

Impact Assessment of the Jal Jeevan Mission in Rural Jharkhand: An Analysis of Tap Water Supply

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ABSTRACT

The Jal Jeevan Mission (JJM), launched by the Government of India, aims to provide safe and adequate tap water to every household in rural India by 2024. This study focuses on the impact of the Jal Jeevan Mission in rural Jharkhand, assessing its effectiveness in enhancing the availability and accessibility of clean drinking water in the state's villages. Jharkhand, with its predominantly rural population, has long faced challenges related to water scarcity, inadequate infrastructure, and contamination of natural water sources. Through an analysis of key performance indicators, beneficiary feedback, and infrastructure improvements, this paper evaluates the outcomes of the mission in the context of health, sanitation, and socioeconomic upliftment. The study also explores the challenges faced during implementation and provides recommendations for sustaining the momentum of the initiative in Jharkhand's diverse rural landscape.

Key Words: Jal Jeevan Mission, Rural Areas, Clean Drinking Water, Jharkhand

INTRODUCTION

Background

Jharkhand, with over 75% of its population residing in rural areas, has historically struggled with water-related challenges. Access to clean drinking water has been a persistent issue, compounded by the state's undulating terrain, irregular rainfall, and pollution of water sources due to mining activities. To address these concerns, the Government of India launched the Jal Jeevan Mission (JJM) in 2019, with the objective of providing safe, functional household tap connections to every rural household by 2024. This initiative is critical for Jharkhand, where a significant portion of the population relies on traditional sources such as wells, ponds, and handpumps, which often do not meet the standards of potable water.

The mission not only aims to ensure water security but also to improve the overall quality of life by reducing the burden on women and children, who are often tasked with collecting water from distant sources. It is also linked to improving health outcomes by reducing waterborne diseases, enhancing hygiene and sanitation practices, and promoting overall rural development. In Jharkhand, the program has the potential to significantly transform rural water supply systems, improve community engagement, and establish sustainable water management practices.

This analysis seeks to evaluate the progress made under the Jal Jeevan Mission in Jharkhand's rural regions, exploring both quantitative and qualitative impacts. By examining data on coverage, infrastructure development, water quality, and community participation, this report provides a comprehensive assessment of the mission's effectiveness. Additionally, it identifies the challenges faced during the implementation phase, such as geographical constraints, technical hurdles, and socioeconomic factors, and suggests strategies for overcoming these obstacles to achieve the mission's goals in the state.

Objective

This research aims to:

- Analyze the progress of tap water connections across Jharkhand's districts from 2019 to 2023.
- Assess the financial investments made toward this mission and its implications for rural water security.
- Identify trends in coverage and highlight districts with significant progress or gaps in implementation.

MATERIALS AND METHODS

Data Source

The data used for this analysis is sourced from the Jal Jeevan Mission dashboard for Jharkhand. The dataset contains information on the total number of households in each district, the number of households with functional tap water connections, and the percentage coverage of the tap water supply.

Methodology

- **District-wise Analysis:** We break down the data district-wise to assess the disparities in water supply.
- **Financial Analysis:** The study includes a review of financial allocations and expenditures from 2019 to 2023, divided into central and state contributions.
- **Temporal Comparison:** A comparison of data from August 2019 to the most recent available data will be conducted to highlight trends and the pace of infrastructure development.

RESULTS

Tap Water Supply Across Districts

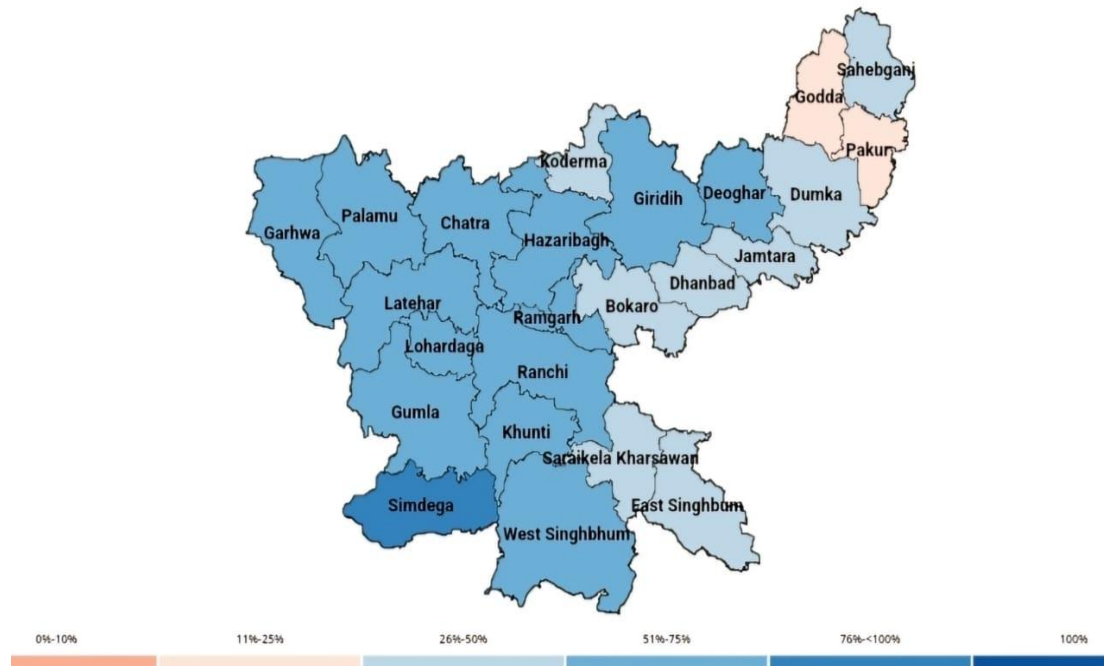
As of the latest data, Jharkhand comprises a total of **6,249,574** rural households, with **54.26%** of these households receiving tap water connections (Fig. 2). The following districts demonstrate significant progress (Fig.1):

- **Simdega:** Highest coverage with **92.72%** of households receiving tap water connections, indicating strong infrastructure development in this district.
- **Lohardaga:** Close to Simdega with **73.37%** coverage.
- **Latehar** and **Giridih** follow closely, with **72.54%** and **71.21%** coverage, respectively.

Underperforming Districts

Some districts show substantial gaps in coverage:

- **Pakur:** The lowest coverage, with only **12.75%** of households connected to tap water.
- **Godda:** Second lowest with **19.16%** coverage. This demonstrates the need for focused efforts in these districts to improve access to clean drinking water.

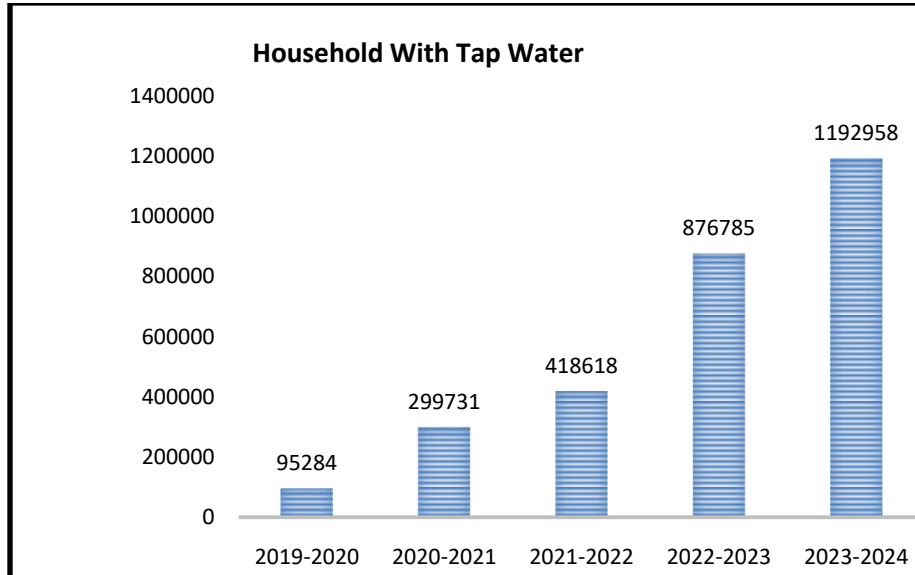


Source: <https://ejalshakti.gov.in/>

Fig. 1: Tap Connection across Rural Jharkhand

Financial Progress

From 2019 to 2023, the central share of funding allocated to Jharkhand under JJM was ₹2,114.22 crore, with an assured fund of ₹2,377.68 crore. The state received an equal allocation of ₹2,322.28 crore. However, there was a notable gap in fund utilization, with only ₹365.91 crore being spent by 2023, highlighting the potential bottlenecks in project execution.



Source: <https://ejalshakti.gov.in/>

Fig. 2: Trends in Growth of Tap Connection

DISCUSSION

Geographic Disparities

The data indicates significant geographic disparities in tap water supply across districts in Jharkhand. Districts such as **Simdega** and **Lohardaga** have achieved considerable success in connecting households to the water supply network, while districts like **Pakur** and **Godda** lag behind. This could be attributed to differences in geographical terrain, water resource availability, or socio-political factors.

Financial Utilization Challenges

While substantial funds have been allocated for JJM implementation, the low utilization rate raises questions about the efficiency of fund distribution and project management at both the state and district levels. The data suggests a need for improved financial oversight and resource management to accelerate the mission's progress.

Infrastructure Development and Sustainability

Although Jharkhand has made notable strides, achieving full tap water connectivity requires not just infrastructure development but also sustainability. The formation of Village Water and Sanitation Committees (VWSC) in **28,735** villages and the identification of human resources for Operation & Maintenance (O&M) in **9,918** villages suggest that the groundwork for sustainable water supply management is underway.

RECOMMENDATIONS

- Focused Interventions in Underperforming Districts:** Districts like **Pakur** and **Godda** need targeted interventions, with customized strategies to address the unique challenges they face in water access.
- Increased Financial Accountability:** To ensure better fund utilization, stricter financial controls and project oversight are necessary at both the district and state levels.
- Sustainability Measures:** Strengthening O&M mechanisms in all districts will ensure that water infrastructure remains functional, thereby securing long-term water availability.
- Community Involvement:** Encouraging greater community participation, particularly through the VWSCs, will help in the smooth functioning of the water supply systems and ensure accountability at the village level.

CONCLUSION

The Jal Jeevan Mission has brought significant improvements to Jharkhand's rural water supply, with more than **33.9 lakh** households now connected to tap water. However, the goal of 100% household coverage is still a challenge in many districts. The financial and human resources allocated under JJM show promising results, but to fully realize the mission's objectives, Jharkhand must address the gaps in low-performing districts and improve its fund utilization efficiency.

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