



AN ALL IN ONE PLUG AND PLAY ROV DEPLOYMENT SOLUTION

WT Industries – based in Houston Texas – have developed a radically new patented deployment system for use in both offshore and inshore ROV markets.

The entire industry has had to adapt in order to find cost effective solutions in this very challenging marketplace. With this in mind, CEO Doug Trail has developed a self contained and complete single lift, compact ROV deployment system. The Contain-A-LARS is a 20ft container that houses an umbilical winch, 10ft x 7ft controls cabin, extendable launch frame, ROV, and Pass Through TMS (PT-TMS). The umbilical is deployed directly to ROV through the PT-TMS, via a patented constant tension system. This gives the ROV the reliability of a free flying vehicle, but with all the functionality of a TMS. A camera, tilt, and lights are mounted within the TMS, to monitor all umbilical operations. The ROV excursion is now limited only to the amount of umbilical on the main winch, not what the traditional TMS drum can hold. Independent deployment cables to the PT-TMS, suspend the PT-TMS from the extendable launch frame. As the PT-TMS is lowered, the winch pays out the umbilical as required automatically. When the PT-TMS is at the required depth, the PT-TMS simply passes the umbilical to the ROV for operations.

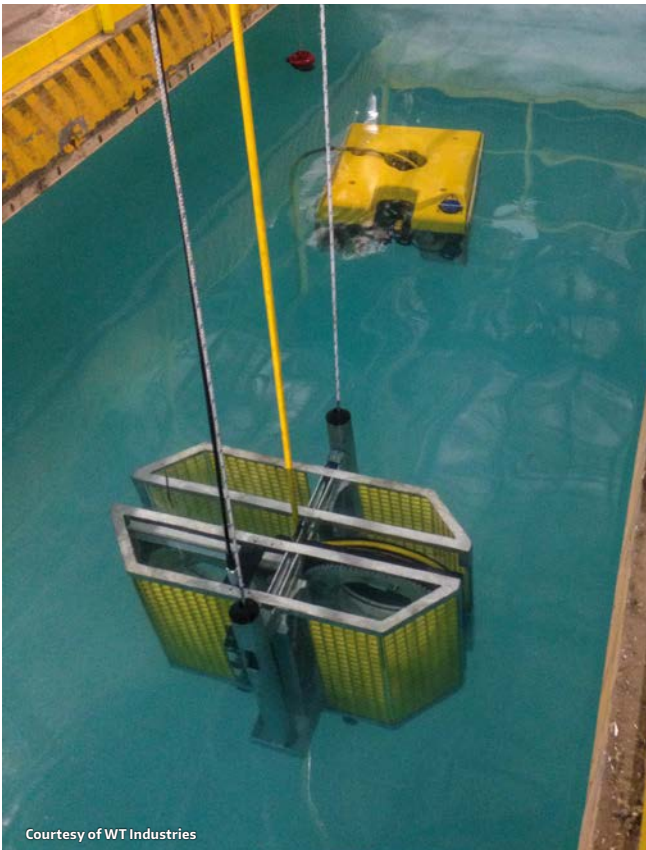
The use of the patented PT-TMS makes the use of an expensive main lift umbilical redundant. The elimination of the armored lift umbilical not only reduces the overall weight of the system and associated equipment, but makes LARS required SWL capacity minimal and independent of depth. With previous deepwater LARS systems, the weight in water of fully armored umbilical and TMS exceeded the in air weight of ROV and TMS, and thus required LARS structure have larger SWL capacities making everything progressively bigger and heavier.



Courtesy of WT Industries



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The plug and play Contain-a-LARS system reduces all major ROV operations cost drivers such as mobilization, personnel, and downtime.

The current Observation Class Contain-a-LARS complete unit weighs less than 10 tonnes, which is a single non permit truck to dock, single pick mobilization onto the vessel. Comparable systems require a separate truck for a controls van and second truck for LARS, which could also need permits due to being oversized. Being gravity based, it makes installation on offshore installations simple; on vessels the unit can be sea-fastened using standard twistlocks.

The elimination of the traditional TMS rotary slings has resulted in increased reliability; the system has fewer connections and becomes more simplified. Any tether retermination required can be completed very efficiently, especially compared to a garage-style TMS where it could take up to a whole 12 hour shift offshore.

With a traditional LARS it takes at least two people to launch and recover the ROV. One has to man the winch and the other has to stabilize the ROV / TMS while landing. The Contain-a-LARS launch frame incorporates alignment receptacles to stabilize the launch and recovery of the ROV which can easily be done with only one person.

The Contain-a-LARS system is also all electric eliminating the possibility of oil discharges. It's also very energy efficient with the largest motor being only 5 HP compared to typical minimum 25 HP HPU for a typical hydraulic A-Frame LARS.



To put the theory in practice, Doug Trail has built a prototype working model of the Contain-a-LARS system for electric observation class ROV's, housed within the high cube 20'x8' container. The system currently has a refurbished Apache ROV installed, but it is pretty universal and capable of accepting any free swimming ROV up to the size of a Saab Sea-eye Cougar. This innovative system is currently on offshore trials in the Gulf of Mexico. Soon it will be available for lease to any interested ROV operator keen on reducing their cost base with the reduction of weight, footprint and potentially vessel size when performing observation and inspection work in these difficult market conditions.

The North Sea Market is currently seeking to go to platform based vs. vessel based inspections and the new Contain-a-LARS is ideally suited for this. WT Industries is in latter stages of putting together an agreement to manufacture the Contain-a-LARS system with a prominent UK LARS manufacturer to full DNV or Lloyds certification to address this much safer and economical way to perform inspections.