## Module title
Numerical Mathematics 1 for students of other subjects

### Abbreviation
10-M-NUM1af-152-m01

## Module coordinator
Dean of Studies Mathematik (Mathematics)

## Module offered by
Institute of Mathematics

### ECTS
10

### Method of grading
numerical grade

### Only after succ. compl. of module(s)
--

### Duration
1 semester

### Module level
undergraduate

### Other prerequisites
--

## Contents
Solution of systems of linear equations and curve fitting problems, nonlinear equations and systems of equations, interpolation with polynomials, splines and trigonometric functions, numerical integration.

## Intended learning outcomes
The student is acquainted with the fundamental concepts and methods in numerical mathematics, applies them to practical problems and knows about their typical fields of application.

## Courses
(type, number of weekly contact hours, language — if other than German)
V (4) + Ü (2)

## Method of assessment
(type, scope, language — if other than German, examination offered — if not every semester, information on whether module is creditable for bonus)
a) written examination (approx. 90 to 180 minutes, usually chosen) or b) oral examination of one candidate each (15 to 30 minutes) or c) oral examination in groups (groups of 2, 10 to 15 minutes per candidate)

Language of assessment: German and/or English creditable for bonus

## Allocation of places
--

## Additional information
--

## Referred to in LPO I (examination regulations for teaching-degree programmes)
--

## Module appears in
Bachelor' degree (1 major) Computer Science (2015)
Bachelor' degree (1 major) Physics (2015)
Bachelor' degree (1 major) Nanostructure Technology (2015)
Bachelor' degree (1 major) Aerospace Computer Science (2015)
Bachelor' degree (1 major) Functional Materials (2015)
Bachelor' degree (1 major) Aerospace Computer Science (2017)
Bachelor' degree (1 major) Computer Science (2017)
Bachelor' degree (1 major) Computer Science (2019)
Bachelor' degree (1 major) Physics (2020)
Bachelor' degree (1 major) Nanostructure Technology (2020)
Bachelor' degree (1 major) Aerospace Computer Science (2020)
Bachelor' degree (1 major) Functional Materials (2021)
Bachelor' degree (1 major) Computer Science und Sustainability (2021)
Bachelor' degree (1 major) Quantum Technology (2021)