

GOVERNMENT SCHEME ALERTS WEB APPLICATION

Submitted in partial fulfillment of the requirements for the award of
Bachelor of Engineering degree in Computer Science and
Engineering

By

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DEPARTMENT OF COMPUTER SCIENCE AND ENGINEERING

SCHOOL OF COMPUTING

SATHYABAMA

**INSTITUTE OF SCIENCE AND TECHNOLOGY
(DEEMED TO BE UNIVERSITY)
CATEGORY -1 UNIVERSITY BY UGC**

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APRIL - 2024



DEPARTMENT OF COMPUTER SCIENCE AND ENGINEERING

BONAFIDE CERTIFICATE

This is to certify that this Project Report is the bonafide work of **SOURAV DAS (40111254)** and **ROHIT KUMAR (40111240)** who carried out the Project entitled “**GOVERNMENT SCHEME ALERT WEB APPLICATION**” under my supervision from November 2023 to April 2024.

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I, **SOURAV DAS (40111254)**, hereby declare that the Project Report entitled **“GOVERNMENT SCHEME ALERT WEB APPLICATION”** done by me under the guidance of **Dr. L. K. Joshila Grace, M.E., Ph.D** is submitted in partial fulfilment of the requirement for the award of Bachelor of Engineering degree in **Computer Science and Engineering**.

DATE: 08/04/2024

PLACE: Chennai

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ABSTRACT

The proposed system aims to rectify the persistent issue of government schemes not effectively reaching their intended recipients due to administrative lapses. It introduces a user-friendly platform with a seamless registration process, allowing individuals from diverse backgrounds to apply for schemes. The administrator's role involves adding scheme details and ensuring the transparent and accurate review of user registrations against predefined eligibility criteria. The system's interface prioritizes accessibility with multilanguage support, and the administrator's centralized authority facilitates informed decision-making on scheme applications. Detailed scheme information, including eligibility criteria and application guidelines, is provided to users. A notification system offers real-time updates on application status, promoting user engagement and trust. Security measures are robust, with regular audits to safeguard sensitive user data. Multi-role access control allows for delegation of responsibilities without compromising security. Analytics and reporting tools aid administrators in data-driven decision-making. Public awareness campaigns leverage diverse channels to inform citizens about available schemes and the user-friendly application process. The comprehensive system aims to enhance transparency, accessibility, and efficiency, mitigating the risk of government schemes underperforming due to administrative shortcomings.

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LIST OF ABBREVIATIONS

ABBREVIATIONS	EXPANSION
JDK	Java Development Kit
JRE	Java Runtime Environment
JVM	Java Virtual Machine
API	Application Program Interface
DB	Data Base
GUI	Graphical User Interface
MVC	Model-View-Control
SDK	Software Development Kit
SQL	Structured Query Language
UI	User Interface
UX	User Experience
XML	eXtensible Markup Language
HTTP	Hypertext Transfer Protocol
HTTPS	Hypertext Transfer Protocol Secure

CHAPTER 1

INTRODUCTION

This exploration into the realms of social media data analysis not only delves into the technicalities of algorithms but also illuminates the nuanced interconnections between online conversations and real-world impact. By scrutinizing the sentiments and discussions revolving around pivotal government schemes, this study aims to decode not just what is being said but the underlying motivations, concerns, and aspirations driving these digital dialogues.

Moreover, the study acknowledges the transformative power wielded by social media in fostering community movements, mobilizing opinions, and influencing public policies. It's not merely about parsing through vast data sets but understanding the human narratives woven within these digital threads. The analysis strives to capture the pulse of the society reflected in the virtual sphere, recognizing that social media is more than a repository of information— it's a mirror that reflects the ethos and ethos of our times.

Additionally, this research acknowledges the ethical considerations inherent in analyzing user-generated content. It aims to respect privacy, avoid biases, and present findings ethically, ensuring that the insights garnered contribute positively to societal understanding without encroaching upon individual liberties.

Furthermore, the study aims to bridge the gap between academic insights and practical applications. By highlighting the potential implications of this data analysis for policymakers, businesses, and societal stakeholders, it emphasizes the need for responsible utilization of these insights for the collective betterment.

As the study navigates the labyrinthine terrain of social media data analysis, it illuminates the need for a multidisciplinary approach. It integrates the realms of computer science, sociology, and communication studies to unravel the intricate tapestry of online interactions.

Moreover, this research acknowledges the dynamic nature of social media ecosystems. It recognizes that these platforms evolve continually, adapting to technological advancements and societal shifts. Thus, it underscores the importance of adaptability in analytical methodologies, advocating for approaches that are not just static algorithms but frameworks capable of flexing and adapting to the ever-changing digital landscape.

Furthermore, the study's endeavor extends beyond mere data analysis; it champions the art of storytelling. It seeks not just to present statistical findings but to craft compelling narratives that resonate with the experiences and emotions embedded within the digital discourse. This approach aims to humanize the data, transforming it from abstract numbers into relatable stories that capture the essence of societal sentiments and attitudes.

1.1 SCOPE AND OBJECTIVE:

In essence, this research journey embarks on an expedition into the heart of digital conversations, aiming to decipher the underlying themes and emotions that permeate through the virtual corridors of social media. It underscores the significance of not just quantitative analysis but qualitative understanding, recognizing that behind every data point lies a narrative waiting to be understood and shared. Through this holistic approach, it aims to transcend the boundaries of conventional data analysis and enrich our comprehension of the intricate interplay between technology, communication, and society. In conclusion, this study stands as a testament to the evolving nature of digital communication and its pivotal role in shaping our world. It embraces the challenges and complexities inherent in analyzing social media data, viewing them not as obstacles but as gateways to deeper insights. By doing so, it aspires to pave the way for a more profound comprehension of the interconnectedness between the virtual and the real, propelling us towards a future where digital interactions are not just data points but windows into the collective consciousness of humanity.

CHAPTER 2

LITERATURE SURVEY

In software development, a comprehensive literature survey stands as the cornerstone, shaping the entire development process. Before crafting any tool or system, meticulous evaluation of critical factors—time, economic viability, and resource robustness—is imperative.

These considerations act as guiding compasses, steering subsequent actions.

Once these foundational aspects are established, attention turns to the practical realm: choosing an optimal operating system and programming language. These decisions lay the groundwork for the tool's architecture and functionality, transcending technical choices to become strategic maneuvers aligned with project objectives.

Programmers, not working in isolation, rely on a wealth of knowledge. Senior developers, reference materials, and online resources provide indispensable support, offering insights and guidance throughout the developmental journey. This fusion of experience, literature, and digital resources strengthens the development process, transforming conceptual ideas into functional realities.

Within the landscape of software development, a comprehensive literature survey serves as more than a starting point; it's the bedrock upon which successful projects are built. The meticulous evaluation of crucial elements—time constraints, economic viability, and the solidity of available resources—serves not just as a checklist but as guiding principles shaping the trajectory of the development process.

The emergence of web applications as a tool for disseminating government scheme information marks a significant advancement in ensuring timely and accessible communication with the public. Traditionally, government scheme alerts were communicated through methods like newspaper advertisements,

radio broadcasts, and pamphlets, which often suffered from limitations such as limited reach and delayed updates.

Once these foundational elements are securely established, the spotlight shifts to the

pragmatic realm: the selection of an optimal operating system and programming language. These choices transcend technical preferences; they become strategic decisions that lay the groundwork for the tool's architecture and functionality, aligned meticulously with the overarching objectives of the project.

Moreover, each stage of this meticulous process undergoes continuous evaluation. Resource allocation, manpower considerations, economic feasibility, and the overall strength of the company's standing are subject to constant reassessment. This perpetual scrutiny ensures not just compliance with project goals but also alignment with industry standards, fostering a developmental environment deeply rooted in foresight and understanding.

Collaboration isn't just a buzzword in this domain; it's an operational reality. Programmers, far from toiling in solitary endeavors, draw upon a rich tapestry of knowledge. Seasoned developers, reference materials, and the vast expanse of online resources become invaluable pillars, offering insights and guidance that fortify the developmental journey. This synthesis of experience, literature, and digital support elevates abstract concepts into tangible, functional realities.

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Hence, the essence of project development extends beyond mere coding and design. It lies in strategic planning and informed decision-making facilitated by an extensive literature survey—a compass guiding through complexities,

ensuring purposeful and optimized strides toward realizing a robust and effective software tool.

2.1 INFERENCES FROM LITREATURE SURVEY

Literature survey is the most important step in development process. The Incentive of

Government Chief Officials at Grass-roots Level: An Analysis of the Political Tournament Model in Interagency Information Sharing .

In the literature survey, a critical inference emerges regarding the lack of incentive mechanisms for government chief officials, posing a significant obstacle to enhancing interagency government information sharing.

The lack of incentive mechanism for government chief officials is the key obstacle to improving interagency government information sharing. This paper considers the political tournament model as suitable to stimulate local governmental “top leaders” at district-level and county-level, and then puts forward some measures for the application of the model

2.2 OPEN PROBLEMS IN EXISTING SYSTEM

Research on the E-Government Scheme Based on Multi-Technologies and BiDirectional Authentication

In the existing system, particularly in the realm of e-government schemes, the authentication process emerges as a critical area requiring attention. The utilization of multi-technologies and bi-directional authentication mechanisms represents a significant step towards ensuring network security and uniform authentication services across various e-government application systems.

The authentication is the key part of the network security. It is also the main problem we should resolve. This scheme, which is bi-directional, using multi mechanism to ensure safety authentication and providing a uniform authentication service to other e-government application system, meets the need of current e-government system. But authentication technology and e-government system are continually developing, there are still many problems need to be solved.

DISADVANTAGE OF EXISTING SYSTEM

- Vulnerability to Technological Obsolescence
- Fragmentation and Compatibility Issues

CHAPTER 3

REQUIREMENT ANALYSIS

3.1 Feasibility Studies/Risk Analysis of the Project

In software development, a comprehensive literature survey stands as the cornerstone, shaping the entire development process. Before crafting any tool or system, meticulous evaluation of critical factors—time, economic viability, and resource robustness—is imperative.

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A secure publishing scheme in e-Government One of the most important functions of e Government is publication through the Internet. Though digital signature can be exploited to protect the integrity and authenticity of published information, it can not effectively resist malicious replacement in scenarios where the published information consists of different files. A secure publishing scheme based on Merkle hash tree is proposed. The scheme is able to resist the malicious replacement of published information and its cost is modest.

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ADVANTAGES OF PROPOSED SYSTEM

- Provides all the schemes released by the Government.
- Announcing the every new schemes.
- Displaying the notifications on the main pages.
- User registration process.
- Login authentication.

3.2 SYSTEM REQUIREMENTS

HARDWARE REQUIREMENTS:

- **System** - Windows 7/10
- **Speed** - 2.4GHZ
- **Hard disk** - 40GB
- **Monitor** - 15VGA color
- **RAM** - 4GB

SOFTWARE REQUIREMENTS:

- Operating System- Windows 10.
- Coding language - Java
- IDE - Eclipse

CHAPTER 4

DESCRIPTION OF PROPOSED SYSTEM

4.1 Architecture / Overall Design of Proposed System

□ SYSTEM ARCHITECTURE

A simple system architecture involving an ADMINISTRATOR, SCHEME, and USER. The ADMINISTRATOR has control over the SCHEME, while users can interact with it. Both the administrator and users can add, update, and delete schemes. Additionally, both have access to view different types of schemes. The image is a flowchart that clearly depicts the system architecture. The SCHEME box has three actions listed: ADD, UPDATE, DELETE, which are likely permissions or capabilities within the system. Similarly, the USER box also has three actions listed: ADD, UPDATE, DELETE indicating users' permissions or capabilities. The label "VIEW TYPES OF SCHEME" below both the SCHEME and USER boxes suggests that both have access to view different types of schemes.

The flowchart visually represents this architecture, with clear delineation of actions and permissions associated with each component. In the Scheme entity, the Administrator is granted the permissions to Add, Update, and Delete schemes, signifying their overarching control and management authority. Similarly, Users are endowed with similar permissions within the Scheme entity, enabling them to actively engage with the system's functionalities.

The label "View Types of Scheme" positioned below both the Scheme and User entities underscores the shared access they possess to explore and view various types of schemes available within the system. This feature enhances user engagement and facilitates informed decision-making by providing comprehensive access to scheme information.

Overall, this simplified system architecture fosters efficient management and interaction within the system, enabling seamless collaboration between

Administrators and Users while ensuring the smooth operation and accessibility of scheme-related functionalities.

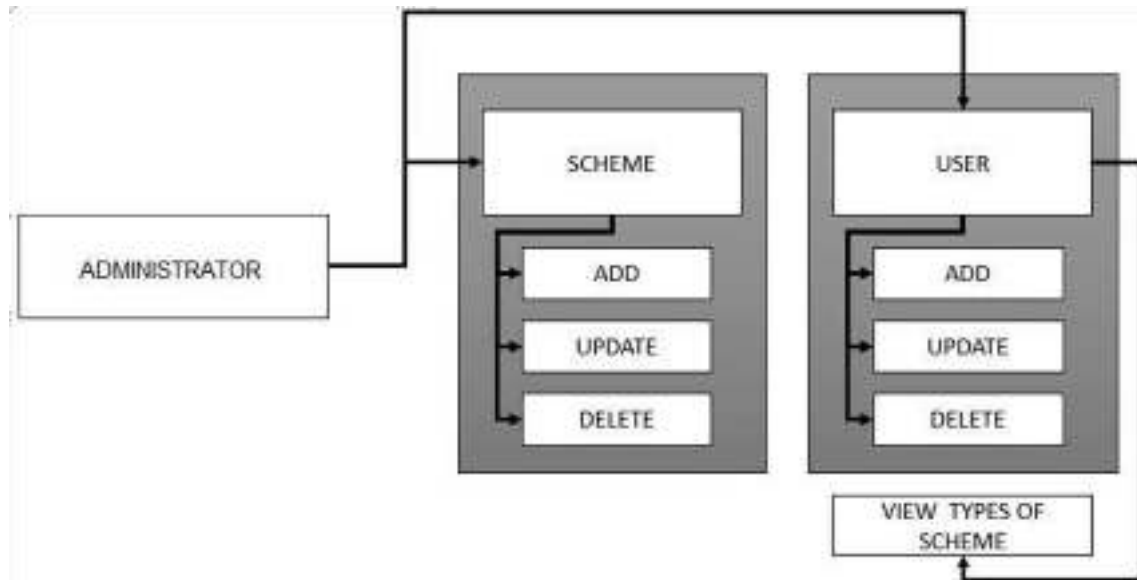


FIG 4.1 Architecture diagram

□ Work Flow

The project depicts a workflow for a student's decision-making process regarding their profile. The workflow starts with a "Student" node where the student decides what action to take with their profile. Two paths diverge from this decision point:

"Update Profile" and "View Scholarship Status". If the student chooses to update their profile, they proceed to use case 1.1, where they make the necessary changes to their profile information. After updating, they save the changes and then decide whether to modify the updates or continue with the saved changes. If modifications are needed, they return to use case 1.1; otherwise, they proceed forward in the workflow. If the student chooses to view their scholarship status instead of updating the profile, they move directly to use case 1.2 and review their scholarship status. The flowchart uses different shapes like ovals for start/end points, diamonds for decisions, and rectangles for processes or actions.

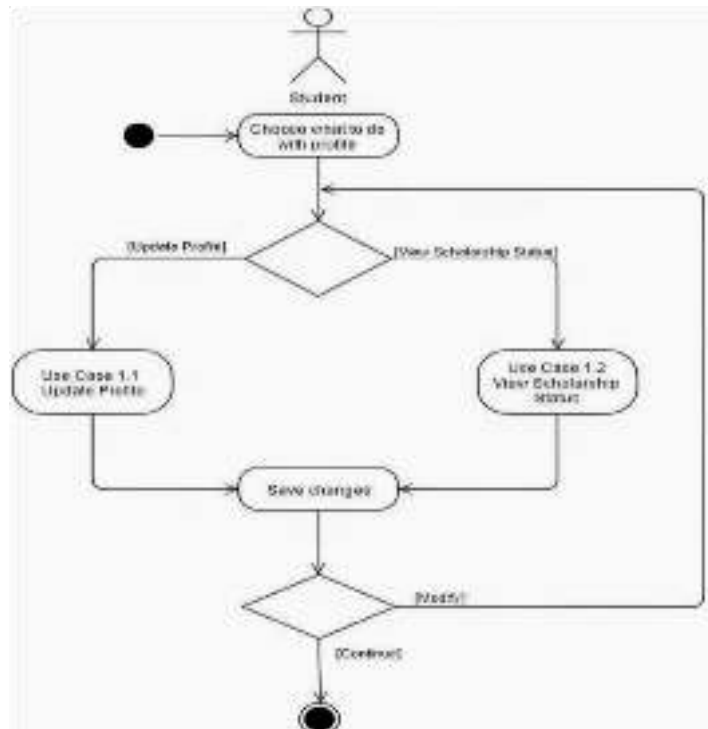


FIG 4.2 Work flow diagram

□ USECASE DIAGRAM

A use case diagram in the Unified Modeling Language (UML) is a type of behavioral diagram defined by and created from a Use-case analysis. Its purpose is to present a graphical overview of the functionality provided by a system in terms of actors, their goals (represented as use cases), and any dependencies between those use cases.

The diagram visually depicts how actors initiate use cases to accomplish their goals within the system. Dependencies between use cases can also be illustrated, showcasing how certain functionalities that may rely on each-others.

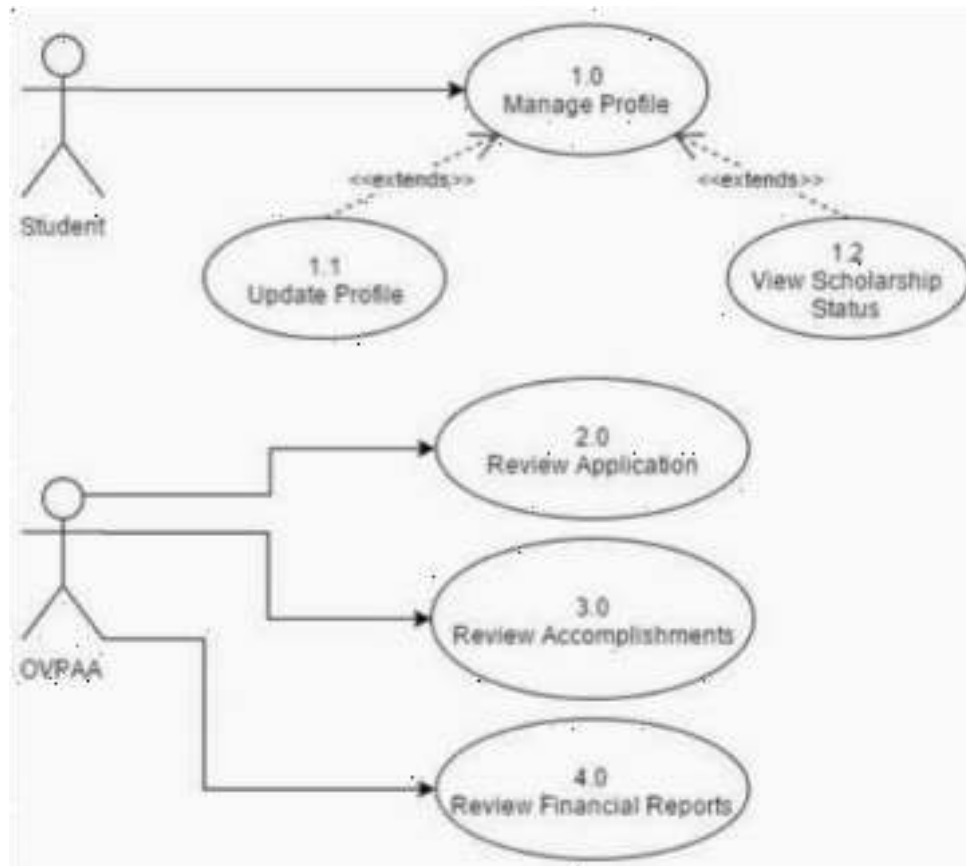


FIG 4.3 Use case diagram

Overall, a Use Case Diagram provides a high-level overview of the system's functionality, helping stakeholders to understand the system's scope, requirements, and interactions with external entities. It serves as a valuable communication tool throughout the development process, guiding the design and implementation of the system to meet the needs and goals of its users effectively

□ Student Information Edit Use Case

The flowchart illustrates the steps that a student or applicant needs to follow to check their application status for a scholarship. It is also a representation of the process a student follows to edit and submit changes to their information, accomplishments, and financial status. The student reviews the changes and decides whether they are satisfied or dissatisfied. If satisfied, they submit the changes; if not, they can cancel the changes.

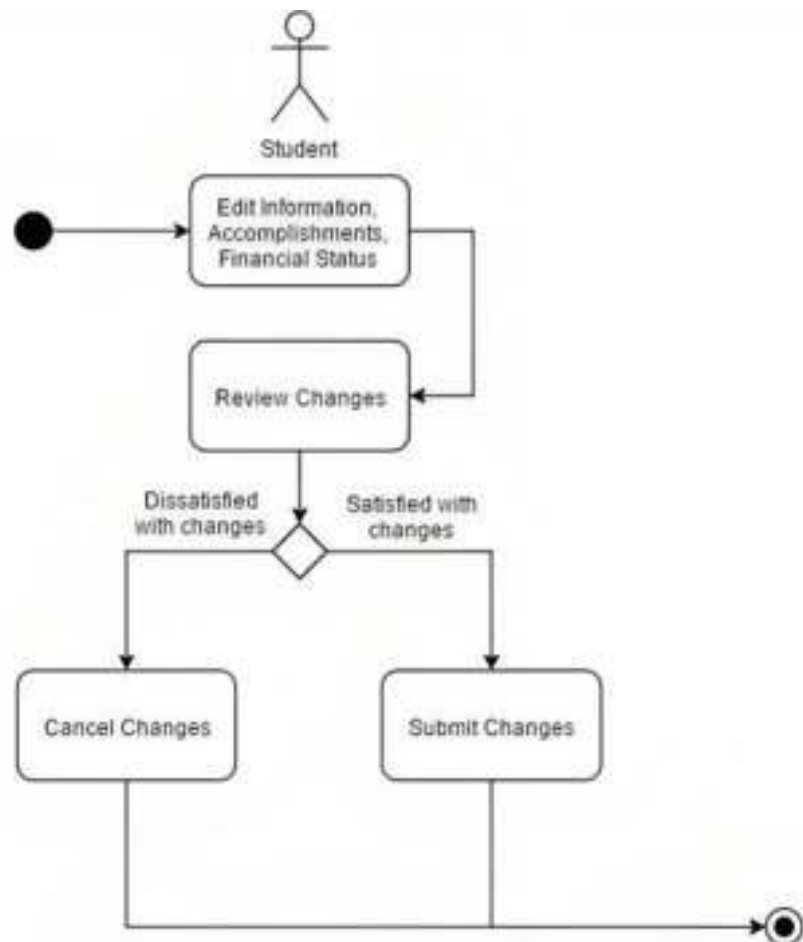


FIG 4.4 Student Information Edit Use Case

□ Scholarship Evaluation Flowchart

The flowchart starts with “OVPA” at the top, indicating the beginning of the process. The first step is that the scholars’ accomplishments are evaluated. The next step is “Evaluate Scholar’s Accomplishments,” where a decision is made based on Good Performance or Bad Performance. If Good Performance, it leads directly to “Keep Student’s Scholarship.” In case of bad performance, there are warnings issued. The first three warnings lead to sending a warning note to the scholar. If there is a 4th warning, it leads to the removal of the student’s scholarship. There are two endpoints marked as ‘A’ and ‘B’. ‘A’ is reached if after receiving a warning note, the student does not reapply for scholarship. ‘B’ is reached if after removal of scholarship, the student does not reapply for scholarship.

In the event of Good Performance, the flowchart seamlessly transitions to “Keep Student’s

Scholarship,” affirming the continuation of the scholar’s financial aid support. Conversely, if Bad Performance is identified, the process diverges into a series of actions aimed at addressing performance concerns and enforcing accountability.

For scholars demonstrating subpar performance, warnings are issued as a means of intervention. The issuance of the first three warnings triggers the dispatch of warning notes to the respective scholars, urging them to improve their academic standing. However, if a fourth warning is warranted, signaling persistent underperformance, the consequence is the termination of the student’s scholarship.

The flowchart further elucidates two distinct endpoints denoted as ‘A’ and ‘B,’ signifying potential outcomes subsequent to warning issuance or scholarship removal. Endpoint ‘A’ is reached if, following the reception of a warning note, the scholar opts not to reapply for the scholarship, effectively concluding their engagement with the program. On the contrary, endpoint ‘B’ is attained if, subsequent to scholarship removal, the scholar elects not to pursue scholarship

reapplication, thereby discontinuing their participation in the scholarship program.

This structured flowchart offers a systematic approach to scholarship evaluation and management, facilitating timely interventions and delineating clear pathways for scholars based on their performance and subsequent actions. It provides a visual roadmap for scholarship administrators to navigate the complexities of scholarship evaluation and ensure the equitable and effective management of scholarship programs.

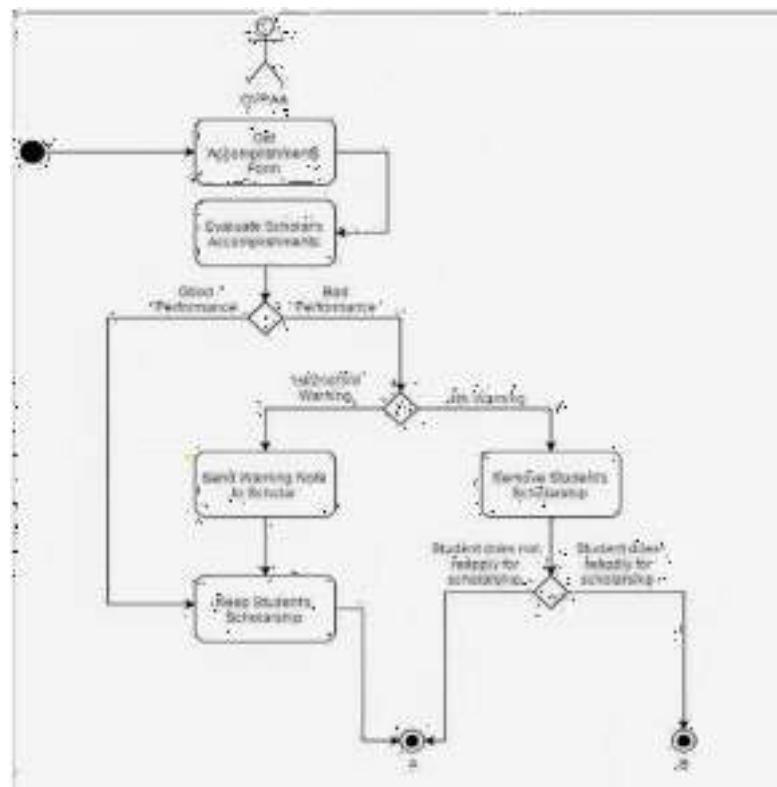


Fig 4.5 Scholarship Evaluation Flowchart

4.2 Implementation and Testing Software: Model/System Plan

4.2.1 MODULE

- Administrator
- User
- Schemes
- Report
- Result

4.2.2 MODULE DESCRIPTION

□ ADMINISTRATOR:

Administrator will check for the new updates are available then admin updates all these information on the site and if user is applicable for the particular schemes administrator send the SMS. Administrator will also check Eligibility details, how many members are already applied for the schemes all these details will be displayed. Admin takes care of the activities related to the schemes provided by the government. This module takes care of accepting various applications from users.

Additionally, administrators play a pivotal role in assessing users' eligibility for specific schemes. They review eligibility criteria and determine whether users meet the requirements to apply for particular schemes. If a user is deemed eligible, administrators may notify them via SMS to inform them about the scheme and encourage application submission.

Furthermore, the Administrator module facilitates the management of scheme-related activities, including monitoring the number of applications received for

each scheme. Administrators can view details such as the number of applicants, their eligibility status, and any other relevant information associated with the schemes. This comprehensive oversight ensures efficient handling of scheme applications and enables administrators to track the scheme's popularity and effectiveness.

Overall, the Administrator module serves as the backbone of the government scheme alerts web application, ensuring smooth operations, timely updates, and effective communication with users. By centralizing scheme management activities, administrators streamline the application process and enhance user engagement with government schemes, ultimately contributing to the platform's success in promoting public welfare and participation.

□ **USER:**

User got the message if he is illegible for scheme first user visit the website and then checks the document that are needed for schemes and then can apply for that particular scheme. They also check their application status by logging into the system easily. Only user can update or delete the details of users from list.

The User module is integral to the government scheme alerts web application, serving as the primary interface for individuals seeking access to various government schemes. Users interact with the system to explore available schemes, ascertain their eligibility, apply for relevant schemes, and monitor the status of their applications.

Upon visiting the website, users are greeted with a user-friendly interface that provides comprehensive information about the available schemes. Users can easily navigate through the website to access details about each scheme, including eligibility criteria, required documents, and application procedures. This enables users to make informed decisions about which schemes to apply for based on their eligibility and needs.

After reviewing the scheme details, users can proceed to submit their applications through the online platform. The system guides users through the application process, prompting them to provide necessary information and upload required documents. Once the application is submitted, users receive confirmation messages, ensuring transparency and accountability throughout the process.

Additionally, the User module empowers users to track the status of their applications effortlessly. By logging into their accounts, users can access a dashboard that displays the current status of their applications, including whether they are under review, approved, or rejected. This real-time visibility enhances user experience and fosters trust in the system.

Furthermore, users have the autonomy to manage their personal information within the system. They can update their profiles, modify contact details, and delete their accounts if necessary. This feature ensures data accuracy and gives users control over their information, enhancing privacy and security.

Overall, the User module caters to the diverse needs of individuals seeking access to government schemes, providing a seamless and intuitive platform for scheme exploration, application submission, and status tracking. By prioritizing user experience and empowerment, the module contributes to the overall effectiveness and success of the government scheme alerts web application.

□ **SCHEMES:**

This module provides facility to admin, admin can add new scheme, delete previous scheme, update previous scheme. In these is displays all details of scheme also scheme wise user and criteria as well as conditions. Only the admin is able to new scheme on the portal. All the remaining users can view the details of schemes

The Schemes module serves as the backbone of the government scheme alerts web application, facilitating the management and dissemination of information regarding various government schemes. Admin users wield exclusive authority to administer this module, enabling them to add new schemes, delete outdated ones, and update existing schemes as needed. This level of control ensures that the platform remains current and relevant to users' needs.

Within this module, admin users have access to comprehensive details about each scheme, including eligibility criteria, application procedures, and any associated conditions or criteria. This information is crucial for users to make informed decisions about which schemes align with their needs and qualifications.

Additionally, the Schemes module provides scheme-wise user and criteria listings, allowing admin users to track user participation and ensure compliance with scheme requirements. This feature enables admin users to monitor scheme utilization effectively and identify any areas for improvement or optimization.

Incorporating schemes from specific regions, such as Andhra Pradesh and Tamil Nadu, enriches the platform's offerings and expands its reach to users in different geographical areas. Admin users can curate a diverse range of schemes from these regions, catering to the unique needs and priorities of residents. By including schemes from Andhra Pradesh and Tamil Nadu, the platform enhances its utility and relevance, fostering greater engagement and participation among users.

Overall, the Schemes module plays a pivotal role in the government scheme alerts web application, empowering admin users to manage scheme-related activities efficiently and ensuring that users have access to up-to-date and relevant information about government schemes. Through effective administration and inclusion of schemes from diverse regions, the module contributes to the platform's overall effectiveness in promoting public welfare and facilitating user participation.

□ **REPORT:**

The reporting module we can see various types of reports like scheme wise report, and user wise report. Various reports like Approved applications, Pending applications and rejected applications also user wise. Scheme wise report contains scheme name, scheme type, scheme id, validity date. User

wise report should contains all the information of user and also scheme details which are they apply with criteria and condition. Status of the application and any remarks information will be displayed inapproved applications report. All the rejected applications report will be placed in the rejected applications reports.

The Reporting module within the government scheme alerts web application serves as a vital tool for generating and analyzing various reports pertaining to scheme utilization and user engagement. This module offers administrators valuable insights into the effectiveness and efficiency of the platform, enabling informed decision-making and strategic planning.

One of the key functionalities of the Reporting module is the ability to generate Scheme- wise reports. These reports provide administrators with a comprehensive overview of each scheme, including scheme name, type, ID, and validity date. By aggregating this information, administrators can assess the performance and popularity of individual schemes and identify areas for improvement or expansion.

Similarly, the Reporting module facilitates the generation of User-wise reports, which offer detailed insights into user activities and interactions with the platform. These reports include information such as user profiles, applied schemes, criteria, conditions, and application statuses. By analyzing user-wise reports, administrators can gain a deeper understanding of user behavior, preferences, and needs, enabling them to tailor the platform's offerings to better serve the user community.

Furthermore, the Reporting module categorizes applications into Approved, Pending, and

Rejected categories, providing administrators with a clear overview of application statuses. Approved applications reports contain detailed information about successfully processed applications, including status updates and any remarks provided by administrators. Similarly, Rejected applications reports offer insights into applications that did not meet the eligibility criteria or were

declined for other reasons, helping administrators identify potential issues or areas for improvement in the application process.

Overall, the Reporting module enhances the functionality and effectiveness of the government scheme alerts web application by providing administrators with valuable data and insights. By leveraging Scheme-wise and User-wise reports, as well as detailed application status reports, administrators can make informed decisions.

CHAPTER 5

IMPLEMENTATION DETAILS

5.1 DEVELOPMENT AND DEPLOYMENT SETUP

To create a government scheme alert web application in Java, one would start by setting up a robust backend framework, perhaps using Spring Boot for its simplicity and efficiency. The application would need a secure login system for administrators who upload new schemes. This could be achieved using Spring Security to handle authentication and authorization. For the database, a system like PostgreSQL can be used to store scheme details and user information securely.

The admin interface would allow the uploading of scheme details, which would include eligibility criteria, application procedures, and deadlines. These details would be stored in the database with proper relations and constraints to ensure data integrity. On the user side, individuals could create accounts where they input their personal details, which the system uses to determine eligibility for various schemes.

The core functionality for users would be the ability to apply for schemes for which they are eligible. This would involve filling out forms, which the system would then process to update the user's application status. To keep users informed, an alert system would be implemented. This could use Java's Mail API to send emails or integrate with a service like Twilio for SMS notifications.

For the front-end, a framework like Angular or React could be used to create a responsive user interface. This would communicate with the Java backend through RESTful APIs, ensuring a seamless user experience. The application would also need to implement error handling to inform users of any issues with their applications or eligibility checks.

Finally, to ensure the application's scalability and maintainability, proper documentation and testing would be essential. Unit tests could be written using JUnit to cover the backend logic, while Selenium could be used for end-to-end

testing of the web interface. With these implementation details, the government scheme alert web application would be well- equipped to serve administrators and users efficiently and securely.

5.2 TESTING

As the project is on a bit large scale, we always need testing to make it successful. If each component works properly in all respects and gives the desired output for all kinds of inputs then the project is said to be successful. So, the conclusion is to make the project successful, it needs to be tested. The testing done here was System Testing checking whether the user requirements were satisfied. The code for the new system has been written completely using Python as the coding language, and Django as the interface for front-end designing. The new system has been tested well with the help of the users and all the applications have been verified from every nook and corner of the user. Although some applications were found to be erroneous these applications have been corrected before being implemented.

5.3 OUTPUT TESTING

The output testing in proposed system is done since no system could be useful if it does not produce the required output in the specified format. Asking the users about the format required by them tests the outputs generated by the system under consideration. Here the output format is considered in two ways, one is on the screen and the other is the printed format. The output format on the screen is found to be correct as the format was designed in the system design phase according to the user's needs. For the hard copy, the output comes as the specified requirements by the users. Hence output testing does not result in any corrections in the system.

5.4 USER ACCEPTANCE TESTING

The system under study is tested for user acceptance by constantly keeping in touch with the prospective system users at the time of development and making changes wherever required.

Registration: To begin with login, users need to register by filling up basic registration details. There are multiple fields on the registration page and every field has to be filled by the user. The user cannot use characters in the login id field.

Login: - Login ID and password are kept compulsory fields, and if the ID or password doesn't match then it will show an error message.

CHAPTER 6

RESULTS AND DISCUSSIONS

6.1 RESULT AND DISCUSSION

To provide that schemes to applicable user first we required that users all information to check every condition mention above, for that we collect user's information using user registration process after that we are able to deliver the particular scheme to that particular applicable person or user. Using it user can get benefit from tat government scheme.

The Result module of the government scheme alerts web application is intricately tied to the successful delivery of schemes to eligible users. To ensure that users receive schemes tailored to their needs and qualifications, it is imperative to collect comprehensive user information through the user registration process. This process serves as the foundation for matching users with applicable schemes, as it enables administrators to verify user eligibility based on specific criteria and conditions.

By gathering detailed user information during the registration process, administrators can accurately assess users' eligibility for various government schemes. This includes demographic details, income levels, educational qualifications, employment status, and other relevant criteria specified by each scheme. Administrators can then utilize this information to match users with schemes for which they qualify, thereby maximizing the utilization and impact of government initiatives.

Once users are successfully registered and their eligibility is verified, they gain access to the relevant schemes through the application interface. This empowers users to explore and apply for schemes that align with their needs and circumstances, thereby enabling them to benefit from government support programs effectively.

Ultimately, the Result module ensures that government schemes are delivered to the applicable users in a targeted and efficient manner. By leveraging user registration data and accurately matching users with relevant schemes, the module facilitates the effective utilization of government resources and enhances the overall welfare of the user community.

6.2 ADVANTAGES

The proposed system for a Government Scheme Alert Web Application using Java offers several advantages.

Firstly, Java's platform independence means the application can run on any system with a Java Virtual Machine (JVM), ensuring wide accessibility.

Secondly, Java's robust security features are ideal for protecting sensitive user data and government information.

Thirdly, Java's strong community support and extensive libraries can accelerate development and provide solutions for complex problems.

Additionally, Java's ability to handle large amounts of data efficiently makes it suitable for managing the vast information associated with government schemes.

Lastly, the use of Java ensures scalability, allowing the application to accommodate an increasing number of users and schemes without compromising performance.

6.3 FUTURE WORK

Envisioning a future work for a government scheme alert web application, one could imagine a platform that not only notifies users of new and existing government schemes but also offers personalized recommendations. This application could use advanced data analytics to match users with schemes for which they are eligible, based on their profile and past interactions. It might also integrate with other government services to provide a seamless experience, allowing users to apply for schemes directly through the app. Additionally, the application could feature a community forum where users can share experiences and tips, fostering a supportive network. Such an application would be a valuable tool in ensuring that government assistance is accessible and utilized effectively by those who need it most.

CHAPTER 7

CONCLUSION

7.1 CONCLUSION

In conclusion, the government scheme web application is a useful tool for citizens to access various benefits and services offered by the state. It allows users to register, login, browse, apply and track their applications online, without the hassle of visiting physical offices or filling out paper forms. The web application is designed to be user-friendly, secure and reliable, with features such as password encryption, data validation and backup. The web application also provides feedback and support to users through email notifications, FAQs and chat-bots. By using the government scheme web application, citizens can save time, money and effort, while enjoying the convenience and transparency of the digital platform.

7.2 IMPLEMENTATION ISSUES

When developing a government scheme alert web application in Java, several implementation issues may arise. These can include ensuring the application's security, as it will handle sensitive user data and government information. Scalability is another concern, as the application should be able to handle a growing number of users and schemes over time. Integration with existing government databases and systems for real-time updates on schemes is also crucial. Additionally, the application must be user-friendly to cater to a diverse audience, including those with limited technical skills. To address these challenges, developers can look into using robust frameworks and libraries that provide security features, consider cloudbased solutions for scalability, and adopt a modular architecture for easier maintenance and updates. For inspiration and reference, one might explore existing projects like the Government-Scheme-Alert-System on GitHub, which aims to provide accessible information on new government schemes to the public.

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APPENDIX

A. SOURCE CODE

APPLICATION CODE

```
package com.example.application;

import java.util.Arrays;

import org.springframework.boot.CommandLineRunner;          import
import org.springframework.boot.SpringApplication; import
import org.springframework.boot.autoconfigure.SpringBootApplication;
import org.springframework.boot.web.servlet.support.SpringBootServletIni
tializer; import org.springframework.context.annotation.Bean; import
import org.springframework.scheduling.annotation.EnableScheduling;
import org.vaadin.artur.helpers.LaunchUtil;

import com.example.application.data.entity.User;

import com.example.application.data.repository.UserRepository;

/**
 * The entry point of the Spring Boot application.
 */

@SpringBootApplication
@EnableScheduling
public class Application extends SpringBootServletInitializer {

public static void main(String[] args) {
```

```

LaunchUtil.launchBrowserInDevelopmentMode(SpringApplication.r
un(Application.class, args));

}

@Bean public CommandLineRunner
run(UserRepository repository) { return args -> {

        if(repository.count() == 0) {
            repository.saveAll(Arrays.asList(
                new User(null, "gov", "gov123")
            ));
        }
    };
}
}

```

ALERTS

```

package com.example.application.data.entity;

import java.math.BigDecimal;

import javax.persistence.Entity;
import
javax.persistence.Generated

```

```

Value;    import
javax.persistence.Generation
Type;        import javax.persistence.Id;

@Entity
public class
Alerts
{

    @Id

    @GeneratedValue(strategy =
GenerationType.IDENTITY) private
BigDecimal id; private String
currentEducation; private boolean
whiteRationCard; private boolean
belowPovertyLine; private BigDecimal rank;
private boolean parentGovtEmployee;
private String caste; private BigDecimal
parentalIncome; private boolean
physicallyChallenged; private String
residency; private String profession; private

    Integer numberOfAcres; private String email;
private Integer age;

public
Alerts()
{

```

```

    su
    pe
    r();

}

```

```

        public Alerts(BigDecimal id, String currentEducation, boolean
whiteRationCard, boolean belowPovertyLine,

```

```

        BigDecimal rank, boolean parentGovtEmployee, String caste,
BigDecimal parentallIncome,

```

```

        boolean physicallyChallenged, String residency, String
profession, Integer numberOfAcres, String email,

```

```

        Integer age) { super(); this.id
= id;    this.currentEducation  =
currentEducation;
this.whiteRationCard           =
whiteRationCard;
this.belowPovertyLine         =
belowPovertyLine; this.rank = rank;
this.parentGovtEmployee       =
parentGovtEmployee; this.caste =
caste;    this.parentallIncome  =
parentallIncome;

```

```
        this.physicallyChallenged      =  
        physicallyChallenged; this.residency  
        = residency;  this.profession  =  
        profession;  this.numberOfAcres  =  
        numberOfAcres; this.email = email;  
        this.age = age;  
  
    }
```

```
    public String getEmail()
```

```
    {    return  
        email;
```

```
    }
```

```
    public void setEmail(String  
        email) { this.email = email;
```

```
    }
```

```
    public BigDecimal getId()
```

```
    {  
        return id;
```

```
    }
```

```
    public void setId(BigDecimal  
        id)
```

```

        { this.id = id;

        }

    public String
        getCurrentEducation() {
            return currentEducation;

        }

    public void setCurrentEducation(String currentEducation)
        { this.currentEducation = currentEducation;

        }

    public boolean isWhiteRationCard()
        { return
            whiteRationCard;

        }

    public void setWhiteRationCard(boolean whiteRationCard)
        { this.whiteRationCard = whiteRationCard;

        }

    public boolean
        isBelowPovertyLine()
        { return
            belowPovertyLine;

        }

    public void setBelowPovertyLine(boolean belowPovertyLine) {
        this.belowPovertyLine = belowPovertyLine;
    }

```

```

    }

    public BigDecimal getRank() {
        return rank;
    }

    public void setRank(BigDecimal rank)
        { this.rank = rank;

    }

    public boolean isParentGovtEmployee()
        { return
        parentGovtEmployee;

    }

    public void setParentGovtEmployee(boolean parentGovtEmployee)
        { this.parentGovtEmployee = parentGovtEmployee;

    }

    public String getCaste()

        {    return
        caste;

    }

    public void setCaste(String
        caste) { this.caste = caste;

    }

    public BigDecimal getParentalIncome()    {

```

```

        return parentallIncome;

    }

    public void setParentallIncome(BigDecimal parentallIncome)    {
        this.parentallIncome    = parentallIncome;

    }

    public boolean isPhysicallyChallenged()
        { return
        physicallyChallenged;

    }

    public void setPhysicallyChallenged(boolean physicallyChallenged)
        { this.physicallyChallenged = physicallyChallenged;
        }

    public String getResidency() {
        return residency;

    }


    public void setResidency(String residency) { this.residency =
        residency;

    }

    public String
    getProfession() {
        return profession;

```

```

    }

    public void setProfession(String profession) {
        this.profession = profession;
    }

    public Integer getNumberOfAcres() {
        return numberOfAcres;
    }

    public void setNumberOfAcres(Integer numberOfAcres)
    { this.numberOfAcres = numberOfAcres;

    }

    public Integer getAge() {
        return age;
    }

    public void setAge(Integer
        age) { this.age = age;

    }

}

```

MAIL SENT.JAVA

```
package com.example.application.data.entity;
```

```
import java.math.BigDecimal;
```

```
import  
javax.persistence.Entity;  
import  
javax.persistence.Generated  
Value;      import  
javax.persistence.Generation  
Type;      import javax.persistence.Id;
```

```
@Entity
```

```
public class MailSent {
```

```
    @Id
```

```
    @GeneratedValue(strategy =  
        GenerationType.IDENTITY) private BigDecimal id;
```

```
    private BigDecimal alertId;
```

```
    private
```

```
    String scheme;
```

```
    public MailSe
```

```
        nt() {
```

```
            super()
```

```
        ;
```

```
    }
```

```

public MailSent(BigDecimal id, BigDecimal alertId, String scheme) {
    super();

    this.id = id;
    this.alert
    Id    =
    alertId;

    this.scheme = scheme;
}

```

```

public BigDecimal getId() {
    return id;
}

```

```

public void setId(BigDecimal
    id) { this.id = id;
}

```

```

public BigDecimal getAlertId() {
    return alertId;
}

```

```

public void setAlertId(BigDecimal
    alertId) { this.alertId = alertId;
}

```

```

    public String getScheme()
    {
        return
            scheme;
    }

    public void setScheme(String scheme) { this.scheme
        = scheme;
    }
}

```

USER

```
package com.example.application.data.entity;
```

```

import
javax.persistence.Entity;
import
javax.persistence.Generated
Value;      import
javax.persistence.Generation
Type;      import javax.persistence.Id;

```

```

@Entity

```

```

public
class
User {

    @Id
    @GeneratedValue(strategy =
    GenerationType.IDENTITY) private Integer id;

    private String username;

    private String password;

    public
        Us
        er()
        {
            su
            pe
            r();
        }

    public User(Integer id, String username, String
        password) { super(); this.id = id;

                this.username = username;
            this.password = password;

        }

```

```
public boolean    checkPassword(String password)
    {    return
        this.password.equals(password);

    }
```

```
public Integer
getId() { return
    id;

}
```

```
public void setId(Integer
    id) { this.id = id;

}
```

```
public String getUsername()
    {    return
        username;

}
```

```
public void setUsername(String username) { this.username =
    username;

}
```

```
public String getPassword()
    {    return
        password;

}
```

```

    }

    public void setPassword(String password) { this.password =
        password;

    }

}

```

APPLICATION.JAVA

```

package com.example.application;

import java.util.Arrays;

import
org.springframework.boot.CommandLineRunner;
import org.springframework.boot.SpringApplication;

import
org.springframework.boot.autoconfigure.SpringBootApplication;
import
org.springframework.boot.web.servlet.support.SpringBootServletI
nitializer; import org.springframework.context.annotation.Bean;

import org.springframework.scheduling.annotation.EnableScheduling
; import org.vaadin.artur.helpers.LaunchUtil;

import com.example.application.data.entity.User;
import com.example.application.data.repository.UserRepository;

/**

```

```

    * The entry point of the Spring Boot application.
    */
    @SpringBootApplication @EnableScheduling

    public class Application extends SpringBootServletInitializer {

        public static void main(String[] args) {

            LaunchUtil.launchBrowserInDevelopmentMode(SpringApplication.run(
                Application.class, args));

        }

        @Bean public CommandLineRunner
            run(UserRepository
                repository) { return args -> {

                    if(repository.count() == 0) {
                        repository.saveAll(Arrays.asList(
                            new User(null, "gov", "gov123")
                        ));
                    }

                }
            };
        }
    }

```

B. SCREENSHOTS

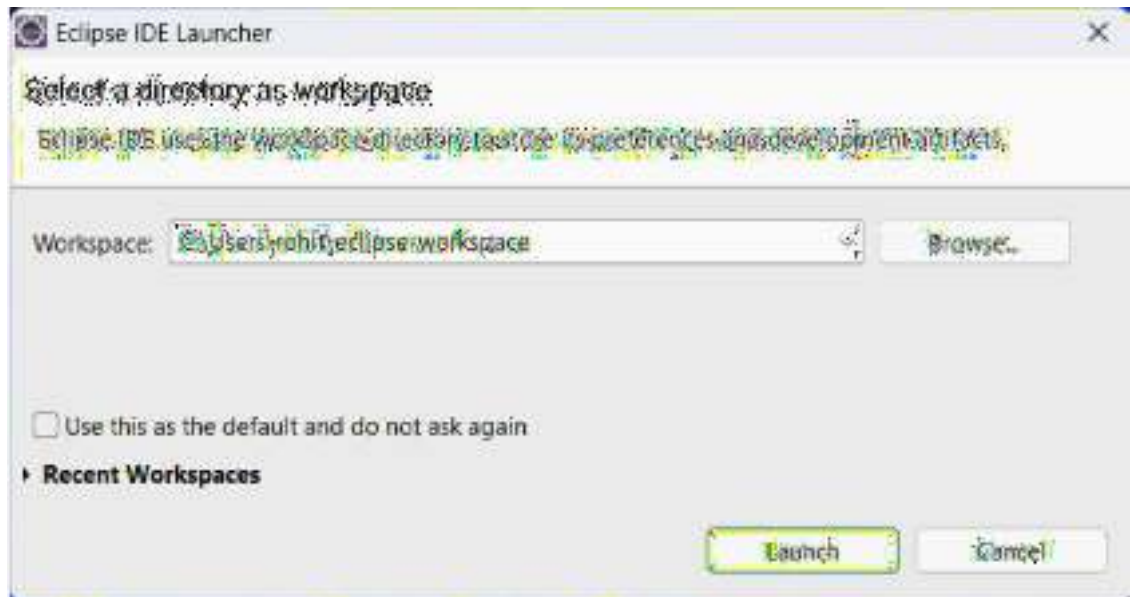


Fig.B.1: Eclipse IDE Launcher

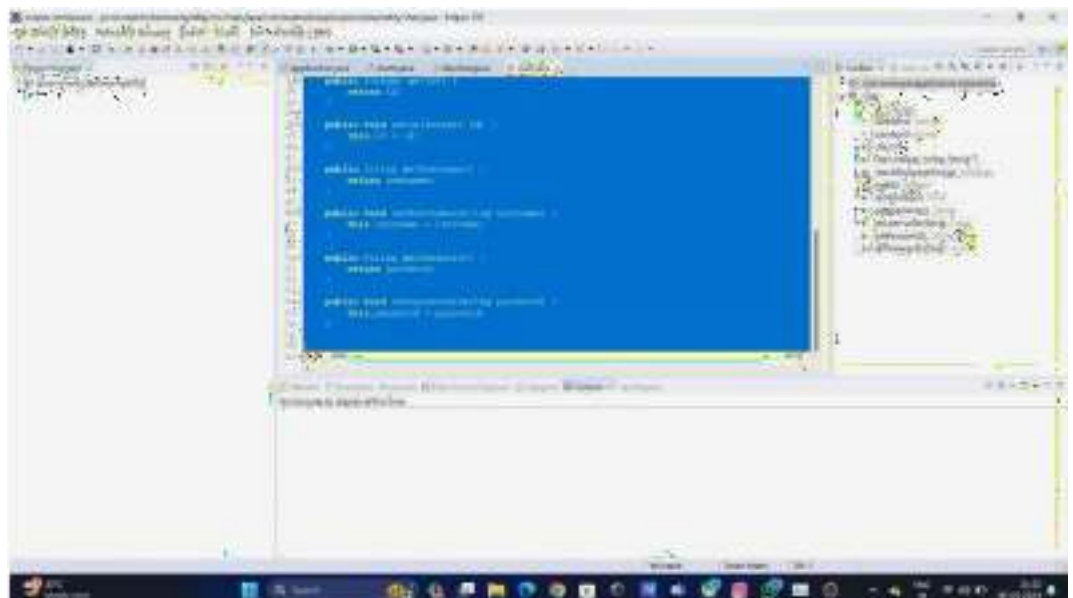


Fig.B.2: Working Code

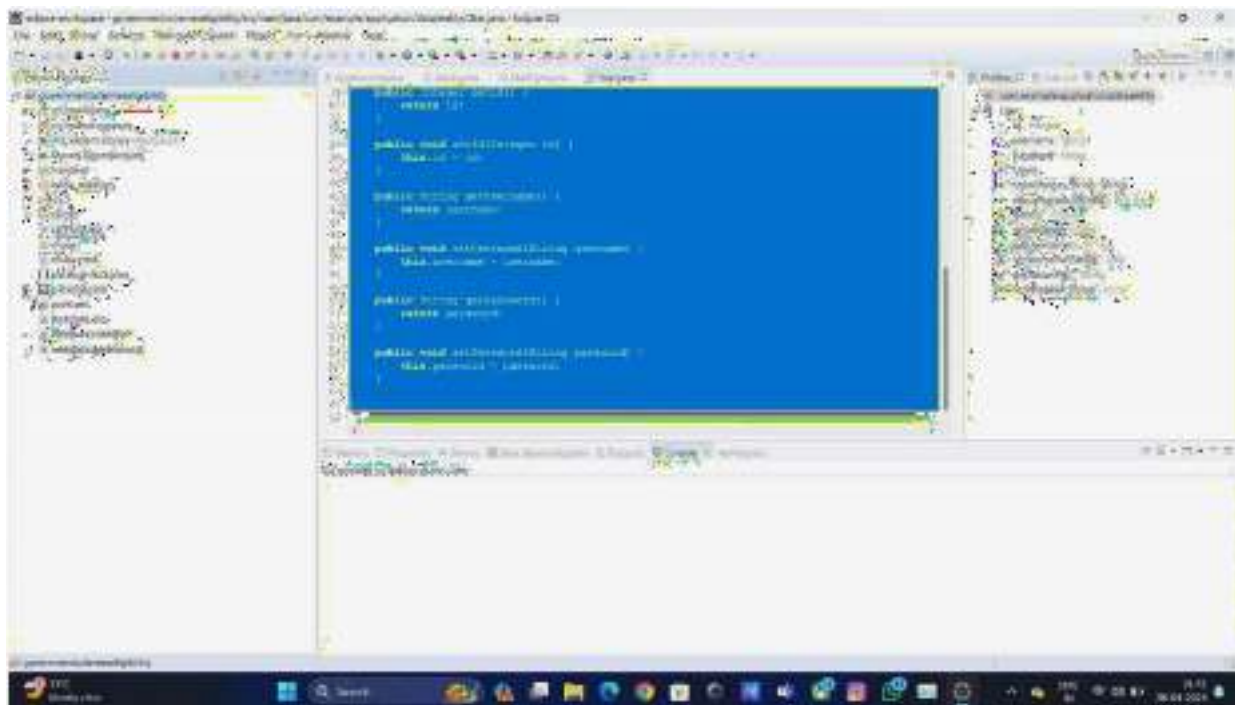


Fig.B.3: Insert Scheme Codes

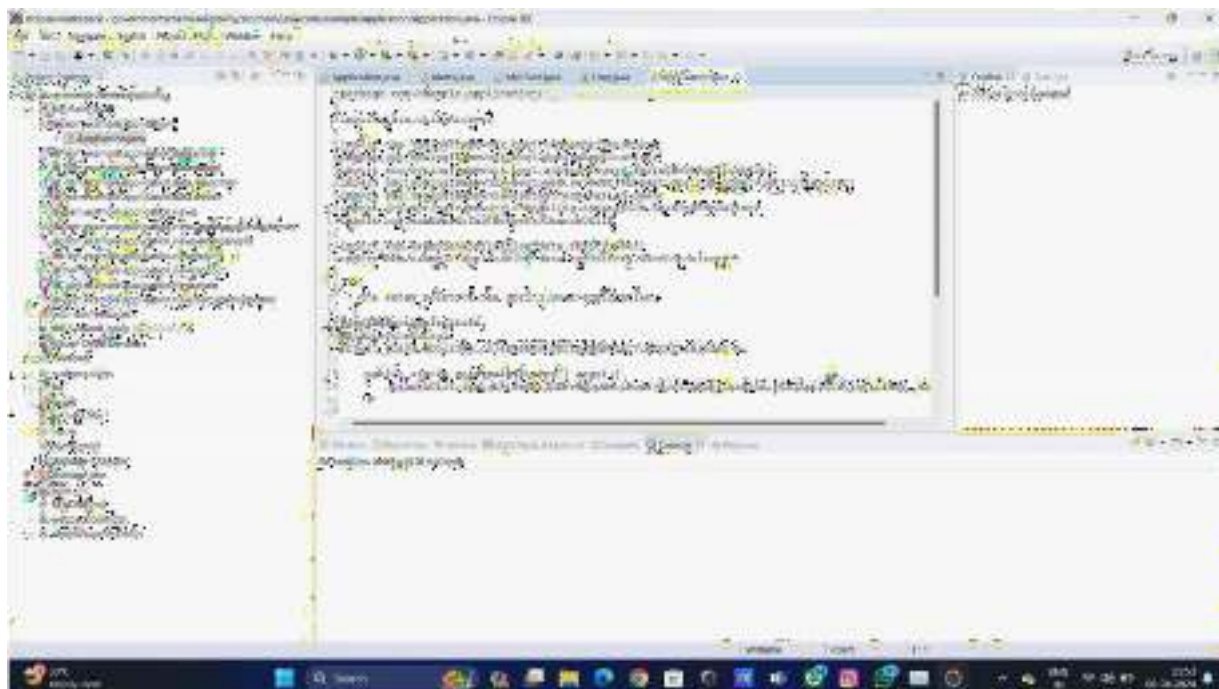


Fig.B.4: Application.Java

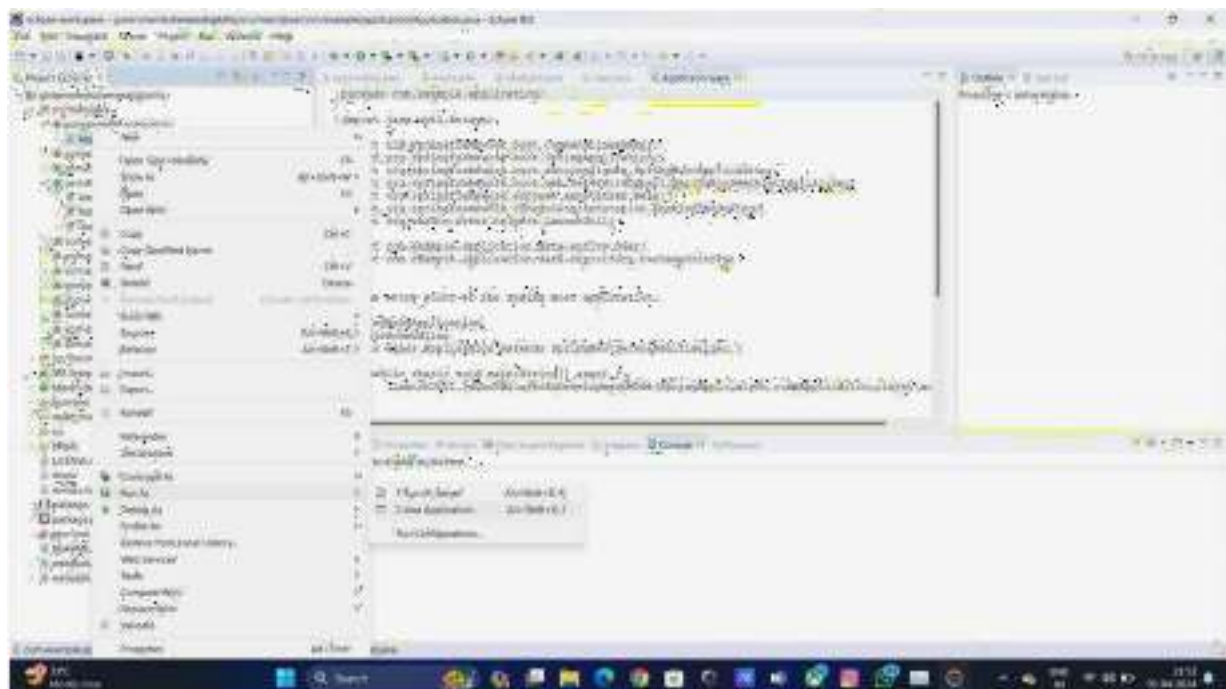


Fig.B.5: Run as application

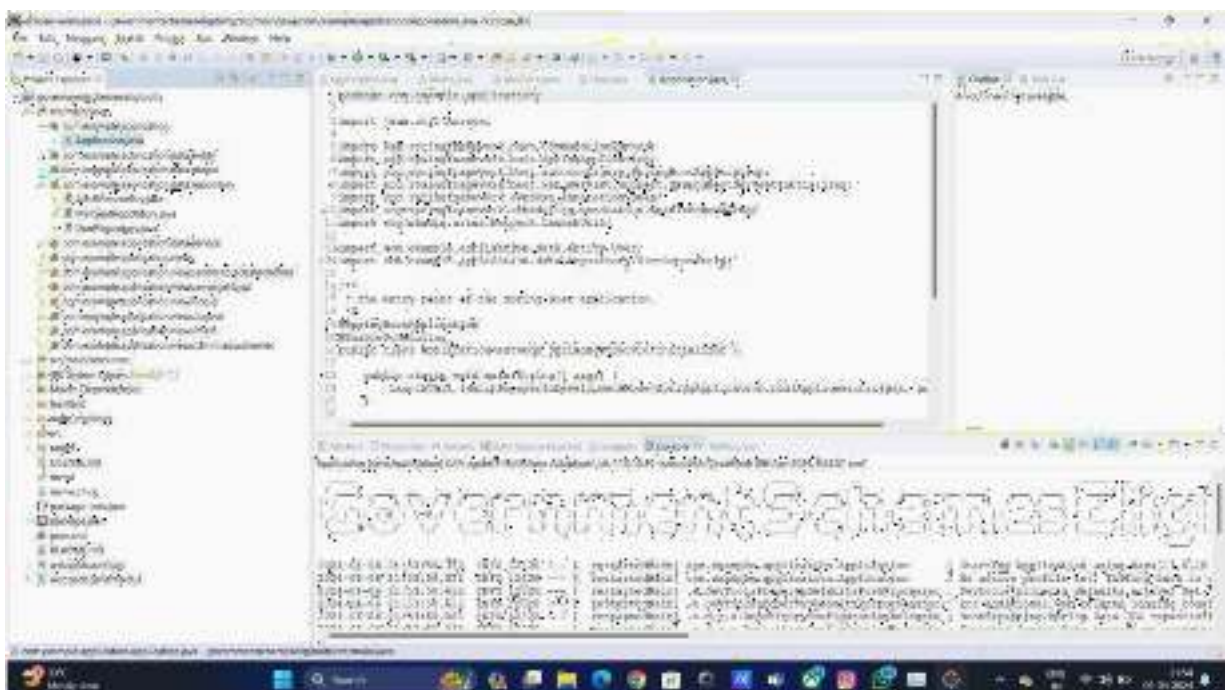


Fig.B.6: Execute the code

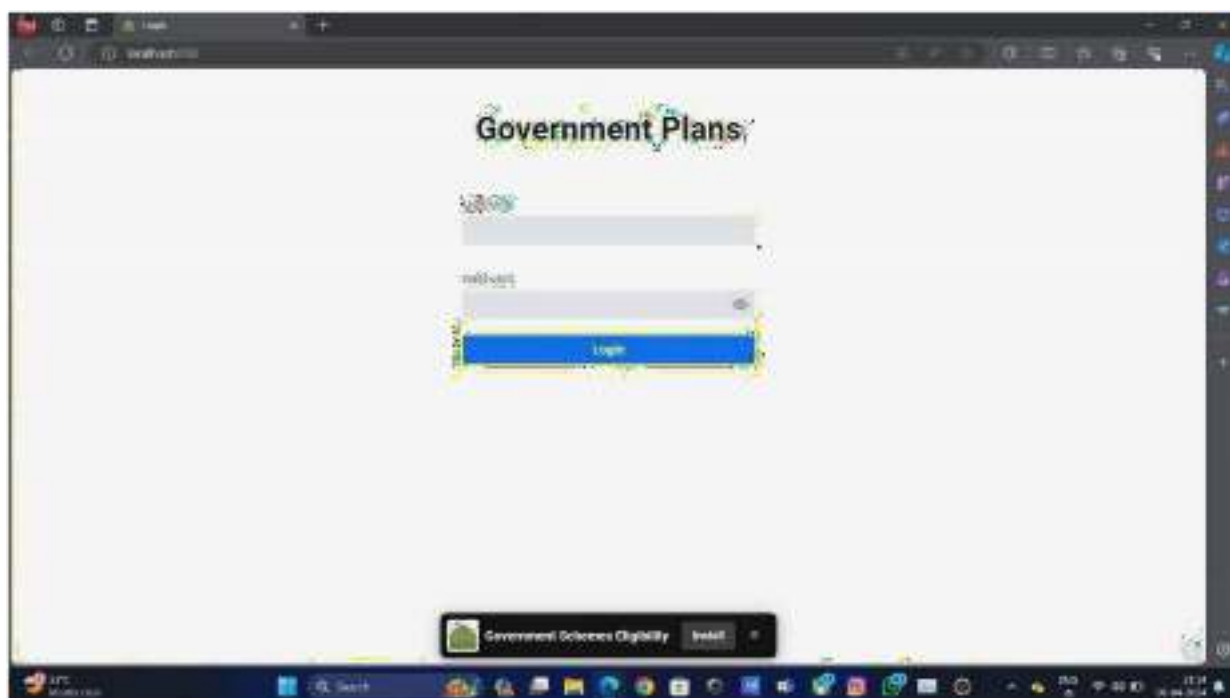


Fig.B.7: Login page

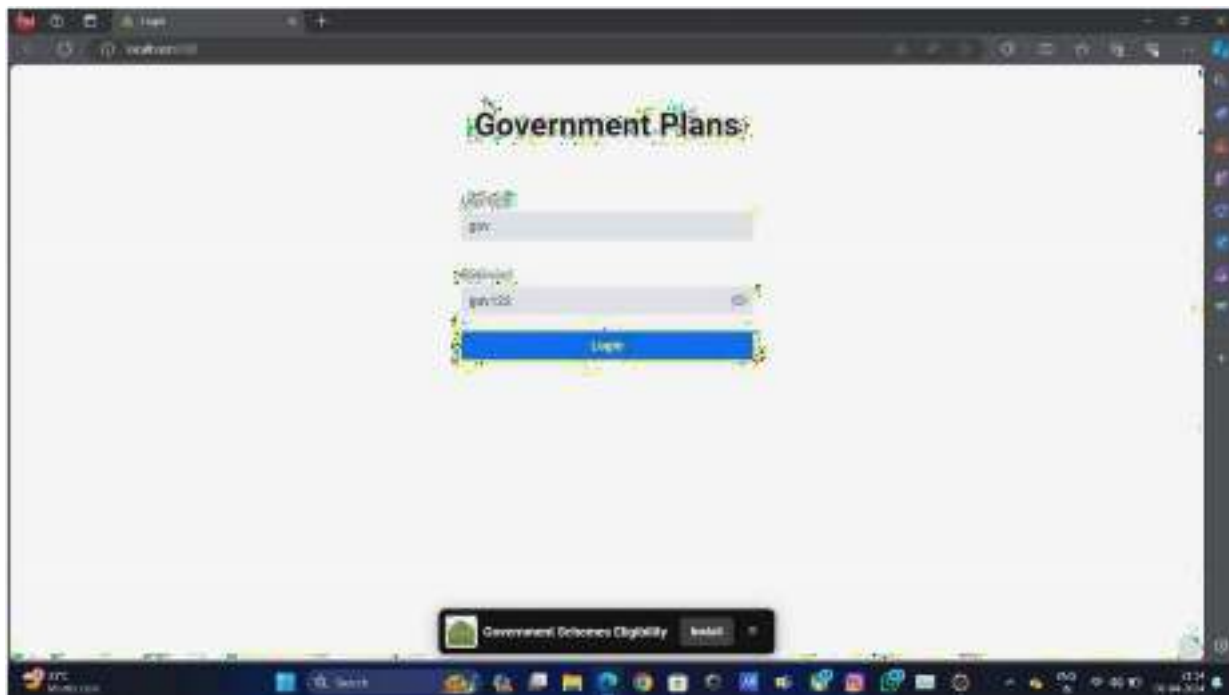


Fig.B.8: Enter credentials

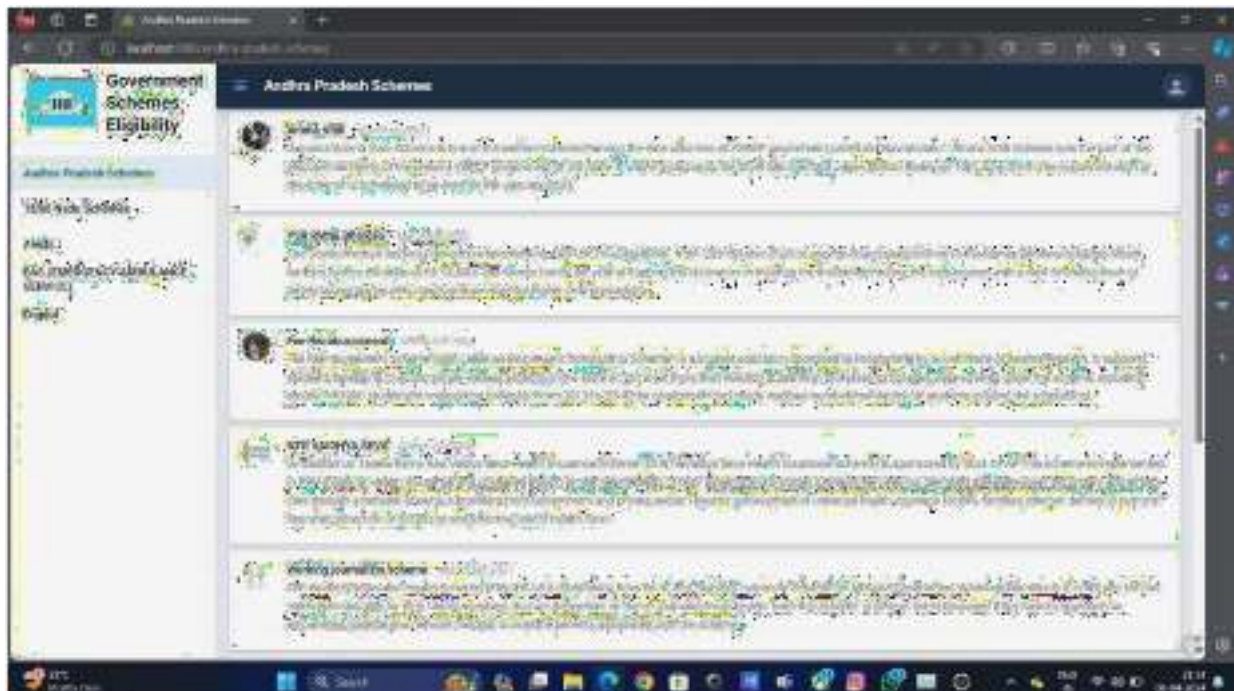


Fig.B.9: Home page (Andhra pradesh schemes)

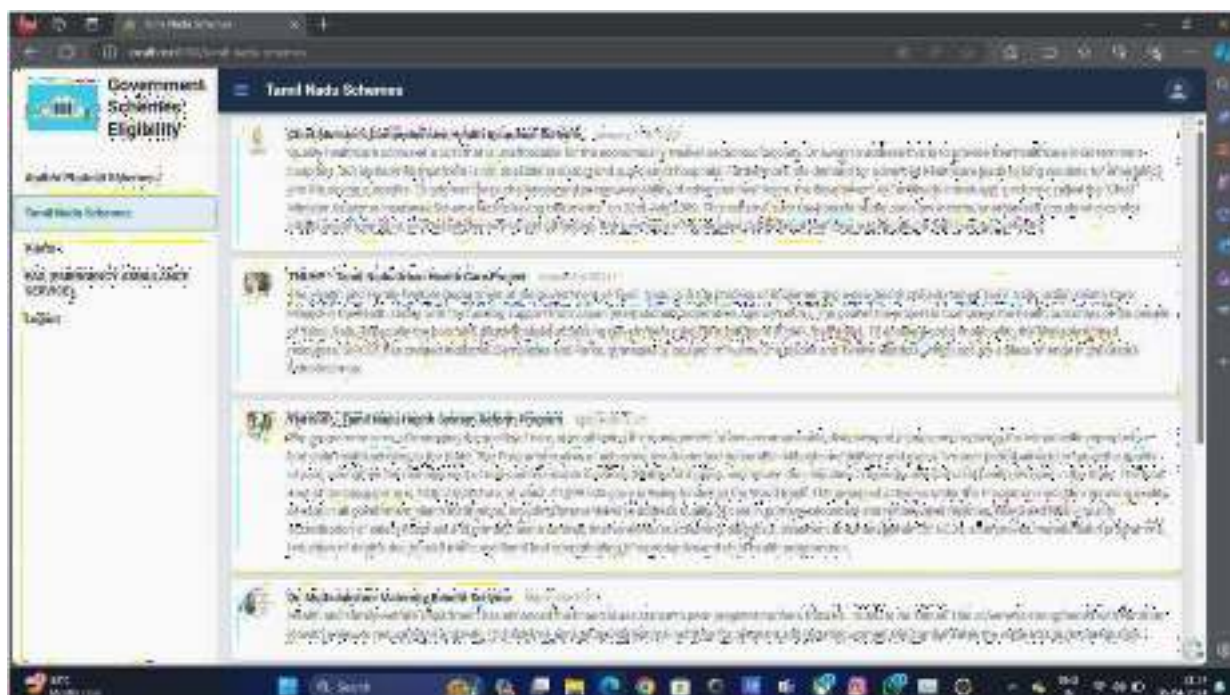


Fig.B.10: Tamil nadu schemes

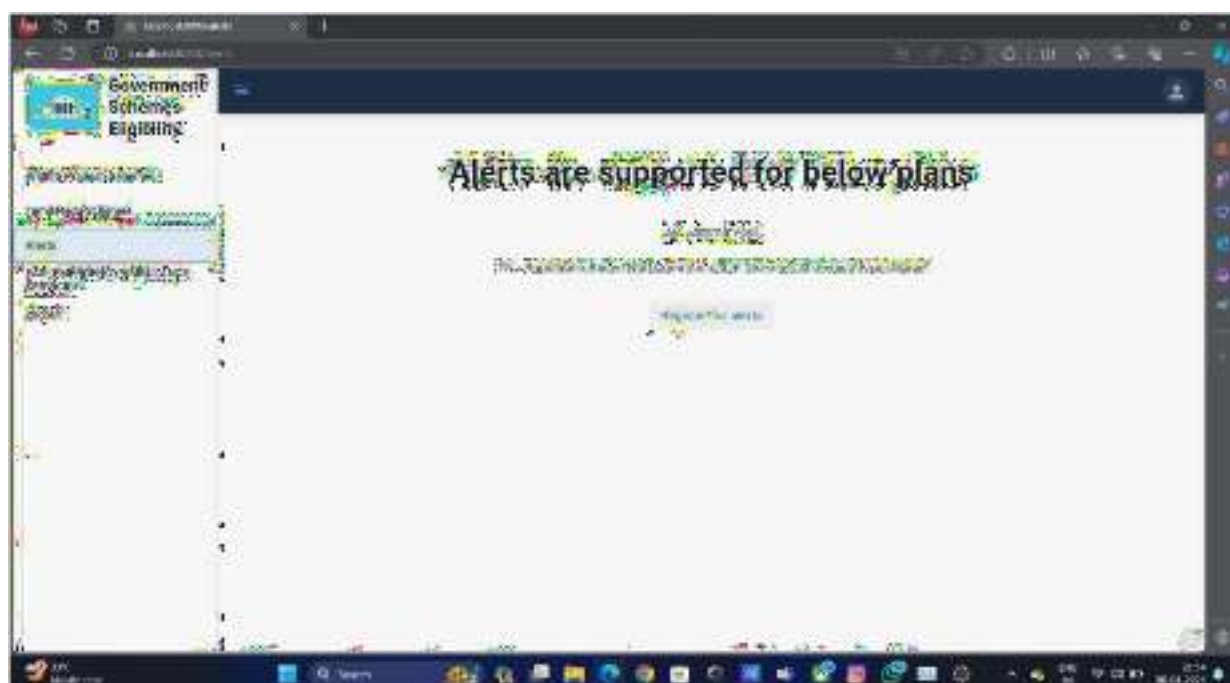


Fig.B.11: Register for alerts

Alerts are supported for below plans

Register for alerts

State: [Dropdown] District: [Dropdown] Pincode: [Dropdown]

Crop: [Dropdown]

☐ Agriculture
 ☐ Fisheries
 ☐ Livestock
 ☐ Poultry

Register for alerts

Save Reset

Fig.B.12: Enter information for alerts

Alerts are supported for below plans

Register for alerts

State: [Dropdown] District: [Dropdown] Pincode: [Dropdown]

Crop: [Dropdown]

☐ Agriculture
 ☐ Fisheries
 ☐ Livestock
 ☐ Poultry

Email: rishi.pant@gmail.com

Register for alerts

Save Reset

Fig.B.13: Enter users email

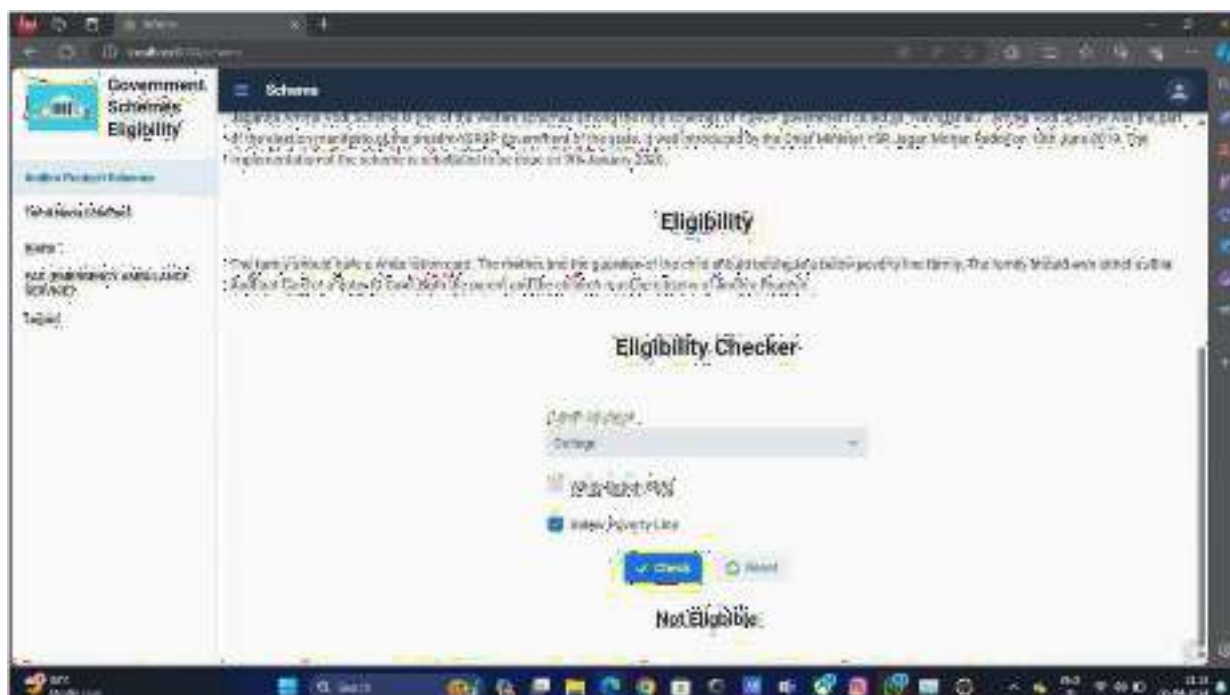


Fig.B.16: Enter details

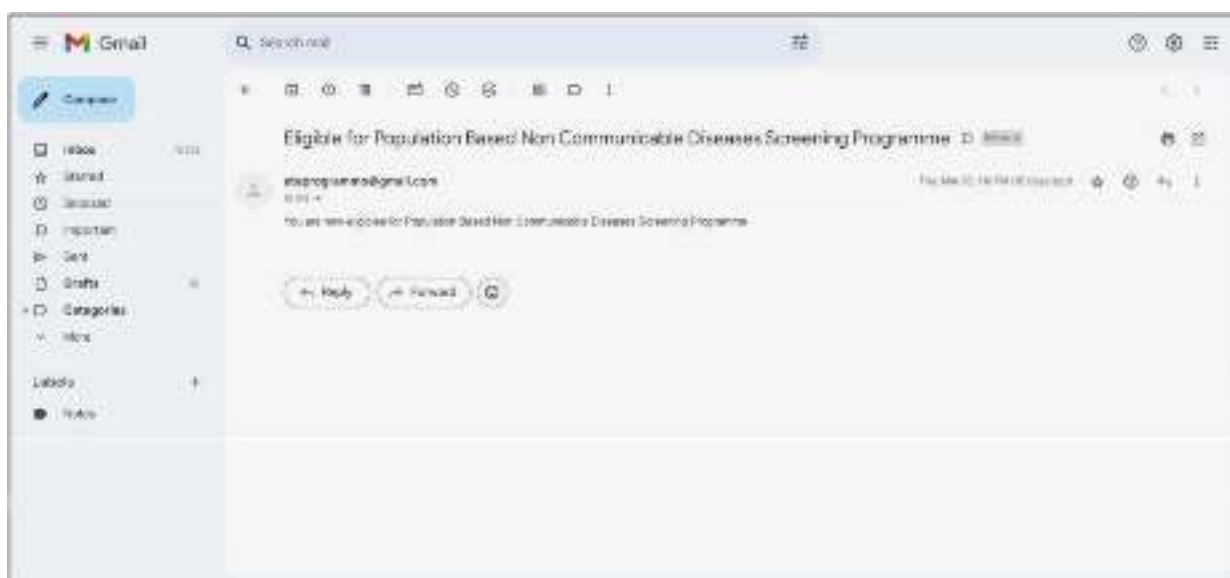


Fig.B.17: Alerts received successfully

Government Scheme Alert Web Applications

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Abstract— The proposed system aims to rectify the persistent issue of government schemes not effectively reaching their intended recipients due to administrative lapses. It introduces a user-friendly platform with a seamless registration process, allowing individuals from diverse backgrounds to apply for schemes. The administrator's role involves adding scheme details and ensuring the transparent and accurate review of user registrations against predefined eligibility criteria. The system's interface prioritizes accessibility with multi-language support, and the administrator's centralized authority facilitates informed decision-making on scheme applications. Detailed scheme information, including eligibility criteria and application guidelines, is provided to users. A notification system offers real-time updates on application status, promoting user engagement and trust. Security measures are robust, with regular audits to safeguard sensitive user data. Multi-role access control allows for delegation of responsibilities without compromising security. Analytics and reporting tools aid administrators in data-driven decisionmaking. Public awareness campaigns leverage diverse channels to inform citizens about available schemes and the user-friendly application process. The comprehensive system aims to enhance transparency, accessibility, and efficiency, mitigating the risk of government schemes underperforming due to administrative shortcomings.

Keywords—Administrator, E-Government Scheme, Societal sentiments, Bi-Directional Authentication.

1. INTRODUCTION

This exploration into the realms of social media data analysis not only delves into the technicalities of algorithms but also illuminates the nuanced interconnections between online conversations and real-world impact. By scrutinizing the sentiments and discussions revolving around pivotal government schemes, this study aims to decode not just what

is being said but the underlying motivations, concerns, and aspirations driving these digital dialogues. Moreover, the study acknowledges the transformative power wielded by social media in fostering community movements, mobilizing opinions, and influencing public policies. It's not merely about parsing through vast data sets but understanding the human narratives woven within these digital threads. The analysis strives to capture the pulse of the society reflected in the virtual sphere, recognizing that social media is more than a repository of information—it's a mirror that reflects the ethos and ethos of our times.

Additionally, this research acknowledges the ethical considerations inherent in analyzing user-generated content. It aims to respect privacy, avoid biases, and present findings ethically, ensuring that the insights garnered contribute positively to societal understanding without encroaching upon individual liberties.

Furthermore, the study aims to bridge the gap between academic insights and practical applications. By highlighting the potential implications of this data analysis for policymakers, businesses, and societal stakeholders, it emphasizes the need for responsible utilization of these insights for the collective betterment. As the study navigates the labyrinthine terrain of social media data analysis, it illuminates the need for a multidisciplinary approach. It integrates the realms of computer science, sociology, and communication studies to unravel the intricate tapestry of online interactions. By amalgamating these diverse fields, it aims not just to crunch numbers but to weave narratives that encapsulate the essence of societal perceptions and aspirations. Moreover, this research acknowledges the dynamic nature of social media ecosystems. It recognizes that these platforms evolve continually, adapting to technological advancements and societal shifts. Thus, it underscores the importance of adaptability in analytical methodologies, advocating for approaches that are not just static algorithms but frameworks capable of flexing and adapting to the everchanging digital landscape.

In addition, this study contributes to the existing literature on social media data analysis by employing novel techniques and tools. It leverages the power of artificial intelligence, machine learning, and natural language processing to extract meaningful insights from large-scale and unstructured data. It also utilizes various visualization methods to present the results in an intuitive and engaging manner. Furthermore, it applies various quality measures and ethical principles to ensure the validity and reliability of the data and the analysis.

It also addresses the challenges and limitations of social media data analysis, such as data quality, privacy, bias, and interpretation issues. By doing so, it aims to provide a comprehensive and rigorous account of the current state and future directions of social media data analysis.

The study goes beyond the conventional data analysis and aims to excel in the art of storytelling. It does not simply present the statistical findings in a dry and factual manner, but it also weaves captivating narratives that resonate with the experiences and emotions that are embedded within the digital discourse. This approach endeavors to humanize the data, transforming it from abstract and cold numbers into relatable and meaningful stories that capture the essence of societal sentiments and attitudes.

In essence, this research journey embarks on an expedition into the heart of digital conversations, aiming to decipher the underlying themes and emotions that permeate through the virtual corridors of social media. It underscores the significance of not just quantitative analysis but qualitative understanding, recognizing that behind every data point lies a narrative waiting to be understood and shared. Through this holistic approach, it aims to transcend the boundaries of conventional data analysis and enrich our comprehension of the intricate interplay between technology, communication, and society.

In conclusion, this study stands as a testament to the evolving nature of digital communication and its pivotal role in shaping our world. It embraces the challenges and complexities inherent in analyzing social media data, viewing them not as obstacles but as gateways to deeper insights. By doing so, it aspires to pave the way for a more profound comprehension of the interconnectedness between the virtual and the real, propelling us towards a future where digital interactions are not just data points but windows into the collective consciousness of humanity.

1.1 PROBLEM ANALYSIS

1.1.1 EXISTING SYSTEM

Authentication is a vital component of network security, especially in the context of e-government systems that

provide online public services to citizens and businesses. Authentication refers to the process of verifying the identity of users and systems that interact with each other over the network.

However, authentication is not a static or simple problem. It is a dynamic and complex challenge that requires constant innovation and improvement. As new technologies emerge and new threats arise, authentication methods need to be updated and adapted to meet the changing needs and demands of e-government systems.

1.1.2 PROPOSED SYSTEM

This website provides all the schemes released by the Government for the benefit of the citizens. It also announces every new scheme that is launched or updated by the Government and displays the notifications on the main pages of the website. The user registration process is simple and secure, requiring only basic information and verification. The login authentication ensures that only registered users can access the scheme details and apply for them. The website also allows users to check their status details, such as eligibility, application status, payment status, etc., for any scheme they have applied for or are interested in.

2. LITERATURE SURVEY

In software development, a comprehensive literature survey stands as the cornerstone, shaping the entire development process. Before crafting any tool or system, meticulous evaluation of critical factors—time, economic viability, and resource robustness—is imperative. These considerations act as guiding compasses, steering subsequent actions.

Once these foundational aspects are established, attention turns to the practical realm: choosing an optimal operating system and programming language. These decisions lay the groundwork for the tool's architecture and functionality, transcending technical choices to become strategic maneuvers aligned with project objective.

Programmers, not working in isolation, rely on a wealth of knowledge. Senior developers, reference materials, and online resources provide indispensable support, offering insights and guidance throughout the developmental journey. This fusion of experience, literature, and digital resources strengthens the development process, transforming conceptual ideas into functional realities.

Within the landscape of software development, a comprehensive literature survey serves as more than a starting point; it's the bedrock upon which successful projects are built. The meticulous evaluation of crucial elements—time constraints, economic viability, and the solidity of available resources—serves not just as a checklist but as guiding principles shaping the trajectory of the development process.

Once these foundational elements are securely established, the spotlight shifts to the pragmatic realm: the selection of an optimal operating system and programming language. These choices transcend technical preferences; they become strategic decisions that lay the groundwork for the tool's architecture and functionality, aligned meticulously with the overarching objectives of the project.

Moreover, each stage of this meticulous process undergoes continuous evaluation. Resource allocation, manpower considerations, economic feasibility, and the overall strength of the company's standing are subject to constant reassessment. This perpetual scrutiny ensures not just compliance with project goals but also alignment with industry standards, fostering a developmental environment deeply rooted in foresight and understanding.

Collaboration isn't just a buzzword in this domain; it's an operational reality. Programmers, far from toiling in solitary endeavors, draw upon a rich tapestry of knowledge. Seasoned developers, reference materials, and the vast expanse of online resources become invaluable pillars, offering insights and guidance that fortify the developmental journey. This synthesis of experience, literature, and digital support elevates abstract concepts into tangible, functional realities.

Furthermore, every stage undergoes meticulous evaluation. Resource allocation, manpower, economic feasibility, and company strength undergo constant reassessment, ensuring alignment with project goals and industry standards. This meticulous scrutiny ensures each step is rooted in a solid foundation of foresight and understanding.

Hence, the essence of project development extends beyond mere coding and design. It lies in strategic planning and informed decision-making facilitated by an extensive literature survey—a compass guiding through complexities, ensuring purposeful and optimized strides toward realizing a robust and effective software tool.

3. METHODOLOGY

3.1 SYSTEM ARCHITECTURE

The system architecture consists of three main components: an ADMINISTRATOR, a SCHEME, and a USER. The

administrator is responsible for creating and managing the scheme, which is a set of rules or parameters that define how the system operates. The user is an individual or entity that interacts with the system through the scheme. Both the administrator and the user have the ability to ADD, UPDATE, and DELETE schemes, depending on their needs and preferences. Additionally, both can view different types of schemes that are available in the system, such as public, private, or hybrid schemes. The system architecture is illustrated by a flowchart that shows the relationships and actions among the components. The scheme component has three subcomponents: ADD, UPDATE, and DELETE, which represent the possible actions that can be performed on a scheme. Similarly, the user component has three subcomponents: ADD, UPDATE, and DELETE, which represent the possible actions that can be performed on a user account. The view types of scheme component is shared by both the scheme and the user components, indicating that both have access to this functionality.

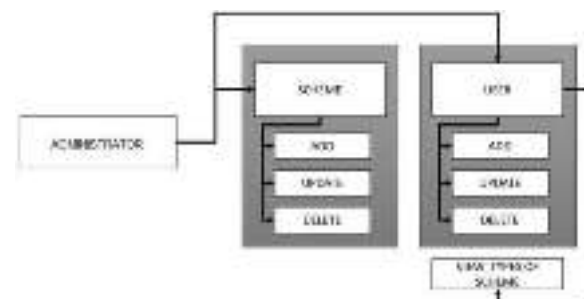


Fig 3.1 Architecture diagram

3.1.1 ADMINISTRATOR:

This module manages the programs and schemes that the government funds for eligible citizens. The administrator's role is to keep the citizens informed and updated about the programs and schemes and their changes and opportunities. The administrator does these tasks:

Checks for new updates: The administrator regularly checks the official sources for any new updates or changes in the programs and schemes, such as eligibility, benefits, duration, application process, etc.

Updates the website and sends notifications: The administrator updates the website with the latest information and sends SMS notifications to the eligible citizens for the specific programs and schemes. The

notifications tell the citizens about the details and deadlines and encourage them to apply quickly.

Reviews the eligibility data and reports the numbers: The administrator reviews the eligibility data of the applicants and verifies their documents and information. The administrator also reports how many members applied for each program and scheme and tracks their progress and status.

Approves or rejects applications: The administrator approves or rejects different applications based on eligibility and documents. The administrator also gives feedback and guidance to the rejected or improved applicants.

The module's goal is to administer the programs and schemes efficiently and transparently and to help the citizens get the maximum benefits from them.

3.1.2 USER:

The user received a notification about a scheme that offers financial assistance to eligible applicants. The scheme is designed to help people who are facing economic challenges due to the pandemic. The user was informed that if he is not eligible for the scheme, he should visit the website to verify the necessary documents before applying for that specific plan. The website provides a list of documents that are required for each plan, such as income statements, bank statements, tax returns, etc. The user can also find out more information about the eligibility criteria and the amount of assistance available for each plan. The user can apply for the scheme online by filling out a simple form and uploading the documents. They simply log into the system to monitor the status of their applications as well. The system will notify them when their applications are approved or rejected. The details of users in the list can only be edited or removed by the user. The user can change their personal information, such as name, address, phone number, etc., or cancel their applications at any time. The user can also contact the customer service team if they have any questions or issues regarding the scheme or the website. [12].

3.1.3 SCHEMES:

This module provides the administrator with the functionality to create new schemes, delete obsolete schemes, and modify existing schemes. These display all the scheme details along with the information related to the scheme-specific user, criteria, and condition. On the portal, the administrator is the only one who has the privilege to create new schemes. The details of the schemes are accessible to all remaining users. A scheme is a set of rules and parameters that define how a certain process or task is executed. For example, a scheme can specify how to allocate resources, assign roles, or evaluate performance. The administrator can use this module to customize and optimize the schemes according to the needs and goals of the organization. The module also allows the administrator to view and manage the users who

are enrolled in each scheme, as well as the criteria and conditions that determine their eligibility and progress. In this module, the user can perform various actions such as creating a new scheme, editing an existing scheme, deleting an unwanted scheme, viewing the scheme details, and managing the scheme users, criteria, and conditions.

4. RESULTS AND DISCUSSION

In order to supply the schemes to the relevant user, we first need the user to verify all of the conditions mentioned above. To do this, we gather the user's information through the user registration procedure. Once we have that, we can provide the relevant scheme to the relevant user. The user can profit from this government program by using it.

We can view a variety of report types in the reporting module, including scheme- and user-wise reports. Various reports include Approved applications, Pending applications and rejected applications also user wise. The scheme name, scheme type, scheme id, and validity date are included in the scheme-wise report. The user-specific report should include all of the user's data as well as the specifics of the scheme that they are using, along with the conditions and criteria. The accepted applications report will show the application's status as well as any notes. The rejected applications reports will contain all of the reports on the denied applications.

In order to supply the schemes to the relevant user, we first need the user to verify all of the conditions mentioned above. These conditions may vary depending on the type and purpose of the scheme, but they generally include eligibility criteria, required documents, and consent forms. To do this, we gather the user's information through the user registration procedure, which involves filling out an online form and uploading the necessary files. Once we have that, we can provide the relevant scheme to the relevant user. The user can profit from this government program by using it for their intended goals, such as education, health care, or business development.

We can view a variety of report types in the reporting module, which helps us monitor and evaluate the performance and impact of the schemes. These reports include scheme- and user-wise reports. Scheme-wise reports show us how many users have applied for, received, or rejected each scheme. They also provide us with information about the scheme name, scheme type, scheme id, and validity date. User-wise reports show us how each user has benefited from the schemes that they have received. They also provide us with information about the user's data, such as name, age, gender, location, income level, etc., as well as the specifics of the scheme that they are using, along with the conditions and criteria. The accepted applications report will show us the application's

status as well as any notes that we have added during the approval process. The rejected applications reports will contain all of the reports on the denied applications, along with the reasons for rejection and any feedback that we have given to the users.



Fig. 4.2 Login Page



Fig.4.3 Andhra Pradesh scheme dashboard Page



Fig.4.4 Tamil Nadu Scheme Dashboard Page

5. CONCLUSION

In conclusion, the government scheme web application is a valuable resource for citizens who want to avail themselves of the various benefits and services that the state provides. The web application enables users to create an account, log in, explore, apply and monitor their applications on the internet, without the need of going to physical offices or completing paper forms. The web application has a user-friendly, secure and reliable design, with features such as password encryption, data validation and backup. Additionally, the web application offers feedback and support to users through email notifications, FAQs and chat-bots. By utilizing the government scheme web application, citizens can conserve time, money and effort, while benefiting from the convenience and transparency of the digital platform. Furthermore, the web application helps the state to improve its efficiency, accountability and responsiveness to the needs and preferences of the citizens.

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