

Multidisciplinary project:

Automatic Micro-Injection Mechanism

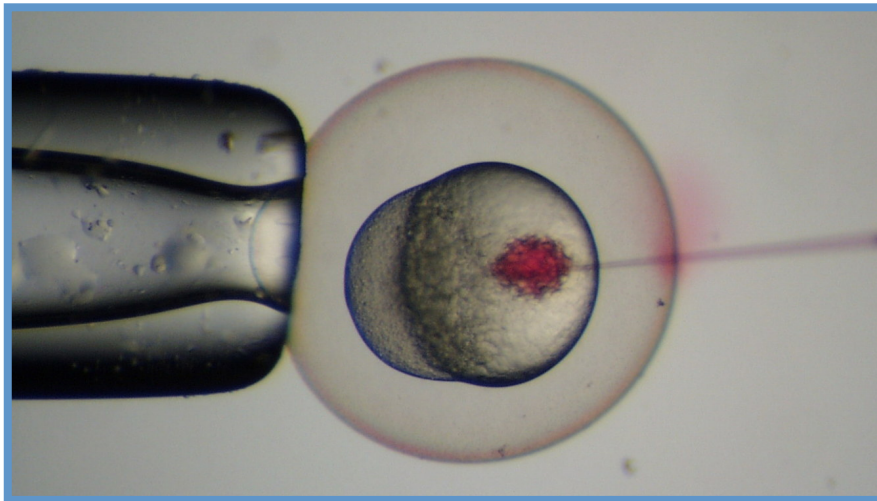
Project Type: Student project (Master thesis, Bachelor thesis, Semester project)

Hiwi possibility: Conditional

Host: Klinikum Rechts der Isar – Ophthalmology Department

Supervisor: Prof. Dr. –Ing Alois Knoll, Prof. Dr. Dr. –Med Chris P. Lohmann

Advisor: M. Ali Nasser



A one-cell zebrafish embryo being micro-injected into the yolk with RNA (mixed with a red dye).
David Mawdsley, Heath Lab

This is a medically driven project, which addresses a clinical challenge in broad range of clinical procedures. The aim is to design, develop and prototype a system to perform automatic injection of drugs. Embedded system knowledge both in hardware design and programming are needed. Robotics and image processing knowledge is a plus for performing this project.

The student will work at Klinikum Rechts der Isar, with a team of researchers from different disciplines (medicine, mechanical engineering, robotics, software engineering, image processing and medical imaging).

For more information and arrange a personal visit please contact ali.nasser@mri.tum.de