0.4 VERIFY BOTH ENVIRONMENTS

At this point you've set up:

- `simple-ollama-environment` – local LLM sandbox.
- `simple-watsonx-enviroment` – watsonx.ai sandbox.

This final Day 0 module is a **sanity check** to make sure everything works *together*, and that you're ready for Day 1.

GOAL

- Confirm you can:
  - Run a local model via Ollama **inside a notebook**.
  - Run a Granite model via watsonx.ai **inside a notebook**.
- Confirm that:
  - The `accelerator/` folder is present and notebooks open.
  - The `labs-src/` reference notebooks open.
- End with a clear **ready / not ready** checklist.

QUICK VERIFICATION SCRIPT / NOTEBOOK

You can create a tiny notebook (e.g. `verify_envs.ipynb`) in your main folder that does:

```
# verify_envs.ipynb

import os
from dotenv import load_dotenv

print("🔎 Verifying environments...")

# 1) Test Ollama client
try:
    import ollama
    print("✅ ollama Python package is importable")

    res = ollama.chat(
        model="qwen2.5:0.5b-instruct",  # or any model you've pulled
        messages=[{"role": "user", "content": "Say hello from Ollama."}],
    )
    print("Ollama says:", res["message"]["content"][:100], "...")
except Exception as e:
    print("❌ Ollama check failed:", e)

# 2) Test watsonx.ai client
try:
    load_dotenv()  # pick up .env from simple-watsonx-enviroment if you run this there
    from ibm_watsonx_ai import Credentials
    from ibm_watsonx_ai.foundation_models import ModelInference
    from ibm_watsonx_ai.metanames import GenTextParamsMetaNames as GenParams

    api_key = os.getenv("IBM_CLOUD_API_KEY") or os.getenv("WATSONX_APIKEY")
    url = os.getenv("IBM_CLOUD_URL") or os.getenv("WATSONX_URL")
    project_id = os.getenv("IBM_CLOUD_PROJECT_ID") or os.getenv("PROJECT_ID")

    if not api_key or not url or not project_id:
```

You don’t have to create this combined notebook, but it’s a nice, quick sanity check.

Alternatively, you can simply:

- Run `ollama_quickstart.ipynb` in `simple-ollama-environment`.
- Run `watsonx_quickstart.ipynb` in `simple-watsonx-enviroment`.

PAIR CHECK EXERCISE

If you're in a classroom setting, do a quick **pair verification**:

1. Pair up with someone next to you.
2. Each person shows:
   - Jupyter running in **`simple-ollama-environment`**.
   - `ollama_quickstart.ipynb` successfully returns a model response.
3. Then each person shows:
   - Jupyter running in **`simple-watsonx-enviroment`**.
   - `watsonx_quickstart.ipynb` successfully returns a Granite response.

This often surfaces:

- Small typos in `.env`.
- Misconfigured paths.
- Port conflicts.

And you get to practice explaining what you did – which already reinforces Day 1 concepts.

CONFIRM ACCELERATOR & NOTEBOOK PACKS

Next, verify your **project scaffolding** is complete.

CHECK THE `accelerator/` DIRECTORY

From the `watsonx-workshop` repo root:

```
ls accelerator
```

You should see something like:

```
assets/  assettypes/  config.yaml  rag/  service/  tools/  ui/  ...
```

Try opening one of the accelerator notebooks (read-only is fine for now):

- `accelerator/assets/notebook/notebook:Create_and_Deploy_QnA_AI_Service.ipynb`

Make sure:

- Jupyter loads the notebook.
- You can scroll through the cells.

CHECK THE `labs-src/` FOLDER

From the same repo:

COMMON FAILURE MODES

Here are some frequent issues and what to do about them.

OLLAMA ISSUES

- **“Connection refused” / timeout**
  - Ensure Ollama server is running:
    - In Docker: container up with port `11434` exposed.
    - Local: Ollama app/service started.
- **“Model not found”**
  - Pull the model:

```
ollama pull qwen2.5:0.5b-instruct
```

- **Out-of-memory**
  - Use smaller models (e.g., 0.5B–1B variants).

WATSONX.AI ISSUES

- **401 / 403**

WHAT TO DO IF SOMETHING FAILS

If you hit issues:

1. **Capture the error**
   - Copy the error message and the command you ran.
2. **Ask for help**
   - Instructor / Slack / Teams channel.
3. **Fallback paths**
   - If local Docker or Ollama is blocked:
     - You can still follow many labs in the watsonx environment.
     - Or use a pre-provisioned VM / cloud notebook if your team provides one.

The key is: by the time Day 1 starts, you should at least have **one working LLM path** (preferably both).

END-OF-DAY 0 CHECKLIST

Tick off each of these:

- ✅ `simple-ollama-environment`:
  - Repo cloned.
  - Jupyter working.
  - `ollama_quickstart.ipynb` returns a model response.
- ✅ `simple-watsonx-enviroment`:
  - Repo cloned.
  - `.env` configured with valid IBM Cloud API key, URL, project ID.
  - Jupyter working.
  - `watsonx_quickstart.ipynb` returns a Granite response.
- ✅ `accelerator/`:
  - Folder present.
  - Notebooks under `accelerator/assets/notebook/` open.
- ✅ `labs-src/`:
  - Notebooks open and are readable.