Sentiment Analysis API

This project provides a Flask-based API that performs sentiment analysis on text input using the VADER Sentiment Analyzer. The API is exposed to the internet using ngrok, allowing external requests to be made to the Flask server.

Features

- Perform sentiment analysis on text.
- Expose the local Flask server to the internet using ngrok.
- Return sentiment and sentiment scores in JSON format.

Prerequisites

Before running the project, make sure you have the following installed:

- Python 3.x
- `pip` (Python package installer)

Installation

1. **Clone the repository** or download the project files.
2. **Install the dependencies** using `pip`. You can find the list of dependencies in the `requirements.txt` file.
3. **Set up ngrok**:
   - Sign up for an account at ngrok.
   - Get your ngrok authtoken from the ngrok dashboard.
   - Authenticate ngrok by running the appropriate command in your terminal.

Running the API

1. **Run the Flask app**: Start the Flask application to launch the local server.
2. **Expose the Flask server to the internet**: The app will automatically generate a public URL using ngrok, which you can use to make requests to the API.

Usage

You can send POST requests to the API using tools such as:

- `curl`
- Postman
- Python's `requests` library

Ensure you are using the ngrok-generated URL to make requests.

Files

- `app.py`: The main Flask application file.
- `sentiment_analysis.py`: Contains the logic for sentiment analysis.
- `requirements.txt`: A list of all the dependencies required to run the project.
- `README.md`: This file with instructions on how to run and use the project.