

Vesper Marine Guardian Solution to Protect Submarine Cable System in Thailand



Vesper Marine, a leading manufacturer of innovative marine safety products, has announced that Provincial Electrical Authority (PEA), the major power distribution company in Thailand, is trialling Guardian:protect to monitor the 22kV submarine cable system from Sriracha to Koh Si Chang. Guardian:protect is a 24/7 asset protection system that prevents accidental vessel damage to subsea cables, pipelines and marine assets. Using an automatic identification system (AIS), it gives vessels visibility of the protected marine assets via virtual buoys displayed on their electronic navigation systems.

The solution monitors realtime vessel movements, evaluates their behavior to determine if they present a risk to the assets and proactively sends both the target vessel and the asset owner an alert if an incident might occur. The alert goes directly to the vessel's electronic navigation system, so the crew can immediately take corrective action.

Anchor strikes

The 9km cable system from Sriracha to Koh Si Chang has been impacted by three subsea cable incidents in recent years. Although marine traffic was monitored by AIS base stations, they could not determine whether a vessel presented a risk and had no mechanism to instantly contact the vessel, alerting them of the potential danger.

"The situation that PEA is confronted with is not new to Vesper Marine," said Jeff Robbins, CEO Vesper Marine. "Guardian:protect is currently being used by New York Power Authority (NYPA) to protect subsea power cables in Long Island Sound between Connecticut and New York. NYPA commissioned us to develop a solution in early 2016 after two anchor strikes cost the organisation tens of millions of dollars to repair. Guardian helps NYPA, North America's largest government power authority, protect the environment and their critical infrastructure from damage."

Virtual buoys

The PEA trial will create virtual buoys across the full length of the subsea power cables that will be seen on vessels' navigation displays making ship operators aware of the cables. Vessel location, direction, speed and other information will be continuously monitored and recorded by a Guardian Virtual AIS Station and automatically analysed with customised rules to determine if they present an anchoring risk. If a vessel appears to be anchoring within the cable zone, an alert is automatically sent to the PEA team, while a special AIS text message will be transmitted directly to the vessel's navigation system.

"We are honoured to be part of this trial of new technology with PEA," said Joe Tan Chong Hoe, Sales Manager, A. & Marine (Thai) Co., Ltd, who will manage the local installation and configuration of the Guardian solution. "Vesper Marine has solutions protecting marine assets from accidental vessel damage in many countries. We are confident this trial will be a success."

"The Guardian solution should address multiple challenges in protecting these essential power cables by removing any delay communicating to vessels posing a risk," commented Nongluck Suwanjumrat, Director, Electrical Maintenance Division, PEA. "This is critical to ensure we continuously supply power to businesses and people, and improve the safety of vessels and personnel in the area."

For more information on the Guardian:protect, Vesper Marine or its entire product line, visit www.vespermarine.com.

