Module MA-INF 1313	**Topics in Theoretical Cryptography**		
Workload 270 h	**Credit points** 9 CP	**Duration** 1 semester	**Frequency** every year
Module coordinator	Prof. Dr. Joachim von zur Gathen		
Lecturer(s)	Prof. Dr. Joachim von zur Gathen, Dr. Michael Nüsken		
Classification	**Programme** M. Sc. Computer Science	**Mode** Optional	**Semester** 3.
Technical skills	Gain deeper understanding in a special area of cryptography close to current research.		
Soft skills	Oral presentation (in tutorial groups), written presentation (of exercise solutions), team collaboration in solving homework problems, critical assessment.		
Contents	One varying, advanced topic related to current research in theoretical cryptography, e.g. • elliptic curve cryptography, or • quantum cryptography		
Prerequisites	**Required:** MA-INF 1103 – Cryptography and one further course in cryptography like The Art of Cryptography or eSecurity.		

Format	**Teaching format**	**Group size**	**h/week**	**Workload[h]**	**CP**
	Lecture	60	4	60 T / 105 S	5.5
	Exercises	30	2	30 T / 75 S	3.5
	T = face-to-face teaching; S = independent study				

Exam achievements	Written exam (graded)
Study achievements	Successful exercise participation (not graded)
Forms of media	
Literature	Research articles