

Invitation to the Oral Examination – Department CS

For the occasion of her examination for a Doctoral Degree,

Ms. Anne Catherine Sai

will present her dissertation entitled

**Enabling Business Process Compliance with
Regulatory Constraints from Natural Language**

on **April 17, 2026** at **12:30 h (CET)**

Attendance to the presentation is open to the public. The presentation will be in English.

The candidate, all members of the Examination Committee, and authorized examiners of the TUM School of CIT are invited to the presentation and subsequent oral examination.

The presentation and subsequent examination will take place in hybrid form:

In person in room

00.12.019, CIT Sitzungsraum 2, FMI, Boltzmannstraße 3, 85748 Garching

and online via Teams:

<https://teams.microsoft.com/meet/38273136867542?p=hYmJpCXrkye8zMk4Vm>

Meeting ID: 382 731 368 675 42

Passcode: Me3fY6gH

Examination committee:

Chair: **Prof. Dr. Florian Matthes**

First Examiner: **Prof. Dr. Stefanie Rinderle-Ma**

Second Examiner: **Prof. Dr. Luise Pufahl**

Garching, April 8, 2026

Mailing list:

Members of the examination committee

Doctoral candidate

Abstract:

Organizations face growing, complex, and evolving regulatory demands that manual approaches cannot scale to. This dissertation explores AI-driven (semi-)automation of regulatory process compliance across five challenges: identifying, interpreting, communicating, aligning, and integrating requirements. Six contributions advance NLP and hybrid AI to extract, model, and reason over regulations, ensuring transparent, explainable, and trustworthy compliance automation.