Welcome
The Villages Safety Brief
April 2019

ELT ?

Euglobulin Lysis Time (blood test)

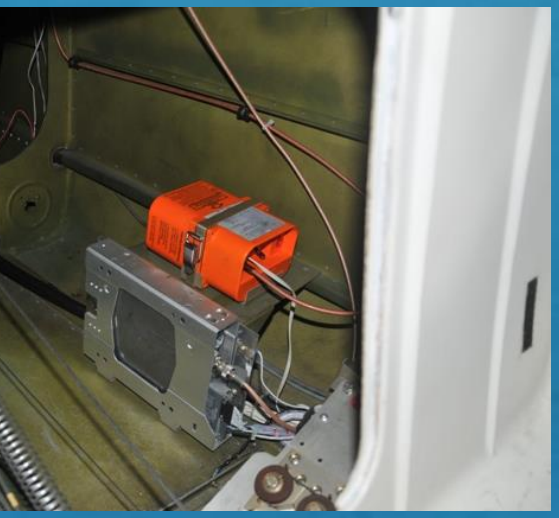
Evacuation Liaison Team (US

Emergency Locator Transmitter

(Ever Little Thing (The Beatles)

Egg, Lettuce, and Tomato

Emergency Locator Transmitter



Typical Installation in Cessna

ELTs are mounted aft in the airplane, and designed to be triggered upon impact or may be manually activated using the remote switch and control panel indicator in the cockpit.

Activation of the ELT triggers an audio alert, and 406-MHz ELTs transmit GPS position for search and rescue.

Plane that crashed late last month had outdated ELT that was turned off

By Kortnie Horazdovsky | Posted: Tue 4:56 PM, Jul 10, 2018

ANCHORAGE (KTUU) - A plane that crashed late this month, killing a pilot and his wife near Delta Junction, was equipped with an outdated emergency locator transmitter, but even so, the transmitter was turned off at the time of the crash.

NTSB investigators wrote in a preliminary report released Monday, that Arthur Ward's plane was outfitted with a legacy 121.5 Mhz ELT, a frequency that hasn't been monitored by search and rescue satellites since February of 2009. Installation of newer, digital 406 MHz ELTs is voluntary.

Investigators found that the switch for the outdated ELT was in the "off" position. When investigators turned the switch "on," a signal could be heard on the 121.5 MHz frequency.

Hale Boggs' (D-La.), **plane vanishes in Alaska: Oct. 16, 1972**
After 39 days, the search was called off with no sign of the wreckage or survivors. The accident prompted Congress to pass a law mandating the installation of emergency locator transmitters in all U.S. civil aircraft.

- Disappeared October 16, **1972**
- FAR 91.52, published on September 21, 1971, had an effective date of December 30, **1973** for existing aircraft to have an ELT
- NTSB could not determine if an ELT was on board.
- No emergency transmission signal was heard during the search.
- Neither the wreckage of the plane nor the pilot's and passengers' remains **were ever found**.
- ELTs are required to be installed in almost all U.S.-registered civil aircraft, including general aviation aircraft, as a result of a congressional mandate. This mandate was a resulted of the 1972 crash.

What happens when an ELT is activated?

Search and Rescue (SAR) personnel begin responding immediately to every activation of a beacon.

That response will only stop when it has been proven that the activation was real or a false alert.

Every false alert has the potential to put rescuers in harm's way and waste valuable resources.

ELT False Alerts

- ELTs cause over 8,000 false alerts each year. Most of these false alerts occur during testing and maintenance.
- False alerts create a problem for Search and Rescue (SAR) personnel, since they respond to every activation of an emergency beacon.
- SAR response will stop only when the activation has been proven a false alert.
- Pilots should make every effort to prevent or identify false alerts.
  - Pilots should conduct ELT self-tests and annual tests according to the manufacturer's instructions.
  - If the ELT is accidentally activated, cancel the false alert by calling the U.S. Air Force Rescue Coordination Center at 1-800-851-3051 or the nearest Federal Aviation Administration Air Traffic facility.

- ELTs are emergency transmitters that are carried aboard most general aviation aircraft in the U.S. In the event of an aircraft accident, these devices are designed to transmit a distress signal on 121.5 and 243.0 MHz frequencies, and for newer ELTs, on 406 MHz.

121.5 vs 406 MHz

These ELT's have experienced an activation rate of less than 25 percent in actual crashes and a 97 percent false-alarm rate.

121.5

This newest model activates 81-83 percent of the time and transmits a more accurate and a near-instantaneous emergency signal by utilizing digital technology. This digital 406 MHz ELT also allows search and rescue personnel to have vital information specific to you and your aircraft.

406 MHz

What can I do to help prevent false alerts?

- **Always** ensure you are conducting **self-tests** and **annual tests** according to the **manufacturer's instructions** for your ELT.
- Each year the majority of 406 MHz ELT false alerts occur during testing and maintenance.
- Test 121.5 ELT IAW AIM

In **2009**, the international COSPAS-SARSAT satellite system **discontinued** satellite-based monitoring of the 121.5/243 MHz frequencies, in part because of a high number of false signals attributed with these frequencies.

Satellite monitoring today utilizes the 406 MHz frequency only.

If you realize you have accidentally activated your 406 Mhz beacon, call the **US Air Force Rescue Coordination Center** at **1-800-851-3051** or your nearest FAA Air Traffic facility with your beacon's **hex ID** ready to cancel the false alert.

The Hex ID is a 15 hexadecimal character string (valid range: numbers 0 through 9 and letters A through F), referred to as the beacon 15 Hex Identification, or **15 Hex ID**.

Your beacon's 15 character Hex ID **uniquely** identifies your 406 MHz beacon and is encoded in the message your beacon transmits to search and rescue services if your beacon is activated.

When your beacon is activated satellites will detect the transmission and relay the distress alert to search and rescue services.

The Hex ID contains the country code and other identification features relative to the carrier which are dependent upon the coding protocol used.

The Hex ID can identify the carrier using the radio call sign, a serial number, aircraft registration marking, etc.

What is a Hex ID, and where can I find mine?

You should find your beacon's Hex ID on a label affixed to the beacon or in the beacon documentation provided by your beacon manufacturer. If you have difficulty locating your beacon Hex ID, contact your beacon manufacturer.

ELT REQUIREMENTS AND TESTING

ELT must be inspected every 12 months.

Battery must be replaced after one hour of continuous use, or after reaching 50 percent of its useful life.

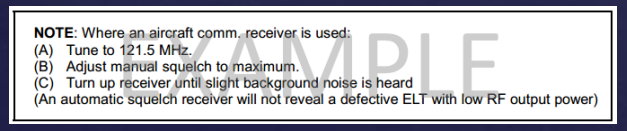
Expiration date for replacing (or recharging) the battery must be legibly marked on the outside of the transmitter.

Testing of an analog 121.5 ELT can only be done within the first **five minutes after** the hour, and you may transmit **no more than three** audible sweeps.

Tune 121.5 and listen.

Digital 406 ELTs should only be tested in accordance with the manufacturer's instructions.

Airborne tests are **not authorized** for any ELT.



§91.207 Emergency locator transmitters.
AIM: 6-2-4

ELT SIGNAL AT KLEE

Last month, the Leesburg Airport Manager received a call from the FAA notifying her that an ELT signal has been identified as emanating from the airport area

The manager was also notified by the fire department about the signal.

The local police department was contacted the Air Force SAR about the signal.

The Civil Air Patrol had a plane fly from Clearwater to KLEE to investigate the signal.

The signal was a false alarm.

WINGS SEMINARS

Date	Title and Description	Location
4/15/2019 19:00 EST SO1591389	IMC Club Meeting - Loss of Control **An Airplane Crashed. Reason: ' I just looked away...** LOC ACCIDENTS: Loss Of Control is 'still ' the number one cause of General Aviation accidents.	Sanford, FL
4/16/2019 19:00 EDT SO1591530	Angle of Attack Awareness **Use of Angle of Attack to prevent Loss of Control...** The General Aviation Steering Committee (GAJSC) work group contends that a lack of awareness with respect to	Maitland, FL 39 seats remaining
4/20/2019 11:00 EDT SO3589297	The Electronic Flight Bag at NOAA **How NOAA Uses ForeFlight in Their Operations. An...** NOAA uses ForeFlight, just as many of us do! Learn from their tips and techniques! This is an interactive	Plant City, FL 21 seats remaining
4/30/2019 19:00 EDT SO1591527	Emergency Upset Recovery **Upset Recovery and Loss of Control Accidents** Mr. Tim Plunkett a long time airline captain, aerobatic instructor, airshow performer and test pilot will...	Daytona Beach, FL

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PLAY SAFE