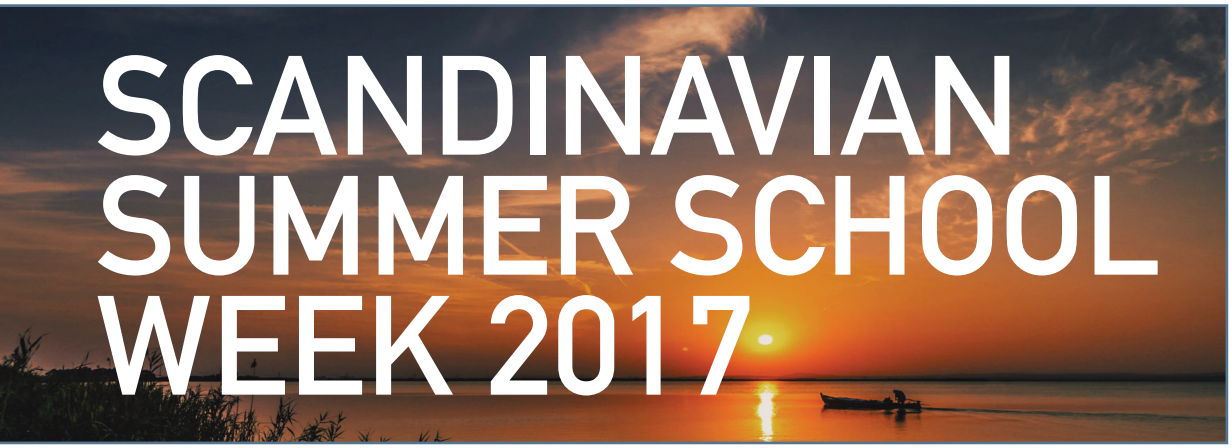
Syntell | excellence in systems lifecycle management

INVITATION TO



SCANDINAVIAN SUMMER SCHOOL WEEK 2017

A UNIQUE WEEK OF INTENSE LEARNING, NETWORKING AND INSPIRATION TO PREPARE YOU FOR FUTURE CHALLENGES IN DEFINING, DESIGNING AND MANAGING SYSTEMS THROUGHOUT THEIR LIFETIME.

COURSES:

- DESIGN THINKING AND SYSTEMS ENGINEERING
- SYSTEMS ARCHITECTING FUNDAMENTALS
- LOGISTICS ENGINEERING AND MANAGEMENT

2017

Utö, Stockholm Archipelago, August 20-25

Syntell AB | Box 100 22 | 100 55 Stockholm | Sweden | Tel +46(0)8 660 02 80 | Fax +46(0)8 660 09 65 | info@syntell.se | **www.syntell.se**

Welcome to Scandinavian Summer School Week 2017!

This unique course week combines theory and practice as well as hard work and social activities in an inspiring environment. Together with participants from many industrial sectors you will be taught and guided by internationally recognised lecturers.

The Scandinavian Summer School Week is an intense annually held event that has taken place in the Nordic countries since 1999. It is open for international participation and serves two major purposes:

- to teach the principles of how to develop and manage effective systems and;
- to support networking between practitioners

This year the Summer School Week includes the following three courses:

- **Design Thinking and Systems Engineering**
- **Systems Architecting Fundamentals**
- **Logistics Engineering and Management**

Instructional Approach

Each course is presented by internationally recognised lecturers with teaching experience from universities such as Stevens Institute of Technology, Cranfield University and the Royal Institute of Technology as well as solid industrial experience from international organizations. All courses during the Summer School Week combine theory with engineering practice and real-world problems.

Target Group

The Scandinavian Summer School Week is aimed at anybody involved in the engineering, management or support of technical systems (systems comprising hardware/software/humans). It is a good opportunity to establish a shared view for customers and contractors (acquirer and supplier) project teams as well as for different departments within the organization.

Previous participants

Previous participants of Syntell Summer and Winter Schools, numbering nearly 1000, include representation from BAE Systems Bofors, BAE Systems Hägglunds, BMW, Bombardier, ESS, FMV, Kockums, Kongsberg A&D, Micronic Mydata, Norwegian Defence, Novo Nordisk, Nokia, Saab Group, Scania, Siemens, SJ, Solvina, TetraPak, TVO, Vattenfall and the Volvo Group.

Design Thinking and Systems Engineering

Lecturers:

Dr. Dinesh Verma
Stevens Institute of Technology, USA

Tom Strandberg, CSEP
Syntell AB, Sweden

	Sunday	Monday	Tuesday	Wednesday	Thursday	Friday
08.00						
09.00		Business Drivers	Alternative System Design Concepts	System Objectives	System Architecting	Student Case Study Review
10.00		Break				
11.00		Terms and Definitions	Context diagram and Concept of Operations	Developing Requirements	Lifecycle Analysis	Student Case Study Review
12.00		Lunch	Lunch	Lunch	Lunch	Lunch
13.00		Case Study – Defining the Need	Development of Case Study	Development of Case Study	Guest Lecture	Course Review, Q&A Closing session
14.00						
15.00	Intro to System Concepts and course outline	Break				
16.00		Stakeholders and their Requirements	Use Cases and Sequence Diagrams	Introduction to System Architecture	Documenting the Case Study	
17.00						
18.00	Welcome Reception and Dinner	Dinner	Dinner	Dinner	Social Event	
19.00		Case Study – Stakeholder Definition	Development of Case Study – System Design	Development of Case Study – Iteration w stakeholders		
20.00						
21.00						
22.00						

To be successful in today´s and tomorrow´s marketplace requires you to define and develop or acquire innovative products and services in an increasing rapidly changing business environment. Essential skills include a customer focus while considering other stakeholders and a systems approach to the definition and engineering of the solution.

About the course

The course discusses fundamental concepts and processes of design thinking and systems engineering, along with applicable methods and tools.

Initial focus is on need identification and problem definition, carried out in interactive sessions with the customer and other stakeholders. This is followed by requirements and design definition activities during concept and system design phases and articulated through examples and case study projects.

Emphasis will be on enhancing the effectiveness of deployed systems by ensuring that the products and services meet stakeholders needs while reducing their operational and support costs. Specific topics include: Needs Analysis, Concept of Operation, System context, Requirements definition and traceability, Voice of the Customer, Design Concepts identification and selection, System Functional Architecture; Life Cycle and Risk Management.

The course finishes with a simulated System Requirements Review (SRR) in which the students present their case studies.

Course goal

This course will provide you with the systemic mindset you need to identify the real customer needs and hence solving the right problem.

You will be given a systematic and pragmatic approach to define and design creative solutions that not only meet customer needs but also those of other stakeholders.

Target group

This course is aimed at anyone involved in the marketing, procurement, engineering, management or support of technical systems (systems comprising hardware/software/humans). It is a good opportunity to establish a shared view for customers and contractors project teams as well as for different departments (e.g. marketing and engineering) within the organization.

Previous knowledge

No formal knowledge in Systems Engineering is needed. However, a few years practical experience in the field of complex technical systems is recommended to have gained an insight to the need for thinking and acting in terms of systems. Course language is English but one lecturer is fluent in Swedish.

Personal Development Units

This course allows you to apply for 30 PDU:s according to INCOSE:s Systems Engineering Professional (SEP) Certification program.

Systems Architecting Fundamentals

Lecturers:

Prof. Hillary Sillitto, ESEP
Sillitto Enterprises, UK

Peter Henriksson
Syntell AB

	Sunday	Monday	Tuesday	Wednesday	Thursday	Friday
08.00						
09.00		SE recap	System perspective	Case study discussions	Architecting the lifecycle	Guest lecture
10.00		Break				
11.00		The "six step process"	Logical perspective	Viewpoints, views and frameworks	Incremental validation and deployment	Modelling approaches
12.00		Lunch	Lunch	Lunch	Lunch	Lunch
13.00						Course Review, Closing session
14.00		Enterprise perspective	Physical perspectives	Layered architectures	Case study review	
15.00	Introduction to course	Break				
16.00		Operational perspective	Decision perspective	Evaluating alternatives	Case study review	
17.00						
18.00	Welcome Reception and Dinner	Dinner	Dinner	Dinner	Social Event	
19.00		Development of Case Study	Video and discussion	Development of Case Study		
20.00						
21.00						
22.00						

In an ever changing market, how do you manage complexity and develop successful systems and products that are adaptable, resilient and sustainable? A good architecture is critical for sustained success when dealing with complex systems in a changing environment.

About the course

This course starts with describing WHY a good architecture is critical for sustained success when dealing with complex systems in a changing environment. You will be introduced to the concepts, principles and practice of systems architecting and design as well as the necessary competencies for a system architect.

Throughout the course you will learn HOW to architect a system using systems engineering and a six-step architecting process on a case with a final presentation on the last day. During the course you will be exposed to terms such as architectural views, decision roadmap and trade-offs, architecture drivers, product lines, life cycle management and model-based systems engineering (MBSE).

Course goal

This course will introduce you to the necessary tools and concepts behind systems architecting. It will also give you the opportunity to practice your architecting skills, by developing and refining a case study throughout the week. The goal is to illustrate and emphasise the importance of creating a good systems architecture, and to reflect on what we actually mean by a "good architecture".

Target Group

This course is aimed at anybody involved in the development or management of systems that wishes to enhance their competence and capability to develop systems that effectively meet the changing business environment. Suitable roles are: Product and Platform Managers, System Engineers, Product Engineers, System Architects, System Engineering Managers or Technical Project Managers.

Previous knowledge

Some previous education in Systems Engineering or Product Development is beneficial, together with a few years practical experience in the field of complex technical systems. Course language is English but one lecturer is fluent in Swedish.

Personal Development Units

This course allows you to apply for 30 PDU:s according to INCOSE:s Systems Engineering Professional (SEP) Certification program.

The course is given in cooperation with Sillitto Enterprises, UK.

Logistics Engineering and Management

Lecturers:

Stuart Allison MCIPS
Syntell AB

Mike Cost
Syntell AB

Dr. David Moore
Fellow of Cranfield
University UK

	Sunday	Monday	Tuesday	Wednesday	Thursday	Friday
08.00						
09.00		Why and what is ILS?	How do we apply ILS -Part 3	Acquirer & Supplier relationship	ILS Mgmt, Reqmts, Tools & Methods	International trends in ILS
10.00		Break				
11.00		How do we apply ILS-Part 1	How do we apply ILS-Part 4	Through Life Management	Obscolence Mgmt & Software Sp	Pres. of Case Study/Guidance conference
12.00		Lunch	Lunch	Lunch	Lunch	Lunch
13.00						
14.00		How do we apply ILS -Part 2	Development of Case Study	Development of Case Study	Dr David Moore; UK Acquisition reforms and ILS	Q+A Session
15.00	Introduction	Break				Evaluation and closure
16.00	A holistic view on logistics engineering	Development of Case Study	Maintenance & LSA	Contracting & planning for ILS	Development of Case Study	
17.00						
18.00	Welcome Reception and Dinner	Dinner	Dinner	Dinner	Social Event	
19.00		Development of Case Study	Development of Case Study	Development of Case Study		
20.00						
21.00						
22.00						

This course gives you insight into the through life management of systems. The course covers methods, tools and knowledge about how supportability is addressed, analyzed and measured as a part of the Systems Engineering process.

About the course

The course Logistics Engineering and Management provides insight into the through life management of systems from inception to retirement. It covers Logistics Engineering methods and tools and how supportability is addressed, analyzed and measured as a part of the Systems Engineering process. The management methodology covers aspects such as tailoring, managing, contracting, planning and methods.

The course focuses on the objectives of Integrated Logistics Support (ILS) and in particular the influence and optimization of system design from a support perspective. It also includes the relationships with other project disciplines and an insight into factors/issues that increasingly impact modern day procurements, such as the use of Commercial Off The Shelf (COTS) technology, Obsolescence and Software Support.

International standards and initiatives such as the ASD series and PLCS initiatives are discussed and evaluated. The relationship between acquirer and supplier is a central theme throughout the course. The course ends with a simulated ILS Guidance Conference.

Course goal

The aim of the course is to give a fundamental overview of logistics management and engineering in an acquisition management context with particular emphasis on the life-cycle / through life approach to Support Solution Development and implementation.

Target group

Anyone involved in acquisition projects and programmes, both from a supplier or acquirer perspective, who require an overview of Support Solution Development in a through life context. Particularly those involved in individual ILS/Support disciplines looking to take on a management role or requiring a better understanding of their role within the overall through life support solution environment.

Previous knowledge

A basic knowledge of system design and support issues within your own organization. Course language is English.

Personal Development Units

This course allows you to apply for 30 PDU:s according to INCOSE:s Systems Engineering Professional (SEP) Certification program.

Important information

Register for the Summer School Week at **www.syntell.se.**
Register before June 1, 2017, and get an early bird discount of 10% of the course fee!
Last day for registration is July 1, 2017. Welcome!

Venue

Utö is located about 90 minutes southeast of Stockholm. The surroundings offer a relaxing atmosphere and scenery. For those more active there are plenty of sporting opportunities. Participants share a cottage close to the conference area and restaurant. More information will be sent to you upon registration.

Time

The course starts at 15:00 on Sunday, August 20, 2017, and ends at 15:00 on Friday, August 25, 2017.

Transportation

A chartered bus leaves from Stockholm City on Sunday, August 20, which takes us to the boat to Utö. More information upon registration.

Price

The course fee is SEK 30 995, which covers attendance, a full set of course materials and a course certificate. In addition, an accomodation fee of SEK 11 500 will apply, including lodging and full board (breakfast, lunch and dinner) as of dinner Sunday, through lunch Friday. Syntell will invoice after receipt of registration, and payment is due 10 days after invoice. All prices exclude VAT.

Early Bird discount

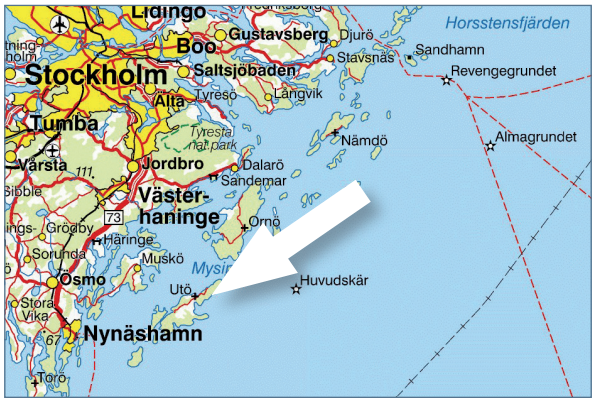
Register before June 1, 2017 and you get an early bird discount of 10% of the course fee!

Registration

Register for the Summer School Week at www.syntell.se. Last day for registration is July 1, 2017.

More information

For more information, please contact us at tel +46 (0) 8 660 02 80 or training@syntell.se



Utö is a stunning island in the Stockholm Archipelago. It offers a relaxing and inspiring surrounding for the Summer School courses. The ferry from the mainland takes around 40 minutes.

Conditions

Last day for registration is July 1, 2017. Please note that the registration is binding, but can be transferred to another person within the company. However, if participants must cancel for any reason, prior to June 1, no cancellation fee will apply. Thereafter but before July 1, half the course fee will apply. Thereafter full fee will be charged. We reserve the right to cancel courses due to too few participants or events beyond our control. We also reserve the right to increase the price due to circumstances beyond our control. Read more about the conditions on our homepage, www.syntell.se!

Customer satisfaction guarantee

If you are not satisfied with the course you participate in, after agreement, we offer you participation in a similar course without any further cost. The guarantee is limited to those who fall into the course target group and have the required previous knowledge as indicated in the course description. To ensure that you get to the right course, we ask you to study the course description, target group and previous knowledge requirements carefully. Please contact us if you have questions about which course to choose. We will be happy to help you!

Syntell in cooperation with SILLITTO ENTERPRISES Cranfield UNIVERSITY

Syntell Manager Discount

Special offer for all managers - sign four employees to the Summer School Week and you as a manager can attend the course at no cost!

Develop your business

We provide an opportunity for managers to develop closer relationships to your personnel and the ability to develop your business! It is also an excellent opportunity to create a common language and a platform for new and ongoing projects. Sign four employees to Syntell Summer School Week and you as a manager can attend the course at no cost. You as a manager pay only for room and board.

Benefits

• deeper understanding of the students' development and how your organisaton can benefit from the new skills and motivation

• the ability to build internal relationships in an inspiring environment

• deeper understanding of your business needs for competence

• development of your own skills on any of the Summer School Courses

• ability to influence the future direction and contents of Syntell's training

In addition to attending the course you are invited into a **special programme** with Syntell that will help you develop a sustainable organizational capability in Systems Engineering, Architecture and Logistics Engineering.

Requirements

• You are employed by the same company as the participating employees.

• You have a formal leadership of the employees (at any stage).

• You must attend one of the courses along with any of your employees.

It is a one-time registration, this offering can only be used on the formal registration of four employees. This offer cannot be combined with other offers such as our "early bird" discount. Each participant pays the full price for their Summer School Location and your investment for four employees will be 30 995 SEK per person plus room and board for 11 500 SEK per person. The manager pays for room and board (11 500 SEK) but not the course fee (30 995 SEK).

For more information about the discount and prices, please call us at tel +46 (0) 8 660 02 80 or e-mail training@syntell.se.

Learn more about this year's Sandinavian Summer

Register at:
www.syntell.se or email us at training@syntell.se

About Syntell

We see your product as a system that is embedded in its environment. Also, we see a system's whole lifecycle, from its conception through development and operation, to its retirement.

We support you in every stage of your capability development

We educate. We provide you the highest standards in our open and tailored training courses and complete competence development programs.

We enable. We help you develop lifecycle processes, methods and infrastructure for your organization. Our experienced consultants apply proven global best practice for developing your capabilities.

We execute. We assist you in bringing neccessary changes into practice. We consult and coach your project teams in the new ways of working in your environment and specific challenges.

Our resources

Established since 1994, and with headquarters in Stockholm, Syntell is now operating worldwide with our clients.

We are a mid-sized consultancy firm with highly qualified and experienced staff, exceeding 10 MEUR in revenues while being AAA credit rated. This makes us a long-term and reliable supplier, partner and employer.

We complement our competences and capacity from our Syntell & Partners network, bringing together more than 50 organizations with a total of over 1500 individuals to meet your demands.

Systems & their lifecycles – our passion & approach

We see your product as a system that is embedded in its environment. Also, we see a system´s whole lifecycle, from its conception through development and operation to its retirement. The different stages require both generic and specific capabilities to optimize the system´s performance and availabilty. For this, we can help you build and improve:

- Enterprise Architecture
- Change Management
- Process Development
- Acquisition & Bid Management
- Specifications & Requirements Management
- Configuration Management
- Project & Program Management
- Systems Engineering
- Verification & Validation
- Support Solution Management & Design (Integrated Logistic Support)
- Supply Chain Management
- Through-life Costing
- Systems Lifecycle Management
- Information & Data Management

Syntell

sauf
SVERIGES AUKTORISERADE UTBILDNINGSFÖRETAG

We are certified by SAUF - The Swedish Association of Certified Training and Educational companies.

Syntell AB | Box 100 22 | 100 55 Stockholm | Sweden | Tel +46(0)8 660 02 80 | Fax +46(0)8 660 09 65 | info@syntell.se | **www.syntell.se**