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Nota di contenuto	Preface -- Acknowledgement -- 1 A Systematic Literature Review on Cyber Security Threats of Industrial Internet of Things 1 Ravi Gedam and Surendra Rahamatkar -- 1.1 Introduction -- 1.2 Background of Industrial Internet of Things -- 1.3 Literature Review -- 1.4 The Proposed Methodology -- 1.5 Experimental Requirements -- 1.6 Conclusion -- 2 Integration of Big Data Analytics Into Cyber-Physical Systems 19 Nandhini R.S. and Ramanathan -- 2.1 Introduction -- 2.2 Big Data Model for Cyber-Physical System -- 2.3 Big Data and Cyber-Physical System Integration -- 2.4 Storage and Communication of Big Data for Cyber-Physical System -- 2.5 Big Data Processing in Cyber-Physical System -- 2.6 Applications of Big Data for Cyber-Physical System -- 2.7 Security and Privacy -- 2.8 Conclusion -- 3 Machine Learning: A Key Towards Smart Cyber-Physical Systems 43 Rashmi Kapoor, Chandragiri Radhacharan and Sung-ho Hur -- 3.1 Introduction -- 3.2 Different Machine Learning Algorithms -- 3.3 ML Use-Case in MATLAB -- 3.4 ML Use-Case in Python -- 3.5 Conclusion -- 4 Precise Risk Assessment and Management 63 Ambika N. -- 4.1 Introduction -- 4.2 Need for Security -- 4.3 Different Kinds of Attacks -- 4.4 Literature Survey -- 4.5 Proposed Work -- 4.6 Conclusion -- 5 A Detailed Review on Security Issues in Layered Architectures and Distributed Denial Service of Attacks Over IoT Environment 85 Rajarajan Ganesarathinam, Muthukumaran Singaravelu and K.N. Padma Pooja -- 5.1 Introduction

-- 5.2 IoT Components, Layered Architectures, Security Threats -- 5.3 Taxonomy of DDoS Attacks and Its Working Mechanism in IoT -- 5.4 Existing Solution Mechanisms Against DDoS Over IoT -- 5.5 Challenges and Research Directions -- 5.6 Conclusion -- 6 Machine Learning and Deep Learning Techniques for Phishing Threats and Challenges 123 Bhimavarapu Usharani -- 6.1 Introduction -- 6.2 Phishing Threats -- 6.3 Deep Learning Architectures -- 6.4 Related Work -- 6.5 Analysis Report -- 6.6 Current Challenges -- 6.7 Conclusions -- 7 Novel Defending and Prevention Technique for Man-in-the-Middle Attacks in Cyber-Physical Networks 147 Gaurav Narula, Preeti Nagrath, Drishti Hans and Anand Nayyar -- 7.1 Introduction -- 7.2 Literature Review -- 7.3 Classification of Attacks -- 7.4 Proposed Algorithm of Detection and Prevention -- 7.5 Results and Discussion -- 7.6 Conclusion and Future Scope -- 8 Fourth Order Interleaved Boost Converter With PID, Type II and Type III Controllers for Smart Grid Applications 179 Saurav S. and Arnab Ghosh -- 8.1 Introduction -- 8.2 Modeling of Fourth Order Interleaved Boost Converter -- 8.3 Controller Design for FIBC -- 8.4 Computational Results -- 8.5 Conclusion -- 9 Industry 4.0 in Healthcare IoT for Inventory and Supply Chain Management 209 Somya Goyal -- 9.1 Introduction -- 9.2 Benefits and Barriers in Implementation of RFID -- 9.3 IoT-Based Inventory Management--Case Studies -- 9.4 Proposed Model for RFID-Based Hospital Management -- 9.5 Conclusion and Future Scope -- 10 A Systematic Study of Security of Industrial IoT 229 Ravi Gedam and Surendra Rahamatkar -- 10.1 Introduction -- 10.2 Overview of Industrial Internet of Things (Smart Manufacturing) -- 10.3 Industrial Reference Architecture -- 10.4 FIWARE Generic Enabler (FIWARE GE) -- 10.5 Discussion -- 10.6 Conclusion -- 11 Investigation of Holistic Approaches for Privacy Aware Design of Cyber-Physical Systems 257 Manas Kumar Yogi, A.S.N. Chakravarthy and Jyotir Moy Chatterjee -- 11.1 Introduction -- 11.2 Popular Privacy Design Recommendations -- 11.3 Current Privacy Challenges in CPS -- 11.4 Privacy Aware Design for CPS -- 11.5 Limitations -- 11.6 Converting Risks of Applying AI Into Advantages -- 11.7 Conclusion and Future Scope -- 12 Exposing Security and Privacy Issues on Cyber-Physical Systems 273 Keshav Kaushik -- 12.1 Introduction to Cyber-Physical Systems (CPS) -- 12.2 Cyber-Attacks and Security in CPS -- 12.3 Privacy in CPS -- 12.4 Conclusion & Future Trends in CPS Security -- 13 Applications of Cyber-Physical Systems 289 Amandeep Kaur and Jyotir Moy Chatterjee -- 13.1 Introduction -- 13.2 Applications of Cyber-Physical Systems -- 13.3 Conclusion -- References -- Index.

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## Sommario/riassunto

**CYBER-PHYSICAL SYSTEMS** The 13 chapters in this book cover the various aspects associated with Cyber-Physical Systems (CPS) such as algorithms, application areas, and the improvement of existing technology such as machine learning, big data and robotics. Cyber-Physical Systems (CPS) is the interconnection of the virtual or cyber and the physical system. It is realized by combining three well-known technologies, namely "Embedded Systems," "Sensors and Actuators," and "Network and Communication Systems." These technologies combine to form a system known as CPS. In CPS, the physical process and information processing are so tightly connected that it is hard to distinguish the individual contribution of each process from the output. Some exciting innovations such as autonomous cars, quadcopter, spaceships, sophisticated medical devices fall under CPS. The scope of CPS is tremendous. In CPS, one sees the applications of various emerging technologies such as artificial intelligence (AI), Internet of Things (IoT), machine learning (ML), deep learning (DL), big data (BD), robotics, quantum technology, etc. In almost all sectors, whether it is

education, health, human resource development, skill improvement, startup strategy, etc., one sees an enhancement in the quality of output because of the emergence of CPS into the field. Audience Researchers in Information technology, artificial intelligence, robotics, electronics and electrical engineering.

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