inf661 - Digital Transformation

Module label  Digital Transformation
Module code  inf661
Credit points  6.0 KP
Workload  180 h
Used in course of study
- Master's Programme Business Informatics > Akzentsetzungsmodule Bereich Wirtschaftsinformatik
- Master's Programme Computing Science > Angewandte Informatik

Contact person
Module responsibility
- Jorge Marx Gomez
- Die im Modul Lehrenden

Authorized examiners
- Jorge Marx Gomez
- Die im Modul Lehrenden

Entry requirements
Skills to be acquired in this module

After successful completion of the lecture, the students should be able to define enabler and actors of a digital transformation within the context of a model company. Furthermore, key competences such as Cloud Computing or IoT are used to make potential exploitation by new digital business models visible. The results will be evaluated.

The lecture explains basic properties of a digital transformation for companies and shows specific development potential. By forming and building a model company, students are able to create a realistic and practical scenario. A final documentation reveals the degree of fulfillment and the students' point of view on the scenario.

Professional competence
The students:
- recognize basic properties and facts of a digital transformation for companies
- divide different terms of digital transformation
- expose actual introduction projects
- compile practical knowledge by dividing goals of enabler and actors of a digital transformation
- obtain basic knowledge of key competences such as IT-Security, Data Analytics, Big Data, Cloud Computing
- identify digital business models within the specific development potential

Methodological competence
The students:
- determine and analyse required information
- prepare the given information for specific target groups
- establish an analytical understanding of digital enterprise structures within key competences and applications

Social competence
The students:
- work in groups, identify work packages and take on responsibility for the jobs assigned to them
- discuss and introduce the results on a functional level

Self-competence
The students:
- reflect their actions on the basis of self defined objectives
- analyse their own state of knowledge

Module contents
Within the lecture the upcoming topics are discussed:
• definition and introduction of digital transformation
• success factors, market changes and introductory projects
• enabler of a digital transformation (competences, applications and structures)
• digital business models and networks
• actors of a digital transformation
• industry 4.0 in the context of a digital transformation

Reader’s advisory


Links: http://www.wi-ol.de
Languages of instruction: German, English
Duration (semesters): 1 Semester
Module frequency: 
Module capacity: unlimited
Module level: ---
Moduleart: je nach Studiengang Pflicht oder Wahlpflicht
Lern-/Lehrform / Type of program
Vorkenntnisse / Previous knowledge

Examination
Final exam of module
Time of examination: After the end of the lecture period
Type of examination: Papers, project or written examination. Announcement at the beginning of the lecture period.

Course type
Lecture
Exercises
Comment
2.00
2.00
SWS
Frequency
SuSe or WiSe
SuSe or WiSe
Workload attendance
28 h
28 h
56 h

Total time of attendance for the module 56 h