

## Master Thesis

# Photogrammetrical measurements of freeform- surfaces in automotive



### Motivation

Ambient lighting of automotive interior as well as displaying information on given surfaces inside a car are state of the Art. In order to ensure a distortion-free representation of an image, the geometry and structure of a given surface must first be measured and described.

### Task

After completing your literature research in the field of photogrammetry, you will use the photogrammetric approaches and methods to capture and characterize a given geometry. The resulting data must then be evaluated and used to transform images and pictograms so that they can be projected onto the surface of the geometry without distortion..

### Prerequisite

Good knowledge of MATLAB, an interest in lighting and automotive lighting and an independent and creative way of working.

### We offer

Comprehensive support while induction and editing  
Relaxed working atmosphere with nice colleagues  
Cooperation with partners from industry might be possible

### Optical Technologies in automotive

### Orientation

Hands-on,  
algorithms

### For

Electrical  
Engineering and IT,  
Computer science and  
other related

### Entry Date

From now on

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