

# Online Shop Engine Using RPA

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**Abstract-** *The Online Shop Engine could be a Robotic Process Automation (RPA) Project. The Bot is majorly created to enter into the various online website like Amazon, Flipkart, snapdeal, etc and scrap the information. The user enters the merchandise name, gives location for the shipment purpose then searches the actual product. The bot actually collects the desired information of the chosen product from different websites for the comparison. The user compares the searched product in a single website, the method is straightforward, easy and highly supported cost and time efficient. the web Shop Engine is employed for several tasks like scraping data from a distinct website, comparison of product details like cost, features and specifications. It reduces the time and energy required to drill down from each website. It collates the automated results which is straightforward to consume, visualize, understand and it helps to match & buy the merchandise easily.*

**Keywords-** Bot, Website, User, Comparison, Product.

## I. INTRODUCTION

Robotic process automation (RPA) is that the bring into play of software with computer science and machine learning potential to handle high-volume, errands that previously required humans to perform. These tasks are often comprised of queries, calculations and maintenance of records and transactions. RPA is backend processor to perform the tasks without human interference. RPA technology is mentioned as a software robot or a Bot which mimic a person's action.

UI path is one in all the extensively used robotic process automation tools and it had been founded by the Romanian entrepreneur within the year 2015 to grant software which might eradicate the monotonous time consuming rear works.

UiPath Studio may be a complete software mechanism that enables you to automate your side recurring tasks. It converts tiresome tasks into complete UI automation, thus, making your work ease and quicker. UiPath may be a Robotic Process Automation tool which is employed for Windows desktop automation. it's accustomed automate repetitive/redundant tasks and eliminates human intervention.

The tool is straightforward to use and incorporates a drag and drop functionality of activities.

### 1.1 COMPONENTS USED

A. *UiPath Studio* – A tool that authorizes you to style automation processes in a very graphical manner, throughout diagrams. UiPath Studio has an ample style of characteristics which might easily incorporate with any language and stimulate easy use, competence, and scalability.

B. *UiPath Robot* -implements the processes in-built Studio, as an individual's would. The Robot will commence executing the business activities with perfect precision. All robots required are a wonderfully predefined rule and set of accurate data.

C. *UiPath Orchestrator* - a Web/Server-based application that permits you to arrange, schedule, supervise and handle Robots and processes. It acts as a middle platform in managing the performance of the automation. The Orchestrator runs on a server to attach all robots to the current server and passes instructions on different events like whether to attend, unattended, or be idle for a specific event. Browser-based orchestration enables management of many robots through one click.

### 1.2 UI PATH PROJECTS

There are two styles of standalone projects that are available within the UiPath and that they are process and library.

*Process:*A process forms an association between an environment and a package. A package may be a predefined pack of services developed using the Jacada Integration and Automation (JIA) application. whenever a package is inserted into an environment, it automatically gets distributed to all or any the robot machines that are associated to the environment.

*Library:*A library may be a package which contains various reusable components. Libraries are saved within the style of files and may be installed once they are necessary to handle the surplus workflows using the package manager. In Orchester, this is often termed as a consolidate place to store

all the libraries, namely the library page. From this destination, the libraries are accessible by the those who have permission or accessibility to that.

A process library is defined as a sequence of endeavour with a well-defined business function, which make them suitable for reusability and sharing. On the Libraries page, you've got an choice to view and delete the libraries that had been used on the UiPath Studio, and also the files that were uploaded manually.

1.3 TYPES OF SUPPORTED WORKFLOW

In UiPath, the Automation is interconnected with multiple aspects and it enables you to automate the rule-based process. to realize effective automation, each work should be assigned to a selected thing and might be performed effectively. Each activity in UiPath needs to undergo small activities like reading a file, clicking a button, writing a log panel, etc.

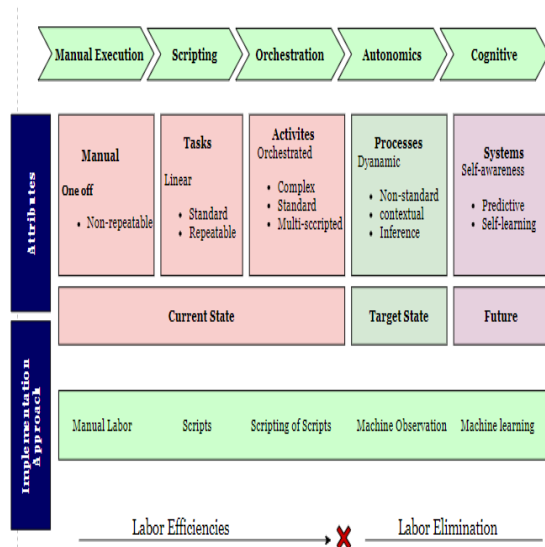


Fig.1: Workflow of UiPath

1.4 LAYOUT DIAGRAMS

A. Sequences: It most closely fits for the linear process in moving from one stage to a different without causing any disturbance to the workflow.

B. Flowcharts: It is designed to suit the organizations whose automation requires some logical ability. It clears all the issues in a very diversified manner through multiple branching operations.

C. State machines: It uses an infinite number of states in their execution which are triggered by a condition (transition) or task.

D. Global exception handler: it's appropriate for identifying the workflow performance while encountering an execution error.

II. PROBLEM STATEMENT

In the existing system, the user must surf different shopping websites to buy a product in online. Because of this, it takes excessive time to check same product with different sellers. Therefore, in our proposed system all the products from different shopping websites are automated and shown in single webpage which saves many time while shopping online.

III. PROPOSED SYSTEM

To overcome the problem, we face within the existing system, the RPA robot has been structured fixing all the problems. The proposed system consists of 4 panels: Data-Scraping the products from different shopping websites are automated and shown within the single webpage. Automatically the bot monitors the purchasers search product and automate it from all the shopping websites into one webpage. By using this we will reduce lots of your time for the purchasers to shop for best products.

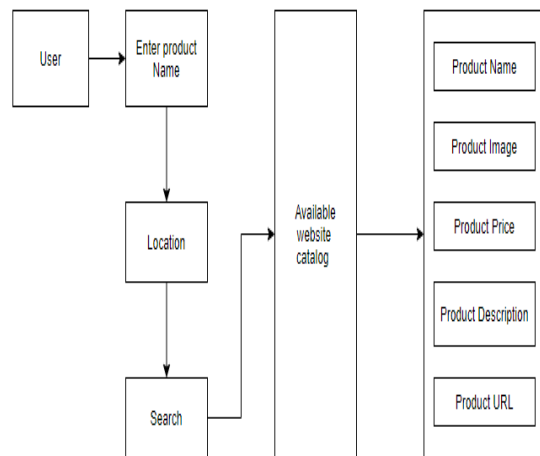


Fig.3.1: Architecture Diagram

**IV. OUTPUT AND RESULTS**

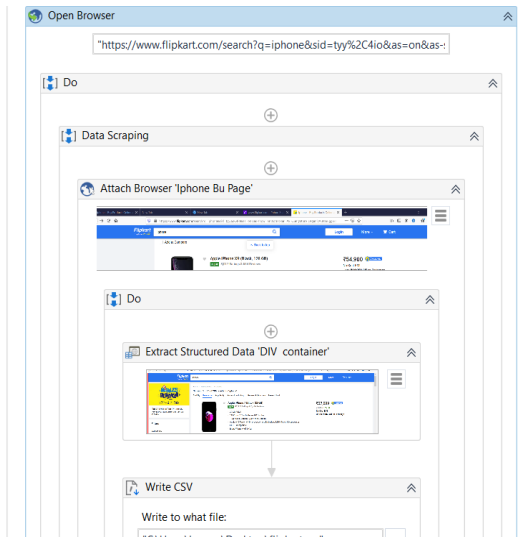


Fig.4.1: Data Scraping

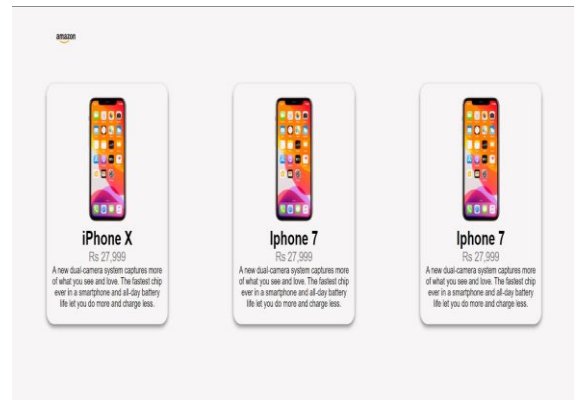


Fig.4.4 Product from Particular Website

**Online Shop Engine**

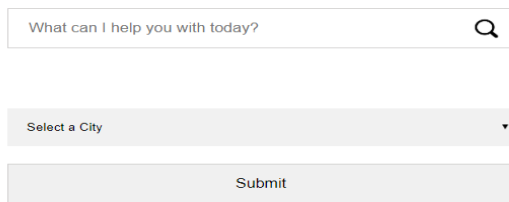


Fig.4.2. Open Browser

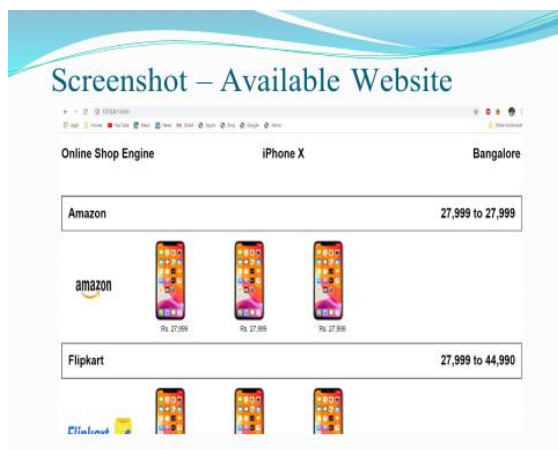


Fig.4.2. Available Website

**V. CONCLUSION**

As the automation reaching every nook and corner of today's world, it's become indispensable vital role for the organizations in choosing the precise tool that most closely fits their organizational needs. The web site is straightforward to shop for products together with comparison of costs. It reduces manpower and supply accurate results for the subsequent searches. Users are given feedback choice to express their views which is able to be sent to the shopping server directly.

**VI. FUTURE ENHANCEMENT**

This paper is targeted to implement the method by the servers and databases maintained by the corresponding online sites on the actual account of the customer. The bot will display the shipping price together with the particular price of the merchandise in future.

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