

KD2OFD & WECA present

How to register for, install and use EchoLink

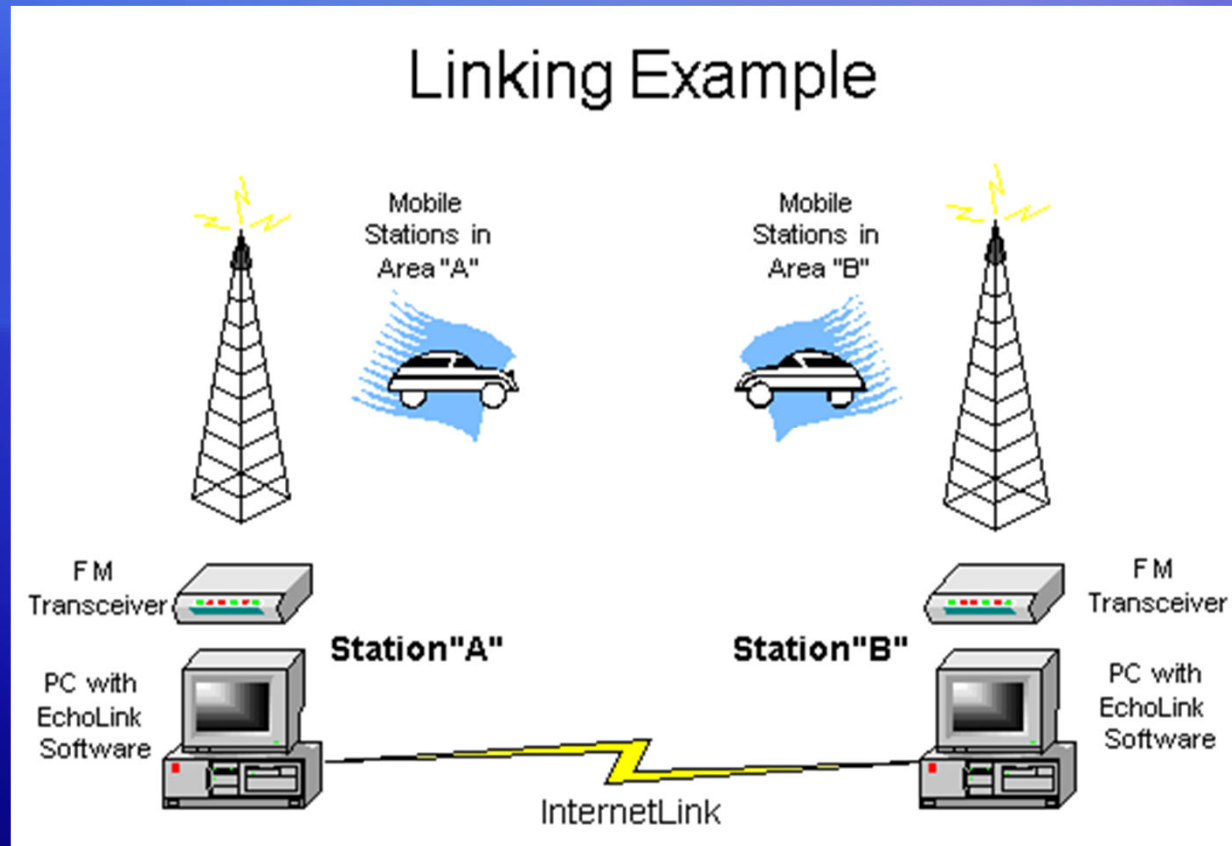
**Use your Smartphone/PC
to access analog repeaters**

What is EchoLink

EchoLink allows licensed Amateur Radio stations to connect to one another over the Internet. You can use EchoLink to connect your station (or your computer) over the Internet to other amateurs using the same software, and carry on a voice QSO. This greatly enhances the range and utility of mobile and portable VHF/UHF-FM stations, and also allows computer-equipped hams to access distant repeaters directly.

What is EchoLink

The website for EchoLink is <http://echolink.org/>



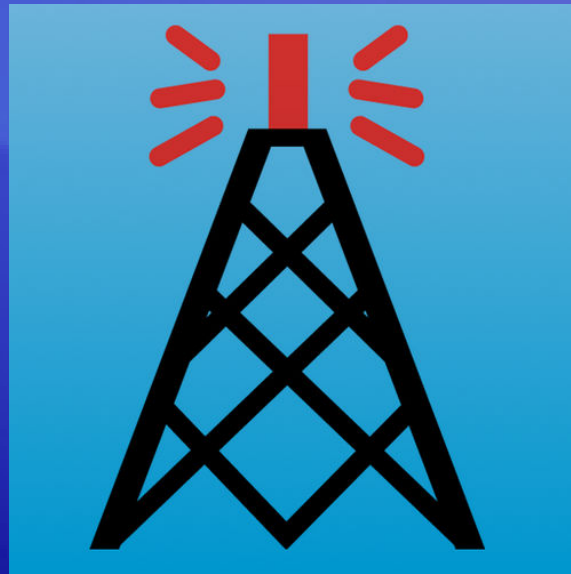
WECA EchoLink

The WECA 147.060 repeater is accessible by EchoLink.

WECA's EchoLink Node number is 825225 located at grid square FN31cb.

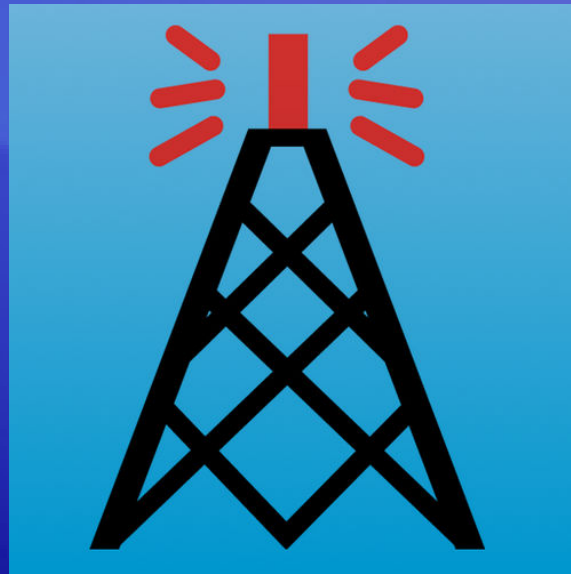
EchoLink App

In your smartphone go to Google Play Store or Apple App Store and download the EchoLink by Synergenics, LLC app.



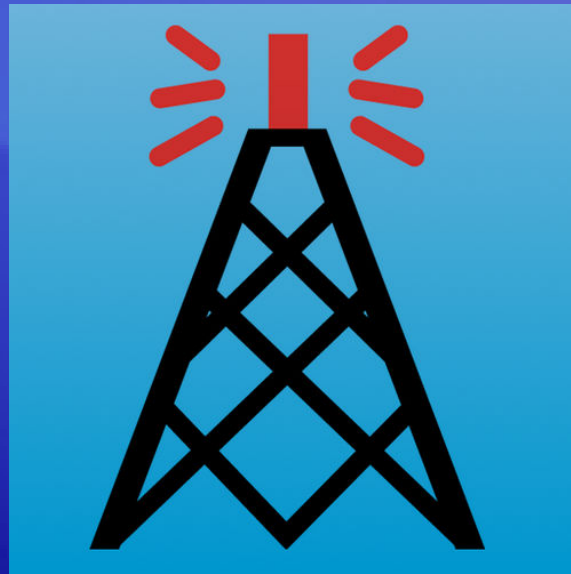
EchoLink App

Open the app, enter your call sign and tap OK.



EchoLink App

Enter your email address and enter a new password for your EchoLink account. Click on Register Callsign.



EchoLink Verification

To register for EchoLink, a valid FCC Amateur Radio license is required.

Proof of this is required in the form of an “Official Copy” of your license in .pdf, .jpg, .gif, .tif, or .png file format .

FCC ULS

In your smartphone search for “FCC ULS License Manager File Online.”

You should now be at
<https://www.fcc.gov/wireless/systems-utilities/universal-licensing-system>

FCC ULS

If you have forgotten your password, click on “Forgot your password-Contact Tech Support.”

Follow the instructions on the subsequent pages.

You will be prompted to provide the answer to your Personal Security Question.

FCC ULS

Step by step download instructions are available at <https://www.fcc.gov/how-obtain-official-authorizations-uls>.

Expand “Instructions for Downloading Official Authorizations in ULS,” or continue with the instructions in the presentation.

FCC ULS

At the “My Licenses” webpage, in the menu on the left side, click on “Download Electronic Authorizations.”

At “Download Authorizations” enter callsign and click “Search” next to “Callsign.”

FCC ULS

In the tile at bottom left, below “My Authorizations” click on dropdown, checkmark “HA-Callsign”, click OK. (HV- for vanity callsigns).

Between the tiles click “Add>.”

FCC ULS

In the tile at bottom right “Authorizations to Download”, click on dropdown, checkmark “HA-Callsign”, click OK.

At bottom center, click on “Download.” Official Copy of your FCC License should open. Note where this file is saved, you will need it soon.

EchoLink Validation

Go to <http://echolink.org/>.

In menu on left, click on “Validation.”

At “Validation” screen, enter callsign, click “Continue.”



Validation

EchoLink opens a world of new communications possibilities by joining Amateur Radio stations over the Internet. Since the Internet is a shared, public resource, security is naturally a very important part of the system.

Each new user of EchoLink must provide proof of license before access is granted. This is to ensure that only licensed Amateurs have access to the system, and to ensure that each user is using a valid callsign that he or she is authorized to use.

There are several different ways you can provide proof of license. These options vary somewhat by country. The various options will be explained on the pages that follow.

First, please be sure that you have downloaded, installed, and **run** the EchoLink software. This registers your callsign with the system. Then, please enter your callsign below, and click Continue.

Callsign:

KD2OFD 111219

EchoLink Validation

In “Validation - Choose Type”, select “FCC PDF Document (Preferred Method).”



Validation - Choose Type

Callsign: .
Country: **United States**

There are several different ways you can authenticate yourself for EchoLink, so that this callsign can be validated. Please choose *one* of the methods below for more information.

Please choose **one** of the validation methods below:

Password	Enter the EchoLink password for _____ which has already been validated.
FCC PDF Document (Preferred Method)	Download your PDF license document from the FCC Web site, and upload it online.
Credit Card	Match your credit card billing name and address with your FCC-registered mailing address. (There is a \$1.00 fee for this option.)

Smartphone Downloads/Files

In your smartphone, go to where you downloaded the “Official Copy” file of your FCC license.

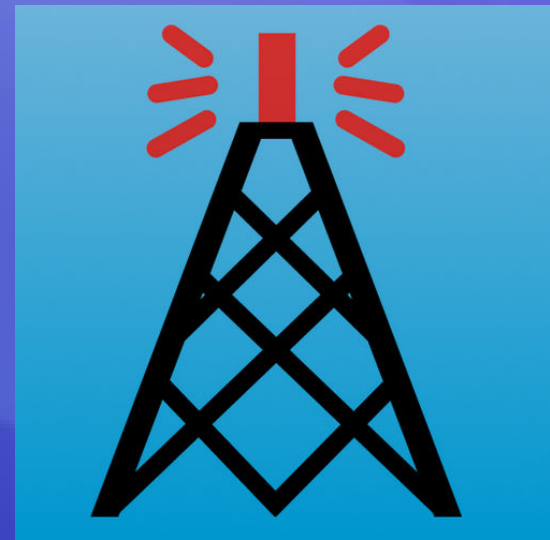
Highlight file and submit.

EchoLink will send you a validation email once they have processed your application.

EchoLink Operation

Now that you have an EchoLink number you are ready to operate.

Open the EchoLink app on your smartphone.

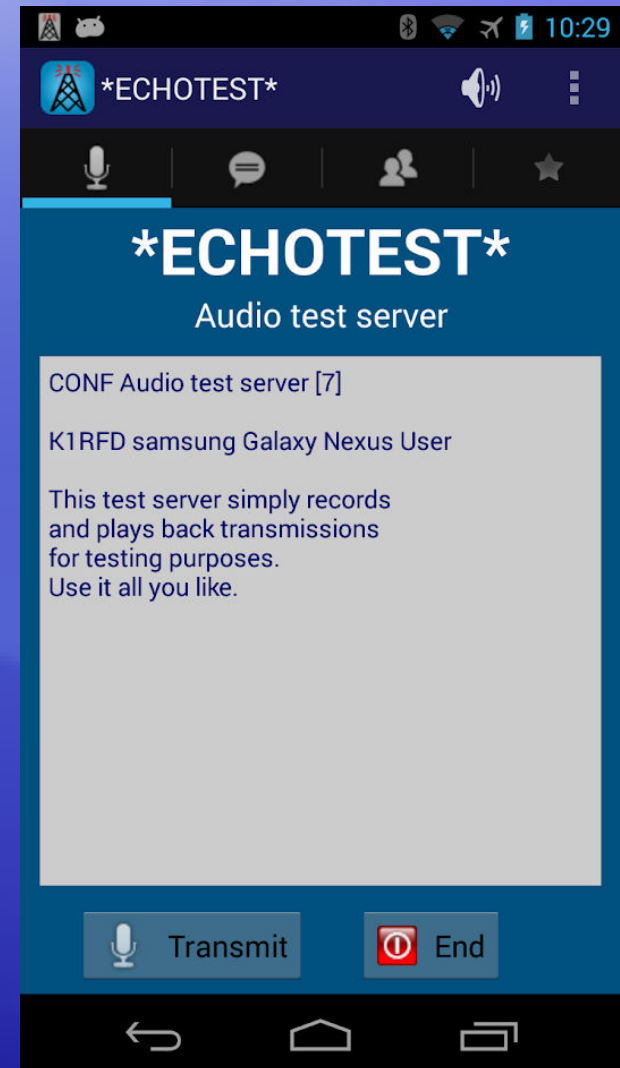


ECHOLINK

EchoLink Operation

In the black task bar, click on the contacts (two people) icon.

In “Stations”, click on “Echotest.”



EchoLink Operation

Click on “Connect.”

A recording will start. Once recording is finished click on “Transmit” at bottom of the screen. This will start a recording of your transmission. When finished press “End.” Your recording will be played back to allow you to hear how your audio sounds.

EchoLink Operation

If the audio does not sound acceptable click on the three dots icon (menu) at top right.

Click on “Settings.”

You may have to adjust Microphone Gain up or down. Other settings in the menu are available for customization.

EchoLink Operation

For repeater operation, “Network Connection” is recommended to be set to “Relay.”

After settings are acceptable, press your phone’s return button to return to EchoLink.

EchoLink Operation

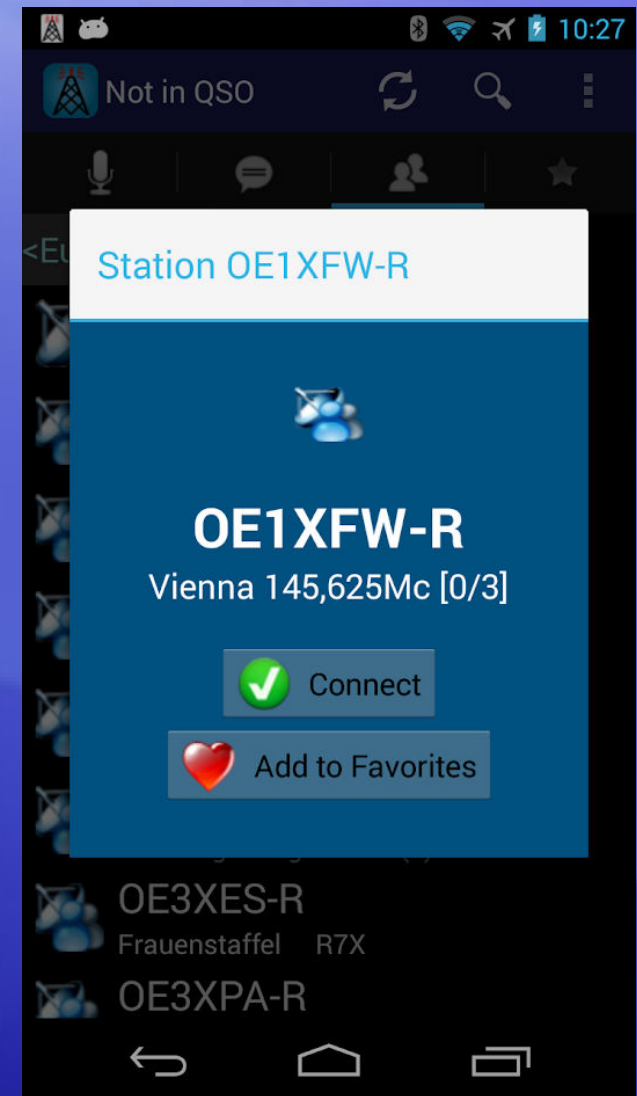
Now that you have the app working, the next step is to select a repeater to connect to.

Click on “Locations” then “North America” then “United States.”



EchoLink Operation

Click on “Area 2”, scroll toward bottom to WB2ZII-R, click on WB2ZII-R, or in blue task bar click “search” icon, enter “Valhalla” then enter. Search Results will display WB2ZII-R.



EchoLink Operation

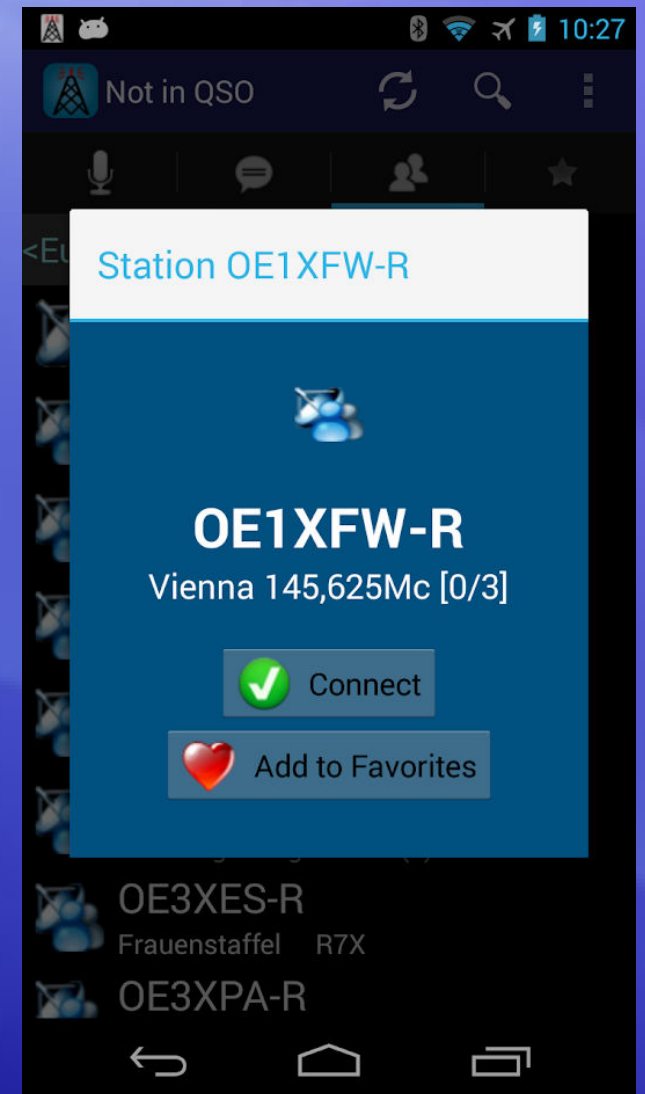
At Station WB2ZII-R, click on “Connect.”

You should now be connected to WB2ZII-R, with the screen showing:

Welcome to Allstar Node 45956

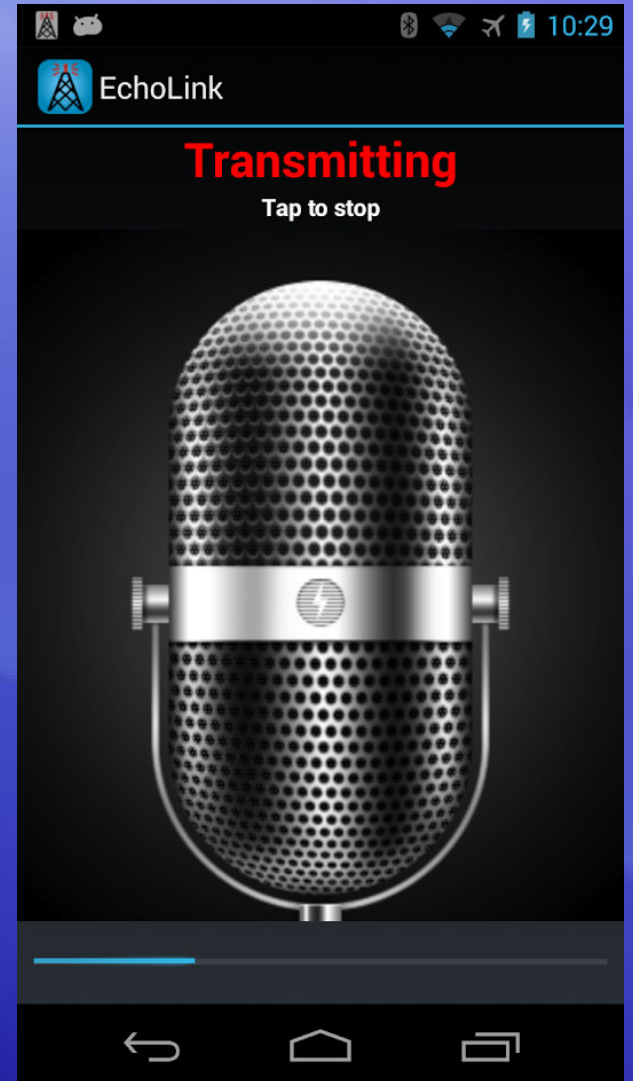
Echolink Node WB2ZII-R

Number 825225



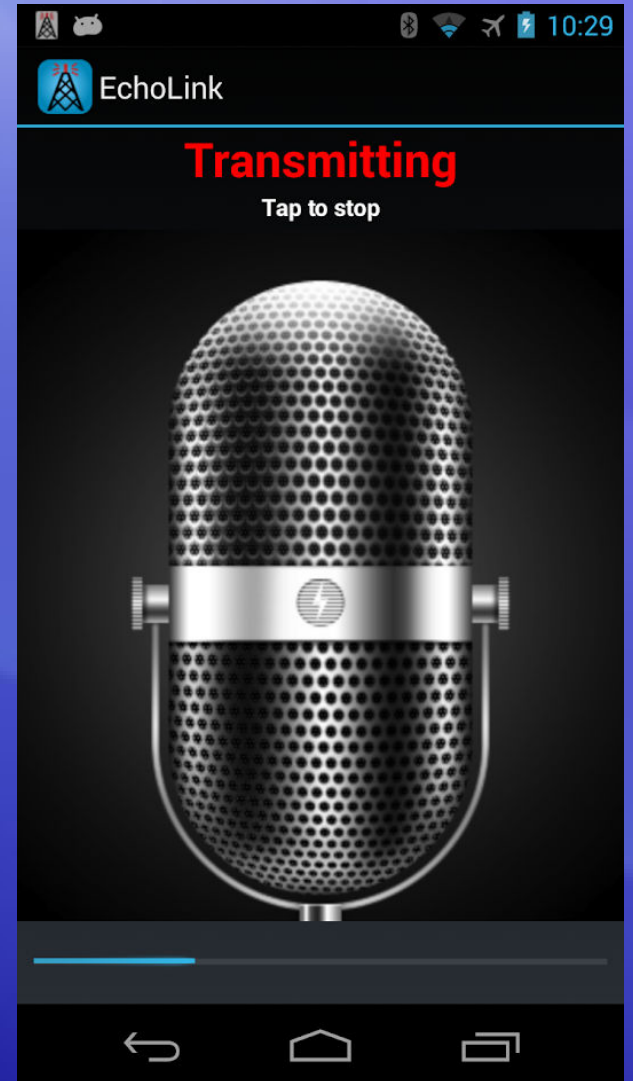
EchoLink Operation

At bottom right click
“Transmit.” Screen at right
will appear and you will now
be transmitting through the
WECA 147.060 repeater.
Tap on screen to stop
transmitting.



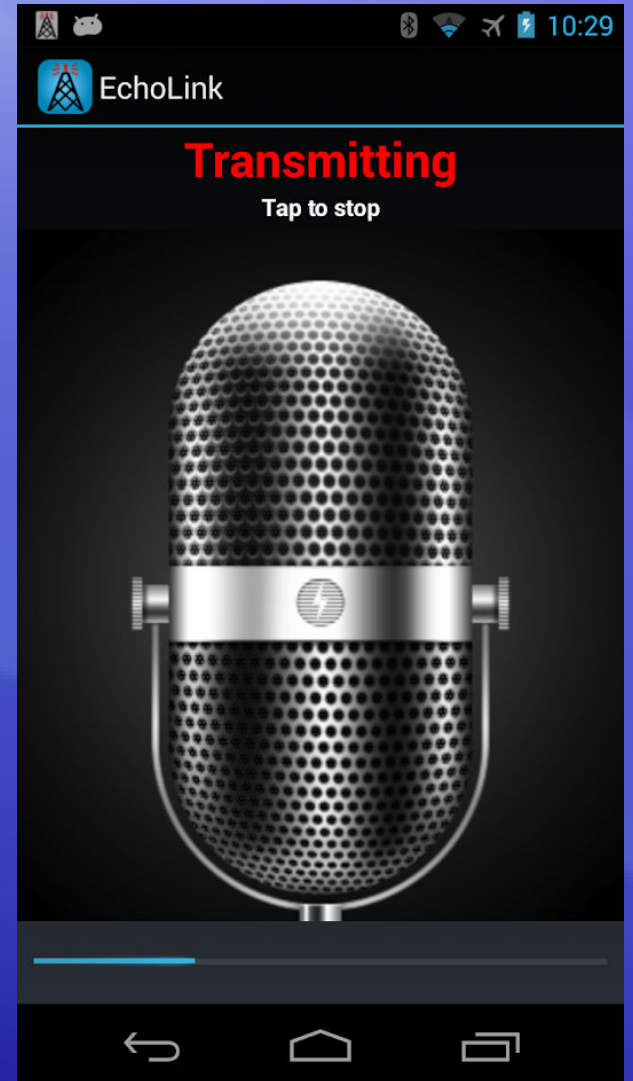
EchoLink Operation

To connect to a different repeater, click on “Contacts” icon, “Stations”, “Locations”, then select Continent, Country, Area, then Repeater.



EchoLink Operation

To exit out of EchoLink, click on your Smartphone's return icon. "Exit Application – Are you sure you want to exit EchoLink?" will appear, click "Yes" and you will have exited EchoLink.



Conclusion

EchoLink can be used as a supplement to Amateur Radio repeaters i.e. when you are out of range of the repeater you want to access, or you just want to explore other repeaters/areas.

Conclusion

I hope this presentation was informative, and if you have any questions/comments please contact me at KD20FD@WECA.org.

Steve Pendzuk / KD20FD