

247

URBAN PLANNING LEGISLATION IN SAUDI ARABIA
A SYSTEMATIC CLASSIFICATION

BY

ABDULLAH HUSSAIN AL-KADI

JANUARY 1989

247

VOLUME - I

A THESIS SUBMITTED TO THE KING FAISAL UNIVERSITY
IN PARTIAL FULFILLMENT OF REQUIREMENTS
FOR DEGREE OF MASTER IN URBAN AND REGIONAL PLANNING

DEPARTMENT OF URBAN AND REGIONAL PLANNING
COLLEGE OF ARCHITECTURAL AND PLANNING
KING FAISAL UNIVERSITY

ACCEPTANCE

This thesis has been accepted in partial fulfillment of the requirements for the Degree of Master of Urban and Regional Planning in the College of Architecture and Planning in King Faisal University.


Date: 14 / 1 / 1989

ADVISING COMMITTEE

CHAIRMAN : DR. MOHAMMAD S. AL-ISSA



MEMBER : DR. NASIM A. ANSARI



MEMBER : DR. AHMAD J. AL-JARRALLAH



King Faisal University
College of Architecture and Planning

Thesis Examination Report

Date: 7 / 6 / 1409 (14 / 1 / 1989)

We have carefully read the report entitled Urban Planning Legislation in Saudi Arabia - A Systematic Classification

submitted by Abdullah Hussain Al-Kadi
in partial fulfillment of the requirements of the degree of Master in Urban Planning. We have also carried out a report discussion on Saturday 7/6/1409 (14/1/1989) at 10 am, in The Auditorium of the Computer Building. We here recommend that this work be;

☒ Accepted.

☐ Completed.

☐ Rejected

In support of this recommendation we present the following joint statement of evaluation.

The student has achieved the standard required for a Master's Thesis in Urban and Regional Planning. The work is well-structured and presented in a clear and logical manner. This evidence of desk research and willingness to undertake the work with primary sources. The conclusions are related to the objectives. The recommendations are worthy of further study and discussion. The thesis is a useful work of great richness.

Thesis Examining Committee: 1) Dr. Mohammad Salem Al-Isa

2) Dr. Omar Awadh Al-Mashaabi

3) Dr. Amjad Bahadur Rizvi

ملخص البحث

أدى النمو الحضري الكبير الذي شهدته كثير من مدن المملكة العربية السعودية الى حتمية تدخل الدولة بغية تنظيم هذا النمو الحضري ، فصدرت كثير من التعميمات وسنت كثير من الانظمة على فترات مختلفة ومن قبيل جهات متعددة لهذا الغرض . ومن ثم وجدت تشريعات التخطيط على شكل متناثر ، وكانت محاولة لم شعها غير كافية لمواكبة النمو المخطط الذي عم أرجاء المملكة العربية السعودية على عظم مساحتها . ويرمى هذا البحث الى تحقيق هدفين وهما :

اولا : تطوير نظام لتصنيف تشريعات التخطيط الحضري بالمملكة العربية السعودية .
ثانيا : تصنيف تشريعات التخطيط الحضري ذاتها في المملكة العربية السعودية .
وقد تحقق الهدف الاول من خلال مراجعة مكثفه لتشريعات التخطيط الحضري في بريطانيا وامريكا حيث تتوفر كثير من المعايير التي استنبطت من خلال تجربة مثل هذه البلاد المتقدمة .
وقد طور هذا البحث نظام تصنيفي لتشريعات التخطيط الحضري في المملكة مع مراعاة الظروف والاوزاع الخاصة بها .

كما تحقق الهدف الثاني من خلال مراجعة تفصيليه وتحليليه لمهام جميع الجهات الحكومية التي لها علاقة مباشرة او غير مباشرة بالتخطيط الحضري بالمملكة العربية السعودية واجراء تحليل لتشريعات التخطيط الحضري على ضوء النظام التصنيفي الذي طور في هذه الدراسة .

ومن خلال التحليلات والدراسات وجد ان كثير من تلك الجهات الحكومية تسهم في التنمية الحضرية بالمملكة على المستويين القومي والمحلي ومن ثم فهي تشارك في عملية التخطيط الحضري .

كما لاحظ البحث ان هناك كثير من القصور في الممارسات الحالية وخلص الى صياغة عدد من التوصيات التي من شأنها تعديل تشريعات التخطيط الحضري القائمة الى الافضل .

ABSTRACT

The rapid physical development experienced in many Saudi Arabian Cities made it necessary for the government to intervene and control urban growth. Accordingly many regulations and directives have been developed and issued in different periods and by different governmental agencies.

Consequently the existing legislation is found to be fragmented developed in a piecemeal way and lagged behind physical developments. This research aimed to accomplish two objectives: first to determine criteria for classification system for urban planning legislation in Saudi Arabia; second to classify existing urban planning legislation in the Kingdom of Saudi Arabia.

First objective of this study was satisfied through the extensive review of the urban planning legislation in the United Kingdom and United States, where a set of criteria was created. Given the experience of developed countries and the conditions of Saudi Arabia, this research proposed a classification system for urban planning legislation in Saudi Arabia.

Second objective of this research was satisfied through the detailed review and analysis of the working of all governmental agencies related directly or indirectly with the field of urban planning in Saudi Arabia. The analysis of the urban planning legislation has been done on the basis of the

proposed classification system in this study.

Reviewing the role of governmental agencies in the Kingdom and analysing the existing urban planning legislation practice it was found that many of those governmental agencies contribute to the physical development in Saudi Arabia at the national and local levels and hence participate in the urban planning process. Moreover, the research observed many deficiencies in the existing practice and proposed several recommendations for improvements.

ACKNOWLEDGEMENT

In the name of Allah, the Merciful, the Compassionate

I wish to express my deep appreciation to my supervisor Dr. Mohammad Al-Isa, for his continuous encouragement, invaluable advice and enthusiastic assistance given throughout the duration of this work and the writing of the thesis. Dr. Mohammad Al-Isa with his extensive knowledge and logical way of reasoning has exerted a vital influence on me.

Special appreciation and thanks is also expressed to Dr. Nasim A. Ansari for his efforts and close guidance to this work. My thanks is also due to Dr. Ahmed Al-Jarallah who contributed many valuable things in the thesis.

The writer is also deeply indebted to many people in most of the governmental agencies in the Kingdom for their assistance and encouragement in this study. In this respect, Mr. Abdul Rahman Al Arfaj, Head of the Library at Dammam Public Administration Institute did outstanding job and provided the research with valuable data.

I am deeply indebted to the King Faisal University for providing me necessary logistics while writing this thesis.

Special thanks are also due to Adel Fahad Al-Hothail and Mohammad Ilyas for their sincere efforts in typing the thesis.

The writer is also thankful to all others whose help made this venture possible.

Finally, I am deeply grateful to my family, especially my parents, wife and two daughters - Noora, and Abrar - for their continued encouragement and sacrifice whilst the work was in progress.

TABLE OF CONTENTS

	PAGE
CHAPTER - I : INTRODUCTION.....	1
1.1 Background.....	1
1.2 Objectives.....	14
1.3 Methodology and Organization.....	14
 CHAPTER - II : THE CLASSIFICATION SYSTEM.....	 17
2. Review of Literature.....	18
2.1 Administration of Urban Planning.....	21
2.1.1. Central Authority.....	21
2.1.1.1 Central Authority : Britain.....	21
2.1.1.2 Central Authority : United States..	22
2.1.2 Local Authorities.....	23
2.1.2.1 Local Authorities : Britain.....	23
2.1.2.2 Local Authorities : United States..	24
 2.2 Development Plans.....	 28
2.2.1 Development Plans : Britain.....	28
2.2.1.1 Structure Plan.....	29
2.2.1.2 Local Plans: Britan.....	34
2.2.2 Development Plans: United States.....	37
2.2.2.1 Preparation and approval of the Comprehensive Plan.....	38
2.2.2.2 The Comprehensive Plan Documents..	39
2.2.2.3 Periodical Review the Comprehen- sive Plan.....	39

2.2.2.4	Review of the Comprehensive Plan after five to ten years.....	39
2.2.2.5	Amendment of the plan at any time..	40
2.3	Development Control.....	40
2.3.1	Development Control : Britain.....	40
2.3.1.1	Planning Permission.....	41
2.3.1.2	Compulsory Acquisition.....	43
2.3.2	Development Control : United States..	44
2.3.2.1	Zoning Ordinance.....	45
2.3.2.2	Land Subdivision Regulations.....	49
2.3.2.3	Building Regulations.....	53
2.3.2.4	Compulsory Acquisition (Power of Eminent Domain).....	57
2.3.2.5	Leving Taxes.....	58
2.3.2.6	Financial Planning and Capital Improvement Programming.....	59
2.4	Planning Legislation: Anglo American Comparision.....	59
2.5	Proposed Classification System for Saudi Arabia.....	66
2.5.1	Administration of Planning.....	66
2.5.1.1	Central Authority.....	66
2.5.1.2	Local Authority.....	67
2.5.2	Development Plans.....	67
2.5.2.1	Execution Plan and Action Area Plan.....	68
2.5.2.2	Project Planning.....	68

2.5.3	Development Control.....	69
2.5.3.1	Direct Development Control.....	69
2.5.3.2	Indirect Development Control.....	69
 CHAPTER - III : CLASSIFICATION OF EXISTING PLANNING LEGISLATION IN THE KINGDOM OF SAUDI ARABIA.....		 73
3.	Analysis of Existing Planning Legislation....	74
3.1	Administration of Planning.....	75
3.1.1	Central Authority.....	75
3.1.2	Local Authority.....	90
3.2	Development Plans.....	100
3.2.1	National Settlement Plans.....	100
3.2.2	Regional Plans.....	100
3.2.3	Master Plan.....	101
3.2.3.1	Master Plans for all cities and Towns by Ministry of Municipal and Rural Affairs and other Governmental agencies.....	102
	i) Preparation and approval of Master Plan.....	102
	ii) Master Plan Documents....	105
	iii) Periodical Review of the Master Plan.....	106
	iv) Alteration, Repeal or Replacement of a Master Plan.....	106

3.2.3.2	Work of Consultant: Master Plan.....	108
	i) Preparation and approval of Master Plan.....	108
	ii) Master Plan Documents.....	109
	iii) Periodical Review of the Master Plan.....	110
	iv) Alteration, Repeal or Replacement of Master Plan.....	110
3.2.3.3	Master Plan for all Industrial Estates by Ministry of Industry and Electricity.....	110
3.2.3.4	Master Plan for the two Industrial cities Jubail and Yanbu.....	111
3.2.4	Execution Plan.....	112
3.2.4.1	Execution Plan for All cities and Towns by Ministry of Municipal and Rural Affairs and other Governmental Agencies.....	112
	i) Preparation and approval of Execution Plan.....	112
	ii) The Execution Plan Documents.....	113
	iii) Periodical Review of the Execution Plan.....	115
	iv) Alteration, Repeal or Replacement of Execution Plan.....	115
3.2.4.2	Work of Consultants : Execution Plan.....	115
	i) Preparation and Approval of Execution Plan.....	115
	ii) The Execution Plan Documents.....	116
	iii) Periodical Review of the Execution Plan.....	116
	iv) Alteration, Repeal or Replacement of Execution Plan.....	117

3.2.5	Action Area Plans.....	117
3.2.5.1	Action Area Plans for all cities cities Towns by Ministry of Municipal and Rural Affairs and other Governmental Agencies.....	117
3.2.5.2	Work of Consultants : Action Area Plans.....	118
	i) Preparation and Approval of Action Area Plans.....	118
	ii) The Action Area Plans Documents.....	119
	iii) Periodical Review of Action Area Plans.....	119
	iv) Alteration, Repeal or Rep- lacement of an Action Area Plans.....	119
3.2.6	Project Planning.....	119
3.3	Development Controls.....	121
	I. Direct Development Controls.....	122
3.3.1	Zonning Ordinances.....	122
3.3.1.1	Zoning Ordinances for all cities and Towns by Ministry of Municipal and Rural Affairs and other Governmental Agencies.....	123
	i) Preparation and Adoption of Zoning Ordinances.....	123
	ii) Documents of Zoning Ordinances.....	128
	iii) Admendments of Zoning Ordinances.....	131

3.3.1.2	Work of Consultants : Zoning Ordinances.....	132
	i) Preparation and Adoption of Zoning Ordinances.....	132
	ii) Documents of Zoning Ordinances.....	133
	iii) Amendments of Zoning Ordinances.....	133
3.3.1.3	Zoning Ordinances by Ministry of Industry and Electricity...	134
3.3.1.4	Zoning Ordinances by Royal Commission for Jubail and Yanbu.....	134
	i) Preparation and Adoption of Zoning Ordinances.....	135
	ii) Documents of Zoning Ordinances.....	135
	iii) Amendments of Zoning Ordinances.....	135
3.3.2	Land Subdivision Regulations.....	136
3.3.2.1	Land Subdivision Regulations for all cities and Towns by Ministry of Municipal and Rural Affairs and otehr Governmental Agencies.....	136
	i) Design Standards.....	137
	ii) Improvement Requirements...	140
	iii) Plat Review Procedures and Adoption.....	140
	iv) Periodical Review of Land Subdivision Regulations....	152
3.3.2.2	Working of Consultants : Land Subdivision Regulation.....	152
	i) Design Standards.....	153
	ii) Improvement Requirements...	153

	iii) Plat Review Procedure and Adoption.....	153
	iv) Periodical Review of Land Subdivision Regulations....	154
3.3.2.3	Land Subdivision Regulations by Ministry of Industry and Electricity.....	154
3.3.2.4	Land Subdivision Regulations by Royal Commission for Jubail and Yanbu.....	155
	i) Design Standards.....	155
	ii) Improvement Requirements...	156
	iii) Plat Review Procedures and Adoption.....	157
	iv) Periodical Review of Land Subdivision Regulations....	158
3.3.3	Building Codes (Regulations).....	158
3.3.3.1	Building Codes for all Cities and Towns in the Kingdom except the Industrial Estates and the two Industrial Cities Jubail and Yanbu.....	159
	A. Architectural.....	159
	B. Structural.....	164
	C. Plumbing.....	166
	D. Electrical.....	166
3.3.3.2	Building Codes for all Industrial Estates in the Kingdom..	168
3.3.3.3	Building Codes for the Two Industrial Cities Jubail and Yanbu.....	168

3.3.4	Planning Permission.....	171
3.3.4.1	Planning Permission Granted by Ministry of Municipal and Rural Affairs and Other Organization.....	171
	A. Meaning of Development.....	171
	B. Application for Planning Permission.....	172
	C. Appeals.....	187
	D. The Enforcement of Develop- ment Control.....	188
3.3.4.2	Work of Consultants:Planning Permission.....	194
	A. Meaning of Development.....	195
	B. Application for Planning Permission.....	195
	C. Appeals.....	196
	D. Enforcement of Development..	196
3.3.4.3	Planning Permission fully Granted by Ministry of Industry and Electricity.....	197
	A. Meaning of Development.....	197
	B. Application for Planning Permission.....	197
	C. Appeals.....	198
	D. Enforcement of the Develop- ment Control.....	198

3.3.4.4	Planning Permission fully Granted by Royal Commission for Jubail and Yanbu.....	198
	A. Meaning of Development.....	198
	B. Application for Planning Development.....	199
	C. Appeals.....	199
	D. Enforcement.....	199
3.3.5	Compulsory Acquisition.....	199
3.3.5.1	Power of Compulsory Acquisi- tion of Land.....	200
	A. Competent Authority for Expropriation.....	200
	B. Procedure of Expropriation..	200
	C. Committee for Compensation Estimation.....	202
3.3.5.2	Compensation Payable on Compulsory Acquisition.....	203
	A. How to Calculate Compen- sation.....	204
	B. Re-estimate of the Value of the Property which will be Expropriated.....	207
	C. Informing Owners Officially..	208
	D. Preparation of Expropriation Decisions.....	208
	E. The Compensation paid to the Owner(s).....	209
	F. Transfer of Ownership.....	210
	G. Limited Period for the Compen- sation to be collected.....	210
3.3.5.3	Appeals.....	210

3.3.6 Financial Planning and Capital Improvement Programming.....	211
II. Indirect Development Control.....	211
3.3.7 Land Granting.....	212
3.3.8 The Real Estate Development Fund.....	213
3.3.9 The Saudi Industrial Development Fund.....	214
3.3.10 Home Ownership:ARAMCO.....	215
3.4 Overall view of Urban Planning Legislation in Saudi Arabia.....	215
CHAPTER IV CONCLUSION AND RECOMMENDATIONS.....	219
4. Conclusion and Recommendations.....	220
4.1 Conclusion.....	220
4.2 Recommendations.....	228
List of Interviewers	
Bibliography.	

LIST OF TABLES

<u>Table</u>	<u>Page</u>
1.1 Urban Population in Relation to Total Population of Saudi Arabia from 1932 to 1980	1
2.1 Similarities and Differences of Anglo-American Planning Legislation.....	61
2.2 Overall Characteristics of Anglo-American Planning Legislation.....	65
4.1 Inventory of the Governmental Agencies Contributing to the Physical Development in Saudi Arabia.....	225

LIST OF ILLUSTRATIONS

<u>Diagram</u>	<u>Page</u>
1.1 Governmental Agencies Contributing to Physical Development in Saudi Arabia.....	3
1.2 Methodology and Organization of the Study.....	16
2.1 Diagram Showing Arrangements for Town and Country Planning and Development Control in England and Wales.....	25
3.1 Overall View of Governmental Agencies involved in Urban Planning Legislation in Saudi Arabia.....	218

CHAPTER ONE

INTRODUCTION

1.1 BACKGROUND:

After the discovery of oil in 1938 Saudi Arabia became one of the wealthiest countries of the world and experienced a very fast and rapid development in all spheres of life. The range and diversity of physical development in all ranks of life have not been witnessed for other countries in the same period. (Chard 1986 P.95-118, Al Musailhi 1985, Kadi and Ibrahim 1981)

With the increase of Saudi Arabia income, a lot of efforts were directed toward the development of Saudi cities and villages to provide them with basic utilities and facilities for a better standard of life. The consequence was a rapid urbanization in most of the Saudi cities and towns (see table 1.1)

Table 1.1

Urban Population in relation to total population of
Saudi Arabia from 1932 to 1980

Year	1932**	1962**	1974*	1980*	1985*
Total Popu.	1500000	3300000	7012642	8289000	9800000
Urban Popu.	20% !	24% !	50% !!	64% !!!	74% !!!

Source: * Jolany 1984 P.156

** Al Hammad 1983

! Al Hammad 1983, Al Musailhi 1985, Al Jolany 1984.

!! Kadi and Ibrahim 1981

!!! Al Madinah Al Arabiah 1987.

The rapid urbanization process is always accompanied with some difficulties on a huge scale diversion of resources towards urban areas, there was rapid transformation of pattern of settlements in the Kingdom. The main urban problems experienced during the decade in the Kingdom were lack of community facilities and services, shortage of housing, increase in land and building costs, traffic congestion and urban sprawl of the cities. (Kadi and Ibrahim 1981, Al Musailhi 1985)

The above urbanization process and urban problems associated with the physical development made it necessary for the government to intervene with various proper measures for starting the initial stages of urban planning. This research would address and evaluate the planning legislation practices in Saudi Arabia.

Urban Planning in Saudi Arabia:

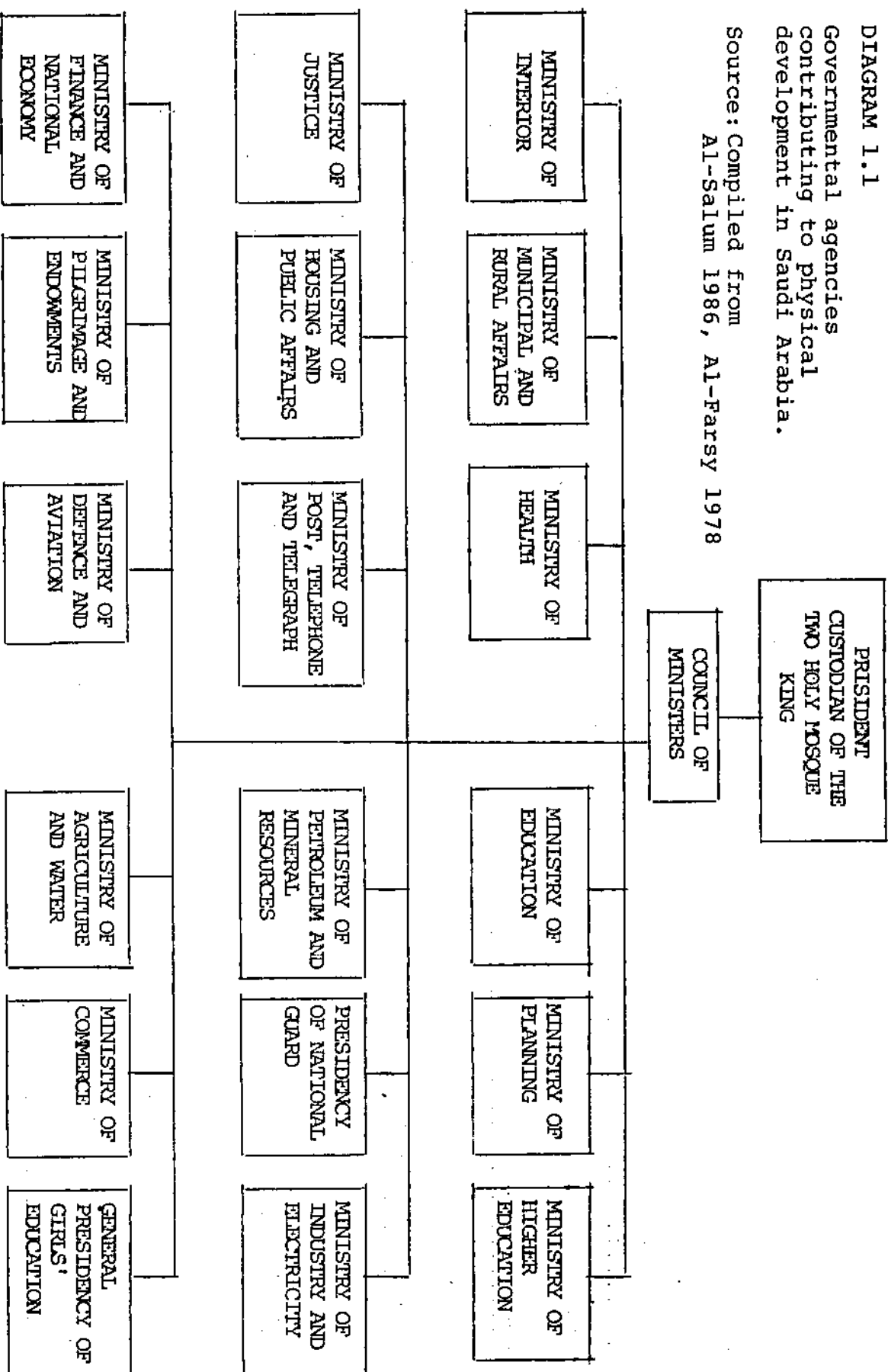
In an effort to deal with physical development and manage urban growth, the government stepped in and established the governmental agencies and special authorities and delegated them with the necessary powers and duties (see diagram 1.1). In 1357H, a Royal Decree was announced to establish Amant Alasimah (Municipality of Makkah) and other municipalities. This decree had such an arrangement that municipalities officially became responsible for the planning and development of their respective areas.

DIAGRAM 1.1

Governmental agencies
contributing to physical
development in Saudi Arabia.

Source: Compiled from

Al-Salum 1986, Al-Farsy 1978



This decree also defined the role of a municipality regarding preparation of good development plans, enforcement and development of controls, provision for utilities and other public services (Ministry of Municipality and Rural Affairs 1984, J P.4)

In 1382H/1962, the Deputy Minister of Interior for Municipal Affairs appointed international consultants to prepare the first generation of regional physical plans in the Kingdom and Master plans for a number of principal cities and towns. The first generation of urban and regional development plans were important and useful but they did not consider the comprehensive development on the national level and failed to institutionalize the physical planning process in the Kingdom.

Due to the increased responsibilities of the municipalities, the government in 1370H/1950 established the Municipalities Department in the Ministry of Interior. In 1382H/1962 the Department of Municipalities was upgraded to the level of Deputy Ministry of Interior for Municipal affairs. Finally, in 1395H/1975 an independent Ministry of Municipal and Rural Affairs was created. (Al Salum 1986 P.291-292, Rashid and Abushaar 1982 P.26-28, Assaf and Khashuggy 1983, Al Hathloul and Anis Al Rahman 1985 P.206-211, Kadi and Ibrahim 1981). This Ministry had four major responsibilities: (Ministry of Municipality and Rural Affairs 1978, N)

1. To plan the physical development of the Kingdom's cities and towns and develop roads and infrastructure.
2. To manage the services needed to keep cities and towns clean and healthy and to maintain the infrastructure in these areas.
3. To administer the various procedures concerned with the donation, sale and rental of free land and the acquisition of land for municipal projects.
4. To coordinate the development of rural areas outside the jurisdiction of the municipalities.

The need for an official land development policy was also recognized in the second five years plans 1975-1980 emphasized diversification of economy, rapid development of manpower resources, and the development of five regions of the country, namely, Central Region, Eastern Region, Western Region, South West Region and Northern Region. This plan laid out the following national physical development objectives: (Ministry of Planning 1975)

1. Making cities, towns and villages healthier more comfortable, more enjoyable and less costly places in which to live, work and travel.
2. Improving the efficiency of cities, towns and villages as trade, industry and services.
3. To enable every household in the Kingdom to have a decent safe and sanitary dwelling of a standard consistent with its level of income.

In order to achieve previous objectives, following policies were laid out in the same plan:

1. Prepare and subsequently implement master plans for both large and needy towns.
2. Provide all municipal residents with piped water in sufficient quantity to meet all reasonable needs.
3. Establish integrated rain water drainage networks, separate from sewer networks, in those areas within large cities that suffer from flooding.
4. Install waterborn sewage disposal networks in all municipalities within the 'A' and 'B' categories and in 'C' and 'D' municipalities where sewage disposal problems are acute.
5. Provide a basic network of permanently asphalted roads lit with mercury lamps in all municipalities.
6. Create new model communities, including housing, in the large and in some of the medium cities of the Kingdom.

So far a number of development plans for particular cities were carried through different periods as follows (Kadi and Ibrahim 1981, Al Hathloul and Al Rahman 1985 P.206-211)

First period: In 1947 the Governor of Eastern province requested the assistance from the Arabian American Oil Company (ARAMCO) to help in preparing a lay-out plan for both Dammam and Khobar. After the shift of the capital of the Eastern Province from Hofuf to Dammam in 1952, Aramco developed plans for both Dammam and Khobar with the cooperation of Dammam Municipality.

Second period: In the late 1960s, officials of the Government realized the need to control and direct the growth of the urban areas. In 1968, the Government engaged Doxiadis Associates to prepare the master plan for Riyadh. The final master plan of Riyadh was submitted in 1971 and was approved by the Council of Ministers in 1973.

Third period: In 1970 the Kingdom of Saudi Arabia was divided into five planning regions (Middle Region, Western Region, Eastern Region, Northern Region and Southern Region) International consultants (Doxiadis and Kenzo Tange & Urtec) were appointed to prepare the regional master plans for 20 Saudi Arabian cities.

Fourth period: In 1976 the Deputy Ministry of Town Planning was established and it appointed the international consultants (Group of Arab Consultants for Development and Reconstruction, CH2M Hill International and Consulting Engineering Group, Scet International/Sedes, Sert Jackson International Saudconsult, Speerplan & Koshak and Scan plan Sweco/Arch Center) to prepare

the executive master plans for seven cities, Dammam, Riyadh, Jeddah, Taif, Abha, Madina, and Jizan.

Fifth period: In 1978 up to now there are five comprehensive development plans that have been prepared by the international consultants (Finnplanco - Ahmed A. Hajjar Consultants, RSH International, Inc. and Al Rajehi Consulting Engineers Joint Venture, Norconsult A.S., CH2M Hill International Consulting Engineering Group Saudi Consulting House, Dar Al Handasah Consultants and Saudi Consulting Group), for Baha, Tabuk, Qassim, Hail, and Makkah. This planning period introduced the concept of regional development as well as local development. Recently in 1985 and in response to the urban sprawl of Saudi cities, a Royal Decree was issued to delineate the limits of urban areas.

The above urban planning efforts were associated along with history of planning legislation practices to be explored below.

Urban Planning Legislation in Saudi Arabia:

The historic development of planning legislation in the Kingdom of Saudi Arabia dates back to 1345H/1925 according to Al Hathloul and Anis Al Rahman 1985. This law was renewed in 1960's, when Royal Decree on Roads and Buildings was promulgated. This decree is comprised of provision of legislation on physical planning, buildings, protection of residential environment, safeguard from hazards and dangers,

housing standards and organizing activities of the contractors, engineers and architects. It was followed by Royal Decree on the establishment of municipalities and villages promulgated in 1377H. This decree outlined the role of the municipalities in respect of preparation of master plans, development control, provision of utilities, refuse collection and disposal. (Ministry of Municipal and Rural Affairs 1981 J P.4)

Planning legislation in all the countries of the world is related to urban development and its control. It consists of various levels and these levels differ with the administrative set up of each country. In the Kingdom, like most other countries of the world, urban legislation is devised and enacted by the central government, which enables the local authorities to prepare their own local regulations. The central government's legislation in all countries takes the form of a law decreed by the high authority. In the Kingdom this authority is the King, who delegates powers or authority to the ministers to issue directives for execution. (Ministry of Municipal and Rural Affairs 1980, M P.8)

In the Kingdom all central government departments with major capital expenditure have a direct effect on the physical growth of towns and cities. The location of public utilities and facilities influence the way urban areas develop in any country. Health, public works, housing and communications are all important agents in urban development process. These

departments do not have any direct responsibility to take into account the effects of their departmental policies on urban development. The major concern of the functional ministers is the effective delivery of services. The consequences in terms of spatial development patterns appears to get little consideration. (Daghistan and Lee 1979, Ministry of Municipal and Rural Affairs 1979, D, R). The level of participation and coordination of each such ministry or agency is analyzed in detail later in the thesis.

In Saudi Arabia physical planning legislation is in a piecemeal form. It is scattered in the form of Royal Decrees and Ministerial Directives issued from time to time by different Ministries (Ministry of Municipal and Rural Affairs 1981, A P.29). This is due to the absence of a comprehensive legislative code in the Kingdom for controlling all aspects of physical planning process in the country. (Ministry of Municipal and Rural Affairs M 1980 P.29). At present there are no comprehensive regulations in the Kingdom for the control of development and the use of land in both urban and rural areas. In addition the fast growth and expansion of urban areas in the Kingdom did not keep pace with the enactment of planning legislation, and led to lack of planning control in both urban and rural areas (Ministry of Municipal and Rural Affairs 1981, A P.86, Kadi and Ibrahim 1981)

The major sources of planning legislation in Saudi Arabia are as follows:

Quran and Sunnah: Saudi Arabia is a country that applies Islamic Shariah in its judgement. Quran and Sunnah (Prophet's Tradition peace be upon him) are the two major sources for Islamic Shari'ah. Therefore, all legislation in the Kingdom of Saudi Arabia should be derived and based on the strict application of Quran and Sunnah.

The Royal Decrees and the Ministerial directives on urban planning legislation that were issued between 1937 till 1983 were compiled in seven volumes and published by the Ministry of Municipal and Rural Affairs. Major characteristics of this document can be summarized as follows:

1. Each volume contains all related legislation for a specific period, this specific period varies from one volume to another.
2. It contains many Royal Decrees and Ministerial directives that are not related to the field of urban planning. This is because of the fact that there are many responsibilities of Ministry of Municipal and Rural Affairs and the related local authorities.
3. The document is classified by the level of issuing authority (King, Ministry) and the date of issue.

There are a number of master plans for particular cities of which some were passed before the establishment of the Ministry of Municipal and Rural Affairs and the rest after the establishment of this ministry. These master plans were carried through different periods: (Kadi and Ibrahim 1981, Al Hathloul and Al Rahman 1985 P.206-211) details of which are discussed in chapter II of the thesis later.

Other important sources of planning legislation are the Royal Decrees and ministerial directives related to the working of ministries and agencies other than Ministry of Municipal and Rural Affairs. Details of these regulation will be discussed later in the thesis.

Planning Legislation Features:

On the basis of previous discussion it can be traced that physical planning legislation in the Kingdom of Saudi Arabia has the following features:

1. It was developed in a piecemeal form, was issued for some particular cases and then applied to others also.
2. It is fragmented among several government agencies which lacks coordination.
3. There is no comprehensive planning code which covers all aspects of physical development and controls in the Kingdom.

4. The planning legislation did not cope with rapid development that took place in all spheres of life in the Kingdom.

The foregoing features of existing planning legislation in the Kingdom may be attributed mainly to the very rapid development of Saudi Arabia. Whatever the reason(s), the situation demands that steps be taken to develop a system that will help reduce the deficiencies in the future urban planning legislation in the Kingdom. Moreover, this is in line with the desire expressed in the Royal Decree No.13151 dated 27/05/1396H/1976 to gather various, fragmented and outdated bye-laws and regulations, and arrange them properly for further analysis and evaluation.

To this end, the present research will attempt to develop a system of classification deemed a necessary step toward better evaluation and development of urban planning legislation. In addition, it is anticipated, that the outcome of this research will be a potential source of information and hence of great benefit to many agencies and departments that have to do with planning legislation in one form or another. Therefore, this study will try to accomplish the following objectives.

1.2 OBJECTIVES:

1. To determine criteria for a classification system for urban planning legislation in the Kingdom of Saudi Arabia.
2. To classify existing urban planning legislation in the Kingdom of Saudi Arabia.

1.3 METHODOLOGY AND ORGANIZATION:

The work of the study was divided into three stages (see diagram 1.2). First stage achieved first objective by reviewing and comparing the Anglo-American experience in urban planning legislation. Second stage achieved the second objective by reviewing and analyzing the roles of involved governmental agencies. Third stage of the research came up with a summary and recommendations.

To achieve the first objective, the research reviewed and compared the experience of urban planning legislation in both United Kingdom and United States. Those two countries were chosen because, they are pioneer and having rich experience in the field of urban planning legislation, they represent two different experiences where Britain is centralized and United States is decentralized in terms of the administration structure, and the existing practice of urban planning in Saudi Arabia utilized both experiences through consultants from both countries. This review and comparison has been directed towards the creation of a set of criteria

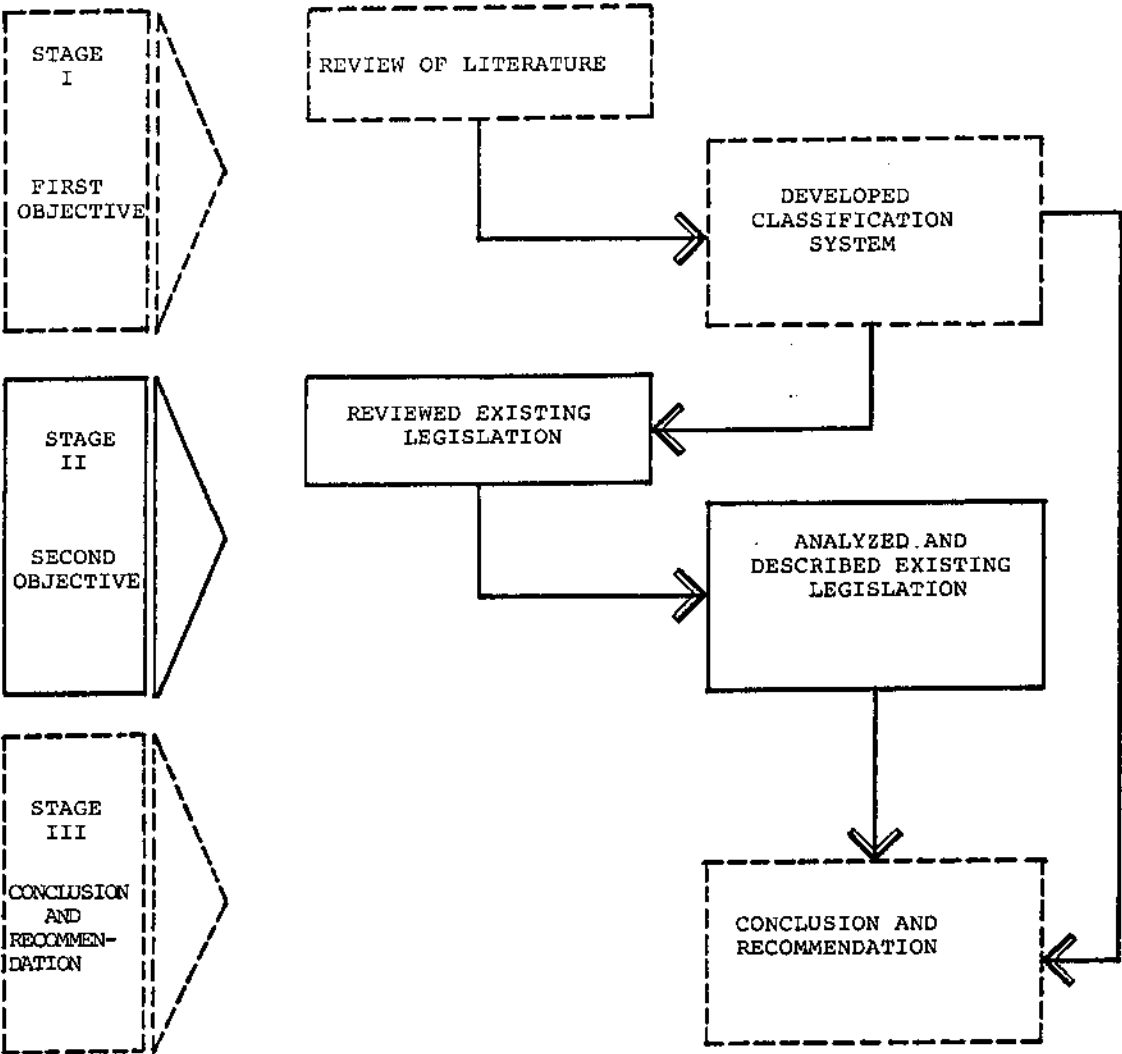
for classification.

To address the second objective, the research conducted an intensive review of governmental documents on the role and responsibilities of many governmental agencies to identify their contribution to physical development. The urban planning legislation related to ministries and organizations was collected and classified according to the criteria developed. The legislation not related with the field of urban planning was excluded from the study.

The main sources of information, are the publications of the concerned organizations and intensive interviews with the officers in charge of the concerned organizations were made to fill in the gaps in the information given in the reports of the concerned department or to remove any confusions.

Diagram 1.2

METHODOLOGY AND ORGANIZATION



CHAPTER TWO

THE CLASSIFICATION SYSTEM

2. REVIEW OF LITERATURE:

Basic aim of this review of literature is to develop a scientific framework or a foundation for a classification system for urban planning legislation in Saudi Arabia.

Saudi Arabia is a fast developing country with vast resources and unlimited scope for development. During the last two decades, specially after the oil boom of 1960, this country has experienced very rapid progress in all spheres of life, including the field of city planning. The basic model for this development was provided by Anglo-American experience in all fields of the development. This model of development left a deep impression on all aspects of the life of Saudi Society.

Review of literature in this chapter basically is based on a comparative analysis of planning and land use controls in Britain and United States, a detailed study of legal basis of these controls in the two countries, is also included. A comparison of the formal structure of plan preparation and planning procedures in the two countries is also done in the chapter to develop a criteria for a classification system for the existing planning legislation in Saudi Arabia.

Physical planning as generally understood by the layman is connected with "controls of land use". It is concerned with the making of physical plans showing the location of different land uses. All types of plans prepared by city planners become

meaningless if their proposals can not be implemented. The legislative basis of planning is important in the sense that it provides requisite powers to city planners to implement their plans and proposals. Experience both in developed and developing countries has shown that many physical plans proved ineffective, due to lack of legal basis of implementation.

The advanced industrial countries found it necessary to institute some degree of control over the land uses in the interest of city growth and economic efficiency. In this aspect some questions are important as to who does the planning, by what rules, to what ends and by what process. These basic questions are answered in the proceeding discussion with reference to Britain and United States of America.

Review of the existing state of art in the field of planning legislation in Britain and the United States showed that the urban planning legislation falls into three major classes as: (Heap 1973, 1987, Garner 1975, Telling 1973, Hamilton 1975, 1982, Cullinigworth 1978, 1982, McKown 1973, Grant 1982, Purdue 1977, Beaumont 1973, Encyclopedia of Halsbury's Statutes of England 1971, Encyclopedia of Halsbury's Laws of England 1984, Williams 1984, Keeble 1969, Gallion and Eisner 1975, Goodman 1968, Patterson 1979, International City Managers Association 1948)

1. Administration of urban planning.
2. Development plans.

3. Control of the development.

Detailed discussion on above mentioned classes with reference to Anglo-American experience in the field of planning legislation follows as under:

2.1 Administration of urban planning:

To carry out urban planning, it is necessary to have the power to implement the plan. Primarily planning is controlling the private persons property. (International City Manager's Associations 1948 P.21). It was found that the power and specific responsibility to control urban development are usually discussed under the aspect "Administration of Urban Planning".

Generally, the legislation related to urban planning in most of the countries of the world draws its basic form and pattern from the administrative set up at various levels in the country and the form of government. (Ministry of Municipal and Rural Affairs M 1980 P.9)

It was recognized that in Britain and United States administration of urban planning falls into two major classes as:

1. Central Authority
2. Local Authority

2.1.1 Central Authority:

2.1.1.1 Central Authority: Britain:

In Britain Central Authority is the Secretary of State (Minister) for the environment. Minister for the Environment is ultimately responsible to parliament for government policies relating to all matters of planning and development control. (Heap 1987). Duties of the Minister for Environment related to planning and development control can be summarized as follows: (Telling 1973)

a. Making of Regulations:

The Ministry for Environment delegates powers to local authorities to execute policies concerning urban development. The Minister also has the power to enforce regulations and clarify legislation which was issued by the Parliament in the form of statutory instruments. According to Telling "the law of town and country planning is to be found not only in various acts of Parliament but also in orders and regulations made by the Minister of the Crown in the form of statutory instruments relevant to planning". (Telling 1973)

b. Approval:

Some actions do not come into force unless approved by the Minister, such as structure plan, tree preservation orders, and orders establishing areas of special control for outdoor

advertisements.

c. Appeals:

People could appeal to the Minister against the local planning authority, for example, refusing planning permission.

d. Powers of Direction:

"In some cases the Minister may give directions either of a general or a particular nature". (Telling 1973).

e. Default Powers:

"If the Minister considers that a local planning authority have failed to fulfill some function..., he may himself take action". (Telling 1973).

f. Claims for Compensation:

"Claims for compensation... for refusal of planning permission or for conditions attached to a planning permission are dealt with by the Minister". (Telling 1973).

2.1.1.2 Central Authority: United States of American:

The formal structure of U.S. system of land use controls differs from the British system due to the different distribution of legal and political powers among

various levels of the government. Under American system of government, land use planning and controls are the domain of local government under powers delegated by the state. The control authority is the state but there have been few federal laws relating to land use controls. In United States, no formal review and adoption of city and metropolitan plans is usually required by any unit of the government except the city metropolitan council or the county involved. (Clawson and Hall 1973)

2.1.2 Local Authorities:

Local authorities are ultimately responsible to the central authority (Minister for Environment in Britain and the State in America) for the execution of the governments policies relating to all matters of planning and development control. (Heap 1987, Clawson and Hall 1973)

2.1.2.1 Local Authorities: Britain:

Local Authorities in Britain are sub divided into the following:

1. Shire Countyes
 - a. Shire Countyes Council
 - b. Shire District Council
2. Metropolitan Countyes.

The Shire County Council according to British law, shall be the county planning authority for the whole country. This authority will be responsible for the

preparation of the structure plan and grants or refuses planning permission for development to the county matters (see diagram 2.1). Planning law in Britain stated that the Shire Districts Council shall each be the district planning authority for their own district. This authority will be responsible for the preparation of local plans and will grant or refuse planning permission for development except as to county matters (see diagram 2.1).

Metropolitan County according to planning law in Britain shall be the planning authority for their own districts. This authority will be responsible for the preparation of the unitary development plan and grants or refuses planning permission for development in respect of Metropolitan County (see diagram 2.1). (Heap 1987)

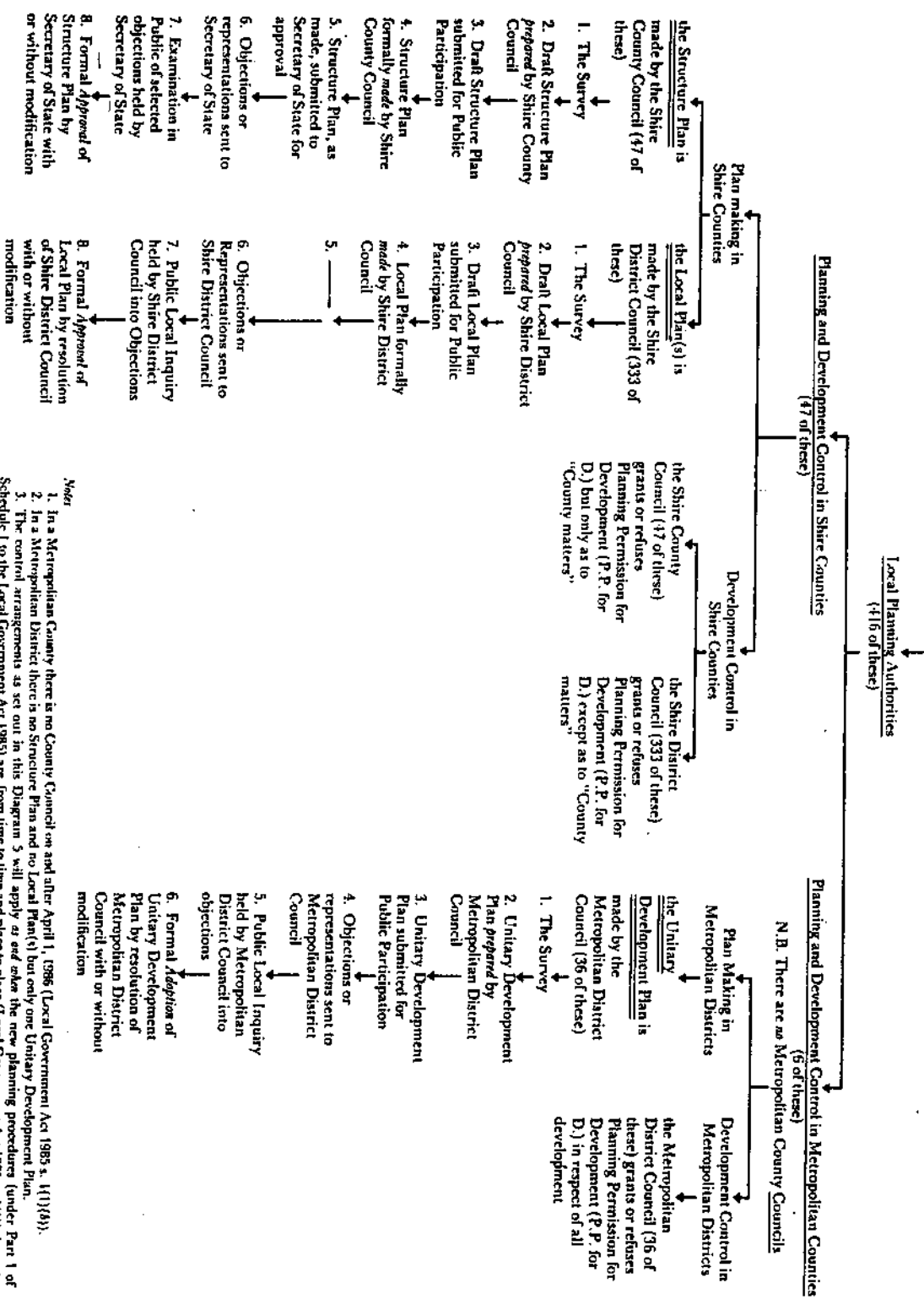
2.1.2.2 Local Authorities: United States of America:

In the United States, local authorities are granted powers of land use controls by the states but the level of application of those powers at the local level is different. Some rural counties may do nothing; others may be engaged in limited planning and land use controls, still others, mostly larger cities, are likely to have developed planning controls with qualified staff.

DIAGRAM 2.1 DIAGRAM SHOWING ARRANGEMENTS FOR TOWN AND COUNTRY PLANNING AND DEVELOPMENT
 CONTROL IN ENGLAND AND WALES (OUTSIDE GREATER LONDON)
 Source: Heap 1987

ON AND AFTER APRIL 1, 1986 BUT FOLLOWING THE
 MAKING OF A COMMENCEMENT ORDER BRINGING INTO FORCE (IN ANY
 PARTICULAR AREA) PART I OF SCHEDULE 1 TO THE LOCAL GOVERNMENT ACT 1985.

The Secretary of State for the Environment, the Government Minister ultimately responsible to Parliament for Government Policy relating to all matters of planning and development control.



Note

1. In a Metropolitan County there is no County Council on and after April 1, 1986 (Local Government Act 1985 s. 4(1)(a)).
2. In a Metropolitan District there is no Structure Plan and no Local Plan(s) but only one Unitary Development Plan.
3. The control arrangements as set out in this Diagram 3 will apply as and when the new planning procedures (under Part 1 of Schedule 1 to the Local Government Act 1985) are, from time to time and place to place (Local Government Act 1985, s. 4(1)), brought into force . . . by an order made by the Secretary of State . . .

This has led to a greater degree of variability in land use planning and planning controls in the United States. (Clawson & Hall 1973, International City Manager's Associations 1948 P.21, International City Management Associations 1979, Goodman 1968)

In the United States, local authorities comprise of the legislative body and the planning commission.

The legislative body ultimately makes the decisions necessary to carry out public improvements and coordinate private development.

The legislative body is elected by and answerable to the citizens. The legislative body has the advantage of being a pluralistic body, encouraging the consideration of a variety of views on any issue, formulates the long range policies to guide physical development. It has the authority to give final approval to the comprehensive plan, zoning ordinance and land subdivision regulations. (Goodman 1968). The planning commission is responsible for the following responsibilities:

1. Prepare and adopt a master plan.
2. Prepare and adopt planning regulations and pass land sub division plats.
3. Prepare a zoning ordinance.
4. Prepare an urban redevelopment program.

5. Prepare mapped street plans and an official map.
6. Report on planning problems that are referred to it for review by the chief executive or legislative body of the city.
7. Prepare such surveys, reports and studies as are required for the above and other authorized planning purposes. (International Manager's Associations 1948 P.41-42).

In some cases, in addition to planning commission, zoning commission is also given the responsibility of formulating, zoning ordinance. This is a wasteful duplication of responsibilities. (Goodman 1987)

Operative Agencies of the Comprehensive Plan:

The implementation of the comprehensive plan is not only the responsibility of the municipal government but also a large number of line departments like public works, urban renewal, utilities, police, fire and libraries. Other local public agencies like school boards are also involved directly or indirectly in the physical development. The comprehensive plan helps in coordination and cooperation among those departments. (Goodman 1968).

2.2 Development Plans:

Development plans are the second main aspect in the field of urban planning legislation. The purpose of the development plan is to present the policies and proposals designed to achieve the stated planning aims for the area. This aspect will be discussed as follows:

2.2.1 Development Plans: Britain:

1947? The Town Planning code in Britain started with the enactment of town and country planning act 1969, which was amended and consolidated many times. This code initially introduced the concept of master plan. (Heap 1987)

The town planning code in Britain developed further with passage of time and experience. In the beginning planning machinery was created for the preparation and implementation of master plans. But later the authorities felt that the old system of plan preparation and implementation was too slow and rigid. By the time master plan was ready it was an outdated document, because society was experiencing fast changes and the system of data collection and plan preparation was lengthy.

1968 The town and country planning act 1947 made drastic changes in British Planning Control system and introduced the concept of structure plans. (Clawson and Hall 1973)

Development plans in Britain now comprises of two main levels as: (Garner 1975, Telling 1973, Hamilton 1975, 1982, Cullingworth 1978, 1982, Mckown 1973, Grant 1982, Heap 1973, 1987, Purdue 1977, Beaumont 1973, Encyclopedia of Halsbury's Statutes of England 1971, Encyclopedia of Halsbury's Laws of England 1984, Keeble 1969, Ministry of Housing and Local Government 1970)

1. Structure Plan
2. Local Plans

2.2.1.1 Structure Plan:

Structure Plan mainly brings before the Minister of Environment, the planning authority's intentions for their area over the next twenty to thirty years. The functions of the structure plan can be summarized as follows:

1. Interpreting national and regional policies.
2. Establishing aims, policies and general proposals.
3. Providing framework for local plans.
4. Indicating action areas.
5. Providing guidance for development control.
6. Providing guidance for coordination decisions.
7. Bringing before the minister and public the main planning issues and decisions. (Ministry of Housing and Local Government 1970 P.19)

In Britain, planning legislation usually discuss four major aspects under the structure plan. These aspects are as follows:

1. Preparation and approval of structure plan.
2. The structure plan documents.
3. Periodical review of the structure plan.
4. Alteration, repeal or replacement of a structure plan. (Heap 1987, Ministry of Housing and Local Government 1970, P.25-32)

1. Preparation and Approval of Structure Plan:

Planning legislative body in Britain delegated the power to the local planning authority to prepare the structure plan for its area. Procedures for the preparation and approval of the structure plan are as follows: (Heap 1987, Telling 1973 P.64-68)

a. Instituting the Survey:

Local Planning Authorities were asked to carry out surveys of specific aspects to be used for structure plan. British planning law stated that the survey must consider the following aspects:

- i) The principal physical and economic characteristics of the area of the authority.

ii) The size, composition and distribution of the population of that area;

iii) Without prejudice to paragraph (i) above, the communications, transport system and traffic of that area and, so far as they may be expected to affect that area, of any neighbouring areas;

iv) Any consideration not mentioned in any of the foregoing paragraphs which may be expected to affect any matters so mentioned.

v) Such other matters as prescribed or as the Secretary of State may in particular case direct;

vi) Any changes already projected in any of the matters mentioned in any of the foregoing paragraphs and the effect which those changes are likely to have on the development of that area or the planning of such development.

b. Prepare Draft Structure Plan:

Having made a survey of their area the next duty of the county planning authority as stated in the British planning law is to prepare the draft structure plan.

c. Draft Structure Plan submitted for public participation.

- d. Structure plan formally made by county planning authority.
- e. Structure plan as made, submitted to Secretary of State for approval.
- f. Objection or representation sent to Secretary of State.
- g. Examination in public of selected objections held by Secretary of State.
- h. Formal approval of structure plan by Secretary of State with or without modification.

2. Structure Plan Documents:

British Planning law has required local authorities to prepare the documents of structure plan consisting of written statements and diagrams. Written statements are used to express the long range policies, while diagrams are used to explain or illustrate the proposals in the written statement. (Heap 1987, Telling 1973 P.51-57, Ministry of Housing and Local Government 1970 P.25-35)

3. Periodical Review of Structure Plan:

Local Planning authorities were required to review the structure plan for their area periodically. The idea behind this review is to update the structure plan. Under British Planning legislation, local planning authorities are required to carry out a fresh survey within five years of the Minister's approval of the structure plan. A report of the survey had to be submitted to the Minister together with proposals for such amendments to the plan as deemed necessary. The procedure for the review of structure plans will be the same as discussed earlier under the preparation of the structure plan. (Heap 1987)

4. Alteration, Repeal or Replacement of a Structure Plan:

Since policies in the structure plan are stated in broad terms, allowing for some freedom in the way the detailed implications are worked out, therefore, according to British planning legislation, at any time after a structure plan has come into operation the local planning authority may submit to the Secretary of State proposals for alterations to the plan and they must submit such proposals if required to do so by the Secretary of State. (Heap 1987).

premises, a special consent has to be obtained from the Department of Trade and Industry before the application can be considered. (Garner 1975, P.184-185, Heap 1987)

The Planning Authority on the receipt of documents can decide one of the following:

1. Unconditional Permission
2. Conditional Permission
3. Refusal. (Garner 1975 P.185)

3. Appeals:

In case an authority refuses the application or grants it subject to conditions, the applicant has the right to raise an appeal to the Minister, then to the High Court, if the applicant was not satisfied with the Minister's decision. (Heap 1987, Garner 1975 P.186)

4. Enforcement:

In case any person carries out illegal development the local planning authority may serve an enforcement note requiring demolition of the building.

The person who is served with such note may appeal to the Secretary of State, and further to the High Court on a point of law. (Garner 1975

Any proposals for alteration or for repeal and replacement of a structure plan must be accompanied by an explanatory memorandum summarizing the reasons of the local planning authority justifying the alteration or the replacement of the plan. (Heap 1987)

The procedure for the submission and approval of structure plan, discussed above (PP.29-31), applies also to the alterations or repeal and replacement of a structure plan.

2.2.1.2 Local Plans: Britain:

Local plans are the second level of development plans for Britain. The major functions of local plans as stated by British Planning legislation can be summarized as follows: (Ministry of Housing and Local Government 1970 P.40)

1. Applying strategy of the structure plan in detail.
2. Providing detailed basis for development control.
3. Providing basis for coordinating decisions.
4. Bringing before the public detailed planning issues and decisions.

In Britain, local authorities were required to prepare the local plans into three different kinds of plans as follows:

- a. District Plans
- b. Action area Plans
- c. Subject Plans.

a. District Plans:

In addition to the above mentioned functions of local plans, action plans have three more functions as follows:

1. In general, to set the planning policies for each area or district to restate and amplify the long term planning intentions of the structure plan, to describe specific proposals and to lay down development control criteria.

2. In urban areas, to apply the structure plan policies for environmental planning and management.

3. In rural areas, to apply the structure plan policies for managing the rural environment.

(Ministry of Housing and Local Government 1970 P.47-53).

b. Action Area Plans:

In addition to the above mentioned functions for local plans, action area plans inform the public about the local planning authority's intentions, advise property owners how they will be affected and indicate to developers where the opportunities are.

Action area plan may involve new development, redevelopment, improvement or a combination of these.

As discussed in the British planning legislation, action area plan can be prepared for any area where comprehensive treatment of this kind is to be commenced within the period of ten years. (Telling 1973, Ministry of Housing and Local Government 1970 P.55-58)

c. Subject Plans:

There might be some urgent matters requiring the development of detailed local policies, which cannot be fitted in the time tabling of district plans. In such a matter subject plan will develop a particular structure policy in advance of a comprehensive district plan.

Local plans consist of four major aspects as:

1. Preparation and approval of local plans.
2. Local plans documents.
3. Review of the local plans.
4. Alteration, repeal or replacement of local plans.

(Heap 1987)

The above mentioned aspects will adopt the same procedures as were discussed under the structure plan, except the approval will be by the local planning authority.

2.2.2 Development Plans: United States of America:

Development plans according to American Planning legislation are different from British development plans. America has only one level of development plan named as "Comprehensive Plan".

"The Comprehensive Plan is an official public document adopted by a local government as a policy guide to make decisions about the physical development of the community" (Goodman 1968).

Four major aspects were required by the legislation under a comprehensive plan such as:

1. Preparation and approval of the comprehensive plan.
2. Comprehensive plan documents.
3. Periodical review of the comprehensive plan.

4. Review of the comprehensive plan after five to ten years.

5. Amendment of the comprehensive plan at any time.

2.2.2.1 Preparation and approval of the comprehensive plan:

1. There should be one official comprehensive plan, to avoid confusion and inefficiency that would result from multiple plans.

2. The plan should be formally adopted by the legislative body, details of which are already discussed under 2.1.2.2. It gives a degree of stability to the plan, so that it is not changed prematurely.

3. There should be a lengthy period of public debate prior to adoption. This period of public debate is held prior to adoption. Provides opportunity for citizen participation.

4. "The plan should be available and understandable to the public. It should be published and furnished to any one who requests it, preferably free of charge. The plan should be complete and self-explanatory, while still being as concise, interesting and attractive as possible. It should not be abstruse, but should be comprehensible to the average citizen."(Goodman 1968 PP. 367-368).

5. The plan should be formulated so as to capitalize on its education potential. This should correct the aims of the Planning Commission and staff.

6. The plan should be amendable. The plan should be kept up to date which means the plan should be flexible and adequate to the existing situation. (Goodman 1968 PP.367-368).

2.2.2.2 The Comprehensive Plan Document:

Planning legislation in most countries require certain form and content of document for the development plan. Planning legislation requires that the comprehensive plan should be supported by a large drawing showing the general physical design proposed for the entire community, written text, and whatever maps, illustrations and tables are needed, to support the text. (Goodman 1968 PP.371)

2.2.2.3 Periodical Review of the Comprehensive Plan:

Once a year the legislator should re-examine the plan and consider amendments. This is the main process which is intended to assure that the plan will be kept upto date. (Goodman 1968 PP.368-370)

2.2.2.4 Review of the Comprehensive Plan after five to ten years:

Planning legislation requires that the comprehensive plan should be reviewed after five to ten years from its adoption. New surveys, updated forecasts, and re-study of major alteration should be carried out. The effort should be similar to that put into the original plan, and the same general procedures should be followed including a period of

debate before adoption. A new plan document should be published and the old one replaced. (Goodman 1968 P.368 - 370)

2.2.2.5 Amendment of the Plan at any time:

Planning legislation empowered local authorities to carry out annual review of the comprehensive plan, it is not meant to preclude amendments at other times. During the normal use of the plan, new things will appear. Therefore, local planning authorities were empowered to amend the plan immediately to keep the plan current. (Goodman 1968 PP.368 -370)

2.3 Development Control:

Control of the development is the third main category in the field of urban planning legislation. The control of the development consists of a number of tools to implement the development plans.

2.3.1 Development Control: Britain:

The urban development in Britain is mainly controlled by two basic tools, planning permission and compulsory acquisition.

They will be discussed as follows: (Heap 1987, Telling 1973, Garner 1975, Grant 1982, Cullingworth 1978, 1982, Mckown 1973, Hamilton 1975, Purdue 1977, Beaumont 1973, Encyclopedia of Halsbury's Statutes of England 1971,

Encyclopedia of Halsbury's Law of England 1984)

2.3.1.1 Planning Permission:

No development may be carried out prior to permission obtained from the local planning authority.

British Planning legislation discusses the planning permission according to the following classes:

1. Meaning of the development
2. Application for planning permission
3. Appeals against the local planning authority or Secretary of State.
4. Enforcement of the development.

1. Meaning of the development:

To know the kind of development that has to obtain the planning permission, planning legislation in Britain identified the development as "the carrying out of building, engineering, mining or other operations in, over or under land, or the making of any material change in the use of any building or land" (Garner 1975 P.184).

2. Application for Planning Permission:

A developer should apply first to obtain the planning permission from the concerned planning authority with all required documents. If the applicant contemplates an industrial use of the

P.186-187)

2.3.1.2 Compulsory Acquisition of Land:

According to British Planning legislation compulsory acquisition is considered as the second tool to control the urban development and implement the development plans.

This tool was discussed by British Planning legislation as follows: (Heap 1987)

1. Powers as to compulsory acquisition of land.
2. Compensation payable on compulsory acquisition of land.
3. Appeals.

Following is a detailed discussion of each of the above mentioned aspects under the compulsory acquisition.

1. Powers as to Compulsory Acquisition of Land:

The Local Planning Authorities may be authorized by the Secretary of State to acquire land compulsorily for planning purposes so as to implement a scheme of development or redevelopment or where it is considered expedient to acquire land in the interest of the proper planning of the area. (Heap 1987)

2. Compensation Payable on Compulsory Acquisition of Land:

Under this title, planning legislation in Britain discusses procedures on how to calculate the value of the compensation to be paid for the acquired land and on which basis this calculation will be followed. (Heap 1987)

3. Appeals:

If the land owner has an objection to the resolution of the local planning authority's action toward the acquisition of his land or the amount of compensation, the land owner can lodge an appeal to the Secretary of State and further more to the High Court. Final decision toward the compensation will be decided by the Land Tribunal. (Heap 1987)

2.3.2 Development Control: United States:

Urban development and implementation of the development plans mainly depend on the following basic tools: (Goodman 1968, Patterson 1979, International City Manager's Association 1948, Gallion and Eisner 1975, Catanese and Snyder 1979)

1. Zoning Ordinance
2. Land Subdivision Regulations
3. Building Regulations
4. Compulsory acquisition of land.
5. Levying Taxes

6. Financial Planning and Capital Improvement Programming.

Following is a detailed discussion about each of the above mentioned tool.

2.3.2.1 Zoning Ordinance:

Zoning as discussed by American Planning legislation consists of the following aspects: (Patterson 1979, Goodman 1968)

- a. Nature and characteristics of zoning ordinance.
- b. Preparation and adoption of zoning ordinance.
- c. Documents of zoning ordinance.
- d. Amendment of zoning ordinance.

Following is a detailed discussion about each of the above mentioned aspects:

a. Nature and Characteristics of Zoning Ordinance:

Zoning as defined by T. William Patterson (1979) provides for the division of a local government unit in the districts by categories of allowed and/or prohibited land uses. Within the districts, zoning regulates the height and bulk of buildings and other structures, minimum lot sizes, the amount of open spaces, and requirements for such uses as parking and off street loading etc.

Zoning came into force as a result of a U.S. supreme court ruling in 1926 that police powers could be used by the authorities to eliminate a misuse. Ever since the police powers are used to frame legislation for protecting health, safety, morals and general public welfare. Zoning ordinance must prove to be a reasonable exercise of the police power, or they risk coming in conflict with the due process. Under American system of government land use planning and planning controls are the exclusive right of the local government, under powers delegated by the states. (Patterson 1979)

Zoning was not originated as a tool for planning, but planners have tried to use it for implementing plans with mixed results. In fact many states require zoning to be based on a comprehensive plan. (Goodman 1968, Patterson 1979)

With all the limitations zoning is the most powerful tool of control of development in the field of planning.

b. Preparing and Adopting the Zoning Ordinance:

American Planning. Legislation enacts local planning authorities to prepare the zoning ordinance through following procedures: (Goodman 1968 P.404-413)

i) Gathering Necessary Information:

Most necessary information to be collected and analyzed by the planning commission shall be as follows:

1. The existing use of every piece of property within the city.
2. The terms of restrictive covenants applying to large sections of the city.
3. The location and capacities of all utility lines and major streets.
4. The assessed valuation of properties in different section of the city.
5. The location of all new buildings erected during the past five years.
6. The location and characteristics of all vacant land in the city.
7. The width of streets.
8. The size of front, side, and rear yards.
9. The heights of buildings.
10. The dimensions of lots.
11. The number of families in each dwelling.

ii) Preparing a Tentative Ordinance:

The tentative ordinance will consist of two parts: a map delineating the various districts or zones within the city, and written regulations controlling the manner in which property may be used in each of these districts.

iii) Hearing on the Tentative Zoning Ordinance:

American enabling act require the planning or zoning commission to hold public hearings prior to the adoption of an ordinance in order to meet the citizen's views.

iv) Adoption and Final Steps:

After holding various number of public hearings and doing all kind of amendments to the ordinance, it will be approved by the city council and then by the mayor.

c. Documents of the Zoning Ordinance:

Zoning Ordinance are generally made up of two parts: a map showing the boundries of the various zones or districts within the locality, and written regulation which explain the ways in which property within each district may be developed and used. The map and the regulation have to be prepared in a closely coordinated way. (Goodman 1968 P.409, Patterson 1979)

d. Amendments of the Zoning Ordinance:

A city is a dynamic entity; it does not stop in one situation. It's activities, social and economical values are always changing. Therefore, enabling act in United States of America requires the planning or zoning commission to undertake complete revision of the ordinance every five years and whenever needed to keep the ordinance

upto date. The procedure for the submission and approval of zoning ordinance as discussed above applies also to the amendments of a zoning ordinance. (Goodman 1968 P.419)

2.3.2.2 Land Subdivision Regulation:

Land subdivision regulations is the second major tool used by American planning legislation to implement the development plans. It is the process of transforming the open land into streets and blocks of lots.

Land subdivision regulations primary objective is to assure that subdivided land will constitute a permanent asset to the community and will provide the maximum degree of health, comfort, convenience and beauty with true economy.

Subdivision regulation like other laws governing the use of property are an exercise of the so called police power of state and local units of government (Goodman 1968 P.446-447).

Purpose of land subdivision regulations can be summarized as follows: (Patterson 1979)

1. To insure the provision of safe water supply and an adequate sewage disposal system.
2. Providing records of properties to the need for re-assessment.

3. Insure the provision of good design and adequate construction of streets, drainage, and utilities.
4. To insure the provision of adequate fire fighting water and vehicle access.
5. To insure that the new development will be supplied by different land uses based on proper planning standards.
6. Developers will insure that the subdivision will be homogeneous with other subdivisions.
7. Buyers will insure that their property are adequate to erect building on them with in a well planned area.

In United States planning legislation usually discusses the following aspects under land subdivision regulations: (Goodman 1968)

a. Design Standards:

Most regulations in most countries tell that the subdivision should go parallel with the master plan. Also the regulations should not become limited to the standards only but also should indicate locations that subdivisions has prohibited, for example "the general provisions may specify where in the locality subdivision is altogether prohibited of adverse soil, subsoil, or flooding conditions which are potential health or safety dangers, compliance with the general land use plan and provisions for coordination with adjacent development specially in regard to

streets and utilities" (Patterson 1979 P.101)

In addition, design standards discuss all regulations about streets, blocks, utilities easement, lots, public services, planned unit development, special subdivision of commercial and industrial zones, subdivision of lands on a hilly steep and valley areas, water front etc. etc. (Patterson 1979 P.101, Allam 1986 P.110-150)

b. Improvement Requirements:

In some countries, the developer is committed to construct the infrastructure and street pavement. Therefore, under this element usually all required regulations are discussed. (Goodman 1968, Patterson 1979)

c. Procedures for the preparation of the plats: (Patterson 1979 P.99-110)

1. Preliminary Plat or Plan:

After the preparation commences, the subdivider submits a preliminary plats or plan for approval by the planning commission or other agency charged with administering the subdivision regulation. The regulations usually describe in detail the informations required on this plan. For example, the required format and materials, legend informations, designation of easements and

public areas, boundries, ownership of adjacent property, contours, areas subject to flooding, proposed land use, key map, and title block. (Goodman 1968, Patterson 1979)

According to the requirement of law the preliminary plan must be submitted with a sufficient number of copies so that all the interested agencies will have an opportunity to review the plan and comment on it as it affects them. These include the locality's directors of public works or engineers, the works department, school board, public health department and other relevant agencies.

2. Construction of Improvements:

The planning legislation states that the developer is required to construct the agreed upon necessary improvements (infrastructure) in the time span between the approval of the preliminary plan and approval of the final plats.

3. Fees:

According to the law the developer is required to pay the fees for the expenses of checking both the plats submitted and the construction work.

4. Final Review and Adoption of the Plat:

At this stage, the intention is to assure that the recorded plats will be in accordance with the plans approved earlier and that construction has taken place in accordance with such plans. Usually the regulations provide for its submission in approximately the same manner as was required for the (preliminary) plats, with adequate time and number of copies for distribution to the interested departments who made recommendation earlier.

d. Periodical Review of Landsubdivision

Regulations:

Legislation in most countries state that the land subdivision regulations must be reviewed from time to time in order to cope with the future changes (Allam 1986 P.149-150)

2.3.2.3 Building Regulations:

Legislation aims to control building and housing on the basis of standards codes, for the sake of safety, health and comfort. In addition, these codes with the cooperation of zoning and subdivision regulation will help in implementing the master plan.(Patterson 1979 P.133). In the industrial countries building codes are separated from the housing codes, while in the developing countries both are combined in one law, called the building regulations

law. (Allam 1986 P.183)

a. **Building Codes:**

Building codes are designed primarily to insure that buildings will be safe and healthy for human occupation. They are applied mainly at the time of construction; they also may be applied to derelict or unsafe structures which need to be condemned. (Patterson 1979 P.144) For a better guidance, building codes should satisfy the following: (Patterson 1979 P.116-122)

Adequacy: Building codes should be adequate to the existing situation, which means they should be up-dated up-dated and periodical reviews should be held. According to Patterson "Obsolete code requirements exist where there is no institutionalized way of updating the codes". (Patterson 1979).

Also, the Advisory Commission on Inter-Governmental Affairs recommended on the research called 'to remedy the problems in regard to the building codes'. They recommended "..... appropriate permanent machinery for keeping the code revised and uptodate". (Patterson 1979).

Flexibility: Building codes should be flexible. This is possible by the "elimination of arbitrary registrations which add unnecessarily to the cost of construction and the price to the buyer". (Patterson 1979).

Clarity: Building codes should be clear and consistent, otherwise many problems will occur as Patterson stated (1979): "If the provisions of a code are not clear, or the interpretations of it by the building department are arbitrary or in doubt, there may have to be costly revisions of construction plans before a building permit can be obtained, and/or delays on the job caused by the building inspector where the building regulations involve a collection of codes applicable to various aspects of construction rather than a single integrated code there is likely to be overlapping and conflicting requirements causing confusion and inefficiency in administration". (Patterson 1979).

Comprehensiveness: Building codes cannot satisfy the aims unless they are comprehensive. Also, building and other codes altogether will comprise of comprehensiveness. As to Patterson "the full benefits of a comprehensive building construction code cannot be realized unless

construction aspects of mechanical (i.e. plumbing, electrical, elevator), fire and special-use (factories, hospitals, hotels, theatres, etc.) codes are integrated within the requirements of a single building construction code". (Patterson 1979).

b. Housing Codes:

"Housing codes differ from building codes in that they are designed to be applied to housing already built for as long as it can be occupied. They are intended to insure the continued safety and healthfulness of buildings for human occupation". (Patterson 1979 P.122)

What was stated about building codes for adequacy, clarity, flexibility and comprehensiveness could also be said for the housing codes.

c. Health and Sanitary Regulations:

In addition to building and housing codes, health and sanitary regulations are having some influence on urban development patterns. In the United States health and sanitary regulation are usually adopted at the state rather than local level and administered by the state or a local governmental unit acting as an agent of the state.

In the United States, subjects covered by these regulations may include air pollution, sewage disposal, water supply, public and private swimming pools, restaurants and food services, and certain classes of housing such as hotels, motels, rooming houses and mobile home parks. Since these regulations are adopted at the state level, zoning regulations need to take these codes into account in order to avoid conflicting. (Patterson 1979).

As a conclusion of previous discussion on Building Codes (Regulation) it can be recognized that the codes might be prepared and classified into the following major classes.

1. Architectural
2. Structural
3. Plumbing
4. Mechanical
5. Electrical

2.3.2.4 Compulsory Acquisition (Power of Eminent Domain)

It is the power to take land for public purposes with just compensation.

Central authority delegates this power to the local authority and in few countries like the United States delegate this power to few companies such as the Railroads

Company which is given this power in order to secure right-of-ways.

It is obvious that land development would be easier if the land was possessed by the State. Individual property is an obstacle to land development. However, the State has a right to acquire land for the public interest. By all means, the use of Eminent Domain, however, is usually avoided whenever it is possible to negotiate purchasing because it tends to create adverse public reactions. (Patterson 1979 P.22)

2.3.2.5 Levying Taxes (The Taxing Powers)

The tax policies of governments influence directly or indirectly the pattern of urban development and may have some potential for aiding the implementation of land use plans. Although tax policies are primarily designed to raise money for the financing of Government spending. In most countries the central authority enables the local authority the power to levy taxes in order to provide revenues for municipal services. Local taxes and tax policies have been little used directly as planning tools. Therefore, an increasing amount of discussion by planners and other professions concerning more direct role of the taxing power to guide the urban development.

Method of taxation that have been tried out include: property tax, land transactions/transfer tax, municipal income tax, price and sale control, infrastructure charges, taxation based on a development scheme. (Patterson 1979, Al Rahman 1985 P.45)

2.3.2.6 Financial Planning and Capital Improvement

Programming:

Financial Planning and Capital Improvement Programming in many countries are also one of the most important tool to implement the development plans. Financial planning insures that there will be enough money for financing operational and capital budgets. Their concern about the operational budgets includes the financing of planning process and the economic and social programmes which are part of the comprehensive plan. (Patterson 1979)

2.4 Planning Legislation: Anglo American Comparison

On the basis of previous discussion of Anglo American experience in planning legislation, we can come up with the following comparison to shed light on the major similarities and differences and the overall characteristics of the planning legislation system. (see table 2.1, 2.2)

Reviewing the details of both classification systems, it was found that urban planning legislation in both countries have the following features:

1. In Britain the urban planning legislation emphasize centrality where urban planning mostly conducted by central level.

2. While in United States, planning legislation emphasize decentrality, where planning mostly conducted by local authorities and this reflect the administrative structure of both countries.

3. Urban planning legislation in both countries considered to be comprehensive, which means covering the full spectrum of urban planning legislation. However, looking at the details of both systems, we find Britain is more comprehensive in term of development plans. Where it consist of various levels of plans, as structure plans, local plans, district plans, action area plans and subject plans. While United States is comprehensive in development controls, where more tools are used to control the development such as, zonning, land subdivision, building codes, acquisition and leving taxes.

4. In terms of procedures, it was found that planning legislation in Britain tend to be specific, where in United States planning legislation tend to be general.

5. Lastly citizens participation is considered in both countries.

Table 2.1 Similarities and Difference of Anglo-American Planning Legislation.

BRITAIN	UNITED STATES OF AMERICA
<p>1. Under town and country planning act 1947 and its subsequent revisions the Secretary of State for Environment has powers of wide nature and the whole system of plan preparation and development controls is centralized where there is greater degree of centralized monitoring and approval under British System.</p> <p>2. Local authority plans have to pass many hurdles:</p> <ul style="list-style-type: none"> a. Authorities planning committee. b. Approved by full council. c. Minister for planning. d. Public objections. e. Degree of centralized control was considerable till 1968. f. Ministers approval only needed for structure plans not for local plans. <p>3. Under Town Planning act 1947 (modified in 1968) it is specified that the development plan and each subsequent revision of it show all proposals of different authorities including other agencies or departments within the local</p>	<p>1. Plan preparations and development controls are under the system of decentralization, where local authorities are fully responsible for plan preparation and development controls, where there is greater degree of variation in plan preparation and approval procedure.</p> <p>2. No formal review and adoption of city or metropolitan plans is required by any unit of the government, except city or metropolitan council or county involved. State governments do not review or approve such plans until the local government unit arranges funds for the purpose.</p> <p>3. The city or metropolitan plan should guide the actions of its government. The extension of public services of all kinds should be in conformity with the general plans, highways roads, streets, parking areas should be based on the plan.</p>

BRITAIN

authority itself. Thus potential conflict between departments of the authority and between authority and other agencies are avoided in county boroughs and in counties. The local authority is also simultaneously the planning authority, education authority, highway authority the main drainage authority also housing authority; so there is no potential danger of any conflict like in American system.

4. The plans developed and approved by the general body are effective only within the area of the local authority. The land use plan can not be extended to adjoining areas.

British cities have the power under 1952 town development act to locate their public housing in other local government units beyond their boundaries but only by agreement.

5. The boundaries are clearly defined for the local planning authorities and there is no contradiction.

UNITED STATES OF AMERICA

In this area there is lot of contradiction. Relationship between physical planner and limited function planner are in conflict. The engineer may have his own idea about highways or sewer lines location and size, and he is able to persuade the general plan is either modified or thrown out. This leads to a lot of contradictions and conflicts.

4. Usually the limits of the planning area of a local authority are the boundaries of the local authority involved. In some limited cases some cities do have some zoning power beyond their boundaries.

5. The legal city no longer conforms to physical city. The cities have extended multiplying the problems in terms of provision of infrastructure. To control development legal city is forced to act in ways that would not be rational, if only the problems of urban areas are attached ignoring the rural hinter-land.

BRITAIN

6. All different level councils are elected and are more representative from citizen's participation point of view.
7. City or metropolitan plans should be based on statistical information about past trends in population, employment, manufacturing output income, transportation and projection on future trends.
8. Plan in Britain have been more standarized than the corresponding plan in U.S. from 1947 onward.
9. Plan making and development control are linked together and is carried out by the same staff.
10. The 1947 act gives right of appeal to develop against exercise of development control just as it does against original formulation of development plans. Here

UNITED STATES OF AMERICA

6. In United States citizen planning boards usually exist with appointed members nominated by the Mayor.
7. Plans will also be based on similar information as in case of Britain.
8. Procedure for submitting plans and for revising them is described to the planning agency, while details of the plans form were left for the decision of the planning commission. This reflect the fact of decentralization.
9. Planning and zonning are two separate steps; zoning maps and ordinance are prepared separately and may not be based on the plan.

In many cases zoning action is taken without a plan or contrary to the plan. In more than two third local government agencies planning staff is also the zoning staff.
10. All zoning ordinances provide for a board of zoning appeals or adjustments. Without a board of zoning appeals the administration of a zoning ordinance would be practically impossible.

BRITAIN

the procedure is not Judicial but quasi judicial. The appellant has not automatic right to appeal to a court, he has to seek permission for appeal from the Minister, the Minister will decide that a public inquiry should be held.

11. The system of land use controls is the result of Town and Country Planning Act 1947, under which the right to carry out development by the owners, was nationalized.
12. According to the definition of the structure plan it is the regional plan, where structure planning authorities are advised by central government to consider the regional framework and frame their own policies in a regional context (GLASSON 1978). Therefore, development plans concern the regional level and hence can be named regional plans and local plans.

UNITED STATES OF AMERICA

If a building commissioner refuses to issue a building permit or certificate of occupancy, an appeal against his decision can be made to board of zoning appeals.

11. United States acquired its system of land use controls and zoning through a crucial court decision in 1926. The American system of land use controls relies on police powers, power of eminent domain and the due process.
12. The comprehensive plan is concerned with the local urban area, while the comprehensive plan in the United States will be as the District plans from the local plans in Britain. Therefore, it can be recognized that United States have the comprehensive plan as the development plan in the local level.

Table 2.2 Overall characteristics of Anglo-American Planning Legislation.

BRITAIN	UNITED STATES OF AMERICA
<p>1. <u>Centralization:</u> The system of land use controls in Britain is centralized.</p> <p>2. <u>Comprehensiveness:</u> In terms of types of plans and development control the system of planning legislation in Britain is comprehensive.</p> <p>3. <u>Specificity:</u> More specified and standardized nature of planning legislation in Britain has given it a character of clarity of course with a little degree of inflexibility.</p> <p>4. <u>Citizen Participation:</u> Legislation stems from the society which it affects. Involvement of people in planning matters leads to better development control. In Britain at all stages of development citizen's participation is considered important.</p>	<p>1. <u>Decentralization:</u> The system of land use control in United States is decentralized and mostly the powers lie with local authorities.</p> <p>2. <u>Comprehensiveness:</u> In comparison with Britain the degree of comprehensiveness in United States is less in plan preparation and more in development control.</p> <p>3. <u>Generality:</u> The nature of planning legislation in the United States is more generalized. This generality has given it more flexibility character to cope with future changes.</p> <p>4. <u>Citizen Participation:</u> In the United States like Britain at all stages of planning citizen's participation is considered of paramount importance.</p>

2.5 PROPOSED CLASSIFICATION SYSTEM FOR SAUDI ARABIA

In light of the Anglo American experience and in view of the Saudi Administrative characteristics and existing urban planning practice, proceeding discussion will determine the necessary elements in the classification system for the planning legislation in Saudi Arabia.

2.5.1 Administration of Planning:

2.5.1.1. Central Authority:

In Saudi Arabia according to articles 18 and 44 of the constitution of the Council of Ministers of 1958, the president of the Council of Ministers shall be responsible to the King to ensure the direction, coordination and cooperation between the various Ministers. The Council of Minister possess regulatory, executive, and administrative authority. According to article 9 of the above mentioned constitution each Minister shall be regarded as the direct head and the final authority over the affairs of his ministry. This indicates elements of centrality in planning administration in the Kingdom. Therefore, it will be considered as an element in the proposed system of classification.

2.5.1.2 Local Authority:

Saudi Arabia is divided into fourteen administrative regions. Branches of most of the central Ministries are established in these regions to supply their services through affiliated local departments. However, the local authorities in the Kingdom have limited powers and they are mainly executive authorities. It is suggested to give wider powers to the local authorities in the Kingdom. Therefore, it would be of great value to assume the local authorities as one of the elements in the proposed system of classification.

2.5.2 Development Plans:

Previous practices emphasized master plans as the first level of local plans. However, the Deputy Ministry for Town Planning recently adopted the regional plans as the first. Moreover, the Ministry of Municipal and Rural Affairs is adopting the approach of national settlement plans. Therefore, this research, for the sake of being comprehensive, suggests that urban development plans may be broken into three types and levels:

1. National Settlement Plans. (National Spatial Strategy)
2. Regional Plans.
3. Master Plans. (Local Plans: Master Plan, Execution Plan and Action Area Plan).

This approach is viable with the centrality characteristics in Saudi Administration. Moreover, this research also suggests the adoption of the major procedural elements with consideration of the Saudi Administrative context.

2.5.2.1 Execution Plan and Action area plans:

In the Kingdom "Execution Plan" and Action Area plans are also in practice at the local level, which are comparable to British "Action Area plan" and "Subject Plan". This level of local plans will form an important element of the proposed system of classification for the Kingdom to achieve higher degree of comprehensiveness. It is also an important step for project planning.

2.5.2.2 Project Planning:

Project planning in the Kingdom of Saudi Arabia is a recognized aspect, where many physical projects are developed by different governmental agencies. Thus, the proposed system has to be in line with the existing practices in the Kingdom. Project planning is included as an element in the proposed classification system to secure better coordination among the various governmental projects.

2.5.3 Development Control:

2.5.3.1 Direct Development Control:

In the case of Britain and United States development control are more comprehensive, and specific in character which lead to clarity in the development control system in those countries. In the Kingdom, these elements have lesser degree of comprehensiveness and specificity which leads to confusion in effective plan implementation. Therefore, this research would strongly recommend to adopt the full spectrum of development control in the Anglo American experience. However, the administrative arrangement and procedures should comply and benefit from the Saudi conditions.

2.5.3.2 Indirect Development Control:

Although, government contribute significantly and heavily to physical developments (Public Work Projects, Housing Projects, Housing Mortgage, Land Distribution), indirect element of development control in the Kingdom is not utilized as formal part of development control system. Therefore, this research would include the indirect elements of development controls.

Based on outgoing discussion, the elements of the proposed classification system are outlined below:

1. Administration of Planning:

- A. Central Authorities.
- B. Local Authorities.

2. Development Plans:

A. National Settlement Plans.

- i. Preparation and approval of national settlement plans.
- ii. The national settlement plans documents.
- iii. Periodical review of the national settlement plans.
- iv. Alteration, repeal or replacement of national settlement plans.

B. Regional Plans.

- i. Preparation and approval of regional plans.
- ii. The regional plans documents.
- iii. Periodical review of the regional plans.
- iv. Alteration, repeal or replacement of regional plans.

C. Master Plan.

- i. Preparation and approval of master plan.
- ii. The master plan documents.
- iii. Periodical review of the master plan.
- iv. Alteration, repeal or replacement of a master plan.

D. Execution of Plan:

- i. Preparation and approval of execution plan.
- ii. The execution plan documents.
- iii. Periodical review of the master plan.
- iv. Alteration, repeal or replacement of execution plan.

E. Action Area Plans.

- i. Preparation and approval of action area plan.
- ii. The action area plans documents.
- iii. Periodical review of the action area plan.
- iv. Alteration, repeal or replacement of action area plan.

F. Project Planning

3. Development Control:

I. Direct Development Control:

A. Zoning Ordinances:

- i. Preparation and adoption of zoning ordinances.
- ii. Documents of zoning ordinance.
- iii. Amendment of zoning ordinance.

B. Land Subdivision Regulations:

- i. Design Standards
- ii. Improvement Requirements.
- iii. Plate Review Procedures and Adoption.
- iv. Periodical Review of Landsubdivision regulations.

C. Building Codes (Regulations)

- i. Architectural
- ii. Structural
- iii. Plumbing
- iv. Mechanical
- v. Electrical

D. Planning Permission:

- i. Meaning of the development
- ii. Application for planning permission.
- iii. Appeals
- iv. Enforcement of the development.

E. Compulsory Acquisition of Land:

- i. Power as to compulsory acquisition of land.
- ii. Appeals.

F. Financial Planning and capital Improvement
Programming.

II. Indirect Development Control:

- i. Land Granting
- ii. The real estate fund.
- iii. The Saudi Industrial Development Fund.
- iv. Arabian American Oil Company (ARAMCO) (Home
owner-ship)

CHAPTER THREE

CLASSIFICATION OF EXISTING

PLANNING LEGISLATION IN THE KINGDOM OF SAUDI ARABIA

3. ANALYSIS OF EXISTING PLANNING LEGISLATION IN THE KINGDOM:

This chapter will analyze the role of different governmental agencies involved in urban planning with a view to classifying the planning legislation according to the classification system developed earlier. A review of the role and responsibilities of various governmental agencies (Al Salum 1986, Rashid and Abu Shaar 1982 P.26-27, Ministry of Municipal and Rural Affairs 1979, R P.1-13, Ministry of Industry and Electricity, I.R,39-55, Al Farsy 1978, Dahllan 1984, Assaf and Khashuggy 1983, Al Dubaikhy 1988, Al Arfaj 1988 A, Al Arfaj 1988H, Jasim, 1988, Al Falih 1988, Al Hashan and Al Omair, Ministry of Public Works and Housing 1981, Al Khail 1986 P.138-145, Al Suwaidan 1988, Presidency of Girls Education 1968, Al Selemi 1988, Royal Commission for Jubail and Yanbu 1985, 1986 B, R, S, Z, Al Saieed 1988, Al Fuzan 1988, Al Zubair 1988) indicate the following considered agencies as involved directly and indirectly in physical development.

1. Ministry of Municipal and Rural Affairs. (MOMRA)
2. Ministry of Industry and Electricity (MOIE)
3. Ministry of Agricultural and Water (MOAW)
4. Role of general Civil Defence Administration under Ministry of Interior (GCDA)
5. Organization of Al-Amro Bil Maroof Wan Nahi Anil Monker (OOABNM).
6. Ministry of Finance and National Economy. (MOFNE)
7. Ministry of Planning (MOP)

On the basis of article 9 and 44 of the constitution of the Council of Ministers, it can be traced for all the governmental ministries that each Minister shall delegate powers to local authorities to execute policies concerning the responsibilities to be carried out by his ministry, each minister also has the power to enforce regulations and clarify legislation which was issued by the Council of Ministers or the King in the form of statutory instruments. In addition, each minister shall be the final authority over the affairs of his ministry.

Ministry of Municipal and Rural Affairs (MOMRA) can be singled out as the most involved agency in the field of physical planning. Duties of MOMRA at the central level which are related to planning and development control can be summarized as follows: (Rashid and Abu Shaar 1982)

1. Physical planning for large and small cities and provision of roads and basic utilities.
2. Administration of services related with health care, beautification for cities, cleanliness and improvement of cities in the Kingdom.
3. Implementing actions related to land management, such as granting, buying, renting and obtaining lands for the construction of projects.

4. Developing villages that are not within the authority of Municipalities.

On the role of MOMRA it was found that Deputy Ministry for Town Planning mainly carries out the following responsibilities (Ministry of Municipal and Rural Affairs 1979, R P.2-3):

1. Formulate general growth policies in cooperation with the Ministry of planning.
2. Institute surveys in order to prepare development plans.
3. Prepare all level of development plans.
4. Revision and approval of detailed plans of cities within the overall framework of the master plans.
5. Revision and comment on the subdivision plans for cities in order to ensure conformity with the regulations.
6. Preparation of planning standards.
7. Preparation, approval and implementation of the technical plans. This includes the construction and maintenance of intracity streets and utilities in urban areas.

MOMRA is also involved in the field of physical development through the Deputy Ministry for Technical Affairs. This Deputy Ministry has the responsibility of making technical plans, supervising consultants work and the construction and maintenance of intracity streets. (Ministry of Municipal and Rural Affairs 1979 P.4)

Ministry of Industry and Electricity (MOIE) also participates in the field of physical development. This participation stems from the following responsibilities.

1. Implementation of the policies related to industrialization (to be handled by Deputy Ministry for Industry) and electrification (to be carried out by Deputy Ministry for Electricity) in the Kingdom.

(Ministry of Industry and Electricity, I).

2. Prepare, approve and implement all development plans and development controls within the boundaries of all industrial estates in the Kingdom. (Ministry of Industry and Electricity, R P.54-55).

3. In addition, the Deputy Ministry for Electricity is responsible for the issuing and publishing of all codes related to the electrical installations in buildings (Ministry of Industry and Electricity, R P.39)

General Civil Defence Administration also contributes to the physical development at the central level. This is according to the Law of Civil Defence promulgated by the decision of Council of Minister number 25 in 23/1/1406H/1986, the decision of Civil Defence Council number 9/T/W/4 in 29/10/1407H/1987, the directive number 1/5/3/146/D/F in 19/4/1406H/1986 sent from Ministry of Interior to Governor of Emirates and the two directives number 4404/1 in 23/10/1398H/1978 and 1065/3 in 22/3/1388H/1968 issued by the Ministry of Interior. (see appendix). This General Civil Defence Administration, mainly contributes to physical development through its responsibility of issuing, publishing and implementing all safety standards and regulations in all buildings and controlling locations of gas and services stations. This includes granting permission prior to the building permit.

According to Royal Decree number M/37 in 26/10/1400H/1980 which authorized the organization of Al Amro Bil Maroof Wan Nahi Anil Monker (OOABNM) to take any action in order to implement its role or (advising and leading people to follow main points of Islamic Religion) makes the OOABNM to be involved in physical development at the central level. OOABNM issues regulations to be forced on different uses of places and buildings and executed by local authorities.

Ministry of Finance and National Economy (MOFNE) is also involved in the field of physical planning at the central level. MOFNE under the Royal Decree number 31 in 6/1/1374H/1954 shall be responsible for the financial budgets of all government agencies. In addition, MOFNE is involved in physical development at the central level. Where MOFNE is supervising governmental properties. MOFNE also involved indirectly in the field of physical development through its affiliated organizations, the Real Estate Development Fund and the Saudi Industrial Development Fund which were established by the two Royal Decrees number M/23 in 11/6/1394H/1974 and M/3 in 26/2/1394H/1974 respectively. These two funds issues regulations to be forced on buildings that are funded by these two funds. In addition, MOFNE is also contributes to the physical development through its affiliated organization, the General Directorate of Statistics which was established by the Royal Decree number 23 in 7/12/1379H/1959 to be responsible for carrying out all statistical works needed in all fields and the supervision and cooperation of statistical works in the governmental agencies (Al Salum 1986 P.336-337).

Ministry of Planning (MOP) is also considered as one of the governmental agencies who contributes to physical development at the central level. MOP is responsible for setting national and regional socio-economic objectives, and is in-charge of the preparation of the five year national development plans. Therefore, its cooperation in the physical planning at the central level is considered to assure that it

is compatible with national objectives and that public investment in the cities development is in conformity with the five year development plan.

Ministry of Commerce (MOC) according to its role defined by the Royal Decree number 236/I in 28/1/1395H/1975 also participates in the physical development at the central level by the execution of the Law of Hotels which was promulgated by the Royal Decree number M/27 in 11/4/1395H/1975. The law of hotels controls locations, number of rooms dimensions and other building regulations of the proposed hotels. Moreover, MOC sometimes issues regulations controlling the locations of other commercial uses such as location of bakeries. (Al Arfaj 1988, A).

In addition MOC at the central level prepares, approves and publishes the standard of buildings' materials. This is through its affiliated organization, the Saudi Arabian Standard Organization which was established by the Royal Decree number M/10 in 3/3/1392H/1972. (Al Hashan and Al Omair)

Ministry of Public Works and Housing (MOPWH) on the basis of its role stated by Royal Decree in 1395H/1975 and followed by three decisions from the Council of Minister number 1542 in 8/11/1395H/1975, 422 in 8/3/1396H/1976 and 187 in 24/1/1396H/1976 also participates in the physical development at the central level. These make MOPWH fully responsible for preparation, approval and implementation of

all housing projects in all the Kingdom and also for all projects in area of Mina in Holy Makkah. In addition, MOPWH also responsible for the preparation and imposition of standards in all the governmental buildings' related to construction, architectural and structural design. (Ministry of Public and Housing 1981, Al Salum 1986, P.296-297).

Ministry of Defence and Aviations (MODA) according to its role and following decisions by the Council of Ministers number 65 in 1-2/9/1391H/1971, 386 in 9/4/1394H/1975, 296 in 15/2/1396H/1976, 429 in 2/3/1396H/1976, 1833 in 10/11/1396H/1976, 155 in 25/2/1397H/1977 and 744 in 11/6/1397H/1977 is also involved in physical development. MODA is fully responsible for plans preparations, approvals and implementation of any projects related to its role such as, military bases, housing, hospitals, school, airports, etc. etc.

Presidency of National Guard (PONG) based on its role stated by the Royal Decree issued in 10/9/1374H/1954 and the Royal Decree issued in 24/3/1394H/1974 (Al Khail 1986 P.141) makes PONG contributes to physical development. This contribution is in term of plans preparations, approvals, and implementations of any projects related to any physical development carried out within its boundaries, such as military bases, housing, hospitals, schools and etc.

Ministry of Education (MOE) also involved in physical development. It prepare, approves and implements all plans for the erection of boy's school. MOE also issues building regulation in order to be forced on private schools. (Alfaleh 1988).

Ministry of Health (MOH) established by the Royal Decree number 5/11/4/8697 in 26/8/1370H/1950 mainly to carry responsibility of health in the Kingdom. This Royal Decree makes MOH participating to the physical development. This is through the responsibility of MOH plans preparation, approval and implementation for the governmental hospitals. (Al Suwaidan 1988). In addition MOH issues regulations and standards to control all private treatment establishment. This is based on the Law of Private Treatment Establishment issued by the Royal Decree number 8 in 25/1/1382H/1962.

General Presidency of Girls Education (GPOGE) also contributes to the physical development. GPOGE and its affiliated organizations established Engineering Department to take care of all GPOGE's construction projects, where GPOGE is responsible for all girls schools and colleges' designing, drawing, standard and implementation. GPOGE published one document in 1388H/1966 for the general specifications related with all GPOGE'S projects (Presidency of Girls Education 1968).

GPOGE also responsible for private girls' education. Any private sector wishing to practice private girls' education might construct, rent or buy ready constructed building for the purpose of private education. In all these cases GPOGE will check the capability of the building in terms of architectural, structural, health, plumbing and electrical designs. (Jasim 1988).

Ministry of Haj and Auqaf (MOHA) contributes to physical development at the central level. MOHA is responsible for all governmental mosques, plans preparation, approval and the standards of material and construction. MOHA also approves the location of mosques which are unzoned on the subdivision as mosques.

Ministry of Justice (MOJ) which at the central level is the Supreme Judicial Council and Courts of Distinction according to their role stated by the Royal Decree number M/64 in 14/7/1335H/1975 is also involved in physical development. MOJ judges private sector cases when they are not satisfied with decision of the local court and general courts. The decision of supreme judicial council is final.

According to Royal decree no.M/51 in 17/7/1402H/1982 Bureau of Appeals at the central level will act as the final Court of Appeals against the decisions of local bureau. Bureau of Appeals also gets involved in physical planning field by catering cases based on misuse of power by any

administrative office.

On the basis of the foregoing analysis on the role of central authorities, the following points can be recognized:

First: There are many governmental agencies independently preparing, approving and implementing plans related to their projects, such as housing military bases, schools, hospitals, etc.

Second: There are many governmental agencies issuing building regulations related to their particular projects or the Kingdom as a whole like the codes issued by the Ministry of Municipal and Rural Affairs, Ministry of Commerce, General Civil Defence Administration, etc.

As a result of above mentioned points many building codes were issued from different agencies, which leads to duplications, conflict, and contradiction. These are listed below for reference:

1. The Building Code for Fire Protection is issued and published by the Saudi Arabian Standards Organization. This is duplication and it contradicts also with the responsibility of the General Civil Defence Administration stated by the decision of the Civil Defence Council number 9/T/W/4 in 26/10/1407H/1987.

2. Safety Instruction for Gas Stations, issued and published by General Civil Defence Administration in 1983.

3. Safety Guidelines for High Rise Buildings and for Roof Top Heli Pad issued and published by General Civil Defence Administration in 1983.

4. Safety Guidelines for Fire Extinguishers and Regulations for the Insulation of fire hydrants issued and published by General Civil Defence Administration in 1983.

5. Safety Guidelines for Cabins and Prefabricated Buildings issued and published by General Civil Defence Administration in 1983.

6. Safety Guidelines for Storage of Chemical Materials issued and published by General Civil Defence Administration in 1983.

7. Safety Instruction for Bakeries issued and published by General Civil Defence Administration in 1983.

8. Safety Instructions for Early Warning System issued and published by General Civil Defence Administration in 1983.

9. Safety Instructions for Fuel Transporting Vehicles issued and published by General Civil Defence Administration in 1983.

10. Safety Instructions for Warehouses issued and published by General Civil Defence Administration in 1983.

11. Safety Instructions for Amusement Parks and Dwellings issued and published by General Civil Defence Administration in 1983.

12. Safety Instructions for Stand by Generators and Water Coolers issued and published by General Civil Defence Administration in 1983.

13. Safety Guidelines for Hotels, Schools, and Hospitals issued and published by General Civil Defence Administration in 1983.

14. Safety Guidelines for Electrical Lifts issued and published by General Civil Defence Administration in 1983.

15. Safety Guidelines for Transport, Handling and Storage of Liquified Gas issued and published by General Civil Defence Administration in 1983.

16. Physical and Mechanical Testing Methods of Portland Cement issued and published by Saudi Arabian Standards Organization in 1979.

17. Hollow Blocks From Burn Clay for Walls issued and published by Saudi Arabian Standards Organization in 1980.

18. Portland Cement Ordinary and Rapid - Hordening issued and published by Saudi Arabian Standards Organization in 1979.
19. Concrete (Cement) Hollow Blocks for Building issued and published by Saudi Arabain Standards Organization in 1979.
20. Aluminium and Aluminium Alloys Productors for Architectural Applications issued and published by Saudi Arabian Standards Organization in 1978.
21. Testing Method for Aluminium and Aluminium Alloys Products for Building Purposes issued and published by Saudi Arabian Standards Organization in 1978.
22. Steel Bars for the Reinforcement of Concrete issued and published by Saudi Arabian Standards Organization in 1979.
23. Solid Concrete (Cement) Building Bricks issued and published by Saudi Arabian Standards Organization in 1979.
24. Tensile Testing of Steel issued and published by Saudi Arabian Standards Organization in 1979.
25. Methods of Test for Concrete (Cement) Building Bricks and Blocks issued and published by Saudi Arabian Standards Organization in 1979.

26. General Specification for Building Construction issued and published by Ministry of Public Works and Housing in 1983.

27. General Specification for The General Presidency's Projects issued and published by the General Presidency of Girls Education in 1968.

28. Regulations and Technical Specifications for Ministry of Education Building, issued and published by Ministry of Education.

29. General Technical Specifications for Buildings Construction issued and published by the Presidency of National Guard.

30. General Regulations for the Installation of Telephone Wires in Residential Dwellings, issued and published by Ministry of Post, Telegraph and Telephone.

31. General Guidelines for the Installation of Telephone Wire/Cable inside Buildings, issued and published by Ministry of Post, Telegraph and Telephone.

32. In addition to many Building Codes in the form of Royal Decrees and Ministerial Directives.

2.1.2 Local Authorities:

Local authorities is the second element under the administration of planning.

At the local level also it can be singled out that local authorities of Ministry of Municipal and Rural Affairs (MOMRA) are the most involved ones in the field of physical development.

MOMRA established local authorities and classified them according to "service area" and population size. These were titled as "Amanat" and "Municipalities" based on above two factors. In small settlements where municipalities cannot handle physical planning work MOMRA established regional offices (Directorate of Municipal and Rural Affairs) to carry out various responsibilities stated by Ministry decision number 4018 in 26/11/1397H/1977. These responsibilities can be summarized as follows:

1. To assist in the preparation of development plans all level.
2. To prepare and revise the detailed plans (execution and action area plans) for each municipality under its authority.
3. Prepare Subdivisions Plan.

While Amanat and Municipalities which are directly administrated by the central authority according to the Law Governing Municipalities and villages issued by the Royal Decree number M/5 in 21/2/1397H/1977 are mainly responsible for the following:

1. Granting of permits and approval for the construction of buildings for public and private use.
2. Expropriation of properties for public interest.
3. Prevention and removal of aggression on private and public properties within its boundaries.
4. Control over unfit and dilapidated buildings in a state of collapse in collaboration with the authorities concerned.
5. Construction and management of parks, public open spaces, slaughter houses, markets, cemeteries and car parks.

In addition, a Municipal Council within each amanat or municipality according to the law Governing Municipalities and villages will be established to be responsible mainly for the following:

1. Issue ordinances with regards to the planning framework, organizational and technical guidelines to develop the metropolitan areas.

2. Issue ordinances for execution to enable the municipality to exercise the power restored on it.
3. Proposing projects of expropriation of properties in the interest of the public.
4. On the basis of the decision of Civil Defence Council number 9/T/W/4 in 26/10/1407H/1987, branches of Ministry of Municipal and Rural Affairs are responsible for the issuing of regulations and technical instruction for the safety of public and private buildings. In addition the above stated branch will also be responsible for the demolition of all dilapidated structures.

The city of Riyadh was given more attention in the decision of Council of Ministers number 771 in 28-29/5/1394H/1974 established high Committee for the Development of Riyadh. (Ministry of Municipal and Rural Affairs 1979, R P.12-13)

Major responsibilities of the Committee as defined by Minister of Interior decision number 212/4 in 20/1/1394H/1975 are as follows:

1. To establish a general policy for the development of Riyadh.
2. To approve development regulation.

3. To approve timing of master plans implementation.
4. To expropriate properties with the city boundries for public use.
5. To approve programs of public services.
6. To propose amendment of the plan when requested.

MOMRA at the local level also contributes to physical development through its affilicated organization, the Directorates of Water and Health Sanitation. These Directorates are responsible for the construction and laying down of water supply and drainage and sewerage networks in the cities. This responsibility according to the Royal Decree number 22 in 23/6/1971 was given to the Directorates of Water and Health Sanitation under the supervision of Minister of Municipal and Rural Affairs.

Through the analysis of the MOMRA's responsibilites, it was found that the Directorates at the local level are fully responsible for water and sewerage networks in term of draining policies plans preparation, approval and implementation (Al Zubair 1988).

On the basis of role of Ministry of Industry and Electricity (MOIE), it can be found that MOIE at the local level has no role in relation to physical planning, except in

term of electricity. Local authorities (SCECO) are responsible for policies planning, plans preparations, approval and implementation in term of electricity networks in all Kingdom except industrial estates, the two industrial cities, Jubail and Yanbu, completed projects by various agencies, such as Ministry of Defence and Aviation, General presidency of National Guard, Arabian American Oil Company (ARAMCO), etc. etc.

Ministry of Agriculture and Water (MOAW) also participate in physical development at the local level but very little. According to its role stated by the Royal Decree number 5/21/495/1 in 18/4/1373H/1953 and the Ministerial Directive from Minister of Municipal and Rural Affairs by number 340/5 in 20/10/1396H/1976 that local authorities (Directorate of Agriculture and Water) of MOAW will be responsible for the approval or disapproval of carrying out physical development on agricultural lands within the boundries of the municipalities.

General Civil Defence Administration (GCDA) based on its role and the Decision of Civil Defence Council number 9/T/W/4 in 26/10/1407H, make GCDA contribute to the physical development at the local level. GCDA will be an execution authority for all regulations and codes issued by the Council of Civil Defence and the GCDA at the central level. In order to implement these regulations and codes GCDA at the local level were empowered to grant permission for applicants. This

power was granted under the directive number 1/5/3/146/D/F in 18/4/1406H/1986 sent from Ministry of Interior to the Governors of Emirates and the two directives number 4404/1 in 23/10/1398H/1978 and 1065/3 in 22/3/1388H/1968 issued by the Ministry of Interior.

The organization of Al Amro Bil Maroof Woa Nahi anil Manker (OOABNM) also contributes to physical development at the local level but very little. Local authorities of OOABNM in term of physical planning are mainly executives responsible for granting permissions prior to the building permits in order to ensure implementation of codes issued by their Central Authority (ALDubaikhy 1988).

Local authorities of Ministry of Commerce in the field of physical development are also mainly executive authorities. Their responsibility is to implement regulations and specifications issued by their Central Authority. Therefore, in order to implement these regulations and specifications, they are empowered to grant permissions to applicants prior to the building permits of commercial uses.

Local authorities of Ministry of Education are also involved in the field of physical development. These are the Department of Archaeology. Articles 6, 12, 13 and 17 of the Law of Archaeology issued under Royal Decree No. M/26 in 23/6/1392H/1972, the Departments of Archaeology were empowered to be involved in the approval of any development plans where

historical and important ancient buildings are also located.

In terms of development control, Departments of Archaeology are also to be involved in the granting of permission for any development near or within the historically important ancient buildings.

Local authorities of Ministry of Education also were empowered to grant permissions prior to the final building permits for private boys schools in order to ensure the implementation of their central authority's regulations and codes (Al-Faleh 1988).

Ministry of Higher Education contributes to the physical development at the local level through the universities. All these universities were authorized to construct their campus within their boundaries. They are responsible for plans preparation, approval and implementation. (Al Baady 1988)

Affiliated local authorities of Ministry of Health (MOH), in term of physical development are also involved. They are mainly responsible for the implementation of the executive by-laws of Law of Private Treatment Establishment issued by the Decision of Minister of Health Number 5031/20 in 19/8/1983. Therefore, local authorities of MOH were empowered to grant permission for any private treatment establishment in order to ensure the implementation of the MOH's regulations. (Al Sawaidan 1988).

General Presidency of Girls Education (GPOGE) at the local level contributes little to physical development. GPOGE at local level mainly ensures the suitability of a building for private girls education in terms of architectural, structural, health plumbing and electrical designs and standards. (Jasim 1988)

Local authorities of the Ministry of Haj and Auqaf (MOHA) are mainly executives in term of physical development and their contribution is considered very little. Engineering Departments at the local authorities of MOHA, are involved in the development control, where these Engineering Department grant the permission prior to building permits for any private sector wants to build a mosque (Al Arfaj 1988, H).

Ministry of Post, Telegraph and Telephone (MOPTT) in terms of the physical development and in terms of telephone networks, its local authorities are fully responsible for policies planning, plans preparation, approval and implementation. This responsibility is for all cities and towns in the Kingdom except industrial estates, the two industrial cities, Jubail and Yanbu, completed projects by various agencies, such as, Ministry of Defence and Aviation, University's campus, etc..etc. (Al Sulimi 1988)

Royal Commission for Jubail and Yanbu based on its role stated by the Royal Decree number M/75 in 16/9/1395H/1975, established two local authorities, as Directorate General of Jubail Project and Directorate General of Yanbu Project. Each Directorate was enabled to prepare all development plans for its boundries. In addition, each local authority was authorized to prepare, approve and implement all development controls in order to implement the development plans.

The Arabian American Oil Company (ARAMCO) are mainly located in the Eastern Province. This company contributes to the physical development in Eastern Province where it has the full authority to prepare, approve and implement all development plans within its boundries. ARAMCO also participates in physical development indirectly through its "Home Owner-ship Program for Saudi ARAMCO Employers".

Analysis on the role of local authorities, indicated that there are many governmental agencies contributing to the physical development at the local level. Inspite of their large numbers, their contribution is very little and only executive in nature, such as the Organization of Al Amro Bil Maroof Wan Nahi Anil Monker, Ministry of Health, Ministry of Haj and Auqaf, General Presidency of Girls Educations. There are local authorities possessing wider powers such as municipalities. This is normal as their nature of work demand such powers. Some authorities possess full power in order to handle its responsibilites, such as, the Directorates of Water

and Health Sanitation and Telephone Departments. There are authorities fully responsible for physical development within their boundaries without the contribution of any other agencies. These local authorities are the Directorate General for Jubail Project, for Yanbu Project and the seven Universities. Riyadh has given special consideration as the High Committee for the Development of Riyadh was established consisting of important members in the government and it enjoy very wide powers. The idea of such a committee needs consideration for application in every city in the Kingdom especially in the large or important ones.

Ministry of Justice (MOJ) which at the local level, are the General Courts, also contribute to physical development. These courts according to the Royal Decree Number M/64 in 14/7/1395H/1975 will judge cases between private sectors.

Bureau of Appeals at the local level according to their role stated by the Royal Decree number M/51 in 17/7/1402H/1982 also participate in physical development. Bureau of Appeals will judge in all appeals against administrative action from the governmental officers. The judgements of Bureau of approved by the Central President of Bureau of Appeals at Riyadh.

3.2. Development Plans:

Development plans are the second major element of the proposed classifications system for urban planning legislation in Saudi Arabia. This will be discussed according to the following elements (as determined in chapter two of this study):

1. National Settlement Plans
2. Regional Plans
3. Master Plans
4. Execution Plans
5. Action Area Plans.
6. Project Planning.

3.2.1 National Settlement Plans:

There is no planning legislation concerning the national settlement plans. However, the Deputy Ministry for Town Planning is considering the development of National Settlement Strategy. For the sake of comprehensiveness a national authority for national spatial development be established to include all governmental agencies and coordinated by Ministry of Municipal and Rural Affairs. Therefore, it is suggested that national settlement plans should be the first level of development plans.

3.2.2 Regional Plans:

The importance of regional planning has been emphasized by the Ministry of Planning in the third Five-Years

Development Plan 1980-1985. As a result, several regional plans for Holy Makkah, Hail, Tabuk, Qassim and Baha are recently being adopted by the Deputy Ministry of Town Planning. However, there is no planning legislation concerning regional plans except what were proposed by various international consultants (Finnplanco - Ahmed A. Hajjar Consultants, RSH International, Inc. and Al Rajehi Consulting Engineers Joint Venture, Norconsult A.S., Serete/CEG, CH2M Hill International Consulting Engineering Group, Saudi Consulting House, Dar Al Handasah Consultants and Saudi Consulting Group). Therefore, it is suggested that Saudi Planning Legislation should considered regional plans as the second level of development plans.

3.2.3 Master Plan:

Through the analysis of the urban planning legislation documents, it was found that the master plans are done for all industrial estates by the Ministry of Industry and Electricity, the two industrial cities of Jubail and Yanbu by the Royal Commission for Jubail and Yanbu and then for all cities and towns in the Kingdom by the Ministry of Municipal and Rural Affairs and other governmental agencies.

Therefore proceeding discussion will be presented as follows:

1. Master Plans for all cities and towns by Ministry of Municipal and Rural Affairs and other governmental agencies.
2. Master Plans for all industrial estates by Ministry

of Industrial and Electricity.

3. Master Plans for industrial cities Jubail and Yanbu by Royal Commission for Jubail and Yanbu.

3.2.3.1 Master Plans for all Cities and Towns by Ministry of Municipal and rural Affairs and Other Governmental Agencies:

The available legislation about master plans is not comprehensive and scattered in various documents. This section will discuss the available legislation as follows:

1. Preparation and approval of Master Plan:

According to the first section of town planning article 5 in the Law of Road and Buildings which was promulgated in 1360H/1940, it was pointed out that a technical committee should be formed prior to the preparation of town plan (s). The law did not mention who is to be on the committees, but in the Law Governing Municipalities and villages which was promulgated by the Royal Decree number M/5 in 21/2/1397H. (1977), it is mentioned that one of the municipal council's function is to participate with the concerned authorities in the preparation of the master plan. In the decisions of Minister of Municipal and Rural Affairs number 4018 in 26/11/1397H. (1977) and 39/6 in 2/1/1398H. (1978) for the establishment of the directorates of municipal and rural affairs, their functions include the preparation of master plans.

It was found that the Law of Roads and Buildings instructed the technical committee, when preparing town plans, to give special consideration to the location of slaughter houses, horse and cattle houses, workshops, factories, petrol filling stations and similar land uses constituting a possible health or fire hazard. While preparing the plan consideration should be given to location and width of roads, lanes and their directions as well as the location and dimension of public squares of the town area including main roads and public gardens. Military barracks with their annexes regulated after consultation and agreement with the authorities concerned.

According to the directive number 3492 in 3/5/1398H. (1987) circulated to local authorities of the Ministry of Municipal and Rural Affairs, while preparing the plans the concerned committee should contact the Department of Traces in the Ministry of Education to locate the historically and culturally valuable buildings. This emphasize article 12 and 17 of Law of Traces which was promulgated by the Royal Decree number M/26 in 23/6/1392H/1972, while preparing any master plan for new development and expanding or renewal, all historical and important ancient buildings should be considered, and it is prohibited that any master plan including historical and important ancient buildings be approved unless the approval from the Department of Traces at MOE is obtained.

Under the Law of Roads and Buildings or any other piece of legislation, there was no requirement or conducting any surveys for the preparation of master plans. Only three ministerial directives of Ministry of Municipal and Rural Affairs number 221/5 in 13/6/1395H/1975, 592 in 8/8/1396H/1976 and 81 in 11/11/1397H/1977 asked the following surveys to be carried out for small settlements only.

A. A comprehensive survey of cultivate areas and in order to be doubly sure that they are prime land as far as agriculture is concerned. Reference is to be made in this connection to the branch offices of the Ministry of Agriculture and water directly to avoid many formalities that have to be gone through if the approach was made otherwise.

B. Availability of actual residential settlement.

In addition, the Law of Roads and Buildings or any other legal document, did not ask the concerned authority for the master plan preparation, to prepare draft master plan to be submitted for citizen participation.

According to first section of article 5 of the Law of Roads and Buildings after the preparation of the plan by the assigned committee, it will be presented to the concerned authorities to be studied in the presence of the committee at the mayor's office as well as the municipal council. After approval is decided, it should immediately be raised to the

higher authorities to take the necessary action. After the approval of the higher authorities, the plan becomes a legal document. The Law did not state who are the higher authorities, especially this law is very old and many agencies were established, changed and renamed since then.

The law also did not consider the objections of citizens after the final approval of the master plan.

2. Master Plan Documents:

According to article 5 of the Law of Roads and Buildings, the drawings (master plan) will be prepared with a scale not less than 1/1000, and according to the directive of Deputy Minister of Town Planning number 1226 in 3/2/1397H/1977, which stated that the master plan will be the general structure which lays the main lines of the physical development of the city. The same directive stated that the master plan should be prepared on specific scales in accordance with the area of the city and the area of the plat. These scales should be within 1/2500, 1/5000, 1/10000, 1/20000, 1/25000, and/or 1/50000.

Also the above mentioned directive stated that the master plan should be prepared with the following information:

- A. North Arrow.
- B. Names and width of the main streets.
- C. Proposed land uses.

- D. All land marks in the city.
- E. Location of the plan in the context of Saudi Arabia.
- F. Propose imaginary lines by equal squares.

The directive went into unnecessarily detailed instruction as to how to fold the drawings but left wide gaps regarding the preparation of master plan documents.

3. Periodical Review of the Master Plan:

There is no legislation asking the authorities for the review of the master plans periodically. It makes most of the master plan static and out dated in character.

4. Alteration, Repeal or Replacement of a Master Plan:

It was found that the Law of Roads and Buildings stated in section two article 22, that maps which were already prepared, approved and agreed upon by the higher authorities may be altered if the general welfare necessitates such alteration. But this article did not clarify the nature of maps. The Law was followed by eleven ministerial directives of Ministry of Municipal and Rural Affairs, prohibiting the amendments of the approved plans, unless they are very minor but important cases.

These directives are as follows:

Directive number 124/5 in 25/3/1393H/1973.

Directive number 55/5 in 29/2/1394H/1974.

Directive number 452/5 in 9/10/1395H/1975.

Directive number 373/5 in 18/11/1396H/1976.

Directive number 121/5 in 6/4/1398H/1978.

Directive number 3384 in 11/8/1398H/1978.

Directive number 2054 in 10/5/1399H/1979.

Directive number 232/5 in 15/11/1400H/1980.

Directive number 291/5 in 14/9/1403H/1983.

Directive number 327/5 in 22/10/1403H/1983.

Directive number 38/5 in 26/1/1403H/1983.

From previous directives, only the directive number 327/5 in 22/10/1403H. (1983) explained the procedures of the amendment to be followed.

These procedures were as follows:

FIRST: Reasons and justifications of amendments should be explained to the Branch Committee. (There is no any legal document found by the researcher, stating the members of the Branch Committee, but there is one case found at Amant Al Dammam signed by the Branch Committee. This committee consisted of Deputy Prince of Easter Province, Mayor of Amanat Al Dammam and Head of Town Planning Department of Amant Al Dammam, (Directive number 104 in 16/3/1407H (1987)).

SECOND: Suggestions of the Branch Committee will be presented to the High Committee for the follow up of the area's planning for discussion and take their decision. (There is also not legal document found by the author, stating the members of the High Committee, but there is one case found at Amanat Al

Dammam signed by the High Committee. This Committee consisted of Prince of Eastern Province, Deputy Minister of Town Planning and Mayor of Amant Al Dammam), (Directive number 104 in 16/3/1407H (1987)).

THIRD: Suggestions of the High Committee will be presented to the Minister of Municipal and Rural Affairs, while amendments will not become legal and valid unless approved by the Minister.

According to the same directive, in the case of amendments of plans for cities or any area that have yet no Branch or High Committee, the concerned authority should take the approval of the Minister prior to any step in the procedure of amendments. Actually, this directives did not mention who is the concerned authority.

3.2.3.2 Work of Consultants: Master Plan

After the analyses of the available legislation about the master plan in relation to the Ministry of Municipal and Rural Affairs and other governmental agencies. From the available planning report adopted by the Ministry of Municipal and Rural Affairs the work of consultants who prepared master plans for particular cities will be discussed as follows:

1. Preparation and Approval of Master Plan:

According to the reports of Consultants who prepared the master plans for many cities of the Kingdom already listed and

discussed in chapter I, the main purpose of the master plan is to "study and propose policies for the overall land use and physical development within the plan area". Therefore, consultants, affirm that the plan should be based on forecasts, calculations and programs of future changes in the economy and the population.

In addition, they stated that the approved master plan should be the guideline for preparing detailed plans and should serve as a basis for discussion and policy statements by the Authorities on future development. Thus, they asked that the master plan should have a rather long planning perspective, normally dealing with a time period of 15 years.

One of the consultant proposed that the planning legislation should require planning authorities to let citizens involve in the plan preparation.

Suggestions by the consultants, as to the approval of the master plans vary in chapter. Some of them suggested to get approval from the Council of Minister while others proposed Deputy Minister of Town Planning.

2. The Master Plan Documents:

According to the work of most of the Consultants, the master plan is mainly a written statement accompanied by necessary supporting diagrams and illustrations in various scales, but the main maps of most of master plans are prepared

on scale 1:10,000 or 1:25,000.

3. Periodic review of the Master Plans:

Most of the consultants suggested periodic review of master plans from time to time without mentioning the length of time. Moreover, nothing is mentioned about new surveys, citizen participation and the approved procedure. This leaves gaps in the master plan documents.

4. Alteration, Repeal or Replacement of a Master Plan:

One of the consultants stated that parts or whole, of most plans will from time to time need to be reviewed, amended and approved. It was not stated by the consultant who will approve the plan, and what kind of process should be followed if this review is needed. In addition, it was not clarified when this review is considered or can be carried out.

As a conclusion for the previous works of the consultants on the master plan, it was done in a comprehensive way and most of the legislation related to the master plan was clarified with little gaps. Their works are limited to the particular cities therefore, it is suggested to be taken for all the Kingdom.

3.2.3.3 Master Plan For all Industrial Estates by Ministry of Industry and Electricity:

After the discussion on the consultants work on master plans, now the discussion comes to the master plan in relation

to the Ministry of Industry and Electricity.

Through the analysis of documents, it was found that the Department of Engineering and Projects under the Ministry of Industry and Electricity is responsible for the master plans of the industrial cities (Estates) in all the Kingdom except Jubail and Yanbu. In site selection and master plan preparation during approval and execution stages there is no cooperation and coordination between Ministry of Industry and electricity and the Ministry of Municipal or Rural Affairs or any agency involved in Planning Work.

It was also found that there is no legislation about the master plans for the industrial estates. All of the available legislation was prepared for particular estates by different consultants. The available master plans for particular estates will not be discussed as they do not represent any legislation for other estates.

3.2.3.4 Master Plans For the Two Industrial Cities Jubail and Yanbu by Royal Commission for Jubail and Yanbu:

It was found that the Royal Commission for Jubail and Yanbu prepared the development plans for these two cities. Since this commission is responsible only for Jubail and Yanbu, preparation and approval procedures of these development plans will not be discussed, as they do not represent any legislation for other cities.

In master plan preparation during approval and execution stages there is no cooperation and coordination between Royal Commission for Jubail and Yanbu and other planning agencies in the field. This lead to duplication in standards.

3.2.4 Execution Plan:

After the analysis of all available existing legislation related to master plan proceeding discussion will be on execution plan, the fourth element under development plans.

3.2.4.1 Execution Plan For all Cities and Towns by Ministry of Municipal and Rural Affairs and Other Governmental Agencies:

The available legislation about execution plans is not comprehensive and scattered in various documents. This section will discuss the available legislation as follows:

1. Preparation and Approval of Execution Plan:

The Law of Roads and Buildings article 5 asked authorities to prepare plans at different levels for every city in the Kingdom. Therefore, what was mentioned for the master plans will be for the execution plans. All comments stated for the master plan will be true for the Execution plans also.

In addition, the law mentions only "higher authority" for the approval of plans at all levels. For lower level plans there is no mention of any specific authority. According to

the role of Deputy Ministry for Town Planning, detailed plans (Execution plans) will be approved by the said ministry. The Ministerial decision of Minister of Municipal and Rural Affairs number 4018/6 in 26/11/1397H/1977 and 39/6 in 2/1/1398H/1978 stated that the Directorates of Municipal and Rural Affairs will be responsible for the approval of detail plans (Execution plans) for municipal areas under them. Assigning two authorities for the approval will lead to a confusion, and conflict and overlapping of authorities. Therefore, it is suggested that the Directorate of Municipal and Rural Affairs should approve the execution plans and Deputy Ministry of Town Planning should have discretion for the approval of execution plans. Also, it would be suggested that the execution plans should preferably be approved at the local level by Amanat or Municipality.

2. The Execution Plan Documents:

The law of Roads and Buildings did not make any distinction for different level plans in terms of documents also. According to the directive of Deputy Minister of Town Planning number 1226 in 3/2/1397H/1977, the detailed plans (Execution plans) will be a organizational plat for the area indicating the way the land will be used. In addition the directorate stated the plan should be prepared with a specific scale which could be read and is in accordance with the area of the city and the area of the plat. Scales which should be used are: 1/200, 1/500, 1/1000, 1/2500.

The directive also ask for the following information to be obtained in the executive plans:

1. North Arrow.
2. Names and widths of streets.
3. All platforms and important details for car parks should be shown as much as possible.
4. Names and areas of public facilities.
5. Cross sections for all streets in the plan.
6. Land uses as in the master plan.
7. Amendment of the use with the mention of the name of the authority who did the amendment and all legal documents empowering it to do so.
8. Building regulations (setbacks and height) as in the master plan.
9. Show the imaginary lines as proposed in the master plan.
10. Different level of the contour lines should be mentioned in writing in the plan.

The above mentioned directive continued discussing very detailed instructions which are unnecessary. At the same time this directive or any other legal document, did not indicate some major aspects that the execution plan will consist of written statements to express economic and social policies at the local level, package drawings to explain the written proposals in diagrams.

3. Periodical Review of the Execution Plan:

There is no legislation asking the authorities for the review of execution plans periodically, which makes these plans static in nature and outdated in character.

4. Alteration, Repeal or Replacement of Execution plans:

It was found that this element is also discussed under article 22 of the Law of Roads and Buildings and directive number 325/5 in 22/10/1403H/1983 of Ministry of Municipal and Rural Affairs. Alteration is allowed for important cases and particular procedures to be carried (see appendix).

3.2.4.2 Work of Consultants: Execution plans

After the analysis of the available legislation about the execution plan in relation to the Ministry of Municipal and Rural Affairs, the work of the consultants for particular cities is discussed below:

1. Preparation and Approval of Execution Plan:

All of the consultant, proposed an executions plan for the areas which were assigned to them. All of them stated that the main purposes of the execution plan is to mark boundaries and designations of land use for all sites or areas to be used for public facilities, parks and main roads. In addition, execution plans provide guidelines for action area plans.

According to one of the consultants, planning legislation should require planning authorities to let citizens involve in the plans preparation. While the approval of the execution plan according to the proposed work of the consultants, it is suggested to be approved by the Regional Branch Committee for Planning.

2. The Execution Plan Documents:

Most of the Consultants stated that the execution plan, should normally be presented on maps in scale 1/20000, 1/2500 and/or 1/4000.

The execution plan normally consist of the following maps:

- a) Public facilities and land acquisition map.
- b) Zoning map with information of land use.
- c) Utility maps, water supply, sewerage system, electricity and telephone.

In addition to these maps, written regulations in the form of bye-laws are needed to secure the reservations of land for public facilities.

3. Periodical Review of the Execution Plan:

Most of the consultants suggested periodic review of master plans from time to time without mentioning the length of time. Moreover nothing is mentioned about new surveys, citizen participation and the approved procedure. This leaves

gaps in the master plan documents.

4. Alteration, Repeal or Replacement of an Execution Plan:

According to the work of consultants alteration of the Execution Plan was considered.

3.2.5 Action Area Plans:

Action Area Plan is the fifth element under development plans. Proceeding discussions will be as follows:

3.2.5.1 Action Area Plans For all Cities and Towns by Ministry of Municipal and Rural Affairs and Other Governmental Agencies:

Responsibility of action area plans is mainly in the hand of Ministry of Municipal and Rural Affairs. Based on the analysis of all available legislation about the execution plan, there is no distinction given to execution plan or action area plans. All documents used "detailed plans". Also other governmental agencies participate in Action Area Plans such as Ministry of Defence, Interior, National Guard through their housing projects, Ministry of Industry and Electricity through the Industrial Estates, Ministry of Higher Education through University Campuses, Ministry of Public Works and Housing through housing projects and ARAMCO through its campuses.

3.2.5.2 Work of Consultants: Action Area Plans

After the analyses of the available legislation about action area plan in relation to the Ministry of Municipal and Rural Affairs. From the available planning reports adopted by the Ministry of Municipal and Rural Affairs the work of consultants for particular cities in relation to action area plans will be discussed as follows:

1. Preparation and Approval of Action Area Plans:

Most of the Consultant who proposed an action area plan for the areas which were assigned to them, stated that the main purposes of the action area plans can be summarized as follows:

1. Applying strategy of the Master Plan in detail.
2. Providing detailed basis for development control.
3. Providing basis for coordinating decisions.
4. Bringing before the authorities detailed planning issues and decisions.

According to one of the Consultants, planning legislation should require planning authorities to let citizen be involved in the plans preparation.

While the approval of the action area plans according to the proposed work of the consultants, it is suggested to be approved by the Regional Branch Committee for Planning.

2. The Action Area Plan Documents:

According to most of the consultants, the action area plan should be prepared on scale of 1/1000 and these plans must be completed under action area plan bye-laws.

3. Periodical Review of Action Area Plan:

What was mentioned under periodical review of the master plan and the execution plan by the work of the consultants, is the same for the periodical review of the action area plans.

4. Alteration, Repeal or Replacement of an Action Area Plans:

One of the consultants stated that a growing population and an expanding economic activity will gradually bring about a demand for extension of the action areas and consequently the action area plans. At the same time, changes in the basic conditions and values on which the action area plans were originally based will necessitate revisions of both a minor and major extent within a shorter or longer period after their approval.

But the consultant did not state the procedures to be followed in order to alter, repeal or replace the action area plans.

3.2.6 Project Planning:

Project planning is the sixth element under the development plans in the proposed classification system for

planning legislation in Saudi Arabia.

Based on the existing planning legislation in Saudi Arabia, several governmental agencies are fully responsible for all physical development within their assigned boundaries. These governmental agencies are as follows:

1. Ministry of public works and housing is fully responsible for all housing projects related to the government and projects in area the haram of holy Makkah.
2. Ministry of Defence and Aviation is responsible for all physical development within the military bases, airports and for any projects related to it such as military hospitals.
3. General Presidency of National Guard is responsible for all physical developments within its military bases and any projects related to it such as military hospitals.
4. Ministry of Higher Education through universities becomes fully responsible for all physical development for university campuses.

Above mentioned four agencies have no standardized planning legislation for regulating their activities and for the preparation, approval and implementation of these plans. All these agencies assign consultants for their projects independently and there is complete lack of cooperation and

coordination in their working and those of outside agencies.

5. Ministry of Education is fully responsible for all developments related to governmental boys school. Ministry of Health is fully responsible for all development related to governmental hospitals and clinics.

7. General Presidency of Girls Education is fully responsible for all developments related to governmental girls schools and colleges.

8. Ministry of Haj and Auqaf is fully responsible for all developments related to governmental mosques.

9. Finally, the Arabian American Oil Company (ARAMCO) is fully responsible for all physical development within its boundaries. This company also has its own planning legislation to be applied by its own Department of Planning at Dhahran. This (Pencel 1987) planning legislation will not be discussed in this study, as ARAMCO is mainly concerned with Eastern Province.

3.3 Development Controls:

Development Controls are the third major element of the proposed classification system for urban planning legislation in Saudi Arabia. This will be discussed according to following elements (as determined in chapter two of this study):

I Direct Development Control:

1. Zoning Ordinances.
2. Land subdivision regulations.
3. Building codes (regulations)
4. Planning Permission.
5. Compulsory acquisition of land.
6. Financial planning and capital improvement programming.

II. Indirect Development Control:

1. Land granting
2. Real Estate development fund.
3. Saudi Industrial Development Fund.
4. ARAMCO home-ownership programme.

I. Direct Development Control:

3.3.1 Zoning Ordinances:

Analytical study of planning legislation in the Kingdom reveals that these ordinances are issued by three authorities in the Kingdom which are listed below:

1. Zoning Ordinances for all cities and towns by Ministry of Municipal and Rural Affairs.
2. Zoning Ordinances for all industrial estates by Ministry of Industry and Electricity.
3. Zoning Ordinances for Industrial Jubail and Yanbu by Royal Commission for Jubail and Yanbu.

3.3.1.1 Zoning Ordinances for all Cities and Towns by Ministry of Municipal and Rural Affairs and other Government Agencies:

The available legislation about zoning ordinances is not comprehensive and scattered in various documents this section will discuss the available legislation as follows:

1. Preparation and Adoption of Zoning Ordinances:

According to law of Roads and Buildings the Committee for the preparation of master plans, execution and action area plans also issues zoning ordinances. The law did not assign different committees for different levels of plans and for zoning. According to the first section of the law, following should be considered while preparing the plans:

a) While preparing the maps, location of slaughter houses, horse stables, cow barns, work shops, factories, warehouses for preliminary materials, construction materials, and fuel tanks should be considered, as well as detail areas should be defined.

b) Location and width of roads, lanes and the wind directions location and dimension of public squares of the town area including main roads and public gardens, the military barracks with its annexes after considering agreement with the authorities concerned should be studied.

At different times after the Law of Roads and Buildings, a number of directives were issued concerning specific uses. These uses came later when the government discovered the need for them, such as directives of Ministry of Municipal and Rural Affairs number 1/1/1/4/d/1036/3 in 21/3/1388H (1968), 14/5 in 14/1/1397H. (1977), 10/5 in 19/1/1400H (1980) and 86/1/4/a in 16/6/1401H (1981) based on the decision of Council of Minister number 1277 in 1/12/1397H/1977 concerning the provision of car parking. Directives of Ministry of Municipal and Rural Affairs number 4127/3 in 19/10/1389H. (1986) and 2992 in 2/8/1402H. (1982) concerning the provision of area for light industries. Directive of Ministry of Municipal of Rural Affairs number 155/5 in 28/5/1394H (1974) concerning the provision of land for fires stations. Directives of Minister of Municipal and Rural Affairs number 3471 in 16/6/1401H (1981), 461/w/z in 1/7/1401H. (1981), and 158 in 19/4/1402H. (1982) based on Royal Decree number 3/8865 in 20/4/1401H/1981 concerning provision of area for Eid Prayers. Directives of Minister of Municipal and Rural Affairs number 231/5 in 1/8/1402H (1982) and 2138 in 29/5/1402H. (1982) concerning the provision of lands in every city and towns for the Organization of Al Amro Bil Maroof Woa Nahi Anil Monker and for post, telegram and telephone departments.

For the cities that are located on the coast, such as in the Eastern Province, there are two directives of Minister of Municipal and Rural Affairs number 154/w/z in 24/3/1400H. (1980) and 87/5/t in 19/3/1401H (1981) based on Royal Decree

number 3/H/4499 in 28/2/1400H/1980 stating that all areas directly on the coast in Eastern Province will be zoned for recreation.

In addition, there is a law of premises causing discomfort, nuisance, health hazard or fire risk which was issued by Royal Decree number 17 in 18/3/1382H. (1962).

There is a long list of construction that is considered as premises causing discomfort, nuisance, health hazard or fire risks. This list was approved by the Council of Ministers by the number 1054 in 7/9/1393H. (1973), and this list was categorized into three levels. (See appendix).

To ascertain that the dimension of buildings, structures and lands, etc., are considered upon preparing the maps, according to the official documents in possession of the owners, the Technical Committee should perform its assignment. This Committee should be formed by the Mayor's office or the Municipalities to make the necessary study and make decisions according to the rules, on condition that the maps should include the following:

1. A separating line should be drawn to show the limits of the land of the Ministry of Finance, the Municipalities and the land to be distributed to the inhabitants.

2. The land where buildings are already constructed or are being constructed at present, whether owned by the government or the public, must be divided into first, second and third classes. They also should be defined as residential areas, shops market places, public auction, unwholesome handicrafts, and building plots.

3. Plots for the military authorities or for the government's use should be reserved. While preparing the maps, some uses should be out of the urban areas, because of the population of these uses, ugliness, as they will hinder the development of urban areas. Therefore, there are directives concerning the provision of these uses, such as, directives of Minister of Municipal and Rural Affairs number 2706/3 in 3/7/1388H/1968, 131/3 in 12/1/1389H/1969 and 2642, and 2642 in 27/10/1397H/1977 concerning provision of areas for cemeteries in each city and towns. Directives these location of these cementries according to the same directives will be decided by the committee consisting of a member representing the emirate, a member representing the court and a member representing the municipality number 83/55 in 12/2/1390H/1970 and 420/55 in 8/6/1391H/1971 of Ministry of Municipal and Rural Affairs concerning garbage disposal. Directives of Ministry of Municipal and Rural Affairs number 45/5/55 in 3/2/1397H/1977 and 162/5 in 3/7/1406H/1984 concerning the location of damaged and unused cars, and the directive number 77/5 in 11/3/1402H/1982 concerning the location of stone breaking Industry.

While preparing the plans, the municipalities were instructed that should consider the development outside of the urban limits, and should keep in touch with other ministries. The directives of Ministry of Municipal and Rural Affairs number 278/5/5 in 15/9/1402H/1982, 282/5 in 24/9/1404H/1984, 305/1/a in 21/2/1405H/1985, and 80/3 in 19/1/1408H/1987 concerning all construction on the inter urban roads, indicate that the municipalities should communicate with the Ministry of Communication. Directive number 23/5 in 24/1/1407H of Ministry of Municipal and Rural Affairs concerns any construction out of the urban areas. All of this land is the responsibility of the Ministry of Agriculture and Water. Therefore, municipalities should refer to these ministries while preparing the plan.

Previous analysis of existing legislation under the preparation and adoption of zoning ordinances showed that there is huge and scattered number of documents. In spite of these huge number of legal documents, there are many aspects under this element which were not pointed out. The legislation did not ask the authorities for gathering of necessary information in order to prepare the zoning ordinances.

Also the legislation did not require the preparation for tentative ordinances to be discussed carefully before the final adoption.

In addition, the legislation did not require for holding any public hearings prior to adoption of an ordinance in order to meet the citizen's views.

Finally, the legislation did not propose the authority to be responsible for the approval of the zoning ordinances, except what was mentioned about all drawing in article 5 of the Law of Roads and Building, which means the High Authorities. As stated earlier in the chapter, high authorities were not nominated. The Law of Roads and Buildings is very old as it was issued in 1940 and names of many agencies and authorities were changed since then. From the role of Ministry of Municipal and Rural Affairs, it can be recognized that Deputy Ministry for Town Planning is responsible for the approval of zoning ordinances.

It is suggested that the approval of zoning ordinances be entrusted to the local planning authorities as these ordinances deal with detailed regulations concerning local environment.

2. Documents of Zoning Ordinances:

There is no legislation stating that, the zoning ordinances consist of maps and written material, but from the expression in the second section of the Law of Roads and Buildings, we can tell that it is meant to be written. The law stated that the following rules are to be used and considered when using the area:

A. It is not allowed to use any building located in the residential area for shops, workshops, markets or any unwholesome handicraft.

B. It is not permitted to use a building meant to be for a shop or market place for any unwholesome handicraft.

C. It is not allowed to use the building at the workshops area for any wholesome handicraft, yet it is possible for the municipality to give permission if the situation necessitates, to be used for a year on condition that the rules and timing is abided by.

D. Residential buildings are not to be used as government departments, mosques, hospitals, clinics, hotels, coffee houses, stables, garages, swimming pools, and vice versa, unless the owner can obtain a written permit from the municipality. The permit must not be granted except after inspection is made by the building and health authorities who must state its suitability for the required purposes. Also the permit must not be given until necessary changes and repairs are made to make such uses possible.

E. The Law of Roads and Buildings in section three also stated that no building is to be constructed on any plot on the residential areas unless the following conditions are abided by:

1. The plot at the residential area should not be less than 175 square arms (100 sq. m) according to the building authority's decision. Approval is to be obtained also in regard to the proper measurements decided for the plots in the residential areas.

2. The measurements of the width of the front part of the plot facing the street should not be less than $\frac{1}{3}$ of the length of the plot. In any case, it should not be less than 9m.

3. The conditions laid down in paragraph (1) should not be valid for any plot meant to be for shops or market area, if it is used as a room or a living quarters. The municipality chiefs after approval of the higher authorities should circulate local instructions to help give the least measurement of the front part of the plot or place at the market and shop area and the percentage to be used for building.

There are some uses that are confidential. Therefore, Minister of Municipal and Rural Affairs in his directive number 12 in 11/2/1399H/1979. based on the directive of Minister of Interior number 21S 8996 in 7/10/1397H/1977 stated that these uses will be indicated on the maps under the title of private uses.

While preparing the zoning ordinance, there are some uses that will be non-conforming with the approved zoning ordinance; for example, a gas station would appear in the residential area. These kind of uses should be mentioned in the written documents of the ordinances. Therefore, the Law of Roads and Buildings section three stated that the building authority must not apply the conditions stated in paragraph one article E (under zoning ordinance: written documents) in a case where a certain plot is privately owned but not covered by the conditions above upon the release of this regulation. The authorities should be convinced that, it is not easy or logical to ask the landlord to find an-other plot instead, to secure the necessary conditions, or to sell the plot to a neighboring landlord. In this case, the measurement of the plot on which no buildings exist is to be less than half of the total amount of the measurement of the plot.

3. Amendments of the Zoning Ordinance:

There is no legislation requiring the authority for a periodical review or whenever required for the zoning ordinances.

But what was discussed under the amendment of the master plan, execution and action area plans will be applicable for zoning ordinances. Amendments of all the plans were discussed at the same time in the Law of Roads and Buildings and in the ministerial directives (number and date were mentioned under the element called amendment of the master plan) without

stating any distinction between them. Therefore, it is suggested that the procedures and approval of these plans should be different in cases where, for example, the approval of the amended zoning ordinances by the Minister of Municipal and Rural Affairs or his Deputy for town planning will lead to a long process and a very high degree of centralization.

3.3.1.2 Work of Consultants: Zoning Ordinances

After the analyses of the available legislation about zoning ordinances in relation to the Ministry of Municipal and Rural Affairs and other governmental agencies, from the available planning reports adopted by the Ministry of Municipal and Rural Affairs, the work of Consultants who prepared zoning ordinances for particular cities will be discussed as follows:

1. Preparation and Adoption of Zoning Ordinances:

Most of Consultants who propose the zoning ordinances for particular cities in the Kingdom, stated that the main purpose of zoning is "to promote the orderly development of the metropolitan area in accordance with the adopted Master Plan, Execution plan and Action Area Plans; to prevent overcrowding and traffic congestion to protect the value of land and buildings; to safeguard the privacy of individual homes and grounds; and in general, to promote the public health, safety and welfare. (Ministry of Municipal and Rural Affairs 1980 DP.19) The Consultants prepared the zoning ordinances and these were approved by the Minister of Municipal and Rural

Affairs.

Consultants did not mention, that the zoning ordinances be prepared on the basis of surveys and they did not propose tentative zoning ordinances to be discussed by citizens. In addition they did not suggest the approving authority as they did for Development Plans.

2. Documents of Zoning Ordinances:

According to the proposals of Consultants, zoning ordinances consist of written documents and a zoning map. The map shows the boundaries of each district or zone. The written documents describe the schedule of uses that are allowed, the development standards that apply within each zone, and basic administrative procedures. (Ministry of Municipal and Rural Affairs 1980 D P.10,11).

3. Amendments of Zoning Ordinances:

According to most of the Consultants, amendments to the zoning map may be authorized under certain circumstances which are mentioned in their reports. In addition, the Consultants proposed procedures to be followed in order to amend the zoning ordinance. As suggested by Consultants, approval of Amendment shall be carried out by Higher Planning Committee. (Ministry of Municipal and Rural Affairs 1980 D P.67,86).

3.3.1.3 Zoning Ordinances by Ministry of Industry and Electricity:

Upon reviewing all documents related to the Ministry of Industry and Electricity, it was found that the only existing zoning legislation is that which was prepared by consultants for a particular master plan for industrial estate which means it was not meant to be legislation for other plans of projects.

Through the review of the prepared master plans, one finds that the master plans included zones of different types and that all the necessary ordinances were proposed in the master plan documents. Discussion on those zoning ordinances is not included in this study as they are related to specific projects.

3.3.1.4 Zoning Ordinances by Royal Commission for Jubail and Yanbu:

Royal Commission for Jubail and Yanbu prepared, adopted and implemented zoning ordinances for Jubail and Yanbu industrial cities. These zoning ordinances are very similar in term of preparation and adoption procedures. Therefore, the zoning ordinance for Jubail will be selected for discussion. Directorate General for Jubail Project, in 1986 published zoning regulations of Madinat Al-Jubail Al Sanaiyah. It is discussed as follows:

1. Preparation and Adoption of Zoning Ordinances:

The planning development and regulations branch of city planning department at Jubail at the Directorate General for Jubail Project has prepared the zoning ordinances and they were approved by the office (Royal Commission for Jubail and Yanbu 1986).

It was not mentioned whether they gathered necessary information for the preparation of these zoning ordinance or not. But usually the authority for the preparation of the master plan zoning ordinances is the same. Therefore, there is no need for instituting another survey. In the case of Madinat Al-Jubail Al Sanaiyah, the information gathered for the master plan was also used for the zoning ordinance preparation. Citizens too were not considered in the preparation of the zoning regulation.

2. Documents of Zoning Ordinances:

The Planning Development and Regulations branch of city planning department at Jubail, issues the documents of zoning regulations.

3. Amendment of Zoning Ordinances:

Jubail master plan report on zoning regulation stated that the zoning regulations may be amended from time to time. These amendments will be in accordance with certain procedures. These procedures were discussed in depth in the document of zoning regulations. (Royal Commission for Jubail

and Yanbu 1986) Since this Commission is responsible only for Jubail and Yanbu, these procedures will not be discussed here as they are specific in nature.

3.3.2 Land Subdivision Regulations:

Analytical study of planning legislation in the Kingdom reveals that those regulations are issued by three authorities in the Kingdom which are listed below:

1. Land Subdivision regulations for all cities and towns by Ministry of Municipal and Rural Affairs.
2. Land Subdivision regulations for all industrial estates by Ministry of Industry and Electricity.
3. Land subdivision regulations for industrial cities of Jubail and Yanbu by Royal Commission for Jubail and Yanbu.

3.3.2.1 Land Subdivision Regulations for all cities and Towns by Ministry of Municipal and Rural Affairs and other Governmental Agencies:

The available legislation about land subdivision regulations is not comprehensive and scattered in various documents. This section will discuss the available legislation as follows:

1. Design Standards:

Through the analysis of land subdivision regulations it was found that the only available design standards are in scattered forms and were issued for particular cases by the ministries.

According to the Law of Roads and Buildings article 21 and 23 which were amended by the Ministers Council decision number 1270 in 12/11/1392/1972, stated that it is possible to transform open land, planted or built, into plots for construction; they should technically be distributed according to specific rules. It is not allowed to sell part or parts of the land mentioned above except after making the necessary sub-division. According to section eight in the Law of Roads and Buildings, it is not allowed to construct any building in open land before the subdivision has been approved. Also Sharia Courts and the Courts Clerks are not allowed to prepare any official document for the transfer of ownership of distributed land under the rules, unless it is according to an approved subdivision showing the location and limits of the plot and its measurements as well.

According to the Law of Roads Buildings section two articles 21 and 23 (after amendment) stated that subdivision plans should be arranged with the master plan organization and the regulations of the Law of Roads and Buildings. Subdivision plans should consider that streets are to be systematic and well placed to match the neighbouring streets and roads, and

that their width should not be less than the following:

- 15m. For main roads in big cities.
- 12m. For secondary roads in small towns.
- 6m. For link roads and lanes in the big cities.
- 5m. For link roads and lanes in the small towns.

According to the Law of Roads and Buildings article 21 after its amendment by the Council of Ministers decision number 1270 in 12/11/1392H/1972, the landlord will not be compensated for the parts cut for the construction of streets, roads, gardens and public squares if they do not exceed 33% of the whole subdivided area but he is to be compensated for any additional percentages by the municipality concerned according to the estimated price for each square meter before subdivision.

In addition, there are certain directives of Ministry of Municipal and Rural Affairs considering the design standards. These directives are analysed as follows:

a) Directive number 118/5 in 20/4/1394H/1974 required to provide an area of 100m x 100m for girls school in each subdivision.

b) Directive number 274/5 in 29/8/1394H/1974 required to provide as minimum the following areas for boys schools:

Elementary School	80 m x 100 m
-------------------	--------------

Intermediate School	100 m x 100 m
Secondary School	100 m x 120 m
Teaching Institutes	100 m x 120 m

c. Directive number 161/5 in 7/5/1395H/1975 required to provide minimum area for playground as 50 m x 75 m.

d. Directives number 9882 in 24/10/1396H/1976, 992/H in 26/1/1397H/1977, 321/5 in 27/11/1397H/1977, 2746 in 2/5/1401H/1981, 940 in 3/3/1403H, 208/5 in 17/7/1403H/1983, 366/5 in 28/11/1403H/1983, and 19/5 in 23/4/1406H/1986 required the provision of enough number of mosques with a suitable area and dominant location, in addition to two plots for the houses of the Imam (who lead prayers) and Muathen (who call for Prayers).

e) Directives number 187/5 in 23/6/1394H/1974 and 7538/H in 20/7/1397H/1977 were required to provide the suitable location of the clinics and the ideal area of each clinic will be 100m x 100m.

f) Directive number 4322 in 12/8/1401H/1981 required the provision of a minimum area of 100m x 100m for fire stations. Review of design standards reveals that they are too brief and do not mention any thing in detail about streets, blocks, lots, building lines, utilities casement, public uses, minor subdivisions etc.etc..

2. Improvement Requirements:

In some countries, the developer is committed to construct the infrastructure and street pavement at his own expense. In Saudi Arabia, the cost of such improvement is paid by the municipality and other agencies, from annual appropriations made available by the central government (MOMRA d 1980). That is true for all areas within the urban limit, whether residential, commercial and/or light industries areas.

According to the Law of Water and Sewerage Directorate which was promulgated by the Royal decree number 22 in 23/4/1391H/1971, providing and operating the water and sewerage network is the responsibility of Water and Sewerage Directorate.

In addition, directive number 44/5 in 13/2/1394H/1974 stated that the water and electricity supply is the responsibility of Electricity Corporation and Directorate of Water and Sewerage. Therefore, there are no regulations concerning the improvement of the land to be followed by the owner of any subdivision in Saudi Arabia as this work is instead carried out by the government agencies.

3. Plat Review Procedures and Adoption:

This element under land subdivision regulations is the only available comprehensive legislation in the Kingdom. This element was prepared at a time by the directive of Minister of Municipal and Rural Affairs number 340/5 in 20/10/1396H/1976

according to the Law of Roads and Buildings section two, paragraph 21 (after amendment) and in the directive number 340/5 in 20/10/1396H/1976; following procedure should be followed:

I. Applying and Application:

The landlord(s) will give the application of the land subdivision to the concerned municipality asking for the subdivision of the land. A typical copy of deed ownership sealed from the court is required.

II. The responsibility of the municipality toward the application:

Location of the land which wanted to be subdivided will be limited on the master plan of the city. The following are the reasons of locating the land on the master plan:

- A. To know if the land was subdivided or not.
- B. To know if the land is within the master plan or not.
- C. To know if the land is agricultural land or located within agricultural area.

If the municipality found that the land is located within the master plan, is not agricultural land, is not within agricultural areas, and has not been subdivided before, the landowner will be informed in writing the possibility of subdividing his land and he will be required to submit the survey plan showing the following:

- 1. Limits of concerned land.

2. All the natural physical features in the land or around it, such as, trees, springs, valleys, and etc.

3. All the construction in or around the land, such as all streets with their different levels and conditions, such as asphalted or not, all buildings with their conditions and heights, sewerage or water tank, electricity lines or utility networks, wells and their types, and lastly fences, gates and entrances.

If the municipality found that the land is agricultural land, within an agriculture area, and/or not within the master plan boundary, an approval to do so will be required from the Directorate of Agriculture in the same city, and the municipality will then send the case to the higher committee of planning for their approval.

In the case that the land was approved to be subdivided by all the concerned authorities, the municipality will inform the land owner to submit the following:

1. Original and two copies of the survey plan containing all the requirements (they were listed in directive number 340/5 in 20/10/1396H/1976.

2. Four copies of proposed subdivision with the same scale of the survey plan and fulfilling all requirements.

After the land owner submit the requirements, the municipality will do the following:

1. Checking with the survey plan to see if it meets all the requirements or not.
2. Checking on the field survey plan with the deed ownership. This was emphasized by the directive number 16/5 in 3/2/1405H/1984. In the cases where there is incomplete information in the survey plan the municipality will write to the landowner their remarks and ask him to complete the missing information.

When all the required information about the survey plan are completed, the municipality will identify the following:

1. Owners of properties surrounding the concerned land.
2. The auqaf (charitable foundations) properties that are neighbors to the concerned land.
3. The building lines according to the approved subdivision that surround the land, whether close to it or overlapping. Numbers and dates of these subdivisions should be written too.
4. Any properties or easement on the land.
5. Utilities passing through the land which are not visible. This was emphasized by the directive number 35/5 in 25/1/1401H/1980.

Then the municipality will send the case to the town planning department with the following documents:

1. Application of landowner asking the municipality to subdivide his land.
2. The approval of the Directorate of Agriculture to subdivide the land (if needed as explained).
3. The approval of the higher committee of planning (if needed as explained).
4. Four copies of the survey plan after the municipality shows the explained requirements and is signed by surveyor, head of land department, head of technical department and by the mayor of the municipality.
5. Four copies of the proposed subdivision.
6. A letter from the municipality indicating that the case was carried out as stated in the directive number 340/5 in 20/10/1396H/1976.

III. Responsibilities of the Town Planning Departments:

According to the directive number 340/5 in 20/10/1396H/1976, the Town Planning Department after receiving the case from the municipality will be responsible to check the requirements of the received documents. If they are incomplete the case will be returned to the concerned

municipality with the indication that parts are missing. If the case is completed as far as the municipality is concerned, the town planning department will carry out the following:

1. Study the location of the land and its relation to the master plan to identify the following:

- a) Land uses
- b) Densities
- c) Streets and their categories.
- d) Relations between the concerned land and the neighboring areas.
- e) Types of the residential (if the land is residential area or not).
- f) to identify any stipulations toward the development of the concerned land according to the master plan.

2. Study the relationship between the land and the approved neighboring subdivision, and any impact it will have on the neighboring land uses. Numbers and dates of the approved neighboring subdivision (whether mentioned within the survey plan or not) will be checked against records.

3. Visit the land to physically check the construction on the land.

4. Calculating types, numbers and areas of the facilities that are needed to serve the concerned land.

During preparation of the subdivision the Town Planning Department is required to arrange with concerned agencies about their facilities, as requested in the directives number 183/5 in 17/6/1394H/1974, 175/5 in 19/5/1397H/1977, 1807 in 2/5/1398H 1978, 1756/1/a in 19/11/1399H/1979, and 2490/1/a in 1/12/1402H/1982 to arrange with the police traffic about the design of streets, squares and location of the traffic lights, the directive number 11625/k in 21/12/1396H/1976 to arrange with the Electricity Corporation if the land is in their areas; the directive number 158/5 in 28/5/1403H/1983 to arrange with the Ministry of Education about the schools and their parking, and the directives number 81/5 in 21/3/1403H/1983, 127/5 in 15/4/1402H/1982, 81/5 in 21/3/1403H/1983 and 15/5 in 13/1/1407H/1986 to arrange with the Ministry of Communication about the preparation of the subdivision.

5. Prepare subdivision plat according to the technical procedure as in the appendix number 4 in the directive number 240/5 in 20/10/1396H/1976.

According to directives numbers 2035/4 in 15/6/1390H/1970 and 2220 in 25/3/1401H/1981 all plots in the plats should be numbered to solve difficulties while selling and documenting the lots in the court and municipalities. In the case of large subdivisions, the subdivision plat will be subdivided into sections, such as, A,B, C,...etc., plats in each section will be numbered in order. In case it is small, subdivision

there is no need for those sections.

6. Finally check the plat before the approval to be sure it is right in terms of technical and planning preparation and presentation and that all information is included.

IV. Final Approval of the Plat:

According to directive number 340/5 in 20/10/1396H/1976, Town Planning Department for the concerned area should send the prepared subdivision to the Deputy Minister of Town Planning for the final approval. It should contain the following documents:

1. Five copies of the subdivision plat.
2. A copy of Directorate of Agriculture's approval (if needed).
3. A copy of Higher Committee's approval (if needed)
4. A copy of the survey plan.
5. A letter asking the approval of the plan and explaining any remarks toward the plat (if any).

V. Responsibilities of Town Planning Departments after Final Approval:

According to directive number 340/5 in 20/10/1396H/1976, after the final approval the following duties should be carried out by the Town Planning Departments:

1. Write on the original that this plat was approved in such date and number. The plat should be registered in the plats record.

2. The original plat and all related documents should be kept in the technical file.

3. Refer the plat to the survey department to locate all points and dimensions of the subdivision for the preparation of execution plan as explained in appendix number 3 under the directive number 340/5 in 20/10/1396H/1976.

4. Refer a copy of the plat to the utilities engineer to locate the paths of the different utility lines.

In addition, there are five directives asking the authorities to follow a typical section for the utility paths for more satisfaction for avoiding wastage of time and money and for avoiding passage through properties. The following are the directives of Ministry of Municipal and Rural Affairs in this regard.

Directive Number 1815 in 2/5/1398H/1978.

Directive Number 910 in 4/3/1402H/1982.

Directive Number 198 in 22/10/1404H/1984.

Directive Number 112/5 in 13/5/1405H/1985.

Directive Number 188/5 in 22/7/1406H/1986.

5. Refer one copy of the plat for road engineer to locate cross-sections of the street and their levels to tie them to the existing ones with the consideration of a storm water network.

6. Refer one copy of the plat to the traffic engineer to locate the points and types of traffic lights, warning signs and ground signs.

Town Planning department is also responsible to deliver the following:

1. Three copies of the approved plat to the concerned authority and three copies of the execution survey plan.

2. One copy of the plat, one copy of the execution survey plan, and one copy of the utility paths to the Directorate of Water and Sewerage in the concerned area.

3. One copy of the utility paths and one copy of the execution survey plan to the electricity corporation in the concerned area.

4. One full copy (approved plat, utility paths, roads sections, traffic signs, and the execution survey plan) to the engineering department in the concerned area.

5. A copy of the approved plat and execution survey plan to any agency which has any facility related to it; for example one copy is to be submitted to the Ministry of Education, because it is responsible for the construction of schools in the subdivided land. There are individual directives emphasizing this last point. These directives are as below:

Directive number 5/5 in 5/1/1394H/1974
Directive number 66/5 in 10/3/1394H/1974
Directive number 74/5 in 20/2/1395H/1975
Directive number 200/5 in 24/6/1398H/1978
Directive number 145/5 in 12/7/1400H/1980
directive number 797 in 4/3/1401H/1981
Directive number 5132 in 25/10/1401H/1981

VI. Responsibilities of the Municipalities After Final Approval:

After the concerned municipality is informed by the town planning department about the approved plat, the following should be carried out by this municipality:

1. Inform the land owner and give him his own copy of the approved plat and the execution survey plan.
2. Keep one copy of the plat and the execution survey plan in the file.
3. Authorize the owner to fix the points of the whole subdivision according to the execution survey plan, and inform him that he is not allowed to sell or change any lot unless the fixing is complete in all of the land.
4. After the owner fixes all points of subdivision on the land, the municipality will check in the field. One copy of the plat and a copy of the survey plan with the signature

of the municipality indicating that all points of the subdivision are fixed on the land and they are correct to be sent to the court justice officer (the court person who legally approves buying and selling of land).

VII. Resubdivision of Existing Buildings:

There are two directives concerning the resubdivision of existing buildings. The first one with number 36/5 in 28/2/1400H/1980 concerns the procedures to be carried out with the land of any airport when it has been shifted. The following are the procedures:

1. The land of the old airport will be given to the municipality in which it is located.
2. The land will be subdivided and sold. The proceed of the land will be given to the municipality for it's projects.

The second directive with number 11761 in 19/9/1407H/1987 concerns the subdivision of existing residential campuses, the directive stated these campuses will follow the procedure of normal subdivision, as in directive 340/5 in 20/10/1396H/1976.

VIII. Amendment of the Subdivision:

According to directive number 340/5 in 20/10/1396H/1976, the amendment of the subdivision will follow the same procedure of any new subdivision, except that in the application the land owner should state reasons for the amendment. In addition, the approval of the Higher Committee

for Planning is necessary. On the basis of previous analysis of plat review procedures and adoption, it can be seen that it was prepared in a way to help both the subdivider and the concerned authorities. In addition, it is suggested that if the final approval is given by local planning authorities instead of the central authorities to avoid delays and centrality. In addition, local authorities (Directorates of Municipal and Rural Affairs) were empowered by the Decision of Minister of Municipal and Rural Affairs number 4018/6 in 26/11/1397H/1977 and 39/6 in 2/1/1398H/1978 to approve and revise the detail plans for their areas; the approval of subdivision plans is less important than the approval of detail plans. Local authorities should also be delegated powers for the approval of subdivision plans.

4. Periodical Review of Land Subdivision Regulations:

Through the analysis of planning legislation related to Ministry of Municipal and Rural Affairs, it was found that there is no available legislation asking the authorities for the review of the land subdivision regulations periodically.

3.3.2.2 Work of Consultants: Land Subdivision Regulations:

After the analysis of the available legislation about land subdivision regulations in relation the Ministry of Municipal and Rural Affairs and other governmental agencies. From the available planning reports adopted by the Ministry of Municipal and Rural Affairs the work of Consultants who prepared land subdivision regulation for particular cities

will be discussed as follows:

1. Design Standards:

Most of the consultants discussed this element comprehensively; they stated all design standards in relation to streets, blocks, lots, building lines, utility easements, public uses, minor subdivision, exceptions, planned unit development, and variances. (Ministry of Municipal and Rural Affairs, 1980).

2. Improvement Requirements:

Consultants did not discuss the element of improvement requirements. There are no requirements for the owner to make any improvements in the subdivision, such as grading and paving streets or providing sewer and water lines. (Ministry of Municipal and Rural Affairs 1980 D).

3. Plat Review Procedures and Adoptions:

According to most of the consultants, this element was proposed to follow the following procedures:

- a) Preliminary Subdivision Plan:
 - i) Submission of preliminary plan.
 - ii) Information on preliminary plan.
 - iii) Preliminary Review.
 - iv) Conditional Approval.

- b) Final Subdivision Plan:
 - i) Submission for final plan.
 - ii) Information on final plan.
 - iii) Final Review.
 - iv) Final Approval.
 - v) Filing of Final Plan.

Above mentioned procedure is not discussed in detail in the thesis as it applies to specific cities.

4. Periodical Review of Land Subdivision Regulations:

None of the consultants proposed the review of land subdivision regulations periodically or whenever needed.

3.3.2.3 Land Subdivision Regulations by Ministry of Industry and Electricity:

Through the review of all existing planning legislation related to Ministry of Industry and Electricity, it was found that there is no legislation concerning land subdivision. Existing subdivisions are found only in the master plans for particular industrial cities (estate), where the consultants subdivided all of the land which was reserved for the particular industrial estate. All subdivided land is to be improved and all basic utility services such as electricity, water, telephone, sewerage and storm water network provided by the Ministry of Industry and Electricity (Ministry of Industry and Electricity 1987).

3.3.2.4 Land Subdivision Regulations by Royal Commission for Jubail and Yanbu:

Royal Commission for Jubail and Yanbu is affiliated by the two local authorities, Directorate General for Jubail project and Directorate General for Yanbu Project. Each directorate prepares, approves and implements its own land subdivision regulations. These subdivision regulations for both cities are similar. Therefore, the land subdivision regulations for Jubail will be selected for the discussion here.

Directorate General for Jubail Project in 1986 published subdivision regulations of Madinat Al-Jubail Al-Sanaiyah. (Royal Commission for Jubail and Yanbu 1986). Hence, the discussion will be as follows:

1. Design Standards:

It was stated in the subdivision regulations for Madinat Al-Jubail Al-Sanaiyah, that the prepared subdivision of the applicants must complete the subdivision planning criteria. These criteria or design standards have already been discussed in detail in their report. (Royal Commission for Jubail and Yanbu 1986). Main headlines are listed here for reference:

1. Lot layout and dimensions.
2. Road classifications and planning criteria.
3. Pedestrian paths and bikeways.
4. Parks and recreational facilities.
5. Landscaping.

These headings will not be discussed, where they represent only the case of Jubail and Yanbu. But anyhow it can be seen that the Royal Commission for Jubail and Yanbu is the only agency which discusses the improvements requirements in a very clear and comprehensive detail and it does require the applicants to improve the subdivision.

3. Plat Review Procedures and Adoption:

According to the subdivision regulations of Madinat Al-Jubail Al-Sanaiyah, land subdivisions were classified into minor subdivision or major subdivisions. Minor subdivision is defined as any subdivision fronting on one or more existing streets, not requiring any new streets or public facility, or the extension of any street or public facility, and having no effect on any other lot or public improvement. A major subdivision is defined as any subdivision of land requiring any new street, public facility or right of way, or the extension of any street, public facility or right of way. (Royal Commission for Jubail and Yanbu 1986).

The subdivision regulations required that the process of minor subdivision shall be as follows:

1. Conceptual Subdivision.
2. Final Subdivision Map and Construction plans, if required.

The same will hold for major subdivision map, final construction plans and construction specifications.

It is a good idea to classify subdivisions into minor and major, so as to avoid lengthy process for the minor ones.

4. Periodical Review of Land Subdivison Regulations:

According to the subdivision regulations of Madinat Al-Jubail Al-Sanaiyah, the provisions of the subdivision regulations may be amended from time to time.

3.3.3 BUILDING CODES (REGULATIONS)

Building code is the third element under the Development Control. This element will be discussed according to the developed classification system for planning legislation in Saudi Arabia. This element mainly was classified as follows:

- A. Architectural
- B. Structural
- C. Plumbing
- D. Mechanical
- E. Electrical

Analytical study of planning legislation in the Kingdom reveals that these regulations are implemented under following three categories:

1. Building Codes for all cities and towns in the Kingdom except the industrial estates and the two industrial cities Jubail and Yanbu.

2. Building Codes for all industrial estates in the Kingdom.

3. Building Codes for the two industrial cities Jubail and Yanbu.

3.3.3.1 Building Codes for all Cities and Towns in the Kingdom Except the Industrial Estates and the Two Industrial Cities Jubail and Yanbu:

All available legislation about building codes are scattered in various directives and documents between the various governmental agencies. They are not in the form of comprehensive legislation, except very brief codes for the Region of Jizan prepared by a consultant. (Ministry of Municipal and Rural Affairs 198). Hence these codes of Jizan Region will not be discussed, as they do not represent the building codes for cities and towns in the Kingdom.

A. Architectural

A.1 Requirements Based on Occupancy

A.1.1 Measurement of height, length and width.

Analysing existing building codes, it was found that there are no building codes concerning the measurement of height length and width, except what is in the Law of Roads and Buildings which is as old as 1940's (see appendix)

A.1.2. Construction and Some Requirements.

Reviewing the existing building codes, it can be said that there are no codes concerning specific requirements of constructions to be provided, except what was required by various agencies. These agencies are the General Civil Defence

Administration who published 15 volumes concerning the safety regulations, and the Real Estate Development Fund who published two volumes for construction requirements to be followed by any applicant for the loans. A list of these codes are under 3.1.1.

A.1.3. Light and ventilation

Based on the existing building codes there are no codes concerning light and ventilation, except what are under section seven of the Law of Roads and Buildings. (see appendix)

A.1.4 Sanitation

Reviewing the existing building codes it was found that the only available codes about sanitation under section ten in the Law of Roads and Buildings. (see appendix) These codes are lagging behind in relation to the present technology.

A.2 Exits

It was found that the only available building codes relating to exits what were mentioned under section nine of the Law of Roads and Buildings. (see appendix). In addition, there are some fragmented codes about the exits in various volumes of safety regulations which were published by the General Civil Defence Administration. These publications are listed under 3.1.1.

A.3 Requirements Based on Type of Construction:

The Law of Roads and Buildings is also discussed the requirements based on type of construction under part nine. These requirements considered as very detailed and specific to particular uses. (see appendix).

In addition, according to directive number 268/5 in 29/8/1401H. (1981) of Ministry of Municipal and Rural Affairs, construction of ceilings with wood is prohibited. Furthermore, there are three directives of Ministry of Municipal and Rural Affairs concerning weather protection and "heat insulation". These directives as directive number 1713/1/4 in 6/11/1405H. (1985), 3137/4/f in 28/5/1407H. (1987) and 1073/4/wf in 19/2/1408H. (1987).

These directives asked the municipalities to insure the application of the heat insulation in all governmental buildings and multi story buildings either commercial or residential. It was also required that no building permission would be granted unless all the drawings of mentioned buildings showed types and specifications of the insulation material used. Municipalities were asked to follow the board of heat insulation which was issued by the GCC. (Gulf Cooperation Council).

A.4 Fire Projection

On the basis of section nine of the Law of Roads and Buildings and the two directives of Ministry of Municipal and Rural Affairs number 6210/2/D/Q in 16/9/1392H/1972 and 1522/1/A in 7/9/1405H/1985, particular codes concerning fire protection were discussed, under the instruction for gas tanks installations (see appendix). In addition, the fifteen volumes issued and published by the General Civil Defence Administration and one publication issued and published by the Saudi Arabian Standard Organization concerning fire protection codes. A list of these publications is under 3.1.1.

Architectural Code for Specific Uses:

There are architectural codes for particular uses as follows:

1. The directives of Ministry of Municipal and Rural Affairs number 1/1/1/3/q/15219 in 28/10/1386H. (1966), 1/1/1/4/d/1350/3 in 10/4/1388H. (1968) and 1/1/1/4/q/3463/3 in 12/g/1388H. (1968) based on the decision of Council of Minister number 602 in 19/7/1386H/1966 stated that the land owner who wants to build large buildings on their land located on the major streets are supposed to preserve the ground level or part of it for car parking. Directives also stated that the mayors of each municipality will define the major streets and will put the detailed specifications for these parking areas.

2. The directive number 4495/H in 24/4/1397H/1977 of Ministry of Municipal and Rural Affairs stated that there are regulations controlling the construction of hotel in terms of location, number and size of rooms. The directive required the concerned authority to ensure the implementation of these regulations while granting the building permits for hotels (see appendix).

3. The directives number 6/9 in 5/11/1399H. (1979), 138/3/5 in 20/2/1400H. (1980), 139/3/5 in 20/2/1400H. (1980), 157/3/5 in 26/2/1400H. (1980) and 158/3/5 in 26/2/1400H. (1980) mentioned particular points of the code to be provided in the following stores: (see appendix)

1. Butchery Store
2. Bakeries
3. Fish Markets
4. Grocery Stores
5. Restaurants
6. Dairy Stores
7. Dairy Manufacturing Rooms

4. On the basis of the directives number 999/1/4 in 11/7/1403H/1983, 24 in 7/1/1406H/1986 and 4/5 in 6/1/1407H/1987 of Ministry of Municipal and Rural Affairs and the interview with Al Dubaikhy (1988), there are building codes issues by the Organization of Al Amro Bil Maroof Woa Nahi Anil Monker to be imposed in particular uses.

These building codes concern the responsibility of Al Amro Bil Maroof Woa Nahi Anil Monker. These building codes are to be imposed on the following uses: (see appendix)

1. Closed Female Shopping Centers.
2. Female Tailors Managed by Female.
3. The Shops of Female Tailors Managed by Males
4. Wedding Places
5. Recreational Places
6. Commercial Centers
7. Gas Stations

5. The directive number 1813/1/5 in 10/9/1403H/1983 stated that the cement shops should be provided with particular requirements (see appendix).

B. Structural

B.1 General Design Requirements.

B.1.1. Walls and structure framing.

On the basis of reviewed existing building codes, there are no codes concerning walls and structure framing except what were mentioned in the Law of Roads and Buildings under section six (see appendix). These codes are very old and outdated for present technology.

B.2 Excavations and Foundations

It is also true for this element that there are no codes concerning the excavations and foundations except what was discussed under section six of the Law of Roads and Buildings. These codes discussed very minor points, which cannot be considered as codes for this element. (see appendix)

For the excavation and foundation codes the directives number 764/1/a in 29/5/1402H. (1982), 828/a in 1/7/1402H. (1982) and 1220/1/4 in 5/7/1405H. (1985) of Ministry of Municipal and Rural Affairs stated that the earth of the ground should be tested before any building is erected over it. (see appendix)

B.3 Steel

It was found that the only existing building codes related to steel structure what were published by the Saudi Arabian Standard Organization. (see 3.1.1.).

B.4 Buildings Revert to Fall

It was found that codes relating to building revert to fall are mainly the responsibility of Ministry of Municipality and Rural Affairs.

Therefore, Directives number 13982 in 26/9/1386H. (1966), 1/1/1/4/q 1944/3 in 26/3/1387H. (1967), 1/1/1/4/1/q/300/3 in 11/8/1388H. (1968), 3222/3 in 28/7/1389H. (1969), 89/5 in 28/3/1394H. (1974) and 3329/1/a in 23/10/1403H. (1983) of

Ministry of Municipality and Rural Affairs discussed the buildings about to fall and the procedures of pulling them down. (see appendix)

In addition, codes for buildings revert to fall are discussed under article 30 and 31 of the Law of Roads and Buildings.

C. Plumbing

Reviewing existing building codes it seems that plumbing codes are the weakest in relation to other elements of building codes. They are discussed under section ten of the Law of Roads and Buildings and in the three directives number 821/5 in 20/1/1391H/1971, 39/5 in 11/2/1394H/1974 and 151/5 in 24/1/1397H/1977 of Ministry of Municipal and Rural Affairs, but in very minor points and manner. (see appendix)

D. Electrical

The only available electrical codes are under section seven of the Law of Roads and Buildings. Two reports were published by the Saudi Arabian Standard Organization. These two publications discussed how to test and install electrical wiring in residential building..

In addition, there are published building codes of various governmental agencies. (see 3.1.1).

On the basis of previous discussion on building codes, the following points can be singled out:

i) There are many governmental agencies contributing to the preparation and implementation of the building codes.

ii) There is duplication of the work (Building Codes) because of large number of agencies involved.

iii) All available existing building codes are scattered between various governmental agencies.

iv) The available existing building codes are not comprehensive and there are shortages in many areas of the codes.

v) With this kind of scattering a developer and all professionals will be faced with many hurdles.

vi) The building codes were prepared for each use specifically, like bakeries, fish market, butchery store, etc. It is suggested to prepare the codes in more general way in order to be easily reviewed.

vii) Previous codes put penalty for a single action independently for some of them, but for the others penalties were not stated. (see appendix) This kind of legislation will confuse the authority. It was better if an independent section for penalties was written and discussed under the enforcement of development in the planning permission. In addition, in previous penalties, the fines were very small amount in comparison to the existing days, while the penalties were stated since 1940 which means almost 50 years ago. In addition the law governing municipalities and village which

was promulgated by the royal decree number m/5 in 21/2/1397H (1977) article 23/7 stated that the Municipal Council has the right to set fines which should not exceed S.R.100/-, and since this law or any other one did not limit the minimum fines, therefore the previous fines are valid.

3.3.3.2 Building Codes for all Industrial Estates in the Kingdom:

Ministry of Industry and Electricity is responsible for imposing building codes in all industrial estates in the Kingdom.

The analysis of the legislative documents related to building codes of industrial estates indicated that there are few points about building codes in addition to what was prepared by consultants for each particular industrial estate for implementing its master plan. These available points are mainly concerned with architectural and electrical codes. These codes are not well discussed by Ministry of Industry and Electricity. (Ministry of Industry and Electricity, I)

3.3.3.3 Building Codes for the Two Industrial Cities Jubail and Yanbu:

Building codes for both cities, Jubail and Yanbu, are the same. Therefore, the Royal Commission has prepared and published in 1986 in one separated volume the residential building codes. Since, the codes published by Royal Commission are only for Jubail and Yanbu, they do not represent other

cities and towns. The Jubail and Yanbu building codes will not be discussed here in details, as the Royal Commission discussed these very comprehensively under the following heads:

A. Architectural.

- A.1 Requirements based on occupancy.
- A.2 Exits.
- A.3 Requirements based on type of construction.
- A.4 Veneer.
- A.5 Roof covering.
- A.6 Wall and ceiling coverings.
- A.7 Garages and patio covers.
- A.8 Glass and glazing.
- A.9 Fire protection systems.

B. Structural.

- B.1 General design requirements.
- B.2 Masonry.
- B.3 Concrete.
- B.4 Steel.
- B.5 Wood frame construction.
- B.6 Excavations and foundations.

C. Plumbing.

- C.1 Materials and alternatives.
- C.2 General regulations.
- C.3 Drainage System.

- C.4 Vents and venting
- C.5 Indirect waste piping, wet vented systems and special wastes.
- C.6 Traps and interceptors.
- C.7 Plumbing fixtures, joints and connections.
- C.8 Water distribution.
- C.9 Rain-water systems.

D. Mechanical.

- D.1 Equipment general.
- D.2 Ducts.
- D.3 Comfort cooling.
- D.4 Fuel supply systems.

E. Electrical.

- E.1 Requirements for electrical installations.
- E.2 Ground conductors, branch circuits, feeders and calculations.
- E.3 Services and over - load protection.
- E.4 Grounding.
- E.5 Wiring methods and materials.
- E.6 Conducting for general wiring and raceways.
- E.7 Boxes, conduct bodies, fitting, cabinets, switches and panel - boards.
- E.8 Lighting fixtures, lamp - holders, lamps and receptacles.
- E.9 Appliances.

3.3.4 Planning Permission:

Analytical study of planning legislation in the Kingdom reveals that the planning permission is granted for Industrial cities of Jubail and Yanbu, for industrial estates and for all other cities and towns for the following agencies:

3.3.4.1 Planning Permission Granted by Ministry of Municipal and Rural Affairs and Other Organization:

The available legislation about planning permission is not comprehensive and scattered in various documents. This section will discuss the available legislation as follows:

Planning permits were discussed in the Law of Roads and Buildings under sections 4,6,11,12,14 and 15. Additional directives were issued to complement the Law of Roads and Buildings. The following legislation are extracted either from the Law of Roads and buildings or from various directives, which were issued from Ministry of Municipal and Rural Affairs unless otherwise stated. Thus, if the legislation is extracted from the Law of Roads and Buildings, it will not be mentioned as such. However, when the legislation described is according to directives, the number and date will be mentioned.

A. The Meaning of Development:

Any person who desires to construct, change the use of a building or carry out any excavations or earth fill related to construction of buildings on any major road, public square or

garden is not allowed to do so unless a building permit is granted from the concerned municipality. This is true for governmental buildings too according to the directives number 1/1/1/4/2/d/3057/3 in 17/10/1387H. (1967) and 684/4/d in 25/2/1390H. (1970).

Directives number 2/1/1/4/2/w/6714 in 20/8/1387H. (1967), 3708 in 23/2/1388H. (1968), 1572/222 in 12/4/1396H. (1976) and 4770/5 in 18/12/1398H. (1978) stated that planning permits will not be given in the villages or settlements that are not occupied by a satisfactory number of people due to the high cost of providing infrastructure. On the other hand, there are villages and settlements with a reasonable number of people that are still without plans. In the first case municipalities are not allowed to grant permits; in the second application should be submitted to the municipality nearest to the village or settlement.

B. Application for Planning Permission:

The applicant for planning permission should submit an official petition to the concerned municipality. According to the directive number 2999/4/d in 4/9/1390H. (1970), the applicant should also submit with the petition a preliminary design to show the location of the land and the surrounding streets. The Municipality should then send this preliminary design to the Town Planning Department to get its opinion about the project. The Town Planning Department should inform the municipality about the regulations to be followed and

requirements to be met in order to erect the project. The municipality will then inform the applicant to produce the final drawings.

When the applicant comes with the final drawings, the municipality must (according to the Law of Roads and Buildings and directives number 173/5 in 10/5/1396H. (1976) and 99/5 in 10/4/1403H (1983)) investigate and confirm the ownership of the building which will be constructed or maintained as well as the land. It must also insure the correctness of the area, surrounding streets, and neighboring buildings depicted on the drawings. If the land is owned by any governmental agency, citizens will not be permitted to build on it unless a written document is produced from the concerned agency. For example, if a person wants to build a mosque on land owned by the Ministry of Interior, the written document to be submitted by the citizen should be from the Ministry of Interior giving its permission.

Through the analysis of the legislation related to the procedure for application for planning permission, the following elements are discussed:

1) Examination of the Final Drawings:

The Law of Roads and Buildings and the directives listed below outline the details the of the drawings to be submitted:

Directive number 1/1/1/4/8328 in 27/5/1386H. (1966).
Directive number 1/1/1/4/1/14599 in 11/10/1386H. (1966).
Directive number 1/1/1/4/302/3 in 2/2/1387H. (1967).
Directive number 1651/3 in 25/5/1387H. (1967).
Directive number 2/1/4/2/6287/3 in 29/3/1389H. (1969).
Directive number 155/5 in 28/4/1397H. (1977).
Directive number 3398/4/n in 23/1/1390H. (1970).
Directive number 391/5 in 28/11/1396H. (1976).
Directive number 77/2/1397H. (1977).
Directive number 71/5 in 28/3/1399H. (1979).
Directive number 1139/1/a in 12/8/1403H. (1983).
Directive number 1468/1/a in 22/8/1405H. (1985).

An applicant for planning permission should submit the drawings for the project in metric scale. These drawings should satisfy all the regulations of the zoning ordinance, land subdivision regulations and building regulations. Also, these drawings should be drawn by an engineering office, registered to a branch of the Trade Ministry in the Kingdom of Saudi Arabia. The municipality is responsible for the examination of previous requirements.

ii) Supervising Engineer:

According to the directive number 756/1/a in 4/5/1404H. (1984) the applicant for the permission should provide a contract between him and a registered engineering office to supervise the construction of the building. This contract is required only for large projects which need direct supervision

from a professional for the purpose of the construction's safety. The engineering office will be responsible for the construction's safety and answerable to the municipality.

iii) Duration of the Planning Permission:

According to the directive number 1/1/1/4/1/eg/14610 in 1386H. (1966) the municipality should indicate on the permit its duration. The permit is valid for three years provided that construction is begun in the first year. Directive number 840/4/b in 11/3/1390H. (1970) stated that the owner should apply for renewal of the permit. According to the Law of Roads and Buildings, the maintenance permit will be valid for six months from the date of issue.

iv) Construction and Maintenance Fees:

It was found that the construction and maintenance fees were discussed in detail under article 131 upto 151 of the Law of Roads and Buildings. Moreover, the Law Governing Municipalities and Villages which was promulgated by the Royal Decree number M/5 in 21/2/1397H/1977 empowered the Municipal Council to determine the fees that they should not exceed 100 S.R.

Apparently, the mentioned fees in the Law of Roads and Buildings look unreasonable but, according to the Law Governing Municipalities and Villages which was promulgated by Royal Decree number m/5 in 21/2/1397H. (1977), article 23 phrase 7 enabled the municipal council to determine the fees

and fines and that they should not exceed 100 S.R. In the same law, article 49 phrase 3 stated that this law will cancel any rules, decisions and ordinances that contradict this law. Since this law did not determine the minimum fees and fines, the fees which were determined in the Law of Roads and Buildings under section 12 are valid because they do not contradicting the Law Governing Municipalities and Villages.

v) Places Exempted of Fees:

According to the Law of Roads and Buildings section 15 which was complemented by directive number 1112/4/d in 10/3/1392H. (1972) the following places are exempted of fees:

- a) Government centers.
- b) Mosques and endowment buildings.
- c) National and private schools.
- d) Benevolent public wells.
- e) Charity hospitals and all projects meant to be for charity purposes.

vi) Refunding the Fees:

According to directive number 1/1/4/1/m/1660/3 in 15/4/1389H. (1969) once a permit has expired and the applicant has not used it, the fee will not be refunded. If he wants to renew it, he must pay again for the renewal of the permit.

vii) Renew or Reissue for the Lost Permission:

According to directive number 332/5 in 16/9/1395H. (1975) and 8/5 in 6/1/1396H. (1976) it is not allowed to renew the permit before the expiration date. If the applicant lost the permit and asks for another one, the municipality is supposed to re-issue one according to the original and write in red ink exact copy of original which is lost. The applicant will not be charged another fee because the lost one is still valid.

Special Planning Permits:

There are some uses of which permits can not be issued without the approval of another agency, either before or after the approval of the municipality, (usually before). The following is a list of the uses that require special permits.

a. MASJIDS (mosques):

According to the directives number 104/3 in 15/3/1393H. (1973), 104/5 in 15/3/1393H. (1973), 181/5 in 12/6/1394H. (1974) and 37/5 in 27/2/1400H. (1980) municipalities are not allowed to process the planning permits for Masjids unless the applicant gets approval from the Ministry of Hajj and Auqaf (Pilgrimage and Charitable Foundations).

b. Historical and Important Ancient Buildings:

According to article 13 of the Law of Archaeology which was issued by Royal Decree under number m/26 in 23/6/1392H. (1972), directives number 877/2/f in 24/8/1398H. (1978), and 242/5 in 2/12/1400H. (1980), municipalities are not allowed

to grant planning permission for the maintenance of buildings or construction of new buildings if the concerned building is part of or near historic or important ancient areas unless the applicant discusses the project with the Department of Archaeology in the concerned area and get their approval. Department of Archaeology works under the administrative control of Directorate of Education. The above requirement is different in practice. First, when an applicant asks for a planning permission, from whom the Municipality will know that this application should be approved by the Department of Archaeology, as they do not have any indication that this application is for historic building or located within or near historic area. Secondly, the Municipality may decide that this application should be approved by the Department of Archaeology. Later on the Department of Archaeology may find that the concerned area is not located in or near the historic site. This way the applicant is given a hard time and his time is wasted for nothing. Department of Traces is also given hard time by referring unrelated applications. Thirdly, the Municipality may grant planning permission to an applicant, on the belief that his application has no relation with the historic site, while in actuality the site might be related to historic aspect. This way an important historical site might be damaged.

Hence, it is suggested, that the historical buildings and sites be located on a map and listed in a written for every city and village for the guidance of planning officers.

c. Industrial Construction:

According to directives number 229/5 in 24/6/1396H. (1976), 504/1 in 8/2/1398H. (1978), 232/5 in 1/8/1402H. (1982), 256/5 in 18/12/1405H. (1985), 40/5 in 9/2/1406H. (1986), 245/5 in 13/5/1406H. (1986) and 99/5 in 28/4/1407H. (1987), Municipalities are not allowed to grant planning permission for industrial construction unless the applicant gets the approval from the Ministry of Industry and Electricity. Drawings should also be approved by the Research and Industrial Development Center in Riyadh or any branch of it.

Industrial construction is recognized in the directive number 23215 in 1/8/1402H. (1982) as any place prepared for industrial investment to turn raw materials into manufactured material or "half manufactured" material, or turn the "half manufactured" material into full manufactured material, and preparing full manufactured material for market by canning filling or packaging. Also according to this directive no new industrial projects with capital of less than 1,00,00 SR. will be allowed to be built inside an industrial city (estate). When the Ministry of Industry and Electricity forming a newly submitted project will exceed 1,000,000 SR. in capital it will require this project to locate in an industrial city (estate).

d. Hotels:

According to the law governing hotels which was issued by royal decree number m/27 in 11/4/1395H. (1975) under article 3

hotels can not operate unless an operation permit is granted by the Minister of Commerce and Industry (Ministry of Commerce since 1975), (Allam 1985) based on the recommendations of the Department of Hotels in the same Ministry. Under article 4 the building permit for a hotel must be obtained from the municipality of the city that the hotel is located in. Directives number 102/5 in 17/3/1396H. (1976), 49/5 in 28/7/1398H. (1978), 4203 in 5/8/1401H. (1981) and 4425 in 3/12/1402H. (1982) stated that the building permit will not be granted from the municipality unless the operation permit is granted from the Ministry of Commerce. According to the same law article 7 and directive number 4425 in 3/12/1402H. (1982) the private investor who has been granted the authorization to build a hotel should commence construction within a period of not more than one year from the date the authorization is granted. This period can be extended by the Minister for an additional six months. If the investor fails to comply with this provision, or brings the building process to an unnecessary close the authorization shall be withdrawn. If the investor wants to renew the building permit, a new operation permit from the Ministry of Commerce is needed.

According to directive 4495/h in 24/4/1397H. (1977), the following regulations and specifications should be considered when granting the operation and building permits. (These regulations and specifications were described in this research under building regulations (Architectural code for specific uses).

According to the directive number 73/5 in 22/2/1398H. (1978) it is prohibited for any person who has been granted a permit to construct a hotel to use the building for other uses.

According to the law governing hotel, penalties for breaching regulations could include closure of the hotel temporarily or permanently. If any investor (s) is punished with this penalty he can lodge an objection with Diwan Al Mazalim (the High Court of Appeal in the Ministry of Justice). The decision of Diwan Al Mazalim will be final.

e. Commercial and Service oriented uses:

There are different kinds of commercial and service uses. Municipalities have the authority to grant the permission whether these uses are allowed to be in a particular area or not. These uses need specific documents from various agencies, but there are two documents for all the uses which should be presented to the municipality if the applicant asks for renewal, of or new permission for, any commercial use. The two documents are:

1. Ownership deed or a renting contract for a store.
2. According to directive number 86/5 in 30/2/1395H. (1975) a certificate from Zakah Directorate (Zakah in Islam is 2.5% of the money that is saved or not used for one complete year and is given to the poor muslims) proving that he repaid the amount of zakah.

The following commercial uses must have prior approval from various agencies:

a. Information activities:

According to directives number 30/5 in 28/1/1402H. (1982), 1/5 in 1/1/1403H. (1983) and 14/5 in 13/1403H. (1983) any applicant who comes to the municipality for the permission to open any information activity (such as printing press, magazine, book store, recording, selling and renting films and videos and tape recorders, technical production establishments, news offices, information senders, advertisement offices, public relations offices, and publishing and distributing offices), the municipality is not allowed to grant such a permission unless the approval to open this business is granted by the Ministry of Information first.

b. Gas stations and car wash:

According to directives 4044/1 in 23/10/1387H. (1967), 1065/3 in 22/3/1388H. (1968), 928/1/a in 23/7/1402H. (1982), 1426/1/4 in 21/9/1400H. (1980), 686/1/a in 5/5/1401H. (1981), 639/1/a in 8/4/1405H. (1985) and 551/1/a in 22/5/1406H. (1986) municipalities are not allowed to grant the building permit for gas stations unless the approval of the General Civil Defence Administration is obtained. Police stations represent the General Civil Defence Administration in the towns that have no General Civil Defence Administration. The approval of the police station in these towns is acceptable to the municipalities. Municipalities are responsible to take a

pledge from the owner, when granting permits, to check with the Ministry of Commerce before running the station and have the meters checked. Directive number 215/ws in 3/6/1406H. (1986) asked municipalities not to grant building permission for gas stations and any other buildings that are near runways of airports, unless the approval is granted from the Ministry of Transportation first.

c. Surveying offices:

According to the directive number 184/5 in 17/6/1394H. (1974), any applicant opening for a surveying office should get approval from the Ministry of Commerce practising as a surveying office. The applicant should then apply to the concerned municipality for the permission to run this kind of business in such area.

d. Gas selling stores:

According to the directive number 193/5 in 21/9/1399H. (1979), municipalities are not allowed to grant compressed gas store permits unless the applicant brings an approval letter from the Gas and National Manufacturing Company.

e. Passengers and goods transport offices:

According to the directive number 173/5 in 16/6/1401H. (1981), municipalities are not allowed to grant the permission to open passenger and goods transport offices unless the approval from the Ministry of Transportation is granted first.

f. The permission form

After the municipality decides to grant permission to open any one of the commercial or service activities, standard form should be used by all municipalities. This is according to directives number 618/3/s in 5/11/1399H. (1979), 159/5 in 21/5/1402H. (1982), 4/5 in 6/1/1403H. (1983), 89/5 in 1/4/1403H. (1983), 1505/1/a in 5/4/1403H. (1983) and 221/5 in 24/7/1403H. (1983).

f. Poultry farm

According to the directive number 294/2/in 1/2/1392H. (1972) and 70/3/s in 4/2/1400H. (1980), municipalities are not allowed to grant building permits for poultry farms unless the applicant gets approval from the Ministry of Agriculture and Water first.

g. Edible salt projects

According to directive number 322/5 in 17/9/1393H. (1973) municipalities are not allowed to grant building permits for producing edible salt from sea water unless the approval is first granted from the Ministry of Petroleum and Minerals.

h. Land granted by the Ministry of Agriculture and Water

According to the directive number 319/5 in 15/11/1398H. (1978), municipalities are not allowed to grant any building permit for the construction on land which was granted by the Ministry of Agriculture and Water for the purpose of agriculture unless the approval is granted first from the

Ministry of Agriculture and Water or any one of its branches.

i. Buildings on the roads related to the Ministry of Transportation

According to directives number 127/5 in 23/6/1399H. (1979), 78/5 in 10/4/1400H. (1980) and 16/5 in 16/1/1403H. (1983), municipalities are not allowed to grant building permits for any building to be constructed on the roads that are related to the Ministry of Transportation unless the approval is granted first from the Ministry of Transportation.

j. Digging water wells

According to the directives number 305/5 in 10/11/1397H. (1977) and 151/5 in 24/5/1403H. (1983), municipalities are not allowed to grant permission for digging water wells, as granting these permit is the responsibility of the Ministry of Agriculture and Water. Municipalities are also required to get permission from the Ministry of Agriculture and Water if they want to dig water well.

k. Excavation and filling

According to the law of roads and buildings article 43 and the directives number 220/5 in 23/6/1393H. (1973), 103/5 in 20/3/1396H. (1976), 3/h/3434 in 26/2/1400H. (1980), 1325 in 1/4/1402H. (1982), 2368/1/a in 28/10/1402H. (1982) and 742/1/a in 24/5/1403H. (1983), final permissions for excavation and filling in the streets should be taken from the concerned municipality. This permission should be granted on standard

form as the approval of various concerned agencies are necessary, such as, the Electricity Corporation, Telephone Department, Water and Sewerage Department and Ministry of Transportation.

In addition to the previous uses, following uses need a permit from concerned agency prior to the approval of planning permission. Following uses were found through interviews with officials concerned:

a) Hospital and Pharmacies:

According to Ministry of Health requirements, any private developer has to obtain a permit from the General Department for Medical and Pharmacies Permits at the Directorate of Health Affairs (Branches of Ministry of Health) (Al Suwaidan 1988).

b) Wedding Halls, Closed Women Shopping Centers, Places of Women Tailors, Recreational Places, and any Places for Gathering:

Any person wants to practice or construct any kind of the above mentioned buildings has to obtain a permit from the Organization of Al Amro Bil Maroof Woa Nahi Anil Monker (Al Dubaikhya 1988).

C. APPEALS

According to the Law of Roads and Buildings article 34, any conflict that may arise between landlords and the building authority (municipality) while taking the necessary action the case must be studied by the municipality. After a decision is reached in this regard by the administrative council and the municipal council, the decision must be conveyed to the landlord. If the landlord feels that he has been aggrieved by the decision conveyed, this decision, together with the objection of the landlord, must be raised to the Royal Authority on condition that the objection period must not exceed 10 days time from the date it was conveyed. According to the Law Governing Municipalities and Villages which was promulgated by Royal Decree number m/5 in 21/2/1397H/1977, article 46, stated that any person adversely affected by a decision made by the municipal council or the municipality has the right to appeal to the Minister of Municipal and Rural Affairs.

Royal Decree number M/51 in 17/7/1402H/1982 outlines the role of Bureau of Appeals, where appeals can be lodged with the Bureau against any administrative decision. It means that legally and aggrieved person can appeal simultaneously to the Royal Authority, Minister of Municipal and Rural Affairs and the Bureau of Appeals according to the three legislations stated above. This will lead to confusions and conflicts. It is suggested to establish a hierarchy of authorities amongst Minister of Municipal and Rural Affairs, Bureau of Appeals and

the Royal Authority. (in the Kingdom, Judges were empowered to be the final authority in any case).

D. THE ENFORCEMENT OF DEVELOPMENT CONTROL

There are persons who do not care for or respect the law. They might carry out development without obtaining planning permission, or might not follow the permission accurately, or they might develop land owned by the Government or others. The Government, in order to stop these breaches and to insure the right of development, issued large number of directives in addition to the articles in the Law of Roads and Buildings. The word aggression will be used in the following discussion for any construction carried illegally on land that is owned by the Government or other owners. The following discussion is based on a large number of directives; hence, numbers and dates of all these directives will not be mentioned, as the directives are in the appendix.

a. Observation of Land and Removing Aggression Committee:

According to directive number 30815 in 27/10/1402H. (1982), a committee should be formed in each main Emirate (state) in each region of the Kingdom by the Prince (administrator governor) of the region or any person authorized by the prince of the region. In each region there can be more than one committee if needed. If there is more than one committee, each committee is to be assigned for a specific area. The Committee should be formed of highly qualified Saudis, consisting of one member as the head from

the Emirate, one member from the Police Station, one member from the Ministry of Municipal and Rural Affairs and one member from the Ministry of Agriculture and Water. At times a member from the Ministry of Transportation is needed. According to directive number 249/1/a in 13/2/1405H. (1985) if the aggression is on roads related to the Ministry of Transportation, it should be represented on the council.

This Committee is directly supervised by the Prince of the region. The Prince of the emirate or any person authorized by him could form a committee for any city in the region when there is a need. This committee will be supervised directly by the Prince of the city.

b. Treatment of aggression on land:

The aggression on land was divided into the aggression before 12/1/1385H. (1965) which is the date that the King requested there is the end of reviving of land and the aggression after 12/1/1385H. (1965).

Aggression on land (owned by private or government) before 12/1/1385H. (1965):

Following treatment will be applied to remove aggression on land before 12/1/1385H. (1965) if there is no permission from the owner:

1. Directive number 1/1/1/4/1/q/1246/3 in 22/4/1387H. (1967) stated that when one's house was built on land owned by another private person, and he has no other house, he will be given a free land from the government. This aggressor will be given limited time from the date he received the free land to remove the existing building on the aggrieved land. No compensation will be given to the aggressor for removing debris which he causes. If the aggressor set an agreement with the owner, it will be valid with the assurance that the building does not contradict building lines.

2. When approved, his house was built on land owned by the Government, he will be given this land with the removing of any construction or cut part of the land that contradict with the building lines.

3. When approved, his house was built on land owned by another private person, and he has another house, his aggression should be removed without any compensation for removing the debris, and no free land will be given to him. But if his aggression was carried on Governmental land and he has another house, this land will be sold to him at the decided value after the remove of what contradicts the building lines.

Aggression on land (owned by private or Government) after 12/1/1385H. (1965):

Directives number 194/5 in 12/10/1399H. (1979) and 87/5 in 28/4/1400H. (1980) stated that the following penalties will be followed for those aggressors on land not owned by them after 12/1/1385H. (1965):

1. An aggressor will be charged a fine of not less than 10,000 S.R. and not more than 50,000 S.R. or he will be imprisoned for 15 to 30 days, or both fine and prison if he repeats his aggression. The aggressor will be forced to remove his aggression immediately within 10 days from the date of being asked to do so. In case he refuses or delays removing his aggression, the concerned authority will do so and expenses will be taken from the aggressor as doubled.

2. Contractor or the owner of the tools will be charged a fine of not less than 2000 S.R. and not more than 10,000 S.R. and he will be in prison from one to two weeks, and all his tools used in the aggression will be impounded for two weeks.

3. If the aggressor is the contractor or the owner of the tools he will be penalized with the highest fine and his tools will be impounded for one month.

c. Aggression on land by the same owner of the land:

There are persons who breaches the law, either by carrying construction without obtaining any permission or will not follow the permission. These persons will be penalized.

According to the Law of Roads and Buildings articles 20/h, any building that is be constructed without securing permit is to be pulled down and the person who constructed it or was responsible for its construction should pay all charges. However, if the building is in harmony with other existing buildings in the area and there is no harm done in regard to the general welfare or to the neighbors, then it will be allowed to exist but the owner should pay one quarter of the total cost of the building as a penalty. This action is to be taken by the Building Committee. Directive number 191/5 in 24/6/1404H. (1984) stated, that since there are some concerned authorities not implementing the article 20/h from the Law of Roads and Buildings, the following procedures will be followed if any building was erected without obtaining building permission:

1. The Aggression Committee will serve an enforcement notice requiring the owner to stop the work on the building. A promise will be taken from the owner to stop the work until a legal permit is issued. The owner will be given only 10 days to obtain a building permit and submit it to the concerned authority.

2. After the owner applies for the permit, a technical committee will study the building and prepare a report to explain the harmony of the building with other existing buildings in the area and if there is no harm done in regard to the general welfare or to the neighbors, the opinion of

this committee should be stated in the report either to let the building exist with a penalty to be paid by the owner or to pull the building down.

3. The report of the Technical Committee will be directed to the Mayor to take the proper action.

If the building is a mosque, according to the directive number 1602 in 25/5/1407H. (1987), an arrangement will be made with the Ministry of Hajj and Auqaf (pilgrimage and charitable foundations). If this Ministry agrees to let the mosque exist, it will be on its own responsibility by the writing of a report to the concerned Municipality from The Ministry of Hajj and Auqaf.

In addition, enforcement of development was discussed under articles 35, 36, 43, and 121-130 of the Law of Roads and Buildings (see appendix).

According to directives number 328/5 in 10/9/1395H. (1975), 211/5 in 6/7/1398H. (1978), 218/5 in 18/7/1402H. (1982) and 44/5 in 15/2/1403H. (1983) one of the solution for aggression on land is to grant land for the landless people. These directives asked municipalities to prepare subdivision plans for land that will be granted to them. This kind of granting is considered as indirect control of development. Therefore the following discussion will be on indirect control of development.

On the basis of foregoing discussion on planning permission, it can be recognized that there are many governmental agencies participating in the granting of a planning permission. Most of these agencies require their approval before the final approval of a municipality to ensure the implementation of their regulations. It is suggested to shorten the process of obtaining a planning permission by excluding the stages of required approval of certain agencies, by delegating the approval powers to the municipal authorities only. For example the Organization of Al Amro Bil Maroof Woa Nahi Anil Monker (OOABNM) requires to get approval of the drawings prepared to the satisfactory of its regulations. OOABNM has no engineering department or even a single engineer to check the drawings; so if the requirements of OOABNM are given to the municipality, the municipality would make sure that these regulations are implemented.

3.3.4.2 WORK OF CONSULTANTS: PLANNING PERMISSION

After the analysis of the available legislation about planning permission in relation to the Ministry of Municipal and Rural Affairs and other governmental agencies. From the available planning reports adopted by the Ministry of Municipal and Rural Affairs the work of consultants who proposed planning permission for particular cities will be discussed as follows:

A. Meaning of the Development:

Most of the consultants in their proposals for planning permission stated that the construction of new private buildings is prohibited without planning permission. The same applies to prohibition for all extensions to existing private buildings unless the extension is very minor. The construction of permanent walls also requires planning permission (Ministry of Municipal and Rural Affairs 1981 P.62).

B. Application for Planning Permission:

It was stated by most of the consultants that this element will mainly include the following (Ministry of Municipal and Rural Affairs 1981 P. 31-32):

a) The form of application, and the site plan and information to accompany the application.

b) Power of local authority to require further information.

c) Power of local authority to grant, subject to relevant conditions, or to refuse planning permission, and the basis for making such decisions.

d) Regulation of period of validity of planning permission, for instance 3 years.

e) Obligation on local authority to give reasons for refusals and conditions, if any.

f) Obligation on local authority to certify that development has been carried out in accordance with planning permission.

g) Obligation on local authority to distribute to public written information explaining the system.

h) An established division of responsibility between regional office and the municipality for granting planning permission.

C. Appeals:

According to the proposed work of the consultants, appeals might usually discuss the following (Ministry of Municipal and Rural Affairs 1981 P.32):

a) Provision for appeals against municipality decisions.

b) General Progress towards the establishment of an Appeals Committee.

c) Procedure for such appeals.

D. Enforcement of the Development:

The proposed work of the consultants suggested the following to be discussed under the Enforcement of Development (Ministry of Municipal and Rural Affairs 1981 P.31):

a) Power of Municipality to prevent development being carried out without permission or in contravention of conditions.

b) Power to enforce landowner to rectify illegal development at his own expense.

c) Power of municipality to rectify illegal development at owner's expense if owner refuses to carry out the ordered work.

3.3.4.3 Planning Permission fully Granted by Ministry of Industry and Electricity in the Industrial Estates:

A. Meaning of Development:

Resolution number 15 in 14/11/1394H (1974) of the Council of Ministers approved the statement of the industrial policy of the Kingdom of Saudi Arabia. This provided for the adoption of the principle of compulsory licensing (permission) for industrial projects that exceed a certain size in terms of the invested capital, number of workmen or the production capacity. (Ministry of Industry and Electricity 1987).

More specifically, any new industrial project with an initial capital of more than one million Saudi Riyals must be constructed in an industrial city (estate). (Al-Nasser 1988).

B. Application for Planning Permission (Industrial Permits):

It was found that the most comprehensively and clearly discussed element is the application for industrial permit. This element differentiated the process of the application between projects if their capital less than one million Saudi Riyal and more than one million Saudi Riyal. In addition this element discussed all required documents to be produced in case of Saudi and foreign capital involvement in the project (Ministry of Industry and Electricity, I).

C. APPEALS:

Available legislation about the industrial planning permission related to the Ministry of Industry and Electricity, stated that in case industrial permit was refused the applicant may request the Minister of Industry and Electricity to look at his application. (Ministry of Industry and Electricity).

D. Enforcement of the Development Control:

Nowhere in the legislation related to planning permission on from the Ministry of Industry and Electricity, is there mention of any legislation related to the breach of planning control. Legally, violators cannot be stopped from carrying on the development.

3.3.4.4 Planning Permission fully Granted by Royal Commission for Jubail and Yanbu:

A. Meaning of the Development:

According to the regulations of the Royal Commission for Jubail and Yanbu, a building permit must be obtained from the city (either Jubail or Yanbu) before beginning any construction, extension, alteration, demolition, removal or conversion of any building anywhere in the city. A building permit is also required before making any installation, alteration, replacement or repair of any building service equipment regulated by the building codes. (Royal Commission for Jubail and Yanbu).

B. Application for Planning Permission:

Royal Commission for Jubail and Yanbu publish a pamphlet called building requirements for each city (Jubail and Yanbu).

Each pamphlet outline in detail the regulations and requirement related to issuing a building permit and to monitor the construction that is authorized by the building permit. (Royal Commission for Jubail and Yanbu 1986).

C. Appeals:

According to the review of Royal Commission for Jubail and Yanbu planning permission appeals were not discussed under planning permission.

D. Enforcement of Development:

Also enforcement of development was not discussed under the planning permission.

3.3.5 Compulsory Acquisition of Land:

Compulsory acquisition of land is the fifth element under the third major element "Development Control" of the proposed classification system. Compulsory acquisition is considered as one of the tools to implement and control the physical development. Thus, proceeding discussion will be based the following element of the proposed classification system:

1. Powers of compulsory acquisition of land.
2. Compensation payable on compulsory acquisition of land.

3. Appeals.

3.3.5.1 Power of Compulsory Acquisition of Land:

On the basis of analysed legislation this element will be discussed as follows:

- a) Competent authority for expropriation.
- b) Procedure of expropriation.
- c) Committee for compensation estimation (CCS).

A. Competent Authority for Expropriation:

In the Law of Roads and Buildings, under section one, the law authorizes the assigned committee to prepare a master plan for each city. Article 14 under the same section stated that if the matter necessitates removal of part of a building based on the map referred to in article 7 (the map prepared by the committees), the municipality must compensate the owner.

The Law of Expropriation which was issued by Royal Decree number 65 in 16/11/1392H/1972 stated that the decision to expropriate property is to be taken by a competent Minister.

B. Procedure of Expropriation:

Through the analysis of the documents, it was found that following instructions should be followed when the concerned authority is planning to acquire any properties:

A. The directive numbers of Minister of Municipal and Rural Affairs 317/5 in 25/11/1397H. (1977), 63/5 in 29/3/1400H. (1980), 492/w/z in 16/8/1400H. (1980), 146/5 in 22/5/1401H. (1981), 510 in 11/1/1405H. (1985), 58/5 in 13/3/1405H. (1985) and 59/5 in 13/3/1405H. (1985) stated municipalities are not allowed to implement any step of expropriation, such as, stopping the owner from doing any construction on his property or asking the Committee for Compensation Estimation (CCE) to carry out estimating the value of any property, unless the property to be expropriated is approved in the budget or approved by royal order.

B. According to the directive of the Minister of Municipal and Rural Affairs number 492/w/z in 16/8/1400H. (1980) and the Law of Expropriation, each municipality which wants to expropriate any property should prepare the data concerning each property individually, including location, area, boundaries, name of the owner, original ownership, whether granted or sold, deed ownership, and the estimated compensation. The data of the property should be filled in a standard form (see appendix), which was instituted by the Minister of Municipal and Rural Affairs by the directive number 506/w/z in 23/8/1400H. (1980). On the bases of the data, the Minister will agree on the expropriation of the property or not.

C. According to the Law of Expropriation, a copy of the expropriation plan detailing the present state of the property

to be expropriated and its location is to be appended to the expropriation decision.

D. According to the Law of Expropriation, the resolution of acquiring such property is to be published in the official gazette and in one of the daily newspapers circulated in the district where the real-estate concerned is located. Publishing of the decision is the legal invitation to the property's owners to submit their documents for compensation.

E. The directives of Ministry of Municipal and Rural Affairs number 52/5 in 9/2/1396H. (1976), 300/5 in 29/10/1397H. (1977), 11365 in 26/11/1397H. (1977), 97/5 in 9/3/1397H. (1977), and 132/5 in 4/5/1401H. (1981) stated that if any mosque or part thereof or part of any cemetery is being considered for expropriation, the subject should be presented to the judge in the court, for his decision.

C. Committee for Compensation Estimation:(CCE):

According to the law of expropriation, in order to compensate the owners for their properties, a committee made up of six, people is constituted. Four of the members represent respectively; 1) Emirate, 2) Ministry of Finance, 3) The Ministry or Department concerned, 4) The municipality. Two reputable experts of the utmost probity are appointed by the judge or the chief of the district court. Directive number 12/5 in 11/1/1397H (1977) stated that any member of the Committee for Compensation Estimation (CCE) who

directly or indirectly owns property to be estimated for compensation, should withdraw from the committee and another member will be assigned. If the property has already been estimated and it was then found that one or more of the Committee members owns such property or has a share in it, the estimate will be cancelled and a new estimate produced after new Committee members are installed. In addition, such members as were replaced will be prevented from getting the fees for that particular estimation.

According to the Law of Expropriation, the committee should prepare two documents; the first should show the type of property, its general description, buildings, trees, plants, wells, dams, name of owner, occupancy of the property, and all necessary drawings. It should be indicated if the property was granted or revived. If so, the signature of the committee is necessary. The second document should describe the estimated compensation, on what basis the estimate was made, and the signatures of the committee. Objections from any members should be stated with reasons, in the documents.

3.3.5.2 COMPENSATION PAYABLE ON COMPULSORY ACQUISITION:

Through the analysis of the legislation documents related to compensation, it was found that these documents could be discussed as follows:

- a) How to calculate (estimate) compensation.
- b) Re-estimate the value of the property which will be expropriated.

- c) Inform owners officially.
- d) Prepare of expropriation decisions.
- e) The compensation paid to the owner(s).
- f) Transfer of ownership.
- g) Limited period for the compensation to be collected.

A. How to Calculate (estimate) Compensation:

As stated by Deputy Minister of Municipal Affairs in directive number 108/5 in 18/3/1393H. (1973), any Governmental agency which needs to acquire any property, should estimate compensation for the property, whether the property is governmental or not.

The Law of Roads and Buildings, section one, article 11 and 12, Council of Ministers decision number 56 in 22/1/1393H (1973), and directive of Deputy Minister of Municipal Affairs number 173/5 in 11/5/1393H (1973) stated that if any property will be expropriated to widen a street, one arm (75 cm) will be taken free without compensation for the owner.

In addition to the Law of Roads and Buildings and the Law of Expropriation, three directives of Ministry of Municipal and Rural Affairs explained ways of calculating the estimate of compensation. These directives are, directive number 24/5 in 17/1/1395H. (1975), 27/5 in 23/1/1398H. (1978), and 96/5 in 13/3/1398H (1978).

Therefore, according to previous two laws and the directives the following should be considered by the committee while calculating the compensation:

I. The committee should consider the value of the acquired properties in the period of publishing the decision for expropriation. Any building and planting, etc. carried out after the decision to expropriate, will be not considered.

II. The CCE should take rent as indicator for estimating the value of the property, as the value of the property usually does not exceed 15 year's rent. If the property is occupied by the owner, the rent will be based on the surrounding building's rent if possible.

III. If the property is within the commercial area, no consideration will be given unless the property could have been used in that area before expropriation. For example, if the property is close to the commercial area but the use is restricted to residential, and after expropriation the municipality changes the use to commercial, the value of the estimate should not be increased because of the later change by the municipality.

IV. The committee should distinguish between mud buildings and reinforced concrete buildings, as some of the mud buildings are deserted and damaged; therefore, the committee should estimate only the used or useable parts.

V. If the value of the property which was not acquired, increased or decreased because of the expropriation, this increase or decrease should be considered while estimating compensation. It should be insured that the amount to be added because of decrease or to be deducted because of increased value not be more than half of the estimated value for the acquired part of the property.

VI. To implement the last stage (V), the following process should be followed:

i. The whole value of the property in total should be estimated in the first instance.

ii. The value of the part to be expropriated and the remainder (which is not to be expropriated) should be simply calculated from the whole value of the property as estimated at (i).

iii. A revised value of the non-expropriated property should be estimated taking into account the expected enhanced or reduced, value as a result of the project being implemented.

iv. The difference between these two estimated valuations of the non-expropriated property estimated at (ii) and (iii) is then added to or subtracted from, (if appropriate and following the procedure outlined in V above), the initial

value of the part to be expropriated. This will create either an additional compensation payment or an even settlement whichever is indicated.

VII. If property to be expropriated is land which has not been revived (Improved at onetime or another) wholly or in part, and the right attached thereto originates from iqta (granted land), the land owner should be compensated only on the part which has been revived as expropriation revokes unimproved lands. If the right attached to land is derived from tahajur (mere exploitation of land rather than revival of land), (Alrahman 1985), the owner should be compensated for exploitation rights and not ownership.

VIII. Having gone through the above mentioned stages, the CCE issues a resolution giving an exact definition of properties (complete or in part) subject to expropriation together with the corresponding compensation for each property making plain the share to be taken by each party. Then the committee should forward a copy both to the government agency carrying out the expropriation and to the owners as well.

B. Re-estimate of the Value of the Property Which Will be Expropriated:

The directive of Ministry of Municipal and Rural Affairs number 1869/4 in 3/5/1392H. (1972) and 129/5 in 2/4/1393H. (1973) stated that, once the value for the compensation is approved and put in the budget, it is not allowed to

re-estimate the value of the compensation, (except if it is found that members of the CCE own part or all of the land in question as indicated in directive 12/5 in 11/1/1397H (1977)). If the amount of compensation is not put in the budget or approved in such a budget for any reason, the compensation value should be re-estimated for the following year's budget.

C. Informing Owners Officially:

As stated in the Law of Roads and Buildings article 9, the Law of Expropriation, Ministry of Municipal and Rural Affairs directive number 13919 in 24/9/1386H. (1968) and Ministry of Municipal and Rural Affairs directive number 63/5 in 14/2/1397H. (1977), the designated authority should inform land owners through administrative procedure to vacate properties subject to expropriation orders and surrender the property to that authority in not less than thirty days from the notice being served. The surrender of the property should be recorded in a mandate. Sufficient copies as required should be made and signed by the committee and the owner(s) should then sign the mandate.

D. Preparation of Expropriation Decisions:

The directives of Ministry of Municipal and Rural Affairs number 60/5 in 13/3/1405H. (1985), 7/5 in 3/1/1406H. (1986), 166/b/t in 8/1/1406H. (1986) and 5/99 in 7/4/1406H. (1986) stated that no compensation of any expropriated property will be given to the owner unless particular forms are submitted to the Minister. (see appendix)

E. The Compensation Paid to the Owner (s):

According to the expropriation decision, the compensation shall be paid to the owner(s) through the concerned agency. As stated by Ministry of Municipal and Rural Affairs in the directives number 17/5 in 26/1/1399H. (1979) and 357/5 in 28/12/1401H. (1981) the compensation will be paid from the budget of the benefitted agency.

If the expropriated property is owned by any governmental agency, the compensation shall be paid to the Ministry of Finance and National Economy under the name of governmental ownerships; this is according to the directive of Deputy Minister of Municipal and Rural Affairs number 13/5 in 15/1/1395H. (1985).

If the expropriation is a mosque or part of a mosque, the compensation will be paid directly to the Ministry of Hajj and Auqaf (Pilgrimage charitable foundations). This is according to the decision of Council of Ministers number 59 in 2/4/1405H/1985.

The decision of Council of Ministers number 33 in 30/11/1406H/1986 stated that the private owner(s) could be compensated for their expropriated properties by the exchange with the housing units which were built by the Ministry of Public Works and Housing. In addition, the difference between the value of compensation for the expropriated property and the value of the housing unit will be considered.

F. Transfer of Ownership:

According to article 9 of the Law of Expropriation, the ownership of the expropriated property will be transferred to the government through the justice officers as the applicable regulations state.

G. Limited Period for the Compensation To Be Collected:

The directive of Ministry of Municipal and Rural Affairs number 65/m/5 in 12/2/1393 H. (1973) stated that the compensation for the expropriation will be cancelled if the owner(s) did not collect his compensation within three years from the date when he was told of the compensation.

3.3.5.3 APPEALS:

According to article 7 of the Law of Expropriation, if the land owner(s) has an objection to the resolution of the Committee for Compensation Estimation (CCE), then he must lodge an appeal to reverse this decision within a period of not more than thirty days from the date when he was informed of this resolution. His appeal is forwarded to a committee set up at the Ministry of Justice being composed of a judge as the head of the committee, a professional from the competent authority concerned and a representative from the Ministry of Finance. The decision of this committee is final and may adjust the compensation worked out by the CCE to ensure a fair compensation provided that the committee abides by the provisions of article (A) (How to calculate the value of compensation) under section (4) and applies them correctly.

The objection made by an owner shall not prevent the CCE from going ahead with the procedure to evict tenants from properties and handing them over to the authorities concerned. Again such objections shall not stand in the way of procedures to expropriate properties.

3.3.6 Financial Planning and Capital Improvement

Programming:

According to article 18 of the Law of Council of Ministers issued by Royal Decree number 38 in 22/10/1377H/1958, the Council of Ministers was delegated the power to approve annual budget of the Kingdom. The role of Ministry of Finance and National Economy was outlined by Royal Decree No.31 in 6/11/1375H/1954 which was based on planning financing and capital improvement programming. This ministry controls the budget allocation for all governmental agencies in the Kingdom.

II. Indirect Development Control:

Indirect development control is a major device under Development Control, where as discussed under the proposed classification system for Saudi Arabia, indirect development control is not a formal part of development control system. The writer on the basis of his studies of the development control system in the Kingdom felt that there were certain factors contributing indirectly to the development control system. These factors are discussed below:

3.3.7 Land Granting:

Land granting is one of the tools for indirect development control. The government grant land is always situated within the planning boundaries of the master plan. The land will not be leased to the applicant until and unless he gets legal planning permission. There are three kinds of grants namely:

- a) Grant for low income people for housing.
- b) Land granted for any investment project.
- c) Clear grants (grants not controlled by any conditions, area or place) (Al Hashim 1987).

The low income grants are subject to a number of conditions. These conditions are described in the directives number 286/5 in 14/10/1398H/1978 and the two amended directives numbers 147/5 in 22/5/1401H 1981 and 9751 in 29/8/1407H/1987, of the Ministry of Municipal and Rural Affairs (see appendix).

Preparation of the Low Income Subdivision Plans:

According to the directive number 6/5 in 7/1/1398H/1978, a subdivision plan should be provided only for the land to be granted to the low income people for quick disposal of the huge number of applications. Other grants should be referred to other subdivisions. Directive number 372/5 in 16/11/1396H 1976 stated that the following procedure is to be followed for the preparation of low income subdivision plans:

1. Figure the actual number of people to be granted land who have satisfied the previous conditions.

2. After figuring the actual number of applicants, the required area should be calculated by, multiplying the number of qualified applicants by 625 sq. m. (directive number 9751 in 29/8/1407H 1987) and then adding the required area for facilities and open spaces.

3. After the required area is figured, selection of the land is done in agreement with the Town Planning Department. Selection of the land should be from the Government properties to avoid acquisition costs.

4. The concerned municipality will prepare the survey for the selected location as described in directive number 2615/w/z 240/5/z in 20/10/1396H 1976. (see section 3.3.2.1)

5. The Municipality will send the surveys to the Town Planning Department with complete data asking them to subdivide the concerned land to be distributed to the qualified applicants.

3.3.8 The Real Estate Development Fund:

The real estate development fund (REDF) was established by Royal Decree number M/23 dated 11/6/1394H 1974. This law is considered as an indirect tool to control development. This law does not authorize funding unless building permission

is granted from the municipality. As mentioned earlier building permission will not be granted unless all regulations of the development are satisfied.

REDF requires that the applicant for the grant of loan should satisfy minimum standards outlined under the regulation. These regulations have been published by Ministry of Finance and National Economy under the title "Directory for Commercial Investment Loans", in 1983.

3.3.9 The Saudi Industrial Development Fund (SIDF):

This is the third tool of indirect development control. The government of Saudi Arabia grants loans for the industrial projects through the Saudi Industrial Development Fund (SIDF).

These loans are be given only for those who obtain industrial permission for the project (Ministry of Industry and Electricity).

The Saudi Industrial Development Fund (SIDF) was established by Royal Decree number M/3 in 26/2/1394H 1974, (Al Salum 1986). The SIDF was set up as a financial institution affiliated to the Ministry of Finance and National Economy to support and develop the national industrial sector in the Kingdom of Saudi Arabia. (Ministry of Industry and Electricity).

Investors who obtained industrial permission are entitled to apply for loans that amount to 50% of the total cost of the project including the initial operational capital. The period of settlement depends on the expected cash flow of the project noting that the maximum period for settlement is fifteen years (Ministry of Industry and Electricity)

3.3.10 Home Owner - Ship:(ARAMCO)

This is the fourth tool of indirect development control in the Kingdom.

ARAMCO contributes to the development control in the Kingdom indirectly through the program called "Home Ownership Program for Saudi ARAMCO Employers". The idea underlying this program is to grant long range loans for Saudi ARAMCO, in order to grant any loan. The applicants are required to get a permit for these loans. The requirement of permit is to ensure the application of building regulations. (Al Talha 1988).

3.4 Overall View of Urban Planning Legislation in Saudi Arabia:

On the basis of the previous analysis, we could summarize urban planning legislation in diagram 3.1. If we look at the diagram horizontally, we can notice that there are various governmental agencies that are involved in the process of urban planning. However, these agencies lack coordination amongst each other. Therefore, it is recommended that there ought to be a higher coordination commission at the central

level as well as at the local level.

The diagram shows also that some of these governmental agencies are involved directly in the development of physical plans. However, this kind of individual efforts with minimum coordination between them leads to variation in the overall urban fabric. Therefore, it is suggested that these agencies should refer to the physical plan of the Ministry of Municipal and Rural Affairs prior to any action with respect of their own individual schemes.

Concerning development control, the diagram 3.1 illustrates that there are overlapping interests resulting in repetitive and contradictory building codes. Upon producing a uniform building code, it is advisable to solve such conflicts of interests among various agencies that are involved in producing individual codes so such uniform building code can be established an essential tool to control development.

On the other hand, when we look at the diagram vertically, we detect that it is the Ministry of Municipal and Rural Affairs which is the most frequent governmental agency involved in physical planning and development. Yet its participation role in building code is moderate. We strongly recommend the Ministry of Municipal and Rural Affairs, due to its strong involvement in physical planning and development, to be the principal governmental agency in coordinating between other agencies concerning the uniform building code as

well as matters concerning overall physical development, centrally and locally.

We highly recommend that those governmental agencies involved in the physical development process, namely Ministry of Industry and Electricity, General Civil Defence Administration, Ministry of Public Works and Housing, Ministry of Defence and Aviation, Presidency of National Guard, Ministry of Education, Ministry of Higher Education, Ministry of Health, Ministry of Haj and Auqaf, Ministry of Post, Telephone and Telegraph, ought to cooperate with the Ministry of Municipal and Rural Affairs as the principal coordinator in term of physical development.

Diagram 3.1 Overall View of Governmental Agencies involved in Urban Planning Legislation in Saudi Arabia.

	Ministry of Municipal and Rural Affairs Ministry of Industry and Electricity Ministry of Agricultural and Water General Civil Defence Administration Al Amro Bil Marooif Waa Nahi Anil Munker Ministry of Finance and National Economy Ministry of Planning Ministry of Commerce Ministry of Public Works and Housing Ministry of Defence and Aviation Presidency of National Guard Ministry of Education Ministry of Higher Education Ministry of Health General Presidency of Girls Education Ministry of Haj and Arafat Ministry of Post, Telegram and Telephone Royal Commission for Jubail and Yanbu Arabian American Oil Company (ARAMCO) Ministry of Justice Bureau of Appeals															
Administration of Planning																
Central Authorities	○	○				○	○	○	○	○	○	○	○	○	○	○
Local Authorities	○	○	●	●	●	○	○	○	○	○	○	○	○	○	○	○
Development Plans																
National Settlement Plans																●
Regional Plans																●
Master Plan				●	○				○							●
Execution Plan																●
Action Area Plans			●						●	●	●					●
Project Planning			●			●	●	●	●	●	●	●	●	●	●	●
Development Control																
Direct Development Control																
Zoning Ordinances				●								○			○	○
Landsubdivison Regulations				●	○	○	○	○	○						○	○
Building Codes			○	●		○	○	○	○		●	●		○	○	○
Planning Permission				●		○	○	○	○			○			○	○
Aquisition of Plans					○	○	○	○	○		○				○	○
Financial PING & CAPL. IMPT. PROG.														●		
Indirect Development Control																
Land Granting																●
Real Estate Development Fund														●		
Saudi Industrial Development Fund														●		
Home Owner-ship: ARAMCO			●													

● Strong

● Moderate

○ Partial

CHAPTER FOUR

CONCLUSION AND RECOMMENDATIONS

4. CONCLUSION AND RECOMMENDATIONS

4.1 Conclusion:

Throughout the Kingdom of Saudi Arabia, the rapidly increasing population and national economy has resulted in very rapid urban development. This rapid urban development was accompanied with some problems. In an effort to deal with physical development and manage urban growth, the government stepped in and established the governmental agencies and special authorities and delegated them with the necessary powers and duties.

These agencies followed up the physical development of the Kingdom as it progressed, and carried on the work of development control with the help of planning legislation, issued through Royal Decrees and Ministerial Directives and decisions.

The planning legislation had a number of features as it was developed in a piecemeal form for particular cases and then applied to others. It lacked comprehensiveness was fragmented among several governmental agencies, and lacked coordination against related agencies. As such, development of planning legislation did not keep pace with the rapid development that took place in all spheres of life in the Kingdom.

The above mentioned features showed the necessity for evaluation and development of urban planning legislation in

the Kingdom. To satisfy this need for evaluation the development of an information system is essential. The research accomplished two objectives firstly, it determined criteria for classification system for planning legislation in Saudi Arabia, and secondly, it classified existing planning legislation in the Kingdom of Saudi Arabia.

The first objective of this study was accomplished through extensive review of the urban planning legislation in the United Kingdom and the United States, where a set of criteria were created. Given the experience of developed countries and the conditions of Saudi Arabia, this research proposed the following classification system for urban planning legislation in Saudi Arabia.

1. Administration of Planning:

- A. Central Authorities.
- B. Local Authorities.

2. Development Plans:

- A. National Settlement Plans
 - i) Preparation and approval of national settlement plan.
 - ii) The national settlement plan documents.
 - iii) Periodical review of the national settlement plan.
 - iv) Alteration, repeal or replacement of national settlement plan.

B. Regional Plans

- i) Preparation and approval of regional plan.
- ii) The regional plan documents.
- iii) Periodical review of the regional plan.
- iv) Alteration, repeal or replacement of regional plan.

C. Master Plans:

- i) Preparation and approval of master plan.
- ii) The master plan documents.
- iii) Periodical review of the master plans.
- iv) Alteration, repeal or replacement of a master plans.

D. Execution of Plans:

- i) Preparation and approval of execution plan.
- ii) The execution plan documents.
- iii) Periodical review of the master plan.
- iv) Alteration, repeal or replacement of execution plan.

E. Action Area Plans.

- i) Preparation and approval of action area plan.
- ii) The action area plan documents.
- iii) Periodical review of the action area plan.
- iv) Alteration, repeal or replacement of action area plan.

F. Project Planning

3. Development Control:

I. Direct Development Control:

A. Zoning Ordinance:

- i) Preparation and adoption of zoning ordinance.
- ii) Documents of zoning ordinance.
- iii) Amendment of zoning ordinance.

B. Land Subdivision Regulation:

- i) Design Standard
- ii) Improvement Requirement
- iii) Plat Review Procedures and Adoption.
- iv) Periodical Review of Landsubdivision Regulation.

C. Building Code (Regulations)

- i) Architectural
- ii) Structural
- iii) Plumbing
- iv) Mechanical
- v) Electrical

D. Planning Permission:

- i) Meaning of development
- ii) Application for planning permission.
- iii) Appeals
- iv) Enforcement of development control.

E. Compulsory Acquisition of Land:

- i) Power as to compulsory acquisition of land.
- ii) Appeals.

F. Financial Planning and Capital Improvement
Programming:

II. Indirect Development Control:

- i) Land Granting
- ii) The Real Estate Development Fund (REDF).
- iii) The Saudi Industrial Development Fund (SIDF).
- iv) Arabian American Oil Company (ARAMCO) (Owner-ship).

The second objective of this research was satisfied through the detailed review and analysis of the working of all governmental agencies related directly or indirectly with the field of urban planning in Saudi Arabia. The analysis of the planning legislation has been done on the basis of the proposed classification system in this study.

Reviewing the role of governmental agencies in the Kingdom it was found that many of the reviewed governmental agencies contribute to the physical development in Saudi Arabia at national and local levels and thereby participate in the planning legislation. Table 4.1 Summarizes these findings.

Table 4.1 Inventory of the Governmental Agencies
Contributing to the Physical Development
in Saudi Arabia.

Type of Development	Governmental Agencies
Physical development within the boundaries of all industrial estates in the Kingdom.	Ministry of Industry and Electricity.
Physical development within the boundaries of the two industrial cities, Jubail and Yanbu.	Royal Commission for Jubail and Yanbu.
Physical development within the boundaries of particular projects, (Project Planning, for detail see Chapter-III of this research) such as, housing, military bases, schools, hospitals , university Campuses, airports. Each agency is responsible for its own particular projects.	<ol style="list-style-type: none"> 1. Ministry of Public works and Housing. 2. Ministry of Defence and Aviation. 3. General Presidency of National Guard. 4. Ministry of Education. 5. Ministry of Higher Education. 6. Ministry of Health. 7. General Presidency for Girls Education. 8. Ministry of Haj & Auqaf. 9. ARAMCO.

Table 4.1 (Continued)

Type of Development	Governmental Agencies
Physical development in all the Kingdom except what was mentioned above.	<ol style="list-style-type: none"> 1. The Council of Ministers 2. Ministry of Municipal and Rural Affairs. 3. Ministry of Industry and Electricity. 4. Ministry of Agriculture and Water. 5. General Civil Defence Administration. 6. Organization of Al Amro Bil Marof Wea Nahi Anil Al Monker 7. Ministry of Finance and National Economy. 8. Ministry of Planning. 9. Ministry of Commercial. 10. Ministry of Public works and Housing. 11. Ministry of Defence and Aviation. 12. General Presidency of National Guard. 13. Ministry of Education. 14. Ministry of Health. 15. General Presidency of Girls Education. 16. Ministry of Haj & Auqaf. 17. Ministry of Post, Telephone and Telegram. 18. ARAMCO. 19. Ministry of Justice. 20. Bureau of Appeals.

In view of the previous governmental roles and through the developed classification system, the planning legislation practice was analysed and evaluated, the following are the major findings on each planning legislation element.

i) There are many governmental agencies contributing to the field of urban planning at the central and local levels in the Kingdom.

ii) There is very little coordination between all involved governmental agencies in the field of urban planning.

iii) Many governmental agencies are doing the same work at the same time which leads to duplication and conflicts, such as in building codes (for detail see chapter three and diagram 3.1).

iv) Local authorities are acting as executive authorities, while in other organizations local authorities are engaged in supervision.

v) Lack of clear definition of the limits of powers between and within the governmental agencies create conflicts, contradiction and overlapping of authorities.

4.2 Recommendations:

From the previous review and analysis, this research proposes the following recommendations:

1. This research showed that there is a lack of scientific classification for urban planning legislation in Saudi Arabia. Therefore, it is highly recommended that the proposed classification system in this research be adopted.

2. Further research is suggested to utilize the findings of this research for evaluation and improvement of existing urban planning legislation.

3. Establish a High Committee for Urban Planning and Development Control to control all physical development in the area.

4. Local Authorities should be given wider powers rather than executives power only.

5. Reduce the number of governmental agencies that are involved in the field of urban planning by limiting particular practice of planning legislation to certain agencies, as for example, the Organization of Al Amro Bil Maroof Wan Nahi Anil Al Monker is involved in the issuing of building codes and in the granting of planning permission.

6. It is essential to issue (create) a comprehensive physical planning legislation for the whole Kingdom. This planning legislation should define the various levels of physical plans, their purpose, format and legal status, development controls and also the responsibility of the various governmental agencies regarding different plans and development controls.

7. Establish a Committee to deal with all project planning in all the Kingdom. This committee might consist of members of all governmental agencies involved in the project planning.

LIST OF INTERVIEWERS

Personal Interviews were carried by the author with the following people in 1988.

AL ARFAJ, A	Ministry of Commerce : Al Hasa Branch.
AL ARFAJ, H	Ministry of Haj and Auqaf : Dammam Branch.
AL DUBAIKHY	Organization of Al Amro Bil Maroof Woa Nahi Anil Monker Branch.
AL FALEH	Ministry of Education : Dammam Branch.
AL FUZAN	Bureau of Appeals : Dammam Branch.
AL HASHIM	Directorate of Municipal and Rural Affairs, Eastern Province.
JASIM	General Presidency of Girls Education: Dammam Branch.
AL SELIMI	Telephone Department : Dammam Branch.
AL SUAIEED	Ministry of Justice : Qatif Branch.
AL SUWAIDAN	Ministry of Health : Dammam Branch.

B I B L I O G R A P H Y

ALAMIN, A. AND SALEH GANYIAH, INTRODUCTION TO CATALOGING AND CLASSIFICATION. DAR ALHURIAH, BAGDAD, 1979.

ABUAIASH, A. AND ISHAG ALQUTUB, GROWTH AND URBAN PLANNING IN THE GULF COUNTRIES. WAKALAT ALMATBOAT, KUWAIT, 1980.

ALDABAS, A. AND JAMIL ALSHALABY, THE SCINTIFIC DIRECTORY FOR CLASSIFICATION IN LIBRARIES. JAMEIAT ALMADTABAT ALURDUNIAH, AMMAN, 1985.

ALFARSY F., SAUDI ARABIA: A CASE STUDY IN DEVELOPMENT, STACEY INTERNATIONAL, LONDON, 1978.

ALHAMMAD, M., THE GROWTH OF SAUDE CITIES BETWEEN THEORY AND APPLICATION. SEMINAR OF SAUDI CITIES, RIYADH, 1983.

ALHASHAN, M. AND A. ALOMAIR, ENCYNCLOPIDIA FOR SAUDI REGULATIONS. DAR MOSOAT ALANTHIMAH AL SAUDIAH, RIYADH.

ALHATHLOUL, S. AND ANIS ALRAHMAN, THE EVOLUTION OF URBAN AND REGIONAL PLANNING IN SAUDI ARABIA. ESKITICS, VOL. 312, MAY/JUN: 206-211, 1985.

AL JAMIAH AL ISLAMIAH, THE LAW OF AL JAMIAH AL ISLAMIAH. GOVERNMENT PRESS, RIYADH, 1976.

AL-KHAIL, H., MIRACLE IN KHASHIM ALAN IN RIYADH SATISFIED BY NATIONAL GUARD FOR HIS EMPLOYEES. AL HARAS AL WATANI, MAY 1986 VOL. 43 P.P. 138-145.

ALLAM, A., LEGISLATION REGULATING DEVELOPMENT. ALANJLO LIBRARY, CAIRO, 1986.

AL MADINA AL ARABIA (ARABIC CITY) MAGAZINE, NOVEMBER 1987. P. 17-22.

AL SALUM, Y., THE ADMINISTRATIVE ORGANIZATION IN SAUDI ARABIA, SAUDI ARABIAN PRESS COMPANY, RIYADH, 1986.

ENGINEERING COMMITTEE, BUILDING CODES FOR FIRE PROTECTION. AL-MOHANDIS SAFAR: 15 1409H.

ALMUSAILHI, F., PERSONALITY OF SAUDI CITY. ALISLAH, DAMMAM, 1985.

ALRAHMAN, H., REVIEW AND ANALYSIS OF LAND USE REGULATION IN JEDDA. THESIS, 1985.

ALZOWKAH, M., AN INTRODUCTION TO REGIONAL PLANNING. DAR ALJAMEAT ALMASRIYAH, ALESKANDARIAN, 1980.

ARABIAN AMERICAN OIL COMPANY., REGULATIONS OF THE COUNCIL OF MINISTERS. LOCAL GOVERNMENT RELATION DEPARTMENT, DHAHRAN, 1958.

ARABIAN AMERICAN OIL COMPANY., FACTS AND FIGURES. SUPORT
INDUSTRY PRINTING CENTER, JUBAIL, 1984.

ARABIAN AMERICAN OIL COMPANY., BUILDING AND DEVELOPING. NO
PUBLISHER NAME. NO DATE.

ASSAF, A. AND HANY KHASHUGGY., INTRODUCTION TO LOCAL
ADMINISTRATION AND IT'S APPLICATION IN SAUDI ARABIA. NO
PUBLISHER NAME, 1983.

BEAUMONT, C., THE TOWN AND COUNTRY PLANNING ACTS 1971 AND
1972. BUTTERWORTHS, LONDON, 1973.

CATANESE, A. AND J. SNYDER, INTRODUCTION TO URBAN PLANNING.
MCGRAW -HILL, INC, NEW YORK, 1979.

CHARD, R., SAUDI ARABIA, IN PATRICIES, N., (EDS.)
INTERNATIONAL HANDBOOK ON LAND USE PLANNING, GREENWOOD PRESS,
NEW YORK:95-118, 1986.

CLAWSON, M. AND PETER HALL, PLANNING AND URBAN GROWTH. THE
JOHNS HOPKINS UNIVERSITY PRESS, BALTIMORE AND LONDON, 1973.

CULLING WORTH, J., TOWN AND COUNTRY PLANNING IN BRITAIN.
GEORGE ALLEN AND UNWIN, LONDON, 1979.

CULLING WORTH, J., TOWN AND COUNTRY PLANNING IN BRITAIN.
GEORGE ALLEN AND UNWIN, LONDON, 1982.

DAGHISTANI, A. AND COLINE LEE, URBAN PLANNING AND DEVELOPMENT
IN SAUDI ARABIA, THE ARAB CITY.

DAHLAN, A., A STUDY IN THE INTERNAL POLITICS OF THE KINGDOM
OF SAUDI ARABIA. DAR ALSHURUG, JEDDAH, 1984.

DIRECTORATE OF PUBLIC SECURITY, LAW FOR THE DIRECTORAT OF
PUBLIC SECURITY IN THE KINGDOM OF SAUDI ARABIA. GOVERNMENT
PRESS, MAKKAH, 1968.

ELROD, J., CLASSIFICATION. THE SCARE CROW PRESS INC, LONDON,
1978.

ENCYCLOPEDIA OF HALSBURY'S STATUTES OF ENGLAND. VOLUME 41,
1971.

ENCYCLOPEDIA OF HALSBURY'S LAWS OF ENGLAND. VOLUME 46, 1984.

EVELYN, F. AND P. DAVEY, AJ LEGAL HANDBOOK. THE
ARCHITECTURAL PRESS, LOND, 1978.

FARAJ, T., INTRODUCTION TO LEGAL SCIENCE. NO PUBLISHER NAME,
1979.

GALLION, A. AND S. EISNER, **THE URBAN PATTERN**. D. VAN NOSTRAND COMPANY, NEW YORK, 1975.

GARNER, J., **PLANNING LAW IN WESTERN EUROPE**. NORTH-HOLLAND PUBLISHING COMPANY, AMSTERDAM. 1975.

GENERAL CIVIL DEFENCE ADMINISTRATION, **SAFTY INSTRUCTION FOR GAS STATIONS**. MINISTRY OF INTERIOR, RIYADH, 1983.

GENERAL CIVIL DEFENCE ADMINISTRATION, **SAFTY GUIDELINES FOR HIGH RISE BUILDINGS AND FOR ROOF TOP HELI-PAD**. MINISTRY OF INTERIOR, RIYADH. 1983.

GENERAL CIVIL DEFENCE ADMINISTRATION, **SAFTY GUIDELINES FOR FIRE EXTINGWISHORS AND REGULATIONS FOR THE INTULATION OF IRE HYDRANCES**. MINISTRY OF INTERIOR, RIYADH. 1983.

GENERAL CIVIL DEFENCE ADMINISTRATION, **SAFTY GUIDELINES FOR CABINS AND PREFABRICATED BUILDINGS**. MINISTRY OF INTERIOR, RIYADH. 1983.

GENERAL CIVIL DEFENCE ADMINISTRATION, **SAFTY GUIDELINES FOR STORAGE OF CHEMICAL MATERIALS**. MINISTRY OF INTERIOR, RIYADH. 1983.

GENERAL CIVIL DEFENCE ADMINISTRATION, **SAFTY INSLRUCTION FOR BAKERIES**. MINISTRY OF INTERIOR, RIYADH. 1983.

GENERAL CIVIL DEFENCE ADMINISTRATION, **SAFTY INSTRUCTION FOR EARLY WARNING SYSTEMS**. MINISTRY OF INTERIOR, RIYADH. 1983.

GENERAL CIVIL DEFENCE ADMINISTRATION, **SAFTY INSTRUCTIONS FOR FUEL TRANSPORTING VEHICLES**. MINISTRY OF INTERIOR, RIYADH. 1983.

GENERAL CIVIL DEFENCE ADMINISTRATION, **SAFTY INSTRUCTIONS FOR WAREHOUSES**. MINISTRY, RIYADH. 1983.

GENERAL CIVIL DEFENCE ADMINISTRATION, **SAFTY INSTRUCTIONS FOR AMUSEMENT PARKS AND DWELLINGS**. MINISTRY OF INTERIOR, RIYADH. 1983.

GENERAL CIVIL DEFENCE ADMINISTRATION, **SAFTY INSTRUCTIONS FOR STAND BY GENERATORS AND WATER COOLERS**. MINISTRY OF INTERIOR, RIYADH. 1983.

GENERAL CIVIL DEFENCE ADMINISTRATION, **SAFTY GUIDLINES FOR HOTELS, SCHOOLS, AND HOSPITALS**. MINISTRY OF INTERIOR, RIYADH. 1983.

GENERAL CIVIL DEFENCE ADMINISTRATION, **SAFTY GUIDELINES FOR ELECTRICAL LIFTS**. MINISTRY OF INTERIOR, RIYADH. 1983.

GENERAL CIVIL DEFENCE ADMINISTRATION, SAFTY GUIDLELINES FOR TRANSPORT, HANDLING AND STORAGE OF LIQUIFIED GAS. MINISTRY OF INTERIOR, RIYADH. 1983.

GLASSON, J., AN INTRODUCTION TO REGIONAL PLANNING. HUTCHINSON, LONDON, 1978.

GOODMAN, W., PRINCIPLES AND PRACTICE OF URBAN PLANNING. INTERNATIONAL CITY MANAGERS' ASSOCIATION, WASHINGTON, 1968.

GRANT, M., PLANNING LAW HANDBOOK. SWEET AND MAXWELL, LONDON, 1981.

GRANT, M., URBAN PLANNING LAW. SWEET AND MAXWELL, LONDON, 1982.

HAMILTON, R., A GUID TO DEVELOPMENT AND PLANNING. OYEZ PUBLISHING, LONDON, 1975.

HAMILTON, R., A GUID TO DEVELOPMENT AND PLANNING. OYZEN PUBLISHING, LONDON, 1981.

HATEM, S., ADMINISTRATIVE LAW. ALAHLIAH FOR PUBLISHING AND DISTRIBUTION, BEIRUT, 1979.

HEAP, D., AN OUTLINE OF PLANNING LAW. SWEET AND MAXWELL, LONDON, 1973.

HEAP, D., AN OUTLINE OF PLANNING LAW. SWEET AND MAXWELL, LONDON, 1987.

HERDMAN, M., CLASSIFICATION: AN INTRODUCTORY MANUAL. AMERICAN LIBRARY ASSOCIATION, 1972.

IBN MANTHOR, J., LESAN ALARAB. DAR ALMAARIFA, CIRO, NO DATE OF PUBLICATION.

INTERNATIONAL CITY MANAGMENT ASSOCIATION, THE PRACTICE OF LOCAL GOVERNMENT PLANNING. INTERNATIONAL CITY MANAGMENT ASSOCIATION, WASHINGTON, 1979.

INTERNATIONAL CITY MANAGER'S ASSOCIATION, LOCAL PLANNING ADMINISTRATION. INTERNATIONAL CITY MANAGER'S ASSOCIATION, CHICAGO, 1948.

KADI, O. AND HAZIM IBRAHIM, CITY PLANNING IN SAUDI ARABIA. SAUDI ARABIA PRESS CO., RIYADH, 1981.

KAMONAH, H., PLANNING LAWS FACING PROBLEMS OF ADMINISTRATION AND REGULATION OF ARABIC CITIES. SEVENTH SYMPOSIUM FOR ARABIC CITY, ARABIC INSTITUTE FOR CITIES DEVELOPMENT, 1985.

KEEBLE, L., PRINCIPLES AND PRACTIC OF TOWN AND COUNTRY PLANNING. THE ESTATES GAZETTE LIMITED, LONDON, 1969.

KING ABDULAZIZ UNIVERSITY, THE LAW OF KING ABDULAZIZ UNIVERSITY. GOVERNMENT PRESS, MAKKAH, 1972.

KING SAUD UNIVERSITY, THE LAW OF RIYADH UNIVERSITY. GOVERNMENT PRESS, MAKKAH, 1972.

KING ABDULAZIZ UNIVERSITY, ANNOUNCEMENT OF SAUDI REGULATIONS. KING ABDULAZIZ UNIVERSITY PRESS, JEDDAH, 1980.

KING ABDULAZIZ UNIVERSITY, ANNOUNCEMENT OF SAUDI REGULATIONS. KING ABDULAZIZ UNIVERSITY PRESS, JEDDAH, 1981.

KING ABDULAZIZ UNIVERSITY, ANNOUNCEMENT OF SAUDI REGULATIONS. KING ABDULAZIZ UNIVERSITY PRESS, JEDDAH, 1982.

KING ABDULAZIZ UNIVERSITY, ANNOUNCEMENT OF SAUDI REGULATIONS. KING ABDULAZIZ UNIVERSITY PRESS, JEDDAH, 1983.

KING ABDULAZIZ UNIVERSITY, ANNOUNCEMENT OF SAUDI REGULATIONS. KING ABDULAZIZ UNIVERSITY PRESS, JEDDAH, 1984.

KING ABDULAZIZ UNIVERSITY, ANNOUNCEMENT OF SAUDI REGULATIONS. KING ABDULAZIZ UNIVERSITY PRESS, JEDDAH, 1985.

LANGRIDGE, D., APPROACH TO CLASSIFICATION. LINNET BOOKS AND CLIVE BINGLEY, LONDON, 1973.

MALTBY, A., CLASSIFICATION. CLIVE BINGLEY, LONDON, 1972.

MCKOWN, R., COMPREHINSIVE GUIDE TO TOWN PLANNING LAW AND PROCEDURES. GEORGE GODWIN LTD, LONDON, 1973.

MINISTRY OF MUNICIPAL AND RURAL AFFAIRS, MADINAH MASTER PLANS, RIYADH, 1980, M, VOLUME NO.7

MINISTRY OF MUNICIPAL AND RURAL AFFAIRS, DAMMAM ACTION MASTER PLANS. RIYADH, 1980, D, VOLUME NO.7

MINISTRY OF MUNICIPAL AND RURAL AFFAIRS, JEDDAH ACTION MASTER PLANS. RIYADH, 1981, J, VOLUME NO.7

MINISTRY OF MUNICIPAL AND RURAL AFFAIRS, TAIF ACTION MASTER PLANS. RIADH, 1981, T, VOLUME NO. 7

MINISTRY OF MUNICIPAL AND RURAL AFFAIRS, ABHA ACTION MASTER PLANS. RIADH, 1981, A, VOLUME NO.7

MINISTRY OF MUNICIPAL AND RURAL AFFAIRS, MAKKAH ACTION MASTER PLANS. RIYADH, 1983, K, VOLUME NO. 7

MINISTRY OF COMMERCE, LAW OF SAUDI ARABIAN STANDARD ORGANIZATION. GOVERNMENT PRESS, MAPPAH, 1974.

MINISTRY OF MUNICIPAL AND RURAL AFFAIRS, **MASTING URBAN GROWTH**. MCKINSEY INTERNATIONAL, INC, NEW YORK, 1978, N.

MINISTRY OF FINANCE AND NATIONAL ECONOMY, **THE LAW OF REAL ESTATE FUND AND THE EXECUTION BY-LAWS**. NO PUBLISHER NAME. NO DATE.

MINISTRY OF INTERIOR, **LAW OF INTERNAL SECURITY FORCE**. GOVERNMENT PRESS, MAKKAH, 1965.

MINISTRY OF MUNICIPAL AND RURAL AFFAIRS, **REGULATIONS, ORDINANCES AND INSTRUCTION**. NO PUBLISHER NAME. NO DATE OF PUBLICATION, VOL. 6.

MINISTRY OF MUNICIPAL AND RURAL AFFAIRS, **REGULATIONS, ORDINANCES AND INSTRUCTIONS**. AL SHARY AL AUSAT PRESS, RIYADH. NO DATE OF PUBLICATIONS. VOL. 7.

MINISTRY OF COMMERCE, **THE LAW OF SAUDIAN ARABIAN STANDARD ORGANISATION**. GOVERNMENT PRESS, MAKKAH, 1972.

MINISTRY OF INTERIOR, **THE LAW OF AMANT AL ASSIMAH AND MUNICIPALITIES IN THE KINGDOM OF SAUDI ARABIA**. GOVERNMENT PRESS, MAKKAH, 1964.

MINISTRY OF PLANNING, **SECOND DEVELOPMENT PLAN**. DAR OKAZ PRINTING AND PUBLISHING, JEDDAH, 1975.

MINISTRY OF HOUSING AND LOCAL GOVERNMENT, **DEVELOPMENT PLANS**. HER MAJESTY'S STATIONERY OFFICE, LONDON, 1970.

MINISTRY OF POST, TELEGRAPH AND TELEPHONE, **GENERAL REGULATIONS FOR THE INSTALLATION OF TELEPHONE WIRES IN RESIDENTIAL DWELLING**. PRINT SHOP OF DEPUTY MINISTRY FOR OPERATION AND MAINTENANCE AFFAIRS, RIYADH. NO DATE OF PUBLICATION.

MINISTRY OF EDUCATION, **THE LAW OF ARCHEOLOGY**. GOVERNMENT PRESS, MAKKAH, 1973.

MINISTRY OF MUNICIPAL AND RURAL AFFAIRS, **REGULATIONS, ORDINANCES AND INSTRUCTIONS**. NO PUBLISHER NAME, 1975. VOL.1.

MINISTRY OF MUNICIPAL AND RURAL AFFAIRS, **REGULATIONS, ORDINANCE AND INSTRUCTIONS**. NO PUBLISHER NAME, NO DATE OF PUBLICATION. VOL. 2.

MINISTRY OF MUNICIPAL AND RURAL AFFAIRS, **REGULATIONS, ORDINANCE AND INSTRUCTIONS**. AL NAHDAH PRESS, RIYADH. 1975. VOL. 3.

MINISTRY OF MUNICIPAL AND RURAL AFFAIRS, **REGULATIONS, ORDINANCE AND INSTRUCTIONS**. SAFFEER PRESS FOR OFFSET, RIYADH. 1976. VOL 4.

MINISTRY OF MUNICIPAL AND RURAL AFFAIRS, REGULATIONS,
ORDINANCE AND INSTRUCTIONS. AL NASER PRESS, RIYADH, 1980.
VOL. 5.

MINISTRY OF PUBLIC WORKS AND HOUSING, SUPERVISION ON THE
CONSTRUCTION, ALMUTAWA'A PRESS COMPANY, DAMMAM, 1981.

MINISTRY OF AGRICULTURE AND WATER, LAWS AND REGULATIONS
ISSUED FOR AGRICULTURE LANDS IN THE KINGDOM. AL HARAMIN
PRESS, RIYADH, NO DATE OF PUBLICATION.

MINISTRY OF FINANCE AND NATIONAL ECONOMY, REAL ESTATE FUND:
DIRECTORY FOR COMMERCIAL INVESTMENT LOANS. NO PUBLISHER
NAME. 1983.

MINISTRY OF INDUSTRY AND ELECTRICITY, INDUSTRY AND
ELECTRICITY. NO PUBLISHER NAME, NO DATE OF PUBLICATION.

MINISTRY OF INDUSTRY AND ELECTRICITY, RESPONSIBILITIES OF
DEPARTMENT AT MINISTRY OF INDUSTRY AND ELECTRICITY. AL NASIR
AL HADITHAN PRESS, RIYADH, NO DATA OF PUBLICATION.

MINISTRY OF EDUCATION, GENERAL TECHNICAL SPECIFICATIONS AND
CONDITIONS FOR THE BUILDINGS OF MINISTRY OF EDUCATION.

PATTERSON, T., LAND USE PLANNING: TECHNIQUES OF
IMPLEMENTATION. VAN NOSTRAND REINHOLD ENVIRONMENTAL
ENGINEERING SERIES, NEW YORK, 1979.

PRESIDENCY OF GIRL'S EDUCATION, GENERAL SPECIFICATIONS FOR
THE PRESIDENCY'S PROJECTS. AL MATABEL AL HADITHAL, RIYADH,
1968.

PRESIDENCY OF GIRLS EDUCATION IN EASTERN PROVINCE, YEARLY
REPORT FOR 1986. AL TALIAH PRESS, DAMMAM, NO PUBLICATION
DATE.

PRESIDENCY OF NATIONAL GAURD, GENERAL TECHNICAL
SPECIFICATIONS FOR BUILDING CONSTRUCTION. NATIONAL GAURD
PRESS, RIYADH, 1980.

PURDUE, M., CASES AND MATERIALS ON PLANNING LAW. SWEET AND
MAXWELL, LONDON, 1977.

RASHID, A. AND ABDURRAZAQ ABUSHAAR, CHOSEN PROBLEMS IN THE
ADMINISTRATION OF MUNICIPALITIES. INSTITUTE OF PUBLIC
ADMINISTRATION, RIYADH, 1982.

RASHID, A AND ABDURRAZAQ ABUSHAAR, ADMINISTRATION OF
MUNICIPALITIES. PUBLIC ADMINISTRATION INSTITUTE PRESS,
RIYADH, 1982.

RATCLIFFE, J., TOWN AND COUNTRY PLANNING. HUTCHINSON
EDUCATIONAL LTD., LONDON, 1974.

RATCLIFFE, J., TOWN AND COUNTRY PLANNING. HUTCHINSON EDUCATIONAL LTD., LONDON, 1981.

ROYAL COMMISSION FOR JUBAIL AND YANBU, RESIDENTIAL BUILDING CODE, 1986, R.

ROYAL COMMISSION FOR JUBAIL AND YANBU, PUBLIC RELATIONS DEPARTMENT, JUBAIL, 1985.

ROYAL COMMISSION FOR JUBAIL AND YANBU, BUILDING REQUIREMENTS, 1986, B.

ROYAL COMMISSION FOR JUBAIL AND YANBU, SUB-DIVISION, 1986, S.

ROYAL COMMISSION FOR JUBAIL AND YANBU, ZONING, 1986, Z.

SAUDI CONSULTING HOUSE, A GUIDE TO INDUSTRIAL INVESTMENT, AL AHLIAH PRESS, RIYADH, 1986.

SALAH, S., ADMINISTRATION OF LOCAL SERVICES. RESEARCHES OF THE LOCAL ADMINISTRATION SEMINAR IN SAUDI ARABIA HELD IN THE PUBLIC ADMINISTRATION INSTITUTE IN JUNE, 1981, PUBLIC ADMINISTRATION INSTITUTE PRESS. NO DATE OF PUBLICATION.

SAUDI ARABIAN STANDARDS ORGANIZATION, PHYSICAL AND MECHANICAL TESTING METHODS OF PORTLAND CEMENT. SAUDI ARABIAN STANDARDS ORGANIZATION, RIYADH, 1979.

SAUDI ARABIAN STANDARDS ORGANIZATION, HOLLOW BLOCKS FROM BURN CLAY FOR WALLS. SAUDI ARABIAN STANDARDS ORGANIZATION, RIYADH, 1980.

SAUDI ARABIAN STANDARDS ORGANIZATION, PORTLAND CEMENT ORDINARY AND RAPID - HORDENING. SAUDI ARABIAN STANDARDS ORGANIZATION, RIYADH, 1979.

SAUDI ARABIAN STANDARDS ORGANIZATION, CONCRETE (CEEMENT) HOLLOW BLOCKS FOR BUILDING. SAUDI ARABIAN STANDARDS ORGANIZATION, RIYADH, 1979.

SAUDI ARABIAN STANDARDS ORGANIZATION, ALUMINIUM AND ALUMINIUM ALLOYS PRODUCTORS FOR ARCHITECTURAL APPLICATIONS. SAUDI ARABIAN STANDARDS ORGANIZATION, RIYADH, 1978.

SAUDI ARABIAN STANDARDS ORGANIZATION, TESTING METHOD FOR ALUMINIUM AND ALUMINIUM ALOYS PRODUCTS FOR BUILDING PURPOSES. SAUDI ARABIAN STANDARDS ORGANIZATION, RIYADH, 1978.

SAUDI ARABIAN STANDARDS ORGANIZATION, STEEL BARS FOR THE REINFORCEMENT OF CONCRETE. SAUDI ARABIAN STANDARDS ORGANIZATION, RIYADH, 1979.

SAUDI ARABIAN STANDARDS ORGANIZATION, SOLID CONCRETE
(CEMENT) BUILDING BRICKS. SAUDI ARABIAN STANDARDS
ORGANIZATION, RIYADH,

SAUDI ARABIAN STANDARDS ORGANIZATION, TENSILE TESTING OF
STEEL. SAUDI ARABIAN STANDARDS ORGANIZATION, RIYADH, 1979.

SAUDI ARABIAN STANDARDS ORGANIZATION, METHODS OF TEST FOR
CONCRETE (CEMENT) BUILDING BRICKS AND BLOCKS. SAUDI ARABIAN
STANDARDS ORGANIZATION, RIYADH, 1979.

TELLING, A., PLANNING LAW AND PROCEDURE. BUTTER WORTHS,
LONDON, 1973.

THE INSTITUTE OF PUBLIC ADMINISTRATION, DEWEY DECIMAL
CLASSIFICATION. THE INSTITUTE OF PUBLIC ADMINISTRATION PRESS,
RIYADH, 1985.

WALY, A., URBAN PLANNING. DAR ALMAARIFAH ALJAMEIAH,
ALISKANDARIAH, 1983.

WILLIAM, A., PLANNING LAW CASEBOOK. NO PUBLISHER NAME 1984.

WYNAR, B., INTRODUCTION TO CATALOGING AND CLASSIFICATION.
LIBRARIES UNLIMITED INC., ELITTLETON, 1980.

V I T A

Abdullah Hussain Al-Kadi was born in Al-Hasa, Saudi Arabia 1959. He received his high school Diploma in 1979 from Dammam High School. He graduated from King Faisal University at Dammam with a B.S. in Architecture and Planning in 1984. He received his M.S. degree in Urban and Regional Planning from King Faisal University in 1989. Since 1984 he is working as a teaching assistant at the College of Architecture and Planning of King Faisal University at Dammam.

His permanent address is:

College of Architecture and Planning
King Faisal University,
P.O. Box # 999,
Dammam,
Saudi Arabia.