

## THE STUDY OF THE ROLE OF SMART CITY MISSION IN INDIA'S URBAN DEVELOPMENT AND CHALLENGES OF SMART CITY MISSION

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#### Abstract:

About 31% of India's current population lives in cities and they contribute 63% to the GDP (Census 2011). It is expected that by the year 2030, 40% of India's population will live in urban areas and its contribution to India's GDP will be 75%. This requires comprehensive development of institutional, physical, social, and economic infrastructure. All of these are important in improving the quality of life and attracting people and investment, setting up a virtuous cycle of growth and progress. The development of the smart city is a step in this direction. The Smart City Mission is an innovative and innovative initiative by the Government of India to enable local development and drive economic growth and improve quality of life through better outcomes for citizens with the help of technology. In this research paper, the role of Smart City Mission in the urban development of India and the challenges of Smart City Mission have been studied.

**Keywords:** Smart City Mission, Urban Development, India's GDP, Comprehensive Development, Indian Economy

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#### **Research Methodology:**

The research paper has depended on secondary data.

#### **Objective of Research:**

- 3) To study the role of Smart City Mission in the urban development of India.
- 4) To study the challenges of Smart City Mission of India.

#### Introduction:

Smart cities focus on people's most pressing needs and the biggest opportunities to improve lives. In the Smart City Mission approach, the objective is to promote cities that provide basic infrastructure and provide a decent quality of life to its citizens, a clean and sustainable environment, and the use of 'smart' solutions. The special focus is on sustainable and inclusive growth and creating a replicable model that will act as a beacon for other such aspiring cities. The Smart City Mission aims to set an example that can be replicated within and outside the Smart City, catalyzing the creation of similar Smart Cities in different regions and parts of the country.

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Under the Smart City Mission Strategy, a city-wide initiative in which at least one smart solution is implemented citywide. Based on the area, three models of progress, retrofitting, redevelopment, and greenfield construction are being made. Core infrastructure elements include adequate water supply, assured power supply, sanitation including solid waste management, efficient urban mobility, and public transport, affordable housing, especially for the poor, strong IT connectivity and digitization, good governance, especially e-governance and citizen participation, sustainable environment, safety and security of citizens, especially women, children and elderly, and health and education are being provided.

The mission covered 100 cities and had a duration of five years (FY 2015-16 to FY 2019-20). The mission can be continued thereafter with the Ministry of Urban Development evaluating and incorporating the lessons learned. The total number of 100 smart cities has been distributed among the states and union territories based on uniform criteria. The method gives equal weight (50:50) to the urban population of the State/UT and the number of constitutional towns in the State/UT. Based on this method, there will be a fixed number of potential smart cities, with at least one in each state/UT. The number of potential Smart Cities from each State/UT will be capped at the indicated number. This distribution formula has also been used for the allocation of funds under AMRUT – the Atal Mission for Rejuvenation and Urban Transformation.

The Smart City Mission is operated as a Centrally Sponsored Scheme (CSS) and the central government proposed to provide financial assistance of Rs 48,000 crore over five years to the mission, at an average of Rs 100 crore per city per year. An equal amount, on a matching basis, will be contributed by the State/ULB; Therefore, about one lakh crore rupees of Government/ULB funds will be available for smart city development.

Comprehensive development takes place by integrating physical, institutional, social, and economic infrastructure across regions. Many of the government's sectoral plans converge on this goal, although their paths differ. There is a strong complementarity between AMRUT and the Smart City Mission in achieving urban transformation. AMRUT follows a project-based approach, while the Smart Cities Mission is an area-based strategy. Similarly, considerable gains can be made by seeking convergence of central and state government programs/schemes with smart cities missions.

# The Role of Smart City Mission in India's Urban Development and Challenges of Smart City Mission:

The present urban system of India is characterized by the presence of 7935 cities, and three metropolitan cities (Mumbai, Kolkata, and Chennai) which developed during British rule. In addition, the national capital is Delhi. They are followed by big cities like Bengaluru, Hyderabad, Ahmedabad, and Pune in second place. The interdependence and interrelationships of these eight cities and their regional hegemony and urban corridors have the potential to transform India into a global economic power. But these cities are not able to do this on their own, as they face huge challenges. Therefore urban development strategy can play an important role. Regional disparity, the urban-rural divide, and within-city disparity are major

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impediments to India's urban rejuvenation and economic progress. The concepts and strategies of the Smart Cities Mission and AMRUT of the present Central Government should be seen in this light.

The objective of the Smart City Mission is to drive economic growth and improve the quality of life of people by realizing local area development and harnessing technology. Areabased development will result in the transformation (reconfiguration and re-development) of existing areas including the transformation of slums into better-planned cities. To accommodate the growing population of urban areas, new areas, green-belts are being developed around the cities. Cities are using technology, information, and data to improve infrastructure and services using smart solutions. In this way, comprehensive development is improving the quality of life, generates employment, and increases the income of all, especially the poor and marginalized, making cities inclusive.

Smart cities have some typical features of comprehensive development. Planning for unplanned areas involving multiple compatible activities and land uses adjacent to each other to make land use more efficient. States can bring some flexibility in land use and make such bye-laws so that they can adapt to the change. expanding housing opportunities for all; The objectives of reducing congestion, air pollution, and resource depletion, boosting the local economy, promoting interaction, and ensuring safety are slowly being met. Road networks are being built or equipped not only for vehicles and public transport, but also for pedestrians and cyclists, and essential administrative services are being provided for distances covered on foot or by bicycle. Open spaces – parks, playgrounds, recreational areas – are being conserved and developed to enhance the quality of life of citizens, reduce the effects of heating in urban areas, and generally promote ecological balance.

Transit Oriented Development (TOD), public transport, and transport connectivity at the final destination; Governance increasingly dependent on online services to be made citizenfriendly and cost-effective, especially mobile usage, to bring down costs of services and to bring accountability and transparency in providing services without visiting municipal offices. Formation of e-groups for public listening and taking suggestions and use of online monitoring of programs and activities with the help of cyber visits to sites; To provide an identity to the city based on its main economic activities such as local food, health, education, arts and crafts, culture, sporting goods, furniture, hosiery, clothing, dairy, etc.; Area-based development to improve infrastructure and services, use smart solutions for them, etc. are being done under the Smart City Mission.

The strategic components of area-based development in the Smart City Mission are urban reform (re-engineering), city renewal (redevelopment) and city expansion (greenfield development), and pan-city initiatives covering large areas of the city. Smart solutions are being used. Retrofitting has begun planning in the existing built-up area to achieve smart city objectives, along with other objectives to make the existing area more efficient and liveable. In recombination, such an area will be identified adjacent to the city which is more than 500 acres in consultation with the citizens. Based on the existing level of infrastructure services in the identified area and the vision of the residents, a strategy is being formulated to make the cities

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smart. Since existing structures will be largely retained in this model, the reconfigured smart cities are expected to have more in-depth infrastructural service levels and smart applications. This strategy can also be accomplished in a much shorter time frame, allowing it to be replicated in other parts of the city.

The redevelopment will have the effect of replacing the existing built environment and co-creating a new layout with enhanced infrastructure utilizing mixed land use and increased density. The redevelopment envisages an area of over 50 acres identified by the Urban Local Bodies (ULBs) in consultation with the citizens. Affordable housing through greenfield development, especially the provision of housing for the poor, through innovative planning, planned financing, and planned implementation (eg land pooling/land reclamation) of previously vacant areas (over 250 acres) ) will have most smart solutions implemented. To meet the needs of the growing population, it is required to develop green areas around the cities. A well-known example of this is GIFT City in Gujarat. Unlike retrofitting and redevelopment, green space development can be done within the purview of urban local bodies or the purview of a local development authority (UDA).

Pan-city development envisages the application of select smart solutions to the existing infrastructure across the city. The application of smart solutions will involve the use of technology, information, and data to improve infrastructure and services. For example, using smart solutions (intelligent traffic management systems) in the transportation sector and reducing the average travel time or cost incurred by citizens will have a positive impact on the productivity of citizens and their quality of life. Another example of this could be wastewater recycling and smart metering, which can contribute greatly to better water management in the city.

In June 2020, the Smart City Mission, an ambitious project of the Government of India, completed five years. At present, the importance of this mission has increased immensely in the context of health services in the Kovid-19 pandemic. Smart City Mission 1,333 projects worth Rs 50,626 crore completed or under implementation/at tender stage. Smart City Mission is an amalgamation of several other missions like AMRUT and some of its projects are being executed under public-private partnerships. 1333 projects worth Rs 50,626 crore have been completed or are under implementation/at tendering stage. 2,03,979 crore projects are underway for all 99 smart cities across the country. Out of 99 smart cities selected so far, SPVs (Special Purpose Vehicles) have joined 91 smart cities. Integrated City Command and Control Rooms (ICCCs) have been set up in 9 Smart Cities Ahmedabad, Rajkot, Vadodara, Visakhapatnam, Bhopal, Pune, Kakinada, Surat, and Nagpur. Work is in progress in 14 more smart cities and 32 smart cities are in the tender stage. Smart road projects worth Rs 228 crore have been completed in four smart cities and projects worth Rs 5,123 crore are under implementation/tendering in 40 smart cities. Smart solar projects have been completed in 6 Smart Cities while projects in 49 Smart Cities are under the implementation/tendering stage. Smart water projects have been completed in 6 Smart Cities while projects in 43 Smart Cities are under the implementation/tendering stage. Similarly, smart wastewater projects in 46 smart cities have been completed or are under the implementation/tendering stage. Public-Private

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Partnership projects worth Rs 734 crore have been completed in 13 smart cities, while projects worth Rs 7,753 crore are under implementation/tendering in 52 smart cities. Besides this, other important projects like heritage conservation, water ghat development, and public space development have been completed in 13 smart cities for Rs 107 crore, and projects worth Rs 5,865 crore are under the implementation/tendering stage.

For the first time, the Ministry of Urban Development is using the challenge or competition method to select cities for funding in the program and is using the strategy of areabased development. It reflects the spirit of competitive and cooperative federalism. States and urban local bodies will play an important supporting role in the development of smart cities. Smart leadership and vision and the ability to take decisive action at this level will be the key factors that will determine the success of the mission. Capacity building would be required to understand the concepts of retrofitting, redevelopment, and green-sector development at various levels by policymakers, implementers, and other stakeholders. Major investments in time and resources must be made during the planning phase before participation in challenges. This is different from the traditional DPR-driven.

The Smart City Mission requires smart people who actively participate in governance and reforms. Citizen participation is much more than formal participation in governance. Smart people are involved in smart city definition, decisions about using smart solutions, implementing improvements, getting more from less, and overseeing implementation and postproject structures to make smart city developments sustainable. Huh. Through increased use of ICT, especially mobile-based devices, the SPV will enable smart peope participation.

The potential of the Smart Cities Mission and its synergy with AMRUT and Housing for All can bring many benefits but there is a need to protect the interests of the poor and slum dwellers who have a population of 65 million as per the 2011 census. These programs should neither be separate at the level of administration nor at the level of implementation, otherwise, their inclusion will end. As envisaged, smart cities are not meant to widen the digital divide, but to bridge the divide within the city and between the city and the countryside. The idea of a smart city should be viewed to curb corruption and ensure adequate and effective service delivery in urban areas through the use of information and digital technologies. The success of these programs will be judged in the future by seeing how much they changed the lives of the people and how much they reduced the growing inequality in our society.

The coronavirus pandemic has largely been an urban crisis. Most of the smart cities were hit by the Covid-19 crisis. Megacities like Delhi, Mumbai, Bengaluru, and Chennai were the worst hit by the pandemic. Indian cities are not only facing a public health crisis but also facing economic issues and livelihood crises. The projects launched under the Smart City Mission are well behind schedule. Out of 5151 smart city projects in 100 cities, 4700 projects were tendered, while only 1638 projects have been completed. Public health has been largely neglected under the mission. Out of over 5,000 projects under the Smart City Mission, only 69 projects were related to health infrastructure. The mission further weakened local governments. The existence of parallel governance structures of the special purpose vehicle has reduced the accountability of the local bodies.

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#### **Conclusion:**

Programs like the National Urban Livelihoods Mission and the National Urban Health Mission, which have so far received little attention, need to be encouraged in a big way by providing more resources. A National Urban Employment Guarantee Program should be started for the employment security of urban residents. Indian cities are currently facing an unprecedented challenge. The need of the hour is to invest in programs that can help achieve better health and livelihood for its residents, based on the priorities of urban development. Under the mission, green areas should be developed around the cities to accommodate the increasing population of the urban areas. The use of technology, information, and data to improve city infrastructure and services through the use of smart solutions will see a vast improvement in the quality of life, thereby making cities inclusive by generating employment as well as increasing the income of marginalized sections.

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