

Unlocking urbanization: Lessons from India on the state of practice

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Welcome to the Volume 2 Issue 1 of the Journal of Sustainable Urbanization, Planning and Progress (JSUPP). It gives me great pleasure to introduce the special edition titled “*Unlocking Urbanization: Lessons from India on the State of Practice*”. In keeping with the journal’s mission to provide leadership in research in the areas of urbanization and planning around the world and progress made in Asia, in particular, this special edition addresses urbanization issues and efforts for transformative change in Indian Cities. The papers in this issue bring out the challenges faced by a fast-urbanizing city of Bengaluru in south India and the approaches that have been evolved to address them.

Urbanization, while bringing prosperity, has also led to environmental degradation and infrastructure problems, like poor quality of air and water, unreliable power, and traffic congestion. Often, our basic need for clean air, water and environment conflict with those of economic goals of growth and therefore, adopting sustainable practices is a decision that needs to be made consciously and consistently. This special edition examines a globally emerging economic powerhouse and a fast-urbanizing world city, Bengaluru, India, from the lens of sustainability and how the typical 40 to 100 year lock-ins of planning decisions made today will impact the city's liveability and its competitive status in the global economy. It shows how urbanization presents a tremendous opportunity in creating momentum for solutions, thus bringing about a virtuous cycle of positive change across urban sectors and ultimately enhancing the quality of life for a large number of residents.

Encouraging cities to embrace a more sustainable path requires initiating a process towards efficient use

of natural resources, empowering people and building capacity in governance. There is a need for extensive outreach aimed at strengthening capacities, sharing best practices and providing a learning platform for all stakeholders. Given that the next decade present a unique opportunity to influence policy and decision makers to intelligently leverage investments being made in cities, the paradigm shift needed is the ability to seamlessly translate ambitious schemes and reforms on-ground. In this scenario, are there institutions, processes and solutions which can incrementally address the challenges urbanization presents? This is an urgent need to insert and establish sustainable best practices and the six cases presented in this edition explicitly examine the methods adopted for incremental change where the principal goal was to improve systems and decision making in urban sectors. This was done by applying tools to carry out assessments and using the results to identify and push for reforms.

The papers on unlocking urbanization and participatory planning speak to the theme of building capacity of various stakeholders and how equipped with information and the right tools, they can enable transformation in cities. The papers on Bengaluru’s public transport and reimagining of its Peripheral Ring Road papers address the infrastructure issues in the city and how ensuring transport and land use integration can not only address the current problems but can ensure the future sustainability and viability of these networks and the city. The papers on Water and Bengaluru’s solar potential deal with the pertinent issue of how to efficiently utilize and manage resources and contribute to a circular economy. Several of these papers highlight case studies to illustrate a symptomatic problem, its genesis and potential solutions, further

analysing with respect to scale. Summary of each of the contributed paper in Volume 2 Issue 1 of JSUPP is as follows:

The first paper talks about the “Unlocking Urbanization”

India is going through the early phase of urbanization with 33% of its citizens currently living in urban areas, with the number expected to go up to 40% by 2030. The sudden growth in Indian cities has led to challenges in infrastructure provisioning and service delivery which have not kept pace. Evidence in the form of case examples from across cities point to the possibility that there is room for leveraging disruptive innovation in filling the space in efficient service delivery via institutions outside the formal public setup. In the context of the gaps in governance, this paper seeks to examine the role of institutions and the potential of coalitions as ‘agents of change’ that can empower and equip the government and citizenry with technical capacity and methodologies for action, enabling sustainable development and eventually, triggering broader cross-sectoral, city-wide transformation.

Second paper discusses on the Participatory Planning in Indian Cities

In some states, at the level of the smallest administrative unit, i.e. the electoral ward, there are institutionalised processes that enable citizen engagement through ward committees. However, in most cases, with limited mechanisms to enable participatory planning processes, the impact is diminished. Supporting programs such as capacity building for government officials and awareness building amongst citizens to engage effectively, guidelines to be followed for effective participative processes are integral for effective engagement. This paper analyses and evaluates practises of participative local area planning in India, particularly at the level of electoral wards and highlights successful models of engagement and processes that allow for effective participatory planning and identifies learnings that help overcome barriers to the process.

Third paper discusses about how to Enhance Bangalore Public Transport

This paper models trip scenarios emphasising increase in public transport supply and generates sustainable transport models for the city. This study also identifies

two major barrier to the enhancement of the city’s public transport network - lopsided investments in mass transit modes and the presence of a fractured institutional framework for transport in the city. Where conventional solutions addressing congestion within the city — such as road widening, creating one ways and building grade separators such as flyovers and underpasses — have failed to address the issue, and at the current rate of increasing vehicular volumes, the city’s roads are forecast to be completely saturated by 2025. This paper’s premise is that public transport serves as the sole sustainable solution to Bengaluru’s chronic congestion and that only a large mode-shift towards public transport by 2025 can help reduce congestion on the city’s roads.

Fourth Paper highlights regarding the Ring Roads as a Catalysts for the growth of the city

The Peripheral Ring Road (PRR) was envisioned as a mere bypass to ‘decongest an already crowded Outer Ring Road (ORR) and prevent long distance private vehicles from entering the city centre’. This approach led to the mega project being imagined as a mere strip of road on the ground, intersected by a few National Highways that entered the city, and land was sought only for the road’s proposed length and width. As a result, the inherent potential of the PRR to increase the value of the adjoining land; surge the change of land use and building construction applications along with it and increase in the frequency of land transactions was not recognised. PRR could be reimaged to not only be financially more feasible and time bound for government agencies, but also to serve as a catalyst to plan and finance urban expansion.

Fifth paper discusses on an important problem of water and presents Making Water Flow in the city of Bengaluru

Today as one of the fastest growing cities in the world, Bengaluru is unusual in the fact that it is an old city, located at a distance from perennial sources of fresh water. This paper traces the evolution of Bengaluru’s water supply infrastructure from the precolonial past into the present day. We posit that the shift of the city’s dependence on water from local to distant sources, with the advent of technology and the introduction of centralized piped water, has weakened local residents’ and policy makers’ awareness of the im-

portance of conservation of local ecosystems. The resulting degradation and conversion of the city's water bodies have reduced the resilience of Bengaluru to flooding and drought, especially affecting the poorest and most vulnerable of its residents. In an era of increasing climate change, the study stresses the need to develop an integrated perspective that considers the importance of local ecosystems as commons for increased urban resilience.

Sixth paper talks about the Solar Potential in the city

Solar energy is a key component of cities' climate mitigation and energy security plans, due to its ease of installation & operation and drastic decline in costs. In Bengaluru, residential, commercial and industrial (C & I) consumers contributed to around 85% of the electricity consumption and resultant emissions during 2014 and 2015. What are the options for these consumers within the ambit of current policies to procure solar power? Are changes required in these policies to scale up the adoption of solar power? The study explores two possible options – off-site procurement, where grid-connected solar power projects in Karnataka, commissioned before 31 March 2018, were exempted from payment of wheeling, banking charges and cross subsidy surcharge for the first 10 years for sale to 3rd party customers, which, for certain categories of consumers (commercial), made solar energy more viable and on-site procurement which allows export of excess power to the grid of solar energy.

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