

GovConnect: Facilitating Direct Communication for Grievance Resolution

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Abstract: Infrastructure and human resource development are crucial to economic and social progress, as they encompass essential physical structures like roads, electricity, water systems, and telecommunications, which are vital for both economic activities and everyday life. However, many regions face persistent civic issues due to inadequate infrastructure, and the existing methods for reporting these issues—such as written letters, telephone calls, and manual entries at local offices—have proven to be ineffective and outdated. The current reporting mechanisms are cumbersome and not user-friendly, leading to inefficiencies and prolonged resolution times. To address these problems, a modern, streamlined reporting system is needed to ensure that citizens can easily report and track civic issues, thereby improving overall quality of life and civic satisfaction.

Keywords: Infrastructure Development, Civic Issues, Citizen Engagement

I. INTRODUCTION

Smartphones have the potential to revolutionize how citizens engage in civic activities, leveraging crowdsourcing and eParticipation to address complex problems more effectively. The proposed Citizen Grievance Lodging and Redressal app aims to modernize outdated reporting methods by providing a streamlined, user-friendly platform for reporting and tracking physical civic issues. By simplifying the reporting process, the app encourages greater citizen involvement, fosters a sense of community, and ensures timely responses from local authorities. The app's design focuses on ease of use, aiming to make reporting straightforward and less time-consuming, thus enhancing overall civic engagement and improving the quality of local services.

Currently, in India, citizens often face inefficiencies and corruption when trying to resolve civic issues, such as having to bribe officials or wait extended periods for resolutions. The Citizen Grievance Lodging and Redressal app addresses these challenges by facilitating direct, digital communication between the public and local authorities. This app allows for efficient management of grievances, promoting transparency and accountability. It empowers users to track their reports and receive timely updates, contributing to better problem-solving and fostering a more engaged and informed citizenry. With its simple interface and robust functionality, the app aims to significantly improve urban management and community satisfaction.

II. LITERATURE SURVEY

In [1] The paper quality. It also aims to improve the relationship between Citizens and Social Solidarity by introducing an e-Complaint web service based on SOA. presents a Customer Complaint Management System to minimize customer dissatisfaction and encourage participation in service. In [2] The case study discusses the Public Grievance and Redressal Module (PGRM), also known as the "Helpline," in 213 urban local bodies in Karnataka, India. Implemented as part of the Municipal Reforms Programme, the Helpline aims to strengthen service delivery mechanisms and enhance community participation in governance.

It allows citizens to register grievances and track redressal progress using a complaint number. In [3] Government departments often struggle with grievance redressal, leading to unregistered complaints and recurring issues. To address this, complaints could be made public through various media channels, imposing pressure on agencies to improve their functioning. Structured complaints could be collected through IVR and SMS systems, and statistics exposed transparently. This approach would be scalable for immediate action and analysis of flawed patterns. However, to create long-lasting stable systems, government departments must respond adequately to citizens. In [4] C2C.com is an online complaint management system that allows customers to register and resolve issues with engineers. It acts as a bridge between customers and companies, providing flexibility and speed. The system eliminates paper movements, allowing customers to register complaints and automatically schedule and prompt operators to source them to relevant departments.

III. PROBLEM STATEMENT

In India, the traditional channels for citizens to address civic issues and grievances often involve cumbersome processes, bureaucratic hurdles, and, at times, unethical practices such as bribery. The lack of a direct and efficient communication channel between the government and the public exacerbates people's dissatisfaction, leading to prolonged resolution times for civic problems. Citizens often find themselves waiting for months to get their issues resolved, resulting in a significant hindrance to effective governance.

The absence of a streamlined, digital platform for grievance redressal further compounds these challenges. To bridge this gap, there is a pressing need for a modern Grievances Redressal System that leverages technology to facilitate direct communication between citizens and government officials. This system should eliminate the need for bribery, reduce resolution times, and encourage active citizen participation in addressing civic issues. The GovConnect Android app serves as a solution to these problems, providing citizens with a user-friendly platform to register and track grievances efficiently.

IV. OBJECTIVE

- Easy and systematic method to register grievances and track the redress.
- Introduces transparency to the system through digitalization.
- Provides an easy method of communication between the Municipality Officials and the citizens.
- Tries to improve the relationship between the Municipality Officials and the citizens.
- Enables ordinary citizens to report civic problems to the municipal and municipality authorities.
- User can lodge his grievances regarding any municipality or local issues (i.e. water connection problem, pipeline leakages, polluted drinking water, irregular water supply, clogged drains, stray dog menace, illegal constructions, encroachment on municipality lands, illegal hoardings, negligence in maintenance of playgrounds and parks, electricity problems, improper garbage handling, neglected road repair, a pothole down the road, a nonfunctional street light, overflowing dustbin, broken footpaths etc. and can also track the status of the grievances registered.)
- User can post images related to the grievance. This app is like an Alert Mechanism for citizens.
- The app is simple and easy to use. No formal knowledge is required by the user to use the app. Hence it is user friendly.

V. METHODOLOGY

Designed as a systematic approach, the System Development Life Cycle (SDLC) seeks to build information systems by means of a comprehensive, multi-stage process. Starting with preparation, the process consists of numerous steps: analysis, design, development, testing, implementation, and maintenance follows. We clarify the goals, scope, and feasibility of the project during the planning stage.

Gathering and recording system requirements is a fundamental component of the analysis process. During the design process, the found needs are turned into thorough requirement papers including exact system architecture, data models, and user interfaces all around. Developed and programmed at the implementation stage is the system. Guaranteeing that the system satisfies all criteria and operates as expected depends on testing. Using this whole approach helps to create dependable and outstanding systems.

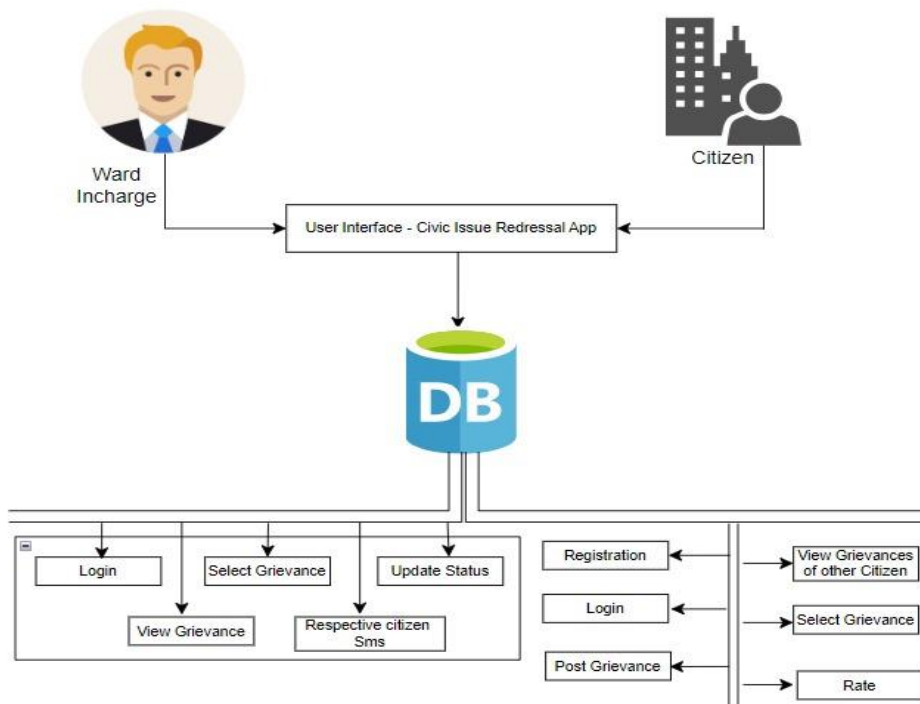


Fig.1 System Architecture

VI. PROPOSED SYSTEM

Every business has distinct definition for complaints. Complaints appeal to them as they let them interact with unhappy consumers and help them to become loyal and contented ones. One approach to define consumer complaint behaviour is as the outcome of consumer unhappiness.

Designed to take user complaints and guarantee that the relevant agency handles them effectively, the Citizen Grievance Lodging and Redressal system guarantees. Citizen Grievance Lodging and Redressal will provide a useful way for people everyday problems are resolved. It was initially developed for the Android platform, hence a significant audience already owning Android handsets will be able to access it. Furthermore, the simpler design of the app will help users to negotiate the system and inspire them to report problems using the channel they are already acquainted with.

From the comfort of his house, a person may lodge and address his grievance with the relevant authorities using his smartphone, a Grievance Lodging and Redressal App. It saves him time, effort, and money on complaining. First this software will be accessible in a certain city. Once a city has effectively put the system into use, it might be extended to include a whole state or county, therefore enabling more people to gain from it. Although it won't offer anybody a feeling of importance, it will also help those in positions of power to be in line.

VII. SOFTWARE IMPLEMENTATION

The idea behind the System Development Life Cycle (SDLC) is to break down a system into smaller, more manageable parts in order to create it in an iterative manner. Unlike the conventional waterfall technique that requires finishing each stage before going on to the next, the iterative paradigm lets one review and improve past phases depending on feedback and insights acquired along the process. Including planning, analysis, design, implementation, and testing in every iteration helps iterative development and improvement to be supported. This method is very good in controlling changes and making sure the end result satisfies customer expectations.

The iterative model of the Systems Development Life Cycle (SDLC) repeats planning, designing, developing, and testing in order to progressively enhance and perfect the system for use in sequence. Every iteration starts with the conception and execution of a predefined set of features, then extensively tested and evaluated.

User and stakeholder comments are received and analyzed to identify areas needing improvement. Following that, iterations enhance the previous ones by adding fresh elements and using feedback to implement necessary modifications. This approach ensures that the program always adjusts to meet user needs, address fresh issues, and improve its general usability and performance. Ultimately, this produces a robust and user-oriented answer for housing and handling municipal concerns.

UI OF THE APP

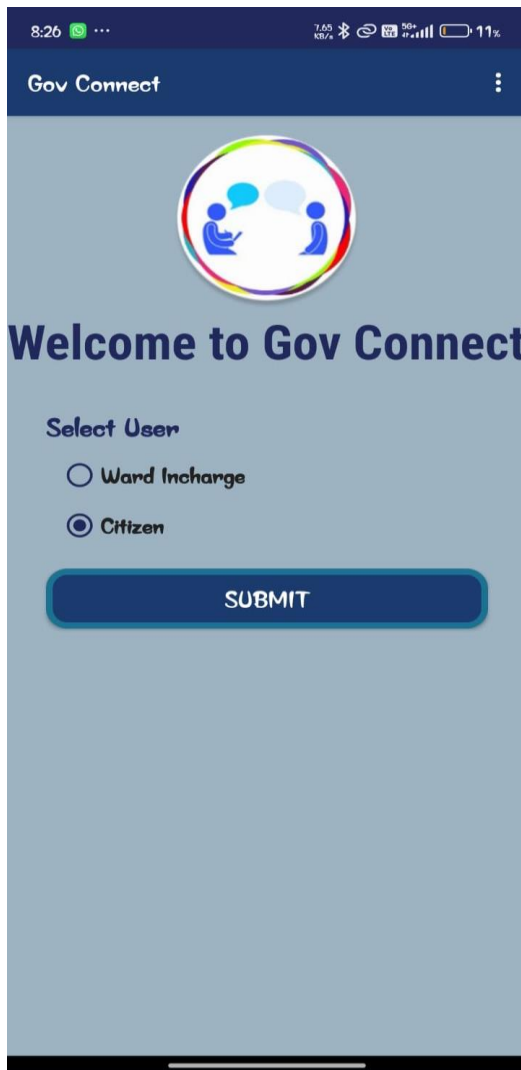


Figure 1: Home Screen

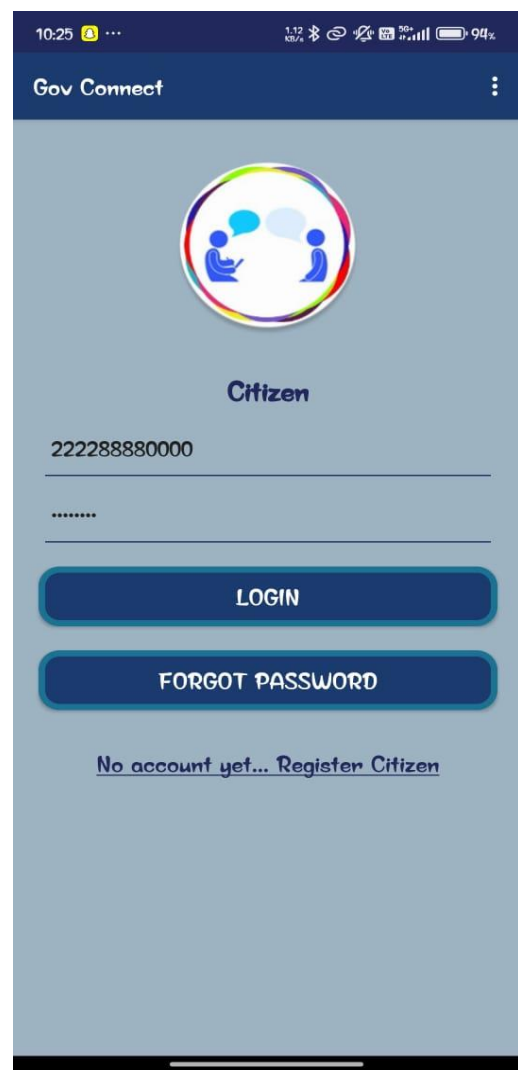


Figure 2: Citizen Login Page

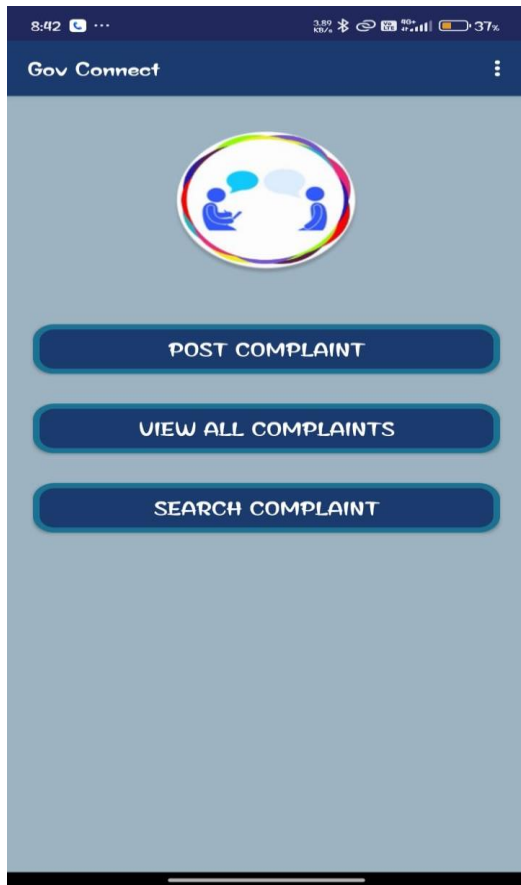


Figure 3: Citizen Home Page

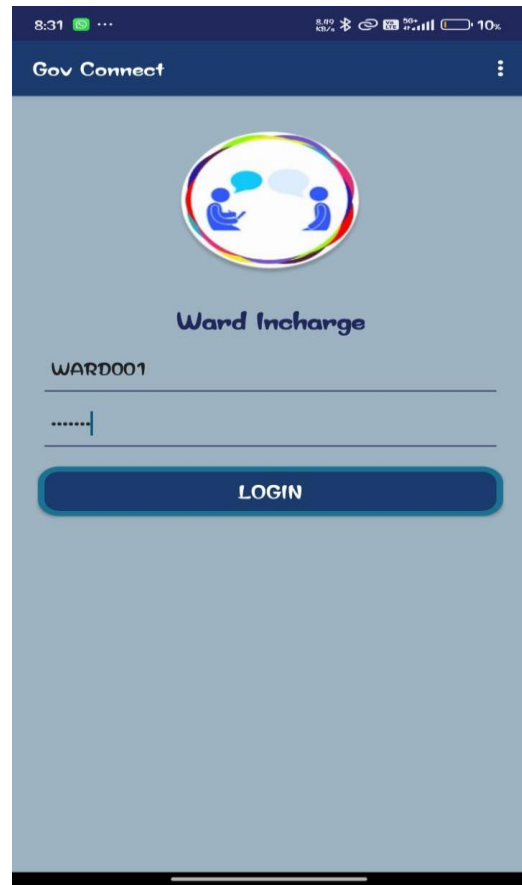


Figure 4: Ward Incharge Login Page

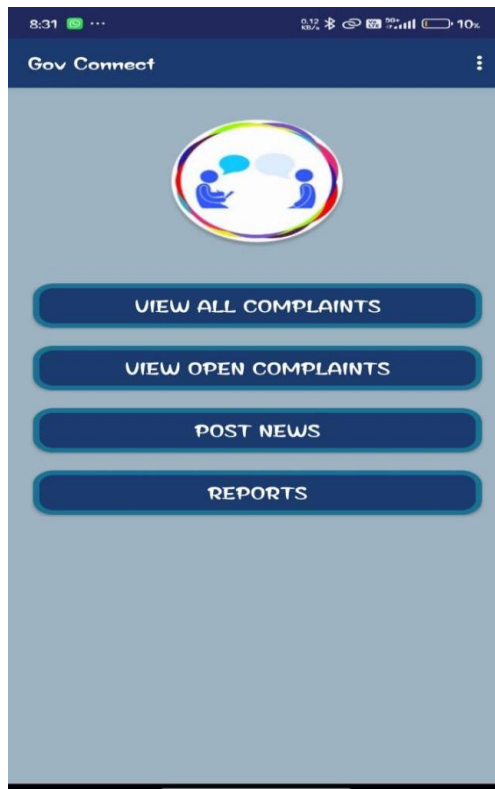


Figure 5: Ward Incharge Home Page

VIII. CONCLUSION AND FUTURE SCOPE

Important sources of information organizations might use to improve the quality of their offerings are positive and negative comments. Although grievance management is a complex and significant problem, the results of the implementation are favourable and instructive for the future development of more advanced systems.

Eventually, the program will be built with web-based backend and several language support. Multiple language support will raise user engagement and inclusion by letting users from many linguistic backgrounds report issues and use the app in their native tongue, therefore increasing the availability of the service. By providing local authorities with a centralized platform to properly address and monitor problems, building a web-based backend will help the app perform even more. This backend technology will provide real-time updates, improved data analytics, and seamless interaction with existing municipal systems, therefore enabling eventual increases in the efficiency and responsiveness of addressing civic concerns.

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