

Are Immersion Suits Enough?

by Richard Hiscock

In the last issue of Marine Safety Update I discussed immersion suit and PFD terminology. This issue will address a far more important topic: are immersion suits the only flotation devices you should carry on your vessel?

Thanks to efforts of NIOSH and a number of manufacturers there is an evolving array of very wearable PFDs that can be used as an alternative to an immersion suit in some emergency situations, and that make it possible to work comfortably on deck in most any situation.

Vessels that carry immersion suits for each person on board (whether required to or not) are not required to be equipped with any other Personal Flotation Devices (PFDs). This provision in the regulations goes back to 1984, pre-dating the Fishing Vessel Safety regulations published in 1991. It is – in my opinion – of dubious merit.

Most safety professionals, including Coast Guard Search and Rescue specialists, strongly recommend that all vessels be equipped with PFDs in addition to immersion suits.

There are many reasons why the well-equipped vessel should have PFDs as well as immersion suits on board. First, whenever the Coast Guard responds to requests for assistance they will ask that personnel on board don life jackets. If all you have on board are

immersion suits, this may mean a long, hot, uncomfortable wait for assistance.

Second, when the Coast Guard tows a vessel, personnel handling the towing bridles and hawsers are asked to put on PFDs. This is a sensible precaution; working on a slippery foredeck can be hazardous at best. While an immersion suit will provide increased protection should a fall overboard occur, wearing an immersion suit while handling towing bridles, shackles, and towing hawsers could prove hazardous in itself.

There are other cases when wearing an immersion suit may actually interfere with activities necessary to save the vessel. Some examples include: going aloft to make repairs to rigging or tackle; transferring fish; operating small boats; making emergency repairs; carrying out damage control or dewatering procedures; or, fighting a fire. In these and other cases – such as a medical evacuation of an injured or ill crewperson – an immersion suit is not the PFD of choice.

Immersion suits are designed for the abandon ship situation, and while they are theoretically designed to permit functions such as holding a pencil or operating a radio, they are extremely awkward to work in. If all efforts to save your vessel have failed, it is time to don your immersion suit and abandon the

vessel - to the liferaft, we hope.

Because there are many situations where an immersion suit is not the appropriate device, it is recommended that all vessels be equipped with PFDs for all persons on board. An exception might be a vessel with a large crew – such a fish processor – many of whom will not be involved in deck operations.

The prudent mariner should equip his vessel with both immersion suits and appropriate PFDs, including exposure coveralls, in order to provide for maximum crew safety and comfort. If you still have PFDs on board, keep them on board. If you took them home, bring them back. If you don't have any PFDs there are a number of very wearable models available to choose from.

All PFDs (and immersion suits) should be equipped with a Coast Guard Approved PFD light that works – preferably a strobe light. For those times when it is necessary to work aloft or on the foredeck it is recommend that vessels be equipped with exposure coveralls (Type V PFD) for personnel working in hazardous areas.

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