

NexgAI AI Engineering Challenge: Build a MedMCQA-Powered Chatbot

Objective

Design and implement an **AI chatbot** that uses the MedMCQA dataset (<https://huggingface.co/datasets/openlifescienceai/medmcqa>) as its **source of truth** to answer general purpose medical questions.

Your chatbot should:

- Understand user queries related to medical concepts.
- Use **LangGraph** to define a conversational flow.
- Answer based **only** on the dataset (not general knowledge).
- Be powered by an LLM of your choice (open or closed).

Minimum Requirements

1. Use **LangGraph** to build the chatbot's logic/flow.
2. Use **any LLM** (e.g., OpenAI, HuggingFace, Claude, etc.).
3. Leverage the **MedMCQA dataset** for responses.
4. Ensure the chatbot stays grounded in the dataset content.
5. Any database of your choice

Deliverables

- A **GitHub repo** with:
 - Full source code
 - A README.md with:
 - Setup instructions
 - How to run the chatbot
 - Justification of your design choices (LangGraph structure, LLM choice, implemented techniques)
- Clear instructions for running locally (or via notebook/Colab).

Submission

- Submit your GitHub repo link via email mariya.varghese@nexgai.com (as per instructions shared).
- After code review, shortlisted candidates will be invited for a **technical interview** with the NexgAI team.

Important Notes

- Do **not** hallucinate answers. The chatbot must respond only if confident, or gracefully decline if it cannot answer based on the dataset.
- Make sure your LLM and tools comply with **ethical AI** and **privacy standards**.