# FEEDBACK



**JULY 2001** 

VOLUME 46 NUMBER 7



### **JULY MEETING**

The meeting for the month of July will be held at the Massillon Senior Center on July 6, 2001 at 8:00 PM.

This will be a very unusual meeting. We will be minus a few members as we will be having the Safety Break going on at this time. As you know this is a major money maker for the club. This is how we stay solvent for the entire year. This is a chance to complete the entire year's funds in only one set - up & tear - down. In the week following Field Day, you should have been called to participate. I hope that everyone gets a chance to participate in this very worth - while event. I have published the list of volunteers on page three of this issue ( as it stands at this writting) . Please make sure that the times that you have volunteered for are the times that are marked. If there is discrepancy, please let Perry, W8AU, know as soon as possible.

This should be one of the best Safety Breaks that we have ever hade! It will take us through the Fourth Of July Holidays, and the entire week! If we have a real good Safety Break, maybe we can replace some of the faulty equipment that we experienced during Field Day!

And speaking of Field Day, the final score and results will not be known for some time yet. This newsletter is written just after Field Day and we haven' had time to do the necessary duping and gathering all that is necessary to sent to the League. With this in mind, we will NOT be ready with a score at the July meeting. It will be published in the August issue of *Feedback*, along with the score there will be a complete listing of band by band totals and scores. I hope to have a few pictures to publish also. This year's Field Day was a very enjoyable event. The weather cooperated, the bands were adequate and the food was delicious! I hope everyone had a chance to at least come and visit! I seen a lot of new faces there and I hope to see a lot more of them!

### - SHORT SKIP -



Twelve volt automotive electrical systems will soon be a thing of the past as automotive manufactures switch to new world standard of 36 volt systems. Let's hope our ham gear manufactures follow suit. Gee, I can recall when they went from 6 volt systems to 12 volt systems . . . . .

73 DE WB80WM



HAVE A HAPPY AND SAFE 4th OF JULY

### MARC MINUTES Friday June 1,2001

The June MARC meeting was held at the Senior Center with 37 members and guests present.

Don W8DEF called the meeting to order at 8:00 P.M. The Pledge of Allegiance was given and a round of introductions was made. He then asked if there were any corrections in last months minutes. There were none so they were accepted by Steve WD8MIJ and second by Tim WB8HHP.

The Treasury report was given by Anne N8GAF. It was accepted by Tim WB8HHP and second by Byron KF8UN.

Vice President Gene W8KXR was absent so Perry W8AU read the ARRL letter.

Don W8DEF gave the correspondence report. He had a couple of newsletters from other Amateur Radio Clubs He also gave dates of upcoming Hamfests.

### **OLD BUSINESS**

Don W8DEA said all 4 students that took the class passed their exams. They include, Thomas Hawley KC8RPA, Jerry Epstein KC8JLY, and Leonard Gerger KC8RPB. The only one present was Don Gusinger KC8RPE, he not only passed his Tech test he also passed the code and the General exam. Congratulations Don, he is waiting for his call.

We welcomed 3 new MARC members that joined that night. Don KC8RPE, Jim Zorger N8AHO, and Larry Feirstos KC8RKU. We also had 2 guests Jeff KC8CFM and Randy KC8KKT.

Thanks goes to Bruce AB8FB for finishing the shelves in the shack.

Don W8DEF said the lettering on the trailer has been finished. The trailer is ready for Field Day.

Discussed Field Day, workers will meet at 8:00A.M. at Jim WA8GXM's house, then proceed to Petros Park by 9:00 A.M. Perry W8AU to notify the media and Don W8DEF will contact the reporters.

Dan N8DZM will be chef again this year. Dan also suggested movies for those not contesting.

Gary WC8W gave the VE exam results,12 tested with 11 passing.

### **NEW BUSINESS**

The Safety Break will be Monday July 2nd. thru Sunday July 8th. We need everyone to sign up at least 2 times to cover all the times that need to be filled. Remember this is the only fund raiser MARC will have this year and we need all the help we can get to make it successful.

After the meeting there was refreshments, thanks to Dan N8DZM. Also the program which was a video on ESD.

Don W8DEF closed the meeting at 8:45 P.M.

Congratulations goes to Don K8DON and Rick K8RLW for winning the Breeze Shooters Hamfest tickets.

Congratulations also goes to Tim WB8HHP for winning the 50-50 for \$14.00.

Minutes by Linda K8MOO Secretary MARC

Safety Break list	6 p.m 12 midGary, WC8WSteve, WD8MIJ				
Monday, 2 July set-upDon W8DEF 10 a.m NoonEd, WA8DRT	Friday, 6 July, 12 mid - 6 a.m( )				
Noon - 6 p.mAnne, N8GAFPerry, W8AU	6 a.m 12 noon Dan, N8DZM				
6 p.m 12 MidDon, W8DEAStan, WA8NZE					
Tuesday, 3 July Mid-6 a.m( )	12 noon - 6 p.m				
6 a.m 12 noon	6 p.m 12 midTerry, N8ATZLynette, (xyl)				
12 noon - 6 p.mDon, K8DONEd, WA8DRT	Saturday, 12 mid - 6 a.m( )				
6 p.m 12 mid( )( )	6 a.m 12 noonSaundy, N8TZBShelby, N8XEO				
Wed, 4 July, 12 Mid - 6 a.mRich, KC8LYG	12 noon - 6 p.m				
6 a.m 12 noonSaundy, N8TZBShelby, N8XEO	6 p.m 12 midTerry, N8ATZLynette, (xyl)				
12 noon - 6 p.m	Sunday, 8 July, 12 mid - 6 a.m. ( )				
6 p.m 12 mid	6 a.m 12 noonSaundy, N8TZBShelby, N8XEO				
Thurs, 12 mid - 6 a.m	12 noon - 6 p.m				
6 a.m 12 noonJeff, KC8HRUDon, W8DEA	6 p.m 11 p.m. Tear downDon, W8DEF				
12 noon - 6 p.mLinda, K8MOOAnne. N8GAF					

### ..... DAYTON HAMVENTION 2001 REVIEW .....

This years Dayton Hamvention marked its 50th anniversary and except for some unfortunate soggy weather on Friday, it was the same fun and exciting event for me that it has always been. I can't be the only one who thinks this with attendance topping over 30,000 again this year. Quite an achievement no matter what you may think. Yes the weather was a bit dreary on Friday with rain occurring off and on nearly all day. I didn't even know that Flash Flood advisories were issued for the area until Friday night! Here in Massillon we don't have to worry about this very much but in southern Ohio its a different story!

As usual when it rains on the outside, it gets very busy on the inside making it nearly impossible to get around very easily especially in the main arena where the big names in amateur radio set up elaborate displays. In previous years there were several new introductions of new equipment that premiered at Dayton, but this year the only new rig that seemed to draw attention was the Kenwood TS-2000 which has actually been out for a while.

Since I was stuck inside on Friday I took the opportunity to stock up on all the free literature and catalogs that it usually available. My wife Lynnette was with me again this year and I can tell you she knows how to sneak through the maze of people and pickup every piece of free literature available and a few that I probably should have paid for! You can tell that everyone is cutting back on this sort of thing though, when I checked the size of the pile of catalogs it was only about 4 inches thick. I can remember when I would come home with 3 or 4 bags busting at the seams as well as a bag of free trinkets!. I also did a little bit of shopping, stocking up on some new rechargeable batteries, a ten pack of friction tape, wire ties and solder. You know the staples of a good amateur junk box!

There is always something happening in digital communications these days as personal computers become a part of every hams shack so I checked out the West Mountain Radio display to see the "RigBlaster" in use. At least I tried to but they were standing 5 deep at this table! Where's my step stool when I need it! The RigBlaster is a fancy name for a device that lets you operate nearly every digital mode know to man along with slow scan television using only a modest computer equipped with a sound card, some software and a rig. I finally decided to buy one and so far its pretty neat, especially the slow scan TV. I can remember when you had to have a very big and heavy Robot Scan Converter that slowly painted a greenish picture on a tiny 5 inch screen. Ah the golden days of radio, slowly but surely replaced by modern technology. Sorry, I drifted into my Ham Radio Time Tunnel for a few seconds again!. Anyway, the computerized Slow Scan TV works pretty good, perhaps I'll give a short demonstration at a future club meeting.

I capped off the day by attending the ARRL ARES forum moderated by Larry Rain, WD8IHP, Ohio's Section Emergency Coordinator. The main focus of the forum was an update on the new Emergency Communications Certifications program. Some new information and as soon as I condense it I'll put it up on our website. I also spoke to Larry about attending a future club meeting and we are making plans for this also.

Saturday at Dayton was a much nicer day so it was off to explore the huge Dayton fleamarket. I really don't think anyone can

do it justice in only one day, that's how really big it is but I managed to accomplish it by just scimming the table tops. I know I probably missed the really great buys this way but that's how it goes. I was looking for a great buy on a camcorder for use with ATV and did find a few that looked promising. One thing I've learned in nearly 15 years of attending Dayton Hamvention is that if you see something that you want BUY IT right then. Don't try to mark down the space and walk away to think about it. When you return to haggle over the price, guess what ... IT'S GONE! So needless to say I didn't come back with any camcorder, but I did manage to find a nice camera at a local discount junk store that works great for only \$ 15.00. I did end up buying a few items and am enjoying them a lot.

If you haven't been to Dayton lately I highly recommend you go next year. I know it will be pretty much the same as this years hamvention and you know what .... I SURE HOPE SO!!

### .... MORE KONTEST KUDOS ....

The July issue of QST is out and so are the results of last years ARRL November Phone Sweepstakes. This has always been one of the more popular events of the year and scanning the results for Ohio I came upon a noted a few familiar callsigns again.

Past club member Scott Detloff - K8DX has really done it this time by capturing top honors not only in the State of Ohio but also Great Lakes Single Operator High Power category. How? By only scoring 252,000 points on 1,575 QSO's!, that's how!. Congratulations Scott on this unbelievable achievement. Hey Scott, doing anything special for field day next year??????

Also special kudos again go out to our own resident contester Bryon Berger - KF8UN who also scored well during sweep-stakes obtaining 12,528 points on 116 contacts. Oh did mention he did this operating mobile? A tremendous effort Bryon, well done to both you and Scott.

Out of time for this month, I'm just back from Field Day weekend and a little pooped out! Next month a wrap up of Field Day 2001 - Massillon Amateur Radio Club style! Till next time,

**Terry - N8ATZ** 



### What Ever Happened to Channel 1?

bet you never thought about it, but if you were to look at your TV you would find an interesting thing. The channels go from 2 – 67, If your TV is older it will go to Channel 83. Why is this? Well you are about to take a step back in history to the year 1937 when TV was a brand new invention.

When TV stations were just getting started in the United States, there was a channel 1 There were also television stations that operated on channel 1 and TV sets that could receive channel 1. (Through all my Dumpster digging I have still not found a TV with a channel 1)

Here are all the frequencies.

In 1937 there were several channels and frequencies assigned to the TV broadcasters. They are as follows. Apex radio stations 41-44 MHz

Channel 1 44-50 MHz

Channel 2 50-56 MHz

Channel 3 66-72 MHz

Channel 4 78-84 MHz

Channel 5 84-90 MHz

Channel 6 96-102 MHz

Channel 7 102-108 MHz

Twelve additional channels 156-294 MHz

Referring to the twelve higher channels, an article in Broadcasting magazine on Nov. 1, 1937, said the FCC was "apparently earmarking them for the time when workable tubes are devised for these very short waves." Apex radio stations used amplitude modulation. Many evolved into the country's first FM stations.

In 1940, the FCC allocated 42-50 MHz for FM commercial broadcasters. This moved the TV channels up in frequency which meant a few stations had to change the frequencies they were operating at. FM radio stations 42-50 MHz

Channel 1 50-56 MHz

Channel 2 66-72 MHz

Channel 3 72-78 MHz

Channel 4 78-84 MHz

Channel 5 84-90 MHz

Channel 6 96-102 MHz

Channel 7 102-108 MHz

Channel 8 162-168 MHz Channel 9 180-186 MHz

Channel 10 186-192 MHz

Channel 11 204-210 MHz

Channel 12 210-216 MHz

Channel 13 234-240 MHz

Channel 14 240-246 MHz

Channel 15 258-264 MHz

Channel 16 264-270 MHz

Channel 17 282-288 MHz

Channel 18 288-294 MHz

The FCC Report on Ultra-High Frequency Allocations, printed in Broadcasting on June 1, 1940, said, "In addition, the Commission decided to discontinue television service in the present television channels No. 1 and 8; i.e., 44-50 mc., and 156-162 mc. Accordingly, since old television channel No. 1 is discontinued, television channel No. 2 will be renumbered television channel No. 1; and a new channel to be known as television channel No. 2, will be assigned from 60 to 66 mc. There is thus no loss of total space assigned to television below 66 mc., and there will remain a total of 7 television channels below 108 mc. Former television channel No. 8, 156-162 mc. together with frequencies between 116 and 119 mc. will be used to replace assignments in the band 132-140 mc."

In 1945, the FCC moved the FM radio band to the 88-106 MHz band (later 88-108 MHz). Since TV Channel 1 would be moving off 43-50MHz, Channel 1 could move down to that part of the spectrum. The chart below went in effect on February 25, 1946.

Channel 1 44-50 MHz

Channel 2 54-60 MHz

Channel 3 60-66 MHz

Channel 4 66-72 MHz

Channel 5 76-82 MHz

Channel 6 82-88 MHz

FM radio stations 88-106 MHz

Channels 7-13 as presently assigned

Some of the stations that were assigned to channel 1 were KARO, Riverside, CA, and WSBE, South Bend, Indiana. The WNBC-TV station was scheduled to move to channel 1 also. Here are the cities had a channel 1. Bridgeport CT, Canton OH, Fall River/Bedford MA, Manchester NH, Racine/Kenosha WI, Scranton/Wilkes-Barre PA, South Bend IN, Springfield/Holyoke MA, Springfield OH, Trenton NJ, York PA

If you look closely at the list again I bet you will see a city very close to us. There was presumably at channel 1 operating in Canton, Ohio. I have not been able to get any other information on this station though.

There were no broadcasters that were licended to operate on the new Channel 1. This was because it was necessary for the existing FM stations to move. After those services moved it was decided to reallocate the 44-50MHz to other services. This meant the end of Channel 1 and there was no renumbering of the remaining.

In 1948 the FCC added 2 more MHz to the FM band. It became like it is today (88-108 MHz). This gave the frequencies of channel 1 to a land mobile allocation. This included dispatchers and police and later the 6meter Ham band.

The television service was given what remained in VHF. Channels 2, 3, 4 operated between 54 and 72 MHz. Channels 5 and 6 were below the FM radio band at 76 to 88 MHz. Channels 7 - 13 occupied 174 to 216 MHz.

The FCC also gave television an allocation in the new UHF band. This was channels 14-83. But broadcasters preferred to operate on the VHF frequencies because the TV's out there were all on VHF.

The UHF band has even faced reallocations over the years. The old channel numbers were 14-83. Channel 14 was around 490MHz and channel 83 was in the 880MHz area. With the high demand in 800MHz and lots of inactivity in the channels of 70 - 83, the FCC reduced the UHF band. It is currently Channels 14-69. Channels 70-83 are used today for Cell phones, pagers, even Canton PD uses frequencies in this part of the huge electromagnetic spectrum.

Now every time you key up your 6meter radio you can remember the old channel 1 which operated on the frequencies back in the early TV days.

> 73 until next month, Jason Stroll (KC8LIN) © 2001 Jason Productions

### ARRL NEWS

### ARLB025 W1AW seeks 80-meter bulletin reports

ZCZC AG25 QST de W1AW ARRL Bulletin 25 ARLB025 From ARRL Headquarters Newington CT June 25, 2001 To all radio amateurs

SB QST ARL ARLB025 ARLB025 W1AW seeks 80-meter bulletin reports

A change has been made to the 80-meter bulletin antenna system. W1AW is requesting from amateurs who listen to the 80-meter transmissions send in signal reports. Please note QTH, time of reception, mode, signal strength and quality. Use of the standard RST system is acceptable. Mail your report on a postcard to W1AW 80-meter reports, 225 Main Street, Newington, Connecticut, 06111. Email reports may be sent to w1aw@arrl.org. The complete W1AW Operating Schedule appears in July QST, page 105, or on the web at http://www.arrl.org/w1aw.html.

NNNN /EX

### **ARLP026 Propagation de K7VVV**

ZCZC AP26 QST de W1AW Propagation Forecast Bulletin 26 ARLP026 From Tad Cook, K7VVV Seattle, WA June 22, 2001 To all radio amateurs

SB PROP ARL ARLP026 ARLP026 Propagation de K7VVV

All solar indicators rose this week. New sunspots emerged, and the average daily sunspot number for this week rose over 43 points. Average solar flux was up 32 points. 289 was the sunspot number on Sunday, the highest since April 1, when it was 320. Around the end of March there was a huge increase in sunspots, which will probably move the smoothed value for the peak of Cycle 23 to a later season than earlier assumed. Over the past two weeks we have witnessed another large run up in activity, although not quite as sharp but perhaps a little more sustained than the increase at the end of March.

A strong interplanetary shock wave struck earth on Monday, beginning its journey last Friday from a coronal mass ejection. The ejection was not aimed toward earth, but as it expanded through the gaseous interplanetary medium it created a shock wave that affected earth's magnetosphere. The result was a planetary A index on Monday of 34.

Solar flux for Friday through Monday is expected to be 205, 205, 200 and 195. Geomagnetic conditions should be fairly stable, with a predicted planetary A index of 10, 10, 10 and 12 for the same days.

Interest in conditions for Field Day this weekend is running high. We have just passed the summer solstice, and from now until the end of the year the days get shorter. Several months from now we will be back to fall conditions, with better 12 and 10 meter openings, especially in the higher latitudes.

But this weekend Field Day operators will not be concentrating on working DX, because the focus of the operating event is on making lots of contacts while operating in the field. We will present some path projections, but the targets will all be domestic. For those interested in racking up points, remember that the emphasis is on the number of contacts, not number of states, sections or countries worked, since those don't count for multipliers.

Here are the path projections, based on an average solar flux of 203. Since Alaska and Hawaii are often neglected in this bulletin, we will begin with them. The lists will get shorter for subsequent target areas, because the same paths have already been shown in a previous target. Remember the paths work both ways. If you want to do your own projections, download W6ELprop from http://www.qsl.net/w6elprop/.

### >From Alaska:

To Hawaii, 80 meters 0630-1400z, 40 meters 0500-1530z, 20 meters 0030-2100z, 15 meters possible openings, but not from 1000-1500z.

To California, 80 meters 0500-1300z, 40 meters 0330-1400z (best 0700-1130z), 20 meters possible 24 hour opening, but strong and reliable 0400-1400z, 15 meters also possibly open 24 hours, best 0500-0800z, weakest 0930-1200z, 10 meters possibly 1500-2230z.

To Texas, 80 meters 0600-1100z, 40 meters 0330-1200z, 20 meters 2200-1600z, 15 meters unlikely, especially 0800-1200z.

To the Pacific Northwest (Seattle) 80 meters 0500-1300z, 40 meters 0000-1700z (strongest 0630-1230z), 20 meters open 24 hours, strongest 0500-1300z, 15 meters possible openings anytime but 0830-1200z.

To the Southeast states (Atlanta), 80 meters 0600-1000z, 40 meters 0400-1130z, 20 meters 0130-1330z, 15 meters possibly open any time but 0900-1100z.

To Omaha, Nebraska, 80 meters 0600-1030z, 40 meters 0300-1230z, 20 meters open all hours, strongest 0500-1130z, weakest 1800-2130z, 15 meters possibly 1500-1830z.

To Ohio, 80 meters 0600-0930z, 40 meters 0330-1100z, 20 meters 2200-1530z (best 0530-0930z), 15 meters possibly 0000-0530z.

To the Northeast states (Pennsylvania), 80 meters 0630-0900z, 40 meters 0400-1100z, 20 meters 0100-1300z, 15 meters might open any time, except 0600-1000z.

### >From Hawaii:

To California, 80 meters 0500-1330z (best 0630-1200z), 40 meters 0330-1500z (best 0530-1230z), 20 meters open all hours, strongest 0530-1300z, weakest 2000-2300z, 15 meters possible openings anytime, best 0430-0930z or 1630-0100z, 10 meters possibly around 1830z.

To Texas, 80 meters 0500-1200z (strongest 0730-1030z), 40 meters 0400-1300z (best 0600-1100z), 20 meters 0200-1500z (best 0500-1130z), 15 meters open all hours, best 0530-0930z, weakest 1900-2230z, 10 meters may open 1500-1000z, best chance around 0500-0630z.

To Pacific Northwest, 80 meters 0500-1330z (strongest 0700-1130z), 40 meters 0400-1500z (best 0600-1130z), 20 meters open all hours, best 0530-1230z, weakest 2030-2230z, 15 meters possible openings anytime, best possibility 0600-1130z.

To Southeast states, 80 meters 0500-1130z (best 0800-0930z), 40 meters 0400-1200z (best 0600-1000z), 20 meters 0200-1400z (best 0530-1030z), 15 meters 0030-1700z (best 0430-0930z), 10 meters possible openings anytime, best possibility 0430-0530z.

To Omaha, 80 meters 0500-1200z (best 0730-1000z), 40 meters 0400-1300z (best 0600-1030z), 20 meters 0230-1500z (best 0530-1100z), 15 meters open all hours, best 0400-0800z, weakest 1400-1500z and 1900-2200z, 10 meters possibly open 0400-0700z and 1500-0130z.

To Ohio, 80 meters 0500-1100z (best 0800-0900z), 40 meters 0430-1130z (best 0600-0930z), 20 meters 0230-1400z (best 0530-1000z), 15 meters 0030-1700z (best 0300-0700z), 10 meters may open, but not 0700-1300z.

meters 0230-1330z (best 0600-0900z), 15 meters possibly 0230-0430z.

#### >From California:

To Texas, 80 meters 0200-1230z (best 0430-1030z), 40 meters 2230-1600z, best 0400-1100z), 20 meters open all hours, best 0400-1030z, 15 meters possibly open any time, most likely 1500-2100z or 0330-0700z, possible 10 meter openings 1530-1700z or 1830-2030z.

To Pacific Northwest (Seattle), 80 meters 0130-1500z (best 0430-1130z), 40 meters open all hours, best 0500-1100z, 20 meters possibly open anytime except 0900-1200z.

To Southeast states, 80 meters 0200-1130z (best 0530-0930z), 40 meters 0100-1300z (best 0400-1000z), 20 meters open all hours, best 0400-1000z, 15 meters open all hours, best 0230-0700z), 10 meters might open any time except 0730-1300z.

To Omaha, 80 meters 0200-1230z (best 0430-1000z), 40 meters open all hours, best 0430-1000z, weakest 1730-2100z, 20 meters open all hours, best 0400-1000z, 15 meters might open any time.

To Ohio, 80 meters 0230-1100z (best 0600-0900z), 40 meters0100-1230z (best 0400-0930z), 20 meters open all hours, best0400-0930z, weakest 1230-1400z, 15 meters open all hours, best 0230-0500z, weakest 1230-1500z, 10 meters could open any time, except 0030-0300 and 0600-1300z.

To Pennsylvania, 80 meters 0230-1030z (best 0430-0900z), 40 meters 0100-1200z (best 0430-0830z), 20 meters open all hours, best 0300-0700z, 15 meters possible openings around 0300-0400 or 1330-1930z.

#### >From Texas:

To Pacific Northwest, 80 meters 0230-1200z (best 0600-1030z), 40 meters 0000-1430z (best 0400-1100z), 20 meters 0000-1430z, 15 meters possible openings anytime, best 0330-0630z, worst 0900-1100z, 10 meters possible opening 1330-2100z.

To Southeast states, 80 meters 2300-1300z (best 0200-1000z), 40 meters open all hours, best 0230-0930z, 20 meters possibly open any time.

To Omaha, 80 meters 2230-1430z (best 0300-1000z), 40 meters open all hours, best 0300-1000z, 20 meters possible opening 1230-0000z or 0230-0400z.

To Ohio, 80 meters 0000-1200z (best 0230-0330z), 40 meters open all hours, best 0230-0900z, weakest 1700-1900z, 20 meters open all hours, best 0200-0500z, 15 meters possible opening 1230-2000z.

To Pennsylvania, 80 meters 0030-1100z (best 0300-0900z), 40 meters open all hours, best 0230-0830z, weakest 1600-1900z, 20 meters open all hours, 15 meters may open any time, except 0700-1100z.

### >From Pacific Northwest:

To Southeast states, 80 meters 0230-1100z (best 0600-0900z), 40 meters 0100-1230z (best 0430-1000z), 20 meters open all hours, best 400-1000z, 15 meters open all hours, best 0300-0500z, worst 0800-1000 and 1300-1430z, 10 meters might open any time, except 0030-0300 and 0530-1300z.

To Omaha, 80 meters 0230-1200z (best 0530-1000z), 40 meters open all hours, best 0430-1000z, weakest 1730-2100z, 20 meters open all hours, 15 meters might open any time, except 0630-1330z.

To Ohio, 80 meters 0230-1100z (best 0600-0830z), 40 meters 0100-1230z (best 0500-0900z), 20 meters 0030-1200z, 15 meters might open any time, best 0300-0500z, least likely 0700-1030z

To Pennsylvania, 80 meters 0230-1030z (best 0630-0800z), 40 meters 0100-1200z (best 0430-0900z), 20 meters open all hours, best 0400-0930z, 15 meters 2130-0600z and 1200-1300z, 10 meters possibly 1300-2030z or 0300-0500z.

>From Southeast states:

To Omaha, 80 meters 2330-1230z (best 0200-1000z, especially around 0230-0330z), 40 meters open all hours, best 0230-0930z, weakest 1630-1930z, 20 meters may open any time, least likely 0530-1200z.

To Ohio, 80 meters 2130-1330z, 40 meters open all hours, strongest 0200-0930z, 20 meters possibly 1200-1930z.

To Pennsylvania, 80 meters 2200-1230z (strongest 0130-0830z), 40 meters open all hours, strongest 0130-0900z, 20 meters may open any time except 0430-1130z.

>From Omaha to Ohio, 80 meters 2330-1230z, 40 meters open all hours, best 0230-0930z, weakest 1600-2000z, 20 meters could open any time, except 0530-1200z.

To Pennsylvania, 80 meters 0000-1130z, best 0200-0400z, 40 meters open all hours, best 0230-0900z, weakest 1630-1900z, 20 meters open all hours, 15 meters possibly 1200-1930z.

>From Ohio:

To Pennsylvania, 80 meters open all hours, best 0200-0900z, 40 meters open all hours, best 0200-0530z.

Sunspot numbers for June 14 through 20 were 273, 264, 276, 289, 220, 222 and 232 with a mean of 253.7. 10.7 cm flux was 194.7, 196.9, 207.6, 204.6, 221.3, 195.4 and 198.5, with a mean of 202.7, and estimated planetary A indices were 9, 12, 7, 9, 34, 14 and 15 with amean of 14.3.

NNNN /EX

### ARLD025 DX news

ZCZC AE25 QST de W1AW DX Bulletin 25 ARLD025 From ARRL Headquarters Newington CT June 21, 2001 To all radio amateurs

SB DX ARL ARLD025 ARLD025 DX news

This week's bulletin was made possible with information provided by Tedd, KB8NW, the OPDX Bulletin, QRZ DX, The Daily DX, DXNL, 425DXnews and Contest Corral from QST. Thanks to all.

SRI LANKA, 4S. Nelson, 4S7NE, has been QRV on 18074 kHz from around 1900 to 2000z.

BAHAMAS, C6. John, WZ8D, is QRV as C6AIE from Abaco Is-

land, IOTA NA-080, until July 2. He is active mainly on 6 and 2 meters, with some activity on 40 to 10 meters. QSL to home call.

JUAN FERNANDEZ ISLAND, CE0. Eliazer, CE0ZIS, has been QRV on 28495 kHz around 1400z. He has also been QRV using RTTY on 28081 kHz just after 1500z.

MADEIRA ISLANDS, CT3. Glen, K0JGH and Pamela, N0ICF, are QRV as CT3/homecalls until June 26. Activity is on 30 to 10 meters. They also plan to use RTTY and SSTV as well. QSL via operator's instructions.

URUGUAY, CX. Geo, CX1SS, has been QRV on 1833 kHz around 0200z.

MAYOTTE, FH. Bert, FH/PA3GIO, is usually QRV near 21295 kHz between 1300 and 1500z. QSL to home call.

FRENCH POLYNESIA, FO. Yves, F6CTL, is QRV as FO/F6FTL from Rangiroa Island, IOTA OC-066, until mid July. QSL to home call.

MALPELO ISLAND, HK0, Jairo, HK5MQZ and Hiro, HK5QGX, are QRV as homecalls/0M using SSB and CW, respectively. Activity is on 80 to 6 meters, including 17 and 12 meters. QSL HK5MQZ/0M to home call and HK5QGX/0M via JA0MGR.

ITALY, I. Antonio, IK2DUW, is QRV from Ventotene, IOTA EU-045, as well as some other IB0 prefix islands until June 28. QSL to home call.

MONGOLIA, JT. JT1FCR is QRV on 6 meters until July 15.

GUAM, KH2. AH2G, who is QRV from IOTA OC-026, will be active during the ARRL Field Day.

DODECANESE, SV5. Mike, SV5/NA9Q/p and Arlyce, SV5/NB9Q/p, are active from Afondou Beach until July 3. They are using CW, SSB and PSK31 on 40 to 10 meters. QSL to home calls. Meanwhile, Carl, GW0VSW, is QRV as SV5/GW0VSW from the Island of Rhodos using mainly CW on 40 to 10 meters on the IOTA and QRP frequencies. He is here until June 30. QSL to home call.

TURKEY, TA. YM0KI will be QRV from Kefken Island from June 23 to 25. Activity will be on a few bands, using CW, SSB and possibly SSTV, depending on propagation. QSL via operator's instructions.

UKRAINE, UR. Special event station EN1WJP will be active on all bands and modes from June 22 to 27 to celebrate the visit of Pope John Paul II to Lviv. QSL via UR4WG.

ANTIGUA, V2. Bill, W4WX, will be QRV as V2/W4WX from June 23 to 26. He will be active on RTTY with some SSB, on all bands, including the newer ones. QSL to home call.

NNNN /EX

## July 2001

### Monthly Planner

Sunday	Monday	Tuesday	Wednesday	Thursday	Friday	Saturday
BD KC8JLX Stark County Mutual Aid Net 146.520 11:30 AM	2 Sloppy Fist Net every Monday thru Friday at 9PM on 28.138	3	4	7:30 PM QCWA (Chapter 21) Net, 147.180	Massillon ARC Meeting	7 BD KB8AKD
Stark County Mutual Aid Net 146.520 11:30 AM	9	10 BD N8TZB	11	12 7:30 PM QCWA (Chapter 21) Net, 147.180	13 BD WC8W West Stark Info Net 147.180 at 8:00 PM	14
15 Stark County Mutual Aid Net 146.520 11:30 AM	16	17	18 Canton ARC Meeting 7:30 PM	7:30 PM QCWA (Chapter 21) Net, 147.180	20 West Stark Info Net 147.180 at 8:00 PM	21
22 Stark County Mutual Aid Net 146.520 11:30 AM	23 BD K8DON Sloppy Fist Net every Monday thru Friday at 9PM on 28.138	24	25 BD W8ZNV	26 7:30 PM QCWA (Chapter 21) Net, 147.180	27 West Stark Info Net 147.180 at 8:00 PM	28 BD KF8UN BD WD8IKC
29 Hamfest Portage ARC Randolpf,- OH Call Joanne@330- 274-8240 Stark County Mutual Aid Net 146.520 11:30 AM	30	31	S M T  3 4 5  10 11 12  17 18 19	June W T F S 1 2 6 7 8 9 13 14 15 16 20 21 22 23 27 28 29 30	Augu S M T W 1 5 6 7 8 12 13 14 15 19 20 21 22 26 27 28 29	T F S 2 3 4 9 10 11 16 17 18 23 24 25