

CHAPTER 1

INTRODUCTION

1.1 PROBLEM DEFINITION

The National Social Assistance Programme in India faces several challenges in its implementation. One major issue is the limited coverage of the program, as many eligible individuals remain excluded from the scheme due to administrative and logistical challenges. Additionally, there is a lack of awareness among the targeted population about the program's benefits and the application process. Another issue is the inadequate funding for the program, which limits the amount of financial assistance that can be provided to beneficiaries. The funds allocated for the program are often insufficient, leading to delays in payments and the inability to expand the program's coverage to reach more vulnerable individuals. Moreover, there is a lack of transparency and accountability in the implementation of the program, which may lead to corruption, discrimination, and other forms of malpractice. This undermines the program's effectiveness and hinders its ability to reach those who need it the most.

Overall, the NSAP's success in achieving its objectives is hindered by these challenges, highlighting the need for improved policies and mechanisms to address the issues. The National Social Assistance Programme (NSAP) is a government welfare scheme launched in India in August 1995 to provide financial assistance to the most vulnerable sections of society. The scheme aims to provide social security to the elderly, widows, and disabled persons living below the poverty line. The NSAP is an umbrella programme that includes five different components, including pensions for the elderly, widows, and disabled persons, a family benefit scheme, and an Annapurna scheme for food security. The objective of the scheme is to alleviate poverty among the most vulnerable sections of society and promote their well-being by providing financial assistance and social security. This program has helped millions of people in India by providing them with a means of livelihood and financial stability.

CHAPTER 2

LITERATURE REVIEW

[1] **A. X. Chang and C. D. Manning**, proposed a paper where high dynamic range image generation method using a single input image is used. The proposed approach generates over- and under-exposed images by making use of a novel adaptive histogram separation scheme. Thus the same way we are going to use the a novel adaptive histogram separation to achieve the NSAP. Additionally, it is proposed to utilize a fuzzy logic based approach at the fusion stage which takes visibility of the inputs pixels into account. Since the proposed approach is computationally light-weight, it is possible to implement it on mobile devices such as smart phones and compact cameras. Such the same way we are going use 3 stages in NSAP which can be used in websites. Experimental results show that the proposed approach is able to provide ghost-free and improved performance compared to the existing methods. Such the same way the websites are improved performance compared to the existing websites.

Advantages: These websites are improved performance and implementation oriented compared to the existing websites. . This website is not affected by the government and organization The low computational complexity of the proposed approach makes it suitable for the people

Disadvantage: Existing websites proposed approach requires approximately two times higher processing time than our website

[2] **P. De Rose et al.** stated that the overexposure usually occurs in the digital image due to the limited dynamic range of the low dynamic range displays. Such as the same way due to the lack of knowledge to people about the government scheme is due to lack of awareness .In their paper, a novel method to correct the overexposed region in the image, which consists of the lightness recovery and the color correction, is proposed. Such as the same way we are going to use our website to increass the awareness to the people For correcting the color, they apply the bilateral filter with weights obtained using the recovered lightness to the color of the overexposed region. Such as we are using the three teams in which each team recover the different set of peoples who are eligible for the NSAP scheme

Advantages: Provides more enhanced result in the overexposed region such as rural/urban areas. The NSAP websites are the proposed method exhibits more genuine while maintaining details of the overexposed region of the people.

Disadvantage: If the overexposed region people does not have the basic details properly. Our team will not work in all cases and we cannot able to provide the basic details to the people

[3] **L. Falquet et al** proposed a weighted sum based multi-exposure image fusion method which consists of two main steps: three image features composed of local contrast, brightness and color dissimilarity are first measured to estimate the weight maps refined by recursive filtering. Then, the fused image is constructed by weighted sum of source images. 13 The main advantage of the proposed method lies in a recursive filter based weight map refinement step which is able to obtain accurate weight maps for image fusion. Another advantage is that a novel histogram equalization and median filter based motion detection method is proposed for fusing multi-exposure images in dynamic scenes which contain motion objects. Furthermore, the proposed method is quite fast and thus can be directly used for most consumer cameras. Experimental results demonstrate the superiority of the proposed method in terms of subjective and objective evaluation

Advantages: The system can create high visual quality tone-mapped-like fused images in both dynamic scenes and static scenes. Such as the same way our websites can provide the government schemes to all the people in both urban and rural .

Disadvantage: If the bank organization is not helping the teams created by us it will be the drawback whick mean the peoples application may be delayed and we cannot assure time to complete the process

[4] **M. Bando, N. S. Artan, and H. J. Chao**, presented a ghost artifacts removing method for obtaining artifact-free high dynamic range images in the presence of camera movement. The existing methods work on condition that there is no camera movement when acquiring multiple low dynamic range images. For overcoming such unrealistic restriction, they register the multiple images by using a novel target frame finding method. Ghost artifacts are removed in the resulting images since the registration process of images compensates undesired camera motion. Since the proposed method can embed the self-compensating function into an imaging device, Ghost-free imaging application can be extended to most consumer cameras, such as mobile phone cameras, point-and-shoot cameras, and digital single lens reflected cameras without using additional stabilizing equipments

Advantages: The database will be backup by every month this makes the detail of the people more secure. The databse will be under maintenance for every six month this makes the database more secure.

Disadvantage: The person details can be uploaded by the team one in the database but due to some database issue the details can be delayed . These will affect the application because the team two will not receive the details at the correct time

[5] **C. R. Meiners, J. Patel, E. Norige, E. Torng, and A. X. Liu**, proposed an anti-aliasing algorithm which first performs the discrete anti-aliasing method using combined wavelet-Fourier transforms for enhancement of mobile imaging systems. The method can remove aliasing artifacts while preserving highfrequency details using frequency-domain analysis and adaptive shrinkage of wavelet sub bands. The algorithm consists of three steps; Wavelet transform of the input Degraded image Wavelet Transform to decompose the input image into a set of band-limited components, sub bands. We use the Fourier transform of the sub band for analyzing aliased components, and remove them using the notch filter. From the resulting aliasing-free band we. Analysis of Fourier transform coefficients and aliasing compute the edge-map for the later use. Aliasing components reduction in the sub band of the wavelet transform and iii) Selective reduction of aliasing artifacts according to the classification between details and aliased components in the LH, HL, and HH sub bands. Based on experimental results,sub bands are removed using the edgemap of the LL band and adaptive wavelet shrinkage. The resulting enhanced image is obtained by the inverse proposed algorithm can successfully remove aliasing artifacts while preserving high visual quality.

Advantages: The people can able to know that in which stage our application is in progress. This makes the people to know that whether our approval is accepted or rejected.

Disadvantage: The approval can be rejected on the final stage. Due to some technical problem the people cannot be able to see their approval in which level they are in. .

[6] **M. Roesch et al.**, Underexposed video enhancement aims at revealing hidden details that are barely noticeable in video frames with noise. Previous work typically relies on a single heuristic tone mapping curve to expand the dynamic range, which inevitably leads to uneven exposure and visual artifacts. In this paper, we present a novel approach for underexposed video enhancement using an efficient perceptiondriven progressive fusion. For an input underexposed video, we first remap each video frame using a series of tentative tone mapping curves to generate an multiexposure image sequence that contains different exposed versions of the original video frame. Guided by some visual perception quality measures encoding the desirable exposed appearance, we locate all the best exposed regions from multiexposure image sequences and then integrate them into a well-exposed video in a temporally consistent manner. Finally, we further perform an effective texturepreserving spatio-temporal filtering on this well-exposed video to obtain a highquality noise-free result. Experimental results have shown that the enhanced video

exhibits uniform exposure, brings out noticeable details, preserves temporal coherence, and avoids visual artifacts. Besides, we demonstrate applications of our approach to a set of problems including video

Advantages: By calling, telling about the scheme to the people the three teams will able to make the people more reliable and self dependent

Disadvantage: The people may not attend the call, The team members may not have a proper respect while calling to the people

[7] **F. Yu, Z. Chen, Y. Diao, T. Lakshman, and R. H. Katz,** Image enhancement plays an important role in image processing and analysis. Among various enhancement algorithms, Retinex-based algorithms can efficiently enhance details and have been widely adopted. Since Retinex-based algorithms regard illumination removal as a default preference and fail to limit the range of reflectance, the naturalness of non-uniform illumination images cannot be effectively preserved. However, naturalness is essential for image enhancement to achieve pleasing perceptual quality. In order to preserve naturalness while enhancing details, we propose an enhancement algorithm for non-uniform illumination images. In general, this paper makes the following three major contributions. First, a lightness order error measure is proposed to access naturalness preservation objectively. Second, a bright-pass filter is proposed to decompose an image into reflectance and illumination, which, respectively, determine the details and the naturalness of the image. Third, we propose a bilog transformation, which is utilized to map the illumination to make a balance between details and naturalness. Experimental results demonstrate that the proposed algorithm can not only enhance the details but also preserve the naturalness for non-uniform illumination images.

Advantages: The people can able to get their money in the bank by every month from day one to day ten. Our team members will be there for every month from one to ten. The team members will help people to take their money.

Disadvantage: The team member may not be there everytime. The people may have some personal problems like body related, age related, family related due to this reasons they may not come to the bank in the proper time..

CHAPTER 3

THEORETICAL BACKGROUND

3.1 IMPLEMENTATION ENVIRONMENT

The implementation environment of NSAP involves the following:

Identification of Beneficiaries: The first step in the implementation of NSAP is the identification of eligible beneficiaries. This is done through a process of survey and verification by the respective State Governments and Union Territory Administrations.

Eligibility Criteria: The eligibility criteria for the NSAP include age, income, and social status. The program targets elderly persons, widows, and persons with disabilities who are below the poverty line.

Grievance Redressal: The program has a grievance redressal mechanism to address complaints and grievances of beneficiaries. The complaints are addressed by the respective State Governments and Union Territory Administrations.

Overall, the implementation environment of NSAP is aimed at providing social assistance to vulnerable individuals in India. Some of the disadvantages are,

- Inadequate Coverage
- Insufficient Funding
- Lack of Transparency

3.2 SYSTEM ARCHITECTURE

Currently to be added into any scheme under the National Social Assistance Programme (NSAP), the individual must either

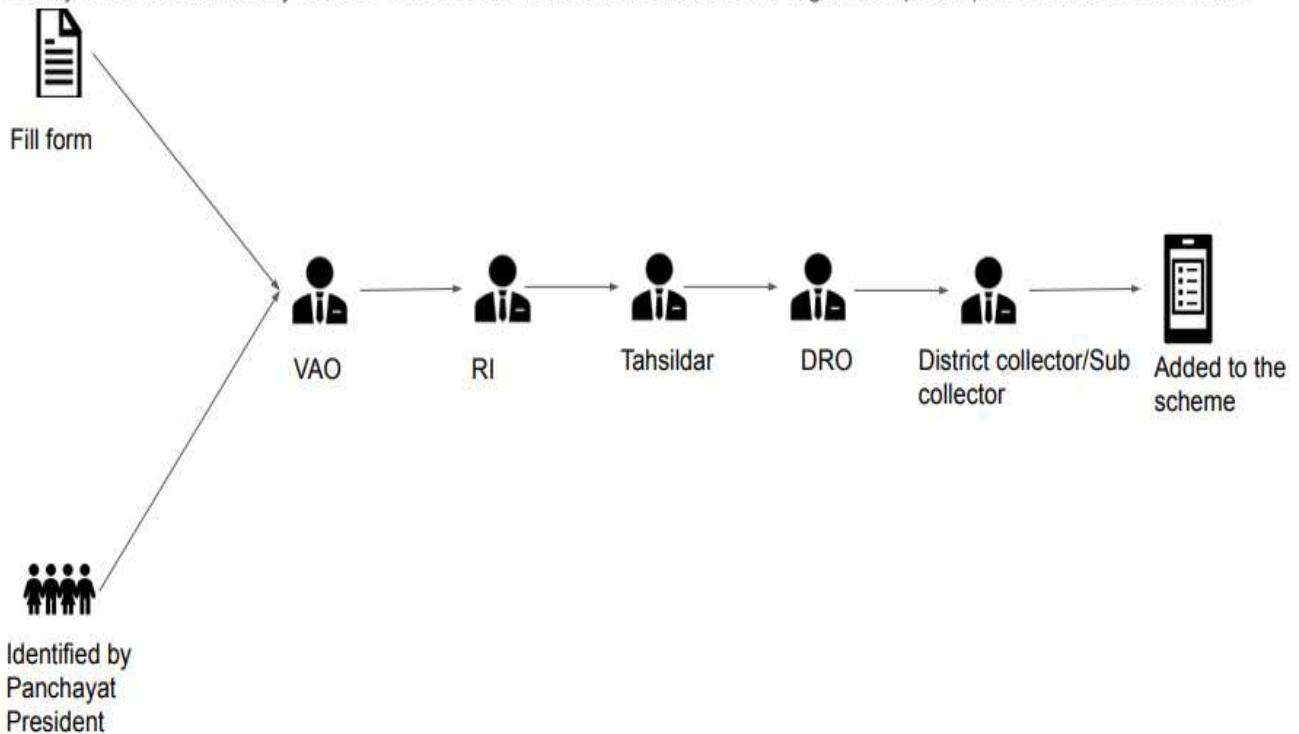


Fig 3.2. Architecture diagram for NSAP

The figure 3.2 consists of National Social Assistance Programme The NSAP scheme's architecture also involves a robust monitoring and evaluation mechanism to ensure effective implementation and identify areas for improvement. The Ministry of Rural Development and state governments use various tools and technologies to monitor the scheme's implementation, including management information systems (MIS), data analytics, and feedback mechanisms. This architecture diagram provides a high-level view of the NSAP system's components and their interactions, illustrating how data flows through the system and how it integrates with external systems to deliver social assistance to beneficiaries.

3.3 PROPOSED METHODOLOGY

3.3.1 Data Set Description

This is normally represented as the data about data. It is also termed as metadata sometimes which gives the data about the data stored in the database. It defines each data term encountered during the analysis and design of a new system. Data elements can describe files or the processes. Following are some rules, which defines the construction of data dictionary entries:

- Words should be defined to understand for what they need and not the variable need by which they may be described in the program.
- Aliases or synonyms are allowed when two or more enters shows the same meaning. For example, a vendor number may also be called as customer number. 10
- A self-defining word should not be decomposed. It means that the reduction of any information in to subpart should be done only if it is really required that is it is not easy to understand directly.
- Each word must be unique. We cannot have two definition of the same client.

Data dictionary includes information such as the number of records in file, the frequency a process will run, security factor like pass word which user must enter to get excess to the information.

3.3.1a Eligibility Checking Table:

COLUMN NAME	DATA TYPE	DESCRIPTION	CONSTRAINT
USERNAME	VARCHAR(100)	NAME OF THE USER	NOT NULL
PASSWORD	VARCHAR(100)	USER PASSWORD	NOT NULL
NAME	VARCHAR(100)	NAME OF THE USER	NOT NULL
EMAIL	VARCHAR(100)	USER EMAIL ID	NOT NULL

Tabel 3.3.1a Eligibility checking table for NSAP

3.3.1b Verification Table:

COLUMN NAME	DATA TYPE	DESCRIPTION	CONSTRAINT
NAME	VARCHAR(25)	NAME OF THE USER	NOT NULL
AADHAR	BIGINT(12)	USER AADHAR NUMBER	NOT NULL
PHONE NUMBER	BIGINT(20)	USER PHONE NUMBER	NOT NULL
ADDRESS	TEXT	USER ADDRESS	NOT NULL

Tabel 3.3.1b Verification table for NSAP

3.3.1c Approval / Reject Table:

COLUMN NAME	DATA TYPE	DESCRIPTION	CONSTRAINT
APPLICATION_ID	VARCHAR(100)	USER APPLICATION ID	NOT NULL
NAME	VARCHAR(100)	NAME OF THE USER	NOT NULL
AADHAR	BIGINT(20)	USER AADHAR NUMBER	NULL
SCHEME	VARCHAR(10)	GOVERNMENT SCHEME	NOT NULL
DATE_OF_VERIFICATION	DATE	VERIFYING THE USER	NULL
STATUS	VARCHAR(100)	STATUS OF THE SCHEME	NOT NULL

Tabel 3.3.1c Approval / reject table for NSAP

3.3.2 Input Design

SOFTWARE REQUIREMENT

- Windows 10
- HTML
- CSS
- Java script
- Django
- MYSQL
- VS Code

HARDWARE REQUIREMENT

- Processor: Minimum 1 GHz
- Memory (RAM): 4 GB
- Hard Drive: 32 GB
- Internet Connection

3.3.3 Module Design

UML DIAGRAMS

3.3.3a Use case diagram

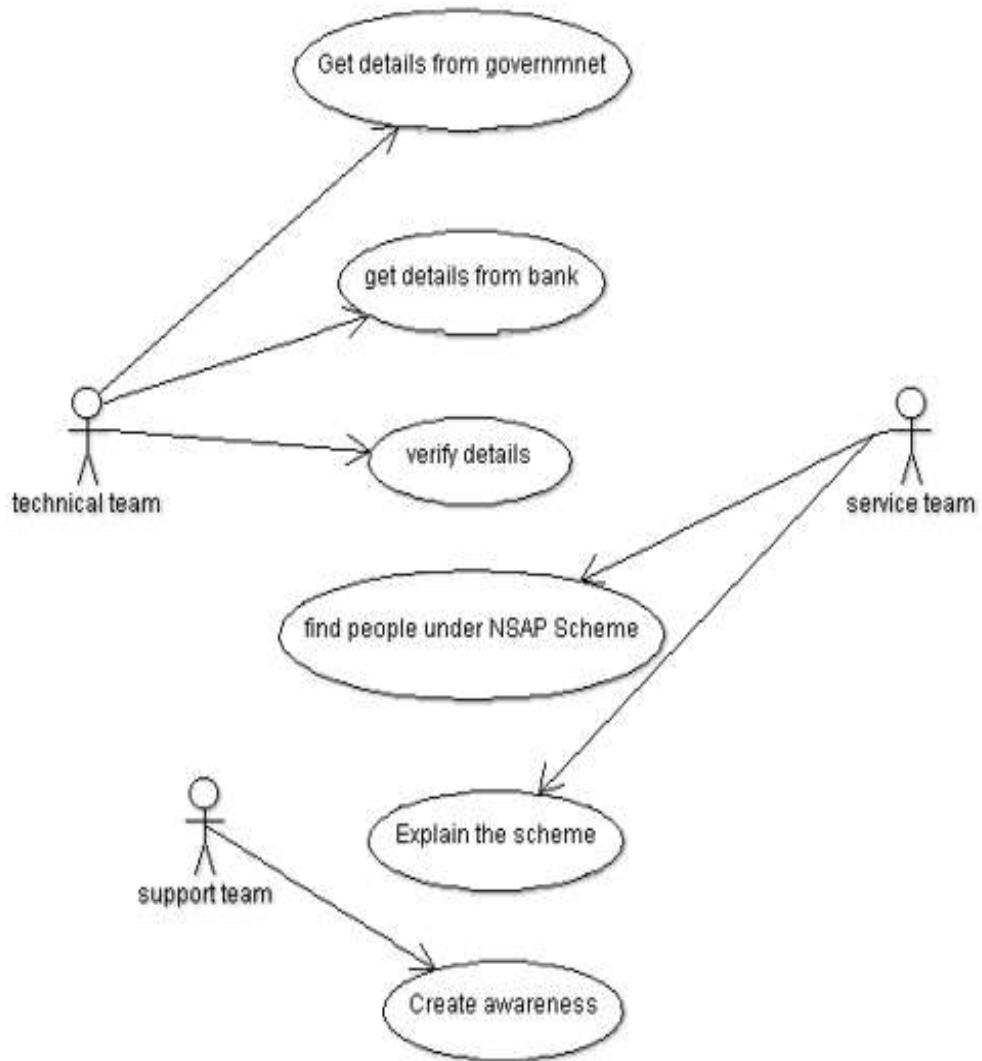


Fig 3.3.3a Use case diagram for NSAP

This use case diagram refers to activities done by vendors and customer and their corresponding use cases. This use case diagram provides a high-level overview of the interactions between users and NSAP system, outlining key functionalities and scenarios for both beneficiaries and administrators.

3.3.3b Class diagram

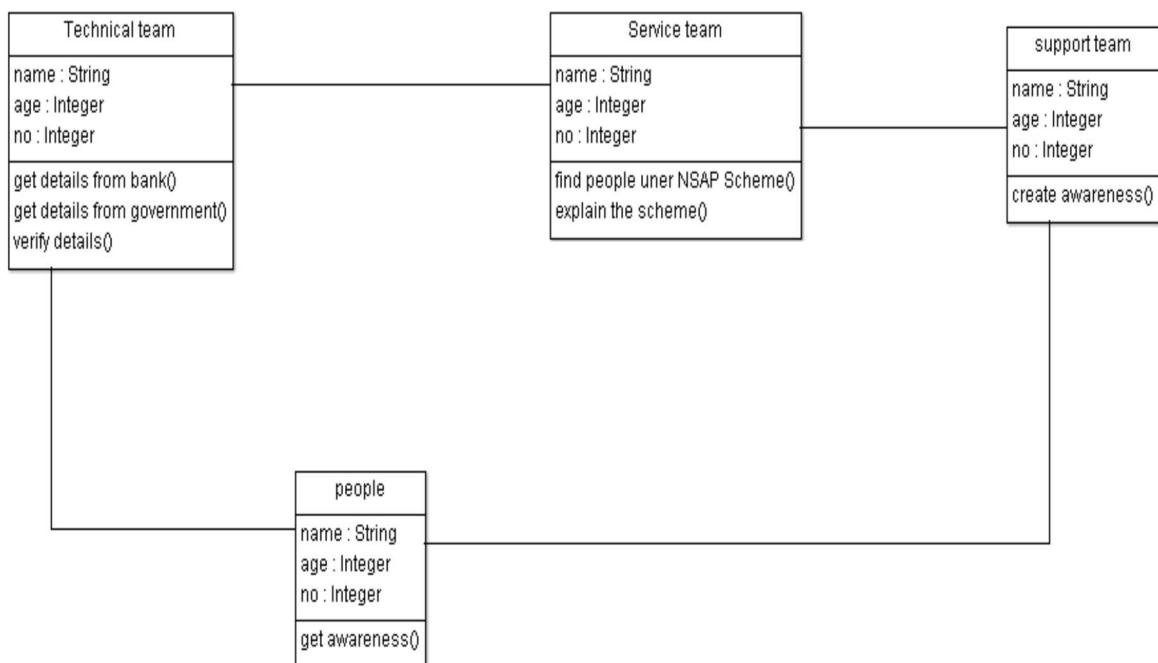


Fig 3.3.3b Class diagram for NSAP

Creating a class diagram for the National Social Assistance Programm (NSAP) involves identifying the key classes and their relationships within the system. This use case diagram refers to activities done by technical ,support and service team and their corresponding usecases. In this classdiagram, relationships such as aggregation and composition are not explicitly shown for simplicity. However, you can further refine the diagram by adding associations between classes and indicating the new multiplicity of relationships based on the requirements of the NSAP system.

3.3.3c Sequence diagram

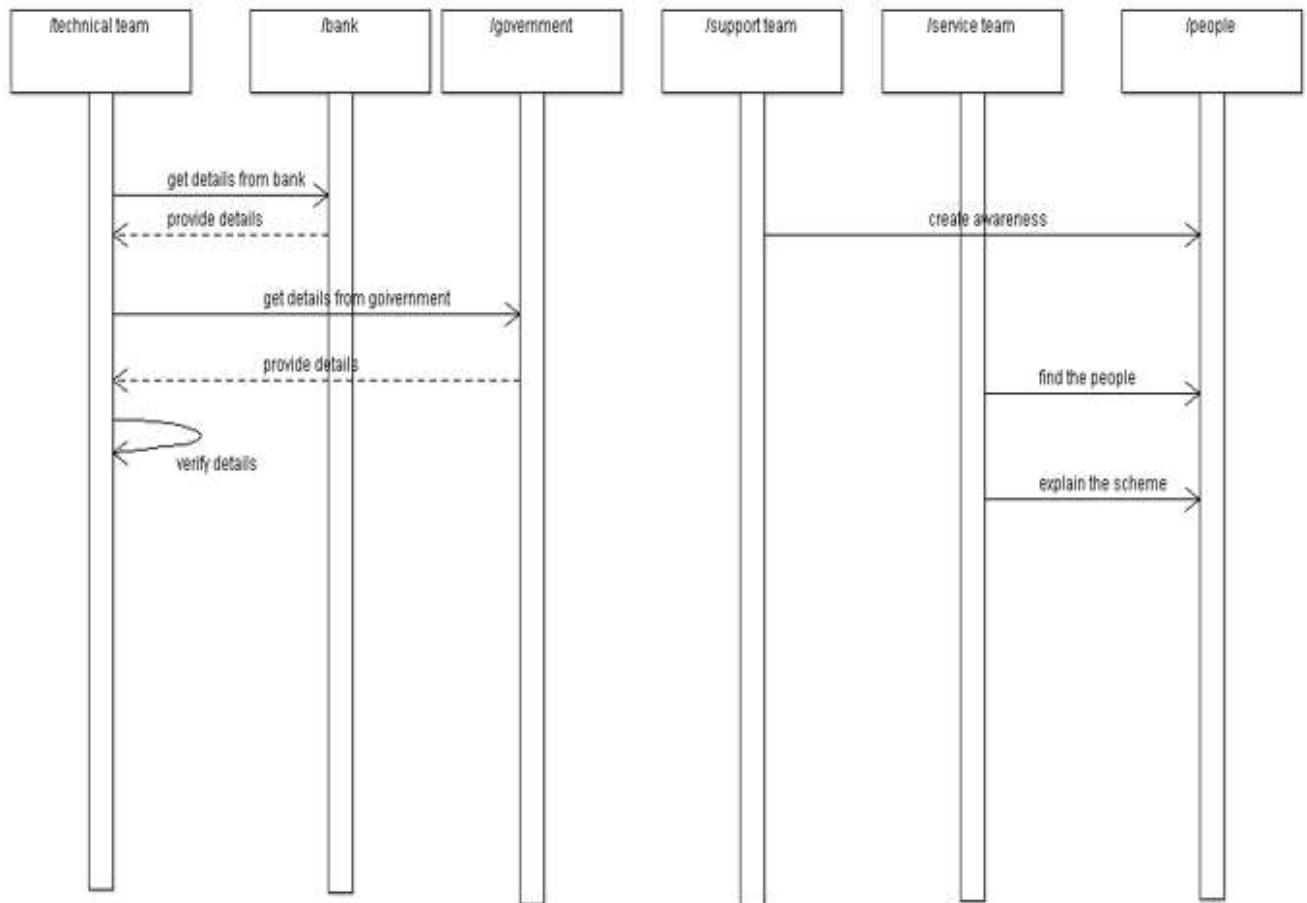


Fig 3.3.3c Sequence diagram for NSAP

The sequence diagram of NSAP String matching shows the sequence of how the technical team getting details from the government. Creating a sequence diagram for the National Social Assistance Programme (NSAP) involves illustrating the interactions between various components or actors in the system over time. This sequence diagram provides a step-by-step visualization of the interactions between the beneficiary and the NSAP system during the application, verification, calculation, payment, and receipt of benefits process.

3.3.3d Collaboration diagram

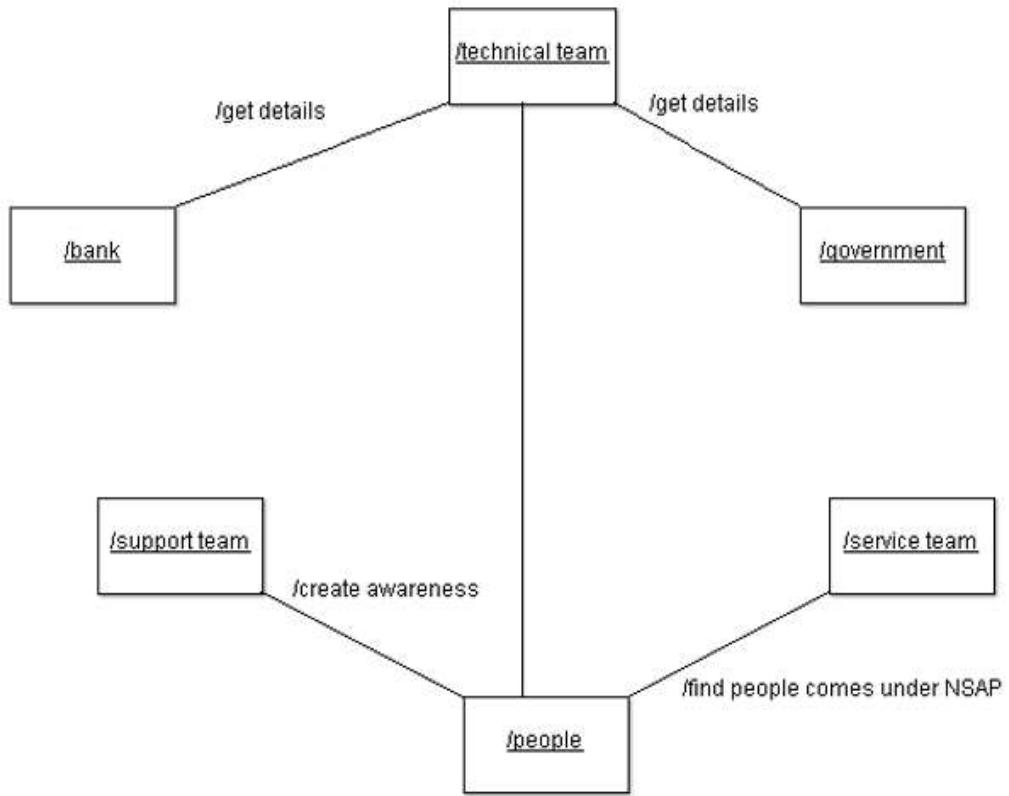


Fig3.3.3d Collaboration diagram for NSAP

The collaboration diagram of NSAP String matching shows the sequence of activities of creating a awareness for people. A collaboration diagram, also known as a communication diagram, illustrates how objects collaborate to achieve a specific task or scenario. This collaboration diagram demonstrates the interactions between the beneficiary, application form, administrator, and NSAP system to accomplish the task of applying for social assistance, verifying eligibility, calculating benefits, processing payments, and disbursing benefits. Each step involves communication between different components of the system to achieve the overall objective of the National Social Assistance Programme.

3.3.3e Activity diagram

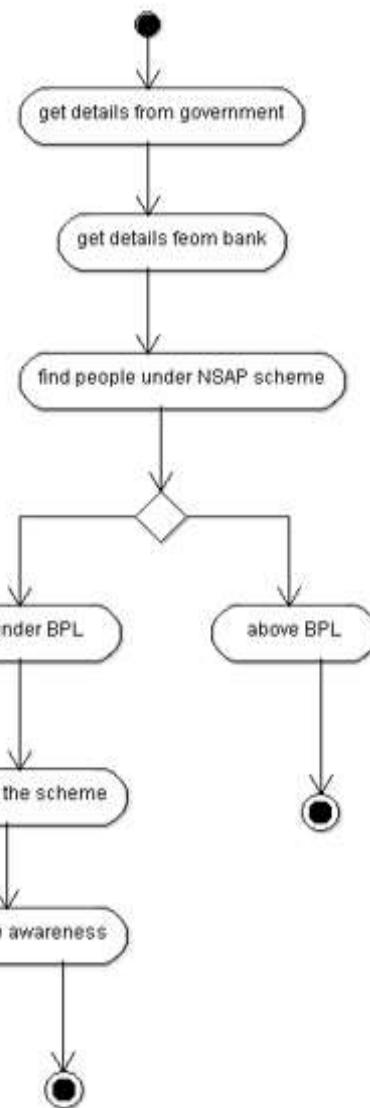


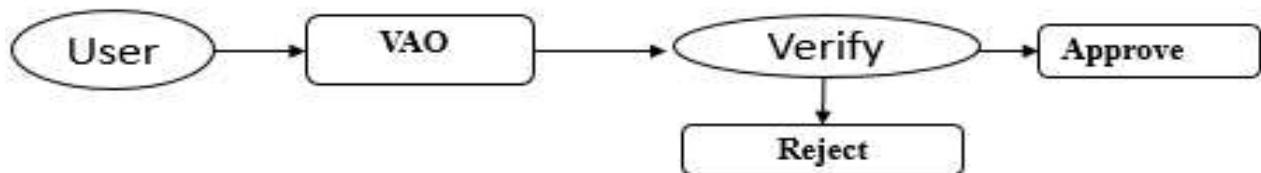
Fig 3.3.3e Activity diagram for NSAP

The activity diagram shows the step by step process for NSAP String Matching. The above is a simplified activity diagram for the National Social Assistance Programme (NSAP), illustrating the steps involved in the application process. This activity diagram provides a visual representation of the sequential steps involved in the application process for the National Social Assistance Programme. Each step leads to the next until the benefits are disbursed to the eligible beneficiary.

DATA FLOW DIAGRAM

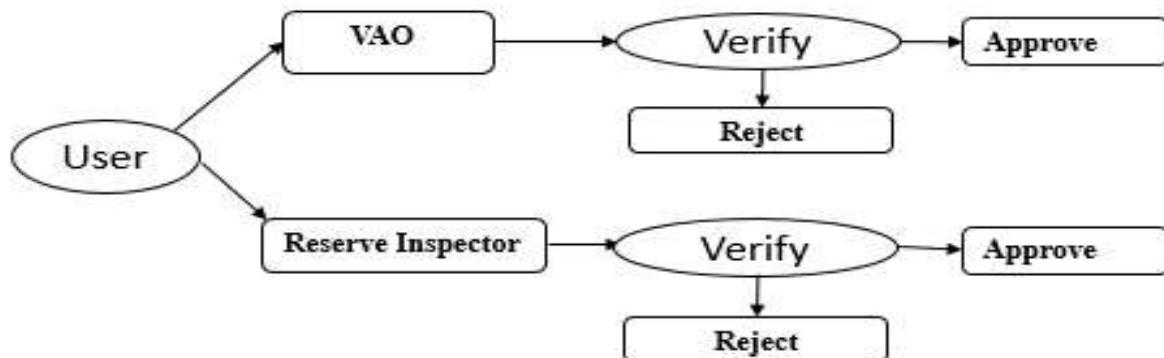
A Data Flow Diagram (DFD) is a graphical representation of the “flow” of data through an information system, modeling its aspects. It is a preliminary step used to create an overview of the system which can later be elaborated DFDs can also be used for visualization of data processing.

Level 0:



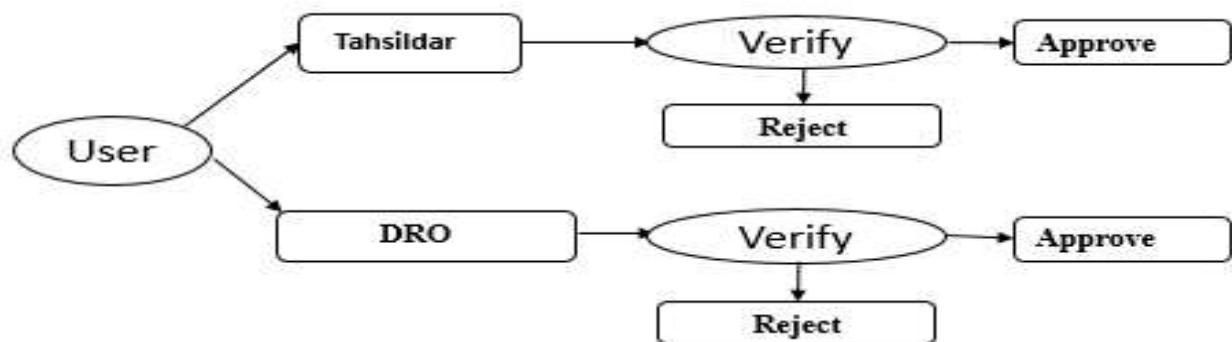
Level 0 DFA diagram for NSAP

Level 1:



Level 1 DFA diagram for NSAP

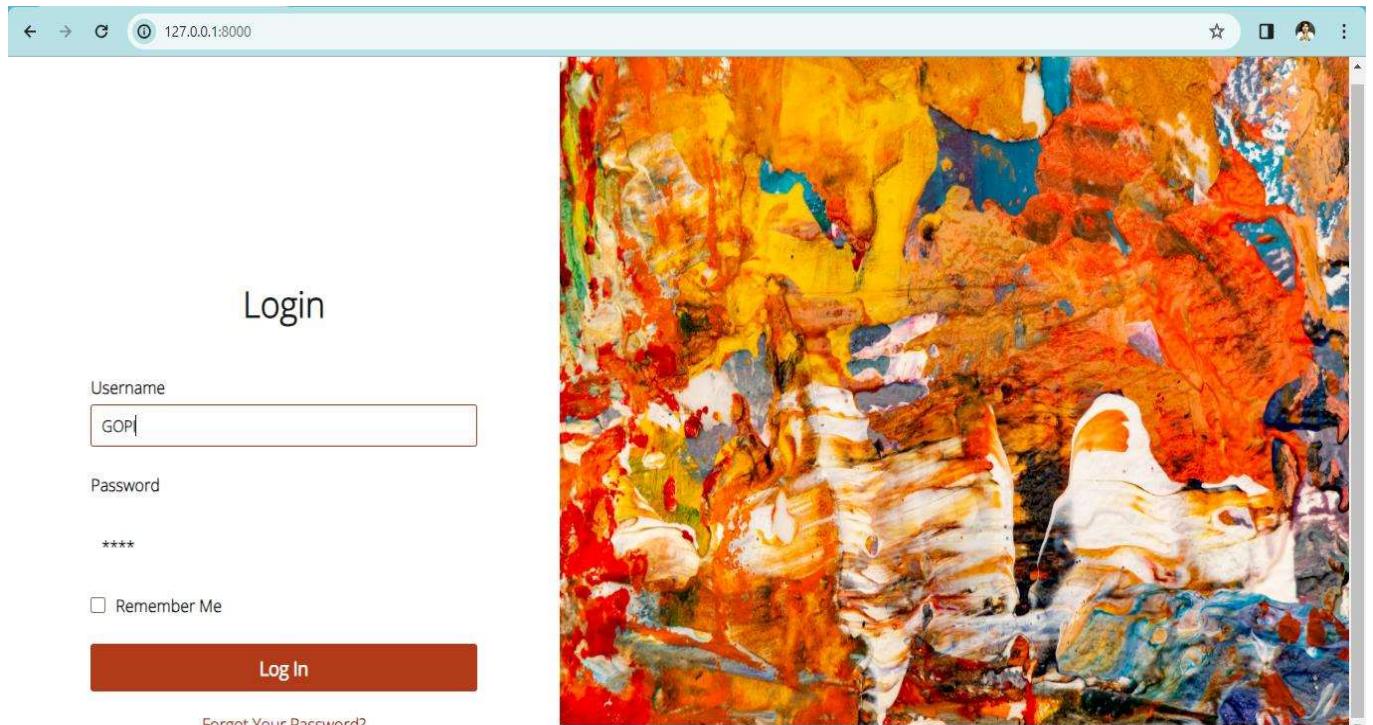
Level 2:



Level 2 DFA diagram for NSAP

CHAPTER 4

4.1 LOGIN MODULE



Fg 4.1 Login Module Page

The figure 4.1 tells about the concept of the login page of national social assistance programme. The above Dashboard is displayed to the user if their username and password are entered correctly. The user remains on the same page and sees an error message if they enter the incorrect username and password. By selecting the "forget your password" option, users can reset their password and have it verified against our database. After successfully logged in ,if the logged person is the regional head the details will be shown and explained as given in the fig 4.2 . if the logged person is the village administrative officer the details will be shown and explained as given in the fig 4.3 . ,if the logged person is the district head the details will be shown and explained as given in the fig 4.4 . If the user enters the wrong username or password it will show in the pop-up invalid username or invalid password and the details will be recorded in the database that the user id has been tried and the technical team will check with the database and make the conformation that the user has been wrongly entered or the unknown person tries to open the website. If the user enters wrongly they will leave or the technical team will take the action

4.2 ELIGIBILITY CHECKING MODULE

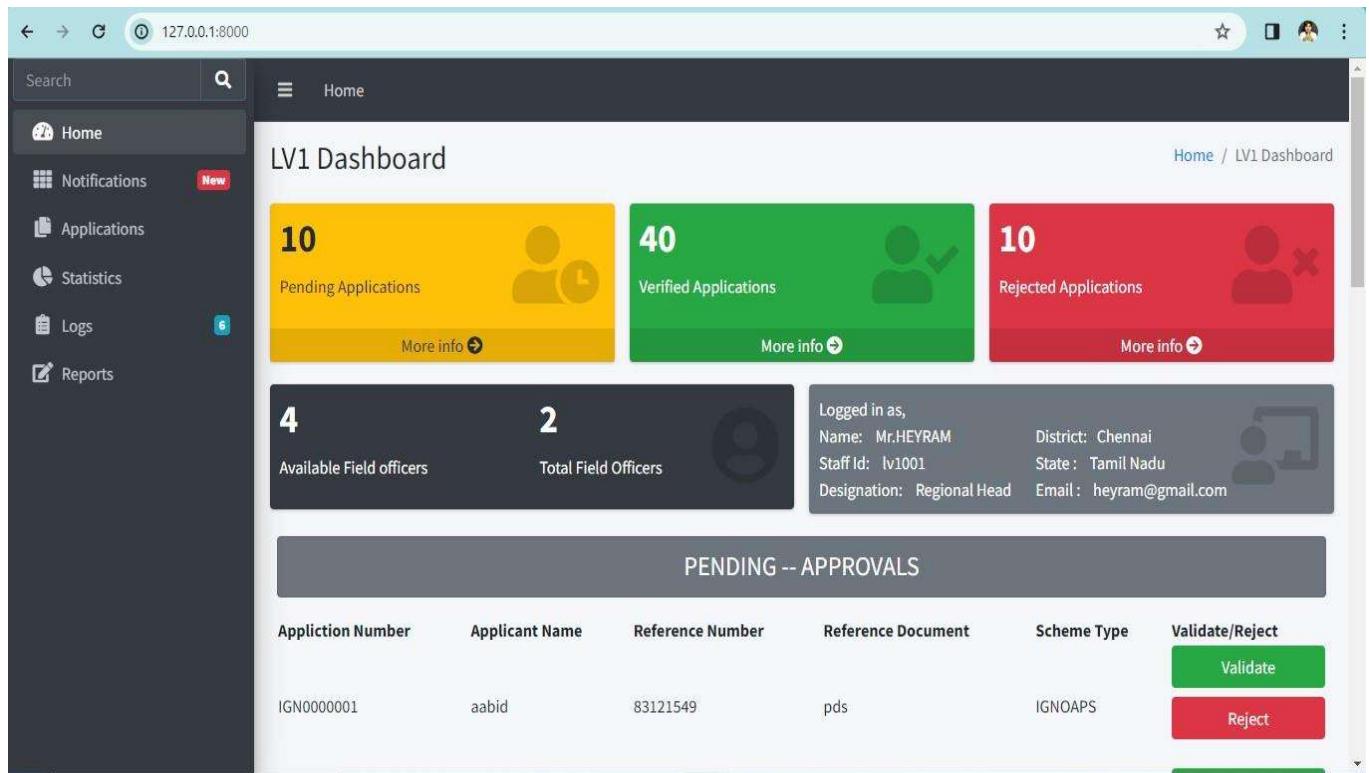


Fig 4.2 Eligibility Checking ModulePage

The figure 4.2 tells about the concept of the eligibility checking module page of national social assistance programme. At level 1, those who have filed their own forms for the NSAP scheme, or who have been identified as eligible by the panchayat president or someone else, will send their information to the village administrative officer. The village administrative officer will submit the person's details to the level 1 dashboard after the VAO verifies their information in accordance with the NSAP scheme's criteria. The reserve inspector would review the individual's Aadhaar and bank details that were uploaded to the level 1 dashboard by the village administration office. After confirming the person's details based on the NSAP criteria, if they meet the NSAP requirements, the reserve inspector will authorize them in the level 2 dashboard. Now from the above image we can see that there are pending applications , verified applications and rejected application, It also displayed the user's details and it also shows the available field officers as well as total field officers and there is also a pending approvals which have to be accept or reject by the regional head according to the people's detail the regional head will check with national social assistance programme scheme criteria.

4.3 VERIFICATION MODULE

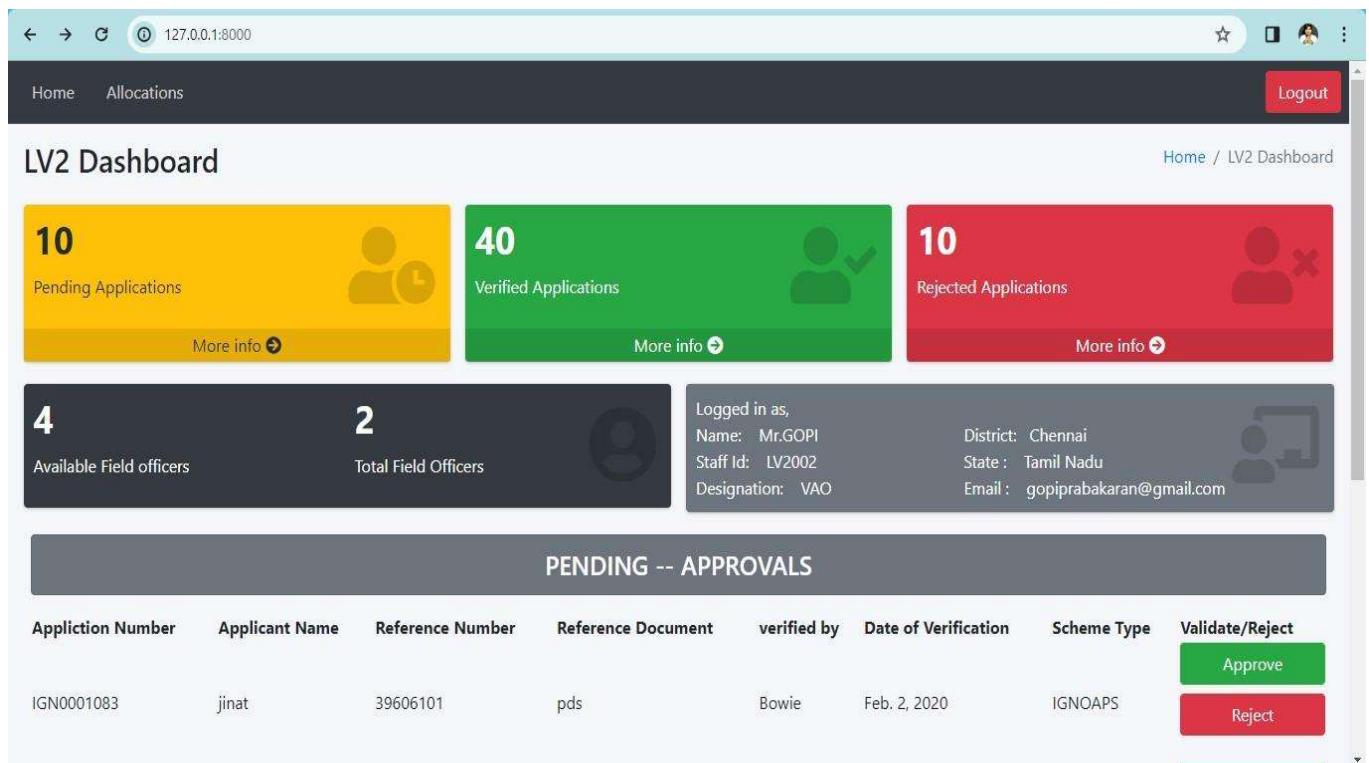


Fig 4.3 Verification Module Page

The figure 4.3 tells about the concept of the verification module page of national social assistance programme. At level 2 the reserve inspector will check the entire documents of the person uploaded by the village administrative officer which is uploaded in the level 2 dashboard. After verifying the person's documents based on the NSAP criteria if the person's detail comes under the NSAP criteria the reserve inspector will approve the person's detail in level 3 dashboard. If the person's detail does not come under the NSAP criteria the reserve inspector will reject the person's detail in level 2 dashboard itself. Now from the above image we can see that there are pending applications, verified applications and rejected application and it displayed the user's details and it also shows the available field officers as well as total field officers and there is also a pending approvals which have to be accept or reject by the village administrative officer according to the regional head given detail the village administrative officer will check with national social assistance programme scheme criteria. The process will be done by the reserve inspector under the guidance of the village administrative officer. After the details given by the reserve inspector the village administrative officer will decide to accept or reject the approval and forward to the district head.

4.4 APPROVAL/REJECT MODULE

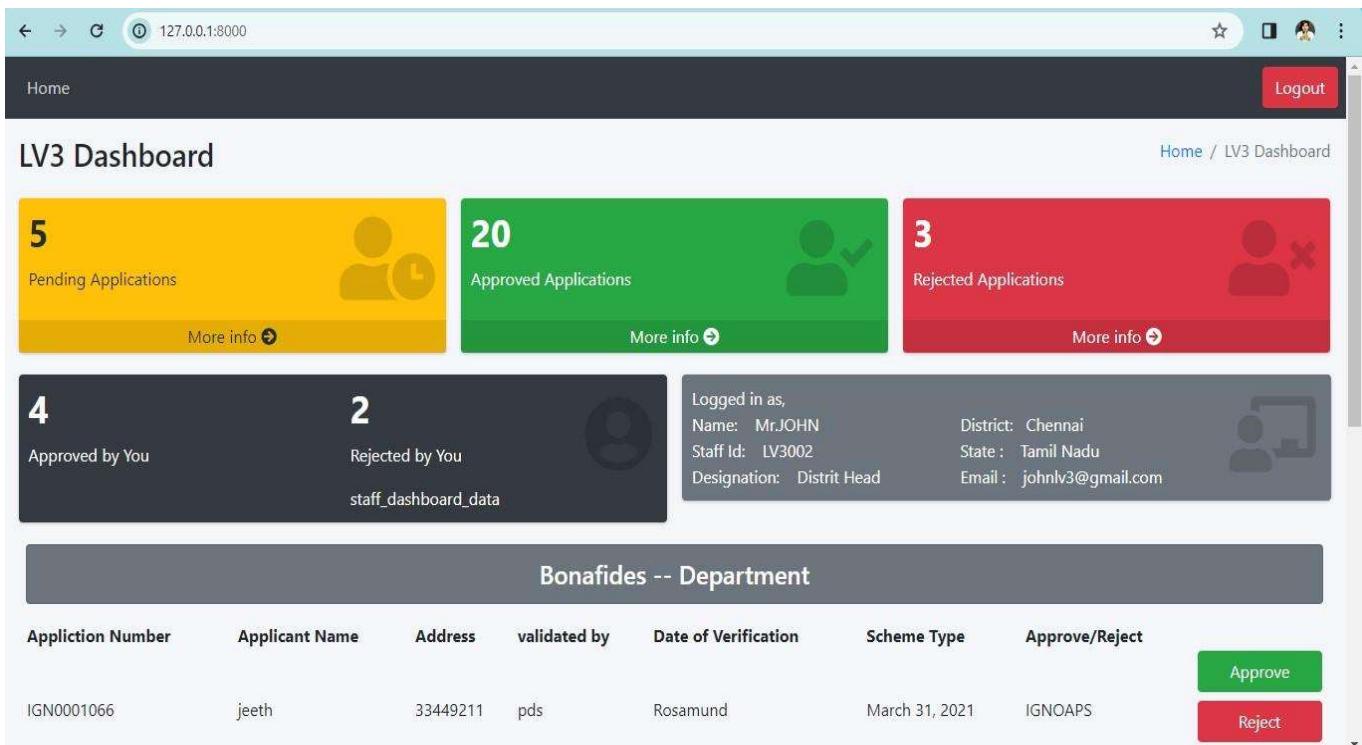


Fig 4.4 Approval / Reject Module Page

The figure 4.4 tells about the concept of the approval / reject module page of national social assistance programme. At level 3 the tahsildar will receive the persons detail sended by the reserve inspector which is uploaded in the level 3 dashboard. The tahsildar will send the person's detail to the corresponding bank in charges to check the person's account details if the details come under the criteria of the NSAP scheme the tahsildar will forward the person's application to the district revenue officer. If the details does not comes under the criteria of the NSAP scheme the tahsildar will reject the person's application. Now the district revenue officer will send the person's detail to the aadhar organization to cross check the person whether he/she have any other account, land ,etc. If the details come under the criteria of the NSAP scheme the DRO will forward the person's application to the district collector. If the details does not comes under the criteria of the NSAP scheme the DRO will reject the person's application. At last based on the Tahsildar and DRO's approval the District Collector will approve the person's application to the NSAP scheme and the eligible person will get the NSAP scheme benefits. Now the above image tells the detail about how many approved by you as well as how many approvals are rejected by you

CHAPTER 5

5.1 TESTING

TEST CASE ID	TESTCASE/ ACTION TO BE PERFORMED	EXPECTED RESULT	ACTUAL RESULT	PASS/ FAIL
1.	Selecting “SIGN IN” button	Display signin page	Display sign in page	Pass
2.	Selecting “ACCEPT” button in level 1	Display alert box	Alert box is displayed	Pass
3.	Select “REJECT” Button in level 1	Display a lert box	Alert box is displayed	Pass
4.	Selecting “ACCEPT” button in level 2	Display alert box	Alert box is displayed	Pass
5.	Selecting “REJECT” Button in level 2	Display alert box	Alert box is displayed	Pass
6.	Selecting “ACCEPT” button in level 3	Display alert box	Alert box is displayed	Pass
7.	Selecting “REJECT” Button in level 3	Display alert box	Alert box is displayed	Pass

Tabel 5.1 Test cases and Report Table for NSAP

5.2 RESULT

Assessing the results of the National Social Assistance Programme (NSAP) involves examining various aspects of its performance and impact on the targeted beneficiaries. Here are some key results and outcomes associated with NSAP.

Increased financial security: NSAP has provided a source of regular income to millions of elderly individuals, widows, and persons with disabilities who were living below the poverty line. This has contributed to their financial security and helped them meet their basic needs.

Poverty alleviation: By providing financial assistance to vulnerable sections of society, NSAP has contributed to poverty alleviation efforts, helping improve the living standards of beneficiaries and their families.

Enhanced social inclusion: NSAP has played a crucial role in promoting social inclusion by ensuring that marginalized groups, such as the elderly, widows, and persons with disabilities, have access to financial support and social security.

Improved health outcomes: The financial assistance provided under NSAP has enabled beneficiaries to access healthcare services and essential medications, leading to improved health outcomes and well-being among the targeted population.

Empowerment of women: NSAP has particularly benefited women, including widows and elderly women, by providing them with financial independence and security, thereby empowering them to make decisions about their lives and well-being.

Reduction in vulnerability: By providing a safety net to vulnerable sections of society, NSAP has helped reduce their vulnerability to economic shocks, natural disasters, and other emergencies.

Promotion of financial inclusion: NSAP has facilitated financial inclusion by encouraging beneficiaries to open bank accounts and access other financial services, thereby promoting their economic empowerment and resilience.

Recognition of rights: NSAP has helped raise awareness about the rights of vulnerable groups and the importance of social security, contributing to efforts to protect and promote their rights within society.

5.3 DISCUSSION

Discussing the National Social Assistance Programme (NSAP) involves examining its objectives, effectiveness, challenges, and potential for improvement. Here are some points to consider in a discussion about NSAP.

Objectives: NSAP aims to provide financial assistance and social security to vulnerable sections of society, including the elderly, widows, and persons with disabilities, who are living below the poverty line. It seeks to ensure a minimum standard of living and promote social inclusion among marginalized groups.

Effectiveness: NSAP has been successful in providing a safety net for millions of beneficiaries, offering them regular financial assistance to meet their basic needs. It has contributed to poverty alleviation efforts, improved health outcomes, and empowered women by providing them with financial independence.

Coverage and Reach: Despite its achievements, NSAP faces challenges related to coverage gaps and reaching all eligible beneficiaries, particularly in remote and marginalized areas. Efforts are needed to enhance outreach and ensure that all deserving individuals can access the benefits of the program.

Administrative Efficiency: Streamlining administrative processes and improving the efficiency of implementation is crucial for maximizing the impact of NSAP. This includes ensuring timely disbursal of payments, minimizing bureaucratic hurdles, and enhancing transparency and accountability in program management.

Financial Inclusion: Promoting financial inclusion among beneficiaries by facilitating access to banking services and promoting financial literacy can enhance their economic empowerment and resilience.

Sustainability: Ensuring the long-term sustainability of NSAP requires adequate funding, strategic planning, and regular monitoring and evaluation to assess its impact and effectiveness.

Partnerships and Collaboration: Collaborating with civil society organizations, community groups, and other stakeholders can strengthen the implementation of NSAP and improve its reach and impact.

CHAPTER 6

CONCLUSION AND FUTURE WORK

CONCLUSION

In conclusion, the National Social Assistance Programme (NSAP) in India stands as a vital pillar of support for the country's vulnerable populations, including the elderly, widows, and persons with disabilities. Through its various schemes, NSAP has made significant strides in alleviating poverty, promoting social inclusion, and enhancing the well-being of millions of beneficiaries across the nation. NSAP's impact is evident in the improved financial security and access to essential services experienced by its beneficiaries. By providing regular financial assistance, NSAP has empowered individuals to meet their basic needs, access healthcare, and live with dignity. Moreover, the program has contributed to gender empowerment by supporting women, particularly widows, in achieving financial independence. However, challenges remain, including ensuring comprehensive coverage, enhancing administrative efficiency, and ensuring sustainability. Addressing these challenges requires continued commitment from policymakers, efficient utilization of resources, and collaboration with stakeholders at all levels. Despite these challenges, NSAP remains a beacon of hope for India's most vulnerable populations. By building on its successes, addressing its shortcomings, and adapting to evolving socio-economic realities, NSAP can continue to make a meaningful difference in the lives of those who need it most, ultimately contributing to a more inclusive and equitable society.

FUTURE ENHANCEMENTS

The future of the National Social Assistance Programme (NSAP) holds opportunities for expansion, innovation, and refinement to better serve the evolving needs of vulnerable populations. Here are some potential areas of future work for NSAP:

Enhanced Coverage and Outreach: Expand NSAP's coverage to include more vulnerable groups, such as homeless individuals, transgender persons, and victims of trafficking. Increase outreach efforts to identify and enroll eligible beneficiaries, especially in remote and underserved areas.

Improved Targeting Mechanisms: Implement advanced data analytics and targeting mechanisms to identify and prioritize the most vulnerable individuals and households for assistance. Utilize demographic data, socio-economic indicators, and geographic information systems (GIS) to improve targeting accuracy.

Digital Transformation: Embrace digital technologies to streamline program administration, enhance service delivery, and improve beneficiary experiences. Develop user-friendly mobile applications, online portals, and digital payment systems to facilitate access to benefits and reduce administrative burdens.

Healthcare Integration: Strengthen integration between NSAP and healthcare systems to address the healthcare needs of beneficiaries more effectively. Collaborate with healthcare providers to offer preventive care, health screenings, and essential healthcare services to vulnerable populations.

Social Protection Innovations: Explore innovative approaches to social protection, such as conditional cash transfers, livelihood support programs, and insurance schemes, to complement existing NSAP initiatives. Pilot new interventions and evaluate their effectiveness in addressing the multidimensional needs of beneficiaries.

Research and Evaluation: Invest in research and evaluation efforts to assess the impact, effectiveness, and efficiency of NSAP interventions. Conduct rigorous impact evaluations, performance assessments, and beneficiary surveys to inform evidence-based decision-making and program improvement.

Policy Advocacy and Partnerships: Advocate for policy reforms and resource mobilization to strengthen social protection systems and expand NSAP's reach and impact. Forge strategic partnerships with government agencies, international organizations, donors, and other stakeholders to leverage expertise, resources, and support for NSAP initiatives.

By prioritizing these areas of future work, NSAP can continue to evolve as a dynamic and responsive social assistance program that effectively addresses the needs of vulnerable populations and promotes inclusive development and social justice.

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APPENDICES

A.1 SDG GOALS

The National Social Assistance Programme (NSAP) in India contributes to several Sustainable Development Goals (SDGs) outlined by the United Nations. Here are some of the SDGs that NSAP aligns with:

GOAL 1: No Poverty: NSAP aims to alleviate poverty by providing financial assistance to vulnerable populations such as the elderly, widows, and persons with disabilities who are living below the poverty line.

GOAL 2: Zero Hunger: While NSAP primarily focuses on providing financial assistance, it indirectly contributes to SDG 2 by helping beneficiaries food and basic necessities through improved financial security.

GOAL 3: Good Health and Well-being: NSAP supports SDG 3 by improving access to healthcare services for beneficiaries, thereby contributing to better health outcomes and overall well-being.

GOAL 4: Gender Equality: NSAP promotes gender equality by providing financial assistance to vulnerable women, including widows and elderly women, thereby empowering them and reducing their economic dependency.

A.2 SOURCE CODE

A.2.1 Front-end coding base.html

INDEX.HTML

```
<html lang="en">

<head>

<style>

#back {
    height:100%;
    width:100%;
    background-size: cover;
}

</style>

</head>

{%- load static %}

<head>

<meta charset="UTF-8">

<meta http-equiv="X-UA-Compatible" content="IE=edge">

<meta name="viewport" content="width=device-width, initial-scale=1.0">

<!-- Custom CSS -->

<link rel="stylesheet" href="{% static 'dist/css/style.css' %}">
```

```
<title>Login</title>

</head>

<body>

{%- if m%}

<script>

window.onload=function (){

    alert("Invalid Login!");

}

</script>

{%- endif %}

<aside>

<!-- <div class="aside-logoBox">

</div> -->

<div class="aside-lblTitleBox">

    <h1 class="aside-lblTitle">Login</h1>

</div>

<div class="aside-formBox">

    <form action="" class="aside-form" method="post">

        <div class="asideForm-fieldBox">

            <span class="formField-lblName">Username</span>


```

```
<input type="text" name="txtEmail" id="txtEmail" class="formField-txtName">

</div>

<div class="asideForm-fieldBox">

    <span class="formField-lblName">Password</span><br>

    <input type="text" name="txtPassword" id="txtPassword" class="formField-txtName">

</div>

<div class="asideForm-fieldBox">

    <input type="checkbox" name="" id="chRememberMe" class="formField-
chRememberMe">

    <span class="formField-lblName">Remember Me</span>

</div>

{%- csrf_token %}

<input type="submit" value="Log In" class="asideForm-btnLogin">

<div class="asideForm-btnForgetBox">

    <a href="" class="asideForm-btnForget">Forgot Your Password?</a>

</div>

</form>

</div>

</aside>

<main>

    
```

```
</main>
```

```
</body>
```

```
</html>
```

Level1.HTML

```
<!DOCTYPE html>
```

```
<html lang="en">
```

```
{% load static %}
```

```
<head>
```

```
    <meta charset="utf-8">
```

```
    <meta name="viewport" content="width=device-width, initial-scale=1">
```

```
    <title>perfect ui</title>
```

```
<!-- Google Font: Source Sans Pro -->
```

```
    <link rel="stylesheet"
```

```
        href="https://fonts.googleapis.com/css?family=Source+Sans+Pro:300,400,400i,700&display=fallback">
```

```
<!-- Font Awesome -->
```

```
    <link rel="stylesheet" href="{% static 'plugins/fontawesome-free/css/all.min.css' %}">
```

```
<!-- Ionicons -->
```

```
    <link rel="stylesheet" href="https://code.ionicframework.com/ionicons/2.0.1/css/ionicons.min.css'"%>
```

```
<!-- Tempusdominus Bootstrap 4 -->
```

```
    <link rel="stylesheet" href="{% static 'plugins/tempusdominus-bootstrap-4/css/tempusdominus-bootstrap-4.min.css' %}">
```

```
<!-- iCheck -->
```

```
    <link rel="stylesheet" href="{% static 'plugins/icomoon/icomoon.min.css' %}">
```

```
<!-- JQVMap -->
```

```
    <link rel="stylesheet" href="{% static 'plugins/jqvmap/jqvmap.min.css' %}">
```

```
<!-- Theme style -->
```

```
    <link rel="stylesheet" href="{% static 'dist/css/adminlte.min.css' %}">
```

```
<!-- overlayScrollbars -->
```

```

<link rel="stylesheet" href="% static 'plugins/overlayScrollbars/css/OverlayScrollbars.min.css' %">
<!-- Daterange picker -->
<link rel="stylesheet" href="% static 'plugins/daterangepicker/daterangepicker.css' %">
<!-- summernote -->
<link rel="stylesheet" href="% static 'plugins/summernote/summernote-bs4.min.css' %">
<!-- Select2 -->
<link rel="stylesheet" href="% static 'plugins/select2/css/select2.min.css' %">
<link rel="stylesheet" href="% static 'plugins/select2-bootstrap4-theme/select2-bootstrap4.min.css' %
%}>
<script src="% static 'dist\js\jquery-3.5.1.js' %}></script>

<script>
$(document).ready(function(){
    var currentRow;
    var appid;
    // code to read selected table row cell data (values).
    $("#table_id").on('click','.btn',function(){
        // get the current row
        currentRow=$(this).closest("tr");
        appid=currentRow.find("td:eq(0)").text(); // get current row 1st TD valu
        name=currentRow.find("td:eq(1)").text();
        scheme=currentRow.find("td:eq(4)").text();
        dtype=currentRow.find("td:eq(3)").text(); // get current row 1st TD valu
        document.getElementById("app").innerHTML=appid;
        document.getElementById("name").innerHTML=name;
        document.getElementById("scheme").innerHTML=scheme;
        document.getElementById("dtype").innerHTML=dtype;
    });
    return fetch('https://localhost:8000/approve', {
        method: 'GET',

```

```

headers: {
  'Accept': 'application/json',
  'Content-Type': 'application/json'
},
body: appid
});

});

function fn(){
  alert("User Updated");
}

</script>

</head>

<body class="hold-transition sidebar-mini layout-fixed">
  <div class="wrapper">
    <!-- Navbar -->
    <nav class="main-header navbar navbar-expand navbar-dark">
      <!-- Left navbar links -->
      <ul class="navbar-nav">
        <li class="nav-item">
          <a class="nav-link" data-widget="pushmenu" href="#" role="button"><i class="fas fa-bars"></i></a>
        </li>
        <li class="nav-item d-none d-sm-inline-block">
          <a href="#" class="nav-link">Home</a>
        </li>
      </ul>
    </nav>

```

```

<!-- Right navbar links -->

<!-- /.navbar -->

<!-- Main Sidebar Container -->
<aside class="main-sidebar sidebar-dark-primary elevation-4">
  <!-- Sidebar -->
  <div class="sidebar">
    <!-- SidebarSearch Form -->
    <div class="form-inline">
      <div class="input-group" data-widget="sidebar-search">
        <input class="form-control form-control-sidebar" type="search" placeholder="Search" aria-label="Search">
        <div class="input-group-append">
          <button class="btn btn-sidebar">
            <i class="fas fa-search fa-fw"></i>
          </button>
        </div>
      </div>
    </div>
  </div>

  <!-- Sidebar Menu -->
  <nav class="mt-2">
    <ul class="nav nav-pills nav-sidebar flex-column" data-widget="treeview" role="menu" data-accordion="false">
      <!-- Add icons to the links using the .nav-icon class
           with font-awesome or any other icon font library -->
      <li class="nav-item menu-open">
        <a href="#" class="nav-link">
          <i class="nav-icon fas fa-tachometer-alt"></i>
          <p>
            Home
          </p>
        </a>
      </li>
    </ul>
  </nav>
</aside>

```

```
</a>
</li>
<li class="nav-item">
<a href="#" class="nav-link">
<i class="nav-icon fas fa-th"></i>
<p>
    Notifications
    <span class="right badge badge-danger">New</span>
</p>
</a>
</li>
<li class="nav-item">
<a href="dashboard1.html" class="nav-link">
<i class="nav-icon fas fa-copy"></i>
<p>
    Applications
</p>
</a>
</li>
<li class="nav-item">
<a href="#" class="nav-link">
<i class="nav-icon fas fa-chart-pie"></i>
<p>
    Statistics
</p>
</a>
</li>
<li class="nav-item">
<a href="#" class="nav-link">
<i class="nav-icon fas fa-clipboard-list"></i>
<p>
    Logs
    <span class="badge badge-info right">6</span>
</p>
```

```

        </a>
    </li>
<li class="nav-item">
    <a href="#" class="nav-link">
        <i class="nav-icon fas fa-edit"></i>
        <p>
            Reports
        </p>
    </a>
</li>
</ul>
</nav>
<!-- /.sidebar-menu -->
</div>
<!-- /.sidebar -->
</aside>

<!-- Content Wrapper. Contains page content -->
<div class="content-wrapper">
    <!-- Content Header (Page header) -->
    <div class="content-header">
        <div class="container-fluid">
            <div class="row mb-2">
                <div class="col-sm-6">
                    <h1 class="m-0">LV1 Dashboard</h1>
                </div><!-- /.col -->
                <div class="col-sm-6">
                    <ol class="breadcrumb float-sm-right">
                        <li class="breadcrumb-item"><a id="breadcrumb-home" href="index.html">Home</a></li>
                        <li class="breadcrumb-item active">LV1 Dashboard</li>
                    </ol>
                </div><!-- /.col -->
            </div><!-- /.row -->
        </div><!-- /.container-fluid -->

```

```

</div>

<!-- /.content-header -->

<!-- Main content -->
<section class="content">
<div class="container-fluid">
<!-- Small boxes (Stat box) -->
<div class="row">

<div class="col-lg-4 col-6">
<div class="small-box bg-warning">
<div class="inner">
<h3>
<div>10</div>
</h3>
<p>Pending Applications</p>
</div>
<div class="icon">
<i class="fas fa-user-clock"></i>
</div>
<a type='submit' class="small-box-footer">More info <i class="fas fa-arrow-circle-right"></i></a>
</div>
</div>
<div class="col-lg-4 col-6">
<div class="small-box bg-success">
<div class="inner">
<h3>
<div>40</div>
</h3>
<p>Verified Applications</p>
</div>
<div class="icon">
<i class="fas fa-user-check"></i>

```

```

</div>
<a type='submit' class="small-box-footer">More info <i class="fas fa-arrow-circle-right"></i></a>
</div>
</div>
<div class="col-lg-4 col-6">
<div class="small-box bg-danger">
<div class="inner">
<h3>
<div>10</div>
</h3>
<p>Rejected Applications</p>
</div>
<div class="icon">
<i class="fas fa-user-times"></i>
</div>
<a type='submit' class="small-box-footer">More info <i class="fas fa-arrow-circle-right"></i></a>
</div>
</div>

<div class="col-lg-6 col-6">
<div class="small-box bg-dark">
<div class="inner">
<div class="row">
<div class="col-6">
<h3><span>4</span></h3>
<p> Available Field officers</p>
</div>
<div class="col-6">
<h3><span>2</span></h3>
<p> Total Field Officers</p>
</div>
</div>

```

```

</div>
<div class="icon">
  <i class="fas fa-user-circle"></i>
</div>
<!-- <a href="#" class="small-box-footer">More info <i class="fas fa-arrow-circle-right"></i></a> -->
</div>
</div>
<div class="col-lg-6 col">
<!-- small box -->
<div class="small-box bg-secondary">
  <div class="inner">
    <div class="row">
      <div class="col-5">
        Logged in as,<br>
        Name: &nbsp;&nbsp; <span>Mr.John</span><br>
        Staff Id: &nbsp;&nbsp; <span>LV2002</span><br>
        Designation: &nbsp;&nbsp; <span>Regional Head</span><br>
      </div>
      <div class="col-7">
        <br>
        District: &nbsp;&nbsp;<span>Chennai</span><br>
        State : &nbsp;&nbsp; <span>Tamil Nadu</span><br>
        Email : &nbsp;&nbsp; <span>johnlv3@gmail.com</span>
      </div>
    </div>
  </div>
</div>
<div class="icon">
  <i class="fas fa-chalkboard-teacher"></i>
</div>
<!-- <a href="#" class="small-box-footer">More info <i class="fas fa-arrow-circle-right"></i></a> -->
</div>
</div>

```

```

</div>
<div class="col-sm-12">
<h4 class="text-center alert alert-secondary"><span id="type"></span> PENDING -- <span
    id="department1"></span> APPROVALS</h3>
</h4>
<div class="wrapper-editor">
<span>
    <table id="table_id" class="hover display nowrap" style="width:100%">
        <thead>
            <tr>
                <th>Application Number</th>
                <th>Applicant Name</th>
                <th>Reference Number</th>
                <th>Reference Document</th>
                <th>Scheme Type</th>
                <th>Validate/Reject</th>
            </tr>
        </thead>
        <tbody>
            { % for i in dt %}
            <tr >
                <td id="app_id">{{i.Application_ID}}</td>
                <td>{{i.name}}</td>
                <td>{{i.rno}}</td>
                <td>{{i.rdoc}}</td>

                <td>{{i.scheme}}</td>
                <td>
                    <button class="btn btn-block btn-success" data-toggle="modal"
                        id="btn" data-target="#modal-xl" > Validate</button>
                    <button class="btn btn-block btn-danger">Reject</button>
                    <br>
                </td>
            
```

```

</tr>
{%
    endfor
}
</tbody>
</span>
<!-- <table id="example" class="hover display nowrap" style="width:100%"> -->
</div>
</div>

</div><!-- /.container-fluid -->
<div class="modal fade" id="modal-xl">
<div class="modal-dialog modal-xl">
<div class="modal-content">
<div class="modal-header">
<h4 class="modal-title">Form</h4>
<button type="button" class="close" data-dismiss="modal" aria-label="Close">
<span aria-hidden="true">&times;</span>
</button>
<!-- <div class="ball-wrapper">
<div class="blue ball"></div>
<div class="red ball"></div>
<div class="yellow ball"></div>
<div class="green ball"></div>
</div> -->
</div>
<div class="modal-body">
<form class="form-horizontal">
<div class="card-body">
<div class="form-group row">
<label for="applicantNo" id="apn" class="col-sm-3 col-form-label">Applicant Number
:</label>
<div class="col-sm-9">
<label id="app"></label>
</div>
</div>

```

```

<hr />

<div class="form-group row">
    <label for="applicantName" class="col-sm-1 col-form-label">Name :</label>
    <div class="col-sm-4">
        <label id="name"></label>
    </div>
    <div class="col-sm-1"></div>
    <label for="applicantGender" class="col-sm-1 col-form-label">Gender :</label>
    <div class="col-sm-5">
        <!-- select -->
        <div class="form-group">
            <select class="form-control">
                <option>Male</option>
                <option>Female</option>
                <option>Prefer not to disclose</option>
            </select>
        </div>
    </div>
</div>

<div class="form-group row">
    <label for="applicantScheme" class="col-sm-1 col-form-label">Scheme :</label>
    <div class="col-sm-5">
        <!-- select -->
        <div class="form-group">
            <label id="scheme"></label>
        </div>
    </div>
    <div class="col-sm-1"></div>
    <label for="applicantDob" class="col-sm-2 col-form-label">Date of Birth :</label>
    <div class="col-sm-3">
        <div class="form-group">
            <div class="input-group date" id="reservationdate" data-target-input="nearest">
                <input type="text" class="form-control datetimepicker-input"
                    data-target="#reservationdate" />

```

```

<div class="input-group-append" data-target="#reservationdate" data-
toggle="datetimepicker">
    <div class="input-group-text"><i class="fa fa-calendar"></i></div>
</div>
</div>
</div>
</div>
</div>
</div>
<div class="form-group row">
    <label for="documentType" class="col-sm-2 col-form-label">Document Type :</label>
    <div class="col-sm-4">
        <!-- select -->
        <div class="form-group">
            <label id="dtype"></label>
        </div>
    </div>
    <div class="col-sm-1"></div>
    <label for="applicantDob" class="col-sm-2 col-form-label">Document :</label>
    <div class="col-sm-3">
        <div class="form-group">
            <div class="input-group">
                <div class="custom-file">
                    <input type="file" class="custom-file-input" id="inputFile">
                    <label class="custom-file-label" for="inputFile">Choose file</label>
                </div>
            <div class="input-group-append">
                <span class="input-group-text">Upload</span>
            </div>
        </div>
    </div>
    </div>
</div>
<!-- /.card-body -->

```

```

    </form>
</div>
<div class="modal-footer justify-content-between">
    <button type="button" class="btn btn-default" data-dismiss="modal">Close</button>
    <button type="button" class="btn btn-primary" onClick="fn()">submit</button>
</div>
</div>
<!-- /.modal-content -->
</div>
<!-- /.modal-dialog -->
</div>
<!-- /.modal -->
</section>
<!-- /.content -->
</div>

<!-- Control Sidebar -->
<aside class="control-sidebar control-sidebar-dark">
    <!-- Control sidebar content goes here -->
</aside>
<!-- /.control-sidebar -->
</div>
<!-- ./wrapper -->

<!-- jQuery -->
<script src="{% static 'plugins/jquery/jquery.min.js' %}"></script>
<!-- jQuery UI 1.11.4 -->
<script src="{% static 'plugins/jquery-ui/jquery-ui.min.js' %}"></script>
<!-- Resolve conflict in jQuery UI tooltip with Bootstrap tooltip -->
<script>
$.widget.bridge('uibutton', $.ui.button)

</script>

```

```

<!-- Select2 -->
<script src="<% static 'plugins/select2/js/select2.full.min.js' %>"></script>
<!-- Bootstrap 4 -->
<script src="<% static 'plugins/bootstrap/js/bootstrap.bundle.min.js' %>"></script>
<!-- ChartJS -->
<script src="<% static 'plugins/chart.js/Chart.min.js' %>"></script>
<!-- Sparkline -->
<script src="<% static 'plugins/sparklines/sparkline.js' %>"></script>
<!-- JQVMap -->
<script src="<% static 'plugins/jqvmap/jquery.vmap.min.js' %>"></script>
<script src="<% static 'plugins/jqvmap/maps/jquery.vmap.usa.js' %>"></script>
<!-- jQuery Knob Chart -->
<script src="<% static 'plugins/jquery-knob/jquery.knob.min.js' %>"></script>
<!-- daterangepicker -->
<script src="<% static 'plugins/moment/moment.min.js' %>"></script>
<script src="<% static 'plugins/daterangepicker/daterangepicker.js' %>"></script>
<!-- Tempusdominus Bootstrap 4 -->
<script src="<% static 'plugins/tempusdominus-bootstrap-4/js/tempusdominus-bootstrap-4.min.js' %>"></script>
<!-- Summernote -->
<script src="<% static 'plugins/summernote/summernote-bs4.min.js' %>"></script>
<!-- overlayScrollbars -->
<script src="<% static 'plugins/overlayScrollbars/js/jquery.overlayScrollbars.min.js' %>"></script>
<!-- AdminLTE App -->
<script src="<% static 'dist/js/adminlte.js' %>"></script>
<!-- AdminLTE for demo purposes -->
<script src="<% static 'dist/js/demo.js' %>"></script>
<!-- AdminLTE dashboard demo (This is only for demo purposes) -->
<script src="<% static 'dist/js/pages/dashboard.js'"></script>
<script src="https://code.jquery.com/jquery-3.5.1.js"></script>
<script src="https://cdn.datatables.net/1.11.3/js/jquery.dataTables.min.js"></script>
<script src="https://cdn.datatables.net/buttons/2.0.1/js/dataTables.buttons.min.js"></script>
<script src="https://cdnjs.cloudflare.com/ajax/libs/jszip/3.1.3/jszip.min.js"></script>

```

```

<script src="https://cdnjs.cloudflare.com/ajax/libs/pdfmake/0.1.53/pdfmake.min.js"></script>
<script src="https://cdnjs.cloudflare.com/ajax/libs/pdfmake/0.1.53/vfs_fonts.js"></script>
<script src="https://cdn.datatables.net/buttons/2.0.1/js/buttons.html5.min.js"></script>
<script src="https://cdn.datatables.net/buttons/2.0.1/js/buttons.print.min.js"></script>

<script>
$(function () {
    //Initialize Select2 Elements
    $('.select2').select2()

    //Initialize Select2 Elements
    $('.select2bs4').select2({
        theme: 'bootstrap4'
    })
})
</script>
<style>
.ball-wrapper {
    display: flex;
    justify-content: center;
    align-items: center;
    height: 200px
}

.ball {
    width: 22px;
    height: 22px;
    border-radius: 11px;
    margin: 0 10px;
    animation: 2s bounce ease infinite;
}

```

```
.blue {  
background-color: #4285F5;  
}
```

```
.red {  
background-color: #EA4436;  
animation-delay: .25s;  
}
```

```
.yellow {  
background-color: #FBBD06;  
animation-delay: .5s;  
}
```

```
.green {  
background-color: #34A952;  
animation-delay: .75s;  
}
```

```
@keyframes bounce {  
50% {  
transform: translateY(25px);  
}  
}  
</style>
```

```
</body>
```

A.2.2 Back-end coding model.py

```
from django.shortcuts import render,redirect
from django.http import HttpResponseRedirect,JsonResponse
from django.contrib import messages
from django.contrib.auth import authenticate
from django.contrib.auth.models import User,auth
from rest_framework.authentication import TokenAuthentication
from rest_framework.permissions import AllowAny
from rest_framework.exceptions import AuthenticationFailed
from django.shortcuts import render,get_object_or_404
from rest_framework import status
from rest_framework.views import APIView
from rest_framework.response import Response
from .utils import generate_access_token
import jwt
import csv
import pandas as pd
from .models import nsap_vld,lv1,lv2,lv3
# from wsgiref.util import FileWrapper
from django.template.response import TemplateResponse
import json
import joblib as jb

class login(APIView):

    def get(self,request):
        return render(request,"index.html")

    def post(self,request):
        username=request.POST['txtEmail']
        password=request.POST['txtPassword']

        if lv1.objects.filter(username=username).exists():
            dt=nsap_vld.objects.filter(status="pending")
```

```

        return render(request,"lv1.html",{"dt":dt})

    elif lv2.objects.filter(username=username).exists():

        dt=nsap_vld.objects.filter(status="Verified")
        return render(request,"lv2.html",{"dt":dt})

    elif lv3.objects.filter(username=username,password=password).exists():

        dt=nsap_vld.objects.filter(status="Validated")
        return render(request,"lv3.html",{"dt":dt})

    else:
        return render(request,"index.html",{"m":True})

def get_tokens_for_user(self, user):
    """
    This method returns refresh and access token for valid login
    """

    refresh = RefreshToken.for_user(user)
    return {
        'refresh': str(refresh),
        'access': str(refresh.access_token),
    }

class show(APIView):
    authentication_classes = (TokenAuthentication,)
    permission_classes = (AllowAny,)

    def get(self, request):
        "user_token = request.COOKIES.get('access_token')"

        if not user_token:
            raise AuthenticationFailed('Unauthenticated user.')

        payload = jwt.decode(user_token, settings.SECRET_KEY, algorithms=['HS256'])
        msg=payload["Message"]

```

```

#return response(msg)"""
return render(request,"sih.html")

class app(APIView):
    authentication_classes = (TokenAuthentication,)
    permission_classes = (AllowAny,)
    def get(self, request):

        df = pd.read_csv("D:\dataset\census_data.csv")
        df=df[:25]
        json_records = df.reset_index().to_json(orient ='records')
        arr = []
        arr = json.loads(json_records)
        ct= {'d': arr}
        return render(request,"table.html",ct)

class mlcd(APIView):
    #'Marital Status' 'Caste' 'Income'
    def __init__(self):
        self.rp1=jb.load('notebooks\\rp1')
        #self.rp2=jb.load('notebooks\\rp2')
    def get(self,request):
        #self.rp1.drop(columns=['Marital Status ','PWD','Caste ','Asset status','Income ','Pref'],inplace=True)
        r1=self.rp1.head(10)
        print(r1)
        nsap_vld.objects.all().delete()
        for index,row in r1.iterrows():

            fl=nsap_vld(Application_ID=row.Application_ID,name=row.Name,aadhar=row.Aadhar,pno=row.Phone
            _number,gender=row.Gender,address=row.Address,age=row.Age,dob=row.DOB,scheme=row.Scheme)
            fl.save()
        return Response("Done")

```

Name	Aadhar	Phone number	Gender	Address	Age	DOB	Scheme	ID
------	--------	--------------	--------	---------	-----	-----	--------	----

```

class add(APIView):
    def get(self,request):
        dt=pd.read_csv("notebooks\\lv2.csv")
        for index,row in dt.iterrows():

            fl=nsap_vld(Application_ID=row.Application_ID,name=row.Name,aadhar=row.Aadhar,pno=row.Phone
            _number,gender=row.Gender,address=row.Address,age=row.Age,dob=row.DOB,scheme=row.Scheme,r
            no=row.rno,rdoc=row.rdoc,verified_by=row.verified_by,date_of_verification=row.date_of_verification,s
            tatus=row.status)
            fl.save()
        return Response("Done")

```

```
class approve(APIView):
```

```

    def get(self,request):
        id=request.body
        return Response(id)

```

URLS.PY

```

from django.contrib import admin
from django.urls import re_path,include,path
from .views import login,show,app,mlcd,add,approve
from rest_framework_simplejwt.views import TokenObtainPairView,TokenRefreshView

```

```

urlpatterns = [
    path(r'',login.as_view()),
    path(r'show/',show.as_view()),
    path(r'application/',app.as_view()),
    path(r'mlcd/',mlcd.as_view()),
    path(r'add/',add.as_view()),
    path(r'approve/',approve.as_view(),name="approve"),
]

```

MODELS.PY

```
from django.db import models
from django.db import connections

# Create your models here.

class nsap_vld(models.Model):
    Application_ID=models.CharField(primary_key=True,max_length=100)
    name=models.CharField(max_length=100)
    aadhar=models.BigIntegerField(null=True)
    pno=models.BigIntegerField(null=True)
    gender=models.CharField(max_length=10)
    address=models.CharField(max_length=150)
    age=models.IntegerField(null=True)
    dob=models.DateField(null=True)
    scheme=models.CharField(max_length=10)
    rno=models.BigIntegerField()
    rdoc=models.CharField(max_length=150)
    verified_by=models.CharField(max_length=50)
    date_of_verification=models.DateField(null=True)
    status=models.CharField(max_length=100,default="pending")
    class Meta:
        db_table='nsap_vld'

    ""
```

Application_ID	IGN0003806
Name	deepali
Aadhar	701305798832
Phone number	9569313090.0
Gender	male
Marital Status	widow
PWD	1.0
Address	Egmore, Chennai, Tamil Nadu
Caste	2.0
Asset status	No

```

Income           3771.0
Age             74.0
Scheme          IGNOAPS
Pref
"
#lv 1,2,3
# usn pss email name stf_id degn distr state
class lv1(models.Model):
    username=models.CharField(max_length=100)
    password=models.CharField(max_length=100)
    name=models.CharField(max_length=100)
    email=models.CharField(max_length=100)
    staff_id=models.CharField(max_length=100)
    designation=models.CharField(max_length=100)
    district=models.CharField(max_length=100)
    state=models.CharField(max_length=100)
    class Meta:
        db_table='lv1'

class lv2(models.Model):
    username=models.CharField(max_length=100)
    password=models.CharField(max_length=100)
    name=models.CharField(max_length=100)
    email=models.CharField(max_length=100)
    staff_id=models.CharField(max_length=100)
    designation=models.CharField(max_length=100)
    district=models.CharField(max_length=100)
    state=models.CharField(max_length=100)
    class Meta:
        db_table='lv2'

class lv3(models.Model):
    username=models.CharField(max_length=100)
    password=models.CharField(max_length=100)
    name=models.CharField(max_length=100)

```

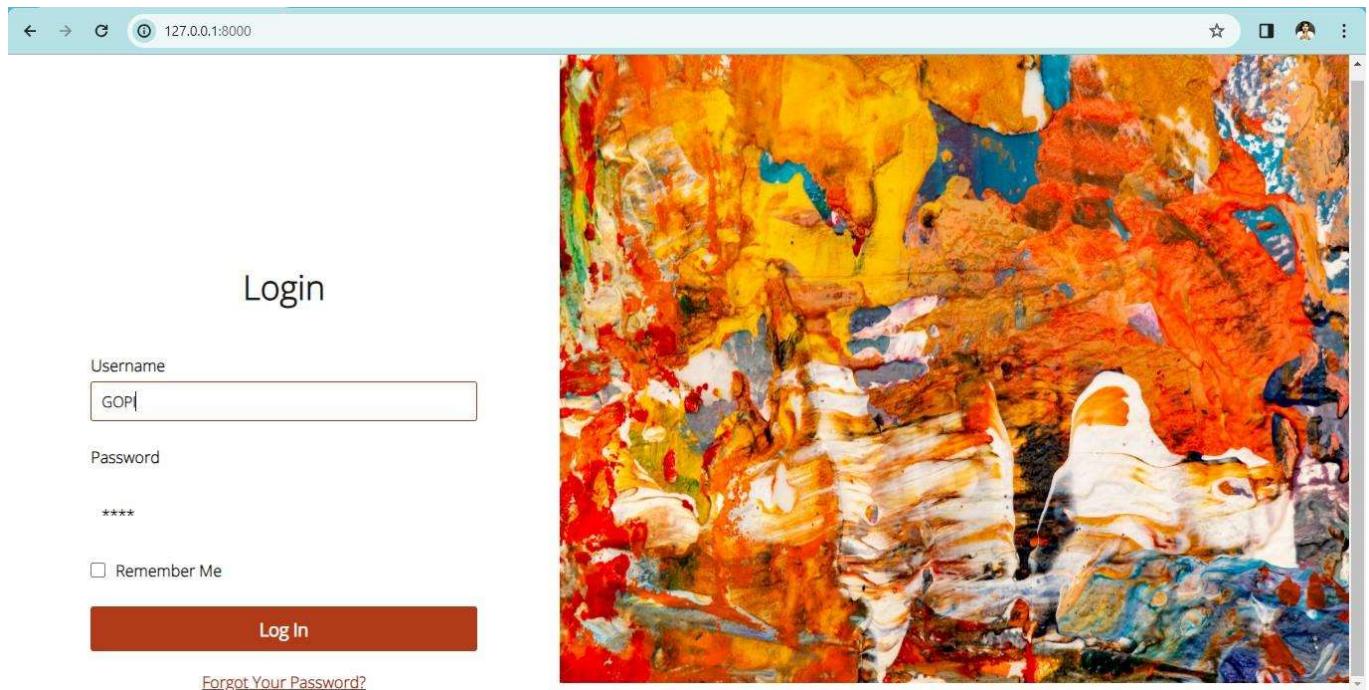
```
email=models.CharField(max_length=100)
staff_id=models.CharField(max_length=100)
designation=models.CharField(max_length=100)
district=models.CharField(max_length=100)
state=models.CharField(max_length=100)
class Meta:
    db_table='lv3'
```

""

```
class staff(models.Model):
    username=models.CharField(max_length=100)
    password=models.CharField(max_length=100)
    name=models.CharField(max_length=100)
    email=models.CharField(max_length=100)
    staff_id=models.CharField(max_length=100)
    designation=models.CharField(max_length=100)
    district=models.CharField(max_length=100)
    state=models.CharField(max_length=100)
    class Meta:
        db_table='staff'
```

""

A.3 SCREEN SHOT



A.3.1 Login Screen Shot

A screenshot of a web browser window displaying the LV1 Dashboard. The URL in the address bar is 127.0.0.1:8000. The dashboard includes a sidebar with links for Home, Notifications (New), Applications, Statistics, Logs (6), and Reports. The main area shows the "LV1 Dashboard" with three summary cards: "Pending Applications" (10), "Verified Applications" (40), and "Rejected Applications" (10). Below these are two dark cards: "Available Field officers" (4) and "Total Field Officers" (2). A user profile card displays: Logged in as, Name: Mr.HEYRAM, Staff Id: lv1001, Designation: Regional Head, District: Chennai, State: Tamil Nadu, Email: heyram@gmail.com. A section titled "PENDING -- APPROVALS" lists an application: Application Number IGN0000001, Applicant Name aabid, Reference Number 83121549, Reference Document pds, Scheme Type IGNOAPS, with "Validate/Reject" buttons for "Validate" and "Reject".

A.3.2 Eligibility checking Screen Shot

127.0.0.1:8000

Home Allocations Logout

LV2 Dashboard

Home / LV2 Dashboard

10

Pending Applications



More info ↗

40

Verified Applications



More info ↗

10

Rejected Applications



More info ↗

4

Available Field officers

2

Total Field Officers



Logged in as,
Name: Mr.GOPI
Staff Id: LV2002
Designation: VAO

District: Chennai
State : Tamil Nadu
Email : gopiprabakaran@gmail.com



PENDING -- APPROVALS

Application Number	Applicant Name	Reference Number	Reference Document	verified by	Date of Verification	Scheme Type	Validate/Reject
IGN0001083	jinat	39606101	pds	Bowie	Feb. 2, 2020	IGNOAPS	Approve Reject

A.3.3 Verification Screen Shot

127.0.0.1:8000

Home Logout

LV3 Dashboard

Home / LV3 Dashboard

5

Pending Applications



More info ↗

20

Approved Applications



More info ↗

3

Rejected Applications



More info ↗

4

Approved by You

2

Rejected by You



staff_dashboard_data

Logged in as,
Name: Mr.JOHN
Staff Id: LV3002
Designation: Distrit Head

District: Chennai
State : Tamil Nadu
Email : johnlv3@gmail.com



Bonafides -- Department

Application Number	Applicant Name	Address	validated by	Date of Verification	Scheme Type	Approve/Reject	
IGN0001066	jeeth	33449211	pds	Rosamund	March 31, 2021	IGNOAPS	Approve Reject

A.3.4 Approval / Reject Screen Shot

Plagiarism Report

NATIONAL SOCIAL ASSISTANCE PROGRAMME SCHEME

S.SOPHANA JENNIFER, M.E

Assistant Professor,

Department of Computer Science and

Engineering

Panimalar Engineering College

Chennai,India

sophanajennifers@gmail.com

GOPLP

2 Department of Computer Science and

Engineering

Panimalar Engineering College

Chennai,India

gopiprabakaran30@gmail.com

HEYRAM.K

6 Department of Computer Science and

Engineering

Panimalar Engineering College

Chennai,India

heyram2k25@gmail.com

1 *Abstract—The National Social Assistance Programme (NSAP) is a government welfare scheme in India that provides financial assistance to the elderly, widows, and disabled persons living below the poverty line. Launched in August 1995, the scheme consists of five different components, including pensions for the elderly, widows, and disabled persons, as well as a family benefit scheme and an annapurna scheme for food security. The NSAP aims to alleviate poverty among vulnerable sections of society and promote the well-being of senior citizens, widows, and disabled persons, providing them with social security.*

Keywords— National Social Assistance Programme, NSAP, government welfare scheme, financial assistance, elderly, widows, disabled persons, poverty line, pensions, family benefit scheme, annapurna scheme, social security, vulnerable sections of society

I. INTRODUCTION

1 The National Social Assistance Programme (NSAP) is a government welfare scheme launched in India in August 1995 to provide financial assistance to the most vulnerable sections of society. The scheme aims to provide social security to the elderly, widows, and disabled persons living below the poverty line. The NSAP is an umbrella programme that includes five different components, including pensions for the elderly, widows, and disabled persons, a family benefit scheme, and an Annapurna scheme for food security. The objective of the scheme is to alleviate poverty among the most vulnerable sections of society and promote their well-being by providing financial assistance and social security. This program has helped millions of people in India by providing them with a means of livelihood and financial stability.

II. RELATED WORK:

Researchers have already dedicated effort to studying National Institute of Public Finance and Policy (NIPFP), the NSAP scheme has helped in reducing poverty and inequality among the targeted groups. The study found that the scheme has been successful in providing financial assistance to the elderly, widows, and disabled persons, and has improved their overall well-being.

Another study by the Institute of Economic Growth (IEG) found that the NSAP scheme has contributed to a reduction in poverty levels among the elderly population in India. The study also found that the scheme has helped in reducing the vulnerability of the elderly to poverty and social exclusion.

A review of the NSAP scheme by the World Bank found that the scheme has been successful in improving the

social and economic status of the targeted groups. The review recommended that the government should consider increasing the coverage and benefit levels of the scheme to further improve its effectiveness.

3 A study by the Centre for Budget and Governance Accountability (CBGA) found that the NSAP scheme has been successful in providing social security to the targeted groups, but there are some implementation issues that need to be addressed. The study recommended that the government should focus on improving the administrative efficiency and transparency of the scheme.

1 Overall, the literature survey suggests that the NSAP scheme has been effective in providing financial assistance and social security to the most vulnerable sections of society in India. However, there are some implementation issues that need to be addressed to further improve the effectiveness of the scheme.

III.PROPOSED IDEA & RESEARCH HYPOTHESIS

Improved targeting: The proposed system could include improved targeting mechanisms to identify and reach the most vulnerable sections of society, including the elderly, widows, and disabled persons living below the poverty line.

Digitalization: The proposed system could also leverage digital technologies to streamline the application process, reduce administrative costs, and improve transparency and accountability.

Mobile-based payments: The proposed system could facilitate payments through mobile-based platforms to ensure timely and efficient delivery of benefits to the beneficiaries.

Increased coverage and benefits: The proposed system could consider increasing the coverage and benefit levels of the NSAP scheme to provide more financial assistance and social security to the targeted groups.

Monitoring and evaluation: The proposed system could also include robust monitoring and evaluation mechanisms to assess the implementation and effectiveness of the scheme and to identify areas for improvement.

Overall, a proposed system for the NSAP scheme could include improvements in targeting, digitalization, mobile-based payments, increased coverage and benefits, and monitoring and evaluation. These features could help to further improve the effectiveness of the NSAP scheme in providing financial assistance and social security to the most vulnerable sections of society in India..

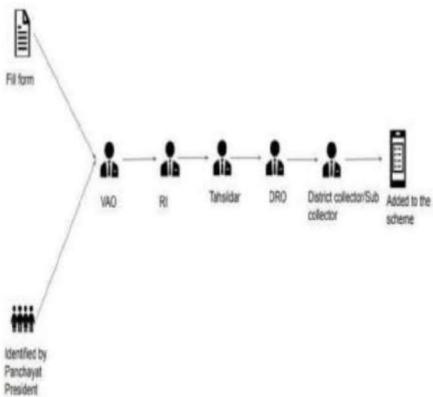
IV. ARCHITECTURE & METHODOLOGY

Strengthening institutional capacity: The first step in implementing the NSAP scheme effectively would be to strengthen the institutional capacity of the relevant government agencies responsible for the scheme's implementation. This could involve providing training and capacity building support to frontline staff, improving coordination among different agencies, and investing in infrastructure and technology to enhance administrative efficiency.

Targeted outreach: To ensure that the scheme reaches the most vulnerable sections of society, there needs to be targeted outreach to potential beneficiaries. This could involve conducting awareness campaigns and information dissemination drives to inform potential beneficiaries about the scheme's eligibility criteria, benefits, and application process.

Streamlining application process: Another key implementation strategy would be to streamline the application process for the NSAP scheme. This could involve digitizing the application process, simplifying the application forms, and reducing the documentation requirements.

Efficient payment systems: The NSAP scheme's effective implementation would depend on the efficient payment systems. To ensure timely payment to beneficiaries, the government could consider leveraging mobile-based payment systems and bank transfers.



Monitoring and evaluation: Finally, to ensure the effective implementation of the NSAP scheme, there needs to be a robust monitoring and evaluation mechanism in place. This could involve conducting regular field visits to verify the beneficiaries' eligibility and monitoring the scheme's implementation to ensure that the benefits are reaching the intended beneficiaries.

Overall, implementing the NSAP scheme effectively would require a combination of strengthening institutional capacity, targeted outreach, streamlining the application process, efficient payment systems, and robust monitoring and evaluation. These strategies could help to ensure that the scheme reaches the most vulnerable sections of society and provides them with the necessary financial assistance and social security.

enables encryption procedures to protect user's sensitive information and also ensure compliance with data protection laws.

V. IMPLEMENTATION OF PROPOSED SYSTEM

Software Tools:

Mobile applications: Given the widespread use of mobile phones in India, the government could develop mobile applications to streamline the NSAP scheme's application process. These applications could be designed to be user-friendly, with simple interfaces that allow beneficiaries to submit their applications and access information about the scheme's benefits.

Web portals: The government could also develop web portals to enable beneficiaries to access information about the NSAP scheme's benefits and eligibility criteria. These web portals could be designed to be interactive, with features such as chatbots that can answer beneficiaries' queries and provide guidance.

Data analytics tools: To monitor the NSAP scheme's implementation, the government could leverage data analytics tools to analyze the scheme's data and identify areas for improvement. These tools could be used to identify trends in the scheme's implementation, assess the scheme's effectiveness, and identify areas where the scheme needs to be strengthened.

Payment gateway tools: To enable efficient payments to beneficiaries, the government could use payment gateway tools that are integrated with the mobile applications and web portals. These tools could be designed to be secure, with strong encryption mechanisms that protect beneficiaries' financial data.

Monitoring and evaluation tools: Finally, to monitor the NSAP scheme's implementation and assess its effectiveness, the government could use monitoring and evaluation tools. These tools could be designed to be user-friendly, with simple interfaces that allow government officials to access data on the scheme's implementation and evaluate its impact on the intended beneficiaries.

Overall, software tools such as mobile applications, web portals, data analytics tools, payment gateway tools, and monitoring and evaluation tools could be used to streamline the NSAP scheme's implementation and make it more efficient and effective in providing financial assistance and social security to the most vulnerable sections of society in India.

Hardware Tools:

Biometric authentication devices: To prevent fraud and ensure that the benefits of the NSAP scheme reach the intended beneficiaries, the government could use biometric authentication devices such as fingerprint scanners or iris scanners. These devices could be used to verify the identity of beneficiaries when they apply for the scheme or when they receive their benefits.

Handheld devices: Government officials involved in the implementation of the NSAP scheme, such as field workers and supervisors, could use handheld devices such as tablets or smartphones to access beneficiary data, update records, and report on the scheme's progress. These devices could be equipped with appropriate software applications that enable efficient data collection, analysis, and reporting.

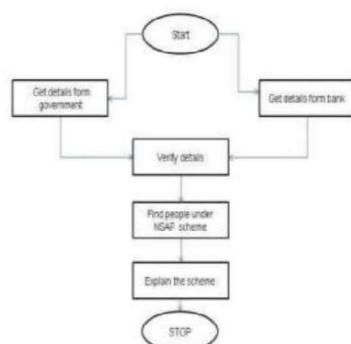
Barcode scanners: To streamline the distribution of benefits to beneficiaries, the government could use barcode scanners to track the movement of goods and ensure that they reach the intended beneficiaries. Barcode scanners

could be used at various points in the distribution chain, from warehouses to distribution centers to the beneficiaries themselves.

GPS-enabled devices: To monitor the movement of goods and the progress of the NSAP scheme, the government could use GPS-enabled devices such as smartphones or tablets. These devices could be used to track the location of beneficiaries, goods, and government officials involved in the scheme's implementation.

Server hardware: The government could set up a dedicated server infrastructure to host the software applications and databases used for the NSAP scheme. The server infrastructure could be designed to be scalable and secure, with appropriate redundancy and backup mechanisms in place to ensure the availability and integrity of data.

Overall, hardware tools such as biometric authentication devices, handheld devices, barcode scanners, GPS-enabled devices, and server hardware could be used to streamline the implementation of the NSAP scheme and ensure that the benefits of the scheme reach the intended beneficiaries efficiently and securely.



VI. COMPARISON WITH OTHER SYSTEMS

NSAP (National Social Assistance Programme) is a government-sponsored social welfare scheme in India that provides financial assistance to vulnerable and marginalized sections of the society. As a language model, I do not have access to specific information about existing surveys for NSAP. However, I can provide you with some general information on surveys and assessments that are conducted for social welfare programs like NSAP. Surveys and assessments are important tools for evaluating the effectiveness of social welfare programs like NSAP. They help to identify gaps in the program's implementation, determine the needs of the beneficiaries, and measure the impact of the program on the lives of the beneficiaries.

Some of the common types of surveys and assessments conducted for social welfare programs include:

Baseline surveys: These are conducted at the beginning of the program to gather information about the existing social and economic conditions of the beneficiaries. This information is used as a reference point to measure the impact of the program over time.

Mid-term assessments: These are conducted midway through the program to assess the progress made in achieving the program's objectives and to identify any challenges that need to be addressed.

End line surveys: These are conducted at the end of the program to assess the overall impact of the program on the lives of the beneficiaries.

Monitoring and evaluation (M&E) surveys: These are conducted regularly throughout the program to monitor its implementation and evaluate its effectiveness.

In addition to surveys and assessments, social welfare programs like NSAP may also conduct focus group discussions, interviews, and case studies to gather more detailed information about the experiences of the beneficiaries.

Overall, surveys and assessments are essential for ensuring that social welfare programs like NSAP are meeting the needs of their beneficiaries and achieving their intended objectives.

VI. ADVANTAGES OF OUR PROPOSED SYSTEM

Coverage and targeting: The NSAP scheme is intended to provide financial assistance and social security to the most vulnerable sections of society in India. Thus, one important factor to consider is whether the scheme is reaching its intended beneficiaries effectively. The government could assess the scheme's coverage and targeting mechanisms to ensure that the benefits are reaching the intended beneficiaries and identify any areas where the scheme needs to be strengthened.

Efficiency and effectiveness: The NSAP scheme's effectiveness depends on how efficiently and effectively the benefits are being delivered to the beneficiaries. The government could assess the scheme's implementation processes and identify any bottlenecks or inefficiencies that may be hindering the scheme's effectiveness. Additionally, the government could measure the impact of the scheme on the beneficiaries' lives and assess whether the benefits are sufficient to meet their basic needs and improve their social and economic well-being.

Transparency and accountability: To ensure that the NSAP scheme's benefits are distributed fairly and transparently, the government could establish appropriate mechanisms for monitoring and reporting on the scheme's implementation. These mechanisms could include audits, regular reviews, and public reporting on the scheme's progress, to enhance transparency and accountability.

Continuity and sustainability: The NSAP scheme is intended to be a long-term social security measure, providing financial assistance and social security to the most vulnerable sections of society. Thus, it is essential to ensure the scheme's continuity and sustainability over the long term. The government could assess the scheme's financial sustainability and explore ways to fund the scheme in the long term, while also identifying ways to enhance the scheme's effectiveness and impact.

VII. CONCLUSION

National Social Assistance Programme (NSAP) scheme is an essential social security measure aimed at providing financial assistance and social security to the most vulnerable sections of society in India. The scheme provides financial assistance to the elderly, widows, and disabled persons living below the poverty line, helping them to meet their basic needs and improve their social and economic well-being.

The implementation of the NSAP scheme requires a robust framework involving various stakeholders such as government officials, civil society organizations, and beneficiaries. The scheme's effectiveness depends on how efficiently and effectively the benefits are delivered to the intended beneficiaries, and how transparently and accountably the scheme is implemented.

The government could assess the scheme's implementation

processes, including its coverage, efficiency, transparency, and sustainability, to ensure that the scheme is meeting its intended objectives effectively and sustainably. Additionally, the government could explore ways to enhance the scheme's effectiveness and impact, such as improving the targeting mechanisms, strengthening the implementation processes, and providing adequate funding and resources for the scheme's long-term sustainability.

The NSAP scheme is an essential social security measure that can help reduce poverty and enhance the social and economic well-being of the most vulnerable sections of society in India. The scheme's successful implementation and effectiveness depend on various factors, and thus require continuous monitoring, evaluation, and improvement.

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