

The opportunity

Two postdoctoral research positions are open for candidates interested in developing and validating an innovative hyperspectral camera for histologic and clinical retinal imaging using new bioengineering technologies employing optics and electronics.

Applicants with strong background, expertise, and interests in one or more of the following areas: imaging, optics, autofluorescence, lasers, laser-scanning microscopy, analog and digital electronics, optics, optical coherence tomography, signal and image processing, and microscopy will be considered.

The positions will be 75%-100% for the duration of the research project (aim: 36 months). Compensation will be commensurate with experience.

The projects are partly funded by the German Federal Ministry of Education and Research (BMBF) under the VIP+ program.

Qualifications

The following qualifications and skills are required:

- Ph.D. in physics, applied physics, biomedical engineering, or other relevant discipline.
- The candidates must have demonstrated a strong background in one of the above areas, as evidenced by publications; and being able to work both independently and in an interdisciplinary international team.
- Candidates with broad expertise in experimental optics in biomedical applications are preferred. Skills in high-level programming and optical simulation software (e.g., Zemax OpticStudio, C++, Python, Matlab) are also advantageous.
- Strong communication in basic German and English.

How to apply

Interested applicants should submit, via e-mail in pdf format, the following:

- Cover letter outlining how qualification requirements are met
- Updated curriculum vitae
- Contact information for two references
- Copies of up to three publications from previous research on which the applicant has made significant contribution (e.g., first author).

Please send your application (one pdf) to Dr Thomas Ach: thomas.ach@ukbonn.de

First interviews will take place online. Applications will be reviewed on a rolling basis until the position is filled.