**URL SHORTENER USING FLASK**

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URL Shortener is used to make a long URL into a small URL so that whenever we access the shortener URL it should redirect to the original URL.

This Project is built using Flask. “app.py” is the Application Server where we imported required libraries

import os

from flask import Flask,render\_template,request,redirect

from flask\_sqlalchemy import SQLAlchemy

from flask\_migrate import Migrate

import random

import string

app=Flask(\_\_name\_\_)

After Importing libraries the next step is “SQL Alchemy Configuration”.

################### SQL Alchemy Configuration #####################

basedir = os.path.abspath(os.path.dirname(\_\_file\_\_))

app.config['SQLALCHEMY\_DATABASE\_URI'] = 'sqlite:///'+ os.path.join(basedir,'data.sqlite')

app.config['SQLALCHEMY\_TRACK\_MODIFICATIONS'] = False

db = SQLAlchemy(app)

Migrate(app,db)

The next step is to Create a Model using Class and def which helps to create a table name and column names

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Then come the Flask part to create the required routes with functions binded which helps in connecting the frontend (i.e to HTML Pages)

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**HTML PAGES**

This Project Consists of 3 HTML Pages namely

* **“Layout.html”** – The Inheritance Page which gives the same layout to all the html pages and save time to create header footer again and again for every html file

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* **“Home.html”** - The Home Page where the original URL should be entered, and the shortened URL will be displayed with a copy button so that user can easily copy the URL to Clipboard and able to use in the browser. Here JS is used for Copy Button

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* **“History.html”** - The Page displays the History of the URL’s and the respective Shortened URL’s

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