EARLY DETECTION OF CHRONIC KIDNEY DISEASE USING MACHINE LEARNING

LITERATURE SURVEY

TEAM ID:	PNT2022TMID52708
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S NO	YEAR	AUTHOR	JOURNAL NAME	TITLE	METHODOLOGY	LIMITATIONS
1.	**2018**	**María E. Rodríguez-Ortiz, Claudia Pontillo, Mariano Rodríguez, Petra Zürbig, Harald Mischak & Alberto Ortiz**	**Scientific report**	**Novel Urinary Biomarkers For Improved Prediction Of Progressive eGFR Loss In Early Chronic Kidney Disease Stages And In High Risk Individuals Without Chronic Kidney Disease**	**Support Vector Machine**	**It does not execute very well when the data set has more sound i.e.target classes are overlapping**

2.	**2015**	**Olivier J. Wouters, Donal J. O'Donoghue, James Ritchie,Panos G. Kanavos and Andrew S. Narva**	**NIH**	**Early chronic kidney disease: diagnosis, management and models of care**	**Classifiers**	**many of the classifications themselves are based on subjective judgments, which may or may not be shared by everyone participating.**
3.	**2018**	**L.Jerlin Rubini, Dr.P.Eswaran**	**Academia**	**Generating comparative analysis of early stage prediction of Chronic KidneyDisease**	**Logistic Regression**	**assumption of linearity between the dependent variable and the independent variables**
4.	**2020**	**Chin-Chuan Shih , Chi-Jie Lu , Gin-Den Chen 1,6 and Chi-Chang Chang 7**	**MDPI**	**Risk Prediction for Early Chronic Kidney Disease: Results from an Adult Health Examination Program of 19,270 Individuals**	**C4.5(Decision tree Algorithm),ELM**	**it gives poor results for larger distinct attributes.**
5.	**2018**	**Ahmed J. Al-jaaf,Dhiya Al-Jumeily, Hussein M.Haglan,Mohamed Alloghani**	**IEEE**	**Early Prediction of Chronic Kidney Disease Using Machine Learning Supported by Predictive Analytics**	**Classifier Algorithm**	**they are largely unstable compared to other decision predictors.**

6.	**2016**	**Parul Sinha, Poonam Sinha**	**Academia**	**Comparative Study of Chronic Kidney Disease Prediction using KNN and SVM**	**Support Vector Machine, K-Nearest Neighbor**	**Doesn't work well with a large dataset.**
7.	**2021**	**Vijendra Singh , Vijayan K. Asari,Rajkumar Rajasekaran**	**MDPI**	**A Deep Neural Network for Early Detection and Prediction of Chronic Kidney Disease**	**K-Nearest Neighbor**	**Sensitive to outliers and missing values**
8.	**2019**	**S.Revathy, B.Bharathi, P.Jeyanthi, M.Ramesh**	**IJEAT**	**Chronic Kidney Disease Prediction using Machine Learning Models**	**Random Forest Algorithm,Support Vector Machine.**	**a large number of trees can make the algorithm too slow and ineffective for real-time predictions.**
9.	**2019**	**Njoud AbdullahAlmansour Hajra Fahim Syed Nuha RadwanKhayat**	**Elsevier**	**Neural network and support vector machine for the prediction of chronic kidney disease: A comparative study**	**SVM**	**Doesn't work well with a large dataset.**
10	**2021**	**Linta**	**IEEE**	**A**	**K-Means**	**K-means can**

		Antony, Sami Azam, Eva Ignatious		**Comprehensive Unsupervised Framework for Chronic Kidney Disease Prediction**	**Clustering**	**only handle numerical data.**
11.	**2021**	**Chaity Mondol,F. M. Javed Mehedi Shamrat Md. Robiul Hasan**	**MDPI**	**Early Prediction of Chronic Kidney Disease: A Comprehensive Performance Analysis of Deep Learning Models**	**O-LSTM**	**LSTMs take longer to train.LSTMs require more memory to train.LSTMs are easy to overfit.**
12.	**2021**	**Shamima Akter,Ahsan Habib**	**IEEE**	**Comprehensive Performance Assessment of Deep Learning Models in Early Prediction and Risk Identification of Chronic Kidney Disease**	**ANN**	**exploding gradient problem.RNNs cannot be stacked up.Slow and Complex training procedures. Difficult to process longer sequences**
13.	**2020**	**Guozhen Chen,Cheng**	**IEEE**	**Prediction of**	**CNN**	**Overfitting, exploding**

		uang Ding		**Chronic Kidney Disease Using Adaptive Hybridized Deep Convolutional Neural Network on the Internet of Medical Things Platform**		**gradient, and class imbalance**
14.	**2019**	**R Devika; Sai Vaishnavi Avilala; V. Subramaniyaswamy**	**IEEE**	**Comparative Study of Classifier for Chronic Kidney Disease prediction using Naive Bayes, KNN and Random Forest**	**Naives Bayes,KNN**	**All predictors (or features) are independent, rarely happening in real life.**
15.	**2018**	**Vikas Chaurasia,Saurabh Pal**	**SSRN**	**Chronic Kidney Disease: A Predictive Model Using Decision Tree**	**Decision Tree**	**Overfitting Problem.** **Expensive.** **Independency between samples.**