



DX Monitor

Devoted Exclusively to
Broadcast Band DXing

March 17, 1984

Volume 21, Number 26

Issue Number 681

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News from Headquarters

NEW GOODIE FACTORY ADDRESS: Goodie Factory manager Dennis Kibbe is moving. After April 1, 1984, all orders, correspondence, etc should be sent to him at 1017 West Manhattan Drive, Tempe Arizona 85282.

WANTED-NEW EASTERN DX FORUM EDITOR: Rick Evans is stepping down as EDXF editor, effective this August (if not sooner). If you are interested in taking over, contact our president Phil Bytheway. The only requirements for being EDXF editor are that you live in the eastern U.S. or Canada, can type, and can devote an hour or two per issue for typing (less if you're a fast typist).

ERRATA DEPARTMENT: Well, folks, I did it again. The March 3 DX Monitor was Vol 21, Number 24, not 25. And the following issue was Number 25, not 26. So far nobody's written asking for their missing issue, so I guess you guys are catching on to me, hi. Also, Mark Connelly sent the following corrections to his APT-3 article, which appeared in the February 11 DXM: Figure 1: Add connection: CCW pin of R2 to wiper arm of R2. APT-3 usage procedure step 5.0.5 should read "To regenerate after having peaked C1, perform step 4.2.2." (not 4.2.1 and 4.2.2).

A FLASH TIP: From Brock Whaley, via Bill Hardy, comes word that KIFH-1040 in Honolulu (ex-KPOI) is now on the air. The format is Contemporary Christian music. The callsign evidently stands for "Inspiration for Hawaii". KPOI left the air on 1040 around February 9, but its rock format continues on FM (see this week's WDXR). Brock says KIFH signed on around 6 am Hawaiian time on Monday March 5. Contrary to the announced schedule in this week's WDXR, KIFH is 24 hours and will be NSP.

TOP END YEARBOOK: Craig Healy has published the 1983 edition of the "Top End" yearbook, which lists all the contributions to the "Top End" column from January 1983 to January 1984. It's a pretty interesting collection of loggings of bleeps, glorns, chirps, tones and other funny noises (including voice announcements and morse code identifiers) heard by IRCA/NRC members. You can get your very own copy of this 8 page booklet (2 8½x11 sheets) by sending a 20¢ stamp (or equivalent for foreign members), plus one "Top End" logging to: Craig Healy, 66 Cove St., Pawtucket, RI 02861.

NEXT WEEK'S DX MONITOR will be the anniversary issue. It's guaranteed to be a biggie (assuming the Post Office doesn't lose Heald's column, hi). The schedule for the rest of this volume is as follows:

Issue Number 28:	March 31	32:	June 16
	29: April 14	33:	July 14
	30: April 28	34:	August 11
	31: May 19		

The deadline here at headquarters is one week (Saturday) before the mast-head date. Editors' deadlines will be as announced in their respective columns.

EASTERN DX FORUM

RICHARD EVANS
P.O. Box 1294
NORTH WALES, PA 19454

Reports from members living east of the Mississippi River
Deadlines: 3/30 4/13 5/2 6/1 6/29 7/27.

Don Moore, Apartado #3, Santa Bárbara, S.B., Honduras

Finally back after a month of travelling through Mexico. Visited quite a few areas. Chiapas I found to be basically a second rate Guatemala. Veracruz, while having little of Touristic interest, is a beautiful and pleasant city with a fine jewelry market. Guanajuato, a very colonial city with an extensive ceramics market and good buys on silver. Uruapan is a worthwhile visit with its national park. Pátzcuaro has excellent buys on wood and copper work. Guadalajara is a modern city, but much more pleasant than Mexico City. Manzanillo has good clean beaches and is not very gringo-ized yet. Mexico is very cheap to travel in typical Peace Corps low budget style. I spent \$340 in four weeks. A comfortable four week trip could be had for \$500 easily. Anyone interested in travel tips to Mexico or Central America just write. While in Mexico, I taped 97 stations at local or near local levels. Would have been more, but I took several overnight buses. One interesting spot was Veracruz, where at night U.S. Gulf Coast stations rolled in overwhelming the Mexicans. Except for locals, most frequencies had only English. While in Colima, I visited the antique car museum, which included some other antiques too. Among them an old closet sized transmitter by Gasco Industries of Rochester. Anyone ever hear of them? The best station I found was Radio Universidad de Guanajuato on 970 kHz, certainly the equal of NPR in quality. The odd one was XESP-1070, Guadalajara. IDing as Radio Juventud (Radio Youth), a slogan usually associated with rock music, it played nothing but big band. Guess you're as young as you feel. Noted an ad in a Mexico City paper for XERPM-660 calling itself "Radio Infantil" (child-like) and "Mexico's only station run for and by children". Unfortunately didn't have time to check this out. Highlight of the trip was watching the Orange Bowl in Guadalajara on Mexican TV with Spanish announcers.

Richard C. Evans, P. O. Box 1294, North Wales, Pennsylvania 19454

Just a quick note to let everyone know that I'm stepping down as EDXF editor. The 8/11/84 EDXF will be my last column. It'll give Phil Bytheway enough time, hopefully, to find a replacement. If you're interested, write to Phil, not to me. If someone comes along sooner, I'm not adverse to stepping down before August (and my wife will be very happy about it...). 13 reports on hand so far for the anniversary issue next week. Gotta run. PTL.

STARADIO MUSIC-96-KAR



RadioWorld, via Fred Vobbe

Radio station drops TV 'snake' ad

DETROIT (AP) — A Detroit radio station no longer will send live snakes slithering across television screens, a move aimed at easing the fears of some Detroit-area elderly women.

WHYT-FM and the W.B. Doner and Co. advertising agency canceled the commercials after complaints published Monday in the Detroit Free Press. Officials said the commercial was aimed at a younger audience, who responded favorably to the snakes.

"We're sensitive to how people feel," said Steve LaGattuta, creative director for Doner. "It was meant to be humorous and tongue in cheek. But if there are people who don't take it that way, we have to be sensitive."

In the commercial, actor Bruce Campbell holds a radio tuned to the contemporary hit station while perched on a rock in a writhing tangle of the reptiles. He calmly says that WHYT-FM has a soothing effect on the coiling creatures.

The spot had a different effect on Mattie Horton, 72, who said she has been unable to watch television because of it.

If she looks at the commercial again, she said, "My heart would quit. The fear goes all over me."

Dr. Kenneth Adams, chief psychologist at Henry Ford Hospital in Detroit, said the commercial could provoke symptoms of extreme anxiety

such as a rapid heartbeat, sweating and clammy skin.

Fear of snakes is "one of the most common fears that people have," Adams said.

"Just because someone reacts to this commercial does not mean that they have some horrible psychological problem. It's not irrational, it's not crazy, it's frightening," he said.

"Our intent was never to offend people," said Maureen Hathaway, general manager of WHYT-FM. "We've had a lot of good calls and good comments."

But Berniece Washington, a volunteer visiting nurse with Greater Bethel Baptist Church, said about 20 elderly patients have complained to her about the commercial.



Western DX Forum

★ ★ ★ ★

HCCA—Serving the Broadcast Band DX'er Since 1964

Editor: Ric Heald, 1632 J St., #3, Eureka, CA 95501

DEADLINES - WEEKLY ON TUESDAY, 12 DAYS PRIOR TO PUBLICATION DATE

RANDY SEAVER, 1154 VIA TRIESTE, CHULA VISTA, CA 92011

The DX highlight of the last year for me was the Seattle convention in July. I started planning for it in May, when I dug out the propagation work that I'd done two years before, and started writing computer programs for my IBM PC to calculate field strength of MW stations based on the Knight (BEC) data. I gave two one-hour talks on propagation and at least half the attendees didn't fall asleep - a new record for my talks, I think.

The Beverage party in the valley of Kirkland was exciting - it looked like a war zone with fireworks on all sides until the wee hours. Somehow, I missed out on a DX location inside the two campers and ended up on the hood of Tony Hemphill's car, where the only catch was that new Canadian, COLD. Why was I on the hood? Because the feed off the Beverage only reached that far. We later moved the car and DX'ed from inside for awhile.

One item of note was the Luxembourg effect noted on KBOI 670 from some sort of station in southeastern Washington - Bill Frahm says he hears the same sound on KOMO 1000 in Boise.

The most interesting station tours were KOMO and KMPS. It was fun to talk DX and propagation with Hall-Patch, Portzer, Bytheway, Moman, Martin, Williams, et al.

The Hemphill's year-old son, John, was more interesting to me than the auction - we had a great time talking about geomagnetic fields - the perfect audience.

Our convention hosts made sure we got some exercise - we walked to KOMO, KMPS, the Coast Guard Vessel Traffic Center (some of us walked), in addition to going between DX shacks at the Beverage party. All in all a job well done, Bruce and Phil - thanks for a great time. (I knew you'd get around to reviewing the convention sooner or later, hi-RTH.)

ROB HARRINGTON, P.O. BOX 3434, LITTLETON, CO 80161

I've finally moved into my own apartment, street address to be given out later so continue using the P.O. Box. Location is in southeast Denver near Holly and Evans, also near I-25 and Evans. No phone yet, but hopefully will have one by the time you read this. And with my own phone, I will not be able to make other than local calls. So if you wish to stay in contact with me, please write or correspond with a cassette.

Do you own a computer? If so, do you belong to COMPU*SERVE? I hope to be on COMPU*SERVE within the next couple of months.

Any DX'er, whether into BCB, SW, LW, etc., planning to be in the Denver area you are more than welcome to stay here. Planning to make accommodations for that shortly with a spare sofa bed.

73.

GARY LARSON, 2806 LINCOLN, BURBANK, CA 91504 (818) 954-0111

Hello. I'm at work in San Fernando (midnight to five). Very windy here at the moment. Am listening to a tape of KBAY FM and soon will DX some with the GE AM/FM.

Tuned in at 0300 ELT and heard s/off from KSUE 1240 Susanville, California, mentioning their FM and to return to the air at 0600 PLT. SSB was a fast paced one, never heard that version before. Also at midnight (local time) I noticed an OC on 710 (KMPC) plus 1470 Tijuana was in with OC.

Am looking forward to the anniversary issue of DXM.

Does anyone know the transmitter location of KSES 1420? Los Angeles Times had a story on Yucca Valley in their travel section and that got me wondering where it was (KSES) and how many towers on their site.

If anyone wants a program guide for local non-commercial KCSN 88.5, let me know.

I picked up a pirate on 540 a couple weeks ago ID'ing as KDX. Maybe a pirate but interesting to listen to. Wish I could contact its owner to arrange for a visit.

As I write, I'm DX'ing and sending a report to WDXR - finally. 73.

(What happens to journalism students who flunk out? Why, they resurface in the most unusual places - so once again it's time for - JAISUN'S JOURNAL II) JEP JAISUN, KIRKLAND, WA (He doesn't believe in return address, folks, hi-Rth)

Call letter change a-comin'. KIXI 880 has sold its FM affiliate and tossed in the calls, too, so look for a change coming fairly soon. . . as soon as they can figure out what they want. Originally, KIXI was on 910 and the IX-I stood for 9-1. Now that they've moved to 880, the calls are irrelevant. I suggested they try KVIII, hi, but we've already got one here (KVI 570. . . you'll notice that V-I makes 5-1, not 5-7. Bad math, hi). I tell ya, too, when KIXI changes calls it'll be about the most exciting DX here all season.

Man, talk about a washed out winter. Since October I've logged 15 "new" stations, six of them being changes to (or new on) previously clear channels, and two call changes. Whoopee. By this time of the year I've usually got 75-100 newies in the bag. Even the TPs and DUs have gone "TU" this season. Anybody want to buy an SP-600 cheap, hi?

In a related development, you know how some of us occasionally joke (ha ha) about cutting the umbilicus to one or more of our local pests? Well, looks like someone not too far north staged a pre-emptive strike against KGDN 630. They currently broadcast from Edmonds, ten miles north of Seattle, but they've been approved for fulltime with transmitter change to Bothell, about 10 miles east of Edmonds and three miles north of my receiver. Right down the old northfacing throat, as it were. They were getting ready to test their new three-tower array when a vandal with an awesum (hi) nail clipper dropped one of the towers. Sickening crunch. \$50K damage. No April NSP s/on. Awwwww. Call me cruel, call me heartless. OK, it was a dumb thing for somebody to do when the could have just as easily thrown a crowbar across the power grid. But heck, I've already logged these guys. Just cuz they wanna go 24 hours doesn't mean anybody wants to hear 'em. Especially me. Not that 630 is that popular around my shack, but there are adjacent channels, ya know. Also, what do you get when you add 630 and 910? 1540, which is KJZZ Bellevue, ten miles south beaming north. This could get real messy. (Besides, all you have is KFI on one side and KGW on the other, so KGDN will eliminate those two slop kings, hi-Rth.) (Be sure and tune in same time, same station, possibly same channel if it hasn't been reassigned, two weeks from now, for another chapter of JAISUN'S JOURNAL)

RIC HEALD, 1632 J ST., #3, EUREKA, CA 95501 (707) 443-1685 M-F 9-6 or (707) 443-2704 SAT 9-2 PLT & ppd

Greetings and all that usual stuff. Just a brief reminder that should you call, best time M-F is between 1700 and 1800 PLT. I manage a busy travel agency and at times it's impossible to take personal calls. Onward. . .

Quite possibly deregulation of the FCC and the insuing craziness on the BCB will go the way of the travel industry - at least I hope so. Our predictions seven years ago were that there would be massive price wars among the airlines, there'd be mergers, bankrupt airlines, and then, steadily increasing prices. We're now seeing the latter two. With the majority of markets now claiming an FM'er as numero uno in a given market, AM radio is fading in favor of FM. If the FCC allows an overkill of new stations in small or (better yet) suburban areas, they quite possibly won't be able to survive after a few brief (hopefully) years. As with the airlines, markets will be so oversaturated not everyone will be able to survive. Like with air transportation, there are only so many passengers who will travel. Increase number of transcontinental airlines three and four fold under deregulation (which has happened) and someone comes up the loser. I feel the same will be true with stations. There's only so far the advertising dollar can go.

Next week, anniversary issue. See ya then. 73 de Rth. .

Typos corrected by flunked out journalism student, hi.

At
C-

RADIOKANSEL -- RADIO PULPIT

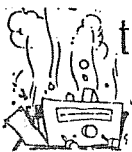
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broadcasting on

RADIO 540 MEDIUM GOLF
MEDIUM WAVE

BOPHUTHATSWANA

"Die stasie vir inspirasie" - "The station for inspiration"



the irca technical column

Editor: Nick Hall-Patch
1538 Amphion St.
Victoria, B.C. V8R 4Z6
Canada

A collection of oddments this time.... first of all, if your review of the TS430 transceiver in the Jan 14/84 DXM was hard to read (mine was), I can send a readable copy to anyone interested.

News from Europe

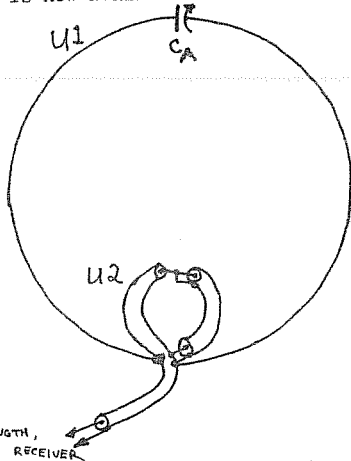
Harking back to that same issue, Ben Peters sends more information on using his wall-mounted loops. For daytime and top-band nulling, try connecting terminal 3 (or 4) to receiver chassis (via shield of coax if you're using it), and terminal 4 (or 3) to the receiver antenna terminal. Nulls may be harder to find, but DX signal strength may also be much better. Try connecting terminals 1 and 6 together in this mode as well.

Another nulling trick for those who don't like to have to tilt a big loop for a deep null, is to construct a ceiling loop similar to that described in the Dec 10/83 DXM. This is a two turn "box" loop wound near the ceiling (horizontally) and resonated with a suitable value variable capacitor. Null the unwanted signal as best you can with the regular loop, then tune the ceiling loop for a deeper null. (This system would not be a good idea if you wanted to make accurate direction finding measurements with your loop). This is a similar idea to Mike Levintow's "Using Two Loops to Generate Asymmetrical Receiving Patterns" (IRCA reprint A12).

----The new Grundig Satellit 600 (successor to the 3400) is available now for the equivalent of about US\$500; has automatic "motor driven" presel-ector on LW/MW/SW, plus manual fine tuning. System seems to work well according to the December '83 issue of FUNK.

-----A West German Amateur has been experimenting for several years with loop antennas which can be used for transmitting on the 80 and 40 meter bands, and in the process has found them very effective for receiving in those bands as well. His best version recently appeared in the German amateur radio magazine CQ-DL, and the device is now available commercially in Germany. The design might be of interest to those who favor the possibility of large sensitive loop antennas.

U1 is 10.5 meters circumference, and is formed of 20 mm diameter copper pipe. C_A is about 160 pF and is tuned remotely using a small barbecue (rotisserie?) motor. The pick-up turn (U2) is formed of 2.1 meters of RG-213/U coax connected as shown. The ratio of U1 to U2 length is apparently best at 5:1. The whole device is rotated by a TV rotor. This has also been used against a vertical and two radials for a cardioid pattern. U1 and U2 can be more than one turn according to the designer. (the mind boggles at applying something like this at MW!)



-----If you know enough of the language to read a simple German novel, and have a German-English technical dictionary, Die Deutsche Funkpeil-und-Horch-Verfahren bis 1945 by Fritz Trenkle (ISBN 3-87087-129-6) may be of interest to the dedicated loop builder, as it covers radio direction finding techniques in Germany up to 1945--a subject of some interest to the military, so a fair bit of research went into it. Gives lots of practical info on air-core loops, "cross-loops", goniometers etc. etc. Cost is in the US\$20 range; info from AEG-Telefunken AG/Anlagentechnik, Geschäftsbereich Hochfrequenz-technik, Sedanstrasse 10, 7900 ULM, West Germany.

(all the above from Ben Peters)

----and for those who read German, how about "SW Receivers--Which to Choose", a compilation of over 50 very professional test reports by Rainer Lichte, who does the receiver testing for the German publication "Weltweit Horen". Most of us will need a translation unfortunately.

(Dennis Kibbe)

(ed. note: from what I've seen, anyone with a serious interest in things technical has a great advantage if they can read German. There's some pretty interesting things going on in the German speaking part of Europe. Something to keep in mind if you'd like to learn a second language...)

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For the incurably orderly as well as technically inclined, here's an index of what's been happening in the tech column for the last 5 years:

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* * * * *

Ferranti Semiconductors is making the ZN415, a TRF AM radio IC, in an 8-pin DIP. It is very similar to the ZN414 used in the homebrew receiver described in the March 7/81 DX Monitor, but includes enough audio amplification to drive low impedance headphones at a low power level. A 1.5 volt supply at a few milliamps is all that's needed along with a few external components. (I have a list of distributors if anyone's interested, but these IC's list at \$10 in single lots--ed.)

(info from Mike Bittner & Ferranti Electric)

Here is a quick, easy, and above all, cheap way to create labels for that next electronics project. Stick a piece of Scotch Magic tape to the platen of your typewriter. Type out the label, then use another piece of magic tape to lift off the ink from the first piece. Trim the tape neatly and stick it to your project. Doesn't look too bad, does it?

(Dennis Kibbe)

The Martens MW Loop Antenna

This commercially available antenna has been used by European DXers for the past few years, and a few of them have now turned up in North America as well. It is a small unbalanced air-core loop (approximately 16" x 10"); it comes with a two MOSFET amplifier, which can be switched out if desired. An unusual provision in the amplifier is the option of regenerative feedback to sharpen selectivity and improve DX signal strength. There is no provision for tilting and rotation is effected by moving the loop around on whatever surface it is placed on. Both the amplifier and the two tuning capacitors (the second is for fine tuning) are placed within the winding, which runs counter to accepted North American loop design. Two IRCA members, George Hakiel and Don Moman own this loop, and thanks to them we have some comments regarding its usefulness.

Sensitivity---George feels that with the regenerative amp, the Martens has more sensitivity than the NRC 4' loop. Also because of the regeneration, tuning is sharper on the Martens loop than on the NRC loop. In fact, the Martens' bandwidth can be narrowed to about 1 kHz, and George has found that at his location, the extra selectivity is very useful for digging out foreign splits. The fine tuning capacitor can give a passband effect in this case.

After initial problems with his Martens loop (due to shorting turns apparently; tightening up the windings with spacers improved matters greatly), Don found that it was quite sensitive, more so than a Radio West loop, but not by an outstanding amount, and that regeneration did help to shave sidebands. However, the Martens was only useable out in the country. In the city, 99% of frequencies were unuseable because of cross-mod from the locals when using the amplifier; due to its small area, it is rather insensitive when the amplifier is not used. This would be a severe limitation for many city DXers. In general, Don has found that the unamplified NRC loop gives a slightly better signal to noise ratio than any amplified units.

Nulling---The NRC loop gives much better nulls than the Martens according to George, especially when the NRC loop is tilted. Tilting the Martens loop does not seem to improve its nulls particularly. Don has found poor nulling ability for the Martens within the confines of the metal and wiring of his basement, yet other loops give reasonable nulls there. Away from the basement however, nulls are quite reasonable.

Direction Finding---George states that the Martens is no match for the NRC loop here, because the Martens is an unbalanced loop.

Miscellaneous---Don felt the loop was quite well constructed overall, and particularly liked the gear reduction drives on the tuning capacitors.

George adds these comments: "To make the Martens loop operate at its best, I have found out several things about it. First, one needs something to make it revolve--a large "Lazy Susan" is good. I use a small revolving table, being sure not to touch the loop, because it is sensitive to the touch. Make sure not to use a ground on the receiver---also, try to keep other antennas away from the loop. Sometimes grounding your outside antennas helps the loop null better. This is not always true. Both ways must be tested.

The most important thing that I have found about the loop's nulling ability is the distance and height that it is placed from the receiver. These two items are probably the reason for its rejection by many people. The height of the top of the loop should be 3 to 5 inches below the receiver. The distance from the receiver is variable--sometimes the nulls are better near the receiver, but this varies at different times of the day."

So--an interesting device whose principal selling points are sensitivity and selectivity, but which falls down on strong signal handling and nulling. Regenerative loop amplification has not been investigated particularly on MW until now (Mark Connelly's APT-2 amplifier would be a possibility), although longwave loops have been built with regeneration by experimenters. More experimentation in this field is needed, particularly if we are to avoid overloading such amplifiers in our RF loaded urban environments.

Price of the complete Martens loop and other info may be obtained from: Jürgen Martens, Adolf Damaschkestr. 32, D-7410 Reutlingen, 11, West Germany. Enclose an IRC or two...

Mark Connelly - WA1ION DX Labs - 28 FEB 1984

Introduction

The varactor is a diode which can be used as a voltage-controlled variable capacitor. This is done in a reverse-biased condition (cathode voltage more positive than anode voltage). Low-value varactor diodes have long enjoyed popularity in VHF/UHF TV tuner applications and also in functioning as externally-adjustable trimmers to peak the performance of various circuits within professional-grade commo RX's (communications receivers).

Several varactors introduced recently have relatively high maximum capacitance (over 300 pF) and high C_{max}/C_{min} ratios (12 to 1, or better). These include Motorola's MV1401, MVAM100, and MVAM109.

Instead of using the traditional 10 to 365 pF variable capacitor in antenna tuner, loop, VFO, phaser, and receiver circuits; one may sometimes find that the varactor is a useful alternative. The primary focus of this article will be the use of these larger capacitance varactors, as there already have been articles in the DX press (available as reprints) about using the smaller capacitance varactors as externally-tweakable trimmers in homebrew receiver designs.

There are both advantages & disadvantages associated with replacing a conventional variable capacitor with a varactor diode. Each circuit to be considered has its own particular characteristics which may weigh towards use of varactors or towards use of variable capacitors.

The advantages & disadvantages of using varactors in several MMDX-enhancing projects will both be addressed.

Varactor Advantages

SIZE: A varactor diode and its associated pot generally occupy less space than a full-sized 10-365 pF air variable capacitor. Miniature mica-dielectric variable capacitors may occupy less space, but these mini-caps. are notoriously prone to early failure.

IMPROVED CIRCUIT-BOARD LAYOUT: A varactor may be mounted directly on an active-front-end circuit board with other components, whereas a variable capacitor is control-panel-mounted (in other words, off of the circuit board). The cable connection between the variable cap. & the circuit card adds extra capacitance (decreasing the C_{max}/C_{min} ratio). If the variable cap. is 'floating' (= neither side grounded), undesired stray coupling leading to unplanned feedback may be another side effect. Floating variable capacitors present assorted other problems, such as hand-capacitance detuning effects and mechanical assembly / mounting difficulties far greater than those involved in the installations of one-side-grounded variable capacitors. The pot controlling a varactor, on the other hand, controls only DC, not RF, so it may be located at a considerable distance from the circuit card with no stray coupling problems, reduction of tuning range, or other ill effects. Cabling to this control pot can be simple twisted-pair or 2-conductor speaker wire rather than expensive, harder-to-prepare coaxial cable.

REMOTE TUNING CAPABILITY: This is, by far, the greatest advantage of varactors over variable capacitors. A tuner or tunable-amplifier may be located at a considerable distance from a control box. Remote tuning is very valuable when the antenna to be used must be in a noise-free, good-signal-pickup area (e. g. outdoors) while the receiver to be used is in an area of considerable RF noise (and also, perhaps, of considerable broadcast-signal attenuation).

A typical situation demanding a remote tuner is that of a DX shack located in the basement of a large steel-frame apartment or industrial building, a shack site far from windows or other outside exposures. Any antenna wire brought in from the outside picks up so much noise (from fluorescent lights, TV's, dimmers, computers, motorised

machinery, etc.) that it would be worthless at the point that it reached the receiver.

The solution would be to locate a wire aerial either on the roof of the building or in a nearby open outdoor area; an outdoor remote tuner-amplifier fed by this aerial could then send desired-frequency signals back to the receiver site through low-impedance shielded coaxial cable to prevent any noise-pickup. A second coaxial line, consisting of 2 inner conductors & a ground shield, would transfer amplifier DC power, varactor control voltage, & power ground to the remote tuner from the control box. Good grounding and stiff RF-decoupling at each end of the DC lines, as well as proper impedance management on the RF coaxial line, would be required to keep noise pickup to an absolute minimum.

Varactor Disadvantages

INFERIOR STRONG-SIGNAL-HANDLING CAPABILITY: A varactor being 'hit' with a strong signal will tend to produce spurious signals on other frequencies. The more strong signals present, the worse the spur problem gets as the varactor starts behaving more like a mixer and less like a capacitor. The variable capacitor, on the other hand, is relatively 'bulletproof': not likely to introduce any distortion products. With varactors, steps have to be taken to ensure that, when desired stations are properly peaked, garbage from way-off-channel stations is kept to a minimum. Reducing overall system sensitivity by loosely-coupling the antenna is often the only solution. This is usually implemented by selecting a small-value coupling capacitor (less than 22 pF) between the aerial wire & the tank. Unfortunately, doing this severely reduces low-band sensitivity (already at a disadvantage if aerial length is less than 100 m.). The small input coupling capacitor solution is OK if the strong offending stations are MW broadcast only; it, however does not cure VHF-mixing-caused spurious 'hash' in areas of strong TV & FM signals. Indeed, the small coupling capacitor makes the VHF QRM situation worse: MW signals are attenuated considerably, whilst VHF signals sail through even an input capacitor as small as 5 pF with little difficulty. Inductive loose-coupling may be one way to lick the VHF-trash problem. This may be accomplished by connecting the aerial wire to the junction of two inductors that we'll call L1 & L2: L1's value would be about 90 % of the total required tank inductance, L2 the other 10 % or so. The opposite end of L2 is routed to ground whilst the opposite end of L1 goes to the tuning capacitance. Really difficult spur problems may require custom-designed bandpass & band-reject filters, optimised for the specific aerial, ahead of the remote tuner. It's useful to note that a longer aerial will present fewer VHF-related spurious problems than a very short one. Urban & suburban areas - the most likely locations requiring the use of remote tuners - also present the greatest problems in the realm of strong-signal management.

NEED FOR REGULATED CONTROL VOLTAGES: For a varactor to maintain a (somewhat) constant capacitance, the control voltage should be regulated. Regulators gobble up a good deal of current to transform an unregulated or sloppily-regulated (and perhaps noisy) input DC voltage to a lower, firmly-regulated, clean output DC voltage suitable for varactor control. Many varactors do not attain their minimum capacitance until the applied voltage is considerably greater than 9 volts. [Note: Maximum varactor capacitance is at minimum applied voltage; minimum capacitance at maximum applied voltage. Normal minimum voltage is about 1.5 V.]

These considerations make battery-operated varactor control circuits impractical, at best. Use of a mains-AC to regulated-DC power supply is mandated for good results. For the MVAR108 & MV1401 varactors, with required maximum voltages in the 9 V to 12 V ballpark, the Radio Shack # 22-124 regulated 12 VDC supply (designed for home operation of car stereos & CB's) is probably the cheapest, easiest way to go. Some mains-powered commo RX's may provide built-in user-accessible regulated supplies of +12 VDC or greater.

GREATER EXPENSE (in some circumstances): A high-capacitance varactor may alone cost close to the \$7 to \$11 pricetag that a good 10-365 pF air variable retails for today. Even a two-

air-variable scheme (10-365 pF main tuner in parallel with a 3-30 pF fine tuner), costing about \$15, may be cheaper than a one-varactor setup when you consider that, for really good varactor control, a regulated DC supply is necessary. Furthermore, a 10-turn type pot with a turns-counter dial (another sizeable chunk of cash) is the best way to control varactor voltage for fine-tuning capability rivalling that of a dual variable air capacitor configuration.

Other cost considerations include the need for additional fixed-value resistors, coupling/decoupling capacitors, & RF chokes in some varactor-implementation strategies.

Few DXers live within reasonable driving distance of electronics shops (catering to the general public) which stock the new high-C varactors. Therefore, the costs of shipping & handling get into the varactor cost-consideration equation, as well.

RANDOM CAPACITANCE DRIFT: A varactor, even when controlled by an absolutely pure & stable filtered DC voltage, may shift its capacitance (admittedly just slightly) more than an air-variable capacitor would. This could be detrimental in critical applications such as the production of phasing-nulls & regeneration (super-Q) peaks: situations demanding a set capacitance that remains rock-steady until intentional change is desired.

When to Use Varactors

Varactor technology is best applied (1) in remote tuners properly designed to prevent undesirable overloading/spurs, (2) in receiver local-oscillator circuitry and AGC-controlled circuitry in which the varactor will be acting upon a known-acceptable-level, essentially-single-frequency signal, and (3) in circuits where the length of cable between a panel-mounted capacitor and internal circuit-card components could contribute too much capacitance or other undesirable side effects.

When Not to Use Varactors

There is little or no justification for using varactors in non-remote tuners, especially in those not requiring 'floating' tuning capacitors and in those which will be used (1) in strong-signal areas, (2) for regeneration, (3) for phasing, and/or (4) with batteries or with no other required power sources (e. g. passive tuners).

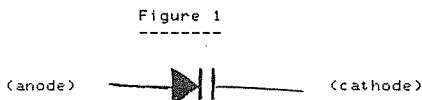
Varactor Circuit Implementations

Now that we've covered the pro's & con's of varactor diodes, it may well be worthwhile to see how these devices are connected to replace the conventional variable capacitor.

The Motorola RF Data Manual is a goldmine of useful information in this regard; it also covers related areas of interest such as high-frequency amplifier design using both discrete transistors and the immensely-usable MWR & MHW - ranges of hybrid amplifiers / 'gain boxes'.

The symbol for the varactor diode is like that of a conventional diode except that it has an added line at the cathode end. Some add a curved line instead of a straight line just as some represent a capacitor with a straight line & a curved line instead of with two straight lines.

Figure 1 shows the most common varactor symbol in use:



Circuits to follow include:

- Figure 2: C to ground from RF-high in parallel-LC tank
- Figure 3: 'Floating' C across balanced loophead (DC ground accessible via loop centre-tap)
- Figure 4: 'Floating' C, general case (DC ground not necessarily available to cap. in the original circuit design)
- Figure 5: A varactor-tuned non-remote MW aerial tuner
- Figure 6: A varactor-tuned remote MW aerial tuner (semi-block-diagram format, based upon Figure 5).
- Figure 7: A varactor VFO (variable-frequency oscillator) for broadcast-band applications [receiver LO, QRP-transmitter driver, frequency-spotter/digital-counter driver, etc.] (Fig. 7A = VFO Overall Schematic) (Fig. 7B = VFO Card Subassembly)

Appendix: Manufacturer-Supplied Plots of Capacitance versus applied Reverse Voltage

FIGURE 2

Parallel-LC - tank from RF-high to ground

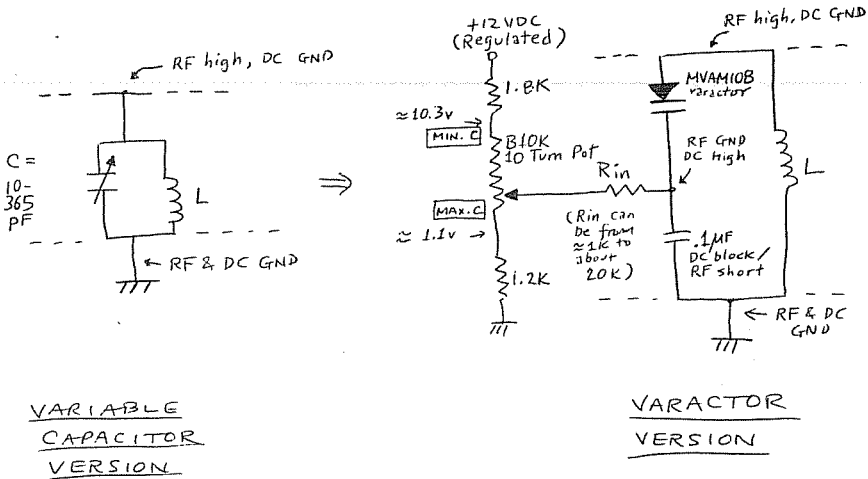
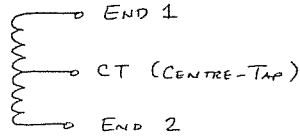
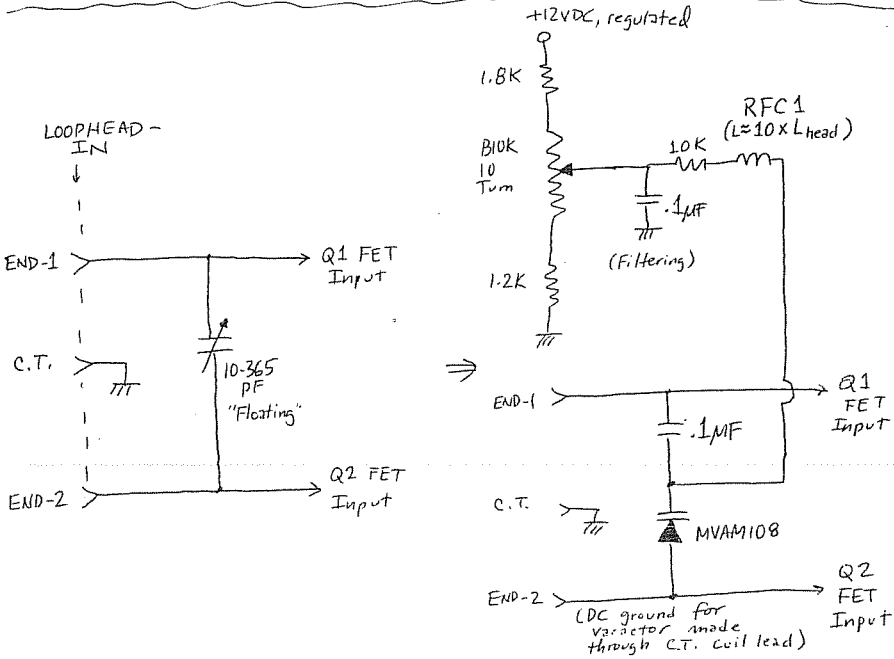


FIGURE 3 : Balanced Loop

Note : Loophead =



$L_{HEAD} =$ Inductance measured from END 1 to END 2



VARIABLE

CAPACITOR

VERSION

VARACTOR

VERSION

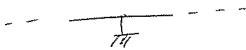
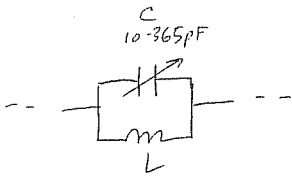
(Note : when changing from variable - capacitor to varactor it may be necessary to decrease loophead inductance)

FIGURE 4

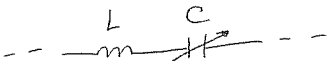
GENERAL - CASE 'FLOATING'

(= NEITHER SIDE GROUNDED) VARIABLE CAPACITANCE.

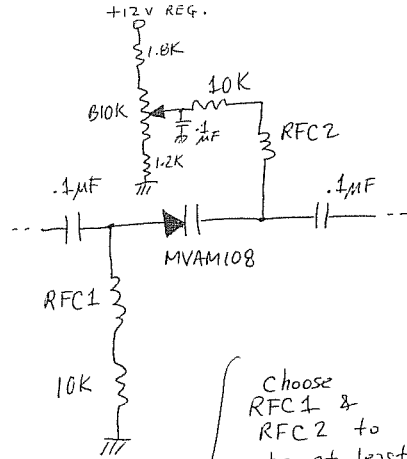
DC-GROUND CONNECTION TO CAPACITOR PRESUMED TO BE ABSENT IN ORIGINAL CIRCUIT.



(OR)



VARIABLE CAPACITOR VERSIONS



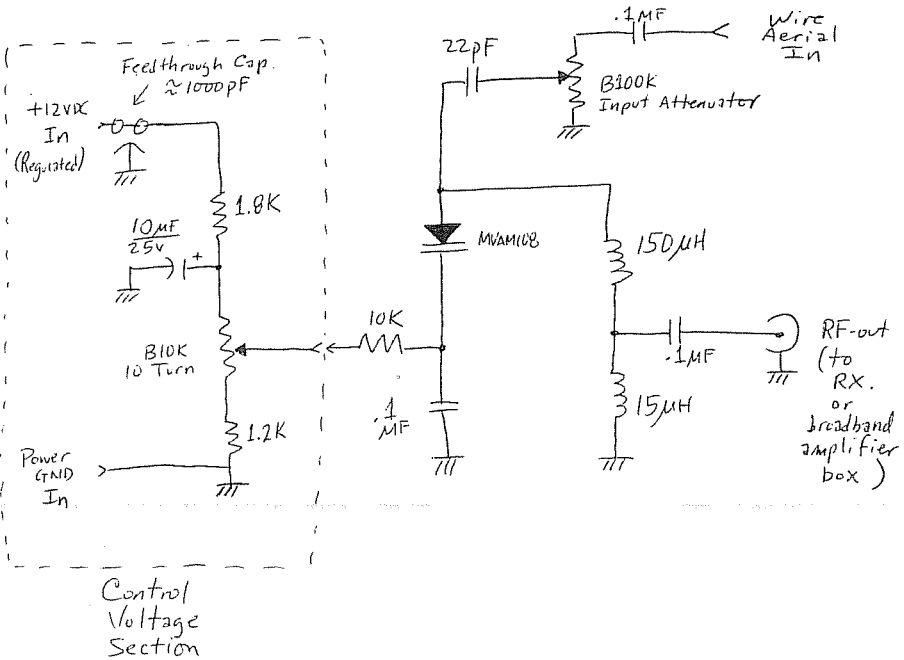
⇒

Choose RFC1 & RFC2 to be at least 6 times the value of the inductor connected to the varactor circuit

VARACTOR REPLACEMENT FOR VARIABLE CAP. SECTION OF DRAWINGS TO LEFT.

FIGURE 5

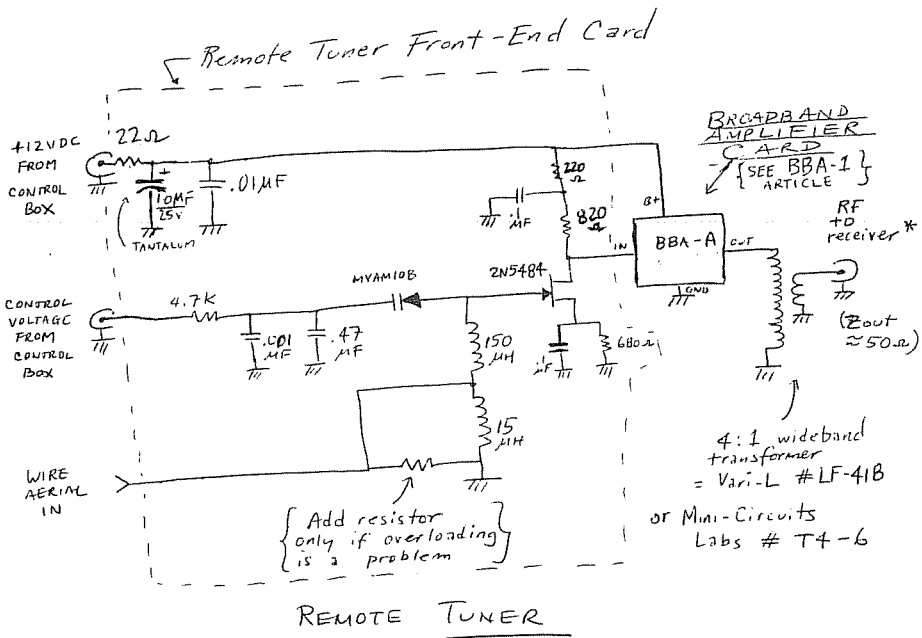
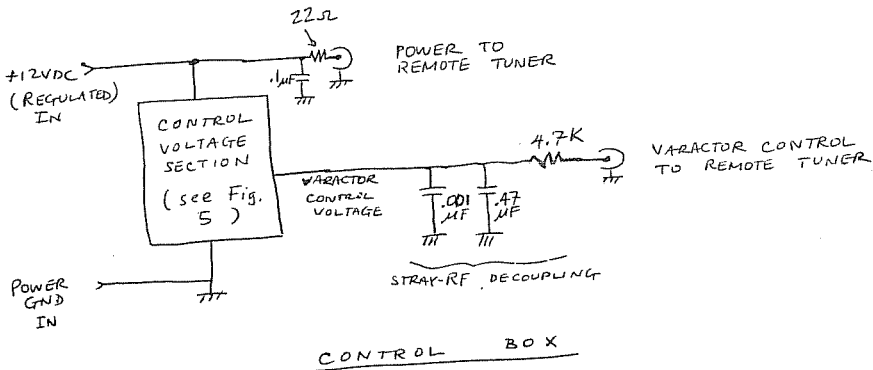
A NON-REMOTE VARACTOR MW AERIAL TUNER,
USING CAPACITIVE INPUT COUPLING



Notes: There is little appreciable voltage drop across the 10K fixed resistor.

With the varactor cathode at approximately +1.2VDC, the frequency of peak reception should be approximately 530 KHz. with the above circuit. If a +10VDC cathode to ground voltage is set, resonance at (about) 1620 KHz. should occur.

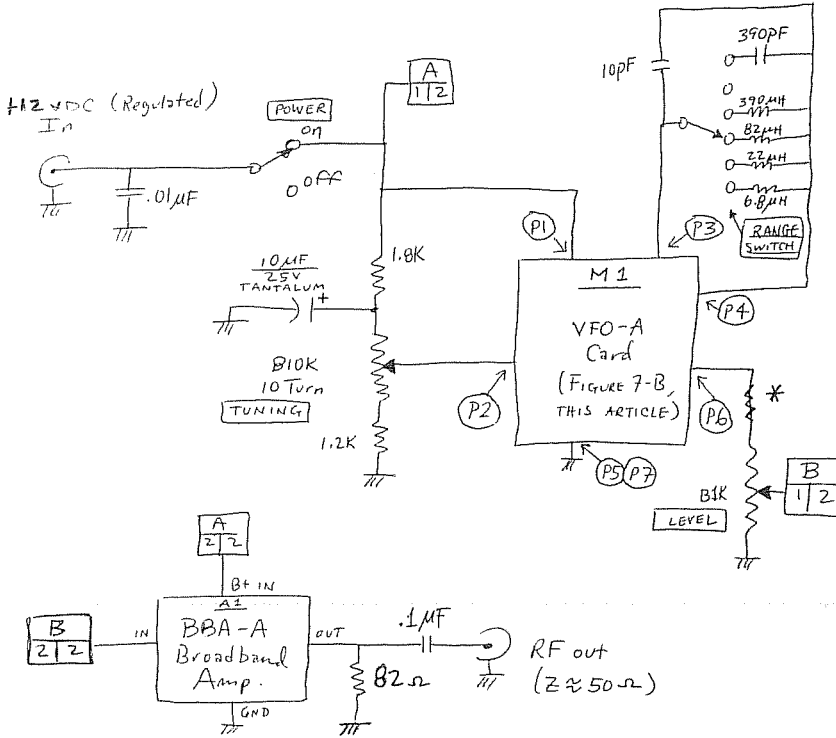
FIGURE 6 : REMOTE TUNING SYSTEM



* Impedance at receiver-end of RF cable should be approx. 50Ω.

FIGURE 7-A

Varactor Longwave-Mediumwave VFO Overall Schematic

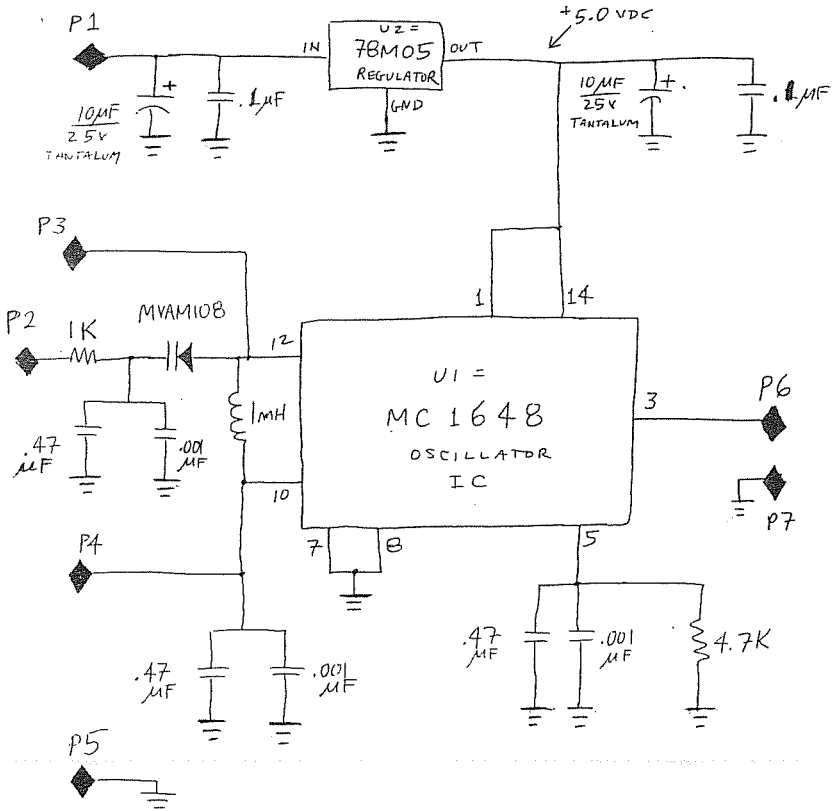


* = Add resistor between VFO-A Card and pot, if necessary, to keep maximum level output undistorted.

VFO USES

- (1) ZERO-BEAT STATION, TAKE FREQUENCY MEASUREMENT ON A DIGITAL COUNTER (= "SPOTTING")
- (2) DRIVE A LOW-POWERED TRANSMITTER (E.G. 1750-METRE BAND)
- (3) LOCAL OSCILLATOR IN HOMEBREW RECEIVERS.

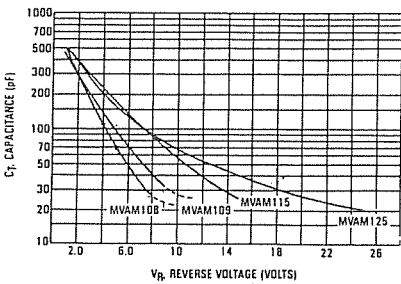
FIGURE 7 - B : VFO - A Card
(M1 of Figure 7 - A)



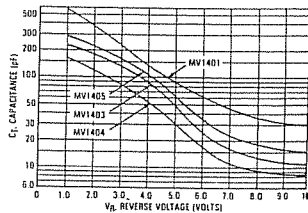
APPENDIX

Manufacturer - supplied varactor
voltage - versus - capacitance plots.

CAPACITANCE versus REVERSE VOLTAGE



DIODE CAPACITANCE versus
REVERSE VOLTAGE



EASTERN DX ROUNDUP

Bob Lazar

11011 Becontree Lake Drive, #410

Reston VA 22090

Deadlines: Mondays 3/19, 4/2, 4/16, 5/7

Of Special Interest

- 790 WAKY KY Louisville, 2/20 switched to Mutual net at 0000. (RCW-OH)
840 WHAS KY Louisville, 2/20 switch to ABC-Information net including Paul Harvey, at 0000. (RCW-OH)
980 WWRC DC Washington, new call letters for WRC! I'm finding it hard to believe but the hourly ID is definately WWRC. All other IDs are just "WRC". This stn was recently sold by NBC. Format remains news/talk with NEC network. (RAL-VA)
1080 WCII KY Louisville, 2/20 switch to CBS net at 0000. (RCW-OH)
1540 WPGR PA Philadelphia, 2/26 1752 s/off by m, ment of sister stn WSNI-FM, no SSB, good. Apparent call sign change. (RCR-PA)
540 WGTO FL Cypress Gardens, 2/19 1812 promo for \$54 giveaway, ID "54-GTO" into C&W mx, lost at power change. (DLR-KY)
570 WVMI MS Biloxi, 2/19 1821 ID "57 cx WVMI", cx mx. (DLR-KY) (David, the abbreviation "cx" means "conditions", as in reception conditions, not "country" as I assume you mean here. --ed)
610 KDAL MN Duluth, 2/20 1808 MN mx, lcl spots, ments of Duluth, but no ID so tentative. (DLR-KY)
790 WLBE FL Leesburg, 2/25 1525 ID into NBC mx w/ ad for Trident gum and U.S. bonds, SID into FN mx at 1530. (JBH-FL) (I'm guessing that "FN" is "Florida Network"?--ed)
860 WAEC GA Atlanta, 2/18 1800 IDs - "Love 86 WAEC", lcl spots into REL pop mx. Good. (DLR-KY)
900 WWJD GA Savannah, 3/1 1820 "the spirit will continue on WWJD", into gospel mx. Fair but fading fast to CMKB. (JBH-FL)
940 WLQH FL Chiefland, 2/29 1700 ID into AP mx. U/ WINZ. New! (JBH-FL)
CBM PQ Montreal, 2/26 0112-0115 s/off by f, long list of affiliates, GSQ. Xlnt. (RCR-PA)
950 KXJK AR Forrest City, 3/1 1904 ID noted w/ pop mx in Cuban null. (JBH)
WGTA GA Summerville, 2/28 1825 ID, s/off anmts, o/o by Tri-State Broadcasting Corp. (DLR-KY)
1000 KTOK OK Oklahoma City, 2/20 1850 wx, lcl mx, lcl spots, IDs. Good o/u WCFI. (DLR-KY)
1140 WSAO MS Senatobia, 2/28 1845 mx by Culture Club, ID, prayer, s/off anmts, ment of 5000 watts, o/o by Northwest MS Broadcasting Corp., Inc. (DLR-KY)
1180 WKKE MS Pearl-Jackson, 3/1 C&W mx, ID at 0800 as "The spirit of the new South" and CNN radio mx. (RCW-OH)
1320 WVLY MS Water Valley, 2/26 s/off 1843 w/ full info & what sounded like last few bars of "America." (KVJ-GA)
KNCB LA Vivian, 2/26 1855 w/ B/SOL mx, ancr name Jerry King. (KVJ-GA)
1330 WWAB FL Lakeland, 2/26 1327 ID noted into pop mx. Fair. (JBH-FL)
1350 WGAD AL Gadsden, 2/18 1837 lcl spots, SID, into mx. (DLR-KY)
WDCF FL Dade City, 2/25 1515 C&W mx w/ ID & ads at 1515. My closest unheard! Fair sig thru much TVI. (JBH-FL)
1360 KSCJ IA Sioux City, 2/25 1823 lcl spots, wx, into mx by Natalie Cole. (DLR-KY)
1370 KAPB LA Marksville, 2/28 s/off 1857 w/ full info, FM ment & SSB. (KVJ)
KTPA AR Prescott, 2/28 poor sig w/ s/off 1900 w/ 6:00 a.m. s/on ment. (KVJ-GA)
1380 WRBQ FL St. Petersburg, 2/18 2349 lcl spots, SID - "Hit radio Q-105", into mx by Pink Floyd. (DLR-KY)
1390 WTJS TN Jackson, 2/18 1901 w/ U. of TN basketball net, local ads, ID. (RCW-OH)
WLVA VA Lynchburg, 2/18 2157 w/ Herb Alpert mx, ID & Ai mx. (RCW-OH)
1420 KTOE MN Mankato, 2/25 1841 lcl spots, ments of Mankato into C&W mx. (DLR-KY)
1460 WBAR FL Bartow, 2/26 1019 ID into soft pop mx, SID at 1033. (JBH-FL)
1570 KQWC IA Webster City, 2/22 1902 talk of IA state wrestling championships, ments of Webster City. (DLR-KY)
1580 WCCF FL Punta Gorda, 2/26 0949 ID w/ oldies mx this morn. Fair sig w/ much WRXB-1590 splatter. (JBH-FL)

1580 WUIV NC Icard, 2/22 1800 ID, s/off anmths, o/o by Unical Broadcasting Corp. (DLR-KY)
 WTTN WI Watertown, 2/26 1830 wx & s/off by m, no SSB. Fair at best. (RCR-PA)
 1590 WONX IL Evanston, 2/12 1859 w/ SS pgm, long SS ID, "WONX Evanston" ID in middle of SS by f. Is WONX SS on Sunday nights? (RCW-OH)
 1600 WCPK VA Chesapeake, 2/23 1745 s/off by m, mx by Arthur Godfrey, no SSB. Good signal. (RCR-PA)

Eastern DXers

JBH - Jody Hughes, 13720 Gulf Blvd. #401, Madeira Beach, FL 33708 (DX-160, R-1000, Radio West loop)
 KVJ - Karl Jeter, 2115 Scarbrough Rd., Stone Mountain, GA 30088
 RAL - Bob Lazar, 11011 Becontree Lake Dr. #410, Reston, VA 22090
 DLR - David Reitz, 9332 Fairground Rd., Fern Creek, KY 40291 (DX-160, GE Superadio)
 RCR - Robert C. Ritchy, R.D. 1, Box 738, East Freedom, PA 16637
 RCW - Bob Walker, 16 Wythe Court #10, Fairfield, OH 45014 (GE Superadio, HQ-129-x, longwire)

Robert Kramer
 6416 N. Richmond
 Chicago, IL 60645

CENTRAL DX ROUNDUP

UnIDed, SPECIAL, CHANGES, et. al.

780 WPTN TN COOKEVILLE, 2/14 1828 weak w/mx in WBBM null, good by s/off. ex-1550. LEB-IL
 810 WDDD IL JOHNSON CITY, 2/28 noted w/new calls. ID as "W triple D" or "Triple D", ex-WDDW. LEB-IL
 1580 WIZY GA COLUMBUS, 2/2 now using new calls. No format change noted, ex-WCIS. LEB-IL

All da Rest

630 KSLR TX SAN ANTONIO, 2/6 0100 fair w/rel pgm & s/off. KDF-IL
 640 CBN NF ST. JOHNS, 2/27 1830-45 very readable w/CBC pgm "As It Happens" about bi-lingual laws in Manitoba. Call to CBN couldn't verify content, but did say this was the right CBC feed. Abruptly gone at 1845, pattern change ?// (Larry, CBN is nondirectional, so they wouldn't have a pattern change. CBN is also 10 kw fulltime, so there would be no power change either. I would suspect that what you heard was WOI. They sign-off at 1845 during February. It is not all that uncommon for public radio stations to air programs produced by the CBC. Before counting this one I would check with WOI, ed.) LEB-IL
 730 WFMW KY MADISONVILLE, 2/12 1859 fair w/mx & s/off. KDF-IL
 920 CFBY MB PORTAGE la PRAIRIE, 2/27 0129 good w/C&W mx & "C-Fry" ID. RK-IL
 1060 KIMO CO IONGMONT, 2/27 1913 dominant w/sports tlk, // K1AK-1600. LEB-IL
 KNLV NE ORD, 2/14 1915 weak w/s/off mixing w/KYW. LEB-IL
 1140 KNAB CO BURLINGTON, 2/19 1937 fair w/lcl ads, wx, ID. LEB-IL
 KMMZ WY GREYBULL, 2/19 1845 weak but constant w/mx, wx, ads, ID as AM 1140. Several mentions of 10,000 watts, never gave call letter ID. LEB-IL RK-IL
 CKXL AB CALGARY, 2/26 0310 fairly good, even w/WJJD slop, w/rck mx, MST TC & ID.//
 1360 KSCJ IA STIOUX CITY, 2/25 1848 fair w/rr mx, lost to KKBJ. TMJ-IL
 1380 WYNK LA BATON ROUGE, 2/21 1845 s/off on top of mess. TMJ-IL
 1420 WEMT TN ERWIN, 2/17 0559 fair through WOC w/s/on. KDF-IL
 1540 KBXM MO KENNETT, 2/22 1845 very weak in KXEL null w/possible s/off. TMJ-IL
 1560 WKXK IN PAOLI, 2/24 0600 s/on fair until 0630 w/mx, farm rpt o/WQXR, no sign of WPAD. TMJ-IL
 WMIC MI SANDUSKY, 2/24 0559 very weak s/on o/WQXR into nx & gone. TMJ-IL

The Illinois Quads:

LEB... Larry Black RRI Box 108A Glenarm, IL 62536 (R-1000, SM-1)
 KDF... Karl Forth 2714 N. LeClaire Chicago, IL 60639 (R-70, HQ-160, RF-2900, spital loop)
 TMJ... Tom Jasinski 503 Jensen St. Shorewood, IL 60436 (FRG-7, 2 1/2' loop)
 RK... The Prairie Dog (R-1000, HQ-140X, HQ-129X, Radio West Loop, Kowalski Loop, spiral loop)

CADX Get Together

The 14th annual Chicago Area DXers annual spring get together will be held this year over Memorial Day weekend (May 25-28). There already are plenty of people planning to come, so why not join them. There should be several out of towners, so if you live within a few driving hours of the Chicago Area, why not take a spin on down. The event is being held at RK's, address at the top of this page. For more info, call 1-312-262-6299. Ask for spike the wonder newt.

WESTERN DX ROUNDUP

Nancy Hardy
2301 Pacific Avenue
Aberdeen, WA 98520

All times are
Eastern Local

Phone for hot WDXR tips: (206)532-6827 till 10pm(PLT)

DEADLINES: Tuesdays March 20, April 3, April 17, May 8, June 5

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- (PM) Patrick Martin-P.O. Box 843-Seaside, OR 97138
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(DP) Dale Park-2253 Kanealii Avenue-Honolulu, HI 96813
(bp) Bruce Portzer-6546 19th N.E.--Seattle, WA 98115
HQ-180A, 4* Loop
(RW) Robert Wien-1309 Dentwood Dr.--San Jose, CA 95118
GE Superadio, GE long-range portable, SM-2

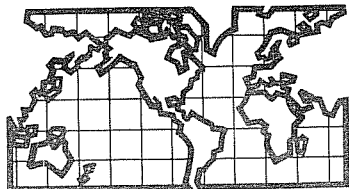
OF SPECIAL INTEREST:

- 730 KRVC OR, Medford per verie, PSSA is 75 watts. (PM-OR)
1040 (KPOI) HI, Honolulu per story in Honolulu Advertiser 9 Feb. is off the air. Sure enough it was off 10 Feb., but sister stn KPOI-FM was still 98 Rockin'. Story said that due to ratings, KPOI was going to return soon as a relig. formatted stn w/ different call letters. A week later I contacted the stn & they said they'd return about March 1, but the new calls were unknown. The story also said that KAIM-870 & KNDI-1270, although both carry relig. programming, were not 100% relig., which KPOI will be, operating 6am-midnight (had been 5am-midnight). AM recently began simulcasting FM while FM dropped old calls (KDUK, now in Florence, OR) & became "98 Rock, AM & FM," simulcast was 5-10am & 3-7pm. (DP-HI)
1470 KSEM WA, Moses Lake per call to stn, they are still KSEM, but will be changing calls to KBSN on March 1. (RW-CA)

- *****
670 (KBOI) ID, Boise 2/27 0226 totally off. (RW-CA)
700 *KGRV* OR, Winston 2/20 0614-0720+ strong on ET w/OC/TT. No ID hrd but called stn to confirm it was them. Said they were using 25kw day facilities & had been testing a lot lately. CE was very friendly & asked me to send a reception report. Said call stands for "God's Radio Voice." (bp-WA)
820 *WBAP* TX, Ft. Worth 2/20 0327 OC, some TT. (bp-WA)
1000 *KOMO* WA, Seattle 2/27 0736 noted w/TT. (RW-CA)
1110 KRGC CA, Roseville 2/24 0208 call change, ex-KPIP, good in KRLA null w/ID "Kah-ehre-ceh-equis, Radio Capital," still SS, though. (RW-CA)
1360 KPQP CA, San Diego 2/27 0415 hrd poorly w/MOR mx, much like MYL, frequent IDs. Haven't hrd before w/this call. (PM-OR)
KAMT WA, Tacoma 2/20 0254 on w/gospel mx program. Off at 0306 recheck. Used to have 0200 MM s/off. (bp-WA)
KRKK WY, Rock Springs 2/20 0536 atop w/local ads, jx, G&W mx. (bp)
1370 KEEN CA, San Jose 2/21 noted plugging heavily for their brand new AM stereo system, San Jose's 1st AM stereo stn. (RW-CA)
1540 *KJZZ* WA, Bellevue OC only 2/20 0340. Weak talk (KZLA or KXEL) in their null. (bp-WA)
1550 KXXR WA, Opportunity 2/27 0301 way o/KRGO after KKHI s/off, w/wx. ID "...this is the music of your life, on 15-50, KXXR," into MYL. Freq. change, ex-1440. Last logged on '79 DX test. Thanks to DKF for this tip. (RW-CA)
+2/20 0251 o/u KKHI/KVAN w/nostalgia mx, "Music of your life 15-50, KXXR" ID. (bp-WA)
+2/28 hrd fair o/u KVAN w/MOR, probably MYL. ID 0145. Ex-1440. (PM-OR)
1560 KLLV CO, Hesperus/Ft. Lewis/Breen per another call to stn Sa 2/25, phone now ringing again, no one answered (perhaps because it was a weekend). Phone still (303)259-5558. Not on air yet. (RW)
1610 KNHD WA, Olympia TIS 2/16 0950 2 xmtr's fading in & out fair to nil w/same message, one w/woman other w/man. ID as "Dept. of Trans., Highway Advisory Radio," then ment. of construction on I-5. Short message, 10-15 secs long. Location determined by Bill Block & Pat Martin, who hrd it on car rx's while driving to my 2/18 GTG. (bp-WA)

UNID:

- 860 2/20 0608 ET w/ABC network audio feed, OC, mx, looping WNW/ESE. KTRB most likely. Good signal. (bp-WA)
I expect a quite long WDXR next week! ♡



DX WORLDWIDE - WEST

Pat Martin - Editor

P.O. Box 843, Seaside, Oregon 97138
(503) 861-3185 - deadline Tuesday

Not too much to report this week, as conditions haven't been the best. Friday 3/3 was a pretty good morning for Northern TPs. CC stations (Harbin, etc) were in before 0800 UTC (see under TPs). We have a report from Jef Jaisan this week, also...So on with reports:

PAN-AMERICAN DX ROUNDUP

- 830 ECUADOR, Guayaquil-0425 1/30 fair w/Andean type pops and "Huancavilca" ID. (BP-Wa) (I sure wish this would show up at this QTH. hi PM)
840 CUBA, Habana-0458 on 1/27 strong o/WHAS w/light mx, s/off by man, then anthem (BP-Wa)

TRANS-PACIFIC DX ROUNDUP

- 558 SOUTH KOREA, Pohang-KBS, here v'y good at 1415 on 3/3 w/US rr tunes, YL ancr. (PM-Or)
585 JAPAN, Kushiro-JOPG hrd // 594 in JJ at 1425 -2/27. (DW-Or)
594 JAPAN, Tokyo-JOAK, NHK 2/19 1202-1302, v'y strong. (JJ-Wa)
+Also noted weakly w/OM and YL talk at 0832-2/20 (BP-Wa)
603 SOUTH KOREA, Namyang-OM in KK at 1429 on 2/27, UNID QRM (DW-Or)
+Also noted // to 558 w/US rr tunes at 1417-3/3 (PM-Or)
621 USSR, Khabarovsk-talk in RR at 1440 on 2/29. (DW-Or)
639 CHINA, Beijing--CPBS 1, in CC talk at 1501 2/25 (DW-Or)
648 USSR, Iman-2/19 from 1155-1312 YL talk, sounded like CC, presume it was Russkie. (JJ-Wa)
657 CHINA, Zhengzhou-CC talk o/u KK at 1504 on 2/25. (DW-Or)
738 CHINA, 3 stations here w/CC talk and mx at 1455-1500 2/29. One sounded like the station PM heard a few weeks back, poss. the language is Cantonese. (DW-Or)
+Also heard the same YL in talk at 1620 on 3/3. This may be Changsha in Southern China, being in Cantonese-instead of Thai. Sent tent.taped reports to both Thai station and Changsha, so will have to wait and see. I'm keeping my fingers crossed.(PM-Or)
747 JAPAN, Sapporo-JOIB-NHK 2/19 from 1202-1302, v'y strong. Strong het on 693, but too much KIRO slop. (JJ-Wa)
756 CHINA, CPBS 1 station here w/YL in CC at 1444, KXL slop on 2/25. (DW-Or)
828 JAPAN, Osaka-JOBB-NHK 2/19 1202-1302, v'y strong. (JJ-Wa)
+Also noted good w/JJ talk 2/20 at 0828 (BP-Wa)
PHILIPPINES, Cagayan de Oro-DXCC, fair w/OM in Philipino and EE IDs, usual MOR US mx at 1530 on 3/4. (PM-Or)
837 CHINA, hrd w/ CC talk at 1358 on 2/26, JJ QRM. (DW-Or)
NEW ZEALAND, Kaitia/Whangarei-1YK/1YX 2/20 from 1258-1321, presumed to be the one w/man and woman talk. Sounded like a phone-in talk show 6 pips in key of B at TOH (which is supposed to be New Zealand), and 3 pips in key of C and precisely 1310 (which was a real surprise). Also a four-note IS following the 6 pips, with notes of B, A, F, D. Never here before. (JJ-Wa) (Good catch Jef-only 2KW.PM)
873 CHINA, Harbin-Heilongjiang, hrd quite good after 0800 on 3/3, w/CC mx, tuned out, tuning back in just before 0900. With ID in CC and 0858 by YL "Po Tien Tai.....Heilongjiang....." Pips at 0900, and then ID again by OM into nx. Excellent signal!! Taped and sent report direct to Harbin in EE, hoping for the best. A little North Korean QRM at times. (PM-Or)
900+++ NEW ZEALAND, Dunedin-4YC, fair w/KNUI off for a while, no CJVI QRM, YL in talks and old New Zealand, // 657 and 963. Have been after this for several years. Hrd at 0915 on 3/4. Now I've hrd all the YC net. This was really a surprise. If KNUI wouldn't have been off, I'm sure I would not have heard this, not w/KNUI 60DB+. (PM-Or)
1008 JAPAN, Osaka-JONR fair 0823 2/20 w/YL talk in JJ, not noted later (BP)
1017 CHINA, CPBS 1, noted w/YL in CC at 1523 2/25 (DW-Or)
1314 JAPAN, Osaka-JOUF, YL in JJ at 1422 2/27. (DW-Or)
1476 USSR, Vladivostok-2/13 at 1229 Kremlin Bells and YL talk, sounded like KK or CC (JJ-Wa)

1512 UNID, het on KGA at 1454 2/16, looped aprox 315 degrees. (BP-Wa)
1521 UNID, het on KYXI at 1524 1/30 Also 1455 on 2/16 (BP-Wa)
1566 SOUTH KOREA, Cheju-HLAZ great w/rel talk in lang. 1523 1/30 (BP-Wa)
1575 THAILAND, VOA vy strong in Thai at 1512 on 2/29. (DW-Or)

VERIES:

895 COLOMBIA, Santa Marta-Radio Galeon-HJPM sent friendly letter in SS in 3 months for taped report. Station is now 30KW, not 20 KW as per WRTH. Colombian QSL #5. (PM-Or)

THANKS TO THESE REPORTERS:

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Pan American DX Roundup

620 Antigua St. John's 2/16 rising o/ZYH590 w/8 sets of their 3 pips at 2300 into EE talk, pr-fr but little domestic QRM in AU. (Kaz-ME)
620 Brazil Fortaleza ZYH590 2/16 fr-gd w/continuous PP talk // 5035 2237-2240 well o/WVMT w/wk 621 het from AU attenuated Canary Is. At this time, many Brazilians are in // w/"A Voz do Brasil" pgm. (Kaz-ME)
690 Anguilla Caribbean Beacon 2/7 0222 vy common in AU here. Exc // 1610. (Kaz-ME)
730 Dominican Republic Santo Domingo HIZ 2/7 0225 fr in mess w/Trinidad's Indian chants thru phased CJBC w/"HIZ" ID. (Kaz-ME)
880 Brazil Belo Horizonte ZYL275 still common here; 1/22 ranging from gd-exc at sev. checks between 0512 & 0633 when R. Inconfidentia ID hrd; WCBS off & no Cuban or anything else hrd on chan. + 2/16 2327 vy gd w/WCBS phased, AU cx, // 620, 740 w/PP M&W talk & sports event later & still gd 0116 2/17 w/PP mention of "basketball". + 2/26 0640 w/WCBS again off on a Sun morn.; gd on Bev. w/PP ballad, but pr on loop w/occ. SS LA QRM. (Kaz-ME)
914 Surinam Paramaribo 2/16 2325 w/vy str sig but only gd w/undermod audio w/what sounded like Hindi talk then mx; sd/lk "Rani" ID. + In well again 2/17 2252 w/Hindi-type chants. (Neil Kazaross, Ogunquit, Maine)
1220 Brazil Rio de Janeiro ZYJ458 2/16 2243 briefly gd w/PP talk & = w/local WSME PSSA. (Kaz-ME)

Trans Atlantic DX Roundup

SS/EE pops. (Kaz)
882 Canary Islands 1/22 0515-0525 v gd w/nearly NSP WCBS off; SS M-anncr & usual
882 England Washford et al 1/15 2002 fr w/EE talk. + 2/25 2256 exc // 909 & o/low growl from Canaries w/EE coverage of soccer. (Kaz-ME)
998 Morocco Ad-Dakhla 2/21 2313 // 819, 1044, 1116 to gd peaks w/AA chants & AA talk later at 2335. Now back on old channel, ex-999. Het is in most nights; sometimes accompanied by Spain-999 het. (Kaz-ME)
1233 Morocco Tanger 1/21 2128 gd w/FF talk. + 2/21 2315 gd // 612 w/AA singing. (Kaz-ME)
1325 Morocco Safi 1/21 2314 fair; this is the stn on this off-freq; finally pinned down as // 1197 & 828 2/21 2326 w/network B in FF fr-gd on peaks. (Kaz-ME)

Week's Contributor

(Kaz-ME) Neil Kazaross - P. O. Box 1908 - Ogunquit, ME 03907
IC-R70 w/phased 1350' Bev's at 150 degrees
175' LW at 72 deg., NRC Loop, R. West Ferrite Loop
& APT-2 tuner/amplifier

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