

## **CALL FOR APPLICATIONS - PhD Position & Postdoc Position in History of Modern Logic and History of Logical Empiricism (both 3 years, fully funded), University of Vienna**

The Department of Philosophy at the University of Vienna is inviting applications for the positions of a PhD candidate (fully funded, 75%, equivalent to 30 hours/week; 3 years) and a Postdoctoral researcher (fully funded, 100%, equivalent to 40hours/week, 3 years) within the project “*The Formal Turn – The Emergence of Formalism in Twentieth-Century Thought*”. <https://formalism.phl.univie.ac.at/>

This is a five-year Consolidator Grant project (2022-2027) funded by the European Research Council and led by Georg Schiemer, Professor at the Department of Philosophy.

### Project Description:

The philosophy of science and logic underwent a wide-ranging *formal turn* in the first half of the twentieth century. This shift is characterized by a new emphasis on formal methods and the adoption of a general formalist viewpoint towards the disciplines in question. Roughly put, formalism presented a novel methodological and epistemological stance: it is characterized by the use of non-representational forms of reasoning as well as the focus on the purely structural features of a field of inquiry, studied in abstraction from its traditional subject matter and from considerations about meaning or interpretation. As such, the position was often linked to a new understanding of the nature of scientific objectivity and rigor. Moreover, formalist positions not only dominated research at the time, but also led to fundamentally revised conceptions of logic, mathematics, and the philosophy of the exact sciences, determining the shape of these disciplines today.

The project will give a comparative study of early contributions to formalism in twentieth-century thought. This general objective will be addressed in terms of three interrelated subprojects. The first subproject is historical in character and aims at a historical reconstruction of the emergence of formalist thinking in nineteenth-century mathematics and neo-Kantian philosophy of science. On the mathematical side, the project will retrace several methodological developments in geometry, symbolic algebra, and number theory in the nineteenth century that contributed to a formalist conception of these fields. Regarding its philosophical roots, the focus will be on contributions to a formalist notion of scientific objectivity in the work of the Marburg school of neo-Kantianism. The second subproject will give a comparative study of the formal turn in logic and the philosophy of logical empiricism between 1920 and 1940. This includes research on the foundations of mathematics and the formality of logic by members of the Göttingen school as well as central contributions to a scientific formalism in logical empiricism. The third subproject will analyze the philosophical implications of the formal turn for the subsequent shaping of these fields. The emergence of formalist thinking was closely related to the development of new theories of semantics in logic and philosophy. The aim will therefore be to connect the early contributions to formalism with contemporary debates on the philosophy of model theory and inferentialism as well as with the logical study of scientific theories.

### Job Description:

The PhD candidate and the Postdoctoral researcher will conduct research on the history of modern logic and the history of philosophy of science and mathematics in Logical Empiricism, as related to subprojects (2) (“*Formality in early twentieth-century logic*”) and

(3) (“*Scientific formalism in Logical Empiricism*”) of the ERC project. Potential research areas include (but are *not* limited to):

- Hilbert’s work on the foundations of mathematics and the Göttingen school of logic
- Philosophical aspects of Hilbert’s program
- Early contributions to metalogic: model theory and proof theory (Hilbert, Bernays, Gödel, Gentzen, etc.)
- “General axiomatics” and the metatheory of axiomatic systems (Tarski, Lindenbaum, Carnap, etc.)
- Early contributions to the “logic of science” and formal theory reconstruction in Logical Empiricism.
- Contributions to the philosophy of logic and mathematics in the Vienna Circle (Rudolf Carnap, Hans Hahn, Karl Menger, Felix Kaufmann, etc.)

Both candidates will carry out research in one of these fields (or a related field), the PhD candidate will write a doctoral thesis under the supervision of Georg Schiemer.

The PhD and Postdoctoral researcher are expected to present the results of their research at workshops and international conferences. They are also expected to assist the PI in the organization of local workshops and/or conferences related to the ERC project.

The positions come without teaching obligations. No German language competency is required.

Extent of Employment: 30 hours/week for the PhD candidate; 40 hours/week for the Postdoctoral researcher.

Job grading in accordance with collective bargaining agreement: <https://personalwesen.univie.ac.at/en/jobs-recruiting/job-center/salary-scheme/>

The pay grades for both positions will depend on previous work experience of the applicants.

#### Requirements:

The successful candidates will have a PhD (for the Postdoctoral position) or a Master’s degree (for the PhD position) in philosophy. If the PhD applicant does not yet have a Master’s degree at the time of the application, she/he can submit a letter by the university confirming that the MA thesis has been submitted.

Successful candidates for the positions will have demonstrable competence in one of the research areas outlined in the job description. The postdoctoral candidate will also have accepted or submitted contributions in international peer-reviewed journals and a strong research track record.

#### Application:

Applications must include a CV, copies of degree certificates, a description of planned research (500-1000 words), as well as a writing sample. Letters of reference are not required. Applications should be sent as a single PDF file (max. 4 MB) by email to: [florian.kolowrat@univie.ac.at](mailto:florian.kolowrat@univie.ac.at)

The deadline for the application is May 31, 2023. The expected starting date for both positions is October 1, 2023 (a later starting date is possible in exceptional cases).

For further questions, please contact Georg Schiemer ([georg.schiemer@univie.ac.at](mailto:georg.schiemer@univie.ac.at)) or visit the project website: <https://formalism.phl.univie.ac.at>

The University pursues a non-discriminatory employment policy and values equal opportunities, as well as diversity (<http://diversity.univie.ac.at/>). The University lays special emphasis on increasing the number of women in senior and in academic positions. Given equal qualifications, preference will be given to female applicants.