Group 5: Assignment11

Projects in Machine Learning - INFO8665

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1. Docker secret

First of all we create docker secret like below

```
docker swarm init
echo "xapp-1-A074H8NQJ23-7181182531969-
ed57de8747a48f5b53253db1feb7d8af61c7ea65ef1d5773c959340e6ae73a74" | docker secret
create slack_app_token -
echo "xoxb-7151988919749-7191456940736-UfM4CI9M77fjaWxjS2dgrRHC" | docker secret
create slack_bot_token -
echo "https://onlyxool.atlassian.net" | docker secret create jira_url -
echo "ATATT3xFfGF0QE39cPvrUolx3dntf1ALh1FwXdrul4b-
cpgnzFDwphVoXBSKRBfMK0VgpPvWNK_n-ckesbuAtkT0e8dgS08tCGH-GC1EljHPnlEBObLBCZdk0q8-
OXG   9XJn6BMvkytjpLnw3pmFAe1jgIpChtGta7_lyqQ50eu-AHG-04wGsjns=E0E476F1" | docker
secret create api_token -
echo "onlyxool@gmail.com" | docker secret create email -
echo "pomzyppm" | docker secret create flask_secret_key -
```

```
Kyles-MacBook-Pro:AI-Scrum-Master onlyxool$ docker secret ls
ID                            NAME              DRIVER    CREATED          UPDATED
xwevidar24jem1zq307s4y06u     api_token                   29 seconds ago   29 seconds ago
wgi9btaz5j9462t3tab6l4xgc     email                       29 seconds ago   29 seconds ago
3lsle86evy8jcl078koggvsiv     flask_secret_key            27 seconds ago   27 seconds ago
aenejzfkwncpx8ka5toe57ve9     jira_url                    29 seconds ago   29 seconds ago
uz2lthkfp57klkq5s4q93yvnr     slack_app_token             29 seconds ago   29 seconds ago
jrd1g84wmd5itby3bzh1uhday     slack_bot_token             29 seconds ago   29 seconds ago
```

Then we make sure read secret informat from /run/secrets/

```python
import os

def read_secret(secret_name):
    secret_path = f"/run/secrets/{secret_name}"
    if os.path.exists(secret_path):
        with open(secret_path, 'r') as file:
            return file.read().strip()
    else:
        raise FileNotFoundError(f"Secret {secret_name} not found.")

# 替代原有的硬编码内容
SLACK_APP_TOKEN = read_secret('slack_app_token')
SLACK_BOT_TOKEN = read_secret('slack_bot_token')
JIRA_URL = read_secret('jira_url')
API_TOKEN = read_secret('api_token')
EMAIL = read_secret('email')
FLASK_SECRET_KEY = read_secret('flask_secret_key')
```

Finally we run docker container as service and mount the secrets to the container like below

```
docker service create -p 7804:80 --name AI_Scrum_Assistant \
  --secret slack_app_token \
  --secret slack_bot_token \
  --secret jira_url \
  --secret api_token \
  --secret email \
  --secret flask_secret_key \
  onlyxool/ai-scrum-assistant:latest
```

After docker service start, it will take about 2 mins to download language model(The actual time depends on internet speed). After download finish, everything will all set.

We can use below command to check if the language model download finish.

```
docker ps -a #display all docker container id
docker attach <container id>
```

2. Screenshots of the application running locally

Running locally:

```
(aiscrum) Kyles-MacBook-Pro:AI-Scrum-Master onlyxool$ python start.py
DEBUG:root:Start...
 * Serving Flask app 'flaskapp.app'
 * Debug mode: off
INFO:werkzeug:WARNING: This is a development server. Do not use it in a produc
 * Running on http://127.0.0.1:5000
INFO:werkzeug:Press CTRL+C to quit
Error sending message to U075QC694N4: time_in_past
Error sending message to U074ZR41109: time_in_past
Error sending message to U075E7VDC01: time_in_past
Error sending message to #project: time_in_past
⚡ Bolt app is running!
```