## **Course of Study Computer Science (Study Cohort w22)**

Sample course plan M Master Computer Science (CSMS) Core Qualification Compulsory Specialisation Compulsory Focus Compulsory Thesis Compulsory Specialisation I. Computer and Software Engineering, Specialisation II: Intelligence Engineering, Specialisation Core Qualification Elective Compulsory Specialisation Elective Compulsory Focus Elective Compulsory Interdisciplinary complement III.<sub>P</sub>Mathematics, Specialisation IV. Subject Specific Focus 1 Security of Cyber-Physical Systems Compilers for Embedded Systems **Research Project Computer Science** Master Thesis Security of Cyber-Physical Systems VL 2 Compilers for Embedded Systems VL 3 Research Project Computer Science PK 8 2 Security of Cyber-Physical Systems GÜ 2 Compilers for Embedded Systems PBL 1 3 4 5 6 7 Intelligent Autonomous Agents and Cognitive Robotics Model Checking - Proof Engines and Algorithms Model Checking - Proof Engines and Algorithms VI 2 8 Model Checking - Proof Engines and Algorithms GÜ 2 9 10 11 12 13 Hierarchical Algorithms Machine Learning and Data Mining Intelligent Systems in Medicine Hierarchical Algorithms VL 2 Machine Learning and Data Mining VL 2 Intelligent Systems in Medicine VI 2 14 Hierarchical Algorithms GÜ 2 Machine Learning and Data Mining GÜ 2 Intelligent Systems in Medicine GÜ 1 15 Intelligent Systems in Medicine PS 2 16 17 18 19 Randomised Algorithms and Random Graphs Advanced Machine Learning Randomised Algorithms and Random Graphs VL 2 Advanced Machine Learning VI 2 20 Randomised Algorithms and Random Graphs HÜ 2 GÜ 2 Advanced Machine Learning 21 22 23 24 25 26 27 28 29 30 Business & Management (from catalogue) - 6LP Non-technical Courses for Master (from catalogue) - 6LP Technical Complementary Course I for CSMS - 6LP Technical Complementary Course II for CSMS - 6LP

The choice of courses from the catalogue is flexible (depends on the semestral work load), provided the necessary number of required credits is reached.