

S68-700001

22308

SS

YSS

1997



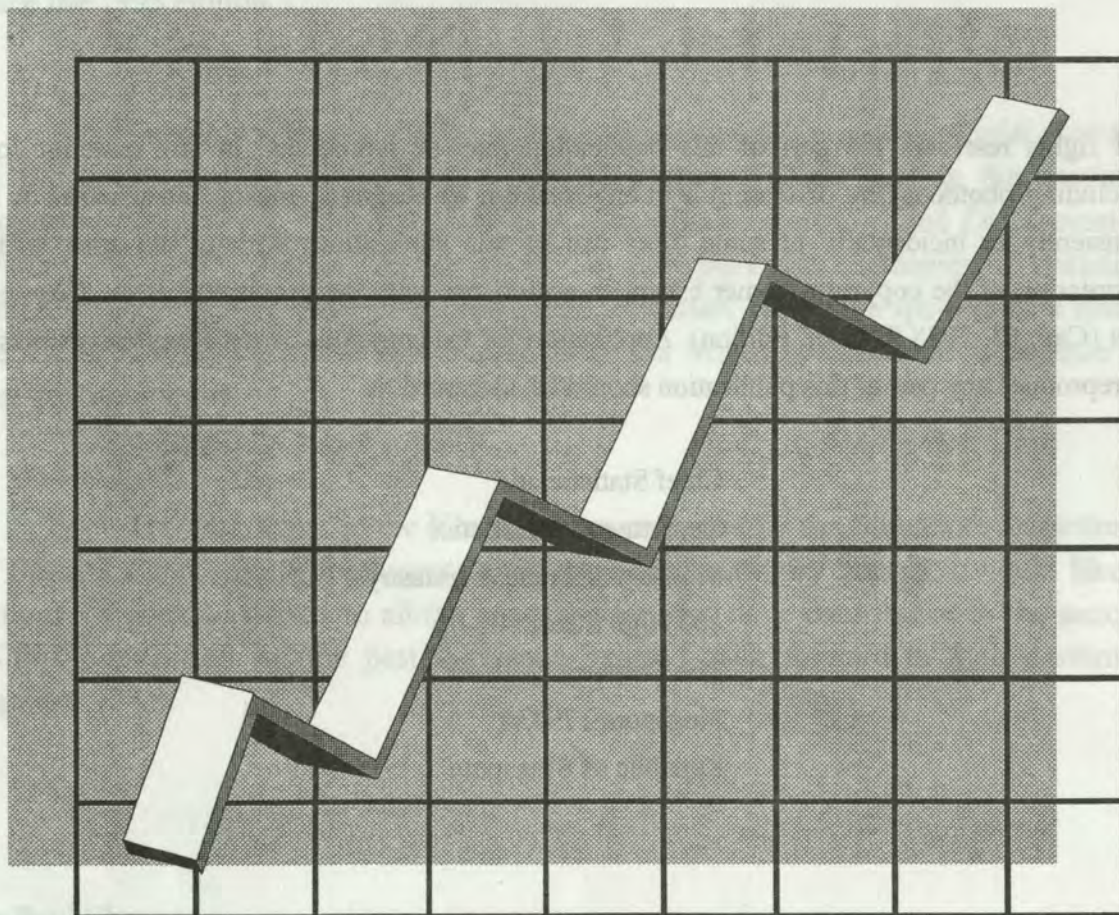
Yearbook of Statistics Singapore, 1997



SINGAPORE DEPARTMENT OF STATISTICS

012782 (7052)
SS YSS 1997

Yearbook of Statistics Singapore, 1997



SINGAPORE DEPARTMENT OF STATISTICS

NATIONAL LIBRARY BOARD



B20035501E



Yearbook of Statistics

YEARBOOK OF STATISTICS, SINGAPORE, 1997

ISSN 0583-3655

© Department of Statistics, Ministry of Trade & Industry, Republic of Singapore

All rights reserved. No part of this publication may be reproduced in any material form (including photocopying or storing it in any medium by electronic means and whether or not transiently or incidentally to some other use of this publication) without the prior written permission of the copyright owner except in accordance with the provisions of the Copyright Act (Cap. 63, 1988 Revised Edition). Application for the copyright owner's written permission to reproduce any part of this publication should be addressed to:

Chief Statistician
Department of Statistics
Ministry of Trade & Industry
100 High Street #05-01
The Treasury
Singapore 179434
Republic of Singapore

PREFACE

The Yearbook of Statistics, 1997 is the thirty-first edition of a series first published in 1967. The publication provides a comprehensive, current statistical record of the key socio-demographic and economic characteristics of Singapore. Users are able to get a snapshot picture of the Singapore economy and population based on the latest available information.

Improvements are continuously made to the Yearbook to enhance its value to users. New data series on topics of interest are added as and when appropriate. Since 1967 when the Yearbook was first published, the number of tables in the publication has increased from 124 to 255. The Yearbook has been produced from an automated system since the 1995 edition.

In addition to this Yearbook, the Department disseminates official statistics on Singapore through a variety of electronic services. These include the Statistics Singapore Home Page, SingStat DataShop, Time Series Retrieval and Dissemination System and MTI Telelink. Internet users can now purchase softcopies of statistical tables in the Yearbook through the DataShop. For users who have specific data needs, the Department's Statistical Information Services offers personalized assistance on cost-recovery basis.

The data series in the Yearbook are compiled by the Singapore Department of Statistics and other government departments and statutory boards. I would like to extend my grateful thanks to all the organisations that have contributed to the success of this publication for the past thirty-one years. I look forward to their continued support.

Dr Paul Cheung
Chief Statistician
Singapore

May 1998

CONTENTS*Page*

o Preface	i
o Notes on Changes and Revisions	xv
o Statistical Tables	1
Key Indicators	1
Climate, Air Quality and Land Use	13
Demography	19
Labour and Productivity	37
National Income and Balance of Payments	55
The Corporate Sector	71
Agriculture, Livestock and Fisheries	77
Manufacturing	81
Utilities	95
Construction and Real Estate	99
Commerce and Services	117
External Trade	131
Transport and Communications	145
Tourism	157
Finance	165
Public Finance	189
Prices	201
Education	221
Health	247
Hawkers and Food Establishments	255
Community Services	259
Culture and Recreation	265
Miscellaneous	273
o Latest Editions of Publications	277
o Information Dissemination Services	281

LIST OF TABLES BY SECTION

Page

Key Indicators	1
1.1 National Income	2
1.2 Inflation, Labour and Business Costs	3
1.3 Manufacturing and Building & Construction	4
1.4 External Trade and Tourism	5
1.5 Transport and Communications	6
1.6 Government Finance	7
1.7 Banking and Finance	8
1.8 Population	9
1.9 Vital Statistics	9
1.10 Employment	10
1.11 Health	10
1.12 Education and Literacy	11
1.13 Public Housing and Utilities Usage	12
1.14 Other Social Indicators	12
Climate, Air Quality and Land Use	13
2.1 Air Temperature and Sunshine	15
2.2 Mean Relative Humidity and Rainfall	15
2.3 Air Pollution Levels	16
2.4 Land Use	17
Demography	19
3.1 Population and Growth Rate	22
3.2 Vital Rates	23
3.3 Mid-Year Estimates of Singapore Residents by Age Group and Sex	24
3.4 Singapore Resident Population by Age Group, Ethnic Group and Sex, End June 1997	25
3.5 Age-Specific Fertility Rate	26
3.6 Live-birth by (a) Birth Order and (b) Place of Occurrence	26
3.7 Male and Female Age-Specific Death Rates	27
3.8 Deaths by Broad Group of Causes	28
3.9 Age at First Marriage and Divorce	29
3.10 Age-Specific Marriage Rates	29
3.11 Grooms by Age Group	30
3.12 Brides by Age Group	31
3.13 Marriages Registered by Ethnic Group of Couple	32
3.14 Age-Specific Divorce Rate	32
3.15 Male Divorcees by Age Group	33

Demography (continued)

3.16	Female Divorcees by Age Group	34
3.17	Divorces by Ethnic Group of Couple	35

Labour and Productivity

4.1	Labour Force	41
4.2	Age-Specific Labour Force Participation Rates	41
4.3	Age-Specific Male Labour Force Participation Rates	42
4.4	Age-Specific Female Labour Force Participation Rates	42
4.5	Employed Persons Aged 15 Years and Over by Occupational Status	43
4.6	Employed Persons Aged 15 Years and Over by Occupation	43
4.7	Employed Persons Aged 15 Years and Over by Industry	44
4.8	Employed Persons Aged 15 Years and Over by Occupational Status and Gross Monthly Income, 1997	44
4.9	Employed Persons Aged 15 Years and Over by Industry and Occupation, 1997	45
4.10	Government Employees by Divisional Status	46
4.11	Central Provident Fund Members by Age Group	46
4.12	Central Provident Fund Contributors by Age Group	47
4.13	Central Provident Fund Contributors by Wage Level	47
4.14	Central Provident Fund Contributors by Industry	48
4.15	Employment Service	48
4.16	Changes in Labour Productivity by Industry	49
4.17	Average Monthly Earnings by Industry	49
4.18	Average Weekly Hours Worked by Industry	50
4.19	Average Monthly Recruitment Rate by Industry and Occupational Group	50
4.20	Average Monthly Resignation Rate by Industry and Occupational Group	51
4.21	Participants in Training Courses Conducted by Singapore Productivity and Standards Board	52
4.22	Quality Circles	52
4.23	Skills Development Fund Grants and Training Places Committed by Type of Training	53
4.24	Trade Unions and Membership	54
4.25	Labour Relations	54

National Income and Balance of Payments

5.1	Indigenous Gross National Product	59
-----	-----------------------------------	----

National Income and Balance of Payments (continued)

5.2	Output, Saving and Investment	60
5.3	Gross Domestic Product by Industry	61
5.4	Expenditure on Gross Domestic Product	62
5.5	Private Consumption Expenditure	63
5.6	Gross Fixed Capital Formation	64
5.7	Gross Domestic Product Deflators by Industry	65
5.8	Deflators of Expenditure on Gross Domestic Product	65
5.9	Balance of Payments	66
5.10	Stock of Foreign Equity Investment in Singapore by Industry	67
5.11	Stock of Singapore's Equity Investment Abroad by Industry	67
5.12	Stock of Foreign Equity Investment in Singapore by Country	68
5.13	Stock of Singapore's Equity Investment Abroad by Country	69

The Corporate Sector 71

6.1	Active Companies by Industry	73
6.2	Local-controlled Companies by Industry	73
6.3	Foreign-controlled Companies by Industry	74
6.4	Total Assets/Liabilities of Companies by Main Industrial Sectors	74
6.5	Equity Ratios of Companies by Main Industrial Sectors	75
6.6	Current Ratios of Companies by Main Industrial Sectors	75
6.7	New Companies Formed by Industry	76

Agriculture, Livestock and Fisheries 77

7.1	Production of Principal Crops	79
7.2	Livestock Slaughtered	79
7.3	Fish Supply and Auction	79

Manufacturing 81

8.1	Principal Manufacturing Statistics	84
8.2	Selected Averages and Ratios in the Manufacturing Sector	84
8.3	Manufacturing Establishments by Industry	85
8.4	Manufacturing Output by Industry	86
8.5	Value Added of Manufacturing Establishments by Industry	87
8.6	Workers in Manufacturing by Industry	88
8.7	Remuneration in Manufacturing by Industry	89

Manufacturing (continued)

8.8	Value of Output of Selected Manufactured Products	90
8.9	Index of Industrial Production	91
8.10	Indices of Unit Business Cost and Unit Labour Cost	92
8.11	Principal Statistics of Pioneer Manufacturing Establishments	92
8.12	Principal Statistics of Pioneer Manufacturing Establishments by Industry, December 1996	93
8.13	Net Investment Commitments in Manufacturing by Industry	94
8.14	Net Investment Commitments in Manufacturing by Country of Origin	94

Utilities

9.1	Electricity Generation and Sales and Gas Sales	97
9.2	Water Treatment and Sales	97

Construction and Real Estate**99**

10.1	Written Permission by Type of Development in the Public Sector	102
10.2	Written Permission by Type of Development in the Private Sector	102
10.3	Commencement of Building Construction by Type of Development in the Public Sector	103
10.4	Commencement of Building Construction by Type of Development in the Private Sector	103
10.5	Public Sector Construction Projects Completed by Type of Development	104
10.6	Private Sector Construction Projects Completed by Type of Development	104
10.7	Building Plan Approvals by Type of Development in the Private Sector	105
10.8	Residential Units in the Public Sector by Type of Building and Stage of Development	106
10.9	Residential Units in the Private Sector by Type of Building and Stage of Development	107
10.10	Contracts Awarded by Sector and Type of Work	108
10.11	Progress Payments Certified by Sector and Type of Work	109
10.12	Properties Under the Management of Housing and Development Board	110
10.13	Residential Units Constructed and Sold by Housing and Development Board	110
10.14	Residential Units under the Management of Housing and Development Board, March 1997	111
10.15	Stock of Private Properties	112

Construction and Real Estate(continued)

10.16	Occupancy Rate of Private Properties	113
10.17	Potential Supply of Private Properties	114
10.18	Demand, Supply and Occupancy of Jurong Town Corporation Standard/Flatted Factories and Industrial Lands	115

Commerce and Services**117**

11.1	Principal Statistics of the Commerce Sector by Industry	121
11.2	Selected Averages and Ratios in the Commerce Sector	122
11.3	Principal Statistics of the Services Sector by Industry	123
11.4	Selected Averages and Ratios in the Services Sector	125
11.5	Retail Sales Index	127
11.6	Sales Index of Catering Trade	128
11.7	Wholesale Trade Index	129

External Trade**131**

12.1	External Trade by Type	134
12.2	Total Trade by Area/Country	135
12.3	Imports by Area/Country	136
12.4	Exports by Area/Country	137
12.5	Domestic Exports by Area/Country	138
12.6	Imports by Commodity	139
12.7	Exports by Commodity	140
12.8	Domestic Exports by Commodity	141
12.9	Imports of Specific Commodities	142
12.10	Exports of Specific Commodities	143

Transport and Communications**145**

13.1	Sea Cargo and Shipping Statistics	147
13.2	Civil Aircraft Landings, Passengers and Parcel Mail	147
13.3	Air Cargo Discharged by Region and Selected Country of Origin	148
13.4	Air Cargo Loaded by Region and Selected Country of Destination	149
13.5	Air Passenger Arrivals by Region and Selected Country of Embarkation	150
13.6	Air Passenger Departures by Region and Selected Country of Disembarkation	151
13.7	Public Roads	152
13.8	Motor Vehicle Population	152
13.9	Car Population by CC Rating	153
13.10	Age Distribution of Cars	153

Transport and Communications (continued)

13.11	Road Casualties	154
13.12	Vehicles Involved in Road Accidents by Type of Vehicle	154
13.13	Mass Rapid Transit Operation and Ridership	155
13.14	Postal Articles Handled and Telecommunications	155

Tourism 157

14.1	Visitor Arrivals by Region and Selected Country of Residence	159
14.2	Visitor Arrivals by (a) Sex and (b) Age Group	160
14.3	Visitor Arrivals by (a) Purpose of Visit and (b) Type of Accommodation	161
14.4	Visitor Arrivals by Length of Stay	162
14.5	Average Expenditure Per Visitor Per Day by Country of Residence	162
14.6	Outbound Departures of Singapore Residents by Mode of Transport	163
14.7	Hotels and Cess Collection	163
14.8	Conventions, Exhibitions and Incentive Groups	164

Finance 165

15.1	Currency in Circulation	168
15.2	Money Supply	168
15.3	Changes in Money Supply and Underlying Factors	169
15.4	Official Foreign Reserves	170
15.5	Exchange Rates	170
15.6	Assets of Banks	171
15.7	Liabilities of Banks	172
15.8	Banks' Loans and Advances to Non-bank Customers by Industry	172
15.9	Assets and Liabilities of Asian Currency Units	173
15.10	Assets and Liabilities of Finance Companies	174
15.11	Finance Companies' Loans and Advances by Industry	175
15.12	Assets and Liabilities of Merchant Banks	176
15.13	Domestic Interest Rates	177
15.14	Number of Accounts and Deposits of Post Office Savings Bank	178
15.15	Contributions and Withdrawals of Central Provident Fund	178
15.16	Withdrawals of Central Provident Fund by Type	179
15.17	Turnover of Stocks and Shares	180
15.18	Stock Exchange of Singapore Indices	181
15.19	Pledges at Pawnshops	181
15.20	Life Insurance Policies	182
15.21	Revenue and Expenditure Accounts of Life Insurance Funds	183
15.22	Assets of Life Insurance Funds	184

Finance (continued)

15.23	Premiums and Claims of General Insurance Funds	185
15.24	Revenue and Expenditure Accounts of General Insurance Funds	186
15.25	Assets of General Insurance Funds	187

Public Finance

16.1	Government Operating Revenue	192
16.2	Government Operating Expenditure	193
16.3	Government Development Expenditure	194
16.4	Sources and Uses of Development Fund	195
16.5	Government Debt	195
16.6	Revenue Collected by Customs and Excise Department	196
16.7	Revenue Collected by Inland Revenue Authority	196
16.8	Taxpayers, Assessed Income and Gross Tax Assessed, 1996	197
16.9	Assessed Income and Gross Tax Assessed on Individuals by Assessed Income Group, 1996	198
16.10	Assessed Income and Gross Tax Assessed on Companies by Assessed Income Group, 1996	199

Prices

17.1	Consumer Price Index	204
17.2	Consumer Price Index for Households in Different Income Groups	205
17.3	Price Indices of Selected Consumer Items	206
17.4	Retail Prices of Food and Groceries	207
17.5	Domestic Supply Price Index	209
17.6	Singapore Manufactured Products Price Index	211
17.7	Import Price Index	213
17.8	Export Price Index	215
17.9	Building Materials Price Index	217
17.10	Price Indices of Selected Farm Products	217
17.11	Produce Prices	218
17.12	Private Property Price Index by Type of Property	219
17.13	Commercial Property Rental Index by Type of Property	219

Education

18.1	Enrolment in Educational Institutions	226
18.2	Students and Teachers in Educational Institutions, End June 1997	226
18.3	Enrolment in Government and Government-Aided Primary Schools by Level and Age	227

Education (continued)

18.4	Enrolment in Government and Government-Aided Secondary Schools and Junior Colleges by Level and Age	228
18.5	Private Regular Schools, Students and Teachers	229
18.6	Enrolment at Primary, Secondary and Pre-University Levels in Private Regular Schools by Level	229
18.7	Enrolment in Institutions of Higher Learning by Sex	230
18.8	Part-time Enrolment in Institutions of Higher Learning by Sex	230
18.9	Students Admitted to Institutions of Higher Learning by Sex	231
18.10	Part-time Students Admitted to Institutions of Higher Learning by Sex	231
18.11	Male Students Admitted to Institutions of Higher Learning by Course	232
18.12	Female Students Admitted to Institutions of Higher Learning by Course	234
18.13	Graduates from Institutions of Higher Learning by Sex	236
18.14	Graduates from Part-time Courses of Institutions of Higher Learning by Sex	236
18.15	Male Graduates from Institutions of Higher Learning by Course	237
18.16	Female Graduates from Institutions of Higher Learning by Course	239
18.17	Polytechnic Graduates from Part-time Courses by Course	241
18.18	Students Admitted to Open University, 1997	242
18.19	Intake of Trainees Under the Full-time Institutional Training and Apprenticeship Programmes and Trainees who Completed the Programmes, 1997	242
18.20	Training Places Taken Up by Workers Under the Skills Training Programmes and Workers who Completed the Programmes, 1997	243
18.21	Training Places Taken Up by Workers Under the Continuing Academic Education Programmes and Workers who Completed the Programmes, 1997	243
18.22	Government Expenditure on Education	244
18.23	Government Recurrent Expenditure on Education Per Student	245

Health 247

19.1	Hospitals and Government Clinics	249
19.2	Hospital Admissions and Public Sector Outpatient Attendances	249
19.3	Registered Health Personnel	250
19.4	Visits to Government Dental Clinics	251
19.5	Notifications of Specific Notifiable Diseases	251
19.6	Immunisation Coverage by Public and Private Sectors	252
19.7	Vaccination and Immunisation of School Children	252
19.8	Student Medical Check-up	253
19.9	Common Defects of Students Examined	253
19.10	Blood Donations and Transfusions	254

Hawkers and Food Establishments **255**

20.1	Licensed Hawkers by (a) Type of Premises and (b) Type of Goods Sold	257
20.2	Licensed Hawkers by (a) Management Authority and (b) Type of Goods Sold	257
20.3	Licensed Food Establishments	258

Community Services **259**

21.1	Grassroots Organisations	261
21.2	Volunteers by Volunteer Group and Type of Service	262
21.3	Enrolment in Child Care Centres by Type of Programme and Organisation	263
21.4	Public Assistance Recipients by Category	263
21.5	Residents in Old Folks' Homes by Type of Organisation and Sex	264

Culture and Recreation **265**

22.1	Television Licences, Cable Vision Subscribers, Rediffusion Subscribers and Cinemas	268
22.2	Radio and Television Transmission	268
22.3	National Library Membership, Book Collections and Loans of Books	269
22.4	Daily Newspaper Circulation	269
22.5	Visitors to Places of Interest	270
22.6	Utilisation of Sports Facilities	270
22.7	Sports and Cultural Courses Conducted by Community Centres/Clubs	271
22.8	The Arts	272

Miscellaneous **273**

23.1	Fire Occurrences	275
23.2	Selected Criminal Offences	275

NOTATION

Figures may not add up to the totals due to rounding.
Some figures, particularly those for the most recent time periods, are provisional
and may be subject to revision in later issues.

20.1	Licensed Hawkers by (a) Type of Premises and (b) Type of Goods Sold	257
20.2	Licensed Hawkers by (a) Management Authority and (b) Type of Goods Sold	257
20.3	Licensed Food Establishments	258
21	Community Services	259
21.1	Grassroots Organisations	261
21.2	Volunteers by Volunteer Group and Type of Service	262
21.3	Employment in Child Care Centres by Type of Programme and Organisation	263
21.4	Public Assistance Recipients by Category	263
21.5	Residents in Old Folks' Homes by Type of Organisation and Sex	264
22	Culture and Recreation	265
22.1	Television Licences, Cable Vision Subscribers, Radio Subscribers and Cinemas	266
22.2	Radio and Television Transmission	268
22.3	National Library Membership, Book Collections and Loans of Books	269
22.4	Daily Newspaper Circulation	269
22.5	Visitors to Places of Interest	270
22.6	Utilisation of Sports Facilities	270
22.7	Sports and Cultural Courses Conducted by Community Centre Clubs	271
22.8	The Arts	272
23	Miscellaneous	273
23.1	Fire Occurrences	275
23.2	Selected Criminal Offences	276

NOTATIONS

na	not available
nec	not elsewhere classified
-	nil or negligible

NOTES

Figures may not add up to the totals due to rounding.

Some figures, particularly those for the most recent time periods, are provisional and may be subject to revision in later issues.

NOTES ON CHANGES AND REVISIONS

From time to time, changes are made to the Yearbook of Statistics to maintain its currency and relevance. Such changes include addition of new series and replacement of existing series as a result of revision necessitated by changed circumstances. In this edition, the following changes are made :

New Tables

The following six tables are included :-

Table 3.1	Population and Growth Rate
Table 4.19	Average Monthly Recruitment Rate by Industry and Occupational Group
Table 4.20	Average Monthly Resignation Rate by Industry and Occupational Group
Table 4.23	Skills Development Fund Grants and Training Places Committed by Type of Training
Table 11.7	Wholesale Trade Index
Table 18.23	Government Recurrent Expenditure on Education Per Student

Replacement of Existing Series

Series in Table 5.9 Balance of Payments have been revised based on the recommendations in International Monetary Fund's "Balance of Payments Manual, Fifth Edition".

Table 13.1 Sea Cargo and Shipping Statistics replaces the previous series.

The following six tables in the Education Section replace the previous series:-

Table 18.1	Enrolment in Educational Institutions
Table 18.2	Students and Teachers in Educational Institutions, End June 1997
Table 18.3	Enrolment in Government and Government-Aided Primary Schools by Level and Age
Table 18.4	Enrolment in Government and Government-Aided Secondary Schools and Junior Colleges by Level and Age
Table 18.5	Private Regular Schools, Students and Teachers
Table 18.6	Enrolment at Primary, Secondary and Pre-university Levels in Private Regular Schools by Level

Other Changes

Indicators on Per Cent of Residents with Secondary or Higher Qualification and Annual Output for ITE, Polytechnic and University have been included in Table 1.12 Education and Literacy.

Table 18.25 Persons Who Registered for Public Trade Tests and Examinations (in previous editions) has been discontinued.

Year	Gross National Product (GNP) (1991 = 100)	Gross National Saving (1991 = 100)	Gross National Capital Formation (1991 = 100)	Gross Domestic Product (1991 = 100)	Gross Fixed Capital Formation (1991 = 100)
1987	100.0	100.0	100.0	100.0	100.0
1988	101.2	101.5	101.8	101.5	101.8
1989	102.5	102.8	103.1	103.0	103.3
1990	103.8	104.1	104.4	104.3	104.6
1991	105.1	105.4	105.7	105.6	105.9
1992	106.4	106.7	107.0	106.9	107.2
1993	107.7	108.0	108.3	108.2	108.5
1994	109.0	109.3	109.6	110.0	110.3
1995	110.3	110.6	110.9	111.3	111.6
1996	111.6	111.9	112.2	112.6	112.9
1997	112.9	113.2	113.5	114.0	114.3
1998	114.2	114.5	114.8	115.3	115.6
1999	115.5	115.8	116.1	116.6	116.9
2000	116.8	117.1	117.4	117.9	118.2
2001	118.1	118.4	118.7	119.2	119.5
2002	119.4	119.7	120.0	120.5	120.8
2003	120.7	121.0	121.3	121.8	122.1
2004	122.0	122.3	122.6	123.1	123.4
2005	123.3	123.6	123.9	124.4	124.7
2006	124.6	124.9	125.2	125.7	126.0
2007	125.9	126.2	126.5	127.0	127.3
2008	127.2	127.5	127.8	128.3	128.6
2009	128.5	128.8	129.1	129.6	129.9
2010	129.8	130.1	130.4	130.9	131.2
2011	131.1	131.4	131.7	132.2	132.5
2012	132.4	132.7	133.0	133.5	133.8
2013	133.7	134.0	134.3	134.8	135.1
2014	135.0	135.3	135.6	136.1	136.4
2015	136.3	136.6	136.9	137.4	137.7
2016	137.6	137.9	138.2	138.7	139.0
2017	138.9	139.2	139.5	140.0	140.3
2018	140.2	140.5	140.8	141.3	141.6
2019	141.5	141.8	142.1	142.6	142.9
2020	142.8	143.1	143.4	143.9	144.2
2021	144.1	144.4	144.7	145.2	145.5
2022	145.4	145.7	146.0	146.5	146.8
2023	146.7	147.0	147.3	147.8	148.1
2024	148.0	148.3	148.6	149.1	149.4
2025	149.3	149.6	149.9	150.4	150.7
2026	150.6	150.9	151.2	151.7	152.0
2027	151.9	152.2	152.5	153.0	153.3
2028	153.2	153.5	153.8	154.3	154.6
2029	154.5	154.8	155.1	155.6	155.9
2030	155.8	156.1	156.4	156.9	157.2

KEY INDICATORS

Year	GNP	GNP	GNP	GNP	GNP	GNP
1987	100.0	100.0	100.0	100.0	100.0	100.0
1988	101.2	101.5	101.8	101.5	101.8	101.8
1989	102.5	102.8	103.1	103.0	103.3	103.3
1990	103.8	104.1	104.4	104.3	104.6	104.6
1991	105.1	105.4	105.7	105.6	105.9	105.9
1992	106.4	106.7	107.0	106.9	107.2	107.2
1993	107.7	108.0	108.3	108.2	108.5	108.5
1994	109.0	109.3	109.6	110.0	110.3	110.3
1995	110.3	110.6	110.9	111.3	111.6	111.6
1996	111.6	111.9	112.2	112.6	112.9	112.9
1997	112.9	113.2	113.5	114.0	114.3	114.3
1998	114.2	114.5	114.8	115.3	115.6	115.6
1999	115.5	115.8	116.1	116.6	116.9	116.9
2000	116.8	117.1	117.4	117.9	118.2	118.2
2001	118.1	118.4	118.7	119.2	119.5	119.5
2002	119.4	119.7	120.0	120.5	120.8	120.8
2003	120.7	121.0	121.3	121.8	122.1	122.1
2004	122.0	122.3	122.6	123.1	123.4	123.4
2005	123.3	123.6	123.9	124.4	124.7	124.7
2006	124.6	124.9	125.2	125.7	126.0	126.0
2007	125.9	126.2	126.5	127.0	127.3	127.3
2008	127.2	127.5	127.8	128.3	128.6	128.6
2009	128.5	128.8	129.1	129.6	129.9	129.9
2010	129.8	130.1	130.4	130.9	131.2	131.2
2011	131.1	131.4	131.7	132.2	132.5	132.5
2012	132.4	132.7	133.0	133.5	133.8	133.8
2013	133.7	134.0	134.3	134.8	135.1	135.1
2014	135.0	135.3	135.6	136.1	136.4	136.4
2015	136.3	136.6	136.9	137.4	137.7	137.7
2016	137.6	137.9	138.2	138.7	139.0	139.0
2017	138.9	139.2	139.5	140.0	140.3	140.3
2018	140.2	140.5	140.8	141.3	141.6	141.6
2019	141.5	141.8	142.1	142.6	142.9	142.9
2020	142.8	143.1	143.4	143.9	144.2	144.2
2021	144.1	144.4	144.7	145.2	145.5	145.5
2022	145.4	145.7	146.0	146.5	146.8	146.8
2023	146.7	147.0	147.3	147.8	148.1	148.1
2024	148.0	148.3	148.6	149.1	149.4	149.4
2025	149.3	149.6	149.9	150.4	150.7	150.7
2026	150.6	150.9	151.2	151.7	152.0	152.0
2027	151.9	152.2	152.5	153.0	153.3	153.3
2028	153.2	153.5	153.8	154.3	154.6	154.6
2029	154.5	154.8	155.1	155.6	155.9	155.9
2030	155.8	156.1	156.4	156.9	157.2	157.2

1.1 NATIONAL INCOME

Year	Gross National Product (GNP) \$ M	Per Capita GNP \$	Gross National Saving \$M	Gross Capital Formation \$M	Gross Domestic Product \$M	Gross Fixed Capital Formation \$M
	At Current Market Prices				At 1990 Market Prices	
1987	43,140.6	15,547.3	15,966.9	16,298.7	50,899.9	16,283.1
1992	82,391.9	25,925.7	38,724.2	29,081.2	77,337.6	27,349.8
1993	93,497.8	28,685.6	42,536.7	35,749.2	85,387.3	30,202.4
1994	109,160.5	32,454.4	52,904.6	35,539.9	94,367.9	32,870.9
1995	121,887.4	35,151.4	60,957.0	40,702.8	102,531.2	36,105.0
1996	133,108.0	36,851.6	66,734.6	46,170.0	109,572.8	42,309.6
1997	146,890.9	39,310.3	75,144.7	53,422.3	118,077.8	46,072.5
Percentage Change Over Previous Year						
1987	7.3	5.7	3.6	10.8	9.7	-0.6
1992	9.1	6.1	13.3	13.0	6.2	11.8
1993	13.5	10.6	9.8	22.9	10.4	10.4
1994	16.8	13.1	24.4	-0.6	10.5	8.8
1995	11.7	8.3	15.2	14.5	8.7	9.8
1996	9.2	4.8	9.5	13.4	6.9	17.2
1997	10.4	6.7	12.6	15.7	7.8	8.9

Year	Measures of Inflation			Unit Labour Cost		Unit Business Cost of Manufacturing (1988 = 100)
	Consumer Price Index (Oct 92 - Sep 93 = 100)	Domestic Supply Price Index (1990 = 100)	Gross Domestic Product Deflator (1990 = 100)	Overall Economy (1988 = 100)	Manufacturing (1988 = 100)	
1987	86.4	97.7	85.6	97.0	96.2	96.9
1992	98.3	91.7	104.7	127.8	134.2	122.2
1993	100.5	89.2	110.5	129.3	130.0	121.0
1994	103.6	87.3	114.7	133.5	126.1	120.2
1995	105.4	87.4	117.7	136.4	124.0	122.6
1996	106.9	87.5	119.4	141.8	126.7	125.0
1997	109.0	86.5	121.1	143.4	126.7	125.5
Percentage Change Over Previous Year						
1987	0.5	7.5	1.2	-4.3	-5.4	-3.5
1992	2.3	-4.4	1.0	3.7	6.3	3.1
1993	2.3	-2.8	5.5	1.2	-3.1	-1.0
1994	3.1	-2.0	3.8	3.2	-3.0	-0.7
1995	1.7	0.1	2.6	2.2	-1.7	2.0
1996	1.4	0.1	1.4	4.0	2.2	2.0
1997	2.0	-1.2	1.4	1.1	-	0.4

1.3 MANUFACTURING AND BUILDING & CONSTRUCTION

Year	Manufacturing			Building & Construction			
	Net Investment Commitments	Output ¹	Index of Industrial Production ¹ (1996=100)	Written Permission	Building Plan Approval ²	Building Commencement	Building Completed
	\$M			Thousand Square Metres of Gross Floor Area			
1987	1,743.0	46,084	45.6	7,369	1,069	4,199	7,057
1992	3,481.0	77,276	70.5	9,560	2,889	8,827	6,581
1993	3,922.6	87,639	77.7	8,162	3,157	9,040	6,506
1994	5,764.6	100,622	87.8	9,563	4,101	9,498	6,213
1995	6,809.1	113,358	96.8	12,751	4,106	11,890	8,193
1996	8,085.1	119,869	100.0	13,121	5,979	10,612	8,791
1997	8,488.4	125,537	104.6	14,414	6,602	11,963	11,072
Percentage Change Over Previous Year							
1987	20.2	23.7	17.4	-13.2	33.0	-21.2	-21.3
1992	18.6	3.6	2.4	33.2	-18.7	7.2	54.4
1993	12.7	13.4	10.2	-14.6	9.3	2.4	-1.1
1994	47.0	14.8	13.0	17.2	29.9	5.1	-4.5
1995	18.1	12.7	10.3	33.3	0.1	25.2	31.9
1996	18.7	5.7	3.3	2.9	45.6	-10.7	7.3
1997	5.0	4.7	4.6	9.9	10.4	12.7	25.9

1 Refer to establishments engaging 10 or more workers.

2 Refer to private sector only.

1.4

EXTERNAL TRADE AND TOURISM

Year	External Trade					Tourism	
	Total	Exports			Imports	Visitor Arrivals ¹	Hotel Rooms Available ²
		Total	Domestic Exports	Re-exports			
	Million Dollars					Thousand	Number
1987	128,681.0	60,265.7	39,070.6	21,195.1	68,415.2	3,678.8	21,891
1992	220,880.7	103,351.0	66,336.8	37,014.3	117,529.7	5,989.9	23,342
1993	257,076.4	119,473.4	75,394.0	44,079.4	137,603.0	6,425.8	23,959
1994	303,723.0	147,327.2	88,533.3	58,793.9	156,395.8	6,899.0	24,601
1995	343,828.2	167,514.7	98,472.7	69,042.0	176,313.5	7,137.3	25,590
1996	361,455.3	176,271.9	103,588.8	72,683.2	185,183.4	7,292.5	27,010
1997	382,217.7	185,612.5	107,535.2	78,077.3	196,605.2	7,198.0	27,915
Percentage Change Over Previous Year							
1987	23.1	23.0	21.9	25.2	23.2	15.3	16.1
1992	2.2	1.4	0.5	3.3	2.9	10.6	2.8
1993	16.4	15.6	13.7	19.1	17.1	7.3	2.6
1994	18.1	23.3	17.4	33.4	13.7	7.4	2.7
1995	13.2	13.7	11.2	17.4	12.7	3.5	4.0
1996	5.1	5.2	5.2	5.3	5.0	2.2	5.5
1997	5.7	5.3	3.8	7.4	6.2	-1.3	3.4

1 Exclude arrivals of Malaysians by land.

2 Refer to gazetted hotels.

Year	Cargo Handled					International Telephone Calls ²
	Air ¹		Sea		Container Throughput	
	Discharged	Loaded	Inward	Outward		
	Tonnes		Thousand Freight Tonnes		Thousand TEUs	
1987	222,160	196,937	75,779.7	53,678.6	2,634.4	30,797
1992	386,793	332,212	136,468.2	101,977.7	7,555.8	105,246
1993	444,019	394,397	158,959.7	114,763.4	9,047.0	123,680
1994	529,334	480,430	164,486.0	125,588.8	10,400.3	146,093
1995	577,749	528,024	175,259.7	130,224.3	11,846.0	176,141
1996	622,019	568,438	179,571.7	134,592.5	12,944.5	199,612
1997	696,778	639,570	188,234.4	139,272.3	14,135.9	230,524
Percentage Change Over Previous Year						
1987	15.3	22.9	8.6	5.3	19.6	42.5
1992	13.0	10.4	17.1	13.4	18.9	19.0
1993	14.8	18.7	16.5	12.5	19.7	17.5
1994	19.2	21.8	3.5	9.4	15.0	18.1
1995	9.1	9.9	6.5	3.7	13.9	20.6
1996	7.7	7.7	2.5	3.4	9.3	13.3
1997	12.0	12.5	4.8	3.5	9.2	15.5

¹ Refer to Changi Airport only.

² Exclude calls to Peninsular Malaysia.

1.6 GOVERNMENT FINANCE

Year	Operating Revenue ¹	Operating Expenditure ²	Development Expenditure ³	Public Debt ⁴		
				Total	Domestic	External
	Million Dollars					
1987	na	na	na	38,274.3	37,971.1	303.2
1992	17,218.4	8,485.6	3,794.8	67,252.5	67,228.2	24.3
1993	19,527.2	9,144.0	3,410.3	69,822.0	69,810.4	11.6
1994	23,280.2	9,699.8	4,418.3	75,344.4	75,339.7	4.7
1995	24,781.6	10,883.7	4,671.3	86,507.6	86,507.6	-
1996	28,038.3	12,253.6	6,920.7	94,830.7	94,830.7	-
1997	30,612.7	15,159.0	10,705.9	102,371.9	102,371.9	-
Percentage Change Over Previous Year						
1987	na	na	na	13.3	13.9	-32.8
1992	15.9	8.7	7.7	13.9	13.9	-40.4
1993	13.4	7.8	-10.1	3.8	3.8	-52.3
1994	19.2	6.1	29.6	7.9	7.9	-59.5
1995	6.4	12.2	5.7	14.8	14.8	-
1996	13.1	12.6	48.2	9.6	9.6	-
1997	9.2	23.7	54.7	8.0	8.0	-

1 Refer to receipts credited to the Consolidated Revenue Account, Development Fund Account and Sinking Fund Account, but excludes investment income and capital receipts.

2 Refer to Expenditure on Manpower, Other Operating Expenditure (excluding expenses on investment and agency fees on land sales), Grants-in-Aid and Pensions.

3 Exclude loans to statutory boards, industrial and commercial enterprises.

4 Refer to end of year.

End of Year	Money Supply (M1)	Official Foreign Reserves	CPF	Total Assets / Liabilities		
			Amount Due to Members	Commercial Banks	Merchant Banks	Asian Currency Units
	Million Dollars					
1987	11,030.5	30,441.7	30,607.8	86,483.6	32,119.5	244,868.5
1992	18,515.6	65,788.4	51,526.9	153,302.4	36,786.7	355,378.6
1993	22,882.2	77,866.8	52,334.3	170,250.4	42,205.3	386,103.0
1994	23,411.5	85,165.5	57,649.2	201,952.5	45,049.4	416,345.4
1995	25,349.2	97,336.6	66,035.4	224,578.7	50,253.1	478,232.9
1996	27,040.0	107,750.8	72,566.6	252,723.4	53,580.6	506,870.2
1997	27,510.9	119,616.8	79,657.4	289,722.3	66,662.0	557,182.3
Percentage Change Over Previous Year						
1987	12.3	8.1	4.3	12.6	1.7	22.1
1992	12.7	17.9	11.9	12.6	22.5	-0.7
1993	23.6	18.4	1.6	11.1	14.7	8.6
1994	2.3	9.4	10.2	18.6	6.7	7.8
1995	8.3	14.3	14.5	11.2	11.6	14.9
1996	6.7	10.7	9.9	12.5	6.6	6.0
1997	1.7	11.0	9.8	14.6	24.4	9.9
End of Year	Commercial Banks		Finance Companies			POSBank
	Deposits of Non-Bank Customers	Advances to Non-Bank Customers ¹	Deposits from Individuals & Institutions	Loans for		Total Deposit Base
				Hire Purchase of Motor Vehicles	Housing	
1987	36,393.0	37,868.6	5,362.9	359.9	1,544.6	11,281.1
1992	78,483.2	69,138.9	9,550.9	2,238.9	1,473.6	18,126.8
1993	85,400.8	78,454.3	10,567.8	3,390.0	1,826.9	20,310.0
1994	99,032.2	90,974.2	13,790.3	4,729.8	2,314.3	20,268.9
1995	108,885.5	108,974.0	15,417.8	4,651.1	2,637.3	22,334.6
1996	118,201.5	126,987.7	15,071.6	4,052.3	3,221.1	24,897.6
1997	124,134.8	143,243.8	15,611.8	3,975.2	3,721.7	25,833.3
Percentage Change Over Previous Year						
1987	18.9	5.8	9.7	24.6	6.9	6.1
1992	8.6	8.0	6.5	33.7	-3.3	15.9
1993	8.8	13.5	10.6	51.4	24.0	12.0
1994	16.0	16.0	30.5	39.5	26.7	-0.2
1995	9.9	19.8	11.8	-1.7	14.0	10.2
1996	8.6	16.5	-2.2	-12.9	22.1	11.5
1997	5.0	12.8	3.6	-1.9	15.5	3.8

1 Include bills financing.

1.8 POPULATION

Year	Mid-Year Population		Population Density	Median Age ¹	Dependency Ratio ²	Sex Ratio ¹
	Total	Resident				
	Thousand		Per Square Kilometre	Years	Per Hundred	Males Per 1,000 Females
1987	2,774.8	2,553.9	4,457	28.3	47.6	1,027
1992	3,178.0	2,818.2	4,958	30.6	48.1	1,021
1993	3,259.4	2,873.8	5,087	31.0	48.4	1,018
1994	3,363.5	2,930.2	5,206	31.4	48.7	1,015
1995	3,467.5	2,986.5	5,355	31.8	49.0	1,013
1996	3,612.0	3,044.3	5,578	32.2	48.9	1,012
1997	3,736.7	3,103.5	5,768	32.6	48.7	1,010

1 Refer to resident population (citizens and permanent residents).

2 Residents under 15 years and those 60 years and over divided by residents aged 15 - 59 years.

1.9 VITAL STATISTICS

Year	Population Growth Rate	Crude Birth Rate	Crude Death Rate	Infant Mortality Rate	Total Fertility Rate	Gross Reproduction Rate
	Per Cent	Per 1,000 Population		Per 1,000 Live-births	Per 1,000 Female Population Aged 15-44 years	
1987	1.4	16.6	4.7	5.5	1,621	781
1992	2.0	17.0	4.7	4.8	1,760	853
1993	2.0	17.0	4.6	4.7	1,778	859
1994	2.0	16.4	4.7	4.1	1,749	846
1995	1.9	15.7	4.8	3.8	1,708	821
1996	1.9	15.3	4.7	3.6	1,696	813
1997	1.9	14.6	4.5	3.3	1,637	787

Note : Data refer to resident population (citizens and permanent residents).

1.10 EMPLOYMENT

Year	Labour Force ¹	Unemployment Rate ¹	Labour Force Participation Rate ¹			CPF Contributors in Labour Force	Union Members Among Employed
			Total	Males	Females		
	Thousand		Per Cent				
1987	1,329.3	4.0	62.7	78.6	47.0	70.4	16.2
1992	1,619.6	2.1	65.3	79.9	51.3	66.3	14.5
1993	1,635.7	2.0	64.5	79.1	50.6	67.7	14.8
1994	1,693.1	1.9	64.9	79.6	50.9	67.3	14.1
1995	1,749.3	1.9	64.4	78.4	50.1	67.2	13.8
1996	1,801.9	2.1	64.6	78.7	51.5	66.3	14.6
1997	1,876.0	1.7	64.2	78.3	51.1	65.3	14.2

¹ Refer to persons aged 15 years and over in June of the respective years. Unemployment rates were seasonally adjusted.

1.11 HEALTH

Year	Life Expectancy at Birth			Doctors	Dentists	Nurses	Per Capita Government Expenditure on Health ¹
	Total	Males	Females				
	Years			Per 10,000 Population			Dollar
1987	74.6	72.5	76.7	11	2	31	190
1992	75.9	73.8	78.2	12	2	33	372
1993	76.1	74.0	78.3	13	2	34	375
1994	76.3	74.2	78.5	13	2	35	400
1995	76.4	74.2	78.7	13	2	36	477
1996	76.7	74.6	79.0	13	2	37	484
1997	77.1	75.0	79.2	13	2	38	512

¹ Include expenditure of restructured hospitals.

Year	Pupils Per Teacher		Student Enrolment Ratio ¹	Literacy Rate ²	Residents Aged 25 Years & Over ³	
	Primary	Secondary			Mean Years of Schooling	% with Secondary or Higher Qualification
	Number		Per Cent			
1987	26	22	94.5	87.0	5.9	32.7
1992	26	21	92.7	90.3	7.0	40.3
1993	24	21	92.3	90.8	7.1	41.2
1994	24	22	91.6	91.3	7.3	42.9
1995	25	23	92.3	91.8	7.7	47.5
1996	26	22	92.5	92.2	7.6	46.1
1997	25	21	93.0	92.8	7.8	46.4

Year	Passes At			Annual Output		
	PSLE ⁴	GCE 'O' Level	GCE 'A' Level	ITE ⁵	Polytechnic ⁶	University ⁷
	Per Cent			Number		
1987	86.5	88.1	74.2	9,968	6,436	4,638
1992	91.2	89.0	82.7	8,173	8,582	6,631
1993	92.2	90.5	86.1	8,209	10,016	7,248
1994	92.9	89.3	88.1	8,035	11,025	7,515
1995	94.2	90.9	86.3	7,325	11,457	7,927
1996	95.5	90.8	85.4	5,581	12,650	8,218
1997	95.7	90.3	84.2	4,918	13,904	8,679

1 Students aged 6-17 years divided by resident population of same age group.

2 Refer to resident population aged 15 years and over.

3 Refer to non-students.

4 From 1993, figures refer to students eligible for secondary schools.

5 Refer to trainees who completed full-time institutional training or apprenticeship programmes.

6 Include graduates from part-time courses.

7 Refer to first degree graduates from National University of Singapore and Nanyang Technological University.

1.13

PUBLIC HOUSING AND UTILITIES USAGE

Year	Public Housing ¹				Utilities Usage	
	Public Flats		Per Cent of Total Population ⁴ Living in		Domestic Electricity Consumption Per Resident	Domestic Water Consumption Per Resident
	Total ² Number Managed	Per Cent ³ Owner-occupied	Public Flats	Owner-occupied Public Flats	Kilowatt Hour	Cubic Metre
1987	612,826	80	86	69	676.9	59.4
1992	641,016	89	87	82	1,024.9	70.0
1993	655,487	89	87	81	1,087.2	71.4
1994	676,558	90	86	80	1,182.9	73.7
1995	700,060	90	86	81	1,283.5	73.0
1996	725,144	91	86	81	1,367.5	73.9
1997	755,313	91	86	81	1,526.2	74.7

1 Refer to flats managed by Housing and Development Board.

2 As at end of year.

3 Percentage of sold flats over total units under management.

4 Data from 1990 refer to resident population.

1.14

OTHER SOCIAL INDICATORS

Year	Television ¹ Licences	Residential ¹ Telephone Lines	Private Cars ¹	Public Buses	Daily Newspaper Circulation	Crime Rate ² Per 100,000 Population
	Per 1,000 Population					
1987	208	245	79	3	253	1,823
1992	218	265	95	3	288	1,617
1993	222	270	100	3	300	1,499
1994	220	279	105	3	306	1,451
1995	219	287	110	3	290	1,401
1996	224	305	115	3	279	1,305
1997	193	321	117	3	274	1,198

1 Indicator computed based on resident population.

2 Refer to total offences reported.

CLIMATE, AIR QUALITY AND LAND USE

2

1991	1992	1993	1994	1995	1996	1997
------	------	------	------	------	------	------

Location

The Republic of Singapore is located between latitudes 1° 02'N and 1° 29'N and longitudes 103° 36'E and 104° 25'E. This location at the focal point of the trade routes in Southeast Asia contributes greatly to the development of Singapore as a regional centre for commerce, finance, transport and communications, and other services.

CLIMATE, AIR QUALITY AND LAND USE

Geography

The land area of Singapore is approximately 647.8 square kilometres. It comprises the main island and a number of islets scattered off its north-east and south-east coasts. The main island measures about 42 kilometres from north to south and 23 kilometres from east to west.

Singapore can be geographically divided into three major areas: the central area with heavy deposits of granite in Bukit Timah, Bukit Panjang, Bukit Merah and Bukit Batok; the western undulating area comprising Mount Faber Ridge and Bukit Panjang Ridge; and the eastern coastal area consisting of alluvium and sediment stretches from Katong to Bedok and Changi.

Climate

The main features of the climate of Singapore are the relatively stable temperature throughout the year due to its close proximity to the Equator and high humidity and abundant rainfall due to the maritime exposure of the island. The average maximum and minimum temperatures are around 32°C and 25°C respectively. The relative humidity is usually between 65 and 70 per cent on dry afternoons but frequently exceeds 90 per cent in the early hours of the morning before sunrise. Although

Land Use

Of the total land area, about 49.7 per cent has been developed for residential, commercial and industrial usage and another 1.6 per cent used for agriculture. The rest consists of forest reserves, marsh and other non-built up areas.

Based on the Pollutant Standards Index (PSI), there were 1977 good days, 484 moderate days and 37 unhealthy days for the year.

The overall air pollution levels in 1997 with the exception of respirable suspended particulates, were generally low and were within the World Health Organisation (WHO) Long Term Goals and the US Environmental Protection Agency (USEPA) Standards. The respirable suspended particulates exceeded the acceptable levels due to a severe transboundary smoke haze episode from August to early November.

The Ministry of the Environment monitors the ambient air quality through a network of air quality monitoring stations linked to a Central Control Station via telephone lines. The 12 stations are located in urban, industrial and sub-urban areas. The pollutants monitored are sulphur dioxide (12 stations), nitrogen oxides (12 stations), carbon monoxide (4 stations), ozone (4 stations) and PM10 (8 stations).

Air Pollution
line quality occasionally hit the island. During the Southeast Monsoon season from May to September, early morning rain falls throughout the year, the wettest months are usually during the first part of the Northeast Monsoon season from November to January.

Location

The Republic of Singapore, is located between latitudes 1° 09'N and 1° 29'N and longitudes 103° 36'E and 104° 25'E. This location at the focal point of the trade routes in Southeast Asia contributes greatly to the development of Singapore as a regional centre for commerce, finance, transport and communications, and other services.

Geography

The land area of Singapore is approximately 647.8 square kilometres. It comprises the main island and a number of islets scattered off its north-east and south. The main island measures about 42 kilometres from east to west and 23 kilometres from north to south with a coastline of 150.5 kilometres.

Singapore can be geographically divided into three major areas - the central hilly area with heavy deposits of granite in Bukit Timah, Bukit Panjang, Bukit Mandai and Bukit Batok; the western undulating area comprising Mount Faber Ridge and Pasir Panjang Ridge and the eastern coastal area consisting of alluvium and sediment stretches from Katong to Bedok and Changi.

Climate

The main features of the climate of Singapore are the relatively stable temperature throughout the year due to its close proximity to the Equator and high humidity and abundant rainfall due to the maritime exposure of the island. The average maximum and minimum temperatures are around 32°C and 25°C respectively. The relative humidity is usually between 65 and 70 per cent on dry afternoons but frequently exceeds 90 per cent in the early hours of the morning before sunrise. Although

rain falls throughout the year, the wettest months are usually during the first part of the Northeast Monsoon season from November to January. During the Southwest Monsoon season, from May to September, early morning line squalls occasionally hit the island.

Air Pollution

The Ministry of the Environment monitors the ambient air quality through a telemetric network of 12 ambient air monitoring stations linked to a Central Control Station via telephone lines. The 12 stations are located in urban, industrial and sub-urban areas. The pollutants monitored are sulphur dioxide (12 stations), nitrogen oxides (12 stations), carbon monoxide (4 stations), ozone (4 stations) and PM10 (8 stations).

The overall air pollution levels in 1997, with the exception of respirable suspended particles, were generally low and were within the World Health Organisation (WHO) Long Term Goals and the US Environmental Protection Agency (USEPA) Standards. The respirable suspended particles exceeded the acceptable levels due to a severe transboundary smoke haze episode from August to early November.

Based on the Pollutant Standards Index (PSI), there were 49% 'Good' days, 48% 'Moderate' days and 3% 'Unhealthy' days for the year.

Land Use

Of the total land area, about 49.7 per cent has been developed for residential, commercial and industrial usage and another 1.6 per cent used for agriculture. The rest consists of forest reserves, marsh and other non-built up areas.

2.1 AIR TEMPERATURE AND SUNSHINE

	1987	1992	1993	1994	1995	1996	1997
Air Temperature in Degree Celsius							
Means							
Daily Maximum	31.5	31.5	31.3	31.3	31.3	31.3	32.4
Daily Minimum	24.7	24.4	24.6	24.7	24.7	24.5	25.3
Absolute Extremes							
Maximum	34.6	34.7	34.2	34.2	34.1	34.4	35.1
Minimum	21.2	21.1	21.7	20.5	21.8	22.1	22.0
Bright Sunshine							
Daily Mean Hours	5.9	5.5	5.9	5.4	5.1	5.6	5.7

Source : Meteorological Service

2.2 MEAN RELATIVE HUMIDITY AND RAINFALL

	1987	1992	1993	1994	1995	1996	1997
Mean Relative Humidity ¹ at 2.00 pm (Per Cent)							
	71	71	72	72	74	72	66
Rainfall							
Total (mm)	2,103	2,261	2,169	1,942	2,333	2,418	1,119
Maximum in a day (mm)	127	121	68	178	199	94	66
Number of rainy days	151	163	163	160	179	170	116

Source : Meteorological Service

- 1 The ratio of the actual amount of water vapour in a given volume of air to the amount that would be present were the air saturated at the same temperature, expressed in percentages.

2.3 AIR POLLUTION LEVELS

	1992	1993	1994	1995	1996	1997
Sulphur Dioxide (Mean)($\mu\text{g} / \text{m}^3$)						
Industrial	22	25	29	30	32	29
Urban	18	15	17	19	27	18
Sub-Urban	11	11	12	17	22	12
Nitrogen Dioxide (Mean)($\mu\text{g} / \text{m}^3$)						
Industrial	20	15	30	30	39	41
Urban	22	15	32	31	33	33
Sub-Urban	26	15	24	18	23	23
PM 10 (Mean)($\mu\text{g} / \text{m}^3$)						
Industrial	na	40	54	36	36	54
Urban	na	38	45	29	30	49
Sub-Urban	na	38	46	32	34	51
Carbon Monoxide (No of times max 8-hour value exceeded)						
Industrial	na	na	na	-	-	-
Urban	na	na	na	-	-	-
Sub-Urban	na	na	na	-	-	-
Ozone (No of times max 1-hour value exceeded)						
Industrial	-	-	-	-	-	-
Urban	-	-	-	-	-	-
Sub-Urban	-	-	1	-	-	-

Source : Ministry of the Environment

Notes : Standards for Air Quality

Sulphur Dioxide = $80 \mu\text{g}/\text{m}^3$ (annual mean), $122 \mu\text{g}/\text{m}^3$ (monthly mean)

Nitrogen Dioxide = $100 \mu\text{g}/\text{m}^3$ (annual mean), $153 \mu\text{g}/\text{m}^3$ (monthly mean)

PM 10 (Particulate Matter ≤ 10 microns) = $50 \mu\text{g}/\text{m}^3$ (annual mean), $76 \mu\text{g}/\text{m}^3$ (monthly mean)

Carbon Monoxide = $10 \text{ mg}/\text{m}^3$ (maximum 8-hour value)

Ozone = $235 \mu\text{g}/\text{m}^3$ (maximum 1-hour value)

All measurements of air quality are corrected to a reference temperature of 25°C and pressure of 760 mm of mercury.

2.4 LAND USE

Square Kilometres

	1987	1992	1993	1994	1995	1996	1997
Total	622.6	641.0	641.4	646.1	647.5	647.5	647.8
Built-up Area ¹	302.9	315.7	316.5	318.9	319.3	321.6	322.2
Farm Holding Area ²	32.6	6.8	6.9	7.8	9.3	10.8	10.8
Forest	28.6	28.6	28.6	28.6	28.6	28.6	28.6
Marsh & Tidal Waste	15.7	15.7	15.7	15.7	15.7	15.5	15.5
Others ³	242.8	274.2	273.8	275.1	274.6	271.0	270.7

Source : Survey Department

1 Include new industrial sites.

2 Refer to licensed farms excluding land occupied by pure rubber and coconut plantations.

3 Include inland water, open spaces, public gardens, cemeteries, non-built up areas in military establishments, quarries, rubber and coconut plantations.

DEMOGRAPHY

GRAPHY

3 DEMOGRAPHY

Population Census

Singapore's first census was taken in April 1871. After that, regular censuses were undertaken in ten-year intervals up to 1931. The Second World War delayed the next census till 1947. In the pre-war censuses, Singapore was included as part of the Straits Settlements and, later, part of Malaya. Separate censuses for Singapore were carried out since 1947. The 1990 Census was Singapore's third census since independence. The other two censuses were conducted in 1970 and 1980. In 1995, Singapore conducted her first mid-decade mini census.

Census data generally refer to all persons enumerated in Singapore at the time of the census except non-locally domiciled services personnel and their dependants, ships' crew and passengers in transit in Singapore waters and foreign visitors living in hotels. However, data for the 1990 Census published for general information refer only to Singapore residents, that is, citizens and those granted permanent residence in Singapore.

Births and Deaths

The Registration of Births and Deaths Act (cap 267), specifies that a birth must be registered within 42 days of the date of birth. Births registered after 42 days from occurrence are classified as late registrations. A birth registration after one year from the date of birth can only be effected with the written authority of the Registrar-General of Births and Deaths. Under the same Act, a death must be registered within 3 days of its occurrence. Still-births, which are classified separately from births and deaths, must be registered within 14 days of their occurrence.

Registration facilities for births and deaths are available at the Registry of Births

and Deaths, and at designated government hospitals. Deaths and still-births can also be registered at gazetted police stations/sub-stations/neighbourhood police posts. The registration system is comprehensive and the records of vital statistics are virtually complete.

Measures of natality and mortality include the crude birth and crude death rates. From 1981 onwards, these are defined as the number of live-births and deaths respectively of Singapore residents, per thousand mid-year resident population.

Marriages

Registration of marriages is compulsory in Singapore. Marriages other than Muslim marriages are registered under the Women's Charter, 1961. Notices of such marriages have to be lodged with the Registrar of Marriages regardless of the venue of solemnization.

Registration of Muslim marriages in Singapore became compulsory from 1 July 1909 when the Mohammadan Marriage Ordinance, 1908 (Ordinance No. XXV of 1908) was enacted. This Ordinance was subsequently repealed and replaced by the Administration of Muslim Law Act, 1966.

Divorces

Pertinent information on Muslim divorces are compiled from records maintained by the Syariah Court while those on non-Muslim divorces are compiled from petitions submitted to the Supreme Court. Time-dependent variables, eg, the year of occurrence, age of divorcees, and duration of marriage are based on the date of registration for Muslim divorces and date decree made absolute for non-Muslim divorces.

3 DEMOGRAPHY (cont'd)

Definitions

Rates on fertility and reproduction refer to residents only.

Age-specific fertility rate : It refers to the number of births by mothers of a specific age group during a given year, per thousand females in that age group.

Total fertility rate : It is the average number of children that would be born per female, if all females lived to the end of their childbearing years and bore children according to a given set of age-specific fertility rates. It is derived by aggregating the age-specific fertility rates of females in each of the reproductive ages for a specific year.

Gross reproduction rate : It gives the average number of daughters produced by each female during her whole reproductive period and is similarly computed as in the case of TFR, on the basis of female births only. This rate implicitly assumes that all females live to the end of their childbearing years.

Net reproduction rate : It is a refinement of the gross reproduction rate, in that it takes into account the mortality of females from birth to the end of their reproductive years. It is the average number of female children that would replace one female

if current fertility and mortality levels prevail. It is also the measure of replacement of population.

Age-specific marriage rate : It is defined as the number of persons within a specific age group marrying in a given year, out of every thousand unmarried persons in the same age group. From 1984 onwards, the rates refer to Singapore residents only.

Other References

Vital statistics on births and deaths are compiled and published monthly in the "Singapore Demographic Bulletin". The annual "Report on Registration of Births and Deaths" published by the Registrar-General of Births and Deaths also provides demographic and socio-economic characteristics of parents and characteristics of births, detailed causes of death, together with statistical tables and charts.

Annual data on marriages and divorces are available in the publication "Statistics on Marriages and Divorces". This publication analyses annual marriage trends and the socio-economic characteristics of grooms and brides, as well as provides insight into the nature of divorces and the socio-economic characteristics of divorcees.

3.1 POPULATION AND GROWTH RATE

Year	Total Population	Resident Population ¹	Total Population Growth ²	Resident Population Growth ²
	Thousand		Per Cent	
Census				
1901	227.6	na	na	na
1911	303.3	na	2.9	na
1921	418.3	na	3.3	na
1931	557.7	na	2.9	na
1947	938.2	na	3.3	na
1957	1,445.9	na	4.4	na
1970	2,074.5	2,013.6	2.8	na
1980	2,413.9	2,282.1	1.5	1.3
1990	3,016.4	2,705.1	2.3	1.7
Mid-Year Estimates				
1991	3,089.9	2,762.7	2.4	2.1
1992	3,178.0	2,818.2	2.9	2.0
1993	3,259.4	2,873.8	2.6	2.0
1994	3,363.5	2,930.2	3.2	2.0
1995	3,467.5	2,986.5	3.1	1.9
1996	3,612.0	3,044.3	4.2	1.9
1997	3,736.7	3,103.5	3.5	1.9

- 1 Resident population refers to citizens and permanent residents.
- 2 The population growth rate for each Census year refers to average annual rate of increase between that Census and the preceding one.

3.2 VITAL RATES

Year	Rate of Natural Increase	Crude Birth Rate	Crude Death Rate	Infant Mortality Rate	Total Fertility Rate ¹	Gross Re- production Rate ¹
	Per 1,000 Population			Per 1,000 Live-births	Per 1,000 Females	
1950	33.4	45.4	12.0	82.2	na	na
1955	36.2	44.3	8.1	49.5	na	na
1960	31.3	37.5	6.2	34.9	5,813	2,803
1965	24.1	29.5	5.4	26.3	4,698	2,292
1970	17.0	22.1	5.2	20.5	3,086	1,500
1975	12.6	17.7	5.1	13.9	2,079	1,005
1980	12.7	17.6	4.9	8.0	1,818	879
1987	11.9	16.6	4.7	5.5	1,621	781
1992	12.3	17.0	4.7	4.8	1,760	853
1993	12.4	17.0	4.6	4.7	1,778	859
1994	11.7	16.4	4.7	4.1	1,749	846
1995	10.9	15.7	4.8	3.8	1,708	821
1996	10.7	15.3	4.7	3.6	1,696	813
1997	10.1	14.6	4.5	3.3	1,637	787

Notes : Figures prior to 1980 refer to total population.
 From 1980, figures refer to Singapore residents (citizens and permanent residents).
 1 From 1980 onwards, the rate refers to resident females aged 15-44 years instead of total females aged 15-49 years.

3.3

MID-YEAR ESTIMATES OF SINGAPORE RESIDENTS BY AGE GROUP AND SEX

Thousand

Age Group (Years)	1987	1992	1993	1994	1995	1996	1997
Males							
Total	1,294.2	1,423.7	1,449.9	1,476.3	1,502.9	1,531.1	1,559.4
0 - 4	103.8	126.3	127.7	126.6	127.3	125.9	125.8
5 - 9	102.1	106.0	108.7	115.5	119.0	124.9	130.2
10 - 14	108.5	104.4	106.9	107.2	108.3	108.6	108.1
15 - 19	113.0	109.7	105.2	103.4	103.4	104.6	105.2
20 - 24	131.7	116.6	118.2	119.2	118.7	116.3	113.9
25 - 29	147.2	139.7	137.0	132.2	128.9	127.8	128.8
30 - 34	136.5	152.2	152.4	152.4	151.5	150.9	149.5
35 - 39	112.2	141.2	145.9	149.8	153.6	156.7	157.6
40 - 44	72.8	115.4	120.3	125.8	131.0	137.4	143.9
45 - 49	66.2	73.8	83.0	91.6	103.6	112.5	116.0
50 - 54	52.4	65.2	65.9	66.3	63.3	63.7	72.8
55 - 59	46.4	50.2	51.3	54.2	56.9	60.5	62.8
60 - 64	35.6	42.7	43.6	44.5	46.0	46.7	46.7
65 - 69	26.6	31.7	33.1	34.6	36.2	37.2	37.9
70 - 74	18.9	21.9	22.7	23.6	24.3	25.4	26.5
75 & Over	20.3	26.7	28.0	29.4	30.9	32.0	33.7
Females							
Total	1,259.7	1,394.5	1,423.9	1,453.9	1,483.6	1,513.2	1,544.1
0 - 4	96.3	118.4	119.4	118.4	119.1	118.1	117.2
5 - 9	94.5	98.1	101.1	107.9	111.0	116.6	122.2
10 - 14	101.3	97.2	99.2	99.3	100.7	100.4	100.5
15 - 19	105.5	103.3	99.2	97.2	97.3	98.5	98.8
20 - 24	127.7	113.5	116.3	118.1	118.2	116.0	114.0
25 - 29	140.9	139.1	137.4	134.2	132.1	131.2	133.3
30 - 34	131.8	147.4	148.6	150.1	150.3	151.0	150.8
35 - 39	110.3	135.8	140.7	145.0	148.5	151.2	152.7
40 - 44	71.5	112.2	116.3	121.0	125.9	132.0	138.0
45 - 49	66.2	71.9	81.1	89.4	101.1	109.7	112.7
50 - 54	51.8	65.6	66.1	65.9	62.9	62.8	71.6
55 - 59	45.8	50.3	51.5	54.8	57.2	61.7	64.4
60 - 64	35.1	44.0	44.7	45.9	48.4	48.9	48.6
65 - 69	28.6	33.2	35.0	37.3	39.2	40.6	41.3
70 - 74	22.9	25.5	26.3	26.8	27.1	28.2	29.7
75 & Over	29.5	39.0	41.0	42.6	44.6	46.3	48.3

3.4 SINGAPORE RESIDENT POPULATION BY AGE GROUP, ETHNIC GROUP AND SEX, END JUNE 1997

Ethnic Group / Sex	Total	Thousand							
		0 - 4	5 - 9	10 - 14	15 - 19	20 - 24	25 - 29	30 - 34	35 - 39
Total	3,103.5	243.0	252.4	208.6	204.0	227.9	262.1	300.3	310.3
Males	1,559.4	125.8	130.2	108.1	105.2	113.9	128.8	149.5	157.6
Females	1,544.1	117.2	122.2	100.5	98.8	114.0	133.3	150.8	152.7
Chinese	2,394.2	170.6	178.4	148.5	156.4	181.6	204.9	226.8	239.8
Males	1,195.5	88.4	92.3	77.3	80.7	90.7	100.3	112.6	121.3
Females	1,198.7	82.2	86.1	71.2	75.7	90.9	104.6	114.2	118.5
Malays	437.9	46.1	48.4	40.2	31.1	29.6	34.5	45.6	43.5
Males	222.4	23.9	24.8	20.6	16.1	15.2	17.4	23.1	22.4
Females	215.5	22.2	23.6	19.6	15.0	14.4	17.1	22.5	21.1
Indians	230.6	20.4	20.6	16.9	14.3	14.7	19.9	24.1	23.4
Males	122.3	10.5	10.5	8.7	7.3	7.1	10.1	12.4	12.4
Females	108.3	9.9	10.1	8.2	7.0	7.6	9.8	11.7	11.0
Others	40.8	5.9	5.0	3.0	2.2	2.0	2.8	3.8	3.6
Males	19.2	3.0	2.6	1.5	1.1	0.9	1.0	1.4	1.5
Females	21.6	2.9	2.4	1.5	1.1	1.1	1.8	2.4	2.1

Thousand									
Ethnic Group / Sex	40 - 44	45 - 49	50 - 54	55 - 59	60 - 64	65 - 69	70 - 74	75 - 79	80 & Over
Total	281.9	228.7	144.4	127.2	95.3	79.2	56.2	37.8	44.2
Males	143.9	116.0	72.8	62.8	46.7	37.9	26.5	16.6	17.1
Females	138.0	112.7	71.6	64.4	48.6	41.3	29.7	21.2	27.1
Chinese	226.0	187.3	119.3	105.0	75.4	62.0	43.4	30.1	38.7
Males	115.3	95.3	60.1	51.7	36.8	28.2	18.7	11.9	13.9
Females	110.7	92.0	59.2	53.3	38.6	33.8	24.7	18.2	24.8
Malays	33.9	23.8	14.3	12.2	11.8	9.1	6.8	4.1	2.9
Males	17.3	11.7	7.0	5.7	5.6	4.3	3.6	2.2	1.5
Females	16.6	12.1	7.3	6.5	6.2	4.8	3.2	1.9	1.4
Indians	19.0	15.1	9.3	8.7	6.9	7.1	5.2	3.0	2.0
Males	9.9	7.7	4.9	4.7	3.7	4.9	3.8	2.2	1.5
Females	9.1	7.4	4.4	4.0	3.2	2.2	1.4	0.8	0.5
Others	3.0	2.5	1.5	1.3	1.2	1.0	0.8	0.6	0.6
Males	1.4	1.3	0.8	0.7	0.6	0.5	0.4	0.3	0.2
Females	1.6	1.2	0.7	0.6	0.6	0.5	0.4	0.3	0.4

Note : Figures refer to citizens and permanent residents.

3.5 AGE-SPECIFIC FERTILITY RATES

Age Group (Years)	Per Thousand Resident Females						
	1987	1992	1993	1994	1995	1996	1997
15 - 19	7.7	7.9	8.3	7.4	6.5	6.8	6.7
20 - 24	59.7	53.5	50.9	47.5	47.1	44.7	41.7
25 - 29	124.8	131.5	133.2	132.7	129.0	125.9	119.5
30 - 34	92.5	109.6	111.4	111.7	110.0	111.1	109.5
35 - 39	33.5	42.5	44.5	43.6	42.2	43.7	42.7
40 - 44	5.9	6.8	7.3	6.9	6.6	7.1	7.2

Source : Population Planning Section, Ministry of Health

Note : The rates were computed based on resident live-births per 1,000 resident females.

Resident live-births refer to those with at least one parent who is a Singapore citizen or permanent resident.

3.6 LIVE-BIRTHS BY (a) BIRTH ORDER AND (b) PLACE OF OCCURRENCE

	Number						
	1987	1992	1993	1994	1995	1996	1997
Total ¹	43,616	49,402	50,225	49,554	48,635	48,577	47,371
Birth Order							
1st	17,586	20,307	20,677	20,438	20,158	19,804	19,469
2nd	16,441	17,374	17,807	17,648	17,280	17,519	17,111
3rd	6,966	8,843	8,759	8,561	8,279	8,297	7,939
4th	1,590	2,223	2,279	2,223	2,212	2,291	2,179
5th	398	441	507	496	505	470	487
6th & over	235	213	192	185	199	195	184
Place of Occurrence							
Public Sector Hospitals	26,212	23,275	23,229	22,007	21,179	20,979	21,187
Private Sector Hospitals	17,004	25,930	26,814	27,396	27,296	27,449	26,035
Nursing Homes	131	39	20	-	-	-	-
Other Locations	269	158	162	151	160	149	149

Source : Registry of Births and Deaths

1 Include birth order not stated.

3.7 MALE AND FEMALE AGE-SPECIFIC DEATH RATES

Per Thousand Residents

Age Group (Years)	1987	1992	1993	1994	1995	1996	1997
Males							
Total	5.2	5.2	5.0	5.2	5.4	5.2	5.0
Under 1 ¹	6.0	5.3	5.1	4.3	4.4	3.6	3.9
1 - 4	0.4	0.3	0.3	0.4	0.4	0.4	0.3
5 - 9	0.3	0.3	0.1	0.2	0.2	0.2	0.2
10 - 14	0.3	0.4	0.3	0.3	0.3	0.3	0.2
15 - 19	0.5	0.5	0.5	0.5	0.5	0.5	0.4
20 - 24	0.8	0.8	0.8	0.7	0.7	0.7	0.8
25 - 29	0.8	0.8	0.6	0.7	0.6	0.7	0.6
30 - 34	1.0	0.9	0.7	0.8	0.9	0.8	0.8
35 - 39	1.5	1.2	1.0	1.4	1.3	1.2	1.0
40 - 44	2.2	2.1	2.0	2.1	1.8	2.0	1.9
45 - 49	4.0	3.7	3.4	3.2	3.6	3.2	2.6
50 - 54	8.1	6.1	6.2	6.1	5.8	6.0	5.3
55 - 59	14.0	11.0	10.6	10.6	10.8	9.8	9.3
60 - 64	22.2	20.4	18.6	18.2	18.2	18.2	16.9
65 - 69	30.7	31.1	29.5	31.1	30.0	28.5	27.5
70 & Over	70.9	68.4	65.5	67.1	70.0	65.8	61.4
Females							
Total	4.3	4.2	4.3	4.2	4.3	4.2	4.1
Under 1 ¹	4.9	4.4	4.3	4.0	3.2	3.5	2.7
1 - 4	0.3	0.3	0.3	0.3	0.2	0.3	0.1
5 - 9	0.2	0.1	0.2	0.1	0.2	0.1	0.1
10 - 14	0.2	0.2	0.2	0.2	0.2	0.2	0.1
15 - 19	0.3	0.3	0.2	0.3	0.2	0.3	0.2
20 - 24	0.4	0.3	0.3	0.3	0.3	0.3	0.3
25 - 29	0.5	0.4	0.3	0.3	0.3	0.5	0.3
30 - 34	0.7	0.6	0.5	0.4	0.5	0.5	0.5
35 - 39	1.0	0.7	0.8	0.8	0.8	0.7	0.7
40 - 44	1.7	1.4	1.4	1.1	1.2	1.1	1.1
45 - 49	2.7	2.3	1.9	2.1	2.0	1.8	1.8
50 - 54	5.0	3.9	3.9	3.7	3.5	3.4	3.2
55 - 59	7.7	6.4	6.7	6.6	6.3	5.6	5.4
60 - 64	12.8	10.7	10.2	10.7	9.9	9.5	9.4
65 - 69	20.0	17.8	17.6	17.1	16.8	16.6	16.4
70 & Over	56.0	53.0	53.9	52.6	53.7	52.9	50.2

1 Infant mortality rate (deaths of resident infants under 1 year of age per thousand resident live-births).

3.8 DEATHS BY BROAD GROUP OF CAUSES

Number

Causes of Death	1987	1992	1993	1994	1995	1996	1997
Total	13,173	14,337	14,461	14,946	15,569	15,590	15,305
Infective & Parasitic Diseases	432	342	398	366	369	358	314
of which : Tuberculosis	186	101	115	101	118	132	115
Neoplasms	3,169	3,497	3,560	3,785	3,921	4,034	4,176
of which: Cancer	3,131	3,456	3,531	3,756	3,898	3,985	4,126
Endocrine, Nutritional & Metabolic Diseases	521	269	309	374	327	403	365
of which : Diabetes	492	238	264	334	271	320	281
Diseases of the Blood & Blood-forming Organs	35	33	34	24	37	37	44
Diseases of the Nervous System & Sense Organs	102	127	93	71	89	89	95
Diseases of the Circulatory System	4,675	5,270	5,315	5,460	5,560	5,896	5,650
of which : Heart & Hypertensive Diseases	3,251	3,457	3,552	3,653	3,742	3,984	3,916
Cerebrovascular Disease	1,343	1,697	1,652	1,692	1,701	1,805	1,642
Diseases of the Respiratory System	1,942	2,522	2,588	2,564	2,912	2,534	2,364
of which : Pneumonia	998	1,420	1,596	1,670	2,028	1,693	1,536
Bronchitis	49	46	13	12	15	13	13
Diseases of the Digestive System	329	353	361	394	409	416	352
Diseases of the Genito-Urinary System	393	362	371	444	483	444	398
Congenital Anomalies	171	163	160	148	157	130	103
of which : Congenital Anomalies of Heart	87	92	94	90	89	74	64
Certain Causes of Perinatal Mortality	128	82	76	68	51	64	61
Accidents, Poisonings & Violence	931	1,127	1,066	1,122	1,113	1,040	906
of which :							
Motor Vehicle Accidents	233	240	274	265	233	237	247
Other Accidents	198	231	216	220	220	226	184
Suicides	302	298	296	347	401	271	309
Other Diseases & Causes ¹	345	190	130	126	141	145	477
of which : Senility	125	5	4	2	4	6	3

Source : Registry of Births and Deaths

Note : Deaths are classified according to the Ninth (1975) Revision of the International Classification of Diseases.

1 Figure for 1997 includes causes of death that are pending the Coroner's decision.

3.9 AGE AT FIRST MARRIAGE AND DIVORCE

	Years						
	1987	1992	1993	1994	1995	1996	1997
Mean Age at First Marriage ¹							
Grooms	28.2	29.1	29.3	29.4	29.4	29.5	29.4
Brides	25.5	26.1	26.3	26.3	26.3	26.5	26.5
Mean Age of Divorcees ²							
Males	36.0	37.9	37.1	38.3	39.0	39.3	39.3
Females	32.4	34.5	34.7	34.9	35.6	35.9	35.9

1 Marriages between spinsters and bachelors.
 2 Include annulments of marriages.

3.10 AGE-SPECIFIC MARRIAGE RATES

Age Group (Years)	1987	1992	1993	1994	1995	1996	1997
Males (per thousand unmarried male residents)							
15 - 19	1.0	1.3	1.6	1.4	1.2	1.5	1.2
20 - 24	37.9	32.9	29.6	29.6	29.3	27.9	33.1
25 - 29	104.1	116.7	110.7	109.4	115.0	109.9	117.7
30 - 34	107.8	109.9	107.0	111.1	110.5	112.7	110.1
35 - 39	87.7	79.9	78.1	77.7	71.4	70.9	76.0
40 - 44	61.1	50.5	53.0	55.4	55.2	51.5	47.1
General Marriage Rate	53.4	57.7	56.0	55.2	55.5	53.5	57.1
Females (per thousand unmarried female residents)							
15 - 19	11.9	10.1	8.8	7.8	7.5	6.9	6.6
20 - 24	87.9	80.4	73.0	71.0	70.4	64.0	74.0
25 - 29	124.3	134.7	133.3	133.7	139.3	134.7	145.4
30 - 34	74.3	74.9	75.1	77.6	78.5	73.0	80.8
35 - 39	37.8	36.9	38.7	39.3	38.2	35.7	40.1
40 - 44	19.3	17.6	18.0	16.9	17.4	19.0	19.8
General Marriage Rate	63.9	61.3	59.7	58.2	58.2	54.7	61.0

3.11 GROOMS BY AGE GROUP

Age Group (Years)	Number						
	1987	1992	1993	1994	1995	1996	1997
Women's Charter							
Total	18,635	21,025	20,692	20,243	20,553	19,935	21,300
Under 20	64	89	89	79	61	71	55
20 - 24	3,550	2,854	2,635	2,639	2,626	2,443	2,868
25 - 29	8,672	9,311	9,047	8,533	8,833	8,417	9,366
30 - 34	4,301	5,507	5,496	5,311	5,318	5,155	5,045
35 - 39	1,318	2,075	2,118	2,232	2,196	2,222	2,303
40 - 44	388	682	740	854	902	936	952
45 - 49	182	252	279	324	349	393	415
50 & Over	160	255	288	271	268	298	296
Muslim Law Act							
Total	4,465	4,759	4,606	4,411	4,412	4,171	4,367
Under 20	54	56	84	73	68	83	72
20 - 24	1,373	967	854	890	878	842	858
25 - 29	1,888	2,170	2,010	1,806	1,743	1,606	1,612
30 - 34	636	859	929	868	903	799	884
35 - 39	226	358	362	382	391	387	451
40 - 44	97	151	151	168	206	198	216
45 - 49	74	78	76	81	96	113	113
50 & Over	117	120	140	143	127	143	161

Source : Registry of Marriages

Registry of Muslim Marriages

Note : Data on marriages registered under the Women's Charter exclude marriages previously solemnized outside Singapore or under religious and customary rites.

3.12 BRIDES BY AGE GROUP

							Number
Age Group (Years)	1987	1992	1993	1994	1995	1996	1997
Women's Charter							
Total	18,635	21,025	20,692	20,243	20,553	19,935	21,300
Under 20	850	749	613	519	493	475	425
20 - 24	7,801	7,583	7,363	7,257	7,254	6,564	7,174
25 - 29	7,044	8,478	8,365	8,218	8,427	8,367	9,093
30 - 34	2,079	2,821	2,829	2,709	2,811	2,874	2,857
35 - 39	613	928	997	1,018	1,018	1,058	1,076
40 - 44	150	325	337	336	351	391	435
45 - 49	66	88	121	124	134	132	154
50 & Over	32	53	67	62	65	74	86
Muslim Law Act							
Total	4,465	4,759	4,606	4,411	4,412	4,171	4,367
Under 20	487	492	455	402	420	386	359
20 - 24	2,282	2,006	1,843	1,815	1,805	1,678	1,676
25 - 29	1,065	1,330	1,356	1,175	1,164	1,090	1,188
30 - 34	322	489	497	547	492	489	539
35 - 39	175	223	241	251	289	248	282
40 - 44	67	121	111	118	134	146	154
45 - 49	37	53	65	58	67	86	102
50 & Over	30	45	38	45	41	48	67

Source : Registry of Marriages
Registry of Muslim Marriages
Note : Data on marriages registered under the Women's Charter exclude marriages previously solemnized outside Singapore or under religious and customary rites.

3.13 MARRIAGES REGISTERED BY ETHNIC GROUP OF COUPLE

Ethnic Group	1987	1992	1993	1994	1995	1996	1997
Women's Charter							
Total	18,635	21,025	20,692	20,243	20,553	19,935	21,300
Chinese	16,769	18,709	18,290	17,681	17,972	17,242	18,760
Indians	1,050	1,069	1,095	1,044	1,020	1,087	946
Others	99	124	109	144	170	198	200
Inter-ethnic	717	1,123	1,198	1,374	1,391	1,408	1,394
Muslim Law Act							
Total	4,465	4,759	4,606	4,411	4,412	4,171	4,367
Malays	3,545	3,658	3,487	3,381	3,270	3,033	3,197
Indians	231	242	266	222	256	248	264
Others	17	24	20	13	27	26	10
Inter-ethnic	672	835	833	795	859	864	896

Source : Registry of Marriages

Registry of Muslim Marriages

Note See note to Table 3.12.

3.14 AGE-SPECIFIC DIVORCE RATES

Age Group (Years)	1987	1992	1993	1994	1995	1996	1997
Males (per thousand married resident males)							
20 - 24	17.9	17.2	12.8	17.1	15.3	16.1	21.2
25 - 29	11.8	13.7	14.3	12.1	12.3	12.6	14.2
30 - 34	7.4	9.9	10.2	9.4	9.9	10.0	11.2
35 - 39	6.1	7.9	8.0	7.2	8.5	8.8	8.8
40 - 44	5.1	6.5	6.2	5.7	6.6	7.2	6.8
45 - 49	3.0	4.6	4.6	4.7	5.6	5.8	5.6
50 & Over	1.1	2.0	1.9	1.7	2.0	2.3	2.5
General Divorce Rate	4.9	6.2	6.1	5.6	6.2	6.5	6.7
Females (per thousand married resident females)							
20 - 24	14.2	16.6	17.8	16.3	15.8	17.0	20.1
25 - 29	10.3	12.5	11.8	10.6	11.5	12.1	14.3
30 - 34	6.6	8.8	9.3	8.0	8.8	9.5	9.5
35 - 39	4.7	7.0	6.8	6.3	7.6	7.7	7.6
40 - 44	3.1	5.2	4.9	5.1	5.7	6.5	5.8
45 - 49	2.1	3.7	3.6	3.2	4.1	4.8	4.6
50 & Over	0.6	1.2	1.2	1.1	1.4	1.4	1.9
General Divorce Rate	5.0	6.3	6.2	5.7	6.3	6.7	6.7

Note : Figures include annulments of marriages.

3.15

MALE DIVORCEES BY AGE GROUP

								Number
Age Group (Years)		1987	1992	1993	1994	1995	1996	1997
Women's Charter								
Total ¹		1,912	2,942	2,742	2,690	3,315	3,546	3,676
Under 20		-	-	-	-	-	-	-
20 - 24		50	40	20	28	33	28	32
25 - 29		360	423	368	317	367	363	385
30 - 34		499	696	656	621	703	724	776
35 - 39		434	688	639	615	774	812	771
40 - 44		246	520	486	476	573	649	617
45 - 49		128	221	264	310	410	468	449
50 & Over		102	279	263	265	326	372	474
Muslim Law Act								
Total		796	1,002	1,224	1,082	983	1,088	1,212
Under 20		1	3	4	6	2	2	5
20 - 24		62	47	42	51	32	47	63
25 - 29		220	190	224	192	134	152	169
30 - 34		171	254	308	305	250	270	303
35 - 39		131	189	281	223	213	239	285
40 - 44		81	119	162	133	149	165	170
45 - 49		51	77	77	69	92	94	105
50 & Over		79	123	126	103	111	119	112

Source : Supreme Court

Syariah Court

Note : Figures for divorces under Women's Charter include annulments of marriages.

1 Includes age not stated.

3.16 FEMALE DIVORCEES BY AGE GROUP

Age Group (Years)							Number	
	1987	1992	1993	1994	1995	1996	1997	
Women's Charter								
Total ¹	1,912	2,942	2,742	2,690	3,315	3,546	3,676	
Under 20	2	1	-	3	-	1	1	
20 - 24	175	195	145	152	182	163	181	
25 - 29	593	708	612	569	677	691	749	
30 - 34	488	736	743	648	755	813	803	
35 - 39	311	579	552	565	703	713	694	
40 - 44	137	362	349	389	446	529	493	
45 - 49	80	163	170	189	248	333	320	
50 & Over	33	124	125	117	174	171	265	
Muslim Law Act								
Total	796	1,002	1,224	1,082	983	1,088	1,212	
Under 20	21	18	17	25	13	16	19	
20 - 24	148	120	153	151	107	133	139	
25 - 29	234	253	282	238	178	199	286	
30 - 34	167	225	299	272	245	250	270	
35 - 39	102	181	218	176	190	200	212	
40 - 44	51	99	123	109	118	155	137	
45 - 49	34	50	72	51	75	81	81	
50 & Over	39	56	60	60	57	54	68	

Source : Supreme Court

Syariah Court

Note : Figures for divorcees under Women's Charter include annulments of marriages.

1 Includes age not stated.

3.17 DIVORCES BY ETHNIC GROUP OF COUPLE

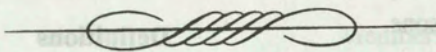
Ethnic Group	Number						
	1987	1992	1993	1994	1995	1996	1997
Women's Charter							
Total	1,912	2,942	2,742	2,690	3,315	3,546	3,676
Chinese	1,648	2,552	2,412	2,322	2,849	2,980	3,176
Indians	131	227	176	209	258	315	256
Others	24	17	33	22	21	66	19
Inter-ethnic	109	146	121	137	187	185	225
Muslim Law Act							
Total	796	1,002	1,224	1,082	983	1,088	1,212
Malays	636	790	996	912	803	933	1,015
Indians	27	38	42	31	39	24	43
Others	5	6	6	1	5	4	8
Inter-ethnic	128	168	180	138	136	127	146

Source : Supreme Court

Syariah Court

Note : Figures for divorces under the Women's Charter include annulments of marriage.

LABOUR AND PRODUCTIVITY



Statistics on average monthly earnings of workers are compiled on the basis of the monthly earnings survey conducted by the Ministry of Labour. The survey is conducted by the Ministry of Labour and covers all establishments with at least 10 employees. The survey is conducted by the Ministry of Labour and covers all establishments with at least 10 employees. The survey is conducted by the Ministry of Labour and covers all establishments with at least 10 employees.

Labour force survey data are based on annual survey. The data refer to persons aged 15 years and over. The reference period refers to the 12 months preceding the date of the survey. The data are based on annual survey. The data refer to persons aged 15 years and over. The reference period refers to the 12 months preceding the date of the survey.

The Employment Service Department of the Ministry of Manpower provides free service to Singapore citizens and permanent residents seeking employment. The service is provided free of charge. The service is provided free of charge. The service is provided free of charge.

Unemployed persons are those who are not employed during the reference period. The reference period is the 12 months preceding the date of the survey. The reference period is the 12 months preceding the date of the survey.

Category	1990	1991	1992	1993	1994
Unemployed persons	15.5	15.5	15.5	15.5	15.5
Unemployed persons	15.5	15.5	15.5	15.5	15.5
Unemployed persons	15.5	15.5	15.5	15.5	15.5

Labour productivity is defined as the ratio of output per worker to the number of workers. The output per worker is measured in terms of value added. The number of workers is measured in terms of full-time equivalent workers.

Labour Force

Labour force data are based on annual labour force surveys. The data refer to persons aged fifteen years and over. The reference period refers to the full calendar week preceding the date of the interview.

Definitions

Employed Persons : Refer to those who, during the reference week (i) worked for one hour or more either for pay, profit or for family gains or (ii) had a job or business but were temporarily absent because of illness, injury, mechanical breakdown, labour-management dispute or other reasons.

Unemployed Persons : Refer to those who did not work during the reference period but were available for work and were looking for a job with pay. Persons in the process of starting their own business or taking up a new job after the reference period were also considered as unemployed.

Economically Active Persons : Refer to those who were either employed or unemployed during the reference week.

Economically Inactive Persons : Refer to those who were not working, did not have a job to return to and were not looking for a job during the reference period.

Age-Sex Specific Labour Force Participation Rate : Refers to the percentage of economically active population to the total population in the specific age-sex groups.

Unemployment Rate : Refers to the percentage of unemployed persons to the total economically active population.

Labour Productivity : Refers to the output per worker in terms of value added at 1990 prices.

Monthly Earnings and Hours Worked

Statistics on average monthly earnings of workers are compiled based on the payroll of CPF contributors. Statistics on weekly hours worked are compiled from various establishment surveys conducted by the Ministry of Manpower. Prior to 1988, the coverage included public and private sector establishments with at least 10 employees. From 1988, only private sector establishments with at least 25 employees are included. The data for the two periods are thus not strictly comparable.

Definitions

Monthly Earnings : Refers to all remuneration received before deduction of the employee's CPF contributions and personal income tax. It includes annual wage supplement and variable payments/bonuses.

Weekly Hours : Refer to the total number of paid hours worked during a week. It is the sum of standard hours and paid overtime hours worked.

Employment Service

The Employment Service Department of the Ministry of Manpower provides free service to Singapore citizens and permanent residents seeking employment to look for suitable jobs and assists employers to recruit workers. Registration for employment assistance by job seekers and notification of job vacancies by employers are voluntary.

Definitions

A registrant refers to an unemployed job seeker who is registered for employment assistance at the Department. Each registration

4 LABOUR AND PRODUCTIVITY (cont'd)

is valid for 3 months. If a registrant wants further assistance after the period, he has to renew his registration.

A new registrant refers to an unemployed registrant seeking employment assistance the first time or an ex-registrant who is re-registered for employment assistance after a break between his previous and current registration.

Statistics on the number of registrants and the number of vacancies notified and filled are compiled from administrative records.

Central Provident Fund

The Central Provident Fund (CPF) was set up in 1955 to provide financial security for workers in their old age. Over the years, it has evolved into a comprehensive social security scheme, which aims at catering to not only a member's old age, but also his home ownership and health care needs.

Both the worker and his employer contribute to the worker's savings with the CPF. Different contribution rates apply to workers in different age groups. From 1 July 1994, the CPF contribution rates (as percentage of wages) are as follows :

<u>Age</u>	<u>Employer</u>	<u>Employee</u>	<u>Total</u>
55 years and below	20.0	20.0	40
Above 55 years to 60 years	7.5	12.5	20
Above 60 years to 65 years	7.5	7.5	15
Above 65 years	5.0	5.0	10

Each member has three accounts: the Ordinary, Medisave and Special Accounts. CPF savings can be used under the various CPF schemes. Savings in the Ordinary Account can

be used for housing, approved investments, insurance, education and transfers to top up parents' Retirement Accounts. Medisave Account savings can be used for hospitalisation expenses and medical insurance, while savings in the Special Account are reserved for old age and contingency purposes.

Savings in the CPF earn a fair rate of interest and are tax-exempt. Since March 1986, the CPF Board has been paying market-related interest rate on members' savings and the rate is adjusted every six months. Savings in the Special and Retirement Accounts earned additional interest of 1.25 percentage points above normal CPF interest rate.

Members can withdraw their CPF savings when they reach 55 years of age after setting aside a minimum sum in their Retirement Account. This is to ensure that they have a minimum regular income to meet their basic needs during retirement.

Singapore Productivity and Standards Board

The Singapore Productivity and Standards Board (PSB) was established in April 1996. Its mission is to raise productivity so as to enhance Singapore's competitiveness and economic growth for a better quality of life for our people.

PSB has six major thrusts to support its mission. They are :

Productivity Promotion : Through an annual national productivity campaign, the interest of the workforce in productivity is sustained. "Innovation and Quality" has been adopted as the foundation theme of the campaign from 1995 to 2000 in support of Singapore's innovation-driven stage of development.

Manpower Development : Some of the key programmes promoted are structured on-the-job

training and the People Developer Standard which grants national recognition to organisations that invest in their people.

Technology Application : PSB acts as a technology connector by establishing conduits that allow industry to gain access to the wide range of technological programmes and services available.

Industry Development : PSB's Local Enterprise Upgrading Centre provides a first stop for small and medium-sized enterprises (SMEs) that are keen to grow and upgrade. In addition, PSB nurtures selected promising SMEs and assists them to become promising local enterprises. PSB also plays a lead role in revitalising the domestic industries so that they will play a bigger part in contributing to the economy's overall performance.

Standards and Quality Development : PSB promotes the widespread use of standards that are aligned to international norms. In addition, PSB establishes mutual recognition agreements with Singapore's key trading nations and companies on the acceptance of Singapore standards and conformity assessments.

Incentives Management : PSB administers and manages various incentive schemes to help local enterprises upgrade their operations, acquire new capabilities and provide better quality and services. These include the Local Enterprise Finance Scheme and the Local Enterprise Technical Assistance Scheme. PSB also administers the Skills Development Fund which provides grants to help companies defray the cost of training their workers.

Trade Unions

Data on trade unions and membership are compiled from returns submitted to the Registrar of Trade Unions and cover both employees' and employers' unions.

Trade Disputes

Data on trade disputes relate only to cases referred to the Labour Relations Division of the Ministry of Manpower.

A trade dispute refers to any dispute between/among workers and employers regarding employment, non-employment, the terms of employment or the conditions of work.

Industrial Stoppages

Data on industrial stoppages refer to cases reported to and handled by the Labour Relations Division of the Ministry of Manpower and include both strikes and lockouts.

Other References

Similar data are in the "Singapore Yearbook of Labour Statistics" published by the Manpower Research and Statistics Department of the Ministry of Manpower.

Detailed statistics on the labour force are published in the "Report on the Labour Force Survey of Singapore".

4.1 LABOUR FORCE

	1987	1992	1993	1994	1995	1996	1997
Labour Force ('000)	1,329.3	1,619.6	1,635.7	1,693.1	1,749.3	1,801.9	1,876.0
Males	827.2	970.8	977.5	1,012.0	1,072.4	1,054.6	1,107.8
Females	502.2	648.8	658.2	681.0	676.9	747.4	768.2
Employed ('000)	1,266.9	1,576.2	1,592.0	1,649.3	1,702.1	1,748.1	1,830.5
Males	785.0	944.3	952.3	987.1	1,044.0	1,023.6	1,081.0
Females	481.8	631.8	639.7	662.2	658.1	724.5	749.4
Unemployed ('000)	62.4	43.4	43.7	43.8	47.2	53.8	45.5
Males	42.1	26.4	25.2	24.9	28.4	31.0	26.8
Females	20.3	17.0	18.5	18.9	18.8	22.8	18.7
Labour Force Participation Rate (%)	62.7	65.3	64.5	64.9	64.4	64.6	64.2
Males	78.6	79.9	79.1	79.6	78.4	78.7	78.3
Females	47.0	51.3	50.6	50.9	50.1	51.5	51.1
Unemployment Rate ¹ (%)	4.0	2.1	2.0	1.9	1.9	2.1	1.7

Source : Ministry of Manpower (Other than 1995)

Note : Refers to persons aged 15 years and over as at June of the respective years.

1 Seasonally adjusted.

4.2 AGE-SPECIFIC LABOUR FORCE PARTICIPATION RATES

Age Group (Years)	1987	1992	1993	1994	1995	1996	Per Cent 1997
Total	62.7	65.3	64.5	64.9	64.4	64.6	64.2
15 - 19	26.7	29.3	25.3	23.3	19.9	20.1	16.8
20 - 24	83.0	81.2	80.2	79.0	76.9	76.1	73.5
25 - 29	83.6	87.0	86.5	87.5	86.6	88.1	88.2
30 - 34	77.0	81.5	80.5	80.6	80.3	82.1	82.5
35 - 39	74.6	77.3	77.5	78.2	77.9	79.0	78.3
40 - 44	71.6	76.0	76.3	76.5	76.6	77.4	77.8
45 - 49	67.9	71.6	73.0	73.6	74.3	75.3	76.0
50 - 54	58.3	62.6	63.1	64.0	65.1	67.5	68.8
55 - 59	40.6	47.3	47.0	49.5	49.7	52.6	50.9
60 - 64	28.9	30.5	30.6	30.6	28.9	31.3	32.4
65 - 69	19.8	20.5	19.0	20.5	17.9	20.5	20.6
70 - 74	12.4	11.8	11.9	12.6	10.1	11.5	9.8
75 & Over	5.5	4.7	4.5	5.3	3.6	4.5	4.0

Source : Ministry of Manpower (Other than 1995)

Note : See note to Table 4.1.

4.3 AGE-SPECIFIC MALE LABOUR FORCE PARTICIPATION RATES

Age Group (Years)	Per Cent						
	1987	1992	1993	1994	1995	1996	1997
Total	78.6	79.9	79.1	79.6	78.4	78.7	78.3
15 - 19	26.3	30.0	25.1	23.6	20.4	21.7	17.1
20 - 24	86.0	82.3	81.0	79.0	76.3	74.3	72.1
25 - 29	96.7	97.0	96.0	96.2	94.6	96.4	94.9
30 - 34	98.3	98.6	98.4	98.2	97.0	98.2	98.5
35 - 39	98.6	98.5	98.4	98.7	97.6	98.2	98.2
40 - 44	98.7	98.2	98.1	98.8	97.5	98.2	97.9
45 - 49	96.3	96.1	96.6	97.1	96.3	96.8	96.9
50 - 54	89.6	89.4	90.0	91.1	90.6	91.4	92.7
55 - 59	63.8	71.3	71.9	74.5	73.7	77.8	76.2
60 - 64	45.7	49.2	50.9	48.9	46.4	48.6	49.9
65 - 69	31.8	33.8	33.1	34.4	29.9	33.5	34.3
70 - 74	20.5	20.1	20.6	21.7	16.7	18.9	15.8
75 & Over	10.3	9.6	8.2	11.1	6.5	8.9	7.8

Source : Ministry of Manpower (Other than 1995)

Note : See note to Table 4.1.

4.4 AGE-SPECIFIC FEMALE LABOUR FORCE PARTICIPATION RATES

Age Group (Years)	Per Cent						
	1987	1992	1993	1994	1995	1996	1997
Total	47.0	51.3	50.6	50.9	50.1	51.5	51.1
15 - 19	27.0	28.6	25.6	23.0	19.3	18.5	16.4
20 - 24	79.9	80.2	79.4	79.0	77.4	77.6	74.9
25 - 29	71.2	77.8	77.6	79.4	78.9	81.4	82.4
30 - 34	56.3	64.7	64.3	64.5	63.7	68.0	67.9
35 - 39	50.2	56.9	57.7	58.3	57.7	60.5	59.1
40 - 44	45.5	54.5	54.6	54.4	53.8	56.9	57.9
45 - 49	39.3	47.6	49.3	49.7	50.8	53.9	54.9
50 - 54	28.1	36.6	36.8	38.1	37.1	43.7	44.7
55 - 59	17.1	22.7	23.9	26.1	25.2	28.5	27.1
60 - 64	12.2	12.6	10.9	12.8	11.6	14.9	15.5
65 - 69	8.4	7.4	6.4	8.1	6.8	8.9	8.7
70 - 74	5.6	5.3	3.4	4.8	4.1	5.3	5.0
75 & Over	2.4	1.3	1.9	1.4	1.7	1.6	1.6

Source : Ministry of Manpower (Other than 1995)

Note : See note to Table 4.1.

4.5

EMPLOYED PERSONS AGED 15 YEARS AND OVER BY OCCUPATIONAL STATUS

Occupational Status	Thousand						
	1987	1992	1993	1994	1995	1996	1997
Total	1,266.9	1,576.2	1,592.0	1,649.3	1,702.1	1,748.1	1,830.5
Employers	63.9	92.3	94.2	95.5	85.1	98.4	99.5
Own Account Workers	108.8	106.2	107.5	111.8	91.6	137.3	124.3
Employees	1,066.1	1,362.8	1,376.1	1,424.0	1,505.6	1,491.6	1,588.1
Contributing Family Workers	28.1	14.9	14.3	18.0	19.9	20.9	18.6

Source : Ministry of Manpower (Other than 1995)

Note : See note to Table 4.1.

4.6

EMPLOYED PERSONS AGED 15 YEARS AND OVER BY OCCUPATION

Occupation	Thousand						
	1987	1992	1993	1994	1995	1996	1997
Total	1,266.9	1,576.2	1,592.0	1,649.3	1,702.1	1,748.1	1,830.5
Legislators, Senior Officials and Managers	93.8	157.6	167.0	178.8	218.0	215.3	230.2
Professionals	59.7	91.6	97.0	106.4	124.7	128.6	164.1
Technicians and Associate Professionals	132.3	216.5	224.4	250.0	269.1	307.5	319.7
Clerical Workers	178.9	225.2	233.4	243.3	220.0	263.3	277.4
Service Workers, Shop and Market Sales Workers	199.3	214.5	215.6	221.1	210.0	230.2	229.5
Agricultural and Fishery Workers	15.2	3.1	2.3	2.9	1.4	1.7	2.6
Production Craftsmen, Plant and Machine Operators, Cleaners and Labourers	527.9	602.3	589.9	583.1	588.2	541.4	546.3
Others	59.7	65.4	62.4	63.7	70.7	60.1	60.7

Source : Ministry of Manpower (Other than 1995)

Notes : Data are classified according to the Singapore Standard Occupational Classification, 1990.

See note to Table 4.1.

4.7 EMPLOYED PERSONS AGED 15 YEARS AND OVER BY INDUSTRY

Industry	Thousand						
	1987	1992	1993	1994	1995	1996	1997
Total	1,266.9	1,576.2	1,592.0	1,649.3	1,702.1	1,748.1	1,830.5
Agriculture, Fishing & Quarrying	11.7	5.5	4.2	5.2	4.5	3.7	5.8
Manufacturing	338.6	434.1	429.5	422.5	412.7	406.3	414.1
Utilities	7.7	8.0	7.5	8.5	5.7	7.2	12.1
Construction	97.1	103.2	102.1	108.8	113.9	115.0	126.1
Commerce	296.7	356.0	363.6	376.9	347.8	405.9	398.2
Transport & Communications	128.5	158.4	166.8	174.7	182.8	195.3	210.0
Financial & Business Services	112.3	171.4	173.4	198.6	248.2	246.0	273.5
Other Services	272.6	339.2	344.1	353.6	375.8	367.7	390.7
Activities Not Adequately Defined	1.7	0.2	0.8	0.5	10.7	1.1	-

Source : Ministry of Manpower (Other than 1995)

Note : Data are classified according to the Singapore Standard Industrial Classification, 1990.

See note to table 4.1.

4.8 EMPLOYED PERSONS AGED 15 YEARS AND OVER BY OCCUPATIONAL STATUS AND GROSS MONTHLY INCOME, 1997

Income (\$)	Thousand						
	Total ¹			Employees		Self-employed	
	Persons	Males	Females	Males	Females	Males	Females
Total	1,830.5	1,081.0	749.4	894.6	693.5	186.5	55.9
Below 500	148.1	56.6	91.5	52.2	78.6	4.4	12.9
500 - 999	257.6	112.6	145.0	98.6	135.8	14.1	9.2
1,000 - 1,499	371.4	221.7	149.7	189.6	141.2	32.1	8.5
1,500 - 1,999	291.8	178.8	113.0	150.8	107.7	28.0	5.3
2,000 - 2,999	341.5	211.5	130.0	169.3	121.5	42.3	8.5
3,000 - 3,999	173.8	114.8	59.1	89.1	54.8	25.6	4.3
4,000 - 4,999	74.5	50.6	23.8	39.7	21.8	10.9	2.1
5,000 and Over	171.6	134.3	37.3	105.3	32.2	29.0	5.1

Source : Ministry of Manpower

¹ Includes contributing family workers.

4.9

EMPLOYED PERSONS AGED 15 YEARS AND OVER BY INDUSTRY AND OCCUPATION, 1997

Occupation	Thousand				
	Total	Agriculture, Fishing & Quarrying	Manufacturing	Utilities	Construction
Total	1,830.5	5.8	414.1	12.1	126.1
Legislators, Administrators & Managers	230.2	0.9	47.1	0.6	20.3
Professionals	164.1	0.3	38.5	1.3	10.0
Technicians & Associate Professionals	319.7	0.3	69.4	4.2	11.1
Clerical Workers	277.4	0.5	44.3	1.7	10.3
Service Workers, Shop & Market Sales Workers	229.5	0.2	4.5	0.2	0.3
Agricultural & Fishery Workers	2.6	2.3	0.1	-	-
Production Craftsmen, Plant & Machine Operators, Cleaners & Labourers	546.3	1.3	210.1	4.0	74.1
Workers Not Classifiable by Occupation	60.7	-	0.1	-	0.1

Occupation	Thousand				
	Commerce	Transport & Communications	Financial & Business Services	Other Services	Activities Not Adequately Defined
Total	398.2	210.0	273.5	390.7	-
Legislators, Administrators & Managers	88.9	16.9	40.0	15.5	-
Professionals	7.4	8.2	49.1	49.5	-
Technicians & Associate Professionals	32.5	35.4	78.0	88.6	-
Clerical Workers	56.9	43.2	76.2	44.2	-
Service Workers, Shop & Market Sales Workers	168.9	13.5	8.5	33.5	-
Agricultural & Fishery Workers	-	-	-	0.2	-
Production Craftsmen, Plant & Machine Operators, Cleaners & Labourers	43.3	92.4	21.6	99.4	-
Workers Not Classifiable by Occupation	0.2	0.3	0.2	59.8	-

Source : Ministry of Manpower

Note : The industries and occupations are classified according to the Singapore Standard Industrial Classification 1990 and Singapore Standard Occupational Classification 1990 respectively.

4.10 GOVERNMENT EMPLOYEES BY DIVISIONAL STATUS

Divisional Status	Number						
	1987	1992	1993	1994	1995	1996	1997
Total	69,494	59,751	59,689	59,537	60,023	62,185	62,853
Division I	11,433	13,117	13,751	15,998	16,952	19,509	21,208
Division II	22,611	20,058	19,876	18,416	18,249	18,906	19,604
Division III	21,794	18,918	18,688	18,041	17,941	17,128	15,571
Division IV	13,656	7,658	7,374	7,082	6,881	6,642	6,470

Source : Public Service Commission

Public Service Division, Prime Minister's Office (wef 1995)

Note : Figures exclude daily-rated employees.

4.11 CENTRAL PROVIDENT FUND MEMBERS BY AGE GROUP (End of Period)

Age Group (Years)	Thousand						
	1987	1992	1993	1994	1995	1996	1997
Total	1,988.5	2,322.8	2,456.4	2,521.8	2,683.5	2,741.8	2,782.0
Up to 20	95.4	108.2	108.5	105.7	105.1	99.2	100.9
> 20 - 25	316.4	234.0	237.8	235.7	238.0	229.9	218.6
> 25 - 30	393.3	361.0	345.9	327.0	315.7	299.7	291.2
> 30 - 35	359.2	404.3	410.3	413.3	413.5	404.3	389.3
> 35 - 40	278.4	365.4	377.3	389.2	404.2	411.6	417.4
> 40 - 45	169.1	284.3	304.7	322.6	343.5	360.4	373.7
> 45 - 50	132.0	174.3	198.8	226.0	263.3	280.7	294.6
> 50 - 55	92.2	130.9	141.2	142.0	144.7	156.0	179.8
Over 55	122.0	229.9	301.5	330.0	425.5	470.1	486.8
Not specified	30.5	30.5	30.4	30.3	30.0	29.9	29.7

Source : Central Provident Fund Board

Note : Data include self-employed who had made CPF contributions.

4.12 CENTRAL PROVIDENT FUND CONTRIBUTORS BY AGE GROUP

(End of Period)

Thousand

Age Group (Years)	1987	1992	1993	1994	1995	1996	1997
Total	935.3	1,074.0	1,107.1	1,138.9	1,174.8	1,193.9	1,224.2
Up to 20	43.5	39.6	40.0	37.3	35.9	33.1	35.5
> 20 - 25	168.7	135.7	136.5	137.1	136.1	129.8	123.1
> 25 - 30	206.1	205.4	204.0	201.6	202.0	198.7	200.5
> 30 - 35	168.9	196.8	199.7	203.5	207.1	207.0	206.0
> 35 - 40	126.6	168.3	175.5	181.8	187.9	191.2	194.0
> 40 - 45	77.6	130.7	137.5	144.4	152.4	160.4	168.9
> 45 - 50	57.5	79.0	89.0	101.3	115.6	123.5	130.0
> 50 - 55	40.3	55.3	56.9	57.6	57.2	63.2	74.5
> 55 - 60	23.5	32.8	35.7	39.4	42.5	46.0	47.6
Over 60	20.1	29.9	31.8	34.4	37.8	40.7	43.9
Not specified	2.5	0.5	0.5	0.5	0.3	0.3	0.2

Source : Central Provident Fund Board

Note : Data from 1992 exclude self-employed who had made CPF contributions.

4.13 CENTRAL PROVIDENT FUND CONTRIBUTORS BY WAGE LEVEL

(End of Period)

Thousand

Monthly Wage Level (\$)	1987	1992	1993	1994	1995	1996	1997
Total	935.3	1,074.0	1,107.1	1,138.9	1,174.8	1,193.9	1,224.2
Up to 200	23.0	16.6	16.5	15.7	14.5	14.0	14.2
200 - 399	106.9	47.6	45.0	40.5	37.0	35.6	34.8
400 - 599	176.7	63.6	57.9	50.8	47.9	47.4	48.4
600 - 799	156.7	106.4	89.4	71.6	62.5	58.0	53.1
800 - 999	111.0	133.5	121.3	105.4	89.7	75.0	65.1
1,000 - 1,499	158.1	263.2	270.5	268.8	260.9	245.8	228.3
1,500 - 1,999	74.4	165.3	184.0	199.0	214.1	213.3	214.8
2,000 - 2,499	41.2	90.5	104.6	124.1	140.4	152.0	160.0
2,500 - 2,999	24.4	53.1	60.8	73.2	85.3	96.0	107.1
3,000 - 3,499	17.8	35.8	41.2	49.4	57.7	65.3	75.9
3,500 - 3,999	9.4	24.8	28.4	34.0	38.4	40.0	46.8
4,000 - 4,499	7.4	15.3	17.9	22.6	27.9	32.6	41.7
4,500 - 4,999	5.2	11.1	11.8	14.2	16.4	19.6	24.4
5,000 - 5,499	4.5	9.8	12.8	14.5	16.5	21.3	20.7
5,500 & Over	15.5	33.3	39.7	49.6	58.8	71.8	81.7
Not specified	3.1	4.1	5.1	5.2	6.8	6.2	7.2

Source : Central Provident Fund Board

Note : See note to Table 4.12.

4.14

CENTRAL PROVIDENT FUND CONTRIBUTORS BY INDUSTRY (End of Period)

								Thousand
Industry	1987	1992	1993	1994	1995	1996	1997	
Total	935.3	1,074.0	1,107.1	1,138.9	1,174.8	1,193.9	1,224.2	
Agriculture & Fishing	2.4	2.4	2.7	2.6	2.5	2.6	2.9	
Quarrying	0.6	0.4	0.4	0.4	0.4	0.4	0.4	
Manufacturing	287.5	298.0	294.4	296.9	294.5	280.4	275.1	
Utilities	7.3	6.7	6.6	6.6	6.7	6.7	6.6	
Construction	44.2	48.5	53.9	58.6	66.3	76.0	81.3	
Commerce	204.1	262.3	274.5	280.0	289.0	291.5	297.1	
Transport & Communications	91.9	106.6	109.3	111.3	113.9	115.6	116.8	
Financial & Business Services	111.8	162.8	174.1	186.8	200.4	211.3	225.5	
Other Services	185.5	186.2	191.1	195.5	201.0	209.0	218.4	
Activities Not Adequately Defined	-	0.1	0.1	0.2	0.1	0.4	0.1	

Source : Central Provident Fund

Note : Data from 1992 exclude self-employed who had made CPF contributions.

4.15

EMPLOYMENT SERVICE

								Number
	1987	1992	1993	1994	1995	1996	1997	
Number on 'Live' Register ^{1,2}	5,703	891	975	1,004	1,345	2,746	2,352	
New Registrants ²	15,655	2,332	2,373	2,378	2,660	4,230	4,777	
Males	10,801	1,540	1,569	1,549	1,550	2,068	2,336	
Females	4,854	792	804	829	1,110	2,162	2,441	
Vacancies Filled	3,228	797	764	745	530	675	628	
Males	2,168	560	483	471	324	377	345	
Females	1,060	237	281	274	206	298	283	

Source : Ministry of Manpower

1 At end of period. Figures exclude those who already have jobs as confirmed by the Central Provident Fund Board's employment records.

2 Data include job registrants under the Back To Work Programme which was launched in September 1996 to attract the economically inactive, namely the housewives and the retirees, to join the workforce. The Programme ended its 6-month pilot run in April 1997. Job registrants can renew their registration after the 3-month validity period.

4.16

CHANGES IN LABOUR PRODUCTIVITY BY INDUSTRY

4.18

										Per Cent
Industry			1987	1992	1993	1994	1995	1996	1997	
Total			5.1	2.9	7.0	5.7	3.5	0.6	1.6	
Total excluding Construction			5.2	2.3	8.3	6.1	4.5	2.1	3.3	
Manufacturing			3.7	2.9	11.8	11.2	6.6	3.0	5.2	
Construction			0.7	13.9	-5.3	4.6	-3.8	-4.8	-5.7	
Commerce			5.7	0.6	5.5	5.4	6.3	3.2	2.7	
Transport & Communications			6.4	2.0	5.9	8.6	6.5	3.4	5.0	
Financial & Business Services			8.2	1.9	7.9	2.2	-1.2	-0.3	2.2	

Source : Department of Statistics and Ministry of Manpower

4.17

AVERAGE MONTHLY EARNINGS BY INDUSTRY

Industry	Dollars						
	1987	1992	1993	1994	1995	1996	1997
Total	1,176	1,804	1,918	2,086	2,219	2,347	2,480
Manufacturing	1,009	1,686	1,818	1,995	2,157	2,320	2,487
Construction	926	1,624	1,713	1,865	1,941	1,971	1,991
Commerce	977	1,535	1,631	1,763	1,889	1,994	2,088
Transport, Storage & Communications	1,305	1,888	1,973	2,133	2,261	2,425	2,581
Financial & Business Services	1,564	2,246	2,374	2,533	2,691	2,828	3,004
Community & Personal Services	1,400	1,978	2,084	2,286	2,369	2,472	2,576

Source : Ministry of Manpower

Central Provident Fund Board

Note : Average monthly earnings are computed using data obtained from the CPF Board. They include bonuses, if any, but exclude employers' CPF contributions. From 1992, figures exclude all identifiable self-employed persons.

4.18

AVERAGE WEEKLY HOURS WORKED BY INDUSTRY

41.6

Hours

Industry	1987	1992	1993	1994	1995	1996	1997
Total	45.5	46.6	46.9	47.0	47.1	47.3	47.4
Manufacturing	48.4	48.7	49.2	49.3	49.3	49.4	49.5
Construction	49.5	50.5	50.6	51.0	51.4	51.8	51.7
Commerce	42.8	42.6	42.8	42.9	43.1	43.3	43.3
Transport & Communications	46.0	46.8	46.8	46.7	47.3	47.3	46.9
Financial & Business Services	43.6	44.1	44.2	43.9	43.8	43.9	43.9
Community & Personal Services	40.8	42.0	41.7	41.7	42.0	41.9	42.2
Others ¹	46.3	46.6	45.0	45.0	45.5	45.7	47.6

Source : Ministry of Manpower

Note : The data for 1992-1997 refer to private sector establishments with at least 25 employees, while those for 1987 refer to private and public sector establishments with at least 10 employees. They are thus not strictly comparable.

Data refer to September of the respective years except 1987. For 1987, data refer to June.

1 Include Agriculture & Fishing and Mining & Quarrying.

4.19

AVERAGE MONTHLY RECRUITMENT RATE BY INDUSTRY AND OCCUPATIONAL GROUP

Per Cent

	1987	1992	1993	1994	1995	1996	1997
Total	4.7	3.7	3.6	3.5	3.6	3.2	3.2
Industry							
Manufacturing	5.4	3.6	3.4	3.5	3.3	2.9	2.9
Construction	3.0	3.1	3.8	2.6	3.3	2.9	3.1
Commerce	5.7	5.4	5.6	5.2	5.3	4.5	4.5
Transport, Storage & Communications	1.9	2.2	2.1	2.3	2.4	2.4	2.2
Financial, Insurance, Real Estate & Business Services	2.9	3.3	3.4	3.5	3.3	3.3	3.4
Community, Social & Personal Services	5.9	3.4	3.3	3.2	3.1	3.1	3.2
Occupational Group							
Professional, Technical, Administrative, Managerial, Executive & Related Employees	2.0	2.1	2.1	2.5	2.4	2.5	2.5
Clerical, Sales, Service & Related Employees	4.9	4.7	4.7	4.6	4.5	4.0	4.0
Production, Transport & All Other Employees	5.4	3.7	3.7	3.4	3.6	3.1	3.1

Source : Ministry of Manpower

4.20

AVERAGE MONTHLY RESIGNATION RATE BY INDUSTRY AND OCCUPATIONAL GROUP

Per Cent

	1987	1992	1993	1994	1995	1996	1997
Total	3.6	3.3	3.2	3.1	3.0	2.8	2.7
Industry							
Manufacturing	3.9	3.4	3.1	3.1	3.0	2.8	2.5
Construction	2.9	2.4	2.5	2.1	2.3	2.1	2.3
Commerce	4.8	4.8	5.0	4.8	4.7	4.1	4.2
Transport, Storage & Communications	1.4	1.7	1.6	1.8	1.9	1.8	1.7
Financial, Insurance, Real Estate & Business Services	2.2	2.9	2.7	2.8	2.7	2.7	2.7
Community, Social & Personal Services	4.4	2.6	2.7	2.7	2.6	2.5	2.5
Occupational Group							
Professional, Technical, Administrative, Managerial, Executive & Related Employees	1.3	1.5	1.6	1.8	1.8	1.8	1.9
Clerical, Sales, Service & Related Employees	3.9	4.2	4.2	4.1	4.0	3.7	3.7
Production, Transport & All Other Employees	4.1	3.6	3.3	3.1	3.1	2.8	2.7

Source : Ministry of Manpower

4.21

PARTICIPANTS IN TRAINING COURSES CONDUCTED BY SINGAPORE PRODUCTIVITY AND STANDARDS BOARD

								Number
Industry	1987	1992	1993	1994	1995	1996	1997	
Total	12,814	26,545	32,275	29,380	33,969	40,940	44,841	
Executive Development Programmes	2,017	3,833	5,338	3,406	3,973	3,205	3,970	
Productivity Improvement Programmes ¹	3,899	4,728	5,085	1,984	2,695	3,306	9,574	
Quality Circles (QC) ²	3,610	4,230	6,640	2,924	3,100	5,754	4,426	
Total Quality Programmes (TQP)	-	3,453	2,934	5,467	5,569	4,341	3,335	
Productivity-Related Management Seminars/Conferences/Talks	3,288	2,469	2,033	11,133	11,230	16,934	17,382	
FAST FORWARD Courses	-	7,300	8,032	2,378	4,216	4,242	3,878	
On-the-Job Training Courses (OJT) ³	-	532	2,213	2,088	3,186	3,158	2,276	

Source : Singapore Productivity and Standards Board

1 1997 figure includes WIN programme which came under the Institute of Productivity Training in October 1996.

2 Prior to 1992, figures include Labour Management Relations.

3 Figures exclude workers who have been trained through their companies' in-house OJT courses.

4.22

QUALITY CIRCLES (End of Period)

							Number
Industry	1987	1992	1993	1994	1995	1996	1997
Registered Quality Circles	5,750	13,627	14,264	16,092	17,723	19,241	19,651
Organisations (Companies, Government Bodies & Statutory Boards)	168	278	304	366	377	387	389
Membership	41,164	100,089	104,996	117,363	129,434	140,760	144,030

Source : Singapore Productivity and Standards Board

4.23

SKILLS DEVELOPMENT FUND GRANTS AND TRAINING PLACES COMMITTED BY TYPE OF TRAINING

Type of Training	1986	1991	1992	1993	1994	1995	1996
Grants Committed (Thousand Dollars)							
Total	61,462	80,611	59,944	89,336	62,081	61,935	67,767
Productivity & Quality-related Skills	5,491	3,154	6,903	7,994	12,525	10,231	12,567
Computer-related Skills	4,999	8,196	6,867	9,311	10,040	10,354	12,089
Technical Production & Engineering Skills	20,225	9,577	7,745	8,711	7,039	6,528	9,617
Technical Service Skills	7,570	22,362	18,332	24,920	15,971	14,046	15,524
Management & Supervisory Skills	7,671	11,183	8,270	15,904	11,215	9,816	12,718
Trade & Craft Skills	9,958	23,386	11,250	21,492	4,654	10,299	4,393
Others	5,548	2,753	578	1,003	637	660	858
Training Places (Number)							
Total	113,164	407,852	381,716	506,010	493,338	461,651	483,286
Productivity & Quality-related Skills	30,608	36,931	70,946	75,678	96,099	99,379	112,904
Computer-related Skills	12,081	59,575	56,650	98,661	88,952	97,739	104,636
Technical Production & Engineering Skills	17,291	104,602	76,696	100,104	99,984	64,529	94,796
Technical Service Skills	15,264	112,159	105,240	134,577	126,834	114,613	92,889
Management & Supervisory Skills	24,061	66,509	57,646	80,045	67,946	72,412	68,570
Trade & Craft Skills	3,011	5,670	5,393	12,682	5,659	5,995	2,219
Others	10,848	22,406	9,145	4,263	7,864	6,984	7,272

Source : Singapore Productivity and Standards Board

Note : The period refers to financial year beginning on 1 April and ending on 31 March the following year.

Figures exclude BEST, WISE and Vocational Training Scheme (VTS).

4.24 TRADE UNIONS AND MEMBERSHIP

(End of Period)

								Number
Industry		1987	1992	1993	1994	1995	1996	1997
Employee Class								
Unions		93	81	82	82	81	83	82
Members		205,717	228,686	235,723	232,927	235,157	255,020	260,130
Employer Class								
Unions		5	3	3	3	3	3	3
Members		1,188	1,052	1,045	1,088	1,225	1,337	1,522

Source : Ministry of Manpower

4.25 LABOUR RELATIONS

								Number
		1987	1992	1993	1994	1995	1996	1997
Trade Disputes		275	353	370	333	305	309	253
Claims Registered ¹		275	353	370	333	305	309	253
Wages		180	233	256	207	174	190	157
Others		95	120	114	126	131	119	96
Cases Referred to IAC ²		56	27	13	15	3	14	14
IAC Awards		39	18	9	10	9	11	12
Industrial Stoppages		-	-	-	-	-	-	-

Source : Ministry of Manpower

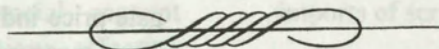
1 Refer to main cause of individual disputes referred to the Conciliation Section.

"Wages" include Wage Increase and Conditions of Service.

"Others" include Retrenchment Benefits, Bonus or Gratuity and other Industrial Matters (eg Sales Commission, Shift Allowances, etc).

2 IAC = Industrial Arbitration Court.

NATIONAL INCOME AND BALANCE OF PAYMENTS



Great Domestic Product (GDP) refers to the aggregate value of output produced within the domestic territory of Singapore.

Expenditure on GDP: It refers to the sum of private consumption expenditure of households, including non-profit institutions, government consumption expenditure, gross capital formation and net exports.

In order to measure the price level of output expenditure over time, it is necessary to remove the effect of price changes. This is achieved by selecting a base price structure of 1990 as the base according to which the goods and services in the economy are valued. The resulting GDP Deflator: They are the aggregate price index of the GDP of the economy.

Constant Price GDP: The price level of the base year 1990 is set at 100. The deflator is derived as the ratio of current price estimates to the corresponding constant price estimates.

Valuation of GDP Estimates: GDP and expenditure on GDP are valued at market prices, that is, they are valued at the actual transaction prices and include customs and excise duties and other indirect taxes levied on goods and services.

With the availability of more comprehensive and up-to-date information, the estimates have been revised, especially for the Monetary Fund's "Balance of Payments Manual". The structure and classification of Singapore's external accounts are as follows:

Studies to improve the balance of

national income estimates are being undertaken by the Department of Statistics. The output and expenditure approaches are adopted for compiling national income aggregates of Singapore. The concepts, definitions and methodologies of the United Nations' publication, "A System of National Accounts, 1968", are followed.

The development of the Singapore economy depends on foreign capital. Consequently, a large foreign surplus of employees and of the operating surplus as recorded in national accounts, foreigners and foreign enterprises.

The GDP of Singapore is defined on a territory basis, that is, it includes the income of Singaporeans. Hence, a series on indigenous per capita GDP which excludes the foreigner's contribution is compiled.

This involves the calculation of income accruing to foreign workers and foreign enterprises which are residents of Singapore and the exclusion of the amount from the GDP.

Current account balance refers to the balance of trade in goods and services, current transfers and current income. It is the sum of the balance of trade in goods and services, current transfers and current income. It is the sum of the balance of trade in goods and services, current transfers and current income.

Overall balance: This is the balance of trade in goods and services, current transfers and current income, plus the balance of trade in financial assets and liabilities.

5 NATIONAL INCOME AND BALANCE OF PAYMENTS

National Income Estimates

The output and expenditure approaches are adopted for compiling national income aggregates of Singapore. The concepts, definitions and methodology given in the United Nations' publication, "A System of National Accounts, 1968" are closely followed.

The development of the Singapore economy depends heavily on foreign capital, foreign technology and foreign workers. Consequently a large share of the compensation of employees and of the operating surplus, as recorded in national accounts, accrue to foreigners and foreign enterprises.

The per capita GNP as conventionally defined on a residential basis is therefore not a true reflection of the income of Singaporeans. Hence, a series on indigenous per capita GNP which excludes the foreigners' contribution is compiled.

This involves the calculation of income accruing to foreign workers and foreign enterprises which are residents of Singapore and the exclusion of this amount from the GNP.

Definitions

Gross National Product (GNP) : It refers to the aggregate value of output produced by productive factors owned by Singapore residents irrespective of whether they are located within Singapore's domestic territory or abroad.

Indigenous GNP : It refers to the aggregate value of output accrued to Singaporeans.

Gross Domestic Product (GDP) : It refers to the aggregate value of output produced within the domestic territory of Singapore.

Expenditure on GDP : It refers to the sum of private consumption expenditure of households including non-profit institutions, government consumption expenditure, gross capital formation and net exports.

GDP at Constant Prices : In order to compare the real value of output/expenditure over time, it is necessary to remove the effect of price changes. This is achieved by selecting the price structure of 1990 as the base according to which the goods and services in other years are revalued. The resulting aggregates after adjustment for price changes are known as constant-price estimates.

GDP Deflators : They are the aggregate price indices of the GDP of the economy. They measure implicitly the price level of the current GDP relative to the base year 1990 which is set at 100. The deflators are derived as the ratio of current price estimates to the corresponding constant price estimates.

Valuation of GDP Estimates : GNP, GDP and expenditure on GDP are valued at market prices, that is, they are valued at the actual transacted prices and include customs and excise duties and other indirect taxes levied less subsidies.

With the availability of more comprehensive and up-to-date information, the estimates have been revised, especially for the last two years.

5 NATIONAL INCOME AND BALANCE OF PAYMENTS (cont'd)

Balance of Payments Estimates

The balance of payments is a systematic record of all economic transactions between residents of an economy and residents of the rest of the world in a given period. It is very useful for assessing the external performance of an economy and for formulating policies connected with it.

The transactions recorded in the balance of payments fall into the following three broad categories:

- a) The current account which consists of transactions relating to Singapore's current national income and expenditure. These include exports and imports of goods and services, income receipts and payments as well as current transfers.
- b) The capital and financial account which covers transactions affecting the foreign financial assets and liabilities of Singapore. Hence it records transactions that affect the national income in future periods.
- c) Official reserves which shows the changes in Singapore's foreign reserves holdings. It consists of Singapore's official holdings of monetary gold and foreign exchange assets, as well as Singapore's special drawing rights and reserve position in the International Monetary Fund.

The compilation of Singapore's balance of payments estimates is based on the principles recommended by the International Monetary Fund's "Balance of Payments Manual". The structure and classification of Singapore's balance of payments accounts follows the fifth edition of the manual.

Studies to improve the balance of

payments estimates are an on-going process and the estimates are revised as and when appropriate.

Sources of Data

The balance of payments estimates are compiled mainly from trade and shipping statistics, regular surveys of companies and administrative records of government departments and statutory authorities.

Definitions

Goods balance : It refers to the difference between total exports and total imports of goods on an f.o.b. basis.

Services balance : It refers to the difference between total exports and total imports of services.

Income balance : It refers to the difference between factor income accrued to Singapore residents from abroad and factor income accrued to non-Singapore residents.

Current account balance : It refers to the balance of transactions in goods, services, income and current transfers. It shows the net change in financial assets arising from Singapore's real transactions.

Capital and financial account balance: It refers to the balance of transactions in the capital and financial account. It reflects the net changes in Singapore's foreign financial assets and liabilities.

Overall balance : This is the overall balance of the current, capital and financial accounts. It is the balance of all of Singapore's transactions with non-residents and is financed by official reserves.

5 NATIONAL INCOME AND BALANCE OF PAYMENTS (cont'd)

Foreign Investment

Data on foreign equity investment in Singapore are compiled from the balance sheets of all companies in Singapore which have part of their paid-up capital held by foreign residents.

Data on Singapore's overseas investment are gathered from the Survey of Singapore's Investment Abroad. The survey covers all companies except banks, finance companies and insurance companies.

Definitions

Equity Capital : For incorporated companies, it refers to the amount of paid-up capital held by investors and the proportionate amount of reserves accrued to them. For branches of banks it is approximately equal to their "net fixed assets". For branches of other companies, it refers to the "net amount owed to their head offices".

Direct Investment : An investment is considered a direct investment when investors have effective influence over the policies and

business operations of the companies they invested in. Ownership of 20 per cent or more of the total paid-up shares is regarded as possession of effective influence.

Portfolio Investment : An investment is considered a portfolio investment when investors do not have effective influence over the policies and business operations of the companies they invested in.

Other References

The "Singapore System of National Accounts, 1995", published by the Singapore Department of Statistics, contains the detailed methodology used to compile Singapore's national accounts and has data series from 1960 to 1995. Significant changes in treatment and classification of the balance of payments are described in the occasional paper "Implementation of IMF Balance of Payments Manual, 5th Edition in Singapore's Balance of Payments". Analyses on the national output and balance of payments of Singapore may be found in the "Economic Survey of Singapore" published by the Ministry of Trade & Industry annually.

5.1 INDIGENOUS GROSS NATIONAL PRODUCT

(At Current Market Prices)

	1987	1992	1993	1994	1995	1996	1997
Million Dollars							
Total Gross Domestic Product	43,569.3	80,936.0	94,317.5	108,216.9	120,704.1	130,775.3	143,014.0
Share of Resident Foreigners & Resident Foreign Companies in GDP	12,302.4	23,442.1	29,252.7	32,232.0	39,460.3	43,870.7	48,664.6
Indigenous GDP	31,266.9	57,493.9	65,064.8	75,984.9	81,243.8	86,904.6	94,349.4
Factor Receipts of Singaporeans from Rest of the World	4,739.5	10,889.8	10,528.0	12,290.3	14,528.3	16,209.1	18,686.7
Indigenous GNP	36,006.4	68,383.7	75,592.8	88,275.2	95,772.1	103,113.6	113,036.1
Per Capita Indigenous GNP (\$)	14,098.6	24,265.0	26,304.1	30,126.0	32,068.3	33,871.0	36,422.1
Percentage Change Over Previous Year							
Total Gross Domestic Product	11.0	7.2	16.5	14.7	11.5	8.3	9.4
Share of Resident Foreigners & Resident Foreign Companies in GDP	18.9	-7.8	24.8	10.2	22.4	11.2	10.9
Indigenous GDP	8.1	14.7	13.2	16.8	6.9	7.0	8.6
Factor Receipts of Singaporeans from Rest of the World	18.9	3.1	-3.3	16.7	18.2	11.6	15.3
Indigenous GNP	9.4	12.7	10.5	16.8	8.5	7.7	9.6
Per Capita Indigenous GNP (\$)	7.9	10.5	8.4	14.5	6.4	5.6	7.5

5.2 OUTPUT, SAVING AND INVESTMENT

(At Current Market Prices)

Million Dollars

	1987	1992	1993	1994	1995	1996	1997
Gross National Product (GNP)							
GNP at Market Prices	43,140.6	82,391.9	93,497.8	109,160.5	121,887.4	133,108.0	146,890.9
Gross Domestic Product (GDP) at Factor Cost	40,542.6	73,387.6	84,956.8	96,403.9	107,912.8	117,285.8	128,271.6
Taxes on Production	3,026.7	7,548.4	9,360.7	11,813.0	12,791.3	13,489.5	14,742.4
Net Factor Income from Abroad	-428.7	1,455.9	-819.7	943.6	1,183.3	2,332.7	3,876.9
Generation of Gross National Saving							
Gross National Saving	15,966.9	38,724.2	42,536.7	52,904.6	60,957.0	66,734.6	75,144.7
Gross Domestic Saving	16,887.8	38,104.0	44,337.7	53,099.3	61,130.1	66,110.1	73,287.0
GDP at Market Prices	43,569.3	80,936.0	94,317.5	108,216.9	120,704.1	130,775.3	143,014.0
Less : Private & Government Consumption Expenditure	26,012.0	44,385.3	50,274.2	56,154.5	59,880.7	66,271.5	71,483.4
Statistical Discrepancy	-669.5	1,553.3	294.4	1,036.9	306.7	1,606.3	1,756.4
Net Factor Income from Abroad	-428.7	1,455.9	-819.7	943.6	1,183.3	2,332.7	3,876.9
Net Transfers from Abroad	-492.2	-835.7	-981.3	-1,138.3	-1,356.4	-1,708.2	-2,019.2
Finance of Gross Capital Formation							
Gross Capital Formation	16,298.7	29,081.2	35,749.2	35,539.9	40,702.8	46,170.0	53,422.3
Gross National Saving	15,966.9	38,724.2	42,536.7	52,904.6	60,957.0	66,734.6	75,144.7
Net Borrowing from/Lending (-) to Abroad	331.8	-9,643.0	-6,787.5	-17,364.7	-20,254.2	-20,564.6	-21,722.4

5.3 GROSS DOMESTIC PRODUCT BY INDUSTRY

Million Dollars

	1987	1992	1993	1994	1995	1996	1997
At Current Market Prices							
Total	43,569.3	80,936.0	94,317.5	108,216.9	120,704.1	130,775.3	143,014.0
Agriculture & Fishing	221.5	160.4	156.8	171.7	199.9	215.8	199.8
Quarrying	57.3	38.7	38.3	53.4	37.5	47.1	42.4
Manufacturing	12,209.0	21,282.1	24,651.8	27,619.5	31,536.6	33,164.2	34,744.0
Utilities	962.4	1,353.3	1,571.1	1,713.6	1,956.9	2,279.7	2,671.4
Construction	3,042.4	6,212.2	6,772.4	7,943.6	8,986.7	11,140.2	12,906.8
Commerce	7,471.5	15,094.0	18,021.4	21,360.9	23,734.3	24,937.4	26,877.7
Transport & Communications	5,941.3	10,168.7	11,494.5	13,025.1	14,277.5	14,671.3	15,803.4
Financial & Business Services	11,074.6	22,127.2	26,577.6	31,939.0	34,956.2	39,051.9	44,254.1
Other Services	5,022.8	9,048.2	10,046.8	11,674.2	12,709.0	13,815.9	15,301.5
Less : Imputed Bank Service Charge	2,887.3	5,284.4	5,866.6	8,049.0	8,442.4	9,308.7	10,540.0
Add : Taxes and Duties on Imports	453.8	735.6	853.4	764.9	751.9	760.5	752.9
At 1990 Market Prices							
Total	50,899.9	77,337.6	85,387.3	94,367.9	102,531.2	109,572.8	118,077.8
Agriculture & Fishing	233.3	161.9	161.7	170.9	184.5	195.5	184.2
Quarrying	110.7	63.3	48.6	44.4	30.3	28.0	23.4
Manufacturing	13,674.4	20,957.5	23,004.1	25,926.5	28,528.6	29,394.2	30,651.5
Utilities	962.6	1,405.6	1,504.3	1,638.9	1,741.0	1,868.6	2,069.8
Construction	3,575.1	5,548.5	6,016.9	6,990.9	7,585.5	9,066.5	10,271.6
Commerce	9,085.4	14,510.1	15,722.7	17,159.3	18,747.1	19,906.0	21,050.7
Transport & Communications	6,584.9	9,902.1	10,929.2	12,093.1	13,428.8	14,515.0	15,849.3
Financial & Business Services	13,559.4	20,642.0	23,406.2	25,681.9	27,468.8	29,617.7	32,889.8
Other Services	6,044.1	8,562.1	9,302.8	10,034.5	10,714.2	11,465.1	12,323.1
Less : Imputed Bank Service Charge	3,408.2	5,121.1	5,505.7	6,073.2	6,567.0	7,155.9	7,929.5
Add : Taxes and Duties on Imports	460.2	705.6	796.5	700.7	669.4	672.1	693.9

Note : Prior to 1990, the aggregates may not equal the sum of their components.

5.4 EXPENDITURE ON GROSS DOMESTIC PRODUCT

Million Dollars

	1987	1992	1993	1994	1995	1996	1997
At Current Market Prices							
Total	43,569.3	80,936.0	94,317.5	108,216.9	120,704.1	130,775.3	143,014.0
Private Consumption Expenditure	20,697.4	36,416.6	42,114.8	47,209.5	50,020.4	53,920.1	58,066.5
Government Consumption Expenditure	5,314.6	7,968.7	8,159.4	8,945.0	9,860.3	12,351.4	13,416.9
Gross Fixed Capital Formation	14,405.4	28,811.8	32,849.3	36,193.2	39,962.0	48,157.7	52,883.9
Increase in Stocks	1,893.3	269.4	2,899.9	-653.3	740.8	-1,987.7	538.4
Net Exports of Goods & Services	589.1	9,022.8	8,588.5	17,559.4	20,427.3	19,940.1	19,864.7
Statistical Discrepancy	669.5	-1,553.3	-294.4	-1,036.9	-306.7	-1,606.3	-1,756.4
At 1990 Market Prices							
Total	50,899.9	77,337.6	85,387.3	94,367.9	102,531.2	109,572.8	118,077.8
Private Consumption Expenditure	23,227.1	34,768.6	38,533.3	41,348.9	43,322.2	46,423.4	49,536.9
Government Consumption Expenditure	6,147.9	7,835.9	7,915.0	8,216.7	9,096.4	11,230.9	12,142.0
Gross Fixed Capital Formation	16,283.1	27,349.8	30,202.4	32,870.9	36,105.0	42,309.6	46,072.5
Increase in Stocks	2,462.0	207.5	2,214.2	-505.7	577.8	-1,551.1	427.7
Net Exports of Goods & Services	2,549.0	7,669.8	6,688.4	13,027.2	14,566.0	13,105.7	11,711.4
Statistical Discrepancy	230.8	-494.0	-166.0	-590.1	-1,136.2	-1,945.7	-1,812.7

Note : Prior to 1990, the aggregates may not equal the sum of their components.

5.5 PRIVATE CONSUMPTION EXPENDITURE

Million Dollars

	1987	1992	1993	1994	1995	1996	1997
At Current Market Prices							
Total	20,697.4	36,416.6	42,114.8	47,209.5	50,020.4	53,920.1	58,066.5
Food & Beverages	5,219.9	7,128.7	7,502.1	7,664.9	7,826.9	8,297.4	8,545.0
Clothing & Footwear	1,857.5	2,646.8	2,863.8	2,950.9	2,945.7	2,988.7	3,010.2
Rent & Utilities	3,100.1	5,535.1	6,025.8	6,428.7	6,862.0	7,404.9	7,893.9
Furniture & Household Equipment	2,073.6	3,378.4	3,641.9	3,937.9	4,160.9	4,542.5	4,845.8
Medical Services	962.8	1,917.2	2,049.0	2,236.1	2,454.7	2,680.8	2,862.1
Transport & Communications	3,129.8	7,080.7	8,835.0	10,202.8	10,564.4	10,436.8	10,502.7
Recreation & Education	3,245.5	6,491.9	7,281.2	7,942.8	8,317.3	8,560.5	8,703.6
Other Goods & Services	4,497.1	8,354.9	10,108.8	11,439.6	11,987.8	12,918.0	13,733.6
Add : Residents' Expenditure Abroad	1,362.3	3,316.5	4,094.8	4,793.0	5,773.3	6,572.6	7,324.2
Less : Non-residents' Expenditure							
Locally	4,751.2	9,433.6	10,287.6	10,387.2	10,872.6	10,482.1	9,354.6
At 1990 Market Prices							
Total	23,227.1	34,768.6	38,533.3	41,348.9	43,322.2	46,423.4	49,536.9
Food & Beverages	5,628.3	6,891.1	7,187.4	7,166.3	7,203.4	7,510.5	7,610.2
Clothing & Footwear	1,970.6	2,601.4	2,748.4	2,765.6	2,714.9	2,740.6	2,744.7
Rent & Utilities	3,682.0	4,949.9	5,234.5	5,594.6	5,916.9	6,254.3	6,612.1
Furniture & Household Equipment	2,240.5	3,277.1	3,484.6	3,673.7	3,803.3	4,109.9	4,354.1
Medical Services	1,080.8	1,683.7	1,736.6	1,835.5	1,979.2	2,121.5	2,216.8
Transport & Communications	3,850.2	6,482.1	7,516.2	7,802.9	7,994.7	7,994.1	7,851.4
Recreation & Education	3,505.6	6,434.9	7,022.4	7,423.0	7,531.1	7,616.2	7,700.9
Other Goods & Services	5,012.4	8,216.4	9,488.5	10,314.0	10,854.3	11,616.4	12,332.0
Add : Residents' Expenditure Abroad	1,476.4	3,150.4	3,761.0	4,248.2	4,993.4	5,663.5	6,279.0
Less : Non-residents' Expenditure							
Locally	5,301.9	8,918.4	9,646.3	9,474.9	9,669.0	9,203.6	8,164.3

Note : Prior to 1990, the aggregates may not equal the sum of their components.

5.6 GROSS FIXED CAPITAL FORMATION

Million Dollars

	1987	1992	1993	1994	1995	1996	1997
At Current Market Prices							
Total	14,405.4	28,811.8	32,849.3	36,193.2	39,962.0	48,157.7	52,883.9
Construction & Works	6,986.3	13,949.4	15,435.5	18,677.3	20,978.1	26,413.5	29,949.4
Residential Buildings	3,021.0	5,679.4	7,156.6	8,767.2	10,368.4	14,056.6	16,164.2
Non-residential Buildings	1,772.6	6,515.5	6,556.6	7,757.8	8,468.3	9,649.3	10,304.6
Other Construction & Works	2,192.7	1,754.5	1,722.3	2,152.3	2,141.4	2,707.6	3,480.6
Transport Equipment	1,991.3	4,915.2	5,817.9	4,837.6	5,856.6	7,786.0	7,483.0
Machinery & Equipment	5,427.8	9,947.2	11,595.9	12,678.3	13,127.3	13,958.2	15,451.5
At 1990 Market Prices							
Total	16,283.1	27,349.8	30,202.4	32,870.9	36,105.0	42,309.6	46,072.5
Construction & Works	8,751.9	12,751.6	13,670.3	15,964.7	17,738.2	21,336.5	23,892.7
Residential Buildings	3,885.2	5,132.9	6,194.6	7,183.8	8,411.8	10,797.0	12,387.8
Non-residential Buildings	2,194.7	6,010.5	5,928.3	6,865.6	7,395.8	8,157.6	8,536.7
Other Construction & Works	2,630.8	1,608.2	1,547.4	1,915.3	1,930.6	2,381.9	2,968.2
Transport Equipment	2,110.0	4,643.0	5,326.9	4,366.4	5,220.6	6,746.8	6,384.8
Machinery & Equipment	5,620.0	9,955.2	11,205.2	12,539.8	13,146.2	14,226.3	15,795.0

Note : Prior to 1990, the aggregates may not equal the sum of their components.

5.7 GROSS DOMESTIC PRODUCT DEFLATORS BY INDUSTRY (1990=100)

Industry	1987	1992	1993	1994	1995	1996	1997
Total	85.6	104.7	110.5	114.7	117.7	119.4	121.1
Agriculture & Fishing	94.9	99.1	97.0	100.5	108.3	110.4	108.5
Quarrying	51.8	61.1	78.8	120.3	123.8	168.2	181.2
Manufacturing	89.3	101.5	107.2	106.5	110.5	112.8	113.4
Utilities	100.0	96.3	104.4	104.6	112.4	122.0	129.1
Construction	85.1	112.0	112.6	113.6	118.5	122.9	125.7
Commerce	82.2	104.0	114.6	124.5	126.6	125.3	127.7
Transport & Communications	90.2	102.7	105.2	107.7	106.3	101.1	99.7
Financial & Business Services	81.7	107.2	113.5	124.4	127.3	131.9	134.6
Other Services	83.1	105.7	108.0	116.3	118.6	120.5	124.2

Note : Refer to gross domestic product at market prices.

5.8 DEFLATORS OF EXPENDITURE ON GROSS DOMESTIC PRODUCT (1990=100)

	1987	1992	1993	1994	1995	1996	1997
Total	85.6	104.7	110.5	114.7	117.7	119.4	121.1
Private Consumption Expenditure	89.1	104.7	109.3	114.2	115.5	116.1	117.2
Government Consumption Expenditure	86.4	101.7	103.1	108.9	108.4	110.0	110.5
Gross Fixed Capital Formation	88.5	105.3	108.8	110.1	110.7	113.8	114.8
Exports of Goods & Services	96.3	94.5	93.1	92.3	91.6	90.1	89.0
Imports of Goods & Services	98.7	93.3	91.8	89.5	88.4	86.8	85.4

5.9 BALANCE OF PAYMENTS

Million Dollars

	1987	1992	1993	1994	1995	1996	1997
A Current Account Balance	-229.4	9,704.8	6,902.8	17,493.2	20,355.2	20,760.2	21,979.5
Goods Balance	-2,408.1	-2,967.3	-4,401.4	2,068.7	1,384.2	3,136.4	1,700.7
Exports of Goods	61,275.6	108,432.3	125,802.2	149,565.8	167,896.5	177,679.6	186,758.1
Imports of Goods	63,683.7	111,399.6	130,203.6	147,497.1	166,512.3	174,543.2	185,057.4
Services Balance	2,490.5	10,924.3	11,855.5	14,068.7	17,238.7	14,928.9	16,241.8
Exports of Services	12,203.5	26,388.2	30,032.0	35,184.3	42,255.9	42,210.4	45,245.5
Transportation	2,517.3	4,505.5	5,127.7	6,174.4	7,265.1	7,322.3	7,660.1
Travel	4,597.3	9,333.4	10,327.5	10,357.9	10,981.0	10,551.7	9,442.5
Insurance	212.1	273.4	423.0	503.8	502.4	559.7	661.2
Government	189.9	160.0	161.1	159.9	131.8	137.9	137.9
Others	4,686.9	12,115.9	13,992.7	17,988.3	23,375.6	23,638.8	27,343.8
Imports of Services	9,713.0	15,463.9	18,176.5	21,115.6	25,017.2	27,281.5	29,003.7
Transportation	4,046.7	5,835.4	6,486.8	7,327.7	8,401.4	8,860.7	9,380.3
Travel	1,674.0	4,106.3	5,081.4	5,953.8	7,180.7	8,178.0	9,112.6
Insurance	846.2	869.4	1,022.0	1,177.6	1,380.3	1,414.5	1,484.4
Government	94.4	174.2	168.6	150.2	167.6	137.2	166.1
Others	3,051.7	4,478.6	5,417.7	6,506.3	7,887.2	8,691.1	8,860.3
Income Balance	78.0	2,521.7	314.7	2,365.6	2,987.7	4,207.5	5,799.1
Income Receipts	6,151.4	13,381.0	13,047.5	14,924.9	18,142.7	20,196.1	22,860.0
Income Payments	6,073.4	10,859.3	12,732.8	12,559.3	15,155.0	15,988.6	17,060.9
Current Transfers (Net)	-389.8	-773.9	-866.0	-1,009.8	-1,255.4	-1,512.6	-1,762.1
General Government	-134.4	-160.3	-181.3	-203.4	-313.6	-332.0	-374.9
Other Sectors	-255.4	-613.6	-684.7	-806.4	-941.8	-1,180.6	-1,387.2
B Capital and Financial Account							
Balance	887.2	2,859.1	-2,073.6	-17,984.1	-1,027.3	-3,633.2	-6,991.9
Capital Account (Net)	-102.4	-61.8	-115.3	-128.5	-101.0	-195.6	-257.1
Financial Account (Net)	989.6	2,920.9	-1,958.3	-17,855.6	-926.3	-3,437.6	-6,734.8
Direct Investment	5,538.7	1,445.5	4,095.1	6,659.3	4,179.2	4,650.9	6,921.0
Portfolio Investment	530.9	4,055.8	-8,023.9	-15,269.4	-11,630.9	-12,144.8	-16,138.9
Other Investment	-5,080.0	-2,580.4	1,970.5	-9,245.5	6,525.4	4,056.3	2,483.1
Assets	-4,783.9	-10,889.4	-11,478.6	-18,274.4	-11,169.3	-15,847.3	-51,701.1
Banks	-3,285.7	-9,555.0	1,242.0	-6,554.5	1,635.1	-4,943.4	-18,492.1
Other Sectors	-1,498.2	-1,334.4	-12,720.6	-11,719.9	-12,804.4	-10,903.9	-33,209.0
Liabilities	-296.1	8,309.0	13,449.1	9,028.9	17,694.7	19,903.6	54,184.2
Banks	1,475.5	8,382.3	3,149.4	8,261.8	6,268.8	11,333.4	28,341.4
Other Sectors	-1,771.6	-73.3	10,299.7	767.1	11,425.9	8,570.2	25,842.8
C Net Errors and Omissions	1,670.7	-2,604.9	7,324.5	7,792.6	-7,154.0	-6,720.4	-3,131.9
D Overall Balance (A+B+C)	2,328.5	9,959.0	12,153.7	7,301.7	12,173.9	10,406.6	11,855.7
E Official Reserves (Net)¹	-2,328.5	-9,959.0	-12,153.7	-7,301.7	-12,173.9	-10,406.6	-11,855.7
Special Drawing Rights	-29.1	76.1	-11.9	-9.7	-15.5	-9.4	-38.3
Reserve Position in the Fund	-11.7	-146.7	-14.8	-20.3	-48.8	1.5	-135.5
Foreign Exchange Assets	-2,287.7	-9,888.4	-12,127.0	-7,271.7	-12,109.6	-10,398.7	-11,681.9

1 Increase in assets is indicated by a minus (-) sign.

5.10 STOCK OF FOREIGN EQUITY INVESTMENT IN SINGAPORE BY INDUSTRY

(End of Period)

Million Dollars							
Industry	1985	1990	1991	1992	1993	1994	1995
Total (I+II)	25,502.7	57,935.2	62,910.5	65,351.0	73,285.2	86,811.7	99,215.7
(I) Direct Equity Investment	22,354.9	49,830.6	54,563.2	56,660.9	62,766.9	74,605.2	84,267.0
Agriculture & Fishing	72.2	116.8	82.6	136.6	36.6	34.5	34.3
Mining & Quarrying	-39.4	-44.0	-39.7	-6.4	-1.4	2.1	-2.3
Manufacturing	11,287.5	19,760.3	20,658.7	20,034.0	22,418.3	27,143.1	30,626.4
Construction	230.6	600.6	749.8	607.7	479.0	611.5	969.0
Commerce	2,963.9	6,516.8	8,561.5	7,933.8	9,113.2	11,461.0	11,697.2
Transport & Storage	-84.6	1,229.6	1,372.4	1,531.6	1,971.5	2,534.8	2,654.5
Financial & Business Services	7,883.7	21,530.6	23,049.2	26,293.3	28,630.1	32,797.3	38,238.1
Other Services	41.0	120.0	128.6	130.5	119.6	20.9	49.8
(II) Portfolio & Other Equity Investment	3,147.8	8,104.5	8,347.3	8,690.1	10,518.4	12,206.4	14,948.7

Note : Negative figures result when outstanding amount due from foreign head offices to their Singapore branches are larger than the amount due from branches to the head offices.

5.11 STOCK OF SINGAPORE'S EQUITY INVESTMENT ABROAD BY INDUSTRY

(End of Period)

Million Dollars						
Industry	1990	1991	1992	1993	1994	1995
Total (I+II)	17,826	19,718	22,886	27,952	37,065	48,498
(I) Direct Equity Investment Abroad ¹	13,622	15,184	17,741	22,181	29,765	36,866
Manufacturing	2,395	2,901	3,760	4,550	7,042	9,424
Construction	70	72	130	187	236	320
Commerce	1,504	1,606	1,967	2,285	2,800	3,289
Transport & Storage	347	245	290	546	893	861
Financial	7,301	8,648	9,753	12,225	15,473	18,997
Real Estate	1,213	859	963	1,420	1,989	2,535
Business Services	512	605	595	766	1,005	1,084
Others	280	247	283	202	329	356
(II) Portfolio Equity Investment Abroad	4,204	4,534	5,144	5,770	7,300	11,632

Notes : Data breakdown by industry prior to 1990 are not available.

Data prior to 1994 exclude investment undertaken by financial institutions such as banks, finance companies and insurance companies.

¹ Figures include stocks of attributable reserve of overseas subsidiaries and associates.

5.12 STOCK OF FOREIGN EQUITY INVESTMENT IN SINGAPORE BY COUNTRY

(End of Period)

Million Dollars

	1985	1990	1991	1992	1993	1994	1995
Total (I+II)	25,502.7	57,935.2	62,910.5	65,351.0	73,285.2	86,811.7	99,215.7
(I) Direct Equity Investment	22,354.9	49,830.6	54,563.2	56,660.9	62,766.9	74,605.2	84,267.0
United States	5,959.5	8,590.2	9,530.4	9,646.6	11,251.3	12,051.7	14,253.0
Australia	524.2	2,953.1	2,886.6	2,943.9	3,128.1	3,281.2	3,131.6
Europe	6,799.9	13,465.2	15,834.2	16,385.1	17,847.6	22,383.5	24,815.7
European Union	5,273.9	10,564.3	12,683.2	13,083.2	13,777.5	15,828.3	17,385.3
United Kingdom	3,600.0	4,639.0	6,150.0	6,020.5	6,165.9	6,616.8	6,666.3
Germany	559.6	884.1	985.9	1,032.5	1,069.4	1,345.3	1,894.9
Netherlands	789.0	4,072.3	4,344.9	4,078.5	4,056.6	4,194.6	4,397.2
Others	325.2	969.0	1,202.4	1,951.7	2,485.6	3,671.6	4,426.9
Switzerland	1,395.8	2,262.4	2,434.5	2,634.2	3,348.1	5,753.5	7,106.7
Others	130.2	638.5	716.5	667.7	722.0	801.7	323.7
Asia	7,284.5	17,301.6	18,422.8	20,176.3	21,965.6	25,800.9	28,388.4
Japan	3,163.2	10,662.7	11,717.9	13,186.3	13,471.1	15,806.3	16,969.5
Hong Kong	1,810.9	3,267.1	3,245.0	3,461.8	3,758.7	3,623.1	3,910.4
Taiwan	65.3	225.2	253.1	360.3	503.5	725.2	927.9
Asean	2,061.9	3,002.7	2,889.8	3,041.9	3,843.5	4,928.6	5,676.9
Malaysia	1,784.8	2,109.7	2,106.4	2,220.7	2,462.5	2,910.9	3,523.9
Indonesia	117.9	245.1	91.6	61.3	170.6	575.0	788.2
Philippines	30.2	159.3	157.2	150.3	167.8	351.0	356.7
Thailand	43.5	417.3	485.7	516.9	951.0	904.3	801.8
Brunei	85.4	71.4	48.9	92.7	91.5	187.4	206.2
Others	183.2	143.9	317.0	126.0	388.8	717.7	903.7
Other Countries	1,786.8	7,520.5	7,889.2	7,509.0	8,574.3	11,087.9	13,678.3
(II) Portfolio & Other Equity Investment	3,147.8	8,104.5	8,347.3	8,690.1	10,518.4	12,206.4	14,948.7

5.13

STOCK OF SINGAPORE'S EQUITY INVESTMENT ABROAD BY COUNTRY

(End of Period)

Million Dollars

Country	1990	1991	1992	1993	1994	1995
Total (I+II)	17,826	19,718	22,886	27,952	37,065	48,498
(I) Direct Equity Investment Abroad ¹	13,622	15,184	17,741	22,181	29,765	36,866
Asia	7,013	7,402	9,209	11,643	17,358	21,511
Asean	3,567	3,996	4,897	6,107	9,680	12,467
Brunei	66	69	89	75	77	37
Indonesia	225	267	328	620	1,997	3,448
Malaysia	2,790	3,121	3,917	4,619	6,500	7,305
Philippines	98	90	106	202	382	521
Thailand	388	448	457	591	723	860
Vietnam ²	-	-	-	70	127	296
Hong Kong	2,266	2,369	3,051	3,847	4,940	5,089
Taiwan	495	287	350	394	496	530
China	240	220	283	652	1,533	2,445
Japan	52	74	76	96	171	382
Others	394	457	554	477	412	598
Europe	1,095	1,398	1,480	1,566	2,200	3,844
Netherlands	656	550	526	499	453	456
United Kingdom	300	322	351	328	930	2,435
Others	139	526	604	739	818	953
Australia	531	570	637	583	999	1,116
United States	690	1,304	1,590	1,773	1,681	2,036
Other Countries	4,293	4,511	4,826	6,617	7,527	8,359
(II) Portfolio Equity Investment	4,204	4,534	5,144	5,770	7,300	11,632

Note : Data prior to 1994 exclude investment undertaken by financial institutions such as banks, finance companies and insurance companies.

1 Data prior to 1990 exclude stock of attributable reserves of overseas subsidiaries and associates as they are only available from 1990 onwards.

2 With effect from 1995, Vietnam is included in Asean total.

[illegible]

Data on the Corporate Sector covered all companies incorporated or registered in Singapore, including branches of foreign companies. Partnerships and sole proprietorships were, however, not included because of the difficulty in obtaining financial statements for such business enterprises. For companies with up-to-date accounts filed with the Singapore Registry of Companies and Businesses (RCB), the data were extracted from those accounts. For the remaining companies, data were collected directly via a postal survey of the companies.

Definitions

Local-controlled companies : Refer to companies with at least 50 per cent of their ordinary paid-up shares owned by shareholders who have their residential or registered address in Singapore, with the exception of subsidiaries of local companies which are foreign-controlled.

Foreign-controlled companies : Refer to companies with at least 50 per cent of their ordinary paid-up shares owned by shareholders who have their residential or registered address outside Singapore. They include branches of foreign corporations as well as subsidiaries of foreign-controlled companies.

Equity Ratio : It is defined as the ratio of shareholders' equity to the total debt or

liabilities. This ratio measures the dependence of companies on external funding i.e. funding which is not from its shareholders or to its overseas headquarters in the case of the local branch of a foreign enterprise. The lower is this ratio, the higher is the company's dependence on external funding.

Current Ratio : It is defined as the ratio of current assets (including the outstanding funds due from holding and related companies) to current liabilities (including the outstanding amount due to holding and related companies). This ratio measures the liquidity of companies, i.e. their ability to meet current debt payments when due. A ratio of 1 indicates that the company has exactly balanced its current liabilities with current assets. The further is the ratio below 1, the higher is the risk of the company running into a liquidity problem. A ratio above 1 indicates an excess of liquidity in the company.

Other References

The report "Singapore's Corporate Sector, 1986-1995", published by the Singapore Department of Statistics, contains analyses of data and detailed tables showing the aggregated balance sheets and profit and loss accounts.

6.1 ACTIVE COMPANIES BY INDUSTRY

(End of Period)

								Number
Industry	1985	1990	1991	1992	1993	1994	1995	
Total	32,373	37,379	40,242	44,681	45,605	49,332	62,390	
Agriculture & Fishing	122	109	141	87	90	62	77	
Manufacturing	3,877	5,351	5,629	5,469	5,947	6,607	7,849	
Construction	2,106	2,335	2,592	2,677	3,398	3,791	5,036	
Commerce	13,509	15,259	16,361	18,302	18,870	20,015	24,421	
Transport & Storage	2,381	2,935	3,229	3,537	3,591	4,034	4,849	
Financial & Business Services	9,663	9,989	10,942	12,986	12,338	13,387	17,726	
Social & Personal Services	682	1,377	1,319	1,585	1,360	1,416	2,407	
Others	33	24	29	38	11	20	25	

6.2 LOCAL-CONTROLLED COMPANIES BY INDUSTRY

(End of Period)

								Number
Industry	1985	1990	1991	1992	1993	1994	1995	
Total	25,455	28,693	31,463	34,263	34,362	36,242	51,100	
Agriculture & Fishing	111	101	136	78	85	55	72	
Manufacturing	2,998	4,171	4,301	4,299	4,624	4,697	6,465	
Construction	1,842	2,150	2,404	2,462	2,963	3,132	4,765	
Commerce	10,532	11,609	12,526	13,749	13,827	14,725	19,673	
Transport & Storage	1,843	2,138	2,585	2,710	2,702	2,937	3,987	
Financial & Business Services	7,490	7,214	8,293	9,539	8,938	9,399	14,030	
Social & Personal Services	613	1,294	1,199	1,418	1,216	1,290	2,092	
Others	26	16	19	8	7	7	16	

6.3 FOREIGN-CONTROLLED COMPANIES BY INDUSTRY

(End of Period)

								Number
Industry	1985	1990	1991	1992	1993	1994	1995	
Total	6,918	8,686	8,779	10,418	11,243	13,090	11,290	
Agriculture & Fishing	11	8	5	9	5	7	5	
Manufacturing	879	1,180	1,328	1,170	1,323	1,910	1,384	
Construction	264	185	188	215	435	659	271	
Commerce	2,977	3,650	3,835	4,553	5,043	5,290	4,748	
Transport & Storage	538	797	644	827	889	1,097	862	
Financial & Business Services	2,173	2,775	2,649	3,447	3,400	3,988	3,696	
Social & Personal Services	69	83	120	167	144	126	315	
Others	7	8	10	30	4	13	9	

6.4 TOTAL ASSETS / LIABILITIES OF COMPANIES BY MAIN INDUSTRIAL SECTORS

(End of Period)

Billion Dollars							
	1985	1990	1991	1992	1993	1994	1995
Total	546.5	972.2	990.3	1,048.4	1,175.8	1,272.8	1,444.2
Financial Services Sector	401.5	732.5	714.0	759.0	840.8	878.6	967.0
Non-Financial Sectors	145.0	239.7	276.4	289.4	335.0	394.2	477.3
Manufacturing	35.8	66.3	71.5	71.7	82.5	96.6	108.3
Construction	12.9	9.2	12.0	14.7	19.0	21.4	27.6
Commerce	33.5	63.7	78.0	75.5	87.8	104.5	119.8
Transport & Storage	19.5	27.7	30.5	37.4	40.7	46.5	50.3
Insurance, Real Estate & Business Services	41.5	68.7	79.8	84.7	99.5	119.8	147.0
Others	1.8	4.1	4.5	5.5	5.4	5.3	24.2

6.5

EQUITY RATIOS OF COMPANIES BY MAIN INDUSTRIAL SECTORS

(End of Period)

	1985	1990	1991	1992	1993	1994	1995
Total	0.13	0.20	0.21	0.19	0.20	0.21	0.26
Financial Services Sector	0.06	0.14	0.15	0.13	0.14	0.14	0.20
Non-Financial Sectors	0.31	0.39	0.37	0.37	0.37	0.38	0.39
Manufacturing	0.50	0.49	0.47	0.48	0.48	0.49	0.51
Construction	0.07	0.19	0.17	0.12	0.11	0.10	0.11
Commerce	0.27	0.27	0.26	0.25	0.25	0.26	0.26
Transport & Storage	0.19	0.42	0.44	0.44	0.47	0.48	0.50
Insurance, Real Estate & Business Services	0.31	0.40	0.39	0.40	0.40	0.40	0.40
Others	0.32	0.48	0.51	0.44	0.44	0.42	0.60

6.6

CURRENT RATIOS OF COMPANIES BY MAIN INDUSTRIAL SECTORS

(End of Period)

	1985	1990	1991	1992	1993	1994	1995
Total	0.95	1.07	1.08	1.04	1.04	1.05	1.08
Financial Services Sector	0.96	1.07	1.09	1.04	1.05	1.04	1.09
Non-Financial Sectors	0.94	1.08	1.06	1.04	1.02	1.08	1.05
Manufacturing	1.29	1.34	1.27	1.31	1.30	1.35	1.33
Construction	0.94	0.89	0.92	0.86	0.84	0.88	0.91
Commerce	0.98	1.12	1.13	1.09	1.08	1.11	1.10
Transport & Storage	0.98	1.04	1.01	1.00	0.88	0.99	0.99
Insurance, Real Estate & Business Services	0.63	0.77	0.76	0.78	0.79	0.89	0.85
Others	0.66	1.15	1.23	1.02	1.06	0.86	0.71

6.7 NEW COMPANIES FORMED BY INDUSTRY

Industry	1987	1992	1993	1994	1995	1996	1997
Total	4,184	7,220	8,816	9,811	9,468	9,473	8,918
Agriculture, Fishing, Mining & Quarrying	43	23	17	27	23	25	44
Manufacturing	700	953	1,075	1,140	1,104	1,062	1,067
Construction	224	465	525	553	581	651	680
Commerce	1,550	3,162	3,632	3,719	3,551	3,557	3,099
Transport & Communications	235	485	545	573	645	589	559
Financial & Business Services	1,007	1,798	2,623	3,275	3,086	3,151	3,035
Other Services	218	334	399	450	440	433	433
Not Stated	207	-	-	74	38	5	1

Source : Registry of Companies and Businesses

Industry	1987	1992	1993	1994	1995	1996	1997
Total	1.07	1.08	1.04	1.04	1.04	1.04	1.08
Financial Services Sector	1.07	1.09	1.04	1.04	1.03	1.04	1.09
Non-Financial Sectors	1.04	1.04	1.04	1.04	1.04	1.04	1.03
Manufacturing	1.04	1.04	1.04	1.04	1.04	1.04	1.03
Construction	1.04	1.04	1.04	1.04	1.04	1.04	1.03
Commerce	1.04	1.04	1.04	1.04	1.04	1.04	1.03
Transport & Storage	1.04	1.04	1.04	1.04	1.04	1.04	1.03
Insurance, Real Estate & Business Services	1.04	1.04	1.04	1.04	1.04	1.04	1.03
Others	1.04	1.04	1.04	1.04	1.04	1.04	1.03

7 AGRICULTURE, LIVESTOCK AND FISHERIES

	1997	2001	2002	2003	2004	2005
General	182.6	182.6	182.6	182.6	182.6	182.6

turning activity in Singapore, meets about 35 per cent of eggs consumed locally. The seven large-scale layer farms in agro-technology parks are expected to increase their egg production to 1.6 million eggs or 23% of projected daily consumption.

The agricultural sector of Singapore is engaged mainly in the production of eggs, fish and vegetables for local consumption and orchids and ornamental fish for exports. About one per cent of Singapore's land area is used for agricultural purposes.

Land for farming has declined over the years. In order to achieve a significant measure of local production, the Government has initiated the development of agro-technology parks to house large-scale intensive farms using such technology.

of 1,135 hectares have been successfully developed and an additional 325 hectares are under development.

The main crops cultivated in Singapore are vegetables and orchids. Vegetable cultivation is highly intensive, producing mainly leafy vegetables like cai xin, kai lan, wong cai and xian cai, mushrooms and bean sprouts.

A number of farms and nurseries grow orchids, ornamental and foliage plants for export and domestic sale. Singapore is renowned for her exotic orchid cut-flowers which are exported to many countries. The orchid and other horticultural enterprises are supported by plant tissue laboratories which produce several hundred thousands of plantlets.

Poultry and Livestock

Hon egg production, an important

AGRICULTURE, LIVESTOCK AND FISHERIES

mainly catches from the sea with relatively small quantities from aquaculture fish farms. The Senoko Fishing Port which handles the bulk of fresh fish landed by foreign vessels as well as those imported by air and road. The Senoko Fishing Port began its operations in September 1997. It handles much smaller quantities landed by local fishing vessels. There are 91 fish processing establishments licensed to manufacture fishery products for the domestic market and 13 establishments approved for exports to EU markets.

The Jurong Fishing Port plays an important role as a major fish landing and distribution point in Singapore. The Port handles the bulk of fresh fish landed by foreign vessels as well as those imported by air and road. The Senoko Fishing Port which replaced the Punggol Fishing Port began its operations in September 1997. It handles much smaller quantities landed by local fishing vessels. There are 91 fish processing establishments licensed to manufacture fishery products for the domestic market and 13 establishments approved for exports to EU markets.

There are 90 licensed marine farms covering about 49.0 hectares of coastal waters, cultivating high-value fish like groupers and sea bass for the live fish market.

General

The agricultural sector of Singapore is engaged mainly in the production of eggs, fish and vegetables for local consumption and orchids and ornamental fish for exports. About one per cent of Singapore's land area is used for agricultural purposes.

Land for farming has declined over the years. In order to achieve a significant measure of local production of fresh food supply, the government has initiated the development of agro-technology parks to house large-scale intensive farms using such technology. Six agrotechnology parks covering a total land area of 1,135 hectares have been successfully developed and an additional 332 hectares are under development.

Horticulture

The main crops cultivated are vegetables and orchids. Vegetable cultivation is highly intensive, producing mainly leafy vegetables like cai xin, gai lan, weng cai and xian cai, mushrooms and bean sprouts.

A number of farms and nurseries grow orchids, ornamental and foliage plants for export and domestic sale. Singapore is renowned for her exotic orchid cut-flowers which are exported to many countries. The orchid and other horticultural enterprises are supported by plant tissue laboratories which produce several hundred thousands of plantlets.

Poultry and Livestock

Hen egg production, an important

farming activity in Singapore, meets about 35 per cent of eggs consumed locally. The seven large-scale layer farms in agrotechnology parks are expected to increase their egg production to 1.6 million eggs or 53% of projected daily consumption.

Pigs, sheep, goats and cattle are slaughtered at the Jurong and Kim Chuan Abattoirs under close supervision of the Primary Production Department.

Fisheries

Local fish production comprises mainly catches from the sea with relatively small quantities from aquaculture fish farms. Singapore also imports, exports and transships fish caught by foreign fishing vessels.

The Jurong Fishing Port plays an important role as a major fish landing and distribution point in Singapore. The Port handles the bulk of fresh fish landed by foreign vessels as well as those imported by air and road. The Senoko Fishing Port which replaced the Punggol Fishing Port began its operations in September 1997. It handles much smaller quantities landed by local fishing vessels. There are 91 fish processing establishments licensed to manufacture fishery products for the domestic market and 13 establishments approved for exports to EU markets.

There are 90 licensed marine farms covering about 49.0 hectares of coastal waters, culturing high-value fish like groupers and seabass for the live fish market.

7.1 PRODUCTION OF PRINCIPAL CROPS

	1987	1992	1993	1994	1995	1996	1997
Vegetables (Tonnes)	16,810	5,189	4,800	5,644	7,336	10,870	16,281
Orchid Flowers (Million Stalks)	na	42	37	33	29	29	16
Plants ¹ (Million Plants)	na	na	233	188	77	65	66

Source : Primary Production Department.

¹ Include potted plants, foliages, ornamental plants, aquatic plants and tissue-cultured plantlets.

7.2 LIVESTOCK SLAUGHTERED

	1987	1992	1993	1994	1995	1996	Number 1997
Pigs	1,106,678	1,266,718	1,287,801	1,311,753	1,291,560	1,252,516	1,257,041
Sheep	52,363	26,677	24,331	20,170	14,357	9,077	7,905
Goats	1,432	947	246	235	19	48	56
Oxen	1,703	1,409	1,315	789	441	200	281

Source : Primary Production Department.

7.3 FISH SUPPLY AND AUCTION

	1987	1992	1993	1994	1995	1996	Tonnes 1997
Fish Supply							
Local Production ¹	16,875	11,548	11,940	14,101	13,353	13,129	13,049
Imports	133,976	180,403	167,077	178,537	181,090	156,077	150,257
Exports	93,724	121,941	109,966	136,518	136,909	116,396	102,427
Fish Auction	111,864	108,589	103,109	92,550	93,761	91,460	87,139

Source : Primary Production Department

Trade Development Board

Note : Exclude dried, salted and fish in brine.

¹ Data include aquaculture production.

MANUFACTURING

employers and other persons provided for working proprietors, it refers to the amount withdrawn for their personal use. For unpaid family workers, it includes allowances in kind and in cash. It is not included in the total value of all the products of the manufacturing sector (including by-products) and industrial services rendered during the year. It is not covered by the census and is not included in the index of industrial production.

Value Added: It refers to gross output less intermediate consumption. It is the value added in the manufacturing sector. It is the value added in the manufacturing sector. It is the value added in the manufacturing sector.

Index of Industrial Production

The index of industrial production covers all manufacturing activities classified under Section E of the Singapore Standard Industrial Classification 1996. Rubber, processing, granite quarrying and production undertaken by government departments and statutory boards are not covered by the index. The indices published are at the 2-digit industry division level and the total manufacturing level.

The index of industrial production was rebased to 1996=100 using the value added weighting pattern obtained from the 1997 Census of Industrial Production data. The weighting pattern reflects the relative importance of the industry divisions and changing structure within the manufacturing sector. The Laspeyres' formula is used for the compilation of the index, with 1996 as the base year.

Census of Industrial Production: This is a biennial survey of manufacturing establishments in Singapore. It is a census of manufacturing establishments, not a sample survey. It covers all manufacturing establishments, whether they are engaged in manufacturing or in the service of manufacturing. The results provide comprehensive data for the study of the structure and trends of the manufacturing sector.

The activities covered in the census include manufacturing, construction, and other activities. The census is primarily conducted by mail, using two standard questionnaires. The reference period is the calendar year except for those establishments whose financial years do not coincide with the calendar year. The census is primarily conducted by mail, using two standard questionnaires. The reference period is the calendar year except for those establishments whose financial years do not coincide with the calendar year.

Definitions: An establishment is defined as a manufacturing unit engaged in one manufacturing activity and generally operating at one location. It is a manufacturing unit engaged in one manufacturing activity and generally operating at one location.

Workers: They refer to all persons engaged in the industrial activity of the establishment, that is, all employees, the self-employed and their relatives. Data generally refer to employment as at 30 June, except where establishments commence operation after June.

Remuneration: It refers to the amount expended for the whole year. For employees, total remuneration comprises salaries (including bonuses), contributions to the Central Provident Fund and pensions paid by

Census of Industrial Production

A census of manufacturing establishments employing ten or more workers is conducted annually by the Research and Statistics Unit, Economic Development Board. The results provide comprehensive data for the study of the structure and trends of the manufacturing sector.

The activities covered in the census include manufacturing, industrial servicing and granite quarrying. They are classified according to the Singapore Standard Industrial Classification 1996.

The census is primarily conducted by mail, using two standard questionnaires. The reference period is the calendar year except for those establishments whose financial years do not coincide with the calendar year.

Definitions

Establishments : A manufacturing establishment is defined as a manufacturing unit engaged in one manufacturing activity and generally operating at one location.

Workers : They refer to all persons engaged in the industrial activity of the establishment, that is, all employees, the self-employed and their relatives. Data generally refer to employment as at 30 June, except where establishments commence operation after June.

Remuneration : It refers to the amount expended for the whole year. For employees, total remuneration comprises salaries (including bonuses), contributions to the Central Provident Fund and pensions paid by

employers, and other benefits provided. For working proprietors, it refers to the amount withdrawn for their personal use. For unpaid family workers, it refers to allowances.

Gross Output : The gross output of industries refers to the total value of all commodities produced (including by-products) and industrial services rendered during the year.

Materials Used : Materials used cover raw or basic materials, chemicals and packing materials consumed in the production. They refer to the actual consumption during the year.

Value Added : It refers to gross output less materials, utilities, fuel, transportation charges, work given out and other operating costs.

Index of Industrial Production

The index of industrial production covers all manufacturing activities classified under Section D of the Singapore Standard Industrial Classification 1996. Rubber processing, granite quarrying and production undertaken by government departments and statutory boards are not covered by the index. The indices published are at the 2-digit industry division level and the total manufacturing level.

The index of industrial production was rebased to 1996=100, using the value added weighting pattern obtained from the 1995 Census of Industrial Production data. The weighting pattern reflects the relative importance of the industry divisions and changing structure within the manufacturing sector. The Laspeyres' formula is used for the compilation of the index, with 1996 as the base year.

8 MANUFACTURING (cont'd)

Indices of Business and Labour Costs

The Unit Business Cost Index (UBCI) is compiled by the Singapore Department of Statistics. It measures the relative cost of producing one unit of real output with respect to the base year. The main components for business cost are labour cost, services cost and government rates and fees. The weighting pattern for the components are derived from the input-output tables. As a fixed-weight index, the UBCI takes the reference year of input-output tables as the base year. The Laspeyres' formula is used for the compilation of the index.

Unit labour cost is defined as the total labour cost per unit of real output. Total labour cost comprises wages and salaries, benefits, CPF contributions by employers, foreign workers' levy and skill development levy.

Investment Commitments

Investment commitments refer to investment projects in terms of gross fixed

assets which companies commit to invest in Singapore. Projects are only recorded as commitments if their potential for establishment is favourable and the company has made a firm undertaking to implement the project.

Pioneer Manufacturing Establishments

These are establishments which had been granted approval under the Pioneer Industries Programme of the Economic Expansion Incentives Act. The principal statistics of these establishments were obtained from the Census of Industrial Production.

Other References

More detailed statistics on the manufacturing sector are available from the "Report on the Census of Industrial Production". This report is published annually by the Research and Statistics Unit, Economic Development Board.

8.1 PRINCIPAL MANUFACTURING STATISTICS

	Unit	1987	1992	1993	1994	1995	1996	1997
Establishments	No	3,514	3,917	3,993	4,013	4,036	4,068	4,195
Workers	No	276,309	358,394	355,175	365,588	370,281	368,055	362,269
Materials	\$m	29,050	47,407	54,251	63,097	71,680	76,026	79,340
Output	\$m	46,084	77,276	87,639	100,622	113,358	119,869	125,537
Value Added	\$m	10,995	18,302	21,351	23,567	26,903	28,214	29,481
Remuneration	\$m	4,198	8,387	8,995	9,881	10,682	11,253	11,795
Capital Expenditure	\$m	2,726	4,793	5,624	5,972	7,136	8,088	na
Direct Exports	\$m	30,380	46,907	53,022	61,532	69,013	72,964	76,917

Source : Economic Development Board (with effect from April 1987)

Notes : Figures refer to establishments engaging 10 or more workers.

Data exclude rubber processing and granite quarrying.

8.2 SELECTED AVERAGES AND RATIOS IN THE MANUFACTURING SECTOR

	Unit	1987	1992	1993	1994	1995	1996	1997
Output Per Worker	\$'000	166.8	215.6	246.7	275.2	306.1	325.7	346.5
Value Added Per Worker	\$'000	39.8	51.1	60.1	64.5	72.7	76.7	81.4
Value Added to Output	%	23.9	23.7	24.4	23.4	23.7	23.5	23.5
Remuneration to Value Added	%	38.2	45.8	42.1	41.9	39.7	39.9	40.0
Remuneration to Output	%	9.1	10.9	10.3	9.8	9.4	9.4	9.4
Direct Exports to Total Sales	%	66.0	60.3	60.6	61.5	61.1	60.7	61.1
Direct Exports to Output	%	65.9	60.7	60.5	61.2	60.9	60.9	61.3

Source : Economic Development Board (with effect from April 1987)

Note : See notes to Table 8.1.

8.3 MANUFACTURING ESTABLISHMENTS BY INDUSTRY

Code	Industry	Number						
		1987	1992	1993	1994	1995	1996	1997
15/16	Food, Beverage & Tobacco	297	305	305	312	312	313	320
17	Textiles & Textile Manufactures	63	64	65	59	58	53	54
18	Wearing Apparel except Footwear	373	347	310	274	231	193	194
19	Leather, Leather Products & Footwear	75	47	44	39	33	27	27
20	Wood & Wood Products	95	76	75	69	64	57	59
21	Paper & Paper Products	81	101	103	106	110	104	105
22	Publishing, Printing & Reproduction of Recorded Media	320	365	387	386	407	415	430
23	Refined Petroleum Products	9	14	16	18	20	18	19
24	Chemicals & Chemical Products	152	171	174	185	187	195	205
25	Rubber & Plastic Products	273	323	333	337	346	355	363
26	Non-metallic Mineral Products	94	87	92	93	85	95	97
27	Basic Metals	28	29	29	27	25	25	27
28	Fabricated Metal Products except Machinery & Apparatus	395	511	533	559	584	605	625
29	Machinery & Equipment	382	470	473	499	515	565	585
30	Electrical Machinery & Apparatus	109	138	142	145	150	152	157
31	Electronic Products & Components	203	241	241	237	239	238	245
32	Medical, Precision & Optical Instruments, Watches & Clocks	46	62	60	57	62	62	65
33	Transport Equipment	184	250	285	294	305	307	318
34	Other Manufacturing Industries	332	310	319	310	295	279	289
35	Recycling of Metal/Non-metal Waste & Scrap	3	6	7	7	8	10	11
Total Manufacturing		3,514	3,917	3,993	4,013	4,036	4,068	4,195

Source : Economic Development Board (with effect from April 1987)

Notes : Figures refer to establishments engaging 10 or more workers.

Rubber processing and granite quarrying are excluded.

Data are classified according to Singapore Standard Industrial Classification, 1996.

8.4 MANUFACTURING OUTPUT BY INDUSTRY

Million Dollars

Code	Industry	1987	1992	1993	1994	1995	1996	1997
15/16	Food, Beverage & Tobacco	2,422.4	3,018.8	3,135.5	3,457.4	3,607.7	3,650.3	3,475.9
17	Textiles & Textile Manufactures	317.1	388.3	368.0	320.8	294.4	237.6	248.3
18	Wearing Apparel except Footwear	1,562.3	1,631.5	1,323.4	1,205.8	973.7	801.6	760.7
19	Leather, Leather Products & Footwear	80.5	123.6	123.6	121.4	116.5	112.1	100.6
20	Wood & Wood Products	323.0	295.7	295.1	283.3	289.6	270.2	243.2
21	Paper & Paper Products	591.2	803.7	855.5	950.4	1,056.9	1,021.9	926.9
22	Publishing, Printing & Reproduction of Recorded Media	1,127.7	2,156.4	2,330.2	2,446.5	2,660.8	2,755.3	2,838.0
23	Refined Petroleum Products	7,446.0	10,216.7	11,154.4	10,909.5	10,653.8	13,746.5	14,502.5
24	Chemicals & Chemical Products	3,701.4	5,035.3	5,154.4	5,918.7	6,865.1	7,163.1	9,197.5
25	Rubber & Plastic Products	959.3	1,755.5	2,019.1	2,275.7	2,588.5	2,601.0	2,450.1
26	Non-metallic Mineral Products	734.9	1,563.1	1,830.1	2,001.9	2,055.1	2,372.0	2,424.2
27	Basic Metals	541.2	706.5	734.2	720.9	662.7	636.9	660.7
28	Fabricated Metal Products except Machinery & Apparatus	2,104.9	4,161.3	4,668.8	5,607.5	6,313.2	6,297.8	6,323.0
29	Machinery & Equipment	2,659.2	4,543.9	4,395.1	4,965.1	5,849.2	6,452.2	6,840.6
30	Electrical Machinery & Apparatus	1,326.7	2,074.3	2,255.3	2,797.1	3,344.9	3,110.9	3,110.9
31	Electronic Products & Components	16,364.9	31,912.2	39,706.6	48,725.3	57,872.7	60,912.8	63,410.3
32	Medical, Precision & Optical Instruments, Watches & Clocks	498.0	994.2	1,137.0	1,184.8	1,473.1	1,547.1	1,694.1
33	Transport Equipment	2,097.9	4,433.8	4,622.4	5,071.6	5,191.7	4,828.0	5,025.9
34	Other Manufacturing Industries	1,216.3	1,444.9	1,514.0	1,639.2	1,463.3	1,315.0	1,265.0
35	Recycling of Metal/Non-metal Waste & Scrap	9.1	16.0	16.5	19.4	25.0	36.7	38.2
Total Manufacturing		46,084.0	77,275.9	87,639.0	100,622.1	113,358.0	119,869.0	125,536.6

Source : Economic Development Board (with effect from April 1987)

Notes : See notes to Table 8.3.

8.5 VALUE ADDED OF MANUFACTURING ESTABLISHMENTS BY INDUSTRY

Million Dollars

Code	Industry	1987	1992	1993	1994	1995	1996	1997
15/16	Food, Beverage & Tobacco	468.1	720.9	778.6	852.8	845.2	853.8	819.5
17	Textiles & Textile Manufactures	74.5	89.6	87.2	81.9	66.4	61.5	67.4
18	Wearing Apparel except Footwear	364.6	370.4	311.7	265.3	220.1	173.7	163.3
19	Leather, Leather Products & Footwear	18.3	30.5	36.2	35.2	33.3	32.2	29.7
20	Wood & Wood Products	48.7	51.4	57.0	58.5	61.3	59.4	54.8
21	Paper & Paper Products	191.7	278.3	324.7	366.9	372.2	378.3	345.0
22	Publishing, Printing & Reproduction of Recorded Media	445.5	918.3	1,029.5	1,236.5	1,304.3	1,322.1	1,439.8
23	Refined Petroleum Products	494.9	1,260.8	1,499.1	1,444.5	1,296.9	1,623.8	1,709.9
24	Chemicals & Chemical Products	1,405.5	1,869.9	1,984.7	2,162.8	2,527.8	2,731.1	3,009.7
25	Rubber & Plastic Products	260.0	540.2	658.7	732.0	781.7	796.1	771.5
26	Non-metallic Mineral Products	148.1	424.0	455.7	516.3	544.0	590.6	594.1
27	Basic Metals	120.2	216.5	170.1	160.2	148.0	133.7	129.8
28	Fabricated Metal Products except Machinery & Apparatus	535.5	1,207.6	1,332.0	1,509.2	1,680.6	1,704.1	1,733.1
29	Machinery & Equipment	694.4	1,279.9	1,333.6	1,392.5	1,636.7	1,753.7	1,942.8
30	Electrical Machinery & Apparatus	400.1	608.8	612.0	746.2	834.4	808.0	812.1
31	Electronic Products & Components	3,918.8	6,160.8	8,231.3	9,543.4	11,987.9	12,672.2	13,181.6
32	Medical, Precision & Optical Instruments, Watches & Clocks	230.0	402.0	471.3	472.1	536.4	578.5	621.3
33	Transport Equipment	885.3	1,560.1	1,667.8	1,700.8	1,731.2	1,655.4	1,779.6
34	Other Manufacturing Industries	285.5	308.1	305.8	284.4	289.1	276.7	267.0
35	Recycling of Metal/Non-metal Waste & Scrap	5.1	3.6	4.1	5.6	5.4	9.1	9.6
Total Manufacturing		10,994.8	18,301.8	21,351.0	23,567.1	26,902.9	28,214.1	29,481.4

Source : Economic Development Board (with effect from April 1987)

Notes : See notes to Table 8.3.

8.6 WORKERS IN MANUFACTURING BY INDUSTRY

		Number						
Code	Industry	1987	1992	1993	1994	1995	1996	1997
15/16	Food, Beverage & Tobacco	13,002	14,460	14,613	14,673	13,996	14,215	14,179
17	Textiles & Textile Manufactures	2,918	3,286	3,101	2,613	2,238	1,748	1,725
18	Wearing Apparel except Footwear	27,718	23,434	20,751	18,143	14,684	10,309	8,670
19	Leather, Leather Products & Footwear	1,544	1,372	1,285	1,187	1,076	998	1,018
20	Wood & Wood Products	3,046	2,139	1,903	1,749	1,626	1,450	1,373
21	Paper & Paper Products	3,590	5,044	5,198	5,475	5,730	5,474	5,228
22	Publishing, Printing & Reproduction of Recorded Media	13,157	17,434	18,230	18,115	18,651	18,932	19,500
23	Refined Petroleum Products	3,148	3,640	3,713	3,752	3,700	3,531	3,414
24	Chemicals & Chemical Products	7,867	10,712	11,169	11,995	12,730	13,621	14,397
25	Rubber & Plastic Products	11,269	17,255	18,627	19,255	20,547	21,545	20,123
26	Non-metallic Mineral Products	5,365	5,866	6,301	6,589	5,512	6,505	6,128
27	Basic Metals	1,916	2,380	2,217	2,301	2,215	2,105	1,905
28	Fabricated Metal Products except Machinery & Apparatus	18,318	28,328	30,603	32,450	33,634	34,765	33,479
29	Machinery & Equipment	25,127	31,015	30,214	31,700	32,936	35,145	35,922
30	Electrical Machinery & Apparatus	14,072	15,835	15,589	17,170	18,051	15,652	14,697
31	Electronic Products & Components	84,912	121,954	117,048	122,380	126,891	128,455	127,789
32	Medical, Precision & Optical Instruments, Watches & Clocks	6,443	9,259	8,766	9,266	9,232	9,291	9,142
33	Transport Equipment	17,474	32,031	33,234	34,964	36,620	34,892	34,334
34	Other Manufacturing Industries	15,367	12,848	12,502	11,692	10,085	9,247	9,053
35	Recycling of Metal/Non-metal Waste & Scrap	56	102	111	119	127	175	193
Total Manufacturing		276,309	358,394	355,175	365,588	370,281	368,055	362,269

Source : Economic Development Board (with effect from April 1987)

Notes : See notes to Table 8.3.

8.7 REMUNERATION IN MANUFACTURING BY INDUSTRY

Million Dollars

Code	Industry	1987	1992	1993	1994	1995	1996	1997
15/16	Food, Beverage & Tobacco	208.7	351.5	372.8	400.1	406.4	435.0	394.4
17	Textiles & Textile Manufactures	39.3	61.8	62.6	56.8	52.4	43.8	44.6
18	Wearing Apparel except Footwear	258.4	314.6	281.0	263.8	224.6	176.5	155.1
19	Leather, Leather Products & Footwear	13.9	24.3	25.0	26.0	25.3	24.8	24.8
20	Wood & Wood Products	38.3	43.0	39.4	40.5	38.8	35.1	35.0
21	Paper & Paper Products	64.2	125.5	137.5	153.0	167.5	171.7	171.4
22	Publishing, Printing & Reproduction of Recorded Media	248.1	490.8	537.3	587.6	647.9	671.1	715.4
23	Refined Petroleum Products	145.4	247.6	282.7	280.8	277.2	301.8	327.2
24	Chemicals & Chemical Products	203.8	433.1	488.6	554.4	627.9	676.2	802.7
25	Rubber & Plastic Products	144.1	340.8	408.0	444.8	505.1	539.0	528.7
26	Non-metallic Mineral Products	83.3	152.1	169.8	195.5	182.9	210.6	220.5
27	Basic Metals	43.8	79.4	80.2	84.2	82.1	87.0	82.5
28	Fabricated Metal Products except Machinery & Apparatus	295.0	663.8	753.8	845.5	945.6	1,006.1	1,024.2
29	Machinery & Equipment	420.3	834.0	875.8	967.4	1,078.3	1,183.7	1,264.7
30	Electrical Machinery & Apparatus	191.1	348.2	390.3	449.0	501.2	484.8	490.1
31	Electronic Products & Components	1,188.3	2,523.4	2,639.7	2,953.4	3,280.1	3,522.5	3,814.9
32	Medical, Precision & Optical Instruments, Watches & Clocks	87.5	208.3	210.8	240.8	258.3	288.8	296.3
33	Transport Equipment	352.9	911.9	995.3	1,081.9	1,132.7	1,164.9	1,170.8
34	Other Manufacturing Industries	170.7	230.8	241.8	252.0	242.7	223.9	225.7
35	Recycling of Metal/Non-metal Waste & Scrap	0.8	2.2	3.0	3.6	4.6	5.4	6.1
Total Manufacturing		4,197.9	8,387.1	8,995.4	9,881.0	10,681.7	11,252.8	11,795.2

Source : Economic Development Board (with effect from April 1987)

Notes : See notes to Table 8.3.

8.8 VALUE OF OUTPUT OF SELECTED MANUFACTURED PRODUCTS

Million Dollars

Commodity	1986	1991	1992	1993	1994	1995	1996
Soft Drinks	201.5	277.7	309.6	303.8	315.4	286.7	281.8
Fabrics	123.8	150.4	135.7	140.9	146.0	152.3	123.1
Paints	136.9	309.8	355.3	339.0	381.6	453.6	459.6
Pharmaceutical Products	691.1	1,436.6	1,373.1	1,439.4	1,327.3	1,345.4	1,704.8
Lubricating Oil	529.3	601.0	632.5	629.0	642.3	781.9	945.0
Cement	151.8	333.6	374.1	426.8	454.8	485.7	471.3
Ready-mixed Concrete	257.9	434.2	497.1	587.0	700.7	809.8	1,024.5
Metal Stampings	168.6	558.9	516.7	639.9	838.1	930.0	989.8
Oil Rigs & Oilfield Equipment	490.5	996.6	864.2	785.3	865.4	940.8	1,197.1
Motors	180.5	416.4	366.4	384.7	441.8	497.5	446.3
Disk Drives	2,044.4	6,545.1	7,724.6	8,499.2	10,456.3	12,617.0	15,826.9
Communication Equipment	494.3	1,243.1	1,491.2	1,846.7	1,653.7	1,914.2	1,683.7
Television Receivers	578.4	1,452.0	1,135.5	1,134.2	1,156.8	1,252.3	1,236.6
Radios (excluding Radio Cassette Recorders)	151.8	126.3	93.5	63.9	98.9	165.2	125.1
Cassette Recorders (with or without radio)	730.5	1,347.6	1,138.5	1,109.2	1,320.3	960.3	469.7
Capacitors	101.7	394.1	409.7	489.9	518.1	498.7	406.6
Shipbuilding & Repairing	913.0	2,564.7	2,446.1	2,375.6	2,671.3	2,769.9	2,389.2
Marine Engines & Parts	99.0	232.2	243.8	266.4	356.9	303.5	306.7
Jewellery	142.7	341.6	333.4	316.6	412.3	305.4	276.4

Source : Economic Development Board (with effect from April 1987)

8.9 INDEX OF INDUSTRIAL PRODUCTION

(1996=100)

01.8

Code	Industry	1987	1992	1993	1994	1995	1996	1997
15/16	Food, Beverage & Tobacco	67.5	91.8	93.9	98.9	99.4	100.0	94.6
17	Textiles & Textile Manufactures	210.1	217.3	192.1	184.4	134.7	100.0	107.2
18	Wearing Apparel except Footwear	234.0	213.6	169.4	146.2	120.8	100.0	95.9
19	Leather, Leather Products & Footwear	151.6	142.3	137.9	128.8	118.4	100.0	91.1
20	Wood & Wood Products	167.1	116.8	108.3	100.1	97.0	100.0	91.0
21	Paper & Paper Products	83.4	90.5	91.0	96.9	105.0	100.0	92.9
22	Publishing, Printing & Reproduction of Recorded Media	52.5	82.5	89.5	96.3	100.2	100.0	103.2
23	Refined Petroleum Products	59.0	82.9	95.0	97.2	94.9	100.0	103.9
24	Chemicals & Chemical Products	50.7	82.7	85.8	93.1	94.1	100.0	125.2
25	Rubber & Plastic Products	69.9	82.7	88.6	98.9	108.1	100.0	94.8
26	Non-metallic Mineral Products	42.7	67.8	78.6	81.2	90.2	100.0	96.7
27	Basic Metals	86.0	101.6	107.9	109.4	100.0	100.0	105.0
28	Fabricated Metal Products except Machinery & Apparatus	59.4	76.3	79.3	88.4	102.5	100.0	97.0
29	Machinery & Equipment	43.1	73.9	69.9	84.7	95.1	100.0	106.6
30	Electrical Machinery & Apparatus	61.3	84.4	87.4	96.7	101.4	100.0	101.4
31	Electronic Products & Components	30.4	52.6	64.7	78.7	93.7	100.0	103.4
32	Medical, Precision & Optical Instruments, Watches & Clocks	31.7	63.4	71.4	73.1	98.8	100.0	110.9
33	Transport Equipment	57.5	98.0	97.2	104.1	105.7	100.0	107.5
34	Other Manufacturing Industries	175.3	133.1	126.0	133.4	104.4	100.0	96.1
	Total Manufacturing¹	45.6	70.5	77.7	87.8	96.8	100.0	104.6

Source : Economic Development Board (with effect from April 1987)

Note : The industries are classified according to Singapore Standard Industrial Classification (SSIC) 1996.

The current index series have been rebased with base year 1996=100. The rebased indices reflect the relative importance of the industry divisions and changing structure within the total manufacturing sector.

1 Exclude rubber processing.

8.10

INDICES OF UNIT BUSINESS COST AND UNIT LABOUR COST (1988=100)

	Weights ¹	1987	1992	1993	1994	1995	1996	1997
Unit Business Cost of Manufacturing								
Total	100.0	96.9	122.2	121.0	120.2	122.6	125.0	125.5
Unit Labour Cost	49.4	96.2	134.2	130.0	126.1	124.0	126.7	126.7
Services Cost	48.3	97.6	108.2	110.1	112.2	118.1	119.8	121.0
Government Rates & Fees	2.3	96.7	159.5	158.3	161.5	186.7	196.2	192.7
Unit Labour Cost of Overall Economy		97.0	127.8	129.3	133.5	136.4	141.8	143.4

1 The unit business cost indices prior to 1988 are based on the 1983 input structure and those from 1988 onwards are based on the 1988 input structure.

8.11

PRINCIPAL STATISTICS OF PIONEER MANUFACTURING ESTABLISHMENTS (End of Period)

	Unit	1986	1991	1992	1993	1994	1995	1996
Establishments	No	427	432	420	421	410	405	397
Workers	No	111,951	170,584	166,724	162,341	166,042	171,206	170,780
Materials	\$m	13,791	29,295	30,010	36,315	43,140	50,880	54,748
Output	\$m	22,351	46,077	47,330	56,334	65,415	76,345	82,418
Value Added	\$m	6,082	11,702	11,328	13,760	14,871	17,581	19,156
Remuneration	\$m	1,835	3,733	3,989	4,271	4,612	5,013	5,352
Paid - up Capital	\$m	4,242	6,756	7,089	8,155	9,752	9,463	10,097
Gross Fixed Assets	\$m	12,980	22,395	24,661	27,389	29,758	32,596	36,115
Direct Exports	\$m	17,275	33,863	33,531	39,461	45,871	53,087	56,293
Value Added Per Worker	\$ '000	54	69	68	85	90	103	112

Source : Economic Development Board (with effect from April 1987)

8.12 PRINCIPAL STATISTICS OF PIONEER MANUFACTURING ESTABLISHMENTS BY INDUSTRY, DECEMBER 1996

Industry	Establish- ments	Workers	Materials	Output	Value Added
	Number		Million Dollars		
Total	397	170,780	54,748	82,418	19,156
Food & Beverages	7	955	234	384	86
Textiles & Wearing Apparel	8	1,116	24	65	31
Paper Products & Printing	7	1,132	150	381	176
Petroleum, Chemicals & Chemical Products	51	8,778	10,581	15,489	3,703
Rubber & Plastic Products	18	2,811	138	323	114
Non-metallic Mineral Products	10	2,257	252	584	217
Basic Metals	8	1,517	305	489	98
Fabricated Metal Products	38	6,646	764	1,397	441
Machinery & Equipment	74	12,952	1,123	2,369	753
Electrical Machinery & Apparatus	25	8,597	807	1,544	486
Electronic Products & Components	94	108,465	39,308	56,549	12,008
Instrumentation Equipment	23	7,142	595	1,301	510
Transport Equipment	24	7,547	413	1,445	511
Miscellaneous	10	865	52	98	21

Industry	Remun- eration	Paid-up Capital	Gross Fixed Assets	Direct Exports	Value Added Per Worker
	Million Dollars				\$ ' 000
Total	5,352	10,097	36,115	56,293	112
Food & Beverages	38	94	288	234	90
Textiles & Wearing Apparel	20	79	86	45	27
Paper Products & Printing	44	27	328	327	156
Petroleum, Chemicals & Chemical Products	565	2,918	12,923	5,544	422
Rubber & Plastic Products	77	78	408	152	41
Non-metallic Mineral Products	67	205	728	241	96
Basic Metals	66	305	442	116	65
Fabricated Metal Products	208	314	809	530	66
Machinery & Equipment	453	492	2,251	1,359	58
Electrical Machinery & Apparatus	258	226	1,177	1,037	57
Electronic Products & Components	3,019	4,707	14,471	44,376	111
Instrumentation Equipment	221	117	763	1,149	71
Transport Equipment	298	484	1,281	1,120	68
Miscellaneous	19	51	161	64	25

Source : Economic Development Board

8.13 NET INVESTMENT COMMITMENTS IN MANUFACTURING BY INDUSTRY

Million Dollars

Industry	1987	1992	1993	1994	1995	1996	1997
Total	1,743.0	3,481.0	3,922.6	5,764.6	6,809.1	8,085.1	8,488.4
Food & Beverages	156.6	76.5	92.9	36.3	103.7	224.6	167.4
Textiles	3.0	5.2	-	-	3.3	2.2	-
Wearing Apparel	6.8	10.0	2.4	-	-	10.1	0.4
Leather & Rubber	8.5	2.8	1.7	2.6	26.5	-	8.4
Wood Products	14.7	4.6	24.7	-	4.0	16.1	-
Paper Products & Printing	25.1	89.5	92.2	268.4	140.6	297.1	166.2
Industrial Chemicals	32.9	294.3	783.5	1,192.8	1,325.2	2,394.4	1,979.0
Other Chemical Products	11.0	248.4	340.4	113.9	247.4	337.2	235.6
Petroleum	122.4	454.2	84.6	1,180.3	1,186.4	108.3	581.3
Plastic Products	115.9	110.8	48.3	26.9	28.7	102.9	100.6
Non-metallic Mineral Products	6.2	63.1	126.1	206.8	43.1	84.5	85.7
Basic Metals	5.2	34.3	69.4	6.6	63.8	9.5	112.0
Fabricated Metal Products	104.3	152.5	147.9	324.5	318.9	299.1	355.4
Machinery except Electrical	93.5	343.7	330.8	276.5	346.4	357.3	336.2
Electrical Machinery & Appliances	128.1	17.9	93.6	28.8	50.3	4.6	124.4
Electronic Products & Components	710.3	1,257.3	1,227.4	1,513.4	2,536.6	3,489.2	3,805.8
Transport Equipment	61.7	167.1	341.2	555.4	300.0	249.4	359.9
Precision Equipment	116.6	138.3	113.7	19.6	67.0	82.6	70.1
Other Products	11.8	10.5	1.8	11.9	17.1	16.0	-
Servicing / Engineering	8.4	-	-	-	-	-	-

Source : Economic Development Board

Note : Net investment commitments refer to gross commitments less projects withdrawn or uncertain as at 31 December 1997.

8.14 NET INVESTMENT COMMITMENTS IN MANUFACTURING BY COUNTRY OF ORIGIN

Million Dollars

Country	1987	1992	1993	1994	1995	1996	1997
Total	1,743.0	3,481.0	3,922.6	5,764.6	6,809.1	8,085.1	8,488.4
Local	295.0	748.0	745.5	1,437.2	1,956.7	2,368.9	2,580.3
Foreign	1,448.0	2,733.0	3,177.1	4,327.4	4,852.4	5,716.2	5,908.1
United States	543.5	1,201.4	1,452.2	2,451.7	2,075.8	2,262.0	2,365.9
Japan	601.1	858.0	779.4	913.8	1,152.5	1,960.4	2,033.0
Europe	285.8	618.7	881.9	907.0	1,526.3	1,389.1	1,423.7
European Union (EU)	241.0	555.7	806.2	893.0	1,510.8	1,320.5	1,398.4
United Kingdom	42.4	305.5	357.8	525.1	771.6	397.6	445.1
Netherlands	70.9	43.1	7.7	175.6	391.4	517.8	384.7
Germany	90.3	106.4	204.6	91.8	183.9	246.4	121.3
France	15.2	34.1	124.9	54.0	140.5	59.1	271.5
Italy	22.0	26.7	43.3	38.9	12.8	53.9	175.0
Other EU Countries	0.2	20.6	62.9	7.6	10.6	45.7	0.8
Switzerland	27.8	63.1	66.3	11.4	13.2	60.1	25.2
Other European Countries	17.0	-	9.5	2.7	2.2	8.5	-
Others	17.6	55.0	63.5	54.9	97.8	104.8	85.5

Source : Economic Development Board

1997	1996	1995	1994	1993	1992	1991
------	------	------	------	------	------	------

Electricity

Electricity was first made available to the Republic in 1906. Today, electricity is generated by PowerGen and PowerCorp, which operate 4 power stations. The total installed generating capacity is 2,541 megawatts (MW).

A network of 230 kilowatt (kW), 66kV, 22kV, 6.6kV and 0.4kV cables, operated by PowerGen's transmission and distribution system, supplies electricity to the power stations to the customers. The network now consists of about 21,487 kilometres of cable circuit, 7,820 substations, in order to meet future demand for electricity. PowerGen is putting in place a new 400kV transmission system to enhance the handling capacity of the grid system while at the same time providing economic transmission of electricity supply.

WATER

Gas

PowerGen's Senoko Gasworks, located in Kallang, started operations in October 1996. Senoko Gasworks has a total installed gas production capacity of 1.5 million cubic metres per day. It has 2 cyclic and 3 continuous gasmaking plants, 2 high pressure spherical gasholders and 2 water cooled gasholders. 3 asphalt tankers, a nitrogen splitter plant and a jetty for the delivery of asphalt. With an increased production capacity of 13%, Senoko Gasworks will produce enough gas to meet the needs of Singapore into the 21st century.

The Public Utilities Board (PUB) is the Water Authority and Regulator of the electricity and piped gas industries in Singapore.

As the Regulator, PUB ensures that customers in Singapore continue to enjoy safe and adequate supply of electricity and piped gas at fair prices. The six companies which have been issued with licences to engage in the production, transmission and supply of electricity and piped gas are PowerGen Ltd, PowerCorp Ltd, PowerSupply Ltd and PowerGas Ltd. At the end of 1997, there were 1,378 electrical workers and 418 cable detection workers on PUB's register.

Water

Singapore, with 4.8 million and a total population of some 3.7 million, uses an average of 1.2 million cubic metres of water per day in 1997. PUB is the authority responsible for providing an adequate and reliable supply of potable water at the most economic cost to sustain Singapore's

economic growth. Fresh, potable, water, drinkable straight from the tap, is supplied to all parts of Singapore, including the main islands and islands. The water is moderately soft and treated to a quality well within the World Health Organisation's Guidelines for Drinking Water Quality and is fluoridated. Singapore's water supply comes from local sources and sources in Johor. PUB's total water supply system comprises 19 raw water reservoirs, nine treatment works, 14 storage or service reservoirs and 4,700 kilometres of pipelines.

9 UTILITIES

The Public Utilities Board (PUB) is the Water Authority and Regulator of the electricity and piped gas industries in Singapore.

As the Regulator, PUB ensures that customers in Singapore continue to enjoy safe and adequate supply of electricity and piped gas at fair prices. The six companies which have been issued with licences to engage in the production, transmission and supply of electricity and piped gas are PowerSenoko Ltd, PowerSeraya Ltd, Tuas Power Pte Ltd, PowerGrid Ltd, Power Supply Ltd and PowerGas Ltd. At the end of 1997, there were 6,498 electrical workers, 1,575 electrical contractors, 418 gas service workers and 648 cable detection workers on PUB's register.

Water

Singapore, with 648 sq km and a total population of some 3.7 million, uses an average of 1.21 million cubic metres of water per day in 1997. PUB is the authority responsible for providing an adequate and reliable supply of potable water at the most economic cost to sustain Singapore's economic growth.

Fresh potable water, drinkable straight from the tap, is supplied to all parts of Singapore including the main offshore islands. The water is moderately soft and treated to a quality well within the World Health Organisation's Guidelines for Drinking Water Quality and is flouridated.

Singapore's water supply comes from local sources and sources in Johor, Malaysia. PUB's total water supply system comprises 19 raw water reservoirs, nine treatment works, 14 storage or service reservoirs and 4,760 kilometres of pipelines.

Electricity

Electricity was first made available to the Republic in 1906. Today, electricity is generated by PowerSenoko and PowerSeraya which operate 4 power stations. The total installed generating capacity is 5,641 megawatts (MW).

A network of 230 kilovolt (kV), 66kV, 22kV, 6.6kV and 0.4kV cables interlinked by transformers at substations forms PowerGrid's transmission and distribution system whereby electricity is supplied from the power stations to the customers. The network now consists of about 21,487 kilometres of cable circuits, 34,647 megavolt-amperes of transformer capacity and 7,820 substations. In order to meet future demand for electricity, PowerGrid is putting in place a new extra high voltage of 400kV transmission system to enhance the fault handling capability of the grid system while at the same time providing economic transmission of electricity supply.

Gas

Built at a cost of \$240 million, PowerGas's Senoko Gasworks replaced Kallang Gasworks and started operations in October 1996.

Senoko Gasworks has a total installed gas production capacity of 1.6 million cubic metres per day. It has 5 cyclic and 3 continuous gasmaking plants, 2 high pressure spherical gasholders and 2 water sealed gasholders, 3 naphtha tanks, a naphtha splitter plant and a jetty for the delivery of naphtha. With an increased production capacity of 45%, Senoko Gasworks will produce enough gas to meet the needs of Singapore into the 21st century.

9.1 ELECTRICITY GENERATION AND SALES AND GAS SALES

	1987	1992	1993	1994	1995	1996	1997
Electricity							
Generation (mkh)	11,813.8	17,543.1	18,962.4	20,675.4	22,057.4	23,458.4	26,188.1
Sales (mkh)	10,616.5	15,948.0	17,194.1	18,901.5	20,239.6	21,906.1	24,627.8
Domestic	1,728.6	2,888.4	3,124.3	3,466.0	3,833.3	4,162.9	4,736.9
Manufacturing	4,843.6	7,305.0	7,793.0	8,528.2	8,978.4	9,659.1	10,946.5
Other Industries	4,044.3	5,754.6	6,276.8	6,907.3	7,427.9	8,084.0	8,944.5
Gas Sales							
Piped (million units) ¹	577.7	919.3	998.3	1,045.7	1,083.9	1,151.3	1,218.2
LP (Nett Tonnes)	na	na	na	144,395.3	142,697.5	127,064.1	125,330.9

Source : Department of Statistics

PowerGrid Ltd

PowerGas Ltd

mkh = million kilowatt hours

¹ One unit is equivalent to one kilowatt hour

9.2 WATER TREATMENT AND SALES

	Thousand Cubic Metres						
	1987	1992	1993	1994	1995	1996	1997
Treatment	378,060.1	451,126.1	465,428.8	487,385.4	501,932.1	513,020.4	521,709.5
Sales	334,679.7	419,565.6	433,940.5	455,866.2	468,972.0	481,327.0	494,661.5
Domestic	151,772.8	197,368.7	205,251.1	215,840.5	217,889.1	224,979.9	231,758.8
Shipping	1,856.7	3,010.4	2,982.0	3,471.1	3,014.8	2,871.6	2,771.3
Commerce & Industry	95,084.0	125,197.1	134,375.3	145,983.9	152,625.5	163,592.4	176,851.8
Government & Statutory Boards	33,285.4	27,718.9	28,130.5	29,617.6	29,941.3	29,958.4	29,676.4
Johore	52,680.8	66,270.5	63,201.6	60,953.1	65,501.3	59,924.8	53,603.0

Source : Public Utilities Board

Construction and Real Estate

Building construction refers to erection of new building and addition/alteration to existing building, but excludes erection of temporary structures, illegal building works or minor works which do not require planning approval. Data on new buildings given written permission and building plan approval and submitted notice of commencement and issued TOPs are compiled from the administrative records of the Development Control Division, Urban Redevelopment Authority (URA) and Building Control Division of the Public Works Department (PWD). Data on notices of tender invitation and completion of public buildings are collected through surveys conducted by the Research Section, URA. Statistics on contracts awarded and progress payments certified are collected through surveys conducted by the Construction Economics Research Unit, Construction Industry Development Board (CIDB).

Definitions

Written Permission : Refers to the approval granted by the Minister or the Competent Authority to develop any land subject to conditions in accordance with the development rules in force.

Building Plan Approval (Private Sector Only) : Refers to the permission granted by the Director, Building Control Division, PWD to building plans and specifications submitted in accordance with prescribed building regulations in force.

Building Commencement : Refers to the approval given by the Building Control Division (BCD), PWD to the "Notice of Intention to Commence" submitted by architects or engineers to the Division, in accordance with the building regulations. In the case of the public sector projects, it refers to the first tender or quotation invited for public

sector projects. In cases where contractors are selected by the pre-qualification or closed tender, the date of contract awarded will be taken as the date of notice of commencement.

Building Completion : Refers to the issue of temporary occupation permits/certificate of statutory completion by the Building Control Division, PWD. In the case of public sector projects, it refers to the issue of certificate of completion by the architect or engineer in charge of the project.

Gross Floor Area : Refers to the total area of floor space within a building measured between the centre line of party walls, including the thickness of external walls but excluding internal voids except ducts and refuse chute.

Contracts Awarded : Refers to the full contract given to the main contractor by the architect, engineer or developer/owner even though part or all the works may be further sub-contracted to another contractor.

Progress Payment Certified : Refers to the value of all construction works done and certified for progress payment. Where construction works are carried out by the developer/owner himself and the architect does not certify progress payments, the expenses incurred on the construction work are taken to be the progress payments certified.

Other References

More details of construction and real estate statistics may be obtained from the "URA Real Estate Statistics Series, Potential Supply", "URA Real Estate Statistics Series, Prices & Rental Indices", and "URA Real Estate Statistics Series, Stock and Occupancy" published by the Research Section, URA. Details on contracts awarded and progress payments certified may be obtained from the "Construction Focus" and "Construction Economics Report" published by the CIDB.

Housing

The Housing and Development Board (HDB) was established on 1 February 1960 as the public housing authority of Singapore. HDB's mission is to provide affordable public housing of a high quality. HDB also develops and maintains other facilities, namely commercial and industrial properties, markets and hawker centres and car parks. To help build communities, HDB also provides recreational and communal facilities such as neighbourhood parks and children's playground in its housing estates.

The public housing building programme is carried out through five-year plans. HDB is currently into its eighth five-year building programme (1996-2000), under which about 140,000 flats are targeted to be built. In 1997, 31,312 flats were completed, bringing the total number of flats built since HDB's inception in 1960 to 756,312.

The Home Ownership for the People Scheme introduced in 1964 enables citizens to buy HDB flats. HDB sold 28,220 HDB flats in 1997. To-date 86 per cent of Singaporeans live in HDB flats and 81 per cent of the population own their flats. HDB offers a number of measures to help low-income families own HDB flats. These are the sale of flats to sitting tenants, sale of 4-room budget flats, buying of 3-room flats for sale at subsidised prices and priority allocation of 4-room or smaller flats to tenants of rental flats.

HDB regularly reviews and revises its rules and regulations pertaining to homeownership flats to meet customer needs. In 1997, the revised mortgage financing policy and the revised policies for purchase of new

flats were announced. HDB also announced that it will build and sell studio apartments to elderly Singaporeans.

To bridge the gap between the standards of the older estates and those of the newer towns, the Estate Renewal Strategy was introduced in September 1995. HDB's programmes such as the Main Upgrading Programme (MUP), the Interim Upgrading Programme (IUP), the Selective En Bloc Redevelopment Scheme, Sale of Sites and Project to improve the Living Conditions of the Elderly are all part of the Estate Renewal Strategy.

At the end of 1997, the number of precincts selected under the MUP was 70, involving about 73,000 units of HDB flats. Under the MUP, improvements are made to the flat, the apartment block and the precincts. At the end of 1997, the upgrading works at 16 precincts had been completed. Under the IUP carried out by the Town Councils to improve the precincts, four batches comprising 103 precincts had so far been selected. The IUP works in all the 26 precincts in the first batch and 13 precincts in the second batch had been completed as at end 1997.

The Selective En-Bloc Redevelopment Scheme was launched in August 1995. Under the scheme, selected old flats that are economically not viable for upgrading are redeveloped into more intensive and better quality housing. As at December 1997, 20 precincts have been announced for redevelopment.

Since 1993, HDB had selected five batches of 24 blocks of 1-room flats comprising 7,300 units for improvement works under the project to improve the living conditions of the elderly.

10.1

WRITTEN PERMISSION BY TYPE OF DEVELOPMENT IN THE PUBLIC SECTOR

Type of Development	1987	1992	1993	1994	1995	1996	1997
Number							
Total	81	94	102	118	144	135	138
Residential	25	39	37	39	57	45	49
Commercial	3	9	6	5	10	9	10
Industrial	3	12	9	11	14	10	10
Others	50	34	50	63	63	71	69
Gross Floor Area (Thousand Square Metres)							
Total	5,301	5,803	4,190	5,245	7,802	6,666	7,681
Residential	4,876	4,744	3,526	4,562	6,746	5,185	6,118
Commercial	77	119	78	17	26	70	183
Industrial	33	436	144	153	495	490	408
Others	315	504	442	513	535	921	972

Source : Urban Redevelopment Authority (with effect from September 1989)

Note : Figures refer to erections of new buildings only.

10.2

WRITTEN PERMISSION BY TYPE OF DEVELOPMENT IN THE PRIVATE SECTOR

Type of Development	1987	1992	1993	1994	1995	1996	1997
Number							
Total	637	830	842	991	1,460	1,464	1,187
Residential	463	636	645	760	1,178	1,109	888
Commercial	27	53	52	73	82	106	92
Industrial	104	121	97	126	153	209	161
Others	43	20	48	32	47	40	46
Gross Floor Area (Thousand Square Metres)							
Total	2,068	3,757	3,972	4,318	4,949	6,455	6,733
Residential	963	2,358	1,875	2,359	2,699	2,980	3,093
Commercial	112	346	697	721	494	776	653
Industrial	758	1,018	936	1,145	1,484	2,537	2,640
Others	235	35	464	93	272	162	347

Source : Urban Redevelopment Authority (with effect from September 1989)

Note : Figures refer to erections of new buildings only.

10.3

COMMENCEMENT OF BUILDING CONSTRUCTION BY TYPE OF DEVELOPMENT IN THE PUBLIC SECTOR

Type of Development	1987	1992	1993	1994	1995	1996	1997
Number							
Total	112	136	119	130	117	111	131
Residential	50	75	62	58	57	48	56
Commercial	2	15	8	6	6	7	11
Industrial	4	7	15	20	8	10	7
Others	56	39	34	46	46	46	57
Gross Floor Area (Thousand Square Metres)							
Total	2,544	5,727	5,047	4,850	6,932	5,081	5,939
Residential	2,088	4,702	4,492	4,210	5,552	3,808	4,484
Commercial	2	125	66	28	48	36	268
Industrial	35	114	181	294	580	379	558
Others	418	786	308	318	752	859	630

Source : Urban Redevelopment Authority (with effect from September 1989)

Note : Figures refer to erections of new buildings only.

10.4

COMMENCEMENT OF BUILDING CONSTRUCTION BY TYPE OF DEVELOPMENT IN THE PRIVATE SECTOR

Type of Development	1987	1992	1993	1994	1995	1996	1997
Number							
Total	475	687	859	1,044	1,254	1,282	1,137
Residential	321	502	653	767	921	966	806
Commercial	27	59	48	90	98	118	106
Industrial	93	108	118	143	199	165	192
Others	34	18	40	44	36	33	33
Gross Floor Area (Thousand Square Metres)							
Total	1,655	3,100	3,993	4,648	4,958	5,531	6,024
Residential	747	1,782	2,184	2,550	2,384	2,585	2,953
Commercial	113	424	279	607	494	702	421
Industrial	555	786	1,421	1,305	1,980	2,105	2,530
Others	241	108	109	186	100	139	120

Source : Urban Redevelopment Authority (with effect from September 1989)

Note : Figures refer to erections of new buildings only.

10.5

PUBLIC SECTOR CONSTRUCTION PROJECTS COMPLETED BY TYPE OF DEVELOPMENT

Type of Development	1987	1992	1993	1994	1995	1996	1997
Number							
Total	165	98	99	94	142	107	97
Residential	86	51	39	48	63	55	42
Commercial	8	5	5	8	11	6	6
Industrial	-	9	9	12	23	8	10
Others	71	33	46	26	45	38	39
Gross Floor Area (Thousand Square Metres)							
Total	5,492	3,979	3,397	3,429	4,698	4,541	5,633
Residential	4,480	3,340	2,541	2,655	3,867	3,762	4,524
Commercial	212	50	17	97	84	23	25
Industrial	-	171	259	331	260	301	392
Others	799	418	580	346	486	455	693

Source : Urban Redevelopment Authority (with effect from September 1989)

Note : Figures refer to erections of new buildings only.

10.6

PRIVATE SECTOR CONSTRUCTION PROJECTS COMPLETED BY TYPE OF DEVELOPMENT

Type of Development	1987	1992	1993	1994	1995	1996	1997
Number							
Total	401	593	630	747	841	1,057	1,319
Residential	241	391	445	561	611	760	996
Commercial	31	43	50	43	51	80	100
Industrial	87	133	109	112	135	178	181
Others	42	26	26	31	44	39	42
Gross Floor Area (Thousand Square Metres)							
Total	1,565	2,602	3,109	2,784	3,495	4,250	5,439
Residential	581	876	1,409	1,344	1,226	1,542	2,685
Commercial	603	619	878	479	794	592	658
Industrial	318	905	691	786	1,314	1,737	1,954
Others	63	202	131	175	161	380	142

Source : Urban Redevelopment Authority (with effect from September 1989)

Note : Figures refer to erections of new buildings only.

10.7 BUILDING PLAN APPROVALS BY TYPE OF DEVELOPMENT IN THE PRIVATE SECTOR

Type of Development	1987	1992	1993	1994	1995	1996	1997
Number							
Total	396	623	716	970	1,240	1,388	1,432
Residential	264	448	533	755	972	1,031	1,077
Commercial	22	56	52	60	93	110	122
Industrial	75	110	99	114	136	213	189
Others	35	9	32	41	39	34	44
Gross Floor Area (Thousand Square Metres)							
Total	1,069	2,889	3,157	4,101	4,106	5,979	6,602
Residential	502	1,365	1,762	2,392	2,255	2,615	3,110
Commercial	113	674	491	367	559	738	604
Industrial	334	769	808	1,196	1,167	2,421	2,551
Others	120	81	96	146	125	206	337

Source : Urban Redevelopment Authority (with effect from September 1989)

Note : Figures refer to erections of new buildings only.

10.8

RESIDENTIAL UNITS IN THE PUBLIC SECTOR BY TYPE OF BUILDING AND STAGE OF DEVELOPMENT

Type of Building		1987	1992	1993	1994	1995	1996	1997
Planning Approval Stage								
Total		30,283	24,776	19,207	30,002	44,728	34,342	42,963
Terrace		-	-	-	-	-	3	-
Flats		29,982	24,776	19,207	30,002	44,728	33,145	40,477
Condominium		-	-	-	-	-	1,194	2,486
Others		301	-	-	-	-	-	-
Building Commencement Stage								
Total		13,083	24,951	25,626	27,603	31,745	24,862	30,548
Flats		13,083	24,951	25,626	27,603	31,745	23,668	26,821
Condominium		-	-	-	-	-	1,194	3,727
Building Completion Stage								
Total		32,859	18,165	12,978	17,932	24,564	24,550	24,844
Terrace		-	4	-	-	-	-	-
Flats		32,859	18,161	12,978	17,932	24,564	24,550	24,844

Source : Urban Redevelopment Authority (with effect from September 1989)

Note : Figures refer to erections of residential units only.

They do not include additions or alterations.

10.9

RESIDENTIAL UNITS IN THE PRIVATE SECTOR BY TYPE OF BUILDING AND STAGE OF DEVELOPMENT

Type of Building	Number						
	1987	1992	1993	1994	1995	1996	1997
Planning Approval Stage							
Total	3,984	10,512	10,073	13,983	15,363	17,292	17,705
Detached	202	244	279	384	665	502	396
Semi-detached	457	594	505	938	1,191	1,304	648
Terrace	1,562	834	533	1,724	1,728	1,781	2,874
Flats	1,752	2,330	2,797	2,579	4,833	3,987	3,651
Condominium	6,510	5,959	8,358	6,946	9,718	10,136	
Others	11	-	-	-	-	-	-
Building Plan Approval Stage							
Total	2,051	6,714	9,266	13,316	12,823	15,188	17,871
Detached	126	167	211	351	566	493	475
Semi-detached	336	397	433	683	1,098	913	1,030
Terrace	655	869	328	1,485	1,354	1,218	2,413
Flats	934	1,231	2,459	1,646	3,971	4,500	3,801
Condominium	4,050	5,835	9,151	5,834	8,064	10,152	
Others	-	-	-	-	-	-	-
Building Commencement Stage							
Total	3,246	8,411	10,640	14,287	13,890	15,461	17,633
Detached	108	200	290	426	509	424	315
Semi-detached	461	375	532	1,066	872	980	812
Terrace	1,225	573	1,018	1,624	1,602	1,504	2,130
Flats	1,451	1,260	2,011	2,574	5,037	3,275	2,341
Condominium	6,003	6,789	8,597	5,870	9,278	12,035	
Others	1	-	-	-	-	-	-
Building Completion Stage							
Total	2,295	3,595	5,920	7,027	6,725	8,111	14,579
Detached	157	121	157	216	257	351	469
Semi-detached	275	282	528	394	605	705	1,167
Terrace	457	869	1,278	699	683	1,305	1,278
Flats	1,393	793	1,479	1,017	1,261	2,182	2,614
Condominium	1,530	2,478	4,701	3,919	3,568	9,051	
Others	13	-	-	-	-	-	-

Source : Urban Redevelopment Authority (with effect from September 1989)

Note Figures refer to erections of residential units only.

They do not include additions or alterations.

Million Dollars

Type of Work	1987	1992	1993	1994	1995	1996	1997
All Sectors							
Total	4,041	12,832	10,587	12,227	16,019	19,807	20,237
Building Work	2,903	11,038	8,689	11,235	13,239	15,744	15,797
Residential	1,639	5,172	4,639	6,125	7,721	7,525	9,309
Commercial	145	3,476	1,264	1,637	1,378	2,182	2,088
Industrial	541	1,542	1,434	1,945	2,008	3,435	2,104
Others	578	848	1,352	1,528	2,132	2,602	2,296
Civil Engineering Work	1,137	1,795	1,898	992	2,780	4,063	4,440
Private Sector							
Total	1,265	6,771	4,376	6,649	7,164	9,263	9,116
Building Work	1,255	6,692	4,312	6,510	7,078	8,979	9,019
Residential	573	1,968	1,812	3,127	3,718	3,668	5,258
Commercial	89	3,237	999	1,468	1,268	1,930	1,311
Industrial	504	1,346	1,205	1,604	1,546	2,846	1,870
Others	89	141	296	311	546	535	580
Civil Engineering Work	9	79	64	139	86	284	97
Public Sector							
Total	2,776	6,061	6,211	5,578	8,855	10,544	11,121
Building Work	1,648	4,346	4,377	4,725	6,161	6,765	6,778
Residential	1,066	3,204	2,827	2,998	4,003	3,857	4,051
Commercial	56	239	265	169	110	252	777
Industrial	37	196	229	341	462	589	234
Others	489	707	1,056	1,217	1,586	2,067	1,716
Civil Engineering Work	1,128	1,716	1,834	853	2,694	3,779	4,343

Source : Construction Industry Development Board (with effect from October 1993)

Million Dollars

Type of Work	1987	1992	1993	1994	1995	1996	1997
All Sectors							
Total	4,678	8,872	9,555	11,343	12,131	15,313	18,172
Building Work	2,659	7,346	8,230	9,470	10,320	13,097	15,207
Residential	1,476	3,107	4,147	4,531	4,955	6,935	8,450
Commercial	337	2,011	1,814	1,978	1,936	1,720	1,738
Industrial	300	1,349	1,202	1,317	2,056	2,837	2,677
Others	546	879	1,067	1,644	1,373	1,605	2,342
Civil Engineering Work	2,019	1,526	1,325	1,873	1,811	2,216	2,965
Private Sector							
Total	926	4,603	4,525	5,463	6,315	8,190	8,981
Building Work	910	4,506	4,443	5,314	6,153	7,806	8,553
Residential	362	1,244	1,475	1,852	2,468	3,548	4,226
Commercial	203	1,909	1,673	1,839	1,725	1,531	1,458
Industrial	280	1,137	1,019	1,118	1,733	2,257	2,337
Others	65	215	276	505	227	470	532
Civil Engineering Work	16	97	82	149	162	384	428
Public Sector							
Total	3,752	4,269	5,030	5,880	5,816	7,123	9,191
Building Work	1,749	2,840	3,787	4,156	4,167	5,291	6,654
Residential	1,114	1,863	2,672	2,679	2,487	3,387	4,224
Commercial	134	102	141	139	211	189	280
Industrial	20	212	183	199	323	580	340
Others	481	664	791	1,139	1,146	1,135	1,810
Civil Engineering Work	2,003	1,429	1,243	1,724	1,649	1,832	2,537

Source : Construction Industry Development Board (with effect from October 1993)

10.12 PROPERTIES UNDER THE MANAGEMENT OF HOUSING AND DEVELOPMENT BOARD (End of Period)

	1987	1992	1993	1994	1995	1996	1997
Residential	612,826	641,016	655,487	676,558	700,060	725,144	755,313
1-room	58,237	27,470	27,446	26,769	25,930	25,540	25,182
2-room	47,713	36,671	36,682	36,127	35,165	34,939	34,610
3-room	256,648	247,030	244,824	242,128	241,085	240,164	239,562
4-room	171,557	211,455	215,467	224,417	236,798	252,809	267,517
5-room	58,776	83,213	90,431	100,899	111,664	121,486	134,051
Executive ¹	14,288	29,713	35,173	40,754	44,100	46,134	50,320
HUDC ²	5,607	5,464	5,464	5,464	5,318	4,072	4,071
Shops ³	26,136	30,691	30,697	30,914	30,527	30,037	19,583

Source : Housing & Development Board

1 From 1987, figures include multi-generation flats.

2 From 1989, figures include landed properties.

3 Include industrial units. From 1992 onwards, figures exclude industrial units.

10.13 RESIDENTIAL UNITS CONSTRUCTED AND SOLD BY HOUSING AND DEVELOPMENT BOARD

	1987	1992	1993	1994	1995	1996	1997
Flats Constructed ¹ (No)	29,008	18,482	17,888	25,987	26,185	27,484	31,312
Flats Sold Under ' Home Ownership Scheme ' ² (No)	25,635	19,188	19,030	23,770	27,776	26,532	28,220
Percentage of Population Living in Public Flats ³ (End of Period)	86	87	87	86	86	86	86

Source : Housing & Development Board

1 Figure for 1992 excludes 96 units due to reclassification.

2 Flats are considered 'sold' only when keys are issued to the applicants. From 1989, figures include HUDC units.

3 From 1990 onwards, data refer to resident population.

Town ¹							Number
	Total	1-room	2-room	3-room	4-room	5-room	Executive ²
Total	727,950	25,539	34,933	240,006	255,960	124,174	47,338
Ang Mo Kio	48,020	1,625	3,791	26,181	11,879	4,168	376
Bedok	56,677	2,250	2,056	22,976	17,741	8,977	2,677
Bishan	19,038	396	-	2,397	9,199	5,386	1,660
Bukit Batok	30,127	92	164	11,252	12,206	3,779	2,634
Bukit Merah	46,762	6,546	6,192	20,074	8,746	5,169	35
Bukit Panjang	17,743	-	-	2,622	9,357	4,136	1,628
Choa Chu Kang	27,397	-	240	1,318	13,960	8,131	3,748
Clementi	23,952	484	656	13,095	7,000	2,144	573
Geylang	30,659	1,044	4,541	12,802	8,392	3,053	827
Hougang	41,187	538	315	9,647	20,174	7,078	3,435
Jurong East	19,856	-	-	7,953	5,803	4,653	1,447
Jurong West	48,691	1,048	502	13,546	20,041	9,753	3,801
Kallang/Whampoa	33,249	5,119	3,617	14,372	6,432	3,262	447
Pasir Ris	27,418	-	21	168	10,716	9,053	7,460
Queenstown	28,962	624	3,905	18,055	3,771	2,250	357
Sembawang	658	-	-	437	220	1	-
Sengkang	625	160	-	247	215	3	-
Serangoon	20,557	-	154	4,775	10,019	3,514	2,095
Tampines	61,297	154	126	12,304	27,057	15,823	5,833
Toa Payoh	34,796	1,754	4,094	17,814	6,520	3,768	846
Woodlands	40,182	868	320	5,561	18,240	10,842	4,351
Yishun	45,739	16	16	13,126	23,061	6,796	2,724
Other Estates:							
Central Area	13,964	2,821	2,873	5,706	2,464	96	4
Bukit Timah	2,427	-	-	449	920	678	380
Lim Chu Kang	93	-	-	64	29	-	-
Marine Parade	7,874	-	1,350	3,065	1,798	1,661	-

Source : Housing & Development Board

Note: Data exclude HUDC and landed properties.

¹ Equivalent to Town Registration Boundary.² Include multi-generation flats and penthouses.

Type of Property	1987	1992	1993	1994	1995	1996	1997
Private Residential Units ¹ (No)	49,538	66,330	71,299	78,012	129,106	149,114	161,273
Landed	13,890	21,680	23,371	24,583	59,796	61,594	63,231
Non-Landed	35,648	44,650	47,928	53,429	69,310	87,520	98,042
Office Space ^{2,3} ('000 sq m)	3,228	3,850	4,384	4,579	4,857	5,107	5,481
Private Sector	2,089	2,781	3,316	3,494	3,798	4,016	4,446
Public Sector	1,139	1,069	1,068	1,085	1,059	1,091	1,035
Shop Space ^{2,3} ('000 sq m)	1,503	1,677	2,844	2,887	2,944	3,013	3,030
Private Sector	848	963	1,743	1,750	1,789	1,836	1,862
Public Sector	656	714	1,101	1,137	1,155	1,177	1,168
Factory Space ³ ('000 sq m)	11,900	14,714	15,929	16,647	18,002	19,482	21,113
Private Sector	7,617	10,014	11,061	11,642	12,819	14,059	15,597
Public Sector	4,283	4,700	4,868	5,005	5,183	5,423	5,516
Warehouse Space ³ ('000 sq m)	2,228	2,992	3,128	3,404	3,641	4,090	4,528
Private Sector	1,657	2,402	2,538	2,693	2,984	3,434	4,318
Public Sector	570	590	590	711	657	656	210

Source : Urban Redevelopment Authority

1 From 1995, coverage has been expanded to include another 44,891 private housing units built before 1974.

Prior to this, only housing units completed after 1973 were surveyed.

From 1996, coverage has been expanded to include 12,489 units comprising HUDC units which have not been privatised, apartments above shops and privatised apartments previously under the Government Housing Schemes for employees.

2 From 1993, coverage of office space and shop space has been expanded to include 372,000 sq m nett and 980,000 sq m nett respectively for unrefurbished pre-war shophouses and units in HDB towns and housing estates.

3 Refer to nett floor area.

10.16

OCCUPANCY RATE OF PRIVATE PROPERTIES (End of Period)

Type of Property	1987	1992	1993	1994	1995	1996	1997	Per Cent
Private Residential Units ¹	89.2	92.6	92.9	93.0	94.3	93.8	91.0	
Landed	na	94.5	94.6	94.6	95.1	93.8	94.0	
Non-Landed	na	91.7	92.1	92.2	93.6	93.8	89.1	
Office Space ^{2,3}	81.8	88.7	90.1	92.4	91.0	91.5	88.8	
Private Sector	84.3	87.5	89.4	92.0	90.2	90.8	87.9	
Public Sector	77.2	91.7	92.6	93.5	93.8	94.0	92.7	
Shop Space ^{2,3}	85.7	94.0	92.7	92.7	93.0	92.4	92.9	
Private Sector	84.6	91.5	89.6	89.7	90.4	89.3	90.3	
Public Sector	87.0	97.5	97.5	97.3	97.1	97.3	97.2	
Factory Space ³	87.7	96.7	96.9	97.3	97.4	96.1	93.2	
Private Sector	92.1	96.4	97.0	96.8	97.2	96.5	93.1	
Public Sector	79.9	97.4	96.7	98.4	97.9	95.2	93.3	
Warehouse Space ³	87.4	94.6	94.5	94.6	95.5	93.0	91.1	
Private Sector	92.2	94.0	94.2	94.3	95.2	92.9	91.2	
Public Sector	73.4	97.1	95.4	95.6	97.1	93.4	89.0	

Source : Urban Redevelopment Authority

Note : See notes to Table 10.15.

10.17

POTENTIAL SUPPLY OF PRIVATE PROPERTIES (End of Period)

Type of Property	1992	1993	1994	1995	1996	1997
Private Residential Units (No)	52,340	69,020	79,137	88,080	103,034	86,670
Landed	12,632	15,005	17,562	18,348	17,460	10,556
Non-Landed	39,708	54,015	61,575	69,732	85,574	76,114
Office Space ¹ ('000 sq m)	2,638	2,199	2,554	2,708	2,823	2,656
Private Sector	1,955	1,617	1,890	2,009	1,922	1,807
Public Sector	683	582	664	699	901	849
Shop Space ¹ ('000 sq m)	1,369	1,454	1,243	1,013	1,087	745
Private Sector	1,217	1,261	1,071	888	914	658
Public Sector	152	193	172	125	173	87
Factory Space ¹ ('000 sq m)	3,858	4,653	4,989	7,101	8,375	10,159
Private Sector	2,746	3,908	4,159	5,980	7,227	8,460
Public Sector	1,112	745	830	1,121	1,148	1,699
Warehouse Space ¹ ('000 sq m)	905	874	1,258	1,546	1,457	1,202
Private Sector	672	776	1,001	1,332	1,229	1,057
Public Sector	233	98	257	214	228	145

Source : Urban Redevelopment Authority

Note : The potential supply of properties covers all developments under construction as well as those which have yet to commence construction.

1 Refer to gross floor area.

10.18

DEMAND, SUPPLY AND OCCUPANCY OF JURONG TOWN CORPORATION STANDARD/FLATTED FACTORIES AND INDUSTRIAL LANDS

Factory Space/Industrial Land	1987	1992	1993	1994	1995	1996	1997
Flatted Factory Space ('000 sq m)							
Gross Allocation	194	123	158	159	159	159	228
Termination	68	147	114	99	112	153	176
Net Allocation	127	-24	44	60	48	6	52
Demand	861	885	929	987	1,034	1,036	1,112
Supply	945	942	1,014	1,057	1,069	1,107	1,272
Occupancy Rate (%)	91	94	92	93	97	94	87
Standard Factory Space ('000 sq m)							
Gross Allocation	88	121	138	173	159	156	133
Termination	15	26	28	37	20	41	57
Net Allocation	73	95	110	137	140	115	76
Demand	1,203	1,663	1,772	1,913	2,058	2,185	2,265
Supply	1,440	1,739	1,846	1,925	2,128	2,332	2,384
Occupancy Rate (%)	84	96	96	99	97	94	95
Industrial Land ¹ (hectares)							
Gross Allocation	72	78	101	227	160	161	170
Land under preparation	-	10	8	-	-	-	-
Prepared Land	72	68	93	227	160	161	170
Termination	46	8	9	21	34	30	48
Net Allocation	26	69	93	206	126	131	122
Prepared Land							
Demand	2,752	3,246	3,329	3,536	3,647	3,797	3,929
Supply	3,618	3,760	3,781	4,017	4,022	4,059	4,243

Source : Jurong Town Corporation

¹ Exclude industrial land used for JTC Standard/Flatted Factory developments.

11 COMMERCE AND SERVICES

The first statistical inquiry on the Services Sector was conducted by the Singapore Department of Statistics for the reference year 1967 and that on the Commerce Sector for the reference year 1968. The next inquiries on these two sectors were for reference years 1972 and 1973 respectively. Since then, they were conducted biennially until 1985 and subsequently on an annual basis.

Scope and Coverage

The Survey of Services covers all establishments including statutory boards and non-profit organisations engaged in transport, storage and communications, financial, insurance, real estate and business services and community, social and personal services as classified under Sections I, J, K, L, M, N and O of the "Singapore Standard Industrial Classification (SSIC) 1996". Government ministries and departments, foreign missions, political parties, taxi and trishaw operators, independent artistes and domestic servants are outside the scope of the survey. From the reference year 1986, establishments engaged in financial activities such as banking, financial, stock-broking and insurance services are surveyed by the Monetary Authority of Singapore.

The Survey of Commerce covers all establishments (except hawkers and stall-holders) engaged in wholesale and retail trades, restaurants and hotels as classified under Sections G and H of the SSIC 1996.

Prior to 1976, both surveys were conducted on a census basis. From 1976 to 1982, sample surveys were carried out while for reference years 1983 and 1984, censuses of commerce and services were respectively undertaken. For reference years 1985 to 1992 and 1995 to 1996, annual sample surveys were conducted. Censuses of commerce and services were again conducted for reference years 1993 and 1994 respectively.

For sample surveys, stratified sampling by industry was adopted. Within each industry, establishments with large operating receipts were selected with certainty and the rest were sampled.

The statistical unit used in both surveys is the establishment. A separate return is normally required from each branch of a multi-activity firm, organisation or enterprise. However, a consolidated return is allowed if the accounts are so kept that it is not possible to obtain separate data for each individual branch.

Definitions

Establishment : Refers to a business or organisation unit engaged in one activity and generally operating in a single location.

Employment : Refers to the total number of persons engaged including part-time employees, working proprietors and partners, working directors and unpaid family workers as at 30 June of the reference year. It includes those temporarily away on leave.

Remuneration : Refers to the amount paid to employees in the form of wages and salaries, bonuses and allowances, CPF/ pension fund contributions and that given to unpaid family workers and directors as allowances, fees and benefits in kind.

Turnover/Operating Receipts : Refers to the total receipts and receivables from sales of goods and services including commissions and brokerage fees, insurance premiums and rental income. For financial institutions, operating receipts include interest, dividend income and gains from transactions in stocks and shares and foreign exchange.

11 COMMERCE AND SERVICES (cont'd)

Operating Expenditure : Refers to the aggregate of all current expenditure after adjustment for changes in stocks and work-in-progress. For insurance companies, claims, surrenders, cash bonus and annuities paid and increases in insurance funds or liability reserves are also included in operating expenditure.

Operating Surplus : Refers to the amount of operating receipts less operating expenditure plus depreciation of fixed assets. For local offices of foreign airlines and foreign shipping lines, representative offices of foreign banks and companies and non-profit organisations, operating surplus refers only to depreciation of fixed assets.

Value Added : Comprises the value of operating surplus, remuneration and indirect taxes. However, for financial and insurance services, value added is computed on a different basis. For the Monetary Authority of Singapore, Board of Commissioners of Currency and investment holding companies, value added is the sum of remuneration, depreciation allowances and indirect taxes. For other financial institutions, value added refers to the sum of operating surplus, remuneration and indirect taxes less dividends received, and net gains from stocks and share transactions, commodity and financial futures and gold trading. For insurance companies, value added refers to the sum of operating surplus, remuneration, imputed amount of commissions paid and indirect taxes less dividends received and net gains from foreign exchange, stocks and share transactions as well as gold trading.

Sales Indices of Retail and Catering Trade

The sales indices of retail and catering trade are compiled from the results of the Retail and Catering Trade Sales Survey initiated in 1985. The survey covers a sample of retail and catering establishments. Retail establishments

are defined as those selling merchandise directly to the consumers. Catering establishments are defined as those selling prepared food and drinks for in-premises consumption or on a take-away basis such as restaurants, fast food outlets, coffee houses, cafes, coffee shops, creameries, snack bars, canteens and food caterers. Hawkers and stall holders (including those in the food courts) selling cooked food and prepared drinks are not considered as catering establishments.

For the compilation of indices, survey data are supplemented by administrative records.

The overall indices are compiled by assigning a weight to each activity based on their turnover in the base year. Two series of the indices are compiled and presented, one in current prices and the other in constant prices. The base year of the index is 1991.

Wholesale Trade Index

The Wholesale Trade Index (WTI) measures the sales transactions of wholesale establishments in the economy. Data for the compilation of the WTI are sourced from some 750 wholesale establishments covered in the quarterly survey of wholesale trade and business expectations surveys. The base year for the WTI is 1994.

Two series of the WTI are compiled - the Domestic WTI and Foreign WTI. The Domestic WTI records sales transactions made locally. It captures the sale of wholesale goods from wholesalers to other wholesalers, manufacturers and retailers whose business operations are in Singapore. The Foreign WTI pertains to wholesale sales outside Singapore. It comprises wholesale exports of goods manufactured in Singapore, re-exports, offshore merchandise and transshipment cargo.

Other References

Further information on the concepts and methodology and detailed statistics prior to the reference year 1990 may be obtained from the "Report on the Survey of Services", and the "Report on the Survey of Wholesale Trade, Retail Trade, Restaurants and Hotels". From the

reference year 1990 onwards, they can be obtained from the various industry-specific reports under the Economic Survey Series, viz "Transport & Communications", "Real Estate & Business Services", "Community, Social & Personal Services", "Wholesale & Retail", "Hotels & Catering" and "The Services Sector".

Value Added : Comprises the value of operating surplus, remuneration and indirect taxes. However, for financial and insurance services, value added is computed on a different basis. For the Monetary Authority of Singapore, Board of Commissioners of Currency and investment holding companies, value added is the sum of remuneration, depreciation allowance and indirect taxes. For other financial institutions, value added refers to the sum of operating surplus, remuneration and indirect taxes less dividends received, and net gains from stocks and share transactions, commodity and financial futures and gold trading. For insurance companies, value added refers to the sum of operating surplus, remuneration, dividend amount or commissions paid and indirect taxes less dividends received and net gains from foreign exchange, stocks and share transactions as well as gold trading.

Foreign Receipts : Refers to sales of goods and services to foreign residents and tourists. It includes sales of goods and services to foreign residents and tourists. It includes sales of goods and services to foreign residents and tourists. It includes sales of goods and services to foreign residents and tourists.

For the compilation of indices, survey data are supplemented by administrative records. The indices are compiled by the Department of Statistics, Singapore. The overall indices are compiled by assigning a weight to each activity based on their turnover in the base year. Two series of the indices are compiled and presented, one in current prices and the other in constant prices. The base year of the index is 1991. Wholesale Trade Index : The Wholesale Trade Index (WTI) measures the sales transactions of wholesale establishments in the economy. Data for the compilation of the WTI are sourced from some 750 wholesale establishments covered in the quarterly survey of wholesale trade and business expectations survey. The base year for the WTI is 1991. Two series of the WTI are compiled - the Domestic WTI and Foreign WTI. The Domestic WTI records sales transactions made locally. It captures the sale of wholesale goods from wholesalers to other wholesalers, manufacturers and retailers whose business operations are in Singapore. The Foreign WTI pertains to wholesale sales outside Singapore. It comprises wholesale exports of goods manufactured in Singapore, re-exports of offshore merchandise and trans-shipment cargo.

Year	Establish- ments	Employ- ment	Remunera- tion	Turnover	Operating Expenditure	Operating Surplus	Value Added
	Number		Million Dollars				
Total							
1986	36,621	219,972	2,799	73,873	72,417	1,930	4,924
1991	44,679	288,183	5,881	214,597	209,318	6,224	13,032
1992	46,750	307,703	6,811	243,851	239,513	5,452	13,603
1993	50,999	330,911	7,835	272,823	267,105	7,013	17,125
1994	47,393	329,957	8,805	296,257	289,866	7,798	20,451
1995	47,792	341,805	9,803	341,305	334,416	8,447	21,985
1996	51,840	349,599	10,464	369,684	362,982	8,412	22,686
Wholesale Trade							
1986	18,166	103,772	1,813	62,157	61,067	1,368	3,242
1991	23,575	145,847	4,002	192,841	188,757	4,675	8,835
1992	25,299	157,879	4,721	219,820	216,813	3,725	8,578
1993	27,900	170,427	5,410	243,806	239,500	5,138	10,684
1994	26,178	173,703	6,147	264,899	260,036	5,785	12,733
1995	26,203	179,673	6,919	311,263	305,889	6,423	14,357
1996	28,903	190,329	7,516	340,265	334,956	6,482	15,232
Retail Trade							
1986	15,503	63,103	451	9,581	9,291	358	896
1991	17,832	75,015	894	17,541	16,871	791	2,338
1992	18,150	77,896	1,004	19,427	18,692	881	2,960
1993	19,731	86,316	1,216	24,119	23,210	1,084	4,296
1994	18,005	85,032	1,378	26,235	25,324	1,115	5,370
1995	18,415	86,318	1,456	24,623	23,737	1,095	5,094
1996	19,502	83,621	1,435	23,915	23,110	1,027	4,875
Hotels and Catering							
1986	2,952	53,097	535	2,135	2,060	204	786
1991	3,272	67,321	984	4,215	3,690	758	1,858
1992	3,301	71,928	1,086	4,604	4,008	846	2,066
1993	3,368	74,168	1,209	4,898	4,395	791	2,145
1994	3,210	71,222	1,280	5,123	4,506	898	2,348
1995	3,174	75,814	1,428	5,419	4,790	929	2,534
1996	3,435	75,649	1,513	5,504	4,916	903	2,580

11.2 SELECTED AVERAGES AND RATIOS IN THE COMMERCE SECTOR

1.11

Year	Turnover	Operating Surplus	Value Added	Value Added Per Person Engaged	Operating Surplus to Turnover	Remuneration to Operating Expenditure	Remuneration to Value Added
	Per Establishment						
	Thousand Dollars						
Total							
1986	2,017	53	134	22	2.6	3.9	56.8
1991	4,803	139	292	45	2.9	2.8	45.1
1992	5,216	117	291	44	2.2	2.8	50.1
1993	5,350	138	336	52	2.6	2.9	45.8
1994	6,251	165	432	62	2.6	3.0	43.1
1995	7,141	177	460	64	2.5	2.9	44.6
1996	7,131	162	438	65	2.3	2.9	46.1
Wholesale Trade							
1986	3,422	75	178	31	2.2	3.0	55.9
1991	8,180	198	375	61	2.4	2.1	45.3
1992	8,689	147	339	54	1.7	2.2	55.0
1993	8,739	184	383	63	2.1	2.3	50.6
1994	10,119	221	486	73	2.2	2.4	48.3
1995	11,879	245	548	80	2.1	2.3	48.2
1996	11,773	224	527	80	1.9	2.2	49.3
Retail Trade							
1986	618	23	58	14	3.7	4.9	50.3
1991	984	44	131	31	4.5	5.3	38.2
1992	1,070	49	163	38	4.5	5.4	33.9
1993	1,222	55	218	50	4.5	5.2	28.3
1994	1,457	62	298	63	4.2	5.4	25.7
1995	1,337	59	277	59	4.4	6.1	28.6
1996	1,226	53	250	58	4.3	6.2	29.4
Hotels and Catering							
1986	723	69	266	15	9.6	26.0	68.1
1991	1,288	232	568	28	18.0	26.7	52.9
1992	1,395	256	626	29	18.4	27.1	52.6
1993	1,454	235	637	29	16.1	27.5	56.4
1994	1,596	280	732	33	17.5	28.4	54.5
1995	1,707	293	798	33	17.1	29.8	56.3
1996	1,602	263	751	34	16.4	30.8	58.6

Year	Establish- ments	Employ- ment	Remunera- tion	Operating Receipts ¹	Operating Expenditure ¹	Operating Surplus ¹	Value Added
	Number		Million Dollars				
Transport, Storage and Communications Services							
1986	5,611	87,286	1,736	12,147	10,346	2,851	4,779
1991	6,503	103,301	3,169	20,509	16,137	5,714	9,215
1992	6,654	102,064	3,090	21,540	17,246	5,773	9,232
1993	7,167	109,885	3,514	24,510	19,499	6,690	10,582
1994	8,149	118,175	4,060	28,097	22,115	7,806	12,369
1995	7,983	123,272	4,555	30,677	23,990	8,593	13,682
1996	8,106	122,986	4,765	32,932	26,531	8,852	14,387
Financial and Insurance Services ²							
1986	2,417	9,689	233	6,387	3,481	2,960	607
1991	3,128	12,003	437	12,695	7,693	5,096	918
1992	3,371	12,198	506	11,336	6,387	5,064	1,036
1993	3,766	13,761	603	15,438	6,221	9,352	1,277
1994	4,881	16,453	828	15,932	10,109	5,992	1,883
1995	4,797	17,403	937	17,817	10,944	7,057	2,038
1996	5,706	18,098	1,083	23,754	11,622	12,326	2,091
Real Estate and Business Services							
1986	8,918	70,807	1,267	10,602	8,251	2,739	4,305
1991	12,551	97,190	2,796	19,503	15,733	4,481	7,802
1992	12,253	96,375	3,005	19,753	15,578	4,841	8,436
1993	13,492	102,786	3,396	24,216	19,462	5,532	9,539
1994	17,873	126,845	4,632	35,091	29,160	6,892	12,411
1995	18,137	133,993	5,345	35,789	29,915	6,881	13,304
1996	20,717	138,290	5,863	38,913	32,868	7,346	14,205

(continued on next page)

1 With effect from 1995, 'rental for land' has been reclassified from an operating to a non-operating item, according to the Singapore System of National Accounts classification.

2 With effect from 1986, data exclude establishments within the purview of the Monetary Authority of Singapore (MAS).

11.3 PRINCIPAL STATISTICS OF THE SERVICES SECTOR BY INDUSTRY (continued)

Year	Establish- ments	Employ- ment	Remunera- tion	Operating Receipts ¹	Operating Expenditure ¹	Operating Surplus ¹	Value Added
	Number			Million Dollars			
Community, Social and Personal Services ³							
1986	8,408	47,613	481	1,930	1,635	377	944
1991	9,825	62,808	1,200	4,613	4,001	838	2,625
1992	10,121	69,620	1,408	5,422	4,719	968	3,059
1993	10,500	73,364	1,589	6,175	5,293	1,187	3,557
1994	11,786	84,298	1,952	7,457	6,487	1,355	4,229
1995	11,706	86,667	2,111	7,988	7,006	1,390	4,560
1996	11,174	84,869	2,229	8,395	7,223	1,549	4,933
Non-profit Organisations ⁴							
1986	5,192	37,884	769	279	1,446	118	906
1991	4,340	41,609	1,256	1,136	2,847	192	1,517
1992	4,979	44,313	1,380	1,280	3,289	208	1,661
1993	5,449	46,585	1,617	1,586	3,782	257	1,930
1994	5,452	50,922	1,981	1,982	4,444	307	2,396
1995	5,664	52,565	2,169	2,117	5,175	496	2,686
1996	5,754	58,953	2,424	3,085	5,999	569	3,084

3 The formulas for computing operating receipts, operating surplus and value added have been revised in 1993. For comparability, data from 1986 onwards were correspondingly revised.

4 With effect from 1986, data exclude mutual benefit organisations, citizens' consultative committees & residents' committees.

11.4

SELECTED AVERAGES AND RATIOS IN THE SERVICES SECTOR

(Excluding Non-Profit Organisations)

Year	Operating Receipts ¹	Operating Surplus ¹	Value Added	Value Added Per Person Engaged	Operating Surplus to Operating Receipts ¹	Remuneration to Operating Expenditure ¹	Remuneration to Value Added
	Per Establishment						
	Thousand Dollars						
	Total				Per Cent		
1986	1,225	352	419	49	28.7	15.7	35.0
1991	1,791	504	642	75	28.1	17.5	37.0
1992	1,792	514	672	78	28.7	18.2	36.8
1993	2,014	652	715	83	32.4	18.0	36.5
1994	2,028	516	724	89	25.5	16.9	37.1
1995	2,165	561	788	93	25.9	18.0	38.6
1996	2,275	658	779	98	28.9	17.8	39.1
Transport, Storage and Communications Services							
1986	2,165	508	852	55	23.5	16.8	36.3
1991	3,154	879	1,417	89	27.9	19.6	34.4
1992	3,237	868	1,387	90	26.8	17.9	33.5
1993	3,420	933	1,476	96	27.3	18.0	33.2
1994	3,448	958	1,518	105	27.8	18.4	32.8
1995	3,843	1,076	1,714	111	28.0	19.0	33.3
1996	4,063	1,092	1,775	117	26.9	18.0	33.1
Financial and Insurance Services ²							
1986	2,643	1,225	251	63	46.3	6.7	38.4
1991	4,058	1,629	293	76	40.1	5.7	47.6
1992	3,363	1,502	307	85	44.8	7.9	48.8
1993	4,099	2,483	339	93	60.6	9.7	47.2
1994	3,264	1,228	386	114	37.6	8.2	44.0
1995	3,714	1,471	425	117	39.6	8.6	46.0
1996	4,163	2,160	366	116	51.9	9.3	51.8

(continued on next page)

1 With effect from 1995, 'rental for land' has been reclassified from an operating to a non-operating item, according to the Singapore System of National Accounts classification.

2 With effect from 1986, data exclude establishments within the purview of the Monetary Authority of Singapore (MAS).

(Excluding Non-Profit Organisations)

Year	Operating Receipts ¹	Operating Surplus ¹	Value Added	Value Added Per Person Engaged	Operating Surplus to Operating Receipts ¹	Remuneration to Operating Expenditure ¹	Remuneration to Value Added
Thousand Dollars				Per Cent			
Real Estate and Business Services							
1986	1,189	307	483	61	25.8	15.4	29.4
1991	1,554	357	622	80	23.0	17.8	35.8
1992	1,612	395	689	88	24.5	19.3	35.6
1993	1,795	410	707	93	22.8	17.5	35.6
1994	1,963	386	694	98	19.6	15.9	37.3
1995	1,973	379	734	99	19.2	17.9	40.2
1996	1,878	355	686	103	18.9	17.8	41.3
Community, Social and Personal Services ³							
1986	230	45	112	20	19.5	29.4	51.0
1991	470	85	267	42	18.2	30.0	45.7
1992	536	96	302	44	17.9	29.8	46.0
1993	588	113	339	48	19.2	30.0	44.7
1994	633	115	359	50	18.2	30.1	46.2
1995	682	119	390	53	17.4	30.1	46.3
1996	751	139	441	58	18.4	30.9	45.2

3 The formulas for computing operating receipts, operating surplus and value added have been revised in 1993. For comparability, data from 1986 onwards were correspondingly revised.

	Weights ¹	1987	1992	1993	1994	1995	1996	1997
At Current Prices								
Total	10,000	67.1	109.4	119.9	123.0	124.8	126.6	123.5
Total (excl Motor Vehicles)	8,087	79.8	104.3	107.1	110.9	113.3	119.9	122.8
Textiles & Personal Effects	2,043	85.1	109.2	106.5	107.0	103.7	104.4	106.1
Furniture & Household Equipment	1,160	80.4	101.1	104.4	106.4	108.7	121.1	132.5
Motor Vehicles	1,913	32.6	123.3	173.7	174.2	173.5	155.0	126.1
Petrol Service Stations	505	66.8	106.9	109.3	110.2	113.4	121.5	119.5
Department Stores & Supermarkets	1,766	73.1	103.9	112.2	122.4	127.8	133.1	133.8
Provision & Sundry Shops	853	101.1	98.1	100.1	102.1	104.6	106.2	109.8
Others	1,760	80.4	104.0	107.3	111.3	117.4	130.1	132.1
At Constant Prices								
Total	10,000	69.2	109.7	115.4	113.7	116.5	120.0	119.8
Total (excl Motor Vehicles)	8,087	82.4	105.2	106.5	107.8	111.1	118.1	122.4
Textiles & Personal Effects	2,043	75.7	115.2	108.2	106.5	105.3	106.4	113.6
Furniture & Household Equipment	1,160	80.9	101.5	104.4	102.5	107.1	120.0	131.7
Motor Vehicles	1,913	33.6	122.1	153.2	138.5	139.6	127.7	108.8
Petrol Service Stations	505	84.9	107.6	111.6	113.3	115.4	122.4	115.3
Department Stores & Supermarkets	1,766	78.3	102.3	109.0	115.9	119.9	124.1	123.3
Provision & Sundry Shops	853	108.0	96.8	95.8	94.4	95.8	95.7	96.5
Others	1,760	83.7	104.2	107.0	109.6	117.6	134.1	140.2

¹ Based on turnover data derived from the 1991 Annual Survey of Retail Trade.

11.6 SALES INDEX OF CATERING TRADE (1991=100)

	Weights ¹	1987	1992	1993	1994	1995	1996	1997
At Current Prices								
Total	1,000	68.8	107.4	114.4	120.6	127.0	133.0	138.3
Restaurants	411	67.8	107.5	114.0	122.4	128.6	132.0	129.0
Fast Food Outlets	134	59.9	111.9	126.9	142.9	157.0	168.8	182.6
Other Eating Places	455	75.8	104.9	111.0	112.5	116.7	123.4	133.6
At Constant Prices								
Total	1,000	74.7	104.7	109.9	111.5	113.5	116.4	119.2
Restaurants	411	74.5	104.4	108.8	112.4	112.6	113.6	108.4
Fast Food Outlets	134	65.2	109.1	121.5	133.7	143.8	151.4	165.2
Other Eating Places	455	79.8	103.4	107.6	104.2	105.4	108.7	115.5

Note : Catering trade refers to the sales of prepared food and drinks for in-premises consumption or on a take-away basis.

All eating places are included with the exception of hawker stalls.

1 Based on turnover data derived from the 1991 Annual Survey of Catering Trade.

11.7 WHOLESALE TRADE INDEX

(1994=100)

	Weights ¹	1995	1996	1997
Domestic Wholesale Trade Index				
Total	10,000	109.9	107.5	117.6
Total (excl Petroleum)	8,091	114.4	106.9	115.9
Food, Beverages & Tobacco	839	130.5	128.4	134.0
Textiles, Wearing Apparel & Personal Effects	519	83.7	85.9	93.0
Household Equipment & Furniture	1,138	120.1	99.7	130.6
Petroleum & Petroleum Products	1,909	90.8	110.4	124.4
Electronic & Electrical Components & Industrial Machinery	2,067	124.3	98.6	103.3
Office Equipment, Computers & Accessories	566	111.6	139.4	162.3
Timber, Paints & Construction Materials	767	104.7	113.6	111.4
General Wholesale Trade	513	132.4	120.2	132.7
Other Wholesale Trade	1,682	99.9	99.6	101.2
Foreign Wholesale Trade Index				
Total	10,000	118.9	132.0	141.2
Total (excl Petroleum)	6,550	123.1	125.5	126.9
Food, Beverages & Tobacco	583	112.8	107.8	119.3
Textiles, Wearing Apparel & Personal Effects	257	102.6	103.5	95.9
Household Equipment & Furniture	1,227	100.7	98.6	88.2
Petroleum & Petroleum Products	3,450	111.1	144.3	168.3
Electronic & Electrical Components & Industrial Machinery	1,026	129.3	136.9	135.8
Office Equipment, Computers & Accessories	327	136.2	153.3	170.0
Timber, Paints & Construction Materials	360	105.8	97.1	97.7
General Wholesale Trade	1,472	124.5	122.2	124.0
Other Wholesale Trade	1,298	147.9	158.8	166.8

¹ Based on turnover data derived from the 1994 Annual Survey of Wholesale Trade.

Sources of Data

From April 1987, Singapore's external trade statistics are compiled by the Trade Development Board from import and export permits submitted to the Controller and Registrar of Imports and Exports or the Director-General of Customs and Excise, Singapore, except for the following:-

- (i) Postal packages which are based on particulars furnished by the Singapore Post Pte Ltd; and
- (ii) Bunkers and stores supplied to non-Singapore registered ships and aircraft, which are compiled from statements furnished by ships and aircraft agents to the Trade Development Board.

Prior to April 1987, external trade statistics were compiled by the Singapore Department of Statistics from the same sources.

Coverage

The "general" system for recording trade statistics is adopted in Singapore. Under this system, all goods imported into or exported from Singapore are included in the external trade statistics with the following major exceptions:

- (i) Transshipment cargo on through bills of lading or through air waybills;
- (ii) Fish and other marine produce landed by Singapore and Peninsular Malaysian registered vessels direct from sea;
- (iii) Goods imported and exported by, or on behalf of, diplomatic services and Armed Forces;

- (iv) Exposed cinematographic films imported or exported on rental basis;
- (v) Television news films, news or press materials;
- (vi) Ships and aircraft arriving for or departing after repairs;
- (vii) Goods temporarily taken in or out of the country to be returned after a specific purpose eg for exhibition;
- (viii) Personal and household effects accompanying passengers or crews;
- (ix) Samples and specimens for test or analysis; and unaccompanied personal effects and gifts not exceeding the value of \$400;
- (x) Gold bullion and gold coins; and
- (xi) Issued currency notes and coins.

Ships and aircraft are included if they are imported or exported as merchandise whether or not they arrive or depart under their own power.

Definitions

Imports : Refers to all goods brought into Singapore, except those specified as excluded under the **Coverage** section, irrespective of whether they are for consumption, for processing, for use in manufacturing, or for subsequent re-shipment to other countries.

12 EXTERNAL TRADE (cont'd)

Exports : Refers to all goods taken out of Singapore, except those specified as excluded under the **Coverage** section. It comprises domestic exports and re-exports.

Domestic Exports : Refers to exports of Singapore origin. It comprises (i) primary commodities grown or produced in Singapore; and (ii) goods which have been transformed, that is, manufactured, assembled or processed in Singapore including those with imported materials or parts.

Re-exports : Refers to all goods which are exported from Singapore in the same form as they have been imported (including goods that have undergone minor processing, such as re-packing, splitting into lots, sorting or grading, making and the like).

Trade at 1990 Prices : This is obtained by adjusting the recorded value of trade using import/export price indices with base year 1990. The series on trade at 1990 prices indicate the volume of trade after adjusting for the effect of price changes.

Valuation

Imports are valued at cif, that is, the value of goods at the frontier of the exporting

country plus the cost of insurance and freight to the registration area. Customs duties and other import charges payable in the registration area are not included in the value of imports.

Exports are valued at fob, that is, the value of goods to the purchaser abroad up to the point where the goods are deposited on board the outgoing vessel, aircraft or vehicle.

Classification

With effect from 1 January 1996, the trade classification adopted for documenting Singapore's external trade is the 1996 Singapore Trade Classification and Customs Duties, which is based on the Harmonized System. However, for the publication of external trade statistics, a classification based on the Standard International Trade Classification (Revision 3) is used. Imports are classified by the country of origin and exports by the country of destination.

Other References

Detailed monthly trade statistics are available in the "Singapore Trade Statistics, Imports and Exports".

12.1

EXTERNAL TRADE BY TYPE

Million Dollars

	1987	1992	1993	1994	1995	1996	1997
At Current Prices							
Total Trade	128,681	220,881	257,076	303,723	343,828	361,455	382,218
Exports	60,266	103,351	119,473	147,327	167,515	176,272	185,613
Oil	12,198	13,510	14,612	14,075	13,858	16,728	16,219
Non-oil	48,068	89,841	104,862	133,252	153,657	159,544	169,393
Domestic Exports	39,071	66,337	75,394	88,533	98,473	103,589	107,535
Oil	11,754	13,409	14,557	13,985	13,721	16,551	15,912
Non-oil	27,317	52,928	60,837	74,548	84,751	87,038	91,624
Re-exports	21,195	37,014	44,079	58,794	69,042	72,683	78,077
Imports	68,415	117,530	137,603	156,396	176,314	185,183	196,605
Oil	12,526	14,987	14,912	13,788	14,204	17,313	18,635
Non-oil	55,890	102,542	122,691	142,608	162,110	167,870	177,971
At 1990 Prices							
Total Trade	127,982	240,303	284,346	343,485	394,721	423,053	454,497
Exports	59,873	114,669	134,884	172,097	199,736	214,296	228,821
Oil	13,636	17,465	20,114	22,360	22,389	23,339	23,220
Non-oil	46,237	97,204	114,770	149,737	177,347	190,957	205,601
Domestic Exports	39,209	76,035	88,719	109,988	125,765	133,799	140,352
Oil	13,176	17,341	20,036	22,230	22,188	23,104	22,820
Non-oil	26,033	58,694	68,682	87,758	103,578	110,694	117,532
Re-exports	20,664	38,634	46,165	62,109	73,970	80,497	88,469
Imports	68,109	125,633	149,462	171,388	194,986	208,757	225,676
Oil	13,013	18,467	20,792	20,314	20,482	22,408	23,940
Non-oil	55,096	107,167	128,670	151,073	174,504	186,349	201,736

Source : Trade Development Board (with effect from April 1987)

Note : Figures from 1994 are slightly inflated due to improved coverage arising from the implementation of Goods and Services Tax from 1 April 1994.

12.2

TOTAL TRADE BY AREA/COUNTRY

Million Dollars

Area/Country	1987	1992	1993	1994	1995	1996	1997
Total	128,681	220,881	257,076	303,723	343,829	361,455	382,218
America	27,086	45,429	51,398	56,712	62,531	69,099	74,226
Brazil	383	610	961	906	1,127	1,164	1,008
Canada	839	1,289	1,320	1,548	1,552	1,396	1,595
United States ¹	24,731	41,119	46,652	51,539	57,017	62,703	67,135
Asia	76,693	129,608	155,991	190,038	217,105	224,019	235,316
Bahrain	579	320	258	196	191	230	245
Bangladesh	550	587	614	708	868	989	897
Brunei	984	1,513	1,374	1,565	2,394	2,702	2,337
China, Peo Rep	4,523	5,479	6,945	7,619	9,640	11,043	14,484
Hong Kong	5,617	11,668	14,703	18,100	20,173	21,609	23,629
India	1,696	2,392	2,613	3,136	3,967	4,354	4,846
Iran (Islamic Rep)	1,126	1,130	1,205	999	848	676	1,071
Japan	19,479	32,610	39,032	44,765	50,355	48,071	47,688
Korea, Rep of	2,832	6,194	7,754	9,856	12,249	11,715	11,539
Kuwait	1,680	689	1,228	1,303	1,757	2,013	1,870
Malaysia	18,037	30,213	39,612	54,690	59,410	59,551	61,953
Pakistan	359	564	530	574	524	480	495
Philippines	1,253	1,834	3,027	3,604	4,291	5,197	7,335
Saudi Arabia	3,414	6,690	5,982	6,110	5,841	7,577	8,529
Sri Lanka	460	602	567	603	611	618	661
Taiwan	4,780	8,909	10,099	11,958	14,073	14,291	16,575
Thailand	4,690	10,807	12,481	15,657	18,768	20,123	18,613
United Arab Emirates	1,567	2,145	2,554	2,552	3,238	4,168	3,823
Europe	18,862	36,619	39,814	46,361	53,055	56,564	60,574
France	2,336	4,509	4,890	5,317	6,816	8,717	9,080
Germany, Fed Rep ²	4,312	8,228	8,950	10,499	11,793	12,173	12,101
Italy	1,617	3,153	2,885	3,259	3,601	3,904	3,675
Netherlands	1,628	4,297	4,375	5,569	6,061	5,860	6,253
Switzerland	852	1,864	2,192	2,479	2,735	2,911	2,664
United Kingdom	3,888	6,284	7,168	8,311	9,039	10,050	11,703
Commonwealth of Independent States ³	478	823	1,155	1,551	1,907	1,552	1,571
Oceania	4,097	6,150	6,609	7,480	7,965	8,607	8,878
Australia ⁴	2,963	4,454	5,086	5,883	6,230	6,811	6,997
New Zealand	460	780	656	773	837	875	895
Africa	1,943	3,076	3,265	3,132	3,172	3,167	3,223

Source : Trade Development Board (with effect from April 1987)

1 Prior to 1986, the United States of America included Puerto Rico.

2 Figures from Oct 1990 include the former German Democratic Republic.

3 Data prior to 1992 referred to Soviet Union.

4 Prior to 1989, Australia included Christmas Island.

12.3

IMPORTS BY AREA/COUNTRY

Million Dollar

Area/Country	1987	1992	1993	1994	1995	1996	1997
Total	68,415	117,530	137,603	156,396	176,314	185,183	196,605
America	10,847	21,159	24,168	25,923	28,856	33,209	36,297
Brazil	225	417	487	538	510	477	385
Canada	355	536	544	634	742	830	1,028
United States	10,057	19,341	22,360	23,902	26,470	30,256	33,017
Asia	45,392	74,822	89,837	103,135	115,932	117,093	124,271
Bahrain	520	239	205	149	154	190	201
Bangladesh	90	47	54	50	34	45	71
Brunei	277	433	350	319	317	290	271
China, Peo Rep	2,976	3,668	3,877	4,412	5,730	6,259	8,447
Hong Kong	1,802	3,587	4,339	5,286	5,821	5,922	5,780
India	526	867	1,080	1,208	1,306	1,427	1,548
Iran (Islamic Rep)	973	826	1,049	901	675	511	873
Japan	14,029	24,753	30,111	34,422	37,288	33,617	34,564
Korea, Rep of	1,837	3,869	4,428	5,986	7,652	6,362	6,056
Kuwait	1,558	554	1,106	1,171	1,654	1,911	1,769
Malaysia	9,477	17,287	22,670	25,600	27,285	27,808	29,548
Pakistan	83	134	107	103	91	100	88
Philippines	376	517	813	1,193	1,558	1,960	2,954
Saudi Arabia	2,836	6,018	5,359	5,607	5,380	7,042	7,974
Sri Lanka	61	48	64	87	77	72	69
Taiwan	3,143	4,721	5,458	6,018	7,251	7,421	8,208
Thailand	2,137	4,365	5,676	7,471	9,097	10,117	10,080
United Arab Emirates	1,129	1,092	1,454	1,335	2,035	2,898	2,430
Europe	10,135	18,293	19,718	23,623	27,640	30,654	31,944
France	1,416	2,927	3,131	3,318	3,964	5,250	5,431
Germany, Fed Rep	2,359	3,839	4,203	5,270	6,127	6,760	6,723
Italy	921	2,088	1,832	2,209	2,510	3,188	2,903
Netherlands	513	1,080	1,275	1,638	1,600	1,787	1,695
Switzerland	649	1,203	1,488	1,694	2,168	2,347	2,292
United Kingdom	2,175	3,281	3,593	4,326	4,687	5,067	5,513
Commonwealth of Independent States	84	263	263	287	513	237	394
Oceania	1,572	2,359	2,741	2,744	2,910	3,231	3,111
Australia	1,313	1,998	2,384	2,393	2,556	2,797	2,668
New Zealand	222	302	290	292	293	333	335
Africa	469	897	1,139	971	976	997	982

Source : Trade Development Board (with effect from April 1987)

Note : See notes to Table 12.2.

12.4

EXPORTS BY AREA/COUNTRY

Million Dollars

Area/Country	1987	1992	1993	1994	1995	1996	1997
Total	60,266	103,351	119,473	147,327	167,515	176,272	185,613
America	16,239	24,270	27,230	30,789	33,675	35,890	37,929
Brazil	157	194	475	368	618	688	623
Canada	484	753	775	915	810	565	568
United States	14,674	21,779	24,292	27,637	30,547	32,446	34,117
Asia	31,301	54,786	66,154	86,903	101,173	106,926	111,045
Bahrain	59	81	53	47	37	40	44
Bangladesh	460	541	560	658	835	944	825
Brunei	708	1,080	1,025	1,246	2,077	2,412	2,067
China, Peo Rep	1,547	1,811	3,068	3,207	3,911	4,784	6,038
Hong Kong	3,815	8,081	10,364	12,814	14,352	15,687	17,848
India	1,170	1,524	1,533	1,928	2,661	2,927	3,297
Iran (Islamic Rep)	153	304	156	98	173	165	198
Japan	5,449	7,857	8,921	10,343	13,066	14,455	13,125
Korea, Rep of	995	2,325	3,326	3,871	4,597	5,353	5,483
Kuwait	123	135	122	132	103	102	101
Malaysia	8,560	12,925	16,942	29,089	32,125	31,743	32,405
Pakistan	276	430	423	471	433	380	407
Philippines	877	1,317	2,214	2,411	2,733	3,238	4,382
Saudi Arabia	579	671	623	503	461	535	555
Sri Lanka	399	554	503	516	534	546	591
Taiwan	1,637	4,188	4,641	5,940	6,822	6,870	8,367
Thailand	2,554	6,442	6,805	8,186	9,672	10,006	8,532
United Arab Emirates	438	1,053	1,100	1,217	1,203	1,270	1,393
Europe	8,727	18,326	20,096	22,738	25,415	25,910	28,630
France	920	1,583	1,759	1,999	2,852	3,467	3,648
Germany, Fed Rep	1,953	4,389	4,747	5,230	5,666	5,413	5,378
Italy	696	1,065	1,053	1,050	1,091	716	771
Netherlands	1,114	3,217	3,100	3,931	4,461	4,073	4,558
Switzerland	203	661	705	785	567	564	373
United Kingdom	1,713	3,003	3,575	3,985	4,352	4,984	6,190
Commonwealth of Independent States	394	560	892	1,264	1,394	1,315	1,176
Oceania	2,525	3,791	3,868	4,736	5,055	5,376	5,767
Australia	1,650	2,457	2,702	3,490	3,674	4,014	4,328
New Zealand	239	478	366	481	544	542	559
Africa	1,474	2,179	2,126	2,161	2,196	2,170	2,241

Source : Trade Development Board (with effect from April 1987)

Note : See notes to Table 12.2.

12.5

DOMESTIC EXPORTS BY AREA/COUNTRY

Million Dollars

Area/Country	1987	1992	1993	1994	1995	1996	1997
Total	39,071	66,337	75,394	88,533	98,473	103,589	107,535
America	13,163	19,150	21,218	23,757	26,234	27,907	29,193
Brazil	39	77	334	219	335	393	307
Canada	339	499	510	626	545	357	320
United States	12,240	17,571	19,239	21,728	24,213	25,689	26,849
Asia	17,732	30,409	36,513	45,408	50,875	53,835	55,036
Bahrain	39	36	28	18	17	17	23
Bangladesh	273	326	340	410	485	576	372
Brunei	237	327	332	323	379	388	405
China, Peo Rep	1,059	1,028	2,197	2,089	2,350	2,844	3,599
Hong Kong	2,541	5,177	6,719	7,845	8,377	9,538	10,536
India	581	860	729	865	1,116	1,194	1,379
Iran (Islamic Rep)	82	111	82	35	48	58	47
Japan	4,149	5,107	5,802	6,959	9,051	9,789	7,956
Korea, Rep of	642	1,382	1,957	2,010	2,424	3,019	2,767
Kuwait	74	59	58	63	66	56	51
Malaysia	3,407	6,222	8,009	13,429	13,441	13,299	13,997
Pakistan	114	157	154	156	160	158	169
Philippines	493	657	1,173	1,280	1,345	1,525	2,208
Saudi Arabia	302	282	209	188	174	197	226
Sri Lanka	139	243	215	192	206	214	254
Taiwan	977	2,436	2,594	3,285	3,884	3,710	4,223
Thailand	1,759	4,162	3,975	4,115	4,759	4,561	4,041
United Arab Emirates	241	433	397	353	395	416	386
Europe	5,617	13,222	14,255	15,495	17,297	17,821	19,360
France	625	1,157	1,311	1,536	2,035	2,557	2,520
Germany, Fed Rep	1,330	3,411	3,468	3,388	3,575	3,456	3,579
Italy	516	775	710	735	790	459	463
Netherlands	698	2,481	2,363	2,946	3,384	3,168	3,149
Switzerland	94	506	500	436	216	303	125
United Kingdom	1,147	2,170	2,662	2,901	3,306	3,601	4,557
Commonwealth of Independent States	147	256	283	492	436	418	303
Oceania	1,826	2,545	2,385	2,856	3,022	3,097	3,004
Australia	1,197	1,630	1,663	2,088	2,139	2,258	2,129
New Zealand	150	321	185	256	312	266	256
Africa	732	1,010	1,023	1,018	1,046	929	943

Source : Trade Development Board (with effect from April 1987)

Note : See notes to Table 12.2.

12.6

IMPORTS BY COMMODITY

Million Dollars

Commodity	1987	1992	1993	1994	1995	1996	1997
Total	68,415	117,530	137,603	156,396	176,314	185,183	196,605
Food	3,952	4,837	5,033	5,218	5,153	5,160	5,223
Cereals & Cereal Preparations	362	471	513	519	523	573	588
Fruits & Vegetables	971	1,249	1,279	1,224	1,223	1,222	1,161
Coffee & Spices	831	563	533	704	603	495	613
Beverages & Tobacco	595	1,652	2,074	2,141	2,024	2,393	2,641
Crude Materials	2,267	1,867	1,968	1,939	2,086	1,889	1,787
Rubber	1,159	596	508	533	684	553	455
Wood	295	306	317	344	369	321	304
Mineral Fuels	12,526	14,987	14,912	13,788	14,204	17,313	18,635
Petroleum & Petroleum Products	12,516	14,971	14,903	13,778	14,196	17,304	18,625
Animal & Vegetable Oils	792	878	834	641	753	517	514
Unprocessed Vegetable Oils	299	367	330	322	314	418	448
Chemicals	4,082	8,855	9,615	10,114	11,385	10,940	11,268
Chemical Compounds	1,079	1,935	2,047	2,302	2,944	2,749	3,127
Medicinal Products	314	441	702	799	937	964	1,072
Plastic Materials	1,276	1,354	1,558	1,756	1,977	1,795	2,010
Manufactured Goods by Material	9,537	15,046	16,013	16,523	19,191	18,255	19,626
Textile Manufactures	2,878	3,255	3,163	3,072	2,987	2,701	2,556
Non-metal Mineral Manufactures	1,045	1,782	1,891	2,268	2,662	3,059	3,025
Iron & Steel	1,661	3,005	3,289	3,222	3,910	3,758	4,254
Metal Manufactures	1,333	2,361	2,602	2,697	3,006	3,170	3,549
Paper, Paperboard & Related Articles	886	1,228	1,295	1,408	1,674	1,446	1,376
Machinery & Transport Equipment	27,534	56,331	71,916	88,306	102,055	107,209	113,163
Non-electric Machinery	9,704	22,862	27,641	32,744	37,143	41,916	45,536
Electric Machinery	14,263	26,200	35,916	47,902	56,194	53,767	55,975
Transport Equipment	3,567	7,268	8,359	7,661	8,719	11,527	11,652
Miscellaneous Manufactured Articles	6,054	11,718	13,415	15,428	17,390	19,347	20,685
Scientific & Optical Instruments	1,571	3,413	4,124	4,843	5,359	5,563	6,461
Watches & Clocks	596	1,072	1,221	1,412	1,452	1,545	1,650
Miscellaneous Transactions nec	1,078	1,359	1,823	2,298	2,072	2,160	3,063

Source : Trade Development Board (with effect from April 1987)

Commodity	1987	1992	1993	1994	1995	1996	1997
Total	60,266	103,351	119,473	147,327	167,515	176,272	185,613
Food	2,717	2,987	2,910	3,542	3,554	3,192	3,220
Cereals & Cereal Preparations	167	203	212	255	265	262	238
Fruits & Vegetables	364	394	450	543	558	554	488
Coffee & Spices	1,148	795	728	1,082	1,073	818	1,010
Beverages & Tobacco	387	1,969	2,389	2,448	2,274	2,631	2,766
Crude Materials	3,003	2,278	2,132	2,193	2,405	1,987	1,797
Rubber	1,544	986	808	819	981	777	568
Wood	510	412	374	319	270	220	247
Mineral Fuels ¹	12,198	13,510	14,612	14,075	13,858	16,728	16,219
Petroleum & Petroleum Products	9,650	11,097	11,880	11,412	11,250	13,575	12,720
Animal & Vegetable Oils	796	747	610	574	718	520	509
Unprocessed Vegetable Oils	363	278	220	247	280	353	369
Chemicals	3,762	6,732	7,663	8,418	9,999	9,885	11,136
Chemical Compounds	1,253	2,572	2,613	2,884	3,593	3,488	4,113
Medicinal Products	305	403	599	753	852	869	916
Plastic Materials	1,175	1,382	1,567	1,751	2,090	2,059	2,427
Manufactured Goods by Material	4,523	7,115	7,756	8,856	10,614	10,072	10,402
Wood Manufactures	591	489	505	433	317	270	278
Textile Manufactures	1,330	1,761	1,980	2,154	2,119	1,900	1,844
Iron & Steel	472	846	977	1,083	1,212	1,168	1,230
Metal Manufactures	627	1,204	1,266	1,614	1,820	1,852	1,982
Machinery & Transport Equipment	26,274	56,939	69,641	94,199	110,007	116,262	122,474
Non-electric Machinery	10,754	28,575	35,214	45,096	52,424	58,313	62,592
Electric Machinery	14,035	25,553	31,284	45,949	54,427	54,422	56,008
Transport Equipment	1,484	2,811	3,142	3,154	3,156	3,528	3,874
Miscellaneous Manufactured Articles	5,556	9,593	9,768	11,185	12,552	13,103	14,260
Clothing	2,096	2,948	2,500	2,322	2,075	1,972	2,215
Scientific & Optical Instruments	1,045	2,351	2,721	3,288	3,704	3,758	4,165
Watches & Clocks	227	595	708	860	1,156	1,388	1,510
Miscellaneous Transactions nec	1,050	1,482	1,993	1,838	1,532	1,892	2,831

Source : Trade Development Board (with effect from April 1987)

¹ Include oil bunkers.

Million Dollars

Commodity	1987	1992	1993	1994	1995	1996	1997
Total	39,071	66,337	75,394	88,533	98,473	103,589	107,535
Food	731	1,165	1,078	1,169	1,197	1,259	1,275
Animal Feeding Stuffs	37	47	44	51	52	62	61
Beverages & Tobacco	177	461	519	529	483	494	407
Crude Materials ¹	344	457	427	448	579	495	562
Mineral Fuels ²	11,754	13,409	14,557	13,985	13,722	16,551	15,912
Oil Bunkers	2,451	2,263	2,544	2,447	2,393	2,878	3,178
Animal & Vegetable Oils	605	584	456	335	333	299	316
Chemicals	2,360	4,174	4,464	4,696	5,621	5,626	6,650
Medicinal Products	199	235	263	269	280	298	282
Plastic Materials	864	920	966	1,087	1,346	1,374	1,711
Manufactured Goods by Material	1,328	2,190	2,443	2,731	2,924	2,844	2,935
Wood Products excluding Furniture	190	144	122	110	85	64	59
Textile Yarn & Thread	70	78	150	170	158	159	166
Woven Textile Fabrics	63	128	158	140	142	123	123
Lime, Cement & Fabricated Construction Materials	22	37	29	29	38	22	18
Iron & Steel Pipes & Fittings	59	65	67	65	82	86	116
Machinery & Transport Equipment	17,817	38,338	46,083	59,071	67,751	70,288	72,845
Office Machines	6,400	18,065	22,083	27,961	33,504	37,415	39,453
Other Non-electric Machines	804	1,522	1,577	1,870	2,033	2,103	2,311
Electric Generators	1,275	1,457	1,741	2,627	2,812	2,822	2,949
Telecommunications Apparatus	3,768	5,975	6,937	9,066	8,758	7,455	6,224
Other Electric Machinery	6,772	7,246	8,887	12,495	15,477	15,970	17,785
Ships, Boats & Oil Rigs	195	620	931	647	575	435	238
Miscellaneous Manufactured Articles	3,689	5,234	4,987	5,208	5,332	5,176	6,017
Clothing	1,487	1,590	1,201	1,026	831	699	654
Scientific & Optical Instrument	523	1,022	1,145	1,262	1,477	1,434	1,643
Watches & Clocks	93	237	313	233	252	243	303
Printed Matters	257	573	517	612	705	661	643
Toys & Games	440	268	221	184	139	137	110
Miscellaneous Transactions nec	265	324	380	361	532	558	617

Source : Trade Development Board (with effect from April 1987)

¹ Exclude processed rubber and sawn timber.² Include oil bunkers.

12.9 IMPORTS OF SPECIFIC COMMODITIES

Million Dollars

Commodity	1987	1992	1993	1994	1995	1996	1997
Meat	324	364	365	404	392	417	403
Rice	117	150	156	166	164	195	225
Unmilled Cereals	115	95	84	71	64	56	59
Fruits & Nuts	454	563	580	546	531	543	521
Spices	247	172	171	158	170	196	273
Animal Feed	125	125	86	70	59	66	51
Crude Rubber	1,131	544	453	463	617	486	388
Sawn Timber	262	276	287	291	295	273	272
Crude Petroleum	8,544	10,323	10,363	8,929	9,190	11,256	11,925
Petroleum Products	3,971	4,647	4,540	4,849	5,006	6,048	6,700
Fixed Vegetables Oils	299	367	330	322	314	418	448
Medicinal Products	314	441	702	799	937	964	1,072
Paper & Paperboard	661	825	816	909	1,172	935	835
Textile Yarn & Thread	233	294	333	351	318	286	293
Woven Textile Fabrics	2,205	2,303	2,160	2,019	1,914	1,648	1,479
Iron & Steel Plates, Sheets, Bars Shapes, etc	1,027	1,742	2,009	1,980	2,620	2,331	2,608
Iron & Steel Pipes & Fittings	356	947	802	801	837	996	1,156
Generators	4,359	6,186	7,298	8,671	8,879	8,630	8,864
Industrial Machinery	1,218	2,618	2,775	3,114	3,796	4,661	4,798
Telecommunications Apparatus	3,160	7,276	9,611	11,315	11,421	10,152	10,461
Office Machines	3,201	9,116	12,160	15,132	18,666	21,594	24,750
Motor Vehicles	1,103	2,678	3,344	3,171	3,782	3,589	3,587
Ships, Boats & Oil Rigs	1,105	2,014	2,098	1,872	2,350	3,622	3,294
Clothing	1,072	1,943	2,174	2,399	2,330	2,442	2,682
Scientific & Optical Instrument	1,571	3,413	4,124	4,843	5,359	5,563	6,461
Watches & Clocks	596	1,072	1,221	1,412	1,452	1,545	1,650
Toys & Games	333	550	630	637	666	694	648

Source : Trade Development Board (with effect from April 1987)

12.10

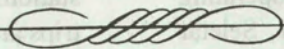
EXPORTS OF SPECIFIC COMMODITIES

Million Dollars

Commodity	1987	1992	1993	1994	1995	1996	1997
Spices	382	203	208	218	312	269	444
Coffee	299	111	133	484	400	194	222
Animal Feed	98	136	111	107	112	91	86
Crude Rubber	1,535	966	779	785	949	744	531
Sawn Timber	487	366	343	285	231	191	212
Petroleum Products	9,625	11,097	11,880	11,404	11,239	13,575	12,720
Fixed Vegetable Oils	363	278	220	247	280	353	369
Medicinal Products	305	403	599	753	852	869	916
Manufactured Fertilizers	82	56	38	31	19	21	23
Crude Vegetable Materials	313	241	246	275	270	262	242
Wood Products excluding Furniture	589	488	504	432	316	269	278
Textile Yarn & Thread	194	232	360	418	379	350	354
Woven Textile Fabrics	998	1,304	1,379	1,457	1,406	1,214	1,133
Iron & Steel Plates, Sheets, Bars Shapes, etc	264	472	562	616	756	629	628
Iron & Steel Pipes & Fittings	175	322	335	385	350	435	513
Generators	2,606	3,347	3,963	5,498	5,795	5,727	5,984
Office Machines	7,049	21,114	26,655	34,339	41,024	46,637	50,680
Industrial Machinery	733	1,440	1,656	2,250	2,652	2,831	2,916
Telecommunications Apparatus	5,200	9,673	11,560	15,284	15,163	14,117	13,062
Household Equipment	521	673	694	680	658	665	691
Motor Vehicles	382	1,151	1,492	1,405	1,647	1,754	1,883
Ships, Boats & Oil Rigs	688	1,045	1,204	1,322	922	945	939
Furniture	263	363	358	363	295	272	257
Clothing	2,096	2,948	2,500	2,322	2,075	1,972	2,215
Scientific & Optical Instrument	1,045	2,351	2,721	3,288	3,704	3,758	4,165
Watches & Clocks	227	595	708	860	1,156	1,388	1,510
Printed Matters	306	644	600	736	863	839	844

Source : Trade Development Board (with effect from April 1987)

TRANSPORT AND COMMUNICATIONS



13 TRANSPORT AND COMMUNICATIONS

Vessels Entered and Cleared

Data on the movement of vessels are compiled from declarations submitted to the Port Master by all merchant ships entering or leaving Singapore waters. The data are given in terms of number and gross registered tonnage.

Sea Cargo Handled

The volume of cargo handled refers to those handled by vessels of all tonnages at all parts of Singapore including private wharves and anchorages. The data include transshipment cargo but exclude ship's stores and mineral oil supplied as bunker fuel to vessels.

Civil Air Traffic

The Civil Aviation Authority of Singapore (CAAS) is responsible for operating the Singapore Changi Airport and Seletar Aerodrome. It also provides air traffic services, regulates and promotes the development of air transport and aerospace industries, as well as compiles and collates statistics on passengers, airfreight, airmail and aircraft traffic passing through Changi Airport and Seletar Aerodrome.

Data on passenger arrivals and departures and incoming and outgoing mail are obtained from manifests submitted by airlines through their handling agents. Statistics on aircraft movements are compiled by the Authority's Aeronautical Information Services Unit.

Monthly statistics on passengers, aircraft landings and mail carried through

Changi Airport and Seletar Aerodrome are available in the "Air Transport Statistics" published by the CAAS.

Roads

Data on public roads refer to the length of roads in kilometres and are classified into expressways, major arterial roads, collector roads and local roads.

Mass Rapid Transit (MRT)

Singapore MRT Ltd provides passenger service along major high density travel corridors in Singapore to satisfy the needs of the travelling public. Since operation in 1987, the MRT system has been extended to a route length of 83 km and a total of 48 stations. Today, close to a million passenger trips are made on the MRT daily.

Vehicles Registered

All vehicles to be kept or used in Singapore must be registered with the Vehicle and Transit Licensing Division of the Land Transport Authority.

Road Casualties

Data on road casualties are compiled from reports made to the police on all traffic accidents occurring on roads.

13.1 SEA CARGO AND SHIPPING STATISTICS

	1987	1992	1993	1994	1995	1996	1997
Vessel Arrivals (No)	42,560	81,334	92,655	101,107	104,014	117,723	130,333
Shipping Tonnage ('000 GT)	352,360	578,495	623,841	678,560	710,573	768,521	808,305
Total Cargo ('000 tonnes)	129,458	238,446	273,723	290,075	305,484	314,164	327,507
General	51,858	125,717	142,643	157,247	169,745	175,083	185,559
Bulk	77,600	112,729	131,080	132,828	135,739	139,081	141,948
Total Container Throughput ('000 TEUs)	2,634	7,556	9,047	10,400	11,846	12,944	14,136
Bunker Sales ('000 tonnes)	na	16,310	16,723	17,642	17,489	16,939	16,941
Singapore Ship Registry (End of Period)							
Number	1,229	2,087	2,394	2,647	2,910	3,157	3,380
'000 GT	7,247	10,739	12,164	13,201	14,964	18,239	20,774

Source : Maritime and Port Authority of Singapore

Notes : GT = Gross Tonnes

TEU = Twenty-Foot Equivalent Unit

13.2 CIVIL AIRCRAFT LANDINGS, PASSENGERS AND PARCEL MAIL

	1987	1992	1993	1994	1995	1996	1997
Aircraft Landings (No)	38,131	62,770	68,355	72,565	78,134	83,345	86,276
Passengers ('000)							
Arriving	5,017	8,446	9,421	10,134	10,920	11,587	11,916
Departing	5,028	8,432	9,375	10,069	10,823	11,542	11,883
In Transit	1,159	1,222	1,191	1,442	1,453	1,384	1,375
Parcel Mail (Tonnes)							
In-coming	4,208	5,948	7,927	8,538	9,521	10,572	10,813
Out-going	5,351	6,073	6,759	8,401	9,543	10,380	10,977

Source : Civil Aviation Authority of Singapore

Note : Figures from 1989 refer to Changi Airport only.

13.3

AIR CARGO DISCHARGED BY REGION AND SELECTED COUNTRY OF ORIGIN

								Tonnes
Region/Country	1987	1992	1993	1994	1995	1996	1997	
Total	222,160	386,793	444,019	529,334	577,749	622,019	696,778	
South East Asia	61,838	120,489	119,529	134,259	136,795	154,068	168,936	
Malaysia	12,617	24,262	21,664	23,996	23,409	21,882	26,945	
Philippines	4,055	4,090	5,351	7,650	8,251	11,772	16,500	
Thailand	21,093	31,601	36,212	42,022	44,934	47,096	51,049	
North East Asia	66,112	112,526	136,316	162,282	183,040	196,745	229,292	
Hong Kong	14,603	22,373	28,644	35,562	39,403	40,720	46,764	
Japan	27,763	46,957	53,557	57,450	58,314	58,375	71,259	
Taiwan	15,770	21,165	25,641	35,888	46,510	50,715	54,607	
South Asia	12,879	22,164	26,919	31,165	32,480	37,666	38,684	
India	8,749	13,240	16,984	19,971	20,256	24,305	22,394	
West Asia	1,345	2,912	4,831	10,263	9,608	8,259	9,869	
Oceania	29,882	52,980	60,366	65,680	67,523	69,155	72,437	
Australia	26,828	47,692	52,715	56,289	59,067	61,271	64,314	
New Zealand	2,871	4,858	7,330	8,771	8,018	7,570	7,808	
Europe	34,794	57,433	70,516	86,036	96,429	102,118	116,040	
France	2,904	4,245	4,192	5,102	6,626	8,355	14,455	
Germany ¹	2,938	7,152	8,626	10,365	11,808	12,297	15,413	
Netherlands	5,588	9,906	11,772	18,389	18,209	20,255	16,824	
Scandinavia	2,467	6,277	7,240	7,902	9,921	10,471	12,335	
Switzerland	3,993	8,227	8,976	9,596	11,966	10,380	14,549	
United Kingdom	4,614	7,906	11,377	12,052	13,545	15,454	16,295	
North America	14,811	16,742	22,823	36,440	47,944	49,779	57,087	
USA	14,737	14,738	21,458	35,121	46,257	48,667	56,275	
Other Regions	500	1,546	2,719	3,209	3,930	4,229	4,433	

Source : Civil Aviation Authority of Singapore

Notes : Data refer to Changi Airport only. Data exclude passenger baggage, diplomatic cargo and aircraft stores.

¹ Data prior to 1991 referred to Federal Republic of Germany only.

13.4

AIR CARGO LOADED BY REGION AND SELECTED
COUNTRY OF DESTINATION

Region/Country	1987	1992	1993	1994	1995	1996	1997
Total	196,937	332,212	394,397	480,430	528,024	568,438	639,570
South East Asia	43,027	78,534	93,143	121,047	126,481	144,984	145,204
Malaysia	13,655	20,785	25,533	28,069	31,272	33,002	31,264
Philippines	4,990	6,851	8,463	10,130	12,791	19,043	24,790
Thailand	9,402	23,234	27,597	41,565	36,446	37,207	38,125
North East Asia	51,859	112,125	136,631	166,943	197,688	206,249	233,576
Hong Kong	14,527	28,388	35,840	40,065	45,106	47,708	56,109
Japan	22,920	51,312	56,016	61,934	74,741	77,706	83,056
Taiwan	5,956	13,436	18,413	31,910	36,626	35,251	45,671
South Asia	11,447	13,830	17,150	21,362	25,979	28,861	31,856
India	6,223	7,360	9,491	11,540	15,855	19,069	20,815
West Asia	5,526	7,360	10,583	12,506	11,264	11,527	13,632
Oceania	19,185	27,683	32,114	40,720	43,573	45,662	54,815
Australia	15,044	22,141	25,482	32,394	35,423	37,636	46,006
New Zealand	3,598	4,504	5,711	7,424	7,226	7,167	7,784
Europe	46,918	68,954	73,229	80,721	82,938	85,833	101,670
France	3,816	2,884	2,241	3,339	4,928	6,195	11,933
Germany ¹	4,479	6,505	7,985	8,836	10,106	11,525	14,230
Netherlands	9,718	13,440	13,729	16,963	14,766	15,496	15,127
Scandinavia	2,603	4,602	4,354	4,008	4,897	5,537	6,241
Switzerland	3,403	7,428	7,050	6,627	8,289	7,896	8,843
United Kingdom	9,826	10,526	11,899	12,594	12,927	16,095	17,346
North America	17,595	20,402	27,869	32,960	35,620	39,667	52,477
USA	17,354	18,676	26,465	31,798	34,408	39,140	51,896
Other Regions	1,379	3,324	3,678	4,171	4,481	5,655	6,340

Source : Civil Aviation Authority of Singapore

Note : See notes to Table 13.3.

AIR PASSENGER ARRIVALS BY REGION AND SELECTED COUNTRY OF EMBARKATION

Thousand

Region/Country	1987	1992	1993	1994	1995	1996	1997
Total	5,017	8,446	9,421	10,134	10,920	11,587	11,916
South East Asia	2,379	3,980	4,420	4,614	4,944	5,211	5,235
ASEAN	2,377	3,918	4,317	4,569	4,876	5,117	5,145
Brunei	na	121	127	129	133	140	139
Indonesia	na	1,080	1,162	1,265	1,400	1,583	1,610
Malaysia	na	1,696	1,818	1,842	1,944	1,854	1,820
Philippines	na	179	208	229	207	279	326
Thailand	na	842	1,002	1,004	1,074	1,134	1,121
Vietnam	na	na	na	100	119	127	130
North East Asia	1,019	2,029	2,217	2,471	2,761	2,956	2,947
Hong Kong	465	650	725	733	795	887	816
Japan	375	814	871	961	1,049	1,104	1,086
Taiwan	120	322	351	433	467	445	456
South Asia	339	440	480	517	602	644	755
India	224	258	269	289	348	383	458
Pakistan	29	28	34	39	40	43	44
Sri Lanka	51	89	96	98	100	96	107
West Asia	67	106	115	123	126	128	133
Oceania	557	826	930	1,029	1,056	1,087	1,172
Australia	468	713	795	873	908	933	1,010
New Zealand	75	95	120	138	134	142	150
Europe	526	819	945	1,033	1,075	1,172	1,259
France	30	51	63	76	74	84	109
Germany ¹	48	126	167	180	197	223	228
Netherlands	62	90	93	110	117	119	116
Scandinavia	29	47	47	47	46	50	58
Switzerland	37	54	69	77	89	112	113
United Kingdom	211	313	340	359	384	426	472
North America	93	176	222	246	241	264	287
USA	91	151	197	221	220	247	269
Other Regions	37	69	92	102	115	125	127

Source : Civil Aviation Authority of Singapore

Notes : Data refer to Changi Airport only.

Data exclude transit passengers who continued their journey on the same flight.

¹ Data prior to 1991 referred to Federal Republic of Germany only.

13.6

AIR PASSENGER DEPARTURES BY REGION AND SELECTED
COUNTRY OF DISEMBARKATION

Region/Country	1987	1992	1993	1994	1995	1996	1997	Thousand
Total	5,028	8,432	9,375	10,069	10,823	11,542	11,883	
South East Asia	2,347	3,880	4,303	4,522	4,825	5,113	5,153	
ASEAN	2,345	3,816	4,207	4,480	4,765	5,022	5,070	
Brunei	na	118	126	127	132	144	139	
Indonesia	na	1,126	1,218	1,336	1,467	1,618	1,678	
Malaysia	na	1,554	1,656	1,684	1,780	1,743	1,723	
Philippines	na	169	196	224	215	278	319	
Thailand	na	848	1,011	1,011	1,053	1,108	1,079	
Vietnam	na	na	na	99	119	132	132	
North East Asia	1,000	2,060	2,266	2,495	2,779	2,960	2,962	
Hong Kong	435	643	740	741	797	881	782	
Japan	383	885	886	963	1,059	1,101	1,103	
Taiwan	118	351	369	454	491	474	508	
South Asia	351	420	459	491	553	602	697	
India	236	244	263	277	323	359	419	
Pakistan	27	31	35	39	40	41	38	
Sri Lanka	51	84	91	94	93	86	101	
West Asia	67	99	106	115	113	118	120	
Oceania	611	877	990	1,082	1,135	1,164	1,240	
Australia	516	755	846	922	979	999	1,072	
New Zealand	80	104	127	144	143	153	156	
Europe	524	833	925	1,012	1,048	1,151	1,259	
France	35	54	63	74	73	82	111	
Germany ¹	58	126	155	171	189	221	229	
Netherlands	54	86	87	103	110	114	117	
Scandinavia	30	52	48	48	47	53	61	
Switzerland	43	60	73	85	94	116	120	
United Kingdom	186	299	325	355	372	409	447	
North America	95	191	231	251	256	308	327	
USA	93	166	204	234	235	290	307	
Other Regions	34	72	95	102	115	126	126	

Source : Civil Aviation Authority of Singapore

Note : See notes to Table 13.5.

13.7

PUBLIC ROADS

(End of Period)

	1987	1992	1993	1994	1995	1996	1997
Total	2,760	2,967	2,989	3,027	3,056	3,072	3,101
Paved Roads	2,655	2,883	2,905	2,943	2,972	2,988	3,017
Expressways	83	109	112	128	132	139	148
Major Arterial Roads	490	554	563	565	567	566	559
Collector Roads	227	305	309	315	326	330	340
Local Roads Improved	1,855	1,915	1,921	1,935	1,947	1,953	1,970
Local Roads Unimproved	105	84	84	84	84	84	84

Source : Land Transport Authority (with effect from 1995)

13.8

MOTOR VEHICLE POPULATION

(End of Period)

	1987	1992	1993	1994	1995	1996	1997
Total	471,124	557,584	584,322	611,611	642,129	668,304	683,204
Cars ¹	222,487	285,500	303,864	321,556	342,245	362,142	373,345
Rental Cars	3,081	3,879	4,141	4,341	5,144	5,451	6,152
Taxis	10,552	13,445	13,917	14,750	16,517	16,857	16,933
Buses	8,733	9,658	9,716	10,198	10,723	10,998	11,240
Goods Vehicles	102,643	119,335	122,739	123,844	126,428	128,115	129,587
Motor Cycles & Scooters	116,544	116,532	119,939	126,156	129,587	132,344	132,629
Others	7,084	9,235	10,006	10,766	11,485	12,397	13,318

Source : Land Transport Authority

¹ Include private cars and company cars.

13.9

CAR POPULATION BY CC RATING

(End of Period)

CC Rating	Number						
	1987	1992	1993	1994	1995	1996	1997
Total	223,456	287,612	306,216	324,026	345,432	365,558	377,365
1,000 cc & below	33,783	44,879	46,245	47,019	48,558	51,094	53,094
1,001 to 1,600 cc	152,101	180,924	189,155	195,694	205,563	214,814	217,830
1,601 to 2,000 cc	28,435	47,116	54,083	61,410	67,726	73,018	77,343
2,001 to 3,000 cc	8,075	12,446	13,623	15,950	18,515	20,815	22,856
3,001 cc & above	1,062	2,247	3,110	3,953	5,070	5,817	6,242

Source : Land Transport Authority

Notes : Figures refer to private cars, company cars and rental cars only.

They do not include taxis and tax exempted cars.

13.10

AGE DISTRIBUTION OF CARS

(End of Period)

Age (Years)	Number						
	1987	1992	1993	1994	1995	1996	1997
Total	223,456	287,612	306,216	324,026	345,432	365,558	377,365
Below 1	12,609	29,554	39,621	34,044	32,701	28,785	25,064
1 - below 2	8,161	28,718	29,553	39,616	33,975	32,672	28,774
2 - below 3	13,422	31,919	28,747	29,548	39,591	33,859	32,594
3 - below 4	22,220	35,511	31,920	28,740	29,531	39,558	33,682
4 - below 5	30,974	26,548	35,494	31,902	28,722	29,471	39,518
5 - below 6	31,649	12,852	26,522	35,466	31,874	28,695	29,390
6 - below 7	23,023	8,749	12,787	26,399	35,317	31,734	28,623
7 - below 8	29,705	13,561	8,625	12,442	25,637	34,432	31,110
8 - below 9	21,399	21,924	13,482	8,589	12,392	25,509	34,214
9 - below 10	10,395	24,561	17,589	10,691	7,345	11,049	23,253
10 - below 11	4,714	11,672	8,467	5,047	2,289	2,256	2,343
11 - below 12	1,792	7,009	11,642	8,439	5,017	2,276	2,245
12 - below 13	1,907	10,557	6,993	11,608	8,375	4,976	2,263
13 - below 14	2,718	8,732	10,532	6,956	11,545	8,283	4,924
14 - below 15	3,228	5,451	8,716	10,508	6,910	11,460	8,060
15 & above	5,540	10,294	15,526	24,031	34,211	40,543	51,308

Source : Land Transport Authority

Note : See notes to Table 13.9.

13.11

ROAD CASUALTIES

CAR POPULATION BY CC RATING
(End of Period)

13.9

	1987	1992	1993	1994	1995	1996	1997
Total ¹							
Killed	205	240	258	255	225	225	257
Injured	8,056	7,190	7,636	6,751	6,727	7,628	7,341
Pedestrians							
Killed	73	65	61	67	63	70	78
Injured	1,149	995	930	841	831	862	839
Pedal Cyclists, Trishaw Riders & Passengers							
Killed	16	18	19	17	7	15	16
Injured	291	263	265	240	239	262	262
Motor Cyclists & Passengers							
Killed	86	103	123	118	117	94	111
Injured	3,571	3,502	3,840	3,546	3,538	3,825	3,703
Motor Vehicle Drivers & Passengers							
Killed	29	48	52	51	38	39	47
Injured	2,959	2,327	2,503	2,055	2,050	2,440	2,370

Source : Traffic Police Department

¹ Include other categories of road users not shown in table.

13.12

VEHICLES INVOLVED IN ROAD ACCIDENTS BY TYPE OF VEHICLE

	1987	1992	1993	1994	1995	1996	1997
Total	10,166	9,171	9,679	8,856	8,867	9,816	9,652
Pedal Cycles	317	289	287	260	252	280	283
Motor Cycles & Scooters	3,390	3,180	3,462	3,211	3,187	3,440	3,374
Motor Cars	3,911	3,666	3,823	3,436	3,449	3,941	3,992
Light Goods Vehicles	968	672	655	597	567	670	634
Heavy Goods Vehicles ¹	855	815	901	850	872	952	916
Buses	628	467	450	427	454	425	380
Others	97	82	101	75	86	108	73

Source : Traffic Police Department

¹ Cover lorries, tippers and trailers only.

13.13 MASS RAPID TRANSIT OPERATION AND RIDERSHIP

	1991	1992	1993	1994	1995	1996	1997
Total Train Km Operated ('000)	8,946	8,990	9,046	9,127	9,172	11,746	12,212
Total Number of Passengers ('000)	203,818	220,762	239,634	257,373	271,279	312,429	334,016
Average Number of Weekday Passengers (No)	563,800	612,300	671,900	724,500	765,300	877,000	945,400
Average Weekday Traffic of Selected Stations (No)							
Orchard Station	63,458	66,217	78,086	84,200	85,100	87,800	91,300
Raffles Place Station	58,521	62,713	72,324	97,400	100,400	105,700	108,600
City Hall Station	77,530	81,026	83,708	81,100	81,600	88,100	94,100
Ang Mo Kio	63,410	66,942	70,240	73,200	74,100	83,900	89,400
Tanjong Pagar	46,053	47,909	50,570	63,300	67,500	70,400	71,000

Source : Singapore MRT Ltd

13.14 POSTAL ARTICLES HANDLED AND TELECOMMUNICATIONS

	1987	1992	1993	1994	1995	1996	1997
Postal Articles Handled	685,220	989,617	1,116,587	1,181,129	1,245,124	1,344,214	1,453,700
Subscribers							
Telephone ¹	897	1,154	1,227	1,310	1,400	1,531	1,656
Mobile Phone ¹	na	110	162	222	292	404	743
Pager ²	119	425	525	652	828	955	1,073
Dial-up Internet ^{1,3}	na	na	na	2	25	129	267
Out-going International							
Telegrams	273	179	164	105	45	29	23
Telex Calls	16,026	6,270	5,178	4,547	4,288	3,344	2,818
Telephone Calls ⁴	30,797	105,246	123,680	146,093	176,141	199,612	230,524
Telephone Lines Installed ¹	875	1,153	1,227	1,310	1,400	1,531	1,656
Residential	627	747	777	816	858	928	995

Thousand

Source : Singapore Post

Telecommunication Authority of Singapore

Singapore Telecom

¹ As at end of period.

² As at March of period.

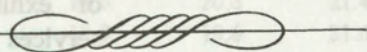
³ The first commercial Internet service, SingNet, was launched in July 1994.

Figures prior to 1995 exclude subscriptions from academic, government and R & D organisations.

⁴ Exclude calls to Peninsular Malaysia.

Region/Country	1987	1991	1993	1994	1995	1996	1997
Visitor Arrivals	4,694,532	5,057,700	5,244,400	5,498,400	5,737,700	5,957,700	6,187,700
Data on visitor arrivals are compiled from Disembarkation/Embarkation Forms (IMM 23A) completed by all visitors arriving in Singapore at the point of entry.	4,694,532	5,057,700	5,244,400	5,498,400	5,737,700	5,957,700	6,187,700
Monthly and annual summaries of characteristics of visitor arrivals from major markets are available respectively in the "Singapore Monthly Report on Tourism Statistics" and the "Singapore Annual Report on Tourism Statistics", published by the Singapore Tourism Board (STB).	4,694,532	5,057,700	5,244,400	5,498,400	5,737,700	5,957,700	6,187,700
Visitor Expenditure	5,789,000	6,200,000	6,500,000	6,800,000	7,100,000	7,400,000	7,700,000
Data are collected in the STB's Survey of Overseas Visitors to Singapore. Face-to-face interviews with visitors leaving Singapore by air are conducted throughout the year.	5,789,000	6,200,000	6,500,000	6,800,000	7,100,000	7,400,000	7,700,000
Average Expenditure Per Visitor Per Day: This is obtained by dividing the sum of the total expenditure of those who indicated the total amount spent in Singapore by the sum of the party size and visitor-days.	5,789,000	6,200,000	6,500,000	6,800,000	7,100,000	7,400,000	7,700,000
Definitions:	5,789,000	6,200,000	6,500,000	6,800,000	7,100,000	7,400,000	7,700,000
Form of travel programme sponsored by a company to reward or motivate employees to achieve extraordinary levels of performance.	5,789,000	6,200,000	6,500,000	6,800,000	7,100,000	7,400,000	7,700,000
Incentive travel: This refers to any form of travel programme sponsored by a company to reward or motivate employees to achieve extraordinary levels of performance.	5,789,000	6,200,000	6,500,000	6,800,000	7,100,000	7,400,000	7,700,000
Trade, industrial users and bulk buyers.	5,789,000	6,200,000	6,500,000	6,800,000	7,100,000	7,400,000	7,700,000
Exhibitors: Trade shows, exhibitions and trade fairs are interchangeable terms. An exhibition is defined as an event held during a limited period of time at which a large number of exhibitors display product samples with the ultimate goal of selling to the trade, industrial users and bulk buyers.	5,789,000	6,200,000	6,500,000	6,800,000	7,100,000	7,400,000	7,700,000
Conventions: The terms "congress", "conference", "convention", "symposium" and "seminar" are used interchangeably.	5,789,000	6,200,000	6,500,000	6,800,000	7,100,000	7,400,000	7,700,000
Organised gatherings such as corporate meetings, conventions, congresses, conferences, symposiums, seminars, trade shows, fairs, exhibitions, or incentive meetings.	5,789,000	6,200,000	6,500,000	6,800,000	7,100,000	7,400,000	7,700,000
Events: These refer to any form of organised gatherings such as corporate meetings, conventions, congresses, conferences, symposiums, seminars, trade shows, fairs, exhibitions, or incentive meetings.	5,789,000	6,200,000	6,500,000	6,800,000	7,100,000	7,400,000	7,700,000
Foreign Participants: They refer to foreign nationals who are not permanent residents of Singapore, nor are they based in Singapore; delegates, speakers, observers, and members of the press are included.	5,789,000	6,200,000	6,500,000	6,800,000	7,100,000	7,400,000	7,700,000

TOURISM



- Source: Singapore Tourism Board.
- Notes: Excludes arrivals of Malaysian by land.
- Figures include 1995 Vietnam.
- Data prior to 1991 related to Federal Republic of Germany only.
- Ch. 14.1 Tourism The Commonwealth of Independent States formerly known as Soviet Union.

Visitor Arrivals

Data on visitor arrivals are compiled from Disembarkation/Embarkation Forms (IMM 23A) completed by all visitors arriving in Singapore at the points of entry.

Monthly and annual summaries of characteristics of visitor arrivals from major markets are available respectively in the "Singapore Monthly Report on Tourism Statistics" and the "Singapore Annual Report on Tourism Statistics" published by the Singapore Tourism Board (STB).

Visitor Expenditure

Data are collected in the STB's Survey of Overseas Visitors to Singapore. Face-to-face interviews with visitors leaving Singapore by air are conducted throughout the year.

Definitions

Average Expenditure Per Visitor Per Day : This is obtained by dividing the sum of the total expenditures of those who indicated the total amount spent in Singapore by the sum of the party size and visitor-days.

Events : These refer to any form of organised gatherings such as corporate meetings, conventions, congresses, conferences, symposiums, seminars, trade shows, fairs, exhibitions, or incentive meetings.

Conventions : The terms "congress", "conference", "convention", "symposium" and "seminar" are used interchangeably.

Exhibitions : Trade shows, exhibitions and trade fairs are interchangeable terms. An exhibition is defined as an event held during a limited period of time at which a large number of exhibitors display product samples or services with the ultimate goal of selling to the trade, industrial users and bulk buyers.

Incentive Travel: This refers to any form of travel programme sponsored by a company to reward or motivate employees to achieve extraordinary levels of performance.

Foreign Participants : They refer to foreign nationals who are not permanent residents of Singapore, nor are they based in Singapore; delegates, speakers, observers, and members of the press are included.

14.1

VISITOR ARRIVALS BY REGION AND SELECTED COUNTRY OF RESIDENCE

Region/Country	Thousand						
	1987	1992	1993	1994	1995	1996	1997
Total	3,678.8	5,989.9	6,425.8	6,899.0	7,137.3	7,292.5	7,198.0
America	260.6	367.2	389.6	428.1	425.8	459.5	460.4
Canada	36.6	63.9	63.9	65.5	61.9	65.6	62.5
USA	211.4	287.6	307.4	343.7	345.6	374.1	376.4
Asia	2,344.4	4,127.7	4,470.4	4,918.8	5,231.6	5,319.4	5,201.1
ASEAN ¹	1,074.0	1,810.9	1,940.5	2,141.1	2,189.9	2,255.9	2,327.0
Hong Kong	125.1	232.6	252.8	270.8	279.8	288.6	264.8
India	243.5	195.5	179.7	173.8	188.5	204.2	226.6
Japan	541.4	1,000.8	1,001.0	1,109.4	1,179.0	1,171.9	1,094.0
South Korea	36.4	155.5	198.3	289.6	351.0	384.5	298.4
Pakistan	33.5	40.2	36.4	38.8	51.1	45.9	40.8
Saudi Arabia	19.5	20.7	21.2	21.1	18.7	16.9	15.0
Sri Lanka	28.4	58.1	47.2	47.5	48.8	46.4	47.1
Taiwan	148.4	386.1	427.0	510.8	563.3	528.5	499.8
Europe	619.3	957.6	1,019.6	1,016.7	966.0	1,002.8	987.6
Austria	14.8	19.6	20.6	21.4	21.6	23.0	18.9
Belgium & Luxembourg	12.2	18.3	19.6	21.6	18.9	20.1	22.0
France	47.5	73.8	77.2	77.2	74.6	76.7	73.6
Greece	19.0	15.0	15.1	15.3	14.5	13.9	13.0
Italy	37.3	56.6	64.5	53.5	47.0	41.9	41.4
Netherlands	48.2	78.2	78.6	75.9	70.6	66.1	63.2
Scandinavia	67.9	92.5	90.9	95.0	93.5	102.0	106.2
Switzerland	40.4	60.6	62.5	60.1	54.3	60.7	53.0
United Kingdom	195.2	303.3	310.7	302.0	288.7	312.5	333.2
Germany ²	93.3	160.4	188.2	196.0	190.2	190.6	169.5
CIS ³ & Eastern Europe	26.2	37.9	42.3	51.4	47.0	48.5	46.6
Oceania	421.2	467.1	447.9	434.3	426.6	431.0	462.8
Australia	330.2	385.1	365.1	347.4	346.8	351.6	381.5
New Zealand	76.5	62.0	63.0	69.1	66.2	67.7	70.4
Others	33.4	70.3	98.2	101.1	87.2	79.8	86.1
Africa	31.5	69.7	97.6	100.7	86.9	79.6	70.6

Source : Singapore Tourism Board

Note : Exclude arrivals of Malaysians by land.

1 Figures from 1995 include Vietnam.

2 Data prior to 1991 referred to Federal Republic of Germany only.

3 CIS denotes The Commonwealth of Independent States formerly known as Soviet Union.

14.2 VISITOR ARRIVALS BY (a) SEX AND (b) AGE GROUP

Thousand

	1997	1996	1995	1994	1993	1992	1991	1990	1989
Total	7,198.0	7,292.5	7,137.3	6,899.0	6,425.8	5,989.9	6,422.8	7,137.3	7,292.5
Sex									
Males	4,540.7	4,434.2	4,361.4	4,204.2	3,982.7	3,701.7	4,518.8	4,231.5	4,540.7
Females	2,657.3	2,858.3	2,775.9	2,694.7	2,443.1	2,288.2	2,704.0	2,700.8	2,657.3
Age Group (Years)									
Under 15	485.1	469.9	466.0	439.8	397.5	366.8	484.7	484.7	485.1
15 - 19	202.7	195.1	193.4	186.6	172.4	160.4	210.8	202.7	202.7
20 - 24	516.5	537.1	567.7	561.5	530.0	528.7	516.7	516.5	516.5
25 - 34	1,808.3	1,818.4	1,817.8	1,763.5	1,649.0	1,577.3	1,577.3	1,577.3	1,577.3
35 - 44	1,674.6	1,711.8	1,663.5	1,612.4	1,517.9	1,421.3	1,421.3	1,421.3	1,421.3
45 - 54	1,343.2	1,376.7	1,317.3	1,262.7	1,165.2	1,035.8	1,035.8	1,035.8	1,035.8
55 - 64	755.6	788.2	742.4	706.8	656.1	583.2	583.2	583.2	583.2
65 & Over	364.1	374.0	348.6	338.8	308.2	281.8	281.8	281.8	281.8
Not Stated	47.8	21.3	20.6	27.1	29.5	34.6	34.6	34.6	34.6

Source : Singapore Tourism Board

Note : Exclude arrivals of Malaysians by land.

14.3 VISITOR ARRIVALS BY (a) PURPOSE OF VISIT AND (b) TYPE OF ACCOMMODATION

Thousand

	1987	1992	1993	1994	1995	1996	1997
Total	3,678.8	5,989.9	6,425.8	6,899.0	7,137.3	7,292.5	7,198.0
Purpose of Visit							
Holiday	2,443.5	3,519.1	3,751.9	4,024.1	3,965.4	3,880.2	3,442.2
Business	456.4	792.3	863.0	929.4	1,010.8	1,063.2	1,156.0
Business & Holiday	172.2	199.8	206.6	213.3	212.4	212.3	208.5
Others	300.9	934.4	982.5	1,101.4	1,234.1	1,452.2	1,724.3
In Transit	305.8	544.3	621.8	630.8	714.6	684.7	667.0
Type of Accommodation							
Hotel	2,789.7	4,381.5	4,709.9	5,065.9	5,121.3	5,100.1	4,553.0
Residence of Friends/Relatives	421.2	715.5	743.3	745.5	766.7	764.7	766.1
Others	289.1	564.2	599.3	686.0	806.7	936.4	1,367.1
No Accommodation Required	178.9	328.7	373.3	401.6	442.6	491.3	511.8

Source : Singapore Tourism Board

Note : Exclude arrivals of Malaysians by land.

14.4 VISITOR ARRIVALS BY LENGTH OF STAY

Thousand							
Length of Stay (Days)	1987	1992	1993	1994	1995	1996	1997
Total	3,491.3	5,854.1	6,251.7	6,723.5	6,902.2	7,073.6	6,922.6
Under 1	335.6	802.7	872.6	969.6	1,066.6	1,243.7	1,303.8
1	717.1	1,273.0	1,462.2	1,606.1	1,727.5	1,825.2	1,778.7
2	828.2	1,382.0	1,503.2	1,589.7	1,577.0	1,526.7	1,397.5
3	593.2	958.3	977.2	1,041.3	1,019.2	1,003.6	975.4
4 - 7	682.4	907.1	916.3	994.2	983.3	959.6	949.0
8 - 14	221.1	351.2	339.0	331.3	325.5	316.9	320.5
15 - 29)		103.0	102.1	108.8	121.9	123.1	130.4
30 - 59)	113.6	45.4	44.8	46.9	45.7	41.0	39.9
60 & Over)		31.4	34.3	35.6	35.5	33.7	27.4
Average Length of Stay (Days)	3.4	3.7	3.6	3.5	3.4	3.3	3.3

Source : Singapore Tourism Board

Notes : Exclude arrivals of Malaysians by land.

Refer to visitors who left Singapore during the period specified.

14.5 AVERAGE EXPENDITURE PER VISITOR PER DAY BY COUNTRY OF RESIDENCE

Dollars							
Country	1986	1991	1992	1993	1994	1995	1996
Total	194	282	213	237	216	221	220
ASEAN	169	302	229	271	241	277	255
Australia	189	260	234	230	170	194	184
Canada	154	281	158	164	158	131	147
China	na	na	95	277	138	146	165
France	177	323	210	256	165	164	187
Germany	177	242	201	169	177	155	163
Hong Kong	123	213	136	148	153	154	160
India	222	299	184	286	235	231	216
Italy	199	312	245	196	209	215	226
Japan	263	305	197	244	236	229	221
Netherlands	149	234	185	185	170	143	153
New Zealand	160	240	210	233	180	227	216
South Africa	na	na	na	638	320	358	312
South Korea	na	234	164	163	183	160	307
Switzerland	157	282	216	184	185	213	193
Taiwan	223	232	205	184	256	195	203
United Kingdom	140	187	156	162	141	174	148
USA	206	263	164	180	194	163	181

Source : Singapore Tourism Board

14.6 OUTBOUND DEPARTURES OF SINGAPORE RESIDENTS BY MODE OF TRANSPORT

	1992	1993	1994	1995	1996	Number 1997
Total	1,863,190	2,156,235	2,446,519	2,867,242	3,304,714	3,671,149
Air	1,376,695	1,587,416	1,740,030	1,979,378	2,204,125	2,391,808
Sea	486,495	568,819	706,489	887,864	1,100,589	1,279,341

Source : Singapore Immigration & Registration

14.7 HOTELS AND CESS COLLECTION

	1987	1992	1993	1994	1995	1996	1997
Tourist Hotels ¹							
Number (At End Year)	63	68	70	75	80	89	94
Number of Rooms Available	21,891	23,342	23,959	24,601	25,590	27,010	27,915
Weighted Average Hotel Tariff (\$)							
Single	91.0	179.0	171.0	173.0	183.0	182.0	174.0
Double	93.0	190.0	180.0	181.0	189.0	187.0	178.0
Average Occupancy Rate (%)	68.7	79.8	83.4	86.6	84.1	82.2	79.5
Cess Collected ² (\$ ' 000)	11,503.4	37,258.9	40,483.6	19,748.7	11,896.1	12,494.0	12,512.0
Cess on Food & Beverages ² (\$ ' 000)	26,737.0	53,086.0	59,957.0	28,406.0	17,332.0	16,947.0	16,978.0

Source : Singapore Tourism Board

Customs & Excise Department

¹ Refer to gazetted hotels.

² With effect from 1 April 1994, the rate has been reduced from 4% to 1%.

14.8 CONVENTIONS, EXHIBITIONS AND INCENTIVE GROUPS

								Number
	1986	1991	1992	1993	1994	1995	1996	
Events								
Conventions	418	390	582	702	642	673	996	
Exhibitions	49	67	76	78	96	114	106	
Incentive groups	994	2,447	2,548	3,307	3,348	3,275	3,693	
Foreign Participants								
Conventions	33,206	38,176	34,176	34,864	52,591	56,119	52,004	
Exhibitions	124,436	180,755	249,170	243,476	216,455	230,507	254,996	
Incentive Groups	52,224	84,381	99,025	117,630	113,582	110,798	119,051	

Source : Singapore Tourism Board

FIN

FINANCE

Before 1971, the various monetary functions normally associated with a central bank were performed by several government departments and agencies. To centralize these functions, the Monetary Authority of Singapore (MAS) was established in 1971 to assume the central bank role except for the currency issuing function which remained the responsibility of the Board of Commissioners of Currency. The MAS conducts monetary and exchange rate policies appropriate for steady and non-inflationary economic growth in Singapore. It administers the statutes pertaining to money and banking and formulates policies for the development of a sound banking system and an orderly financial market. It aims to develop Singapore into an international financial centre.

Banking and finance company statistics are compiled from monthly returns submitted to the MAS.

Asian Dollar Market

The Asian Dollar Market was officially established in October 1968 when approval was first given for a bank to operate an Asian Currency Unit (ACU). Since then, merchant banks have also been allowed to operate ACUs. There are now a total of 197 ACUs in operation. Data on ACUs are compiled from returns submitted regularly by the ACU operators to the MAS.

Insurance

The insurance industry is regulated by the MAS under the Insurance Act (Cap 142). The MAS is responsible for supervising and developing the insurance industry in Singapore.

Insurance business in Singapore comprises life and general insurance. The general insurance business covers a wide range of risks such as fire, marine and aviation, motor, workmen's compensation, public liability and personal accident. The main types of insurance plans offered by life insurers are whole life insurance, endowment insurance, term insurance and annuity contracts.

Data on insurance are compiled by the MAS from returns submitted by all insurance companies in Singapore. The MAS also publishes the Annual Report of the Insurance Commissioner which contains a write-up on the performance of the insurance industry during the year, together with detailed statistics. The report is usually available around July of the following year.

More statistics on banking, finance and insurance may also be found in the "Monthly Statistical Bulletin" published by the MAS.

Post Office Savings Bank

The Post Office Savings Bank of Singapore (POSBank) was incorporated under the Post Office Savings Bank of Singapore Act (Chapter 237). The principal functions of the Bank are:

- (a) to carry out the general business of a savings bank and promote saving and encourage thrift; and
- (b) to mobilise domestic savings for the purpose of public development.

Savings in the POSBank are fully guaranteed by the government. Interest earned on savings accounts is tax-exempt. POSBank offers Passbook and Passcard Savings accounts, Save-As-You-Earn and Current accounts. The deposit base at the end of each year includes interest credited.

Central Provident Fund

Please see text in Section 4.

Definitions

Money Supply : Refers to the amount of money in an economy. Narrowly defined, money supply (M1) consists of currency in active circulation and demand deposits. A broad definition of money supply (M2), comprises money supply (M1) and quasi money. The latter includes fixed, savings and other deposits with banks as well as negotiable certificates of deposit in Singapore dollar issued by Singapore banks. Money supply (M3) consists of M2 and net deposits with non-bank financial institutions.

Asian Currency Unit (ACU) : Refers to an operational entity of a financial institution

which has been granted approval by the MAS to participate in the Asian Dollar Market in Singapore. The ACU is essentially a separate accounting unit of a financial institution set up for its transactions in the Asian Dollar Market.

Official Foreign Reserves : Refers to the gold and foreign exchange, Special Drawing Rights and Singapore's reserve position in the International Monetary Fund.

Special Drawing Rights (SDR) : Refers to an international reserve asset created by the IMF and allocated to its members in proportion to their quotas as a supplement to existing reserve assets. The SDR is a unit of account of the IMF. The valuation of the SDR is determined on the basis of a basket of five currencies: the US Dollar, the Deutschmark, the French Franc, the Japanese Yen and the Pound Sterling.

15.1 CURRENCY IN CIRCULATION

(End of Period)

	1987	1992	1993	1994	1995	1996	1997
Gross Circulation (\$m)	5,885.7	8,971.0	9,674.7	10,169.6	10,756.5	11,276.2	11,732.7
Notes	5,561.5	8,411.2	9,073.3	9,520.2	10,053.9	10,520.9	10,928.1
Coins	324.2	559.8	601.4	649.4	702.6	755.4	804.6
Active Circulation ¹ (\$m)	5,439.8	8,279.2	8,942.1	9,420.3	9,906.5	10,293.1	10,703.8
Ratio of Active to Gross Circulation (%)	92.4	92.3	92.4	92.6	92.1	91.3	91.2

Source : Board of Commissioners of Currency, Singapore

- 1 Refer to gross circulation less amounts held by Government treasuries and banks as well as commemorative coins issued by the Board of Commissioners of Currency, Singapore.

15.2 MONEY SUPPLY

(End of Period)

	1987	1992	1993	1994	1995	1996	1997
Money Supply (M1)	11,030.5	18,515.6	22,882.2	23,411.5	25,349.2	27,040.0	27,510.9
Currency in Active Circulation ¹	5,439.8	8,279.2	8,942.1	9,420.3	9,906.5	10,293.1	10,703.8
Demand Deposits of Private Sector	5,590.7	10,236.4	13,940.1	13,991.2	15,442.7	16,746.9	16,807.1
Money Supply (M2)	37,089.2	75,728.5	82,130.3	93,980.6	101,967.3	111,950.8	123,443.4
M1	11,030.5	18,515.6	22,882.2	23,411.5	25,349.2	27,040.0	27,510.9
Quasi-Money	26,058.7	57,212.9	59,248.1	70,569.1	76,618.1	84,910.8	95,932.5
Fixed Deposits	17,407.3	43,176.4	40,321.0	53,622.8	54,908.2	59,987.0	72,704.6
S\$ Negotiable Cert of Deposits	761.2	741.1	835.4	596.2	815.1	844.5	633.5
Savings and Other Deposits	7,890.2	13,295.4	18,091.7	16,350.1	20,894.8	24,079.3	22,594.4
Money Supply (M3)	47,147.9	91,082.1	100,969.4	117,035.1	128,836.6	139,844.7	154,306.0
M2	37,089.2	75,728.5	82,130.3	93,980.6	101,967.3	111,950.8	123,443.4
Net Deposits with Non-bank Financial Institutions ²							
Finance Companies	4,490.5	8,060.9	9,301.3	11,863.8	13,273.7	13,192.0	13,969.3
Post Office Savings Bank	5,568.2	7,292.7	9,537.8	11,190.7	13,595.6	14,701.9	16,893.3

Source : Monetary Authority of Singapore

- 1 Exclude commemorative, numismatic and bullion coins issued by the Board of Commissioners of Currency, Singapore and cash held by commercial banks and other financial institutions.
- 2 Refer to deposits of finance companies and the Post Office Savings Bank less their deposits with banks which have been included in M2.

15.3

CHANGES IN MONEY SUPPLY AND UNDERLYING FACTORS

(Changes During Year)

Million Dollars

	1987	1992	1993	1994	1995	1996	1997
Money Supply (M1)	1,209.2	2,085.6	4,366.6	529.3	1,937.7	1,690.8	470.9
Private Sector							
Bank Credit to Private Sector	2,208.2	6,124.3	10,432.3	12,093.6	18,510.5	17,386.4	16,136.6
Quasi Money	4,925.1	4,100.6	2,035.2	11,321.0	6,049.0	8,292.7	11,021.7
Excess of Lending or of Deposits (-)	-2,716.9	2,023.7	8,397.1	772.6	12,461.5	9,093.7	5,114.9
Public Sector							
Bank Credit to Government	1,310.7	1,821.9	1,170.6	810.7	2,185.6	1,784.0	1,345.4
Government Deposits with Banks	461.3	5,376.1	5,643.6	5,788.7	9,756.3	6,440.2	599.5
Excess of Lending or of Deposits (-)	849.4	-3,554.2	-4,473.0	-4,978.0	-7,570.7	-4,656.2	745.9
Net Foreign Assets of Banking System							
Monetary Authorities ¹	945.1	7,514.2	9,773.7	5,860.3	9,702.0	6,815.6	7,441.4
Banks	1,810.2	1,172.7	-4,391.4	-1,707.3	-7,903.9	-6,343.6	-9,307.6
Others	321.4	-5,070.8	-4,939.8	581.7	-4,751.2	-3,218.7	-3,523.7

Source : Monetary Authority of Singapore

¹ Refer to the Monetary Authority of Singapore and the Board of Commissioners of Currency, Singapore.

15.4 OFFICIAL FOREIGN RESERVES

(End of Period)

Million Dollars

	1987	1992	1993	1994	1995	1996	1997
Total Foreign Reserves	30,441.7	65,788.4	77,866.8	85,165.5	97,336.6	107,750.8	119,616.8
Special Drawing Rights	224.5	203.0	214.9	224.6	240.1	249.5	287.8
Reserve Position in the International Monetary Fund	240.5	346.4	361.2	381.5	430.3	428.8	564.3
Gold & Foreign Exchange	29,976.7	65,239.0	77,290.7	84,559.4	96,666.2	107,072.5	118,764.7

Source : Monetary Authority of Singapore

15.5 EXCHANGE RATES

(Average for the Year)

Currency	1987	1992	1993	1994	1995	1996	1997
Singapore Dollar Per							
Ringgit Malaysia	0.8362	0.6398	0.6277	0.5823	0.5651	0.5605	0.5353
US Dollar	2.1060	1.6290	1.6158	1.5274	1.4174	1.4100	1.4848
Sterling Pound	3.4489	2.8762	2.4271	2.3377	2.2369	2.2017	2.4334
Deutschemark	1.1727	1.0451	0.9781	0.9423	0.9900	0.9377	0.8569
French Franc	0.3506	0.3083	0.2858	0.2754	0.2843	0.2758	0.2546
100 Japanese Yen	1.4595	1.2869	1.4568	1.4951	1.5154	1.2971	1.2277
100 Korean Won	0.2561	0.2087	0.2014	0.1900	0.1838	0.1754	0.1587
100 New Taiwan Dollar	6.6354	6.4724	6.1279	5.7724	5.3382	5.1354	5.1751
Hong Kong Dollar	0.2700	0.2104	0.2089	0.1976	0.1832	0.1823	0.1918
Australian Dollar	1.4758	1.1978	1.0983	1.1166	1.0510	1.1040	1.1025

Source : Monetary Authority of Singapore

15.6 ASSETS OF BANKS

(End of Period)

Million Dollars

	1987	1992	1993	1994	1995	1996	1997
Total	86,483.6	153,302.4	170,250.4	201,952.5	224,578.7	252,723.4	289,722.3
Cash	328.4	543.1	578.3	593.5	688.8	811.2	802.2
Amounts Due from Banks	33,853.1	57,724.2	62,516.6	79,152.9	79,837.0	86,112.6	100,085.3
In Singapore	9,270.5	11,936.4	17,401.5	28,411.2	30,926.6	33,555.1	30,220.6
Outside Singapore ¹	24,582.7	45,787.8	45,115.1	50,741.7	48,910.4	52,557.5	69,864.6
Balances with The Monetary Authority of Singapore	2,153.2	4,764.5	5,198.9	5,564.3	6,471.8	7,095.4	7,702.2
S\$ Negotiable Certificates of Deposit Held	135.5	198.6	180.3	71.0	104.9	198.5	212.5
Investments in Securities & Equities	8,525.3	16,377.1	17,976.0	19,496.4	22,299.0	24,633.3	26,405.7
In Singapore	8,270.6	16,089.2	17,559.8	18,326.6	21,169.8	23,339.4	25,078.2
Outside Singapore	254.7	287.9	416.3	1,169.8	1,129.2	1,293.9	1,327.5
Loans & Advances Including							
Bills Financing	37,868.6	69,138.9	78,454.3	90,974.2	108,974.0	126,987.7	143,243.8
Bills Discounted or Purchased	3,599.6	5,710.3	5,835.8	6,247.8	6,879.2	8,693.4	9,363.5
Payable outside Singapore	1,424.2	1,610.8	1,530.6	1,947.2	2,211.7	2,928.8	3,812.4
Payable inside Singapore	2,175.4	4,099.5	4,305.3	4,300.6	4,667.6	5,764.6	5,551.1
Loans & Advances	34,269.0	63,428.6	72,618.4	84,726.4	102,094.7	118,294.3	133,880.3
All Other Assets	3,619.5	4,556.0	5,346.0	6,100.3	6,203.2	6,884.7	11,270.7

Source : Monetary Authority of Singapore

¹ Include Asian Currency Units.

15.7 LIABILITIES OF BANKS (End of Period)

								Million Dollars	
			1987	1992	1993	1994	1995	1996	1997
Total			86,483.6	153,302.4	170,250.4	201,952.5	224,578.7	252,723.4	289,722.3
Deposits of Non-bank Customers			36,393.0	78,483.2	85,400.8	99,032.2	108,885.5	118,201.5	124,134.8
Demand Deposits			6,657.9	11,635.0	15,765.4	15,787.6	17,537.8	18,862.7	18,289.1
Fixed Deposits			21,008.5	52,136.9	49,877.9	65,083.2	67,389.6	71,802.7	80,089.1
Savings Deposits			8,482.0	14,208.8	16,895.3	16,900.2	23,501.3	27,168.2	25,439.4
Other Deposits			244.6	502.5	2,862.1	1,261.2	456.8	368.0	317.2
S\$ Negotiable Certificates of									
Deposit Issued			896.8	939.7	1,015.7	667.2	920.0	1,043.0	846.0
Amounts Due to Banks			36,397.5	54,397.4	62,264.7	77,295.1	86,063.1	101,576.8	125,908.1
In Singapore			8,560.4	11,862.8	16,626.7	25,125.5	29,881.0	34,328.6	31,134.2
Outside Singapore ¹			27,837.1	42,534.6	45,638.0	52,169.6	56,182.1	67,248.2	94,773.9
All Other Liabilities			12,796.4	19,482.0	21,569.2	24,958.1	28,710.1	31,902.1	38,833.4

Source : Monetary Authority of Singapore

1 Include Asian Currency Units.

15.8 BANKS' LOANS AND ADVANCES TO NON-BANK CUSTOMERS BY INDUSTRY (End of Period)

	Million Dollars						
	1987	1992	1993	1994	1995	1996	1997
Total (Including bills financing)	37,868.6	69,138.9	78,454.3	90,974.2	108,974.0	126,987.7	143,243.8
Agriculture, Mining & Quarrying	111.2	86.5	105.5	119.8	159.3	132.8	187.6
Manufacturing	6,141.3	8,380.4	8,353.4	8,856.2	11,003.1	12,248.2	12,472.0
Building & Construction ¹	7,669.1	17,911.2	23,112.6	28,212.8	34,195.6	41,803.5	49,169.6
General Commerce	10,728.6	17,188.8	17,732.6	19,442.6	21,644.0	23,931.8	26,349.5
Transport, Storage & Communications	818.8	1,939.8	1,837.8	1,902.2	2,178.1	2,618.7	3,575.7
Financial Institutions	5,281.6	11,250.2	13,132.5	13,644.4	16,888.6	19,448.3	20,997.4
Professional & Private Individuals	4,641.5	8,135.5	9,352.8	13,786.0	16,889.5	20,256.1	22,775.4
Others	2,476.5	4,246.5	4,826.9	5,010.2	6,015.8	6,548.3	7,716.5

Source : Monetary Authority of Singapore

Notes : All data on bills financing include bills refinanced by the Monetary Authority of Singapore.

1 Include building and building co-operative societies, building developers, real estate agents and housing loans.

ASSETS AND LIABILITIES OF ASIAN CURRENCY UNITS

(End of Period)

Million US Dollars

	1987	1992	1993	1994	1995	1996	1997
Assets							
Total	244,868.5	355,378.6	386,103.0	416,345.4	478,232.9	506,870.2	557,182.3
Loans to Non-bank Customers	55,010.8	134,184.1	136,857.3	145,822.5	173,264.8	180,505.5	173,246.8
Inter-bank Funds	171,092.9	194,757.7	214,276.8	234,338.5	258,769.9	278,743.1	330,624.7
In Singapore	5,079.7	9,726.4	12,716.9	17,106.7	18,591.6	22,357.2	29,846.3
Inter-Asian Currency Units	26,055.8	26,740.3	31,713.5	36,356.6	39,669.5	40,236.8	48,882.9
Outside Singapore	139,957.4	158,291.1	169,846.4	180,875.2	200,508.8	216,149.1	251,895.5
Other Assets	18,765.0	26,436.8	34,968.9	36,184.4	46,198.2	47,621.5	53,310.9
Liabilities							
Total	244,868.5	355,378.6	386,103.0	416,345.4	478,232.9	506,870.2	557,182.3
Deposits of Non-bank Customers	41,575.5	63,612.2	62,669.0	65,787.8	80,603.6	95,373.8	113,756.2
Inter-bank Funds	192,485.3	279,821.3	308,940.1	333,537.9	376,106.6	389,469.6	414,485.1
In Singapore	6,538.7	18,194.7	18,502.5	22,676.4	25,133.5	25,257.4	32,320.5
Inter-Asian Currency Units	26,056.6	26,741.6	31,716.6	36,354.3	39,670.2	40,243.3	48,905.3
Outside Singapore	159,890.0	234,885.0	258,721.1	274,507.2	311,302.9	323,968.9	333,259.2
Other Liabilities	10,807.6	11,945.1	14,493.9	17,019.7	21,522.7	22,026.8	28,940.9

Source : Monetary Authority of Singapore

	1987	1992	1993	1994	1995	1996	1997
Assets							
Total	7,706.3	13,207.6	14,994.4	18,997.7	21,135.5	21,189.4	22,210.6
Cash	10.8	11.7	12.4	14.8	13.7	14.3	12.8
Balances with The Monetary Authority of Singapore	271.1	493.6	578.7	728.2	836.1	812.7	871.8
Deposits with Banks & Other Institutions	1,592.4	2,207.1	1,802.3	2,333.6	2,666.1	2,165.9	1,904.2
Investments	455.8	702.3	845.5	942.9	1,089.8	1,139.4	1,201.6
Loans & Advances	5,160.0	9,563.7	11,516.8	14,708.6	16,251.9	16,762.7	17,900.2
Hire Purchase Finance	563.0	3,045.9	4,245.8	5,616.1	5,580.2	4,982.4	4,958.8
Housing Loans	1,544.6	1,473.6	1,826.9	2,314.3	2,637.3	3,221.1	3,721.7
Other Loans & Advances	3,052.4	5,044.3	5,444.2	6,778.2	8,034.4	8,559.2	9,219.8
Other Assets	216.1	229.3	238.8	269.7	277.9	294.5	320.0
Liabilities							
Total	7,706.3	13,207.6	14,994.4	18,997.7	21,135.5	21,189.4	22,210.6
Capital & Reserves	1,176.6	1,678.9	1,850.2	2,202.9	2,620.9	3,014.7	3,267.5
Deposits from Individuals & Institutions	5,362.9	9,550.9	10,567.8	13,790.3	15,417.8	15,071.6	15,611.8
Savings Deposits	325.9	342.4	350.5	320.5	348.8	371.6	392.7
Fixed Deposits	4,609.6	8,685.1	9,729.2	12,345.5	13,584.6	13,311.8	15,124.9
Other Deposits	427.3	523.4	488.0	1,124.3	1,484.4	1,388.2	94.2
Other Liabilities	1,166.7	1,977.7	2,576.5	3,004.5	3,096.7	3,103.1	3,331.2

Source : Monetary Authority of Singapore

FINANCE COMPANIES' LOANS AND ADVANCES BY INDUSTRY

(End of Period)

Million Dollars

	1987	1992	1993	1994	1995	1996	1997
Total	2,472.2	3,792.8	4,096.4	5,115.2	6,402.6	7,177.1	7,784.9
Agriculture, Mining & Quarrying	0.8	0.6	0.8	0.4	0.9	0.5	0.1
Manufacturing	249.4	262.5	243.7	228.5	263.3	325.4	419.6
Building & Construction	808.7	879.6	1,096.4	1,243.7	1,508.4	1,799.2	1,897.3
General Commerce	273.5	404.2	395.0	442.7	535.0	635.9	637.8
Transport, Storage & Communications	39.2	219.3	272.3	267.3	313.5	318.7	359.2
Financial Institutions	229.9	700.6	589.5	742.7	953.3	1,156.3	1,319.4
Professional & Private Individuals	646.5	980.8	1,180.3	1,907.7	2,568.6	2,585.6	2,766.7
Others	224.0	345.2	318.3	282.2	259.5	355.5	384.9

Source : Monetary Authority of Singapore

15.12 ASSETS AND LIABILITIES OF MERCHANT BANKS

(End of Period)

Million Dollars

	1987	1992	1993	1994	1995	1996	1997
Assets							
Total	32,119.5	36,786.7	42,205.3	45,049.4	50,253.1	53,580.6	66,662.0
Amounts Due from Banks	12,067.2	11,343.3	15,828.2	18,590.9	21,678.6	21,796.7	28,222.0
In Singapore	472.6	616.8	609.0	997.6	715.2	771.9	1,221.3
Outside Singapore ¹	11,594.6	10,726.5	15,219.2	17,593.3	20,963.4	21,024.8	27,000.7
Loans & Advances to Non-bank Customers	12,861.7	15,691.2	11,545.8	13,138.8	15,258.2	17,348.9	21,777.5
Securities & Equities	5,914.1	9,045.7	13,547.4	10,880.2	10,550.1	11,678.3	14,339.0
Other Assets	1,276.5	706.4	1,283.9	2,439.4	2,766.3	2,756.7	2,323.5
Liabilities							
Total	32,119.5	36,786.7	42,205.3	45,049.4	50,253.1	53,580.6	66,662.0
Capital & Reserves	4,574.2	4,777.7	5,777.4	5,704.7	6,089.9	6,646.0	8,331.4
Amounts Due to Banks	19,461.9	19,286.3	27,473.3	28,668.5	30,543.6	34,571.8	41,111.3
In Singapore	678.4	499.7	471.2	399.0	657.5	481.5	974.2
Outside Singapore ¹	18,783.5	18,786.6	27,002.1	28,269.5	29,886.1	34,090.3	40,137.1
Borrowings from Non-bank Customers	6,221.9	11,099.4	6,711.3	7,453.2	8,779.6	9,030.0	13,820.6
Other Liabilities	1,861.5	1,623.3	2,243.4	3,223.0	4,840.0	3,332.9	3,398.8

Source : Monetary Authority of Singapore

Notes : Data include operations of Asian Currency Units of merchant banks.

Provision of corporate financial advisory services, underwriting and operations in the gold market are not reflected in the data.

¹ Include Asian Currency Units.

15.13

DOMESTIC INTEREST RATES

(End of Period)

							Per Cent Per Annum	
							1987	1992
							1993	1994
							1995	1996
							1997	
Banks ¹								
Prime Lending Rate								
Deposit Rates								
3 Months								
6 Months								
12 Months								
Savings Deposit Rate								
Finance Companies								
Deposit Rates ²								
Up to 3 Months								
12 Months								
POSBank Deposit Rate								
Up to \$100,000								
Exceeding \$100,000								

Source : Monetary Authority of Singapore

Post Office Savings Bank

1 Refer to the average quoted by 10 leading banks.

2 Refer to the average quoted by 10 leading finance companies.

15.14 NUMBER OF ACCOUNTS AND DEPOSITS OF POST OFFICE SAVINGS BANK

	1987	1992	1993	1994	1995	1996	1997
Number of Accounts ('000) (End of Period)	3,398	4,533	4,792	4,981	5,190	5,440	5,719
Transaction Volume ('000)	71,586	135,681	164,391	182,584	194,519	216,057	243,049
Net Deposit Inflow (\$ Million)	341	2,073	1,824	-450	1,565	2,059	386
Total Deposit Base (\$ Million) ¹ (End of Period)	11,281	18,127	20,310	20,269	22,335	24,898	25,833

Source : Post Office Savings Bank

Notes : Data refer to Savings Accounts and include Current Accounts from 1984.

Current Accounts were implemented on 16 February 1984.

1 Include interest credited at end of year.

15.15 CONTRIBUTIONS AND WITHDRAWALS OF CENTRAL PROVIDENT FUND

	Million Dollars						
	1987	1992	1993	1994	1995	1996	1997
Amount							
Contributed	4,446.8	9,028.2	10,427.0	11,278.5	13,536.1	14,623.0	15,873.8
Withdrawn	4,297.2	5,413.0	10,943.9	7,292.0	7,252.7	10,529.6	11,456.5
Due to Members (End of Period)	30,607.8	51,526.9	52,334.3	57,649.2	66,035.4	72,566.6	79,657.4

Source : Central Provident Fund Board

Note : Large amount withdrawn in 1993 and 1996 was due to members who withdrew their funds under the Investment Schemes (in 1993) and for the purchase of the Singapore Telecom shares (in 1993 & 1996).

	1987	1992	1993	1994	1995	1996	1997
Million Dollars							
Total	4,297	5,413	10,944	7,292	7,253	10,530	11,457
Housing Scheme ¹							
Public Housing	1,408	2,139	1,822	1,875	2,782	3,000	3,460
Residential Properties	1,239	1,475	1,688	1,626	1,809	2,059	2,327
Reached 55 Years of Age ²	548	773	928	1,079	1,112	1,205	1,070
Leaving Singapore & Malaysia							
Permanently ³	144	161	178	202	241	310	350
Death	49	73	73	84	88	109	116
Medisave Scheme	141	238	250	276	296	316	339
Others ^{1,4}	769	554	6,006	2,151	925	3,532	3,794
Number							
Housing Schemes ⁵							
Public Housing	45,111	56,537	49,477	54,241	59,720	55,178	53,544
Residential Properties	12,287	18,092	21,121	18,631	18,482	17,773	17,867
Reached 55 Years of Age ²	24,399	31,924	49,483	43,060	137,829	101,757	117,592
Leaving Singapore & Malaysia							
Permanently ³	5,070	4,629	5,110	5,859	7,799	8,841	8,218
Death	3,141	4,915	4,802	6,101	6,207	10,545	12,446

Source : Central Provident Fund Board

- 1 Refer to net amount withdrawn (gross amount withdrawn less amount refunded) by members in the year.
- 2 Include first and subsequent withdrawals. In 1995, the increase in the number of withdrawals was due to the withdrawal of the government top-up under Sotus II and CPF top-up scheme.
- 3 Include Malaysians leaving Singapore permanently.
- 4 Include withdrawals by persons who are physically/mentally incapacitated and under the various CPF schemes - Minimum Sum, MediShield, Home Protection, Dependents' Protection, Education, Non-Residential Properties, Investment and DelGro Corporation Ltd shares. Amount withdrawn in 1993 increased largely because of Singapore Telecom shares offer.
- 5 Refer only to members who joined the scheme in the year.

	1987	1992	1993	1994	1995	1996	1997
Million Units							
Total	9,758.0	13,904.3	66,398.3	45,540.3	33,918.6	26,881.0	40,185.4
Industrial	5,384.7	7,177.9	33,171.0	21,368.2	19,272.4	13,716.7	20,239.4
Finance	1,131.7	1,487.1	6,584.9	5,419.0	3,506.8	3,145.0	5,902.6
Hotels	577.3	524.6	2,925.9	2,052.3	1,106.3	713.0	790.8
Properties	1,167.7	2,360.4	12,563.5	7,890.6	3,764.7	4,834.7	5,954.4
Mining	140.9	62.2	133.5	36.7	87.8	213.2	153.7
Plantation	416.9	440.6	3,509.0	1,426.5	899.5	439.9	813.2
Debentures, Loan Stocks & Bonds	938.8	1,851.5	7,510.5	7,347.0	5,281.1	3,818.4	6,331.0
Million Dollars							
Total	22,478.2	29,443.8	127,797.1	123,520.5	83,866.3	76,999.2	94,846.8
Industrial	12,510.5	16,704.0	67,663.9	60,834.4	46,450.6	38,320.3	44,087.5
Finance	5,261.8	6,038.3	20,027.6	21,654.7	15,843.9	16,310.6	26,189.4
Hotels	835.0	973.4	5,626.5	5,455.5	2,212.5	1,945.3	1,627.3
Properties	2,202.2	3,577.4	20,468.0	20,765.1	11,391.3	14,551.0	14,965.9
Mining	268.8	87.8	277.6	113.0	251.4	705.4	376.5
Plantation	804.9	557.2	5,823.8	4,048.7	2,093.2	1,164.6	1,787.0
Debentures, Loan Stocks & Bonds	595.0	1,505.7	7,909.7	10,649.1	5,623.4	4,002.0	5,813.4

Source : The Stock Exchange of Singapore

15.18

STOCK EXCHANGE OF SINGAPORE INDICES (1975=100)

	1987	1992	1993	1994	1995	1996	1997
All Shares	330.5	386.2	476.7	567.6	514.0	558.6	492.3
Industrial	299.3	383.6	476.6	521.8	458.8	506.1	438.7
Finance	355.6	369.1	452.8	608.6	558.2	557.0	503.6
Hotels	355.2	490.6	540.0	689.8	677.4	718.7	651.7
Properties	354.2	292.6	389.4	591.8	598.5	698.7	630.3

Source : The Stock Exchange of Singapore

Note : Data from 1990 are computed based on the share prices of all listed Singapore companies.

15.19

PLEDGES AT PAWNSHOPS

	1987	1992	1993	1994	1995	1996	1997
Pledges (' 000)							
Received	2,211.4	2,474.3	2,602.2	2,610.1	2,653.7	2,709.7	2,677.5
Redeemed	2,103.1	2,221.8	2,286.9	2,346.9	2,323.0	2,394.4	2,292.0
Amount of Loans (\$m)							
Given Out	586.7	762.1	856.2	954.2	1,022.7	1,097.3	1,133.0
Redeemed including Interest	584.5	742.2	801.7	909.1	973.1	1,041.6	1,021.4

Source : Registry of Pawnbrokers

	1986	1991	1992	1993	1994	1995	1996
Thousand							
Policies in Force (End of Period)	463	1,263	1,537	1,823	2,126	2,454	2,792
New Policies	93	264	335	381	391	417	440
Policies Matured or Discontinued	35	56	61	96	88	90	101
Million Dollars							
Policies in Force							
Amount Insured (End of Period)	23,440	73,256	88,786	103,893	125,382	146,426	169,868
Premiums	424	1,393	1,712	2,070	2,547	3,016	3,538
New Policies							
Amount Insured	6,070	18,638	21,358	24,474	27,237	28,866	34,940
Premiums	98	334	397	485	578	584	657
Policies Matured or Discontinued							
Amount Insured	2,097	4,837	5,825	8,322	6,817	8,944	11,498
Premiums	37	64	79	126	101	118	135

Source : Monetary Authority of Singapore

Million Dollars

	1986	1991	1992	1993	1994	1995	1996
Revenue							
Total	2,069	5,418	6,802	8,823	11,220	13,911	17,130
Balance of Revenue Account at Beginning of Year	1,463	3,728	4,542	5,662	7,332	9,483	12,006
Premiums	398	1,370	2,042	2,493	3,020	3,523	4,215
Net Interest, Dividends & Rents	110	245	265	327	409	476	559
Miscellaneous	97	74	-47	340	459	429	350
Expenditure							
Total	2,069	5,418	6,802	8,823	11,220	13,911	17,130
Claims on Death, Disability & Maturity	86	256	333	379	439	522	622
Surrenders	64	74	85	119	161	191	262
Cash Bonuses & Annuities	7	25	28	39	49	55	63
Management Expenses							
Commission	92	324	409	523	647	697	788
Salaries	19	54	59	66	78	92	107
Others	26	94	104	116	157	162	177
Miscellaneous	54	49	122	248	206	186	274
Balance of Revenue Account at End of Year	1,721	4,542	5,662	7,332	9,483	12,006	14,837

Source : Monetary Authority of Singapore

15.22 ASSETS OF LIFE INSURANCE FUNDS

(End of Period)

	1986	1991	1992	1993	1994	1995	1996
Total	1,852	4,936	6,290	8,249	10,481	13,228	16,303
Land & Buildings	60	131	237	312	497	884	1,174
Loans	443	963	1,074	1,204	1,621	2,089	2,519
On Mortgages	240	355	433	580	818	1,021	1,293
On Policies	179	333	390	470	582	713	866
Others	24	276	251	153	220	355	360
Investments	935	2,686	3,905	5,164	6,124	7,404	9,000
Government & Statutory Authorities	457	1,065	1,424	1,418	1,222	1,231	896
Debentures & Shares ¹	478	1,622	2,481	3,745	4,902	6,173	8,104
Cash & Deposits	355	957	838	1,290	1,915	2,496	3,168
Miscellaneous (including Outstanding Premiums) ²	59	199	236	279	324	355	442

Source : Monetary Authority of Singapore

1 Include other investments.

2 Include furniture.

Million Dollars

	1986	1991	1992	1993	1994	1995	1996
Net Premiums ¹							
Total	421	750	831	968	1,099	1,221	1,306
Marine, Aviation or Transit	63	104	113	128	138	148	153
Others	359	646	719	840	961	1,073	1,153
Fire	72	94	100	105	111	121	130
Motor Vehicles	148	316	349	397	458	497	492
Miscellaneous	138	237	270	339	392	455	531
Net Claims ²							
Total	230	361	419	491	509	525	582
Marine, Aviation or Transit	26	53	53	50	48	43	51
Others	205	308	367	441	461	482	531
Fire	30	37	30	39	37	34	43
Motor Vehicles	100	169	208	247	264	277	300
Miscellaneous	75	103	129	156	160	171	188

Source : Monetary Authority of Singapore

- 1 Refer to gross premiums less premiums paid for re-insurance in and out of Singapore.
- 2 Refer to gross claims paid less recoveries from re-insurance placed in and out of Singapore.

REVENUE AND EXPENDITURE ACCOUNTS OF GENERAL INSURANCE FUNDS

	Million Dollars						
	1986	1991	1992	1993	1994	1995	1996
Revenue							
Total	1,237	2,237	2,543	2,926	3,298	3,597	3,999
Balance of Revenue Account at Beginning of Year	96	330	425	547	661	758	862
Reserves for Unexpired Risks at Beginning of Year	200	310	326	358	439	488	545
Loss Reserves at Beginning of Year	421	697	755	831	932	1,003	1,108
Net Premiums Written	421	750	831	968	1,099	1,221	1,306
Net Interest, Dividends & Rents	47	83	76	77	94	94	103
Miscellaneous	52	67	130	146	73	33	75
Expenditure							
Total	1,237	2,237	2,543	2,926	3,298	3,597	3,999
Net Claims Settled, Loss Reserves at End of Year	677	1,118	1,253	1,422	1,515	1,640	1,792
Management Expenses							
Commission	69	116	127	143	150	161	171
Others	110	176	201	225	272	297	332
Miscellaneous	58	74	54	38	112	81	111
Balance of Revenue Account at End of Year	125	428	550	661	760	871	1,009
Reserves for Unexpired Risks at End of Year	196	326	358	437	489	547	584

Source : Monetary Authority of Singapore

15.25

ASSETS OF GENERAL INSURANCE FUNDS (End of Period)

Million Dollars

	1986	1991	1992	1993	1994	1995	1996
Total	985	1,844	2,252	2,606	2,931	3,291	3,610
Land & Buildings	36	72	108	120	135	194	202
Loans	14	20	15	14	42	53	66
Investments	369	742	860	979	1,185	1,306	1,428
Government & Statutory Authorities	187	332	379	350	346	320	273
Debentures & Shares	183	410	482	629	839	986	1,155
Cash & Deposits	430	773	923	1,119	1,155	1,276	1,435
Miscellaneous	137	237	345	375	414	462	479

Source : Monetary Authority of Singapore

For the Year of Assessment 1997, the corporate income tax rate is 25 per cent. There are various tax incentives in the form of tax exemptions and concessional tax rates to promote capital investments, export of services, development of financial and consultancy services, research and development and overseas ventures.

(ii)

The Government has concluded comprehensive agreements for the avoidance of double taxation with countries which have entered into such agreements in force.

Under the Goods and Services Tax (GST) which is implemented since 1 April 1994, the Government has introduced a new tax to broaden the revenue base and to shift the tax burden from direct taxes to indirect taxes. The GST is imposed on almost all goods and services supplied in Singapore except the sale and lease of residential properties and certain financial services which are exempt. International services and exports of goods are zero-rated (i.e. GST is charged at zero per cent).

Government revenue is credited to and current expenditures paid out of the Consolidated Revenue Account.

Development Fund

The Development Fund is established by the Development Fund Act.

The Development Fund in the Government Financial Statements cover the period from 1 April of the year to 31 March of the following year. Data are obtained from ministries and captured into the government's accounting system which produces the actual figures for the Development Fund.

Government Revenue and Expenditure

The main revenue collecting agencies are the Customs and Excise Department and the Inland Revenue Authority of Singapore (IRAS). The former is responsible for the collection of import and excise duties on liquor, tobacco, petroleum, motor vehicles, film hire and entertainment duties. The IRAS is responsible for the collection of income tax, property tax, goods and services tax, estate and stamp duties. Other revenue is derived from lotteries, land and water rates, and all such dues are promptly collected.

Residents of Singapore pay personal income tax at progressive rates on the income for the preceding year after appropriate deductions have been made. Residents in this context refer to persons having stayed in Singapore for a period of 6 months or more during the reference year. For the Year of Assessment 1997, the tax rates range from 2% to 28% and a once-off tax rebate is given. This rebate is in addition to the \$250 rebate granted to offset Goods and Services Tax (GST). Deductions include allowances for personal relief, earned income, maintenance of wife, children and dependants, delivery and hospitalisation expenses for a new born child, life insurance premiums, contributions to the Central Provident Fund (CPF) or other approved pension or provident funds, payments to top up an individual's or his parents' retirement account under the CPF Minimum Sum Scheme, course fees and foreign maid levy. Special rebates are also available for newborn second, third and fourth children. Non-resident individuals are not entitled to personal reliefs and are normally taxed at a flat rate (12 per cent on employment income and from the Year of Assessment 1997, 26 per cent on other income).

Government Revenue and Expenditure

The main revenue-collecting agencies are the Customs and Excise Department and the Inland Revenue Authority of Singapore (IRAS). The former is responsible for the collection of import and excise duties on liquor, tobacco, petroleum, motor vehicles, film hire and entertainment duties. The IRAS is responsible for the collection of income tax, property tax, goods and services tax, estate and stamp duties, duties on sweepstakes and lotteries. It also ensures that liabilities of all persons for tax, duty, levy or fee are speedily and correctly assessed, and that all such dues are promptly collected.

Residents of Singapore pay personal income tax at progressive rates on the income of the preceding year after appropriate deductions have been made. Residents in this context refer to persons having stayed in Singapore for a period of 6 months or more during the reference year. For the Year of Assessment 1997, the tax rates range from 2% to 28% and a once-off tax rebate is given. This rebate is in addition to the \$550 rebate granted to offset Goods and Services Tax (GST). Deductions include allowances for personal relief, earned income, maintenance of wife, children and dependants, delivery and hospitalisation expenses for a new born fourth child, life insurance premiums, contributions to the Central Provident Fund (CPF) or other approved pension or provident funds, payments to top up an individual's or his parents' retirement account under the CPF Minimum Sum Scheme, course fees and foreign maid levy. Special rebates are also available for newborn second, third and fourth children. Non-resident individuals are not entitled to personal reliefs and are normally taxed at a flat rate (15 per cent on employment income and from the Year of Assessment 1997, 26 per cent on other income).

For the Year of Assessment 1997, the corporate income tax rate is 26 per cent. There are various tax incentives in the form of tax exemptions and concessionary tax rates to promote capital investments, export of services, development of financial and consultancy services, research and development and overseas ventures.

The government has concluded comprehensive agreements for the avoidance of double taxation with countries which have trading and other interests in Singapore. There are currently 36 such agreements in force.

A 3 per cent Goods and Services Tax (GST) has been introduced since 1 April 1994 to broaden the revenue base and to shift the reliance from direct taxes to indirect taxes. The tax is imposed on almost all goods and services supplied in Singapore except the sale and lease of residential properties and certain financial services which are exempt. International services and exports of goods are zero-rated (i.e. GST is charged at zero per cent).

Government revenue is credited to and current expenditure paid out of the Consolidated Revenue Account.

Development Fund

The Development Fund is established by the Development Fund Act.

The Development Fund in the Government Financial Statements cover the period from 1 April of the year to 31 March of the following year. Data are obtained from ministries and captured into the government's accounting system which produces the actual figures for the Development Fund.

16 PUBLIC FINANCE (cont'd)

The sources of funds for the Development Fund are :

- (i) moneys appropriated from time to time from the Consolidated Fund;
- (ii) proceeds of any loan raised for the purposes of the fund and appropriated to such purposes by the law raising the loan;
- (iii) interest and other incomes from investments of the fund and profits arising from realization of any such investments; and
- (iv) re-payments of any loans made from the fund or payments of interest on such loans.

The Fund may be used for :

- (i) construction, improvement, acquisition or replacement of capital assets (eg buildings, vehicles, aircraft, machinery, rolling-stock, roads) required in respect of or in connection with the economic development or general welfare of Singapore;
- (ii) acquisition of land and of any right or interest in or over land and in respect of the use of any invention; and
- (iii) grants and loans to, or investments in any public authority or corporation for any of the purposes mentioned in (i) and (ii) above.

16.1 GOVERNMENT OPERATING REVENUE

Million Dollars

	1992	1993	1994	1995	1996	1997
Total ¹	17,218.4	19,527.2	23,280.2	24,781.6	28,038.3	30,612.7
Tax Revenue	13,758.8	15,453.7	18,605.0	19,578.6	21,919.5	24,441.4
Income Tax	6,863.2	7,190.1	8,603.2	8,766.1	9,539.0	11,464.3
Corporate & Personal						
Income Tax	6,142.1	6,748.9	8,055.4	8,138.3	8,904.0	9,520.4
Contributions by Statutory Boards	721.1	441.2	547.8	627.8	635.0	1,943.9
Assets Taxes	1,465.4	1,676.4	1,750.1	1,838.9	1,629.6	2,403.4
Taxes on Motor Vehicles ²	1,502.9	1,884.6	1,965.5	1,817.5	2,443.5	1,765.8
Customs & Excise Duties	1,525.8	1,667.5	1,560.8	1,597.5	1,646.4	1,676.5
Betting Taxes	694.9	823.4	884.5	981.6	1,151.4	1,256.7
Stamp Duty	603.6	983.3	1,275.0	1,364.3	1,834.5	1,694.5
Goods & Services Tax ³	-	-	1,110.7	1,647.4	1,788.3	1,989.2
Others	1,103.0	1,228.4	1,455.2	1,565.3	1,886.9	2,191.0
Fees & Charges	2,209.7	3,017.9	3,690.7	3,665.0	4,055.9	4,030.5
Other Receipts ⁴	1,249.9	1,055.6	984.5	1,538.0	2,062.9	2,140.8

Source : Ministry of Finance

- 1 Operating revenue refers to receipts credited to the Consolidated Revenue Account, Development Fund Account and Sinking Fund Account, but excludes Investment Income and Capital Receipts.
- 2 Taxes on motor vehicles comprise additional registration fees, road tax, special tax on heavy-oil engine, passenger vehicle seating fees and non-motor vehicle licences, but exclude import duties on motor vehicles which are classified under Customs and Excise Duties.
- 3 Goods and Services Tax was implemented on 1 April 1994.
- 4 Other Receipts exclude repayment of direct loans and advances but include Interest on Loans.

16.2

GOVERNMENT OPERATING EXPENDITURE

Million Dollars

	1992	1993	1994	1995	1996	1997
Total ¹	8,485.6	9,144.0	9,699.8	10,883.7	12,253.6	15,159.0 ²
Security	3,866.3	4,405.4	4,412.6	5,245.9	6,215.6	6,667.3
Social & Community Services	3,458.5	3,388.0	3,811.1	4,119.9	4,387.8	5,221.7
Education	2,461.5	2,171.3	2,422.8	2,677.7	2,848.4	3,352.6
Health	516.9	634.5	724.9	685.0	701.8	979.2
Environment	208.4	222.0	249.7	273.8	289.5	303.9
Public Housing	60.5	109.3	125.0	164.0	150.0	148.0
Others	211.2	250.9	288.7	319.4	398.1	438.0
Economic Services	440.6	432.9	573.6	688.3	910.7	1,009.4
National Development	261.5	273.2	325.3	357.1	268.8	310.9
Communications	38.9	37.7	44.9	76.4	277.3	311.4
Trade & Industry	108.8	88.8	165.1	214.2	315.8	336.5
Labour	31.4	33.2	38.3	40.6	48.8	50.6
General Services	427.3	606.1	563.8	720.3	739.5	760.6
Pensions	292.9	311.6	338.7	109.3	-	-

Source : Ministry of Finance

1 Government operating expenditure refers to Expenditure on Manpower, Other Operating Expenditure (excluding expenses on investment and agency fees on land sales), Grants-in-Aid and Pensions (up to first quarter 1995).

2 Figure for 1997 includes one-off compensation of \$1.5 billion paid to Singapore Telecom for early termination of its exclusive telecommunication privileges.

	1992	1993	1994	1995	1996	1997
Total	34,774.3	37,238.2	36,873.0	35,344.4	36,307.6	36,337.9
Singapore Registered Stocks	34,021.3	36,380.2	36,851.7	35,300.8	36,270.9	36,202.7
Treasury Bills & Deposits	2,763.0	8,940.0	4,990.0	5,000.0	5,300.0	7,000.0
Advance Deposits	1,169.8	5,928.0	7,000.0	13,000.0	12,000.0	12,000.0
Federal	303.2	24.3	11.6	4.7	-	-
OE Special Aid	62.0	15.7	9.9	6.7	-	-
World Bank	72.4	3.1	1.7	-	-	-
Asian Development Bank	60.0	3.4	-	-	-	-
Regional Market Loan	61.3	-	-	-	-	-
Others	479.8	6.2	-	-	-	-

Source : Accounting General's Department

The Ministry of Finance, Singapore

Figures were compiled at year-end prices

16.3 GOVERNMENT DEVELOPMENT EXPENDITURE

	1992	1993	1994	1995	1996	1997
Total ¹	3,794.8	3,410.3	4,418.3	4,671.3	6,920.7	10,705.9
Security	386.1	410.6	488.7	379.6	786.5	1,216.0
Social & Community Services	1,593.4	1,456.1	1,713.6	2,044.7	3,134.9	2,823.3
Education	559.5	662.8	753.5	779.6	646.4	909.2
Health	164.8	115.8	202.9	326.9	356.0	266.4
Environment	231.7	190.4	219.2	282.7	520.6	649.2
Public Housing	565.5	395.9	440.2	498.1	1,021.2	717.7
Others	71.9	91.2	97.8	157.4	590.7	280.8
Economic Services	1,539.2	1,190.8	1,754.4	1,816.7	1,986.2	3,201.3
National Development	481.7	586.3	390.5	375.5	174.1	117.2
Communications	600.5	332.1	824.3	788.1	787.6	1,261.5
Trade & Industry	211.9	103.7	312.1	386.1	501.3	1,161.8
Labour	0.7	0.5	3.2	1.7	0.9	3.0
Research & Development	244.4	168.2	224.3	264.7	522.3	657.8
General Services	276.1	352.8	461.6	430.3	1,013.1	3,465.3

Source : Ministry of Finance

1 Government development expenditure excludes loans to statutory boards, industrial and commercial enterprises.

16.4 SOURCES AND USES OF DEVELOPMENT FUND

Million Dollars

	1987	1992	1993	1994	1995	1996	1997
Balance (Beginning of Financial Year)	10,295	48,677	47,238	44,431	36,351	25,770	48,616
Sources							
Total	36,482	4,936	5,053	3,070	5,596	16,685	24,183
Consolidated Revenue Account	1,544	-	-	-	-	12,331	17,729
Consolidated Loan Account	30,826	-	-	-	-	-	-
Others	4,112	4,936	5,053	3,070	5,596	4,354	6,454
Uses							
Total	7,087	6,375	7,860	11,150	16,177	20,030	24,628
Government Development Expenditure	5,548	3,649	3,895	3,971	5,962	9,128	8,905
Loans to Statutory Boards & Enterprises	1,539	2,226	3,966	7,179	9,215	10,902	15,723
Others	-	500	-	-	1,000	-	-

Source : Accountant-General's Department

Note : Data refer to the financial year which begins in April of the current year and ends in March of the following year.

16.5 GOVERNMENT DEBT (End of Period)

Million Dollars

	1987	1992	1993	1994	1995	1996	1997
Total	38,274.3	67,252.5	69,822.0	75,344.4	86,507.6	94,830.7	102,371.9
Domestic	37,971.1	67,228.2	69,810.4	75,339.7	86,507.6	94,830.7	102,371.9
Singapore Registered Stocks	34,021.3	56,360.2	56,851.7	56,501.9	59,701.9	67,853.9	73,305.7
Treasury Bills & Deposits	2,780.0	4,940.0	4,990.0	5,000.0	5,750.0	5,990.0	6,920.0
Advance Deposits	1,169.8	5,928.0	7,968.7	13,837.8	21,055.7	20,986.8	22,146.2
External ¹	303.2	24.3	11.6	4.7	-	-	-
UK Special Aid	62.0	15.5	9.9	4.7	-	-	-
World Bank	72.4	5.1	1.7	-	-	-	-
Asian Development Bank	60.0	3.4	-	-	-	-	-
Capital Market Loan	61.8	-	-	-	-	-	-
Others	47.0	0.3	-	-	-	-	-

Source : Accountant-General's Department

The Monetary Authority of Singapore

¹ Figures were computed at market rates.

16.6

REVENUE COLLECTED BY CUSTOMS AND EXCISE DEPARTMENT

								Million Dollars
1987	1992	1993	1994	1995	1996	1997		
Total	962	1,576	1,721	1,602	1,630	1,682	1,698	
Import & Excise Duties								
Liquors	219	283	281	302	313	327	359	
Tobacco	215	336	340	327	348	394	405	
Petroleum	335	558	585	565	563	587	615	
Motor Vehicles	114	301	416	375	369	340	289	
Others	49	62	58	3	2	3	2	
Entertainment Duties	15	15	16	9	5	5	5	
Film Hire Duty	4	7	8	4	-	-	-	
Licence Fees	7	9	11	12	12	16	15	
Anti-Dumping Duty ¹	-	-	-	-	10	2	2	
Miscellaneous Receipts	4	6	6	5	8	9	7	

Source : Customs and Excise Department

1 Duty collected with effect from 27 January 1995 for selected items.

16.7

REVENUE COLLECTED BY INLAND REVENUE AUTHORITY

	Million Dollars						
	1987	1992	1993	1994	1995	1996	1997
Total	3,759	8,936	10,270	13,081	13,985	15,279	16,857
Income Tax ¹	2,339	6,150	6,798	8,057	8,148	8,893	9,533
Property Tax ²	678	1,440	1,644	1,706	1,776	1,564	2,356
Goods & Services Tax ³	-	-	-	1,110	1,649	1,761	1,959
Estate Duty	26	26	46	39	59	76	55
Stamp Duty	411	621	972	1,282	1,356	1,843	1,699
Betting, Sweepstakes & Private Lotteries ⁴	282	699	810	887	998	1,144	1,255
Others ⁵	24	-	-	-	-	-	-

Source : Inland Revenue Authority of Singapore.

1 Include compounding fees and court attendance fees.

2 Include compounding fees and surcharges on property tax, search and valuation fees, Auctioneers, Appraisers and House Agent Licence fees and court attendance fees.

3 Goods & Services tax was implemented on 1 April 1994.

4 Include duty on Toto sales.

5 Include Skills Development Levy. With effect from June 1991, exclude Skill Development Levy as Inland Revenue Authority is no longer collecting this item.

16.8

TAXPAYERS, ASSESSED INCOME AND GROSS TAX ASSESSED, 1996

	Total	Individuals	Companies	Trusts	Clubs & Associations
Taxpayers (No)	530,774	506,490	22,361	608	1,315
Resident	521,662	498,153	21,589	605	1,315
Non-resident	9,112	8,337	772	3	-
Assessed Income (\$m)	52,244	29,518	22,581	23	121
Resident	49,817	29,382	20,291	23	121
Non-resident	2,426	136	2,291	-	-
Gross Tax Assessed (\$m)	8,349	3,021	5,290	6	32
Resident	7,890	2,993	4,859	6	32
Non-resident	459	28	431	-	-

Source : Inland Revenue Authority of Singapore

Note : Resident individuals whose chargeable income for Year of Assessment 1996 not exceeding \$13,809 need not pay income tax due to one-off 10% rebate plus \$600 GST rebate.

16.9

ASSESSED INCOME AND GROSS TAX ASSESSED ON INDIVIDUALS BY ASSESSED INCOME GROUP, 1996

	Assessed Income Group (\$)					
	Total	6,000 & below	6,001 - 8,000	8,001 - 10,000	10,001 - 15,000	15,001 - 20,000
Taxpayers (No)	506,490	4,138	691	453	646	8,900
Resident	498,153	-	-	-	-	8,465
Non-resident	8,337	4,138	691	453	646	435
Assessed Income (\$m)	29,518	12	5	4	8	167
Resident	29,382	-	-	-	-	159
Non-resident	136	12	5	4	8	8
Gross Tax Assessed (\$m)	3,021	2	1	1	2	8
Resident	2,993	-	-	-	-	6
Non-resident	28	2	1	1	2	2

	Assessed Income Group (\$)					
	20,001 - 30,000	30,001 - 50,000	50,001 - 100,000	100,001 - 200,000	200,001 - 1,000,000	1,000,001 & above
Taxpayers (No)	122,483	199,342	116,953	37,512	14,974	398
Resident	121,849	198,676	116,408	37,398	14,960	397
Non-resident	634	666	545	114	14	1
Assessed Income (\$m)	3,180	7,572	7,906	5,116	4,722	827
Resident	3,164	7,547	7,869	5,101	4,717	825
Non-resident	16	26	37	15	5	1
Gross Tax Assessed (\$m)	112	341	617	713	989	234
Resident	109	336	609	710	988	234
Non-resident	3	6	8	3	1	-

Source : Inland Revenue Authority of Singapore

Note : See note to Table 16.8.

16.10

ASSESSED INCOME AND GROSS TAX ASSESSED ON COMPANIES BY ASSESSED INCOME GROUP, 1996

	Assessed Income Group (\$)					
	Total	10,000 & below	10,001 - 20,000	20,001 - 30,000	30,001 - 60,000	60,001 - 100,000
Taxpayers (No)	22,361	5,223	2,342	1,517	2,793	2,150
Resident	21,589	5,122	2,284	1,461	2,702	2,078
Non-resident	772	101	58	56	91	72
Assessed Income (\$m)	22,581	23	35	38	124	170
Resident	20,291	22	34	37	120	165
Non-resident	2,291	-	1	1	4	6
Gross Tax Assessed (\$m)	5,290	6	9	10	33	46
Resident	4,859	6	9	10	32	44
Non-resident	431	-	-	-	1	2

	Assessed Income Group (\$)					
	100,001 - 300,000	300,001 - 500,000	500,001 - 1,000,000	1,000,001 - 3,000,000	3,000,001 - 5,000,000	5,000,001 & above
Taxpayers (No)	3,732	1,192	1,280	1,243	288	601
Resident	3,614	1,138	1,219	1,185	264	522
Non-resident	118	54	61	58	24	79
Assessed Income (\$m)	657	465	922	2,151	1,123	16,874
Resident	636	444	879	2,036	1,030	14,889
Non-resident	21	21	43	115	93	1,985
Gross Tax Assessed (\$m)	175	123	244	563	292	3,788
Resident	170	118	233	536	269	3,432
Non-resident	6	6	10	27	22	356

Source : Inland Revenue Authority of Singapore

Note : See note to Table 16.8.

gouly. Clothing materials, furniture, appliances, etc., as well as those of services are priced monthly. For items with infrequent price fluctuations eg house rents, school fees, utilities charges, bus fares, they are priced quarterly or as and when their prices are revised. A total of 3,296 items are selected for regular pricing including brands, varieties and grades.

to maintain the consistency of the index, the index is revised annually by the Department of Statistics.

Wholesale Price Index
The Wholesale Price Index (WPI) is a composite index of the prices of goods and services at the wholesale level. It is compiled monthly using the base-weighted Laspeyres' formula. The base year for the Domestic Supply Price Index, Singapore Manufactured Products Price Index, Import Price Index and Export Price Index is 1990.

The list of items and weighting patterns for the Singapore manufactured products were derived from data collected in the 1990 Census of Industrial Production, while those for the exported and imported products were derived from exports and imports statistics for 1990. The weights for the Domestic Supply Price Index were made proportionate to the combined value of retained imports and locally manufactured goods sold in the domestic market.

Data are collected monthly by mail from importers, exporters and manufacturers. Indices at commodity division level are published in the Department's "Monthly Digest of Statistics". Details on methodology, commodity coverage, weighting pattern and methods of computation can be found in these publications: Import Price Index (1990 = 100), A Guide to Export Price Index, A Guide to

Consumer Price Index (CPI)
The Consumer Price Index (CPI) measures the price changes over time of a fixed basket of goods and services commonly consumed by households. The latest series is based on the list of items and weighting pattern derived from the Household Expenditure Survey conducted from October 1992 to September 1993. The monthly expenditure records of 2,692 households with a monthly expenditure of \$230-\$2,300 were used as the weighting pattern. These households constituted the central 90 per cent of the households surveyed.

The index is compiled monthly by the Singapore Department of Statistics using the base-weighted Laspeyres' formula. The index is the simple average of the twelve monthly indices. This yearly index is compared with that of the preceding year to obtain the annual rate of inflation for the year.

The monthly CPI is published in the Department's "Monthly Digest of Statistics". More detailed CPI data and analysis of consumer price changes are available in the monthly report on the Consumer Price Index. Information on the methodology may also be obtained from the report "The Consumer Price Index, Singapore, based on Household Expenditure Survey 1992/93".

Retail Prices

Retail prices of selected goods are collected regularly from markets, supermarkets, provision shops, eco-mini marts and other retail outlets located in various housing estates and retail centres. With effect from 1 April 1994, retail prices refer to total prices inclusive of goods and services tax.

The frequency of pricing depends on the price stability of the items. Prices are collected thrice every week for perishable food items such as fish, vegetables, meat and

PRICES

Consumer Price Index (CPI)

The Consumer Price Index measures the price changes over time of a fixed basket of goods and services commonly consumed by households. The latest series is based on the list of items and weighting pattern derived from the Household Expenditure Survey conducted from October 1992 to September 1993. The expenditure records of 5,692 households with monthly expenditure of \$820-\$8,300 were used as the weighting pattern. These households constituted the central 90 per cent of all households surveyed.

The index is compiled monthly by the Singapore Department of Statistics using the base-weighted Laspeyres' formula. The yearly index is the simple average of the twelve monthly indices. This yearly index is compared with that of the preceding year to obtain the annual rate of inflation for the year.

The monthly CPI is published in the Department's "Monthly Digest of Statistics". More detailed CPI data and analysis of consumer price changes are available in the monthly report on the Consumer Price Index. Information on the methodology may also be obtained from the report "The Consumer Price Index, Singapore, based on Household Expenditure Survey 1992/93".

Retail Prices

Retail prices of selected goods are collected regularly from markets, supermarkets, provision shops, econ-mini marts and other retail outlets located in various housing estates and retail centres. With effect from 1 April 1994, retail prices refer to total prices inclusive of goods and services tax.

The frequency of pricing depends on the price stability of the items. Prices are collected thrice every week for perishable food items such as fish, vegetables, meat and

poultry. Clothing materials, furniture, consumer durables etc as well as items of services are priced monthly. For items with infrequent price fluctuations eg house rents, school fees, utilities charges, bus fares, they are priced quarterly, yearly or as and when their prices are revised. A total of 3,296 items are selected for regular pricing including brands, varieties and grades.

Wholesale Price Indices

Other price indices consist of the Domestic Supply Price Index and Indices on Singapore manufactured products, imported products and exported products. For imported products, the prices are valued at cif (cost, insurance and freight); for exported products, they refer to fob (free on board) prices; and for locally manufactured products, they are ex-factory prices. The indices are compiled monthly using the base-weighted Laspeyres' formula. The base year for the Domestic Supply Price Index, Singapore Manufactured Products Price Index, Import Price Index and Export Price Index is 1990.

The list of items and weighting patterns for the Singapore manufactured products were derived from data collected in the 1990 Census of Industrial Production, while those for the exported and imported products were derived from exports and imports statistics for 1990. The weights for the Domestic Supply Price Index were made proportionate to the combined value of retained imports and locally manufactured goods sold in the domestic market.

Data are collected monthly by mail from importers, exporters and manufacturers. Indices at commodity division level are published in the Department's "Monthly Digest of Statistics". Details on methodology, commodity coverage, weighting pattern and methods of computation can be found in these publications: Import Price Index (1990 = 100), A Guide to Export Price Index, A Guide to

17 PRICES (cont'd)

Singapore Manufactured Products Price Index and A Guide to Domestic Supply Price Index.

Authority (URA) and Building Materials Price Index by the Construction Industry Development Board.

Other Price Indices

Data on selected farm products are obtained from the Primary Production Department. The collection and compilation of data for the Property Price Index and Commercial Property Rental Index are undertaken by the Urban Redevelopment

Produce Prices

Prices of rubber are obtained weekly from the Singapore Commodity Exchange. Weekly prices for other types of produce are obtained from the Singapore Chinese Produce Exchange.

17.1 CONSUMER PRICE INDEX

	Weights ¹	1987	1992	1993	1994	1995	1996	1997
October 1992-September 1993=100								
All Items	10,000	86.4	98.3	100.5	103.6	105.4	106.9	109.0
Food	2,995	93.3	99.5	100.3	103.9	106.2	108.5	110.7
Clothing	606	89.9	99.2	100.3	102.6	104.1	104.6	105.3
Housing	2,341	87.0	97.4	100.5	101.8	102.6	103.1	105.5
Transport & Communications	1,583	78.7	98.5	101.0	107.8	108.5	108.9	113.1
Education	573	76.0	97.3	100.5	103.0	107.4	110.6	112.3
Health	280	78.8	97.4	101.0	104.2	105.8	108.3	112.2
Miscellaneous	1,622	81.3	96.5	100.5	102.3	104.8	106.8	106.9
Percentage Change Over Previous Year								
All Items	10,000	0.5	2.3	2.3	3.1	1.7	1.4	2.0
Food	2,995	-0.2	1.3	0.8	3.6	2.3	2.1	2.0
Clothing	606	0.3	2.2	1.2	2.2	1.5	0.5	0.7
Housing	2,341	-1.0	2.1	3.2	1.3	0.7	0.5	2.3
Transport & Communications	1,583	1.1	2.9	2.6	6.7	0.6	0.4	3.9
Education	573	2.5	4.7	3.3	2.5	4.2	3.0	1.5
Health	280	1.5	2.8	3.7	3.1	1.6	2.3	3.7
Miscellaneous	1,622	3.0	3.2	4.1	1.7	2.5	1.8	0.2

¹ The weights refer to the consumption pattern of 1992/93 and are used in the computation of the indices for the years 1993-97. Indices for the years 1987 and 1992 relate to the consumption pattern of 1982/83 and 1987/88 respectively.

17.2

CONSUMER PRICE INDEX FOR HOUSEHOLDS IN DIFFERENT
INCOME GROUPS

Income Group	All Items	Food	Clothing	Housing	Transport & Comm - unications	Education & Stationery	Health	Miscel- laneous
Weights Per 10,000								
Lowest 20%	10,000	3,843	207	3,326	1,072	376	153	1,023
Middle 60%	10,000	3,299	565	2,375	1,348	581	274	1,558
Highest 20%	10,000	1,924	670	1,943	2,866	599	275	1,723
Consumer Price Index (Oct 92-Sep 93=100)								
1995								
Lowest 20%	104.6	106.1	103.5	101.9	102.9	111.6	105.7	107.2
Middle 60%	104.9	106.2	104.1	102.3	104.8	107.9	105.7	105.1
Highest 20%	108.9	106.6	104.6	103.9	118.9	106.0	106.3	103.6
1996								
Lowest 20%	106.3	108.5	103.9	102.6	104.2	115.1	108.2	109.7
Middle 60%	106.5	108.5	104.6	102.8	105.8	111.1	108.1	107.2
Highest 20%	109.7	108.7	104.8	104.4	117.8	109.9	108.6	105.1
1997								
Lowest 20%	108.3	110.7	104.2	104.2	107.4	116.2	112.5	111.2
Middle 60%	108.3	110.7	105.2	104.5	108.5	112.8	112.3	107.5
Highest 20%	113.3	111.0	105.7	108.3	125.6	112.1	112.1	104.8
Percentage Change Over Previous Year								
1996								
Lowest 20%	1.6	2.2	0.4	0.6	1.3	3.2	2.4	2.3
Middle 60%	1.5	2.2	0.5	0.5	1.0	3.0	2.3	1.9
Highest 20%	0.7	2.0	0.2	0.5	-0.9	3.6	2.2	1.5
1997								
Lowest 20%	1.9	2.1	0.3	1.5	3.1	1.0	4.0	1.4
Middle 60%	1.7	2.0	0.6	1.7	2.6	1.5	3.9	0.3
Highest 20%	3.3	2.1	0.8	3.7	6.6	2.1	3.2	-0.3

Note : See note to Table 17.1.

17.3

PRICE INDICES OF SELECTED CONSUMER ITEMS

(October 1992-September 1993=100)

	Weights Per 10,000	1987	1992	1993	1994	1995	1996	1997
Utility								
Water Tariff	55	93.3	96.2	101.4	102.3	102.3	102.3	118.7
Electricity Tariff	139	110.9	98.4	100.2	98.3	101.5	106.9	109.2
Gas Tariff	20	87.3	100.0	100.0	102.6	113.3	121.6	128.2
Liquefied Petroleum Gas	34	88.0	100.0	100.0	98.5	104.4	105.6	106.1
Private Road Transport								
Petrol, Premium	216	79.8	101.1	99.7	99.2	100.0	101.0	105.5
Petrol, Intermediate	13	82.7	100.8	99.6	98.3	99.2	100.3	105.2
Other Running Costs	237	72.9	99.9	100.2	103.3	103.6	103.0	102.6
Education								
Primary School								
Miscellaneous Fees	10	59.7	96.4	100.4	102.2	104.1	105.6	105.8
Secondary, Pre-U & JC School & Miscellaneous Fees	23	60.4	98.1	100.1	105.6	107.0	107.1	107.2
Health								
Consultation Fees for Adult & Children at Outpatient Dispensary	141	74.6	97.3	101.3	105.0	105.8	109.2	115.8

Note : See note to Table 17.1.

17.4

RETAIL PRICES OF FOOD AND GROCERIES

Dollars

Item	Unit	1987	1992	1993	1994	1995	1996	1997
Rice & Other Cereals								
Thai Rice 100% Fragrant	5 kg pkt	4.52	5.74	5.79	6.24	6.35	6.41	7.88
Instant Noodles	5 pkts	1.74	1.69	1.77	1.77	1.79	1.77	1.74
Ordinary White Bread	400 g	0.68	0.76	0.79	0.84	0.86	0.93	0.98
Vitamin Enriched Bread	400 g	1.15	1.35	1.35	1.47	1.50	1.48	1.49
Plain Butter Cake	500 g	4.30	4.50	5.13	5.22	5.28	5.46	5.63
Meat & Poultry								
Lean Pork	Per kg	6.24	6.28	6.13	6.10	6.15	6.78	6.98
Pork Rib Bones	Per kg	6.88	7.25	7.09	7.19	7.20	7.80	8.03
Fresh Beef	Per kg	13.32	13.32	13.56	13.32	13.38	12.63	12.49
Fresh Mutton	Per kg	10.80	10.41	10.41	10.27	10.23	10.29	10.36
Hen	Per kg	4.11	4.28	4.38	4.73	4.46	4.41	4.49
Duck	Per kg	4.15	5.00	5.07	5.23	5.20	5.27	5.38
Fresh Chicken Wing	Each	0.47	0.49	0.48	0.50	0.49	0.48	0.49
Chicken Extract	½ doz	na	na	16.78	16.79	16.83	16.83	16.83
Fish & Other Sea Products								
Kurau (cut)	Per kg	22.59	29.00	30.78	34.46	38.03	37.60	38.11
White Pomfret	Per kg	13.33	15.60	16.09	18.59	19.08	18.78	20.03
Spanish Mackerel (tenggiri)	Per kg	8.05	8.78	7.78	8.17	8.31	8.92	9.10
Flowery Grouper	Per kg	11.07	11.71	11.72	12.51	12.80	13.07	13.98
Gold Banded Scad (kunning)	Per kg	5.04	5.67	5.74	5.89	5.59	5.43	5.83
Sea Bream (kerisi)	Per kg	na	na	5.44	6.01	6.14	6.51	6.93
Medium Prawns	Per kg	15.87	14.48	14.44	15.79	16.22	16.25	17.34
Large Prawns	Per kg	20.75	18.63	18.60	20.14	21.50	21.20	22.28
Milk & Eggs								
Fresh Milk	1 litre pkt	na	3.10	2.60	2.55	2.57	2.54	2.54
Condensed Milk	397 g tin	0.93	1.11	1.08	1.08	1.03	1.01	1.02
Milk Powder	2 kg tin	13.70	15.69	16.63	16.56	17.09	16.95	17.39
Hen Eggs	Per 10	1.46	1.41	1.36	1.38	1.34	1.58	1.55

(continued on next page)

Note : Prices between 1987-1992 and 1993-1997 may not be strictly comparable due to changes in specifications.

Item	Unit	1987	1992	1993	1994	1995	1996	1997
Oils								
Deodorised Oil	2 kg bottle	5.29	5.16	3.74	3.89	4.21	4.18	4.13
Corn Oil	2 kg bottle	5.64	5.74	5.72	5.80	5.88	5.87	5.91
Vegetables								
Cabbage	Per kg	1.61	1.67	1.77	1.83	1.91	1.88	1.83
Spinach (bayam)	Per kg	1.76	2.17	2.05	1.94	2.02	1.97	1.88
Small Mustard	Per kg	2.37	2.26	2.25	2.07	2.15	2.17	2.04
Kale	Per kg	4.14	3.20	3.04	2.93	3.02	2.78	2.80
Cauliflower	Per kg	3.52	3.61	3.41	3.46	3.52	3.47	3.49
Long Beans	Per kg	1.89	2.39	2.26	2.33	2.52	2.56	2.62
Tomatoes	Per kg	2.32	2.35	2.29	2.38	2.51	2.65	2.63
Garlics	Per kg	2.79	2.99	2.92	2.66	2.97	3.05	3.22
Carrots	Per kg	1.92	1.98	1.98	2.08	2.05	2.00	1.99
Potatoes	Per kg	1.01	1.07	1.04	1.16	1.09	1.13	1.10
Dried Mushrooms	100g	6.99	8.64	8.38	7.46	7.57	7.70	7.55
Fruits								
Papaya	Per kg	0.90	1.04	1.03	1.06	1.10	1.20	1.16
Bananas (emas)	Per kg	1.23	1.25	1.26	1.29	1.30	1.33	1.32
Watermelon	Per kg	na	1.29	1.31	1.39	1.40	1.42	1.37
Grapes	Per kg	na	6.11	6.53	6.68	6.64	6.68	6.78
Orange	Each	0.38	0.38	0.32	0.33	0.32	0.33	0.33
Apple	Each	0.30	0.34	0.35	0.34	0.34	0.34	0.33
Pear	Each	0.55	0.66	0.63	0.63	0.67	0.67	0.66
Miscellaneous								
Sugar	2 kg pkt	1.91	1.97	1.94	1.97	2.01	2.02	2.00
Coffee Powder	Per kg	11.70	10.65	10.77	11.23	11.75	11.75	11.75
Food Beverage	400 g tin	3.38	3.32	3.29	3.29	3.19	3.17	3.21
Aerated Soft Drinks	330 ml can	0.50	0.53	0.54	0.57	0.58	0.55	0.55
Chocolate	250 g bar	na	na	3.16	3.16	3.44	3.41	3.55

17.5

DOMESTIC SUPPLY PRICE INDEX
(1990=100)

17.5

(1990=100)

Item	Weights ¹	1987	1992	1993	1994	1995	1996	1997
All Items	10,000	97.7	91.7	89.2	87.3	87.4	87.5	86.5
Food	407	95.8	96.5	93.4	95.5	96.7	100.1	101.7
Live animals	31	97.8	94.0	87.9	87.3	89.7	110.1	109.8
Meat & meat preparations	33	94.5	93.3	89.3	92.9	94.2	95.8	95.6
Dairy produce & eggs	39	76.3	92.0	91.7	89.6	91.2	98.2	96.1
Fish & fish preparations	57	96.1	117.4	108.8	112.7	111.4	110.5	114.7
Cereals & cereal preparations	60	90.3	97.9	97.1	96.0	95.5	104.0	108.1
Vegetables & fruits	75	100.5	101.5	96.9	95.9	98.0	100.1	99.3
Sugar & sugar preparations	27	90.1	71.8	75.0	78.8	83.5	81.3	78.1
Coffee etc & spices	46	132.3	80.2	77.1	91.2	93.3	88.9	95.9
Animal feeding stuff	11	93.3	101.3	99.8	98.5	97.8	101.9	101.9
Miscellaneous food preparations	28	102.4	98.2	99.1	100.3	102.5	103.5	106.0
Beverages & Tobacco	102	91.3	108.1	112.4	113.6	113.5	114.1	115.8
Beverages	55	91.1	105.5	107.4	107.9	108.2	107.7	107.2
Tobacco & manufactures	47	91.5	111.1	118.4	120.2	119.8	121.6	125.9
Crude Materials	133	99.0	93.1	94.6	96.7	101.5	101.2	97.4
Oil seeds, nuts & kernels	7	94.2	93.3	89.1	93.1	96.9	100.7	101.8
Crude rubber incl synthetic	16	132.6	93.2	89.3	112.3	139.7	123.4	97.5
Cork & wood	28	87.3	101.3	112.3	119.6	122.7	120.8	118.1
Textile fibres & waste	7	116.3	92.6	90.6	86.5	85.2	84.3	86.9
Crude fertilizers & minerals	36	83.5	85.9	87.1	87.2	83.9	97.2	96.0
Metallic ores & scrap	22	98.9	82.0	81.6	79.8	83.4	74.3	74.1
Crude materials nec	17	101.0	109.1	107.1	91.6	100.1	98.4	98.5
Mineral Fuels	2,119	96.1	80.2	71.7	66.6	68.1	76.5	77.1
Petroleum & products	2,110	96.1	80.2	71.6	66.6	68.1	76.5	77.0
Gas	9	100.0	94.5	87.8	78.7	92.1	95.9	103.8
Animal & Vegetable Oils	71	119.2	118.3	114.1	138.2	152.4	133.9	139.4
Vegetable oil unprocessed	37	104.6	120.7	115.4	143.0	157.5	141.8	144.0
Other animal & vegetable oils	34	124.7	115.6	112.7	133.0	146.7	125.3	134.3

(continued on next page)

1 The weight for each commodity item is proportional to the value of its total supply or availability in the domestic market in 1990.

17.5

DOMESTIC SUPPLY PRICE INDEX (continued)

(1990=100)

Item	Weights ¹	1987	1992	1993	1994	1995	1996	1997
Chemicals & Chemical Products	747	99.6	94.7	91.8	90.0	90.9	89.0	89.1
Organic chemicals	133	96.6	84.8	80.4	80.4	90.5	81.1	85.3
Inorganic chemicals	43	109.6	95.3	93.0	91.5	86.9	85.8	81.6
Dyes & colours	54	95.4	95.0	96.3	93.4	93.7	91.4	90.2
Medicinal products	28	121.1	99.0	98.1	99.3	102.7	101.5	96.0
Perfume, toilet preparations	50	89.9	95.2	94.7	93.8	93.8	90.8	89.2
Plastics in primary forms	119	97.2	86.2	79.4	87.5	98.0	89.9	90.1
Plastics in non-primary forms	61	102.7	94.5	92.4	90.7	91.0	86.2	80.8
Chemical products nec	259	97.6	103.0	100.8	93.3	86.2	91.6	92.8
Manufactured Goods	1,457	87.5	95.3	93.8	93.5	96.9	94.8	92.9
Leather products nec	12	73.3	104.0	91.0	93.5	103.3	103.4	92.7
Rubber manufactures nec	37	95.1	97.4	100.1	101.9	107.3	109.7	106.9
Wood & cork manufactures	47	94.0	99.0	109.3	109.4	105.8	106.2	106.0
Paper manufactures	165	93.9	92.2	89.0	88.6	101.2	92.9	86.6
Textile manufactures	225	100.2	95.6	86.8	86.8	87.1	85.3	85.4
Non-metal mineral manufactures	209	80.0	99.9	98.8	98.3	99.4	102.7	100.7
Iron & steel	289	85.6	90.6	88.3	85.4	90.4	87.2	85.1
Non-ferrous metals	149	84.5	86.6	90.1	94.7	99.2	94.1	94.6
Metal manufactures	324	85.0	100.9	101.5	100.8	102.1	100.6	99.1
Machinery &								
Transport Equipment	3,903	103.7	93.5	92.8	90.9	87.8	84.8	82.5
Power generating machinery	267	101.9	90.8	95.8	91.4	88.9	86.7	87.3
Industrial machinery	216	113.5	108.1	111.6	113.9	111.4	108.0	106.7
Metalworking machinery	74	95.0	103.7	112.6	116.4	118.8	111.7	106.1
General industrial machinery	376	86.6	102.2	105.3	105.6	105.8	103.7	103.2
Office & data machines	743	107.7	90.3	90.2	82.0	80.2	81.3	78.2
Telecommunications apparatus	569	104.3	95.2	95.1	92.6	92.8	89.8	86.2
Electrical machinery nec	1,458	109.0	87.8	82.4	82.0	76.3	70.3	67.7
Road vehicles	200	105.8	108.2	117.7	120.6	112.9	116.2	114.8
Miscellaneous Manufactures	1,061	100.9	96.2	95.9	95.2	96.4	95.5	95.5
Prefab building, sanitary, lighting	19	104.1	98.8	101.3	101.1	100.3	120.0	120.5
Furniture, bedding, mattresses	67	97.3	100.1	100.5	103.6	104.8	105.5	105.6
Travel goods	38	93.6	101.1	101.7	98.4	98.1	95.8	93.5
Clothing	122	91.9	98.0	98.8	96.6	97.5	97.9	98.6
Footwear	33	99.1	95.5	95.5	93.1	92.2	95.2	102.1
Scientific instruments	116	104.5	103.1	108.9	109.4	107.8	105.8	111.2
Photographic apparatus	163	98.2	95.4	95.3	95.4	97.4	95.7	95.6
Miscellaneous mfd articles nec	503	105.4	93.4	91.3	90.1	92.0	90.3	88.6

Item	Weights ¹	1987	1992	1993	1994	1995	1996	1997
All Items	10,000	95.9	86.4	83.1	80.2	80.9	80.9	79.2
Food	349	100.7	93.2	94.2	97.0	98.3	97.3	100.2
Meat & meat preparations	10	97.6	92.6	92.6	95.4	98.0	98.0	98.0
Dairy produce & eggs	53	84.0	97.8	95.5	94.1	92.2	91.7	93.9
Fish & fish preparations	19	97.9	103.6	106.6	110.3	120.0	117.8	114.3
Cereals & cereal preparations	60	93.4	101.9	103.5	104.7	105.6	106.0	105.4
Vegetables & fruits	17	99.1	97.7	97.8	98.4	100.3	100.0	100.9
Sugar & sugar preparations	28	100.3	73.1	76.0	80.5	85.8	85.9	80.6
Coffee etc & spices	88	154.3	82.5	84.0	90.7	89.6	86.8	99.8
Animal feeding stuff	17	88.3	97.7	97.7	97.7	97.7	97.7	97.7
Miscellaneous food preparations	57	92.5	100.1	102.2	104.6	108.2	107.1	107.1
Beverages & Tobacco	102	88.1	112.7	122.4	127.1	128.3	130.5	133.2
Beverages	63	90.6	106.0	108.1	110.8	111.2	111.3	110.9
Tobacco & manufactures	39	82.6	123.7	145.4	153.3	156.1	161.5	169.3
Crude Materials	421	108.3	90.2	90.0	98.0	107.7	106.3	94.5
Crude rubber incl synthetic	123	133.1	95.4	91.5	121.7	156.2	135.2	103.3
Cork & wood	55	89.0	101.0	103.9	108.8	110.1	110.4	110.8
Crude fertilizers & minerals	150	79.4	85.1	86.4	84.4	82.9	97.6	93.0
Metallic ores & scrap	68	108.5	82.3	84.3	83.3	83.4	79.9	75.4
Crude materials nec	25	87.8	93.6	90.0	80.1	78.3	79.8	75.4
Mineral Fuels	1,552	89.9	75.9	70.9	62.3	62.6	72.7	73.5
Petroleum & products	1,530	89.7	75.6	70.5	61.9	62.0	72.3	72.9
Gas	22	91.9	102.5	98.3	88.5	103.0	106.2	116.0
Animal & Vegetable Oils	113	99.8	106.9	104.8	111.6	118.5	113.5	111.5
Vegetable oil unprocessed	62	95.9	108.9	104.6	110.3	112.4	109.3	109.4
Other animal & vegetable oils	51	101.8	104.6	105.2	113.1	126.0	118.7	114.0

(continued on next page)

1 Based on 1990 production value of the commodity item.

Item	Weights ¹	1987	1992	1993	1994	1995	1996	1997
Chemicals & Chemical Products	725	103.1	89.1	85.2	85.2	92.3	88.1	89.7
Organic chemicals	140	96.0	77.0	66.9	67.7	88.3	82.0	91.6
Inorganic chemicals	43	109.8	89.8	84.3	82.1	83.9	82.1	75.0
Dyes & colours	60	91.4	96.9	98.5	96.1	99.9	101.3	101.7
Medicinal products	148	115.8	103.4	102.5	100.1	99.2	99.1	97.8
Perfume, toilet preparations	26	96.1	95.1	93.7	90.4	91.4	91.2	91.5
Plastics in primary forms	188	na	77.4	72.0	76.1	88.3	77.5	79.4
Plastics in non-primary forms	32	110.8	95.5	91.4	87.7	91.7	87.9	86.5
Chemical products nec	88	99.7	99.8	99.8	99.0	95.0	94.9	95.1
Manufactured Goods	872	82.4	94.6	93.7	92.9	94.0	95.1	93.0
Rubber manufactures nec	15	92.9	87.7	94.6	93.0	88.0	84.0	82.6
Wood & cork manufactures	37	95.6	93.7	100.5	106.6	105.4	106.2	106.5
Paper manufactures	135	90.7	96.4	97.4	93.7	103.3	108.0	105.0
Textile manufactures	44	105.4	89.6	85.2	85.5	82.3	78.4	76.9
Non-metal mineral								
Manufactures	144	72.8	100.5	99.9	101.4	102.0	107.4	104.4
Iron & steel	143	83.6	83.9	81.3	78.9	79.0	78.8	77.9
Non-ferrous metals	26	95.1	91.4	90.6	83.1	76.7	75.1	75.2
Metal manufactures	328	79.9	97.2	95.3	95.0	95.2	94.5	92.3
Machinery &								
Transport Equipment	4,980	102.0	84.5	80.3	76.5	75.3	73.1	70.4
Power generating machinery	72	105.8	91.8	95.8	97.1	98.5	89.1	86.3
Industrial machinery	116	104.3	101.6	100.9	101.5	102.6	102.4	101.6
Metalworking machinery	26	89.5	97.5	95.5	95.9	96.3	95.6	95.7
General industrial machinery	250	97.5	99.2	94.7	93.1	90.6	91.1	91.6
Office & data machines	1,810	115.5	72.9	65.5	59.2	56.4	51.9	46.5
Telecommunication apparatus	1,121	106.9	93.1	90.2	88.1	90.0	90.3	89.7
Electrical machinery nec	1,544	95.4	87.5	85.3	82.4	80.5	78.8	77.0
Road vehicles	41	102.7	88.8	87.3	85.3	83.0	91.3	94.0
Miscellaneous Manufactures	886	99.3	95.7	92.8	91.3	92.1	91.2	90.6
Prefab building, sanitary,								
lighting	6	79.0	106.0	109.0	108.1	107.6	106.5	105.7
Furniture, bedding, mattresses	76	99.5	101.4	103.1	107.8	110.6	112.1	112.4
Travel goods	4	100.0	100.0	100.0	100.0	100.9	103.0	101.7
Clothing	217	89.2	98.5	100.9	98.9	98.0	97.7	98.3
Footwear	6	90.7	99.1	97.6	92.6	95.3	95.9	96.9
Scientific instruments	64	118.2	99.4	96.8	92.3	88.2	87.7	84.8
Photographic apparatus	37	113.1	95.4	101.9	102.2	100.8	97.8	95.2
Miscellaneous mfd articles nec	476	103.6	92.8	86.0	84.0	86.0	84.6	83.6

Item	Weights ¹	1987	1992	1993	1994	1995	1996	1997
All Items	10,000	100.7	93.5	91.6	90.7	90.6	89.6	88.2
Food	442	103.7	96.9	92.4	96.8	98.7	101.5	106.4
Live animals	29	98.4	94.1	87.9	87.3	89.7	110.1	109.9
Meat & meat preparations	32	93.2	93.1	87.9	91.4	92.8	95.0	94.8
Dairy produce & eggs	33	74.1	89.5	90.6	87.3	91.7	101.5	97.5
Fish & fish preparations	82	98.4	119.8	108.4	109.0	108.3	109.5	115.6
Cereals & cereal preparations	41	89.5	94.8	91.8	89.2	88.2	101.8	106.1
Vegetables & fruits	103	101.3	101.8	95.6	92.6	94.8	98.1	98.1
Sugar & sugar preparations	18	84.3	74.2	77.1	80.2	84.5	82.3	80.3
Coffee etc & spices	78	178.5	77.9	77.9	107.3	111.9	101.4	121.7
Animal feeding stuff	8	97.7	104.4	101.8	99.4	98.1	105.9	106.0
Miscellaneous food preparations	18	113.9	95.6	95.0	95.2	96.7	99.4	103.6
Beverages & Tobacco	130	97.6	107.2	108.3	106.2	103.5	102.6	104.4
Beverages	49	91.9	110.0	113.4	110.8	107.8	105.7	105.2
Tobacco & manufactures	81	104.9	105.4	105.2	103.5	101.0	100.8	103.9
Crude Materials	267	117.5	95.3	94.9	106.7	123.8	115.0	102.5
Hides, skins undressed	2	115.7	97.8	100.0	99.0	114.6	115.6	115.5
Oil seeds, nuts, kernels	14	97.4	94.6	90.7	94.3	97.3	102.6	104.1
Crude rubber incl synthetic	122	132.1	94.5	90.2	115.6	149.9	131.0	104.3
Cork & wood	47	86.0	101.4	113.5	122.2	124.8	122.5	119.2
Textile fibres & waste	13	117.5	90.8	92.2	90.0	89.3	88.7	90.2
Crude fertilizers & minerals	17	100.7	87.4	88.5	90.6	85.3	97.2	99.6
Metallic ores & scrap	22	95.0	82.9	80.2	75.2	79.5	70.3	70.8
Crude materials nec	30	110.0	104.4	102.5	92.1	98.7	97.9	97.1
Mineral Fuels	1,600	97.0	81.3	71.9	67.7	69.5	77.4	77.9
Petroleum & products	1,598	97.0	81.3	71.9	67.7	69.5	77.4	77.9
Gas	2	110.1	78.5	66.7	59.2	70.2	75.3	79.2
Animal & Vegetable Oils	70	122.9	119.1	114.9	141.6	156.8	136.4	142.7
Vegetable oil unprocessed	38	113.2	121.6	116.1	147.2	162.9	145.3	147.9
Other animal & vegetable oils	32	127.9	116.1	113.4	135.0	149.6	125.8	136.5

(continued on next page)

1 Based on value of the commodity item imported in 1990.

Item	Weights ¹	1987	1992	1993	1994	1995	1996	1997
Chemicals & Chemical Products	766	102.9	96.4	93.7	91.7	91.0	89.4	88.3
Organic chemicals	123	103.4	91.5	90.6	89.7	92.8	84.0	81.8
Inorganic chemicals	39	107.7	96.6	95.5	95.4	90.2	88.6	84.5
Dyes & colours	43	106.6	93.5	94.0	91.5	89.3	84.8	82.5
Medicinal products	33	120.8	98.6	97.2	98.8	102.8	101.7	95.6
Perfume, toilet preparations	59	89.9	95.3	93.9	93.3	93.8	89.9	87.0
Fertilizers manufactured	5	92.0	84.4	81.6	76.6	67.7	66.9	66.9
Plastics in primary forms	135	90.8	89.2	81.9	89.5	98.7	92.7	92.9
Plastics in non-primary forms	54	103.3	94.4	92.2	90.4	89.6	84.4	78.8
Chemical products nec	275	96.0	103.0	100.7	92.5	85.4	90.9	92.1
Manufactured Goods	1,366	96.0	95.4	93.3	92.9	97.1	93.9	92.5
Leather products nec	14	74.4	103.5	90.6	93.2	103.1	103.1	92.7
Rubber manufactures nec	48	96.7	99.5	101.3	102.9	109.3	112.2	109.9
Wood & cork manufactures	57	92.6	100.3	114.4	111.3	106.4	107.0	106.2
Paper manufactures	118	95.7	90.1	85.3	86.0	101.0	86.8	79.3
Textile manufactures	312	99.6	96.9	88.0	87.4	87.9	86.1	86.5
Non-metal mineral manufactures	142	87.4	99.4	98.0	95.9	97.4	98.9	98.2
Iron & steel	277	89.0	93.2	90.5	87.6	94.1	90.3	87.7
Non-ferrous metals	202	90.6	84.5	84.7	88.6	94.2	89.4	89.4
Metal manufactures	196	91.7	104.9	108.3	107.7	110.3	107.9	107.3
Machinery &								
Transport Equipment	4,404	102.6	95.0	95.4	93.9	90.7	87.5	84.9
Power generating machinery	324	100.1	92.6	97.1	92.7	90.1	89.0	89.7
Industrial machinery	343	101.3	109.1	112.9	115.0	113.4	111.0	110.0
Metalworking machinery	79	96.6	104.4	114.5	118.7	120.8	113.5	107.6
General industrial machinery	454	85.5	102.6	108.2	108.5	109.6	106.3	105.2
Office & data machines	757	106.6	91.9	93.0	85.1	83.0	84.1	80.8
Telecommunications apparatus	795	102.7	96.0	96.1	93.9	93.3	89.8	85.0
Electrical machinery nec	1,388	111.0	87.5	81.3	81.9	75.2	68.2	65.5
Road vehicles	264	107.1	109.4	121.8	123.9	115.9	119.6	118.0
Miscellaneous Manufactures	955	100.2	96.4	97.6	97.0	96.4	95.4	96.2
Prefab building, sanitary, lighting	18	108.2	96.9	98.6	98.4	97.2	121.1	122.1
Furniture, bedding, mattresses	28	94.4	98.7	97.2	96.9	96.5	95.7	95.7
Travel goods	35	91.3	101.2	101.8	98.3	97.8	95.1	92.8
Clothing	161	96.9	97.3	96.5	95.1	95.4	95.8	96.9
Footwear	33	102.3	94.8	94.7	92.3	91.2	94.8	101.8
Scientific instruments	150	105.4	102.9	109.0	109.7	108.1	105.4	111.3
Photographic apparatus	224	98.1	95.2	94.8	94.6	96.0	94.3	94.1
Miscellaneous mfd articles nec	306	109.6	93.2	94.3	93.8	91.9	89.5	88.4

17.8

EXPORT PRICE INDEX

(1990=100)

Item	Weights ¹	1987	1992	1993	1994	1995	1996	1997
All Items	10,000	101.4	88.4	86.4	82.9	81.5	80.7	79.5
Food	287	115.9	93.2	91.7	97.2	99.0	97.9	104.1
Meat & meat preparations	11	90.2	93.4	90.2	89.9	80.9	81.5	80.8
Dairy produce & eggs	16	92.0	89.3	89.0	86.6	87.6	90.6	92.5
Fish & fish preparations	74	116.0	104.4	102.4	104.9	102.5	100.9	105.7
Cereals & cereal preparations	21	93.7	97.0	97.5	97.2	97.7	105.0	104.1
Vegetables & fruits	43	103.5	100.5	93.5	82.3	85.4	90.7	89.4
Sugar & sugar preparations	7	76.0	83.1	91.1	92.8	92.9	91.2	92.0
Coffee etc & spices	79	186.1	79.9	80.4	104.0	109.7	101.4	119.5
Animal feeding stuff	11	93.9	85.1	84.5	82.3	81.6	90.1	85.5
Miscellaneous food preparations	25	92.1	94.8	94.0	96.5	103.6	101.5	104.9
Beverages & Tobacco	144	94.1	102.0	99.3	97.5	98.8	99.9	99.9
Beverages	56	95.9	103.0	98.4	95.6	98.3	101.0	100.8
Tobacco & manufactures	88	91.9	101.3	99.9	98.6	99.1	99.1	99.3
Crude Materials	302	116.0	92.2	91.4	105.9	125.5	111.9	99.5
Hides, skins undressed	3	93.4	87.3	87.9	84.3	79.0	77.4	77.9
Oil seeds, nuts, kernels	11	103.6	81.6	87.1	85.6	81.9	88.4	102.9
Crude rubber incl synthetic	141	131.1	94.3	91.1	116.2	151.4	131.9	103.8
Cork & wood	49	83.2	99.8	112.9	125.0	128.5	120.4	123.5
Paper making material	8	112.6	86.5	56.4	87.0	131.2	69.1	59.1
Textile fibres & waste	9	na	99.7	103.5	105.8	102.7	102.2	107.9
Crude fertilizers & minerals	9	123.9	88.7	87.1	87.6	86.1	87.4	87.9
Metallic ores & scrap	37	103.9	76.3	71.6	73.4	85.8	69.7	68.4
Crude materials nec	35	94.5	94.1	91.2	89.0	90.8	92.8	91.8
Mineral Fuels	1,821	89.2	77.5	72.9	62.9	61.9	71.8	69.9
Petroleum & products	1,808	89.2	77.3	72.7	62.8	61.7	71.6	70.0
Gas	13	90.2	97.7	94.8	81.6	85.4	91.4	61.1
Animal & Vegetable Oils	77	102.4	106.4	104.9	112.2	124.0	117.1	119.9
Vegetable oil unprocessed	37	100.3	104.9	104.2	112.9	122.5	123.9	124.5
Other animal & vegetable oils	40	108.3	107.9	105.5	111.6	125.5	110.8	115.6

(continued on next page)

¹ Based on value of the commodity item exported in 1990.

Item	Weights ¹	1987	1992	1993	1994	1995	1996	1997
Chemicals & Chemical Products	690	100.5	89.8	86.2	85.1	87.2	83.3	81.5
Organic chemicals	214	88.6	85.1	81.9	78.2	79.2	73.7	66.2
Inorganic chemicals	29	109.9	91.5	92.1	92.9	92.1	89.8	91.1
Dyes & colours	47	95.5	88.3	83.0	81.3	80.6	79.3	77.6
Medicinal products	39	120.8	102.3	100.1	94.6	89.2	84.4	88.3
Perfume, toilet preparations	42	107.6	94.6	93.1	88.5	87.9	87.3	87.8
Fertilizers manufactured	6	75.9	94.8	96.0	88.7	82.9	85.0	87.9
Plastics in primary forms	169	96.0	79.5	71.2	76.6	87.0	78.6	81.2
Plastics in non-primary forms	23	108.6	92.6	91.3	92.4	96.3	95.1	92.4
Chemical products nec	121	111.4	106.0	106.3	102.7	100.7	103.0	101.5
Manufactured Goods	772	94.4	93.6	92.0	90.4	91.4	90.3	88.9
Leather products nec	6	na	118.4	116.3	109.5	110.7	110.2	112.7
Rubber manufactures nec	32	98.6	97.2	103.6	98.1	94.6	94.8	97.1
Wood & cork manufactures	49	99.0	96.3	110.7	107.1	102.1	98.7	97.2
Paper manufactures	60	86.1	97.8	96.8	99.0	103.9	100.3	96.6
Textile manufactures	173	98.4	90.4	84.3	82.5	80.7	78.0	76.1
Non-metal mineral manufactures	70	88.1	102.6	101.7	100.4	101.7	103.7	103.4
Iron & steel	125	86.3	88.4	87.1	83.3	86.8	84.8	83.8
Non-ferrous metals	112	109.8	91.9	84.8	82.8	86.7	85.9	82.9
Metal manufactures	145	94.0	94.1	94.3	95.7	96.4	97.8	97.6
Machinery &								
Transport Equipment	5,031	108.0	89.2	87.7	83.6	79.7	76.6	75.8
Power generating machinery	181	99.8	95.5	99.7	102.9	97.7	96.0	96.2
Industrial machinery	270	128.7	95.9	99.9	98.4	98.9	97.9	96.7
Metalworking machinery	43	91.5	102.7	103.1	104.8	103.1	101.2	102.1
General industrial machinery	372	99.7	95.2	95.8	95.4	93.6	93.9	95.7
Office & data machines	1,709	115.3	78.8	74.3	66.8	61.5	56.8	52.5
Telecommunication apparatus	1,187	110.4	92.5	91.0	87.7	83.7	83.2	84.0
Electrical machinery nec	1,131	104.7	95.2	95.1	92.9	90.3	84.3	85.8
Road vehicles	138	103.2	98.1	101.0	87.9	79.6	78.9	81.9
Miscellaneous Manufactures	876	97.5	94.1	95.0	94.4	91.4	90.0	88.9
Prefab building, sanitary, lighting	8	107.6	93.9	94.9	90.1	90.1	89.2	89.9
Furniture, bedding, mattresses	35	95.3	98.5	99.1	101.5	101.6	101.5	101.8
Clothing	288	90.1	95.3	98.1	100.3	96.3	95.1	93.2
Footwear	15	96.5	96.7	97.3	98.3	91.8	90.0	90.0
Scientific instruments	125	106.5	97.4	103.7	104.0	100.6	103.9	106.4
Photographic apparatus	137	108.3	92.5	91.4	89.0	85.8	84.8	84.4
Miscellaneous mfd articles nec	268	100.2	91.2	88.6	85.4	83.2	79.1	76.6

17.9 BUILDING MATERIALS PRICE INDEX (1985=100)

Section	Weights ¹	1987	1992	1993	1994	1995	1996	1997
All Items	10,000	97.1	116.9	118.2	118.2	119.9	120.8	119.4
Timber & Wood Products	585	98.1	112.0	122.6	126.7	127.2	126.9	126.9
Concrete Ingredients								
(Granite)	872	84.3	92.9	91.0	95.6	95.4	102.5	99.4
Paints	292	105.7	111.9	120.1	121.7	126.0	124.9	125.0
Cement	1,338	93.4	151.6	149.6	136.3	136.2	141.7	138.6
Bricks & Concrete Blocks	2,076	84.2	106.6	110.9	114.6	115.7	115.5	115.1
Tiles	952	107.7	114.0	110.5	113.0	113.7	111.7	111.7
Iron & Steel Products	1,764	109.2	107.8	106.4	103.6	105.2	102.5	100.7
Cables	646	101.3	121.2	121.2	117.1	123.1	121.2	120.6
Sanitary & Plumbing								
Fixtures	69	98.7	102.8	102.6	106.2	107.4	107.5	107.6
Others	1,406	101.0	128.9	133.4	138.6	143.1	145.9	144.3

Source : Construction Industry Development Board (with effect from October 1992)

Note : Prices used are ex-factory price of manufactured building material and CIF (Cost Insurance Freight) price of imported building materials.

1 Based on the 1984 distribution pattern of building materials.

17.10 PRICE INDICES OF SELECTED FARM PRODUCTS (1985=100)

Farm Product	1987	1992	1993	1994	1995	1996	1997
Pigs	98.1	100.4	89.8	91.3	91.7	116.6	103.3
Fowls	87.7	99.7	106.5	116.1	108.1	110.4	107.8
Ducks	94.3	91.6	89.9	92.5	91.8	93.8	92.1
Hen Eggs	91.6	95.5	91.4	96.2	85.0	109.8	99.7
Leafy Vegetables	102.9	97.2	97.4	90.9	88.4	76.1	72.7
Fruit Vegetables	106.5	118.7	111.7	113.1	121.6	126.3	128.5
Root Vegetables	88.8	109.2	107.6	120.9	124.5	139.8	141.5
Fresh Fish	97.7	101.6	101.8	107.9	110.0	118.9	118.2

Note : Prices used for the respective indices are auction prices for pigs and fresh fish, wholesale prices for fowls and ducks, retail prices for fruit and root vegetables, and ex-farm prices for hen eggs and leafy vegetables.

17.11 PRODUCE PRICES

	1987	1992	1993	1994	1995	1996	1997
Rubber (Cents per kg, fob)							
Ribbed Smoked Sheet							
Int 2	202.57	138.84	133.32	174.26	227.73	199.09	149.08
Int 3	199.05	137.26	132.22	173.26	227.05	199.09	149.02
Int 4	193.13	134.17	126.45	167.57	221.80	193.84	144.39
Thin Pale Crepe							
Int 1	na	206.01	200.42	224.99	286.17	259.84	212.56
Int 9	na	212.01	206.42	230.99	292.17	265.84	218.55
SSR 20	192.88	137.34	131.46	175.56	223.54	188.90	150.39
SSR 50	191.00	135.34	129.46	173.56	221.54	186.90	148.39
Pepper (\$ per 100 kg, fob)							
Black Lampung	1,047.32	175.56	200.52	286.54	357.04	326.96	625.18
White Muntok Genuine	1,233.59	217.60	348.05	449.57	519.83	503.91	914.01
Coffee AP1 (\$ per 100 kg, fob)	461.40	164.13	184.46	402.27	425.50	289.79	327.27
Crude Coconut Oil (\$ per 100 kg, fob) (in Drums)	101.28	106.49	84.43	102.50	112.14	120.83	110.58
Tin (RM/kg, fob)	16.83	15.21	13.14	14.19	15.35	15.34	15.54

Source : Singapore Commodity Exchange

Chinese Produce Exchange

Note : Int = International

SSR = Singapore Specified Rubber

AP1 = After Polished Grade 1

RM = Ringgit Malaysia

17.12

PRIVATE PROPERTY PRICE INDEX BY TYPE OF PROPERTY (1990=100)

Type of Property	Weights ¹	1987	1992	1993	1994	1995	1996	1997
All Properties	10,000	72.8	123.1	153.2	216.2	254.9	283.6	259.8
Residential	8,357	74.2	127.6	163.4	234.8	273.8	305.0	278.2
Detached	1,114	78.4	128.1	188.0	325.9	384.4	397.2	363.2
Semi-detached	990	81.9	130.2	188.1	284.7	323.7	337.4	317.0
Terrace Houses	1,500	77.5	128.9	173.9	247.5	287.1	298.8	263.0
Private Flats	1,513	70.8	127.5	152.7	196.9	233.6	268.5	240.5
Condominium Units	3,240	68.5	126.1	147.6	200.1	233.3	283.3	261.8
Commercial	1,232	63.8	93.6	91.6	111.6	142.8	149.7	137.1
Offices	586	51.2	93.5	92.5	117.3	163.4	172.2	157.2
Shops	646	75.6	93.6	90.7	106.4	124.1	129.3	119.0
Industrial	411	56.8	121.2	129.3	151.1	207.3	251.7	253.3
Flatted Factories	354	na	121.2	129.2	153.5	210.0	251.5	256.0
Warehouses	57	na	121.4	130.3	136.4	190.1	252.8	235.6

Source : Urban Redevelopment Authority

Note : Data from 1992 are compiled from Caveats lodged with Registry of Land Titles and Deeds.

¹ Based on transaction values in 1990.

17.13

COMMERCIAL PROPERTY RENTAL INDEX BY TYPE OF PROPERTY (1990=100)

Type of Property	Weights ¹	1992	1993	1994	1995	1996	1997
Office Space							
Whole of Central Region	10,000	86.0	74.0	74.9	96.3	106.9	101.9
Central Area	8,469	86.7	74.4	75.3	97.5	106.1	101.3
Downtown Core	6,049	83.4	71.1	71.8	97.2	103.9	99.7
Orchard	1,389	93.4	77.2	77.6	95.2	109.3	107.4
Rest of Central Area	1,031	97.0	89.3	92.5	102.6	114.6	102.4
Fringe Area	1,531	82.1	72.2	72.6	89.7	111.6	105.3
Shop Space							
Whole of Central Region	10,000	85.1	82.2	78.8	75.0	68.0	65.3
Central Area	9,227	86.0	83.2	79.3	76.0	68.5	65.7
Downtown Core	1,536	77.2	82.3	90.6	83.9	79.4	75.5
Orchard	6,795	84.9	79.6	74.4	71.4	64.1	62.8
Rest of Central Area	896	109.4	112.4	97.0	97.4	82.5	71.2
Fringe Area	773	73.7	70.3	72.1	63.3	62.3	60.3

Source : Urban Redevelopment Authority

Note : Data exclude HDB properties and other public sector properties.

¹ Based on rental values in 1990.

EDUCATION

Every child in Singapore undergoes at least ten years of general education. A fundamental feature of Singapore's education system is the bilingual policy which ensures that each child learns both English and his mother tongue, so as to maintain an awareness of his cultural heritage whilst learning the skills to function in a modern, industrialized economy.

Primary Education

At the Primary level, pupils go through a four-year foundation stage (from Primary One to Four), and a two-year orientation stage (from Primary Five to Six). At the foundation stage, the emphasis is basic literacy and numeracy skills. Eighty per cent of curriculum time is devoted to giving pupils a working knowledge of English and a good grounding in the mother tongue and Mathematics.

At the end of Primary Four, pupils are placed in different language streams according to their abilities. At the end of primary schooling, all pupils will take the Primary School Leaving Examination (PSLE), the purpose of which is to assess pupils' ability and place them in the appropriate secondary school course to suit their learning pace and aptitude.

Secondary Education

Secondary education may take four or five years, depending on the ability of the child. Pupils in the Special and Express courses sit for the General Certificate of Education 'Ordinary' Level (GCE 'O' Level) Examination at the end of their fourth year. Pupils in the Normal Course may take the Normal (Academic) or Normal (Technical) course, both of which lead to the General Certificate of Education 'Normal' Level (GCE 'N' Level) Examination at the end

of their fourth year. Those who do well may do a fifth year of study in preparation for the GCE 'O' Level.

Post Secondary Education

On completing secondary education, pupils can enter a junior college for a two-year pre-university course or a centralised institute for a three-year course. At the end of the pre-university course, pupils sit for the General Certificate of Education 'Advanced' Level (GCE 'A' Level) Examination, the results of which determine their eligibility for tertiary education.

Pupils interested in technical and commercial studies can join the polytechnics for diploma courses or the Institute of Technical Education's technical institutes for Industrial Technician Certificate, National Technical Certificate Grade 2, Certificate in Business Studies or Certificate in Office Skills Courses. Polytechnic graduates who do well may also pursue degree courses at the universities. ITE graduates who perform well may pursue diploma courses at the Polytechnics.

Institute of Technical Education

The Institute of Technical Education, Singapore (ITE), is an integral part of Singapore's education and training system. As a post-secondary institution, equal emphasis and attention are accorded to pre-employment training for school leavers and Continuing Education and Training (CET) for working adults.

ITE provides pre-employment training to school leavers through 2 main approaches, namely, full-time institutional training in an

ITE institute and apprenticeship training in partnership with companies. Full-time institutional training is offered to GCE 'O' and GCE 'N' school leavers. Technical courses lead to the award of the Industrial Technician Certificate (ITC) and the National Technical Certificate Grade 2 (NTC-2), Business Studies courses lead to the award of the Certificate in Business Studies (CBS) and the Certificate in Office Skills (COS). Provisions are also made for school leavers with less than 10 years of general education to receive vocational training up to the National Technical Certificate Grade 3 (NTC-3) in separate Vocational Training Centres or selected apprenticeship programmes.

The apprenticeship system provides an attractive alternative avenue for school leavers to earn as they learn. Training is conducted on- and off-the-job. The latter is conducted either in ITE institutes or Approved Training Centres run by companies or industry associations. Most apprenticeship programmes lead to the NTC-level certification and cater to the needs of the manufacturing sector. Other apprenticeship courses available are Certificate in Health Care (In-patient and Out-patient), Certificate in Travel Services, Certificate in Retailing (Sales and Customer Service) and COS.

ITE's Continuing Education and Training includes skills training programmes and academic education programmes. Skills training comprises 3 broad-based programmes leading to the Certificate of Competency (CoC) and NTC for working adults who wish to acquire a new skill or upgrade their existing skills. These are the Modular Skills Training (MOST), Training Initiative for Mature Employees (TIME) and Adult Cooperative Training Scheme (ACTS) programmes. MOST is opened to workers with at least a PSLE education or its equivalent. TIME is targeted at mature workers aged 40 years and above. ACTS is for working adults between 20 and 40 years old.

Two national worker education programmes, namely, the Basic Education for Skills Training (BEST) and Worker Improvement through Secondary Education (WISE) programmes are offered by ITE for working adults to achieve functional competencies in English Language and Mathematics and to lay the foundation for skills training and further academic education. ITE also offers continuing education programmes for working adults to upgrade their general education on a part-time basis to the GCE 'N', 'O' and 'A' levels.

Higher Learning

The institutions of higher learning in Singapore are the National University of Singapore, the Nanyang Technological University, the Singapore Polytechnic, the Ngee Ann Polytechnic, the Temasek Polytechnic and the Nanyang Polytechnic.

The National University of Singapore (NUS) was established in August 1980 with the merger of the University of Singapore (founded in 1962) and Nanyang University (founded in 1956).

The University has eight faculties, namely, Architecture and Building, Arts and Social Sciences, Business Administration, Dentistry, Engineering, Law, Medicine and Science. All faculties offer courses leading to first degrees as well as higher degrees. There are also six postgraduate schools for Arts & Social Sciences, Business, Dental Studies, Engineering, Medical Studies and Science.

Research is accorded top priority at the University. NUS has established specialist research institutes and centres. These include the East Asia Institute, the Institute of Systems Science, National University Medical Institutes, American Studies Centre, Bioinformatics

Centre, National Supercomputing Research Centre and Tropical Marine Science Initiative. There are five research institutes which are affiliated to the University, namely, the Institute of Molecular and Cell Biology, the Institute of Micro-electronics, the Institute of Molecular Agro-biology, the Data Storage Institute and the Institute for Materials Engineering and Research.

The Nanyang Technological University (NTU) was established on 1 July 1991. It has its origin in the former Nanyang Technological Institute (NTI) which was set up in 1981. In its main campus in Yunnan Garden, there are six schools, namely, the Schools of Accountancy and Business, Applied Science, Civil and Structural Engineering, Electrical and Electronic Engineering, Mechanical and Production Engineering and Communication Studies.

NTU places top priority in relating its professional courses to the requirements of industry and business. Apart from the undergraduate courses, NTU offers postgraduate programmes leading to the award of higher degrees as well as postgraduate diplomas. In order to facilitate research and advanced training, various research institutes and centres are set up at the University.

The National Institute of Education (NIE), formed in July 1991 by the merging of the former Institute of Education and the College of Physical Education, became part of NTU on the same day. Located at the University's branch campus in Bukit Timah, NIE provides professional training for teachers as well as the study of Science, Physical Education, the Humanities and Fine Arts in its four schools, respectively the Schools of Education, Science, Physical Education and Arts.

Four-year courses leading to either a Bachelor of Arts or Bachelor of Science degree

with Diploma In Education were introduced for the first time in 1991. NIE also offers the Postgraduate Diploma in Education programmes for university graduates and the two-year Diploma in Education and Diploma in Physical Education programmes for holders of GCE 'A' level and Diploma qualifications. In addition to the initial teacher-training courses, NIE conducts a variety of in-service training programmes. Facilities are also available at NIE for higher degree studies leading to the degrees of Master and Doctor of Philosophy.

The Open University : Since 1994, the Singapore Institute of Management has been appointed by the Ministry of Education to run the Open University Degree Programmes (OUDP). The undergraduate programmes are accredited and examined to the standards maintained by the Open University in the United Kingdom. Open University degrees are recognised and accepted on par with the British degrees by employers in Singapore. The Public Service Commission has indicated that it would accept Open University degrees for employment in the Civil Service.

The OUDP offers courses leading to Bachelor of Arts in English Language and Literature, Bachelor of Arts (English with Economics, Management or Psychology), Bachelor of Science in Mathematics, Bachelor of Science (Mathematics with Economics, Management or Psychology), Bachelor of Science in Computer Science, Bachelor of Science (Computer Science with Economics, Management or Psychology), Bachelor of Science (Psychology with Economics or Management) and Bachelor of Science (Honours) in Technology with Electronics.

Polytechnics : There are four polytechnics offering a wide range of courses at diploma and post diploma levels. They are the Singapore Polytechnic, Ngee Ann Polytechnic, Temasek Polytechnic and Nanyang Polytechnic. Each of the polytechnics

18 EDUCATION (cont'd)

specializes in specific fields, in addition to various basic engineering, general business and management and computing courses. The specialized fields include maritime studies, publishing, information technology and design, library studies, health sciences, optometry, nursing, sonography, police studies and security management and insurance practice. Some of the courses are conducted on a part-time basis

for the working adults.

Expenditure on Education

Education has been a major item of public expenditure, accounting for about 25.3% of the total government recurrent expenditure. A substantial proportion of the cost of education is subsidized by the State.

18.2 STUDENTS AND TEACHERS IN EDUCATIONAL INSTITUTIONS
END JUNE 1997

Institution	Students		Teachers	
	Total	Female	Total	Female
Nanyang Technological University	40,683	22,286	18,397	7,378
National University of Singapore	1,126	963	2,188	887
National Institute of Education	1	1	1	1
Polytechnics	681	671	1,011	681
Institute of Technical Education	10	9	10	9
Junior Colleges	14	14	21	21
Continental Institutions	1	1	1	1
Secondary Schools	147	147	187,412	98,634
Primary Schools	196	196	280,108	142,802
Total	417,14	372,340	316,112	181,122
Notes: Figures for primary, secondary, and pre-university exclude private schools.				

18.1

ENROLMENT IN EDUCATIONAL INSTITUTIONS

	1987	1992	1993	1994	1995	1996	1997
Total	523,666	524,084	529,933	538,774	558,705	576,869	597,240
Primary Schools	261,399	262,465	261,402	251,005	261,553	269,590	280,108
Secondary Schools	171,617	155,832	155,296	173,934	180,982	184,726	187,415
Pre-University ¹	29,508	24,663	23,958	22,857	21,690	22,032	22,419
Institute of Technical Education ²	16,166	15,117	15,168	12,492	9,476	8,233	9,906
Institutions of Higher Learning ³	44,976	66,007	74,109	78,486	85,004	92,288	97,392

Source : Ministry of Education

Note : Figures for primary, secondary and pre-university exclude private schools.

1 Include Pre-U Centres, Centralised Institutes and Junior Colleges.

2 Refer to average enrolment of full-time students. Enrolment for 1994 decreased because of reduced pool of primary 8 Monolingual and Extended school leavers with the phasing in of the Improved Education System.

3 Include National University of Singapore, Nanyang Technological University, Singapore Polytechnic, Ngee Ann Polytechnic, Temasek Polytechnic and Nanyang Polytechnic.

18.2

STUDENTS AND TEACHERS IN EDUCATIONAL INSTITUTIONS, END JUNE 1997

	Institutions ¹	Students			Teachers		
		Total	Males	Females	Total	Males	Females
Total	378	597,240	316,115	281,125	30,941	12,674	18,267
Primary Schools	196	280,108	145,805	134,303	11,189	2,457	8,732
Secondary Schools	147	187,415	98,624	88,791	9,049	3,272	5,777
Centralised Institutes	4	1,146	407	739	114	44	70
Junior Colleges	14	21,273	9,882	11,391	1,510	612	898
Institute of Technical Education ²	10	9,906	7,245	2,661	1,315	994	321
Polytechnics	4	53,553	30,904	22,649	3,639	2,351	1,288
National Institute of Education	1	3,156	962	2,194	447	235	212
National University of Singapore & Nanyang Technological University	2	40,683	22,286	18,397	3,678	2,709	969

Source : Ministry of Education

Notes : Figures for primary, secondary and pre-university exclude private schools.

Figures for institutions of higher learning include part-time students and teachers.

1 A school conducting both primary and secondary classes is treated as one primary and one secondary school.

2 Refer to full-time teaching staff and students.

18.3 ENROLMENT IN GOVERNMENT AND GOVERNMENT-AIDED PRIMARY SCHOOLS BY LEVEL AND AGE

	1987	1992	1993	1994	1995	1996	1997
Total	261,399	262,465	261,402	251,005	261,553	269,590	280,108
Level							
Primary 1	40,218	41,622	38,055	43,684	53,117	48,082	51,520
Primary 2	40,161	40,672	41,736	38,319	43,847	53,407	48,242
Primary 3	39,344	39,790	40,878	42,030	38,577	44,054	53,623
Primary 4	38,702	41,901	40,000	41,113	42,209	38,775	44,214
Primary 5	43,421	49,103	42,153	40,221	41,269	42,338	38,904
EM1	-	5,739	6,368	6,784	7,187	7,561	7,203
EM2	-	36,299	32,182	30,277	30,439	31,071	28,389
EM3	-	7,065	3,603	3,160	3,643	3,706	3,312
Primary 6	40,540	33,309	50,488	45,638	42,534	42,934	43,605
EM1	-	-	5,542	6,078	6,384	6,744	6,933
EM2	-	-	36,163	30,623	28,553	28,889	29,390
EM3	-	-	8,783	8,937	7,597	7,301	7,282
Primary 7	8,534	7,991	-	-	-	-	-
Primary 8	10,479	8,077	8,092	-	-	-	-
Age (in years)							
Under 7	40,039	41,239	37,583	43,222	52,655	47,515	50,868
7 & Under 8	40,083	40,410	41,543	37,926	43,467	53,060	47,851
8 & Under 9	39,148	39,505	40,553	41,719	38,083	43,685	53,251
9 & Under 10	38,372	41,593	39,675	40,775	41,912	38,237	43,821
10 & Under 11	42,968	41,358	41,730	39,895	40,970	42,077	38,397
11 & Under 12	39,611	40,437	41,445	41,880	40,012	41,060	42,144
12 & Under 13	11,586	10,895	11,183	3,628	2,887	2,600	2,493
13 & Under 14	8,896	6,766	7,397	1,821	1,418	1,189	1,069
14 & Over	696	262	293	139	149	167	214

Source : Ministry of Education

Notes : EM1 refers to the stream where pupils learn English and the mother tongue at higher level (Higher Chinese, Higher Malay or Higher Tamil formerly known as CL1, ML1 and TL1).

EM2 refers to the stream where pupils learn English and the mother tongue (Chinese, Malay or Tamil formerly known as CL2, ML2 and TL2).

EM3 refers to the stream where pupils learn English and the mother tongue (Chinese, Malay or Tamil) at basic proficiency level.

18.4

ENROLMENT IN GOVERNMENT AND GOVERNMENT-AIDED SECONDARY SCHOOLS AND JUNIOR COLLEGES BY LEVEL AND AGE

	Number						
	1987	1992	1993	1994	1995	1996	1997
Total	201,125	180,495	179,254	196,791	202,672	206,758	209,834
Level							
Secondary 1	38,987	36,505	36,680	54,587	43,500	40,888	41,614
Special	2,169	2,519	2,739	3,671	4,127	3,980	4,049
Express	22,370	19,989	20,729	25,265	22,128	21,292	21,244
Normal (Academic)	14,448	13,997	13,212	17,063	9,985	8,932	9,344
Normal (Technical)	-	-	-	8,588	7,260	6,684	6,977
Secondary 2	40,837	35,185	36,436	36,776	53,968	43,768	40,965
Special	2,203	2,424	2,682	2,873	3,527	4,091	3,880
Express	24,238	20,521	20,716	21,433	25,326	22,311	21,507
Normal (Academic)	14,396	12,240	13,038	12,470	17,173	10,673	9,475
Normal (Technical)	-	-	-	-	7,942	6,693	6,103
Secondary 3	41,728	35,767	35,728	36,970	37,366	53,395	44,617
Special	2,194	2,550	2,515	2,805	2,937	3,523	3,870
Express	25,340	20,995	21,020	21,116	21,835	25,554	23,398
Normal (Academic)	14,194	12,222	12,193	13,049	12,594	16,935	11,019
Normal (Technical)	-	-	-	-	-	7,383	6,330
Secondary 4	38,910	37,884	35,306	35,433	36,238	36,283	50,478
Special	1,791	2,316	2,582	2,480	2,753	2,778	3,410
Express	24,134	22,807	20,877	20,935	20,670	21,257	24,270
Normal (Academic)	12,985	12,761	11,847	12,018	12,815	12,248	15,974
Normal (Technical)	-	-	-	-	-	-	6,824
Secondary 5	11,155	10,491	11,146	10,168	9,910	10,392	9,741
Normal (Academic)	11,155	10,491	11,146	10,168	9,910	10,392	9,741
Pre-University 1	2,686	1,824	1,373	1,047	611	409	325
Pre-University 2	2,223	1,994	1,573	1,128	926	539	305
Pre-University 3	2,098	1,944	1,916	1,482	1,033	882	516
Junior College 1	11,884	9,371	10,213	9,566	10,051	10,575	11,197
Junior College 2	10,617	9,530	8,883	9,634	9,069	9,627	10,076
Age (in years)							
Under 12	17	18	20	22	43	42	35
12 & Under 13	30,594	29,498	29,537	38,239	39,268	37,713	38,796
13 & Under 14	36,633	32,255	32,969	38,992	40,451	40,981	39,174
14 & Under 15	39,926	34,192	35,308	39,225	39,931	40,930	41,332
15 & Under 16	37,693	38,041	33,913	35,312	38,897	39,389	40,420
16 & Under 17	28,187	23,373	26,211	23,212	24,390	27,577	27,821
17 & Under 18	19,744	17,064	15,650	17,117	15,472	16,238	18,805
18 & Under 19	6,381	4,685	4,266	3,654	3,474	3,134	2,936
19 & Under 20	1,655	1,160	1,144	837	649	650	425
20 & Over	295	209	236	181	97	104	90

Source : Ministry of Education

18.5

PRIVATE REGULAR SCHOOLS, STUDENTS AND TEACHERS

	Number						
	1987	1992	1993	1994	1995	1996	1997
Schools	4	4	4	4	4	4	3
Students	1,936	1,788	1,607	1,282	1,085	1,059	1,118
Primary	204	134	132	92	95	98	90
Secondary	437	530	538	549	566	598	690
Pre-university	1,295	1,124	937	641	424	363	338
Teachers	68	65	60	56	57	56	50

Source : Ministry of Education

18.6

ENROLMENT AT PRIMARY, SECONDARY AND PRE-UNIVERSITY LEVELS IN PRIVATE REGULAR SCHOOLS BY LEVEL

Level	Number						
	1987	1992	1993	1994	1995	1996	1997
Total	1,936	1,788	1,607	1,282	1,085	1,059	1,118
Primary	204	134	132	92	95	98	90
Primary 1	18	6	8	6	6	5	6
Primary 2	11	6	8	8	10	10	5
Primary 3	11	10	7	12	10	16	12
Primary 4	20	20	18	10	16	19	17
Primary 5	20	23	23	17	13	13	24
Primary 6	124	69	68	39	40	35	26
Secondary	437	530	538	549	566	598	690
Secondary 1	119	179	190	156	117	101	66
Secondary 2	87	152	153	163	120	77	77
Secondary 3	91	102	114	137	144	133	98
Secondary 4	140	97	81	93	185	287	449
Pre-university	1,295	1,124	937	641	424	363	338

Source : Ministry of Education

18.7

ENROLMENT IN INSTITUTIONS OF HIGHER LEARNING BY SEX

	1987	1992	1993	1994	1995	1996	Number 1997
Total	44,976	66,007	74,109	78,486	85,004	92,288	97,392
Males	27,812	37,828	42,183	44,373	47,603	51,200	54,152
Females	17,164	28,179	31,926	34,113	37,401	41,088	43,240
Polytechnics	24,611	35,753	40,900	43,574	47,792	51,254	53,553
Males	17,350	21,642	24,577	25,670	28,010	29,736	30,904
Females	7,261	14,111	16,323	17,904	19,782	21,518	22,649
National Institute of Education ¹	1,459	2,088	2,453	2,351	2,482	3,095	3,156
Males	271	487	609	647	658	857	962
Females	1,188	1,601	1,844	1,704	1,824	2,238	2,194
National University of Singapore & Nanyang Technological University ¹	18,906	28,166	30,756	32,561	34,730	37,939	40,683
Males	10,191	15,699	16,997	18,056	18,935	20,607	22,286
Females	8,715	12,467	13,759	14,505	15,795	17,332	18,397

Source : National University of Singapore
Nanyang Technological University
Singapore Polytechnic

Ngee Ann Polytechnic
Temasek Polytechnic
Nanyang Polytechnic

Note : Figures include part-time students.

¹ Include enrolment for both undergraduate and postgraduate courses.

18.8

PART-TIME ENROLMENT IN INSTITUTIONS OF HIGHER LEARNING BY SEX

	1987	1992	1993	1994	1995	1996	Number 1997
Total	5,786	8,690	10,110	10,179	10,904	12,360	13,070
Males	4,800	6,617	7,681	7,683	8,245	9,421	10,034
Females	986	2,073	2,429	2,496	2,659	2,939	3,036
Polytechnics	5,150	6,169	6,754	6,370	6,622	7,132	6,733
Males	4,345	4,684	5,137	4,861	5,086	5,494	5,294
Females	805	1,485	1,617	1,509	1,536	1,638	1,439
National Institute of Education ¹	135	143	175	207	243	221	278
Males	45	47	85	91	98	95	104
Females	90	96	90	116	145	126	174
National University of Singapore & Nanyang Technological University ¹	501	2,378	3,181	3,602	4,039	5,007	6,059
Males	410	1,886	2,459	2,731	3,061	3,832	4,636
Females	91	492	722	871	978	1,175	1,423

Source : See Table 18.7.

¹ Include enrolment for both undergraduate and postgraduate courses.

18.9 STUDENTS ADMITTED TO INSTITUTIONS OF HIGHER LEARNING BY SEX

	Number						
	1987	1992	1993	1994	1995	1996	1997
Total	15,496	23,419	25,362	25,609	27,792	29,645	29,801
Males	9,035	12,554	13,657	13,765	14,702	15,631	15,515
Females	6,461	10,865	11,705	11,844	13,090	14,014	14,286
Polytechnics ¹	9,311	13,879	15,889	16,105	17,978	18,817	18,736
Males	6,331	8,088	9,203	9,155	10,261	10,754	10,426
Females	2,980	5,791	6,686	6,950	7,717	8,063	8,310
National Institute of Education ²	928	1,636	1,460	1,064	1,097	1,809	1,760
Males	222	386	386	325	325	517	555
Females	706	1,250	1,074	739	772	1,292	1,205
National University of Singapore & Nanyang Technological University ²	5,257	7,904	8,013	8,440	8,717	9,019	9,305
Males	2,482	4,080	4,068	4,285	4,116	4,360	4,534
Females	2,775	3,824	3,945	4,155	4,601	4,659	4,771

Source : National University of Singapore
Nanyang Technological University
Singapore Polytechnic

Ngee Ann Polytechnic
Temasek Polytechnic
Nanyang Polytechnic

Note : Data refer to academic year.

1 Include part-time students.

2 Cover undergraduates only.

18.10 PART-TIME STUDENTS ADMITTED TO INSTITUTIONS OF HIGHER LEARNING BY SEX

	Number						
	1987	1992	1993	1994	1995	1996	1997
Total	1,774	2,430	2,588	2,013	2,565	3,071	2,413
Males	1,514	1,853	1,849	1,469	1,886	2,371	1,859
Females	260	577	739	544	679	700	554
Polytechnics	1,716	2,430	2,537	1,961	2,379	2,707	2,083
Males	1,500	1,853	1,825	1,446	1,762	2,060	1,599
Females	216	577	712	515	617	647	484
National Institute of Education ¹	58	-	51	52	70	46	47
Males	14	-	24	23	29	22	23
Females	44	-	27	29	41	24	24
National University of Singapore & Nanyang Technological University	-	-	-	-	116	318	283
Males	-	-	-	-	95	289	237
Females	-	-	-	-	21	29	46

Source : See Table 18.9.

Note : Data refer to academic year.

1 Cover undergraduates only.

MALE STUDENTS ADMITTED TO INSTITUTIONS OF HIGHER LEARNING BY COURSE

Course	Number						
	1987	1992	1993	1994	1995	1996	1997
Total	9,035	12,554	13,657	13,765	14,702	15,631	15,515
National University of Singapore (NUS) ¹	2,160	1,953	2,121	2,318	2,242	2,162	2,398
Arts & Social Sciences	238	357	370	428	366	432	403
Science ²	443	668	705	691	601	634	583
Medicine	102	115	110	113	111	104	123
Dentistry	21	19	24	22	19	19	18
Law	109	83	90	70	95	79	56
Business Administration	171	141	183	261	208	167	199
Architecture, Building & Real Estate	100	140	110	111	106	92	123
Engineering	976	430	529	622	641	560	823
B.Tech. (Electronics Engineering) ³	-	-	-	-	95	75	70
Nanyang Technological University (NTU) ^{1,4,5}	322	2,127	1,947	1,967	1,874	2,198	2,136
Engineering ⁵	129	1,251	1,123	1,144	1,074	1,315	1,347
Accountancy ⁶	193	298	271	252	278	296	256
Business	-	234	211	235	210	211	153
Communication Studies	-	-	28	27	20	35	40
Computer Engineering ⁷	-	274	219	210	214	249	233
Materials Engineering	-	33	52	37	39	49	54
Arts with Diploma in Education	-	24	29	45	24	28	29
Science with Diploma in Education	-	13	14	17	15	15	24
National Institute of Education (NIE) ^{1,8}	222	386	386	325	325	517	555

(continued on next page)

Note : Data refer to academic year.

- 1 Cover undergraduates only.
- 2 Include Pharmacy, Information Systems and Computer Science.
- 3 B.Tech. (Electronics Engineering) is a part-time course.
- 4 NTU was established in July 1991, with its origin in the former Nanyang Technological Institute.
- 5 Exclude second year engineering students transferred from NUS. There is no more streaming from NUS into 2nd year from 1992 onwards.
- 6 The School of Accountancy was transferred from NUS to the former Nanyang Technological Institute in July 1987.
- 7 Prior to 1994, it was known as Computer Technology.
- 8 NIE, formed in July 1991 by merging of the former Institute of Education and College of Physical Education, is part of NTU.

18.11 MALE STUDENTS ADMITTED TO INSTITUTIONS OF HIGHER LEARNING BY COURSE (continued)

Course	Number						
	1987	1992	1993	1994	1995	1996	1997
Singapore Polytechnic	3,846	4,367	4,528	4,300	4,773	4,382	3,944
Engineering ⁹	3,409	3,449	3,508	3,295	3,504	3,166	2,869
Architecture & Building	198	278	326	348	356	300	287
Nautical ¹⁰	83	171	167	138	155	177	139
Business ¹¹	106	284	302	348	510	446	351
Computer ¹²	50	185	225	171	248	293	298
Ngee Ann Polytechnic	2,485	3,115	2,736	2,811	3,113	2,745	2,865
Engineering	2,128	2,652	2,183	2,131	2,366	2,108	2,195
Business Studies & Accountancy	279	293	314	350	402	275	282
Computer Studies	78	135	183	260	263	242	292
Mass Communication & Film, Sound & Video	-	35	56	70	82	120	96
Temasek Polytechnic ¹³	-	484	790	862	1,184	2,336	2,228
Business	-	198	217	179	154	406	419
Design	-	78	99	109	92	103	108
Information Technology & Applied Science	-	72	201	172	196	325	322
Engineering	-	128	268	393	742	1,502	1,368
Library	-	8	5	9	-	-	-
Administration	-	-	-	-	-	-	11
Nanyang Polytechnic ¹⁴	-	122	1,149	1,182	1,191	1,291	1,389
Business	-	84	107	138	111	166	172
Health Science	-	38	59	95	95	107	98
Engineering ¹⁵	-	-	903	874	882	892	952
Information Technology ¹⁶	-	-	80	75	103	126	167

Source : National University of Singapore
Nanyang Technological University
Singapore Polytechnic

Ngee Ann Polytechnic
Temasek Polytechnic
Nanyang Polytechnic

Notes : Data refer to academic year.

Figures for Polytechnics include part-time students.

9 Include technology courses, eg Biotechnology.

10 Include Maritime Transportation.

11 From 1993, it was known as Business and include Accountancy, Banking and Finance.

12 Refer to courses conducted by Japan-Singapore Institute of Software Technology. The Institute was transferred to

Singapore Polytechnic with effect from 1 April 1987.

13 Temasek Polytechnic was established in April 1990.

14 Nanyang Polytechnic was established in April 1992.

15 Include Engineering Informatics, Product Design & Development.

16 Include Digital Media Design.

18.12

FEMALE STUDENTS ADMITTED TO INSTITUTIONS OF HIGHER LEARNING
BY COURSE

	Number						
Course	1987	1992	1993	1994	1995	1996	1997
Total	6,461	10,865	11,705	11,844	13,090	14,014	14,286
National University of Singapore (NUS) ¹	2,326	2,588	2,595	2,697	2,950	3,117	3,067
Arts & Social Sciences	773	1,029	1,115	1,103	1,239	1,200	1,203
Science ²	689	736	686	853	857	856	807
Medicine	79	35	40	37	39	47	57
Dentistry	14	15	10	12	14	15	16
Law	87	117	100	109	76	81	94
Business Administration	337	423	411	350	411	449	398
Architecture, Building & Real Estate	126	131	136	141	157	205	200
Engineering	221	102	97	92	136	249	279
B.Tech. (Electronics Engineering) ³	-	-	-	-	21	15	13
Nanyang Technological University (NTU) ^{1,4,5}	449	1,236	1,350	1,458	1,651	1,542	1,704
Engineering ⁵	24	139	147	229	323	305	411
Accountancy ⁶	425	420	450	491	484	492	494
Business	-	429	473	491	465	470	475
Communication Studies	-	-	69	78	93	87	81
Computer Engineering ⁷	-	25	32	35	69	46	54
Materials Engineering	-	27	14	26	43	59	77
Arts with Diploma in Education	-	170	134	91	134	60	81
Science with Diploma in Education	-	26	31	17	40	23	31
National Institute of Education (NIE) ^{1,8}	706	1,250	1,074	739	772	1,292	1,205

(continued on next page)

Note : Data refer to academic year.

1 Cover undergraduates only.

2 Include Pharmacy, Information Systems and Computer Science.

3 B.Tech. (Electronics Engineering) is a part-time course.

4 NTU was established in July 1991, with its origin in the former Nanyang Technological Institute.

5 Exclude second year engineering students transferred from NUS. There is no more streaming from NUS into 2nd year from 1992 onwards.

6 The School of Accountancy was transferred from NUS to the former Nanyang Technological Institute in July 1987.

7 Prior to 1994, it was known as Computer Technology.

8 NIE, formed in July 1991 by merging of the former Institute of Education and College of Physical Education, is part of NTU.

18.12

FEMALE STUDENTS ADMITTED TO INSTITUTIONS OF HIGHER LEARNING BY COURSE (continued)

Course							Number
	1987	1992	1993	1994	1995	1996	1997
Singapore Polytechnic	1,316	2,395	2,427	2,289	2,338	2,211	2,102
Engineering ⁹	836	1,222	1,217	1,243	1,149	1,071	1,058
Architecture & Building	119	255	267	261	251	249	204
Nautical ¹⁰	-	23	25	28	27	38	36
Business ¹¹	239	701	736	680	808	739	667
Computer ¹²	122	194	182	77	103	114	137
Ngee Ann Polytechnic	1,664	2,110	1,976	2,182	2,167	2,143	2,146
Engineering	540	807	808	878	867	864	914
Business Studies & Accountancy	934	988	884	1,018	1,019	950	876
Computer Studies	190	226	180	154	159	148	153
Mass Communication & Film, Sound & Video	-	89	104	132	122	181	203
Temasek Polytechnic ¹³	-	709	970	976	1,528	2,009	2,219
Business	-	393	466	401	527	767	787
Design	-	109	83	99	147	157	168
Information Technology & Applied Science	-	109	211	183	331	449	473
Engineering	-	42	148	244	523	636	781
Library	-	56	62	49	-	-	-
Administration	-	-	-	-	-	-	10
Nanyang Polytechnic ¹⁴	-	577	1,313	1,503	1,684	1,700	1,843
Business	-	300	326	393	448	430	485
Health Science	-	277	498	555	664	718	675
Engineering ¹⁵	-	-	393	462	471	434	578
Information Technology ¹⁶	-	-	96	93	101	118	105

Source: National University of Singapore
Nanyang Technological University
Singapore Polytechnic

Ngee Ann Polytechnic
Temasek Polytechnic
Nanyang Polytechnic

Notes : Data refer to academic year.

Figures for Polytechnics include part-time students.

9 Include technology courses, eg Biotechnology.

10 Include Maritime Transportation.

11 From 1993, it was known as Business and include Accountancy, Banking and Finance.

12 Refer to courses conducted by Japan-Singapore Institute of Software Technology. The Institute was transferred to Singapore Polytechnic with effect from 1 April 1987.

13 Temasek Polytechnic was established in April 1990.

14 Nanyang Polytechnic was established in April 1992.

15 Include Engineering Informatics, Product Design & Development.

16 Include Digital Media Design.

18.13

GRADUATES FROM INSTITUTIONS OF HIGHER LEARNING BY SEX

	1987	1992	1993	1994	1995	1996	1997
Total	11,883	16,436	18,433	19,813	20,702	21,828	24,070
Males	6,847	8,815	9,771	10,734	10,739	11,469	12,345
Females	5,036	7,621	8,662	9,079	9,963	10,359	11,725
Polytechnics ¹	6,436	8,582	10,016	11,025	11,457	12,650	13,904
Males	4,545	5,352	5,940	6,507	6,418	7,182	7,667
Females	1,891	3,230	4,076	4,518	5,039	5,468	6,237
National Institute of Education ²	809	1,223	1,169	1,273	1,318	960	1,487
Males	158	289	266	338	317	265	402
Females	651	934	903	935	1,001	695	1,085
National University of Singapore & Nanyang Technological University ²	4,638	6,631	7,248	7,515	7,927	8,218	8,679
Males	2,144	3,174	3,565	3,889	4,004	4,022	4,276
Females	2,494	3,457	3,683	3,626	3,923	4,196	4,403

Source : National University of Singapore
Nanyang Technological University
Singapore Polytechnic

Ngee Ann Polytechnic
Temasek Polytechnic
Nanyang Polytechnic

Note : Data refer to academic year.

1 Include graduates from part-time courses.

2 Cover first degree graduates only.

18.14

GRADUATES FROM PART-TIME COURSES OF INSTITUTIONS OF HIGHER LEARNING BY SEX

	1987	1992	1993	1994	1995	1996	1997
Total	1,187	1,219	1,290	1,235	1,517	1,403	1,900
Males	899	952	926	949	1,080	1,017	1,309
Females	288	267	364	286	437	386	591
Polytechnics	1,150	1,147	1,231	1,215	1,467	1,353	1,845
Males	898	933	919	932	1,058	997	1,282
Females	252	214	312	283	409	356	563
National Institute of Education ¹	37	72	59	20	50	50	55
Males	1	19	7	17	22	20	27
Females	36	53	52	3	28	30	28

Source : See Table 18.13.

Note : Data refer to academic year.

1 Cover first degree graduates only.

18.15

MALE GRADUATES FROM INSTITUTIONS OF HIGHER LEARNING
BY COURSE

Number								
Course	1987	1992	1993	1994	1995	1996	1997	
Total	6,847	8,815	9,771	10,734	10,739	11,469	12,345	
National University of Singapore (NUS) ¹	1,584	1,926	2,010	2,181	2,117	2,201	2,472	
Arts & Social Sciences	281	407	481	512	497	497	554	
Science ²	432	609	678	682	778	820	816	
Medicine	155	119	95	99	93	97	107	
Dentistry	23	27	14	23	20	24	20	
Law	82	115	92	87	94	75	90	
Business Administration	151	211	183	280	147	147	244	
Accountancy	99	-	-	-	-	-	-	
Architecture, Building & Real Estate	152	99	132	136	140	142	135	
Engineering	209	339	335	362	348	399	506	
Nanyang Technological University (NTU) ^{1,3}	560	1,248	1,555	1,708	1,887	1,821	1,804	
Engineering	560	869	978	1,062	1,050	1,041	1,069	
Accountancy	-	208	295	271	289	262	227	
Business	-	60	99	133	219	211	204	
Computer Engineering	-	111	183	213	276	213	178	
Materials Engineering	-	-	-	29	41	48	53	
Arts with Diploma in Education	-	-	-	-	6	27	22	
Science with Diploma in Education	-	-	-	-	6	14	8	
Arts (Hons)	-	-	-	-	-	1	7	
Science (Hons)	-	-	-	-	-	4	8	
Communication Studies	-	-	-	-	-	-	28	
National Institute of Education (NIE) ^{1,4}	158	289	266	338	317	265	402	

(continued on next page)

Notes : Data refer to academic year.

1 Cover first degree graduates only.

2 Include Pharmacy, Information Systems and Computer Science.

3 NTU was established in July 1991, with its origin in the former Nanyang Technological Institute.

4 NIE, formed in July 1991 by merging of the former Institute of Education and College of Physical Education, is part of NTU.

18.15 MALE GRADUATES FROM INSTITUTIONS OF HIGHER LEARNING BY COURSE (continued)

Course	1987	1992	1993	1994	1995	1996	1997
Singapore Polytechnic	2,776	3,104	3,315	3,344	3,306	3,278	3,591
Engineering ⁵	2,397	2,576	2,769	2,794	2,655	2,566	2,652
Architecture & Building	234	190	174	146	220	229	286
Nautical ⁶	35	42	70	123	98	154	143
Business ⁷	55	165	163	168	227	223	392
Computer ⁸	55	131	139	113	106	106	118
Ngee Ann Polytechnic	1,769	2,105	2,235	2,361	2,326	2,425	2,444
Engineering	1,511	1,852	1,979	2,042	1,929	1,929	1,881
Business Studies & Accountancy	160	180	179	210	256	292	300
Computer Studies	98	68	66	94	114	153	200
Mass Communication & Film, Sound & Video	-	5	11	15	27	51	63
Temasek Polytechnic ⁹	-	143	195	386	384	559	661
Business	-	111	105	201	134	120	172
Design	-	32	27	46	66	103	75
Information Technology & Applied Science	-	-	51	45	73	135	139
Engineering	-	-	-	86	106	201	275
Library	-	-	12	8	5	-	-
Nanyang Polytechnic ¹⁰	-	-	195	416	402	920	971
Engineering ¹¹	-	-	195	412	268	731	734
Health Science	-	-	-	4	43	44	77
Business	-	-	-	-	91	88	96
Information Technology	-	-	-	-	-	57	64

Source : National University of Singapore
Nanyang Technological University
Singapore Polytechnic

Ngee Ann Polytechnic
Temasek Polytechnic
Nanyang Polytechnic

Notes : Data refer to academic year.

Figures for Polytechnics include part-time courses.

5 Include technology courses, eg Biotechnology.

6 Include Maritime Transportation.

7 From 1993, it was known as Business and include Accountancy, Banking and Finance.

8 Refer to courses conducted by Japan-Singapore Institute of Software Technology. The Institute was transferred to Singapore Polytechnic with effect from 1 April 1987.

9 Temasek Polytechnic was established in April 1990.

10 Nanyang Polytechnic was established in April 1992.

11 Data for 1993 refer to students transferred from the Economic Development Board institutions (graduates were conferred with the German-Singapore Institute or French-Singapore Institute certificates).

18.16

FEMALE GRADUATES FROM INSTITUTIONS OF HIGHER LEARNING
BY COURSE

Course	Number						
	1987	1992	1993	1994	1995	1996	1997
Total	5,036	7,621	8,662	9,079	9,963	10,359	11,725
National University of Singapore (NUS) ¹	2,390	2,689	2,655	2,621	2,803	2,944	3,021
Arts & Social Sciences	828	1,104	1,173	1,134	1,239	1,364	1,367
Science ²	580	728	843	801	811	794	878
Medicine	45	78	61	66	48	53	40
Dentistry	17	10	11	6	8	13	10
Law	90	79	93	99	100	106	97
Business Administration	367	479	262	282	377	390	370
Accountancy	311	-	-	-	-	-	-
Architecture, Building & Real Estate	118	158	144	182	156	136	163
Engineering	34	53	68	51	64	88	96
Nanyang Technological University (NTU) ^{1,3}	104	768	1,028	1,005	1,120	1,252	1,382
Engineering	104	175	135	104	145	119	178
Accountancy	-	443	396	378	395	433	453
Business	-	118	446	451	412	458	438
Computer Engineering	-	32	51	65	39	28	30
Materials Engineering	-	-	-	7	28	15	29
Arts with Diploma in Education	-	-	-	-	77	150	120
Science with Diploma in Education	-	-	-	-	24	25	23
Arts (Hons)	-	-	-	-	-	15	30
Science (Hons)	-	-	-	-	-	9	14
Communication Studies	-	-	-	-	-	-	67
National Institute of Education (NIE) ^{1,4}	651	934	903	935	1,001	695	1,085

(continued on next page)

Notes : Data refer to academic year.

1 Cover first degree graduates only.

2 Include Pharmacy, Information Systems and Computer Science.

3 NTU was established in July 1991, with its origin in the former Nanyang Technological Institute.

4 NIE, formed in July 1991 by merging of the former Institute of Education and College of Physical Education, is part of NTU.

Course	Number							
	1987	1992	1993	1994	1995	1996	1997	
Singapore Polytechnic	950	1,489	1,755	1,899	2,061	1,886	2,116	
Engineering ⁵	662	787	1,002	1,035	1,095	962	1,118	
Architecture & Building	172	116	150	197	259	203	225	
Nautical ⁶	-	-	1	16	17	19	27	
Business ⁷	37	435	444	517	590	654	685	
Computer ⁸	79	151	158	134	100	48	61	
Ngee Ann Polytechnic	941	1,660	1,757	1,882	1,749	1,720	1,913	
Engineering	422	563	617	684	656	630	766	
Business Studies & Accountancy	418	865	861	940	881	905	948	
Computer Studies	101	186	208	175	144	86	91	
Mass Communication & Film, Sound & Video	-	46	71	83	68	99	108	
Temasek Polytechnic ⁹	-	81	508	591	581	694	818	
Business	-	26	324	319	343	359	365	
Design	-	55	65	73	86	76	75	
Information Technology & Applied Science	-	-	68	98	94	134	173	
Engineering	-	-	-	53	39	125	205	
Library	-	-	51	48	19	-	-	
Nanyang Polytechnic ¹⁰	-	-	56	146	648	1,168	1,390	
Engineering ¹¹	-	-	56	103	73	331	398	
Health Science	-	-	-	43	297	489	551	
Business	-	-	-	-	278	279	359	
Information Technology	-	-	-	-	-	69	82	

Source : National University of Singapore
Nanyang Technological University
Singapore Polytechnic

Ngee Ann Polytechnic
Temasek Polytechnic
Nanyang Polytechnic

Notes : Data refer to academic year.

Figures for Polytechnics include part-time courses.

5 Include technology courses, eg Biotechnology.

6 Include Maritime Transportation.

7 From 1993, it was known as Business and include Accountancy, Banking and Finance.

8 Refer to courses conducted by Japan-Singapore Institute of Software Technology. The Institute was transferred to Singapore Polytechnic with effect from 1 April 1987.

9 Temasek Polytechnic was established in April 1990.

10 Nanyang Polytechnic was established in April 1992.

11 Data for 1993 refer to students transferred from the Economic Development Board institutions (graduates were conferred with the German-Singapore Institute or French-Singapore Institute certificates).

	Number						
	1987	1992	1993	1994	1995	1996	1997
Singapore Polytechnic	1,150	1,020	1,054	975	1,116	1,015	1,402
Engineering	917	813	877	852	805	717	841
Architecture & Building	201	66	35	65	203	162	229
Business	32	74	75	21	45	136	317
Computer	-	67	67	37	63	-	15
Ngee Ann Polytechnic	-	127	177	240	229	290	284
Engineering	-	85	104	170	182	230	267
Business Studies & Accountancy	-	30	53	70	47	60	17
Computer Studies	-	12	20	-	-	-	-
Temasek Polytechnic	-	-	-	-	99	39	159
Management Diploma in Accounting & Finance	-	-	-	-	10	-	-
Management Diploma in Sales & Marketing	-	-	-	-	49	-	47
Advanced Diploma in Management Studies	-	-	-	-	16	-	-
Certificate in Library Studies	-	-	-	-	24	-	23
Advanced Certificate in Library Studies	-	-	-	-	-	-	45
Diploma in Information Technology	-	-	-	-	-	16	-
Advanced Diploma in Design & Technology	-	-	-	-	-	23	-
Certificate in Police Studies & Security Management	-	-	-	-	-	-	38
Advanced Diploma in Quality Engineering	-	-	-	-	-	-	6
Nanyang Polytechnic	-	-	-	-	23	9	-
Management Diploma in Marketing	-	-	-	-	23	-	-
Advanced Diploma in Consumer Electronics	-	-	-	-	-	9	-

Source: Singapore Polytechnic

Ngee Ann Polytechnic

Temasek Polytechnic

Nanyang Polytechnic

Note: Data refer to academic year.

18.18 STUDENTS ADMITTED TO OPEN UNIVERSITY, 1997

	Total	Sex		Age Group (Years)			Number
		Males	Females	Below 30	30 - 39	40 & Over	
Arts	170	46	124	81	66	23	
Science	944	740	204	572	323	49	

Source : Singapore Institute of Management

18.19 INTAKE OF TRAINEES UNDER THE FULL-TIME INSTITUTIONAL TRAINING AND APPRENTICESHIP PROGRAMMES AND TRAINEES WHO COMPLETED THE PROGRAMMES, 1997

Type of Training/Level	Intake of Trainees			Trainees who Completed the Programmes			Number
	Total	Males	Females	Total	Males	Females	
Total	6,276	4,530	1,746	4,918	3,369	1,549	
Engineering							
Industrial Technician Certificate	1,402	1,259	143	915	815	100	
Business Studies							
Certificate in Business Studies	665	204	461	636	129	507	
Certificate in Office Skills	827	131	696	822	146	676	
Technical Skills							
National Technical Certificate (Incl Certificate of Vocational Training)	3,281	2,903	378	2,479	2,266	213	
Service Skills							
Certificate in Service Skills ¹	101	33	68	66	13	53	

Source : Institute of Technical Education

Note : The Full-time Institutional Training and Apprenticeship Programmes are offered to school leavers with GCE 'O' and 'N' level qualifications.

1 Includes Travel Services (General), Retailing (Sales & Customer Service), Health Care (In-Patient), Health Care (Out-Patient) and Computer Operations.

18.20

TRAINING PLACES TAKEN UP BY WORKERS UNDER THE SKILLS TRAINING PROGRAMMES AND WORKERS WHO COMPLETED THE PROGRAMMES, 1997

Type of Training/Level	Number					
	Training Places Taken Up			Workers who Completed the Programmes		
	Total	Males	Females	Total	Males	Females
Total	27,736	23,233	4,503	19,851	14,782	5,069
Engineering						
Industrial Technician Certificate	484	463	21	236	220	16
Business Studies						
Certificate in Business Studies	3,452	3,208	244	695	26	669
Certificate in Office Skills	4,143	3,596	547	1,059	67	992
Technical Skills						
National Technical Certificate (incl						
Certificate of Vocational Training)	15,565	13,284	2,281	13,803	11,574	2,229
Certificate of Competency	1,197	386	811	970	328	642
Service Skills						
Certificate in Service Skills	362	200	162	722	566	156
Others						
(incl Continuing Training, customised, theory only and Certificate of Endorsement courses)	2,533	2,096	437	2,366	2,001	365

Source : Institute of Technical Education

Note : Most of the Skills Training Programmes are offered in modules of 6 months' duration. A worker may attend more than one module a year.

18.21

TRAINING PLACES TAKEN UP BY WORKERS UNDER THE CONTINUING ACADEMIC EDUCATION PROGRAMMES AND WORKERS WHO COMPLETED THE PROGRAMMES, 1997

Type of Programme	Number					
	Training Places Taken Up			Workers who Completed the Programmes		
	Total	Males	Females	Total	Males	Females
Total	49,033	18,618	30,415	28,691	10,942	17,749
Basic Education for Skills Training (BEST)	22,303	7,256	15,047	13,758	4,363	9,395
Worker Improvement through Secondary Education (WISE)	14,602	5,518	9,084	8,400	3,593	4,807
Continuing Education (Secondary & Pre-University)	12,128	5,844	6,284	6,533	2,986	3,547

Source : Institute of Technical Education

Note : Most of the Skills Training Programmes are offered in modules of 6 months' duration. A worker may attend more than one module a year.

18.22

GOVERNMENT EXPENDITURE ON EDUCATION

Thousand Dollars

	1987	1992	1993	1994	1995	1996	1997
Total	1,654,115	2,597,894	2,902,886	3,318,956	3,443,857	3,770,433	4,691,539
Recurrent Expenditure	1,352,551	2,043,178	2,210,329	2,486,241	2,682,419	2,996,965	3,566,198
Primary Schools	392,741	559,138	590,326	633,966	694,703	764,004	924,542
Secondary Schools & Junior Colleges ¹	424,465	616,059	664,452	759,658	831,401	944,073	1,115,515
Institute of Technical Education	64,191	89,000	103,100	105,648	109,670	112,899	118,382
Tertiary	408,608	638,704	727,482	861,674	900,171	999,364	1,133,348
National University of Singapore & Nanyang Technological University	293,443	412,524	431,554	502,999	520,289	546,120	669,004
National Institute of Education	15,910	29,850	33,335	38,392	40,922	59,620	52,222
Polytechnics	99,255	196,330	262,593	320,283	338,960	393,624	412,122
Others ²	62,546	140,277	124,969	125,295	146,474	176,625	274,411
Development Expenditure	301,564	554,716	692,557	832,715	761,438	773,468	1,125,341

Source : Ministry of Education

Note : Data refer to the financial year which begins in March and ends in April of the following year.

1 Include Centralised Institutes.

2 Include Headquarters, Institute of Southeast Asian Studies, Open University and Science Centre Board.

	Dollars						
	1987	1992	1993	1994	1995	1996	1997
Primary Schools	1,474	2,061	2,254	2,523	2,653	2,837	3,230
Secondary Schools ¹	2,042	3,129	3,412	3,488	3,723	4,152	4,845
Junior Colleges ²	2,643	4,780	5,178	5,832	6,363	6,726	7,715
Institute of Technical Education	3,631	6,201	5,212	7,511	9,547	11,646	8,942
Polytechnics	4,219	6,142	6,990	7,584	7,776	8,406	8,856
Universities ³	11,993	15,422	15,450	16,355	17,241	18,450	19,926

Source : Ministry of Education

Note : Data refer to the financial year which begins in March and ends in April of the following year.

1 Exclude Independent schools.

2 Include Centralised Institutes.

3 Include National University of Singapore, Nanyang Technological University and National Institute of Education.

1997	1991	1995	1999	2002	2007
------	------	------	------	------	------

Hospital Services

There are 10 public sector hospitals of which 5 are general hospitals providing accident and emergency services and 5 are multi-disciplinary treatment, 1 is a specialist hospital and 4 specialist hospitals providing specialist treatment in oncology and dermatology and venereology and infectious diseases. In addition, there are 13 private hospitals catering to the medical needs of the

The health services provided by the government is very comprehensive. The Ministry of Health is responsible for the overall policy on health matters, the maintenance of public health standards, the development of health programmes and preventive measures and the provision of treatment and hospital facilities in the public sector. In addition, the Ministry monitors family planning and population policies.

HEALTH

Public Health Services

The Public Health Services include the Family Health Service, School Health and Dental Service. The Family Health Service (MCH) services through a network of 20 Polyclinics, 2 outpatient dispensaries and 1 Maternal and Child Health Clinic. MCH services concentrate on preventive health care for women of childbearing age and pre-school children, and implementing immunisation programmes for pre-school children.

The Public Health Services include the Family Health Service, School Health and Dental Service. The Family Health Service (MCH) services through a network of 20 Polyclinics, 2 outpatient dispensaries and 1 Maternal and Child Health Clinic. MCH services concentrate on preventive health care for women of childbearing age and pre-school children, and implementing immunisation programmes for pre-school children. Statistics on immunisation are collected from the Polyclinics vaccination records kept by SHS and compulsory notifications of immunisation to the Central Immunisation Registry by private practitioners.

These are provided by the Radiology Department, Blood Transfusion Service, Rehabilitation Services (including physiotherapy, occupational therapy and speech therapy), Medical Social Services and Pharmaceutical Services.

Data on patient attendance at primary health care clinics are obtained from the Polyclinic Patient Management System. Data on attendance at dental clinics are obtained from the dental clinics located at the various hospitals, family/maternal and child health clinics and schools. Data on attendance at dental clinics are obtained from the pharmaceutical and patient registration records of the clinics.

Data on medical personnel are for the registered medical practitioners, dentists, pharmacists, nurses and midwives registered respectively under the Medical Registration Act, the Dentists Registration Act, the Pharmacists Registration Act, the Nurses and Midwives Act. Separate computerised manpower registers for each of these personnel groups are maintained by the Ministry of Health and the statistics pertaining to these health personnel are derived from the registers.

The Dental Service provides curative and preventive dental treatment at 103 dental clinics located at the various hospitals, family/maternal and child health clinics and schools. Data on attendance at dental clinics are obtained from the pharmaceutical and patient registration records of the clinics.

The health services provided by the government is very comprehensive. The Ministry of Health is responsible for the overall policy on health matters, the maintenance of public health standards, the development of health programmes and preventive measures and the provision of treatment and hospital facilities in the public sector. In addition, the Ministry monitors family planning and population policies.

Public Health Services

The Public Health Services include Family Health Service, School Health Service and Dental Service. The Family Health Service offer outpatient and maternal and child health (MCH) services through a network of 20 Polyclinics, 2 outpatient dispensaries and 1 Maternal and Child Health clinic. MCH services concentrate on preventive health care for women of childbearing age and pre-school children, and implementing immunisation programmes for pre-school children. Health screening and immunisation for school children are undertaken by School Health Service (SHS).

Statistics on immunisation are collected from the Polyclinics vaccination records kept by SHS and compulsory notifications of immunisation to the Central Immunisation Registry by private practitioners. Data on patient attendances at primary health care clinics are obtained from the Polyclinic Patient Management System.

The Dental Service provides curative and preventive dental treatment at 193 dental clinics located at the various hospitals, family/maternal and child health clinics and schools. Data on attendances at dental clinics are obtained from the administrative and patient registration records of the clinics.

Hospital Services

There are 10 public sector hospitals of which 5 are general hospitals providing accident and emergency services and multi-disciplinary treatment, 1 community hospital and 4 specialist hospitals/centres providing specialist treatment in obstetrics and gynaecology, ophthalmology, psychiatry, dermatology and venereology and infectious diseases. In addition, there are 13 private hospitals catering to the medical needs of the people.

Data on government hospital beds, patient admissions and outpatient attendances are obtained from administrative records and the computerised patient registration systems of the hospitals. For the private hospitals, the data are compiled from special returns prescribed by the Ministry of Health and from the Central Claims Processing System.

Medical Support Services

These are provided by the Radiology and Radiotherapy Departments, Pathology Department, Blood Transfusion Service, Rehabilitation Services (including physiotherapy, occupational therapy and speech therapy), Medical Social Services and Pharmaceutical Services.

Medical Personnel

Data on medical personnel refer to the number of doctors, dentists, pharmacists, nurses and midwives registered respectively under the Medical Registration Act, the Dentists Registration Act, the Pharmacists Registration Act, the Nurses and Midwives Act. Separate computerised manpower registers for each of these personnel groups are maintained by the Ministry of Health and the statistics pertaining to these health personnel are derived from the registers.

19.1 HOSPITALS AND GOVERNMENT CLINICS

									Number
	1987	1992	1993	1994	1995	1996	1997		
Hospitals	21	22	24	25	24	26	23		
Public Sector ¹	10	12	13	13	12	12	10		
Private Sector ²	11	10	11	12	12	14	13		
Hospital Beds	10,027	9,726	10,469	10,407	10,498	10,668	11,030		
Public Sector ¹	8,191	7,833	8,640	8,346	8,326	8,511	8,845		
Private Sector ²	1,836	1,893	1,829	2,061	2,172	2,157	2,185		
Government Dental Clinics ³	183	184	185	185	195	199	193		
Family Health Services ⁴									
Outpatient	24	19	20	21	20	20	20		
Maternal & Child Health	23	17	18	19	15	15	1		

Source : Ministry of Health

Note : The number of hospitals in public sector includes medical institutions.

1 Include Government Hospitals, Government Restructured Hospitals and National University Hospital.

2 Chronic Sick Unit in Woodbridge Hospital was managed by Ren Ci Hospital with effect from 1 September 1994.

3 Include dental clinics in schools.

4 Integrated with effect from 1 July 1992. Community Health Clinics and Maternal & Child Health Clinics were renamed Family Health Services in May 1993.

19.2 HOSPITAL ADMISSIONS AND PUBLIC SECTOR OUTPATIENT ATTENDANCES

	Number						
	1987	1992	1993	1994	1995	1996	1997
Hospital Admissions	310,302	348,126	342,591	343,052	357,709	373,413	369,456
Public Sector Hospitals ¹	247,659	265,535	259,446	257,843	266,142	277,785	275,339
Private Sector Hospitals	62,643	82,591	83,145	85,209	91,567	95,628	94,117
Public Sector Outpatient Attendances							
Specialist Outpatient Clinics	1,339,712	1,762,927	1,869,061	1,963,901	2,071,310	2,233,262	2,343,765
Accident & Emergency							
Departments	436,660	545,339	510,556	499,937	520,132	541,833	547,178
Walk-in Clinics ²	-	-	-	273	22,402	67,273	69,111
Family Health Services ³	2,970,997	2,918,624	2,940,694	2,799,248	2,821,586	2,892,141	2,910,366
Dental Clinics	1,155,532	1,082,380	1,051,485	1,054,561	1,086,737	1,081,583	1,051,705
Day Surgeries	20,453	51,634	60,400	58,387	62,566	69,670	75,032

Source : Ministry of Health

Note : The number of hospitals in public sector includes medical institutions.

1 Include Government Hospitals, Government Restructured Hospitals and National University Hospital.

2 Started at Tan Tock Seng Hospital with effect from 1 November 1994 and at Singapore General Hospital with effect from 10 August 1995.

3 Community Health Clinics and Maternal & Child Health Clinics were renamed Family Health Services in May 1993.

19.3 REGISTERED HEALTH PERSONNEL

Number								
	1987	1992	1993	1994	1995	1996	1997	
Doctors	2,939	3,962	4,146	4,301	4,495	4,661	4,912	
Public	1,420	1,985	2,013	2,051	2,124	2,177	2,285	
Private	1,413	1,813	1,967	2,082	2,194	2,302	2,407	
Not in active practice	106	164	166	168	177	182	220	
Dentists ¹	557	706	743	767	791	835	877	
Public	160	175	172	176	163	176	183	
Private	379	503	543	568	602	626	670	
Not in active practice	18	28	28	23	26	33	24	
Pharmacists	487	677	720	773	815	858	930	
Public	59	140	140	150	167	175	169	
Private	428	500	536	575	591	623	691	
Not in active practice ²	-	37	44	48	57	60	70	
State Registered Nurses	6,438	7,975	8,461	9,148	9,536	10,141	10,867	
Public	3,374	4,596	4,835	5,148	5,373	5,724	6,144	
Private	2,203	2,250	2,431	2,589	2,736	2,881	2,973	
Not in active practice	861	1,129	1,195	1,411	1,427	1,536	1,750	
State Enrolled Nurses	2,285	2,658	2,666	2,575	2,762	3,052	3,365	
Public	1,602	1,605	1,547	1,394	1,548	1,727	1,918	
Private	421	616	649	656	693	735	807	
Not in active practice	262	437	470	525	521	590	640	
Midwives	588	530	522	507	499	487	473	
Public	352	281	266	255	245	228	215	
Private	92	108	107	106	104	103	100	
Not in active practice	144	141	149	146	150	156	158	

Source : Ministry of Health

Note : Registered health personnel in the public sector refer to Government,
Government Restructured Hospital and University personnel.

1 Refer to those with professional degrees only.

2 Prior to 1988, figures were included in private sector.

19.4 VISITS TO GOVERNMENT DENTAL CLINICS

								Number		
				1987	1992	1993	1994	1995	1996	1997
Dental Clinics				1,155,532	1,082,380	1,051,485	1,054,561	1,086,737	1,081,583	1,051,705
School				825,484	813,405	791,741	790,164	813,405	797,231	795,158
Hospital				172,056	168,945	168,959	174,435	175,882	187,980	38,122
Community				157,992	100,030	90,785	89,962	97,450	96,372	100,084
National Dental Centre ¹				-	-	-	-	-	-	118,341

Source : Ministry of Health

¹ Started functioning with effect from March 1997.

19.5 NOTIFICATIONS OF SPECIFIC NOTIFIABLE DISEASES

							Number
Notifiable Diseases	1987	1992	1993	1994	1995	1996	1997
Dengue/DHF	436	2,878	946	1,239	2,008	3,128	4,300
Malaria	165	221	354	277	316	364	421
Enteric fever ¹	132	162	144	151	171	316	112
Viral Hepatitis	752	596	317	258	267	318	345
Cholera	63	17	24	42	14	19	11
Poliomyelitis	-	-	-	-	-	-	-
Diphtheria	1	1	-	-	-	1	-
Chicken pox	4,312	29,976	43,876	39,558	23,224	49,763	27,723
Viral Encephalitis	4	10	2	-	4	1	2
Tuberculosis	1,616	1,747	1,939	1,836	2,167	2,483	2,790
Leprosy	44	41	24	27	34	23	23

Source : Ministry of the Environment

Ministry of Health

Note : No cases of plague, smallpox and yellow fever were reported during the period.

¹ Refer to typhoid and paratyphoid.

19.6

IMMUNISATION COVERAGE BY PUBLIC AND PRIVATE SECTORS

	1987	1992	1993	1994	1995	1996	1997	Per Cent
BCG								
National	98	99	98	97	97	97	98	
Public	61	47	45	45	42	42	47	
Private	37	52	53	52	58	58	51	
Diphtheria								
National	96	90	92	95	96	95	96	
Public	59	72	75	64	56	68	64	
Private	37	18	17	31	44	32	32	
Poliomyelitis								
National	95	92	92	92	94	93	96	
Public	59	63	70	61	71	70	64	
Private	36	29	22	31	29	30	32	
Measles								
National	94	89	87	89	90	94	94	
Public	63	61	68	66	76	72	66	
Private	31	28	19	23	24	28	28	

Source : Ministry of Health

19.7

VACCINATION AND IMMUNISATION OF SCHOOL CHILDREN

	1987	1992	1993	1994	1995	1996	1997	Thousand Doses
BCG Vaccination	31.2	27.7	38.9	34.3	33.0	33.5	35.4	
Diphtheria Tetanus	71.0	70.2	81.2	81.5	87.7	84.8	89.7	
Poliomyelitis Immunization	57.0	70.1	81.1	81.3	87.6	84.6	89.5	
Rubella	38.2	30.7	45.3	40.7	38.2	39.4	36.4	

Source : Ministry of Health

Thousand

	1987	1992	1993	1994	1995	1996	1997
Total	469.6	587.9	660.9	647.2	642.9	648.0	680.1
New Entrants	39.9	41.5	37.8	43.3	53.2	48.0	52.6
Primary School Leavers and equivalent levels	39.7	33.2	49.6	45.3	42.4	43.0	43.5
Secondary School Leavers and equivalent levels	35.2	39.1	36.1	35.8	35.9	35.9	49.3
Re-examination	354.8	470.6	533.7	518.9	507.9	517.1	530.7
Others ¹	-	3.5	3.5	3.9	3.6	4.0	4.0

Source : Ministry of Health

¹ Figures from 1988 refer to Institute of Technical Education and Special School Students.

19.9

COMMON DEFECTS OF STUDENTS EXAMINED

	1987	1992	1993	1994	1995	1996	1997
Per 10,000 Males Examined							
Incidence of:							
Defective Vision	3,598	4,407	4,432	4,767	4,836	5,040	5,083
Obesity							
Primary School Entrants	1,174	1,501	1,519	1,381	1,227	1,256	1,057
Primary School Leavers	1,570	2,117	2,121	1,442	1,382	1,383	1,410
Secondary School Leavers	1,271	1,719	1,676	1,227	1,069	1,120	1,223
Scoliosis	538	313	255	263	191	153	174
Asthma	135	445	552	545	503	866	979
Phimosis	511	287	334	272	256	253	209
Per 10,000 Females Examined							
Incidence of:							
Defective Vision	3,998	4,640	4,797	4,767	5,035	5,219	5,327
Obesity							
Primary School Entrants	973	1,197	1,288	1,377	1,213	1,199	1,087
Primary School Leavers	1,023	1,315	1,545	1,232	1,175	1,217	1,151
Secondary School Leavers	1,106	1,465	1,399	1,255	1,126	1,096	1,218
Scoliosis	791	637	537	533	379	314	357
Asthma	100	274	455	406	651	631	688
Heart Conditions	189	185	255	210	273	272	180

Source : Ministry of Health

19.10 BLOOD DONATIONS AND TRANSFUSIONS

	1987	1992	1993	1994	1995	1996	1997
Donors (Persons)	39,654	42,442	41,389	45,855	49,011	48,155	49,156
Blood Donations Received (No of Units)	59,985	60,962	64,126	64,164	69,190	70,814	74,940
National Blood Centre ¹	34,137	32,791	33,969	33,648	33,542	34,036	35,682
Apheresis Donations	-	832	2,028	2,881	3,989	3,837	4,986
Mobile	20,474	21,489	22,167	22,324	28,210	27,056	31,080
Red Cross	5,374	2,639	2,607	2,563	2,674	4,097	3,167
National University Hospital Blood Centre ²	-	3,933	4,926	5,331	4,764	5,625	5,011
Manulife Static Site ³	-	110	457	298	-	-	-
Blood Transfusions Given (No of Units)	53,658	53,465	54,076	53,525	57,067	58,790	60,779
Public Sector Hospitals ⁴	46,301	45,596	44,738	44,737	47,179	47,564	49,417
Private Sector Hospitals	7,357	7,869	9,338	8,788	9,888	11,226	11,362

Source : Ministry of Health

Notes : One unit of blood is approximately 430 millilitres.

Figures exclude blood bank in Mt Alvernia Hospital.

- Figures from 1991 include Apheresis donations. Apheresis is a specialised blood component donation process in which cell-separator machines draw out whole blood, separate specified components by centrifugation and return the rest of the blood to the donor.
- Blood collections from NUH Blood Centre were included in the National blood collection programme with effect from 1 November 1989.
- Started functioning from 27 October 1992 and closed on 31 December 1994.
- Include Government Hospitals and Government Restructured Hospitals.

The Ministry of the Environment has been dealing over the years because of clearance for several markets and food centres for development.

Licensed Food Establishments

The total number of licensed food establishments has been on the rise over the past decade. Due to the increasing affluence in Singapore, there are significant in restaurants and snack bars.

The Ministry of the Environment issues licences to hawkers and operators of food establishments. It also ensures that all hawkers observe proper food hygiene practices and that all food sold in Singapore is safe for consumption.

Licensed Hawkers

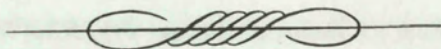
The number of licensed various types of premises

HAWKERS AND

FOOD ESTABLISHMENTS

20.2

LICENSED BAKERS
 (b) TYPE OF GOODS
 (End of Period)



	1987	1988	1989	1990	1991	1992	1993
Total	1,248	1,248	1,248	1,248	1,248	1,248	1,248
Marketing Authority							
Planning & Development Board	1,248	1,248	1,248	1,248	1,248	1,248	1,248
Planning Town Corporation	1,248	1,248	1,248	1,248	1,248	1,248	1,248
Port of Singapore Authority	1,248	1,248	1,248	1,248	1,248	1,248	1,248
Singapore Tourism Board	1,248	1,248	1,248	1,248	1,248	1,248	1,248
Private Market	1,248	1,248	1,248	1,248	1,248	1,248	1,248
Type of Goods Sold							
Market Produce	1,248	1,248	1,248	1,248	1,248	1,248	1,248
Cooked Food	1,248	1,248	1,248	1,248	1,248	1,248	1,248
Fruit & Sundries	1,248	1,248	1,248	1,248	1,248	1,248	1,248

Source: Ministry of the Environment

The Ministry of the Environment issues licences to hawkers and operators of food establishments. It also ensures that all licensees observe proper food hygiene practices and that all food sold in Singapore is safe for consumption.

Licensed Hawkers

The number of licensed hawkers in various types of premises managed by the

Ministry of the Environment has been decreasing over the years because of clearance of several markets and food centres for redevelopment.

Licensed Food Establishments

The total number of licensed food establishments has been on the rise over the past decade. Due to the increasing affluence among Singaporeans, there are significant increases in restaurants and snack bars.

20.1

LICENSED HAWKERS BY (a) TYPE OF PREMISES AND (b) TYPE OF GOODS SOLD (End of Period)

	Number						
	1987	1992	1993	1994	1995	1996	1997
Total	6,254	4,475	4,286	4,142	3,955	3,868	3,867
Type of Premises							
Market/Food Centre	5,960	4,332	4,157	4,020	3,840	3,765	3,772
Street Pitch ¹	56	-	-	-	-	-	-
Show Case	31	18	14	13	11	8	6
Itinerant ²	207	125	115	109	104	95	89
Type of Goods Sold							
Market Produce	2,642	1,785	1,698	1,594	1,504	1,490	1,471
Cooked Food	2,994	2,222	2,140	2,097	2,001	1,958	1,909
Piece & Sundries	618	468	448	451	450	420	487

Source : Ministry of the Environment

Note : Exclude private markets and markets/food centres of Statutory Boards.

1 Phased out by 1989.

2 Hawkers selling ice-cream, cakes or/and bread.

20.2

LICENSED HAWKERS BY (a) MANAGEMENT AUTHORITY AND (b) TYPE OF GOODS SOLD (End of Period)

	Number						
	1987	1992	1993	1994	1995	1996	1997
Total	18,574	15,933	15,516	15,499	15,434	15,255	14,908
Management Authority							
Housing & Development Board	17,158	15,384	15,169	15,162	15,125	14,950	14,608
Jurong Town Corporation	228	216	215	210	208	210	207
Port of Singapore Authority	76	72	72	72	59	58	57
Singapore Tourism Board	29	-	-	-	-	-	-
Private Market	1,083	261	60	55	42	37	36
Type of Goods Sold							
Market Produce	9,853	8,037	7,837	7,814	7,703	7,535	7,310
Cooked Food	6,352	5,786	5,675	5,675	5,752	5,758	5,672
Piece & Sundries	2,369	2,110	2,004	2,010	1,979	1,962	1,926

Source : Ministry of the Environment

20.3 LICENSED FOOD ESTABLISHMENTS (End of Period)

	1987	1992	1993	1994	1995	1996	1997
Total	7,645	8,584	9,082	9,265	9,199	9,512	9,743
Restaurants	880	1,342	1,488	1,578	1,704	1,807	1,942
Eating Houses	1,723	1,523	1,523	1,491	1,467	1,465	1,436
Snack Bars	671	814	991	1,108	1,231	1,348	1,469
Canteens	1,584	1,576	1,614	1,614	1,639	1,689	1,653
School	447	386	397	399	405	417	409
Others	1,137	1,190	1,217	1,215	1,234	1,272	1,244
Coffee Shops	263	142	134	119	105	92	83
Food Factories	1,260	1,452	1,445	1,441	1,203	1,236	1,174
Supermarkets	160	160	168	163	179	184	192
Others	1,104	1,575	1,719	1,751	1,671	1,691	1,794

Source : Ministry of the Environment

	1987	1992	1993	1994	1995	1996	1997
Total	18,214	18,922	12,716	12,499	12,424	12,222	14,908
Management Authority							
Housing & Development Board	17,128	12,384	12,160	12,102	12,122	14,920	14,608
Jurong Town Corporation	228	216	212	210	208	210	207
Port of Singapore Authority	76	72	72	72	70	68	67
Singapore Tourism Board	29	-	-	-	-	-	-
Private Market	1,083	261	60	22	42	32	36
Type of Goods Sold							
Market Produce	9,822	8,027	7,827	7,814	7,702	7,222	7,310
Cooked Food	6,222	2,786	2,672	2,672	2,722	2,722	2,672
Pices & Sundries	2,160	2,110	2,217	2,013	1,970	1,982	1,926

Source : Ministry of the Environment

1991	1992	1993	1994	1995	1996	1997
------	------	------	------	------	------	------

Data on residential homes for the aged are obtained from the Government Welfare Homes, sheltered housing, nursing homes as well as voluntary and non-profit nursing homes. With effect from 1 Jan 1993, the nursing homes are administered by the Private Hospitals and Medical Clinics Act which is under the purview of Ministry of Health.

The Ministry of Community Development (MCD) provides a wide range of community services, which include: (i) the care, protection and rehabilitation of children and youth; and (ii) assistance programmes for the aged, the destitute, the disabled, families with problems and victims of civil calamities. It also promotes neighbourhood, racial harmony and social cohesion among the people through a network of effective grassroots organisations.

COMMUNITY SERVICES

The main objectives of the child care programme are to promote and develop child care centres and to supervise centres in accordance to the Child Care Centres Act (Cap 3A) and Regulations (Cap 3A Section 19). The MCD encourages individuals, organisations and employers in the public and private sectors to set up child care facilities. Most centres provide full-day and half-day care services for children between the ages of two and seven years.

In addition to the establishment of child care centres to meet the needs of working mothers for alternative child care arrangements for their children.

Public Assistance

Grassroots organisations

Grassroots organisations include Residents' Committees, Community Centre/Club Management Committees, Women's Executive Committee, Senior Citizens' Executive Committee and Constituency Sports Clubs. These provide ample opportunities for residents to participate in the affairs of their communities and to interact with one another to promote better communication and closer rapport between the Government and the people.

Public assistance (PA) is provided to help the financially distressed regain their independence. It is not intended as an unemployment, retirement or disability support. PA recipients are categorized as follows:

Volunteers

"Volunteers", in the MCD context, refer to individuals who are providing services in community and welfare programmes without receiving full market rates of remuneration or allowances.

Services for Senior Citizens

The MCD plans, coordinates and monitors the implementation of a range of services for senior citizens. The main services under the Aged Programme include community-based services and residential care services.

- (i) aged destitute;
- (ii) the disabled, the mentally ill and the chronically sick who are rendered unfit to work;
- (iii) widows or deserted wives with dependent children;
- (iv) orphans; and
- (v) residents of residential institutions who require assistance to pay for their upkeep.

The Ministry of Community Development (MCD) provides a wide range of community services, which include: (i) the care, protection and rehabilitation of children and youth, and (ii) assistance programmes for the aged, the destitutes, the disabled, families with problems and victims of civil calamities. It also promotes neighbourliness, racial harmony and social cohesion among the people through a network of effective grassroots organisations.

In addition, the MCD promotes the establishment of child care centres to meet the needs of working mothers for alternative child care arrangements for their children.

Grassroots organisations

Grassroots organisations include Residents' Committees, Community Centre/Club Management Committees, Women's Executive Committees, Senior Citizens' Executive Committees and Constituency Sports Clubs. These provide ample opportunities for residents to participate in the affairs of their communities and to interact with one another to promote better communication and closer rapport between the Government and the people.

Volunteers

"Volunteers", in the MCD context, refer to individuals who are providing services in community and welfare programmes without receiving full market rates of remuneration or allowances.

Services for Senior Citizens

The MCD plans, coordinates and monitors the implementation of a range of services for senior citizens. The main services under the Aged Programme include community-based services and residential care services.

Data on residential homes for the aged are obtained from the Government welfare homes, sheltered housing/community homes as well as voluntary and commercial nursing homes. With effect from 1 Jan 1993, the nursing homes are administered by the Private Hospitals and Medical Clinics Act which is under the purview of Ministry of Health.

Child Care Programme

The main objectives of the child care programme are to promote and develop child care centres and to supervise centres in accordance to the Child Care Centres Act (Cap 37A) and Regulations (Cap 3A Section 19). The MCD encourages individuals, organisations and employers in the public and private sectors to set up child care facilities. Most centres provide full-day and half-day care services for children between the ages of two and seven years.

Public Assistance

Public assistance (PA) is provided to help the financially distressed regain their independence. It is not intended as an unemployment, retirement or disability support. PA recipients are categorised as follows :

- (i) aged destitutes;
- (ii) the disabled, the mentally ill and the chronically sick who are rendered unfit to work;
- (iii) widows or deserted wives with dependent children;
- (iv) orphans; and
- (v) residents of residential institutions who require assistance to pay for their upkeep.

21.1

GRASSROOTS ORGANISATIONS
(End of Period)

								Number
	1987	1992	1993	1994	1995	1996	1997	
Residents' Committees (RC)	341	402	412	436	444	454	477	
Citizens' Consultative Committees (CCC)	79	81	81	81	81	81	82	
CCC Area Committees	44	46	47	51	57	59	63	
Community Centres/Club Management Committees (CCMC)	120	110	108	108	110	115	111	
Women's Executive Committees (WEC)	80	90	90	88	93	98	102	
Senior Citizens' Executive Committees	71	91	96	195	219	237	243	
Constituency Sports Clubs	76	81	81	81	81	81	83	

Source : People's Association
Singapore Sports Council

21.2 VOLUNTEERS BY VOLUNTEER GROUP AND TYPE OF SERVICE

(End of Period)

	Number						
	1987	1992	1993	1994	1995	1996	1997
Community Service							
Total	15,753	19,236	19,898	22,024	23,068	23,872	25,045
RC/Block Representatives ¹	7,031	8,984	9,687	10,176	10,518	10,869	11,072
CCC/CCC Area-Committees ¹	2,471	2,662	2,707	2,763	2,897	2,964	3,434
Community Resource Volunteers	26	114	85	72	72	72	69
Community Centre/Club Management							
Committees	2,089	2,213	2,185	2,257	2,282	2,418	2,772
Women's Executive Committees	929	1,206	1,178	1,194	1,295	1,410	1,469
Senior Citizen's Executive							
Committees	693	1,339	1,389	2,859	3,245	3,473	3,480
Youth Executive Committees	1,387	1,440	1,454	1,440	1,531	1,451	1,527
Constituency Sports Club Members	1,127	1,278	1,213	1,263	1,228	1,215	1,222
Welfare Service							
Total	833	1,235	1,342	1,329	502	558	360
Welfare Service Boards/Committees	96	93	69	69	74	165	64
Befrienders for the Aged Destitutes ²	165	129	128	128	65	64	20
Volunteer Probation Officers	284	387	366	404	349	315	266
Befrienders for Senior Citizens ³	274	599	758	707	-	-	-
Volunteers in Toa Payoh Girls' Homes, Singapore Boys' Home and Bukit Batok Boys' Hostel	14	27	21	21	14	14	10

Source : Ministry of Community Development

1 RC = Residents' Committees.

CCC = Citizens' Consultative Committees.

2 Woodlands Home for the Aged was closed in 1997.

3 From 1995, the Befrienders for Senior Citizens came under the Voluntary Welfare Organisations.

21.3 ENROLMENT IN CHILD CARE CENTRES BY TYPE OF PROGRAMME AND ORGANISATION

	1987	1992	1993	1994	1995	1996	Number 1997
Total	5,659	18,732	21,853	22,945	25,800	28,575	31,242
Full-Day Programme	4,537	16,613	19,571	20,863	23,506	26,051	28,408
People's Association	601	869	1,040	1,126	1,174	1,399	1,406
NTUC	779	1,486	1,732	1,902	2,057	2,227	2,333
Voluntary	1,874	5,391	6,517	6,998	7,617	7,910	8,271
Workplace ¹	626	1,254	1,430	1,489	1,560	1,820	2,071
Private	657	7,613	8,852	9,348	11,098	12,695	14,327
Half-Day Programme	1,122	2,119	2,282	2,082	2,294	2,524	2,834

Source : Ministry of Community Development

Notes : Data for 1990-1993 were as at 1 December while those for other years were as at 31 December.

NTUC = National Trades Union Congress.

1 Include 6 centres set up by employers at workplace but run by private operators and 1 workplace run by NTUC.

21.4 PUBLIC ASSISTANCE RECIPIENTS BY CATEGORY (End of Period)

	1987	1992	1993	1994	1995	1996	Number 1997
Total	2,934	2,255	2,220	2,132	1,958	2,008	1,960
Aged Destitutes	2,618	1,954	1,915	1,852	1,695	1,707	1,659
Medically Unfit for Work	78	90	87	76	86	106	103
Abandoned/Distressed Wives & Orphans	55	70	73	61	57	58	54
Handicapped and Disabled	134	102	104	101	98	115	121
Widows with Children under 12 years old	49	39	41	42	22	22	23

Source : Ministry of Community Development

21.5 RESIDENTS IN OLD FOLKS' HOMES BY TYPE OF ORGANISATION AND SEX (End of Period)

	1987	1992	1993	1994	1995	1996	1997
Total	3,542	3,848	4,037	4,196	4,371	4,795	5,203
Males	1,660	1,696	1,801	1,851	1,913	1,946	2,181
Females	1,882	2,152	2,236	2,345	2,458	2,849	3,022
Government Old Folks' Home ¹	754	763	766	720	703	582	743
Males	623	636	637	607	603	487	631
Females	131	127	129	113	100	95	112
Sheltered Housing/ Community Homes	na	na	449	442	488	529	538
Males	na	na	189	184	192	205	206
Females	na	na	260	258	296	324	332
Voluntary Nursing Homes ²	2,070	2,147	1,833	1,905	1,945	2,398	2,593
Males	774	778	646	682	697	836	905
Females	1,296	1,369	1,187	1,223	1,248	1,562	1,688
Commercial Nursing Homes	718	938	989	1,129	1,235	1,286	1,329
Males	263	282	329	378	421	418	439
Females	455	656	660	751	814	868	890

Source : Ministry of Community Development
Ministry of Health

- Figures include only those aged 60 years and above.
- Data prior to 1993 include certain Sheltered Housing/Community Homes.

CULTURE AND RECREATION

RECREATION

CULTURE AND

Television Corporation of Singapore (TCS)

TCS owns and manages two 24-hour channels, Channels 5 and 8, which provide English and Chinese mass entertainment and information programmes respectively. TCS Teletext offers specialised information on each channel: Intv features news and information on Channel 5 while Classitext provides instant TV classifieds on Channel 8.

MediaCity, TCS's home website on the internet, was launched in mid-1996. Its features include News@TCS, which offers news on-line in sound and motion.

TCS is establishing a growing global presence through TCS International (TCSI), its international marketing and distribution arm. Its programmes are now distributed worldwide. Through TCSI, Singapore's first satellite channel, Xin Shi, beams Mandarin programmes to 85% of 3.5 million cable households in Taiwan, 18 hours a day and is also being distributed through cable TV in New Zealand.

Radio Corporation of Singapore

Radio Corporation of Singapore (RCS) owns and operates the nation's largest radio network comprising ten national and three international radio stations. Its 10 local stations collectively reach 2.3 million listeners weekly, each offering music and information to specific segments of the population. The three international stations provide overseas listeners with a mix of Singapore news, current affairs and entertainment programmes.

NTUC Radio Heart

NTUC Voice Co-operative Society Limited was restructured in October 1997 to NTUC Media Co-operative Ltd. NTUC Radio Heart, which runs 2 radio stations FM91.3 and FM100.3, is the broadcast media for the co-operative. It broadcasts 24 hours daily in 4

languages over 2 frequencies FM91.3 and FM100.3.

Rediffusion

Rediffusion (Singapore) Pte Ltd, a commercial audio broadcasting station under Government franchise since 1949, provides direct sound broadcasts via cable to subscribers on two networks. One network broadcasts Mandarin programmes daily from 6 am to 12 midnight and the other carries 24 hours of non-stop English/Chinese cultural programmes. The monthly rental is \$10.00 per set.

Cinema

Data on cinema attendances are compiled by the Singapore Department of Statistics from returns submitted by cinema organisations. Prior to April 1994, they were obtained from the Customs and Excise Department. Total attendances are based on the number of tickets sold.

Library

The National Library Board provides essential library facilities as well as a variety of cultural, educational and recreational programmes for the community. Membership is opened to Singaporeans and permanent residents free of charge and to foreigners at an annual subscription of \$10.00.

In addition to the Central Community Library at Stamford Road, there are 12 Community Libraries and one Regional Library. They provide books and materials for loan, audio-visual services, and reference and information services.

The National Reference Library at Stamford Road provides books and collections of special interest for reference and research, as well as periodicals, newspapers, maps, etc. It

22 CULTURE AND RECREATION (cont'd)

has a comprehensive collection of reference materials and information published in Singapore. The National Reference Library also provides reference and enquiry services, both for on-site and remote users. On-site facilities include a Student Reference Centre, a Multimedia Centre and a General Reference Centre.

The computerised National Library Network is a centralised system which links all the libraries under the National Library Board. The computerised functions include cataloguing, acquisitions, serials, legal deposit, enquiries, loans and the on-line public access catalogue. Data on library membership, loans and collections are generated on a regular basis by the computer system. The NLLine provides an electronic link via the Internet to information and services from the National Library Board.

Sports Facilities

The Singapore Sports Council (SSC) is responsible for the promotion of both competitive and recreational sports in Singapore. Through the "Sports for All" policy, it promotes a wide range of sports activities and programmes.

The SSC also provides a wide range of sports facilities for the public. Apart from the National Stadium and the Singapore Indoor Stadium, the SSC maintains and operates a number of stadia, multi-purpose fields, sports halls, netball courts, squash courts, tennis courts, swimming pools and fitness parks and corners.

Cultural and Sports Courses

The People's Association (PA), a statutory board established on 1 Jul 1960, is a

community development agency. The PA organises and promotes group participation in social, cultural, educational, youth, sports, recreational and other wholesome activities to nurture inter-racial understanding at its community centres and community clubs. The community centres and community clubs conduct regular sports and cultural courses.

The Arts

Data on arts activities are compiled by the National Arts Council (NAC) from designated performing venues, arts groups and impresarios, and the 'What's On Column' in the Straits Times. Prior to the implementation of goods and services tax in April 1994, pertinent data were also provided by the Customs & Excise Department. The data cover only the serious arts forms promoted by the NAC. They do not include performances of mainly commercial and entertainment value.

Definitions

Performing Arts : Refer to folk, traditional, classical and contemporary forms, of dance, music, theatre and other performances. Traditional arts performances like lion and dragon dances, and street operas are excluded as they are usually performed for closed religious and ceremonial audiences. Performances classified as 'others' include multi-media and multi-discipline performances, and festival openings.

Visual Arts : Refer to public exhibitions of abstract or representational arts objects such as paintings, sculpture, pottery, ceramics, creative photography and installation art. Commercial applied arts like graphic and fashion design, film and video, jewellery design and handicraft are excluded.

22.1

TELEVISION LICENCES, CABLE VISION SUBSCRIBERS, REDIFFUSION SUBSCRIBERS AND CINEMAS (End of Period)

	1987	1992	1993	1994	1995	1996	1997
Television Licences Issued (No)	531,215	614,309	639,139	645,529	652,970	681,597	600,382
Cable Vision Subscribers (No)	-	9,544	22,214	25,671	24,027	57,580	104,027
Rediffusion Subscribers (No)	62,457	37,270	33,423	29,200	27,017	24,903	22,132
Cinemas (No)	41	77	103	107	108	131	135
Seating Capacity ('000)	48	51	59	55	49	51	53
Attendances ('000)	19,767	19,301	19,977	17,857	18,128	17,258	17,347

Source : Television Corporation of Singapore

Singapore Cable Vision Ltd

Rediffusion (Singapore) Pte Ltd

Department of Statistics (with effect from April 1994)

22.2

RADIO AND TELEVISION TRANSMISSION

	1987	1992	1993	1994	1995	1996	1997
	Hours Per Week						
Radio	653	1,514	1,542	1,955	1,878	1,941	2,254
Radio (RCS)							
AM/FM							
English	131	127	133	168	168	168	168
Malay	135	149	149	149	149	149	168
Chinese	148	127	133	140	140	140	140
Tamil	112	134	140	147	147	147	147
Symphony 92.4 FM	127	126	126	140	126	126	126
Radio (RCS and NTUC ¹)							
FM							
English	-	423	427	483	483	483	483
Malay	-	148	154	161	161	161	161
Chinese	-	259	259	546	483	546	840
Tamil	-	21	21	21	21	21	21
Television	155	195	212	275	336	336	336

Source : Television Corporation of Singapore

Radio Corporation of Singapore

NTUC Media Co-operative Ltd

¹ Operated with effect from January 1991.

22.3

NATIONAL LIBRARY MEMBERSHIP, BOOK COLLECTIONS
AND LOANS OF BOOKS

	Thousand						
	1987	1992	1993	1994	1995	1996	1997
Membership ¹	891.3	875.1	862.8	935.8	1,035.0	1,254.5	1,318.8
Persons Aged 12 years and Over ²	672.7	696.6	680.8	745.7	827.0	1,006.7	985.6
Children Under 12 Years ³	218.6	178.5	182.0	190.0	208.0	247.8	333.2
Book Collections	2,671.8	2,890.7	2,855.8	2,969.3	3,134.1	4,123.5	4,846.1
English	1,545.4	1,814.0	1,788.8	1,861.2	1,949.7	2,706.2	3,210.7
Chinese	732.5	682.5	663.6	675.7	736.7	891.5	1,084.5
Malay	307.7	316.1	327.1	341.9	352.5	411.6	415.0
Tamil	86.2	78.1	76.3	90.5	95.2	114.2	136.0
Loan of Books	7,580.7	6,995.9	9,076.3	9,738.3	12,429.2	14,209.5	22,500.1
Persons Aged 12 Years and Over ²	3,934.8	3,248.9	4,295.3	4,782.3	5,965.2	6,664.7	10,717.7
Children Under 12 Years ³	3,645.8	3,747.0	4,781.0	4,956.0	6,464.0	7,544.8	11,782.4

Source : National Library Board

1 Members were re-registered in 1988 as a result of computerisation.

2 Figures for 1997 refer to persons aged 13 years and over.

3 Figures for 1997 refer to children under 13 years.

22.4

DAILY NEWSPAPER CIRCULATION

	Number						
	1987	1992	1993	1994	1995	1996	1997
Total	700,927	916,102	977,846	1,029,043	1,005,307	1,008,176	1,024,532
English	292,721	447,600	481,392	513,506	499,996	503,805	516,531
Chinese	360,691	410,424	433,871	450,539	441,758	440,321	442,257
Malay	42,041	53,059	57,676	59,751	58,078	56,211	56,907
Tamil	5,474	5,019	4,907	5,247	5,475	7,839	8,837

Source : Singapore Sports Council
Note : Data refers to sports facilities provided by Singapore Sports Council

22.5

VISITORS TO PLACES OF INTEREST

	1987	1992	1993	1994	1995	1996	1997
Thousand							
National Museum	348.9	237.7	243.2	273.0	293.0	251.8	262.6
Singapore Art Museum ¹	-	-	-	-	-	104.8	159.6
Asian Civilisations Museum ²	-	-	-	-	-	-	47.6
Singapore Science Centre	620.1	515.0	533.9	529.3	542.9	427.9	637.5
Singapore Zoological Gardens	1,112.1	1,355.3	1,486.7	1,433.6	1,438.5	1,509.0	1,410.6
Sentosa ³	2,106.8	3,609.8	4,040.0	4,102.0	3,868.0	4,100.0	3,497.0
Chinese/Japanese Gardens ³	712.8	350.9	286.6	286.0	243.0	251.6	247.6
Jurong Bird Park ³	850.2	1,532.9	1,549.6	1,512.7	1,513.6	1,510.9	1,107.9

Source : National Museum
Singapore Science Centre
Singapore Zoological Gardens

Sentosa Development Corporation
Singapore Leisure Industries Pte Ltd
Jurong Bird Park

1 Opened in January 1996.

2 Opened in April 1997.

3 Figures refer to financial years from April to March of the following year.

22.6

UTILISATION OF SPORTS FACILITIES

	1987	1992	1993	1994	1995	1996	1997
Attendances ('000)							
Swimming	6,247,930	5,626,328	5,695,235	5,459,531	5,743,594	6,801,879	6,515,987
Bookings (Number)							
Tennis	135,937	188,879	140,642	121,737	108,327	99,902	108,381
Badminton	67,332	118,554	117,203	154,655	150,157	149,193	152,680
Squash	130,044	66,369	49,078	47,679	44,360	41,619	36,721
Netball	1,221	1,822	2,675	3,426	3,614	4,613	4,971
Soccer	10,140	9,130	8,350	10,158	10,757	9,874	10,011
Hockey	697	1,357	1,036	1,287	1,553	1,791	1,732
Rugby	74	121	114	247	301	345	441
Athletics	721	530	920	571	592	641	640
Golf (Persons)	8,737	15,623	12,759	9,807	5,791	4,814	4,779

Source : Singapore Sports Council

Note : Data refer to sports facilities provided by Singapore Sports Council.

SPORTS AND CULTURAL COURSES CONDUCTED BY COMMUNITY CENTRES/CLUBS

Type of Course	Number						
	1987	1992	1993	1994	1995	1996	1997
Classes							
Sports Courses	2,150	2,317	2,264	2,323	2,371	2,540	2,667
Ball Games	427	313	220	192	136	133	120
Board Games	15	-	-	-	-	11	10
Keep Fit	698	412	408	375	331	313	319
Martial Arts	752	825	891	877	809	824	846
Performing Sports	111	114	134	118	109	96	105
Water Sports	143	646	611	761	986	1,163	1,267
Others	4	7	-	-	-	-	-
Cultural Courses	4,826	6,229	6,672	6,750	6,700	5,700	4,607
Dance	2,528	3,055	3,097	3,031	2,900	2,300	1,830
Drama	40	168	416	423	500	300	300
Music	2,254	2,993	2,173	2,192	2,100	2,000	1,547
Vocal ¹	-	-	977	1,102	1,200	1,100	924
Others	4	13	9	2	-	-	7
Participants							
Sports Courses	67,702	37,817	35,420	35,015	35,327	38,788	39,099
Ball Games	5,263	2,696	2,101	2,145	1,372	1,670	1,570
Board Games	197	-	-	-	-	84	80
Keep Fit	27,557	6,361	5,804	5,291	6,217	4,767	4,392
Martial Arts	28,278	19,576	17,914	16,944	15,734	17,067	16,328
Performing Sports	3,508	3,122	4,058	3,327	3,043	2,114	2,335
Water Sports	2,801	5,964	5,543	7,308	8,961	13,086	14,394
Others	98	98	-	-	-	-	-
Cultural Courses	72,299	92,912	90,420	93,392	95,000	99,000	123,180
Dance	51,205	51,790	47,148	46,080	46,000	46,000	58,090
Drama	646	2,971	6,763	7,293	8,000	9,000	8,980
Music	20,321	37,643	14,160	15,301	16,000	18,000	19,310
Vocal ¹	-	-	22,225	24,675	25,000	26,000	36,660
Others	127	508	124	43	-	-	140

Source : People's Association

Note : Period refers to financial year from April to March of the following year.

1 Prior to financial year 1993, Vocal was grouped under Music.

22.8 THE ARTS

						Number
Art Form	1991	1992	1993	1994	1995	1996
Performing Arts						
Total Performances ¹	1,698	2,322	1,915	2,091	2,036	2,809
Music	552	854	670	740	655	927
Dance	96	160	112	138	175	313
Theatre	952	1,163	1,071	989	1,045	1,217
Others	98	145	62	224	161	352
Ticketed Performances	1,163	1,517	1,609	1,532	1,562	1,662
Music	371	478	512	538	484	454
Dance	82	79	87	102	107	173
Theatre	642	937	968	858	865	921
Others	68	23	42	34	106	114
Attendances ²	678,970	798,929	798,345	845,201	750,460	720,523
Music	276,488	331,357	382,827	473,098	356,166	327,560
Dance	56,849	52,073	55,159	59,426	54,431	93,533
Theatre	292,169	402,337	341,445	299,298	277,186	253,726
Others	53,464	13,162	18,914	13,379	62,677	45,704
Visual Arts Exhibitions						
Number	255	295	150	208	254	272
Days	2,443	2,762	1,441	2,135	3,258	3,230

Source : National Arts Council

- 1 Include non-ticketed performances.
- 2 Refer to ticketed performances.

23 MISCELLANEOUS

Fire Occurrences

The mission of the Singapore Civil Defence Force (SCDF) is to protect and save lives and properties in peacetime and emergency. Data on fire occurrences are compiled by SCDF.

Definitions

Structural (Residential) : Refers to all building structures, either permanent or temporary, used for residential purposes only.

Structural (Non-Residential) : Refers to all building structures, either permanent

or temporary, used for other than residential purposes such as commercial, manufacturing, storages, sales and services, etc.

Non-Structural : Refers to all properties other than building structures such as motor-vehicles, ships, vegetation, discarded materials, outdoor electrical cables/wiring, etc.

Criminal offences

Singapore's crime statistics are compiled from offences reported to the police during the reference period and not at the time the offences were actually committed.

23.1 FIRE OCCURRENCES

Type of Property	Number						
	1987	1992	1993	1994	1995	1996	1997
Total	5,206	5,102	5,724	5,830	5,091	5,508	6,705
Structural	2,705	2,851	3,164	3,910	3,831	4,021	4,430
Residential	2,122	2,115	2,419	3,283	3,262	3,287	3,620
Non-Residential	583	736	745	627	569	734	810
Non-Structural	2,501	2,251	2,560	1,920	1,260	1,487	2,275

Source : Singapore Civil Defence Force

23.2 SELECTED CRIMINAL OFFENCES

Type of Offence	1987	1992	1993	1994	1995	1996	1997
Number of Cases Reported							
Robbery	1,681	1,066	1,022	812	784	768	741
Housebreaking	3,014	3,039	3,003	2,459	1,921	1,737	1,526
Motor Vehicle Theft	3,790	3,491	3,148	2,569	2,647	2,467	2,242
Snatch Theft	1,258	669	588	447	409	313	315
Per 100,000 Population							
Robbery	61	34	31	24	23	21	20
Housebreaking	109	96	92	73	55	48	41
Motor Vehicle Theft	137	110	97	76	76	68	60
Snatch Theft	45	21	18	13	12	9	8

Source : Police Intelligence Department

SINGAPORE DEPARTMENT OF STATISTICS

LATEST EDITIONS OF PUBLICATIONS

Prices in S\$
(excluding postage)

General

1	Monthly Digest of Statistics	5.50
2*	Statistics Singapore Newsletter, Vol 20, No. 4, April 1998	-
3	Statistics Singapore, An Official Guide	6.50
4	Singapore 1996 Statistical Highlights	12.00
5	Yearbook of Statistics, 1997	7.00
6*	Singapore In Brief, 1997	-
7*	Singapore In Figures, 1997	-
8*	1998 Singapore Data Sheet	-
9	Singapore Standard Occupational Classification, 1990	7.50
10	Singapore Standard Industrial Classification, 1996	5.00

Economic Statistics

11	Seasonal Adjustment of Economic Indicators	9.00
12	Analysis of Singapore Input-Output Tables, 1973-1988	4.50
13	Input-Output Tables 1988 - Models and Applications	7.50
14	Singapore Input-Output Tables 1990: Concepts and Applications	14.00
15	Foreign Equity Investment in Singapore, 1987-1994	11.50
16	Singapore System of National Accounts, 1995	16.00
17	Singapore's Investment Abroad, 1994-1995	15.00
18	Singapore's Corporate Sector, 1986 -1995	15.00

Business Statistics

19	Economic Surveys Series - Transport & Communications, 1995	8.50
20	Economic Surveys Series - Hotels & Catering, 1995	10.00
21	Economic Surveys Series - Real Estate & Business Services, 1995	8.50
22	Economic Surveys Series - Community, Social & Personal Services, 1995	10.00
23	Economic Surveys Series - The Services Sector, 1995	8.00
24	Economic Surveys Series - Wholesale & Retail, 1995	10.50
25*	Monthly Retail Sales and Catering Trade Indices, March 1998	2.00
26*	Business Expectations: Commerce and Services Sectors Survey Report, 1st Quarter 1998	-

Prices and Household Expenditure

27	Import Price Index (1990=100)	8.00
28	A Guide to Export Price Index	7.00

SINGAPORE DEPARTMENT OF STATISTICS
LATEST EDITIONS OF PUBLICATIONS (continued)

Prices in S\$
(excluding postage)

Prices and Household Expenditure (*continued*)

29	A Guide to Singapore Manufactured Products Price Index	8.00
30	A Guide to Domestic Supply Price Index	8.50
31	The Consumer Price Index, Singapore (Based on Household Expenditure Survey, 1992/93)	5.50
32	Report on the Household Expenditure Survey, 1992/93	10.00
33*	Consumer Price Index, Singapore, April 1998	1.50

Population, Demographic and Social Statistics

34	Census of Population, 1990 - Advance Data Release	7.00
35	Singapore Census of Population 1990, Statistical Release 1 - Demographic Characteristics	13.00
36	Singapore Census of Population 1990, Statistical Release 2 - Households and Housing	16.00
37	Singapore Census of Population 1990, Statistical Release 3 - Literacy, Languages Spoken and Education	18.00
38	Singapore Census of Population 1990, Statistical Release 4 - Economic Characteristics	16.00
39	Singapore Census of Population 1990, Statistical Release 5 - Transport and Geographic Distribution	18.00
40	Singapore Census of Population 1990, Statistical Release 6 - Religion, Childcare and Leisure Activities	18.00
41	Singapore Census of Population 1990, Monograph No. 1 - The Aged Population of Singapore	11.00
42	Singapore Census of Population 1990, Monograph No. 2 - Religion in Singapore	7.50
43	Singapore Census of Population 1990, Monograph No. 3 - Cultural, Social and Leisure Activities in Singapore	7.50
44	Singapore Census of Population 1990, Monograph No. 4 - Households and Housing in Singapore	8.00
45	Singapore Census of Population 1990, Monograph No. 5 - Geographic Analysis of the Singapore Population	8.50
46	Singapore Census of Population 1990, Monograph No. 6 - Multi-Lingualism in Singapore: Two Decades of Development	6.50
47	Profile of Singapore Resident Population, 1980-1991	8.00
48	General Household Survey 1995, Release 1 - Socio-Demographic and Economic Characteristics	10.00
49	General Household Survey 1995, Release 2 - Transport Mode, Households and Housing Characteristics	10.00
50	Statistics on Marriages and Divorces, 1996	15.50

SINGAPORE DEPARTMENT OF STATISTICS
LATEST EDITIONS OF PUBLICATIONS (continued)

Prices in S\$
(excluding postage)

Occasional Paper Series*

51	Implementation of IMF Balance of Payments Manual, 5th Edition in Singapore's Balance of Payments	5.00
52	Income Components of GDP: Trends and Analysis	5.00
53	Multifactor Productivity Growth in Singapore : Concept, Methodology and Trends	5.00
54	Performance of Singapore Companies: Efficiency and Profitability Ratios	5.00
55	Measuring Singapore's External Economy	5.00
56	A Guide to Singapore's Wholesale Trade Index	5.00
57	Tenant Households in HDB Flats	5.00
58	Private Consumption Expenditure - Concepts and Trends	5.00
59	Survival Analysis of Small & Medium Enterprises	5.00
60	Profile of Growing Small and Medium Enterprises in Singapore	5.00
61	Home Upgrading in Singapore, 1991 - 1995	5.00
62	Foreign Direct Investment Activities of Singapore Companies, 1995	2.00
63	Retailer Credit in Singapore	2.00
64	Rebasing of the Singapore System of National Accounts	2.00
65	Singapore's Direct Investment Abroad, 1994	2.00
66	The Extent and Pattern of Foreign Investment Activities in Singapore	2.00
67	Income Growth and Distribution	2.00
68	The Impact of Economic Restructuring on Output, Employment and Income Shifts in Singapore	2.00
69	Foreign Equity Investment in Singapore, 1992	2.00
70	Households in Mid-Life : Asset and Consumption Profile	2.00
71	Impact of the Introduction of the Goods and Services Tax on Retail Trade	2.00
72	Singapore's Direct Investment Abroad, 1993	2.00
73	Advertising Trends in the Economy, 1987-1992	2.00
74	Performance of Retail Trade Within CBD and Outside CBD	2.00
75	Dual-Career Couples in Singapore	1.00
76	Composite Social Indices : A Pilot Study	1.00
77	Direct Investment Abroad of Local Companies, 1991	1.00
78	Industry Profile of New Establishments, 1991-1992	1.00
79	Life Cycle Analysis of Singapore Households	1.00
80	Receipts from Overseas Transactions in the Services Sector	1.00
81	Unit Business Cost Index of the Manufacturing Sector	1.00
82	Profile of Self-Employed Persons in Singapore	1.00
83	A Guide to Retail Sales and Catering Trade Indices	1.00
84	A Guide to Singapore's Consumer Price Index	1.00

SINGAPORE DEPARTMENT OF STATISTICS

LATEST EDITIONS OF PUBLICATIONS (continued)

Prices in S\$
(excluding postage)

Occasional Paper Series* (continued)

85	Comparison of Retail Prices of Food Items Sold at Wet Markets and Market Produce Shops	1.00
86	Destination, Activity and Returns of Singapore's Direct Investments Abroad	1.00
87	Efficiency of Singapore Companies : A Study of the Returns to Assets Ratios	1.00

Joint Publications by Department of Statistics and Other Organisations

88	Finding Key Executives for your International Ventures	3.00
89	Manpower for Overseas Ventures : A Study of MNCs and Local Companies in Singapore	6.00
90	The National Survey of Senior Citizens in Singapore, 1995	-

Publications are obtainable from :

SNP CORPORATION LTD
8 Shenton Way #11-03
Temasek Tower
Singapore 068811
Tel : 2230834

Publications marked with (*) are
obtainable from :

DEPARTMENT OF STATISTICS
100 High Street #05-01
The Treasury
Singapore 179434
Tel : 3327684

SINGAPORE DEPARTMENT OF STATISTICS INFORMATION DISSEMINATION SERVICES

Statistics Singapore Home Page

The Statistics Singapore Home Page was launched by the Singapore Department of Statistics since January 1995. Internet users can access the Home Page by connecting to:

<http://www.singstat.gov.sg>

Key Singapore statistics are available in:

- ◆ **Current Indicators**
which provide the latest monthly, quarterly and annual data for key economic and financial indicators.
- ◆ **Facts and Figures**
which provide annual key data on Singapore's economy and population.
- ◆ **Press Releases**
which cover the Economic Survey of Singapore, the Consumer Price Index, the Wholesale Price Index, the Wholesale Trade Index, Retail Sales and Catering Trade Indices and Industrial Production Index.
- ◆ **Publications**
which include reports on the Business Expectations Survey, latest issue of the Statistics Singapore Newsletter and feature articles on economic and social topics.

The Home Page provides a gateway to the SingStat DataShop, the Electronic Transmission of Returns (ETR) System and the Singapore Business Directory.

SingStat DataShop

The SingStat DataShop is the virtual one-stop centre for official statistics on Singapore. Users can use cashcard or credit card to purchase softcopies of selected statistical reports or tables.

- ◆ Occasional Papers Series
- ◆ Yearbook of Statistics
- ◆ Singapore Statistical Highlights
- ◆ Monthly Digest of Statistics
- ◆ Consumer Price Index
- ◆ Retail Sales Index

Electronic Transmission of Returns (ETR) System

The ETR system enables business organisations to complete and submit their survey forms through the internet. Using an advanced encryption technology, the ETR ensures that the information transmitted through the net is secured and protected.

With the ETR, respondents do away with the tedious paperwork and manual tasks of mailing or faxing survey forms to the Department.

SINGAPORE DEPARTMENT OF STATISTICS INFORMATION DISSEMINATION SERVICES (continued)

Singapore Business Directory

The Singapore Business Directory offers access to basic information of more than 230,000 establishments in Singapore. Internet users can search the Directory by:

- ◆ Name of Company
- ◆ Business Sector
- ◆ Type of Product

Time Series Retrieval and Dissemination (TREND) System

Monthly, quarterly and annual time series data are available through the Singapore Department of Statistics' TREND system. TREND comprises:

- ◆ a depository of time series data
 - with over 26,000 current and historical data series
 - covering the economic, demographic and social characteristics of Singapore
 - including seasonally adjusted data for selected series with strong seasonally pattern
- ◆ a comprehensive data directory
 - with information about the data series in 19 main subjects
- ◆ a user friendly, windows-based front-end interface
 - for data retrieval and analysis

The subscription form for TREND may be obtained through the **MTI Telelink**. For enquiries, please contact the Department at **Tel : 3327119**.

MTI Telelink

The MTI Telelink provides an information service over the telephone. Callers can access the service at **Tel : 3328400** to obtain information over the phone or select the type of document to be faxed to a given telephone number in Singapore.

Voice/fax information available through the MTI Telelink includes:

- ◆ Press Releases on Singapore Economy
- ◆ Latest Key Monthly and Quarterly Economic Indicators
- ◆ Latest Key Annual Economic and Social Indicators
- ◆ Telephone numbers for enquiries on main surveys conducted by the Singapore Department of Statistics

Statistical Enquiries and Feedback

If you have any statistical enquiries or comment or suggestions on our statistical publications and electronic services, you are welcomed to :

- ◆ Fax to us at **Tel : 3327689**
- ◆ Call us at **Tel : 1800-3238118**
- ◆ E-mail us at **info@singstat.gov.sg**

PUBLICATIONS SECTION

Head

Mrs Eunice Tan

Statistical Officer

Mr Low Fook Meng

Statistical Assistants

Mrs Wah Chye Lian

Mdm Warty Bte Zakaria

To be purchased from

SNP CORPORATION LTD

8 Shenton Way #11-03, Temasek Tower, Singapore 06811

Tel : 2230834

Printed by Grace Communications Pte Ltd

To be purchased from

SNP CORPORATION LTD

8 Shenton Way #11-03, Temasek Tower, Singapore 068811

Tel : 2230834

Price : \$7.00

ISSN 0583-3655

Printed by Grace Communications Pte Ltd