

USER MANUAL OF ELSA CHATBOT

Introduction

Elsa is designed to help users quickly build and manage their shopping lists through a simple and interactive interface. By typing in everyday language, users can add items to their list, and Elsa will automatically detect the products, identify their shelf locations, and even suggest corrections for misspelled words. The chatbot also allows saving the shopping list in either text(.txt) or PDF(.pdf) format for later use. This manual provides step-by-step instructions to set up, run, and use the chatbot effectively.

Initiate the chatbot

- I. Open the **bot.py** file in your VS Code(or any other text editor)

Name	Date modified	Type	Size
Manual and video	9/13/2025 8:11 PM	File folder	
Shopping_list	9/13/2025 12:13 PM	File folder	
bot	9/13/2025 8:32 PM	Python Source File	6 KB
README.md	9/14/2025 8:43 AM	Text Document	1 KB

Figure 01 : Open bot.py

- II. Replace the file path at line 28 according file path that you want to save the shopping lists in PDF and text format.

```
27 # Save folder
28 SAVE_FOLDER = r"E:\Semester_5\NLP\Assignments\Assignment_2\Shopping_list"
29 os.makedirs(SAVE_FOLDER, exist_ok=True)
30
```

Figure 02 : Change the file path at line 28

- III. Run the python file.(Make sure that you installed relevant tools and libraries (spacy and reportlab). If not you can install them using ‘pip install spacy reportlab’ and ‘python -m spacy download en_core_web_sm’ commands on your terminal/command prompt)

The screenshot shows the PyCharm IDE interface with the following details:

- File Menu:** File, Edit, Selection, View, Go, Run, ...
- Search Bar:** Search [Administrator]
- Toolbars:** Standard toolbar with icons for Open, Save, Run, Stop, etc.
- Code Editor:** The main window displays Python code for a grocery store management system. The variable `nlp` is highlighted, and a code completion dropdown is open, listing suggestions like `Run Code`, `Go to Definition`, and `Find All References`.
- Code Completion Dropdown:** Shows the following options:
 - Run Code (Ctrl+Alt+N)
 - Go to Definition (F12)
 - Go to Declaration
 - Go to Type Definition
 - Go to Implementations (Ctrl+F12)
 - Go to References (Shift+F12)
 - Peek (with a dropdown arrow)
 - Find All References (Shift+Alt+F12)
 - Find All Implementations
 - Show Call Hierarchy (Shift+Alt+H)
 - Show Type Hierarchy
 - Copilot (with a dropdown arrow)
 - MongoDB Copilot Extension (with a dropdown arrow)
 - Rename Symbol (F2)
 - Change All Occurrences (Ctrl+F2)
 - Refactor... (Ctrl+Shift+R)
 - Source Action...
 - Cut (Ctrl+X)
 - Copy (Ctrl+C)
 - Paste (Ctrl+V)
 - Run in Interactive window (with a dropdown arrow)
 - Run Python (with a dropdown arrow)
- Bottom Status Bar:** Shows file paths, line numbers, and other status information.

Figure 03 : Run the python file

Figure 04 : Interface of chatbot

How to use the Chatbot

To begin, type a message into the input box and click on the ‘Send’ button. You can start with greeting such as ‘Hi’ or ‘Hello’ to check that the chatbot is responding. Elsa will reply with a friendly message to let you know the system is ready.

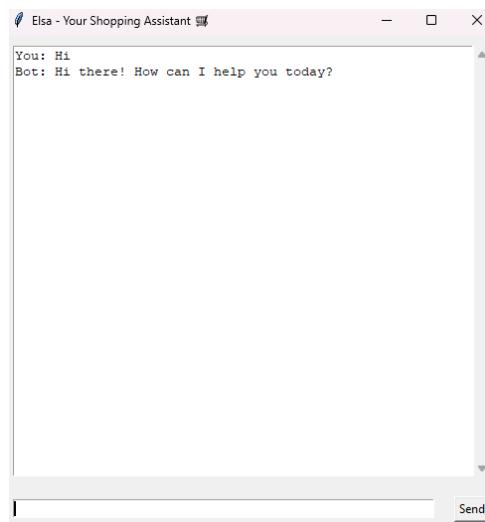


Figure 05 : Start of the conversation with ‘Elsa’

When you want to add items to your shopping list, simply type them in natural language. For an example, you can write ‘I want to buy bread, milk and eggs’ or ‘Please add bread, milk and rice to my list’. Then the chatbot detects the items, identify them as nouns using Natural Language Processing(NLP), and display their corresponding shelf numbers.

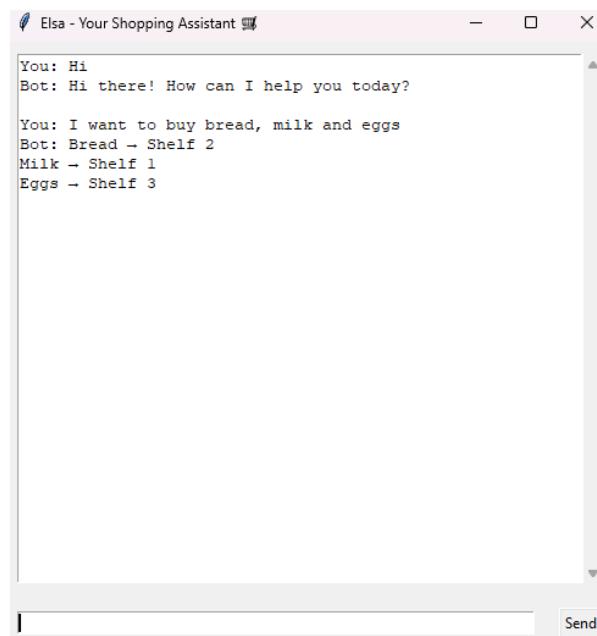


Figure 06 : Display the shopping list with the according shelf numbers

If you accidentally misspell an item, Elsa will try to guess the correct word and ask for confirmation. For example, if you type ‘orenge’, the chatbot might ask, “Item ‘mlik’ not found. Did you mean ‘milk’?”. Then you can respond with “yes” to add that item to the shopping list or “no” to ignore that.

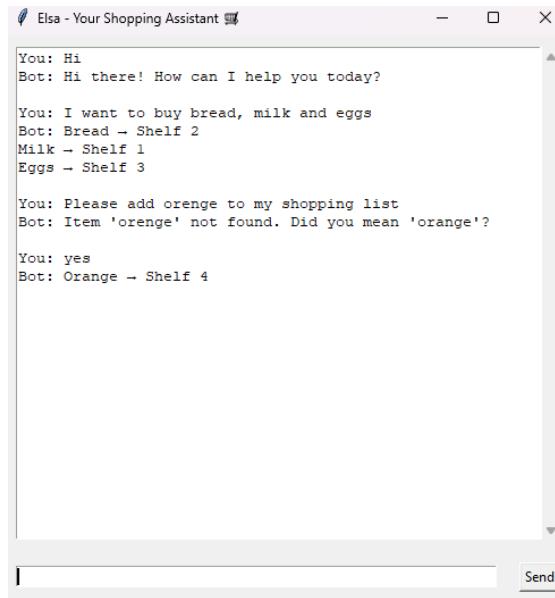


Figure 07 : Suggest words for the misspelled words

At any point, you can ask Elsa to save your shopping list. If you want a plain text file, type “save my list” or “save my list”. If you prefer a PDF, type “save as PDF”. The file will be generated and stored in the folder path you configures in the program. Each saved file will include the items and their shelf numbers, along with a timestamp in the frame.

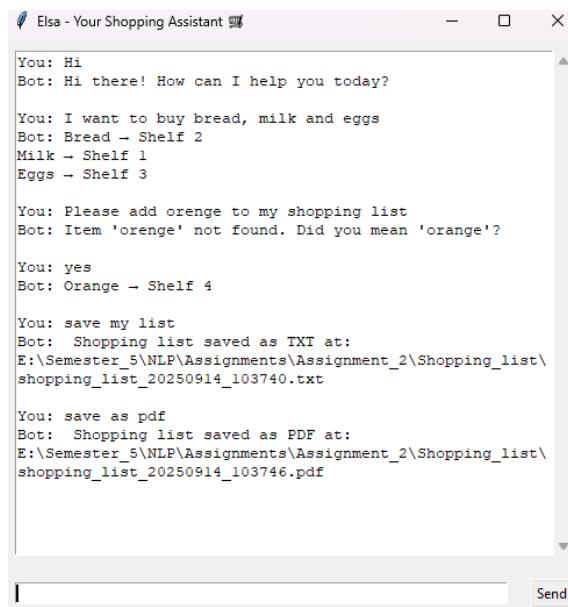


Figure 08: Save the shopping list as .txt and .pdf

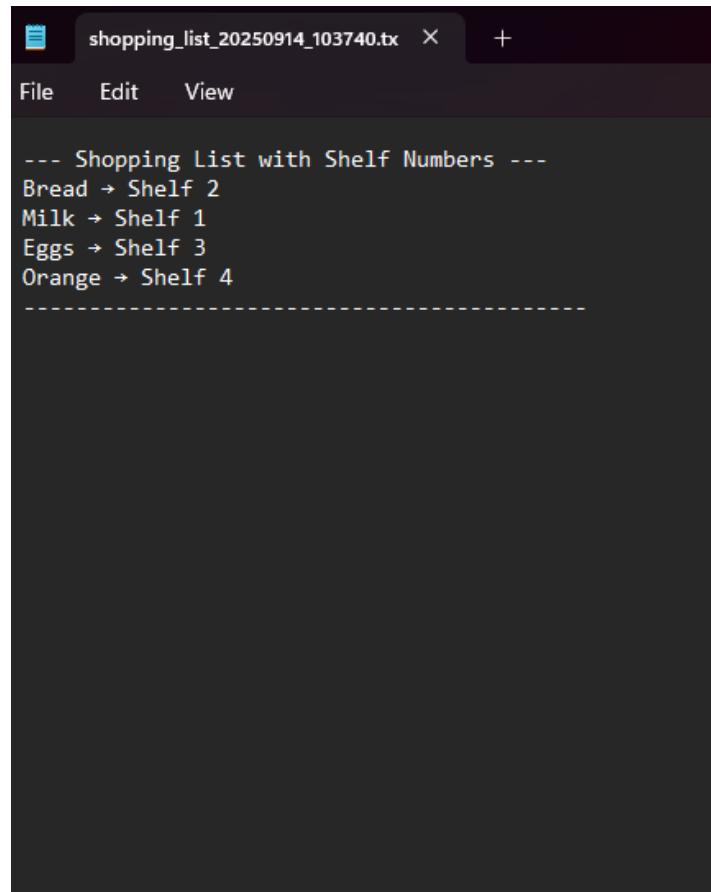


Figure 09 : Saved shopping list in .txt

Shopping List ■

Bread → Shelf 2
Milk → Shelf 1
Eggs → Shelf 3
Orange → Shelf 4

Figure 10 : Saved shopping list in .pdf

Check the video demonstration here:-

<https://drive.google.com/file/d/1IvwvqKUt99Di2AIx7uBjgvmziNHXPYc6/view?usp=sharing>