CHAPTER 3

INTRODUCTION TO THE STUDY, URBANIZATION TRENDS AND FEATURES OF URBANIZATION IN STUDY AREAS

3A. INTRODUCTION TO THE STUDY

This chapter states the contextual framework of this study and the research problem. It affirms the conceptual framework, the hypotheses and the objectives of the study. The literature scan and the presentation of chapters are then outlined. The chapter further looks at some aspects of India’s economic growth, issues of migration and GDP contribution in the context of India’s urbanization. This is because of the close relationship that appears between certain patterns of economic growth and urbanization and the planning of urbanization.

Operational Definitions

It would be apposite that some of the terms frequently used in the present study are understood with clarity. From that viewpoint, therefore, operational definitions of these terms are provided upfront.

Urban planning is a multi-tiered and multi-disciplinary process that concerns itself with the use of land, its balanced apportionment for several uses comprising, inter alia, economic, environmental, and social infrastructure designed to ensure a desired productivity and quality of life.

Modern urban planning originated in the aftermath of industrial cities that grew in a highly disorderly, unhygienic and chaotic fashion in the 19th century that caused huge distress, squalour, disease and death. Governments stepped to stem in such rot. From there, urban planning followed a learning process and evolved to the current stage. The complexities and of urban life and urban dynamics have made urban learning a continuous process and the discipline continues to change and evolve.
Urban planning is made up of several disciplines, from land use planning to architecture to engineering to social science. Its ultimate objective is to guide and ensure the orderly development of cities settlements according to certain development benchmarks and rules of development. There are various terms used to denote aspects of urban planning, such as regional plans, development plans, town plans strategic plans, comprehensive plans, neighbourhood plans, heritage plans. Over the years such several newer concepts have entered the urban planning field such as sustainable urban development, reconstruction and renewal planning, transportation planning and participatory planning.

Urban dynamics denotes the processes and factors that constantly shape and reshape urban spaces through their use and subsequent modifications. This, inter alia, comprises suburbanization, ex-urbanization, counter-urbanization, green-field and brown-field development, urban decay, urban renewal and spatial exclusion. Sub-urbanization refers to growth of certain areas as units away from the centre. Ex-urbanization stands for a process whereby generally affluent sections of people move away from the city to the rural areas, but with an enhanced quality of life. Counter-urbanization refers to a significant decline in a city’s population and the growth of other smaller settlements at the expense of the main city. Greenfield development refers to fresh construction within a city’s virgin land hitherto left undeveloped or fresh outlying areas merged into the city and their development. Brown-field development refers to redevelopment of old structures in the city that are either dysfunctional or have outlived their lives. Additionally, such structures, even before the end of their lifespan are demolished and rebuilt to get more value out of the land.

Cities across the world are continuously going through such a process of constructional transformation. Because of a city’s comparative longevity and on account of the in-migration and out-migration of populations, the impact of changes in global and local economy, physical, technological and environmental changes, cities per force are required to change and respond to the altering factors in the external environment that they cannot control, but to which they must respond in order to survive.

Urbanization is a process by which a human settlement acquires the characteristics of a town. It is also understood generally as an increase in the population of towns in relation to a slower growth in rural areas. The urban population means the total population living in urban areas, as defined by the country. The census of India considers urban areas on the triple criteria of population, non-agricultural working population and density. A town should have a
minimum population of 5000. At least 75% of its male working population should be engaged in non-agricultural work. Its density of population must be at least 400 per sq km.

The second measure, **rate of urbanization**, describes the projected average rate of change of the size of the urban population over the given period of time. This is the increase in the proportion of urban population over time, calculated as the rate of growth of the urban population minus that of the total population. Positive rates of urbanization result when the urban population grows at a faster rate than the total population. This is especially true in Asia, home to the most rapidly urbanizing nations today.

**Unplanned cities** are cities that have still not been brought within the fold of an urban plan. They could also be large urban areas within planned cities but have grown in a manner not prescribed by planning norms within that city. While the planned city obeys urban laws and carries out development with approvals from the authorities according development control regulations, the unplanned city often displays a bottom-up approach where people construct without permission and without observing the planning yardsticks mandated for the city.

Many of such unplanned areas are also referred to as informal settlements. They connote the same constituents of unplanned, unauthorized structures and beyond urban laws and regulations. Slums fit this categorization very closely. So would the hawking markets on parts of roads and footpaths or other lands not earmarked for the cited purpose. These unplanned areas are generally occupied by the poor, since the planned city is not affordable either for their residential needs or for their enterprise. They therefore per force resort to informal settlements and informal enterprise, recognized as the informal sector.

**Quality of life (QOL)** is used worldwide to describe the general well-being of societies and people. This is measured on the basis of a basket of indicators thought to be comprehensive and conclusive enough to establish the quality of life in a particular country, region or individual settlement. In general, a similar formulation would be applicable to cities.

We could, therefore, state that ‘quality of urban life’ refers to the capacity of a city to deliver to its citizens a basket of conditions and services for living life. These would comprise conditions and services related to economy, politics, environment, society, recreation, culture, safety and security.
The QOL concept, however, has remained mainly theoretical as it contains a large element of subjectivity. The determining factors taken as criteria in these studies are far from being standard. Very often, economic indicators outshine all other criteria for evaluating well-being in cities. This approach, however, is very restrictive, since such indicators have been proved inadequate in expressing the real needs, preferences and priorities of citizens. For these reasons, the definition and the adequate measurement of QOL in a given society still remains inefficient.

Because of the relativity of the concept in relation to a country’s stage of development, it would be inappropriate to rely on any international benchmark that would not be representative of India and its cities. For this study, therefore, we have relied on certain service benchmarks set by Government of India, the annual studies made by the cities themselves and a general trend on how, based on the indigenous norms has quality of life moved in the research cities.

Development Control Regulations are that component of urban planning that regulate the use of land and built space through permits for layouts, subdivisions and buildings. In simple terms they lay down the details and the working tools of how development and construction would be permitted and controlled. They stipulate the manner in which permissions can be obtained, and prescribe access, layouts, open spaces, area and height limitations, lifts, fire protection, exits and parking requirements. These rules could be city specific, approved by the planning authority and finally sanctioned by the state government. These originated from public health considerations. These subsequently have expanded to encompass environmental, demographic safety and aesthetic concerns and the prevention of nuisance and hazard.

Urbanism stands for the way of life of people who live in a city. It is additionally understood to mean the characteristic way of interaction of inhabitants of urban areas with the built environment. A sociologically significant definition of the city seeks to select those elements of urbanism which mark it as a distinctive mode of human group life. While commonly urban areas are judged urban on the basis of demographic size, the characterization of a community as urban on the basis of size alone is considered from a sociological viewpoint inaccurate. A sociological definition seeks to be inclusive enough to comprise whatever essential
characteristics urban areas possess. Despite differences that would exist in types of cities, they will have similarities as social entities.

The central problem of the sociologist of the city is to discover the forms of social action and organization that typically emerge in relatively permanent, compact settlements of large numbers of heterogeneous individuals. It follows that urbanism will assume its most characteristic and extreme form in the measure in which the conditions with which it is congruent are present. Thus the larger, the more densely populated, and the more heterogeneous a community, the more accentuated the characteristics associated with urbanism will be.

There is also a manner of city planning that has found itself associated with urbanism. New Urbanism is seeking to redefine the nature of the city by reintroducing traditional notions of neighbourhood design and fitting those ideas into a variety of urban and suburban settings. These comprise walkable neighbourhoods, primary orientation around public transit systems, and greater integration of different types of land uses at the neighbourhood level. In addition, it claims commitment to the concepts of strong citizen participation, affordable housing, and social and economic diversity. New Urbanism focuses on a community’s physical infrastructure in the belief that community design can create or influence particular social patterns.

3A.1 Contextual framework

The second half of the twentieth century has witnessed spectacular growth of the urban population in the developing world. India has experienced rapid urbanization and the emergence of metropolises. According to the United Nations (1993-1995) by the year 2015, ten of the world's 15 largest cities will be in Asia and 3 of these will be in India. This projection suggests that demographic growth in India's large cities will be high, partly due to natural in-city population growth, partly on account of merger of additional areas and partly due to migration. The logistic model used by the United Nations, World Bank and other International Agencies for the projection of the urban population worldwide suggests that India is poised for rapid urbanization along with several other countries in South and East Asia (Champion 1989).
Urbanization is usually associated with increase in employment, higher income, improved health and higher literacy. However, concentration or urban population in bigger cities has not only increased environmental and social ills but has put severe pressure on the infrastructure and basic amenities available to city dwellers, leading to degradation of the quality of city life. The problem posed by this situation is a major threat to the survival of human beings and the developmental resources. It is not so that efforts have not been made to solve these problems. For instance, the 74th Constitutional Amendment is a milestone in this regard. However, the anticipated results have not been achieved so far. Two main reasons have been advanced to explain this underachievement. One - there is a considerably large gap between the rate of growth and planning of development of cities and second — despite the budgetary provision made for urban development, these resources are too inadequate for achieving the expected goals of development. In all cities, the problem of quality of life is becoming more complex which is grossly affecting the overall process of human development. The Census of India 2001 indicates that India comprises 27.44% urban population but the numerical figures do not show the levels of human development.

Various attempts have been made to find out the deficit in planning that has created several social problems. In spite of its significance for economic change the process (urbanization) is not uniformly spread. The regional disparities have further aggravated the problems in urban areas. The studies of Davis and Golden (1954), Sovani (1966), Bose (1978), Mills and Becker (1986) Bala (1986) and National Institute of Urban Affairs (1988) have showed that large scale regional disparities have invited several problems and concluded that inadequate and appropriate planning has further made it more complex. Mohan and Pant (1982) and Reissman's (1964) study has concluded that regional disparities are the main reasons for the problems in urban areas. Many research scholars have studied trends of urbanization in India. Raza and Habeeb (1981), Habeeb (1987), Puri (1991) have examined the trends and pointed out the lopsided nature of urban planning. These authors have concluded through their studies that the nature of urbanization is in favour of big cities, which is due to rural urban migration. Bose (1980) showed that much of urban population growth had occurred in big cities. According to him “the urbanization is the process of migration to big cities while there has been stagnation of small towns”.

On this background, in the context of urbanization in Maharashtra Slate the norms and processes hitherto adopted in urban planning and mechanism adopted for achieving the
expected goals are not far encouraging. Therefore it is proposed to study the group of cities in the state with a view to identify the major problem areas.

3A.2. Statement of the Research Problem

- Though the State has adopted urban planning benchmarks for spatial division of activities and services and reservations for the provision of public services, have these benchmarks been able to answer the needs of the cities? And what amendments are needed in the new benchmarks?
- The State is witnessing substantial urbanization of poverty, especially in its larger cities. The poor have their own employment and living needs. Has the State's urban planning methodologies been able to integrate them into the city and if not, what have been the consequences of the failure?
- While the development plans have a time frame for implementation, have the cities been able to substantially implement their development plans in the given time frame? If not, what are the causes and how could these be redressed?
- How have the development control rules of cities responded to development as well as regulation of cities? What have been the major areas of shortfall, if any? If there are such areas, what alternate strategies and amendments need to be made to be more responsive to city needs?

The proposed research is expected to provide insights into the issues of urban planning in Maharashtra. As the lead urbanized State, these insights are expected to prove useful even in the larger Indian context, it would offer findings on how cities are affected by their current planning processes and benchmarks, and what rectifying measure need to be adopted to plan cities better. It is also expected to reveal the peculiar nature of the socio-economic context of this country and why we need to see them in different light from the planning benchmarks of the Western world. It is imperative that we take up such research in good time, because India is yet to substantially urbanize. It would, therefore, be extremely relevant and useful to understand what has happened in the past and how better planning of cities could emerge by drawing lessons for the future. In the final analysis, the proposed research should serve as a pioneering work in terms of delivering better planned cities and more livable urban settlements in Maharashtra and India.
3A.3. Conceptual framework

A city development plan is probably the most vital planning and envisioning instrument of any city. The plan captures the essence of what a city intends to be in the coming twenty years and beyond, and has an impact on its emerging economic profile and the quality of life that it intends to provide. The development control regulations are almost equally critical since they provide a framework in which development would take place. The adequacy of the framework is critical, failing which a number of developments may get awry and affect the quality of life of cities. It is, therefore, imperative that the city gets the plan as close to the emerging state and Indian urban socio-economic dynamics. Some of the most important forces that are impacting cities are the forces of globalization on the one hand and the urbanization of poverty on the other. The forces of globalization are in many ways leading to the commodification of urban land and the urbanization of poverty is ‘informalizing’ the city. The spectacular growth of the Indian economy is also putting greater money power into the hands of a section of citizens that is translating into certain heightened infrastructure demands on the cities.

Given these developments, we need to study whether cities are responding to these challenges and do they have the strategies and answers to deal with these challenges. Accordingly following hypotheses were kept in view for study.

3A.4. Hypotheses

For convenience and ready reference, it would be apposite to state the hypotheses that this research wishes to test. They are as follows:

1. The current urban planning benchmarks will not sufficiently respond to the unfolding urban dynamics in the State.
2. The conceptual backdrop to current urban planning glosses over the emerging urbanization of poverty that will continue to ‘unplan’ cities through ‘informalization’ and growth outside plan.
3. The execution of urban plans in the given time frame will remain highly improbable through current methodologies and practices.
4. The present development control regulations of cities are hugely inadequate to deliver livable cities.

To test these hypotheses following objectives were derived for the study.
3A.5. Objectives of the study

1. To study the current urban planning benchmarks in relation to urban dynamics.
2. To study the consequences of failure of present urban planning methodologies and to suggest the corrective measures consistent with the present rate of urbanization.
3. To study the implications of growth of unplanned cities in relation to quality of urban life.
4. To critically analyze the present development control regulations and their implications for improving quality of life in cities.
5. To work out appropriate methodology and strategy to bring the urban poor in the mainstream of urban life.

3A.6. Literature Scan

The researcher began by scanning the available body of literature knowledge pertaining to urbanization and its trends. This was with a view to understand the subject area better and to conceptualize the research problem clearly and precisely. It also helped to understand the correlation between the research problem and the body of knowledge in the area. These comprised studies by UN-HABITAT, the urban agency of the United States, studies of UNFPA regarding demography, books and articles on urbanization (see bibliography) and studies specific to India and Maharashtra such as the decennial Census conducted by Government of India, studies commissioned by the Ministry of Urban Development and Poverty Alleviation, Government of India. Journals published by Regional Centre for Urban Environment (RCUES), Yashada and some others were also referred to. The above literature was used to pull together themes and issues that are associated and knowledge relevant to the theoretical framework of the research. An attempt was made to examine the extent to which the findings could be generalized.

3A.7. Presentation

The study is presented in following chapters. Data is presented in form of graphs, tables, charts and boxes. Maps are given at appropriate places.
CHAPTER 1 presents the Urban Sociological Theoretical Framework and a Review of Indian Urban Policy. It traces the framework from the classical theoretical perspectives of Marx and Engels, down to the 21st century with special reference to Tonnies, Durkenheim, Simmel, Weber and the Chicago School. It deals with the contemporary theoretical perspectives of Geddes, Park, Wirth, Hoyt, Castells, Giddens, Harvey and others. It also gives an account of Indian sociologist, social effects of urbanization and urbanization in 21st century. In regard to urban policy in post independent India, it traces the main policy landmarks during each five-year Plan, the enactments in regard to urban issues, the JNNURM and a review of these initiatives.

RESEARCH METHODOLOGY is explained in Chapter 3 in detail. In the introductory part of the chapter the overall view of the research methodology used in social sciences is given. This Chapter states the geographical area in which the study was conducted. It also states the precise research methods employed in the conduct of the study. The researcher’s intention is to explain the manner in which data and information was assembled and analyzed to address the research objectives and test the hypotheses. Wherever necessary, reasons and justifications accompany the choice of research design, data sources, data collection techniques and analytical techniques applied. This chapter contains Contextual framework, Statement of the research problem, Conceptual framework, Hypotheses, Objectives of the study Universe of the study, Sampling, Judgmental Sampling, Research sample size, Research Design, Types of Data-Primary Data and Secondary Data, Quantitative and Qualitative Data, Sources of Data, Geographical Spread of the Research, Selection of Cities, Literature Scan, City Specific Data, Study Population, Participants, and tools of data collection. The Questionnaire and Presentation of study are included as the final part.

CHAPTER 3 deals with Introduction to the Study, Urbanization Trends and features of Urbanization in Study Areas. This chapter highlights the linkages between Economic Growth and Urbanization, Economic Growth and Structural Transformation, Contribution of Migration from Rural Areas, Urbanization across the States of India, Agglomeration, Economic Geography and Development Synergy, Agglomeration, Reshaping Economic Geography, Creating Synergy with Rural Development and Planning for Urbanization. The account on urbanization trends includes Global Urbanization Trends, Asian Urbanization Trends, National Urbanization Trends and Urban Maharashtra Urbanization Trends. It then discusses the urbanization features of Mumbai, Pune, Nashik, Kolhapur and Baramati. These are cities that comprise the core study cities. A comparison of Urbanization Trends in
CHAPTER 4 explains BACKGROUND TO URBAN PLANNING IN MAHARASHTRA. The chapter includes discussion on The Significance of Urban Planning, The Significance of Towns, Global Examples of Urban Planning, Urban Planning In India, Urban Planning in Maharashtra, Process of Urban Planning in the State, DCRs as Regulating Instrument, Urban Poverty and Infrastructure Planning for Quality of Life in Urban Maharashtra, Challenges Countenanced by Maharashtra Cities. REFERENCES are given at the end of the chapter.

CHAPTER 5 is one of the critical chapters of the study. It provides detailed account of the principal features and benchmarks of the development plans and development control regulations of selected cities. It talks of Development Plans and City Development Plans, Purpose of Preparing Development Plan, Composition of Development Plan, Statutory Process of Plan Preparation and Colour Coding in Development Plan. It outlines the Mumbai Development Plan, Land Use in Development Plan, Building Bye Laws and Development Control Rules, Pune Development Plan, Land Use, Plan Implementation, Nashik Development Plan and Land Use, Kolhapur Development Plan and Land Use Plan and Baramati Development Plan and Development Control Regulations. It attempts an analysis of DPs and DCRs. Relevant REFERENCES are given at the end of the chapter.

CHAPTER 6 deals with CURRENT STATUS OF DEVELOPMENT PLANS AND DEVELOPMENT CONTROL REGULATIONS IN TERMS OF THE URBANIZATION OF POVERTY. In this chapter the concept of poverty and its impact on overall development is discussed. This chapter also explains Urbanization of Poverty, Informalization of Urban Poverty, Rural and Urban Poverty, Slums, Slums in India and Maharashtra, Slums in Research Cities, Basic Services in Slums, the Shelter Scenario in India, Informal Sector, Development Plans vis a vis the Urban Poor, DCRs vis a vis the Urban Poor. REFERENCES are given at the end of the chapter.

OPERATIONALIZATION OF DEVELOPMENT PLANS AND DEVELOPMENT CONTROL REGULATIONS are discussed in Chapter 7. It includes a discussion on the Significance and Preparation of Development Plans and DCRs, Future City Growth and DP, Integration of Development Plan with Other Plans, Operationalization of DPs and DCRs,
Municipal Empowerment, Land Acquisition for DPs and Costs of Acquisition, Land Acquisition and TDR, Structures and Encroachments, Institutional and Legal matters, Technical Manpower and Financial Support to Operationalization of DPs at the municipal, State and Central levels. The chapter analyzes costs of providing basic services and municipal ability. It looks at ways to bridge the gap by use of land instruments, PPPs the need to abandon municipal monopoly over service provisioning and strategic changes required.

CHAPTER 8 is about PROVISION OF MAJOR NON-SOCIAL MUNICIPAL INFRASTRUCTURE. It deals with Water Supply, costs of water supply and key performance indicators for water. Sewerage and Sanitation, the state of this service and sanitation and toilet facilities figure next. An analysis of Solid Waste Management in ULBs, Urban Transportation, National Urban Transport Policy and City Roads are the other key infrastructure areas dealt with.

CHAPTER 9 explains the DEFICITS IN NON-SOCIAL MUNICIPAL INFRASTRUCTURE PLANNING. It discusses the Deficits in Water Planning, in Sewerage and Sanitation, in Solid Waste and in Urban Transport and City Roads. The serious implications of these deficits are detailed. REFERENCES are given in last part.

CHAPTER 10 talks of the DEFICITS IN PLANNING AND DEVELOPMENT REGULATIONS. It details the lack of well-rounded development through Development Plans, Overall Failure of DPs/DCRs, Delays in Plan Preparation, poor Approval Process of Development Plans, Limited Use of Technology and Modern Techniques in Plan Preparation and DP Preparation and Lack of Transparency. There is No Fixation on Expansion of Municipal Limits; there is Lack of Emphasis on Planning People and City Activities get frozen in many ways through Development Plan. Issues such as the difficult Amendment Process, Limitations of Merely Physical Land Use Approach, Extraneous Influences in Planning, Planning Gaps, Little Emphasis on Poverty Planning,

Inadequate Treatment of Housing, Inadequate Road Space, DP and Impracticable Applications, perfunctory Central and State Financial Support, Limited Use of TP Schemes and Land Instruments, Development Plan Implementation and Municipal Monopoly, Lack of Municipal Empowerment, the inability of ULBs to Plan, Weak Laws on Encroachment and such issues of significance are also discussed.
CHAPTER 11 explains NEW STRATEGIES FOR ADDRESSING PLANNING AND DEVELOPMENT REGULATION DEFICITS. This chapter explains Key DP Deficiencies and Remedial Measures, Three-Fold Planning Process and Institutional Planning Framework, DP Implementation Plan and Suggestions with respect to DCRs. It outlines suggestions of Report on Indian Infrastructure and Services, Dovetailing Ste Plans with Central Infrastructure Plans, Metropolitan Planning Committees, Unified Metropolitan Transport Authority, Conversion of Agricultural Land, Peri-urban Growth, Town Planning Schemes, Planning FSI, Inclusion and focus on the Poor and Public Private Partnerships, City Development Strategy. It also outlines suggestions on city road planning an urban transport planning in their various facets.

In conclusion, CHAPTER 12 affirms that the hypotheses with which the research began stand more than adequately vindicated. A summary and recommendations are given in this chapter. Bibliography is given in the last part of the thesis.

3A.8 Economic Growth and Urbanization
It appears that as the Indian economy moves up the growth trajectory with greater trade and investment, there would be a resultant decline in the dependence of population on agriculture. This would suggest that migration from rural to urban areas is likely to be an important factor contributing to the process of urbanization of the Indian economy.

In her book, Cities and the Wealth of Nations, Jane Jacobs (1984) provides evidence from across the globe to argue that the real growth engines and generators of national wealth are cities which nurture the fundamental processes leading to economic expansion or stagnation. Her analysis suggests that the wealth of nations is actually the wealth of its cities, and the roots of ailments that plague nations can be traced to the state of their cities.

The linkages between economic growth and urbanization are further explained in a volume prepared for the Growth Commission (2009) titled “Urbanization and Growth”. Here Annez and Buckley summarize the international experience on urbanization and growth. Citing a study by the National Research Council (2003), they report that between 1980 and 1998, 86 per cent of the growth in value-added in developing countries came from the manufacturing and services sectors. In the initial phase of the evolution of these economies, productivity increases reflected shifting resources away from lower-productivity rural activities to the
industry and services sectors. Beyond a point, rapid productivity gains mainly reflected improvements in the industry and services sectors.

The evidence suggests that in China, growth and urbanization have occurred at very rapid rates in the past 30 years. However, a mutually reinforcing pattern of urbanization and economic growth in China has been attained by investing in infrastructure and managing the pace of urbanization through policies such as the hukou system of registration. Brazil’s experience seems to be an exception in that urbanization continued to increase steadily from about 60 per cent at the end of the 1960s to 83 per cent in 2003 even though rapid growth occurred only in the 1970s and the Brazilian economy slipped into a long period of stagnation after that. Some African countries have also experienced urbanization without growth.

It would be reasonable to argue in the light of this evidence that urbanization in the sense of simply having people move to cities does not guarantee growth. The latter depends on the nature of urbanization and the manner in which it is managed, i.e. on the absolute quality of urban opportunities. People move to the cities to seek better opportunities relative to rural ones, but it is the absolute quality of the opportunities in urban areas that determines the outcome in terms of growth. Source: (Urbanization and Growth 2009).

3A.9 Economic Growth and Structural Transformation

Despite the evidence of global economic downturn during the last half a decade, India remains one of the fastest growing economies in the world today. After recording a growth rate of 5.5 per cent per annum during 1981-2001, there was acceleration in GDP growth to 7.7 per cent per annum during 2001-11. The economy has weathered the impact of the global slowdown of 2008 much better than most and is striving to resume its journey towards a higher GDP growth (Graph 2.1).

Graph No 2.1 GDP Growth At Constant Prices*
India's heavily protectionist trade policy regime before 1991 had encouraged capital-intensive industrialization. Rigid labour laws and reservation for small scale units in production also militated against labour-intensive industrialization. Growth in industrial output was therefore associated with much slower growth in employment. A gradual process of dismantling the highly restrictive trade policy regime was begun in 1991 and implemented over a decade. While economic growth responded reasonably well to the market-oriented reforms that were set in motion in the 1990s, it was not until after 2001 that larger response of the economy to the reforms became evident. The gradualist nature of the reforms, structural rigidities in the economy, and the time taken to establish the credibility of the new policy regime meant that a strong pick-up in private investment came only after some years (Graph 2.2).

The acceleration in GDP growth in the non-agricultural sectors after 2001 was predominantly driven by the private sector, particularly in some states which led the process of market orientation and built the necessary infrastructure and supportive investment environment in their urban areas.

GDP in the industry and services sectors grew at 6.9 and 9.4 per cent per annum during 2001-11, compared with 5.7 and 7.3 per cent per annum respectively in the 1990s. GDP in agriculture grew at 3.1 per cent per annum in 2001-11 compared with 2.8 per cent per annum.
in 1991-2001, indicating that agricultural growth continued to be much slower than growth in the non-agricultural sectors (Table 2.1).

Graph No 2.2 Trends In Investment

The rapid economic growth has brought about a considerable structural transformation in the economy. This has resulted in the share of agriculture in the GDP declining from 34 per cent in 1983-84 to about 15 per cent in 2009-10. There has been a pointed increase in the share of services in the GDP from 40 per cent to 57 per cent and some increase in the share of construction, while the share of industry has remained relatively unvarying at 20 per cent (Graph 3.3).

Structural transformation is typically associated with reduced dependence of the population on agriculture and increased migration from low-productivity agriculture to high-productivity sectors of industry and services in search of employment. Since these sectors are based in urban areas, rapid economic growth is normally associated with urbanization. The Indian experience of economic growth and structural transformation in the period 1980-2005 (for which employment data are also available by sector), however, is associated with only a moderate decline in the share of agriculture in total employment in the economy (Graph 2.4).

Table 3.1: GDP GROWTH

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<tr>
<th>Year</th>
<th>Agriculture</th>
<th>Industry</th>
<th>Construction</th>
<th>Services</th>
<th>GDP</th>
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<td>1951-61</td>
<td>3.1</td>
<td>6.1</td>
<td>6.8</td>
<td>4.2</td>
<td>3.9</td>
</tr>
<tr>
<td>1961-71</td>
<td>2.5</td>
<td>5.4</td>
<td>5.6</td>
<td>4.8</td>
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<td>4.4</td>
<td>3.3</td>
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The decline in the agricultural sector’s share in employment in the 1980s was small, and even in the decade from 1993-94 to 2004-05 when it was faster, the share only fell from 64 per cent to 52 per cent. The industrial sector failed to draw an increased share from agriculture as industry’s share in total employment in the economy actually decreased, contrary to the normal process of economic growth. Services were the principal sector recording a sharp increase in the share of total employment. Since GDP growth was coming from highly skilled services such as information technology (IT), telecom, and banking, or from sophisticated manufacturing industries like engineered goods and pharmaceuticals, it did not draw much labour from rural areas. Overall, growth of urban population which had already decelerated from 3.9 per cent per annum in the 1970s to 3.2 per cent per annum in the 1980s, further slowed down to 2.8 per cent per annum in the 1990s (Table 2.2).

The transformed growth scenario in the economy in the 2000s and the expected acceleration in the growth of GDP, increasingly moving towards labour-intensive manufacturing, construction, and services, should augur well for migration in the years ahead. As more states join the fray of improving their investment environment through economic reforms, this should increase opportunities for non-agricultural employment. As the faster growth is expected to occur in the context of a more open economy, employment elasticity of the growth should increase. This should lead to greater employment opportunities in the industry.
and services sectors, and larger migration from rural to urban areas. Other forces contributing to urban growth would be expansion of city boundaries, large villages growing into towns in situ, and emergence of new towns either planned or the result of market forces possibly along the transport and growth corridors.

However, flexibility in the use of labour in the industrial sector in India is severely constrained by the Industrial Disputes Act of 1947 which requires a firm with more than 100 workers to obtain written permission from the State Government for lay-off, retrenchment, and closure. Reservation for the small-scale sector for certain products has also stood in the way of large-scale labour-intensive manufacturing units exploiting export opportunities, although this policy is being slowly phased out.

Graph No 2.3 Share of GDP by Sector

![Graph No 2.3 Share of GDP by Sector](image-url)
Table 3.2: Gross Increase Adjusted For Reclassification

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<tr>
<td>Class IV+</td>
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Memo:
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<td>Rural Population</td>
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<tr>
<td>Total Population</td>
<td>2.2</td>
<td>2.1</td>
<td>2</td>
<td>1.5</td>
</tr>
</tbody>
</table>

(Source: Census of India).

Some turnaround from a decelerating trend of urbanization may be expected in the decades ahead and a larger response of migration to the acceleration in economic growth as also expansion of city boundaries may occur in the years ahead. Available estimates suggest that by 2031, the urban population of India would be 598 million, or just short of 40 per cent of the total population. The UN population projections estimate that the urban population of India will be larger than its rural population by 2045.

**3A.10. Contribution of Migration from rural areas**

An important feature of urbanization in India during the period 1981-2001 was the relatively small contribution of migration to the increase in urban population in India. As Chart 1.5 shows, net migration from rural areas contributed about 21 per cent to the increase in urban population in the 1990s, a little smaller than its contribution of 22.6 per cent in the 1980s. These figures, however, do not include seasonal migration. Natural increase has been by far the largest source of increase in urban population (62.7 per cent in the 1980s and 59.2 per cent in the 1990s). A recent survey carried out by National Council for Applied Economic Research (NCAER) and Future Capital Research (2008) suggests a much larger in-state migration in Coimbatore, Hyderabad, and Chennai compared with cities like Surat, Mumbai and Bangalore.

**Graph No.2.5 Labour Productivity: Urban and Rural**

![Graph showing labour productivity](image-url)
Unlike what would be predicted by the standard theories on rural-urban migration like Lewis (1954) and Harris-Todaro (1970), the evidence in India suggests that the rural-urban differentials in productivity have widened since 1993-94, indicating that there is considerable scope for migrants to take advantage of the higher-productivity non-agricultural sectors if they can be equipped with the skills and education relevant for employment in urban areas. The economy seems to be far from reaching saturation point in migration and it is reasonable to expect a hastening in the pace of urbanization (Graph 1.6). The McKinsey Report (2010) on India's urbanization prospects estimates that over the period 2010-2030, urban India will create 70 per cent of all new jobs in India and these urban jobs will be twice as productive as equivalent jobs in the rural sector.

3A.11. Urbanization across the States of India
The relationship between urbanization and income levels across the states of India is depicted in Graph 2.7 which shows higher levels of per capita income with higher levels of urbanization. Some relatively higher-income states such as Tamil Nadu, Maharashtra, Gujarat, Karnataka, and, to some extent, Punjab have higher urbanization levels than would be predicted by their income levels, given the equation. Interestingly, states such as Uttar Pradesh and Madhya Pradesh are also more urbanized by the same token. West Bengal and Rajasthan appear to be somewhat less urbanized than expected. Haryana and Andhra Pradesh show significant urbanization deficits, given their per capita incomes, as do the relatively lower income states such as Assam, Bihar, and Orissa.

Graph No 2.7: Per Capita Income and Urbanization Levels: States 2008

Note: PCGSDP stands for per capita gross state domestic product. Sources: Estimates based on Census of India data and CEO.
Among the major states, Tamil Nadu is the most urbanized state of India with 54.4 per cent of its population living in urban areas, followed by Maharashtra (46.2 per cent) and Gujarat (40.3 per cent) (Graph 2.8). The seven states of Andhra Pradesh, Gujarat, Karnataka, Madhya Pradesh, Tamil Nadu, Uttar Pradesh, and Maharashtra are expected to account for 62 per cent of India’s urban population in 2011. Trends in urbanization in India have necessarily to be seen in the context of overall trends in population growth. India is experiencing a significant slowing down of population growth in the period 2001-11. As Table 2.2 shows, growth of population went down from 2.1 per cent per annum in the 1980s to 2 per cent per annum in the 1990s. It is estimated to decelerate to 1.5 per cent per annum in the decade 2001-11.

Graph No 2.8: Urbanization Ranking: Top 10 Major States of India 2011

An important characteristic of India’s urbanization is the ‘metropolization’ of cities. In 1951, there were only five metropolitan cities (with population of over 1 million), i.e., Kolkata, Mumbai, Chennai, Hyderabad, and Delhi. Their number increased to 12 in 1981 and 35 in 2001 (Graph 2.9). Their share in urban population increased from 18.9 per cent in 1951 to 27.7 per cent in 1981 and 37.8 per cent in 2001. By 2001, all the original five metropolitan cities had grown to population of over 5 million, and Bangalore had joined their ranks (Table 2.3). The 29 cities which had population between 1 million and 5 million in 2001 included four state capitals, i.e. Jaipur, Lucknow, Bhopal, and Patna, and other cities such as Meerut,
Faridabad, Pune, Surat, Nagpur, Kanpur, and Ludhiana. In 2011, the number of such cities has touched 50 and their population accounts for 42.3 per cent of the total urban population. Ahmedabad and Pune join the rank of cities with population over 5 million.

Graph No 2.9 Metropolitan Cities: Number and Population

Within the metropolitan cities, the ‘Big Eight’ (Mumbai, Delhi, Kolkata, Chennai, Hyderabad, Bangalore, Ahmedabad, and Pune) with population exceeding 5 million (50 lakh) may have grown at a slower rate than others, but the sheer magnitude of their numbers and their importance in generating agglomeration economies and economic growth call for urgent attention to their urban infrastructure deficits and the state of service delivery. Some of the big metros like Hyderabad and Bangalore have experienced peripheral expansion with smaller municipalities and large villages surrounding the core city becoming part of the larger metropolitan area.

The bulk of the increase in population share of large cities has come about as a result of the moving up of cities and towns from the lower size categories to higher ones. As cities and towns became larger, a phenomenon commonly known as ‘size-class jumping’ or ‘graduation’ of lower order settlements occurred.
Table 3.3: Big Eight City Demography

<table>
<thead>
<tr>
<th></th>
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<tbody>
<tr>
<td>Mumbai</td>
<td>9.4</td>
<td>12.6</td>
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<tr>
<td>Kolkata</td>
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<td>13.2</td>
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<tr>
<td>Delhi</td>
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<td>8.5</td>
<td>12.9</td>
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<tr>
<td>Chennai</td>
<td>4.2</td>
<td>5.3</td>
<td>6.6</td>
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<td>Hyderabad</td>
<td>2.6</td>
<td>4.3</td>
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<tr>
<td>Bangalore</td>
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<td>4.1</td>
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<td>7.9</td>
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<tr>
<td>Ahmedabad</td>
<td>2.6</td>
<td>3.4</td>
<td>4.5</td>
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<td>Pune</td>
<td>1.7</td>
<td>2.5</td>
<td>3.8</td>
<td>5.4</td>
</tr>
</tbody>
</table>

* The ‘Big Eight’ metropolitan cities have been defined as those with population above 5 million. (Source: Census of India and Committee Estimates.)

A similar phenomenon of peripheral expansion is beginning to emerge in smaller metros like Indore, Surat, and Nagpur. The proliferation of slums is also not limited to big metros like Mumbai and Kolkata, but has afflicted smaller metropolitan cities like Meerut, Faridabad, and Nagpur as well. The group of smaller metropolitan cities (Class IB) are expected to continue to grow faster than the ‘Big Eight’ (Table 2.2). Cities such as Faridabad, Kanpur, Lucknow, Patna, Amritsar, and Ludhiana would need urgent attention before the challenges facing them acquire the scale and proportion of those facing the big metros.

The fastest growth in the 1990s has been of Nashik and Faridabad, which were non-metropolitan cities, i.e. cities with population between 0.1 million and 1 million, to begin with, but crossed the threshold to become metropolitan cities in 2001. Other non-metropolitan cities, i.e. cities with population less than 1 million that have grown very rapidly are Jamnagar, Junagad, Mangalore, Gulbarga, Aurangabad, Solapur, and Nanded-Waghala.

It is worth noting that population growth of Indian towns has been slowing down, particularly in the 1990s. Their population growth decelerated from 3.4 per cent per annum in the 1970s to 3.2 per cent per annum in the 1980s and 2.3 per cent per annum in the 1990s. Migration
from villages has been largely to the metropolitan cities, and the small and medium towns have languished for want of an economic base.

The lower share of urban population in smaller towns, and the relatively slower growth of these towns compared to larger urban centres, has implications for how the urbanization challenge needs to be managed. The 3984 Class II and smaller towns with population of less than 100,000 in India also have very different levels of managerial and governance systems compared to larger Class I and metropolitan cities. Hence, interventions for preparing our cities will need to distinguish between the challenges and capacities of larger cities versus the smaller towns in the country.

Notwithstanding the growing and disproportionate importance of the ‘big’ cities, public policy needs to take note of the smaller urban centres particularly because of their weak economic base, high incidence of poverty, and lack of access to benefits which are available to rural areas. Besides their large number, often the smaller centres are very different from their ‘bigger’ counterparts in their problems and hence in the solutions to these problems. For example, the internal capacities of the smaller urban local bodies (ULBs) are likely to be much less than of the bigger Corporations. Similarly, the economies of scale argument in service provision that works for big ULBs may not be equally applicable for many smaller ULBs. Hence policy interventions need to be differentiated to address these challenges.

A large number of well-endowed centrally sponsored schemes targeted at the rural sector, e.g. Bharat Nirman, the National Rural Health Mission (NRHM), National Rural Employment Guarantee Scheme (NREGS), Swarnajayanti Gram Swarojgar Yojana (SGSY), and Pradhan Mantri Gram Sadak Yojana (PMGSY) have also contributed to holding back migration from rural areas. It is important to recognize that some of the rural areas are future candidates for urban centres. There were 18,760 villages with more than 5000 population each in 2001. The development of these villages needs to be nurtured through proper planning so that they do not annex to urban India as unplanned and haphazard settlements or slums. Their spatial and functional linkages to growing cities and own hinterlands need to be secured so that they become centres of agglomeration economies.
3A.12 Agglomeration, Economic Geography and Development Synergy

3A.12.1 Agglomeration

As economies move to a more mature phase of development, they become more knowledge-based and service-oriented. Notwithstanding the IT revolution and 'death of distance' arguments, there are aspects of agglomeration and the resultant spatial concentration which remain intrinsic to the industry and services sectors.

Cities tend to be the reservoirs of skill and capital and centres of knowledge and innovation. The proximity of firms, individuals, and institutions gives rise to agglomeration economies that play an important role in lowering the costs of new firms as they enter the manufacturing and services sectors. Agglomeration economies arise from localization and urbanization.

3A.12.2 Reshaping Economic Geography

Cities, migration, and trade have been major catalysts of progress in the developed world over the past two centuries. These stories are now being repeated in the developing world's most dynamic economies. Growing cities, ever more mobile people, and increasingly specialized products are integral to development. These changes have been most noticeable in North America, Western Europe, and Northeast Asia. But countries in East and South Asia and Eastern Europe are now experiencing changes that are similar in their scope and speed. Just as a primary city forms the core of a country's metropolitan area with adjacent cities, other large urban centres or secondary cities act as regional foci for both the economy and society. For example, they are the local centres for the financial sector, which serve the areas around them. Smaller cities within these areas constitute more specialized urban centres, typically focusing on manufacturing and the production of traditional and standardized items. Symbiosis is the ruling order. The larger cities depend on the smaller ones for the daily provision of workers through commuting. Towns draw sustenance from the agricultural activity of rural areas, but their prosperity also spills over to villages by providing non-farm employment opportunities. Towns act as market centres for agricultural and rural output, as stimulators of rural non-farm activity, as places of seasonal job opportunities for farmers, and as providers of secondary education and health care services.

The World Development Report 2009 argues that some places are doing well because they have promoted transformations along the three dimensions of economic geography:
Higher densities, as seen in the growth of cities;
Shorter distances, as workers and businesses migrate closer to density;
Fewer divisions, as countries thin their economic borders and enter world markets to take advantage of scale and specialization.

In places urbanizing rapidly, governments must put in place, in addition to institutions, connective infrastructure so that the benefits of rising economic density are more widely shared.

Localization economies arise from the advantages of locating firms of an industry in a neighbourhood so that when the scale of an activity expands, the production of many intermediate services becomes profitable. This improves access of co-located firms to specialized suppliers of intermediate inputs of goods and services and also to a pool of skilled workers. Clustering of firms also reduces the uncertainty in the adoption of new technology through smooth flow of information and technology spillovers. Intra-industry spillovers are localization externalities.

Urbanization economies accrue to all firms located in an urban area and result from the scale and diversity of the entire urban area. The larger and more diverse markets enable greater division of labour. A large concentration of firms and individuals results in reduction of transactions costs, sharing of risks, and better matching of skills to jobs. Ease of contact and informational spillovers between firms and individuals make cities the centres of technological innovation and diffusion. An additional feature of urbanization in developing economies is the creation of large urban informal sectors which are not captured by the standard sources of data.

Agglomeration economies rely on provision of basic urban infrastructure services in general, and urban transport infrastructure in particular. In the absence of the latter, diseconomies could set in from traffic congestion, environmental degradation, deterioration in civic services, and air and water pollution. In order for cities to perform their role as engines of economic growth and innovation, it is very important to integrate the competing demands of commerce, transport including public transport, and housing including affordable housing for the poor. The challenge lies in augmenting the agglomeration advantages of cities while minimizing their congestion diseconomies.
3A.12.3 Creating Synergy with Rural Development

In industrialized economies, economic activity in urban areas accounts for as much as 80 per cent of GDP. The urban share of economic activity in less-developed economies is typically around 50 per cent. In India, in 1999-2000, cities and towns contributed 51.7 per cent to the GDP, and the share is estimated to be around 62 per cent in 2009-10 (Graph 1.11). By investing in urban infrastructure, putting in place systems of public service delivery which cater to the service norms for one and all, and planning for transport and housing with special attention to affordable housing for the poor, inclusive urbanization can replace parasitic urbanization which is otherwise inevitable. District Planning Committees (DPCs) can play a very important role in integrating rural and urban planning. Housing also acts as a source of agglomeration by its important role in generating economic activity through its multiple linkages with several sectors.

As the agglomeration economies in cities energize industrial growth in a new competitive environment, there will be synergetic linkages with agriculture. The revival of the agricultural sector itself is crucially linked to the manner in which growth in the industry and services sectors unfolds. While investments in agricultural R&D (research and development), soil and water management, and biodiversity in the wake of climate change are important to realize the potential of agriculture in India, the quantum and quality of value addition in agriculture will be increasingly determined by growth of the non-agricultural sector. For example, in the high value agricultural sector (including fruits and vegetables, livestock, fishery), which accounts for about half of the value of agricultural produce in India, more than half the value addition takes place after these products leave the farms.

Graph No 2.10: Urban Share of GDP (per cent)

Source: CSO and Eleventh Five Year Plan.
As urbanization grows, food budgets of households will be spent more on fruit, vegetables, milk, etc., and more food will have to be transported from rural hinterlands to urban demand centres. This will lead to more investments in infrastructure, logistics, processing, packaging, and organized retailing. These investments connect and build synergy between rural India and urban centres. They ensure not only efficient supply lines but also seamless flow of goods from rural to urban areas and substantially increased incomes for farmers (Gulati et al. 2011). People living in rural areas typically tap the opportunities that cities provide for employment, entrepreneurial avenues and learning. The boundaries of urban settlements are usually more blurred than may be portrayed by administrative delimitations. Technologies like mobile phones and satellite television have further blurred the rural-urban divide. Policies can play an important role in generating an urban-rural synergy rather than fearing a rural-urban divide.

Cities perform a critical role in generating resources for both urban and rural development by creating an agglomeration-related tax base. Funding of rural programmes would simply not happen unless cities develop and generate revenues of central, state, and local governments for both urban and rural development. This is the basic argument for urbanization as an engine of rural development and overall economic development.

Rising standards of living in India's urban areas in the post-reform period appear to have had significant distributional effects favoring the country's rural poor. (Datt and Ravallion, 2009) document that the non-farm sectors that use unskilled labour more intensively, notably trade, construction, and ‘unorganized’ manufacturing, have seen higher employment growth in the post-reform period, because the urban and rural sectors are now positively interlinked in a number of ways through trade, migration, and transfers. While the rural poor have benefited more from urban economic growth in the post-reform period, they are also likely to be more vulnerable in the future to urban-based economic shocks. The fortunes of the rural and urban populations will be increasingly linked in the years to come.

Whether it is through agglomeration economies in existing and expanding cities or through location of industry in Industrial Corridors or Special Economic Zones or through developing new towns in the rural periphery, urban settlements and cities will play a very important role in India's new dynamics of growth. India's policymakers and planners must ensure that cities
are provided with infrastructure and governance systems so that they can perform their new role effectively. At India's current stage of development, it is not only expected that there will be an increase in migration to cities in search of high-productivity jobs, but also that cities will act as engines of rural development.

3A.13 Planning for Urbanization
Preparing India's cities for a rapid growth scenario will require a paradigm shift in planning for urban infrastructure and reforming the institutions for service delivery. Regional and urban planning have an important role to play in generating new spaces and in rejuvenating existing city spaces so that a healthy socio-economic environment can be created in which the fast-growing urban population of India can live with higher standards of public service delivery and contribute to growth.

In view of the fact that the Indian strategy of industrialization was crucially anchored in a framework of centralized planning, it is ironic that there was no deep engagement with planning in the urban sector, and that socio-economic planning was not linked to spatial planning. Instead of exploiting ‘agglomeration economies’ to drive the efficiency of cities and thereby their growth potential and creativity, attention was focused on the rhetoric of diversion’. The Fourth and the Fifth Five Year Plans covering the period 1969-79 explicitly envisaged the creation of smaller towns in order to prevent further growth of population in large cities. The National Commission on Urbanization in its report in 1988 had stressed the need to reap the benefits of agglomeration economies. The Seventh Five Year Plan (1987-92) recognized that urbanization is a phenomenon which is part and parcel of economic development. Certain activities are best performed in, indeed require, agglomeration of people. Subsequently, at the time that India launched market-oriented economic reforms in the early 1990s, the Eighth Five Year Plan (1992-97) identified the widening gap between the demand and supply of urban services, the rapid growth of urban population aggravating the accumulated backlog of shortages of housing and infrastructure, and high incidence of urban poverty. But even then, urban planning received inadequate attention.

A beginning was made with the 74 Constitutional Amendment Act of 1992, which mandated the setting up of elected municipalities as institutions of self-government thereby creating political space for ULBs within India's federal framework, and recommended that state governments devolve a specified set of functions to the local governments. The concentration
of the Amendment, however, was more on the governance aspects of a city and less on its planning aspects. These are dealt with by the Town planning Acts. In the instance of Maharashtra, it is the Maharashtra Regional and Town Planning Act. This study deals with that aspect in detail in its future chapters.

It is quite evident that as the Indian economy engages in major structural transformation, planning for urbanization assumes enormous importance, because that is the where the future of India lies. The study delves into the current status of such planning and derives on the basis of the emerging urbanizing scene, the inadequacies in the planning process.

**Summary**

An important feature of urbanization has been the ‘metropolization’ of cities. However, rural migration’s contribution to urbanization has been modest. Studies reveal that there are positive linkages between economic growth and urbanization. But the quality of opportunities provided in the process of urbanization is significant. There is also evidence that cities are critical in generating resources for urban and rural development. In view of this, cities need to be kept well oiled through the provision of infrastructure and governance. Planning for urbanization assumes huge significance and a paradigm shift is required for crafting urban infrastructure and service delivery.
3B. URBANIZATION TRENDS AND FEATURES OF URBANIZATION IN STUDY AREAS

This chapter outlines the global, Asian and Indian urbanization trends and the definitional variations of the term urbanization across countries. It then briefly recounts contours of urbanization in Maharashtra and its select cities including those that are the focus of this research and makes a brief comparative analysis of the key attributes of such urbanization.

3B.1. Global Urbanization Trends

"Urbanization, the spatial concentration of people and economic activity, is arguably the most important social transformation in the history of civilization". It has been no secret that countries of the world have been urbanizing at different speeds for the last several centuries. This trend, however, strengthened over the last hundred years and more so in the last fifty years. In view of the massive urbanization that happened in the course of the twentieth century, humanity for the first time began living more in towns than in villages. Hence the twenty-first century has widely been recognized and labeled as the "Century of the City".

In 1950, some 733 million people, or 29% of the world's population, lived in urban areas. By 2005, the urban population had grown to an estimated 3,172 million or 49% of the population. By 2030, it is estimated that 4,945 million people, almost 61% of the world's population, will be urban. The urban population is set to increase by more than 55%, or 1,770 million, in the next 25 years while the rural population is estimated to decline by 3% or 96 million. Between 1950 and 2030, the population of the world is set to change from about 70% rural to 60% urban. (UN World Urbanization Prospect, 2000) UNDP, however, cautions that the data are based on national definitions of what constitutes a city or metropolitan area. These definitions may vary leading to some complication about global comparisons. (Box 1.1)

To begin with, the developed world displayed the first and heaviest signs of urbanization, primarily in the 1950s and 1960s. Sometime before the end of the twentieth century, the process of urbanization in these countries had already and substantially run its course and their city populations had generally stabilized. By 1975 they were well past the half way mark and between 1975 and 2003 their urban population rose only about 8 per cent. These
countries also broadly happen to be countries with the highest GDP per capita, mostly in Europe, North America and Latin America. A demographic analysis of cities such as New York, London bears this out. New York's population has been hovering between 7.7 million and 8.2 million between 1960 and 2010. Similarly, London has been demographically stagnant in numbers between 1960 and 2010, at around 7 million. Urban demographic data globally collected by the United Nations Development Programme (UNDP) over several decades reveals the following data. A country's human development level is based on the human development index. The HDI (human development index) is a summary measure of human development. It measures the average achievements in a country in three basic dimensions of human development: a long and healthy life, as measured by life expectancy at birth; knowledge as measured by the adult literacy rate and the combined primary, secondary and tertiary gross enrolment ratio; a decent standard of living, as measured by GDP per capita.

Table No 3.4: Global Urbanization Levels

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<td>68.7</td>
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<td>Per cent urbanization in countries with</td>
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<td></td>
<td></td>
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<tr>
<td>medium human development</td>
<td>27.9</td>
<td>30.3</td>
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<td>48.6</td>
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<tr>
<td>Per cent urbanization in countries with low</td>
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<td></td>
<td></td>
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<tr>
<td>human development</td>
<td>18.2</td>
<td>22.7</td>
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</tr>
</tbody>
</table>

(Human Development Report 2005 & 2009, UNDP)
The cited Table clearly indicates that countries with high human development are the most highly urbanized. Countries with medium human development come next. They are credited to have added, during the same cited period about 14 per cent to their urban population. However, in the developing world, the growth of cities has picked up greater speed during the past few decades leading to a cumulative process of transition of the world from predominantly rural to largely urban settlements. These countries, mostly in Asia and Africa added about 16 per cent to the urban population.

This remarkable urban revolution is recorded in the following words: “The 21st century is the Century of the City. Half of the world’s population already lives in urban areas and by the middle of this century, most regions of the developing world will be predominantly urban.” (UN-HABITAT, 2008)

The ongoing urbanization percentages for the three groups of countries between 2003 and 2015 are expected to be 2.9, 6.4 and 7.7 per cent. Quite clearly, urban growth rates are highest in the developing world and are likely to be so over several coming decades. The UN-HABITAT Report on the State of The World's Cities, 2009 states that the developing world "absorbs an average of 5 million new urban residents every month and is responsible for 95 per cent of the world's urban growth". It further states that by 2050, “the urban population of the developing world will be 5.3 billion; Asia alone will host 63 per cent of the world's urban
population, or 3.3 billion people, while Africa, with an urban population of 1.2 billion, will host nearly a quarter of the world's urban population." (UN-HABITAT, 2008)

Apart from the overall reality that urbanization has been a historical trend and a natural concomitant of economic development, there are many other underlying causes of this phenomenon that reveal large variations in what has propelled and is propelling urbanization and in the manner in which urbanization has manifested in different countries. We have known that geography has played an important part in the urbanization of the past and coastal zones and areas along river banks have a natural propensity to urbanize. Data reveals that fourteen of the world's 19 largest cities are port cities. However, there is evidence now that cities of late have grown faster in other eco systems. Clearly technological progress and state policy in regard to economic development through pro-urban thrusts and industrialization have been important catalysts in this transformation.

Governments take major decisions in regard to public and private investment and lay the road map for the creation of green-field infrastructure. They pump in resources for such construction, as well as for up gradation and refurbishment, operation and maintenance. “A preliminary UN-HABITAT analysis of the fastest growing cities in the developing world shows that more than 40 per cent benefited from the diversification, expansion or improvement of regional or national transport systems, including roads, airports, urban and inter-urban railway lines and ports." (UN-HABITAT, 2008)

One of the most remarkable ways in which Governments have impacted urbanization has been through the creation of special economic zones. These special areas are blessed by Government with tax exemptions and other modes of facilitation with the objectives of attracting investment, promoting employment, generating exports and supporting these growths through creation of infrastructure. In Asia, in particular, SEZs have fuelled rapid urbanization and the most startling example is that of Shenzhen in China. "It experienced a phenomenal growth rate of 20.8 per cent, slightly more than the city's economic growth rate of 16.3 per cent in the 1990s. Shenzhen's population grew from fewer than 1 million inhabitants in 1990 to 7 million by 2000." By 2025, UN-HABITAT suggests that it would be the 25th largest city in the world.
Migration, particularly rural to urban, for a considerable period of time was a major urbanization factor. But there are several other nuances to migration in this process of urbanization. Natural population multiplication from within cities now accounts for almost 60 per cent of urban growth. The remaining 40 per cent of urban growth is on account of migration, either rural to urban in some cases, or urban to urban in other cases and international in some other. What is now fairly clearly observed is that the pattern of migration is impacted by levels of national development. "In countries with low levels of urbanization, migration is often the primary engine driving economic growth, as in the case of various countries in Asia and Africa. In many other countries, the largest movements of population are taking place between cities and not from rural to urban areas. In Latin America and the Caribbean ...where almost 80 per cent of the population lives in cities ...half of all migrations originate and end in cities and natural growth accounted for less than 20 per cent of urban growth." (UN-HABITAT, 2008)

In Africa, both positive economic growth and negativities such as conflict and disaster have been contributing factors. Drought, famine and ethnic conflicts have driven people away from the unprotected rural regions to the safer urban centres. "The region's most distinguishing urban characteristic is the presence of high concentration of people and investments in the single largest city of its countries, in most cases, the capital. This phenomenon, known as 'urban primacy', characterizes urbanization in Africa today, as it did in Latin America and the Caribbean in past decades." (UN-HABITAT, 2008)

In Asia, metropolitan growth has been a prominent urban feature. "In 2000, the region contained 227 cities with 1 million or more residents with 21 cities with 5 million or more inhabitants.....Moreover, of the 100 fastest growing cities with populations of more than 1 million inhabitants in the world, 66 are in Asia..... among these fastest growing cities, 33 are Chinese. In fact, China hosts half of the urban population of the developing world." (UN-HABITAT, 2008)

It is interesting to see the following table on the world's mega cities as they ranked in 2007 and would, in all probability, rank in 2025. As demonstrated by the figures, there is a lot of rank movement among the cities and only Tokyo, Sao Paulo and Kolkata maintain their positions at 1, 5 and 8. Mexico City, New York, Shanghai and Buenos Aires move down while Mumbai, Delhi and Dhaka, all three South Asian cities, move up.
Table No 3.5: Top 10 Global Cities (By Demography)

<table>
<thead>
<tr>
<th>City</th>
<th>Population 2007 (Thousands)</th>
<th>Rank</th>
<th>Projected Population 2025 (Thousands)</th>
<th>Projected Rank</th>
</tr>
</thead>
<tbody>
<tr>
<td>TOKYO</td>
<td>35,676</td>
<td>1</td>
<td>36,400</td>
<td>1</td>
</tr>
<tr>
<td>MEXICO CITY</td>
<td>19,028</td>
<td>2</td>
<td>21,009</td>
<td>6</td>
</tr>
<tr>
<td>NEW YORK-NEWARK</td>
<td>19,040</td>
<td>3</td>
<td>20,628</td>
<td>7</td>
</tr>
<tr>
<td>MUMBAI</td>
<td>18,978</td>
<td>4</td>
<td>26,385</td>
<td>2</td>
</tr>
<tr>
<td>SAO PAULO</td>
<td>18,845</td>
<td>5</td>
<td>21,428</td>
<td>5</td>
</tr>
<tr>
<td>DELHI</td>
<td>15,926</td>
<td>6</td>
<td>22,498</td>
<td>3</td>
</tr>
<tr>
<td>SHANGHAI</td>
<td>14,987</td>
<td>7</td>
<td>19,412</td>
<td>9</td>
</tr>
<tr>
<td>KOLKATA</td>
<td>14,787</td>
<td>8</td>
<td>20,560</td>
<td>8</td>
</tr>
<tr>
<td>DHAKA</td>
<td>13,485</td>
<td>9</td>
<td>22,015</td>
<td>4</td>
</tr>
<tr>
<td>BUENOS AIRES</td>
<td>12,795</td>
<td>10</td>
<td>13,768</td>
<td>16</td>
</tr>
</tbody>
</table>

(UN-HABITAT 2008/2009)

Improvement in the quality of life in cities such as public amenities, more open spaces and better transport and water, better education and health has been a significant driver. Among these, transport communication is the most important driver of city growth. Such connectivity underlies the opening up of a region to economic growth coupled with demographic growth. This is especially significant for cities in close proximity to large urban centres. Information technology and financial service sectors has been another important economic driver. It would, however, be wrong to predict that all cities around the world are growing. The overall urbanization figures do conceal more micro truths within nations.

What is also significant about urbanization is the huge social challenges that are emerging. Cities are becoming more unequal and more prone to sudden social crises. The most notable phenomenon is the unbridled growth of slums in cities. This phenomenon has serious dimensions of spatial inequality. Along with social challenges cities are increasingly faced with environmental challenges. Both would require serious attention if cities were to continue to be human settlements worth living and working.
3B.2. Asian Urbanization Trends

Of the many intense changes which have impacted Asia during the last half-century, none have been so deep and far reaching as the doubling of its urban population. This has involved adding around 44 million people to the population of cities every year and 120,000 people every day. In Asia in 1950, some 232 million people, or 17% of the population, lived in urban areas. Over the following 55 years to 2005, the urban population grew nearly sevenfold to an estimated 1,562 million, clocking 40% of the population. By 2030, it is estimated that 2,664 million people, or almost 55% of the population in the Asia region, will be urban, representing an increase of over 70% or 1,100 million in the next 25 years. Over this same period, the rural population is expected to decline by 6%, or 133 million. Almost all future population growth in Asia will be in towns and cities. (Urbanization and Sustainability in Asia 2006)

According to a United Nation’s study, more than 60 percent of the increase in the world's urban population over the next three decades will occur in Asia, particularly in China and India. Other countries that would swell the urban ranks would be Pakistan, Bangladesh, the Philippines and Vietnam. Despite revealing a lower overall level of urbanization in 2030 (53 percent), as against Africa's 55 percent urbanization and Latin America's 83 percent, Asia's total urban population will exceed 2.6 billion in 2030, compared with 604 million in Latin America and 766 million in Africa. The following chart encapsulates these details:

**Graph 2.12: Urban Population by Region: 2000 and 2030**

![Graph](image)

**Source:** UN, *World Urbanization Prospect, 2000*

Unlike other continents, Asia has five countries, each with more than 100 million people that dominate the demographic landscape — China, India, Bangladesh, Pakistan, and Indonesia.
These five constitute 75 percent of the Asian population. By 2030, it is predicted that Iran, the Philippines and Vietnam would join the other five. These eight together will constitute 81 percent of Asia's population. The combined urban population of these eight countries will increase by about one billion people by 2030, making up roughly four-fifths of the total urban increment in Asia.

Along with such colossal urbanization, Asia will dominate the list of world's largest cities. 16 of the world's 24 megacities (cities with more than 10 million people) will be located in Asia, according to the UN's World Urbanization Prospects, cited above. Many of these megacities will be located in China and South Asia. The following table further illustrates the dominance of Asia's largest cities with the passage of decades.

**Table No 3.6: Population of Cities with 10 Million Inhabitants or More, 1950, 1975, 2001 and 2015**

<table>
<thead>
<tr>
<th>City</th>
<th>Population</th>
<th>City</th>
<th>Population</th>
<th>City</th>
<th>Population</th>
<th>City</th>
<th>Population</th>
<th>City</th>
<th>Population</th>
</tr>
</thead>
<tbody>
<tr>
<td>New York</td>
<td>12.3</td>
<td>Tokyo</td>
<td>198</td>
<td>São Paulo</td>
<td>18.3</td>
<td>Mexico City</td>
<td>18.3</td>
<td>Mumbai</td>
<td>22.6</td>
</tr>
<tr>
<td>Shanghai</td>
<td>114</td>
<td>Mexico City</td>
<td>107</td>
<td>Mumbai</td>
<td>16.5</td>
<td>Delhi</td>
<td>20.9</td>
<td>Dhaka</td>
<td>22.8</td>
</tr>
<tr>
<td>Mexico City</td>
<td>107</td>
<td>São Paulo</td>
<td>103</td>
<td>Mumbai</td>
<td>16.5</td>
<td>Delhi</td>
<td>20.9</td>
<td>Dhaka</td>
<td>22.8</td>
</tr>
<tr>
<td>São Paulo</td>
<td>103</td>
<td>Tokyo</td>
<td>26.5</td>
<td>Tokyo</td>
<td>27.2</td>
<td>Tokyo</td>
<td>27.2</td>
<td>Tokyo</td>
<td>27.2</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>13.3</td>
<td>Mexico City</td>
<td>20.4</td>
<td>New York</td>
<td>17.9</td>
<td>New York</td>
<td>17.9</td>
<td>New York</td>
<td>17.9</td>
</tr>
<tr>
<td>Calcutta</td>
<td>13.3</td>
<td>São Paulo</td>
<td>21.2</td>
<td>Jakarta</td>
<td>17.3</td>
<td>Jakarta</td>
<td>17.3</td>
<td>Jakarta</td>
<td>17.3</td>
</tr>
<tr>
<td>Dhaka</td>
<td>13.2</td>
<td>New York</td>
<td>17.9</td>
<td>Jakarta</td>
<td>17.3</td>
<td>Jakarta</td>
<td>17.3</td>
<td>Jakarta</td>
<td>17.3</td>
</tr>
<tr>
<td>Delhi</td>
<td>13.0</td>
<td>Bengaluru</td>
<td>16.7</td>
<td>Bengaluru</td>
<td>16.7</td>
<td>Bengaluru</td>
<td>16.7</td>
<td>Bengaluru</td>
<td>16.7</td>
</tr>
<tr>
<td>Shanghai</td>
<td>12.8</td>
<td>Karachi</td>
<td>16.2</td>
<td>Karachi</td>
<td>16.2</td>
<td>Karachi</td>
<td>16.2</td>
<td>Karachi</td>
<td>16.2</td>
</tr>
<tr>
<td>Buenos Aires</td>
<td>12.1</td>
<td>Jakarta</td>
<td>17.3</td>
<td>Jakarta</td>
<td>17.3</td>
<td>Jakarta</td>
<td>17.3</td>
<td>Jakarta</td>
<td>17.3</td>
</tr>
<tr>
<td>Jakarta</td>
<td>11.4</td>
<td>Bengaluru</td>
<td>16.7</td>
<td>Bengaluru</td>
<td>16.7</td>
<td>Bengaluru</td>
<td>16.7</td>
<td>Bengaluru</td>
<td>16.7</td>
</tr>
<tr>
<td>Osaka</td>
<td>11.0</td>
<td>Bengaluru</td>
<td>16.7</td>
<td>Bengaluru</td>
<td>16.7</td>
<td>Bengaluru</td>
<td>16.7</td>
<td>Bengaluru</td>
<td>16.7</td>
</tr>
<tr>
<td>Beijing</td>
<td>10.8</td>
<td>Bangkok</td>
<td>12.6</td>
<td>Bangkok</td>
<td>12.6</td>
<td>Bangkok</td>
<td>12.6</td>
<td>Bangkok</td>
<td>12.6</td>
</tr>
<tr>
<td>Rio de Janeiro</td>
<td>10.8</td>
<td>Manila</td>
<td>12.6</td>
<td>Manila</td>
<td>12.6</td>
<td>Manila</td>
<td>12.6</td>
<td>Manila</td>
<td>12.6</td>
</tr>
<tr>
<td>Karachi</td>
<td>10.4</td>
<td>Beijing</td>
<td>11.7</td>
<td>Beijing</td>
<td>11.7</td>
<td>Beijing</td>
<td>11.7</td>
<td>Beijing</td>
<td>11.7</td>
</tr>
<tr>
<td>Metro Manila</td>
<td>10.1</td>
<td>Cairo</td>
<td>11.5</td>
<td>Cairo</td>
<td>11.5</td>
<td>Cairo</td>
<td>11.5</td>
<td>Cairo</td>
<td>11.5</td>
</tr>
<tr>
<td>Osaka</td>
<td>11.0</td>
<td>Dhaka</td>
<td>22.8</td>
<td>Dhaka</td>
<td>22.8</td>
<td>Dhaka</td>
<td>22.8</td>
<td>Dhaka</td>
<td>22.8</td>
</tr>
<tr>
<td>Tianjin</td>
<td>10.3</td>
<td>Bengaluru</td>
<td>16.7</td>
<td>Bengaluru</td>
<td>16.7</td>
<td>Bengaluru</td>
<td>16.7</td>
<td>Bengaluru</td>
<td>16.7</td>
</tr>
</tbody>
</table>

**Source:** United Nations 2002, 8

Within Asia, however, there are large variations between individual countries and regions. South-Central Asia is the least urbanized part of the region with less than a third (29.8
percent) of its population living in urban areas while Eastern Asia is the most urbanized (41.6 percent). By 2030, two in three residents in East Asia will live in urban areas while the urban proportion will be 44 percent in South Central Asia and 56.5 percent in South-east Asia. (Urbanization in Asia, 2003)

In view of such massive urbanization, Asian cities shall have to contend with the provision of employment, infrastructure, environment and issue of equity. Asian cities would require the construction of more than 20,000 new dwellings, 250 kilometers of new roads, and additional infrastructure to supply more than six mega litres of potable water. Traffic congestion and pollution would continue to grow and so would densities and overcrowding. Urban poverty, associated with unemployment and the lack of access to adequate housing and services, would be an increasing social problem. Urban governance, the institutions and arrangements for the planning, provision, and financing of urban infrastructure and services would be no less critical in tackling this magnitude of urbanization.

3B.3. Urban Areas, Census 2001 and the Indian Constitution

One of the most important documents that have attempted to define urban and rural is the Census of India. In 2001, it defined all urban areas as 'town' and rural areas as 'village'. The Census further elaborated that towns are statutory places with a municipality, corporation, cantonment board, notified town area committee and such others so declared by State law. The Census towns were also to simultaneously satisfy the three criteria of a minimum population of 5,000, at least 75 per cent of male working population engaged in non-agricultural pursuits and a population density of at least 400 persons per sq km. In addition, some areas falling in the vicinity of city or town are also considered as urban area if they are treated as out growths (OGs) of the main urban unit. Such OGs are shown as urban agglomerations. As per the Census definition, urban agglomeration is a continuous urban spread constituting a town and its adjoining urban outgrowths (OGs) or two or more physically contiguous towns together and any adjoining urban out growths of such towns. The same Census definition has been adopted in Census 2011.

The Constitution (seventy-fourth) Amendment Act categorized urban areas into nagarpanchayat (an area in transition from a rural area to an urban area), municipality (institution of self-government constituted under article 243Q) and municipal corporation (for a larger urban area). The designation of such areas would be done with
regard to the population of the area, the density of the population therein, the revenue generated for local administration, the percentage of employment in non-agricultural activities, their economic importance or such other factors.

At the other end, beyond a municipal corporation, an area with a population of one million or more, comprised in one or more districts and consisting of two or more Municipalities or Panchayats or other contiguous areas, was categorized as a metropolitan area. The Constitution stipulates that each city above 1 million would have a Metropolitan Planning Committee. This Committee will prepare a draft development plan for the Metropolitan area as a whole.

Globally, urban and rural settlements are defined in the national context and vary from country to country (Box 1.1). These various approaches could broadly be categorized as administrative (area actually administered by an urban local body), functional (area actually served by ULB), demographic (a prescribed minimum population threshold), economic (a minimum percentage of population engaged in non-agricultural activities) and approaches based on density (a prescribed minimum density of buildings or population) or brick and mortar (a contiguous built-up area). Despite these different approaches, it is possible to get a fair idea from data available, about the urbanization trends in different countries. We shall here deal with India alone.

**3B.4. National Urbanization Trends**


As per the provisional Census Report 2011, this population accounted for world's 17.5 per cent population, comprising 623.7 million males and 586.5 million females. This was second only to China, the most populous nation on earth, accounting for 19.4 per cent of the global population. The Indian population saw an increase of more than 181 million during the decade 2001-2011. However, India's demographic growth rate fell in 2011 to 17.64 per cent
from 21.15 per cent in 2001. India's headcount now is almost equal to the combined population of the United States, Indonesia, Brazil, Pakistan, Bangladesh and Japan put together.

**Box 3.1: Varying Definitions of Urban**

<table>
<thead>
<tr>
<th>Country</th>
<th>Definition</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>China</strong></td>
<td>City districts with an average population density of at least 1500 persons per sq. km; the population in sub-district units and township-level units meeting criteria such as contiguous built-up area’, being the location of local government, having a street’, or having a resident committee.</td>
</tr>
<tr>
<td><strong>Indonesia</strong></td>
<td>Municipalities (kotamadya), regency capitals (kabupaten), and other places with urban characteristics.</td>
</tr>
<tr>
<td><strong>Argentina</strong></td>
<td>Population centres with at least 2000 inhabitants.</td>
</tr>
<tr>
<td><strong>Brazil</strong></td>
<td>Urban and suburban zones of administrative centres of ‘municipios’ and districts.</td>
</tr>
<tr>
<td><strong>Mexico</strong></td>
<td>Localities with at least 2500 inhabitants.</td>
</tr>
<tr>
<td><strong>South Africa</strong></td>
<td>A classification based on dominant settlement type and land use. Cities, towns, townships, suburbs, etc., are typical urban settlements. Enumeration areas (Census units) comprising informal settlements, hostels, institutions, industrial and recreational areas, and small holdings within or adjacent to any formal urban settlement are classified as urban.</td>
</tr>
<tr>
<td><strong>United Kingdom</strong></td>
<td>Localities with at least 1500 people in England and Wales, at least 1000 inhabitants in Northern Ireland, and all settlements/localities in Scotland as per 2001 Census.</td>
</tr>
<tr>
<td><strong>United States</strong></td>
<td>Areas with minimum population density requirements and encompassing a population of at least 2500 inhabitants.</td>
</tr>
</tbody>
</table>

*Source: (United Nations 2007)*

This process of urbanization has been contributed by four factors – natural multiplication of existing urban population, the emergence of new towns, expansion of jurisdiction of existing towns through merger of peripheral areas and migration. Data collected by a study reveals that of these, internal urban population increase has contributed 60 per cent. The share of new towns fell from 13.8 per cent to 6.2 per cent during 1961-2001 and the share of old towns through jurisdictional expansion rose to 13 per cent. Migration contributed 18.7 per cent to
During the earlier part of the twentieth century, Indians were generally immobile and migration was a trickle. The total intercensal migration in percentage terms was 15 per cent for 1961, 12.4 per cent for 1971, 12.2 per cent for 1981 and 9.7 per cent for 1991. Migration, therefore as a factor of urbanization has been clearly declining. (K.C. Sivaramakrishnan, Amitabh Kundu, B.N.Singh, 2005)

India displays significant regional variation in the distribution of urban population. Among the large states and in the highest bracket fall Tamil Nadu, Kerala and Maharashtra and Gujarat that are more than 40 per cent urbanized as per Census 2011, and Karnataka that is more than 30 per cent urbanized. West Bengal too has a larger urban percentage than the national, above the average Indian figure of 31.16 per cent. Among the smaller states and union territories, Delhi’s population is more than 90 per cent urban, Chandigarh more than 80 per cent, Pondicherry and Goa more than 60 per cent, Lakhshadweep above 40 per cent, and Daman & Diu, Punjab, Haryana, Andhra Pradesh, Manipur and Andaman & Nicobar Islands above 30 per cent. The other States are less urbanized than the Indian average with the least urbanization reported in Arunachal Pradesh and Himachal Pradesh at less than 10 per cent.

In the case of cities, the Census of India classifies towns into six categories based on their population. Class 1 are towns with 100,000 persons or more, class 2 are towns with 50,000 persons up to 99,999; class 3 are towns with 20,000 persons up to 49,999; class 4 are towns with 10,000 persons up to 19,999; class 5 are towns with 5,000 persons up to 9,999 and class 6 are towns below 5,000 persons.

Data on urbanization in India also discloses that class 1 cities dominate India’s urban demography. “In 1901, the share of class 1 cities in India was 26.00 per cent, but rose to 68.67 per cent by 2001. The class 2 and 3 towns remained demographically more or less dormant with a slight drop over the century from 11 to 9 and 15 to 12 respectively. The class 4, 5 and 6 towns, however, have seen a sharp drop over the century, from 21, 20 and 6 per cent to 7, 2 and 0.2 per cent respectively. The most significant cause of such demographic changes has not been because of loss of populations but on account of the upward movement
of towns to a higher category or class. Class 1 towns were only 24 in 1901 but went up to 393 in 2001. A similar factor is noticeable in other classes as well.

A significant factor in urban growth is the growth of metro cities, or cities with more than one million population. Between 1981 and 2001, “the demographic growth in metro cities is higher than that in common towns or class 1 cities”. They “claimed about 26.41 per cent of urban population in 1981. This has increased to 32.54 in 1991 and further to 37.81 in 2001”. This appears to be on account of “higher growth in their peripheries than in cores. Huge population, lack of infrastructure….cost of living…… may have decelerated the capacity of the core areas…This tendency in urbanization basically indicates an agglomerated trend.”

(K.C. Sivaramakrishnan, Amitabh Kundu, B.N.Singh, 2005)

The urbanization of poverty has been one of the principal trends in India’s urbanization. Unfortunately this has not been a much researched subject, as poverty studies in the country, to begin with, concentrated on rural poverty. While poverty levels were high in the less urbanized states, they were high in developed states as well, such as in Maharashtra, Tamil Nadu and Gujarat. Industrialization in these states did not significantly impact poverty and its decline. Based on NSS data, the poverty scenario has changed significantly in the mid 1990s. The percentage of people below poverty line in rural areas has increased by one percentage point in 1994-5 compared to that of the previous year. It remained at that level till 1997. Correspondingly, the figures have gone up by around two percentage points in urban areas. There is thus evidence that the poverty level increased during 1993-8 and the trend of decline was stalled in the mid-1990s.

The process of engaging with slums began through a nation-wide sample survey conducted by the NSSO and published in 1980. Comprehensive data on slums, however, only became available through Census 2001. The Census computed slum population data of all urban areas with 50,000 or more population. The total slum population aggregated to 40 million or 14.12 per cent of the total urban population. Maharashtra, Andhra Pradesh and Haryana were found with high slum population share” constituting 25.9 per cent, 25.1 per cent and 23 per cent of the urban population respectively. West Bengal and Delhi too have exhibited moderately higher shares of slum population than the national average.” (K.C. Sivaramakrishnan, Amitabh Kundu, B.N.Singh, 2005)
3B.5: Maharashtra Urbanization Trends

Maharashtra is the premier industrial state in the country and economically one of the most advanced. It attracted a sizeable chunk of FDI that flowed into India. It is, therefore, not surprising that the State has the largest urban population. At the point of the State's formation in 1960, it had a population of 3.96 crores. This doubled in the next three decades and now stands at 11.24 crores.

Table No 3.7: Maharashtra Population Growth

<table>
<thead>
<tr>
<th>Year</th>
<th>Total Pop (Cr)</th>
<th>Percent Decadal Increase</th>
</tr>
</thead>
<tbody>
<tr>
<td>1961</td>
<td>3.96</td>
<td>-</td>
</tr>
<tr>
<td>1971</td>
<td>5.04</td>
<td>27.3</td>
</tr>
<tr>
<td>1981</td>
<td>6.28</td>
<td>24.6</td>
</tr>
<tr>
<td>1991</td>
<td>7.89</td>
<td>25.6</td>
</tr>
<tr>
<td>2001</td>
<td>9.68</td>
<td>22.7</td>
</tr>
<tr>
<td>2011</td>
<td>11.24</td>
<td>16.1</td>
</tr>
</tbody>
</table>

HDR Maharashtra 2002 and Prov. Census Figures 2011
In terms of urban population, the following table summarizes the key figures:

**Table No 3.8: Level of Urbanization in Maharashtra**

<table>
<thead>
<tr>
<th>YEAR</th>
<th>URBAN UNITS</th>
<th>URBAN POP (CRORE)</th>
<th>URBAN POP AS PERCENT OF TOTAL POP</th>
<th>DECADAL GROWTH RATE OF URBAN POP</th>
</tr>
</thead>
<tbody>
<tr>
<td>1961</td>
<td>266</td>
<td>1.12</td>
<td>28.2</td>
<td>21.3</td>
</tr>
<tr>
<td>1971</td>
<td>289</td>
<td>1.57</td>
<td>31.2</td>
<td>40.08</td>
</tr>
<tr>
<td>1981</td>
<td>307</td>
<td>2.20</td>
<td>35.0</td>
<td>40.0</td>
</tr>
<tr>
<td>1991</td>
<td>336</td>
<td>3.05</td>
<td>38.7</td>
<td>38.9</td>
</tr>
<tr>
<td>2001</td>
<td>378</td>
<td>4.10</td>
<td>42.4</td>
<td>34.3</td>
</tr>
<tr>
<td>2011</td>
<td>NA</td>
<td>5.08</td>
<td>45.2</td>
<td>23.7</td>
</tr>
</tbody>
</table>

HDR Maharashtra 2002 and Prov. Census Figures 2011

Till 1991, Maharashtra ranked number one in terms of both urban population and in terms of the percentage of urban population. However, in 2001, in terms of percentages, Tamil Nadu became number one with its urban population standing at 43.4 % of its total population as against Maharashtra's 42.4 %. Yet in absolute terms, Maharashtra's 41 million urban population far exceeded Tamil Nadu's 27 million. Maharashtra's urban population grew by around 97 lakhs between 2001-2011, taking its number of city dwellers to 5.08 crore (out of a total of 11.24 crores). This accounted for 62.8 % of the total population growth in Maharashtra. While its total urban population remained the highest for any state in the country, in percentage terms it slipped to the third position (45.23 5%), behind Tamil Nadu (48.45 %) and Kerala (47.72 %). Tamil Nadu's total urban population stood at 3.49 crores. The steep rise in urban population percentage in Tamil Nadu and Kerala appear to be on account of redesignating a number of villages as nagarpanchayats.

As per Census 2011, while Maharashtra's population grew at 16 percent, its urban population jumped up by 23.7 percent, whereas its rural population crawled up by 10.3 percent. Thane district grew by 77 percent, Nagpur by 68 percent, and Pune by 61 percent. The Mumbai Metropolitan region held 25 percent of the total State population. There were some startling growth stories revealed by Census 2011. For instance, Kharghar showed 1117 percent growth.
over 2001, Vasai Virar 221 percent, New Panvel 113 percent, Kalyan, Mira Bhajinder 50 percent, Thane 43 percent, Pen 33 percent, Uran 30 percent, Ambarnath 28 percent and Khopoli 21 percent.

Some factors seem to be constant if one analyzes census figures of 2001 and earlier and figures of 2011. In terms of regions, Konkan division comprising Mumbai, Mumbai Suburban, Thane, Raigad, Ratnagiri and Sindhudurg districts is the most urbanized. Konkan is followed by Western Maharashtra and Vidarbha. The Marathwada division emerges as the least urbanized region. (HDR Maharashtra 2002)

Maharashtra’s inter-district urban population distribution continued to have large variations, similar to the inter-state disparities in urbanization. In 2001, at one end of the spectrum were the districts of Mumbai, Thane, Nagpur and Pune with urban populations standing at 100 per cent, 72.58 per cent, 64.36 per cent and 58.07 per cent respectively. At the other end were districts of Gadchiroli, Sindhudurg, Ratnagiri and Gondia with 6.93 per cent, 9.56 per cent, 11.33 per cent and 11.95 per cent respectively. These facts were not much different in 2011. Mumbai, Thane, Nagpur and Pune emerged as the most urbanized districts in the State. Gadchiroli, Sindhudurg and Hingoli, on the other hand, were the least urbanized. Most of Maharashtra’s urbanization was, during the decade driven by Mumbai, Thane, Pune and Nagpur.

The class 1 cities in Maharashtra housed 75.24 of the state’s urban population in 1981. “This figure has gone up to 77.8 per cent and 79.7 per cent in 1991 and 2001 respectively.” On the other hand, class iv, v and vi towns “have lost their share over time, viz., from 7.9 per cent in 1981 to 5.3 per cent in 1991 and 4.2 per cent in 2001.” (K.C. Sivaramakrishnan, Amitabh Kundu, B. N. Singh 2005)

As of 31 March 2010, Maharashtra had a total of 1,57,68,421 registered motor vehicles. This was the highest for any state, followed by Tamil Nadu and Uttar Pradesh. This was up from 99.36 lakhs as on 31 March 2005.

The growth of slums in Maharashtra has gone hand in hand with the process of urbanization. The UN-HABITAT defines a slum as a run-down area of a city characterized by substandard housing and squalor and lacking in tenure security. The State considers a slum as a compact
area of at least 300 souls, or some 70 households of poorly built congested quarters, often illegally on lands not belonging to the owner/occupant of tenements. As per Census 2001, Maharashtra had 1.06 crores lumdwellers, with Mumbai sharing 58.2 lakhs, Nagpur 7.3 lakhs, Pune 5.3 lakhs and Nashik 1.4 lakhs.

3B.6: Mumbai Urbanization Trends

Mumbai is India's largest city, the country's financial capital with administrative jurisdiction over 437.71 sq km. Its decadal population since 1951 is as follows:

<table>
<thead>
<tr>
<th>YEAR</th>
<th>POPULATION</th>
<th>INCREASE</th>
<th>DECADAL GROWTH (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>1951</td>
<td>29,94,444</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>1961</td>
<td>41,52,056</td>
<td>11,57,612</td>
<td>38.66</td>
</tr>
<tr>
<td>1971</td>
<td>59,70,575</td>
<td>18,18,519</td>
<td>43.80</td>
</tr>
<tr>
<td>1981</td>
<td>82,43,405</td>
<td>22,72,830</td>
<td>38.06</td>
</tr>
<tr>
<td>1991</td>
<td>99,25,891</td>
<td>16,82,486</td>
<td>20.41</td>
</tr>
<tr>
<td>2001</td>
<td>1,19,78,450</td>
<td>20,52,559</td>
<td>20.68</td>
</tr>
<tr>
<td>2011</td>
<td>1,24,78,447</td>
<td>4,99,997</td>
<td>4.17</td>
</tr>
</tbody>
</table>

These figures clearly reveal the huge demographic growth of the city. The Human Development Report of Mumbai 2009 predicts that by 2031 its population is projected to grow somewhere between 1.5 crores and 2.1 crores. The city currently ranks as the fifth largest in the world and with the kind of predicted growth, it is destined to become the second largest city on the globe after Tokyo. Since its boundaries during the period have not
expanded, the city has grown denser and now ranks as the densest city in the world with a population of 28,508 persons per sq km.

As per Census 2001, 54.1 percent of the population lived in slums in just about "6 percent of all land in Mumbai explaining the horrific levels of congestion." (Human Development Report Mumbai, 2009).

According to a survey conducted by YUVA, a non-governmental organization, and Montgomery Watson Consultants in 2001, there were 1959 slums holding 57.2 lakhs of slum dwellers. The urbanization of poverty appeared in its most virulent form in the city. The provisional figures released by Census 2011 show that the number of people living in slums and slum-like areas has gone up by a staggering 30 lakhs since the last Census. The projections showed that about 90 lakh Mumbai residents now live in slums as against 60 lakh recorded in 2001 census. This would mean that about 60 per cent of Mumbai is staying in slums-shanties built in unplanned manner with limited access to civic amenities.

Mumbai’s vehicular population has also witnessed a steep rise. Mumbai had 12.94 lakh motor vehicles in 2005, 13.94 lakhs in 2006, 15.03 lakhs in 2007, 16.05 lakhs in 2008, 16.74 lakhs in 2009. In 2010, its vehicular population was 17.68 lakhs out of which car population was 5.15 lakhs and two-wheeler population 9.67 lakhs. The vehicular population in Mumabi as of March 2011 was 19.38 lakhs. About 400 vehicles are registered every day in the city and the vehicular population is growing at an average of 7 percent per annum. (Motor Transport Statistics of Maharashtra 2009-2010)

3B.7: Pune Urbanization Trends

Pune is situated on the leeward side of the Sahyadri ranges and Western Ghats, 560 metres above sea level, at the confluence of the Mula and Mutha rivers. Two more rivers, Pavana and Indrayani, traverse the north-western outskirts of the urban area. The Sinhagad-Katraj-Dive Ghats form the southern boundary of the urban area. The city is located at the confluence of the National Highways viz., NH-4 leading to Mumbai in the north and Bangalore in the south, NH-50 to Nasik and NH-9 to Sholapur.

Pune is India's eighth largest city and the second largest of Maharashtra. Also known as the cultural capital of the State, it has administrative jurisdiction over an area of 243.84 sq km, up
from its original administrative boundaries of 146 sq km. The following table shows its decadal population since 1951:

Table No 3.10: Pune Demography

<table>
<thead>
<tr>
<th>Year</th>
<th>Population</th>
<th>Increase</th>
<th>Decadal Growth (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>1951</td>
<td>4,80,942</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>1961</td>
<td>5,97,562</td>
<td>1,16,620</td>
<td>24.25</td>
</tr>
<tr>
<td>1971</td>
<td>8,56,105</td>
<td>2,58,543</td>
<td>43.27</td>
</tr>
<tr>
<td>1981</td>
<td>12,03,363</td>
<td>3,47,258</td>
<td>40.56</td>
</tr>
<tr>
<td>1991</td>
<td>15,66,651</td>
<td>3,63,288</td>
<td>30.19</td>
</tr>
<tr>
<td>2001</td>
<td>25,38,473</td>
<td>9,71,822</td>
<td>62.03</td>
</tr>
<tr>
<td>2011</td>
<td>37,60,636</td>
<td>12,22,163</td>
<td>48.15</td>
</tr>
</tbody>
</table>

From a traditional city with an agro-based economy, Pune has steadily metamorphosed into an industrial and educational centre, crowned with labels like the Detroit of India and the Oxford of the East. The industrial efflorescence of Pune began with the entry of the Kirloskar Oil Engine Ltd in 1946. In 1960, MIDC set up a huge industrial estate on 4000 acres of land at Bhosari, leading to a spate of engineering and ancillary industries. Later, the city witnessed the entry of auto majors such as Tata Motors, Bajaj Auto and Bharat Forge Ltd. Today, the city is home to Kinetic Engineering, Force Motors (previously known as Bajaj Tempo), Daimler Chrysler and Cummins Engines Co Ltd. Education has been another stronghold of Pune. Starting with the establishment of the Deccan Education Society in 1880, the city has
nurtured six universities, which have 600 functional colleges and PG departments in their fold. The student population of Pune exceeds five lakhs. Also, in recent years, Pune has attracted about 8000 foreign students from over 62 countries. Moreover, a number of established educational institutions have introduced new courses and research areas.

Quite like Mumbai, Pune's growth has been very rapid. This has especially been assisted by the connectivity provided by the Mumbai-Pune Expressway and the widened national Highway No. 4. Because of the ongoing urbanization happening on its boundaries, it has had to merge within its fold 23 villages. Its educational institutions and its emergence as an IT hub have further fuelled its growth. At the same time the slum population in Pune has also grown. In 2001, a total of 13.75 lakh persons were slum dwellers forming 57.83 percent of the total population. This was only 7.64 percent in 1951.

The Environmental Status Report 2010-2011 states that Pune generates about 1300 to 1400 metric tonnes of solid waste every day and the number of its registered motorized vehicles stand at approximately 20 lakhs, up from 6.73 lakhs in 1995 and 6,423 in 1960. However, it has been able to maintain a forest cover of 35 percent. The city supplies 194 litres of water per person per day and this is about 1.5 times the normal average water supply to cities.


3B.8: Nashik Urbanization Trends
Nashik is situated in the northwest of Maharashtra, in the western ghats and on the banks of river Godawari. The Godavari River flows through the city from its source in the holy place of Trimbakeshwar, cutting the city into two. Nashik is connected by road to Mumbai (180 km) and to Pune (200 km). Rail connectivity is through the Central railway, with direct connection to Mumbai. Air link is with Mumbai, though the air service is not consistent and a proper Airport does not exist. Nashik is the administrative headquarters of Nashik District and Nashik Division. It is popularly known as the “Grape City” and for its twelve yearly ‘SinhastaKumbhMela’. The city is known for its picturesque surroundings and pleasant climate. Of recent, it has also been christened as India’s ‘wine capital’. 
Nashik is among the fastest growing cities in the State and in India. Its transformation from a small pilgrimage town in the 70s to a bustling industrial city was when the State consciously promoted industries around the city. It now has a total area of 264.23 sq km; is one of the most industrialized cities in the State and has become a metropolitan city with a population above one million. Geographical proximity to Mumbai and its location within the golden triangle of Mumbai, Pune and Nashik has accelerated its growth. The natural benefits of geography and climate and abundant availability of water have further catalyzed this expansion. The developments of the past two decades have completely transformed this traditional pilgrimage center into a vibrant modern city, and it is poised to become a metropolis with global links.

The city's economy is driven chiefly by the engineering and manufacturing industry as well as the progressive agriculture in area surrounding the city. Auto majors such as Mahindra & Mahindra and Original Equipment Manufacturers (OEMs) such as VIP, Samsonite and CEAT have their plants here and have spawned a huge network of auto component suppliers and engineering ancillary services. It is also a pharmaceutical hub with presence of GlaxoSmithKline and Fem. In recent years, as the wine capital, Nasik has also carved a niche for itself as India's and locally established wine brands such as 'Sula' and 'Zampa'. Modern efforts are on to promote the growth of an export-oriented rose farming and wine industry in the district.

The population of the city grew from 6.56 lakhs to 10.77 lakhs during 1991-2001, recording 64% decadal growth rate. The growth rate has been very rapid during the past three decades (50% +). According to the Census of India, 2001, Nashik had a population of 1,076,967. Population growth rate started rising steadily after 1961 and Nashik recorded more than the average growth rate for India in two decades, between 1971. In 1982 the city limit was expanded and Nashik acquired the status of Municipal Corporation with a population of 432,000 souls. Growth rate of 63% for the decade 1971-81 continued in the decade 1981-91. In 2001 Nashik became one of the 35 metropolitan cities. Nashik has grown from a population 21,940 in 1901 to 10,77,236 in 2001. It took Mumbai 157 years to grow from a base population of 70000 in 1744 to a million in 1901. Nashik has achieved this within a short period of 55 years, from 1945 to 2000. Nashik was the seventh largest city in 1947 in Maharashtra. Now it is the fourth largest.
Table No 3.11: Nashik Demography

<table>
<thead>
<tr>
<th>Year</th>
<th>Population (L)</th>
<th>Increase (L)</th>
<th>Decadal Growth Rate (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>1951</td>
<td>1.49</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>1961</td>
<td>2.01</td>
<td>0.52</td>
<td>35.16</td>
</tr>
<tr>
<td>1971</td>
<td>2.74</td>
<td>0.73</td>
<td>36.68</td>
</tr>
<tr>
<td>1981</td>
<td>4.32</td>
<td>1.58</td>
<td>57.40</td>
</tr>
<tr>
<td>1991</td>
<td>6,56,925</td>
<td>2.25</td>
<td>52.05</td>
</tr>
<tr>
<td>2001</td>
<td>10,76,967</td>
<td>4.20</td>
<td>63.98</td>
</tr>
<tr>
<td>2011</td>
<td>11.52</td>
<td>0.96</td>
<td>6.96</td>
</tr>
</tbody>
</table>

Source: Census of India

The slum population in Nashik is surprisingly low. The Nashik Municipal Corporation conducted a survey of slums in 2007. The survey also revealed that there were a total of 42,742 slum dwellings with a total population of 2,14,769.

Table No 3.12: Slum Population in Nashik

<table>
<thead>
<tr>
<th>Type</th>
<th>Notified</th>
<th>Unauthorized</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>On Government Land</td>
<td>13</td>
<td>20</td>
<td>33</td>
</tr>
<tr>
<td>On NMC Land</td>
<td>11</td>
<td>5</td>
<td>16</td>
</tr>
<tr>
<td>On Private Land</td>
<td>32</td>
<td>87</td>
<td>119</td>
</tr>
<tr>
<td>Total</td>
<td>56</td>
<td>112</td>
<td>168</td>
</tr>
</tbody>
</table>
The vehicular population in Nasik rose from 5.23 lakhs in 2005 to 5.71 lakhs in 2006, 6.22 lakhs in 2007, 6.70 lakhs in 2008, 7.20 lakhs in 2009 and 7.81 lakhs in 2010. Of these 2.72 lakhs were two-wheelers and 29,791 cars. (Motor Transport Statistics of Maharashtra 2009-2010)

3B.9: Kolhapur Urbanization Trends

Kolhapur, widely recognized as the DakshinKashi, is situated on the banks of the river Panchganga, in the south-west part of Maharashtra and is the headquarters of Kolhapur district. Located at the gateway of Konkan, Kolhapur enjoys the status of a traditional, beautiful and economically developed city. Kolhapur city has the Sahyadri hills on the west, the Waranariver on the north and Belgaum district on the south. The approximate area of the city is 66.82 sq. kms. Agriculture is the main contributor for the economy of Kolhapur. Its sugarcane industry contributes to over 5% of the sugarcane produced in the country and accounts for a significant share of sugar, jaggery and baggase produced. Kolhapur is fast becoming a highly industrialized city and is already a front-runner in agro-based industries.

It is one of the growing cities in Maharashtra, in keeping with the overall trend of urbanization in the State. The demographic growth of Kolhapur is depicted in the following table. The table clearly shows that while the population of the city has moved up in absolute numbers, its decadal growth rate has considerably slowed down. This appears to be on account of faster peri-urban growth and availability of land outside city, especially since the municipal boundaries have remained frozen since the inception of the municipal corporation. The population density of the city stood at 7261 persons/sq.kms. and that has now marginally gone up to 7565 persons per sq km.

<table>
<thead>
<tr>
<th>Year</th>
<th>Population</th>
<th>Increase</th>
<th>Decadal Growth Rate</th>
</tr>
</thead>
<tbody>
<tr>
<td>1951</td>
<td>1,36,835</td>
<td>56,351</td>
<td>47.08</td>
</tr>
<tr>
<td>1961</td>
<td>1,93,186</td>
<td>50,607</td>
<td>36.98</td>
</tr>
<tr>
<td>1971</td>
<td>2,67,513</td>
<td>74,327</td>
<td>38.47</td>
</tr>
<tr>
<td>1981</td>
<td>3,51,392</td>
<td>83,879</td>
<td>31.36</td>
</tr>
<tr>
<td>1991</td>
<td>4,06,370</td>
<td>54,978</td>
<td>15.65</td>
</tr>
<tr>
<td>2001</td>
<td>4,93,167</td>
<td>86,797</td>
<td>21.36</td>
</tr>
<tr>
<td>2011</td>
<td>5,79,281</td>
<td>86,114</td>
<td>17.46</td>
</tr>
</tbody>
</table>

Source: Census of India
The city of Kolhapur gets a raw water supply of 128 MLD, of which the Corporation supplies
120 MLD and 8 MLD is obtained through ground water sources. The total quantity of waste
generated is in the order of 170 tonnes per day (TPD) at a per capita generation of 342 grams
per day. The percentage of waste collected and disposed is 86% of the generation.

There are 54 slums in Kolhapur, of which 44 are declared and 10 undeclared. The total slum
population was approximately 56,235 as on 01-01-1995, which is 11.60% of the city’s total
population. Of the 44 declared slums, 10 are located on municipal land, 22 on government
land and the rest 12 on private land.

The vehicular traffic in Kolhapur has increased during the period 1997-2006 with a
Compounded Annual Growth Rate of 34%. According to RTO Kolhapur, the vehicular
population rose from 76,645 in 1997 to 1,10,266 in 2000, to 1,50,468 in 2003 and to
4,52,197 in 2007. In 2010, this stood at 6.36 lakhs of which 1.47 lakhs were two-wheelers
and 19,581 were cars. (Motor Transport Statistics of Maharashtra 2009-2010). The city
runs its own bus fleet through the Kolhapur Municipal Transport Undertaking. It has a fleet
of 119 buses and 15 other buses on contract.
This has put tremendous pressure on the existing infrastructure. The city has currently four
custom parking spaces, which are located at Shahapuri, Kapilteerth market, Shivaji market and near
Mahalaxmi temple. These lots are insufficient given the inflow of traffic in the city and the
increasing floating population.

3B.10: Baramati Urbanization Trends
Baramati is a 'B' class municipal council located in the Pune district of western Maharashtra,
situated at a distance of about 109 km from Pune on the banks of the river Karha. The council
was established in 1865 and has an area of 4.94 sq km. This place is 99 Km by road and 120
km by rail from Pune, which is connected by daily air services to Mumbai and Aurangabad.
Agriculture is the main occupation of the people of Baramati. The land in the region is fertile
and the Neera canal provides irrigation facility to farms. The main food crops grown include
sugarcane, grapes and cotton. Some of its products are marketed in the Middle East and
Europe.

However, Baramati has moved simultaneously towards industrialization industries located in
Baramati range from Steel Processing to Wine making. Baramati is also home to the three
wheeler plant of the Italian company Piaggio. Baramati uses 800 hectares of land as MIDC
(Maharashtra Industrial Development Corporation) Industrial Area along Baramati-Bhigwan
Road, 5 km outside Baramati town's municipal limits. Baramati has an airstrip near MIDC.

The city had a population of 44,515 in 2001 and has currently a population of 55,342 as per
Census 2011. Its vehicular population was 0.53 lakhs in 2005 and rose to 0.71 lakhs in 2006,
0.91 lakhs in 2007, 1.10 lakh in 2008, 1.28 lakh in 2009 and 1.51 lakhs in 2010. Of these 1.04
lakhs were two wheelers and 9,877 cars. (Motor Transport Statistics of Maharashtra 2009-
2010).

3B.11: A Comparison of Urbanization Trends in Research Cities
A comparison of research studies reveals that Mumbai showed very high decadal
demographic growth from 51 to 81. These were close to 40 or above 40 percent. Subsequent
decades show more modest growth rates of around 20 per cent. Pune, on the other hand, had
modest growth in the fifties up to early seventies. But from the late seventies to the current
decade, the growth rates have been very high, between 40 to 60 per cent, except the thirty per
cent revealed in 1991 census. The growth of Nashik has been even more phenomenal. While
in the 60s, the city grew at around 35 per cent, in the subsequent decades Nashik has clocked around 37, 57, 52 and 63 per cent. Kolhapur grew fastest between the decades 1951 and 1981, at 47, 36, 38 and 31 per cent. However, its demographic growth has comparatively slowed down to 15, 21 and 17 percent in the last three decades. Baramati, however, has had a more modest growth in terms of numbers.

It appears that a city’s ability to grow is facilitated when it reaches a critical mass of between 5 to 8 lakhs. This gets coupled with the growth of urbanization witnessed outwards of Mumbai, both on Pune and Nashik axis. As cities move further away from this axis, their growth gets more modest.

3B.12: Overall Conclusions

It is also evident that the crisis of planned growth and governance of planning is a larger concern of the larger cities and the bigger in size it is, the more acute its problems are. In Mumbai, for instance, there are huge issues of informal settlements, of people living in very high densities, of immense traffic and transportation bottlenecks, of parking, of collection and disposal of solid waste and of general city order and security. The smaller cities face similar problems but with lesser intensity. However, as they increase in size, the intensity of these issues appears to be rising.

Some of these issues clearly appear to be arising out of planning deficits. In subsequent chapters, we shall get into these issues in greater detail.

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