

Breast Cancer Diagnosis Using Adaptive Voting Ensemble Machine Learning Algorithm

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Abstract: According to Breast Cancer Institute (BCI), Breast Cancer is one of the most dangerous type of diseases that is very effective for women in the world. As per clinical expert detecting this cancer in its first stage helps in saving lives. As per cancer.net offers individualized guides for more than 120 types of cancer and related hereditary syndromes. For detecting breast cancer mostly machine learning techniques are used. We proposed adaptive ensemble voting method for diagnosed breast cancer using Wisconsin Breast Cancer database. The aim of this work is to compare and explain how logistic algorithm provide better solution when its work with ensemble machine learning algorithms for diagnosing breast cancer even the variables are reduced. There are 2 types tumours are there. One is Benign Tumour and the other is malignant in which benign Tumour is non-cancerous and the malignant is a cancer Tumour.

Keywords: Logistic Regression, SVC, Random Forest, Decision Tree, Cat Boost, KNeighbours, MLP Classifier.

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