

Processing Big Medical Data with Machine Learning Algorithms for Prediction and Diagnosis of Cardiovascular Diseases

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The thesis explores the use of big medical data and machine learning algorithms for prediction and support in diagnosing cardiovascular diseases. The methodology includes preparing and processing a dataset, cleaning and analysing the data, selecting and applying machine learning models, and evaluating their performance through relevant measures of accuracy and precision. The research demonstrates the value of a data-driven approach for identifying patterns that are difficult to detect using traditional methods. The conclusions indicate that appropriately processed medical data and properly selected models can contribute to more informed clinical decision-making, earlier risk identification, and the development of more personalised healthcare solutions.

Keywords: Big data · Machine learning · Cardiovascular diseases