DIGITAL URBAN SIMULATION



Digital Urban Simulation

In this course students analyze architectural and urban design using current computational methods. Based on these analyses the effects of planning can be simulated and understood. An important focus of this course is the interpretation of the analysis and simulation results and the application of these corresponding methods in early planning phases.

The students learn how the design and planning of cities can be evidence based by using scientific methods. The teaching unit conveys knowledge in state-of-the-art and emerging spatial analysis and simulation methods and equip students with skills in modern software systems. The course consists of lectures, associated exercises, workshops as well as of one integral project work.

19.02.2018 Introduction to the course

26.02.2018 Simulation of urban networks and morphologies growth

05.03.2018 Space Syntax I

12.03.2018 Space Syntax II

19.03.2018 Seminar Week

26.03.2018 Urban Climate I

09.04.2018 Urban Climate II

23.04.2018 Workshop: from analysis to design proposals

30.04.2018 Guest lecture

07.05.2018 Final consultations

14.05.2018 Final presentations

Where HIT H 31.4 (Video wall)

Supervision Dr. Estefania Tapias Dr. Peter Bus

tapias@arch.ethz.ch bus@arch.ethz.ch Exercises 50% (documentations)
Presentation 25% (project at the end)
Written documentation 50%

The most recent outline will be found on www.ia.arch.ethz.ch

Prof. Dr. Gerhard Schmitt Chair of Information Architecture Information Science Lab Wolfgang-Pauli-Strasse 27, 8093 Zurich www.ia.arch.ethz.ch

