



Scuttlebutt

August 2008

Issue 195

Next Meeting:

Saturday, August 23, 2008

Speakers 1PM-4PM *** General Meeting 4PM-5PM**

New England Division Convention Holiday Inn, Boxboro, MA

Captain's Cabin

As I write this next installment of the Captain's report, I have to say this has been one of the busiest summers I have experienced in quite some time and for the most part, a lot of non-radio stuff. Things are settling down a bit so now I need to get going on all those spring projects I promised to get done ASAP (NOT). Every year I go through the same challenge – during the contest season I consider all kinds of station upgrades, antenna changes, and new strategies that all require some hours in the backyard and time and time again, I just cannot make it out into the antenna farm. Very frustrating! But I still do have a goal of doing something better for 160 M by adding 30 ft. to one of my towers, and building a 4 Square system for this band. If you did not make it to Dayton this past May (and I did not), there was a great presentation done by K9RS on putting up such antennas on small lots and short towers – worth reading on the K3LR website. Check it out. This has inspired me to continue to get this project done.

August is already here and we are on the verge of another fun contest season. I have been “tuning in” to some of those projects that are finding success around the YCCC territory such as new towers, home brew yagis placed on towers defined by the HFTA program. A lot of high expectation from these people as they try out their new digs! Good luck and enjoy the next phase of your contesting endeavors! It's those incremental changes that can really make a difference in the score!

And another big event in YCCC country takes place on August 23 in Boxboro, MA – the ARRL New England Division Convention. The club holds a key block of time during this weekend of radio fun – nearly all of Saturday we host a series of presentations that will appeal to the masses. John, N1PGA will present the theme of low power contesting with wires and provide some very excellent insight into this side of contesting, and Ed, N1UR will give us a trip to the other side of the world and show us all what it takes to put Spratley Island on the air. Finally, if you have done any receiver analysis and wished you could experience testing multiple receivers in a perfect environment, and then you need to hear Rob, NC0B present on receiver design. For old timers in the crowd, you recognize his work with the Drake line many years ago. This talk one should not miss. The YCCC is covering his expenses as he is OUR guest speaker. Come and learn something about the most critical piece of equipment in your shack.

Then at the end of the day, the YCCC will hold it's general meeting that includes the following lineup – Raffle Drawing for the YCCC Youth Scholarship Fund – we have some very nice additions for your shack this time. Only \$25 gets you a chance to come home with a contest-oriented device for your shack or antenna farm. Check the YCCC reflector for the list of prizes! And included in this highly charged meeting, our own Paul and Charlotte, K1XM and KQ1F will take us to the land of the 6V in west Africa – this you cannot miss – awesome show!

So see you at the Convention near the end of August and get busy with those Spring projects that you have been putting off (oh, like me!). Good contesting!

Mark, K1RX

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CREW NEWS

New Crew:

WMA Meeting

N1YCW, Bruce Pierce
KB1OEV, Blake Edwards
AE1T, Peter Drexel
W1LOZ, Alan Lisitano
KB1MYK, Brenda Lisitano
KB1MYL, Lori Lisitano.

KB1OEV is a recent college graduate and KB1MYK and KB1MYL are high school seniors; these younger members are a welcome addition to the club.

YCCC Remembers - SK:

KC1F, Stuart Santelmann
KB1GW, Glen Swanson
N1NAP, Santo Cassarino
W1GDQ, Dave Miller

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The editorial deadline for the Scuttlebutt is the 10th of every odd month.

Flotsam & Jetsam

Barnacle Jack Schuster, W1WEF w1wef@arri.net

Ahoy Maties!

I don't know about you, but my summer is flying by faster than ever. Although I expected to make fewer trips back to CT from the Cape than ever, I just couldn't stay here knowing there were antennas to be repaired back home. It seemed like almost all my antennas developed problems at the same time. The toughest to reach are fixed now, at the top of the tower, but another TH6 and 40-2CD are yet to be overhauled and returned to the tower.

After the boom broke on the reinforced 40-2CD at 116 ft, an intermittent problem developed in the overhauled lower 40-2CD that I replaced it with. To isolate where the problem was, I hauled a long pole to the top of the tower, hooked up my MFJ259B at the top, and banged on each element. SWR jumped way up when I hit the culprit. After a lot of work to get the element down, I found a loose sheet metal screw at one end of the coil...a problem that unfortunately is all too common with this antenna. The fix was to drill thru the element and replace the sheet metal screw with an 8-32 SS pan head screw and nylock nut. In addition to the loose sheet metal screw, I found two loose rivets that held the element to the fiberglass coil form. These were drilled out and replaced with pop rivets, as the play that resulted from the loose rivets might have caused the loose coil connection.

At lunch last week with K1ZM, Jeff mentioned that the newer beefier Cushcraft XM240 uses nylock nuts to hold the "top hats" that provide capacitive loading to shorten the elements.

The earlier antennas with small lockwashers and nuts on top hats have been known to sometimes loosen and drop the hat to the ground. At his PEI station, Jeff has to ruggedize his antennas to survive a tough environment. For example, to prevent booms from rotating in the wind, he makes his own U Bolts by bending threaded 1/4 in or 5/16 threaded rod around the appropriate diameter pipe. By using threaded rod, the threads bite the element or mast better than a smooth U bolt. The storms that miss us and go out to sea often find their way to PEI.

Jeff also passed this along...When mounting a beam in a fixed direction on tower legs, he clamps the boom to two legs. However, the legs are seldom aligned in the exact direction desired. To overcome this, Jeff used a typical boom to mast plate with 4 U bolts, but uses his home brewed extra long threaded rod U bolts around one tower leg. On the back side of the plate he puts spacers between the leg and plate, nested between the four U bolts to get the desired offset and boom direction. For spacers he has used ceramic tiles or pressure treated wood.

After a couple years hiatus from tower work, BJ (Barnacle JACK) had to recall a lot of old lessons learned. Most of all, PLAN carefully step by step what you will be doing; what tools will you need, what EXTRA tools or hardware you should bring up the tower in case you drop something. Which leg should I mount the gin pole on?

By the way, if you don't have carabineers and slings with you on the tower, you should! (get them at EMS or REI) If you haven't got a full body harness instead of an old fashioned climbing belt...look at Champion Radio products and order one. (IMHO outlawing climbing belts was one of the best things OSHA ever did).

BJ recently had a nice visit with John Thompson, W1BIH. He is in an assisted living facility in Kingston MA, where he has a rig in his room but isn't very active. (with current condx who is?) He did work a BY recently though with his low power Elecraft rig and wire antenna. There is only one other ham in the place, a woman whose room is directly above his with her 75M dipole fed right in front of John's window! John has coax feed and his antenna is farther away in the woods.

Have I told you about my favorite power tool? I probably have, but it comes in handy so often I have to mention it again. It's a Ryobi 4 inch angle grinder that makes cutting thru steel like cutting a piece of cake. Only about \$30 at HD, cutting wheels are \$1.49 each. The last time I used it was at the top of the tower where the rotor plate I installed between the thrust bearing and rotor was interfering with the mast. I did have to run 120VAC up the tower, but was able to cut the clearance I needed in the steel plate.

George, W1EBI sent this along: For those (like me) who prefer not to build their own baluns and RF chokes, I am happy so far with some high power 1:1 baluns from Balun Designs LLC. Rated for 5kW and very well made by KZ5R. I fried the very over-spec'd matching units on both my Carolina Windoms with only 1kW out and max SWR of around 3:1. All my antennas are now coax-fed traditional dipoles. These choke baluns have not been in service very long, but I expect a far better survival rate. Balun Designs website: <http://www.balundesigns.com/servlet/StoreFront>.

See you all in Boxboro!

Look for me and my RV!

JACK W1WEF

The YCCC Find-A-Chair Program

The Find-A-Chair program is designed to increase the fun of contesting for all members of YCCC involved not only in multi-op stations but single op stations too! A central repository of available operating positions and operators will be created. The program will match operators with chairs.

All you have to do is send an email request from anyone interested in participating in the program. Who will participate? Anyone can! Here are some examples:

- A multi-operator station that does not have enough operators.
- A beginning operator looking to sit alongside more experienced operators to improve his or her skills.
- An experienced operator without a station looking for a place to get on the air.
- A member with a single op station that would otherwise be idle.

The program attempts to match operators with stations. How do I participate in this program? Simply send an email to FindAChair@k0tv.com and let us know how you would like to participate.

For multi-operator stations, please include your station location and what kind of operator you'd like to have participate.

For members with single op stations that would otherwise be idle, please include your location and any specific restrictions on the use of your station. Please also indicate if you wish to have your station posted as available on a web site.

For members looking for a place to operate, please include the distance you would be willing to drive, the hours you are available to operate, whether you are a beginning or experienced operator, and any other specific information relating to your needs.

I will post available stations on a web site and put operators in touch with stations and let the participants take it from there.

Currently: Operators looking for seats
None

Stations looking for operators
K1TTT (Peru, MA - M/M),
KB1H (East Killingly, CT - M/M/2),
K0TV (Hudson, NH - M/2).

All Multis are looking for operators at all skill levels.

Kick Butt,
Jerry, K0TV

YCCC Wins 2007 Russian DX Contest Club Competition May, 2008

Received in the mail the Plaque for the Club Competition from the Russian DX Contest sponsor!

YCCC Winner for 2007

For all that played in this one, especially K3NA and W1UE with their big scores - Thanks!

Mark, K1RX

EVOLUTION OF A 4-SQUARE

Les Peters, N1SV



The four square array is a popular antenna invented in the 80s by Fred Collins, W1FC and Dana Atchley W1CF (SK). A classic four square array consists of four vertical antennas spaced $\frac{1}{4}$ wavelength apart forming the corners of a square. A hybrid coupler mounted at the center of the array provides the required phasing in order to achieve a gain of approximately 5 dB over a single vertical, a front to back ratio (F/B) of 20 dB or greater, and a 3 dB beam width of approximately 90 degrees.

In the summer of 2000 I decided to construct my first 80m four square array. Looking back now I really had no idea what I was getting myself into. Not content with the performance of the original array it's undergone a number of changes over the years in order to get to its present day configuration.

In the beginning

My first 80m antenna was a dipole strung between two pine trees about fifty feet above the ground. It wasn't a fancy antenna but it was effective in working my first 125 DXCC entities on 80m SSB. As my 80m DXCC total rose it became more difficult to hear and work new and more distant countries. I began to realize that I had reached a plateau and needed a better antenna system.

Selecting a new antenna design

In researching 80m antenna designs, I soon realized that it was unrealistic to think that I could elevate a horizontal antenna high enough to achieve the low angle of take off that I desired. So I began looking at vertically

polarized antennas. With verticals being omni-directional I decided I would have to combine two or more of them to achieve the directivity I desired. So the size of this project quickly grew!

To make or to buy

The decision whether "To make or to buy" is a classic one. And in my case I decided my goal was not another homebrew project but rather upgrading an antenna system in a reasonable amount of time.

After researching various antenna systems that would fit my property, and my wallet, I decided on a four square array using shortened commercial verticals and a hybrid coupler to properly feed power to the antennas with the correct phase relationships.

Birth of a Four Square

Not having any experience with four square arrays was a little intimidating at first. Sort of like jumping into the deep end of a pool when you're just learning to swim. While there was a lot of practical information available on setting up four squares using full size verticals there was little if any practical information available for someone trying to do the same using shortened verticals?

During the summer of 2000 I began construct the array in the woods in back of my house. With the array requiring almost an acre of land the first task was where to put it. After careful measurements the array was staked out with 10 feet to spare to the property lines of each adjacent neighbor. The area was then cleared and masts installed for mounting the verticals to

After assembling all four verticals in the backyard the first one was installed and its radials installed. I had decided to install four tuned elevated radials per vertical instead of a much greater number of ground mounted ones for simplicity. Each pair of radials was installed about seven feet above ground and adjusted using an antenna analyzer as if they were a low dipole. After the two pairs of verticals were tuned and then attached to the vertical, the vertical was then adjusted for resonance. When this was completed the antenna was temporarily detuned so that it would not affect the tuning of any of the other verticals. This process was repeated for each remaining vertical.

With all the verticals properly setup the hybrid coupler was installed along with the four 75 ohm RG-6 phasing lines that would connect the hybrid coupler to each vertical. In addition 200 feet of RG-213 coax and control lines were run between the hybrid coupler and my shack. The second coax run was connected between the dump port on the hybrid coupler and a dummy load and power meter in my shack. Being able to monitor the dump port power in the shack allowed me to monitor any energy that was reflected back from the array due to a mismatch.

Tuning the array was accomplished by monitoring the dump power from the hybrid coupler with 100w of drive applied and making small adjustments to the length of each vertical. This was repeated for all four directions (NE, SE, SW, and NW). This was a very tedious and time consuming process due to the interaction between the antennas. At times when I thought I had all the antennas in the current direction looking good, I would switch to another one only to find I had screwed another one up. Once I had properly balanced the array and achieved minimum dump power at 3.8 MHz for all four directions, I repeated the process with 1000w of drive power to make my final adjustments.

The array was completed in the fall of 2000. The first contacts made were with Europeans and the performance was eye opening. Signals from stateside stations received off the back or sides of the array were down 10 to 20 dB making it much easier to hear the DX stations in the highly congested DX window. While the many reports from Europeans confirmed that the array was working toward Europe, reports from Australia and Africa weren't so stellar. They indicated that there was little if any front to back in those directions. It was obvious that further adjustments were required before this array could reach its full potential.

More elevated radials?

During the summer of 2001, I increased the number of elevated radials from four to eight in the hopes of reducing my angle of take off and gaining a better front to back ratio in other directions than Europe. While the results using the increased number of radials showed an improved front to back ratio on longer paths like Australia or Africa, I still was unable to see the 20 dB or better I typically saw with the Europeans.

Still more elevated radials?

So if eight elevated radials work good then sixteen must work better right? So in the summer of 2002, I again doubled the number of elevated radials under each vertical to sixteen. At this point the radials in the back woods looked like a series of spider webs. The upgraded radial network showed an improved front to back on longer paths but how much was unclear. Was I starting to reach the point of diminishing returns? I found it difficult to find distant stations in certain directions that were strong enough that when I turned the array away from them that they were still far enough above the noise level to accurately measure F/B. Two stations that were very helpful were Don VK3DZM (SK) who regularly was on the short path at our sunrise and Robin VK6LK who was regularly on long path at our sunset.

Ground radials VS elevated radials

I wasn't fully satisfied with the elevated radial system and a little concerned with maintenance of all those wires. So in 2003 I decided to replace the elevated system with a system of 64 ground radials under each vertical. This was a fairly significant task that required nearly 3 miles of wire. I found adjusting the array using the new ground radial system much easier and I was able to achieve a minimum dump power of less than 1% for all directions as compared to 2.5 to 3% with the elevated radial system.

On air performance confirmed that the ground radials provided a lower take off angle in all directions as well as a minimum 20 dB front to back ratio. On several occasions I saw a 30 dB front to back ratio (~6 S-units difference). As expected my 75m DXCC total began to accelerate as I was now able to finally work stations in the Indian Ocean and Southeast Asia.

What about all that DX down on CW

During the winter of 2005 finding new countries to work was becoming difficult. It seemed that all the new countries I needed were only showing up down in the CW DX window from 3.500 to ~3.525 MHz. When I tried to use my four square array down there I ended up dumping more than 80% of my transmitter power into the dummy load connected to the hybrid couplers dump port. On receive the array exhibited little if no front to back ratio. It became obvious that I needed to modify the array if I expected to work station in the CW DX window.

During the summer of 2006 I installed a loading coil and relay at the feed point of each antenna. When the relay was energized it would insert the loading coil in series at the antenna feed point making it resonant at ~3.510 MHz. I also designed a new phasing network with a relay box and two new phasing lines for each antenna. The idea here was to construct a new 75-ohm phasing line which when connected to the relay box in a normally closed configuration representing a $\frac{1}{4}$ wavelength path at 3.8 MHz. When the relay was energized, a another 75-ohm phasing line approximately 1 meter long would be connected in line making the combination a $\frac{1}{4}$ wavelength at 3.510 MHz.

With the modifications in place, the array was now operational from 3.500 – 3.550 MHz as well as in the SSB DX window. The array appeared to have the same F/B down at 3.5 MHz as it did at 3.8 MHz. Having the capability to now use the array in the CW DX window has allowed me to work nearly 30 new



countries including my first 80m contacts to India and Mongolia.

Final thoughts

The evolution of my 80m four square array over the past seven years has been a real learning experience for me. Long term on air comparisons with other stateside stations running similar arrays but with full size verticals have shown that my signal is typically slightly lower to the same location due to my use of shortened verticals. However on receive my array appears to hear just as well as those using full size verticals and as they say you can't work them if you can't hear them!

While this array was an expensive investment for me, there were more cost effective ways I could have approached this project and achieved the same outcome. The commercial verticals purchased from Force12 worked well, but homemade verticals would have worked just as well and would have been considerably cheaper. If I were to build another four square array, I would not use elevated radials. Installing and maintaining an array like this takes a considerable amount of time and effort but produces big results. For those wanting to take on a project like this I suggest doing a lot of research. Talk to people who have successfully tried this before and take a look at several different installations to get ideas on how to create your own.

Editor's Note: If you don't have room for a full-sized array like Les, take a look at N9NB & K9RS's Dayton presentation Multi-element Lowband Vertical Arrays - Approaches for Small Lots
<http://www.kkn.net/dayton2008/multi-element%20lowband%20verticals%206.pdf>

Boxboro Lineup

A great line up of speakers prior to the General meeting at 4 PM.

N1UR will take us to Spratley and N1PGA will tell us about the contest thing with wires and low power. All good stuff for us to learn and appreciate the talent within the club.

Additionally, we have invited Rob Sherwood, NC0B to the Convention as our guest speaker - for the Convention as well as the YCCC meeting. He puts on a fabulous presentation on receiver technology. Come and learn!

And we are also to have another great multi media presentation from K1XM and KQ1F on their trip to 6V7 - you don't want to miss this one!

And of course, we continue to support our YCCC Youth Scholarship program with a great raffle.

Prizes include:	MFJ Tuner MFJ-989D	Heil Pro-set Plus
	Radiowaves	G5RV Lite
	Rig Blaster	ARRL Books
	Baluns.	

Although we are not posting up a radio this round, there are plenty of good reasons to buy a ticket and take a shot. Tickets will be sold at the convention just prior to the meeting. Look for Ed, K1EP and get a ticket or two AND help an extremely worthy cause.

http://www.boxboro.org/Boxboro_Schedule_Rev_4.pdf

Radian Rohn Sold to O'Brien Steel

June 30, 2008 - O'Brien Steel has acquired the assets related to tower and pole manufacturing operations of Rohn Products, formerly a Division of Radian Communication Services, Inc. Radian Rohn has a long history in the tower business, starting in the 1960's as Rohn and variously renamed through ownership changes as: UNR-Rohn and Radian Rohn. The newly reconstituted company will be known once again as Rohn. This change is not expected to effect the Amateur Radio portion of the business.

Rebuilding Cushcraft 40M Antenna Loading Coils

Jack Schuster W1WEF

When the boom broke on my Cushcraft 40-2CD and half the antenna came tumbling down from 116 ft, I was happy that it didn't land on a car and that the only damage aside from the boom was the tip of one element and a couple of loading coils. The antenna didn't owe me anything, having been up for about fifteen years and probably was "used" when I bought it. It always played well, and stood up to a lot of tough weather until now, thanks to N4KG modifications (Mar-Apr 94 NCJ) I had done to reinforce it sometime along the way. I did not reinforce the boom at the point that it broke, at the farthest joint where the end boom piece telescoped into the next piece.

One of the loading coils broke on one end, and the other had loose aluminum extensions and a loose screw holding the end of the coil winding to the aluminum. Since I like to document my station fixes, and was going to write up what I did anyway, I thought perhaps someone else could benefit from my experience. I believe the newer XM-240 uses the same coil design, so this may apply to that antenna as well.



The first step on both coils was to cut away the shrink tubing on both ends to just beyond the self drilling screws that secured the two ends of the coil winding. Next, I removed the screws, and drilled through the screw hole and through the opposite side to take an 8-32 stainless 1-¼ inch long machine screw. Before replacing the screw, I cleaned up the aluminum on both ends of the drilled hole with fine sandpaper, and applied a bit of Noalox. I used a stainless nut with a nylon insert (aka "nylock") instead of a lock washer and nut, but that would have worked as well.



The aluminum extensions on the fiberglass coil form are pop riveted through the fiberglass. I found some of the pop rivets loose, allowing the end of the element to wiggle slightly, and to possibly cause the coil winding screw to loosen. I have seen and heard from others who had the same screws loosen on other antennas before, but never linked the possibility that it was because of loose pop rivets.

I then drilled out the pop rivet that was at right angles to the machine screw I just installed, and installed a new 3/16 pop rivet. On the coil that had the broken aluminum extension, I cut a 6 inch piece of 7/8 OD .058 wall aluminum from my scrap pile, carefully measured for the machine screw and pop rivet location, and drilled the new piece.



The final step was to tape up the ends of the coil using a first layer of 3M 130C covered by 3M 700 electrical tape. After replacing the broken aluminum boom and element tip, I'll be happy if the antenna only lasts another 15 years!



The Finished Product, Good for another 15 years!

WMA Area Meeting July 26, 2008

The Western Massachusetts Area of the Yankee Clipper Contest Club held a picnic/regional meeting at the station of Dave Robbins, K1TTT, on July 26, 2008. The Picnic's purpose was to allow anyone interested in learning more about contesting to see a multi-multi contest station and the extensive antenna farm that goes with it, ask operating or hardware questions, operate the station in the IOTA contest, other general questions and to learn more about YCCC.

The agenda included a walking tour of the antenna farm and a discussion of antenna performance. The antenna damage from the winter ice storms has been repaired and many other station improvements have been made. Dave's latest project, under development, is a lowband receiving four square.

Several people took advantage of the opportunity to pass out QSOs in the IOTA contest.

A regional Yankee Clipper Contest Club meeting was held at 2 p.m. to consider applications from those interested in joining, rejoining, paying dues, etc.

We had record high number of applications for membership in YCCC, for the WMA Area. Six new members were voted in to membership and dues were collected from several other members.

Dave generously provided door prizes. Nine lucky people won various books, hats and coffee mugs.

The new members welcomed to YCCC were:

N1YCW, Bruce Pierce
W1LOZ, Alan Lisitano

KB1OEV, Blake Edwards
KB1MYK, Brenda Lisitano

AE1T, Peter Drexel;
KB1MYL, Lori Lisitano

KB1OEV is a recent college graduate and KB1MYK and KB1MYL are high school seniors; these younger members are a welcome addition to the club.

Attendees:	N1FJ	K1TTT	W1TO	N2KW
	K2XA	N2JFS	KB1W	KM2O
	WA1ZHM	W1EQO	KE3HT	N1YCW
	KB1OEV	W1LOZ	N1LZH	W1BS
	AE1T	W1ASV	KB1MYK	KB1MYL
	Linda Sullivan	Diane Gold.		

Tom Homewood, W1TO
Western Mass. Area Manager

YCCC CLUB RESOURCE INFORMATION

DUES AND MEMBERSHIP STUFF Dues are payable as of the April election meeting, which begins our club “contest year”. The YCCC has adopted a multi-tiered membership format as follows: Please note that payment of dues IS NOT a prerequisite for contributing scores to the Club aggregate, but IS for the various YCCC Awards Programs

Full Member - \$20 (\$35/2 yr) (Eligible for YCCC awards programs and paper delivery of Club newsletter)

Full Member - \$15 (\$25/2 yr) (Eligible for YCCC awards programs and electronic "Ebutt" delivery of Club newsletter)

Family Member - \$0 (Grants full membership to all amateurs residing at one domicile on payment of one member's "Full Member" annual dues and entitlement to one Club Newsletter sent to one domicile or email address. All members of said family are eligible for YCCC awards programs.)

Student Member - \$10 (Grants full membership to students at a reduced level. Eligible for YCCC awards programs and paper or electronic delivery of the Club Newsletter.)

Subscription - \$** (A "friend of YCCC" - not a member but a possible candidate for future membership. Receives club newsletter only in paper or electronic form. Fee basis is \$20 for overseas paper delivery, \$15 for domestic paper delivery and \$10 for electronic "Ebutt" delivery domestically or overseas.)

Club members who move out of club territory and so are not eligible to contribute to club aggregate scores automatically become subscribers. New members who join at the February meeting are credited with dues for the year beginning the following April. You can tell if you owe dues by checking your ‘Butt mailing label. **Mail your dues to the club treasurer, Ed Parish, K1EP, 9 Spoon Way, N. Reading, MA 01864**

SCUTTLEBUTT ARTICLES should be sent to the Scuttlebutt editor, Steve Rodowicz N1SR, preferably by E-mail at n1sr@arrl.net or on 3½” disk (in MS-Word format or text file) by snail mail to Steve Rodowicz, 809 Pendleton Avenue, Chicopee, MA 01020. The deadline for each issue is the 10th of the preceding month..

Scuttlebutt Advertising: Nominal Business Card sized ad, \$50 per year (6 appearances)

CONTEST SCORES should be sent to the club scorekeeper, Dave Hoaglin, K1HT, preferably by E-mail at scores@yccc.org. Please include details such as numbers of QSOs, QSO points (if appropriate), and multipliers (all types); entry category; and power.

CLUB GOODIES

BADGES YCCC badges are available from Ric, KV1W. Send \$2, name and call desired on the badge, and your mailing address to: Ric Plummer - YCCC Badge, PO Box 1158, Berlin, MA 01503-2158.

APPAREL Contact Bob Rogers KB1LN@yahoo.com

YCCC LOGO ITEMS <http://www.cafepress.com/n1ik>

QSL CARDS are ordered through Burt Eldridge, W1ZS. To order, send Burt an email at eldr@adelphia.net, detailing card information per “QSL Request” form available at http://www.yccc.org/members/yccc_qsl.htm. You will receive a proof by email. Approve the proof, making any corrections, and return to Burt *with payment* (make checks out to Burt, not YCCC). Current price is \$35 (delivered) for 1,000 cards.

MEMBERSHIP ROSTER is posed on the YCCC website. Updates are published in ‘Movers and Shakers’ when members move or change call signs.

COMPUTER STUFF INTERNET REFLECTOR There is an Internet mailing list for YCCC members. To subscribe, send mail to yccc-REQUEST@yccc.org. Insert only the word “subscribe ” in the subject of the mail message. (Do not send messages to the reflector that have file attachments, HTML formatting, use boldface or other fancy fonts, etc.)

WWW HOME PAGE Come visit us at <http://www.yccc.org> Our Webmaster is Mike Gilmer, N2MG.

ADMINISTRATIVE STUFF The W1 QSL BUREAU is sponsored by the YCCC. Keep your account up to date by sending a check. Stamps are sold at face value, envelopes are 20 cents each. Address: W1 QSL Bureau, PO Box 7388, Milford, MA 01757-7388. Email address: w1qsl@yccc.org.

ARRL COMMITTEE REPS are:

CAC: New England Dick Green, WC1M **Hudson** George Wilner, K2ONP **Atlantic** Michael Gilmer, N2MG

DXAC: New England Bob Beudet, W1YRC **Hudson** John Sawina, NA2R **Atlantic** Chris Shalvoy, K2CS

ARRL LIAISON: Tom Frenaye, K1KI.

Upcoming Meetings

Date	Type	Place
Aug 23	General	NE Div Conv Holiday Inn, Boxboro, MA

Ship's Log	August 2008	Issue 195
Captain's Cabin	Mark Pride - K1RX	1
New Crew		2
Flotsam & Jetsam	Jack Schuster – W1WEF	3
YCCC Find-a-Chair Program	Jerry - K0TV	4
Evolution of a 4-Square	Les Peters - N1SV	5
Rebuilding CushCraft 40M Loading Coils	W1WEF	8
WMA Meeting Minutes		10

Next Meeting:
Saturday, August 23, 1PM -5PM
Holiday Inn, Boxboro MA
(Directions: <http://www.boxboro.org/directions.html>)

The YCCC Scuttlebutt
18 Bancroft Tower Road
Worcester, MA 01609

FIRST CLASS MAIL