GLOUCESTER COUNTY AMATEUR RADIO CLUB

1993 OFFICIERS

President	Cory Sickles	WA3UVV
Vice-President	Ken Bozarth	KN2U
Treasurer	Bill Mollenhauer	N2FZ
Recording Sec.	Peter Butler	KA2DZF
Corresponding Sec.	*John Fisher*	K2JF

Directors

3Yr	Leroy Brady Jr.	KB2ODL
3Yr	Harry Jessen	N2DUZ
2Yr	Jim Mollica Sr.	K2OWE
2Yr	Chris Chamberlain	N2IVN
1Yr	Charles Colabrese	WA2TML
1Yr	John Cliver	N2NLE

Trustees

4Yr	Marla Bozarth	N2DWR
3Yr	Joel Supkow	KB2AYW
2Yr	Milt Marder	WA2FGA
1Yr	Howard Marder	WA2IBZ

CLUB REPEATERS

147.780/180Mhz 223.06/224.66 Mhz
447.100/442.100 Mhz (CTCSS 131.8)

NETS

ARES/RACES	Sunday at 2200Hrs on 147.780/180 and 223.06/224.66 Repeaters
10 Meter	Sundays immediately after the ARES/RACES net on 28.350 Mhz

1993 Committee Chairpersons

Advertising	Jacob	N2MPN
ARES/RACES	Chick	WA2USI
Awards	Jack	K2ZA
Banquet	Marla	N2DWR
Chaplain	Tom	N7GBH
Constitution	Harry	N2DUZ
Crosstalk	Harry	N2DUZ
Data Processing	Charlie	K2PQD
DX	Cliff	N2PLE
Field Day	Steve	N2GVR
HAMFEST	Pete	KA2DZF
Help	Ken	KN2U
Historian/Archivist	Pete	KA2DZF
Hospitality	//OPEN//	
Legislation	//OPEN//	
Membership	Ed	KB2ODJ
Nets	Mike	WA2TOP
Publicity	Jacob	N2MPN
Repeaters	Chuck	WA2TML
Site	Ed	KB2ODJ
Scholarships	Greg	WN2T
Special Events	Walt	WB2OYQ
Special Services	Al	N2FJQ
Sunshine	Miriam	KB2EUA
Technical	Ken	KN2U
Training/Testing	Bill	WA2VQG
TVI	John	K2JF
Ways & Means	//OPEN//	

The G.C.A.R.C. General Membership meeting is at 8PM, the first Wednesday of every month at the Deptford Elks Lodge, on Highland Ave., 1 block from Egg Harbor Road.

The G.C.A.R.C. Board of Directors meet at 7:30 PM, the third Wednesday of every month at the G.C.A.R.C. site which is located at the Harrison Twp. 4-H Grounds, approximately 1 mile south of Mullica Hill, on Rt. 77.

Deadline for April Crosstalk articles is Sunday, March 28, at 8PM.

SPECIAL SERVICE CLUB

W2MMD

SPECIAL SERVICE CLUB

G.C.A.R.C.
President's Message

MARCH

AS I SIT HERE writing this, it is finally snowing. Not the stuff that the so-called meteorologists in the Delaware Valley usually predict; no-show snow.

I think it would be great to be a weatherman. You get to be on television, look at satellite pictures all day, people anticipate seeing you on the news, yet, you can be wrong a lot and still get paid big bucks! The other great field to work in is philosophy; there's no "right" and "wrong", just opinions.

On a different note, have you noticed how technology has evolved in the radio industry? Today's transceivers have digital displays, multiple VFO's, microprocessor's, filters galore, and more controls than a nuclear reactor. Yet, you can still get on the air with a radio 20 or 30 years old and communicate with someone who has one of the new ones. That's because while the hardware has changed, the software is pretty much the same. This hobby is about people talking to people. If you are able to get past the signal reports and equipment lists, you can have a conversation with someone across the world or across town, without a bill in the mail at the end of the month. (Except maybe the electric bill.)

For some of us the frequencies and ways we operate have changed. The frequencies seem to go up, and the time available seems to go down. I'm probably a good example of that. While writing this, I'm listening to see if there is any activity on 1,294.50 Mhz. Yet, most of my operating time is spent in the car. Interesting. Anyone working 160 meters throughout the night? How about mobile?

As we continue to go up in frequency and sophistication (packet, satellite, spread-spectrum), I hope we continue to remember that this hobby is about communications. I hope we can all take time out to recapture the "thrill" of radio that existed in *the good old days*. Friends, regardless of your favorite band(s) and mode(s), *the good old days* are right now. Enjoy them while you can. We will become silent keys all too soon.

73, Cory

FOR THE MONTH OF MARCH, we will hear a presentation by John Fisher, K2JF, on Lightening Arresters. Everyone who has a rig at home should be VERY interested in this discussion.

73.... Ken, KN2U

The **ARES** Primary and Alternate Net controls and their alternates for the months of March and April will be:

	Date:	Primary	Alternate
March	07	AA2BN	K2JF
	14	K2OWE	K2ZA
	21	KA2DZF	KA2KMW
	28	KB2EAI	KB2AYU
April	04	KB2GL	KB2FRM
	11	KB2ODJ	KB2IRK
	18	KE2ES	N2AIV
	25	KN2U	N2ASV

Thanks.... Chick, WA2USI

YOU MAY NOTICE SOME CHANGES in "Crosstalk" this month. We are trying to incorporate the Committee Reports in the newsletter. This will allow is to inform ALL of you what is going on, not just those attending the meeting. Also, it will "free up" more time at the meeting for some additional items. Two of those items this month are a brief 15-minute technical session near the beginning, and a special-interest breakout session at the end. So come to the meeting this month prepared to learn something, and share your interests with others. You can huddle around in groups and see what's going on. This can be a great way to expand your horizons or find a fix for that nagging problem. See you there!

73, Cory

MINI HAM/COMPUTER FEST

(XYL-Endorsed Garage Sale)

Saturday, March 20th at 9:00 AM
1200 Cedar Avenue, Glassboro
For directions or additional info,
call Cory at (609) 582-5695

AMATEURS DOMINATE

LET US TAKE A LOOK AT the early days of radio, however brief, and acknowledge the role played by the radio amateur. From the turn of the century in 1912, activity by amateurs was totally unregulated. The great simplicity of the spark system attracted many amateur experimenters. Almost anyone with a little skill and a few dollars could build a wireless transmitter and receiver. All that was needed was a spark coil from an automobile ignition system, a telegraph key a telephone receiver, a piece of galena and a miscellaneous collection of tin foil, wax paper, glass plates, copper wire and empty cereal boxes, for the construction of coils, tuning capacitors, etc.

As the amateur ranks expanded the number of their broad spark signals proliferated and so did the interference with the operations of the Navy, and commercial interests. The records show that many amateur stations had better and more powerful equipment than that used by the Navy and by many commercial stations. And with these two services accounting for only 15 to 30 percent of the total number of stations in operation, it was the amateur who dominated the air waves. Understandably, relations with the Navy and other services deteriorated.

LIMITED TO "WORTHLESS" FREQUENCIES

While earlier attempts to restrict amateur activity during 1910 and 1911 had failed, the worsening interference problem finally resulted in the Radio Act of 1912 which limited amateur activity to wavelengths below 200 meters, and for the first time required the licensing of all operators. Thought infamous by the amateur community of the day, since these wavelengths were believed to be worthless except for very short range wave communication, the new rules proved to be a blessing in disguise, thanks to the influence of the ionosphere on radio propagation.

The successful trans-atlantic listening tests of December 1921 were followed a little more than a year later by the first two-way contact with Europe. Successful transpacific tests soon followed, and when amateurs were finally freed from the fixed wavelengths just below two hundred meters, record after record was broken and at unbelievably low power. One record established at the time, which may still remain unbroken, was a contact between 8AZ at Columbus, Ohio and A5AB in Adelaide, Australia. With the Australian station running a UV199 receiving tube oscillator with a power input of 0.567 Watts and with the distance between the two stations of 10,200 miles, this translated to 17,990 miles per watt.

Happily, relations with the Navy improved rapidly during the early twenties and remain so today. In the period between 1923 and 1926, when the Naval Research Laboratory (NRL) started to take a serious look at high frequency radio communication, the Navy relied heavily on amateur cooperation during many tests conducted by NRL.

Thanks to W2BFW

Tnx K2JF

For the month of **MARCH**, we wish the following a

Very Happy Birthday!

CALL	NAME	DAY
N2DJZ	James	01
N2IMH	James	05
W2SPV	Edwin	06
W2YC	David	07
WA2LET	Wayne	07
N/C	Daniel Tremolini	08
N2PLE	Wayne	09
N7GBH	Thomas	10
WA2FGA	Milt	12
N2FKT	Daniel	12
WN2T	Gregory	13
WA2NPD	Douglas	13
AA2BN	John	13
N2AYK	Edward	16
KB2KCM	Thomas	22
KB2BF	Paul	22
KB2ETT	John	25
N2HYS	Janice	27

Belated Birthday wishes to KZ2N, Al, for February! OOPS! Sorry we missed it.

Chas Sketchley, K2PQD
Data Processing

HAM HISTORY

IT IS DIFFICULT TO BELIEVE the 2 meter band was once a desolate, virtually ignored allocation. Today, it is arguably the most popular and active band we have. But many years ago, it was not this way.

At one time, activity was limited to a few hearty souls with homebrew or converted 2 $^1/_2$ meter gear. Others had AM rigs from Heathkit or Gonset, with professional sounding nicknames like "Lunchbox" or "Gooneybox". In fact, before incentive licensing in 1967, Novices had voice privileges on 2 meters!

However, something else began to emerge as the dominant mode of operation on this band; FM. Genetically predetermined as scroungers and pack rats, hams began using surplus VHF commercial equipment. Soon, activity was flourishing. Just 1 channel was all you needed. Sixty-watt mobiles, complete with tubes and vibrator or dynamotor power supplies sitting in your trunk or under the seat, were common. Names like Motorola, GE and RCA ruled the day.

A band plan began to emerge which was based upon a number of factors. Since much of the early FM gear was wide-band(15Khz deviation), channels were spaced 60 Khz apart. Also, since most equipment was being converted or re-tuned down in frequency, and Technicians were limited to an upper range of 147Mhz, the top channel became 146.94MHz.

You could travel throughout the country with "94" in your car, and if there was FM activity, you would hear it. But along with this new-found mode of operation came another type of station; the repeater.

Through experimenting, it was found that the maximum frequency excursion possible without transmitter retuning was about 600Khz. So the most popular repeater frequency became, you guessed it, 34/94.

Well, no progress is ever made without some grief. In areas where 94 simplex activity was high, and the attitude towards a 34/94 repeater was... "Not in MY town", some creativity was called for. A common repeater pair in such areas (such as Philadelphia) became 34/76, drawing on a 420Khz spacing plan devised around 1960. In other areas, following the 600Khz plan, you had 16/76. Now, in order to "cover all the bases", your mobile rig had to be capable of 94/94, 34/94, 34/76 and 16/76. This taxed some older radios, designed as single-frequency rigs, but through an additional dose of creativity, it was made possible with diode switching of 3 transmit oscillators and 2 receive oscillators.

Buy the time this was all happening, narrowband (5Khz) deviation and amateur-market 6 and 12 channel rigs were being manufactured. The old stuff could be adjusted, and the new plans (1968-1972) called for 30Khz spacing. Later, in the seventies, 15Khz and 20Khz channels would emerge, as would Technician access to the 147Mhz segment of the band. Portables and hand-helds emerged as big contenders for market share, as well.

As reasonably priced equipment became available, along with the adjunct of synthesizer electronics, the band really "took off" and became what it is today; Crowded. So much for the merits of success...

Someday, if we and our hobby survive long enough, we may find ourselves debating the merits of a 15 or 20 Khz channel plan for the increasingly populated 23cm band!

You never know...

Cory/WA3UVV

WHO SAID IT WAS FUNNY!?

- Now that dentists are beginning to use lasers instead of drills, they can cause pain at the speed of light!
- A bore is someone who insists on talking about himself when you want to talk about yourself.
- Here's an interesting thought... What did the person who owned the first fax machine do with it?

From the collection of
Sonny Guttin, WB2DXB

QST DE W1AW
ARRL BULLETIN 14 ARLB014
FROM ARRL HEADQUARTERS
NEWINGTON CT FEBRUARY 8, 1993
TO ALL RADIO AMATEURS

A TELECOMMUNICATIONS BILL TO FREE UP GOVERNMENT SPECTRUM FOR COMMERCIAL USE, INTRODUCED INTO THE NEW U.S. CONGRESS, CONTAINS IMPORTANT PROTECTIONS FOR RADIO AMATEURS. THE BILL, S. 335, IS A REVISED VERSION OF S. 218, WHICH WAS NOT ACTED UPON IN THE LAST CONGRESS.

DURING THE LAST 102ND CONGRESS, THE ARRL SUGGESTED SIX POSSIBLE AMENDMENTS TO S. 218 TO MITIGATE THE EFFECT OF RELEASING FOR PRIVATE USE GOVERNMENT FREQUENCIES, SOME OF WHICH RADIO AMATEURS OCCUPY ON A SHARED, SECONDARY, NON-INTERFERENCE BASIS. FIVE OF THESE SIX PROPOSED AMENDMENTS WERE INCORPORATED INTO S. 335.

SENATOR DANIEL INOUYE (D-HI) INTRODUCED S. 335, "THE EMERGING TELECOMMUNICATIONS TECHNOLOGIES ACT OF 1993," ON FEBRUARY 4, SAYING:

"SENATOR STEVENS" (CO-SPONSOR FROM ALASKA) "AND I HAVE INCORPORATED SOME CHANGES TO ACCOMMODATE CONCERNS OF THE AMATEUR RADIO INDUSTRY. I AM HAPPY TO INCLUDE THESE CHANGES IN ORDER TO PROTECT THE RIGHTS OF AMATEUR RADIO USERS TO THEIR SPECTRUM."

THE CHANGES MADE AS A RESULT OF THE ARRL INITIATIVE ARE AS FOLLOWS:

1. THE BILL MAKES A "FINDING" THAT "A REASSIGNMENT OF FEDERAL GOVERNMENT FREQUENCIES CAN BE ACCOMPLISHED WITHOUT ADVERSE IMPACT ON AMATEUR RADIO LICENSEES THAT CURRENTLY SHARE ALLOCATIONS WITH FEDERAL GOVERNMENT STATIONS."

2. IN DETERMINING WHETHER A FREQUENCY REALLOCATION IS FEASIBLE, THE SECRETARY OF COMMERE SHALL "SEEK TO AVOID EXCESSIVE DISRUPTION OF EXISTING USE OF FEDERAL GOVERNMENT FREQUENCIES BY AMATEUR RADIO LICENSEES."

3. ONE BASIS TO BE USED IN DETERMINING WHETHER COMMERCIAL USE OF A FREQUENCY IS FEASIBLE IS TO BE "THE EXTENT TO WHICH COMMERCIAL USERS CAN SHARE THE FREQUENCY WITH AMATEUR RADIO LICENSEES."

4. THE ADVISORY COMMITTEE CONVENED TO REVIEW AND ADVISE UPON THE SECRETARY'S REPORT SHALL INCLUDE REPRESENTATIVES OF "OTHER USERS OF THE ELECTROMAGNETIC SPECTRUM, INCLUDING RADIO AND TELEVISION BROADCAST LICENSEES, STATE AND LOCAL PUBLIC SAFETY AGENCIES, AMATEUR RADIO LICENSEES, AND THE AVIATION INDUSTRY."

5. THE PRESIDENT MAY, ON CERTAIN GROUNDS, SUSTITUTE ALTERNATIVE FREQUENCIES OR BANDS FOR THOSE CHOSEN. AMONG THE GROUNDS ON WHICH HE MAY ACT IS "THE REASSIGNMENT WILL DISRUPT THE EXISTING USE OF A FEDERAL GOVERNMENT BAND OF FREQUENCIES BY AMATEUR RADIO LICENSEES."

6. COMPETITIVE BIDDING AUTHORITY GIVEN THE FCC UNDER THIS ACT "SHALL NOT EXTEND TO ... AMATEUR OPERATOR SERVICES...."

"THESE CHANGES GO A LONG WAY TOWARD ADDRESSING AMATEURS' CONCERNS ABOUT THIS LEGISLATION, AND CLEARLY ESTABLISH THAT OUR NEEDS MUST BE CONSIDERED AS THE BILL PROCEEDS THROUGH THE CONGRESS," ARRL EXECUTIVE VICE PRESIDENT DAVID SUMNER, K1ZZ SAID.

Today's Educational System...

In an examination, a Junior High student wrote about the "hideous corpus". Another student quoted from the Declaration of Independence..."Every man should be divided equal".

The computer is one of the great inventions of our time. There are still as many mistakes as before, but now it's nobody's fault.

From the collection of
Sonny Gutin, WB2DXB

It's Still The LAW...

- In New Jersey, it's against the law to slurp your soup.
- In Michigan, it's against the law to dress like a deer during hunting season.
- In Dyersburg, Tennessee, it is against the law for a female to call a male and ask him for a date.

PACKET RACKET

- or -

Is packet becoming like CB?

Please consider this:

CB has limited channels. Most CB'ers know virtually nothing about setting up their stations properly, so they buy radios and antennas that are plug and play. When their limited channels become crowded, they try to make their rigs more aggressive, and they buy amplifiers and bigger antennas in an effort to make their signals heard.

Packet has limited channels. Most packeteers know virtually nothing about setting up their stations properly (how many know what their deviation setting is for NBFM 1200 baud?). When their limited channels become crowded, they try to make their TNC's more aggressive, and they buy amplifiers and beam antennas in an effort to make their signals heard.

Sound similar? Yup - and you know what - it doesn't work! Making your TNC more aggressive merely insures that you'll collide with another station, with the stronger station winning. Beam antennas contribute to hidden terminal syndrome on carrier sense multiple access (CSMA) simplex channels.

Your TNC has collision avoidance parameters, and using these will actually make your station work better. If you wait until the smoke clears, and then send your packet or ACK, it probably won't be collided with, and will get through a lot more often than those in the "dogpile".

What can you do to make your station work better?

First, set your deviation to around 3 KHz. A simple way to get it in the ballpark is to listen to your packets on a second rig. Open the squelch, and make your packets a bit less in volume than the squelch noise.

Second, set FRACK 8 or MORE!!! FRACK sets how many seconds your TNC waits for an ACK before sending a polling frame. The default setting of 3 is far too aggressive, and causes a lot of needless retries, and actually makes you more likely to retry out!!

Third, set RETRY 15. This will not cause problems if your path is good and packets make it the first try, and will give you a few more tries than the default RETRY 10 in case you need them. If you retry out with RETRY 15, your path is probably bad, and you should try setting your parms "nicer", and/or find a better path.

On rare occasions, you might need to set RETRY 0, but be careful! You could be voted "the most popular fellow on the channel since Saddam" if you forget, and hammer the channel with endless packets all night long!

Forth, set persist 63 (31 if there are closer to 8 users at any given time) and slottime 30. If your TNC doesn't have these (older TNC's use DWAIT and RESPTIME, and are not compatible), upgrade your ROM to a newer version that supports p-persist. This will randomize the time you wait before trying to send a packet, and gives everyone a better chance at completing their packets.

Fifth, most TNC's don't have a DCD state machine in them, such as AEA. These require you to use the radio's squelch control - otherwise your TNC won't transmit. Most can be retrofitted with a DCD state machine for around $20 from TAPR [(602)749-9479]. It's the best $20 you'll ever spend on packet!

Sixth, some radios are not very well suited for packet. These usually have wideband receivers, slow keyup times, slow receiver recovery times, and/or are not designed for outdoor antennas. A lot of HT's fit this category, although some do a very good job. Also, some cheaper mobile rigs have problems.

These problems all cause you to miss hearing packets. While your rig is deaf, another station could be sending a packet, but because you don't hear it, you'll transmit over it. This causes a collision, and adds to channel congestion.

Not everyone can afford to run out and buy a new packet rig at the drop of a hat, and that's not what I'm saying. It is good for us to be aware of these things. Some might be able to mod their rigs, such as keeping the receiver and transmitter oscillator stages running constantly, or perhaps adding some selectivity to the receiver front end, etc. Some of us will have to use cheezy radios because that's all we have - and that's

(Cont'd Next Page)

OK! I use an ICOM u2AT (one of the worst!) for portable packet. We have to use what we have, and a few extra packets is no reason to deny anyone access to this wonderful digital mode!

The bad thing about many of these problems is that you don't notice them. Packet is very forgiving, and will retry any lost packets. If you notice you're keying your transmitter a lot more often than you're hitting the ENTER key, be suspicious!

The answer to congestion is NOT the CB answer - it's the HAM answer. We hams are trained radio operators. Every one of us who is legally licensed knows enough about electronics to be considered an "Einstein" by the average person.

The HAM answer is to properly set up our equipment, cooperate with one another, help one another, and make it work!

Complements to Mike, WD6ERH

73...DE...JOHN\N2PKF

Attention N.J. Amateurs

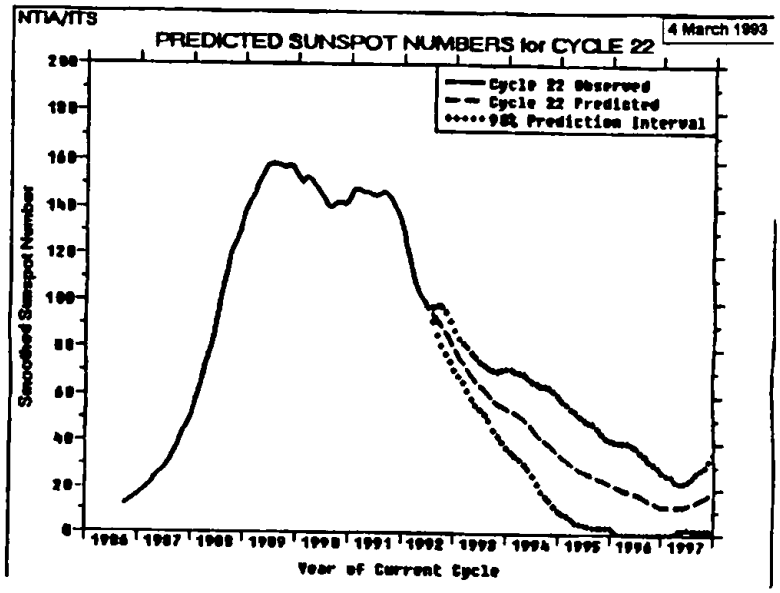
AS WE ALL KNOW (Ed:Especially if you read the January 1993 Crosstalk article by KB2GW), New Jersey Motor Vehicles is distributing new reflective licence plates. Their plan is to eliminate and replace all other colors of plates within the next three years. All those who have custom tags, which includes HAM TAGS, with their amateur call must register for the new tags by the deadline. If you don't, the state will issue you a regular, 3 letters & 4 numbers, tag.

If you need an application for the new reflective plates, I have several. All it requires is a copy of your current registration and a check or money order for $10.00 made out to the N.J. D.M.V.

If your registration is due to expire within 60 days you must wait untill after renewal to send in your application.

If you want an application please contact me and I will get one to you. I am listed in the new club roster for 1993.

73... ED HANKIN\KB2ODJ



This is the predicted Sunspot Number for cycle 22. This tells when it started, where we are now, and what to look for in the future. As you can see we are just about half-way down the curve and it means that at night the high bands like 20, 17, 15, 12, and 10 are not worth anything. It means that in a couple of months, like June or July, and thereafter until the year 2000 or 2001, 12 and 10 meters will not be worth anything. 15, 17 meters will stay open from about 10:00 AM EST to about 1600 EST and then die. 20 meters will not do any good at night time until about the year 2000, and then it will open up very slowly.

At the present time unless the Solar Flux number rises above 150 and the A and K indexes stay low, 10 meters will be like 2 meters, you will be able to talk across town. This Sunspot cycle is very regular and nothing exceptional is going to happen and the DXers, will have time to do a lot of low-band stuff.

30, 40, 80 and 160 meters are alive now and will be even better and the cycle deteriorates. During the winter season is the time for the fellows to get their low-band DX in now while the QRN is low. This is the time to work on their 5 Band stuff and get the low band contacts out of the way.

If anyone is interested I have the correlation between the Sunspot number and the Solar Flux data.

Hope this helps. Have fun, keep warm.

C U L 73 John. K2JF

ATLANTIC DIVISION AWARDS

An "Amateur of the Year" award for the ARRL Atlantic Division is presented every year at the Division Convention, held in conjunction with the Rochester, NY, Hamfest.

A "Grand Ole Ham" award may also be presented to an OM or YL in the Atlantic Division who deserves recognition for lifetime contributions to Amateur Radio. He or she must be at least 50 years of age or licensed at least 30 years.

A "Technical Achievement" award recognizes an individual or group in the Atlantic Division for outstanding technical contributions.

The awards are announced at the hamfest banquet and commemorated by handsome plaques. Publicity about the awards is sent to major Amateur news media.

Many hams in the Atlantic Division deserve nomination for these awards. You probably have some in your own club or community. All you need to know in order to nominate someone is available from:

Dick Goslee - K2VCZ
24 Elaine Drive
Rochester, NY 14623.

The nomination deadline is April 1, 1993, so don't delay.

73... The 1993 Awards Selection Committee:
Dick Goslee, K2VCZ, Chairman
Hugh Turnbull, W3ABC, Director,
ARRL Atlantic Division
Kay Craigie, WT3P, Vice Director,
ARRL Atlantic Division
Bill Thompson, W2MTA, ARRL Section
Manager, Western New York
Jake Kovalchek, AK2I,
1991 "Amateur of the Year"
Bob Josuweit, WA3PZO,
1992 "Amateur of the Year"

(Editor's Note: Doesn't the G.C.A.R.C. have people who deserve to be nominated for these awards? How about it!? Let's get together and put our winners up front!)

AS YOU ALL KNOW BY NOW Mary Ellen Wells (N2KLD) has resigned as New Membership Chairperson. I have taken her place, and would like to thank her for the great job she did preparing me for all my new responsibilities.

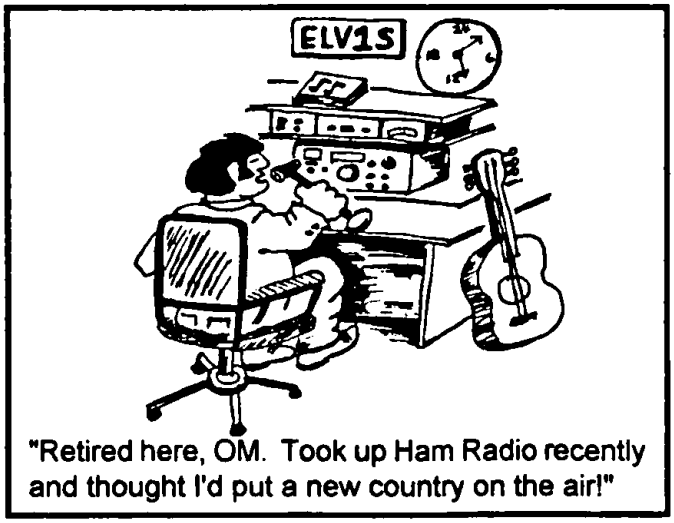
If anyone needs an application or information to help bring in a new member, please feel free to contact me at any time during the early evening.

I have also taken the position as site chairperson after Jim McDonald's (N2AIV) resignation last December. I would also like to thank Jim for his service to the club in taking care of the trailer and grounds at Mulica Hill.

As new site chairmen I have many projects planned for the spring season and am already looking for volunteers to help out. If you are ever at the site and notice any problems call me imediately. Both my home phone and beeper numbers are clearly posted by the site phone. If you have any questons about the site or would like to offer to help out, please contact me.
Hope to hear from you as a member.

73...KB2ODJ\Ed Hankin

Last month I had to ask..."What Next?"
Now I know!



"Retired here, OM. Took up Ham Radio recently and thought I'd put a new country on the air!"

W2MMD Repeater- Call Slot Listing

As Of 02/15/93

01:	SYSTEM USE	21:	WA2TML	41:	WA2IBZ	61:	N2SRO
02:		22:	N2FNF	42:	N2AKL	62:	N2FKT
03:		23:	KC2PC	43:		63:	KA2OSW
04:		24:	K2JF	44:	K2RCH	64:	N2FKS
05:		25:	W2PAX	45:	WB2THM	65:	WB2CAK
06:	KF2AW	26:	N2ASV	46:	KA2DZF	66:	WB2DXB
07:	KA2ZRN	27:	WB2OZE	47:	WA2QOY	67:	WA2ZND
08:	N2KLD	28:		48:		68:	KB2GTV
09:	KB2AYU	29:	K2OWE	49:	KD2CR	69:	
10:	N2KDU	30:	KB2GW	50:	WA2USI	70:	KN2U
11:	AA2DJ	31:	WB2LNR	51:	WA2UDO	71:	N2DWR
12:	KE2WC	32:		52:	KE2ES	72:	KB2ETV
13:	N2KLE	33:	N2FJQ	53:		73:	WA2SIT
14:	AA2BN	34:	WB2HVJ	54:	WA2TOP	74:	N2DUZ
15:	WA3UVV	35:	W2SPN	55:	K2PQD	75:	
16:	N2HYS	36:	WA2GFK	56:	KA2OSV	76:	N2IVN
17:	KA2DOT	37:	WA2FGA	57:	W2DWE	77:	KB2COB
18:	N2MOO	38:	WB2OYQ	58:	N2DJZ	78:	SYSTEM USE
19:	N2LZS	39:	KA2KMW	59:	N2AYK	79:	SYSTEM USE
20:	KE2SC	40:	KZ2N	60:		80:	SYSTEM USE

JUDGE RULES RADIO NOXIOUS!

February 11, 1993, David K. & Sharon T. Brower, WA4NST & N4XLF respectively, of Vero Beach, Florida recently lost a two year legal battle over their 68 foot radio tower and antennas. In the Final Judgement for the plaintiffs (seven households) Judge Charles E. Smith of the 19th Judicial Circuit in and for Indian River County, Florida, has found the radio transmissions to be a noxious and offensive activity, the appearance of the tower and antenna an annoyance and nuisance to the neighborhood, and, quoting the Final Judgement, "This large, tall (87-feet) tower and antenna sticks out like an eyesore to this subdivision and neighborhood."

Smith also broadly ruled that the tower is a building that exceeds the two story limitation for buildings in the deed restrictions and limitations of the subdivision. The deed restrictions are silent about antenna support structures. Pending appeal, Smith has stayed his order to remove the radio tower and antenna but has enjoined the Browers from further radio transmissions from their home!

If the Browers are not successful with the appeal, this case will set a dangerous precedent for any Ham who has a neighbor that does not like the appearance of his exterior antenna and alleges interference to home electronic appliances. Like the Browers, the Ham will be ordered by the court to remove his tower and cease radio transmissions.

73 de Roger

KC4NHB @ KB4VOL.#WPBFL.FL.USA.NA

(Editor's Note: Thanks to N2IMK, Gene, for sending this item to us from Canton, Ohio.)

Repeater News

SINCE WE HAVE A LOT OF NEW USERS on the repeater, I thought it would be appropriate to go over some "rules" for repeater operating. Some of these, as you will see, are really rules, *i.e.* the FCC requires them. Others are merely suggestions for courtesy and good operating practice.

1. Monitor the repeater to become familiar with how it operates and to learn how other hams use the repeater. Listen a lot. Don't be afraid to ask questions if you hear something you don't understand.

2. To initiate a contact, if the repeater is quiet, simply indicate that you are on frequency. "This is N2XYZ monitoring" works just fine. Hams do not call "CQ" on a repeater.

3. Identify legally. You must transmit your call sign at the end of each contact and every 10 minutes during a contact. It is illegal to "kerchunk" a repeater (transmit an unmodulated carrier) without identification. This is an unidentified transmission. It is also just as illegal to transmit "touch-tones" to activate repeater functions without identifying.

4. Pause between transmissions. This allows other hams to break in (someone may have an emergency). Don't begin speaking until all of the courtesy tones have passed. This is necessary on our repeaters to reset the time-out timer.

5. Keep your transmissions short and thoughtful. Try not to tie up the machine too long. And remember, your transmissions are being heard by many listeners, including non-hams with scanners.

6. Use simplex whenever possible. Make contact on the repeater, and move off to a simplex frequency if you can, especially if both parties are at base stations. Leave the repeater free to be used by mobiles and those who need it.

7. Use the minimum amout of power needed to maintain communications. This is an FCC Rule and it minimizes the possibility of bringing up a distant repeater on the same frequency.

8. Use the Repeater and Autopatch properly. Don't abuse the Autopatch or Reverse Patch by making excessive calls. Unlike some other repeaters in the area, 147.18 is not an "Autopatch Repeater". The Patches are available for use when needed by all authorized GCARC members, but they are not our primary reason for maintaining the repeater. Consider whether a situation is really an emergency when using the Emergency Autodialer. A car broken down on the side of the road does not necessarily constitute an emergency. FCC Rules prohibit the use of Amateur Frequencies for any type of communications that further the interests of a business.

9. Contribute to the support of the repeater(s) that you use. Repeaters are assembled and maintained at considerable expense and the regular users of a repeater should contribute to it's support.

The ARRL Handbook was used as the basis for the above rules.

And a reminder . . . the 2 meter repeater uses a transmitter turn-on delay to prevent weak, distant signals, which are fading in and out, from constantly bringing up the repeater. The delay is 500 milliseconds. It delays turn-on of the transmitter. If you key your mike before the transmitter drops the delay will not affect you. However, if the repeater transmitter has dropped, you should key the mike and pause briefy before beginning to speak. Otherwise, the first few syllables you speak will not go out over the air. If you have any questions about any aspect of our repeater operation don't hesitate to give me a call.

Thanks and 73...

Chuck, WA2TML

Repeater Chairperson

G.C.A.R.C.

$500 SCHOLARSHIP

Any G.C.A.R.C. graduating highschool senior plann9ing a career in electronics, computer science or mass media, is eligable to apply. For an appplication, write or call:

Greg Potter - WN2T
70 Pitman Ave
Pitman, NJ 08071

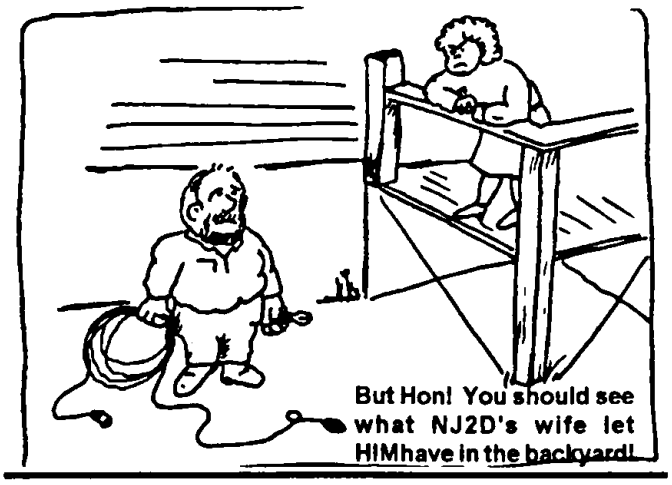
DEADLINE - APRIL 26, 1993

73... Gerg, WN2T

SORRY FOLKS, but there was no **DX Report** this month. And, because of space, I had to cut the calander out also. However, these are the events that are due for the month of March:

3rd ..... G.C.A.R.C. General Membership Mtg.
4th ..... Phil-Mont VEC Testing 1800Hrs
6th ..... Hamfest - Absecon, NJ
7th ..... RACES Net 2000Hrs
14th ..... RACES Net 2000Hrs
17th ..... G.C.A.R.C. Board of Directors Mtg.
18th ..... Bellmawr VEC Testing 1815Hrs
21th ..... RACES Net 2000Hrs
Hamfest - Monroeville, PA (ARRL)
Hamfest - New Castle, DE (ARRL)
27th ..... U. of P. ARC VEC Testing 1030Hrs
Hamfest - Timonium, MD
28th ..... RACES Net 2000Hrs
Hamfest - Timonium, MD

73... N2DUZ, Harry
Crosstalk Editor



The difference between men and boys?
Nothing more than the cost of the toys?
Nah! We need SPACE too!!!!

Club Jacket Order Form

Royal blue - Satin finish - Quilt lined Jacket. White/blue striped collar & cuffs. GCARC Club emblem on back in yellow with name & call on front. COST?

Standard jacket $32.65
Call sign (xtra) ..... $ 1.75
Total Each $34.40

Jackets over the size of XL, add 2.50 for each xtra size. (*I.E.* XXL=$2.50, XXXL=$5.00)

We NEED a minimum of 45 jackets to place the order. All jackets must be paid in full before delivery. If we do not make the 45 MINIMUM piece quota, checks will be returned in full.

NAME: _____

CALL: _____ Spelling of name on jacket: _____

SIZE: _____ DATE _____

AMOUNT: _____ SIGNATURE: _____

PHONE NUMBER: _____

Clip the above form and mail it with your check, payable to Louis Iocona, to:

Louis Iocona
P.O. Box 343
Mantua, N.J. 08051

Delivery should be about three(3) weeks after order is placed, by me to the company.