Install n8n in WSL2



guide me in installing n8n in wsl2

Here is a **step-by-step guide to installing n8n in WSL2** (Windows Subsystem for Linux 2) on Ubuntu:

☑ Step 1: Ensure Prerequisites Are Installed

Make sure your WSL2 is set up with Ubuntu (20.04 or 22.04 recommended) and updated:

```
sudo apt update && sudo apt upgrade -y
```

You'll need:

- Node.js (LTS version)
- npm
- n8n
- Optional: PM2 or Docker (for running n8n persistently)

☑ Step 2: Install Node.js & npm

Install Node.js LTS version using NodeSource:

```
curl -fsSL https://deb.nodesource.com/setup_18.x | sudo -E bash -
sudo apt install -y nodejs
```

Verify installation:

```
hash
node -v
npm -v
```

Step 3: Install n8n

Install n8n globally via npm:

```
npm install n8n -g
```

Check if n8n installed:

```
bash
n8n --version
```

Step 4: Run n8n

Just run:

```
bash
n8n
```

It will start a local instance accessible via:

```
arduino
http://localhost:5678
```

★ If accessing from Windows browser, use: http://127.0.0.1:5678

☑ Step 5 (Optional): Run n8n in Background with PM2

Install PM2:

```
bash
npm install pm2 -g
```

Start n8n with PM2:

```
pm2 start n8n
pm2 startup
pm2 save
```

☑ Step 6 (Optional): Use .env for Custom Configuration

Create a .env file for settings like credentials encryption key or webhook URLs:

```
nano ~/.n8n/.env
```



Example content:

```
N8N_BASIC_AUTH_ACTIVE=true
N8N_BASIC_AUTH_USER=admin
N8N_BASIC_AUTH_PASSWORD=yourpassword
```

Then run with:

bash n8n

Step 7 (Optional): Expose n8n to Public Internet with Tunneling (e.g., for Webhooks)

Use tools like ngrok:

ngrok http 5678

Would you like to use Docker instead? I can guide you through that too.



will this n8n saves our work

Yes, **by default, n8n running locally in WSL2 saves your workflows in memory only** — so if you close the terminal or reboot, **your work is lost** unless you configure **persistent storage**.

▼ To Persist Your Workflows, You Have 3 Options:

Option 1: Use n8n with Local Filesystem Database (recommended for WSL2)

By default, n8n uses SQLite, but you must specify a **folder for the database and config**:

```
bash

mkdir -p ~/.n8n
```

Then run n8n like this:

```
n8n --data-folder ~/.n8n
```

This makes sure it saves all workflows and credentials under ~/.n8n.

Option 2: Use PM2 to Keep it Running (Auto-Restart)

```
bash

pm2 start n8n --name n8n -- --data-folder ~/.n8n
pm2 save
```

Your workflows and credentials will persist in the ~/.n8n folder.

Option 3: Use External Database (PostgreSQL, MySQL)

For larger-scale or team setups:

- Setup a database (e.g., PostgreSQL)
- Set these environment variables in .env or as inline before running n8n:

```
DB_TYPE=postgresdb
DB_POSTGRESDB_HOST=localhost
DB_POSTGRESDB_PORT=5432
DB_POSTGRESDB_DATABASE=n8n
DB_POSTGRESDB_USER=youruser
DB_POSTGRESDB_PASSWORD=yourpass
```

Important Notes:

- Workflows, credentials, execution history, etc. are stored in the data folder (SQLite or external DB).
- Always use --data-folder to make data persistent across sessions.
- Don't rely on just n8n without any config it's for testing only.

Let me know if you want a sample .env file or full Docker setup for persistent storage.



now guide the n8n installation through docker

Here's a **complete guide to install and run n8n using Docker inside WSL2**, with **persistent storage** and optional **basic authentication**:

V

Step-by-Step: Install n8n with Docker in WSL2

💤 Prerequisites

1. WSL2 installed with Ubuntu

2. Docker installed inside WSL2

(If not done, ask me for Docker installation in WSL2)

Step 1: Create a Project Folder

```
mkdir -p ~/n8n-docker
cd ~/n8n-docker
```

Step 2: Create Docker Compose File

Create docker-compose.yml:

```
nano docker-compose.yml
```

Paste this content:

```
yaml
version: "3.1"
services:
  n8n:
    image: n8nio/n8n
    restart: always
    ports:
- "5678:5678"
    environment:
      - N8N_BASIC_AUTH_ACTIVE=true
      - N8N_BASIC_AUTH_USER=admin
- N8N_BASIC_AUTH_PASSWORD=yourpassword
      - N8N HOST=localhost
      - N8N_PORT=5678
      - N8N_PROTOCOL=http
       - N8N_EDITOR_BASE_URL=http://localhost:5678
    volumes:
       - ./n8n_data:/home/node/.n8n
```

Replace yourpassword with a secure password.

Step 3: Start the Container

Run:

```
bash
docker-compose up -d
```

Step 4: Access n8n in Browser

Open:

```
arduino
http://localhost:5678
```

Login with:

- Username: admin
- Password: yourpassword (from above)

H Step 5: Persistence Confirmed

All workflows, credentials, and settings are saved in:

```
bash
~/n8n-docker/n8n_data/
```

You can back up this folder or move it across systems.

Common Commands

Restart service:

```
bash
docker-compose restart
```

• Stop service:

```
bash
docker-compose down
```

• View logs:

```
bash
docker-compose logs -f
```

Optional: Auto-start on WSL Boot

Add this to your .bashrc or .zshrc:

```
bash

cd ~/n8n-docker && docker-compose up -d
```

Let me know if you'd like to use PostgreSQL or enable webhook tunneling with ngrok.



how to start n8n service

To start the n8n service, the method depends on how you installed it. Here's how to start it based on your setup:



If You Installed n8n via Docker Compose:

Go to the project directory where docker-compose.yml is:

```
bash
cd ~/n8n-docker
```

Then start the service:

```
bash
docker-compose up -d
```

-d means "detached" (runs in the background)

To check if it's running:

bash docker ps

🔄 To Restart or Stop Docker-Based n8n:

```
bash
docker-compose restart
                         # Restart
docker-compose down
                          # Stop
```

🌅 If You Installed n8n via npm (native):

Start manually:

```
bash
n8n --data-folder ~/.n8n
```

This runs n8n in the terminal. Keep it open or use background tools like tmux or pm2.

Start with pm2 (recommended for always-on):

If using pm2:

```
bash

pm2 start n8n --name n8n -- --data-folder ~/.n8n

pm2 save
```

Check status:

```
bash
pm2 list
```

🛑 Access n8n in Your Browser:

```
text
http://localhost:5678
```

If you're using basic auth, enter your credentials when prompted.

Let me know your install method (Docker or npm) and I'll tailor next steps like auto-start on reboot or database config.