

AI Text Similarity LLM Microservice

Base URL:

http://<host>:<port>

Example: http://127.0.0.1:5000

Endpoint: POST /analyze

Description:

This endpoint compares two input texts using a selected similarity method and if score is higher than threshold will call LLM for answer. Supports both cosine and Jaccard similarity.

Request

Method: POST

Path: /analyze

Headers:

- Content-Type: application/json

Request Body (JSON):

Field	Type	Required	Description
prompt1	string	Yes	First input text
prompt2	string	Yes	Second input text
method	string	No	Similarity method: cosine(default) or jaccard

Example Request:

```
{  
  "prompt1": "Hello world",  
  "prompt2": "Hello again",  
  "method": "cosine"  
}
```

Response

Status Code: 200 OK on success

Content-Type: application/json

Response Body (Success):

Field	Type	Description
response	string	LLM Output
similarity_score	float	Similarity score between 0 and 1

Example Response:

```
{  
  "response": "LLM Output",  
  "similarity_score": 0.857  
}
```

Error Responses

Missing Parameters (400):

```
{  
  "error": "Both 'prompt1' and 'prompt2' are required."  
}
```

Internal Server Error (500):

```
{  
  "error": "Unexpected error occurred."  
}
```

Supported Similarity Methods

Method	Description
cosine	Uses TF-IDF vectors and cosine similarity
jaccard	Compares token sets using Jaccard index

Example CURL Request

```
curl -X POST http://127.0.0.1:5000/analyze \  
-H "Content-Type: application/json" \  
-d '{  
  "prompt1": "The cat is on the mat.",  
  "prompt2": "A cat lies on a mat.",  
}
```

```
"method": "jaccard"  
}
```
