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APPMINE WEB APPLICATION

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Abstract: The purpose of this project is to overcome the existing problem of system by the help of detecting the device architecture and OS, it will only such application which is compatible with the client's machine. It can be detected using User Agent in the HTTP request. A JSON string will be returned whenever client requests the sever. The Application enables users to submit reviews, ratings and know the popularity of app based upon the number of times the app has been downloaded. The store allows users to browse and download apps created by individuals or an organization. Admin access is also provided for the developers to publish their own apps once the production phase is over.

IndexTerms - Component, formatting, style, styling, insert.

I. INTRODUCTION

User can download Applications according to their compatibility using one website. Applications for multiple platforms or Operating System will be available in other word it is a One app store Admin access will be provided to developers for publishing their own apps after the registration over the website. Existing Users have to login in their account before downloading any Application. User can register itself as a new user as well. Once logged in as a user, one can search for their desired application, enhanced searching techniques are to be implemented such as voice recognition. The purpose of this project is to overcome the exiting problem of the system by the help of detecting the device, and according to device OS we can provide the application according to their need and operating system in his/her device.

II. AIMS AND OBJECTIVE

Detect the OS of the client machine and show only those application which are compatible.

User can easily download the application without bothering about system compatibility.

Developer can register themselves and publish new application.

Application for multiple platforms or Operating System will be available.

User can register itself as a new user as well.

Once logged in as a user, one can search for their desired application, enhanced searching techniques are to be implemented such as voice recognition.

A single web application for multiple platform compatible devices according to ones need and additionally the system configuration. Advanced Searching Technique are available such as, voice to text, search on the basis of Application name, searching on the basis of Operating System.

Benefit to Organization the organization will obviously be able to gain benefits such as saving in operating cost, reduction in paperwork, better utilization of human resource and more presentable image increasing goodwill.

The Initial Cost the initial cost of setting up the system will include the cost of hardware software & labor.

III. METHODOLOGY

Using User-Agent of HTTP request, we can identify the requesting machines architecture as well the platform it is running on. User agent (UA) strings transmitted during HTTP transactions convey client system configuration to the server, using an algorithm fill will differentiate between the systems and according to the compatibility the applications will be shown. The Front-end is designed using EJS, CSS and JavaScript and for the Back-end Express.js framework is used in Node.js Environment and the MongoDB a NoSQL database is used to store the details of applications that are published.

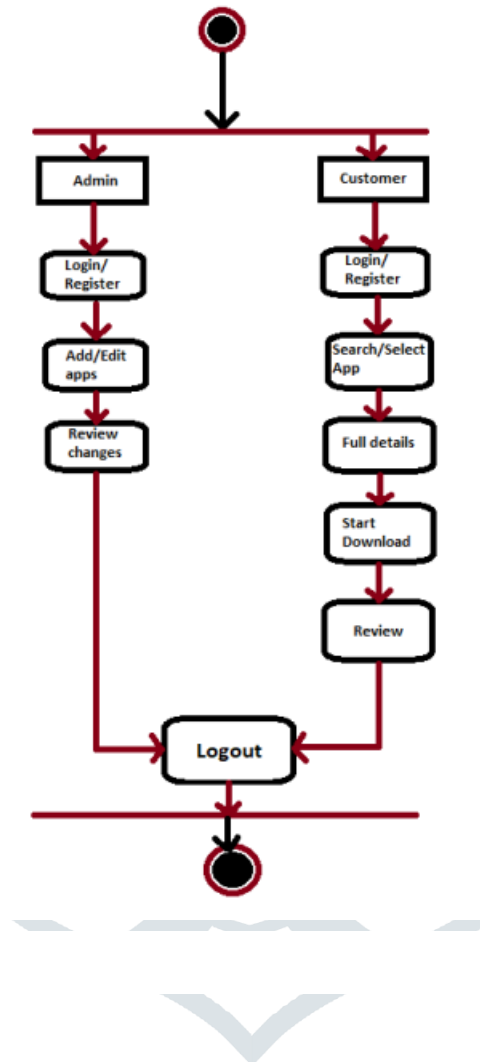
IV. ACTIVITY DIAGRAM

An activity diagram portrays the control flow from a starting point to a finishing point showing the various decision ways that exit while the activity is being executed. We can depict both sequence processing and concurrent processing for user and admin of activities using an activity diagram.

There are two routes, one for the user/customer and another one for developer/admin-

In the customer route, there will be a sign up/sign in page. After successful authentication by creating new account or logging in to an existing one, user is redirected to the home. Where application compatible to the client machine will be shown. User can navigate to any page and download that application and can leave a review as well.

Now talking about the admin route. Once the admin completes the authentication by creating new account or logging in to an existing one. Admin is redirected to the home page. Where he/she can publish new application, edit existing one or completely delete one. Admin can also view its already published applications as well. Once the admin/user is done with task, he/she can log-out of the web application.

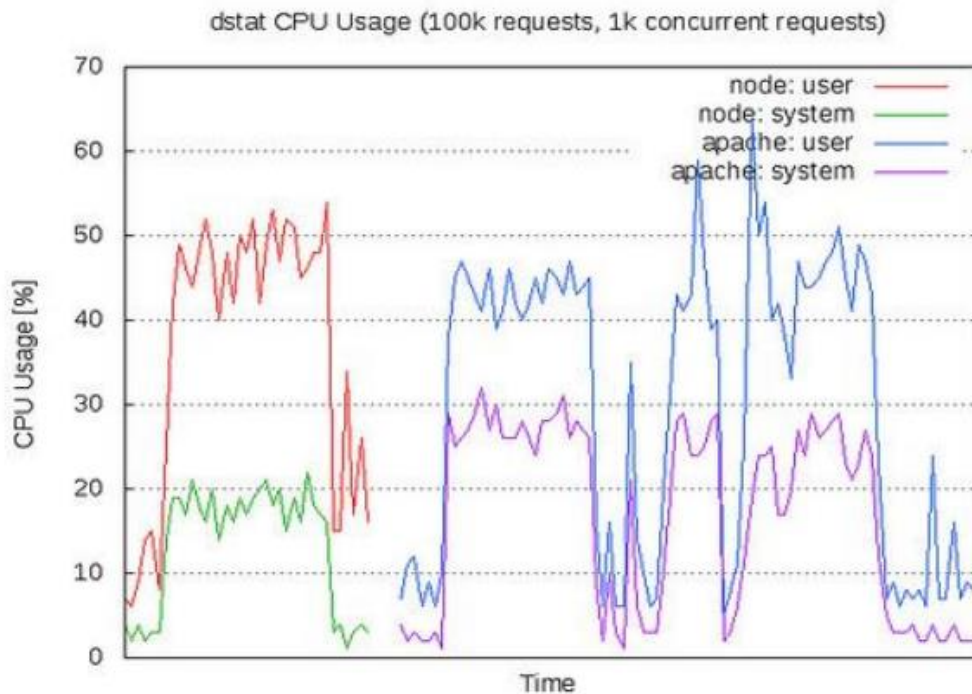


V. SYSTEM ANALYSIS

In this paper, test driven improvement of a web application has been completed utilizing generally new programming framework called express.js running over node.js environment (server-side JavaScript technology).

Developed in 2009 by Ryan Dahl, Node.js (or just Node) is a single-threaded server-side JavaScript environment implemented in C and C++.

Nodes architecture makes it simple to use as an expressive, functional language for server-side programming that's is well known among developers [4]. Node uses the JavaScript V8 engine, developed by Google, a quick and effective usage of JavaScript that helps Node accomplish top performance. In the following examinations, Node will be contrasted with Apache, a multithreaded web server, and Even machine, an evented Ruby web server, to evaluate practical web framework for the difficulties postured by the current web.



Node.js Vs Apache Server

Operating System	Windows 10,11, Linux
Language	Node Js
Database	MongoDB
Browser	Any of Mozilla, Opera, Chrome etc.
Scripting Language Enable	JavaScript
Database JDBC Driver	Mongoose
Web Server	Local Host, Heroku

Processor	i5 8 th Generation
RAM	8 GB
Hard disk	1 TB HDD, 128 GB SDD
Monitor	15.6" color monitor
Keyboard	122 keys

System Analysis

VI. FUTURE SCOPE

The implemented project follows the concept of Application store from where user can download applications, it can be independent of the platform as well the operating system.

The applications of two modules, i.e., User Module and Admin Module,

User Module has following set of functionalities-

- Sign-in / Sign-up
- Home page consisting of compatible applications.
- Dedicated application page and details
- Download button
- Review option
- Number of Downloads
- Success Page
- Log-out Button

Admin Module has following set of functionalities-

- Sign-in / Sign-up
- Home page consisting applications published by current user
- Edit button to change the description
- Delete button to delete the current application
- Publish new application
- Success Page
- Log-out Button

In the current prototype, few limitations are there which need to be resolved when trying to be implemented in a real world. Some of them are need to be discussed thoroughly-

- In the Sign-in / Sign-up page, the authentication should be improved using passport or some other third-party API, and other social media sign-up options should be the as well.
- In the home page, a better categorization of application might be implemented.
- When publishing the application, some review algorithm should also be there to avoid or detect the malicious software/application to avoid any unwanted harm.
- Due to unavailability of such algorithm in open source we were not able to implement it.

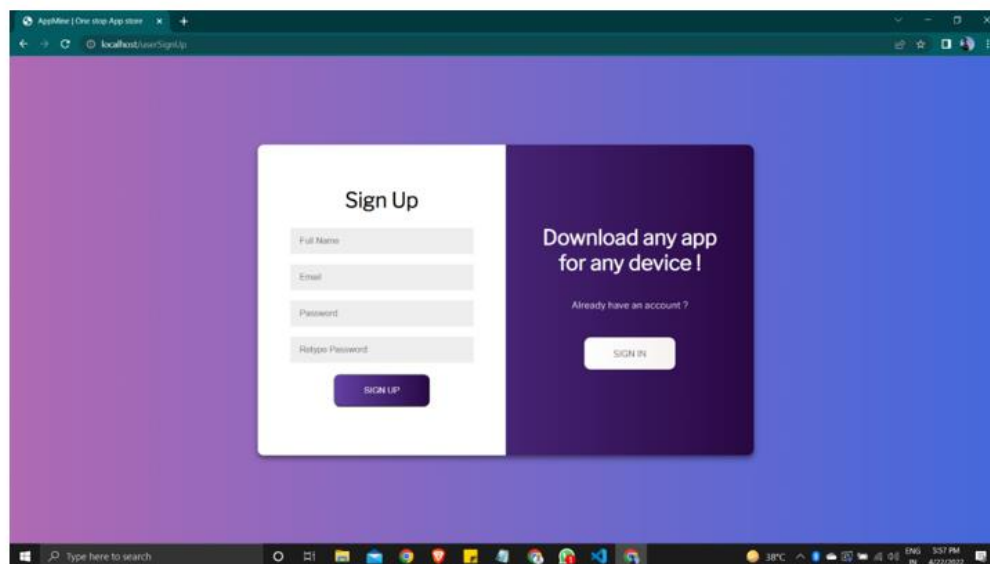
In the last decade, the popularity of apps continued to increase (currently, there are more than 2.87 million apps available) and impacting the economies worldwide.

This fast-growing market has attracted 40 billion Apps in 155 countries and the platform had paid out over 7 billion dollars to App developers in 2022.

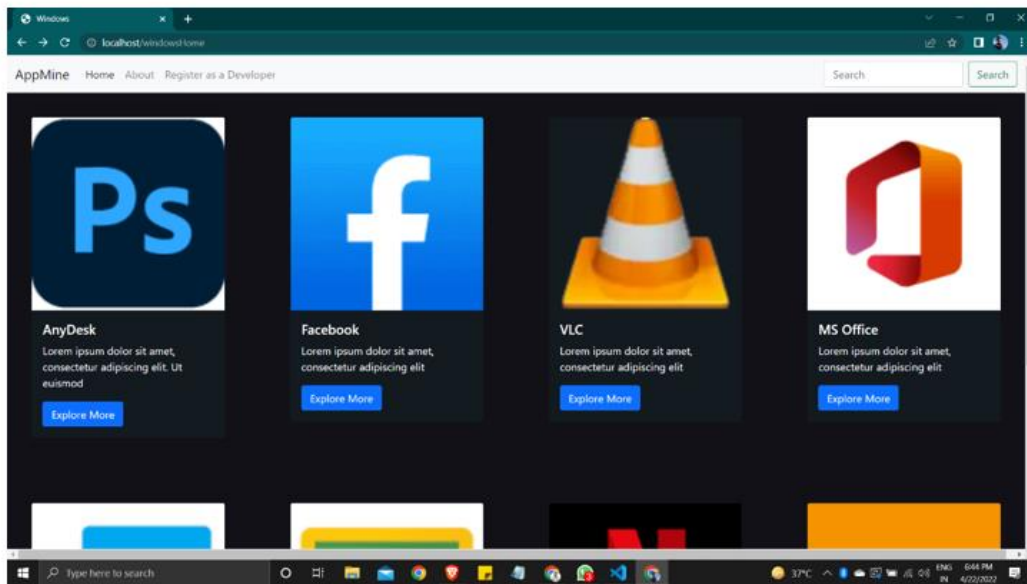
For instance, in the US, apps drive about 60% of digital media consumption which makes it very lucrative market.

Mobile applications markets with App stores have introduced a new approach to define and sell software applications with access to a large body of heterogeneous consumer population [5].

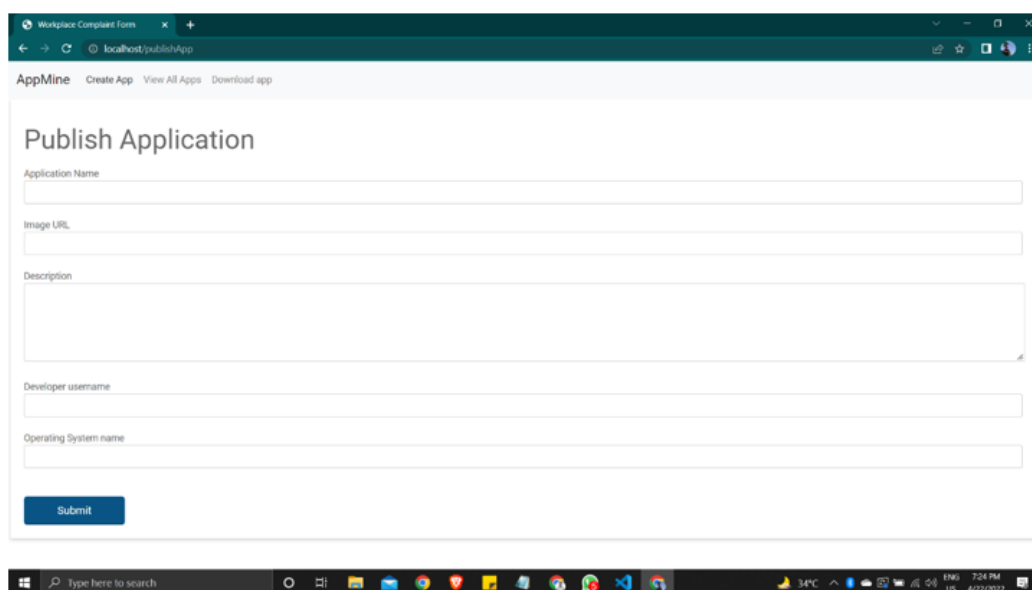
VII. RESULT



User Sign-up Page



User Home Page



Admin Application Publishing Page

VIII. CONCLUSION

Our project is based on node.js project and it is used for downloading and managing application of Android and Windows both as per user requirement which they want and according to the system compatibility. At the end it is concluded that we have made effort on following points in the below.

A description of the background and context of the project its relation to work already done in the area.

Made statement of the aims and objectives of the project.

The description of purpose, scope and applicability.

We define the problem who is very clear on which we are working in the project.

Requirement specification is defined of the system and the actions that can be done on these things

We have understood the problem statement and produced a prototype model of the system consisting of multiple operations.

We include features and operations in details, include screen layouts.

We have designed GUI accordingly so that person with technical and non-technical knowledge can use.

Finally, the system is successfully tested on the recommended test cases including the edge cases.

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