





ERC – Emergency Release Couplers for Marine and Land Loading Arms

Emergency Release Couplers are integral components of most loading systems. Through the self-monitoring system of the loader, looming emergency situations caused by a tanker drifting off are quickly detected. Consequently, the coupling will automatically be released.

Therefore, SVT Emergency Release Couplers provide efficient protection of the personnel, the environment, and the terminal loading system. It is our investment in safety.



SVT Emergency Release Couplings can function at temperatures ranging from –196°C to 250°C. Different heavy-duty materials used in the couplers allow them to adjust to different kinds of substances to be transported, be it a toxic, an aggressive, or an explosive liquid or gas. With the help of lining and/or heating, SVT Emergency Release Couplers can handle the most critical substances.

SVT Emergency Release Couplers are vacuumproof and also suitable for high-pressure services.



The SVT Emergency Release Coupler consists of two ball valves and a removable clamp that holds the valves tightly together. The ball valves provide the desirable full flow with minimum characteristics of pressure loss.

Moreover, due to the special construction of the ball valves, the spill volume during separation can be minimized.



Depending on the special conditions during loading, the upper ball valve can be separately closed (optional). The closing time can be preset. Because of its unique construction, the function of the SVT Emergency Release Coupler remains independent of the closing of the upper ball valve.





FRC EMERGENCY RELEASE COUPLERS FOR MARINE AND LAND LOADING ARMS





In contrast to other systems, the SVT Emergency Release Coupler needs only one single hydraulic cylinder.

Thanks to the special geometric design, when activated, the ball valves first fully close, and then the clamp releases.

This mechanical interlock system ensures complete closure of the ball valves before the clamp is released, i.e. disconnection of the coupler.

The probability of failure is thus minimized, ensuring the highest possible availability of the safety device. All SVT Emergency Release Couplers comply with international safety integrity levels (SIL).



SVT Emergency Release Couplers are equipped with special testing clamps with which the complete safety circuit can be tested without actually disconnecting it. The need for connecting to a vessel/test flange can be omitted.

The components of the coupling system can easily be reassembled in a few minutes after releasing.



SVT Emergency Release Couplers are available in nominal pipe sizes ranging from 4" to 20". They are certified according to international standards.



Weight reduction is of critical importance for vapour return lines as well as for truck and railcar tankers.

In these cases, a different construction is usually employed. If, during product transfer, the loading arm approaches unsafe operating limits, the clamps on both ends of the pipe immediately close due to the elastic resilience of a spring.

These SVT Emergency Release Couplers also achieve minimal pressure loss and minimal spill volume at full bore. Operation can be hydraulic or mechanic. Reassembly after disconnection is simple and fast.

The light-weight SVT Emergency Release Couplers are available in nominal pipe sizes ranging from 2" to 10". They can also operate at temperatures ranging from -196°C to +250°C. And, of course, different materials - no matter whether they are toxic, aggressive, or explosive can be transferred.









