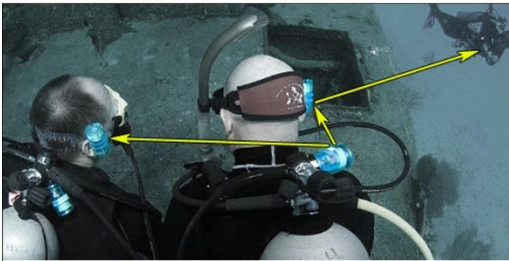


# APA - Diver Low Air Pressure Alert Operating Instructions



A NOAA SBIR Product



APA pressure transmitter unit signals to both you and your team member's alert unit. Mask mounted alert unit relays to buddies. Minimize obstructions for good signal path.



Do not twist housing. Tighten with wrench here.

Green status LED.

Point in a safe direction when pressurizing.

## Alert Unit Mounting

Optional fiber optic light stalk. Minimize flexing to prevent fiber breakage.

Use snorkel keeper. Mount alert unit close to ear for best audio signaling.



Your transmitter and your alert unit must have the same ID.

Other team members' units must have different IDs.



Activate Alert Unit: Press button until LED lights  
 Activate Transmitter: Apply more than 100psi  
 \*If the LED stays solid for 8 seconds, do not use!

## Use Recommendations

1. APA raises your air status awareness. Use to augment gauge checks, **not** replace them!
2. If it blinks or beeps fast sweeps, check your gauge. If you aren't low, another team member is.
3. Minimize obstructions of transmitter and alert unit for best signaling reliability. Neoprene, air bladders, tank & diver's body block telemetry signals.

## Air Status and Other Signals

Air status signals (tone sweeps & blinks) are roughly equivalent to the standard diver rope pull signals.

| Your Air Status                           | You will see & hear   | Other team members will see & hear                        | Equivalent Rope Pull Signal |
|---|---|---|-----------------------------|
| <b>OK (more than 750 PSI)</b>             | One rising pitch 'slow sweep' & <b>yellow</b> blink. 16 sec interval.             | Not reported  | 1 pull – "I'm OK"           |
| <b>CAUTION (600-750 PSI)</b>              | Three rising pitch 'fast sweeps' & <b>yellow</b> blinks. 8 sec interval.          | Three falling pitch 'fast sweeps' & <b>yellow</b> blinks. | 3 pulls – "Pull me In"      |
| <b>LOW (less than 600 PSI)</b>            | Four rising pitch 'fast sweeps' & <b>red</b> blinks. Continuous for five minutes. | Four falling pitch 'fast sweeps' & <b>red</b> blinks.     | 4 pulls – "Haul me up"      |
| Hailing signal (press button until start) | Confirming <b>yellow</b> blink & beep. Four repeats.                              | Two falling pitch 'slow sweeps' & <b>yellow</b> blinks.   | 2 pulls – "Give me slack"   |
| No air status received for 30 seconds     | Single 'buzz' & <b>yellow</b> blink. Check your gauge.                            |   |                             |

Transmitter LED signals: Rapid blinking – CAUTION or LOW air. One blink, 16 sec repeat – OK air.