

Fully-funded PhD position in Quantum Thermodynamics at Trinity College Dublin

A PhD position is available at Trinity College Dublin in the group of Prof. Felix Binder, to start in September 2023 or earlier. The position is fully-funded, including tuition fees, a monthly stipend, and access to travel funding.

Quantum Information Theory group

The Quantum Information Theory group at Trinity College Dublin currently consists of two PhD researchers, three postdoctoral fellows and the group leader Prof. Felix Binder. Our research interests span quantum information theory, quantum thermodynamics, and complexity science. The group maintains a collaborative approach to science and an active international collaboration network.

Possible PhD topics include the thermodynamics of quantum information processing in the presence of temporal correlations, and quantum models for discrete-time quantum stochastic processes.

More information about the group:

<https://www.tcd.ie/Physics/research/groups/quantum-information-theory-group/>

Location

The candidate will join a new interdisciplinary Quantum Centre at Trinity College Dublin. Trinity is Ireland's premier university located in the centre of the Irish capital. Dublin is the heart of Ireland's unique culture, sport, and music, and boasts beautiful beaches and highlands just beyond the city limits. The student will also benefit from additional training and professional development via the [MSc in Quantum Science and Technology in the School of Physics](#). The School of Physics itself is home to 28 academic staff, 50 postdoctoral fellows and over 100 postgraduate students. There will be numerous opportunities to interact and collaborate with other researchers in the School working on quantum science.

Prerequisites

Prospective applicants should have a strong background in quantum physics and mathematics and some experience in (quantum) information theory, and/or quantum thermodynamics. Enthusiasm and a pro-active approach to research are essential.

How to apply

To apply, please get in touch directly with Felix Binder (felix.binder@tcd.ie) with a personal statement, a copy of your CV, including the contact details of two references, and up-to-date academic transcripts.

Diversity begets creativity, and our goal is to build a diverse team of researchers in order to find creative solutions to some of the most challenging problems in quantum physics. Women and members of other underrepresented groups are therefore strongly encouraged to apply.

Applications will be evaluated mid January or until a suitable candidate has been found.