Activity Name # 8 Laboratory Activity 8 - The Selection Widget	
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Course/Section: CPE 009B / CPE21S1	Mrs. Maria Rizette Sayo

1. Objectives

In this section, the goals in this laboratory are:
● To create a Python program that use selection widget like Combobox
● To use ttk function as part of Tk ( ) in the Tkinter module

2. Intended Learning Outcomes (ILO)

After this activity, the student should be able to:
● Be able to understand the concept of GUI using Python Tkinter library
● Be able to implement the use of Python Tkinter library applying combobox
● Be able to implement immediate feedback in GUI using Python Tkinter

3. Discussion and Results

Present the visualized procedures done. Also present the results with corresponding data visualizations such as graphs, charts, or screenshot of the output. Please provide insights, commentaries, or explanations regarding the data. If an explanation requires the support of literature such as academic journals, books, magazines, reports, or web articles please cite and reference them using the IEEE format.

Please take note of the styles on the style ribbon as these would serve as the style format of this laboratory report. The body style is Times New Roman size 12, line spacing: 1.5. Body text should be in Justified alignment, while captions should be center-aligned. Images should be readable and include captions. Please refer to the sample below:

Figure 2. A cheerful professor

If an image is taken from another literature or intellectual property, please cite them accordingly in the caption. Always keep in mind the Honor Code [1] of our course to prevent failure due to academic dishonesty.

4. Materials and Equipment
• PyCharm • Spyder(Anaconda)
5. Procedure

```python
import tkinter as tk
from tkinter import ttk
from tkinter import messagebox
from tkinter.messagebox import showinfo

# Creating tkinter window and set dimensions
window = tk.Tk()
window.title('Combobox')
window.geometry('500x250')

# Label text for title
ttk.Label(window, text="Choose your birth month",
          background='light yellow', foreground="black",
          font=("Times New Roman", 15)).grid(row=0, column=1)

# Set label
ttk.Label(window, text="Select the month of your birth :",
          font=("Times New Roman", 12)).grid(column=0, row=5, padx=5,
pady=25)

# Create Combobox
n = tk.StringVar()
month = ttk.Combobox(window, width=27, textvariable=n)

# Adding combobox drop down list
month['values'] = (' January',
                   ' February',
                   ' March',
                   ' April',
                   ' May',
                   ' June',
                   ' July',
```

```python
                    ' August',
                    ' September',
                    ' October',
                    ' November',
                    ' December')
month.grid(column=1, row=5)
month.current(0)  # Set the default selection

# Function to handle selection
def choice(event):
    showinfo(
        title="Selection",
        message=f'You selected {n.get()}'
    )

# Bind the combobox selection event
month.bind("<<ComboboxSelected>>", choice)

# Run the application
window.mainloop()
```

6. **Output**

Code:

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from tkinter import messagebox
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```
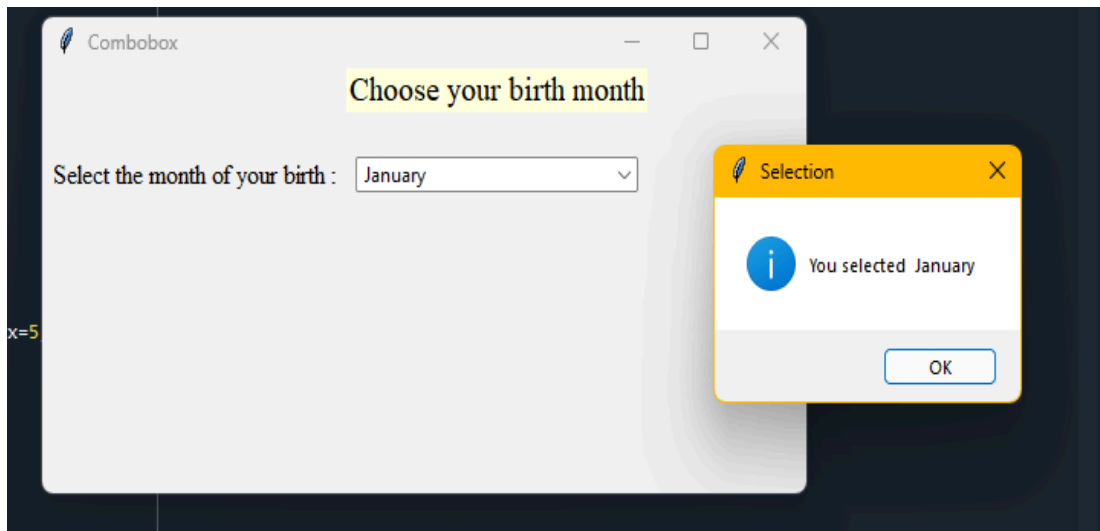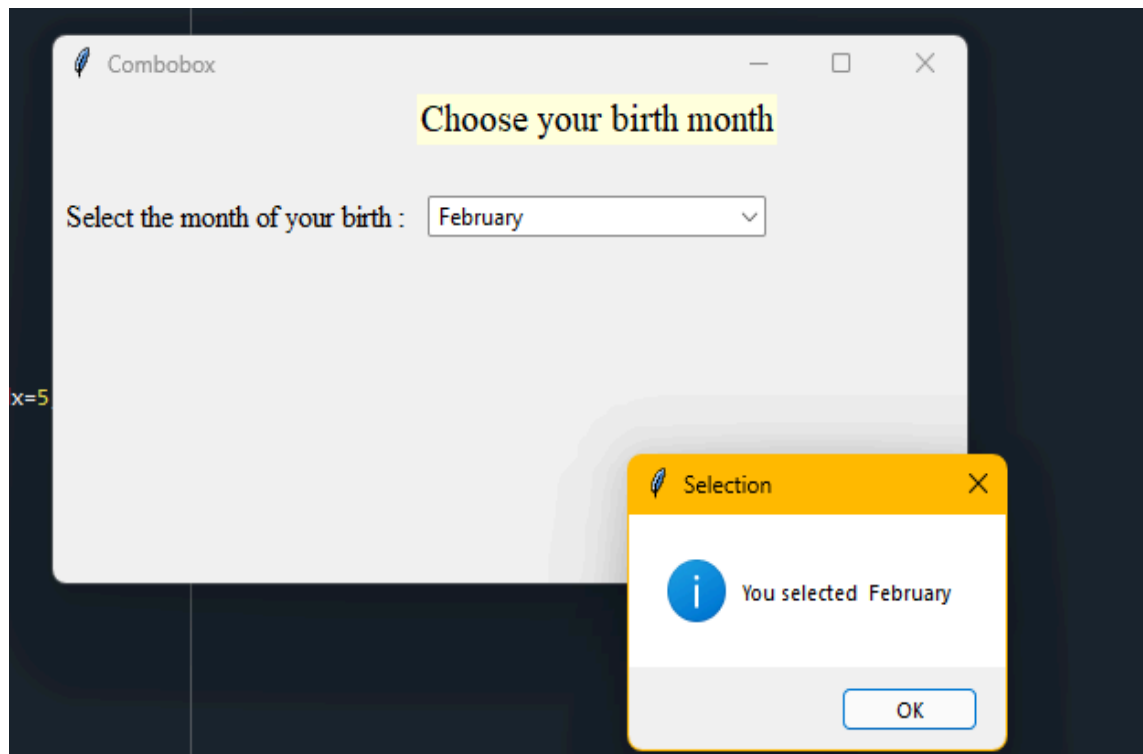
Output:

Figure 1. Output of Selecting January
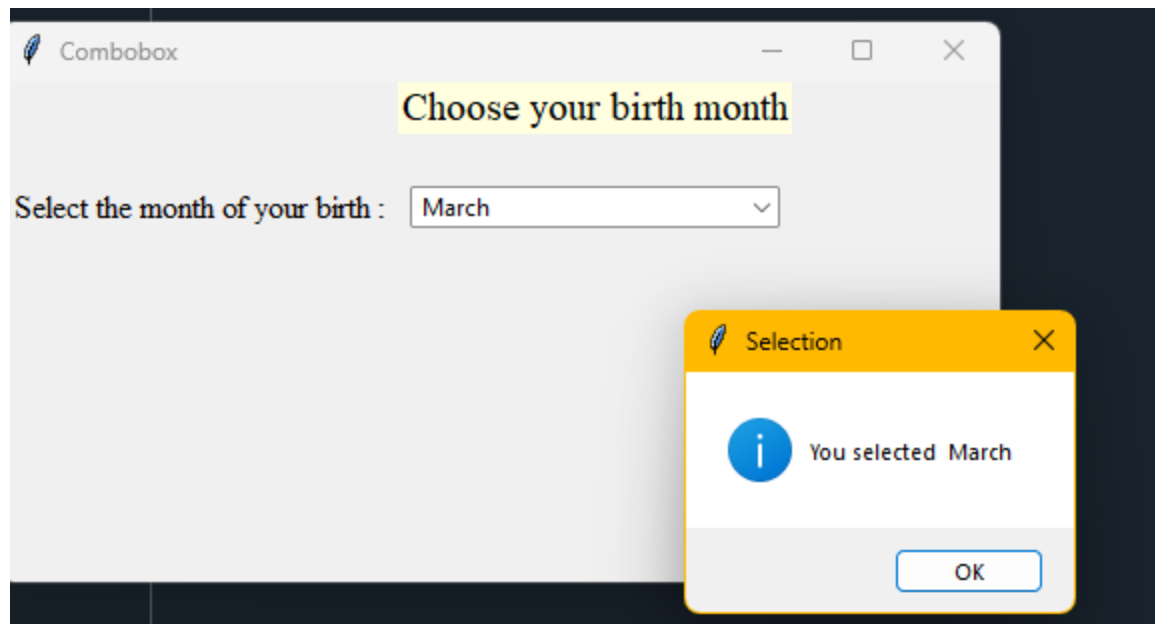

Figure 2. Output of Selecting February

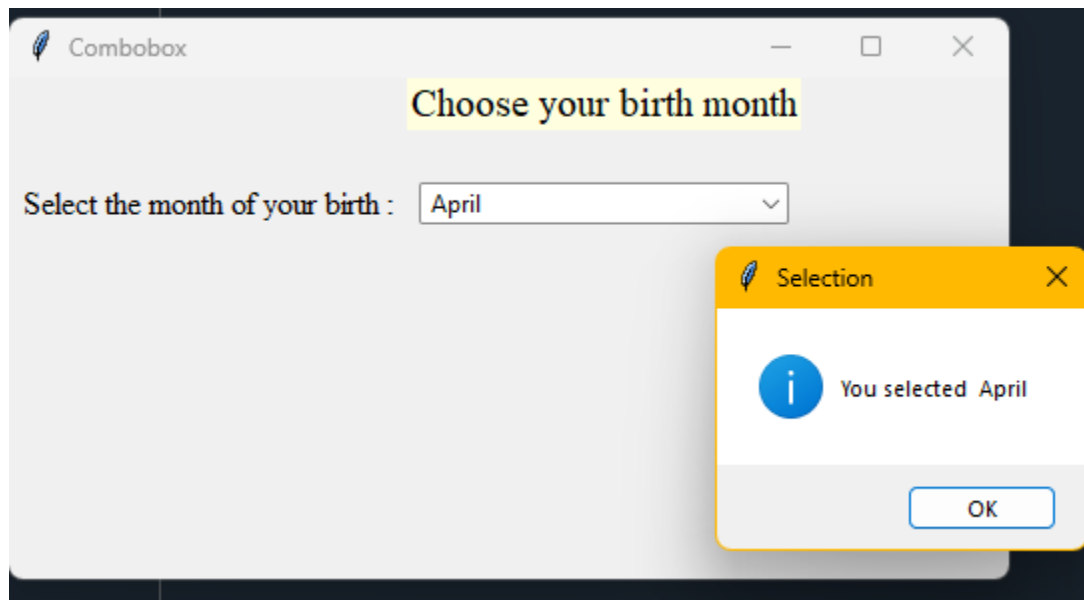**Figure 3. Output of Selecting March**
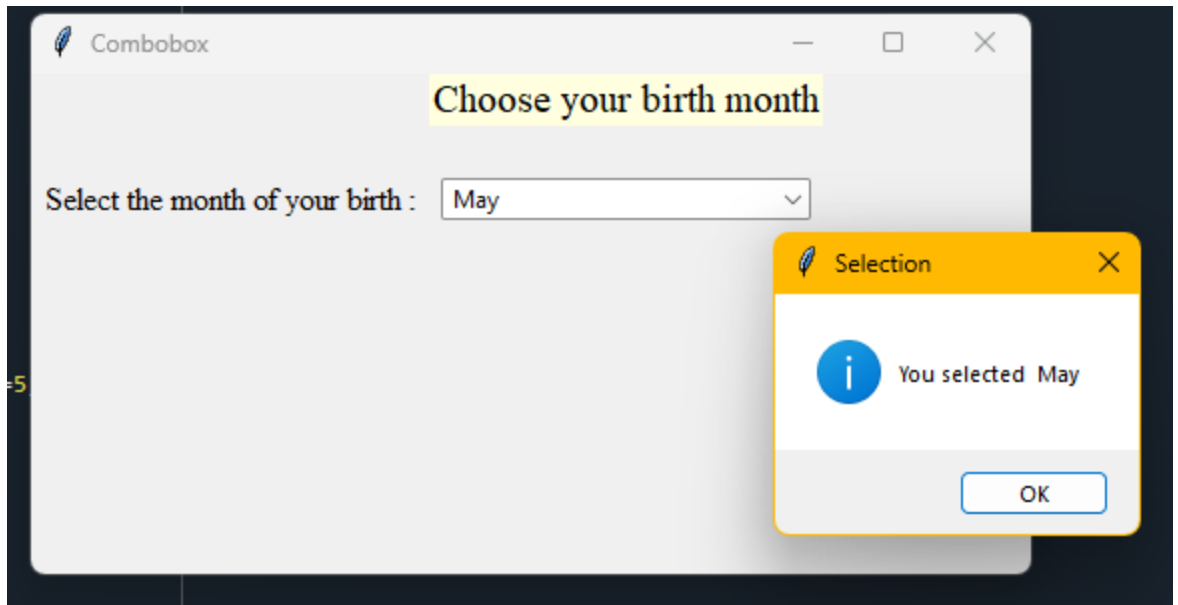

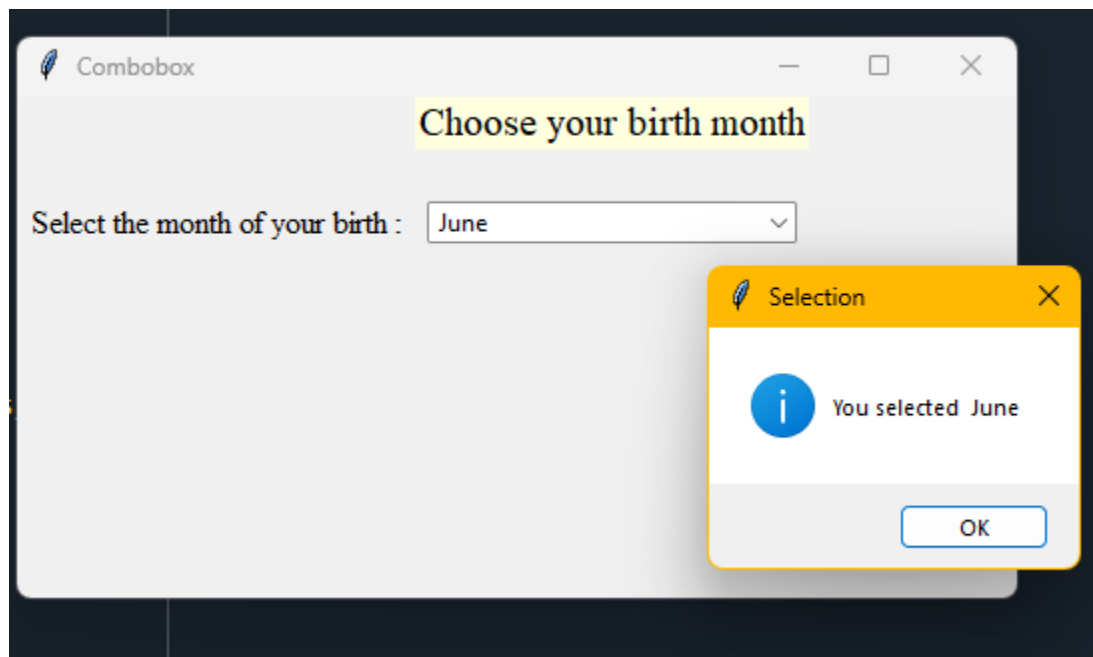**Figure 4. Output of Selecting April**

Figure 5. Output of Selecting May
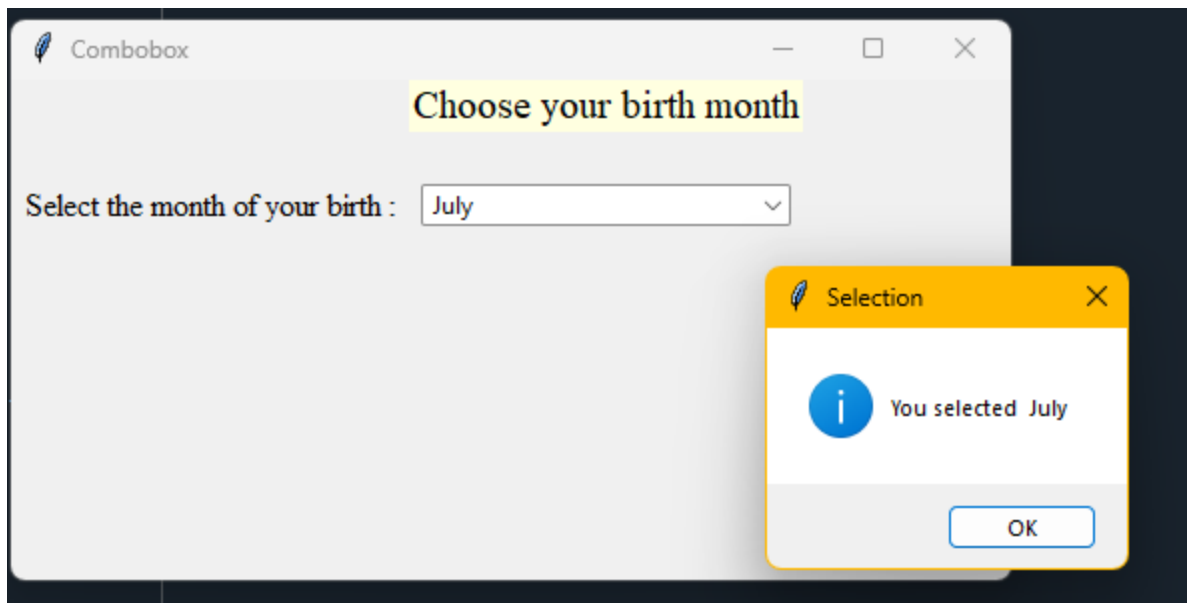

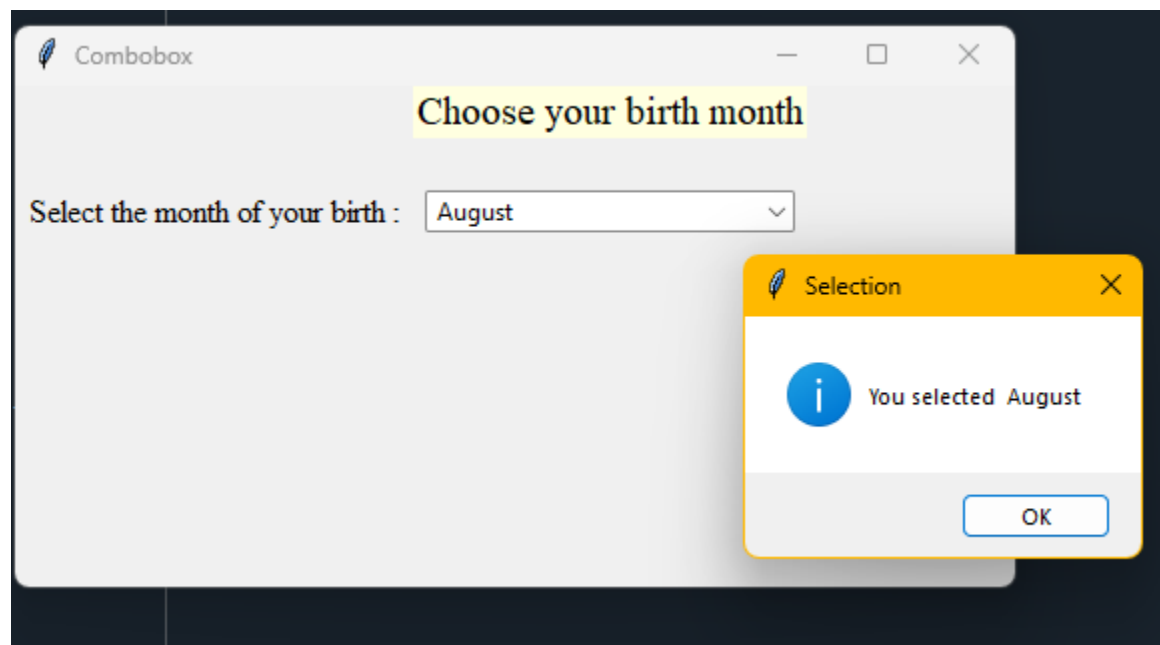**Figure 6. Output of Selecting June**

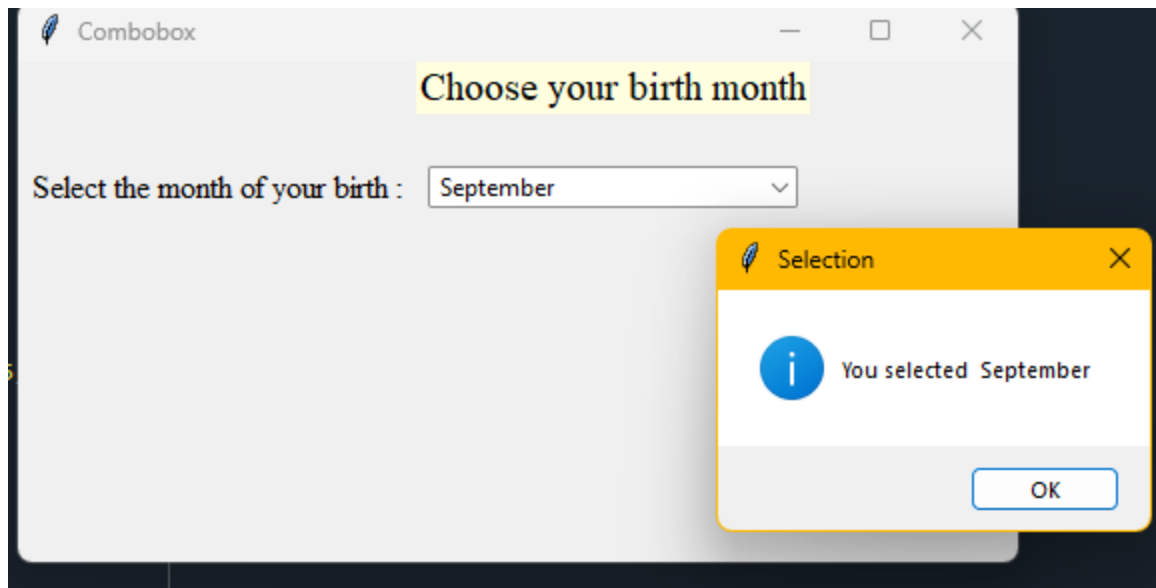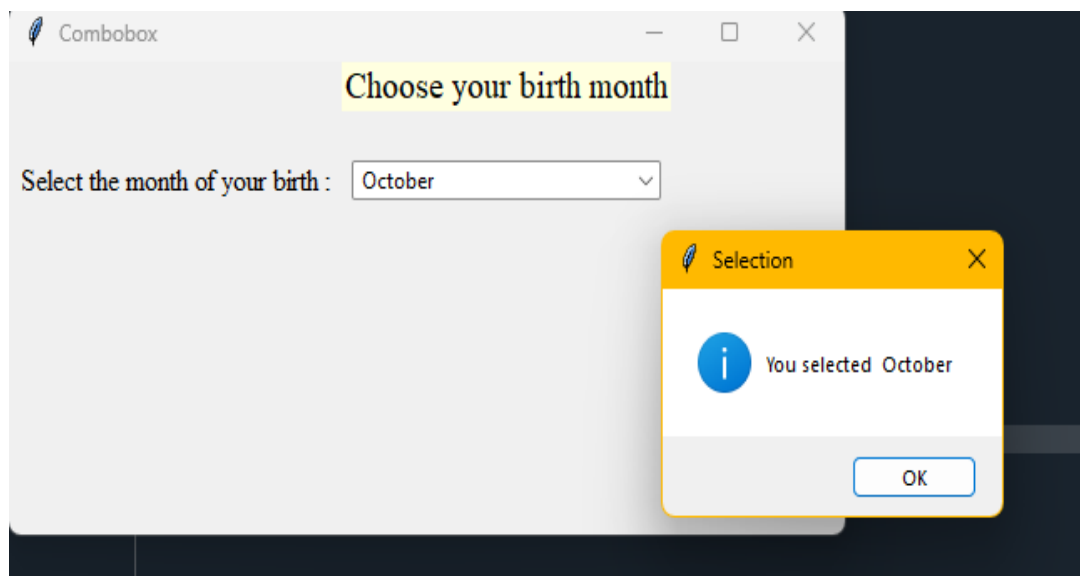**Figure 7. Output of Selecting July**

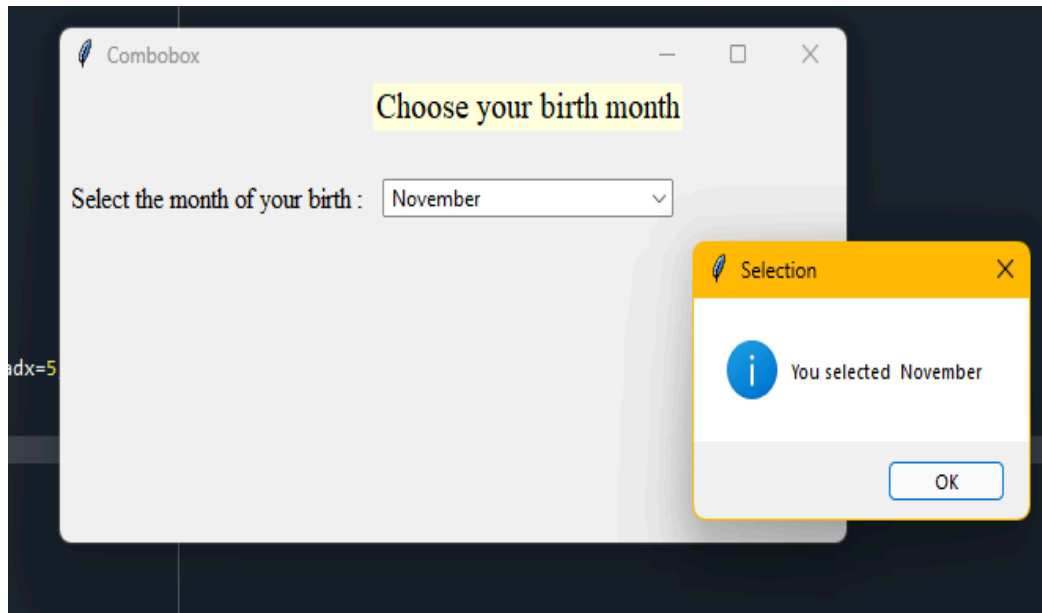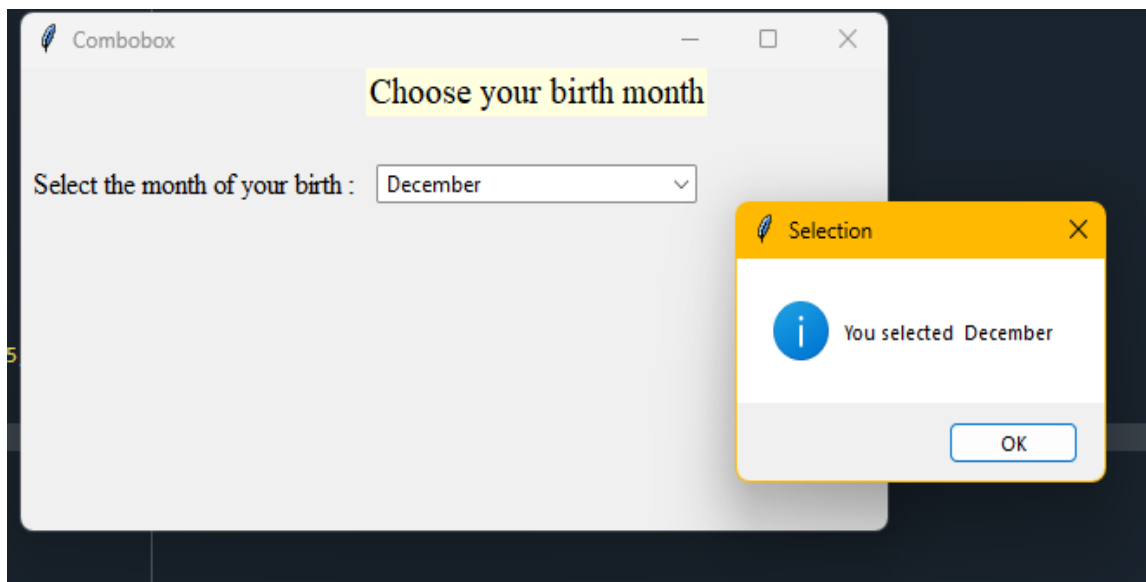**Figure 8. Output Selecting August**

Figure 9. Output of Selecting September

Figure 10. Output of Selecting October

Figure 11. Output of Selecting November

Figure 12. Output of Selecting December

7. Insights/Explanation of the Code

The program is a GUI (Graphical user Interface) with the use of the Tkinter module in Python. When you run the program it lets you select your month of birth, the general purpose of this program is to have you select your birth month with the use of Tkinter's functions like combo boxes and selection widgets. The program notifies you by making a smaller window appear in front of you and what month you selected in the program.

8. Conclusion

After completing the assigned laboratory, we learned a GUI module, which is selection widgets and combo boxes under the Tkinter module in Python. First we complied with the given procedure and we followed the proper instruction for it, which is copy pasting the code that is given from the laboratory file. We needed to see the output of the code in order to see the appearance of the GUI from the laboratory procedure. After running the code, we saw a simple output that lets you select your birth month using a selection widget function with combo boxes. We concluded that we have learned how to code and interpret the purpose of selection widgets and combo boxes in GUI under the Tkinter module in Python.

9. References

What are Widgets in Tkinter? (2020, May 15). GeeksforGeeks.
https://www.geeksforgeeks.org/what-are-widgets-in-tkinter/

Combobox Widget in tkinter | Python. (2020, January 9). GeeksforGeeks.
https://www.geeksforgeeks.org/combobox-widget-in-tkinter-python/