



WILDERNESS PROTOCOL

This could save your life!

(Or the life of another)


Murray Amateur Radio Club

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WILDERNESS PROTOCOL

- ▶ What is it?
 - ▶ History
 - ▶ How can it help me?
 - ▶ Thank you Steve, KG7GIT, for bringing this important topic up!
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WILDERNESS PROTOCOL

➤ What is it?

- The Wilderness Protocol is a dedicated effort to insure emergency communications help either in areas beyond normal repeater coverage, or in the event local repeaters are off-the-air and not reachable in an emergency situation.
- The purpose of this initiative is to offer stations outside or without repeater range capability an opportunity to be heard when needed the most!
- The Wilderness Protocol suggests that radio operators in the Amateur service monitor standard simplex channels at specific times in case of Emergency or priority calls.



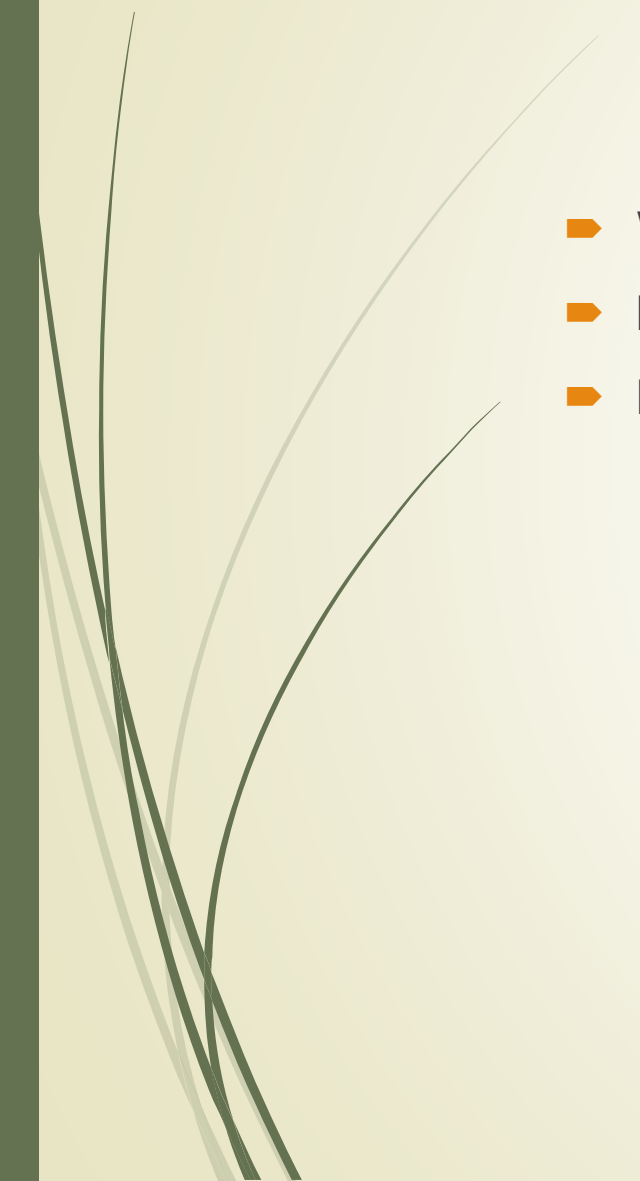
WILDERNESS PROTOCOL

➤ What is it?

- The primary frequency to monitor is **146.52 MHz**; secondarily or alternatively **52.525, 223.5, 446.0** and **1294.5 MHz** respectively.
- The idea is to allow communications between hams that are hiking or backpacking in uninhabited areas, or outside repeater range an alternative opportunity to be heard.
- NOTE- Though it's mainly used in the wilderness settings, it's NOT just for hikers, back packers, or similar situations....it is also available for ANYONE to use at ANYTIME assistance is needed.



WILDERNESS PROTOCOL

- ▶ What is it?
 - ▶ **History**
 - ▶ How can it help me?
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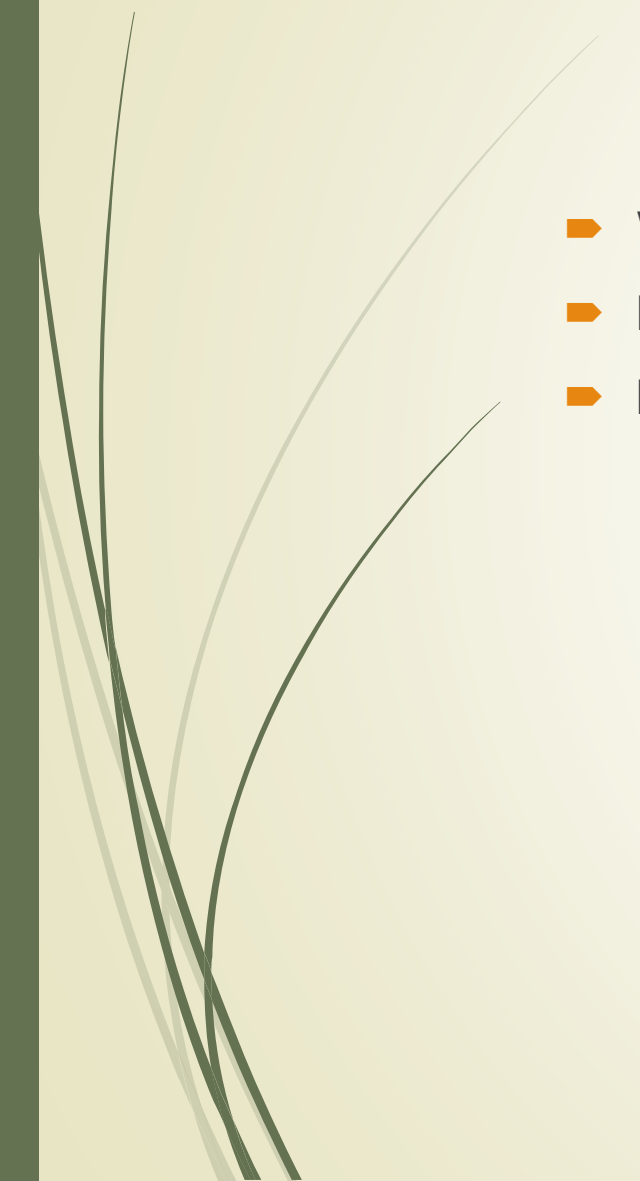
WILDERNESS PROTOCOL

▶ History

- ▶ The Wilderness Protocol first appeared in the QST article, A Wilderness VHF FM Protocol, February 1994 issue of QST, Page 99. Author: William Alsup, N6XMW
- ▶ It was later reprinted with additional content in the QST article, Mutual Assistance Procedures for VHF/UHF FM, 1996 issue of QST, Page 85. Author: Paul Newland, AD7I
- ▶ This article recommends that stations (fixed, portable or mobile) monitor the primary (and secondary, if possible) National Simplex Calling Frequencies **every 3 hours, starting at 7am local time for 5 minutes.**
- ▶ Additionally, stations that have sufficient power resources should monitor for five minutes starting at the top of every hour, or even continuously.



WILDERNESS PROTOCOL

- ▶ What is it?
 - ▶ History
 - ▶ **How can it help me?**
- 



WILDERNESS PROTOCOL

▶ How can it help me?

- ▶ An increasing number of hams who are serious explorers of the wilderness carry hand-held transceivers for potential emergency and safety communications.
- ▶ There are, however, two problems. First, without a customary protocol an HT radio is usually only useful when it's within range of a repeater, and repeaters are generally located outside of wilderness areas.
- ▶ Second, an HT's battery power is precious, and backcountry amateurs can't monitor continuously, much less monitor all possible frequencies for simplex or repeater operations.
- ▶ Using this protocol allows you to conserve battery juice and still contact help.
- ▶ This requires, however, others to be using the wilderness protocol as well.



WILDERNESS PROTOCOL

➤ What should we do as MARC?

- The Wilderness Protocol is a great idea, but there are some fundamental rules each one of us should follow.
- **Rule #1:** Don't ever rely solely on a radio or mobile phone to get you out of trouble in the backcountry. Your primary strategy must be self-sufficiency. Be prepared for the unexpected.
- **Rule #2:** Know what repeaters are available in the area where you will be visiting. You need to know the frequency, offset and CTCSS (or DCS) tone (if any). The VHF Society's web site has information that will help you here.
- **Rule #3:** In remote areas, monitor 146.520 MHz as much as possible. This applies to backcountry travelers, mobile stations and fixed stations.



WILDERNESS PROTOCOL

- ▶ **What should we do as MARC?**
 - ▶ Use the LONG TONE ZERO (abbreviated LiTZ).
 - ▶ Begin calls for assistance with about **3 to 10 seconds of TONE with the LiTZ signal.**
 - ▶ Do this by **keying up and holding down the zero key** to continuously transmit the zero DTMF tone (hence: LONG TONE ZERO).
 - ▶ Then proceed to make your emergency call. This should help those listening to recognize that an emergency or priority call is coming through.
 - ▶ Let's remind people of the protocol at our club meetings and on the Net. It's a good thing to know and be reminded about!



WILDERNESS PROTOCOL

➤ SUMMARY

- **Times:** 7am, 10am, 1pm, 4pm, 7pm
- The **primary frequency** to monitor is **146.520 MHz**; secondarily or alternatively **52.525, 223.500, 446.000** and **1294.500 MHz** respectively.
- Begin calls for assistance with about **3 to 10 seconds of TONE with the LiTZ signal using DTMF "0"**.
- Start by saying "**Break, Break, Break**", then "**This is <your call sign> and I need help**".
- Continue for **5 minutes**.
- **Conserve** battery after that.



WILDERNESS PROTOCOL

► Tips and Tricks

► **BEFORE LEAVING**

- Previous to heading out on your excursion, TELL SOMEONE where you will be and when to expect you back.
- Tell these people that you will be using the Wilderness Protocol.
- If you pass a Rangers Station, STOP and inform them where you will be and when to expect your return.

► **IN THE FIELD**

- ALREADY be prepared for the worse!
- Try to find a location which is at a higher altitude.
- Get your antenna up as high as possible.
- And NEVER NEVER NEVER say, “What’s the worst that could happen?”

