### **Objective**

The main objective is to build an intelligent AI system that can accurately identify and provide expert-level explanations for Indian paintings. The system should act as a specialized tool for students, researchers, and art enthusiasts.

### **Purpose**

The purpose of this project is to automate the manual, time-consuming process of identifying and researching Indian paintings. It aims to provide instant, reliable information by leveraging both a machine's visual recognition capabilities and human-curated textual knowledge.

### **Need for the Project**

The project fulfills the need for a comprehensive, easily accessible tool in the niche field of Indian art history. It solves the challenge of distinguishing between different Indian painting schools and provides a dynamic educational platform, eliminating the need to manually sift through numerous research papers for basic information.

### **What the Project Should Do**

The project is designed to perform a series of logical steps:

1. **Image Analysis:** Accept an image and classify it as one of the pre-defined Indian painting schools.
2. **Hierarchical Classification:** Based on the classification, it should be able to answer whether the image is a painting, handmade, and specifically Indian.
3. **Confidence-Based Rejection:** If the model's prediction is not confident enough (i.e., it doesn't recognize the image as an Indian painting), it should reject the image and not provide an explanation.
4. **Dynamic Explanation:** Once a painting is identified, the system will automatically pull relevant information from a knowledge base built from your research papers and generate a detailed explanation of its key features.

### **Expectations from the Project**

The final output should be a reliable, single application that provides an accurate classification and a rich, dynamically generated explanation. It is expected to act as a valuable assistant, but its performance is directly dependent on the quality and quantity of the training images and research papers you provide. It will not identify non-Indian paintings or other forms of art.