

Member-at-Large

Dewey Bennett, WMØH Corresponding Secretary Mark Foecking, AAØUJ

Jesse Bowen, WMØY



Central Missouri Radio Association, P.O. Box 283, Columbia, MO 65205

September 1996

A Special Service Club

### PHIL BROOKS, WØHBQ, SILENT KEY

Many of you will be saddened to hear of the untimely passing of Phil Brooks, WØHBQ (ex NØMYX). He was one of the really long time members of the CMRA. He is in one of the pictures in the club station from the 1950's. Our condolences to his wife and family, and remember him well.

#### **CLUB BUSINESS**

Please welcome Chris Rice into the club as a new member. We discussed obtaining a plaque to commemorate Paul Stuart's (SK, ex-KØSI) contribution to the CMRA and our selection of his call sign as an in memoriam call. We also may do a special event station from the club station to commemorate the many years the CMRA has been in existence. Any thoughts on this can be brought to club meetings or to the Central Missouri Radio Net on 146.76-, Wednesdays at 9:00 Central time.

After the Saturday morning breakfast August 31, several club members went to the club station at the Red Cross building to clean it out. Humidity had caused a lot of mildew to grow on the furniture and printed material kept there. We cleaned out all of the old magazines and books, scraped the carpet adhesive off the floor, and generally dusted and spruced up. Participating were:

> Bill Clark **KBØTNM** Mike Baker NØLBA Jesse Bowen WMØY Esther Bowen Jim Lawler **WYØB** Dewey Bennett **WMØH** Al Kullman NØREF Beth Kullman NØYXS Ray Gauthier **KBØIRV** Mark Foecking **AAØUJ**

The club's TS-430 has been returned to Kenwood for repair, and should be back in a month or so.

### REPEATER ABUSE

The return of '76 to the air has also brought an incident of abuse of the autopatch. Anyone hearing repeater abuse is asked to liusten carefully for any identifying sounds or voices, to tape record the incident if possible, and to call John Turner, NDØN, at 882-2479 days and 657-2391 evenings.

Ray Gauthier, KBØIRV, has accepted the task of becoming conversant with the repeater controller programming language, and will be responsible for changing the autopatch codes. He will give a short program on those changes at the September

meeting.

## MEETINGS STILL AT BOONE HOSPITAL

Our September meeting will be held Tuesday, the 9th of September, in Cafeteria Room B in Boone Hospital on E. Broadway in Columbia. According to officials of Boone Electric, the community room where we have held our meetings in the past will not be ready until probably November or December. We will test as usual after the meeting.

# PROPAGATION PRIMER (Part 1)

The bottom of the solar cycle is well upon us, as anyone who has worked the HF frequencies recently knows. But earlier this summer, astronomers have detected sunspots at high latitudes on the sun which are definately associated with the start of a new sunspot cycle. This means in a couple of years, it will once again be possible to work the world on 10 meters, or even 6 meters for you no-code licensees. Perhaps you have heard of the smoothed sunspot number or the 10.7 cm solar flux. Here is what these numbers do for you.

The sun has an 11 year cycle in which the number of sunspots (dark araeas on the sun's surface associated with ionization of the ionosphere) waxes and wanes. In years where there are few sunspots, the ionosphere is weakly ionized, and poor HF propagation results. When there are many spots, good HF propagation is the result. One way of quantifying the activity of the sun is simply to count the spots, which can be done with any decent telescope with a good optical filter (actually it is better to view the sun indirectly to avoid burning your retina if the filter fails. Information on observing the sun can be found in any amateur astronomical text). Since the number of spots visible from the earth varies from day to day, astronomers average the number of spots over a months time, and then average those quantities over a 12 month period. This is the smoothed sunspot number (SSN). Sunspot numbers of 30 or less are associated with relatively poor DX conditions, and few openings on bands higher than 20 meters. Sunspot numbers of 100 or more are associated with excellent DX conditions on 10 and 15 meters, as well as F2 propagation on 6 meters at times. Normally these high numbers are only seen for a few years out of each cycle. The last cycle peaked at a SSN of 159, and numbers into the low 200's were observed in 1958. We should see numbers in the 100's in 1999 or so.

Another index of solar activity is the 10.7 cm solar flux. This is a measure of the RF output of the sun at around 2800 MHz, which correlates with the activity of the ionosphere. The two measures are roughly proportional assuming a quiet geomagnetic field. A good source for these numbers is WWV at 18 minutes past the

hour. Hopefully the worst of the cycle is behind us and the next few years will bring a return to good DXing.

## HAM RIGS AT TRUCK STOPS -- BOON OR BUST

By Mark Foecking, AAØUJ

Many of you have heard of Kenwoods new marketing strategy, aimed at increasing the exposure of ham radio to CBers and others who may not have a knowledge of the hobby. Kenwood proposes to sell its rigs at truck stops and consumer electronics outlets, along with displays promoting ham radio. The idea is that people will become interested, get their license, and purchase a Kenwood rig to use in their hobby. Kenwood feels that this will give ham radio a much needed "shot in the arm" as well as boosting the profitability of their amateur radio lines.

No active ham needs to be told that they should be informative and supportive of our hobby. If people show an interest, they can be invited to the club station or a meeting to talk to other hams or get a chance to operate the club station. Interest among young people is waning with the popularity of computer communications, and there is not a lot of publicity concerning ham radio, particularly digital modes. We can tell interested persons that amateur radio can complement their Internet browsing, as well as opening up a new world of people to communicate with. It is possible to get into the hobby for less than the cost of a Netscape capable computer, and once the equipment is purchased or built, operation is essentially free. In many cases, we as hams do not promote our hobby as energetically as we might.

So back to Kenwood, and the idea that making ham rigs more widely available will increase the number of amateurs. Perhaps a few will be reached that wouldn't otherwise. But there is another consideration, and one which is hard to evade. I feel that making these radios more available will lead to the increased illegal use of said radios, particularly among those who already know what amateur radio is but do not want to take the time and trouble to study for a license. This is different from Radio Shack selling 2m and 70 cm equipment. When I bought my HTX-202, the retailer was very careful to ask for my license before he would let me transmit. Would comsumer electronics chains or truck stops be as careful? Radio Shack has always catered to the electronics hobbyist and ham operator, where many of the big electronics chains and truck stops have catered to the consumer only.

These rigs are also rather expensive, and stores would have a greater need to move them, particularly since they are not likely to be as popular as TVs and VCRs. I doubt that an assistant manager at a large truck stop would let a little thing like a license get in the way of making a sale. In fact, it is not against the law for an unlicensed person to own a ham rig. It is only illegal to operate them without a license, and given the poor state of enforcement lately, it is quite possible that an illegal operator could work the ham bands for many years without being caught.

Yes, it is possible to go to a hamfest and buy a rig without a license. In fact, I have seen hamfests where illegal 11 meter equipment and 10-only linears were openly for sale. But it takes some doing to find a hamfest, unlike merely going to your nearest retail store and plunking down your money. Information is available over the Internet for out-of-band transmit conversions for almost any modern radio. Selling rigs at consumer outlets makes it quite a bit easier for people looking for a 285Ø channel CB radio or police and fire band radio to get one, and one wonders if Kenwood really

cares what their gear gets used for. Money is money, I suppose.

I know that many hams and prospective hams, particularly those outside of big cities or who do not like to buy through the mail, will find it convenient to be able to purchase a new rig locally. It is possible that some interest will be sparked among groups with little prior exposure to ham radio. But care needs to be taken to reduce illegal use of this equipment. We as hams should be careful not to sell to unlicensed people, especially linear amplifiers and general-coverage-transmit capable radios. Stores selling these rigs should advise prospective customers of the need for a license and not sell until they can produce the license document or CSCE. Perhaps it can be made illegal for an unlicensed person to own equipment capable of transmitting on ham bands. After all, our bands are crowded enough. Hopefully your next 10-meter CW QSO will not be cut short by AM or LSB interference from a CBer using a Kenwood TS-50 that he picked up from Montgomery Ward. Or worse, police communications being jammed by someone using a converted TM-241 and 600 watt brick on the VHF police frequencies. It is true that all of this happens now. We shouldn't make it easy. I feel that we should be careful to make operation as difficult as possible for those who do not want to take the time to get their license. After all, it's not that hard to get the license! But you do have to try... 73 OM/YL de AAØUJ....

Central Missouri Radio Association P. O. Box 283
Columbia, MO 65205

\*\*\*Support CMRA!!!\*\*\*
Jesse Bowen WMØY
1915 Blue Ridge Rd.
Columbia, MO 652Ø2

