

OpenRouter provides a unified API that gives you access to hundreds of AI models through a single endpoint, while automatically handling fallbacks and selecting the most cost-effective options. Get started with just a few lines of code using your preferred SDK or framework.

☆ Looking for information about free models and rate limits? Please see the [FAQ](#)

In the examples below, the OpenRouter-specific headers are optional. Setting them allows your app to appear on the OpenRouter leaderboards. For detailed information about app attribution, see our [App Attribution guide](#).

## Using the OpenAI SDK

Python

TypeScript



```
1 from openai import OpenAI
2
3 client = OpenAI(
4     base_url="https://openrouter.ai/api/v1",
5     api_key="<OPENROUTER_API_KEY>",
6 )
7
8 completion = client.chat.completions.create(
9     extra_headers={
10         "HTTP-Referer": "<YOUR_SITE_URL>", # Optional. Site URL for ranking
11         "X-Title": "<YOUR_SITE_NAME>", # Optional. Site title for rankings
12     },
13     model="openai/gpt-4o",
14     messages=[
15         {
16             "role": "user",
17             "content": "What is the meaning of life?"
18         }
19     ]
20 )
21
```

## Using the OpenRouter API directly

☆ You can use the interactive [Request Builder](#) to generate OpenRouter API requests in the language of your choice.

**Python**

TypeScript

Shell



```
1 import requests
2 import json
3
4 response = requests.post(
5     url="https://openrouter.ai/api/v1/chat/completions",
6     headers={
7         "Authorization": "Bearer <OPENROUTER_API_KEY>",
8         "HTTP-Referer": "<YOUR_SITE_URL>", # Optional. Site URL for ranking
9         "X-Title": "<YOUR_SITE_NAME>", # Optional. Site title for rankings
10    },
11    data=json.dumps({
12        "model": "openai/gpt-4o", # Optional
13        "messages": [
14            {
15                "role": "user",
16                "content": "What is the meaning of life?"
17            }
18        ]
19    })
20 )
```

The API also supports [streaming](#).

## Using third-party SDKs

For information about using third-party SDKs and frameworks with OpenRouter, please [see our frameworks documentation](#).