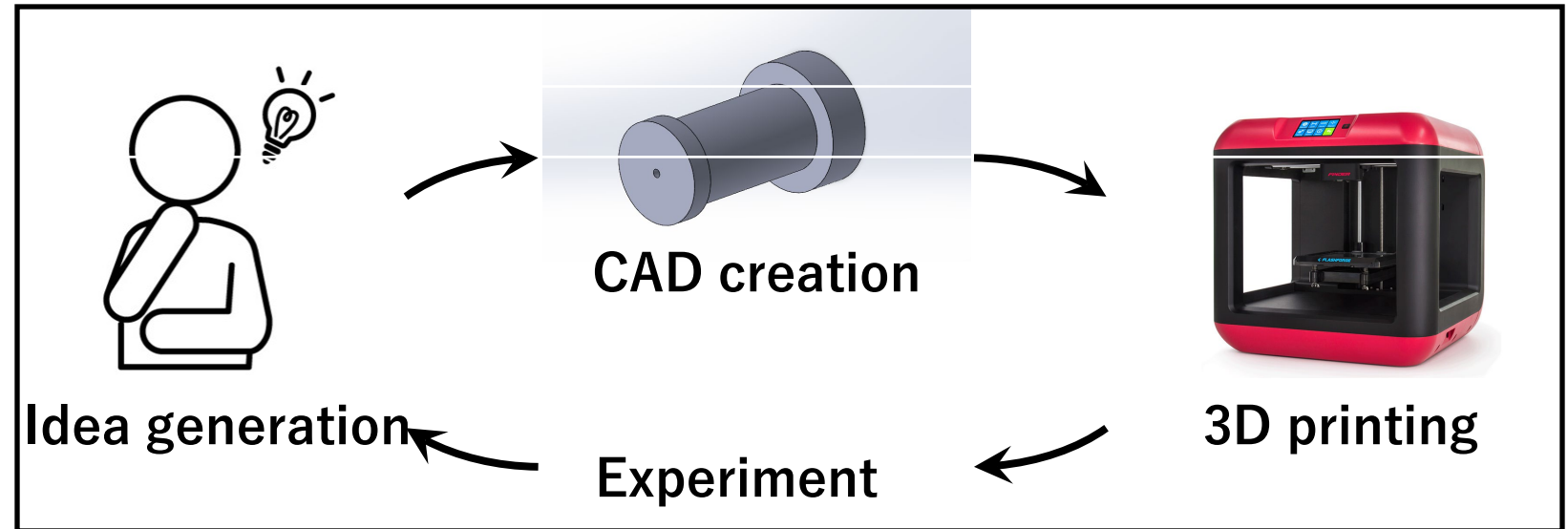
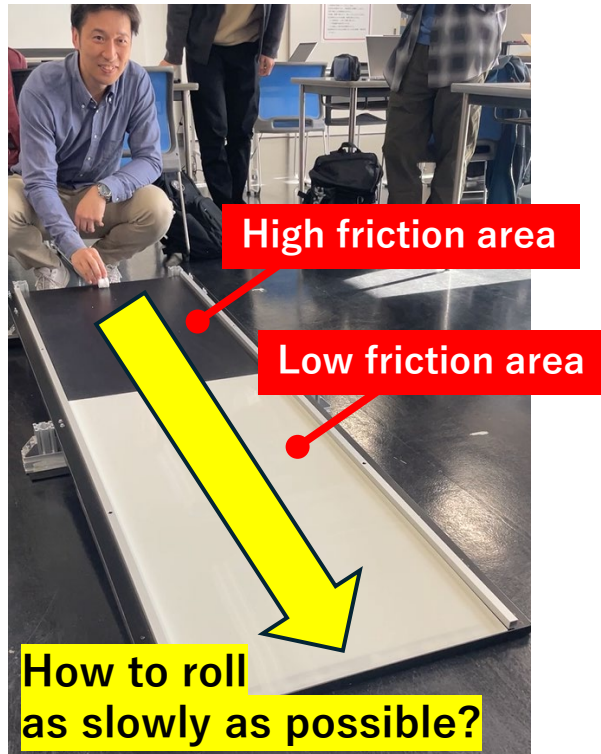


# Rolling Design: Build and Race Your Own Slope-Rolling Object

1. Instructors: ○Associate Professor Toshiaki Nishi (TEL 022-795-6897 toshiaki.nishi.b3@tohoku.ac.jp)  
Assistant Professor Arata Ishizako (TEL 022-795-6897 arata.ishizako.a1@tohoku.ac.jp)  
Professor Takeshi Yamaguchi (TEL 022-795-6897 takeshi.yamaguchi.c8@tohoku.ac.jp)
2. Capacity: 10 students
3. Schedule: Second semester, Monday, 5th period
4. Monday, October 6th, 16:20 (Graduate School of Engineering, A01 2F 203)
5. Course Overview: In this course, students will learn about the motion of objects sliding or rolling down a slope, and creatively design the shape and structure of objects that can descend the slope more slowly. They will fabricate their designs using 3D CAD and 3D printers. A midterm presentation on the design will be held during the course, followed by a final competition. Through these activities, students will gain hands-on experience with digital fabrication technologies and deepen their understanding of the mechanics and motion of objects descending slopes. Additionally, the course aims to provide practical experience in the iterative process of design, fabrication, and evaluation, which are essential parts of manufacturing.



**Presentation & Competition**