



NANO OPTICS

HUMBOLDT-UNIVERSITÄT ZU BERLIN



## PhD position in quantum optics

The Nano Optics group at the Institute for Physics of the Humboldt-University in Berlin is offering a PhD Position in the field of quantum optics.

The Federal Ministry of Education and Research (BMBF) is funding a project working towards the realization of a quantum repeater. Hybrid technologies are an important tool, which combine the advantages of natural atoms (e.g. neutral cesium atoms) and artificial atoms (e.g. semiconductor quantum dots).

### Tasks/aims:

- Conducting experiments in which semiconductor quantum dots are stabilized to atomic wavelengths
- Experimental work on the realization of a hybrid quantum system consisting of natural and artificial atoms
- Experimental work on the conversion of the near infrared, single photons into the telecommunications range

### Qualifications:

- Completed university degree (Masters or equivalent) in physics or a related field
- Prior knowledge in one of these areas is required: optics, nonlinear optics, quantum optics, atomic physics
- Experience in experimental work in an optics lab
- Highly motivated, team player, also willing to conduct scientific work independently
- Proficient in English

The Humboldt University is an equal opportunity employer committed to increasing participation of women wherever they are underrepresented. The Humboldt University is committed to employing more handicapped individuals and especially encourages them to apply.

### Please refer questions to:

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Please send applications and additional information (letter of motivation, CV, references, grades) preferably within a combined PDF file to:

### Prof. Dr. Oliver Benson

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