# QST NFL

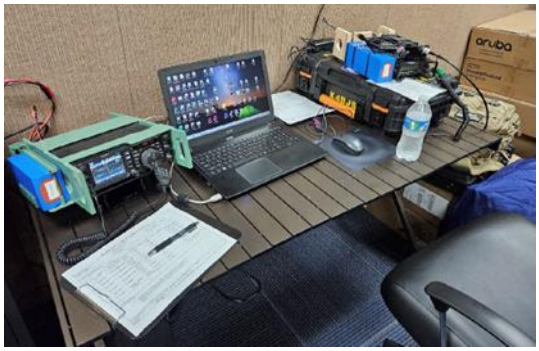
***Newsletter for the Northern Florida Section***

**Come join the FUN!**

**Volume 11 Issue 10** | www.arrl-nfl.org | **October 2024**


## From the Section Emergency Coordinator

Arc Thames, W4CPD



September was quite the month for Florida in having yet another hurricane. Helene made landfall Friday September 27 as a major hurricane in the big bend area. As we continue to work with leadership at the State, we further sharpen our activation skills and operations.

Prior to landfall, at the State, we received a mission request from Gadsden County for an AUXCOMM amateur radio operator. The call was put out and Brian Schultheis-K4BJS, our EC in Duval County, responded that he was ready for deployment. Brian deployed on Wednesday 9/25 and was released on Friday 9/27 following the storm when the local EOC determined their traditional communications methods were still available. During Brian's deployment, he discovered that the Gadsden County EOC actually had an HF radio and antenna. Gadsden is one of our county's that does not have a local ARES Emergency Coordinator (EC) so if you happen to be in Gadsden County and are interested, please reach out to me.

In addition to the Gadsden County mission we were also tasked, as usual, to activate the radio room at the State EOC. Due to the landfall slated to be directly aimed at Tallahassee, we went back to our list of individuals that had notified us they were willing to deploy as many of our Leon County team had to prepare for or evacuate for the hurricane. Myself along with Rick Royston-KF4ZZ EC of Walton County, and Tim Cunningham-KM4YGV of Pas- County answered the call. We were supported locally by our Leon County team-ARES EC Erik Brooks-KC4NVU, Austin Dixon-KO4YGV, and Chuck Bashim-AI4KA.

co

Lastly, we were asked to standup communications at an alternate EOC location in Escambia county. Thanks to all of the team members in Escambia that were on standby should we have lost communications at the State EOC as well as temporarily operating the HF net.

I want to extend a huge thank you to all of the volunteers across the state that activated, whether it be for a deployment or to support your local county emergency operations center. As we've seen with the disaster in North Carolina following Hurricane Helene, amateur radio continues to be a much-needed resource in a time when traditional communications methods are impacted or completely wiped out. Stay vigilant and keep your skills up to date so that you're ready to support your community at a moment's notice.

As I write this article, we're now ramping up and preparing for yet another major hurricane, Milton. We're currently working on staffing and will once again stand up an alternate communications point at Santa Rosa County Emergency Management. All information related to any of our activations for the state can be found online - https://floridaemergency.net/activation-status/.

We're still looking for volunteers to be on standby for deployment activities. For anyone willing to deploy, we have an online form for signing up to be available. Completing this form does not guarantee that someone will deploy, and phone interviews will be conducted ahead of the deployment. Completion of the AUXCOMM class is preferred for deployable resources however, prior deployment or experience can be accepted depending on the individual (as well as ARES task book level 2 or higher completion.)

Don't forget, the new emergency communications courses are now available from the ARRL and align with the new ARES task book. The courses can be found online - https://www.arrl.org/online-course-catalog and the task book can be found via this link.

**Monthly ARES Statistics**

The ARRL is still experiencing server issues, so we are still unable to provide the monthly report at this time.

**Arc Thames**, the coordinator of the Santa Rosa County Community Emergency Response Team (CERT) program, was recently recognized with the CERT Association of Florida Distinguished Service Award. This award is given to a long-standing Florida CERT volunteer who has made significant contributions to the CERT organization and demonstrated leadership


## Jamboree-on-the-Air (JOTA) and Jamboree-on-the Internet (JOTI),

The largest Scouting event in the world, takes place on the weekend of October 18 - 20, 2024. Youth amateur radio station WB4SA will be active for the event in a big way. Ken Lyons, KN4MDJ, ARRL Southeastern Division Assistant Director for Radio Scouting and Trustee for WB4SA, said the club will host one of the largest sites in the country, with up to 2000 youth, during JOTA/JOTI weekend. Lyons said the club with active on:

- 80 meters SSB 3.690 & 3.940 MHz CW 3,570 MHz
- 40 meters SSB 7.090 & 7.190 MHz CW 7,030 MHz
- 20 meters SSB 14.290 MHz CW 14.060 MHz
- 17 meters SSB 18.140 MHz CW 18.080 MHz
- 15 meters SSB 21.360 MHz CW 21.140 MHz
- 12 meters SSB 24.960 MHz CW 24.910 MHz
- 10 meters SSB 28.390 MHz CW 28.180 MHz
- 6 meters SSB 50.160 MHz CW 50.160 MHz
- And VHF simplex on 147.420, 146.580, and 146.520 MHz

The Boy Scout and Girl Scout programs covered by the Central Division of Florida Division 2 includes 30,000 scouts in nine counties.

## NFL Officials

**Section Manager**
*Scott Roberts KK4ECR*

**Assistant Section Managers**
*Kevin Bess KK4BFN*
*Helen Straughn WC4FSU*
*DJ Stewart KI4ZER*
*Joe Bassett, W1WCN*

**Section Emergency Coordinator**
*Arc Thames W4CPD*

**Section Public Info Coordinator**
Jim Bledsoe, KI4KEA

**Section Technical Coordinator**
*Frank Haas KB4T*

**Section Affiliated Club Coordinator**

**Section Traffic Manager**
*Helen Straughn WC4FSU*

**Section Official Observer Coordinator**
*Robert Leasko WB8PAF*

**Section State Government Liaison**
*Darrell Brock N4GOA*

## NFL Committees

**Webmaster, www.arrl-nfl.org**
Kari McClure, NW4R

**Newsletter, *QST NFL***
Earl McDow, K4ZSW

***QST NFL*** *is a monthly publication of the ARRL Northern Florida Section.* ***QST NFL*** is intended for wide distribution within the NFL Section, including club Leaders and all licensed Amateurs in Florida. A current issue of this publication can be found at the ARRL Southeastern Division web site, Northern Florida Section. www.***ARRL-NFL.org*** Opinions expressed by contributors are their own, and may not express the positions of the ARRL.

Submissions may be made to the editor: Earl McDow earl.mcdow@gmail.com.

All submissions are subject to editing prior to publication.

## Looking for Something?

Gordon Gibby, KX4Z, has taken the time to index the articles from all the 2021 issues of ***QST NFL***!
https://arrl-nfl.org/wp-content/uploads/2021/12/2021QSTNFLIndex.pdf

## What's Inside…



## NFL Section Member of the Month!

We are always accepting nominations for the NFL Section Member of the Month. To submit a nomination, please email Section Manager Scott Roberts at kk4ecr@gmail.com. Include the nominee's name, call sign, county, reason for the nomination, and a photo of the nominee. Arc and I will review the nominations and contact you with any questions

## Digital Library of Amateur Radio & Communications

Marty Brown, N4GL

Digital Library of Amateur Radio & Communications is now archiving ***QST NFL*** issues. DLARC is a project of the Internet Archive (the not-for-profit online library best known for The Wayback Machine.) DLARC is growing to be a massive online library of the past and present of ham radio and related communications. It is funded by a grant from Amateur Radio Digital Communications. You can see what we have so far at https://archive.org/details/dlarc .

Three years of QST NFL are now online, and I am working with the curator, Kaye Savetz, K6KJN, to eventually get all the issues that I have edited since 2014. DLARC can also scan paper issues. So if you have any stashed in your attic, let me know.

## How I became a Ham

DJ Stewart, KI4ZER
Pres, W4AAZ/W4ZBB

**Welcome to Fall**

Y'all! Or so it would seem with somewhat cooler temperatures, leaves dropping and a buzz of HF in the air! We in the Panhandle are sure glad to be a part of this amazing Amateur Radio Journey! Thank you for being involved and making this fun and exciting! The month of September draws to a close and where did the time go?! It seems like we did so much along our journey, and we have so much more yet to do!

Before I start with the amazing ham venture below, I was asked to discuss how I got into the hobby!
My Grandfather and Father originally obtained their tickets in 1961. I was not around just yet. A "few" years later, I came along and Ham was always a focal point throughout my childhood and into my young adult life! My father, N0KBS took us to field days, club meetings, repeater repair jobs and the standing up of new equipment! Following 1991, we started going to Hamfests and trading/selling at shows! We met many people with similar and different interests! Since then, talking on a radio was a passion! I pursued it in my own form learning from watching and listening to others. I paid attention at every event we went to and retain many of the great lessons to this day! Now fast forward into my previous military career. I was gone, a lot. So the hobby was there, but only in a form of which I could handle due to the missions we had to execute. Entire my time into South Carolina! I traveled to the Shelby Hamfest and got licensed? What? I wasn't licensed before 2007? No. But I did monitor and participated with Hams and other Radio enthusiast all my life! Following that there were a number of years where I moved due to the military. Since I had my license, I was able to get with many clubs and organizations in multiple locations all over there world [where permitted] as time allowed.

I finally landed in Florida. I got involved on the air with QRP, largely thanks to talking on the Panama City Florida Repeaters and doing a bunch of research online. As I was still military, time was tight. I moved to the Destin Florida area a few years later. This time, I decided that I would get involved with the local clubs! Wow what a journey! I teamed up with the Activities Director and asked the club how could I be appositive representative and bolster their organization more! I have not looked back since and have continued to make my families passion for Amateur Radio a calling! I volunteered to do just about everything I could! Contests, parade support, walk-a-thons, 5K's, bike races, community events, operate demonstration tables at tailgates and Hamfest [locally and out of the area], make flyers, promote events, volunteer for committees, assist in running field days, and most importantly, learn from everyone I met to enhance my skills, learn from others, and teach the knowledge I have retained or experimented with!
Being a Ham to me is exceptionally rewarding! Not only because of the fellowship, but also because of the opportunity to grow as an operator and join organizations which bolster amateur Radio! Plus being able to go to a club station at my hearts content means I get to operate equipment that I may or may not be able to have in my home! For me, Amateur Radio is not just another check on a sheet of paper, for me, it is a positive impact in my entire families life! Just ask my son who is also licensed and is the fourth generation operator! He has already served a the President of K4UCF during his time in college! When he got his ticket, he did it by surprise! He since learns from all and follows in the footsteps of everyone he meets and is honing his path forward! So make it a family affair if you can! I recommend it!

## How do I renew my Ham License

There are several ways to renew a ham radio license, including:

**Online:** https://apps.fcc.gov/cores/userLogin.do
Use the FCC License Manager System to renew your license online:

1. Go to https://www.fcc.gov/universal-licensing-system
2. Log in with your FCC Registration Number (FRN) and password.
3. Select Renew Licenses from the My Licenses page.
4. Choose the license you want to renew.
5. Pay the $35 renewal fee.

**By mail** : Send FCC Forms 605 and 159 directly to the FCC:

1. Download Form 605 from https://www.fcc.gov/fcc-form-605
2. Download Form 159 and its instructions.

**With the ARRL or W5YI**

These organizations can help renew your license:

1. ARRL: Members can have their application submitted for free by calling or emailing the ARRL.
2. W5YI: This group can help renew your license for a fee.

**You can renew your license up to 90 days before it expires, or within the two-year grace period after it expires.**

## Pathways for Amateur Radio

DJ Stewart, KI4ZER
Pres, W4AAZ/W4ZBB

Following that discussion, we ventured down the topic of forward pathways for Amateur Radio. The ham radio community is experiencing a resurgence, driven by innovative technologies, changing demographics, and a renewed interest in amateur radio.

Here are key aspects of this new era:

- **Youth Engagement**: Ham radio is attracting a younger generation, with many newcomers entering the hobby in their teens and twenties. This influx of fresh perspectives and skills is revitalizing the community.
- **Digital Modes and Software Defined Radios (SDRs)**: The adoption of digital modes, such as FT8 and WSJT-X, has made it easier for hams to communicate and experiment with new technologies. SDRs, in particular, have democratized access to advanced radio capabilities, allowing operators to customize and upgrade their equipment.
- **Global Connectivity**: The internet and social media have enabled hams to connect with each other worldwide, fostering a sense of community and collaboration. Online forums, social media groups, and digital modes have bridged geographical distances, making it easier for operators to find and communicate with each other.
- **Experimentation and Innovation**: The ham radio community is known for its DIY ethos and experimental spirit. Today, hams are pushing the boundaries of radio technology, developing new modes, and creating innovative projects, such as satellite communications and IoT applications.
- **Interoperability and Standards**: Efforts to standardize digital modes and protocols are ensuring greater interoperability between different radio systems and software platforms. This facilitates communication and collaboration among hams, regardless of their equipment or location.
- **Focus on Skills and Knowledge**: Amidst the technological advancements, there is a renewed emphasis on traditional ham radio skills, such as operating techniques, antenna design, and electronics knowledge. This focus on fundamentals is helping to ensure that new operators are well-equipped to participate in the hobby.

### Key Takeaways

- Ham radio is experiencing a renaissance, driven by technological innovation, demographic shifts, and a renewed interest in the hobby.
- Youth engagement and digital modes are revitalizing the community, while SDRs and online platforms are democratizing access to advanced radio capabilities.
- Experimentation, innovation, and a focus on skills and knowledge are defining characteristics of this new era in ham radio.

All of this was just the start of the month! So, what's coming next?! How about Hamfests, Tailgaters, and Holiday Parties oh my!!!

# MERT

Marion County Sheriff's Office
Division of Emergency Management

# COMMUNICATIONS UPDATE

## October 2024

**MERT's primary role is to support all open Evacuation Shelters throughout Marion County during declared Emergency events. We also support EOC and emergency personnel along with Community Emergency Response Teams (CERT) with voice, image and data communications resources.**
**"*Call MERT… When all else fails*!"**

**MERT Monthly Meeting**

**The next meeting is on October19th @ 10:00 am.**

## Your *Pen* is as Important as your *Microphone*!

**Harlan Cook (KN4VRM) MERT Co-ordinator**

As emergency communicators (EMCOMM), we have all dedicated a significant amount of time, energy and effort in learning and following the Incident Command System (ICS) protocols. As we know, our certifications for the ICS-100, 200, 700 and 800 courses are important credentials required by the MCSO Division of Emergency Management for MERT membership.

With your membership and willingness to support a school shelter during a hurricane as the last level of communications support, members also learn that documentation is a critical and vital part of our overall responsibilities.
***Did you know?*** During any activation or deployment, all activated operators should spend as much time writing and documenting activities… **as we do talking**. *Really? Why?*

First and foremost, documenting your activities and communications is required by ICS protocols to verify your actions during any declared emergency. This information might be used to verify reimbursement requests by the Division of Emergency Management… but even more importantly, the information may be used to verify what MERT operators have done in support of an emergency situation… like a rescue (as MERT members performed during the 2022 Hurricane Ian event in Ft. Meyers). That documentation supported the creation and verification of a detailed report by the MERT IC to the MCSO EOC IC on duty by 0545 hours that morning.

With the verbal reports from the operators on duty, specific details were collected from the ICS-213, ICS-214 and ICS-309 verifying the timelines, events and details

MERT's life-saving actions and other work were recognized with a **Meritorious Volunteer Unit Award** by Sheriff Billy Woods on March 31, 2023.

Thank you for always completing and signing all documents required by ICS procedures and understanding we never know when they will be used for an important reason. Sign In – Sign Out - and Document!

To all MERT Members… thank you for your enthusiasm and support of our mission…
***"When all else fails. Call MERT!"***

HRCook


MARION COUNTY SHERIFF'S OFFICE
Meritorious Volunteer Unit Award
MARION EMERGENCY RADIO TEAM (MERT)
March 31, 2023
Sheriff Billy Woods

**"In a world that is filled with challenges and uncertainties, a positive mental attitude is key to always moving forward in life." –** Nick Jacobs

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## Welcome Cindy Sheffield (K9LRX) – New Documentation Manager

Cindy Sheffield, (K9LRX) Documentation Manager

MERT welcomes Cindy Sheffield as its new Documentation Manager. Cindy shares this about herself… "I initially got my HAM myself more useful to the K9 Search and Rescue teams where I was serving as Communication Chief (in Texas).

I did a weekend HAM CRAM class and passed the FCC Technician license but was only called on to use the HAM license once or twice during my 14-year tenure with the various teams. So technically, I'm a real newbie when it comes to talking over the airwaves. I'm looking forward to learning more and communicating with other operators."

Since joining MERT a few months ago, Cindy has enthusiastically participated in operational, technical and procedural training events, hurricane preparations and SHREK Kit audits. Her New Member Orientation Guide is quickly being filled too. Cindy also joined in the Hurricane Helene activation as a EOC Trainee who impressed as a quick learner! Thank You Cindy for your support as MERT Documentation Manager!

## Hurricane Helene Activation

As Tropical Storm Helene moved across the eastern Gulf growing into a Category 4 Hurricane, MERT was activated at 8:00 am on Sept 26th supporting the special needs Shelter at West Port High School and the EOC Radio Room. MERT recognizes the following for honoring their membership commitment:

**Bill Gillespie**
**EOC**

**Bill Sobel**
**EOC**

**Gary Neron**
**Shelter**

**Pat Davis**
**Shelter**


**Ray Woody**
**Shelter Trainee**

**Cindy Sheffield**
**EOC Trainee**

**Not shown: Royce Hagerman, Harlan Cook and Standby Operators Dave Gustafson & Mike Condon.**

Few were able to predict the incredible devastation and loss of life Hurricane Helene would cause across Florida, Georgia, the Carolinas, Tennessee and Virginia, especially after the mostly limited impacts it had here in Marion County despite the growth of the Hurricane into a huge monster Cat 4 hurricane. (MERT Note: Pat & Bill Davis were without power, cellphone and Internet for 5 days.)

MERT Operators were deactivated at 10:00 PM (14 hours) but provided EOC support to CERT communities having amateur radio Op's during their deployment on Friday morning. (Thanks to Bill Sobel K1WLS) MERT thanks all members for their excellent support!

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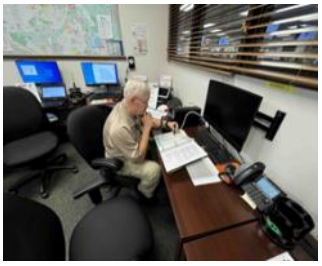


**(Top L) Bill Gillespie**
**(Top C) Cindy Sheffield; Bill Gillespie & Royce Hagerman**
**(Top R) EOC Weather Update**
**(Lower L) Gary Neron & Bill Sobel**
**(Lower R) Hayden Kaufman (ARES) and Cindy Sheffield**

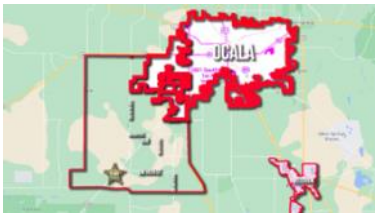
## MERT Surprise Visit

During the Thursday, Sept. 26th Activation for Hurricane Helene, Lt. Ryan Robbins visited MERT's Radio Room for the first time in thanking us for what we do in support of Marion County residents.

He shared Preston Bowlin, Director of Emergency Management is vocal about our activities during emergencies and the significant training, readiness and EMCOMM support we provide when called upon. As he is now assigned to the EOC for future Activations, he wanted to personally say Hi! and let us know to call… if he can ever be of assistance to MERT.

We sincerely thank him for the visit and sharing his offer of support for our efforts. Harlan Cook, Coordinator and Bill Gillespie, Assistant Coordinator invited him to visit at any time!

**Lt. Ryan Robbins, Southwest District Commander**




**(L) Marion County Southwest District has 41,000 residents and covers 78 Sq. mi.**

## NVIS Go Box Equipment List

A big "Thank You" goes to MERT member Dee Seagraves and new member Jerry Landrum for completing the NVIS ANTENNA GO BOX inventory which was the final task of the project. This antenna resource is designed for rapid deployment ensuring all components are available for setup/operation anywhere MERT is deployed.

**"To bring about change, you must not be afraid to take the first step. When you change your thoughts, remember to also change your world". –** Rosa Parks

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And completing the meeting was an informative update from Bruce Twiss (KI4NFA) on the current activities of the Hospital Team including the 145.270 Repeater at Advent Health Ocala call sign changed to KN4MIV, Jim Burgess is the new Trustee. Funding has been approved for a new radio/antenna connection for Advent Health Belleview ER; HEC was not activated for Tropical Storm DEBBY; WINLINK VHF Gateways – W9CHA-10 & K8ZAG-10 Gateways are permanently off-air.

MERT NVIS GO BOX Equipment List September 14, 2024

| Item | Manufacturer | Model | Serial Number | Description | Quantity | Notes |
|---|---|---|---|---|---|---|
| 1 | Sunnyglade | 28 inches | na | Collapsable Traffic Cones w/reflective collars (Antenna stake location ground safety markers) | 3 | One more needed |
| 2 | Beefore | 12 inches | na | Yellow HD Plastic Ground anchoring stakes for antenna lead cables | 10 | |
| 3 | Misc | na | na | Gray, insulated guy tensioners | 8 | |
| 4 | Misc | 1 inch x 100 ft | na | Orange Surveyor Tape (Antenna lead safety markers used 1 – 6ft above ground on antenna ropes) | 1 roll | |
| 5 | Dasron | IP-54 | na | Orange, Weather resistant & watertight, LMR-400 Coaxial Connector covers, 7 in x 3 in | 2 | |
| 6 | Misc | Velcro straps | na | Black, 1 in x 12 in straps to secure coax cable and antenna lead cables | 8 | |
| 7 | Times Fiber | LNR-400 Coax | na | NVIS antenna jumper cable, 100 ft coaxial cable w/PL-259 male coaxial connectors each end | 1 | |
| 8 | DX Engineering | 12 in SMA cable w/BNC Male & SO-238 connectors | na | BNC Male (NVIS antenna connector) to SO238 Female Jack (NVIS Jumper cable) adapter cable using via SMA coax | 2 | |
| 9 | DX Engineering | BNC Male to SO-238 | na | Backup adapter for NVIS antenna to NVIS jumper cable | 1 | |
| 10 | DX Engineering | SO-238 female to PL-259 Adapter | na | Backup adapter for NVIS antenna to NVIS coax jumper | 1 | |
| 11 | DX Engineering | N female to N Female adapter | na | Backup adapter for NVIS jumper cable | 1 | |
| 12 | US Army Surplus | AS-2259 | na | Duffel bag | 1 | |
| 13 | " " " | AS-2259 | na | NVIS Antenna Base Unit | 1 | |
| 14 | " " " | AS-2259 | na | NVIS Mast – approx. 2 ft each – 7 pieces | 7 | |
| 15 | " " " | AS-2259 | na | NVIS top unit Assembly with antenna elements, rope hooks, etc. | 1 | |
| 16 | | | | | | |
| 17 | | | | | | |

**(L) A copy of the completed Equipment List.**

**(R) Members constructed the NVIS antenna and made a 40 Meter contact within 30-minutes on July 17th.**


## Informative speakers.

First up was Sergeant Todd Winkler (W1NKX) of the Sheriff's Office who stopped by and said "Hi!" to fellow hams. Todd is interested in using his license and learning more about the hobby and was invited to join our weekly and monthly meetings whenever time allows.

Harlan led off sharing a proposal for adding the Forest Tower to MERT's County repeaters along with an overview and recommendation on creating a County-wide, linked multi-repeater network for MERT. The proposal has been submitted to Director Preston Bowlin for review.

MERT welcomed Guest Speaker Earl McDow (K4ZSW) from Gainesville, FL who shared how he became a ham, his new responsibilities as Editor of the "QST NFL" newsletter along with a few of the current activities of the Alachua County ARES team, including the new larger EOC being planned. We sincerely thank Earl (and his son Mark KN4POZ) for joining MERT!

Next, Gray Moffett (KC3DWY) provided Marion County ARES Update on a FEMA Go Kits and the ARES ICS 217 form. All enjoyed his Show and Tell too.

**Sergeant Todd Winkler W1NKX**

**Earl McDow (K4ZSW)**

**"Every accomplishment starts with the decision to try. Do what you can, with what you have, where you are". –** John F. Kennedy

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**The MERT Linked-Repeater Proposal was shared A full house!**


**(L) Gray Moffett presenting information on FEMA "Go Kit" recommendations. (R) Bruce Twiss sharing several updates on Hospital Emergency Team activities**

**Preston Bowlin, Director of Emergency Management**

## MERT Appreciation Visit

During the Wednesday, September 11th "Check In" meeting, Preston Bowlin, Director of Emergency Management visited with members in thanking them for all MERT does by staying ready and prepared for supporting the Shelters with MERT Radio Operators!

We thank Preston and the entire Emergency Management Team for their support!

## Weekly "Check In" Meeting Photos

September "Check In's" were fun and packed with many different classes and updates from many Members. Here's some of the photos from the meetings. Join us anytime!

## Following that is Playground Amateur Radio Clubs Annual Tailgate!!!


This event is FREE FREE FREE and they are sporting one of the best Food Trucks Rise and Swine! They have Prizes for a donation, Free entry, free parking, and more! Do not miss this event and contact them at PARCFWB@Gmail.com subject line "Swampfest"!

But wait!!! Just when you think the upcoming events for the year are over, THERE'S MORE!

The Playground Amateur Radio Club, INC. is proud to announce that we will be hosting our annual Holiday event December 15th from 4 to 7 pm as a Banquet in the newly renovated event space at Angler's on Okaloosa Island Florida!
We formally invite you to bring your friends & family and come out for a night of friendship and fun to close out our year together!

We hope to award 2024 Ham of the Year to all clubs. So if you are part of a club you would like to have it and your members at this event recognized, please contact us at parcfwb@gmail.com.

Stay tuned for updates, as this event is going to be big!
Please email kq4frb@gmail.com if you would like to RSVP!!!

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## Playground ARC

DJ Stewart KI4ZER

Other than planning for events to get hams together, the coordinated effort to serve the community is taking place with support for our local governments and fellow no-profits alike! Parades, fairs, community events, sponsored runs benefiting multiple organizations, bike races and more! If it needs communications with an established protocol, the Hams in the Panhandle are answering and offering their services! Nothing gets the energy flowing more than the chance to interact with the communities that we all call home! Announcements to come next month in the QST and on all the Social media sites for area and Panhandle Clubs for a request of support so stay tuned!

Did you know that sharing information with perspective, new or non-hams is a thing?! Who would have thought! Panning is also in work for more combined efforts in Parks On The Air! This is wonderful way to show off the innovation of Amateur Radio and showcase our gear, skills, and test out practices as the hobby continues to advance in multiple directions! If you are asked what POTA is, just use this simple brief as written by Team PARC:

The **Parks on the Air (POTA)** program encourages amateur radio operators to set up stations in parks and engage in radio communications. This initiative has led to the development of various portable equipment setups that facilitate quick and efficient operations in outdoor environments.

**Portable Radio Stations**

1. **Custom Portable POTA Packs**:
    - Operators often create personalized portable radio packs tailored for ease of transport and setup. For example, one operator designed a pack using a NATO rucksack, which includes a Yaesu FT-891 transceiver and various accessories like an autotuner and a LiFePO4 battery. This setup allows for comfortable operation while seated on a lightweight camping stool.

**2. Antenna Options**:

- A variety of antennas are available for portable operations. The **Reel POTA-ble EFHW antennas** are specifically designed for easy setup and lightweight transport, making them suitable for POTA activities. These antennas can cover multiple bands (40-10 meters) and are praised for their performance in portable scenarios.
- Other popular options include the **MFJ-1979 telescoping antenna**, which is noted for its quick deployment and effectiveness across several bands.

**Additional Considerations**

- **Setup and Deployment**: Quick deployment is crucial for POTA activations. Many operators emphasize the importance of having an antenna that can be set up in under five minutes, allowing them to maximize their operating time in the field.
- **Community and Resources**: The POTA community offers numerous resources, including guides on how to participate effectively, tips on equipment selection, and forums for sharing experiences.

- **Conclusion**

Engaging in the POTA program requires thoughtful preparation of portable equipment that balances functionality with ease of transport. Whether through custom packs or specialized antennas, operators can enjoy successful activations while promoting emergency awareness and communication from beautiful outdoor settings.

Thank you for your time and reading and remember, we are all here because we enjoy each others coordination, communication, and combined efforts to share the love of radio!

## Suwannee ARC

Steve Kostro N2CEI, President


Tuesday OCT 1st, the SARC will be celebrating the 12th year of our Clubhouse with a Pizza party. Along with our standing membership, we have invited some local guests to attend our celebration. The clubhouse will be on the air on various bands throughout the evening. If you get a chance look us up!

This summer, membership activity has been at a minimum. At our early July meeting, it was decided that after our successful AC power upgrade, a new Air Conditioner was in order to better control the environment in our meeting and operation areas. The installation was successfully completed on two very hot days but we immediately enjoyed the fruits of our labors. Two small but efficient teams were formed. One did the electrical work since we required a new 220 VAC line drop and a construction crew that replace the older unit that was installed in the wall 10 years previously. The project completion met everyone's requirements.

During the month of July, membership activated the clubhouse when there wasn't a work party (grounds maintenance, AC Install, and such) but the summer's heat and crazy rough weather kept the RF signals generated to a minimum. There was participation in the 13 Colony's event and operation during the CQ WW VHF contest (that was interrupted by the weather) along with some scattered mid week operations. It was a good time to be on vacation somewhere else besides Suwannee County and membership took advantage of that!

Our August meeting was canceled due to the first major storm of the season that caused flooding throughout the county that made travel difficult. It was to be a Business meeting so it was rescheduled for Sept 3rd. During the month of August, membership participated in the ARRL 222 MHZ and up contest and the World Wide Digital Contest along with various "Sprint" events scheduled during the weeknights. The clubhouse was a great place to hang out in during the summer's heat!

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September's operating events included various weeknight Sprints and the ARRL Sept. VHF contest that was again interrupted be a weather event but was fun for those that participated. The last weekend in September was dedicated to sprucing the grounds up and getting ready for our Birthday party on OCT 1st

The Months of October and November bring many scheduled operating events including the ARRL EME, CQ WW DX, (CW and SSB) and ARRL Sweepstakes (CW and SSB). You will find N4SVC operating as a multi-op station on all bands. Maybe we will catch you on during one of those weekends.


And always remember, if you are passing through the Live Oak area, take time to say hello on our 145.410 repeater (-600, 100 PL) and as always, if you hear us on the bands 160M through 3cm, give us a call and say HI!

Then if you worked us in any past operation event, or even just in a casual QSO, you will find your QSO information on LOTW.

We hope you are enjoying your favorite aspect of the hobby and maybe catch you on the bands some day! See you soon and all the best from all of us at the Suwannee ARC!

# SUWANNEE COUNTY ARES NEWS - SEPTEMBER 2024

J. Gordon Beattie, W2TTT

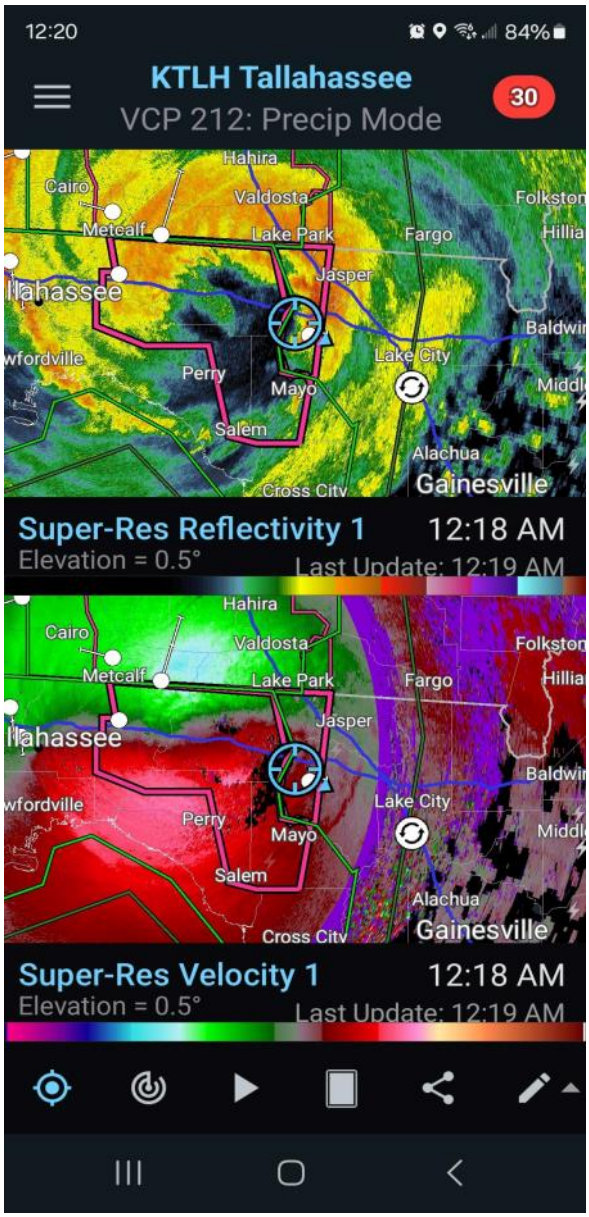
***Author's Note***

*Here is a preliminary report for the NFL Section Newsletter from Suwannee County ARES. We are awaiting more text and photos from other members of our ARES team for next month's issue. It is being composed on a phone and being typed with thumbs while on emergency power.*

## Preparations and Operations

The month of September started with a lot of us with work and family conflicts that led to less than 100% Section and State net participation, but our habit of preparation really paid off as several hurricanes threatened the Gulf region. As Helene started to track toward the Big Bend and Suwannee County, we found our last minute arrangements to be fairly modest and almost routine which is where one needs to be when bad things are on the horizon.

Several of us have been maintaining a radio watch for Suwannee County Emergency Management since Wednesday evening and have had everything on generator or battery since 22:00 ET on Thursday. We have been monitoring the 145.27 MHz W2TTT/R and the 443.7 MHz Live Oak SARNET repeater since 18:00 ET on Wednesday. We also were monitoring 145.41 in Live Oak until it was no longer on the air. Battery backup appears to be a valuable capability in these situations. This watch has been maintained around the clock by our EC Mike Meador KM4BTW, Joe Kelman KI4TRR, Tom Burnett WA4ZET, James Raulerson KO4LFB, Nancy Beattie N2FWI and Gordon Beattie W2TTT and it will continue until late in the evening on Monday or early in the morning on Tuesday. This watch was done at the Suwannee County EOC and in home stations with telephone access to the EOC should a situation arise.




A full test of the EOC antennas and radios at KK4RQY was conducted on Wednesday during the North Florida ARES Net on 7.197 MHz at 09:00 and during the weekly County and Served Agency Net at 13:00. All local/regional repeaters were tested and SARNET access was verified for Live Oak, Madison, Perry and Lake City.

As Wednesday turned into Thursday, Helene went from a Tropical Storm to a Cat 4 Hurricane and taunted Tallahassee before returning to Steinhatchee and Perry before heading toward Madison, Lee, Live Oak and Lake City. Once again only a short time after Debby, and only thirteen months after Idalia the Big Bend was the target for a hurricanes destruction. And so it was…

We had the eye wall on the "dirty side" of Helene roll right through here. The reflectivity is the top image and the bottom the wind speeds.

## Damage and Miracles

Gordon W2TTT's triband Diamond X-6000 antenna on a tilt mount came down when the pole barn over his shack went through the mast in the wind. The radials were bent up, but the antenna seems to have survived. It narrowly missed Gordon W2TTT's truck and landed across his antenna hitch mount. The violent break of a 6×6 is humbling to see! Mother Nature is a tough old bird!

Along with that mast, Gordon lost a 40-6m OCF dipole and a 2m/70cm j-pole both of which can be put back up.

Continued on next page.

The really dramatic aspect of this event was that the carport over the shed that has Gordon and Nancy's ham shack, was blown apart and toward the road. It is what destroyed the mast and miraculously did not harm Gordon's truck or the ham shack as shown above as it went over and past the truck. Note the partial remains wrapped around the utility pole by the road and the huge gashes in the grass.

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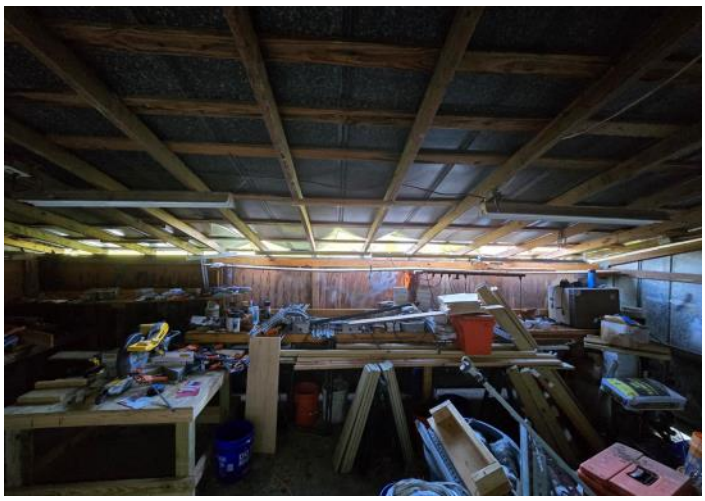


## Other Damage Reports

Joe KI4TRR had some downed branches that were easily cleared from his driveway and minor siding and handrail damage. Mike KM4BTW and James KO4LFB had some roof damage that can be tapped over and the inevitable tree branch removal. Tom WA4ZET's home was spared, but he has some tree work to clear up.

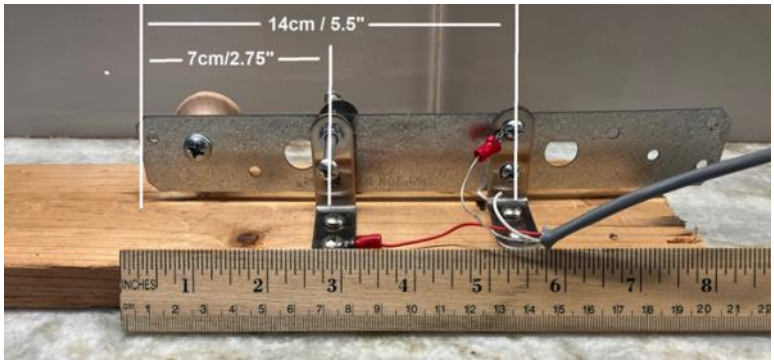
## Closing Comments

As we close for the month, we thank God for sparing us and for the repairable damage that we need to address. No one was killed or injured. We can count our blessings, rebuild and become stronger for the next time.

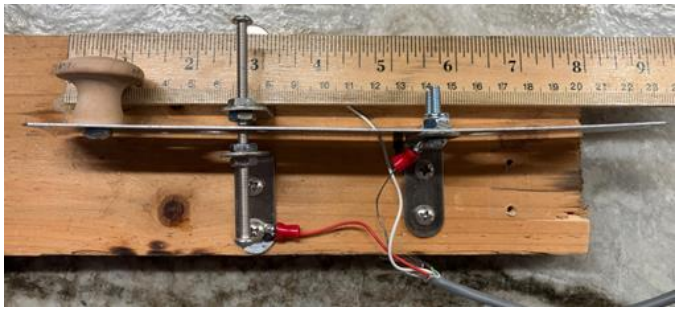
# $7 Homebrew Club Project CW Paddles - "Bencher Emulator"

Gordon Gibby KX4Z

After our great success at building K3NG-based Arduino Winkeyer emulators, of course I needed another CW paddle to go with the new keyer! Paddles are expensive! Could I build a homebrew set that would feel as nice as my Bencher paddles, and work reliably?




Eric Pleace KO4ZSD has built a very successful paddle set using a hacksaw blade or similar -- and 3D printed holders for screw contacts. His example got me thinking. Right angle brackets left over from securing or front porch railing, with some nuts on each side should easily hold adjustable screws for contacts. For the center arm, a thin piece of



provided the base, and it was easy to just press-start sheet metal screws into the soft wood to secure the end-bracket, and the "dot arm" and "dash arm" contacts. steel should be flexible enough to work. Supported at one end, with the contacts in the middle, the genius of this project is that *the remaining lever arm to the hand piece will provide "give" to keep arthritic finger joints happy*! No banging into "hard stops" like a straight key! For 88 cents I got a pre-cut galvanized 20-gauge stamped arm from Home Depot with some useful holes already present. A hardwood cabinet knob provides the right amount of width to hold comfortably between thumb and finger. Leftover 1"x4" pine board provided the base, and it was easy to just press-start sheet metal screws into the soft wood to secure the end-bracket, and the "dot arm" and "dash arm" contacts.

I used stainless steel 8-32 screws for the contacts, with nuts on both sides of the vertical bracket to clamp down and secure the screw contact. A plastic-insert lock nut for the outside nut might even be better.

My first effort used the entire length of the thin steel tie piece for the arm. It was **far too flexible** and would vibrate annoyingly. Too lazy to hacksaw it shorter, it was easy to drill a hole or two for new "end" support position to shorten the business end. Repositioning the brackets on the soft pine board is easy and doesn't even require pre-drilled holes if you can press hard with the screwdriver.

Now with a shorter arm (14 cm/5.5"), the flexibility and "feel" was perfect! I was able to adjust the dot & dash screws to set a tiny movement (the way I like it) and this was just **an amazingly nice paddle!** It would class it as within a hair of the nice feel of my Bencher -- and I had less than $5 invested so far!

Although I made my cable, a pre-made $0.89 Monoprice shielded 3.5mm TRS cable can be cut in two to service two paddles. That product has real shielded and insulated wires; easy to work with. The end bracket/arm is grounded, and the other two brackets become "dot" and "dash" contacts. Screws can tighten on either flat crimp terminals or just the bare wires.

With these new dimensions, this is a really, really nice paddle! It will now become the standard CW paddle for our get-away home, saving me another bundle!

This could be a great club project, under $7 each if a few are constructed. If you want to give your paddle significant weight just like a real Bencher: replace the 1"x4" long base with a shorter, thinner piece of 1/4" plywood epoxy-glued to a 1/2" thick 4"x4" hot-rolled steel plate, and line the bottom with felt or cardboard for friction. Let the grounded end-bracket screws reach into the steel plate a bit (pre-drilling probably necessary) and use shorter, 1/4" sheet metal screws to secure the dot- and dash-arm brackets only into the insulating plywood.

Continued on next page.

**Parts and Prices**

1. 1"x4" soft wood - bed slats come in 3.25feet, enough to make 2 or more paddles, for $4 total (8-foot lengths are even cheaper per foot.)
2. 20-gauge galvanized 1-1/4"x9" tie - 88 cents https://www.homedepot.com/p/Simpson-Strong-Tie-LSTA-1-1-4-in-x-9-in-20-Gauge-Galvanized-Strap-Tie-LSTA9/202255804
3. Hardwood Round Knob -- many available choices. 2 for $1.18 (may need shorter screws) https://www.homedepot.com/p/Waddell-Hardwood-Round-Knob-2-Pack-with-Screws-1-25-in-Dia-Premium-Flat-Grain-for-Even-Finish-DIY-Drawers-Cabinet-Doors-9211-25-DP/203706841
4. #8 machine screws and nuts. Zinc plated may be fine; I used stainless for the two contact screws, 1-2" is fine.
5. #8 x 1/2" sheet metal screws to secure the brackets to the soft pine board.
6. Stainless right angle brackets -- 18 for $9.95 (enough for 6 paddles). 40mm x 40mm allows for two-screw strong mounting. https://www.amazon.com/gp/product/B08BZPG7ZM/?th=1
7. 3.5mm 6foot double-ended TRS cable - enough for two paddles, $0.89. https://www.amazon.com/gp/product/B003L1722Y/
8. Optional hot-rolled steel for heavy base: Pack of two 1/2" x 4" x 4" steel, $19.75 total. https://www.amazon.com/dp/B00YWBPWDS

## Various Types of Connectors

Gordon Gibby KX4Z

I put together the accompanying PDF with color images of various types of connectors that are often used for:

a. Morse Code "straight" keys (single closure)
b. Morse Code "paddles" - which include two closures, one for dot and one for dash, and hence require a connector with two signal lines plus ground
c. Headphones -- originally monaural (same sound going to both ears) and could use a simple mono plug; but now are more likely to be "stereo" with two signal lines (similar to morse code paddles) and therefore requiring a stereo plug.

Microphones are a completely different set of connectors in most cases, but in audio (public address etc.), low end microphones may also use these same connectors as above. Higher end public address use "XLR" connectors, while ham radio microphones tend to use multiple conductor connectors such as the Icom 8-pin octal connector, or the RJ45 connector (same as Ethernet).

Cables with RCA phono male connectors were widely used on older video recorders, DVD's and Televisions. They often came with three different cables -- "left" "right" and "video" (red, white, yellow) and can often be picked up for $1 at thrift stores because almost no one uses them with TV's today, which usually have newer HDMI connectors. Likewise, USB printer cables and 3.5mm stereo cables are also widely available at thrift stores (this decade at least).

# Rambunctious Alachua Crew Builds Arduino CW Winkeyer-Emulators

Gordon Gibby KX4Z

We had SO MUCH FUN building together at our August Lab'N'Lunch -- the last stragglers stayed until 7PM! I think all told, we have now constructed $1,350-worth of Winkeyer-emulators (ours even have a *display*, something you can't even get in some base commercial models) -- and we did it for pennies on the dollar.

Steve K1EL's extraordinarily popular Winkeyer (https://www.k1elsystems.com/index.html ) sends perfect code, not jerky ill-timed code that comes out of multi-threaded over-burdened PC's. His famous WINKEYER communications protocol revolutionized Field Day CW for me, and Anthony K3NG's public Arduino code (see: https://blog.radioartisan.com/arduino-cw-keyer/ ) made for a fantastic homebrew project.

I think there were EIGHT (plus me) of our Alachua County crew building, but that actually included the EC of neighboring Columbia County, Brad Swartz N5CBP. (His wife let him come from 45 miles away, after he finished with Hurricane Debby debris!)

Kitchen Table Teamwork Building

People were learning! FIRST time for most of them to solder in a complete MICRO-PROCESSOR. We started easy, with the 5-volt 3-terminal regulator section. Testing at that point allowed soldering problems to be corrected before really $$$ stuff was placed at risk.

Then we soldered in the **pre-programmed 30-pin Arduino Nano**, and subsequently each little optional section. Testing at each stopping point allowed new problems to be solved quickly.

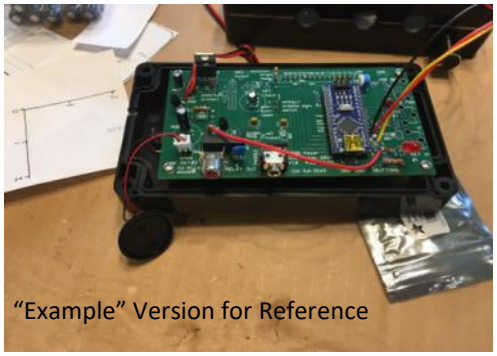
We built SO MANY keyers that I actually ran out of some parts -- I think we had more people than I had even counted in pre-planning! People were learning what resistors, capacitors, electrolytics, transistors *look like* and how connectors work. At each successful function-check there was hearty group rejoicing! Troubleshooting of problems helped develop invaluable disaster-resiliency skills.

For this first Lab'N'Lunch we primarily only got working circuit boards built, although the plastic cases were available. I managed to get holes drilled and boards mounted on the two I was building, verifying that my "drilling template" was accurate and useful.

(L->R) Hugh Minnich KN4IIM, Eric Pleace KO4ZSD (kneeling) David Huckstep W4JIR, Mannish Sahni KQ4KTE, Rosemary Jones KI4QBZ, Susan Halbert KG4VWI, Brad Swartz N5CBP, Wendell Wright KN4TWS

For the first time, I learned how to use a Dremel **miniature circular saw** -- and when you get the blade on the right direction, it works a lot better!! The printed circuit board design has a built-in ground-plane and will actually work pretty well even just mounted on a pine board.

In the Lab'N'Lunch to follow we'll coach people on the confusing issues of connectors. *Phone* versus *phono*, 3.5mm versus 1/4", stereo (TRS) versus mono (TS) -- all very confusing to many hams. Huge savings for hams who can roll their own cables! There was also a lot of learning going on about how CW actually gets transmitted. At that Lab'N'Lunch we'll drill the remaining boxes and cut the squares and put on "standoffs" and get these things boxed up.



"Example" Version for Reference

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*"Spy" EC Brad Swartz N5CBP joins in the fun in hopes of catching Columbia County up to Alachua in the 2025 Field Day*

This is a GREAT project for building teamwork! Hams of all experience levels working around the same table, gracefully dealing with all issues and questions, no matter how confusing or simple. This is how we build teams in Alachua County!

## Sumter County ARES

*Mark Newby, KC4LEO*
Emergency Coordinator
Sumter County ARES

As we watch our latest tropical disturbance, just a reminder that we have a number of weather related resources on the Sumter County ARES website. You can access all this at

www.sumterares.org/weather

- Severe Weather Alerts for Sumter County and Florida
- Links to Tampa and Orlando live radars
- Local current weather conditions / forecasts
- Links to the National Weather Service
- NWS Ruskin Net Control
- Link to the National Hurricane Center
- Information on Power Outages
- SKYWARN information

Submit storm reports online directly to Ruskin NWS

## Fixing the Low-Oil-Pressure Fuel Shutdown on Yanmar L100 & Chinese 186F 10HP Diesel Engine Generators

Yanmar is a very respected diesel engine and tractor manufacturer, with a very famous line of small air-cooled single cylinder diesel engines, the L100. So well-respected in fact that the Chinese have copied their engine, and it is known as the 186F, available for under $400 on Amazon: https://www.amazon.com/Diesel-Cylinder-Cooling-Agricultural-Machinery/dp/B088D4Z491

Manufacturers mate this capable 10hp fuel-sipping engine without any spark plug ignition noise, to an alternator head, set the engine to 3600 RPM and let the mechanical governor keep it there, despite heavy loads. You get a noise, but very fuel-efficient generator. For ham and emergency EmComm, the huge advantage is there is no need for an electronic voltage regulator or inverter -- and hence near ZERO RFI. Commercial 5kW diesel generators built on this arrangement generally sell for $4,000. The actual Yanmar engine should run for hundreds and hundreds of hours (I had 3,000 hours on one tractor) with proper care; the longevity of the Chinese knockoff is debatable, but it is cheap!

A sampling of generators using this engine:
https://www.absolutegenerators.com/yanmar-portable-diesel-generator-ydg5500w-6ei-5500-watt-9-1-hp-120-240-volt-tier-iv-final
https://www.electricgeneratorsdirect.com/Generac-6864-Portable-Generator/p50700.html

https://www.maxflow.co.uk/generators/diesel-engine/elite50yantf

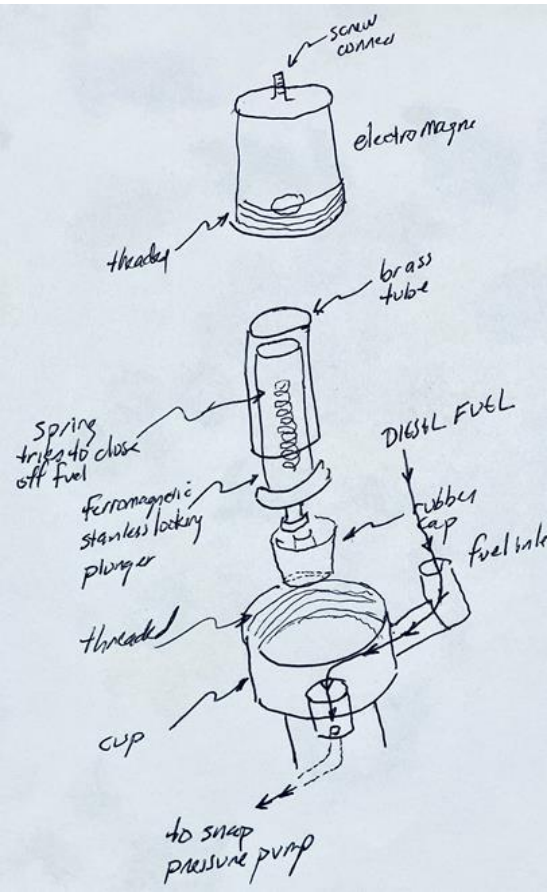
https://www.pramac.com/product?product=10457&folder=66

Our 2nd-hand generator left over from the USS Cole repair, was an earlier version of the Italian Pramac diesel generator. It had the low-pressure oil switch, but it wasn't hooked up, nor was the starter motor! Apparently the Navy relied on sailor muscle power for starting! I wired all of that up with an aftermarket ignition switch and key-- and had a **key-start 5kw diesel generator**. The low-pressure oil switch drives an electric fuel shutoff. The typical Yanmar L100 uses a 12-volt solenoid to block fuel delivery to the diesel high pressure pump, such as this $28 model: https://www.amazon.com/labwork-parts-Injector-Solenoid-Yanmar-Generator/dp/B07KT14KVQ (See photo.) This exact same solenoid is used for a fuel shutoff in the ALH-series of VW TDI diesel engines, and in some Volvo's as well. It has a rubber tip affixed to the end of the solenoid.

Continued on next page.

## All is not well...

Unexpectedly, I ran into a very significant problem: Once shut down using the key to turn off 12V to the solenoid and block fuel, and the solenoid pushed out by its internal spring to block fuel flow and shut off fuel, **you couldn't get the engine to restart**! A lot of head-scratching suggested that just possibly, the high pressure pump might be drawing a partial vacuum against that rubber tip and just like a suction cup Florid Sun Pass, it was vacuum-stuck, with no means of easing the vacuum if the fuel system had no leaks…




Nothing we tried seemed to fix this problem. If you stopped the generator to refill it, you could count on NOT being able restart it anytime soon... It was so bad that one of our crew did something VERY DANGEROUS to refill that generator during Field Day -- we all shuddered to think about the possibilities.....

When I disassembled it for the most recent time, indeed the plunger came clear out of the electromagnetic housing and appeared stuck to the outlet hole. I had to physically grab it and pull, to get it freed up (suggesting it was vacuum-stuck). Yet then it went in and out of the recess quite easily and didn't seem stuck at all! The vacuum-stuck idea seemed to explain this reasonably!

Somewhat in desperation, I removed the rubber tip and tested whether the little protuberance left underneath would work. It does! Pressed by the internal spring, it very nicely closed off the fuel enough to stop the engine or prevent it from starting, and yet did NOT get physically stuck anywhere. Would it pass the acid test?

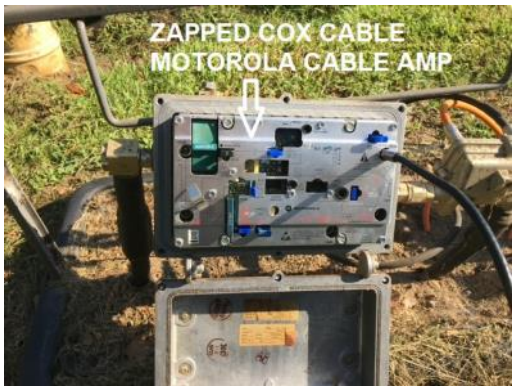
So I put it all back together without the rubber tip, and it seems to be a solution. I ran the generator for 2 hours, and after shutting down with the key, it easily restarted, and after stopping it again, again it restarted. It would not do this before. **Success!!**

Alternative possible solutions for those who might not want to take off the tip include

- Use a knife to cut a slice across the business end of the rubber tip, allowing a tiny leak, which would be enough to release the vacuum, but not keep the engine running.
- Find a tip that is not cup-shaped, but more flat or rounded
- Drill a tiny hole in the tip to potentially allow a tiny leak

## Repairing Hurricane Debby Power Supply Damage

by Gordon Gibby KX4Z




During Hurricane Debby, I was out at a shelter, and completely unaware that the bridge rectifier in my SHARES station ICOM linear power supply got zapped, shorted out, blew the fuse in the Internet-controllable protective switch.....and thus took down ALL my HF RMS's -- both KX4Z (ham) and NND4FL (SHARES)! We also lost Internet at my house -- so every GIS-mappable Field Situation report that went to KX4Z-12.....just sat on RMS_RELAY because its outflow HF station was INOP. Ouch!

Down the street from me, the Cox amplifier for our Internet ALSO took a hit. Thus the Internet out...And the front-gate pushbutton also seemed to be mixed up. So it fits for a power-line issue....

### Simple linear supply

The ICOM supply is very pedestrian: big transformer, a low AC output voltage with lots of amps available, a big heat-sinked bridge rectifier, a huge electrolytic capacitor to smooth out the hum, and then a linear (voltage dropping) regulator to maintain 13.6 VDC. The fuse on the primary side blew instantly when I reapplied power. The fuse between the big capacitor and the regulator was fine. The problem was a shorted bridge rectifier. A clamp on AC ammeter helped demonstrate enormous current going through the shorted rectifier while running the linear supply from just 5 - 10VAC....

**Change the Bridge Rectifier**

Amazon thankfully had a nearly IDENTICAL bridge rectifier, same shape, 25A and 400VDC rating, 2 for $7. Unsoldering and resoldering the wires was the worst problem with my dinky soldering iron. But I got it done -- no short, good DC, regulator produced 13.7 and stayed there for hours in an infant mortality test. The temporary power supply has now been relieved of duty and the SHARES station is back on line with its normal ICOM linear supply! **Big Success and only $7**.


The Amateur Radio Service, unlike many others, is expressly allowed to SERVICE (and even construct!) OUR OWN RADIOS. This is a huge privilege earned by our history of electronics skills.

## Melrose Community Radio Network

Reid Tillery K9RFT, WRZM878

Saturday, Aug 31 the Melrose Community Radio Network, a combined GMRS/ham net, conducted its first Simulated Emergency Test. (See attached document)

Special thanks to Cliff Sirman (KN4RGR, WRCK820) and Anders Georgsson (KZ4JN) who along with myself sent out health-and-welfare traffic via HF Winlink. Also, thanks to Charlie Scordo (WRXH538) who passed GMRS traffic from his neighborhood. Without these folks, the net wouldn't be effective.

The Falcon Stations mentioned above met on the air in accordance with the Wilderness Protocol (at the top of each of these hours: 7 AM, 10 AM, 1 PM, 4 PM, 7 PM, and 10PM). At those times, we took traffic and sent it out. At the end of the exercise, we had handled 13 outgoing Winlink messages. We know this is not a lot, but it is a great start. We had people delivering messages to us over the radio when just a few weeks back some didn't know how to use the PTT button. They now understand about the net, the useful purposes it can serve, the Wilderness Protocol, and how to pass traffic. I'd say we're off to a good start.

# SIMULATED EMERGENCY TEST (SET) - Melrose Community Radio Net

Reid Tillery K9RFT

## THE PURPOSE OF A COMMUNITY RADIO NET

The fundamental purpose of our net is to have a means of communications besides the public switched telephone network and local internet. Any community with an alternate means of communicating is better prepared to deal with unexpected and potentially disastrous events such as hurricanes, wildfires, tornadoes, and cyberattack.

Cell phones are great when they work, but the whole cellphone system has multiple points of failure, meaning they might not work when we most need for them to. Copper landlines can be more reliable than cell phones, but the old mostly reliable copper twisted pair of wires from our homes to the telephone company central office is giving way to voice over internet protocol (VoIP) run over fiber-optic cable. While these "upgrades" may work better on a day-to-day basis, more points of failure are introduced into the system. Besides, fewer people even have landlines these days, meaning they rely totally on cell phones for communications.

## MELROSE COMMUNITY RADIO NET

Melrose has the beginnings of a community GMRS/FRS radio network. We hope the network will continue to grow as more people come to understand the need for and the usefulness of an alternate means of communication, both during emergencies and in normal times.

## THE USEFULNESS OF A SET

One advantage of a functioning community radio net is the ability to send messages both in and out of the local area. Our radio net consists not only of GMRS/FRS stations but also amateur (ham) radio stations with the ability to communicate long distances. Hams can, for example, use their radios to send emails even without local internet or grid electricity. What this means for any member of our community radio network is that, if normal communications are down, you have the ability to use the network to get a message to friends/loved ones out of the area.

## SET SCENARIO

For the purposes of this SET, we'll assume a CAT 5 hurricane traveling up the east coast doglegged and slammed into Flagler Beach, and then traveled west-northwest across the state, hitting Melrose and Gainesville as a CAT 2 storm. All communications in the path of the storm are down, power is out, and emergency services are overwhelmed. The local fire station is operating on backup power. Those on wells no longer have water, and Melrose Water is continuing to operate for the time being using backup pumps powered by propane.

Unrealistic situation? Not at all. Some of you will remember the 1999 Hurricane Floyd and the massive and panicked evacuation attempts from Jacksonville along Interstate 10. Fortunately, for us Floridians, Floyd never made landfall here. If, however, it had come ashore at Flagler Beach as once projected, the situation described here might have been a reality.

## GET THE MESSAGE OUT

To see how well our radio net can function, we will practice getting messages out of the area. Any GMRS/FRS station can participate by originating a message which you want sent out of the local disaster zone.

### Example:

You want to send a message to Aunt Bessie in Colorado Springs that you and your family have survived the hurricane without any injuries but your house is damaged. Write that message using 25 words or less. The period at the end of a sentence counts as a word, except for the period at the end of the last sentence. It's important to keep it brief.

"WE ARE ALL OKAY AFTER THE STORM. HOUSE SUSTAINED SOME DAMAGE. WILL CALL WHEN PHONES ARE WORKING AGAIN"

The above message is considered to be 20 words. Remember, we count as a word the period at the end of a sentence, but we don't count the period at the end of the last sentence. Each word must be accounted for. This way the message doesn't change as it passes from one station to another. Provide an email address and a phone number if possible for Aunt Bessie. These don't count as part of your 25-word limitation. And for purposes of this SET, include your own email address and we'll CC you on that email so you'll know it got through. In a real situation, of course, we won't have local internet.

Next, pass this message over the air to a Falcon Station who can either send the email message over the air or pass it to another Falcon who can.

The sender of the message will include the prominent notation: THIS IS AN EXERCISE. THIS IS NOT REAL. This way, Aunt Bessie won't be too concerned. We don't want to create a "War of the Worlds" scenario.

## USE THE WILDERNESS PROTOCOL

In the aftermath of a disaster, people aren't going to be on the air continuously. They'll be busy, plus they'll need to save battery power. So, how can you be relatively assured of finding someone on the air to pass your message (in radio terms, "your traffic"). Using what's known as the Wilderness Protocol, all stations are encouraged to be on the air at the top of each hour for 10 minutes at these times: 7 am, 10 am, 1 pm, 4 pm, 7pm, and 10 pm. If you can't make each one, that's okay. But do what you can to keep the network operational. Falcons are encouraged to be on the net at all these times.

Continued on next page.

At these appointed times, the net control station will ask for traffic:

- First, for emergency or priority traffic, e.g. Wilbur is having a stroke, my house on fire, a tree fell on Fred.
- Next, for health-and-welfare traffic, i.e. those messages sent to friends/loved ones out of the area.
- Finally, net control will ask for routine traffic, i.e. anything not included in the above categories.

When net control asks for traffic, say "This is YOUR NAME AND CALL SIGN, with traffic." Then, pass your traffic (i.e. your message) to net control. If you can't reach net control directly, pass your traffic to net control via a relay, if possible.

### Sample Script:

This is Net Control's Call Sign. I will be monitoring this channel until at least 10 minutes past the hour.

- Is there any emergency or priority traffic?
- Is there any health-and-welfare traffic?
- Is there any routine traffic?

After taking all traffic, net control will likely go off air, but may remain on the air if he or she is able. Moreover, net control may also be on the air for 10 minutes at the top of any hour in which he or she is able. At the very least, net control will be on the air at the times designated by the Wilderness Protocol.

## HOW TO EVALUATE THIS EXERCISE

The success of this exercise will depend on how many messages are successfully delivered. So, by all means, pass some traffic. Then, we can all better see the usefulness of all this radio stuff.

## FINAL COMMENTS

To some, while things are rocking along as normal, this fairly formal method of passing traffic may seem unnecessary and perhaps over the top. This is likely especially true with those not familiar with radio. Yet, in a disastrous situation, having some formal protocol for passing traffic makes good sense. Without some formal protocol, radio communications can devolve into something less effective than we'd like to have. Even if our radio communications are never needed in a disaster, we can and should take pride in being properly prepared for one.

# FCC Testing Information

**Daytona Beach Amateur Radio Assn (DBARA)**
- Monthly, third Monday, 5:30 PM, prior to meeting
- Lehman Building, Embry-Riddle Aeronautical University
- Registration Required
- Info: https://dbara.org/testing/

**Hog County Amateur Radio Association, Bushnell FL**
- First Saturday, 11:00 AM
- Cross Connection Church, 1451 West County Road 476, Bushnell, FL 33513
- Info: sumterVE@gmail.com

**Lake ARA, Leesburg FL**
- Monthly on the 3rd Saturday, prior to meeting. (Except December)
- 8:00 AM
- LARA Clubhouse (11146 Springdale Ave, Leesburg – off of CR 473)
- For more information and registration, contact: Dave Templeton N4NG, 386-804-2806 n4ng@icloud.com in advance of the meeting.

**Lake Monroe ARS FCC Testing, Sanford FL (LMARS)**
- Third Saturday of every month
- Seminole County Sheriff's Office, 100 Eslinger Way, 1st Floor, Sanford, FL
- Registration Required
- For more information and registration, contact Bob Cumming, W2BZY, 407-333-0690 or w2bzy@cfl.rr.com

**Milton Amateur Radio Club, Milton FL**
- Check date at miltonarc.org
- Walk-in
- Bagdad United Methodist Church
- Info: Chuck, N4QEP, merlinman3@yahoo.com

**Orlando Amateur Radio Club**
- First Wednesday
- 5:30 PM, Walk-ins allowed
- ARRL/VEC
- William Beardall Senior Center 800 S Delaney Ave Orlando FL 32801.
- Info: testing@OARC.org Robert Cumming, 407-333-0690

**Santa Rosa County FL ARES® Testing (Walk-in)**
- Information and dates can be found at srcares.org

**Testing information is subject to change. Check with the testing venue to confirm the testing session and requirements.**

**Seminole County**
- Every month on the third Saturday
- 9:15 AM
- Seminole County Sheriff's Office off SR 17-92, on 100 Eslinger Way in Sanford, FL
- Info: Bob Cumming, W2BZY, w2bzy@cfl.rr.com

**Silver Springs Radio Club, Ocala FL (SSRC)**
- Go to http://k4gso.us/class/ to signup for classes
- Go to http://k4gso.us/test-signup/ for testing. Testing is held on the 2nd Tuesday of odd months at 7 PM.
- Note http://k4gso.us/ncvec605/ is requested to be filled out before you show for testing. It is best to download the form and open it as a PDF so you can fill in the blanks.

**Suwannee ARC, Live Oak, FL**
- Last Saturday of the month
- Suwannee Regional Library
- Contact Gerald Guy, geraldlguy@gmail.com

**Tallahassee Amateur Radio Society (TARS)**
The Tallahassee Amateur Radio Society (TARS) has begun limited License testing. Please refer to the following for the updated testing dates and requirements for individuals wishing to take exams. https://www.k4tlh.org/getting-started/license-testing

**West Volusia Amateur Radio Society**
- Second Saturday of each odd numbered month
- 6:00 AM
- St. Johns Lodge #37, 2557 N. Spring Garden Ave, Deland FL
- Info: https://westvars.org/testing

**Gainesville Amateur Radio Society**
- 1st Saturday of even numbered months
- Tech day two weeks after testing
- https://gars.club/Testing.html

## Statewide Digital Radio Resources

**Did you know we have designated ARES® DSAR Reflectors & a DMR Talk group?**

- **DSTAR Reflector 046**
  - REF046A – Florida Statewide
  - REF046B – NFL ARES®
  - REF046C – NWS Mobile, AL SKYWARN
- **DMR Florida State ARES® TG 31127**

Feel free to link your local repeaters to help create a digital repeater network through the state!