

KURSPLAN

Enterprise Architecture and IT Architecture, 7,5 högskolepoäng

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Kurskod: TEAR27 Utbildningsnivå: Avancerad nivå

Fastställd av: VD 2016-03-01 Utbildningsområde: Tekniska området (95%) och

samhällsvetenskapliga området

(5%)

Version:1Ämnesgrupp:DT1Diarienummer:JTH 2016/1202-313Fördjupning:A1NHuvudområde:Informatik

Lärandemål

After a successful course, the student shall

Kunskap och förståelse

Gäller fr.o.m.: 2017-01-01

- demonstrate comprehension of enterprise architecture, information system architecture and technology architecture
- show familiarity with enterprise architecture management
- display knowledge of research trends in the areas relevant for enterprise architecture and it architecture

Färdighet och förmåga

- demonstrate skills of creating a model of EA using modern standards and tools
- demonstrate the ability to create a high-level requirements specification and design description for an information system based on an EA model

Värderingsförmåga och förhållningssätt

- demonstrate an understanding of how EA and IT architecture can contribute to business and IT alignment

Innehåll

The course provides the knowledge and skills of applying a holistic and systemic perspective on enterprises and enterprise architecture (EA). In general, it will address EA in order to capture and structure relevant components for describing an enterprise, including its business and operation model, organizational structure, business processes, data, applications and technology - as well as the processes used for development of the EA as such. A number of architectural layers will be explained, e.g. the business architecture, the information architecture, the solution architecture, and the technology architecture. Enterprise Architecture Management (EAM) will be introduced as one of the key activities to keep the IT of an organization aligned with the business challenges and activities. Methods, standards and tools will be covered to construct and analyse conceptual enterprise models addressing various organizational design problems from

different modelling perspectives. Examples of such perspectives are goals, processes, concepts, information, and enterprise information architecture. A connection will be established between to IT architectures and services and cloud computing.

The topics covered in the course include:

- Enterprise architecture and enterprise architecture management
- Business and IT alignment
- Enterprise modelling, methods, languages and modelling processes
- EA standards such as TOGAF and ArchiMate
- Business model impact on enterprise architecture
- Design thinking for enterprise architectures
- Information system architecture and technology architecture
- IT architectures based on services and cloud computing
- EA as a tool to guide requirements specifications and design descriptions

Undervisningsformer

Undervisningen bedrivs på engelska.

Förkunskapskrav

Passed courses at least 90 credits within the major subject in Informatics, Computer Science, Computer Engineering, Interaction Design (with relevant courses in web programming). Proof of English proficiency is required (eller motsvarande kunskaper).

Examination och betyg

Kursen bedöms med betygen 5, 4, 3 eller Underkänd.

The final grade will only be issued after satisfactory completion of all assesments.

The final grade for the course is based upon a balanced set of assesments.

Poängregistrering av examinationen för kursen sker enligt följande system:

Examinationsmoment	Omfattning	Betyg
Skriftlig tentamen	3 hp	5/4/3/U
Inlämningsuppgifter	4,5 hp	5/4/3/U

Kurslitteratur

Modeling Enterprise Architecture With TOGAF by Philippe Desfray, Gilbert Raymond, Philippe Desfray, Morgan Kaufmann Publishers, 2014.

The literature list for the course will be provided one month before the course starts.