

CS 272 HCI

Assignment 1

Name: Raja Hamza Sikandar

Reg No: 2024532

Part A

Donald Norman Model Analysis:

Phase 1: The Goal

- The goal of this design is to allow the user to find a specific word from a list of 80-100 words.

Phase 2: The Execution

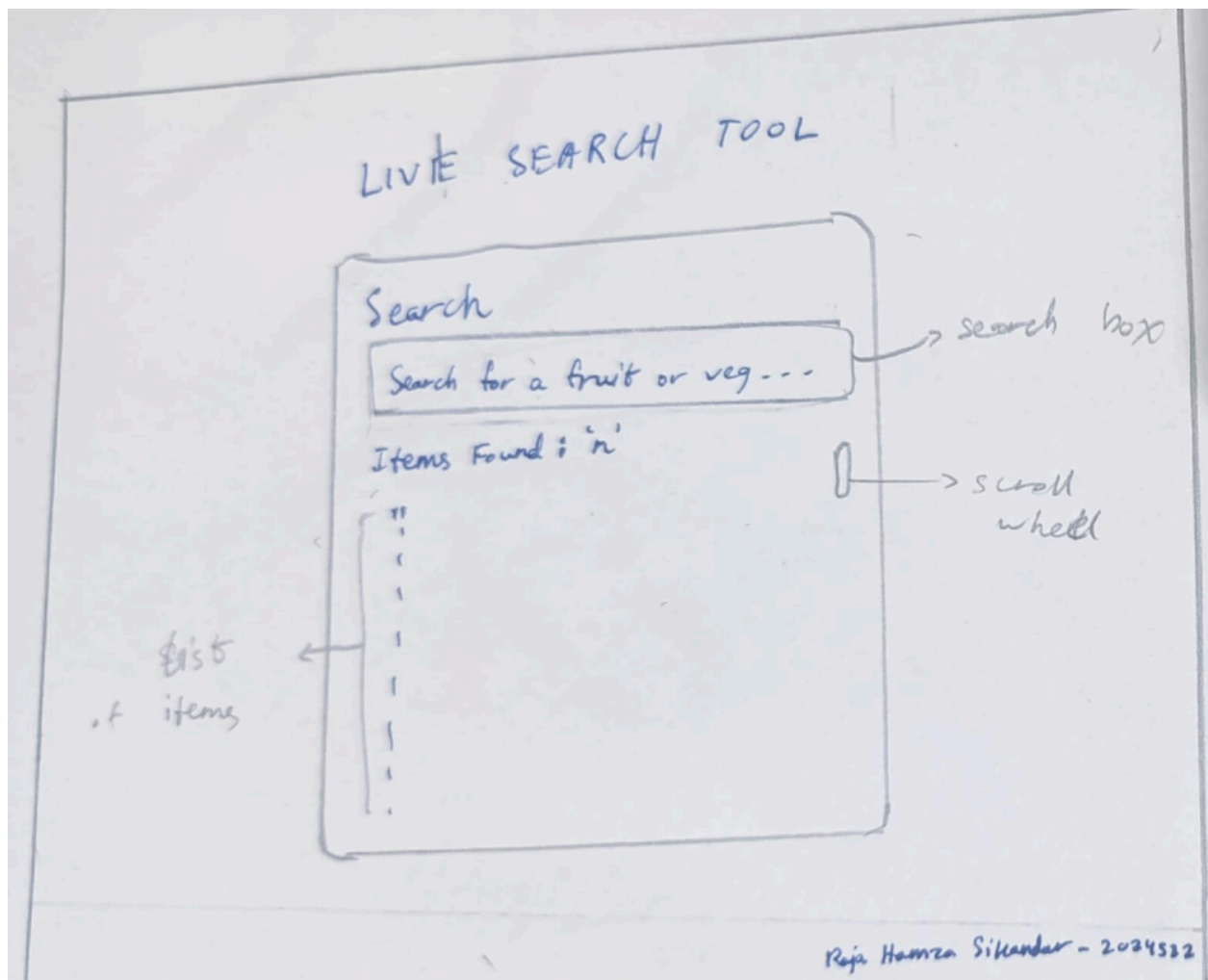
- Forming the Intention: The user wants to use the search bar on top, as searching through a list of 100 words takes too long.
- Specifying the Actions: The user maps out the physical steps: move the cursor to the search input box, click it, and type the letters.
- Executing the Action: The user physically clicks on the search bar using the cursor and enters the letters of the desired name. (eg A-P-P-L-E)

Phase 3: The Evaluation

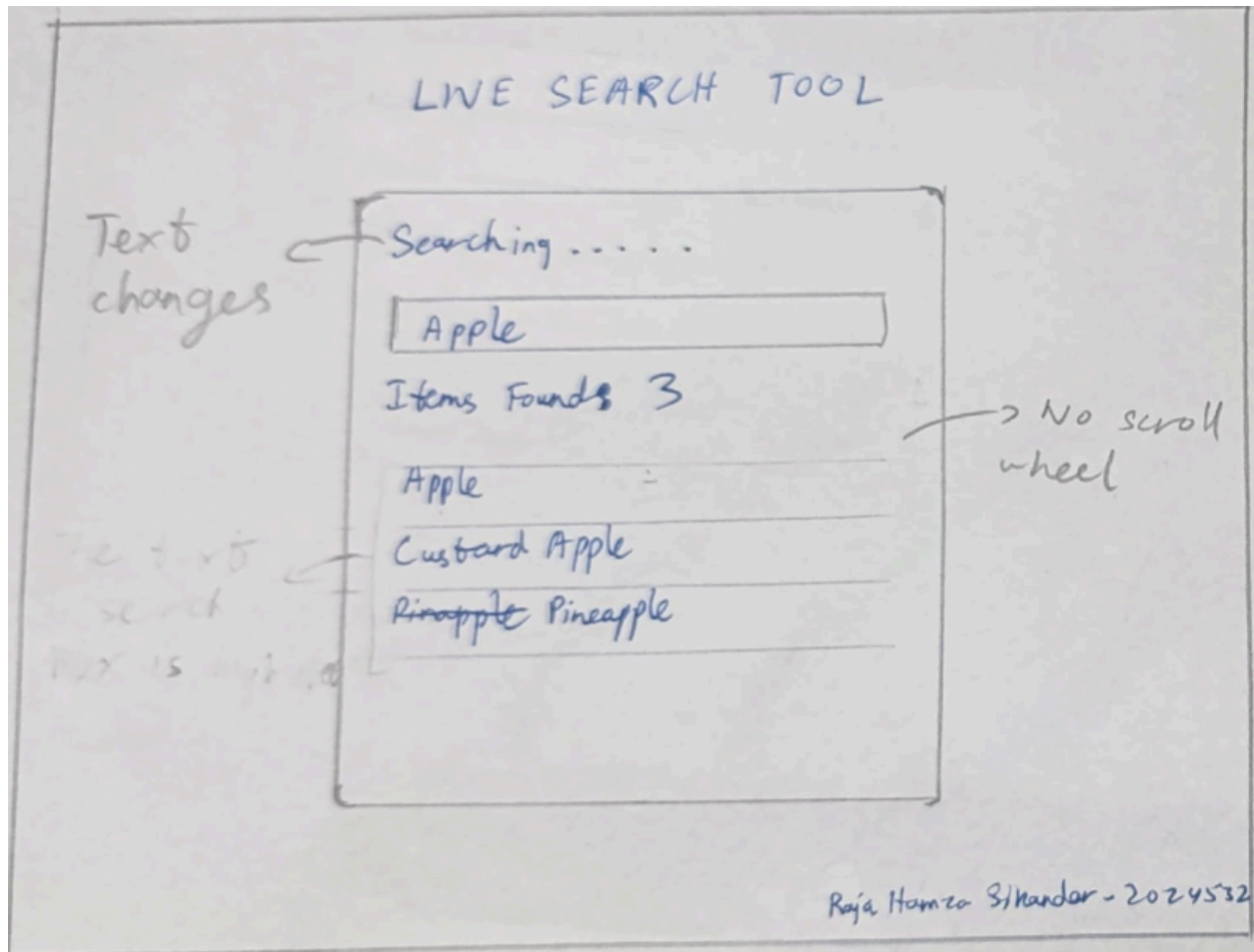
- Perceiving the State: As the user types, they see the letters appear in the search bar. Simultaneously, they see the list of words visually change, and they notice the number counter updating. They also observe the top part of the box turn to "Searching".
- Interpreting the System State: The user observes the changes in the screen as the list seen on the screen reduces in size, the counter displays the number of matches in the list, and the search text is highlighted in the observed list for each record.
- Evaluating the Outcome: The user checks if their specific word ("Apple") is now easily visible on the screen. If it is, their goal is achieved. If they

delete their search, they expect the interface to restore the full list, completing the cycle

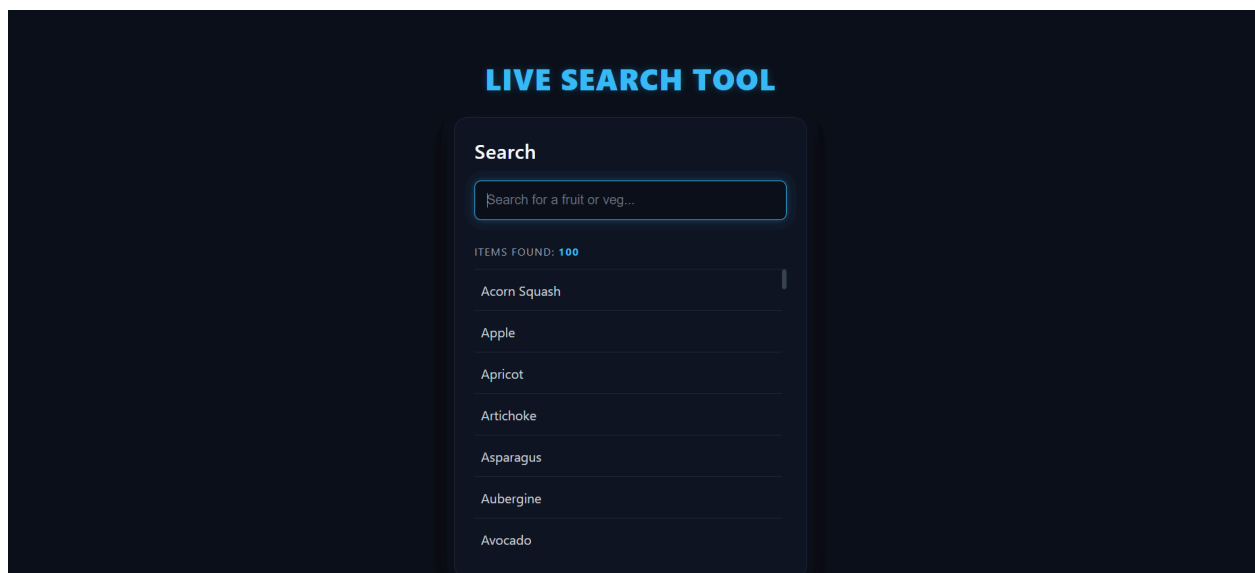
Sketch of planned screen



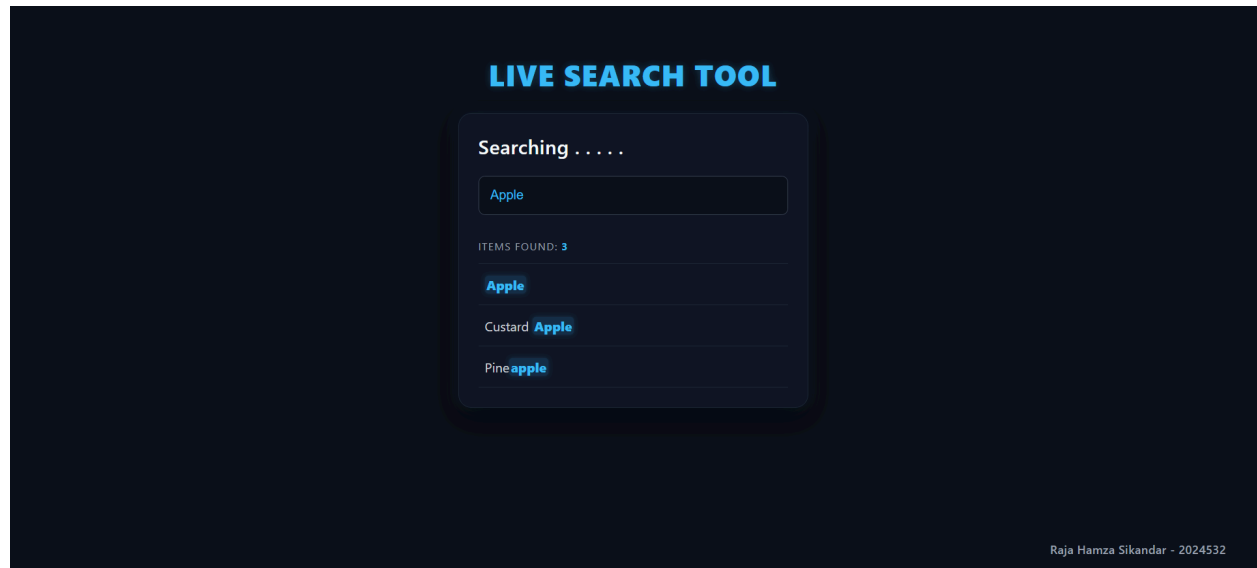
Sketch of Active Searching:



Final Version.



Final Version - Active Searching



USABILITY IMPROVEMENTS:

- When the text is entered into the search box, the same substring is highlighted in each item in the list below. This demonstrates Preattentive Processing as the user can visually differentiate between the old and new lists and find substrings more easily.
- When the user is actively searching, the text on top of the box turns to “Shifting”. This feature has been added to give immediate feedback to the user that the system is processing their input.