

1. Record Nr.	UNINA9910767584103321
Titolo	Artificial Intelligence: Towards Sustainable Intelligence : First International Conference, AI4S 2023, Pune, India, September 4-5, 2023, Proceedings // edited by Sanju Tiwari, Fernando Ortiz-Rodríguez, Sashikala Mishra, Edlira Vakaj, Ketan Kotecha
Pubbl/distr/stampa	Cham : , : Springer Nature Switzerland : , : Imprint : Springer, , 2023
ISBN	9783031479977 3031479971
Edizione	[1st ed. 2023.]
Descrizione fisica	1 online resource (234 pages)
Collana	Communications in Computer and Information Science, , 1865-0937 ; ; 1907
Disciplina	060
Soggetti	Artificial intelligence Machine learning Database management Image processing - Digital techniques Computer vision Application software Artificial Intelligence Machine Learning Database Management System Computer Imaging, Vision, Pattern Recognition and Graphics Computer and Information Systems Applications Computer Vision
Lingua di pubblicazione	Inglese
Formato	Materiale a stampa
Livello bibliografico	Monografia
Nota di bibliografia	Includes bibliographical references and index.
Nota di contenuto	Intro -- Preface -- Organization -- Keynote Abstracts -- Data Analytics for Sustainable Global Supply Chains -- Building Trustworthy Neuro-Symbolic AI Systems with Explainability and Safety: Knowledge is the Key -- Contents -- An Approach Towards Mitigation of Renewable Energy Curtailment -- 1 Introduction -- 2 Test Case Modifications and Assumptions -- 2.1 Test Case and Modifications -- 2.2 Assumptions -- 3 Solution Methodologies and Cases -- 3.1 Solution

Methodology -- 3.2 Configuration of Cases -- 4 Results and Discussion -- 4.1 Results -- 4.2 Discussion -- 5 Conclusion and Future Scope -- References -- ESG and IoT: Ensuring Sustainability and Social Responsibility in the Digital Age -- 1 Introduction -- 2 Overview of ESG and Sustainability -- 2.1 Environmental, Social and Governance Impacts of IoT -- 2.2 The Contribution of Artificial Intelligence to ESG -- 2.3 Industry 4.0 and Its Potential Impact on ESG -- 3 Proposed Approach -- 3.1 Proposed Architecture -- 3.2 SAS® Intelligent Monitoring: Product Overview -- 4 Possible Applications -- 5 Future Work -- 6 Conclusion -- References -- AI and Assistive Technologies for Persons with Disabilities - Worldwide Trends in the Scientific Production Using Bibliometrix R Tool -- 1 Introduction -- 1.1 Background -- 1.2 Problem Statement -- 2 Methodology -- 2.1 Data Collection -- 2.2 Analysis -- 3 Results and Discussion -- 3.1 Production -- 3.2 Sources -- 3.3 Authors -- 3.4 Documents -- 4 Conclusion -- 4.1 Limitations and Future Research Directions -- Appendix A: -- References -- Leaf Disease Detection Using Transfer Learning -- 1 Introduction -- 2 Related Work -- 3 Model Architecture and Design -- 3.1 ResNet -- 3.2 MobileNet -- 3.3 VGG16 -- 3.4 Design Consideration -- 4 Dataset Preparation and Training -- 4.1 Kaggle Dataset: Potato, Tomato, and Pepper Black Diseases -- 4.2 Training the Models. 5 Results -- 5.1 VGG16 Model -- 5.2 ResNet Model -- 5.3 MobileNet Model -- 5.4 Performance Comparison -- 6 Conclusion -- References -- Automated Scene Recognition for Environmental Monitoring: A Cluster Analysis Approach using Intel Image Classification Dataset -- 1 Introduction -- 2 Literature Review -- 3 Data Preprocessing and EDA -- 3.1 About the Dataset -- 3.2 Data Transformation -- 3.3 Dimensionality Reduction with PCA for Improved Clustering Efficiency -- 4 Clustering Methods for Scene Recognition -- 4.1 K Means Clustering Technique -- 4.2 Agglomerative Clustering -- 4.3 BIRCH (Balanced Iterative Reducing and Clustering Using Hierarchies) -- 4.4 DBSCAN (Density Based Spatial Clustering of Applications with Noise) -- 4.5 Spectral -- 5 Evaluation of Clustering Algorithms -- 5.1 Silhouette Score -- 5.2 Davis-Bouldin Score -- 5.3 Calinski-Harabasz Score -- 6 Conclusion and Future Scope -- References -- Unveiling the Potentials of Deep Learning Techniques for Accurate Alzheimer's Disease Neuro Image Classification -- 1 Introduction -- 2 Literature Survey -- 3 Methodology -- 4 The Proposed Bi-LSTM-AJSO Model Development -- 5 Experimentation -- 5.1 Datasets Used and Model Training and Testing -- 5.2 Comparison with Other Machine and Deep Learning Approaches -- 5.3 Execution Time Comparisons -- 5.4 Interpretability Analysis and Significance -- 6 Conclusion and Future Directions -- References -- Food Composition Knowledge Extraction from Scientific Literature -- 1 Introduction -- 2 Food Composition Knowledge -- 3 Food Composition Knowledge Extraction from Scientific Papers -- 3.1 Knowledge Sources -- 3.2 Knowledge Extraction -- 4 Knowledge Validation -- 4.1 Matching to Existing Vocabularies -- 5 Conclusion -- References -- Design and Analysis of an Algorithm Based on Biometric Block Chain for Efficient data sharing in VANET -- 1 Introduction. 2 Literature Review -- 3 Proposed Work -- 4 Experimental Result -- 5 Conclusion -- References -- An Improved Deep Learning Model Implementation for Pest Species Detection -- 1 Introduction -- 2 Related Work -- 3 Methodology -- 3.1 Dataset -- 3.2 Deep Learning -- 3.3 Data Augmentation -- 3.4 Model Architecture -- 3.5 Classification -- 4 Results -- 5 Conclusion -- References -- Identification of Diseases Affecting Mango Leaves Using Deep Learning Models -- 1

Introduction -- 2 Literature Survey -- 2.1 Disease Affecting Mango Leaves -- 2.2 Factor Influencing Fungal Diseases -- 3 Dataset Description -- 4 Methodology -- 4.1 Feature Extraction -- 4.2 Classification -- 4.3 Model Evaluation -- 4.4 Prediction -- 5 Results and Discussion -- 6 Conclusion -- References -- RWNDR: Radial Basis Feed Forward Neural Network Driven Semantically Inclined Strategy for Web 3.0 Compliant News Recommendation -- 1 Introduction -- 2 Related Works -- 3 Proposed Architecture -- 4 Implementation -- 5 Results and Performance Evaluation -- 6 Conclusion -- References -- WDNRegClass - A Hybrid ANN + Bayesian Learning Model to Reduce Temporal Predictive In-Variance Towards Mitigation of WDN Revenue Losses -- 1 Introduction -- 2 Literature Study -- 2.1 Leak Identification Using Hydraulic Model Parameters: -- 2.2 Data-Driven Approaches with Sequential or Temporal Data: -- 2.3 The Integration of Bayesian Belief Propagation: -- 3 Proposed Work -- 4 Result and Discussion -- 5 Conclusion -- References -- Real-Time Birds Shadow Detection for Autonomous UAVs -- 1 Introduction -- 2 Related Work -- 3 Proposed Approach -- 3.1 Acquiring a Sample Dataset -- 3.2 Shadow Generation -- 3.3 Data Cleaning -- 3.4 Post-processing -- 3.5 Detection Model Training -- 4 Results and Discussion -- 5 Conclusion -- References.

Knowledge Graph for Fraud Detection: Case of Fraudulent Transactions Detection in Kenyan SACCOs -- 1 Introduction -- 2 Related Work -- 3 Proposed Approach -- 4 Results -- 4.1 Sample Fraudulent Funds Movement Detection -- 5 Conclusion and Future Work -- References -- Conceptual Framework for Representing Knowledge in the Energy Sector -- 1 Introduction -- 2 State of the Art -- 3 Methodology for Semantic Data Model Design and Construction -- 3.1 Step 1: Ontology Requirements Specification -- 3.2 Step 2: Ontology Analysis -- 3.3 Step 3: Overview of Ontological Modules -- 3.4 Step 4: Interaction with Stakeholders and Ontology Formalization -- 4 Overview of Main Pilots' Topics -- 5 Methodology Application -- 5.1 Application of Step 1 - Ontology Requirements Specification -- 5.2 Application of Step 2 - Ontology Analysis -- 5.3 Application of Step 3 - Overview of Ontological Model -- 5.4 Application of Step 4 - Formalization of Semantic Data Models -- 5.5 Use Case Instantiation with an Illustrative Example -- 6 Discussion -- 7 Conclusion -- References -- Semantic Carbon Footprint of Food Supply Chain Management -- 1 Introduction -- 2 Ontology Methodology -- 2.1 Ontology Requirements Specification -- 2.2 Competency Questions -- 2.3 Users -- 2.4 Intended Use -- 3 Ontology Design -- 3.1 Data Sources -- 3.2 Evaluation -- 4 Conclusion -- References -- Author Index.

Sommario/riassunto

This book constitutes the proceedings of the First International Conference, AI4S 2023, held in Pune, India, during September 4-5, 2023. The 14 full papers and the 2 short papers included in this volume were carefully reviewed and selected from 72 submissions. This volume aims to open discussion on trustworthy AI and related topics, trying to bring the most up to date developments around the world from researchers and practitioners.