Package ‘gptr’

May 7, 2024

Type Package

Title A Convenient R Interface with the OpenAI 'ChatGPT' API

Version 0.6.0

Description
A convenient interface with the OpenAI 'ChatGPT' API at https://openai.com/api. 'gptr' allows you to interact with 'ChatGPT', a powerful language model, for various natural language processing tasks. The 'gptr' R package makes talking to 'ChatGPT' in R super easy. It helps researchers and data folks by simplifying the complicated stuff, like asking questions and getting answers. With 'gptr', you can use 'ChatGPT' in R without any hassle, making it simpler for everyone to do cool things with language!

License MIT + file LICENSE

Encoding UTF-8

RoxygenNote 7.3.1

Imports jsonlite, RCurl

NeedsCompilation no

Author Wanjun Gu [aut, cre] (<https://orcid.org/0000-0002-7342-7000>)

Maintainer Wanjun Gu <wanjun.gu@ucsf.edu>

Repository CRAN

Date/Publication 2024-05-07 08:00:03 UTC

R topics documented:

- dataframe_to_text ................................................................. 2
- get_response ................................................................. 2

Index 4
dataframe_to_text  
**Convert dataframes to text interpretable by ChatGPT**

**Description**
This function takes a dataframe as input and converts it to a text representation.

**Usage**
```r
dataframe_to_text(dataframe)
```

**Arguments**
- `dataframe`: A dataframe to be converted.

**Value**
A character vector representing the dataframe in text format.

**Examples**
```r
dataframe <- data.frame(
  Name = c("John", "Alice", "Bob"),
  Age = c(25, 30, 22),
  Score = c(95, 88, 75)
)
dataframe_to_text(dataframe)
```

get_response  
**Get Response from OpenAI Chat API**

**Description**
This function sends a user input to the OpenAI Chat API and retrieves a response.

**Usage**
```r
get_response(
  user_input = "what is a p-value in statistics?",
  system_specification = "You are a helpful assistant.",
  model = "gpt-3.5-turbo",
  api_key = Sys.getenv("OPENAI_API_KEY"),
  print_response = TRUE
)
```
get_response

Arguments

user_input The user's input for the chat interaction. Default is "what is a p-value in statistics?".

system_specification The system's role and content for the chat interaction. Default is "You are a helpful assistant."

model The OpenAI language model to use. Default is "gpt-3.5-turbo".

api_key The API key for accessing the OpenAI API. Defaults to the value of the "OPENAI_API_KEY" environment variable.

print_response Logical, indicating whether to print the response. Default is TRUE.

Value

A list containing the response from the OpenAI Chat API.

Examples

response1 = get_response(user_input = "How to calculate the bonforoni corrected p values?")
response2 = get_response(user_input = paste0("Based on this data.frame in R: \n\n", data.frame_to_text(mtcars), "\nwhich variables are correlated?
"))
response3 = get_response(user_input = "What are redox reactions?, system_specification = "You are a knowledgeable and helpful chemist
who will answer any questions in German")
Index

dataframe_to_text, 2
get_response, 2