Dr. Dipankar Bhattacharya

Robotics & Control Systems Expert

🏆 **Marie Skłodowska-Curie Fellow**

📍 Imperial College London | 🔬 Dyson School of Engineering

🎯 Cable-driven Soft Exoskeletons for Rehabilitation

15+ Publications

5+ Countries

10+ Projects

🔬 Research Domains

Medical Robotics

Soft esophagus modeling, Stent testing, Rehabilitation robotics, Exoskeletons

Cable-Driven Robotics

Parallel robots, Cable wrapping, Growing vine robots, Soft mechanisms

Industrial Automation

Fabric manipulation, Garment production, Physics-based control

AI & Learning

Imitation learning, Iterative control, Predictive models, Deep learning

🛠️ Technical Expertise

🤖 Robotics

Cable-driven robots • Soft robotics • Mechatronics • Control systems • Manipulation

💻 Programming

PyTorch • Python • MATLAB • ROS • LabVIEW • Gym • Assembly • C

🎨 Design

Blender • SOLIDWORKS • Inventor • Inkscape • 3D modeling • CAD

🔧 Hardware

Raspberry Pi • Arduino • myRIO • Microprocessors • Embedded systems

🧠 Machine Learning

Deep learning • Imitation learning • Physics-based modeling • Neural networks

📝 Research

Scientific writing • LaTeX • Grant proposals • Mentorship • Teaching

📅 Career Milestones

Nov 2025 - Present

Marie Skłodowska-Curie Fellow

Imperial College London, UK

May 2025 - Oct 2025
Senior Research Engineer - Control Systems
Center for Transformative Garment Production

Jul 2024 - Oct 2025
Visiting Research Associate
Hong Kong University

Mar 2021 - Jun 2024
Postdoctoral Fellow
Chinese University of Hong Kong

Oct 2021 - Jan 2022
Visiting Postdoctoral Fellow
École Centrale de Nantes, France

Aug 2016 - Apr 2021
Ph.D. in Mechatronics Engineering
University of Auckland, New Zealand

2017 - 2020
Graduate Teaching Assistant
University of Auckland

Jul 2013 - Jun 2016
Lecturer (Assistant Professor)
Galgotia's University, India

Academic Qualifications

Ph.D. in Mechatronics Engineering
The University of Auckland, New Zealand
2016 - 2021

M.Tech in Systems and Control
Indian Institute of Technology (IIT)
2011 - 2013
GPA: 8.4/10.0

B.Tech in Electronics and Communication
NERIST
2004 - 2010
GPA: 9.1/10.0

Research Focus: Advancing robotics for healthcare and industry through innovative control systems and AI

Current Project: CASREx - Cable-driven Soft Exoskeletons for Rehabilitation