The Game:

Sheldon Cooper’s stone, paper, scissor, lizard, spock .

INSPIRATION

Have you ever played stone, paper and scissor? I guess everybody has played this game at least once in life in childhood. But have you ever played with computer?

WHAT DOES IT DO ?

We have created a project using python that does the same, via image detection, Our game has five variables. i.e stone, paper, scissor, lizard, spock and you have to choose one of the variables and in output computer will give its own option and at last it would be decided that either you win or computer.

We have used image recognition by training nearly a 1000 images of various Hand movements under a controlled environment of green screen .

And you can insert any image of the hand in .png format and upload it to the webpage in the local host and our code will detect the image wether it is a legit movement considered in the game.

And this game is actually inspired by an amazing TV series “The big bang theory”. And it was introduced by a legendry character “Sheldon cooper”. From his idea we created a game and tried to put our own uniqueness inside the game by adding image detection to play with computer

CHALLENGES FACED

We faced many challenges during this project especially in training the model and detecting images .

Getting the correct libraries like tensor flow and keras and thus took a lot of time which deviated us from our goal of making a game with video inout

But as it’s said hurdles are also a part of life and that adds something special in your success..

WHAT’S NEXT FOR ?

The next big thing is to get it ready to become an actual game where user can play with the computer using hand gestures .

BUILD WITH PYTHON

LIBRARIES USED IN THE CODE

* This project is built with python and the libraries used in python are:

1. Open CV
2. Keras
3. Tensorflow
4. Numpy
5. Squeezenet