FEEDBACK

The Official Newsletter of the
Georgian Bay Amateur Radio Club

February 2020

This Month

2019 Executive

President .....Tom VA3TVA
Vice-President... Frank VA3GUF
Treasurer.....Bobby VE3PAV
Secretary.....Peter VE3BBN

President's Message

Tom VA3TVA

Winter is marching onto it's end. Maybe not as fast as some of us would like. I find it hard to believe that it's the 19th of February already. I hope that everyone's Valentine's budget and sections were met with approval.

I missed last months meeting, so I don't have anything to report on that. But we the executive are trying to acquire a list of club assets. So, if any of you have been storing something for the Club, please let us know.

February and Marches Club meeting's have been pushed out a day to the Wednesday rather then Tuesday as there have been some gremlins in the wires.

Field day is fast approaching. I'm looking forward to it. I missed out last year due to work, but am expecting to make it this year. I hope.

I hope all are well and good, and I look forward to seeing everyone at the meeting, on Wednesday.

73 Tom

Minutes of Meeting January 28th, 2020

Presentation: Adam Karasinski VE3-IZS on weekend CW contest event and use of simple home made (Bullgrip paper clamp) paddle keyer. Contest was done on multiple bands for extra point multiplier and done with the home made keyer. Presented was info also on the Win-keyer that was also used in the contest. The Win-keyer is able to change the speeds to that of the other contact for ease of communication. Also discussed were the differences between the IAMBIC keyer that allows for half movements versus that of the straight keyer. IAMBIC keyer allows for sequential DOT's or DASH's to be transmitted by simply holding the IAMBIC key in contact requiring less wrist movements. Sample of the home made paddle keyer was passed around and seen by all to its simplicity in how it is made.

Call to order; executive did not have a quorum with VP and Treasure present. Missing were President (sick) and Secretary (travelling). Quorum was only available by attendees (8 other members, totaling 10). One guest was present, Doug McDougall (VE3-DGY), who moved into the area from Mississauga.

Accept Minutes; Phil and Dan.

Treasures report; Club account has $890 after expenses.

Winter Field Day; We had 2 stations set up, a digital station by Marvin & Janet demonstrating multiple digital methods. Some challenges were had without timer synchronization with a GPS clock. The other station was set up by Frank using a club antenna that was later changed for an Off Center Buckmaster dipole that did not need a tuner. A number of members showed up on the Saturday and appeared to have a good time while some contacts were made and much socializing was had. Sunday a student from the Ham Radio course showed up and made some contacts before Field Day closed. Conditions Sunday morning were better than on the Saturday.

Comments on the Basic Course; We started with 5 students with one not able to attend due to home commitments that conflict with the course. The remaining 4 students are motivated and expected to complete the course. Last course presentation date is Saturday February 22nd.

February Meeting

The February meeting will be

Wednesday this month instead of Tuesday

due to an issue with availability of our meeting location.

Attendance record keeping; Attendance is being recorded by the executive to keep a record of those members participating at GBARC events. This will assist the executive to remember who participated at which events with greater certainty than just using our memory. The VP mentioned that his certainly was not the best.

Student Applications; A discussion was had that it might be a good idea to consider how to handle Student associate memberships. Tabled was the idea to have a new membership status created

however there was an indication that this would need a revision of the club constitution. An alternate idea was to create a method for certified students to upgrade their status with an upgrade fee that is currently not available. Further discussions should be had when a full quorum is available and a final decision implemented.

New Hardware; A new Repeater has been acquired that is in near new condition.

Old Equipment; The executive will be creating in the next couple of months a list of all Club equipment held at members sites. From this list will be created a FOR SALE list of items that are no longer needed or required for use by club members. This will aid to rebuild the clubs coffers and make the money available for future use.

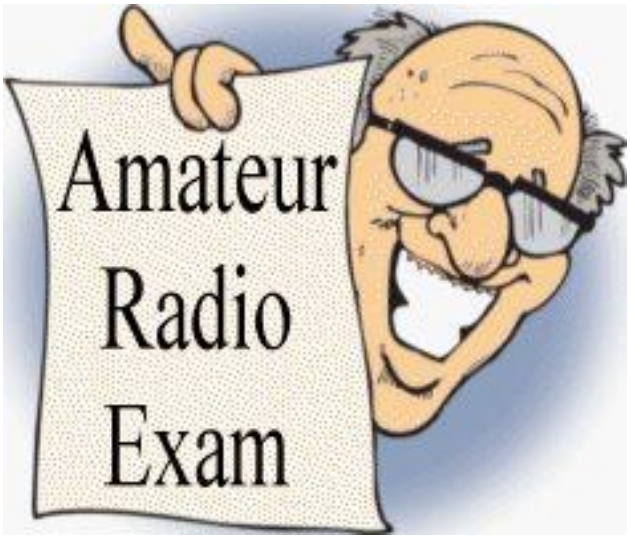
Summer Field Day; Submission made to City of Owen Sound for the fairgrounds again. Field Day will be held June 28th & 29th, timing same as last year. We are awaiting final acceptance. Marvin has agreed to set up a digital station for Field Day. Invitations are put out to others for stations that they wish to set up at Field Day. I will make my utility trailer available for a station. It was added in the discussion from one of the members that the ARRL Field Day package will be available in February.

Change of February Meeting date? The club was advised by the building hosts that there is a conflict on the February normal meeting night. Members were asked at the meeting to see if holding the meeting on the Monday prior (Day before, Feb 24th) or the Wednesday after (next day, Feb 26th) would be most preferential for this one time change. Members voted that the Wednesday Feb 26th was the preferred date starting at the same time, 7PM.

NEW BUSINESS

No new business was presented.

Meeting was adjourned. Voted on by Phil and seconded by John.



Would you like to write the amateur radio exam or upgrade the qualification you have? The pass mark for a written examination is 70%. However, a pass mark of 80% provides the candidate with additional HF operating privileges (< 30 MHz). This is referred to as "Basic with Honours" or "basic +.". Just send an email and we will get back to you… 73 Tom VA3TS

VA3KOT John

https://www.qrz.com/db/VA3KOT

I am John, VA3KOT. I began my radio hobby in 1961 when my grandfather gave me a crystal set. I spent many happy hours listening to AM broadcast stations with a pair of military surplus headphones. Later I added a transistor amplification stage to make life easier. I have been homebrewing radio equipment ever since.

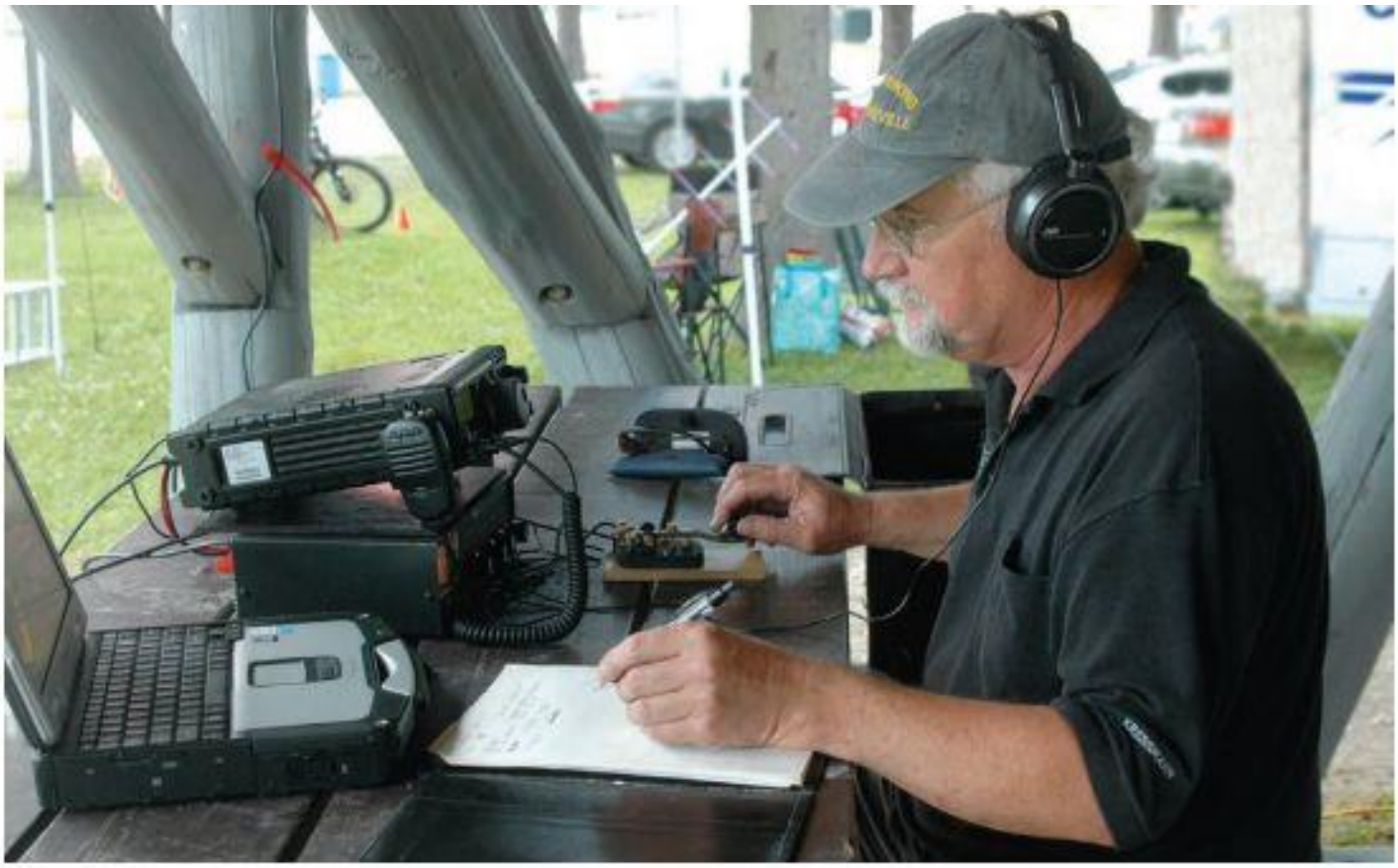


PHOTO BY BRIAN LOCKHART

Dufferin Amateur Radio Services member John Corby, keys in Morse Code during a 24 hour session held at Hyland Park in Shelburne. Members of the organization invited the public to see what they were all about as they contacted other radio operators from around the world.

I built my first transmitter - by accident - when I was 12 years old. It was a single vacuum tube regenerative receiver. If I adjusted the "reaction" control incorrectly my receiver radiated a powerful RF signal that wiped out AM reception throughout the neighborhood. I well remember my mother shouting up the stairs "John, are you playing with your electronics again?".

In the 1990s I developed an interest in monitoring satellite signals - especially Russian navigation satellites. I wrote an article for Monitoring Times magazine on a simple method of decoding the signals from these satellites and went on to write a regular monthly column in MT for a couple of years. I have also been published by the Ontario DX Association and QRP-ARCI.

By 2000 the urge to get licensed finally overcame me. After decades listening to the radio I decided it was time to get my own signals on the air. Now I am active mainly on CW on the HF bands and regularly check into the weekly CW net (DUF) on 3.541MHz on Wednesdays at 7:30pm ET (the NCS is based in Dufferin County, Ontario, Canada).

My main interest is portable QRP field operations using end-fed half-wave wires and a Hendricks PFR3 or Yaesu FT-817 (the original version from 2001). I am often to be found in parks, on trails and in roadside rest areas working CW.

I also own a Yaesu FT897 as my main base station rig. My home QTH antenna is an end-fed 130ft wire up only 12 feet - yes, just 12 feet! That makes it a NVIS end-fed half-wave on 80m. On 40m it is a full-wave and on 20m it is two wavelengths long. Any wire at least one wavelength long has low angle propagation off its ends. On 20m my low wire is quite an effective DX antenna - believe it or not!

Thanks for checking out my page and I hope to meet you on the bands.

NAQCC nr 7155, SKCC nr 11989T, QRP-ARCI nr 16398

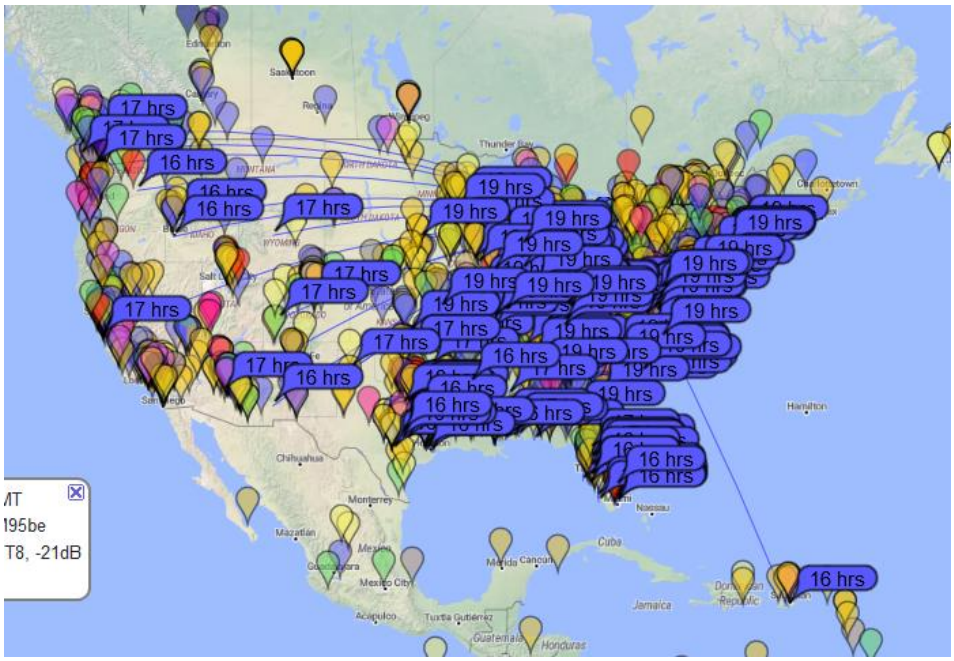
Winter Field Day 2020

On the 25th we were at the home of Frank VA3GUF and Marie-Claude VE3YNO. A wire dipole and a vertical were erected, for 80/40/20m and the vertical for digital modes. In attendance was Frank VA3GUF, Marie-Claude VE3YNO, VE3EAC Janet, VE3VCG Marvin, VE3PAV Bobby, VA3DNY Dan, VA3KOT John, VE3QVC Philip, VA3TS Tom and Ray, one of the course students. Marvin was operating FT8 while Franks station was used for HF phone. Bands were more open today at Field day. Ray, one of the course students, came by this morning and made a contact. Bands looked to be more open so was able to make more contact with the Saturday set up. (GUF)

As you can see from the PSK reporter map my vertical was being heard all over North America and down into the Carribean. With that point in view, I asked myself why the contacts I made were few and no activity was seen on JS8 call.

After puzzling over this question for a few minutes I think I've hit on the answer. Mu rig does not have a means of synching the clock while off-grid. When doing digital it's critically important to maintain a very accurate clock. Without having the clock synchronized perfectly connections with other stations might be flaky. In addition, incoming signals might not appear or might simply be seen as just noise

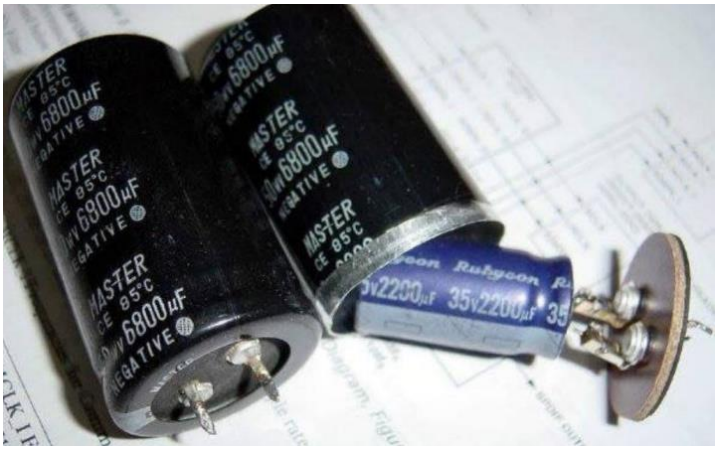
Julian, OH8STN in Finland has done several excellent videos on the importance of having a correctly synced clock when doing digital modes off-grid. He uses a GPS dongle which takes UTC time directly from satellites. I don't yet have such a device but will be getting one shortly.



I just thought you'd appreciate seeing that my demonstration was not a total bust. Obviously, according to PSK-reporter the 17-foot Cameleon whip was doing its job pretty well. Failure to make contacts was largely operator error - lesson learned.

Marvin VE3VCG

PS: In spite of the lack of contacts Jan and I had a great time.



Sometimes cheaper isn't better

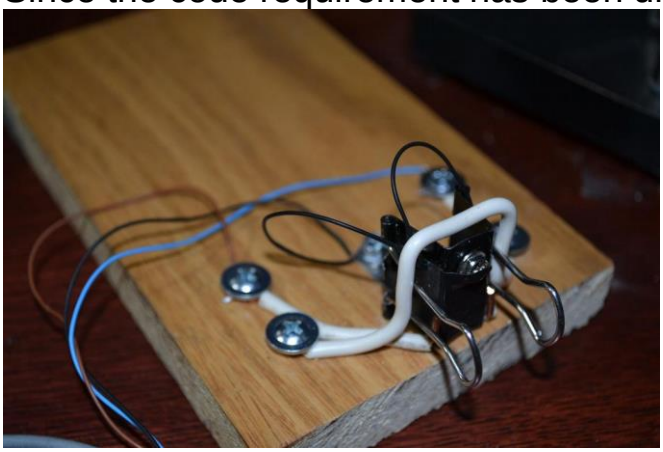
You may want to consider this when buying caps from ebay.

But it does illustrate a great way to keep that vintage rig looking just like it left the factory. Capacitors these days are a bit smaller physically and have the same value than the originals so almost always will fit.

Build your own CW Paddles

Interested in learning Morse Code (CW)? By Adam VE3FP

Since the code requirement has been dropped from acquiring or upgrading your amateur radio license, more and more ops are becoming interested in CW among other digital modes. You may ask why CW?



The answer is simple as with other modes like FT8, PSK or RTTY, no computer or expensive interfaces are needed. Just your transceiver and a key or paddles. Very little power is required to get equivalent results compared to operating voice (SSB).

Now comes the hard part, right? How difficult is it to learn CW? Well not really, all depends how committed you are to learning CW. Like learning anything, it takes time and practice. In my case 40 plus years ago I passed my Advanced with 15 wpm and then CW gradually became non existent until about 5 or 6 year ago and decided to commit to learning CW all over again. That was basically from ground Zero for me.

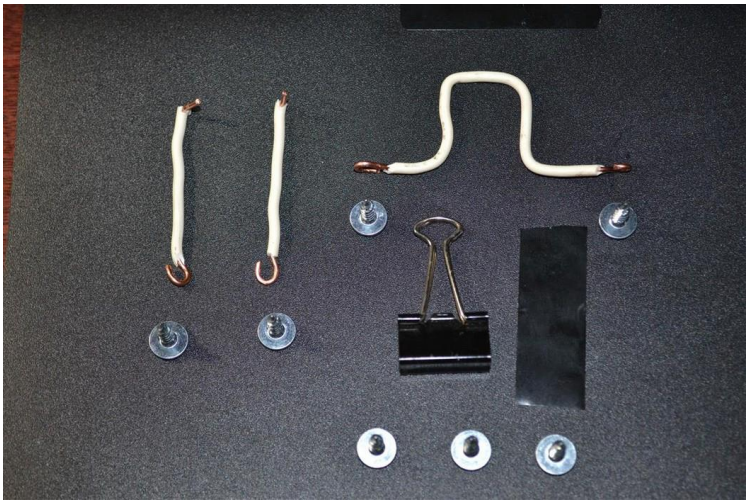
Today we have multitude of resources available on the internet, software and clubs offering CW courses but the real success is in each individual effort but practice is the key to success.

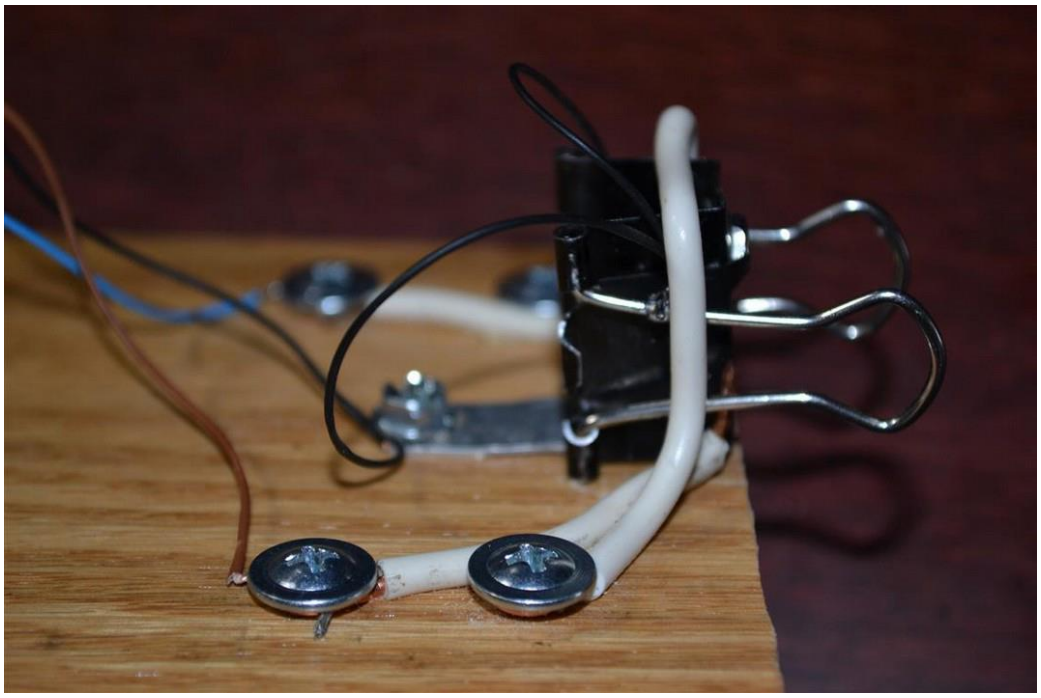
Here are some more popular resources for different skill levels.

https://cwops.org/cw-academy/ - online twice per week, in 2 month blocks
https://longislandcwclub.org/events/ - calendar posted on web page
https://lcwo.net/
http://www.arrl.org/w1aw/ - on the air practice transmissions
http://www.g4fon.net/CW%20Trainer.htm – very good Morse Code trainer
http://www.dxatlas.com/MorseRunner/ - all skill levels
http://www.dxatlas.com/PileupRunner/ - more for advanced CW ops
http://www.justlearnmorsecode.com/ - all levels
http://www.rufzxp.net/ - RufzXP great for speed building.

So here we have some of the learning software and web links and now need a key or paddles. Just a day before Winter Field Day I saw a picture of CW paddles made from a paper clip. Knowing that some ops may not even have paddles or a key to practice with. I decided to build one just to see how difficult and how it would work. To my surprize in couple of hours I was on the air with my newly built paddles. Took more time to round up the required pieces.

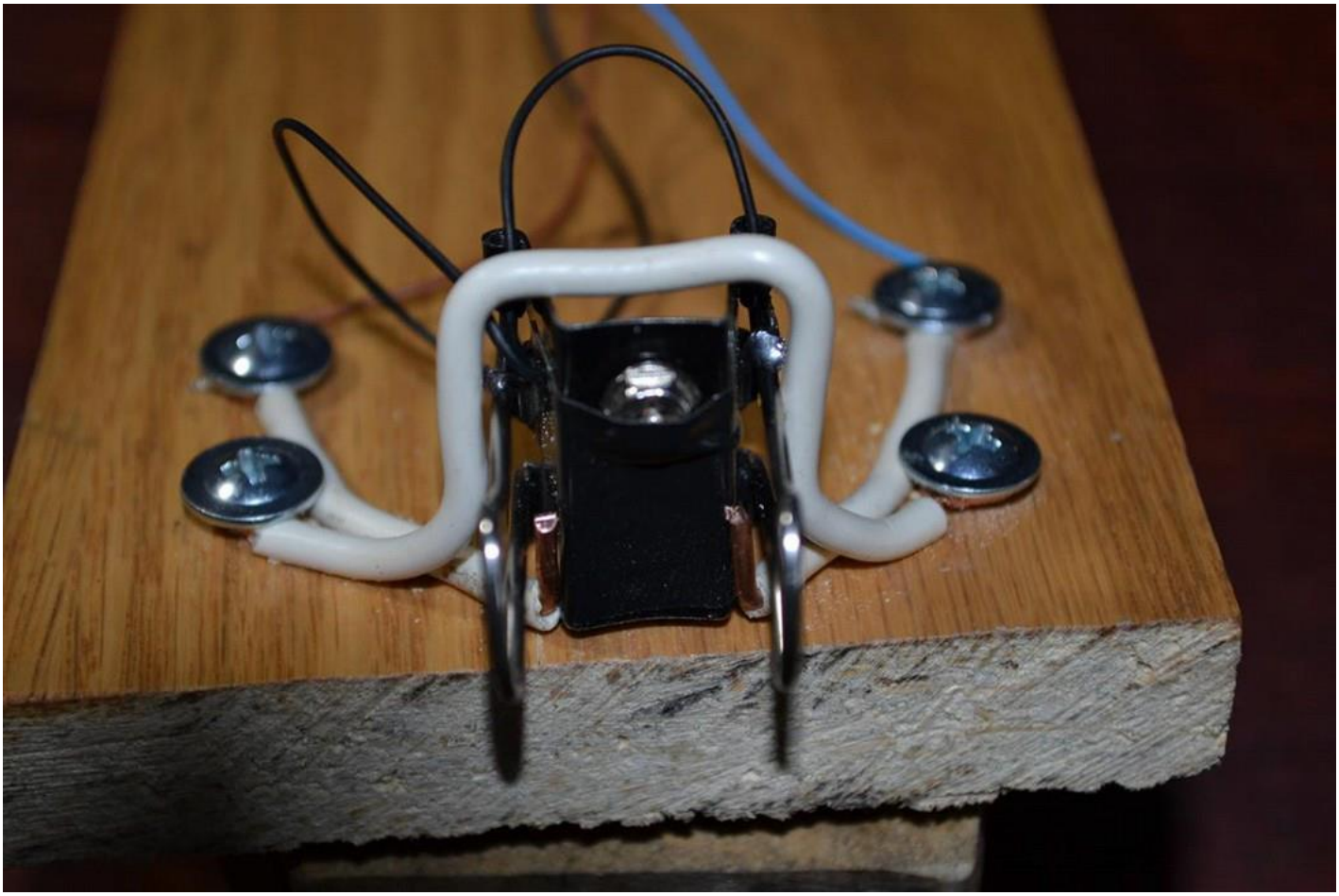
Material required:
1 - paper clip
1 - 6” of #14 AWG insulated wire
6 - 1/2” wood screws
2 - 2.5” of #14 AWG insulated wire
1 - wood for base
1 - 3 conductor wire
1 - stereo plug
1 - 2.5” electrical tape



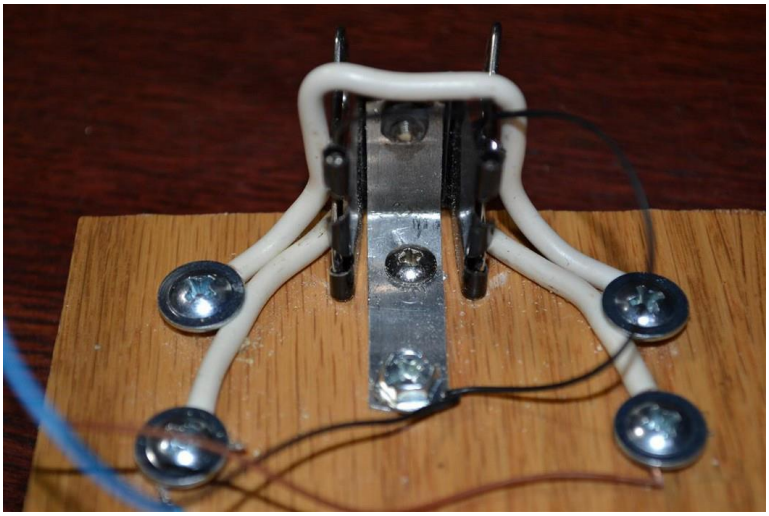


1. Remove the spring paddles by squeezing them.
2. File the paddle mountings to opposite angle so open it other direction
---/ \--- should be ---/ \---
3. Open the paper clip as shown in pictures. NOTICE takes a bit of force to open and stay open.
4. Wrap the piece of tape around the front of the clip to act as insulator.

5. Mount the clip on the board, I used a little L bracket made from piece of aluminum



(your choice).
6. Insert the paddles back in and make sure they swing away from the paper clip or adjust the angle by
filing some more.



7. Assemble as shown in pictures. The 2 short pieces act as contact for the paddles and U shaped bridge is adjusted to the desired spacing between the paddles and contacts. Bend to achieve desired spacing.
8. Solder Common of the 3 wire conductor to both paddles.
9. Connect the other coresponding conductors to each of the contact screws as shown.
10 . Install stereo plug on the other end of the wire.

Enjoy your new Iambic Paddles, 73 de VE3FP

Websites of Interest *Right Click the link and select "open in new tab"*

Moonbounce for Beginners
http://ve2zaz.net/Presentations/Downloads/VE2ZAZ_EME_Presentation.pdf

For Blind and Vision-Impaired Ham Radio Operators
https://www.hamradioandvision.com/

AB4OJ/VA7OJ Homepage
https://www.ab4oj.com/

VY2NX QRZ Page
https://www.qrz.com/db/VY2NX

Wirelessly Charge Phones With Radio Waves
https://www.qrz.com/db/Ve3ijd

GBARC Membership January 2020
https://gbarc.ca/gbarcmembers.php

NinoTNC N9600A kit
http://tarpn.net/t/nino-tnc/n9600a/n9600a_info.html

It's never too early to get ready for field day.

Advanced repeater controller and EchoLink software for Linux
https://www.svxlink.org/

Internet of crap (encryption) IoT gear is generating easy-to-crack keys
https://www.theregister.co.uk/2019/12/16/internet_of_crap_encryption/

Virtual Audio Mixer Application
https://www.vb-audio.com/Voicemeeter/index.htm

PD9Z Wire Antennas
http://pd9z.com/wire-antennas/

Letters to the Editor

Hi Tom

As you know I have been following the M17 project which has the goal of kicking the proprietary protocols like DStar etc off the air with a fully open source protocol. There has been a few changes in the project, they now have a new web page with a new address https://m17project.org/

There was a good interview on the Ham Radio Workbench about the project, it is a long interview but does cover a lot of the project https://www.hamradioworkbench.com/podcast/m17-open-source-digital-radio-system

They have also started a new handheld design using the ADF7021 chip, which they will use for testing the M17 protocol. It should have 3 to 4 watts ouput, and can also be used as a high power hotspot. They are now doing the layout the board and started development of the software to control the ADF7021 chip.

There is a IRC channel were the developers hang out using the GeekShed server and the channel is #M17. The big thing this week was getting the ADF7021 chip to output a signal for the digital side of things, and also get some experamental feedback on the possibility of getting Analog FM out of the ADF7021.

They also have a twitter account https://twitter.com/m17_project

73 Carl VE3APY

The Last Word

A few words of appreciation to those that contribute to this newsletter by submitting news stories or interesting web links or ideas. If you have something then send it to https://gbarc.ca/mailus.php , any format, any size, anytime, but if you want it to appear in the current months newsletter, then send it by the 3rd Tuesday of the month.

Membership for details regarding membership in the club go to:
https://www.gbarc.ca/gbarcmembers.php

The next newsletter will be in March.