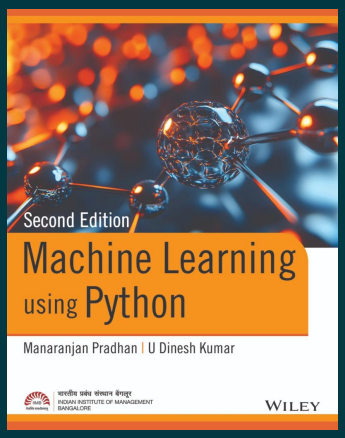

Machine Learning using Python, 2ed

By Manaranjan Pradhan, U Dinesh Kumar

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Description

Machine Learning using Python offers a comprehensive foundation in machine learning, blending theoretical concepts with practical applications. It is ideal for beginners and aspiring professionals, covering all essential topics to build a strong foundation in machine learning. The book begins with python language basics, statistics, probability, and exploratory data analysis, and then progresses to supervised learning techniques like linear and logistic regressions, decision trees, KNN, SVM, random forests, boosting, stacking, recommender systems, and text analytics. It also explores unsupervised learning techniques such as clustering, anomaly detection, and dimensionality reduction.

The book also addresses advanced topics like ML explainability and MLOps, including model interpretation, deployment, and monitoring. Each chapter includes real-world use cases and step-by-step Python implementations using libraries like Pandas, NumPy, Matplotlib, Seaborn, and Sci kit-learn. The content reflects over 15 years of teaching experience of the authors in institutions like IIM Bangalore and ISB Hyderabad.

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