



Deployment with confidence

The International Fire Academy in Balsthal (CH) is Europe's leading competence and training centre for dealing with (fire) incidents in tunnels and other underground transport systems (UTS). With its operation procedures, courses and consultations, it contributes to the success and safety of fire services being able to successfully and safely meet the challenges in UTS with confidence.

Firefighting operation procedures for road and rail tunnels

The basis for all training and consultations of fire services are the firefighting operation procedures for road and railway tunnels, which were developed by the didactics and development team (DDT) of the International Fire Academy. The DDT is a team of experts that includes experienced officers from emergency services and representatives from authorities and infrastructure carriers. The operation procedures are now a binding training basis throughout Switzerland and are also the basis for international training courses.

Unique tunnel training facilities

In 2009, the International Fire Academy opened its training tunnel facilities in Balsthal and Lungern. The facilities on a scale of 1:1 map all traffic and safety-related details. In Balsthal, the training facility consists of a 260 m long single-tube road tunnel with a cross passage, a 100 m long railway tunnel, a railway training ground and a training car park, supplemented by the Tactics Centre for the training of officers. The facility in Lungern is located in a mined tunnel system with attack routes of up to 650 m. In all tunnels, there are several gas-powered fire scenes with which the most diverse operation scenarios can be simulated. Also, up to 50 vehicles are used as props, including a tanker and an urban bus.

Training and services

The training at the International Fire Academy is aimed at officers and entire fire service platoons. They prepare the participants realistically for (fire) operations in road and rail tunnels, car parks and other UTS as well as commanding such operations. Course languages are German, English, French and Italian. In addition, training or drills at the fire services' location can be accompanied and supported by instructors from the International Fire Academy.



Motifs from training in the training tunnels in Balsthal (above) and Lungern





Railway training area with overturned rail car operational drill in the railway training tunnel



The services of the International Fire Academy focus on counselling fire services on individual preparation for the intervention in their tunnels. This offering can be made use of during the planning phase for a tunnel, the construction phase, the operation phase, or for a tunnel renovation. The Fire Chief Forum is used for an in-depth exchange between fire service officers. This two-and-a-half-day event in changing locations combines specialist lectures with visits to UTS-relevant facilities.

Experiential learning as a basis

The International Fire Academy practices experiential learning: In order to compensate for the lack of operational experience in the comparatively rare deployments in UTS, learning and experience worlds have been created in which almost all operation conditions and tasks can be realistically represented. The course participants experience realistic scenarios with all senses and can test tactics and techniques for success under controlled conditions.

Customers from Europe, America and Asia

At the International Fire Academy, about 4 000 firefighters take part in courses each year. On the one hand, Swiss fire services have framework agreements, for example with the Federal Roads Office (FEDRO) and railway infra-

structure carriers in Switzerland. On the other hand, fire services book offers in Balsthal and Lungern directly or through their responsible fire service school. In addition, on-site training, support for operational drills and counsels are provided.

A public company

The International Fire Academy is operated by the Inter-cantonal Fire Service Training Center in cooperation with Gasser Felstechnik AG. The main shareholders are Basel-Landschaft and Solothurn building insurances, which hold the cantonal oversight of the fire service.

The International Fire Academy has 35 permanent employees, and around 100 experienced part-time instructors and technicians. It provides the entire training infrastructure required, from the training facilities to a canteen and accommodations.

Milestones of development

In response to the fire incidents in 1999 in the Montblanc road tunnel and the Tauern tunnel, development work for the International Fire Academy began in 2001. Research, own experiments and intensive exchanges with fire services throughout Europe were the basis for the development and construction of the training tunnels in Balsthal and Lungern. In 2009 the training facilities were put into operation. Since 2011, the training has been internationally orientated. In 2018, the railway training tunnel was expanded, and the railway training area was built. The «Road Tunnel Firefighting Procedure» was approved by the Swiss Fire Service Inspector Conference in 2012, while the «Railway Tunnel Firefighting Procedure» was approved in 2018. Both procedures have been published as textbooks and can be obtained from the International Fire Academy.

TRAINING COUNSELLING

Clemens Pessel
Training counselor
T +41 62 386 11 66
clemens.pessel@if-a-swiss.ch

International Fire Academy

Industriezone Klus 17
4710 Balsthal
Switzerland
T +41 62 386 11 11
F +41 62 386 11 12

www.ifa-swiss.ch

