



VIKSIT BHARAT 2047

**NATIONAL REAL ESTATE
DEVELOPMENT FRAMEWORK**

SEPTEMBER 2025

TABLE OF CONTENTS

FOREWORD	07
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EXECUTIVE SUMMARY	09
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01

INTERNATIONAL AND NATIONAL OUTLOOK ON THE REAL ESTATE SECTOR	12
---	----

02

VISION FOR REAL ESTATE SECTOR - VIKSIT BHARAT @ 2047	20
---	----

03

KEY PILLARS OF THE REFORM AGENDA	22
----------------------------------	----

PILLAR 1: LAND REFORMS	24
------------------------	----

1.1 Ensure Conclusive Titling through the Land Titling Act	25
1.2 Create Unified National Digital Land Register	27
1.3 Enactment of Registration Bill 2025 & Implement Fast, Simplified Registration and Mutation Process	29
1.4 Create Land Banks for Affordable Housing (Ownership-based / Rental)	30
1.5 Timely Land Acquisition	31
1.6 Zoning and Master Plan Reforms	34
1.7 Town Planning (TP) Acts and Master / Development Plans	36
1.8 Digitisation and Technology Integration	38
1.9 Governance and Process Simplification	39

PILLAR 2: DEVELOPING FUTURE CITIES -100 CITIES OF TOMORROW	42
2.1 New Counter Magnet / Satellite Cities as Growth Engines of Future	43
2.2 Revitalising Existing Cities - Urban Regeneration with Heritage Sensitivity	46
2.3 Reform Urban Planning to Enable Purpose-Based Zoning	47
2.4 Urban Infrastructure Readiness	48
2.5 Merge Housing and Urban Development Departments	49
PILLAR 3: EASE OF DOING CONSTRUCTION	52
3.1 Transform Building Plan Approvals through Digitization, Transparency & Time-Bound Processing	54
3.2 Introduce a Statutory Framework for Deemed Approvals in Urban Development	55
3.3 Establish Uniform Development Control Rules (DCR) and State Processing Centres for Building Plan Approvals	56
3.4 Empower Empanelled Professionals for Self-Approval of Standard Building Plans	57
3.5 Transparent Dashboards on Time for Approval & Status	58
3.6 Competent Authorities like ULBs / Planning Authorities etc. & Government Authorities to be accountable to RERA	58
3.7 Preventing Unauthorized / Informal Housing	59
3.8 Centralized NoC Integration	60
3.9 TDR Marketplace	62
PILLAR 4: FINANCING & COSTING	64
4.1 Rationalisation of Development and Approval Charges	65
4.2 Infrastructure Financing through Dedicated Funds	71
4.3 Government Back Infrastructure & Housing Bonds	72
4.4 Ensuring Financial Viability of Social Housing (Affordable Housing and Social Rental Housing) for Rural & Urban	73
4.5 Reform Circle Rates to Reflect Market Realities	75
4.6 Encouraging Private Public Partnerships	76
4.7 CSR Contribution	77
PILLAR 5: REDEVELOPMENT	78
5.1 Area-Based Redevelopment Rather than Project-Based	79
5.2 Slum Redevelopment – Whole of Slums Approach	81
5.3 State Slum Rehabilitation Authority	82
5.4 Redevelopment Roadmap 2047 for cities to be developed	83
5.5 Community Participation in Urban Redevelopment Process	85

PILLAR 6: GREEN AND SUSTAINABLE LIVING 86

6.1	Government Must Lead - All New Government Buildings to Be Net-Zero + Retrofit Existing Stock	89
6.2	Fast-Track Environmental Clearance for Net-Zero Buildings	92
6.3	Incentivize Greater Green Building Adoption	93
6.4	Incentivize Green Retrofitting – Launch a National Green Retrofit Mission	95
6.5	Ensure Continuity of Green Operations – Link Property Tax to Sustainability Performance	96
6.6	Launch Pilot Net-Zero Townships with Private Sector Participation	97
6.7	Construction and Demolition Waste Management	98

PILLAR 7: CONSTRUCTION AND PROPERTY TECHNOLOGY 100

7.1	R&D & Centre of Excellence on Con-Tech & Prop-Tech	101
7.2	Startup and SME Support	102
7.3	Investment Funds for Women-Led Companies in Real Estate	103
7.4	Develop Technical Capacity in New Construction Technologies	104
7.5	Building Information Modelling (BIM) and Digital twin for Future City Development	105

PILLAR 8: SKILL DEVELOPMENT AND LABOUR WELFARE 106

8.1	State-Led Labour Demand Assessment and Trade-Specific Training Infrastructure	107
8.2	Strengthen Public-Private Partnerships (PPP) Across the Skilling Value Chain	108
8.3	Raise Aspirational Value of Vocational Education through Integration and Visibility	109
8.4	Reform Utilization of Labour Cess to Directly Benefit On-Site Workers	110
8.5	Implement Youth Upskilling Programme Integrating “Job needs + Training + Certification + Job placement”	111

PILLAR 9: EASE OF LIVING 112

9.1	Every Major Urban Centre to celebrate Cultural Uniqueness / Heritage	113
9.2	Citizen-Driven City Governance	115
9.3	Climate Resilience of Urban Infrastructure	116

04

ROLE OF CREDAI IN NATION BUILDING 118

4.1	Role of CREDAI in Achieving Vision 2047 for India's Real Estate Sector	119
4.2	Implementation Plan for Achieving Vision 2047	122



FOREWORD

As India prepares to mark 100 years of Independence in 2047, the leadership of our nation has set for itself the bold vision of becoming a developed economy - Viksit Bharat and achieving a multi-trillion-dollar GDP milestone. In this journey, the real estate and construction sector will be one of the foremost drivers of growth and transformation. The sector already contributes nearly 15% to GDP, supports millions of livelihoods, and plays a decisive role in shaping the quality of life across urban and rural India. As our cities expand and new growth centres emerge, real estate will not only accelerate economic progress but also redefine the future of living for generations to come.

The National Real Estate Development Framework – Vision 2047 has been prepared by the Executive Committee of CREDAI under the leadership of Shri Shantilal Kataria. It provides a comprehensive roadmap to align the sector with India's aspirations of becoming a Vishwa Guru, guided by the philosophy of Vasudhaiva Kutumbakam and driven by the adoption and development of innovative technologies. The framework emphasizes housing for all, sustainable and resilient urban growth, adoption of advanced technology, and strengthening of ease of doing business.

The roadmap is structured around nine pillars, encompassing land reforms, urbanization and future-ready cities, financial planning and financing, redevelopment and sustainability, skilling/reskilling/upskilling of workforce, technological upgradation, and improved ease of living. These reforms will bring in greater discipline, enhance quality standards, improve global competitiveness, and instill the much-needed transparency in the larger interest of society.

CREDAI remains deeply committed to this national mission. Our members across the country are working to promote sustainable development, advocate progressive policy reforms, skill a future-ready workforce, and foster innovation. Through this framework, we reaffirm our pledge to act as catalysts of inclusive growth and partners in nation building.

The future of Indian real estate is not just about creating buildings but about building communities, livelihoods, and aspirations. With coordinated efforts between government, industry, and civil society, the sector is poised to play a defining role in nation building.

Together, we will set new global benchmarks for the real estate sector and position it as a cornerstone of Viksit Bharat by 2047.

Shri Shekhar G. Patel

President,
CREDAI





EXECUTIVE SUMMARY

India's Vision 2047 articulates an ambitious roadmap for transforming the real estate sector and urban development. It envisions a future where every Indian has access to safe, secure, and affordable housing, achieving 100% home accessibility in both rural and urban areas. The vision foresees Indian cities emerging as global role models of urban excellence, ranking among the top cities worldwide for liveability by 2047.

By this time, India aims to be a global hub for research, innovation, and advanced construction (Con-Tech) and property technologies (Prop-Tech) in the real estate sector, driving cutting-edge development. The motto "Made in India, Built for the World" reflects the sector's aspiration to not only provide homes for India but also to design and develop world-class real estate projects across the globe.

Sustainability is a core priority, with the real estate sector striving for net-zero carbon footprint targets. The aim is for India to attain the first rank globally in ease of doing construction and business by 2047, fully digitalizing the real estate ecosystem - from planning and approvals to ownership transfers.

Real estate will play a pivotal role as a driver of economic growth and employment, becoming a pillar of India's \$30 trillion economy, and generating millions of skilled jobs. This vision embodies India's commitment to building inclusive, innovative, sustainable, and globally competitive urban environments by the nation's centenary of independence.

The vision document lays out a comprehensive strategy to modernize India's real estate and urban development ecosystem through nine pillars aimed at transforming regulatory frameworks, urban planning, construction ease, financing, redevelopment, sustainability, technology, skill development, and overall ease of living.

The first pillar - land reforms -

prioritizes ensuring conclusive land titling through the Land Titling Act and creating a unified national digital land register to enhance transparency and accessibility. The enactment of the Registration Bill 2025 aims to simplify and expedite land registration and mutation processes. Additionally, the creation of land banks focused on affordable housing, whether ownership-based or rental, along with timely land acquisition, zoning and master planning reforms, digitization, and governance simplification, form the backbone of this pillar.

Pillar two emphasizes developing future cities, targeting 100 new “cities of tomorrow.” This includes

fostering new counter magnet and satellite cities as growth engines, revitalizing existing urban centres through heritage-sensitive regeneration, reforming urban planning for purpose-based zoning, ensuring infrastructure readiness, and merging housing and urban development departments for greater administrative coherence.

Ease of doing construction

constitutes the third pillar, seeking to transform building plan approvals via digitization, transparency, and time-bound processing. The introduction of a statutory framework for deemed approvals, establishment of uniform development control rules and state processing centres, empowerment of empanelled professionals for self-approval of standard plans, and transparent approval dashboards aim to boost efficiency. Accountability of competent authorities under RERA, prevention of unauthorized and informal housing, centralized integration of NoCs, and development of a TDR marketplace complement these reforms.

In the **fourth pillar, financing and costing reforms** target rationalizing development and approval charges and setting up dedicated funds for infrastructure financing, including government-backed infrastructure and housing bonds. Financial viability of social housing, circle rate reforms, encouragement of private-public partnerships, and leveraging CSR contributions form important strategies.

The fifth pillar tackles

redevelopment with a shift from project-based to area-based approaches, advocating a whole-of-slums approach for slum redevelopment, empowering state slum rehabilitation authorities, crafting a redevelopment roadmap through 2047, and promoting community participation in urban redevelopment.

Green and sustainable living

comprises the sixth pillar, where government leadership is highlighted to ensure all new government buildings are net-zero and existing ones are retrofitted. Fast-tracking environmental clearances, incentivizing green building adoption and retrofitting through a national mission, linking property tax with sustainability performance, piloting net-zero townships with private sector participation, and managing construction and demolition waste are key initiatives.

The seventh pillar focuses on

construction and property technology, emphasizing research and development centers of excellence, startup and SME support - especially for women-led enterprises - capacity building in new construction technologies, and promoting BIM and digital twin technologies for future city planning.

Skill development and labor welfare

form the eighth pillar, advocating state-led labor demand assessments and trade-specific training infrastructure, strengthening public-private partnerships in the skilling value chain, raising the aspirational value of vocational education, reforming labor cess utilization to directly benefit workers, and implementing youth upskilling programs that integrate job needs, training, certification, and placement.

The final pillar, ease of living,

promotes celebrating cultural uniqueness and heritage in all major urban centers, advancing citizen-driven governance models, and incorporating climate resilience into urban infrastructure.

CREDAI's pivotal role in nation-building is acknowledged through its commitment to realizing Vision 2047 via advocacy, capacity building, and policy support. The roadmap to implementation includes constituting high-level committees at the Prime Minister's level, state-level war rooms, and a phased implementation plan spanning short, medium, and long-term goals.

Together, these pillars chart a path toward a transparent, sustainable, inclusive, and technologically advanced real estate and urban development ecosystem fit for India's ambitious future.

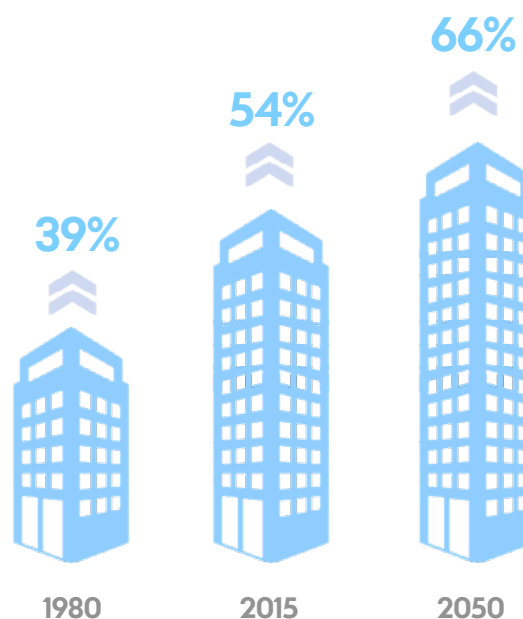


INTERNATIONAL AND NATIONAL OUTLOOK ON THE REAL ESTATE SECTOR

By 2050, nearly two-thirds of the world's population (640 crore people) will live in urban areas, up from just 39% in 1980. This rapid urbanisation means 245 crore additional urban dwellers, translating into a demand for 48,000+ new housing units every day worldwide.

Countries like India, China, and parts of Africa will drive much of this growth, while highly urbanised nations such as Japan, the US, and the UK already have urbanisation levels above 80%. This global urban shift presents both an opportunity and a challenge: cities must grow sustainably while meeting massive housing needs.

Figure 1 | Percentage of Global Urban Population



Yet, urbanisation has often outpaced housing access. As of 2020, 1.1 billion people lived in slums or slum-like conditions, with 80% concentrated in Asia and Africa. While the proportion of slum dwellers declined marginally (from 25.4% in 2014 to 24.2% in 2020), the absolute numbers continue to rise due to rapid migration. This underscores the urgent need for inclusive urban development and affordable housing solutions, without which urban poverty and inequality will only deepen further.

Figure 2 | Slum Population (in Crores)

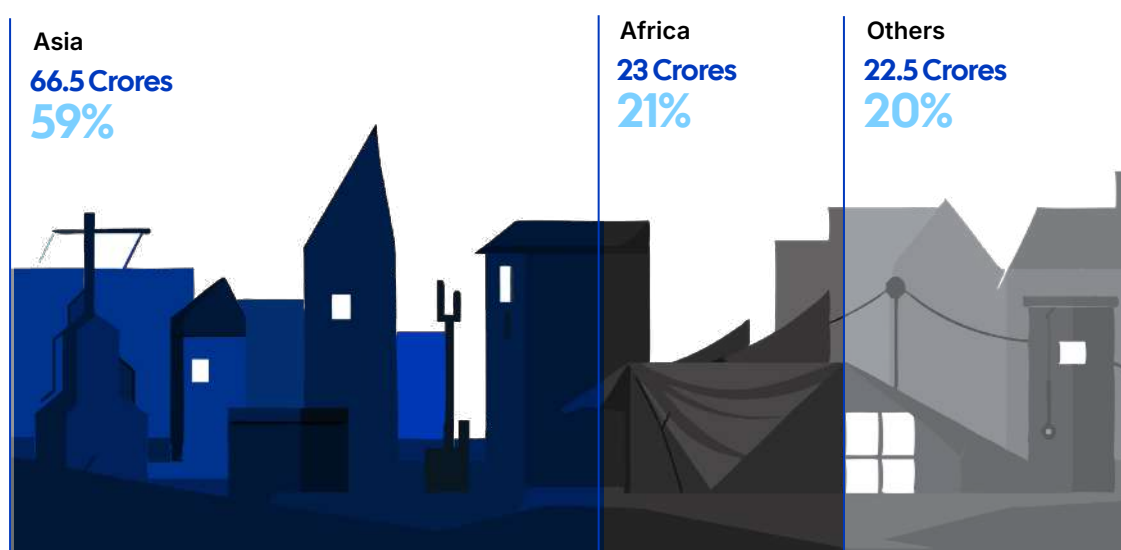


Figure 3 | Percentage of Urban Population by Countries, 2025

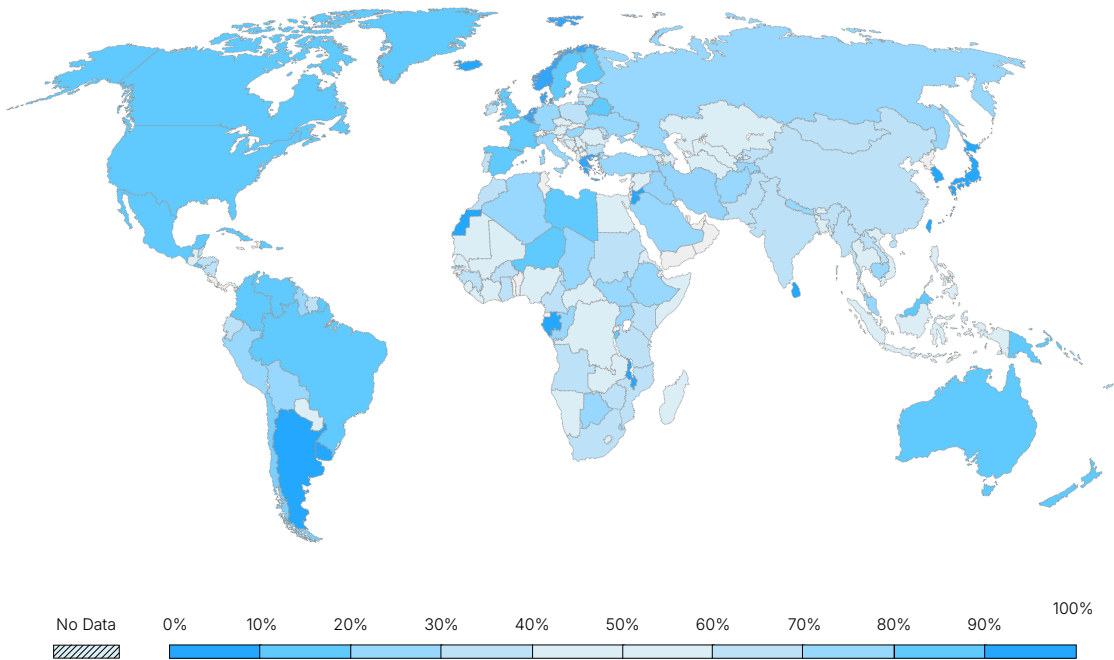
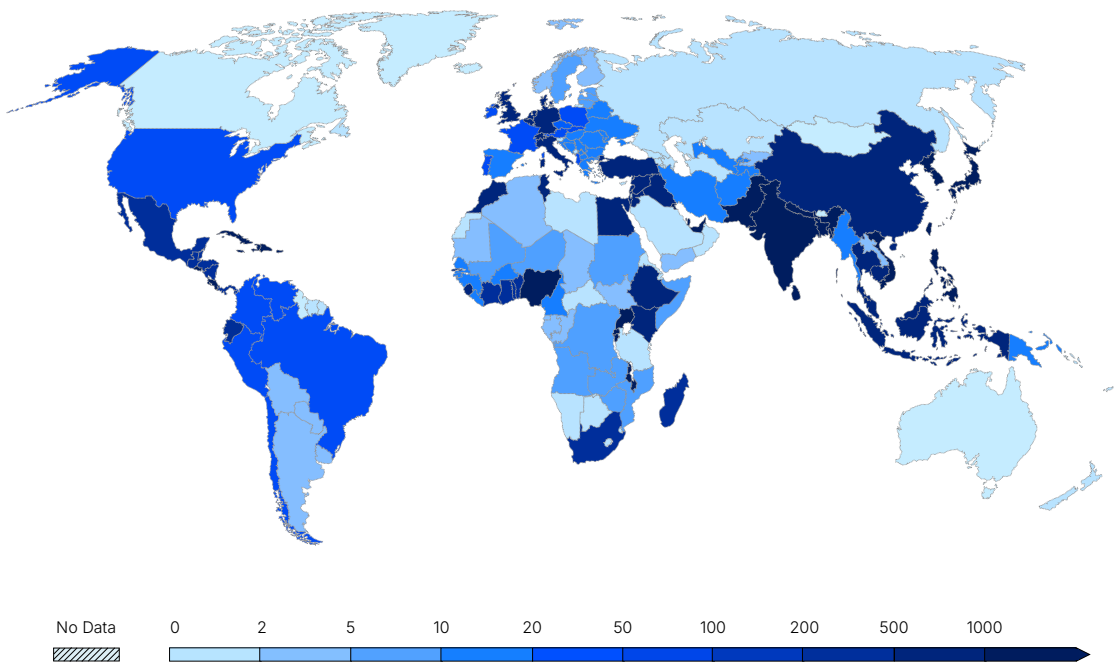
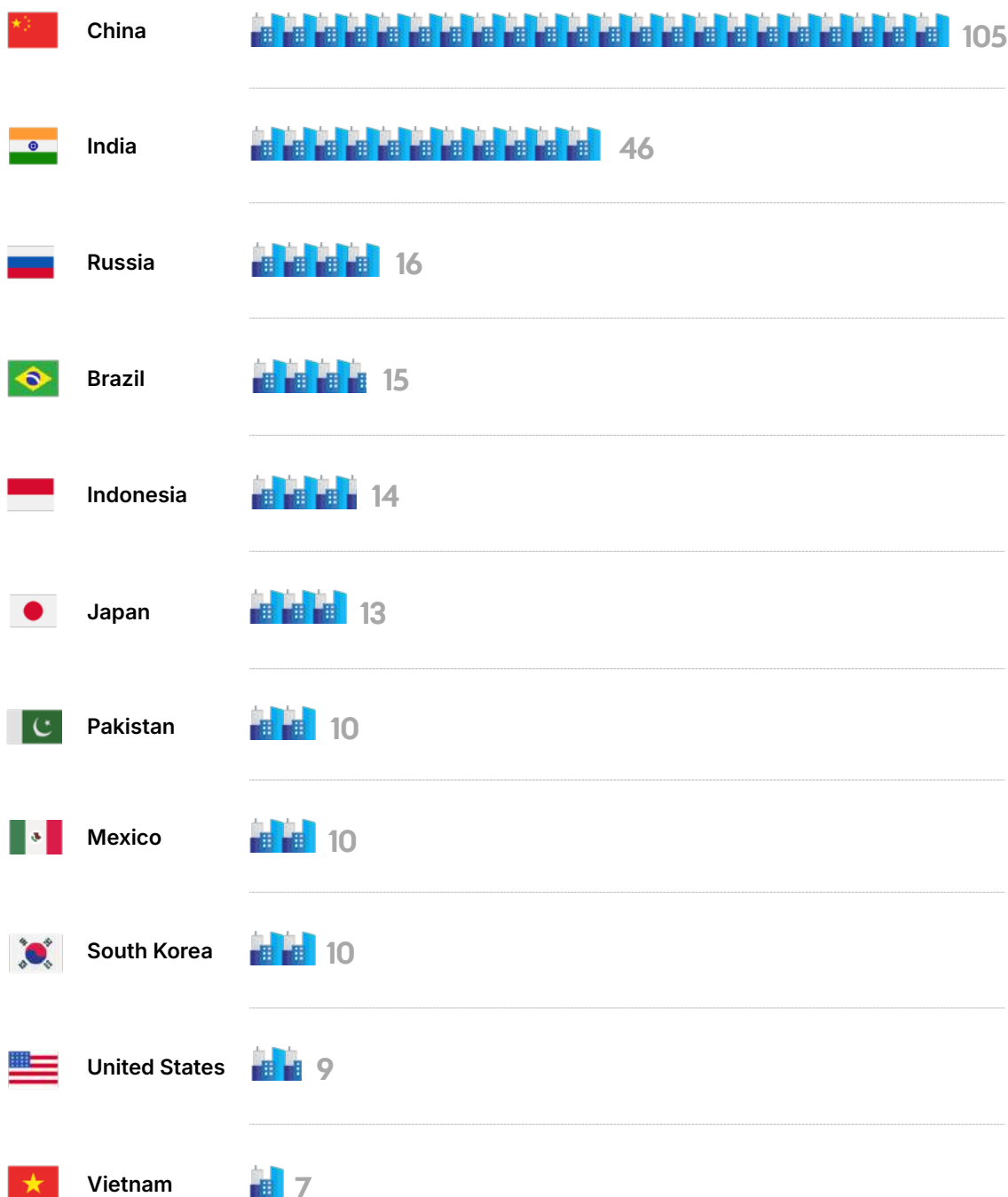


Figure 4 | Population Density: Number of people per km² of land area



India stands at the cusp of a massive urban transition. Though India has one of the highest population densities (492 people/km²), it has less than half the number of large cities compared to China (46 cities with over 10 lakh people versus China's 105).

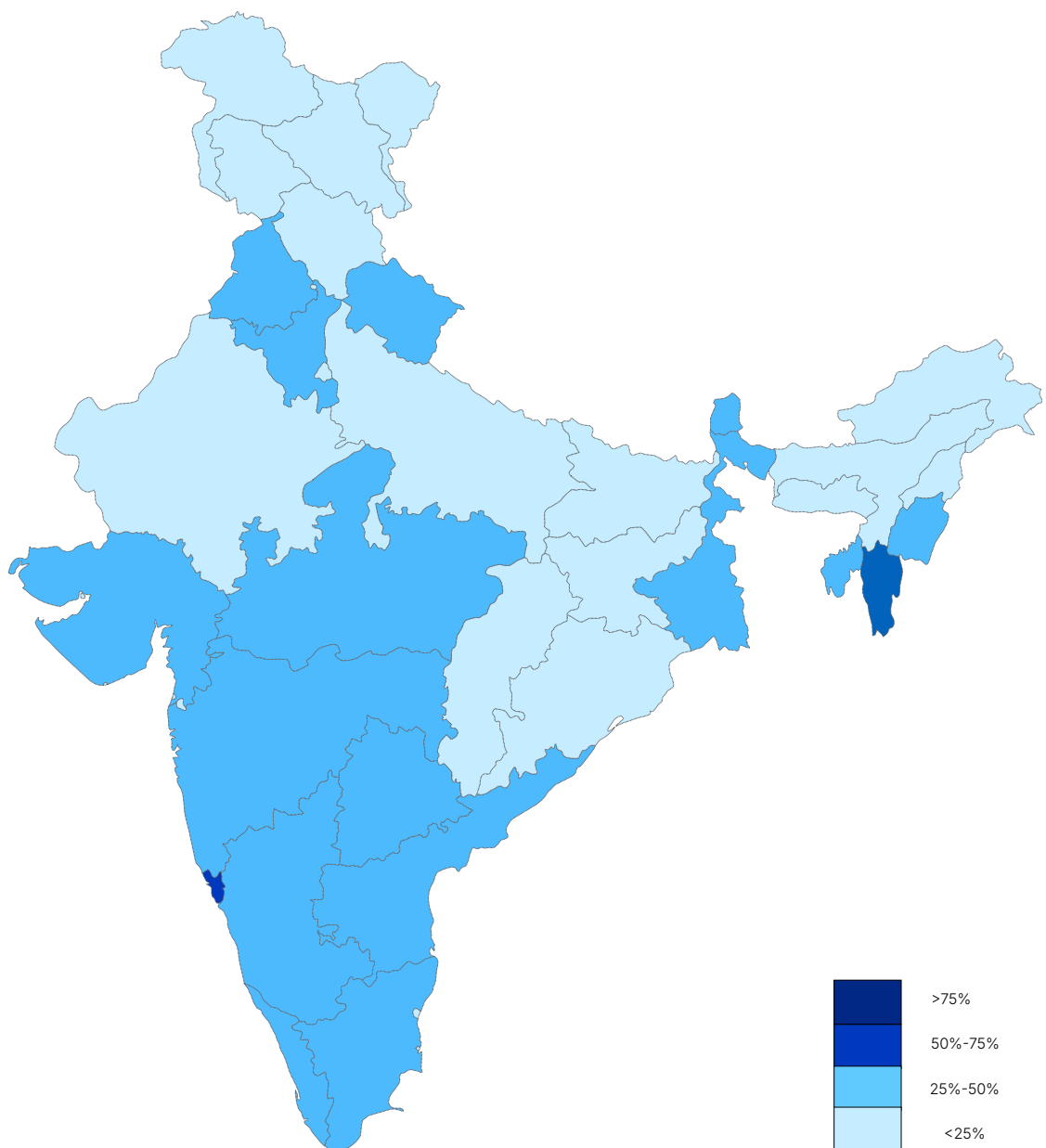
Figure 5 | Number of Cities with 10 Lakh+ Population



By 2050, India's urban population will nearly double, rising from 48 crore in 2020 to 95 crore.

To meet this demand alone, India will need to build 10,200+ new housing units per day, excluding redevelopment requirements. Urbanization is more advanced in southern states such as Goa, Tamil Nadu, Kerala, and Maharashtra, while northern states show lower levels. This signals the need for planned expansion and creation of more large cities across the country.

Figure 6 | Percentage of Urban Population to Total Population in India



The real estate and construction sector is central to meeting the massive housing demand. Already, it contributes 14.7% to India's GDP (8.8% from construction and 5.9% from real estate services). It is the second largest employer after agriculture, engaging 13% of the labour force and supporting over 250 ancillary industries such as cement, steel, and tiles. Importantly, the sector is end-user driven, with 64% of buyers purchasing homes for self-use. This makes real estate a cornerstone of India's \$30 trillion economic vision, as investments in housing and infrastructure not only address urban needs but also drive broad-based economic growth.

Table 1 | Top 20 Cities with Highest Slum Population (Year 2011) ¹

Sr. No	State	City/Town	Slum Population
1	Maharashtra	Greater Mumbai (M Corp.) (Part)	52,06,473
2	Andhra Pradesh	Greater Hyderabad Municipal Corporation (M Corp. + OG) (Part)	22,87,014
3	Delhi	Delhi Municipal Corporation (U) (Part)	16,17,239
4	West Bengal	Kolkata (M Corp.)	14,09,721
5	Tamil Nadu	Chennai (M Corp.)	13,42,337
6	Maharashtra	Nagpur (M Corp.)	8,59,487
7	Andhra Pradesh	Greater Visakhapatnam Municipal Corporation (Part)	7,70,971
8	Karnataka	Bruhat Bengaluru Mahanagara Palike (M Corp. + OG) (Part)	7,12,801
9	Maharashtra	Pune (M Corp.)	6,90,545
10	Madhya Pradesh	Indore (M Corp. + OG) (Part)	5,90,257
11	Uttar Pradesh	Meerut (M Corp.)	5,44,859
12	Uttar Pradesh	Agra (M Corp.)	5,33,554
13	Madhya Pradesh	Jabalpur (M Corp. + OG) (Part)	4,83,626
14	Madhya Pradesh	Bhopal (M Corp.)	4,79,699
15	Gujarat	Surat (M Corp.) (Part)	4,67,434
16	Andhra Pradesh	Vijayawada (M Corp.) (Part)	4,51,231
17	Uttar Pradesh	Kanpur (M Corp. + OG)	4,25,008
18	Chhattisgarh	Raipur (M Corp. + OG)	4,06,571
19	Uttar Pradesh	Lucknow (M Corp.)	3,64,941
20	Maharashtra	Bhiwandi Nizampur (M Corp.)	3,45,386

¹ Census of India, 2011

While the real estate sector addressed housing demand, the need for affordable and inclusive housing remains a pressing challenge. As per World Bank data of 2019, about 5% of Indians, about 6.3 crore people live in slums. While the share has marginally declined over the years, the absolute number has risen, with states like Maharashtra, Andhra Pradesh, West Bengal, Uttar Pradesh, and Tamil Nadu accounting for the largest slum populations. This makes affordable and inclusive housing not just a social necessity, but also a policy imperative. Addressing it will unlock healthier cities, reduce inequality, and ensure that India's urban growth story is sustainable and equitable, paving the way for a stronger, more resilient economy.

Figure 7 | Percentage of Slum Population to Urban Population in India

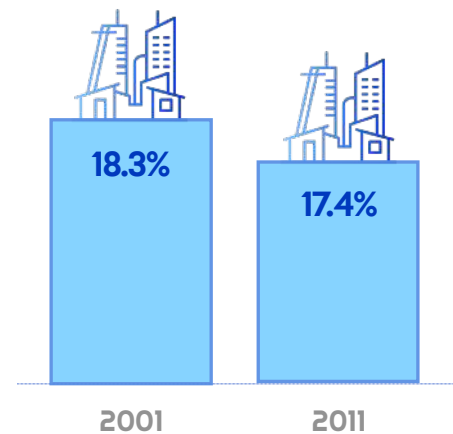
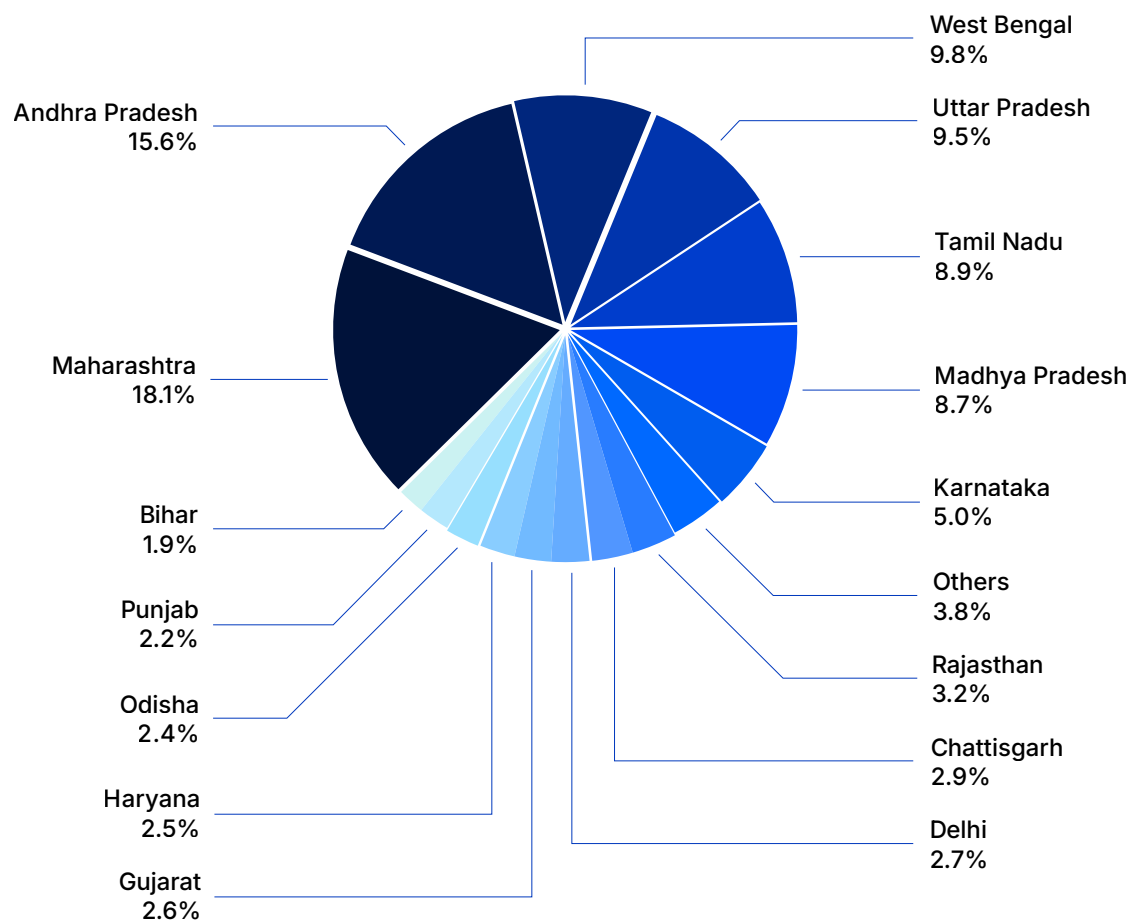


Figure 8 | State share of Slum Population to Total Population in India



Recognising the urgency of housing for all, the Government of India launched the Pradhan Mantri Awas Yojana (PMAY) as part of the Housing for All 2020 mission, which was later extended with the vision of providing a safe, secure, and affordable housing to every household by 2047 - marking 100 years of India's Independence. The initiative has already sanctioned over 3 crore houses, of which nearly 2.6 crore have been completed and delivered across urban and rural India. With its focus on beneficiary-led construction, interest subsidy under the Credit-Linked Subsidy Scheme (CLSS), and promotion of green and disaster-resilient technologies, PMAY has emerged as one of the largest affordable housing programmes in the world. Its scale, reach, and inclusive design strongly position it as the driver that will enable India to achieve the goal of housing for all by 2047.

Looking ahead, the real estate sector will play a transformative role in shaping India's urban and economic future. By 2047, India aspires to rank first in the world in Ease of Doing Construction and Real Estate Business, powered by a fully digitalised ecosystem that streamlines everything from planning and approvals to ownership and transactions.

This will establish transparency, efficiency, and global investor confidence. Simultaneously, the sector is set to become a core driver of India's \$30 trillion economy, creating millions of skilled jobs, catalysing over 250 allied industries, and anchoring sustainable, inclusive urbanisation.



02

**VISION FOR
REAL ESTATE
SECTOR -
VIKSIT BHARAT
@ 2047**

In 2047, when India attains 100 years of Independence, the Real Estate Sector would ensure:



Housing for All

Every Indian has access to safe, secure, and affordable housing – **100% Home Accessibility in Rural & Urban Areas**



India's Cities of 2047: Global Role Models of Urban Excellence

Indian cities will rank among the top global cities for livability



Global Hub for Research, Innovation & Advanced Technology

By 2047, India will be a Global hub for research, innovation, and advanced Con-Tech & Prop-Tech in the real estate sector



Made in India, Built for the World

Indian real estate sector will not only build homes for India but will design and **develop world-class projects across the globe.**



Net-Zero Real Estate

Real Estate Sector should strive for zero carbon footprint



1st Rank in Ease of Doing Construction & Business

India will top global rankings in ease of doing construction and real estate business. By 2047, India will lead in fully digitalized real estate — from planning to ownership

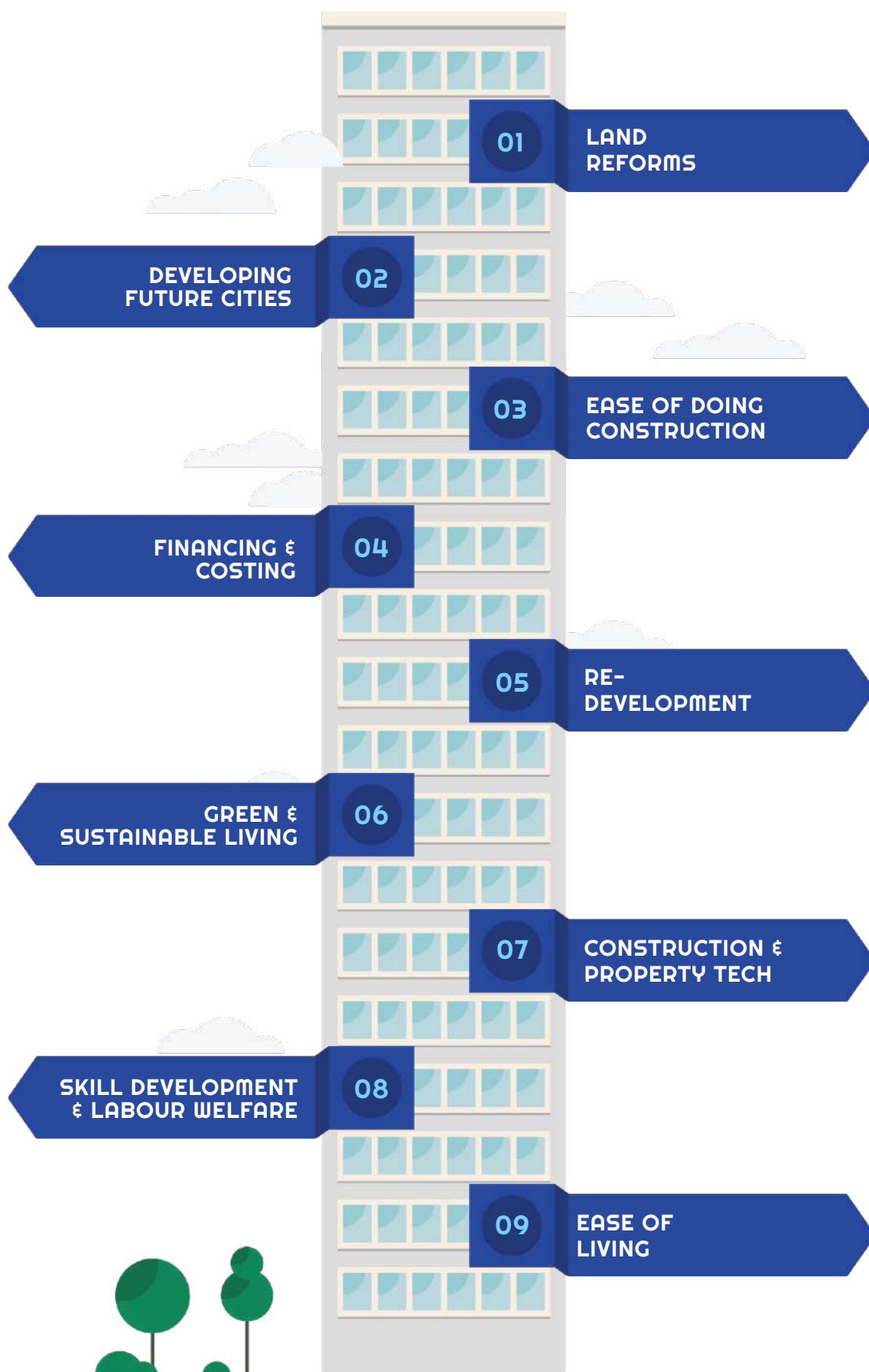


Real Estate as a Driver of Economic Growth & Employment

The sector will be a pillar of India's \$30 trillion economy by 2047, creating millions of skilled jobs

03

KEY PILLARS OF THE REFORM AGENDA





PILLAR 1

LAND REFORMS

India's real estate and infrastructure sectors face a systemic bottleneck: land-related disputes. Around **66% of civil cases in India are related to land or property disputes**, and **about 25% of cases decided by the Supreme Court involve land issues**.

The average resolution time for acquisition cases at the Supreme Court is over 20 years. As of 2025, total pending court cases exceed 52 million, with over 85% (45 million) pending in district courts.

Land disputes constitute 20% of these overall pending cases and account for 66% of all pending civil cases. ²

These disputes not only burden the judiciary but also delay critical infrastructure and real estate projects, discouraging investment and shrinking economic value, while ambiguous titles and protracted court disputes deter capital inflows into real estate and manufacturing, stalling job creation and economic scaling. Against this backdrop of pervasive land disputes and systemic barriers, the following reforms seek to chart a pathway toward transparent, efficient, and growth-oriented land governance.

1.1 ENSURE CONCLUSIVE TITLING THROUGH THE LAND TITLING ACT

Ambiguous land ownership and prolonged disputes continue to hinder India's real estate and infrastructure development. A shift from presumptive titling to a nationwide conclusive land titling system backed by law and supported by the state guarantee would help address the persistent challenge of land-related disputes, thereby unlocking economic growth, boosting business confidence, and reducing litigation.

Transition to Conclusive Land Titling in India







India should shift from a **presumptive to a conclusive land titling system**, with the state guaranteeing title validity and providing compensation in case of error or fraud, in line with the Committee on Financial Sector Reforms (2009) and global best practices. Countries such as **Australia, the UK, Singapore, South Korea, and Thailand** have successfully implemented conclusive titling, a model followed by **over 80 nations** worldwide.

A **Land Titling Act** should:

- ✓ Establish definitive, state-backed land titles and ensure **compensation for errors or fraud**.
- ✓ Mandate **complete digitisation and geo-referencing** of land records linked to verified identities.
- ✓ Set up **specialised tribunals** for dispute resolution within defined timelines.

² Centre for Policy Research, Understanding Land Conflict in India and Suggestions for Reform, Accessed on 12.08.2025, <https://cprindia.org/understanding-land-conflict-in-india-and-suggestions/>

A **transitional framework** should address existing disputes, while **state-backed indemnity funds** can boost investor confidence and unlock capital for real estate and infrastructure. A comparative matrix based on the proposed Land Titling Act and its parameters, showing how Australia, the UK, Singapore, South Korea, Thailand, and India stack up on those parameters.

						
Parameter	Australia	UK	Singapore	South Korea	Thailand	India (Current)
Enactment of the Dedicated Act	Yes. The Torrens Title system has been enshrined in state laws since 1858	Yes. Land Registration Act 2002	Yes. Land Titles Act 1993	Yes. Real Name Real Estate Act 1995, Cadastral Act 1961	Yes. Land Code 1954	No. The Model Land Titling Bill exists, but has not been enacted nationally
State-Guaranteed Title & Compensation	Yes. State guarantee with indemnity funds	Yes. State guarantee and indemnity for errors	Yes. Government guarantee with an assurance fund	Yes. State guarantee and compensation fund	Yes. State guarantee via the Land Department	No. Presumptive titles only; no statutory compensation
Computerisation & Digital Integration	Full. All records digitised & geo-referenced	Full. Centralised HM Land Registry portal	Full. Integrated with Singpass, e-KYC	Full. Cadastral maps integrated with national ID	Partial/Full. Most records digitised, some rural gaps	Partial. 68% village maps digitised and only 157 ULBs are in the process of digitisation under DILRMP; integration gaps remain
Specialised Land Titling Tribunals	Yes. Land & Environment Courts in some states	Yes. Property Chamber in First-tier Tribunal	Yes. Dedicated land courts for disputes	Yes. Land Dispute Mediation Committees	Yes. Specialised Land Courts	Limited. Revenue Courts: few in number, time-consuming, and; no dedicated national tribunal
Transitional Dispute Clearance Mechanism	Yes. Conversion & settlement programs during Torrens adoption	Yes. Systematic first registration & adjudication	Yes. Title conversion program for older deeds	Yes. Land survey & registration drives	Yes. Systematic adjudication during digitisation	No. Ad hoc state programs; no national transitional framework
Investor Assurance & Title Insurance	Yes. Indemnity schemes via assurance funds	Yes. Market & state-backed title insurance	Yes. Assurance fund protects buyers/ lenders	Yes. Compensation fund for lenders & buyers	Yes. Compensation and insurance are optional	Minimal. Title insurance offered privately; no state backstop

A dedicated Land Titling Act should be enacted to legally support this shift, to improve ease of doing business, unlock economic potential, and boost investor confidence in the real estate and infrastructure sectors. Further, it enhances judicial efficiency, speeds up the real estate project cycle, and increases investor confidence, which will lead to economic growth.

1.2 CREATE UNIFIED NATIONAL DIGITAL LAND REGISTER

The **Digital India Land Records Modernisation Programme (DILRMP)**, launched in 2008 and subsumed under the Digital India initiative in 2016, represents the Government of India's flagship effort to digitise land records, integrate textual and spatial data, and improve service delivery. Under the DILRMP, about 68% of India's cadastral maps and 67% of textual records have been digitised nationwide, and 49% of land parcels were geo-referenced under the Unique Land Parcel Identification Number (ULPIN) by 2024. ³ NAKSHA (National geospatial Knowledge-based land Survey of urban Habitations) is a pioneering one-year pilot programme launched by the Department of Land Resources (DoLR) under the Digital India Land Records Modernization Programme (DILRMP). It aims to revolutionise urban land records across 157 Urban Local Bodies (ULBs) in 27 States and 3 Union Territories, covering over 4484 sq. km and benefiting 1.5 crore+ citizens.



This demonstrates strong momentum but also reveals gaps in completeness and centralisation. Nonetheless, its implementation remains fragmented, with data formats varying across states, incomplete geo-referencing coverage, and limited interoperability with financial institutions and legal systems. Furthermore, the lack of a unified national framework hampers transparency and results in inconsistencies in ownership validation, encumbrance checks, and historical traceability. These limitations underscore the need to move beyond DILRMP toward a Unified National Digital Land Register (UNDLR) that centralises, standardises, and safeguards land information nationwide.

³ Department of Land Records, Ministry of Rural Development, <https://dolr.gov.in/programmes-schemes/dilrmp/>, accessed on 16.08.2025



The proposed **Unified Digital National Land and Property Register (UNDLR)** would encompass the following key features:

- #1** **Create a fully digital, geo-referenced National Land and Property Register**, leveraging blockchain for tamper-resistance and auditable traceability, consolidating all property-related datasets across states into a single, real-time accessible platform.
- #2** **Integrate ownership records, boundaries, encumbrances, and transaction history** to ensure transparency, accuracy, and interoperability among citizens, financial institutions, and government agencies.
- #3** **Eliminate paper-based records and manual interventions to reduce disputes**, enhance service delivery, and boost investor confidence in land markets.
- #4** **Leverage existing DILRMP infrastructure**: All 36 states and UTs have State Data Centres and land digitisation cells, supported by over ₹4,000 crore from the central government.
- #5** **Accelerate digitisation and centralisation efforts** using geo-referencing, blockchain, and real-time platforms, combined with the Land Titling Act, **to create a future-ready land governance system**, reduce disputes, speed up services, and improve investment sentiment.

1.3 ENACTMENT OF REGISTRATION BILL 2025 & IMPLEMENT FAST, SIMPLIFIED REGISTRATION AND MUTATION PROCESS

Property registration in India still involves approximately 9 procedures, 7-15 days, and costs approximately 7-8% of property value (City of Bombay taken as a benchmark), which is too slow and costly for a modern real market whereas many states in already have digital infrastructure and data to bring the SLA of Land and Property registration to a level of developed countries.

As per the Department of Land Records, Ministry of Rural Development, as of 2024,

95% of **Record of Rights (RoR)** are computerised;
68% of **cadastral maps** are digitised;
95% of **Sub-Registrar Offices (SROs)** are computerised;
87% of **SROs** are integrated with land records. ⁴

The national registration platform NGDRS (One Nation One Registration Software) now covers 31 States/UTs, with 18 implemented so far. Out of these, 13 States/UTs are actively sharing live transaction data with the national NGDRS central database, and the system natively supports auto-mutation.

Integration with DILRMP, ULPIN, e-KYC, and encumbrance verification will reduce the risk of disputes, while automated dashboards and audit trails will strengthen governance and accountability. Overall, enactment of the Registration Bill, 2015, with these measures **will enhance investor confidence, streamline property transfers, and support a transparent, standardised, and legally secure land market.**

The Enactment of the Registration Bill 2025 mandates:

- #1** Mandates statewide implementation of **NGDRS** as the single-entry point for all conveyance deeds and related land services.
- #2** Supports **digital registration** using e-KYC, e-payment, and e-signature, eliminating physical presence.
- #3** Integrates with **circle rate databases, municipal property tax systems, banking networks, and e-Courts** to reduce delays and promote interoperability.
- #4** Provides **a single-window framework** with automatic land record mutation after registration.
- #5** Establishes **time-bound SLAs** for registration to mutation completed within 72 hours and will significantly reduce transaction costs by 7-8% via transparent, auto-calculated e-payments.
- #6** Quality and fraud prevention measures include **e-KYC, PAN validation, prohibited property registries, and encumbrance APIs.**

⁴ Department of Land Records, Ministry of Rural Development, <https://www.pib.gov.in/PressReleasePage.aspx?PRID=1989671&utm>, accessed on 16.08.2025

1.4 CREATE LAND BANKS FOR AFFORDABLE HOUSING (OWNERSHIP-BASED / RENTAL)

According to the UN's 2024 report, India's population is projected to reach around 1.68 billion by 2050, with a significant share concentrated in urban areas. This demographic shift will exert substantial pressure on urban housing demand, particularly in the affordable segment. However, escalating land prices within city limits pose a critical constraint, limiting the capacity of urban local bodies and development authorities to facilitate affordable housing supply at scale.

Since the 1990s, land banks established under the Urban Land (Ceiling and Regulation) Act (ULCRA), along with other allocations managed by Urban Local Bodies (ULBs) and State Housing Boards, have served as a crucial resource for meeting housing demand generated by rapid urbanisation. Land under the jurisdiction of State Housing Boards contributed to fulfilling overall urban housing needs, but it did not necessarily translate into enough housing stock for vulnerable and economically weaker sections due to the high share of the cost of land. To address the high land costs in urban areas, a major barrier to affordable housing, cities must identify and develop dedicated land banks within city limits specifically for affordable housing, including both ownership and rental options.

Unlocking Government and PSU Land for Affordable Housing

- #1 Underutilised Land Holdings:** Several government departments and PSUs, including Indian Railways, Defence Estates, and other central/state agencies, hold vast tracts of underutilised or encumbered land in and around urban areas.
- #2 Potential for Development:** Coordinated frameworks, land value capture instruments, and public-private partnerships can unlock these lands for mixed-use and affordable housing, optimising public assets and easing speculative pressure on private urban land markets.
- #3 State-wide Land Surveys:** States should conduct comprehensive surveys to identify and consolidate buildable land parcels, covering government-owned, PSU-held, underutilised, and Master Plan earmarked but undeveloped lands.
- #4 Digital Land Bank:** Create a district-wise digital land inventory, integrated with GIS, to enable evidence-based allocation of land for affordable housing (ownership and rental). This will improve transparency, reduce transaction risks, and facilitate inclusive, in-situ urban growth.

By unlocking government-held land banks and institutionalising a state-wide land inventory, ULBs and Housing Boards will be equipped to continuously augment affordable housing stock in line with population growth, urbanisation trends, and the objectives of Housing for All.

1.5 TIMELY LAND ACQUISITION

Delay in Land Acquisition is one of the key reasons for delays in key infrastructure and large-scale projects in India. Ensure Timely Land Acquisition through innovative means, including Land-Pooling and adjustment schemes.

The Land Acquisition Act of 2013 aimed to balance development needs with fair compensation for landowners, but its implementation has led to delays in acquiring land for infrastructure projects. Disputes over compensation, land valuation, and rehabilitation have slowed large-scale projects, including highways, railways, and industrial corridors. In some cases, land acquisition has taken up to seven years, significantly hampering India's ability to meet its infrastructure goals. Countries like China and South Korea have streamlined land acquisition processes through mechanisms like land readjustment and state-led land banking, enabling faster development while balancing compensation for landowners. International experience, such as South Korea's land readjustment programs, has shown that redistributing land among original owners, rather than resorting to full expropriation, minimises displacement, creates additional value for landowners, and reduces acquisition delays substantially. In these schemes, landowners typically receive between 60–70% of their original holding as serviced plots, which, due to infrastructure provision, significantly appreciates in market value compared to pre-scheme land prices.⁵

To streamline land acquisition processes and resolve related disputes, Special Land Acquisition Tribunals shall be established at the state level, ensuring the faster resolution of issues under relevant land and urban development laws. These tribunals will operate within clear jurisdiction, timelines, and appellate procedures to reduce delays in infrastructure and urban development projects. Additionally, evidence shows that Urban Local Bodies (ULBs) have played a crucial role in enabling land acquisition in many successful town planning and urban development models.

To formalise this role, both the State and the Central Governments should create a structured Performance-Linked Incentive and Penalty Framework based on Key Performance Indicators (KPIs) for ULBs.



⁵ World Bank, Land readjustment policies: Potential for transformative urban policy in the age of climate adaptation, accessed on 19.08.2025 <https://documents1.worldbank.org/curated/en/099100124053525592/pdf/P180002-1e146c52-162c-45d7-be97-fa2e0ade5b4f.pdf>

Successful Land Pooling Models in India



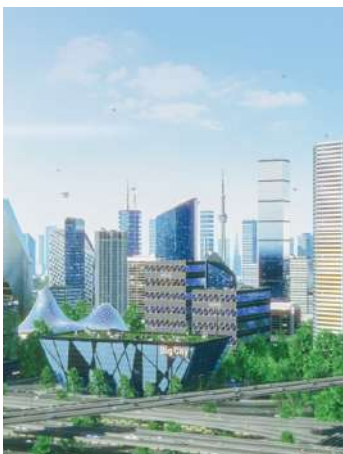
Gujarat Town Planning Schemes (TPS)

- ✓ Landowners contribute 30–40% of their holdings for roads, open spaces, public amenities, and affordable housing.
- ✓ The remaining 60–70% is returned as serviced plots, which appreciate in value due to infrastructure and regulated layouts.
- ✓ This model has enabled cities like Ahmedabad to deliver large-scale infrastructure with minimal displacement and reduced litigation.



Amaravati Land Pooling Scheme (Andhra Pradesh)

- ✓ About 27,000 farmers voluntarily contributed 33,000 acres for the new capital region.
- ✓ Landowners received 25–30% reconstituted residential and commercial plots, along with annual annuities and other benefits.
- ✓ The scheme demonstrated that transparent processes and fair returns can mobilise land rapidly for planned urban development.



Future City (Hyderabad)

- ✓ Planned as a large-scale, integrated urban hub adjacent to Hyderabad, envisaged on 30,000 acres of pooled land parcels.
- ✓ Farmers and landowners contributed land in return for reconstituted serviced plots and shares in the project's commercial value.
- ✓ Positioned as India's first Net-Zero Greenfield Smart City, envisioned as a model for sustainable urban development and technological innovation.



Magarpatta Township (Pune, Maharashtra)

- ✓ Over 120 farmer families came together to pool 400 acres of land, instead of selling to private developers.
- ✓ Formed the Magarpatta Township Development and Construction Company Ltd., where each family became a shareholder.
- ✓ The township was developed into a modern integrated city with IT parks, housing, schools, and healthcare facilities.
- ✓ Landowners benefited from steady dividends, employment opportunities, and long-term wealth creation, showcasing a self-driven, cooperative urban development model.

In addition to the land pooling and land readjustment, it is proposed that land acquisition be linked with the following innovative financial mechanisms:

- #1 Land acquisition can be paired with financial instruments such as **Transferable Development Rights (TDR), premium adjustments, and applicable fees** to streamline compensation.
- #2 Landowners can receive **direct cash and/or TDR certificates**, which developers can use elsewhere in the city **for higher FAR or trade in the market**.
- #3 Developers **paying premiums to ULBs or Development Authorities** for land use changes, additional FSI, or approvals can have a portion of **these payments redirected to fund acquisition costs**.
- #4 This dual mechanism ensures **a market-driven channel** of compensation for landowners, **reduces the upfront fiscal burden** on public agencies, and **aligns private sector benefits** with public infrastructure needs.

Drawing on these precedents, governments should leverage innovative models for timely land acquisition, like land pooling and readjustment schemes and adjustment of Land Acquisition against TDR / Premium adjustments as a primary mechanism for securing land for affordable housing, infrastructure projects, and urban expansion.

1.6 ZONING AND MASTER PLANNING REFORMS

A. Modernise Zoning Laws for Flexible Urban Development

India's zoning framework is fragmented and rigid, slowing project approvals and constraining land supply for housing, commercial and other mixed uses. To enable faster, more sustainable growth, zoning laws should **be modernised into broader, flexible categories**.

A single 'Urban Use Zone' can integrate multiple interdependent uses, including residential, commercial, healthcare, institutional, retail, business, malls, and non-hazardous storage facilities, promoting mixed-use, high-density, and walkable neighbourhoods.

International experiences from **Japan, South Korea, and Singapore** demonstrate that **such flexibility unlocks land for integrated development**, improves housing affordability, and reduces repeated change-of-land-use approvals.

Zoning should be streamlined to a minimum set of categories:



Urban Zone

Mixed-use, high-density development



Agricultural Zone

Protection of farmland and rural livelihoods



Heritage Zone

Conservation of cultural assets



Gamtal

Village settlement areas



Industrial Zone

Manufacturing, logistics, and allied uses

These reforms will modernise Indian cities' planning systems, strengthen **Ease of Doing Business**, cut compliance delays, expand private sector participation, and foster **sustainable, inclusive, and affordable urban growth**.

Furthermore, All **Urban Local Bodies (ULBs)** should mandatorily adopt a **Liveable Standards Guide** for building and urban design, ensuring inclusivity for **persons with disabilities, children, elderly, and women**. The guide must set minimum benchmarks for universal accessibility, safety, and user-friendly design, while also promoting **placemaking** as an equally important element in both **urban and rural neighbourhoods**, to foster vibrant, safe, and inclusive communities.

B. Promote Transit-Oriented Development (TOD)

India's cities are facing severe traffic congestion, air pollution, and long commute times, largely driven by urban sprawl and excessive dependence on private vehicles. To address these challenges, **Transit-Oriented Development (TOD) must be adopted as a core planning principle**, integrating land use and transport planning to create compact, mixed-use, and high-density communities around mass transit corridors.

Several Indian states and cities have already notified TOD policies (e.g., Delhi, Ahmedabad, Pune, Bengaluru), but implementation remains fragmented and slow.

A national framework for TOD, aligned with the National Transit Oriented Development Policy (2017), should be strengthened and made binding across states, with:

- #1 Time-bound implementation of TOD zones** in all major metro/BRT cities.
- #2 Integrate a multi-modal public transport system with Transit-Oriented Development (TOD) zones** to optimise land use along transit corridors, ensuring seamless connectivity between metro, bus, rail, and non-motorised transport.
- #3 Land value capture tools** (impact fees, betterment levies, premium FSI) to finance transit and public amenities.
- #4 Incentivising private sector participation** through higher Floor Area Ratios (FAR) and streamlined approvals in TOD zones.



1.7 TOWN PLANNING (TP) ACTS AND MASTER/DEVELOPMENT PLANS

A. Uniform Implementation of TP Acts across States

- #1 Progressive states such as **Gujarat and Maharashtra** have successfully used TP Acts for planned urban expansion via land pooling and reconstitution.
- #2 **Gujarat's Town Planning Schemes (TPS)** demonstrate effective urban growth with well-laid roads, open spaces, and affordable housing.
- #3 **Formulate Local Area Plans (LAPs) and Neighbourhood Plans** for planning at the micro scale, ensuring alignment with city-level master plans while addressing local infrastructure, mobility, housing, and community needs for more inclusive and responsive urban development.
- #4 Extend similar frameworks uniformly across all states, including those where adoption is pending (e.g., UP, MP), to ensure **consistency, predictability, and balanced national growth**.



B. Pre-defined Land Uses in TP Schemes

- #1 Gujarat's TPS uses **pre-defined zoning** within reconstituted land parcels, reducing the need for frequent **Change of Land Use (CLU)** approvals.
 - #2 Parcels designated for housing, commerce, or industrial purposes are **pre-approved**, enabling faster project execution.
 - #3 Implement similar nationwide exemptions, e.g., permitting worker housing in industrial estates without additional CLU approvals to accelerate industrial and housing development.
-

C. Reduce Master Plan Cycles

- #1 Current Master Plans (20–25 years) often lag behind rapid urbanisation, causing mismatches between approved land uses and emerging needs, leading to delays and informal developments.
 - #2 Cities like **Delhi and Bengaluru have seen mismatches** between approved land uses and emerging realities, resulting in delays and informal developments.
 - #3 **Reduce Master Plan cycles to 5–10 years**, following global best practices (e.g., Singapore revises its land-use Master Plan every 5 years) to improve adaptability to demographic and economic changes.
-

D. Accountability and Timelines

- #1 **Approval delays** remain a major bottleneck in urban development.
- #2 Enforce strict, time-bound approval timelines at every stage, supported by digitisation and single-window clearance systems.

1.8 DIGITIZATION AND TECHNOLOGY INTEGRATION

Traditional static master plans often fail to adapt to the fast-changing realities of urban growth. By **adopting GIS-enabled dynamic master plans and advanced tools like Digital Twins**, cities can layer data on land use, transport corridors, utilities, environmental features, and population density into a single system. These plans can be continuously updated to reflect new developments, allowing authorities to make evidence-based, real-time decisions.



Dynamic GIS-Based Master Plans

Develop real-time, GIS-enabled master plans that integrate multiple layers - utilities, transport, housing, and infrastructure for holistic and adaptive city planning.



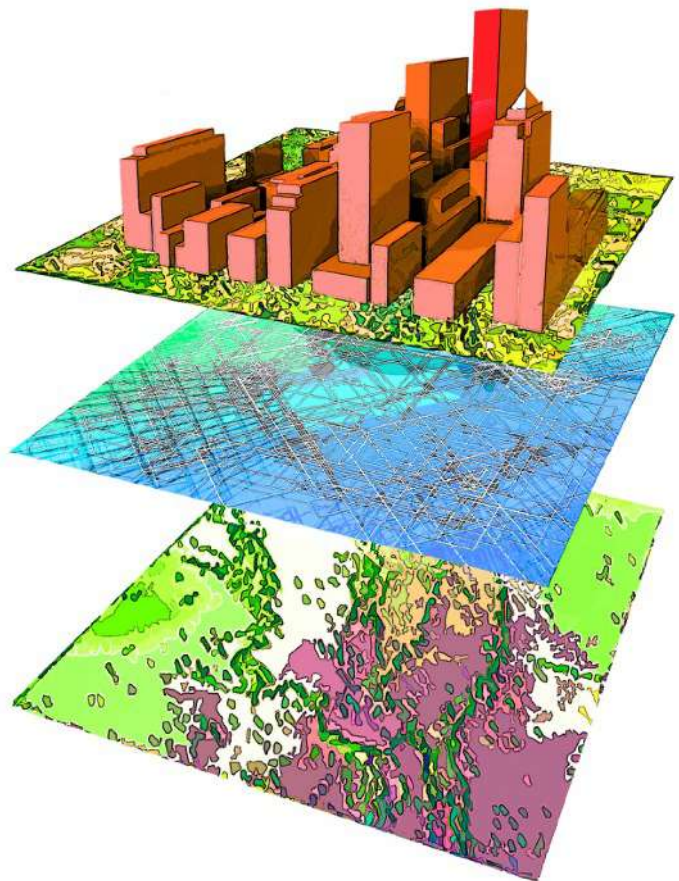
Digital Twin Technology

Use Digital Twin platforms to simulate and monitor urban systems, enabling predictive planning, scenario analysis, and better disaster preparedness. Singapore's Virtual Singapore project uses Digital Twin technology for real-time decision-making.



Integrated Portal for All Data Points of ULBs

Create a unified portal where all government departments, including ULBs, Revenue departments, Irrigation Department, Forest Department, Electricity Department, etc., can map and update their data points, including land records and infrastructure assets (roads, water, sewerage, power, telecom, etc.), ensuring interdepartmental coordination and reducing duplication of efforts. Gujarat and Karnataka are experimenting with GIS-based planning portals to improve coordination.



1.9 GOVERNANCE AND PROCESS SIMPLIFICATION

Delays in approvals, overlapping mandates, and excessive discretion in land and building permissions are among the biggest bottle-necks in India's urban development. To unlock private sector participation and accelerate project delivery, transparent, digital, and rule-based clearance systems must be institutionalised across states.



Create a Separate Civil Service Cadre for Spatial Planning and Development

Establish a dedicated Civil Service Cadre for Spatial Planning and Development to institutionalise expertise in land use, urban design, and regional planning, and to lead institutions responsible for spatial development.

This cadre would address the talent gap in planning agencies, strengthen evidence-based policymaking, and ensure continuity in the implementation of long-term development strategies.



Digital Approval Systems

Establish end-to-end online approval systems for land use, building permissions, and master plan implementation, integrated with GIS layers. These systems should allow developers and citizens to track applications in real-time, ensuring transparency, predictability, and accountability.



The TS-bPASS system in Telangana enables instant online building approvals for low-rise projects and has reduced approval times from months to days.





Single Window Clearance

Introduce a single-window clearance mechanism that consolidates approvals for land-use change, conversion of leasehold to freehold, partition, demarcation, and other permissions. This reduces the multiplicity of authorities and the uncertainty of sequential approvals.



Gujarat's Investor Facilitation Portal has streamlined industry-related clearances through single-window systems.



Scrapping or Automating Non-Agricultural (NA) Permissions

In many states, even land already earmarked for residential, commercial, or industrial use in master plans requires additional "non-agriculture" (NA) clearance, an outdated requirement that creates unnecessary delays and scope for discretion. Once land is zoned for a specific use in a notified master plan, conversion from agriculture to that use should be automatic upon payment of the requisite fees, without requiring discretionary approvals.



Empowering Local Bodies

Local municipal bodies, being closest to ground realities, should be empowered to approve land-use conversions and building permissions, within the framework of clearly defined policies in city development plans. This will ensure faster, context-sensitive decision-making.



Environmental Clearance (EC)

The **EIA Notification, 2006**, which currently governs the Environmental Clearance process, has become outdated and requires a comprehensive revision.

The reform should focus on:

✓ Streamlining Approval Timelines:

At present, obtaining **EC often takes more than six months**, leading to substantial project delays and cost overruns. The revised framework should mandate a maximum of **20 working days** for the entire EC process, including evaluation and final decision.

✓ Strengthening Compliance Mechanisms:

Establish clear, transparent, and well-defined methods for identifying and addressing violations of EC conditions. Implement graded penalties and corrective measures to ensure accountability without unnecessarily stalling projects.

✓ Decentralisation of EC for Mid-Sized Projects:

Delegate authority to Urban Local Bodies (ULBs) to grant EC for building and construction projects up to **150,000 sq. m**, in the form of standard bylaws. This will enable faster approvals, enhance local accountability, and integrate environmental safeguards within city-level governance.



Rule-Based, Automated Clearances

The discretionary powers of officials should be replaced by automated, rule-based approvals. Applications should be evaluated against predefined parameters (e.g., zoning, setbacks, road width, FAR/FSI) and cleared automatically if they comply.

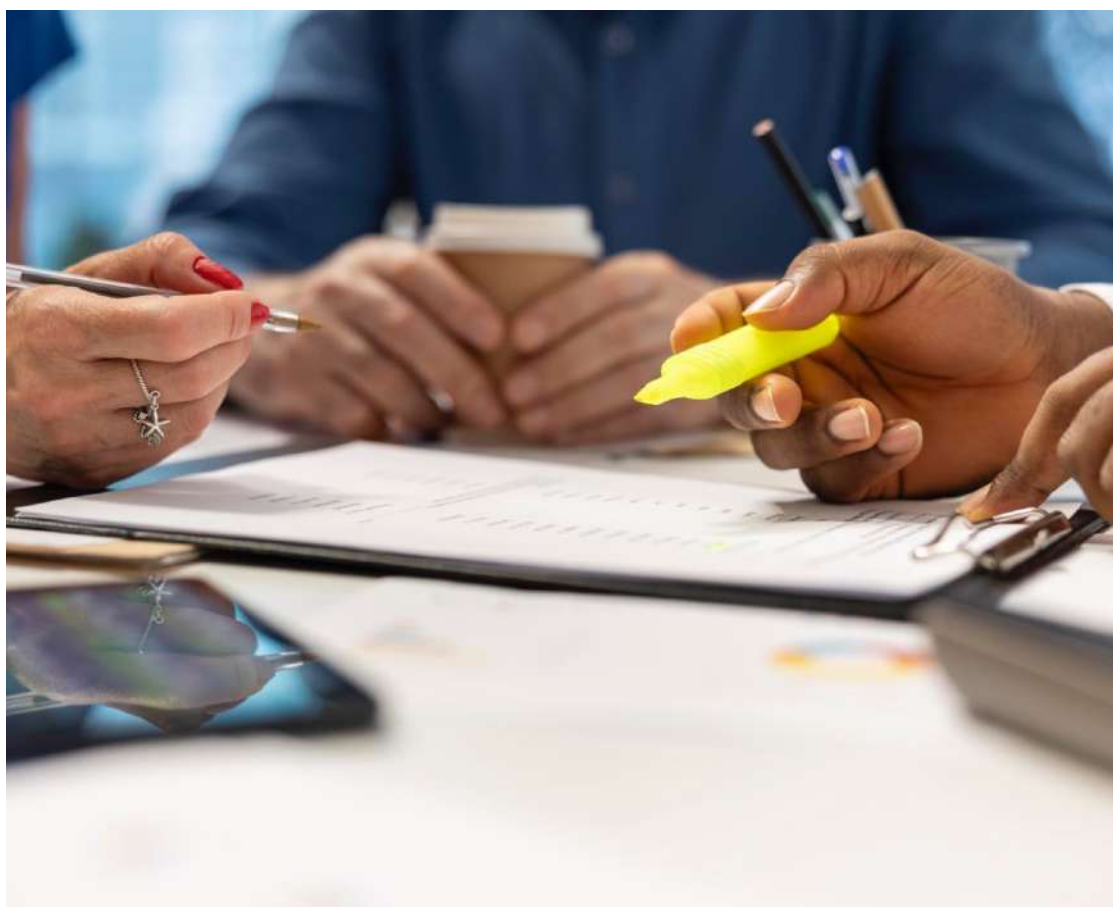


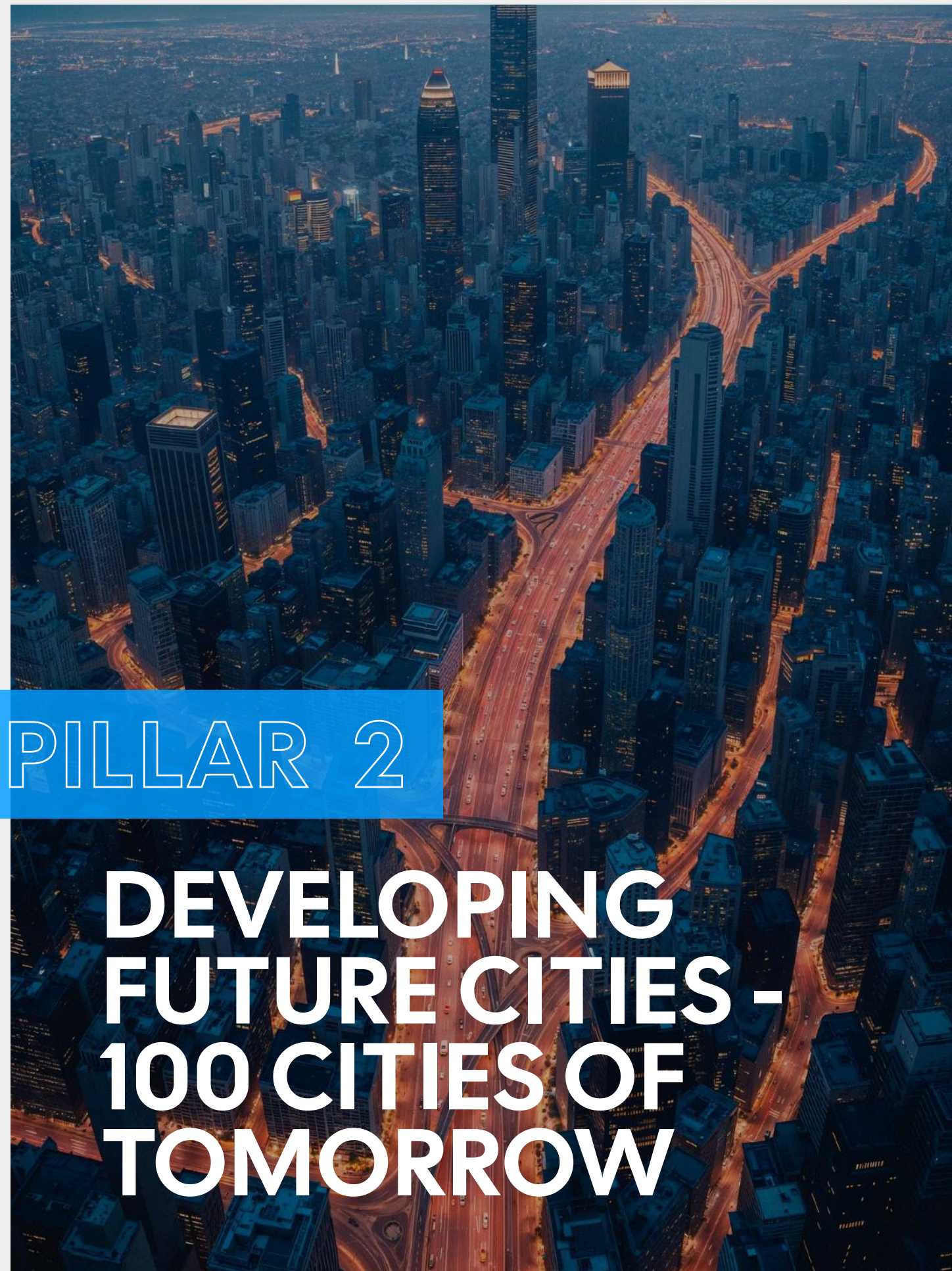
Singapore's CORENET system and Haryana's OBPAS automate compliance checks against building codes and zoning regulations, significantly cutting approval timelines.



Aviation NOC (No Objection Certificate)

The Aviation NOC process for areas impacted by both civilian and defence airports should be fully digitised through an integrated online platform equipped with real-time application tracking and monitoring features. The system should be designed to automatically generate NOCs for projects whose heights fall within the permissible limits prescribed for funnel zones. Such projects would not be required to obtain a separate Aviation NOC, thereby streamlining the approval process, reducing delays, and ensuring compliance with prescribed safety standards.





PILLAR 2

DEVELOPING FUTURE CITIES - 100 CITIES OF TOMORROW

2.1 NEW COUNTER MAGNET / SATELLITE CITIES AS GROWTH ENGINES OF FUTURE

India has experienced rapid urbanisation since the early 1990s, largely driven by integration with global markets. This growth and expansion of Indian cities have largely been organic and unplanned, placing significant pressure on infrastructure, housing, and public services.

In addition, urban population distribution is highly concentrated, with a few major cities accounting for a disproportionate share of residents. A UN report notes that **26% of India's urban population is concentrated in just 10 major cities** - an imbalance that contrasts starkly with the broader urban landscape of 7,935 towns recorded in Census 2011.

Figure 9 | Share of Urban Population: Top 10 Cities vs. Rest of Urban Areas

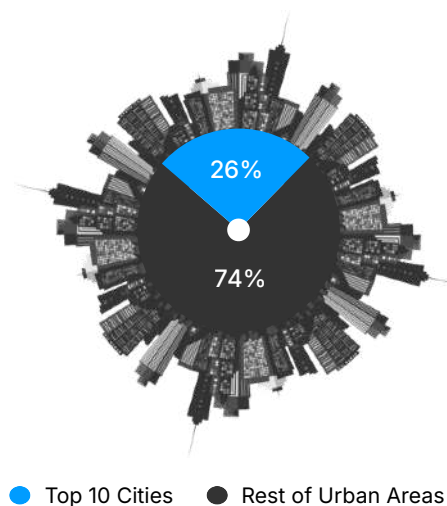
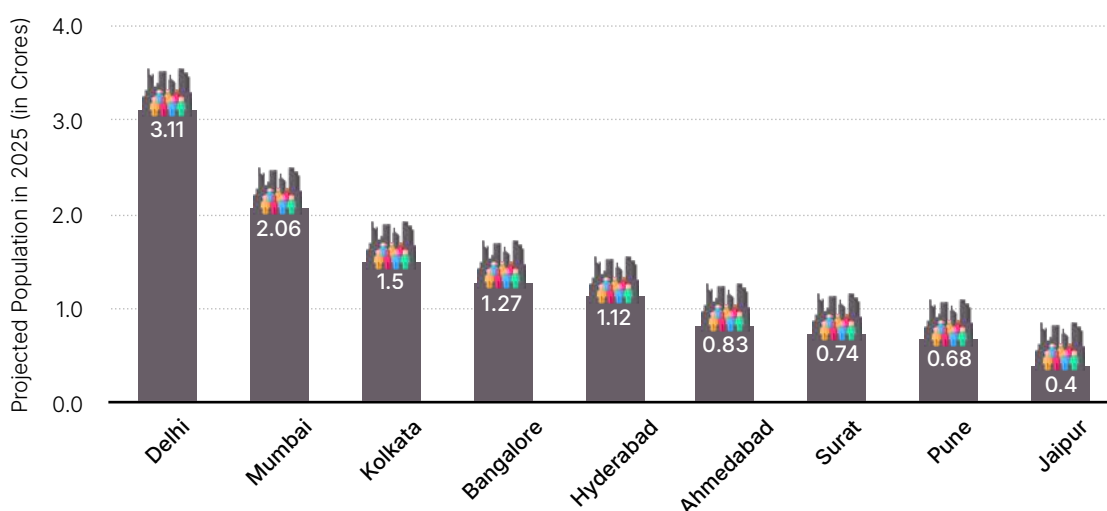


Figure 10 | Population of Top 10 Cities in India



As a result, **the existing set of cities is already creaking under the weight of their current residents**, and they struggle to accommodate further. This highlights both the necessity and the potential for developing new cities and satellite towns.

Consequently, the Government has decided to undertake a special mission for the development of new cities aimed at ensuring balanced urban growth. In its report on fiscal devolution for the period 2021-26, the 15th Finance Commission recommended the allocation of ₹8,000 crore for the establishment of eight new cities. The Ministry of Housing and Urban Affairs has since received 26 proposals for new cities.

In addition to the new cities, **the Government should develop 100 new satellite cities and economic zones** (list attached) as counter-magnets to alleviate congestion in existing urban centres. This will provide residents in surrounding areas with comparable social, economic, and growth opportunities, similar to those found in big cities.



These satellite cities should be envisioned as **"Cities of the Future,"** and their success will depend on the development of the following key aspects:



Strengthening of Economic Base Functions

- ✓ Promote robust economic activities in counter-magnet areas **to create local employment and growth opportunities.**
- ✓ **Reduce migration pressure on major cities** by providing attractive prospects for the working-age population locally.



Physical and Social Infrastructure

- ✓ Develop high-quality infrastructure, including universities, professional colleges, and cultural facilities, **to support economic growth.**
- ✓ Enhance tourism and cultural destinations, fostering social and institutional development in the region.



Strengthening of Regional Linkages

- ✓ Establish strong connections between counter-magnet areas (CMAs), surrounding hinterlands, and major cities **for seamless movement of goods, services, and talent.**
- ✓ **Boost regional integration and growth** by leveraging infrastructure and economic development across connected areas.

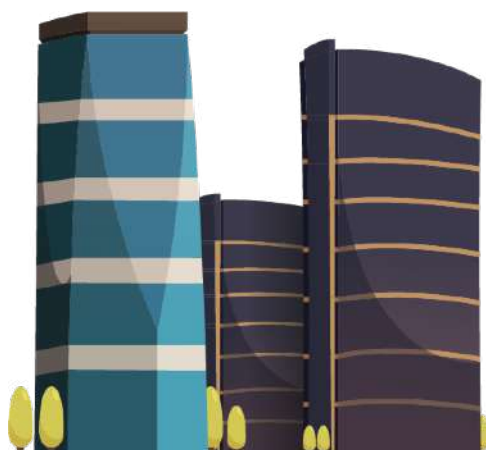
Strategy to develop Counter-Magnetic Cities

A two-pronged strategy is envisaged for the development of CMAs: (a) urban development and (b) economic development, which are elaborated below:



Urban Development Strategy

- ✓ State Governments should prepare a **comprehensive 20-year Development Plan and Action Plan**, covering land use, area planning, population distribution, housing, transportation, physical and social infrastructure, and economic development zones.
- ✓ These plans should **align with the broader Regional Plan as well as the Metropolitan Development Plan** while focusing on urban planned areas.
- ✓ **States should also promote investment and development in the influence zones of Counter-Magnet Areas (CMAs)** through state policies, integrated with District Development Plans.



Economic Development Strategy

- ✓ Identify and promote initiatives to drive economic growth, such as **Industrial Parks, SEZs, and Model Industrial Estates**.
- ✓ Recognise that investors value flexibility and ease of doing business; government-directed location strategies alone are often ineffective.
- ✓ **Leverage market mechanisms as the primary driver for attracting investment**, while local and state governments facilitate growth through targeted incentives and an enabling environment.



Resource Mobilisation

- ✓ **Timely implementation of development initiatives** in counter-magnet areas is crucial to leverage prevailing economic conditions.
- ✓ **Mobilise resources from multiple sources**, including State and Central Governments, private sector investment, FDI, and other viable financing options.

2.2 REVITALISING EXISTING CITIES – URBAN REGENERATION WITH HERITAGE SENSITIVITY

Many Indian cities are grappling with ageing infrastructure, congested streets, inadequate public spaces, and a lack of modern amenities, particularly in core urban areas. There is a pressing need to undertake comprehensive urban regeneration to transform these zones into vibrant, liveable, and sustainable city districts.

The Government should **launch a dedicated National Urban Regeneration Mission to re-develop 10–15 high-potential urban areas in each city** through a phased and strategic approach.

Cities will be responsible for identifying priority areas, which may include old central business districts, transit corridors, or deteriorated residential pockets, and for preparing integrated regeneration strategies covering:



Master Planning and Urban Design

Formulation of spatial plans to guide redevelopment, optimise land use, and enhance urban aesthetics.



Transport and Mobility Integration

Upgradation of public transport systems, pedestrian-friendly pathways, and traffic management solutions.



Housing and Slum Rehabilitation

Redevelopment of substandard housing, provision of affordable housing, and inclusive community planning.



Heritage Conservation and Public Space Enhancement:

Preservation of historic structures and creation of accessible public spaces to enhance cultural and social value.



Infrastructure Modernisation and Climate Resilience

Upgradation of utilities, adoption of smart-city technologies, and integration of climate-resilient infrastructure solutions.

This mission will serve as a model for **area-based transformation, combining community participation, public-private investments, and innovative planning** to reshape the urban fabric for the aspirations of India@2047.

2.3 REFORM URBAN PLANNING TO ENABLE PURPOSE-BASED ZONING

India's prevailing urban planning framework continues to **rely predominantly on land-use-based zoning** (e.g., residential, commercial, industrial), which often does not adequately address the evolving needs of contemporary cities.

This rigid framework restricts flexibility in meeting the demand for affordable housing, rental housing, co-living, senior housing, and mixed-use developments, thereby limiting opportunities for inclusive and efficient urban growth.

To address these challenges, there is a **need to transition towards a purpose-based zoning framework**, which explicitly earmarks and integrates land for diverse housing and community requirements. This approach should include the following:



Affordable Housing Zones

Integrated within city cores to ensure proximity to employment and services.



Rental Housing Districts

Strategically located near employment hubs, industrial clusters, and major transit nodes.



Student and Senior Living Zones

Dedicated provisions catering to specific demographic needs, with supporting amenities and services.



Mixed-Income and Inclusive Housing Clusters

Promoting social integration and equitable urban development.



Transit-Oriented Mixed Use Development Zones

Enhancing density and accessibility through integration of residential, commercial, and mobility infrastructure.

The Government should formulate revised model planning guidelines to institutionalise purpose-based zoning across States.

These guidelines should be linked to incentives for cities to update their Master Plans and Development Plans, ensuring alignment with the broader objectives of social inclusion, economic efficiency, and spatial integration.

This reform will be pivotal in creating future-ready, equitable, and resilient cities, in line with India's development vision for 2047.

2.4 URBAN INFRASTRUCTURE READINESS

Sustainable and viable urban development requires that **trunk and core infrastructure**, such as roads, water supply, drainage, electricity, and gas networks, **be provisioned concurrently with, or in advance of, development approvals.**

Evidence from the infrastructure sector demonstrates that inadequate coordination between infrastructure delivery and real estate development creates systemic delays.

Nearly 50% of large infrastructure projects (₹150 crore and above) have experienced delays, with an average lag exceeding 36 months and cost overruns of approximately 19%. These inefficiencies not only escalate housing costs but also erode the overall livability and competitiveness of urban areas.



Link Development Approvals to Infrastructure Readiness

- ✓ **Development approvals should be sequenced and prioritised in zones** where physical and social infrastructure are already operational or can be delivered within a defined, time-bound framework.
- ✓ This mechanism will prevent the emergence of unplanned, underserved settlements and reduce the burden of post-facto retrofitting.



Infrastructure Financing Mechanisms

ULBs and state governments may adopt innovative financing models to ensure timely provisioning, including:

- ✓ **Land Value Capture (LVC):** Harnessing appreciation in land values generated by infrastructure investments to finance future works.
- ✓ **Impact Fees/Betterment Charges:** Requiring developers to contribute proportionally to infrastructure costs in high-growth areas.
- ✓ **Public-Private Partnerships (PPPs):** Leveraging private capital and expertise for infrastructure development under defined risk-sharing frameworks.

2.5 MERGE HOUSING AND URBAN DEVELOPMENT DEPARTMENTS

At present, in most Indian states, Housing Departments (HDs) and Urban Development Departments (UDDs) **operate as separate entities with fragmented and overlapping mandates**. UDDs are primarily responsible for overall urban development, whereas HDs focus largely on housing schemes, state housing boards, and targeted beneficiary-oriented interventions. This institutional bifurcation often leads to duplication of efforts, overlapping jurisdictions, and weak coordination, ultimately delaying project delivery and reducing the efficiency of urban growth management.

Housing cannot be planned in isolation from transport, water, sanitation, and land use systems. Similarly, urban planning is incomplete without a housing strategy that addresses affordability, inclusivity, and density management. **Combining the Housing and Urban Development Departments will create an integrated governance structure capable of delivering on India's urbanisation challenges at scale.** This reform will enable coherent planning, efficient project delivery, and affordability in housing, thereby strengthening the foundation for Viksit Bharat @2047.

Proposed List of 100 Cities Identified for Satellite Town Development

Sr. No	City/Urban Agglomeration	State/UT
1	Vijayawada	Andhra Pradesh
2	Nellore	Andhra Pradesh
3	Visakhapatnam	Andhra Pradesh
4	Guntur	Andhra Pradesh
5	Kurnool	Andhra Pradesh
6	Guwahati	Assam
7	Patna	Bihar
8	Chandigarh	Chandigarh/Punjab/Haryana
9	Raipur	Chhattisgarh
10	Durg-Bhilai	Chhattisgarh
11	Panaji	Goa
12	Surat	Gujarat
13	Rajkot	Gujarat
14	Ahmedabad	Gujarat
15	Vadodara	Gujarat
16	Jamnagar	Gujarat
17	Faridabad	Haryana
18	Gurugram	Haryana
19	Rewari	Haryana
20	Rohtak	Haryana

Sr. No	City/Urban Agglomeration	State/UT
21	Srinagar	Jammu & Kashmir
22	Dhanbad	Jharkhand
23	Ranchi	Jharkhand
24	Jamshedpur	Jharkhand
25	Bengaluru	Karnataka
26	Belagavi	Karnataka
27	Hubballi-Dharwad	Karnataka
28	Davanagere	Karnataka
29	Mangaluru	Karnataka
30	Mysuru	Karnataka
31	Kochi	Kerala
32	Kozhikode	Kerala
33	Thiruvananthapuram	Kerala
34	Alappuzha	Kerala
35	Gwalior	Madhya Pradesh
36	Indore	Madhya Pradesh
37	Jabalpur	Madhya Pradesh
38	Bhopal	Madhya Pradesh
39	Nagpur	Maharashtra
40	Aurangabad	Maharashtra
41	Kolhapur	Maharashtra
42	Mumbai	Maharashtra
43	Nashik	Maharashtra
44	Jalgaon	Maharashtra
45	Pune	Maharashtra
46	Thane	Maharashtra
47	Amravati	Maharashtra
48	Ahmednagar	Maharashtra
49	Nanded	Maharashtra
50	Solapur	Maharashtra
51	Imphal	Manipur
52	Shillong	Meghalaya
53	Aizawl	Mizoram
54	Delhi	NCT Delhi (plus NCR states)
55	Bhubaneswar	Odisha
56	Cuttack	Odisha
57	Puducherry	Puducherry
58	Amritsar	Punjab
59	Jalandhar	Punjab
60	Ludhiana	Punjab

Sr. No	City/Urban Agglomeration	State/UT
61	Mohali	Punjab
62	Jaipur	Rajasthan
63	Ajmer	Rajasthan
64	Kota	Rajasthan
65	Udaipur	Rajasthan
66	Jodhpur	Rajasthan
67	Chennai	Tamil Nadu
68	Tiruchirappalli	Tamil Nadu
69	Salem	Tamil Nadu
70	Tiruppur	Tamil Nadu
71	Hosur	Tamil Nadu
72	Coimbatore	Tamil Nadu
73	Madurai	Tamil Nadu
74	Hyderabad	Telangana
75	Karimnagar	Telangana
76	Nizamabad	Telangana
77	Warangal	Telangana
78	Khammam	Telangana
79	Agartala	Tripura
80	Varanasi	Uttar Pradesh
81	Agra	Uttar Pradesh
82	Ghaziabad	Uttar Pradesh
83	Kanpur	Uttar Pradesh
84	Noida	Uttar Pradesh
85	Prayagraj	Uttar Pradesh
86	Lucknow	Uttar Pradesh
87	Aligarh	Uttar Pradesh
88	Ayodhya	Uttar Pradesh
89	Bareilly	Uttar Pradesh
90	Gorakhpur	Uttar Pradesh
91	Meerut	Uttar Pradesh
92	Moradabad	Uttar Pradesh
93	Dehradun	Uttarakhand
94	Srinagar	Uttarakhand
95	Haldwani	Uttarakhand
96	Haridwar	Uttarakhand
97	Durgapur	West Bengal
98	Howrah	West Bengal
99	Asansol	West Bengal
100	Siliguri	West Bengal

PILLAR 3

EASE OF DOING CONSTRUCTION

India ranks 27th globally in “Dealing with Construction Permits” (Doing Business 2020), a significant improvement, yet further reforms are needed to streamline approval processes, reduce compliance burdens, and ensure transparency.

A comparative matrix to show the gap between international benchmarks, progressive Indian practices, and the prevailing situation in most Indian states can help establish the urgency for systemic reforms:

Comparative Benchmarking: Building Plan Approvals & Urban Development Practices

Parameter	International Benchmark	Progressive Indian States	Current Situation in Most Indian States
Approval Timelines	Singapore : 10–14 days; South Korea : 10–15 days	Andhra Pradesh : Introduced a 72-hour fast-track approval system for high-rise building permits.	45–90+ days for just building plans; often delayed further due to manual file movement While environmental clearances take 1-1.2 years for approval. Additional approvals like fire, airport authority for heights are also required which cause further delay.
Deemed Approval	France & Germany : Tacit consent laws (auto-approval after deadline)	Telangana : Statutory deemed approval provisions	No deemed approval in most states
Uniform Development Control Rules (DCR)	UK & Singapore : Standardized national codes	Maharashtra : Unified DCPR 2020	Different by-laws across ULBs;
Centralized Processing	Singapore CORENET : One-stop clearance	Andhra Pradesh : APDPMS: single digital platform	Fragmented, ULB-specific systems; partial digitization
Self-Certification by Professionals	UK : Approved Inspectors; Singapore : Qualified Persons; Australia : Private Certifiers	Telangana & Haryana : self-certification for small residential plots	Most states lack structured empowerment of professionals
Transparency (Dashboards)	Singapore CORENET : Public dashboard with status & timelines	-	Tracking limited; dashboards often internal or not real-time
Regulatory Oversight (RERA Accountability)	EU models : Regulators cover all stakeholders, incl. govt agencies	-	RERA covers only promoters/agents, not govt authorities
Unauthorized Housing Prevention	Brazil : Strict GIS-based monitoring; strong penalties	Delhi NCR & Haryana : GIS mapping + colony regulation	Informal colonies and unregulated layouts proliferate

These systemic gaps collectively increase project costs, reduce investor confidence, and delay housing delivery, underscoring the urgent need for structural reforms to bring India’s urban development framework in line with international best practices.

3.1 TRANSFORM BUILDING PLAN APPROVALS THROUGH DIGITIZATION, TRANSPARENCY & TIME-BOUND PROCESSING

The current building plan approval process in many Urban Local Bodies (ULBs) is **lengthy, inconsistent, and opaque**, leading to project delays, cost overruns, and loss of investor confidence.

International benchmarks indicate the efficient building can process approvals in 10-15 days. To streamline and modernize the system, it is imperative to **standardize and digitize** the entire approval process across all ULBs.

Key features of the proposed reform include:

- #1** Limit approvals to a maximum of **three decision-making levels**, eliminating unnecessary bureaucratic layers.
- #2** Mandate **full IT enablement** of the approval process - including application submission, document checks, tracking, and communication.
- #3** Applications must be submitted **online only**, with built-in validation to ensure **incomplete submissions are auto rejected**.
- #4** Impose a **strict 30-day deadline** for final decision by the Planning Authority, with **clearly defined timelines for each stage**.



This reform will significantly improve **ease of doing business**, promote **transparency and accountability**, and accelerate the delivery of real estate and infrastructure projects in line with India's urban development goals. In 2025, Andhra Pradesh introduced a 72-hour fast-track approval system for high-rise building permits. A dedicated cell has been established within the DTCP office at Mangalagiri to exclusively process applications for such projects, ensuring quicker clearances and reducing procedural delays.

3.2 INTRODUCE A STATUTORY FRAMEWORK FOR DEEMED APPROVALS IN URBAN DEVELOPMENT

To improve efficiency, transparency, and accountability in urban project approvals, the government should introduce a **statutory "Deemed Approval" provision** within the urban planning and building regulatory framework.

Under this provision:

- #1 **All applications** (building plans, NOCs, layout approvals, etc.) submitted through the designated **digital platform** must be decided upon **within a fixed time frame** (e.g., 30 days).
- #2 If the **competent authority fails to act within the prescribed timeline**, the application shall be considered **"deemed approved" by default**, subject to compliance with applicable laws and design standards.
- #3 The authority must issue a **formal approval certificate** as deemed approval.
- #4 **Deemed approval shall not apply to cases involving violations**, missing documents, or illegal land use, and any misuse will attract **strict penalties**.

The introduction of a Deemed Approval framework will reduce discretionary delays, enhance investor confidence, and support the timely execution of real estate and infrastructure projects — especially critical in fast-growing urban centers.



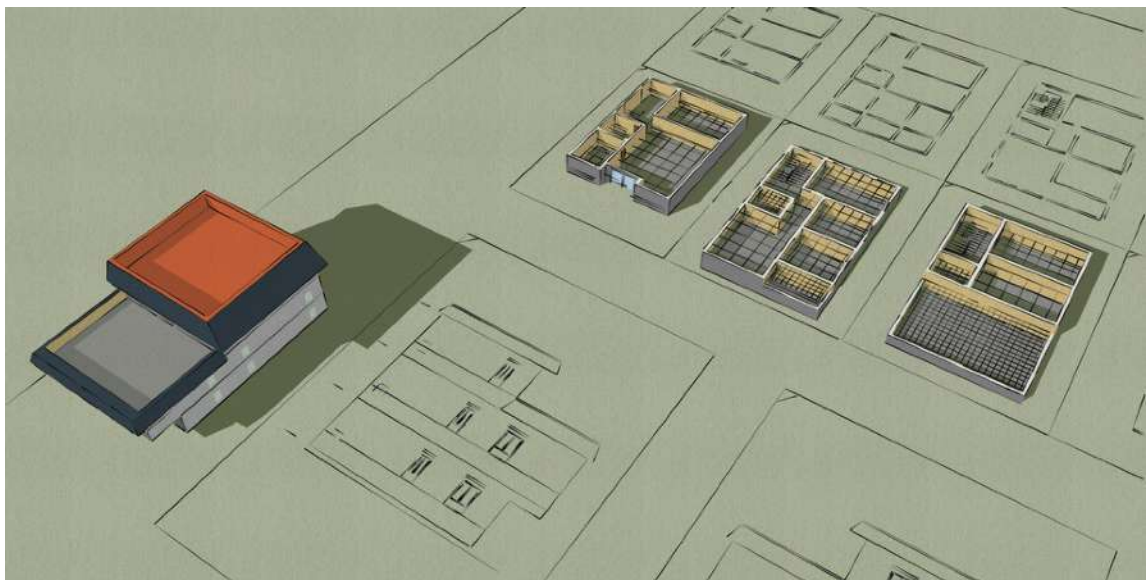
3.3 ESTABLISH UNIFORM DEVELOPMENT CONTROL RULES (DCR) AND STATE PROCESSING CENTRES FOR BUILDING PLAN APPROVALS

To bring consistency, transparency, and efficiency in the building plan approval process across urban areas, State Governments should implement **Uniform Development Control and Promotion Regulations (DCPR)** across all cities and towns - removing local discrepancies and simplifying compliance for developers and citizens alike.

In parallel, each state should establish a centralized, technology-enabled State Processing Centre for building plan approvals, modelled on the success of the Passport Seva Kendras.

These centres would:

- #1 Enable faceless, professional, and time-bound approvals of building and layout plans through a unified digital platform.
- #2 Function with defined service-level agreements (SLAs) and be monitored through real-time dashboards and audit trails.
- #3 Maintain seamless coordination with Urban Local Bodies (ULBs) for site verification, NOCs, and final occupancy certification.



This reform will result in a transparent, predictable, and citizen-friendly urban development ecosystem, accelerating real estate and infrastructure projects while upholding planning integrity and safety standards.

3.4 EMPOWER EMPANELLED PROFESSIONALS FOR SELF-APPROVAL OF STANDARD BUILDING PLANS

To accelerate real estate project execution and reduce regulatory delays, the Government should implement a policy to empower empanelled professionals — such as licensed architects, structural engineers, and planners — to approve standard (“typecast”) building plans through a self-certification model.

Key Elements:

- | | |
|--|--|
| <p>#1 The system will apply to pre-defined, compliant building typologies (e.g., G+3 residential buildings, plotted housing layouts).</p> | <p>#3 A robust compliance audit system will randomly inspect certified plans, with strict penalties (suspension/blacklisting) for professionals found to have approved non-compliant or illegal structures.</p> |
| <p>#2 Empanelled professionals, vetted and registered by the state or regulatory body, will be authorized to:</p> <ul style="list-style-type: none"> ✓ Verify compliance with building by-laws and Development Control Rules (DCR) ✓ Approve and digitally submit the plans on behalf of the promoter | <p>#4 This mechanism will complement the existing approval process, offering a faster, accountable alternative especially for small-to-mid-scale housing projects.</p> |

International Precedents

As also reflected in the benchmarking table, countries like the UK (Approved Inspectors), Singapore (Qualified Persons), and Australia (Private Certifiers) have successfully adopted similar models, ensured faster approvals while maintaining planning integrity.

This reform will de-bottleneck approvals, build professional accountability, and contribute to faster, cost-effective housing delivery in line with India's urbanization goals.



3.5 TRANSPARENT DASHBOARDS ON TIME FOR APPROVAL & STATUS

A critical issue in the ease of doing construction is the delay time in the approval process. Such delays not only escalate the project costs but also create a sense of distrust in the developers. A transparent and real time approval & status dashboard will allow more transparency in the system. This will not only allow the developers to build more trust and confidence on the governance but will also allow the governance to become more accountable.

The key feature of such a dashboard may include:

- #1 Application timelines
- #2 Real time application status update
- #3 Alerts and Notifications to the users
- #4 Integration with single window approval systems
- #5 Public grievance & escalation mechanisms

3.6 COMPETENT AUTHORITIES LIKE ULBS / PLANNING AUTHORITIES ETC. AND GOVERNMENT AUTHORITIES TO BE ACCOUNTABLE TO RERA



One of the key objectives of RERA is to ensure timely completion of projects. However, in order to ensure the same, it is important that all stakeholders including Government Organisations are under the ambit of RERA. RERA should be able to hold each of the stakeholder including Government organisations accountable for their role and responsibility towards the real estate project.

Accordingly, Section 37 which provides RERA with power to issue directions to promoters, allottees and real estate agents should be expanded to also include “any stakeholder of the project”. This shall be a positive step towards ease of doing construction in state increasing accountability and efficiency of all stakeholders.

3.7 PREVENTING UNAUTHORIZED / INFORMAL HOUSING

The problem of informal / irregular housing in large cities has been confronting the States for quite long.

While endeavoring to reduce the shortage of housing through new development, it is also necessary that new unauthorized colonies do not come up hereafter. Unregulated plotted and residential development threatens to undermine the entire development effort of the state.

The proliferation of unsanctioned plotted development and/or building development on agricultural/ no development lands is all pervasive.

Government should introduce stricter provisions in the Law to stop illegal construction and effective implementation of this provision so that the present problem does not escalate further.

Illegal/ Unauthorized construction should be stopped at initial stages only before homebuyers move in.

A proactive prevention framework that combines GIS mapping, early detection, and strict enforcement can be key to safeguarding planned urban growth.



3.8 CENTRALIZED NOC INTEGRATION

One of the major bottlenecks in construction approvals is the need to obtain multiple NoCs (No Objection Certificates) from different agencies, each working in silos with paper-based processes and lengthy timelines.

Developers are often required to secure clearances from authorities such as:



Oil & Natural Gas Corporation (ONGC)
For projects near fuel pipelines



Indian Railways
For sites near railway tracks



Airports Authority of India (AAI)
For projects around flight paths and airport zones



Archaeological Survey of India (ASI)
For construction near protected monuments



Power Utilities
For projects affecting transmission or distribution lines



Highway Authorities
For access and right-of-way approvals



Defence
For any construction within designated restricted zones around defence establishments

The absence of a unified system leads to:

- #1 Duplication of effort
- #2 Manual file movement
- #3 Lack of predictability in timelines
- #4 Opaque and inconsistent decision-making



Proposed Solution

A **centralized NoC integration system** should be developed to digitally integrate approvals from all relevant agencies into a single unified platform. This would allow applicants to submit requests once and track them transparently, rather than approaching each agency individually.

Key Features of the Centralized System



Digital Integration of Agencies

ONGC, AAI, Railways, Power Utilities, Highway Authorities, and ASI linked on a single platform.



Automated Validations

Physical verifications (e.g., road width, buffer zones, utility corridors) can be replaced with GIS-based mapping and digital rule engines



Transparency & Accountability

A centralized NoC portal, supported by digital governance platforms (e.g., eGov), would provide clear timelines, status tracking, and reduce manual intervention.



Faster Approvals

Integration would significantly cut approval timelines by eliminating redundant steps and parallelizing clearances.



Precedent from Delhi

The Urban Local Body (ULB) system in Delhi has already operationalized such integration, proving feasibility. A step toward ease of doing construction and improving India's ranking in global benchmarks.

3.9 TDR MARKETPLACE

The Transfer of Development Rights (TDR) mechanism is a critical tool for enabling planned urban growth, compensating landowners, and facilitating infrastructure development without heavy upfront government expenditure. However, the current TDR trading ecosystem in many cities is fragmented, opaque, and often dominated by middlemen, leading to misinformation and high transaction costs.

As highlighted in NITI Aayog's guidelines, there is a strong case for creating a digital TDR marketplace managed by local bodies. Such an online portal or mobile application could serve as a TDR bank, ensuring transparency, accountability, and ease of access for all stakeholders.

Key features may include:



- #1 Digital TDR certificates with unique IDs to prevent fraud and duplication.
- #2 Clear TDR area calculations and eligibility criteria visible to all parties.
- #3 Real-time notifications of available TDR for sale or purchase.
- #4 Automated valuation tools to standardize pricing and reduce speculation.
- #5 Direct buyer-seller interface to minimize dependence on brokers and reduce transaction costs.
- #6 Integration with land records and GIS systems to ensure authenticity of transfers.

Benefits of a Digital TDR Marketplace



Enhanced Transparency

Digital TDR certificates and centralized listings reduce fraud, duplication, and misinformation.



Improved Monitoring and Regulation

Real-time tracking and integration with land records strengthen oversight by authorities.



Lower Transaction Costs

Direct buyer-seller interactions minimize broker dependency, saving both time and money.



Increased Participation

A user-friendly and citizen-centric system builds confidence among landowners, developers, and investors.



Fair and Standardised Valuation

Automated tools can help ensure consistency in pricing and prevent speculation.



Efficient Urban Development

By unlocking land potential, cities can accelerate infrastructure projects and promote balanced, sustainable growth.



By making the TDR market transparent and citizen-friendly, such a system would not only improve monitoring and governance but also encourage greater participation from landowners, developers, and investors. In the long run, a robust TDR marketplace can accelerate infrastructure development, improve land use efficiency, and contribute to more balanced and sustainable urban growth.

The background of the slide is a photograph of a person's hand writing on a document with a blue pen. The person is wearing a light blue shirt. In the background, there is a laptop, a potted plant, and a window with a view of trees. The image is slightly blurred, focusing on the hand and the pen.

PILLAR 4

FINANCING & COSTING

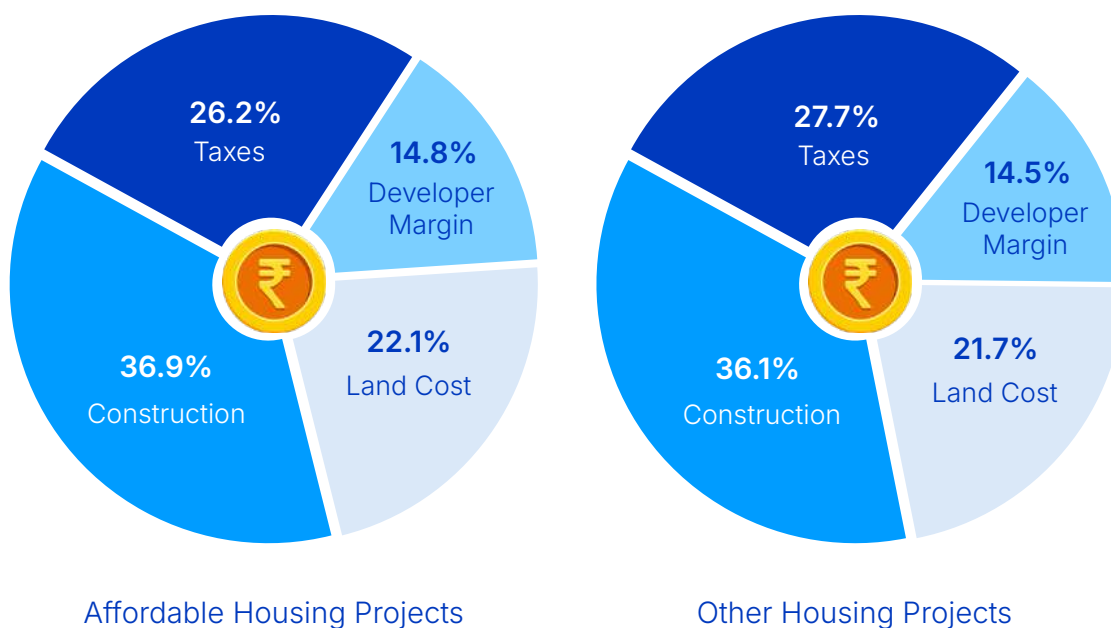
4.1 RATIONALISATION OF DEVELOPMENT AND APPROVAL CHARGES

One of the key contributors to the high cost of housing in India is the excessive burden of government-imposed charges, including premiums for Floor Space Index (FSI), fire clearance, fungible area, common areas, and other development levies.

In many cities, these charges account for 30-40% of the total project cost (as shown in figure below), which is significantly higher than both national and international benchmarks. This inflates the final price of homes, making affordable housing financially unviable in urban areas.







Figure 11 | Cost and Tax Share



Comparative analysis of tax incidence across sectors highlights this imbalance:

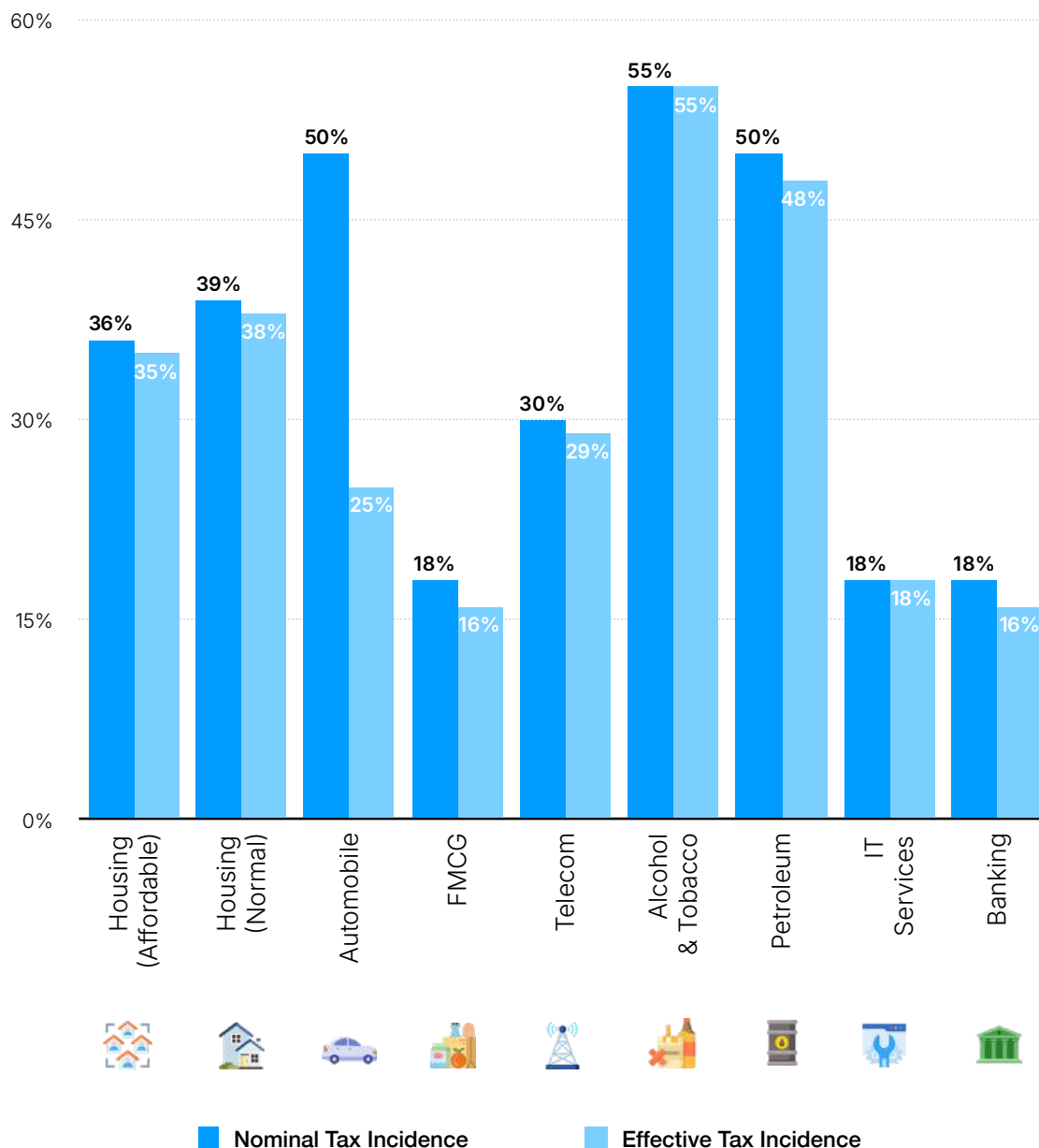
Tax Incidences on Real Estate Comparison with Other Sectors*

Sector	Typical Tax Incidence	Remarks
 Housing (Affordable)	35–36%	High burden from stamp duty, GST on construction, ULB levies, income tax.
 Housing (Normal)	38–39%	Even higher due to GST on sale of under-construction units.
 Automobile	~23–25%	Nominal 28% GST + small cess, but ITC on all raw materials knocks actual burden down to ~25%.
 FMCG / Consumer Goods	15–18%	Nominal 18% slab, but ITC across chain reduces effective incidence by ~2–3%.
 Telecom Services	18%	GST + license fee (8%) + spectrum usage charges (~3%) → ~29%.
 Alcohol & Tobacco	50–55%+	Excise + GST + cesses; among the highest-taxed sectors.
 Petroleum Products	45–50%	Excise duty + VAT + cesses, very high
 IT / Software Services	18%	GST only, no cascading levies.
 Banking & Financial Services	~15–17%	GST 18% on fees, but large parts of income (interest, deposits) exempt, so effective burden lower.

Note: Approximate effective tax incidence, based on published reports and policy documents – GST, excise, customs, cesses, etc.










This shows that **housing, despite being a critical social and economic sector, is taxed at par with petroleum products**, which is counterproductive to the government's goal of **Housing for All**.

Figure 12 | Nominal vs. Effective Tax Incidence across Sectors



Unlike other sectors (automobiles, FMCG, services) where Input Tax Credit (ITC) reduces the effective burden by 5–15 percentage points, housing does not get ITC. As a result, housing's effective incidence (35–39%) is almost the same as its nominal burden, making it one of the most heavily taxed essential sectors—at par with petroleum and alcohol.

This shows that **housing, despite being a critical social and economic sector, is taxed at par with petroleum products**, which is counterproductive to the government's goal of **Housing for All**.

Country/ Region	Corporate Tax Rate	VAT/ GST on Construction	Property Transfer/ Stamp Duty	Other Levies/ Cesses	Effective Total Incidence
 India	22% - 30%	18% standard, 1% - 5% for affordable housing	5% - 8%	BOCW, ULB levies (1% -8%)	20% - 38%
 USA	21% federal + upto 10% state	No federal GST/VAT; state sales tax varies, generally not on construction	0.01% - 5% varies by state	Local development fees	26% - 35%
 Germany	15% - 30%	19% VAT	3.5% - 6.5%	Local fees	25% - 40%
 UK	25%	20% VAT	0% - 15%	Local fees	25% - 40%
 Japan	29% - 31%	10% VAT	3% - 4%	Local levies	26% - 35%
 Dubai/ UAE	9%	5% VAT (commercial), 0% on new residential first supply (within 3 years)	4% Property transfer fee	Minimal (admin fee AED 430 -5,000)	9 - 14% commercial, lower on residential
 China	25%	6% - 13% VAT	3% - 5% Deed/land transfer tax	Urban construction/ maintenance fees	15 - 25%
 Hong Kong	16.50%	No VAT/GST	1.5% - 4.25% Stamp duty (residential/ commercial)	No additional cesses	18 - 22%
 Singapore	17%	9% GST	1% - 4% Stamp duty	Development Charges, Property tax	20 - 28%

India has one of the highest effective total tax incidences in the construction sector at 20% – 38%, surpassing major economies, while tax burdens in Dubai, China, Hong Kong, and Singapore remain significantly lower.

A part of this high incidence comes from the **GST regime itself**, where developers pay:

- #1** 1% GST on affordable housing and 5% on other housing, but without input tax credit (ITC)
- #2** 28% GST on cement, 18% on steel and works contracts, and 12% on marble/tiles, all of which are non-creditable and add directly to project costs
- #3** **GST on land-linked transactions** such as TDR, FSI, JDA, and long-term lease, despite stamp duty already being paid, leading to double taxation



The government should conduct a **comprehensive benchmarking of all statutory charges and premiums across Indian cities** and comparable global urban centers. Based on this analysis, charges should be rationalized and standardized to reduce variations and bring them within reasonable limits. This will enhance cost efficiency, improve housing affordability, and attract greater private sector participation in real estate and affordable housing projects.

A statutory cap should be introduced on the total government-imposed charges - not exceeding a fixed percentage (e.g., 20%) of the total project cost. This cap should be differentiated based on the category of housing.

A differentiated fee structure, for example, 0–5% for Affordable Housing, 5–10% for Rental Housing, and higher rates for mid- and luxury segments, will ensure cost predictability and faster financial closure. Lower charges for priority segments will incentivise affordable and rental projects, directly supporting the Housing for All mission, while higher-end projects contribute proportionately to urban infrastructure.

Additionally, **rationalising GST on key construction inputs (cement, steel, marble, works contracts), and exempting GST on land-related transactions** would directly ease costs for developers, improve project viability, and reduce final housing prices.

Standardisation reduces compliance delays by 20–30%. Telangana introduced the **TS-bPASS (Telangana State Building Permission Approval & Self-Certification System)** to streamline building approvals.

By simplifying and digitising processes, approval timelines were reduced from 180 days to under 30 days, cutting compliance delays by nearly 75–80%.

Developers reported that delays typically added 4–5% extra cost to projects due to interest outgo and holding charges.

The TS-bPASS model demonstrates how rationalisation of charges and approvals can directly lower project costs, enhance ease of doing construction, and boost affordable housing supply.



Singapore Development Charges Framework

Singapore uses a transparent, capped development charge system, updated twice a year based on land values.

Impact

- ✓ Predictability helps developers plan financing without “hidden premiums.”
- ✓ Ensures balanced revenue for government while keeping housing cost growth stable.

Learning

Benchmarking India’s charges against international best practice shows the scope for introducing a statutory cap (e.g., max 20% of project cost).

4.2 INFRASTRUCTURE FINANCING THROUGH DEDICATED FUNDS

The World Bank estimates that India will require nearly USD 840 billion in urban infrastructure investments by 2036, a scale far beyond current budgetary allocations.

Global precedents show how innovative financing can bridge such gaps:

Singapore's Housing & Development Board (HDB) leverages land sales and Central Provident Fund contributions to continuously finance large-scale affordable housing



Brazil's Minha Casa, Minha Vida mobilised ~\$100 billion for 10 million homes between 2009–2020.



In India, measures like SWAMIH Investment Fund (Special Window for Completion of Construction of Affordable and Mid-Income Housing Projects) was a commendable initiative undertaken by Honourable Finance Minister to set up a 'Special Window' in the form of AIF to provide priority debt financing for the completion of stalled housing projects.

Another one is SBICAP Ventures which is the Investment Manager to the first AIF set-up under this special window.



However, the scale of demand far outstrips available funds. This fund should provide the funding to not just the stalled projects but the special projects like green projects, rental housing etc. Accordingly, there is need for more such Housing Fund to provide priority low-cost funding for real estate.

Accordingly, India needs to create more Housing Funds structured as **blended finance vehicles**, pooling government support, institutional investors, and ESG-linked private capital. Dedicated tranches within such funds could be earmarked for affordable housing, green projects, rental housing, and rural housing upgrades, ensuring predictable, low-cost financing and an equitable flow of capital across segments.

4.3 GOVERNMENT BACK INFRASTRUCTURE AND HOUSING BONDS

Large-scale infrastructure and housing projects demand long-tenure, low-cost capital. Government-backed bonds can provide this predictability while deepening India's domestic capital markets. Yet, India's municipal bond issuances have raised only ₹4,000 crore since 2015, in stark contrast to US cities that collectively raise ~USD 4 trillion annually.

The 2017 Pune Municipal Corporation bond issue of ₹200 crore, oversubscribed within minutes, demonstrated strong investor appetite when robust governance and repayment frameworks are in place.

Scaling such issuances, supported by tax incentives and credit enhancements, can reduce financing costs for developers while democratizing housing finance by allowing retail investors to directly participate in national development with assured, stable returns.

India should prioritize expanding government-backed infrastructure and housing bond programs with:

- #1 Credit Enhancements**
Sovereign/State guarantees to boost investor confidence
- #2 Tax incentives**
To attract retail and institutional investors
- #3 Standardized Frameworks**
For ULBs and housing boards to issue bonds at scale

This will ensure predictable financing, lower borrowing costs, and unlock a sustainable pipeline of capital for urban growth.



4.4 ENSURING FINANCIAL VIABILITY OF SOCIAL HOUSING (AFFORDABLE HOUSING & SOCIAL RENTAL HOUSING) FOR RURAL AND URBAN

The housing challenge in India is distinct in nature for both urban and rural.

While in the rural areas, significant population resides in semi pucca houses or kutcha houses. Nearly **40% of households still live in semi-pucca or kutcha homes** (NSSO, 2021). Seasonal incomes limit access to formal housing loans, leaving households reliant on subsidies or informal borrowing. The seasonal nature of the jobs makes it difficult for them to secure loans. This results in dependence on the small savings, informal borrowing, or government subsidies which is also not sufficient to fulfil the actual cost of construction. Additionally, limited access to the technical expertise also leads to unstable houses.

However, in the urban areas, rapid urbanisation, high land prices and limited serviced land pose a major challenge. Around 95% of India's urban housing shortage lies in economically weaker section (EWS) and Low-Income Groups (LIGs). A major threat to scaling **affordable and social rental housing** in urban India is the **lack of financial viability** for private developers and housing agencies.

While schemes like **Pradhan Mantri Awas Yojana (PMAY)** have introduced subsidies and incentives, there is a need to **evaluate their adequacy** across geographies and housing typologies. The problem persists and forces a large section of urban poor to live in poor living conditions.



Mega cities require **dedicated and context-specific affordable housing schemes**, with higher land costs and urban service demands in mind. Mexico's INFONAVIT program provides long-tenure, low-interest loans to workers via payroll deductions, ensuring both repayment security and affordability.

Importantly, the Return on Investment (ROI) for affordable and social housing must be rationalised back to around 6%-9%, as it was a few years ago, instead of the current 10-12%+ which makes such projects financially unattractive compared to mid- and high-income housing. Achieving this lower ROI benchmark will require a mix of tax rationalisation (e.g., reducing GST on inputs, exempting GST on affordable housing units), land subsidies, and viability gap funding to reduce overall project costs and make the segment sustainable for private participation.



Mexico (INFONAVIT)

Provides long-tenure loans at **4-6% interest**, directly deducted from payroll, reducing default risk and ensuring affordability.



Singapore (HDB model)

Offers housing loans at **2.6% interest**, well below market rates, enabling large-scale participation of low- and middle-income groups.



India (current)

Affordable housing loans for developers often cost upwards of **10-12%**, which pushes project ROI requirements to unsustainable levels.

To enable sustainable participation of the private sector in both urban and rural areas, the government should:

- #1** Offer **differentiated incentive structures** (e.g., land subsidies, tax breaks, fast-track approvals) based on project type and location
- #2** Facilitate access to **low-cost, long-tenure finance** for affordable and rental housing
- #3** Create **Viability Gap Funding (VGF)** frameworks for high-cost urban projects
- #4** Offer pre-approved structural and architectural drawings for construction, especially in affordable housing and rural construction.
- #5** Increase limit for repayment of housing loan principal and introduce provision for deduction of Interest on home loan in the Income Tax Act

A significant leaning can be taken from Rajasthan's PPP Housing Policy 2011 that delivered 20,000+ affordable units using VGF + land incentives, showing replicability at scale.

Ensuring financial feasibility will be critical to meeting the scale and urgency of **India's rural & urban housing needs**, especially for low- and middle-income groups in fast-growing metropolitan regions.

4.5 REFORM CIRCLE RATES TO REFLECT MARKET REALITIES

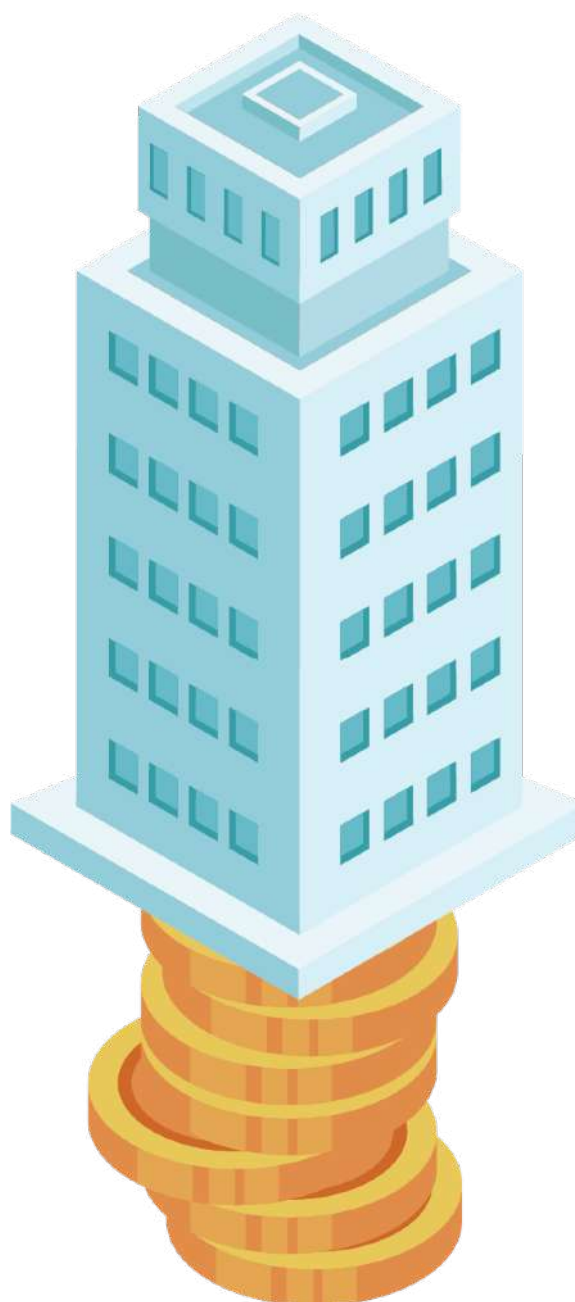
In many urban areas, Circle rates are misaligned with actual market values - being either significantly higher or lower than prevailing prices. This discrepancy leads to distorted transaction values, reduced transparency, tax inefficiencies, and hesitancy among buyers and developers.

Precedent can be taken from the Delhi's 2021 circle rate revisions raised stamp duty collections by 18% within one year; Maharashtra's reforms in 2020 boosted transaction volumes by 30%. Even Singapore and Hong Kong update property values annually with full public disclosure which enhances transparency and revenue predictability.

There is a need to adopt a dynamic, data-driven mechanism for determining circle rates that reflects real-time market conditions, local demand, and property characteristics. Governments should:

- #1 Replace static formulas with regularly updated algorithms based on market transactions
- #2 Use GIS mapping, digital property registries, and market analytics to fine-tune valuations
- #3 Ensure uniformity and transparency across jurisdictions to build buyer confidence

Aligning circle rates with market reality will improve revenue collection, enhance market transparency, and promote genuine price discovery in the real estate sector.



4.6 ENCOURAGING PRIVATE PUBLIC PARTNERSHIPS

India faces a pressing need for urban housing and infrastructure, while public resources alone remain insufficient to meet this demand.

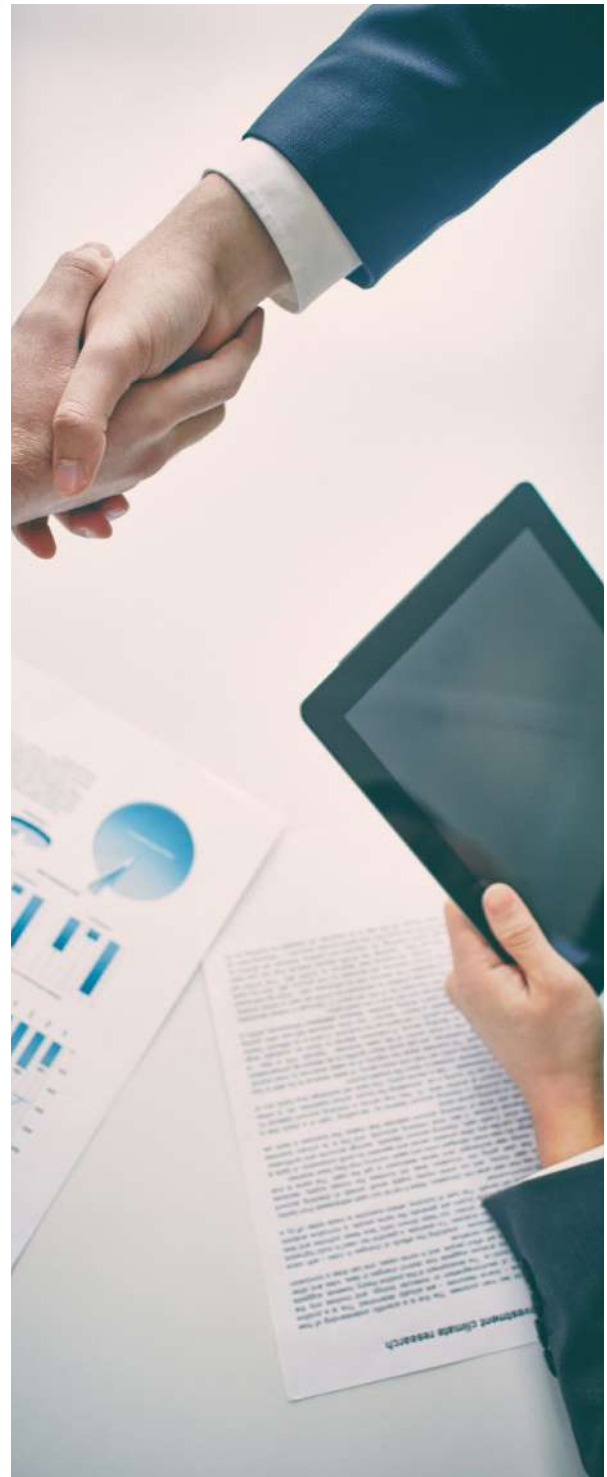
To bridge the gap, Public-Private Partnership (PPP) frameworks become critical by combining public sector oversight with private sector efficiency.

Private participation frameworks become important to:

- #1** Share risks between the public and private entities potentially including market risks, construction risks and operational risks.
- #2** Enables guarantees or incentives for private players to invest in affordable and rental housing segments.

We can learn from the examples of Rajasthan leveraged PPPs on government land to build 20,000+ affordable units and Brazil's Minha Casa Minha Vida delivered 10 million homes under PPP-like models.

By leveraging private execution capacity and public land/resources, PPPs ensure scalability, while private players benefit from predictable returns backed by government support and guaranteed demand in affordable housing segments.



4.7 CSR CONTRIBUTION

Corporate Social Responsibility (CSR) can be a powerful enabler for affordable housing. Under Schedule VII of the Companies Act, CSR already covers activities such as women's empowerment, homes for vulnerable groups, and reducing social inequalities. **Corporates can complement government efforts by:**

- #1 Co-financing low-income housing and shelters for homeless populations.
- #2 Funding rehabilitation and resettlement projects.
- #3 Supporting vocational training for construction workers.
- #4 Promoting financial literacy among economically weaker homebuyers.

CSR can also strengthen the sector by financing skill training for construction workers and promoting financial literacy among homebuyers from weaker sections.

These measures would not only improve housing access but also create jobs, enhance social equity, and support sustainable community development.

BPCL Kochi Refinery and Sobha Group contributed ₹1.5 crore under Kerala's LIFE Mission, enabling the construction of 197 houses for low-income families in Shanthipuram Colony, Kochi - showcasing how CSR can effectively support affordable housing delivery.



PILLAR 5

RE- DEVELOPMENT

5.1 AREA-BASED REDEVELOPMENT RATHER THAN PROJECT-BASED

Area-based redevelopment emphasizes transforming entire neighbourhoods or regions through an integrated and holistic approach, rather than focusing on isolated, project-specific interventions. By simultaneously addressing housing, infrastructure, transport, public amenities and economic activities within a long-term vision, it ensures sustainable and balanced urban growth. Unlike project-based efforts that solve only localized issues, area-based redevelopment fosters comprehensive improvement, attracts private investment, strengthens community participation and creates more inclusive and liveable environments. Two model examples of this approach are Singapore and London.



London's East End Regeneration (Docklands)

- ✓ London Docklands Development Corporation (LDDC) established in 1981 to drive large-scale, area-based redevelopment.
- ✓ Focused on **comprehensive revitalization rather than piecemeal projects.**
- ✓ Converted **derelict industrial land into a vibrant mix of commercial, residential, and public spaces.**
- ✓ Developed Canary Wharf, an international financial hub.
- ✓ Backed by major transport investments such as the Docklands Light Railway (DLR) and Jubilee Line extension to improve connectivity.
- ✓ Relied on **strong private sector participation, with community involvement** improving over time.



Singapore's Transformation

- ✓ Implemented a well-planned **area-based strategy aligning housing, infrastructure, and sustainability** with a national master plan.
- ✓ Housing & Development Board (HDB), established in 1960, delivered **large-scale public housing** while integrating land use with efficient transport networks.
- ✓ **Developed satellite towns with schools, healthcare facilities, and public transport** to reduce congestion.
- ✓ Promoted affordable housing through subsidized rentals and the Home Ownership Scheme supported by the Central Provident Fund (CPF).
- ✓ Launched redevelopment programs such as the Selective En bloc Redevelopment Scheme (SERS) for urban renewal.
- ✓ Encouraged **public-private partnerships** to fuel commercial development.
- ✓ Prioritized **green spaces, stormwater management, and mixed-use planning for sustainable growth.**
- ✓ Successfully overcame the housing crisis and became a global model for liveability and economic success.

5.2 SLUM REDEVELOPMENT – WHOLE OF SLUMS APPROACH

The basic strategy for slum redevelopment should be a holistic ‘Whole City – All Slums’ approach. As a first step towards this goal, Slum Rehabilitation Authorities (SRAs) should conduct a comprehensive survey of all slums in a city. This survey should include details such as the number of slum dwellers eligible for rehabilitation, the number of non-eligible slum dwellers, tenement density and a preliminary assessment of the feasibility of redevelopment for each slum. Based on these findings, the Authority shall prepare a comprehensive plan for each slum, following the model of a Town Planning Scheme (TPS).

Implementation Method

- #1 Publish the master plan to encourage slum dwellers to appoint a developer within one year.

- #2 If slum dwellers fail to appoint a developer:
 - SRA will invite competitive bids from private developers through a transparent process.
 - If no bids are received, SRA will provide viability gap funding of up to 40% of project cost.

- #3 Where the SRA appoints a developer, individual consent from slum dwellers will not be required.

Special Provisions for Government of India (GOI) Lands

Option 1: In-situ Development

- ✓ Allowed if the concerned Ministry/Agency agrees.
- ✓ SRA to act on agency charges = 10% of project cost.
- ✓ Ensure at least 25% of Ready Reckoner (RR) rate of affected land goes to the land-owning department/Ministry.

Option 2: Relocation

- ✓ If Ministry/Agency does not agree to in-situ development.
- ✓ SRA to act on payment of 75% of prevailing RR rate of residential premises.
- ✓ Slums to be shifted to another location or integrated into another scheme, preferably within the same ward.
- ✓ Offer higher FSI/additional benefits to the receiving scheme to enable relocation.

5.3 STATE SLUM REHABILITATION AUTHORITY

Every state shall constitute a dedicated Slum Rehabilitation Authority (SRA) to exclusively plan, coordinate and implement slum redevelopment within the state.

The following will be the non-negotiable principles to be followed in schemes:



Town Planning for Slum Rehabilitation Based on the Concept of “Whole City - All Slums”

State-Wide Approach

- ✓ Slum redevelopment to be undertaken as a Statewide exercise.
- ✓ Every identified slum cluster to be addressed within a unified planning framework.
- ✓ Prevents redevelopment from being confined to isolated pockets.
- ✓ Ensure less commercially attractive slums are not neglected.
- ✓ SRA shall prepare a structured redevelopment blueprint integrating all slums into every city's land use and infrastructure plans.

Key tasks include:

- #1 Mapping physical boundaries of each slum.
- #2 Evaluating connectivity to urban services.
- #3 Determining redevelopment models balancing social, economic and environmental considerations.
- #4 Integration with City Development Plans and Regional Plans.
- #5 Redevelopment to be treated as part of the overall city growth strategy aligning with State goals.
- #6 Synchronize slum housing provision with transport networks, public amenities and utility infrastructure upgrades.
- #7 Enables better phasing of projects, optimized use of Floor Space Index (FSI) and creation of mixed-use, inclusive neighborhoods.

By adopting the “Whole City – All Slums” approach, all Municipal Corporations and large municipalities within the State will ensure that no settlement is excluded from redevelopment opportunities, that planning is transparent and time-bound and that the benefits of urban growth reach all sections of the population.

5.4 REDEVELOPMENT ROADMAP 2047 FOR CITIES TO BE DEVELOPED

The State-level Redevelopment Authority will plan, coordinate, and implement large-scale, area-based redevelopment projects in an integrated and systematic manner. Its core functions will include land pooling, infrastructure development, housing provision, stakeholder engagement and ensuring sustainable and inclusive urban growth.

Redevelopment Roadmap 2047



All States to prepare a Redevelopment Roadmap 2047 with a long-term vision.



Provide **timelines, funding strategies, and implementation mechanisms.**



Strategic focus on:

- Slums, dilapidated buildings, and ageing urban precincts.
- Aligning redevelopment with economic growth, infrastructure expansion and sustainability goals.



Emphasize:

- Preservation of cultural heritage
- Mixed-use development
- Disaster resilience in new constructions



Roadmap to:

- Identify & map all slum settlements, unsafe/dilapidated buildings and old neighbourhoods.
- Specify redevelopment model for each area - In-situ rehabilitation, Relocation, Cluster redevelopment and Integrated township development.



Integrate housing redevelopment with:

- Roads
- Water Supply
- Sewerage
- Drainage
- Public Transport
- Green Spaces

Monitoring & Prevention of New Slums



Continuous citywide and region-wide monitoring to prevent new slum formation.



Strengthen building permissions & land-use controls with ward-level monitoring teams.



Methods:

- Regulatory enforcement & proactive housing provision
- Real-time surveillance with GIS mapping, satellite imagery and ground surveys.



Conduct regular assessment of housing demand, especially for low-income & migrant populations.



Ensure adequate affordable housing stock is planned in advance.



Immediate Response:

- Address encroachments/ unauthorized constructions with legal action.
- Provide alternative affordable housing where necessary.



Run community awareness campaigns to discourage encroachment and promote participation in formal housing schemes.

The roadmap shall be prepared through a participatory process involving relevant government agencies, urban local bodies, planning authorities, private developers and community representatives.

It shall be reviewed and updated periodically, at least every five years to reflect changes in demographics, infrastructure needs and policy priorities, ensuring that by 2047, all cities within a state achieve a safe, inclusive and sustainable built environment.



5.5 COMMUNITY PARTICIPATION IN URBAN REDEVELOPMENT PROCESS

Community participation shall be an integral and non-negotiable component of the urban redevelopment framework to ensure that redevelopment projects are socially inclusive, locally relevant and sustainable. Active involvement of residents, particularly those directly affected by redevelopment shall be included as it will help build trust, ensures transparency and fosters ownership of the process, leading to smoother implementation and long-term success.

Mechanisms for Community Engagement

- #1 Urban Local Bodies & Slum Rehabilitation Authorities (SRAs) to establish **structured systems for participation**.
- #2 Tools include **awareness campaigns, consultation meetings** and **participatory workshops**.
- #3 Communities to be informed about project objectives and timelines, rehabilitation options and rights and responsibilities.
- #4 **Focus on Vulnerable Groups:**
 - Special attention to women-headed households, senior citizens, persons with disabilities and economically weaker sections (EWS).
 - Ensure their needs are adequately represented in planning & design.
- #5 **Enable residents to provide inputs** on housing layouts community facilities, open spaces and social infrastructure.
- #6 **Final development should reflect socio-cultural fabric** of the area.

Institutional & Digital Support

- #1 Formation of local committees comprising elected community representatives, NGOs and ward-level officials.
- #2 Functions shall include acting as a bridge between authority and residents, monitoring progress and addressing grievances promptly.
- #3 Use of digital tools like online portals, mobile applications, GIS-based platforms and real-time info sharing & tracking milestones.
- #4 Periodic public disclosure of financial & implementation status → strengthens accountability.

By embedding community participation into the redevelopment process, States can ensure that urban transformation is not merely a physical upgrade of buildings and infrastructure, but also an enhancement of the quality of life, social cohesion and economic opportunities for all residents.

An aerial photograph of a modern building complex. The building features multiple levels with green roofs (living roofs) and large solar panel arrays. The surrounding area includes trees and a paved walkway. The text 'PILLAR 6' is overlaid on a blue rectangular background.

PILLAR 6

GREEN AND SUSTAINABLE LIVING

India currently ranks third globally in annual CO₂ emissions, contributing approximately 8% of total global emissions.

At the same time, the construction industry worldwide accounts for nearly 40% of total emissions, making it a significant contributor to environmental degradation. In this context, India faces an urgent need to reduce its carbon footprint, and green buildings can play a crucial role in this effort.

Figure 11 | Share of Construction Industry in CO₂ Emissions ⁶

Source: United Nations Environment Programme (UNEP)

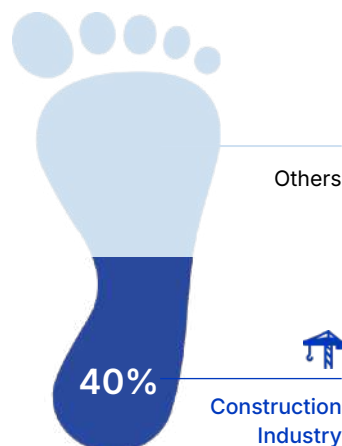


Table 2 | CO₂ emissions for 2023 ⁷

Country	Rank	Annual CO ₂ Emissions (bn tonnes)	Share in Global Annual CO ₂ Emissions (%)	Per Capita CO ₂ Emissions (tonnes per person)
 China	1	11.9	31.50%	8.4
 United States	2	4.91	13.00%	14.3
 India	3	3.06	8.10%	2.1
 Russia	4	1.82	4.80%	12.5
 Japan	5	0.98	2.60%	8
 Iran	6	0.82	2.20%	9
 Saudi Arabia	7	0.74	1.95%	22.1
 Indonesia	8	0.73	1.94%	2.6
 Germany	9	0.59	1.58%	7.1
 South Korea	10	0.57	1.53%	11.2

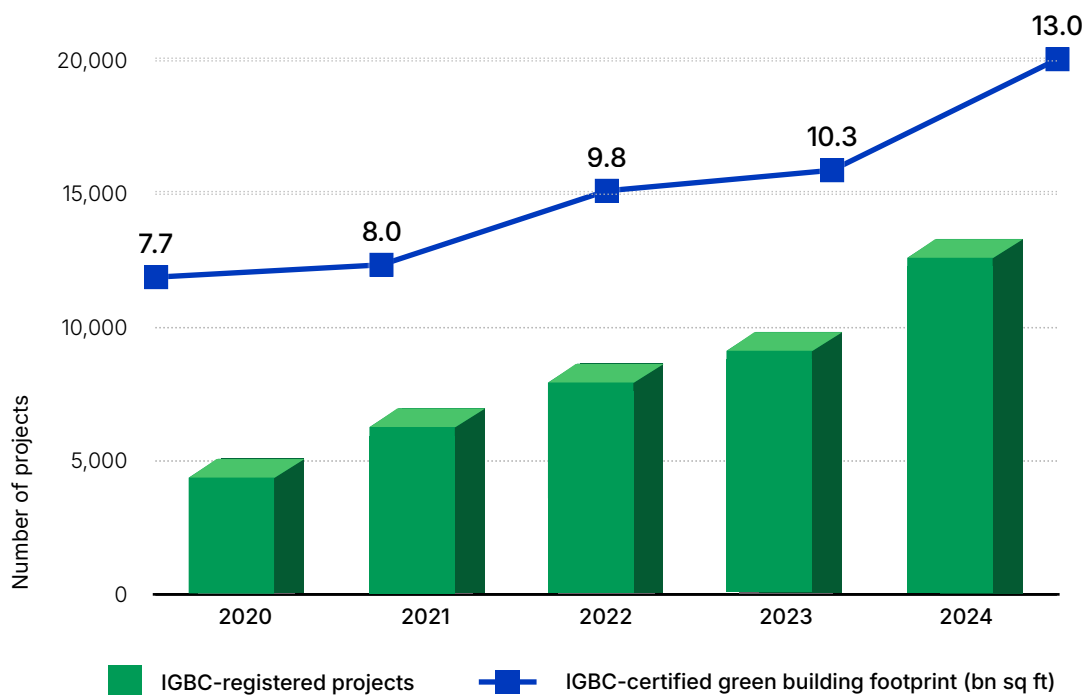
Note: The above data pertains to CO₂ emissions for 2023, Ranking is based on absolute annual emissions

⁶ United Nations Environment Programme (UNEP)

⁷ ourworldindata.org

Over the years, India has made notable progress in promoting sustainable construction, with the Indian Green Building Council (IGBC) certifying green projects covering a cumulative area of around 13 billion square feet. Despite this achievement, there remains immense potential for further expansion. By actively encouraging and implementing more green building projects, India can significantly reduce its carbon emissions, promote energy efficiency, conserve natural resources and move toward a more sustainable and environmentally responsible future.

Figure 13 | Green-Certified Projects are on the rise ⁸



8,52,000 ACRES
of Large Developments



6,500+
Commercial Projects



21 LAKHS +
Residential Dwelling units



765+
Industrial Buildings

⁸ CREDAI Report on Sustainability in Real Estate: Towards a Greener Skyline

6.1 GOVERNMENT MUST LEAD – ALL NEW GOVERNMENT BUILDINGS TO BE NET-ZERO + RETROFIT EXISTING STOCK

The Government should take a leadership role in promoting sustainable construction by mandating that all new buildings constructed for government use including offices, staff housing and public institutions are designed and built as Net-Zero Energy and Net-Zero Water Buildings.

Key Features of Net-Zero Buildings:

- #1 Integrated renewable energy systems (rooftop solar, solar water heating)
- #2 High-performance building envelopes
- #3 Energy-efficient HVAC & lighting systems
- #4 Rainwater harvesting
- #5 Advanced water recycling & reuse technologies
- #6 Zero-discharge waste management systems



Benefits

- ✓ Future-ready infrastructure
- ✓ Lifecycle cost-efficiency
- ✓ Alignment with national & global climate commitments

By making Net-Zero the baseline standard, the government will set a strong example for the private sector, inspire innovation in the construction industry and accelerate the adoption of green building practices across the country.

In parallel, a **time-bound Net-Zero Retrofit Program should be launched** for existing government buildings.



Net-Zero Retrofit Program for Existing Buildings

Focus on cost-effective interventions such as:

- ✓ Upgrading to energy-efficient lighting
- ✓ Installing smart energy management systems
- ✓ Optimizing water use
- ✓ Integrating renewable energy solutions

By leading through example, the government can establish itself as the primary driver of the transition towards sustainable urban development, thereby catalysing demand for Net-Zero buildings in the wider real estate and infrastructure market.

The proposed timeline for Net-Zero Buildings in India shall be as follows:

Phase	Timeline	Government Buildings	Non-Government Buildings
Phase 1: Policy & Awareness	0-12 Months	<ul style="list-style-type: none"> National Net-Zero mandate for all new Govt. buildings Launch Retrofit Program for existing govt. stock Technical guidelines + DPR templates Identify 10–15 pilot projects 	<ul style="list-style-type: none"> Voluntary Net-Zero Certification schemes Incentives: fast-track approvals, tax rebates, green financing Pilot projects: IT parks, universities, hospitals, malls Green rating linked to RERA & municipal approvals
Phase 2: Quick Wins / Early Adoption	Year 1-2 (Govt) Year 1-3 (Private)	<ul style="list-style-type: none"> 100% LED lighting in Govt. offices Smart meters & energy monitoring Rainwater harvesting & low-flow fixtures 	<ul style="list-style-type: none"> Early adoption of voluntary certification by large developers Showcase projects demonstrating business case for Net-Zero
Phase 3: Expansion / Regulatory Push	Year 2-4 (Govt) Year 3-5 (Private)	<ul style="list-style-type: none"> All new govt. buildings → Net-Zero compliant Retrofit 50% govt. stock (solar rooftops, HVAC, water recycling) 	<ul style="list-style-type: none"> Mandatory Net-Zero compliance for: <ul style="list-style-type: none"> New commercial complexes >50,000 sq. ft New institutional campuses (universities, hospitals) Incentives for housing societies to adopt renewables & water recycling
Phase 4: Full Rollout / Transition	Year 4-6 (Govt) Year 5-8 (Private)	<ul style="list-style-type: none"> 100% central govt. buildings Net-Zero State-level rollout: secretariats, collectorates, municipal HQs, hospitals, universities 	<ul style="list-style-type: none"> All new urban housing projects >200 units → Net-Zero Ready Large-scale industrial & commercial → Net-Zero by design Retrofit programs for existing commercial hubs & institutional campuses
Phase 5: Scaling & Enforcement / Full Transition	Year 6-10 (Govt) Year 8-12 (Private)	<ul style="list-style-type: none"> Independent certification (BEE, GRIHA, IGBC) Digital dashboard for real-time monitoring By Year 10 → All govt. buildings Net-Zero 	<ul style="list-style-type: none"> 100% new urban construction → Net-Zero by default Retrofit 50% of large private buildings (malls, IT parks, hospitals) Financing & ESG investments drive adoption
Phase 6: Universal Adoption	Year 10-15	<ul style="list-style-type: none"> Continued monitoring & upgrades for govt. stock Ensure state-level compliance nationwide 	<ul style="list-style-type: none"> All new private buildings → Net-Zero Retrofit of existing large-scale private stock mandatory By Year 15 → Net-Zero mainstreamed across all sectors

6.2 FAST-TRACK ENVIRONMENTAL CLEARANCE FOR NET-ZERO BUILDINGS

The Ministry of Environment, Forest and Climate Change (MoEFCC), Government of India, already offers a fast-track environmental clearance process for pre-certified green building projects. Building on this framework, a dedicated and more robust fast-track approval mechanism should be institutionalized for projects that commit to certified green building standards or net-zero energy and water performance. This specialized clearance pathway would prioritize environmentally responsible projects and significantly reduce bureaucratic delays.

Step #1

Project Identification

- ✓ Developer commits to certified green building standards or net-zero energy and water performance.

Step #2

Application Submission

- ✓ Application filed under dedicated fast-track category.
- ✓ Option to use pre-approved green building typologies (standard sustainable designs).
- ✓ Fully digitized submission → online portal.

Step #3

Review Process

- ✓ Application enters a separate approval queue (green and net-zero projects only).
- ✓ Digitized review & tracking system provides real-time updates.
- ✓ Parallel clearances: planning and environmental authorities review simultaneously (not sequentially).

Step #4

Decision & Approval

- ✓ Reduced bureaucratic delays due to priority processing.
- ✓ Clearance granted faster for eligible projects.

Step #5

Implementation & Monitoring

- ✓ Project executed as per certified green/net-zero standards.
- ✓ Continuous monitoring for compliance with sustainability norms.

Step #6

Outcomes

- ✓ Developers incentivized to adopt sustainable models.
- ✓ Accelerated adoption of climate-friendly development.
- ✓ Positions India as a global leader in green urban growth.

6.3 INCENTIVIZE GREATER GREEN BUILDING ADOPTION

To accelerate the adoption of green building practices across residential, commercial and industrial developments, it is essential that the government introduces attractive policy measures and financial incentives.

These incentives would not only reduce the incremental cost burden on developers and homeowners but also create a strong push for sustainable construction.



Possible incentives may include:



Additional Floor Area Ratio (FAR)

Developers opting for green building certification may be granted additional FAR or built-up area permissions beyond the standard permissible limits. Several states, including Maharashtra, Punjab, Jharkhand, Himachal Pradesh, Uttar Pradesh and West Bengal, already provide this benefit for green building projects.

To maximize impact, this incentive should be adopted across all states as part of a uniform, country-wide policy. Such a measure serves as a strong economic driver, as it allows developers to construct additional sellable or leasable space within the same land parcel, thereby enhancing project viability while promoting sustainable construction.



Heavy Incentives for Platinum-rated Green Buildings:

To further push the highest standards of sustainable development, Platinum-rated green buildings should be incentivised heavily. Such projects may be granted full or substantial exemptions from development charges, property tax, and FSI (Floor Space Index) costs.

This approach would reward developers for achieving the most rigorous sustainability benchmarks, ensuring large-scale adoption of top-tier green construction practices.



Rebate on Development Charges

Concessions or rebates on municipal development charges, such as land use conversion fees, building permit fees or other statutory levies, can lower the upfront cost of green-certified projects. Such rebates can make green buildings more financially attractive compared to conventional buildings.



Reimbursement of Green Building Certification Fee

Certification fees often act as a deterrent for smaller developers or housing projects. Reimbursing or subsidizing these costs will encourage wider participation, especially from affordable housing providers and mid-size developers who may otherwise avoid certification due to budget constraints.

By implementing these measures, the government can create a win-win situation where developers gain economic benefits, homebuyers and tenants benefit from healthier and more energy-efficient spaces and the nation progresses toward its sustainability and climate action goals.



6.4 INCENTIVIZE GREEN RETROFITTING – LAUNCH A NATIONAL GREEN RETROFIT MISSION

A National Green Retrofit Mission should be launched to accelerate the transformation of existing residential, commercial and institutional buildings into energy-efficient and environmentally sustainable assets. This mission would address the vast stock of operational buildings in India that were constructed before the widespread adoption of green building norms, many of which consume excessive energy and water while offering suboptimal indoor environmental quality.



Key Retrofit Measures



Energy efficiency upgrades:

- ✓ Improved insulation & glazing
- ✓ Replacement of inefficient lighting & HVAC systems with high-performance alternatives



Renewable energy adoption:

- ✓ Rooftop solar PV installations



Water Efficiency:

- ✓ Water-saving fixtures
- ✓ Rainwater harvesting
- ✓ Greywater recycling systems



Indoor air quality improvements:

- ✓ Better ventilation systems
- ✓ Use of non-toxic, low-emission materials.

Financial & Policy Incentives

- #1 Offer low-interest loans, tax rebates and direct subsidies to building owners for certified green retrofits.
- #2 Establish a national accreditation framework to verify performance benchmarks.
- #3 Provide fast-track approvals & extra incentives for projects achieving exemplary results.

By systematically improving the operational efficiency of India's existing built environment, the National Green Retrofit Mission would help lower national carbon emissions, reduce resource consumption and improve public health, while also generating green jobs in retrofitting services, manufacturing and maintenance.

6.5 ENSURE CONTINUITY OF GREEN OPERATIONS – LINK PROPERTY TAX TO SUSTAINABILITY PERFORMANCE

A common challenge with net-zero and green buildings is that many fail to sustain their performance after handover. Systems such as rooftop solar panels, sewage treatment plants (STPs), rainwater harvesting units and greywater recycling infrastructure often fall into disuse due to poor maintenance, operational costs or lack of awareness among occupants.

To ensure long-term effectiveness and protect public investments in sustainability, local governments can link property tax incentives directly to verified sustainability performance.

Key measures could include:



Annual Property Tax Rebates for housing societies, Resident Welfare Associations (RWAs) or commercial complexes that continue to meet predefined net-zero targets for energy, water and waste.



Mandatory Annual Sustainability Disclosures, either self-reported or verified by accredited third-party auditors, to track operational performance against benchmarks.



Recognition and Reward Programs for high-performing communities, including public awards, preferential approvals for future projects or additional fiscal incentives.



By linking financial benefits with operational sustainability, this approach ensures that green features remain functional and effective throughout the building's lifecycle. It will also create a culture of accountability, encourage communities to adopt preventive maintenance and drive long-term behavioural change in managing resources efficiently.

6.6 LAUNCH PILOT NET-ZERO TOWNSHIPS WITH PRIVATE SECTOR PARTICIPATION

The Government, in partnership with leading private developers, should initiate Pilot Net-Zero Townships in strategically selected urban locations. These pioneering projects would serve as living laboratories for sustainable urban development and showcase the feasibility of large-scale, climate-resilient living. Each township should be designed to integrate advanced green technologies and infrastructure, including:



Renewable Energy Integration

Deployment of solar photovoltaic panels, wind turbines and Building-Integrated Photovoltaics (BIPV) to achieve energy self-sufficiency.



Circular Water and Waste Systems

Comprehensive systems for harvesting rainwater, water recycling, sewage treatment and zero-landfill waste management.



Smart Energy Grids and IoT-Based Monitoring

Digital infrastructure to enable real-time monitoring of energy, water and waste performance, ensuring efficiency and transparency.



Low-Carbon Construction and Green Mobility Infrastructure

Use of sustainable construction materials, electric vehicle charging infrastructure, dedicated cycling lanes and pedestrian-friendly layouts.

By functioning as “lighthouse projects”, these townships will demonstrate best practices, generate data and provide a replicable framework for other cities. Insights gained can be fed into urban planning policies, national building codes and climate action strategies, accelerating India’s transition to a low-carbon urban future.



6.7 CONSTRUCTION AND DEMOLITION WASTE MANAGEMENT

Urban areas generate a significant volume of Construction and Demolition (C&D) waste due to continuous development activities by both government and private agencies. If it is not properly managed, this waste can cause land degradation, air and water pollution, and overuse of natural resources.

Similar to the Vehicle Scrappage Policy (2021), which incentivizes the recycling of old and polluting vehicles to promote a circular economy in the automobile sector, the government should adopt a parallel framework for C&D waste management by encouraging industries to use demolition waste as raw material and mandating its reuse in infrastructure projects.

To address this, it is essential that all local bodies:

- #1 Identify and publicly notify designated C&D waste dumping and collection sites.
- #2 Conduct comprehensive C&D waste assessments to estimate quantities, types, and potential reuse opportunities.
- #3 Establish modern C&D waste processing facilities in strategic locations, supported by adequate logistics for waste collection and transportation.
- #4 Incentivize industries which use construction and demolition waste as raw materials



In addition, the government should actively promote the reuse of processed C&D waste in public infrastructure projects, such as roads, landscaping and public housing. This will reduce the demand for virgin construction materials, lower costs and contribute to a circular economy.

A clear target should be set to achieve 100% reuse of C&D waste in these applications over time. As a first step, pilot “Circular Construction Zones” can be implemented in 10–15 districts, where all C&D waste is collected, processed, and reused locally.

Case Study: Indore’s Best Practice

Implementation Model

- **Indore Municipal Corporation (IMC)** adopted a Public-Private Partnership (PPP) model.
- Established **4 strategically-located dumping stations**.
- **Daily collection capacity:** 50–60 tons of Construction & Demolition (C&D) waste.

Processing Plant

- ✓ **Recycling capacity:** up to 100 tons/day.
- ✓ **Produces** paver blocks, bricks, and other construction materials.
- ✓ **Composition of recycled products:** 40% recycled C&D material, 60% fresh material.

Utilization of Recycled Products

- ✓ Sold to both government and private clients.
- ✓ IMC itself uses recycled products for public works.
- ✓ Private sector uses them in construction projects.



This closed-loop system of Indore Municipal Corporation has become a model for sustainable C&D waste management in India. By replicating such models across cities, India can drastically reduce landfill dependency, conserve natural resources and make urban construction significantly more sustainable.

PILLAR 7

CONSTRUCTION & PROPERTY TECHNOLOGY

7.1 R&D AND CENTRE OF EXCELLENCE ON CON-TECH & PROP-TECH

Existing Centres of Excellence (CoEs) in India function with fragmented mandates - skills, management, fire safety, infrastructure methods leading to duplication, limited scalability, and poor adoption. Research output often remains confined to academia, while small and medium contractors rarely benefit due to high costs and lack of awareness. Reliance on periodic grants further restricts continuity and large-scale deployment.

To address these gaps, a dedicated CoE on Construction Technology (Con-Tech) and Property Technology (Prop-Tech) will be established with the following objectives:



- #1 Drive R&D and innovation** in areas such as 3D printing of houses, modular construction systems, AI-based project monitoring, drones for site surveys and IoT-enabled smart building systems.
- #2 Collaborate with stakeholders** like industry leaders, academia, startups and government to co-create scalable and cost-effective solutions.
- #3 Pilot and validate technologies** (e.g., low-carbon materials, digital twin platforms, block-chain-based property records) before commercial deployment.
- #4 Facilitate adoption** by conducting training, workshops and demonstration projects to build capacity, particularly among SMEs.
- #5 Promote pre-engineered and innovative technologies** by providing heavy subsidies and exemptions from GST, ensuring affordability and faster adoption across the sector.
- #6 Support construction technology** start-ups and set-ups by offering a 10-year tax holiday, thereby enabling them to scale and compete globally.
- #7 Establish Centres for Construction Innovation Hubs - at least five in every State** to decentralize innovation, foster regional capacity-building and ensure equitable access to advanced technologies.

7.2 STARTUP AND SME SUPPORT

To accelerate innovation in Con-Tech and Prop-Tech, dedicated incubators and accelerators will be established to provide startups and SMEs with mentorship, infrastructure and business development support. A government-backed fund will assist with R&D, product development and commercialization, reducing entry barriers for innovators.

Collaboration mechanisms will connect startups with government agencies, enabling public sector pilot projects to validate solutions such as AI-based construction monitoring, BIM-enabled approval systems, digital land records or modular housing units before large-scale deployment.

Global models demonstrate the success of such approaches:



Singapore's Built Environment Accelerate to Market Program (BEAMP) connects startups with industry partners for real-world pilots.



EU's PropTech House Initiative fosters cross-border scaling of real estate tech startups.



US Con-Tech Labs provide testing grounds for startups to refine and commercialize solutions.

To promote investments in India's construction and real estate sector, the Department for Promotion of Industry and Internal Trade (DPIIT) plays a pivotal role by formulating investment-friendly policies, coordinating FDI flows, managing the Consolidated FDI Policy, and facilitating single-window clearances for both domestic and foreign investors. **DPIIT can further accelerate investments by acting as the nodal agency for sectoral reforms** of Real Estate and Construction, engaging with industry stakeholders, supporting infrastructure and innovation funding, and ensuring that new policy frameworks such as REITs, plug-and-play industrial parks, logistics parks, warehouses, retail, hospitality, data centres, etc. are implemented effectively to attract both global and domestic capital into construction and real estate. By including the real estate and construction sector under the Business Reform Action Plan i.e. the Ease of Doing Business exercise, approval processes can be stream-lined, and regulatory compliance burden would be reduced.

Additionally, to strengthen the innovation pipeline and attract global capital, **greater foreign investment in real estate and construction technology** ventures will be enabled by easing FDI norms and streamlining regulatory processes. This will facilitate inflow of funding, international expertise, advanced technologies and best practices into the Indian ecosystem.

By combining funding, mentorship, pilot deployments and foreign investment, this initiative will build a strong ecosystem to drive innovation, efficiency and competitiveness in the sector.

7.3 INVESTMENT FUNDS FOR WOMEN-LED COMPANIES IN REAL ESTATE

To promote gender diversity and innovation in real estate, a dedicated investment fund will be established for women-led Prop-Tech startups and SMEs. The initiative will provide both financial and non-financial support, enabling women entrepreneurs to scale their innovations and strengthen their role in the sector.

Key Features:

- #1 Financial Backing:**
Seed capital, growth-stage investments and access to investor & expert networks.
- #2 Capacity Building:**
Mentorship, training programs and collaboration with government and private stakeholders.

Best Practice References:



Startup India
Women Entrepreneurship Platform (WEP)



SIDBI
Women Startup Program



SheEO and IFC
Women Entrepreneurs Finance Initiative (We-Fi)



Core Objectives:

- ✓ Drive adoption of advanced property technologies.
- ✓ Empower women entrepreneurs and promote inclusive leadership.

Impact

Fosters an innovative, competitive and equitable real estate ecosystem while setting a model for gender-focused investments across industries.

7.4 DEVELOP TECHNICAL CAPACITY IN NEW CONSTRUCTION TECHNOLOGIES

Building technical capacity is key to scaling modern construction methods. Targeted training programs will be designed for engineers, architects, contractors and workers to build hands-on expertise in advanced materials, digital tools and building techniques (e.g., 3D printing, modular construction, prefabricated housing).



Integration in Education & Skilling:

Modern technology modules will be included in engineering curricula, ITIs and vocational programs (e.g., NSDC's skill courses, IIT Delhi's Con-Tech training).



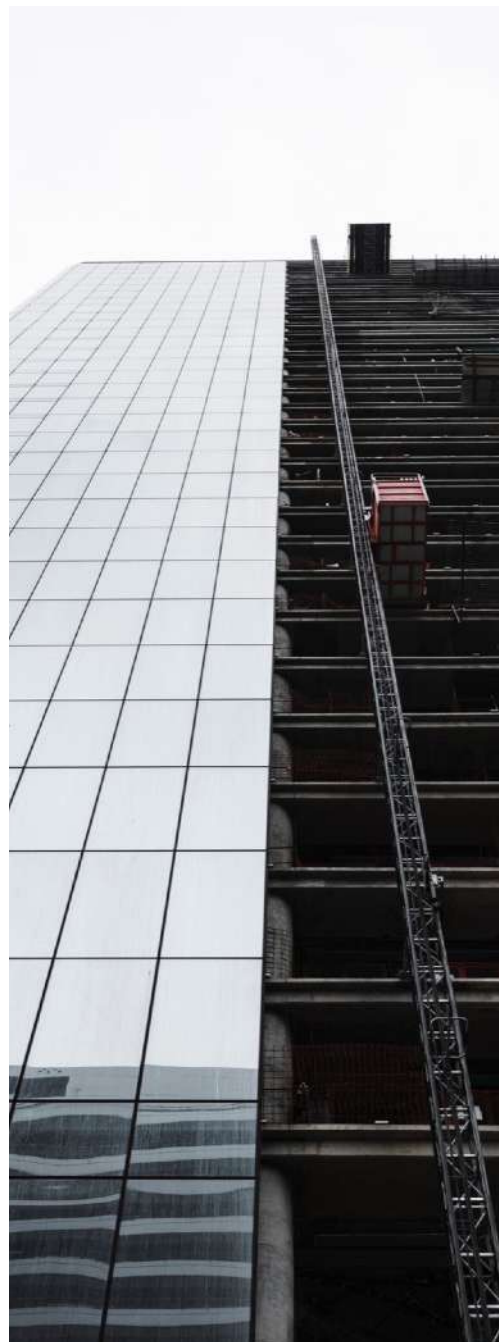
Industry-Academia Partnerships:

Collaboration with institutions and industry bodies to ensure alignment with global best practices. (e.g., NITI Aayog-CSIR's 3D printed housing initiative, IIT Madras's 3D printing startup Tvasta)



Demonstration Projects:

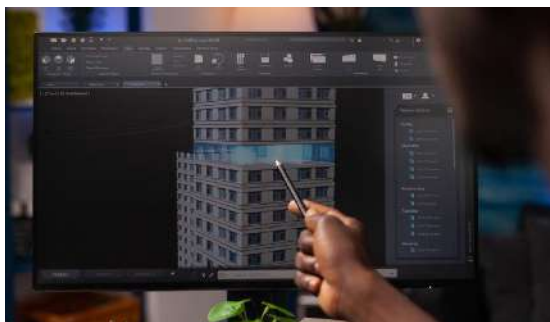
Lighthouse and pilot projects to showcase cost savings, speed and sustainability. (e.g., PMAY's 3D-printed homes in Chennai, GHTC-India Light House Projects in Lucknow and Indore)



This approach will create a future-ready workforce capable of adopting scalable, efficient, and sustainable construction technologies.

7.5 BUILDING INFORMATION MODELLING (BIM) AND DIGITAL TWIN FOR FUTURE CITY DEVELOPMENT

The integration of BIM and Digital Twin technologies is transforming the development of future cities.



BIM (Building Information Modelling):

- ✓ Collaborative platform for architects, engineers, and planners.
- ✓ Creates accurate 3D models with real-time data, reducing design errors.
- ✓ Example: Optimizing building layouts for energy efficiency before construction.



Digital Twin Technology:

- ✓ Virtual replicas of buildings, infrastructure, or entire cities.
- ✓ Uses IoT sensors and AI for predictive maintenance and performance monitoring.
- ✓ Example: Simulating traffic flow or disaster response before implementation.



Applications for Future Cities:

- ✓ Smarter urban planning and faster project execution.
- ✓ Enhanced sustainability and resource efficiency.
- ✓ Scenario simulations for energy efficiency, traffic and disaster resilience.

Governments will drive adoption through public projects, interoperability standards and professional training, making cities efficient, resilient and citizen focused.

PILLAR 8

SKILL DEVELOPMENT & LABOUR WELFARE

8.1 STATE-LED LABOUR DEMAND ASSESSMENT AND TRADE-SPECIFIC TRAINING INFRASTRUCTURE

One of the biggest challenges facing India's real estate sector is the **severe shortage of skilled labour** across key construction trades. For example, **Larsen & Toubro recently reported a shortage of 25,000 labourers** for its engineering and construction business.

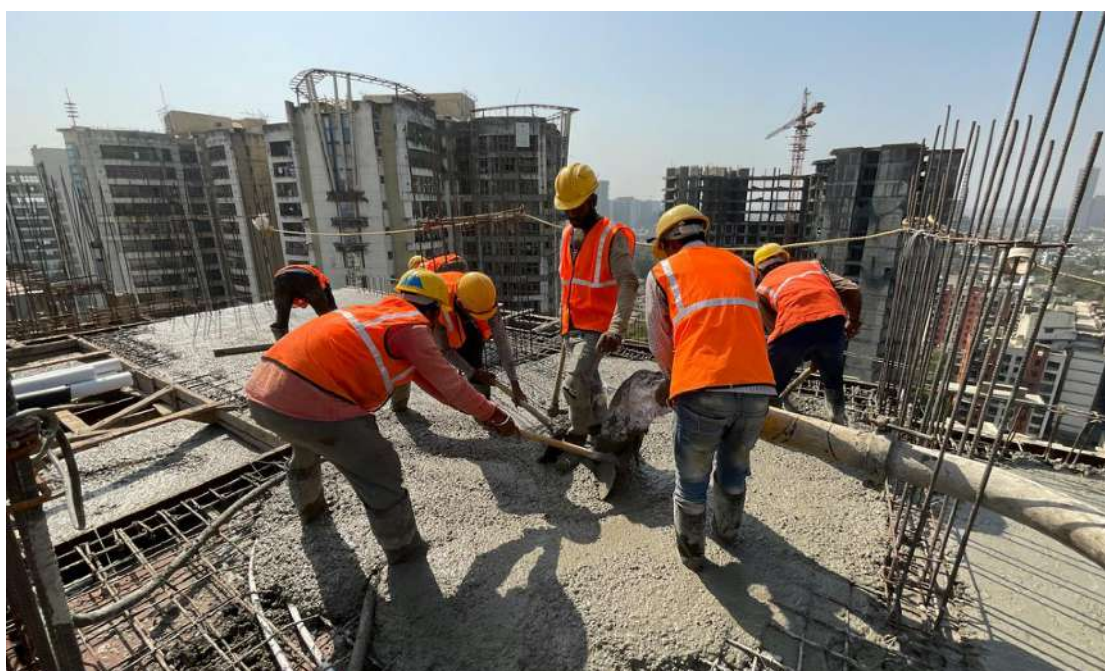
To address this, **BOCW (Building and Other Construction Workers) Boards in every state** must conduct **labour demand assessments** by region and sector.

Based on these assessments, states must establish, or upgrade **training centres focused on high-demand trades** such as **masonry, carpentry, bar bending, plumbing, electrical work, welding, and painting**.

These centres should offer:

- #1 New trainee skilling programs
- #2 Upskilling and refresher modules for existing workers
- #3 Mandatory on-site practical training and certification linked to employment
- #4 Safety and social skills training

This demand-aligned, trade-specific skilling ecosystem will ensure **better employability, higher productivity, and quality delivery** in the real estate sector.

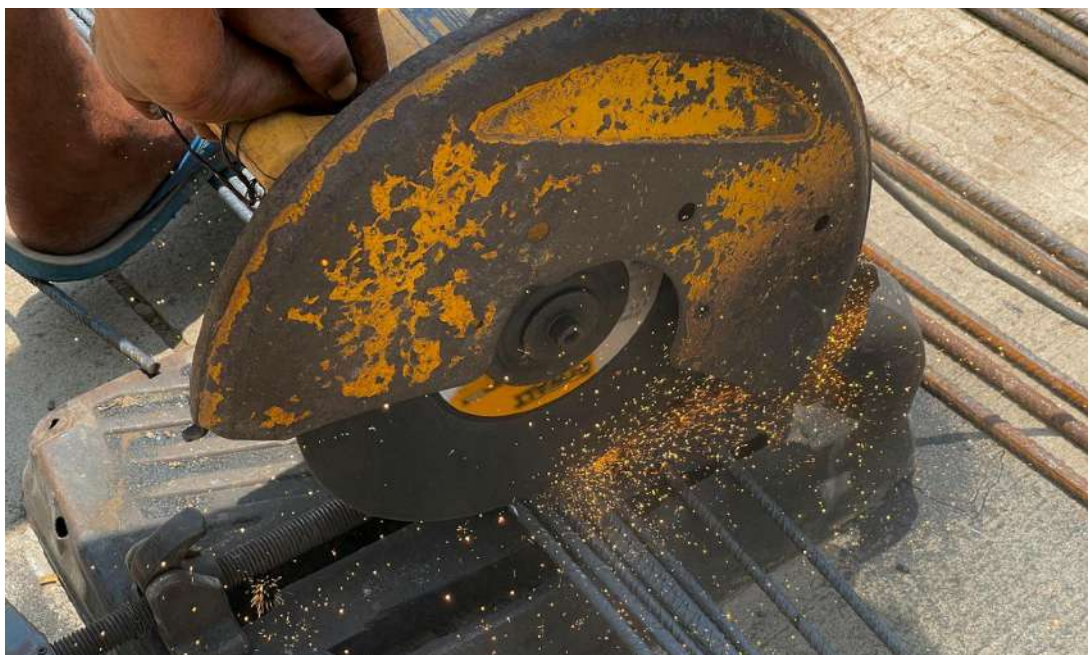


8.2 STRENGTHEN PUBLIC–PRIVATE PARTNERSHIPS (PPP) ACROSS THE SKILLING VALUE CHAIN

Despite the presence of ITIs and polytechnics, only 41% of ITI and 29% of polytechnic graduates are considered employable. This points to a major gap between curriculum and industry requirements. To bridge this gap:

- #1 Skilling must be reimagined through **robust PPPs** where **industry is actively involved** in:
 - ✓ **Curriculum design** (based on actual site requirements)
 - ✓ **Training delivery** (via on-site programs and industry-led trainers)
 - ✓ **Assessment and certification** (aligned with real-world job roles)
- #2 Leading real estate firms, EPC contractors, and REITs should be incentivized to **adopt training centres**, co-invest in infrastructure, and provide **placement-linked programs**.

This approach will create a future-ready workforce capable of adopting scalable, efficient, and sustainable construction technologies.



8.3 RAISE ASPIRATIONAL VALUE OF VOCATIONAL EDUCATION THROUGH INTEGRATION AND VISIBILITY

India's vocational skilling ecosystem suffers from a **low aspirational value**, poor career mobility, and limited awareness. Only **4.42% of youth (15–29 years)** possess any formal vocational certification – compared to **96% in South Korea, 80% in Japan, and 75% in Germany**. To change this:

- #1 Integrate vocational and mainstream education** by operationalizing the National Credit Framework (NCrF), allowing **seamless progression from certificates to diplomas and degrees**.
- #2** Develop and publicize **career pathways** within construction trades — from unskilled worker → skilled technician → site supervisor → contractor.
- #3** Promote **awareness campaigns, success stories, and career counselling** at the school and college level.
- #4** Introduce **national recognition systems for skilled trainers and skills Olympiads or competitions** to generate prestige.
- #5 Upskilling of construction professionals** such as engineers, supervisors, and storekeepers also needs to be focused so that they can perform their roles more efficiently and professionally.

By creating a **visible, aspirational, and rewarding vocational ecosystem**, India can attract youth into the construction workforce and build long-term sectoral capacity.



8.4 REFORM UTILIZATION OF LABOUR CESS TO DIRECTLY BENEFIT ON-SITE WORKERS

Under the **Building & Other Construction Workers' Welfare Cess Act, 1996**, a 1% **labour cess** is levied on the cost of construction to fund welfare schemes for construction workers.

While this framework is well-intentioned, the **actual reach and impact of BoCW welfare programs remain limited.**

To improve effectiveness and ensure **direct, timely benefit to workers**, the following reforms are recommended:



Allow developers to utilize up to 50% of the labour cess collected for on-site welfare measures at the project level.

Eligible uses may include:





- ✓ Provision of **healthcare, sanitation, safety equipment**
- ✓ **Childcare, food, and resting facilities** on site
- ✓ Creation of temporary shelters and crèches

These reforms will help ensure the **labour cess serves its core purpose** - enhancing the dignity, security, and livelihoods of the very workers it is meant to protect - while also improving workforce retention and productivity on construction sites.



8.5 IMPLEMENT YOUTH UPSKILLING PROGRAMME INTEGRATING “JOB NEEDS + TRAINING + CERTIFICATION + JOB PLACEMENT”

The proposed programme envisions a government-led initiative to upskill youth and bridge the work-force gap in labour-intensive construction sector, which is the second highest employer of workers in the country.

Sector	% Workforce	Skill Level	Formal-ization	Gender Ratio (M/F)	Growth Trend
 Agriculture	45.80%	Low	Low	2.5:1	Declining
 Construction	13.00%	Low-Semi	Very Low	5:01	Rising
 Manufacturing	11.40%	Low-High	Moderate	3:01	Slight decline
 Services	29.8%*	Mixed	Moderate	2:01	Mixed

*Services sector includes - trade, hospitality, transport, communications, other professional services

Under this model, **training will be aligned with actual job requirements** and delivered at the **Urban Local Body (ULB) level across India**, ensuring accessibility at the grassroots. Upon successful completion, candidates will receive **certification and direct job placement** in urban and peri-urban areas where construction opportunities exist. To facilitate smooth mobility, the programme will also extend **migration support** for workers.

Further, the **integration of government support with private sector partnerships** will enable assured job placements and better working conditions, thereby enhancing the **welfare and security of workers** while meeting industry demands.

This integrated approach addresses two critical challenges:

- #1 Reducing workforce shortages** in high-demand sectors.
- #2 Providing industries with a steady pipeline of certified, skilled labour** while creating dignified livelihood opportunities for youth.

By combining training with assured placement and institutional support, the programme ensures a win-win outcome for workers, industries, and India's urban growth.

PILLAR 9

EASE OF LIVING

9.1 EVERY MAJOR URBAN CENTRE TO CELEBRATE CULTURAL UNIQUENESS / HERITAGE



A people or city without the knowledge of their past history, origin and culture is like a tree without roots.

- Marcus Garvey

As Indian cities continue to urbanise at an unprecedented pace, they often do so at the cost of losing their cultural roots and heritage identity. The character of a city is defined by its cultural uniqueness and heritage assets – yet many modern Indian cities have evolved into generic urban spaces lacking distinctiveness.

Take Gurugram for example: despite being a leading financial and corporate hub, it lacks a cultural signature of its own. The rapid transformation into a metropolitan hub has overlooked the rich Haryanvi heritage, leaving the city resembling any other modern business district, without an authentic sense of place.

To address this, every major urban centre must actively celebrate and preserve cultural uniqueness through:

- #1 Heritage mapping and protection of historic precincts, sites, and cultural assets.
- #2 Annual city festivals showcasing local art, crafts, food, and traditions.
- #3 Adaptive reuse of heritage spaces (e.g., old havelis or industrial sites converted into cultural hubs).
- #4 Integration of local motifs and identity in new public spaces and urban design.



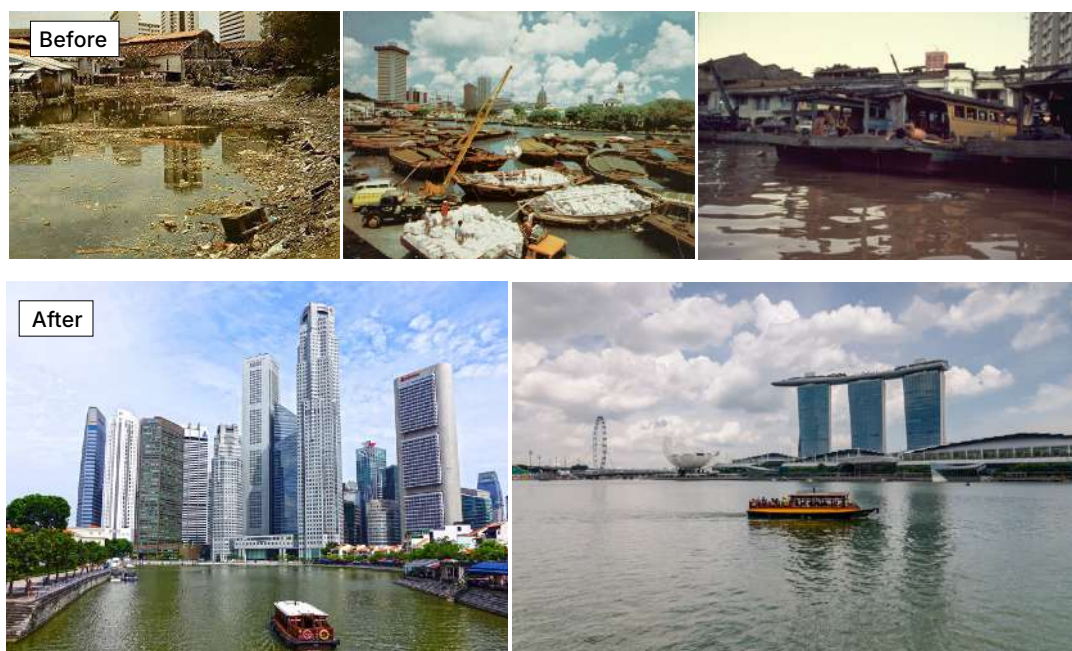
Such measures not only **strengthen cultural identity** but also enhance **tourism, city branding, and citizen pride** while ensuring that urbanisation does not erase the distinct character of Indian cities.

For instance, **Ahmedabad**, India, has successfully safeguarded its local heritage while evolving into a modern city. The traditional pol houses in the old walled city have been carefully maintained, Ahmedabad further supports its cultural preservation through the use of heritage Transferable Development Rights (TDR).

Singapore's revival of the Singapore River showcases how heritage can enhance liveability. Once polluted, it was transformed into a vibrant public realm where conserved shophouses and warehouses at Boat Quay, Clarke Quay, and Robertson Quay were adaptively reused. By blending cultural heritage with modern leisure and commerce, the city created a distinctive identity that boosts tourism, recreation, and quality of life.

Figure 14 |

How Singapore transformed its rivers over the span of 30 years



By striking a balance between heritage conservation and modern urban growth, cities can shape dynamic, culturally vibrant, and sustainable environments that honor historical legacies while embracing future aspirations.

9.2 CITIZEN-DRIVEN CITY GOVERNANCE

Cities have been serving as the growth engines for people and the country. However, the success of the city is dependent on how well they are governed. In a democratic country like India, engagement of citizen in the citizen governance becomes important.

As the population of our cities grow, a citizen driven governance is needed to build trust of the citizens on the government. The involvement of citizens makes the governance more accountable and transparent.

Cities like Pune have participatory budget strategy and Kerela people's planning illustrate how co-governance enhances service delivery, ownership, and civic pride.



The various tools that can be used for the citizen participation may be as follows but not limited to:

- #1 Participatory Budgeting**
Citizens directly vote or have a say in budget allocation at municipal levels.
- #2 Ward Committees & Mohalla Sabhas**
Decentralization of the power to the municipal officials to discuss the local issues.
- #3 Digital Governance Platforms**
Digital platforms like apps for grievance redressal, feedback and service tracking.
- #4 Citizen Report Cards**
A system that publicly displays the level of citizen satisfaction.
- #5 Open Data**
Municipal data like budgets, infrastructure projects available publicly in real time for public monitoring.

A citizen-driven governance framework - enabled by ward committees, civic-tech tools, and transparent municipal practices - can make Indian cities more resilient, inclusive, and trusted by their people.

9.3 CLIMATE RESILIENCE OF URBAN INFRASTRUCTURE

Indian cities face recurring climate-linked disasters, from severe droughts in Bengaluru to chronic waterlogging in Gurugram, Delhi, and other major urban centres to the major cloud bursts in the regions of Himalayas.

While many of these are human induced, they reflect the unique climate vulnerabilities across India's diverse geographies, posing complex challenges for urban infrastructure and governance.

Building climate-resilient urban infrastructure is therefore critical to ensuring ease of living in the coming decades. Cities must shift towards sustainable, adaptive, and risk-sensitive urban planning, supported by integrated policies and community participation.

These challenges and threat caused by the climate is going to rise in the coming years and the Indian cities must be ready to face them.

Fundamentals governing the climate resilience in urban areas:



Sustainable Urban Planning

Cities can enhance climate resilience by integrating sustainability into urban planning.

For instance, Copenhagen's cloudburst management strategy provides a structured approach to handling extreme rainfall events, combining urban design with flood mitigation measures.



Green Infrastructure

Incorporating green infrastructure - such as parks, green roofs, urban forests, and wetlands - helps cities manage stormwater, reduce flooding, and improve water quality.

New York City's Green Infrastructure Program exemplifies this approach, employing rain gardens, permeable pavements, and rooftop vegetation to address urban water challenges while improving environmental quality.

Adaptive Policies

Flexible and context-sensitive policies enable cities to respond effectively to climate risks.

A notable global example is the floating city of Rotterdam. Waterplein Benthemplein, Rotterdam is one of the world's first 'water squares.' It doubles as a vibrant public space during dry periods and transforms into a stormwater retention basin during heavy rains. The project reflects Rotterdam's tradition of integrating water management with urban design, offering valuable lessons on how cities can combine climate adaptation with community-oriented public spaces while also highlighting the practical challenges of implementation.



Community Engagement

Involving local communities in climate resilience planning strengthens both social and environmental outcomes.

Medellín, Colombia, has successfully engaged residents in participatory planning processes, transforming informal settlements with green corridors and public spaces that enhance safety, accessibility, and ecological resilience.



Technology Integration

Advanced technologies can support urban resilience by enabling real-time monitoring and efficient resource management.

Singapore's Smart Nation initiative leverages sensors, AI, and data analytics to monitor urban heat islands, optimize energy usage, and integrate sustainability practices into everyday urban life, providing a model for technologically enabled climate resilience.



Ease of living relies on preserving cultural heritage, enabling citizen-driven governance, and building climate-resilient infrastructure. Together, these strategies create vibrant, inclusive, and sustainable cities that honour the past while preparing for the future.

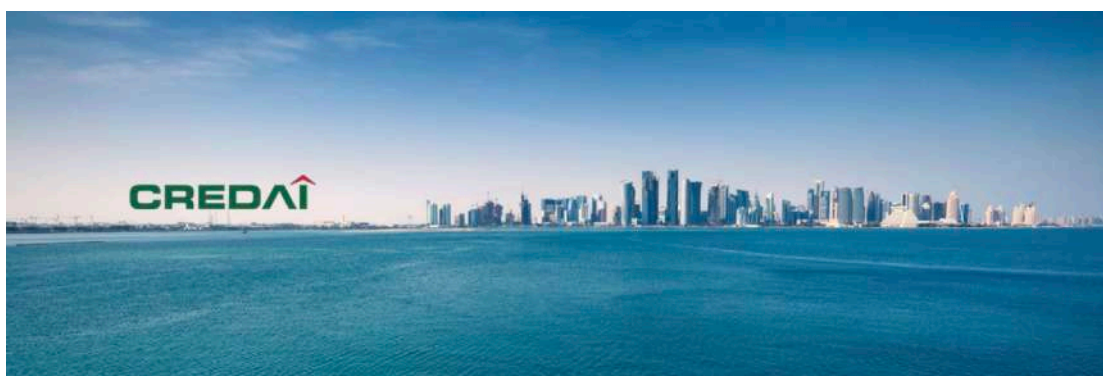
04

ROLE OF CREDAI IN NATION BUILDING



4.1 ROLE OF CREDAI IN ACHIEVING VISION 2047 FOR INDIA'S REAL ESTATE SECTOR

The real estate sector in India is set to emerge as one of the primary drivers of economic growth, urban transformation, and social progress in the coming decades. As India aspires to become a developed nation by 2047, the sector must deliver on the twin imperatives of scale and sustainability - creating inclusive urban ecosystems while meeting the aspirations of a rapidly urbanizing population. In this journey, the **Confederation of Real Estate Developers' Associations of India (CREDAI)** is uniquely positioned to play a catalytic role, given its national footprint, industry expertise, and proven experience in working alongside both government and private stakeholders.



CREDAI has established itself as the voice of the real estate sector, with over 13,000 developers as members across 230 city and 20 state chapters. Its strength lies in bridging ground-level realities with national-level policymaking, enabling it to act as both a representative and a thought leader. Building on this foundation, CREDAI's contribution to **Vision 2047** can be envisaged across seven critical areas.

01 POLICY PREPARATION AND APPROVALS FACILITATION

CREDAI has been instrumental in advocating **tax incentives like Section 80-IB** for affordable housing, ensuring alignment with national housing goals. It has also represented the industry on key issues such as **GST rationalization, RERA implementation, FDI/REIT reforms, infrastructure status, and stamp duty rationalization**, thereby balancing regulatory compliance with developer viability and consumer protection.

Regulatory delays and fragmented approval systems continue to be a bottleneck for real estate growth. CREDAI's strength lies in **working closely with government bodies** to assist in the **preparation of effective policies** that address ground-level challenges and industry needs.

By contributing practical insights from developers and urban practitioners, CREDAI can help in drafting frameworks that enable **streamlined processes, digitization of approvals, and reforms in land, taxation, and financing policies**. Through this collaborative approach, CREDAI can support the government in creating a **transparent and conducive regulatory framework**, thereby reducing costs, enhancing ease of doing business, and attracting investments into the sector.

02 URBAN PLANNING AND MASTER PLANS

Serving as a knowledge partner and policy advocate, CREDAI has actively supported the formulation and rollout of master plans for cities and towns. **In Tamil Nadu, CREDAI unveiled master plans for 135 urban centres** to guide sustainable growth, infrastructure investments, and zoning reforms. Additionally, CREDAI has promoted digital solutions for **planning approvals and flexible zoning**, aligning with national reforms such as the Town Planning Scheme and smart city initiatives.

India's cities are expected to host nearly 900 million people by 2047, placing enormous pressure on existing urban infrastructure.¹⁰ CREDAI, through its local chapters, can assist in the preparation and periodic revision of **Master Plans for 100 cities of Tomorrow**. By integrating private sector knowledge with public planning processes, CREDAI can ensure that these plans are not only visionary but also practical, aligned to land use realities, housing demand, and growth corridors. This will make Indian cities more livable, sustainable, and future-ready.

03 SKILLING A FUTURE-READY WORKFORCE

Recognizing sectoral needs, CREDAI launched a dedicated **Skilling Council and CSR Foundation to upskill construction workers nationwide**. The programs were delivered onsite and offsite, targeting modern construction skills, safety, and employability. Its recent initiatives set goals to provide **skilling to 5 lakh workers across the country**. Strategic **MoUs with NSDC and QCI** have institutionalized these programs, aiming to build a future-ready, quality-oriented workforce.

Construction remains one of the most labour-intensive industries in India, employing 73 million workers.¹¹ However, skill gaps and lack of formal training often limit productivity and worker welfare. CREDAI has already piloted successful skill development initiatives in partnership with government schemes, and this experience can be scaled up into a **comprehensive national skilling programme**. By equipping youth with modern construction skills, digital know-how, and safety training, CREDAI can ensure that India has a **future-ready workforce** to meet the sector's growing demands while also creating dignified employment opportunities.

¹⁰ <https://www.pib.gov.in/PressReleasePage.aspx?PRID=2108407>

¹¹ PLFS July 2023 - June 24, MoSPI

04 BUILDING REAL ESTATE DIGITAL PUBLIC INFRASTRUCTURE (DPI)

CREDAI is driving digital transformation through initiatives such as **E-Library, which serves as a national repository for regulations, notifications, and research for practitioners**. Transparency and trust are the cornerstones of a mature real estate market. CREDAI can play a key role in developing a **Real Estate Digital Public Infrastructure** that integrates land records, approvals, transactions, and compliance systems on a unified platform. Such an ecosystem will not only enhance ease of doing business but also empower citizens with reliable, accessible information - reducing disputes, improving accountability, and fostering investor confidence.

05 PROMOTING SATELLITE TOWNS FOR BALANCED GROWTH

Rapid urbanization has led to congestion in major metropolitan cities. To decongest these hubs and promote regional equity, CREDAI can actively support the **planned development of satellite towns** around metros. CREDAI works with government bodies to **frame township policies, promote new residential zones, and unlock peripheral land for urban expansion**, thereby supporting infrastructure and affordable housing in emerging corridors. By leveraging its member network and working with state governments, CREDAI can ensure these towns are well-connected, affordable, and sustainable, creating new engines of growth while reducing the pressure on existing city infrastructure.

06 CHAMPIONING SUSTAINABLE AND INCLUSIVE DEVELOPMENT

Finally, as India balances growth with sustainability, CREDAI can serve as a champion of **green, affordable, and smart urban development**. By promoting energy-efficient buildings, sustainable construction technologies, and affordable housing models, CREDAI can help align the sector with India's climate commitments and the UN Sustainable Development Goals (SDGs). Its advocacy can also ensure that inclusivity - whether in terms of housing affordability, worker welfare, or gender participation - remains at the core of real estate growth. The CSR wing of CREDAI is committed to the preparation of developing and executing the social welfare and development schemes, for betterment of some of the most marginalised communities in India.

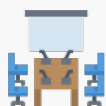
07 ESTABLISHING A NATIONAL REAL ESTATE DATA CENTRE

Data-driven planning will be essential for building resilient and sustainable urban ecosystems. CREDAI can spearhead the creation of a **National Real Estate Data Centre**, which will serve as a repository of authentic market intelligence, demand-supply analytics, housing trends, and investment flows. This will aid policymakers in evidence-based decision-making, enable developers to align with market needs, and support investors in making informed choices.

4.2 IMPLEMENTATION PLAN FOR ACHIEVING VISION 2047

Achieving the ambitious goals of Vision 2047 for India's real estate sector requires a robust governance framework, coordinated execution across levels of government, and active participation of industry stakeholders. The implementation strategy must be rooted in strong institutional mechanisms, clear accountability, phased reforms, and continuous monitoring.

The proposed plan rests on three pillars:



National-level High-Level Committee at the Prime Minister's Office

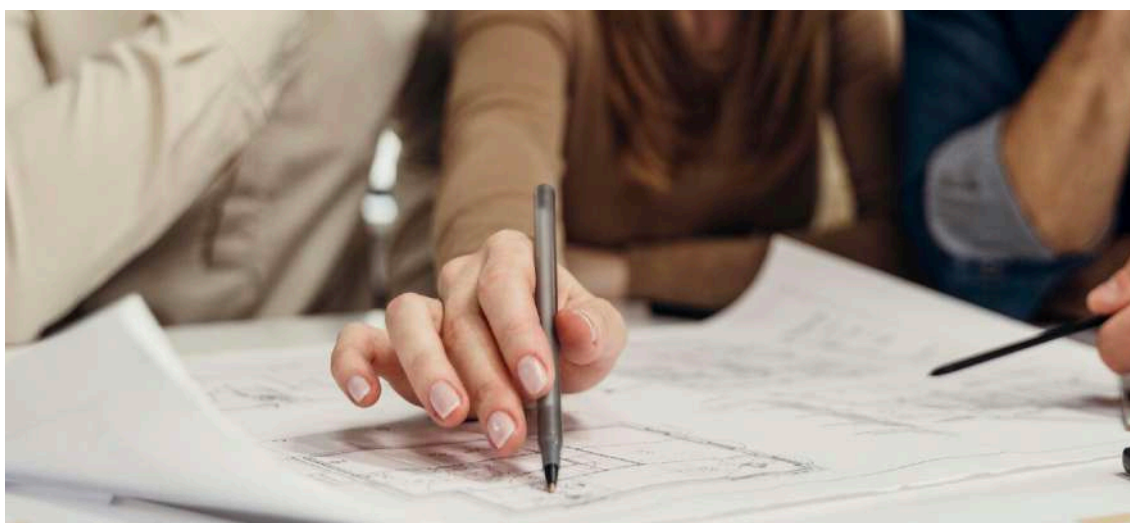


State-level War Rooms for localised execution



Phased roll-out of short, medium, and long-term reforms

Together, these measures will ensure that urban development and real estate transformation remain on track, scalable, and impactful over the next two decades.



4.2.1 CONSTITUTING HIGH-LEVEL COMMITTEE AT THE PM LEVEL

To provide overall vision, guidance, and accountability, a **High-Level Committee chaired by the Hon'ble Prime Minister of India** should be constituted.

This committee will serve as the apex body for setting national targets, aligning policies across ministries, and fast-tracking decision-making for critical reforms.

The composition of the committee may be:

Chair

Hon'ble Prime Minister of India

Members

- ✓ Minister of Housing & Urban Affairs
- ✓ Minister of Finance
- ✓ Minister of Rural Development
- ✓ Minister of Environment
- ✓ Minister of Law
- ✓ Minister of IT

Special Invitees

- ✓ Vice-Chairperson, NITI Aayog
- ✓ Chief Secretaries of States
- ✓ Representatives from CREDAI
- ✓ Policy think tanks
- ✓ Domain experts

The mandate of the Committee will include:

- #1 Overseeing nationwide implementation of real estate and urban reforms.
- #2 Setting Key Performance Indicators (KPIs) for states and ministries.
- #3 Approving national-level frameworks on land reforms, digital transformation, affordable housing, and sustainability.
- #4 Reviewing progress quarterly and directing mid-course corrections where necessary.

By positioning this Committee at the highest level, the government ensures political will, policy coherence, and the ability to overcome inter-ministerial or inter-state hurdles.



4.2.2 CONSTITUTING WAR ROOM AT THE STATE LEVEL

While the High-Level Committee provides vision, **State War Rooms** will act as the operational command centres. Chaired by the Chief Minister, these War Rooms will translate national policy into state-specific action and serve as real-time problem-solving hubs.

The composition of the committee may be:

Chair

Chief Minister of State

Members

- ✓ Chief Secretary of State
- ✓ State Departments:
 - Urban Development
 - Housing
 - Revenue
 - IT
 - Environment
- ✓ State Town Planning Authorities
- ✓ ULB Commissioners

Special Invitees

- ✓ CREDAI representatives
- ✓ GIS and land survey experts
- ✓ Legal experts
- ✓ IT specialists

The functions of the War Room will include:

- #1 Monitor the progress of reforms on a day-to-day basis.
- #2 Resolve bottlenecks in land titling, building approvals, and urban regeneration.
- #3 Facilitate convergence across state departments and ULBs.
- #4 Act as nodal centres for engaging with industry and local communities.
- #5 Feed progress updates into national dashboards for periodic review by the High-Level Committee.

These War Rooms will ensure reforms do not remain policy documents but are implemented effectively at the grassroots.



4.2.3 IMPLEMENTATION ROADMAP: SHORT, MEDIUM, AND LONG-TERM PLANS

A phased approach is critical to balance ambition with feasibility. The following roadmap lays out **Short-Term (up to 2 years)**, **Medium-Term (up to 5 years)**, and **Long-Term (up to 10 years)** milestones that will collectively pave the way for achieving Vision 2047.

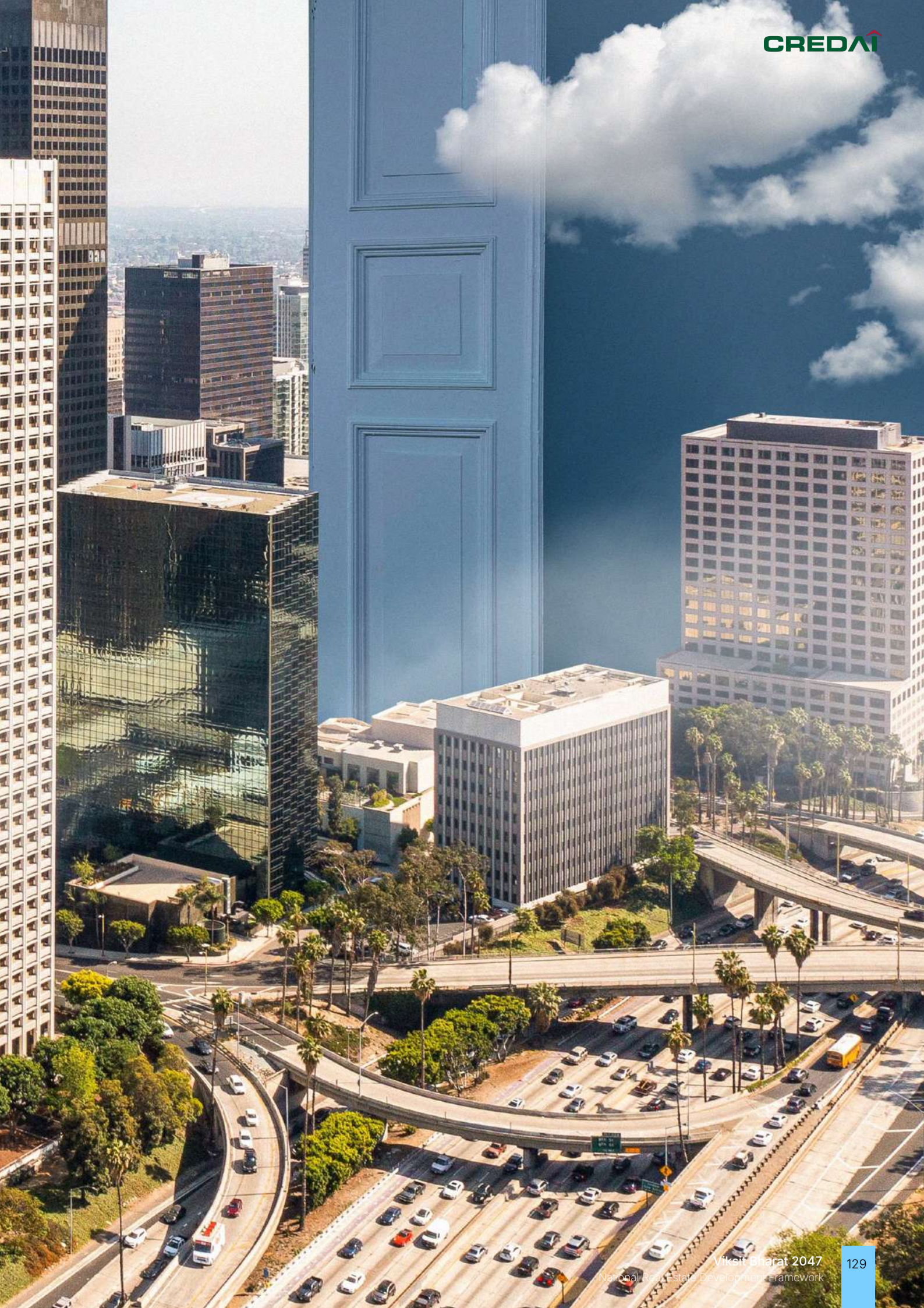
Pillar	Reform	Timeline
Land Reforms	Ensure Conclusive Titling through Land Titling Act	Medium-Term
	Create Unified National Digital Land Register	Medium-Term
	Enactment of Registration Bill 2025 & Implement Fast, Simplified Registration and Mutation Process	Short-Term
	Create Land Banks for Affordable Housing (Ownership based / Rental)	Medium-Term
	Timely Land Acquisition	Medium-Term
	Zoning and Master Planning Reforms	Medium-Term
	Town Planning (TP) Acts and Master/Development Plans	Medium-Term
	Digitisation and Technology Integration	Short-Term
	Governance and Process Simplification	Short-Term
Developing Future Cities – 100 cities of tomorrow	New Counter Magnet / Satellite Cities as growth engines of Future	Long-Term
	Revitalising Existing cities – Urban Regeneration with Heritage Sensitivity	Medium-Term
	Urban Infrastructure Readiness	Medium-Term
	Merge Housing and Urban Development Departments	Medium-Term
Ease of Doing Construction	Transform Building Plan Approvals through Digitization, Transparency & Time-Bound Processing	Short-Term
	Introduce a Statutory Framework for Deemed Approvals in Urban Development	Medium-Term
	Establish Uniform Development Control Rules (DCR) and State Processing Centres for Building Plan Approvals	Medium-Term
	Empower Empanelled Professionals for Self-Approval of Standard Building Plans	Short-Term
	Transparent Dashboards on Time for Approval & Status	Short-Term
	Competent Authorities like ULBs / Planning Authorities etc. & Government Authorities to be accountable to RERA	Medium-Term
	Preventing Unauthorised / Informal Housing	Long-Term
	Centralized NoC Integration	Medium-Term
	TDR Marketplace	Medium-Term

Pillar	Reform	Timeline
Financing & Costing	Reduce and Rationalize Government Charges to Lower Housing Costs - Introduce a Cap on Government Charges	Short-Term
	Infrastructure Financing through Dedicated Funds	Medium-Term
	Government Back Infrastructure & Housing Bonds	Short-Term
	Ensuring Financial Viability of Social Housing (Affordable Housing and Social Rental Housing) for Rural & Urban	Medium-Term
	Reform Circle Rates to Reflect Market Realities	Short-Term
	Encouraging Private Public Partnerships	Medium-Term
	CSR contribution	Medium-Term
Redevelopment	Area Based Redevelopment Rather than Project Based	Medium-Term
	Slum Redevelopment – Whole of Slums Approach	Medium-Term
	State Slum Rehabilitation Authority	Medium-Term
	Redevelopment Roadmap 2047 for cities to be developed	Short-Term
	Community Participation in Urban Redevelopment Process	Short-Term
Green and Sustainable Living	Government Must Lead – All New Government Buildings to Be Net-Zero + Retrofit Existing Stock	Medium-Term
	Fast-Track Environmental Clearance for Net-Zero Buildings	Short-Term
	Incentivize Green Retrofitting – Launch a National Green Retrofit Mission	Medium-Term
	Ensure Continuity of Green Operations – Link Property Tax to Sustainability Performance	Medium-Term
	Launch Pilot Net-Zero Townships with Private Sector Participation	Long-Term
	Construction and Demolition Waste Management	Short-Term
Construction & Property Technology	R&D & Centre of Excellence on Con-Tech & Prop-Tech	Medium-Term
	Startup and SME support	Short-Term
	Investment Funds for Women-led Companies in Real Estate	Short-Term
	Develop Technical Capacity in New Construction Technologies	Medium-Term
	Building Information Modelling (BIM) and Digital twin for Future City Development	Long-Term

Pillar	Reform	Timeline
Skill Development & Labour Welfare	State-Led Labour Demand Assessment and Trade-Specific Training Infrastructure	Medium-Term
	Strengthen Public-Private Partnerships (PPP) Across the Skilling Value Chain	Short-Term
	Raise Aspirational Value of Vocational Education through Integration and Visibility	Medium-Term
	Reform Utilization of Labour Cess to Directly Benefit On-Site Workers	Short-Term
	Implement Youth Upskilling Programme Integrating "Job needs + Training + Certification + Job Placement"	Medium-Term
Ease of Living	Every Major Urban Centre to celebrate Cultural Uniqueness / Heritage	Medium-Term
	Citizen Driven City Governance	Medium-Term
	Climate Resilience of Urban Infrastructure	Long-Term







DISCLAIMER

This report has been prepared by the Confederation of Real Estate Developers' Associations of India (CREDAI), with research and analytical support from Primus Partners Private Limited.

The contents of this report draw upon advisory inputs and guidance provided by Executive Committee of CREDAI, supplemented by research and analysis conducted by Primus Partners. The information presented is based on publicly available material, primary discussions, and/or third-party sources. While due care has been taken to validate the authenticity and accuracy of such information, the report is intended solely for general informational purposes.

This report does not constitute a recommendation or endorsement by CREDAI or Primus Partners to invest in, sell, or otherwise engage with any of the markets, entities, or companies mentioned herein.

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Established in 1999, CREDAI represents over 13,000+ real estate developers across 21 states and 230 city chapters in India. Our mission is to advocate for progressive and sustainable development in the real estate sector, fostering inclusive growth and excellence through leadership and innovation. We work closely with all stakeholders including Government representatives, policymakers, investors, finance companies, consumers, and other real estate professionals.



Primus Partners stands as a prominent Indian management consulting firm, firmly grounded in the ethos of 'India First'. Established by seasoned industry leaders with extensive experience in global organizations, Primus Partners boasts a team of close to 350 consultants and advisors, showcasing some of the finest talent in the nation. With six offices strategically located across India, the firm enjoys a pan-India presence and successfully executes projects in over thirteen countries.