IJARSCT
ISSN (Online) 2581-9429
International Journal of Advanced Research in Science, Communication and Technology (IJARSCT)
Volume 2, Issue 4, May 2022
Impact Factor: 6.252

Student Performance Prediction using Support Vector Machine

Prathmesh Jadhav, Abhishek Toshniwal, Yash Golawar, Pratik Khomhane
Sinhgad College of Engineering, Pune, Maharashtra, India

Abstract: *Predicting students' academic progress is critical in a university setting for early diagnosis of at-risk pupils. The goal of this work is to offer data mining models that use classification methods based on Support Vector Machine (SVM) algorithms to forecast students' academic accomplishment after a preparatory year, as well as to select the optimal approach. Based on graduation CGPA, students' academic achievement is classified as High, Average, or Below Average, and these classifications are applied to a newly produced dataset.*

Keywords: Support Vector Machine (SVM), computer vision, neural networks, Data Mining, Error Measurement, Accuracy.

REFERENCES

[1]. M. Goyal and R. Vohra, IJCSI International Journal of Computer Science Issues, Vol. 9, Issue 2, No. 1, March 2012, "Applications of Data Mining in Higher Education."
[2]. R. Huebner, Studies in Higher Education Journal, "A study of educational data mining research," 2012.
[3]. M.S. Mythili and A.R. Mohamed Shanavas, "An Analysis of Students' Performance Using Classification Algorithms," IOSR, Journal of Computer Engineering, Volume 16, Number 1, January 2014.
[4]. S. Lakshmi Prabha and A.R.Mohamed Shanavas, "Educational data mining applications," ORAJ, Vol. 1, No. 1, August 2014.
[5]. "Data mining in course management systems: Moodle case study and tutorial," Computers & Education, vol. 51, no. 1, 2008, pp. 368-384.
[6]. S. Ayesha, T. Mustafa, A. Sattar, and M. Khan, "Data mining model for higher education system," European Journal of Scientific Research, vol.43, no.1, pp.24-29, 2010.
[7]. Z. J. Kovacic, "Early prediction of student success: Mining student enrollment data," InSITE 2010 Proceedings.
[8]. I. Milos, S. Petar, V. Mladen, and A. Wejdan, INFOTEH- JAHORINA Vol. 15, March 2016, 684.
[9]. P.Kavipriya, A Review on Predicting Students' Academic Performance Using Data Mining Techniques Earlier, International Journal of Advanced Research in Computer Science and Software Engineering, Volume 6, Issue 12, December 2016 ISSN: 2277 128X.
[10]. N. Ankita and R. Anjali, Student Performance Analysis Using Data Mining Technique, International Journal of Innovative Research in Computer and Communication Engineering, Vol. 5, Issue 1, January 2017.
[11]. P. Shruthi and B. Chaitra, Student Performance Prediction in the Education Sector Using Data Mining, Volume 6, Issue 3, March 2016, International Journal of Advanced Research in Computer Science and Software Engineering.
[12]. 2012, S.K. Yadav, B. Bharadwaj, and S. Pal. A Comparative Study of Data Mining Applications for Predicting Student Performance Vol. 1, No. 12 of the International Journal of Innovative Technology and Creative Engineering (ISSN: 2045-711),A. Mohamed Shahiria, W. Husaina, N. Abdul Rashida, "A Review on Predicting Student's Performance using Data Mining Techniques" Procedia Computer Science 72 (2015) 414 – 422, ELSEVIER. December.
[13]. K. Kohli and S. Birla, " Data Mining on Student Database to Improve Future Performance", International Journal of Computer Applications (0975 – 8887), Volume 146 – No.15, July 2016.

IJARSCT
ISSN (Online) 2581-9429
International Journal of Advanced Research in Science, Communication and Technology (IJARSCT)
Volume 2, Issue 4, May 2022
Impact Factor: 6.252

[14]. Hilal Almarabeh, "Analysis of Students' Performance by Using Different Data Mining Classifiers", International Journal of Modern Education and Computer Science (IJMECS), Vol.9, No.8, pp.9-15, 2017.DOI: 10.5815/ijmecs.2017.08.02

[15]. K. B. Eashwar, R. Venkatesan and D. Ganesh, Student Performance Prediction Using Svm, International Journal of Mechanical Engineering and Technology 8(11), 2017, pp. 649–662.