

DEVELOPMENT THROUGH CONSERVATION

**A SUSTAINABLE DEVELOPMENT STRATEGY
WITH SPECIAL REFERENCE TO A
HERITAGE ZONE IN MADRAS**

by

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*They will rebuild the ancient ruins
and restore the places long devastated;
they will renew the ruined cities
that have been devastated for generations.*

Isaiah 61:4

*This thesis is dedicated to
my father, the late Dr. R. Ramadas, Ph.D., M.Com., B.Sc.(Hons.)
who showed me the way leading to the inexhaustible fountainhead of knowledge.*

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Except where otherwise stated, this dissertation is entirely my own work. During the course of this study a number of papers, based on different parts of this dissertation were presented at conferences and workshops and have been published. All these are referred to in the bibliography.

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ABSTRACT

Reviewing the past as we approach the turn of the millennium and go into the 21st century, we see modernisation with all its benefits, causing at the same time much social re-structuring, influencing people's attitudes towards money and paradoxically too easily destroying the very cultural values that we cherish. Whilst the process of urban conservation and regeneration has become well established in Western Europe, gentrification, fostered by extensive commercialisation accompanied by the multinationals, has too often been at the cost of local cultural values and the long established resident communities. Now, that the so called developed economies face a slow-down in economic growth, there seems to be a burst of growth in economic and developmental activity in some countries in the Asia-Pacific region. Though many others are still poor in economic terms, particularly concerning the distribution of this new found wealth, they are rich in their cultural heritage, traditions and unique local distinctiveness. This deserves greater recognition and appropriation.

The purpose of this study is to link progress and development, with and through the conservation of what we already have and value. Whereby, addressing these issues will provide a new insight into the opportunities presented by development. We need to restore the balance to the development of our perspective on city building and urbanisation by giving greater emphasis to the social and cultural context. The intention here is to present the need for a wider understanding of the development process; *with* and *through* conservation. The thesis will review the social, political and economic issues whose implications could tilt the balance of development and conservation towards a more democratic and inclusive city building process; with particular reference to an area in Madras rich in its cultural built heritage.

This study attempts to identify the impacts that development has on the cultural and historic fabric of cities in the developing world; trying to reconcile normally assumed conflicting objectives: development and conservation, identity and change, and the blindness of development to so much richness of culture.

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LIST OF ABBREVIATIONS

ASI	Archaeological Survey of India
CPWD	Central Public Works Department
CSD	Commission on Sustainable Development
CSI	Church of South India
DCR	Development Control Rules
DoE	Department of the Environment
FAR	Floor Area Ratio
HUDCO	Housing and Urban Development Corporation
ICOMOS	International Council On Monuments and Sites
INTACH	Indian National Trust for Art and Cultural Heritage
LDDC	London Docklands Development Corporation
LOTS	Living Over The Shop
LPAC	London Planning Advisory Committee
MMDA	Madras Metropolitan Development Authority
MMWSSB	Madras Metropolitan Water and Sewerage Board
MRTS	Mass Rapid Transit System
MTP	Metropolitan Transport Project
NCU	National Commission on Urbanisation
NRLCCP	National Research Laboratory for Conservation of Cultural Property
ODA	Overseas Development Administration
PTC	Pallavan Transport Corporation
PWD	Public Works Department
R. K. MUTT	Ramakrishna Mutt
TNHB	Tamilnadu Housing Board
TNSCB	Tamilnadu Slum Clearance Board
TTC	Tiruvalluvar Transport Corporation

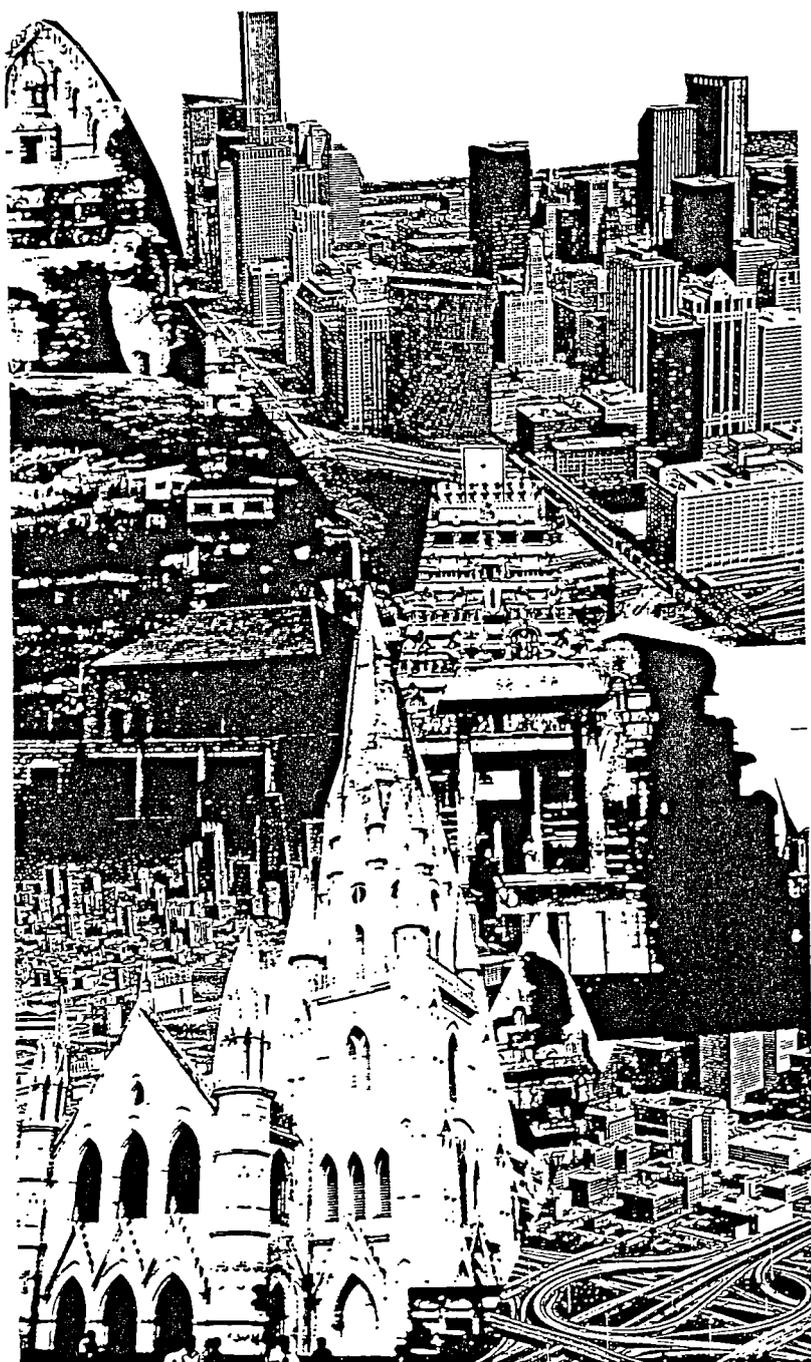
GLOSSARY OF FOREIGN TERMS USED

<i>bharatanatyam</i>	classical dance of Tamilnadu
<i>brahmmins</i>	priestly class and priests in the Hindu temples
<i>chettians</i>	a mercantile class
<i>danda</i>	stick
<i>darshan</i>	viewing of the deity, or as in a Godly presence
<i>devasthanam</i>	a Hindu religious institution/board or trust
<i>gopuram</i>	temple tower
<i>gur</i>	jaggery or hardened cane sugar that is powdered and used as an additive in Madras Terrace roofing, also used in cooking of sweets etc.
<i>jallies</i>	concrete, wooden or metal grills with designed openings
<i>kadukkai</i>	a bitter nut similar to nutmeg, that is soaked and used as an additive in Madras Terrace roofing
<i>kalyana mandapam</i>	marriage hall
<i>katha kalaskshepam</i>	song and dance style of either religious discourses or for presenting epics
<i>kolam or</i>	
<i>rangoli</i>	designs drawn on floors with colour or rice powders
<i>kolattam</i>	folk dance using sticks
<i>mada</i>	ward
<i>mahila</i>	woman
<i>nadaswaram</i>	a south Indian wind instrument, generally played on auspicious occasions.
<i>naer kuthu</i>	the straight passageway from the front to the back door of a house
<i>panchayat</i>	term used for rural governing bodies
<i>pongal</i>	harvest festival or a food item (sweet or savory) prepared during the harvest festival
<i>puja</i>	worship
<i>ratha</i>	processional temple car

<i>sabas</i>	academies for music and other cultural activities
<i>theppam</i>	float in the temple tank
<i>ther</i>	temple car afloat in the temple tank
<i>theru koothu</i>	folk dance
<i>thinnai</i>	veranda
<i>utsavam</i>	festivities such as processions of the idols
<i>vedanta</i>	philosophy of non-dualism
<i>vizha</i>	occasion

INTRODUCTION

There is nothing like leaving a place to help you find it.



*Cities and Thrones and Powers
Stand in times eye, Almost as long as flowers,
which daily die:
But, as new buds put forth
to glad new men,
Out of the spent and unconsidered Earth
The cities rise again.*

(Kipling, 1980 : 476)

PREAMBLE

Today's rapid growth and expansion of cities presents unprecedented challenges and opportunities for people in all parts of the world. The continually changing economic situation and urban growth associated with development can cause traumatic change to individuals, families and communities. In turn, this may lead to a loss of cultural identity and to a disorientation of well established social practices; to others it is seen by some as an escape from an oppressive and feudal lifestyle.

Economic development and growth due to it inevitably cause social restructuring, influencing people's attitudes towards money and paradoxically this too easily destroys the very cultural values of historic cities that gave them their '*raison d'etre*'. It would be a human tragedy if economic success came at the cost of cultural annihilation.

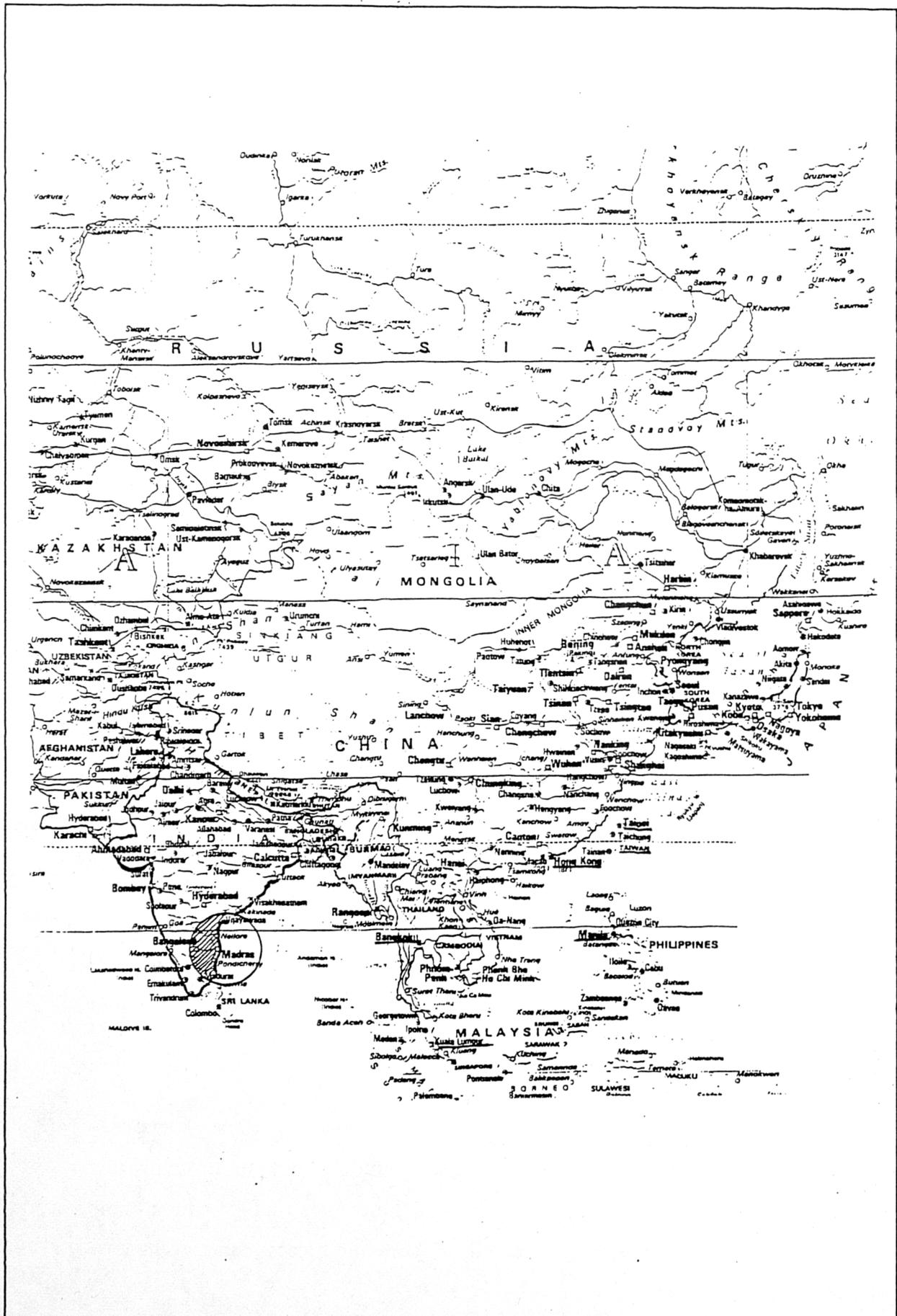


Figure 1 Madras, India and the Asia-Pacific Rim

Resources such as environment, architecture and culturally specific environs are limited and are disappearing at an alarming rate. The impact that this has had on mankind is reflected in the quality of life in historic cities, as revealed by the study of their history. The conservation of these resources is a shared responsibility of present and future generations, which have to ensure the continuance of living traditions and pass on the knowledge of our past civilisations. Thus it is very important to recognise the values associated with conservation so that there is a stimulus to preserve our history - only then can there be a genuine future for our past.

Within this context, Madras, where the old East India Company (an organisation that can now be seen as the equivalent of a radical Urban Development Corporation) started, is the historic capital city on the Coromandal Coast, and is today one of the four major Indian cities that needs to relate and balance development with conservation. Madras has to be conscious of its geographical position on the south-eastern corner of India. It is the largest city in the southern region with a population of approximately 5.5 million (Britannica Book of the Year 1995, Britannica World Data, India p. 628) and an area of 172 sq. kms.

Originally known for its unique Madras cotton goods, it is also known for its leather products, ornate jewellery, home based handlooms and handicrafts. It is also a centre of music, dance and drama and other extensive cultural associations and activities. All these indigenous skills have for too long been seen as hangovers from the past, as not worthy of modernisation, as without a market beyond the local and as victims of a desire to ape the West. This attitude is changing and must be encouraged. This recognition of the importance of craft skills is beginning to be recognised in the world, as highlighted by Clifford and King (1993), and should increasingly underpin our approach to modernisation, employment and economic development (Rapoport, 1969, 1994; Trainer, 1989; Schumacher, 1973).

Traditional and historic urban cores, especially in developing countries are subject to threats from a number of sources. The process of modernisation has in a number of cases led to serious consequences for the integrity of the old city. Some of the causes already identified by Correa (Correa, 1985) are population explosion and rural-urban migration. Feilden (1989) adds other factors such as the increasing use of motor transport in areas not designed for it, land speculation, lack of adequate infrastructure to meet the growing needs and changing industrial methods. We can add also, the lack of appropriate policies for Conservation Areas, or Heritage Zones as they are known in India.

Conservation is often seen in India as the antithesis of development and the fallacy of this is explored in certain issues of Architecture + Design (Nov. - Dec. 1989 and May - June 1994), devoted to conservation practices in India. This is because conservation is not just about the technical protection of any single building; but also involves an awareness of people's activities, their links to tradition, customs and beliefs, which are already under severe pressure to change in the hope of new economic gains.

Jane Jacob's *The Death and Life of Great American Cities* (1985) was influential in promoting the concept that urbanity was a central component of a civilised society and was under threat from a variety of quarters, including insensitive planning. These sought to make the city *neater* by sweeping away old buildings and putting neo-brutalist industrialised concrete bunkers in their place, all in the name of the most elusive of concepts - modernity or in the context of this thesis - *development*. Her book was also influential in promoting the idea of renovation and restoration rather than wholesale redevelopment. She criticised life in the city for various reasons, arguing that the rise in inner-city violence and poverty had its cause in the demolition of traditional neighbourhoods and their replacement by isolated housing estates even when they were placed in favourable green and wide-open spaces.

Urban growth, as seen in many countries in the West, has been a late starter in many developing countries. However, some would argue that, far from being a handicap, the late start in urbanisation may indeed have spared the community some of the undesirable consequences which appeared in conjunction with early industrialisation of certain American cities.

The author has examined the issues raised regarding urban deterioration and disintegration and the degeneration of the historic environment in India and important initiatives in regeneration since the 1980's. This follows on from the argument of Menon (1989) who identifies efforts at sustainable living in India, even when these are on a very small scale and are often lost in a sea of economic development and accompanying urbanisation. So it is important to define and review this development in an economic and social context, for India is a vast country with about 915 million population spread over an area of 3,165,596 square kilometres (Britannica Book of the Year 1995 : 628).

Development today in India had been limited by its large population and its inability to cope with its growing demands. But since Independence, only 50 years ago, the country is addressing this problem and recent changes in the country's economic and fiscal policies show that the development curve is steadily rising (The Hindu, 1994). There is a growing perception (Agnew, Mercer and Sopher, 1984; UNESCO, 1981, 1983, 1985, 1992, 1994; Feilden, 1989, 1990; Hewison, 1987) around the world that development also needs to pay attention to the country's well established cultural and traditional practices and that such cultural inheritance as these have to be preserved, so that development would not necessarily mean growth that is dependent on market economies (Trainer 1989). For this to happen, the regeneration of cities and settlements has to reflect the associated cultural values and at the same time control the rate of change (or destruction).

Numerous planning and conservation studies have already been drawn up for

towns and cities in India, which are suitable for recognition as Conservation Areas, or Heritage Zones as they are known in India; and these aim to conserve and regenerate such areas¹ (Architecture + Design, May-June 1994 and Architecture + Design, Nov.-Dec. 1989), but few have so far been implemented. The obstacles are many and professional response is sadly minimal; perhaps the vision of cultural assets and heritage contributing to regeneration itself appears too innovative and complex to be undertaken. Also there are few willing to go through the complicated and apparently endless steps in the corridors of power to ensure results. Finally the numerous changes made at ministerial level, the current political situation and the ubiquitous bureaucracy all contribute to the cooling off of any initial enthusiasm after the project report has been commissioned and presented. Perhaps the emphasis needs to be on solutions rather than problems; about long-term investment planning rather than short-term politically oriented motives restrained by penny-pinching attitudes.

India has a very old civilisation and the rich variety of social ways of life entwined with the past are still very much our living tradition. In the Indian context, development, urbanisation and urban regeneration need to be related to this 'living tradition' (Menon, 1989)² to ensure better sustainable development and the maintenance of our national identity in the 21st century. This concept may seem to clash with the more scientific attention to detail and technological approach of the West, but India still has a diverse and largely traditional society, and the alternative of conservation or the extinction of this tradition, is a vitally significant issue to be faced when planning the nature and scope of development. Unless this archetypal Indian society is to be lost, emphasis has to be on the continuity of tradition. At the same time development and modernisation must go further than merely drawing attention to the sanctity of the past and improve the quality of life for the community.

¹Golconda, Cochin, Mehrauli Walks Delhi, Princes Ghats Calcutta and East Coast Road Pondicherry.

²described by Menon as that which is passed down the generations through word of mouth, and is embodied in the way of life.

Through overcrowding many historic cities in the developing world are facing decline and deterioration, especially in the wake of so many economic changes and new pressures. The research is based on the contention that in recently urbanising countries, cultural heritage occupies an important position. This should not be undermined in the name of development.

This thesis represents an attempt to show the connection between progress and development on the one hand, and on the other, conservation of what is already there and valued by society - i.e., the cultural built heritage with all its associated traditions, customs and folklore. This study thus has a central purpose: to address the issues and provide an insight into some of the problems of conservation and development. In this way a balance can be restored between urbanisation with its economically driven development and the social and cultural contexts. The intention here is to provide a stimulus for *development through conservation*. In turn this nexus between development and conservation is calibrated against the needs of the society. Just as development is identified with progress, conservation also needs to accommodate change, not just by freezing buildings in time or creating open air museums. Far from being a re-enactment of a dead past, culture is an essential element of the ongoing life of a city.

Madras, the cultural, political and financial capital of Tamil Nadu (until four decades ago, more than half of peninsular India) is strategically positioned to face the expanding Pacific markets. It is also a centre of rising international significance through which important routes are plied by air and sea. Its economic, financial, industrial and service base has been growing in strength for some decades and the city is now set for further development, with the initiative of different segments of society, and can further increase its international significance and role as we move from this millennium to the next.

CHAPTER 1

RESEARCH DESIGN AND

METHODOLOGY

Extending our minds and seeking to achieve order, form, purpose and value in man-made artifacts

*"Progress has come to be identified
with improvement in quantitative indicators;
these concern mainly economic processes,
seldom social,
hardly ever cultural".
(De Kadt, 1990)*

1.1 Background

Development, growth and change within the city is in response to the existing network of practices and ideas that are drawn from the shared experiences and histories of social groups. Further these can be invoked to account for specific patterns of urban growth and form within particular cultural contexts. (Agnew, Mercer and Sopher, 1984).

We all have strong views about our cities. De Kadt is concerned about the lack of importance attached to cultural beliefs in the development process. Agnew, Mercer and Sopher also emphasise the need for culture to influence the city building process. This train of thought has further been reflected in the works of Amos Rapoport and much earlier in the works of Patrick Geddes on India. Geddes in particular stressed the importance of "conservative surgery" within the planning process so that the traditional culture is not lost but can itself be developed. However the conservation approach has too often been primarily

based on sentimental and aesthetic considerations; and conservation of living traditions, local distinctiveness and historic urban areas and buildings is a relatively new issue in India. Public interest and involvement have however been gaining momentum all over the world in recent years.

Since Independence, the Indian government gradually adopted a planning policy which combined some of the features of planning and of free enterprise. Aspects of planning involving land-use and the provision of infrastructure have involved Indian development policy in the task of coping with the pressures of urbanisation. The first Master Plan for Madras (see Section 4.3) after Independence was published in 1977. It emphasises zoning, specified land-use and particular projects like slum rehabilitation, mass rapid transit system and cleaning of waterways. Interestingly, all these are envisaged as centrally controlled and funded. This may suggest that with deregulation, we are likely to see the pace of city building expanding greatly over the next 20 years.

There have been numerous studies, books and reports on the following: development, urban planning, economic regeneration, conservation of buildings and artifacts, the ethics and methods of conservation. All of them have stressed the tasks facing planners who have to promote and achieve well-structured, locally responsive and economically viable schemes. Sadly, many attempts more often than not result in the destruction of the local community or over-gentrification. In some cases this arises from a lack of understanding between developers and conservationists but mostly from a complete ignorance on the part of politicians and developers alike concerning the role and nature of conservation. There is, in short, an imbalance between urban development and social planning.

Since the 1990's, the new liberalisation policies followed by the Indian Government in order to encourage free trade and investment by multi-national companies and build up and free the country from its previous economic

shackles, has stirred the hornet's nest of commercialisation. This process has resulted in cities that are predicated more to the needs of the motorist and the global market than those of the pedestrian and the indigenous entrepreneur, private rather than public transport (Sherlock, 1991). If we do not want this we must look to ways of encouraging those schemes culturally responsive to the participation and needs of the local community.

The gap between the development and urbanisation process and utilising the existing cultural resources is already apparent and needs to be bridged. Addressing and linking the two presently divergent approaches could be a response to the concerns of, for example Rapoport, De Kadt and Messrs Agnew, Mercer and Sopher. Now that there is a greater importance being attached to including the life styles of the people concerned and enabling them to contribute to the identity of their area, it is all the more vital that we address development *and* community regeneration together. By conserving and utilising the existing cultural resources we hope to show that it is possible to move towards the more needed goals of sustainable development *through* conservation. This research therefore examines the claims of both development *and* conservation side by side, and aims to determine the extent of their joint impact on the changing face of any city; this undertaking is imperative for Madras where rapid industrialisation is taking precedence over all other considerations.

Madras, from where the age of the British Empire dawned in India, is *worth taking care of*, its rich cultural heritage combined with the new economic opportunities afforded by the Indian Government, perhaps can, for the first time for hundreds of years, give ordinary Indians a say in their quality of life. As in much of the rest of India development and planning policies in Madras have so far tended to be related only to the physical aspects; the socio-cultural input has only recently seeped into the consciousness of the authorities. In 1992 a pilot study carried out by the Indian National Trust for Arts and Cultural Heritage (INTACH) declared Mylapore-Santhome, an area in Madras with a rich

composition of religious, historic and cultural structures to be a Heritage Zone, but legislation for the conservation of buildings and areas therein is yet to be incorporated within the Development Control Rules (DCR).

The variety of life styles within this Heritage Zone and the emphasis on culture and tradition of the people living here is reflected in their daily life (see Chapter 5). But rapid urbanisation and more commercialisation are now changing, even destroying this scene, and so far only marginal attempts have been made to strike a happy balance between cultural sustainability and urban and commercial change. This area in Madras is to be studied to test the idea of *development through conservation*.

It is equally important that *development through conservation* is reflected in the planning and development policies for the whole city. Madras must build up its strengths and use the benefits of its geographical position, improve its infrastructure, and respond to the demands of being part of the global network. At the same time it needs to retain its unique character and cultural identity. To illustrate how both can be achieved concurrently, we draw on examples of the recent city regeneration policies adopted by three English cities: York, Manchester and London.

Rudyard Kipling, the poet of the British Empire, described Madras as "crowned above queens, a withered bedlam now". Madras has been called the old maiden of the three great cities founded by the British in India, the other two being Bombay and Calcutta. The other principal city is Delhi which is now the administrative and political capital. Bombay has become the unchallenged centre of commerce and Calcutta is overburdened by its population, congestion and derelict infrastructure; but Madras, orthodox and traditional in its outlook, has yet to build on its economic prowess and physical potential. To compete in the international market and be recognised as an international city, Madras has to find ways to sustain its cultural diversity alongside its efforts to meet the

demands of urbanisation and development.

1.2 Problem / Opportunity Statement

Development is not the problem of conservation but its opportunity.

(Lichfield, 1988 : 69.)

This study aims to show that conservation can serve as a tool for development (see, for example, Lichfield, 1988: 69). It seeks to emphasize the need to find methods which ensure a strong socio-economic basis that makes use of the living traditions of India (viz. its skills, materials and entrepreneurship). In this way authenticity of tradition and culture are carried on down the ages and become an appropriate means of providing sustainable development. Thus Menon (1989) has observed that:

Conservation needs to be development oriented and development ecologically appropriate, so as to reduce dependence on materials, skills and technology that may be external to the area and stimulate local benefits.

As we approach the 21st century, India and its cities are faced with the vital question of identifying the direction for growth and need to confront the problem of balancing the claims of both development and conservation. So far most of the conservation studies have focused on the historical importance of the place, rather than on the economic potential of the historical associations. While development studies have focused on the economic demands of urbanisation, they have largely overlooked the traditional socio-cultural setting. The problem has been that neither approach has utilised the other for its mutual benefit.

Now the opportunity must be grasped to bring them together so that future planning uses the potential from both conservation and development. To facilitate the achievement of this goal, this thesis provides an insight into the theoretical and pragmatic arguments for a unified approach.

The aim of this thesis may alternatively be expressed as seeking to answer two questions:

How is it possible to plan and manage the inevitable process of change so as to incorporate the notions of cultural sustainability, allowing development to take place through conservation of its built heritage?

Since development through conservation is linked to the social structure, what are the criteria for assessing the possible strategies for promoting this?

1.3 Scope of the Study

The scope of this study is by looking at various examples of development, conservation and city regeneration schemes such as those provided by York, Manchester and London (see Chapter 3) to show that despite an underlying universality there is no uniform style that can be applied to meet the requirements of individual situations. However, in different ways, each of these cities have largely balanced commercialisation with heritage consciousness towards furthering economic activity by schemes which generate income locally.

The recent changes in the economic policies in India and the throwing open of its doors to multi-nationals and foreign and private investment have set in train a rapid swing towards development; and Madras has to be cautioned against being overwhelmed by these changes at the expense of its traditional culture. The lessons learnt from the three cities in England are useful in defining the scope for sustainable development in Madras City. They fall into two broad areas: (1) Madras city itself as a whole with its national and international importance and (2) in particular the Heritage Zone of Mylapore and Santhome within Madras city, where the feasibility of the principles already enunciated, can be tested.

The approach to the potential and problems in the City and Heritage Zone is determined by the author's professional capacity as an architect and a resident

of the city, along with a deep concern for the continuation of its cultural ethos. This wider understanding of the needs of the area provides a motivation for promoting this approach of development through conservation as the most suitable for the locality researched.

1.3.1 Madras in the national context

Madras has important strengths in the diversity of its economy, transport and communication links, size and status of its institutions of learning, industry, sports and culture, historical and religious monuments, and in the quality of life of its residents (see Chapter 4 and Appendix II), which justifies its recognition as one of the four major cities in India.

Madras city is the State capital for Tamilnadu and is divided into 150 divisions (each being represented by a Councillor), with a total area of 172 sq.km. and an estimated population of 5.3 million in 1990. The Madras Metropolitan Development Authority (MMDA) has overall statutory powers for planning and development, but associated bodies such as the following have specific powers, priorities and responsibilities:

- Tamil Nadu Slum Clearance Board (TNSCB),
set up in 1971 with primary responsibility for rehabilitation of slum dwellers;
- Madras Metropolitan Water Supply and Sewerage Board (MMWSSB), set up in 1978;
- Madras Corporation,
since 1990 in charge of garbage clearance, storm water drains, public health and certain areas of street lighting, roads and regulating the construction of buildings up to the first floor;
- Department of Highways,
which looks after all the roads including the three main

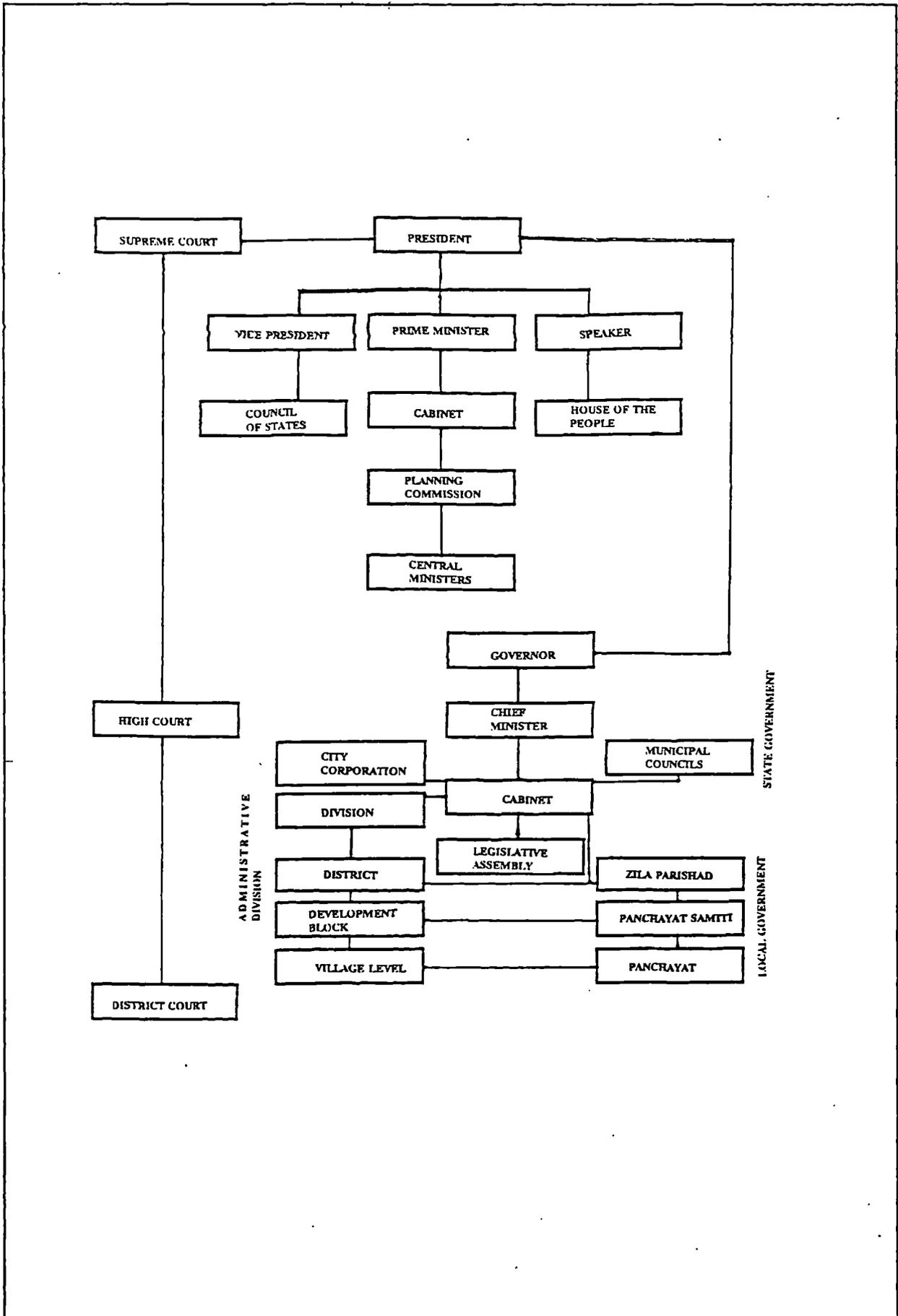


Figure 2 Indian Administrative and Judicial Power Structure (terms used for local governments vary in the States)

arteries of Madras that form part of the National Highways network.

The concept of local self-government in Madras, was first envisaged in an Act of Parliament passed in 1792 by which municipal functions and powers were entrusted to a body. A system of wards was introduced in 1867. The first piece of municipal legislation providing for a system of elected councillors came with the Madras City Municipal Corporation Act in 1919. This also consolidated the de-centralised municipal powers in matters of taxes, drainage, public health, conservancy and others under the one authority. The Madras Metropolitan Area was statutorily recognised in 1974 with authority to oversee the planned development of its 1170 sq.km., covered by the Madras Corporation, 4 municipalities, 5 townships, 27 town panchayats and 230 villages in 10 Panchayat unions, with a total population of 5.3 million in 1990. The MMDA formally took over the planning the development control functions in 1977-78 and prepared the first Master Plan for Madras City (Menezes, 1991 : IV.A.3). He further elaborates on the problem of financial resources for maintenance of services and for development faced by the city over a period of twenty years from 1971-1991. This study indicates that the accelerated demands for essential urban services and the sluggish revenues of urban local bodies and show the urgent need to strengthen the financial resources of local bodies both quantitatively and qualitatively. At present the main sources of income to the local bodies are property tax, profession tax, entertainment tax and surcharge on sales tax in addition to other miscellaneous taxes and government grants.

The chart opposite illustrates the judicial, administrative and policy-making mechanism in the inter-relations of local authorities represented in the Local and State Governments and the Central Government. The State Governments are the main decision makers especially in terms of State budgeting, State taxation, financial allocations and local area development plans, with the addition of its share from the Finance Commission (a Central Government statutory body).

This brief introduction showing Madras in its national context is the scope within which this research has been carried out and it is further elaborated in Chapter 4 and Appendix II. The next section is an introduction to Mylapore and Santhome, a Heritage Zone within the city and the case study area. It is a unique area within the city and within the planning area of the MMDA; and in view of its historical and cultural character it deserves special consideration.

1.3.2 The Heritage Zone of Mylapore and Santhome

The contiguous areas of Mylapore and Santhome are both historically important and culturally significant. The foci of these areas today are a seventeenth century temple and a basilica, possibly succeeding other structures on those sites since the first century AD. The area is also rich in traditional vernacular housing and colonial bungalows. But the values associated with tradition, culture and social structure in these areas are now under threat of destruction and the neighbourhoods are gradually losing their traditional identity.

In both areas the pressures of urbanisation along with inadequate infrastructure are causing an economic blight. Excessive commercialisation leading to changed land values combined with a demand the increasing demand for housing in existing over-crowded residential areas, have been some of the reasons for the deterioration of the physical fabric. The continuation of this trend could destroy the remaining cultural assets and heritage and it must be halted. It is within the scope of this research to show how this might be done in the important area of built heritage where there is already controversy between development and conservation. Focusing on the present urban growth, built heritage, areas, buildings and streets worthy of conservation will show their impact on the economy, environment and host communities and highlight the need for development to take place through conservation.

Having outlined the scope of the study as within the city of Madras and in

particular with the Heritage Zone, the next section draws out the research objectives.

1.4 Research Objectives

The basic hypothesis of this research is two-fold:

- (a) that conservation can be used as a tool for development, and
- (b) that successful development sustains local economy and social and cultural built heritage through their conservation.

In the process, the city will raise community consciousness and standards that can then unlock the potential for sustainable regeneration and thus attract international businesses and visitors.

At this point, the aims and objectives of the research are defined as follows:

1. *to formulate* a hypothesis for *development through conservation*;
2. *to investigate* the criteria set for development, conservation and urban regeneration in selected English cities;
3. *to make a case* for *development through conservation* for the city of Madras on the one hand, and the Heritage Zone of Mylapore and Santhome on the other, by outlining their potential and assets in the light of a knowledge of the three English cities;
4. *to outline* the lessons learnt and to *apply* them to the opportunities and constraints identified in both the larger city of Madras and the specific Heritage Zone (see 1.5.2 point 2) in order to *test* the practical possibilities of utilising conservation as a tool for development.

Each of the above will be carried out bearing in mind questions that always direct thoughts on *development through conservation* towards addressing the needs of the local community and the relationship of the city to the Heritage Zone and *vice versa*. Another important consideration in achieving the above goals and objectives arises out of the need to link socio-economic imperatives, legislation

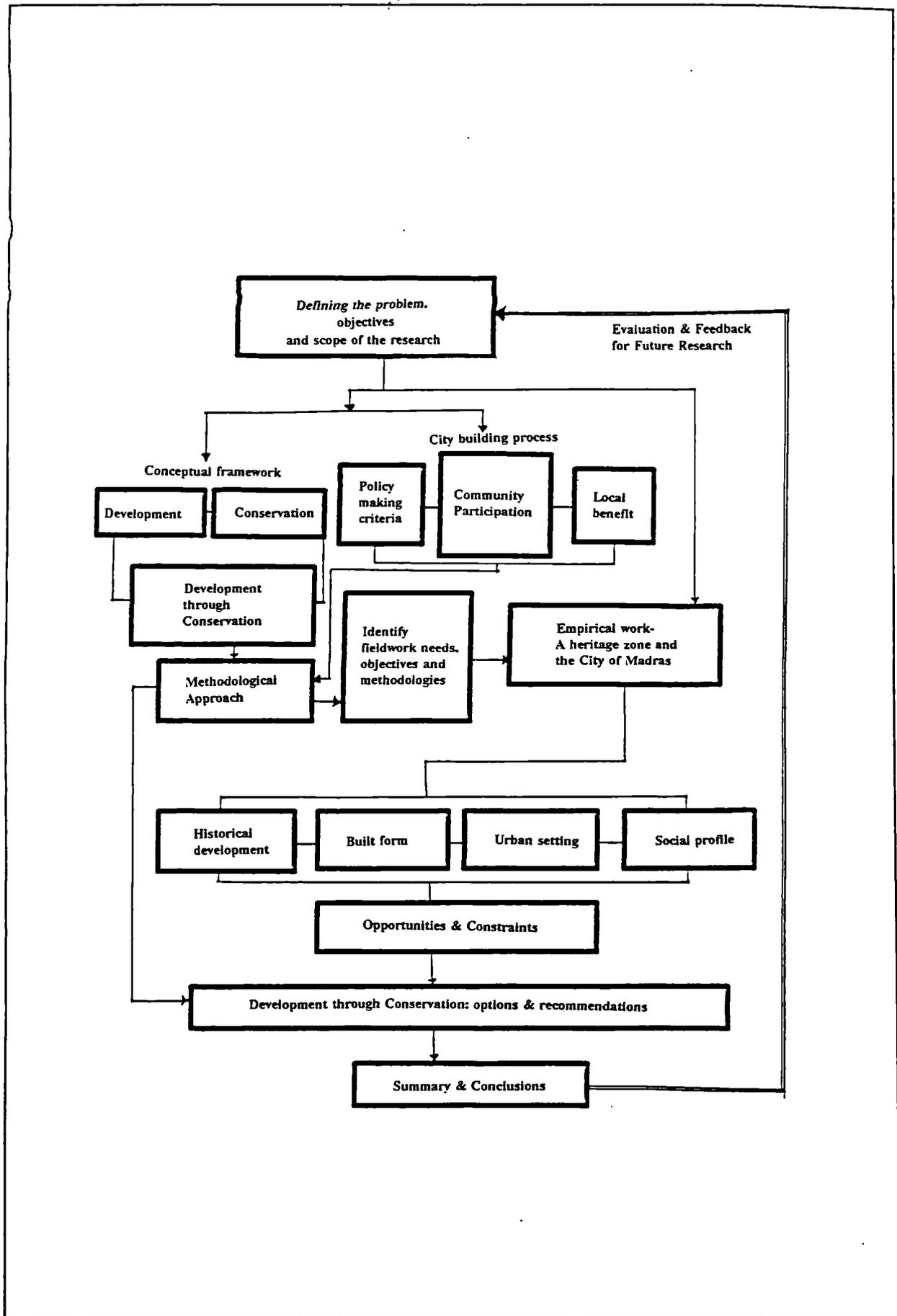


Figure 3 The Research Methodology

and financial requirements.

1.5 Research Methodology

Having identified the scope and objectives of the research, the programme of work formulated is as follows:

1. *to identify* the nature of the inherent and subsequent problems;
2. *to develop* a theoretical and practical understanding of the major issues using both literature and experience in India and England;
3. *to make a case* for proposals in the Case Study Area and validating them against tested experiences.

This programme has been carried out from two aspects:

First, theoretical as well as practical approaches were reviewed through a study of the relevant literature in order to identify the definitions, aims and options in respect of the following topics:

- culture, history, heritage and identity; their nature and importance;
- sustainability, development and conservation; the theoretical arguments and practical approaches to the debate between them;
- current planning and development policies, administrative and political constraints, conservation practice and understanding in India; and their impact on the overall development process;
- costs and benefits; identification of the key elements and participants in the city building process and thereby the influences of local government, visitors, residents and market forces on the cultural and social fabric;
- legislation; role of legislative and administrative frameworks in helping to achieve recognition for a city in the international arena and yet maintain a balance between development policies and cultural ideals reflecting and benefiting the local community.

On the basis of the study outlined above, I have drawn conclusions that would lead to evaluation of different policies concerning *development through conservation* within both the Heritage Zone and the city of Madras.

Second, the empirical side of the research - represented by both documentary and field surveys - was conducted with a view to assessing the present condition of the study area. Field work, primary and secondary data, form the main sources of information. A detailed breakdown of this part of the methodology is as follows:

1.5.1 Data collection and sources of input

The present conflicts between development and conservation have been highlighted by three inter-related factors:

1. the Indian governments policy welcoming multi-national penetration of the economy;
2. the growing world-wide concern '*to achieve a comprehensive programme of action towards a sustainable pattern of development*³'; and
3. the need to preserve the cultural heritage of the city and its traditions and local distinctiveness.

Much of the data relating to the recent thinking on these topics has been collected from city challenge schemes in England, and from both the Indian and foreign press. This included a literature survey and numerous formal and informal discussions with professionals and academicians in the field. From this came identification of definitions, aims and options and a review of changes in philosophy and practice. Much of this data is in Chapter 2.

³Rio Earth Summit and the Berlin Conference - United Nations Conventions on Climate Change at Berlin, March - April 1995.

While studying architecture at the University of Madras and later teaching and working on a variety of research and consultancy projects related to conservation and development issues in India, the author has been only too fully aware of the problems faced by practising architects and planners. Later experiences during the M.A. course in Building Conservation Studies in York of being exposed to conservation practices in the West have increased an appreciation and concern in relating the conservation issues to development practices. Thus the purpose of the study is to highlight the need to strike a healthy balance between conservation and development by ensuring that economic growth does not undermine cultural values.

Much of the information relating to current planning and development policies is very recent:

- administrative and political limitations are part of a survey for the Madras Metropolitan Development Authority for Madras 2011, (1991);
- conservation practice and its interpretation in India come from seminars and workshops, INTACH publications and journals such as Architecture + Design and Indian Architect and Builder, featuring conservation issues particular to India;
- the impact of overall development on the industry is found in the Survey of the Indian Industry 1994;

Data relating to India alongside the author's own experience, was additionally researched from the following sources:

- experience of working with projects and case studies involving urban design, conservation, housing (including low-cost housing and public housing) and environment studies. One of these was entitled Science City and was a survey of an area in South Madras, detailing its economic, educational, industrial and environmental potential between 1991 - 92. Another concerned fishermen's housing in 1988 - 89;
- the author's study of Indian planning and development policies, judicial and administrative processes, conservation legislation and reviews and

- comments on them by Indian and foreign academicians and practitioners.
- the author's experiences of over two decades of field work in Madras and neighbouring towns, both as a student of architecture and as lecturer; and more recently visits to Madras and the Heritage Zone within it specifically for this research;
 - attending seminars and organising conferences and workshops, presenting papers, interacting with academics, practitioners, students and lay persons on their work both in the developing and the developed world, thus gaining an understanding of the processes of city building and the practical constraints to which they are subject.

1.5.2 Specific data collection from York, Manchester and London

These three established cities are all of historic, economic and cultural importance and were seen to offer valuable experience which could be of use in Madras. The author has been living in York since 1992 and therefore many of the experiences, observations and contacts have been of a day-to-day nature. York, a medieval city, now so well preserved, conserved and visited, motivated the author to study its experiences of development and conservation. The other two cities, Manchester and London, were visited a number of times for visual surveys, meetings with professionals in the field, participating in workshops and seminars⁴. Manchester, a great commercial centre, has been rebuilding itself for the last 30 years. Even though its attempts in 1992 to attract the Olympic games has not been successful, it has nevertheless enabled the city to project itself on the international scene. London, for its part, has made constant attempts to recover and build further upon its past achievements as a great cultural centre and also as a formidable citadel of world finance.

⁴ 1. Cities '94, Workshop on Management Strategies for Cities, 10-11 May 1994, Canary Wharf, London.

2. "Urban Development Pattern as a Contextual Link to Sustainable Development Potential", at the International Association for People-environment Studies (IAPS) 13, held in Manchester 13-15 July 1994.

3. City Pride Seminar, 21-22 July 1994, Manchester.

The York study was based on:

- an extensive literature survey of the history and of the more recent economic developments and conservation practices;
- discussions with past and present City Council councillors, planning and conservation officers, the economic development unit and other conservation bodies in the city;
- numerous formal and informal discussions with professionals.

The Manchester study included:

- a comprehensive research, visual and literature survey in regenerated areas like Hulme, where such programmes are transforming the prospects of some of the most disadvantaged and deprived communities; Salford Quays, a major area of industrial dereliction redeveloped to create new homes and new industrial and commercial space; and Castlefield where improvements include construction of major new sporting and cultural facilities;
- attendance and participation in the "City Pride" seminars and follow-up workshops in focusing on and detailing a new vision for the city.

The London study was based on:

- a literature survey on London, strategic planning for London and including recent books, reports and studies done by London Planning Advisory Committee (LPAC) and others;
- discussions with Robin Clement, leader and LPAC deputy Chief Planner and others in LPAC;
- several visits to the city, including areas like Covent Garden, Westminster, Camden, Spitalfields and London Docklands Development;
- attending "Cities '94" followed by discussions at the exhibition of city challenge schemes and projects with planners and conservation officers from other parts of the country.

1.5.3 Madras and the case study area of Mylapore and Santhome

The collection of quantitative data for both the city of Madras and the Heritage Zone was from the following sources:

1. Most of the information on urban form and structure and the cultural built heritage are my own observations before and during field work on two recent visits. Information relating to public opinion, interests and understanding the people's needs, particularly in the Heritage Zone of Mylapore and Santhome, was gained by both formal study and as a result of conversations with the local residents and planning authorities.
2. Further material on the Heritage Zone was collected when the author was involved in the coordination of a survey initiated by INTACH as part of its efforts to get the area of Mylapore and Santhome designated as a Heritage Zone. This was carried out by M.Arch students in Conservation (Anna University 1991 -92) under the author's supervision, giving her a personal detailed knowledge of the area. In 1994 the area of Mylapore and Santhome had been declared a Heritage Zone. This declaration is still only on paper and amendments to the Development Control Rules are yet to be for Heritage Zones such as Mylapore and Santhome.
3. Field work involved building on the information previously collected and relating it to this thesis. The INTACH survey focused only on the physical aspects of the area in terms of buildings worthy of conservation, conforming and non-conforming activities within the area and others. Further field work for this thesis enabled the author to highlight the conservation potential of the Heritage Zone with respect to its development possibilities, both locally and as a part of the city of Madras.
4. The historical background to the study and the earliest records of Madras such as the Pitt map of 1710, the later map of Wheeler, and other articles on early Madras were researched by the author from the archives of various organisations in the city, the Connemara Library and the Fort Museum. Additional historical and conservation orientated information

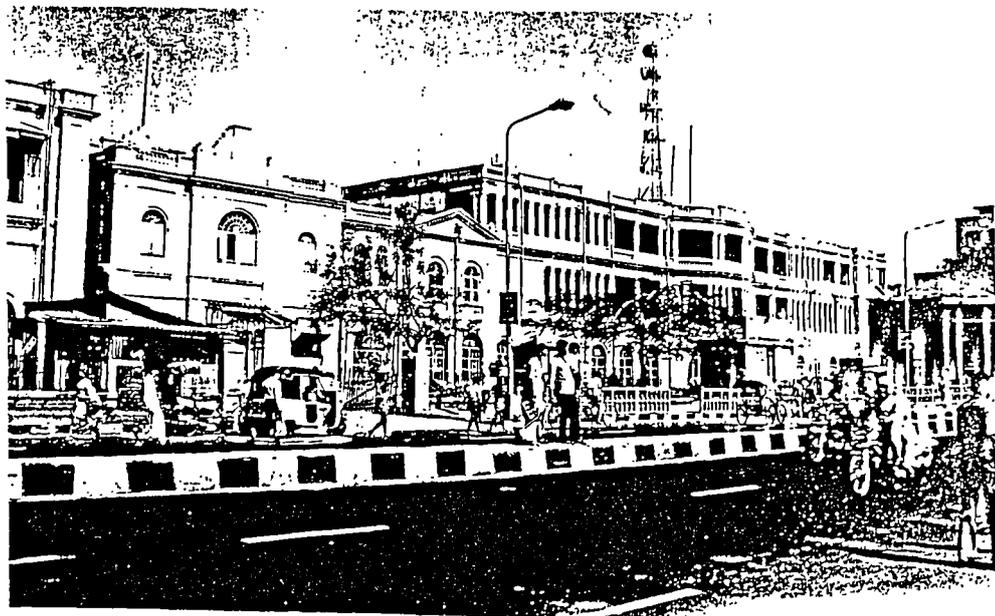


Figure 4 The Bentinck Building

and data came from the author's own experiences of a struggle to prevent the demolition of a historical structure, the Bentinck Building, which was eventually demolished in 1993. This was built in regency classical style (photograph opposite) in 1809 and was the seat of the first Supreme Court in India and later the Madras High Court before the latter was shifted to its present location. The historic importance of this building was documented in a video - "Madras - Architectural Legacies" - produced by the author for a University Grants Commission programme televised on the Indian national network in 1992

5. The documents of the Madras Corporation, the master plan for Madras in 1977 and the subsequent developments have provided a framework to enhance my understanding of urban change and growth in the city since Independence in 1947. More recently the study on Madras 2011 for the MMDA in 1990 included a comprehensive survey of the physical environment, demographic characteristics and data, economic and industrial potential and financial dealings. For the purposes of this dissertation, it was a valuable starting point towards establishing and understanding the planning and development scenario for Madras.

Finally, based on all this data, theoretical arguments for *development through conservation* which may be applicable universally were formulated. These were shown to provide a new strategy for sustainable development and this thesis is a pioneering attempt to bring these two concepts into a working relationship for the development of any area of historic and cultural significance. Conclusions and recommendations appropriate to the study area were then drawn up. The structure of the research presented in this thesis is next detailed.

1.6 Structure of the Research

Chapter 2 examines the theoretical background of development and conservation; their goals, values and objectives, trends and role in the built

environment. Thus the study draws attention to the need for a comprehensive view of development and conservation, where the objectives of both activities may be reconciled and complement one another.

Chapter 3 sets out to provide a picture of some major issues which could contribute and be involved in the process of conservation, development and urban regeneration. It will outline the current UK government policy for inner city regeneration and will then study the three cities of York, Manchester and London so as to identify the key participants and elements in the city building process. It highlights how cultural and built heritage, conservation and development policies, planning laws, practices and attitudes in these cities have individually or together influenced the effective balance between development and conservation.

York is a striking example of effective conservation which has given rise to economic resurgence. In Manchester the regeneration measures have helped in establishing it globally and have given it a new lease of life. Finally London, an established world city, has focused on aspects of enhancing the quality of life, community participation along with private sector involvement and opportunity development; and all these have given the city an impetus to build on its strengths and maintain its world status.

Chapters 4 and 5 present the study area. They will portray *first*, the city of Madras: its development through different historical periods, its physical setting, built environment and a sociological profile. The chapter will highlight its rich cultural built heritage and the more recent social, political and economic changes so as to identify the opportunities for and the constraints against *development through conservation*. This is imperative as unchecked development and the modernisation process will surely cause the city to lose the very qualities that have made it unique.

The chapter then sets out to provide a picture of the current development scenario and the conservation practice and understanding in India and the state of Tamilnadu of which Madras is the capital. The development scene will include an interpretation of reforms, policies and implementation in Tamilnadu with particular reference to Madras, its urbanisation trends and changing character of development. Study of conservation includes a review of the philosophy and practice while evaluating and identifying problems and potential with respect to the reality of conservation and the nature of heritage.

Secondly, the study of the Heritage Zone - Mylapore and Santhome - will provide a detailed survey of the area. It will outline the importance and uniqueness of the area by providing a general understanding of its social profile, urban structure, economy, historic buildings, architectural character, built form and its visual qualities. This study on a micro scale will be the key factor in applying the theoretical framework for *development through conservation*.

Chapter 6 will draw out lessons learnt from the British experiences and outline a pattern of potential development for the ongoing changes in the Heritage Zone. It will identify the various constraints and conclude with areas of application and recommendations for any priority actions that need to be undertaken by both policy makers and commercial developers.

Chapter 7 concludes with the research outcomes and reasons that the city building process or urban regeneration, of which *development through conservation* is an essential part, could not only ensure cultural sustainability but also contribute to the role of support structures, opportunity development and enabling frameworks within any city. Further these could become tools for collaborative development in enabling notions of working partnerships and in instilling pride for their city into the residents. Topics for future research will also be suggested.

Appendices provide further information on:

1. major dates and events in the Indian conservation history,
2. historical background, heritage, present potential and assets of Madras,
3. list of festivals attracting tourists within the Heritage Zone,
4. study of devotees coming to Kapaleeshwar Temple,
5. questionnaire used in collection of data.

PART I CONTEXT

Chapter 2 BUILDING A HYPOTHESIS

Chapter 3 CITY REGENERATION: York, Manchester and London

CHAPTER 2

BUILDING A HYPOTHESIS

Development and historic fabric - the syntax for pattern language

*Increasingly technology is being seen negatively rather than positively.
In some ways it is seen as being in conflict with how things should be,
with how one should live, with our very humanity.*
(Rapoport, 1994 : 329)

2.1 Introduction

This chapter forms the basis for the argument towards *development through conservation*. The chapter will look *first*, at conservation and *then* development so as to identify their respective concerns and values. The salient emphasis here being to ensure the inherited, irreplaceable resources not only provide a stabilising factor in a fast changing world but also contribute to contemporary needs. *Finally*, a synthesis of the two is shown to be the most effective way for future development within any city building process. The theoretical justification for *Development through conservation* is to be applicable universally, though in this thesis it is viewed with respect to the Indian situation. Hence this chapter also looks beyond the Indian context.

Rapoport, in the quote "*increasingly technology... ...humanity* attributes the negative influence of technology to a major shift in values, where technology

though a human artefact becomes an important factor in the evolution of human race. For Borchert and Steward (1979) the argument about human values,

...is either seen as an unqualified good, another stage in humanity's mastery of nature, leading to an age of leisure and plenty, or as an unqualified evil.

The advance of technology is not always an unmixed blessing. It is often accompanied by consequences that may be negative such as depriving the population of some of the social advantages that they might have taken for granted before modernisation was introduced. If development is considered to be destroying or altering human values - cultural, social and historical - conservation is seen by many as an obstacle to modernisation and therefore development. At present both development and conservation are blinkered to their own goal. But together they could achieve a greater good and there needs to be a reconciling approach through the skilful sorting out of goals, values and procedures.

In this respect it can be said that the life and work of Patrick Geddes prefigure the age in which we now live. The projects he put forward but could never execute, precisely because he was so far in advance of the surrounding army of administrators, technicians and architects, are now at least in part, on the way to realisation. Geddes's advocacy of civic surgery as indispensable to planning - diagnosis before treatment - and his application of his sociological insight and his biological knowledge of the region, stress the importance of historical perspectives to the planning process. Until Geddes applied his insight, regionalism was an archaic and backward looking movement, following the pattern of nationalism, and paying more attention to a static and isolationist conception of the local community than to a dynamic one which placed the region in the midst of the currents of modern civilisation. Geddes respected the old roots of regional culture and rather than limiting its expression to some historic movements of the past; and his theory was that if the roots were alive, they would keep on putting forth new shoots, and it was in the new shoots that

he was interested. He was able to link the technical and economic developments of regionalism with its historic and social manifestations and never fell into the isolationist error of regarding a local culture as in any sense complete, final or self-sustaining (Tyrwhitt, 1947).

This chapter will therefore look at the concerns of both conservation and development within the built environment, and how both together can encourage sustainable development.

2.2 Concerns of Conservation

Conservation has been variously defined by many authors, scholars and conservation professionals. For example:

Conservation is the action taken to prevent decay. It embraces all acts that prolong the life of our cultural and natural heritage, the object being to present to those who use and look at historic buildings with wonder, the artistic and human messages that such buildings possess. ...Conservation must preserve and, if possible enhance the messages and values of cultural property (Feilden, 1989 : 3-4).

The definitions in articles 1-13 in the International Charter for the Conservation and Restoration of Monuments and Sites (ICOMOS, 1990 :14-15) also detail conservation, the first two read as:

The concept of a historic monument embraces not only the single architectural work but also the urban or rural setting in which is found the evidence of a particular civilisation, a significant development or a historic event. This applies not only to great works of art but also to more modest works of the past which have acquired cultural significance with the passing of time.

The conservation and restoration of monuments must have recourse to all the sciences and techniques which can contribute to the study and safeguarding of the architectural heritage.

In Esher 1968 : 73, conservation is defined as

... the careful management of a limited or vulnerable resource so as to ensure efficiency of use, while at the same time taking such steps

as are necessary to ensure continuity of supply.

Thus conservation could be summed up as any action that has been taken to prevent decay and arrest deterioration. This ranges from dealing with aspects of the built environment, be they historic buildings or areas, to even small artifacts. The main objective of conservation is to prolong the life of the cultural and natural heritage so that future generations may benefit from it. For the best results there needs to be a common platform where principles guiding the process of conservation can be agreed and considered on a global scale, with individual countries being responsible for applying the policies and plans within the framework of their own cultures. The Charter for the Conservation of Historic Towns and Urban Areas, adopted by ICOMOS in October 1987 outlines this approach (ICOMOS, 1990 : 121-122).

The term "Conservation" is very broad and is open to a number of interpretations and philosophical stances. Since early days, conservation has taken different forms. The human desire to leave evidences of their time can be observed in the monuments of the period, be they gigantic temples or inscriptions on rocks; and they have had various connotations; some political and some religious.

According to Jokilehto (1986), current trends of cultural heritage conservation started with the Renaissance of the sixteenth century. Ashworth and Turnbridge (1990) support this when they hold that it was initiated by:

the pre-occupation of a small, but influential, group who were motivated by a sufficiently crusading vision to allow this aspect of planning to be labelled a 'movement', whose driving force was the enthusiasm of amateurs rather than the technical expertise of professionals.

Later in the eighteenth and nineteenth centuries, this movement became a forerunner to the artistic, literary, historical and scientific societies such as the arts and crafts movements in London, Paris and Berlin. Inspiring an interest in

antiquity and authenticity, this led to a formation of a new attitude towards the past, led by pioneers like William Morris and others. The scope of this movement broadened as rapid industrialisation and urbanisation took place, including not only buildings but urban and natural environments with many programmes being related to cities. This is reflected in the works of Abercrombie, Ebenezer Howard, Patrick Geddes, Corbusier and others.

In this context, the Athens Charter of 1931 by defining the basic principles for conservation, paved the way for later charters such as the Venice Charter and Burra Charter. The International Council on Monuments and Sites (ICOMOS) in 1987 has drawn up a Charter for the Conservation of Historic Towns and Urban Areas to complement the Venice Charter. It was in this ICOMOS charter that a Conservation Area was first identified and is described there as *an area of special architectural, historical and cultural interest*. In India such areas are now designated as Heritage Zones.

The idea of conservation is not new to India's old and continuous civilisation. Visible proof of concern for the conservation of natural heritage can be seen in Ashoka's edicts of the third century BC. In the conservation of cultural heritage we have examples from the early Christian era, like that of Rudradaman who ordered the renovation of a historic dam that was falling to ruin; during the sultanate period, Feroz Shah Tuglaq set a high priority on the repair of ancient monuments. But these are only individual examples born out of an individual's penchant or liking. Conservation of historic monuments as a policy matter, was taken up briefly in the nineteenth century under the East India Company and later the British Crown but by and large, until the mid nineteenth century, preservation of monuments was only used as a means of legitimising existing ruling dynasties (Thapar, 1994). After independence in 1947, and with the formation of different states, the State Departments of Archaeology and Museums were responsible for the protection of an increasing number of monuments. Today, just under five thousand monuments are under the Central

Government and over three thousand under State governments; unfortunately, this total of eight thousand is only a very small part of India's abundant unsurpassed cultural heritage and much still needs to be done in identification and conservation.

It has been said by S. Pepper (1971),

...the conservation problems today are not technological ones, but social in nature. Until present times we have acquired some knowledge to restore single objects. A very different situation exists when we try to consider the meaning of art work in a social context, or the preservation of an environment.

So far the conservation *movement* in India⁵ has been directed towards monumental conservation and it has a strong archaeological dimension; it still needs to be more actively concerned with vernacular and socio-economic living styles if it is to be acceptable to the people concerned.

So far the conservation movement in India has not established itself into any adequate organisation, nor has it political power or a track record of significant achievements; this is unlike the strong development forces which are already at work. The Archaeological Survey of India (ASI) does however exist, but is often located only in important cities and does not have the money or the resources for effective overall control. Therefore a considerable number of buildings, areas and maybe even regions are excluded from the control of these central and regional offices. There are also conflicts between various departments and their administrations involved in the development process. The objectives of the offices dealing with architectural heritage and its conservation are restricted and do not have a multi-disciplinary approach. As a result every office and department develops its plans without reference to an overall strategy. Other important factors are the lack of educated, committed professionals to propagate the values of cultural and architectural heritage and the lack of private sector

⁵Major dates and events in Indian Conservation history listed in Appendix I.

involvement in conservation. There is an obvious lack of political will in general and consequently little or no commitment of finance to develop conservation through education and training in addition or for expenses such as for regular repairs and maintenance. Moreover the interests and aspirations of the national and state governments, and those involved in any form of economic development, tourism or even construction are too often in direct conflict with even the ideals of conservation.

So far this fragmentation of concern has resulted in there being no Conservation Act for Tamilnadu; and in turn this limits the effectiveness of any policies that may be enunciated or any conservation schemes that are attempted.

Having sketched the *movement*, it can be noted that conservation today needs to be more outwardly oriented to environment and social behaviour and more than just the technical protection of any one building. It is an attitude and expertise that deals with the activities of the people, their links to heredity, tradition, customs and beliefs that are nowadays under severe pressure to change in the expectation of new life. Since the appreciation of tradition and customs is so engrained it is ironic that conservation is not yet an acceptable process in the progress of human history.

2.2.1 The rationale of conservation

With all the technological advances of today, it is very easy to build a new structure and it is often much cheaper to demolish an existing one and replace it with something new. So, why do we think of conserving at all? Answers to this question have taken various shapes, patterns and directions. One aspect of conservation policies brought out by Dix (1987) is that it provides a stabilising factor in a fast-changing world; and this is a valuable reason for using it as a tool for accessing change and progress within particular time grids and reference points. By using this tool one is able to evaluate the present decline and

deterioration in many historic cities, especially in the developing world. Then their cultural heritage may be seen as an asset in some way contributing to the inevitable process of modernisation and not hindering it. The value of our relationship with the past is therefore an important dimension while considering future course of action.

Maintenance of identity is another important reason for conservation, and this covers individuals, places and cultures. It is Shankland's (1975) contention that conservation claims a high place in the priorities of nations of various political outlook and he argues that attitudes of conservation draw on very psychic sources in national consciousness.

This almost magical power of the past does not lie only in the intrinsic beauty of what is being preserved, survivals of an age when towns were made by artisans, but above all in the identity they confer...

Psychologists lay great stress on the importance of identity to individuals and groups as something they must maintain in the face of social and economic developments that offer physical comfort, security and cheaper products at the price of de-personalisation (Shankland, 1975).

Cultural heritage is one resource that can be used by the current generation (Isaiah, 1994) to loss of identity and it is an irreplaceable investment that cannot be replicated but provides continuity in an otherwise swiftly changing world.

Lichfield (1988) adds his point to the case when he argues that the economic dimension of conservation where development is seen as an opportunity, is also significant; this is not only because it is a justification in many cases for conservation, but also because it may then be seen as a motive.

2.2.2 What to conserve?

Globally we see the 'world heritage' sites and the measures taken to protect,

preserve and conserve them. During the past twenty years attitudes have widened to include the conservation of areas, urban and rural sites, the environment, built heritage, tradition and culture as well as monuments and historic locations. In fact the stress on monumental conservation often negates the equally important, less dramatic structures, historic areas and traditional social customs, habits and life styles that are so important to the maintenance of the cultural fabric. This further adds to the contention that all strategies need to concentrate on appropriate local distinctiveness.

While the attitudes and concepts of heritage and conservation have developed a wider connotation and there are more claims for attention, it is all the more important that it is not age or political whims that should be the deciding factors, but appropriateness to the specific situation which should determine what is to be conserved. However the extent of this type of reasoning may be questioned as one reads Hewison's criticism of conservation movements in Britain (Hewison, 1987) where heritage has become a money-making industry.

In India, among all the basic needs of food, clothing, shelter and infrastructure and the problems compounded by slums, unemployment and other factors, one may wonder if it is even ethical to consider conservation, especially when it has an archaeological dimension. At a national level few developing countries can allocate funds to it and it is not a national priority. It is therefore imperative that it is considered in an economic context in terms of upgrading and re-building communities in the manner most appropriate and financially viable to the situation.

When evaluating possible schemes for conservation there are also other considerations to be taken into account. Feilden (1989) identifies such as "values in conservation" elaborating them as economic, use, historic, age, landscape, artistic, patriotic, symbolic, emotional, aesthetic and other values; and all these need to be weighed up in any consideration for conservation.

India is among the few civilisations in the world which still retains its uninterrupted cultural heritage even until the present time; and it has managed to survive despite the rule of various foreign powers. Today Western thought and philosophy have created a duality in our society: one element wants to retain its tradition and daily rituals and the other wants to leap into the modernism of the 21st century. The effect of these two trends is considered Radhakrishnan (1976), an internationally distinguished scholar in Indian philosophy and the first President of India who observes:

The contact with the spirit of the West has disturbed the placid contentment of the recent times. The assimilation of a different culture has led to the impression that there are no official answers to ultimate problems. It has shaken the faith in the traditional solutions, and has, in some degree, helped to a larger freedom and flexibility of thoughts. Tradition has become fluid again, and while some thinkers are busy rebuilding the house on ancient foundations, others want to remove the foundations altogether. The present age of transition is as full of interest as anxiety.

...an adaptive culture is incompatible with static social structures. We have suffered in the past by our adherence to outmoded forms and habits. Social changes are necessary if we are to build a united and progressive India.

...Modernity consists of preserving whatever is valuable in our ancient heritage and discarding whatever is not of value.

At present one can see in India the efforts that are being made to restore and conserve national monuments, such as palaces, mosques, mausoleums, etc. (see section 4.4); and these may be seen as efforts directed to attract tourists, promote national prestige, or even encourage national or international funding; but they are also responses to the modernity about which Radhakrishnan has written.

The implication of all this is that decisions for conservation in India must include consideration of all aspects of the socio-cultural environment in which the people live alongside any claims of modern needs and pressures.

2.2.3 Attitudes influencing conservation

In addition to the above considerations of economic viability and local heritage there are abstract concepts in India that also influence decisions and are inherent in the situation such as eternity, time, space, use and duality; and these need to be addressed when determining priorities for conservation.

The concept of eternity: in India there is an attitude which believes that things are intended to be eternal, whether life or structure, where as in the West the emphasis seems focused on transitory nature of things; for example the expected life span of a building is limited from the start. In India defiled or even destroyed temples are made functional again merely by chanting suitable religious verses as expressed by Naipaul (1979) "*...A thousand year temple will live again; India, Hindu India is eternal; conquests and defilements are instants in time*". Rituals thus assume more importance than the physical repair of a building. There is a similar situation as in the case of Japanese Shinto temples. This attitude towards eternity influences public opinion and can dictate the decisions taken regarding conservation.

The concept of time: an example of this, is the eternal space or the sacred place where a temple stands, which is often referred to on enquiry of its age, rather than the fabric of the structure which is periodically renewed.

Unlike the West, where the linear perception of time determines their cultural resources, the concept of cyclic time is the deep cultural mode in India. This fundamental difference in the concept of time is highlighted in the differences in the concept of authenticity; in the West it is determined by the awareness of time's irreversibility which emphasises the temporal qualities of objects and events - the golden stain of time - but in India, the cyclical perception of time places no critical temporal value on man-made objects but transfers the quality of authenticity to the site on which the object exists. Thus, cultures, where the concept of cyclical time prevails, venerate the place rather than the building built on it (Menon, 1989).

Such attitudes are to be taken into account when dealing with a living heritage where tradition and fabric have to be respected together.

The concept of space: According to Khosla (1987), space, whether in small villages, towns or a metropolitan city like Madras, is dominated by sacred and symbolic geography, history and rituals, all of which give meaning to a place.

...space in Asiatic planning is primarily mytho-poetical and a model of the universe which is alive with spirit. Here, one is talking about physical space which could either be private, public, religious or mundane. Space within the chronotope of Asia is often constituted only by objects or images and a range of invisible but felt influences of the object - be it a sacred tree or a grapevine or even an image.

In contrast, the awareness of Space in the European mind has been formulated as a geometrical and Euclidean pattern which is not only homogeneous but also capable of sub-division.

This conceptualisation of a homogeneous space capable of subdivision is the basis of contemporary town planning theory and practice. Modern space, European space, precedes the objects that fill it and is thus ideal, abstract and inherently devoid of cultural content.

This essentially Asiatic approach, where character is determined by objects and activities is another dimension to be considered and this should influence the decision making process.

The concept of use: India is a way of life and a cherished old civilisation, but yet most people are not obsessed with antiques. This concept as developed in the West, was brought to India since the Raj. Indian society at large is utilitarian and the concepts of antiquity prevail only among the élite and those exposed to Western influences. In spite of antique trafficking, the situation at large is such that many sculptures, or pieces of old structures and carvings, lie scattered around sacred places, ruins and abandoned structures in towns and rural areas. Although they are unprotected, they are rarely collected or taken away, but instead are apt to be used on the spot for construction or any other utilitarian purpose. Similarly, many ancient objects within households, such as brass lamps,

pottery and utensils are used daily and passed down generations, rather than being displayed as collectors' items. This attitude of the Indians is described by Naipaul (1964) as:

...Many of the things in my grandmother's house were therefore irreplaceable. They were cherished because they came from India and were continued to be used with no regret attached to their disintegration. It was an Indian attitude, as I was to recognise. Customs are to be maintained because they are felt to be ancient. This is continuity enough; it does not need to be supported by a cultivation of the past, and the old, however hallowed, be it a Gupta image or a string bed, is to be used until it can be used no more.

The concept of change: change is an inevitable part of nature. Built heritage in India is treated as part of the living fabric of the society, which like all living entities will change with time. In the West the emphasis is on the product, which may be continuously prolonged without change whereas in the East change has traditionally been allowed to evolve within broad parameters of rituals and design proportions. This has given flexibility in vernacular style and details, and this has led to a process of development in both art and architecture, to which the changing use of ancient monuments is living proof.

It can therefore be debated whether it is the change itself, or the type and rate of change that need to be considered and regulated. The task therefore is to reconcile these changes with the traditions and the present aspirations of modernism. Conservation can thus become the key to development, instead of being a separate identity with frozen attitudes and restricting heritage to enclaves of conservation and heritage zones.

The concept of duality: the aspirations of the modern Indian society are to imitate the West's materialist achievements perceived as progress; yet simultaneously it is reluctant to break completely from tradition and its intangible values. Living with this dual concept is bound to have consequences which result from the struggle between economic values (development) and traditional cultural values and heritage (conservation). This is very evident in the

many cases of historic buildings that are being demolished to make way for newer developments, or the case of historic areas becoming blighted making them concentrated areas of slums.

This conflict is apparent when one studies the urban fabric of most cities in the developing world, as seen in the Iranian city of Shiraz (Karimi and Hanson, 1995):

on one hand a dense traditional core with tiny patterns of streets and pathways, small buildings and artisan workshops, and apparent poverty, while on the other hand, modern fabric with wide roads, geometric layouts, high buildings, cars and apparent wealth.

2.3 Concerns of Development

At one level development is a natural human process and all definitions contain the notion of progress or change being from a less desirable to a more desirable society. To many in the developing countries, development means only economic growth and increased market economies and thus having a higher standard of living whatever the cost. It is equally true that over-development and allowing commerce and the market to be the determinants of development have been the cause of many social evils such as materialism and the breakdown of social values which in turn lead to crime. Further, this has led to a break-up of extended families, to non-involvement in the affairs of the local area, and less commitment towards civic responsibilities and such like. Trainer (1989) lends his argument to the case when he concludes that development has often involved in people giving up traditional ways of living within rural cultures which are endowed with satisfaction, towards living with low material standards in order to adopt the competitive, individualistic, alienated, stress-ridden and insatiably greedy life styles of the over-developed countries.

Coneyrs and Hill (1984) refer to conventional development theories as being mainly based on market forces often accompanied by social, cultural, political

and environmental problems. Trainer refers to these as 'inappropriate' development, where there is no concern about the actual needs of the society and the main objective is simply to increase the output of anything that those with capital want to produce (e.g. bubble gum, Cola, etc.). The stress therefore needs to be on the appropriateness of development rather than development itself.

What then is appropriate development, its aims and the means to achieve it? These questions have been the subject of a large variety of literature attempting to define development, its aims, approaches, etc (Young and Mason, 1983; Schumacher, 1973; UNDP 1994; Bairoch, 1988). The continuous, focused and broad-based debate on development has been on for many years, and it is beyond the scope of this thesis. However, it is maintained that development needs differ from one society to another; and there is no universal model; it must relate to the socio-economic and cultural needs of each situation as perceived by Trainer (1989):

Develop only those things that are likely to enhance the overall quality of life and not forces connected to mere economic growth, abandoning western affluence as a goal of development.

This principle is further emphasised by the "Happiness Index" of the Gallup Poll (King, 1995) and other comparisons from the survey conducted among eighteen countries.

2.3.1 Development in the built environment

Evolving views of urban planning, theory and practice in recent years have increasingly concentrated on urban and regional planning as a dynamic, organisational process of pursuing moving goals and objectives into new territories and rapidly changing situations. This perception has shifted the emphasis from conventional planning based on land use to wide-ranging vision and policy-oriented research and analysis in a constantly changing development

process within an economic and social context.

The City of Birmingham recently adopted this new approach to urban planning. In common with many other industrial cities in Britain, Birmingham suffered from substantial economic decline during the 1970's and 1980's as its traditional industries faced strong competition from abroad. The City Council therefore took up a number of strategies to promote development in the city. The National Exhibition Centre, International Convention Centre, Symphony Hall and Indoor Arena to name a few were designed to attract new business to the city. By the use of public and private sector resources derelict industrial land was reclaimed and made available for new uses as in 1,200 ha of Heartland. Assembling of land has made possible new infrastructure, improving the local environment, making available sites of different sizes for industrial, commercial, and residential development, providing training skills and attracting new businesses. Another innovative way was to improve the older, privately-owned housing stock by using public funds to renovate the external shell, thereby encouraging private resources to be used on internal improvements, and preventing the unnecessary further deterioration and loss of housing assets. As part of the attempt to attract investment and encourage development in the city, there was established a Development Department bringing together functions of urban planning, estate management and local economic development, with the clear aim achieving of greater responsiveness to development opportunities and simplified planning regulations (Devas and Rakodi, 1993).

Manchester's Olympic bid has served to secure its place in the international market by a similar planning policy. The City Pride Vision for Manchester (1994) for the year 2005 rests on integrating the city's enhanced international prestige with local resources. This vision has the potential to become the focus for new economic activity and its role as an international city and the commercial, cultural and creative capital of the area make it a centre for investment growth. Then the quality of life available to its residents, and the high percentage of

those enabled to enjoy this better lifestyle will make it a city worth living in.

Within the last decade major areas of industrial dereliction in the city have been redeveloped to create new homes and new industrial and commercial floor space, notably in Salford Quays and East Manchester; while comprehensive regeneration programmes such as that in Hulme are transforming the prospects of some of the most disadvantaged and deprived communities. In the city centre improvements particularly in Castlefield, and the construction of major new sporting and cultural facilities - the Concert Hall, and Victoria Arena, for example - have strengthened Manchester's position as the regional capital and its attractiveness to business and leisure visitors. The Olympic bid, in addition to the substantial investment it brought to the city, has also strengthened the sense of civic pride, already a feature of loyal residents.

Planning for such development is no doubt a complex process that not only involves different levels of intervention but also changes many socio-economic aspects (Gibson and Langstaff, 1982). It is the result of a variety of influences, typically interwoven into the revolution of the inner city; changes in the demographic structure, physical fabric, affordability, costs of energy, etc (Ashworth and Turnbridge, 1990). The issue here is not to debate the levels of intervention and methods of regeneration as in Birmingham or Manchester, or their policies, but to set the criteria that need to be adhered to in similar cases:

- What will raise the over-all quality of life and not only its economic growth?
- What is the local model for development? What are the social, cultural, economic and political aspects for the desired development?
- How to employ development aspects in preserving the cultural heritage and *vice versa*?
- What are the resources available and the appropriate technologies needed for this development?

- How can there be community action to involve people in the process, deliver local benefit and instil city pride in the residents?

It now becomes essential to define the different levels of involvement by the parties so to ascertain what is desirable and what is possible so that decisions can be made and implemented. Grading from the national level, three levels can be identified for decision making for any urban programme and it is vital that there is coordination between them.

At the *National Level* decision making is mainly concerned with issues like national economic policies, balance of payments, legislation, housing, political acceptance and so on. *National Level* policies aim at addressing the correctness of free market or social policies and at questions such as - do such policies encourage large investments and consequently large scale developments? For as said by Ronald Brown in a BBC programme (1994)

emerging world or capital cities are aiming to differentiate themselves in their attitudes to growth and external contacts. ...commercial interests are terribly important to the economic future and security of the nation as economic security strengthens national security. As part of this national mission to put America first, the nation is geared to boost strategic industrial projects, high speed data networks and so on.

Europe's equivalent took the form of the EU Commission's White Paper "Growth, Competitiveness and Employment":

...development of key critical technologies may be for military reasons, but in addition subsidising and protecting such is purely an economic one. Maintaining competitiveness, high value jobs with a leading edge on industry seems to be the European answer to development (Walter, 1994).

This assessing of strengths and weaknesses towards an appropriate urban policy framework suggests that the various components of cities, in short, the raw physical, social and cultural material, enable them to work, grow, evolve and build themselves up. As Rekhi (1994) points out in his article, Porter's study on

"Developing India's Competitive Advantages", shows that the macro indicators are clear that India can "produce a high and rising standard of living for its citizens" and become competitive in the global arena. Surely it is time for India's cities to evolve a sustainable and appropriate urban policy framework, improve the utilisation of existing resources and infrastructure while at the same time balancing the development with the socio-cultural climate so that the special charm of India is reflected in its world class cities.

City Level decision making is to be concerned with more detailed affairs so as to secure the balance between various aspects of the city's life; population, jobs, housing, traffic, transportation and other communication networks and commercial activities, so as to avoid centralisation and overcrowding problems. Additionally, it needs to be concerned with the funding allocation and technical and financial feasibility of incorporating the many local schemes into that of the city as a whole.

At a *Local Level*, implementation programmes should be considered with regard to the local needs of housing, services, amenities, a share of available resources and the potential for influencing increased community participation.

For all these developments the common problems experienced by cities of both the developed and the developing world is the availability of finance. But the magnitude of the problem is much greater in the developing countries as they are faced with scarcity of resources, growing pressure to industrialise and many other priorities. This issue has been addressed by Serageldin (1994), who is concerned for the financing of large-scale urban projects. He also highlights four main areas hindering the development process: urban growth, the social dimension, the economic dimension and the institutional setting.

Problems of urban growth and development in the industrialised world can be attributed to the demands imposed by modern life (e.g. the motor car, transport

and communication networks). In Indian cities like Madras, Bombay and Calcutta one can see the influence of colonial times when the colonists tried to create urban settlements that resembled those at home. These cities have since grown enormously and outgrown their services and infrastructure. Here, the planned and established older quarters with easy accessibility around have caused an increase in land values (land prices in Bombay which has a large inheritance of Victorian architecture are the highest in the world today). Such increases create growing economic pressure to replace old structures by new ones for commercial use. An example of this is in First Line Beach Road, a part of the central business district in Madras, where the Public Works Department demolished the historic structure that once housed the mercantile offices of the British since 1805 and later the first Indian high court from 1861 to 1899. This was to meet the demand for government offices through new high rise construction and the floor area ratio was beyond the capabilities of the city's transport and physical infrastructure. Even as this thesis is being written, there is an on going struggle to save another fine building along the Marina in Madras, the twin-columned office building of the Deputy Inspector General of police which may well go as have too many other such historic structures. As urban land values spiral upward, heritage areas and structures lose out. Often site development commences regardless of the law, and the long drawn out prosecution procedures and minimal fines that regularise such deviations aid and abet the practices.

The social dimension of such areas is characterised by severe overcrowding and altered social structures. Newer developments and opportunities, mobility of population in search of jobs and other such factors have resulted in the break-up of joint or extended families. Bigger residential spaces and houses are being either sold off in portions or sublet for economic reasons, while wealthier families take up their roots and move to new suburban locations. Such practices on one hand, have increased the overcrowding problems as large residences have been subdivided to accommodate many families, and on the other hand,

accelerated the degradation of these structures. It would be equally disruptive if any reverse trend were encouraged for it could also have undesirable social repercussions.

The economic dimension reveals the decrease in the number of traditionally skilled artisans and craftsmen due to the introduction of technology and modern machinery. Such a change becomes a challenge in most urban and economic regeneration schemes as well as in conservation measures. Taking a typical situation in Mylapore of a goldsmith working on his ornaments: if he were given the choice of machine cutting in an industrial atmosphere which is less labour-intensive or working beside a fire and bellows, manually detailing every single piece in a small room open, and directly accessible from the street, he would undoubtedly take the former. He would not realise the value of tradition, its setting in the cultural scene of Mylapore and the irretrievable loss if unpreserved. If restrained in the name of conservation, he would view conservation as a tool that prevents him going up the social and economic ladder and as an obstacle to his development.

In many developing countries, the fourth aspect namely the institutional setting, is another major problem. In India, so far the central and state governments have always been responsible for various urban development programmes like development of housing layouts, industrial estates, slum clearance and rehabilitation, water supply, sewerage and other services. This approach is constrained by the limitations of departmental responsibilities and is overshadowed by the government's fragmented approach that carves out an arbitrary area for direct intervention or that injects substantial subsidies into specific private sector developments.

2.3.2 Planning for sustainable development

Another aspect of development is the notion of sustainability which has been

defined as "development that meets the needs of the present without compromising the ability of future generations to meet their own needs" (UNCED, 1994).

Very few countries had been trying to relate the concept of sustainable development to their national policy making but it has more recently become the subject of growing international concern. This concern was focused at the UN conference on Environment and Development (the Earth Summit) held in Rio de Janeiro in 1992. One of the three main outcomes of the Earth Summit was: Agenda 21 which is a comprehensive programme of action (throughout the world) to achieve a more sustainable pattern of development for the next century. It places great emphasis on the need for all sections of society to participate in the formation of effective strategies for sustainable development. The other outcomes of the Earth Summit were the Climate Change Convention, the Bio-diversity Convention and a statement of principles for the management, conservation and sustainable development of all world's forests. The Climate Change Convention was an agreement between countries to establish a framework for action to realise the risks of global warming by limiting the emission of so-called "green house gases". The Bio-diversity convention was an agreement between the countries about how to protect the diversity of species and habitats in the world.

A new UN Commission on Sustainable Development (CSD) was set up to monitor progress on Agenda 21, and its first meeting was in New York in June 1993. It will continue to monitor progress against commitments made and review the need for further action through conferences of the parties concerned. An important recommendation of the Earth Summit was that individual countries should prepare strategies and action plans to implement their part of these agreements with a world-wide review to take place in 1997, five years after the Rio Summit.

For cities to become sustainable, they need to develop a strong awareness of the ways they affect the immediate environs, local hinterland and the world at large and create their own control systems, acting like thermostats, continually monitoring their global and local environment impacts. The challenge is to promote ways of encouraging environment friendly economic activity such as wind farms,⁶ and of discouraging environmentally damaging activities such as displacing a community in order to build a dam.⁷

Sustainable development is also concerned with such policies, programmes and practices as will ensure that the development is matched by access to better basic infrastructure, shelter and employment for the local community. During the last decade many international agencies along with the local governments have shown interest in improving the living communities and environment especially of the poorer sections; and any such interventions will improve their quality of life, for example voluntary societies with or without external grants have provided facilities such as drinking water and latrines in the slums of Madras.

Another aspect of sustainable development that needs to be recognised and promoted is the encouragement of local labour, artisans and craftsmen. Their

⁶Non conventional energy sources add a new concept to the idea of sustainable development, as conventional energy costs are increasing while those of renewable energy are falling. In India the use of solar water heating and cooking, biogas also for cooking and energy from wind farms help to save the fossil fuels. With the help of many financial incentives given by the government to encourage the industry and consumers, the Madras Cements factory set up a large wind farm to generate 6MW of electricity in the Kanyakumari District in Tamilnadu for the combined use of the company and the Tamilnadu Electricity Board. Another government owned Tamilnadu Newsprint and Papers Ltd. has set up the largest wind farm in India. It now draws 8% less from the national power grid. Domestic users are being encouraged to use similar energy efficient methods and it is necessary that any schemes to maintain the environment are translated into planning guidelines.

⁷Too often after a 'development' project has been completed, be it a large dam, plantation, or industrial fishery, the local community ends up ill-fed, ill-clothed and ill-housed and transplanted from their traditional society into one of quite different values and priorities in which it is extremely difficult for them to pick up the threads of life and start again. A current example of this tragic process can be seen in the Narmada Valley Project in India's States of Gujarat, Madhya Pradesh and Maharashtra. The two largest dams involved in this project will between them displace over 200,000 people, many of them tribals, who will have their villages and fields totally or partially flooded.

There is a relatively small amount of direct employment generated but this disappears on completion of the construction. Despite state government rhetoric, there is not the remotest prospect that sufficient fertile land will be found elsewhere to give people displaced by such activity independent livelihoods again. Cut off from their traditions, their communities destroyed, the vast majority of the displaced will eventually drift to slums of Bombay or Ahmedabad, like countless development refugees before them.

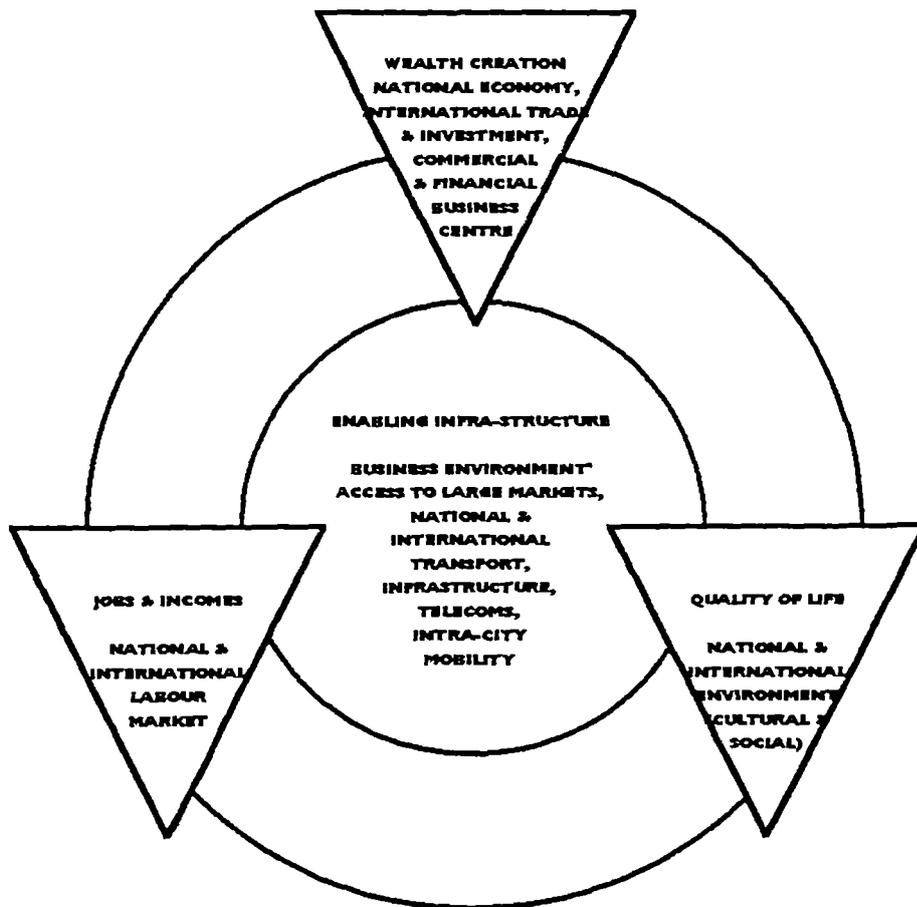
moving out will not only upset the demand in the labour market resulting in an imbalance between demand and supply of labour, but also the living traditions of India such as family values and skills that are inherited will disappear. This surely is the opposite to the intention of sustainable development.

Measures to encourage and retain the local skills within the community not only ensure the continuation of local heritage and their being passed on to the next generation but also enable finances to be retained within local communities adding to their stability and sustainability.

2.4 Development through Conservation

With respect to development through conservation, two key problems face planners and decision makers; first, the conflict between the need for change on the one hand, and the political and socio-cultural reluctance (and associated uncertainties) to change; and secondly, the bureaucratic, financial and professional inadequacies (see last para on page 43) and the very real fear that tackling these problems will involve enormous expense. On the other hand, this need not be the case; it has to do more with the re-allocation of resources. Yet having redefined these activities (both conservation and development), the challenge arises of how to create a new and mutually beneficial balance between the two.

Our relationship to the past is an important dimension for defining the values, purposes and uses of our historical and cultural heritage. Nostalgia, in a seeming climate of decline and change, is not merely a longing for the past, but more importantly a response to conditions in the present, where the past is considered as a better alternative. The economic dimension is no doubt the most significant, not only as a justification for conservation but as the motive. Thus conservation of the built heritage is to be seen as an irreplaceable resource of the past generations for continued use by the present generation, thus avoiding the need



BUILDING & ESTABLISHING CAPITAL CITIES

SOURCE: LONDON WORLD CITY: COOPER & TYBRAND 1991

Figure 5 Building and Establishing Capital Cities

for new investment resources to replace it. Therefore when a project is presenting itself as a special case for conservation, the economic arguments are often the most understandable and convincing.

Quality of life, jobs and income generating capacity, wealth creation and good infrastructural facilities together contribute to re-building and re-equipping capital cities with their distinctive specialisations (Kennedy, 1991). Hence conservation becomes a tool in the city building process. Figure 5 shows that the three main components in city building are wealth creation, jobs and income and the quality of life. These three revolve around adequate enabling infrastructure where the means to do this are its resources. When these happen to be in the form of cultural heritage and the built environment, conservation and preservation along with development need to be employed to ensure sustainability and a continuous city building process. This approach can be summed up as: capitalising on opportunities that appropriate development affords to preserve, restore and further cultural uniqueness, maximising local self-sufficiency by encouraging small-scale regional economies, using locally available inputs and providing goods and services needed in the area.

2.4.1 The reality of development through conservation

In 1988 the Government of India constituted a National Commission on Urbanisation (NCU) which included in its report:

...Even while expressing its conviction that the pace of urbanisation in India would and must continue to grow, the Commission made a strong recommendation in favour of heritage conservation and suggested a methodology for the State governments to include it as an integral part of the town planning process and to cease relying on the Central and State Departments of Archaeology (Guzder, 1993).

This idea is also reflected in the strategy in the eighth Five-Year Plan where the emphasis is on "conservation in the context of planned development". The framework of conservation is primarily through the State Town and Country

Planning Act. This is largely an enabling piece of legislation. It gives powers to prepare statutory regional and urban development plans which are based on specified land uses, zoning and sub-division regulations. Some States combine specific projects which are within the frame work of city development plans. These may be known as Town Planning Schemes and Action Area Plans. Such plans include projects ranging from subdivision lay-outs, group housing, commercial and/or other urban forms to revitalise areas around monuments and to prepare controls for specific areas. Additionally, they may include general and special controls concerned with maximum floor area ratio, heights, minimum setbacks, building lines, parking specifications and façade controls.

The emerging picture from these initiatives is of the specificity of conservation for the Indian context; and the development of any new scheme needs to be both sustainable and maintaining regional if not national identity. While conservation is *any action taken to prevent decay and arrest deterioration* and includes all the processes of looking after a place so as to retain its cultural significance with long-term goals and objectives, preservation is only one such process, keeping the object in its existing state and is limited to protection. Therefore conservation and not preservation. It is a contributing aspect of development which manages change to achieve sustainability. Development through conservation should attempt to retain local distinctiveness and develop approaches based on experience and research to evolve and apply local solutions. It has to be the result of work that involves the different disciplines, rather than each of them working individually. Conservation is not to be viewed as limiting development or growth by eliminating conflicting ideas and urban aggrandizement. Instead it must be able to sustain life styles and also meet the demands of development. Attitudes, expectations, systems and organisations that have developed over centuries cannot and should not be destroyed or changed overnight. They have come as a result of gradual and continuous change at the local level, by the activities of the local people. Thus a mere face-lift to problems associated with development and management of historic areas would be both superficial and

disastrous. As communications develop so will the demands for change; and the proper management of these two elements in the modernisation process is the crucial factor and strong conservation measures and controls are the essential tool for this.

Looking at conservation and development alongside each other in India, it is clear that the two are related but merely declaring areas as Conservation Areas/Heritage Zones does not necessarily ensure their conservation or indeed their development. This can be attributed largely to the lack of a multi-disciplinary approach, long-term goals, identification, listing and establishment of historic areas and many more factors. When areas have been identified, there is often a lack of clear policy for implementation and insufficient financial inputs. It may also be due to a lack of genuine understanding concerning the purpose of the proposed changes.

We further find that different of people have different preferences and values (see 2.2.3). Such attitudes and human concepts of environmental relationships have been outlined in Rapoport's papers (1994) and may be illustrated as shown opposite. The translation of such abstract values into the terminology of development and conservation (such as 'utilism' meaning 'adapatibility' 'reuse of a building' and 'culturally oriented' meaning 'appropriate conservation of buildings, areas or artifacts') brings them into the context of the planning agenda.

2.4.2 The nature of heritage and its market value

Lichfield (1988) has classified heritage under two main headings: the physical stock and the activities within that stock. But Shankland (1975) had earlier classified the built environment - our area of interest - into historic groups, sites and places; historic quarters in large towns and cities; small historic towns and villages; and towns and cities that are themselves by definition historic. Activities

that occur within these defined built environments mainly fall under the three-fold classification of production (small industries), consumption (markets and shopping areas) and places of religious devotion. It may therefore be inferred that heritage is a continuous process of growth and change whereby the quantified results occur not only in material acquisitions only but, in a way that growing populations can presently benefit and pass on to future generations. It is therefore maintained that such heritage cannot be quantified only in material terms; it has a special *value* to the user and is a major contributing factor to the quality of their life.

The urgent need is to understand the residents' needs and aspirations so as to seek solutions that are feasible, acceptable and beneficial to them because effective conservation and rehabilitation is dependent more on achieving their co-operation than on the strict enforcement of conservation area legislation. This *development through conservation* then has spin-offs in the form of pumping business and economic dynamism into the areas; and a right balance has to be achieved so that it does not prove to be at a social and even economic cost too great for the residents to benefit.

However it is debatable whether the values of conservation and the so-called 'planning gains' alone can ever achieve an optimum balance to regenerate an area and yet retain its special charm and cultural ethos or will they simply cheapen the architecture and kill the existing urban harmony and texture, eventually helping to create new urban slums and crime-ridden ghettos.

In the light of these two views the important process of evaluation is essential and must depend upon careful assessment of principles through *cost-benefit analysis* which as Schofield (1987) defines:

...is a tool for making decisions about the use of society's scarce resources.

Cost-benefit studies in social, cultural, economic and built environmental terms

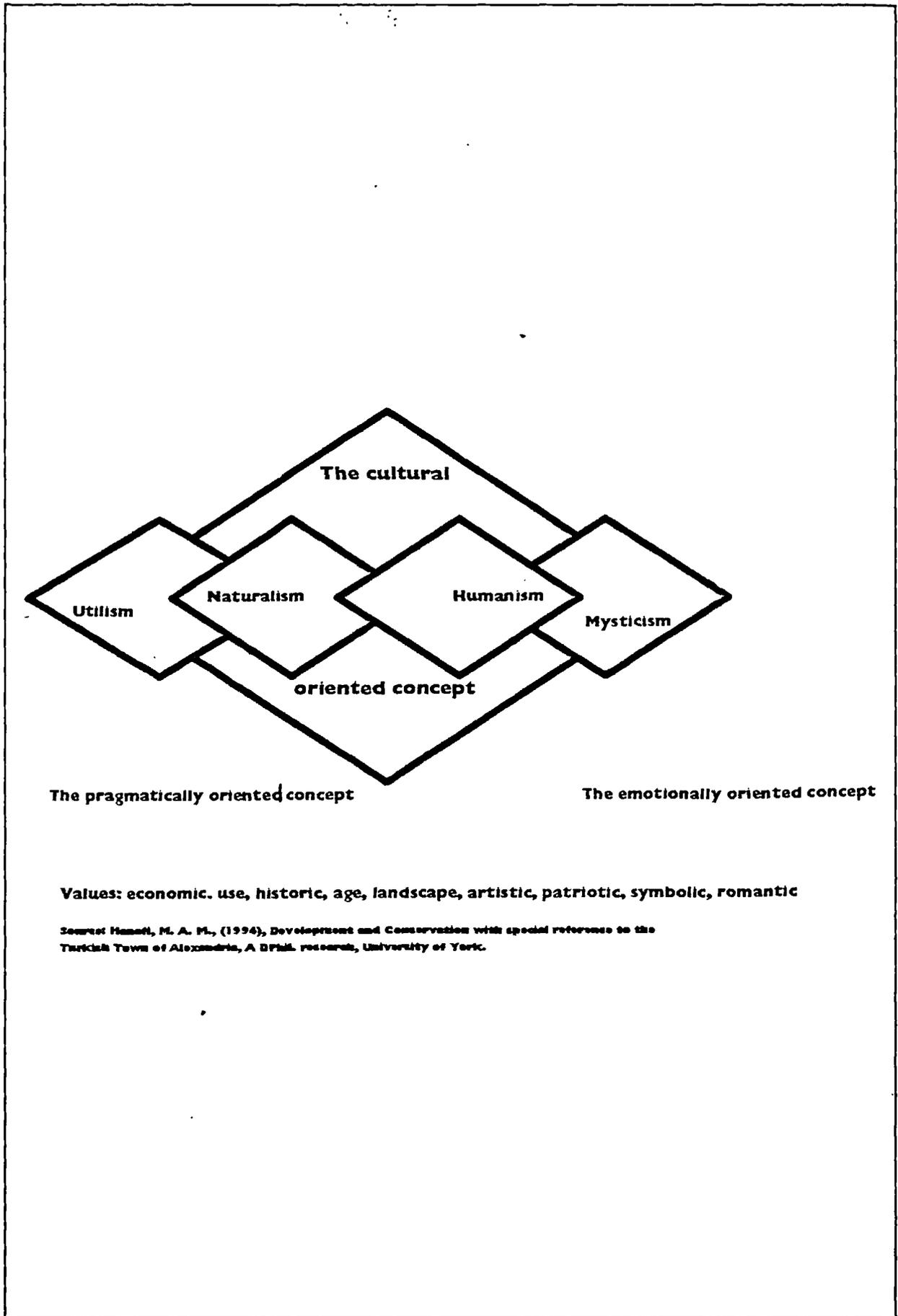


Figure 6 Values in the Built Environment

have to take into account not only the direct costs involved but also the opportunity costs that are influenced by factors such as location and setting, age and attachment factors, derived utility and satisfaction, for

...what is the value of a motor car stuck in some accessible desert or the building site in a jungle? (Lichfield, 1988)

Rehabilitation therefore becomes a determining factor in defining the utility of any built fabric and its value for conservation. This can be the result of four elements (Lichfield, 1988 : 22-25):

1. *the extent of physical or structural deterioration*, where repairs and improvements are needed beyond normal maintenance, making a more searching economic justification a necessity,
2. *functional quality*, when the building or area has become obsolete in terms of its original design, function or the services provided and is no longer suitable for efficient functioning,
3. *locational change*, when the building is no longer sited in an appropriate relation to its external linkages and communications which influence its use, and
4. *environmental unsuitability*, when the conditions in the immediately adjoining area render the use of that particular element unacceptable to the adjoining inhabitants; the question then arises as to the relative cost of re-locating or having to live with that element.

In this context when Lichfield (1988:176-177) considers the criteria of Forte and Girard he suggests various bases for valuing heritage that may be summarised as:

1. the contribution to national income (e.g. tourist economy), as well as the indirect costs and benefits to those nearby who may be influenced (e.g. increased trade for hotels, shops, transport, increases in accommodation costs, overcrowding problems and additional stress on infrastructure),
2. the willingness of the local population to pay for increased accommodation and the associated living expenses,
3. the capitalization of annual expenses for conservation, maintenance, etc.,

and

4. the opportunity cost, the value of resources saved in providing a new buildings, infrastructure etc.

Thus examples of the costs and benefits involved are:

Costs

- the costs of retaining obsolete structures in historical cores, with high development potential, where land values have rapidly increased, can become a substantial economic cost,
- the social costs taking on local families and small businesses who cannot afford the increased inhabitants and rents that often accompany the implementation of conservation policies, and are thus displaced by others who can afford them, and
- the costs of introducing tourism reflected in the fact that extensive exposure to tourism leads to social and economic disturbances in normal patterns of life; gentrification of the local resources and the resulting loss of their *raison d'être*; higher prices and scarcity of goods for local residents; more traffic problems and restrictions for the locals; and a possible adverse effect on their 'sense of belonging' to the place.

Benefits

- the utilisation of existing resources and economic regeneration of the society through the provision of new jobs,
- enhancing the quality of the environment, infrastructure and services, and therefore the quality of life, and
- preserving local heritage, identity, distinctiveness and therefore maintaining the sense of belonging and civic pride.

2.5 Conclusion

At this point having defined the broad meanings of conservation, development and sustainability, it is clear that there is no single formula to either conserve or

develop a historic urban neighbourhood. But having studied each of them and the associated factors, it can be said that what is needed is: a positive socio-economic change that does not undermine the ecological and social systems upon which communities and societies are dependent.

In more specific terms the following will need to be the basis for decision-making:

1. Within an overall vision for the future of the city, the aims and approach of both development and conservation need to be clearly defined before either predominates in the decisions,
2. cultural aspects of conservation need to be highlighted in order to influence the decision-making process appropriately and this can only come from a thorough understanding of the structure and social patterns of the community,
3. conservation in any situation will be influenced by economic and political forces that have to be taken into consideration at the planning phase,
4. proper and controlled planning needs to ensure a holistic approach along with reducing the damage to the historic fabric,
5. once priorities have been determined, the claims of both development and conservation must be continually reviewed to maintain the agreed balance, and
6. a balance must be struck between the needs of the *local residents*, the claims for maintaining the local distinctiveness and the planned development of the whole area.

Having drawn attention to the need for a comprehensive view of development and conservation, where the objectives of both activities may be reconciled and complement one another, Chapter 3 now sets out to provide a picture of some major issues, through a study of three cities in the England. which could contribute to the thinking involved in the process of conservation, development and urban regeneration in Madras.

CHAPTER 3
CITY REGENERATION:
York, Manchester and London



Enabling frameworks and strategies

...draw on the past to develop the resources of the future.

...prepare for change and anticipate new developments.

...develop and enhance global links and relations.

3.1 Introduction

In the previous chapter we have concluded that development does not have a universal model for application, but has to be taken in its appropriate context within the constraints of the surrounding environment. Having explored the apparent conflict between development and conservation and seeking ways to their common goal, this chapter attempts to explore the issues involved, drawing on the British experiences in city building and urban regeneration that have been echoed in the three lines at the top of this page.

This chapter will attempt to illustrate differences in conservation and development policies, planning laws, practices and attitudes, through a study of three cities, with the aim of understanding the relationship between development and conservation and its application in three different situations. It will further determine the different factors and influences that have played a significant role

and identify the degree of involvement and financial input of the various parties involved, and their role in the process and the catalytic factors such as tourism and traffic that have also been involved in shaping the policies.

The first is the city of York, a historic walled town, and a praiseworthy example of conservation. Its high standard is the result of the commitment of the local authority to a sensitive balance between economic growth and preservation of its heritage, alongside the availability of substantial central government grants.

Then there is Manchester, whose bid in 1988 for the Olympic Games of year 2000 helped the city to regenerate its centre politically, corporately and physically. The public and private sectors worked together towards a common goal concentrating on the positive qualities of the city. The 'Development Guide for the City' formed a tool to attract development and helped to position it as a leading city in Europe. The investment in bidding for the Olympic Games helped to secure the English nomination for the Commonwealth Games in 2002.

Thirdly London, where the 1994 Advice on Strategic Planning Guidance (1994), put forward a four-fold vision, objectives and policies as part of a co-ordinated overview of policy making and implementation and set it in a broad social and economic context for its continuing role as a world city. This has meant focused emphasis on enabling infrastructure that included wealth creation (national and international trade and investment), jobs and income generating measures, and improving the quality of life (national, international, cultural and social environment). After an overview of London, an individual case of Covent Garden redevelopment - a large area in a key position in Central London is reviewed to gain lessons on both a city scale and a focused smaller area.

3.2 Conservation, Development and Regeneration

The 'Action for Cities' launched in Britain in March 1988 involved a mixture of

old and new initiatives that were supported by the six government departments of environment, trade and industry, transport, education and science and employment and the home office. Many of the inner-city regeneration schemes were enabled by city grants, urban development corporations, urban programmes, enterprise zones, city action teams and task forces. All these programmes involved projects like providing jobs, housing, encouraging developers to come to inner cities, improvement of blighted areas and structures, encouraging and promoting private sector involvement.

3.2.1 The historic city of York

The city of York situated in the North of England has for the past 2000 years been an important religious and political centre. Today in York, one sees a high quality of historic conservation with its medieval characteristics well preserved alongside a growth in commercial activity.

3.2.1.1 York in history

In 71 AD York was a Roman legionary fortress, Eboracum, and later the capital of the province Britannia Inferior. Its role in history is etched in its many museums and Roman remains are still evident under the Minster and Museum Gardens. Its later place in history as a Viking town of the 9th century is encapsulated in the Jorvik Viking Centre, supported by the annual Viking festival each February. The 15th century York Minster, the largest Gothic Cathedral in Europe, established York as an important ecclesiastical centre in the North. The Minster with numerous other medieval buildings dotted around the town along with its medieval streets form the major attraction of historic York.

The introduction of the mainline railway in the 19th century maintained the importance of York and until 1995, when the railway works ABB were closed,

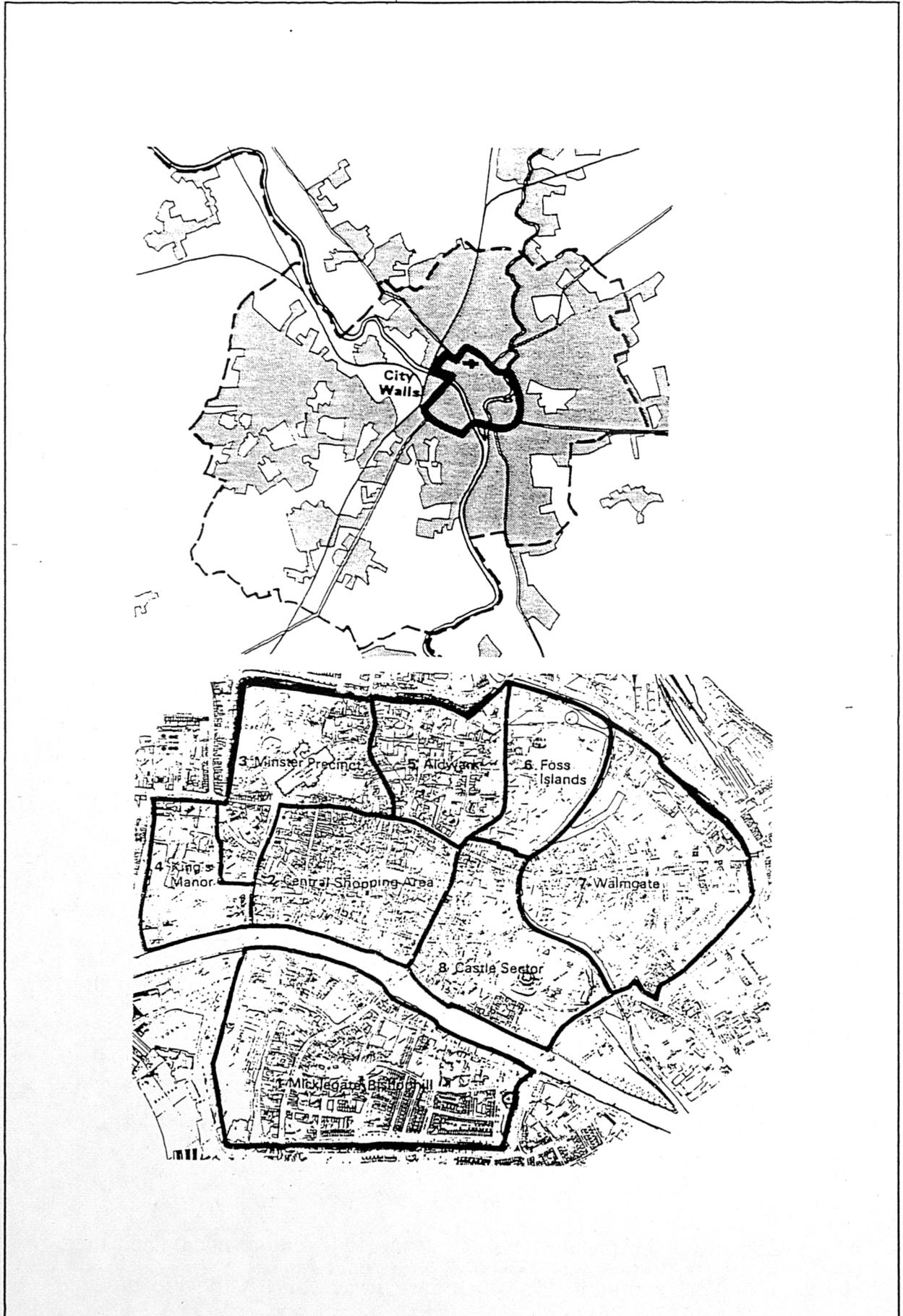


Figure 7 York - above: the walled city
below: definition of sectors within the city
(Source: York - A Study in Conservation, Esher, London HMSO, 1968)

York has been an important railway centre and the railways a major employer. The National Railway Museum alongside many other museums is an important tourist attraction and reflects the historic nature of the city.

3.2.1.2 Conservation in York

Conservation has been the result of understanding, public support and delivering local benefit, all of which have been at the forefront of major planning considerations. In 1966 the Minister of Housing and Local Government and four City Councils commissioned a report on the historic towns of Bath, Chester, Chichester and York and the subsequent Esher study (1968) uncovered the assets of the historic town of York and showed that they could be put to gainful re-use instead of demolition. The planning attitude of the early sixties identified a few examples of particular buildings to be protected and preserved, but the idea of defined 'conservation areas' was non-existent. The reports on the historic towns and the Civic Amenities Act of 1967, enabled the local planning authorities to designate 'Conservation Areas' for the first time.

York; a Study in Conservation (1968), by the architect/planner Lord Esher, commonly referred to as the Esher report, detailed activities, traffic and conservation patterns within the walled city. There were detailed alternative solutions to the problems identified in the 1967 feasibility report which had then proposed the construction of an inner ring road through demolition of many Georgian properties, principally along Gillygate. Such a solution was in tune with the 1950's ideology of demolition and reconstruction. In the wake of stiff opposition from the residents and other civic-minded organisations to such large-scale clearance and demolition, Esher then found alternative solution to the ring road, making carefully considered suggestions for new traffic patterns, car parking and pedestrianisation, supported by detailed cost analysis. This is a reminder that what may at first appear the easiest and cheapest solution is not necessarily the right one when looked at on a wider canvas; and any decision

involving demolition which by its nature cannot be reversed needs careful consideration and a wide consensus from people representing different interests.

The Esher report though welcomed by most of the residents of York, but faced opposition from the City Council, who feared the estimated costs could become a burden on its finances. However attitudes changed as a result of pressure exerted by local organisations, e.g. Civic Trust, the Georgian Society, the Chamber of Trade, consumer groups, the University including the King's Manor Luncheon Group run by Patrick Nuttgens and citizens of the city - and the inner-ring road was never built leaving the city of York well preserved.

A reflection on the attitudes towards such redevelopment, for example the public reaction to the threatened widespread demolition as an easy solution to a problem and the power of public opinion is seen to have been decisive. But it needs to be recognised that such public outcry may be ill-informed or media induced and it is important to ensure that proper facts and arguments are communicated to the public. In this way they can make informed choices and support what will be for the ultimate good of the community and town.

Since the 1970's with the establishment of a 'Conservation Advisory Panel' the area within the city walls has become a well managed Conservation Area with over 1500 historic buildings preserved. The Council now provides assistance and advice on the restoration and repair procedures for York's many historic buildings, as well as assuming a management role for the Conservation Area including streets, squares, pavements, street furniture and trees.

In 1965 an Urban Renewal Initiative known as the Town Scheme had been started and over £2 million was made available by grants from York City Council, North Yorkshire County Council and English Heritage; and this in turn generated over £10 million from the private sector for the restoration work within the city (York City Council, 1993:1). The scheme enabled comprehensive

and high quality restoration to take place within the city walls and demonstrated the value of a sustained partnership between the Central Government and Local Authorities.

Subsequently the York Redundant Church Uses Committee was set up in response to the increasing number of redundant churches, enabling their restoration and conversion/reuse for new purposes. They became the Arts Centre, the Archaeological Resource Centre, tea room and a day centre for the Elderly at the churches of St. John's, St. Saviore, Spurriergate Centre and Samson's Square respectively. Because of these early conservation successes, there is now a continuous stream of new projects being proposed.

York's fate as a collective monument of historic and architectural interest is a matter of primary concern: it is the English Toledo or even Venice. Hence the interest in conservation, often carried out to a point, which born Yorkers regard as exaggerated and intrusive; but which they must come to accept as natural and inevitable. (Harvey, 1975)

Even though effective conservation has made York the envy of many towns, there is now a noticeable movement towards a somewhat 'fairy tale' image of this medieval town. In an admirable attempt to keep the historic character, new investment was solicited; but increased commercial and industrial activity have lead to a reduced residential and community life in the city centre and the loss of its earlier vibrant life.

3.2.1.3 Conservation activities, development and planning for the future of York

The increasing number of new developments in the city centre reflect changing trends from residential to commercial uses leaving many upper floors over shops under-used or even vacant, thus reducing the resident population within the city walls. The decreasing number of grocery stores, high insurance covers, traffic and parking restrictions along with increasing fears associated with urban crime also

further discourage people from living in the centre. Residential use creating activity and vibrancy during most periods of the day is an important and essential element in the quality of life of any well-balanced city. This project to increase residential use above shops in city centres is being tackled by the Living Over The Shop (LOTS) initiative set up in 1989 and run by Ann Petherick at the University of York. It was initially funded by the Joseph Rowntree Foundation and promoted by the National and Town Planning Council; and it has had good support from the City Council and the Department of the Environment (DoE).

The growing importance of small partnership initiatives are evident in all parts of the city. The past 25 years have seen the city pioneering in the conservation movement with a shift to tourism planning and management initiatives of the 1980's. To this can be added local concern for higher quality jobs with increasing investment in training opportunities for the service sector, diversification of the economy by promoting new commercial opportunities through business initiatives. There is also a growing recognition of the importance of educational institutions with their contribution to research.

With a decline in the coal, textile and confectionery industries of the region, and in the railways in York, tourism has become the major industry and income generator. It may be noted that today 85 per cent of the jobs are tourism related (York City Council, 1984).

The City Council is committed to looking at ways of improving employment opportunities and attracting high skill companies to move to York. It also attracts major conventions and conferences by building up on its ecclesiastical reputation (the recent Anglican Synod in June 1995 and many before of other denominations have been held here). And on the strengths of offering good accommodation, a wide variety of dining, shopping and pub facilities and promoting the arts many are attracted throughout the year to this richly endowed city. The value of tourism to any historic city is clearly apparent and needs to be

encouraged by the provision of good facilities. But this must always be weighed up against the needs and feelings of the local residents who may have to suffer inconvenience with reduced privacy, increased cost of living and traffic restrictions.

None of what has happened in York could have been achieved without generous funding from outside in addition to what is generated by the tourist industry. This will be wasted if there is not a strong income generating plan to continue it when funding ceases and this may involve some hard decisions by the treasury department regarding priorities. Consideration must also be given to the conditions and restrictions imposed by the grant giving authority so that there are no problems later.

Museums and tourist facilities are constantly being increased and improved. Many conservation organisations have established themselves in York, including the York Archaeological Trust, which not only supervises archaeological work in the city, but also helps to fund further high quality research and education work of the Trust, through the Jorvik Viking Centre, the Archaeological Resource Centre and others. Traffic measures within the city centre have largely been resolved by pedestrianisation, and since September 1987 York has become one of Europe's largest pedestrian zones. The city centre is closed to traffic between 11.00 am and 4.00 pm six days a week. This allows for morning and evening deliveries to the retail outlets, and a comfortable shopping zone for pedestrians. The parking problem is eased by the 'Park and Ride' scheme whereby visitors park their cars free at several identified points outside the city centre and use a regular bus service at very low fares for coming into town.

The re-use of redundant property, whether churches, warehouses or disused buildings raises a number of questions: whether they are worth repairing and allotting to a new purpose; whether they have to be destroyed because they are too expensive to repair appropriately; they are in a situation where another type

of development has to take priority; or the very use to which a redundant building may be allotted can create division of opinion.

The decision-making power of local establishments in influencing the development process and the direction of the planning process is evident in the shift and emphasis on tourism and the 'heritage' industry making it obvious over the thirty years how conservation has helped to build and dictate the direction of growth.

3.2.2 The industrial city of Manchester: renewal, image and marketing

Manchester's proud tradition is that of the world's first truly industrial city of the Victorian era. The city then experienced phenomenal population growth and physical expansion. However in this century in common with other cities in Britain, Manchester is experiencing a decline in its traditional industrial base, jobs and population. It still remains an important manufacturing centre and the local economy is characterised by a high average of 42.7 per cent employment in the service sector jobs (Manchester City Council, 1994). New sectors of the economy such as the financial services, media and cultural industries, high technology and tourism related industries have also grown in importance.

3.2.2.1 City Pride: the core strategy

This assessment for the City Pride Partnership, focused attention on those areas where there was real need and potential to improve its standing relative to its European peers in terms of business, people and place prosperity. The Prospectus provided a vision and framework for the regeneration and development of the city into the next century enabling it to become a focus for new economic activity. It could the become a European regional capital and an international city of outstanding commercial, cultural and creative richness, with a high quality of life for its residents.

Reflecting on these experiences, the focusing on an overall vision at the start is seen to be paramount. The original vision of the council was developed by brainstorming ideas also involving the expertise of consultants from other parts of the country. In this way a wide range of interests was represented and innovative schemes proposed. However, these then needed careful assessment and have led to the continuing work of an Advisory Panel to prioritise their potential for realisation and provide a guide for future development.

The first step was to under-pin its international status. This involved strengthening its well established public sector services, financial and banking services, higher education sector, quality of transport and communication links, including the development of systems of advanced global telecommunications; in this way it could attract more multi-national companies (including HQ's) and international institutions notably from the European Union. The prospectus identified for renewal many areas of acute economic and social deprivation, with decaying infrastructure - the least welcome legacy of its Victorian industrial heritage; and over the past decade, local authorities together with development corporations have undertaken massive reclamation and improvement schemes. These have had a substantial effect both on the physical appearance of the areas and in attracting private sector investment.

Strategic projects have been identified, like the major conference/convention centre developed in the area around G-Mex and the Great Northern Railway Goods Warehouse and have been the result of strong private/public partnership. The redevelopment of the Piccadilly Plaza and Gardens provides a local focus and strengthens Manchester's position as a Regional Centre. The Lowry Centre, the Velodrome and the Victoria Arena all enhance and support the artistic, cultural and sporting traditions in addition to the already established cultural industries such as the BBC, Granada TV and others. Taking advantage of the potential already existing in certain venues such as the sporting complexes and higher education institutions, reflects the ideology of building on inherent

strengths and is worthy of special mention. Refurbishment, provision of adequate infrastructure and good publicity have contributed to the growing civic pride and more national and international events are now being held here.

Housing development is a key component of area regeneration and the Manchester Development Corporation and the local authorities are already tackling these issues within the context of wider regeneration. The regeneration of Hulme in Manchester (targeting acute areas of dereliction and regeneration of areas blighted by poor quality development) and of Pendleton in Salford (through which the city is to regenerate a residential and retailing area in partnership with developers and the University and University College of Salford) are illustrative of the approach where the strategies have responded to the commercial, social and environmental needs and opportunities.

The experience of regeneration in Hulme and its renewal of a living community encourages the policy of renovation and reuse rather than demolition. This conserves the traditional housing stock and character of the neighbourhood in keeping with the ideals of *development through conservation*. In view of the shortage of housing resources and in order to tackle the blight caused by empty property, the targeting of investment to such areas of is paramount.

3.2.2.2 The marketing strategy

Marketing is seen as an essential element in the vision for any city to compete effectively and city management and approaches to marketing (Smyth, 1994) stressed the importance of a positive image in addition to the provision of adequate and appropriate infrastructure so as to attract diverse audiences. This is the key element of the Manchester City Pride Prospectus, and has helped in developing a two-fold strategy - one being to promote the city on a regional, national and international basis to secure interest, investment and jobs and the second being to promote the city internally to residents, to develop a strong

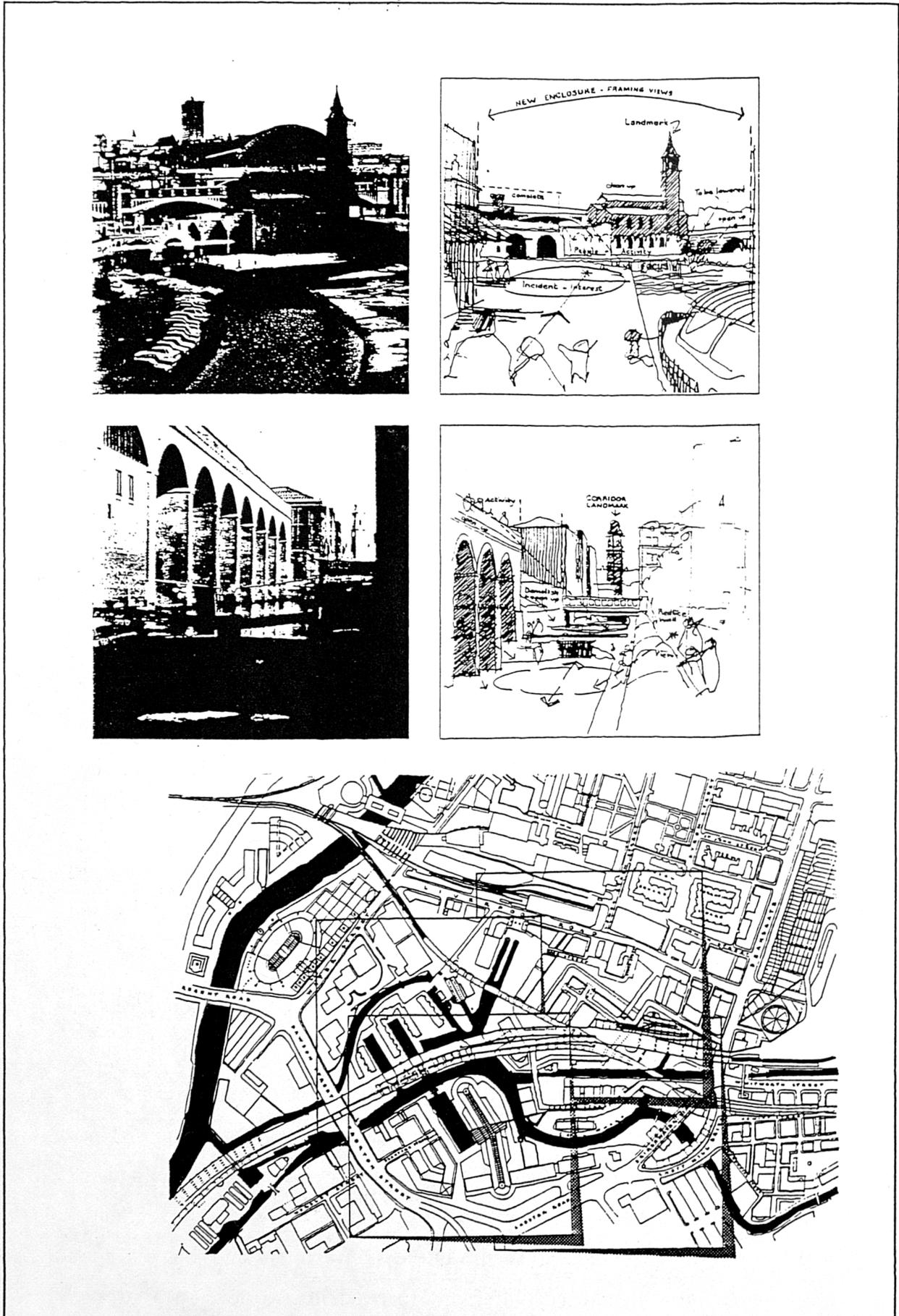


Figure 8

Manchester - the industrial city (Source: The Waterways Guide, Central Manchester Development Corporation, Building Design Partnership, Manchester 1989) Castlefield is one part of the Development Area where the design of every building and every element is important.

sense of civic pride and ownership of the city - within a ten year period.

As part of promoting the city of Manchester on a regional, national and international level the City Pride Prospectus identified the potential in such venues as the National Cycling Centre, the Victoria Arena and the International Concert Hall to attract visitors by hosting national and international events. The reasoning was that unlike cities and towns where heritage or cultural facilities provide the attraction for visitors and residents alike, it would be events whether sporting, cultural or environmental that would provide people with a reason to visit Manchester. Promoting the city internally to its residents involved finding ways to enhance civic pride as rightly, it is the residents who are the city's most important ambassadors. The Olympic Bid provided such a vehicle. Identification and development of strategic projects is therefore of paramount importance. Coupled with the formulation of a strategy, the initiation of a marketing agency was recommended to undertake promotional work, coordinate the efforts of other marketing bodies and liaising with economic initiatives to attract inward investment.

3.2.2.3 The working arrangements

The City Pride Advisory Panel comprised people drawn from a wide range of organisations, communities and areas of activity, from both public and private sectors, all with an interest and commitment to the future economic and social development of Manchester. It was chaired by the leader of the City Council and was involved in overseeing the production of the Prospectus as well as providing direction to the exercise. Building on the stimulus provided by the Olympic Bid and the subsequent presentation of the Prospectus to the Government in September 1994, the panel has been involved through Topic Groups, a broader cross-section of local interests and is considering the creation of a 'Development Guide for the City'. They have brought together the public, private and voluntary sectors to examine needs, problems and opportunities within particular areas of

activity.

3.2.3 London

London is Britain's capital City. As such it is the principal centre of government. It also enjoys a high profile in the spheres of tertiary education, retailing, art culture and entertainment, publishing, advertising, and international and national communications. Kennedy (1991) describes it as a city that boasts a rich cultural and multi-ethnic diversity having the potential to take the capital and the country into a leading role in an economically and politically reformed Europe.

The step into the third millennium marks a real turning point in the future development of Europe and its cities as one sees the implications of the single European Market and the changes taking place in the European Community's boundaries. London as a world city will inevitably be involved but is different in many aspects from other cities around the globe. Cities in the Third World may also be large - for example Mexico is one of the largest cities in the world - but at present their ability to control global markets as London can do is virtually non-existent. Kennedy (1991) in his study of London, comparing it with other world cities, brought out the point that their global performance was related to (1) their status as centres of financial and commercial activity; (2) communication and administration; and, (3) culture and knowledge.

London's role as a world city was firmly reflected in Abercrombie's thinking in 1943 and in the Greater London Development Plan (GLDP) of 1976. This vision is further enhanced and strengthened as revealed in the various documents, white papers and plans of the authorities such as the London Planning Advisory Committee (LPAC). The conceptual framework outlined in Advice on Strategic Planning Guidance for London (LPAC, 1994) revolves round the view that London should have an enabling infrastructure which would facilitate wealth creation, generation of jobs and a high quality of life (see figure 5) through a

four-fold vision: a strong economy, a good quality of life, opportunities for all and a sustainable future. These were viewed as inter-linked and inter-dependent components critical to the sustainability of a city and in particular to London's future as a world city. This is further elaborated in Kennedy's study (1991), where the focus was on London's future competitiveness as a world city and how can this position could be sustained and enhanced by appropriate urban policy framework.

One of the key factors in sustaining a city's development and growth is its continuing ability to create wealth. This is dependent on the emerging businesses of the '90s which, according to Worthington (1995) are less about manufacturing and more about services. Emerging businesses of the '90s include education and culture, health and fitness, leisure and entertainment, innovation brokerage, research and development, design and business support services and all these are important to the continuance of London as world city.

The city as we know it today is the result of centuries of evolution. The extensive war damage in London during the '40s was followed by a period of comprehensive redevelopment and rebuilding. Attention was focused on restoration and conservation alongside new construction. However, the City Corporation's attitude to conservation in the post-war ear has been spasmodic and inconsistent. For example, comprehensive redevelopment and traffic improvements have generally been accorded priority over conservation with special effort to improve the setting of only major historical set pieces such as St. Paul's and the Guildhall. It is now accepted that future development should respect the traditional character of the city; and this is reflected in the various re-development schemes that have emerged in recent decades.

Covent Garden Market stands out as an example of the success of sensitive re-development that resulted from a long drawn out controversial public enquiry. The Greater London Council (GLC) was at the centre of it. Public opinion

roused and channelled by committed professionals and community groups, also played a very important role. For a long time the market had been crippled by acute traffic congestion. It was scheduled to move to the south of the Thames by 1972. Recognising the opportunity for imaginative urban planning the three councils viz. The Greater London Council, Westminster Council and Camden Borough Council made new plans for comprehensive re-development with enormous office blocks replacing Covent Garden's famous 18th and 19th century buildings. This included large-scale projects that were to be an extension of the 'bright lights' of the West End. The area was to be redeveloped as a major shopping and entertainment route with offices, banks, restaurants and some housing at the upper levels. The degree of local participation and involvement was open to question. Anson (1981) describes the total lack of sensitivity on the part of the Consortium to the needs of the local community and, in particular, to the working class population which was to be displaced.

One by one, many of the working-class quarters of London have been invaded by the middle classes (Anson, 1981:182).

The struggle of the residents of Covent Garden was made highly viable by a number of street parties, theatre people, politicians and media. It became a typical example of confrontation in the sphere of urban planning and redevelopment.

3.2.3.1 Covent Garden: a perspective into its past

London, 'the unique city, as Rasmussen calls it, is steadily being straightened out, having its eccentricities corrected, its character impoverished, not only by piece-meal replacement but also by the well-intentioned doctrine of the clean sweep (politely called comprehensive redevelopment). It is being made to conform to a desiccated conception of what it ought to be like, with everything in compartments and no mixing by order. It is becoming just like anywhere else. What hope then for Covent Garden? (Browne, 1971:28)

But Covent Garden is not just anywhere. Apart from having been the central

fruit and vegetable market for London, it was also a place of historical significance and therefore required a special approach. Originally, it was the brain child of Inigo Jones who, in the 17th century, designed plans for the 'piazzas'⁸, but his original concept was modified by subsequent developments. Much later, Fowler's fine neo-classical market buildings of the 1830s dominated the piazza. More recently in the 1960s, the special nature of the site and the opportunity it presented for redevelopment has revived Covent Garden and its surrounding spaces.

3.2.3.2 The Redevelopment of Covent Garden

Covent Garden has many outstanding features and houses many special activities. It has been described as the place where one finds 'ballerinas and bananas cheek by jowl'. The juxtaposition of culture and commerce is one of the outstanding features of the area. Numerous special activities, many of which spring from these two sources, contribute to the variety and informality that distinguish it. Its original architectural features provided the historic setting for the new developments. These were sensitively designed and reflect Covent Garden's dual identity, based on culture and commerce. This was made possible by the ideological struggle against the developers mounted by the diverse groups of people.

The relationship between the Covent Garden area and the areas adjoining it was a major factor influencing the formulation of the redevelopment plan by the consortium of Greater London Council, City of Westminster and the London Borough of Camden. This was also an important factor in the reformulation of broad proposals for land use as well as specific development projects. Moreover the redevelopment plan included the construction of links across the perimeter

⁸Nicholl's drawing (Browne, 1971: 28) shows the original layout as a civic square of 1630, the first of its kind in London. It was bounded by arcaded buildings of equal height viz., 'the piazzas'. A Tuscan temple (St. Paul's church), rebuilt by Thos. Hardwick after a fire (1795) is axially placed and projects into the piazza.

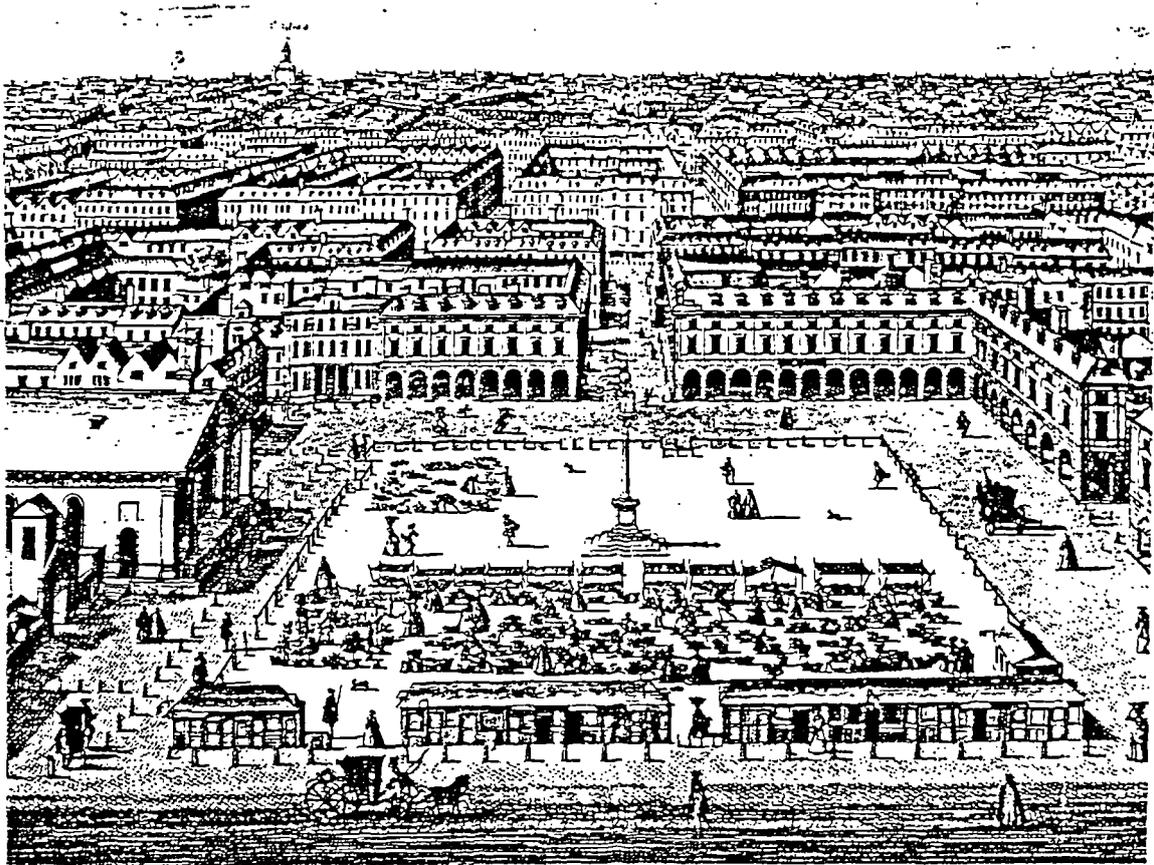


Figure 9 Nicholl's drawing of Covent Garden
(Source: Browne, 1971 : 28)

roads leading to other development areas (including Piccadilly Circus, Whitehall and the South Bank).

The major objectives outlined in the Covent Garden Area Draft Plan (CGADP) / 1968 were:

1. The creation of a vigorous and interesting environment by day and by night, both as a place to live and as a centre for entertainment and cultural activities;
2. A substantial increase in residential accommodation;
3. Provision of new public spaces including open spaces within individual sites;
4. To ease congestion in Central London, in particular by not undertaking major building or road construction enterprises;
5. To construct separate but integrated systems for pedestrian and vehicular movement within and around the area;
6. To integrate new development with existing land uses and to make provision for retaining suitable mixed uses of land that are appropriate for the area's special location and character; and
7. To retain those groups of buildings, including buildings of architectural and historic importance, that contribute substantially to the variety and character of the area.

One of the great levers for land acquisition behind the 1968 GLC plan for Covent Garden was provided by the fact that many land leases in the area came up for expiry during the early '70s. This proved to be convenient because land assembly and plans for subsequent massive redevelopment could be easily drawn up. This and other similar plans for redevelopment showed that the whole project was motivated by crude commercialism. Jacobs (1985) had fore-warned against such land speculation and insensible planning. Such a general warning

had particular relevance for the problems faced by Covent Garden in view of the fact that it had a long history of local vested interests deciding on matters of landuse, design, construction and related questions without taking into account the interests of the general public living and working in the area.

The 1968 Draft Plan showed no regard to the local community, sensitive social linkages, the local community's shared knowledge or the memories of their environment. But the private sector was enthusiastic about the plan because it promised profit. Then began the struggle of the GLC against the residents, small businesses and local workers led by Brian Anson, Jim Monaghan, Sam Driscoll, John Toomey and others. Following the Public Inquiry into the Redevelopment Scheme, with a sympathetic Secretary of State for Transport, the interests of the pressures of public opinion and local views were considered against the ideas strongly advanced by those whose main interest lay in comprehensive redevelopment.

The Secretary of the State was able to put the brake on comprehensive redevelopment in Covent Garden by means of legislation 'spot-listing' buildings. As the official communiqué of the Department of Environment put it,

...The Secretary of the State considers it of the utmost importance that the future redevelopment of the Covent Garden area, following the removal of the Market to Nine Elms, should take place in an orderly and planned manner...Conservation of the historic nature of the ...area, is the top priority stressed in a letter from ...Mr Geoffrey Rippon, to the Greater London Council today ... the Secretary of State is ... adding about 250 buildings of special architectural or historic interest in the area to the existing list ... In view of the special importance of the Covent Garden, and its key position as an area of major change in the centre of the capital city, the Secretary of State feels that he should maintain a closer liaison than usual with the Council over the progress of redevelopment with the CDA boundary...(quoted in Anson, 1981:176).

By such action, it was possible, to identify within the area of proposed comprehensive redevelopment, key strategic properties and spotlight them as

buildings of historic value. Many of these buildings came within sites that would have been prime targets for demolition and redevelopment. But due to spotlisting the areas surrounding them could not be demolished because of the value that accrued to them by virtue of their setting. Thus vast areas were saved from demolition.

The pace of events, during the year leading up to the shift to Nine Elms of the market, was so rapid that it was difficult to keep their significance in perspective. A particular course had been taken, the end result of which was that the GLC was to be responsible for the work relating to the restoration and rehabilitation of the market area, with the CGDC acting as the client and the Historic Buildings Division as the architects.

However, the apparent success of the fight against comprehensive redevelopment must be chalked up against the departure of the original residents of the area. As Anson has pointed out, the community attitude therein had changed. Those who ran the original fruit and vegetable market and other workers in low-paid employment, who had traditionally lived in that neighbourhood, could not afford the new up-market rents and had to go with the market for their work. The residents were slowly replaced by those who could afford the new up-market residences in refurbished historic buildings. The plans of the new commercial development took precedence over the continuing needs of the original residents; and this one-sided attitude deprived the scheme of a valuable resource.

...the identification and encouragement of community initiatives, on the premise that the most important resource of any area is the local community itself, whose energy and ideas (let alone knowledge) must form an integral part of any plan for the future (Rogers and Fisher: 1992 : 179).

3.2.3.3 Covent Garden in retrospect

Remarking on the resistance movement to Covent Garden's redevelopment, the Guardian wrote in July 1971:

The community's grass-roots network would do credit to a war-time resistance movement.

By the same token, the Morning Star drew attention to the extent of commercialism and to the intense speculative interests of property developers in the redevelopment of Covent Garden.

Covent Garden is the last piece of unexploited real estate in Central London, and both the GLC, and their friends the private developers, stand to make a lot of money out of their jointly conceived project.
(Anson, 1981:70)

The above two passages provide an indication of the lessons that can be drawn from the experiences of Covent Garden redevelopment. These relate to (1) the positive power of action-orientated public opinion and (2) the destructive influence of speculative private developers if left unrestrained. Restraint, in the case of Covent Garden, took the form of imposition of government control by spot listing.

A study of the financial appraisal of the Draft Plan for Covent Garden (1968), showed that it included provisions for redevelopment by a variety of public and private organisations. It was constantly scrutinised during the course of the actual work with the main aim of reducing the initial capital costs that the local authority would have to bear. However, a comprehensive redevelopment in this part of London would only permit a certain degree of alterations which could be on the basis of such factors as:

1. the availability of blocks of land which might be acquired in order to pool together their different holdings;
2. the closure of streets not in conformity with the planning layout; and
3. securing land for multi-use development.

The proposals for public development took into account existing public ownership and availability of market lands, use of low-value areas less suited to private development, and the importance of keeping public acquisition to the

minimum necessary to realise the major objectives of the redevelopment scheme.

Taking the scheme as a whole, the total cost of acquiring and preparing sites for redevelopment (£71½ million, including land to the value of £10 million that was in local authority ownership) was roughly equal to the capital value of the sites for the proposed redevelopment (£71 million). Whilst the value of the lands to be redeveloped by private bodies exceeded the costs involved, the reverse was true (to an extent of £3 million) in respect of the lands for redevelopment by the local authorities. However, local authority costs included the costs of all roads and pedestrian ways, public utility diversions, new water mains and the laying out of new public open spaces as well as the current market value of the land in their ownership.

After years of surveys, discussions, meetings, legislation, negotiation and adaptation, Covent Garden as we know today constitutes a fine balance between commercial activity and cultural built heritage.

In retrospect, it can be said that the aim of increasing residential accommodation under the 1968 Draft Plan, gave rise to a new community, thus highlighting an important factor in successful redevelopment. This is in contrast to the experience of some downtown areas (Jacobs, 1984; Sherlock, 1991).

In spite of the economic pressures to build on any available land, the retention of open areas providing a 'breathing space' in an otherwise crowded environment is one of the valuable features of this redevelopment, and shows that money is not always the deciding factor in such major schemes.

In a restoration project on a large scale, involving complex situations and attitudes, the end result is not just the preservation of historic monuments, but that the new balance involves new uses to which the buildings themselves are put. Any restoration project, may well involve a radical transformation of its

original use. In order for such a transformation to be socially and architecturally appropriate, steps should be taken to ensure that the space is continually in use.

Covent Garden is undoubtedly one of the well known examples of a phenomenon that swept the urban areas of the western world during the late '60s. It is comparable to the transformation of Les Halles in Paris and of the Nieumarkt area in Amsterdam. Booming economies meant that astronomical profits were to be made from drastic redevelopment in city centres. It can be said that:

...there was an unholy alliance of politicians, profiteers and planners who in effect, declared a war in which the bulldozer was substituted for the bomb (Anson, 1981:14).

Often decisions were taken before the threatened communities (many of them the inner-city poor) could voice their protest. The Covent Garden community, for a variety of reasons, was better organised than most. The bulldozers could be stopped by community activists at the very gates of their territory.

The Covent Garden struggle is today generally regarded as a phenomenal success: an object lesson in how to resist a system which accords disproportionate importance to economic factors. The GLC was forced to abandon its thoughtless plans for the area and compelled to assume a more human approach to its development. The historic area, that faced obliteration in 1971, survived in the event.

3.3 Summary and Conclusions

The conservation measures at York, the inner-city regeneration at Manchester, and the redevelopment scheme in Covent Garden share a common feature. All three were brought about by the process of change; at the same time they took account of the past. Any rational redevelopment project must therefore intelligently deal with dilemmas that straddle the barrier between economic

worthwhileness and the social priorities of public projects (e.g. housing, conservation projects, defence, infrastructure).

The criteria underlying the choice of such projects and how the cities concerned have been benefitted are brought out in this chapter. The debate on the impact of redevelopment on communities living in areas affected by it was fascinating because they tackled questions never before faced. It also poses theoretical challenges in the sphere of building re-use. Such projects invariably point to an upsurge of interest in preservation and in the desire to rejuvenate familiar places rather than in tearing them down. In each instance, as in the case of Covent Garden, a historic building has been used for retailing, with an emphasis on small quality traders rather than multiple dealers or commerce dealing with huge quantities of merchandise. There are now sufficient examples of this kind of conversion for the developers and estate agents to approach their task in a sensitive manner. Also there are signs that successful conversion is governed by elementary rules. They may come in handy to those who argue in favour of *development through conservation* in other places - in this case, Madras and the Heritage Zone within the city.

From a comparative discussion of York, Manchester and London, it would appear that in these three different situations, three strategies were evolved and all of them were successful to a large degree. In the development of Madras, a further criterion also needs to be taken into account. As in most developing countries, where food, clothing and shelter are the prime needs, conservation has to be related to economic factors and to economic viability. The prospect of economic regeneration must needs be kept in view. This may well be applicable to the British examples, but the difference lies in economic and social context. What comes to light from the experience of the three British cities is the economic diversity and cultural dynamism that contributed to the success of each and made it unique.

Chapters 4 and 5 present the material relating to Madras with a view to identifying opportunities for and constraints against it. Development in the city of Madras is first reviewed in order to identify and outline its area of emphasis, assets, potential and problems. The outline of a Heritage Zone - Mylapore and Santhome - is then presented. Chapter 6 outlines the lessons learnt through the study of the three British cities. An indication of the relevance of Madras as a whole as well as the Heritage Zone is also contained in the chapter.

PART II STUDY AREA

Chapter 4

THE CITY OF MADRAS

Chapter 5

AN URBAN STUDY OF MYLAPORE AND SANTHOME

CHAPTER 4

THE CITY OF MADRAS

*Madras - the setting for the case study area and for applying the thesis of
development through conservation.*

"We had come to Madras, which we both love, although it is hard to say why. This birthplace of the seventeenth and eighteenth century commercial Raj is now spoken of by non-southern Indians rather as the English speak of Wigan. My grandfather's copy of the ninth edition of Encyclopedia Britannica of 1883... "The inhabitants are laborious, frugal, pleasure loving, omnivorous in diet, quite uneducated, and very fanatical..." In spite of all this, I have a sort of trust in Madras, I like its dimensions, the lowness of its buildings, the half-hearted nature of its enterprise, its steamy heat, its good-natured acceptance of its provincialism. Madras has not the second-hand self-importance of New Delhi, nor the hysterical ugliness of Bombay, it is a million miles from the despairing horrors of Calcutta. It is an agreeable, rather boring place; it is the sort of place I would be if I were a town" (Cameron, 1987).

4.1 Introduction

The paragraph quoted from Cameron's book shows how different Madras is from Delhi, Bombay or Calcutta, the three other major cities in India. It is no longer a "rather boring place" and its distinctiveness rather than its conformity to some universal norm, deserves recognition. In addition its historic importance and economic potential have made it worthy of this study.

Madras can well be taken as an example of *historical evolution* as described by Middleton (1987) and it contains yet unmanifested characteristics of world cities as laid out by Peter Hall (1966) in his book, "World Cities". The city through its long history, has experienced various stages of development, and is today a repository for many values and historic cores where indigenous activities and traditions have been retained; and there is also rich potential for capitalization through appropriate development.

In the previous chapters, having explored the apparent conflict between conservation and development and the need for a more comprehensive concept in which heritage is considered as an important resource, it has been concluded that there is no universal model for development. Various experiences in the three cities provided different approaches to urban regeneration like the *means for the management of change* in York, *measures to revitalise economies* in Manchester and wealth-generating measures, jobs, income and infrastructural provisions *providing a good quality of life* Covent Garden, London. This chapter looks at Madras in the light of the experiences of these cities.

The aims of this chapter are *first*, to review the historical development of Madras, the reasons for its present importance and the various agencies that have been involved in its growth. *Then* a case is made for this further study of Madras and the need for realising its potential. As in many other historic cities, its long-standing urban traditions are not yet accepted by experts and professionals as 'historic', 'heritage' and 'valuable'; and too often the recognition of the merit of the city is confined to the scattered archaeological, monumental and religious sites and edifices. *Thirdly*, the scene is set for identifying the potential assets in the Heritage Zone of Mylapore and Santhome in relation to the city. It will then conclude with the justification for studying this small area within the city.

4.2 History of Recent Development in the City

Madras is a city whose international commercial connections started with the establishment of a trading port by the East India Company in 1639.

Fort St. George where a city was born has seen it all. The merchants who first settled behind its walls, founded a city that has remained true to its commercial beginnings to this day (Muthiah, 19990 : 28).

The commercial connections also involved forces of growth that are directly related to the socio-economic growth of the city, such as increasing population

Growth of Madras City, 1901 - 1981

Year	Area for which the population is given (sq.km)	Population	Decadal variation in population (%)	Annual compound growth rate for population for the decade
1901	127	552,899	-	-
1911	127	575,377	+ 4.07	0.40
1921	127	591,536	+ 2.81	0.28
1931	127	733,552	+ 24.01	2.18
1941	127	881,485	+ 20.17	1.85
1951	127	1,516,056	+ 60.64	4.85
1961	127	1,729,141	+ 22.11	2.02
1971	127	2,469,449	+ 42.81	3.63
1971	172	2,572,896	-	-
1981	172	3,266,034	+ 26.94	2.41

Source: Census of India (1961 e); p.4, (1971 b), (1981).

Population growth in different zones of Madras City, 1961-1971

Zone	Manufacturing Zone	Trade & Commerce Zone	Old Residential Zone	New Residential Zone	Madras City
Population in 1961	624,153	286,801	538,357	297,830	1,729,141
Actual population in 1971	940,252	283,705	664,079	581,413	2,469,449
Corrected population in 1971	984,606	252,481	668,840	555,925	2,461,852
Area in 1961 (sq.km)	39.07	9.38	26.69	52.13	127.27
Area in 1971 (sq.km)	37.31	10.54	26.50	54.52	128.87
Population density in 1961	15,975	28,657	20,171	5,713	13,586
Population density in 1971	25,201	26,917	25,060	10,504	19,162

Source: Growth of the Madras Metropolitan Area The Demographic Profile, A Research conducted by the Times Research Foundation, Madras Metropolitan Development Authority, October 1991, p. 1,22.

Figure 10 Growth of Madras City

and agglomeration of work force into the industry and service occupations. Here we will outline the development of the city and a more detailed résumé is provided in Appendix II.

The growth of Madras city has not taken place at a uniform pace over the last eight decades and different parts of the city have grown at different rates. It has recorded a population increase from 55,899 in 1901 to 3,66, 034 in 1981 as shown on the opposite page. (The year 1971 occurs twice in the table as it was the year that the area for the city's jurisdiction expanded from 127 sq.kms. to 172 sq.kms.) Statistics show that in the last three decades, the congested central parts of the city are either being depopulated or stagnating while the outer periphery of the city has been growing at a rapid rate and apparently seems to act as a filter for migrants aiming for Madras.

It is clear from the tables opposite that the Trade and Commerce Zone which is the Central Business District (CBD) of the City, after being stagnant, has become depopulated during the last decade; but it is still the densest zone. The old Residential Zone has also been stagnant, registering just about 2 per cent annual growth of population over the decade. In sharp contrast, the outer fringes of the city have registered a very high rate of growth particularly in the New Residential Zone. This dispersal had its roots in the planning policies that promoted decentralisation to the new towns (refer Appendix II).

The effects of decentralisation and containing the urban population has already been felt in many world cities such as London, New York and others, which have led to "underclasses", social polarisations and deprivations for the ethnic minorities and under-privileged (Kennedy, 1991).

Now as such cities recognise the value of keeping the inner cities populated, planning policies for cities such as Madras should reflect this new thinking and take suitable action so that the same mistake does not recur here.

Overall growth in any city brings with it an influx of population from the

neighbouring areas which results in housing problems. If new housing is not provided, the result is further overcrowding and the creation of new slums and squatter settlements in already congested inner districts. Employment, transportation and infrastructure soon add to the strain of accommodation in already congested areas. The climate of economic growth creates pressures for renewal of central areas so as to accommodate more intensive commercial uses of land; but the overcrowded and worn out residential areas, which invariably exist around the central core, are left untouched unless the community or local government moves in to redevelop; and that brings in problems of land acquisition and finance. The growth of the city thus rapidly outruns the existing means of government and defeats any attempt at reform. Reference to this train of thought has been made by many authors (Bairoch, 1988, Correa, 1985; Lichfield, 1992; Feilden, 1989; Girardet, 1992; Lynch, 1981, Middleton, 1987; Devas and Rakodi, 1993; Sherlock, 1991; and others).

Although there are common problems experienced by most cities in both developed and developing countries, the magnitude of the problem is mostly witnessed in the latter, where the massive scale of the challenge is matched by a lack of a holistic and co-ordinated approach to development and urbanisation. The accelerating pace of modern life coupled with the industrial and later technological revolutions of the twentieth century have subjected urbanisation to various pressures such as obsolescence, adaptation, replacement, etc. (Lichfield, 1988).

The gap between this process of change and adaptation in the continuous process of city living and the lack of the holistic approach is very evident in the relatively recent urbanisation process of Madras as seen from both a historic perspective and by its present trends of development.

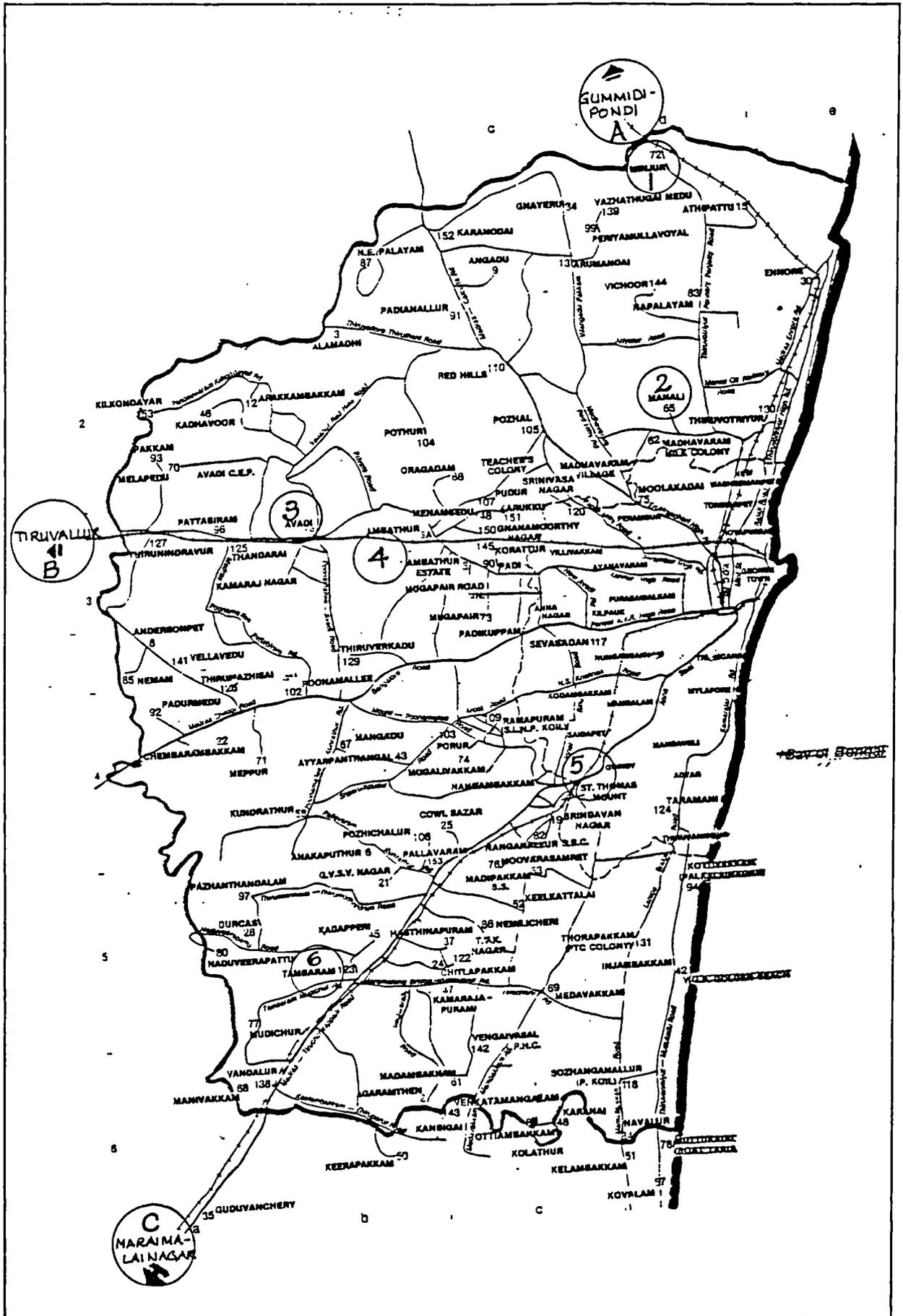


Figure 11 Madras city - the three satellite towns and the six urban nodes. A. Gummidipondi, B. Thiruvallur, C. Maraimalai Nagar, 1. Minjur, 2. Manali, 3. Avadi, 4. Ambattur, 5. Alandur, 6. Tambaram

4.3 Urbanisation and Changing Character of Development

Rapid growth creates enormous problems of land-use competition, transportation and urban renewal. The urban growth policies for the city of Madras fall into the following broad classifications:

- land use and spatial planning issues in the Madras Metropolitan Area, related to development controls, enforcements and legislation
- development initiatives
- shelter management
- services, infrastructure and environmental concerns

The first Master Plan after Independence for the city of Madras in 1977 produced by the MMDA was based on a dispersal strategy emphasising a policy of urban containment. The measures were restrictive in nature with the stress being on control rather than guidance. The strategy identified areas that exhibited wide disparities in development and proposed to restructure them with balanced development by imposing restrictions on density and population growth in both the city and areas of industrial and commercial developments within the MMA. The realisation of this came through the development of radial corridors linked to the three satellite towns (Gummidipoondi, Thiruvallur and Maraimalai Nagar shown in Figure 11), that were expected to be self-contained communities in respect of housing, employment and commerce. This plan was also to relieve the congestion in the core of the city, disperse the flow of traffic along the major arteries and absorb a major part of the population intending to migrate to the city in search of employment.

Furthermore six major urban nodes on the periphery of the city along the transport corridors were identified where urban development was already taking place and where a minimum level of infrastructure was already available for optimisation. The policy of restricting the density in the city proper also involved dispersal of certain wholesale and commercial activities that were otherwise

Estimated Housing Demand
Annual requirements: 1991-2011

	Madras City	MUA Towns	Total
Low income groups	6,700	11,300	18,000
Middle and High Income Groups	5,100	8,900	14,000
Total	11,800	20,200	32,000

Rate of Growth of Population for Madras City, Satellite Towns and Rural Areas in Madras Metropolitan Area: 1951-1981

Year	Madras City		MMA		Satellite Towns		Rural Area in MMA	
	Area (sq.km)	Pop. in mil.	Area (sq.km)	Pop. in mil.	Area (sq.km)	Pop. in mil.	Area (sq.km)	Pop. in mil.
1951	127.00	1.416	1166.80	1.91	373.27	0.265	666.52	0.223
1961	127.00	1.729 (2.21)	1166.80	2.358 (2.346)	373.27	0.345 (3.019)	666.53	0.284 (2.402)
1971	127.00	2.469 (4.28)	1166.80	3.419 (4.5)	373.27	0.616 (7.855)	666.53	0.334 (1.761)
1971	172.00	2.573 (-)	1166.80	3.419 (-)	373.27	0.616 (-)	621.53	0.23 (-)
1981	172.00	3.266 (2.693)	1166.80	4.629 (3.539)	373.27	1.004 (6.299)	621.53	0.359 (5.609)

Note: Figures in brackets give decadal variation in population.

Source: Nagaraaj, N., & Ramani, R., (1991). Growth of Madras Metropolitan Area: The Demographic Profile. A research programme by The Times Research Foundation for the Madras Metropolitan Development Authority, Vol. I, p.138.

Figure 12 Rate of growth of population for Madras City, Satellite Towns and Rural areas in MMA

adding to the congestion by virtue of being carried out in the Central Business District (CBD) which includes the oldest quarter of the city namely George Town.

A review of the Master Plan suggests that the new town strategy was not very effective in arresting the immigration wave into the city and even the limited projects taken up were impeded by land acquisition problems, administrative bottlenecks and failure to generate enough internal resources. Relocation of fruit, vegetable and steel wholesale markets had been identified for transfer but this had hardly started by 1990. The combined bus and truck terminals at three locations on the main radial arteries (land for two of which has now been acquired in the 1990's) are yet to take off, but there has been some improvement in bus and suburban rail services. This has resulted in the population settling along these transportation corridors, even in locations far beyond the identified urban nodes. Piecemeal housing developments, some independent, have come up without any integration to the infrastructure systems, and often lacking in essential services. A rough figure of the MMDA suggests that annually 400 acres of agricultural land is being converted into residential plots which raises further questions for the future.

With the rapid increase in population density in Madras (refer figure opposite), housing has inevitably become a major issue and needs to be given top priority. Also the pattern of housing has been changing dramatically as seen in the increase in the so-called slum population, inadequacy of infrastructure (see 6.7.3) and serious over-crowding in some areas. The causes and evolution of the problem are beyond the scope of this research but the following have been highlighted by Menezes (1991):

- 18 per cent of the total number of households in the Madras Metropolitan Agglomeration (MMA) live in slums.
- there are roughly 20,000 households living on the pavements and streets of Madras.

- 27 per cent of the housing type in MMA may be classified as *kutcha* and *semi-pucca*.
- As far as tenure is concerned, renters predominate in Madras City; for every 2 families living in their own houses, there are 3 families living in rented accommodation.

There have been serious deficiencies in key service sectors, particularly water supply, sanitation and shelter. Investments in utility services have failed to keep up with the increasing population, resulting in large populations being housed in poorly serviced slum settlements. Some attempts to redress these situations have been made through urban development programmes oriented to the extension of basic services to the majority of poor families.

Further, according to Menezes (1991), the Madras Urban Development Programmes (MUDP) I (1977-81) and II (1981-88) have concentrated on:

- shelter - mainly sites and services schemes and slum improvement projects. 28,000 plots under *Sites and Services Schemes* have been provided under the two projects, basic infrastructure services provided to 85,140 families, secured land tenure through lease-cum-sale agreement to 42,547 families, and 29,276 families given home improvement loans to put up their own shelters.
- employment - provision of sheds for small and cottage industries at appropriate locations to facilitate employment and training schemes and developing skills. About 9000 jobs have been generated through 350 new small industries and 47 cottage industries.
- basic services, infrastructure and assistance - there has been the formation of 17.5 kms of inner ring road, upgrading 14.5 kms. of trunk roads, construction of 9 pedestrian subways, 7 bridges, etc. Under public transport 850 buses have been procured and 4 bus depots, 8 terminals and 400 passenger terminals constructed. There has also been improved child care, maternity and child welfare services to urban poor families.

The housing market directly affects urban development especially through its influence on the labour market and through the prices that people have to pay for their housing, the ease of access for new entrants into the housing market, and the quantity, quality and location of housing investments. In European countries, these are affected more by central than by local government policies, whereas in India, the announcement of a national housing policy by the Central government with the establishment of a national housing bank and decentralised offices has made it easier now to access finance for the housing sector at affordable rates. Besides Central and State Governments which make budgetary allocations for housing, financial institutions like the Life Insurance Corporation of India, the General Insurance Corporation of India, commercial and co-operative banks and provident fund organisations whose main business is not housing, are now providing funds.

To lure private investment into the housing sector, a package of fiscal and monetary policies and a re-oriented system for levy of taxes have been evolved by the Ministry of Urban Development. The incentives include a contractual savings scheme for small savers and other schemes to mobilise savings, reoriented credit norms, tax-free bonds, capital gains to facilitate flow of urban real estate gains into housing, new lending norms for the Housing and Urban Development Corporation (HUDCO) and concessions on house building loans for all. These policies aim at an average investment of about Rs. 15,000 crores (£ 3 billion) per annum from public and private sectors into the housing sector (Gopalakrishnan, 1991).

Full utilisation of the Madras Metropolitan Area's share of all these resources is still inadequate to tackle the colossal housing shortage and is projected to continue into the next millennium as shown in figure opposite. In order to satisfy the projected demand by the year 2011, allowing one dwelling unit per family, the present level of production of 21,000 per annum must be enhanced to 32,000 (Gopalakrishnan, 1991). Besides new construction other means of improving the

situation will be by maintaining the existing and rebuilding the dilapidated stock. The needs of those with *semi-pucca* and *kutchha* shelters living without minimum basic amenities have also to be addressed and their neighbourhood and environment improved.

Another major problem is the insufficiency of services, infrastructure and environmental inadequacies.

...with 35 litres per capita of drinking water supply, the city has the lowest supply of drinking water among the cities of the world of comparable size. ...the number of people who have no access whatsoever to any form of safe and dignified sanitary facilities is calculated to be a phenomenal 1 million out of a population of 3.8 million in 1991. ...the main waterways (save one) running through the city, which till 5 years ago were used for navigation, fishing and recreation are today polluted to a degree which international experts say has few parallels in any urban waterway anywhere, with BOD levels of 100 mg./l to 600 mg./l (Menezes, 1991).

The one encouraging aspect of Madras's services and infrastructure is its transport and communication links. The strength of Madras's public transport is its fleet of buses and the suburban railway catering to almost 90 per cent of its residents. The 8.4 km. stretch of the Mass Rapid Transit System, presently under construction, is to complement the existing systems and relieve their load. Consistency of funding over a long time frame is a crucial factor that is lacking and needs to be followed up. Along with this should come an integrated transport network, perhaps as in Paris where a regional master plan integrates all the city's various forms of transport.

The appeal of public transport services would be greatly enhanced if users were required to pay once for a whole complex journey rather than separately with either controls or incentives like zonal fares or period travel cards and others (Kennedy, 1991).

4.4 Controlling Factors in Development and Conservation

The changing character of development and piecemeal developments in the MMA suggest that future policies should be aimed at guiding developments

rather than accepting the MMDA's role of controlling them. Also current policies and programmes need to be frequently reviewed to allow for the changing developmental scenario; and already the landuse planning advocated in the Master Plan has had to be adapted in certain situations in response to specific requests. The Development Control Rules (DCR), have also undergone several changes in response to changing aspirations, expectations and requirements of the people and their interests.

Evolving views on urban planning have;

Encouraged a shift of emphasis from conventional town planning (designing of comprehensive land use plans), towards the initiation of wide-ranging and policy-oriented research and analysis requiring contrasting and changing clusters, patterns and flows of activity not necessarily focused on land uses (Sivaramakrishnan and Green, 1986).

Such changes in the developmental scene in MMA and the problems it is facing seem to suggest;

Differently oriented activity may in fact be concerned mainly with defining development problems and goals in the economic and social context; such activity includes the design and appraisal of related action projects and extends to learning by assessing performance (Sivaramakrishnan and Green, 1986).

As far as conservation is concerned, so far little attention has been given to it in India. The Archaeological Survey of India is the only central or federal agency and this looks after the nationally important monuments. Within the states their respective State Departments of Archaeology take responsibility for the less significant monuments; while State Departments of Town Planning are involved in making overall development policies for the entire state. In addition to these bodies, Delhi and Bombay also have an Urban Arts Commission, which controls and regulates proper growth in those cities; Madras does not have an Urban Arts Commission but does have a regional chapter of INTACH (a non-governmental organisation) looking after conservation related issues. There are also various local pressure and activist groups.

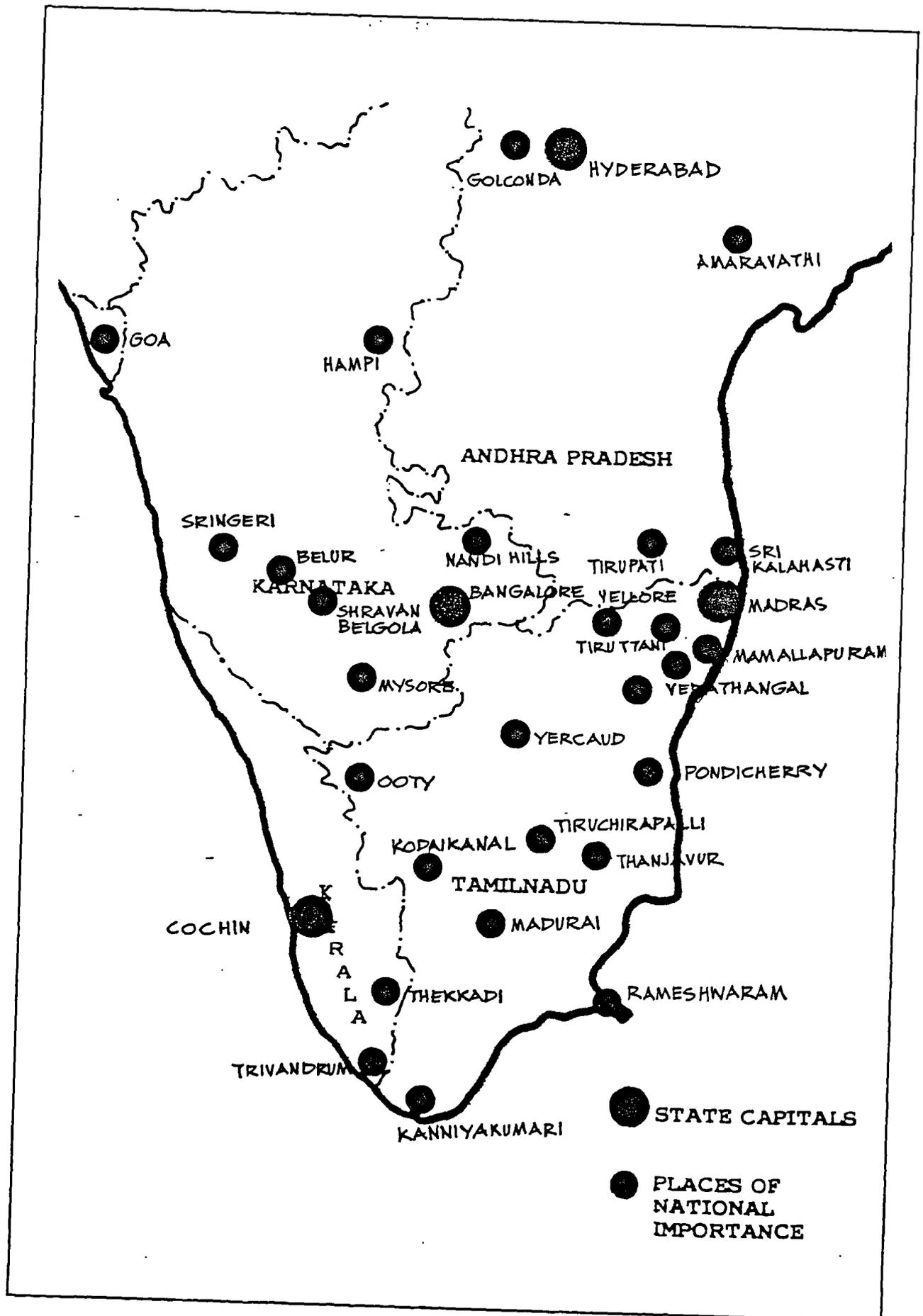


Figure 13 The Four Southern States - places of international and national importance

4.4.1 The Government Agencies

a) The Archaeological Survey of India (ASI)

This organisation is one of the oldest institutions in the country and has until recently been the only agency concerned with building conservation. Major dates and events in Indian Conservation history are listed in Appendix I and within its life-span of over a hundred years it has seen high and low points according to the whims of the Viceroys and the prevailing political situations. After the Ancient Monuments Preservation Act of 1904 and with the emphasis on archaeology under Sir John Marshall, it has never been able to replicate its past achievements in relationship to building conservation. According to Ray (1990), since 1945 this may be attributed to the abolition of work services provided by the Public Works Department (PWD) under Wheeler, the then Director-General of ASI. Since independence in 1947 the Indian Government has given only low priority to the repairs and maintenance of the country's cultural heritage, as is evident from their annual budgets and the Five Year Plans (Muthiah, 1987). However recognition and credit have to be given to the vast amount of work the ASI has done in conservation and there are few similar organisations to the ASI in other parts the world.

The main work of the ASI is now confined to monuments and public buildings; and architects, and in particular conservationists, have little or no say in its activities. The present functioning therefore suggests that the weakness of the organisation is that it works in a very self-governing and isolated manner which is not conducive to the present day expanding field of conservation. It needs a much stronger involvement and input from professionals.

In the jurisdiction of Madras and the suburban districts, the ASI has many nationally protected monuments like the Rock-cut Temples and Rathas at Mahabalipuram, the adjoining Shore Temple, Tiger Cave, Temples at Tirukaligundram and others. Figure 13 shows places of international, national,

state and regional importance in the four southern states in India. Mahabalipuram with its many rock-cut structures has been recognised as a World Heritage Site; but sadly the recent interventions to these monuments show the inappropriate use of cement, reinforced concrete and adhesives for repairs, which go against all concepts of conservation.

b) The State Department of Archaeology and Museums

This department is responsible for protecting ancient and historical monuments in the state other than those declared as of national importance by parliament. The main functions of the department like the central ASI is the survey of monuments, preservation and conservation of monuments less than 100 years and more than 50 years old, exploration and excavation, epigraphy, numismatics and other treasure troves, publications such as excavation reports, monographs and photographic record of monuments of antiquity. The department though organised on the same lines as the central ASI is totally independent in its functioning and administration.

c) The Tamilnadu Town and Country Planning Organisation

This department looks after urban and regional planning of the state through the preparation of regional or urban development plans based on specified land uses, zoning and sub-division regulations. Under the Tamilnadu Town and Country Planning Act of 1971, this organisation has powers to acquire any private land that is notified in the Development Plan and has been designated for public use. Until recently the trends of such organisations have been to neglect the historic cores, concentrating on comprehensive land-use plans, and applying the planning and development principles of the early twentieth century. This uni-dimensional approach did not consider the views of the local people nor take into account the concept of Heritage Zones and sustainable development.

The Town and Country Planning organisations have nominal provision for preservation of features, structures and places of historical, natural, architectural

and scientific interest but as Guzder (1993) has commented

[This]...does not make any provision for taking suitable actions to implement proposals for conservation of these buildings, nor does the Act include, in its meaning of development, works of normal repairs... Most important, the demolition of a building is not included in the term "development" so no permission in the normal course need be sought for the demolition of a building even if it were listed.

d) Madras Metropolitan Development Authority and Madras Municipal Corporation

Constituted in 1975, the MMDA prepared its first master plan in 1977. The duties, powers, responsibilities and the legislative frameworks of both the MMDA and the Madras Municipal Corporation were discussed earlier in Sections 1.3.1 and 4.3.

e) The Public Works Department

Established after the consolidation of British rule in India around 1860, this department undertook all types of government work, ranging from conservation to new constructions. It may be said that this department is responsible for the slow death of the existing tradition of native master craftsmen. After Independence, the department's decline started and at present it is reduced to a bureaucratic, engineering organisation, looking after government buildings and some new constructions. Post-Independence PWD architecture is reflected in *Ezhilagam*, built next to some of the fine examples of Chisholm's Indo-Saracenic architecture in Madras, the buildings of the University of Madras including the Senate House, and the present headquarters of the PWD itself.

4.4.2 Voluntary pressure/activist groups

These organisations have played a significant role in crusading for the conservation movement in India. Many of them started as watchdogs, who publicised indiscriminate developments and destruction of built heritage. Such organisations today have become mediators between pro-conservation

professionals and some organisations with a narrow-minded vision of short-term economic gains averse to the movement .

a) **Indian National Trust for Arts and Cultural Heritage (INTACH)**

Started in 1984, this organisation has experienced various stages of growth, consolidation and communication. With its headquarters in Delhi, its network extends to 144 Chapters, located in 5 States and 6 Union Territories.

...Its present role incorporates that of a voluntary organisation with fluid variable objectives, foremost among which is the creation of awareness of the urgent need for conservation of our natural and cultural heritage. The organisation also has a very important role as a professional body that undertakes the listing of historic buildings, identifies heritage conservation zones, takes up conservation projects, lays down guidelines for design, frames training schemes for building up expertise in the field of conservation, awards scholarships and stipends, proposes appropriate legislation, develops close liaison with related government ministries and departments, as well as international organisations like ICOMOS, the World Heritage Commission, ICCROM and IUCN. Arising out of these objectives is another function which the trust seeks to perform, namely that of a watchdog and a catalyst in matters pertaining to preservation of both the natural and cultural heritage (Thappar, 1994).

4.4.3 Sources of funding

The skill, or genius, of the designer and the artist will come to naught if it is not supported by the hard discipline of financial realities. We need to work as much, if not more, on economic and financial policies and implementation as we do on the more attractive and familiar occupations of architecture and urban design. Only the former can turn the latter into realities (Serageldin, 1980).

This statement is particularly true in developing countries where there is a scarcity of financial resources and foreign exchange reserves. The role of the government and possible involvement by the private sector in housing and infrastructure is discussed earlier in Section 4.3. A closer look into the situation (Gopalakrishnan, 1991 : vol. 1, 120 -162) suggests that allocating funds to various

needs is a process of continuous trade-off between priority and political acceptability.

In the case of Madras and its proposed Heritage Zone, much of the built environment is the responsibility of either the central or state governments and both are pressed for finance. There are a limited sources of funding in the form of foreign aid through loans, international campaigns or grants. But with few exceptions most of this aid is directed towards government institutions in the form of studies and research projects which are far from practical or of benefit to the local community. These then become objects of scepticism and lose any remaining public appeal.

The field work for this research along with the earlier pilot study of INTACH (detailed in Chapters 5 and 6) have shown that there is potential for private sector financial involvement along with that of voluntary organisations and civic societies. The role played by the religious authorities such as the Hindu Religious Endowments Boards and Devasthanams, the authorities of the Basilica and Churches and Mosques in addition to the maintenance and upkeep of the Temples, Churches and Mosques is at present minimal. But the presence of the latter and their particular demands as for religious processions in the Heritage Zone, could be a potential to involve them in the upkeep of the surroundings. Most churches have welfare schemes and community outreach programmes and their integration and support could be solicited for certain schemes within the conservation zone.

Similarly, there are a number of voluntary, non-governmental and civic societies and agencies involved in providing public amenities such as drinking water points and pay-and-use toilets. These along with philanthropic and charitable institutions within the Heritage Zone such as the Ramakrishna Mutt and Andhra Mahila Sabha and other community civic societies can be included as potential sources of revenue.

4.5 Summary and Conclusion

Following on from this consideration of the current development and conservation practices in India and Madras in particular, and the influence these two are having on building and shaping cities for the future, the value can be seen of the growing Western practice of simultaneous discussion of both. This is moving towards enabling infrastructure, community participation and delivering local benefit alongside development; and this not only provides continuity for its residents and generates economic advantages but also projects the city on an international stage. Today as India opens its doors to foreign investments, cultural identity and integrity is being exposed to Western expectations of capitalism and market-oriented economies; too often this overlooks the cultural and socio-economic needs of the residents in favour of increasing the commercial potential. It seems therefore that conservation in India has to take up a much broader spectrum in the planning process and be a force in itself. The basic criterion for future *development through conservation* will then be mainly determined by its value and utility to the local community.

Having discussed the levels of intervention and their impacts on the urban environment in Madras, what has come to light from the cities of York, Manchester and London, is the different roles they play in policy making. It is also apparent that comprehensive master plans that attempt to deal with all problems at the same time on a wide scale are entangled by the complexity of the situation. This has proved to be true in some individual small projects, e.g. the Shore Temple and the Rock-cut caves in Mahabalipuram, while major studies and master plans for the area have failed to leave the shelves. Attention should therefore be focused on smaller projects that benefit local communities and bring out the inherent strengths by local participation. These need to be based within a clearly defined overall vision, which is given a realistic phased programme for achievement.

It may therefore be concluded that smaller areas of intervention which can respond to the socio-economic structure are more likely to be successful. So taking small areas within Madras with historic, commercial, educational, industrial or other potential and regenerating them within the framework of an overall vision for Madras seems the most appropriate way forward and the next chapter - an Urban Study of a Heritage Zone in Madras - does just that. It focuses on the heritage and socio-cultural importance of the unique area of Mylapore and Santhome and its struggle between development and conservation, between modernisation and cultural sustainability.

CHAPTER 5
AN URBAN STUDY OF MYLAPORE
AND SANTHOME

*Urban structure and conflicts between development and conservation
in a Heritage Zone*

*It stood there
With only time as a friend
No one cared for it
Patiently waiting for its end*

*People came and looked at it
Threw stones and bricks
It had nothing for itself
Nothing but blows and kicks*

*It remembered the Maharana and his kin
All the long-lost grandeur
The pageants and festivals
Now life - blander and blander*

*It overheard a rumour
That it would soon be demolished
Now things were such it waited
Nothing better could be wished*

*Soon another minaret would go
Another relic of the past
Two or three more and soon
The next one going would be the last*

(Mukhopadyay, An ode to a dying monument: 13½ years)

5.1 Introduction

In the previous chapter we have raised the need for prescribing a practical scale of intervention. The next two chapters will illustrate the variety of problems involved in the real life situation of a Heritage Zone in Madras, where the aspects of reality can be identified on a micro scale, and where issues can be better understood and more practical approaches achieved.

Having set the scene for the Heritage Zone in Madras, this chapter will examine in detail the potential within the area. It will review the historic, social and economic background, the reasons for its importance as a Heritage Zone, the architecture of the area, nature and functions, physical setting and urbanisation implications, attitudes and socio-economic patterns. Chapter 6 will then draw on the last three chapters, apply the lessons learnt and develop guidelines for

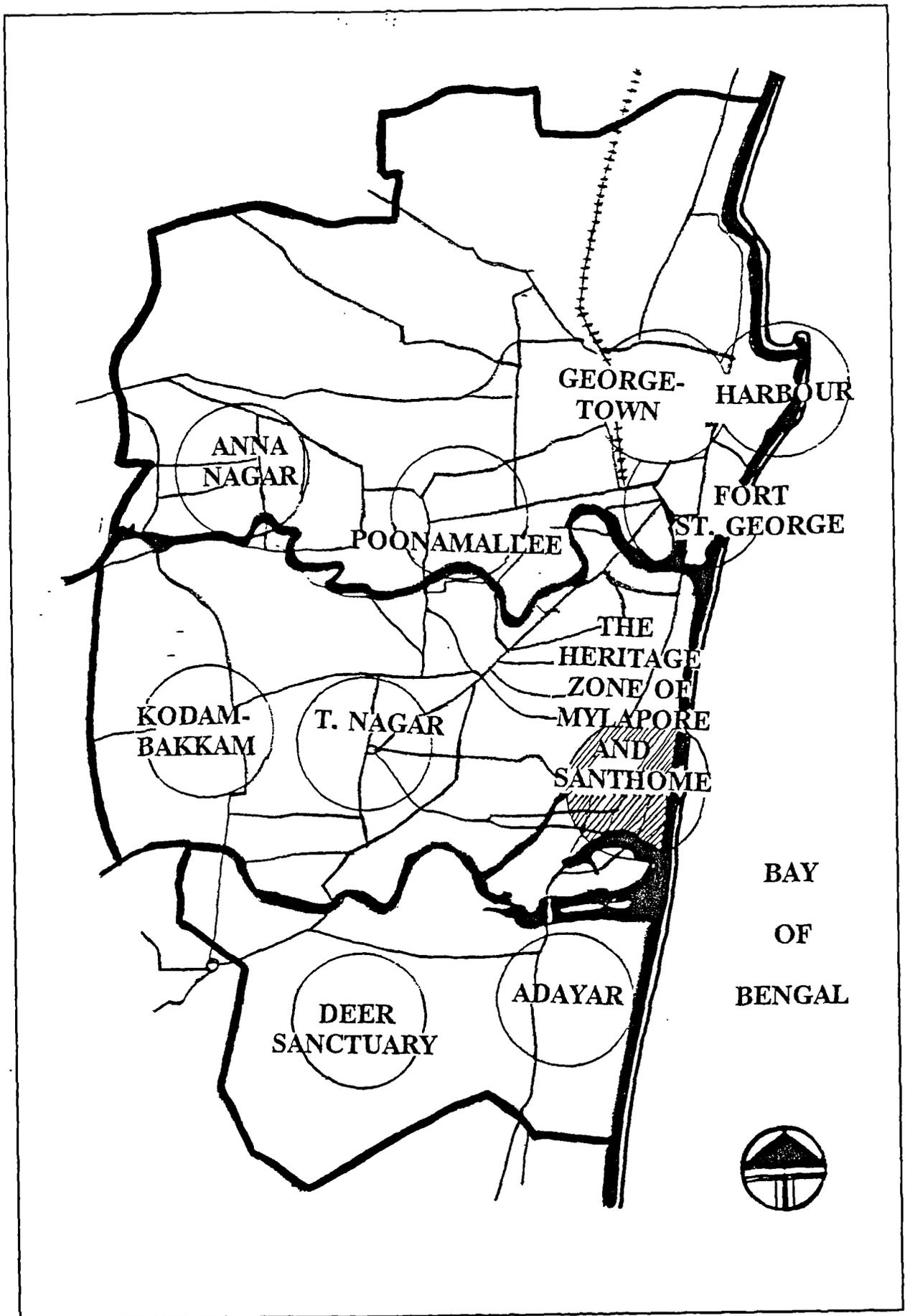


Figure 14 The delineated area for study and neighbouring areas in Madras

development to take place through conservation.

This chapter is based on the field work along with the earlier observations made during the INTACH survey which included the author's participation. It involved the recording of buildings of historical and architectural importance, the land use, and establishing activity patterns in Mylapore and Santhome. Collection and analysis of additional information in relation to *development through conservation* formed part of the field work and this stimulated the argument for this thesis.

The historic areas of Mylapore and Santhome are uniquely rich in cultural heritage and outstanding examples of traditional vernacular housing and colonial bungalows. The values associated with this tradition, culture and social structure are now sadly under threat of losing their identity, due to mounting pressures of urbanisation and development and are found to be falling prey to economic blight. Excessive commercialisation, changing land values and demand for more housing in existing over-crowded residential areas, have been further reasons for the deterioration of the physical fabric. Continuation of this trend could destroy the cultural assets and heritage held in trust for future generations and it is exceedingly important that this trend is halted.

5.2 Geographical Location and Importance

The area delineated for study is that of the contiguous localities of Mylapore and Santhome within the metropolitan area of Madras (see Figures 14 and 15). It is bounded on the east by the Bay of Bengal, and on the west by the Buckingham Canal; the neighbourhoods of Foreshore Estate and Mandavelli are on the south and Triplicane and further parts of the Buckingham Canal on the north.

The focus of Mylapore today is the Kapaleeshwar Temple and its temple tank, built in mid-seventeenth century on the site of a former temple. The temple along with its tank spreads over area of one sq. km. Around it are various

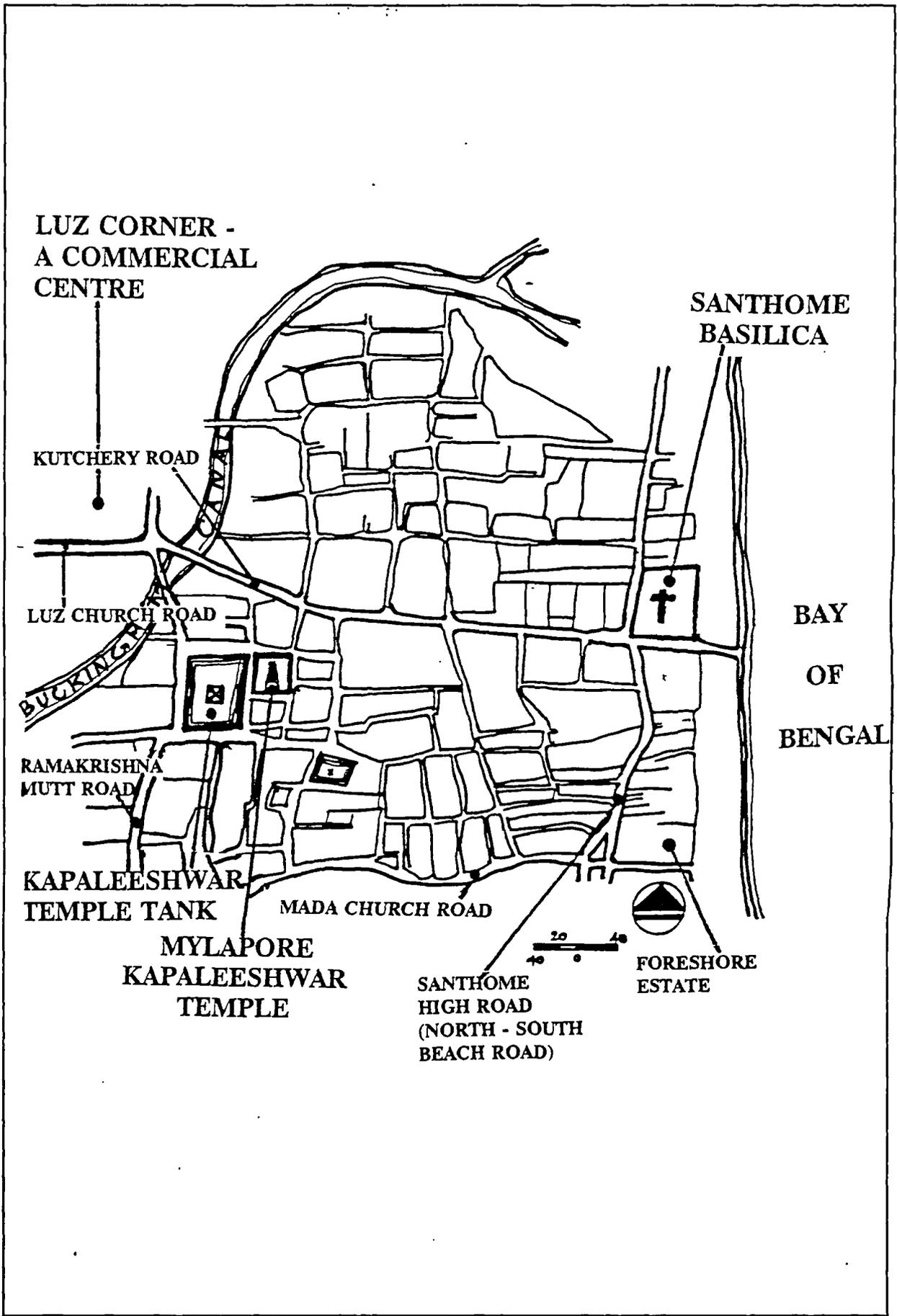


Figure 15 The Heritage Zone of Mylapore and Santhome

religious, cultural, educational and philanthropic institutions within a radius of 1½ km. The Basilica of St. Thomas with the adjoining educational institutions is the focus of Santhome that is bounded on one side by the Bay of Bengal. The area of its immediate influence is about one km. on the north, south and west of the Basilica. The Basilica is the reputed place of the burial of the apostle St. Thomas and later it became the place of the early Portuguese settlers. The Kapaleeshwar Temple in Mylapore and the Basilica in Santhome both attract a number of regular worshippers and national and international visitors. Within the study area are also a wide variety of housing, streetscapes, occupational environments and infrastructures, which together with the temple and basilica provide a unique cultural environment which more than justifies the study and its conservation as a Heritage Zone.

The area of Mylapore and Santhome, approximately 25 sq. km., (see map opposite) is one of the busy centres of the life of Madras and has grown to be a focus of religion, education and culture, and so is already an important tourist spot because of the traditional and social structures that have emerged. Two important arterial roads, Santhome High Road and Ramakrishna Mutt Road cut it in a north-south direction; the main road running east-west is Kutchery Road which connects the two historic areas under consideration. One of the edges of the Kapaleeshwar Temple tank abutting the Ramakrishna Mutt Road acts as a bus terminus. The phased development of the Mass Rapid Transit System (MRTS) has plans for a station to be located at Luz, in Mylapore, just off the Ramakrishna Mutt Road, along the Buckingham Canal. So it is fairly well provided with access facilities.

The macro climate of Madras within which lie Mylapore and Santhome is relatively hot and humid with day temperatures varying from 25° to 40° C throughout the year. Being close to the sea, it experiences relief during the hot summer days from the sea breeze that generally sets in, in the afternoons. The average annual rainfall is 100 mm. as calculated between 1975 and 1990; but



Figure 16 Views of Mylapore Temple

recently there have been repeated droughts and Madras has an acute water shortage. Streets and housing within the areas were once well responsive to the climatic considerations with winding and narrow lanes, and houses built wall to wall, which were passive energy-saving devices. Today these are being replaced by broad wide roads giving rise to more traffic in areas not intended for it and there are subsequent parking problems and congestion.

The geographical position of the Heritage Zone is quite well placed in terms of its transportation linkages with the rest of the city. This is important not only in terms of the facilities offered to the residents with respect to commercial activities and places of work but also to tourists who need boarding, lodging and ease of travel. This is discussed later in the Sections 5.4 and 5.7. Climatic considerations play a prominent part in the housing within the Heritage Zone, discussed later in Section 5.7.2. New build and alterations to existing housing seem not only to overlook this important aspect relating to climatic responsiveness but also disregard their broader significance to features such as the streetscape and character of the area.

5.3 Historical, Archaeological and Literary References

The two areas now known as Mylapore and Santhome were originally known by the one name: Mylapore. The name was spelt in many different ways such as Mayilapore, Meliapore, Malepur, Mirapolis, Mayilarppol, Mayurvalli and the modern form is presumed to have come from Mayilapore meaning the place of the peacocks; and there is ample evidence to show that in earlier times the area had hills and trees and abounded with peacocks.

An early traveller Nicolo Conti, during the first half of the fifth century spoke of Malepur and the large beautiful church, with its decoration of peacocks and crosses where St. Thomas was reputed to be buried. Marco Polo after visiting there in the thirteenth century also referred to peacocks. The present St. Thomas

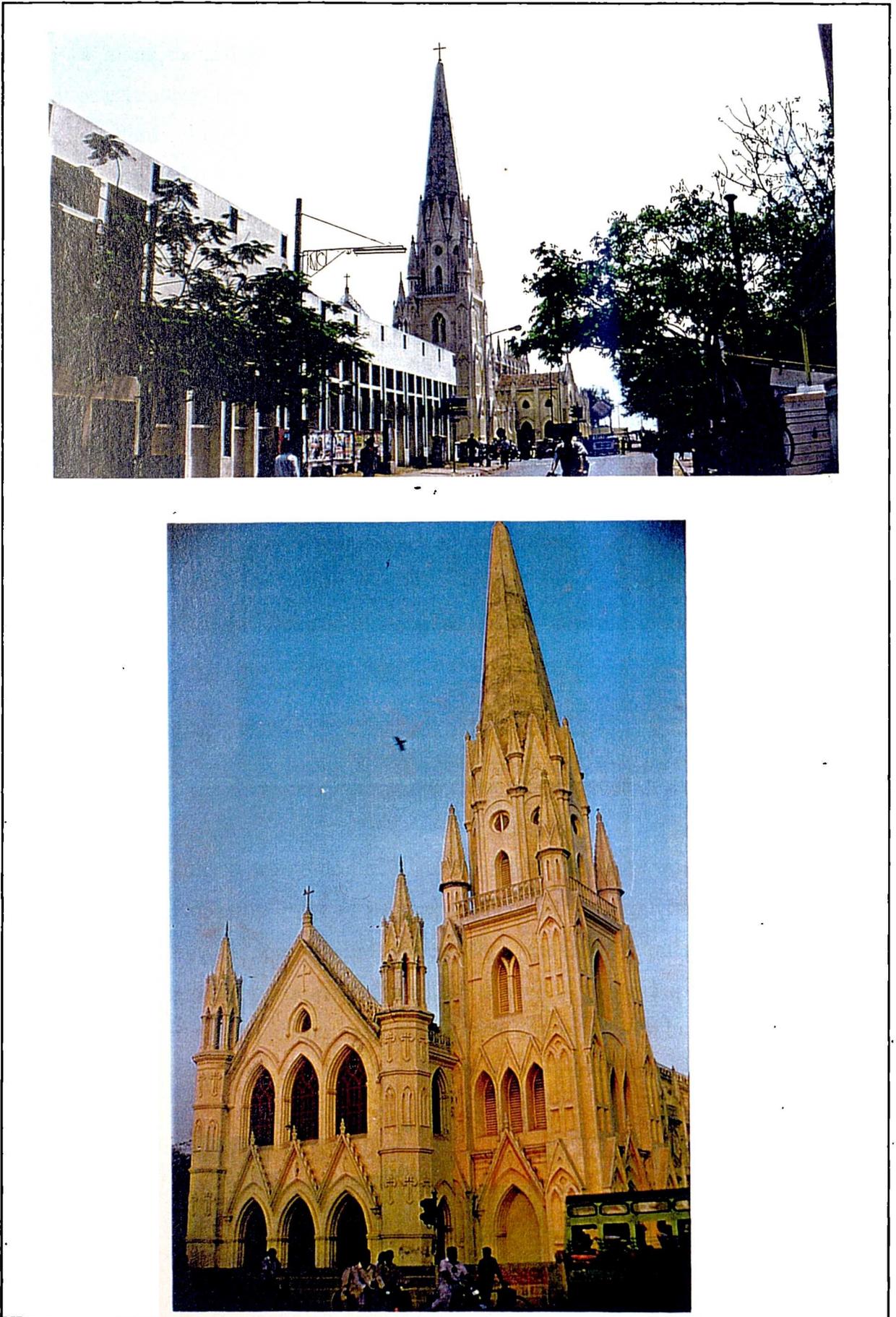


Figure 17 Views of Santhome Basilica

Basilica is a nineteenth century Victorian construction but it is quite possible that it was the site of an earlier church. The history of Christianity in India certainly dates back to early times and although difficult to substantiate, a deep mark has been left in the history of Santhome by the legend of St. Thomas and his coming to India in the first century. He is directly commemorated in the name Santhome given by the Portuguese to this area of Mylapore in the sixteenth century.

The early history and the prosperity of the then famous port of Mylapore ended with the decline and final defeat of the Pallavas in the tenth century. Earlier settlement patterns evidently underwent major changes after the twelfth century, and very likely again after the advent of the Portuguese in 1522.

The Portuguese, known for their religious intolerance to those outside Catholicism, may have excluded the Hindus and Jains who were not converts from worshipping or living in their area of settlement which was on the coast and became Santhome. Thus they might have had to shift their traditional communities inland where they are now concentrated in the Mylapore area.

The present Kapaleeshwar Temple is not dated, and there are no relevant inscriptions, but the temple's history dates it ambiguously to either 1570 or 1670 AD. Outside the temple, the spatial lay-out of long deep narrow plots of contiguous buildings dates the environs to the end of the seventeenth century. The conversion of adjacent open lands and coconut groves into housing took place in the eighteenth century and this led to a change in settlement pattern. Increasing density and more conversion of land into housing and commercial development has continued from 1920, accelerating after Independence in 1947.

If we turn from the world of tradition and legend to that of written history and archaeology we find that the history of commerce in South India reaches back into the far distant past. The discovery of gold and silver coins in 1775, date Roman commerce with India back to the early years of the first century. Further

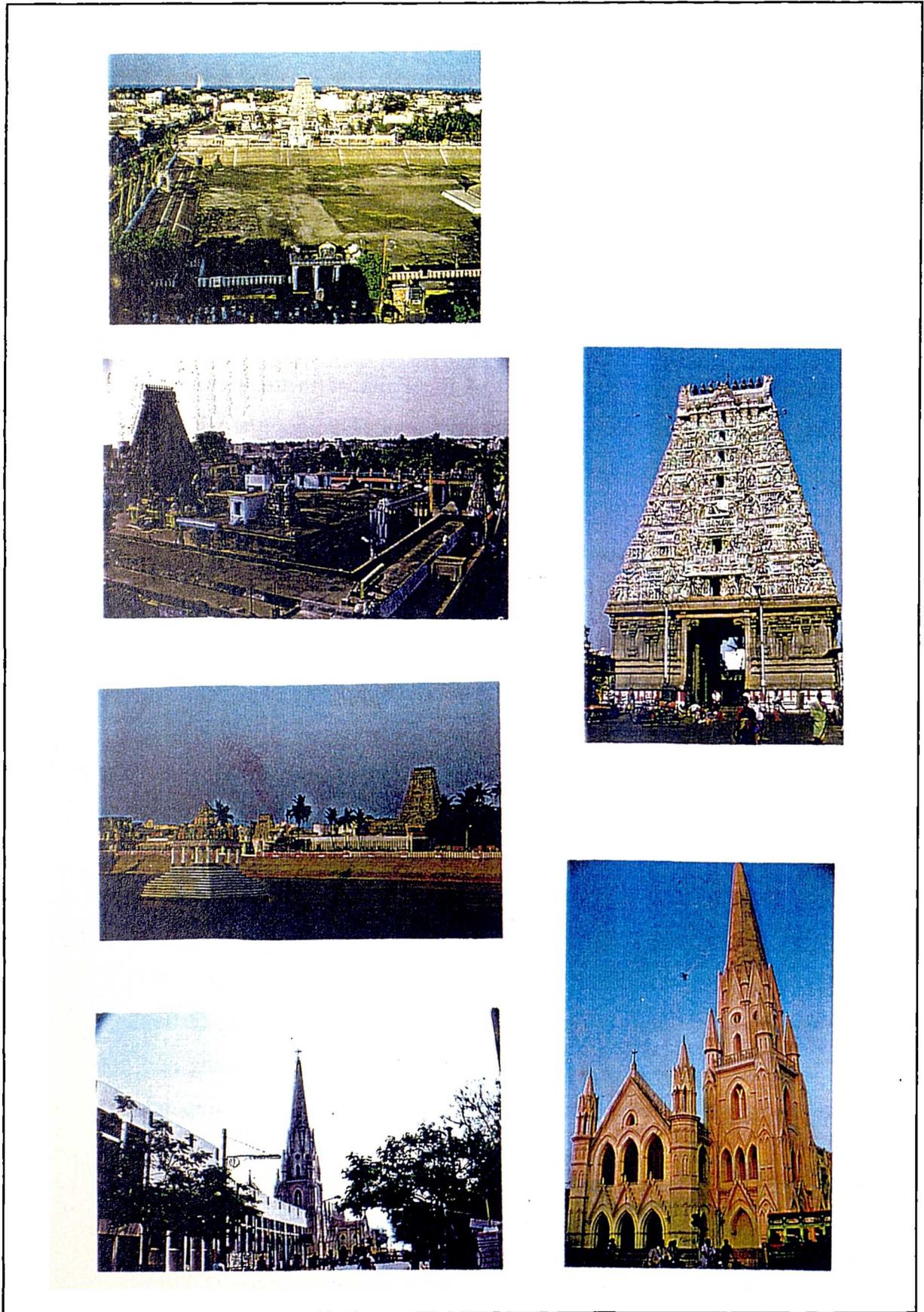


Figure 19

Views of Mylapore Temple and Santhome Basilica

reading from the bottom left anti-clockwise: The Basilica and adjacent vocational training centre, Front view of Basilica; Entrance gopuram of the Temple, Gopuram towering the low skyline, Aerial view of Temple complex, Temple tank.

finds in a Roman commercial settlement in Arikkamedu near Pondicherry in 1945 confirms this dating.

There are a number of references to early life-styles in the writings of Manikavachgar, one of the great Tamil poets, in his Thiruvachagam or Sacred Utterances. Thiruvalluvar in his Thirukural and many other poets also describe the life of the people, their religious devotion and customs of their day.

The earliest references to the Temple in Mylapore is in the Thevaram - an extensive collection of hymns of great saints and poets, Appar (600 - 681 AD), Sambandar (644 - 660 AD), Manikavachagar (660 - 690 AD), Sundarar (710 - 753 AD), the Alwars and the Nayanmars who date back to the seventh and eighth centuries. K.R.Srinivasa Iyengar, in his book (History and Culture, 3, p. 328), accepts this dating giving by C.V. Narayana Ayyar in his book. Further, an early Jain manuscript refers to a Jain temple near the seashore at Mylapore abandoned due to the encroachment of the sea.

The reference to the Historical, Archaeological and Literary associations of the Heritage Zone shows the importance this area has had in the past. Today its importance has been side-tracked and it is just another old area within the city in need of attention. With the present thinking of urban regeneration and capitalising on the inherent strengths of the area to regenerate it, the "old" has to be rejuvenated in terms of conservation of the built heritage, making known its value to the residents and visitors to the area alike, and thus enhancing its tourist potential and inward income generating capacity. All of these have been dealt with in detail in further detail in Chapter 6, Lessons.

5.4 The Developing Urban Pattern

Present-day Mylapore took shape between the sixteenth and eighteenth centuries. The spatial lay-out of the houses and the concentric street pattern of

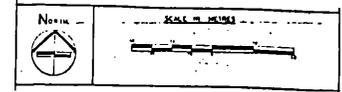
the built-up areas around the Kapaleeshwar temple had developed with the purpose of locating people involved in the daily life of the temple in close proximity to it. The employees of the temple such as administrators, treasurers, accountants, brahmins and their assistants who performed daily *puja*, and special ceremonies during festivals, participants in daily or festival worship such as singers, nadaswaram players, drummers, actors and dancing girls were all housed around the temple within a radius of half a kilometre. There were also a number of institutions attached to the temple and the teachers who taught Vedanta, Mimamsa, Thevaram, and cultural activities such as song and dance stayed nearby and often conducted their classes in the temple compound or enclosures attached to the temple complex.

The rituals connected with the temples also influenced the street patterns and spaces. The ablutions for the purification of the self before entering the inner temple sanctuary necessitated the construction of the temple tank. The tank was also used for Theppam or *Ther* festivals, when the deity was put on a float. Other religious activities such as processions occurred in and around the temple complex and the four *mada* (similar to "ward") streets were the standard routes. Often the processions were extended to other destinations and temples as decreed by the ritual practices. Thus these often governed street patterns around the temple.

From the time when the British took over Madras in the seventeenth century a number of changes have taken place which have influenced Mylapore. Originally it had been one of a number of villages like Triplicane, Adayar, Egmore and they were brought together when the British set up a trading post at what is now Fort St. George. After this settlement patterns did not change but there was a significant increase in the density of population.

Santhome although the site of an early Portuguese settlement, today owes its urban form with wide streets and spacious bungalows, many of which have sadly

-  COLONIAL INSPIRED - More ornate
-  COLONIAL INSPIRED - Less ornate
-  TRADITIONAL
-  MODERN



Housing in the Heritage Zone

FOR SHIP ESTATE

been replaced by apartment blocks, primarily to colonial influences. The extent of houses still retaining the colonial influence is shown in Figure 19. The present preponderance of Christian residents and institutions may reflect the earlier religious intolerance of the Portuguese to outsiders.

The early vernacular and traditional housing around the Kapaleeshwar Temple in Mylapore is generally one or two storeys high. The houses have certain basic features that are common, though some vary in execution. The house is generally entered from the veranda through a finely carved timber door, which is either set to one side or in the centre of the front wall. The door opens into an entrance hall, from which is accessed an open corridor around a central courtyard. Other rooms open off this. The kitchen and utilities are found at the rear of the house. The Madras terrace roof uses well-finished timber beams, usually of Burma teak, which give it a ribbed appearance from the inside. The roof is supported by timber wall brackets and columns. These are often intricately carved, the degree of decoration depending on the wealth of the owner. Some houses have pitched roofs and the residents interpret the sloped roof and low skyline as expressive of their bowing down to the supreme being. Whatever the interpretation, the characteristic low skyline of the area (approximately 75 per cent) is a unique feature of vernacular housing around the temple and suits the climate and life-style of the residents. But it is currently being destroyed.

In contrast, the area of Santhome is dominated by colonial-style elegant bungalows each in its own spacious compound. The bungalows are generally tiled roof structures, one or two floors high. They have deep verandas with roofs supported on circular pillars. The entrance verandas with gracious columns lead into spacious lofty rooms. The large windows, some with arched lintels are appropriately responsive to the hot humid climate enabling cross ventilation and adequate light. Those bungalows with flat roofs have Madras terrace roofing using bricks on edge over teak rafters. The elaborate balusters and overall form

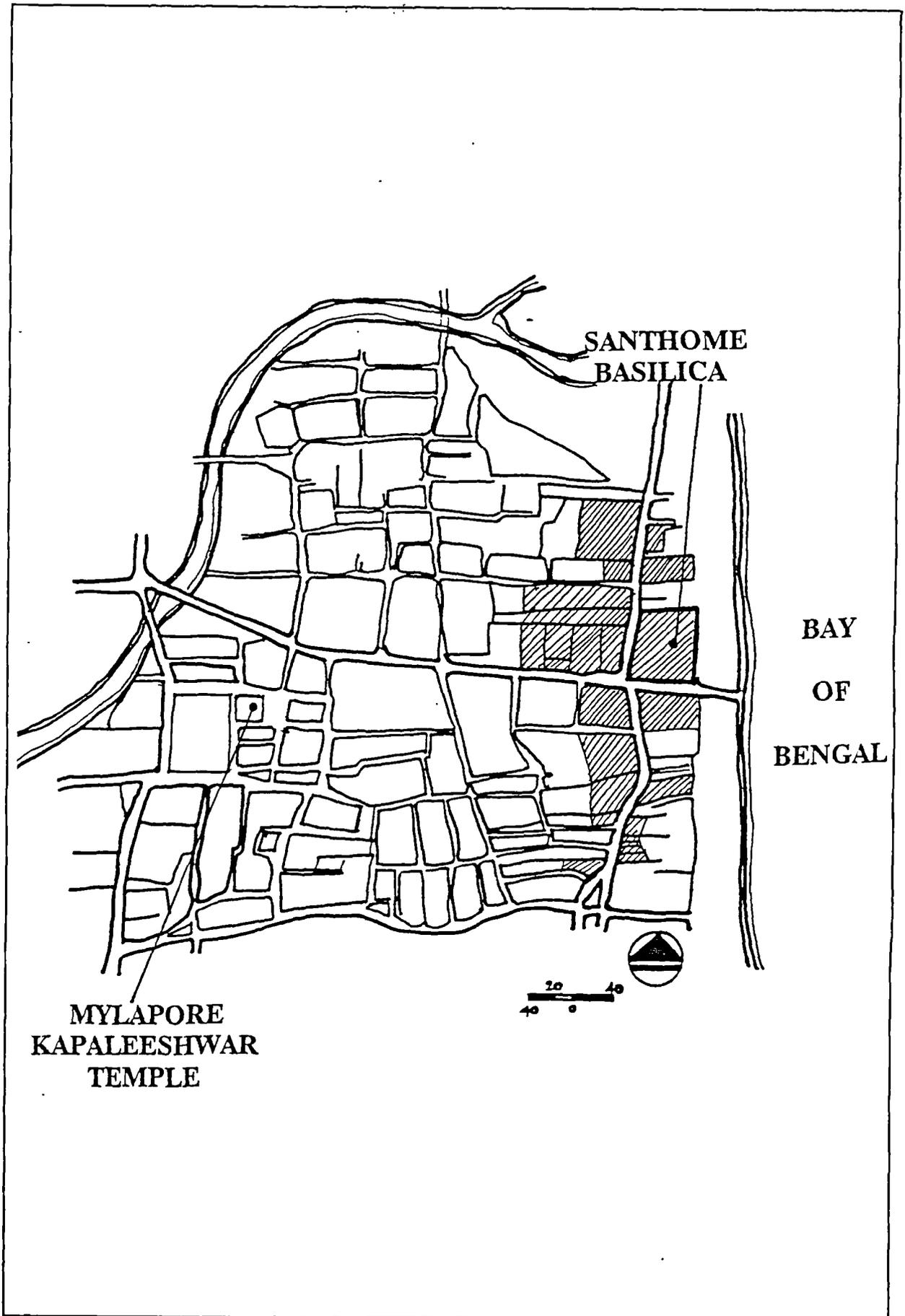


Figure 20 Extent of Christian religious and educational institutions in Santhome

of the houses are quite impressive.

The Kapaleeshwar Temple dominates the visual scene in Mylapore. Among Hindus, *darshan* or the viewing of a gopuram (temple tower) is considered auspicious and this may have suggested the height of the *gopuram*. The contrast of the vertical disposition of the *gopuram* with the horizontal profile of the Temple tank and low skyline of the surrounding housing is characteristic of this area. The open spaces round the Temple such as the tank and the area at the east front, punctuate the visual scene and help to direct the eye up to the temple gopuram.

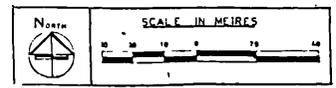
The character of Santhome is symbolised by the Basilica situated on the coast where its nineteenth century Victorian church spire dominates the skyline. The vast expanse of the seashore with the deep sea beyond seems to express the vastness of God's love and deep understanding that embraces all creation. This idea may also be seen in the establishment by Christian missionaries of institutions and schools on the other three sides of the Basilica.

Also within the area are a Jain shrine tucked away near Kutchery Road, a historic church on Santhome High Road, a mosque near the Kesavaperumal Temple and many other smaller temples. There is an interesting traditional right of the Muslims to perform ablutions in the Kapaleeshwar Temple tank once a year, which is a visible reminder of the long-standing co-existence of communities, so symbolic of brotherhood sadly lacking in today's troubled world and demonstrated during the Ayodhya episode in December 1992. Mylapore is representative of the multi-cultural community of Madras, as seen also in its wide range of institutions embracing varied religious, social, cultural and educational activities.

The developing urban pattern as described above highlights the assets of the Heritage Zone that need to be capitalised on. The survey indicating the number



- KEY:**
- ① — FLOWER SHOPS
 - ② — TEXTILES HOSEYRY BEDDING
 - ③ — MILK OR COCONUTS FIREWOODS
POOJA COFFEE APPALAM PETTY
 - ④ — ELECTRONICS HARDWARE
FURNITURE MEDICAL PHOTO STUDIO ETC
 - ⑤ — VESSELS STEEL IRUNKS
 - ⑥ — FANCY GOODS PROVISIONS
DEPT-STORE (SMALL SCALE) HANDICRAFTS
 - ⑦ — BOOKS CASSETTES
 - ⑧ — JEWELLERS
 - ⑨ — CLINICS OPTICIANS LABORATORIES
TRAVEL AGENCY HAIR SALOON ETC
 - ⑩ — TAILOR LAUNDRY PHOTO FRAME
CYCLE REPAIR MECHANIC
METAL FABRICATOR PRINTER ETC
 - ⑪ — LODGE RESTAURANT MESS REFRESHMENTS
 - ⑫ — GENERAL
 - ⑬ — BANKS
 - ⑭ — INSTITUTES SCHOOLS AUDITORIUM
FINE ARTS ORG.
 - ⑮ — MARRIAGE HALLS
 - BS — BUS STAND
 - BK — BUS KIOSK



Activity in the Core Area

of visitors to the various religious institutions in the Heritage Zone (see Appendix IV), the increasing reputation of the established educational institutions and growing numbers of social and cultural activities such as the *sabas*, *kalyana mandapams* and others (refer figure 21) indicate the continuing and growing need and importance of these activities. As this importance is recognised and the need nurtured it will enhance the profile of the Heritage Zone. Then more exhibition spaces, museums, funding to promote local skills and crafts and legislation to enable all this to happen will benefit not only the residents but the visitors to the area. Tourists need places to stay and Mylapore being a predominantly residential area has a lack of hotels and lodges. Could this lack be turned to advantage by the exposing the visitors to local hospitality and customs by sub-letting the traditional houses (refer Section 5.7.2) to visitors? This idea is largely from the bed and breakfast accommodation as seen in England. While acknowledging that the concept is totally foreign to the local customs and traditions (the orthodox life styles), it is worth exploring by first educating the residents to their valuable built heritage and elaborating on how this could be a chance for the visitors (especially international) to experience local cultures.

An elaboration on the importance and need to sustain the values within the Heritage Zone have been further reflected on in Chapter 6 especially Sections 6.7, 6.8 and 6.9.

5.5 Identity and Cultural Factors

Mylapore has over the years attracted the devout and scholarly and has remained a bastion of true Tamil middle class society. Its cultural reputation arises from the presence of many varied institutions. The presence of the Temple ensures the continuance of religious traditions through festivals, processions and such *utsavams* (festivities) as weddings and cultural activities such as *kolattam*, *theru koothu*, *braratanatyam*, *pongal vizha*, and classes for spiritual teaching, *katha*

kalekshepam, all of which take place in and around the temple complex. In addition there are a number of educational and philanthropic institutions like the Ramakrishna Mutt (a *vedanta* centre) and the Andhra Mahila Sabha (a centre for destitute *mahilas*) nearby. The area also boasts certain historic sites, such as the site of the first All India Congress Committee meeting at which the movement towards Independence was launched, and residences of great intellectual personalities such as Radhakrishnan, the first President of India and Alladi Ramaswami, the famous mathematician; and there is Chettinad House, a seventeenth century palace now owned by the Chettiar family. All these deserve more recognition and to be included in the tourist itinerary.

Such activities, centres, institutions and places with historical associations at present have a very low profile. This is reflected in the fact that there is not even a single map or publication that refers to them as important or worth visiting. Such intrinsic qualities of the Heritage Zone have to be highlighted not only for the benefit of the visitors to the area but also to increase the awareness and appreciation of the local residents of their heritage. Each of the centres deserves to be developed into a museum or centre of local historic value, skills and crafts.

Another traditional feature the area has retained is the *kolams*. These are geometric or floral patterns drawn both inside and outside the house and also on the streets. The ground on the street fronts of the narrow built-up plots is sprinkled with water and the designs are drawn with white or coloured powder. This is an early morning activity, mainly done by the women folk. During festival times these designs are filled with colour and are also known as *Rangoli*. This and other traditional activities enrich the way of life of the residents and stimulate social activity through *Rangoli* competitions. The tradition of drawing *kolams* on the streets is sadly now slowly disappearing, perhaps due to the changed road surface or even the changing roles of the women from housewives to wage earners. But the skill needs to be nurtured and kept alive. Activities such as these could figure on the programmes of the various cultural academies or

centres of performing arts, thus sustaining local crafts, skills and talents.

Traditional culture represented by activities such as described above is now being lost as new houses and apartment blocks come up and vernacular areas are losing the people who have such skills. The changing housing densities, the land use and socio-economic profile are evidenced in the findings of the Times Research Foundation for the MMDA (vols. I-VIII, 1991) and this breakdown of tradition and values is resulting in much folk art ceasing to have symbolic value and no longer communicating to the new generation. This reality is discussed by Rapoport (1994 : 313 - 324) when he relates the more specific components of culture to components of the environment which have a relationship to technology and the designed environment.

In responding to culture, designed environments are best seen as settings, or systems of settings, for systems of activities (Rapoport, 1994 : 337).

...Both in understanding and designing valid and appropriate environmental form, relationships of various sorts are extremely important. If the built environment is seen as an expression of the organisation of space, time, meaning and communication, these in turn are related to activity systems, life style, cognitive style, symbolic systems and so on; that is, the various expressions of culture (Rapoport, 1994 : 320).

In the case of the Heritage Zone of Mylapore and Santhome, the cultural identity, represented by the traditional activities and life styles as described above is losing out to the modern ways of increasing commercialisation and the bustle. If the present trend continues the special charm of the area and cultural identity will soon be replaced by development that is so anonymous that it could be anywhere. Its special identity needs to be preserved and conserved by nurturing traditional activities in a more focused and monitored fashion.; and such a measure as including the areas of traditional skill and craft in the tourist map will highlight the wealth of local heritage to both the residents and the tourists (for marketing as in the case of Manchester, see Section 3.2.2.2). Further appropriate recommendations for maintaining the cultural identity of case study

area are set out in Chapter 6.

5.6 Social Profile

Tradition, religion, and morality determine the social interaction and structure of a community to a large extent. The historic core of Mylapore and Santhome is such a repository of traditions, centres of education and charitable institutions, centres of preservation of fine arts, living evidences of historical records, and thus a centre reinforcing cultural identity. In addition, religious institutions are the places for peaceful assembly of communities and exchange of information and they can be viewed as places of informal education. The awareness and value of these assets has to be communicated to the residents so that they can build on it for surely it is reflected in the subconscious intellect of the residents for it to have survived over centuries. Now with the changing economic perspective the need for a stronger emphasis to sustain the social profile is required.

The increasing population density and changing land uses since Independence have recently gained momentum. The Fifties and early Sixties saw a number of upper middle class living in the area with most of them occupying the big houses - the traditionally ornate ones in Mylapore and the bungalows in Santhome (refer Appendix III). The later Sixties showed a change in settlement pattern in Mylapore (Nagaraj and Ramani, 1991; Chandrasekharan, 1991), with more of the poor and lower middle class occupying the core and the rich moving to the periphery and newer residential developments within the city like Adayar, Kodambakkam and Anna Nagar (see figure 14). This pattern is broadly prevalent even today with one obvious change, i.e. the bigger houses in their spacious plots are being replaced by multistorey apartment blocks. The poor and lower income groups still occupy the dilapidated housing while the new apartments are occupied by the upper middle class who want to remain in the area but cannot afford the luxurious big houses that need heavy expenditure to be maintained. The reasons behind this change in living styles may be: the break-up of the

extended families or joint families, resulting in smaller nuclear families requiring smaller living quarters; inflation and increase of land prices whereby land is being divided up into smaller plots and sold off for revenue; the rising aspiration of these families that require higher incomes to sustain the property; the widening network of transportation and communication allowing accessibility to larger geographical areas for job and educational prospects both nationally and internationally; all these factors are leading to the increasing migration of wealthier residents from the area. This conversion of big traditional housing and bungalows into multi-storeyed apartments is not only detrimental to the historic character of the area but is also destroying the mix of population densities and is responsible for shifting the original local community. This trend has to be halted by making living in the Heritage Zone an attractive prospect (see Section 6.9), thus motivating the local residents to remain within the area.

The socio-economic profile of the people living in both Mylapore and Santhome (see Residents' Survey in Appendix III) shows that about 47 per cent of the people are academicians or professionals with intellectual and cultural leanings. Many are either teachers (academic or arts related) or doctors and lawyers. Another 23 per cent are skilled workmen with small businesses or are employed in small-scale enterprises like the making of gold and other jewellery and manufacturing food and other agro-based products for which the area is well-known. The recent increase of commercial activity servicing these middle income communities by numerous small businesses such as small-scale retail shops, shops offering xerox and typing facilities and others is one of the factors that has led to the present congestion around the Kapaleeshwar Temple which may be termed as the core of the Heritage Zone. The remaining 30 per cent of the residents in the Heritage Zone include day-wage workers, manual labourers, those working in religious institutions, workers in the service industry and squatters in the area. The interests and needs of all three groups must be addressed in any scheme to promote the economic welfare of the Heritage Zone.

There is a mushrooming of slums and squatter settlements especially along the banks of the Buckingham Canal. The people living here are usually employed in the service industry and many of them earn their daily living through manual labour and working in the houses of the upper middle class and rich as gardeners, cooks or maidservants. Their situation needs to be addressed.

Provision for social life such as cinemas and theatres and other leisure activities is notably missing, perhaps due to the beach being available for relaxation and the lack of space to provide for further facilities in this congested area. Playgrounds and public parks are also absent other than those provided within school premises.

In spite of the overcrowding and congestion, the wide expanse of the beach and the horizontal emphasis of the temple tanks give visual relief, and a number of cultural performances in *sabhas* or halls for the performing arts, together provide the social and cultural input. These are the more positive aspects of the social structure of the area alleviating the negative aspects of congestion, dilapidated structures and slums.

This study of the social profile of the Heritage Zone has revealed the changing trends and opportunities and the constraints it presents for development and conservation, whether in controlling new-build or in retaining the original character of the area. What is becoming more and more apparent is the urgent need for development to go alongside measures that can sustain local economies and culture and bring in inward investment to the area.

5.7 Analysis of Urban Form and Structure

The analysis of urban form and structure of the case study area provides a detailed understanding of the developing urban pattern, identity and cultural factors and social profile. The first section (5.7.1) deals with the architectural

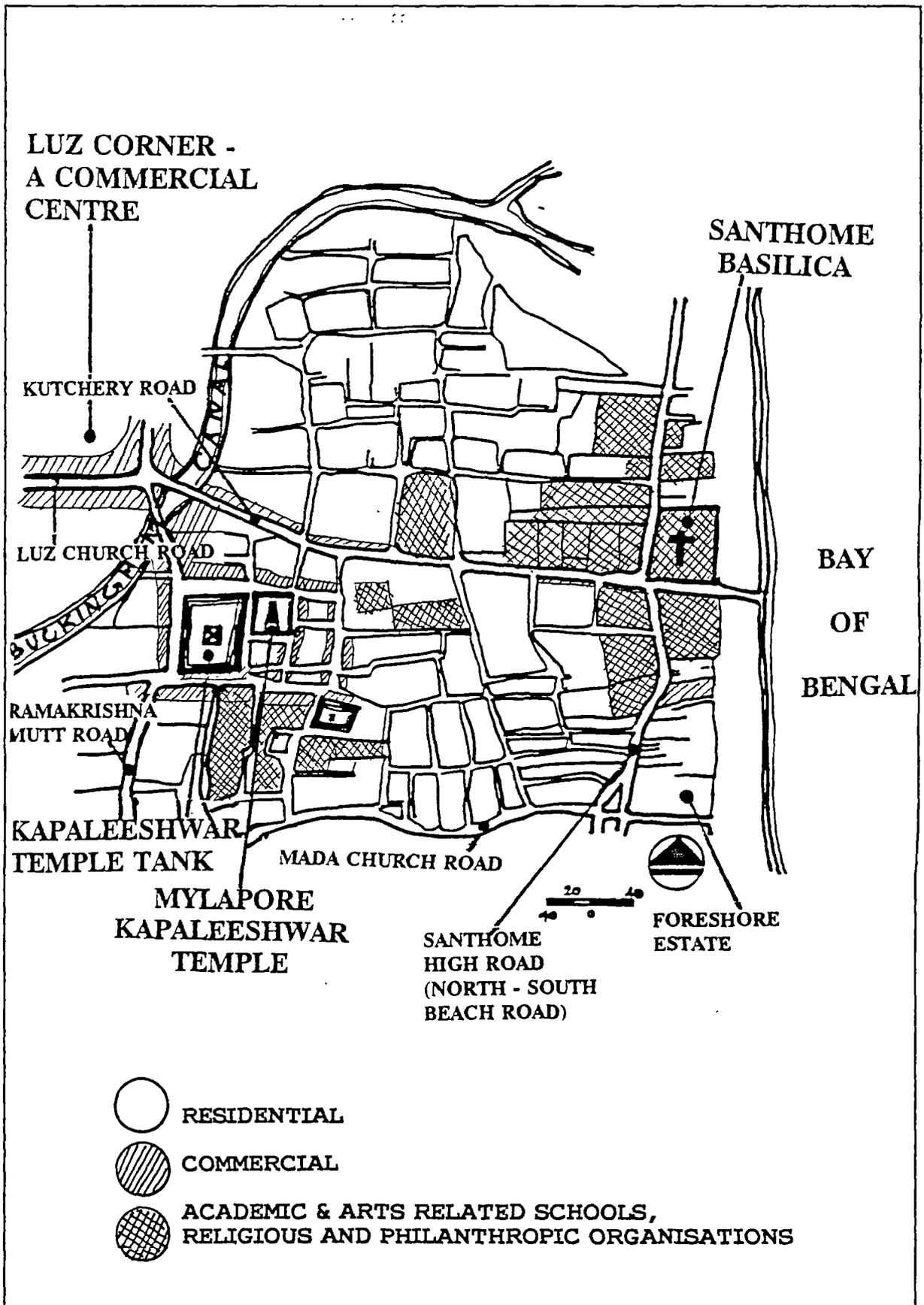


Figure 22 Land use in the Heritage Zone

character, built form and visual qualities of the Heritage Zone. Then having established that the Heritage Zone is predominantly residential, a detailed study of the housing (5.7.2) is made to identify potential assets, opportunities and constraints. Then a study of the activities like commerce, services, education, tourism, transport and infrastructure (5.7.3) is made to outline the different activities that take place and to enable an overall feel of the place. Finally a study on movement network and activity patterns (5.7.4), basic city infrastructure (5.7.5) and tourism (5.7.6) lead to the next section on conflicts to be resolved (5.8). In this way areas for later detailed recommendations (Section 6.9) will have been identified.

The congested urban form of Mylapore and Santhome may be considered as the response of the people to the conditions of life and culture in this area. The present street pattern, land-use, configuration of temples, tanks, churches, and mosques provide the attractive characteristics of the area; and they need very sensitive consideration when changes to meet the demands of modern life are made.

The area immediately around the Basilica has a number of educational institutions, like higher secondary schools, a school for the deaf and dumb, academies for vocational training and so on, while most of the other areas are purely residential. The commercial areas in the Heritage Zone are mostly along the main streets around the Temple and Kutchery Road in the western quarter (see figure 22). There is little commerce in Santhome. A few service industries are to be found but open spaces for parks and gardens are sparse.

5.7.1 Architectural character, built form and visual qualities

Indian architecture is characterised by its spiritual content and the areas of Mylapore and Santhome are outstanding for their spiritual and cultural architectural character. The towering heights of the Kapaleeshwar Temple and

the Santhome Basilica seem to be part of a grand scheme of architecture, sculpture and religion, dominating the visual spaces of the area. They overlook continuous housing in Mylapore and bungalow type development in Santhome where both areas are characterised by the low skyline of their buildings. The term 'continuous housing' here in the Indian context, is known as 'terraced housing' in the UK; such a term in India would mean a house with a flat terrace above accessed by a staircase.

Built up densities are generally higher in Mylapore than Santhome, and the ground coverage here is as high as 80 per cent. The area is predominantly residential with some commercial and institutional uses. Around the Temple the area is mixed-residential. The Floor Area Ratio (FAR) here is 1.5, resulting in high densities when coupled with the low rise (maximum of two or three floors high) nature of the area. The height of the buildings is related to the widths of the streets in front; for example, if the road width is 30 meters, then the building height is restricted to 10 meters.

As mentioned earlier, buildings in Santhome show considerable colonial influence, while those in Mylapore reflect a rich mixture of indigenous and vernacular styles with or without signs of such colonial influence. Older houses in Mylapore with their introverted spatial planning around courtyards still reflect the distinctive social structure, customs and manners of the people. However the present building bye-laws and regulations of the Madras Metropolitan Development Authority (MMDA) are not sympathetic to this existing built form. For example, they require buildings to conform to prescribed set-backs; i.e. any new building to be built in the area is first governed by the FAR. So if the plot has a dimension of 40 x 80 feet (a typical long narrow plot) then the maximum permissible built-up area is limited to 4800 sq. ft. Then with the front and back set-backs of 15 feet each and with 5 feet on either side the structure may be built in say three floors. But it is the regulation on set-backs and other such rules that are destroying the physical structure and street character of the traditional

contiguous building façades. Such issues in the Heritage Zone, affected by the Development Control Rules (DCR) need to be addressed immediately so that the DCR are not only sympathetic to the nature of the Heritage Zone but also makes special provisions with respect to alterations or additions to old structures and others as detailed in Section 6.9.

5.7.2 A study of housing within the Heritage Zone

The study of housing reflects the concrete expressions of people living within a region and their response to a complex interaction of skills, norms, climatic considerations, potentialities of natural materials, physical condition of the environment and the cultural preferences and capabilities. This view is strengthened when one reads Rapoport's article on Ecology of Housing (1994: 155 - 166), wherein he develops his argument in the following four major steps:

Accepting that social change to western forms in emerging countries is neither inevitable nor desirable

he assumes that:

...the rich variety of cultures, value systems and life styles typical of most developing countries will survive.

There is a link between cultural and built forms, and the forms of physical environment can be supportive or destructive of life styles, value systems, and cultures.

The stress in most housing design has been based on health, climatic, economic and technological criteria, but this is too limited, and, in many cases, absolute housing and planning standards are extremely questionable.

Variables related to traditional social organisation, family structures, symbolic values, cultural definitions of environment quality and the like, should be considered, and there is a need to see housing in the broadest social context-what could be called the cultural ecology of housing.

What therefore is apparent in the case of Mylapore and Santhome is that if any criteria are to be defined for "right" economic development, traditional values

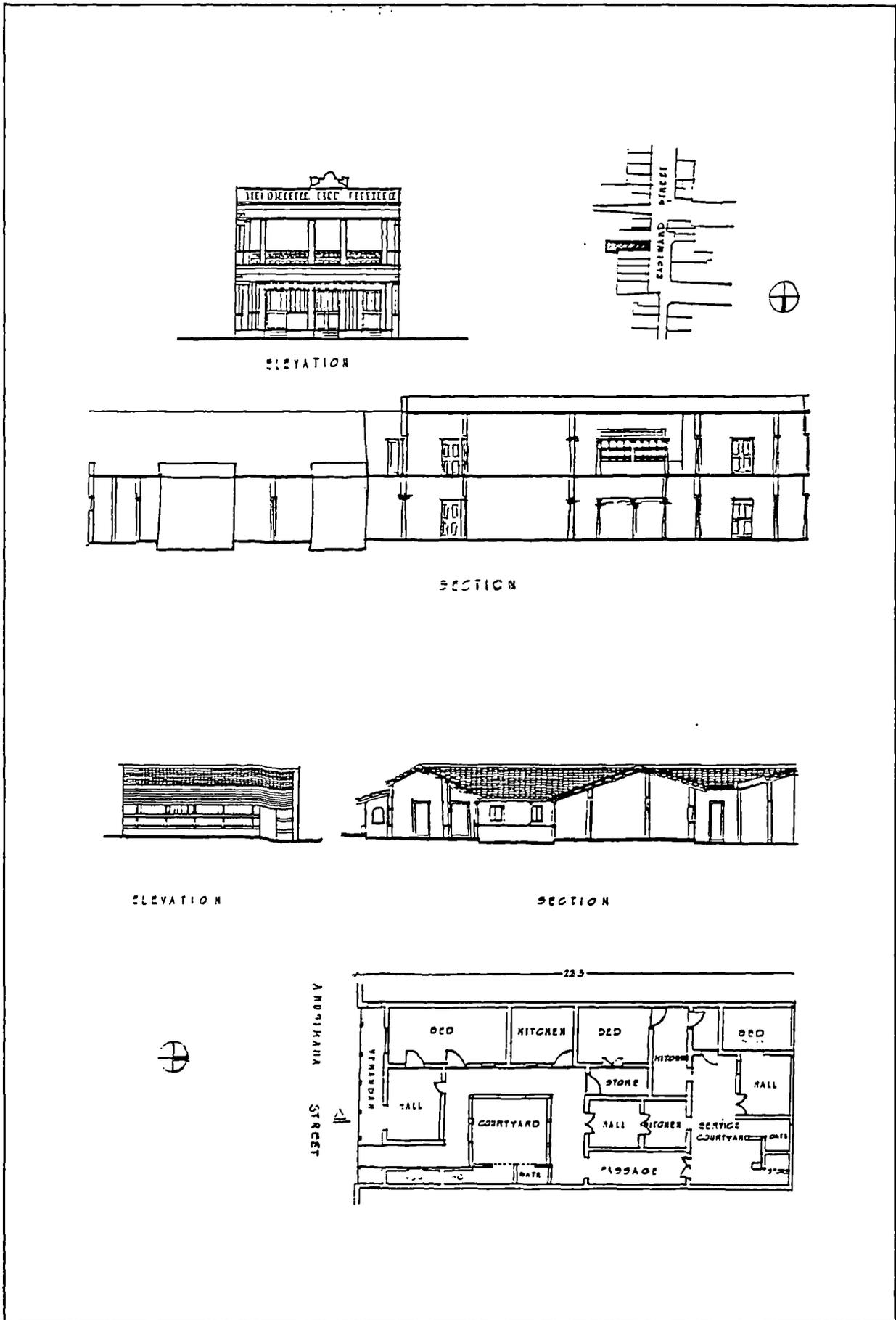


Figure 23 Housing in Mylapore (described opposite)
 above: section, elevation and location plan of a two storey house
 below: section, elevation and plan of single storey house

and their interpretation in the local context need to be considered alongside; these criteria can then be seen as responses to specific needs and activities and appropriate to their location. An example encountered in Mylapore in traditional housing is *naer kuthu* which refers to the direct positioning of the front and the rear doors of the house; traditionally it dictated a straight passage from the front to the rear and was believed that any evil spirit entering the house, could find its way out immediately through the rear. An explanation for this in today's context and such positioning of other doors and windows, is found when these are viewed as climatic considerations for cross-ventilation and lighting. The neglect of this cultural pattern and non-adherence to traditional values has resulted in new buildings with changed massing and the loss of features characteristic of traditional housing such as delicately carved and ornate door jambs, entrance porches, *chajjas*, loss of verandas or *thinnaish* and their conversion into rooms for other purposes.

The Heritage Zone of Mylapore and Santhome is predominantly residential and housing can be seen to be occupying about 80 per cent of the area (see figure 19). 55 per cent of the houses in this predominantly residential area are owner-occupied. The findings of the fieldwork (1992-1994) and the INTACH study (1991-92) in both of which the author was involved show that many of the houses have undergone repairs and renovation over the past ten years, while about 25 per cent of the houses have not undergone any significant change, since they were built. As said earlier, the original housing within the Heritage Zone, falls into two distinct patterns: one being traditional housing and the other, the bungalows showing the colonial influence of the Portuguese and later the English. Between them is a mixture of traditional housing with varying degrees of colonial influence where differences are seen in the level of ornamentation and adaptation. Urgent attention needs to be given to preserving these traditional styles and to enabling new build to fit in with what already exists.

The traditional housing is mainly concentrated south of the Kapaleeshwar

Temple, around Chitrakulam, the Kesavaperumal Temple and around the Mundakanniamman Temple north of Kutchery Road. Examples of those that have colonial influence are shown in Figure 23. Most of the traditional houses have certain basic features that are common to all communities though they vary in execution and often in the materials used. The row-house character so prevalent in the area, prevents the party walls being exposed to the hot humid climate and the houses are noticeably cooler in the afternoons of the hot summer days when daily temperatures range between 30-34°C. Most houses are built of brick with lime plaster, but the use of brick with cement mortar is gaining popularity over the past thirty years. Floors for older houses consist of stone slabs - *cuddappa* stone (*Cuddappa* being the place from where it was brought), which again keeps the floors cool. Other materials for floors include cement flooring finished with a red glazing, or stone tiles. Some of the more ornate houses have patterns etched on cement floors, ceramic tiles used for skirting or in decorative and geometric designs. Mosaic flooring consisting of small chips of stone in a mixture of cement and lime plaster polished after the floor is laid is of more recent origin. Nowadays mosaic tiles cut to standard size are readily available and need final polishing. Other elaborations for the houses include ornate teak wood doors, door jambs, parapets, facings, ceiling details, pilasters and column detailing. Such features and the skills that produce them are unique to this area and deserve recognition for their continued existence.

Sky-lighting and ventilating by use of inner courts and varying the heights of roofs to facilitate light and ventilation in the dark interiors are other outcomes of climatic considerations. Every house has a front open space usually covered by a lean-to-roof, supported on wooden pillars. This pillared veranda in front is not only a place for meeting visitors, but also a sleeping place during the hot summer months. The inner courtyards or sometimes the rear courtyards serve the same purpose for the women and also house service facilities like a toilet, a water point and sometimes a well. Activities such as washing dishes, clothes and drying take place here and home industries making products for sale often use

these spaces to sun-dry. Thus the outer verandas and inner courtyards double as extensions of usable indoor space.

The major feature of many of the bungalows in Santhome is their sprawling spaciousness. The plans are generally symmetrical, with rooms directly connected to one another without a corridor. High ceilings and alignment of doors and windows are generally used to provide natural cross ventilation. Deep verandas around the front and rear are also common features. Sometimes columned porticos leading out into the gardens are used instead of verandas to provide better protection against sun and rain. Some rooms also open on to the gardens by way of French doors (the term used for hinged patio doors of wood with an inner leaf of wooden louveres). The roofs are either flat-terraced or pitched, roofed over by clay tiles. The flat terraced style is known as Madras Terrace roofing where the roof is first spanned with wooden, often teak, rafters generally 3"x6" at about 1 foot intervals. With the aid of shuttering (generally wooden planks) between the rafters a layer of lime plaster ½" thick is laid on top over which bricks are laid diagonally on edge. The roof is then finished off either with broken brick in lime plaster for a thickness of 2" or with tiles laid flat and pointed with lime plaster; sometimes additives like *gur* and *kadakkai* are used. Many houses that have Madras Terrace roofing are at least 70 - 80 years old. Those with teak wood often last over a hundred years as in the case of the Bentinck Building built in 1806 and demolished in 1992 wherein the rafters were of costly but long-lasting Burma Teak.

Traditional housing is termed as being in the Dravidian Style, and the others with the colonial touch as a combination of Dravidian and Colonial. The latter generally belonged to the more affluent residents. Nearly all traditional houses are built straight off the streets and fall roughly into three categories with variations peculiar to material and decoration both on the exterior and the interior as well. There is also a fourth category of colonial housing distinguished by being set in a garden. All four types of housing are described below to show

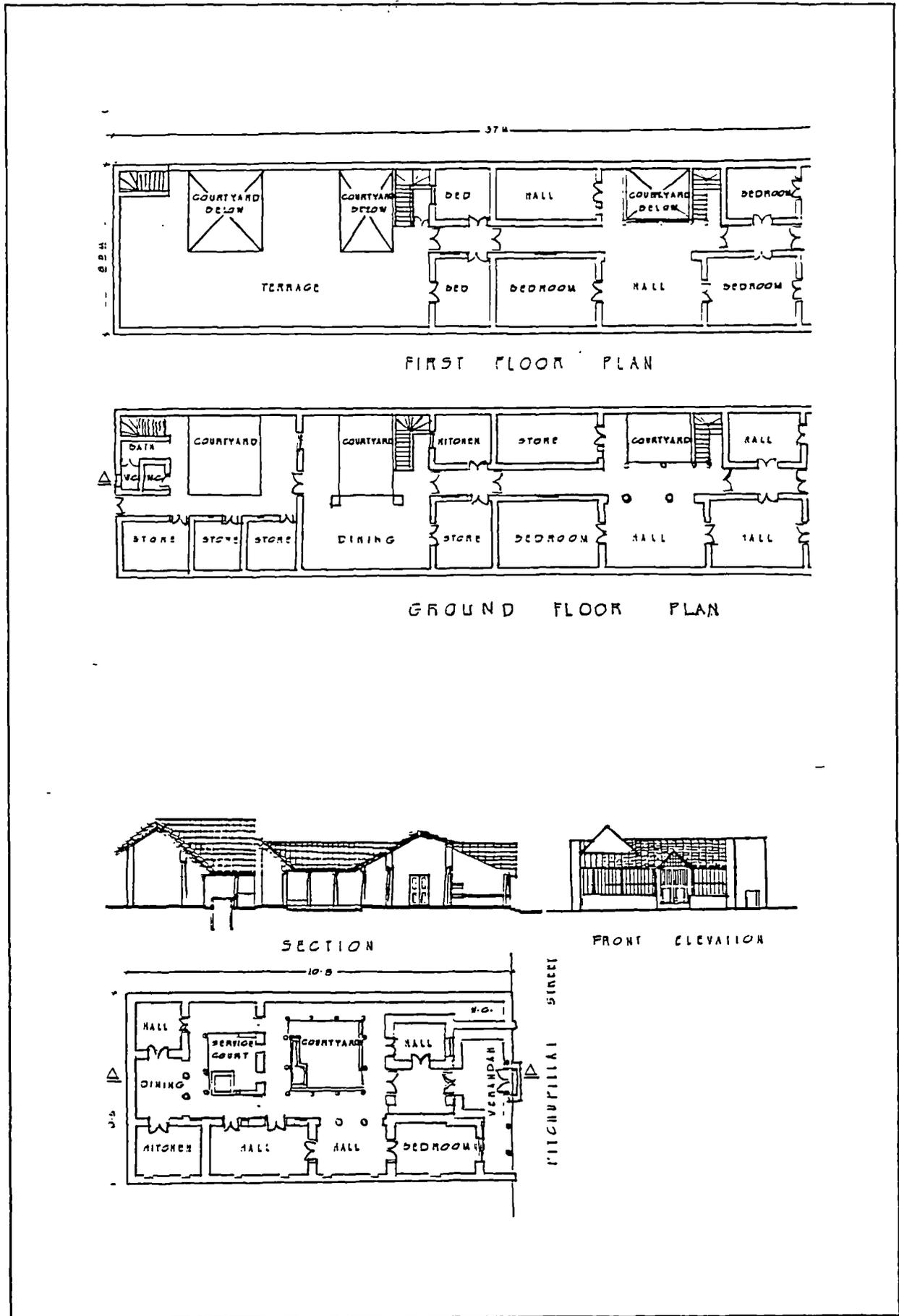


Figure 24 Housing Type I Colonial inspired less ornate
 above: shows the plans of a typical house in two floors
 below: shows the plan, section and elevation of a typical house in one floor

the distinctiveness of each and the need for proper documentation and conservation (see Figure 19 showing these four types of housing in the Heritage Zone).

Type I Colonial Inspired - Less Ornate

This is the simplest and oldest of building types (between 60 - 100 years old) which still exists in many pockets within the Heritage Zone. This type of housing (see plans opposite) is largely prevalent among the 25 per cent of the housing that is more than 50 years old and forms the biggest component of the traditional housing. Most of these houses are on one floor with either flat, Madras terrace roofs or tiled pitched roofs.

Originally the old houses used pot and pan tiles which give a distinctive ribbed appearance, but because of present-day demand the making of these tiles is being replaced by Mangalore tiles that can be mass produced. Their other advantage is that they have grooves for interlocking and are therefore more permanent. An entrance veranda whose roof is supported mostly on timber columns is another distinguishing feature. A variation to this porch in many cases is a raised platform on the two sides of the entrance separating the house from the road outside. The veranda joins a passage into an inner courtyard which has a covered corridor around it. Many houses have rear yards used for washing and other similar service facilities. Slender timber columns with capitals support the lean-to roof (when the rest of the roof is flat) or pitched roof covering the corridor around the inner courtyard. The capitals of the columns are often intricately carved and decorated.

Most of rooms in these houses get their light and ventilation from the inner courtyards and many deep plots have more than one courtyard. The houses are generally on plots in varying sizes between 12 x 40 meters and 15 x 25 meters. A typical house is shown in Figure 24 whose dimensions are 12 x 37 meters. It has a central corridor with rooms flanking either sides. The more public spaces

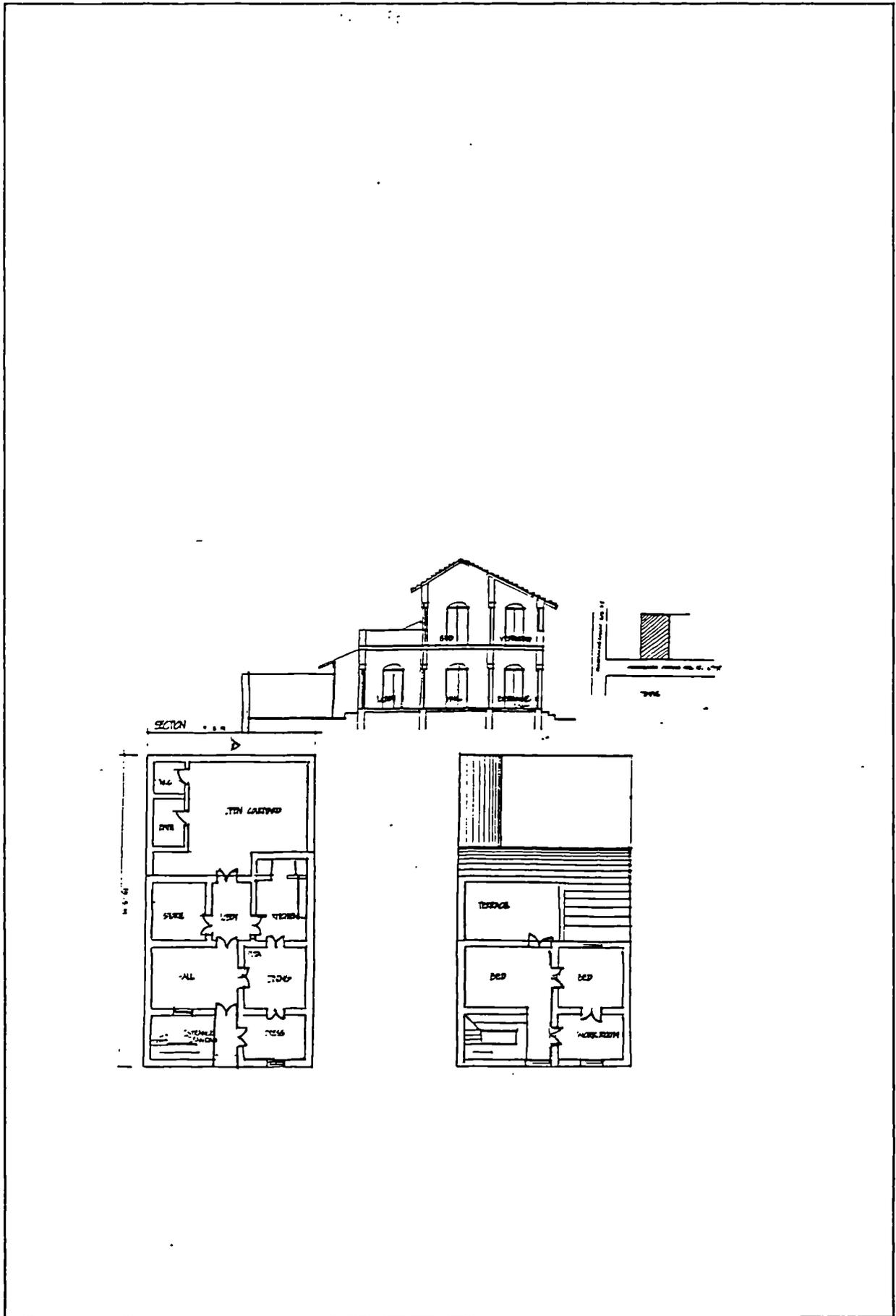


Figure 25 Housing Type II Colonial inspired more ornate
Ground and first floor plans with section and location plan

like halls are in the front and the rear has service areas, kitchens and stores. Many deep plots have a service lane at the rear and where that is not possible side access from the front is given. This type of housing was very convenient when the joint family system prevailed, but with increasing nuclear families, subdividing them for subletting is causing a problem in terms of access, maintenance and ease of improvement. Guidelines and arrangements for overseeing and enforcement of development control rules for doing such alterations in a conservation area need to be drawn up and residents suitably advised if the character of the area is to be preserved.

Type II Colonial Inspired - More Ornate

This type of housing is very similar to the Type I, except that many of them are more ornate with a lot of detailing both in the interiors and exteriors (see Figure 25). Most of the houses in this category have flat roofs and may be one or two floors high. Many have a room or two on the upper terrace, either in front or in the rear, but the terrace itself is never fully covered. It is generally used for sleeping at nights, and drying clothes and other foodstuffs in the day. In most cases the lower floors show the Dravidian influence, with rectangular windows, niches in the walls in the interior of the house, timber columns with decorated capitals, doors with intricate detailing and carving on the top panel above the rail and sometimes even on the side rails. Often decorations on the panel above the top rail of the door differentiated the *Saivites* from the *Vaishnavites*, the *Iyers* from the *Iyengars* and so on. The colonial influence in the upper floor is seen in the arched windows, and sometimes the openings connecting the rooms within the house, brick pilasters and decorated plaster mouldings.

Some houses of Muslims in the Mylapore bazaar area and along Kutchery Road, show an Islamic influence, by their use of geometric patterns and tiles in the interiors and the detailing on the exteriors. Some houses have more than one central courtyard and there is a rear courtyard as well, allowing for the orthodox segregation of men and women, that is still partially prevalent. The financial and

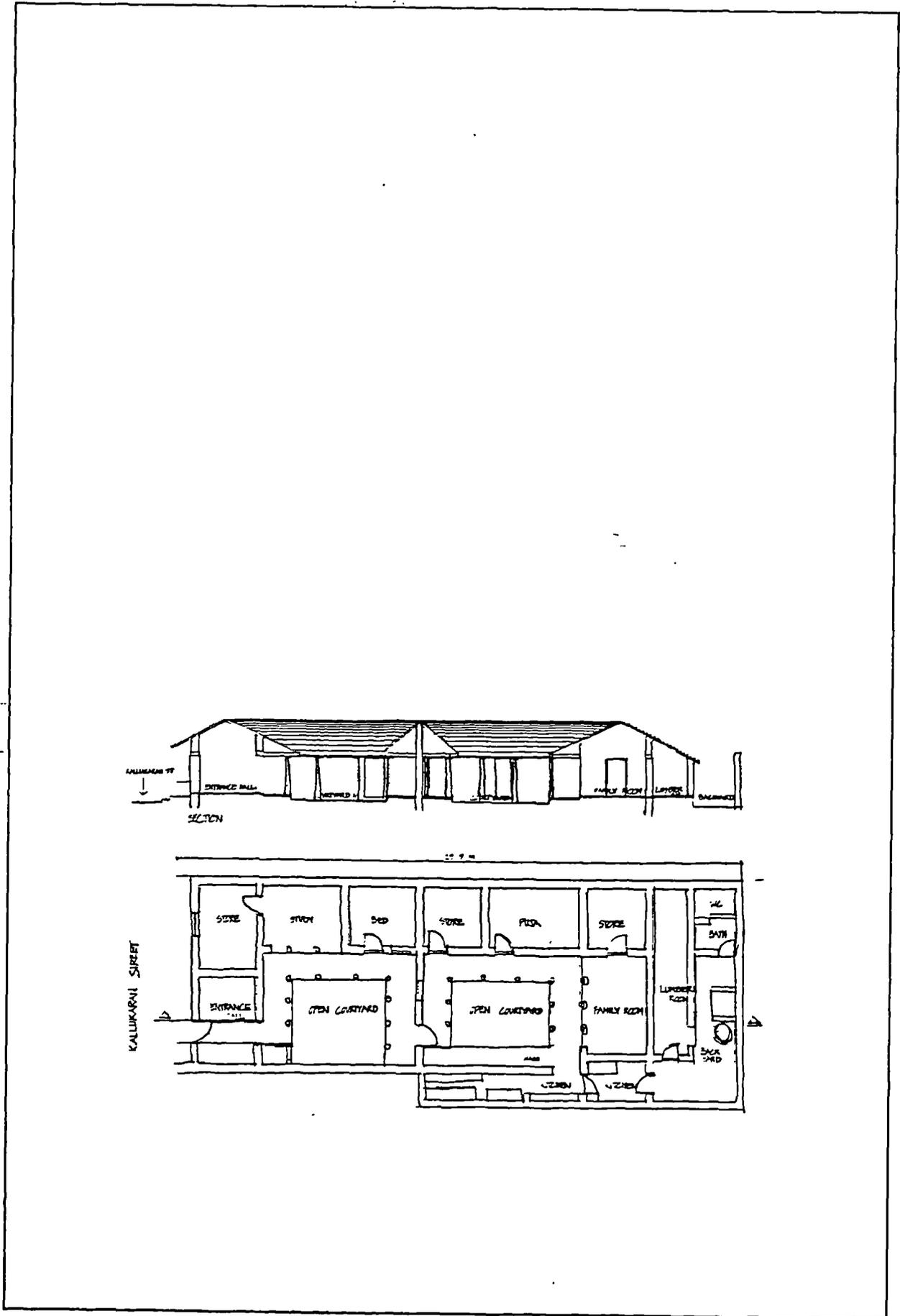


Figure 26 Housing Type III Traditional
A typical plan and elevation

social status of the owner in the community is often reflected in the degree of intricate detailing.

Type III - Traditional

These houses generally belong to the wealthier people and are often set in large plots, sometimes with spaces around them and larger courtyards inside (see figure 26). Most of them are single-storied with pitched roofs and elaborate detailing and decoration. The interiors, timber columns with capitals, doors, door frames and other structures have elaborate decoration and as with type II reflect the changing economic and social status of the owner. Many of the houses have obvious additions, put on as the joint families grew bigger. Later additions also came in the form of shops that were sublet. Large houses that once provided for whole joint families are now being divided up into smaller portions for nuclear family units or being sub-let to outsiders. The conversion of verandas and sometimes even of rooms abutting the street into shops shows the changing economic status of the owner. Shared facilities of toilets, water points in courtyards and other common spaces are part of the emerging scene of overcrowding.

Type IV - Colonial Bungalows

Moving away from traditional housing in Mylapore where the streets have narrow house fronts generally abutting the road, to colonial houses in Santhome, one is struck by the vast differences. The bungalows here are wide, spacious and are often set in gardens or are set in square plots of varying sizes, generally about 3000 sq. ms. The colonial influence of the Portuguese and later the British is seen in the gracious columned entrance porticoes, columned deep verandas, big windows and lofty ceilings. Rooms generally lead off one another and plans are usually symmetrical. Presently these rooms are being divided into smaller rooms and in some cases the verandas themselves are being converted into rooms. Big plots are being sub-divided and bungalows are being pulled down to accommodate flats or smaller houses are built around the bungalows. Sadly so

many of these original colonial buildings have been destroyed by developers for financial gain and modern structures, offices or apartment blocks, have been put up on the large plots, and this problem needs to be addressed before another distinctive feature of the area is lost.

Many of these contemporary buildings do not accord with their context and people are being led away into accepting them as the only style of development, namely apartments and multi-storeyed housing units. One may say that these are initially in response to the economic demand and needs of a growing population, but they are at the cost of destroying workable social patterns and creating a new social outlook.

Having looked at the various types of housing and their general characteristics it can be concluded that there is already a high density of housing in Mylapore and the trend in new apartment buildings indicates its growth. Looking at these developments in the light of the housing demand and supply the present predicament highlights that provision of housing needs to be a major priority. But the Heritage Zone cannot cope with increasing densities and uncontrolled alterations and additions to existing buildings. This has to be stopped not only because the character of the area is being lost but also because the infrastructure and services within cannot match the growing density. Housing is discussed later in Section 6.7.1 with respect to the lessons learnt and the opportunities and constraints it presents.

5.7.3 Commercial, Educational and other City Infrastructures

The main attractions of the area for shopping are the presence of a major vegetable market and various kinds of commerce, many of them distinctive of South Indian customs not found in other parts of the city, except perhaps in Triplicane, a *Vaishnavite* settlement, in another old and nearby part. There are numerous shops selling stainless steel vessels, coffee (roasting and grinding),

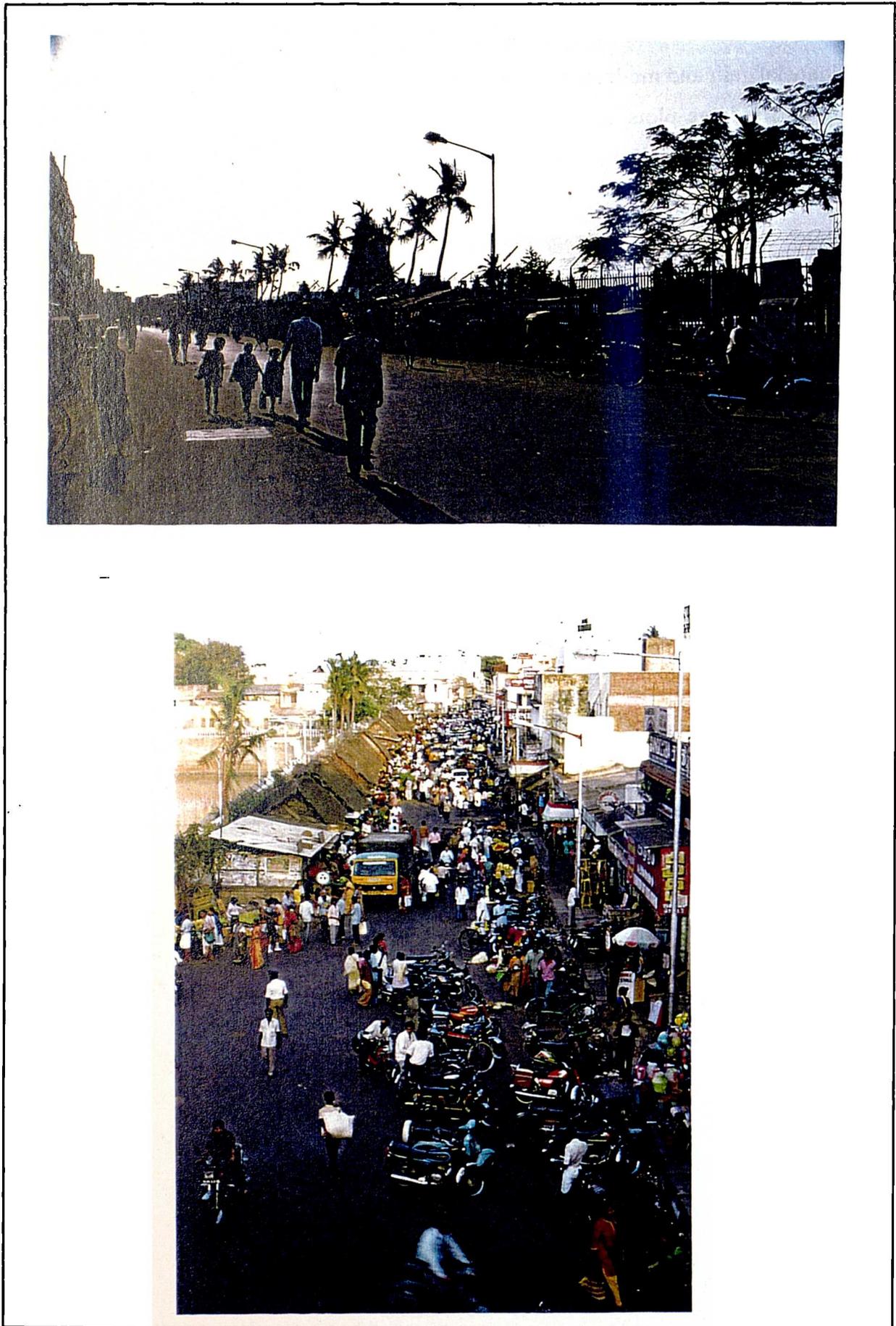


Figure 28 Activities along (above) North *Mada* Street and vegetable market (below) on South *Mada* Street.

jewellery, silk saris and home-made *appalams* or *pappadums* (traditional South Indian crispies) and 27 per cent of the local residents are engaged in these activities.

Many petty shops have become established near the temple for the convenience of worshippers needing coconuts, fruits, flowers, camphor and incense for their offering so that today the four *mada* streets are lined on both sides with such outlets, small stores, sweetmeat stalls and street hawkers (refer figure 21 showing the activity in the core area). South *Mada* Street has the vegetable market on one side of the road and this has a huge catchment area of buyers. On the other side are shops dealing in stainless steel vessels, utensils and other kitchen ware. The presence of the nearby bus terminus facilitates the shoppers.

Commercial activity has developed extensively along Kutchery Road, Ramakrishna Mutt Road and the Mylapore Bazaar Road with informal vending on the pavements adjoining the temple tank. The surveys (refer Appendix III) indicate that only 7 per cent of the residents in the Heritage Zone feel the presence of the wholesale vegetable market is a necessity important to the locality and a 66 per cent feel that its location near the main arterial road, causes disturbance to the residential peace of the locality and creates problems of cleanliness, inconvenience, congestion and restriction on moving space. It was also found that 26 per cent of the residents are against the conversion of residential units to more commercial use as this is destroying the character of the locality.

North *Mada* Street is lined with jewellery shops trading in gold and silverware. Traditionally goldsmiths have been located near the temples; it may have been originally that they supplied or rented jewellery to the performers of dance and drama associated with temples. This custom continues even today, though the traditional ware made by the goldsmiths is being partially replaced by machine-cut jewellery which is sold in other retail outlets. The commercial development

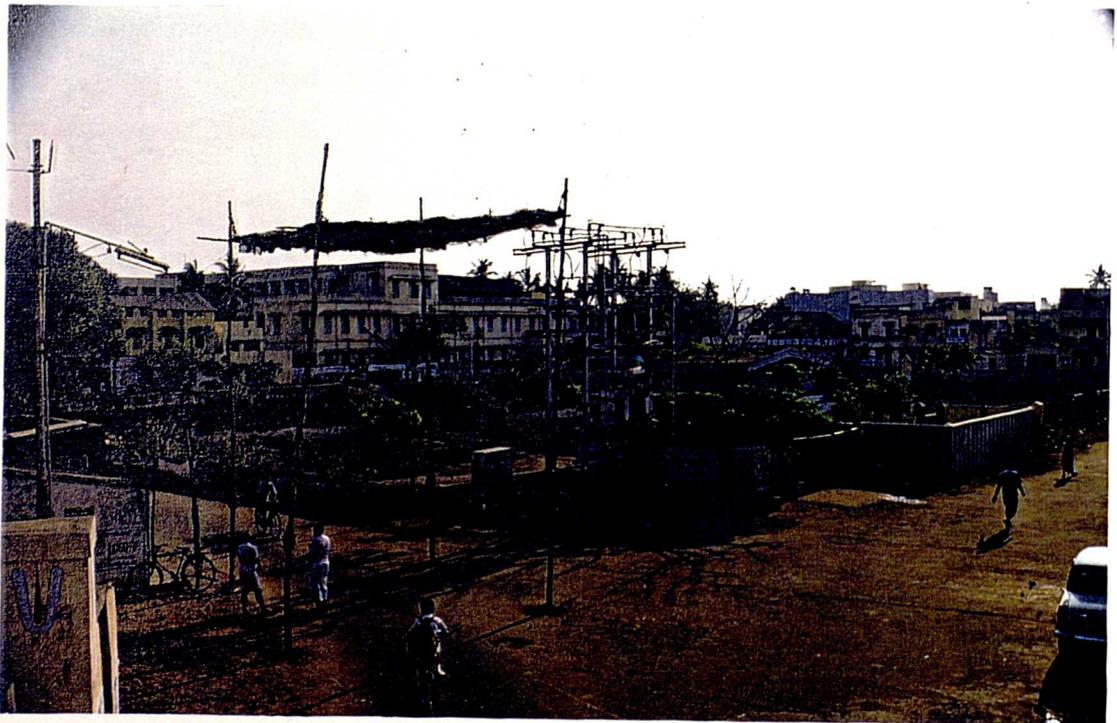


Figure 27 Below: An impromptu shelter along the road to house temporary temple activities, shops, above: Sides along the Chitrakulam used for parking of tourist vehicles.

on the East and West *Mada* Streets mainly caters to the temple devotees and there are a large number of shops selling silk saris. The reason behind this development is similar to that of the development of jewellery shops. Also Mylapore area was previously populated predominantly by Brahmins and these women were particularly partial to silk saris, flowers, jewellery and often adorned themselves before going to the temple. There is an even more dazzling display of these splendours during festivals. The above customs have been largely responsible for the commercial growth of these traditional trades so unique to the area.

As stated earlier, Mylapore and Santhome are predominantly residential with few office buildings. Those that there are, are of recent origin and on an average have five storeys. The central business district of Madras is located to the north and its connection to this area is in the form of the arterial road that runs through the core. For commuters by public transport, the bus terminus here serves as a transit point for them and for shoppers. Generally speaking offices and big businesses do not fit the character of the historic core and the new buildings are a disfigurement to the historic landscape. This raises the issue of what to do with them? Answers to these are not within the scope of this thesis but it may be suffice to raise the possibilities involved on which decisions need to be taken. Should they be left as they are or should the non-conforming uses be re-housed elsewhere and the present buildings used as administration offices for the Heritage Zone, co-operatives for the indigenous small-scale trade in the area or centres complementing the educational institutions in the Heritage Zone by offering facilities or should they be demolished in toto and new structures sympathetic to the character of buildings in the Heritage Zone and in conformity to the uses therein be built? In some cases even partial demolition and remodelling may be considered.

Education has always played a major part in the development of the areas of Mylapore and Santhome. There are a number of educational institutions that

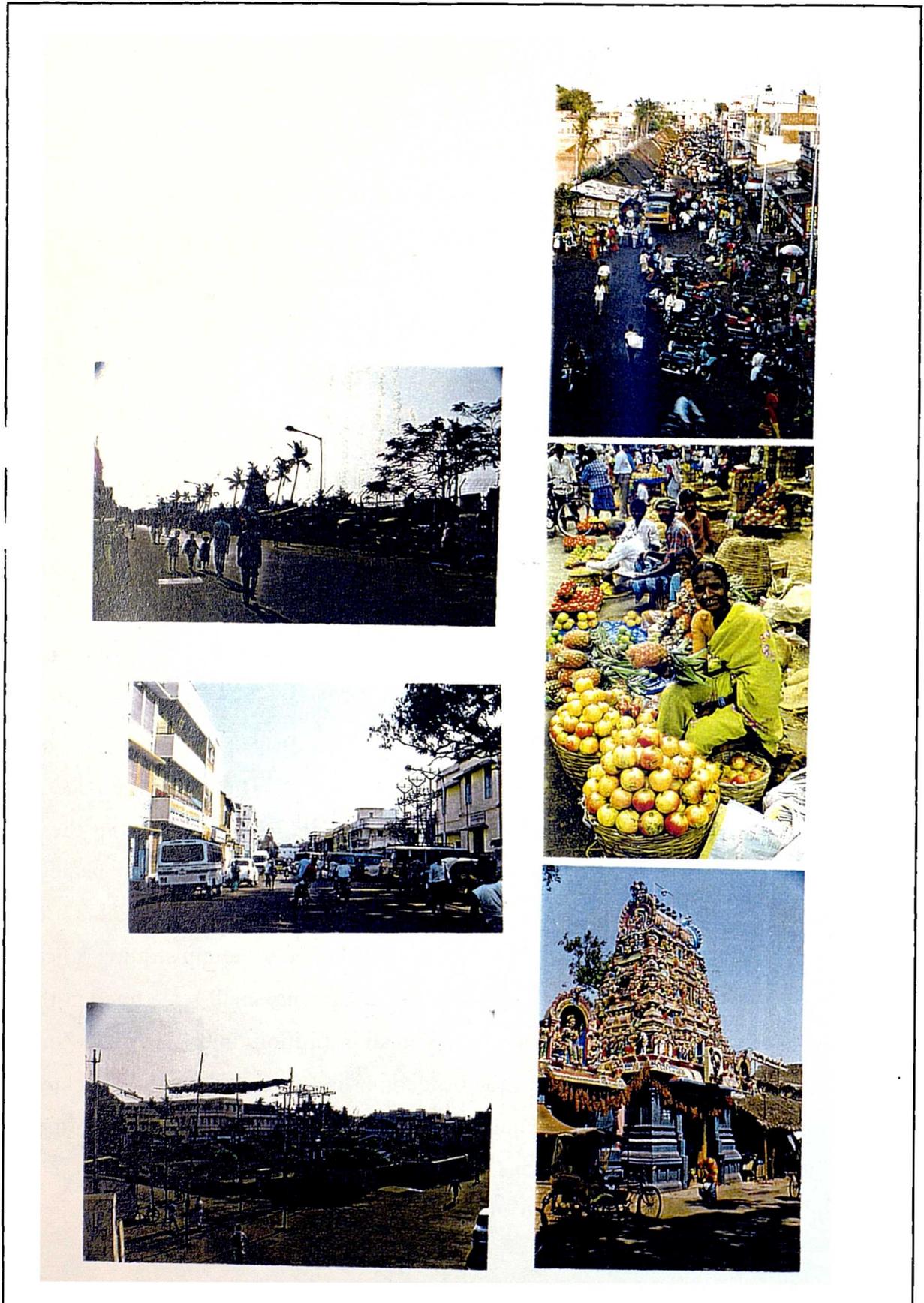


Figure 27 Activities along the North, South and East *Mada* streets. below: informal spaces in front of temples and an impromptu shelter along the road to house temporary temple activities, shops and congestion in other streets

teach the regular primary, junior and high school curriculum, in addition to those that teach theology and the fine arts. There are also nursery schools, crèches and special schools for the handicapped, technical skills and vocational training. Many of them are for girls and boys separately while a few are co-educational. Higher education colleges and universities are outside the core, though easily accessible. Having said that education plays a major part in the development of the areas of Mylapore and Santhome, what then is the future of this industry in the Heritage Zone? Should preference be given for development of this industry instead of the many non-conforming uses that are mushrooming in the area? Possibilities to this are dealt with in Section 6.9.

Service industry and related occupations within the Heritage Zone includes all who work within the religious centres, those in different types of commercial establishments, municipal services, cycle repair shops, transport and office support services such as photocopying, duplication and job-typing centres, and others such as milkmen, housemaids, mobile launderers, gardeners, and others. These services are all necessary for the life of the core and many of the workers live there and should be encouraged to remain. Already there exists the practice of "living over the shops" which needs to be sustained. There has been a noticeable growth in the number of automobile workshops and other non-conforming trades, such as small-scale mosaic tile manufacturers. These are of more recent origin (within the last 20 years), which makes their presence questionable in the context of maintaining the local heritage.

5.7.4 Movement network and other activity patterns

The religious geography, the location of the temples and the processional paths of the temple car dictate the street pattern within Mylapore. This is evident in the four *mada* streets. The width of the streets along the processional paths was based on the size of the *ratha* or processional temple car and the devotees who moved with it. In Manasara, the ancient book on temple architecture, different

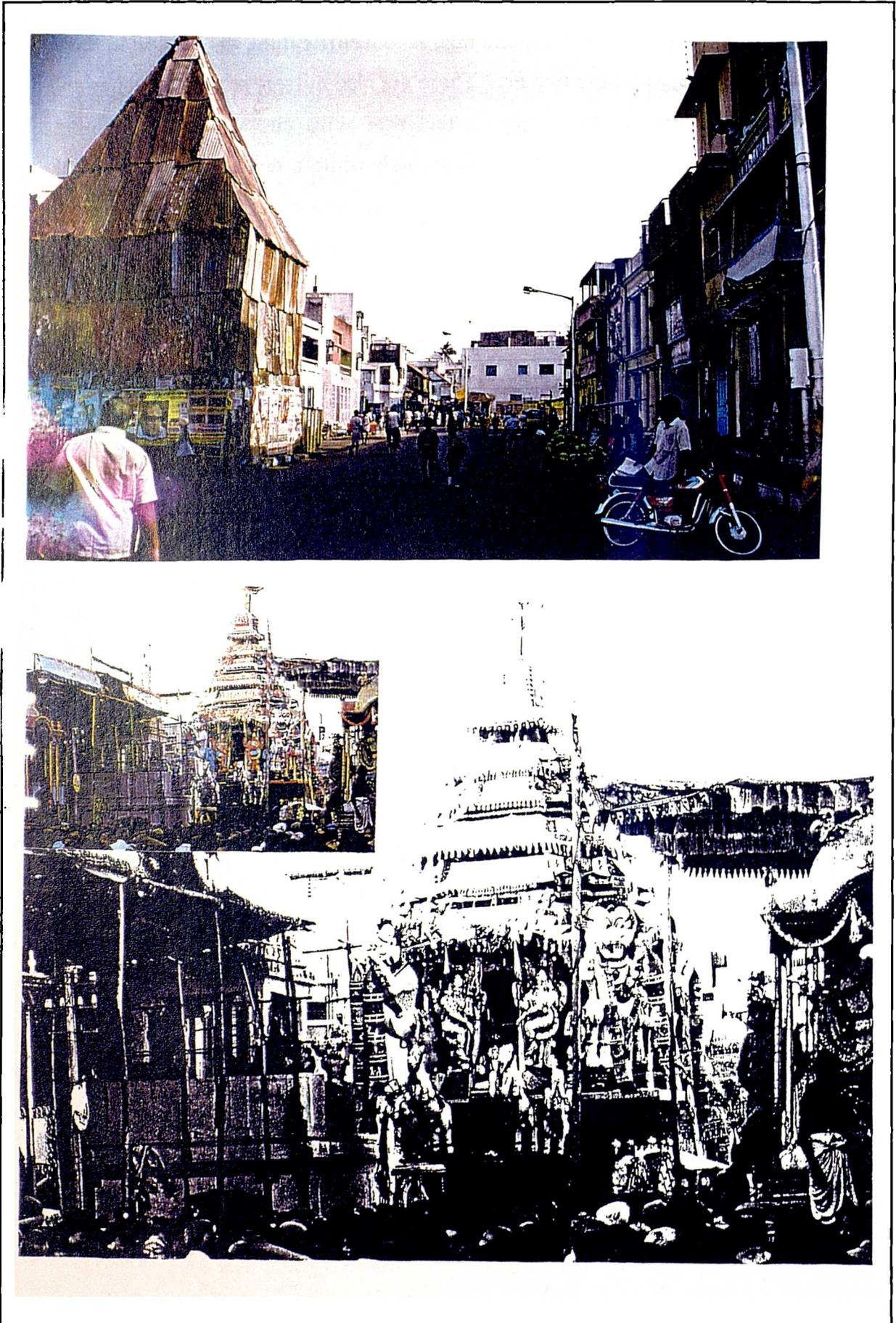


Figure 28 The Mylapore Temple car
above: within the tin shelter, below: in procession on another occasion

widths of streets are prescribed in *danda* (one *danda* = six feet), varying from four to ten, ten being preferred for the royal route. The height of the *ratha* was another consideration and when the procession went round the *ratha* had to dominate the street scene and not be overshadowed by taller structures. This was another reason for the low rise development profile of the buildings in the area. Except for the *mada* streets that were wide, and a few others that formed parts of the processional routes of the temple car, most others were quite narrow and some were cul-de-sacs.

Streets are used not only for circulation and access, but also as places for social and cultural interaction. In addition many household, commercial and work activities occur here. Enhanced by the presence of pavements, trees and shrines, the neighbourhood streets are important community spaces. The streets under study fall roughly into three categories. One is in the busier parts where the streets are broad and traffic and pedestrians co-exist; e.g. the four *mada* streets. The next category is in relatively less busy parts where the streets have reduced vehicular traffic; these are often narrower and are in the interior of the core, catering mainly to pedestrians, push-cart vendors, cyclists and the occasional vehicle. Finally many of them are merely narrow lanes which give access to only a small number of houses and therefore have a more private and individual character. Most houses here have verandas which may be covered with iron grilles or wooden *jallies*. The verandas form a continuous row of seats at varying heights along the lane and the narrow width of the lane permits people sitting on either side to converse. Streets of varying widths, and with twists and turns, provide useful spaces for passers-by to stop, for housework and for side-walk vendors and their small businesses. Such lanes are often used for festivals when the lane itself may be decorated for the occasion at the way-side shrines, as occurs also along the processional paths of the temple cars.

North *Mada* Street is typical of the first-mentioned category. It has a number of shops and houses that are at least seventy to hundred years old. Along the edge

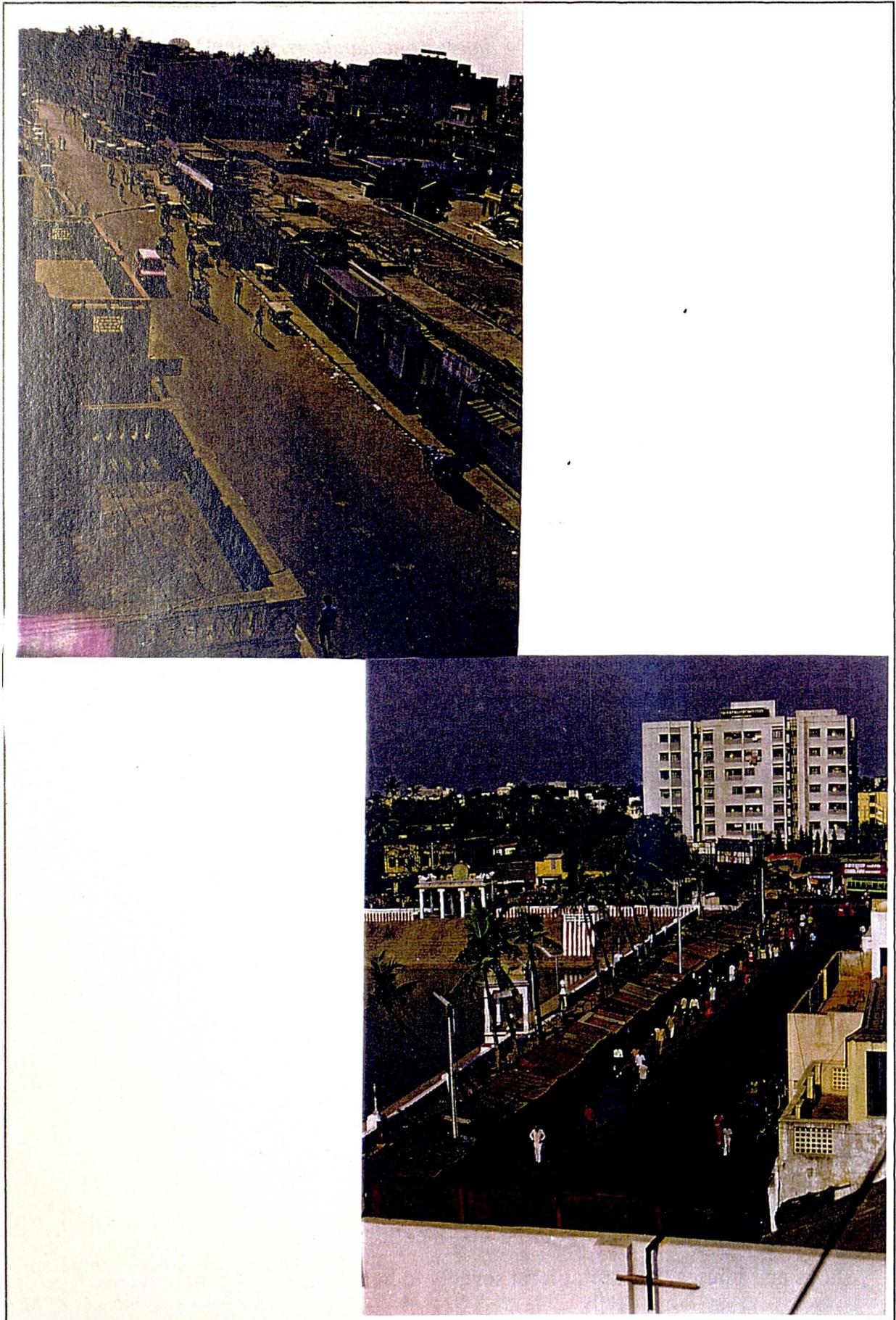


Figure 32 Changing character of shops on two ends of North *Mada* Street, from single-storey height to multi-storey

of the tank are many informal vendors selling bangles, small wooden toys and other traditional items. Many houses in this street are being converted into marriage halls. This trend is relatively new, but is in keeping with the activities of the core as the customs dictate a visit to the temple *janvasam* before the marriage ceremony and later. But proper facilities to accommodate the huge numbers of people, cars and services for the halls have to be provided and the conversion of these buildings into halls in many cases does not blend with the street facade in terms of the surface treatments and sometimes the scale. This has to be controlled if the streetscape is not to be disfigured.

Other problems to be faced in the area are the number of encroachments and high buildings and the absence of open spaces other than the streets themselves and the temple tanks. Moreover new style buildings replacing older ones do not fit into the existing context, and are often undesirably large in scale (see photographs opposite). The informal vending and the vegetable market abutting the tank restrict pedestrian and vehicular movement; and street furniture such as seating along the edges of the temple tank and signage are almost non-existent.

Transport and its infrastructure is an important aspect when dealing with the problems within the Heritage Zone as in the case of York where the two main concerns in answer to that situation have been traffic management and traffic calming (refer last paragraph in Section 6.4).

By far the greatest single obstacle to the rehabilitation of the historic core of York is road traffic and its familiar accompaniment of noise, smell, congestion and visual intrusion. Money spent on buildings will be wasted unless the traffic problem is progressively solved at the same time (Esher, 1968).

The same may be said of the areas of Mylapore and Santhome. Traffic on Santhome High Road connecting north and south Madras is relatively smooth flowing due to its linear nature and being bounded on one side by the seashore. The traffic input is mainly from the west. The situation on the Ramakrishna



Figure 34 below: The junction of South and West *Mada* Streets with vegetable market and petrol filling station; above: toilet inappropriately located along Temple wall on left and electric transformer along the temple tank on right

Mutt Road on the other hand can be described as chaotic. Traffic intensity is very high with an influx from almost every direction. The presence of the bus terminus and a petrol-filling station on one edge of the Temple Tank add to the congestion (photograph opposite). Most smaller roads that lead off the main road go into the adjoining residential areas. Pedestrians never have right of way and pavements when present are narrow, uneven and often taken over by hawkers.

To add to all the present chaos, there is an on-going scheme for the Mass Rapid Transit System which includes the siting of a station just off the Ramakrishna Mutt Road along the Buckingham Canal. This will inflate land values and encourage land speculation in the neighbourhood. Undue commercialisation will result and it would also add to the traffic and pedestrian congestion and traffic management problems. Such traffic dilemmas are not confined to these two roads and the congestion and encroachments are widespread throughout the area and need attention. If the physical fabric of the Heritage Zone is to be conserved, traffic management and possible pedestrianisation in the core area has to be addressed as in the case of York (Esher, 1968) where traffic restrictions, in some cases controlled access and pedestrianisation were imposed (referred to in Sections 6.4 and 6.5.4).

5.7.5 Basic city infrastructure

This section will touch upon the situation of water supply, sewerage and drainage within the Heritage Zone. Recognising that it is a vast but important aspect of urban regeneration, this section will highlight the main issues and the problems and opportunities they present to the overall development of the Heritage Zone.

The present almost complete absence of water in the two temple tanks (Kapaleeshwar Temple Tank and Chitrakulam shown in figure 36) greatly reduces their symbolic and ritualistic significance for worship. This is not due

merely to an appreciable drop in the rainfall in the city for the past fifteen years but is mainly due to heavy water withdrawals by the increasing population and a corresponding flourish of construction activity. The average annual rainfall is 100 mm. as calculated between 1975 and 1990. The city received near normal rainfall in 1993 with 75 cm from the north-east monsoon (October-December) and 27 from the south-west (June-September), with the average annual rainfall being 132 cm.

Added to all this is a water supply system that is more than a century old. Inadequate recharging of aquifers and the reclamation of a number of open spaces, previously catchment areas, for new building activity have further increased the gravity of the situation. Another problem is that the infrastructure and pipelines cannot cope with the present demand and often repairs to old pipes that are corroded and worn away due to age would be so costly that they are shut down. Sinking of deep bore wells and indiscriminate drawing of ground water from sources all over the city has been on the increase and added to the problem. The Central Ground Water Board has warned that the groundwater has now been over 80 per cent depleted and further extraction should be done with caution for fear of salt water intrusion. The municipal water supply, or Metrowater as it called, is quite unable to meet the growing demands and hence the apparent drought conditions. A quote from the article *A City Wrung Dry*, Frontline, July 2, 1993 on the gravity of the water situation reads:

Against the per capita water consumption norm of 200 litres for a metropolitan city in India, Madras, as of January 10, 1993, has recorded 70 litres, supplied on alternate days. In theory then this works out to 35 litres per head a day, and further rationing is expected.

...Does this mean the people of Madras will have to make do with a little more than a pot of potable water a day for the next two years until the Krishna waters flow in from Andhra Pradesh?

...Yes...subject to the monsoon.

What then are the alternatives? Projects such as the Telugu-Ganga and Cauvery

river projects from the neighbouring states, the Palar water scheme, conversion of Pulicat into a fresh water lake, desalination and other such schemes in addition to augmenting the supply from the existing reservoirs at Chemberambakkam and Poondi and flood conservation schemes seem to be the obvious answers. The situation in the Heritage Zone depends on such overall schemes for Madras city. But what can be controlled at this stage is the increasing population densities and further demands on the already crumbling infrastructure, and immediate work is needed for new pipelines and arresting leakages and wastage by prompt repairs.

The existing sewer network in the Heritage Zone is also inadequate to meet the growing needs and large quantities of untreated sewage are presently being let into the Buckingham Canal. A storm-water pipe system exists but tends to become blocked during the dry months and is totally inadequate to cope with monsoon downpours when they come so that roads are quickly flooded. The situation is aggravated by this area being at sea level. At some places sewers and storm-water drains have been inter-connected, to serve as a means of flushing the sewers with the storm-water; and at other times the quick answer to relieve the pressure on sewers has been using the storm-water drains as spill-over. This very improper system makes it impossible to charge the temple tanks by using the storm-water drains and thus alternative sewage disposal methods and identification of new catchment areas to charge the Temple Tanks, in addition to addressing the water situation are some of the issues to be taken up in the Heritage Zone (see Appendix III).

5.7.6 Tourism in the Heritage Zone

Santhome Basilica and Mylapore Temple are the two main centres of attraction for a large number of national and international tourists (see Appendix IV). In addition tourists congregate at the times of annual festivals when crowds throng into the Basilica, Temple and around the tank (see survey of religious geography

within the Heritage Zone in Appendix IV). The sea front, said to be the second largest in the world, abutting the Basilica is yet another major attraction.

Madras having an almost uniform climate throughout the year, has no particular tourist season, and all times of the year are appealing. Other factors that influence tourists to visit Madras in addition to the religious festivities are the rock-cut temples of the 7th century at Mahabalipuram 42 kms. from Madras, the National Reserve and Deer Park, its institutions of higher learning, trade and commerce. Madras is also the regional headquarters in the South of India for many concerns like the passport office, foreign embassies and businesses. Being the administrative capital of the State of Tamilnadu, it is well connected by road, rail and air. It is also the point of interchange for broad gauge and meter gauge trains. Since many connections are from here (the other interchange cities being Bangalore, Cochin, and Hyderabad), most transit passengers tend to spend a day or two here. Madras also has an international airport and a well established seaport, hence it is a junction not only for domestic but also international traffic.

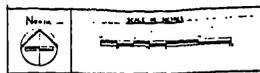
Within the Heritage Zone, both the Mylapore Temple and the Santhome Basilica are important tourist centres but regrettably the great majority of visitors spend most of their time in these, unaware of other historic spots nearby. A study of devotees coming to the Kapaleeshwar Temple shows that at least an average of 4100 people visit the temple on a daily basis. On weekends the crowds are heavier, especially on Saturday evenings when the numbers increase by over 100 per cent. These figures are for normal days and weekends. Crowds also vary with the particular festival, for example yearly festivities attract anything between ½ - 1 million visitors. Many of the visitors stay with relatives or friends, and only a few stay in hotels. Moreover the few hotels in and around the Heritage Zone cannot accommodate the sudden influx of tourists and development of this facility needs to be considered within the overall framework of Madras as a tourist city.

Within the Heritage Zone there are also other interesting places that could be made more appealing and to which the tourists could be directed such as St. Thomas Church (CSI), mosques, a Jain temple and such places as are referred to in Section 5.5. There are also such features as traditional streets, handicraft centres and dance academies with tourist potential. But tourists being unaware of these usually miss out on them. It is a pity that facilities to attract the tourists and keep them in the Heritage Zone over a longer period of time are not developed for surely it is in the interests of the local economy to exhibit these as well as the skills and crafts indigenous to the area. Measures to encourage this aspect of inward income generation to benefit local economies is discussed in Sections 6.4 and 6.7.4.

Another appealing aspect in the Heritage Zone is the beach. A tropical beach can be very attractive to tourists but sea-bathing is not safe in the area, due to strong currents and the steep differential levels of the sea-bed even along the water's edge. Sea-bathing Florida-style is still a Western idea as can be seen from the almost non-existent sea-bathers. Most south Indians true to their traditional and orthodox life-styles only dip their feet in the water. Facilities for sea-bathing to cater to the international tourists are more common in parts of the beach stretch like the areas of Adayar and Besant Nagar, and developed resorts further south on the way to Mahabalipuram. The sea is also associated with religious activities like the immersion of idols when devotees in large processions go to the water's edge. At present facilities like shops and kiosks for the large numbers who go not only for religious purposes, but for an evening stroll or jog along the water's edge are very haphazard and uncontrolled. Mercifully the under-utilisation of the beach as a resource for putting up shops, restaurants, slot machines and casino facilities have saved one of the longest beaches from becoming "Florida-ised". But one can see the trends for such development in other parts of the beach such as the Marina, to the north of the Heritage Zone where mobile vans provide all types of fast foods and small shops displaying shells and others sea-related artifacts soon become permanent structures along



1. MAJOR THOROUGHFARE CUTTING ACROSS THE HERITAGE ZONE
2. BUCKINGHAM CANAL - A MAJOR ENVIRONMENTAL PROBLEM
3. UNCHARACTERISTIC BUILDINGS (due to reasons of building height, bulk, setbacks from roads, surrounding buildings, facade detail colour)
4. BUS TERMINUS LOCATION
5. MAJOR TRAFFIC BOTTLE NECK
6. NARROW BRIDGE
7. PROPOSED MRTS STATION LOCATION
8. POTENTIAL PLOTS FOR LARGE SCALE DEVELOPMENT
9. NON-CONFORMING USES (such as automobile workshops, small scale mosaic industries)
10. POOR HYGENIC CONDITION (slums, poor servicing)
11. ACTIVITIES ALONG THE EDGE OF THE TANK BLOCK IT PHYSICALLY AND VISUALLY
12. DRY TANK BED (for reasons like storm water drains being plugged etc.)
13. ENCROACHMENT OF PARKING ALONG SANNIDHI STREET DISPLACING TRADITIONAL TEMPLE ACTIVITIES
14. RUINED OLD MOSQUE - VISUALLY AND PHYSICALLY INACCISSIBLE
15. CATTLE DUNG MENACE
16. VEGETABLE MARKET (proving difficult for pedestrians, servicing, poor hygenic condition and garbage accumulation)
17. CONFLICTS BETWEEN ACTIVITIES AND TRAFFIC



Issues in the Heritage Zone

the sea-front. Whether such development should be allowed in the beach stretch along the Heritage Zone or what is the type of development that can fit in with its character is discussed in Section 6.7.4.

5.8 Conflicts to be Resolved

Though the areas of Mylapore and Santhome are predominantly residential they have a rich cultural heritage and many traditional activities. Any action that may result in their demise must be carefully scrutinised and where there are conflicts of interest they need to be identified and resolved (see Figure 33 identifying the present issues in the Heritage Zone).

A conflict with the residential activity is caused by industry because it generates noise, danger, pollution and waste disposal problems. Hence any non-conforming uses such as those mentioned earlier e.g. automobile workshops, mosaic tile manufacturers have to be identified and their intrusion limited by curbing any such new development, as in the case of York where some indigenous industries were renewed and others cleaned up and land uses that conflicted with the conservation plan and its historic character were progressively removed from the walled city. Thought must also be given to preventing any further industry coming into the Heritage Zone and this has to be reflected in the conservation area plan. At the same time it is recognised that indigenous crafts which may even be small industries should remain and be nurtured; these will provide job opportunities and retain local skills and artisans.

To a lesser extent commerce conflicts with residence for similar reasons of noise, etc. and it also creates the nuisance of competition for vehicular access, parking and servicing in old narrow streets, often with no rear access. But much of the commercial activity such as trading is indigenous to the area and contributes to the cultural wealth. Large-scale commercial ventures have so far not intruded into this area but there could be conflict in the future if land use is

accommodated to allow them in bringing the additional problems of traffic, congestion and parking.

All such activities as residence, industry and commerce generate traffic and this conflicts with the existing educational facilities because of its noise and danger to school-going children; however the presence of educational institutions causes little conflict with the residential nature of the area. Tourism necessarily conflicts to some extent with the residential nature because of its intrusion on privacy and it also adds to the problems of traffic, transportation and parking. In fact heavy through-traffic conflicts with all the historic core's activities and its only possible advantage is for providing for the catering and servicing activities. The study of conflicting activities highlights traffic and transportation as the major problem (see section 5.8 and Figure 36). There is also a conflict between the needs of pedestrians and traffic in a Heritage Zone.

While there are a number of special features within the Heritage Zone that need to be preserved there are some that are obsolete; and different types of obsolescence have been discussed earlier in Section 2.4.2. For example many cloisters in the temple complexes in Mylapore have become redundant in terms of their original use. In the Tanjore Brihadeshwar Temple, the cloisters now house the administrative offices; and at other places huge halls within and near temples have been converted to marriage halls that are rented out for such functions and are able to house the huge gatherings. Such uses may be considered for places now functionally obsolete. Other instances of locational and environmental obsolescence are the toilets adjacent to the temple wall, the vegetable market, the bus terminus, the petrol-filling station and others. A similar problem exists with electric pylons, overhead water tanks, hoardings and such inappropriate sitings need to be considered for relocation where they will be less obtrusive.

There are also less obvious conflicts that may arise during the course of

development when proposals clash with cultural and traditional practices. When there is so much demand for land there will always be a conflict with developers where money is too often the deciding factor and this can lead to rising land prices and speculation. Threatened destruction of traditional housing and introduction of industrial processes which destroy local talent are two of the conflicts arising in a Heritage Zone and can already be seen in the decreasing number of traditionally skilled craftsmen.

The INTACH study report concluded that the area of Mylapore and Santhome needs to be declared a Heritage Zone. While this is yet to be done and incorporated in the MMDA development control rules, it can be foreseen that such an action will satisfy the conservationists (thought to be élitist), but may cause conflict in the minds of some residents not understanding the benefits of conservation. They may well fear the effect of proposed changes on their life style and possible higher expenses to maintain and repair their houses conforming to the high standards of a Heritage Zone. In all these conflicts an element of finance is involved so that the basic conflict becomes one between those who control the resources and those seeking to promote ideals and a better environment for the community. Moreover especially in a developing country where resources are so limited and there are many other claims, setting priorities alongside adequate focused propaganda become the crux of all progressive decision-making.

Having defined the various conflicts that can occur in the Heritage Zone, it is recognised that these conflicts can only be resolved by separating conflicting activities on the basis of priorities that maintain the historical character of the area; these in the case of Mylapore and Santhome being its religious geography, its traditional housing, indigenous trade and tourism. Therefore all activities that conflict with these priorities should be subject to further scrutiny and thorough discussion in order to deal with undesirable consequences that might result such as a disproportionate increase in heavy traffic, non-conforming land use and

industry. Criteria used in the case of York for deciding priorities for the removal of an industry or business from the historic core were its size and scale; its need to expand; the traffic it generated; its situation (e.g. on the backs of existing or potential residences); its noxious characteristics (noise, smell or smoke); obsolete location derived from river transportation that is no longer used; agricultural or market activities no longer appropriate within the walls. Such priorities leading to objectives (see Section 6.2) need to be worked out for the Heritage Zone of Mylapore and Santhome.

5.9 Conclusion

Conservation in the areas of Mylapore and Santhome has to be related to a basic set of principles and development proposals, which will root out the causes for deterioration of both the physical and cultural fabric. At present there are a number of conflicts and such can only be resolved by identifying and prioritising discordant activities. This study therefore indicates that the first need is to achieve:

1. legislation to recognise the area as of special interest, i.e. a Heritage Zone and the consequent adaptation of the present Development Control Rules to suit the needs of a Heritage Zone.
2. a statement of principles for *development through conservation* which will provide for a sustainable future of the Heritage Zone.

The Heritage Zone of Mylapore and Santhome presents on a small scale the problems, attitudes and activities of people and their environment found in many places in a world of changing values, economies and social distinctions. Everywhere the urbanisation process has to take into account the fact that historic areas are constantly being supplanted by newer planned developments for the people of all economic sections and the unplanned development of spontaneous informal growth by the urban poor. As in Mylapore and Santhome, this may be seen as an observable collage including treasures from the historic

past and the times of colonisation, post-colonial expansion and recent modern growth. All these are inter-related and this scenario is worthy of retention; so this dialogue between the past and the present, between tradition and modernity needs to be maintained and developed for the benefit of future generations.

Continuing the metaphor of dialogue which is needed between the indigenous cultures related to the past on the one hand and on the other present growth associated with international commercialisation, it should be emphasised that a balance should be maintained between the two. A city cannot live only on its past if it is to be part of the present-day global economy; and certain aspects of the indigenous cultures and lifestyles, however old and established, may have to accommodate to the inevitable development inherent in the globalisation process; and yet they must retain their roots which are what hold the community together. Mere conservation of the past results in a museum piece which would almost certainly miss out on the benefits of modern commercialisation. On the other hand excessive development, that is development for its own sake may well result in a permanent loss of well established tradition (see page 57). A vibrant and economically sustainable community will then result from the benefits of each being available and the long-term success of development will depend on giving much more importance to local traditions and established practices alongside the economic considerations in the planning process.

PART III
DEVELOPMENT
THROUGH
CONSERVATION

Chapter 6
Chapter 7

LESSONS, OPPORTUNITIES AND CONSTRAINTS
SUMMARY AND CONCLUSIONS

CHAPTER 6
LESSONS, OPPORTUNITIES AND
CONSTRAINTS



Analysis, moving towards a resolution

*To survive as a living entity into the future,
buildings, units and neighbourhoods
have to be a part of a continuing culture
with a living function in today's society.
Regeneration is bringing back life or conserving a lifestyle
which is transforming within itself,
not remodelling a past.*

6.1 Introduction

In the earlier chapters of this thesis, the main objective has been identified as justifying *development through conservation*. Chapters 4 and 5 have portrayed various aspects of the historic town of Madras and a Heritage Zone within it which is the Case Study Area. A recognition of their assets and potential and the opportunities for and constraints against achieving this intention to draw out what development options are possible. Important to this is the fact that any improvement will count for little unless the opportunities to benefit from it are available to all sections of the community, with emphasis on development which will work towards redressing current inequalities and disadvantages within the area. This chapter therefore aims to examine the options for this approach through testing them in the chosen Heritage Zone of Mylapore and Santhome. Where necessary for the argument, it will consider the implications on a macro scale for the city of Madras. The lessons learnt from the study of both the theory

and the experiences in the three English cities are then applied to the case study area and specific recommendations suitable to the context are made.

6.2 Objectives for the Study Area

Having identified the present situation in the Heritage Zone (Chapter 5), the objectives for *development through conservation* may be summed up as:

1. *Mylapore and Santhome should remain alive, exhibit their traditional character and contribute to the overall development of Madras enabling it to compete on level terms with neighbouring cities, new or old.*
2. *The environment should be so improved by the elimination of decay, congestion and noise that the Heritage Zone will become highly attractive as a place to live in and stop the migration of people to other parts of the city.*
3. *Inward income generating activities suitable to the ethos of the Heritage Zone should be encouraged so that adequate opportunities and resources become available for the benefit of all the residents.*
4. *The historic character of the area should be so enhanced and the best of its buildings of all ages so secured that they become economically self-conserving.*
5. *Land uses that conflict with the character of the Heritage Zone should be progressively removed.*
6. *Within the Heritage Zone the erection of new buildings of anything but the highest architectural standard suitable to the area should*

cease.

7. *Relevant legislation to enable the above objectives to be realised, should be enacted as soon as possible.*

In order that residents and visitors alike may fully appreciate the built heritage the extent of the Heritage Zone would have to be clearly defined; then the designated area will have a specific meaning in terms of action to be taken and the authorities can take this into account when deciding on their plans. Specific designation will have to include key sites like the Kapaleeshwar Temple and its immediate environs (Section 6.5.1), the Santhome Basilica, specific types of traditional housing of considerable architectural importance (Section 6.5.2), traditional streets with townscape value (Section 6.5.3) and the main traffic corridors cutting through and affecting the Heritage Zone (Section 6.5.4).

With the outlined objectives and priorities in the Heritage Zone and learning from the different approaches and successful experiences of York, Manchester and London, in this case Covent Garden, the good results in each case are worth appropriating for the *development through conservation* of both the Heritage Zone and the city of Madras. However, it is recognised that the Indian context provides a somewhat different set of parameters and the application of the principles will need certain modifications based on the author's understanding of the local opportunities and constraints and these are highlighted below.

6.3 Lessons drawn out from the theoretical justification

From the review in Chapter 2, it has become apparent that *development* has no one universal model and that it needs to be appropriate to the local people, place and society. The ultimate challenge in promoting *conservation* is to involve people and their day-to-day activities. For the residents the Heritage Zone is the place in which they live and work and they cannot be regarded as artifacts or

museum objects; neither can they be "conserved" against their will and desire, nor stay immune to "gentrification" in the process of modernisation and development. It means that conservation and development policies have to go hand in hand with the actual needs of the locally affected community so that they not only survive, but develop, grow and prosper in order to contribute to the present and future wellbeing of their families, their businesses and their city.

Conservation has already been clearly defined in its aims and approach (see Section 2.2) and a consensus on the priorities is necessary before it can influence development; and then proper and controlled planning needs to be emphasised to ensure the needed holistic approach. Furthermore there needs to be a constant reviewing of the goals of both development and conservation so that the right balance is maintained.

There is plenty of opportunity for applying all these lessons within the Heritage Zone and capitalising on the rich legacy that is waiting to be used to advantage. Then both *development* and *conservation* can be of mutual benefit and this can only be good for the prosperity of the city as a whole. However, there are constraints and the basic one is to achieve recognition by the authorities that this is a unique situation and deserves special consideration, financial support and suitable adaptations to the present Development Plan (see Section 5.8). Once this has been formalised, there is the constraint of negative public opinion and the public need to be made aware of the benefits of the scheme in such a way as to gain their co-operation and instil civic pride.

6.4 Lessons from York

Having studied the varying development strategies of the three cities, the emphasis in York has been identified as utilising the potential for conservation and pedestrianisation. The latent assets in the built heritage were uncovered, restored and put to gainful use instead of being demolished or modified beyond



Figure 33 The dilapidated Kesavaperumal Temple Tank (bottom), the Kapaleeshwar Temple Tank (above) and other structures showing changing land uses in the Heritage Zone.

One of the major problems that York had to face was the congestion of traffic and the narrowness of streets. This problem was addressed by creating pedestrian precincts in the centre, reorganising the traffic flow and introducing schemes such as Park and Ride. Since an efficient transport system is an important prerequisite to a city's overall development, it must be given priority and recognised that more problems can be anticipated by its being a Heritage Zone with special requirements of pedestrianisation, reorganisation and so on. Opportunities for applying this lesson are found especially in the immediate areas around the Temple, the Basilica and the Ramakrishna Mutt Road.

6.5 Lessons from Manchester

Here the strengthening of public services, developing the higher education sector, identifying and backing strategic projects to promote sports, arts and culture, regenerating derelict residential areas and marketing the city's image both at home and abroad have all contributed to the success of the development programme. In contrast to York it has been identified that the emphasis has not been so much on conservation as on inner city regeneration and community participation. This joint effort of planners and the local residents is an essential aspect of successful *development through conservation* and is crucial for the Heritage Zone also.

Other lessons from Manchester that can be applied in Mylapore and Santhome have already been taken up when considering the lessons from York. An additional lesson here is the importance of marketing its particular strengths in order to attract both visitors and investment.

Within the Heritage Zone there is plenty of scope for identifying both existing potential and new opportunities for strategic projects for promoting arts and culture, which in turn will promote tourism. Existing assets that afford an opportunity for development are the Temple, Basilica and other such religious

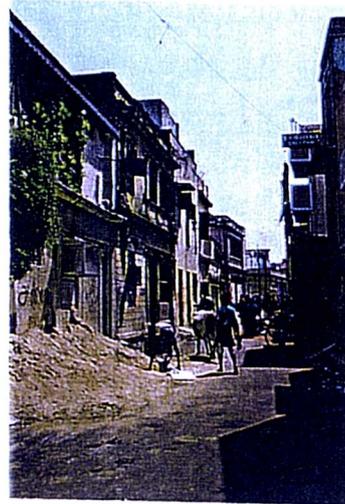


Figure 34 Additions and alterations to housing in the Heritage Zone.

and historic sites, traditional housing, festivals and celebrations particular to the area and local skills and crafts (making jewellery, wooden toys, bangles, sweetmeats and other home-based products) in their natural setting. New opportunities exist in the improvement of the beach as a recreational facility, the opening up of workshops and exhibition space for the exposure of local skills through demonstration and sale, the building of museums to exhibit local arts and crafts and archaeological finds and the extension of facilities for training and demonstration of performing arts such as *bharatanatyam*, Indian classical music and *katha kalekshepam*.

At present, too much traditional housing is being pulled down and replaced by modern constructions which are thought to have economic advantages; but the experiences in Hulme, Salford and Castlefield show that with suitable incentives the owners can be persuaded to restore and maintain their old properties and to take pride in their contribution to local heritage. Such incentives could stop not only the present trend of degeneration in housing but also of other deteriorating structures that are found in parts of Mylapore and Santhome. An example of degeneration of an area can be seen at the Kesavaperumal Temple where its tank Chitrakulam, has been allowed to become dilapidated and out of use. It is appropriate that a body such as the Hindu Religious Endowment Board should assume responsibility - financial and administrative - for such, as projects like these would provide a 'breathing space' in the midst of a very crowded locality.

Just as the effectiveness of good marketing has now brought the Commonwealth Games to Manchester, so there is an opportunity in the Heritage Zone to project the image of the area through a well-thought out strategy, which will in turn bring in visitors on a national and international scale. Already thousands come into the area at the time of festivals from all over the country. They take part in the religious festivities and with that their visit is usually over. But if they can be persuaded through effective marketing to spend time in other *places worth*

visiting within the area, it could be one way of sustaining local economies and give them a boost. If the visitors are suitably impressed by the facilities and rich character of the environment, they will be effective ambassadors in encouraging others to visit. Publication material could also project the image; at present this is non-existent and is another opportunity waiting to be tapped.

6.6 Lessons from London

The lessons identified for successful development coming from London's experience relate to a large metropolitan city and therefore they can be more suitably appropriated by the city of Madras than by the limited area of the Heritage Zone. However, it must be recognised that any development within the case study area must be an integral part of the total development plan under the MMDA and cannot be conceived in isolation.

The future for London as it approaches the turn of the century is being reflected in its four-fold vision based on a strong economy, a good quality of life, opportunities for all and a sustainable future. These have already contributed to its development as a world-class city and can be used as criteria for planning the future development of Madras. Also London's now established position on the international scene emphasises its global importance and this can have lessons for Madras, as it seeks to take advantage of its siting near the Asia-Pacific Rim. Furthermore any improvement to the city as a whole along will be beneficial repercussions to the special area under study.

Development in London has concentrated on making it a centre of financial and commercial activity, building up its communication and administration networks and establishing itself as a focus for culture and knowledge. This has been made possible by building up an adequate and multi-faceted infrastructure to facilitate a high quality of life. The overall picture of development here shows that it has been successful not only through its conservation measures but also through

emphasis on such aspects of development as concern for building up the right relationship between the city and its hinterland, using public expenditure on infrastructure to attract private investment, putting more emphasis on services than manufacture and by seizing opportunities for further development as they present themselves. All these beneficial aspects of development are needed in Madras but it is important to see that they are not introduced at the expense of local distinctiveness.

Another lesson that comes out of the development at Covent Garden is the proximity of commerce and culture to the mutual benefit of both. This has only been possible because of the part played by public opinion in the propagation of which committed professionals and community groups were important. Dogmatic schemes of the planners who ignored history and character of Covent Garden were thus kept at bay.

The importance of a 'breathing space' along with the retention of local communities as a means of contributing to the growth of the area was crucial to redevelopment of Covent Garden. Similar opportunities might well be availed of in the Mylapore and Santhome area. In order to counteract the tendency to migrate out of Mylapore and Santhome, it would be important to maintain adequate housing and other associated incentives. If this were done, as in Covent Garden so too in the Heritage Zone of Madras a living community would be well placed to contribute to a vibrant future.

Covent Garden is particularly power wielded by the relevant local authorities. The latter are open to the temptation of damaging the communities in the name of development. Their power can only be tempered by increased public participation. The importance of this balance for the Indian context cannot be exaggerated.

6.7 Opportunities and Constraints in the Case Study Area

An evaluation of what already exists (see Chapter 5) in terms of usage, condition of the structures, obsolescence, redundancy and local customs and traditions has led to defining the objectives and priorities (see Section 6.2) for action within the Heritage Zone. There we have said that the first step is to designate the area as one of special interest and then identify smaller areas for concentrated efforts. From the lessons learnt (see Section 6.3 - 6.6) some opportunities the Heritage Zone presents have been identified. Now four areas of special concern are taken up for more detailed consideration in view of their opportunities and constraints. They are housing, infrastructure, transport and tourism. Also realising that this special area is part of the much bigger area of Madras City and that the opportunities of developing certain features are often dependent on developing the same feature on a larger scale in the city, a macro view is also referred to.

6.7.1 Housing

The housing situation and the changes in patterns of urban growth (as discussed in Chapter 5) both in the city and the Heritage Zone have not merely been to establish new settlements and suburbs, but have also taken place vertically within the existing areas. High-rise commercial buildings are now infiltrating most areas, thus seriously disturbing the traditional character of the city. Both Mylapore and Santhome are facing the same problem of the replacement of traditional vernacular housing and bungalows by tall apartment buildings and the addition of new floors to existing buildings, without any regard to style or character (refer photographs opposite).

Rapid increase in population is reflected in the present high density of housing, whether it is new or existing, *pucca* or *kutchra* and the problem has already reached serious dimensions. This is due to increasing family sizes, sub-letting of houses and unaffordable high rents, which in turn have often led to a cut-down

in the house size and fast dilapidation of the housing caused by the lack of maintenance and alterations to accommodate yet more inhabitants. Demographic projections for Madras vary considerably but such consensus as there is suggests that by the year 2000, the city's population will be over 7 million. This will put ever greater pressure on the housing situation including that within the Heritage Zone.

Another projection is that the labour force is expected to increase considerably as a result of a rise in the employment of women, incentives to small-scale industries, more enterprise development, financial aids, compulsory educational and training programmes for people in the lower income categories (Appasamy, 1991). This will have its effect on the Heritage Zone in terms of both the mix in population and further housing shortage; it could also challenge the existence of the many resident traditional craft-based enterprises.

Provision of housing stock is influenced by the potential supply of land and vacancies therein. This has a dual impact on the built environment. On the one hand there are the speculative land prices and high-rise structures, and on the other the need for sensitive development. The potential of vacancies is undermined by factors such as ownership disputes, financial incapacities and problems of land acquisitions and; and going by past experience in public land acquisition for the provision of public sector housing, as highlighted in the research paper on "Land Supply in Madras Metropolitan Area" (Chandrasekharan, 1991), the picture is anything but optimistic. Since the density of housing is already so high and new land for the purpose is no longer available, there is no scope for new housing within the Heritage Zone. In cases of existing vacant land and in case any land becomes vacant in the future, they should be allowed to remain vacant and provide much needed open space in the area.

There is only a small potential for new housing involving renovation or rebuilding of existing structures. These may include premises that have become

dilapidated. Such possibilities may well be taken advantage of in order to increase the housing stock consistent with the requirements of the Heritage Zone. At present there is a considerable mismatch between skills and job availability resulting in migration for new employment. This suggests an opportunity for initiating suitable training programmes which will not only provide the skills but help towards retaining the craftsmen in their traditional setting. Provision of housing for such traditional entrepreneurs will be an incentive and an opportunity worth exploring to add to the housing stock and as it is an important that consideration be given both to improving the existing stock through conservation measures such as re-use and rehabilitation, and to finding new uses for old buildings and areas. But all these possibilities are constrained by limitations such as affordability, succession and inheritance laws, maintenance of common areas and such like.

Housing in a Heritage Zone should be seen not only as providing accommodation for residents but also a valuable asset towards the total picture presented in the conservation plan; for example each style depicting a different period in the history of the region links the present residents with their ancestors. This can help to build up a sense of continuity and security of belonging to a stable community. Therefore to conclude, though the need to provide more housing is a priority in the Heritage Zone, there is at the same time an opportunity waiting to be tapped in terms of new uses for old buildings; and learning from experiences abroad, as in York and Manchester this can be highly successful (see Section 6.9.2).

6.7.2 Movement, transportation and telecommunications

In a city of 4 million people that has expanded as rapidly as Madras, the present state of the traffic is undoubtedly a major consideration and this can be witnessed in the amount of congestion in the streets. The magnitude of the problem is becoming increasingly alarming because of:

- the rapid and uncontrolled increase in the rate of car and two-wheeler ownership;
- the unmanaged limited capacity of the city's roads, fly-overs, sub-ways;
- the menace of stray cattle on the roads;
- the uncontrolled spill-over of vendors and hawkers from the side walks on to the roads;
- the increase in commuters (from 780,000 in 1941 to 3,300,000 in 1981).

This situation is a severe constraint on the development of other facilities and the well-being of the Heritage Zone and the city as a whole.

However, the strength of the public transport in the form of buses, suburban railway and the 8.4 km. of Mass Rapid Transit System (MRTS) under construction are the better facilities of the area. The MRTS project is planned to connect areas with a concentrated population such as Mylapore, Triplicane and the CBD. It is estimated that 600,000 passengers will use the service once it is commissioned, though adequate support in terms of parking, and controlling the mass passenger exodus is yet to be planned. To add to all the present chaotic situation, is the MRTS's proposal to site a station just off the Ramakrishna Mutt Road along the Buckingham Canal. This will inflate land values and encourage land speculation in the neighbourhood. Undue commercialisation will result and it will also add to the traffic and pedestrian congestion and management problems. Traffic on Santhome High Road already has its own problems in catering to the school traffic and those others who use the road as a thoroughfare (see Section 5.7.2).

Such traffic dilemmas are not confined to these two roads and congestion and encroachments are widespread throughout the area and need attention. If the physical fabric of the historic core is to be conserved, one of the issues that needs to be addressed is its adaptation to modern traffic requirements. However, the scope for any alterations and road improvements (widening, cutting and curving, etc.) is limited and anyway such changes could threaten not only the

physical fabric but the social life of the neighbourhoods and street activities; and in turn this could destroy the distinctive character of the area because of the resulting noise, vibration, fumes, air pollution and visual disharmony. All this points to the desirability of pedestrianisation of the core of the case study area, (see Section 6.9.3) and possible traffic reorganisation (see Section 6.9.4).

The many aspects of the telecommunications system in Madras must be greatly strengthened and massive financial inputs to bring it on a par with other established cities are beginning to take place. Electronics has already made an impact on the Indian banking industry and in Tamilnadu it has been declared as a high priority development area (Gopalakrishnan, 1991). Such studies have shown that at present Bombay scores over Madras in terms of telecommunications with the introduction of services like paging, mobile phones, electronic mail. Bangalore, another city in a neighbouring southern State is also fast emerging as a telecommunications centre. If Madras is to retain its pre-eminence as a leading financial centre in the south and use its present standing to build its resources to compete in the international arena, then it is imperative that the State Government channels its vision towards the provision of the necessary infrastructural facilities. This will be critical to the success of the city to be established on a global scale.

6.7.3 Basic city infrastructure

Another set of priorities in both the city and the Heritage Zone is the obvious need for adequate services and infrastructure as the lack of this at present is contributing to the dilapidation of the area, as well as forming a major constraint for any future regeneration plan. Therefore if a major city can only boast of 20 per cent of its citizens enjoying basic infrastructural services, it is obvious that there is an urgent need to give highest priority to this development especially within the case study area. Some of the opportunities and constraints to be addressed are in the following paragraphs.

Within Madras City, conservancy involves the single greatest expenditure among the various municipal services, accounting for roughly 20-26 per cent of total investment; and yet in 1991 out of a total population of 3.8 million, 30 per cent did not have access to any form of safe sanitation and toilet facilities (Menezes, 1991). This is also the situation in the Heritage Zone (see Section 5.7.9) and at present this constraint is hindering much of the development and there is an urgent need to concentrate maximum effort for the introduction of new systems and their extension to cover the whole area.

At the beginning of 1991, it was calculated that Madras city generates roughly 2,500 tonnes of garbage every day of which leaves, vegetation, organic matter and night-soil account for almost 65 per cent. Due to limited land availability and other operational problems, it has been extremely difficult to arrange for proper sanitary fills and with garbage vehicles being in short supply for various reasons, even the normal cycle of storage and removal is not maintained. Within the Heritage Zone much of the local garbage is dumped on the banks of the Buckingham Canal and in the south-east corner of the study area and these unsightly dumps are potential sources of disease.

Madras has the lowest per capita water supply of the major cities in India and over recent years has been repeatedly struck by drought and erratic monsoons. Till recently the city depended for its water supply entirely on surface storage in the three reservoirs of Poondi, Red Hills and Cholavaram. Now it has become necessary to supplement the supply by drawing from ground water and other major sources like the Krishna and Cauvery River projects.

The main waterways in Madras are the Cooum and Adayar rivers, (287 and 847 sq. kms. of catchment areas respectively) running west to east and the Buckingham Canal (406 kms long) running north-south and parallel to the coast. In addition there is another smaller water course, the Otteri Nullah, discharging into the North Buckingham Canal, and numerous temple tanks in and around

the city, most still being used for religious purposes. The principle sources of pollution affecting the water courses are: unsewered areas and properties, effluent from sewage treatment plants, flood water and storm drainage, industrial effluent, slum settlements, cattle wastes and solid wastes.

It does not need much investigation to realise the reasons for this deteriorating condition of the infrastructure, since most of the water supply and sanitation networks date back to the 1930's and they have become totally inadequate to cope with the increased population requirements. Their condition is poor and most of it requires renewal and upgrading. Low-lying areas that served as reservoirs for the water during the monsoons have become infiltrated with slums and squatter settlements and these have later become legalised. Such development not only prevents storage during monsoons and causes floods, which inundate the housing, but also adds to the strain of the municipal services as they need temporarily to accommodate the residents and restore the sanitation system at large. This also occurs within the Heritage Zone along the Buckingham Canal and is repeated every monsoon.

The water supply situation in Mylapore and Santhome has already been referred to in Section 5.7.9, additionally there is a need to identify new catchment areas to replenish the temple tanks and provide safe or potable water.

Cattle menace arising from the maintenance of cattle within the city limits is another serious problem; most of them are maintained in the densely built up areas of the city, of which Mylapore is one such, and the maintenance of milch cattle in densely populated areas adds to the already grave water and sanitation situation. However, harnessing the wastes from cow sheds can produce biogas, which is a cheap and environmentally compatible fuel and would be a means to help to reduce dependence on fuel inputs from outside, and so aid sustainable development.

6.7.4 Tourism

The opportunity that tourism affords is becoming more widely recognised. Every year thousands come to Madras and especially to Mylapore and Santhome from all parts of India and abroad. Every day thousands of worshippers come everyday to the Kapaleeshwar Temple (study of devotees coming, see Appendix IV). All these bring vitality and are income-generating and not only build up the potential sources of wealth, skills and craftsmen in the area but also nurture the growing self-sustainability of the residents. Increasing numbers of visitors can help to improve the facilities available and provide resources for further exploiting the treasures in the Heritage Zone.

Like York many tourists are only one-day visitors; and for these more facilities like cafés and shops, drinking-water fountains, as well as toilets and garbage bins need to be provided. Townscape and city centre management is relatively unknown in India; among other managerial responsibilities they need to be concerned with more visual and aesthetic aspects such as the provision of street furniture and better lighting that are sympathetic and harmonious to the conservation area. Consideration also needs to be given to providing adequate sign-posting, pedestrian crossings and information centres; these improvements can be achieved by the normal process of local authority planning together with educating the public and increasing the awareness of need.

There are also long-term tourists from other parts of India and abroad, requiring over-night accommodation, but at present there are few lodgings or hotels within the Heritage Zone. The character of the area can still be maintained by rehabilitating existing buildings to cater for these new requirements. The overall development starting with the infrastructure of the city gives an emphasis to the study of proper communication links between areas, much needed by tourists; in turn the tourist income can become significant to finance city investment. This growing industry is labour intensive and small-scale so many can be involved it

could be called the twenty first century version of 'subsistence agriculture'.

Pedestrianisation in certain areas of the Heritage Zone would have several advantages for the tourists, and this justifies the idea of re-routing the traffic to the outside of the historic core. It will also bring the public closer to the actual heritage sites; and there is the opportunity for providing maps and other publications which will be part of the marketing strategy for the area.

As pointed out earlier excessive catering to tourism can lead to destroying the ethos and commercialising the heritage. Therefore it is important that a right balance is struck between the two and decisions sensitive to the Indian way of thinking are taken. For example there must be adequate provision of vegetarian food outlets (*udipi* hotels), and the readily available religious icons must not be allowed to become so commercialised as to encourage trafficking or cheap and shoddy reproductions of religious symbols.

In the case of the stretch of beach along the Heritage Zone, we had identified earlier (see Section 5.7.6) that it is relatively free of structures catering to the tourists. The type of development here that justifies consideration is an extension of facilities for temple processions that immerse idols in the sea water. Right now all stretches of the beach along the entire coastline of Madras are open to such activities with no selected or pre-determined points of entry. One such may be designated for the Heritage Zone so that the rest of the beach is left to strollers, joggers and children playing.

6.8 Other Constraints Intrinsic to the Indian Context

As indicated earlier, the local political system operates within the context of national politics, i.e. decisions, even at the local level, have to be politically acceptable. The debate on this is not within the scope of this study, but what may be identified are the criteria for politically acceptable interventions. These

are often large-scale and involve major physical programmes and mass appeal such as the MRTS project that passes through the Heritage Zone. The question here arises of how this development and other such projects fit into the context of conservation policy of the Heritage Zone? The general answer is that it does not, as things stand.

Most of the opportunities that have already been identified will come up against financial stringency and the general inadequacy of funds. Therefore it is important that in the Heritage Zone a clear case is made not only for its conservation but also for the income-generating development opportunities it presents to the city as a whole. The author's case is that development must include conservation and conservation should include sensitive development. Only on this basis can economic growth in India cope with both the quality and quantity of her heritage and at the same time provide new opportunities for her people.

As nearly 25 per cent of the residents in the Heritage Zone are slum-dwellers and squatters, they form a significant community. Relocation of their settlements on the banks of the Buckingham Canal while apparently necessary cannot be regarded as a realistic possibility for, eventually they will return to take up the service jobs in that part of the city. Any proposal for the rehabilitation of squatters in Mylapore must be preceded by studies that will progress their businesses, improve their training and develop the infrastructure that they need to support the expansion of the services they provide. It is appropriate here to promote the general notion that suitable housing policies must be developed to improve the life opportunities of the squatters and to see them not as a liability but as a resource for the future benefit of the community as a whole, backed up with legislation. It seems that the present biased attitude, that the slums and their environment pose a constraint for the Heritage Zone is "ill-informed" and prejudiced, but in fact they can the means by which to develop the whole project if they are legitimately taken into account.

Where movement of activities has to take place due to their being non-conforming to the ethos of the Heritage Zone and families need to be relocated, both control legislation and encouragement through systems like the transfer of development rights, tax concessions and other incentives are required. Development schemes for empty spaces as they become available, (e.g. Chitrakulam a dilapidated and disused temple tank in the case study area, see Section 6.9.1 para 3) into parks and open squares are ideal and need incentives. The removal of such a constraint as the non-conforming use of land within a Heritage Zone (the mosaic and automobile workshops) can then become an opportunity to enhance the public awareness of the area's special character and provide a breathing space.

The present situation in Mylapore and Santhome illustrates how unrestrained and unguided developers have intruded and contributed to damaging the character of the area. Their demands in terms of any new development or repairs to existing buildings need careful scrutiny and they must be subject to the strict enforcement of the special rules applicable within a Heritage Zone. The present constraint is that the Development Control Rules do not address the special needs of the Heritage Zone and these need to be much more directed towards issues of conservation. It is recognised that development of any area is necessary but at present the economic pressures to achieve this outweigh all other considerations. On the other hand when an area is designated as worthy of being conserved as a Heritage Zone there are at present no noticeable efforts to achieve this. Special consideration must be given to realising the vision and enforcing the principles of conservation in order to achieve a proper balance between development and conservation.

Many of the situations which arise in a Heritage Zone will come up against the constraint of conflicting interests. Relocation of the bus terminus along the edge of temple tank to suit pedestrianisation, as well as the overall plan for traffic re-organisation in the area, will face conflicts arising from the practicability of the

move, the inconvenience to commuters and many more. If this kind of municipal intervention is to succeed, it needs public support; the authorities must present an overall vision for the area together with a step-by-step time-table showing when and how it will be completed, how the private sector is to contribute to its implementation, as well as the benefits that will accrue.

6.9 Recommendations Arising from Lessons Learnt

So far a number of lessons, opportunities and constraints for *development through conservation* have been identified. In order to show their applicability four significant sites within the case study area have been identified for detailed recommendations; many of these can also be applied to other parts of the Heritage Zone. The four significant sites are as follows:

1. *Kapaleeshwar Temple and its environs.*
A congested religious centre with commercial activity in need of selective redevelopment.
2. *Housing in Mylapore and Santhome.*
The hinterland of the historic core containing many houses in traditional and vernacular styles and in need of comprehensive conservation, preservation and readaptation to ensure their continued existence.
3. *A traditional street.*
A typical historic street suffering from blight due to encroachment and many alterations resulting in changed streetscapes.
4. *Movement, traffic and transportation.*
The present chaotic movement patterns, especially of vehicular traffic, requiring immediate attention and reorganisation.

6.9.1 Kapaleeshwar temple and its environs.

This is a historic area that still has to a large extent its cultural character but is suffering due to an increasing trend of characterless commercialisation and a

gradual encroachment of changing land uses around it; it is in need of selective development. The adjacent Kesavaperumal temple area and Chitrakulam are now in a derelict condition (see Figure 36) and the many other surrounding historic buildings are in need of a comprehensive development programme.

If the Temple is to be seen as a centre for worship and tourism, it is essential that it is properly maintained. For the tourists' benefit, a brief history of the temple and the various structures within needs to be produced with a plan of the complex. Nearby historic tourist spots and other areas of interest in the Heritage Zone can be highlighted and historical and cultural information provided; also serviced public conveniences, drinking water fountains and other such facilities have to be made easily accessible. The manner and standard of civic amenities provided at the centre will then raise public awareness and the need for high standards will spread to other areas. The first task is to choose certain sites to act as focal points for upgrading in order to attract public support. For instance, the temple tank is in urgent need of thorough cleaning and then of constant supply of clean water both for the convenience of worshippers and the 'beautification' of the area.

Chitrakulam,(see Figure 36) the other tank in the area to the south of Kapaleeshwar temple, is now dry during all seasons of the year and is in a derelict condition. It is therefore proposed that this area be reclaimed as an open space within the core and developed into a park or a recreation space (see Section 6.5). The floor of the tank may be used for this while the existing steps can be repaired and used for informal seating. They could also form a gallery of seating for any religious discourses or such that may be held there, thus also symbolising the religious significance of the area with the park, becoming a "Garden of Meditation".

The immediate area around the Mylapore temple and its tank form the vital centre to the historic core. On its recognition as a conservation area further

buildings of historic interest or examples of vernacular architecture indigenous to the immediate locality need to be located and listed. Legislation concerned with the core area should require the listing of all buildings that are more than fifty years old and should include regulations to retain such distinctive features as the size, scale, mass, narrow street fronts, the courtyard type of planning and the low profile of the area. These must be identified as providing the guidelines for future additions, alterations or new buildings. Sympathetic usage of building materials, control on external finishes and façades should be introduced and the profile of low development of all residential and office buildings needs to be maintained and encouraged by the enforcement of suitable planning regulations.

Many houses in the four *mada* streets and those abutting the temple have commercial activity on the ground floor with residences above, and this upper area is often divided up and sublet for economic reasons. This feature of living over the shop contributes to the life within the core area and enhances the setting and the economic viability of the area's historic and cultural character. Reasonable amenities for the residents in the form of improved services, proper access, parking, etc. have to be provided, some by the residents themselves so that economic prosperity is not handicapped and they can continue to live there at an improved standard.

It has been observed in the Heritage Zone that most people have cycles, motor cycles or scooters, many of them are parked along the road during the day and in the verandas of the houses or shops at night. The few that have cars and the shoppers who come by car, also park them along the roads, thus inconveniencing and monopolising areas that are primarily pedestrian-oriented. Hence restricting the types of vehicles, pedestrianising the temple precincts and identifying alternative car parking need immediate attention. These solutions will bring advantages to the pavement vendors and push-cart pedlars trading in small merchandise like fruits and flowers who do not require heavy infra-structural facilities. This is a low-cost solution and reduces the need for further permanent

structures involving yet more services.

The area in front of the temple on the east side is Sannidhi Street. It is an open square now being used for the parking of cars. Freeing this area and removing obstructions would re-create the visual harmony, increase the appreciation of the area's spatial characteristics and give a better view of the temple. Similar attention needs to be given to the area to the west at the junction of Ramakrishna Mutt Road and North Mada Street, as new buildings with increased height clash with the low-scale profile of the area and affect the visual movement of the eye, distracting it from the directed movement towards the temple *gopuram*. The junction of East Mada Street and South Mada Street is presently being used for the parking of auto rickshaws, vans and mini buses which are mostly hired by shoppers to the area and tourists. The survey of the pedestrians who worship at the temple and shop within its precincts reveals that a large number of people pass through the area in the morning and return in the evenings. Due to the daily crowds pedestrianisation of the areas is urgently needed especially between 9.00 - 11.00 a.m. and 4.00 - 7.00 p.m. (see Appendix IV).

The conspicuous absence of a 'district level' vegetable market in Mylapore and its surroundings is the reason for the present vegetable market on South Mada Street. This is clearly out of place and needs to be relocated. Already there are a few vegetable shops at Mandavelli Lane, at the southern edge of the historic core, and this area could be developed into a bigger market. This area is accessible from the Mada Church Road, near the Mandavelli bus terminus, and connects with areas south of Madras like Adayar, Gandhinagar and Besantnagar. If it can be shown that the new market location can bring greater business to the present operators, they could actively be involved with the move, supported by infrastructural improvements from the municipality.

The presence of the Mandavelli bus terminus is an important service link and

expansion of this terminus and location of service vehicles like vans and those of the tourist operators may be considered along the road that connects Mandavelli bus terminus to the Foreshore Estate, where the land on the banks of the Adayar river is being reclaimed (part of a proposal within the Master Plan for Madras). Another suitable location is along the banks of the Buckingham Canal, west of the Heritage Zone and near the neighbouring commercial area of Luz, which is also a catchment area for the vegetable market. This area also lies along the Madras Rapid Transit System alignment and a new market here could be easily serviced and a convenience to commuters when the project starts functioning after completion of the present construction work along the route (see Section 6.7.2).

Freeing the edges of the Kapaleeshwar temple tank from encroachment by the vegetable market, the service vehicles and other non-conforming intrusions like the petrol-station and bus terminus, will reduce the problems involved in pedestrianising the area. This could then be suitably landscaped with shade giving trees, some of which could have religious significance, like the *peepul*. Informal seating under the trees and along the edges of the tank needs to be introduced for the comfort of users of the area and would encourage them to rest and enjoy the temple and its surroundings.

6.9.2 Housing in Mylapore and Santhome.

Another typical feature within the case study area is its housing; there is traditional housing in the Mylapore bazaar area and the housing exhibiting the colonial influence in Santhome. Both are in need of a comprehensive approach to development control in terms of their planning, additions and alterations in order to ensure their preservation for residents and possible new uses as lodgings and centres for cultural and craft activities (see Section 6.7.1).

Having identified the types and features of the housing in Mylapore and

Santhome earlier (see Section 5.7.2), proposals for their continued existence, maintenance, repairs and guidelines for new buildings need to be laid down. Typically the building density is high but yet structures are low rise; this aspect needs to be reflected in any new-build through a height restriction to a maximum of two floors. A Floor Area Ratio (FAR) restriction of 1.5 with a ground coverage of 75 per cent will help to limit rising densities. The building character in Mylapore exhibits contiguity (known in England as terrace housing), hence the need to build wall to wall with no restriction on the front set backs in order to ensure continuity of the visual character of the streets. The growing tendency to enclose the entrance veranda with a wall thus converting it into a room ought to be curbed. Further advocacy for retaining and preserving vernacular housing needs to be brought about through legislation and development control and encouragement given to owners of such structures (see Section 6.7.1).

The overall strategy for guidelines for legislation control and planning permission should satisfy the following:

- Flat roofs should have parapets and detailing similar to those existing and identified as sympathetic to local conservation guidelines. Pitched roofs should have tiles on joists and not reinforced concrete sloping roofs with a finish of flat tiles, which looks artificial and does not reflect the true character of the building material.
- Restriction on the use for cantilevers for entrance verandas is to be imposed and columns used to retain the architectural character of the veranda.
- Restoration of original façades during renovation or repairs to buildings is to be insisted on and controls imposed on materials used for external facing. Use of sympathetic cladding and decorative elements on exteriors should be recommended.

Thus legislation to control the character of the area with respect to new buildings or additions and alterations to old structures is essential and should

include the following procedures:

- Any additions and alterations to the buildings within the historic zone can only be executed only after the application is submitted and planning permission granted, ensuring it has been scrutinised for adherence to the controls and guidelines outlined for the historic core.
- Non-adherence should result in stiff penalties to discourage any defiance.

6.9.3 A Traditional Street

There are many traditional streets within the case study area and most are suffering from alterations and additions to old buildings and from new incongruous structures having come up, and thus the harmony of the street façade is destroyed. An overall plan and detailed specifications for the control and treatment of surfaces and textures with traditional building materials and methods of construction is to be evolved.

The four *mada* streets around the temple in Mylapore are worthy of special mention. These processional routes need to be given special visual status and encroachments along the streets removed with regular cleaning and road sweeping. Surfacing of roads and the construction of continuous pavements on both sides of the road, even if they are narrow, is recommended to reduce accidents due to uneven surfaces and the proximity of traffic. The immediate edges of the tank need to be freed and made more accessible. Ungainly and obtrusive hoardings must be removed to provide a smooth visual flow. Guidelines for new development in these areas should be drawn up based on the existing local uniformity of the building bulk, height and set backs. These have to relate to the heights of buildings, the verandas and seats in front (see Section 6.7.1) which will help to give the whole a sense of harmony.

There is often an accumulation of garbage at every street corner and a noticeable absence of garbage bins and providing these and arranging regular

disposal is to be implemented by contracting the job to an agency. Provision of traffic lights, signage, pedestrian crossings, traffic islands, better and sympathetic lighting and handicapped access at road junctions, crossings and other such necessary places needs to be immediately taken up. Guidelines for the various widths of streets, organising the type of vehicles that can have access etc. need to be drawn up, and emphasis given to regular cleaning and maintenance of streets. They should maintain their own individual character through the effective implementation of the legislation and façade controls and in this way the inhabitants can achieve a better sense of identity and belonging to the local community and take a pride in their environment.

6.9.4 Movement, traffic and transportation

The intensity of traffic along the two main thoroughfares in the Heritage Zone is quite high. Since some of the traffic uses these as through roads, it has no real reason to pass through the Heritage Zone and it must be re-routed. Recognising that traffic management is a very important aspect in the regeneration of historic city centres and that it is a whole area of study in itself, it is not within the scope of this thesis to detail it, but possibilities for traffic re-organisation along the two main roads in the Heritage Zone are outlined below for detailed follow up.

In Mylapore, the Ramakrishna Mutt Road carries heavy traffic and has the added complications of a bus terminus and a petrol-filling station located along it. The Metropolitan Rapid Transit System is also envisaged as going along the Buckingham Canal adjacent to the core. This proposal gives an excellent opportunity to shift the main traffic thoroughfare along a new road following the route of the metro rail; and having the bus terminus nearby, all the transport facilities will then be grouped together. The ideal area for this is along the east bank of the Canal, which is now occupied by slums and squatter settlements. Such a proposal has added value as it would also involve addressing the problem of the ill-maintained waterways, in this case the Buckingham Canal.

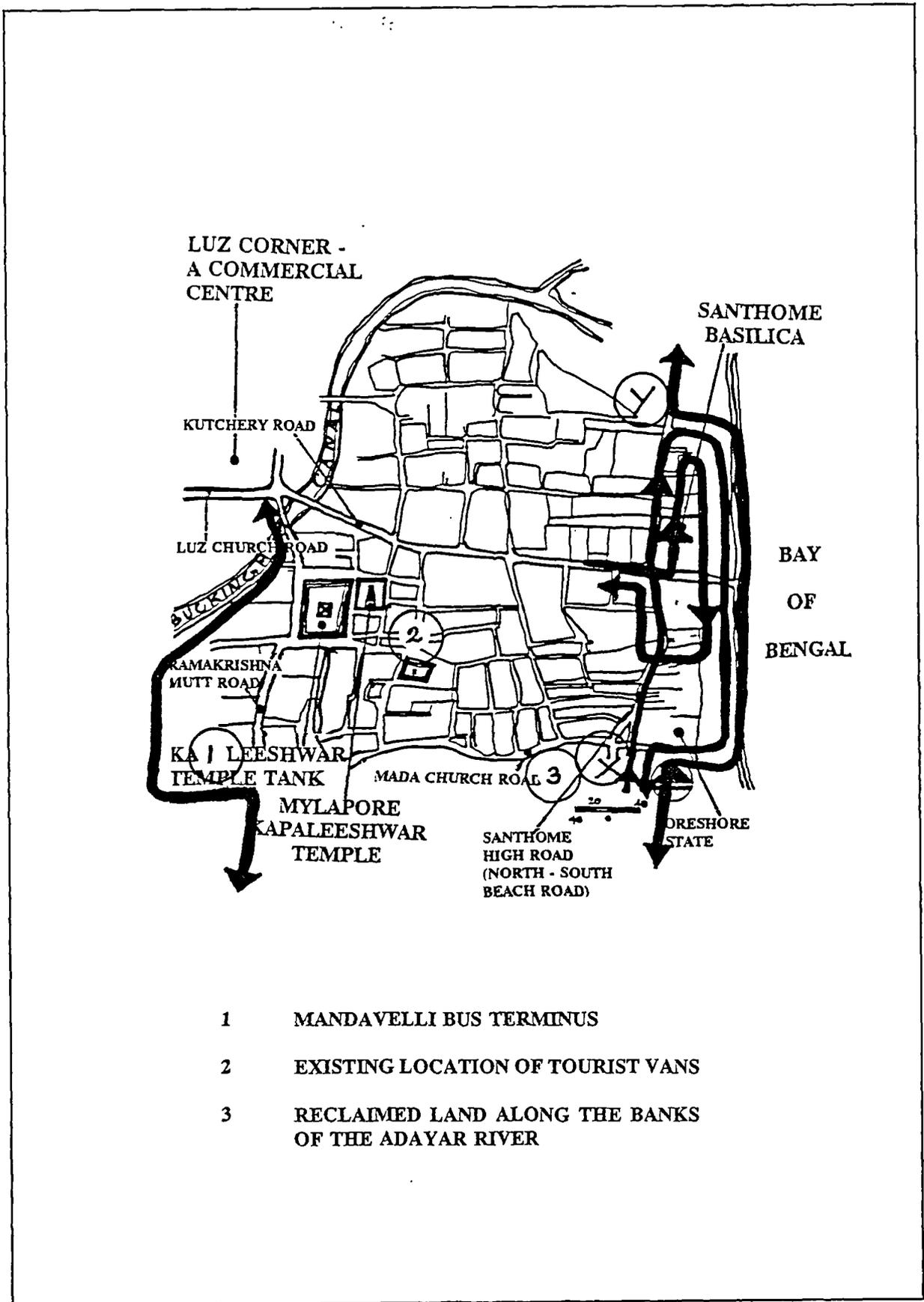


Figure 36 Traffic re-organisation possibilities in the Heritage Zone.

The present situation of traffic flow from the south takes a compulsory detour at Mandavelli towards the Canal, runs parallel to it and then snakes back further north (illustrated in Figure 36) to enter the historic core and cut through it. To avoid this unnecessary re-entry into the core, it is suggested that the detour at Mandavelli goes up to the Canal, along this and eventually connects with Ramakrishna Mutt Road at Luz Corner. The same route could be followed in the other direction also, thus avoiding further congestion along the main core road. This would then further justify shifting the bus terminus to a place along this route.

The possibility of partial pedestrianisation around the temple area of Mylapore will justify the diversion of all through traffic via Mandavelli. The needs of the residents, both east and west of Ramakrishna Mutt Road, who have cars will have to be considered and plans devised for re-routing them to avoid the pedestrianised area.

In Santhome it is recommended that all through traffic in both directions use the Beach Road (illustrated in Figure 38), the surface is upgraded and misuse of the area by the fishermen and playing school children be stopped. Traffic going to the schools which is heavy at the beginning and end of school hours needs to be controlled, so that all traffic coming to the school area must enter from the south either directly along Santhome High Road, or via the Beach Road. When leaving it is to be diverted back on to the Beach Road. This procedure will also have to be followed by other traffic users of the area. In effect the road between "XY" in Figure 36 will become one-way and this will hopefully improve the traffic flow.

Most of the streets in the Heritage Zone need to be upgraded with better surfacing and pavements. The street widths fall into three main categories within the core area. Cars need special attention in the *mada* streets and others along the royal or main processional route of the temple so these must be maintained

at widths of fifteen to twenty metres. At other times these wide streets are used by pedestrians, push-cart vendors, two-wheelers like cycles and scooters, and for parking these specific areas must be allotted. The smaller streets are generally about eight to ten metres and they need to have space allocated for small kiosks, shops and owners' vehicles along the road. The narrow lanes and streets which may be only three or four metres wide need to be kept clear of parking to allow for push-carts, pedestrians and cyclists.

6.10 Administrative Implications

Implementation of the above recommendations can only take place through the involvement of various agencies and with the appointment of a City Centre Manager, as has taken place in most European cities. Within the Heritage Zone the agencies fall into three main categories - the Central and State Government Departments, and Voluntary Agencies. There are also local and international organisations interested in welfare schemes and development programmes, such as local civic societies, Rotary and Lions' Clubs, UNESCO, WHO, and the UK Overseas Development Administration (ODA). For successful implementation there needs to be a co-ordinated effort by all these departments. Their various roles and responsibilities are:

1. The Madras Metropolitan Development Authority (MMDA) covers zoning and formulating byelaws within the Development Control Rules and enforcement of these, drawing up proposals and integrating them in the phased development proposals of the city.
2. The MMDA also needs to integrate its plans with State Departments, such as the Public Works Department (PWD), the State Transport organisations, such as the Pallavan Transport Corporation (PTC), the Thiruvalluvar Transport Corporation (TTC), the Metropolitan Transport Departments, the Tamilnadu Slum Clearance Board, Madras Metropolitan Water Supply and Sewerage Board (MMWSSB) and Metrowater.

3. Organisation of alternate traffic networks, policing of traffic, redesigning road sections and traffic islands, traffic lights, signage and resurfacing of roads and pedestrian walkways with tarmac and pavings, involves the MMDA with the Highways Department and the Madras Corporation.
4. Shifting the vegetable market and the re-organisation of activities along the tank edges would need the involvement of the MMDA and PWD.
5. Shifting the existing bus terminus, from its present location abutting the temple tank to an alternative location as suggested above would be implemented by the PTC.
6. Relocation of the proposed Madras Rapid Transit System station would involve the MMDA in consultation with the Metropolitan Transport Project authorities (MTP).
7. The sanitation, water supply and the cleaning of the Buckingham Canal would be directed by the MMWSSB and Metrowater.

Proposals for all the above could be invited from consultants and professionals through a bidding system - among other criteria for judging the winners would be the incorporation of appropriate sustainable measures towards the regeneration of the vitality of the historic core.

Further needed changes could involve the many non-government agencies (NGO's):

8. Garbage disposal and regular maintenance of streets is at present handled by the Madras Corporation; but input from voluntary civic societies interested and conscious of the environmental upkeep can be solicited for the latter.
9. The maintenance and upkeep of the Temples, Churches and Mosques and their surroundings would best be done by the respective authorities, such as the Hindu Religious Endowments Boards and Devasthanams, and the authorities of the Basilica, Churches and Mosques.
10. Philanthropic institutions and charities, such as the Ramakrishna Mutt

and Andhra Mahila Sabha and other community civic societies can interact to a great extent in social awareness campaigns and extension programmes.

11. Awareness and communication of conservation ideals can be brought about by publicity campaigns, and also by including this as part of the academic curriculum at the national level. One such scheme in Tamil Nadu is the National Social Service, introduced at university level, where students undertake social service projects like cleaning up a particular area, tree planting, and working with slum colonies and so on. These could be extended to schools, clubs, women's organisations and others involved in social activities as part of their awareness of the historical and cultural importance of the area, and the vital need for its proper maintenance.
12. Publicity material like bill-boards, pamphlets, maps, etc., could also be part of the awareness campaign promoted by the above NGO's and could be included along with their own campaigns.

6.11 Conclusion

Lessons drawn out from the theoretical justification, the three cities and those inferred above and the opportunities and constraints identified have led to specific recommendations for the Case Study Area. While addressing the problem at the scale of the Heritage Zone and later relating some of them to the macro scale of the city, an attempt has been made to test the theory behind *development through conservation*; resulting in certain types of recommendations for the sustainable management of the area.

The brief examination of the opportunities and constraints has shown that conservation of historic urban areas is not solely dependent on the strict enforcement of law or the development and planning rules, and it is essential to understand the residents' needs and aspirations, their potential and priorities, so

as to seek solutions that are locally appropriate and acceptable to the residents. The socio-cultural aspects of conservation need to be maintained through an understanding of the structure and motivations of the local community; and in any situation, implementation of conservation measures will be influenced by both economic and political forces, which need to be integrated into the planning process. All this is not an easy process to put in place, it needs careful planning and management with the full co-operation and participation of all the parties involved. But above all it needs the political will to push the proposals through to completion and to ensure there is an effective mechanism in place to maintain that which has been achieved. Physical regeneration needs to be combined with social reconstruction through democratic participation. Hence it can be said that the key element in making a community sustainable is to provide a higher quality of life. This will be built up by the provision of better employment opportunities enabling wealth creation and a better environment - and these will result from the interplay of *development* and *conservation* benefitting not only the Heritage Zone but the city as a whole.

CHAPTER 7

SUMMARY AND CONCLUSIONS

Maintaining structures means maintaining the desirability and continuity of a culture - we are striving to conserve cultures not buildings.

*If you do away with the yoke of oppression,
with the pointing finger and malicious talk,
and if you spend yourselves on behalf of the hungry
and satisfy the needs of the oppressed,
then your light will rise in the darkness,
and your night will become like noonday...
Your people will rebuild the ancient ruins
and will raise up the age-old foundations;
you will be called Repairer of Broken Walls,
Restorer of Streets with Dwellings.*

Isaiah 58: 9b-10,12 (NIV)

7.1 Introduction

In this study, our particular concern has been to show how a better built environment can benefit our cities. The approach for achieving this has been the reconciliation of two interests: *development* - the expectations for better living standards in the continuous process of change; and *conservation* - the need for continuing our strong traditions (see Chapters 2 and 3). Focusing on the Heritage Zone of Mylapore and Santhome within the larger context of Madras has had the dual objective of: *firstly*, attempting to understand the problems and think through the available options and constraints for future growth; and *secondly*, to illustrate a new approach to urban growth and cultural continuity that could be replicated in other areas and cities of India.

Madras is in an advantageous geographical position in close proximity to the Asia-Pacific rim and is one of the four fastest developing cities in India. But it

is in danger of being sucked into the vortex of inappropriate change and unsustainable development in the rush towards modernisation. In this context by addressing urban *development* through sensible *conservation* policies this study has attempted to show that either without the other would be detrimental to the overall social development and long-term stability.

Most studies on this subject have concentrated on either conservation or development. Our objective in addressing the two together has been an important one, which may be defined as placing indigenous culture alongside international commercialisation. We have tried to show that the long-term success of the latter depends upon giving a much higher priority to the former (see Section 5.9), which has not been acknowledged in earlier thinking. In the previous chapters we have tried to show how the various aspects involved in development can take place through conservation, by illustrating their perceived impact on the city of Madras (see Chapter 4 and Appendix II) and its Heritage Zone - Mylapore and Santhome (see Chapter 5). The Mylapore and Santhome urban study is the vehicle for testing the idea of *development through conservation*, (see Chapter 6) the fundamental link between successful economic growth and growing social equity.

The aim of this final chapter is to assemble conclusions from the previous discussions which justify the concept of *development through conservation* as being the most appropriate approach for successful urban growth. This will be done by considering the findings of each chapter in turn and offering concluding remarks. Finally, based on the outcome of this thesis some suggestions for future research are presented.

7.2 Summary of Findings

The concept of conservation in India and most other developing countries has been largely oriented to the task of conserving and preserving national

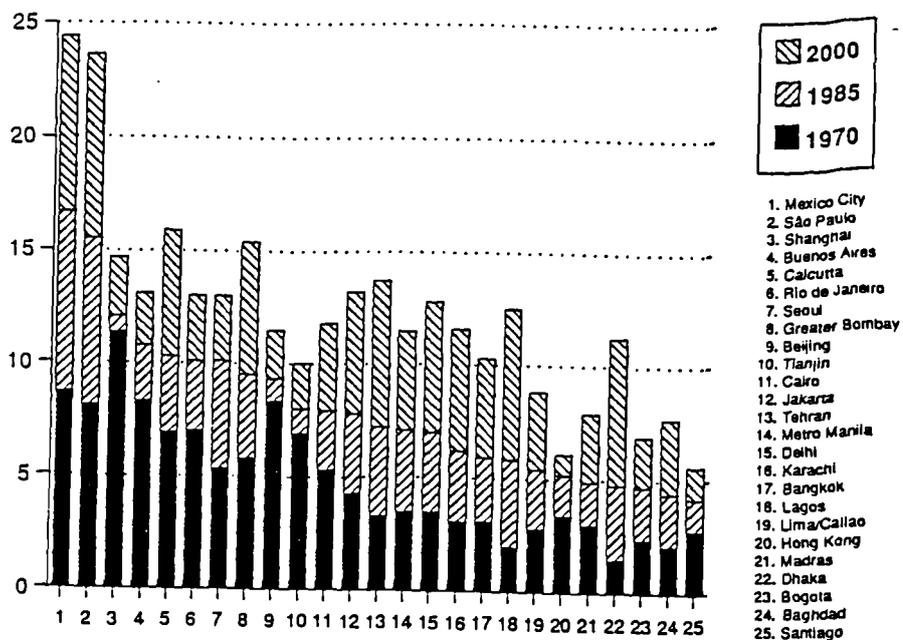


Figure 37 1970, 1985 & projected 2000 population of the largest cities of the developing world Source: Devas and Rakodi (Eds.) (1993)

monuments. These attitudes in terms of structures alone are now considered to be 'elitist' and are gradually being replaced by an understanding that conservation also has a role at the community level, working to retain and improve indigenous settlements and communities. As this awareness grows and the advantages of conservation ideals permeate into society through their results at the grass roots level, so too will the attitude that everything that comes from the West is good. By acknowledging the fact that **change is inevitable**, even desirable, and by suitably **guiding it**, *development through conservation* can be employed to **build up** a status of the city, along with its infrastructure, services and above all its regenerating communities.

With such attitudes to conservation development planning, that has previously been regarded as "obsessively physical" and too often "ordering", with the seemingly inevitable tendency to destroy existing traditional self-sustaining communities, will cease. Ordinary citizens will then be able to play a more active part in setting the agenda for the rebuilding of their cities and become a living force for the uplift of all aspects of the community and the progress of their society into the 21st century.

When it is seen that 27 of the 40 largest cities are in the developing world (Girardet, 1992) and in the 21st century are set to dominate the international stage, the projected huge populations (Devas and Rakodi, 1993) of these cities adds to the forecast that they are bound to make a mark on the development scene. In the developing world there is too often an **obsession to over-develop** and to ape the West without appropriate understanding of the socio-cultural contexts. This results in an imbalance between development and cultural sustainability expressed in the ideals of conservation, and Madras like other cities beginning to make a mark on the global scene needs to be **cautioned against this danger** of overdoing the "development side".

"Quality of life" is another "buzz" phrase of the nineties. If one is to go by the

statistics and figures, in the article, "Britons cannot look on the bright side" by Professor Antony King (1995), it appears that quality of life and satisfaction are not the result of economic success but the elusive factor of stability. This has been confirmed in this thesis that stability comes from being part of a tradition, from community togetherness and shared social and cultural values; these are still present in most developing countries and have to be appropriated in order to build the desired quality of life. Therefore when this is established through conservation, then the inevitable development is tempered and the right balance achieved between *development* and *conservation*.

Within this context, the focus of this research has been a Heritage Zone in Madras - Mylapore and Santhome - showing a wide range of socio-economic, cultural and traditional values that have shaped its physical environment and are worthy of preservation, and are available for creating a sustainable development.

It has been established that for a viable future both *development* and *conservation* are needed and each complements the aims and goals of the other. By employing inherited resources contemporary and future needs can be met. There can be no one universally applicable solution, but rather the utilisation of local aspirations and available resources must determine the precise development in any specific locality.

However the experiences of other successfully developed cities can be instructive and certain key elements have been identified in the city building processes of York, Manchester and London. A "soft pedal" approach was emphasised by which a balance may be achieved between regeneration and economic development, while at the same time trying to ensure cultural sustainability. The need became apparent for positive national intervention oriented towards both local community and international participation.

The review of the these three cities helped to establish the institutional and

infrastructural mechanisms and the parties involved, their present achievements and future potential. The value of heritage emerged as a vital resource and this needs to be supported by appropriate enabling structures and marketing mechanisms. Providing a sustainable quality of life through improved wealth creation combined with encouraging greater employment opportunities was another important factor identified. The study however drew attention to the adverse impacts some interventions can have on cities with a strong and particular local or regional culture and social traditions.

In most city regeneration schemes where the emphasis had been on development alongside the historical associations of the city, it can be said that the success rate for the schemes has been high. If comprehensive redevelopment had been carried out in such areas, the plans could have totally destroyed the economic diversity as well as the cultural dynamism and architectural character that made them unique. Any such plans would have caused a relative revolution in property values, since competition to live or work in such areas would have been reduced.

This is one of the ironies of success! In historic areas such as York and Covent Garden where comprehensive redevelopment has met with stiff opposition to, the resulting schemes had proved so popular that demand for space has raised prices and made these areas more inaccessible to poorer households. The original working class inhabitants of Covent Garden thus gave way to new and energetic middle class conservationists. They successfully established themselves and were able to safeguard the architectural heritage of the locality. Along with the working class also went old fashioned social meeting places such as the pubs, and in their place boutiques and wine bars appeared. This radical transformation of the Covent Garden area from a working class neighbourhood to a suburban middle class neighbourhood was brought about without drawing attention to the disruption involved. If such are the results of carefully worked out redevelopment schemes, the destructive power of speculative private developments is only too obvious; and places such as Madras that are in the

throes of development should take the warning contained in the experience of Covent Garden seriously.

The current situation in the city of Madras and the case study presented here highlight the danger posed by over-commercialisation and development policies blindly imported from abroad. This study points to the importance of identifying the essential requirements of development appropriate to its status as Heritage Zone and carefully avoiding non-conforming land uses. Naturally, the case study area cannot be isolated from the city as a whole and its planning policies. This study has identified some of the macroscopic aspects of planning at the level of the Madras city as well as some of the microscopic aspects of planning at the level of the Heritage Zone of Mylapore and Santhome.

When seeking to apply the lessons learnt, both the opportunities for and constraints against development taking place through conservation were identified. While acknowledging that development has to take place it was found that when the planning policies were considered within the cultural perspective, they could give local benefit and sustain its skills, crafts and cultural heritage.

Finally, using the principle of *development through conservation* as a model, and testing it in the Heritage Zone, recommendations for four significant sites in the case study area were drawn up whereby appropriate conservation was seen as an effective tool, enhancing the quality of life of the residents and sustaining the city's socio-economic and cultural profile.

7.3 Concluding Remarks

At the beginning of this research, (see Section 1.2) Problem / Opportunity Statement, we have expressed the aim of this thesis as seeking to answer two questions:

How is it possible to plan and manage the inevitable process of change

so as to incorporate the notions of cultural sustainability, allowing development to take place through conservation of its built heritage?

Since development through conservation is linked to the social structure, what are the criteria for assessing the possible strategies for promoting this?

The answer to these questions lies in addressing the main causes of the present imbalance between development and conservation in historic urban areas in India which may be identified as:

1. the fragmented approach to planning without an overall vision for the future (see Sections 2.5 and 4.5),
2. the lack of awareness (see Section 2.2 and 2.3) of the notion of value, economic viability and importance of maintenance and upkeep of old structures and settlements, and the significance of formal and informal cultural practices and traditional continuity (see Section 5.8), as a means of socio-economic survival and sustainable development,
3. the neglect of the basic needs that contribute to a good quality of life (see Chapter 5 and 6) of the resident communities and of their role in the process of shaping the environment,
4. the massive urbanisation process and accompanying drastic social changes resulting in a decline of traditional skills, and the commensurate need for re-investment and training,
5. the pressing nature of other priorities and immediate needs such as improved housing, services and infrastructure of all kinds (see Section 6.7),
6. lack of adequate input and involvement on the part of both public and private sectors.

To counteract these constraints the aim must be a balanced development - the concept of *development through conservation* - which may be defined as:

A careful, well thought out balance between the exploitation of existing built heritage and the associated economic opportunities whereby there is a cost-effective utilisation of resources, using existing assets alongside sensibly introduced new ones; this process allows for the changing dynamics of society and progressive growth.

Having identified the causes for imbalance and then defining balanced development, we can establish that *development through conservation* is dependent on:

1. A holistic approach with emphasis on a view to implementation.
2. The active participation of the community in planning and implementation.
3. The involvement of developers (restrained by properly identified conservation guidelines in Heritage Zones) alongside housing co-operatives for development and economic regeneration.
4. The reconsideration of development control rules to accommodate existing features and to eliminate non-conforming structures foreign to the heritage value and identity of the historic core.
5. The extent of the scheme which should be small enough to be achievable within a total comprehensive plan
6. The education of public attitudes towards progressive thinking, sustainable development principles, and promotion of civic pride.

This approach for the Heritage Zone is equally valid for other cities in India and elsewhere, each in its own context; and as *development through conservation* becomes more widely accepted and becomes the defining principle in future planning for historic cities, it will ensure that the world's rich heritage is sustained and passed to future generations.

7.4 Future Research

Through developing the theoretical framework and individual case studies this study has tried to show how the approach of *development through conservation* can be a tool in the city building process in an area of historic and religious importance - Mylapore and Santhome. The approach has brought to the fore the multifaceted areas of further application and detailed study both on a macro scale for the city of Madras and a micro scale for the Heritage Zone. Possible examples of topics for future research following on from where this study closes and some that are beyond the scope of this research but may be taken up on their own merit, are listed below:

1. **The potential of *development through conservation* as a tool to enable Madras to establish itself as a world city**

In an attempt to recognise Madras in the world context and to mobilise the consciousness of what the city was and what it could be, the present research naturally extends to what may happen as it develops further in the next century. Should Madras reach out to attain a world city status as other established world cities (London, New York, Paris, Tokyo) in its attempt to gear itself up and respond to the economic challenge in the Asia-Pacific? Could such a proposition be the means for galvanising financial attention and political follow-through to raise the necessary funds, mobilise the administration, encourage the entrepreneur and alert the diverse communities within the city to contribute to its sustainable development? Or would attaining a world city status merely result in upgrading the levels of infrastructure and services, and filling the coffers of the influential, while sweeping away ethnic traditions, customs and other indigenous cultural attributes with the result that the city loses its uniqueness merely in order to conform to some universal norm? We have seen the latter happen in so many established cities such as Singapore, Hongkong, Kuala Lumpur and Shanghai. The pros and cons arising from building up the other areas of potential in Madras, be they historical, cultural, commercial or

industrial, so that it attains world city status is an area for further exploration.

2. The role of the architect in the process of *development through conservation*

In this study we have stressed the fact that the whole process of *development through conservation* has to be oriented to the community and has to solicit active support not only from the various agencies but also from the residents. In India, with the town planner involved in making master plans, the civil engineer building structures and conserving monuments, the sociologist dealing with the people and the economist with the finances, it seems the architect has little to do other than produce beautification schemes for façades. With concerns ranging from planning to revitalising the built environment, conservation of structures to cultural sustainability, history and peoples' attitudes to change, technology and modernisation, research is needed to explore the crucial role of the "architectural manager" among the diverse other professionals involved.

3. The special role of planning guidelines and development control rules in historic urban areas

This study has touched on the role that these play in regulating the historic built environment. Further study is needed to make detailed proposals and apply them specifically to such areas with emphasis on the Indian socio-cultural context. The role of conservation agencies within the planning and development framework is also to be established, just as is the necessity of having conservation area officers within a Heritage Zone.

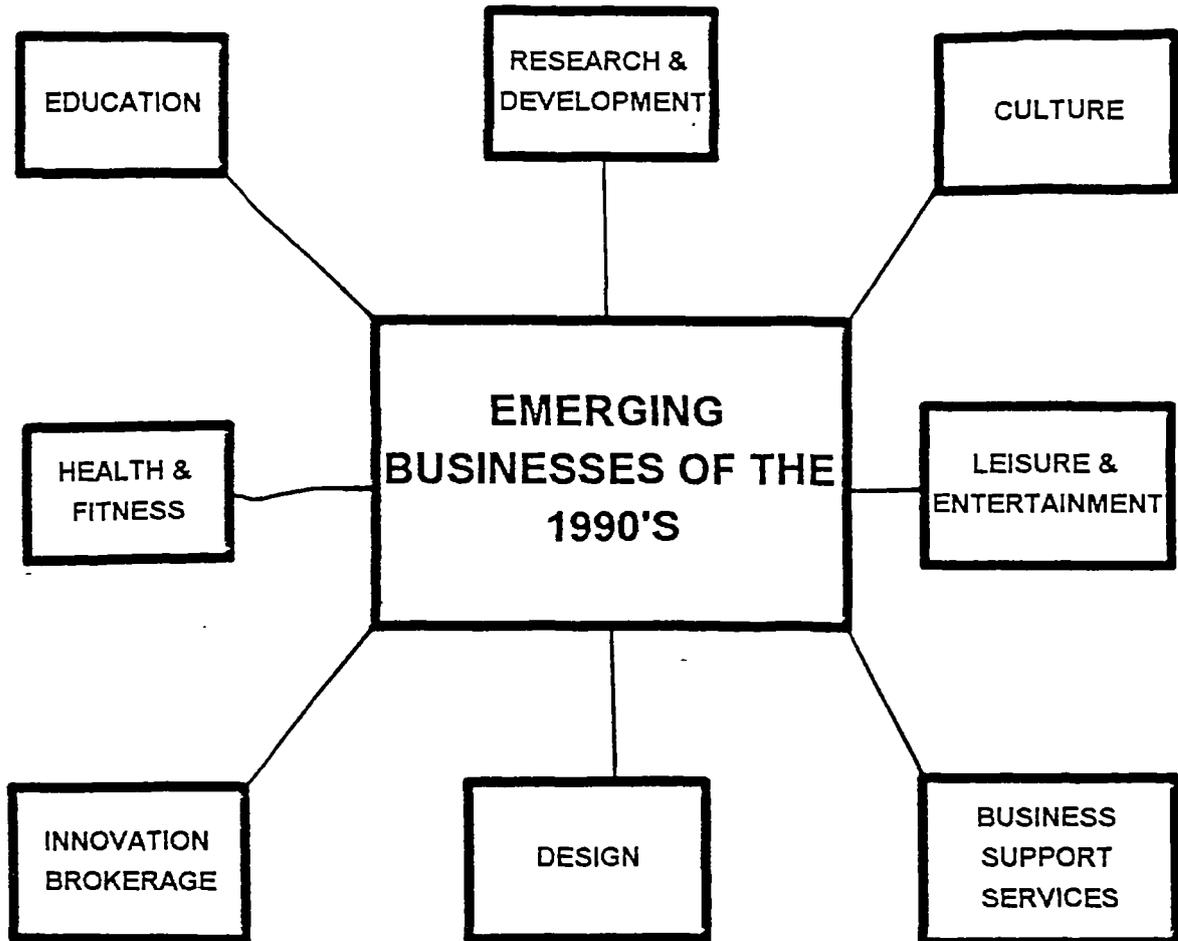
4. The application of the concept of *development through conservation* to other areas in Madras with different inherent potential

The scope of this study has focused in detail on the Heritage Zone of Mylapore and Santhome, with a certain set of values inherent therein. There is a need for further studies focused on other areas with different sets of values, where there could be scope for developing other strategies.

Madras is already an established centre for higher education with its many educational establishments as the University of Madras, Anna University, Indian Institute of Technology, Central Leather and Research Institute and others that it can build on.

The higher educational centres are now focusing on research & development with many establishing contacts with the industry. Research for a Science City, a Diamond park and others are ongoing schemes, while enterprise and industrial zones for the Madras Metropolitan Area are being studied.

Heritage and culture along with leisure and entertainment are open to new boosts in the respective industries.



Health & fitness industry has started in a big way with new speciality hospitals and mushrooming of gymnasiums, all these also promoted by the government. Innovation brokerage is relatively new along with inputs in the design industry. Madras has started in a big way in the field of computers, programming and software.

Business support services like convention centres (an existing proposal in Adayar) and building on other infrastructure for Madras as a financial centre, its tele-communications, hotels, environment, leisure and entertainment are areas open for development.

Figure 38 Emerging businesses of the 90's

5. Future development of Madras through new business opportunities

Worthington at an international workshop on Development through Conservation in 1995 (*Capital Cities: Identifying a future from the past*) talks about the emerging businesses of the 1990's. Figure 38 is indicative of the ever-widening new businesses and opportunities that may be appropriated by Madras. Research is needed to identify the best development model for these.

6. Documentation and building data bases

With the ideology of conservation formalised in India in 1984 with the establishment of INTACH, research is needed to explore the criteria for listing 'heritage' and suitable ways of documentation. Developing efficient and comprehensive data systems could provide the information needed for the various levels of urban management and decision making.

7. The role of the private sector such as in the fields of education and the media in *development through conservation*

This study has emphasised the need for education and awareness among the residents in historic urban areas so as to direct them to the value of heritage, the balance between cultural and commercial concerns and their role in revitalising such areas. More research is therefore needed in understanding the factors that influence the dissemination process creating motivation and facilitating co-operation.

*God gives all men all earth to love
But, since man's heart is small,
Ordains for each one spot shall prove
Beloved over all.
Each to his choice, and I rejoice
The lot has fallen to me
In a fair ground - in a fair ground -
Yea, (Madras) by the sea!*

Adapted from Kipling's Sussex

APPENDICES

Architectural knowledge is value-laden and ethical.⁹

⁹Dr. Francis Duffy, at a workshop on "Developing a Research Proposal and Making an Application for Funds", 27 November 1995 at RIBA.

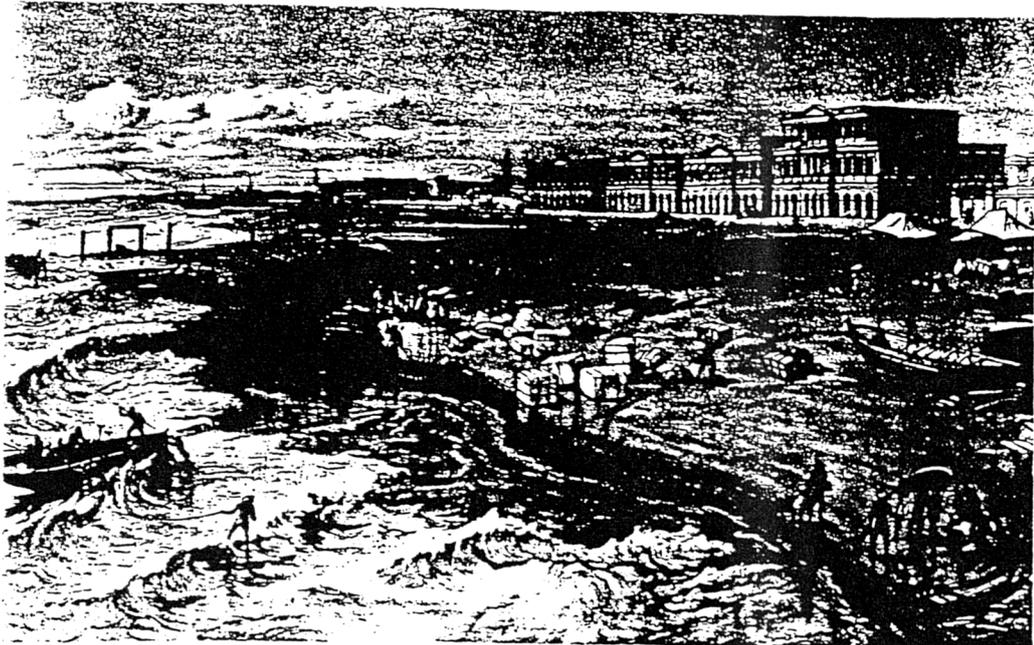
APPENDIX I**Major dates and events in Indian Conservation History¹⁰**

30 March 1774	Dr. Johnson's letter to Warren Hastings. '...to examine nicely the traditions...'
15 January 1784	Sir Williams Jones founded the Royal Asiatic Society.
1800	Marquis of Wellesly, Governor-General, initiated a topographical and statistical survey of Mysore State. Surveyor: Francis Buchanan.
1807	Buchanan survey of Eastern India, covering topographical history and antiquities.
1807 - 13	Lord Minto appointed a committee to examine the Taj.
1813 - 23	Conservation of Sikandra under the Marquis of Hastings.
1823 - 28	Kutub repair work ordered by Lord Amherst.
1830	James Ferguson's Survey for book on Indian Architecture, the first systematic study on the subject.
1832 - 40	James Princep as secretary of Asiatic society; the Brahmi script deciphered.
1850 - 60	Expansion of railways responsible for more antiquities being discovered and their subsequent restoration. Examples: Ajanta Fresco repairs and the cave temples of Bombay.
1861 - 66	The Archaeological Survey of India (ASI) Department created; Alexander Cunningham's survey and recording of buildings of interest.
1866	The survey wound up.
1873	Central Government entrusted work of preservation to local governments.

¹⁰ Sources: This list has been compiled mainly from information contained in: ALLCHIN, F. R. (1978); and CLEERE (1984), pp. 63 - 72.

- 1878 Lord Lytton's concern about the standard of conservation in the absence of a central control; recommendation for a curator of Ancient Monuments.
- 1881 Post of curator of Ancient Monuments created; Major H. H. Cole's reports on Sanchi, Agra Fort and Sikandra; Curator as advisor to local governments to view and maintain quality of work.
- 1883 Post of curator abolished, total decentralisation with local governments once again in charge of conservation and listing.
- 1885 James Burgess as Director-General of Archaeological Survey of India. Functions of conservation merged with research and survey with more central control and concentration on special areas. Drawings and reports on Buddhist caves, Bidar and Aurangabad Districts.
- 1895 Listing of monuments behind schedule; Government take stock of the situation.
- 1898 A major re-organisation of the Archaeological Department proposed. New proposal constituted five survey circles each under an archaeological surveyor.
- 1899 Lord Curzon became Viceroy. His bold and imaginative approach produced a profound change in Government policy and re-organisation of ASI as proposed in 1898. Conservation was emphasised with central control to ensure quality and uniform standard of conservation work. Princely States came under ASI circles.
- 1904 Ancient Monuments Preservation Act established, that included:
monument definition and protection, protection of site around monument, designation powers to local governments, possibilities of compulsory purchase, a set procedure for agreement with owners and many more, resulting in many monuments being repaired.
- 1906 The re-organisation of ASI on permanent basis.
- 1919 Montagu - Chelmsford Reforms. Listing of protected and not-protected monuments and classified according to ownership and general state of repair. All the monuments

- protected under the 1904 Act came under central protection with those unprotected monuments under the charge of local governments.
- 1920 - 44 Sir John Marshall detailed an appropriate conservation policy with main emphasis on systematic re-organisation of ASI.
- 1923 Conservation Manual prepared by Marshall as a guide. Many monuments conserved in an S.P.A.B. style of conservation. Conservation work under Sir Mortimer Wheeler undertaken by ASI and not the Public Works Department (PWD).
- 15 August 1947 Indian Independence declared.
- 1947 - 48 Establishment of State Departments of Archaeology and Museums.
- 26 January 1950 Republic of India declared/inaugurated.
- 1958 Ancient Monuments & Archaeological Sites and Remains Act based on 1904 Monuments Act.
The jurisdiction of the central government department of the ASI included all monuments of national importance. The state departments, similar to earlier local governments in charge of all that are not nationally protected. State Governments encouraged to promote their own legislation.
The new Act empowered Government to assume powers in case owners disagreed, or prohibit construction of buildings within protected areas.
- 1984 Formation of Indian National Trust for Arts and Cultural Heritage (INTACH), an autonomous non-governmental organisation with the primary objective of documenting and making a national level inventory of cultural heritage left unprotected by the archaeological departments and to catalyse public and professional interest and with other local pressure groups, started to undertake feasibility studies in architectural and urban conservation.



Beach of Madras by William Simpson, 1867.

A view of part of St. Thome Street, Fort St. George, 1804.



Figure 39 Early views of Madras (Evenson, 1989)

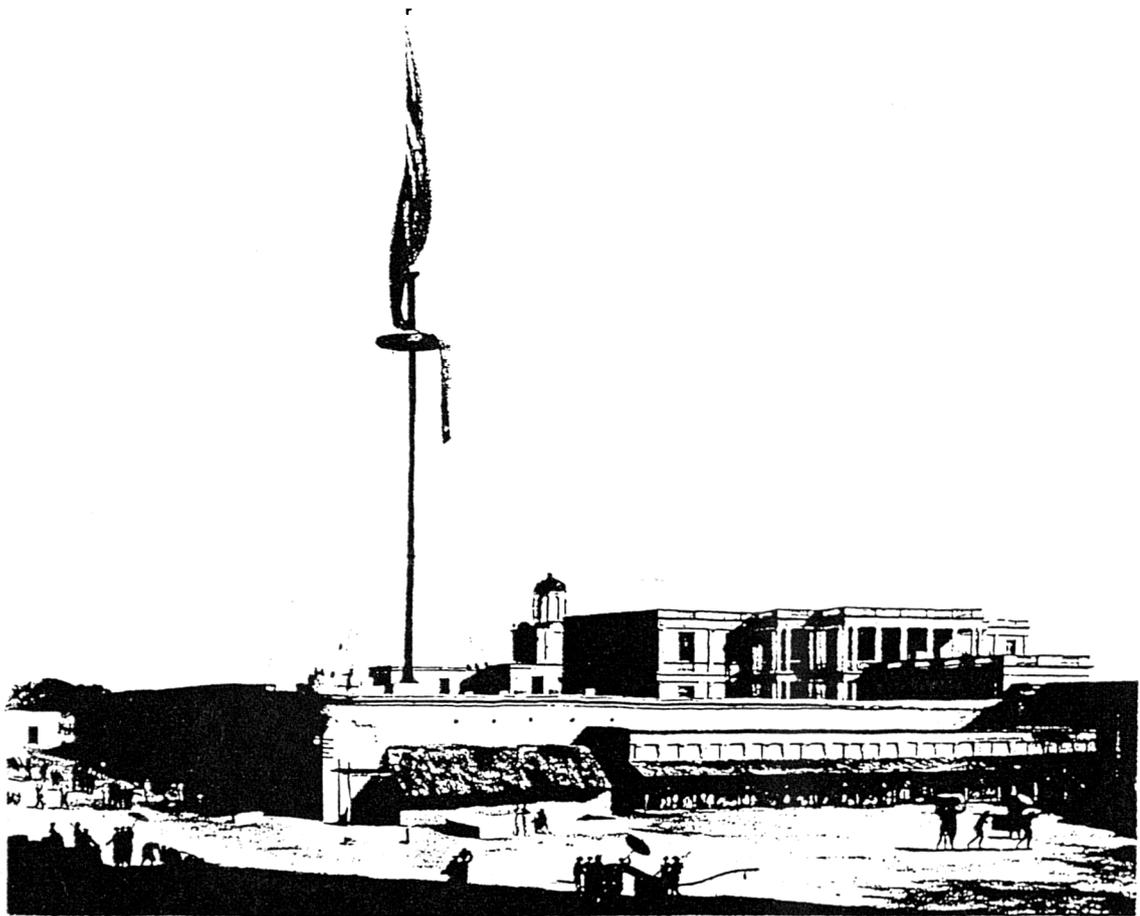
APPENDIX II

Madras - A Historical Background

Introduction

It was to these shores on the Coromandel that people came from ancient Greece and Rome in search of textiles, rice, indigo, teak, sandalwood and rosewood, pearls and diamonds, pepper and cloves, peacocks and elephants. The 750 kilometres long stretch on the south-eastern coast of the Indian peninsula known as *kari manal* or black sands, probably renamed as Coromandel by the English, dates back to as early as c. 185 BC (Brown, 1942). Building, art and architecture developed noticeably under the Sungas and the Andhras (c. 185 BC to 150 AD), the Chalukyans (c. 450 - 650 AD) and the Pallavas (c. 600 - 900 AD). The Dravidian style which emerged later covered the period of the five principal kingdoms which ruled southern India namely: Pallava (600 - 900 AD), Chola (900 - 1150 AD), Pandya (1100 - 1350 AD), Vijaynagar (1350 - 1565 AD), Madura or Nayaks (from 1600 AD). All periods exhibit a high level of trade, activity and life for the people in southern India.

In the days of the Pallavas and the Cholas, the ports of Poohar and Korkai, Puducheri and Devanampattinam, Mamallapuram and Mylapore were renowned harbours of ancient lineage. By the time the European powers reached the Coromandel shores, the waning control by the Vijaynagar empire allowed for the establishment of Western imperialism starting with the Portuguese capture of Goa in 1510. If Goa was to become the 'Lisbon of the East', San Thomé became the pride of their possessions on the eastern coast of India. To found it, the ancient Pallava entrepot of Mylapore - "*the potent city, Meliapore/Named, in olden time rich, vast and grand*", according to Camoens in the Portuguese 1572 epic, *The Lusiads* - had to be pushed back from the shore (Muthiah, 1990).



'The Government House, Fort St George' (II. *Oriental Scenery*, 9) March 1792. The Daniells reached Madras on 29 March 1792 and hastily began to organize their tour of South India. They had little time to make any drawings and this aquatint, like their other views of the city, was based on a watercolour made early in 1793 (see no. 129) after their return there.

Madras was the first of the important British settlements of the East India Company. It was founded in 1639 and a small fort was built in 1644. That was later enlarged, and within it Government House stood in its own fortified enclosure. 'The Government House', Thomas Daniell writes, 'is within the Fort: here the business of the English East

India Company is transacted, but the residence of the Governor is at the distance of a mile and a quarter [2 km] from Madras. The colonnade to the right leads down to the sea gate, where merchandise of various kinds is seen continually passing to and from the ships in the roads.'

When the Daniells were in Madras the Governor frequently lived outside the Fort in his garden house on the Cooum River to the south of the city. The Sea Gate has now been made into a museum. Amongst its collections are paintings by British artists of the Nawabs of the Carnatic, Chinese export-ware made specially for the East India Company, and the silver-gilt alms plate presented to St Mary's Church by Governor Elihu Yale in 1687.

Figure 40 Early views of Madras (Mildred, 1980)

The scramble for trading ports, set off the founding of the East India Company in 1600 to seek for itself the riches of the East, leading to Britain's grandest era, the Age of the Empire. The Dutch reacted by forming the Dutch East India Company in 1602, and by 1615 were trading from Devampattinam and Pulicat, north of modern Madras. The Portuguese by now being a spent power, the British had to establish their stronghold over the Dutch. After two unsuccessful attempts at Machilipatnam and Arumugam (Armagoan), the areas dominated by the Dutch, the discovery of a strip of 'no-man's-land' 40 kilometres south of Pulicat and 7 kilometres north of San Thomé, led to a chain of events which established British supremacy giving them a thoroughfare into the Indian subcontinent. On April 23, 1640, St. George's Day, work was completed on the new factory - little more than a fortified warehouse with living quarters - and it was named Fort St. George. Starting here it was to grow into the town of Madras, then the metropolis, capital of the southern state of Tamilnadu, with Fort St. George now housing the state administrative headquarters and the secretariat.

Historic background and heritage of Madras

It was from Madras that the Age of the Empire dawned in India. This little known fact has been forgotten in the later consolidation of the Raj at Calcutta (possible capital of Britain's Indian Empire in 1774), Bombay, Delhi or even the rest of India. The quartet Francis Day and Thimmanna, Andrew Cogan and Nagabaththan, the former two being the negotiators and the latter the builders, transformed a desolate strip of land into a trading post that was to grow into an Empire, bequeathing to India a *lingua franca*, its new institutions and standards. The ancient settlements of Mylapore, Triplicane, Thiruvanmiyur, Poonamallee, Egmore and Thiruvattiyur were miles away from this new settlement as was San Thomé, where the Portuguese and the ancient Madeiros (or Madra) family (it is believed that they may have bequeathed their name to the city) held court.

'A Pavilion, belonging to an Hindoo Temple' (V. *Antiquities of India*, 211)

October 1792 or February 1793. This view was taken near Mavelaporam on the Coromandel coast. Most of the Hindoo Temples in the southern part of Hindoostan have attached pavilions, which in general are much decorated.

They are principally used for the purpose of receiving the idol of the Temple, on those festival days when it is thought proper to make such an exhibition for the gratification of the populace. On those occasions it is conveyed to its situation with great pomp, amidst the acclamations of the people, by whom it is received with every token of enthusiastic rapture, and after the performance of certain religious rites, it is again returned to the Temple with the same pageantry, and attended with the same iraitic circumstances.

'Sculptured Rocks, at Mavalipuram, on the Coast of Coromandel' (V. *Antiquities of India*, 1). Detail: see colour plate XXIX
October 1792 or February 1793. Mavelaporam lies ... on the sea

coast, and is known to mariners by the name of the Seven Pagodas.'

At the southern side of Mahabalipuram is a group of five freestanding temples, as well as a great elephant, lion and bull, all hewn out of the dark granite boulders that are found on this coastal strip. They were made at the time of the Pallava dynasty during the seventh to eighth centuries. The temples are carved to resemble *raths*, wooden cars which are the vehicles of the gods. Known as the Draupadi, Arjuna, Bhima, and Dharmaraja Raths and the Sahadeva Temple, they are richly covered with sculptures.

This view is a representation of several Rocks, which have been wrought by the Hindoos into curious architectural forms on the outside, and in the lower part excavated for the purpose of religious worship. These rocks are of very hard, coarse granite; nevertheless, the ornamental parts appear to have been executed with a considerable degree of skill, which is very evident on the western side, being there sheltered from the corroding effect of the sea air. A Lion and an Elephant appear in the centre; the former is much larger than nature, but of inferior art of some others to be met with in the neighbourhood: the latter is about the natural size; it is well designed, and the character of the animal strongly expressed.

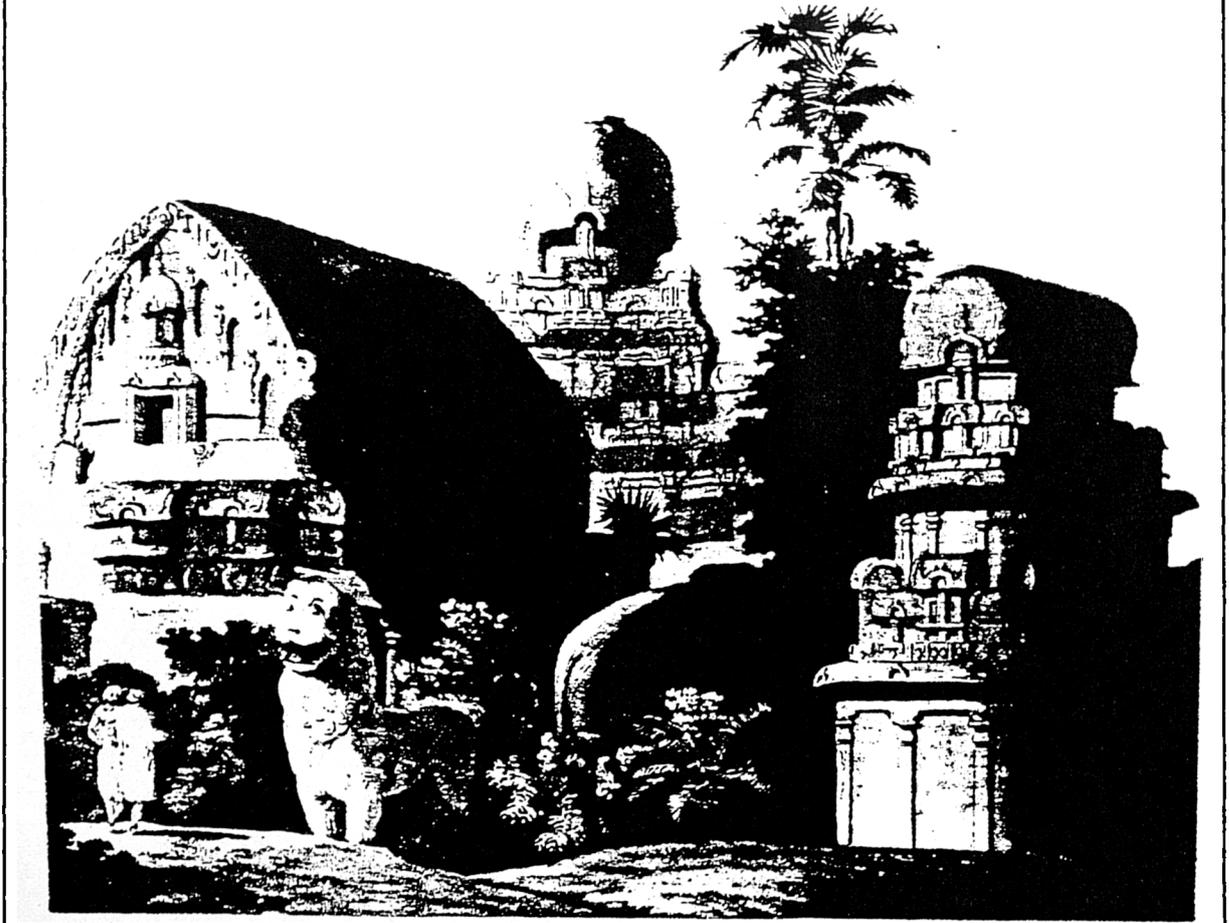


Figure 41 Early views of Madras (Mildred, 1980)

Over the next hundred years neighbouring villages became integrated with the town that grew out of Fort St. George and Madras of today developed. The list of Governors, businessmen, merchants, statesmen and others who have helped to build Madras is recorded and is on display at the Fort Museum. The more recent social, political and economic changes when viewed in the context of the city's conservative image, constantly tilt the balance between economic growth through channelised development and poised heritage consciousness with conservation ideals.

The Dravidian styles and their influences

Each great cultural movement has made its own particular contribution to the art of building so that the aspirations of the people and even their way of life stand revealed in substantial form for all to see (Brown, 1942). In South India these ideals have found expression in the form of sculpture, temples and other numerous monuments which on study reveal the social and political conditions of the region through the ages as one period merged into the other and one dynasty succeeded the last. Culturally speaking, South India consists of three regions: the coastal plains and inland areas south of the peninsula consisting of Karnataka wedged between Tamilnadu and Kerala; the west coast state of Kerala extending almost to Cape Comorin or Kanyakumari and the South Eastern State of Tamilnadu down to Kanyakumari and Rameshwaram. The land of the Tamils has the oldest literature dating back before the Christian era, when the three traditional kingdoms of South India, Chera, Chola and Pandya were already known. The architecture of South India, with few exceptions, did not begin until the seventh century and continued to flourish until the seventeenth. Along with sculpture it then developed very differently both conceptually and aesthetically from that in the other parts of India from about 650 AD. The Pallava and the early Chola styles were more conservative, serene and harmonious, than the experimentation, the exaggeration and the baroque floridity character of the contemporary post-Gupta style (Harle, 1986).

'South East View of Fort St George. Madras' III. *Oriental Scenery*. 7)

c. January 1793. 'This view is taken on the beach southward of the Fort of Madras: the larger building to the right of the flag-staff is the new exchange, and the higher one to the left is the church, to which a spire has been added since the taking of this view in the year 1793, when the other five views of Madras were likewise drawn. In the distance is seen part of the Madras roads: and in the foreground the sea breaking in with its usual turbulency on this coast: the only vessels in use for passing through this surge to communicate with the shipping, are called Massoola boats. They are flat bottomed, and built without iron, the planks being sewed together with line made from the outer coat of the cocoa nut.'

Madras, unlike Northern India, has a double monsoon – from the east in July to September and from the west in December. Many journals comment on the violent storms which at times wrecked ships anchored in the Roads. The heavy surf made landing a hazardous affair: it was done by means of *masula* boats, and as they approached the line of breaking surf the boatmen would leap out and carry the passengers ashore on their shoulders. There was great competition among young officers to assist in carrying attractive ladies. Messages were taken out to the ships on small catamarans, by boatmen who stowed the letters in their pointed waterproof caps.

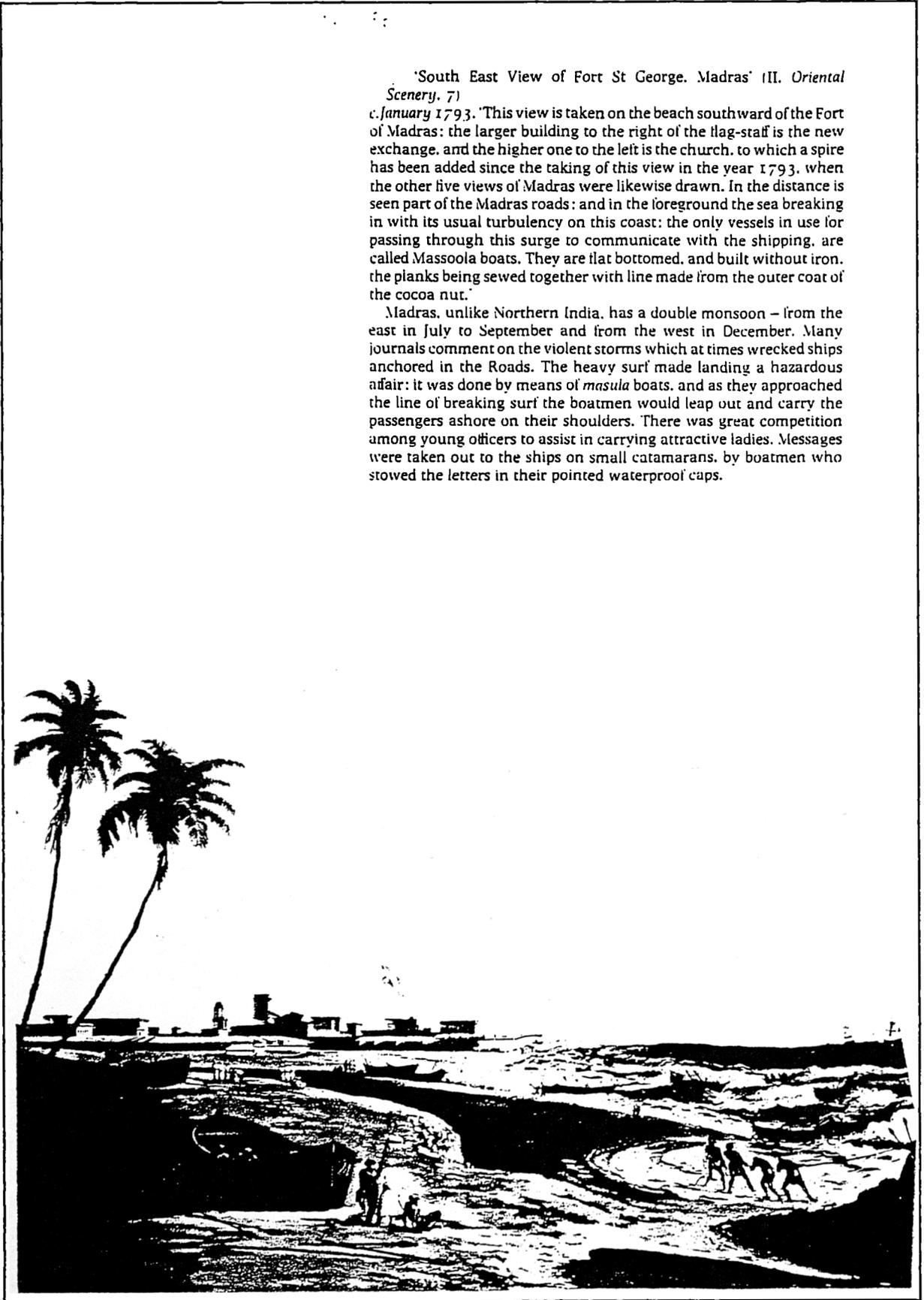


Figure 42 Early views of Madras (Mildred, 1980)

Of all the great powers that made the history of Southern India, the art and architecture of the Pallavas had the most profound effect in providing the foundations for the Dravidian style. The Pallavas came into prominence in the seventh century and their reign spread over the area which corresponds to the Madras presidency. until the beginning of the tenth century. Art and architectural achievements under their reign have been seen by many scholars to fall into two phases; rock-cut and structural; the first phase in the seventh century and the second in the eighth and ninth centuries. Rock-cut architecture of the first phase took two forms; *mandapas* and *rathas*, the former being an excavation in rock taking the form of an open pavilion or simple columned hall with one or more cellars in the back wall; *rathas* being monoliths, the name actually meaning a car or chariot. Practically all examples of rock-cut architecture are found at Mamallapuram, or Mahabalipuram as it is known today, about 42 kms. from the city of Madras.

The Dravidian style in the Tamil country was influenced by the many conflicts between various dynasties such as the Pallavas, Cholas, Pandyas, Chalukyas and Rashtrakutas, all striving for supremacy, until the Cholas finally emerged triumphant by 900 AD, and contributed to the achievements until the Pandyas took over in 1100 AD. The achievements of the Chola dynasty culminated in the grand temples at Tanjore (Grover, 1980) and Gangaikondacholapuram (Michell, 1989 and Davies, 1989). Growing political power was accompanied by the desire to build new cities and the spirit of the times dictated that the most dominant edifice of the new city be a monumental temple. The greatness of an Indian city in the middle ages was measured not by its town planning wonder, nor its streets, bazaars and houses but by the magnificence of the temple of the presiding deity, leading to the evolution of the great *Temple Cities*.

The rituals connected with the temples influenced the street patterns and spaces. The ablutions for the purification of the self before entering the inner temple sanctuary necessitated the construction of the temple tank (the tank was also

used for Theppam or *Ther* festivals, when the deity was put on a float). Other religious activities such as processions occurred in and around the temple complex and the four *mada* (similar to "ward") streets were the standard routes. Often the processions were extended to other destinations and temples as decreed by the ritual practices. Thus these often governed street patterns around the temple.

Similar and more elaborate principles dominated the spatial structure and urban form which can be seen in Srirangam, another temple town in southern India. The spatial lay-out of the houses and the concentric street pattern of the built up areas around the temple had developed with the purpose of locating people involved in the daily life of the temple in close proximity to it. The employees of the temple such as administrators, treasurers, accountants, brahmins and their assistants who performed daily puja, and special ceremonies during festivals, participants in daily or festival worship such as singers, nadaswaram players, drummers, actors and dancing girls (*devadasis*) were all housed around and near the temple. There were also a number of institutions attached to the temple and the teachers who taught Vedanta, Mimamsa, Thevaram, and cultural activities such as song and dance stayed nearby and often conducted their classes in the temple compound or enclosures attached to the temple complex.

The temple generated steady income by financing commercial enterprises and acting as bankers and money lenders. Another constant source of income was from the *devadasis*, a venerated group of women attendants donated by wealthy parents at an early age to the temple, many of whom were painstakingly trained by the learned priests in the art of south Indian classical dance. Art, culture and literature flourished under the Chola, Chera and Pandya dynasties.

Madras and the Raj

As has been said earlier, Fort St. George is where the story of Madras as it is

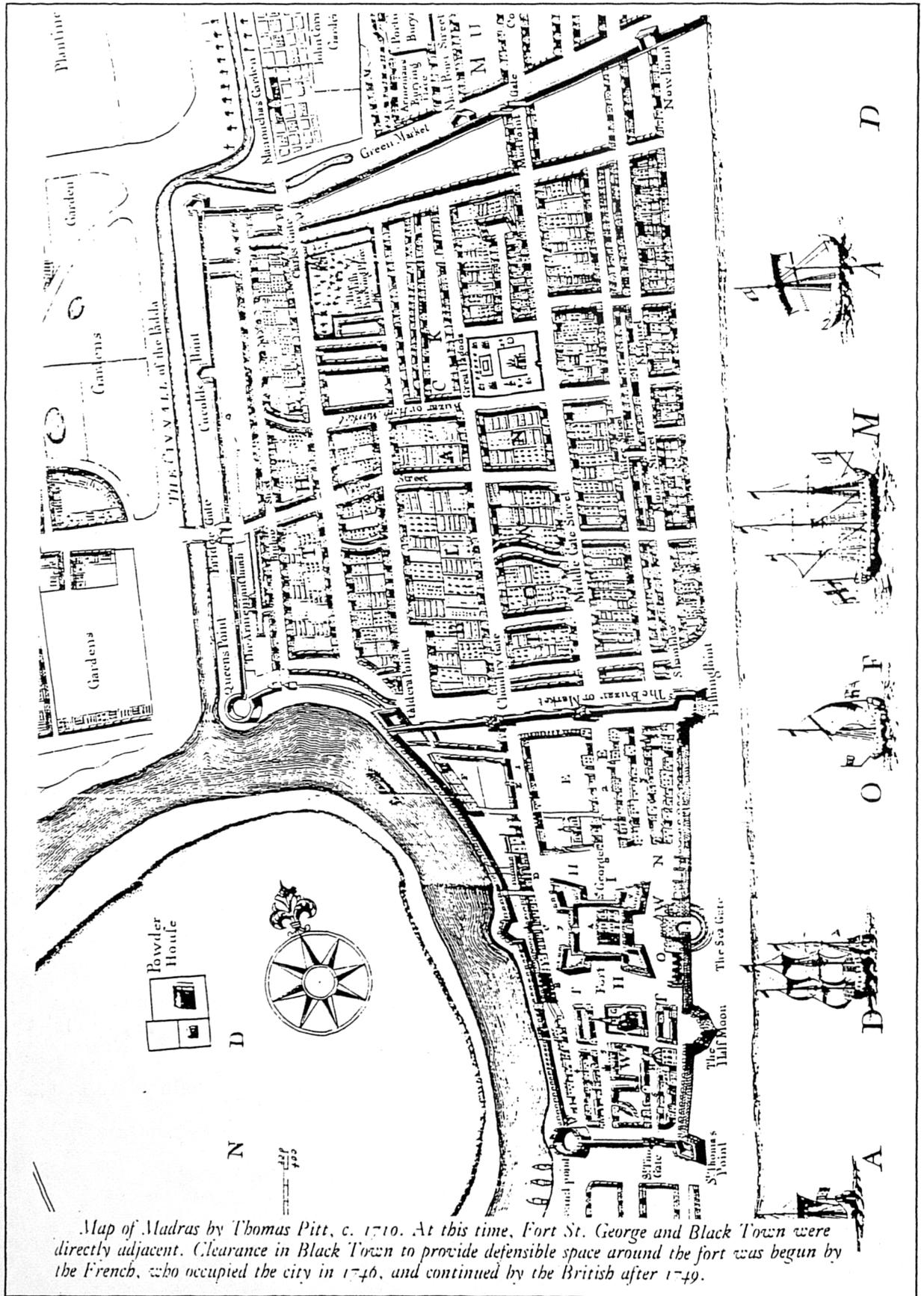


Figure 43 Pitt Map of Madras (Evenson, 1989)

known today began in 1639. The British Empire in India spanned a period of about 350 years. Madras owes its genesis to Francis Day and Andrew Cogan of the East India Company, which was founded in 1599 by a group of 24 merchant importers of London. The strip of no-man's land, 5 kms. in length and 2 kms. in width, protected on three sides by water, granted by Darmarla Venkatadri Nayak of Wandiwash, in anticipation of trade, military protection and Persian horses from the British, led to the establishment of a trading post with the help of Beri Thimmanna and Nagabathan. Around the fortified warehouse that became Fort St. George, completed in 1640, were rice fields in the neighbouring villages of Muthialpet and Peddanaickenpet. Fort St. George became the first white town or '*gentoo*' town with the neighbouring areas forming the black town. Later these areas came to be known as George Town. Nurtured by the British this tiny settlement grew into a moderately large town, adding to its size the many neighbouring villages of Elambur, Chetput, Santhome, Mylapore, Triplicane, Adayar and so on.¹¹

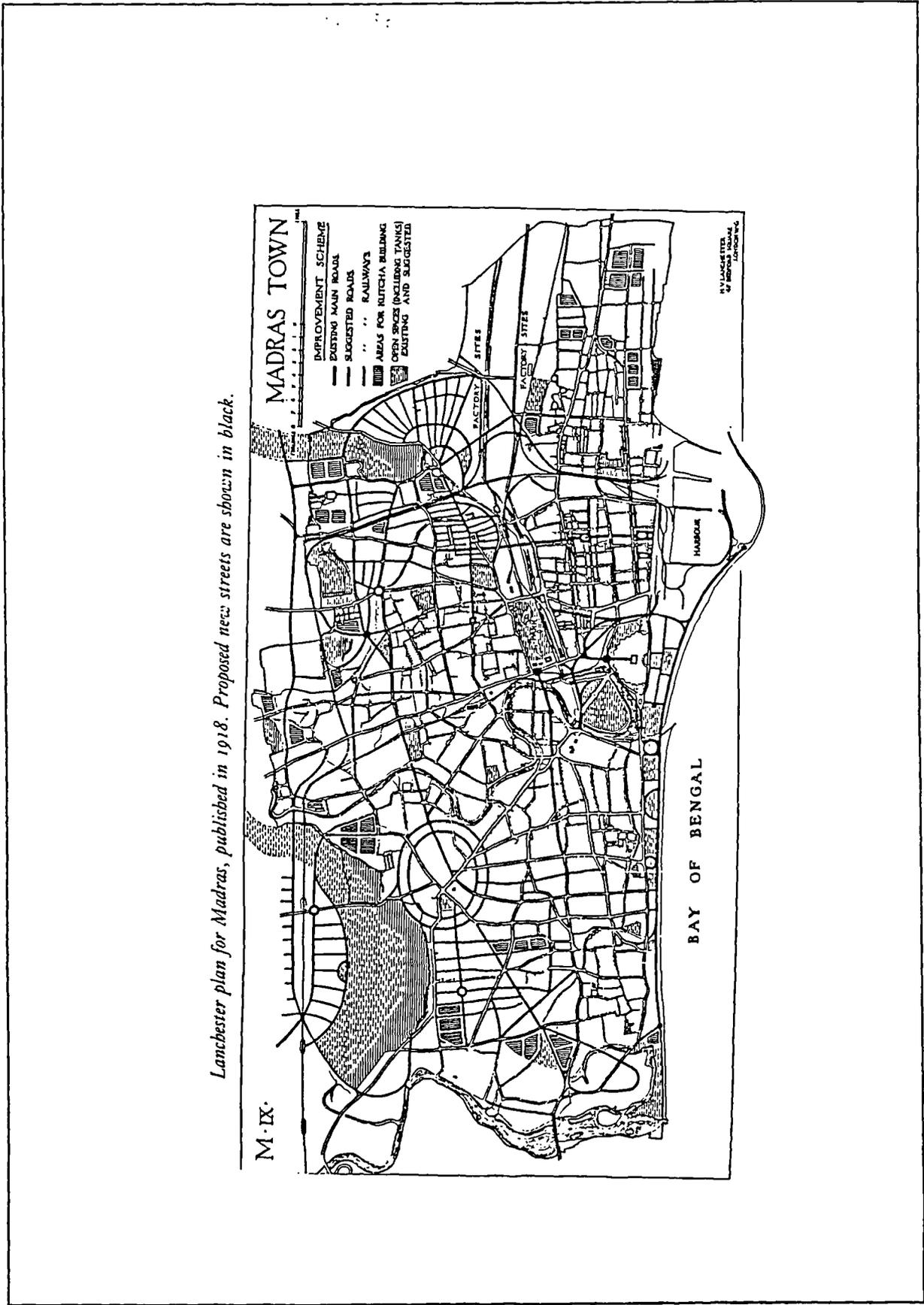
The first reliable map of Madras was drawn on the orders of the Governor Thomas Pitt in 1710, and shows the fort walls, the black and white towns. In it the city limits appear to be the *kuppam* or fishing village just south of the fort, the Elambur river to the west and the northern limit is about 500 yards beyond what is now known as Elephant Gate Street in George Town. The 'sea-gate' or the customs house was the point where goods landed, north of Fort St. George. This stretch of beach housed the collectorate of customs, the High Court, which later became the seat of the first Supreme Court and most commercial and financial establishments like Binny's, Gillanders, Arbuthnots (the later crashing of which led to the formation of the Indian Bank) and so on. This area today is the central business district, housing some of the national and most regional headquarters of national and international banks.

¹¹References and background data taken from the research and subsequent script of the video documentation done by the author for a University Grants Commission programme televised on the Indian national network in 1992.

Simultaneously other parts of the city grew adding to its size and services. The main arterial roads running north-south along the coast connect the neighbouring villages of Triplicane, Santhome and Mylapore and Adayar. The main east-west artery was the great mall, known first as Mount Road and today as Anna Salai, after Anna Durai, the father of the Tamil Resurgence. It started south of the Fort, housing the Government Estate, the banqueting houses of Sir Robert Clive, the Cosmopolitan Club, some properties of the Nawab of Carnatic, the Anglican Church, today known as St. George's Cathedral, Spencer and Co., Higginbothams the book shop and others which remain even today under the constant threat to demolition and the present day vices of commercialism, land speculation and a desire for something new and modern.

It is not within the scope of this review to give a full detailed history of Madras, but it is suffice to say that the subsequent 250 years have contributed to its commercial and financial growth in addition to its cultural and religious importance in areas like George Town, Santhome, Mylapore, Triplicane, St. Thomas Mount. Areas of educational (schools, colleges and universities) and environmental (national park and deer reserve, the marina, theosophical society) importance have been places like Triplicane, Adayar and along the coast. Mention should be made of some at least who have contributed to this building process. There were William Langhorne and Streyntsham Master who established elaborate record-keeping (perhaps leading to the invention of red tape, which binds down so much of the country) and designated the first church to be built by Protestants in Asia (Muthiah, 1990 : 6). There were Parry and Binny who laid the foundation of modern commerce and industry, Bentinck and Macaulay who enacted legal and education reform and Trevelyan establishing the traditions of the Civil Service. Chisholm laid the foundations of Indo-Saracenic architecture as seen in most buildings in Madras of that time.

The experiences of the 250 years established Madras as a major city and brought to the forefront the talents of many who were not only deeply involved with the



Lancaster plan for Madras, published in 1918. Proposed new streets are shown in black.

Figure 45 Early views of Madras (Evenson, 1989)

Congress and the fight for Independence, but responsible for bringing its name into the international arena. There was Dr. Annie Besant, an educationalist and philanthropic English-woman, running a newspaper demanding self-government for India and the Indian newspaper 'The Hindu' was established. The city can also boast of a famous statesman and author, (C. Rajagopalachari *Rajaji*, as he was affectionately known), mathematician (S. Ramanajum) and physicist (C.V. Raman) and others like Bhaktavatsalam, Kamaraj, Krishnamachari and Venkataraman, who became regional and national figureheads.

Madras's involvement with the politics of the country was also responsible for the dawn of the Justice Party, which later became the first non-congress party to rule in the state. Out of this was born regionalism in politics, a pioneering demand for secession and the first cry for greater rights for the states. Satyamurthi and his associates advocated the use of the stage and screen as political platforms (a world first) that has brought M.G.Ramachandran, a film star to be Chief Minister and at present Jayalalitha is Chief Minister. Both have made deep impacts on the Tamilnadu political scene. Annadurai, the leader of Tamil Resurgence, led through his political party, the Dravida Munnetra Kazhagam (DMK), brought in many constitutional reforms.

Classical art, fine arts, culture and religion have always played a prominent part in the story of Madras. Cultural symbolism and tradition that reinforce a Tamil identity are encoded in the various cultural centres throughout the city ranging from the Government School of Arts and Crafts founded in 1850 (of which Robert Fellowes Chisholm was the principal) to the Valluvar Kottam, a cultural centre built in 1976, named after Tiruvalluvar - saint and author of the famed Thirukkural. Each of the statues in the series along the Beach Road parallel to the Bay of Bengal tells of the impact of classical Tamil epics, like the statue of Kannagi, heroine of the famous Tamil epic 'Silapadikaram'.

The emergence of modern Madras

The historic roots of attempts at reshaping the urban landscape of Madras towards a cultural consciousness can be traced to the creation of the Dravida Kazhagam (DK) or the reshaped Justice Party and the subsequent Dravida Munnetra Kazhagam (DMK) party. It was in the form of a 'cultural revolt' to curb the growing poverty of the lower classes during the nineteenth and twentieth centuries, and to protect them against the Brahmin dominated nationalist movement in South India and which was perceived as North Indian and Aryan religious, social and economic exploitation. Issues such as rising food prices and the need for jobs for Tamilians increasingly formed the rhetoric of the party platform, thus successfully manipulating the culture of the Tamils to politically legitimise itself. One such symbolic move was the change of the name of the state from Madras to Tamilnadu in 1967 and the emphasis on the use of the Tamil language in place of English.

The urban kaleidoscope today shows the changes that Madras is going through. The several ancient villages over the years have merged with each other to create a metropolis. As befitting a growing metropolis, there are constant changes, including the changing mood of the city and the lifestyles of its residents.

But for all the change in a city once known for its graciousness, spaciousness, tradition and culture dominated by its orthodoxy and religion, vestiges of the past still survive amidst all the increasing signs of metropolitan growth. The irresistible attraction of spacious Madras is giving way to its increasing numbers of residents and each urban newcomer's preference for a flat rather than a detached or semi-detached house with gardens and open spaces. Towers of industry are the new skylines in the ever-growing suburbs. Yet the symbols of religion and culture are as evident on the persons as on the buildings; nowhere is a place of worship more than a few minutes walk, even if in the process it has had to usurp the sidewalks.

The need to keep this cultural symbolism amidst the development process has not yet touched the consciousness of its residents at large. So the battle to preserve Madras's cultural significance and symbolism has to be fought by the educated few, before the sad realisation of its loss in the wake of the country's new liberalisation programme. This strengthens the author's aspiration for *Development through Conservation*: A sustainable development strategy with special reference to a Heritage Zone in Madras.

Madras in the national context

Madras the capital of Tamilnadu State is a natural regional capital in the southern peninsula of India and is advantageously placed on the Asia-Pacific sea-board; within 10° on the same parallel, as Hongkong, Taiwan, South Korea, Bangkok, Manila, Kuala Lumpur and others. Madras is important not just in terms of its social and economic wealth of the city and region, but, more importantly as it contributes to the capacity of the Indian subcontinent to compete successfully in the Pacific region. The city, with a core of 172 sq.kms. in the Madras Metropolitan Area (MMA) has an estimated resident population in 1990 of 5.5 million, makes it the most important trading port in the whole of south India.

The major consideration in limiting the macro scale of the study area to the City itself, has been to bring a comprehensive and integrated vision to the regeneration of the centre of the Madras Metropolitan Area, defined not just in spatial terms, but also in terms of the concentration of present problems and future opportunities that it contains: most of the areas of economic development potential like the Higher Educational Institutions, the Industrial Estates adjoining the Madras Export Processing Zone (MEPZ), the National Park and Deer Reserve, the adjoining Electronics Industrial Estate, the Central Business District, the Madras Port Trust, the second longest city coastline (12 miles along the coast) in the world. There are also areas where there are problems of

inadequate shelter, serious shortages of social amenities, decaying infrastructure, and a severe lack of water supply, sanitation and waste disposal. These needs if met, could help to realise the fulfilment of a new vision for the city.

Madras - the regional capital

Madras has the strengths and many of the characteristics of a capital of a region. The further development of Madras to enable it to compete in the global realm has to include enhancing those qualities unique to the place so as to attract businesses and visitors from all over the world. This vision has to look beyond current concepts of a retail core or an office core, to a regional centre whose retail, office, leisure and residential sectors are not so confined as at present. While the compactness of the regional centre remains a strength, it should not restrain the expansion of activity right up to its very edges. Therefore areas which have been seen as peripheral to the centre - such as the electronics industrial zone, Chengleput, Maraimalainagar and the MEPZ, Koyambedu, Thirvallur and Manali - need to be bound into it in order to facilitate growth. The regional centre is therefore defined as the area including the three satellite towns and the six urban nodes around Madras City.

Financial resources and services within the city of Madras are dependent on the growth prospects of the infrastructure it serves and the growth of the city is influenced by the developments in larger environments in which it functions which include all forms of economic activity. The background of financial services in Madras show that it could easily grow to be an international finance centre. Commercial and co-operative banks, non-banking intermediaries such as chit-funds, nidhis and other indigenous financiers along with long-term lending institutions show substantial promise in the role of financial services sector. The growth of funds mobilised by such financial institutions registered a 31-fold increase over a period of 20 years from 1970-1989 and is estimated that the present level of about 5000 crore rupees could reach another 20-fold increase by

the year 2011.

Other recent developments worth noting are the liberalised policies of the government of India relating to foreign investments, throwing open the stock market to global investors and subsequent developments within the Madras Stock Exchange. These coupled with the expansion of industries, trade and commerce could further extend large-scale financial services. Indian companies, once secure in their own bastion and protected by the government from foreign competition are now using the momentum generated by the opening up of India's economy to come to the international markets and raise funds for their companies. In the past year some 25 Indian Companies (Mihir Bose, *The Daily Telegraph*, 15 March 1994) have come to the international market; they include almost all the big Indian business houses, such as Tatas, Birlas, Reliance, Bombay Dyeing, Mahindra and Mahindra. Well-known business houses in south India include Enfield India, Leyland India, TVS group, Lakshmi Machine Works, TTK group, LGB group, Premier group, Needle Industries, MRF and many others with foreign collaboration. The result has been a notable interest by many international companies with some successful partnerships emerging such as with Star TV broadcasting, British Gas, Microsoft, ANZ Bank and many others. The introduction of such hi-tech industries reflects global mobility of capital funds and the integration of financial services across countries and continents, providing expansion of trade, increasing mobility of labour, particularly in highly-skilled positions, involving the growing importance of leading-edge technology and telecommunications.

Industrial potential, location, development and support services

Tamilnadu accounts for over 10 per cent of all-India exports and out of the total exports from the southern states, 90 per cent comes from Tamilnadu and Karnataka. Tamilnadu has the largest number of export units (about 140) and the major goods presently exported are auto-parts, machine tools, textile

machinery, spares and industrial castings with electronics production, particularly consumer electronics products and certain components, is a priority development area. Other important export items are semi-finished leather and leather goods (40 per cent of India's total leather export), textiles, sea foods. Madras is also emerging as a major software centre for development services (Source: Industrial Development Bank of India).

A study for the MMDA (Madras 2011 by the Times Research Foundation, 1991) for future development identified a large concentration of engineering industry, particularly automobile industry in the Madras Metropolitan Area (MMA). The establishment of the Standard Motor Products of India at Perungalathur between Tambaram and Chengleput in the south, Ashok Leyland at Ennore and Enfield India at Thiruvottiyur in the north, Tractors and Farm Equipment (TAFE) at Sembiam and TI Cycles at Ambattur in the west, and the heavy earth moving unit of Hindustan Motors at Thiruvallur have helped trigger investment in a number of downstream units. Peripheral areas like Maraimalai Nagar in the south, Gummidipoondi in the north and a new industrial area in Thiruvallur-Sriperumbudur in the west have also been identified for expansion.

Regeneration of major areas and industries and their incorporation into the development plans has to include the potential offered by the industrial areas in absorbing the growing number of skilled and trained work force readily available in the surrounding areas which determines the location of particular groups of industries:

- in the northern corridor, the Manali region for petrochemicals; the Gummidipoondi region for engineering plastics and consumer goods industries;
- in the southern corridor, the Madras Export Processing Zone for electronics, leather, garments and jewellery;
- in the western corridor the Thiruvallur-Sriperumbudur belt for the engineering industry.

The existing industrial potential and location has to be further strengthened by adequate support services and facilities which could include:

- new linkages, pedestrian and public transport corridors through the city, rapid transit networks;
- water supply, sanitation and waste disposal systems;
- housing, hotels, markets, shopping and a food processing centre to boost export of agro-based products;
- a science park, convention centre, a jewellery park and heritage zones.

Some formidable problems in respect of Madras's role at an international level and the situation of the labour market may be identified as the unprecedented population growth, far outstripping the availability of jobs, shelter, social services and social, civic and economic infrastructure where unemployment figures are 14.6 per cent at a national level and 10 per cent at a State level (1988 Planning Commission). Slums and squatter settlements and increase of population living in such areas being 20 per cent of the population. Inadequate and worn-out services and infrastructure, particularly water supply, sanitation and shelter compound the problems.

Concluding remarks

Madras already has many of the strengths and characteristics of a distinctive regional capital and its potential role as an international city is further strengthened by its assets: an industrial centre, a strong service base, a network of research-oriented educational establishments and institutions, an entrepreneurial environment, a reasonably well integrated commercial and administrative base, historical and commercial associations and a centre of cultural importance. These are opportunities that need to be capitalised on as has been done in other world cities. Concentrating on these sectors will create more job opportunities and a better entrepreneurial environment.

National Land-use strategies

City	National body	Status	Spatial Planning Aims
London	Department of the Environment	Statutory	Coordinated framework for regional and local planning. London Docklands, Isle of Dogs Enterprise Zone, Planning Policy Guidance 9
Frankfurt & Berlin	Standing Conference of State Ministers	Advisory but binding statements of principle	Focussed development on: -key centres -populated, under-developed areas (Ranking of Structural Areas) Coordinated development to protect rural areas
Paris	National Government DATAR	Statutory	Decentralisation of commercial activity away from Paris and L'Île de France with tax and other incentives Large scale public developments and investments
New York	Federal Government	Statutory	N/A
Tokyo	Ministry of Construction National Land Agency	Statutory Statutory	Decentralisation out of Tokyo with greater regional integration Multi-centre core strategy for Tokyo Metropolitan Region - Regional Development Plans - Comprehensive Development Plans

Regional Land-use strategies

City	Regional body	Status	Spatial Planning Aims
London	London and the South East Regional Planning Conference	Advisory	Economic growth, revitalised older urban areas, whilst conserving the countryside. A new strategy for the South East, 1990.
Frankfurt	Interior Ministry for Hessen Regional Planning Authority for South Hessen	Statutory Statutory	Focussed development on: -key centres -existing populated, under-developed areas Coordinated development to protect rural areas Frankfurt, Wiesbaden and Darmstadt identified as urban areas
Berlin	Senator for Town Planning and Environmental Protection	Statutory	No formal policies announced since unification but suggestion that greater emphasis be placed on regional centres (including Frankfurter) to ease city congestion in Berlin
Paris	Prefecture de la region d'Île de France with assistance of local government	Statutory	Closure of gap between east and west of Paris region and between central Paris and parts of the periphery: Le Livre Blanc, 1990
New York	Regional Planning Association	Advisory	Regional Plans for New York Metropolitan Area
Tokyo	N/A	N/A	N/A

Urban Land-use strategies

City	Urban Bodies	Status	Spatial Planning Aims
London	London Planning Advisory Committee London Planning Authorities: 33 Boroughs, London Docklands Development Corporation	Advisory Statutory	Strategic growth points and centres: Strategic Planning Advice for London 1988. Major office employment in the Central London Activities Core Zone and Docklands: Boroughs plans, Unitary Development Plans
Frankfurt	Umlandverband Frankfurt Frankfurt City Planning Department	Statutory Statutory	Adequate land provision for commerce in Frankfurt and surroundings: Preparatory Land-use Plan (1985-2000) Detailed plans for specific areas: Binding land-use plans
Berlin	Senator for Town Planning and Environmental Protection	Statutory	No formal policies at present
Paris	IAURIF and DREIF	Statutory	Development of Zones for commerce away from the Central Business Districts: Le Livre Blanc, 1990
New York	State of New York New York City	Statutory Statutory	N/A Development of west-side midtown: decentralisation of business to neighbouring Boroughs: zoning resolutions
Tokyo	Tokyo Metropolitan Government Ward Areas	Statutory Statutory	Multi-centre core plan strategy, development of Tokyo Bay and Tama New Towns: Long Term Plans for Tokyo Preparation of plans with Tokyo Metropolitan Government and Ministry of Construction: zoning of urban promotion and control areas

Figure 46 Summary of Strategic Plans in World Cities (Kennedy, 1991)

A literature study on world cities, indicates that for any city, in this case Madras, to be recognised as a centre of excellence or speciality of some sort, there must be recognition of it not only as a regional capital but also as a centre for investment growth. Such cities have also to be international cities of outstanding commercial, industrial, cultural and creative potential - cities distinguished by the quality of life enjoyed by their residents, and by the high percentage of those residents enabled economically and socially to enjoy this lifestyle.

Attributes of a successful economic capital that could enable Madras to compete effectively within an international dimension are:

- global mobility of capital funds and the integration of financial services across countries and continents,
- multinational firms and corporations and the footloose nature of new investment,
- the expansion of trade in an ever-widening range of goods and services,
- increasing mobility of labour, particularly in highly skilled positions,
- growing importance of leading-edge technology and telecommunications.

In Madras we see plans to decongest the city centre (refer Section 4.3) but this policy may be questionable when one compares it with other cities worldwide where measures like Living Over The Shop are being introduced to repopulate city centres and bring in a mix of activities and living densities. The summary of strategic plans in world cities (figure opposite) suggests that land-use and development is subject to the same varying degrees of government control and some cities are subject to stronger and more effective planning controls than others. Such land-use strategies emphasise two general characteristics; one is the identification in world city terms and initiatives and the other is the linkages with other city-wide policies e.g. the knowledge base of the city, its labour force and the environment. Comparing the strategies with Madras it appears that the key areas of relative weakness are those aspects of enabling infrastructure typically associated with public policy, provision, regulation and control, and a city-wide,

forward looking strategic body, emphasising the need for a long term urban strategy that could benefit the city.

A background review of Madras, its industrial potential and cultural strengths suggests that:-

- (i) Madras City with its population of 4 million in 1991 and a likely increase to 7 million by 2011 and the Madras Metropolitan Area population of 5.3 million in 1991 with a likely increase to 9.5 million in 2011, is showing stabilising trends at work in the process of migration (Nagaraj and Ramani, 1991). This (stabilising) trend needs to be bolstered by policies aimed at taking the city's hinterland into account. Improvement in the strength of this filtration process needs to be made by proper industrial location, housing and transportation policies that can control migration to the city both in qualitative and quantitative terms, maintaining the present density of about 190 persons/sq. km, and the urban physical and social fabric.
- (ii) the economic base of the city is at present geared to playing a dominant role both politically and economically. Most large-scale manufacturing activities are concentrated in the suburban areas of Madras, while many service sector activities, government, health and education services in particular are located in the city. Madras is the administrative and political headquarters and the seat of the State government with reasonable autonomy in the state economy (Appasamy, 1991:1.40-1.99; Viswanathan, 1991:1.100- 1.119; Gopalakrishnan, 1991: 1.120-1.163).

The relationship between the manufacturing and other service sector activities needs to be studied as these affect the employment opportunities within the city and therefore its resident population.

- (iii) Madras has a good proportion of higher-tier economic activity. This

involves an important financial and banking sector with deposits in commercial banks recording a 31-fold increase in the period of 1970-1989, of which Madras City and its residents contributed to more than half. The liberalised policies pursued by the Government of India relating to foreign investments is throwing open the stock market to global investors. The presence of major public sector services and a well-developed telecommunication system, air and sea ports, a network of financial institutions and banks with adequate trained personnel, easy accessibility to the Eastern market and continuity in the time zones of financial centres like Tokyo, Hongkong and Singapore make the concept of an off-shore banking centre at Madras quite feasible. The higher education sector with increasing numbers of Universities and Autonomous Colleges can contribute to research and industrial development.

- (iv) the quality of transport including the ongoing construction of the Madras Rapid Transit connecting north and south Madras and communication links are important contributing factors to the City's international status, as is the development of systems of advanced global telecommunications and all these need further development along with the possibility of expansion.
- (v) quality cultural and leisure provisions (venues, restaurants, museums, sporting areas, music festivals, etc) and an attractive physical environment, combined with the historical and living religious edifices and built heritage and other such resources need to be put to maximum use and benefit for the enjoyment of the local residents, and for national and international visitors.

The background review adds to the view that Madras has important strengths not only in its historic and cultural assets but also in the diversity of its economy, transport and communication links, size and status of its institutions of learning,

industry sports and culture, historical and religious monuments, and in the quality of life of its residents. It is therefore essential for the city to unlock the existing potential for major industrial, commercial and service sector development, and to create the conditions in which existing strong sectors of the economy can thrive and prosper. Equally, sustainable regeneration demands that the benefits of such developments are experienced within the communities in which they take place and can be seen to have some relevance to the lives of people that live there. Achieving the goals of the complex methodology involved in achieving development and delivering local benefit is a step towards sustainable development which is necessary if Madras is to achieve its status of recognition as a 'Capital City' unique in its own respects.

APPENDIX III

Summary of fieldwork, surveys and studies within the Heritage Zone in Madras

Residents' Survey - a summary

Aspects of the Heritage Zone in Madras were explored aimed at eliciting information on the topics below (and see questionnaire form in Appendix V):

- the professions of the residents;
- attitude of the residents to their locality;
- heritage value as perceived by the residents;
- amenities such as water supply, electricity, etc., provided;
- tenancy of housing;
- structural condition of housing;
- extent of repairs and alteration to housing; and
- open spaces and other public spaces.

The residents' survey covered 217 residents from all the streets adjoining the Kapaleeshwar temple and tank and Chitrakulam. Surveys oriented to housing included their plans and room arrangements, number of persons in a house hold, number of smaller families within a house, ownership patterns, condition of the house, amount of alteration and additions (Sections 5.7.2 and 6.7.1).

It was found that 43 per cent of the respondents to the survey were professionals (teachers, doctors, lawyers), 27 per cent were businessmen, and the rest were those who worked in offices as managers, clerks, etc and those in the service industry as labourers, maid-servants, gardeners, etc.

51 per cent of the houses were owner-occupied. 80 per cent of the houses fully residential. 50 per cent of the houses had undergone some renovations or repairs within the last 12 years, while 25 per cent of them had not undergone any significant repairs since they were built. Most of the houses were between 60 -

80 years old.

58 per cent of the residents got their water supply from Metrowater, while others depended on borewells. A few houses in Kesava Perumal Koil Street still have open wells and get their water from it. The well belonging to the Kesava Perumal Temple also had water from which water was taken for use within the temple.

85 per cent of the residents got their milk from Aavin - a milk co-operative outlet, where milk is supplied in the mornings and evenings. This indicates that most of them do not depend on the local milkmen who supply milk from milking their cows. The cow sheds pose a severe hygiene problem in the area with increasing mosquito menace and clogging of sewers. Moreover the increasing dependence on Aavin only goes to show that moving the existing cow sheds from the locality will not greatly inconvenience the residents.

61 per cent of the residents felt that the presence of the major temples in the area was of great importance to the locality. Over 80 per cent of the residents felt that easy access to public transportation and other services as schools and shopping centres and the beach for recreation along with a feeling of security in the area were other positive aspects of the area.

A good majority (66 per cent) of the persons interviewed felt that the presence of the vegetable market in a main road caused disturbance and was not particularly specific to the area and could be moved elsewhere while only 7 per cent felt that the vegetable market was important to the area.

Practically all the residents (owners and tenants) in the area were against the idea of having high-rise structures in their streets, with most preferring two storeyed buildings. The residents welcomed the mixed (housing and small commercial) land use. However there was unanimous opposition to the

automobile and mosaic workshops due to reasons of noise and other pollution. When asked specifically about converting some buildings into marriage halls, there was a mixed reaction. Those working within the area such as in the temples and shopkeepers felt that it would bring in more revenue to the area while the residents felt that such a move would lead to more commercialisation.

Motorised vehicular traffic surveyR.K. Mutt Road and North Mada Street corner

	Vehicles turning at North Mada Street					
	Buses stopping at terminus stop	Buses stopping at Ind.bank corner stop	Buses turning at Ind.Bank corner	Mini bus/van	Three wheelers/two wheelers	Cars
7:30/9:30a.a.	27	5	27	18	456	112
9:30/11:30a.a.	66	6	27	30	629	116
11:30/1:30p.a.	82	11	24	3	409	148
1:30/3:30p.a.	73	10	24	16	487	127
3:30/5:30p.a.	52	58	34	19	771	218
5:30/7:30p.a.	30	103	31	28	900	244

Note : - Increase in traffic flow noted from 9:00 a.m. In the evening flow reduced only after 8:00 p.m.
 Outward traffic in North Mada street is not less than 80% of inward traffic (estimated) - often after U - turning in North Mada street.
 Traffic due to cycles and cycle rickshaws too are quite substantial and add to the chaotic conditions on the road.

Findings : Indian Bank corner is a major bottleneck for smooth flow of traffic in R.K.Mutt road.
 This becomes acute with buses stopping at the corner stop increasing by over 100% in the evening, parking abreast also creates problems.
 U - turning of large buses (every 4 minutes) at this point and buses stopping at this corner, before reaching the tank terminus, also add to the problems.

Vegetable market survey - a summary

This survey considered both the vendors and the customers and was aimed at finding out the extent of the market, the system of waste disposal and hygiene, traffic generated by the market and general comments.

There are 119 fruit and vegetable vendors on the South Mada Street. 63 per cent bring in their stock by motorised transport. There has been a continued increase in the number of shops over the last 15 years with $\frac{1}{3}$ in operation in less than 10 years indicating no restrictions on the number of shops. There are no corporation garbage bins in the area with the result that most of the waste and garbage is just dumped on the streets adding to the cleanliness and hygiene problems of the area.

A survey of 444 customers to the vegetable market showed that most were in favour of relocating it. Over 50 per cent used some form of vehicular transport - public or private and many were not residents in the area indicating that the shift could only benefit the residents and the Heritage Zone. 39 per cent of users to the market from other areas came because of its convenient location near a bus terminus or because it was enroute to home from their place of work.

The water situation in the temple tanks in the Heritage ZoneSTUDY OF WATER FOR KAPALI & CHITRAKULAM TANKS

	HR & CE	METROWATER	PWD
<u>I Water Availability:</u>			
1) Rainfall between 1975 & 1990	1532 mm	1444 mm	-
2) Ground water level in Mylapore area			
1970 b.g.l.	6-7 mtrs	-	2-3 mtrs
1991 b.g.l.	10-12 mtrs	10 mtrs	3-5 mtrs (near Alwarpet)
3) Ground water level inside Mylapore tank			
1970 b.g.l.	5-6 M	-	-
1991 b.g.l.	9-11 M	-	-
4) Water level in wells around Mylapore tank	1.5-2.7M (below tank bed)		
5) Extent of percolation	2-5 Km	2-5 Km	-
6) Water need for Mylapore tank	6423 K.Lts		
(per foot of storage)	119 K.Lts	-	-
7) Current daily water supply to Madras City from Metrowater	55000 K.Lts	55000 K.Lts	-
8) Quality of subsoil water			
- Till 6 M	-	-	Good
- 6-15 M	-	-	Moderate
- Beyond 15 M	Brackish	Brackish	Poor

	HR & CE	METROMETER	PWD
<u>II Storage of Water:</u>			
9) Bed size of Tank LxWxD - Kapali	17CM x 123 x 5.6M b.g.l.		
- Chitrakulam	- 91 x 61 x 4.5M b.g.l.		
10) Recommended minimum water level	1.5 M	-	-
11) Minimum reqd. for Theppaa festival	1.5 M	1.8 M	-
<u>III 12. Evaporation loss / day :</u>			
	11CJ ³ to 22CJ ³	11CJ ³ to 22CJ ³	
<u>IV Water withdrawals in Mvlaore:</u>			
13) By borewells from tank recharge area	2.2/4.5 Mill.lit./day	-	-
14) Current borewell depth in the study area	12/20 M	12/19 M	15 M (alluvial sand)
<u>V Use of rain water:</u>			
15) Akash Ganga etc.	No specific plans known. Agree that building rules should provide for partly unpaved set-offs.	-	-
<u>VI Soil structure:</u>			
16) Kapali tank area GL-10M	Sand	Sand	Sand
12-20M	Clay	Clayey Sand	Clay
20-30	Sandy Clay	Sandy Clay	-
30-40	Masive rock	Masive rock	-

		HR & CE	METROWATER	PHD
Chitrakulam	GL-2M	Sand	Sand	
	8-12 M	Clay	Sandy Clay	Sand
	12-25	Sandy Clay	Clay	Clay
	25-40	Masive rock	Masive rock	-
Parthasarathy temple		Sandy soil.		
Madhava Perusal temple		-	-	-
	Bed - 1.5M	Dry sand		
	1.5 - 6M	Saturated sand		
	6-10M	Coarse sand		
	10-13M	Sandy clay		
	13-18M	Clay		

VII Renovation of Tanks:

17) Parthasarathy temple

cut stones paved
over cement
concrete bed.

Madhava perusal

clay bed

a) Minimum water level planned:

Parthasarathy temple

1.5/2.5M

Madhava perusal

1/2 M

b) Pumps used:

Parthasarathy

3 HP centrifugal
pump

Madhava perusal

3 HP submerisible

	HR & CE	METRE/WATER	PEO
c) No. of hours pumps are used:			
Parthasarathy	1/2 hr/day	-	-
Madhava perumal	1/2 - 1 hr/day	-	-
18) Quantity of water pumped/day-			
Madhava perumal	13.5 K.Lts	-	-
19) Maintenance schedule for tanks	-	-	-
VIII <u>Design of tank bed:</u>			
20) Puddle clay on top	may crack during dry season	-	-
Puddle clay with topping of sand	forms natural impervious bed fit for lillies & fish	stores water in tank - no recharge in surrounding wells.	-
concrete stone paving the bed	problem to keep water clean. Also high cost.	-	-
21) Cost/Sq.Mtr. for different beds.			
a. Puddle clay	Rs.80/-	-	-
b. Puddle with sand topping	Rs.100/-	-	-
c. concreted bed	Rs.120/-	-	-
IX <u>Feeding water to tanks:</u>			
22) Store water drain drgs.	-	-	not available
Age and condition of pipes	-	-	not known

	HR & CE	METROWATER	PHD	
23) Original connection to tank from P.S.High school	now blocked	-	-	from Venkatesa Agraharam - to one part to the tank.
From Lady Sivaswami school to Chitrakulam	now blocked - some thought to reopen.	-	-	not aware.
Surface water from Mada Street to Kapali Tank	Yes	-	-	Yes
Chitrakulam west and north streets.	Yes	-	-	Yes
24) Current position of above connections	Blocked	-	-	Partially damaged
25) Suggestion on method for filtering surface storm water	through settling chambers.	-	-	-
26) Cost of desalination sea-water	-	-	-	-
X) <u>27 Recharging aquifers through wells inside tanks:</u>	-	-	-	-
XI) <u>28. Method to maintain quality of</u> <u>stored water:</u>	-	-	-	-
29) Target for quality	Potable	-	-	-
30) Method currently used in renovated tanks (Parthasarathy temple)	Fish culture	-	-	-

APPENDIX IV**Survey of the religious geography within the Heritage Zone****List of festivals attracting tourists within a Heritage Zone**

The importance of temple activities in the area cannot be over emphasised. Major religious activities, such as processions for the idols occur in and around the streets of the Heritage Zone on no less than 107 days each year. Often processions of more than one temple occur simultaneously. Residents of the Heritage Zone worship the idols as they stop at points along the processional routes. Additionally crowds from in and around Madras and national and international visitors attend these depending on the importance of the occasion (refer Section 5.7.6)).

The dates in the table vary each year according to the almanac. The dates given in the table below are for the year 1991-92. The table shows the dates the processions take place, the timing (morning or evening), the routes taken by the processions and the type of *vahanam* or temple car used for the procession. The table shows that most of the processions are in the evening.

Kapaleeshwar Temple Festivals(days procession taken outside the temple)

MONTH	NAME OF FESTIVAL	TIMING	NO. OF PEEDAM	ROUTES	REMARKS
Jan. 12th	Revathy Mayanar Festival	P.M.	1	"	Pushpa pallaku.
Jan. 15th	Thai Madha Pirappu	P.M.	1	"	-
Jan. 16th	Par Veltai festival	A.M./P.M.	1/1	"	-
Jan. 18th	Thiruvathirai	-	-	-	-
Jan. 19th	Theppam festival	P.M.	1	"	When there is water in the tank.
Jan. 20th	Theppam festival	P.M.	1	"	"
Jan. 21st	Theppam festival	P.M.	1	"	"
Feb. 9th	Vana bhojanam	A.M. TO P.M.	1	Special route to Greenways Road.	
Feb. 10th	Ratha sapthami	P.M.	1 chariot	Standard route *	-
Feb. 11th	Thai Krithikai	P.M.	1	"	-
Feb. 18th	Masi Magam (Kadalattu Vizha)	A.M.	1	Special route to Marina Beach.	-
March 9th	Panguni Big festival (Aruvattu Moovar) - I day	P.M.	5	Standard route *	-
March 10th	" - II day	P.M.	5	"	-
March 11th	Adhikara Mandhi - III day	A.M.	5	"	-
March 12th	" - IV day	-	5	"	-
March 13th	Rishabha vahanam - V day	P.M.	5	"	near midnight.
March 14th	" - VI day	P.M.	5	"	-
March 15th	Chariot festival	A.M.	5	"	-
March 16th	Aruvattu Moovar Festival	P.M.	20	"	-
March 17th	Ehikshaiandar festival	P.M.	5	"	-
March 18th	Thirukalyanam	P.M.	2	"	-

NOTE: The dates are for 1991/1992. Actual day of the festivals for each year will change as per astronomical configurations as detailed in Panchangams (Almanac).

* Standard Route for Kapaleeswarar Kovil - East Mada Street (Part) South Mada Street, A.K.Mutt Road (part), North Mada Street, East Mada Street (Part).

MONTH	NAME OF FESTIVAL	TIMING	NO. OF PEEKS	ROUTES	REMARKS
April 17th	Krithikai	P.M.	1	Standard route	14th April - Tamil New Year's day.
April 18th	Kapaleswarar Vasantha Vizha	P.M.	1	"	-
April 23th	Chitra Pournami	P.M.	3	"	Pancha Darthy procession
May 8th	Singara Velar Vasantha Vizha (10th day)	P.M.	1	"	Peshpa pallaku.
May 14th	Singara Velar Vasantha Vizha (15th day)	P.M.	1	"	"
May 15th	Chakkachar procession (New Moon Day)	P.M.	1	"	Elephant vahanam.
May 27th	Lakshna Geepam	P.M.	1	"	-
May 30th	Thirumana Sannanar festival (10th day)	P.M.	1	"	Peshpa pallaku.
June 10th	Pradosham/Krithikai	P.M.	1	"	-
June 24th	Full Moon (Chanarasekara svana procession.	P.M.	1	"	All full moon days.
June 30th	1008 Sanka Abishekam (Pancha Darthy Festival)	P.M.	3	"	-
July 8th	Krithikai (Singara Velar procession)	P.M.	1	"	-
July 14th	Nannikavachagar Procession	P.M.	1	"	Peshpa pallaku.
July 23th	Sada Velli II	P.M.	1	"	-
August 4th	Sada Krithikai	P.M.	1	"	Peacock vahanam.
August 12th	Sada Purnam (Marudakannai procession)	A.M./P.M.	1/1	"	-
August 14th	Sada Velli V	P.M.	2	"	Elephant, horse vahanam.
August 18th	Pannaru Thirumurai	A.M., P.M.	1/1	"	Elephant vahanam in the morning.
August 22th	Soma Posham	P.M.	1	"	-
August 24th	Full Moon (Sugar cladding)	P.M.	1	"	-

MONTH	NAME OF FESTIVAL	TIMING	NO. OF FEEDING	ROUTES	REMARKS
August 31st	Krithikai	P.M.	1	"	-
Sept. 12th	Vinayaka Chatburthy	P.M.	1	"	Marthana Vinayagar on Mooshika vahanam.
Sept. 23rd	Full moon (Nirai Mani Festival)	P.M.	1	"	-
Sept. 28th	Navarathri Festival I day	-	-	-	-
Oct. 18th	Vijaya Dasami	-	-	-	(Par Vettai) Horse vahanam.
Oct. 22nd	Full Moon - Anna abhishekam	P.M.	1	"	-
Oct. 23th	Krithikai	P.M.	1	"	-
Nov. 7th	Kanda Sashti - I day	A.M./P.M.	1	streets around temple only (short route)	-
Nov. 8th	Kanda Sashti - II day	A.M./P.M.	1	"	-
Nov. 9th	Kanda Sashti - III day	A.M./P.M.	1	"	-
Nov. 10th	Kanda Sashti - IV day	A.M./P.M.	1	"	-
Nov. 11th	Kanda Sashti - V day	A.M./P.M.	1	"	-
Nov. 12th	6th Day - Soora Samarom	A.M./P.M.	1 for P.M.	Standard route + on 1 'Ther' & 3 peedan.	-
Nov. 13th	Rishaba Vahanam	P.M.	1	"	-
Nov. 14th	Laksharchanam	P.M.	1	"	Elephant vahanam.
Nov. 21st	Full Moon Kartikai Deepam	P.M.	1	"	-
Dec. 11th	Thiruvanoavai festival - I day	P.M.	1	"	-
Dec. 12th	" - II day	P.M.	1	"	-
Dec. 13th	" - III day	P.M.	1	"	-
Dec. 14th	" - IV day	P.M.	1	"	-
Dec. 15th	" - V day	P.M.	1	"	-
Dec. 16th	Thiruvanoavai Festival - VI day	P.M.	1	"	-
Dec. 20th	Panchamurthy Vidya	P.M.	1	"	-
Dec. 21st	Arudra Varsanam	P.M.	2	"	-

Srinivasa Perumal Temple Festivals(days procession taken outside the temple)

DATE	NAME OF FESTIVAL	TIMING	NO. OF FEEDAYS	ROUTES	REMARKS
April	Ugadi	P.M.	1	Standard route + (around temple/Chitramlam)	
	Ramanavani	P.M.	1	"	
	Ramar Pallabhishekan	P.M.	1	"	
April 9th	Shravanam	P.M.	2	"	
April 11th	Bhashyakar Utsavam	P.M.	1	"	
April 12th	Bhashyakar Utsavam	P.M.	1	"	
April 13th	Bhashyakar Utsavam	P.M.	1	"	
April 14th	Chitramasa pirappu	P.M.	2	"	
April 15th	Bhashyakar Utsavam	P.M.	1	"	
April 16th	Bhashyakar Utsavam	P.M.	1	"	
April 17th	Bhashyakar Utsavam	P.M.	1	"	
April 18th	Bhashyakar Utsavam	P.M.	1	"	
April 23th	Ekadasi	P.M.	1	"	
April 23th	Chitra gournami	SUNDA.M. 10 midnight	2	Very long route crossing 48 streets	To T.Nagar, halt at Pondy Bazaar / return.
May 5th	Thotta Utsavam	10 A.M. TO 9P.M.	2	Special route	Upto Abhiramaouram. Kasturi Estate.
May 6th	Shravanam	P.M.	2	Standard route +	
May 14th	Amavasai	P.M.	1	"	
May 15th	Brahmotsavam	A.M. & P.M.	1	"	
May 15th	Brahmotsavam	"	1	"	
May 17th	Brahmotsavam	"	1	"	
May 18th	Brahmotsavam	"	1	"	
May 19th	Brahmotsavam	"	1	"	
May 20th	Brahmotsavam	"	1	"	
May 21st	Brahmotsavam	"	1	"	
May 22nd	Car festival	7A.M.	1	"	
May 23rd	Brahmotsavam	12 NOON A.M.&P.M.	1	"	
May 24th	Brahmotsavam	"	1	"	
May 25th	Brahmotsavam	"	1	"	
May 26th	Brahmotsavam	"	1	"	
May 27th	Brahmotsavam	"	1	"	
June 3rd	Shravanam	P.M.	1	"	
June 6th	Ekadasi	P.M.	1	"	
June 12th	Amavasai	P.M.	1	"	
June 15th	Masaperappu	P.M.	1	"	
June 16th					
June 21st	Kodai Utsavam	P.M.	1	"	
June 22nd	Ekadasi (Ami Garudan)	P.M.	2	"	
June 27th	Pournami	P.M.	1	"	
June 30th	Shravanam	P.M.	2	"	
July 9th	Ekadasi	P.M.	1	"	
July 11th	Amavasai	P.M.	1	"	
July 15th	Chakshinavana Punyakaliam	P.M.	2	"	
July 23rd	Ekadasi	P.M.	1	"	
July 25th	Gajenera Mokshan	P.M.	1	South Mada/Venkatesa Agraharam/North Mada street - Standard +	

July 27th	Shravanam	P.M.	2	Standard *	
August 6th	Ekadasi	P.M.	1	"	
August 10th	Amavasya	P.M.	1	"	
Aug. 17th	Ekadasi	P.M.	1	"	
Aug. 27th	Pavithra Utsavam	P.M.	1	"	
Aug. 28th	Pavithra Utsavam	P.M.	1	"	
Aug. 29th	Pavithra Utsavam (Poorna namathu)	P.M.	1	"	
Oct. 1st	Ekadasi	P.M.	1	"	
Oct. 1st	Desika Utsavam	11 A.M. & P.M.	1/1	"	
Oct. 16th	Desika Utsavam - Car festival	A.M.	1	"	
Oct. 22nd	Pournami pancna goorvam	P.M.	1	"	
Nov. 2nd	Ekadasi	P.M.	1	"	
Nov. 4th	Ennakudam Utsavam	P.M.	1	"	
Nov. 5th	Deepavali	P.M.	2	"	
Nov. 7th	Peyazhvar Utsavam	A.M.	1	"	
to 13th					
Nov. 18th	Ekadasi	P.M.	1	"	
Nov. 22nd	Thiru Karthigai	P.M.	1	"	
Dec. 17th	Vaikunta Ekadasi	A.M.	1	"	
Jan. 5th	Andal Neeratta Utsavam	A.M.	1	"	
to 13th					
Jan. 14th	Andal Neeratta Utsavam.	A.M.	1	"	
	Shogi (Kalyana Utsavam)	P.M.	2	"	
Jan. 15th	Uttaraya Purnyakalam	P.M.	2	"	
Jan. 19th	Kamu Parivettai	1 A.M. TO 2 P.M. (halli. to 11P.M. pallakku)	1	Special route	Uple Kayapettah Lakshmanuram Lembe.
Jan. 25th	Ekadasi	P.M.	1	Standard *	
Feb. 3rd	Vanahojana Utsavam	A.M.	2	Special route	To Palathope through R.K.Hill Road.
Feb. 3rd	Mahodayana (once in 12 years)	A.M.	1	Special route	To beach near Foreshore estate.
Feb. 4th	Shravanam	P.M.	2	Standard *	
Feb. 10th	Bathaspathana	A.M./P.M.	1/1	"	
Feb. 12th	Haraspathana	P.M.	1	"	
Feb. 14th	Ekadasi	P.M.	1	"	
Feb. 15th	Sulasekara Sathumudi	P.M.	2	"	
Feb. 16th	Tasi Maqam	A.M.	1	Special route	To beach near Foreshore estate.
Feb. 21st	Ashta	P.M.	1	Standard *	
Feb. 27th	Ekadasi	P.M.	1	"	
March 2nd	Shravanam	P.M.	2	"	
March 4th	Amavasya	P.M.	1	"	
March 14th	Nasa Pirappu	P.M.	1	"	
March 15th	Ekadasi	P.M.	1	"	
March 18th	Panguni Utharam	P.M.	1	"	
March 19th	Gorgole Utsavam	P.M.	2	"	
March 20th	Ashtan	P.M.	1	"	
March 27th	Ekadasi & Shravanam	P.M.	2	"	

NOTE: Dates for each year will change as per Almanac.

* Standard route for Srinivasa & Kesava Perumal Kovil - Kesava Perumal (K.P.) Sannathi Street. K.P. East, K.P.South, K.P.West, Chitranulan West, Chitranulan North, Solaisopa Andali Street.

Study of devotees coming to Kapaleeshwar Temple

The survey sample shown here is for a period of three days two of which are normal weekdays and one a Saturday. Normal weekdays see an average of 4200 visitors while Saturdays show a 50% increase. The number of people visiting the temple varies from day to day even within a normal week and between morning and evening. The figures increase dramatically on special days and annual festivals. Normal weekends especially on Saturdays indicate heavy rush in the late evenings.

Date		5:00a.m.- 2:00a.m.		4:00p.m.- 6:00p.m.		6:00p.m.-8:00p.m.		Daily Total
		Men	Women&Child	Men	Women&Child	Men	Women&Child	
23/12/91 (Saturday)	Morning gopuram	223	223	222	268	375	437	
	Evening gopuram	599	223	523	898	818	855	
		822		1128		1293		3246
24/12/91 (Monday)	Morning gopuram	189	147	187	240	265	222	
	Evening gopuram	255	138	519	766	324	422	
		444		1259		644		1747
21/12/91 (Thursday)	Morning gopuram	154	77	159	319	229	245	
	Evening gopuram	420	225	435	1004	468	375	
		574		1323		624		2521

APPENDIX V**A Questionnaire to collect data from residents in the Heritage Zone****I IDENTITY**

Name and Address: (where possible head of house)

II BIOGRAPHICAL DATASex: Male
Female

Age:

Income:

Academic Status:

No. of persons in the family:

No. of families in house:

No. of rooms per family:

III DESCRIPTION OF HOUSEType of house: Row House
Detached house with garden
Courtyard house
Apartment / flat
Other

Area: Built: Site:

Persons/room:

Utilities: private tap well toilet
(water points/
shared
toilets)Open spaces: existent shared
non-existent privateTenancy: Owner
Tenant

- Age of building:** less than 15 years
 15 - 30 years
 30 - 50 years
 50 years and above
- Construction system:** pucca
 kutcha
- Materials of construction:** brick, limestone and timber
 brick, cement and timber
 reinforced concrete and brick filling
 other

III RESIDENT'S ATTITUDE TOWARDS HIS HOUSE

- My house is:** historic
 old
 modern
 of special value
 nothing special about it
 other
- I consider the condition of my house:** excellent
 good
 fair
 poor
- In order to improve my house, I think it needs to be:**
 demolished
 repaired
 altered
 provided with modern facilities
 other
- What I like or dislike most about my house:** good privacy/lacking
 spacious/ lacking
 good/bad appearance
 modern facilities/lacking
 well maintained/lacking
 all / nothing
 nothing
- I am satisfied / not satisfied with my house because it is:**
- | | |
|------------------|------------------|
| close to work | far from work |
| cheap rent | expensive rent |
| good memories | |
| the surroundings | the surroundings |
| all of the above | not satisfied |
| other | other |

IV RESIDENT'S ATTITUDE TO CHANGE

- Moving from the house** I don't want to move because
I want to move because
- Feelings towards my area** strongly attached
fairly attached
not attached at all
- Concerning my area I feel:** proud of its history
character
don't know
- ashamed because of untidiness
crowded
problems
- don't know
- The area changed during my life time:** yes / no
- The physical changes were:** very little
few
marked change
other comments
- I consider these changes:** good
bad
don't know
- The social changes were:** very little
few
marked change
other comments
- I consider these changes:** good
bad
don't know

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