Tutorial: Photogrammetric Methods in the Machine Vision Industry

**Presenters**: PD Dr.-Ing. Markus Ulrich (MVTec Software GmbH, Munich, Germany)

**Content**: Machine vision is a key technology in the industrial manufacturing process and is used primarily for automation and quality assurance. For accurate and robust measurements in 2D and 3D sensor data in machine vision applications, photogrammetric methods must be adapted to industry-specific conditions and requirements. This is illustrated by three selected examples: camera calibration, hand-eye calibration, and object recognition in robotics. The tutorial is complemented by several real-world machine vision applications.

**Target group**: PhD students/researchers/practitioners

**Level**: ~~beginner~~/**intermediate**/~~experts~~

**Duration**: half-day/~~full-day~~