The dynamics created by a mix of traditional and new operational environments, together with worldwide economic restraints, sets new conditions and requirements for operational performance. Because of this, many countries are developing single units that are capable of executing all types of mission in a combined and joint environment whether at home or overseas. The requirements for interoperability, availability and modularity have a great impact on operational capability design.

Anticipate tomorrow - prepare for the unknown
At Saab, we believe in supporting forces and units with simulation and training expertise throughout the training life cycle.

We act as a Total Training Provider by translating the operational requirement into training objectives that are measured in terms of performance and effectiveness. We know it is important to continuously visualize operational capability according to the training objectives.

Training
Training must deliver strength and depth to operations in order to deliver readiness for ongoing and future missions. For a several of years now, Saab has undergone a period of transformation towards developing a total training concept aimed at achieving mission success. The input to this transformation comes from areas such as embedded training in operational systems as well as managing multi-year training service contracts. The most important focus for Saab is to deliver training value and not let the customers get lost among the technology.

“How to make sure that the most important focus, the training value, isn’t lost among all the technology”
We use the system life cycle stages in order to get a perspective of our role as a Total Training Provider, where the System of Interest (SOI) is a complex system of systems, i.e. a unit or a vessel. As a Total Training Provider, we know what stages in the life cycle we can support and how to enhance traceability and manage changes within it.

In order to describe the training of the SOI and the relationship between different training phases, training objectives and requirements, we use a model-based approach combined with a generic training model of our own design. This makes it possible to analyse the performance and effectiveness of entire systems (unit/vessel/platform) based on the subsystems and display the current capability in real time, enabling a more dynamic decision making process about what to train in the next step – “train the right things at the right time”.

**Life cycle stages ISO/IEC 15288**
To deliver full training value throughout all training systems in a solution, they must be operating coherently and in a controlled manner. This means that all systems should have well-defined initial data related to the actual training scenario. The systems should also be launched in a controlled manner. At the same time, the exercise director should have full control to dynamically select what systems should be allocated to the various parallel exercises.

Our solution for integrated training environments has the functionality to provide full control.

Within the integrated training environment there are applications for creating and managing joint games for the naval domain. There is a set of synthetic environments and models as well as the possibility for 3rd party users to upgrade the environment and models with other parameters or behaviours and replace them with other implementations.

The integrated training environment has tools for connecting training systems so they can participate in different exercises depending on the identified training need. It is also possible to connect to external systems and allow them to join the exercise. The exercise director receives real time views of the current status of the exercise and has the ability to change the level of the exercise to ensure that it achieves its objectives.
Saab has a set of applications for training the different roles in the Combat Management System, both embedded or standalone in a land based facility. This system and other training applications may be combined in different combinations using the integrated training environment and managed by the joint game management applications.

**Ship Protection Training** offers full Live training capability with weapon and RIB instrumentation. It may also be combined with virtual or constructive solutions for full-scale training.

**C4 Training** offers training in command & control methodology without the need for a full-scale operational Combat Management System.

**CMS Training** offers realistic training in the Combat Management System.

**Weapons Training** offers realistic live instrumented training as well as virtual training on desktops or mock-ups.

**Sonar Training** offers training for the sonar operator in realistic environments.

**Comms Training** offers training in the use of COMMS in a synthetic environment and linking it with other operational environments.

**Nav Training** offers a complete bridge simulator.
A Total Training Provider is recognized for its capability to deliver all necessary equipment, tools and knowledge in order to provide a complete training service.

An efficient training operation requires the following capabilities:

- Simulators for the training of different areas of competence
- A qualified organization for operational and maintenance support in order to deliver an availability rate of at least 98%
- Skilled Subject Matter Experts capable of creating training scenarios in line with predefined training objectives
- Tools to efficiently integrate new and legacy simulators into a common training environment
- Tools to set up different configurations of simulators in order to perform joint and combined exercises

Saab as a Total Training Provider is able to provide customers with all capabilities accordingly. With a public-private partnership (PPP) as an alternative way to acquire a training capability, the customer receives the training solution needed today, with it funded and operated by the total training provider.