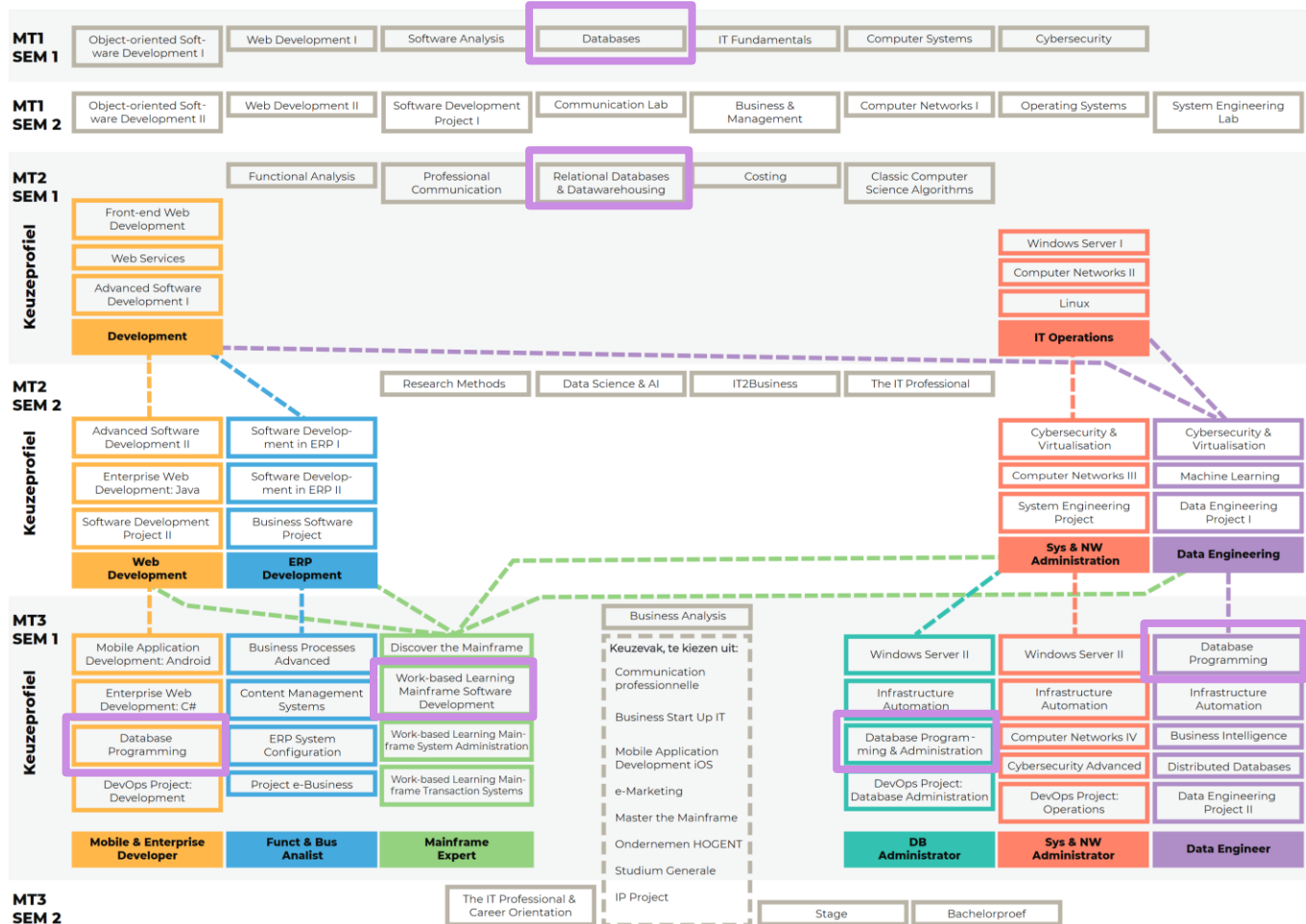




# **Relational Databases & Data warehousing**

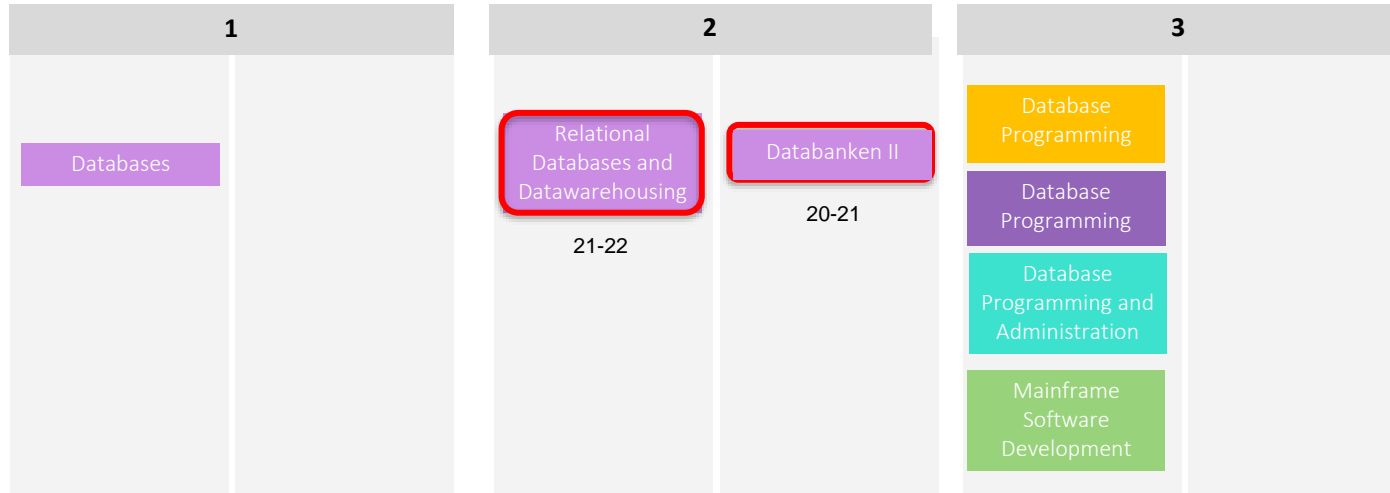
# Situering





# Store and Manage

**De student kan complexe verzamelde informatie analyseren en verwerken tot de meest geschikte gestructureerde databases die hij/zij met het oog op performantie, efficiënt beheert en gebruikt.**

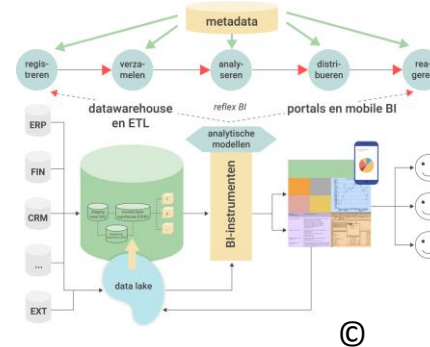


# Objectives-ECTS

- Is able to manage relational databases.
- Is able to elaborate complex query statements.
- Is able to write the appropriate SQL statements for a demand for information.
- Is able to write queries using a minimum of computer resources.
- Is able to handle data exchange formats within a relational database context.
- Is able to explain the use of transactions.
- Is able to explain the recovery techniques for transactions.
- Is able to explain the use and the function of datawarehousing and datamarts.
- Is able to create analytical cubes.
- Is able to develop BI reports using an OLTP database as well as using a datawarehouse.
- Is able to use Business Intelligence in function of a business requirement.
- Is able to explain the importance of NoSQL databases.
- Is able to describe different kinds of NoSQL datases.
- Is able to explain the function of in memory databases.

# Contents

- SQL: DML, DDL, CTE, UDT
- Datawarehousing
- Transactions
- NoSQL



# Overview

## Teachers:

- Chloé De Leenheer
- Sabine De Vreese
- Joeri Van Herreweghe



# Overview

## **Lessons - organisation:**

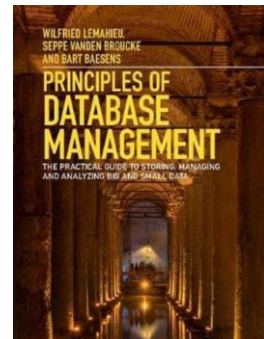
- For regular students: 2x 2 hours / week



# Overview

## Course material:

- Presentations and exercises: Chamilo
- SQL Server (see installation guidelines on Chamilo)
- Reference book: Principles of Database Management
  - Wilfried Lemahieu, Seppe vanden Broucke, Bart Baesens
  - isbn 9781107186125
  - E-book exists as well



# Overview

## Evaluation:

- First exam chance:
  - Written examination (not using MS SQL Server): 40%
  - Written examination (SQL using MS SQL Server): 60%
- Re-sit exam :
  - Written examination (not using MS SQL Server): 40%
  - Written examination (SQL using MS SQL Server): 60%
- Practical: to be determined (online/on campus)