

Speech Scorer – Local Deployment Guide (Simple Explanation)

This guide explains, in very easy words, how to run your Speech Scorer project on your own computer (local server).

1. Install the required software

You must install three things:

1. Python (for backend)

- Download from: <https://www.python.org/downloads/>
- While installing, check "Add Python to PATH"

2. Node.js (for frontend)

- Download from: <https://nodejs.org/en/download>
- After installation:

Open a terminal and type:

```
node -v
```

```
npm -v
```

If you see version numbers, it's installed correctly.

3. Git (optional but recommended)

- Download from: <https://git-scm.com/downloads>
- Type:

```
git --version
```

If it shows a version, Git is installed.

2. Download or Clone the Project

Option A: If you downloaded a ZIP file:

- Extract it into a folder like:

```
C:/Users/ALAM/PycharmProjects/speech-scoring/
```

Option B: If using Git:

- Open PowerShell

- Type:

```
git clone https://github.com/your-username/speech-scoring.git
```

```
cd speech-scoring
```

3. Run the Backend (FastAPI)

1. Open a new terminal window.

2. Go to the backend folder:

```
cd speech-scoring/backend
```

3. Create a virtual environment:

```
python -m venv .venv
```

4. Activate it:

```
.\.venv\Scripts\activate
```

5. Install backend packages:

```
pip install -r requirements.txt
```

6. Start the backend server:

```
uvicorn app.main:app --reload --host 0.0.0.0 --port 8000
```

7. If everything is OK, you will see:

```
Uvicorn running at http://localhost:8000/
```

The backend is now running on:

```
http://localhost:8000
```

API docs:

```
http://localhost:8000/docs
```

Keep this terminal running.

4. Run the Frontend (React + Vite)

1. Open a NEW terminal (don't close backend).

2. Go to frontend folder:

```
cd speech-scorer/frontend/vite-project
```

3. Install node modules:

```
npm install
```

4. Start the frontend server:

```
npm run dev
```

5. It will show something like:

```
Local: http://localhost:5173/
```

Open this link in browser:

```
http://localhost:5173
```

5. Using the App

When both servers are running:

- Backend → <http://localhost:8000>
- Frontend → <http://localhost:5173>

Features you can test:

- Paste a transcript and click “Score Once”
- Try real-time scoring
- Upload an audio file
- View radar chart
- View detailed score breakdown

6. Common Problems & Fixes

Problem: WebSocket error

Fix: Restart backend and frontend.

Problem: Chart not loading

Fix:

```
npm install chart.js
```

Problem: Sentiment or grammar missing

Fix:

```
pip install vaderSentiment language-tool-python
```

7. Summary

To run locally, always start:

Backend:

```
cd backend  
.venv\Scripts\activate  
uvicorn app.main:app --reload
```

Frontend:

```
cd frontend/vite-project  
npm run dev
```

End of Guide
