Visual Servoing-Based Robotic Manipulation

Guest Editor:

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Message from the Guest Editor

Dear Colleagues,

Visual servoing is an important area of research in robotics, driven by advancements in computer vision, machine learning and sensor technologies. As robots become increasingly autonomous and capable of executing complex tasks, the ability to accurately perceive and interact with their environment becomes indispensable. Visual servoing provides a powerful framework for achieving precise control and manipulation in dynamic and uncertain environments. Robots equipped with visual servoing capabilities excel in tasks such as pick-and-place operations, assembly and manipulation, and are applied across various domains, including industrial automation, healthcare and service robotics. Despite the development of general-purpose visual servoing methods, the specific requirements of different applications often necessitate specialized approaches. These requirements are influenced by variations in tasks, environmental conditions and the unique challenges inherent in each application domain.

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Special Issue

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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.

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