Winlink ARDOP

Winlink ARDOP is a method of sending "email" messages over HF radio via an RMS station (see the Winlink How-To for more info). It is very similar to Winmor, but the latter has been deprecated.

Every week, I connect to RMS stations in different locations and keep a log so I can track the most reliable ones. Here's the scenario I'm considering and how I'd use my log.

The Scenario

In the event of an emergency where the power and all communications go down, I want to be able to send my family back east a quick email to let them know that I'm ok, and offer the same service to others in my neighbourhood.

Radio Check

Every week, I connect to RMS stations in different locations without actually sending or receiving messages just to see how long the "handshake" takes and to see if I can connect at all.

I save the successful connections to my Winlink favourites for quick retrieval, but I also log them in a spreadsheet that I continuously analyze.

The Spreadsheet

The Winlink favourites list is an excellent tool, but it's hard to "rank" the best stations. To that end, I use a spreadsheet to log the following information in addition to the stations' information:

- The length of the session (the shorter the better).
- The date I last managed a connection (the most recent the better)
- The number of times I managed a connection (the bigger the better)

I then "rank" the distance (the further away the better since our local emergency might not affect them if they're further away), and the bearing (inland is better assuming we get an Earthquake and/or Tsunami). Based on all these different rankings, I created a semi-subjective "top 5" ranking of the stations. Those are the stations I would try to connect to first.

The purpose of this spreadsheet is to do the "thinking" ahead of time so that in a real emergency, I can just look at the ranking to select the best frequency.

Ardop, Vara, Pactor

There's essentially four different methods for sending Winlink messages on HF:

- **Pactor** is the fastest / most robust method but it requires a [$2100 external modem](#) to work.
- **Winmor** is [has been deprecated](#) and will probably be removed from later versions of Winlink. It has a maximum speed of 750 bps.
- **Ardop** is the method I use. It is an open protocol in active development and has a maximum speed of 1336 bps. See here for [an overview](#).
- **Vara** is a closed protocol. The demo version has a maximum speed of 175 bps and the full version ($70 USD) has a maximum speed of 7536 bps. See here for [more details.](#)