550 (NOS) 5.5 (5.1): down in 19th place was KISO-1230 (Urban A/C) with a 1.0 (0.8); KOOL-960 (Oldies) placed 20th with a 0.8 (1.0); tied for 23rd were KXAM-1310 (Talk) 0.6 (0.5), KVVA-860 (SS) 0.6 (1.1) and KGME-1360 (Sportstalk) 0.6 (0.7); #26 was KSUN-1400 (SS) 0.5 (1.0); and tied for #27 were KPHX-1480 (SS) 0.4 (0.6), KCWW-1580 (C&W) 0.4 (0.8) and KFNN-1510 (Business) 0.4 (0.4). No-shows in the book: KIDR-740 (Children's), KXEG-1010 (Christian), KUKO-1060 (Alternative), KCKY-1150 (SS), KRDS-1190 (Christian), KHEP-1230 (Christian Country), KOPA-1440 (News/Talk, and KASA-1540 (SS). This info taken off the Internet, posted by Michael Hagerty. And from Fresno, another AMer takes the top spot! KMJ-580 (News/Talk) posted a 10.2, down from 10.9 in the Spring ratings. Then we drop down to 16th place for the 2nd AM to show up. That being KGST-1600 (SS) with a 2.2 (1.5). Then we go to #19, KFIG-1430 (SS) with a 1.6 (1.1). Placing 20th is KFRE-940 (C&W) with a 1.5 (1.4), and finally #21 KKTR-1340 with a 0.9 (0.4). Also listed was a KQEQ-AM (The Box) with a 1.5 (0.6) which I can't cross reference to a frequency, so it may either have been a misprint, or it's an FMer.
- A plea to all reporters . . . format your reports as seen here. That is: current info (none older than 30 days at my deadline) only; divide loggings into time and other categories; sort by frequency, not the order in which you heard the stations (BIG help); include date and time for each item (mandatory for most loggings); typed or computer printouts make me overjoyed, but those neatly printed are A-OK, too; include details of what you heard; abbreviate as little as possible; convert to Eastern Time; and to E-mailers . . . do <u>not</u> capitalize the city names. I just have to edit those and that takes extra time. Thanks.

#### REPORTERS

TB-AL	Tom Branch Prattville Heath DF-3 (Primary), Realistic DX-390 with Yaesu FRA-
	7700 + 100 foot longwire, GE SR-III (E-mail: 75034.1566@compuserve.com)
KW-WI	Kent Winrich Waukesha Clarion car radio (E-mail: kwin@execpc.com)
DS-TN	Doug Smith Pleasant View TS-680 ham rig, 400' longwire lying on ground (E-mail:
	72777.3143@compuserve.com)
CB-CO	Craig Barnes Wheat Ridge
BM-SD	Bill Moser Fort Pierre GE Superadio Il barefoot
DY-CT	Dave Yocis Norwalk CT R71A, Kiwa Ioop with unID help (E-mail:
	73564.203@compuserve.com)
BBM-TX	BB McClurkan Irving R-2000 + KIWA Loop
JB-TX	Jim Boehm San Antonio

PR-OR Patrick Roberson, KG7HT (Portland) DXing in North Bend GE Superadio III
Patrick Roberson KG7HT DXing in Reno (vacation) GE Superadio III

BW-MB Barry Wasylik (Winnipeg) DXing at Lewis R7 + beverages
ES-AL Ed Soule Hampton Grove GE Superadio Il barefoot

RWT-MA Richard Turner North Dartmouth, MA unID help and GY update

AB Medicine Hat - IW's unID with hockey between Hurricanes and Tigers is 1270 CHAT CHAT Medicine Hat. They broadcast games of the WHL Medicine Hat Tigers. The Hurricanes are the Lethbridge WHL team; their games are on CJOC-1220. The Calgary Hitmen (WHL) are on CFAC-960 and the Red Deer Rebels (also WHL) are on CKRD-700. (DM-AB) DX AND EQUIPMENT TESTS ID Idaho Falls - DX test of 10/14 was heard over and under KUGN. (BR-CA) 590 KID+ AL Huntsville - 10/23 0205 - Male announcer with WDJL Huntsville, Alabama 1000 WDJL+ testing, then code and music. KTOK & XEOY nulled. Held until 0215. 1210 KREW+ WA Sunnyside - 10/28 - DX test heard very well. (BR-CA) TIS & OTHER STUFF (no time or date) - TIS for GE (?) Plastics on Highway 37, Burkville (?) 530 TIS Alabama, no station IDed as 530 AM with a 5 to 8 mile range. (TB-AL) 1580 CBPK BC Revelstoke - 10/27 0052 - Weather from Environment Canada. Continuous weather, fair - good. 50 watts. In some locations in Canada conventional AM and FM frequencies are used for the government weather forecasts, mostly in small towns. In larger cities the usual 164.xxx frequencies are used. As the call letters suggest, the licenses for the weather stations are actually held by the CBC. (DM-AB) 1620 WNYD21H IL Glen Ellyn - 10/15 0200 - Info on emergency services for Glen Ellyn: When you hear sirens . . . and phone number 469-55??. What made listening to this really interesting was that we knew there was a Glenallen in Alaska, but unfortunately we had a list of telephone exchange numbers listed by area code and city name that confirmed Illinois. (BW-MB) [My PhoneDisk confirms that the 469 exchange in the 708 area code is, indeed, Glen Ellyn -Ed.l MIDNIGHT TO 0800 HOURS ELT 580 KLBG LA Alexandria - 10/9 0104 - News and mention of a local business. (BBM-TX) 600 WREC TN Memphis - 10/8 0516 - ID WREC in Memphis, TC, followed by Amazing Grace on an organ and Bringing in the Sheaves by a choir at 0519 TX Houston - 10/8 0523 - With KILT, Rodeo Country. C&W music. (CB-CO) KILT 620 WRIZ TN Knoxville - 10/20 0010 - Mentions of Knoxville, then song Old Rugged Cross. New. Still no KAAM. (BBM-TX) CA San Francisco - 10/23 0759 - S9+5dB excellent! Local news & calls. (DS-TN) 680 KNBR WGZS AL Dothan - 10/23 0755 - Southern gospel, under WLW, calls. (DS-TN) 700 720 WGCR NC Pisgah Forest - 10/27 0741 - Over/under WGN, with in-depth weather forecast for the whole state of North Carolina. Then into southern gospel

music. NEW! (DE-MO)

760 WURL AL Moody - 10/23 0746 - Southern gospel fair fighting with unID Spirit of 76, Leeds & other community events, address given was different from 15th Edition Log but too much QRM to copy. (DS-TN) [My PhoneDisk (phone numbers on CD-ROM) gives the address and phone as: WURL CHRISTIAN RADIO STATION 732 Pine Hill Rd. Birmingham, AL 35217-1326 205-849-9586, so what is in the (new) Log and what's in the phone book are pretty close - Ed.]

810 WMTS TN Murfreesboro - 10/27 0728 - Barely over a crowd of others, with local ads.

ON Hamilton - 10/25 0008 to 0035 - Fading in and out. Just a little weaker than 820 CHAM WBAP. C&W music. WBAP was talk at this time, which made it easy. (DE-

840 KWPN NE West Point - 10/23 0741 - Calls, Norfolk ad, Nebraska PSA. (DS-TN)

890 KDXU UT St. George - 10/26 0005-0012 - Out of ABC Info News, and into . . . IDE Transponder Channel 10, followed by a 1000 Hz tone repeated for 7 minutes. Abruptly ended with a couple of snaps and crackles and into an unlDed talk show. This isn't real DX, but may be of interest to some. I believe somebody at the station was napping, hi. [Ed.-ID]

960 CFFX ON Kingston - 10/15 0100 - After over an hour of Good Time Oldies, finally a local ID. (BW-MB)

980 KCAB AR Dardanelle - 10/23 0733 - Ad for Russellville haunted house, ID as KC-102 KCIC. (DS-TN)

1160	KSL	UT	Salt Lake City - 10/24 1155 - Fair,
			and medical news, ID and CBS N
		N.I.	local. (EC-CA)
	KTNC	NE	Falls City - 10/12 0824 - In briefly,
	KWHK WTLS	KS AL	Hutchinson - 10/13 1113 - With ID Tallassee - 10/22 1534 - C&W, ac
1300	WILS	AL	station ID. ( <b>TB-AL</b> )
			Station ID. (IB-NE)
			<u>1600 TO 2</u> 4
0550	WDUN	GA	
			Oldsmobile ad, followed by both A
610	WTVN	OH	Columbus - 10/14 2004 - News,
			NEWS, News Radio. (BW-MB)
640	WGST	GA	Atlanta - 10/29 1657 - New here, w
	***************************************	NO	Atlanta's News Monster WGST. (TB
680	WPTF	NC	Raleigh - 10/29 1702 - Local new (TB-AL)
690	WTIX	LA	New Orleans - 10/20 2043-2049
090	****	LA	about constitutional amendments
			sent with ppc. (BM-SD)
750	KOAL	UT	Price-9/15 2300 - Strong, sometim
			clear ID and local commercials. (P
780	WZZX	AL	Linesville - 10/29 1630 - With Ge
			local pads for Jim Pruitt Auto Sale
			Country WZZY AM and FM. (TB-A
910	WDOR	WI	Sturgeon Bay - 10/25 1830 - Ment
			10. Talk about Kewaunee area. WOKY. (KW-WI)
1030	KFAY	AR	Farmington - 10/22 2105 - Ad for
1030	KIAI	щ	only all talk radio, KFAY. Into ESPN
1090	KKYN	ΤX	Plainview - 9/22 1757 - With ID, C
			experiencing intermittent transmit
1130	KWKH	LA	Shreveport - 10/28 2200 - Local w
			(TB-AL)
1190	KBCO	co	Boulder - 9/15 2315 - In null of KE
	KBCO	co	Boulder - 9/18-9/21-2000 to
			overpowering KEX. Usually stron format simulcasting 97.3 KBCO-FI
			watts? (PR-NV)
1210	кокк	SD	Huron - 10/25 2143 - Blowing W
0			No. George Staright on KOKK.
			Anderson Furniture, downtown H
1330	KGAK	NM	Gallup -10/27 2255 - With Gallup
			Clear copy at times. Sometimes he

ous - 10/22	1515 - Fal	con Football	Sports Network,	team interviews,
		tion ID (TB		,

NM Las Cruces - 9/1 0802 - Full ID, followed by news, C&W music. Slogan: K-

AR Harrison - 10/23 0822 - In mess, w/talk show with North Arkansas agency.

MO Jefferson City - 10/23 0828 - C&W, 950 AM KLIK. (DS-TN) KLIK

1130 WACQ AL Carrville - 10/22 1402 - Ohio-based political talk show discussing racism in America, station ID. (TB-AL)

, with TC as KSL Newstime 9:55, then ads News at :00. Usually disappears by 0730

with ID, then back into mud. (CB-CO)

and oldies. (CB-CO)

d for R&I Grocery on Highway 14 West,

#### 2400 HOURS ELT

t else --The World Series. Jimmy Dunn AM and FM IDs. (TB-AL)

several IDs When you see news, call 481-

with Tom Lykus show in progress. IDed as

vs about Fort Bragg followed by legal ID.

- With election eve ads and monologue s on ballot. Potent signal. Second report

nes overpowering KXL. C&W music with PR-OR)

eorge Jones' He Stopped Loving Her Today. les and Just Country nightclub. 1Ded as 95

tions of Door County Advocate. WDOR 9-Just barely under splash from 920 local

r The Cliffs in Fayetteville, AR. Arkansas' N radio. WAY over WBZ! (KW-WI)

C&W music. With local KBYG carrier (was tter problems) nulled. (CB-CO)

weather and legal ID. First from this area.

EX . Heard ID 97.3 KBCO. (PR-OR)

0300 - Signal in and out, sometimes ngest from sunset to midnight (PLT) . AOR M. Are you sure this station only runs 110

VGMP away! HUGE signal. Check Yes & . Ad for Dekalb corn hybrids. Ad for Huron. Finally first SD! (KW-WI)

Bengals football through KWKW/KLBS. Clear copy at times. Sometimes heard before power change in winter, but rare on night power/pattern. With KUPL off. (BR-CA)

1420 KULY Ulysses - 10/14 2045 - C&W music. KJCK Junction City also heard for first time earlier in evening. (BW-MB)

1430 KLO Ogden - 9/26 2200 - With legal ID: This is KLO, Ogden followed by ABC Information News, then Feed The Children ad. ID again at 2206 as 1430 KLO. (CB-CO)

1550 KUAT AZ Tucson - 10/18 1828 - This is NPR, KUAT, Tucson. TC, NPR News with Cheryl Cornman, All Things Considered at 1836. Jazz music, sign-off at 1856 with mention of simulcast on FM. (CK-CO)

**KXEX** CA Fresno - 10/18 2354 - ID as El Mexicano, El XEX en Fresno. SS programming. Also IDed on 10/20 at 0654. (CB-CO)

#### GRAVEYARD DX UPDATE

Totals: Richard W. Turner, N. Dartmouth, MA 1230 1240 1340 1400 1450 1490 Total

#### ABBREVIATIONS USED IN DDXD

/ /:parallel to :00:on the hour AC:Adult contemporary AP:Associated Press BBD:big band BRN:Business Radio Net C&W:country & western CCR:contemporary Christian radio CHR:contemporary hit radio CID:code ID CL:call letter EZL:easy listening EE:English FF:French GOS:gospel IRN:Interstate Radio Net LSR:local sunrise LSS:local sunset NBA:National Basketball Assn NFL: National Football League NPR:National Public Radio OC:open carrier POL: political PRI: Public Radio International PSRA:pre-sunrise authority PSSA:post-sunset authority QRM:man-made interference QRN:natural interference QTH:location PRI:Public Radio International REL:religious ROK:rock 'n' roll RS:regular schedule \$:stereo SID:singing ID SRS:sunrise skip SS:Spanish SSB:Star Spangled Banner SSS:sunset skip TC:time check TT:test tones UC:urban contemporary UPI:United Press International



#### **DDXD-East**

#### **NEWS AND VIEWS**

Welcome to Philip Boersma from Spring Lake, MI who reports on some changes in his neck of the woods.

From John Dunn: "In Vol. 63 No. 3 it was asked why WDCW would carry a local ad for a Toronto business. Most likely a local announcement should have been inserted into the satellite feed as this ad was probably intended only for Buffalo where the afternoon programming originates. In August WDCW took a lightning hit at their studios that wiped out the mixer in the production studio as well as the satellite receiver."

This includes everything received here through 10/31. No DDXD-East next week, as I'll be out of town for a few days, but we will return in two weeks and include everything received up to that point.

#### **SPECIAL**

		SPECIAL
540	WLUX	NY Islip - 10/28 0039 - Satellite NOS music, "For the information you need, and
		the music you love, this is WLUX AM 540." Ex-WLIX, ex-REL, and
		presumably NSP now there goes my only semi-local with a nightly
		sign-off! (DY-CT)
640	WMFN	MI Zeeland - These are the correct calls of this one (not WNFN), format is all
		sports as 'The Fan". (PB–MI)
700	WGZS	AL Dothan - 10/10 1907 - Fair under WLW with southern Gospel to 1915

sign-off, mentioning studios in Meadland and 6:00 sign-on. Power given as 1600 watts instead of listed 5000, so maybe they're non-directional? (SF-TN)

810 WISZ MI Rockford - Ex-WBYY as of early October is Radio Aahs all kids, reportedly has applied for U2 3500/500. Co-owned with WMFN-640. (PB-MI)

900 WCLZ ME Brunswick - 10/19 1845 - Now known as "The Shopping Channel". (AR-MA) (As in shopping for some listeners? - db)

1540 WPTR

NY Albany – Is now owned by Crawford Stations and will definitely be REL (re:

Vol 63, No 4). My source (very reliable) states initially the 20 hour/day
schedule will be done with only two employees, one of whom is transferring
from WDCW, Syracuse. Much of the programming will be satellite feed from
Buffalo. (JD–MA)

1600 WKEN

DE Dover – Has been noted off or at reduced power at several times over the last few weeks, completely off 10/24 1210, on but under WWRL 10/24 2227, off MM 10/30 0320. (DB-DE)

1660 WJDM NJ Elizabeth - 10/17 2210 - Equipment test noted with Eagles oldies and open carrier. (BH-NJ)

1660 WJDM NJ Elizabeth - 10/25 2012-2214 - Presumed testing with Eagles music, frequently cut carrier out completely, no announcements or IDs. (DY-CT)

1660 WJDM? NJ Elizabeth - 10/25 2032-2100 - Uninterrupted music (You Better Let Somebody Love You) with numerous breaks in the transmission. No ID's. Good. (JD-MA)

#### DX<u>TESIS</u>

1000 WDJL

AL Huntsville - 10/23 0200-0230 - Equal to WMVP with rock guitar music and some high-pitched code IDs and test tones. (SF-TN) ...Test tones and instrumental music way under a loud WMVP. (JH-NJ) ...Very good despite WMVP being on. Voice and code IDs, rock guitar instrumentals including limi Hendrix' Star Spangled Banner towards end, short tone segments. (KVJ-GA) ...Very nice test with killer music, tones, ID, code. Great job!



(GM-VA) ...WMVP never went silent, had one heck of a squeal along with WMVP signal on tape player when replayed in the morning. I could make out hard rock music in background, also heard rock version of <a href="Star Spangled Banner">Star Spangled Banner</a>, assume this was part of the test, however I don't have enough clarity for QSL card. (RCP-IN) ...Weak code IDs noted at 0201, 0211, and 0224, fair TT at 0215, followed by fair-poor voice ID by man giving either the station's address or phone number into rock instrumental music. Also heard a weaker, bassy voice at 0209. Overall reception fair-poor, mixing with or under WMVP the whole time. OK with me for AL #1! (AR-MA) (Congrats! – db) ...Tried but not heard. WMVP was still on the air at this time also. (LW-NY)

FL Venice - 10/23 0300-0400 - Good on peaks with test tones, sweep tones, novelty songs, voice IDs and code IDs. Nothing heard during 1 kw segment, and only weak code after 0345. QRM from WISW, WJAS and others. (SF-TN) ...Surprisingly good test tones and code up out of the slop. First half hour good, last 15 minutes fair. Nothing heard 0330-0345. Test tones were alternating, aka a UFO landing and taking off. (JH-NJ) (Uh...how do you know that, John? - db) ...Only heard code ID's and tones. From the code ID,

tone to zero beat, back to tone and more code ID's. Poor through WJAS. (JiL-OH) ...Another nice test with IDs, music included Monster Mash, tones, code. (GM-VA) ...Tried but not heard. (LW-NY)

1320 WOBL OH Oberlin - 10/5 0000-0030 - Not heard, WJAS atop. (BH-NJ)
1460 WZEP FL DeFuniak Springs - 10/7 0530-0600 - Not heard. UNID with *Art Bell* satellite

tele-talk atop. (BH-NJ)

## UNID AND UNID

760 UNID 10/20 0812-0831 - "Bloomberg Information Radio" network. No local IDs, ads? (KVI-GA)

820 WQ??

10/22 1930-1940 - Heard "...82-Q", then into CW song by an UNID female artist, then lost to WNYC. Although log states that this is WQSI, not enough heard to rule out the possibility that this may also be WQIX, as formats are similar. (RWT-MA) (Does WQIX use the "82-Q" slogan? - db)

1160 UNID 10/27 2056 - Sounded like "WEGO" ID but I don't have info on this ID. Weak signal. Half time football show. Mention of Northern Cambria. (DC-ON)

1440 WTN? 10/16 1835 - With many IDs as "Sports Radio 1440", but no locale mentioned. (LW-NY) (I'd guess WWTM-MA - db)

1470 UNID

10/19 1945 - Heard announcer say "1230 and 1470 WUA? - The Touch" into NOS or EZL. Poor. (AR-MA) ("The Touch" slogan goes with a satellite UC format, eg WJDY-1470 which is //WJPY-1280 - db)

1540 CHIN ON Toronto - Likely DB's 10/10 UNID Indian music station, heard nightly with film music and Indian community news while WDCD (ex-WPTR) was dark. (BC-NH)

1570 UNID 10/27 1905 – Poor. Weather forecast covered most of eastern U.S. Station ID as "Peoples Radio Network." (DC-ON)

#### 0000 to 0800 ELT

630 WNEG GA Toccoa - 10/21 0636-0649 - Georgia Tech football promo, many local ads, music, alone till WMAL fade-in. (GM-VA)

770 WEW MO St. Louis – 10/21 0705 – Big Band/NOS, "77–WEW". (KVJ–GA)
WYRV VA Cedar Bluff – 10/21 0731 – Poor with sign–on. (KVJ–GA)

780 WLRM MS Ridgeland - 10/21 0743 - "Capital Country", FM mention. (KVJ-GA) (Karl, new Log shows this as WIIN - db)

790 WSGW MI Saginaw - 10/17 0630 - Good but faded quickly. Lloyd Long Oldsmobile commercial. (DC-ON)

920 KARN AR Little Rock - 10/9 0010 - IDs as "Information Radio 24 hours a day". Very poor, much QRM. (RCP-IN)

WIRD NY Lake Placid - 10/25 0711 - Hurley Oil 523-3391, Bob Camp with detailed weather report, "Radio Lake Placid", ad for US Olympic Spirit Store, Agway 891-1515. //WLPW? 105.5 FM. Loud and clear. (PG-MA)

960 WERC AL Birmingham – 10/16 0632 – Chevron commercial, then male announcer gave 800 number seeking input on "Million Man March". Talk show format, very good frequent IDs. (RCP-IN)

- 1070 CHOK ON Sarnia 10/17 0700 Good signal faded as sun rose. News, sports, weather, and Walmart commercial. (DC-ON)
- 1080 WDSY PA Pittsburgh 10/15 0745 Good strength but fading. Sunday Morning magazine in progress. Station ID as "WDSY Pittsburgh". (DC-ON)
- 1250 WARE MA Ware 10/18 0018-0100 CW with FM, mention of "Serving the heart of New England", legal ID on hour. (GM-VA)
- 1290 WNBF NY Binghamton 10/25 0623 Accuweather followed by ID "Newstalk 1290" WNBF. Faded fast. (PG-MA)
  - WFBG PA Altoona 10/25 0758 Announcer Shaun McKay. 70% off sale at Fashion Bug.

    Indiana Mall promo, ad for Blue Cross of Western PA. "WFBG Altoona, First
    Choice for News" into CBS News Roundup. Over WRCP. (PG-MA)
- 1320 WTKZ PA Allentown 10/17 0618 Ad for Hampton Inns, Scott Chevrolet. Test of Emergency Broadcast System. "This station serves the Allentown area." Imus. (PG-MA)
  - WJAS PA Pittsburgh 10/23 0305 On top most of the time. Very good with weather and then NOS. Heard while looking for WAMR. (JiL-OH)
- 1390 WRIV

  NY Riverhead 10/15 0625 Noted with weather followed by call letter ID by male announcer, and a second ID by recorded singers. Poor with WDCW QRM. Nearby WPLM was on Sunday SP. (AR-MA)
- 1460 WZNZ FL Jacksonville 10/21 0612-0630 Local job fair promo, news, lDs. Atop the frequency. (GM-VA)
- 1470 WWWM OH Toledo 10/10 0433 Sounded like a pre-recorded weather forecast, "Thanks for listening to Magic 1470, where the magic is the music", mentions of a Red Cross shelter. Slop from CJOY-1460 and over CHOW, then gone. (RH-ON)
- 1480 WHBC

  OH

  Canton 10/17 0246 All I heard were call letters. Early morning here this channel sounds like a graveyarder, heavy drone noise. WHBC very, very poor in behind WZRC. Even WZRC was having a tough time. (RH-ON)
- **1500 WDEN GA Macon 10/16 0255–0330 –** CW music, "FM 105" jingles. Under WTOP but good. (GM–VA)
- 1600 WWRL NY New York 10/6 0112 "News Talk 16", heard call letters and slogan, not much else, too much QRM. (RCP-IN)
  - WTZQ NC Hendersonville 10/6 0122 Playing NOS music, announcer gave dual call letters for "WISE-Asheville and WTZQ Hendersonville". Apparently show was simulcast. 1600 a very active frequency here. (RCP-IN)
  - KRVA TX Plano 10/6 0105 IDs as "Radio Variedades", SS rock music, fairly dominant lately, usually KATZ. (RCP-IN)

### JIII W JINTNewsTalk 0800 to 1600 ELT

- 1350 CKDO

  ON Oshawa 10/25 0808 Ad for Harmony Creek Golf Club, 18 holes for \$16 or Twilight \$44 with dinner. Ad for Ontario Motor Sales. Announcement of meeting at the Polish Hall, call 666-9394 for reservations. Usually WINY is heard here. Canada and Western NY/PA strong this AM. (PG-MA)
- 1370 WXXI NY Rochester 10/25 0818 Soliciting membership pledges. Call 454-6300 or 1-800-295-WXXI. Very clear. They needed \$1500 by 0900 to match a challenge. (PG-MA)
- 1450 CHUC ON Cobourg 10/25 1035 Good. Oldies music. Station ID "1450 CHUC." Commercials for Northumberland Mall and Midtown Mall. (DC-ON)

#### 1600 TO 2400 ELT

- 550 CHNO ON Sudbury 10/16 2159 ID with news with Greg Narson? Weather Network Forecast. Ads for Sportsman RV, Burger King (free Whopper with purchase of one at any of the 3 Sudbury BK's). (PG-MA)
- 560 WQAM FL Miami 10/21 2250 Announcer mentioning South Florida, switch to ESPN Sportscenter program, ad for Primestar Satellite Television. (WM-MD)
  - CJKL ON Kirkland Lake 10/16 2100 Fair. Station ID "AM 560 CJKL". Program identified as "GTO Good Time Oldies." (DC-ON)
- 570 WKBN OH Youngstown 10/16 2125 Good signal. Talk show on immigrant's rights.

  Legally Speaking announced for Thursday and Dan Ryan Financial Page for Tuesday. Seems WKBN has a talk format. (DC-ON)
- 580 WILL IL Urbana 10/19 1901 NPR news. "Voice of the University of Illinois." Good (IiL-OH)

- 590 WKZO MI Kalamazoo 10/19 1911 Ad for Big 10 Radio Guide. "WKZO, your new talk station" promo with a talk with the Michigan teacher of the year. Very good. (JiL-OH)
- 600 WMT

  IA Cedar Rapids 10/18 1950 Must have been at least 5 minutes of continuous local ad's. All in the Cedar Rapids area. Finally a good ID. Very good. (JiL-OH)
  - WREC TN Memphis 10/16 1921 "Memphis Talk Radio." Very good. (JiL-OH)
- 680 WPTF NC Raleigh 10/17 1820 Community Bulletin Board, mention of WPTF's staff attending a NC fair, good signal. (LW-NY)
- 740 CBL ON Toronto 10/20 1928 "CBC Radio", jazz and show tunes, promo for program guide, news about Quebec referendum. (KVJ-GA)
- 750 CKGB ON Timmons 10/24 2318 "The Fresh, New Alternative CKGB". Mixing with WSB and Caracas, Venezuela. Baseball, hockey and soccer all at the same time. (PG-MA)
- 790 WAXY FL South Miami 10/8 2123 Talk show with host interviewing Fort Lauderdale police officer in squad car ramming incident by private citizen. First FL station heard. (RCP-IN) (Congrats! db)
- 820 WNYC NY New York 10/19 2220 NPR radio, mention of Boris Yeltsin. (WM-MD)
- **820 WOSU** OH Columbus 10/8 1927 Bluegrass Gospel show very good over WBAP at that time. (RCP–IN)
- 840 WCTG SC Columbia 10/22 1724-1750 "Lighthouse 840", Christian country format, "Your station for information and inspiration". (KVJ-GA)
- 850 WRBZ NC Raleigh 10/22 2208-2230 CNN Headline News, ad for a store "at 406 Capital Boulevard in downtown Raleigh", Don Imus promo, and ID at the half-hour with WEEI partially nulled. Been trying to log this one for a while. (RWT-MA)
- 910 KVIS OK Miami 10/6 2015 Religious song followed by fire and brimstone preacher.

  Much fading. (RCP–IN)
- 930 WMGR GA Bainbridge 10/7 1951 University of Georgia vs. Clemson football game, very good. (RCP-IN)
- 940 WINZ FL Miami 10/24 1850-1900 Ad for The Florida Journal, faded, then back with ID and beginning of Miami Heat basketball, lost to SS station. No sign of CBM. (RWT-MA)
  - WCPC MS Houston 10/14 1932 South Carolina vs. Mississippi State football, very good, my first MS station. (RCP-IN) (Congrats again! db)
- 970 WWIT NC Canton 10/22 1910 Fair signal with promo for auto loan outfit with telephone number 1-800-FOR-AUTO followed by promo for Sports Talk aired M-F at 6pm. Call mentioned twice during the promos. (IR-NI)
  - WBLF PA Bellefonte 10/13 1951 Surfaced briefly with promo for the 82nd anniversary mattress sale at Heilig Myers, 128 S. Allegheny St., Bellefonte, followed by ID "Real Country Radio WBLF". (JR-NJ)
- 1160 WJJD IL Chicago 10/27 2050 Good. <u>Tom Rivers Show</u> in progress about child molestation. (DC-ON)
- 1200 WAGE VA Leesburg 10/24 2100-2109 Mutual news and local weather, ID, ad for Loudoun County Services. Was hoping to hear WOAI, but I'll take this one, thank you very much. (RWT-MA)
- 1240 WKIQ FL Eustis 10/8 2324 Noted fair-weak signal, "We're playing your favorites 1240-W???". Couldn't hear it. Oldies music but at 2338 heard ID again "Good times great oldies, AM 1240 WKI?", news at 2338. The only WKI listed on 1240 is WKIQ. (WW-MA)
  - WCEM MD Cambridge 10/21 1710–1725 Very good with CW music, female DJ, local ads, pumpkin giveaway promo, "Continuous Country, AM 1240". (BH–NJ)
- 1250 CHWO ON Oakville 10/27 2136 Excellent. Middle of the road oldies music. Breeders Cup racing at 2200. (DC-ON)
- NY Niagara Falls 9/27 2142 Sent a report to them for this reception. Their ID was "WHLD AM 1270." They were playing oldies at the time but say they carry prominent religious programming. Eugene L. Hegedus V.P./Station Manager replied with a letter and coverage map. It seems they were operating at 0.1478 kw at that time. WOW! (DC-ON)
- 1290 WCHY GA Savannah 10/5 2016 "Savannah's station for news, sports and racing", poor. (RCP-IN)
  - WIRL IL Peoria 10/13 1900 News report on "Million Man March", good. (RCP-IN)

- WCBL KY Benton 10/13 1856 News and happenings of Marshall County, KY. Poor, under WIRL. (RCP-IN)
- 1300 WOOD MI Grand Rapids 10/16 1806 Station ID then what sounded like Bruce Williams Show. Very tough in local WTLC splash. (RCP-IN)
- 1320 WATR CT Waterbury 10/26 1753 Talk show with Dave ???. World News Tonight from CBS with Christopher Glenn then back to talk with guest Mayor Rado.(PG-MA)
- 1330 WASA MD Havre de Grace 10/28 2355-2400 Noted while scanning the band, good signal with college football scores and ID "WWLG-1360, WASA-1330". No sign of usual WRCA. (RWT-MA)
- 1340 WEPM WV Martinsburg 10/9 2153 Mention of many sponsors of sports event including Peterson's Drug Store. (HJH-PA)
- 1350 WINY CT Putnam 10/15 1900 Ending song by Chicago, then ID, mixing with WOYK Gospel music. (HJH-PA)
- 1360 WNJC NJ Washington Township 10/22 1900 Incredibly strong with SS programming, one ad heard, mentioned Philadelphia. Complete ID at this time. (HJH-PA)
- 1380 WBEL IL South Beloit 10/13 1921 "Information Leader WBEL 1380", weather report then song by Johnny Mathis. Good. (RCP-IN)
- 1390 WXTC SC Charleston 10/5 1821 "Charleston's sports station", call-in sports show called Carolina Calling. Good here for short while. (RCP-IN)
  - WMZQ VA Arlington 10/25 1915 CW music, fair signal, mixing with WEOK and WDCW. (LW-NY)
- 1420 WTCR WV Kenova 10/20 1858 CW music and ID heard through WHK. (HJH-PA)
- 1440 WLPZ

  ME Westbrook 10/25 2102-2113 No legal ID heard, but mentions of New England Patriots football, "the Pirates of Portland" (AHL team?), and a sporting goods store in Brunswick, then faded out and replaced with WWTM, which has similar programming. (RWT-MA)
- 1450 WILM DE Wilmington 10/24 1825 Heard with traffic report and weather for Wilmington. (LW-NY)
  - WOL DC Washington 10/21 1913 Heard briefly in QRM mess with oldies music. (LW-NY)
  - WMAS MA Springfield 10/26 1735 Weather, ID, NOS (Elvis then Dean Martin?!).
    Phone in contest 1-800-582-0201. Mix with WHIM and WTSA. (PG-MA)
  - WTSA VT Brattleboro 10/26 1737 One-on-One Sports. Ad featuring governor discussing Vermont Housing Finance Agency call 1-800-287-8HFA.

    Brattleboro HS football.(PG-MA)
- 1470 WMMW CT Meriden 10/16 2336 ID "Stardust 1470". NOS featuring Ames Brothers. (PG-MA)
  - WJDY MD Salisbury 10/16 2000 Heard with ID, "AM 1470 and WJID 1280, a division of Turner Broadcasting". Dominant station on 1470 at LSS, with AC music. (LW-NY)
  - WJDY MD Salisbury 10/16 2325 Waymon Tisdale promo for "More Continuous Music. Call us up at 1-800-7685." "The All New Sound" 1280 and 1470 WJDY. Fade in and out. (PG-MA)
  - WTTR MD Westminster 10/10 2055 Under WJDY with talk. Several station phone numbers mentioned. Weak-fair signal. (LW-NY)
  - WKAP PA Allentown 10/16 2236 "AM Stereo WKAP". Announcer Jack Davis. NOS. (PG-MA)
  - CHOW ON The Classic Stations Music Radio 1470 CHOW". Promo for Gospel show 0745-0815 Sunday morning, promo for breakfast show and mention of the "Balls Falls Historical Park". Running Country Music Radio with local inserts. Fair with downfades. (RH-ON)
- 1480 WRDW GA Augusta 10/20 1900 ID heard at this time, fair signal. "WRDW Augusta, all sports, all day, all the time". I would guess that this is an "all- sports" station. (HJH-PA)
  - WSAR MA Fall River 10/21 1900 Fair signal, sports Notre Dame football report. (LW-NY)
  - WZRC NY New York 10/16 2217 Man in Korean, then program host speaking in EE and fielding calls from Jersey, Flushing Meadows, Queens, etc. The interesting point here is that although the body of the program was mainly

- in EE, the spots were in KK. KK news at 2300. Dominant, fair on peaks. (RH-ON)
- 1540 WMDO MD Wheaton 10/15 1831 Poor "Radio Mundo" ID and rapid SS talk noted following WSIV sign-off. I thank Albany's brief period of silence for these catches and Bahamian ZNS-1 earlier in the month! (AR-MA)
  - WSIV NY East Syracuse 10/15 1829 Very weak ID heard, followed by (presumably) the station's phone number just before sign-off. (AR-MA)
- 1550 WKBA VA Vinton 10/18 1845 In with end of religious sermon and sign-off. Fair signal. (LW-NY)
- 1570 WNCA NC Siler City 10/21 1835–1836 -- Weak, end of Weekend Magazine program, into Chatham County news. (BH-NI)
- 1580 WSRF FL Fort Lauderdale 10/22 1810–1830 Presumed with wild reggae program.

  Occasionally blasting in. Very loud at 1830 then signal disappeared. Later at 1915 conventional Indian music at much reduced levels. (JW-PA)
  - WPGC MD Morningside 10/26 1955 Poor. Movie reviews. ID as "CNN Entertaiment News." Lynn Russell with Headline News. (DC-ON) (Don, I think this was probably WDAB db)
  - WDAB SC Travelers Rest 10/18 1900 <u>CNN Headline News</u>, good signal. First time heard here at LSS, previously heard only at LSR. (LW-NY)
  - WDAB SC Travelers Rest 10/18 1958 Fairly strong at sign-off. Mentioned 5 kw non-directional, listener comments were invited, couple mentions of "AM 1580". (JR-NJ)
  - WDAB SC Travelers Rest 10/20 1910–1922 In very well right after I exited Lancaster Malt Brewing Co. Friday evening. WDAB is in frequently mornings and evenings. (JW-PA)
- 1590 WHPY NC Clayton 10/17 1839-1845 Fair with preacher asking for money. Thanked listener in Jones County for donation. Gave phone numbers 240-1600 or 1-800- 245-9685. Played county Gospel music. (BH-NJ)
  - WAKR OH Akron 10/26 2003 Fair. Kent Lincoln Mercury '96 Sable sale. Pre-game show for the World Series game. (DC-ON)
- 1600 WTZQ NC Hendersonville 10/16 2023 Neat ID "Autumn in the mountains is like our music, WTZQ Hendersonville". Very good. (RCP-IN)

#### OTHER STUFF

1610 TIS NY - 10/30 0316 - Relay of NOAA weather station WFL(?)34, "serving eastern New York". (DB-DE)

#### REPORTERS

EIGHT • THREE • O Box 90395 Casper, Wyoming 8260

PB-MI Philip Boersma, Spring Lake, MI:

DC-ON Don Cassel, Bramalea, ON: Sony SW-55, GE Superadio III, Yaesu FT-990 and Kiwa Loop

BC-NH Bruce Conti, Nashua, NH: Lowe HF-225 Europa, MWDX-5, 30-m wire, 30-m east sloper

JD-MA John Dunn, N1VPU, dunn@world.std.com, Holbrook, MA: GE Superadio, lcom
R-71A connected to a Hustler 4BTV vertical ham antenna

- SF-TN Steve Francis, Alcoa, TN: Realistic TRF
- PG-MA Phil Greenspan, Marshfield, MA:
- JH-NJ John Hanz, Old Bridge, NJ: NRD-525, attic longwire
- BH-NJ Bob Harrison, Union, NJ: GE Superadio III
- HJH-PA Harry J. Hayes, Wilkes-Barre, PA: Superadio II, Superloop
- RH-ON Russ Horton, Acton, ON:
- KVJ-GA Karl V. Jeter, Lawrenceville, GA: HQ-150, TRF, Quantum Loop, 4' loop
- JiL-OH Jim Leder: NRD-535d/Le, Quantum loop, longwire
- WM-MD William McGuire, Cheverly, MD: DX-380
- GM-VA Greg Myers, Richmond, VA: Grundig YB-400
- RCP-IN Robert C. Pote, Greenwood, IN: GE Superadio III, Realistic DX-392, Select-a-tenna
- AR-MA Aaron Reed, Brockton, MA: Realistic DX-392
- Jeff H. Ross, Flemington, NJ: R8, 135' wire, loop
- RWT-MA Richard W. Turner, North Dartmouth, MA: Realistic STA-785, Recoton FM200 and Select-A-Tenna Loops
- JW-PA Jim Weber, Lancaster, PA: Delco car radio, auto beverage

14 LW-NY WW-MA DY-CT

DB-DE

Leslie Wood, North Merrick, NY: Sony 2010 William Wyllie, Franklin, MA: DX-390 David Yocis, Norwalk, CT: R71A, Kiwa Loop

Professional

Barry S. Finkel BSFINKEL@ANL.gov

Sports 10314 S. Oakley

Chicago, IL 60643-2409

Dave Braun, Wyoming, DE: R-5000, Quantum Loop

Networks

Network listings for team sports stations

Here is NBA 1995/96 Basketball flagship information from 'The Sporting News Pro Basketball Yearbook 1995-1996" via Dave Braun, Ken Onyschuk, and Dave Yocis. (It is better to receive the same information from three sources than to receive nothing when people believe that someone else will send me the information. The announcers are from last season; I do not have current information.

Boston Celtics	Atlanta Hawks	750 WSBT-GA		Steve Holman
Charlotte Hornets Chicago Bulls 670 WMAQ-IL 560 WIND-IL 560 WIND-IL Cleveland Cavaliers 1100 WWWE-OH Dallas Mavericks 570 KLIF-TX Denver Nuggets Detroit Pistons 950 KWJ - MI George Blaha, Mark Champion Golden State Warriors 680 KNBR-CA Houston Rockets 740 KTRH-TX 1010 KLQI-CA 1010 KLAT-TX 1		850 WEEI-MA		TBA
Chicago Bulls 670 WMAQ-IL 560 WIND-IL (SS)  Cleveland Cavaliers 1100 WWWE-OH Dallas Mavericks 570 KLIF-TX Ted Davis Denver Nuggets 950 KKFN-CO Jervoit Pistons 950 WWJ-MI George Blaha, Mark Champion Golden State Warriors 680 KNBR-CA (EE) Greg Papa 1010 KIQI-CA (SS) Amaury Pi-Gonzalez Houston Rockets 740 KTRH-TX (EE) Gene Peterson 1010 KLAT-TX (SS) TBA  Indiana Pacers 1070 WIBC-IN Mark Boyle Los Angeles Clippers 710 KMPC-CA (Chin ese) Los Angeles Lakers 570 KLAC-CA (Chin Heat 940 WINZ-FL (EE) Jose Paneda Heat 940 WINZ-FL (EE) Jose Paneda Milwaukee Bucks 620 WTMJ-WI Howard David, Jon McGlocklin Kevin Harlan, Tom Hanneman, Chad Hartman New Jersey Nets 1560 WQEW-NY New York Knicks 660 WFAN-NY Orlando Magic 580 WDBO-FL Philadelphia 76ers 610 WIP -PA Phoenix Suns 620 KTAR-AZ (EE) Al McCoy, Cotton Fitzsimmons Carlos Burgos, Manual Soliz Bill Schonely, Mike Rice Tim Roye, Gary Gerould Jay Howard David, Jon McGlocklin Kevin Calabro 1350 KCOR-TX (SS) TBA  Will Ajazz 570 KISN-UT Rod Hundley, Ron Boone Washington Bullets 570 WTEM-DC Charley Slowes		680 WRKO-MA	a	
Chicago Bulls 670 WMAQ-IL 560 WIND-IL 570 KLIF-TX 570 KISP-CA 570	Charlotte Hornets	1110 WBT -NC		Matt Pinto
Cleveland Cavaliers 1100 WWWE-OH Joe Tait Dallas Mavericks 570 KLIF-TX Ted Davis Denver Nuggets 950 KKFN-CO Jerry Schemmel Golden State Warriors 680 KNBR-CA (EE) Greg Papa 1010 KlQI-CA (SS) Amaury Pi-Gonzalez Houston Rockets 740 KTRH-TX (EE) Gene Peterson 1010 KLAT-TX (SS) TBA Indiana Pacers 1070 WIBC-IN Mark Boyle Los Angeles Clippers 710 KMPC-CA Ralph Lawler, Rich Marotta ese) Los Angeles Lakers 570 KLAC-CA (Chin ese) Milwaukee Bucks 570 KLAC-CA (Chin Milwaukee Bucks 620 WTMJ-WI Howard David, Jon McGlocklin Kevin Harlan, Tom Hanneman, Chad Hartman New Jersey Nets 660 WFAN-NY New York Knicks 660 WFAN-NY Orlando Magic 580 WDBO-FL Philadelphia 76ers 610 WIP -PA Phoenix Suns 620 KTAR-AZ (EE) Al McCoy, Cotton Fitzsimmons Portland Trail Blazers 1190 KEX -OR Sar Antonio Spurs 1200 WOA-RX (EE) Jay Howard David, Jon McGlocklin Kevin Calabro Fitzsimmons Seattle Supersonics 750 KISN-UT Rod Hundley, Ron Boone Washington Bullets 570 WTEM-DC Charley Slowes  Charley Slowes	Chicago Bulls	670 WMAQ-IL		Neil Funk, John Paxson
Dallas Mavericks 570 KLIF-TX Ted Davis Denver Nuggets 950 KKFN-CO Detroit Pistons 950 WWJ-MI George Blaha, Mark Champion Golden State Warriors 680 KNBR-CA (EE) Greg Papa 1010 KIQI-CA (SS) Amaury Pi-Gonzalez Greg Papa 1010 KLAT-TX (EE) Gene Peterson TBA Mark Boyle Ralph Lawler, Rich Marotta ese)  Los Angeles Clippers 710 KMPC-CA (Chin Heat 940 WINZ-FL (EE) Dave Halberstam 300 KAZN-CA (Chin Sinuments of Milwaukee Bucks 620 WTMJ-WI Howard David, Jon McGlocklin Minnesota Timberwolves 1130 KFAN-MN (EE) Jose Paneda Howard David, Jon McGlocklin Kevin Harlan, Tom Hanneman, Chad Hartman Ian Eagle, Mike O'Koren Mike Breen, Walt Frazier Chip Caray, Jack Givens Jon Gurevitch Phoenix Suns 620 KTAR-AZ (EE) Al McCoy, Cotton Fitzsimmons Carlos Burgos, Manual Soliz Portland Trail Blazers 1190 KEX-OR Sacramento Kings 1140 KHTK-CA San Antonio Spurs 1200 WOAI-RX (EE) Jay Howard Tavid Minnesota Proposed Seattle Supersonics 950 KJR -WA Toronto Raptors 1010 CFRB-ON 99.9 CKFM-ON Utah Jazz 570 KUS-UC Charley Slowes	8	560 WIND-IL	(SS)	
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	-	1360 WWLG-MD		

a "Contrary to what is shown, I [Dave Braun] have recently heard on one of the on-line services that the Celtics will be on WRKO-680 this year." Can someone in the Boston area verify this?



# Product Catalog

Special NRC Member Edition

This special pull-out section will allow NRC members to have access to ordering information for current reprints, other products, and publications from NRC Publications. If you need any information on products that may still be available but are no longer listed in this catalog, please order ZAL (NRC Archived Publications List). This list includes items which are dated or have been superseded and includes bandscans and other early technical articles.

Remember, each purchase benefits your non-profit National Radio Club.

NRC AM Radio Log. 16th Edition - Order ltem ARL Over 2500 updates since the 15th edition!!! This 16th Edition is the 1995-1996 DX season's edition of the hobby's original BCB reference for the U.S. and Canada. Packed with the quick reference station data that you've always loved, it includes cross references by city and call letter.

Verie Signers List - Order Item VSL

NRC Night Pattern Book - Order Item NPB -Coming soon! Will include maps of each frequency with nighttime antenna patterns. Totally redrawn to the latest official information. Price to be announced.

FM Atlas, 16th Edition - Order Item FMA Dr. Bruce Elving's New 16th Edition. Contains listings by frequency and alphabetical listings by state. State-by-state location maps. Translators are listed by state. Entries include power, antenna height and Format.

Getting Started in Medium-Wave DX'ing-Order Item NMB Updated in 1995. This booklet is designed to assist the novice DX'er in pursuit of the hobby. It includes introductory articles on foreign and domestic DX'ing. Articles on OSL'ing, safety, and DX gear are also included. (This book is included with a new membership in the National Radio Club)

Beverage and Longwire Antennas Design and Theory - Order: BAM This manual is a compilation of numerous articles on the subject of design and theory of the beverage and longwire antennas that have appeared through the years in DX News.

Some articles are available as reprints. This book gives details information on the theory of operation, construction, and maintenance of a beverage antenna. Serves as an enhancement to Antenna Reference Manuals Volume 1 and 2. 5 1/2" X 8 1/2" booklet format.

BAM Contents:

The Coolum Beach Beverage 1983 Analysis of the Beverage Antenna

Part 1- Basic Theory

Part 2- Two Wire Phased Antennas

The Florida Beverage

The Care & Feeding of the Wave Antenna

A Non-Resonant Longwire Remote from Earth Ground

Loop Antenna Design and Theory - Orde Item LAM Revised and updated for 1996. This manual is a compilation of numerous articles on the subject of design and theory of the loop antenna that have appeared through the years in DX News. This book gives detailed information on the theory of operation, construction, and maintenance of a loop antenna. Serves as an enhancement to Antenna Reference Manuals Volume 1 and 2.8 1/2" X 11" bound book format.

LAM Contents: Multi-Rod Ferrite Loop Antennas Roll Your Own! (Loop) Loop Antenna Theory & Practice Long Wave Converter Detail Loop Distortion- Why get Skewed? Pattern Controlled Loops

High Dynamic Range Balun Loop BFE-C Loop Amplifier Card

The Hot Rod- Ferrite loop Antenna

Loop Antenna Sensitivity

High Precision Direction finding of MW Skywave Signals

High Performance General Purpose Loop Amp

What's Wrong With Present Day Loop Antennas?

Antenna Reference Manual Volume 1 - Order Item ARM1 Revised and updated for 1996. This manual is a compilation of numerous articles on the subject of antennas for medium wave DX'ers. Originally published between 1969 and 1974 in DX News. Includes articles on air-core and ferrite core loops, antenna tuners for longwire and beverage antennas, and antenna couplers. This is the original book which has been available for several years. 8 1/2" X 11" bound book format.

ARM1 Contents: NRC FET Altazimuth Loop Balanced FET Amplifier Thoughts on FET Loop Construction NRC Two Foot Loop Tips on Loop Construction One Transistor Loop amplifier Balanced & Unbalanced Loops Direct Coupled Loops

A 'Collapsible' Loop for Travel BCB DX'ers Beverage

Antenna Tuning Devices for Longwires on MW

Bob Flick' Loop

Degenerative Loop - An Excellent Antenna Coupler

The Hawk Loop

Alternative Methods of Air Core Loop Amplification

Antenna Reference Manual Volume 2 - Order Item ARM2 Revised and updated for 1996. This manual is a compilation of numerous articles on the subject of antennas for medium wave DX'ers. Originally published between 1974 and 1981 in DX News. Some articles were formerly available as reprints. Includes articles on air-core and ferrite core loops, antenna tuners for longwire and beverage antennas and phasing units for use with beverages and longwires. 8 1/2" X 11" bound book format.

ARM2 Contents:

A Good loop is easy (& Cheap) to make The "Harley Loop"

Whip antenna Coupler for portable Receivers

The Wedge Loop

AC power supply for FET loop amplifiers Antenna Phasing

FET loop amplifier w/coaxial output Practical Phased Beverages Phasing Unit Construction and Use More on Phased Beverages

Phasing Unit Design Modifications More Thoughts on Beverages

Floor Stand and Mounting arrangements for Loops

NRC County Cross Reference - Order Item CCR Compiled by Bill Hale. This handy reference has a complete lists of counties in the USA and Canada. These are listed alphabetically and cross referenced by state. A great way to ID those unID'ed stations that mention a county name! Also included is a complete list of counties listed by state and/or province.

The Challenging Crystal Set - Ray Cole -Order Item CCS This interesting booklet shows you how to build a "modern" crystal set, just like the one your parents or grandparents might have built and used many years ago. The 40-page booklet is full of illustrations and excellent diagrams.

The DX'pedition Handbook - Shawn Axelrod - Order Item DPH With features by Mark Connelley WA1ION. A complete guide to planning and participating in a DX'pedition. Includes the results of the 1991 and 1993 Newfoundland DX'peditions. Recommended for those interested in exotic DX and using beverage and mini-beverage antennas

AM Station Location Maps, 3rd Edition -Order Item SLM Edited by Bill Hale. Contains maps for all frequencies with locations noted for every station in the USA and Canada. 8 1/2 X 11 format, three hole punched. Updated for 1996 with current information and improved maps!

#### DX'ers' Accessories and Aids

Sunrise/Sunset Maps - Order Item SSM A set of 12 maps (8 1/2" X 11") with instruction sheet showing the average monthly sunrise/sunset times for the United States. An invaluable aid for DX'ing sunrise and sunset skip.

Map of U.S. & Canada - Order Item MAP Map of the U.S. & partial Canada with state and provincial borders. Cities are not shown.

"Broadcaster's Guide to DX" - Order Items EEG (English) SSG (Spanish) - FFG (French) - FMG (FM DX) Tri-fold guides for use with reception reports explaining the broadcast band DX hobby, the history of the NRC and the importance of verifications to DX'ers. Sold 20 per order.

NRC Emblem Letter Opener - Order Item LRO Handy yellow plastic letter opener with the National Radio Club logo in black. It opens letters, cuts string, poly bags, package wrapping and more...

Log Sheets - Order Items ... LG (110 sheets) LGS (20 sheets) Organized by frequency

with 25 entries per sheet possible. Space is available to add additional columns. Punched for a three ring binder. 8 1/2" X 11". Sold 110 sheets per pack. (Additional pages are available in 20 sheet packs).

Cassette Tapes (All tapes are high quality music grade cassettes)

Order Items

C-90 = 10 C-90 cassettes C-10 = 10 C-10 cassettes

#### Audio Cassette Magazines

"After Dark Volume 1" - Order Item ADC1 Originally released in the talking book format. Now in two 90-minute cassettes.

"After Dark Volume 2" - Order Item ADC2 Volume 2 is a four-90-minute-cassette collection in a plastic album. It contains air checks from such rarities as WNRC and the 1984 IRCA convention station WTCL-830 as well as Laser-558 and much more from BCB, FM and SW. A variety of what's happening in radio, formats, "rule primer", "for beginners" and much more.

"After Dark Volume 3" - Order Item ADC3 Four 90-minute cassettes in a plastic album. Contains an interview with Radio Nederland's Jonathan Marks, host of "Media Network"; an interview with Dr. Bruce Elving, editor of the FM Atlas; a complete Las Vegas, Nevada band scan; the 10th anniversary of WOJB-FM, an American-Indian owned and operated

station, WWTC in Minneapolis and their "All Kids" "Radio "Ah's" format, Chicago's "Voices of the Night", and much more.

"After Dark Volume 4" - Order ADC4 Four 90-minute cassettes in a plastic album. Featuring an exclusive DXAS interview with Wolfman Jack, plus "A Walking Tour of WWV" featuring Mindy Drayer, an exclusive interview with AM Stereo pioneer Leonard Kahn, two successful blind DI's, and much more!

"After Dark Volume 5" - Order ADC5 A 12cassette collection in a plastic album, featuring an in-depth interview with VOA's John Vodenik on the closing of the Bethany transmitter site, airchecks from 1230 and 1240 stations, interviews with Mark Connelly and Bruce Conti on TA DX, and many more audio magazine features!

#### For Members Only!

Member Stationary - Order Item STA New, cleaner design! Show others that you're a proud member of the National Radio Club. NRC logo and header in black ink. Sold in packs of 100 sheets.

Reception Report Forms -Order items EERF (English) Easy and convenient-to-use forms. Available in English only. NRC logo and header in black ink. Sold in packs of 50 sheets. Items FFRF (French), SSRF (Spanish) - available as sample form only.

#### Reprints

This list supersedes all previous lists and order forms. Number of pages of articles are indicated by ().

#### ANTENNAS

Many articles formerly in this section are now in the Loop and Beverage Manuals.

A2 A ZERO SHARPENING DEVICE FOR A BCB LOOP. T. Holmes. If you're having trouble obtaining sharp nulls with a standard loop, this simple device may

A3 A VERSATILE LONGWIRE ANTENNA COUPLER. R. Foxworth. How to get the maximum mount of signal from your longwire. (3)

A9 DOWN-TO-EARTH GROUNDS. G.P. Nelson. How to make low resistance ground connections for terminating a Beverage (2)

A10 A CALIFORNIA BEVERAGE. Fr. Jack Pejza. Results obtained at this Beverage site. (2)

A12 THE VERTICAL PICKUP PATTERN OF THE MW LOOP ANTENNA. G.P. Nelson. Information for those doing horizon-blockage experiments with a loop antenna. (4)

A13 USING TWO ANTENNAS TO GENERATE ASYMMETRICAL RECEIVING PATTERN, M.Levintow. Shows a simple way to skew your loop's pattern to effect a null that will permit reception of a station impossible to receive on a figure-8 loop antenna by itself. Reprints A5 and A6 are a requirement for understanding this technique. (3)

A14A NEW MEDICAL BREAK-THROUGH FOR LONGWAVE TA'S. C. Clayton. Instructions on how to build an inexpensive loop antenna for LW. (1)

A15 REVIEW OF THE DYMEK DA-3 ANTENNA. Pete Taylor, with notes by R. J. Edmunds. Evaluation of this MW antenna. (4)

A16 MORE ON BEVERAGE ANTENNAS. Wes Boyd. Beverage antenna theory and application. (2)

A17 MORE FERRITE LOOP ANTENNA INFO. Dallas Lankford. Inconsistencies in ferrite-core loop antenna theory. (3)

A19 NEBE: THE NEBRASKA BEVERAGE. D. Fischer, C. Dabelstein, R. Mitchell. Results at the Nebraska Beverage site. (7)

A20 THE LSCA-1. Ron Schatz. Construction plans for the Loop Sense Cardioid Array. Should yield a unidirectional receiving pattern when operated properly. (10)

A25 A NOVEL APPROACH TO BUILDING YOUR OWN BCB LOOP. M. Maloney Ideas for improvements in operation and sturdiness of loop antennas. (4)

A27 SEVEN PASSIVE TUNERS. Mark Connelly. This article will introduce you to many different tuner designs and how they are used (10)

A29 REMOTELY-CONTROLLED ANTENNA TUNER RT-1. Mark Connelly. An introduction to the design of remote tuning for loop or wire antennas from distances of 50 feet or more. Use w/ A43 (7)

17

- A30 REMOTELY TUNED DIRECTIONAL LOOP ANTENNA. E.L. Cummins.
- Loops ideas for building where interior mounted loops will not work. (11)
- A31 SIMPLE CHEAP AND EFFECTIVE PRESELECTOR
  LONGWIRE TUNER-AMPLIFIER. B. Sherwood.
  Schematic and brief instructions are given. (3)
- A33 ANTENNAS FOR AM BROADCASTING. Steve Kennedy. A brief history of early and current station antenna systems. (4)
- A34 SOME ANTENNA EXPERIMENTS PART 1. W.R. McIntosh. Ever heard of a Helical longwire? This article deals with compact antennas for use where space is limited. (3)
- A35 THE PHASE ONE A Delay Line Phasing Unit. Gerry Thomas. Description of an improved phasing unit design that can be built or is available in kit form. (3)
- A36 LOOP-LONGWIRE COMBINED ANTENNA. P. Swain.
  "Sensing" antennas for DXing and direction finding. (3)
- A38 EXTREMELY LINEAR ELECTRICALLY TUNBLE
  ACTIVE RECEIVING ANTENNA. Hopf and
  Lindenmeier. Technical discussion of an antenna
  system that is the optimum solution towards allowing
  undisturbed reception near transmitters. (5)
- A39 SIMPLE PASSIVE LONGWIRE TUNER. Mark
  Connelly. A basic tuner that can eliminate mixing
  spurs caused by strong locals. (2)
- A40 AMPLIFIED PHASED SHORTWIRES. Mark Connelly.

  Contruction article. Utilizing an SM-2, phasing unit and short wire antenna. (8)
- A41 THE KOWALSKI LOOP. Neal Perdue with comments from Paul Kowalski. A first-hand account of this ferrite core loop antenna. A non-technical review, with comparisons to the SM-2. (2)
- A42 THE MWT-1 FAMILY OF ANTENNA TUNERS. Mark Connelly. Construction plans for the MWT-1, Mini MWT-1A, 1B and 1C antenna tuners (28)
- A43 RT-1 REMOTELY-TUNED ANTENNA TUNER. Mark Connelly. Description and construction plans. (10)
- A44 THE MINI MWDX-3, A simple, effective phasing Unit.

  Mark Connelly. Construction plans for a one-box phasing unit. Order also A55. (21)
- A45 THE MWDX-4 FAMILY OF PHASING UNITS. Mark Connelly. Construction and use of two similar series of phasing units. (25)
- A46 WIND A COMPLETE-COVERAGE COIL FOR THE RADIO WEST LOOP. Fritz Mellberg. Eliminate the need to change coils during tuning of the entire MW band on this antenna. (1)
- A47 TEST OF THE MITCHELL LEE LOOP AMPLIFIER.

  Mark Connelly. A new low imped- ance input, 3transistor amplifier used with series tuned loops is
  detailed, along with improve- ment ideas. (6)
- A48 YAD ANTENNA GIZMO Jerry Starr. A simple-tobuild antenna switching device. Will ground the antenna not in use while using the other; designed for 2 antennas and 1 receiver. (1)
- A52 COMPUTER-AIDED ANTENNA TUNER DESIGN. Mark Connelly. This BASIC computer program determines which component values are used in your antenna tuner. Tuner schematics included. (7)
- A53 IMPORTANT LOOP, TUNER AND PHASER DESIGN CONSIDERA-TIONS ("Q" DEMYSTI-FIED) Mark

- Connelly. Technical article. The importance of "Q" and a BASIC program to find antenna tuner component values in light of the "Q" (7)
- A54 THE MITCHELL LEE AMPLIFIER: TWO TUNER IMPLEMENTATIONS. Mark Connelly. Technical article. Tuner circuits using this amplifier. Reference also A47. (5)
- A55 HOTRODDING THE MINI-MWDX-3 PHASING
  UNIT.Mark Connelly. Technical article. More on the
  Mini-MWDX-3. Requires reprint A44. (3)
- A57 MICRO-MWDX-4A LOOP VS WIRE PHASER. Mark Connelly. Connelly. Technical Construction Article. (11)
- A59 LIL-1. Dallas Lankford. Construction plans for a new circuit for combining a loop and inverted L antenna to generate a cardioid pattern. (3)
- A60 MEDIUM WAVE, A PRACTICAL APPROACH.

  Graham Maynard. This is a consolidation of articles that were first published by the Medium Wave Circle of England. It outlines the authors construction of his MW DX receiving set-up. (12)
- A61 MWDX-5 PHASING UNIT. Mark Connelly. The latest the series of Phasing Units. Construction article. (11)
- A62 MINI-MWDX-5. A SIMPLE PHASING UNIT. Mark Connelly. Construction article. Similar to the MWDX-5 but simpler. A61 recommended (3)
- A63 RIBBON CABLE LOOPS. Mark Connelly. A new loop concept. (5)
- A64 QUANTUM LOOP Gerry Thomas and Mark Connelly.
  A new ferrite core loop. Reviewed and modified. (9)
- A66 SUPER BOOSTER BAR. Gerry Thomas. For portable receivers. (2)
- **A67 BUF-A AMPLIFIER.** Mark Connelly. A building block for many Connelly constuction projects. (9)
- A68 HIGH PERFORMANCE LOOP AMPLIFIER. Dallas
  Lankford (6)
- A69 NOISE and INTERFERENCE REDUCING ANTENNAS. Wraight, Lankford and Connelly. (10)
- A70 REMOTELY TUNED LOOP RTL-1 and RTL-1A. Mark
  Connelly Also Contains the latest BBA-C1 Amplifer
  Card. (20)
- **A73 THE MWT-2 REGENERATIVE TUNER.** Mark Connelly (21)
- A75 BEVMATCHER. A broadband Antenna Matching and combing Unit. Mark Connelly. (8)
- A77 The RTU-1. Mark Connelly. A remote tuning unit for active antennas. (11)
- A78 Coupler and Upgrades for the Quantum Loop. G. Thomas (2)
- A79 SUPER MWDX-5 PHASING UNIT. M. Connelly. Upgrade of Reprint A61 (16)
- A80 ANOTHER LOOK AT NOISE REDUCING ANTENNAS by Mark Connelly (3)
- A81 ONE CHIP ACTIVE ANTENNAS by Mark Connelly
  (3)
- A83 THE RTL-2 REMOTELY TUNED LOOP by Mark Connelly (24)
- A84 THE DCP-1 DUAL CONTROLED PHASER FOR REMOTELY TUNED ACTIVE ANTENNAS by Mark Connelly (12)
- **A85 DL-1 DELAY-LINE PHASE UNIT** by Mark Connelly (9)

- A86 THE MWT-3 REGENERATIVE TUNER CONTROLER
  by Mark Connelly A passive and Active broadband
  amplification control of remotely tuned loops and
  white (21)
- A87 ULTRALINEAR 2N5109 AND 2N3053 AMPLIFIERS. D. Lankford. Technical article with instructions/schematics. (15)
- A88 ULTRALINEAR AMPLIFIED ONE METER WHIP ANTENNAS. Dallas Lankford. 1994 Complete instructions and diagrams for 2 one meter antennas. (19)
- A89 THE FULL-SIZE, FULL-PERFORMANCE LOOP. R. Moore. A history and explanation of loops and the author's current design. (10)
- A90 ANTENNA EXPERIEMENTS summer 1994. Mark Connelly. Tests to help you choose for your needs. (5)

#### DOMESTIC DX

- D2 IT TAKES TWO TO VERIFY, PLUS HELPFUL HINTS.

  J. Murley and R. Schiller respectively. Article on the station's attitude toward reception reports and veteran DX'er Schiller's tips on increasing your returns. (4)
- D3 THE DX TEST FROM A STATION'S VIEWPOINT. Bill Croghan. Hints from a broadcaster arranging DX tests and obtaining more verifications. (1)
- D4 WHAT IS A PRE-SUNRISE AUTHORIZATION? R. J. Edmunds. An Explanation of psra's. (3)
- D5 LONG DISTANCE RECEPTION OF DX TESTS. F. Dailey. Proven techniques. (1)
- D6 MAKING THE BEST OUT OF PREPARED-CARD VERIES. Kelly Andrews. The verie collector's last resort, with numerous samples. (3)
- **D9 THE NSP SITUATION.** J. Starr. A look at this problem from the broadcaster's side of the fence. (2)
- **D10 DX FROM THE TWILIGHT ZONE.** P. Sullivan. Sunrise and Sunset Skip explained (4)
- **D11 GRAVEYARD DX**, R. Foxworth, with additions by M. Levintow. DX'ing the local channels with results. (15)
- D12 CANADIAN FAMILY LIFE...IT'S TWINS. J. Oldfield. Explains station "families" in Canada. List of Station groupings as of 1980 (3)
- D13 THE POST-SUNSET AUTHORITY, A DAYTIMER'S DILEMMA Jerry Starr. A discussion on "PSSA's". (4)
- D16 SUNRISE SKIP. R. Kramer. Practical how to info. includes pre-sunrise authorities (psra), station allocations on clear channels and auroral effects. (7)
- D17 THE WORLDS HIGHEST -POWERED STATIONS.

  Mike Burden. From Radio Luxembourg's 1933 150KW transmitter to the mega-watters of today, includes WLW, Doc Brinkley, and more. (3)
- **D18 Q\$L'ING THE LOCALS.** Skip Arey. Extracting veries from your local stations. (1)
- D19 HOW TO "UP" YOUR TOTALS! John J. Rieger. An antidote to "DX burnout" and proof that there is DX after the first 1000 catches! (3)
- **D20 WHO'S ON FIRST?** Bruce Conti. Who was the first broadcasting station in history? (4)
- D21 WHAT MAKES FOR A DX TEST? Wayne Heinen. A look at what happens at a radio station during a DX test (1)

- **D22 FORMAT FUTURES.** Chris Cuomo. What radio formats may look like in the 1990s. (2)
- D23 SATELLITE PROGRAMMING. Ed Ryan. A look at how it works. (2)
- D25 A SEVENTEEN-POINT PLAN FOR AN IMPROVEMENT. Doug Smith A fix to the AM broadcasting service as we know it? (3)
- D26 ONCE UPON A TIME. Ben Dangerfield. What happened 30 years ago in DX, the NRC, and the world! 1963 was an amazing year. (3)
- **D27 THE STEVENSON LOG.** Gene Martin. The Broadcast Band in February 1926. (1)
- D28 SUNSET DXING FROM THE WEST COAST, Guy Kudlemyer. Becoming a pro at catching stations at sunset.(6)
- D29 DXing Tips Using Satellite Services. D. Schmidt (2)
- D30 TRAVELERS INFORMATIONS STATIONS. Rules and Regulations governing these numerous low-power boradcasters. (2)
- **D31 EXPANDED BAND (1610-1700)** Bill Hale. Allotment list with location maps. (2)
- D32 USA DIGITAL RADIO (IN-BAND, ON-CHANNEL).
  Official descriptions. (6)

#### FOREIGN DX

- F1 DX'ING CENTRAL, SOUTH AMERICA AND THE CARIBBEAN. Mark Connelly. Listings, by frequency, of the best bets from these areas, along with the original Connelly, DeLorenzo, Kazaross article DXing Latin America and the Caribbean. (9)
- F2 TA TIPS FOR BEGINNER. Dave Yocis. Your first Trans-Atlantic receptions! (2)
- **F3 PORTUGUESE FOR DX'ERS.** R. Schatz. Describes the important features of this language. (2)
- F4 TA DX'ERS GUIDE TO SUNRISE-SUNSET TIMES.

  Mark Connelly. Reference to SRS-SSS times with
  extensive tables for many locations. (4)
- F5 HUNTING LATINS BY MUSIC. R. Schatz. Describes types of IA music from various countries and how to ID stations using this information.(5)
- F6 ZONAL-ANALYSIS APPROACH TO TA DX. Mark Connelly. A systematic method of grouping TA countries to help the DX'er recognize different types of openings and improve TA reception. (4)
- F7 ZONAL-ANALYSIS APPROACH TO PAN-AMERICAN DX. Mark Connelly. Similar to F6, with the emphasis on the Eastern U.S. loggings of IA and South American stations. (5)
- F8 STATION IDENTIFICATION. Tips on how to ID stations in nearly 50 languages! (2)
- F9 SOME EASY TA'S. Dallas Lankford. (2)
- F10 ID'ING JAPANESE BROADCAST STATIONS. Charles Taylor. Hints to help, without actually knowing the language! (2)
- F12 COMMON SENSE TA DX STRATEGY. Mark
  Connelly. Practical hints are given for hearing TransAtlantic
- stations. (2)
- F13 THE ODDS ON EVEN TA'S. Mark Connelly. The possibility of hearing TA's on channels shared with domestic stations. (10)

- F14 YOUR FIRST 30 COUNTRIES IN ENGLISH. Mark Connelly. Listed by country. (3)
- F15 CARIBBEAN MW DX GUIDE. Mark Connelly. Listed by Country. (4)

#### HOBBY REFERENCE LISTS

- Some repints formerly in this section are found in Station Location Maps
- HRL1 National Radio Club Common Abbreviations List(6)
- HRL2 Cuban Medium-Wave Broadcast Stations This list recently revised! (4)
- HRL3 U.S. Postal Service 3 digit ZIP codes (2)
- HRL4 North American Time Zones to UTC Conversion Chart. (1)
- HRL5 Frequency and Power Relationship Chart. Shows average coverage radius for various powers at BCB frequencies. (1)
- HRL6 List of Electronics Manufactures, Parts supplies and other Hobby related services. Complete with addresses and phone numbers (21)

#### **MISCELLANEOUS ARTICLES**

- M1 LOCAL SIDERAND SPLASH: HOW MUCH IS TOO MUCH? G.P. Nelson. This article describes FCCregulations on sideband radiation on the medium wave band and types of station-originated spurious radiation. (1)
- M2 MODULATION ARCING J.. Starr. Describes a frequent but rarely discussed cause of medium wave interference originating at the station. (1)
- M3 SUNRISE-SUNSET TABLES. G.P. Nelson. These charts allow determination of accurate time of sunset and sunrise at any point in the world on any date. (9)
- M4 RF INTERFERENCE AND THE HOME COMPUTER.

  Bill Krause, ANARC. Home computers will cause interference on your DX rig unless precaution are taken; solutions are discussed. (2)
- M5 UNRESTRICTED RADIATION. G.P. Nelson. Discussion of carrier current stations and how to hear them. (3)
- M6 RF POLLUTION. G. Hauser. General discussion of the radio interference problem and steps necessary to control it. (2)
- M7 PATTERNS, PARTS I, IIA, IIB. P. Hart. These articles explain in detail what patterns mean and understanding their relationship to DX'ing! (34)
- M9 MORE ON HOW DIRECTIONAL ANTENNA
  PATTERNS ARE PRODUCED. Wes Boyd.
  Supplementary information to the articles contained in the 1980 edition of the NRC Night Pattern Book. (1)
- M10 SUPERMODULATION AND EFFECTS ON DX'ING. Steve Kennedy. Discussion on the problem and its affect on DX'ing. (3)
- M11 TERRAIN CHARTS FOR PROPAGATION PREDICATIONS. M. Connelly. This article details how to prepare a chart of a DX'ers surrounding terrain which can help enhance or diminish reception. (3)
- M12 NOISE LEVELS AND USABLE RECEIVER SENSITIVITY. C. Hutton. Technical discussion of the effect of noise on receiver sensitivity. (5)
- M13 GREAT CIRCLE CALCULATIONS REVISITED. Mike Tuggle, with an addendum by R.N. Allen. An

- explanation, how to figure distance and direction of stations mathematically, with a computer program to figure the Great Circle paths. (4)
- M17 SOME THOUGHTS ON INTERFERENCE. Skip Arey.
  A simple modification to eliminate noise from light dimmers.(1)
- M18 MANMADE INTERFERENCE ON THE BCB. Dallas
  Lankford. A systematic approach for evaluating a
  current or future DX'ing location in terms of manmade noise levels. (3)
- M20 THE LOG BOOK. John J. Rieger. Organizing your log book. (3)
- M23 WBBM RADIO: YESTERDAY AND TODAY. Chuck Schaden. A book review (1)
- M25 MUSIC IN THE AIR, by Philip K. Eberly. Reviewed by Armand DiFilippo. (1)
- M30 THE GOLDEN AGE OF DX'ING. John Clements.
  Were the years 1969 thru 1975 the Golden Age of DX'ing? You decide. (4)
- M31 ALL ABOUT WAVELENGTH. John D. Bowker. Wavelength versus frequency. An explanation. (2)
- M32 STANDARDS TIME AND FREQUENCY. via Pete Kemp. Time and frequency stations located on longwave. List by frequency. (3)
- M33 AM RADIO IN HIGH FIDELITY. John D. Bowker. Find out the reason why AM sounds so bad and what can be done to fix it. (1)
- M34 MYSTIQUE OF THE THREE-LETTER CALL. Thomas White, via CompuServe, via Pete Kemp. The historic roll call and current status. (12)
- M37 NOISE Some causes and some cures. Wayne Heinen
- M39 FOUR SOFTWARE PIECES FOR MW DX'ers G.
  Kudlemeyer. Review of programs for Macintosh
  computer owners. (6)
- M40 PIONEER BROADCASTING STATIONS IN THE US.
  Thomas White A comprehensive history of U. S. radio including the oldest 127 stations still in operation with starting dates. (12)
- M41 RFI FROM HOUSEHOLD ELECTRONICS by Perry Crabill Jr (2)

#### **PROPAGATION**

- P1 MEDIUM WAVE SIGNAL PATHS, PARTS I, II, III, AND IV. G. P. Nelson. Discusses Great Circle paths, seasonal absorption patterns, auroral effects and the mid-winter anomaly. (29)
- P2 SOLAR CONTROL OF DAWN E-BLANKETING ON THE MW BCB. G. P. Nelson. Explains how the position of the sun controls the fadeout time of TA's and TP's.

  (3)
- P3 EAST-WEST SYMMETRY AND THE FADE-IN PROBLEM. G. P. Nelson. Explains how the sun controls the fade-in times for MW stations. (2)
- P4 SUMMER RECEPTION ON THE BROADCAST BAND.
  G. P. Nelson. First article describing the seasonal patterns in solar terminator location which makes summer MW reception from deep South America and Africa possible. (3)
- P5 METEOROLOGICAL EFFECTS ON MW
  GROUNDWAVE RECEPTION. R. J. Edmunds. Short
  term variations in groundwave propagation at MW

- frequencies and their relationship to weather conditions. (7)
- P6 AURORAL EFFECTS AND THE 1969 TRANS-ATLANTIC LISTENING TEST. G. P. Nelson. A description of how the geo-magnetic and auroral phenomena control TA reception from various stations. An introduction to auroral effects. (5)
- P7 THE AURORA OF NOVEMBER 6-9, 1970. G. P. Nelson. Traces a classic auroral attack from its origin on the sun to its effect on MW reception. (3)
- P8 COMPARATIVE MEASUREMENTS OF GEOMAGNETIC INDICES. R. J. Edmunds. A three-month comparison of A-index measurements as reported by several major observatories as they relate to each other. (3)
- P9 SKYWAVE OR GROUNDWAVE RECEPTION? G. P. Nelson. How to tell whether the signal from a station is arriving via ground wave, skywave, or both. (3)
- P10 A BEGINNER'S GUIDE TO THE IONOSPHERE. Fr.
  Jack Pejza. This article explains the processes which
  change the ionosphere and the effects of these changes
  on radio wave propagation. (10)
- P11 THE LIMITS OF MIDDAY MW DX. G. P. Nelson.
  Comprehensive article describing the factors which
  influence radio wave propagation and reception
  during the late morning and early afternoon hours.
  (16)
- P12 LIMITATION ON THE USE OF THE A-INDEX. G. P. Nelson. An expanation of the A-index as a DX'ers tool.

  (3)
- P13 BCB RECEPTION DURING PERIODS OF HIGH AURORAL ACTIVITY. G. P. Nelson. Describes research into the effects of the aurora on MW propagation. (8)
- P14 SKYLINE BLOCKAGE Fr. Jack Pejza. Mathematical derivation of the formulas needed to calculate the effect which terrain has on signals. (10)
- P15 SKYLINE BLOCKAGE, SOURCES OF UNCERTAINTY. G. P. Nelson. Takes into account the possibility of signal propagation by some less common modes which are subject to blocking by the horizon.

  (9)
- P16 HORIZON BLOCKAGE: CAN FRESNEL DIFFRACTION BE IGNORED? G. P. Nelson. This article shows how signals that should be blocked by the horizon can sometimes be heard. (10)
- P17 TRANSPOLAR DX RECEPTION. R. J. Edmunds. This technical article relates to the trans-polar reception of central and eastern Asiatic stations at sunset in North America. (27)
- P18 OBSERVATIONS OF TRANS-ATLANTIC MW RADIO SIGNALS. C. W. Bailey. The results of a lengthy survey of TA receptions made over a one-year period. (3)
- P19 PROPAGATION AT MW FREQUENCIES. P. Sullivan.
  Discusses some aspects of the factors which control signal reception on the BCB. (6)
- **P20 FACTORS OF MW PROPAGATION.** F. Dinning. Discussion of the nature of MW propagation. (6)
- P21 DOMESTIC PROPAGATION-ANSWERS TO FREQUENTLY ASKED QUESTIONS. R. J. Edmunds. A discussion on some of the propagational factors that affect domestic reception. (1)

- P22 REVIEW OF SOLAR ACTIVITY FOR THE MW DX'ER.
  R. J. Edmunds. An explanation of the Fredericksburg
  A-index as well as its use in the hobby. (2)
- P23 MEDIUM WAVE IONOSPHERIC PROPAGATION
  PLUS THE SEQUEL TO R. Schatz. These articles take
  a different approach to propagation and presents new
  terms and theory. (11)
- P24 TERMINATOR TRANSIT MECHANIX. R. Schatz. Parts
  I, II, III, IV AND IV-A of a series which the author states
  features practical techniques to hear new stations;
  techniques never before available. (33)
- P25 SUNSPOT CYCLE 21 THE PEAK HOW MUCH AND WHEN. O. Oklehen, H. R. REPORT. This article, through careful predictions, shows how the next peak in solar activity will be one of the most severe in recent history: Includes additional comments by R. J. Edmunds. (3)
- P26 ATMOSPHERIC AND GALACTIC NOISE ON THE BCB. Dallas Lankford. A discussion on the amounts of various types of noise, Compared to receiver sensitivity (3)
- P27 ON THE NATURE OF SCIENCE AND THEORIES OF BCB PROPAGATION. Dallas Lankford. Discussion of several theories, concentrating on the controversy concerning the degree of the arrival angle of signals propagated over long distances. (3)
- P28 DXING THE 1984 SOLAR ECLIPSE. Gerry Thomas.

  One DX'er's experiences during this rare DXing opportunity. (3)
- P29 ON OBLIQUE PROPAGATION. Dallas Lankford. Very technical discussion on the theory of oblique incidence nighttime ionosphere at BCB frequencies. (12)
- P30 MEDIUM-WAVE OBLIQUE PROPAGATION ANOTHER VIEW. Randall J. Seaver. Some different
  interpretations are presented on this subject, as well as
  examples of MW propagation analysis using the Knight
  Wave-Hop method. (9)
- P32 REIATIONSHIPS BETWEEN SOLAR ACTIVITY, THE EARTH'S MAGNETIC FIELD, AND MW DXING. Randy Seaver . General characteristics of geophysical phenomena are addressed, in order to understand relationships between the sun, the geomagnetic field, and high-latitude DX. (15)
- P33 SEA GAIN. Randy Seaver A discussion of the propagation phenomena. (11)
- P36 M.F. PROPAGATION: A WAVE-HOP METHOD FOR IONOSPHERIC FIELD STRENGTH PREDICTION. P. Knight. A method for calculating the strength of medium-wave frequency sky-wave signals at night. (9)
- P37 BEAMIAC-A -DELUXE+ GREAT CIRCLE BEARING DISTANCE COMPUTER PROGRAM. Mark Connelly. A "basic" computer program. (6)
- P38 THE EFFECTS OF WEATHER ON THE IONOSPHERE. Jack Woods. A discussion on weather and MW propagation. (2)
- P39 GROUND WAVE, SKY WAVE. John D. Bowker. A simple explanation of these term. (1)
- P40 TRACKING THE 1994 SOLAR ECLIPSE BY RADIO by Ken Chatterton (3)

#### RECEIVING EQUIPMENT AND TECHNIQUES

- Some articles previously in this section are available in The Challenging Crystal Set
- R1 SPURIOUS SIGNALS and SPURIOUS SIGNALS REVISITED. R. J. Edmunds and G. P. Nelson. Many DX'ers hear stations on frequencies where they don't belong. Article describes causes and cures of spurious MW signals. (10)
- R2 SINGLE SIDEBAND RECEPTION ON THE BCB WITH MECHANICAL FILTERS. G. P. Nelson. Few commercial receivers covering the MW band have adequate selectivity to cope with MW interference-particularly in the presence of powerful local stations. Explains how to add mechanical filters to an existing receiver for the ultimate in adjacent channel rejection. (21)
- R3 SUBAUDIBLE HETERODYNES ON THE MW BCB. G.
  P. Nelson. Details on a technique to permit the MW DX'er to detect and characterize signals too weak to hear at the time; allows the DX'er to count the number of stations on a channel even if no programming is audible and permits direction-finding on channels with several stations present. (6)
- R5 THE TRACKING PROBLEM AND HOW TO CURE IT.

  G. P. Nelson and T. Holmes. Many excellent receivers are poorly designed for MW DX operation. This article describes one of the most common design faults and how to cure it. (4)
- R6 ELECTRONIC VERNIER TUNING.R. Moore. Detailed instructions on how to fit a varactor to a MW receiver to provide fine bandspread. (4)
- R9 RECEIVER/ ACCESSORY INTERFACES MADE SIMPLE AND CHEAP. R.J. Edmunds. A discussion of methods of interconnecting DX equipment. (7)
- R10 UP THE CARRIER. W. Bailey. Dig the weak DX out of the mud with this form of exalted carrier reception. (1)
- R11 PRECISION FREQUENCY MEASUREMENT. R. Schatz. How to use the frequency counter. (3)
- R13 SINGLE SIDEBAND RECEIVING ADAPTERS. T. Sundstrom. How to sharpen your receiver's IF bandpass using a BandW 370 receiving adapter. (2)
- R14 REVIEW OF THE AUTEK Q-BOX. T. Sundstrom.

  Describes the uses of this noise filtering device and its applications in MWDX. (3)
- R17 BUILD YOUR OWN AUDIO FILTERS. P. Sullivan, A technical theory and construction article on inexpensive homebrew audio filters. (7)
- R19 A BRIEF REVIEW OF THE AUTEK QF-1 AUDIO FILTER. C. Hutton. A non-technical review of this noise and interference filter. (2)
- R20 A FREQUENCY COUNTER FOR RECEIVER TUNING. R. Foxworth. A very thorough paper on digital readouts and what to look for in various models. Discusses technical theory and provides circuitry to enable the experimenter to build a counter for use as a "digital dial". (13)
- R22 THE LYNODYNE CRYSTAL WIRELESS RECEIVER.
  R.W. Tuggle. The concepts of vintage crystal radio are incorporated in these construction plans for a simple receiver, offered as a sporting alternative to modern receivers; yet it has the potential for real DX. (4)

- R23 DIVERSITY RECEPTION. C. Hutton. Using more than one antenna and receiver in an effort to reduce fading and interference on one frequency. (1)
- R24 TIPS ON REMOTE TAPING. R. J. Edmunds. This article explains several methods you can use to turn your receiver and recorder on while you are otherwise occupied. (2)
- R25 STRONG SIGNAL HANDLING. C. Hutton. This technical article explains that sensitivity and selectivity are not the only, nor the most important, considerations in a receiver. (6)
- R26 RECORDING JACKS FOR RECEIVERS. Dave
  Arbogast. A simple step-by-step procedure is outlined for adding a tape jack to almost any receiver. (1)
- R27 TAPE RECORDING HINTS. Mark Connelly. A complete method of radio-to-tape interfacing for portable radios is detailed, complete with schematics and parts lists for construction. (4)
- R28 CONVERTING THE R-390A POWER SUPPLY TO SOLID STATE. Charles Taylor. A conversion process to change the older high-voltage tubes to solid-state diodes is described step-by-step. (7)
- R29 R-390A ALIGNMENT CHART. Charles Taylor. A step-by-step procedure for aligning the R-390A. (5)
- R30 MCKAY-DYMEK DP-40 PRESELECTOR. R. Foxworth.

  A non-technical description of this useful filter accessory plus some modifications to improve its performance. (2)
- R31 THE SUPER HQ-180. Dallas Lankford, Add a Collins mechanical filter to your "180". While not a "how-to" article, problems and results are discussed. (4)
- R32 HQ-180A ALIGNMENT WITHOUT A 60 KHZ SOURCE. Dallas Iankford. Although most RF signal generators do not tune below 100 KHz., the HQ-180A's 60 KHz IF can be aligned with a 455 KHz RF source. (4)
- R33 R-390A/URR PTO ALIGNMENT. Dallas Lankford. The alignment procedure to achieve exact end-point alignment in the R-390A PTO tuning is detailed. See R34, (3)
- R34 INSIDE THE R390A PTO. Dallas Iankford. An indepth article that explores the PTO tuning in the R-390A and shows how to improve its performance up to specifications. See R33. (4)
- R35 THE R-390A ON LONGWAVE. Craig Healy. A simple and inexpensive method to modify the R-390A effective amplifier for loops to tune below 500 KHz. (2)
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- R37 THE GENERIC HQ-180 IFALIGNMENT. William Marvin. A non-technical procedure that requires no test equipment. (4)
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## Geomagnetic Phil Bytheway bytheway@ATK.com Summary

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Seattle, WA 98117-2334

High "A" values indicate possible auroral conditions 

		AND PROPERTY.						
Geomagnetic Summary September 6 1995 through October 3 1995								
<u>Date</u>	<u> PLUX</u>	A	<u>K</u>	SA	GEO	OTHER		
9/ 6	72	27	5	very low	quiet-mis	<u> </u>		
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18 19	72	1	1	very low	quiet	-		
	74	2	1	very low	quiet	-		
20 21	76	7	3	low	quiet	-		
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22	75 75	2	2	very low	quiet	•		
23 24		8	1	very low	quiet-active	-		
24 25	74	8	3	very low	quiet-unsettled	-		
26	74 74	6	1	very low	quiet-unsettled	-		
26 27		5	1	very low	quiet-unsettled	-		
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26 29	73	17	1	very low	quiet-mis	-		
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Foreign DX Catches. Times are UTC; for ELT, subtract 5 hrs. 

This week we feature an in-depth look at TP DX, usually our slimmest feature in IDXD.

A mystery broadcast is being heard by several DXers on 1630 kHz, that may be located in the US

Welcome to new reporter Jerry Osborne, formerly of Ottawa, reporting from his new retirement location in Newfoundland, the province known far and wide as the DXing Riviera of North America! Welcome as well to Jerry Starr (reporting state #20), no stranger to DX News, but a rarity in IDXD! Now if only we could get Buffalo K. Foonman to report our lives would all be complete! And welcome (back?) to Karl Forth.

#### TRANS-ATLANTIC DX

621 CANARY ISLANDS RNE, OCT 21 2300 - MAny RNE IDs and Canary Islands ID at 2300 after time pips // 855; a powerhouse signal. [Osborne-NF]

774 SPAIN RNE1 synchros OCT 31 0140 - Good, telephone talk in Spanish parallel stronger 855 signal. [Conti-NH]

864 EGYPT Santah OCT 31 0205 - Fair, Koranic chants, definitely parallel a much weaker 12050 kHz shortwave signal. [Conti-NH]

ENGLAND, OCT 23 0047 - Discussion of welfare state, weak signal with heavy QRM from WABI, Bangor. [Osborne-NF]

1512 BELGIUM, OCT 23 2309 - In Dutch with nuch splatter from 1510. [Osborne-NF]

1521 SAUDI ARABIA, OCT 23 0322 - Powerful signal with chanting. [Osborne-NF]

1521 SPAIN SER, OCT 23 2158 - weak signal, // 1539. [Osborne-NF]

In the absence of detailed loggings, we offer this summary of recent TA conditions from Mark Connelly:

"DX has been reasonable over the last couple of nights: very loud Albania-1395 and France-1467 at sunset. Saudi-1521 was already strong at 4:15 PM EST (2115 UTC) on the car radio at the parking lot at work in Lowell. It was creaming the WWKB/WGAM/WTHE mix on 1520. Night stuff: Spain//Canaries-1098, Spain-1107, Croatia-1134, Spain-1134, Spain-1161, Spain//Canaries-1179, possible Hungary-1188, UK-1215, UK-1197, Libya-1251, Norway-1314, Spain-1584, Spain- 1575, Sweden-1179 (mowing down WHAM at 0453 UTC), UK/Albania-1089, Denmark- 1062, UK-1053, Spain-999, Algeria-981 (through semi-local WCAP!), Spain-855, Algeria-891 (killing WBPS/WLS), UK-909, UK-882, Spain-756, Switzerland-765, Spain-774, Spain-738, Morocco-612, Spain-558, and Vatican-1530. Nothing rare here; certainly a beach roadtrip would get much more. It's still good to hear some TA DX rolling in." [Connelly-MA]



#### **PAN-AMERICAN DX**

535 GRENADA, OCT 22 0359 - Sign-off with fair signal. [Osborne-NF]

535 TURKS & CAICOS RVC - By the way; the pest on 532 is gone. To 535, actually, with all the modulation in the upper sideband. They use the Kahn Powerside device (like WQEW-1560, which does LSB), which I mentioned once on the internet and which was confirmed by their Chief Engineer. The modulation is actually SSB with without the suppressed carrier. [Stutterheim-NY]

690 unID/jammer OCT 31 0050 - Noted strong buzzing interfering with CBF- Montreal while listening to Quebec referendum reports. This was IDed last season as a defective Cuban

transmitter. Still defective, or intentional? [Conti-NH]

740 UNID, OCT 14 0411 - Fair/good with "Nicaragua de Noche" mentioned several times, then Michael Jackson's "Beat It" used as a music theme. Faded out, but later heard ranchera music here at 0458. [Forth-IL]

765 UNID - never see this station mentioned but has been here for years. AN except off Sunday mornings. Even heard back in Massachusetts. Good signal here but haven't spent much time IDing it. Bearing indicates Guatemala or northern El Salvador or Honduras. [Moore-

FL].

770 COLOMBIA RCN, OCT 23 0036 - Strong signal, with many IDs. [Osborne-NF]

800 MEXICO XEROK Cd. Juárez, SEP 3 1140-1207 - LA pop music, Program Comancho, ID as "Radio Quinto", poor. [Trelford\*CO]

810 PUERTO RICO WKVM San Juan, SEP 28 0939-1050 - Religious talk and music, interference from HICY, poor. [Trelford-JAM]

810 COLOMBIA HJCY Bogotá, SEP 28 0945-0950 - Talk and news, singing ID "Caracol", WKVM interference, fair. [Trelford-JAM]

820 VENEZUELA, YVXG R. Guadalupana, Coro, OCT 22 0130 - Strong. [Osborne-NF] OCT 22 0352 - Sign-off announcement with ID, including calls, anthem, atop WNYC, another SS station, very good. [Yocis-CT]

830 ST. KITTS TBN, OCT 23 0059 - TBN ID, religious programs, good signal. [Osborne-NF]

839 CUBA CMBQ La Fe, Isla de la Juventud - Believed the Radio Enciclopedia station heard throughout the day on this frequency. Popular instrumental and light classical music with short announcements between selections. [Moore-FL]

840 ST. LUCIA R. Caribbean International, OCT 21 2231 - Weather and info on tropical storm Sebastian, ID at 2231, strong. [Osborne-NF]

860 VENEZUELA, YVYE R. Enlace 860, Valle de la Pascua, OCT 22 2249 - Talk by man, many mentions of Valle de la Pascua, fair under another SS station. [Yocis-CT]

860 DOMINICAN REPUBLIC R.Clarín, Sto Domingo OCT 31 0300 - Fair, ballads and tropical music, nice top-of-the-hour jingle ID. [Conti-NH]

890 COLOMBIA HJPM Santa Marta, SEP 26 0642-0650 - LA pop music, ID as "Radio Galena, Santa Marta", fair until WLS took over and they were drowned out. [Trelford-JAM] (That's "R. Galeón" - Jim)

900 BARBADOS, CBC R. 900, Bridgetown, OCT 22 2232 - Very good at times with lightly accented EE, cricket scores, other sports news, jingle IDs 2243, CHML, CKTS knocked out by aurora. [Yocis-CT]

910 VENEZUELA, YVRQ, Caracas, OCT 22 2319 - "RQ-910" jingle, SS music, fair- good with domestics. [Yocis-CT]

930 MEXICO XEJ Cd. Juárez, SEP 2 0628-0636 - LA pop music, ID as "La Mexicana", fair. [Trelford\*CO]

950 CUBA, CMHI R. Reloj, Sancti Spiritus, OCT 22 0405 - Usual pips, man and woman with news, poor in WPEN null. Listed 1 kW. [Yocis-CT]

1130 MEXICO unID, OCT 21 0109 - Fairly consistent signal but under WISN with "La Mexicana" ID and vocal music, heard for next 30 minutes or so but no other ID heard. [Forth-IL]

1160 BERMUDA VSB-3, NOV 3 0622-0702 - BBC world service mostly buried in domestic mess, but occasionally rose up to definite // 5975 kHz. This is country #50 heard here! The R-8 nicely separated this from WHAM-1180 slop. [Renfrew-NY]

1162 UNID, OCT 6 0105 - LA SS station noted with "Radio Tiempo" ID. WRTH lists HRGF here which fits my DF bearing, but slogan doesn't match. [Moore-FL]

1320 ARUBA P4A10 Oranjstad, OCT 5 0409-0430 - Old instrumental pop music, woman announcer in DD or Papiamento, music audio good but not voice, fair. [Trelford-JAM]

1480 PUERTO RICO, OCT 21 2213 - Many IDs as "Sonido 14-80", strong. [Osborne-NF]

1500 MEXICO XEAI Mexico City, OCT 8 0151-0208 - LA pop music, ID in part as "XEAI" very clearly, poor over/under WTOP. [Trelford-JAM]

1560 MEXICO XEFAJ Mexico City, OCT 28 1055 - With "Radio Consentida" ID. [Moore-FL]

1630/1645/1660 UNID, OCT 30 0417 - on the NRD-535 with EE gospel and piano/organ evangelical music past bottom of hour, fair. Briefly fired up the HQ-180A and Scotka loop, seemed on a Eastern Seaboard path. US, or LAm site? [Terry L. Krueger] NOV 1 0400 - US religious broadcast, fadey, IDing as "AM- 1630", signed off or faded out at 0400. [Starr-OH] (Jerry, I left your letter at work, I hope I got the details right here - Jim) Decided to call WGOD in the Virgin Islands, who have an application for the expanded band. Their engineer, a very friendly guy, says it's not them, he thinks their application is for 1620 kHz. In fact, their AM, 1090, has been off since the hurricane, and the FM, 10kW on 97.9, is barely on. He says they lost their FM tower, got back on with their exciter only (a puny 50 watts), but now they're using a one-bay antenna on top of a utility pole! He says he heard a rumor the Caribbean Beacon may have put a second xmtr on 1630, so now they're a possibility. Although Terry says this loops NE or SW, I doubt it is the AM in Mims, FL. While I THINK they have an application for 1630, my references say they are secular format, ruling them out. The mystery continues! [David Sharp via DXSF e-mail] Per Jerry Starr tip, had 1660 coming in pretty well tonight also, starting at 0015-0018\*, again 0033 t/in to 0034\*, and thus throughout the evening, on randomly for a couple of songs then would pull the plug midsong, with-out ever IDing. Mostly dirge-like 70's M vocals, probably from sat feed of

some sort. Does anyone have a copy of the FCC bandplan (think it was in NRC or something a few months back)? Re. 1630, it's DEFINITELY not Anguilla, the ID was clear except for the one letter. [David Crawford via DXSF e-mail] Was about to pull the plug at 0410 and did one last EMW bandscan, was surprised to stumble upon a station booming in on 1645.00 KHz, danceable alternative music format. Male dj unreadable but definite mention of "The Shovel Dogs", presumably name of the group. 0415 cart giving P.O. Box 40554, Washington, DC --010 as maildrop, but still no ID readable, more music. 0422 music stopped & went into demented laughter IS repeated for about a minute, then gone 0423. Mostly fair level with occasional good peaks, good audio, but QRN troubles. Any suggestions? 1630 on now also, though data burster giving it a lot of problems now. [David Crawford via DXSF e-mail] (The 1645 item seems like nothing more than a domestic pirate, who are often active around Halloween, David mentions an ID missing one letter, but what were the other letters? Jerry, sometimes pirates mock religious broadcasters, perhaps you heard one of them? I did hear rock music on 1660 this past week, but many think this may be WJDM testing. Keep an eye on these frequencies! - Jim)

#### TRANS-PACIFIC DX

234 RUSSIA Arman FE, OCT 27 1247 - Poor with man speaking RR, classical music // 279.
[Woods-OR]

279 RUSSIA Yuzhno-Sakalinsk FE, OCT 27 1250 - Fair signal with man speaking RR // 234. [Woods-OR]

550 HAWAII KMVI Wailuku, OCT 23 0819 - Fair to good with Hispanic music. [Woods-OR]

620 HAWAII KIPA Hilo, OCT 27 1255-1300 - Fair with NOS, ID on the hour, into news. [Woods-OR]

729 UNID Let me add yet another possible TP: This morning (NOV 3) at 1025 I was getting a strong het on 729; there was also just a hint of one on 738; I followed 729 until 1050UTC by which time it had deteriorated seriously. Snippets of music and talk by man, but unable to ID language. Will try again tomorrow. [Stutterheim-NY]

738 TAHITI/AUSTRALIA Papeete and 2NA Grafton, assumed ones here daily. Sometimes only one station, other times a pronounced 1.5 Hz SAH. OCT 22 1131- 1136 - man then music with a female vocalist. OCT 25 1124-1136 - man talking, 1137 music. Bearing 245 degrees which fits both stations. The Tahiti shortwave outlets have not been audible here. [Moore-FI.]

774 AUSTRALIA 3LO Melbourne assumed one here almost daily with world and national news at 1100. Programming before and after the news is usually a sporting event or a telephone callin show. No ID heard but definite OZ accent and DF bearings consistently 240 degrees, right on for Melbourne. Earlier on OCT 8 taped male announced saying "from Melbourne, Australia" but did not get context. Always seems to be in deep fade at top of hour when they have a brief musical interlude and announcement. [Moore-FL]

774 AUSTRALIA 3LO Melbourne assumed one here almost daily with world and national news at 1100. Programming before and after the news is usually a sporting event or a telephone callin show. No ID heard but definite OZ accent and DF bearings consistently 240 degrees, right on for Melbourne. Earlier on OCT 8 taped male announced saying "from Melbourne, Australia" but did not get context. Always seems to be in deep fade at top of hour when they have a brief musical interlude and announcement. [Moore-FL]

828 JAPAN JOBB Osaka, OCT 22 1302 - wiping out 830 domestics with JJ talk by man. [Helms-CA]

846 Possible JAMMING, OCT 22 1306, OCT 26 1248 - muddled sound like an airplane propeller noted. I also caught this last season, but have seen no other reports of this. Several China and Taiwan stations are listed here, so maybe a PRC jammer? [Helms-CA]

846 KIRIBATI, OCT 30 1112-1134 - Assumed station here with weak audio with voices and music. Four bearings averaged 278 degrees. On other occasions (JUN 28 and SEP 26) bearings have been 249 degrees (2RN Canberra). Often both stations come in and produce a 3-4 Hz SAH. [Moore-FL]

850 HAWAII KHLO Hilo, OCT 24 1048 - Fair with ID "AM 850 KHLO", into C&W. [Woods-OR]

873 ASIATIC RUSSIA, OCT 22 1337 - Symphonic music, announcement by man in RR 1340; good signal. [Helms-CA]

963 ASIATIC RUSSIA, OCT 22 1324 - Talk in RR by man, again heard 1240 on 10/26. Signals much weaker than 873 outlet. [Helms-CA]

972 SOUTH KOREA HLCA, Kimje, OCT 22 1315 - good level with male and female announcers in KK, into choral music. [Helms-CA]

1053 NORTH KOREA, OCT 26 1237 - This jammer has been the most reliable TP so far; stronger than 1050 domestics. [Helms-CA] 1098 MARSHALL ISLANDS WSZO Majuro assumed OCT 28 1111-1131, OCT 29 1121-1133 with heavy beat bass stringed instrument, sometimes with soft-voiced female vocal. Also noted OCT 9 with woman talking softly, possibly in EE. Heard almost daily at threshold level. Easily recognized with DF loop as is 40 degrees north of usual TP signals. The average of 16 DF bearings over the past two months is 284 degrees, exactly on for Majuro. A second station bearing 235 degrees (New Zealand) sometimes causes a 1.5 Hz SAH but has never produced audio. [Moore-FL]

1575 UNID TP, the strange station which I heard last season (suspected Thailand) reappeared last month as a weak carrier. Best yet on OCT 26 1128- 1132 with strong carrier. As last year, no null obtainable. Last season got weak audio on NOV 26 and FEB 10. Have high hopes for this winter. A new Australian is scheduled to come on here, but should be easily recognized with DF. [Moore-FL]

Harry speaks: "October was pretty much a loss until this past week. Am very frustrated by 891, where the megawatt Thai is; a powerful het almost every morning but no audio yet!"

#### STATION NEWS

BELIZE: Gaines Johnson is the VOA Relay Station Manager at Punta Gorda, Belize, Central America. He recently posted a message on The Fido Shortwave Echo which I've edited for length, and reproduced below. The VOA is the only mediumwave broadcaster in Belize, which curtailed its mediumwave (and shortwave) operations a number of years ago. This information about the VOA's attempt to expand its operating hours will be of interest to mediumwave DXers: 'The Voice Of America operates two (2) 100,000 watt AM transmitters on 1580 Khz and 1530 Khz from a relay station at Punta Gorda, Belize, Central America. They operate into a pair of one of a kind, eight-element, horizontal directional arrays, producing an ERP of 1.5 megawatts, each. Nighttime signals be heard in Honduras, Guatemala, Nicaragua, El Salvador, portions of Costa Rica and the Yucatan of Mexico. covering an area with a population of about 21,000,000. The Belize station has been operating since 1986, broadcasting VOA Spanish and English language programs across Central America. It was almost closed in 1994 because of dwindling U.S. Government funding, but because of its strategic importance for reaching Central America, VOA management decided to try a privatization approach to save it. I was one of the charter engineers that opened this station and, because of my prior commercial broadcasting experience, I was sent back to Belize to manage and convert the station into a more costeffective and innovative operation (no good deed goes unpunished in Government). For the past year and a half I have been negotiating with the Government of Belize and VOA management in Washington to partially commercialize this facility. Finally, on October 5th, the Government of Belize signed an amendment to the Voice Of America's operating agreement which now authorizes the VOA Relay to begin leasing time to third-party broadcasters, on a fee/barter basis. The VOA station now broadcasts nightly from 0100 -0400 UTC, only, thus the hours between 0400 to 1200 utc each night will now become available for leasing (on an hourly basis) by qualified interested broadcasters (Commercial, Governmental, Private) who may desire to transmit their programming on the AM band into a large chunk of Central America." [via Werner Funkenhauser]

#### **CONTRIBUTORS**

@Bruce Conti, Nashua, NH; Lowe HF-225 Europa, MWDX-5, 30-m wire, 30-m east sloper. Karl Forth, Chicago IL; Drake R8, Icom IC-R70, Hammarlund HQ-160, spiral loop, LW.

@Harry Helms, AA6FW, San Diego CA; Drake R8, two-foot Sanserino loop.

@Terry Krueger, DX South Florida, NRD-535, HQ-180A, Skotka Loop.

Raymond Moore, Key Largo FL; R8, R1000, RSM 105 loop.

Jerry Osborne VO1GO, Elliot's Cove NF; Icom R-71A, Kenwood TS-140S, 134 dipole. (125 miles west of St. John's)

Jim Renfrew, Rochester NY; Drake R-8, SM-1 ferrite loop, Alpha Delta Sloper.

Jerry Starr, Youngstown OH.

Don Trelford, St. Anns Bay, JAMAICA. Also two loggings from Colorado during the NRC Convention, as the furthest attendee!

Jack Woods, Waldport OR; Lowe Europa, ALN-1 Outdoor Loop, 75' wire, NPM-1 Phaser.

@David Yocis, Norwalk CT; R71A, Kiwa loop [73564.203@compuserve.com]

#### DANGERFIELD ABROAD

Here's my bandscan from the southern end of the Isle of Man which is in the Irish Sea, west of England's lake country, south of Scotland, east of North Ireland, and north of Wales. Man is largely

independent, having its own money, stamps, and local laws, but still under the Queen. It was settled by the Vikings. Under my rating system, D indicates midday daytime reception. D-1 is local quality. D-2 is semi-local. D-3 is good. D-4 is fair. D-5 is barely readable.

162 FRANCE Allouis, D-4

183 GERMANY Saarlouis, Radio Europe in FF, D-3

198 ENGLAND/SCOTLAND Droitwich & Westerglen, D-2

234 LUXEMBOURG Junglinster, D-4

252 IRELAND Clarkestown, Atlantic 252, D-1

567 IRELAND Tullamore, Radio 1, D-1

585 SCOTLAND Dumfries, BBC Solway, D-3 603 ENGLAND Newcastle-on-Tyne, Radio 4, D-4

612 IRELAND Athlone, Radio 2, D-2

657 WALES northern part, same programs as 882, D-4

675 HOLLAND Lopik, D-5

693 ENGLAND Barrow & synch UK, Radio 5, D-2

720 NORTH IRELAND Lisnagarvey, Radio 4, D-2

747 HOLAND Flevoland, D-5

756 ENGLAND Carlisle, Radio Cumbria, BBC local, D-3

774 ENGLAND Leeds, BBC local, D-4

810 SCOTLAND Westerglen, BBC Radio Scotland, D-3

837 ENGLAND Barrow, Radio Cumbria, BBC local, D-2

855 ENGLAND Lancaster, Radio Lancashire BBC local, D-2

882 WALES Penmon & synch, BBC Radio Wales, D-2

909 NORTH IRELAND Lisnagarvey & synch UK, Radio 5, D-1

990 WALES Tywyn, Radio 5, D-4

999 ENGLAND Preston, Red Rose Gold, D-3

1026 NORTH IRELAND Belfast, Down Town Radio, D-3

1035 SCOTLAND Ayr, West Sound Radio, D-4

1053 ENGLAND Barrow & synch. Talk Radio UK, D-3

1089 NORTH IRELAND Lisnagarvey & synch Talk Radio UK, D-1

1107 ENGLAND Wallasy, Talk Radio UK, D-2

1152 SCOTLAND Glasgow, Clyde 2, D-4

1170 ENGLAND Stoke-on-Trent, Signal Gold, D-4

1197 ENGLAND Wallasey, Virgin Radio D-3

1215 NORTH IRELAND Lisnagarvey & synch UK, D-2

1260 WALES Wrexham, Marcher Gold, D-4

1278 IRELAND Dublin, Radio 2, D-2

1296 ENGLAND Birmingham, XL Radio-ethnic-, D-4

1314 NORWAY Kvitsoy, D-5. This one was a daytime semi-local at Edinburgh and Newcastle.

1341 NORTH IRELAND Lisnagaarvey, BBC Radio Ulster, D-1

1368 ISLE OF MAN Foxdale, Manx Radio, D-1

1458 ENGLAND Manchester or Carlisle, D-4

1485 ENGLAND Liverpool, Radio Merseyside, D-2

1503 ENGLAND Stoke-on-Trent, BBC local, D-4

1548 ENGLAND Liverpool, Radio City Gold, D-3

1557 ENGLAND Lancaster, BBC local, D-2

Well, that's how it looked over there. Let me know if any questions.

Ben Dangerfield, Wallingford, Pa. HQ-180, KIWA loop

#### MacHARG'S PATAGONIAN TRAVEL NOTES

Here is some band-scan/DX from our recent trip through the southern cone of South America. All on a small, portable Sangean SG-787 analog model radio. All times local time. (Ken is on the staff of HCJB, Quito, ECUADOR)

HEARD ON A BUS BETWEEN Buenos Aires and Rosario, Argentina:

590 Radio Continental, Buenos Aires, SEP 28, 10:00 a.m. Talk on street children, news.

630 630 Radio Rivadavia, Buenos Aires, OCT 28, 10:00 a.m., news.

710 Radio Municipal, Buenos Aires, SEP 28, 10:40 a.m. Music, weather, promos.

790 Radio Mitre, Buenos Aires, SEP 28, 10:40 a.m. phone in on taxes.



870 Radio Nacional, Buenos Aires, SEP 28, 10:25 a.m., music, talk.

910 La Red, Buenos Aires, SEP 28, 10:30 a.m., news, advertisements.

990 Radio Splendid, Buenos Aires, SEP 28, 10:21 a.m., phone talk with experts (we saw the tower of this one in the B.A. suburb of Quilmes. Had a nice sign out front identifying the station. I wish more stations had that kind of sign.)

1030 Radio Del Plata, Buenos Aires, SEP 28, 10:20 a.m., talk.

1070, Radio El Mundo, Buenos Aires, SEP 28, 10:10 a.m., promo, talk.

1110 Radio Argentina, Buenos Aires, SEP 28, 10:10 a.m., Christian format--preaching.

1190 Radio America, Buenos Aires, SEP 28, 10:05 a.m., news.

1410 Radio Folklorico, Buenos Aires, SEP 28, 10:00 a.m., news, weather, ID.

1500 AM 1500, Radio El Sol, Buenos Aires, SEP 28, 10:00 a.m. news, commercials, music. 1590 Radio Real, Colonia, Uruguay, SEP 28, 9:00 a.m., music.

1600 Radio Ciudad Alumine (tentative ID), Buenos Aires, SEP 28, 10:00 a.m., ID, Music of Latin America and Buenos Aires.

#### HEARD in Puerto Iguazu, Argentina:

820 Radio Cultura, Foz do Iguacu, Brazil, SEP 9, 9:10 p.m., music. 1350 Radio Buenos Aires, SEP 9, 9:00 p.m., music, ID.



Aquí y en todas partes...

HEARD in Calafate, Argentina:

730 Radio Lago Argentina, Calafate, SEP 26, 7 p.m. news.

HEARD in Ushuaia, Argentina (southern most city in the world):

550 Falkland Islands Broadcasting Stations, 9:23, 8:00 p.m., rock program from British Forces Broadcasting Service (heard well, but with fading, every night, also heard in Calafate.) (Ken, we were joking that since we didn't hear it in Newfoundland, it must be off the air! - Jim)

780 Radio Nacional, Ushuaia, SEP 23, 7:30 a.m. Panorama Nacional (I stopped by to visit this station, but they were recovering from a maration 24 hour election return broadcast. They have promised to send me some material, but I haven't received it yet.)

HEARD on bus near Rio Gallegos, Argentina:

680 Radio Rio Gallegos, Rio Gallegos, SEP 27, 10:10 a.m., commercials.

830 Radio Provincia de Santa Cruz, SEP 27, 10:10 a.m., phone-in on economics.

HEARD in hotel room in Rosario, Argentina:

540 Radio Nacional, Santa Fe, SEP 28, 8:25, classical music.

560 Radio Nacional, Esquel, SEP 28, 8:26, classical music.

680 Radio Cereales, Rosario, SEP 28, 8:18 p.m., commercials, music.

830 Radio Rosario, Rosario, SEP 28, 8:21 p.m., phone in on soccer.

1230 Radio Gral San Martin, Rosario, SEP 28, 8:23, talk on sports.

1300 Radio Nacional, Rosario, SEP 28, 8:24, classical music.

HEARD in a hotel room in Cordoba, Argentina:

580 Universidad, Cordoba, SEP 29, 2:55 p.m., music, phone-in, etc.

670 Radio Mar del Plata, Mar del Plata, SEP 30, 7:58 p.m., sports results.

700 Radio Cordoba, Cordoba, 9:29, 7:45 p.m. tango music.

750 Radio Nacional, Cordoba, SEP 29, 2:56-3:00 p.m. music, news, etc., (We saw this transmitter site, very unique antennas perhaps for receiving the signal?)

780 Radio Liberdador, Mendoza, SEP 30, 8 p.m., talk show.

970 Radio General Paz, Cordoba, SEP 29, 9:40 p.m. fútbol (we also passed by this transmitter site).

HEARD ON BUS between Rosario and Cordoba, Argentina:

1450 Radio Villa Maria, Villa Maria, SEP 29, 1:58 p.m., music, news, etc.

HEARD on bus between Cordoba and Santa Fe, Argentina:

800 Radio Mocovi, Charata, OCT 2, 4:25-4:35, show tunes, music.

1020 AM Universidad, Santa Fe, OCT 2, 4:25 p.m., music, advertisements, etc. news at 4:30.

1440 Radio San Francisco, San Francisco, OCT 2, 3:00, news, etc. Passed by transmitter site.

HEARD in Asunción, Paraguay: 680 Radio Caritas, Asunción, OCT 3, 2:40 p.m. Human Rights Discussion.

730 Radio Cardinal, Asunción, OCT 3, 2:42 p.m., discussion on military.

780 Radio Primer de Marzo, Asunción, OCT 3, 2:43 p.m., talk, promo, ads, discussion of NGO's. 860 La Voz de Cordillera, Caacupe, OCT 3, 3:00 p.m., talk, ID.

890 Radio 3 de Febrero, Asunción, OCT 3, 2:50 p.m. discussion on voting.

920 Radio Nacional de Paraguay, Asunción, OCT 3, 2:51 p.m., music.

970 Radio Comuneros, Asunción, OCT 3, 2:51 p.m., birthdays.

1020 Radio Nanduti, Asunción, OCT 3, 3:07 p.m., talk.

1120 Radio Nuevo Mundo, San Lorenzo, OCT 3, 3:08, music.

1250 Radio Asunción, Asunción, OCT 3, 3:10, Christian music.



Reception reports are off to all of these, now we'll see how the cards and letters come in.

## Piracy on the Waves And Not Walking the Plank ... by John D. Bowker

#### Part II

Recap (If you did not read Part I, here is what you missed): Piracy on the radio waves is okay if you do not get caught. The purpose of this series is to keep you from getting caught! And now, Part II.

There are people out there who were born to make your life miserable. This also means that if you increase the coverage area of a pirate station enough, you are bound to reach at least one person who will turn you in. I know first hand. The FCC exchanged all my first equipment for a copy of their rules. Dang.

Had I known about the FCC's Rules that permit low-power broadcasting, I would have been okay. College campuses use these AM "carrier current" stations to cover their rather extensive campus areas. Ball parks use them for internal communications. Commercial equipment is available for this purpose, but it is no real trick to build your own transmitter if you are so inclined.

I want to tell you now about the FCC Rule that most people use for broadcasting on the AM dial without a license. You can probably find this rule in any medium-sized public library, or at colleges that have a law school. Ask the librarian for the Government publication CFR 47, Part 15. You'll find that it is a paper-back book containing FCC Rules from Part 0 to Part 19.

In Rule Part 15, find Section 221. It tells what you are permitted to do with no license. The reason they let you operate at all is because they limit just how far your radio signal is permitted to travel out into space. The Rule specifies a highly technical signal strength limit (15 uV/M maximum at 47,715 Meters divided by the frequency in kHz).

Here is how to use that rule: A reasonably good car radio will just about barely pick up an AM radio signal of 15 microvolts-permeter, so we can use a car radio as a rough check our maximum allowed signal strength. So far, so good.

That formula means that if you select a dial position for your pirate station of 540 kHz, for example, your Part 15 signal can reach out 290 feet. Not bad! At a higher dial setting, say 900 kHz, your range is still 174 feet. You can see, though, that going above 900 kHz results in a rather short range.

Now you may think those ranges are far too little to reach more than next door! Wrong again! The range must be measured from the transmitting antenna. Eureka! If you use the electric power line for your antenna, your signal will clearly reach all the way to the next power company distribution transformer!

If you do it right, this means you could cover an entire apartment house (or at least a substantial part of it) or, from a private home, your station might cover a block or two. If you can connect your transmitter to a long enough wire (I connected mine to a fence that carried it several miles) the FCC will not care provided you keep the power down so the signal is not stronger than they allow once it gets away from the antenna wire. For more details on how to do all this, write me at P.O. Box 1279, Valparaiso, IN 46384. And watch for Part III in this series coming to your DX News real soon!



Archived ... are still available and listed in the "NRC Archived Publications List". If you're interested in older technical articles, computer programs, receiver reviews, bandscans, Publications station profiles, and foreign DX information, order ZAL-1 (40¢ with your next reprint order over \$2.00, 90¢ by itself). From NRC Publications. (NY residents, add sales tax)

### Commission Replaces Current EBS System with a New and Improved Emergency Alert System

Report No. DC-2677 ACTION IN DOCKET CASE November 10, 1994 (FO DOCKETS 91-301/91-171)

#### forwarded by Pete Kemp KZ1Z

Paving the way for an emergency warning system of the 21st century, the FCC today replaced the current Emergency Broadcast System (EBS) with a new Emergency Alert System (EAS). The digital EAS will work with both new and established communications technologies, including satellite, broadcast, and cable, to make the disaster warning system more effective. The new EAS emphasizes speed, reliability, and efficiency. The Commission said the new system will have the ability to alert the public more quickly and reliably than the old EBS and will reduce property damage, injuries, and deaths caused by natural and man-made disasters.

Broadcasters were required to participate in the EBS and will likewise be required to participate in the EAS. In addition, cable operators will be required to participate in the EAS, as mandated by the Cable Act of 1992. The participation of satellite and public service providers will be voluntary.

Major new features of the EAS include: (1) a digital system architecture that will allow broadcast, cable, satellite, and other services to send and receive alerting information; (2) multiple source monitoring for emergency alerts; (3) a shortened (minimum 8 second) alerting tone; (4) automated and remote control operations; (5) a weekly test that is unobtrusive to viewers and listeners, as well as a monthly on-air test; (6) ability to issue alerts in languages other than English; (7) provisions for the hearing and visually impaired; (8) prohibition of the false use of the codes and the alert signal; and (9) a mandated standard protocol for sending messages.

Radio and television broadcasters will be required to replace EBS equipment with EAS equipment by July 1, 1996. The following timetables also apply to broadcasters: (1) existing EBS decoders at broadcast stations must be modified by July 1, 1995 to be capable of decoding a shortened, eight second version of the two-tone alerting signal currently used in the EBS; (2) after July 1, 1995, stations may transmit the shortened two-tone attention signal for not less than eight seconds nor more than 25 seconds; and (3) after July 1, 1997, the two-tone signal must be used only as an audio alert signal to announce either the monthly test or actual emergency message. Class D FM and low power television stations must have decoders according to the timetable used by broadcasters, but are not required to have encoders.

Because the cable industry is new to EAS and may require more time to implement this system, the Commission granted cable systems an additional year to install EAS equipment. Cable systems must comply with the provisions of the new EAS rules by July 1, 1997.

In order to encourage rapid manufacture and deployment of the new EAS equipment, broadcasters and cable systems are authorized to purchase and install the new EAS equipment in advance of the deadlines set forth in the timetables. The Commission will permit early replacement of current technical and operating procedures on a state or local area basis. At that time, new procedures such as weekly unobtrusive tests, the use of a shortened (eight second) twotone signal, and removal of EBS equipment can occur. Authorization for early deployment of EAS can be obtained upon written request to the FCC's EAS office after all broadcast stations in an EAS local area have installed the required EAS equipment, demonstrated representation of cable systems in their state or local emergency communications committee plans, and demonstrated compliance with certain other rules.

The Commission requested additional comment on whether the waiver standards should be extended to small cable systems. The Commission also asked for comment on whether and how certain service providers should participate in the new EAS.

Action by the Commission November 10, 1994, by Report and Order and Further Notice of Proposed Rulemaking (FCC 94-288). Chairman Hundt, Commissioners Quello, Barrett, Ness, and Chong.

#### **Facts About NRC's DX Audio Service**

The DX Audio Service provides the ONLY monthly broadcast news cassette service to the DX community. Available to anyone, anywhere, it is designed to inform the radio listener in a pleasing and informative manner. Many of the announcers on the service are professional broadcasters giving their free time to give the listener the finest service available.

DXAS was started to provide broadcast information, both AM and FM, to the visually-handicapped DX listener. It has evolved into a service which provides useful material to all types of listeners. Many subscribers listen to the tape to and from their place of work while driving. Features include not only news about DX, but also airchecks from radio markets, dialscans, frequency scans, and other items

A one-year subscription is only \$25. Sample 45-minute copy: \$2.00; back issues of DXAS: \$3.

Cassettes are mailed by First Class mail, on or about the 20th of the month. For information, subscriptions, renewals, back and sample copies: write to DX Audio Service - P. O. Box 164 - Mannsville, NY 13661-0164

Station

**Tony Fitzherbert** 356 Jackman Avenue fairfield, CT 06430-1728

A special feature about a unique station

"Seventy Years of Broadcasting Service to Connecticut!".

simply as a new means of publicity. It is a method by which we are able to come into close personal relationship with the public... The hope and constant aim of this station will be to earn the good

"This service has been installed purely and

will, friendship of those who hear us!"

The Leader for News and Information With these broadcast words on February 10, 1925, Walter Cowles, Vice President of Travelers' Insurance signed WTIC - 1080, Hartford, CT. on the air. From this humble beginning, WTIC has established itself as Connecticut's premiere radio station. For the past seven decades, WTIC's story has been intertwined with the history of the Nutmeg State. And WTIC's history mirrors the history, traditions, and growth of broadcasting through the twentieth century. WTIC is a Connecticut

WTIC sprung from an idea by Mr. Cowles in 1924. He proposed that a radio station be sponsored by the Travelers Insurance Company. He was an innovator, having sold America's first auto insurance and flight insurance policies. Radio, he believed, would "Keep the policy holders informed and generate new business". He obtained guidance for building a radio station from the American Radio Relay League. An earlier commercial radio effort in Hartford quickly failed, a commercial station was already on the air in New Haven, 35 miles away, and the University of Connecticut's station was operating at the Storrs Campus, 25 miles north of Hartford.

The U.S. Department of Commerce issued a license to operate Cowles' project, signed by then Secretary of Commerce, Herbert Hoover. Twin 150 foot high towers were built atop the Travelers Insurance Building, on Grove Street, to support WTIC's long wire antenna, and studios were built below. Mr. Cowles hired J. Clayton Randall as Chief Engineer, and Herman Taylor as his assistant. The duo assembled a 500 watt Western Electric transmitter, over which tests were performed on 860 khz, in December 1924. All performing talent for the tests, as would often be the case later, came from the ranks of Travelers employees. The tests included the 50 voice Travelers Choral Club. Hartford learned about the new broadcasting venture from a short front page item 'Travelers' Radio Station Tonight", in the February 10 edition of the Hartford Times.

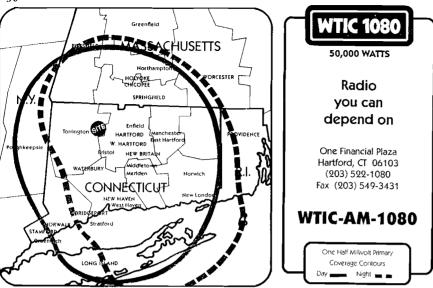
The opening night broadcast lasted until exactly 10:29pm. Chief Engineer Randall assembled a mobile unit - a truck with amplifying gear, which was parked in an alley next to the Hotel Bond, to broadcast the music of the Émil Heimberger Trio, playing in the hotel ballroom, as part of the

WTIC's studios were lavish indeed, appointed with blue drapes, an adjustable microphone on a polished mahogany base in the main studio, and a huge floor lamp, whose tasseled shade obscured another microphone. Folks intimidated by a visible microphone could talk more comfortably into the lampshade. Announcers and musicians routinely dressed in tuxedos, even with no studio audience. Until the advent of recorded music in 1926, all music was performed live. WTIC employed a pianist, a dance band, and the Travelers Symphonic Ensemble. The station did not lack musical talent.

WTIC pioneered remote broadcasting from local hotels, park pavilions, and Yale University. Permanent remote lines ran to several locations, including Woosley and Sprague Halls at Yale, and the Capital Theater in Hartford. WTIC was America's first radio station to air live vaudeville, and among the performers heard over the station were Jack Benny, Pat Rooney, and John Philip Sousa who agreed only to be interviewed. He vowed never to play on radio. In 1926, WTIC became the first station to broadcast to the public from a flying air craft. Connecticut Governor John H. Trumbull was an avid flier, and he and aircraft builder Igor Sikorsky spoke into a shortwave radio above the Connecticut countryside, a conversation relayed over WTIC.

Also in 1926, as its first network venture, WTIC joined with WEAF, New York City, to broadcast the Victor Hour, opera sponsored by the manufacturer of the "Victor Talking Machine". In November, the station joined a nationwide network to carry the inauguration of President Calvin Coolidge. On November 15, WTIC - a charter member of the National Broadcasting Company was one of twenty stations to deliver to America, NBC's very first broadcast.

By 1929, the resoundingly successful WTIC applied for a power increase and purchased new equipment. Permission was received to install the first RCA 50,000 watt transmitter at WTIC's



present transmitter site atop 1000 foot high Talcott Mountain, in the Hartford suburb of Avon. The new transmitter carried WTIC's signal to Canada, Australia, Europe, and New Zealand. Programs from the studios were amplified and sent to the transmitter site, twelve miles away. In 1930, WTIC issued its first advertising rate card. Staffing at the station, now the most powerful in the Northeastern states, had grown to over 100 personnel, including 45 musicians, twelve engineers, several announcers, and a huge support staff.

#### **Bob Steele**

On October 1, 1936, the venerable Bob Steele began his career as a WTIC announcer. He would broadcast over WTIC for exactly 55 years, the longest run ever at a single station for any on air personality in this country. Bob's passion for motorcycles led him into broadcasting, on KGFJ, Los Angeles, where he called to local cycle races. He had auditioned at several West Coast stations, been turned down (their loss!), and had come East looking for work. He auditioned at WTHT (now WPOP), and WDRC, and was again rejected, decisions that would plague both stations for over a half century. He learned that WTIC was looking for an announcer. The station had already screened 13 candidates. He auditioned, and WTIC offered him \$35 a day as a staff announcer, reading commercials and station breaks on a six-month trial basis. Management liked his rich baritone voice, and he became the top morning announcer in America.

The 1930's evolved dramas and soap operas. The WTIC Playhouse was on the air in 1931, and "Wrightsville Daily Clarion" - rural drama with folksy characters ran from 1933 to 1939. And through the 1930's Ben Hawthorne and a cow, "Bessie Bossie" awoke central Connecticut via the "Morning Watch". Hawthorne brokered the show, selling his own time until the FCC objected. WTIC then took control of the "Morning WATCH" and local department store G. Fox sponsored the entire show. Prior to Hawthorne, WTIC carefully scripted everything for its announcers. Ben adlibbed his show, a practice as yet unheard of!

#### WTIC News

WTIC began broadcasting news, sports, and weather on a regular basis in 1927. The announcers read the news, as a news staff had not yet been hired. In the mid 1930's, the station subscribed to the Transradio News Service. Reports were ripped off a teletype machine, and read over the air, and the fledgling Yankee Network News from Boston was added. The need for a dedicated news staff became apparent after the spring, 1936 flood, during which the Connecticut River crested in Hartford, at 37.5 feet above flood stage. Residents were driven from their homes, electric power was lost, and WTIC staff kept Connecticut informed from Hartford Police Headquarters. WTIC employees labored around the clock, often by candle light. WTIC was Hartford's only station to stay on the air through the emergency.

In the fall of 1938, with no prior warning, the "Great New England Hurricane" killed over 500 shore residents as towering waves slammed the Rhode Island and Connecticut coast. WTIC used a temporary shortwave antenna for emergency messages, airing live eyewitness accounts of the flood from atop the 500 foot high Travelers Insurance Tower, Hartford's tallest building. For days, WTIC broadcast on the scene accounts from the devastated shore, plus messages from those who lost touch with relatives. WTIC, through these major stories, developed a policy for accuracy and neutrality. Any editorializing on news broadcasts was cause for dismissal.

December 7, 1941, Pearl Harbor Day, saw WTIC on the air around the clock. Management gave Connecticut Governor Raymond Baldwin complete access to its facilities. During the war, the

station boosted the governor's effort, selling over a million dollars in War Bonds.

Another horrible Hartford news story brought WTIC prominence through its community service commitment. In minutes on July 6, 1944, flames incinerated the main tent of the Ringling Brothers, Barnam and Bailey Circus, during a packed matinee performance. The resulting panic claimed 169 lives and injured over 500 people. WTIC announcers worked with the Red Cross, police, and other agencies to deliver accurate information to the stricken city. From this tragedy came the WTIC Fire Prevention Committee, with hundreds of programs stressing home, school, farm, and theater fire safety.

#### The Bob Steele Show

Ben Hawthorne, popular Morning Watch host, enlisted in the Army. His wife took over the announcing duties. Bob Steele was asked to audition for the slot. Renamed the Bob Steele Show, its host built popularity through a mix of news, music, weather, and folksy, humorous items. Years later when Bob retired, his show was the longest running radio show in WTIC history. He had become the Connecticut River Valley's most popular announcer.

While many locally produced shows came and went over the years, the Connecticut Farm Forum, a regular Saturday morning feature, lasted for over 30 years, well into the 1960's. A teen call in show, "Mind Your Manners" involved a panel of teens answering on the air questions sent in by their peers. In the late 1940's, Ross Miller became WTIC's first DJ, playing recorded music. Live music, performed in WTIC's main studio, was heard into the 1950's, later than over most stations of the era.

The chief announcer set the schedules for his staff. Management required two announcers and two engineers to be on duty at all times WTIC was on the air. Through the 1930's and 40's, announcer attire gradually became less formal, although jackets and ties were required of all announcers, and suspenders were not to be visible! All newscasts were handled by both on duty announcers - one did the news, and the other read commercials.

In June, 1947, the original RCA 50,000 watt transmitter was retired, replaced by a new Westinghouse 50 kw unit. On March 29, 1941, the date of the NARBA Treaty mass frequency switch. WTIC moved to 1080 khz.

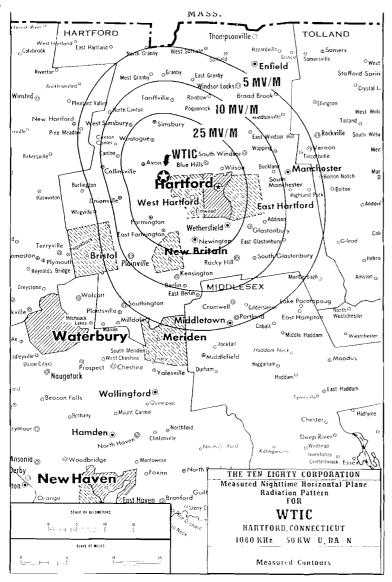
In February, 1940, WTIC's engineers built a 1000 watt experimental FM transmitter. Its call letters were WIXSO. In 1941, this FM experiment began broadcasting, with the revised call W-53-H, simulcasting AM programs. Later, WTIC applied for a TV license to operate 84-90 mhz with one kilowatt. On September 23, 1957, its offspring, WTIC-TV, Channel 3, brought local television to Hartford. Faced with television competitors, including its sister station, WTIC added a lot of audience participation shows and pioneered telephone talk. In August, 1954, the first call in show was the Miller Party Line, hosted by DJ Ross Miller.

WTIC and Travelers Insurance set up a weather research center, to do its own forecasting. WTIC carried five minute weather shows five times daily. The Travelers Weather Service was a WTIC staple until it was discontinued in 1984. Weather again made news in 1955 when Hurricane Connie swept the area. In a sixty eight hour period, WTIC helped the area recover from the wind and flooding, as its staff raised, through on the air appeals, over \$233,000 for the Red Cross which had aided storm victims.

AM, FM, and television operations taxed the space in the Grove Street offices, so WTIC built "Broadcast House" on Constitution Plaza. Two other firsts occurred in the late 1950's. On April 20, 1957, WTIC began broadcasting Red Sox Baseball, which it does today. In December, 1959, Hartford Times editor Sereno Gammell hosted WTIC's first night issues - oriented talk show, "What's Your Opinion?".

#### The Ten Eighty Corporation

In the early 1970's, Travelers Insurance decided to get out of the broadcasting business. WTIC-AM and FM were sold to a new organization, The Ten Eighty Corporation. The stations moved to the present location, the 19th Floor of "The Gold Building", One Financial Plaza. The "Gold Building is so known because of its distinctive color - it is indeed a conspicuous part of the Hartford Skyline!



A most memorable milestone was reached on September 30, 1991, when Bob Steele, after 55 years on WTIC, said "Farewell" to his audience, which spanned generations of Connecticut listeners. This goodbye ended the longest continuous association any US radio personality has had with any one station. Only one other area air personality stayed with a single station for nearly as long a period - Salty Brine, AM announcer at WPRO - 630, Providence, RI, broadcast for over 50 years over WPRO's microphones. Bob Steele's morning drive show entertained hundreds of thousands for over 48 years, from 5:30am to 10:00am. In recent years, his show had been progressively cut back to accommodate an expanding news block, and Bob's age - he retired at age 80. His audience included an estimated 400,000 regular listeners. In 1984, the last year he did his full show, his share in the Arbitrons was 25.1! In 1973, before FM became a factor, WTIC AM drive averaged an incredible 58.9 share. Bob regaled his listeners with music, news, sports, obscure historical events, birthdays of listeners over 80, and anniversaries of couples married at least 60 years, and folksy jokes.

Over the past years, the Ten Eighty management team has developed a full service approach with news, information, sports, business, traffic, and lots of syndicated talk. The station regards itself as full service, information oriented. WTIC id's as "The News, Weather, and Traffic Station - Depend on Us". The weekday lineup begins with "Mornings with Ray Dunaway", a compendium of local news, sports, traffic and "Information Hartford Depends On". At 10:00am, local author and Hartford Courant columnist Colin McEnroe hosts a talk show, followed by Rush Limbaugh, a three hour afternoon drive news block hosted by Bruce Stevens, and sports talk with local host Arnold Dean. Gill Gross and Leslie Marshall host evenings and overnight. WTIC News is heard on each hour. Syndicated talk is featured on weekends. Seasonally, when not on strike, the Red Sox, Hartford Whalers Hockey, and University of Connecticut Basketball fill the evenings and weekends as does New England Patriots Football and U Conn Football.

All locally produced talk shows are on delay. The control board operator screens the calls, handles commercials, and the news. WTIC, after sixty years with NBC, is now a CBS affiliate.

The 19th floor broadcast complex at One Financial Plaza includes ten studios, of which three are for WTIC-AM, one is the news booth, one for AM production, and a large studio is an interview room. The complex is highly computerized. WTIC-FM, 96.5 mhz, with 50,000 watts, an adult contemporary station, and WTIC-TV, Channel 61, a Fox Network station, today are operated by the Ten Eighty Corporation.

WTIC's transmitters are located in an ornate three story brick building built in 1929 around the original RCA transmitter atop Talcott Mountain. The station uses a twelve year old 50 kw solid state Continental 317 C-2, backed up by an older Continental 317 and a 5000 watt Gates 374. This ultimate backup is dipoled into Channel 3's tower, next to the building. The original RCA model is still here, as is the equipment for Channel 3 and Channel 61. WTIC owns the top of the mountain, on which several FM and TV towers are perched. Here, too, is WTIC-AM's two 440 foot high towers. WTIC is non-directional until sunset, Dallas time, when the signal must protect KRLD, in Dallas. WTIC's signal is regularly heard as far away as Brazil, and along the East Coast from Nova Scotia to Northern Florida, based upon calls fielded by the talk hosts. Chief Engineer Tom Ray enjoys reception reports, and regularly hears from DX'ers in Ohio, Pennsylvania, the Carolinas, Florida, the Bahamas, and from England, Scandinavia, and Africa.

A 300,000 watt generator, supplied by a 5000 gallon fuel tank can power the transmitter should power be lost to the site.

"Radio You Can Depend On" will observe its 70th Annuversary of service to Connecticut on February 10, 1995. Thousands of Nutmeg State residents tune to WTIC as a welcome sources of information and entertainment every day!

This WTIC Profile comes from information and historical data supplied by Tom Ray, WTIC CHief Engineer. The National Radio Club thanks Tom for his help, and for the tour which he conducted of WTIC's Talcott Mountain site at the 1993 Enfield Convention. The NRC also salutes WTIC on its 70th anniversary of full service to its loyal listeners.



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## Loop Showdown: KIWA versus RSM-105 (with some comments on the Quantum)

by Mark Connelly WA1ION

The Kiwa Medium Wave Loop and the RSM-105 are two of the finest loop antennas available commercially today to professional monitors and serious medium wave DX hobbyists. They are both excellent performers even though they represent two distinctly different design philosophies. A month before 1 did this study, I purchased an RSM-105 from its builder, Ray Moore of Key Largo, FL. Tom Walsh of the "Boston Area DXers" had just acquired a Kiwa Loop which he was kind enough to let me borrow.

Before going further, it must be stated that the RSM-105 is a passive antenna and cannot be expected to have "S-meter gain" comparable to that obtainable from the amplified Kiwa. The true measure of a loop's weak-signal performance is signal-to-noise ratio. An S-4 signal masked by amplifier noise may be less readable than an S-1 signal from a passive antenna as long as the S-1 signal is still above the receiver's own noise floor. The passive 1-meter-square RSM-105, on some very weak signals, gave SLIGHTLY better signal-to-noise than the physicallysmaller (amplified) Kiwa. But these threshold signals were often fighting with the Drake R8's own noise floor. The best signal-to-noise ratios were obtained by running the RSM-105's output through a low input impedance (inductively-coupled) Mini-MWT-3 regenerative preselector. This homebrew tuner - as described in my DL-1 Delay Line Phasing Unit article - has a lower noise figure than the Drake R8 and can improve the signal-to-noise performance of the receiver on very weak signals whether from a wire, the RSM-105, or the output of a passive phasing unit. The Kiwa's signal-to-noise was very impressive considering that it has substantially less pick-up area than the RSM-105. The differences in weak-station audibility (not S-meter reading) between the loops were minimal. A couple of checks were made with a Quantum Loop. It, for its miniscule size, made a good accounting of itself: as a rule, output levels observed on the Drake R8 S-meter were equal to those from the Kiwa (slightly greater on some frequencies, slightly less on others, usually about the same). However, the Quantum was noticeably more "hissy" on weak daytime stations. This is to be expected because of the physics of a small aperture antenna coupled to a high-gain amplifier. On non- auroral nights, there would be very little difference noted in DXability comparing the RSM-105,

Kiwa, and Quantum. The Kiwa's regeneration might give some desired extra selectivity and bandpass tuning in some circumstances. This would be particularly useful with receivers having less than optimum IF filter selections.

Nulling with the Kiwa was a breeze because of its silky smooth mechanical design. It is a thing of beauty. The RSM-105 and the Quantum required more work to get a null, especially when tilting was required. Two phased wires, or Q-spoiled loop versus wire or amplified whip, can still outperform any stand-alone loop, especially for DX in the direction opposite to stations to be nulled. Here in the Boston area, DX from Europe and Africa is noticeably better on a properly-constructed phased-wires system than on any loop that I've ever tested.

The RSM-105 is the ultimate urban loop as it cannot be overloaded. When either the Kiwa or Quantum is tuned to frequencies other than the receiver's frequency, intermodulation products can be heard and inadvertantly peaked up. This can make peaking a bit dicey when operating one of these loops in less than optimum lighting - such as in the dark at a beach DXpedition site. This doesn't happen with the RSM-105 unless you're using a very poor receiver that causes intermodulation in its own circuitry.

At "nasty" RF-laden sites such as the New Jersey Meadowlands, active loops are likely to generate intermodulation products even when they are properly peaked for the receiver-selected frequency. These unwanted signals can be generated from FM, TV, SW, LW, and utility sources as well as from local medium wave AM stations. A passive loop is your only choice if you're in an RF "hot spot".

The RSM-105 is touted for its use in precision direction finding. Its balance is superb and I have no reason to dispute this claim. I did not find the Kiwa lacking in the symmetry of its nulls either. Both loops should give very good direction fixes - most likely superior to those taken with popular ferrite loops such as the Palomar, Radio West, SM-2 Space Magnet, Quantum, or McKay-Dymek.

The large size of the RSM-105 and the greater care required in its transportation rule it out for DXpeditions requiring air travel. A Quantum Loop and Sony ICF-2010 combination is probably your best choice on a plane trip.

For car-based DXpeditions, the Kiwa would be a better choice than the RSM-105 (or

Quantum) because the control box can be located inside the vehicle while the loop is on the car roof. As one who has used homebrew remotely-tuned antennas on most of my car DXpeditions, I am glad to see a loop of this design now available commercially.

In August of 1995, I performed low signal measurements from a field site in Tewksbury, MA near the Tew-Mac Airport / Route 38 / Shawsheen River. The site is away trom power lines and it is about 4 miles / 6.4 km from my home in Billerica. Measurements were taken between 12:30 and 1:00 PM local time (1630-1700 UTC). There was no skip at the time: all signals were arriving via groundwave.

Stations selected were considered to be weak signals: at or below the noise level of typical consumer portable radios and marginal copy on many car radios.

The following antenna configurations were compared: Kiwa Loop to R8, RSM-105 loop to R8, and RSM-105 loop via (inductivelycoupled) Mini-MWT-3 regenerative preamplifier to R8. The Drake R8, Mini-MWT-3, and Kiwa Loop were powered from the car battery. Amplified readings (Kiwa or RSM-105 via Mini-MWT-3) taken represent minimum regeneration. Add about 15 dB to get readings taken when the given regenerative amplifier was adjusted for maximum level of understandable-audio signal just before oscillation. It was noted that the ratio of signal to adjacent station "slop" was often improved by using regeneration set for intelligible audio coming from the aideband opposite to the "pest" station channel. Regeneration had little effect (good or bad) on weak station signal-to-noise ratio.

The R8 S meter showed an S-1 reading for zero signal in. The empty- frequency S-meter reading with the Kiwa peaked was about half an S unit (3 dB) over S-1; e.g. S-1.5. All Kiwa readings were taken with the amp switch on "DX" and no attenuation on the control box.

#### RECEPTION DATA

Massachusetts Turnpike TIS - 530 / Weston, MA Kiwa: S-6; good readability RSM-105: S-2.5; fair to good readability, slight receiver noise RSM-105 via Mini-MWT-3: S-9 + 5 dB; good readability

WLIX - 540 / Islip, NY Kiwa: S-4; fair readability, slight amplifier hiss RSM-105: S-2; fair readability, receiver noise floor only 6 dB down RSM-105 via Mini-MWT-3: S-8; fair to good readability

CHTN - 720 / Charlottetown, PI Kiwa: S-7; good readability RSM-105: S-4; good readability RSM-105 via Mini-MWT-3: S-9 + 10 dB; good readability On all three setups, WRKO - 680 slop was a problem at times.

CFDR - 780 / Dartmouth, NS Kiwa: S-3; audio in amplifier noise RSM-105: S-1; in receiver noise, carrier only detectable with BFO on RSM-105 via Mini-MWT-3: S-3.5; audio in amplifier noise On all set-ups, WCCM - 800 slop was a problem at times. This station is received at fair level on wire antennas via Mini-MWT-3.

WNYC - 820 / New York, NY Kiwa: S-8; good readability RSM-105: S-5; good readability RSM-105 via Mini-MWT-3: S-9 + 10 dB; good readability

WLAM - 870 / Gorham, ME Kiwa: S-8; good readability RSM-105: S-5; good readability RSM-105 via Mini-MWT-3: S-9 + 10 dB; good readability

CKBW - 1000 / Bridgewater, NS Kiwa: S-5.5; good readability, slight amp noise RSM-105: S-3.5; fair to good readability, slight receiver noise RSM-105 via Mini-MWT-3: S-8.5; good readability, negligible noise

WINS - 1010 / New York, NY Kiwa: S-8; good readability RSM-105: S-5; good readability RSM-105 via Mini-MWT-3: S-9 + 10 dB; good readability

KYW - 1060 / Philadelphia, PA Kiwa: S-2; carrier in amp noise RSM-105: S-1 (not moving meter); carrier only detectable with BFO on RSM-105 via Mini-MWT-3: S-3; bits of apparent talk, in amp noise

CBA - 1070 / Moncton - Sackville, NB Kiwa: S-6; good readability RSM-105: S-2; fair readability with receiver noise RSM-105 via Mini-MWT-3: S-8; good readability The Plattsburgh, NY co-channel station was audible in the background: its strength was about 10 dB weaker than CBA; it could be isolated from CBA by nulling northeast / peaking northwest.

WJJF - 1180 / Hope Valley, Rl Kiwa: S-7; good readability RSM-105: S-2.5; fair to good readability over receiver noise RSM-105 via Mini-MWT-3: S-9 + 5 dB; good readability

WLIB - 1190 / New York, NY Kiwa: S-7; good readability RSM-105: S-2.5; fair to good readability RSM-105 via Mini-MWT-3: S-9 + 5 dB; good readability There was moderate slop at times from WKOX - 1200. The higher Q of the Kiwa gave it an edge over the unamplified RSM-105.

WGMP - 1210 / Philadelphia, PA Kiwa: S-4; with audio but noisy, WKOX slop a problem until regen. tweaked RSM-105: S-1.5; near receiver noise floor, bits of audio heard RSM-105 via Mini-MWT-3: S-8; better readability than Kiwa

WEZS - 1350 / Laconia, NH over WINY - 1350 / Putnam, CT Kiwa: S-9; good readability RSM-105: S-6; good readability, but WLYN - 1360 slop worse because of lower Q than Kiwa. RSM-105 via Mini-

MWT-3: S-9 + 15 dB; good readability 6-dB-weaker WINY could be isolated by nulling north / peaking west.

WI)]Z - 1530 / Bridgeport, CT Kiwa: S-7; fair to good readability (some WNRB - 1510 slop) RSM-105: S-2.5; fair readability with slop and receiver noise RSM-105 via Mini-MWT-3: S-8.5; fair to good readability through WNRB slop

WLIM - 1580 / Patchogue, NY Kiwa: S-5; fair readability RSM-105: S-1.5; poor to fair readability with receiver noise RSM-105 via Mini-MWT-3: S-7; fair readability CBJ (Chicoutimi, PQ) and another signal (NJ?) were audible in the background. Multiple station slop (WNSH - 1570, WSMN - 1590, and WUNR - 1600) was a problem on each set-up some of the time.

Home "reference test" on WZNN - 930 / Rochester, NH (not a weak station) 100 ft. / 30 m wire: S-8.5 100 ft. / 30 m wire via Mini-MWT-3: S-9 + 35 dB Quantum: S-9 + 15 dB Kiwa: S-9 + 12 dB RSM-105: S-7.5 RSM-105 via Mini-MWT-3: S9 + 20 dB Readability in all cases was very good.

Conclusions: The best loop choice for a given DXer will be determined by the receiver, location, and type of DXing to be done. Sensitivity is not critical for night use, except in auroral conditions or at exceedingly remote sites such as the Australian "outback". Strong signal handling is very important at an urban site, but less so in the country. The physical size of the loop is important to those who take it "in the field" or who have very small DX

"shack" rooms. Good nulling is important to most of us, except perhaps for the steel-frame apartment dweller who can only receive stations with the loop pressed up against a window. And a not-insignificant factor is price. Some time ago, Elliot Straus contemplated the question "Is a Kiwa worth more than twice as much as a Quantum ?". For some the answer is "yes", for others "no". The RSM-105 is about twice the price of a Quantum, and a bit less than the Kiwa. For city DXers, the RSM-105 will be the handsdown choice. It is "bulletproof". Active loops are much more likely to generate intermodulation distortion products in the urban environment. Those with less-thanultimate receivers may want to use a lownoise / high-O preamplifier (such as the Mini-MWT-3) between the RSM-105's output and their receiver inputs. For DXers who like parking at a beach, pier, or mountaintop for prime loggings, the Kiwa - with its remote tuning - wins. For the business or vacation traveller, the Quantum fits right in a suitcase when it's time to catch a flight somewhere. Some DXers will forego loops entirely and opt for phased wires. Those lucky enough to have land for Beverages will find them hard to beat.

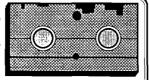
As no one screwdriver can be used for every kind of screw, no single type of antenna is best for every DX situation. This article's discussions and test results should serve as a guide to allow DXers to make wise reception-improving choices for their specific circumstances. I hope that this article stimulates others to do similar testing and to publicize their findings.

### How to place mail orders ...

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#### Stan Solomon Show

- via Robert C. Pote

#### Hourly Affiliate Clearance

HOUR ONE 7-8pm

WXLW 950 AM WSHW 99.7 FM WSLM 1220 AM\* WSLM 97.9 FM\* WCGO 1600-AM+ WSRW 106.7-FM **WTAY 1570-AM** WTYE 101.7-FM **WDAN 1490-AM** WSJP 1130-AM+ KWRE 730-AM KOKB 1580-AM++ WMMG 93.5-FM+ WMMG 1140-AM+ WHBU 1240-AM\*\*\* WOCC 1550-AM+ WZZY 98.3 FM WRCR 94.3 FM 4

(all times are Central)
HOUR TWO
8-9pm

WXLW 950 AM WSHW 99.7 FM WSLM 1220 AM WSLM 97.9 FM WCGO 1600-AM+ WSRW 106.7-FM WTAY 1570-AM WTYE 101.7-FM WDAN 1490-AM WSJP 1130-AM+ KWRE 730-AM KOKB 1580-AM++ WMMG 93.5-FM+ WMMG 1140-AM+ WHBU 1240-AM WOCC 1550-AM+ WZZY 98.3 FM

HOUR THREE 9-10pm

WXLW 950 AM WSHW 99.7 FM WSLM 1220 AM WSLM 97.9 FM WSRW 106.7-FM WTAY 1570-AM WTYE 101.7-FM WDAN 1490-AM KWRE 730-AM KOKB 1580-AM++

WHBU 1240-AM WZZY 98.3 FM

WXLW 950-AM Indianapolis, Indiana WSHW 99.7-FM Frankfort, Indiana WSLM 1220-AM Salem, Indiana WSLM 97.9-FM Salem, Indiana WTSJ 1050-AM Cincinnati, Ohio WCGO 1600-AM Chicago Heights, Illinois WSRW 106.7-FM Hillsboro, Ohio WTAY 1570-AM Robinson, Illinois WTYE 101.7-FM Robinson, Illinois WDAN 1490-AM Danville, Illinois WHBU 1240-AM Anderson, Indiana WSJP 1130-AM Murray, Kentucky KWRE 730-AM Warrenton, Missouri KOKB 1580-AM Blackwell, Oklahoma WMMG 93.5-FM Brandenburg, Kentucky WMMG 1140-AM Brandenburg, Kentucky WOCC 1550-AM Corydon, Indiana WZZY 98.3 FM Winchester, Indiana WRCR 94.3 FM Rushville, Indiana

\* WSLM does not carry Hour One Mondays & Wednesdays
\*\*\* WHBU does not carry Hour One on Monday

^ WRCR carries 7-8PM only for now

++ KOKB airs "best of" on weekends

^ WTSJ will tape-delay show

("Stan Solomon is a <u>very</u> conservative talk show host and has a very distinctive voice," Robert commented. "I have heard his program on another station and was able to verify it with the list." The show originates from WXLW-950.)

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## Musings of the Members

Wilmington, DE 19850-1502

Of the Members

Times are local per Muse; submit double-spaced only.

Thoughts from NRC members ... the opinions expressed in this column are those of the individual writer and do not necessarily reflect those of the editors, publishers, or the National Radio Club, Inc.

## DON TRELFORD - P O BOX 120 - ST. ANNS BAY, IAMAICA, W.I.

Time to reintroduce, well....ok! 1 am 69 years on this planet (not a space alien) and I started DXing as a late teenager. Fascinated with what I could pick up, this was late 39, early 40's. Eventually, I heard of Radex and my cousin and I hunted high and low in the variety stores for it, finally finding a copy. They folded shortly after but listed several radio clubs we could join. I started with the Victory Radio Club, Latrobe, PA and when they closed down, I went for a while to the Universal Radio Club, which also folded (what choices!). Then I joined the Newark News Radio Club, as they had the AM radio log. I had heard of the NRC through my friend Bill Stone and his sidekick Bruce Kennedy (whatever happened to him?). Bill, Bruce and I made several expeditions to Buffalo to see the legendary Ralph Johanns, and on one occasion, Ralphie took us to see Ray Edge, who took us to the police station (hardened criminals!) where he introduced us to 2 Hallicrafters receivers with an antenna on top of the police radio transmitter. We DXed all night and managed to pick up Hawaii. By 1948, I had obtained a job with the ON Ministry of Natural Resources and moved from Toronto to Espanola (N of Manitoulin Island and W of Sudbury). I eventually got my SX40 up there and had an antenna on top of an 80-foot hose drying tower, and, of course, DX was superb. Unfortunately, in order to get ahead, I had to move to Foleyet, ON, where there was no electricity (or anything else), so my DX career stopped. 1 kept my hand in radio, though, as we had a transmitter for government business and working aircraft (worked off a diesel power plant). We were on 4880khz and could work Toronto, 700 miles S. I wondered if anyone else would hear us and went up to the office one morning at 3 and made a test call, but no replies. I still hold a 2nd class radio operators license. I moved after 17 years at Floeyet to Weed, ON, N of Belleville for another 7 or more years, until there was a great shake-up in the Ministry and my job was eliminated (also that of my boss), but was offered work in Kemptville, ON. I was there a few months but decided after 26 years (many personal reasons) to leave. About 5 years ago, I found my old veries (718), sorted and cataloged them, and in browsing in a book store, found a

WRTH and the NRC was listed, the rest you know! Since my wife took early retirement, and the hatred of the cold weather, we moved to Jamaica, from where my wife is from. We have had a house here for 27 years. At present, we operate as a guest house. I attended the Denver convention and it was a most enjoyable to meet some old friends (ERNIE COOPER, CHRIS CUOMO (hope you got home OK!), JOHN MALICKY) and met more new friends. I went to Toronto after the convention and did a little DX there. Now, happily, I'm back in the sunshine! 73s (Thanks for the fine report, Don!-DWS)

## PAUL MOUNT - BOX 142 -

MORGANVILLE, NI 07751 Read of WJDM-1530 being authorized to test on 1660. Sounds like the FCC granted WJDM permission to test, then told everyone else they are going to re-think the process. While tuning the Superadio is somewhat imprecise above 1610, my Sony CFSW501 tunes with digital readout to 1670, but no sign of any testing yet, at various times of day and locations anywhere from within sight of the tower (you have to know exactly where and when to look from the Parkway in the daytime) to here, 30 miles S. Lucky BOB HARRISON, 10 new frequencies, and 1 is granted to a station about 1 mile from his location! Bob would surely know more about whether the tests have begun (by tuning his toaster to 1660!). It will be interesting to see if they use the same puny 100 ft. or so tower in the swamp in Union, NJ for 1660. Dave, any theoretical engineering reasons that a small tower might not be able to take 10kw to it? (No, case in point with the old WPGR-1540 who was running 50kw into its short towers-DWS). Had been thinking that there's the dual frequency problem - even if the tower is the 'right' height for 1530, it won't be for 1660, but then they seem to do fine with 660 and 880 on the same tower over of High Island (When they 'diplex' 2 signals into 1 tower, the operating frequencies of the stations must be at least 20% apart from the other, so I'm told, as the tuning "traps" not only have to filter out the main frequencies from each other but also

## WPJK INSPIRATION 1580

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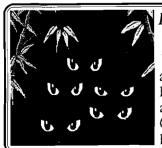
## National Radio Club Financial Statement the following statement is for the year

The following statement is for the year Oct. 1, 1994 through Sept. 30, 1995.	Convention 856.80
(i.e. 1, 1))4 na ough sept. 50, 1)55.	7,148.52
Income Statement	·
Membership Dues	Total Expenses \$41,657.63
NRC AM Log 13,175.31	
Antenna Manuals 450.70	Statement of Income (Loss or Gain)
Receiver Manuals 30.00	
Anniversary Book 59.00	Income (All sources) \$42,016.16
New Member Book 416.45	
Samples 83.89	Bulletin/Publication Costs
Beverage Manual 202.68	Beginning Inventory 4,382.70
Loop Manual 547.93	Printing 21,476.69
Audio Service 4,449.15	Postage 13,032.42
Convention 1,686.14	Less Ending Inventory5,266.28
Reprints 3,530.13	Net Costs \$33,625.53
FM Atlas 796.90	
Map Book 410.10	Profit or Loss \$8,390.63
Miscellaneous Income <u>371.76</u>	Administrative Expenses <u>-7,148.52</u>
Total Income \$42,016.16	Net Profit
Expense Statement	<b>Balance Sheet</b>
Expense Statement Printing:	Assets
<del>_</del>	Assets
Printing:	Assets   Inventory
Printing: Bulletin \$10,784.04	Assets Inventory \$5,266.28
Printing:  Bulletin \$10,784.04  Reprints 2,650.01	Assets   Inventory   \$5,266.28   Cash
Printing:  Bulletin	Assets   Inventory   \$5,266.28   Cash
Printing:       Bulletin       \$10,784.04         Reprints       2,650.01         NRC AM Log       7,044.00         Antenna Manual       340.97	Assets   Inventory
Printing:         Bulletin       \$10,784.04         Reprints       2,650.01         NRC AM Log       7,044.00         Antenna Manual       340.97         Administrative       657.67	Assets   Inventory
Printing:         Bulletin       \$10,784.04         Reprints       2,650.01         NRC AM Log       7,044.00         Antenna Manual       340.97         Administrative       657.67         21,476.69	Assets   Inventory
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Printing:         Bulletin       \$10,784.04         Reprints       2,650.01         NRC AM Log       7,044.00         Antenna Manual       340.97         Administrative       657.67         21,476.69         Postage:         Bulletin       9,223.26	Assets   Inventory
Printing:         Bulletin       \$10,784.04         Reprints       2,650.01         NRC AM Log       7,044.00         Antenna Manual       340.97         Administrative       657.67         21,476.69         Postage:       Bulletin       9,223.26         Sales       2,772.10	Assets   Inventory
Printing:         Bulletin       \$10,784.04         Reprints       2,650.01         NRC AM Log       7,044.00         Antenna Manual       340.97         Administrative       657.67         21,476.69         Postage:       Bulletin       9,223.26         Sales       2,772.10         Administrative       1,037.06	Assets  Inventory \$5,266.28 Cash \$5,547.24 \$9,597.41  Liabilities Deferred Dues \$(-\$7,817.02)  Net Worth \$2996.50  Once again the club is still in excellent financial shape due to everyone's efforts.  Remember — your continued support for NRC
Printing:         Bulletin       \$10,784.04         Reprints       2,650.01         NRC AM Log       7,044.00         Antenna Manual       340.97         Administrative       657.67         21,476.69         Postage:       8         Bulletin       9,223.26         Sales       2,772.10         Administrative       1,037.06         17,344.98         Administrative:       Telephone         Telephone       846.63	Assets  Inventory
Bulletin   \$10,784.04     Reprints   2,650.01     NRC AM Log   7,044.00     Antenna Manual   340.97     Administrative   657.67     Postage:   Bulletin   9,223.26     Sales   2,772.10     Administrative   1,037.06     17,344.98     Administrative:   Telephone   846.63     Information Purchase   63.96	Assets  Inventory \$5,266.28 Cash \$5,547.24 \$9,597.41  Liabilities Deferred Dues \$(-\$7,817.02)  Net Worth \$2996.50  Once again the club is still in excellent financial shape due to everyone's efforts.  Remember — your continued support for NRC
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Treasurer, National Radio Club

## The NRC is growing - and you can help.

More members in the NRC means a larger *DX News* ... and more features and services for all members. You can help your club grow: just send the names and addresses of potential club members to the NRC - P. O. Box 5711 - Topeka, KS 66605 and we'll send them a current copy of *DX News*. You could start with your local AM stations' personnel! Spread the word - the National Radio Club is on the grow!



Miscellaneous . . . .

### From NRC's DX Audio Service ...

## 'After Dark 5'

You wanted receiver reviews ... graveyard station Travellogs ... airchecks ... Harry Caray, Clark Weber, Shotgun Tom Kelly, and Fred Richards ... paging cows ... DX techniques ... eclipse DX ... and a round-table discussion? Then order "After Dark 5" today! 12 C-90 tapes in a holder: \$19.95 postpaid from NRC Publications - Box 164 - Mannsville, NY 13661. NY orders, please add sales tax,

everything in the sidebands and possible combination of frequencies to reduce the harmonic problem, tower height can be compensated for via loading/tuning, thus 1530/1660 might be too close-DWS). Also have noted with mock disgust how many journalists perpetuated the statement "Elizabeth is the largest city in the country with no nightime service." A more accurate statement would be "Elizabeth is the largest city in the country with a LICENSED station that is not on at night" as Jersey City is THE answer to that popular convention quiz question, they have NO licensed station at all and about 2 times the population of Elizabeth. The most recent published interview with WIDM's GM John Quinn indicates the 1660 format is "a surprise", current 1530 format is brokered ethnic and oldies when no one has paid to be on the air. Another bit of trivia tells you that WSKQ-620 has applied to change city of license to Jersey City (on top of their CP to change to Rutherford - I've seen the propsed night pattern and they are better off being licensed to Jersey City if a certain strength contour over downtown and/or the entire city of licensed is required, as Rutherford is 'off the back'). More Jersey City trivia, one of the applicants for the 105.9 frequency wants to change the city of license to Jersey City and WYNY-103.5 has studios in Jersey City). There have been some interesting 'tower' discussions in the Broadcast Professional Forum on Compuserve lately, especially now that NRCer ALPHONSE TOBIA is online, nice to find another 'tower nut'. Now to find out if there are more than 3 people out there who videotape tower sites as another adjunct hobby derived from DXing. It was the Sunday AM guest speaker at the NRC Pittsburgh convention in 1990 who spoke of the impending switch to DAB, meaning the need for AM towers would be eliminated, that got me going on photographing all the NYC area towers. Now 5 years later, it seems to be more a matter of economics that some AM towers aren't being used, rather than DAB. I'm happier that way, anyway. 73

#### BART CRONIN - 10615 ROBBERS ROOST ROAD - EDMONDS, WA 98020

Long time since I have MUSED! I have been a member of the NRC off/on since 1960 and have an old membership card signed by the legendary Ray Edge. My DXing continues on an HQ160 which I bought from JOHN CALLARMAN in the late 60's. The antenna is a longwire that wraps around my attic and then out 50 feet to a Douglas Fur tree. Just a few items from several work related and vacation trips this summer. Using a Ford AM\$/FM\$ and a Pioneer KE1818: In Anchorage, KHAR-590 and KKSD-1080 share

a tower in S Anchorage and KENI-550 and KBYR-770 share a self-supported tower along Cook Inlet just W of downtown, KFOD shares with several FM's while about a half mile away is the 2 tower array for KYAK, the S tower is only about 1/3 as tall as the N tower. KFQD's stereo is excellent. KHAR and KYAK were stereo in the spring but not when I left in July. KFFR-1220 was off the entire time I was there and I never found their tower, supposedly in Eagle River, N of Anchorage. KABN-830 is also off. The tower is at mile 53 of the Parks Highway at the junction to Big Lake. No trace of AFRN-1360 Fort Greeley, 1400-Tok, 1490-Clear or 1490-Eilson, KBCN-1300 Fairbanks is not on. KINP-1170 is listed as U2 but they only have 1 tower. CBDE-560 Dawson City, YT, remains on although the CBC now has an FM there. In N Yukon, there is an FM translator at Eagle Plains (the only place to get gas in 229 miles!) which is supposed to rebroadcast CHON Whitehorse. But due to a satellite mix-up, they were rebroadcasting the audio of an Edmonton TV station! Daytime DX from Inuvik, NWT included CHAK-860, CBAK-540 and CFCT-990. But day was 0400-0120 Mountain Time! I also understand the KINY-690 repeater is still on in Skagway. Overnighting at one spot in the N Yukon noted absolutely NOTHING noted on AM or FM but did get a carrier with 2, low, alternating soft tones on 800 and 1200. I also heard this on 800 at Lake Almanor in N CA. Could this be an internal mix in the radios or some kind of a mix with a Loran? Lots of good AM stereo in BC including nearly every AM in Vancouver and Victoria. But in the Seattle area, only KMTT-850, KBSG-1210 and KMPS-1300 continue stereo. With the 770/1090 swap, KRPM-1090 dropped stereo. KJR-950, KOMO-1000 and KRKO-1380 have likewise. KJR's new towers are up but so far, they have not moved nor has KMPS who will share the 3 tower KIXI-880 array at the 190/1405 interchange. KBLE reportedly has applied to share the day tower with KKDZ-1250 and to reduce night power from 453.5 watts to 440. KJR, KBLE and KMPS are moving from the Seattle waterfront due to an expansion of the Port's container facilities. KKDZ's night site is in Kirkland, E of Seattle, sharing space with KARR-1460. KITZ-1400 is back on with new owners and CW. KCPL-920 Olympia is off. The "Country Gold" stations (KJUN-1450, KBLV-1540, KENU-1330,

## KOA AM 85 KOAQ FM 103

KWYZ-1230, KTOL-1280) are now IDing as "the new 104.9 FM". KBLV is looking for a new transmitter site as the city of Bellevue told them to get off park property in the wetlands near 190. In Eugene, KUGN 590 has a new 3 tall tower, 1 short tower array just W of 15, S of the McKenzie River Bridge. They reportedly share towers with KOOK-840 (which is on again with CW) and KDUK-1280. KZTU 650 may also use the array when (and if) they come on. KEED-1060 is on but their old towers are gone. My spy doesn't know where the station operates from! In Alturas, CA, there are 2 towers apparently for KCNO 570. One is about 15 miles S of town, the other is 1 mile E. Each is a single so I doubt that is their directional array! KBOI-670 is now oldies. Victoria BCs-1200 was noted off for about 2 weeks then began testing off/on for several days, duplicating CKKQ-100.3, and it is now being heard with CW and CKSM. Also have been getting bits of audio, mainly CW, I think, on 1690 at various times from 2300-0500 PDT. Anyone else heard this? Doesn't match anyone locally so I have ruled out harmonics or mixing. Overall, I continue to be amazed at how bad radio content has gotten. While travelling, it is hard to know when you leave one station for another. Slogans and music are the same from market to market, very little creativity. AM, FM and the public statioons, with few exceptions, are all spiraling downward. No wonder CD's are selling so well! 73's (Welcome back 'to the fold', Bart, please report in often!-DWS)

## DAVE SCHMIDT - P O BOX 11502 - WILMINGTON, DE 19850-1502

This report comes to you from the wilds of Conway, SC once again. This is all received in 9 days, kinda hard to put a column together when no one submits reports, right? By the time the next column rolls around, we should have a local address, more centrally located (and out of the station main lobes!). The DX test from WDJL-1000 was heard on 10/23 2:08-2:21AM verv weak under WMVP/Spanish. WAMR-1320 was not heard that same AM. The KREW-1210 test was set up to be tried for on 10/28 but was quickly shot down with a severe thunderstorm in the area at the same time that AM. That's it, will be looking foward to getting wave reports, to . Is column! support your club and M CUN7

# Radio Pete Kemp (KZ1Z) PeteKZ1Z@AOL.com P. O. Box 73 Bethel, CT 06801-0073 News of the radio industry, of interest to DX'ers

CHARLES TO THE CONTRACT Greetings all ... The letters RDS (Radio Data System) will become more familiar to listeners in the future, as information will appear on your screen telling you the call letters of the station, traffic information, NOAA Weather Bulletins or any other information that the station wished to piggyback on its signal. Denon has announced a new car radio, an AM/FM/CD combination unit, dubbed the DCT-950R. Denon has a home unit, the TU-380 RD available. One can't help but wonder where the future of BCB DXing will go in the next twenty years. With these encoded signals and computer interfacing, someone would be able to pre-program all the DX tests, automatically change frequencies, hit the vox for recording, using DSP technology and voice recognition, run the data through a word processor template, filling in the appropriate fields and then sending the whole report to the printer. I doubt that anything will replace the thrill of hearing the stations live in the middle of the night, but the future will be having on impact ... Imagine listening to radio that you didn't wind the coils for? ... Ever wonder

where the ID's went? Listeners to WXOL did, as the station personnel left the transmitter on. switched on the People's Radio Network satellite feed and walk out! During the month of May and on through June 7th the station broadcast a signal without IDs. The station is licensed to operate with 250 watts day / 70 watts at night on 690. One listener began to wonder what was going on, no one answered the telephones and the station up locked up tight and the shades were drawn closed. Nobody was home! Oshkosh, by gosh, had a problem. The station is now on the selling block ... You know what I just love about the new Duopoly concept? All the creative math this technique has brought into the broadcast industry! Mark Twain had it right, figures don't lie, but liars will figure ... If you would like to contribute to this column, I may be reached at the address above, via CompuServe 72376,2557, InterNet PeteKZ1Z@AOL.COM, the FIDO system in the Shortwave, Ham or Broadcasting echo areas, The Oracle 1:141/1015, or amateur radio packet, KZ1Z @ K1UOL.CT. So much for now.

THE REPORT OF THE PARTY OF THE