Special Issue

Integrating Robotics into High-Accuracy Industrial Operations

Message from the Guest Editor

Robotic technology has witnessed significant advancements in recent years, making it increasingly capable of handling complex tasks with high accuracy and precision. This makes them well-suited for applications where accuracy is of the utmost importance, such as precision machining, assembly, measurement, and quality control. Robots have become a key driving force for enhancing production efficiency, ensuring product quality, and catalyzing innovation in the industrial sector. This Special Issue aims to explore the cutting-edge advancements, challenges, and solutions pertaining to robotics technology in high-accuracy industrial operations. We encourage the submission of original research articles, reviews, and short communications focused on precision machining, assembly, measurement, quality control, etc. Keywords:

- precision engineering
- industrial robots
- high-accuracy robotic applications
- human–robot interaction
- high-accuracy robotic machining
- robotic quality control
- robots positioning accuracy and repeatability
- artificial intelligence in industrial robotics
- sensors in robotic systems

Guest Editor

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About the Journal

Message from the Editor-in-Chief

It is my great pleasure to welcome you to our open access journal, *Robotics*, which is dedicated to both the foundations of artificial intelligence, bio-mechanics and mechatronics, and the real-world applications of robotic perception, cognition and actions. The 21st century is the robotics century and intelligent robots will change our lifestyle forever. Let us work together toward the realization of intelligent robots step by step.
It is great fun to create intelligent robots and imagine their practical applications. *Robotics* is now ready to serve you in the long journey towards such a goal.

Editor-in-Chief

Prof. Dr. Marco Ceccarelli
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