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ALERT Man-Overboard Alarm System™

MSLD, EPIRBs, Personal Locator Beacons are all search terms that define a device to alert of a person unintentionally in the water. Regardless of the term, our product is the most proven and defined Fall Overboard Alerting Product on the market.

The Facts...

The greatest risk of a maritime fatality is an unintentional fall in the water without a Personal Flotation Device (PFD). The second greatest risk is when no one knows of the fall overboard. A recent *IMS Maritime* report states "the importance of quick response times in fall-overboard accidents. For a vessel moving at just 6 knots, a person will drift 30 meters away in 10 seconds, 180 meters in one minute, and a kilometer away in five minutes." The ALERT Man-Overboard Alarm System™ is a distress alerting system that can help in preventing a fatality by alerting the crew within seconds that a fall overboard has occurred. Those precious seconds can save a life because a visual of the MOB means a rescue can begin immediately.

Why ALERT...

The ALERT Man-Overboard Alarm System™ is exclusively a man-overboard distress alerting system, protecting mariners for over 20 years before names of these types of products were known. The simple, yet effective proprietary technology allows an automatic activation of an alert transmission to the receiver on the boat. The receiver will sound off an alarm and can also be wired to engage other warning/safety measures such as:

- kill the boat's engine
- sound a louder external alarm
- mark a waypoint on the boat's chartplotter system
- send a message via an external communication system
- the transmitter's continuous transmission is capable of being received by direction finder

The main point to understand is that when the fall-overboard person is coming up for their first breath of fresh air, the boat is already alerted to the incident. A rescue operation can be launched within seconds, which will improve the chance of successful rescue by spotting the person and getting them back on-board in the quickest possible time. In addition to the local rescue attributes of our alerting system, it keeps the incident at a local level unless the rescuers need assistance beyond their resources.

Other Locator Beacon solutions...

There are about a dozen products on the market that are identified as fall-overboard locator beacon products. Two commonly used terms now used to market these devices are "Maritime Survivor Locating Devices (MSLD)" and a more recently introduced term,

“Personal Man Overboard Beacons”. They are generally placed in five different categories:

1. Automatic Identification Systems (AIS)
2. VHF DSC frequency 156.525 (Channel 70)
3. 121.5 MHz distress channel
4. Emergency Position Indicating Radio Beacon (EPIRBs) transmitting to the Cospas-Sarsat Satellite
5. Proximity transmission

When writing about MOB locator beacons in the **MSLD Standard** document (Report ITU-R M.2285-0), the International Telecommunications Union stated, “should provide rapid and sufficient information to a responsible person on board a parent vessel to enable a decision to be quickly reached as to whether external assistance is required or whether on-board assistance is adequate to deal with the situation. In some cases, the responsible person on board may decide to transmit an urgent message (i.e. with urgency priority). The decision then to escalate this to a distress priority level rests with the responsible person on board.” Interestingly, the same report specifically states, “The overriding concern is to ensure that the use of distress and safety frequencies by man overboard devices should not compromise the integrity of GMDSS and aeronautical distress and safety systems.” So the vessel operator is faced with the dilemma of equipping the vessel with proper alerting product but not to the level where it would interfere with the Global Maritime Distress and Safety System (GMDSS) unless absolutely necessary. The ALERT System perfectly supports this scenario. Quick, local alert which can be elevated to a wider rescue operation if deemed appropriate. The ALERT products are not labeled as MSLD devices because the rules established in 2016 were designed by the AIS product industry to focus on their specific product lines.

In its 2012 report the **International Maritime Organization (IMO)** states, “AIS products are meant to be a ship locating device and do not offer any type of instant alert effectiveness due to the 406Mhz frequency requiring manual activation. Furthermore it states, “Locating devices which use AIS technology should not be used for distress alerting and should not be used for routine location.”

In the same report the IMO states, “No satellite detection of the 121.5 MHz signal to assist with position information” Furthermore the reports states, “Inadvertent activations, in coastal waters particularly, is likely to add to the already high rate of false alerts detected by overflying aircraft on the emergency channel.”

As mentioned above, an EPIRB's effectiveness is for a rescue from an “abandon ship” situation. A person who has fallen overboard, even if equipped with a personal EPIRB, will be unable to alert the boat or rescue authorities automatically or quickly. When discussing the response time of a transmission to the Cospas-Sarsat Satellite in a fall-overboard situation, US Coast Guard Admiral Timothy Sullivan Ret. has stated, “Believing that a fall-overboard when detected by an EPIRB device and a search and rescue operation launched by US Coast Guard or other rescue authority provides a false sense of security when figuring in the time and distance needed to be transversed to find the fall-overboard victim. By the time the person is found, if they are found, they may have died from drowning or hypothermia.”

The recently introduced "Personal Man Overboard Beacons" is nothing more than a search term generated by AIS manufacturers to further isolate their search results on web search sites for Man Overboard alerting solutions. The Personal Man Overboard Beacon is not a specific product but by definition the same dozens of products that perform an alerting function of someone who has fallen involuntarily into water.

Simplicity is key...

In a panic situation you need simple effective direction in saving a life. The ALERT Receiver in its most simplistic form will sound an alarm to alert the crew. The ALERT system does not require registration or reading of a lengthy operations manual to understand its function. The ALERT Receiver can be connected to other devices to extend the alerting of crew and other parties. The staff of Emerald Marine Products can offer guidance in these areas.

In conclusion...

No one product offers the total alert solution that mariners would love to have for a guaranteed alert and rescue situation. However, it has been proven by the amount of fall-overboard instances that have had successful rescue outcomes, that a quick response by local vessels is the best way to save a life. ALERT Man-Overboard Alarm System™, because of its proprietary and dedicated solution technology, offers the best cost-effective, durable and proven solution to protecting your crew in a potential fall-overboard situation.

For more information about our products and how they compare to other Personal Man Overboard Beacons, contact Emerald Marine Products via email info@emeraldmarineproducts.com or call, 800-426-4201.