

Practical - 05

!pip install streamlit chromadb sentence-transformers PyMuPDF langchain-community
ollama Collecting streamlit

Downloading streamlit-1.44.1-py3-none-any.whl.metadata (8.9 kB)

Collecting chromadb

Downloading chromadb-0.6.3-py3-none-any.whl.metadata (6.8 kB)

Requirement already satisfied: sentence-transformers in
/usr/local/lib/python3.11/Collecting PyMuPDF

Downloading pymupdf-1.25.5-cp39-abi3-

manylinux2014_x86_64.manylinux_2_17_x86_64.Collecting langchain-community

Downloading langchain_community-0.3.20-py3-none-any.whl.metadata (2.4 kB)

Collecting ollama

Downloading ollama-0.4.7-py3-none-any.whl.metadata (4.7 kB)

Collecting ngrok

Downloading ngrok-1.4.0-cp37-abi3-

manylinux_2_17_x86_64.manylinux2014_x86_64.whl.Requirement already satisfied:
altair<6,>=4.0 in /usr/local/lib/python3.11/dist-packages Requirement already satisfied:

blinker<2,>=1.0.0 in /usr/local/lib/python3.11/dist-packages Requirement already satisfied:

cachetools<6,>=4.0 in /usr/local/lib/python3.11/dist-packages Requirement already satisfied:

click<9,>=7.0 in /usr/local/lib/python3.11/dist-packages Requirement already satisfied:

numpy<3,>=1.23 in /usr/local/lib/python3.11/dist-packages Requirement already satisfied:

packaging<25,>=20 in /usr/local/lib/python3.11/dist-packages Requirement already satisfied:

pandas<3,>=1.4.0 in /usr/local/lib/python3.11/dist-packages Requirement already satisfied:

pillow<12,>=7.1.0 in /usr/local/lib/python3.11/dist-packages Requirement already satisfied:

protobuf<6,>=3.20 in /usr/local/lib/python3.11/dist-packages Requirement already satisfied:

pyarrow>=7.0 in /usr/local/lib/python3.11/dist-packages Requirement already satisfied:

requests<3,>=2.27 in /usr/local/lib/python3.11/dist-packages Requirement already satisfied:

tenacity<10,>=8.1.0 in /usr/local/lib/python3.11/dist-packages Requirement already satisfied:

toml<2,>=0.10.1 in /usr/local/lib/python3.11/dist-packages Requirement already satisfied:

typing-extensions<5,>=4.4.0 in /usr/local/lib/python3.11/Collecting watchdog<7,>=2.1.5
(from streamlit)

Downloading watchdog-6.0.0-py3-none-manylinux2014_x86_64.whl.metadata (44 kB)

—— 44.3/44.3 kB 3.8 MB/s eta 0:00:00

Requirement already satisfied: gitpython!=3.1.19,<4,>=3.0.7 in

/usr/local/lib/python3.11/Collecting pydeck<1,>=0.8.0b4 (from streamlit)

Downloading pydeck-0.9.1-py2.py3-none-any.whl.metadata (4.1 kB)

Requirement already satisfied: tornado<7,>=6.0.3 in /usr/local/lib/python3.11/dist-
Collecting build>=1.0.3 (from chromadb)
Downloading build-1.2.2.post1-py3-none-any.whl.metadata (6.5 kB)
Requirement already satisfied: pydantic>=1.9 in /usr/local/lib/python3.11/dist-packages
Collecting chroma-hnswlib==0.7.6 (from chromadb)
Downloading chroma_hnswlib-0.7.6-cp311-cp311-
manylinux_2_17_x86_64.manylinux2014_ Collecting fastapi>=0.95.2 (from chromadb)
Downloading fastapi-0.115.12-py3-none-any.whl.metadata (27 kB)
Collecting uvicorn>=0.18.3 (from uvicorn[standard]>=0.18.3->chromadb)
Downloading uvicorn-0.34.0-py3-none-any.whl.metadata (6.5 kB)
Collecting posthog>=2.4.0 (from chromadb)
Downloading posthog-3.23.0-py2.py3-none-any.whl.metadata (3.0 kB)
Collecting onnxruntime>=1.14.1 (from chromadb)
Downloading onnxruntime-1.21.0-cp311-cp311-
manylinux_2_27_x86_64.manylinux_2_28_ Requirement already satisfied: opentelemetry-
api>=1.2.0 in /usr/local/lib/python3.11/Collecting opentelemetry-exporter-otlp-proto-
grpc>=1.2.0 (from chromadb)
Downloading opentelemetry_exporter_otlp_proto_grpc-1.31.1-py3-none-any.whl.metadata
Collecting opentelemetry-instrumentation-fastapi>=0.41b0 (from chromadb)
Downloading opentelemetry_instrumentation_fastapi-0.52b1-py3-none-any.whl.metadata
Requirement already satisfied: opentelemetry-sdk>=1.2.0 in
/usr/local/lib/python3.11/Requirement already satisfied: tokenizers>=0.13.2 in
/usr/local/lib/python3.11/dist-Collecting pypika>=0.48.9 (from chromadb)
Downloading PyPika-0.48.9.tar.gz (67 kB)
Downloading PyPika-0.48.9.tar.gz (67 kB)

——— 67.3/67.3 kB 4.9 MB/s eta 0:00:00

Installing build dependencies ... done
Getting requirements to build wheel ... done
!pip install colab-xterm
Collecting colab-xterm
Downloading colab_xterm-0.2.0-py3-none-any.whl.metadata (1.2 kB)
Requirement already satisfied: ptyprocess~=0.7.0 in /usr/local/lib/python3.11/dist-
Requirement already satisfied: tornado>5.1 in /usr/local/lib/python3.11/dist-packages
Downloading colab_xterm-0.2.0-py3-none-any.whl (115 kB)

——— 115.6/115.6 kB 6.2 MB/s eta 0:00:00

Installing collected packages: colab-xterm
Successfully installed colab-xterm-0.2.0

```
%load_ext colabxterm
%xterm
```

Browse... No files selected. Upload widget is only available when the cell has been executed in the current browser session. Please rerun this cell to enable.

Saving requirements.txt to requirements.txt

Saving app.py to app.py

```
from google.colab import files
```

```
uploaded = files.upload()
```

```
!wget -q -O - ipv4.icanhazip.com
```

```
34.90.154.164
```

```
!ollama
```

Usage:

```
ollama [flags]
```

```
ollama [command]
```

Available Commands:

```
serve Start ollama
```

```
create Create a model from a Modelfile
```

```
show Show information for a model
```

```
run Run a model
```

```
stop Stop a running model
```

```
pull Pull a model from a registry
```

```
push Push a model to a registry
```

```
list List models
```

```
ps List running models
```

```
cp Copy a model
```

```
rm Remove a model
```

```
help Help about any command
```

Flags:

```
-h, --help help for ollama
```

```
-v, --version Show version information
```

```
-v, --version Show version information
```

Use "ollama [command] --help" for more information about a command.

```
!ollama serve & ollama list
```

```
2025/04/02 06:55:43 routes.go:1230: INFO server config
```

```
env="map[CUDA_VISIBLE_DEVICES: time=2025-04-02T06:55:43.477Z level=INFO
```

```
source=images.go:432 msg="total blobs: 10"
```

time=2025-04-02T06:55:43.477Z level=INFO source=images.go:439 msg="total unused blobs time=2025-04-02T06:55:43.477Z level=INFO source=routes.go:1297 msg="Listening on 127.0.0.1:time=2025-04-02T06:55:43.477Z level=INFO source=gpu.go:217 msg="looking for compatible time=2025-04-02T06:55:43.619Z level=INFO source=types.go:130 msg="inference compute" [GIN] 2025/04/02 - 06:55:43 | 200 | 78.566µs | 127.0.0.1 | HEAD [GIN] 2025/04/02 - 06:55:43 | 200 | 1.756852ms | 127.0.0.1 | GET

NAME ID SIZE MODIFIED

nomic-embed-text:latest 0a109f422b47 274 MB 11 minutes ago

llama3.2:3b a80c4f17acd5 2.0 GB 11 minutes ago

!ollama list

Error: could not connect to ollama app, is it running?

!streamlit run app.py & npx localtunnel --port 8501

Collecting usage statistics. To deactivate, set browser.gatherUsageStats to false.

⋮⋮

⋮⋮::your url is: <https://bright-lamps-brake.loca.lt>

2025-04-02 06:56:51.926768: E

external/local_xla/xla/stream_executor/cuda/cuda_fft.WARNING: All log messages before absl::InitializeLog() is called are written to STDERR

E0000 00:00:1743577011.952269 9340 cuda_dnn.cc:8310] Unable to register cuDNN factory: E0000 00:00:1743577011.959733 9340 cuda_blas.cc:1418] Unable to register cuBLAS 2025-04-02 06:56:51.985156: I

tensorflow/core/platform/cpu_feature_guard.cc:210] This To enable the following instructions: AVX2 AVX512F FMA, in other operations, rebuild 2025-04-02 06:56:56.563 Examining the path of torch.classes raised:

Traceback (most recent call last):

File "/usr/local/lib/python3.11/dist-packages/streamlit/web/bootstrap.py", line if asyncio.get_running_loop().is_running():

^^

RuntimeError: no running event loop

During handling of the above exception, another exception occurred:

Traceback (most recent call last):

File "/usr/local/lib/python3.11/dist-packages/streamlit/watcher/local_sources_watcher.potential_paths = extract_paths(module)

^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^^

File "/usr/local/lib/python3.11/dist-packages/streamlit/watcher/local_sources_watcher.lambda m: list(m.__path__._path),

^^^^^^^^^^^^^^^^^^^^^^^^^^^^

