



# TECHNICAL PROBLEM SOLVING

## ***Course Descriptions***

Solving complex problems is one of the most urgently required skills in our current time. As technologies become more advanced, the possible solutions created by them become more and more complex to understand, design for and successfully implement. This can be seen across multiple industries and is causing significant front line issues to reliability, maintenance, project cost, product performance and overall schedules.

In this one-day course a systematic methodological process for applying to technical complex problem solving shall be taught. Each stage of the process shall be expanded to include real-world examples in addition to various approaches for tailoring and applying the process. The course includes a moderated group workshop where a modern day example shall be worked through.

In addition, an evening meal with the course presenter is included in the fees.

## ***Learning Outcomes***

- Understanding and application of a Systematic methodological process for applying to technical complex problem solving
- Experience using numerous techniques for finding and developing high value

solutions, eg Triz.

- Experience using numerous techniques for evaluating the value of technical solutions, eg Extended trade-off.
- Experience leading the technical workshop group for one session.

### ***Who Should Attend?***

- Systems Engineers
- Technical Leaders
- Project Managers
- Requirements Engineers
- System Architects
- Development Engineers
- Verification and Validation Engineers
- Quality Engineers

### ***Course Rates***

Regular: 800 CHF

### ***Duration***

1 day

### ***Delivered By***



**Mike Johnson**

Mike has worked leading challenging product development roles predominantly in the Space and Defence Industries since completing his Masters degree in Photonics and Optoelectronic devices at the University of St Andrews, UK.

He has worked predominantly in the roles of Systems Engineer, leading technical developments involving inter-disciplinary teams often consisting of Mechanical, Electrical, Technology, Software and Optical Engineers. He worked at RUAG Space, Zürich for five years. During this period he moved into management, leading the Systems Engineering group in the product unit Optoelectronics and Instruments. In addition he gave Systems Engineering training courses to the employees across the whole company, training circa 100 Engineers from a beginners to an advanced level.

Having moved to Roche Diagnostics International to lead the Systems Engineering team in Rotkreuz, Switzerland, he is now passionately applying his experience and knowledge of Systems Engineering to the Healthcare industry.

He is passionate about product development and especially the application of Systems Engineering. He is one of the founders of the Swiss Society of Systems Engineering (SSSE) and regularly attends Swiss based IET and INCOSE lectures/seminars. He is the organiser of SWISSED, Switzerland's annual conference on Systems Engineering. In addition, he is the co-founder of SE-Training GmbH, specialising in high quality delivery of Systems Engineering training courses in Switzerland.

Chartered Engineer (IET 97325920) and Chartered Systems Engineering Professional (CSEP).