

ವಿಶ್ವೇಶ್ವರಯ್ಯ ತಾಂತ್ರಿಕ ವಿಶ್ವವಿದ್ಯಾಲಯ

("ವಿ ಟಿ ಯು ಅಧಿನಿಯಮ ೧೯೯೪" ರ ಅಡಿಯಲ್ಲಿ ಕರ್ನಾಟಕ ಸರ್ಕಾರದಿಂದ ಸ್ಥಾಪಿತವಾದ ರಾಜ್ಯ ವಿಶ್ವವಿದ್ಯಾಲಯ)

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A mini project report on

MINI PROJECT TITLE

(OPGDBA305/OPGDCC305/ OPGDST305/
OPGDAD305))

Submitted in partial fulfillment of the requirements for the of the 3rd Semester in

PG Diploma in (AI & DS/CS & CC/Big data
Analytics/Software Testing)

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2025~26

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CERTIFICATE

This is to certify that <<Student Name>> bearing <<USN>> has satisfactorily completed the Mini Project (OPGDBA305/OPGDCC305/ OPGDST305/ OPGDAD305)) entitled <<Topic Name>> in the academic year 2025-26 as prescribed by VTU 3rd Semester in PG Diploma in (AI & DS/CS & CC/Big data Analytics/Software Testing)

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DECLARATION

I, <<*Student Name*>>, student of 3rd Semester in PG Diploma in (AI & DS/CS & CC/Big data Analytics/Software Testing), bearing <<*USN*>> hereby declare that the mini project entitled” <<*Topic Name*>> “has been carried out by me under the supervision of Guides name, submitted in partial fulfillment of the requirements for the of the 3rd Semester in PG Diploma in (AI & DS/CS & CC/Big data Analytics/Software Testing), by the **Visvesvaraya Technological University, Belagavi** during the academic year 2025-2026. The report has not been submitted to any other organization for any award of degree or certificate.

Place:
Date:

Signature
Name:
USN:

ACKNOWLEDGEMENT

The “**Project Title**” would not have been complete without remarking and thanking people, who guided me, helped me and encouraged me throughout the development of this project.

I would like to utilize this opportunity to express to each and every person who made it possible for me to complete my project successfully. Thus, I would like to remark few people, whom I want to thank and express sincere gratitude.

I must express the unbound gratitude to Honorable Vice Chancellor, Registrar, Registrar (Evaluation) and Finance officer, Visvesvaraya Technological University for their support throughout the completing this project.

I convey my truthful gratitude to Department of Computer Application, Visvesvaraya Technological University, Centre for Distance and Online Education (CDOE) for providing a good infrastructure and educational support in lighting our career.

I would like to express my sincere thanks to Director, Deputy Director, Assistant Director, and Program Coordinator for their kind support in completing this project.

I take this opportunity to thank our internal project guides **Guide name, Designation, Address**, who supported me with his/her valuable inputs on this project.

I also thank all my **Teaching and non-teaching staff members**, who contributed their help and support directly or indirectly in completing this project.

Last but not the least, I thank **my parents and friends** who stood with me as a moral and encouraged me in completing the project.

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Abstract

Chapter 1

Introduction

In the following sections, a brief introduction and the problem statement for the work has been included.

1.1 Project Introduction

As estimated by John et al. in [1],The detailed review of related techniques has been given in [2, 3].

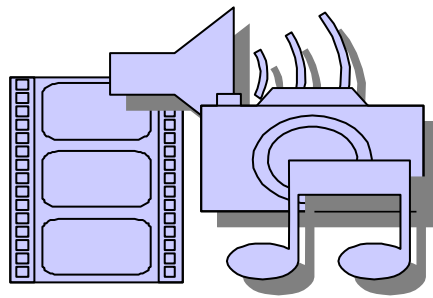


Figure 1.1 Wrapper method for feature selection

1.2 Problem Statement

The problem statement for the present work can be stated as follows:

.....

1.3 Objectives

Chapter 2

Literature Survey/ Background

In the present times, research work is going on in context ofIn this chapter some of the major existing work in these areas has been reviewed.

Chapter 3

Requirements and Methodology



Figure 4.1 Filter method for feature selection

$$RMSE = \sqrt{\frac{(p_1 - q_1)^2 + \dots + (p_n - q_n)^2}{n}} \quad (4.1)$$

Chapter 4

Software Design

Table 4.1 Pseudo code of the ABC algorithm

Input.

D - the dataset, k -the number of clusters and α -the fuzzifier

begin

1. Initialize Z by choosing k points from D randomly;
2. Initialize W with $w_{jh} = \frac{1}{d} (1 \leq j \leq k, 1 \leq h \leq d)$;
3. Estimate U from initial values of W and Z according to Eq. 2.7.
4. Let $error = 1$ and $Obj = E_{\alpha, \epsilon}(W, Z)$;
5. **while** $error > 0$ **do**
6. Update Z according to Eq. 2.6 ;
7. Update W according to Eq. 2.5;
8. Update U according to Eq. 2.7;
9. Calculate $NewObj = E_{\alpha, \epsilon}(W, Z)$;
10. Let $error = |NewObj - Obj|$, and then $Obj \leq NewObj$
11. **end while**
12. Output W , Z and U

End

Chapter 8

Conclusion and Future Work

References

- [1] N. K. Kanhere and S. T. Birchfield, “Real-time incremental segmentation and tracking of vehicles at low camera angles using stable features,” *IEEE Trans. Intell. Transp. Syst.*, vol. 9, no. 1, pp.148-160, March 2008 **(Example : Journal papers)**
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- [4] Open Source Computer Vision (OpenCV) [Online]. Accessed on 21st April 2022: <http://opencv.willowgarage.com/wiki/> **(Example : Website)**