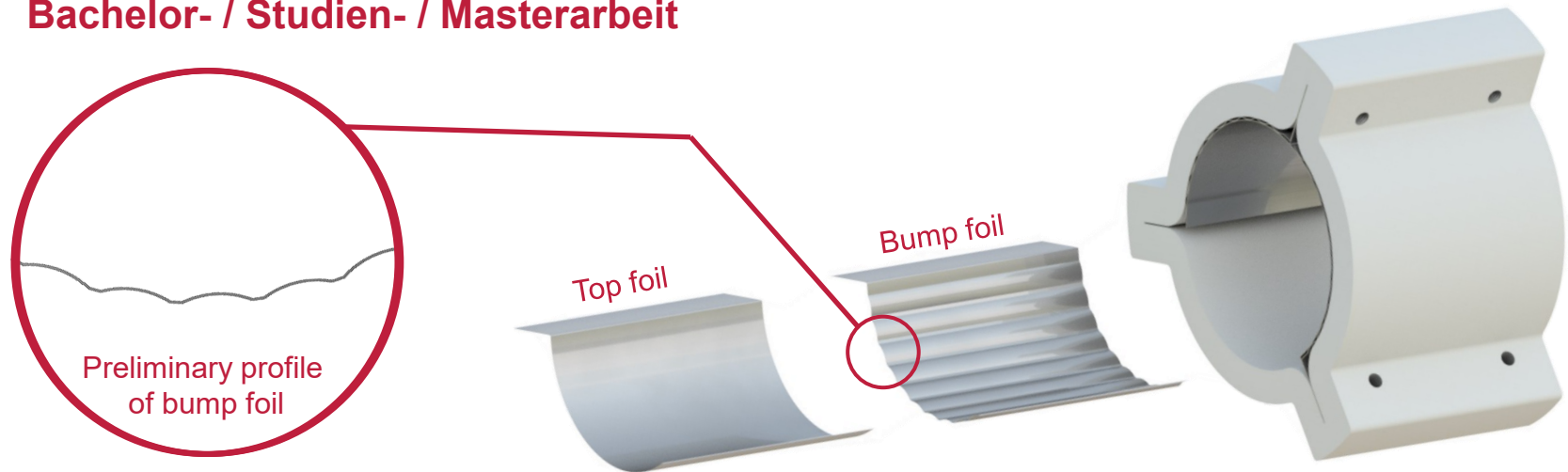


Advancing Gas Foil Bearing (GFB) Performance through Precision Foil Manufacturing Techniques

✓ Bachelor- / Studien- / Masterarbeit



Proper manufacturing of foils for gas foil bearings is crucial for optimal bearing performance, reliability, and efficiency. The challenge lies in achieving precise geometries, consistent material properties, and surface finishes that can withstand high-speed, high-temperature environments.

Key Tasks:

- Investigating advanced cutting techniques for precise foil dimensions and edge quality
- Optimizing forming processes to achieve uniform bump geometry and spring characteristics
- Exploring surface treatment methods to enhance wear resistance and tribological properties

Contact: M. Sc. Nikita Zuravliov
nikita.zuravliov@tu-braunschweig.de
Tel.: 391-8072, Room 116A