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Collana	Lecture Notes in Artificial Intelligence, , 2945-9141 ; ; 13191
Disciplina	005.115
Soggetti	Artificial intelligence Computer engineering Computer networks Compilers (Computer programs) Computer science Machine theory Artificial Intelligence Computer Engineering and Networks Compilers and Interpreters Computer Science Logic and Foundations of Programming Formal Languages and Automata Theory
Lingua di pubblicazione	Inglese
Formato	Materiale a stampa
Livello bibliografico	Monografia
Note generali	Includes index.
Nota di contenuto	Embedding Models for Knowledge Graphs Induced by Clusters of Relations and Background Knowledge -- Fanizzi Automatic Conjecturing of P-Recursions Using Lifted Inference -- Machine learning of microbial interactions using Abductive ILP and Hypothesis Frequency/Compression Estimation -- Answer-Set Programs for Reasoning about Counterfactual Interventions and Responsibility Scores for Classification -- Reyes Synthetic Datasets and Evaluation Tools for Inductive Neural Reasoning -- Using Domain-Knowledge to Assist Lead Discovery in Early-Stage Drug Design -- Non-Parametric Learning of Embeddings for Relational Data using Gaifman Locality Theorem -- Ontology Graph Embeddings and ILP for Financial Forecasting --

Transfer learning for boosted relational dependency networks through genetic algorithm -- Online Learning of Logic Based Neural Network Structures -- Programmatic policy extraction by iterative local search -- Mapping across relational domains for transfer learning with word embeddings-based similarity -- A First Step Towards Even More Sparse Encodings of Probability Distributions -- Feature Learning by Least Generalization -- Learning Logic Programs Using Neural Networks by Exploiting Symbolic Invariance -- Learning and revising dynamic temporal theories in the full Discrete Event Calculus -- Human-like rule learning from images using one-shot hypothesis derivation -- Generative Clausal Networks: Relational Decision Trees as Probabilistic Circuits -- A Simulated Annealing Meta-heuristic for Concept Learning in Description Logics. .

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## Sommario/riassunto

This book constitutes the refereed conference proceedings of the 30th International Conference on Inductive Logic Programming, ILP 2021, held in October 2021. Due to COVID-19 pandemic the conference was held virtually. The 16 papers and 3 short papers presented were carefully reviewed and selected from 19 submissions. Inductive Logic Programming (ILP) is a subfield of machine learning, which originally relied on logic programming as a uniform representation language for expressing examples, background knowledge and hypotheses. Due to its strong representation formalism, based on first-order logic, ILP provides an excellent means for multi-relational learning and data mining, and more generally for learning from structured data.

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