Flask-based Essay Generation API Documentation

Table of Contents

This documentation explains how to utilise the Flask-based API to generate essays based on user input and CSV data.

1. Prerequisites:
   Before using the API, make sure you have the following installed:

   - Python
   - Flask
   - Pandas
   - Transformers (for language model integration)
   - POSTMAN API testing tool of your choice

2. Setup:
   1. Install the required Python libraries using pip:
      'pip install flask pandas transformers'
   2. Run the Flask API:
      Python3 apis.apis.py

   Note: The Flask API should be running on http://127.0.0.1:5000/ by default.

3. Using the API

   a. Uploading a CSV File
      To upload a CSV file containing titles and content data:

      - **Endpoint**: /upload_csv
      - **HTTP Method**: POST
      - **Request Payload**: A form with a file field a.csv file.
      - **Response**: JSON response indicating the success or failure of the upload.

   b. Generating an Essay

      To generate an essay based on a user prompt and the uploaded CSV data:

      - **Endpoint**: /generate_essay
      - **HTTP Method**: POST
      - **Request Payload**: JSON object with a prompt key containing the user prompt.
      - **Response**: JSON response containing the generated essay.

   c. Generating an Essay

      Example Request (Using Postman):

      - Set the request URL to http://127.0.0.1:5000/generate_essay.
      - Set the request method to POST.

- In the request body, select "raw" and choose "JSON (application/json)." Enter the following JSON object:

```
{

    "prompt": "Write an essay about the impact of technology on society."

}
```

4. Troubleshooting

If you have any problems or encounter any difficulties when using the API, please refer to the error messages in the API answers. File format problems or server-related failures are common difficulties that may be resolved by confirming that the CSV file is in the right format and that the Flask API is functioning.

Please contact [03046043943/imfayzanbhatti@gmail.com] if you require any extra assistance or have any queries.

5. Testing

To begin, fire up the Flask-based API server. This server serves as the framework for producing writings. Simply execute the api.py script in your terminal:
python3 apis.apis.py
To run testcase open the folder tests/ then run following command:
python3 test_apis.py