Postdoc
Research Group Mondelli

Full Time | Klosterneuburg (Vienna), Austria | € 57.680 gross/year*

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This two-year postdoctoral position is funded by the 2019 Lopez-Loreta Award in **Prof. Marco Mondelli's** research group (http://marcomondelli.com) and its focus is on theoretical foundations of deep learning and non-convex optimization in high dimensions.

We are at the center of a revolution in information technology, with data being the most valuable commodity. Exploiting this exploding number of data sets requires to address complex inference problems, and our group works to develop mathematically principled solutions. In particular, in machine learning, given a model for the observations, the goal is to understand how many samples convey sufficient information to perform a certain task and what are the optimal ways to utilize such samples. Both the vision and the toolkit adopted by our group are inspired by information theory, which leads to the investigation of the following fundamental questions: What is the minimal amount of information necessary to solve an assigned inference problem? Given this minimal amount of information, is it possible to design a low-complexity algorithm? What are the fundamental trade-offs between the parameters at play (e.g., dimensionality of the problem, size of the data sample, complexity)?

Your profile

- A PhD in computer science, electrical engineering, applied mathematics or a related field is required as well as strong analytical skills
- High level of interest in theoretical foundations of deep learning and non-convex optimization in high dimensions
- Committed to research excellence with a demonstrated relevant publication track record in leading scientific journals
- A proven ability to conduct independent research, as well as to work effectively as a member of a research team
- Excellent command of English (working language)

Your benefits

- Education & training
- Cafeteria
- Childcare
- Free shuttle bus
- Multiple health offers
- Pension insurance

Application deadline: flexible start date

Application documents: CV, publication list, research statement, references at a later stage.
To submit your application please email: **marco.mondelli@ist.ac.at**

* This position comes with possible overpayment depending on education, qualification and work experience. IST Austria processes your personal data in accordance with the law. For more information, please refer to www.ist.ac.at/data-protection.

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