



Universität Konstanz

Logic in Konstanz

Invitation

Silvia De Toffoli

(University School for Advanced Studies IUSS Pavia – Department of Philosophy)

What mathematical explanation need not be (joint work with Elijah Chudnoff)

The talk will take place
on **Monday, 26.05.2025** at **15:15** in room **F426**.

All interested are welcome to attend.

Abstract: Recent works in the philosophy of mathematical practice and mathematical education have challenged orthodox views of mathematical explanation by developing Understanding-first accounts according to which mathematical explanation should be cashed out in terms of understanding. In this talk, I will explore two arguments that might have motivated this move, (i) the context-sensitivity argument and (ii) the inadequacy of knowing why argument. I will show that although these arguments are derived from compelling observations, they ultimately rest on a misunderstanding of what Explanation-first accounts are committed to and an underestimation of the resources available to them. By clarifying the terms at play in the debate and distinguishing different objects of evaluation, I will show that the insightful observations about practice and education made by challengers to the orthodoxy are in fact best accounted for within the traditional Explanation-first framework.

Carolin Antos, Salma Kuhlmann
Coordinators of the Logic Colloquium