



Sign Language Detection

Description:

The main point of this application is to use the camera to recognize gestures from the sign language to offer a new means of communication. The program will be able to transcribe gestures done by dumb people into written words printed on the screen.

Start Date: 3rd Jan'23

Doubt Clear Time:

Course Time: Flexible

Features:

- # Do Everything In Industry Grade Lab
- # Learn As Per Your Timeline
- # Hands-On Industry Real-Time Projects.
- # Self Paced Learning

Dashboard Access

What we learn:

Real Time Projects

Sign Language Detection

Object detection with YOLO v5

Creating custom dataset using OpenCV

How to work with bash cmd & Docker

Modular coding approach for training and prediction pipeline along with Flask app

Learn about AWS

Basics of CICD tools

Github Actions for Production-grade deployment

Requirements:

System with minimum i3 processor or better

At least 4 GB of RAM

Working internet connection

Dedication to learn

Instructor:

Name:

Boktiar Ahmed Bappy

Description:

This is Bappy. I aim for simplicity in Data Science. Real Creativity won't make things more complex. Instead, I will simplify them, Interested in a Data Science Career and so develop myself accordingly. Data Scientist and lecturer with

working experience in Machine Learning, Deep Learning, Microcontrollers and Electronics systems. Hands-on experience in classification, regression, clustering, computer vision, natural language processing and transfer learning models to solve challenging business problems. I have a huge interest in Robotics. I have innovated a lot of innovations, ideas, projects & robots and got a lot of achievements.

>Welcome to the Course:

>>Course Overview

>>Dashboard Introduction

>Project :- Sign Language

Detection:

>>Introduction of Instructor

>>Project Overview

>>End Notes

>>Problem Description

>>Understand the application scope

>>Tour to existing solution

>>End Notes

>>Solution Description

>>Notebook Walkthrough

>>Tour to Architecture diagram

- >>cost involved
- >>End Notes
- >>Structure overview
- >>Data Ingestion
- >>Data Validation
- >>Data Transformation
- >>Model Training and Tunning
- >>Model Evaluation
- >>Model Pusher
- >>Training Pipeline
- >>Prediction Pipeline
- >>Frontend app design
- >>Tour to the cloud and Service Overview (AWS)
- >>IAM setup
- >>ECR setup
- >>EC2 setup
- >>Self hosted runner
- >>docker
- >>Conclude the project
- >>Assignments & External Resources