

## DATTA MEGHE COLLEGE OF ENGINEERING, AIROLI

# **Department of Artificial Intelligence and Data Science**

	Major Project (B.E.) (Sem V/	VI)
Group members:-	Student Name1: - Onkar Indurkar Student Name2: - Gaurav Jagtap Student Name3: - Sumit Kolhe Student Name4: - Sushant Satelkar	Roll no: - 39 Roll no: - 40 Roll no: - 41 Roll no: - 55
Guide's Name:-	Prof. (Mrs.) Deepti Janjani	
Type of Project	Half Yearly	

### **PROPOSED TITLE: - Image Processing with Diffusion Models using Hugging Face**

#### **PROBLEM STATEMENT: -**

Traditional image processing techniques often fail to generate high-quality images while effectively handling noise reduction and style transfer. This project leverages Hugging Face's diffusion models in Python to enhance image processing with improved efficiency, scalability, and visual fidelity.

#### **ABSTRACT: -**

This project explores image processing using a diffuser pipeline in machine learning, leveraging Hugging Face's diffusion models for high-quality image generation and enhancement.

Implemented in Python, it focuses on noise reduction, image synthesis, and style transfer while optimizing performance and scalability. The approach integrates deep learning techniques with pre-trained models to refine, transform, and generate visually compelling images efficiently.

#### NAME AND SIGNATURE OF SUPERVISOR: -