



# TMRA Amateur Radio Beacon

The Toledo Mobile Radio Association is an ARRL Special Services Club Serving Northwest Ohio Since 1953



February 2006

## The Prez Sez:

Hi gang. We officially finished the 2005 membership year with 207 members, and '06 is off to a good start with about 130 members to this point. I know that we have more out there that need to renew. It's no problem for me to check the status of your membership; either shoot off an e-mail my way or give me a call at (419) 724-8672. In the drawing for free memberships for next year the lucky winners were Wanda Cunningham, wife of Dan, KE8UE and Pat Ferguson, N8ORE wife of Charlie, N8JKL. Congratulations to all of them and thanks to those others that have taken care of their membership renewals. Also, if you requested a membership card and haven't gotten it yet, make sure to see me at a future event to pick it up. As for the rest of you, the membership year has ended, memberships are now due, and soon those that have not renewed will be 'dropped from the roll,' meaning you won't continue to get this fine newsletter. We don't want that to happen... contact me about taking care of this matter.

I mentioned a couple of operating events in last month's article; those being Straight Key Night and Kid's day. Unfortunately, I guess I haven't (yet) gotten proficient enough to keep up with the Morse code operators that I could hear, and with 'so-so' conditions I wasn't able to accomplish much during the CW event. I fully intend to attempt it and do much better next year. As for the Kid's Day event, between my schedule and more trying conditions, those factors didn't favor my making any contacts there either. Though, despite those setbacks I still look forward to the challenges of upcoming events. Field Day isn't far off!

In the 'support your local events' report; the Mansfield Hamfest is on February 12. I'm not sure yet, but I am thinking about checking it out for the first time. The Northwest Ohio District 2 Science Day will be held again at UT on March 18. If you're interested in being a judge for those who wish to win our awards, check with Brian, WD8MXR. The day after that on March 19 will be our very own Hamfest. Yes, it is coming up real soon. Check with Brian, WD8MXR again to see how your services can be put to use, either Saturday for setup or security, or for Sunday for one of the many tasks that we can always use help with. If you are a TMRA member and want to utilize a club table at our Hamfest, make sure to check with James, WD8IOL. Last year no one wanted to make use of it, so we didn't have one. It's up to you, and you will have to arrange for someone to watch over your items for sale.

I don't know how many members and others that read this newsletter have checked out our website at [www.tmrahamradio.org](http://www.tmrahamradio.org), but if you have any suggestions or thoughts for it, or for any issues related to membership, I'd like to hear them... please contact me. I've said it before (I'll say it again;) This is YOUR club, it's about YOU having say in its operation.

73 de KB8PAI,  
Tom Swartz, President and Membership Chairman  
[kb8pai@arrl.net](mailto:kb8pai@arrl.net)



March 18<sup>th</sup> - Lucas County Skywarn Training, St. Luke's Hospital Auditorium.

## Regional Simplex Net Reminder

From Karl Erbland K8ARL

Every 4th Sunday of the month is a Regional SIMPLEX Test held on 146.430 MHz, at 4:30 PM. All stations are welcome to join in the activity. The geographical scope of the net has grown to include many counties in the Northwest Ohio and Northern Ohio areas. Stations have checked in from areas as far as Mansfield, Toledo, Bowling Green, Willard, Sandusky, Findlay, Upper Sandusky, Defiance, Norwalk, and beyond.

This is a good rehearsal for times when we need to operate SIMPLEX. We practice relaying, message handling, net control and assistant net control duties, and other tasks. Please pass this on to your area Amateur Radio operators and other ARES leaders. Again, every 4th Sunday of the month is a Regional SIMPLEX Test held on 146.430 MHz at 4:30 PM.

Thanks & 73,  
K8ARL

*From the district 6 ARES newsletter*

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## The LM-Antenna

I have kept an idea secret for the past month, until I could prove it was practical. It makes possible the antennas of my dreams. The potential of being resonate tunable to many frequencies, gain, and ability to test antenna variations with the turn of a knob. In a way, it is like science fiction made real. On the down side people might think it is an April fools joke until they understand the details. (I am already talking about it on Yahoo groups and did not expect the nature of the responses.)

I am making antenna elements from a non-toxic liquid metal pushed into plastic tubing. The length can be adjusted with air pressure to the storage chamber supplying the liquid metal alloy Galinstan, a mixture of Gallium and other metals. Quick tuning and adjustment are obvious uses. You could put liquid metal extensions on the end of solid elements. The length of liquid metal is proportional to the supplied air pressure.

It could have been done over 50 years ago with Mercury. A search of the internet gave no hint that anyone tried using liquid metal for antennas. It surprised me that I may be the first to try the idea. If I am not, then shame on who ever failed to share it with the world!

The only real problem had been the non-toxic metal sticking to the sides of the plastic tubing. There are ways to keep it from sticking. The Geratherm thermometers which use it are the most obvious examples. My main effort at the moment is learning how to make the metal work well without sticking.

I have tested my prototype antenna and will continue on the air testing. Currently it is 1/4 wave tunable to the 2 meter, 222, and 440 bands (and in between). A contact near the top allows for a fixed extension for 6 meters or another length.

Air driven switches or relays are another application of the idea. You could connect, or disconnect, elements within an antenna without wires! This allows you to do things that were not practicable with electrical relays,

## OTHER TOLEDO AREA AMATEUR RADIO ORGANIZATIONS

### ARES

Lucas County Amateur Radio  
Emergency Service meetings are held on the 4<sup>th</sup> Saturday of the month in the "Private Dining Room" in St. Luke's Hospital, at 9:00 AM. You are welcome to meet in the cafeteria for breakfast before the meeting. Alternate meeting locations and information will be announced on the daily 6:40 PM net. Contact Brenda, KB8IUP at 419-866-5928. **ARES NTS and Training Net** meets daily at 6:40 PM. 146.940- Alternate frequencies are: 147.375+ or 147.270+.

**SKYWARN Net** as needed by the NWS, 147.375+ Alternate frequencies are 146.940-, 147.270+ or others announced by "net control".

**GTARA** (146.610-) Meets on the 3<sup>rd</sup> Tuesday of the month at the Red Cross Building, 3100 W. Central, 7:30 PM. Contact Martha, K8AAC.

**SARA** Meets on the 2<sup>nd</sup> Tuesday of the month at the Springfield Twp. Hall, 7617 Angola Rd. at 7:30 PM. Contact Tom, N8MAV, 419-826-7401.

**TRAC** (147.375+, 146.940-) Meets 1<sup>st</sup> Thursday of the month at the Springfield Twp. Hall, 7617 Angola Rd. at 7:30 PM. Contact Terry Caldwell, KC8HQH, 419-874-2173.

**QCWA Chapter 142**, meets on the 2<sup>nd</sup> Saturday of the month at The Big Boy Restaurant, 1402 Reynolds Road, Maumee. (next to Hampton-Inn hotel ) Contact Paul Lentz, K8PL, 419-882-5906. Or email, [pelentzk8pl@juno.com](mailto:pelentzk8pl@juno.com)

**FRAT** (52.360, 146.835-, 224.280-, 444.650+) Meets on the 1<sup>st</sup> Tuesday of the month. FRAT net follows the Rain Dialup and Amateur News Weekly on Thursday nights starting at 8:30 PM.

due to the effects of stray wires on the antenna. In addition it may be cheaper to air switch a liquid metal coax relay than to use an expensive electrical relay. An aquarium air pump, valves, and tubing can be cheaper than doing it electrically.

In the future I would like to make a mobile liquid metal multi-band antenna with coils at the bottom for 5/8 wave at 2 meter, 222, 440 and 1/4 wave at 6 meter. For my house I considered a corner reflector with a liquid metal driven element, on a rotator for gain on multiple bands.

Details are on my website, HamDomain.com: <http://www.hamdomain.com/lm-antenna/>

Mike Lake - KD8CIK

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## ARRL 8th Area Incoming QSL Bureau 2005 Report

Date: Wednesday, January 25, 2006

Approximately 110,905 QSL cards were received for redistribution through the central 8th area bureau in 2005. This is down almost 20% compared to 138,236 handled in 2004. We handled 154,054 cards in 2003. The monthly breakout is as follows:

Jan. -- 6,361	Feb. -- 8,083	Mar. -- 10,401	Apr. -- 8,947	May -- 16,102
Jun. -- 5,417	Jul. -- 11,321	Aug. -- 10,891	Sep. -- 4,676	Oct. -- 4,387
Nov. -- 18,773	Dec -- 5,546			

From these numbers and trends, you can see that LBOTW and decreasing sunspots are affecting QSL volumes. (Could it also be a decreasing population of active DXers?) In 2005 we had five cycles where cards were sent from the central bureau to the individual letter managers. From that you can see that each cycle is approximately 11 weeks.

In mid 2005 Dave Blake, N4DB, resigned as the 'G' letter manager after many years of dedicated service. Those folks with a 'G' after the 8 owe Dave a ton of thanks for the work he has done. Don Karvonen, another well known and active DXer, has stepped up to the plate to assume 'G' letter responsibilities. I recently replaced myself as the 'F' letter manager. Bob Boehm, K8YS, has agreed to improve on what I had been doing in that regard.

The bureau is physically located at the VOA Museum in West Chester, OH. We appreciate the work of those members of the West Chester Amateur Radio Association who do the bulk sorting for us. More information on W8 Incoming Bureau operations, policies and procedures can be found at the web site: <http://home.fuse.net/jslough/w8buro.html>

Everyone is reminded that postage rates went up in January 2006. Do they have enough postage on their envelopes at the bureau to cover the new rates? Even more importantly, do they have envelopes at the bureau? As another item of note, it cost the ARRL a bit over \$1300.00 for direct expenses involving the 8th call area last year. That does not include any associated administrative costs and overhead at the league.

The QSL Bureau - another benefit provided by your league and volunteers who work to serve you.

73,  
Jay Slough, K4ZLE  
W8 Incoming QSL Bureau manager

ARRL Ohio Section  
Section Manager: Joseph J. Phillips, K8QOE  
[k8qoe@arrl.org](mailto:k8qoe@arrl.org)

<p><b>The TMRA <i>Amateur Radio Beacon</i> is published monthly by the Toledo Mobile Radio Association. Editors: Brenda, KB8IUP, and Chuck, KB8FXJ. Email, <a href="mailto:kb8iup@arrl.net">kb8iup@arrl.net</a></b></p>
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February 2006

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**Mansfield Hamfest**, February 12<sup>th</sup>, is just a nice Sunday drive away. Talk-in--146.940- (71.9 Hz). The hamfest is located at the Richland County Fairgrounds. [www.iarc.ws](http://www.iarc.ws)

The **TMRA Hamfest/Computer Fair**, Sunday March 19<sup>th</sup>, will be before you know it. There is still time to volunteer to help make this event a great success. Advance sale tickets are available now. Pick up a pack of ten so your friends won't have to wait in that long line. Ticket sellers for the hamfest morning are needed. Help with setup would be appreciated. Also, we need a leader and some talkers for the talk-in station. Call Brian WD8MXR to sign up.

THE TOLEDO MOBILE RADIO ASSOCIATION P.O. BOX 9673, TOLEDO, OH. 43697-9673  
President, Tom, KB8PAI; Vice-President, Steve, W8TER; Secretary, Brian, WD8MXR;  
Treasurer, Chuck, N8NIR; Public Information Officer, Steve, KC8TVW.

Board Members: Dave, KB8EH; Ed, WA8BHO; Scott, N8BIR; Howard, W8NEE; Bob, K8ADK; Steve, KC8TVW.

TMRA Home Page [www.tmrahamradio.org](http://www.tmrahamradio.org) Webmaster, Becky, KC8ZNX.

TMRA W8HHF Repeaters; 29.680-, 147.270+, 224.140-, 442.850+ (TMRA 2 meter, 220, and 440 repeaters operate with a 103.5 "PL", or a touch-tone access code of 1-2-3) Please "ID" before using phone-patch.  
(10 digit dialing, \*up and #down)

TMRA W8HHF Packet BBS Frequencies 51.780, 145.690, 223.480, 441.060

The TMRA meets at 7:30 PM every second Wednesday in  
The Electrical Industry Building, Lime City Rd. Rossford, Ohio.

The TMRA Q & A net meets every Sunday night at 7:30 PM, followed by the TMRA "Information & Swap 'N-Shop" net at 8:30 on the 147.270+ repeater. All amateurs are invited to check-in. *TMRA Voice Mail 419-535-6594*