

"InfoFinder: Your Personalized Information Assistant"

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Abstract

The proposed RPA (Robotic Process Automation) bot is a powerful tool that can revolutionize the way we search for information online. With its ability to customize search options and deliver results in a convenient and efficient manner, the bot can save time and improve productivity for individuals and organizations alike. It can be used in various industries, including healthcare, finance, and marketing, to automate tasks and improve efficiency. The future scope of the RPA bot is vast, as it can be further optimized and integrated with other technologies to enhance its capabilities and provide more personalized search options. This abstract highlights the potential of the RPA bot to transform the way we search for information and improve our daily lives.

Introduction:

In today's digital age, information is easily accessible. However, finding the right information can be time-consuming and challenging, particularly when traditional search engines fail to provide accurate results. To solve this problem, Robotic Process Automation (RPA) technology can be utilized to automate the search process and provide accurate results. The proposed RPA project aims to provide a solution to the common problem of inefficient and time-consuming search processes. The project involves the development of an RPA bot that enables users to search for information on various topics quickly and easily. The user will input their search query, and the bot will generate a new pop-up containing multiple search options such as PDFs, normal search, documents, images, and videos. One unique feature of the proposed RPA bot is the option to search for images on both the user's computer and the internet. Users can simply provide the path to the saved image or image URL, and the bot will search for similar images on the internet. This feature enhances the search experience and provides users with more options for finding relevant information.

Once the search results are generated, the user can input their email address, and the bot will send the search results to the user in a PDF or Word file containing links to the searched topic. This feature allows users to easily access the information they need, and it is particularly beneficial for users who need to conduct research or gather information for a project. The proposed RPA bot has several advantages over traditional search engines. First, it provides accurate and relevant results that are customized to the user's needs. Second, it saves time and improves productivity by automating the search process. Third, it is highly customizable, enabling organizations to tailor the bot to their specific needs and requirements.

Let's say you are a college student working on a research paper about the impact of social media on mental health. You need to gather information on this topic from various sources, including academic articles, news articles, and videos. However, searching for this information can be time-consuming and overwhelming. The proposed RPA bot demonstrates how it can be used by students to conduct research more efficiently and effectively. However, the potential applications of the bot are not limited to just students. It can be used by businesses, researchers, and individuals to search for information on various topics of interest, making it a valuable tool in today's digital age.

In conclusion, the proposed RPA bot has the potential to revolutionize the way we search for information online. With its ability to customize search options and deliver results in a convenient and efficient manner, it can save time and improve productivity for individuals and organizations alike.

Furthermore, the future scope of the RPA bot is vast. As technology advances and more data becomes available, the bot can be further optimized to deliver even more accurate and relevant results. Additionally, it can be integrated with other technologies, such as machine learning and natural language processing, to enhance its capabilities and provide more personalized search options. The RPA bot can also be used in various industries, including healthcare, finance, and marketing, to automate tasks and improve efficiency. For instance, it can be used to automate data entry tasks, customer service inquiries, and other repetitive tasks, freeing up time for employees to focus on more high-level tasks. Overall, the proposed RPA bot has a bright future, and its potential to transform the way we search for information online is immense. As technology continues to evolve, we can expect to see more innovative solutions like this emerge, making our lives easier and more productive.

Description Of Work

Figure 1: The diagram showing how the whole process takes place.

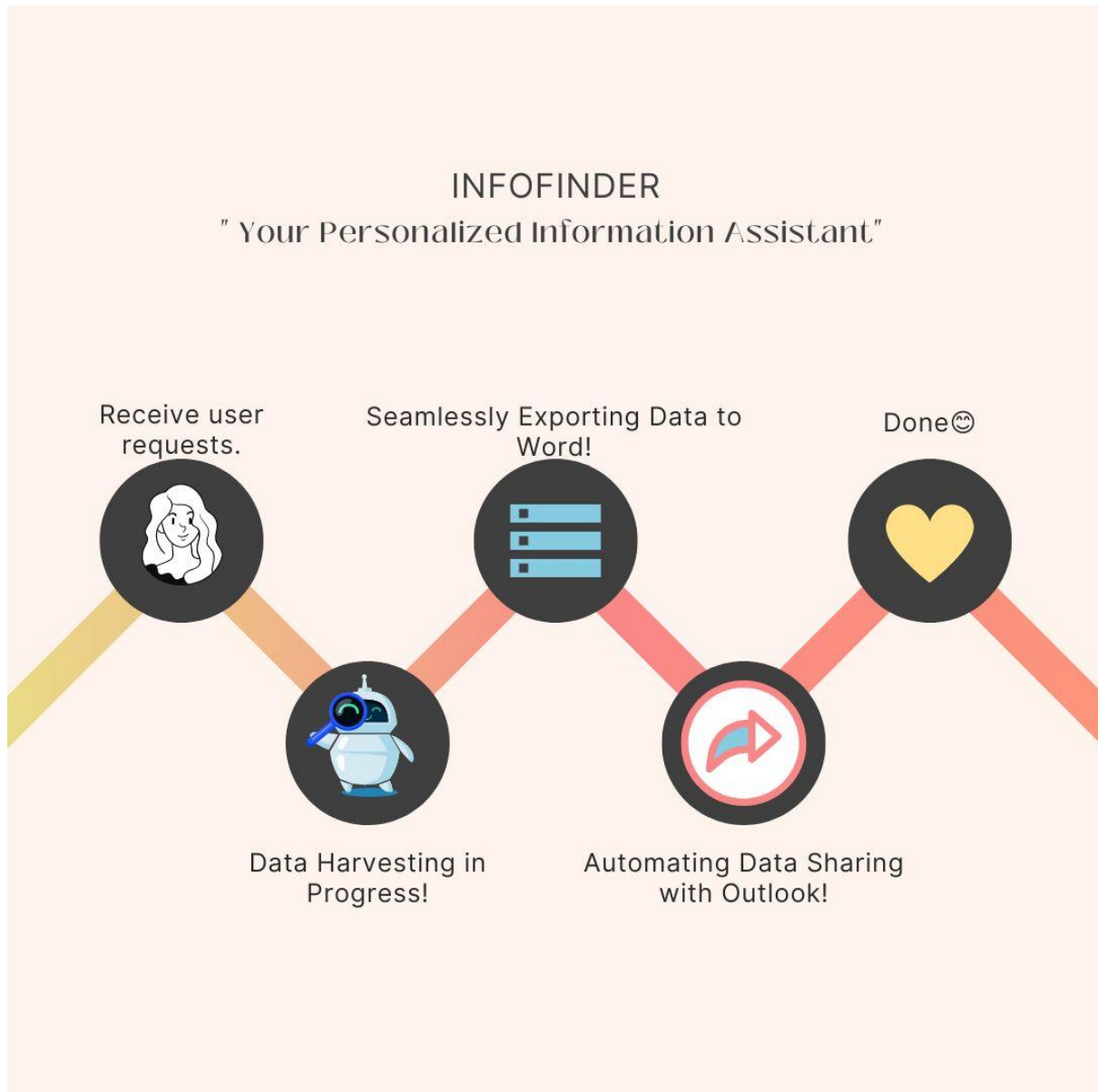


Figure 2: User will enter its preferences for search.

The figure shows three sequential screenshots of an 'Input Dialog' window, connected by downward arrows, illustrating a user's search preferences.

First Dialog:

- Dialog Title:** `Title. Text must be quoted`
- Input Label:** `"in which format you want to search"`
- Input Type:** Multiple Choice
- Input options (separate with ;):** `"Image;Text"`
- Value entered:** `searchfor`

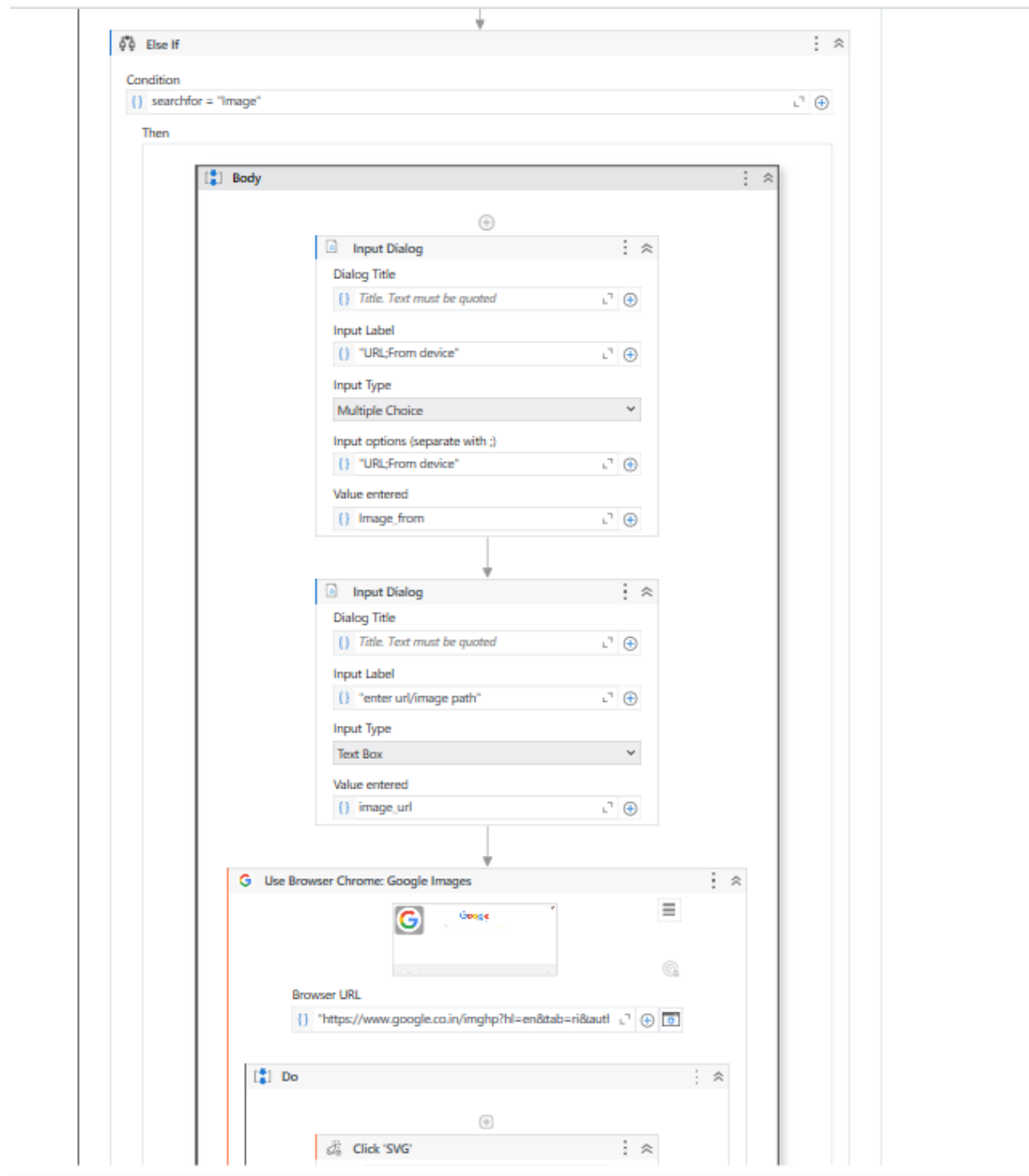
Second Dialog:

- Dialog Title:** `Title. Text must be quoted`
- Input Label:** `"how many responses you want "`
- Input Type:** Text Box
- Value entered:** `responses`

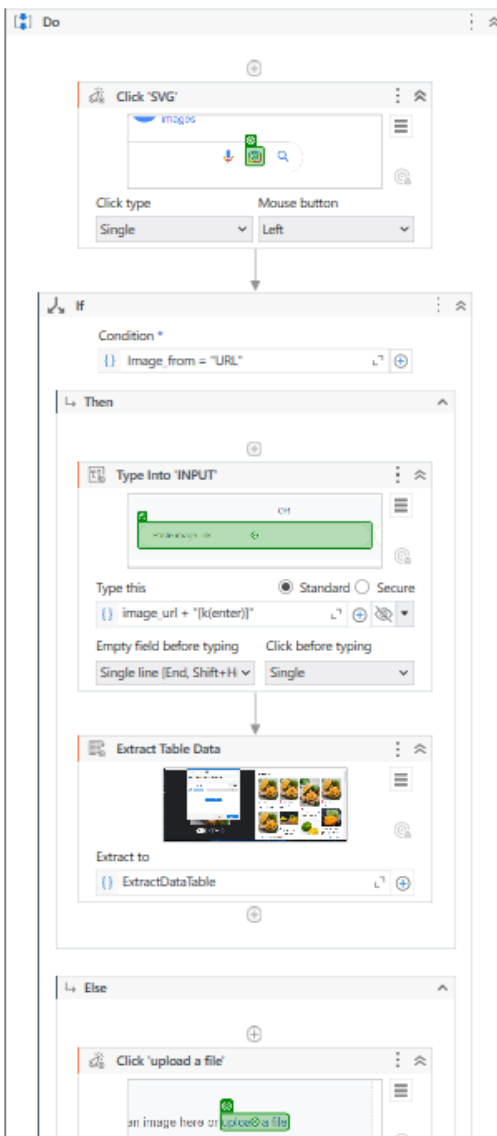
Third Dialog:

- Dialog Title:** `Title. Text must be quoted`
- Input Label:** `"Enter email"`
- Input Type:** Text Box
- Value entered:** `emailAdd`

Figure 3: If a user chooses to search for an image, they will be prompted to provide either a URL or the location of the image on their device. This information will then be used to perform a search on the internet, and any resulting links will be stored in a data table. The data will also be saved in a word document for further reference.



{} "https://www.google.co.in/imghp?hl=en&tab=ri&autl"



Click 'upload a file'

an image here or [upload a file](#)

Click type: Single
Mouse button: Left

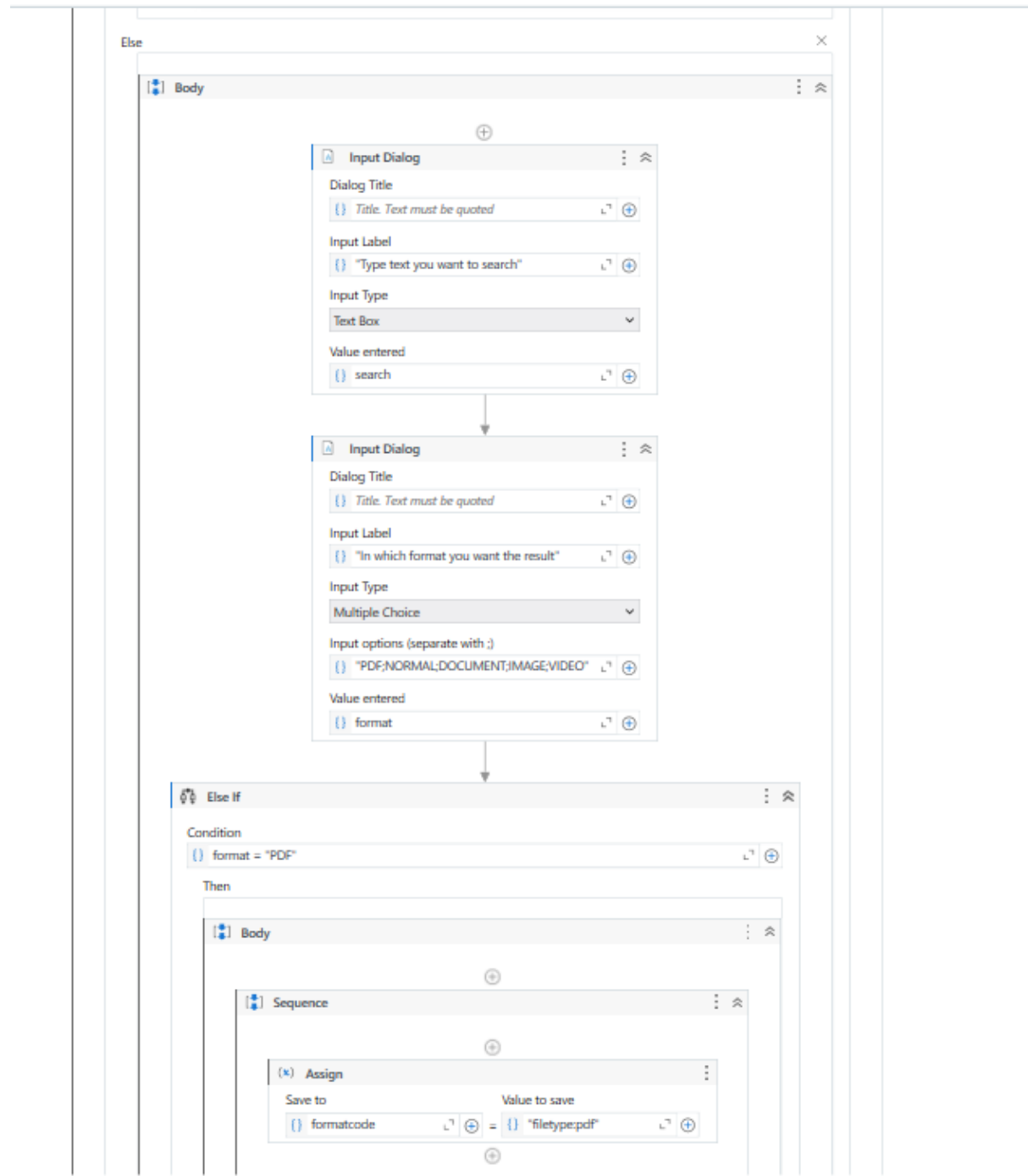
Type Into 'File &name'

Type this: `image.url + "[k(enter)]"`
Type this: Standard (selected), Secure
Empty field before typing: Single line (End, Shift+H)
Click before typing: Single

Extract Table Data

Extract to: `ExtractDataTable`

Figure 4: If the user chooses to search for text, a dropdown list of options including PDF, normal text, image, doc file, and video will be displayed. When the user selects one of these options, the program will use if-else statements to determine the format of the input. If a matching format is found, the program will perform a search on the internet and save the resulting links in a data table. The data will also be saved in a word document for future reference.



Else If - Condition

`() format = "DOCUMENT"`

Then

Body

Assign

Save to

`() formatcode`

Value to save

`() "filetype:doc"`

+ Add Else If or Else

Use Browser Edge: New tab

Browser URL

`() "edge://newtab"`

Do

Else If

Condition

`() format.Equals("PDF") Or format.Equals("DOCUMENT")`

Then

Body

Enter data into search bar

Type this



☒ Standard ☐ Secure

`() search + " " + formatcode + "[k(en`

Empty field before typing



Click before typing

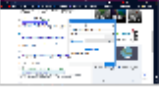
Type this ☒ Standard ☐ Secure

`() search + " " + formatcode + "[k(en`  



Empty field before typing ☐ Click before typing


Multi line [Ctrl+A, Del] ☐ Single ☐


 Extract Table Data 





Extract to



`() ExtractDataTable`  





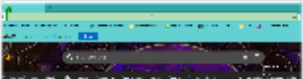
Else If - Condition 

`() format.Equals("NORMAL")`  



Then

 Body 

 Type data in search bar 






Type this ☒ Standard ☐ Secure

`() search + " " + "[k(enter)]"`  



Empty field before typing ☐ Click before typing


Multi line [Ctrl+A, Del] ☐ Single ☐


 Extract Table Data 





Extract to

`() ExtractDataTable`  



Else If - Condition 


`() format.Equals("VIDEO")`  

Then

Then

Body

Type data into search bar



Type this ☒ Standard ☐ Secure

{ }

search + " video " + "{k[enter]}"


Empty field before typing

Multi line [Ctrl+A, Del]

Click before typing

Single

Click "Videos"




Click type

Single

Mouse button

Left

Extract Table Data



Extract to

{ }

ExtractDataTable

Else If - Condition

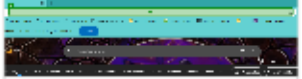
{ }

format.Equals("IMAGE")

Then

Body

Type data into search bar



Type this ☒ Standard ☐ Secure

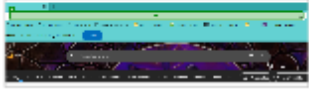
{ }

search + " image " + "{k[enter]}"

Then

Body

Type data into search bar



Type this

Standard

Secure

{ }

search + " image " + "{k[enter]}"


Empty field before typing

Multi line [Ctrl+A, Del]

Click before typing

Single

Click 'Images'




Click type

Single

Mouse button

Left

Extract Table Data



Extract to

{ }

ExtractDataTable

+ Add Else If or Else

Figure 5: It stores the output in the Word file as Links.

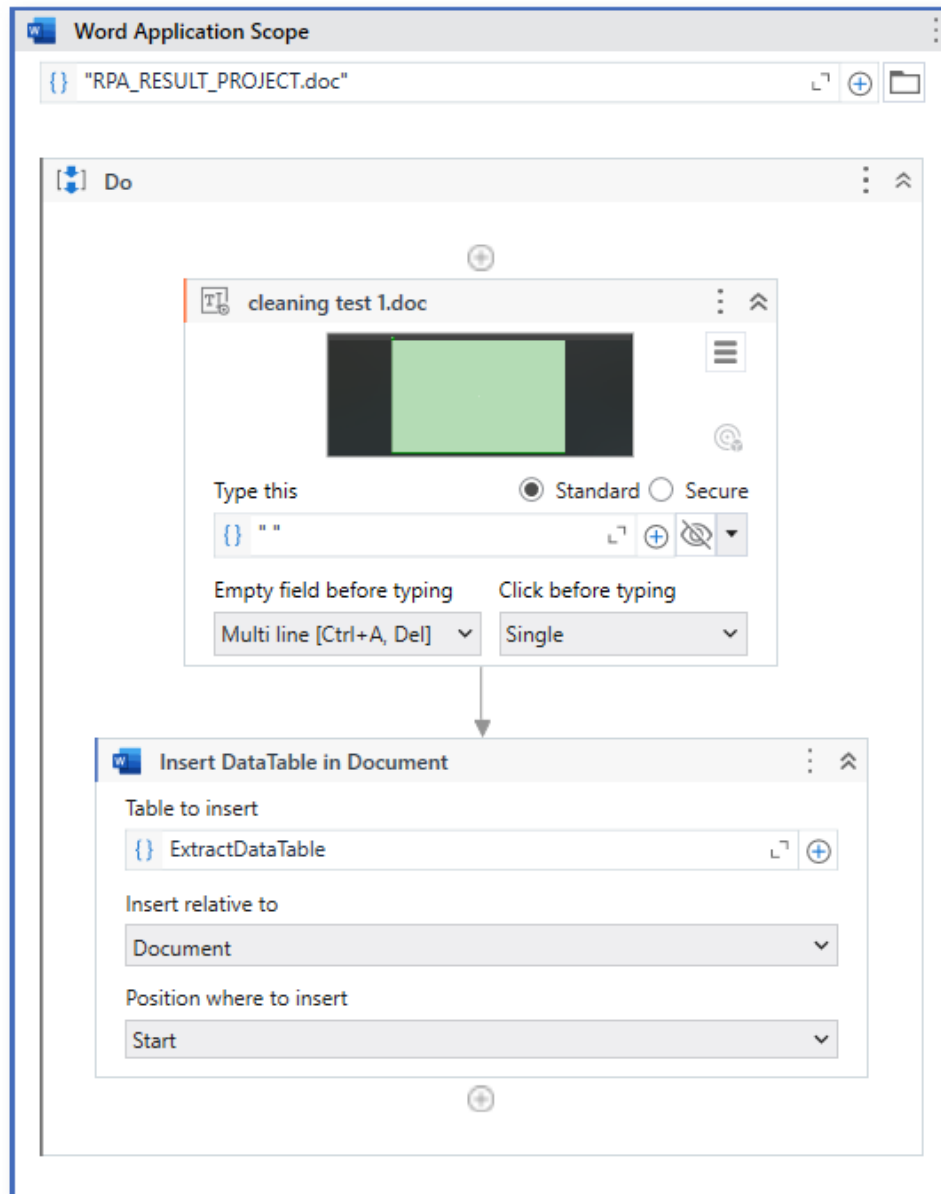
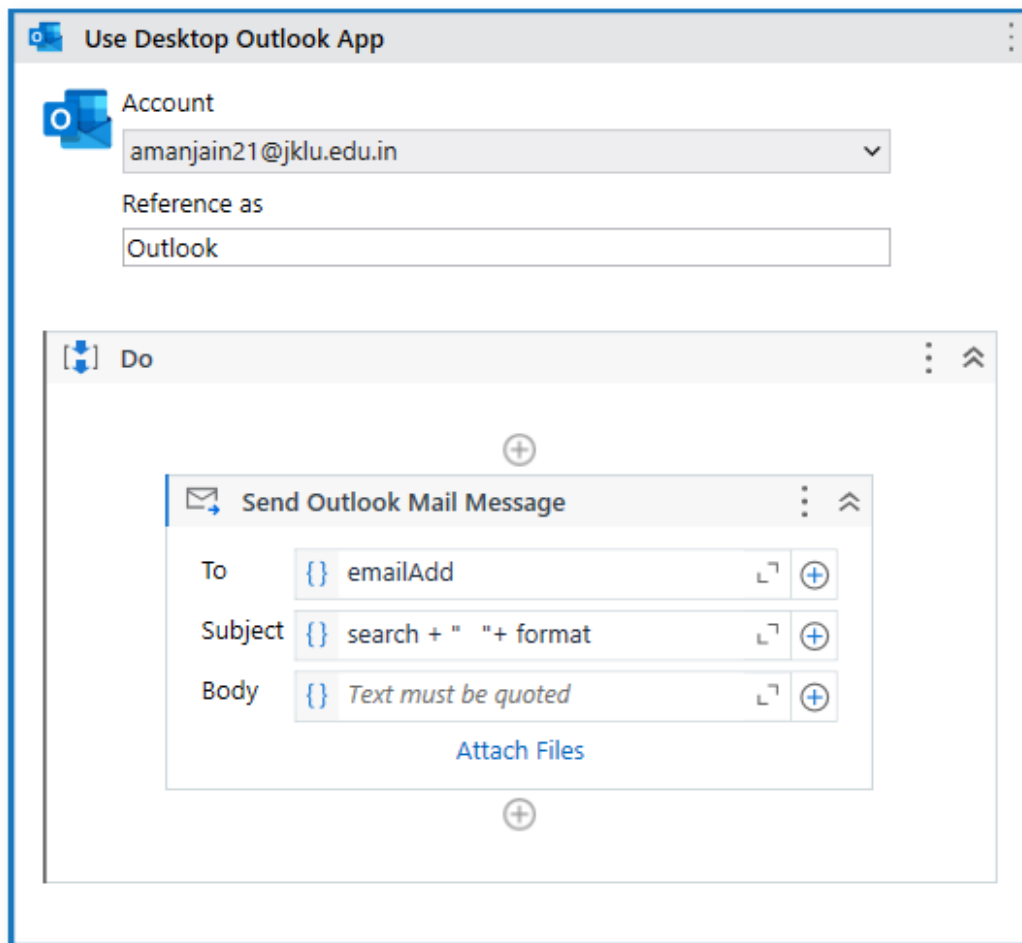


Figure 6: This will send the word file to the user mail ID.



Results:

Figure 7: User will enter the topic he/she wants to search.

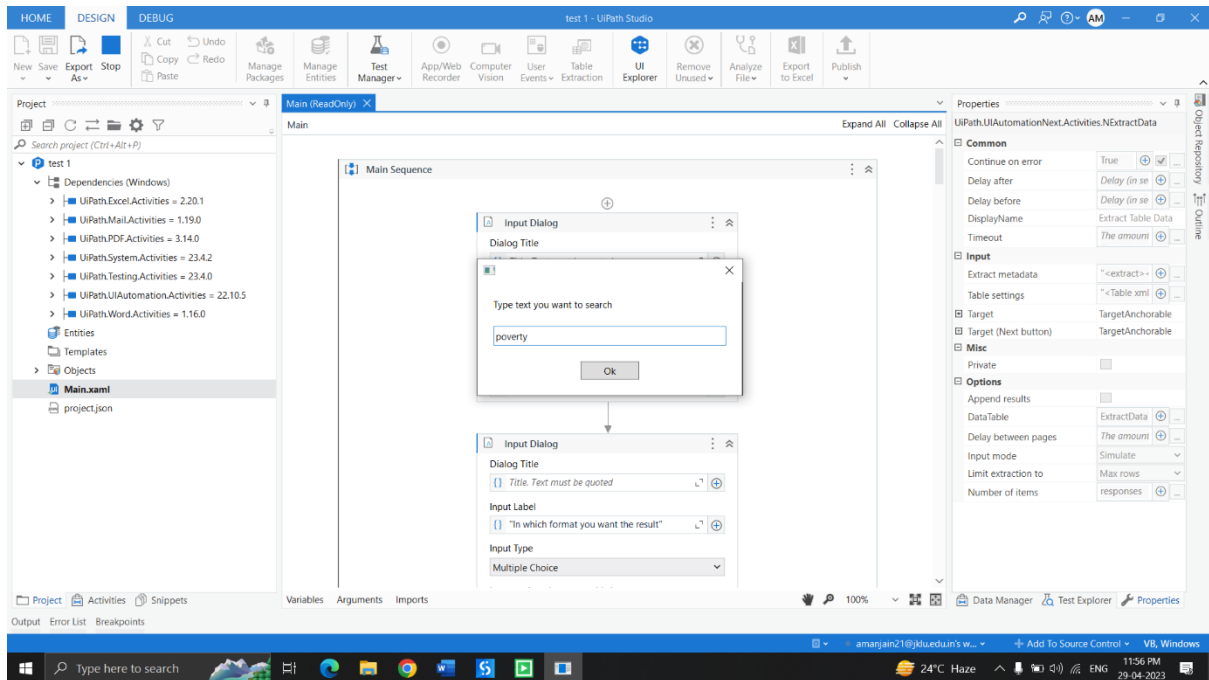


Figure 8: User will choose the desired format.

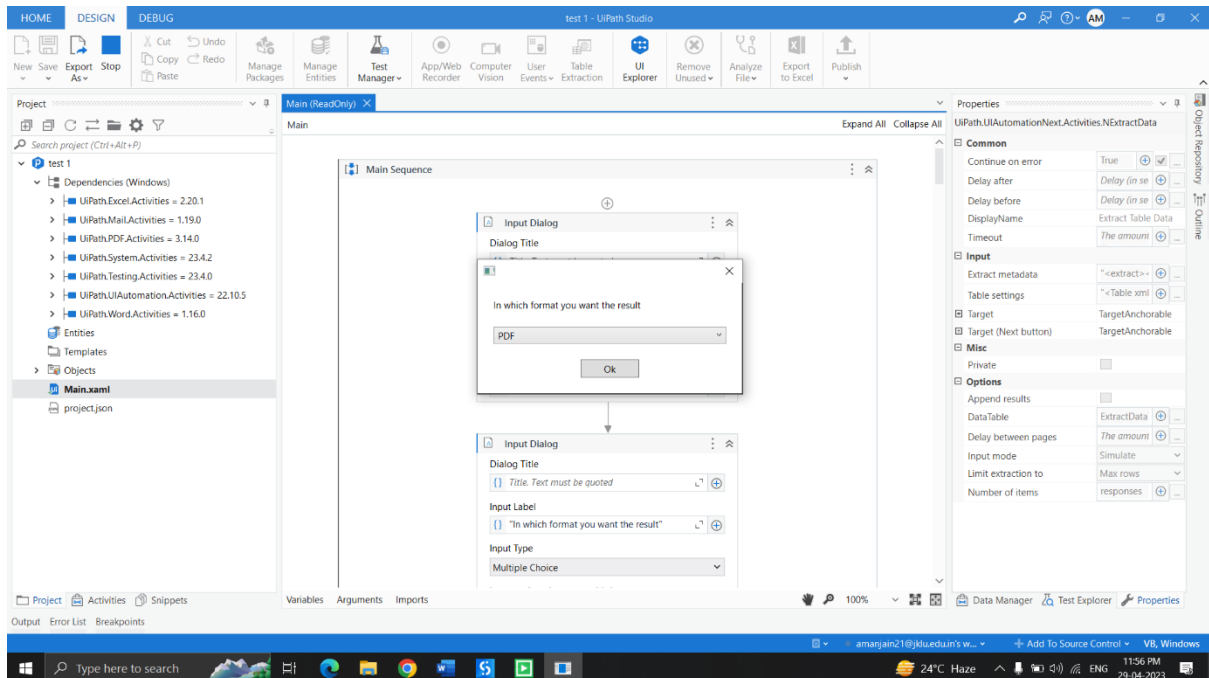


Figure 9: Now user will specify the number of output result he wants.

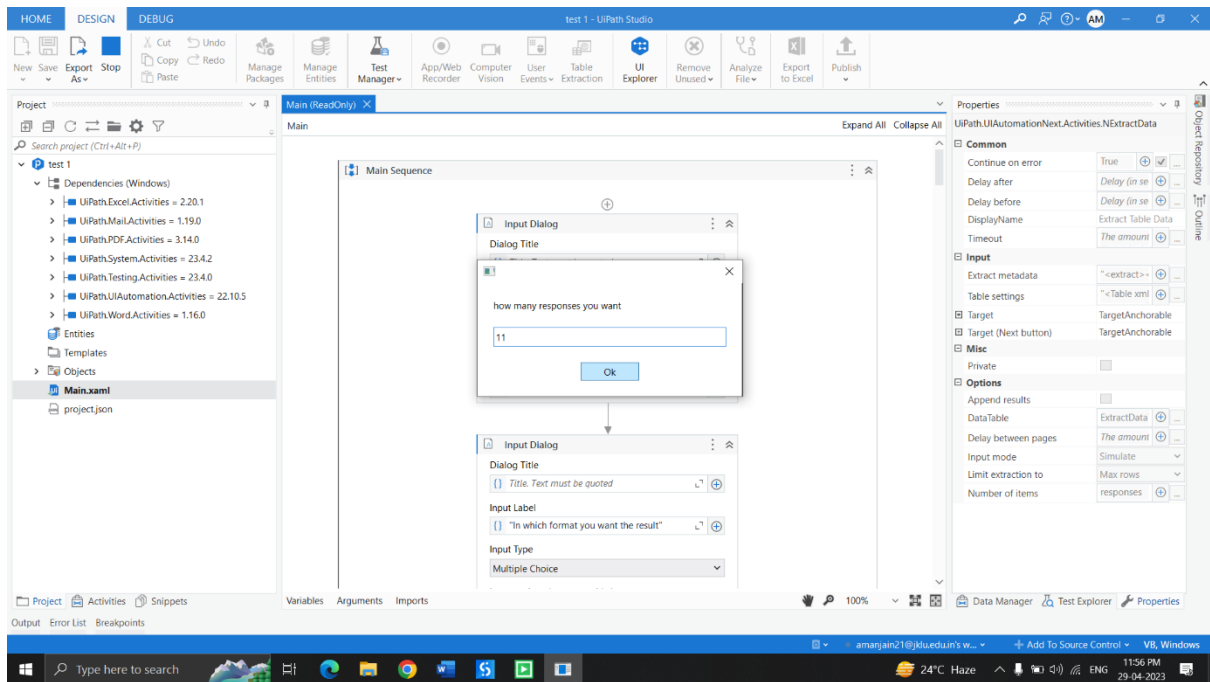


Figure 10: Then user will provide its mail ID to send the desired output that is the word file.

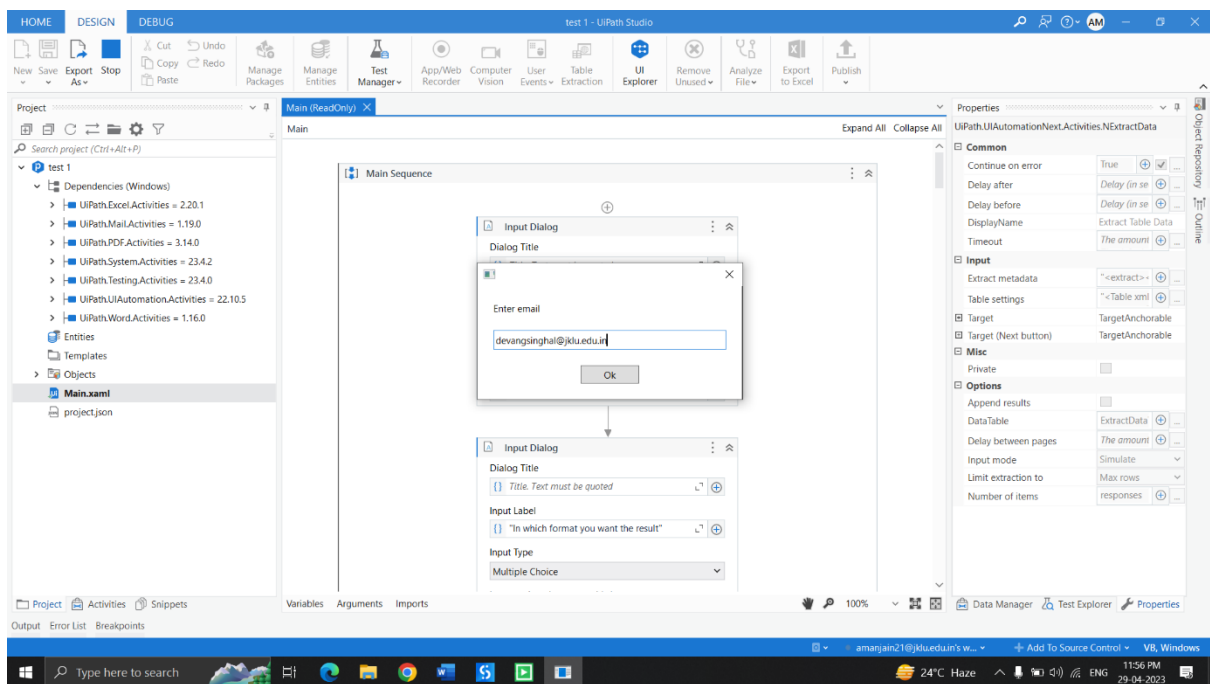


Figure 11: Then it start searching on the internet.

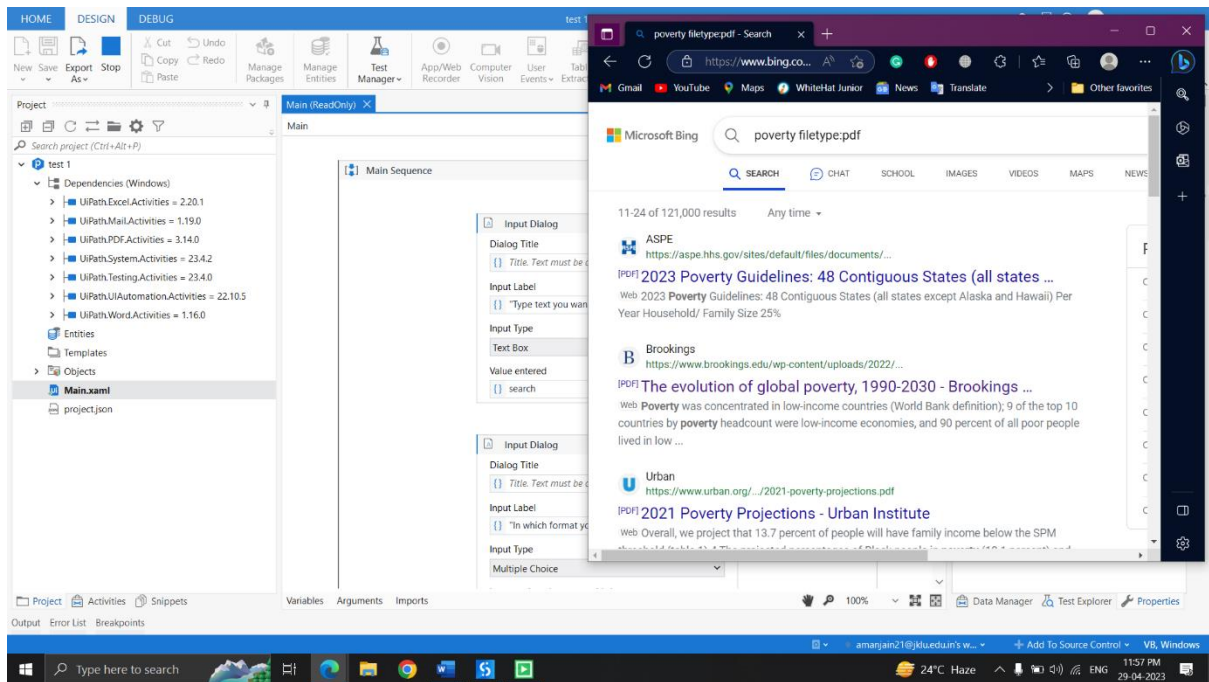


Figure 12: The output will look like this.

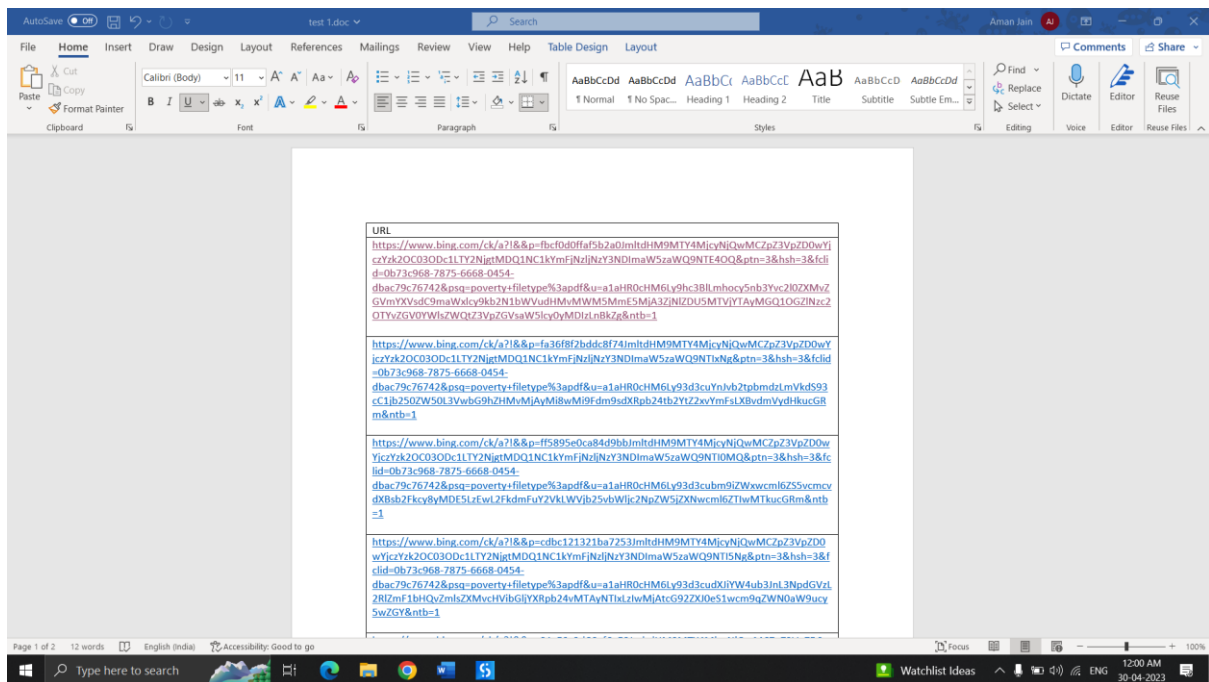


Figure 13: When the user open the link the PDF open.



If user wants to search Image, then it will choose Image as an option as shown below:

Figure 14: We choose image option to search for an image from internet.

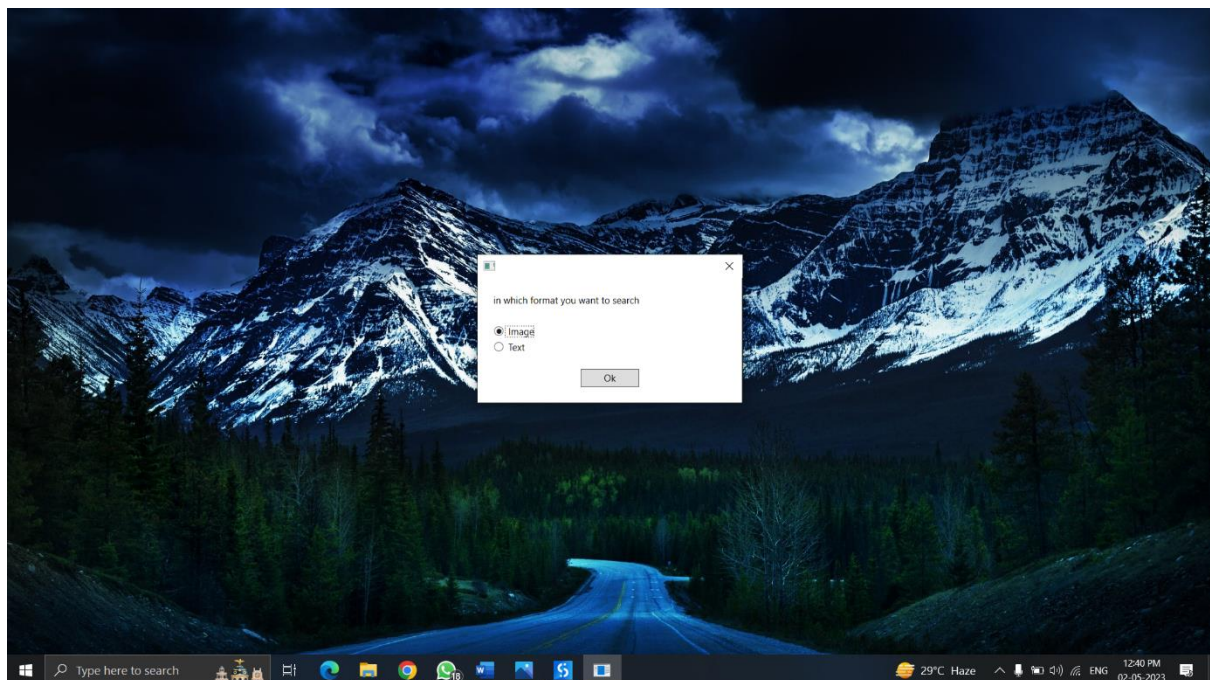


Figure 15: Number of responses we want.

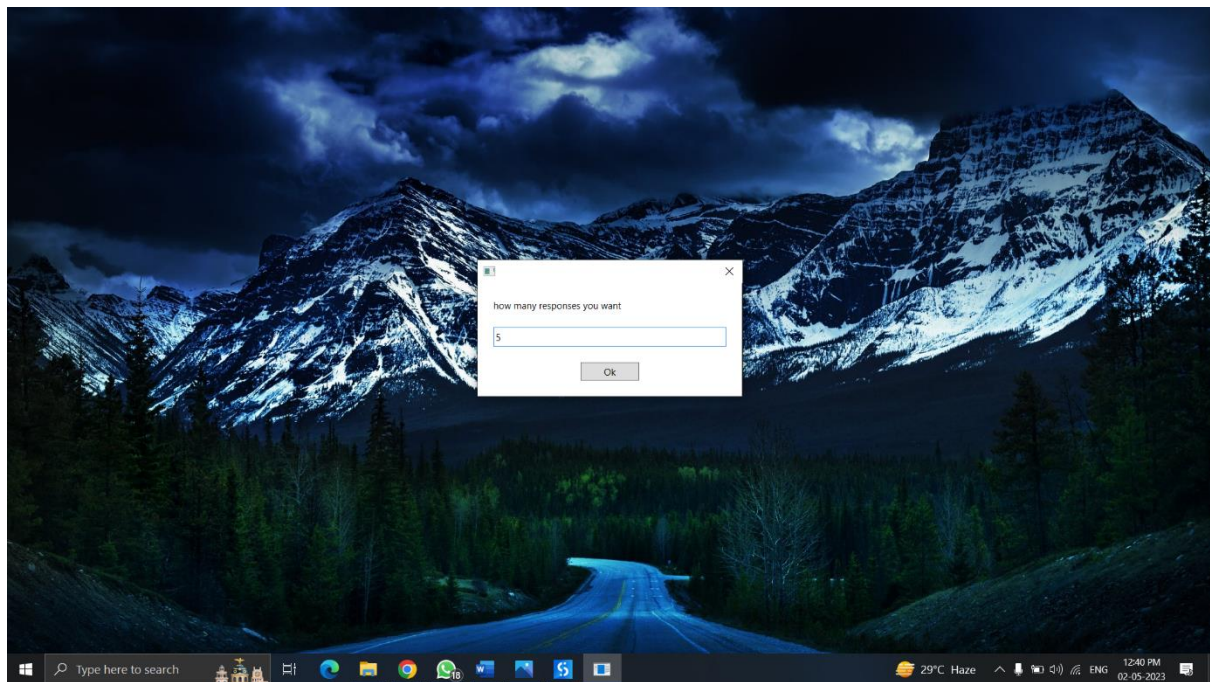


Figure 16: write the mail ID of User.

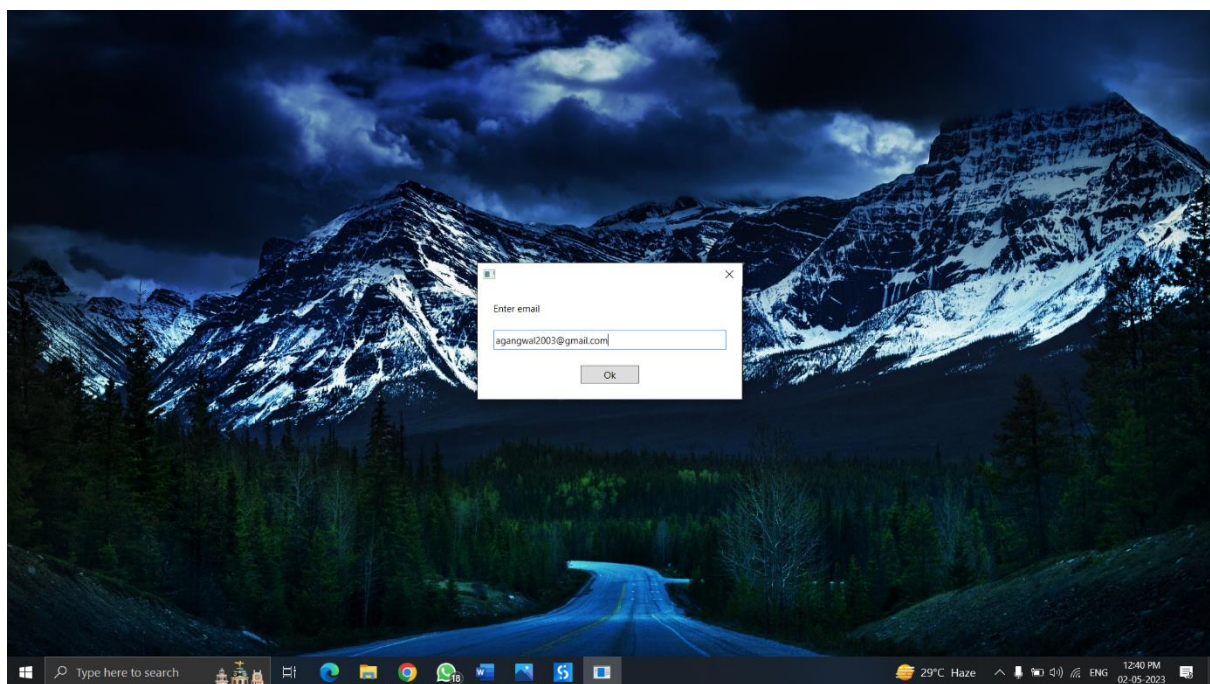


Figure 17: Choose URL option as we want to search from Web.

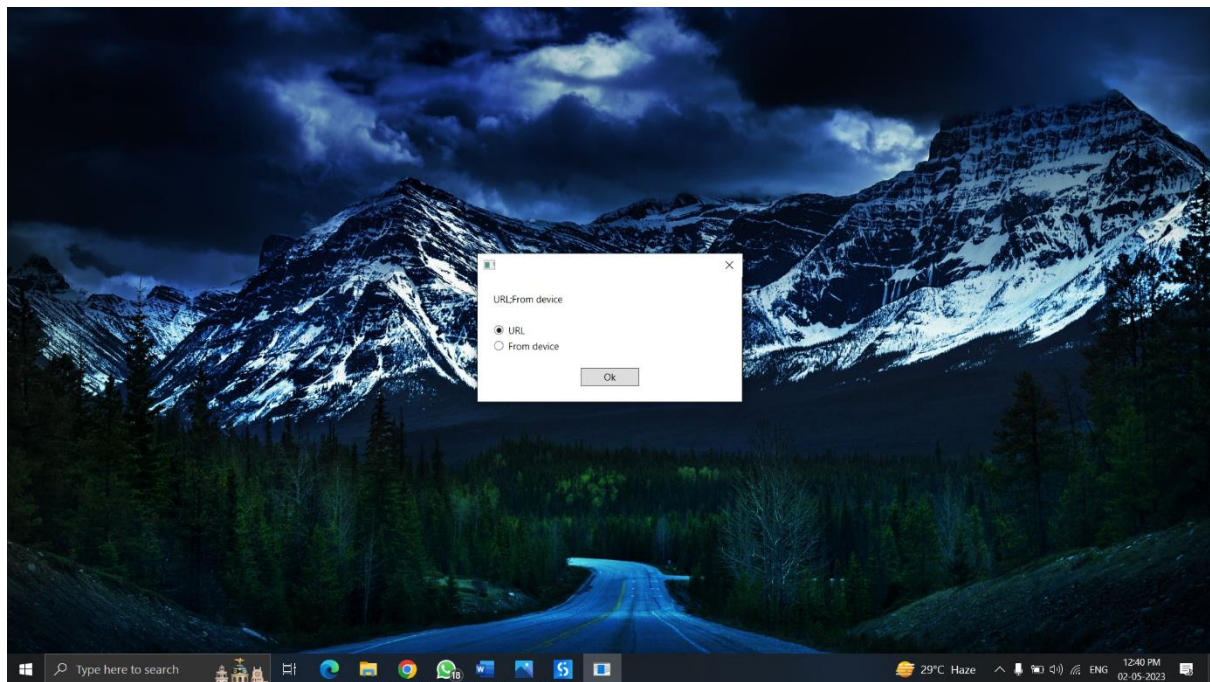


Figure 18: Give the URL of the picture.

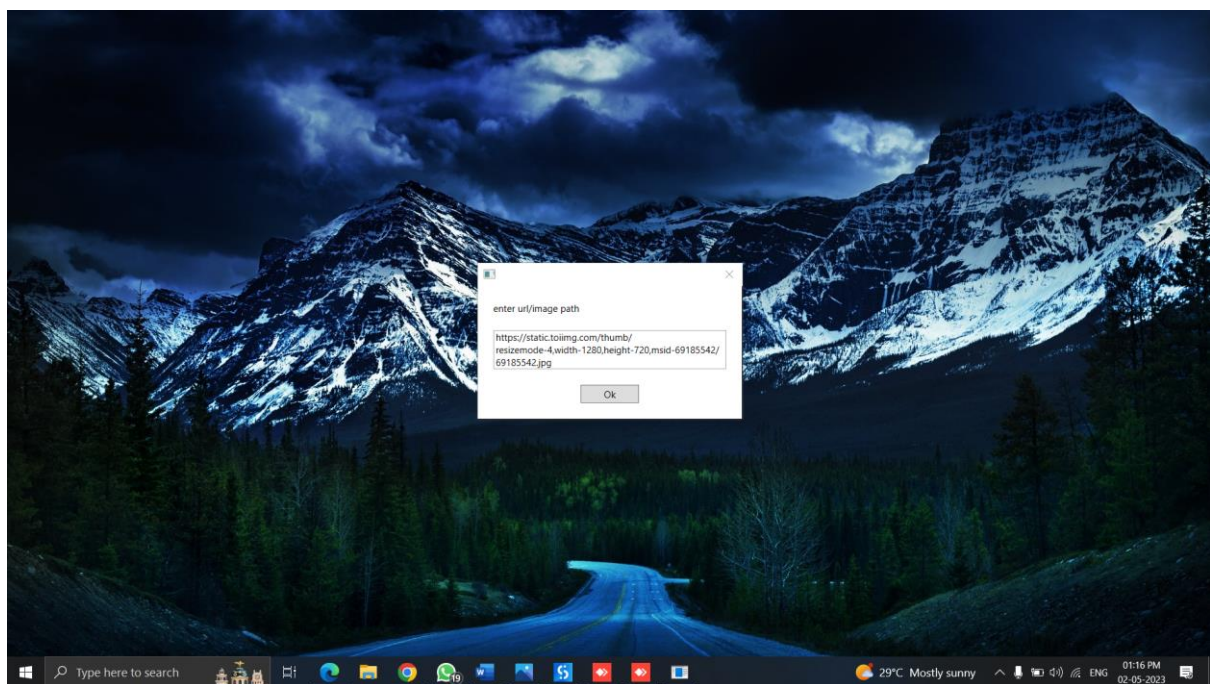


Figure 19: Start finding the image using Google Image.

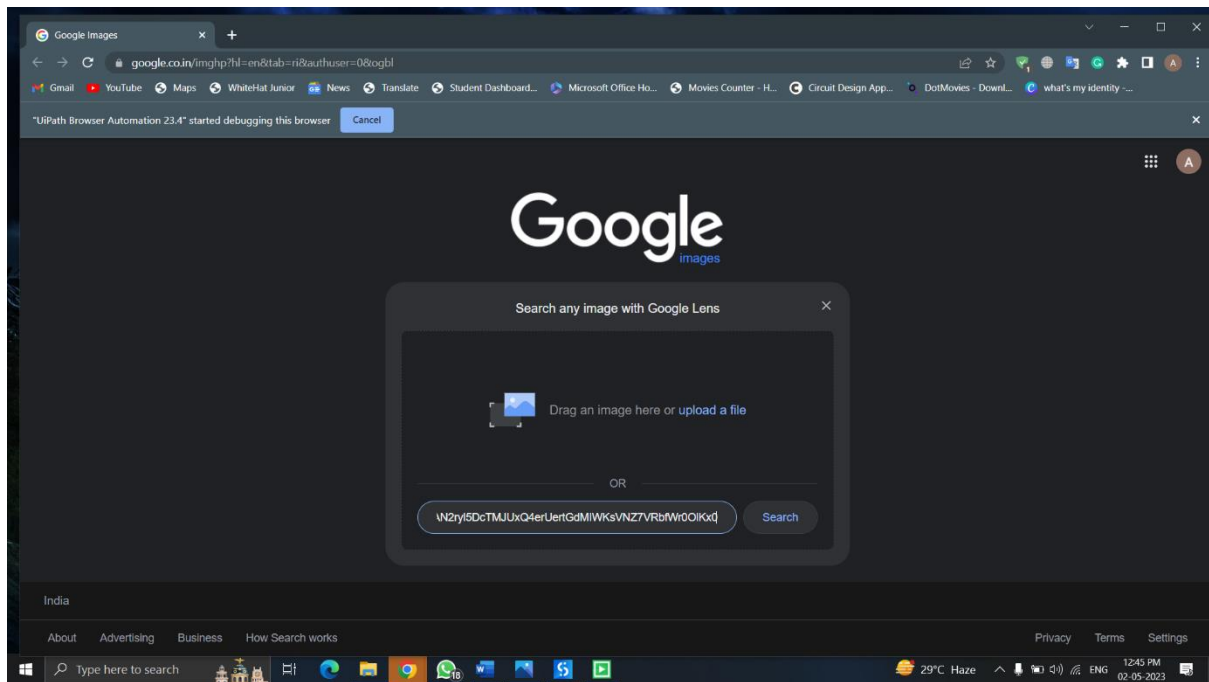


Figure 20: The output is stored in word file as shown in figure 20.

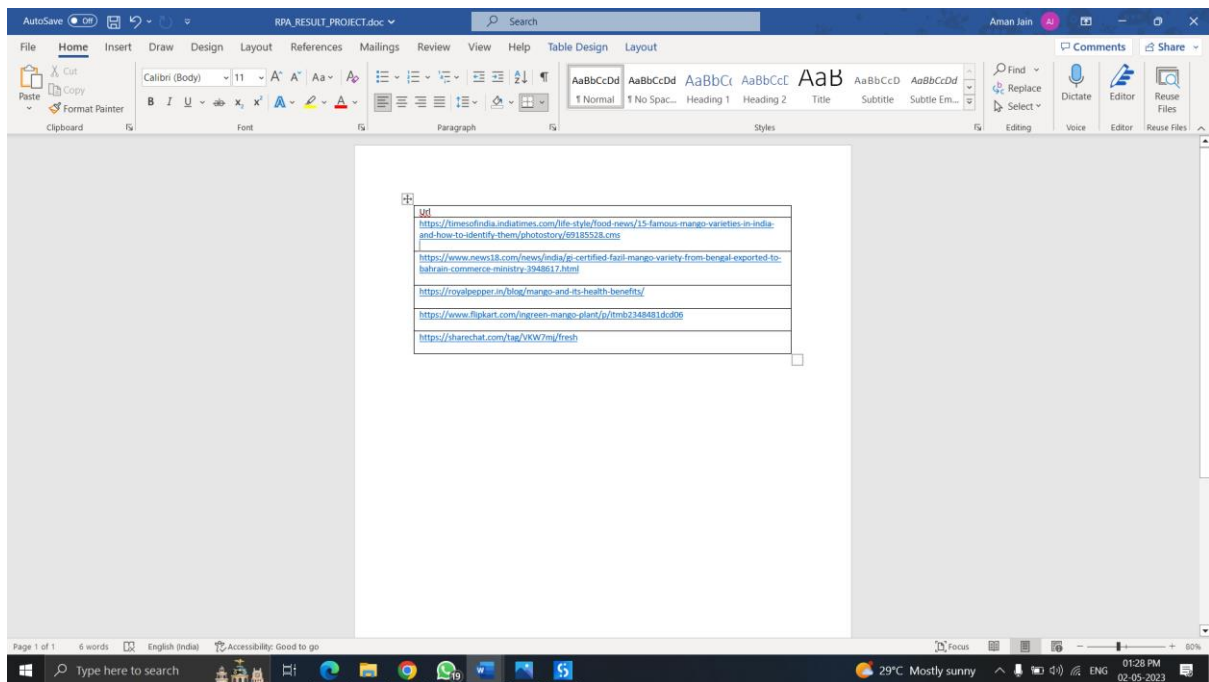


Figure 21: When user open link it will look like this.

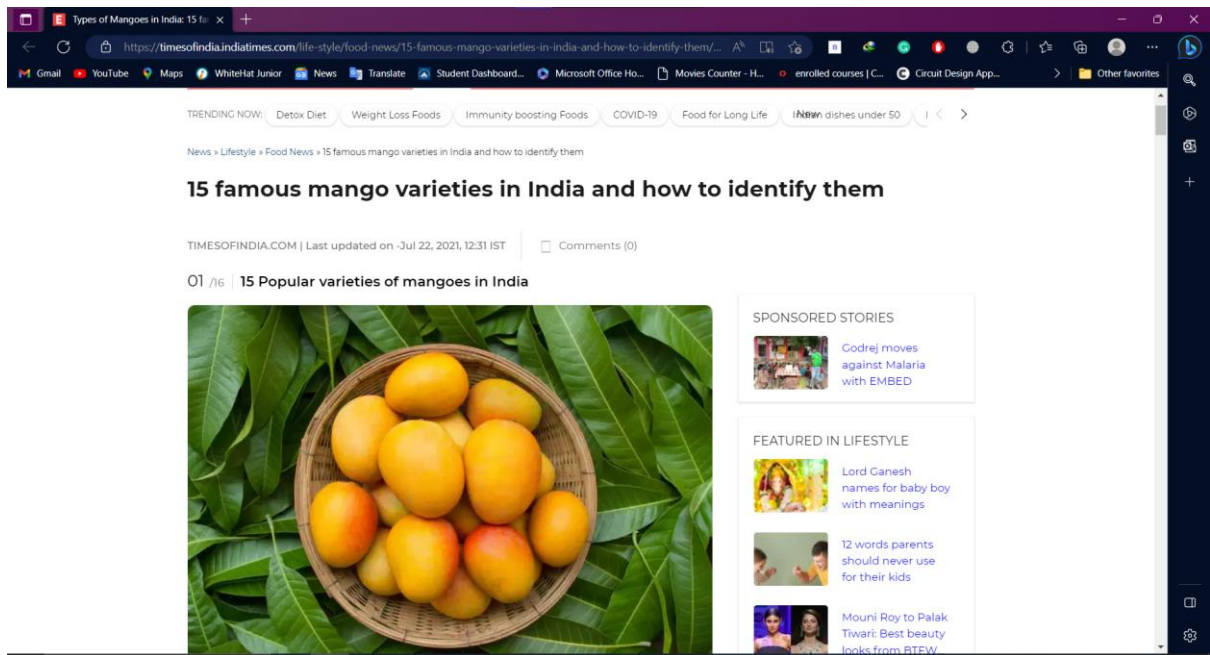


Figure 21: Sender side email.

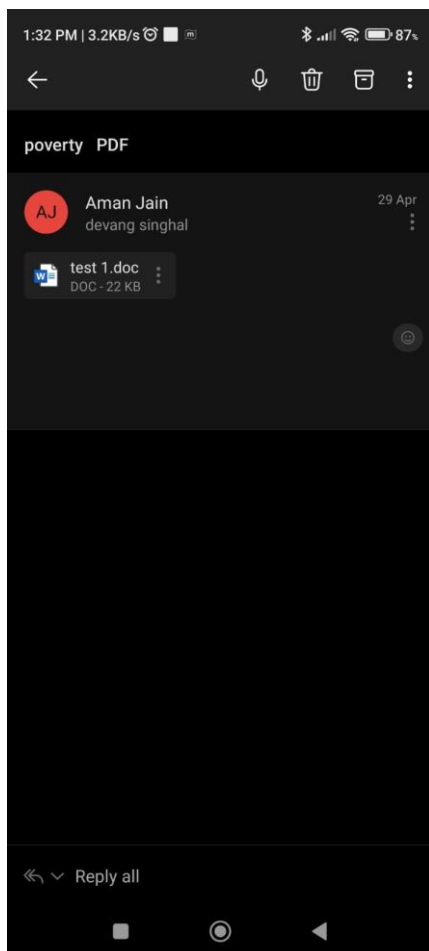


Figure 22: Receiver side Email look like this.



Conclusion:

InfoFinder is a promising innovation that can revolutionize the way people search for information online. Our project aimed to develop an intelligent search bot that can cater to diverse search requirements, including PDFs, documents, images, videos, and normal searches. By allowing users to search images from their PC or input a picture URL, we have made InfoFinder more versatile than traditional search engines. Additionally, by providing users with the option to receive search results in a PDF or Word file, we have made it easier for them to access and share their search results with others. The development of InfoFinder has taught us valuable lessons in software development and project management. We learned about RPA how to define objectives, develop prototypes, test, refine and deploy software products. We also learned how to work in a team and communicate effectively to achieve common goals. We believe that these learnings will be beneficial to us in our future careers.

Future Work:

Future Scope: The potential of InfoFinder is vast, and there are numerous opportunities for further development and integration. For example, we could integrate InfoFinder with voice assistants such as Amazon's Alexa or Google Assistant, enabling users to interact with the bot through voice commands. Another area of development could be the use of machine learning and natural language processing to enhance the bot's intelligence and accuracy. By training the bot with user data, we can improve its search capabilities and provide personalized search results. Finally, we can explore the possibility of integrating InfoFinder with other software products, such as web browsers or mobile applications, to enhance the user experience further.