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THE WECAGRAM



Newsletter of the

Westchester Emergency Communications Association, Inc.

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North Tarrytown, New York 10591-0831

WECA Information Hotline: 914-741-6606

Web site: <http://www.weca.org>

Serving the Public through Amateur Radio and serving Amateurs since 1972

Volume 20, Issue 9 November 1996

Chase Donates Computers

by **Joe Bruno, WB2VVS**

The Chase Manhattan Bank recently donated four IBM PS/2 computers to WECA to be utilized at our annual demonstration of emergency preparedness at Field Day. The donation is thanks to the efforts of Joe Brown, KB2NBN.

Although the machines are not new, they are fully capable of running the most popular Field Day software. Thanks, Joe!



Next Meeting

The next WECA meeting will be held on Monday, November 4, 1996 at the Westchester County Center in White Plains, beginning at 7:30 p.m. with a social half-hour followed by

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the main program at 8 p.m. Note that the meeting is on the first Monday rather than the usual second Monday of the month due to the 11th being Veterans Day.

This month's guest speaker is Hank Lopez, N2MSS. The title of his talk is "An Introduction To VHF/UHF Weak Signal Operating."

Hank has been involved with VHF/UHF weak signal work since 1993. He attained his VUCC on 6 meters in less than one year and is active on 50-1296 MHz during all the VHF/UHF contests throughout the year. His latest experimentation brings him on 10 GHz where he participated in the last contest. Hank's favorite aspect of weak signal work is mountain topping in Maine and activating rare grids.

Blythedale

by George G. Manning, K2RRR

It's Blythedale time again. This year, Santa visits the children at Blythedale on Wednesday, December 18, starting at about 7:00 p.m.

Since 1978, WECA has played Santa Claus to the children at Blythedale Children's Hospital, the long term care hospital for children who are chronically ill or severely injured, almost all of whom have severe physical disabilities.

Although, as I write this, it is still just less than sixty two days until Blythedale, we are asking your help now to make Christmas for the children at Blythedale Hospital a happy one.

Some of you have already received letters about Blythedale; those of you who have not taken part in the event in the past are more than welcome to help out now. Right now, we need your financial assistance; there are eighty-six children in the hospital --the average cost for a gift is about \$20.00. Our goal is to raise \$2500.00 for the children. Your early contributions are much more helpful than later ones because of the many early-purchase discounts and sales, as well as the wider selections available.

Please help! Send your tax-deductible contribution, payable to WECA, to my attention at the address below.

73,

George G. Manning, K2RRR

60 Coachlight Square

Montrose, NY 10548

THE WECAGRAM

Editor: Fuat Baran, N2YGN

Assistant to the Editor: Melissa Metz, KB2SXB

The WECAGRAM is the official newsletter of the Westchester Emergency Communications Association, Inc., a Special Service Club affiliated with the ARRL, ARES, the Westchester County Office of Disaster and Emergency Services, and RACES, and a member of the Westchester County Emergency Medical Services Council.

Any inquiries, comments, items for Swap and Shop, commercial advertising, suggestions, contributions and letters for inclusion should be sent to the editor at:

3215 Arlington Ave, #4H

Riverdale, NY 10463.

Submissions via electronic mail to **wecagram@weca.org** are especially welcome. You can also fax them to 212-662-6442 (ATTN: Fuat Baran). Submissions may be edited for clarity, style and space. The deadline for acceptance of material for each newsletter is the twentieth of the preceding month.

All materials are the opinions of their authors, and do not necessarily reflect the official position of WECA, its officers, directors, or the editor.

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The WECAGRAM would like to exchange newsletters with other clubs. If you are interested in receiving the WECAGRAM through such an exchange or know someone who would, please contact the editor.

WECA Officers/Directors

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Awards Committee Chair: Richard Benda, WB2QJA

President Emeritus: Thomas R. Raffaelli, WB2NHC

WECA gladly accepts donations of equipment, new or used (such as from estates). Please write to WECA at the North Tarrytown address on the cover.

WB2ZII/R

WECA operates the following repeaters:

147.060(+) MHz PL 2A (114.8 Hz)

447.475(-) MHz PL 2A (114.8 Hz)

224.400(-) MHz PL 2A (114.8 Hz)

WECAGRAM Online: <http://www.weca.org/wecagram>

From the Editor

This month Arte, N2ZRC, concludes his series on APRS with some tips on what to do now that you've got APRS up and running.

Bob Wilson, N2DVQ, WECA's Engineering Director, begins a series of articles on the WECA repeater system, starting with a description of why there is a key-up delay. I hope you enjoy the series. If you have any questions or ideas for topics please send me mail, and we'll try to get the issues addressed.

Congratulations to Darlana Mayo, KB2EPU, on a job well done in getting President Clinton to declare October 7-13 amateur radio week. See page 3 in this issue, or a facsimile of the letter from the White House on the WECA home page (<http://www.weca.org>).

RF safety is a topic that all hams should be aware of. In the September *WECAGRAM* I reprinted an *ARRL Letter* article on the new FCC RF safety standards scheduled to go into effect on January 1, 1997. Starting this month I will be serializing the chapter on RF safety from the soon to be published *1997 ARRL Handbook for Radio Amateurs*. This and other resources are also available online through the ARRL Web site at <http://www.arrl.org/news/rfsafety/>.

I'll periodically be bringing you pointers to ham-related web sites. See page 7 for our very own WECA home page and a sneak preview of the new ARRL Hudson Division home page.

73,

October Meeting Notes

by Fuat Baran, N2YGN

The meeting opened with participation awards and another plea for a volunteer to coordinate the next WECA Field Day. (Contact Joe, KB2NBN, if you would like to try your hand at this.)

The guest speaker was Steve Mendelsohn, WA2DHF, ARRL First Vice President. He spoke about the upcoming New York City Marathon and the fine job hams have done at this and other public service events, and how this was helping us fight off attempts to grab our bands. He also discussed the recent ARRL survey on what the ham community thought about the CW treaty requirement (apparently a lot of you want the requirement to stand).

Alan, N2YGK, the new Westchester ARES Emergency Coordinator, discussed the then-

upcoming SET weekend and the NorMet hospital antenna project. (See page 6 for an article on the SET.)

Stan, WA2NRV, mentioned that the solar battery charger project needed to be rethought, since he was unable to procure affordable solar cells to be used with the club project charger circuits. If you have any ideas for projects, bring them to a meeting, or contact Stan. Stan also mentioned that the bulk battery purchase was still pending.

Key-Up Delay

by Bob Wilson, N2DVQ, Engineering Dir.

There is a "key-up delay" on the 2 meter system that causes various amounts of delay between the time you push your PTT button on your radio and the time the repeater begins to transmit. To help you understand and hopefully remember this I will describe what happens when you push your PTT switch and transmit on 147.660 MHz.

Our 2m voice repeater uses a system of three remote receivers. One is located in Mount Vernon, another in Mount Kisco, and the third near Bear Mountain. (Note the "Mount" in each location. :)) Each receiver listens continuously on 147.66 for a user to key it up. When someone does, the remote retransmits the user's audio on another frequency back to the main site in Valhalla where it is supplied to a voter. The voter listens to all the remote receivers plus the receiver at the main site all at once. It selects audio from the receiver with the least noise and provides it to the repeater controller. The controller conditions this audio, mixes in other audio sources like the CW ID and the phone patch, and adds control functions like timers and touch tone decoders.

A receiver generates a control signal called COR (Carrier Operated Relay) when a signal is being heard by it. This COR signal is used by whatever logic is connected (in our case the voter) to tell it there is a signal present. In our system when the voter sees a COR signal it knows that there is a signal on at least one of the receivers. It then decides which one is best and sends audio and COR to the controller. The controller now sees the COR signal and decides if it's OK to turn on the transmitter.

Another control signal we use is called CTCSS (Continuous Tone Control Squelch System) or PL (Private Line). This is a very low frequency tone that your transceiver adds to your audio signal. It is sometimes referred to as a sub-audible tone because it is so low in frequency that most receivers remove it before it gets to the speaker. It is detected by special circuits at both the remote and link receivers.

In order for the remote receiver to retransmit your signal to the main site at the jail a PL tone must be detected along with your carrier. Now this is what causes most of the key-up delay. The time required to detect the carrier part of your signal is smaller than 1/10 of a second and does not account for any noticeable delay. The PL detect time is much longer.

Clinton Declares Oct. 7-13 Amateur Radio Week

Reprinted from ARRL Bulletin ARLB072, 10/9/96

President Bill Clinton has declared this week, October 7 to October 13, as an Amateur Radio Week. The White House today faxed a copy of the president's message to ARRL member Darlana Mayo, KB2EPU, of Mt. Vernon, New York, who's been working with the White House for several months to get the declaration. Mayo said she wanted the president to "be aware of our value to the community--particularly in emergencies." Mayo--a ham for 10 years--is a member of ARES and RACES, and serves as an assistant director and an assistant emergency coordinator in the Hudson Division.

Here's the text of the White House declaration, which was signed by President Clinton:

THE WHITE HOUSE

WASHINGTON

October 8, 1996

Warm greetings to everyone observing October 7 through 13, 1996, as Amateur Radio Week.

In the past century, the medium of radio has changed the way we live and the way we view our world, and amateur radio operators have played a vital role in this communications phenomenon. Sharing knowledge and technological expertise, connecting computers via radio equipment, and linking people all across the globe, ham radio operators have helped to make our world a true global village. But even more important, they have provided a crucial lifeline of relief in times of disaster and hardship, ensuring that hope and help are on the way to those most in need.

Amateur Radio Week offers us a welcome opportunity to thank our nation's amateur radio operators for their commitment to excellence and their willingness to work for the well-being of others.

Best wishes to all for a wonderful week.

(signed)

Bill Clinton

Mayo is hoping to get the White House to schedule a formal presentation of the declaration, sometime after the elections.

APRS: Now What?

by Arte Booten, N2ZRC

In previous articles I've described what the Automatic Position Reporting System is and how to get it set up on your computer and radio. So you're now probably telling yourself "OK, great. I've got these stations appearing on my screen. Now what do I do?"

One of the features in APRS is the ability to send what we call one-liners; that is, one-line messages from station to station either direct or by using digipeaters. From the main APRS screen press S(end), and type the station's call and <CR>. Then type your message and another <CR>. You'll know when they got it when you receive an *ACK* which replaces the first five characters of your message. These one-liners are the only situation when APRS uses anything other than UI packets.

When you send a message in this manner it will be sent via the same digipeater path as your position and ID packets. If your intended recipient is someplace else you can *still* send it there by specifying any of a dozen alternate digipeater paths which the program can store for you. If you press O(perations) D(igipath) S(ave), you'll be prompted to enter a two letter code for that path via whatever path you choose, such as:

```
NJ VIA N2SF ,WA2JNF-4 ,W2HOB
```

to get to Southern New Jersey from Westchester. To see the paths you've stored, press O(perations) D(igipath) L(ist). The prime purpose of these alternate paths is to keep the QRM to a minimum and to use the most direct and, sometimes, the only feasible path.

The weather systems feature of APRS allows you to see various weather information in real-time which is transmitted by stations with a Peet Bros. or Davis Weather Station. Depending on which version of APRS you're using (as of now, late August, it's 7.7) and the options the weather station has, you can get different kinds of information including temperature, rainfall amounts (to the 1/100th inch) in the past hour and 24 hour periods, wind speed, direction and gusts, and barometric pressure. By pressing W(eather), you'll see a list of options to choose from. These have changed (for the better) in the last few versions, so I can't be specific.

If at any time you wish to cease transmitting without actually shutting down the program, just touch C(ommands) X(mit). This will disable the timer within APRS. You will still send out whatever the TNC itself is set to transmit at the predetermined periods. When you want to send a specific packet (most often your position), you can do so by pressing X(mit) P(osition) (or B(eacon), M(essage), bUlletin, O(bject) or A(II), as the case may be.)

In order to find a station on the screen, you can always use the O(perations) F(ind) (what else!) command. If you'd like to see something really neat, try O(perations) R(eplay) with a mobile station. You'll see the station's track being replayed. To access your TNC you'd use

O(perations) C(omms) T(NC) which leads you to a very basic terminal screen. To get stations to appear on your screen faster (within two or three minutes) you'd use O(perations) Q(uey), followed by a radius in miles from you.

Now that you've been on the air with APRS for a few hours, you don't necessarily want to wait for all those stations to reappear if, for some reason, you have to exit the program. No problem. Next time you fire it up, press F(iles) L(oad), then type BACKUP.BK. Every time you shut APRS down it will save this file, replacing the previous copy. Be aware, though, that all of those packets are timed, and any station in this backup that was heard more than two hours ago will "gray-out" (APRS considers them to be inactive and makes room for more stations that way).

One thing to remember when playing with APRS is that the best way to learn, as with anything else, is by doing. You can play with the commands as much as you want. You're not going to *break* anything! About the worst thing that can happen is a lockup, and this is a rare thing. Usually the three-fingered- salute (Ctrl-Alt-Del) will get you out of it and you'll have to start over. So play with the thing. I mean, how do you think I learned all this about APRS, by reading about it?

Speaking of reading about it, yes I did. It's right there in the APRS distribution zip file. You can always read those files by pressing F1 F(iles) and typing in the name of the file you want to see. One suggestion: if you're a slow reader, press the down-arrow button once in a while as APRS seems to get impatient with you when it just sits there while you re-read that paragraph for the umpty-umph time, and it shoves you back into the program.

There are dozens of these readme files in the "README" folder. You can also see them (at your leisure and there for the printing) by using any old text editor. Many of the answers to your questions can be found there, sometimes buried deep and not

quite as visible as you'd like.

I hope you enjoyed this series on APRS and hope to see you on the map in the near future. Whenever I see a new station on the screen I try to send them a one-liner welcoming them to APRS and offering live assistance and advice. Feel free to take advantage of this, or ask questions of any station on the air at that time. We're all very excited about this program and think that "the more, the merrier" is the way to go. We've gotten a lot of "converts" in the last few years and this situation can only improve, so come and join us on 145.790! 73.

Some APRS related web sites:

<http://www.concentric.net/~wa8inz>

<http://www.magg.net/~n2czf/aprs.html>

<http://www.mindspring.com/~rwf/aprs1.html>

<http://msproul.rutgers.edu/aprs.htm>

<http://hurricane.net/~epkor/aprs.htm>

What You Need for TCP/IP

by Richard Benda, WB2QJA, Digital Modes Director

Here's what you need to get started with TCP/IP:

1. A computer. Almost any computer will do. There are versions written for most of them. The two most common are the IBM compatible and the Mac. A hard drive is nice, but the software will run on a laptop with twin 720 K floppies. Speed is also nice, and I would say a 386 is a minimum configuration.
2. The software. There are many versions of NOS (Network Operating Software). The most common in our area are JNOS and MFNOS. Both are available for downloading via the Internet, off the ham forums on Compuserve and AOL, and on KB2NBN's landline BBS.
3. A TNC. The TNC that you are using for regular (AX.25) packet radio is fine as long as it has a KISS mode.
4. An IP address. See me or K2BJG.
5. A 2 Meter Radio. Ideally, you should be in range of WB2ZII-5, on 145.09 MHz. If you can hit it directly, you're in business. Your setup file for NOS (autoexec.nos) would then specify WB2ZII-5 as the default route for any packets sent that you cannot directly connect to.

The best book I have seen as a reference is "NOSintro" by Ian Wade, G3NRW, which is available through the ARRL. There are many hams running Internet-Ham gateways which allow for a lot of interesting opportunities that you don't have running regular packet, such as being able to send email, and weather information in different cities.

Upper Westchester County has been assigned IP subnet 44.68.56/23. This subnet is routed by weca5.ebn.ampr.org (44.68.56.254 / WECA5:WB2ZII-5). WECA5 is a TheNet node running X1-JR4 code. Assignment of IP addresses within the subnet is coordinated by WB2QJA and K2BJG:

Richard L. Benda, WB2QJA, 18 Vermont Ave., White Plains, NY 10606, 914-946-2120,
AX.25: WB2QJA @WB2QJA.#ENY.NY. USA.NA

Robert R. Anderson, Sr., K2BJG, 69 Page Drive, Oakland, NJ 07436, 201-337-6945,
AMPRnet: k2bjg@bbs.k2bjg.ampr.org (44.64.10.8) or AX.25:
K2BJG@WA2SNA.NJ.USA.NA.

The September 7, 1996 host table contained the following address assignments in the area:

44.68.56.11 wecrm.ebn.ampr.org #WCRM:WB2ZII-11

44.68.56.16 n2ygk.ampr.org Briarcliff

44.68.56.20 wb2qja.ampr.org White Plains

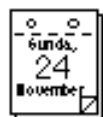
44.68.56.21 wb2qja.ampr.org White Plains

44.68.56.24 n2fmc.ampr.org Chappaqua

44.68.56.32 bbs.k2zm.ampr.org Rye Brook

44.68.56.33 k2zm.ampr.org Rye Brook

44.68.56.254 weca5.ebn.ampr.org WECA5:WB2ZII-5



Turkey Trot

The annual Mamaroneck Turkey Trot will be held on Sunday, November 24, 1996 at Harbor Island. Volunteer communicators will be needed. If you would like to volunteer or need more information, please contact Robert Kantor, N2TSE, at 914-949-4231. About 20-24 people are needed.

Participation Awards

WECA has had a participation awards program for the past eight years. Members who volunteer for at least one WECA event each year are eligible for participation awards. The following is a list of people who have reached their eighth year mark:

KB2APX, WA2ATY, WB2BTJ, N2DHH, N2DVQ, N2FMC, N2GDY, N2GKM, NJ2J, WA2KHR, WB2NHC, WA2NRV, N4OOX, WB2QJA, WK6R, K2RRR, N2SF, K2SJO, WB2VUK, WB2VVS, K4ZGE, and K2VZI.

Thanks to all of you!



Red Cross Van Update

by Anthony Licata, N2NWZ

A lot of work has gone into refurbishing the Red Cross Communications Van over the last year. The work crew first had to remove the existing work tables the Red Cross had in there. Once that was done the planning began on designing a new table and shelves for the radios and work area.

The work crew also checked out the existing antennas that were on the van and found that most of the old mounts were rusted and we had no idea what bands most of them were for. So the simple thing to do was to replace all of the antennas with new ones, and make a standard to use NMO mounts. All the new wiring is well documented and to change antennas now is very simple.

The Red Cross has also been working with us by handling the mechanical work on the van and getting the other vehicle accessories. I have to give a special thanks to Nick Gallo, K2ZVI, who was able to get the wood for the new table donated. He also installed a new carpet , new table, and shelves.



I also have to give thanks for all the other people who have helped so far with this big project, Tom Raffaelli, WB2NHC, Phil Petrus, W2RWR, Mal Ochs, N2MEF, Rob Kantor, N2TSE, Dwight Smith, N2FMC, Bob Casino, N2GDY, and Rich Anderson, KB2MGM.

Hopefully you will now start to see the van at more WECA events. The first real event at which we plan on using it is the Boy Scout Jamboree on the Air (JOTA) on Oct.19 at Camp Siwanoy.

There is still more work to be done on the van, so if anybody is interested on helping just let me know.

Simulated Emergency Test

by Alan Crosswell, N2YGK

Thanks to all of you who participated in the Simulated Emergency Test. We had 51 check-ins to the callup, and a turnout of 14 operators who spent a beautiful Saturday morning demonstrating how well we do, what we do in person at 12 hospitals at the extreme ends of the county and everywhere in between. We participated in, and were the focus of, a seven-county mutual hospital disaster communications network (Westchester was the site of the simulated mass casualty incident). We conducted communications on 2 meters (three repeaters and simplex), 70 centimeters (repeater and simplex), HF (80 meter statewide SEMO/RACES, and several NTS sessions), and packet. The Emergency Operations Center was hopping with radios operating simultaneously on three 2m frequencies (voice and

packet), a 70cm frequency, and 80 meters. Liam Murphy came in, observed, and provided traffic to be sent to the other six EOCs.

If you participated in or monitored the exercise, please send me your comments and criticisms so we can improve things for next time. For SET scoring purposes, I also need to know from participants if you were licensed after 1991 and if you were on emergency or utility power. For those who went to hospitals, I especially need feedback and corrections to the documentation of how to find the hospital and coax location, suggested operating position improvements, etc. Please also let me know your list of other stations heard simplex, on what bands, and how well.

A post-SET discussion was held on the Wednesday night training net. I would like to schedule an in-person discussion too, if there is interest. Let me know.

An SET report will be written and circulated to all members but will take a while as we need to have a post-SET meeting with NorMet and the six other counties.

Thanks & 73.

Gift from WA2KZS's Family

Ron, N2TJE, reports that the family of former member Samuel P. Puner, WA2KZS, has made an equipment donation to WECA in his memory. Mr. Puner was 87 years old when he passed away this summer.

RF Radiation and Electromagnetic Field Safety

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Although Amateur Radio is basically a safe activity, in recent years there has been considerable discussion and concern about the possible hazards of electromagnetic radiation (EMR), including both RF energy and power frequency (50-60 Hz) electromagnetic fields. Extensive research on this topic is underway in many countries. This section was prepared by members of the ARRL RF Safety Committee and coordinated by Dr. Robert E. Gold, WB0KIZ. It summarizes what is now known and offers safety precautions based on the research to date.

All life on Earth has adapted to survive in an environment of weak, natural low-frequency electromagnetic fields (in addition to the Earth's static geomagnetic field). Natural low-frequency EM fields come from two main sources: the sun, and thunderstorm activity. But

in the last 100 years, man-made fields at much higher intensities and with a very different spectral distribution have altered this natural EM background in ways that are not yet fully understood. Much more research is needed to assess the biological effects of EMR.

Both RF and 60-Hz fields are classified as nonionizing radiation because the frequency is too low for there to be enough photon energy to ionize atoms. Still, at sufficiently high power densities, EMR poses certain health hazards. It has been known since the early days of radio that RF energy can cause injuries by heating body tissue. In extreme cases, RF-induced heating can cause blindness, sterility and other serious health problems. These heat-related health hazards are called thermal effects. In addition, there is evidence that magnetic fields may produce biologic effects at energy levels too low to cause body heating. The proposition that these athermal effects may produce harmful health consequences has produced a great deal of research.

In addition to the ongoing research, much else has been done to address this issue. For example, the American National Standards Institute, among others, has recommended voluntary guidelines to limit human exposure to RF energy. And the ARRL has established the RF Safety Committee, a committee of concerned medical doctors and scientists, serving voluntarily to monitor scientific research in the fields and to recommend safe practices for radio amateurs.

Thermal Effects of RF Energy

Body tissues that are subjected to very high levels of RF energy may suffer serious heat damage. These effects depend upon the frequency of the energy, the power density of the RF field that strikes the body, and even on factors such as the polarization of the wave.

At frequencies near the body's natural resonant frequency, RF energy is absorbed more efficiently, and maximum heating occurs. In adults, this frequency usually is about 35 MHz if the person is grounded, and about 70 MHz if the person's body is insulated from the ground. Also, body parts may be resonant; the adult head, for example is resonant around 400 MHz, while a baby's smaller head resonates near 700 MHz. Body size thus determines the frequency at which most RF energy is absorbed. As the frequency is increased above resonance, less RF heating generally occurs. However, additional longitudinal resonances occur at about 1 GHz near the body surface.

Nevertheless, thermal effects of RF energy should not be a major concern for most radio amateurs because of the relatively low RF power we normally use and intermittent nature of most amateur transmissions. Amateurs spend more time listening than transmitting, and many amateur transmissions such as CW and SSB use low-duty-cycle modes. (With FM or RTTY, though, the RF is present continuously at its maximum level during each transmission.) In any event, it is rare for radio amateurs to be subjected to RF fields strong enough to produce thermal effects unless they are fairly close to an energized antenna or unshielded power amplifier. Specific suggestions for avoiding excessive exposure are offered later.

Next Month: Athermal Effects of EMR.

Web Sites of the Month

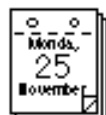


<http://www.weca.org>

<http://members.aol.com/arrlHUDSON/huddiv.htm>

November 1996

Sunday	Monday	Tuesday	Wednesday	Thursday	Friday	Saturday
27	28	29	30	31	1	2 ARRL Novss (CW)
3 YACVE Session NYC Martine ARRL Novss (CW)	4 WECA Meeting ARRL Novss (CW)	5 Election Day	6	7	8	9
10	11 Veterans Day	12	13	14	15	16 Mt Beacon Hamfest ARRL Novss (Phone)
17 ARRL Novss (Phone)	18 ARRL Novss (Phone)	19 Pelham's VE Session	20	21	22	23 CQ WW DX (CW)
24 Hamrock Time Trial CQ WW DX (CW)	25 WECA Board Meeting	26	27	28 Thanksgiving	29	30



Next Board Meeting

The next WECA board meeting will be on Monday, November 25, at 8 p.m. at the EOC (148 Martine Avenue) in White Plains, NY. Meetings are open to all WECA members.



Southern District Net

Darlana Mayo, KB2EPU, net manager of the Southern District Net, reports September SDN stats as follows:

Sessions 30

Total Checkins 491

Traffic brought to the net 150

Traffic passed on the net 117

Percent passed 78

Total time 717 minutes

For Sale

Motorola Radius P10 UHF business band handi-talkie with battery and rubber duck antenna. \$40 or best offer.

Contact: Brian Torpey, N2PHW. Home: 914-769-1413 (leave message). Pager: 914-554-4500.



Westchester Emergency

Communications Association, Inc.

P.O. Box 831

North Tarrytown, NY 10591-0831

RUSH - DATED MATERIAL

PLEASE DO NOT DELAY

Reminder: Next meeting November 4th