Database Systems Group, Prof. Martin Gogolla: Teaching - General remarks

- Courses in the area Database Systems / Software Engineering
- DBS: Database Systems / Datenbanksysteme
  Winter semester
- DIS/EIS: Design of Information Systems / Entwurf von Informationssystemen
  Summer semester
  Topic: Information system design, concentrating on the Object Constraint Language (OCL) in connection with modeling languages as UML (Unified Modeling Language) or EMF (Eclipse Modeling Framework)
- Theses (Bachelor, Master) and examinations in the area Database Systems and Software Design
**COURSE**: Design of Information Systems (8 ECTS)

**WEB INFO**: [http://www.db.informatik.uni-bremen.de](http://www.db.informatik.uni-bremen.de)

Preferably after 4th semester; for students having experience in software development; suitable for Bachelor and Master students

**LECTURES**: Thu 10-12 MZH 1450, Thu 14-16 SFG 2020, Start 1st lect. week

**EXERCISES**: Wed 10-12 MZH 1450, Start 2nd lect. week

**CONTENT**: Design of Information Systems with modeling languages like UML or EMF; UML diagram forms and language features; properties of the Object Constraint Language (OCL); semantics of OCL; datamodels, metamodels

**Tool USE (UML-based Specification Environment)**: internationally used UML/OCL tool; developed in Bremen; interpreter for subset of UML including full OCL; offering executable models; tool gives feedback on the developed system; for example, by animating the system; google 'gogolla publications'

**tool is about MODEL EXECUTION and MODEL TESTING not about DRAWING**

**FORM OF EXAMINATION**: (A) Writing a paper about an application designed with UML/OCL (English or German; homework, “Hausarbeit”; including presentation of results in the exercise lessons; within a group of about 3 students); (B) oral examination (20 minutes)
• **SEMINAR**: Entwicklung von UML- und OCL-Modellen mit USE (4 ECTS) (Master level)
  Development of UML and OCL Models with USE (4 ECTS)

**COORDINATES**: Wed 16-18 MZH 1450, Start 1st lect. week
Student talks on selected topics in modeling with USE
Oral presentation with slides
Written report on the chosen topic
Background: google ‘gogolla publications’