

# Preface

Machine Learning and Deep Learning Techniques for Cybersecurity Risk Prediction and Anomaly Detection delves into the transformative role of artificial intelligence in enhancing cybersecurity strategies. As cyber threats become increasingly sophisticated, traditional defense mechanisms often fall short, making AI-driven solutions essential for effective threat detection and risk management. This book provides an in-depth exploration of machine learning and deep learning techniques, offering practical insights into their application for predicting cybersecurity risks, detecting anomalies, and strengthening digital defenses. Through real-world case studies and comprehensive discussions on various AI methodologies, it equips cybersecurity professionals, researchers, and students with the tools to address contemporary security challenges and stay ahead in the dynamic cybersecurity landscape.