



VMware Tanzu

# Sample LLM App frontend with Multi- step MLflow workflows

## Overview

Use this sample template as a baseline to bootstrap a Generative AI application whose LLM model is retrained / finetuned, evaluated and published using multi-step **MLflow** workflows. The sample template demonstrates using **HuggingFace Transformers** to publish a finetuned model based on the provided base LLM. The application is a **Streamlit** web app. Workflow steps may be configured for each run with MLflow's **MLproject** file.

### Tanzu/VMware LLM Analytics with Postgres and Huggingface Demo

Demonstration of question-answering transformers using neutral networks and VMware Tanzu

Text Summarization [AI Bot](#)

This bot uses on-premise data to provide information about VMware technologies.

Your question

What is Greenplum?



Model Name

TheBloke/open-llama-7b-open-instruct-GGML

Matched Documents

"[result]: 'Greenplum is a proprietary transact system database management platform developed by Oracle Corporation. It was first released in 1987 and marketed as an "enterprise-wide" multi-tiered file server and networked database management system for the Solaris operating system and Hewlett-Packard HP-UX operating system, based on Oracle Database (earlier called Ingres). WwNwWnIn 2005 Greenplum became the third most popular database management platformGreenplum is a multi-model database that supports CPX, CQ, and DKP storage formats as well as static queries and DBSQL. The query optimizer automatically determines the most performant query plan for any given SQL statement. WwNwWnIt also provides transactional materialized path storage which makes all changes to the data visible to all read paths and ensures ACID transactions are upheld in case of concurrent updates. Greenplum is designed to scale horizontally across'..."

[View Document](#)

Rank answer  

## Workflow Steps

The workflow steps are as follows:

<b>upload_dataset</b>	Uploads the training dataset to the training environment ( <i>supports local environment or Ray clusters by default</i> )
<b>train_model</b>	Finetunes or retrains the base LLM model
<b>evaluate_model</b>	Uses defined metrics and thresholds to perform model evaluation on the candidate model
<b>promote_model_to_staging</b>	By default, promotes the candidate model to Staging if it passes the evaluation stage; also publishes the LLM to HuggingFace and stores metadata in Datahub