



# NATIONAL HEALTH AND MORBIDITY SURVEY 2011

*Healthcare Demand  
And Out-Of-Pocket Health Expenditure*

## VOLUME III



**NATIONAL HEALTH  
AND  
MORBIDITY SURVEY  
2011**

**(NMRR-10-757-6837)**

**VOLUME III  
HEALTHCARE DEMAND  
AND  
OUT-OF-POCKET  
HEALTH EXPENDITURE**





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## VOLUME III

### HEALTHCARE DEMAND AND OUT-OF-POCKET HEALTH EXPENDITURE

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## Volume in this series

The report comprises of several volumes, as follows:

- i. Volume I : Methodology and General Findings
- ii. Volume II : Non-communicable Diseases
- iii. Volume III : Health Care Demand And Out-Of-Pocket Health Expenditure

### ***DEDICATION***

Every person deserves the right to the best in life, and health, an integral element that determines the quality of life of a person, and is central to life. This team dedicates this work on the perceived needs for health and health care towards the realization of this dream.

We hope that this report inspires and helps others to join us in this effort, for the love of humanity.

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### ***DISCLAIMER***

The views, interpretations, implications, conclusions, and recommendations expressed in this paper are those of the contributors alone and do not necessarily represent the opinions of the other investigators participating in the project nor the views or policy of the Ministry of Health Malaysia.

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<b>TABLE OF CONTENTS</b>	<b>IV</b>
<b>LIST OF TABLES</b>	<b>IV</b>
<b>TOPIC 1</b>	<b>1</b>
<b>1.0 PERCEIVED NEED &amp; ILLNESS OF THE POPULATION IN MALAYSIA</b>	<b>3</b>
<b>1.1 General Objective</b>	<b>3</b>
1.1.1 Specific Objectives	3
<b>1.2 Prevalence Of Illness</b>	<b>3</b>
1.2.1 Prevalence of Perceived illness (all ages)	3
1.2.2 Severity of illness (all ages)	3
1.2.3 Signs of Illness	4
<b>1.3 Health Problems &amp; Diseases – Informed By A Medical Practitioner</b>	<b>6</b>
1.3.1 Cardiovascular disease (Stroke & Heart Disease)	6
1.3.2 Asthma (ever told to have)	7
1.3.3 Arthritis (ever told to have)	7
1.3.4 Dengue fever (ever told to have)	8
1.3.5 Urinary Tract problems (past 12 months)	8
1.3.6 Other Chronic Diseases	9
<b>1.4 General Health</b>	<b>9</b>
1.4.1 Overall Health Rating (In general, how would you rate your health today?)	9
1.4.2 Difficulty with work/daily activities in the past 30 days	9
1.4.3 Vision	9
1.4.4 Summary	11
<b>1.5 Comparison With NHMS II And NHMS III</b>	<b>12</b>
<b>1.6 Conclusion &amp; Implication</b>	<b>13</b>
<b>1.7 Recommendations</b>	<b>14</b>
<b>1.8 Tables Of Findings</b>	<b>15</b>
<b>1.9 Definition Of Variables</b>	<b>55</b>
 <b>TOPIC 2</b>	 <b>65</b>
<b>2.0 HEALTH SEEKING BEHAVIOUR</b>	<b>67</b>
<b>2.1 Autonomy In Decision-Making</b>	<b>67</b>
2.1.1 Findings	67
2.1.2 Implication	68
2.1.3 Conclusion	69
2.1.4 Recommendation	69
<b>2.2 Health Seeking Behaviour In Relation To Acute Illness/ Disability</b>	<b>69</b>
2.2.1 Findings	69
2.2.2 Implication	72
2.2.3 Conclusion	72
2.2.4 Recommendation	73

<b>2.3</b>	<b>Preferred Choice Of Provider</b>	<b>73</b>
2.3.1	Findings - In-patient Care	73
2.3.2	Findings - Out-patient Care	74
2.3.3	Implication	75
2.3.4	Conclusion	75
2.3.5	Recommendation	75
<b>2.4</b>	<b>Prevalence Of Promotive And Preventive Activities</b>	<b>75</b>
2.4.1	Findings	75
2.4.2	Implication	77
2.4.3	Conclusion	77
2.4.4	Recommendation	77
<b>2.5</b>	<b>Barriers To Seeking Care</b>	<b>78</b>
2.5.1	Findings	78
2.5.2	Implication	78
2.5.3	Conclusion	78
2.5.4	Recommendation	78
<b>2.6</b>	<b>Risky Behaviour</b>	<b>79</b>
2.6.1	Prevalence Of “Ever” Smoker [Shisha, Cigarettes, Cigars, Pipes, Etc]	79
2.6.2	Prevalence Of Current Smoker [Shisha, Cigarettes, Cigars, Pipes, Etc]	79
2.6.3	Daily Smoker Of Shisha, Cigarettes, Cigars, Pipes, Etc	80
2.6.4	Implication	80
2.6.5	Conclusion	80
2.6.6	Recommendation	80
<b>2.7</b>	<b>List Of Tables</b>	<b>81</b>
<b>2.8</b>	<b>Definition Of Variables</b>	<b>131</b>
<b>TOPIC 3</b>		<b>139</b>
<b>3.0</b>	<b>UTILISATION OF HEALTHCARE SERVICES</b>	<b>141</b>
<b>3.1</b>	<b>General Objective</b>	<b>141</b>
3.1.1	Specific Objectives	141
<b>3.2</b>	<b>Utilisation Of Out-patient Healthcare Among Total Population</b>	<b>141</b>
3.2.1	Findings	141
3.2.2	Utilisation Of Outpatient Healthcare Among Those Reported To Have Illness In The Past 2 Weeks	145
3.2.3	Implication	145
3.2.4	Comparison with NHMS II (1996) and NHMS III (2006)	147

<b>3.3</b>	<b>Utilisation Of In-patient Healthcare (Hospitalisation) Among Total Population</b>	<b>148</b>
3.3.1	Findings	148
3.3.2	Implications	151
3.3.3	Comparison with NHMS II (1996) and NHMS III (2006)	153
<b>3.4</b>	<b>Conclusion</b>	<b>155</b>
3.4.1	Utilisation of Out-patient Healthcare	155
3.4.2	Utilisation of In-patient Healthcare (Hospitalisation)	155
<b>3.5</b>	<b>Recommendations</b>	<b>155</b>
<b>3.6</b>	<b>Tables Of Findings</b>	<b>156</b>
3.6.1	Utilisation of Out-patient Healthcare Among Total Population	156
3.6.2	Utilisation of Out-patient Healthcare Among Those Who Reported Ill	167
3.6.3	Utilisation of In-patient Healthcare (Hospitalisation) Among Total Population	172
<b>3.7</b>	<b>Definition Of Variables</b>	<b>181</b>
<b>TOPIC 4</b>		<b>189</b>
<b>4.0</b>	<b>ORAL HEALTHCARE</b>	<b>191</b>
<b>4.1</b>	<b>General Objective</b>	<b>191</b>
4.1.1	Specific Objectives	191
<b>4.2</b>	<b>Load Of Oral Health Problems</b>	<b>191</b>
4.2.1	Prevalence of oral health problems in the last two weeks	191
4.2.2	Prevalence of oral health problems in the last two weeks where daily activities were affected	192
4.2.3	Severity of recent oral health problems in the last two weeks where daily activities were affected	192
<b>4.3</b>	<b>Oral Health Seeking Behavior</b>	<b>192</b>
4.3.1	Type of oral health seeking behavior	192
4.3.2	Prevalence of population with oral health problems alone in the past two weeks and who did not seek care	193
4.3.3	Perceived need for oral healthcare among those who did not seek care	193
4.3.4	Main reasons for not seeking care for recent oral health problems in the past two weeks	193
4.3.5	Preferred oral healthcare provider and reasons for choice in the last 12 months	194
<b>4.4</b>	<b>Oral Healthcare Utilisation</b>	<b>195</b>
4.4.1	Timing of last visit for outpatient oral healthcare	195
4.4.2	Outpatient oral healthcare utilisation in the last 12 months	197
4.4.3	Recommendation of oral healthcare provider to others	201

<b>4.5</b>	<b>Implications And Comparisons</b>	<b>201</b>
<b>4.6</b>	<b>Conclusion</b>	<b>203</b>
<b>4.7</b>	<b>Recommendations</b>	<b>204</b>
<b>4.8</b>	<b>Tables Of Findings</b>	<b>205</b>
<b>4.9</b>	<b>Definition Of Variables</b>	<b>265</b>
<b>TOPIC 5</b>		<b>273</b>
<b>5.0</b>	<b>HEALTHCARE EXPENDITURE</b>	<b>275</b>
<b>5.1</b>	<b>General Objective</b>	<b>275</b>
	5.1.1 Specific Objectives	275
<b>5.2</b>	<b>Findings</b>	<b>275</b>
	5.2.1 Household Spending	275
	5.2.2 Sources of Payment for Health Care	276
	5.2.3 Household Financial sources to pay for health	276
	5.2.4 Usual Payer Who Would Pay for Health Care	276
	5.2.5 Financial Coverage for Health	277
	5.2.6 Out-of-Pocket Expenditure for Health Care	277
<b>5.3</b>	<b>Conclusion</b>	<b>282</b>
<b>5.4</b>	<b>Recommendations</b>	<b>282</b>
<b>5.5</b>	<b>Tables Of Findings</b>	<b>283</b>
<b>5.6</b>	<b>Definition Of Variables</b>	<b>326</b>

**LIST OF TABLES****PERCEIVED NEED & ILLNESS OF THE POPULATION IN MALAYSIA**

Table 1.1:	Comparison with previous NHMS data	12
Table 1.2:	Overall Perceived illness	15
Table 1.3:	Reported Illness Severe Enough To Affect Daily Activities	17
Table 1.4:	Day affected due to illness	18
Table 1.5:	Load of Illness: Fast/ Troubled Breathing	19
Table 1.6:	Load of Illness: Severe/ persistent vomiting	21
Table 1.7:	Load of Illness: Unable to eat (only among population < 13 years old)	23
Table 1.8:	Load of Illness: Bodily injury	24
Table 1.9:	Load of Illness: Severe pain in the chest/ stomach region (Adult: 13 years old and above)	26
Table 1.10:	Load of Illness: Sudden dizziness (Adult: 13 years old and above)	28
Table 1.11:	Load of Illness: Other health problems	30
Table 1.12:	Health Problem: Heart Disease	32
Table 1.13:	Health Problem: Stroke	34
Table 1.14:	Health Problem: Asthma	36
Table 1.15:	Health Problem: Arthritis (13 years old and above)	38
Table 1.16:	Health Problem: Dengue Fever (ever had)	40
Table 1.17:	Health Problem: Dengue Fever (< 12 months)	42
Table 1.18:	Health Problem: Urinary Tract Problem	44
Table 1.19:	Summary of General Health Findings	46
Table 1.20:	Prevalence of Visual Impairment/Poor Vision* (2 years old and above)	47
Table 1.21:	Prevalence of Wearing Spectacles/contact lenses for Distant Vision (2 years old and above)	49
Table 1.22:	Prevalence of Wearing Spectacles/contact lenses for Distant & Near Vision (2 years old and above)	51
Table 1.23:	General Health - Prevalence of Wearing Spectacles/contact lenses for Distant & Near Vision (2 years old and above)	53

**HEALTH SEEKING BEHAVIOUR**

Table 2.1:	Autonomy in deciding whether care need to be sought	81
Table 2.2:	Three most influential decision-maker in deciding whether care need to be sought by sociodemographic characteristics	82
Table 2.3:	Autonomy in deciding where or from whom care should be obtained	84
Table 2.4:	Three most influential decision-maker in deciding where and from whom care should be obtained by sociodemographic characteristics	85



Table 2.5:	Prevalence of type of care resorted to following acute illness among those who experience the health problem	88
Table 2.6:	Prevalence of self-medicate following illness(es) by sociodemographics characteristics	89
Table 2.7:	Prevalence of those seeking treatment or advice from health care provider following illness(es) by sociodemographics characteristics	92
Table 2.8:	Prevalence on perceived necessity to seek treatment or advice from healthcare provider	95
Table 2.9:	Proportion of respondents with number of reasons stated	95
Table 2.10:	Respondents stating reason for not seeking care despite being ill by sociodemographic characteristics	96
Table 2.11:	Prevalence of those purchasing medicine after getting advice from pharmacist following illness(es) by sociodemographic characteristics	99
Table 2.12:	Prevalence of those getting advice from others, other than health care provider following the illness(es), by socio-demographics characteristics	102
Table 2.13:	Prevalence of those doing other than mentioned above following the illness(es) by sociodemographics characteristics	105
Table 2.14:	Proportion of preferred provider for in-patient care	108
Table 2.15:	Preferred provider for in-patient care by sociodemographic characteristics	108
Table 2.16:	Top three factors associated with preferred provider for in-patient care	111
Table 2.17:	Proportion of preferred provider for out-patient care	111
Table 2.18:	Preferred provider for out-patient care by sociodemographic characteristics	112
Table 2.19:	Top three factors associated with preferred provider for out-patient care	114
Table 2.20:	Overall prevalence of promotive and preventive activities	114
Table 2.21:	Promotive and preventive activities by sociodemographics characteristics	115
Table 2.22:	Promotive and preventive activities by sociodemographics characteristics-continues	117
Table 2.23:	Barriers in seeking care	120
Table 2.24:	Top three barriers in seeking care by sociodemographics characteristic	121
Table 2.25:	Prevalence of ever smoker in Malaysia by sociodemographic characteristics	124
Table 2.26:	Prevalence of current smoker by sociodemographic characteristics	127
Table 2.27:	Prevalence of daily smoker by sociodemographic characteristics	129

### UTILISATION OF HEALTHCARE SERVICES

Table 3.1:	Utilisation of out-patient healthcare in the last 2 weeks	156
Table 3.2:	Prevalence of out-patient healthcare utilisation (by socio-demographic characteristics)	156
Table 3.3:	Last out-patient healthcare utilisation	158
Table 3.4:	Total number of out-patient healthcare facilities utilised	158
Table 3.5:	Prevalence of out-patient healthcare utilisation (by socio-demographic characteristics) by sector	159

Table 3.6:	Annual mean visit to out-patient healthcare facility (by socio-demographic characteristics and by sector)	160
Table 3.7:	Utilisation related to previous health problem(s) in last 2 weeks	162
Table 3.8:	Characteristics of out-patient healthcare utilisation	162
Table 3.9:	Characteristics of out-patient healthcare facilities	163
Table 3.10:	Travel time to out-patient healthcare facilities in the last 2 weeks	164
Table 3.11:	Distance to out-patient healthcare facilities in the last 2 weeks	165
Table 3.12:	Pregnant in the last 12 months	166
Table 3.13:	Utilisation of antenatal care	166
Table 3.14:	Place of antenatal care utilisation	166
Table 3.15:	Utilisation of out-patient healthcare among those who reported ill, in the last 2 weeks	167
Table 3.16:	Prevalence of out-patient healthcare utilisation among those who reported ill in the last 2 weeks by socio-demographic characteristics	167
Table 3.17:	Proportion of out-patient healthcare utilisation among those who reported ill in the last 2 weeks by time of last visit	169
Table 3.18:	Proportion of out-patient healthcare utilisation among those who reported ill in the last 2 weeks by number of health care facilities visited	169
Table 3.19:	Proportion of out-patient healthcare utilisation among those who reported ill in the last 2 weeks by sectors	170
Table 3.20:	Proportion of out-patient healthcare utilisation among those who reported ill in the last 2 weeks by utilisation characteristics by sectors	170
Table 3.21:	Mean utilisation of healthcare among those who reported ill in the last 2 weeks by utilisation characteristics by sectors	171
Table 3.22:	Hospitalisation in the last 12 months	172
Table 3.23:	Prevalence of hospitalisation (by socio-demographic characteristics)	172
Table 3.24:	Last in-patient healthcare utilization (admission to hospital)	173
Table 3.25:	Place of hospitalisation - total number of in-patient healthcare facilities utilised	174
Table 3.26:	Proportion of hospitalisation by sector	174
Table 3.27:	Annual mean visit for hospitalisation (in-patient care)- (by socio-demographic characteristics and by sector)	175
Table 3.28:	Characteristics of hospitalisation (proportion)	177
Table 3.29:	Characteristics of hospitalization	178
Table 3.30:	Travel time to in-patient healthcare facilities	179
Table 3.31:	Distance to in-patient healthcare facilities	180

**ORAL HEALTHCARE**

Table 4.1:	Prevalence of reported oral health problems in the last 2 weeks	205
Table 4.2:	Prevalence of oral health problems without any other illness in the last 2 weeks	207
Table 4.3:	Prevalence of oral health problems with at least one other illness in the last 2 weeks	209
Table 4.4:	Prevalence of oral health problems with at least one health illness in the last 2 weeks, with daily activities affected	211
Table 4.5:	Mean number of days where activities were affected by oral health problems in the last 2 weeks	213
Table 4.6:	Mean number of days where activities were affected by oral health problems with at least one other illness in the last 2 weeks	215
Table 4.7:	Prevalence of self care/self medicating oral health behavior in the last 2 weeks	217
Table 4.8:	Prevalence of seeking treatment or advice from health care providers in the last 2 weeks	219
Table 4.9:	Prevalence of seeking oral health care for recent oral health problems without any other illness in the last 2 weeks	221
Table 4.10:	Reasons for choice of preferred oral healthcare facility	224
Table 4.11:	Preferred oral healthcare provider in the last 12 months	228
Table 4.12:	Reasons for choosing government outpatient healthcare facility for oral healthcare	231
Table 4.13:	Reasons for choosing private outpatient healthcare facility for oral healthcare	232
Table 4.14:	Prevalence of outpatient oral healthcare utilisation in the last 12 months	233
Table 4.15:	Timing of last visit for outpatient oral healthcare	238
Table 4.16:	Number of outpatient healthcare facilities visited in the last 12 months	240
Table 4.17:	Type of outpatient healthcare facilities/providers where oral healthcare was sought in the last 12 months	242
Table 4.18:	Variables associated with seeking oral healthcare at outpatient facilities in the last 12 months	243
Table 4.19:	Frequency of visit to government outpatient healthcare facilities in the last 12 months	244
Table 4.20:	Frequency of visit to private outpatient healthcare facilities in the last 12 months	246
Table 4.21:	Distance to the government outpatient healthcare facilities in the last 12 months	248
Table 4.22:	Distance to the private outpatient healthcare facilities in the last 12 months	250
Table 4.23:	Distance to the urban outpatient healthcare facilities in the last 12 months	252
Table 4.24:	Distance to the rural outpatient healthcare facilities in the last 12 months	254
Table 4.25:	Travelling time to government outpatient healthcare facilities in the last 12 months	256
Table 4.26:	Travelling time to private outpatient healthcare facilities in the last 12 months	258
Table 4.27:	Travelling time to urban outpatient healthcare facilities in the last 12 months	260
Table 4.28:	Travelling time to rural outpatient healthcare facilities in the last 12 months	262

Table 4.29: Mode of transport to outpatient healthcare facilities in the last 12 months	264
Table 4.30: Prevalence of recommendation of oral healthcare providers to others	264

**HEALTHCARE EXPENDITURE**

Table 5.1: Household Expenditure	283
Table 5.2: Source of payment for health	283
Table 5.3: “Who would usually pay for healthcare?”	285
Table 5.4: “Who would usually pay for healthcare?” (con’t)	287
Table 5.5: Financial coverage for healthcare	289
Table 5.6: Total Out-of-Pocket Health Expenditure by Sociodemographic for All Respondents	291
Table 5.7: Total Out-of-Pocket Health Expenditure for Inpatient Care by Sociodemographic for All Respondents	294
Table 5.8: Total Out-of-Pocket Health Expenditure for Oral Health Care by Sociodemographic for All Respondents	297
Table 5.9: Total Out-of-Pocket Health Expenditure for Outpatient Care by Sociodemographic for All Respondents	300
Table 5.10: Total Out-of-Pocket Health Expenditure for Appliances by Sociodemographic for All Respondents	303
Table 5.11: Total Out-of-Pocket Health Expenditure for Promotive and Preventive Care by Sociodemographic for All Respondents	306
Table 5.12: Total Out-of-Pocket Health Expenditure for Transportation, Accommodation & Other Expenditures for All Respondents	309
Table 5.13: Total Out-of-Pocket Health Expenditure for Promotive and Preventive Care by Type of Spending for All Respondents	309
Table 5.14: Total Out-of-Pocket Health Expenditure for Those Who Sought Care	309
Table 5.15: Total Out-of-Pocket Health Expenditure for Inpatient Care by Sociodemographic	310
Table 5.16: Total Out-of-Pocket Health Expenditure for Oral Health Care by Sociodemographic	313
Table 5.17: Total Out-of-Pocket Health Expenditure for Outpatient Care by Sociodemographic	316
Table 5.18: Total Out-of-Pocket Health Expenditure for Appliances by Sociodemographic	319
Table 5.19: Total Out-of-Pocket Health Expenditure for Promotive and Preventive Care by Sociodemographic	322
Table 5.20: Total Out of Pocket Health Expenditure for Transportation, Accommodation & Others by Type of Care	325
Table 5.21: Total Out of Pocket Health Expenditure for Promotive & Preventive Care by Type of Spending	325

**LIST OF FIGURES**

Figure 1. 1: Load of illness and the relation with affected activities of daily living	4
Figure 2.1 : Determiner of where and from whom to seek care	68
Figure 2.2: Prevalence of respondents with illness in the preceding two weeks to the interview and chosen type of care	69
Figure 2.3: Comparison of prevalence in self-medication and seeking care from the healthcare provider between 1996 and 2011	72
Figure 2.4: Prevalence of unmet need for health care	78
Figure 2.5: Prevalence of smoker over 15 years	80
Figure 3.1: Utilisation of out-patient healthcare facilities by sector	146
Figure 3.2: Comparison with previous NHMS (NHMS 1996 & 2006) – Out-patient services	147
Figure 3.3: Utilisation of in-patient healthcare facilities by sector	152
Figure 3.4: Prevalence of in-patient healthcare utilisation within the last 12 months prior to interview	153
Figure 3.5: Distribution (%) of in-patient healthcare utilisation between sectors	153
Figure 3.6: Comparison with previous NHMS (NHMS 1996 & 2006) – in-patient services	154
Figure 4.1: Summary of oral health problems, healthcare seeking behavior and oral healthcare utilization	203



# TOPIC 1

## PERCEIVED NEED & ILLNESS OF THE POPULATION IN MALAYSIA





## 1.0 PERCEIVED NEED & ILLNESS OF THE POPULATION IN MALAYSIA

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### 1.1 GENERAL OBJECTIVE

To provide community based data and information on the load of illness in Malaysia.

#### 1.1.1 Specific Objectives

1. To determine the prevalence acute illness/ injury.
2. To determine the prevalence of chronic illness/ disability.

### 1.2. PREVALENCE OF ILLNESS

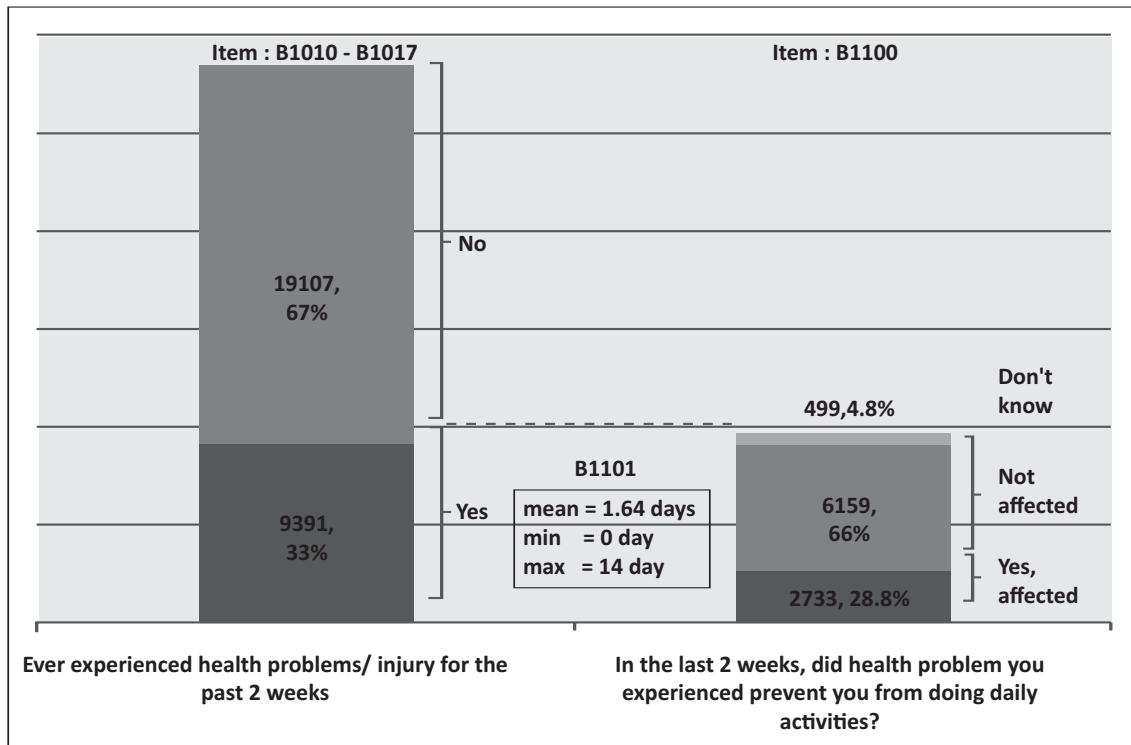
#### 1.2.1 Prevalence of Perceived illness (all ages)

Overall, 33.1% (95% CI, 32.0 - 34.4) of the population reported that they had recent illness 2 weeks prior to the interview. Higher rates were reported by other Bumiputera and the Indian ethnic groups compared to the Malays and the Chinese (**Table 1.1**).

#### 1.2.2 Severity of illness (all ages)

Population with recent illnesses, 28.8% (95% CI, 27.5 - 30.1) reported that the illness/ injury prevented them from carrying out daily activities (at home, work or in school) (**Table 1.2**).

The average number of days they were unable to perform daily activities was 1.64 days  $\pm$  0.0541<sup>1</sup> (95% CI, 1.53 - 1.74), with a minimum of 0 day (duration less than 24 hours) and a maximum of 14 days (**Table 1.3, Figure 1.1**).

**Figure 1.1: Load of illness and the relation with affected activities of daily living**

### 1.2.3 Signs of Illness

#### 1.2.3.1 Fast or troubled breathing (all ages)

In the preceding 2 weeks of the survey, 4.7% of the population reported that they had fast or troubled breathing (95% CI, 4.3 - 5.0). Increase trend in fast or troubled breathing was observed with increase in age and it was reported in 2.6% (95% CI, 2.0 - 3.5) for those aged between 0 to 4 years, 3.3% (95% CI, 2.3 - 4.5) for those aged 10-14 years and 13.1% (95% CI, 9.8 - 17.1) for those aged more than 75 years.

The results showed a significant difference between sexes in those population having fast/troubled breathing; 3.9% (95% CI, 3.5 - 4.3) in males compared to 5.5% (95% CI, 5.0 - 6.0) in female. Results also showed that the Indians (7.8%; (95% CI, 6.3 - 9.7) and other Bumiputera (7.4%; 95% CI, 6.3 - 8.6) had higher rates of fast/troubled breathing compared to Malay (4.6% ; 95% CI, 4.1 - 5.0) and Chinese (2.6% ; 95% CI, 2.0 - 3.3).

The results also revealed that the population in Wilayah Persekutuan (WP) Kuala Lumpur had the highest rate fast or troubled breathing,( 7.5% (95%CI, 5.7 - 9.8)) of followed by Sabah/ Labuan (6.6% ; 95% CI, 5.6 - 7.9) and WP Putrajaya (5.6% ; 95% CI, 4.3 - 7.4). Penang had the lowest percentage of troubled breathing (1.5%; 95% CI, 0.8 - 2.6).

There was a significant difference seen between population in urban and rural areas having trouble breathing, 4.3% (95% CI, 3.9 - 4.8) and 5.6% (95% CI, 5.0 - 6.3) respectively. Those who were never married (single) reported less incidence of breathing problems (4.0%; 95% CI, 3.4 - 4.7) compared with those who were married, divorcee, widow/widower (**Table 1.4**)

#### **1.2.3.2 Severe/ persistent vomiting (all ages)**

In the preceding 2 weeks prior to the survey, occurrence severe vomiting was reported in 1.7% of the population (95% CI, 1.5 - 1.9).

A significant difference was seen in the rates of severe/persistent vomiting between sexes; 1.2% (95% CI, 1.0 - 1.5) males compared with 2.1% (95% CI, 1.8 - 2.5) females. Among the ethnic groups, significant differences were seen between certain ethnic groups; other Bumiputera had higher rates (2.3%; 95% CI, 1.7 - 3.1) compared to the Chinese (1.1%; 95% CI, 0.8 - 1.5). Those living in rural locality reported higher rate of severe vomiting (5.6%; 95% CI, 5.0 - 6.3) (**Table 1.5**).

#### **1.2.3.3 Unable to eat (children < 13 years)**

In the preceding 2 weeks prior to the survey, 2.4% (95% CI, 1.9, 2.9) of the children population (below 13 years old) reported unable to eat/ drink, with a higher rate seen amongst the 0-4 years old (**Table 1.5**).

#### **1.2.3.4 Bodily injury (all ages)**

In the preceding 2 weeks prior to the survey, 1.7% of the population (95% CI, 1.5 - 1.9) reported having bodily injury resulting from a fall, road traffic accident, burn, poisoning, submersion in water, a firearm/ weapon or from an act of violence.

There was no significant difference between occurrence of bodily injury between the sexes; male 2.0% (95% CI, 1.7 - 2.3) and female 1.5% (95% CI, 1.2 - 1.8). Incidence of bodily injury was higher among the singles 2.4% (95% CI, 2.0 - 2.9), compared to those who were ever married (married, separated, divorcee, widow/er), 1.0% (95% CI, 0.8 - 1.2). There was also a significant difference in the rate of bodily injury between population in urban and rural areas, 1.5% (95% CI, 1.3 - 1.8) and 2.2% (95% CI, 1.9 - 2.7), respectively (**Table 1.7**).

### 1.2.3.5 Chest/ stomach pain (age > 13 years old)

Severe pain/ tightness in the chest/ stomach region in the preceding 2 weeks prior to the survey were reported in 4.8% of the population aged 13 years old and above (95% CI, 4.4 - 5.3). There was a significant difference seen between sexes; male 4.3% (95% CI, 3.8 - 4.8) and female 5.5% (95% CI, 4.9 - 6.1).

Population in WP Putrajaya reported higher rate of chest/stomach pain (9.8%; 95% CI, 8.1- 11.9), followed by Sabah/Labuan (8.2%; 95% CI, 6.7 - 10.1), WP Kuala Lumpur (7.7%; 95% CI, 5.7 - 10.4) and Johor, (7.1%; 95% CI, 5.8 - 8.7). Urban population had a lower prevalence, 4.4% (95% CI, 3.9 - 4.9), compared to rural population, 6.1% (95% CI, 5.3 - 7.0) (**Table 1.8**).

### 1.2.3.6 Sudden dizziness (age ≥ 13 years old)

In the preceding 2 weeks prior to the survey, 12.4% (95% CI: 11.6%, 13.1%) of the adult population reported experiencing sudden dizziness.

There was a significant difference in the incidence of sudden dizziness in the incidence between sexes; 9.3% (95% CI, 8.4 - 10.2) males and 15.6% (95% CI, 14.6 - 16.7) females. In WP Putrajaya a higher rate of sudden dizziness (26.5%; 95% CI, 23.0 - 30.4) was reported, followed by Sabah (19.1%; 95% CI, 16.5 - 22.0) and Johor (18.6%; 95% CI, 15.9 - 21.6).

Population in rural location had a higher prevalence of sudden dizziness (14.6%; 95% CI, 13.2 - 16.1) compared to those in urban areas (11.5%; 95% CI, 10.7 - 12.4) (**Table 1.9**).

## 1.3 HEALTH PROBLEMS & DISEASES – INFORMED BY A MEDICAL PRACTITIONER

### 1.3.1 Cardiovascular disease (Stroke & Heart Disease)

#### 1.3.1.1 Heart disease (ever told to have)

In general, 2.1% (95% CI, 1.9 - 2.4) of the population was informed by a doctor/medical assistant that they had a heart disease. A higher percentage of heart disease was seen among the population aged 40 years and above.

There was significant difference between sexes told to have heart disease; 2.3% males (95% CI, 2.0 - 2.7) and 1.9% (95% CI, 1.7 - 2.2) females. Among the ethnic groups, 4.6% (95% CI, 3.6 - 5.8) of the Indians reported to have heart disease, which was significantly higher compared to other ethnic groups.

A higher percentage of those population who were divorced/ widowed reported that they were told to have heart disease (10.1%; 95% CI, 8.1 - 12.5). Higher rate of heart disease was reported by people with no formal education (6.3% (95% CI, 4.9 - 8.2) and primary education (2.8% (95% CI, 2.4 - 3.3) compared with people with tertiary education (1.7%; 95% CI, 1.3 - 2.2) (**Table 1.11**).

### 1.3.1.2 Stroke (ever told to have)

In general, 0.7% (95% CI, 0.6 - 0.9) of the population were informed by a doctor/medical assistant that they had a stroke. There was an increasing trend of stroke with increasing age. Those in the age group of 75 years and above had the highest rate (7.8% ; 95% CI, 5.3 - 11.4), followed by the age group of 70 to 74 years (3.5%; 95% CI, 2.1 - 5.8) and the age group 65-69 years (3.0%; 95% CI, 2.0 - 4.6).

The divorced/widowed were reported to have significantly higher incidence of stroke, 2.5% (95% CI, 1.7 -3.6) compared to single and married, 0.1% (95% CI, 0.1 - 0.3) and 0.9% (95% CI, 0.7 - 1.1), respectively. People with no formal education reported the highest percentage (2.3%; 95% CI, 1.6 - 3.3) of having stroke compared with those with secondary or tertiary education (**Table 1.12**). There was no significant difference seen across gender and ethnicity.

### 1.3.2 Asthma (ever told to have)

Overall, 6.4% of the population (95% CI, 5.9 - 6.8) were informed by a doctor/medical assistant to have asthma. Age group above 75 years had the highest prevalence of asthma (10.7%; 95% CI, 7.5 - 15.2), followed by age group 5 to 9 years (8.5%; 95% CI, 7.3 - 9.8) and age group 15 to 19 years (8.1%; 95% CI, 6.6 - 10.0). Chinese had the lowest percentage of asthma (4.0%; 95% CI, 3.3 - 4.9), compared to the Malays (7.2%; 95% CI, 6.7-7.8), the Indian (7.6%; 95% CI, 6.1 - 9.5) and other Bumiputera (7.8%, 95% CI, 6.4 - 9.6). There were no significant differences in the incidence of asthma across marital status, location, income level and occupation (**Table 1.13**).

Less people in Penang reported being told to have asthma (3.5%; 95% CI, 2.5 - 4.9), while those in Putrajaya reported the highest (10.4%; 95% CI, 8.5 - 12.8).

### 1.3.3 Arthritis (ever told to have)

In general, 4.2% of the population (95% CI, 3.8 - 4.6) was informed by a doctor/ medical assistant to have arthritis /disease of the joints. Those from the age group above 75 years had reported the highest prevalence of arthritis (21.7%; 95% CI, 17.6 - 26.5), followed by the age group of 70 to 74 years (16.2%; 95% CI, 12.7 -

20.4) and age group 65 to 69 years (14.6%; 95% CI, 11.5 - 18.5). There was no significant difference found between sexes. Rural population had reported higher prevalence of arthritis (5.3%; 95% CI, 4.5 - 6.1) compared with urban population (3.8; 95% CI, 3.4 - 4.3). Those who were widowed/divorced had reported highest percentage of having arthritis (12.1%; 95% CI, 10.0 - 14.5), followed by those who were married (5.4%; 95% CI, 4.9 - 6.0). Those with lower education level; no formal education (11.0%; 95% CI, 9.1 - 13.2) and primary education (6.2%; 95% CI, 5.4 - 7.2) had higher prevalence of arthritis compared with those with higher education levels. Sarawak was reported to have the highest prevalence of arthritis, (5.6%; 95% CI, 4.0 - 8.0) while Kelantan had the lowest (0.9%; 95% CI, 0.5 - 1.6) (**Table 1.14**).

### **1.3.4 Dengue fever (ever told to have)**

In general, 2.7% of the population (95% CI, 2.4 - 3.1) was ever informed by a doctor/ medical assistant to have had dengue fever. A higher percentage was seen among those aged 40-44 years old and 35-39 years old; 5.0% (95% CI, 3.7 - 6.6) and 4.5% (95% CI, 3.4 - 5.9), respectively. Males reported a higher percentage (3.3%; 95% CI, 2.9 - 3.8) compared with females (2.1%; 95% CI, 1.8 - 2.5). In urban location there was a higher percentage of dengue fever reported (3.2%; 95% CI, 2.8 - 3.7). Comparison by state, WP Kuala Lumpur, WP Putrajaya, Selangor, Perak and Negeri Sembilan and Johor reported higher percentages. There was no significant difference of having dengue observed across ethnic groups. Those with tertiary education and high income level (more than RM 5000) were reported to have a higher percentage of dengue, 6.1% (95% CI, 5.1 - 7.2) and 4.2% (95% CI, 3.5 - 5.0) respectively (**Table 1.15**).

#### **1.3.4.1 Dengue fever in the past 12 months**

0.7% of the population (95% CI, 0.6 - 0.8) was informed by a doctor/ medical assistant in the past 12 months that they had dengue fever. There were no significant differences observed across urban/rural areas, gender and age group and having dengue fever in the past 12 months. Population in Negeri Sembilan, Penang, WP Kuala Lumpur, WP Putrajaya and Selangor had reported a higher percentage of dengue fever in the past 12 months. There was significant difference seen across income level and education level (**Table 1.16**).

### **1.3.5 Urinary Tract problems (past 12 months)**

In the past 12 months, 1.6% of the population (95% CI, 1.4 - 1.8) was informed by a doctor/ medical assistant to have urinary tract problems. A higher percentage was seen among the older age groups; 70-74 years (6.1%; 95% CI, 4.1 - 9.0), 75 years and above (5.1%; 95% CI, 2.7 - 9.4); 60-64 years (3.7%; 95% CI, 2.4 - 5.6) and 65-69 years (2.9%; 95% CI, 1.9 - 4.3). There was no significant difference in urinary tract problems observed between sexes. Prevalence of urinary tract problems was found

to be significantly different for marital status; people who were never married (single) had the lowest percentage (1.1%; 95% CI, 0.8 - 1.4) compared with those who were ever married. For ethnic group, the Indians had the highest prevalence (2.3%; 95% CI, 1.7 - 3.2), the Chinese having the lowest (1.2%; 95% CI, 0.9 - 1.6) (**Table 1.17**).

### 1.3.6 Other Chronic Diseases

Please refer to Volume II for findings of other diseases captured in this survey.

## 1.4 GENERAL HEALTH

### 1.4.1 Overall Health Rating (In general, how would you rate your health today?)

In general, majority 58.9% (95% CI, 58.2 - 60.0) rated their overall health as good and 24.7% (95% CI, 24.1-25.3) rated their health as very good (**Table 1.18**). Only 16.2% (95% CI, 15.6 - 16.7) of the respondents rated their health as not good.

### 1.4.2 Difficulty with work/daily activities in the past 30 days

Only 2.3% (95% CI, 2.1 - 2.6) of the population reported to have moderate to severe difficulty to perform work/ daily activities in the past 30 days while 12.1% (95% CI, 11.5 - 12.8) reported to have mild difficulty performing daily activities. The majority 85.3% (95% CI, 84.5 - 86.0) reported having no difficulty at all to work or to do daily activities (**Table 1.18**).

### 1.4.3 Vision

#### 1.4.3.1 Visual Impairment

A total of 30.2% (95% CI, 29.5 – 30.9) of the population had poor vision (visual impairment), i.e. having either difficulty seeing near/ distant objects and/ or wearing glasses/ contact lenses. Those who in urban population reported to have higher percentage of poor vision (34.0%; 95% CI 33.1 – 34.9) as compared with those who in rural population (20.8%; 95% CI 20.0 – 21.7). Chinese reported the higher percentage (49.8%; 95% CI 48.1 – 51.6) as compared to other ethnic groups. WP Kuala Lumpur, Perak and Penang showed a high percentage of population using spectacles for distant vision, 41.3% (95% CI, 37.6 – 45.2) , 39.5% (95% CI, 36.7 – 42.3) and 37.9% (95% CI, 34.6 – 41.3), respectively.

A higher rate was seen among females (33.9%; 95% CI, 32.9 – 34.9) as compared to males (26.7%; 95% CI, 25.7 – 27.7). A higher rate was also seen among those with tertiary education (47.5%; 95% CI, 45.5 – 49.6) as compared to those with primary (29.2%; 95% CI, 27.9 – 30.4), secondary (33.7%; 95% CI, 32.5 – 34.9) and no education (28.4%; 95% CI 25.7 –

31.3). Those with higher household income were seen to have higher percentage of poor vision (visual impairment) (**Table 1.19**).

#### 1.4.3.2 Distant vision

Spectacles/ contact lenses were worn by 14.5% (95% CI: 13.7, 15.3) of the population for distant vision, and a higher percentages were seen among young adult; 15-19 years (23.4%; 95% CI, 21.0 - 25.9), 20-24 years (20.9%; 95% CI, 18.5 - 23.5) and 25-29 years (20.3%; 95% CI, 18.0 - 22.8) (**Table 1.20**).

A higher rate of usage of spectacles for distant vision was reported by females (17.2%; 95% CI, 16.3 - 18.2) compared to males (11.8%; 95% CI, 10.9 - 12.8). A higher rate was also seen among those with tertiary education (32.2%; 95% CI, 30.0 - 34.4) compared with people with primary education (9.7%; 95% CI, 8.7 - 10.8) and no formal education (5.3%; 95% CI, 4.0 - 6.9).

Those in urban population reported to have a higher percentage of usage of spectacles for distant vision (17.2%; 95% CI, 16.2 - 18.2) compared with those in rural location (7.7%; 95% CI, 7.0 - 8.6). WP Putrajaya and WP Kuala Lumpur showed a high percentage of population using spectacles for distant vision, 25.4% (95% CI, 21.5 - 29.8) and 24.3% (95% CI, 19.4 - 29.9), respectively.

#### 1.4.3.3 Near vision

Spectacles/ contact lenses were used by 10.3% (95% CI, 9.8 - 10.9) of the population for near vision (reading, sewing), and a higher percentage of users was seen among the older age groups; 50-54 years (40.4%; 95% CI, 37.5 - 43.4), 55-59 years (38.6%; 95% CI, 35.2 - 42.0) and 45-49 years (35.9%; 95% CI, 33.0 - 39.0).

Among the ethnic groups, Chinese reported to have the highest rate of using spectacles for near vision (16.7%; 95% CI, 15.4 - 18.1%), followed by Indians (10.1%; 95% CI, 8.5 - 12.1) and Malays (9.0%; 95% CI, 8.4 - 9.7). There were no significant differences seen across gender, states and education level and near vision. Population in urban location had a higher percentage (10.9%; 95% CI, 10.2- 11.6) compared to rural location (8.9%; 95% CI, 8.1- 9.7) (**Table 1.21**).



#### 1.4.3.4 Both near & distant vision

Spectacles/ contact lenses were used by 5.4% (95% CI, 5.1, 5.9) of the population for both near & distant vision. Female had a higher rate (6.4%; 95% CI, 5.8 - 7.0) compared with males (4.6%; 95% CI, 4.1 - 5.1). Among the ethnic groups, the Chinese had a higher percentage of user of spectacles for near and distant vision (8.4% (95% CI: 7.4%, 9.6%) followed by the Indians, 7.1% (95% CI, 5.4 - 9.4). Urban locality had a higher percentage, 5.9% (95% CI, 5.4 - 6.5) compared to rural areas, 4.2% (95% CI, 3.8 - 4.7) (Table 1.22).

#### 1.4.3.5 Poor distant vision (Despite wearing glasses/contact lenses)

In terms of difficulty (moderate and severe) seeing and recognizing people from a distance of 20 meters in the past 30 days, 5.4% (95% CI, 4.7 - 6.2) reported having difficulty, while 11.9% (95% CI, 10.9 - 13.0) reported they had mild difficulty and 82.5% (95% CI, 81.1 - 83.7) had no difficulties (Table 1.18).

#### 1.4.3.6 Poor near vision (Despite wearing glasses/contact lenses)

In the past 30 days, 3.3% (95% CI, 2.8 - 3.9) reported moderate difficulty/unable to see/recognize object at arm's length or in reading, while 87.2% (95% CI: 86.1- 88.2) reported they had no difficulties, respectively (Table 1.18).

### 1.4.4 Summary

Overall, a substantial number of people had poor vision, majority were correctable with glasses/contact lenses. The rate for poor distant vision was higher among the age group of 15-25 years, females, Chinese, higher income group and those who had tertiary education. Urban areas and the states of Wilayah Persekutuan Kuala Lumpur, Wilayah Persekutuan Putrajaya, Selangor, Penang, Johor and Perak were seen to have high prevalence of poor distant vision while the states in the east coast, Sabah and Sarawak as well as the rural areas had lower rates. Higher rates of problems with near vision were seen in older people, from the age of 40 years and above.

## 1.5 COMPARISON WITH NHMS II AND NHMS III

The table below shows rates from NHMS 1996, NHMS 2006 and the current survey, NHMS 2011 (**Table 1.1**).

Overall rate of illness has increased significantly from 1996 to 2011. The population subgroups with highest rates of illness remained the same, i.e. Other Bumiputera and Indians. Females now report a higher rate of illness than males and rural population experience a significantly higher rate of illness than urban population.

Overall prevalence of asthma has increased by 50% from NHMS II in 1996 until NHMS 2011.

**Table 1.1: Comparison with previous NHMS surveys**

	<b>NHMS II (1996)</b>	<b>NHMS III (2006)</b>	<b>NHMS IV (2011)</b>
<b>Overall illness/injury</b>	29.5% (95% CI, 28.8 - 30.3)	23.6% (95% CI, 22.9 - 24.3)	33.1% (95% CI, 32.0 - 34.4)
Highest prevalence among ethnic group	Other Bumiputera: 37.0% (95% CI, 35.4 - 38.6)  Indian: 29.9% (95% CI, 27.2 - 32.5)	Indian: 26.9% (95% CI, 24.8 - 29.1)  Other Bumiputera: 26.4% (95% CI, 24.7 - 28.2)	Other Bumiputera : 41.7% (95% CI, 37.8 - 45.6)  Indian: 39.8% (95% CI, 35.7 - 44.0)
Sex	Male: 29.3% (95% CI, 28.5 - 30.2)  Female: 29.8% (95% CI, 28.9 - 20.7)	Male: 24.3% (95% CI, 32 - 34.4)  Female: 22.9% (95% CI, 22.1 - 23.7)	Male: 30.6% (95% CI, 29.2 - 32.0)  Female: 35.6% (95% CI, 34.4 - 37.3)
Urban : Rural	Rural: 31.5% (95% CI, 30.4 - 32.6)  Urban: 27.8% (95% CI, 26.8 - 28.9)	Rural: 25.5% (95% CI, 24.3 - 26.7)  Urban: 22.4% (95% CI, 21.6 - 23.3)	Rural: 35.6% (95% CI, 33.5 - 37.7)  Urban: 32.2% (95% CI, 30.7 - 33.6)
Highest prevalence among states	N. Sembilan: 45.8% (95% CI, 41.9 - 49.7)  Sabah: 37.2% (95% CI, 35.5 - 39.0)  Melaka: 35.9% (95% CI, 32.7 - 39.1)	Labuan: 37.9% (95% CI, 33.4 - 42.7)  N.Sembilan: 36.0% (95% CI, 32.5 - 39.5)  Kedah: 34.8% (95% CI, 31.9 - 37.9)	WP Putrajaya: 57.5% (95% CI, 53.8 - 61.1)  WP Kuala Lumpur: 48.7% (95% CI, 44.8 - 52.6)  Johor: 43.8% (95% CI, 40.0 - 47.6)

	NHMS II (1996)	NHMS III (2006)	NHMS IV (2011)
<b>Self reported Medical diagnosed conditions (Chronic Disease/ Health Problem)</b>			
Heart Disease	-	-	2.1% (95% CI, 1.9 - 2.4)
Stroke	-	-	0.7% (95% CI, 0.6 - 0.9)
Asthma	4.2%* (95% CI, 3.9 - 4.4)	4.5%* (95% CI, 4.3 - 4.8)	6.4% (95% CI, 5.9 - 6.8)
Arthritis	-	-	4.2% (95% CI, 3.8 - 4.6)
Urinary tract problem	-	-	1.6% (95% CI, 1.4 - 1.8)
Dengue fever	-	-	2.7% (95% CI, 2.4 - 3.1)
*Prevalence among adult Malaysian (18 years old and above)			

## 1.6 CONCLUSION & IMPLICATION

The load of illness is high in Malaysia, and has increased since 1996, with one out of three people reporting a health problem in the past two weeks, and more than one quarter reporting that their illness affected daily activities. This has possible implications on the demand for health care and economic productivity.

There is a consistent ethnic differences observed in term of load of illnesses with Bumiputera in Sabah being the main disadvantaged group, and the Chinese with the lowest illness burden. Differences were also seen among gender, states and urban/rural locality. Females had reported higher percentages for most complaints except for bodily injury, which was higher in males. The reasons for this need to be further explored. Health seeking behaviour was higher among the disadvantaged group (refer chapter on Health Seeking Behaviour (Topic 2); implying they had taken some action for the reported health problems.

There were no differences seen between income groups and occupation and the load of illness, implying the load of illness is not related to socio-economic status. This suggests other factors could have contributed to this load of illness, such as environmental sanitation, housing and possibly genetic differences, which showed a consistent pattern across ethnicity.

Cardiovascular disease (stroke and heart disease) are common for people aged 40 years and above, Indians and divorcees/widowed. Those in primary education and the very poor had higher rates of heart disease. However, there were no significant differences seen for other parameters for stroke.

Prevalence of asthma has increased. It is unclear if the increase is due to an actual increase in the incidence of the disease or better recognition of the illness.

Arthritis is a common chronic illness affecting the older age group. Prevalence of arthritis increases with age, and higher rates were seen among those from rural area, divorced/widowed and married, had no formal/primary education and widowed. The states with a higher rate were Sarawak, Johor, Sabah, Pahang and the lowest rate was seen in Kelantan. No significant differences were seen between gender or ethnicity.

Dengue is a preventable urban disease and measures should be taken to eliminate the disease. Though the overall prevalence is 2.7%, dengue fever tends to occur in the working age groups, urban areas and the higher income group. It was also more common in certain states, namely WP Kuala Lumpur, WP Putrajaya, Selangor, Negeri Sembilan and Perak.

For urinary tract problems, the prevalence is low, but increased with age 40 years and above, Indians and the ever married population. Health care providers need to be aware of this increasing occurrence of urinary tract problems in these groups.

Refractive errors are extremely common in our population and would become more common as our country gets more developed. Measures need to be taken for early detection. It would pose a heavy burden in terms of health care costs to the family for eye appliances.

## 1.7 RECOMMENDATIONS

- a) Groups with higher self-reported illnesses is a public health concern, especially certain ethnic groups, though this is perceived need.
- b) Prevention and intervention need to be taken for cardiovascular diseases and asthma. Arthritis is a burden in the older age groups, and this needs management that include rehabilitation.
- c) Refractive errors are high, and the increased need for eye appliances is a cause for concern.

## 1.8 TABLES OF FINDINGS

**Table 1.2: Overall Perceived illness**

Socio demographic characteristics	n	Estimated population	% (Prevalence)	95% CI	
				Lower	Upper
<b>MALAYSIA</b>	28,498	27,278,956	33.1	32.0	34.4
<b>State</b>					
Johor	2,469	3,198,775	43.8	40.0	47.6
Kedah	1,700	1,836,622	30.0	25.0	35.5
Kelantan	1,896	1,467,639	15.1	12.7	17.9
Melaka	1,600	788,972	32.2	28.1	36.6
Negeri Sembilan	1,529	975,602	29.8	25.2	34.8
Pahang	1,641	1,387,621	26.4	22.0	31.2
Penang	1,788	1,527,315	17.9	15.6	20.4
Perak	1,599	2,243,870	41.4	38.0	45.0
Perlis	1,424	217,070	26.6	22.9	30.8
Selangor	4,101	5,398,672	28.6	25.6	31.6
Terengganu	1,846	1,012,044	20.9	18.6	23.5
Sabah/Labuan	3,208	3,217,431	43.0	39.0	47.2
Sarawak	1,962	2,316,783	31.5	27.6	35.7
WP Kuala Lumpur	911	1,620,013	48.7	44.8	52.6
WP Putrajaya	824	70,529	57.5	53.8	61.1
<b>Location</b>					
Urban	16,372	19,496,298	32.2	30.7	33.6
Rural	12,126	7,782,659	35.6	33.5	37.7
<b>Sex</b>					
Male	13,757	13,959,955	30.6	29.2	32.0
Female	14,741	13,319,001	35.8	34.4	37.3
<b>Age Group</b>					
0-4	2,772	2,366,121	35.3	32.6	38.1
5-9	2,904	2,596,837	29.7	27.3	32.2
10-14	2,926	2,639,932	27.0	24.9	29.2
15-19	2,450	2,746,005	37.6	34.9	40.4
20-24	2,108	2,712,661	37.0	33.7	40.4
25-29	2,101	2,605,575	33.3	30.3	36.4
30-34	1,885	2,065,596	34.9	32.1	37.8
35-39	1,799	1,844,496	30.3	27.7	33.0
40-44	1,844	1,725,055	32.8	30.2	35.6
45-49	1,801	1,570,079	34.3	31.5	37.4
50-54	1,681	1,313,353	32.9	29.9	35.9
55-59	1,463	1,027,597	31.0	27.9	34.3
60-64	997	772,562	32.0	28.2	36.1
65-69	673	499,048	30.1	25.5	35.2
70-74	538	368,196	32.2	27.0	37.9
75+	556	425,843	38.8	33.7	44.3
<b>Ethnicity</b>					
Malay	16,975	14,253,318	34.1	32.5	35.6
Chinese	4,944	6,332,970	25.4	23.5	27.5
Indians	2,122	1,834,300	39.8	35.7	44.0
Other Bumiputera	2,933	3,300,636	41.7	37.8	45.6
Others	1,524	1,557,733	30.3	25.7	35.3

Socio demographic characteristics	n	Estimated population	% (Prevalence)	95% CI	
				Lower	Upper
<b>MALAYSIA</b>	28,498	27,278,956	33.1	32.0	34.4
<b>Marital status<sup>1</sup></b>					
Single	6,983	7,908,495	34.3	32.4	36.2
Married	12,537	11,676,560	33.6	32.2	35.1
Widow/widower/divorcee	1,470	1,072,354	36.2	33.0	39.5
<b>Education Level</b>					
Primary	8,065	7,159,469	30.9	29.3	32.6
Secondary	9,485	9,704,547	33.3	31.6	35.0
Tertiary	3,873	4,255,316	36.0	33.7	38.5
No formal education	1,559	1,218,847	35.1	31.6	38.7
Unclassified	1,675	1,627,575	29.6	26.2	33.3
N/A	3,841	3,313,202	34.7	32.5	37.1
<b>Occupation<sup>1</sup></b>					
Government/Semi government	2,148	1,811,075	37.0	34.0	40.0
Private	5,843	7,001,658	34.2	32.2	36.3
Self-employed	3,686	3,358,458	30.1	27.5	32.9
Unpaid worker	3,224	2,758,938	36.3	34.0	38.6
Retiree	1,738	1,330,270	33.7	30.5	36.9
<b>Household Income (RM)</b>					
Less than RM400	2,166	2,016,214	29.6	26.8	32.6
RM400 – RM499	448	415,901	28.0	22.1	34.6
RM500 – RM699	1,141	941,916	35.5	30.6	40.7
RM700 – RM999	1,865	1,655,090	32.1	28.6	35.8
RM1000 – RM1999	5,927	5,096,306	31.9	29.8	34.2
RM2000 – RM2999	4,797	4,593,572	34.7	32.2	37.2
RM3000 – RM3999	3,704	3,688,019	34.0	31.4	36.7
RM4000 – RM4999	2,484	2,659,738	33.5	30.5	36.9
RM5000 and above	5,966	6,212,201	33.7	31.4	36.0

95% CI = 95% Confidence Interval

<sup>1</sup>not including "missing/not applicable"

n = total respondent

**Table 1.3: Reported Illness Severe Enough To Affect Daily Activities**

Socio demographic characteristics	n	Estimated population	% 95% CI		
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	9,391	9,040,452	28.8	27.5	30.1
<b>State</b>					
Johor	1,098	1,400,206	26.3	23.0	29.9
Kedah	511	550,428	25.8	20.2	32.2
Kelantan	291	221,772	21.3	16.7	26.8
Melaka	552	253,737	24.9	20.1	30.5
Negeri Sembilan	479	290,558	28.4	24.1	33.2
Pahang	438	365,845	29.4	24.9	34.3
Penang	382	273,024	59.9	53.2	66.3
Perak	673	929,912	32.5	28.5	36.7
Perlis	358	57,829	28.7	22.8	35.5
Selangor	1,284	1,541,439	31.0	28.1	34.1
Terengganu	384	212,013	25.8	20.4	32.1
Sabah/Labuan	1,400	1,384,348	29.7	26.4	33.3
Sarawak	628	729,985	24.8	20.1	30.2
WP Kuala Lumpur	453	788,807	29.2	24.5	34.5
WP Putrajaya	460	40,549	29.7	25.7	34.0
<b>Location</b>					
Urban	5,328	6,272,615	28.0	26.4	29.6
Rural	4,063	2,767,837	30.5	28.4	32.8
<b>Sex</b>					
Male	4,213	4,267,222	28.4	26.5	30.3
Female	5,178	4,773,230	29.2	27.5	30.9
<b>Age Group</b>					
0-4	964	835,139	32.4	28.4	36.7
5-9	844	771,234	37.4	33.1	41.8
10-14	786	713,138	34.4	29.9	39.2
15-19	900	1,033,382	25.2	21.8	29.0
20-24	792	1,003,398	26.1	22.0	30.7
25-29	741	867,401	24.5	20.9	28.6
30-34	663	720,386	28.1	24.1	32.5
35-39	565	558,827	27.5	22.9	32.6
40-44	615	566,226	26.5	22.2	31.3
45-49	619	539,676	25.1	21.1	29.7
50-54	545	431,499	27.8	23.4	32.5
55-59	453	318,545	26.7	21.0	33.2
60-64	311	247,266	24.0	19.0	29.9
65-69	188	150,325	29.0	21.0	38.5
70-74	186	118,598	41.7	32.8	51.2
75+	219	165,411	39.0	30.9	47.6
<b>Ethnicity</b>					
Malay	5,573	4,853,433	29.3	27.7	30.9
Chinese	1,285	1,611,081	22.5	20.0	25.3
Indians	812	729,162	35.4	31.1	39.9
Other Bumiputera	1,232	1,375,228	31.4	27.8	35.3
Others	489	471,547	27.4	21.7	33.9

Socio demographic characteristics	n	Estimated population	%	95% CI	
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	9,391	9,040,452	28.8	27.5	30.1
<b>Marital status<sup>1</sup></b>					
Single	2,405	2,712,008	26.3	23.9	28.8
Married	4,213	3,924,492	27.1	25.3	28.9
Widow/widower/divorcee	523	387,823	31.4	26.8	36.4
<b>Education Level</b>					
Primary	555	427,752	34.1	28.6	40.0
Secondary	2,492	2,215,594	30.0	27.5	32.6
Tertiary	3,158	3,230,969	26.0	24.2	27.9
No formal education	1,409	1,534,011	25.1	22.3	28.2
Unclassified	462	481,629	37.5	31.4	44.0
N/A	1,315	1,150,496	33.6	30.1	37.3
<b>Occupation<sup>1</sup></b>					
Government/Semi government	812	669,646	26.0	22.0	30.5
Private	2,024	2,396,544	27.5	25.2	30.0
Self-employed	1,094	1,012,221	26.7	23.0	30.8
Unpaid worker	1,121	1,000,604	23.8	20.9	26.9
Retiree	583	447,706	30.0	25.4	34.9
<b>Household Income (RM)</b>					
Less than RM400	659	597,224	34.4	29.5	39.8
RM400 – RM499	126	116,248	38.2	27.8	49.8
RM500 – RM699	378	334,158	26.6	21.4	32.6
RM700 – RM999	579	531,537	31.7	26.9	36.9
RM1000 – RM1999	1,812	1,627,326	30.6	27.8	33.6
RM2000 – RM2999	1,651	1,594,030	26.2	23.6	29.0
RM3000 – RM3999	1,247	1,253,520	30.6	27.0	34.4
RM4000 – RM4999	860	893,903	27.9	24.4	31.7
RM5000 and above	2,079	2,092,504	26.1	23.6	28.9

<sup>1</sup>not including "missing/not applicable"

**Table 1.4: Day affected due to illness**

Statistics		
Mean (days)		1.64
Standard error		0.0554
Median		1.00
95% Confidence Interval for Mean	Lower Bound	1.53
	Upper Bound	1.75
Minimum (days)		0
Maximum (days)		14



**Table 1.5: Load of Illness: Fast/Troubled Breathing**

Socio demographic characteristics	n	Estimated population	%	95% CI	
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	28,498	27,278,956	4.7	4.3	5.0
<b>State</b>					
Johor	2,469	3,198,775	5.4	4.3	6.8
Kedah	1,700	1,836,622	4.4	3.2	5.9
Kelantan	1,896	1,467,639	1.6	1.0	2.4
Melaka	1,600	788,972	5.2	3.4	8.0
Negeri Sembilan	1,529	975,602	3.8	2.5	5.6
Pahang	1,641	1,387,621	4.2	3.1	5.7
Penang	1,788	1,527,315	1.5	0.8	2.6
Perak	1,599	2,243,870	4.4	3.3	5.9
Perlis	1,424	217,069	3.8	2.6	5.4
Selangor	4,101	5,398,672	4.4	3.6	5.2
Terengganu	1,846	1,012,044	3.0	2.3	4.0
Sabah/Labuan	3,208	3,217,431	6.6	5.6	7.9
Sarawak	1,962	2,316,783	5.4	4.2	6.9
WP Kuala Lumpur	911	1,620,013	7.5	5.7	9.8
WP Putrajaya	824	70,529	5.6	4.3	7.4
<b>Location</b>					
Urban	16,372	19,496,298	4.3	3.9	4.8
Rural	12,126	7,782,659	5.6	5.0	6.3
<b>Sex</b>					
Male	13,757	13,959,955	3.9	3.5	4.3
Female	14,741	13,319,001	5.5	5.0	6.0
<b>Age Group</b>					
0-4	2,772	2,366,121	2.6	2.0	3.5
5-9	2,904	2,596,837	2.8	2.1	3.8
10-14	2,926	2,639,932	3.3	2.3	4.5
15-19	2,450	2,746,005	3.9	3.1	4.9
20-24	2,108	2,712,661	5.2	4.0	6.7
25-29	2,101	2,605,575	4.5	3.5	5.8
30-34	1,885	2,065,596	4.9	3.9	6.2
35-39	1,799	1,844,496	3.5	2.6	4.6
40-44	1,844	1,725,055	5.4	4.3	6.7
45-49	1,801	1,570,079	5.1	4.0	6.4
50-54	1,681	1,313,353	6.2	5.0	7.7
55-59	1,463	1,027,597	7.3	5.5	9.5
60-64	997	772,562	7.3	5.6	9.4
65-69	673	499,048	7.3	5.1	10.3
70-74	538	368,196	11.5	8.3	15.8
75+	556	425,843	13.1	9.8	17.1
<b>Ethnicity</b>					
Malay	16,975	14,253,318	4.6	4.1	5.0
Chinese	4,944	6,332,970	2.6	2.0	3.3
Indians	2,122	1,834,300	7.8	6.3	9.7
Other Bumiputera	2,933	3,300,636	7.4	6.3	8.6
Others	1,524	1,557,733	4.5	3.0	6.7

Socio demographic characteristics	n	Estimated population	%	95% CI	
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	28,498	27,278,956	4.7	4.3	5.0
<b><i>Marital status<sup>1</sup></i></b>					
Single	6,983	7,908,495	4.0	3.4	4.7
Married	12,537	11,676,560	5.6	5.1	6.2
Widow/widower/divorcee	1,470	1,072,354	10.1	8.3	12.2
<b><i>Education Level</i></b>					
Primary	8,065	7,159,469	5.0	4.4	5.7
Secondary	9,013	9,232,062	4.8	4.3	5.5
Tertiary	3,873	4,255,316	3.9	3.2	4.8
No formal education	1,559	1,218,847	9.1	7.4	11.1
Unclassified	1,675	1,627,575	3.5	2.2	5.5
<b><i>Occupation<sup>1</sup></i></b>					
Government/Semi government	2,148	1,811,075	5.5	4.3	7.1
Private	5,843	7,001,658	4.5	3.8	5.3
Self-employed	3,686	3,358,458	4.6	3.8	5.6
Unpaid worker	3,224	2,758,938	6.2	5.2	7.3
Retiree	1,738	1,330,270	9.7	8.0	11.8
<b><i>Household Income (RM)</i></b>					
Less than RM400	2,166	2,016,214	5.2	4.1	6.7
RM400 – RM499	448	415,901	4.4	2.6	7.2
RM500 – RM699	1,141	941,916	5.4	3.9	7.5
RM700 – RM999	1,865	1,655,090	6.2	4.8	7.9
RM1000 – RM1999	5,927	5,096,306	4.9	4.2	5.8
RM2000 – RM2999	4,797	4,593,572	4.3	3.6	5.2
RM3000 – RM3999	3,704	3,688,019	4.4	3.6	5.4
RM4000 – RM4999	2,484	2,659,738	5.1	4.0	6.6
RM5000 and above	5,966	6,212,201	3.9	3.2	4.8

<sup>1</sup>not including "missing/not applicable"

**Table 1.6: Load of Illness: Severe/persistent vomiting**

Socio demographic characteristics	n	Estimated population	%	95% CI	
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	28,498	27,278,956	1.7	1.5	1.9
<b>State</b>					
Johor	2,469	3,198,775	2.9	2.2	3.8
Kedah	1,700	1,836,622	0.3	0.1	0.6
Kelantan	1,896	1,467,639	0.5	0.3	0.8
Melaka	1,600	788,972	1.6	0.9	3.0
Negeri Sembilan	1,529	975,602	1.0	0.5	1.9
Pahang	1,641	1,387,621	1.6	0.9	2.7
Penang	1,788	1,527,315	1.0	0.4	2.8
Perak	1,599	2,243,870	1.3	0.8	2.0
Perlis	1,424	217,069	1.3	0.7	2.2
Selangor	4,101	5,398,672	1.6	1.2	2.1
Terengganu	1,846	1,012,044	1.4	0.9	2.0
Sabah/Labuan	3,208	3,217,431	1.6	1.1	2.4
Sarawak	1,962	2,316,783	2.5	1.9	3.4
WP Kuala Lumpur	911	1,620,013	2.7	1.6	4.7
WP Putrajaya	824	70,529	2.0	1.2	3.4
<b>Location</b>					
Urban	16,372	19,496,298	4.3	3.9	4.8
Rural	12,126	7,782,659	5.6	5.0	6.3
<b>Sex</b>					
Male	13,757	13,959,955	1.2	1.0	1.5
Female	14,741	13,319,001	2.1	1.8	2.5
<b>Age Group</b>					
0-4	2,772	2,366,121	3.8	3.0	4.8
5-9	2,904	2,596,837	2.0	1.4	2.7
10-14	2,926	2,639,932	1.7	1.1	2.8
15-19	2,450	2,746,005	1.2	0.8	1.8
20-24	2,108	2,712,661	2.1	1.4	3.3
25-29	2,101	2,605,575	1.3	0.8	2.0
30-34	1,885	2,065,596	2.3	1.6	3.3
35-39	1,799	1,844,496	0.9	0.5	1.5
40-44	1,844	1,725,055	0.8	0.4	1.6
45-49	1,801	1,570,079	0.9	0.5	1.8
50-54	1,681	1,313,353	0.7	0.4	1.3
55-59	1,463	1,027,597	1.3	0.8	2.3
60-64	997	772,562	0.7	0.3	1.8
65-69	673	499,048	0.5	0.2	1.2
70-74	538	368,196	2.2	1.2	3.9
75+	556	425,843	2.1	1.1	3.9
<b>Ethnicity</b>					
Malay	16,975	14,253,318	1.6	1.4	1.9
Chinese	4,944	6,332,970	1.1	0.8	1.5
Indians	2,122	1,834,300	2.1	1.5	3.0
Other Bumiputera	2,933	3,300,636	2.3	1.7	3.1
Others	1,524	1,557,733	2.2	1.1	4.2

Socio demographic characteristics	n	Estimated population	%	95% CI	
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	28,498	27,278,956	1.7	1.5	1.9
<b>Marital status<sup>1</sup></b>					
Single	6,983	7,908,495	1.4	1.1	1.9
Married	12,537	11,676,560	1.2	1.0	1.5
Widow/widower/divorcee	1,470	1,072,354	1.9	1.3	3.0
<b>Education Level</b>					
Primary	8,065	7,159,469	1.3	1.0	1.6
Secondary	9,485	9,704,547	1.4	1.1	1.7
Tertiary	3,873	4,255,316	1.3	0.9	1.8
No formal education	1,675	1,627,575	2.1	1.2	3.8
Unclassified	1,559	1,218,847	2.2	1.4	3.4
<b>Occupation<sup>1</sup></b>					
Government/Semi government	2,148	1,811,075	1.4	0.8	2.2
Private	584	7,001,658	1.6	1.2	2.1
Self-employed	3,686	3,358,458	0.8	0.5	1.2
Unpaid worker	3,224	2,758,938	1.4	0.9	2.0
Retiree	1,738	1,330,270	1.1	0.7	1.8
<b>Household Income (RM)</b>					
Less than RM400	2,166	2,016,214	1.3	0.8	2.0
RM400 – RM499	448	415,901	1.9	0.9	4.1
RM500 – RM699	1,141	941,916	1.3	0.7	2.2
RM700 – RM999	1,865	1,655,090	1.6	1.0	2.6
RM1000 – RM1999	5,927	5,096,306	1.9	1.4	2.6
RM2000 – RM2999	4,797	4,593,572	1.6	1.2	2.2
RM3000 – RM3999	3,704	3,688,019	1.5	1.0	2.1
RM4000 – RM4999	2,484	2,659,738	1.8	1.3	2.5
RM5000 and above	5,966	6,212,201	1.7	1.3	2.3

<sup>1</sup>not including "missing/not applicable"

**Table 1.7: Load of Illness: Unable to eat (only among population < 13 years old)**

Socio demographic characteristics	n	Estimated population	%	95% CI	
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	7,476	6,592,737	2.4	1.9	2.9
<b>State</b>					
Johor	674	759,136	4.3	2.5	7.1
Kedah	438	471,480	1.6	0.4	6.9
Kelantan	556	408,584	0.2	0.02	1.1
Melaka	313	173,544	4.1	1.6	9.8
Negeri Sembilan	373	230,096	2.0	0.5	7.0
Pahang	444	365,102	1.5	0.6	3.5
Penang	402	310,111	1.5	0.5	4.4
Perak	355	506,994	1.4	0.6	3.1
Perlis	321	46,690	0.7	0.2	2.7
Selangor	1,092	1,183,399	1.8	1.2	2.8
Terengganu	549	287,439	1.5	0.7	3.1
Sabah/Labuan	976	931,080	3.3	2.1	4.9
Sarawak	558	596,007	3.9	2.1	7.0
WP Kuala Lumpur	215	302,739	2.1	0.9	4.6
WP Putrajaya	210	20,336	3.6	1.8	7.3
<b>Location</b>					
Urban	4,204	4,492,417	0.5	0.4	0.7
Rural	3,272	2,100,320	0.7	0.5	0.9
<b>Sex</b>					
Male	3,803	3,392,769	0.5	0.4	0.7
Female	3,673	3,199,968	0.6	0.5	0.8
<b>Age Group</b>					
0-4	2,772	2,366,121	3.3	2.5	4.3
5-9	2,904	2,596,837	2.0	1.5	2.8
10-12	1,800	1,629,779	1.6	1.0	2.4
<b>Ethnicity</b>					
Malay	4,844	3,791,740	0.5	0.4	0.7
Chinese	961	1,183,959	1.2	0.6	2.4
Indians	440	382,103	5.3	2.7	10.1
Other Bumiputera	919	1,006,492	3.7	2.5	5.6
Others	312	228,443	2.8	1.1	7
<b>Education Level</b>					
Primary	83	92,099	0.3	0.1	1.5
Secondary	2,533	2,247,012	0.6	0.4	0.8
Tertiary	-	-	-	-	-
No formal education	-	-	-	-	-
Unclassified	1,019	940,423	1.0	0.5	2.0
N/A	3,841	3,313,202	3.1	2.4	4.0

<sup>1</sup>not including "missing/not applicable"

**Table 1.8: Load of Illness: Bodily injury**

Socio demographic characteristics	n	Estimated population	%	95% CI	
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	28,498	27,278,956	1.7	1.5	1.9
<b>State</b>					
Johor	2,469	3,198,775	3.0	2.3	3.9
Kedah	1,700	1,836,622	0.8	0.4	1.4
Kelantan	1,896	1,467,639	0.3	0.2	0.7
Melaka	1,600	788,972	1.7	1.0	2.9
Negeri Sembilan	1,529	975,602	0.9	0.5	1.6
Pahang	1,641	1,387,621	1.0	0.6	1.7
Penang	1,788	1,527,315	0.3	0.1	0.8
Perak	1,599	2,243,870	1.8	1.2	2.7
Perlis	1,424	217,070	0.8	0.4	1.4
Selangor	4,101	5,398,672	1.3	1.0	1.7
Terengganu	1,846	1,012,044	1.1	0.6	2.0
Sabah/Labuan	3,208	3,217,431	2.8	2.2	3.7
Sarawak	1,962	2,316,783	1.5	1.0	2.3
WP Kuala Lumpur	911	1,620,013	4.0	2.8	5.6
WP Putrajaya	824	70,529	2.5	1.6	3.9
<b>Location</b>					
Urban	16,372	19,496,298	1.5	1.3	1.8
Rural	12,126	7,782,659	2.2	1.9	2.7
<b>Sex</b>					
Male	13,757	13,959,955	2.0	1.7	2.3
Female	14,741	13,319,001	1.5	1.2	1.8
<b>Age Group</b>					
0-4	2,772	2,366,121	2.5	1.8	3.4
5-9	2,904	2,596,837	2.1	1.5	2.8
10-14	2,926	2,639,932	2.4	1.8	3.4
15-19	2,450	2,746,005	3.6	2.8	4.6
20-24	2,108	2,712,661	1.6	1.1	2.4
25-29	2,101	2,605,575	1.2	0.7	2
30-34	1,885	2,065,596	1.5	1	2.3
35-39	1,799	1,844,496	0.5	0.3	1
40-44	1,844	1,725,055	0.7	0.4	1.3
45-49	1,801	1,570,079	1.3	0.7	2.6
50-54	1,681	1,313,353	0.7	0.3	1.3
55-59	1,463	1,027,597	1.5	0.7	3.3
60-64	997	772,562	1.1	0.6	2.3
65-69	673	499,048	0.6	0.2	2
70-74	538	368,196	1.4	0.7	2.7
75+	556	425,843	1.4	0.7	2.5
<b>Ethnicity</b>					
Malay	16,975	14,253,318	1.7	1.5	2.0
Chinese	4,944	6,332,970	1.0	0.7	1.4
Indians	2,122	1,834,300	2.4	1.6	3.5
Other Bumiputera	2,933	3,300,636	2.9	2.3	3.8
Others	1,524	1,557,733	-	-	-

Socio demographic characteristics	n	Estimated population	%	95% CI	
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	28,498	27,278,956	1.7	1.5	1.9
<b><i>Marital status<sup>1</sup></i></b>					
Single	6,983	7,908,495	2.4	2.0	2.9
Married	12,537	11,676,560	1.0	0.8	1.2
Widow/widower/divorcee	1,470	1,072,354	-	-	-
<b><i>Education Level</i></b>					
Primary	1,559	1,218,847	1.5	0.8	2.5
Secondary	8,065	7,159,469	1.9	1.6	2.4
Tertiary	9,485	9,704,547	1.5	1.2	1.9
No formal education	3,873	4,255,316	1.3	0.9	1.8
Unclassified	1,675	1,627,575	2.1	1.5	3.2
N/A	3,841	3,313,202	2.3	1.7	3.1
<b><i>Occupation<sup>1</sup></i></b>					
Government/Semi government	2,148	1,811,075	1.2	0.7	2.1
Private	5,843	7,001,658	1.6	1.2	2.0
Self-employed	41	51,167	1.5	1.0	2.4
Unpaid worker	3,224	2,758,938	0.7	0.4	1.2
Retiree	1,738	1,330,270	1.2	0.7	1.9
<b><i>Household Income (RM)</i></b>					
Less than RM400	2,166	2,016,214	1.9	1.2	3.0
RM400 – RM499	448	415,901	3.1	1.3	7.3
RM500 – RM699	1,141	941,916	1.4	0.8	2.6
RM700 – RM999	1,865	1,655,090	1.7	1.1	2.8
RM1000 – RM1999	5,927	5,096,306	1.4	1.1	1.8
RM2000 – RM2999	4,797	4,593,572	1.6	1.2	2.0
RM3000 – RM3999	3,704	3,688,019	1.9	1.4	2.6
RM4000 – RM4999	2,484	2,659,738	2.1	1.5	2.9
RM5000 and above	5,966	6,212,201	1.8	1.4	2.2

<sup>1</sup>not including "missing/not applicable"

**Table 1.9: Load of Illness: Severe pain in the chest/stomach region (Adult: 13 years old and above)**

Socio demographic characteristics	n	Estimated population	%	95% CI	
				(Prevalence)	Lower
<b>MALAYSIA</b>	21,022	20,686,219	4.8	4.4	5.3
<b>State</b>					
Johor	1,795	2,439,639	7.1	5.8	8.7
Kedah	1,262	1,365,142	3.7	2.6	5.4
Kelantan	1,340	1,059,055	1.4	0.8	2.2
Melaka	1,287	615,428	3.0	2.0	4.4
Negeri Sembilan	1,156	745,506	4.2	2.7	6.5
Pahang	1,197	1,022,519	3.7	2.2	6.2
Penang	1,386	1,217,204	2.3	1.4	3.7
Perak	1,244	1,736,875	3.7	2.6	5.3
Perlis	1,103	170,379	-	-	-
Selangor	3,009	4,215,273	4.3	3.5	5.2
Terengganu	1,297	724,605	2.7	2.0	3.7
Sabah/Labuan	2,232	2,286,351	8.2	6.7	10.1
Sarawak	1,404	1,720,776	4.9	3.4	7.0
WP Kuala Lumpur	696	1,317,274	7.7	5.7	10.4
WP Putrajaya	614	50,193	9.8	8.1	11.9
<b>Location</b>					
Urban	12,168	15,003,881	4.4	3.9	4.9
Rural	8,854	5,682,339	6.1	5.3	7.0
<b>Sex</b>					
Male	9,954	10,567,186	4.3	3.8	4.8
Female	11,068	10,119,034	5.5	4.9	6.1
<b>Age Group</b>					
10-14	1,126	1,010,153	4.6	3.1	6.7
15-19	2,450	2,746,005	4.8	3.9	6.0
20-24	2,108	2,712,661	5.2	4.0	6.6
25-29	2,101	2,605,575	3.7	2.8	4.9
30-34	1,885	2,065,596	4.7	3.8	5.9
35-39	1,799	1,844,496	3.4	2.6	4.5
40-44	1,844	1,725,055	5.2	4.0	6.7
45-49	1,801	1,570,079	5.1	4.0	6.5
50-54	1,681	1,313,353	5.1	3.9	6.6
55-59	1,463	1,027,597	5.1	3.7	6.8
60-64	997	772,562	5.6	4.1	7.6
65-69	673	499,048	7.5	5.1	10.9
70-74	538	368,196	5.8	4.0	8.4
75+	556	425,843	7.6	5.4	10.6
<b>Ethnicity</b>					
Malay	12,131	10,461,578	4.7	4.2	5.2
Chinese	3,983	5,149,011	3.3	2.7	4.2
Indians	1,682	1,452,197	6.4	5.1	7.9
Other Bumiputera	2,014	2,294,145	8.1	6.4	10.1
Others	1,212	1,329,289	4.9	3.3	7.4
<b>Marital status</b> <sup>1</sup>					
Single	6,983	7,908,495	4.6	3.9	5.3
Married	12,537	11,676,560	4.9	4.3	5.4
Widow/widower/divorcee	1,470	1,072,354	6.8	5.4	8.6



Socio demographic characteristics	n	Estimated population	%	95% CI	
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	21,022	20,686,219	4.8	4.4	5.3
<b>Education Level</b>					
Primary	1,476	1,126,748	6.6	5.0	8.6
Secondary	5,532	4,912,457	5.5	4.7	6.4
Tertiary	9,485	9,704,547	4.7	4.2	5.4
No formal education	3,873	4,255,316	4.1	3.4	4.9
Unclassified	656	687,152	3.3	2	5.2
<b>Occupation<sup>1</sup></b>					
Government/Semi government	2,148	1,811,075	4.7	3.5	6.1
Private	5,843	7,001,658	4.8	4.1	5.6
Self-employed	3,686	3,358,458	4.2	3.4	5.1
Unpaid worker	3,224	2,758,938	4.7	3.8	5.8
Retiree	1,738	1,330,270	7.2	5.8	9.0
<b>Household Income (RM)</b>					
Less than RM400	1,497	1,390,277	5.7	4.4	7.5
RM400 – RM499	319	280,410	7.6	4.7	12
RM500 – RM699	826	695,852	5.6	3.6	8.7
RM700 – RM999	1,375	1,228,009	5.2	3.8	7.1
RM1000 – RM1999	4,327	3,850,556	5.0	4.2	6.1
RM2000 – RM2999	3,557	3,462,693	4.5	3.7	5.5
RM3000 – RM3999	2,783	2,844,775	4.8	3.8	6.1
RM4000 – RM4999	1,890	2,119,275	4.4	3.4	5.8
RM5000 and above	4,448	4,814,372	4.5	3.8	5.4

<sup>1</sup>not including "missing/not applicable"

**Table 1.10: Load of Illness: Sudden dizziness (Adult: 13 years old and above)**

Socio demographic characteristics	n	Estimated population	%	95% CI	
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	21,022	20,686,219	12.4	11.6	13.1
<b>State</b>					
Johor	1,795	2,439,639	18.6	15.9	21.6
Kedah	1,262	1,365,142	12.2	9.3	16.0
Kelantan	1,340	10,590,545	2.6	1.8	3.8
Melaka	1,287	615,428	9.4	7.8	11.4
Negeri Sembilan	1,156	745,506	9.9	7.2	13.5
Pahang	1,197	1,022,519	11.1	8.5	14.3
Penang	1,386	1,217,204	5.8	4.3	7.8
Perak	1,244	1,736,875	11.0	9.1	13.1
Perlis	1,103	170,379	9.4	7.0	12.5
Selangor	3,009	4,215,273	10.6	9.1	12.3
Terengganu	1,297	724,606	7.2	5.4	9.5
Sabah/Labuan	2,232	2,286,351	19.1	16.5	22.0
Sarawak	1,404	1,720,771	13.3	11.0	16.0
WP Kuala Lumpur	696	1,317,274	15.8	12.3	20.1
WP Putrajaya	614	50,193	26.5	23.0	30.4
<b>Location</b>					
Urban	12,168	15,003,881	11.5	10.7	12.4
Rural	8,854	5,682,339	14.6	13.2	16.1
<b>Sex</b>					
Male	9,954	10,567,186	9.3	8.4	10.2
Female	11,068	10,119,034	15.6	14.6	16.7
<b>Age Group</b>					
10-14	1,126	1,010,153	10.1	8.1	12.6
15-19	2,450	2,746,005	13.7	11.9	15.8
20-24	2,108	2,712,661	14.0	11.7	16.6
25-29	2,101	2,605,575	12.4	10.6	14.5
30-34	1,885	2,065,596	13.3	11.7	15.2
35-39	1,799	1,844,496	11.0	9.4	12.8
40-44	1,844	1,725,055	11.7	10.1	13.5
45-49	1,801	1,570,079	12.0	10.1	14.1
50-54	1,681	1,313,353	11.8	10.0	13.8
55-59	1,463	1,027,597	10.0	8.2	12.1
60-64	997	772,562	10.7	8.5	13.4
65-69	673	499,048	11.4	8.5	15.2
70-74	538	368,196	14.6	10.8	19.4
75+	556	425,843	13.0	10.0	16.9
<b>Ethnicity</b>					
Malay	12,131	10,461,578	13.1	12.1	14.2
Chinese	3,983	5,149,011	6.8	5.9	7.9
Indians	1,682	1,452,197	13.6	11.3	16.3
Other Bumiputera	2,014	2,294,145	19.2	16.6	22.0
Others	1,212	1,329,289	14.6	11.1	19.1
<b>Marital status<sup>1</sup></b>					
Single	6,983	7,908,495	12.1	11.0	13.4
Married	12,537	11,676,560	12.3	11.5	13.2
Widow/widower/divorcee	1,470	1,072,354	14.6	12.5	17.0

Socio demographic characteristics	n	Estimated population	%	95% CI	
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	21,022	20,686,219	12.4	11.6	13.1
<b>Education Level</b>					
Primary	1,476	1,126,748	14.4	12.2	16.8
Secondary	5,532	4,912,457	13.7	12.3	15.1
Tertiary	9,485	9,704,547	12.0	11.0	13.0
No formal education	3,873	4,255,316	11.3	10.1	12.6
Unclassified	656	687,152	12.1	9.2	15.8
<b>Occupation<sup>1</sup></b>					
Government/Semi government	2,148	1,811,075	12.3	10.5	14.3
Private	5,843	7,001,658	12.6	11.2	14.0
Self-employed	3,686	3,358,458	10.8	9.5	12.3
Unpaid worker	3,224	2,758,938	15.5	13.8	17.3
Retiree	1,738	1,330,270	10.4	8.6	12.5
<b>Household Income (RM)</b>					
Less than RM400	1,497	1,390,277	12.7	10.5	15.3
RM400 – RM499	319	280,410	11.7	7.8	17.0
RM500 – RM699	826	695,852	11.6	9.1	14.6
RM700 – RM999	1,375	1,228,009	14.5	12.0	17.5
RM1000 – RM1999	4,327	3,850,556	12.8	11.3	14.4
RM2000 – RM2999	3,557	3,462,693	12.8	11.1	14.7
RM3000 – RM3999	2,783	2,844,775	11.6	9.9	13.6
RM4000 – RM4999	1,890	2,119,275	11.3	9.3	13.6
RM5000 and above	4,448	4,814,372	12.1	10.8	13.5

<sup>1</sup>not including "missing/not applicable"

**Table 1.11: Load of Illness: Other health problems**

Socio demographic characteristics	n	Estimated population	%		
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	28,498	27,278,956	24.9	23.8	25.9
<b>State</b>					
Johor	2,469	3,198,775	32.0	28.7	35.4
Kedah	1,700	1,836,622	22.1	18.1	26.5
Kelantan	1,896	1,467,639	12.0	9.7	14.7
Melaka	1,600	788,972	22.3	18.6	26.5
Negeri Sembilan	1,529	975,602	22.5	18.5	27.1
Pahang	1,641	1,387,621	19.5	16.4	23.0
Penang	1,788	1,527,315	14.7	12.7	16.9
Perak	1,599	2,243,870	33.4	30.4	36.6
Perlis	1,424	217,069	18.9	16.1	22.0
Selangor	4,101	5,398,672	21.1	18.7	23.8
Terengganu	1,846	1,012,044	13.9	12.0	16.2
Sabah/Labuan	3,208	3,217,431	32.8	29.3	36.4
Sarawak	1,962	2,316,783	21.5	18.4	25.1
WP Kuala Lumpur	911	1,620,013	38.9	34.3	43.6
WP Putrajaya	824	70,529	46.7	43.2	50.2
<b>Location</b>					
Urban	16,372	19,496,298	24.1	22.9	25.4
Rural	12,126	7,782,659	26.7	25.0	28.5
<b>Sex</b>					
Male	13,757	13,959,955	23.1	21.9	24.4
Female	14,741	13,319,001,	26.7	25.4	27.9
<b>Age Group</b>					
0-4	2,772	2,366,121	32.7	30.2	35.4
5-9	2,904	2,596,837	24.2	21.9	26.6
10-14	2,926	2,639,932	21.8	19.8	23.8
15-19	2,450	2,746,005	27.7	25.2	30.3
20-24	2,108	2,712,661	27.5	24.7	30.5
25-29	2,101	2,605,575	23.0	20.5	25.8
30-34	1,885	2,065,596	24.9	22.5	27.4
35-39	1,799	1,844,496	21.0	18.7	23.5
40-44	1,844	1,725,055	24.2	21.7	26.8
45-49	1,801	1,570,079	24.6	22.0	27.3
50-54	1,681	1,313,353	22.0	19.5	24.7
55-59	1,463	1,027,597	21.2	18.4	24.2
60-64	997	772,562	25.0	21.5	28.8
65-69	673	499,048	20.1	16.2	24.7
70-74	538	368,196	20.5	16.6	25.1
75+	556	425,843	28.7	24.1	33.8
<b>Ethnicity</b>					
Malay	16,975	14,253,318	25.9	24.6	27.2
Chinese	4,944	6,332,970	18.7	17.2	20.4
Indians	2,122	1,834,300	30.7	27.0	34.8
Other Bumiputera	2,933	3,300,636	31.4	28.2	34.9
Others	1,524	1,557,733	19.6	15.8	24.0

Socio demographic characteristics	n	Estimated population	%	95% CI	
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	28,498	27,278,956	24.9	23.8	25.9
<b><i>Marital status</i><sup>1</sup></b>					
Single	6,983	7,908,495	25.3	23.7	27.0
Married	12,537	11,676,560	23.8	22.5	25.1
Widow/widower/divorcee	1,470	1,072,354	25.1	22.4	28.1
<b><i>Education Level</i></b>					
Primary	1,559	1,218,847	24.3	21.4	27.3
Secondary	8,065	7,159,469	22.4	21.0	23.8
Tertiary	9,485	9,704,547	23.7	22.2	25.2
No formal education	3,873	4,255,316	27.4	25.2	29.6
Unclassified	1,675	1,627,575	23.9	20.8	27.3
N/A	3,841	3,313,202	31.2	29.0	33.5
<b><i>Occupation</i><sup>1</sup></b>					
Government/Semi government	2,148	1,811,075	28.0	25.5	30.7
Private	5,843	7,001,658	24.9	23.1	26.7
Self-employed	3,686	3,358,458	21.0	18.8	23.4
Unpaid worker	3,224	2,758,938	24.5	22.5	26.6
Retiree	1,738	1,330,270	23.4	20.8	26.2
<b><i>Household Income (RM)</i></b>					
Less than RM400	2,166	2,016,214	22.2	19.7	24.8
RM400 – RM499	448	415,901	21.2	15.5	28.3
RM500 – RM699	1,141	941,916	27.2	23.3	31.5
RM700 – RM999	1,865	1,655,090	22.5	19.7	25.6
RM1000 – RM1999	5,927	5,096,306	23.3	21.3	25.5
RM2000 – RM2999	4,797	4,593,572	26.1	24.0	28.3
RM3000 – RM3999	3,704	3,688,019	26.2	23.8	28.7
RM4000 – RM4999	2,484	2,659,738	26.1	23.4	29.0
RM5000 and above	5,966	6,212,201	25.3	23.3	27.4

<sup>1</sup>not including "missing/not applicable"

**Table 1.12: Health Problem: Heart Disease**

Socio demographic characteristics	n	Estimated population	%	95% CI	
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	28,498	27,219,150	2.1	1.9	2.4
<b>State</b>					
Johor	2,465	3,193,461	2.6	1.9	3.4
Kedah	1,696	1,832,577	2.8	1.9	4.1
Kelantan	1,895	1,466,974	1.5	1.1	2.2
Melaka	1,596	787,842	3.1	1.8	5.3
Negeri Sembilan	1,528	975,011	2.8	1.9	4.1
Pahang	1,637	1,384,305	2.0	1.4	2.8
Penang	1,786	1,526,221	1.3	0.8	2.2
Perak	1,592	2,232,630	3.4	2.6	4.5
Perlis	1,423	216,943	2.0	1.3	3.1
Selangor	4,090	5,380,492	2.0	1.3	3.1
Terengganu	1,844	1,011,052	1.9	1.5	2.4
Sabah/Labuan	3,206	3,216,421	2.0	1.3	3.1
Sarawak	1,952	2,304,999	1.5	1.1	2.3
WP Kuala Lumpur	911	1,620,013	1.7	1.2	2.6
WP Putrajaya	820	70,208	1.9	1.2	2.9
<b>Location</b>					
Urban	16,343	19,459,100	2.1	1.8	2.3
Rural	12,098	7,760,050	2.4	2.0	2.7
<b>Sex</b>					
Male	13,728	13,929,991	2.3	2.0	2.7
Female	14,713	13,289,159	1.9	1.7	2.2
<b>Age Group</b>					
0-4	2,768	2,362,867	0.7	0.4	1.3
5-9	2,904	2,596,837	0.7	0.3	1.5
10-14	2,921	2,634,675	0.6	0.4	1.1
15-19	2,445	2,740,593	0.6	0.3	1.0
20-24	2,101	2,702,900	0.7	0.4	1.3
25-29	2,097	2,601,324	1.2	0.7	2.0
30-34	1,881	2,059,085	1.0	0.6	1.7
35-39	1,797	1,841,738	1.3	0.8	2.2
40-44	1,840	1,719,962	2.5	1.7	3.6
45-49	1,798	1,567,953	2.2	1.6	3.1
50-54	1,679	1,309,687	4.0	3.1	5.1
55-59	1,459	1,026,827	5.7	4.3	7.5
60-64	995	770,788	9.6	7.4	12.3
65-69	671	495,095	11.6	8.5	15.7
70-74	535	365,941	10.2	7.6	13.5
75+	550	422,879	14.7	10.9	19.6
<b>Ethnicity</b>					
Malay	16,935	14,216,837	2.3	2.0	2.6
Chinese	4,933	6,320,885	1.7	1.4	2.2
Indians	2,122	1,834,300	4.6	3.6	5.8
Other Bumiputera	2,930	3,297,126	1.7	1.2	2.4
Others	1,521	1,550,003	0.8	0.3	0.17

Socio demographic characteristics	n	Estimated population	%	95% CI	
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	28,498	27,219,150	2.1	1.9	2.4
<b>Marital status<sup>1</sup></b>					
Single	6,976	7,894,747	0.8	0.6	1.1
Married	12,516	11,652,648	3.1	2.8	3.5
Widow/widower/divorcee	1,466	1,071,257	10.1	8.1	12.5
<b>Education Level</b>					
Primary	1,553	1,215,346	6.3	4.9	8.2
Secondary	8,057	7,153,399	2.8	2.4	3.3
Tertiary	9,477	9,691,589	2.0	1.7	2.4
No formal education	3,872	4,255,190	1.7	1.3	2.2
Unclassified	1,645	1,593,678	0.8	0.4	0.8
N/A	3,837	3,309,948	0.7	0.4	0.7
<b>Occupation<sup>1</sup></b>					
Government/Semi government	2,147	1,809,011	2.3	1.6	3.3
Private	5,839	6,994,019	1.7	1.3	2.1
Self-employed	3,682	3,355,398	2.1	1.7	2.6
Unpaid worker	3,221	2,756,579	3.2	2.5	4.1
Retiree	1,728	1,323,214,	11.4	9.5	13.6
<b>Household Income (RM)</b>					
Less than RM400	2,159	2,009,391	3.5	2.6	4.6
RM400 – RM499	447	415,102	3.5	2.0	6.2
RM500 – RM699	1,136	935,373	1.7	1.0	2.8
RM700 – RM999	1,860	1,651,359	2.7	1.9	3.8
RM1000 – RM1999	5,914	5,085,594	2.3	1.9	2.8
RM2000 – RM2999	4,787	4,583,247	2.1	1.7	2.6
RM3000 – RM3999	3,698	3,676,396	2.1	1.5	2.9
RM4000 – RM4999	2,479	2,655,051	1.4	1.0	2.0
RM5000 and above	5,961	6,207,638	1.8	1.4	2.2

<sup>1</sup>not including "missing/not applicable"

**Table 1.13: Health Problem: Stroke**

Socio demographic characteristics	n	Estimated population	%	95% CI	
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	20,966	20,619,067	0.7	0.6	0.9
<b>State</b>					
Johor	1,791	2,433,822	0.6	0.3	1.2
Kedah	1,258	1,360,015	1.1	0.6	1.9
Kelantan	1,338	1,057,260	0.5	0.2	1.1
Melaka	1,285	614,508	1.1	0.6	1.9
Negeri Sembilan	1,155	744,915	1.1	0.6	1.8
Pahang	1,191	1,017,539	0.5	0.3	0.9
Penang	1,384	1,216,110	0.8	0.3	2.5
Perak	1,235	1,721,611	1.0	0.6	1.7
Perlis	1,101	170,094	1.2	0.6	2.4
Selangor	3,000	4,198,427	0.5	0.3	0.9
Terengganu	1,296	724,016	0.7	0.4	1.3
Sabah/Labuan	2,229	2,284,869	0.3	0.1	0.6
Sarawak	1,396	1,708,639	0.8	0.5	1.3
WP Kuala Lumpur	696	1,317,274	1.0	0.4	2.7
WP Putrajaya	611	49,969	0.2	0.1	0.9
<b>Location</b>					
Urban	12,138	14,961,907	0.7	0.5	0.9
Rural	8,828	5,657,161	0.8	0.6	1.0
<b>Sex</b>					
Male	9,921	10,531,458	0.8	0.6	1.1
Female	11,045	10,087,609	0.6	0.4	0.7
<b>Age Group</b>					
10-14	1,118	1,001,345	0.2	0.04	1.0
15-19	2,443	2,737,931	0.03	0.0	0.2
20-24	2,100	2,702,427	0.2	0.1	0.6
25-29	2,096	2,600,266	0.02	0.0	0.1
30-34	1,881	2,059,085	-	-	-
35-39	1,797	1,842,218	0.2	0.1	0.6
40-44	1,840	1,719,962	0.6	0.2	1.5
45-49	1,798	1,567,953	0.9	0.4	1.9
50-54	1,677	1,306,589	1.0	0.6	1.9
55-59	1,459	1,026,123	1.7	1.1	2.7
60-64	996	771,453	2.0	1.1	3.6
65-69	671	495,095	3.0	2.0	4.6
70-74	535	363,739	3.5	2.1	5.8
75+	555	424,882	7.8	5.3	11.4
<b>Ethnicity</b>					
Malay	12,090	10,421,385	0.7	0.6	0.9
Chinese	3,973	5,133,862	0.9	0.6	1.3
Indians	1,682	1,452,197	0.4	0.2	0.8
Other Bumiputera	2,012	2,290,065	0.7	0.4	1.1
Others	1,209	1,321,559	0.0	0.0	0.1



Socio demographic characteristics	n	Estimated population	%	95% CI	
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	20,966	20,619,067	0.7	0.6	0.9
<b><i>Marital status<sup>1</sup></i></b>					
Single	6,970	7,887,427	0.1	0.1	0.3
Married	12,515	11,647,637	0.9	0.7	1.1
Widow/widower/divorcee	1,470	1,072,354	2.5	1.7	3.6
<b><i>Education Level</i></b>					
Primary	1,473	1,120,906	2.3	1.6	3.3
Secondary	5,523	4,901,801	1.4	1.1	1.9
Tertiary	9,475	9,690,957	0.4	0.2	0.6
No formal education	3,869	4,251,035	0.2	0.1	0.5
Unclassified	626	654,369	0.8	0.4	1.7
<b><i>Occupation<sup>1</sup></i></b>					
Government/Semi government	2,146	1,807,932	0.2	0.1	0.5
Private	5,838	6,991,582	0.2	0.1	0.5
Self-employed	3,681	3,354,861	0.4	0.3	0.7
Unpaid worker	3,222	2,756,947	0.4	0.2	0.8
Retiree	1,732	1,322,512	4.4	3.2	5.9
<b><i>Household Income (RM)</i></b>					
Less than RM400	1,491	1,380,978	1.2	0.6	2.3
RM400 – RM499	318	279,527	1.2	0.4	3.2
RM500 – RM699	820	688,528	0.5	0.2	1.2
RM700 – RM999	1,370	1,223,719	1.1	0.6	1.8
RM1000 – RM1999	4,317	3,839,256	0.8	0.5	1.2
RM2000 – RM2999	3,547	3,453,406	0.9	0.5	1.5
RM3000 – RM3999	2,777	2,833,152	0.5	0.3	0.9
RM4000 – RM4999	1,882	2,111,189	0.8	0.4	1.4
RM5000 and above	4,444	4,809,314	0.3	0.2	0.6

<sup>1</sup>not including "missing/not applicable"

**Table 1.14: Health Problem: Asthma**

Socio demographic characteristics	n	Estimated population	%	95% CI	
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	28,440	27,209,959	6.4	5.9	6.8
<b>State</b>					
Johor	2,465	3,193,160	6.3	5.0	7.8
Kedah	1,696	1,832,566	5.1	3.7	6.9
Kelantan	1,896	1,467,639	5.9	4.6	7.6
Melaka	1,598	788,052	7.4	5.8	9.4
Negeri Sembilan	1,528	975,011	7.8	6.0	9.9
Pahang	1,635	1,382,857	6.2	4.8	8.0
Penang	1,786	1,526,221	3.5	2.5	4.9
Perak	1,591	2,231,914	7.4	6.0	9.0
Perlis	1,423	216,943	5.3	4.1	6.9
Selangor	4,090	5,379,780	5.9	5.1	6.8
Terengganu	1,844	1,011,052	6.2	4.7	8.0
Sabah/Labuan	3,205	3,215,208	7.1	5.8	8.8
Sarawak	1,954	2,301,089	6.6	5.3	8.2
WP Kuala Lumpur	910	1,618,298	8.1	5.8	11.2
WP Putrajaya	819	70,170	10.4	8.5	12.8
<b>Location</b>					
Urban	16,340	19,455,648	6.2	5.7	6.8
Rural	12,100	7,754,311	6.7	6.0	7.4
<b>Sex</b>					
Male	13,726	13,923,336	6.3	5.7	6.9
Female	14,714	13,286,623	6.4	5.9	7.0
<b>Age Group</b>					
0-4	2,764	2,354,632	5.1	4.2	6.1
5-9	2,903	2,596,121	8.5	7.3	9.8
10-14	2,920	2,633,855	6.9	5.7	8.2
15-19	2,445	2,740,593	8.1	6.6	10.0
20-24	2,100	2,701,184	6.8	5.5	8.3
25-29	2,097	2,601,324	4.7	3.6	6.1
30-34	1,880	2,059,047	5.4	4.3	6.7
35-39	1,798	1,842,377	4.7	3.7	5.9
40-44	1,840	1,719,962	6.1	4.7	7.7
45-49	1,798	1,567,953	4.8	3.7	6.3
50-54	1,678	1,308,971	6.2	4.9	7.8
55-59	1,460	1,026,860	5.9	4.7	7.4
60-64	996	771,453	6.7	5.1	8.9
65-69	671	495,095	6.9	4.9	9.7
70-74	536	366,460	8.0	5.7	11.3
75+	554	424,073	10.7	7.5	15.2
<b>Ethnicity</b>					
Malay	16,933	14,214,453	7.2	6.7	7.8
Chinese	4,934	6,319,419	4.0	3.3	4.9
Indians	2,122	1,834,300	7.6	6.1	9.5
Other Bumiputera	2,931	3,292,999	7.8	6.4	9.6
Others	1,520	1,548,789	3.4	2.4	4.8

Socio demographic characteristics	n	Estimated population	%	95% CI	
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	28,440	27,209,959	6.4	5.9	6.8
<b><i>Marital status</i><sup>1</sup></b>					
Single	6,975	7,893,032	6.6	5.8	7.5
Married	12,519	11,654,656	5.7	5.2	6.2
Widow/widower/divorcee	1,469	1,071,544	7.7	6.2	9.7
<b><i>Education Level</i></b>					
Primary	1,558	1,217,107	6.5	5.1	8.2
Secondary	8,058	7,153,255	6.4	5.8	7.2
Tertiary	9,476	9,691,551	5.7	5.1	6.5
No formal education	3,871	4,253,475	6.8	5.7	8.0
Unclassified	1,644	1,592,858	9.0	7.3	11.1
N/A	3,833	3,301,713	6.2	5.2	7.2
<b><i>Occupation</i><sup>1</sup></b>					
Government/Semi government	2,147	1,809,011	5.9	4.6	7.4
Private	5,838	6,992,905	5.5	4.8	6.3
Self-employed	3,684	3,356,230	5.3	4.0	7.0
Unpaid worker	3,221	2,756,231	6.2	5.2	7.4
Retiree	1,732	1,324,423	8.9	7.2	10.8
<b><i>Household Income (RM)</i></b>					
Less than RM400	2,159	2,007,775	6.7	5.5	8.1
RM400 – RM499	447	410,963	8.2	5.5	11.9
RM500 – RM699	1,136	935,373	6.7	5.2	8.6
RM700 – RM999	1,860	1,651,498	6.0	4.7	7.6
RM1000 – RM1999	5,915	5,084,931	6.5	5.6	7.6
RM2000 – RM2999	4,786	4,581,547	6.9	5.9	8.0
RM3000 – RM3999	3,697	3,675,182	5.9	4.9	7.1
RM4000 – RM4999	2,479	2,655,051	5.4	4.2	6.7
RM5000 and above	5,961	6,207,638	6.3	5.5	7.2

<sup>1</sup>not including "missing/not applicable"

**Table 1.15: Health Problem: Arthritis (13 years old and above)**

Socio demographic characteristics	n	Estimated population	%	95% CI	
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	20,963	20,618,720	4.2	3.8	4.6
<b>State</b>					
Johor	1,791	2,433,822	5.0	4.0	6.3
Kedah	1,257	1,358,271	3.9	2.8	5.4
Kelantan	1,339	1,057,997	0.9	0.5	1.6
Melaka	1,285	614,508	3.0	2.1	4.3
Negeri Sembilan	1,154	744,231	3.7	2.5	5.6
Pahang	1,189	1,016,603	5.0	3.6	6.9
Penang	1,384	1,216,110	3.7	2.6	5.2
Perak	1,234	1,720,440	4.7	3.3	6.6
Perlis	1,102	170,253	2.4	1.6	3.8
Selangor	3,001	4,201,848	4.0	3.2	5.1
Terengganu	1,296	724,016	4.2	3.1	5.7
Sabah/Labuan	2,228	2,283,668	4.8	3.6	6.3
Sarawak	1,396	1,709,711	5.6	4.0	8.0
WP Kuala Lumpur	696	1,317,274	3.6	2.3	5.6
WP Putrajaya	611	49,969	3.2	1.9	5.3
<b>Location</b>					
Urban	12,139	14,964,599	3.8	3.4	4.3
Rural	8,824	5,654,122	5.3	4.5	6.1
<b>Sex</b>					
Male	9,921	10,535,017	4.1	3.6	4.6
Female	11,042	10,083,703	4.3	3.9	4.9
<b>Age Group</b>					
10-14	1,119	1,002,607	0.2	0.0	0.9
15-19	2,442	2,737,626	1.0	0.6	1.6
20-24	2,099	2,701,224	1.2	0.6	2.4
25-29	2,095	2,599,095	1.1	0.7	1.7
30-34	1,880	2,059,657	2.7	1.9	3.7
35-39	1,797	1,841,790	3.7	2.6	5.2
40-44	1,838	1,718,798	4.0	3.0	5.4
45-49	1,798	1,567,953	5.3	4.2	6.6
50-54	1,679	1,309,687	8.3	6.7	10.2
55-59	1,460	1,026,860	9.3	7.4	11.5
60-64	995	769,709	9.8	7.9	12.1
65-69	671	495,095	14.6	11.5	18.5
70-74	535	363,739	16.2	12.7	20.4
75+	555	424,882	21.7	17.6	26.5
<b>Ethnicity</b>					
Malay	557	434,911	4.2	3.7	4.7
Chinese	184	191,640	3.7	3.1	4.5
Indians	116	65,916	4.5	3.5	5.9
Other Bumiputera	141	137,901	6.0	4.6	7.8
Others	40	36,552	2.8	1.6	4.8
<b>Marital status<sup>1</sup></b>					
Single	6,968	7,886,365	1.3	1.0	1.7
Married	12,514	11,648,351	5.4	4.9	6.0
Widow/widower/divorcee	1,470	1,072,354	12.1	10.0	14.5

Socio demographic characteristics	n	Estimated population	%	95% CI	
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	20,963	20,618,720	4.2	3.8	4.6
<b>Education Level</b>					
Primary	1,473	1,120,906	11.0	9.1	13.2
Secondary	5,525	4,903,799	6.2	5.4	7.2
Tertiary	9,473	9,689,209	3.4	2.9	3.9
No formal education	3,867	4,250,786	2.3	1.8	3.0
Unclassified	625	654,021	1.8	0.9	3.2
<b>Occupation<sup>1</sup></b>					
Government/Semi government	2,147	1,810,083	3.7	2.7	5.0
Private	5,837	6,992,618	2.7	2.2	3.3
Self-employed	3,681	3,353,969	5.0	4.0	6.1
Unpaid worker	3,221	2,755,203	5.3	4.5	6.4
Retiree	1,732	1,322,512	15.1	13.1	17.3
<b>Household Income (RM)</b>					
Less than RM400	1,491	1,380,978	6.1	4.6	8.1
RM400 – RM499	318	279,527	4.8	2.6	9.0
RM500 – RM699	820	688,528	4.3	3.1	5.9
RM700 – RM999	1,371	1,224,455	5.1	3.8	6.7
RM1000 – RM1999	4,314	3,836,826	4.4	3.7	5.3
RM2000 – RM2999	3,549	3,454,038	4.2	3.4	5.1
RM3000 – RM3999	2,775	2,831,988	3.7	3.0	4.7
RM4000 – RM4999	1,884	2,113,530	4.6	3.5	6.1
RM5000 and above	4,441	4,808,852	3.3	2.7	4.1

<sup>1</sup>not including "missing/not applicable"

**Table 1.16: Health Problem: Dengue Fever (ever had)**

Socio demographic characteristics	n	Estimated population	%	95% CI	
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	28,254	27,026,434	2.7	2.4	3.1
<b>State</b>					
Johor	2,453	3,174,171	2.5	1.8	3.5
Kedah	1,693	1,829,649	0.3	0.1	0.7
Kelantan	1,884	1,457,426	1.0	0.5	1.7
Melaka	1,579	780,695	1.7	1.0	3.1
Negeri Sembilan	1,503	958,800	4.0	2.9	5.4
Pahang	1,633	1,381,092	1.9	1.3	2.9
Penang	1,774	1,508,051	1.0	0.5	2.3
Perak	1,582	2,218,804	3.8	2.6	5.5
Perlis	1,422	216,783	1.2	0.7	2.1
Selangor	4,049	5,329,850	5.2	4.3	6.3
Terengganu	1,834	1,004,826	1.3	0.8	2.0
Sabah/Labuan	3,190	3,199,080	0.7	0.4	1.1
Sarawak	1,944	2,293,041	1.3	0.5	3.0
WP Kuala Lumpur	902	1,604,631	7.1	5.0	10.0
WP Putrajaya	812	69,535	6.7	5.2	8.6
<b>Location</b>					
Urban	16,223	19,313,232	3.2	2.8	3.7
Rural	12,031	7,713,201	1.5	1.2	1.9
<b>Sex</b>					
Male	13,614	13,807,960	3.3	2.9	3.8
Female	14,640	13,218,473	2.1	1.8	2.5
<b>Age Group</b>					
0-4	2,762	2,353,095	0.4	0.2	0.8
5-9	2,894	2,585,213	0.6	0.4	1.0
10-14	2,905	2,616,009	1.1	0.7	1.7
15-19	2,426	2,718,497	2.6	1.9	3.5
20-24	2,079	2,676,844	4.0	2.9	5.4
25-29	2,072	2,577,966	3.6	2.6	4.9
30-34	1,867	2,045,009	4.3	3.3	5.5
35-39	1,780	1,821,403	4.5	3.4	5.9
40-44	1,825	1,708,153	5.0	3.7	6.6
45-49	1,785	1,559,627	3.7	2.7	5.0
50-54	1,665	1,295,947	3.5	2.4	5.1
55-59	1,447	1,018,281	2.4	1.6	3.6
60-64	989	765,064	1.5	0.8	2.8
65-69	670	494,536	2.2	0.9	5.2
70-74	534	366,085	2.2	0.9	5.5
75+	554	424,705	1.5	0.4	4.9
<b>Ethnicity</b>					
Malay	16,830	14,123,292	3.0	2.6	3.5
Chinese	4,896	6,269,099	3.3	2.7	4.1
Indians	2,101	1,815,651	3.5	2.2	5.4
Other Bumiputera	2,913	3,279,368	0.9	0.4	1.9
Others	1,514	1,539,024	1.0	0.5	2.0

Socio demographic characteristics	n	Estimated population	%	95% CI	
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	28,254	27,026,434	2.7	2.4	3.1
<b><i>Marital status<sup>1</sup></i></b>					
Single	6,912	7,824,833	3.1	2.6	3.8
Married	12,425	11,570,468	3.8	3.3	4.4
Widow/widower/divorcee	1,463	1,067,560	1.8	1.1	2.8
<b><i>Education Level</i></b>					
Primary	1,552	1,210,624	1.2	0.6	2.4
Secondary	8,007	7,101,105	1.6	1.3	2.1
Tertiary	9,406	9,620,010	3.3	2.8	4.0
No formal education	3,822	4,210,089	6.1	5.1	7.2
Unclassified	1,640	1,589,247	1.2	0.6	2.1
N/A	3,827	3,295,358	0.4	0.2	0.8
<b><i>Occupation<sup>1</sup></i></b>					
Government/Semi government	2,121	1,791,973	5.8	4.4	7.5
Private	5,780	6,924,389	4.2	3.5	5.0
Self-employed	3,664	3,338,076	3.6	2.8	4.7
Unpaid worker	3,208	2,745,195	2.4	1.8	3.1
Retiree	1,722	1,315,287	1.8	1.2	2.9
<b><i>Household Income (RM)</i></b>					
Less than RM400	2,149	1,994,906	1.4	0.9	2.3
RM400 – RM499	445	408,711	2.5	1.1	5.4
RM500 – RM699	1,134	933,214	1.4	0.6	3.1
RM700 – RM999	1,848	1,642,660	2.0	1.3	3.1
RM1000 – RM1999	5,877	5,052,390	1.9	1.4	2.5
RM2000 – RM2999	4,759	4,555,700	2.5	1.9	3.3
RM3000 – RM3999	3,678	3,659,981	2.7	2.1	3.5
RM4000 – RM4999	2,459	2,631,972	3.4	2.6	4.6
RM5000 and above	5,905	6,146,902	4.2	3.5	5.0

<sup>1</sup>not including "missing/not applicable"

**Table 1.17: Health Problem: Dengue Fever (< 12 months)**

Socio demographic characteristics	n	Estimated population	%	95% CI	
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	28,441	27,214,411	0.7	0.6	0.8
<b>State</b>					
Johor	2,465	3,193,014	0.6	0.3	1.1
Kedah	1,697	1,833,376	0.2	0.1	0.6
Kelantan	1,894	1,465,844	0.7	0.4	1.3
Melaka	1,597	787,966	0.9	0.4	2.3
Negeri Sembilan	1,526	973,490	1.6	1.0	2.7
Pahang	1,637	1,384,305	0.2	0.1	0.6
Penang	1,786	1,526,221	1.2	0.5	3.0
Perak	1,591	2,231,298	0.5	0.2	1.3
Perlis	1,423	216,943	0.1	0.0	0.5
Selangor	4,091	5,381,132	0.9	0.6	1.4
Terengganu	1,844	1,011,052	0.6	0.3	1.1
Sabah/Labuan	3,206	3,216,421	0.5	0.3	1.0
Sarawak	1,955	2,303,152	0.4	0.2	0.8
WP Kuala Lumpur	911	1,620,013	0.9	0.5	1.8
WP Putrajaya	818	70,183	0.9	0.4	2.0
<b>Location</b>					
Urban	16,342	19,460,784	0.8	0.6	1.0
Rural	12,099	7,753,626	0.5	0.4	0.7
<b>Sex</b>					
Male	13,726	13,927,649	0.9	0.7	1.1
Female	14,715	13,286,761	0.5	0.4	0.7
<b>Age Group</b>					
0-4	2,767	2,357,929	0.2	0.0	0.7
5-9	2,902	2,596,028	0.4	0.2	1.0
10-14	2,921	2,634,675	0.7	0.4	1.2
15-19	2,445	2,740,593	0.8	0.5	1.3
20-24	2,101	2,702,900	1.0	0.5	1.7
25-29	2,095	2,600,249	0.9	0.5	1.5
30-34	1,882	2,061,148	0.8	0.4	1.4
35-39	1,798	1,842,377	1.1	0.6	2.1
40-44	1,838	1,718,988	0.7	0.4	1.3
45-49	1,798	1,567,953	0.5	0.3	1.0
50-54	1,678	1,308,889	1.0	0.6	1.9
55-59	1,459	1,026,123	0.8	0.4	1.5
60-64	995	770,121	0.5	0.2	1.4
65-69	671	495,095	0.1	0.0	0.8
70-74	536	366,460	0.1	0.0	0.5
75+	555	424,882	-	-	-
<b>Ethnicity</b>					
Malay	16,935	14,216,086	0.7	0.5	0.9
Chinese	4,934	6,321,048	0.8	0.5	1.2
Indians	2,122	1,834,300	1.0	0.5	2.0
Other Bumiputera	2,931	3,292,999	0.4	0.2	0.7
Others	1,519	1,549,978	0.7	0.3	1.8



Socio demographic characteristics	n	Estimated population	%	95% CI	
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	28,441	27,214,411	0.7	0.6	0.8
<b><i>Marital status<sup>1</sup></i></b>					
Single	6,975	7,894,730	0.9	0.6	1.2
Married	12,517	11,653,906	0.7	0.6	0.9
Widow/widower/divorcee	1,469	1,071,023	0.3	0.1	0.8
<b><i>Education Level</i></b>					
Primary	1,558	1,217,107	0.5	0.2	1.6
Secondary	8,057	7,153,937	0.7	0.5	1.0
Tertiary	9,476	9,691,354	0.7	0.5	1.0
No formal education	3,871	4,254,132	1.1	0.7	1.5
Unclassified	1,645	1,593,678	0.3	0.1	0.8
N/A	3,834	3,304,202	0.3	0.1	0.7
<b><i>Occupation<sup>1</sup></i></b>					
Government/Semi government	2,148	1,811,075	1.1	0.7	1.6
Private	5,836	6,992,778	1.0	0.7	1.4
Self-employed	3,683	3,355,493	0.5	0.3	0.9
Unpaid worker	3,221	2,755,980	0.4	0.2	0.8
Retiree	1,732	1,323,902	0.6	0.2	1.4
<b><i>Household Income (RM)</i></b>					
Less than RM400	2,161	2,010,294	0.8	0.4	1.4
RM400 – RM499	447	410,963	0.5	0.1	2.2
RM500 – RM699	1,136	935,373	0.2	0.0	1.6
RM700 – RM999	1,859	1,650,783	0.5	0.2	1.3
RM1000 – RM1999	5,916	5,087,207	0.7	0.5	1.0
RM2000 – RM2999	4,787	4,582,648	0.6	0.4	0.9
RM3000 – RM3999	3,697	3,675,598	0.4	0.3	0.7
RM4000 – RM4999	2,478	2,653,993	0.9	0.5	1.5
RM5000 and above	5,960	6,207,552	1.0	0.7	1.4

<sup>1</sup>not including "missing/not applicable"

**Table 1.18: Health Problem: Urinary Tract Problem**

Socio demographic characteristics	n	Estimated population	%	95% CI	
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	28,429	27,194,947	1.6	1.4	1.8
<b>State</b>					
Johor	2,463	3,190,791	2.7	2.0	3.6
Kedah	1,696	1,832,167	1.7	1.1	2.6
Kelantan	1,895	1,466,873	0.2	0.1	0.5
Melaka	1,598	788,052	3.2	2.3	4.4
Negeri Sembilan	1,526	973,412	2.0	1.3	3.0
Pahang	1,633	1,378,467	1.4	0.9	2.1
Penang	1,786	1,526,221	0.7	0.3	1.4
Perak	1,592	2,232,630	1.6	1.1	2.3
Perlis	1,423	216,943	1.3	0.8	2.2
Selangor	4,090	5,380,094	2.0	1.5	2.6
Terengganu	1,839	1,007,380	1.5	1.0	2.3
Sabah/Labuan	3,205	3,215,676	1.0	0.6	1.5
Sarawak	1,954	2,302,015	0.7	0.4	1.3
WP Kuala Lumpur	910	1,614,034	2.2	1.6	3.0
WP Putrajaya	819	70,191	2.4	1.6	3.6
<b>Location</b>					
Urban	16,332	19,442,661	1.6	1.4	1.9
Rural	12,097	7,752,285	1.6	1.4	1.9
<b>Sex</b>					
Male	13,717	13,910,201	1.6	1.3	1.9
Female	14,712	13,284,746	1.6	1.4	1.9
<b>Age Group</b>					
0-4	2,767	2,357,929	0.3	0.1	0.8
5-9	2,904	2,596,837	0.3	0.1	0.6
10-14	2,919	2,632,663	0.5	0.2	0.9
15-19	2,441	2,737,580	1.1	0.7	1.8
20-24	2,100	2,701,476	1.6	1.0	2.4
25-29	2,094	2,596,732	2.0	1.3	3.2
30-34	1,879	2,058,469	1.5	1.0	2.3
35-39	1,797	1,836,398	1.8	1.3	2.7
40-44	1,836	1,716,693	2.5	1.7	3.5
45-49	1,798	1,567,953	2.7	1.8	4.0
50-54	1,679	1,309,687	1.6	1.0	2.5
55-59	1,458	1,025,193	2.5	1.7	3.7
60-64	996	771,453	3.7	2.4	5.6
65-69	671	495,095	2.9	1.9	4.3
70-74	536	366,460	6.1	4.1	9.0
75+	554	424,329	5.1	2.7	9.4
<b>Ethnicity</b>					
Malay	16,928	14,210,544	1.8	1.6	2.1
Chinese	4,932	6,315,645	1.2	0.9	1.6
Indians	2,121	1,828,321	2.3	1.7	3.2
Other Bumiputera	2,930	3,291,862	1.3	0.9	1.9
Others	1,518	1,548,575	1.2	0.6	2.6

Socio demographic characteristics	n	Estimated population	%	95% CI	
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	28,429	27,194,947	1.6	1.4	1.8
<b><i>Marital status<sup>1</sup></i></b>					
Single	6,967	7,884,777	1.1	0.8	1.4
Married	12,512	11,644,267	2.6	2.3	3.0
Widow/widower/divorcee	1,470	1,072,354	2.7	1.7	4.4
<b><i>Education Level</i></b>					
Primary	1,558	1,217,107	1.2	0.8	1.9
Secondary	8,058	7,153,717	1.7	1.4	2.1
Tertiary	9,465	9,674,025	1.9	1.6	2.3
No formal education	3,870	4,253,770	2.1	1.6	2.7
Unclassified	1,642	1,591,317	1.3	0.8	2.0
N/A	3,836	3,305,011	0.2	0.1	0.6
<b><i>Occupation<sup>1</sup></i></b>					
Government/Semi government	2,146	1,809,192	2.2	1.5	3.1
Private	5,828	6,977,334	1.7	1.4	2.2
Self-employed	3,684	3,356,230	2.3	1.8	3.1
Unpaid worker	3,221	2,755,770	2.3	1.7	3.0
Retiree	1,731	1,324,222	4.4	3.3	6.0
<b><i>Household Income (RM)</i></b>					
Less than RM400	2,161	2,010,251	1.8	1.2	2.5
RM400 – RM499	447	410,963	0.6	0.2	1.7
RM500 – RM699	1,136	935,373	1.0	0.5	1.8
RM700 – RM999	1,860	1,651,519	1.0	0.6	1.6
RM1000 – RM1999	5,913	5,084,389	1.3	1.0	1.6
RM2000 – RM2999	4,784	4,579,583	1.6	1.2	2.1
RM3000 – RM3999	3,694	3,673,415	1.8	1.4	2.5
RM4000 – RM4999	2,474	2,642,561	2.1	1.4	3.2
RM5000 and above	5,960	6,206,893	1.8	1.4	2.3

<sup>1</sup>not including "missing/not applicable"

**Table 1.19: Summary of General Health Findings**

GENERAL HEALTH	Count	Estimated population	%	95% CI	
				Lower	Upper
<b>Overall Health Rating (B8001)</b>					
Very good	6,889	6,733,275	24.7	24.1	25.3
Good	16,769	16,067,266	58.9	58.2	60
Not good	4,778	4,413,127	16.2	15.6	16.7
Missing/RA/DK	62	65,288	0.2	0.2	0.3
<b>Difficulty with work/daily activities in past 30 days (B8002)</b>					
No difficulties	20,774	20,423,790	85.3	84.5	86.0
Mild	3,165	2,898,948	12.1	11.5	12.8
Experienced difficulties *	628	554,356	2.3	2.1	2.6
Missing/RA/DK	77	77,825	0.3	0.2	0.5
<b>By wearing glasses or contact lens, how much difficulty did you have in seeing and recognising a person you know who is approximately 20m away? (B8011)</b>					
No difficulties	6,682	6,553,070	82.5	81.1	83.7
Mild	986	948,559	11.9	10.9	13.0
Experienced difficulties *	433	428,965	5.4	4.7	6.2
Children aged below than 7 years old	16	16,437	0.2	0.1	0.3
Missing/RA/DK	18	16,823	0.2	0.1	0.4
Total	8,135	7,963,854			
<b>By wearing glasses or contact lens, how much difficulty did you have in seeing and recognising an object at arm's length or in reading? (B8012)</b>					
No difficulties	6,992	6,927,290	87.2	86.1	88.2
Mild	805	744,573	9.4	8.5	10.3
Experienced difficulties *	309	263,512	3.3	2.8	3.9
Children aged below than 7 years old	16	16,437	0.2	0.1	0.3
Missing/RA/DK	13	12,041	0.2	0.1	0.3
Total	8,135	7,863,854			

Note: Some cells have total respondents less than 30. Results should be interpreted with caution.

\*inclusive moderate, severe and unable to perform

RA = refuse to answer; DK = don't know

**Table 1.20: Prevalence of Visual Impairment/Poor Vision\* (2 years old and above)**

Socio demographic characteristics	n	Estimated population	%	95% CI	
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	27,412	26,357,998	30.2	29.5	30.9
<b>State</b>					
Johor	861	3,102,669	35.0	32.9	37.2
Kedah	452	1,782,752	26.0	23.7	28.6
Kelantan	347	1,422,761	17.0	15.4	18.8
Melaka	544	755,947	33.6	30.4	37.0
Negeri Sembilan	539	942,402	33.9	31.1	36.8
Pahang	366	1,341,848	22.1	19.9	24.4
Penang	574	1,482,752	37.9	34.6	41.3
Perak	580	2,173,882	39.5	36.7	42.3
Perlis	345	209,639	24.7	22.3	27.4
Selangor	1,398	5,235,354	35.7	34.1	37.4
Terengganu	401	973,643	21.3	19.3	23.5
Sabah/Labuan	637	3,040,844	17.8	16.1	19.6
Sarawak	459	2,244,691	23.9	21.7	26.2
WP Kuala Lumpur	341	1,582,888	41.3	37.6	45.2
WP Putrajaya	290	65,924	34.7	31.3	30.9
<b>Location</b>					
Urban	15,747	18,846,998	34.0	33.1	34.9
Rural	11,665	7,511,000	20.8	20.0	21.7
<b>Sex</b>					
Male	13,203	13,477,729	26.7	25.7	27.7
Female	14,209	12,880,269	33.9	32.9	34.9
<b>Age Group</b>					
0-4	1,686	1,445,163	0.2	0.07	0.5
5-9	2,904	2,596,837	5.3	4.4	6.4
10-14	2,926	2,639,932	18.9	17.2	20.8
15-19	2,450	2,746,005	27.3	25.0	29.7
20-24	2,108	2,712,661	25.0	22.7	27.4
25-29	2,101	2,605,575	23.5	21.1	26.0
30-34	1,885	2,065,596	23.7	21.4	26.1
35-39	1,799	1,844,496	25.1	22.6	27.8
40-44	1,844	1,725,055	38.6	35.8	41.4
45-49	1,801	1,570,079	56.5	53.6	59.4
50-54	1,681	1,313,353	66.0	63.3	68.7
55-59	1,463	1,027,597	65.1	61.8	68.2
60-64	997	772,562	64.9	61.2	68.5
65-69	673	499,048	64.4	59.6	68.9
70-74	538	368,196	59.6	53.8	65.1
75+	556	425,843	47.5	42.1	52.8
<b>Ethnicity</b>					
Malay	16,280	13,737,145	26.6	25.8	27.5
Chinese	4,830	6,196,088	49.8	48.1	51.6
Indians	2,060	1,775,763	32.8	30.2	35.5
Other Bumiputera	2,774	3,131,869	16.1	14.5	17.9
Others	1,468	1,517,133	8.8	6.9	11.1
<b>Marital status<sup>1</sup></b>					
Single	6,983	7,908,495	27.9	26.6	29.3
Married	12,537	11,676,560	41.3	40.2	42.4
Widow/widower/divorcee	1,470	1,072,354	49.8	46.6	53.0

Socio demographic characteristics	n	Estimated population	%	95% CI	
				(Prevalence)	Lower
<b>MALAYSIA</b>	27,412	26,357,998	30.2	29.5	30.9
<b>Education Level</b>					
Primary	8,065	7,159,469	29.2	27.9	30.4
Secondary	9,485	9,704,547	33.7	32.5	34.9
Tertiary	3,873	4,255,316	47.5	45.5	49.6
No formal education	1,559	1,218,847	28.4	25.7	31.3
Unclassified	1,675	1,627,575	13.8	11.9	16.0
N/A	2,755	2,392,244	0.7	0.4	1.6
<b>Occupation<sup>1</sup></b>					
Government/Semi government	2,148	1,811,075	43.2	40.4	46.0
Private	5,843	7,001,658	32.7	31.2	34.2
Self-employed	3,686	3,358,458	36.1	34.1	38.2
Unpaid worker	3,224	2,758,938	39.6	37.6	41.7
Retiree	1,738	1,330,270	63.4	60.4	66.2
<b>Household Income (RM)</b>					
Less than RM400	2,076	1,941,818	33.7	31.2	36.3
RM400 – RM499	428	394,926	19.2	15.0	24.2
RM500 – RM699	1,094	902,026	18.1	15.3	21.1
RM700 – RM999	1,796	1,596,241	18.5	16.4	20.7
RM1000 – RM1999	5,706	4,929,767	22.9	21.6	24.4
RM2000 – RM2999	4,616	4,426,228	27.9	26.2	29.6
RM3000 – RM3999	3,575	3,572,752	29.6	27.8	31.5
RM4000 – RM4999	2,389	2,585,437	33.8	31.5	36.3
RM5000 and above	5,732	6,008,801	41.3	39.6	42.9

<sup>1</sup>not including "missing/not applicable"

\*Visual Impairment/Poor Vision: having either difficulty seeing near/distant objects and/or wearing glasses/contact lenses

**Table 1.21: Prevalence of Wearing Spectacles/contact lenses for Distant Vision  
(2 years old and above)**

Socio demographic characteristics	n	Estimated population	%	95% CI	
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	27,412	26,357,998	14.5	13.7	15.3
<b>State</b>					
Johor	2,382	3,102,669	17.2	14.9	19.7
Kedah	1,650	1,782,752	11.7	9.9	13.7
Kelantan	1,831	1,422,761	6.1	4.8	7.9
Melaka	1,546	755,947	15.5	12.8	18.7
Negeri Sembilan	1,475	942,402	14.6	11.7	17.9
Pahang	1,580	1,341,848	9.9	8.4	11.7
Penang	1,729	1,482,752	17.1	13.9	20.9
Perak	1,540	2,173,882	16.1	13.9	18.5
Perlis	1,374	209,639	11.1	8.8	14.0
Selangor	3,942	5,235,354	19.5	17.7	21.5
Terengganu	1,775	973,643	9.2	7.3	11.4
Sabah/Labuan	3,031	3,040,844	8.0	6.2	10.3
Sarawak	1,892	2,244,691	9.6	7.8	11.8
WP Kuala Lumpur	883	1,582,888	24.3	19.4	29.9
WP Putrajaya	782	65,924	25.4	21.5	29.8
<b>Location</b>					
Urban	15,747	18,846,998	17.2	16.2	18.2
Rural	11,665	7,511,000	7.7	7.0	8.6
<b>Sex</b>					
Male	13,203	13,477,729	11.8	10.9	12.8
Female	14,209	12,880,269	17.2	16.3	18.2
<b>Age Group</b>					
0-4	1,686	1,445,163	0.2	0.0	0.5
5-9	2,904	2,596,837	4.3	3.4	5.4
10-14	2,926	2,639,932	15.5	13.6	17.5
15-19	2,450	2,746,005	23.4	21.0	25.9
20-24	2,108	2,712,661	20.9	18.5	23.5
25-29	2,101	2,605,575	20.3	18.0	22.8
30-34	1,885	2,065,596	19.1	16.8	21.6
35-39	1,799	1,844,496	19.8	17.2	22.5
40-44	1,844	1,725,055	14.7	12.7	16.9
45-49	1,801	1,570,079	10.0	8.4	11.9
50-54	1,681	1,313,353	9.7	8.0	11.7
55-59	1,463	1,027,597	7.7	5.9	10.1
60-64	997	772,562	7.8	5.7	10.6
65-69	673	499,048	10.5	7.6	14.3
70-74	538	368,196	8.5	6.0	12.0
75+	556	425,843	7.8	5.5	10.9
<b>Ethnicity</b>					
Malay	16,280	13,737,145	12.9	12.1	13.7
Chinese	4,830	6,196,088	24.7	22.9	26.7
Indians	2,060	1,775,763	15.5	13.2	18.2
Other Bumiputera	2,774	3,131,869	6.4	5.0	8.2
Others	1,468	1,517,133	2.8	1.8	4.3

Socio demographic characteristics	n	Estimated population	%	95% CI	
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	27,412	26,357,998	14.5	13.7	15.3
<b><i>Marital status<sup>1</sup></i></b>					
Single	6,983	7,908,495	22.6	21.0	24.3
Married	12,537	11,676,560	13.9	13.0	14.8
Widow/widower/divorcee	1,470	1,072,354	8.7	7.0	10.8
<b><i>Education Level</i></b>					
Primary	8,065	7,159,469	5.3	4.0	6.9
Secondary	9,485	9,704,547	9.7	8.7	10.8
Tertiary	3,873	4,255,316	15.6	14.5	16.7
No formal education	1,559	1,218,847	32.2	30.0	34.4
Unclassified	1,675	1,627,575	9.8	7.7	12.3
N/A	2,755	2,392,244	0.5	0.3	0.9
<b><i>Occupation<sup>1</sup></i></b>					
Government/Semi government	2,148	1,811,075	22.1	19.7	24.8
Private	5,843	7,001,658	18.8	17.3	20.4
Self-employed	3,686	3,358,458	10.6	9.2	12.3
Unpaid worker	3,224	2,758,938	11.3	9.9	12.8
Retiree	1,738	1,330,270	9.3	7.5	11.6
<b><i>Household Income (RM)</i></b>					
Less than RM400	2,076	1,941,818	13.9	11.9	16.2
RM400 – RM499	428	394,926	6.2	3.5	10.8
RM500 – RM699	1,094	902,026	6.3	4.7	8.3
RM700 – RM999	1,796	1,596,241	5.1	4.0	6.5
RM1000 – RM1999	5,706	4,929,767	8.9	7.8	10.1
RM2000 – RM2999	4,616	4,426,228	13.5	12.0	15.2
RM3000 – RM3999	3,575	3,572,752	14.3	12.7	16.2
RM4000 – RM4999	2,389	2,585,437	17.9	15.6	20.4
RM5000 and above	5,732	6,008,801	22.8	21.1	24.7

<sup>1</sup>not including "missing/not applicable"



**Table 1.22: Prevalence of Wearing Spectacles/contact lenses for Near Vision (2 years old and above)**

Socio demographic characteristics	n	Estimated population	%	95% CI	
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	27,412	26,357,998	10.3	9.8	10.9
<b>State</b>					
Johor	2,382	3,102,669	12.7	10.9	14.8
Kedah	1,650	1,782,752	7.9	6.7	9.2
Kelantan	1,831	1,422,761	8.2	6.8	9.7
Melaka	1,546	755,947	12.5	9.7	16.1
Negeri Sembilan	1,475	942,402	13.4	10.9	16.4
Pahang	1,580	1,341,848	8.9	6.9	11.5
Penang	1,729	1,482,752	13.7	11.4	16.4
Perak	1,540	2,173,882	13.8	11.8	16.2
Perlis	1,374	209,639	8.6	7.0	10.6
Selangor	3,942	5,235,354	10.6	9.4	11.9
Terengganu	1,775	973,643	9.0	7.4	10.9
Sabah/Labuan	3,031	3,040,844	6.1	4.9	7.6
Sarawak	1,892	2,244,691	9.3	7.2	11.8
WP Kuala Lumpur	883	1,582,888	10.1	7.9	12.9
WP Putrajaya	782	65,924	4.7	3.4	6.5
<b>Location</b>					
Urban	15,747	18,846,998	10.9	10.2	11.6
Rural	11,665	7,511,000	8.9	8.1	9.7
<b>Sex</b>					
Male	13,203	13,477,729	10.3	9.6	11.0
Female	14,209	12,880,269	10.3	9.6	11.0
<b>Age Group</b>					
0-4	1,686	1,445,163	0.1	0.0	0.4
5-9	2,904	2,596,837	0.5	0.3	1.0
10-14	2,926	2,639,932	2.2	1.7	3.0
15-19	2,450	2,746,005	1.9	1.3	2.7
20-24	2,108	2,712,661	2.5	1.7	3.6
25-29	2,101	2,605,575	1.2	0.7	2.1
30-34	1,885	2,065,596	2.2	1.4	3.3
35-39	1,799	1,844,496	3.3	2.3	4.5
40-44	1,844	1,725,055	16.3	14.2	18.8
45-49	1,801	1,570,079	35.9	33.0	39.0
50-54	1,681	1,313,353	40.4	37.5	43.4
55-59	1,463	1,027,597	38.6	35.2	42.0
60-64	997	772,562	34.0	30.5	37.8
65-69	673	499,048	28.6	24.2	33.5
70-74	538	368,196	27.4	22.9	32.5
75+	556	425,843	24.1	19.6	29.4
<b>Ethnicity</b>					
Malay	16,280	13,737,145	9.0	8.4	9.7
Chinese	4,830	6,196,088	16.7	15.4	18.1
Indians	2,060	1,775,763	10.1	8.5	12.1
Other Bumiputera	2,774	3,131,869	6.2	4.7	7.9
Others	1,468	1,517,133	4.6	3.2	6.6

Socio demographic characteristics	n	Estimated population	%	95% CI	
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	27,412	26,357,998	10.3	9.8	10.9
<b>Marital status<sup>1</sup></b>					
Single	6,983	7,908,495	3.2	2.7	3.8
Married	12,537	11,676,560	18.5	17.5	19.6
Widow/widower/divorcee	1,470	1,072,354	23.0	20.4	25.8
<b>Education Level</b>					
Primary	8,065	7,159,469	13.7	11.4	16.3
Secondary	9,485	9,704,547	13.2	12.1	14.3
Tertiary	3,873	4,255,316	12.4	11.5	13.3
No formal education	1,559	1,218,847	8.5	7.4	9.7
Unclassified	1,675	1,627,575	2.4	1.7	3.4
<b>Occupation<sup>1</sup></b>					
Government/Semi government	2,148	1,811,075	14.6	12.5	17.0
Private	5,843	7,001,658	8.9	8.1	9.8
Self-employed	3,686	3,358,458	18.5	17.0	20.2
Unpaid worker	3,224	2,758,938	19.0	17.3	20.9
Retiree	1,738	1,330,270	31.5	28.4	34.7
<b>Household Income (RM)</b>			0.0	0.0	0.0
Less than RM400	2,076	1,941,818	12.4	10.7	14.4
RM400 – RM499	428	394,926	7.9	5.2	12.0
RM500 – RM699	1,094	902,026	9.0	6.8	11.7
RM700 – RM999	1,796	1,596,241	8.4	6.8	10.2
RM1000 – RM1999	5,706	4,929,767	9.5	8.5	10.7
RM2000 – RM2999	4,616	4,426,228	9.1	8.1	10.3
RM3000 – RM3999	3,575	3,572,752	10.3	9.1	11.6
RM4000 – RM4999	2,389	2,585,437	10.3	8.8	12.1
RM5000 and above	5,732	6,008,801	12.0	10.8	13.2

<sup>1</sup>not including "missing/not applicable"

**Table 1.23: General Health - Prevalence of Wearing Spectacles/contact lenses for Distant & Near Vision (2 years old and above)**

Socio demographic characteristics	n	Estimated population	% 95% CI		
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	27,412	26,357,998	5.4	5.1	5.9
<b>State</b>					
Johor	2,382	3,102,669	5.1	4.3	6.0
Kedah	1,650	1,782,752	6.5	0.8	5.1
Kelantan	1,831	1,422,761	2.7	2.0	3.7
Melaka	1,546	755,947	5.6	4.1	7.6
Negeri Sembilan	1,475	942,402	5.9	4.6	7.6
Pahang	1,580	1,341,848	3.2	2.4	4.4
Penang	1,729	1,482,752	7.1	5.5	9.1
Perak	1,540	2,173,882	9.5	7.5	12.2
Perlis	1,374	209,639	5.0	3.8	6.7
Selangor	3,942	5,235,354	5.6	4.7	6.7
Terengganu	1,775	973,643	3.2	2.3	4.3
Sabah/Labuan	3,031	3,040,844	3.6	2.8	4.7
Sarawak	1,892	2,244,691	5.0	4.1	6.0
WP Kuala Lumpur	883	1,582,888	6.9	5.0	9.6
WP Putrajaya	782	65,924	4.6	3.1	6.7
<b>Location</b>					
Urban	15,747	18,846,998	5.9	5.4	6.5
Rural	11,665	7,511,000	4.2	3.8	4.7
<b>Sex</b>					
Male	13,203	13,477,729	4.6	4.1	5.1
Female	14,209	12,880,269	6.4	5.8	7.0
<b>Age Group</b>					
0-4	1,686	1,445,163	-	-	-
5-9	2,904	2,596,837	0.5	0.2	1.0
10-14	2,926	2,639,932	1.2	0.8	1.8
15-19	2,450	2,746,005	2.0	1.4	2.8
20-24	2,108	2,712,661	1.6	1.1	2.5
25-29	2,101	2,605,575	1.9	1.2	3.0
30-34	1,885	2,065,596	2.2	1.4	3.3
35-39	1,799	1,844,496	2.1	1.5	3.1
40-44	1,844	1,725,055	7.5	6.1	9.3
45-49	1,801	1,570,079	10.6	8.9	12.5
50-54	1,681	1,313,353	15.9	13.8	18.2
55-59	1,463	1,027,597	18.8	16.3	21.7
60-64	997	772,562	23.1	19.6	26.9
65-69	673	499,048	25.2	21.2	29.7
70-74	538	368,196	23.6	17.7	30.7
75+	556	425,843	15.5	12.2	19.6
<b>Ethnicity</b>					
Malay	16,280	13,737,145	4.8	4.3	5.2
Chinese	4,830	6,196,088	8.4	7.4	9.6
Indians	2,060	1,775,763	7.1	5.4	9.4
Other Bumiputera	2,774	3,131,869	3.5	2.9	4.4
Others	1,468	1,517,133	1.4	0.8	2.6

Socio demographic characteristics	n	Estimated population	%	95% CI	
			(Prevalence)	Lower	Upper
<b>MALAYSIA</b>	27,412	26,357,998	5.4	5.1	5.9
<b>Marital status<sup>1</sup></b>					
Single	6,983	7,908,495	2.1	1.7	2.6
Married	12,537	11,676,560	8.9	8.2	9.7
Widow/widower/divorcee	1,470	1,072,354	18.1	15.8	20.7
<b>Education Level</b>					
Primary	8,065	7,159,469	9.5	7.7	11.6
Secondary	9,485	9,704,547	6.2	5.6	7.0
Tertiary	3,873	4,255,316	5.7	5.1	6.4
No formal education	1,559	1,218,847	6.9	5.8	8.0
Unclassified	1,675	1,627,575	1.6	1.1	2.5
<b>Occupation<sup>1</sup></b>					
Government/Semi government	2,148	1,811,075	6.5	5.3	7.8
Private	5,843	7,001,658	5.0	4.3	5.7
Self-employed	3,686	3,358,458	6.9	5.9	8.0
Unpaid worker	3,224	2,758,938	9.3	8.2	10.6
Retiree	1,738	1,330,270	22.5	19.6	25.7
<b>Household Income (RM)</b>					
Less than RM400	2,076	1,941,818	7.3	6.1	8.8
RM400 – RM499	428	394,926	5.0	2.9	8.3
RM500 – RM699	1,094	902,026	2.8	1.9	4.2
RM700 – RM999	1,796	1,596,241	5.0	3.7	6.7
RM1000 – RM1999	5,706	4,929,767	4.5	3.9	5.2
RM2000 – RM2999	4,616	4,426,228	5.3	4.3	6.4
RM3000 – RM3999	3,575	3,572,752	5.0	4.2	6.0
RM4000 – RM4999	2,389	2,585,437	5.6	4.5	7.0
RM5000 and above	5,732	6,008,801	6.5	5.7	7.4

<sup>1</sup>not including "missing/not applicable"

## 1.9 DEFINITION OF VARIABLES

Variable name	Variable in SPSS	Definition of Variable	Population	Weight Variable	SPSS definition
Overall recent illness/injury	<ul style="list-style-type: none"> <li>▪ b_ill</li> <li>▪ state2</li> <li>▪ strata</li> <li>▪ gender</li> <li>▪ agegp</li> <li>▪ race3</li> <li>▪ maritalgp</li> <li>▪ edu</li> <li>▪ work3</li> <li>▪ <b>hhincomegroup</b></li> </ul>	People who reported any recent illness/injury, in the preceding 2 weeks before the survey. This is measured using the questions b1010-b1017.	All ages; <13 years old; ≥13 years old	weight4	<b>CSTABULATE</b> /TABLES VARIABLES= b_ill /CELLS POPSIZE TABLEPCT /STATISTICS SE CIN(95) COUNT /MISSING SCOPE=TABLE CLASSMISSING=EXCLUDE  /SUBPOP TABLE= <b>state2</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>strata</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>gender</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>agegp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>race3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>maritalgp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>edu</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>work3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>hhincomegroup</b> DISPLAY=LAYERED
fast or troubled breathing	<ul style="list-style-type: none"> <li>▪ b1010.2</li> <li>▪ state2</li> <li>▪ strata</li> <li>▪ gender</li> <li>▪ agegp</li> <li>▪ race3</li> <li>▪ maritalgp</li> <li>▪ edu</li> <li>▪ work3</li> <li>▪ <b>hhincomegroup</b></li> </ul>	Reported to experience fast or troubled breathing, in the preceding 2 weeks before the survey. This is measured using the questions b1010.	All ages; <13 years old; ≥13 years old	weight4	<b>CSTABULATE</b> /TABLES VARIABLES= <b>b1010.2</b> /CELLS POPSIZE TABLEPCT /STATISTICS SE CIN(95) COUNT /MISSING SCOPE=TABLE CLASSMISSING=EXCLUDE  /SUBPOP TABLE= <b>state2</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>strata</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>gender</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>agegp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>race3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>maritalgp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>edu</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>work3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>hhincomegroup</b> DISPLAY=LAYERED
severe/persistent vomiting	<ul style="list-style-type: none"> <li>▪ b1011.2</li> <li>▪ state2</li> <li>▪ strata</li> <li>▪ gender</li> <li>▪ agegp</li> <li>▪ race3</li> </ul>	Reported to experience severe/persistent vomiting, in the preceding 2 weeks before the survey. This is measured using the	All ages; <13 years old; ≥13 years old	weight4	<b>CSTABULATE</b> /TABLES VARIABLES= <b>b1011.2</b> /CELLS POPSIZE TABLEPCT /STATISTICS SE CIN(95) COUNT /MISSING SCOPE=TABLE CLASS MISSING=EXCLUDE

Variable name	Variable in SPSS	Definition of Variable	Population	Weight Variable	SPSS definition
severe/ unable to eat /drink	<ul style="list-style-type: none"> <li>▪ maritalgp</li> <li>▪ edu</li> <li>▪ work3</li> <li>▪ <b>hhincommegroup</b></li> </ul>	questions b1011.			/SUBPOP TABLE= <b>state2</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>strata</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>gender</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>agegp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>race3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>maritalgp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>edu</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>work3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>hhincommegroup</b> DISPLAY=LAYERED
severe/ unable to eat /drink	b1012.2 <ul style="list-style-type: none"> <li>▪ state2</li> <li>▪ strata</li> <li>▪ gender</li> <li>▪ agegp</li> <li>▪ race3</li> <li>▪ maritalgp</li> <li>▪ edu</li> <li>▪ work3</li> <li>▪ <b>hhincommegroup</b></li> </ul>	Reported to experience inability to eat or drink in the preceding 2 weeks before the survey. This is measured using the question b1012	< 13 years old	weight4	<b>age &lt;= 12 (FILTER)</b>  <b>CSTABULATE</b> /TABLES VARIABLES= <b>b1012.2</b> /CELLS POPSIZE TABLEPCT /STATISTICS SE CIN(95) COUNT /MISSING SCOPE=TABLE CLASSMISSING=EXCLUDE  /SUBPOP TABLE= <b>state2</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>strata</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>gender</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>agegp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>race3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>maritalgp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>edu</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>work3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>hhincommegroup</b> DISPLAY=LAYERED
Severe/ illness and bodily injury	b1013.2 <ul style="list-style-type: none"> <li>▪ state2</li> <li>▪ strata</li> <li>▪ gender</li> <li>▪ agegp</li> <li>▪ race3</li> <li>▪ maritalgp</li> <li>▪ edu</li> <li>▪ work3</li> <li>▪ <b>hhincommegroup</b></li> </ul>	Reported to experience bodily in the preceding 2 weeks before the survey. This is measured using the questions b1013.	All ages; <13 years old; ≥13 years old	weight4	<b>CSTABULATE</b> /TABLES VARIABLES= <b>b1013.2</b> /CELLS POPSIZE TABLEPCT /STATISTICS SE CIN(95) COUNT /MISSING SCOPE=TABLE CLASSMISSING=EXCLUDE  /SUBPOP TABLE= <b>state2</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>strata</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>gender</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>agegp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>race3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>maritalgp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>edu</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>work3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>hhincommegroup</b> DISPLAY=LAYERED

Variable name	Variable in SPSS	Definition of Variable	Population	Weight Variable	SPSS definition
Severe illness and severe pains in the chest/stomach region	b1015.2 <ul style="list-style-type: none"> <li>▪ state2</li> <li>▪ strata</li> <li>▪ gender</li> <li>▪ agegp</li> <li>▪ race3</li> <li>▪ maritalgp</li> <li>▪ edu</li> <li>▪ work3</li> <li>▪ <b>hhincomegroup</b></li> </ul>	Reported to experience pain/tightness in the chest or stomach region in the preceding 2 weeks before the survey. This is measured using the question b1015.	≥13 years old	weight4	<b>age &gt; 12 (FILTER)</b>  <b>CSTABULATE</b> /TABLES VARIABLES= <b>b1015.2</b> /CELLS POPSIZE TABLEPCT /STATISTICS SE CIN(95) COUNT /MISSING SCOPE=TABLE CLASSMISSING=EXCLUDE  /SUBPOP TABLE= <b>state2</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>strata</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>gender</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>agegp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>race3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>maritalgp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>edu</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>work3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>hhincomegroup</b> DISPLAY=LAYERED
Severity of illness and sudden dizziness	b1016.2 <ul style="list-style-type: none"> <li>▪ state2</li> <li>▪ strata</li> <li>▪ gender</li> <li>▪ agegp</li> <li>▪ race3</li> <li>▪ maritalgp</li> <li>▪ edu</li> <li>▪ work3</li> <li>▪ <b>hhincomegroup</b></li> </ul>	Reported to experience sudden dizziness in the preceding 2 weeks before the survey. This is measured using the question b1016.	≥13 years old	weight4	<b>age &gt; 12 (FILTER)</b>  <b>CSTABULATE</b> /TABLES VARIABLES= <b>b1016.2</b> /CELLS POPSIZE TABLEPCT /STATISTICS SE CIN(95) COUNT /MISSING SCOPE=TABLE CLASSMISSING=EXCLUDE  /SUBPOP TABLE= <b>state2</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>strata</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>gender</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>agegp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>race3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>maritalgp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>edu</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>work3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>hhincomegroup</b> DISPLAY=LAYERED
Severity of other health problems (listed in codebook)	b1017.2 <ul style="list-style-type: none"> <li>▪ state2</li> <li>▪ strata</li> <li>▪ gender</li> <li>▪ agegp</li> </ul>	Reported to experience pain/tightness in the chest or stomach region in the	All ages; <13 years old; ≥13 years old	weight4	<b>CSTABULATE</b> /TABLES VARIABLES= <b>b1017.2</b> /CELLS POPSIZE TABLEPCT /STATISTICS SE CIN(95) COUNT /MISSING SCOPE=TABLE CLASSMISSING=EXCLUDE

Variable name	Variable in SPSS	Definition of Variable	Population	Weight Variable	SPSS definition
	<ul style="list-style-type: none"> <li>■ race3</li> <li>■ maritalgp</li> <li>■ edu</li> <li>■ work3</li> <li>■ <b>hhincomegroup</b></li> </ul>	preceding 2 weeks before the survey. This is measured using the question b1017.			<pre> /SUBPOP TABLE= state2 DISPLAY=LAYERED /SUBPOP TABLE= strata DISPLAY=LAYERED /SUBPOP TABLE= gender DISPLAY=LAYERED /SUBPOP TABLE= agegp DISPLAY=LAYERED /SUBPOP TABLE= race3 DISPLAY=LAYERED /SUBPOP TABLE= maritalgp DISPLAY=LAYERED /SUBPOP TABLE= edu DISPLAY=LAYERED /SUBPOP TABLE= work3 DISPLAY=LAYERED /SUBPOP TABLE= hhincomegroup DISPLAY=LAYERED </pre>
Unable to perform daily activities due to severe of illness	b1100 b_ill <ul style="list-style-type: none"> <li>■ state2</li> <li>■ strata</li> <li>■ gender</li> <li>■ agegp</li> <li>■ race3</li> <li>■ maritalgp</li> <li>■ edu</li> <li>■ work3</li> <li>■ <b>hhincomegroup</b></li> </ul>	Reported unable to perform daily activities; in the preceding 2 weeks before the survey. This is measured using the question b1100.	All ages; <13 years old; ≥13 years old	weight4	<pre> COMPUTE filter_\$(b_ill=1). CSTABULATE /TABLES VARIABLES=b1100.2 /CELLS POPSIZE TABLEPCT /STATISTICS SE CIN(95) COUNT /MISSING SCOPE=TABLE CLASSMISSING=EXCLUDE  /SUBPOP TABLE= state2 DISPLAY=LAYERED /SUBPOP TABLE= strata DISPLAY=LAYERED /SUBPOP TABLE= gender DISPLAY=LAYERED /SUBPOP TABLE= agegp DISPLAY=LAYERED /SUBPOP TABLE= race3 DISPLAY=LAYERED /SUBPOP TABLE= maritalgp DISPLAY=LAYERED /SUBPOP TABLE= edu DISPLAY=LAYERED /SUBPOP TABLE= work3 DISPLAY=LAYERED /SUBPOP TABLE= hhincomegroup DISPLAY=LAYERED </pre>
Average work days lost		Average number of days lost caused by severity of illness. This measured using the question b1101 with b1100.	All ages; <13 years old; ≥13 years old	weight4	<pre> SPSS prog: COMPUTE filter_\$(b_ill=1 &amp; b1100=1). FREQUENCIES VARIABLES=B1101 /STATISTICS=STDDEV VARIANCE MINIMUM MAXIMUM MEAN MEDIAN /ORDER=ANALYSIS.  Stata prog: svy: mean b1101_2 if b_ill==1 &amp; b1100_2==1 </pre>



Variable name	Variable in SPSS	Definition of Variable	Population	Weight Variable	SPSS definition
Prevalence of heart disease	B7001.2 <ul style="list-style-type: none"> <li>▪ state2</li> <li>▪ strata</li> <li>▪ gender</li> <li>▪ agegp</li> <li>▪ race3</li> <li>▪ maritalgp</li> <li>▪ edu</li> <li>▪ work3</li> <li>▪ <b>hincomegroup</b></li> </ul>	Number of people who was diagnosed with heart disease. This is measured using the questions b7001.	All ages; <13 years old; ≥13 years old	weight4	<b>CSTABULATE</b> /TABLES VARIABLES= <b>b7001.2</b> /CELLS POPSIZE TABLEPCT /STATISTICS SE CIN(95) COUNT /MISSING SCOPE=TABLE CLASSMISSING=EXCLUDE  /SUBPOP TABLE= <b>state2</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>strata</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>gender</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>agegp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>race3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>maritalgp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>edu</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>work3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>hincomegroup</b> DISPLAY=LAYERED
Prevalence of asthma	B7002.2 <ul style="list-style-type: none"> <li>▪ state2</li> <li>▪ strata</li> <li>▪ gender</li> <li>▪ agegp</li> <li>▪ race3</li> <li>▪ maritalgp</li> <li>▪ edu</li> <li>▪ work3</li> <li>▪ <b>hincomegroup</b></li> </ul>	Number of people who was diagnosed with asthma. This is measured using the questions b7002.	All ages; <13 years old; ≥13 years old	weight4	<b>CSTABULATE</b> /TABLES VARIABLES= <b>b7002.2</b> /CELLS POPSIZE TABLEPCT /STATISTICS SE CIN(95) COUNT /MISSING SCOPE=TABLE CLASSMISSING=EXCLUDE  /SUBPOP TABLE= <b>state2</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>strata</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>gender</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>agegp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>race3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>maritalgp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>edu</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>work3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>hincomegroup</b> DISPLAY=LAYERED
Prevalence of stroke	B7003.2 <ul style="list-style-type: none"> <li>▪ state2</li> <li>▪ strata</li> <li>▪ gender</li> <li>▪ agegp</li> <li>▪ race3</li> <li>▪ maritalgp</li> <li>▪ edu</li> <li>▪ work3</li> <li>▪ <b>hincomegroup</b></li> </ul>	Number of people who was diagnosed with stroke. This is measured using the questions b7003.	≥13 years old	weight4	<b>age &gt; 12 (FILTER)</b> <b>CSTABULATE</b> /TABLES VARIABLES= <b>b7003.2</b> /CELLS POPSIZE TABLEPCT /STATISTICS SE CIN(95) COUNT /MISSING SCOPE=TABLE CLASSMISSING=EXCLUDE  /SUBPOP TABLE= <b>state2</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>strata</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>gender</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>agegp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>race3</b> DISPLAY=LAYERED

Variable name	Variable in SPSS	Definition of Variable	Population	Weight Variable	SPSS definition
Prevalence of arthritis	B7004.2 <ul style="list-style-type: none"> <li>▪ state2</li> <li>▪ strata</li> <li>▪ gender</li> <li>▪ agegp</li> <li>▪ race3</li> <li>▪ maritalgp</li> <li>▪ edu</li> <li>▪ work3</li> <li>▪ <b>hincomegroup</b></li> </ul>	Number of people who was diagnosed with arthritis. This is measured using the questions b7004.	≥13 years old	weight4	/SUBPOP TABLE= <b>maritalgp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>edu</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>work3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>hincomegroup</b> DISPLAY=LAYERED <b>age &gt; 12 (FILTER)</b> <b>CSTABULATE</b> /TABLES VARIABLES= <b>b7004.2</b> /CELLS POPSIZE TABLEPCT /STATISTICS SE CIN(95) COUNT /MISSING SCOPE=TABLE CLASSMISSING=EXCLUDE /SUBPOP TABLE= <b>state2</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>strata</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>gender</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>agegp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>race3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>maritalgp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>edu</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>work3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>hincomegroup</b> DISPLAY=LAYERED
Prevalence of dengue fever (in the last 12 months)	B7005.2 <ul style="list-style-type: none"> <li>▪ state2</li> <li>▪ strata</li> <li>▪ gender</li> <li>▪ agegp</li> <li>▪ race3</li> <li>▪ maritalgp</li> <li>▪ edu</li> <li>▪ work3</li> <li>▪ <b>hincomegroup</b></li> </ul>	Number of people who have been told by a doctor/medical assistant to have dengue fever in the last 12 months. This is measured using the questions b7005.	All ages; <13 years old; ≥13 years old	weight4	<b>CSTABULATE</b> /TABLES VARIABLES= <b>b7005.2</b> /CELLS POPSIZE TABLEPCT /STATISTICS SE CIN(95) COUNT /MISSING SCOPE=TABLE CLASSMISSING=EXCLUDE /SUBPOP TABLE= <b>state2</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>strata</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>gender</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>agegp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>race3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>maritalgp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>edu</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>work3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>hincomegroup</b> DISPLAY=LAYERED
Prevalence of dengue fever	B7006.2 <ul style="list-style-type: none"> <li>▪ state2</li> <li>▪ strata</li> <li>▪ gender</li> </ul>	Number of people who have been told by a doctor/medical assistant to have	All ages; <13 years old; ≥13 years old	weight4	<b>CSTABULATE</b> /TABLES VARIABLES= <b>b7006.2</b> /CELLS POPSIZE TABLEPCT /STATISTICS SE CIN(95) COUNT

Variable name	Variable in SPSS	Definition of Variable	Population	Weight Variable	SPSS definition
	<ul style="list-style-type: none"> <li>■ agegp</li> <li>■ race3</li> <li>■ maritalgp</li> <li>■ edu</li> <li>■ work3</li> <li>■ <b>hhincomegroup</b></li> </ul>	dengue fever in the past. This is measured using the questions b7006.			/MISSING SCOPE=TABLE CLASSMISSING=EXCLUDE  /SUBPOP TABLE= <b>state2</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>strata</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>gender</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>agegp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>race3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>maritalgp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>edu</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>work3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>hhincomegroup</b> DISPLAY=LAYERED
Prevalence of urinary tract infection (in the last 12 months)	B7007.2 <ul style="list-style-type: none"> <li>■ state2</li> <li>■ strata</li> <li>■ gender</li> <li>■ agegp</li> <li>■ race3</li> <li>■ maritalgp</li> <li>■ edu</li> <li>■ work3</li> <li>■ <b>hhincomegroup</b></li> </ul>	Number of people who have been told by a doctor/medical assistant to have urinary tract infection in the last 12 months. This is measured using the questions b7007.	All ages; <13 years old; ≥13 years old	weight4	<b>CSTABULATE</b> /TABLES VARIABLES= <b>b7007.2</b> /CELLS POPSIZE TABLEPCT /STATISTICS SE CIN(95) COUNT /MISSING SCOPE=TABLE CLASSMISSING=EXCLUDE  /SUBPOP TABLE= <b>state2</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>strata</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>gender</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>agegp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>race3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>maritalgp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>edu</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>work3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>hhincomegroup</b> DISPLAY=LAYERED
Health status rated by respondents	B8001.2 <ul style="list-style-type: none"> <li>■ state2</li> <li>■ strata</li> <li>■ gender</li> <li>■ agegp</li> <li>■ race3</li> <li>■ maritalgp</li> <li>■ edu</li> <li>■ work3</li> <li>■ <b>hhincomegroup</b></li> </ul>	Number of people who rated their health as very good. This is measured using the questions b8001.	All ages; <13 years old; ≥13 years old	weight4	<b>CSTABULATE</b> /TABLES VARIABLES= <b>b8001.2</b> /CELLS POPSIZE TABLEPCT /STATISTICS SE CIN(95) COUNT /MISSING SCOPE=TABLE CLASSMISSING=EXCLUDE /SUBPOP TABLE= <b>state2</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>strata</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>gender</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>agegp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>race3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>maritalgp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>edu</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>work3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>hhincomegroup</b> DISPLAY=LAYERED

Variable name	Variable in SPSS	Definition of Variable	Population	Weight Variable	SPSS definition
Rate of difficulty to perform daily activities/ work in the last 30 days.	B8002.2 <ul style="list-style-type: none"> <li>▪ state2</li> <li>▪ strata</li> <li>▪ gender</li> <li>▪ agegp</li> <li>▪ race3</li> <li>▪ maritalgp</li> <li>▪ edu</li> <li>▪ work3</li> <li>▪ <b>hhincomegroup</b></li> </ul>	Number of people who rated difficulty to perform daily activities/ work in the last 30 days as none. This is measured using the questions b8002.	>7 years old	weight4	<b>age &gt;= 7 (FILTER)</b> <b>CSTABULATE</b> /TABLES VARIABLES= <b>b8002.2</b> /CELLS POPSIZE TABLEPCT /STATISTICS SE CIN(95) COUNT /MISSING SCOPE=TABLE CLASSMISSING=EXCLUDE /SUBPOP TABLE= <b>state2</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>strata</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>gender</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>agegp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>race3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>maritalgp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>edu</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>work3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>hhincomegroup</b> DISPLAY=LAYERED
People who wear spectacles or contact lenses for distance, near & distance and near	B8010a <ul style="list-style-type: none"> <li>▪ state2</li> <li>▪ strata</li> <li>▪ gender</li> <li>▪ agegp</li> <li>▪ race3</li> <li>▪ maritalgp</li> <li>▪ edu</li> <li>▪ work3</li> <li>▪ <b>hhincomegroup</b></li> </ul>	Number of people who wear spectacles or contact lenses for distance. This is measured using the question b8010.	≥2 years old	weight4	<b>age &gt;= 2 (FILTER)</b> <b>CSTABULATE</b> /TABLES VARIABLES= <b>b8010a</b> /CELLS POPSIZE TABLEPCT /STATISTICS SE CIN(95) COUNT /MISSING SCOPE=TABLE CLASSMISSING=EXCLUDE /SUBPOP TABLE= <b>state2</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>strata</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>gender</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>agegp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>race3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>maritalgp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>edu</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>work3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>hhincomegroup</b> DISPLAY=LAYERED

Variable name	Variable in SPSS	Definition of Variable	Population	Weight Variable	SPSS definition
Difficulty seeing and recognizing people (distance vision)	<b>b8011new</b> <ul style="list-style-type: none"> <li>▪ state2</li> <li>▪ strata</li> <li>▪ gender</li> <li>▪ agegp</li> <li>▪ race3</li> <li>▪ maritalgp</li> <li>▪ edu</li> <li>▪ work3</li> <li>▪ <b>hincomegroup</b></li> </ul>	Number of people who have moderate difficulty seeing and recognizing people from a distance of 20 metres in the past 30 days. This is measured using the question b8011.	≥7 years old	weight4	<b>COMPUTE</b> filter_\$(b8010a=1 b8010a=2 b8010a=3). /TABLES VARIABLES= <b>b8011</b> /CELLS POPSIZE TABLEPCT /STATISTICS SE CIN(95) COUNT /MISSING SCOPE=TABLE CLASSMISSING=EXCLUDE /SUBPOP TABLE= <b>state2</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>strata</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>gender</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>agegp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>race3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>maritalgp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>edu</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>work3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>hincomegroup</b> DISPLAY=LAYERED
Difficulty seeing and recognizing people (near vision)	<b>b8012new</b> <ul style="list-style-type: none"> <li>▪ state2</li> <li>▪ strata</li> <li>▪ gender</li> <li>▪ agegp</li> <li>▪ race3</li> <li>▪ maritalgp</li> <li>▪ edu</li> <li>▪ work3</li> <li>▪ <b>hincomegroup</b></li> </ul>	Number of people who able to see and recognise objects at arms' length or able to read in the past 30 days. This is measured using the question b8012.	≥7 years old	weight4	<b>COMPUTE</b> filter_\$(b8010a=1 b8010a=2 b8010a=3). /TABLES VARIABLES= <b>b8012</b> /CELLS POPSIZE TABLEPCT /STATISTICS SE CIN(95) COUNT /MISSING SCOPE=TABLE CLASSMISSING=EXCLUDE /SUBPOP TABLE= <b>state2</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>strata</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>gender</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>agegp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>race3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>maritalgp</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>edu</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>work3</b> DISPLAY=LAYERED /SUBPOP TABLE= <b>hincomegroup</b> DISPLAY=LAYERED



# TOPIC 2

## HEALTH SEEKING BEHAVIOUR





## 2.0 HEALTH SEEKING BEHAVIOUR

### *Contributors to this section:*

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## 2.1 AUTONOMY IN DECISION-MAKING

### 2.1.1 Findings

This section of the questionnaire received 28498 (100%) responses. It comprised two questions namely, who decided whether care needed to be sought and if so, from where and from whom.

The majority of the respondents reported that they themselves made the decision whether healthcare needed to be sought; 40.7% (95% CI, 39.6 - 41.8), followed by the mother (22.0% ; 95% CI, 21.1- 22.9) and the spouse (14.8% ; 95% CI, 14.1-15.5) (**Table 2.1** and **Table 2.2**).

Those who decided for themselves majority were from the age group of 25-29 years (68.7% ; 95% CI, 66.0 - 71.3) while mother decided mostly for those 19 years and below.

More males determined for themselves (47.6% ; 95% CI, 46.1 – 49.1); female respondents on the other hand reported that besides themselves (33.5% ; 95% CI, 32.3 – 34.7), the spouses determined whether healthcare need to be sought in 19.6% (95% CI, 18.7 – 20.6).

It was noted that those residing in urban areas the person himself/ herself decided to seek healthcare (43.1% ; 95% CI, 41.8 – 44.5) while those in the rural areas, decision by self was lower (34.6% ; 95% CI, 33.0 – 36.2) and other decision makers were the mother (24.0% ; 95% CI, 22.6 – 25.4), spouse (16.6% ; 95% CI, 15.5 – 17.9), child (5.0% ; 95% CI, 4.6 – 5.5) and an elder in the family (3.9% ; 95% CI, 3.4 – 4.4).

Majority of those with tertiary education level (71.2% ; 95% CI, 69.3 – 72.9) reported that they themselves decided.

A similar pattern was seen when asked who usually decided where and from whom the respondents should receive healthcare (Table 2.3). Majority made the decision themselves (40.5% ; 95% CI, 39.4 - 41.6). Mothers were the next highest decision-maker (20.9% ; 95% CI, 20.0 - 21.9). However, instead of the spouses, fathers had more autonomy in deciding the place or from whom to seek care, (15.0% ; 95% CI, 14.0 - 16.0).

Here, majority that decided for themselves in term of where and from whom they should seek care was from the 30-34 age group; 67.8% (95% CI, 65.2 - 70.2). It was noted to be significantly higher among the 15 – 29 age groups that the mother decided for the place and from whom to seek care, as compared to the older age groups.

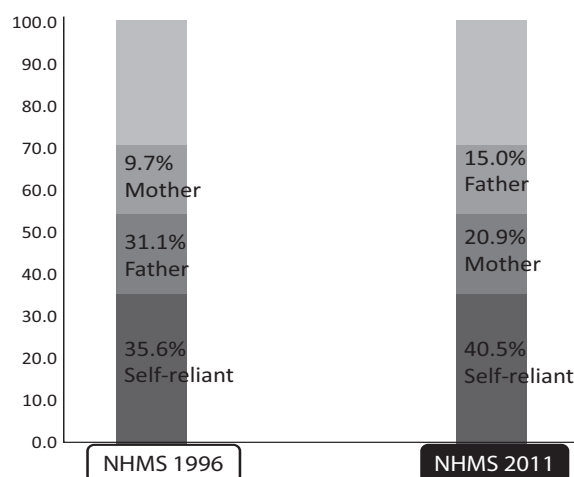
Self-decision making was significantly higher among males while females reported the spouse as the highest decision maker for where and from whom they should receive the healthcare, (20.0% ; 95% CI, 19.2 – 20.8)(Table 2.4).

**2.1.2 Implication**

Commonest decision maker in 2011 was the self. Comparison of the decision maker for “when to seek care” could not be done as this question was not addressed in NHMS 1996.

In determining where to seek health care, deciding for oneself was the commonest. The NHMS 1996 and NHMS 2011 reported this at 35.7% and 40.5% respectively. Mother as the decision maker was at the second place in NHMS 2011 at 20.9% as compared to the third place in NHMS 1996 at 9.7%. On the other hand, father had dropped from the second place in NHMS 1996 to the third spot at 31.1% to 15.0% respectively (Figure 2.1).

**Figure 2.1 : Determiner of where and from whom to seek care**



### 2.1.3 Conclusion

The findings showed that the majority of the respondents independently decided the need for care and selection of suitable provider for any health issue encountered. Therefore, an added advantage would be to equip themselves with sufficient health-related knowledge in helping them make better decisions.

### 2.1.4 Recommendation

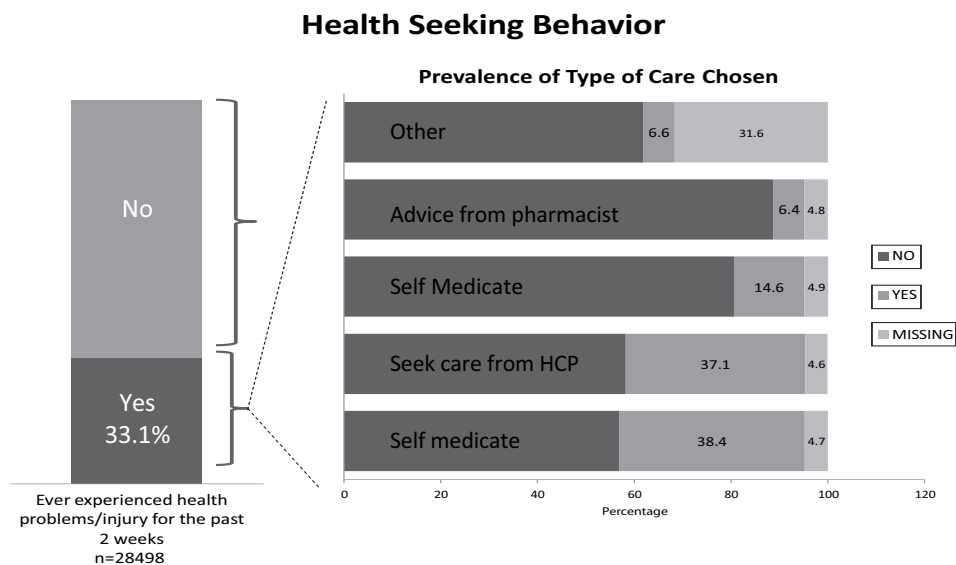
Provide more appropriate and interactive platforms to gain health-related knowledge in order to empower individuals who are now slightly more inclined towards self-decision on own health care needs.

## 2.2 HEALTH SEEKING BEHAVIOUR IN RELATION TO ACUTE ILLNESS/ DISABILITY

### 2.2.1 Findings

In this section, we identified people who experienced health problems within two weeks prior to the date of the interview. This corresponded to 33.1% (95% CI, 32.4 - 33.8) of the total respondents. This group of respondents was asked what was the action taken for their health problem(s). They were specifically asked whether they had self-medicated (38.4% did so; 95% CI, 37.2 - 39.7), seek treatment or advice from health care provider reported by (37.1% ; 95% CI, 35.9 – 38.4), purchase medicine after getting advice from pharmacist (14.6% ; 95% CI, 13.7 – 15.5), get advice from someone other than health care provider (6.4% ; 95% CI, 5.8 – 7.0) or whether they did anything else besides the above (6.6% ; 95% CI, 6.0 – 7.2). The results are in **Figure 2.2**.

**Figure 2.2: Prevalence of respondents with illness in the preceding two weeks to the interview and chosen type of care**



### 2.2.1.1 Self-medicate

A total of 3509 respondents, 38.4% (95% CI, 37.2 - 39.7) of those who experienced health problem within two weeks prior to interview reported they self-medicated (**Table 2.5** and **Table 2.6**). It was significantly higher in Sabah/Labuan and Putrajaya as compared to the other states. There was no significant difference across the age groups, gender, ethnicity, marital status, location, household income group categories and type of occupation

### 2.2.1.2 Seek treatment or advice from health care provider

Health care provider was defined as individual who was able to provide health service to patient regardless of whether it is a modern or an alternative treatment. Those providing modern health services include medical doctor, dentist or dental surgeon, pharmacist or pharmaceutical chemist, registered nurse professional/dental nurse, assistant medical office as well as certified midwife. Meanwhile those providing an alternative treatment include the traditional/complementary medicine practitioner (bomoh, masseur, dukun, sinseh, homeopathic practitioner, ayurvedic practitioner, faith healer, etc.)

The overall prevalence of those seeking treatment or advice from health care provider among those who had health problems within two weeks prior to the interview was 37.1% (95% CI, 35.9 - 38.4) (**Table 2.7**). It was significantly higher among those in the 0-4 age group as compared to the other age groups at 66.9% (95% CI, 63.2 - 70.4).

However, it was noted to be lowest among those who were still unmarried; 26.2% (95% CI, 23.9 – 28.6) as compared to those who are still married or were previously married. There was no significant difference across the states, age groups, gender, ethnicity, location, income ranged, type of healthcare coverage and occupation.

#### 2.2.1.2.1 Did not seek care from health care providers and perception on the necessity to seek care

Those who responded that they did not seek treatment or advice from healthcare provider following their illness corresponded to 5233 (58.3% ; 95% CI, 57.0 - 59.5) of the respondents as compared to 37.1% who sought. This group however, could have taken other type of action such as self-medication, purchasing medicine following pharmacist's advice, getting advice from someone other than health care provider or doing anything else.

On the necessity to seek care for that particular health problem, 20.8% (95% ; 95% CI, 19.5 - 22.2) reported that they perceived that it was actually necessary for them to seek treatment or advice from healthcare provider for their health problems at that time though they did not do so (**Table 2.8**).

#### **2.2.1.2.2 Reasons for not seeking care from health care providers**

Among the same respondents who reported that they did not seek care following their illness, 88.2% (95% CI, 87.1 - 89.3) gave at least one reason for not doing so. **Table 2.9** shows the proportion of respondents that stated reasons why they did not seek care.

It was noted that of the 5233 respondents that did not seek care though they might resort to the other type of care as stated before, 76.8% (95% CI, 75.3 -78.3) stated reason(s) while 23.2% (95% CI, 21.7 -24.7) did not state any (**Table 2.10**). There was no significant difference across the age groups, location, gender, ethnicity, marital status, education level, type of occupation and healthcare coverage. The top three reasons for not seeking treatment or advice from healthcare providers for health problems were due to the perception that their illness is not serious or severe (63.4% ; 95% CI, 61.1 - 65.6), the illness will resolve by itself (6.3% ; 95% CI, 5.2 -7.6), there was no need to (2.5% ; 95% CI, 2.0 -3.2) and they will go at later time (2.5% ; 95% CI, 2.0 - 3.2).

#### **2.2.1.3 Purchase medicine after getting advice from pharmacist**

A total of 1349 (14.6% ; 95% CI, 13.7 - 15.5) respondents reported that they purchased medicine after getting advice from pharmacist (**Table 2.11**). It was significantly higher in Penang (31.2% ; 95% CI, 24.6 – 38.8) and Sarawak (28.5% ; 95% CI, 24.4 – 33.1) as compared to the other states. There was no significant difference across the age groups, location, gender, ethnicity, marital status, education level, type of occupation and healthcare coverage.

#### **2.2.1.4 Seek advice from others**

A total of 682 (6.4% ; 95% CI, 5.8 - 7.0) respondents reported that they got advice from others, other than a health care provider for the illness reported (**Table 2.12**). The respondents were however not being asked to specify who was/were the 'others' here. There was no significant difference across the age groups, location, gender, ethnicity, marital status, education level, type of occupation and healthcare coverage.

### 2.2.1.5 Other than the above

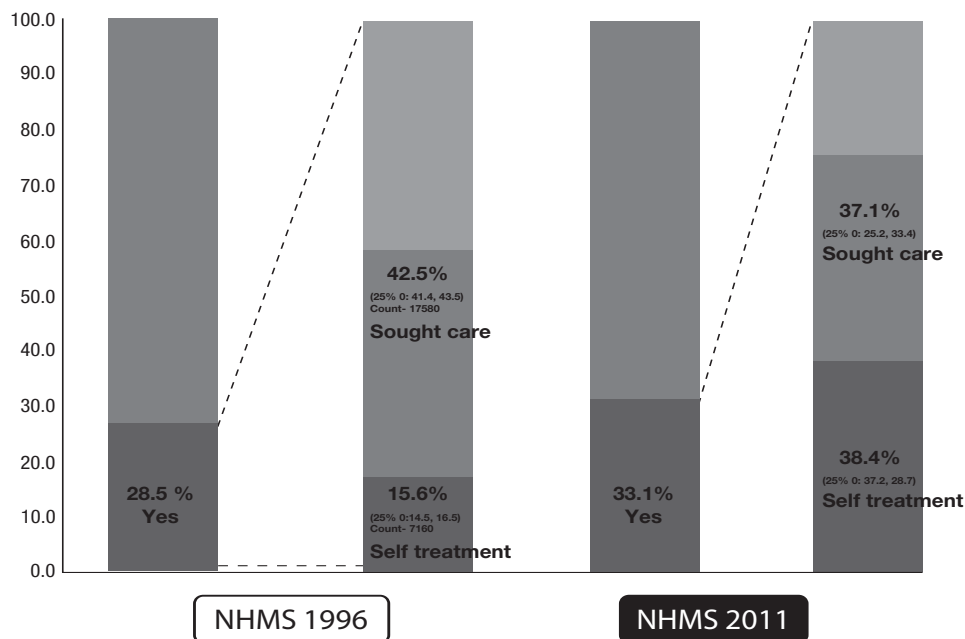
A total of 611 [6.6% (95% CI: 6.0, 7.2)] respondents reported that they did not seek any of the above type of care (**Table 2.13**). There was no significant difference across the age groups, location, gender, ethnicity, marital status, education level, type of occupation and healthcare coverage.

### 2.2.2 Implication

In NHMS 1996, it was reported that 15.6% (95% CI, 14.5 - 16.8) respondents self-medicated. The trend significantly increased in NHMS 2011 at 38.4% (95% CI, 37.2 - 39.7).

There was a significant decline in those who sought care from healthcare providers following their illness, from 42.5% (95% CI, 41.4 - 43.6) in NHMS 1996 to 37.1% (95% CI, 35.9 - 38.4) in NHMS 2011 (**Figure 2.3**).

**Figure 2.3: Comparison of prevalence in self-medication and seeking care from the healthcare provider between 1996 and 2011**



### 2.2.3 Conclusion

Self-medication had doubled in the past 15 years while seeking care from health care providers had significantly reduced from 42.5% to 37.1%.

The practice of self-medication may lead to delay in seeking treatment and hence certain critical or chronic illnesses are not diagnosed. Thus, it is imperative that this must be practiced in a safe and practical manner whereby after a specified time and under certain conditions, help from health care providers is mandatory.

Parents of children at young age will seek care from the healthcare provider.

#### 2.2.4 Recommendation

In the way forward, in empowering people to take care of their own health, it is extremely important that the population is equipped with the right information and knowledge to make sound decisions for medical care.

### 2.3 PREFERRED CHOICE OF PROVIDER

#### 2.3.1 Findings - In-patient Care

A total of 23084 (76.1% ; 95% CI, 74.4 - 77.7) respondents answered that they preferred to be admitted into a government health facility while 5120 respondents (22.8% ;95% CI, 21.2 - 24.4) and 37 respondents (0.1% ; 95% CI, 0.1 - 0.2) preferred the private health facility and traditional/complementary medicine provider (TCM) respectively (**Table 2.14**).

Those residing in the rural areas had significant preference for government health facilities, at 89.5% (95% CI, 87.8 – 91.0) while those who lived in the urban areas preferred the private (28.2% ; 95% CI, 26.1 – 30.3) (**Table 2.15**). The Bumiputeras inclusive of the Malays had significant preference for the government health facility as compared to the non-bumiputeras. It was noted that the Chinese had significantly lowest preference for the government health facility at 54.7% (95% CI, 51.2 – 58.1), yet still higher than the preference for the private, 43.6% (95% CI, 40.2 – 47.1).

Those with no formal education had the highest preference for the government at 87.2% (95% CI, 84.1 - 89.8) while those with tertiary education had the lowest preference at 59.1% (95% CI, 56.0 – 62.2) vice versa, those with tertiary education had the highest preference for the private facility at 40.1% (95% CI, 37.1 – 43.2) and respondents with no formal education had the lowest preference for this (10.2% ; 95% CI, 7.8 – 13.1). Those who reported working as private employees had significantly lowest preference for the government; 55.3% (95% CI, 51.8 - 58.8) respectively as compared to those working either in the government sector, self employed, unpaid worker/home maker or retiree.

Similarly those reported earning >RM5000 had significantly lowest preference for the government at 64.1% (95% CI, 62.4 – 65.6) as compared to the lower income. Those with income ranging from <RM400 – RM2999 had a lower preference for the private health facility as compared to those with income of RM3000 and above. There was no significant difference noted across the gender, age groups, marital status and between citizen and the non-citizen.

The reasons that usually influence respondents' choice of provider for in-patient treatment were (**Table 2.16**):

- Cost; reported by a total of 10318 respondents (34.4% ; 95% CI, 33.2 - 35.5).
- Distance or situated at a convenient location; reported by a total of 7657 respondents (26.5% ; 95% CI, 25.4 - 27.8).
- Familiarity, reported by a total of 4074 respondents (15.2% ; 95% CI, 14.3 - 16.1).

### 2.3.2 Findings - Out-patient Care

A total of 18398 respondents preferred to seek out-patient care from a government health facility; 59.6% (95% CI, 58.9 - 60.4) followed by private health facility with a total of 9812 respondents (39.4% ; 95% CI, 38.6 - 40.1) and traditional/ complementary medicine practitioner (TCM), 0.2% (95% CI, 0.2 - 0.3) (**Table 2.17**).

Those who chose the government health facilities, the majority were those of 70 years and above as compared to the lower age group. Similar to in-patient care preference, it was noted that Bumiputeras significantly preferred the government health facility. The Chinese had lowest preference for this (38.4% (95% CI, 35.4 – 41.6) and preferred the private health facility more at 60.0% (95% CI, 56.8 - 63.2).

It was noted that the widow/widower had the highest preference for the government out-patient healthcare facility (70.0% ; 95% CI, 66.8 – 72.9) as compared to those who were married or still single. In terms of education level, the majority of those with no formal education preferred the government health facility at 78.8% (95% CI, 75.1 – 82.0), compared to those with formal educational background. It was noted that those with tertiary education significantly preferred the private health institution, at 61.6% (95% CI, 58.9 – 64.1).

Private employees had the lowest preference for government facility at 46.1% (95% CI, 43.7 – 48.4), as compared to those who worked with the government, retiree and unpaid worker/ homemaker. Those working in the private sector were noted to have highest preference for the private health institution at 52.9% (95% CI, 50.6 – 55.2) (**Table 2.18**).

The majority with income of RM2999 and below preferred the government health facility while those with income of RM3000 and above preferred the private health institution. Those whose healthcare expenditure sponsored by their employer (inclusive of having a guarantee letter) preferred the government while those with private insurance preferred the private health facility (66.0% ; 95% CI, 63.4 – 68.6). No significant difference was noted between the two genders.



The reasons that usually influenced respondents' choice of provider for out-patient treatment were (**Table 2.19**)

- Cost; reported by a total of 8455 respondents (27.7% ; 95% CI, 26.6 - 28.8).
- Distance or situated at a convenient location; reported by a total of 7243 respondents (25.9% ; 95% CI, 24.7 - 27.0).
- Familiarity; reported by a total of 4640 (17.1% ; 95% CI , 16.2 - 18.0).

### 2.3.3 Implication

The findings showed that the government health facilities were provider for in-patient and out-patient care of choice due to their accessibility and affordability.

### 2.3.4 Conclusion

The government health care services were preferred over the others.

### 2.3.5 Recommendation

The government needs to explore the reasons that will persuade user to likely use one facility over the other which involved cost and accessibility. This might include providing a cheaper alternative and strengthening of the public transport to increase access.

## 2.4 PREVALENCE OF PROMOTIVE AND PREVENTIVE ACTIVITIES

The promotive and preventive care in this survey was classified into:

- Medical check-up such as screening of blood pressure, blood sugar level etc for the past 12 months.
- Family planning consultation for the past 12 months.
- Vaccination acquisition/administration for the past 12 months.
- Pap smear and mammogram examination for the past 12 months.

### 2.4.1 Findings

#### 2.4.1.1 Medical Check-Up for the Past 12-Months (All respondents)

A total of 8689 (37.8% ; 95% CI, 36.7 - 38.8) respondents reported that they underwent medical check-ups in the past 12 months (**Table 2.20**). Significant prevalence was among those aged 25 and above (**Table 2.21**). It was significantly higher among females (40.7% ; 95% CI, 39.5 – 41.8) as compared to the males. It was also noted to be higher in the urban location (38.7% ; 95% CI, 37.6 - 39.7) as compared to the rural areas. In addition, majority of those with tertiary education level went for medical check-up at 46.9% (95% CI, 44.6 - 49.2) as opposed to the others. There was no difference among the ethnicity.

#### **2.4.1.2 Family Planning Consultation For The Past 12 Months (18 Years And Above)**

A total of 797 (3.7% ; 95% CI, 3.3 - 4.1) went for family planning consultation. There was no significant difference across the age groups and ethnicity. As in medical check-ups, it was significantly higher among females as opposed to the male group. It was mostly done by married people (6.4% ; 95% CI, 5.9 – 7.0) as compared to those who were single and widow/widower. It was also noted to be high in the rural areas (4.9% ; 95% CI, 4.3 – 5.5) as opposed to those in the urban. Up-take of family planning consultation was highest among those with secondary and tertiary education level at 4.2% (95% CI, 3.7 - 4.7) and 5.1% (95% CI, 4.3 – 6.0) respectively as opposed to those with primary and no formal education (**Table 2.21**).

#### **2.4.1.3 Vaccination for the Past 12 Months (All respondents)**

A total of 3363 (11.7% ; 95% CI, 11.1 - 12.3) had vaccinations. Highest prevalence was in the 0-4 age group at 38.4% (95% CI, 36.2 - 40.6) as compared to the other age groups (**Table 2.21**). As for medical check-ups, it was significantly higher among females as opposed to the males. The prevalence was noted to be highest among those with primary education level (11.3% ; 95% CI, 10.5 – 12.2) as opposed to those with secondary and tertiary education. On the other hand, those with no formal education were noted to have significantly lowest prevalence of up taking of the vaccination (3.0% ; 95% CI, 2.1 – 4.3). There was no significant difference by location and ethnicity.

#### **2.4.1.4 Pap Smear Examination for the Past 12 Months (Females, 18 Years And Above)**

A total of 1251 (12.8% ; 95% CI, 11.9 - 13.8) respondents had Pap smear examination. Highest prevalence was seen among those within 40-44 age groups at 21.9% (95% CI, 18.7 - 25.1) as opposed to the other age groups (**Table 2.22**). There was no difference between those living in the rural and urban areas. Highest prevalence of the check-up was seen among the Chinese, 16.3% (95% CI, 14.3 - 18.6) as compared to the other ethnic group. Women with secondary and tertiary education level were the majority that went for the examination, 15.3% (95% CI, 14.0 - 16.8) and 12.7% (95% CI, 11.0 – 14.6) respectively as compared to women with primary or no formal education.

#### **2.4.1.5 Mammogram Examination for the Past 12 Months (Females, 40 Years And Above)**

A total of 588 (6.1% ; 95% CI, 5.5 - 6.7) had mammogram. There was no difference across the age groups, ethnicity, education level and between those living in the rural and urban locality (**Table 2.22**).

#### **2.4.2 Implication**

In NHMS 1996, 26.0% had Pap smear examination done as compared to 12.8% (95% CI, 12.0 - 13.7) in NHMS 2011. Highest prevalence was seen among those aged 35 - 50 in 1996 while those aged 40-44 years, in 2011. As for mammogram examination, in NHMS 1996, 3.7% reported they went for the screening and this percentage almost doubled (6.1% ; 95% CI, 5.5 - 6.7) over the 15 years. It was significantly higher in the urban location as compared to the rural area whereas there was no difference between the locations in this era. Nationwide community level data to compare the other health preventive and promotional activities were not available.

#### **2.4.3 Conclusion**

Prevalence for the health preventive and promotional activities is still less than half of the population. Pap smear had declined to half that reported 15 years ago. Mammogram however showed an increase to almost double compared to 1996.

#### **2.4.4 Recommendation**

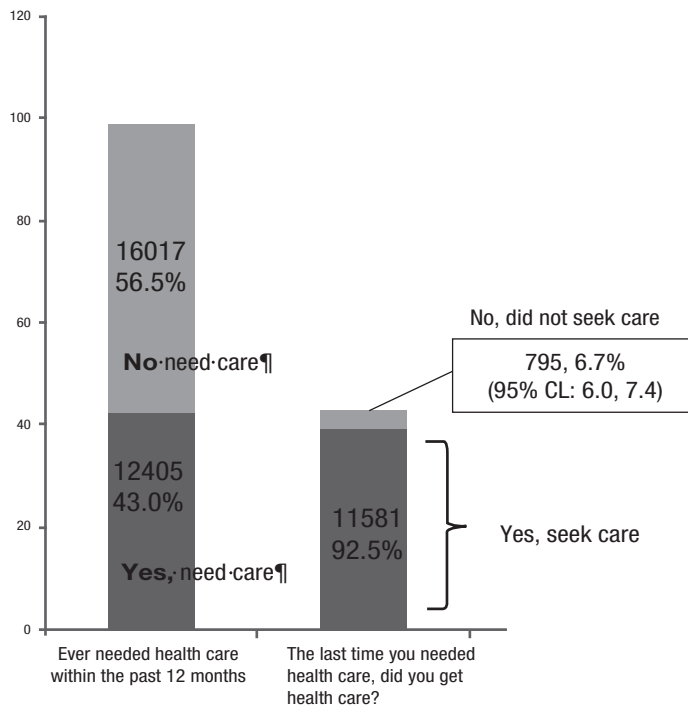
More targeted health campaigns should be implemented; for example to improve Pap Smear uptake, to encourage engagement with the health preventive and promotional activities.

## 2.5 BARRIERS TO SEEKING CARE

### 2.5.1 Findings

A total of 12405 (43.0%) respondents reported that they had needed healthcare in the past 12 months, but did not seek it; 6.7% (95% CI, 6.0 - 7.4) (Figure 2.4).

Figure 2.4: Prevalence of unmet need for health care



Top three reasons identified as barriers to healthcare were the perception that they were not sick enough (70.8% ; 95% CI, 66.9 - 74.4), could not take time off work or have other commitment (24.8% ; 95% CI, 20.9 - 29.0), other unspecified reasons (9.8% (95% CI, 7.7 - 12.2) in Table 2.23 and Table 2.24.

### 2.5.2 Implication

In NHMS 1996, the top five reasons for not seeking care were related to severity of the illness (76.6%), ability to self-medicate (6.1%), unavailability of time to seek treatment (5.2%), perceived necessity to seek treatment (2.3%) and accessibility [distance, travel time, convenience] (3.6%). In contrast, in NHMS 2011 the perception that they were not sick enough (70.8%), could not take time off work or have other commitment (24.8%), other unspecified reasons (9.8%), unable to afford cost of treatment (8.8%) and no available transport (8.0%).

### 2.5.3 Conclusion

Majority of the population still resorted to health care in response to their health need. However, the perception on the severity of illness and availability of time to obtain the needed care will influence the decision whether care would be sought or not.

### 2.5.4 Recommendation

Perception, commitment, work and other unspecified reasons are factors that need to be looked into since they would influence the likelihood of seeking care.

## 2.6 RISKY BEHAVIOUR

### 2.6.1 Prevalence Of “Ever” Smoker [Shisha, Cigarettes, Cigars, Pipes, Etc]

There were 5715 (24.8% ; 95% CI, 24.1 - 25.5) respondents who had smoked shisha, cigarettes, cigars or pipes while 74.3% (95% CI, 73.6 – 75.0) which is equivalent to 18 747 respondents had never smoked.

The prevalence of those who ever smoke in Malaysia can be seen in **Table 2.25**. Smoking was noted to be significantly high among the males at 45.7% (95% CI, 44.5 – 46.9) as compared to the females. It was also noted to be high in the rural area at 27.5% (95% CI, 26.4 – 28.7) as compared to the urban area. Selangor was noted to have a significantly highest ever smoker as compared to the other states. Those within the 10 – 19 age group reported the lowest prevalence of ever smoker as compared to the other higher age groups. Bumiputras were noted to have higher prevalence of ever smoker as compared to the other ethnics.

Those who were married were noted to have significantly higher prevalence as compared to those who did not have a partner at 31.4% (95% CI, 30.4 – 32.5). It was noted that highest rate of ever smoker were those with tertiary education and lowest was among those with no formal or primary education.

### 2.6.2 Prevalence Of Current Smoker [Shisha, Cigarettes, Cigars, Pipes, Etc]

There were 4354 (19.3% ; 95% CI, 18.7 – 20.0) respondents who are currently still smoked shisha, cigarettes, cigars or pipes while 80.7% (95% CI, 80.0 – 81.3) had never smoked.

Similarly to ever smoker, current smoker was also significantly high among the males at 36.4% (95% CI, 35.2 – 37.5) as compared to the females. It was also high in the rural area at 21.7% (95% CI, 20.6 – 22.8) as compared to the urban area. It was highest between the 20 – 59 age groups as compared to the other two extremes age groups. Bumiputras were noted to have higher prevalence of current smoker as compared to the other ethnicities. Widow/widower were noted to have significantly lower prevalence as compared to those who were single and married at 9.3% (95% CI, 7.6 – 11.4). It was noted that highest current smoker has secondary education level as opposed to those with no formal education, primary and tertiary education. **Table 2.26** illustrated the sociodemographic characteristics of the current smoker in detail.

### 2.6.3 Daily Smoker Of Shisha, Cigarettes, Cigars, Pipes, Etc

There were 3999 (17.6% ; 95% CI, 16.9 – 18.2) respondents who smoked shisha, cigarettes, cigars or pipes daily while 82.4% (95% CI, 81.8 – 83.1) had never smoked.

Similarly to the ever smoker and current smoker, daily smoker was also significantly high among the males at 33.3% (95% CI, 32.2 – 34.4) as compared to the females. It was also high in the rural area at 20.1% (95% CI, 19.1 – 21.1) as compared to the urban area. It was highest between the 20 – 44 age groups as opposed to the other age groups. Bumiputras were noted to have higher prevalence of daily smoker as compared to the other ethnics. Widow/widower were noted to have significantly lower prevalence as compared to those who were single and married at 8.7% (95% CI, 7.0 – 10.7). It was noted that highest daily smoker has secondary education level as opposed to those with no formal education, primary and tertiary education. **Table 2.27** illustrated the sociodemographic characteristics of the daily smoker in detail.

Among the daily smokers, 45.7 % (95% CI, 42.4 – 49.0) had been advised by healthcare providers to stop smoking.

### 2.6.4 Implication

Overall trend for current smoker had slowly declined over the period of 15 years (**Figure 2.5**). People reported to start smoking or even tried smoking as early as 10 years old.

Type of smoker	NHMS1996	WHS2002	NHMS2006 <sup>1</sup>	GATS2011 <sup>1</sup>	NHMS2011 <sup>2</sup>
Ever smoker	30.6%	-	27.0% (CI, 26.4 – 27.5)	-	24.8% (95% CI, 24.1 - 25.5)
Current smoker	24.8%	-	21.5% (CI, 21.0 – 22.0)	22.9%	19.3% (95% CI, 18.7 – 20.0)
Daily smoker	-	20.2% (CI, 18.7 – 21.7)	-	20.6%	17.6% (95% CI, 16.9 – 18.2)

<sup>1</sup>Cigarettes smokers only  
<sup>2</sup>Inclusive of cigarettes, shisha and cigars

**Figure 2.5: Prevalence of smoker over 15 years**

### 2.6.5 Conclusion

Smoking prevalence declined steadily to almost half of its reported value 15 years ago.

### 2.6.6 Recommendation

In-depth evaluation should be done to determine the reasons of the slow reduction in prevalence of smoker. This might assist in designing more effective and efficient strategies.

## 2.7 LIST OF TABLES

Table 2.1: Autonomy in deciding whether care need to be sought

Decider of when need to seek care	Count	Estimated population	Proportion (%)	95% CI	
				Lower	Upper
<b>TOTAL RESPONDENT (Overall sample)</b>	<b>28,498</b>	<b>27,278,956</b>	<b>100.0</b>	-	-
Spouse	4,625	4,026,168	14.8	14.1	15.5
Father	4,140	3,792,217	13.9	13.2	14.7
Mother	6,162	5,994,937	22.0	21.1	22.9
Child	1,531	1,101,768	4.0	3.7	4.4
An elder in the family	849	848,871	3.1	2.8	3.5
Self	10,796	11,104,086	40.7	39.6	41.8
Employer	179	214,194	0.8	0.6	1.0
Insurance	-	-	-	-	-
Other	143	119,274	0.4	0.4	0.5

Note: Missing values are not included

95% CI = 95% Confidence Interval

"Count" = number of respondents who answered affirmative for this section, and this is not the total sample unless otherwise stated.

Table 2.2: Three most influential decision-maker in deciding whether care need to be sought by sociodemographic characteristics

Sociodemographics characteristics	Self				Mother				Spouse						
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI	
				Lower	Upper				Lower	Upper				Lower	Upper
<b>MALAYSIA</b>	10,796	11,104,086	40.7	39.6	41.8	6,162	5,994,937	22.0	21.1	22.9	4,625	4,026,168	14.8	14.1	15.5
<i>Relationship to the head of household<sup>1</sup></i>															
Head of household	5,142	5,125,978	73.1	71.5	74.7	32	36,882	0.5	0.3	0.9	1,346	1,205,806	17.2	15.8	18.7
Spouse	2,191	1,961,376	45.3	43.2	47.4	19	15,561	0.4	0.2	0.7	2521	2,089,857	48.3	46.2	50.4
Parents	7	7,610	1.3	0.5	3.4	69	66,831	11.7	8.3	16.2	11	14,747	1.3	0.9	6.9
Child	2,098	2,442,055	21.2	19.8	22.6	5178	5,082,810	44.1	42.3	45.9	420	402,731	3.5	2.9	4.2
Grandparents	3	2,001	5.1	1.3	18.0	16	17,446	44.5	24.4	66.5	-	-	-	-	-
Grandchild	59	55,441	4.5	3.0	6.5	655	574,561	46.2	41.4	51.1	42	30,932	2.5	1.6	3.9
Siblings	237	255,134	63.2	55.9	70.0	21	28,740	7.1	4.1	12.0	18	15,204	3.8	2.2	6.4
Parent-in-law	32	31,096	24.6	15.1	37.3	1	194	0.2	0.0	1.1	13	16,204	12.8	6.8	22.9
Son/daughter-in-law	221	255,752	54.9	49.0	60.7	4	4,445	1.0	0.2	3.8	189	183,201	39.3	34.0	45.0
Brother/sister-in-law	108	124,818	63.1	52.5	72.6	7	7,224	3.7	1.6	7.9	19	18,991	9.6	5.7	15.9
Other relatives	132	183,569	42.9	34.0	52.2	82	81,610	19.1	14.0	25.4	11	13,110	3.1	1.5	6.2
Friend	337	427,441	80.5	72.6	86.6	11	10,771	2.0	0.9	4.5	6	6,892	1.3	0.5	3.3
Workers	28	26,926	21.7	13.1	33.8	1	1,665	1.3	0.2	9.1	-	-	-	-	-
Others	22	27,610	47.2	27.4	68.0	19	12,020	20.6	11.1	34.9	-	-	-	-	-
<b>Location</b>															
Urban	6,623	8,410,672	43.1	41.8	44.5	3,498	4,128,769	21.2	20.0	22.4	2,491	2,731,025	14.0	13.2	14.9
Rural	4,173	2,693,413.5	34.6	33.0	36.2	2,664	1,866,168	24.0	22.6	25.4	2,134	1,295,143	16.6	15.5	17.9
<b>Sex</b>															
Male	6,078	6,643,571	47.6	46.1	49.1	3,042	3,007,642	21.5	20.4	22.7	1,542	1,410,831	10.1	9.3	10.9
Female	4,718	4,460,515	33.5	32.3	34.7	3,120	2,987,295	22.4	21.4	23.5	3,083	2,615,337	19.6	18.7	20.6
<b>Age group (years)</b>															
0-4	6	6,783	0.3	0.1	0.7	1,517	1,281,597	54.2	51.9	56.4	115	95,781	4.1	3.3	4.9
5-9	7	8,846	0.3	0.1	0.8	1,585	1,429,637	55.1	52.9	57.2	107	99,928	3.9	3.1	4.7
10-14	58	51,489	2.0	1.4	2.7	1,548	1,431,994	54.2	52.0	56.5	38	35,017	1.3	0.9	1.9
15-19	489	518,403	18.9	17.1	20.8	1,026	1,214,209	44.2	41.7	46.8	48	59,184	2.2	1.6	2.99
20-24	1,279	1,629,366	60.1	57.3	62.7	327	458,608	16.9	14.9	19.1	185	225,480	8.3	7.0	9.9
25-29	1,414	1,790,372	68.7	66.0	71.3	94	118,217	4.5	3.3	6.1	436	505,655	19.4	17.4	21.6
30-34	1,244	1,416,544	68.6	66.0	71.0	25	24,303	1.18	0.8	1.83	538	538,010	26.0	23.8	28.4



Sociodemographics characteristics	Self				Mother				Spouse						
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI	
				Lower	Upper				Lower	Upper				Lower	Upper
<b>MALAYSIA</b>	<b>10,796</b>	<b>11,104,086</b>	<b>40.7</b>	<b>39.6</b>	<b>41.8</b>	<b>6,162</b>	<b>5,994,937</b>	<b>22.0</b>	<b>21.1</b>	<b>22.9</b>	<b>4,625</b>	<b>4,026,168</b>	<b>14.8</b>	<b>14.1</b>	<b>15.5</b>
35 – 39	1,136	1,247,256	67.6	64.9	70.2	14	12,868	0.7	0.4	1.31	582	518,435	28.1	25.7	30.7
40 – 44	1,160	1,116,029	64.7	61.9	67.4	10	9,199	0.5	0.3	1.1	591	530,284	30.7	28.2	33.4
45 – 49	1,123	1,038,892	66.2	63.4	68.8	5	4,685	0.3	0.2	0.8	580	453,994	28.9	26.4	31.5
50 – 54	985	802,475	61.1	58.2	63.9	5	7,239	0.6	0.1	2.1	533	380,691	29.0	26.4	31.7
55 – 59	802	605,581	58.9	55.7	62.1	2	1,148	0.1	0.0	0.5	398	247,283	24.1	21.5	26.9
60 – 64	495	398,505	51.6	47.7	55.5	1	191	0.02	0.0	0.2	227	161,559	20.9	17.9	24.2
65 – 69	299	249,127	49.9	44.9	54.9	-	-	-	-	-	126	85,712	17.2	13.9	21.0
70 – 74	183	136,322	37.0	30.9	43.6	2	460	0.1	0.0	0.5	76	56,293	15.3	11.7	19.7
75+	116	88,096	20.7	16.6	25.5	1	583	0.1	0.0	1.0	45	32,862	7.7	5.5	10.7
<b>Ethnicity</b>															
Malay	5,885	5,201,040	36.5	35.6	37.4	3,792	3,264,339	22.9	22.1	23.7	3,011	2,397,792	16.8	16.2	17.5
Chinese	2,299	3,176,239	50.2	48.4	51.9	890	1,167,142	18.4	17.2	19.8	636	689,190	10.88	9.9	11.9
Indian	815	714,064	38.9	36.2	41.7	335	329,792	18.0	15.9	20.3	347	283,921	15.47	13.5	17.7
Other Bumiputeras	1,107	1,228,239	37.2	35.0	39.5	878	1,045,268	31.7	29.4	34	394	407,017	12.3	11.0	13.8
Others	690	784,504	50.4	46.5	54.2	267	188,396	12.1	10.1	14.5	237	248,247	15.9	13.4	18.8
<b>Marital Status<sup>1</sup></b>															
Single	3,010	3,551,111	44.9	43.4	46.4	2,007	2,293,809	29.0	27.6	30.4	32	38,597	0.5	0.3	0.7
Married	7,119	7,034,727	60.2	59.2	61.3	56	62,258	0.5	0.4	0.8	4,330	3,755,425	32.2	31.2	33.2
Widow/widower/ divorcee	641	490,926	45.8	42.6	49.0	3	2,369	0.2	0.1	0.8	7	4,632	0.4	0.2	1.0
<b>Education Level</b>															
No formal education	537	426,695	35.0	31.9	38.2	73	96,230	7.9	6.1	10.2	270	207,871	17.1	14.8	19.6
Primary	2,223	2,056,071	28.7	27.4	30.1	1,996	1,871,599	26.1	24.9	27.4	1,243	1,005,266	14.0	13.1	15.0
Secondary	5,152	5,404,406	55.7	54.4	57.0	971	1,148,676	11.8	11.0	12.8	2,201	1,969,321	20.3	19.3	21.3
Tertiary	2,707	3,028,361	71.2	69.3	72.9	206	256,647	6.03	5.1	7.1	700	657,944	15.5	14.2	16.8
Unclassified	169	177,667	10.9	9.18	12.9	810	809,624	49.7	46.8	52.7	53	48,530	2.98	2.17	4.09
<b>Occupation</b>															
Government /Semi- government	1,523	1,292,301	71.4	68.8	73.8	26	31,139	1.72	1.08	2.73	544	444,043	24.5	22.2	27.0
Private employee	4,036	4,874,803	69.6	68.1	71.1	299	431,426	6.2	5.4	7.1	935	995,256	14.2	13.2	15.3
Self employed	2,340	2,241,081	66.7	64.6	68.8	119	156,547	4.7	3.5	6.2	905	721,843	21.5	19.9	23.2
Unpaid worker/home maker	1,266	1,158,722	42.0	39.9	44.1	27	32,092	1.16	0.7	1.9	1,461	1,207,199	43.8	41.7	45.9
Retiree	668	537,156	40.4	37.3	43.5	1	171	0.01	0.0	0.1	293	224,070	16.8	14.7	19.2

Sociodemographics characteristics	Self				Mother				Spouse						
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI	
				Lower	Upper				Lower	Upper				Lower	Upper
<b>MALAYSIA</b>	<b>10,796</b>	<b>11,104,086</b>	<b>40.7</b>	<b>39.6</b>	<b>41.8</b>	<b>6,162</b>	<b>5,994,937</b>	<b>22.0</b>	<b>21.1</b>	<b>22.9</b>	<b>4,625</b>	<b>4,026,168</b>	<b>14.8</b>	<b>14.1</b>	<b>15.5</b>
<i>Household Income group (RM)</i>															
Less than RM400	680	649,043	32.2	29.8	34.7	591	606,752	30.1	27.7	32.6	277	237,670	11.8	10.3	13.5
RM400 – RM499	134	1,15,981	27.9	22.8	33.7	112	1,25,671	30.2	24.1	37.1	73	53,359	12.8	9.69	16.8
RM500 – RM699	389	344,361	36.6	33.0	40.3	284	237,365	25.2	22.1	28.5	185	143,212	15.2	12.7	18.0
RM700 – RM999	639	588,858	35.6	32.8	38.4	445	425,718	25.7	23.3	28.3	355	286,796	17.3	15.3	19.5
RM1000 – RM1999	2,134	1,964,026	38.5	36.9	40.2	1,308	1,168,007	22.9	21.5	24.4	1,034	827,479	16.2	15.1	17.4
RM2000 – RM2999	1,801	1,812,760	39.5	37.7	41.3	1,040	1,012,388	22.0	20.6	23.6	823	706,712	15.4	14.2	16.7
RM3000 – RM3999	1,463	1,575,505	42.7	40.7	44.8	707	722,965	19.6	18.1	21.2	620	543,871	14.7	13.4	16.2
RM4000 – RM4999	1,050	1,211,918	45.6	43.0	48.1	476	482,077	18.1	16.4	20.0	379	382,149	14.4	12.7	16.2
RM5000 and above	2,506	2,841,633	45.7	44.1	47.4	1,199	1,213,994	19.5	18.3	20.8	879	844,919	13.6	12.6	14.7

Note: Caution some cells have counts less than 30. Results should be interpreted with caution.

95% CI = 95% Confidence Interval

"Count" = number of respondents who answered affirmative for this section, and this is not the total sample unless otherwise stated.  
1 not including "missing"

**Table 2.3: Autonomy in deciding where or from whom care should be obtained**

Decider of where or from whom care should be obtained	Count	Estimated population	Proportion (%)	95% CI	
				Lower	Upper
<b>TOTAL (Overall sample)</b>	<b>28,498</b>	<b>27,278,956</b>	<b>100.0</b>	-	-
Spouse	4,623	3,780,914	14.6	14.0	15.3
Father	4,432	4,043,905	15.0	14.0	16.0
Mother	5,865	5,711,628	20.9	20.0	21.9
Child	1,601	1,143,769	4.2	3.9	4.5
An elder in the family	852	847,830	3.1	2.8	3.5
Self	10,675	11,038,648	40.5	39.4	41.6
Employer	227	286,416	1.0	0.7	1.5
Insurance	-	-	-	-	-
Other	143	125,977	0.5	0.4	0.6

Missing values are not included; 95% CI = 95% Confidence Interval

"Count" = number of respondents who answered affirmative for this section, and this is not the total sample unless otherwise stated.

**Table 2.4: Three most influential decision-maker in deciding where and from whom care should be obtained by sociodemographic characteristics**

Sociodemographics characteristics	Self				Mother				Father						
	Count	Estimated population	Prevalence (%)		Count	Estimated population	Prevalence (%)		Count	Estimated population	Prevalence (%)				
			Lower	Upper			Lower	Upper			Lower	Upper			
<b>MALAYSIA</b>	<b>10,675</b>	<b>11,038,648</b>	<b>40.5</b>	<b>39.4</b>	<b>41.6</b>	<b>5,865</b>	<b>5,711,628</b>	<b>20.9</b>	<b>20.0</b>	<b>21.9</b>	<b>4,432</b>	<b>4,043,905</b>	<b>15.0</b>	<b>14.0</b>	<b>16.0</b>
<i>Relationship to the head of household</i>															
Head of household	5,152	5,141,158	73.3	71.7	75.0	31	29,354	0.4	0.2	0.7	26	25,972	0.4	0.2	0.6
Spouse	2,081	1,908,018	44.1	42.0	46.2	23	19,573	0.5	0.3	0.8	31	24,632	0.6	0.4	0.9
Parents	105	99,722	17.5	13.6	22.1	81	81,428	14.3	10.2	19.7	68	66,855	11.7	8.3	16.2
Child	2,079	2,430,780	21.1	19.7	22.5	4,926	4,849,951	42.1	40.3	43.8	3,837	3,478,784	30.2	28.6	31.8
Grandparents	3	2,001	5.1	1.3	18.0	16	17,446	44.5	24.4	66.5	1	905	2.3	0.3	15.2
Grandchild	60	57,459	4.6	3.2	6.7	625	550,979	44.3	39.5	49.3	352	317,893	25.6	21.0	30.7
Siblings	240	261,723	64.9	57.5	71.5	18	22,220	5.5	3.2	9.4	15	23,849	5.9	2.8	12.1
Parent-in-law	31	29,379	23.2	14.0	36.0	-	-	-	-	-	-	-	-	-	-
Son/daughter-in-law	228	262,556	56.4	50.8	61.8	3	3,634	0.8	0.1	4.0	4	1,352	0.3	0.1	1.0
Brother/sister-in-law	109	124,192	62.8	52.2	72.3	4	4,348	2.2	0.7	6.3	2	1,160	0.6	0.1	2.8
Other relatives	134	187,309	43.8	34.9	53.0	81	76,875	18.0	12.9	24.4	45	51,569	12.0	6.7	20.8
Friend	328	405,647	76.4	65.4	84.8	11	10,023	1.9	0.9	4.1	12	16,936	3.2	0.8	12.1
Workers	26	22,679	18.3	9.7	32.0	1	1,665	1.3	0.2	9.1	-	-	-	-	-
Others	21	18,972	32.5	18.0	51.3	18	13,007	22.2	11.9	37.6	11	7,289	12.5	5.2	27.2
<i>Location</i>															
Urban	6,544	8,350,297	42.8	41.5	44.2	3377	3,953,011	20.3	19.1	21.5	2,460	2,834,364	14.5	13.6	15.6
Rural	4,131	2,688,350	34.5	32.9	36.2	2488	1,758,617	22.6	21.3	23.9	1,972	1,209,541	15.5	14.4	16.8
<i>Sex</i>															
Male	6,116	6,663,935	47.7	46.2	49.2	2,856	2,821,081	20.2	19.1	21.3	2,288	2,114,944	15.2	14.3	16.1
Female	4,559	4,374,712	32.8	31.6	34.1	3,009	2,890,547	21.7	20.7	22.8	2,144	1,928,961	14.5	13.6	15.4
<i>Age group (years)</i>															
0-4	8	8,614	0.4	0.2	0.8	1,459	1,231,372	52.0	49.8	54.3	1,044	893,006	37.7	35.5	40.0
5-9	7	8,846	0.3	0.1	0.8	1,523	1,388,656	53.5	51.3	55.7	1,090	936,977	36.1	34.0	38.2
10-14	49	43,722	1.7	1.2	2.3	1,478	1,371,083	51.9	49.7	54.2	1,164	1,012,185	38.3	36.2	40.5
15-19	465	492,974	18.0	16.2	19.8	986	1,176,514	42.8	40.3	45.4	785	832,449	30.3	28.1	32.7
20-24	1,289	1,657,883	61.1	58.4	63.8	284	398,601	14.7	12.8	16.8	220	238,369	8.8	7.5	10.3
25-29	1,423	1,797,004	69.0	66.3	71.5	78	95,784	3.7	2.6	5.2	59	68,881	2.6	1.9	3.8
30-34	1,223	1,399,990	67.8	65.2	70.2	20	21,435	1.04	0.6	1.7	20	14,974	0.7	0.4	1.22
35-39	1,119	1,225,082	66.4	63.7	69.1	11	11,835	0.6	0.3	1.3	11	10,856	0.6	0.3	1.2

Sociodemographics characteristics	Self					Mother					Father					
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI		
				Lower	Upper				Lower	Upper				Lower	Upper	
<b>MALAYSIA</b>	<b>10,675</b>	<b>11,038,648</b>	<b>40.5</b>	<b>39.4</b>	<b>41.6</b>	<b>5,865</b>	<b>5,711,628</b>	<b>20.9</b>	<b>20.0</b>	<b>21.9</b>	<b>4,432</b>	<b>4,043,905</b>	<b>15.0</b>	<b>14.0</b>	<b>16.0</b>	
40 – 44	1,163	1,121,446	65.0	62.2	67.7	9	7,730	0.4	0.2	0.9	16	13,708	0.8	0.4	1.5	
45 – 49	1,093	1,026,811	65.4	62.6	68.1	5	3,568	0.2	0.1	0.6	15	14,434	0.9	0.5	1.7	
50 – 54	978	800,594	61.0	58.1	63.8	8	3,072	0.2	0.1	0.6	4	3,807	0.3	0.1	0.8	
55 – 59	795	601,329	58.5	55.3	61.7	1	412	0.04	0.0	0.3	4	4,259	0.4	0.1	1.4	
60 – 64	486	392,700	50.8	46.9	54.7	1	191	0.02	0.0	0.2	-	-	-	-	-	
65 – 69	296	243,855	48.9	43.9	53.9	-	-	-	-	-	-	-	-	-	-	
70 – 74	178	135,925	36.9	30.7	43.5	1	288	0.1	0.0	0.6	-	-	-	-	-	
75+	103	81,873	19.2	15.2	24.0	1	1,083	0.3	0.0	1.2	-	-	-	-	-	
<b>Ethnicity</b>																
Malay	5,798	5,160,187	36.2	35.0	37.5	3,545	3,064,076	21.5	20.4	22.6	3,074	2,497,359	17.5	16.5	18.6	
Chinese	2,282	3,171,961	50.1	48.0	52.2	872	1,127,945	17.8	16.2	19.5	563	739,770	11.7	10.3	13.3	
Indian	832	743,324	40.5	37.4	43.7	319	308,103	16.8	14.4	19.6	375	336,235	18.3	15.9	21.0	
Others Bumiputera	1,099	1,213,971	36.8	34.6	39.1	858	1,018,503	30.9	28.6	33.2	300	362,182	11.0	9.49	12.7	
Others	664	749,204	48.1	41.7	54.5	271	193,001	12.4	9.1	16.6	245	108,359	15.9	12.8	19.5	
<b>Marital Status</b>																
Single	3,001	3,561,975	45.0	43.5	46.6	1,888	2,158,275	27.3	26.0	28.7	1,533	1,546,977	19.6	18.4	20.7	
Married	7,034	6,972,784	59.7	58.6	60.8	50	52,735	0.5	0.3	0.7	58	54,426	0.5	0.3	0.6	
Widow/widower/ divorcee	613	475,943	44.4	41.2	47.6	4	2,521	0.2	0.1	0.8	4	1,952	0.2	0.1	0.6	
<b>Education Level</b>																
No formal education	506	406,366	33.3	30.3	36.5	71	93,716	7.7	5.89	9.97	41	44,088	3.6	2.4	5.5	
Primary	2,179	2,038,547	28.5	27.2	29.8	1,914	1,788,517	25.0	23.8	26.2	1,512	1,346,337	18.8	17.8	19.9	
Secondary	5,119	5,388,744	55.5	54.2	56.8	904	1,072,515	11.1	10.2	12	735	737,926	7.6	7.0	8.3	
Tertiary	2,693	3,013,191	70.8	69.0	72.6	183	228,817	5.4	4.49	6.4	168	207,877	4.9	4.0	5.9	
Unclassified	168	179,084	11.0	9.3	13.0	758	774,950	47.6	44.7	50.5	544	481,094	29.6	27.1	32.2	
<b>Occupation</b>																
Government /Semi government	1,514	1,281,522	70.8	68.1	73.2	22	26,918	1.5	0.9	2.5	21	17,057	0.9	0.6	1.6	
Private employee	4,057	4,912,016	70.2	68.6	71.7	264	379,125	5.4	4.7	6.3	222	274,729	3.9	3.3	4.7	
Self employed	2,319	2,238,795	66.7	64.6	68.7	100	131,382	3.9	2.8	5.4	81	73,339	2.2	1.7	2.9	
Unpaid worker/home maker	1,192	1,113,372	40.4	38.3	42.5	25	31,452	1.1	0.7	1.8	49	46,139	1.7	1.2	2.4	
Retiree	660	529,077	39.8	36.7	42.9	1	1,083	0.1	0.0	0.6	1	833	0.1	0.0	0.4	

Sociodemographics characteristics	Self					Mother					Father				
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI	
				Lower	Upper				Lower	Upper				Lower	Upper
<b>MALAYSIA</b>	<b>10,675</b>	<b>11,038,648</b>	<b>40.5</b>	<b>39.4</b>	<b>41.6</b>	<b>5,865</b>	<b>5,711,628</b>	<b>20.9</b>	<b>20.0</b>	<b>21.9</b>	<b>4,432</b>	<b>4,043,905</b>	<b>15.0</b>	<b>14.0</b>	<b>16.0</b>
<b>Household Income group (RM)</b>															
Less than RM400	660	639,120	31.7	29.3	34.2	573	592,773	29.4	27.0	31.9	240	216,819	10.8	9.24	12.5
RM400 – RM499	133	119,262	28.7	23.5	34.5	109	120,594	29.0	22.9	35.9	48	53,371	12.8	8.59	18.7
RM500 – RM699	374	336,543	35.7	32.2	39.5	276	231,694	24.6	21.6	27.9	150	11,782	12.5	10.5	14.8
RM700 – RM999	621	580,500	35.1	32.3	37.9	421	406,903	24.6	22.2	27.1	254	204,013	12.3	10.7	14.1
RM1000 – RM1999	2,116	1,963,851	38.5	36.9	40.2	1,233	1,114,355	21.9	20.5	23.3	981	755,312	14.8	13.8	15.9
RM2000 – RM2999	1,792	1,818,752	39.6	37.8	41.4	960	921,781	20.1	18.7	21.5	792	759,869	16.5	15.3	17.9
RM3000 – RM3999	1,442	1,546,442	41.9	39.9	44.0	693	715,144	19.4	17.9	21.0	635	618,764	16.8	15.3	18.3
RM4000 – RM4999	1,041	1,195,734	45.0	42.4	47.5	447	438,857	16.5	14.9	18.3	385	399,219	15.0	13.3	16.9
RM5000 and above	2,496	2,838,443	45.7	44.1	47.3	1,153	1,169,528	18.8	17.6	20.1	947	918,715	14.8	13.7	15.9

Note: Caution some cells have count less than 30. Results should be interpreted with caution.

95% CI = 95% Confidence Interval

"Count" = number of respondents who answered affirmative for this section, and this is not the total sample unless otherwise stated.

**Table 2.5: Prevalence of type of care resorted to following acute illness among those who experience the health problem**

Type of care	Yes					No					Missing				
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI	
				Lower	Upper				Lower	Upper				Lower	Upper
Self medicate	3,509	3,475,541	38.4	37.2	39.7	5,395	5,141,575	56.9	55.6	58.2	487	423,335	4.7	4.2	5.2
Seek treatment or advice from health care provider	3,674	3,354,830	37.1	35.9	38.4	5,233	5,266,515	58.3	57.0	59.5	484	420,000	4.6	4.2	5.2
Purchase medicine after getting advised from pharmacist	1,349	1,316,973	14.6	13.7	15.5	7,544	7,283,111	80.6	79.5	81.6	498	440,367	4.9	4.4	5.4
Getting advice from other than health care provider	682	575,826	6.4	5.8	7.0	8,212	8,030,637	88.8	88.0	89.6	497	433,989	4.8	4.3	5.3
Doing anything else	611	593,631	6.6	6.0	7.2	5,937	5,588,000	61.8	60.5	63.1	2,843	2,859,000	31.6	30.4	32.8

95% CI = 95% Confidence interval

"Count" = number of respondents who answered affirmative for this section, and this is not the total sample unless otherwise stated.  
n (total sample) = 9391

Table 2.6: Prevalence of self-medicate following illness(es) by sociodemographics characteristics

Sociodemographics characteristics	Yes				No					
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI	
				Lower	Upper				Lower	Upper
<b>MALAYSIA</b>	3,509	3,475,541	38.4	37.2	39.7	5,395	5,141,575	56.9	55.6	58.2
<b>State</b>										
Johor	446	585,673	41.8	38.6	45.1	611	764,804	54.6	51.3	57.9
Kedah	156	175,734	31.9	27.4	36.8	281	299,770	54.5	49.4	59.4
Kelantan	67	49,158	22.2	17.6	27.5	202	155,327	70.0	64.3	75.2
Melaka	153	84,271	33.2	27.7	39.3	388	162,092	63.9	57.7	69.6
Negeri Sembilan	144	92,218	31.7	26.9	37.1	319	191,294	65.8	60.5	70.8
Pahang	133	112,031	30.6	26.2	35.5	289	239,928	65.6	60.6	70.3
Penang	107	74,898	27.4	20.8	35.3	260	193,674	70.9	63.1	77.7
Perak	243	339,545	36.5	32.3	41.0	411	570,738	61.4	56.9	65.7
Perlis	83	12,841	22.2	17.9	27.2	218	35,324	61.1	55.4	66.5
Selangor	480	595,182	38.6	35.6	41.7	726	865,306	56.1	53.0	59.2
Terengganu	107	60,909	28.7	24.0	33.9	244	131,309	61.9	56.5	67.1
Sabah/Labuan	694	707,042	51.1	47.3	54.8	681	645,107	46.6	42.9	50.3
Sarawak	249	276,169	37.8	33.4	42.5	345	418,821	57.4	52.6	62.0
WP Kuala Lumpur	163	285,548	36.2	31.2	41.5	258	453,131	57.4	52.1	62.6
WP Putrajaya	284	24,325	60.0	55.1	64.7	162	14,951	36.9	32.2	41.7
<b>Location</b>										
Urban	2,063	2,411,057	38.4	36.8	40.1	2,994	3,575,795	57.0	55.3	58.7
Rural	1,446	1,064,485	38.5	36.6	40.4	2,401	1,565,780	56.6	54.6	58.5
<b>Sex</b>										
Male	1,530	1,590,289	37.3	35.3	39.2	2,456	2,475,014	58.0	56.0	60.0
Female	1,979	1,885,253	39.5	37.8	41.2	2,939	2,666,561	55.9	54.1	57.6
<b>Age group (years)</b>										
0-4	235	212,602	25.5	22.3	28.9	702	601,846	72.1	68.5	75.4
5-9	233	220,549	28.6	24.9	32.6	562	511,139	66.3	62.2	70.1
10-14	307	289,592	40.6	36.3	45.1	438	389,983	54.7	50.2	59.1
15-19	398	470,054	45.5	41.0	50.0	464	521,243	50.4	46.0	54.9
20-24	330	422,245	42.1	37.6	46.7	430	551,459	55.0	50.3	59.5

Sociodemographics characteristics	Yes				No					
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI	
				Lower	Upper				Lower	Upper
25 – 29	319	368,184	42.4	37.9	47.2	388	460,409	53.1	48.3	57.8
30 – 34	285	290,279	40.3	36.0	44.8	350	393,516	54.6	50.1	59.1
35 – 39	229	224,089	40.1	35.3	45.1	297	304,585	54.5	49.5	59.5
40 – 44	245	224,448	39.6	35.0	44.5	332	308,278	54.4	49.6	59.2
45 – 49	239	214,498	39.7	34.8	44.9	344	297,691	55.2	50.0	60.2
50 – 54	213	170,220	39.4	34.6	44.6	293	228,431	52.9	47.8	58.0
55 – 59	147	109,988	34.5	28.8	40.7	271	182,503	57.3	51.1	63.3
60 – 64	130	106,706	43.2	36.6	49.9	165	127,224	51.5	44.7	58.1
65 – 69	67	58,069	38.6	29.6	48.5	112	88,025	58.6	48.8	67.7
70 – 74	64	42,288	35.7	27.3	45.0	111	71,115	60.0	50.6	68.6
75+	68	51,727	31.3	24.3	39.3	136	104,127	63.0	54.8	70.4
<b>Ethnicity</b>										
Malay	2,018	1,790,781	36.9	35.3	38.5	3,238	2,829,528	58.3	56.7	59.9
Chinese	443	591,129	36.7	33.5	40.0	771	927,524	57.6	54.2	60.9
Indian	262	252,982	34.7	30.2	39.5	512	441,427	60.5	55.8	65.1
Others Bumiputera	559	628,334	45.7	42.0	49.5	634	709,311	51.6	47.8	55.3
Others	227	212,315	45.0	38.1	52.2	240	233,785	49.6	42.5	56.7
<b>Marital Status</b>										
Single	1,035	1,173,818	43.3	40.6	46.0	1,263	1,430,612	52.8	50.1	55.4
Married	1,656	1,567,483	39.9	38.1	41.8	2,305	2,138,701	54.5	52.6	56.4
Widow/Widower/Divorcee	196	150,540	38.8	33.7	44.2	299	218,740	56.4	51.1	61.6
<b>Education level</b>										
No formal education	205	175,828	41.1	36.0	46.4	315	228,110	53.3	48.0	58.5
Primary	956	907,276	40.9	38.4	43.6	1,382	1,180,569	53.3	50.7	55.9
Secondary	1,274	1,345,731	41.7	39.4	44.0	1,708	1,717,336	53.5	50.8	55.4
Tertiary	591	589,843	38.5	35.3	41.7	761	893,627	58.3	55.0	61.5
Unclassified	164	168,978	35.1	29.8	40.7	276	295,368	61.3	55.6	66.7



Sociodemographics characteristics	Yes					No				
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI	
				Lower	Upper				Lower	Upper
<b>Occupation</b>										
Government/Semi government	375	286,719	40.0	35.6	44.5	401	353,285	49.3	44.8	53.8
Private employee	754	912,338	34.0	31.3	36.9	1,158	1,361,312	50.8	47.9	53.7
Self employed	443	449,179	40.3	35.9	44.8	591	516,204	46.3	42.2	50.4
Unpaid worker/home maker	464	452,509	42.8	39.1	46.6	602	506,919	48.0	44.3	51.7
Retiree	207	156,735	32.2	27.7	37.0	339	263,348	54.1	49.1	58.9
<b>Household Income group (RM)</b>										
Less than RM400	235	227,136	38.0	33.5	42.7	390	339,876	56.9	52.2,	61.5
RM400 – RM499	57	54,816	47.2	36.5	58.1	64	56,547	48.6	37.9	59.6
RM500 – RM699	139	126,661	37.9	31.9	44.3	224	198,277	59.3	52.9	65.5
RM700 – RM999	194	170,964	32.2	27.8	36.9	351	331,860	62.4	57.5	67.1
RM1000 – RM1999	698	659,769	40.5	37.3	43.8	1,023	894,100	54.9	51.7	58.2
RM2000 – RM2999	604	595,367	37.4	34.4	40.4	951	913,033	57.3	54.2	60.3
RM3000 – RM3999	438	494,450	39.4	36.0	43.0	747	699,486	55.8	52.3	59.3
RM4000 – RM4999	349	361,606	40.5	36.4	44.7	480	509,391	57.0	52.8	61.1
RM5000 and above	795	784,773	37.5	34.8	40.3	1,165	1,199,006	57.3	54.5	60.1
<b>Health Care Coverage</b>										
Guarantee Letter (GL)	921	705,171	37.1	34.5	39.7	1,317	1,130,122	59.4	56.7	62.0
Employer-sponsored	443	543,195	35.1	32.1	38.3	800	944,549	61.1	57.9	64.2
Private Insurance	645	708,241	37.3	34.5	40.2	1,040	1,103,307	58.1	55.2	60.9

Note: Missing values are not included.

95% CI = 95% Confidence Interval

“Count” = number of respondents who answered affirmative for this section, and this is not the total sample unless otherwise stated.

Table 2.7: Prevalence of those seeking treatment or advice from health care provider following illness(es) by sociodemographics characteristics

Sociodemographics characteristics	Yes				No					
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI	
				Lower	Upper				Lower	Upper
<b>MALAYSIA</b>	<b>3,674</b>	<b>3,354,830</b>	<b>37.1</b>	<b>35.9</b>	<b>38.4</b>	<b>5,233</b>	<b>5,266,515</b>	<b>58.3</b>	<b>57.0</b>	<b>59.5</b>
<b>State</b>										
Johor	349	419,038	29.9	27.1	32.9	708	931,350	66.5	63.4	69.5
Kedah	206	217,057	39.4	34.6	44.5	229	257,448	46.8	41.7	51.9
Kelantan	106	78,478	35.4	30.0	41.2	164	126,423	57.0	51.0	62.8
Melaka	196	79,387	31.3	26.0	37.1	345	166,976	65.8	59.8	71.3
Negeri Sembilan	223	136,440	47.0	41.6	52.4	240	147,537	50.8	45.3	56.2
Pahang	180	146,283	40.0	35.2	45.0	242	205,675	56.2	51.1	61.2
Penang	212	158,648	58.1	50.2	65.6	155	109,924	40.3	32.8	48.2
Perak	281	386,368	41.5	37.3	46.0	372	522,872	56.2	51.8	60.6
Perlis	142	23,248	40.2	34.8	45.9	161	25,322	43.8	38.3	49.5
Selangor	527	590,595	38.3	35.4	41.3	681	873,171	56.6	53.6	59.7
Terengganu	167	85,616	40.4	35.2	45.7	184	106,602	50.3	44.9	55.7
Sabah/Labuan	494	440,820	31.8	28.5	35.4	881	912,388	65.9	62.3	69.3
Sarawak	270	291,278	39.9	35.4	44.5	325	404,447	55.4	50.7	60.0
WP Kuala Lumpur	165	287,085	36.4	31.2	41.9	256	451,593	57.3	51.8	62.5
WP Putrajaya	156	14,489	35.7	31.1	40.6	290	24,786	61.1	56.2	65.8
<b>Location<sup>1</sup></b>										
Urban	2,011	2,316,916	36.9	35.3	38.6	3,052	3,676,418	58.6	57.0	60.2
Rural	1,663	1,037,914	37.5	35.6	39.4	2,181	1,590,097	57.4	55.5	59.4
<b>Sex</b>										
Male	1,684	1,615,547	37.9	36.0	39.8	2,304	2,452,636	57.5	55.5	59.4
Female	1,990	1,739,284	36.4	34.8	38.1	2,929	2,813,879	59.0	57.2	60.7
<b>Age group (years)</b>										
0-4	650	558,857	66.9	63.2	70.4	290	257,798	30.9	27.4	34.6
5-9	449	394,939	51.2	47.0	55.5	347	337,743	43.8	39.6	48.1
10-14	257	240,840	33.8	29.6	38.2	487	437,692	61.4	57.0	65.7
15-19	224	234,895	22.7	19.4	26.4	637	755,513	73.1	69.3	76.7
20-24	224	277,578	27.7	23.5	32.2	536	696,126	69.4	64.8	73.6

Sociodemographics characteristics	Yes					No				
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI	
				Lower	Upper				Lower	Upper
<b>MALAYSIA</b>	<b>3,674</b>	<b>3,354,830</b>	<b>37.1</b>	<b>35.9</b>	<b>38.4</b>	<b>5,233</b>	<b>5,266,515</b>	<b>58.3</b>	<b>57.0</b>	<b>59.5</b>
25 – 29	243	249,349	28.7	24.7	33.1	463	578,719	66.7	62.2	71.0
30 – 34	235	270,147	37.5	33.2	42.0	400	413,649	57.4	52.9	61.8
35 – 39	190	185,942	33.3	28.6	38.3	336	341,853	61.2	56.1	66.0
40 – 44	222	207,911	36.7	32.2	41.5	358	329,351	58.2	53.3	62.9
45 – 49	229	181,649	33.7	29.0	38.7	354	330,540	61.2	56.1	66.1
50 – 54	202	159,199	36.9	32.0	42.1	302	237,908	55.1	50.0	60.2
55 – 59	180	123,186	38.7	33.1	44.6	238	169,305	53.2	47.1	59.1
60 – 64	109	81,540	33.0	27.1	39.5	186	153,484	62.1	55.5	68.3
65 – 69	87	63,929	42.5	33.6	52.0	93	82,443	54.8	45.4	63.9
70 – 74	78	43,932	37.0	28.9	46.0	97	69,471	58.6	49.4	67.2
75+	95	80,936	48.9	40.8	57.1	109	74,919	45.3	37.3	53.5
<b>Ethnicity</b>										
Malay	2,186	1,833,387	37.8	36.2	37.3	3,070	2,787,163	57.4	55.8	59.0
Chinese	472	553,501	34.4	31.2	37.6	743	965,569	59.9	56.6	63.2
Indian	393	333,537	45.7	41.2	50.4	381	361,333	49.6	44.9	54.2
Others Bumiputera	467	503,274	36.6	33.1	40.3	727	835,105	60.7	57.0	64.3
Others	156	131,132	27.8	21.9	34.7	312	317,346	67.3	60.3	73.6
Others	12	11,639	47.1	26.7	68.6	15	11,298	45.7	25.7	67.2
<b>Marital Status</b>										
Single	659	710,630	26.2	23.9	28.6	1639	1,893,800	69.83	67.3	72.2
Married	1,551	1,380,759	35.2	33.4	37.0	2410	2,327,496	59.307	57.4	61.2
Widow/Widower/Divorcee	201	156,818	40.4	35.4	45.7	294	212,461	54.783	49.5	60.0
<b>Education level</b>										
No formal education	209	157,547	36.8	32.0	41.9	311	246,391	57.601	52.4	62.6
Primary	935	756,412	34.1	31.8	36.6	1,401	1,331,333	60.089	57.6	62.5
Secondary	1,037	1,008,849	31.2	29.1	33.4	1,946	2,055,673	63.624	61.4	65.8
Tertiary	464	506,461	33.0	29.9	36.2	888	976,681	63.668	60.4	66.8
Unclassified	175	185,250	38.5	32.9	44.4	266	280,091	58.2	52.3	63.8

Sociodemographics characteristics	Yes				No					
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI	
				Lower	Upper				Lower	Upper
<b>MALAYSIA</b>	<b>3,674</b>	<b>3,354,830</b>	<b>37.1</b>	<b>35.9</b>	<b>38.4</b>	<b>5,233</b>	<b>5,266,515</b>	<b>58.3</b>	<b>57.0</b>	<b>59.5</b>
<b>Occupation</b>										
Government employee/Semi government	273	230,307	34.4	30.2	38.8	504	411,428	61.4	56.9	65.8
Private employee	749	842,248	35.1	32.5	37.8	1162	1,431,268	59.7	57.0	62.4
Self employed	357	300,043	29.6	26.0	33.6	678	666,656	65.9	61.8	69.7
Unpaid worker/home maker	382	301,920	30.2	27.1	33.4	681	654,695	65.4	62.1	68.7
Retiree	230	176,036	39.3	34.5	44.3	317	245,743	54.9	49.8	59.8
<b>Household Income group (RM)</b>										
Less than RM400	277	224,552	37.6	33.2	42.2	348	342,460	57.3	52.7	61.9
RM400 – RM499	52	51,765	44.5	33.9	55.7	69	59,598	51.3	40.3	62.1
RM500 – RM699	145	120,538	36.1	30.3	42.3	216	203,009	60.8	54.4	66.7
RM700 – RM999	249	212,083	39.9	35.1	44.9	296	290,741	54.7	49.7	59.6
RM1000 – RM1999	715	612,919	37.7	34.6	40.8	1,007	942,268	57.9	54.7	61.0
RM2000 – RM2999	624	570,371	35.8	32.8	38.8	935	942,528	59.1	56.0	62.2
RM3000 – RM3999	497	459,440	36.7	33.4	40.0	689	736,465	58.8	55.3	62.1
RM4000 – RM4999	332	338,911	37.9	34.0	42.0	496	530,899	59.4	55.3	63.4
RM5000 and above	783	764,251	33.9	33.9	39.3	1,177	1,218,546	58.2	55.4	61.0
<b>Health Care Coverage</b>										
GL	921	705,171	37.1	34.5	39.7	1,317	1,130,122	59.4	56.7	62.0
Employer-sponsored	443	543,195	35.1	32.1	38.3	800	944,549	61.1	57.9	64.2
Private Insurance	645	708,241	37.3	34.5	40.2	1,040	1,103,307	58.1	55.2	60.9

Note: Missing values are not included.

95% CI = 95% Confidence Interval

“Count” = number of respondents who answered affirmative for this section, and this is not the total sample unless otherwise stated.

**Table 2.8: Prevalence on perceived necessity to seek treatment or advice from healthcare provider**

Response	Count	Estimated population	Prevalence (%)	95% CI	
				Lower	Upper
<b>TOTAL RESPONDENTS (Overall)</b>	<b>5,233</b>	<b>5,266,515</b>	<b>100.0</b>	-	-
Yes	1,132	1,097,203	20.8	19.5	22.2
No	3,924	3,975,326	75.5	74.0	76.9
Missing <sup>1</sup>	177	193,987	3.7	3.1	4.4

<sup>1</sup> Missing include those who "Don't know" & "Refuse to answer"

95% CI = 95% Confidence Interval

"Count" = number of respondents who answered affirmative for this section, and this is not the total sample unless otherwise stated.

**Table 2.9: Proportion of respondents with number of reasons stated**

Number of reason stated	Count	Estimated population	Proportion (%)	95% CI	
				Lower	Upper
<b>TOTAL RESPONDENTS (Overall sample)</b>	<b>5,233</b>	<b>5,266,515</b>	<b>100.0</b>	-	-
No reason	293	340,137	6.5	5.6	7.4
One reason	4,680	4,647,440	88.2	87.1	89.3
Two reasons	185	186,422	3.5	3.0	4.2
Three reasons	75	92,517	1.8	1.3	2.3

95% CI = 95% Confidence Interval

"Count" = number of respondents who answered affirmative for this section, and this is not the total sample unless otherwise stated.

Table 2.10: Respondents stating reason for not seeking care despite being ill by sociodemographic characteristics

Sociodemographic characteristic	Respondent that state reason				No answer given			
	Count	Estimated population	Prevalence (%)	95% CI Lower Upper	Count	Estimated population	Prevalence (%)	95% CI Lower Upper
<b>MALAYSIA (Overall)</b>	<b>4,061</b>	<b>4,047,115</b>	<b>76.8</b>	<b>75.3 78.3</b>	<b>1,172</b>	<b>1,219,400</b>	<b>23.2</b>	<b>21.7 24.7</b>
<b>State</b>								
Johor	568	751,807	80.7	77.3 83.7	140	179,543	19.3	16.3 22.7
Kedah	171	191,505	74.4	67.0 80.6	58	65,944	25.6	19.4 33.0
Kelantan	123	95,460	75.5	68.1 81.7	41	30,963	24.5	18.3 31.9
Melaka	303	141,690	84.9	75.1 91.2	42	25,285	15.1	8.76 24.9
Negeri Sembilan	183	118,693	80.4	74.3 85.4	57	28,844	19.6	14.6 25.7
Pahang	183	156,314	76.0	69.7 81.3	59	49,361	24.0	18.7 30.3
Penang	128	86,900	79.1	67.2 87.4	27	23,023	20.9	12.6 32.8
Perak	295	431,843	82.6	78.0 86.4	77	91,030	17.4	13.6 22.0
Perlis	143	22,634	89.4	83.3 93.4	18	2,688	10.6	6.58 16.7
Selangor	489	640,377	73.3	69.5 76.8	192	232,795	26.7	23.2 30.5
Terengganu	139	80,047	75.1	67.6 81.3	45	26,555	24.9	18.7 31.7
Sabah/Labuan	633	659,979	72.3	68.3 76.0	248	252,408	27.7	24 31.7
Sarawak	258	320,209	79.2	72.7 82.7	67	84,238	20.8	15.6 27.3
WP Kuala Lumpur	192	328,359	72.7	65.8 78.7	64	123,234	27.3	21.3 34.2
WP Putrajaya	253	21,297	85.9	80.8 89.8	37	3,489	14.1	10.2 19.2
<b>Location</b>								
Urban	2,367	2,821,838	76.8	74.8 78.6	685	854,580	23.2	21.4 25.2
Rural	1,694	1,225,277	77.1	74.7 79.2	487	364,820	22.9	20.8 25.3
<b>Sex</b>								
Male	1,782	1,872,649	76.4	74.1 78.5	522	579,988	23.6	21.5 25.9
Female	2,279	2,174,467	77.3	75.3 79.2	650	639,412	22.7	20.8 24.7
<b>Age group (years)</b>								
0-4	217	190,732	74.0	67.5 79.6	73	67,066	26	20.4 32.5
5-9	264	251,839	74.6	67.8 80.3	83	85,904	25.4	19.7 32.2
10 - 14	368	336,376	76.9	72.0 81.1	119	101,316	23.1	18.9 28.0
15 - 19	510	601,249	79.6	75.2 83.3	127	154,264	20.4	16.7 24.8

Sociodemographic characteristic	Respondent that state reason				No answer given			
	Count	Estimated population	Prevalence (%)	95% CI Lower Upper	Count	Estimated population	Prevalence (%)	95% CI Lower Upper
<b>MALAYSIA (Overall)</b>	<b>4,061</b>	<b>4,047,115</b>	<b>76.8</b>	<b>75.3 78.3</b>	<b>1,172</b>	<b>1,219,400</b>	<b>23.2</b>	<b>21.7 24.7</b>
20 – 24	420	527,561	75.8	71.0 80.0	116	168,565	83.3	20.0 29.0
25 – 29	355	436,694	75.5	69.9 80.3	108	142,026	24.5	19.7 30.1
30 – 34	319	328,308	79.4	74.3 83.7	81	85,341	20.6	16.3 25.7
35 – 39	257	261,579	76.5	70.7 81.5	79	80,274	23.5	18.5 29.3
40 – 44	278	254,517	77.3	71.7 81.7	80	74,834	22.7	18.0 28.3
45 – 49	290	272,715	82.5	77.4 86.7	64	57,825	17.5	13.3 22.6
50 – 54	246	190,442	80.0	73.9 85.1	56	47,466	20.0	14.9 26.1
55 – 59	182	116,688	68.9	59.5 77.0	56	52,618	31.1	23 40.5
60 – 64	138	113,238	73.8	73.8 81.3	48	40,246	26.2	18.7 35.4
65 – 69	67	60,305	73.1	60.6 82.8	26	22,138	26.9	17.2 39.4
70 – 74	71	51,985	74.8	62.8 84.0	26	17,486	25.2	16.0 16.0
75+	79	52,888	70.6	58.7 80.2	22031	22,031	29.4	19.8 41.3
<b>Ethnicity</b>								
Malay	2,419	2,149,545	77.1	75.2 78.9	651	637,618	22.9	21.1 24.8
Chinese	576	744,416	77.1	72.9 80.8	167	221,153	22.9	19.2 27.1
Indian	285	277,806	76.9	71.1 81.8	96	83,526	23.1	18.2 28.9
Other Bumiputeras	537	625,276	74.9	70.8 78.6	190	209,829	25.1	21.4 29.2
Others	244	250,072	78.8	71.0 84.9	68	67,274	21.2	15.1 29.0
<b>Marital Status</b>								
Single	1,282	1,474,084	77.8	75.2 80.3	357	419,715	22.2	19.7 24.8
Married	1,910	1,816,306	78.0	75.9 80.1	500	511,190	22.0	19.9 24.1
Widow/widower/ divorcee	208	146,706	69.1	62.0 75.3	86	65,755	30.9	24.7 38.0
<b>Education level</b>								
No formal education	211	171,654	69.7	63.1 75.6	100	74,737	30.3	24.4 36.9
Primary	1,093	1,014,068	76.2	73 79.1	308	317,265	23.8	20.9 27.0
Secondary	1,528	1,610,965	78.4	76 80.6	418	444,709	21.6	19.4 24.0
Tertiary	718	755,983	77.4	73.6 80.8	170	220,698	22.6	19.2 26.4
Unclassified	194	210,792	75.3	68.6 80.9	72	69,299	24.7	19.1 31.4

Sociodemographic characteristic	Respondent that state reason					No answer given				
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI	
				Lower	Upper				Lower	Upper
<b>MALAYSIA (Overall)</b>	<b>4,061</b>	<b>4,047,115</b>	<b>76.8</b>	<b>75.3</b>	<b>78.3</b>	<b>1,172</b>	<b>1,219,400</b>	<b>23.2</b>	<b>21.7</b>	<b>24.7</b>
<b>Occupation</b>										
Government / Semi-private employee	414	314,616	76.5	70.9	81.3	90	96,811	23.5	18.7	29.1
Self employed	915	1,125,307	78.6	75.6	81.4	247	305,961	21.4	18.6	24.4
Unpaid worker/home maker	523	511,170	76.7	72.1	80.7	155	155,487	23.3	19.3	27.9
Retiree	532	506,321	77.3	73.1	81.0	149	148,374	22.7	19.0	26.9
<b>Citizenship</b>										
citizen	235	176,599	71.9	64.9	77.9	82	69,144	28.1	22.1	35.1
PR	3,847	3,732,427	76.9	75.3	78.3	1,101	1,123,366	23.1	21.7	24.7
Non citizen	56,752	56,752	81.6	60.0	92.9	10	12,813	18.4	7.1	40.0
<b>Having GL</b>										
Yes	165	248,103	75.4	67.6	81.8	58	80,844	24.6	18.2	32.4
No	33	28,004	2.7	1.8	4.0	1,239	1,010,023	97.3	96.0	98.2
<b>Employer sponsored</b>										
Yes	118	132,079	3.14	2.6	3.9	3,817	4,073,677	96.9	96.2	97.4
No	18	22,186	2.6	1.5	4.4	838,854	838,854	97.4	95.6	98.5
<b>Having private insurance</b>										
Yes	134	138,276	3.2	2.6	3.8	4,399	4,242,016	96.8	96.2	97.4
No	29	33,016	3.05	2.0	4.65	948	1,047,865	96.9	95.4	98.0
	123	127,446	3.07	2.5	3.75	4,095	4,028,280	96.9	96.3	97.5

Note: Missing values are not included.

Caution some cells have count less than 30. Results should be interpreted with caution.

95% CI = 95% Confidence Interval

PR: Permanent resident

"Count" = number of respondents who answered affirmative for this section, and this is not the total sample unless otherwise stated.



Table 2.11: Prevalence of those purchasing medicine after getting advice from pharmacist following illness(es) by sociodemographic characteristics

Sociodemographics characteristics	Yes						No					
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI			
				Lower	Upper				Lower	Upper		
<b>MALAYSIA</b>	<b>1,349</b>	<b>1,316,973</b>	<b>14.6</b>	<b>13.7</b>	<b>15.5</b>	<b>7,544</b>	<b>7,283,111</b>	<b>80.6</b>	<b>79.5</b>	<b>81.6</b>		
<b>State</b>												
Johor	156	200,029	14.3	12.1	16.8	898	1,145,559	81.8	79.1	84.2		
Kedah	68	71,875	13.1	9.9	17.0	369	403,908	73.4	68.8	77.5		
Kelantan	33	25,673	11.6	8.3	16.0	237	179,228	80.8	75.6	85.1		
Melaka	37	19,941	7.9	4.0	15.0	504	226,421	89.2	82.4	93.6		
Negeri Sembilan	41	24,516	8.4	5.8	12.0	419	258,119	88.8	85.0	91.8		
Pahang	67	56,885	15.5	12.3	19.5	355	295,073	80.7	76.2	84.4		
Penang	106	85,315	31.2	24.6	38.8	260	182,441	66.8	59.2	73.6		
Perak	70	95,756	10.3	7.9	13.3	584	814,527	87.6	84.5	90.2		
Perlis	34	4,769	8.2	5.8	11.5	268	43,524	75.3	70.1	79.8		
Selangor	160	184,153	11.9	10.1	14.0	1044	1,273,762	82.6	80.3	84.8		
Terengganu	46	26,822	12.7	9.5	16.7	305	165,396	78.0	73.1	82.2		
Sabah/Labuan	223	215,905	15.6	13.2	18.3	1148	1,130,268	81.6	78.8	84.2		
Sarawak	176	208,370	28.5	24.4	33.1	418	483,894	66.3	61.6	70.7		
WP Kuala Lumpur	45	89,286	11.3	8.3	15.3	376	649,392	82.3	78.0	86.0		
WP Putrajaya	87	7,677	18.9	15.4	23.1	359	31,599	77.9	73.6	81.7		
<b>Location</b>												
Urban	787	905,964	13.3	13.3	15.7	4,268	5,075,085	80.9	79.6	82.2		
Rural	562	411,009	14.8	13.5	16.4	3,276	2,208,026	79.8	78.1	81.3		
<b>Sex</b>												
Male	649	632,626	14.8	13.5	16.3	3,333	3,422,116	80.2	78.6	81.7		
Female	700	684,348	14.3	13.1	15.6	4,211	3,860,995	80.9	79.5	82.2		
<b>Age group (years)</b>												
0-4	159	131,810	15.8	13.2	18.7	777	680,657	81.5	78.4	84.2		
5-9	141	138,774	18.0	14.8	21.8	655	592,819	76.9	73.0	80.4		
10 - 14	105	106,302	14.9	11.8	18.7	637	570,892	80.1	76.1	83.5		
15 - 19	97	115,802	11.2	8.7	14.3	765	875,495	84.7	81.4	87.5		

Sociodemographics characteristics	Yes				No					
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI	
				Lower	Upper				Lower	Upper
<b>MALAYSIA</b>	<b>1,349</b>	<b>1,316,973</b>	<b>14.6</b>	<b>13.7</b>	<b>15.5</b>	<b>7,544</b>	<b>7,283,111</b>	<b>80.6</b>	<b>79.5</b>	<b>81.6</b>
20 - 24	106	129,458	12.9	10.2	16.1	652	838,004	83.5	80.0	86.5
25 - 29	108	127,584	14.7	11.7	18.3	597	699,198	80.6	76.6	84.0
30 - 34	102	91,250	12.7	10.1	15.7	532	590,895	82.0	78.4	85.1
35 - 39	78	80,330	14.4	11.1	18.5	447	447,106	80.0	75.7	83.7
40 - 44	99	95,920	16.9	13.3	21.4	481	438,583	77.5	72.8	81.5
45 - 49	96	83,124	15.4	12.2	19.2	485	427,765	79.3	75.0	82.9
50 - 54	81	61,886	14.3	11.2	18.2	423	335,225	77.7	73.3	81.6
55 - 59	48	43,331	13.6	9.2	19.6	369	248,591	78.0	71.8	83.2
60 - 64	46	42,444	17.2	12.1	23.8	249	191,486	77.4	70.7	83.0
65 - 69	32	31,979	21.3	14.2	30.5	147	114,116	75.9	66.7	83.2
70 - 74	20	16,133	13.6	7.2	24.0	155	97,270	82.0	71.9	89.0
75+	31	20,846	12.6	8.2	18.8	173	135,009	81.6	74.7	87.0
<b>Ethnicity</b>										
Malay	770	676,597	13.9	12.8	15.1	4,483	3,938,545	81.1	79.8	82.4
Chinese	184	222,562	13.8	11.6	16.3	1,027	1,290,362	80.1	77.2	82.7
Indian	78	68,022	9.3	7.0	12.4	692	624,029	85.6	82.2	88.4
Other Bumiputeras	111	127,254	20.5	17.7	23.5	222	251,840	76.8	73.6	79.7
Others	74	68,121	14.4	10.4	19.8	392	374,397	79.4	73.4	84.3
<b>Marital Status</b>										
Single	293	314,757	11.6	10.1	13.3	2,003	2,283,430	84.2	82.3	86.0
Married	616	602,661	15.4	14.0	16.9	3,340	3,098,389	79.0	77.3	80.5
Widow/Widower/Divorcee	69	60,766	15.7	12.0	20.3	425	307,315	79.2	74.4	83.4
<b>Education level</b>										
No formal education	77	68,287	16.0	12.4	20.4	442	334,452	78.2	73.5	82.2
Primary	344	314,531	14.2	12.5	16.1	1,986	1,765,485	79.7	77.5	81.7
Secondary	424	446,180	13.8	12.3	15.5	2,557	2,612,608	80.9	79.0	82.6
Tertiary	223	225,360	14.7	12.5	17.2	1,128	1,256,460	81.9	79.3	84.3
Unclassified	59	70,774	14.7	10.5	20.1	383	394,722	82.0	76.5	86.3

Sociodemographics characteristics	Yes				No					
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI	
				Lower	Upper				Lower	Upper
<b>MALAYSIA</b>	<b>1,349</b>	<b>1,316,973</b>	<b>14.6</b>	<b>13.7</b>	<b>15.5</b>	<b>7,544</b>	<b>7,283,111</b>	<b>80.6</b>	<b>79.5</b>	<b>81.6</b>
<b>Occupation</b>										
Government employee/Semi government	132	102,461	15.3	12.4	18.8	643	534,374	79.8	75.9	83.2
Private employee	278	313,798	13.1	11.4	15.0	1,631	1,952,235	81.5	79.3	83.5
Self employed	159	159,913	15.8	13.0	19.1	876	806,786	79.7	76.3	82.8
Unpaid worker/home maker	137	136,005	13.6	11.2	16.3	924	820,317	82.0	79.0	84.6
Retiree	86	67,825	15.1	11.6	19.5	460	352,259	78.7	74.0	82.7
<b>Household Income group (RM)</b>										
Less than RM400	85	75,862	12.7	10.0	16.1	539	489,888	82.0	78.3	85.3
RM400 – RM499	15	14,309	12.3	7.0	20.8	106	97,054	83.5	74.3	89.9
RM500 – RM699	51	46,408	13.9	10.3	18.5	311	277,294	83.0	78.1	86.9
RM700 – RM999	77	85,166	16.0	12.2	20.7	466	415,815	78.2	73.4	82.4
RM1000 – RM1999	265	248,157	15.2	13.1	17.6	1,455	1,304,913	80.2	77.6	82.5
RM2000 – RM2999	250	246,938	15.5	13.3	18.0	1,304	1,259,448	79.0	76.3	81.5
RM3000 – RM3999	180	175,384	14.0	11.6	16.8	1,005	1,018,905	81.3	78.3	83.9
RM4000 – RM4999	130	142,640	16.0	13.1	19.3	696	721,854	80.8	77.2	83.9
RM5000 and above	296	282,110	13.5	11.7	15.4	1,662	1,697,939	81.1	79.0	83.2
<b>Health Care Coverage</b>										
Guaranteee letter (GL)	356	292,438	15.4	13.5	17.5	1,883	1,544,143	81.1	78.9	83.2
Employer-sponsored	183	217,212	14.1	11.9	16.5	1,060	1,270,385	82.2	79.5	84.5
Private Insurance	280	297,479	15.7	13.6	17.9	1,404	1,511,732	79.6	77.1	81.8

Note: Missing values are not included.

Caution some cells have count less than 30. Results should be interpreted with caution.

95% CI = 95% Confidence Interval

“Count” = number of respondents who answered affirmative for this section, and this is not the total sample unless otherwise stated.

Table 2.12: Prevalence of those getting advice from others, other than health care provider following the illness(es), by socio-demographics characteristics

Sociodemographics characteristics	Yes				No					
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI	
				Lower	Upper				Lower	Upper
<b>MALAYSIA</b>	<b>682</b>	<b>575,826</b>	<b>6.4</b>	<b>5.8</b>	<b>7.0</b>	<b>8,212</b>	<b>8,030,637</b>	<b>88.8</b>	<b>88.0</b>	<b>89.6</b>
<b>State</b>										
Johor	82	110,839	7.9	6.3	9.9	974	1,238,585	88.5	86.2	90.4
Kedah	-	-	-	-	-	422	460,298	83.6	79.9	86.8
Kelantan	-	-	-	-	-	261	198,701	89.6	85.2	92.8
Melaka	-	-	-	-	-	535	241,165	95.0	91.2	97.3
Negeri Sembilan	33	18,015	6.2	4.0	9.4	427	264,348	91.0	87.5	93.5
Pahang	30	23,062	6.3	4.3	9.1	391	328,238	89.7	86.0	92.6
Penang	-	-	-	-	-	355	261,599	95.8	92.3	97.8
Perak	56	66,812	7.2	5.4	9.5	598	843,471	90.7	88.3	92.7
Perlis	-	-	-	-	-	299	47,831	82.7	77.8	86.7
Selangor	59	65,260	4.2	3.2	5.6	1,146	1,393,899	90.4	88.5	92.0
Terengganu	-	-	-	-	-	326	180,017	84.9	80.6	88.4
Sabah/Labuan	140	122,795	8.9	7.2	10.8	1,232	1,223,912	88.4	86.1	90.4
Sarawak	69	58,440	8.0	6.1	10.5	525	636,531	87.2	84.1	89.8
WP Kuala Lumpur	-	-	-	-	-	394	682,876	86.6	82.2	90.0
WP Putrajaya	119	110,839	24.9	21.0	29.4	327	29,166	71.9	67.4	76.1
<b>Location</b>										
Urban	382	353,582	5.6	4.9	6.5	4,673	5,631,103	89.8	88.8	90.7
Rural	300	222,244	8.0	7.1	9.1	3,539	2,399,534	86.7	85.3	87.9
<b>Sex</b>										
Male	291	249,182	5.8	5.0	6.8	3,696	3,814,306	89.4	88.2	90.5
Female	391	326,643	6.8	6.0	7.8	4,516	4,216,330	88.3	87.2	89.4
<b>Age group (years)</b>										
0-4	64	49,856	6.0	4.3	8.2	873	763,905	91.5	89.0	93.4
5-9	55	45,175	5.9	4.2	8.1	741	687,185	89.1	86.4	91.3
10 - 14	75	55,661	7.8	5.9	10.2	667	620,985	87.1	84.2	89.5

Sociodemographics characteristics	Yes					No				
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI	
				Lower	Upper				Lower	Upper
<b>MALAYSIA</b>	<b>682</b>	<b>575,826</b>	<b>6.4</b>	<b>5.8</b>	<b>7.0</b>	<b>8,212</b>	<b>8,030,637</b>	<b>88.8</b>	<b>88.0</b>	<b>89.6</b>
15 - 19	66	61,038	5.9	4.4	7.9	796	930,259	90.0	87.5	92.1
20 - 24	63	67,291	6.7	4.7	9.6	695	902,653	90.0	86.8	92.4
25 - 29	59	65,423	7.5	5.3	10.6	647	762,287	87.9	84.3	90.7
30 - 34	47	40,799	5.7	4.0	8.0	586	640,396	88.9	85.8	91.4
35 - 39	31	28,586	5.1	3.4	7.7	494	498,850	89.3	86.1	91.8
40 - 44	35	33,148	5.9	4.0	8.5	544	503,612	88.9	85.6	91.6
45 - 49	49	35,137	6.5	4.6	9.2	532	475,753	88.2	84.7	90.9
50 - 54	35	26,839	6.2	4.1	9.2	470	370,419	85.8	81.9	89.0
55 - 59	-	-	-	-	-	390	275,414	86.5	81.8	90.0
60 - 64	-	-	-	-	-	268	213,707	86.4	81.3	90.3
65 - 69	-	-	-	-	-	164	137,115	91.2	86.0	94.6
70 - 74	-	-	-	-	-	158	103,445	87.2	80.8	91.7
75+	-	-	-	-	-	187	144,652	87.5	81.5	91.7
<b>Ethnicity</b>										
Malay	418	318,381	6.6	5.8	7.4	4,832	4,296,462	88.5	87.5	89.5
Chinese	60	75,855	4.7	3.4	6.5	1,154	1,443,153	89.6	87.3	91.5
Indian	36	36,621	5.0	3.0	8.4	735	655,636	89.9	86.4	92.6
Other Bumiputeras	129	89,351	9.1	7.5	11.1	1,064	846,453	88.1	85.9	90.1
Others	39	19,286	4.1	2.6	6.5	427	423,232	89.8	85.4	92.9
<b>Marital Status</b>										
Single	179	175,805	6.5	5.3	7.9	2,117	2,424,864	89.4	87.8	90.9
Married	299	244,287	6.2	5.4	7.2	3,657	3,459,146	88.1	86.9	89.3
Widow/Widower/Divorcee	39	28,614	7.4	5.2	10.4	455	339,467	87.5	83.9	90.5
<b>Education level</b>										
No formal education	39	25,977	6.1	4.2	8.7	480	376,763	88.1	84.7	90.8
Primary	189	137,874	6.2	5.2	7.4	2,142	1,942,403	87.7	86.0	89.1
Secondary	215	203,552	6.3	5.3	7.5	2,766	2,860,519	88.5	87.0	89.9
Tertiary	115	104,458	6.8	5.3	8.7	1,235	1,376,411	89.7	87.6	91.5
Unclassified	33	29,585	6.1	4.2	8.9	408	435,158	90.4	87.2	92.8

Sociodemographics characteristics	Yes					No				
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI	
				Lower	Upper				Lower	Upper
<b>MALAYSIA</b>	<b>682</b>	<b>575,826</b>	<b>6.4</b>	<b>5.8</b>	<b>7.0</b>	<b>8,212</b>	<b>8,030,637</b>	<b>88.8</b>	<b>88.0</b>	<b>89.6</b>
<b>Occupation</b>										
Government employee/Semi government	81	54,689	8.2	6.0	11.0	693	581,488	86.8	83.3	89.7
Private employee	108	113,717	4.8	3.8	6.0	1,802	2,158,236	90.1	88.4	91.5
Self employed	84	77,304	7.6	5.5	10.4	951	889,395	87.9	84.9	90.3
Unpaid worker/home maker	79	69,576	7.0	5.3	9.0	982	886,349	88.6	86.1	90.6
Retiree	41	23,093	5.2	3.6	7.4	505	396,990	88.7	85.3	91.3
<b>Household Income group (RM)</b>										
Less than RM400	35	28,537	4.8	3.3	6.9	588	536,669	89.9	86.9	92.2
RM400 – RM499	-	-	-	-	-	117	106,241	91.4	82.3	96.0
RM500 – RM699	-	-	-	-	-	334	300,775	90.0	86.0	93.0
RM700 – RM999	41	35,455	6.7	4.7	9.4	503	466,456	87.8	84.4	90.5
RM1000 – RM1999	122	97,561	6.0	4.8	7.4	1,600	1,458,257	89.6	87.8	91.2
RM2000 – RM2999	136	117,461	7.4	5.7	9.4	1,417	1,388,061	87.1	84.7	89.1
RM3000 – RM3999	94	84,747	6.8	5.3	8.6	1,090	1,109,064	88.5	86.2	90.4
RM4000 – RM4999	71	63,426	7.1	5.3	9.5	756	804,528	90.0	87.3	92.2
RM5000 and above	151	120,590	5.8	4.6	7.1	1,807	1,860,585	88.9	87.2	90.5
<b>Health Care Coverage</b>										
Guarantee letter (GL)	224	130,847	6.9	5.7	8.3	2,013	1,704,321	89.6	87.9	91.0
Employer-sponsored	72	83,483	5.4	4.1	7.1	1,170	1,403,163	90.8	88.7	92.5
Private Insurance	100	93,586	4.9	3.9	6.3	1,582	1,714,906	90.3	88.5	91.8

Missing values are not included

95% CI = 95% Confidence Interval

"Count" = number of respondents who answered affirmative for this section, and this is not the total sample unless otherwise stated.

Table 2.13: Prevalence of those doing other than mentioned above following the illness(es) by sociodemographics characteristics

Sociodemographics characteristics	Yes						No					
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI			
				Lower	Upper				Lower	Upper		
<b>MALAYSIA</b>	<b>611</b>	<b>593,631</b>	<b>6.6</b>	<b>6.0</b>	<b>7.2</b>	<b>5,937</b>	<b>5,588,000</b>	<b>61.8</b>	<b>60.5</b>	<b>63.1</b>		
<b>State</b>												
Johor	112	147,686	10.5	8.7	12.7	620	812,590	58.0	54.8	61.2		
Kedah	-	-	-	-	-	180	186,191	33.8	29.2	38.8		
Kelantan	40	29,638	13.4	9.8	17.9	214	163,960	73.9	68.4	78.8		
Melaka	78	23,981	9.5	6.6	13.3	323	167,191	65.9	60.0	71.3		
Negeri Sembilan	50	23,954	8.2	6.0	11.2	330	206,033	70.9	65.9	75.5		
Pahang	36	30,874	8.4	5.9	11.9	339	282,908	77.3	72.7	81.4		
Penang	-	-	-	-	-	221	159,265	58.3	50.6	65.7		
Perak	72	106,779	11.5	8.9	14.7	393	529,964	57.0	52.5	61.3		
Perlis	-	-	-	-	-	184	29,772	51.5	45.8	57.1		
Selangor	55	69,393	4.5	3.3	6.1	795	974,288	63.2	60.1	66.2		
Terengganu	-	-	-	-	-	305	168,667	79.6	74.8	83.6		
Sabah/Labuan	100	99,980	7.2	5.7	9.1	993	963,344	69.6	66.2	72.8		
Sarawak	-	-	-	-	-	402	463,077	63.4	58.7	67.9		
WP Kuala Lumpur	-	-	-	-	-	248	445,496	56.5	51.1	61.7		
WP Putrajaya	-	-	-	-	-	390	34,920	86.1	82.5	89.1		
<b>Location</b>												
Urban	294	388,352	6.2	5.4	7.0	3,413	3,850,487	61.4	59.8	63.0		
Rural	317	205,279	7.4	6.5	8.5	2,524	1,737,177	62.8	60.8	64.6		
<b>Sex</b>												
Male	238	257,092	6.0	5.2	7.0	2,727	2,700,067	63.3	61.4	65.2		
Female	373	336,539	7.1	6.2	8.0	3,210	2,887,598	60.5	58.8	62.2		
<b>Age group (years)</b>												
0-4	42	41,812	5.0	3.6	7.0	651	538,907	64.5	60.7	68.1		
5-9	41	31,772	4.1	2.9	5.9	524	482,076	62.5	58.4	66.5		
10 - 14	52	49,821	7.0	5.1	9.6	479	427,398	59.9	55.6	64.1		

Sociodemographics characteristics	Yes					No				
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI	
				Lower	Upper				Lower	Upper
<b>MALAYSIA</b>	<b>611</b>	<b>593,631</b>	<b>6.6</b>	<b>6.0</b>	<b>7.2</b>	<b>5,937</b>	<b>5,588,000</b>	<b>61.8</b>	<b>60.5</b>	<b>63.1</b>
15 - 19	61	75,925	7.3	5.5	9.8	584	641,348	62.1	57.7	66.3
20 - 24	56	73,230	7.3	5.2	10.1	541	663,289	66.1	61.6	70.3
25 - 29	53	57,228	6.6	4.7	9.1	470	531,880	61.3	56.6	65.9
30 - 34	42	42,367	5.9	4.0	8.5	421	438,666	60.9	56.4	65.2
35 - 39	46	52,597	9.4	6.8	12.9	348	347,157	62.1	57.2	66.8
40 - 44	42	36,087	6.4	4.6	8.8	372	329,409	58.2	53.3	62.9
45 - 49	47	43,819	8.1	5.6	11.6	382	324,315	60.1	54.9	65.1
50 - 54	35	31,759	7.4	5.0	10.8	339	253,286	58.7	53.4	63.8
55 - 59	32	16,967	5.3	3.5	8.0	270	182,556	57.3	51.1	63.3
60 - 64	-	-	-	-	-	197	163,827	66.3	59.7	72.2
65 - 69	-	-	-	-	-	108	89,360	59.4	49.9	68.3
70 - 74	-	-	-	-	-	117	74,737	63.0	53.7	71.5
75+	-	-	-	-	-	134	99,454	60.1	51.8	67.9
<b>Ethnicity</b>										
Malay	374	345,059	7.1	6.3	8.0	3,481	2,906,154	59.9	58.3	61.4
Chinese	93	111,253	6.9	5.4	8.8	814	1,009,733	62.7	59.3	65.9
Indian	47	44,014	6.0	4.1	8.7	496	440,935	60.5	55.9	64.9
Other Bumiputeras	58	4,989	4.1	3.1	5.5	851	248,331	69.7	66.3	72.9
Others	39	36,580	7.8	5.0	11.8	295	272,324	57.8	50.5	64.7
<b>Marital Status</b>										
Single	173	197,564	7.3	6.1	8.7	1,549	1,697,106	62.6	60.0	65.1
Married	279	265,931	6.8	5.9	7.8	2,627	2,394,665	61.0	59.1	62.9
Widow/Widower/Divorcee	45	30,669	7.9	5.6	11.1	317	230,417	59.4	54.1	64.5
<b>Education Level</b>										
No formal education	41	27,879	6.518	4.3	9.8	350	266,895	62.395	57.1	67.4
Primary	166	145,472	6.6	5.5	7.9	1,536	1,339,929	60.5	57.9	63.0
Secondary	221	229,170	7.1	6.0	8.3	1,963	1,974,599	61.1	58.9	63.3
Tertiary	93	106,508	6.9	5.4	8.9	940	977,276	63.7	60.4	66.9
Unclassified	32	30,364	6.304	4.3	9.1	282	298,342	61.944	56.3	67.3



Sociodemographics characteristics	Yes					No				
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI	
				Lower	Upper				Lower	Upper
<b>MALAYSIA</b>	<b>611</b>	<b>593,631</b>	<b>6.6</b>	<b>6.0</b>	<b>7.2</b>	<b>5,937</b>	<b>5,588,000</b>	<b>61.8</b>	<b>60.5</b>	<b>63.1</b>
<b>Occupation</b>										
Government employee/Semi government	60	52,207	7.8	5.7	10.5	542	416,914	62.3	57.7	66.6
Private employee	132	159,727	6.7	5.4	8.2	1,262	1,458,384	60.9	58.1	63.5
Self employed	83	70,165	6.9	5.3	9.1	684	614,657	60.7	56.5	64.8
Unpaid worker/home maker	83	74,280	7.4	5.7	9.6	708	639,212	63.9	60.4	67.3
Retiree	38	25,203	5.6	3.9	8.1	350	266,169	59.5	54.4	64.3
<b>Household Income group (RM)</b>										
Less than RM400	48	39576	6.6	4.7	9.3	418	378,877	63.4	58.9	67.8
RM400 – RM499	-	-	-	-	-	73	56,893	48.9	38.2	59.8
RM500 – RM699	-	-	-	-	-	253	214,044	64.1	57.6	70.0
RM700 – RM999	-	-	-	-	-	367	343,846	64.7	59.8	69.3
RM1000 – RM1999	127	115,810	7.1	5.7	8.8	1,132	1,007,473	61.9	58.9	64.9
RM2000 – RM2999	98	89,222	5.6	4.4	7.1	1,041	1,002,019	62.9	59.8	65.8
RM3000 – RM3999	86	77,580	6.2	4.8	7.9	790	763,292	60.9	57.4	64.3
RM4000 – RM4999	59	64,870	7.3	5.4	9.7	543	540,608	60.5	56.3	64.5
RM5000 and above	131	143,424	6.9	5.5	8.5	1,320	1,280,612	61.2	58.4	63.9
<b>Health Care Coverage</b>										
GL	145	133,055	7.0	5.7	8.6	1,550	1,201,506	63.1	60.5	65.7
Employer-sponsored	80	109,921	7.1	5.5	9.2	808	949,016	61.4	58.1	64.6
Private Insurance	106	116,512	6.1	4.9	7.7	1,108	1,152,384	60.7	57.8	63.5

Missing values are not included

95% CI = 95% Confidence Interval

"Count" = number of respondents who answered affirmative for this section, and this is not the total sample unless otherwise stated.

Table 2.14: Proportion of preferred provider for in-patient care

Type of health facility	Count	Estimated population	Proportion (%)	95% CI	
				Lower	Upper
<b>TOTAL (Overall)</b>	<b>28,498</b>	<b>27,278,956</b>	<b>100.0</b>	-	-
Government	23,084	20,751,684	76.1	74.4	77.7
Private	5,120	6,212,538	22.8	21.2	24.4
Traditional or complementary medicine	37	28,783	0.1	0.1	0.2
Others	39	27,822	0.1	0.1	0.2
Missing <sup>1</sup>	218	258,130	0.9	0.8	1.1

Missing values include "Don't know", "Refuse to answer" and "No Answer"  
95% CI = 95% Confidence Interval

Table 2.15: Preferred provider for in-patient care by sociodemographic characteristics

Sociodemographics characteristics	Government health facility						Private health facility						TCM					
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI				
				Lower	Upper				Lower	Upper				Lower	Upper			
<b>MALAYSIA</b>	<b>23,084</b>	<b>20,751,684</b>	<b>76.1</b>	<b>74.4</b>	<b>77.7</b>	<b>5,120</b>	<b>6,212,538</b>	<b>22.8</b>	<b>21.2</b>	<b>24.4</b>	<b>37</b>	<b>28,783</b>	<b>0.1</b>	<b>0.1</b>	<b>0.2</b>			
<b>State</b>																		
Johor	1,922	2,462,273	77.0	72.9	80.6	528	706,428	22.1	18.4	26.2	3	2,849	0.1	0.0	0.3			
Kedah	1,455	1,509,647	82.2	76.9	86.5	234	311,342	17.0	12.7	22.3	-	-	-	-	-			
Kelantan	1,821	1,410,363	96.1	94.4	97.3	74	56,831	3.9	2.7	5.5	-	-	-	-	-			
Melaka	1,267	616,202	78.1	70.1	84.5	320	165,983	21.0	15.0	28.7	3	1,651	0.2	0.1	0.8			
Negeri Sembilan	1,242	768,214	78.7	74.1	82.7	280	202,625	20.8	16.8	25.3	4	2,834	0.3	0.1	1.0			
Pahang	1,400	1,176,532	84.8	79.6	88.8	224	200,343	14.4	10.4	19.6	3	1,713	0.1	0.0	0.4			
Penang	1,240	854,329	55.9	44.6	66.7	542	665,779	43.6	33.0	54.8	-	-	-	-	-			
Perak	1,258	1,722,346	76.8	71.5	81.3	302	469,417	20.9	16.4	26.2	1	1,740	0.1	0.0	0.6			
Perlis	1,294	199,050	91.7	89.2	93.6	108	15,983	7.4	5.8	9.3	-	-	-	-	-			
Selangor	2,609	3,229,034	59.8	55.1	64.4	1,446	2,106,900	39.0	34.6	43.7	5	4,809	0.1	0.0	0.2			
Terengganu	1,652	904,915	89.4	85.8	92.2	182	104,654	10.3	7.6	14.0	8	251	0.0	0.0	0.2			
Sabah/Labuan	2,921	2,881,703	89.6	86.1	92.3	251	293,252	9.1	6.6	12.5	4	3,203	0.1	0.0	0.5			
Sarawak	1,717	1,981,583	85.5	80.3	89.5	215	293,506	12.7	9.1	17.4	5	7,960	0.3	0.1	1.0			
WP Kuala Lumpur	602	976,692	60.3	51.8	68.2	293	608,909	37.6	29.8	46.1	1	1,773	0.1	0.0	0.8			
WP Putrajaya	684	58,800	83.4	78.1	87.6	121	10,584	15.0	10.9	20.3	-	-	-	-	-			

Sociodemographics characteristics	Government health facility					Private health facility					TCM				
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI	
				Lower	Upper				Lower	Upper				Lower	Upper
<b>MALAYSIA</b>	<b>23,084</b>	<b>20,751,684</b>	<b>76.1</b>	<b>74.4</b>	<b>77.7</b>	<b>5,120</b>	<b>6,212,538</b>	<b>22.8</b>	<b>21.2</b>	<b>24.4</b>	<b>37</b>	<b>28,783</b>	<b>0.1</b>	<b>0.1</b>	<b>0.2</b>
<b>Location</b>															
Urban	12,377	13,784,542	70.7	68.5	72.8	3835	5,491,268	28.2	26.1	30.3	16	22,449	0.1	0.1	0.2
Rural	10,707	6,967,142	89.5	87.8	91.0	1285	7,212,700	9.27	7.9	10.9	21	6,333	0.1	0.0	0.2
<b>Sex</b>															
Male	11,099	10,592,157	75.9	74.1	77.6	2517	3,199,604	22.9	21.3	24.6	18	15,987	0.1	0.1	0.2
Female	11,985	10,159,528	76.3	74.5	78.0	2603	3,012,934	22.6	20.9	24.4	19	12,795	0.0	0.0	0.2
<b>Age group (years)</b>															
0-4	2,236	1,845,792	78.0	75.3	80.5	525	514,183	21.7	19.2	24.5	2	105	0.0	0.0	0.0
5-9	2,420	2,069,957	79.7	76.8	82.3	473	516,601	19.9	17.3	22.8	2	68	0.0	0.0	0.0
10-14	2,428	2,111,244	80.0	77.4	82.3	456	481,424	18.2	16.0	20.7	7	2,708	0.1	0.0	0.4
15-19	2,084	2,237,039	81.5	78.9	83.7	326	453,023	16.5	14.3	19.0	5	9,025	0.3	0.1	0.8
20-24	1,632	1,928,570	71.1	67.6	74.4	439	744,042	27.4	24.2	30.9	4	225	0.1	0.0	0.3
25-29	1,600	1,825,485	70.1	66.7	73.2	482	753,320	28.9	25.8	32.2	1	303	0.0	0.0	0.1
30-34	1,395	1,430,800	69.3	65.9	72.4	468	606,416	29.4	26.3	32.6	3	3,106	0.2	0.0	0.7
35-39	1,334	1,257,989	68.2	64.9	71.3	449	573,984	31.1	28.0	34.4	2	746	0.0	0.0	0.2
40-44	1,414	1,233,590	71.5	68.2	74.6	410	473,966	27.5	24.4	30.7	1	1,740	0.1	0.0	0.7
45-49	1,449	1,179,058	75.1	71.8	78.1	337	372,992	23.8	20.8	27.0	2	223	0.1	0.0	0.6
50-54	1,401	1,026,235	78.1	75.0	81.0	267	275,715	21.0	18.1	24.2	-	-	-	-	-
55-59	1,257	851,362	82.8	79.4	85.9	190	166,475	16.2	13.2	19.7	2	842	0.1	0.0	0.3
60-64	869	652,928	84.5	81.3	87.2	113	107,927	14.0	11.3	17.1	4	3,322	0.4	0.1	1.2
65-69	603	428,199	85.8	81.3	89.4	65	64,493	12.9	9.4	17.4	-	-	-	-	-
70-74	477	310,425	84.3	78.8	88.6	50	46,284	12.6	8.8	17.6	2	2,332	0.6	0.1	2.9
75+	485	363,011	85.2	80.6	88.9	70	61,694	14.5	10.8	19.1	-	-	-	-	-
<b>Ethnicity</b>															
Malay	14,637	11,796,719	82.8	80.9	84.5	2,244	2,363,865	16.6	14.9	18.4	7	6,373	0.0	0.0	0.1
Chinese	2,935	3,463,583	54.7	51.2	58.1	1,927	2,761,544	43.6	40.2	47.1	16	15,435	0.2	0.1	0.5
Indian	1,621	1,347,709	73.5	69.6	77.0	482	468,704	25.6	22.1	29.4	2	879	0.0	0.0	0.2
Bumiputera Sarawak	929	1,073,758	95.6	92.3	97.5	39	40,213	3.6	1.9	6.5	2	3,248	0.3	0.1	1.6
Bumiputera Sabah	1,768	1,987,185	93.4	91.1	95.2	99	111,557	5.3	3.7	7.5	-	-	-	-	-
Other Bumiputeras	62	49,973	99.5	94.9	100.0	8	251	0.5	0.0	5.1	-	-	-	-	-
Others	1,132	1,032,758	66.3	59.9	72.2	329	466,655	30.0	24.3	36.3	2	2,596	0.2	0.0	1.0
<b>Marital Status</b>															
Single	5,585	5,864,671	74.3	72.0	76.3	1,291	1,895,931	24.0	22.0	26.1	13	12,117	0.1	0.1	0.3
Married	9,954	8,642,945	74.8	72.9	76.5	2,356	2,804,108	24.3	22.5	26.1	13	11,411	0.1	0.1	0.2
Separated	100	92,070	80.6	68.0	89.1	14	22,097	19.4	10.9	32.0	-	-	-	-	-
Divorced	309	238,983	82.1	75.8	87.0	47	46,967	16.1	11.3	22.4	1	1,773	0.2	0.1	4.2
Widow/widower	966	662,613	84.8	81.7	87.5	126	108,771	13.9	11.4	16.9	2	883	0.1	0.0	0.5
Cohabiting	3	5,359	48.7	12.6	86.2	3	5,637	51.3	13.8	87.4	-	-	-	-	-
Others	4	4,362	65.8	20.8	93.4	2	2,267	34.2	6.6	79.2	-	-	-	-	-

Sociodemographics characteristics	Government health facility					Private health facility					TCM				
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI	
				Lower	Upper				Lower	Upper				Lower	Upper
<b>MALAYSIA</b>	<b>23,084</b>	<b>20,751,684</b>	<b>76.1</b>	<b>74.4</b>	<b>77.7</b>	<b>5,120</b>	<b>6,212,538</b>	<b>22.8</b>	<b>21.2</b>	<b>24.4</b>	<b>37</b>	<b>28,783</b>	<b>0.1</b>	<b>0.1</b>	<b>0.2</b>
<b>Education Level</b>															
Primary	6,859	5,834,556	81.5	79.7	83.2	1,116	1,244,783	17.4	15.8	19.1	9	6,165	0.1	0.0	0.2
Secondary	7,775	7,481,673	77.1	75.3	78.8	1,619	2,118,194	21.8	20.1	23.6	14	16,888	0.2	0.1	0.3
Tertiary	2,578	2,514,705	59.1	56.0	62.2	1,275	1,706,232	40.1	37.1	43.2	4	3,089	0.1	0.0	0.2
No formal education	1,401	1,063,097	87.2	84.1	89.8	126	123,847	10.2	7.8	13.1	5	112	0.0	0.0	0.1
<b>Occupation</b>															
Government /Semi government	1,816	1,472,717	81.3	78.9	83.5	322	321,253	17.7	15.6	20.1	1	397	0.0	0.0	0.2
Private employee	4,080	4,484,750	64.1	62.4	65.6	1679	2,421,794	34.6	33.0	36.2	7	11,194	0.2	0.1	0.4
Self employed	3,095	2,665,409	79.4	77.5	81.1	559	659,009	19.6	17.9	21.5	7	5,826	0.2	0.1	0.4
Unpaid worker/home maker	2,758	2,256,714	81.8	80.0	83.5	442	482,681	17.5	15.8	19.3	2	561	0.0	0.0	0.1
Retiree	1,514	1,128,747	84.9	82.5	86.9	201	181,904	13.7	11.7	15.9	2	1,044	0.1	0.0	0.3
<b>Household Income group (RM)</b>															
Less than RM400	1,826	1,618,702	80.3	76.4	83.7	308	365,579	18.1	14.9	21.9	10	2,509	0.1	0.0	0.5
RM400 – RM499	416	388,208	93.3	88.6	96.2	26	20,641	4.96	2.6	9.4	1	2,436	0.6	0.1	4.0
RM500 – RM699	1,072	868,329	92.2	88.7	94.7	56	57,566	6.11	3.9	9.3	1	581	0.1	0.0	0.4
RM700 – RM999	1,734	1,520,364	91.9	88.6	94.3	112	118,709	7.17	4.9	10.4	-	-	-	-	-
RM1000 – RM1999	5,385	4,451,822	87.4	85.4	89.1	496	594,718	11.7	10.0	13.5	4	1,880	0.0	0.0	0.1
RM2000 – RM2999	4,136	3,797,372	82.7	80.2	84.9	601	732,141	15.9	13.8	18.2	8	7,936	0.2	0.1	0.4
RM3000 – RM3999	2,939	2,725,522	73.9	70.7	76.9	741	932,299	25.3	22.4	28.4	1	397	0.0	0.0	0.1
RM4000 – RM4999	1,889	1,944,130	73.1	69.1	76.7	569	699,070	26.3	22.7	30.2	5	3,604	0.1	0.0	0.4
RM5000 and above	3,687	3,437,235	55.3	51.8	58.8	2,211	2,691,815	43.3	39.9	46.8	7	9,439	0.2	0.1	0.4
<b>Health Care Coverage</b>															
Guarantee letter (GL)	5,555	4,359,915	83.1	80.4	85.5	869	847,887	16.2	13.8	18.8	4	2,115	0.0	0.0	0.2
Employer-sponsored	1,943	2,092,093	51.0	47.7	54.4	1,508	1,965,850	48.0	44.6	51.3	3	4,671	0.1	0.0	0.4
Private insurance	2,970	2,792,295	46.8	43.8	49.9	2,422	3,107,230	52.1	49.0	55.1	8	7,005	0.1	0.1	0.3
<b>Citizenship Status</b>															
Citizen	22,078	19,397,976	76.7	75.0	78.3	4,747	5,677,446	22.4	20.9	24.1	36	26,346	0.1	0.1	0.2
PR	158	188,048	81.7	70.6	89.2	27	40,101	17.4	10.0	28.5	-	-	-	-	-
Non citizen	796	1,123,602	66.9	60.5	72.8	334	482,494	28.7	23.0	35.3	1	2,436	0.1	0.0	1.0

Note: Missing values are not included

Caution some cells have count less than 30. Results should be interpreted with caution.

95% CI = 95% Confidence Interval

Table 2.16: Top three factors associated with preferred provider for in-patient care

Reason*	Yes				No					
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI	
				Lower	Upper				Lower	Upper
Cheap	10,318	9,372,135	34.4	33.2	35.5	18,180	17,906,821	65.6	64.5	66.8
Near	7,657	7,258,624	26.6	25.4	27.8	20,841	20,020,332	73.4	72.2	74.6
Familiarity	4,074	4,150,042	15.2	14.3	16.1	24,423	23,128,106	84.8	83.8	85.7

\*The reasons were not analysed according to preference by facility

Missing values are not included

95% CI = 95% Confidence Interval

Table 2.17: Proportion of preferred provider for out-patient care

Type of health facility	Count	Estimated population	Proportion (%)	95% CI	
				Lower	Upper
<b>TOTAL (Overall)</b>	<b>28,498</b>	<b>27,278,956</b>	<b>100.0</b>	-	-
Government	18,398	16,268,681	59.6	58.9	60.4
Private	9,812	10,735,887	39.4	38.6	40.1
Traditional or complementary medicine	75	64,124	0.2	0.2	0.3
Others	67	59,643	0.2	0.2	0.3
Missing <sup>1</sup>	146	150,622	0.6	0.5	0.7

<sup>1</sup>Missing values include "Don't know", "Refuse to answer" and "No Answer"

95% CI = 95% Confidence Interval

Table 2.18: Preferred provider for out-patient care by sociodemographic characteristics

Sociodemographics characteristics	Government health facility					Private health facility					TCM				
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI	
				Lower	Upper				Lower	Upper				Lower	Upper
<b>MALAYSIA</b>	<b>18,398</b>	<b>16,268,681</b>	<b>59.6</b>	<b>58.9</b>	<b>60.4</b>	<b>9,812</b>	<b>10,735,887</b>	<b>39.4</b>	<b>38.6</b>	<b>40.1</b>	<b>75</b>	<b>64,124</b>	<b>0.2</b>	<b>0.2</b>	<b>0.3</b>
<i>State</i>															
Johor	1,331	1,649,469	51.6	47.2	56.0	1,111	1,507,425	47.1	42.7	51.6	8	9,701	0.3	0.1	0.7
Kedah	1,132	1,182,654	64.4	57.7	70.6	554	643,441	35.0	28.9	41.7	2	1,907	0.1	0.0	0.4
Kelantan	1,553	1,205,164	82.1	77.3	86.1	341	261,199	17.8	13.8	22.7	-	-	-	-	-
Melaka	933	438,244	55.5	50.4	60.6	653	343,581	43.5	38.8	48.5	8	4,820	0.6	0.2	1.8
Negeri Sembilan	996	590,667	60.5	54.3	66.5	519	377,189	38.7	32.6	45.1	8	4,438	0.5	0.2	1.2
Pahang	1,251	1,051,383	75.8	69.8	80.9	373	322,495	23.2	18.2	28.2	3	1,808	0.1	0.0	0.4
Penang	993	737,421	48.3	38.5	58.2	787	780,712	51.1	41.4	60.8	-	-	-	-	-
Perak	1,012	1,345,548	60.0	54.3	65.4	559	867,474	38.7	33.2	44.4	6	8,000	0.4	0.2	0.8
Perlis	1,045	160,789	74.1	68.6	78.9	362	54,813	25.3	20.5	30.7	-	-	-	-	-
Selangor	1,931	2,331,859	43.2	38.6	47.9	2,133	3,014,432	55.8	51.2	60.4	8	10,482	0.2	0.1	0.4
Terengganu	1,343	728,946	72.0	67.1	76.5	490	280,797	27.7	23.3	32.7	9	653	0.1	0.0	0.3
Sabah/Labuan	2,416	2,378,633	73.9	69.0	78.3	753	807,134	25.1	20.8	30.0	15	10,844	0.3	0.2	0.6
Sarawak	1,557	1,774,731	76.6	69.5	82.5	370	49,325	21.3	15.8	28.1	5	7,000	0.3	0.1	0.9
WP Kuala Lumpur	405	650,490	40.2	33.7	47.0	497	955,004	59.0	52.3	65.3	3	4,470	0.3	0.1	0.9
WP Putrajaya	500	42,683	60.5	53.9	66.8	310	26,928	38.2	32.0	44.8	-	-	-	-	-
<i>Location</i>															
Urban	9,340	10,259,321	52.6	50.3	54.9	6,865	903,732	46.4	44.1	48.6	48	53,331	0.3	0.2	0.4
Rural	9,058	6,009,359	77.2	74.9	79.3	2,947	1,698,573	21.8	19.7	24.1	27	10,793	0.1	0.1	0.2
<i>Sex</i>															
Male	8,868	8,324,452	59.6	57.7	61.6	4,752	5,500,004	39.4	37.5	41.3	34	32,260	0.2	0.2	0.3
Female	9,530	7,944,229	59.6	57.7	61.6	5,060	5,235,883	39.3	37.4	41.3	41	31,863	0.2	0.2	0.4
<i>Age group (years)</i>															
0-4	1,730	1,421,279	60.1	57.8	62.3	1,030	938,982	39.7	37.5	41.9	3	512	0.0	0.0	0.1
5-9	1,942	1,656,352	63.8	61.6	65.9	948	929,903	35.8	33.7	38.0	3	2,099	0.1	0.0	0.3
10-14	2,028	1,744,690	66.1	63.9	68.2	858	855,599	32.4	30.3	34.6	7	5,126	0.2	0.1	0.5
15-19	1,801	1,901,884	69.3	66.8	71.6	619	804,977	29.3	27.0	31.8	8	10,655	0.4	0.2	0.8
20-24	1,296	1,512,713	55.8	53.0	58.5	787	1,171,406	43.2	40.4	46.0	2	1,109	0.0	0.0	0.2
25-29	1,206	1,355,929	52.0	49.2	54.9	878	1,237,468	47.5	44.7	50.3	3	2,396	0.1	0.0	0.4
30-34	1,015	1,025,306	49.6	46.9	52.4	852	1,016,540	49.2	46.5	52.0	3	2,478	0.1	0.0	0.5
35-39	979	893,325	48.4	45.5	51.3	802	933,556	50.6	47.7	53.5	5	5,157	0.3	0.1	0.8
40-44	1,069	907,415	52.6	49.7	55.5	743	790,067	45.8	43.0	48.7	5	5,803	0.3	0.1	0.9
45-49	1,117	894,367	57.0	54.0	59.9	675	663,894	42.3	39.4	45.3	3	3,339	0.2	0.1	0.7
50-54	1,120	797,826	60.7	57.7	63.7	538	491,565	37.4	34.5	40.4	7	9,294	0.7	0.3	1.5
55-59	1,015	686,261	66.8	63.6	69.8	429	332,545	32.4	29.3	35.6	10	5,047	0.5	0.2	1.0
60-64	727	528,235	68.4	64.5	72.0	259	235,731	30.5	26.9	34.4	5	4,013	0.5	0.2	1.4

Sociodemographics characteristics	Government health facility				Private health facility				TCM			
	Count	Estimated population	Prevalence (%)	95% CI Lower Upper	Count	Estimated population	Prevalence (%)	95% CI Lower Upper	Count	Estimated population	Prevalence (%)	95% CI Lower Upper
<b>MALAYSIA</b>	<b>18,398</b>	<b>16,268,681</b>	<b>59.6</b>	<b>58.9 60.4</b>	<b>9,812</b>	<b>10,735,887</b>	<b>39.4</b>	<b>38.6 40.1</b>	<b>75</b>	<b>64,124</b>	<b>0.2</b>	<b>0.2 0.3</b>
65-69	518	355,805	71.3	66.2 75.9	149	139,219	27.9	23.3 33.0	3	1,119	0.2	0.1 0.7
70-74	409	275,459	74.8	69.6 79.4	119	83,807	22.8	18.5 27.7	4	3,739	1.0	0.3 3.2
75+	426	311,835	73.2	67.9 77.9	126	110,630	26.0	21.3 31.2	3	2,239	0.5	0.1, 2.1
<b>Ethnicity</b>												
Malay	11,509	9,123,641	64.0	61.8 66.2	5,369	5,037,309	35.3	33.2 37.5	19	20,082	0.1	0.1 0.2
Chinese	2,128	2,432,865	38.4	35.4 41.6	2,728	3,802,304	60.0	56.8 63.2	36	34,169	0.5	0.4 0.8
Indian	1,393	1,173,078	64.0	59.4 68.3	718	654,864	35.7	31.4 40.3	2	1,090	0.1	0.0 0.2
Other Bumiputeras	2,462	2,767,873	83.9	82.1 85.5	437	501,441	15.2	13.6 16.9	13	4,974	0.2	0.1 0.4
Others	906	771,223	49.5	45.6 53.4	560	739,969	47.5	43.6 51.4	5	3,810	0.2	0.1 0.7
<b>Marital Status</b>												
Single	4,601	4,763,394	60.2	58.7 61.7	2,305	3,051,576	38.6	37.1 40.1	19	19,571	0.2	0.1 0.4
Married	7,806	6,606,589	56.6	55.5 57.7	4,611	4,957,952	42.5	41.4 43.6	35	29,288	0.3	0.2 0.4
Widow/widower	1,083	750,135	70.0	66.8 72.9	361	304,318	28.4	25.5 31.5	10	9,340	0.9	0.4 1.8
<b>Education level</b>												
No formal education	1,268	960,207	78.8	75.1 82.0	268	237,262	19.5	16.2 23.2	8	2,889	0.2	0.1 0.8
Primary	5,694	4,760,838	66.5	64.2 68.7	2,269	2,318,528	32.4	30.2 34.6	31	26,952	0.4	0.2 0.6
Secondary	6,126	5,842,905	60.2	58.1 62.2	3,276	3,766,973	38.8	36.8 40.8	24	27,852	0.3	0.2 0.4
Tertiary	1,720	1,614,277	37.9	35.3 40.6	2,138	2,621,496	61.6	58.9 64.1	5	2,258	0.1	0.0 0.2
Unclassified	1,169	1,098,448	67.5	63.4 71.3	459	480,017	29.5	25.7 33.6	3	3,626	0.2	0.1 0.7
<b>Occupation</b>												
Government /Semi government	1,369	1,095,694	60.5	56.6 64.3	769	702,905	38.8	35.1 42.7	2	1,427	0.1	0.0 0.4
Private employee	2,980	3,225,208	46.1	43.7 48.4	2,787	3,703,012	52.9	50.6 55.2	13	14,947	0.2	0.1 0.4
Self employed	2,431	2,042,283	60.8	58.1 63.5	1,211	1,276,194	38.0	35.4 40.7	22	16,688	0.5	0.3 0.8
Unpaid worker/home maker	2,247	1,821,966	66.0	63.4 68.6	956	918,854	33.3	30.8 35.9	9	9,256	0.3	0.2 0.7
Retiree	1,291	941,872	70.8	67.5 73.9	426	373,205	28.1	25.0 31.4	7	4,979	0.4	0.2 0.9
<b>Household Income group (RM)</b>												
Less than RM400	1,575	1,399,819	69.4	65.2 73.3	548	578,368	28.7	24.9 32.8	19	10,698	0.5	0.3 1.0
RM400 - RM499	379	369,597	88.9	83.8 92.5	65	41,560	10.0	6.6 14.8	-	-	-	-
RM500 - RM699	973	772,384	82.0	77.4 85.8	157	156,202	16.6	12.9 21.0	3	4,395	0.5	0.1 1.5
RM700 - RM999	1,518	1,331,198	80.4	76.7 83.7	329	310,942	18.8	15.5 22.5	5	4,130	0.2	0.1 0.7
RM1000 - RM1999	4,599	3,801,012	74.6	72.1 76.9	1,286	1,256,184	24.6	22.3 27.1	8	4,418	0.1	0.0 0.2
RM2000 - RM2999	3,300	2,967,800	64.6	61.7 67.4	1,453	1,588,176	34.6	31.8 37.5	7	8,152	0.2	0.1 0.4
RM3000 - RM3999	2,207	1,997,261	54.2	50.8 57.5	1,472	1,665,982	45.2	41.9 48.4	9	7,700	0.2	0.1 0.5
RM4000 - RM4999	1,375	1,374,076	51.7	47.1 56.2	1,081	1,257,567	47.3	42.8 51.8	9	9,178	0.3	0.1 0.8
RM5000 and above	2,472	2,255,535	36.3	33.4 39.3	3,421	3,880,906	62.5	59.5 65.4	15	15,453	0.2	0.1 0.5

Sociodemographics characteristics	Government health facility				Private health facility				TCM				
	Count	Estimated population	Prevalence (%)		Count	Estimated population	Prevalence (%)		Count	Estimated population	Prevalence (%)		
			Lower	Upper			Lower	Upper			Lower	Upper	
<b>MALAYSIA</b>	<b>18,398</b>	<b>16,268,681</b>	<b>59.6</b>	<b>58.9</b>	<b>9,812</b>	<b>10,735,887</b>	<b>39.4</b>	<b>38.6</b>	<b>75</b>	<b>64,124</b>	<b>0.2</b>	<b>0.2</b>	<b>0.3</b>
<b>Health Care Coverage</b>													
Guaranteee letter (GI)	4,180	3,232,773	61.6	58.5	2,248	1,986,621	37.7	34.8	6	5,427	0.1	0.0	0.3
Employer-sponsored	272	324,359	94.7	90.9	11	10,556	3.1	1.5	-	-	-	-	-
Private Insurance	2,092	1,976,813	33.1	30.6	3,304	3,938,931	66.0	63.4	16	14,173	0.2	0.1	0.4

Note: Missing values are not included

Caution some cells have count less than 30. Results should be interpreted with caution.

95% CI = 95% Confidence Interval

**Table 2.19: Top three factors associated with preferred provider for out-patient care**

Reason	Yes				No			
	Count	Estimated population	Prevalence (%)		Count	Estimated population	Prevalence (%)	
			Lower	Upper			Lower	Upper
Cheap	8,455	7,556,202	27.7	26.6	20,043	19,722,755	72.3	71.2
Near	7,243	7,055,004	25.9	24.7	21,255	20,223,952	74.1	73.0
Familiarity	4,640	4,662,757	17.1	16.2	23,856	22,613,650	82.9	82.0

Note: Missing values are not included

\*The reasons were not analysed according to preference by facility

95% CI = 95% Confidence Interval

**Table 2.20: Overall prevalence of promotive and preventive activities**

Type of care	Yes				No				Missing <sup>1</sup>				
	Count	Estimated population	Prevalence (%)		Count	Estimated population	Prevalence (%)		Count	Estimated population	Prevalence (%)		n
			Lower	Upper			Lower	Upper			Lower	Upper	
Medical check-up	8,689	7,809,838	37.8	36.7	12,255	12,792,431	61.8	61	78	83,950	0.4	0.3	21,022
Family planning	797	761,175	3.7	3.3	20,143	19,828,979	95.9	95.5	82	96,066	0.5	0.4	21,022
Immunisation	3,363	3,191,337	11.7	11.1	24,987	23,946,583	87.8	87.3	148	141,036	0.5	0.4	28,498
PAP Smear examination	1,251	1,116,304	12.8	11.9	8,375	7,536,261	86.4	85.5	69	67,794	0.8	0.6	9,695
Mammogram	588	528,384	6.1	5.5	4,775	3,519,821	91.3	90.3	67	64,388	1.7	1.2	5,178

<sup>1</sup>Missing values include "Don't know", "Refuse to answer" and "No Answer"

95% CI = 95% Confidence Interval



Table 2.21: Promotive and preventive activities by sociodemographics characteristics

Sociodemographics characteristics	Medical check-up					Family planning					Vaccination				
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI	
				Lower	Upper				Lower	Upper				Lower	Upper
<b>MALAYSIA</b>	<b>8,689</b>	<b>7,809,838</b>	<b>37.8</b>	<b>36.9</b>	<b>38.6</b>	<b>797</b>	<b>761,175</b>	<b>3.7</b>	<b>3.4</b>	<b>4.0</b>	<b>3,363</b>	<b>3,191,337</b>	<b>11.7</b>	<b>11.2</b>	<b>12.2</b>
<i>State</i>															
Johor	700	908,300	37.2	34.7	39.8	59	79,765	3.3	2.5	4.3	363	439,546	13.7	12.3	15.4
Kedah	496	522,018	38.2	35.1	41.5	45	46,948	3.4	2.3	5.1	239	251,908	13.7	11.9	15.7
Kelantan	539	409,482	38.7	36.0	41.4	41	32,854	3.1	2.3	4.2	115	84,511	5.8	4.8	6.9
Melaka	564	249,405	40.5	36.9	44.2	38	17,327	2.8	1.9	4.2	199	89,946	11.4	11.4	13.7
Negeri Sembilan	558	330,718	44.4	40.9	47.9	43	28,118	3.8	2.7	5.3	160	106,139	10.9	9.1	12.9
Pahang	499	404,924	39.6	36.6	42.7	44	35,448	3.5	2.5	4.7	138	110,709	8.0	6.7	9.4
Penang	671	566,826	46.6	42.7	50.4	32	36,964	3.0	1.8	5.0	167	152,493	10.0	8.1	12.2
Perak	537	723,975	41.7	38.5	44.9	47	62,350	3.6	2.6	4.9	245	347,319	15.5	13.5	17.6
Perlis	519	72,161	42.4	39.2	45.6	55	8,084	4.8	3.6	6.3	185	29,109	13.4	11.6	15.4
Selangor	1,183	1,523,168	36.1	34.2	38.1	109	135,668	3.2	2.6	4.0	501	620,840	11.5	10.5	12.6
Terengganu	498	248,268	34.3	31.5	37.1	51	30,478	4.2	3.2	5.6	132	73,240	7.2	6.1	8.6
Sabah/Labuan	869	786,580	34.4	31.9	37.0	129	138,809	6.1	4.9	7.5	457	428,401	13.3	11.8	14.9
Sarawak	407	449,900	26.1	23.5	28.9	66	80,410	4.7	3.6	6.1	214	238,785	10.3	8.8	12.0
WP Kuala Lumpur	324	587,862	44.6	40.4	48.9	15	25,753	2.0	1.1	3.4	129	208,200	12.9	10.7	15.4
WP Putrajaya	325	26,250	52.3	48.0	56.6	23	2,198	4.4	2.9	6.6	119	10,189	14.4	12.0	17.3
<i>Location</i>															
Urban	5,134	5,799,307	38.7	37.6	39.7	408	484,700	3.2	2.9	3.6	1,922	2,261,759	11.6	11.0	12.2
Rural	3,555	2,010,531	35.4	34.2	36.6	389	276,475	4.9	4.3	5.5	1,441	929,578	11.9	11.2	12.7
<i>Sex</i>															
Male	3,776	3,693,068	34.9	33.7	36.2	102	111,369	1.1	0.8	1.3	1,433	1,414,203	10.1	9.5	10.8
Female	4,913	4,116,770	40.7	39.5	41.8	695	649,806	6.4	5.9	7.0	1,930	1,777,134	13.3	12.7	14.1
<i>Age group (years)</i>															
0-4	-	-	-	-	-	-	-	-	-	-	1,076	909,037	38.4	36.2	40.6
5-9	-	-	-	-	-	-	-	-	-	-	531	502,001	19.3	17.6	21.2
10-14	58	50,987	5.0	3.8	6.8	-	-	-	-	-	572	502,143	19.0	17.3	20.9
15-19	331	340,849	12.4	10.9	14.1	10	7,293	0.3	0.1	0.5	285	314,268	11.4	10.0	13.1
20-24	612	748,032	27.6	25.2	30.1	68	86,264	3.2	2.4	4.2	126	178,372	6.6	5.2	8.2
25-29	821	926,108	35.5	32.9	38.3	170	188,537	7.2	6.0	8.7	184	245,438	9.4	7.8	11.3
30-34	784	837,032	40.5	37.9	43.2	188	195,340	9.5	8.0	11.2	141	153,753	7.4	6.1	9.1
35-39	782	785,406	42.6	39.7	45.5	166	137,572	7.5	6.2	8.9	93	88,090	4.8	3.6	6.3
40-44	865	797,007	46.2	43.4	49.1	106	75,169	4.4	3.5	5.4	75	62,996	3.7	2.7	4.8
45-49	901	763,921	48.7	45.7	51.6	52	44,382	2.8	2.0	3.9	75	62,239	4.0	2.9	5.4
50-54	935	698,663	53.2	50.2	56.2	21	13,324	1.0	0.6	1.7	81	69,650	5.3	4.1	6.8
55-59	889	599,653	58.4	55.0	61.6	11	8,460	0.8	0.4	1.6	47	34,327	3.3	2.4	4.7
60-64	619	460,936	59.7	55.7	63.5	3	3,978	0.5	0.1	1.8	21	21,344	2.8	1.5	5.0
65-69	426	316,221	63.4	58.4	68.1	1	337	0.1	0.0	0.5	24	22,039	4.4	2.6	7.4
70-74	326	215,969	58.7	52.7	64.3	1	519	0.1	0.0	1.0	16	10,749	2.9	1.7	4.9
75+	340	269,054	63.2	57.9	68.2	-	-	-	-	-	16	14,891	3.5	1.8	6.6

Sociodemographics characteristics	Medical check-up				Family planning				Vaccination						
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI	
				Lower	Upper				Lower	Upper				Lower	Upper
<b>Ethnicity</b>															
Malay	5,218	4,157,675	39.7	38.7	40.8	5,218	4,157,675	4.2	3.8	4.6	2,077	1,729,323	12.1	11.5	12.7
Chinese	1,607	1,957,484	38.0	36.1	39.9	1,607	1,957,484	1.6	1.2	2.3	454	598,175	9.5	8.5	10.5
Indian	769	607,600	41.8	38.7	45.0	769	607,600	2.3	1.6	3.4	271	239,946	13.1	11.4	15.0
Other Bumiputeras	699	709,379	30.9	28.5	33.5	699	709,379	6.0	4.9	7.3	414	460,256	13.9	12.4	15.6
Others	396	377,700	28.4	24.7	32.4	396	377,700	5.2	3.8	7.0	147	163,638	10.5	8.2	13.4
<b>Marital Status</b>															
Single	1,445	1,587,083	20.1	18.9	21.3	5	3,603	0.0	0.0	0.1	801	843,712	10.7	9.8	11.6
Married	6,405	5,627,851	48.2	47.1	49.3	784	750,167	6.4	5.9	7.0	681	711,360	6.1	5.5	6.7
Widow/Widower	837	593,012	55.3	55.3	58.5	8	7,404	0.7	0.3	1.5	46	33,825	3.2	2.2	4.5
/Divorcee															
<b>Education level</b>															
No formal education	693	459,677	40.8	37.6	44.0	23	23,137	2.1	1.3	3.2	48	3,6798	3.0	2.1	4.3
Primary	2,217	1,732,095	35.3	33.6	36.9	117	115,617	2.4	1.9	2.9	919	810,016	11.3	10.5	12.2
Secondary	3,749	3,512,019	36.5	35.0	37.4	424	404,263	4.2	3.7	4.7	614	681,227	7.0	6.3	7.8
Tertiary	1,914	1,995,919	46.9	44.9	48.9	230	215,840	5.1	4.3	6.0	307	353,976	8.3	7.2	9.6
Unclassified	116	110,129	16.0	13.0	19.6	3	2,318	0.3	0.1	1.4	234	242,403	14.9	12.8	17.2
<b>Occupation</b>															
Government/Semi government	1,264	1,022,154	56.4	53.6	59.2	145	123,675	6.8	5.5	8.4	196	168,964	9.3	7.8	11.1
Private employee	2,267	2,572,098	36.7	35.2	38.3	197	207,630	3.0	2.5	3.5	299	416,948	6.0	5.1	6.9
Self employed	1,528	1,277,195	38.0	36.0	40.1	107	91,640	2.7	2.2	3.4	158	136,629	4.1	3.4	4.9
Unpaid worker	1,664	1,352,678	49.0	46.9	51.2	314	306,698	11.1	9.8	12.7	184	178,338	6.5	5.5	7.6
/home maker															
Retiree	1,102	819,832	61.6	58.6	64.6	4	3,444	0.3	0.1	0.9	49	45,914	3.5	2.3	5.1
<b>Household Income group (RM)</b>															
Less than RM400	670	554,111	39.9	36.8	43.0	49	49,017	3.5	2.5	4.9	231	211,697	10.5	9.1	12.1
RM400 – RM499	126	107,044	38.2	31.0	45.9	9	7,646	2.7	1.3	5.7	43	42,837	10.3	7.3	14.3
RM500 – RM699	300	220,171	31.6	27.7	35.9	34	29,824	4.3	2.8	6.5	115	92,165	9.8	7.9	12.1
RM700 – RM999	520	394,880	32.2	29.2	35.2	58	53,440	4.4	3.2	6.0	209	184,031	11.1	9.4	13.1
RM1000 – RM1999	1,678	1,331,537	34.6	32.8	36.4	176	151,318	3.9	3.3	4.7	657	562,105	11.0	10.0	12.1
RM2000 – RM2999	1,414	1,245,969	36.0	34.0	38.1	135	129,207	3.7	3.0	4.6	583	571,240	12.4	11.3	13.7
RM3000 – RM3999	1,145	1,052,478	37.0	34.8	39.3	93	98,975	3.5	2.7	4.5	448	444,752	12.1	10.8	13.5
RM4000 – RM4999	801	824,730	38.9	36.2	41.7	77	76,202	3.6	2.7	4.7	301	323,746	12.2	10.6	10.6
RM5000 and above	2,035	2,078,919	43.2	41.3	45.0	166	165,546	3.4	2.9	4.1	776	758,764	12.2	11.2	13.3

Note: Caution some cells have count less than 30. Results should be interpreted with caution.

The counts indicate "Yes" responses only

95% CI = 95% Confidence Interval

Table 2.22: Promotive and preventive activities by sociodemographics characteristics-continues

Sociodemographics characteristics	PAP Smear examination**				Mammogram**			
	Count	Estimated population	Prevalence (%)	95% CI Lower Upper	Count	Estimated population	Prevalence (%)	95% CI Lower Upper
<b>MALAYSIA</b>	<b>1,251</b>	<b>1,116,304</b>	<b>12.8</b>	<b>12 13.7</b>	<b>336</b>	<b>269,498</b>	<b>7.0</b>	<b>6.2 7.9</b>
<b>State</b>								
Johor	87	103,981	10.3	8.2 12.7	22	23,849	5.2	3.3 7.9
Kedah	89	78,206	13.5	10.8 16.8	17	12,708	4.3	2.6 7.2
Kelantan	59	46,556	10.6	8.2 13.6	12	8,599	3.8	2.2 6.8
Melaka	96	45,982	17.1	13.4 21.6	24	11,267	8.7	5.1 14.3
Negeri Sembilan	73	37,768	12.1	9.2 15.6	33	15,374	9.9	6.8 14.0
Pahang	56	43,700	10.7	8.1 14.0	16	9,707	5.0	3.0 8.2
Penang	89	81,382	14.9	11.0 19.9	24	21,539	8.2	5.0 13.2
Perak	88	115,548	15.9	12.8 19.6	33	43,699	10.9	7.6 15.3
Perlis	77	9,414	13.0	10.4 16.1	14	1,559	4.2	2.4 7.2
Selangor	165	207,122	11.6	9.9 13.5	56	62,306	9.2	7.1 12.0
Terengganu	69	35,319	12.0	9.5 15.2	14	5,701	4.2	2.3 7.4
Sabah/Labuan	139	121,490	13.1	10.8 15.9	35	19,345	6.6	4.6 9.4
Sarawak	104	116,091	16.1	13.1 19.6	17	16,714	5.0	3.0 8.2
WP Kuala Lumpur	38	72,042	12.1	8.4 17.1	11	16,724	6.8	3.6 12.5
WP Putrajaya	22	1,702	6.7	4.4 10.1	8	405	7.5	3.6 15.1
<b>Location</b>								
Urban	704	807,550	12.6	11.6 13.7	217	210,096	7.8	6.7 9.1
Rural	547	308,754	13.2	12.0 14.6	119	59,402	5.1	4.1 6.3
<b>Sex</b>								
Male	-	-	-	-	-	-	-	-
Female	1,251	1,116,304	12.8	12.0 13.7	336	269,498	7.0	6.2 7.9
<b>Age group (years)</b>								
0-4	-	-	-	-	-	-	-	-
5-9	-	-	-	-	-	-	-	-
10-14	-	-	-	-	-	-	-	-
15-19	4	4,892	1.1	0.4 3.2	-	-	-	-
20-24	55	73,156	5.5	4.0 7.5	-	-	-	-
25-29	139	164,140	13.1	10.6 16.0	-	-	-	-

Sociodemographics characteristics	PAP Smear examination**					Mammogram**				
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI	
				Lower	Upper				Lower	Upper
30 – 34	176	165,601	16.7	14.2	19.6	-	-	-	-	-
35 – 39	218	195,797	21.7	18.7	25.1	-	-	-	-	-
40 – 44	212	188,182	21.9	19.0	25.1	81	73,426	8.6	6.7	10.9
45 – 49	173	139,984	18.5	15.6	22.0	85	64,859	8.6	6.7	11.0
50 – 54	126	81,619	12.8	10.5	15.5	73	57,800	9.0	7.0	11.6
55 – 59	88	53,968	10.7	8.4	13.6	52	30,490	6.1	4.4	4.4
60 – 64	33	26,813	7.0	4.7	10.3	20	15,079	3.9	2.3	6.7
65 – 69	11	8,837	3.5	1.8	6.9	7	6,886	2.8	1.2	6.2
70 – 74	10	9,612	5.1	2.4	10.5	12	16,321	8.7	4.5	16.1
75+	6	3,704	1.5	0.6	3.6	6	4,637	1.9	0.8	4.6
<b>Ethnicity<sup>1</sup></b>										
Malay	673	509,390	11.4	10.5	12.5	152	107,913	5.5	4.6	6.7
Chinese	302	355,739	16.3	14.3	18.6	120	123,523	10.7	8.8	13.0
Indian	102	81,583	12.9	10.0	18.6	30	18,873	6.4	4.2	9.7
Other Bumiputeras	136	141,843	14.7	12.3	17.6	22	14,440	4.1	2.6	6.3
Others	38	27,749	5.6	3.5	8.7	12	4,749	4.6	2.0	9.9
<b>Marital Status<sup>1</sup></b>										
Single	14	19,138	0.9	0.5	1.7	7	7,804	4.0	1.8	8.6
Married	1,166	1,043,692	18.3	17.1	19.5	288	230,537	8.2	7.1	9.3
Widow/Widower/Divorcee	70	53,181	5.9	4.5	7.8	41	31,157	3.8	2.6	5.4
<b>Education level<sup>1</sup></b>										
No formal education	63	46,626	6.3	4.8	8.3	32	21,659	3.3	2.2	4.9
Primary	241	192,351	10.6	9.1	12.3	91	71,997	5.6	4.3	7.2
Secondary	680	609,795	15.3	14.0	16.8	167	134,166	9.1	7.7	10.8
Tertiary	262	264,371	12.7	11.0	14.6	42	37,804	9.7	6.9	13.6
Unclassified	5	3,162	3.0	1.1	8.3	4	3,871	9.0	3.2	22.9

Sociodemographics characteristics	PAP Smear examination**					Mammogram**					
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI		
				Lower	Upper				Lower	Upper	
<b>Occupation<sup>1</sup></b>											
Government /Semi government	163	122,332	15.2	12.7	18.2	35	24,473	9.4	6.2	14.0	
Private employee	280	304,658	11.6	10.1	13.3	50	49,064	7.9	5.8	10.7	
Self employed	201	174,385	17.1	14.5	20.0	61	43,272	7.0	5.2	9.5	
Unpaid worker/home maker	528	449,378	17.1	15.5	18.9	141	110,707	7.8	6.5	9.3	
Retiree	34	27,235	4.1	2.7	6.1	31	26,602	4.0	2.7	6.0	
<b>Household Income group (RM)<sup>1</sup></b>											
Less than RM400	86	71,906	9.2	7.2	11.7	31	28,340	5.9	4.0	8.7	
RM400 – RM499	20	18,486	13.4	8.4	20.9	9	9,457	12.6	5.7	25.7	
RM500 – RM699	51	48,802	14.8	10.5	20.5	10	7,690	4.6	2.4	8.9	
RM700 – RM999	66	51,030	9.7	7.3	12.8	14	8,111	3.1	1.8	5.5	
RM1000 – RM1999	248	193,904	12.3	10.6	14.3	49	34,214	4.9	3.5	6.7	
RM2000 – RM2999	188	163,869	11.7	9.8	13.9	35	23,869	4.3	2.9	6.4	
RM3000 – RM3999	161	146,773	12.8	10.5	15.5	58	45,111	9.5	7.0	12.6	
RM4000 – RM4999	115	119,461	14.0	11.4	17.2	33	28,124	7.9	5.3	11.6	
RM5000 and above	316	302,073	15.3	13.5	17.3	97	84,581	10.7	8.5	13.5	

Note: Caution some cells have count less than 30. Results should be interpreted with caution.

The counts indicate "Yes" responses only. Question was directed at female, ≥18 years old (for PAP Smear) and 40 years old (for Mammogram) respectively

<sup>1</sup> not includes missing

Table 2.23: Barriers in seeking care

Type of care	Yes					No					Missing		N			
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population		Prevalence (%)		
				Lower	Upper				Lower	Upper				Lower	Upper	
Could not afford the cost of treatment	79	69,409	8.8	6.7	11.4	681	686,406	86.8	83.6	89.4	35	35,302	4.5	3.0	6.7	795
No transport	72	62,894	8.0	5.5	11.4	689	693,741	87.7	84.0	90.6	34	34,482	4.4	2.9	6.6	795
Could not afford the cost of transportation	25	25,590	3.2	2.0	5.3	735	730,188	92.3	89.5	94.4	35	35,339	4.5	3.0	6.7	795
The health care provider's drugs or equipment are inadequate	9	11,815	1.5	0.7	3.3	748	740,309	93.6	91.0	95.5	38	38,993	4.9	3.3	7.2	795
The health care provider's skills are inadequate	7	9,976	1.3	0.5	3.1	750	742,932	93.9	91.4	95.7	38	38,209	4.8	3.3	7.1	795
You were previously badly treated	20	11,167	1.4	0.8	2.5	740	744,256	94.1	91.7	95.8	35	35,694	4.5	3.0	6.8	795
Could not take time off work or had other commitments	178	195,904	24.8	20.9	29.0	583	560,598	70.9	66.5	74.9	34	34,615	4.4	2.9	6.6	795
You did not know where to go	18	23,382	3.0	1.8	4.9	741	731,694	92.5	89.8	94.5	36	36,040	4.6	3.0	6.8	795
Perceived not sick enough	536	560,179	70.8	66.9	74.4	226	197,737	25.0	21.6	28.7	33	33,201	4.2	2.7	6.4	795
You tried but were denied health care	7	6,537	0.8	0.3	2.0	754	750,334	94.8	92.5	96.5	34	34,246	4.3	2.8	6.6	795
Others	90	77,104	9.8	7.7	12.2	657	666,482	84.2	81.0	87.0	48	47,531	6.0	4.2	8.6	795

Missing values include "Don't know", "No answer" & "Refuse to answer"

Note: Caution some cells have count less than 30. Results should be interpreted with caution.

Table 2.24: Top three barriers in seeking care by sociodemographics characteristic

Sociodemographics characteristics	Perceived not sick enough*						Could not take time off work or had other commitments*						Other**					
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI				
				Lower	Upper				Lower	Upper				Lower	Upper			
<b>MALAYSIA</b>	<b>536</b>	<b>563,219</b>	<b>70.8</b>	<b>66.9</b>	<b>74.4</b>	<b>178</b>	<b>195,904</b>	<b>24.8</b>	<b>20.9</b>	<b>29.0</b>	<b>90</b>	<b>77,104</b>	<b>9.7</b>	<b>7.7</b>	<b>12.2</b>			
<b>State</b>																		
Johor	68	97,584	70.7	60.1	79.4	30	42,225	30.6	21.5	41.5	4	4,175	3.0	1.1	8.2			
Kedah	13	12,383	54.5	29.2	77.6	9	11,377	50.0	25.5	74.6	3	3,082	13.6	3.4	41.2			
Kelantan	48	34,920	88.4	76.5	94.7	-	-	-	-	-	8	4,862	12.3	6.0	23.7			
Melaka	46	34,342	87.5	74.0	94.5	19	8,743	22.3	11.8	38.0	1	149	0.4	0.1	2.7			
Negeri Sembilan	9	10,123	72.5	51.3	86.9	4	3,482	24.9	7.4	57.9	-	-	-	-	-			
Pahang	29	25,330	68.9	52.5	81.6	6	6,217	16.9	7.4	34.2	14	10,920	29.7	17.3	46.0			
Penang	29	17,924	72.4	48.2	88.1	5	4,175	16.9	4.8	44.9	5	4,453	18.0	6.1	42.7			
Perak	30	38,711	51.4	36.0	66.5	12	16,620	22.1	11.5	38.2	11	17,969	23.8	12.8	40.0			
Perlis	1	269	13.3	1.7	57.0	4	663	32.8	9.9	68.4	2	217	10.7	2.3	37.8			
Selangor	82	104,702	83.5	74.3	89.8	20	21,782	17.4	10.8	26.7	4	2,618	2.1	0.7	6.2			
Terengganu	35	20,364	59.7	46.5	71.7	5	4,182	12.3	5.1	26.5	13	6,526	6.2	10.5	32.2			
Sabah/Labuan	108	110,769	73.5	64.2	81.2	44	49,061	32.6	22.8	44.1	18	14,003	9.3	5.6	15.0			
Sarawak	9	7,188	26.4	12.6	47.2	10	11,789	43.4	24.2	64.8	3	2,190	8.1	2.4	23.6			
WP Kuala Lumpur	24	45,122	74.9	56.0	87.4	6	15,245	25.3	10.1	50.6	4	59,39	9.9	3.5	24.8			
WP Putrajaya	5	447	41.6	16.7	71.8	4	342	31.9	10.7	64.5	-	-	-	-	-			
<b>Location</b>																		
Urban	339	434,102	74.4	69.7	78.6	86	126,955	21.8	17.2	27.2	53	55,039	9.4	7.0	12.6			
Rural	197	126,078	60.7	54.0	67.1	92	68,949	33.2	27.0	40.1	37	22,065	10.6	7.5	14.9			
<b>Sex</b>																		
Male	262	269,586	73.3	67.9	78.2	83	85,122	23.2	18.3	28.9	41	35,768	9.7	6.9	13.6			
Female	274	290,593	68.6	62.8	73.9	95	110,781	26.2	20.6	32.7	49	41,336	9.8	7.0	13.4			
<b>Age group (years)</b>																		
0-4	32	26,484	65.2	47.7	79.4	4	2,550	6.3	2.1	17.2	5	4,500	11.1	4.3	25.7			
5-9	32	33,536	68.8	52.0	81.8	5	6,426	13.2	4.8	31.6	8	5,783	11.9	5.6	23.4			
10-14	50	44,681	76.8	62.6	86.7	8	5,177	8.9	3.9	18.9	4	3,042	5.2	1.9	13.6			
15-19	84	95,706	81.0	71.3	88.0	21	21,473	18.2	11.2	28.1	9	8,160	6.9	3.4	13.7			
20-24	58	81,214	68.6	55.0	79.6	34	46,757	39.5	26.6	54.0	9	13,169	11.1	5.3	21.9			
25-29	42	58,852	73.2	59.3	83.6	23	29,883	37.1	23.1	53.8	4	5,719	7.1	2.6	18.0			
30-34	33	37,912	67.0	50.3	80.3	16	14,221	25.1	14.4	40.2	10	9,385	16.6	8.5	29.9			

Sociodemographics characteristics	Perceived not sick enough*						Could not take time off work or had other commitments*						Other*					
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI				
				Lower	Upper				Lower	Upper				Lower	Upper			
35 – 39	35	38,139	76.5	62.6	86.4	14	12,165	24.4	13.0	41.1	1	374	0.8	0.1	5.2			
40 – 44	39	42,060	72.5	57.3	83.8	19	22,115	38.1	23.7	55.0	8	7,466	12.9	5.9	25.8			
45 – 49	38	32,816	57.4	42.2	71.3	18	20,413	35.7	22.5	51.6	4	3,912	6.8	2.2	19.3			
50 – 54	29	25,583	69.5	52.1	82.6	8	7,408	20.1	9.2	38.5	6	5,641	15.3	6.3	32.9			
55 – 59	17	8,561	54.3	33.0	74.1	3	1,351	8.6	2.7	24.3	7	2,888	18.3	8.0	36.7			
60 – 64	16	7,921	58.9	31.1	82.0	3	2,306	17.1	4.0	51.0	5	3,318	24.7	9.7	50.0			
65 – 69	10	11,249	70.5	41.6	88.9	-	-	-	-	-	1	346	2.2	0.3	15.1			
70 – 74	12	10,255	75.3	45.1	91.9	2	3,659	63.2	7.3	26.9	4	1,007	7.4	1.9	24.3			
75+	9	5,211	55.5	27.6	80.2	-	-	-	-	-	5	2,394	25.5	8.5	55.8			
<b>Ethnicity</b>																		
Malay	304	294,044	68.1	63.0	72.9	97	102,487	23.8	19.2	29.0	62	53,643	12.4	9.4	16.2			
Chinese	90	121,519	81.7	71.3	88.9	22	29,554	19.9	11.4	32.3	8	7,942	5.3	2.2	12.5			
Indian	38	39,744	71.2	55.4	83.1	12	11,369	20.4	10.8	35.1	4	3,305	5.9	1.6	19.3			
Other Bumiputeras	66	72,051	65.9	54.8	75.5	41	47,444	43.4	31.4	56.2	13	10,597	9.7	5.4	16.7			
Others	38	32,821	71.9	52.1	85.7	6	5,050	11.1	3.6	29.4	3	1,616	3.5	1.0	12.0			
<b>Marital Status</b>																		
Single	199	245,427	74.8	68.1	80.4	72	85,980	26.2	19.7	34.0	22	26,197	8.0	5.0	12.6			
Married	222	218,109	67.6	61.5	73.2	91	95,869	29.7	23.9	36.3	47	36,740	11.4	8.3	15.5			
Widow/Widower /Divorcee	28	17,752	63.8	45.2	78.9	4	3,949	14.2	4.9	34.5	7	2,915	10.5	4.0	24.9			
<b>Education level</b>																		
No formal education	29	25,911	53.3	35.9	69.9	10	11,072	22.8	10.2	43.4	8	6,257	12.9	4.5	31.9			
Primary	150	138,503	71.4	63.4	78.2	26	25,511	13.1	8.5	19.7	29	21,210	10.9	7.3	16.1			
Secondary	191	202,452	72.9	66.4	78.5	78	76,838	27.7	21.1	35.4	29	29,728	10.7	7.2	15.7			
Tertiary	93	122,192	73.1	63.1	81.1	46	64,367	38.5	28.5	49.6	12	10,440	6.2	3.3	11.5			
Unclassified	24	27,617	68.1	49.8	82.1	11	11,165	27.5	13.8	47.4	5	3,767	9.3	3.7	21.6			
N/A	49	43,506	69.2	54.6	80.7	7	6,951	11.1	4.5	24.5	7	5,702	9.1	4.0	19.2			
<b>Citizen</b>																		
DK/RA	1	556	42.4	4.4	92.2	1	754	57.6	7.8	95.6	-	-	-	-	-			
Citizen	505	517,649	71.3	67.3	74.9	172	184,964	25.5	21.5	29.9	86	74,165	10.2	8.0	12.9			
PR	3	6,850	89.3	53.3	98.4	2	6,756	88.1	52.1	98.0	-	-	-	-	-			
Non Citizen	27	35,125	63.1	45.2	78.1	3	3,430	6.2	1.8	19.2	4	2,939	5.3	1.7	15.4			



Sociodemographics characteristics	Perceived not sick enough*					Could not take time off work or had other commitments*					Other**				
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI	
				Lower	Upper				Lower	Upper				Lower	Upper
<b>Occupation</b>															
Government	42	40,830	58.1	43.7	71.2	31	32,744	46.6	32.6	61.1	8	8,985	12.8	6.0	25.1
Private	129	165,082	78.7	70.9	84.8	58	73,905	35.2	25.8	46.0	14	15,456	7.4	4.1	12.9
Self-employed	74	66,425	68.4	57.7	77.4	30	27,445	28.2	19.4	39.1	14	8,695	8.9	5.0	15.6
Unpaid workers	51	52,257	66.2	53.9	76.7	17	17,875	22.7	13.8	34.9	15	107,98	13.7	7.6	23.5
Retiree	31	23,543	66.8	49.0	80.8	-	-	-	-	-	11	4,845	13.7	6.3	27.2
<b>Household Income group (RM)</b>															
Less than RM400	42	39,316	64.7	49.5	77.4	8	6,292	10.4	4.7	21.4	10	8,738	14.4	6.3	29.4
RM400 – RM499	11	8,645	59.9	37.4	78.9	1	536	3.7	0.5	22.5	3	2,519	17.5	5.6	42.9
RM500 – RM699	28	24,463	66.1	47.6	80.7	8	9,978	27.0	13.5	46.5	2	787	2.1	0.5	9.3
RM700 – RM999	29	34,148	84.9	70.1	93.1	12	10,703	26.6	13.0	46.7	2	1,657	4.1	0.7	21.7
RM1000 – RM1999	99	102,191	66.5	56.8	75.1	36	41,288	26.9	17.6	38.7	30	22,748	14.8	9.6	22.1
RM2000 – RM2999	96	99,029	71.2	61.5	79.3	30	30,176	21.7	14.2	31.7	15	13,735	9.9	5.6	16.9
RM3000 – RM3999	60	65,587	63.1	51.0	73.8	26	33,436	32.2	21.7	44.8	10	11,059	10.6	5.6	19.5
RM4000 – RM4999	44	50,495	68.6	53.4	80.7	18	21,920	29.8	17.7	45.6	11	10,599	14.4	7.3	26.4
RM5000 and above	127	136,305	80.8	72.7	87.0	39	41,576	24.7	16.6	34.9	7	5,261	3.1	1.3	7.1

Note: Caution some cells have count less than 30. Results should be interpreted with caution.  
 The counts indicate "Yes" responses only  
 95% CI = 95% Confidence Interval

Table 2.25: Prevalence of ever smoker in Malaysia by sociodemographic characteristics

Sociodemographics characteristics	Yes				No				
	Count	Estimated population	Prevalence (%)		Count	Estimated population	Prevalence (%)		
			Lower	Upper			Lower	Upper	
<b>MALAYSIA</b>	<b>5,715</b>	<b>5,936,392</b>	<b>24.8</b>	<b>24.1</b>	<b>18,747</b>	<b>17,808,428</b>	<b>74.3</b>	<b>73.6</b>	<b>75.0</b>
<b>State</b>									
Johor	499	731,116	3.1	2.8	1,615	2,082,575	8.7	8.4	9.0
Kedah	346	396,340	1.7	1.5	1,130	1,196,152	5.0	4.8	5.2
Kelantan	364	291,662	1.2	1.1	1,266	987,741	4.1	4.0	4.3
Melaka	351	158,468	0.7	0.6	1,076	541,705	2.3	2.1	2.4
Negeri Sembilan	283	213,738	0.9	0.8	1,060	645,277	2.7	2.6	2.8
Pahang	338	306,841	1.3	1.1	1,043	867,053	3.6	3.5	3.8
Penang	322	285,413	1.2	1.0	1,238	1,079,287	4.5	4.3	4.7
Perak	348	480,579	2.0	1.8	1,064	1,520,914	6.3	6.1	6.6
Perlis	316	52,059	0.2	0.2	948	141,830	0.6	0.6	0.6
Selangor	764	1,169,997	4.9	4.5	2,686	3,493,285	14.6	14.2	15.0
Terengganu	397	223,759	0.9	0.8	1,190	653,846	2.7	2.6	2.8
Sabah/Labuan	705	801,090	3.3	3.0	1,974	1,930,238	8.1	7.7	8.4
Sarawak	370	479,534	2.0	1.8	1,302	1,535,551	6.4	6.2	6.7
WP Kuala Lumpur	174	333,292	1.4	1.2	597	1,088,816	4.5	4.3	4.8
WP Putrajaya	138	12,504	0.1	0.0	558	44,156	0.2	0.2	0.2
<b>Location</b>									
Urban	3,054	4,074,630	23.7	22.8	11,018	12,954,523	75.3	74.4	76.2
Rural	2,661	1,861,762	27.5	26.4	7,729	4,853,904	71.7	70.5	72.8
<b>Sex</b>									
Male	5,369	5,600,338	45.7	44.5	6,376	6,580,317	53.7	52.5	54.9
Female	346	336,053	2.9	2.5	12,371	11,228,111	95.9	95.4	96.3
<b>Age group (years)</b>									
0-4	0	0	0.0	0.0	0	0	0.0	0.0	0.0
5-9	0	0	0.0	0.0	1,817	1,634,130	99.1	98.4	99.4
10-14	60	47,377	1.8	1.3	2,855	2,581,479	97.8	97.1	98.3
15-19	475	539,356	19.6	17.6	1,949	2,176,018	79.2	77.0	81.3
20-24	644	844,666	31.1	28.7	1,441	1,831,134	67.5	64.9	70.0
25-29	673	879,641	33.8	31.1	1,413	1,699,375	65.2	62.4	67.9
30-34	596	706,108	34.2	31.6	1,271	1,340,250	64.9	62.2	67.5

Sociodemographics characteristics	Yes				No					
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI	
				Lower	Upper				Lower	Upper
<b>MALAYSIA</b>	<b>5,715</b>	<b>5,936,392</b>	<b>24.8</b>	<b>24.1</b>	<b>25.5</b>	<b>18,747</b>	<b>17,808,428</b>	<b>74.3</b>	<b>73.6</b>	<b>75.0</b>
35 – 39	542	646,628	35.1	32.2	38.0	1,244	1,186,300	64.3	61.4	67.1
40 – 44	542	540,404	31.3	28.6	34.2	1,285	1,165,020	67.5	64.7	70.3
45 – 49	508	466,120	29.7	27.0	32.5	1,283	1,093,967	69.7	66.9	72.4
50 – 54	480	395,681	30.1	27.4	33.0	1,186	902,738	68.7	65.8	71.5
55 – 59	384	289,805	28.2	25.3	31.3	1,072	733,821	71.4	68.3	74.4
60 – 64	288	212,320	27.5	24.0	31.2	701	553,099	71.6	67.8	75.1
65 – 69	202	137,434	27.5	23.4	32.2	467	356,419	71.4	66.7	75.7
70 – 74	161	103,902	28.2	23.3	33.7	372	261,724	71.1	65.6	76.0
75+	160	126,950	29.8	25.0	35.1	391	292,952	68.8	63.4	73.7
<b>Ethnicity</b>										
Malay	3,639	3,351,233	27.1	26.2	28.0	10,718	8,876,230	71.8	70.9	72.7
Chinese	760	1,044,679	18.1	16.7	19.6	3,693	4,649,259	80.7	79.2	82.2
Indian	296	283,591	17.3	15.0	19.8	1,589	1,339,633	81.6	79.1	84.0
Other Bumiputeras	633	780,363	28.0	25.5	30.6	1,807	2,005,197	71.9	69.3	74.4
Others	387	476,526	33.5	29.6	37.7	940	938,108	66.0	61.8	70.0
<b>Marital Status</b>										
Single	1,725	2,112,274	26.7	25.3	28.1	5,205	5,718,599	72.3	70.9	73.7
Married	3,765	3,670,226	31.4	30.4	32.5	8,683	7,907,945	67.7	66.6	68.8
Widow/Widower/Divorcee	223	151,717	14.1	12.1	16.5	1,236	911,307	85.0	82.5	87.2
<b>Education level</b>										
No formal education	337	276,992	22.7	20.0	25.7	1,217	939,512	77.1	74.1	79.8
Primary	1,480	1,399,306	19.5	18.3	20.8	6,541	5,726,409	80.0	78.7	81.2
Secondary	2,865	3,090,479	31.8	30.6	33.1	6,558	6,545,649	67.4	66.2	68.7
Tertiary	931	1,068,441	25.1	23.4	26.9	2,901	3,118,136	73.3	71.4	75.0
Unclassified	102	101,174	6.2	4.9	7.8	1,530	1,478,721	90.9	89.0	92.4
<b>Occupation</b>										
Government employee/Semi government	636	615,629	34.0	31.3	36.8	1,505	1,182,854	65.3	62.5	68.1
Private employee	2,192	2,662,669	38.0	36.5	39.6	3,602	4,273,516	61.0	59.4	62.6
Self employed	1,597	1,483,622	44.2	42.0	46.4	2,067	1,849,210	55.1	52.9	57.2
Unpaid worker/home maker	140	127,536	4.6	3.8	5.6	3,056	2,606,901	94.5	93.4	95.4
Retiree	502	373,622	28.1	25.4	30.9	1,225	946,228	71.1	68.3	73.8

Sociodemographics characteristics	Yes					No				
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI	
				Lower	Upper				Lower	Upper
<b>MALAYSIA</b>	<b>5,715</b>	<b>5,936,392</b>	<b>24.8</b>	<b>24.1</b>	<b>25.5</b>	<b>18,747</b>	<b>17,808,428</b>	<b>74.3</b>	<b>73.6</b>	<b>75.0</b>
<b>Household Income group (RM)</b>										
Less than RM400	260	239,455	13.9	11.9	16.1	1,552	1,466,622	85.0	82.8	87.0
RM400 – RM499	76	71,231	20.3	14.0	28.4	313	278,098	79.1	71.0	85.3
RM500 – RM699	229	194,950	23.9	20.6	27.6	747	612,461	75.2	71.5	78.6
RM700 – RM999	415	396,892	27.7	24.9	30.7	1,175	1,025,326	71.6	68.6	74.4
RM1000 – RM1999	1,300	1,248,495	27.8	26.1	29.6	3,795	3,210,267	71.6	69.8	73.3
RM2000 – RM2999	1,037	1,044,564	26.2	24.4	28.0	3,097	2,933,735	73.5	71.7	75.2
RM3000 – RM3999	795	841,546	25.7	23.8	27.7	2,417	2,410,882	73.6	71.6	75.5
RM4000 – RM4999	496	623,488	26.0	23.6	28.6	1,656	1,750,281	73.0	70.4	75.5
RM5000 and above	1,107	1,275,771	23.2	21.8	24.8	3,995	4,120,756	75.1	73.5	76.6

Note: Caution some cells have count less than 30. Results should be interpreted with caution.

The counts indicate "Yes" responses only

95% CI = 95% Confidence Interval

\*\*Question was directed at female, ≥18 years old (for PAP Smear) and 40 years old (for Mammogram) respectively

**Table 2.26: Prevalence of current smoker by sociodemographic characteristics**

Sociodemographics characteristics	Yes				No				
	Count	Estimated population	Prevalence (%)		Count	Estimated population	Prevalence (%)		
			Lower	Upper			Lower	Upper	
<b>MALAYSIA</b>	4,354	4,630,749	19.3	18.7	20.0	20.0	80.7	80.0	81.3
<b>State</b>									
Johor	371	562,938	19.9	18.0	22.0	22.0	80.1	78.0	82.0
Kedah	296	347,769	21.7	19.2	24.5	24.5	78.3	75.5	80.8
Kelantan	291	239,237	18.7	16.8	20.7	20.7	81.3	79.3	83.2
Melaka	252	120,527	17.1	14.6	20.0	20.0	82.9	80.0	85.4
Negeri Sembilan	212	168,451	19.4	16.7	22.5	22.5	80.6	77.5	83.3
Pahang	264	247,459	20.6	18.3	23.2	23.2	79.4	76.8	81.7
Penang	260	225,288	16.5	13.9	19.4	19.4	83.5	80.6	86.1
Perak	236	323,125	16.1	13.9	18.5	18.5	83.9	81.5	86.1
Perlis	262	43,909	22.6	20.1	25.4	25.4	77.4	74.6	79.9
Selangor	570	897,795	18.8	17.3	20.4	20.4	81.2	79.6	82.7
Terengganu	308	180,380	20.5	18.4	22.8	22.8	79.5	77.2	81.6
Sabah/Labuan	514	628,357	23.0	20.6	25.6	25.6	77.0	74.4	79.4
Sarawak	291	385,317	19.1	16.8	21.6	21.6	80.9	78.4	83.2
WP Kuala Lumpur	130	251,359	17.4	14.5	20.7	20.7	82.6	79.3	85.5
WP Putrajaya	97	8,858	15.6	12.7	19.0	19.0	84.4	81.0	87.3
<b>Location</b>									
Urban	2,294	3,163,812	18.4	17.6	19.3	19.3	81.6	80.7	82.4
Rural	2,060	1,466,937	21.7	20.6	22.8	22.8	78.3	77.2	79.4
<b>Sex</b>									
Male	4,189	4,459,824	36.4	35.2	37.5	37.5	63.6	62.5	64.8
Female	165	170,924	1.5	1.2	1.8	1.8	98.5	98.2	98.8
<b>Age group (years)</b>									
0-4	0	0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
5-9	0	0	0.0	0.0	0.0	0.0	100.0	100.0	100.0
10-14	30	22,737	0.9	0.6	1.3	1.3	99.1	98.7	99.4
15-19	353	392,421	14.3	12.4	16.4	16.4	85.7	83.6	87.6
20-24	567	740,757	27.3	24.9	29.8	29.8	72.7	70.2	75.1
25-29	587	778,552	29.9	27.3	32.6	32.6	70.1	67.4	72.7
30-34	499	590,632	28.6	26.1	31.2	31.2	71.4	68.8	73.9
35-39	447	534,478	29.0	26.3	31.8	31.8	71.0	68.2	73.7
40-44	425	425,363	24.7	22.1	27.4	27.4	75.3	72.6	77.9
45-49	384	361,975	23.1	20.6	25.7	25.7	76.9	74.3	79.4
50-54	356	283,611	21.6	19.2	24.2	24.2	78.4	75.8	80.8
55-59	266	190,634	18.6	16.1	21.3	21.3	81.4	78.7	83.9
60-64	180	131,071	17.0	14.1	20.3	20.3	83.0	79.7	85.9
65-69	109	73,699	14.8	11.6	18.6	18.6	85.2	81.4	88.4
70-74	80	51,951	14.1	10.5	18.8	18.8	85.9	81.2	89.5
75+	71	52,826	12.4	9.2	16.5	16.5	87.6	83.5	90.8

Sociodemographics characteristics	Yes				No					
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI	
				Lower	Upper				Lower	Upper
<b>MALAYSIA</b>	4,354	4,630,749	19.3	18.7	20.0	20,303	19,335,005	80.7	80.0	81.3
<b>Ethnicity</b>										
Malay	2,816	2,650,568	21.5	20.6	22.3	11,669	9,706,124	78.5	77.7	79.4
Chinese	541	739,884	12.8	11.6	14.2	3,948	5,018,613	87.2	85.8	88.4
Indian	213	212,739	13.0	10.9	15.3	1,694	1,428,018	87.0	84.7	89.1
Other Bumiputeras	474	611,956	21.9	19.6	24.5	1,968	2,176,876	78.1	75.5	80.4
Others	310	415,602	29.2	25.4	33.4	1,024	1,005,374	70.8	66.6	74.6
<b>Marital Status</b>										
Single	1,444	1,772,066	22.4	21.1	23.8	5,539	6,136,429	77.6	76.2	78.9
Married	2,766	2,756,798	23.6	22.6	24.6	9,771	8,919,761	76.4	75.4	77.4
Widow/Widower/Divorcee	142	99,710	9.3	7.6	11.4	1,328	972,644	90.7	88.6	92.4
<b>Education level</b>										
No formal education	221	197,316	16.2	13.8	19.0	1,338	1,021,531	83.8	81.0	86.2
Primary	1,087	1,067,609	14.9	13.8	16.1	6,978	6,091,860	85.1	83.9	86.2
Secondary	2,306	2,523,534	26.0	24.8	27.2	7,179	7,181,013	74.0	72.8	75.2
Tertiary	667	765,084	18.0	16.5	19.6	3,206	3,490,232	82.0	80.4	83.5
Unclassified	73	77,205	4.7	3.6	6.2	1,602	1,550,370	95.3	93.8	96.4
<b>Occupation</b>										
Government employee/Semi government	473	462,674	25.5	23.1	28.2	1,675	1,348,400	74.5	71.8	76.9
Private employee	1,805	2,212,474	31.6	30.1	33.1	4,038	4,789,185	68.4	66.9	69.9
Self employed	1,297	1,232,844	36.7	34.6	38.9	2,389	2,125,615	63.3	61.1	65.4
Unpaid worker/home maker	84	84,515	3.1	2.4	3.9	3,140	2,674,424	96.9	96.1	97.6
Retiree	256	180,303	13.6	11.6	15.8	1,482	1,149,966	86.4	84.2	88.4
<b>Household Income group (RM)</b>										
< 400	164	153,906	8.9	7.3	10.8	1,665	1,570,548	91.1	89.2	92.7
400 - 499	60	60,529	17.2	11.2	25.6	331	291,221	82.8	74.4	88.8
500 - 699	172	152,098	18.7	15.6	22.2	810	662,392	81.3	77.8	84.4
700 - 999	326	319,631	22.3	19.7	25.2	1,277	1,112,832	77.7	74.8	80.3
1000 - 1999	1,034	1,017,311	22.7	21.1	24.4	4,095	3,469,343	77.3	75.6	78.9
2000 - 2999	811	829,142	20.8	19.2	22.5	3,342	3,163,497	79.2	77.5	80.8
3000 - 3999	607	639,187	19.5	17.8	21.3	2,627	2,637,181	80.5	78.7	82.2
4000 - 4999	387	514,712	21.5	19.1	24.0	1,785	1,881,896	78.5	76.0	80.9
> 5000	793	944,233	17.2	15.9	18.6	4,371	4,546,094	82.8	81.4	84.1

Note: Caution some cells have count less than 30. Results should be interpreted with caution.

The counts indicate "Yes" responses only 95% CI = 95% Confidence Interval. \*\*Question was directed at female, ≥18 years old (for PAP Smear) and 40 years old (for Mammogram) respectively

Table 2.27: Prevalence of daily smoker by sociodemographic characteristics

	Sociodemographics characteristics									
	Yes			No						
	Count	Estimated population	Prevalence (%)	95% CI Lower	95% CI Upper	Count	Estimated population	Prevalence (%)	95% CI Lower	95% CI Upper
<b>MALAYSIA</b>	3,999	4,212,638	17.6	16.9	18.2	20,658	19,753,116	82.4	81.8	83.1
<b>State</b>										
Johor	338	507,317	17.9	16.1	20.0	1,788	2,319,604	82.1	80.0	83.9
Kedah	278	323,880	20.2	17.8	22.9	1,207	1,278,598	79.8	77.1	82.2
Kelantan	278	227,843	17.8	15.9	19.8	1,355	1,053,948	82.2	80.2	84.1
Melaka	237	109,504	15.6	13.1	18.4	1,201	594,154	84.4	81.6	86.9
Negeri Sembilan	200	158,653	18.3	15.6	21.3	1,156	708,491	81.7	78.7	84.4
Pahang	249	231,684	19.3	17.0	21.8	1,161	968,313	80.7	78.2	83.0
Penang	241	211,186	15.5	13.0	18.3	1,327	1,155,655	84.5	81.7	87.0
Perak	214	287,890	14.3	12.3	16.5	1,206	1,722,982	85.7	83.5	87.7
Perlis	251	41,876	21.6	19.1	24.3	1,015	152,202	78.4	75.7	80.9
Selangor	485	771,981	16.2	14.7	17.7	3,034	4,004,467	83.8	82.3	85.3
Terengganu	294	172,583	19.6	17.6	21.9	1,296	706,346	80.4	78.1	82.4
Sabah/Labuan	467	574,994	21.0	18.7	23.6	2,218	2,158,066	79.0	76.4	81.3
Sarawak	259	345,591	17.1	14.9	19.5	1,417	1,675,965	82.9	80.5	85.1
WP Kuala Lumpur	122	239,349	16.6	13.7	19.8	664	1,205,749	83.4	80.2	86.3
WP Putrajaya	86	8,308	14.6	11.8	18.0	613	48,576	85.4	82.0	88.2
<b>Location</b>										
Urban	2,084	2,855,156	16.6	15.8	17.4	12,107	14,340,342	83.4	82.6	84.2
Rural	1,915	1,357,481	20.1	19.0	21.1	8,551	5,412,774	79.9	78.9	81.0
<b>Sex</b>										
Male	3,865	4,081,342	33.3	32.2	34.4	7,950	8,177,431	66.7	65.6	67.8
Female	134	131,295	1.1	0.9	1.4	12,708	11,575,685	98.9	98.6	99.1
<b>Age group (years)</b>										
0-4	0	0	0.0	0.0	0.0	0	0	0.0	0.0	0.0
5-9	0	0	0.0	0.0	0.0	1,835	1,649,755	100.0	100.0	100.0
10-14	23	18,763	0.7	0.4	1.1	2,903	2,621,170	99.3	98.9	99.6
15-19	304	334,351	12.2	10.4	14.2	2,146	2,411,653	87.8	85.8	89.6
20-24	523	675,541	24.9	22.6	27.3	1,585	2,037,120	75.1	72.7	77.4
25-29	532	705,646	27.1	24.5	29.8	1,569	1,899,929	72.9	70.2	75.5
30-34	453	532,158	25.8	23.4	28.3	1,432	1,533,438	74.2	71.7	76.6
35-39	424	505,671	27.4	24.8	30.2	1,375	1,338,825	72.6	69.8	75.2
40-44	393	387,170	22.4	20.0	25.1	1,451	1,337,885	77.6	74.9	80.0
45-49	357	334,824	21.3	18.9	23.9	1,444	1,235,255	78.7	76.1	81.1
50-54	328	258,869	19.7	17.4	22.3	1,353	1,054,485	80.3	77.7	82.6
55-59	253	178,002	17.3	15.0	20.0	1,210	849,595	82.7	80.0	85.0
60-64	167	112,865	14.6	12.1	17.6	830	659,697	85.4	82.4	87.9
65-69	101	68,563	13.7	10.6	17.6	572	430,485	86.3	82.4	89.4
70-74	77	50,940	13.8	10.2	18.5	461	317,257	86.2	81.5	89.8
75+	64	49,275	11.6	8.4	15.7	492	376,568	88.4	84.3	91.6

Sociodemographics characteristics	Yes					No				
	Count	Estimated population	Prevalence (%)	95% CI		Count	Estimated population	Prevalence (%)	95% CI	
				Lower	Upper				Lower	Upper
<b>MALAYSIA</b>	3,999	4,212,638	17.6	16.9	18.2	20,658	19,753,116	82.4	81.8	83.1
<b>Ethnicity</b>										
Malay	2,600	2,406,667	19.5	18.7	20.3	11,885	9,950,026	80.5	79.7	81.3
Chinese	497	678,265	11.8	10.6	13.0	3,992	5,080,232	88.2	87.0	89.4
Indian	194	188,890	11.5	9.7	13.7	1,713	1,451,867	88.5	86.3	90.3
Other Bumiputeras	417	546,607	19.6	17.3	22.1	2,025	2,242,225	80.4	77.9	82.7
Others	291	392,209	27.6	23.8	31.7	1,043	1,028,767	72.4	68.3	76.2
<b>Marital Status</b>										
Single	1,298	1,586,395	20.1	18.8	21.4	5,685	6,322,099	79.9	78.6	81.2
Married	2,569	2,531,990	21.7	20.7	22.7	9,968	9,144,569	78.3	77.3	79.3
Widow/Widower/Divorcee	131	93,202	8.7	7.0	10.7	1,339	979,152	91.3	89.3	93.0
<b>Education level</b>										
No formal education	205	186,366	15.3	12.9	18.0	1,354	1,032,481	84.7	82.0	87.1
Primary	1,004	988,702	13.8	12.7	15.0	7,061	6,170,767	86.2	85.0	87.3
Secondary	2,118	2,284,684	23.5	22.4	24.7	7,367	7,419,863	76.5	75.3	77.6
Tertiary	610	692,733	16.3	14.9	17.8	3,263	3,562,583	83.7	82.2	85.1
Unclassified	62	60,153	3.7	2.8	4.9	1,613	1,567,422	96.3	95.1	97.2
<b>Occupation</b>										
Government employee/Semi government	432	416,125	23.0	20.6	25.5	1,716	1,394,949	77.0	74.5	79.4
Private employee	1,656	2,016,726	28.8	27.3	30.3	4,187	4,984,932	71.2	69.7	72.7
Self employed	1,222	1,160,188	34.5	32.4	36.7	2,464	2,198,270	65.5	63.3	67.6
Unpaid worker/home maker	76	77,104	2.8	2.1	3.6	3,148	2,681,834	97.2	96.4	97.9
Retiree	234	159,611	12.0	10.2	14.0	1,504	1,170,659	88.0	86.0	89.8
<b>Household Income group (RM)</b>										
< 400	151	141,886	8.2	6.7	10.1	1,678	1,582,568	91.8	89.9	93.3
400 - 499	56	56,100	15.9	10.0	24.4	335	295,649	84.1	75.6	90.0
500 - 699	161	136,963	16.8	13.9	20.2	821	677,527	83.2	79.8	86.1
700 - 999	292	286,414	20.0	17.5	22.8	1,311	1,146,050	80.0	77.2	82.5
1000 - 1999	942	920,786	20.5	19.0	22.2	4,187	3,565,868	79.5	77.8	81.0
2000 - 2999	759	768,573	19.2	17.7	20.9	3,394	3,224,065	80.8	79.1	82.3
3000 - 3999	557	578,462	17.7	16.0	19.4	2,677	2,697,906	82.3	80.6	84.0
4000 - 4999	358	463,617	19.3	17.1	21.8	1,814	1,932,991	80.7	78.2	82.9
> 5000	723	859,836	15.7	14.4	17.0	4,441	4,630,491	84.3	83.0	85.6

Note: Caution some cells have count less than 30. Results should be interpreted with caution.

The counts indicate "Yes" responses only. 95% CI = 95% Confidence Interval. \*\*Question was directed at female, ≥18 years old (for PAP Smear) and 40 years old (for Mammogram) respectively



2.8 DEFINITION OF VARIABLES

Variable Name	Variable Stata/iSPSS	Weight	Definition	Stata/SPSS Variable Definition
Type of care chosen	b1200_hcd- b1204_hcd	Weight4	Type of care chosen by the population that experience any of the health problem listed in the past two weeks prior to the interview	svy : tab b1200_hcd if b1010_17==1, format (%10.3g) ci obs svy : tab b1200_hcd if b1010_17==1, format (%10.3g) ci obs count  svy : tab b1201_hcd if b1010_17==1, format (%10.3g) ci obs svy : tab b1201_hcd if b1010_17==1, format (%10.3g) ci obs count  svy : tab b1202_hcd if b1010_17==1, format (%10.3g) ci obs svy : tab b1202_hcd if b1010_17==1, format (%10.3g) ci obs count  svy : tab b1203_hcd if b1010_17==1, format (%10.3g) ci obs svy : tab b1203_hcd if b1010_17==1, format (%10.3g) ci obs count  svy : tab b1204_hcd if b1010_17==1, format (%10.3g) ci obs svy : tab b1204_hcd if b1010_17==1, format (%10.3g) ci obs count
Necessity to seek care	b1230_hcd	Weight4	The prevalence among those who did not seek care from the healthcare provider following their illness in the past 2 weeks prior to the interview that thought it was necessary to seek care	svy: tab b1230_hcd if b1201_hcd==2, format (%10.3g) ci obs percent svy: tab b1230_hcd if b1201_hcd==2, format (%10.3g) ci obs count
Proportion of respondents with number of reasons stated (tot reas)	S1  S2  S3  tot_s	Weight4		gen s1 = 0 replace s1 = 1 if ( 0 < b1231a < 24 & b1231b ==. & b1231c ==.) replace s1=0 if b1231a==. & b1231b==. & b1231c ==. gen s2 = 0 replace s2 = 1 if ( ( b1231a ==.   0<b1231a<24) & 0< b1231b < 24 & b1231c ==.) replace s2=0 if b1231a==. & b1231b==. & b1231c ==. replace s2=0 if 0<b1231a<24 & b1231b==. & b1231c ==. gen s3 = 0 replace s3=1 if b1231a ==. & b1231b ==. & 0<b1231c <24 replace s3=0 if b1231a==. & b1231b==. & b1231c ==. gen tot_s = s1 + s2 + s3

Variable Name	Variable Stata/iSPSS	Weight	Definition	Stata/SPSS Variable Definition
Respondents answering reason for not seeking care despite being ill by sociodemographic characteristics (reasons)	rea1 rea2 rea3 rea4 rea5 rea6 rea7 rea8 rea9 rea10 rea11 rea12 rea13 rea14 rea15 rea16 rea17 rea18 rea19 rea20 rea21 rea22 rea23	Weight4		<pre> gen rea1 = 1 if (b1231a == 1   b1231b == 1   b1231c == 1) gen rea2 = 1 if (b1231a == 2   b1231b == 2   b1231c == 2) gen rea3 = 1 if (b1231a == 3   b1231b == 3   b1231c == 3) gen rea4 = 1 if (b1231a == 4   b1231b == 4   b1231c == 4) gen rea5 = 1 if (b1231a == 5   b1231b == 5   b1231c == 5) gen rea6 = 1 if (b1231a == 6   b1231b == 6   b1231c == 6) gen rea7 = 1 if (b1231a == 7   b1231b == 7   b1231c == 7) gen rea8 = 1 if (b1231a == 8   b1231b == 8   b1231c == 8) gen rea9 = 1 if (b1231a == 9   b1231b == 9   b1231c == 9) gen rea10 = 1 if (b1231a == 10   b1231b == 10   b1231c == 10) gen rea11 = 1 if (b1231a == 11   b1231b == 11   b1231c == 11) gen rea12 = 1 if (b1231a == 12   b1231b == 12   b1231c == 12) gen rea13 = 1 if (b1231a == 13   b1231b == 13   b1231c == 13) gen rea14 = 1 if (b1231a == 14   b1231b == 14   b1231c == 14) gen rea15 = 1 if (b1231a == 15   b1231b == 15   b1231c == 15) gen rea16 = 1 if (b1231a == 16   b1231b == 16   b1231c == 16) gen rea17 = 1 if (b1231a == 17   b1231b == 17   b1231c == 17) gen rea18 = 1 if (b1231a == 18   b1231b == 18   b1231c == 18) gen rea19 = 1 if (b1231a == 19   b1231b == 19   b1231c == 19) gen rea20 = 1 if (b1231a == 20   b1231b == 20   b1231c == 20) gen rea21 = 1 if (b1231a == 21   b1231b == 21   b1231c == 21) gen rea22 = 1 if (b1231a == 22   b1231b == 22   b1231c == 22) gen rea23 = 1 if (b1231a == 23   b1231b == 23   b1231c == 23) </pre>
Medical check-up	b6010_merge	Weight4	People who reported undergone medical checkup by health care in the last 12 months prior to the interview date.	<pre> *generating variable B6010_merge where values &lt;-44 are considered missing gen b6010_merge=. replace b6010_merge=1 if b6010==1 replace b6010_merge=2 if b6010==2 replace b6010_merge=-44 if b6010==-44   b6010==.   b6010==9   b6010==-7  *By sociodemographic profile svy: tab b6010_merge, format (%10.3g) ci obs percent svy: tab b6010_merge, format (%10.3g) ci obs count  svy: tab state2 b6010_merge, format (%10.3g) ci obs row percent svy: tab state2 b6010_merge, format (%10.3g) ci obs count  svy: tab strata b6010_merge, format (%10.3g) ci obs row percent svy: tab strata b6010_merge, format (%10.3g) ci obs count  svy: tab gender b6010_merge, format (%10.3g) ci obs row percent </pre>

Variable Name	Variable Stata/SPSS	Weight	Definition	Stata/SPSS Variable Definition
Family planning	b6020_merge	Weight4	People who reported seeing a health care provider for family planning in the last 12 months prior to the interview date.	<pre>svy: tab gender b6010_merge, format (%10.3g) ci obs count svy : tab agegp b6010_merge, format (%10.3f) ci obs row percent svy : tab agegp b6010_merge, format (%10.3g) ci obs count svy: tab race3 b6010_merge, format (%10.3g) ci obs row percent svy: tab race3 b6010_merge, format (%10.3g) ci obs count svy : tab maritalgp b6010_merge, format (%10.3f) ci obs row percent svy : tab maritalgp b6010_merge, format (%10.3g) ci obs count svy: tab edu b6010_merge, format (%10.3g) ci obs row percent svy: tab edu b6010_merge, format (%10.3g) ci obs count svy: tab work3 b6010_merge, format (%10.3g) ci obs row percent svy: tab work3 b6010_merge, format (%10.3g) ci obs count svy : tab hhincomegroup b6010_merge, format (%10.3f) ci obs row percent svy : tab hhincomegroup b6010_merge, format (%10.3g) ci obs count gen b6020_merge=. replace b6020_merge=1 if b6020==1 replace b6020_merge=2 if b6020==2 replace b6020_merge=-44 if b6020==-44   b6020==-.   b6020==--9   b6020==--7 svy: tab b6020_merge, format (%10.3g) ci obs percent svy: tab b6020_merge, format (%10.3g) ci obs count svy: tab state2 b6020_merge, format (%10.3g) ci obs row percent svy: tab state2 b6020_merge, format (%10.3g) ci obs count svy: tab strata b6020_merge, format (%10.3g) ci obs row percent svy: tab strata b6020_merge, format (%10.3g) ci obs count svy: tab gender b6020_merge, format (%10.3g) ci obs row percent svy: tab gender b6020_merge, format (%10.3g) ci obs count svy : tab agegp b6020_merge, format (%10.3f) ci obs row percent svy : tab agegp b6020_merge, format (%10.3g) ci obs count svy: tab race3 b6020_merge, format (%10.3g) ci obs row percent</pre>

Variable Name	Variable Stata/iSPSS	Weight	Definition	Stata/SPSS Variable Definition
Vaccination	b6030_merge	Weight4	People who reported seeing a health care provider for vaccination in the last 12 months prior to the interview date.	<pre> svy: tab race3 b6010_merge, format (%10.3g) ci obs count svy: tab maritalgp b6020_merge, format (%10.3f) ci obs row percent svy: tab maritalgp b6020_merge, format (%10.3g) ci obs count svy: tab edu b6020_merge, format (%10.3g) ci obs row percent svy: tab edu b6020_merge, format (%10.3g) ci obs count svy: tab work3 b6020_merge, format (%10.3g) ci obs row percent svy: tab work3 b6020_merge, format (%10.3g) ci obs count svy: tab hhincomegroup b6020_merge, format (%10.3f) ci obs row percent svy: tab hhincomegroup b6020_merge, format (%10.3g) ci obs count gen b6030_merge=. replace b6030_merge=1 if b6030==1 replace b6030_merge=2 if b6030==2 replace b6030_merge=-44 if b6030==-44   b6030==-9   b6030==-7 svy: tab b6030_merge, format (%10.3g) ci obs percent svy: tab b6030_merge, format (%10.3g) ci obs count svy: tab state2 b6030_merge, format (%10.3g) ci obs row percent svy: tab state2 b6030_merge, format (%10.3g) ci obs count svy: tab strata b6030_merge, format (%10.3g) ci obs row percent svy: tab strata b6030_merge, format (%10.3g) ci obs count svy: tab gender b6030_merge, format (%10.3g) ci obs row percent svy: tab gender b6030_merge, format (%10.3g) ci obs count svy: tab agegp b6030_merge, format (%10.3f) ci obs row percent svy: tab agegp b6030_merge, format (%10.3g) ci obs count svy: tab race3 b6030_merge, format (%10.3g) ci obs row percent svy: tab race3 b6030_merge, format (%10.3g) ci obs count svy: tab maritalgp b6030_merge, format (%10.3f) ci obs row percent svy: tab maritalgp b6030_merge, format (%10.3g) ci obs count svy: tab edu b6030_merge, format (%10.3g) ci obs row percent                     </pre>

Variable Name	Variable Stata/SPSS	Weight	Definition	Stata/SPSS Variable Definition
PAP Smear	b6040_merge	Weight4	Female, 18 years and above whom reported seeing a health care provider for PAP Smear in the last 12 months prior to the interview date.	svy: tab edu b6030_merge, format (%10.3g) ci obs count  svy: tab work3 b6030_merge, format (%10.3g) ci obs row percent svy: tab work3 b6030_merge, format (%10.3g) ci obs count  svy : tab hhincomgroup b6030_merge, format (%10.3f) ci obs row percent svy : tab hhincomgroup b6030_merge, format (%10.3g) ci obs count gen b6040_merge= replace b6040_merge=1 if b6040==1 replace b6040_merge=2 if b6040==2 replace b6040_merge=-44 if b6040==44   b6040==9   b6040==7  svy: tab b6040_merge, format (%10.3g) ci obs percent svy: tab b6040_merge, format (%10.3g) ci obs count  svy: tab state2 b6040_merge, format (%10.3g) ci obs row percent svy: tab state2 b6040_merge, format (%10.3g) ci obs count  svy: tab strata b6040_merge, format (%10.3g) ci obs row percent svy: tab strata b6040_merge, format (%10.3g) ci obs count  svy: tab gender b6040_merge, format (%10.3g) ci obs row percent svy: tab gender b6040_merge, format (%10.3g) ci obs count  svy : tab agegp b6040_merge, format (%10.3f) ci obs row percent svy : tab agegp b6040_merge, format (%10.3g) ci obs count  svy: tab race3 b6040_merge, format (%10.3g) ci obs row percent svy: tab race3 b6040_merge, format (%10.3g) ci obs count  svy : tab maritalgp b6040_merge, format (%10.3f) ci obs row percent svy : tab maritalgp b6040_merge, format (%10.3g) ci obs count  svy: tab edu b6040_merge, format (%10.3g) ci obs row percent svy: tab edu b6040_merge, format (%10.3g) ci obs count  svy: tab work3 b6040_merge, format (%10.3g) ci obs row percent svy: tab work3 b6040_merge, format (%10.3g) ci obs count  svy : tab hhincomgroup b6040_merge, format (%10.3f) ci obs row percent svy : tab hhincomgroup b6040_merge, format (%10.3g) ci obs count

Variable Name	Variable Stata/iSPSS	Weight	Definition	Stata/SPSS Variable Definition
Mammogram	b6050_merge	Weight4	Female, 40 years and above whom reported seeing a health care provider for PAP Smear in the last 12 months prior to the interview date.	<pre> gen b6050_merge=. replace b6050_merge=1 if b6050==1 &amp; (agegp==9 agegp==10 agegp==11 agegp==12 agegp==13 agegp==14 agegp==15 agegp==16) replace b6050_merge=2 if b6050==2 &amp; (agegp==9 agegp==10 agegp==11 agegp==12 agegp==13 agegp==14 agegp==15 agegp==16) replace b6050_merge=-44 if b6050==44   b6050==44   b6050==9   b6050==7  svy: tab b6050_merge, format (%10.3g) ci obs percent svy: tab b6050_merge, format (%10.3g) ci obs count  svy: tab state2 b6050_merge, format (%10.3g) ci obs row percent svy: tab state2 b6050_merge, format (%10.3g) ci obs count  svy: tab strata b6050_merge, format (%10.3g) ci obs row percent svy: tab strata b6050_merge, format (%10.3g) ci obs count  svy: tab gender b6050_merge, format (%10.3g) ci obs row percent svy: tab gender b6050_merge, format (%10.3g) ci obs count  svy: tab agegp b6050_merge, format (%10.3f) ci obs row percent svy: tab agegp b6050_merge, format (%10.3g) ci obs count  svy: tab race3 b6050_merge, format (%10.3g) ci obs row percent svy: tab race3 b6050_merge, format (%10.3g) ci obs count  svy: tab maritalgp b6050_merge, format (%10.3f) ci obs row percent svy: tab maritalgp b6050_merge, format (%10.3g) ci obs count  svy: tab edu b6050_merge, format (%10.3g) ci obs row percent svy: tab edu b6050_merge, format (%10.3g) ci obs count  svy: tab work3 b6050_merge, format (%10.3g) ci obs row percent svy: tab work3 b6050_merge, format (%10.3g) ci obs count  svy: tab hhincomegroup b6050_merge, format (%10.3f) ci obs row percent svy: tab hhincomegroup b6050_merge, format (%10.3g) ci obs count </pre>

Variable Name	Variable Stata/iSPSS	Weight	Definition	Stata/SPSS Variable Definition
Prevalence of people in getting care	b6110_6120	Weight4	Prevalence of respondents that needed health care in the last 12 months and yet he did not pursue the care	gen b6110_6120=0 replace b6110_6120=2 if b6110==1 & b6120==2 replace b6110_6120=1 if b6110==1 & b6120==1 svy: tab b6110_6120, format (%10.3g) ci obs percent svy: tab b6110_6120, format (%10.3g) ci obs count
Barriers to seek care	b6121_hcd - b6131_hcd	Weight4	The factors that were perceived as reasons for not seeking care b6121_hcd : could not afford the cost of treatment b6122_hcd: no transport to seek care b6123_hcd: could not afford the cost of transport b6124_hcd: health care provider's drugs or equipment are inadequate b6125_hcd: health care provider's skills are inadequate b6126_hcd: previously badly treated b6127_hcd: could not take time off or had other commitment b6128_hcd: did not know where to go b6129_hcd: thought were not sick enough b6130_hcd: denied health care b6131_hcd: other	svy: tab b6121_hcd if b6110_6120==2, format (%10.3g) ci obs percent svy: tab b6121_hcd if b6110_6120==2, format (%10.3g) ci obs count repeated for b6122_hcd – b6131_hcd (changing at the variables name)
Current smoker	current_smoker	Weight4	Those who reported had ever smoke and currently smoking but not necessarily on daily basis	gen current_smoker=1 if b9010==1 & b9011==1 replace current_smoker=2 if b9010==2   b9010==44   b9010==7   b9010==9   b9011==2   b9011==7   b9011==9   b9011==44
Daily smoker	daily_smoker	Weight4	Those who reported smoking on daily basis	gen daily_smoker=1 if b9010==1 & b9011==1 & b9013==1 replace daily_smoker=2 if b9010==2   b9010==44   b9010==7   b9010==9   b9011==2   b9011==7   b9011==9   b9011==44   b9013==2   b9013==44   b9013==9
Advised stop smoking	b9016	Weight4	Proportion of daily smokers who had been advised to stop smoking by healthcare provider	svy: tab b9016 if daily_smoker==1, format (%10.3g) ci obs percent svy: tab b9016 if daily_smoker==1, format (%10.3g) ci obs count





# TOPIC 3

## UTILISATION OF HEALTHCARE SERVICES



### 3.0 UTILISATION OF HEALTHCARE SERVICES

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### 3.1 GENERAL OBJECTIVE

To determine the pattern of utilization of healthcare services (Public, Private, Traditional and Complementary Medicine)

#### 3.1.1 Specific Objectives

1. To determine prevalence and rate of ambulatory care utilisation (excluding staying overnight in hospitals and other facilities).
2. To determine prevalence and rate of hospitalisation.
3. To determine the average time and distance taken to seek healthcare or treatment.
4. To determine the proportion of utilisation in government and private healthcare facilities.

### 3.2 UTILISATION OF OUT-PATIENT HEALTHCARE AMONG TOTAL POPULATION

#### 3.2.1 Findings

##### 3.2.1.1 Prevalence of utilisation of out-patient healthcare

A total of 28,411 (99.7%) responded to this section (**Table 3.1**).

In the two weeks prior to the interview (**Table 3.2**), 12.6% (95% CI, 12.0 - 13.2) of respondents had out-patient care. Among the states, Wilayah Persekutuan Putrajaya (19.0% ; 95% CI, 16.2 – 22.1), Perak (18.6% ; 95% CI, 16.5 – 20.9), Wilayah Persekutuan Kuala Lumpur (17.1% ; 95% CI, 14.3 – 20.3), Negeri Sembilan (17.2% ; 95% CI 15.0 – 19.6), and Sabah (14.0% ; 95% CI, 12.3 – 15.8) had significantly higher utilisation than Penang (11.1% ; 95% CI, 9.3 – 13.3), Selangor (10.9% ; 95% CI, 9.9 – 12.0), Pahang (10.3%; 95%

CI, 8.7 – 12.0), Sarawak (10.0% ; 95% CI, 8.6 – 11.6), Terengganu (8.3% ; 95% CI, 7.1 – 9.6), and Kelantan (6.9% ; 95% CI, 5.8 – 8.1).

By age groups, the group in the two extreme ends, namely the 0-4 years (23.8%; 95% CI, 21.9– 25.9) and >75 years (22.0%; 95% CI, 17.8 – 26.8) had significantly higher utilisation than the other groups.

By ethnic groups, Indians had the highest utilisation of out-patient care (18.1%; 95% CI, 16.0 – 20.5), followed by Other Bumiputeras (14.2% ; 95% CI, 12.5 – 16.0) and Malays (13.1%; 95% CI, 12.5 – 13.8), while the Chinese (9.6% ; 95% CI, 8.6 – 10.6) had the lowest. Compared to other occupational groups, the self-employed (9.2%; 95% CI, 8.0 – 10.5) had significantly less utilisation. Those who were single (8.7% ; 95% CI, 7.8 – 9.6) utilised significantly less out-patient care than the other marital status groups.

There was no significant difference in prevalence of utilisation between urban and rural areas, sexes and among different education and income level groups.

#### **3.2.1.2 Last out-patient healthcare utilisation**

Among the respondents (**Table 3.3**), more than half of the respondent had utilize out-patient care for the past 1 year (57.6% ; 95% CI, 56.8 – 58.3). About one quarter reported had never utilised out-patient healthcare (24.2% ; 95% CI, 23.6 – 24.9).

#### **3.2.1.3 Total number of out-patient healthcare facilities visited**

Among those who had out-patient healthcare in the last 2 weeks, 94.0% (95% CI, 92.9 – 95.0) had visited only one facility, while only 4.5% (95% CI, 3.6 – 5.4) visited two facilities (**Table 3.4**).

#### **3.2.1.4 Utilisation of out-patient healthcare by sector**

Among those who had out-patient care in the 2 weeks prior to the interview (**Table 3.5**), significantly more had visited private (54.2%; 95% CI, 52.2 – 56.2) than government facilities (45.8%; 95% CI, 43.8 – 47.8).

Higher utilisation of government out-patient care were in Kelantan (67.2% ; 95% CI, 59.0 – 74.4) and Perlis (64.4% ; 95% CI, 56.1 – 71.9), while the lowest was in Selangor (30.2% ; 95% CI, 25.6 – 35.3). Rural location (58.5% ; 95% CI, 55.5 – 61.4) utilised significantly more than urban areas (40.6% ; 95% CI, 38.0 – 43.2).

Highest utilisation of private out-patient care was in Selangor (69.8% ; 95% CI, 64.7 – 74.4), followed by Wilayah Persekutuan Kuala Lumpur (65.0% ; 95% CI, 56.1 – 72.9) and Johor (61.8% ; 95% CI, 56.4 – 66.8). The least was in Kelantan (32.8% ; 95% CI, 25.6 – 41.0). Respondent from urban areas (59.4% ; 95% CI, 56.8 – 62.0) utilised more private out-patient care than rural (41.5% ; 95% CI, 38.6 – 44.5) location.

### 3.2.1.5 Annualised rate of utilisation (mean visit to out-patient healthcare)

Although the recall period for out-patient utilization was 2 weeks, the results were annualised to ease the reporting of utilisation rate (**Table 3.6**). Overall, Malaysian population has an average of 4.43 (95% CI, 4.06–4.79) visits to outpatient clinic in a year. Highest utilization rate was seen in Perak (7.13; 95% CI, 5.26–9.00), followed by Wilayah Persekutuan Putrajaya (6.46; 95% CI, 5.03–7.88) and Sabah/ Labuan (6.44; 95% CI, 4.18–8.70).

By age groups, the group in the two extreme ends, namely the 0-4 years (7.19; 95% CI, 6.51–7.68) and >75 years (8.60; 95% CI, 5.85–11.35) had significantly higher utilisation rate than the other groups.

### 3.2.1.6 Out-patient visit associated with previous health problem in the last 2 weeks

Significantly more visits to the out-patient healthcare facilities were due to health problems (81.3% ; 95% CI, 79.6 – 82.9) than otherwise (**Table 3.7**).

### 3.2.1.7 Number of visits to an out-patient healthcare facility (same facility)

Of all the government facilities, 87.6% (95% CI, 85.3 – 89.6) had been visited once, 5.5% (95% CI, 4.3 - 7.2) twice, and 5.8% (95% CI, 4.4 – 7.7) more than twice, while of private facilities, 89.8% (95% CI, 87.7 – 91.6) had been visited once, 6.0% (95% CI, 4.5 – 7.9) twice, and 3.2% (95% CI 2.4 – 4.3) more than twice (**Table 3.8**).

### 3.2.1.8 Modes of transportation to out-patient healthcare facilities

Most of visits to government out-patient care, had been made using respondents' own car (50.4% ; 95% CI, 47.4 – 53.3). Other modes of transportation used, in decreasing order, were using their own motorcycle (26.0% ; 95% CI, 23.4 – 28.7), public transport (14.2% ; 95% CI, 12.2 – 16.4) and on foot (4.9% ; 95% CI, 3.9 - 6.3) (**Table 3.8**).

Most of the visits to private out-patient care, had been using respondents' own car (69.5% ; 95% CI, 66.7 – 72.2). Other modes of transportation, in decreasing order, were using their own motorcycle (13.4% ; 95% CI, 11.6 -

15.5), on foot (7.0% ; 95% CI, 5.5 – 9.0) and public transport (6.1% ; 95% CI, 4.8 – 7.7) (**Table 3.8**).

#### **3.2.1.9 Travel time to out-patient healthcare facilities**

The mean travel time from home to government out-patient facilities was 18.4 minutes (SD, 18.6), with median of 15 minutes (IQR, 10 – 20) (**Table 3.9**). A total of 76.1% (95% CI, 73.4 – 78.6) were <30 minutes, 18.9% (95% CI, 16.5 – 21.5) 30 – 60 minutes and 1.9% (95% CI, 1.3 – 2.8) >60 minutes (**Table 3.8**).

The mean travel time from home to private out-patient facilities was 15.6 minutes (SD, 16.9), with median of 10 minutes (IQR, 5 – 20) (**Table 3.9**). A total of 83.3% (95% CI, 81.0 – 85.4) were <30 minutes, 13.4% (95% CI, 11.5 – 15.6) 30–60 minutes and 1.2% (95% CI, 0.7 – 2.1) >60 minutes (**Table 3.8**).

Those in the urban area had shorter travel time (15.6 minutes, SD 15.3) as compared to those in rural area (20.2 minutes, SD 22.3). Those in Peninsular had shorter travel time (15.3 minutes, SD 15.8) as compared to Sabah and Sarawak region, which is more than 20 minutes (**Table 3.9**). Detailed distribution of the travel time in urban-rural location shown in **Table 3.10**.

#### **3.2.1.10 Distance to out-patient healthcare facilities**

The mean distance between government out-patient health care facilities and respondents' homes was 8.7km (SD, 15.2), with median of 5 km (IQR, 2 – 10) (**Table 3.9**). A total of 40.2% (95% CI, 37.3 – 43.1) were <5km, 28.9 % (95% CI, 26.4 – 31.6) 5–10km and 17.4% (95% CI, 15.1 – 20.1) >10km (**Table 3.8**).

The mean distance between private out-patient health care facilities and respondents' homes was 8.3km (SD, 15.2), with median of 5km (IQR, 2 – 10) (**Table 3.9**). A total of 43.8 % (95% CI, 40.9 – 46.6) were <5km, 28.7 % (95% CI, 26.2 – 31.3) 5–10km and 16.9% (95% CI, 14.9 - 19.2) > 10km (**Table 3.8**).

Those in the urban area had shorter distance to healthcare facility (7.4 km, SD 13.7) as compared to those in rural area (11.2 km, SD 18.3) (**Table 3.9**). Detailed distribution of the distance to the healthcare facility in urban-rural location shown in **Table 3.11**.

#### **3.2.1.11 Willingness to recommend out-patient healthcare facilities utilised**

About 81.2% (95% CI, 78.8 – 83.8) of the visits made to the government out-patient facilities, the respondent claimed that they would recommend the respective facility used to others, while 69.3% (95% CI, 66.5 – 71.9) for the private out-patient facilities (**Table 3.8**).

### 3.2.1.12 Utilisation Of Antenatal Care

Within 12 months prior to interview, 3.2% (95% CI, 2.9 – 3.4) women were pregnant (**Table 3.12**), and of these, 93.9% (95% CI, 91.4 – 95.7) had sought antenatal care (**Table 3.13**). More had visited government clinics (78.5%; 95% CI, 74.5 – 82.0) as compared to private clinics (21.1%; 95% CI, 17.6 – 25.1) (**Table 3.14**).

### 3.2.2 Utilisation Of Outpatient Healthcare Among Those Reported To Have Illness In The Past 2 Weeks

Of the total respondents, 33.1 % reported ill in the 2 weeks prior to the interview. Of these, 30.5% (95% CI, 29.3 – 31.7), utilised out-patient healthcare (**Table 3.15**). Utilisation of healthcare services among those who reported ill in the last 2 weeks was significantly higher in Penang (50.4% ; 95% CI, 42.6 – 58.1), Negeri Sembilan (43.4% ; CI, 38.1 – 48.9) and Perak (40.7% ; 95% CI, 36.4 – 45.2) compared to the other states. By age groups, utilisation of healthcare services among those who reported ill in the last 2 weeks was significantly higher among the 0-4 years (56.8% ; 95% CI, 53.0 – 60.6) and >75 years (43.5% ; CI, 35.5 – 51.9) compared to the other age groups. There was no difference in utilisation by location, sex, occupation and income (**Table 3.16**).

### 3.2.3 Implication

While among those who had out-patient healthcare in the 2 weeks prior to the interview, significantly more had visited private compared to government facilities, for antenatal out-patient care, more had visited government clinics as compared to private clinics.

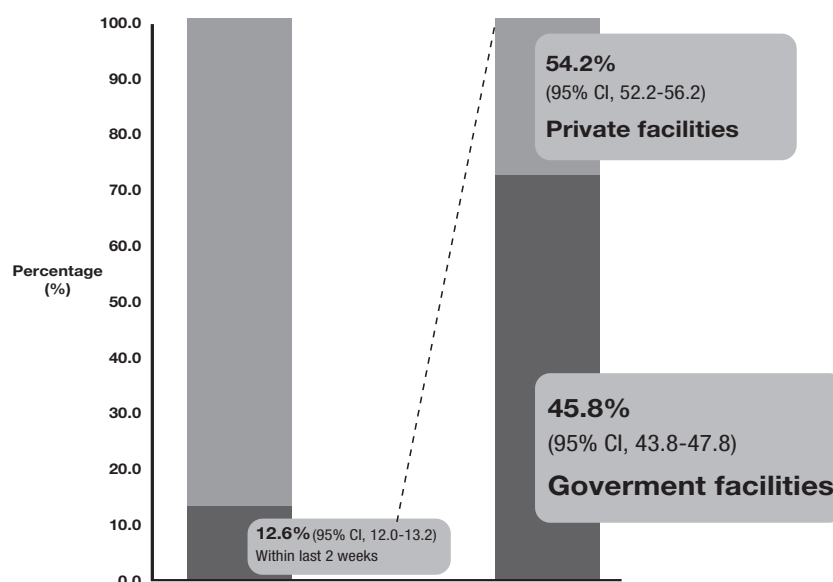
Prevalence of utilisation of out-patient healthcare was highest in Wilayah Persekutuan Putrajaya, Perak, Negeri Sembilan, Wilayah Persekutuan Kuala Lumpur and Sabah, among the 0-4 years and >75 years age groups, Indians, those who were married or widows/ widowers/ divorcees and among retirees. The commonest reason for use was having a health problem.

By average, each individual will seek care 2 times (visits) to each government and private healthcare facility, making it about 4 times / visits to any healthcare facility in a year. The rate of utilisation also seen high in two extreme end of age groups, which were child and elderly. Those who are working tends to go to the private healthcare facility, while those who are not working and retiree tends to go to the government. Those who had lower income group seen more fond towards public healthcare facility.

About one fourth of the respondent had never utilised out-patient care while only about 12% utilised it in the 2 weeks prior to the interview. Almost all utilised only one health care facility, and had made only one visit, either to government or private facility using

their own car. Mean travel time to both government and private out-patient health care facilities was less than 20 minutes and the mean distance travelled was less than 10km. Respondents reported that would recommend both government and private health care facilities to others.

**Figure 3.1: Utilisation of out-patient healthcare facilities by sector**



Utilisation of private out-patient care (**Figure 3.1**) was higher (as compared to the government) in this study (54.2%) which is similar to that previously reported in NHMS II (42.5%). The utilisation rate of government facility was slightly higher in this study (45.8%) as compared to that previously reported in NHMS II (33.8%), indicating that the population had come to rely more on public facilities. Most government out-patient care had been utilised in Kelantan, while private out-patient care had been most utilised in Selangor. Detailed comparisons with NHMS II and NHMS III can be seen in **Section 3.2.4**.

The mean distance travelled had increased from 5.7km in NHMS 2006 to 8.4km in this study. This indicates that the populations are living further away from facilities or that facilities are being by-passed



## 3.2.4 Comparison with NHMS II (1996) and NHMS III (2006)

Figure 3.2: Comparison with previous NHMS (NHMS 1996 &amp; 2006) – Out-patient services

	NHMS II (1996)	NHMS III (2006)	NHMS IV (2011)
Response rate	98.4%	98.3%	99.7%
Ill & sought care	42.5%	58.1%	30.5%
Highest Prevalence by: States	Penang, WP Kuala Lumpur, Perak, Selangor	Perak, Kedah	WP Putrajaya, WP Kuala Lumpur, Perak, Negeri Sembilan, Sabah
Sex	No difference	Female > male	No difference
Ethnic	Indians	Indians	Indians
Urban vs rural	NA	No difference	No difference
Age group	0-4 years	0-4 years, 65+ years	0-4 years, 75+ years
Education level	Lower in < education level	Lowest = secondary	No difference
Income	Increase with income	No difference	No difference
Visit to One place	90%	NA	94%
Type / sector (Private : Government)	Private > Government (59.8%) : (33.8%)	NA	Private > Government (54.2%) : (45.8%)
Distance Mean Median	NA NA	5.7km 3.0km	8.4km 5.0km
Mode of Transport	NA	Own transport = 83.5%	Own transport Government = 50.7% Private = 69.2%
Travel Time : <30mi n	70.4 %	85.4%	76.0%
Marital status	NA	Lowest = Single	Lowest = Single

### 3.3 UTILISATION OF IN-PATIENT HEALTHCARE (HOSPITALISATION) AMONG TOTAL POPULATION

#### 3.3.1 Findings

##### 3.3.1.1 Prevalence of hospitalisation

A total of 28,498 (99.8%) responded to this section (**Table 3.22**).

In the 12 months prior to the interview (**Table 3.23**), 6.9% (95% CI, 6.5 – 7.3) of the respondents had been hospitalised. Among the states, Penang had the highest hospitalisation which was 10.2% (95% CI, 8.2 – 12.7) followed by Negeri Sembilan (9.7%; 95% CI, 8.1 – 11.7) and Melaka (8.5%; 95% CI, 6.9 – 10.6). In contrast, Kelantan had the lowest hospitalisation which was 4.2% (95% CI, 3.3 – 5.2) followed by Sarawak (4.7%; 95% CI, 3.8 – 6.0). There was no significant difference in prevalence of hospitalisation between urban and rural locations. Females (8.5%; 95% CI, 7.9 – 9.1) had more hospitalisation than males (5.3%; 95% CI, 4.8 – 5.8).

By age groups, those in the >75 years group (17.0%; 95% CI, 13.1 – 21.9) had the highest hospitalisation, while the age group 10 – 14 years (2.5% ; 95% CI, 1.9 – 3.2) had the lowest. The 0 – 4 years group (10.2% ; 95% CI, 8.7 – 11.8), 25 – 29 years group (10.6% ; 95% CI, 9.0 – 12.4), 30 – 34 years group (10.2% ; 95% CI, 8.7 – 11.9) and 65 – 69 years group (10.7% ; 95% CI, 8.0 – 14.4) had relatively higher hospitalisation. By ethnic groups, Indians had the most (10.4% ; 95% CI, 8.8 – 12.4), followed by Malays (7.2% ; 95% CI, 6.8 – 7.7) and Other Bumiputera (6.8% ; 95% CI, 5.7 – 8.1).

Those with secondary (7.7% ; 95% CI, 7.0 – 8.5) and tertiary (7.6% ; 95% CI, 6.7 – 8.7) education levels had more hospitalisation than those with primary (5.6% ; 95% CI, 4.9 – 6.2). More unpaid worker / home maker (13.3% ; 95% CI, 11.9 – 15.0), retiree (11.2% ; 95% CI, 9.3 – 13.5) and government workers (9.1% ; 95% CI, 7.7 – 10.8), than private (6.3% ; 95% CI, 5.6 – 7.2) and self-employed (4.5% ; 95% CI, 3.7 – 5.5) had hospitalisation. There was no difference with income.

Prevalence of hospitalisation by married (9.4% ; 95% CI, 8.8 – 10.1) and widow/widower/divorce (11.0 ; 95% CI, 9.0 – 13.2) were significantly higher than single (3.7% ; 95% CI, 3.2 – 4.3) respondents.

### 3.3.1.2 Last admission to hospital

When asked when was the last had being admitted to hospital, 6.9% (95% CI, 6.5 – 7.3) were hospitalized within a year, while 14.9% (95% CI, 14.4 – 15.5) in between 1 to 5 years, while 19.5% (95% CI, 19.0 – 20.1) reported had been admitted to hospital in more than 5 years ago. More than half of the respondents reported never been hospitalised (57.7% ; 95% CI, 56.7 – 58.7) (Table 3.24).

### 3.3.1.3 Place of hospitalisation – total number of in-patient healthcare facilities visited

Among those who had hospitalised in the last 12 months, 94.8% (95% CI, 93.3 – 95.9) had visited one facility only, while only 3.3% (95% CI, 2.5 – 4.4) visited two facilities (Table 3.25).

### 3.3.1.4 Proportion of hospitalisation by sector

Among those who had hospitalised in the last 12 months (Table 3.26), more had visited government (72.2% ; 95% CI, 69.6 – 74.6) compared to private facilities (27.8% ; 95% CI, 25.4 – 30.4).

Highest utilisation of government facilities were in Kelantan (92.4%; 95% CI, 83.2 – 96.7), Sabah (93.4%; 95% CI, 86.8 – 96.8) and Sarawak (90.6%; 95% CI, 84.1 – 94.7), while the lowest was in Penang (38.0%; 95% CI, 28.3 – 48.8). Rural (91.1%; 95% CI, 89.0 – 92.8) utilised significantly more government facilities than urban areas (65.1% ; 95% CI, 61.7 – 68.3).

Highest utilisation of private facilities was in Penang (62.0% ; 95% CI, 51.2 – 71.7), followed by Selangor (42.1% ; 95% CI, 36.4 – 48.1). Private hospitals were least used in Sabah, Kelantan and Sarawak. Urban (34.9% ; 95% CI, 31.7 – 38.3) utilised more private hospital than rural (8.9% ; 95% CI, 7.2 – 11.0) areas.

### 3.3.1.5 Annual rate of hospitalisation (mean visit to in-patient healthcare)

In view of the rare occurrence of hospitalisation, the hospitalization rate for a recall period of 1-year is 0.086 (95% CI, 0.080–0.091) in Malaysian population by average, which can be translated as; of the 1000 Malaysian population there were 86 hospital admissions in a year (Table 3.27)

### 3.3.1.6 Number of hospital visit (admission) to a healthcare facility (same facility)

Of the government facilities, 84.9% (95% CI, 82.6–87.0) had been visited once, 9.4% (95% CI, 7.8 – 11.4) twice and 4.9% (95% CI, 3.7–6.5) more than twice, while of private facilities, 90.5% (95% CI, 86.7 – 93.3) had been visited once, 5.7% (95% CI, 3.5 – 9.3) (Table 3.28).

### 3.3.1.7 Duration of hospitalisation (length of stay)

Generally, the mean duration of stay in government hospital was 5.9 days (SD, 11.8), with median of 3 days (IQR, 2 – 7) (**Table 3.29**). Of the hospitalisation, 65.0% (95% CI, 61.9 – 68.0) had been 0-4 days, 18.5% (95% CI, 16.1 – 21.2) 5-7 days and 15.2% (95% CI, 13.1 – 17.7) >7 days (**Table 3.28**).

While the mean duration of stay in private hospital was 4.0 days (SD, 4.8), with median of 3 days (IQR, 2 – 5) (**Table 3.29**). Of the hospitalisation, 72.3% (95% CI, 67.2 – 76.9) had been 0-4 days, 19.2% (95% CI, 15.4 – 23.6) 5-7 days and 6.9% (95% CI, 4.5 – 10.5) > 7 days (**Table 3.28**).

### 3.3.1.8 Modes of transportation to hospitals/ in-patient healthcare facilities

Most of visits to government hospitals/ facilities, had been made with own car (72.2% ; 95% CI, 69.3 – 75.0). Other modes of transportation, in decreasing order, were public transport (12.2% ; 95% CI, 10.1 – 14.5), ambulance (6.0% ; 95% CI, 4.8 – 7.4), and own motorcycle (5.1% ; 95% CI, 4.0 – 6.6) (**Table 3.28**).

Most of visits to private hospitals/ facilities, had been made with own car (85.8%; 95% CI, 81.2 – 89.5). Other modes of transportation (results on estimates were not shown), in decreasing order, were public transport (4.2%; 95% CI, 2.4 – 7.1), own motorcycle (3.6%; 95% CI, 2.0 – 6.3), and ambulance (1.7%; 95% CI, 0.6 – 4.7) (**Table 3.28**).

### 3.3.1.9 Travel time to hospitals/ in-patient healthcare facilities

The mean time to travel from home to government hospitals/ facilities was 34.1 minutes (SD, 48.8), with median of 20 minutes (IQR, 15 – 30) (**Table 3.29**). A total of 48.1% (95% CI, 45.0 – 51.2) were <30 minutes, 34.9% (95% CI, 31.9 – 38.0) 30–60 minutes and 7.3% (95% CI, 6.0 – 9.0) >60 minutes (**Table 3.28**).

The mean time to travel from home to private hospitals/ facilities was 28.0 minutes (SD, 36.6), with median of 20 minutes (IQR, 10 – 30) (**Table 3.29**). A total of 59.4% (95% CI, 53.7 – 64.9) were <30 minutes and 31.2% (95% CI, 26.2 – 36.7) 30–60 minutes (**Table 3.28**).

Those in the urban area had shorter travel time (28.5 minutes, SD 45.5) as compared to those in rural area (43.4 minutes, SD 44.5). Those in Peninsular had shorter travel time (29.8 minutes, SD 36.7) as compared to Sabah and Sarawak region, which is more than 40 minutes (**Table 3.29**). Detailed distribution of the travel time in urban-rural location shown in (**Table 3.30**).

### 3.3.1.10 Distance to hospitals/ in-patient healthcare facilities

The mean distance between respondents' homes and government hospitals (that they went to) for in-patient care was 23.7km (SD, 43.6), with median of 12km (IQR, 5.1 – 20.0) (**Table 3.29**). A total of 11.6% (95% CI, 9.7 – 13.9) were <5km, 25.4% (95% CI, 22.8 – 28.3) 5–10km and 39.9% (95% CI, 36.9 – 43.0) >10km (**Table 3.28**).

The mean distance between respondents' homes and private hospitals (that they went to) for in-patient care was 17.8km (SD, 37.8), with median of 10km (IQR, 5.0 – 16.0) (**Table 3.29**). A total of 21.8% (95% CI, 17.1 – 27.4) were <5km, 31.5% (95% CI, 26.6 – 36.9) 5–10km and 33.9% (95% CI, 28.9 – 39.3) >10km (**Table 3.28**).

Those in the urban area had shorter distance to healthcare facility (17.2 km, SD 36.9) as compared to those in rural area (35.8 km, SD 51.9) (**Table 3.29**). Detailed distribution of the distance to the healthcare facility in urban-rural location shown in (**Table 3.31**).

### 3.3.1.11 Willingness to recommend in-patient healthcare facilities utilised

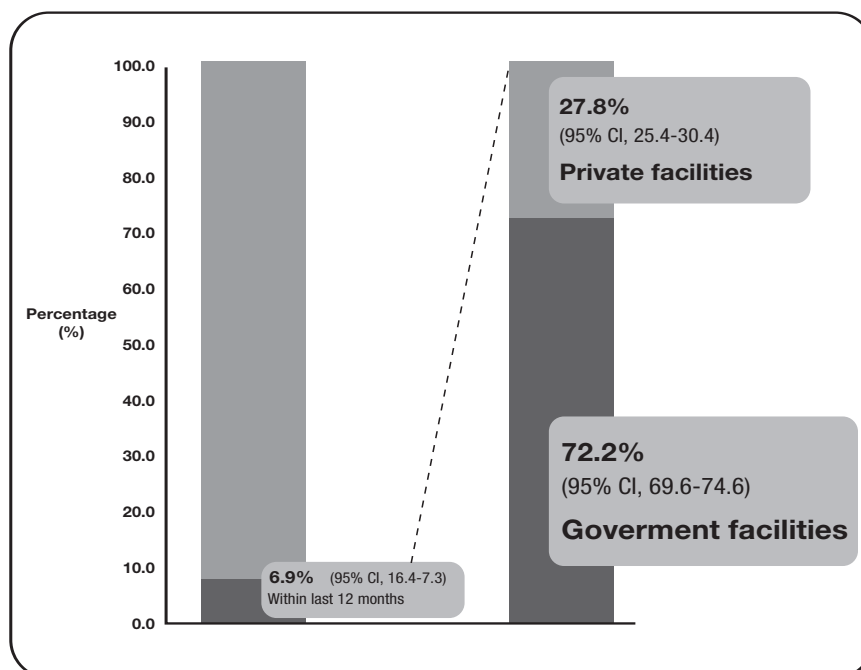
About 79.3% (95% CI, 76.7 – 81.6) of the visits made to the government hospital, the respondent claimed that they would recommend the respective facility used to others, while 67.9% (95% CI, 62.2 – 73.1) for the private facilities (**Table 3.28**).

## 3.3.2 Implications

Prevalence of hospitalisation was highest in Penang, Negeri Sembilan and Selangor, among the >75 years age group, Indians, those who were more educated, married or widows/ widowers/ divorcees and among unpaid workers/ homemakers. While Kelantan and Sarawak were the least.

The rate of hospitalisation was seen higher in 0-4 years old age group, those in reproductive age (25-34 years old), and those who aged more than 60. It also clear that the population had utilised government (64 hospital admissions per 1000 population, in a year) hospital more as compared to private (22 hospital admissions per 1000 population, in a year).

Utilisation of government hospitals for in-patient care (**Figure 3.3**) was higher (as compared to the private) in this study (72.2%) which is similar to that in previous NHMS (**Figure 3.5** and **Figure 3.6**).

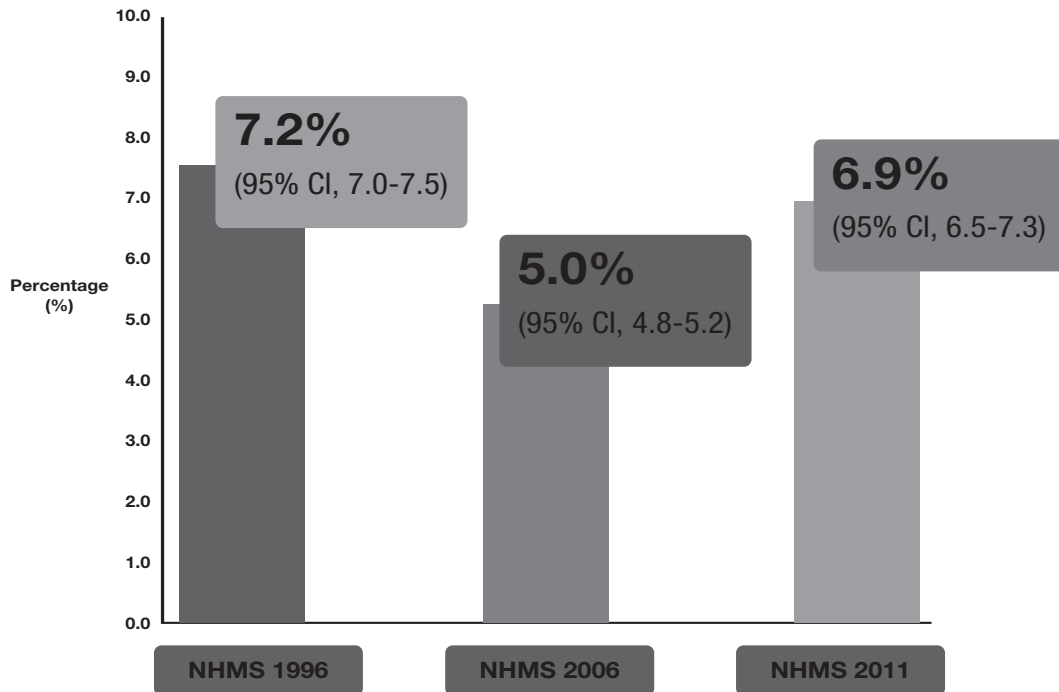
**Figure 3.3: Utilisation of in-patient healthcare facilities by sector**

More than half of the respondents reported had never utilised in-patient care or been hospitalized while less than 10% had been hospitalised in the 12 month prior to the interview. Almost all utilised only one health care facility, and had made only one visit in that time, either to government or private facility using their own car. In comparison with NHMS II and NHMS III (which reported 17.9% and 16.9% respectively), utilization of private in-patient care was higher in this study (27.8%) while the opposite is true of government in-patient care (72.2%). Most in-patient care in Kelantan had been to government hospital, while those in Penang had been to private facilities (**Table 3.26**).

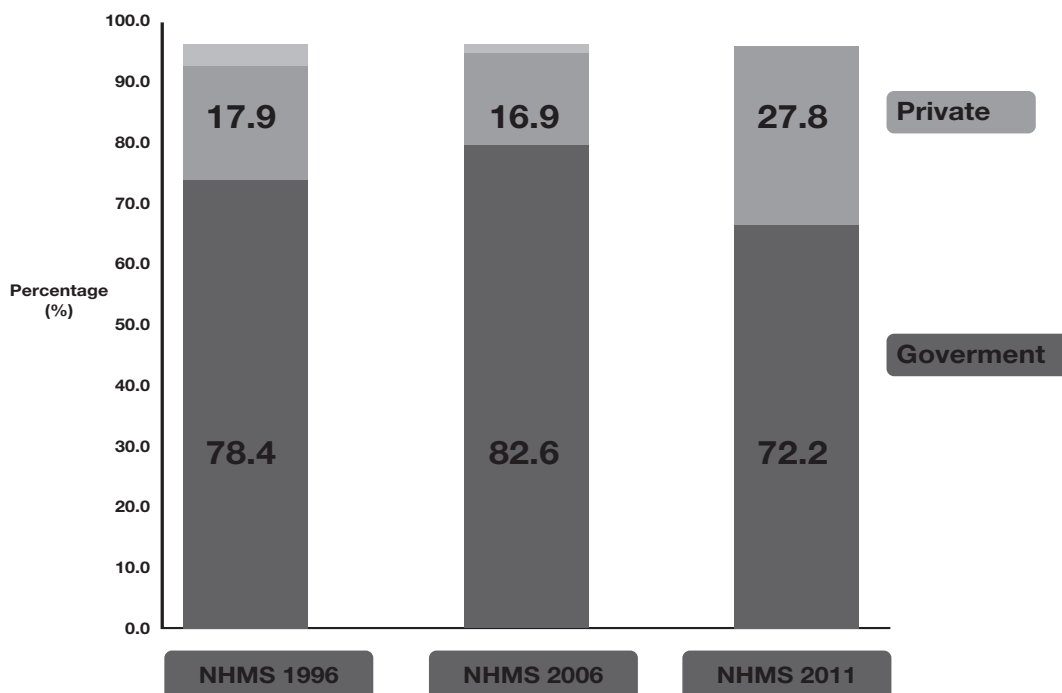
Respondents stayed longer in government than in private facilities. Travel time to both government and private facilities was about half an hour and the distance was about 20km. Both government and private facilities would be recommended to others following less than 80% of visits. Detailed comparisons with previous NHMS can be seen in **Section 3.3.3**.

### 3.3.3 Comparison with NHMS II (1996) and NHMS III (2006)

**Figure 3.4: Prevalence of in-patient healthcare utilisation within the last 12 months prior to interview**



**Figure 3.5: Distribution (%) of in-patient healthcare utilisation between sectors**



**Figure 3.6: Comparison with previous NHMS (NHMS 1996 & 2006) – in-patient services**

	NHMS II (1996)	NHMS III (2006)	NHMS IV (2011)
<b>Prevalence</b>	7.2%	5.0%	6.9%
<b>Highest Prevalence by Sex</b>	Female > male	No difference	Female > male
<b>Type / sector (Private : Government)</b>	Private > Government (78.4% : 17.9%)	Private > Government (82.6% : 16.9%)	Private > Government (69.1% : 26.7%)
<b>Highest Prevalence of Private facility by: State</b>	Perlis, Negeri Sembilan	Penang, WPKL, Selangor	Penang
<b>Urban : Rural</b>	No difference	22.6 : 6.6	No difference
<b>Mean distance to private in-patient facilities</b>	92.6 km	NA	17.8 km



## 3.4 CONCLUSION

### 3.4.1 Utilisation of Out-patient Healthcare

This study showed a change in utilisation pattern between government and private out-patient facilities, and differences among different population groups e.g. between sexes and urban-rural, among states, education and income levels. There exist an aged population (>75 years) with a high utilisation of out-patient care.

About 80% of visits resulted in respondents wanting to recommend the government facilities to others, while only 69% for the private. Although the reason for wanting to recommend was not stated, possibly there is greater general satisfaction with government compared to private out-patient healthcare facilities. Nevertheless, patient experience in both government and private out-patient healthcare facilities can still be improved, towards 100% recommendation.

### 3.4.2 Utilisation of In-patient Healthcare (Hospitalisation)

This study showed a decrease in disparities in hospitalisation between government and private in-patient facilities. At the same time, distance to private facilities had decreased considerably.

With government facilities being utilised three times more than private and stays were 1.5 time longer in government than private facilities clearly the demand on government facilities are greater. This was in spite of the travel being further (23.7km vs 17.8km) and longer (34.1 minutes vs 28.0 minutes) to government facilities.

As less than 80% of visits result in respondents wanting to recommend the facilities to others, there is still room for improvement in both government and private in-patient facilities.

## 3.5 RECOMMENDATION

Increased utilisation in both out-patient & in-patient healthcare services by the aged (>75 years) calls for enhanced geriatric care. Adequate parking facilities are called for to cater for patients who mostly used own car to the healthcare facilities. Otherwise optimum shuttle services must be considered.

## 3.6 TABLES OF FINDINGS

### 3.6.1 Utilisation of Out-patient Healthcare Among Total Population

**Table 3.1: Utilisation of out-patient healthcare in the last 2 weeks**

	Count	Estimated Population	(% Proportion	95% CI	
				Lower	Upper
<b>TOTAL (Overall)</b>	28,498	27,278,956	100.0	100.0	100.0
<b>YES</b>	<b>3,733</b>	<b>3,426,770</b>	12.6	12.0	13.2
No	24,678	23,769,740	87.1	86.5	87.7
Missing	87	82,447	0.3	0.2	0.4

**Table 3.2: Prevalence of out-patient healthcare utilisation (by socio-demographic characteristics)**

Socio-demographic characteristics	n	Estimated Population	% (Prevalence)	95% CI	
				Lower	Upper
<b>MALAYSIA (Overall)</b>	28,498	27,278,956	12.6	12.1	13.1
<b>State</b>					
Johor	2,469	3,198,775	14.0	12.6	15.5
Kedah	1,700	1,836,622	11.4	9.7	13.4
Kelantan	1,896	1,467,639	6.9	5.8	8.1
Melaka	1,600	788,972	12.9	10.9	15.3
Negeri Sembilan	1,529	975,602	17.2	15.0	19.6
Pahang	1,641	1,387,621	10.3	8.7	12.0
Penang	1,788	1,527,315	11.1	9.3	13.3
Perak	1,599	2,243,870	18.6	16.5	20.9
Perlis	1,424	217,069	12.0	10.3	14.0
Selangor	4,101	5,398,672	10.9	9.9	12.0
Terengganu	1,846	1,012,044	8.3	7.1	9.6
Sabah/Labuan	3,208	3,217,431	14.0	12.3	15.8
Sarawak	1,962	2,316,783	10.0	8.6	11.6
WP Kuala Lumpur	911	1,620,013	17.1	14.3	20.3
WP Putrajaya	824	70,529	19.0	16.2	22.1
<b>Location</b>					
Urban	16,372	19,496,298	12.4	11.8	13.1
Rural	12,126	7,782,659	12.9	12.1	13.6
<b>Sex</b>					
Male	13,757	13,959,955	11.8	11.1	12.5
Female	14,741	13,319,001	13.3	12.6	14.1
<b>Age Group (years)</b>					
0 - 4	2,772	2,366,121	23.8	21.9	25.9
5 - 9	2,904	2,596,837	13.8	12.4	15.4
10 - 14	2,926	2,639,932	8.4	7.1	9.8
15 - 19	2,450	2,746,005	8.0	6.6	9.5
20 - 24	2,108	2,712,661	10.0	8.3	12.0
25 - 29	2,101	2,605,575	11.5	9.9	13.4
30 - 34	1,885	2,065,596	12.0	10.3	13.9
35 - 39	1,799	1,844,496	10.9	9.3	12.9
40 - 44	1,844	1,725,055	12.3	10.6	14.3
45 - 49	1,801	1,570,079	12.8	10.9	14.9
50 - 54	1,681	1,313,353	12.5	10.7	14.6
55 - 59	1,463	1,027,597	13.4	11.4	15.6
60 - 64	997	772,562	13.2	10.8	15.9
65 - 69	673	499,048	13.8	10.8	17.5
70 - 74	538	368,196	17.7	12.3	24.9
75+	556	425,843	22.0	17.8	26.8

Socio-demographic characteristics	n	Estimated Population	% (Prevalence)	95% CI	
				Lower	Upper
<b>MALAYSIA (Overall)</b>	28,498	27,278,956	12.6	12.1	13.1
<b>Ethnicity</b>					
Malay	16,975	14,253,318	13.1	12.5	13.8
Chinese	4,944	6,332,970	9.6	8.6	10.6
Indian	2,122	1,834,300	18.1	16.0	20.5
Other Bumiputeras	2,933	3,300,636	14.2	12.5	16.0
Others	1,524	1,557,733	9.6	7.4	12.4
<b>Marital Status<sup>1</sup></b>					
Single	6,983	7,908,495	8.7	7.8	9.6
Married	12,537	11,676,560	12.9	12.2	13.7
Widow/Widower/Divorce	1,470	1,072,354	15.7	13.6	18.1
<b>Education Level</b>					
No formal education	1,559	1,218,847	12.6	10.8	14.7
Primary	8,065	7,159,469	10.7	9.9	11.6
Secondary	9,485	9,704,547	11.3	10.4	12.2
Tertiary	3,873	4,255,316	12.5	11.2	13.9
Unclassified education	1,675	1,627,575	9.7	8.0	11.9
N/A	3,841	3,313,202	21.9	20.3	23.5
<b>Occupation<sup>1</sup></b>					
Government / Semi-government	2,148	1,811,075	13.3	11.6	15.3
Private	5,843	7,001,658	12.8	11.7	13.9
Self employed	3,686	3,358,458	9.2	8.0	10.5
Unpaid worker/homemaker	3,224	2,758,938	12.0	10.8	13.4
Retiree	1,738	1,330,270	15.5	13.2	18.2
<b>Household Income Group (RM)</b>					
Less than RM400	2,166	2,016,214	11.6	10.1	13.4
RM400 – RM499	448	415,901	13.2	9.7	17.9
RM500 – RM699	1,141	941,916	12.4	10.2	14.9
RM700 – RM999	1,865	1,655,090	11.8	10.1	14.3
RM1000 – RM1999	5,927	5,096,306	12.2	11.0	13.7
RM2000 – RM2999	4,797	4,593,572	12.9	11.6	14.6
RM3000 – RM3999	3,704	3,688,019	13.2	11.9	14.6
RM4000 – RM4999	2,484	2,659,738	13.4	11.8	15.2
RM5000 and above	5,966	6,212,201	12.3	11.3	13.4

<sup>1</sup>not including "missing & not applicable"

**Table 3.3: Last out-patient healthcare utilization**

Last experience (years)	Count	Estimated Population	(%) Proportion	95% CI	
				Lower	Upper
<b>Last out-patient healthcare utilization (in years)</b>					
<b>TOTAL (Overall)</b>	28,498	27,278,956	100.0	100.0	100.0
Within last 1 year	16,582	15,703,872	57.6	56.8	58.3
> 1 – 3 years	1,881	1,914,669	7.0	6.6	7.4
> 3 – 5 years	236	238,296	0.9	0.8	1.0
> 5 years	100	101,752	0.4	0.3	0.5
No past history	6,605	6,607,323	24.2	23.6	24.9
Missing <sup>1</sup>	3,094	2,713,044	9.9	9.5	10.4
<b>Detailed last out-patient healthcare utilization (in weeks &amp; months)</b>					
<b>TOTAL (Overall)</b>	28,498	27,278,956	100.0	100.0	100.0
Within last 2 weeks	3,733	3,426,770	12.6	12.1	13.1
> 2 weeks – 1month	775	834,059	3.1	2.8	3.3
> 1– 2 months	2,796	2,554,059	9.4	8.9	9.8
> 2– 3 months	1,996	1,845,354	6.8	6.4	7.1
> 3 – 5 months	3,138	2,954,083	10.8	10.4	11.3
> 6 – 12 months	4,144	4,089,548	15.0	14.5	15.5
> 12 – 24 months	1,568	1,611,763	5.9	5.6	6.3
> 24 – 36 months	313	302,906	1.1	1.0	1.3
> 36 – 48 months	128	114,179	0.4	0.3	0.5
> 48 – 60 months	108	124,117	0.5	0.4	0.6
> 60 months	100	101,752	0.4	0.3	0.5
No past history	6,605	6,607,323	24.2	23.6	24.9
Missing <sup>1</sup>	3,094	2,713,044	9.9	9.5	10.4

<sup>1</sup> missing include those who "Don't know", "Refuse to answer" & "No answer"

**Table 3.4: Total number of out-patient healthcare facilities utilised**

Number of places visited	Count	Estimated Population	(%) Proportion	95% CI	
				Lower	Upper
<b>TOTAL (Overall)</b>	3,733	3,426,770	100.0	100.0	100.0
1 place	3,523	3,222,348	94.0	92.9	95.0
2 places	156	152,769	4.5	3.6	5.4
3 places	20	19,160	0.6	0.3	1.0
Missing <sup>1</sup>	34	32,493	0.9	0.6	1.6

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

<sup>1</sup> missing include those who "Don't know", "Refuse to answer" & "No answer"

**Table 3.5: Prevalence of out-patient healthcare utilisation (by socio-demographic characteristics) by sector**

Type / State / Location	n	Estimated Population	Government			Private		
			Row % (Proportion)	95% CI Lower Upper		Row % (Proportion)	95% CI Lower Upper	
<b>MALAYSIA<sup>a,b</sup></b>	3,903	3,587,956	45.8	43.8	47.8	54.2	52.2	56.2
<b>State</b>								
Johor	405	484,535	38.2	33.2	43.6	61.8	56.4	66.8
Kedah	207	218,558	50.8	42.4	59.2	49.2	40.8	57.6
Kelantan	142	102,093	67.2	59.0	74.4	32.8	25.6	41.0
Melaka	249	107,658	53.7	44.7	62.5	46.3	37.5	55.3
Negeri Sembilan	280	172,588	58.2	50.9	65.1	41.8	34.9	49.1
Pahang	170	145,943	59.4	51.2	67.0	40.6	33.0	48.8
Penang	226	176,872	47.1	38.0	56.5	52.9	43.5	62.0
Perak	327	449,110	45.7	39.5	52.0	54.3	48.0	60.5
Perlis	167	26,584	64.4	56.1	71.9	35.6	28.1	43.9
Selangor	519	616,227	30.2	25.6	35.3	69.8	64.7	74.4
Terengganu	171	84,220	53.0	45.0	60.8	47.0	39.2	55.0
Sabah/Labuan	490	461,436	54.2	47.5	60.8	45.8	39.2	52.5
Sarawak	221	233,913	58.4	51.3	65.2	41.6	34.8	48.7
WP Kuala Lumpur	174	293,994	35.0	27.1	43.9	65.0	56.1	72.9
WP Putrajaya	155	14,225	47.7	39.5	56.1	52.3	43.9	60.5
<b>Location</b>								
Urban	2,196	2,540,661	40.6	38.0	43.2	59.4	56.8	62.0
Rural	1,707	1,047,295	58.5	55.5	61.4	41.5	38.6	44.5

<sup>a</sup> multiple responses (visits by same person)<sup>b</sup> total visits (n) = 3933, results above only include visits to government and private out-patient facilities, excluding 30 missing

Table 3.6: Annual mean visit to out-patient healthcare facility (by socio-demographic characteristics and by sector)

Socio-demographic characteristics	n	Estimated Population	TOTAL				Government				Private			
			Mean visits	95% CI Lower	95% CI Upper	Mean visits	95% CI Lower	95% CI Upper	Mean visits	95% CI Lower	95% CI Upper			
<b>MALAYSIA (Overall)</b>	<b>28,498</b>	<b>27,278,956</b>	<b>4.43</b>	<b>4.06</b>	<b>4.79</b>	<b>2.16</b>	<b>1.86</b>	<b>2.46</b>	<b>2.27</b>	<b>2.06</b>	<b>2.48</b>			
<b>State</b>														
Johor	2,469	3,198,775	5.36	4.40	6.33	1.99	1.53	2.46	3.37	2.53	4.22			
Kedah	1,700	1,836,622	3.18	2.63	3.73	1.59	1.21	1.98	1.59	1.20	1.98			
Kelantan	1,896	1,467,639	1.86	1.53	2.19	1.30	1.02	1.58	0.56	0.39	0.73			
Melaka	1,600	788,972	5.59	3.10	8.08	3.29	0.91	5.67	2.30	1.51	3.09			
Negeri Sembilan	1,529	975,602	5.98	4.75	7.21	3.66	2.56	4.76	2.32	1.74	2.91			
Pahang	1,641	1,387,621	3.06	2.53	3.60	1.84	1.43	2.25	1.23	0.88	1.57			
Penang	1,788	1,527,315	3.91	2.91	4.90	1.62	1.18	2.07	2.28	1.40	3.17			
Perak	1,599	2,243,870	7.13	5.26	9.00	3.16	2.36	3.95	3.97	2.31	5.64			
Perlis	1,424	217,069	3.59	2.91	4.26	2.45	1.85	3.05	1.14	0.81	1.47			
Selangor	4,101	5,398,672	3.36	2.99	3.73	1.06	0.84	1.28	2.30	2.00	2.60			
Terengganu	1,846	1,012,044	2.50	2.06	2.95	1.51	1.14	1.88	0.99	0.74	1.24			
Sabah/Labuan	3,208	3,217,431	6.44	4.18	8.70	4.31	2.08	6.54	2.13	1.68	2.58			
Sarawak	1,962	2,316,783	3.07	2.54	3.61	1.89	1.44	2.34	1.18	0.87	1.49			
WP Kuala Lumpur	911	1,620,013	5.45	4.24	6.65	1.91	1.31	2.52	3.53	2.48	4.59			
WP Putrajaya	824	70,529	6.46	5.03	7.88	3.13	2.10	4.16	3.33	2.30	4.35			
Peninsular Malaysia	23,328	21,744,743	4.27	3.97	4.58	1.87	1.69	2.04	2.41	2.15	2.66			
<b>Location</b>														
Urban	16,372	19,496,298	4.38	3.90	4.85	1.87	1.49	2.25	2.51	2.22	2.79			
Rural	12,126	7,782,659	4.55	4.06	5.04	2.88	2.42	3.33	1.67	1.49	1.86			
<b>Sex</b>														
Male	13,757	13,959,955	4.14	3.76	4.53	1.92	1.63	2.21	2.22	1.96	2.48			
Female	14,741	13,319,001	4.72	4.10	5.35	2.41	1.87	2.94	2.32	1.98	2.65			
<b>Age Group (years)</b>														
0 - 4	2,772	2,366,121	7.19	6.51	7.86	3.24	2.76	3.71	3.95	3.42	4.47			
5 - 9	2,904	2,596,837	4.20	3.66	4.73	1.56	1.26	1.87	2.63	2.18	3.08			
10 - 14	2,926	2,639,932	3.12	1.72	4.52	1.31	0.94	1.67	1.81	0.46	3.17			
15 - 19	2,450	2,746,005	3.66	1.26	6.07	2.50	0.14	4.86	1.16	0.80	1.53			
20 - 24	2,108	2,712,661	3.54	2.56	4.52	1.86	1.03	2.70	1.68	1.16	2.19			
25 - 29	2,101	2,605,575	3.74	3.03	4.45	1.41	1.02	1.80	2.33	1.74	2.92			
30 - 34	1,885	2,065,596	4.44	3.06	5.82	1.98	0.71	3.25	2.45	1.89	3.02			

Socio-demographic characteristics	n	Estimated Population	TOTAL			Government			Private		
			Mean visits	Lower	Upper	Mean visits	Lower	Upper	Mean visits	Lower	Upper
<b>MALAYSIA (Overall)</b>	<b>28,498</b>	<b>27,278,956</b>	<b>4.43</b>	<b>4.06</b>	<b>4.79</b>	<b>2.16</b>	<b>1.86</b>	<b>2.46</b>	<b>2.27</b>	<b>2.06</b>	<b>2.48</b>
35 - 39	1,799	1,844,496	3.36	2.75	3.98	1.09	0.77	1.41	2.27	1.73	2.81
40 - 44	1,844	1,725,055	4.49	3.36	5.62	1.85	1.23	2.47	2.64	1.68	3.60
45 - 49	1,801	1,570,079	5.58	4.12	7.03	2.98	1.73	4.22	2.60	1.84	3.35
50 - 54	1,681	1,313,353	4.90	3.33	6.47	2.23	1.68	2.78	2.67	1.19	4.15
55 - 59	1,463	1,027,597	4.58	3.70	5.46	2.82	2.09	3.55	1.76	1.26	2.27
60 - 64	997	772,562	4.68	3.20	6.17	3.19	1.86	4.53	1.49	0.80	2.18
65 - 69	673	499,048	5.62	3.79	7.44	3.91	2.50	5.32	1.71	0.51	2.91
70 - 74	538	368,196	5.75	3.83	7.67	4.14	2.37	5.92	1.60	0.65	2.56
75+	556	425,843	8.60	5.85	11.35	5.49	3.59	7.39	3.11	1.12	5.10
<b>Ethnicity</b>											
Malay	16,975	14,253,318	4.16	3.88	4.43	2.00	1.79	2.22	2.15	1.98	2.32
Chinese	4,944	6,332,970	3.86	3.07	4.65	1.14	0.89	1.39	2.72	1.97	3.47
Indian	2,122	1,834,300	6.20	5.20	7.21	3.27	2.40	4.13	2.94	2.40	3.47
Other Bumiputeras	2,933	3,300,636	5.95	3.87	8.03	4.38	2.33	6.44	1.57	1.18	1.95
Others	1,524	1,557,733	3.89	2.06	5.72	1.67	0.05	3.28	2.22	1.34	3.11
<b>Occupation</b>											
Government/ Semi-	2,148	1,811,075	4.03	3.40	4.65	1.82	1.44	2.20	2.21	1.70	2.72
Private	5,843	7,001,658	4.94	3.87	6.01	1.97	1.00	2.93	2.97	2.50	3.44
Self employed	3,686	3,358,458	3.93	2.87	4.98	2.24	1.30	3.19	1.68	1.20	2.17
Unpaid worker/homemaker	3,224	2,758,938	3.95	3.42	4.49	2.47	2.07	2.88	1.48	1.15	1.81
Retiree	1,738	1,330,270	6.02	4.68	7.36	3.95	2.87	5.03	2.07	1.24	2.91
<b>Household Income group (RM)</b>											
< 400	2,166	2,016,214	3.48	2.93	4.02	1.91	1.51	2.32	1.56	1.19	1.94
400 - 499	448	415,901	4.04	2.62	5.46	3.21	1.86	4.56	0.83	0.35	1.31
500 - 699	1,141	941,916	4.46	3.24	5.68	2.76	2.04	3.48	1.70	0.69	2.71
700 - 999	1,865	1,655,090	3.76	3.06	4.47	2.33	1.77	2.90	1.43	0.99	1.87
1000 - 1999	5,927	5,096,306	4.18	3.64	4.73	2.79	2.31	3.26	1.40	1.11	1.68
2000 - 2999	4,797	4,593,572	4.77	4.02	5.53	2.28	1.79	2.76	2.49	1.91	3.08
3000 - 3999	3,704	3,688,019	4.72	3.48	5.96	2.03	1.31	2.75	2.69	1.68	3.70
4000 - 4999	2,484	2,659,738	6.06	3.47	8.64	3.01	0.49	5.53	3.05	2.42	3.68
> 5000	5,966	6,212,201	4.00	3.57	4.43	1.13	0.92	1.34	2.87	2.52	3.23

**Table 3.7: Utilisation related to previous health problem(s) in last 2 weeks**

Number of places visited	Count	Estimated Population	(% Proportion)	95% CI	
				Lower	Upper
<b>TOTAL (Overall)<sup>1</sup></b>	<b>3,933</b>	<b>3,620,504</b>	<b>100.0</b>	<b>100.0</b>	<b>100.0</b>
Yes	3,182	2,943,380	81.3	79.6	82.9
No	713	638,998	17.6	16.1	19.3
Missing <sup>2</sup>	38	38,126	1.1	0.7	1.7

<sup>1</sup>multiple responses, including all visits

<sup>2</sup>missing include those who "Don't know", "Refuse to answer" & "No answer"

**Table 3.8: Characteristics of out-patient healthcare utilisation**

Type of Facility / Characteristics	Government					Private				
	Count	Estimated Population	Column % (Proportion)	95% CI		Count	Estimated Population	Column % (Proportion)	95% CI	
			Lower	Upper				Lower	Upper	
<b>TOTAL (Overall)*</b>	2,006	1,642,757	100.0	100.0	100.0	1,897	1,945,199	100.0	100.0	100.0
<b>Frequency of visit (times of visit to same facility)</b>										
Once (1)	1,762	1,438,942	87.6	85.3	89.6	1,728	1,747,412	89.8	87.7	91.6
Twice (2)	112	91,084	5.5	4.3	7.2	91	116,191	6.0	4.5	7.9
More than twice (>2)	106	96,023	5.8	4.4	7.7	61	61,834	3.2	2.4	4.3
Missing <sup>1</sup>	26	16,708	1.0	0.6	1.7	17	19,762	1.0	0.6	1.8
<b>Travel time (minutes)</b>										
< 30 minutes	1,566	1,250,422	76.1	73.4	78.6	1,566	1,620,012	83.3	81.0	85.4
30 - 60 minutes	333	310,156	18.9	16.5	21.5	265	260,586	13.4	11.5	15.6
> 60 minutes	35	31,117	1.9	1.3	2.8	26	23,807	1.2	0.7	2.1
Missing <sup>1</sup>	72	51,062	3.1	2.3	4.1	40	40,794	2.1	1.5	2.9
<b>Distance to facility (km)</b>										
< 5km	838	659,857	40.2	37.3	43.1	799	851,147	43.8	40.9	46.6
5 - 10 km	567	475,002	28.9	26.4	31.6	520	557,830	28.7	26.2	31.3
> 10 km	328	286,549	17.4	15.1	20.1	362	329,264	16.9	14.9	19.2
Missing <sup>1</sup>	273	221,348	13.5	11.7	15.4	216	206,958	10.6	9.1	12.4
<b>Type of transport</b>										
Own car	1,024	827,226	50.4	47.4	53.3	1,342	1,352,301	69.5	66.7	72.2
Own motorcycle	536	426,607	26.0	23.4	28.7	260	261,251	13.4	11.6	15.5
Own bicycle	17	14,354	0.9	0.5	1.6	11	12,462	0.6	0.3	1.2
Own boat	2	3,129	0.2	0.0	0.8	2	1,648	0.1	0.0	0.4
Public transport	258	232,744	14.2	12.2	16.4	111	118,303	6.1	4.8	7.7
Walking	98	81,060	4.9	3.9	6.3	113	136,866	7.0	5.5	9.0
Ambulance	5	6,634	0.4	0.1	1.9	-	-	-	-	-
Missing <sup>1</sup>	66	51,004	3.1	2.3	4.2	58	62,368	3.2	2.4	4.4
<b>Recommend facility to others</b>										
Yes	1,661	1,333,232	81.2	78.8	83.3	1,350	1,347,756	69.3	66.5	71.9
No	315	273,510	16.6	14.5	19.0	507	556,627	28.6	26.0	31.4
Missing <sup>1</sup>	30	36,015	2.2	1.5	3.3	40	40,816	2.1	1.5	3.0

Note: Some cells have total count < 30. Results should be interpreted with caution

\*multiple responses (visits by same person)

\*total visits (n) = 3933, results above only include visits to government and private out-patient facilities, excluding 30 missing



**Table 3.9: Characteristics of out-patient healthcare facilities**

Type of Facility / Characteristics	Mean	95% CL		(±SD)	Median	(IQR)	Count	Estimated Population
		LL	UL					
<b>A-Frequency of visit (times of visit to same facility)</b>								
<b>Total (Overall)</b>	<b>1.24</b>	<b>1.21</b>	<b>1.28</b>	<b>1.21</b>	<b>1.0</b>	<b>1.0 - 1.0</b>	<b>3,860</b>	<b>3,551,486</b>
<b>Sector</b>								
Government facility	1.31	1.25	1.37	1.32	1.0	1.0 - 1.0	1,980	1,626,048
Private facility	1.19	1.15	1.23	0.85	1.0	1.0 - 1.0	1,880	1,925,437
<b>Location</b>								
Urban	1.26	1.21	1.31	1.20	1.0	1.0 - 1.0	2,181	2,523,081
Rural	1.20	1.16	1.24	0.79	1.0	1.0 - 1.0	1,679	1,028,405
<b>Region</b>								
Peninsular Malaysia	1.21	1.17	1.24	0.89	1.0	1.0 - 1.0	3,163	2,872,380
Sabah / Labuan	1.53	1.35	1.71	2.01	1.0	1.0 - 1.0	480	449,147
Sarawak	1.19	1.08	1.30	0.81	1.0	1.0 - 1.0	217	229,959
<b>B-Travel time to facility (minutes)</b>								
<b>Total (Overall)</b>	<b>16.91</b>	<b>16.34</b>	<b>17.47</b>	<b>17.75</b>	<b>10.0</b>	<b>7.0 - 20.0</b>	<b>3,791</b>	<b>3,496,100</b>
<b>Sector</b>								
Government facility	18.43	17.60	19.26	18.61	15.0	10.0 - 20.0	1,934	1,591,694
Private facility	15.64	14.87	16.40	16.90	10.0	5.0 - 20.0	1,857	1,904,406
<b>Location</b>								
Urban	15.56	14.91	16.21	15.34	10.0	5.0 - 20.0	2,139	2,481,737
Rural	20.20	19.12	21.27	22.25	15.0	10.0 - 15.0	1,652	1,014,363
<b>Region</b>								
Peninsular Malaysia	15.28	14.73	15.84	15.76	10.0	5.0 - 20.0	3,109	2,825,961
Sabah / Labuan	24.24	21.94	26.53	25.17	18.0	10.0 - 30.0	464	439,942
Sarawak	22.82	20.28	23.35	19.00	15.0	10.0 - 30.0	218	230,197
<b>C-Distance to facility (km)</b>								
<b>Total (Overall)</b>	<b>8.46</b>	<b>7.95</b>	<b>8.97</b>	<b>15.21</b>	<b>5.0</b>	<b>2.0 - 10.0</b>	<b>3,414</b>	<b>3,159,650</b>
<b>Sector</b>								
Government facility	8.66	7.95	9.38	15.24	5.0	2.0 - 10.0	1,733	1,421,409
Private facility	8.30	7.57	9.02	15.18	5.0	2.0 - 10.0	1,681	1,738,241
<b>Location</b>								
Urban	7.42	6.82	8.03	13.70	4.0	2.0 - 9.0	1,955	2,283,537
Rural	11.17	10.23	12.11	18.31	6.0	2.0 - 14.0	1,459	876,113
<b>Region</b>								
Peninsular Malaysia	8.16	7.60	8.72	15.26	5.0	2.0 - 10.0	2,836	2,587,822
Sabah / Labuan	9.79	8.19	11.38	15.86	6.0	2.0 - 11.6	382	366,854
Sarawak	9.91	8.06	11.76	13.14	5.0	2.0 - 10.0	196	204,974

Note: Any case with missing value was excluded from the analysis

\*SD=standard deviation, IQR=inter quartile range

Table 3.10: Travel time to out-patient healthcare facilities in the last 2 weeks

State	Less than 30 minutes				Between 30-60 minutes				More than 60 minutes						
	Count	Estimated Population	%	95% CI	Count	Estimated Population	%	95% CI	Count	Estimated Population	%	95% CI			
													LL	UL	LL
<b>Travel time to out-patient healthcare facilities in URBAN locations</b>															
<b>MALAYSIA</b>	<b>1,823</b>	<b>2,096,917</b>	<b>82.5</b>	<b>80.3</b>	<b>84.5</b>	<b>296</b>	<b>364,321</b>	<b>14.3</b>	<b>12.4</b>	<b>16.5</b>	<b>20</b>	<b>20,499</b>	<b>0.8</b>	<b>0.5</b>	<b>1.4</b>
Johor	205	282,133	85.4	80.0	89.5	33	43,371	13.1	9.2	18.4	2	2,717	0.8	0.2	3.3
Kedah	71	116,907	84.8	74.7	91.3	12	19,460	14.1	7.8	24.1	-	-	-	-	-
Kelantan	59	39,595	78.1	67.0	86.2	11	7,372	14.5	8.0	25.0	-	-	-	-	-
Melaka	90	79,024	89.8	80.0	95.1	6	5,874	6.7	2.7	15.3	1	1,989	2.3	0.3	14.4
Negeri Sembilan	119	97,894	88.6	79.7	93.9	12	11,587	10.5	5.3	19.5	2	785	0.7	0.2	2.8
Pahang	65	56,895	83.2	72.4	90.4	8	6,302	9.2	4.5	18.0	-	-	-	-	-
Penang	83	123,835	78.4	68.9	85.6	24	34,133	21.6	14.4	31.1	-	-	-	-	-
Perak	154	284,532	90.9	85.8	94.2	14	20,240	6.5	3.7	11.0	-	-	-	-	-
Perlis	82	13,038	89.8	80.7	94.9	8	1,204	8.3	3.8	17.2	-	-	-	-	-
Selangor	323	446,417	81.9	76.1	86.5	49	77,619	14.2	9.9	20.1	4	2,980	0.5	0.2	1.6
Terengganu	59	37,120	87.6	76.5	93.9	6	4,123	9.7	4.4	20.3	1	240	0.6	0.1	4.0
Sabah/Labuan	161	174,069	70.4	59.7	79.2	40	58,068	23.5	15.2	34.5	4	3,270	1.3	0.3	4.9
Sarawak	75	84,887	67.2	56.4	76.4	33	40,145	31.8	22.6	42.6	-	-	-	-	-
WP Kuala Lumpur	143	248,189	84.4	76.9	89.8	22	33,168	11.3	6.7	18.4	5	8,472	2.9	1.1	7.6
WP Putrajaya	134	12,381	87.0	80.2	91.8	18	1,657	11.6	7.1	18.5	1	46	0.3	0.0	2.3
Peninsular Malaysia	1,587	1,837,961	84.8	82.6	86.8	223	266,108	12.3	10.4	14.4	16	17,228	0.8	0.4	1.5
<b>Travel time to out-patient healthcare facilities in RURAL locations</b>															
<b>MALAYSIA</b>	<b>1,309</b>	<b>773,516</b>	<b>73.9</b>	<b>71.0</b>	<b>76.5</b>	<b>302</b>	<b>206,422</b>	<b>19.7</b>	<b>17.4</b>	<b>22.3</b>	<b>41</b>	<b>34,425</b>	<b>3.3</b>	<b>2.2</b>	<b>5.0</b>
Johor	112	107,240	69.5	61.3	76.7	44	40,197	26.1	19.4	34.0	4	2,488	1.6	0.6	4.4
Kedah	108	69,663	86.4	77.9	91.9	11	8,818	10.9	6.0	19.2	3	1,247	1.5	0.4	5.2
Kelantan	44	34,965	68.0	55.8	78.2	12	9,135	17.8	10.2	29.0	1	619	1.2	0.2	8.2
Melaka	125	16,621	84.5	77.0	89.8	19	2,228	11.3	6.9	18.0	-	-	-	-	-
Negeri Sembilan	120	51,743	83.3	75.5	89.0	19	7,937	12.8	7.8	20.2	4	1,607	2.6	0.9	7.4
Pahang	72	61,423	79.2	68.3	87.0	17	13,964	18.0	10.8	28.4	1	536	0.7	0.1	4.8
Penang	101	16,467	87.1	79.5	92.2	15	1,927	10.2	5.8	17.3	1	148	0.8	0.1	5.4
Perak	123	109,540	80.6	73.1	86.4	28	24,069	17.7	12.2	24.9	-	-	-	-	-
Perlis	67	10,840	89.9	80.7	95.0	5	807	6.7	2.7	15.5	-	-	-	-	-
Selangor	107	56,956	80.1	71.4	86.7	20	11,958	16.8	10.8	25.3	3	1,807	2.5	0.8	7.8
Terengganu	82	33,865	80.9	72.3	87.3	14	5,429	13.0	7.7	20.9	1	422	1.0	0.1	6.9
Sabah/Labuan	179	135,996	63.5	55.6	70.7	63	50,147	23.4	17.5	30.6	17	18,392	8.6	4.4	15.9
Sarawak	69	68,199	63.4	52.3	73.3	35	29,806	27.7	19.1	38.4	6	7,160	6.7	2.8	15.2
WP Kuala Lumpur	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
WP Putrajaya	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Peninsular Malaysia	1,061	569,321	78.5	75.6	81.1	204	126,469	17.4	15.0	20.1	18	8,873	1.2	0.7	2.0

Note: Some cells have respondent count &lt; 30. Results should be interpreted with caution. LL = Lower Limit, UL = Upper Limit

**Table 3.11: Distance to out-patient healthcare facilities in the last 2 weeks**

State	Less than 5 km					Between 5 – 10 km					More than 10 km				
	Count	Estimated Population	%	95% CI		Count	Estimated Population	%	95% CI		Count	Estimated Population	%	95% CI	
				LL	UL				LL	UL				LL	UL
<b>Distance to out-patient healthcare facilities in URBAN locations</b>															
<b>MALAYSIA</b>	<b>1,021</b>	<b>1,161,756</b>	<b>45.7</b>	<b>43.1</b>	<b>48.4</b>	<b>650</b>	<b>765,234</b>	<b>30.1</b>	<b>27.8</b>	<b>32.6</b>	<b>284</b>	<b>356,547</b>	<b>14.0</b>	<b>12.1</b>	<b>16.3</b>
Johor	119	164,389	49.8	43.1	56.5	68	94,876	28.7	23.0	35.2	39	47,187	14.3	10.4	19.3
Kedah	54	84,147	61.0	48.7	72.1	20	35,335	25.6	16.4	37.7	6	10,686	7.7	3.5	16.4
Kelantan	32	20,044	39.5	28.9	51.3	9	6,505	12.8	6.7	23.2	2	1,557	3.1	0.8	11.6
Melaka	38	30,381	34.5	25.3	45.1	39	35,833	40.7	30.6	51.7	12	12,441	14.1	7.8	24.3
Negeri Sembilan	64	57,371	51.9	42.1	61.6	50	40,967	37.1	28.1	47.1	19	11,928	10.8	6.3	18.0
Pahang	28	21,089	30.9	21.3	42.4	16	12,838	18.8	11.4	29.4	13	13,614	19.9	10.4	34.8
Penang	56	79,822	50.5	40.2	60.8	34	51,937	32.9	23.7	43.6	7	9,709	6.1	2.9	12.8
Perak	83	155,439	49.6	41.4	57.9	57	104,120	33.3	26.0	41.4	21	34,364	11.0	7.1	16.7
Perlis	65	10,409	71.7	60.6	80.6	13	2,249	15.5	8.8	25.8	10	1,350	9.3	4.7	17.4
Selangor	176	246,025	45.1	39.7	50.7	115	155,848	28.6	24.0	33.6	66	97,565	17.9	13.3	23.7
Terengganu	31	19,060	45.0	32.9	57.7	6	4,658	11.0	5.0	22.5	5	1,394	3.3	1.2	8.8
Sabah/Labuan	77	92,435	37.4	27.6	48.3	78	69,225	28.0	20.3	37.3	29	58,006	23.5	14.5	35.6
Sarawak	40	47,101	37.3	27.8	47.8	44	48,053	38.0	28.5	48.6	10	13,913	11.0	5.6	20.6
WP Kuala Lumpur	70	125,852	42.8	33.8	52.3	61	99,227	33.8	25.9	42.7	23	40,767	13.9	8.5	21.9
WP Putrajaya	88	8,193	57.6	49.1	65.7	40	3,563	25.0	18.6	32.9	22	2,067	14.5	9.3	22.0
Peninsular Malaysia	904	1,022,221	47.2	44.4	50.0	528	647,956	29.9	27.4	32.5	245	284,628	13.1	11.2	15.3
<b>Distance to out-patient healthcare facilities in RURAL locations</b>															
<b>MALAYSIA</b>	<b>616</b>	<b>349,248</b>	<b>33.3</b>	<b>30.6</b>	<b>36.2</b>	<b>437</b>	<b>267,598</b>	<b>25.6</b>	<b>23.0</b>	<b>28.3</b>	<b>406</b>	<b>259,266</b>	<b>24.8</b>	<b>22.3</b>	<b>27.4</b>
Johor	42	43,195	28.0	20.2	37.4	46	44,759	29.0	21.9	37.4	55	48,040	31.2	24.0	39.3
Kedah	52	34,402	42.7	33.7	52.1	43	27,204	33.7	25.5	43.1	19	13,792	17.1	10.8	25.9
Kelantan	25	19,180	37.3	26.4	49.7	6	4,878	9.5	4.3	19.8	9	6,648	12.9	6.8	23.3
Melaka	57	6,815	34.6	26.9	43.2	41	6,213	31.6	23.4	41.1	28	3,540	18.0	12.1	25.9
Negeri Sembilan	68	29,903	48.1	39.3	57.1	32	12,849	20.7	14.5	28.6	35	16,345	26.3	18.9	35.3
Pahang	37	29,768	38.4	28.2	49.7	21	21,706	28.0	18.2	40.3	17	10,252	13.2	7.9	21.4
Penang	62	10,195	53.9	43.9	63.6	33	5,327	28.2	20.3	37.7	18	2,273	12.0	7.2	19.3
Perak	38	33,328	24.5	17.9	32.7	54	48,037	35.3	27.6	43.9	50	44,275	32.6	25.1	41.0
Perlis	33	5,444	45.1	33.8	57.0	20	3,101	25.7	16.9	37.1	18	3,037	25.2	16.2	36.9
Selangor	46	24,779	34.9	26.5	44.2	39	21,636	30.4	22.6	39.6	40	22,225	31.3	23.3	40.5
Terengganu	21	9,259	22.1	14.7	31.8	35	12,849	30.7	22.5	40.3	19	7,762	18.5	12.0	27.5
Sabah/Labuan	89	62,266	29.1	23.1	35.8	52	39,862	18.6	13.4	25.2	57	45,061	21.0	15.3	28.2
Sarawak	46	40,715	37.9	28.0	48.8	15	19,176	17.8	9.7	30.4	41	36,017	33.5	24.3	44.2
WP Kuala Lumpur	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
WP Putrajaya	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Peninsular Malaysia	481	246,268	33.9	30.8	37.2	370	208,561	28.7	25.8	31.9	308	178,189	24.6	21.9	27.5

Note: Some cells have respondent count  $\geq 30$ . Results should be interpreted with caution. LL = Lower Limit, UL = Upper Limit

**Table 3.12: Pregnant in the last 12 months**

	Count	Estimated Population	(%) Proportion	95% CI	
				Lower	Upper
<b>TOTAL (Overall)</b>	28,498	27,278,956	100.0	100.0	100.0
Yes	<b>822</b>	<b>862,207</b>	3.2	2.9	3.4
No	6,991	6,976,333	25.6	24.9	26.2
Missing <sup>1</sup>	68	73,798	0.3	0.2	0.4
Not Applicable*	20,617	19,366,619	71.0	70.3	71.7

\*This question only applicable to WOMEN who AGED between 13 – 49 YEARS old

<sup>1</sup>missing include those who "Don't know", "Refuse to answer" & "No answer"

**Table 3.13: Utilisation of antenatal care**

	Count	Estimated Population	(%) Proportion	95% CI	
				Lower	Upper
<b>TOTAL (Overall)</b>	822	862,207	100.0	100.0	100.0
Yes	<b>774</b>	<b>809,633</b>	93.9	91.4	95.7
No	46	51,333	6.0	4.2	8.4
Missing <sup>1</sup>	2	1,241	0.1	0.0	0.6

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

<sup>1</sup>missing include those who "Don't know", "Refuse to answer" & "No answer"

**Table 3.14: Place of antenatal care utilisation**

	Count	Estimated Population	(%) Proportion	95% CI	
				Lower	Upper
<b>TOTAL (Overall)</b>	774	809,633	100.0	100.0	100.0
Government clinic	<b>635</b>	<b>635,161</b>	78.5	74.5	82.0
Private clinic	136	170,887	21.1	17.6	25.1
Traditional or complementary medicine	1	160	0.0	0.0	0.1
Missing <sup>1</sup>	2	3,425	0.4	0.1	1.8

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

<sup>1</sup>missing include those who "Don't know", "Refuse to answer" & "No answer"

### 3.6.2 Utilisation of Out-patient Healthcare Among Those Who Reported Ill

**Table 3.15: Utilisation of out-patient healthcare among those who reported ill, in the last 2 weeks**

	Count	Estimated Population	(%) Proportion	95% CI	
				Lower	Upper
<b>TOTAL (Overall)</b>	9,391	9,040,452	100.0	100.0	100.0
Yes	<b>2,971</b>	<b>2,758,735</b>	30.5	29.3	31.7
No	6,399	6,265,443	69.3	68.1	70.5
Missing	21	16,274	0.2	0.1	0.3

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

**Table 3.16: Prevalence of out-patient healthcare utilisation among those who reported ill in the last 2 weeks by socio-demographic characteristics**

Socio-demographic characteristics	n	Estimated Population	% (Prevalence)	95% CI	
				Lower	Upper
<b>MALAYSIA (Overall)</b>	<b>9,391</b>	<b>9,040,452</b>	30.5	29.3	31.7
<b>State</b>					
Johor	1,098	1,400,206	26.8	24.0	29.7
Kedah	511	550,428	30.4	25.9	35.3
Kelantan	291	221,772	30.0	24.9	35.6
Melaka	552	253,737	28.1	23.0	33.8
Negeri Sembilan	479	290,558	43.4	38.1	48.9
Pahang	438	365,845	27.2	22.8	32.1
Penang	382	273,024	50.4	42.6	58.1
Perak	673	929,912	40.7	36.4	45.2
Perlis	358	57,829	36.4	31.1	42.0
Selangor	1,284	1,541,439	29.1	26.4	31.9
Terengganu	384	212,013	28.3	23.8	33.2
Sabah/Labuan	1,400	1,384,348	27.1	23.9	30.6
Sarawak	628	729,985	24.1	20.4	28.2
WP Kuala Lumpur	453	788,807	30.8	25.9	36.1
WP Putrajaya	460	40,549	30.9	26.5	35.7
<b>Location</b>					
Urban	5,328	6,272,615	31.1	29.6	32.7
Rural	4,063	2,767,837	29.2	27.5	30.9
<b>Sex</b>					
Male	4,213	4,267,222	30.7	28.9	32.5
Female	5,178	4,773,230	30.3	28.7	32.0
<b>Age Group (years)</b>					
0 - 4	964	835,139	56.8	53.0	60.6
5 - 9	844	771,234	40.8	36.7	45.0
10 - 14	786	713,138	25.9	22.1	30.1
15 - 19	900	1,033,382	18.0	14.9	21.4
20 - 24	792	1,003,398	24.6	20.5	29.2
25 - 29	741	867,401	25.9	22.0	30.2
30 - 34	663	720,386	30.1	26.1	34.4
35 - 39	565	558,827	28.5	24.2	33.3
40 - 44	615	566,226	29.6	25.3	34.2
45 - 49	619	539,676	28.6	24.1	33.6
50 - 54	545	431,499	27.1	22.7	31.9
55 - 59	453	318,545	29.7	24.7	35.1
60 - 64	311	247,266	25.7	20.4	31.8
65 - 69	188	150,325	31.6	23.6	40.9
70 - 74	186	118,598	29.9	22.4	38.6
75+	219	165,411	43.5	35.5	51.9

Socio-demographic characteristics	n	Estimated Population	% (Prevalence)	95% CI	
				Lower	Upper
<b>MALAYSIA (Overall)</b>	<b>9,391</b>	<b>9,040,452</b>	<b>30.5</b>	<b>29.3</b>	<b>31.7</b>
<b><i>Ethnicity</i></b>					
Malay	5,573	4,853,433	31.2	29.7	32.7
Chinese	1,285	1,611,081	29.0	26.1	32.1
Indian	812	729,162	37.6	33.2	42.2
Other Bumiputeras	1,232	1,375,228	28.2	24.9	31.7
Others	489	471,547	24.6	18.8	31.4
<b><i>Marital Status<sup>1</sup></i></b>					
Single	2,405	2,712,008	21.6	19.4	23.9
Married	4,213	3,924,492	29.0	27.3	30.8
Widow/Widower/Divorce	523	387,823	33.4	28.6	38.6
<b><i>Education Level</i></b>					
No formal education	555	427,752	29.1	24.7	33.9
Primary	2,492	2,215,594	27.3	25.2	29.6
Secondary	3,158	3,230,969	26.4	24.4	28.5
Tertiary	1,409	1,534,011	27.9	25.0	31.0
Unclassified education	462	481,629	27.7	22.7	33.2
N/A	1,315	1,150,496	53.3	50.0	56.6
<b><i>Occupation<sup>1</sup></i></b>					
Government & semi government	812	669,646	27.6	23.7	31.8
Private	2,024	2,396,544	30.2	27.7	32.8
Self employed	1,094	1,012,221	23.8	20.4	27.5
Unpaid worker/home maker	1,121	1,000,604	25.2	22.3	28.3
Retiree	583	447,706	31.1	26.6	35.9
<b><i>Household Household Income (RM)</i></b>					
Less than RM400	659	597,224	30.6	26.5	35.1
RM400 – RM499	126	116,248	37.2	27.1	48.7
RM500 – RM699	378	334,158	28.6	23.3	34.7
RM700 – RM999	579	531,537	31.7	27.3	36.6
RM1000 – RM1999	1,812	1,627,326	30.8	27.9	33.8
RM2000 – RM2999	1,651	1,594,030	30.5	27.7	33.5
RM3000 – RM3999	1,247	1,253,520	32.4	29.3	35.7
RM4000 – RM4999	860	893,903	29.7	26.1	33.6
RM5000 and above	2,079	2,092,504	29.1	26.6	31.8

<sup>1</sup>not including "missing"

**Table 3.17: Proportion of out-patient healthcare utilisation among those who reported ill in the last 2 weeks by time of last visit**

Last experience (months)	Count	Estimated Population	(%) Proportion	95% CI	
				Lower	Upper
<b>TOTAL (Overall)</b>	9,391	9,040,452	100.0	100.0	100.0
Within last 2 weeks	<b>2,971</b>	<b>2,758,735</b>	30.5	29.3	31.7
0 months	206	227,660	2.5	2.1	3.0
1 month	930	828,951	9.2	8.5	9.9
2 months	615	591,831	6.5	5.9	7.2
3 – 5 months	887	830,588	9.2	8.5	10.0
6 – 12 months	1,100	1,125,809	12.5	11.6	13.4
> 12 – 24 months	368	388,300	4.3	3.7	5.0
> 24 – 36 months	74	72,155	0.8	0.6	1.1
> 36 – 48 months	21	18,415	0.2	0.1	0.3
> 48 – 60 months	34	36,838	0.4	0.3	0.6
> 60 months	35	35,052	0.4	0.3	0.6
No past history	1,392	1,416,279	15.7	14.7	16.6
Missing <sup>1</sup>	758	709,840	7.9	7.2	8.6

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

<sup>1</sup>missing include those who "Don't know", "Refuse to answer" & "No answer"

**Table 3.18: Proportion of out-patient healthcare utilisation among those who reported ill in the last 2 weeks by number of health care facilities visited**

Number of places visited	Count	Estimated Population	(%) Proportion	95% CI	
				Lower	Upper
<b>TOTAL (Overall)</b>	2,971	2,758,735	100.0	100.0	100.0
1 place	2,796	2,597,224	94.1	93.0	95.1
2 places	136	127,540	4.6	3.7	5.7
3 places	16	16,279	0.6	0.3	1.1
Missing <sup>1</sup>	23	17,692	0.6	0.4	1.0

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

<sup>1</sup>missing include those who "Don't know", "Refuse to answer" & "No answer"

**Table 3.19: Proportion of out-patient healthcare utilisation among those who reported ill in the last 2 weeks by sectors**

Type / State / Location	n	Estimated Population	Government			Private		
			Row % Proportion	95% CI Lower Upper		Row % Proportion	95% CI Lower Upper	
<b>MALAYSIA*</b>	3,122	2,902,979	43.4	41.2	45.6	56.6	54.4	58.8
<b>State</b>								
Johor	339	405,442	36.5	31.1	42.4	63.5	57.6	68.9
Kedah	166	173,263	49.2	40.1	58.3	50.8	41.7	59.9
Kelantan	91	67,922	62.2	52.8	70.9	37.8	29.1	47.2
Melaka	181	75,582	45.8	35.7	56.4	54.2	43.6	64.3
Negeri Sembilan	201	129,955	54.7	46.2	62.9	45.3	37.1	53.8
Pahang	118	103,563	58.3	48.7	67.2	41.7	32.8	51.3
Penang	190	144,533	48.2	38.1	58.5	51.8	41.5	61.9
Perak	294	408,382	45.7	39.1	52.4	54.3	47.6	60.9
Perlis	131	21,524	61.3	51.9	69.9	38.7	30.1	48.1
Selangor	414	480,670	25.5	21.3	30.1	74.5	69.9	78.7
Terengganu	123	60,567	44.9	36.0	54.1	55.1	45.9	64.0
Sabah/Labuan	424	387,032	51.8	44.7	58.8	48.2	41.2	55.3
Sarawak	162	176,823	57.7	49.3	65.7	42.3	34.3	50.7
WP Kuala Lumpur	147	254,476	35.5	26.8	45.2	64.5	54.8	73.2
WP Putrajaya	141	13,245	47.2	38.6	56.0	52.8	44.0	61.4
<b>Location</b>								
Urban	1,761	2,054,746	38.3	35.5	41.2	61.7	58.8	64.5
Rural	1,361	848,233	55.7	52.4	58.9	44.3	41.1	47.6

\*multiple responses (visits by same person)

\*total visits (n) = 3142, results above only include visits to government and private out-patient facilities, excluding 20 missing



**Table 3.20: Proportion of out-patient healthcare utilisation among those who reported ill in the last 2 weeks by utilisation characteristics by sectors**

Type of Facility / Characteristics	Government					Private				
	Count	Estimated Population	Column % Proportion	95% CI		Count	Estimated Population	Column % Proportion	95% CI	
				Lower	Upper				Lower	Upper
<b>TOTAL (Overall)</b> <sup>a,b</sup>	1,512	1,259,561	100.0	100.0	100.0	1,610	1,643,418	100.0	100.0	100.0
<b>Frequency of visit (times of visit to same facility)</b>										
Once (1)	1,346	1,121,472	89.0	86.7	91.0	1,463	1,472,053	89.6	87.2	91.6
Twice (2)	82	69,228	5.5	4.0	7.4	79	104,127	6.3	4.7	8.5
More than twice (>2)	62	54,964	4.4	3.2	6.0	52	48,794	3.0	2.1	4.1
Missing <sup>1</sup>	22	13,897	1.1	0.6	2.0	16	18,444	1.1	0.6	2.0
<b>Travel time (minutes)</b>										
< 30 minutes	1,192	969,165	76.9	74.1	79.6	1,325	1,365,670	83.1	80.5	85.4
30 - 60 minutes	243	229,294	18.2	15.8	20.9	232	226,928	13.8	11.7	16.3
> 60 minutes	22	19,413	1.5	0.9	2.6	20	17,235	1.0	0.6	1.9
Missing <sup>1</sup>	55	41,688	3.3	2.4	4.5	33	33,586	2.0	1.4	3.0
<b>Distance to facility (km)</b>										
< 5km	633	503,516	40.0	36.7	43.3	669	722,287	44.0	40.9	47.1
5 - 10 km	438	373,178	29.6	26.7	32.8	443	467,960	28.5	25.8	31.3
> 10 km	242	213,870	17.0	14.5	19.8	308	273,605	16.6	14.4	19.1
Missing <sup>1</sup>	199	168,997	13.4	11.4	15.7	190	179,566	10.9	9.3	12.8
<b>TOTAL (Overall)</b> <sup>a,b</sup>	1,512	1,259,561	100.0	100.0	100.0	1,610	1,643,418	100.0	100.0	100.0
<b>Type of transport</b>										
Own car	772	619,668	49.2	45.9	52.5	1,137	1,139,613	69.3	66.3	72.2
Own motorcycle	398	330,733	26.3	23.3	29.4	211	210,064	12.8	10.8	15.0
Own bicycle	12	11,456	0.9	0.4	1.9	11	12,462	0.8	0.4	1.4
Own boat	2	3,129	0.2	0.1	1.0	2	1,648	0.1	0.0	0.5
Public transport	191	184,083	14.6	12.3	17.2	100	104,960	6.4	5.0	8.2
Walking	82	69,464	5.5	4.2	7.2	102	124,384	7.6	5.8	9.8
Ambulance	4	1,437	0.1	0.0	0.4	-	-	-	-	-
Missing <sup>1</sup>	51	39,590	3.1	2.3	4.4	47	50,288	3.1	2.2	4.3
<b>Recommendation</b>										
Yes	1,250	1,004,979	79.8	76.9	82.4	1,140	1,138,205	69.3	66.3	72.1
No	236	222,387	17.7	15.1	20.5	434	468,751	28.5	25.7	31.5
Missing <sup>1</sup>	26	32,194	2.6	1.7	3.9	36	36,462	2.2	1.5	3.2

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

<sup>a</sup> multiple responses (visits by same person); <sup>b</sup> total visits (n) = 3142 inclusive of visits to government and private facilities, excluding 20 missing;

<sup>1</sup> missing include those who "Don't know", "Refuse to answer" & "No answer"

**Table 3.21: Mean utilisation of healthcare among those who reported ill in the last 2 weeks by utilisation characteristics by sectors**

Type of Facility / Characteristics	Mean	(±SD)	Median	(IQR)	Count	Estimated Population
<b>Frequency of visit (times of visit to same facility)</b>						
<b>Total (Overall)</b>	1.18	0.72	1.0	1.0 - 1.0	3,084	2,870,637
Government facility	1.20	0.76	1.0	1.0 - 1.0	1,490	1,245,664
Private facility	1.17	0.68	1.0	1.0 - 1.0	1,594	1,624,974
<b>Travel time to facility (minutes)</b>						
<b>Total (Overall)</b>	16.60	16.90	10.0	7.0 - 20.0	3,034	2,827,705
Government facility	18.00	17.42	15.0	10.0 - 20.0	1,457	1,217,873
Private facility	15.55	16.43	10.0	5.0 - 20.0	1,577	1,609,832
<b>Distance to facility (km)</b>						
<b>Total (Overall)</b>	8.25	14.52	5.0	2.0 - 10.0	2,733	2,554,415
Government facility	8.39	14.41	5.0	2.0 - 10.0	1,313	1,090,563
Private facility	8.13	14.61	5.0	2.0 - 10.0	1,420	1,463,852

Note: Cases with missing value were excluded from the analysis

\*SD=standard deviation, IQR=inter quartile range

### 3.6.3 Utilisation of In-patient Healthcare (Hospitalisation) Among Total Population

**Table 3.22: Hospitalisation in the last 12 months**

	Count	Estimated Population	(% Proportion	95% CI	
				Lower	Upper
<b>TOTAL (Overall)</b>	28,498	27,278,956	100.0	100.0	100.0
<b>YES</b>	<b>1,946</b>	<b>1,872,949</b>	6.9	6.4	7.3
No	26,496	25,353,387	92.9	92.5	93.4
Missing	56	52,620	0.2	0.1	0.3

95% CI = 95% Confidence Interval

**Table 3.23: Prevalence of hospitalisation (by socio-demographic characteristics)**

Socio-demographic characteristics	n	Estimated Population	% (Prevalence)	95% CI	
				Lower	Upper
<b>MALAYSIA (Overall)</b>	28,498	27,278,956	6.9	6.5	7.3
<b>State</b>					
Johor	2,469	3,198,775	7.4	6.3	8.6
Kedah	1,700	1,836,622	5.7	4.4	7.2
Kelantan	1,896	1,467,639	4.2	3.3	5.2
Melaka	1,600	788,972	8.5	6.9	10.6
Negeri Sembilan	1,529	975,602	9.7	8.1	11.7
Pahang	1,641	1,387,621	6.3	4.9	8.0
Penang	1,788	1,527,315	10.2	8.2	12.7
Perak	1,599	2,243,870	6.8	5.3	8.6
Perlis	1,424	217,069	5.7	4.5	7.2
Selangor	4,101	5,398,672	7.7	6.8	8.6
Terengganu	1,846	1,012,044	5.5	4.5	6.8
Sabah/Labuan	3,208	3,217,431	6.2	5.2	7.5
Sarawak	1,962	2,316,783	4.7	3.8	6.0
WP Kuala Lumpur	911	1,620,013	7.2	5.6	9.3
WP Putrajaya	824	70,529	5.5	4.1	7.5
<b>Location</b>					
Urban	16,372	19,496,298	7.1	6.6	7.6
Rural	12,126	7,782,659	6.3	5.8	6.9
<b>Sex</b>					
Male	13,757	13,959,955	5.3	4.8	5.8
Female	14,741	13,319,001	8.5	7.9	9.1
<b>Age Group (years)</b>					
0 - 4	2,772	2,366,121	10.2	8.7	11.8
5 - 9	2,904	2,596,837	3.1	2.5	3.9
10 - 14	2,926	2,639,932	2.5	1.9	3.2
15 - 19	2,450	2,746,005	4.5	3.5	5.8
20 - 24	2,108	2,712,661	5.8	4.6	7.2
25 - 29	2,101	2,605,575	10.6	9.0	12.4
30 - 34	1,885	2,065,596	10.2	8.7	11.9
35 - 39	1,799	1,844,496	7.3	6.0	8.8
40 - 44	1,844	1,725,055	6.4	5.1	7.9
45 - 49	1,801	1,570,079	6.6	5.2	8.2
50 - 54	1,681	1,313,353	5.7	4.5	7.2
55 - 59	1,463	1,027,597	6.3	5.0	7.9
60 - 64	997	772,562	9.6	7.3	12.6
65 - 69	673	499,048	10.7	8.0	14.4
70 - 74	538	368,196	9.1	6.7	12.2
75+	556	425,843	17.0	13.1	21.9

Socio-demographic characteristics	n	Estimated Population	% (Prevalence)	95% CI	
				Lower	Upper
<b>MALAYSIA (Overall)</b>	28,498	27,278,956	6.9	6.5	7.3
<b>Ethnicity</b>					
Malay	16,975	14,253,318	7.2	6.8	7.7
Chinese	4,944	6,332,970	5.7	4.9	6.6
Indian	2,122	1,834,300	10.4	8.8	12.4
Other Bumiputeras	2,933	3,300,636	6.8	5.7	8.1
Others	1,524	1,557,733	4.1	2.8	6.0
<b>Marital Status<sup>1</sup></b>					
Single	6,983	7,908,495	3.7	3.2	4.3
Married	12,537	11,676,560	9.4	8.8	10.1
Widow/Widower/Divorce	1,470	1,072,354	11.0	9.0	13.2
<b>Education Level<sup>1</sup></b>					
No formal education	1,559	1,218,847	7.0	5.7	8.7
Primary	8,065	7,159,469	5.6	4.9	6.2
Secondary	9,485	9,704,547	7.7	7.0	8.5
Tertiary	3,873	4,255,316	7.6	6.7	8.7
Unclassified education	1,675	1,627,575	2.7	2.0	3.7
N/A	3,841	3,313,202	8.2	7.1	9.4
<b>Occupation<sup>1</sup></b>					
Government/ Semi-government	2,148	1,811,075	9.1	7.7	10.8
Private	5,843	7,001,658	6.3	5.6	7.2
Self employed	3,686	3,358,458	4.5	3.7	5.5
Unpaid worker/homemaker	3,224	2,758,938	13.3	11.9	15.0
Retiree	1,738	1,330,270	11.2	9.3	13.5
<b>Household Income Group (RM)</b>					
Less than RM400	2,166	2,016,214	6.8	5.5	8.4
RM400 – RM499	448	415,901	7.2	4.8	10.8
RM500 – RM699	1,141	941,916	6.5	5.0	8.5
RM700 – RM999	1,865	1,655,090	5.2	4.2	6.5
RM1000 – RM1999	5,927	5,096,306	6.6	5.8	7.4
RM2000 – RM2999	4,797	4,593,572	7.2	6.3	8.2
RM3000 – RM3999	3,704	3,688,019	6.8	5.8	8.0
RM4000 – RM4999	2,484	2,659,738	8.2	6.9	9.7
RM5000 and above	5,966	6,212,201	6.8	6.1	7.7

<sup>1</sup>not including "missing"

**Table 3.24: Last in-patient healthcare utilization (admission to hospital)**

Last experience (years)	Count	Estimated Population	%	95% CI	
				Lower	Upper
<b>TOTAL (Overall)</b>	28,498	27,278,956	100.0	100.0	100.0
Within 1 year	<b>1,946</b>	1,872,949	6.9	6.4	7.3
1 - 5 years	4,205	4,073,163	14.9	14.4	15.5
1 - 2 years	1,305	1,245,930	4.6	4.3	4.9
2 - 3 years	1,464	1,420,223	5.2	4.9	5.5
3 - 5 years	1,436	1,407,010	5.2	4.8	5.5
> 5 years	5,832	5,329,542	19.5	19.0	20.1
Not being admitted	16,248	15,732,822	57.7	56.9	58.4
Missing <sup>1</sup>	267	270,480	1.0	0.8	1.2

<sup>1</sup>missing include those who "Don't know", "Refuse to answer" & "No answer"

**Table 3.25: Place of hospitalisation - total number of in-patient healthcare facilities utilised**

Number of places visited	Count	Estimated Population	(%)	95% CI	
				Lower	Upper
<b>TOTAL (Overall)</b>	1,946	1,872,949	100.0	100.0	100.0
1 place	1,841	1,774,834	94.8	93.3	95.9
2 places	72	62,061	3.3	2.5	4.4
3 places	11	8,600	0.5	0.2	0.9
Missing <sup>1</sup>	22	27,454	1.5	0.8	2.6

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

<sup>1</sup>missing include those who "Don't know", "Refuse to answer" & "No answer"

**Table 3.26: Proportion of hospitalisation by sector**

Type / State / Location	n	Estimated Population	Government			Private		
			Row % (Proportion)	95% CI		Row % (Proportion)	95% CI	
				Lower	Upper		Lower	Upper
<b>MALAYSIA*</b>	2,014	1,920,735	72.2	69.6	74.6	27.8	25.4	30.4
<b>State</b>								
Johor	190	242,215	78.6	71.6	84.3	21.4	15.7	28.4
Kedah	99	103,022	75.7	62.5	85.3	24.3	14.7	37.5
Kelantan	78	61,374	92.4	83.2	96.7	7.6	3.3	16.8
Melaka	148	67,561	75.9	65.0	84.3	24.1	15.7	35.0
Negeri Sembilan	156	99,990	71.5	62.2	79.3	28.5	20.7	37.8
Pahang	95	91,029	68.0	53.7	79.5	32.0	20.5	46.3
Penang	157	158,264	38.0	28.3	48.8	62.0	51.2	71.7
Perak	129	157,803	74.6	62.7	83.8	25.4	16.2	37.3
Perlis	78	12,019	89.5	81.1	94.4	10.5	5.6	18.9
Selangor	334	423,024	57.9	51.9	63.6	42.1	36.4	48.1
Terengganu	106	56,800	88.9	79.9	94.1	11.1	5.9	20.1
Sabah/Labuan	209	211,765	93.4	86.8	96.8	6.6	3.2	13.2
Sarawak	109	115,706	90.6	84.1	94.7	9.4	5.3	15.9
WP Kuala Lumpur	74	115,885	74.8	62.3	84.2	25.2	15.8	37.7
WP Putrajaya	52	4,279	75.4	59.6	86.4	24.6	13.6	40.4
<b>Location</b>								
Urban	1,146	1,395,403	65.1	61.7	68.3	34.9	31.7	38.3
Rural	868	525,333	91.1	89.0	92.8	8.9	7.2	11.0

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

\*multiple responses (visits by same person)

\*total visits (n) = 2096, include visits to government and private in-patient care facilities, excluding 82 missing

Table 3.27: Annual mean visit for hospitalisation (in-patient care) - (by socio-demographic characteristics and by sector)

Socio-demographic characteristics	n	Estimated Population	TOTAL				Government				Private			
			Mean visits	95% CI Lower	95% CI Upper	Mean visits	95% CI Lower	95% CI Upper	Mean visits	95% CI Lower	95% CI Upper			
<b>MALAYSIA (Overall)</b>	<b>28,498</b>	<b>27,278,956</b>	0.086	0.080	0.091	0.064	0.059	0.068	0.022	0.019	0.025			
<b>State</b>														
Johor	2,469	3,198,775	0.089	0.073	0.105	0.069	0.056	0.083	0.020	0.011	0.028			
Kedah	1,700	1,836,622	0.071	0.047	0.094	0.052	0.032	0.073	0.018	0.007	0.030			
Kelantan	1,896	1,467,639	0.046	0.035	0.058	0.043	0.032	0.054	0.003	0.000	0.006			
Melaka	1,600	788,972	0.098	0.075	0.121	0.073	0.054	0.092	0.025	0.012	0.038			
Negeri Sembilan	1,529	975,602	0.118	0.094	0.142	0.087	0.066	0.109	0.031	0.019	0.042			
Pahang	1,641	1,387,621	0.074	0.054	0.093	0.051	0.035	0.067	0.023	0.010	0.035			
Penang	1,788	1,527,315	0.128	0.098	0.159	0.053	0.034	0.073	0.075	0.051	0.100			
Perak	1,599	2,243,870	0.090	0.067	0.113	0.072	0.051	0.093	0.018	0.009	0.028			
Perlis	1,424	217,069	0.069	0.051	0.086	0.063	0.045	0.080	0.006	0.002	0.009			
Selangor	4,101	5,398,672	0.091	0.079	0.103	0.055	0.045	0.065	0.036	0.029	0.042			
Terengganu	1,846	1,012,044	0.067	0.051	0.083	0.061	0.045	0.076	0.006	0.002	0.010			
Sabah/Labuan	3,208	3,217,431	0.084	0.066	0.102	0.080	0.062	0.097	0.004	0.001	0.008			
Sarawak	1,962	2,316,783	0.070	0.051	0.090	0.064	0.045	0.083	0.006	0.002	0.011			
WP Kuala Lumpur	911	1,620,013	0.092	0.063	0.122	0.070	0.044	0.096	0.022	0.010	0.035			
WP Putrajaya	824	70,529	0.072	0.048	0.096	0.056	0.034	0.078	0.016	0.006	0.026			
Peninsular Malaysia	23,328	21,744,743	0.088	0.081	0.094	0.061	0.056	0.066	0.026	0.023	0.030			
<b>Location</b>														
Urban	16,372	19,496,298	0.085	0.079	0.092	0.057	0.051	0.063	0.028	0.024	0.032			
Rural	12,126	7,782,659	0.087	0.077	0.097	0.080	0.070	0.089	0.007	0.005	0.009			
<b>Sex</b>														
Male	13,757	13,959,955	0.069	0.061	0.076	0.051	0.044	0.057	0.018	0.014	0.021			
Female	14,741	13,319,001	0.104	0.095	0.112	0.077	0.070	0.084	0.027	0.022	0.031			
<b>Age Group (years)</b>														
0 - 4	2,772	2,366,121	0.120	0.100	0.139	0.079	0.064	0.095	0.040	0.028	0.053			
5 - 9	2,904	2,596,837	0.046	0.032	0.060	0.035	0.023	0.047	0.011	0.003	0.019			
10 - 14	2,926	2,639,932	0.034	0.020	0.048	0.026	0.013	0.039	0.008	0.003	0.013			
15 - 19	2,450	2,746,005	0.052	0.039	0.065	0.043	0.031	0.056	0.009	0.004	0.014			
20 - 24	2,108	2,712,661	0.063	0.049	0.078	0.049	0.036	0.061	0.014	0.007	0.021			
25 - 29	2,101	2,605,575	0.129	0.105	0.153	0.095	0.075	0.115	0.034	0.020	0.047			
30 - 34	1,885	2,065,596	0.118	0.096	0.141	0.087	0.067	0.107	0.031	0.021	0.041			

Socio-demographic characteristics	n	Estimated Population	TOTAL				Government				Private											
			Mean visits	95% CI		Mean visits	95% CI		Mean visits	95% CI		Mean visits	95% CI									
				Lower	Upper		Lower	Upper		Lower	Upper		Lower	Upper								
<b>MALAYSIA (Overall)</b>	<b>28,498</b>	<b>27,278,956</b>	0.086	0.080	0.091	0.064	0.059	0.068	0.022	0.019	0.025	0.086	0.080	0.091	0.064	0.059	0.068	0.022	0.019	0.025		
35 - 39	1,799	1,844,496	0.085	0.066	0.103	0.054	0.039	0.068	0.031	0.020	0.042	0.080	0.059	0.101	0.051	0.033	0.070	0.029	0.018	0.040		
40 - 44	1,844	1,725,055	0.080	0.059	0.101	0.062	0.039	0.086	0.032	0.016	0.047	0.094	0.066	0.122	0.055	0.037	0.073	0.019	0.009	0.028		
45 - 49	1,801	1,570,079	0.074	0.053	0.094	0.079	0.056	0.102	0.010	0.003	0.016	1,681	1,313,353	0.074	0.053	0.094	0.079	0.056	0.102	0.010	0.003	0.016
50 - 54	1,681	1,313,353	0.089	0.064	0.113	0.128	0.069	0.187	0.013	0.001	0.025	1,463	1,027,597	0.089	0.064	0.113	0.128	0.069	0.187	0.013	0.001	0.025
55 - 59	1,463	1,027,597	0.141	0.081	0.201	0.106	0.068	0.144	0.021	0.005	0.037	997	772,562	0.141	0.081	0.201	0.106	0.068	0.144	0.021	0.005	0.037
60 - 64	997	772,562	0.128	0.087	0.168	0.156	0.106	0.165	0.037	0.005	0.069	673	499,048	0.128	0.087	0.168	0.156	0.106	0.165	0.037	0.005	0.069
65 - 69	673	499,048	0.156	0.100	0.213	0.218	0.119	0.165	0.037	0.005	0.069	538	368,196	0.156	0.100	0.213	0.218	0.119	0.165	0.037	0.005	0.069
70 - 74	538	368,196	0.218	0.156	0.280	0.043	0.027	0.059	0.032	0.011	0.020	556	425,843	0.218	0.156	0.280	0.043	0.027	0.059	0.032	0.011	0.020
75+	556	425,843	0.092	0.084	0.100	0.072	0.065	0.079	0.019	0.016	0.023	<b>Ethnicity</b>										
Malay	16,975	14,253,318	0.061	0.051	0.070	0.027	0.022	0.033	0.033	0.026	0.040	Malay										
Chinese	4,944	6,332,970	0.139	0.112	0.166	0.089	0.067	0.112	0.050	0.034	0.066	Chinese										
Indian	2,122	1,834,300	0.098	0.078	0.118	0.095	0.075	0.115	0.003	0.001	0.005	Indian										
Other Bumiputeras	2,933	3,300,636	0.043	0.027	0.059	0.032	0.018	0.045	0.011	0.002	0.020	Other Bumiputeras										
Others	1,524	1,557,733	0.117	0.091	0.142	0.089	0.067	0.111	0.028	0.014	0.042	Others										
<b>Occupation</b>												<b>Occupation</b>										
Government/ Semi-Private	2,148	1,811,075	0.074	0.064	0.084	0.045	0.037	0.053	0.029	0.023	0.035	Government/ Semi-Private										
Self employed	3,686	3,358,458	0.050	0.039	0.061	0.034	0.025	0.042	0.016	0.009	0.023	Self employed										
Unpaid worker/homemaker	3,224	2,758,938	0.169	0.146	0.193	0.143	0.121	0.165	0.027	0.018	0.035	Unpaid worker/homemaker										
Retiree	1,738	1,330,270	0.160	0.120	0.200	0.134	0.095	0.172	0.026	0.015	0.037	Retiree										
<b>Household Income group (RM)</b>												<b>Household Income group (RM)</b>										
< 400	2,166	2,016,214	0.084	0.064	0.104	0.071	0.052	0.089	0.013	0.006	0.021	< 400										
400 - 499	448	415,901	0.094	0.053	0.135	0.091	0.051	0.132	0.003	-0.001	0.006	400 - 499										
500 - 699	1,141	941,916	0.080	0.055	0.105	0.068	0.045	0.091	0.012	0.001	0.023	500 - 699										
700 - 999	1,865	1,655,090	0.079	0.054	0.103	0.066	0.043	0.088	0.013	0.004	0.022	700 - 999										
1000 - 1999	5,927	5,096,306	0.085	0.073	0.098	0.075	0.063	0.087	0.011	0.006	0.015	1000 - 1999										
2000 - 2999	4,797	4,593,572	0.090	0.076	0.104	0.076	0.063	0.089	0.014	0.009	0.019	2000 - 2999										
3000 - 3999	3,704	3,688,019	0.087	0.069	0.105	0.063	0.047	0.078	0.025	0.016	0.034	3000 - 3999										
4000 - 4999	2,484	2,659,738	0.096	0.077	0.116	0.071	0.054	0.088	0.026	0.015	0.036	4000 - 4999										
> 5000	5,966	6,212,201	0.080	0.070	0.090	0.037	0.030	0.044	0.043	0.036	0.050	> 5000										

Results can be interpreted as: In Malaysia, out of 1000 population there were 86 hospital admissions.

**Table 3.28: Characteristics of hospitalisation (proportion)**

Type of Facility / Characteristics	Government					Private				
	Count	Estimated Population	Row % (Prevalence)	95% CI		Count	Estimated Population	Row % (Prevalence)	95% CI	
			Lower	Upper				Lower	Upper	
<b>TOTAL (Overall)*</b>	1,550	1,386,311	100.0	100.0	100.0	464	534,424	100.0	100.0	100.0
<b>Frequency of admission (times of admission to same facility)</b>										
Once (1)	1,307	1,177,637	84.9	82.6	87.0	416	483,882	90.5	86.7	93.3
Twice (2)	150	130,747	9.4	7.8	11.4	25	30,696	5.7	3.5	9.3
More than twice (>2)	79	67,486	4.9	3.7	6.5	16	15,066	2.8	1.6	4.9
Missing <sup>1</sup>	14	10,442	0.8	0.4	1.3	7	4,779	0.9	0.4	2.3
<b>Length of stay (days)</b>										
≤ 4 days	1,002	901,172	65.0	61.9	68.0	329	386,262	72.3	67.2	76.9
5 - 7 days	291	256,668	18.5	16.1	21.2	95	102,658	19.2	15.4	23.6
> 7 days	238	211,140	15.2	13.1	17.7	33	36,900	6.9	4.5	10.5
Missing <sup>1</sup>	19	17,331	1.3	0.7	2.1	7	8,604	1.6	0.7	3.6
<b>Travel time (minutes)</b>										
< 30 minutes	732	666,555	48.1	45.0	51.2	253	317,632	59.4	53.7	64.9
30 - 60 minutes	549	483,206	34.9	31.9	38.0	163	166,828	31.2	26.2	36.7
> 60 minutes	119	101,564	7.3	6.0	9.0	22	23,085	4.3	2.6	7.1
Missing <sup>1</sup>	150	134,986	9.7	8.1	11.7	26	26,879	5.0	2.9	8.7
<b>Distance to facility (km)</b>										
< 5km	186	161,422	11.6	9.7	13.9	79	116,395	21.8	17.1	27.4
5 - 10 km	379	352,641	25.4	22.8	28.3	137	168,343	31.5	26.6	36.9
> 10 km	651	553,732	39.9	36.9	43.0	189	181,173	33.9	28.9	39.3
Missing <sup>1</sup>	334	318,516	23.0	20.4	25.8	59	68,513	12.8	9.4	17.3
<b>Type of transport</b>										
Own car	1,104	1,001,382	72.2	69.3	75.0	401	458,750	85.8	81.2	89.5
Own motorcycle	89	70,673	5.1	4.0	6.6	14	19,208	3.6	2.0	6.3
Own bicycle	1	61	0.0	0.0	0.0	-	-	-	-	-
Own boat	-	-	-	-	-	-	-	-	-	-
Public transport	177	168,548	12.2	10.1	14.5	19	22,277	4.2	2.4	7.1
Walking	4	1,683	0.1	0.0	0.5	2	2,180	0.4	0.1	1.7
Ambulance	115	82,642	6.0	4.8	7.4	6	8,852	1.7	0.6	4.7
Missing <sup>1</sup>	60	61,323	4.4	3.3	5.9	22	23,156	4.3	2.4	7.6
<b>Recommend facility to others</b>										
Yes	1,225	1,098,723	79.3	76.7	81.6	322	362,970	67.9	62.2	73.1
No	268	232,646	16.8	14.7	19.1	130	162,940	30.5	25.3	36.2
Missing <sup>1</sup>	57	54,942	4.0	2.9	5.3	12	8,514	1.6	0.8	3.2

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

\*multiple responses

<sup>1</sup>missing include those who "Don't know", "Refuse to answer" & "No answer"

**Table 3.29: Characteristics of hospitalization**

Type of Facility / Characteristics	Mean	95%CI		(±SD)	Median	(IQR)	Count	Estimated Population
		LL	UL					
<b>A-Frequency of visit (times of admission to same facility)</b>								
<b>Total (Overall)</b>	<b>1.23</b>	<b>1.19</b>	<b>1.26</b>	<b>0.82</b>	<b>1.0</b>	<b>1.0 - 1.0</b>	<b>1,993</b>	<b>1,905,514</b>
<b>Sector</b>								
Government facility	1.26	1.21	1.30	0.89	1.0	1.0 - 1.0	1,536	1,375,870
Private facility	1.14	1.09	1.19	0.56	1.0	1.0 - 1.0	457	529,644
<b>Location</b>								
Urban	1.20	1.16	1.24	0.71	1.0	1.0 - 1.0	1,137	1,386,111
Rural	1.30	1.23	1.37	1.05	1.0	1.0 - 1.0	856	519,403
<b>Region</b>								
Peninsular Malaysia	1.20	1.16	1.24	0.77	1.0	1.0 - 1.0	1,682	1,583,218
Sabah / Labuan	1.28	1.15	1.41	0.95	1.0	1.0 - 1.0	208	210,965
Sarawak	1.47	1.25	1.68	1.11	1.0	1.0 - 1.0	103	111,331
<b>B-Length of stay (days)</b>								
<b>Total (Overall)</b>	<b>5.33</b>	<b>4.87</b>	<b>5.79</b>	<b>10.34</b>	<b>3.0</b>	<b>2.0 - 6.0</b>	<b>1,975</b>	<b>1,886,065</b>
<b>Sector</b>								
Government facility	5.85	5.26	6.44	11.76	3.0	2.0 - 7.0	1,521	1,361,997
Private facility	3.99	3.55	4.43	4.78	3.0	2.0 - 5.0	454	524,067
<b>Location</b>								
Urban	4.78	4.41	5.15	6.28	3.0	2.0 - 5.0	1,130	1,373,610
Rural	6.80	5.66	7.94	16.89	3.0	2.0 - 7.0	845	512,454
<b>Region</b>								
Peninsular Malaysia	4.95	4.60	5.29	7.17	3.0	2.0 - 5.0	1,671	1,569,824
Sabah / Labuan	8.88	5.60	12.15	23.61	3.0	2.0 - 7.0	202	205,623
Sarawak	4.20	3.02	5.38	6.00	3.0	1.0 - 6.0	102	110,618
<b>C-Travel time to facility (minutes)</b>								
<b>Total (Overall)</b>	<b>32.34</b>	<b>30.25</b>	<b>34.43</b>	<b>45.69</b>	<b>20.0</b>	<b>15.0 - 30.0</b>	<b>1,838</b>	<b>1,758,870</b>
<b>Sector</b>								
Government facility	34.10	31.54	36.65	48.80	20.0	15.0 - 30.0	1,400	1,251,325
Private facility	28.02	24.58	31.46	36.64	20.0	10.0 - 30.0	438	507,545
<b>Location</b>								
Urban	28.49	25.75	31.22	45.49	20.0	15.0 - 30.0	1,065	1,305,165
Rural	43.43	40.29	46.57	44.49	30.0	20.0 - 45.0	773	453,705
<b>Region</b>								
Peninsular Malaysia	29.80	28.04	31.57	35.66	20.0	15.0 - 30.0	1,564	1,474,139
Sabah / Labuan	40.78	33.93	47.64	46.36	30.0	15.0 - 30.0	178	183,718
Sarawak	54.05	30.64	77.46	115.52	30.0	20.0 - 45.0	96	101,013
<b>D-Distance to facility (km)</b>								
<b>Total (Overall)</b>	<b>21.88</b>	<b>19.83</b>	<b>23.92</b>	<b>41.97</b>	<b>10.0</b>	<b>5.0 - 20.0</b>	<b>1,621</b>	<b>1,533,705</b>
<b>Sector</b>								
Government facility	23.66	21.21	26.11	43.58	12.0	5.1 - 20.0	1,216	1,067,795
Private facility	17.78	14.09	21.47	37.76	10.0	5.0 - 16.0	405	465,910
<b>Location</b>								
Urban	17.20	14.84	19.56	36.92	5.0	10.0 - 16.0	942	1,147,521
Rural	35.77	31.86	39.68	51.88	20.0	10.0 - 40.0	679	386,185
<b>Region</b>								
Peninsular Malaysia	21.37	19.15	23.60	42.23	10.0	5.0 - 20.0	1,385	1,289,300
Sabah / Labuan	23.40	17.64	29.17	36.71	12.8	4.0 - 18.0	158	165,561
Sarawak	26.90	16.11	37.70	47.87	15.0	5.0 - 26.0	78	78,845

Note: Any case with missing value was excluded from the analysis \*SD=standard deviation, IQR=inter quartile range



Table 3.30: Travel time to in-patient healthcare facilities

State	Less than 30 minutes					Between 30-60 minutes					More than 60 minutes				
	Count	Estimated Population	%	95% CI		Count	Estimated Population	%	95% CI		Count	Estimated Population	%	95% CI	
				LL	UL				LL	UL				LL	UL
<b>Travel time to out-patient healthcare facilities in URBAN locations</b>															
<b>MALAYSIA</b>	676	815,161	58.4	54.9	61.8	343	430,463	30.8	27.7	34.2	46	59,541	4.3	3.1	5.9
Johor	69	106,388	65.0	54.1	74.6	31	47,516	29.0	20.0	40.2	4	4,706	2.9	1.1	7.6
Kedah	32	43,806	62.7	44.4	77.9	10	19,844	28.4	15.1	46.9	1	1,946	2.8	0.4	17.7
Kelantan	25	17,574	64.2	46.9	78.4	8	5,616	20.5	10.2	36.8	-	-	-	-	-
Melaka	39	36,203	65.6	51.8	77.2	19	17,035	30.9	19.7	44.7	2	1,104	2.0	0.4	8.6
Negeri Sembilan	52	47,260	72.8	59.9	82.7	18	14,450	22.2	13.3	34.9	1	879	1.4	0.2	9.1
Pahang	23	19,287	40.1	24.5	57.9	11	10,995	22.8	11.5	40.2	3	6,374	13.2	3.6	38.7
Penang	47	78,036	52.4	40.4	64.1	34	60,938	40.9	29.6	53.2	1	1,917	1.3	0.2	8.7
Perak	39	69,427	63.5	50.0	75.2	12	19,786	18.1	10.0	30.6	6	8,077	7.4	3.2	16.4
Perlis	31	4,815	66.4	51.1	78.9	14	1,999	27.6	16.3	42.6	1	127	1.8	0.2	11.7
Selangor	146	216,253	55.4	49.0	61.6	97	134,776	34.5	28.8	40.7	14	18,850	4.8	2.7	8.4
Terengganu	30	21,470	60.9	46.3	73.8	13	7,891	22.4	12.9	35.9	1	733	2.1	0.3	13.6
Sabah/Labuan	37	39,574	38.6	25.3	53.9	33	48,297	47.2	32.1	62.7	4	6,373	6.2	2.1	17.2
Sarawak	21	28,678	54.6	37.7	70.5	15	15,778	30.0	17.4	46.6	3	5,353	10.2	3.3	27.5
WP Kuala Lumpur	52	83,501	72.1	60.1	81.5	17	24,732	21.3	13.1	32.8	2	2,866	2.5	0.6	9.5
WP Putrajaya	33	2,888	67.5	52.6	79.5	11	812	19.0	9.7	33.8	3	236	5.5	1.7	16.2
Peninsular Malaysia	618	746,909	60.2	56.6	63.8	295	366,388	29.5	26.3	33.0	39	47,815	3.9	2.7	5.5
<b>Travel time to out-patient healthcare facilities in RURAL locations</b>															
<b>MALAYSIA</b>	309	169,026	32.2	28.3	36.4	369	219,571	41.8	37.6	46.1	95	65,109	12.4	10.0	15.2
Johor	25	23,883	30.4	20.8	42.0	42	42,471	54.0	42.3	65.4	11	6,810	8.7	4.6	15.6
Kedah	16	9,536	28.8	17.8	43.1	25	16,544	50.0	36.0	64.0	5	2,865	8.6	3.4	20.1
Kelantan	16	13,939	41.0	26.6	57.1	14	12,051	35.5	22.0	51.7	-	-	-	-	-
Melaka	40	5,922	47.9	36.1	60.0	40	5,066	41.0	30.1	52.8	1	129	1.0	0.1	7.1
Negeri Sembilan	30	12,883	36.8	26.1	48.9	36	13,974	39.9	28.7	52.2	11	5,983	17.1	9.5	28.8
Pahang	13	9,552	22.3	12.5	36.4	20	16,239	37.9	23.5	54.7	12	9,449	22.0	12.1	36.8
Penang	36	4,296	46.6	34.2	59.5	29	4,286	46.5	34.1	59.4	3	435	4.7	1.4	14.5
Perak	24	16,687	34.4	23.1	47.8	28	21,948	45.2	32.5	58.6	8	7,123	14.7	7.4	27.0
Perlis	15	2,405	50.4	32.5	68.3	11	1,735	36.4	20.8	55.4	1	139	2.9	0.4	18.6
Selangor	19	9,018	27.5	17.5	40.4	30	14,837	45.2	32.6	58.5	8	5,341	16.3	7.9	30.7
Terengganu	18	7,795	36.2	23.9	50.6	22	8,470	39.3	26.7	53.5	3	1,218	5.7	1.8	16.4
Sabah/Labuan	41	35,259	32.2	23.0	43.1	41	35,851	32.8	23.4	43.8	22	18,364	16.8	10.8	25.1
Sarawak	16	17,850	28.3	14.9	46.9	31	26,100	41.3	27.3	56.9	10	7,254	11.5	5.5	22.3
WP Kuala Lumpur	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
WP Putrajaya	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Peninsular Malaysia	252	115,916	32.9	28.7	37.3	297	157,620	44.7	40.0	49.4	63	39,491	11.2	8.6	14.4

Note: Some cells have respondent count &lt; 30. Results should be interpreted with caution. LL = Lower Limit, UL = Upper Limit

Table 3.31: Distance to in-patient healthcare facilities

State	Less than 5 km						Between 5 – 10 km						More than 10 km					
	Count	Estimated Population	%	95% CI		Count	Estimated Population	%	95% CI		Count	Estimated Population	%	95% CI				
				LL	UL				LL	UL				LL	UL			
<b>Distance to out-patient healthcare facilities in URBAN locations</b>																		
<b>MALAYSIA</b>	193	236,293	16.9	14.3	19.9	365	449,675	32.2	29.1	35.5	384	461,553	33.1	29.9	36.4			
Johor	15	20,615	12.6	7.5	20.3	34	53,441	32.7	23.7	43.2	42	61,687	37.7	27.9	48.6			
Kedah	15	16,104	23.0	12.9	37.7	13	21,898	31.3	16.9	50.6	15	27,594	39.5	24.2	57.1			
Kelantan	5	2,728	10.0	3.7	24.0	11	7,889	28.8	16.3	45.7	4	2,578	9.4	3.4	23.5			
Melaka	7	7,696	13.9	6.7	26.8	16	14,283	25.9	16.0	39.0	30	25,023	45.3	32.5	58.8			
Negeri Sembilan	6	6,348	9.8	4.2	21.3	28	28,051	43.2	30.8	56.5	35	27,173	41.8	29.8	54.9			
Pahang	6	6,105	12.7	5.3	27.2	17	14,437	30.0	17.3	46.7	8	10,062	20.9	8.8	42.1			
Penang	26	49,963	33.5	22.7	46.3	30	49,274	33.1	22.9	45.0	22	32,399	21.7	13.9	32.2			
Perak	10	22,937	21.0	10.2	38.4	19	27,468	25.1	15.7	37.7	20	32,642	29.9	19.2	43.3			
Perlis	16	2,152	29.7	18.1	44.6	8	1,430	19.7	8.9	38.1	21	3,238	44.7	29.9	60.4			
Selangor	36	51,926	13.3	9.5	18.3	83	122,938	31.5	25.8	37.8	107	152,404	39.1	33.1	45.4			
Terengganu	5	3,459	9.8	4.0	22.0	16	11,577	32.8	20.6	47.9	9	6,073	17.2	8.9	30.6			
Sabah/Labuan	16	21,245	20.7	10.4	37.0	22	20,223	19.7	11.9	30.9	32	49,175	48.0	32.9	63.4			
Sarawak	8	9,099	17.3	8.0	33.6	14	17,295	32.9	19.3	50.2	11	13,429	25.6	13.8	42.3			
WP Kuala Lumpur	11	15,070	13.0	6.9	23.1	37	58,047	50.1	37.9	62.2	11	16,526	14.3	7.6	25.1			
WP Putrajaya	11	846	19.8	10.6	33.8	17	1,425	33.3	21.1	48.2	17	1,550	36.2	23.1	51.8			
Peninsular Malaysia	169	205,949	16.6	13.9	19.7	329	412,157	33.2	29.9	36.7	341	398,949	32.2	28.9	35.6			
<b>Distance to out-patient healthcare facilities in RURAL locations</b>																		
<b>MALAYSIA</b>	72	41,524	7.9	5.8	10.7	151	71,310	13.6	11.0	16.6	456	273,351	52.0	47.8	56.2			
Johor	2	2,101	2.7	0.7	10.2	10	9,858	12.5	6.6	22.7	58	53,962	68.7	56.7	78.6			
Kedah	3	1,556	4.7	1.5	14.1	6	3,450	10.4	4.5	22.3	35	22,003	66.4	52.1	78.3			
Kelantan	1	666	2.0	0.3	13.0	4	3,719	10.9	4.1	26.1	14	11,626	34.2	21.0	50.4			
Melaka	6	749	6.1	2.6	13.4	29	4,797	38.8	27.3	51.7	33	4,138	33.5	23.6	45.0			
Negeri Sembilan	11	3,792	10.8	5.6	19.9	15	5,949	17.0	9.9	27.5	46	20,984	59.9	47.7	71.0			
Pahang	4	2,556	6.0	2.1	15.5	3	1,996	4.7	1.4	14.0	34	25,381	59.2	42.2	74.2			
Penang	10	1,286	14.0	6.7	26.7	22	2,727	29.6	19.5	42.2	35	4,925	53.4	40.6	65.9			
Perak	4	2,810	5.8	1.9	16.3	9	6,183	12.7	6.1	24.8	39	30,607	63.1	49.4	74.9			
Perlis	2	326	6.8	1.6	24.4	7	1,117	23.4	11.1	42.8	17	2,701	56.6	38.0	73.6			
Selangor	2	445	1.4	0.2	7.0	9	4,100	12.5	6.4	23.0	43	23,036	70.2	57.2	80.6			
Terengganu	1	332	1.5	0.2	10.4	15	6,341	29.4	18.3	43.7	17	6,030	28.0	17.4	41.7			
Sabah/Labuan	19	20,214	18.5	10.9	29.6	16	14,950	13.7	7.5	23.5	53	39,754	36.4	27.3	46.5			
Sarawak	7	4,691	7.4	3.3	15.9	6	6,125	9.7	3.8	22.5	32	28,206	44.7	29.7	60.6			
WP Kuala Lumpur	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-			
WP Putrajaya	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-			
Peninsular Malaysia	46	16,618	4.7	3.3	6.8	129	50,235	14.2	11.5	17.5	371	205,392	58.2	53.6	62.7			

Note: Some cells have respondent count < 30. Results should be interpreted with caution. LL = Lower Limit, UL = Upper Limit

### 3.7 DEFINITION OF VARIABLES

Appendix 3.1: Definition of Variables (out-patient care utilisation)

Variable name	Variable in STATA	Weight Variable	Definition of Variable	STATA variable definition
Prevalence of out-patient care utilisation in the last 2 weeks	<ul style="list-style-type: none"> <li>■ b4100</li> <li>■ state2</li> <li>■ strata</li> <li>■ gender</li> <li>■ agegp</li> <li>■ race3</li> <li>■ maritalgp</li> <li>■ edu</li> <li>■ work3</li> <li>■ hhincome_group</li> </ul>	weight4	<p>Person reported received any out-patient care in the last 2 weeks</p> <ul style="list-style-type: none"> <li>• 1 = Yes; 2 = No</li> </ul> <p>Display result by socio-demographic characteristics:</p> <ul style="list-style-type: none"> <li>• State</li> <li>• Urban / rural</li> <li>• Gender</li> <li>• Age group</li> <li>• Ethnicity</li> <li>• Marital status</li> <li>• Education levels</li> <li>• Occupation</li> <li>• Household Income group</li> </ul>	<p>svyset [pw=weight4], strata(strata2)</p> <p>svy: tab b4100, obs count format(%10.2g)</p> <p>svy: tab b4100, ci format(%10.3f)</p> <p>svy: tab &lt;var&gt; b4100, obs count format (%10.2g)</p> <p>svy: tab &lt;var&gt; b4100, ci format(%6.3f) row</p> <p>repeat &lt;var&gt; for state2, strata, gender, agegp, ...</p>
Last out-patient care experience	<ul style="list-style-type: none"> <li>■ last_outpatient</li> </ul>	weight4	<p>Person reported for the last time being admitted to out-patient care (years)</p> <ul style="list-style-type: none"> <li>• 1 = within last 2 weeks</li> <li>• 2 = 0 month</li> <li>• 3 = 1 month</li> <li>• 4 = 2 months</li> <li>• 5 = 3 -5 months</li> <li>• 6 = 6 -12 months</li> <li>• 7 = &gt;12 – 24 months</li> <li>• 8 = &gt;24 – 36 months</li> <li>• 9 = &gt;36 – 48 months</li> <li>• 10 = &gt;48 – 60 months</li> <li>• 11 = &gt;60 months</li> <li>• 12 = No past history</li> </ul>	<p>svy: tab last_outpatient, obs count format(%10.2g)</p> <p>svy: tab last_outpatient, ci format(%10.3f)</p>
Total number of place visited in the last 2 weeks	<ul style="list-style-type: none"> <li>■ b4200</li> </ul>	weight4	<p>Number of out-patient health care facilities visited in the last 2 weeks</p> <ul style="list-style-type: none"> <li>• 1 = 1 place</li> <li>• 2 = 2 places</li> <li>• 3 = 3 places</li> </ul>	<p>svy: tab b4200 if b4100==1, obs count format (%10.2g)</p> <p>svy: tab b4200 if b4100==1, ci format(%10.3f)</p>
Type of facility (own by government or private sector)	<ul style="list-style-type: none"> <li>■ b4302_clean</li> <li>■ state2</li> <li>■ strata</li> </ul>	weight4	<p>Type of the out-patient health care facility visited</p> <ul style="list-style-type: none"> <li>• 1 = government; 2 = private</li> </ul>	<p>svy: tab &lt;var&gt; b4302_clean, obs count format (%10.2g)</p> <p>svy: tab &lt;var&gt; b4302_clean, ci format(%6.3f) row</p>

Variable name	Variable in STATA	Weight Variable	Definition of Variable	STATA variable definition
Visit to out-patient health care facility related to health problem in the last 2 weeks	<ul style="list-style-type: none"> <li>▪ b4303</li> </ul>	weight4	<p>Length / duration of stays (days) in the health care facility</p> <ul style="list-style-type: none"> <li>• Length of stay (b4303) <ul style="list-style-type: none"> <li>▪ 1 = 0–4 days</li> <li>▪ 2 = 5–7 days</li> <li>▪ 3 = &gt;7 days</li> </ul> </li> </ul>	<pre>svy: tab b4303 if b4100==1, obs count format(%10.2g) svy: tab b4303 if b4100==1, ci format(%10.3f)</pre>
Annualised rate of utilisation (mean visit)	<ul style="list-style-type: none"> <li>▪ b4302</li> <li>▪ b4304</li> </ul>	weight4	<p>Sector (b4302)</p> <ul style="list-style-type: none"> <li>▪ 1 = government; 2 = private</li> </ul> <p>Number of visit (b4304)</p>	<pre>egen b4304_tg = rowtotal (b4304_ta4 b4304_tb3 b4304_tc3) egen b4304_tp = rowtotal (b4304_ta5 b4304_tb4 b4304_tc4) egen b4304_tall = rowtotal (b4304_tg b4304_tp) gen b4304_t1yr = b4304_tall*365/14</pre>
Frequency of visit to out-patient health care facility	<ul style="list-style-type: none"> <li>▪ visit_no2</li> <li>▪ b4302_clean</li> </ul>	weight4	<p>Number of visit(s) to out-patient health care facility</p> <ul style="list-style-type: none"> <li>• Sector (b4302_clean) <ul style="list-style-type: none"> <li>▪ 1 = government; 2 = private</li> </ul> </li> <li>• Frequency of visit (visit_no2) <ul style="list-style-type: none"> <li>▪ 1 = once</li> <li>▪ 2 = twice</li> <li>▪ 3 = &gt; twice</li> </ul> </li> </ul>	<pre>svy: tab visit_no2 if b4302_clean==1, obs count format (%10.2g) svy: tab visit_no2 if b4302_clean==1, ci format (%6.3f)  svy: tab visit_no2 if b4302_clean==2, obs count format (%10.2g) svy: tab visit_no2 if b4302_clean==2, ci format (%6.3f)</pre>
Mode of transport use to get to the health care facility	<ul style="list-style-type: none"> <li>▪ b4600_1</li> <li>▪ b4302_clean</li> </ul>	weight4	<p>Transportation the person used to get to the out-patient health care facility</p> <ul style="list-style-type: none"> <li>• Sector (b4302_clean) <ul style="list-style-type: none"> <li>▪ 1 = government; 2 = private</li> </ul> </li> <li>• Mode of transport (b4600_1) <ul style="list-style-type: none"> <li>▪ 1 = own car</li> <li>▪ 2 = own motorcycle</li> <li>▪ 3 = own bicycle</li> <li>▪ 4 = own boat</li> <li>▪ 5 = public transport</li> <li>▪ 6 = walking</li> <li>▪ 7 = ambulance</li> </ul> </li> </ul>	<pre>svy: tab b4600_1 if b4302_clean==1, obs count format (%10.2g) svy: tab b4600_1 if b4302_clean==1, ci format (%6.3f)  svy: tab b4600_1 if b4302_clean==2, obs count format (%10.2g) svy: tab b4600_1 if b4302_clean==2, ci format (%6.3f)</pre>
Travel time to out-patient health care facility	<ul style="list-style-type: none"> <li>▪ time2</li> <li>▪ b4302_clean</li> </ul>	weight4	<p>Time taken for the person to get to the out-patient health care facility</p> <ul style="list-style-type: none"> <li>• Sector (b4302_clean) <ul style="list-style-type: none"> <li>▪ 1 = government; 2 = private</li> </ul> </li> <li>• Travel time (time2) <ul style="list-style-type: none"> <li>▪ 1 = &lt;30 minutes</li> <li>▪ 2 = 30 – 60 minutes</li> <li>▪ 3 = &gt;60 minutes</li> </ul> </li> </ul>	<pre>svy: tab time2 if b4302_clean==1, obs count format (%10.2g) svy: tab time2 if b4302_clean==1, ci format (%6.3f)  svy: tab time2 if b4302_clean==2, obs count format (%10.2g) svy: tab time2 if b4302_clean==2, ci format (%6.3f)</pre>
Travel time to out-patient healthcare facility in urban &	<ul style="list-style-type: none"> <li>▪ duration</li> <li>▪ b4302</li> <li>▪ strata</li> </ul>	weight4	<ul style="list-style-type: none"> <li>• Sector (b4302) <ul style="list-style-type: none"> <li>▪ 1 = government; 2 = private</li> </ul> </li> <li>• Location (strata)</li> </ul>	<pre>sum duration if (b4302==1   b4302==2) &amp; (strata==1   strata==2) [aw=weight4], detail sum duration if (b4302==1   b4302==2) &amp; strata==1</pre>

Variable name	Variable in STATA	Weight Variable	Definition of Variable	STATA variable definition
rural area			<ul style="list-style-type: none"> <li>▪ 1 = urban</li> <li>▪ 2 = rural</li> </ul>	<pre>[aw=weight4], detail sum duration if (b4302==1   b4302==2) &amp; strata==2 [aw=weight4], detail</pre>
Travel time to out-patient healthcare facility by region	<ul style="list-style-type: none"> <li>▪ duration</li> <li>▪ b4302</li> <li>▪ state3</li> </ul>	weight4	<ul style="list-style-type: none"> <li>• Sector (b4302) <ul style="list-style-type: none"> <li>▪ 1 = government; 2 = private</li> </ul> </li> <li>• Region (state3) <ul style="list-style-type: none"> <li>▪ 1 = peninsular malaysia</li> <li>▪ 2 = sabah/labuan</li> <li>▪ 3 = sarawak</li> </ul> </li> </ul>	<pre>sum duration if (b4302==1   b4302==2) &amp; state3==1 [aw=weight4], detail sum duration if (b4302==1   b4302==2) &amp; state3==2 [aw=weight4], detail sum duration if (b4302==1   b4302==2) &amp; state3==3 [aw=weight4], detail</pre>
Distance to out-patient health care facility	<ul style="list-style-type: none"> <li>▪ distance2</li> <li>▪ b4302_clean</li> </ul>	weight4	<ul style="list-style-type: none"> <li>Distance between the person's resident to the out-patient health care facility</li> <li>• Sector (b4302_clean) <ul style="list-style-type: none"> <li>▪ 1 = government; 2 = private</li> </ul> </li> <li>• Distance (distance2) <ul style="list-style-type: none"> <li>▪ 1 = &lt;5 km</li> <li>▪ 2 = 5 - 10 km</li> <li>▪ 3 = &gt;10 km</li> </ul> </li> </ul>	<pre>svy: tab distance2 if b4302_clean==1, obs count format (%10.2g) svy: tab distance2 if b4302_clean==1, ci format (%6.3f) svy: tab distance2 if b4302_clean==2, obs count format (%10.2g) svy: tab distance2 if b4302_clean==2, ci format (%6.3f)</pre>
Distance to out-patient healthcare facility in urban & rural area	<ul style="list-style-type: none"> <li>▪ distance</li> <li>▪ b4302</li> <li>▪ strata</li> </ul>	weight4	<ul style="list-style-type: none"> <li>• Sector (b4302) <ul style="list-style-type: none"> <li>▪ 1 = government; 2 = private</li> </ul> </li> <li>• Location (strata) <ul style="list-style-type: none"> <li>▪ 1 = urban</li> <li>▪ 2 = rural</li> </ul> </li> </ul>	<pre>sum distance if (b4302==1   b4302==2) &amp; (strata==1   strata==2) [aw=weight4], detail sum distance if (b4302==1   b4302==2) &amp; strata==1 [aw=weight4], detail sum distance if (b4302==1   b4302==2) &amp; strata==2 [aw=weight4], detail</pre>
Distance to out-patient healthcare facility by region	<ul style="list-style-type: none"> <li>▪ distance b4302</li> <li>▪ state3</li> </ul>	weight4	<ul style="list-style-type: none"> <li>• Sector (b4302) <ul style="list-style-type: none"> <li>▪ 1 = government; 2 = private</li> </ul> </li> <li>• Region (state3) <ul style="list-style-type: none"> <li>▪ 1 = peninsular malaysia</li> <li>▪ 2 = sabah/labuan</li> <li>▪ 3 = sarawak</li> </ul> </li> </ul>	<pre>sum distance if (b4302==1   b4302==2) &amp; state3==1 [aw=weight4], detail sum distance if (b4302==1   b4302==2) &amp; state3==2 [aw=weight4], detail sum distance if (b4302==1   b4302==2) &amp; state3==3 [aw=weight4], detail</pre>
Recommend in-patient health care facility to others	<ul style="list-style-type: none"> <li>▪ b4700</li> <li>▪ b4302_clean</li> </ul>	weight4	<ul style="list-style-type: none"> <li>The person recommend the visited in-patient health care facility to others</li> <li>• Sector (b4302_clean) <ul style="list-style-type: none"> <li>▪ 1 = government; 2 = private</li> </ul> </li> <li>• Recommendation (b4700) <ul style="list-style-type: none"> <li>▪ 1 = yes; 2 = no</li> </ul> </li> </ul>	<pre>svy: tab b4700 if b4302_clean==1, obs count format (%10.2g) svy: tab b4700 if b4302_clean==1, ci format (%6.3f) svy: tab b4700 if b4302_clean==2, obs count format (%10.2g) svy: tab b4700 if b4302_clean==2, ci format (%6.3f)</pre>
Prevalence of those who are pregnant in the last 12 months	<ul style="list-style-type: none"> <li>▪ b4801</li> </ul>	weight4	<ul style="list-style-type: none"> <li>Person (women who aged 13 – 49 years old) who reported pregnant in the last 12 months</li> <li>• 1 = yes; 2 = no</li> </ul>	<pre>svy: tab b4801_1, obs count format(%10.2g) svy: tab b4801_1, ci format(%10.3f)</pre>

Variable name	Variable in STATA	Weight Variable	Definition of Variable	STATA variable definition
Received antenatal care	<ul style="list-style-type: none"> <li>■ b4802</li> <li>■ b4801</li> </ul>	weight4	Those who received any antenatal care among those who were pregnant <ul style="list-style-type: none"> <li>• 1 = yes; 2 = no</li> </ul>	svy: tab b4802 if b4801==1, obs count format (%10.2g) svy: tab b4802 if b4801==1, ci format(%10.3f)
Type of health care facility visited to get antenatal care	<ul style="list-style-type: none"> <li>■ b4803</li> <li>■ b4801</li> <li>■ b4802</li> </ul>	weight4	Type of the health care facility visited for antenatal care <ul style="list-style-type: none"> <li>• 1 = government clinic only</li> <li>• 2 = private clinic only</li> <li>• 3 = TCM</li> </ul>	svy: tab b4803 if b4802==1, obs count format (%10.2g) svy: tab b4803 if b4802==1, ci format(%10.3f)
Who reported ill within the last 2 weeks	<ul style="list-style-type: none"> <li>■ ill</li> <li>■ b1010</li> <li>■ b1011</li> <li>■ b1012</li> <li>■ b1013</li> <li>■ b1014</li> <li>■ b1015</li> <li>■ b1016</li> <li>■ b1017</li> </ul>		Those who have reported to have any illness. Those who had answered "yes" in any question below: <ul style="list-style-type: none"> <li>• b1010 – troubled breathing</li> <li>• b1011 – persistent vomiting</li> <li>• b1012 – unable to eat/drink</li> <li>• b1013 – bodily injury</li> <li>• b1014 – dental problem</li> <li>• b1015 – chest/stomach pain</li> <li>• b1016 - dizziness</li> <li>• b1017 – any health problem</li> </ul>	gen ill = 0 replace ill=1 if b1010==1   b1011==1   b1012==1   b1013==1   b1014==1   b1015==1   b1016==1   b1017==1

Appendix 3.2: Definition of Variables (in-patient care utilisation)

Variable name	Variable in STATA	Weight Variable	Definition of Variable	STATA variable definition
Prevalence of in-patient care utilisation in the last 12 months	<ul style="list-style-type: none"> <li>■ b2100</li> <li>■ state2</li> <li>■ strata</li> <li>■ gender</li> <li>■ agegp</li> <li>■ race3</li> <li>■ maritalgp</li> <li>■ edu</li> <li>■ work3</li> <li>■ hhincmegroup</li> </ul>	weight4	<p>Person reported received any in-patient care in the last 12 months</p> <ul style="list-style-type: none"> <li>• 1 = yes; 2 = no</li> </ul> <p>Display result by socio-demographic characteristics:</p> <ul style="list-style-type: none"> <li>• State</li> <li>• Urban / rural</li> <li>• Gender</li> <li>• Age group</li> <li>• Ethnicity</li> <li>• Marital status</li> <li>• Education levels</li> <li>• Occupation</li> <li>• Household income group</li> </ul>	<pre>svyset [pw=weight4], strata(strata2) svy: tab b2100, obs count format(%10.2g) svy: tab b2100, ci format(%10.3f)  svy: tab &lt;var&gt; b2100, obs count format(%10.2g) svy: tab &lt;var&gt; b2100, ci format(%6.3f) row  do &amp; repeat &lt;var&gt; for state2, strata, gender, agegp,...</pre>
Last in-patient care experience	<ul style="list-style-type: none"> <li>■ b2101</li> </ul>	weight4	<p>Person reported for the last time being admitted to in-patient care (years)</p> <ul style="list-style-type: none"> <li>• 1 = 1 – &lt;2 years</li> <li>• 2 = 2 – &lt;3 years</li> <li>• 3 = 3 – &lt;5 years</li> <li>• 4 = &gt;5 years</li> <li>• 5 = never</li> </ul>	<pre>svy: tab b2101, obs count format(%10.2g) svy: tab b2101, ci format(%10.3f)</pre>
Total number of place visited in the last 12 months	<ul style="list-style-type: none"> <li>■ b2200</li> </ul>	weight4	<p>Number of in-patient health care facilities visited in the last 12 months</p> <ul style="list-style-type: none"> <li>• 1 = 1 place; 2 = 2 places; 3 = 3 places</li> </ul>	<pre>svy: tab b2200 if b2100==1, obs count format (%10.2g) svy: tab b2200 if b2100==1, ci format(%10.3f)</pre>
Type of facility (own by government or private sector)	<ul style="list-style-type: none"> <li>■ b2302</li> <li>■ state2</li> <li>■ strata</li> </ul>	weight4	<p>Type of in-patient healthcare facility visited</p>	<pre>svy: tab state2 b2302, obs count format(%10.2g) svy: tab state2 b2302, ci format(%6.3f) row  svy: tab strata b2302, obs count format(%10.2g) svy: tab strata b2302, ci format(%6.3f) row</pre>
Rate of hospitalization (mean admission)	<ul style="list-style-type: none"> <li>■ b4202</li> <li>■ b4203</li> </ul>	weight4	<p>Sector (b2302)</p> <ul style="list-style-type: none"> <li>■ 1 = government; 2 = private</li> </ul> <p>Number of visit (b2303)</p>	<pre>egen b2303_tg = rowtotal (b2303_ta3 b2303_tb3 b2303_tc3) egen b2303_tp = rowtotal (b2303_ta4 b2303_tb4 b2303_tc4) egen b2303_tall = rowtotal (b2303_tg b2303_tp) svy: tab b2303_3 if b2302==1, obs count format(%10.2g) svy: tab b2303_3 if b2302==1, ci format(%6.3f)</pre>
Frequency of visit to in-patient health care facility	<ul style="list-style-type: none"> <li>■ b2303_3</li> <li>■ b2302</li> </ul>	weight4	<p>Number of visit(s) to in-patient healthcare facility</p> <ul style="list-style-type: none"> <li>• Sector (b2302) <ul style="list-style-type: none"> <li>■ 1 = government; 2 = private</li> </ul> </li> <li>• Frequency of visit (b2303_3) <ul style="list-style-type: none"> <li>■ 1 = once; 2 = twice; 3 = &gt; twice</li> </ul> </li> </ul>	<pre>svy: tab b2303_3 if b2302==2, obs count format(%10.2g) svy: tab b2303_3 if b2302==2, ci format(%6.3f)</pre>

Variable name	Variable in STATA	Weight Variable	Definition of Variable	STATA variable definition
Total days spent in the in-patient health care facility	<ul style="list-style-type: none"> <li>■ b2304_3</li> <li>■ b2302</li> </ul>	weight4	<p>Length/duration of stays (days) in the healthcare facility</p> <ul style="list-style-type: none"> <li>• Sector (b2302) <ul style="list-style-type: none"> <li>■ 1 = government; 2 = private</li> </ul> </li> <li>• Length of stay (b2304_3) <ul style="list-style-type: none"> <li>■ 1 = 0–4 days</li> <li>■ 2 = 5–7 days</li> <li>■ 3 = &gt;7 days</li> </ul> </li> </ul>	<pre>svy: tab b2304_3 if b2302==1, obs count format(%10.2g) svy: tab b2304_3 if b2302==1, ci format(%6.3f)  svy: tab b2304_3 if b2302==2, obs count format(%10.2g) svy: tab b2304_3 if b2302==2, ci format(%6.3f)</pre>
Mode of transport use to get to the health care facility	<ul style="list-style-type: none"> <li>■ b2600_1</li> <li>■ b2302</li> </ul>	weight4	<p>Transportation the person used to get to the in-patient health care facility</p> <ul style="list-style-type: none"> <li>• Sector (b2302) <ul style="list-style-type: none"> <li>■ 1 = government; 2 = private</li> </ul> </li> <li>• Mode of transport (b2600_1) <ul style="list-style-type: none"> <li>■ 1 = own car</li> <li>■ 2 = own motorcycle</li> <li>■ 3 = own bicycle</li> <li>■ 4 = own boat</li> <li>■ 5 = public transport</li> <li>■ 6 = walking</li> <li>■ 7 = ambulance</li> </ul> </li> </ul>	<pre>svy: tab b2600_1 if b2302==1, obs count format(%10.2g) svy: tab b2600_1 if b2302==1, ci format(%6.3f)  svy: tab b2600_1 if b2302==2, obs count format(%10.2g) svy: tab b2600_1 if b2302==2, ci format(%6.3f)</pre>
Travel time to in-patient health care facility	<ul style="list-style-type: none"> <li>■ b2610_total2</li> <li>■ b2302</li> </ul>	weight4	<p>Time taken for the person to get to the in-patient health care facility</p> <ul style="list-style-type: none"> <li>• Sector (b2302) <ul style="list-style-type: none"> <li>■ 1 = government; 2 = private</li> </ul> </li> <li>• Travel time (b2610_total2) <ul style="list-style-type: none"> <li>■ 1 = &lt;30 minutes</li> <li>■ 2 = 30 – 60 minutes</li> <li>■ 3 = &gt;60 minutes</li> </ul> </li> </ul>	<pre>svy: tab b2610_total2 if b2302==1, obs count format(%10.2g) svy: tab b2610_total2 if b2302==1, ci format(%6.3f)  svy: tab b2610_total2 if b2302==2, obs count format(%10.2g) svy: tab b2610_total2 if b2302==2, ci format(%6.3f)</pre>
Travel time to in-patient healthcare facility in urban & rural area	<ul style="list-style-type: none"> <li>■ duration</li> <li>■ b2302</li> <li>strata</li> </ul>	weight4	<ul style="list-style-type: none"> <li>• Sector (b2302) <ul style="list-style-type: none"> <li>■ 1 = government; 2 = private</li> </ul> </li> <li>• Location (strata) <ul style="list-style-type: none"> <li>■ 1 = urban</li> <li>■ 2 = rural</li> </ul> </li> </ul>	<pre>sum duration if (b2302==1   b2302==2) &amp; (strata==1   strata==2) [aw=weight4], detail sum duration if (b2302==1   b4302==2) &amp; strata==1 [aw=weight4], detail sum duration if (b2302==1   b4302==2) &amp; strata==2 [aw=weight4], detail</pre>
Travel time to in-patient healthcare facility by region	<ul style="list-style-type: none"> <li>■ duration</li> <li>■ b2302</li> <li>■ state3</li> </ul>	weight4	<ul style="list-style-type: none"> <li>• Sector (b2302) <ul style="list-style-type: none"> <li>■ 1 = government; 2 = private</li> </ul> </li> <li>• Region (state3) <ul style="list-style-type: none"> <li>■ 1 = peninsular malaysia</li> <li>■ 2 = sabah/labuan</li> <li>■ 3 = sarawak</li> </ul> </li> </ul>	<pre>sum duration if (b2302==1   b2302==2) &amp; state3==1 [aw=weight4], detail sum duration if (b2302==1   b2302==2) &amp; state3==2 [aw=weight4], detail sum duration if (b2302==1   b2302==2) &amp; state3==3 [aw=weight4], detail</pre>



Variable name	Variable in STATA	Weight Variable	Definition of Variable	STATA variable definition
Distance to in-patient health care facility	<ul style="list-style-type: none"> <li>■ b2620_2</li> <li>■ b2302</li> </ul>	weight4	<p>Distance between the person's resident to the in-patient health care facility</p> <ul style="list-style-type: none"> <li>• Sector (b2302) <ul style="list-style-type: none"> <li>■ 1 = government; 2 = private</li> </ul> </li> <li>• Distance (b2620_2) <ul style="list-style-type: none"> <li>■ 1 = &lt;5 km; 2 = 5 - 10 km; 3 = &gt;10 km</li> </ul> </li> </ul>	<pre>svy: tab b2620_2 if b2302==1, obs count format(%10.2g) svy: tab b2620_2 if b2302==1, ci format(%6.3f)  svy: tab b2620_2 if b2302==2, obs count format(%10.2g) svy: tab b2620_2 if b2302==2, ci format(%6.3f)</pre>
Distance to in-patient healthcare facility in urban & rural area	<ul style="list-style-type: none"> <li>■ distance</li> <li>■ b2302</li> <li>■ strata</li> </ul>	weight4	<ul style="list-style-type: none"> <li>• Sector (b2302) <ul style="list-style-type: none"> <li>■ 1 = government; 2 = private</li> </ul> </li> <li>• Location (strata) <ul style="list-style-type: none"> <li>■ 1 = urban</li> <li>■ 2 = rural</li> </ul> </li> </ul>	<pre>sum distance if (b2302==1   b2302==2) &amp; (strata==1   strata==2) [aw=weight4], detail sum distance if (b2302==1   b2302==2) &amp; strata==1 [aw=weight4], detail sum distance if (b2302==1   b2302==2) &amp; strata==2 [aw=weight4], detail</pre>
Distance to in-patient healthcare facility by region	<ul style="list-style-type: none"> <li>■ Distance</li> <li>■ B2302</li> <li>■ state3</li> </ul>	weight4	<ul style="list-style-type: none"> <li>• Sector (b2302) <ul style="list-style-type: none"> <li>■ 1 = government; 2 = private</li> </ul> </li> <li>• Region (state3) <ul style="list-style-type: none"> <li>■ 1 = peninsular malaysia</li> <li>■ 2 = sabah/labuan</li> <li>■ 3 = sarawak</li> </ul> </li> </ul>	<pre>sum distance if (b2302==1   b2302==2) &amp; state3==1 [aw=weight4], detail sum distance if (b2302==1   b2302==2) &amp; state3==2 [aw=weight4], detail sum distance if (b2302==1   b2302==2) &amp; state3==3 [aw=weight4], detail</pre>
Recommend in-patient health care facility to others	<ul style="list-style-type: none"> <li>■ b2700</li> <li>■ b2302</li> </ul>	weight4	<p>The person recommend the visited in-patient health care facility to others</p> <ul style="list-style-type: none"> <li>• Sector (b2302) <ul style="list-style-type: none"> <li>■ 1 = government; 2 = private</li> </ul> </li> <li>• Recommendation (b2700) <ul style="list-style-type: none"> <li>■ 1 = yes; 2 = no</li> </ul> </li> </ul>	<pre>svy: tab b2700 if b2302==1, obs count format(%10.2g) svy: tab b2700 if b2302==1, ci format(%6.3f)  svy: tab b2700 if b2302==2, obs count format(%10.2g) svy: tab b2700 if b2302==2, ci format(%6.3f)</pre>



# TOPIC 4

## ORAL HEALTHCARE





## 4.0 ORAL HEALTHCARE

### *Contributors to this section:*

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## 4.1 GENERAL OBJECTIVE

To determine the pattern of utilization of oral healthcare services.

### 4.1.1 Specific Objectives

1. To determine the prevalence of oral healthcare utilisation.
2. To determine the average time and distance taken to seek oral healthcare or treatment.
3. To determine the proportion of utilisation in government and private healthcare facilities.

## 4.2 LOAD OF ORAL HEALTH PROBLEMS

### 4.2.1 Prevalence of oral health problems in the last two weeks

The overall prevalence of reported recent oral health problems was 5.7% (95% CI: 5.2 - 6.2). Among the ethnic groups, those of Bumiputera Sabah ethnicity had a higher prevalence of reported recent oral health problems [9.5% (95% CI: 6.5 - 13.8)] as compared to Malays [5.5% (95% CI: 5.0 - 6.1)] and Chinese [4.4% (95% CI: 3.7 - 5.4)] (**Table 4.1**).

The prevalence of the population who had oral health problems without any other illness was 1.7% (95% CI: 1.5 - 1.9). A higher prevalence was seen in children aged 5-9 [2.8% (95% CI: 2.1 - 3.6)] as compared to those aged between 10-14 years [1.2% (95% CI: 0.9 - 1.8)] (**Table 4.2**).

The prevalence of the population who had oral health problems with at least one other illness was 4.0% (95% CI: 3.6 - 4.4). The state of Sabah/ Labuan had a higher proportion of population with oral health problems with at least one other illness [7.0% (95% CI: 4.9 – 9.9)] as compared to other states except Johor, Sarawak, WP Kuala Lumpur and WP Putrajaya. Among the ethnic groups, those of Bumiputera Sabah ethnicity had a higher prevalence of reported recent oral health problems with at least one other illness [7.6% (95% CI: 4.7 – 12.1)] as compared to Malays [3.9% (95% CI: 3.5 – 4.4)] and Chinese [2.7% (95% CI: 2.1 – 3.5)] (**Table 4.3**).

#### **4.2.2 Prevalence of oral health problems in the last two weeks where daily activities were affected**

In the preceding 2 weeks of the survey, 7.8% (95% CI: 5.4 - 11.1) of the population who had oral health problems without any other illness, reported that this had prevented them from carrying out daily activities (at home, work or in school). In comparison, about 36.9% of the population who had oral health problems with at least one other illness (95% CI: 33.2 - 40.7) reported that this had prevented them from carrying out daily activities (at home, work or in school) (**Table 4.4**).

#### **4.2.3 Severity of recent oral health problems in the last two weeks where daily activities were affected**

Overall, among the estimated population who had recent oral health problems in the last two weeks and whose daily activities/performance were affected by oral health problems, the mean number of days where daily activities/performance were affected was 2.7 days [(95% CI: 2.4 - 3.0); min. 1.0, max. 14.0] (**Table 4.5**).

Among those with recent oral health problems only, the mean number of days where daily activities could not be performed due to oral health problems was 2.5 days [(95% CI: 1.7 - 3.3); min. 1.0, max. 7.0]. For those with recent oral health problems and with at least one illness, the mean number of days where daily activities could not be performed was 2.6 days [(95% CI: 2.2 - 2.9); min. 1.0, max. 14.0] (**Table 4.6**).

### **4.3 ORAL HEALTH SEEKING BEHAVIOR**

#### **4.3.1 Type of oral health seeking behavior**

The oral health seeking behavior of the population who sought care for their oral health problems in the last 2 weeks preceding the survey were as follows:

##### **4.3.1.1 Self-care/self-medicating oral health behavior**

The overall prevalence for self-care/self-medicating practices for recent oral health problems was 28.1% (95% CI: 23.1 - 33.7). There was no significant difference in prevalence across the sociodemographic groups (**Table 4.7**).

#### **4.3.1.2 Sought treatment or advice from healthcare providers**

The overall prevalence for those who sought care from healthcare providers for recent oral health problems was 21.9% (95% CI: 17.7 - 26.8). There was no significant difference in prevalence across the sociodemographic groups (Table 4.8).

#### **4.3.1.3 Purchased medication after obtaining advice from pharmacist**

The overall prevalence for those who purchased medication after obtaining advice from the pharmacist for recent oral health problems was 9.4% (95% CI: 6.8 - 12.9)

#### **4.3.1.4 Sought advice other than from a healthcare provider**

The overall prevalence for those who sought advice other than from a healthcare provider for recent oral health problems was 4.4% (95% CI: 2.7 - 7.0).

#### **4.3.1.5 Other oral health seeking behavior**

The overall prevalence for those with other oral health seeking behaviour for their recent oral health problems was 4.5% (95% CI: 2.6 - 7.5). There was no significant difference in prevalence across the sociodemographic groups.

### **4.3.2 Prevalence of population with oral health problems alone in the past two weeks and who did not seek care**

Among the estimated population with oral health problems alone in the past two weeks, 59.2 % did not seek care (95% CI: 53.3 - 64.8) for their problems. Only 21.9% (95% CI: 17.7 - 26.8) had sought care from a healthcare provider. There was no significant difference in prevalence across the sociodemographic groups (Table 4.9).

### **4.3.3 Perceived need for oral healthcare among those who did not seek care**

Among the estimated population with recent oral health problems and who did not seek care, only 13.4% (95% CI: 9.5 - 18.4) perceived that they needed oral healthcare.

### **4.3.4 Main reasons for not seeking care for recent oral health problems in the past two weeks**

Among the population who did not seek care for recent oral health problems, the main reason for not seeking care was the perception that their illness was not severe [81.9% (95% CI: 76.3 - 86.4)].

### 4.3.5 Preferred oral healthcare provider and reasons for choice in the last 12 months

The three most common reasons for the preferred choice of oral healthcare providers in the last 12 months, regardless of the type of facilities were distance [33.3% (95% CI: 31.7 - 34.9)] followed by cost [24.2% (95% CI: 22.8 - 25.7)] and waiting time [16.2% (95% CI: 15.2 - 17.2)] (**Table 4.10**).

#### 4.3.5.1 Government dental facility

More than 60% [63.3%, (95% CI: 61.6 - 65.0)] of the population preferred to seek oral healthcare at government dental facilities in the last 12 months. A higher prevalence was observed in the rural population [78.9%, (95% CI: 76.8 - 80.8)], among the population in the age groups less than 20 years age range and those with no formal education [78.9% (95% CI: 75.2 - 82.2)]. A lower prevalence was observed among the Chinese [41.8% (95% CI: 38.6 - 45.1)] and those with a gross monthly income of RM5,000 and above [40.5% (95% CI: 37.6 - 43.5)] (**Table 4.11**).

Among those who preferred to seek oral healthcare at government dental facilities, the three main reasons were “near” [43.5% (95% CI: 41.4 - 45.7)], “cheap” [39.4% (95% CI: 37.3 - 41.5)] and “used to facility” [9.5% (95% CI: 8.5 - 10.6)] (**Table 4.12**).

#### 4.3.5.2 Private dental facility

Slightly more than a third of the population [(35.4% (95% CI: 33.8 - 37.1)] preferred to seek oral healthcare at private dental facilities in the last 12 months. The prevalence was higher in the urban population [41.8% (95% CI: 39.7 - 43.9)] and among the Chinese [56.9% (95% CI: 53.6 - 60.2)]. A higher proportion of those with tertiary level education [59.6% (95% CI: 56.9 - 62.2)] and those with a gross monthly income of RM 5,000 and above [58.4% (95% CI: 55.4 - 61.3)] also preferred to seek oral healthcare at private dental facilities (**Table 4.11**).

Among those who preferred to seek oral healthcare at private dental facilities, the three main reasons cited were “short waiting time” [38.2% (95% CI: 36.2 - 40.3)], “near” (19.6%, 95% CI: 17.8 - 21.4)] and “used to facility” [19.4% (95% CI: 17.7 - 21.2)] (**Table 4.13**).

#### 4.3.5.3 Traditional or complementary medicine facility

Only a very small proportion of population preferred to seek oral healthcare at traditional/complementary medicine facility for oral health problems in the last 12 months [0.1% (95% CI: 0.1 - 0.2)] (**Table 4.11**).



#### 4.3.5.4 Other facilities

A very small proportion of population preferred to seek oral healthcare from facilities other than the aforementioned for oral health problems in the last 12 months [0.2% (95% CI: 0.2 - 0.3)] (**Table 4.11**).

## 4.4 ORAL HEALTHCARE UTILISATION

### 4.4.1 Timing of last visit for outpatient oral healthcare

The timing of the last visit for outpatient oral healthcare (dental visit) at a healthcare facility was as follows (**Table 4.14 – 4.15**):

#### 4.4.1.1 In the last 12 months

The prevalence of population who had a dental visit in the last 12 months was 22.4% (95% CI: 21.4 - 23.3). A higher prevalence was observed among females [24.5% (95% CI: 23.3 - 25.7)] and the population in age groups between the 5-19 age range. A higher prevalence was also seen among those who never married [23% (95% CI: 21.5 – 24.5)] as compared to other marital status groups. The prevalence was lower among those with no formal education [6.1% (95% CI: 4.8 – 7.7)] as compared to those who had or higher level education only. A higher proportion of government employees had their last dental visit in the last 12 months preceding the survey [27.4% (95% CI: 24.8 – 30.2)] as compared to other occupation groups. A higher prevalence was also observed among those earning RM5,000 and above [26.3% (95% CI: 24.3 – 28.4)] as compared to those in the income brackets of less than RM3,000.

#### 4.4.1.2 Between 1 year to less than 2 years ago

The prevalence of population who had their last dental visit between 1 year to less than 2 years ago was 11.1% (95% CI: 10.4 - 11.8). The prevalence was higher in the urban [11.8% (95% CI: 10.9 - 12.7)] and among females [12.3% (95% CI: 11.4 - 13.1)]. A higher prevalence was also observed among those with tertiary level education [15.1% (95% CI: 13.3 – 17.0)] as compared to those with primary level education [10.9% (95% CI: 9.9 – 11.9)]. Among the ethnic groups (excluding 'Other Bumiputera' and the 'Others'), a lower proportion of the 'Bumiputera Sarawak' had their last dental visit between 1 year to less than 2 years ago [4.6% (95% CI: 2.8-7.4)] as compared to the other ethnic groups.

#### **4.4.1.3 Between 2 years to less than 3 years ago**

The prevalence of population who last had a dental visit between 2 years to less than 3 years ago was 7.9% (95% CI: 7.5 - 8.4). A significantly higher prevalence was observed in the urban [8.7 % (95% CI: 8.1 - 9.3)] and those with tertiary level education [13.0% (95% CI: 11.6 - 14.6)].

#### **4.4.1.4 Between 3 years to less than 5 years ago**

The prevalence of population who had their last dental visit between 3 to less than 5 years ago was 5.2% (95% CI: 4.8 - 5.6).

#### **4.4.1.5 More than 5 years ago**

The prevalence of population who had their last dental visit more than 5 years ago was 16.8 % (95% CI: 16.2 - 17.6). The prevalence was higher among males [17.8% (95% CI: 16.8 - 18.7)] than females [15.9% (95% CI: 15.1 - 16.7)] and among the population groups aged 55 or more. It was also higher among the retirees [37.9% (95% CI: 34.9 – 41.0)] as compared to other work status groups. There was also a higher proportion of those in the marital groups of ‘separated’, ‘divorcee’ and ‘widow/er’ who had their last dental visit more than 5 years ago as compared to those who were married.

#### **4.4.1.6 Never had a dental visit before**

About one third of the population claimed that they had never had a dental visit before [33.6% (95% CI: 32.2 - 35.1)]. The prevalence was highest in Sarawak [52.4% (95% CI: 47.2 – 57.6)] as compared to the other states, except for Terengganu and Sabah. The prevalence was also higher in the rural population [37.8% (95% CI: 35.1 – 40.5)] and in males [36.1 % (95% CI: 34.3 - 37.8)]. Among the ethnic groups, the prevalence was also higher among those of ‘Others’ ethnicity [68.1% (95% CI: 63.0 – 72.8)]. A higher prevalence was also seen in those with no formal education [51.0% (95% CI: 45.9 – 56.0)] as compared to the other education level groups. There was a higher proportion of population who had never ever had a dental visit among those with a gross monthly income of less than RM2,000 as compared to those earning RM2,000 or more.

## 4.4.2 Outpatient oral healthcare utilisation in the last 12 months

### 4.4.2.1 Number of healthcare facilities visited

Majority of the population [95.1% (95% CI: 94.3 - 95.8)] had only visited one healthcare facility for oral healthcare in the last 12 months. A very small proportion of the population [2.1% (95% CI: 1.7 - 2.7)] had visited two to three facilities (**Table 4.16**).

### 4.4.2.2 Type of healthcare facilities where oral healthcare was sought

In the last 12 months, more than half of the population had visited the government dental clinic for oral healthcare [56.7% (95% CI: 55.2 – 58.3)] and a substantial proportion of the population had visited the private dental clinic [26.6% (95% CI: 25.3 – 28.0)]. A small proportion of population had sought oral healthcare at the government medical clinic [4.6% (95% CI: 3.9 – 5.4)] and government hospital [4.3% (95% CI: 3.7 – 5.1)]. In addition to these facilities, a very small proportion had visited private medical clinics for their oral health problems [1.1% (95% CI: 0.8 – 1.5)]. Overall, about two thirds of the population [67.0% (95% CI: 65.5 – 68.4)] had sought oral healthcare in government healthcare facilities and about a third [32.1% (95% CI: 30.6 – 33.5)] at private healthcare facilities (**Table 4.17**).

### 4.4.2.3 Mean number of visits to government healthcare facilities in the last 12 months

Overall, the mean number of visits to healthcare facilities in the last 12 months was 1.26 visit (SD,0.96), with a median of 1 visit (IQR, 1.0 – 1.0) (**Table 4.18**). The mean number of visits to government healthcare facilities in the last 12 months was 1.23 visit (SD,0.88), with a median of 1 visit (IQR, 1.0 – 1.0) (**Table 4.18**). About 85.8% (95% CI: 84.3 - 87.2) of the total number of visits to government healthcare facilities for oral healthcare in the last 12 months were only single visits. Less than ten percent of the total number of visits were two visits [7.2% (95% CI: 6.0 - 8.5)] and about 4.4% (95% CI: 3.8 - 5.2) were more than two visits (**Table 4.19**).

### 4.4.2.4 Mean number of visits to private healthcare facilities in the last 12 months

The mean number of visits to private healthcare facilities in the last 12 months was 1.34 visit (SD,1.11), with a median of 1 visit (IQR, 1.0 – 1.0) (**Table 4.18**). About 80.7% (95% CI: 78.3 - 83.0) of the total number of visits to private healthcare facilities in the last 12 months for oral healthcare were only once.

A further 13.1% (95% CI: 11.3 – 15.2) were twice and a slight proportion were more than twice [5.7% (95% CI: 4.4 - 7.3)] (**Table 4.20**).

#### 4.4.2.5 Distance to healthcare facility in the last 12 months

Overall, the mean distance travelled to seek oral healthcare in the last 12 months was 7.20 km (SD, 19.42), with a median of 3.0 km (IQR, 0.5 – 8.0) (**Table 4.18**).

By facilities, the mean distance travelled to seek oral healthcare at government healthcare facilities in the last 12 months was 5.31 km (SD, 15.49), with a median of 2 km (IQR, 0.2 – 5.0) (**Table 4.18**). More than half of the distances [55.0% (95% CI: 53.2 - 56.8)] travelled to seek oral healthcare at government healthcare facilities in the last 12 months were less than 5 km. Slightly less than a fifth of the distances travelled [18.6% (95%CI: 17.2 - 20.1)] were between 5-10 km and about 8.6% (95% CI: 7.6 – 9.7) were more than 10 km (**Table 4.21**).

The mean distance travelled to seek oral healthcare at private healthcare facilities in the last 12 months was 10.84 km (SD, 24.91), with a median of 5 km (IQR, 2.0 – 10.0) (**Table 4.18**). Slightly more a third of the distances [36.2% (95% CI: 33.5 - 39.0)] travelled to seek oral healthcare at private healthcare facilities in the last 12 months were less than 5 km. Another third of the total number of distances [32.2% (95% CI: 29.6 - 34.9)] travelled were between 5-10 km and about one fifth [21.2% (95% CI: 19.0 - 23.6)] were more than 10 km (**Table 4.22**).

By location, the mean distance travelled to seek oral healthcare in the urban in the last 12 months was 6.66 km (SD, 17.29), with a median of 3.0 km (IQR, 1.0 – 8.0) (**Table 4.18**). Slightly less than half of the distances travelled [49.1% (95% CI: 47.2 - 51.1)] to seek oral healthcare at urban healthcare facilities in the last 12 months were less than 5 km. The prevalence of distance travelled to seek oral healthcare in the urban healthcare facilities of less than 5 km was significantly lower in Sarawak [33.5% (95%CI: 26.3-41.6)] as compared to other states except for Pahang, Perak, Terengganu, Sabah/Labuan and WP Kuala Lumpur. A quarter of the distances travelled were between 5-10 km [25.5% (95%CI: 23.9 - 27.3)] and about 11.7% (95% CI: 10.5 – 13.0) were more than 10 km (**Table 4.23**).

In the rural, the corresponding mean distance was 8.75 km (SD, 24.44), with a median of 2.0 km (IQR, 0.2 – 9.0) (**Table 4.18**). Slightly less than half of the distances travelled to seek oral healthcare at rural healthcare facilities in the last 12 months were less than 5 km [47.9% (95% CI: 45.6 – 50.2)] . The prevalence of distance travelled to seek oral healthcare in the rural healthcare facilities of less than 5 km was significantly lower in Sabah [37.7% (95%CI: 31.9-43.9)] as compared to other states except for Kelantan, Perak, Perlis, Selangor, Terengganu and Sarawak. Less than a fifth of the distances travelled were [15.8% (95% CI: 14.2 - 17.5)] and more than 10 km [15.0% (95% CI:13.4-16.8)] (**Table 4.24**) .

By region, the mean distance travelled to seek oral healthcare in Peninsular Malaysia in the last 12 months was 6.61 km (SD, 15.90), with a median of 3.0 km (IQR, 0.5 – 8.0). In Sabah/Labuan, the corresponding mean distance was 11.62 km (SD, 40.52), with a median of 4.3 km (IQR, 1.5 – 9.0 ). The mean distance travelled to seek oral healthcare in Sarawak in the last 12 months was 8.90 km (SD, 13.30), with a median of 5 km (IQR, 2.0 – 10.0) (**Table 4.18**).

#### 4.4.2.6 Travelling time to healthcare facility in the last 12 months

Overall the mean travelling time to seek oral healthcare in the last 12 months was 16.24 minutes (SD, 22.04), with a median of 10 minutes (IQR, 5.0 – 20.0) (**Table 4.18**).

By type of facilities, the mean travelling time to seek oral healthcare at government healthcare facilities in the last 12 months was 14.03 minutes (SD, 18.48), with a median of 10 minutes (IQR, 5.0 – 15.0) (**Table 4.18**). About half of the travelling times to government healthcare facilities in the last 12 months were 30 minutes or less [50.1% (95% CI: 48.3 - 51.9)].The prevalence of travelling time of 30 minutes or less was significantly higher in WP Putrajaya [92.3% (95% CI: 87.3 - 95.4)] and in urban locations [54.0% (95% CI: 51.6 - 56.4)]. The prevalence of travelling time of between 31- 60 minutes was 7.4% (95% CI: 6.2 - 8.7) while the prevalence for travelling times of more than an hour was 0.7% (95% CI: 0.4 - 1.0) (**Table 4.25**).

The mean travelling time to seek oral healthcare at private healthcare facilities in the last 12 months was 19.27 minutes (SD, 25.85), with a median of 15 minutes (IQR, 10.0 – 20.0) (**Table 4.18**). About 70.4% (95% CI: 67.8 - 72.8) of the travelling times to private healthcare facilities in the last 12 months were 30 minutes or less. The prevalence of travelling time of 30 minutes or less was significantly higher in urban locations [(73.6% (95%CI: 70.7 - 76.3)]. The prevalence of travelling time of between 31-60 minutes was 16.5% (95% CI:

14.4 - 18.8) while the prevalence for travelling times of more than an hour was 1.7% (95% CI: 1.2 - 2.5) (**Table 4.26**).

By location, the mean travelling time to seek oral healthcare in the urban healthcare facilities in the last 12 months was 15.44 minutes (SD, 21.67), with a median of 10 minutes (IQR, 5.0 – 20.0) (**Table 4.18**). Slightly less than two-third of the travelling times to urban healthcare facilities in the last 12 months were 30 minutes or less [61.0% (95% CI: 59.2 - 62.9)]. The prevalence of travelling time of 30 minutes or less was significantly lower in Pahang [46.2% (95% CI: 38.3 – 54.3)] as compared to Johor, Selangor, WP Kuala Lumpur and WP Putrajaya . The prevalence of travelling time of between 31- 60 minutes was 10.0% (95% CI: 8.7 -11.5) while the prevalence for travelling times of more than an hour was 0.6 % (95% CI: 0.4 - 1.0) (**Table 4.27**).

In the rural, the corresponding mean travelling time was 18.88 minutes (SD, 23.04), with a median of 10 minutes (IQR, 5.0 – 20.0) (**Table 4.18**). Less than half of the travelling times to urban healthcare facilities in the last 12 months were 30 minutes or less [43.6% (95% CI: 41.3 - 46.0)].The prevalence of travelling time of 30 minutes or less was significantly lower in Kelantan [30.3% (95% CI: 23.3 - 38.3)] as compared to other states except for Negeri Sembilan, Perak, Terengganu, Sabah/Labuan and Sarawak. The prevalence of travelling time of between 31- 60 minutes was 10.8% (95% CI: 9.4 -12.4) while the prevalence for travelling times of more than an hour was 2.1 % (95% CI: 1.5 – 2.8) (**Table 4.28**).

By region, the mean travelling time to seek oral healthcare in Peninsular Malaysia in the last 12 months was 14.85 minutes (SD, 19.88), with a median of 10 minutes (IQR, 5.0 – 15.0). In Sabah/Labuan, the corresponding mean travelling time was 25.30 minutes (SD, 34.24), with a median of 20.0 minutes (IQR, 10.0– 30.00). The mean travelling time to seek oral healthcare in Sarawak in the last 12 months was 22.41 minutes (SD, 24.05), with a median of 15 minutes (IQR, 10.0 – 30.0) (**Table 4.18**).

#### **4.4.2.7 Mode of transport to healthcare facility visited in the last 12 months**

The three most common modes of transport used to travel to government healthcare facilities were as follows; “by walking” [41.8% (95% CI: 40.1 – 43.4)], “by own car” [28.9% (95% CI: 27.3 – 30.5)] and use of “own motorcycle” [12.8% (95% CI: 11.7 – 14.1)]. To travel to private healthcare facilities, the three most common modes of transport used were “use of own

car” [74.9% (95% CI: 72.4 – 77.3)], “by own motorcycle” [12.1% (95% CI: 10.4 – 14.0)] and use of “public transport “[4.5% (95% CI: 3.6 – 5.7)] (Table 4.29).

#### 4.4.3 Recommendation of oral healthcare providers to others

A fairly high proportion of population who sought oral healthcare at government healthcare facilities would recommend such facilities to others [69.0% (95% CI: 67.3 – 70.7)]. Comparatively, a slightly higher proportion of population who sought oral healthcare at private healthcare facilities, would recommend such facilities to others [73.4% (95% CI: 70.8 – 75.8)] (Table 4.30).

## 4.5 IMPLICATIONS AND COMPARISONS

Good oral health is an integral part of general health and dental check-ups should be perceived as an important component of annual health screening. The findings in this study showed that recent oral health problems without any other illness in the last two weeks affected daily activities to as much as two and a half days. The findings also showed that, 4 out of 5 people did not have a dental visit in the last 12 months preceding the survey. In addition, the majority of the population would seek oral healthcare only when they perceived their oral health problems to be serious. These findings are in line with the findings in the National Oral Health Survey of Adults 2010 (NOHSA 2010) where as high as 56.6% of the population cited having had a dental problem as the reason for their last dental visit.

Findings from the Third Health and Morbidity Survey in 2006 (NMHS III) showed that about 1 in 4 of the population had never had a dental visit. In this study, it was found that about 1 in 3 had never had a dental visit. These findings indicate a compelling need to enhance the oral health awareness of the population as well as to strengthen the promotion of individual responsibility towards good oral health. The findings of this survey also showed that the mean distance and travelling time for seeking oral healthcare in Sabah and Sarawak were comparatively higher than those at Peninsular Malaysia. Further comparison of findings between recent national surveys in Malaysia are summarised as follows.

## Comparing oral health problem, oral health seeking behavior and utilisation from recent surveys in Malaysia

	NHMS III <sup>1</sup>	NOHSA 2010 <sup>2</sup> (adults aged 15 years and above)	NHMS 2011 <sup>3</sup>
<b>Population with recent oral health problem</b>			
a) Recall period for survey	4 weeks	na	2 weeks
b) Estimated percentage of population with recent oral health problem	10.0%	na	5.7 %
<b>Oral health seeking behavior</b>			
a) Recall period for survey	One year	Less than one year	2 weeks
b) Estimated percentage of population who had sought oral healthcare	19.5%	27.4%	21.9%
c) Most common source of oral healthcare/oral healthcare provider and estimated percentage of population	Government dental clinic (53.7%)	Government dental clinic (56.1%)	Self care (28.1%)
d) Preferred oral healthcare provider and estimated percentage of population	na	Government dental clinic (66.3%)	Government dental clinic (63.3%)
<b>Oral healthcare utilisation</b>			
a) Estimated percentage of population who had never ever sought oral healthcare	28.3%	7.8%	33.6%
b) Estimated percentage of population who had a dental visit within last 12 months	19.5%	27.4%	22.4%

### Note:

<sup>1</sup> National Health and Morbidity Survey 2006 (NHMS III)

<sup>2</sup> National Oral Health Survey of Adults 2010 (Unpublished weighted data)

<sup>3</sup> National Health and Morbidity Survey 2011

na: not available

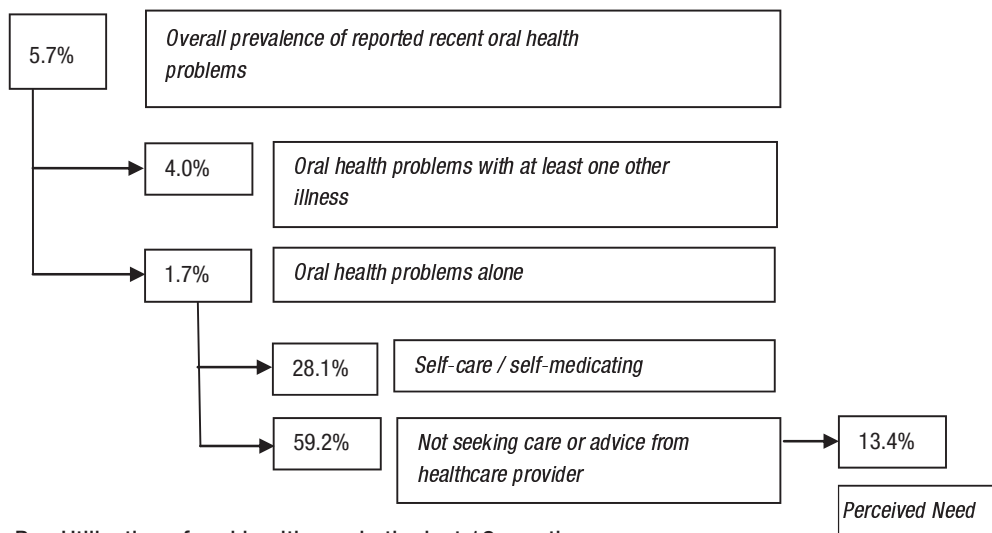


### 4.6 CONCLUSION

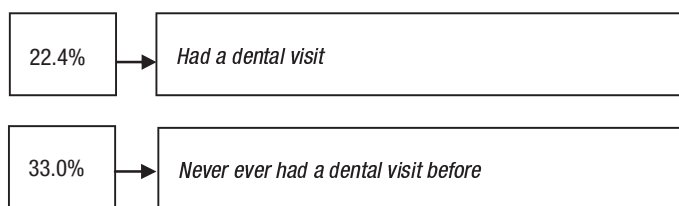
Notwithstanding the limitations of the study, the survey has yielded several important findings with respect to the oral health seeking behavior and utilisation of oral healthcare. The key findings of the survey are summarised in the illustration in **Figure 4.1**. These findings provide evidence for a need to review current oral health promotion strategies and to identify paradigm shifts for addressing the behavioral determinants towards the improvement of the oral health status of the population. There is also a need to improve the accessibility to oral healthcare services in Sabah and Sarawak.

**Figure 4.1: Summary of oral health problems, healthcare seeking behavior and oral healthcare utilization**

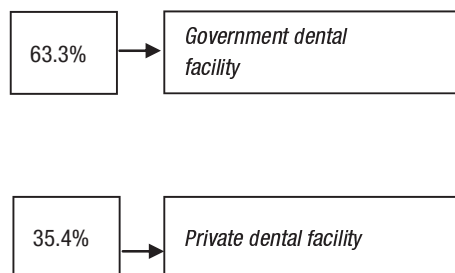
**A. Reported oral health problems in the past 2 weeks**



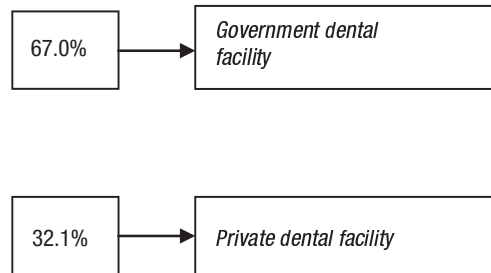
**B. Utilisation of oral healthcare in the last 12 months**



**C. Preferred oral healthcare provider**



**D. Actual utilisation for oral healthcare in the last 12 months**



## 4.7 RECOMMENDATIONS

Taking into cognisance the findings of the study, the following recommendations are made:

1. Strengthening oral health awareness and advocacy on the importance of annual dental check-ups in oral health promotion messages.
2. Utilisation of social media (eg. Twitter, Facebook, etc) as a vehicle in promoting oral health.
3. Strengthening strategic collaborative efforts with other stakeholders and agencies to improve oral health promotion, including increasing the role of mass media in oral health promotion.
4. Further research in oral health promotion to evaluate the effectiveness of oral health promotion among the various target groups in the delivery of oral healthcare for these population groups.
5. Developing further expertise in the behavioral science of oral health promotion for various population groups.
6. Improving accesibility to oral healthcare facilities in Sabah and Sarawak.
7. To consider the inclusion of annual dental check-up in future healthcare financing mechanisms in addition to other curative oral healthcare items.

## 4.8 TABLES OF FINDINGS

**Table 4.1: Prevalence of reported oral health problems in the last 2 weeks**

Sociodemographic Characteristics	Count	Estimated Population	% (Prevalence)	95% CI	
				Lower	Upper
<b>MALAYSIA</b>	1,511	1,545,998	5.7	5.2	6.2
<b>State</b>					
Johor	194	267,383	8.4	7.0	10.0
Kedah	78	84,477	4.6	3.2	6.5
Kelantan	28	21,741	1.5	1.0	2.1
Melaka	70	29,879	3.8	2.5	5.7
Negeri Sembilan	74	47,307	4.8	2.9	7.9
Pahang	66	59,806	4.3	3.0	6.2
Penang	40	31,211	2.0	1.3	3.2
Perak	96	135,896	6.1	4.4	8.3
Perlis	57	9,175	4.2	3.1	5.8
Selangor	216	259,838	4.8	3.9	5.9
Terengganu	60	31,146	3.1	2.3	4.2
Sabah/Labuan	283	298,307	9.3	7.0	12.2
Sarawak	116	138,667	6.0	4.8	7.5
WP Kuala Lumpur	72	126,017	7.8	5.8	10.3
WP Putrajaya	61	5,147	7.3	5.5	9.7
<b>Location</b>					
Urban	838	1,042,613	5.3	4.8	6.0
Rural	673	503,385	6.5	5.7	7.4
<b>Sex</b>					
Male	658	717,868	5.1	4.6	5.8
Female	853	828,130	6.2	5.6	6.9
<b>Age Group</b>					
0-4	58	51,562	2.2	1.6	2.9
5-9	179	165,156	6.4	5.2	7.7
10-14	134	127,276	4.8	3.9	5.9
15-19	146	181,875	6.6	5.1	8.6
20-24	144	194,204	7.2	5.7	9.0
25-29	129	180,059	6.9	5.5	8.6
30-34	111	129,092	6.2	5.0	7.8
35-39	108	102,208	5.5	4.4	7.0
40-44	117	109,212	6.3	5.1	7.9
45-49	127	116,233	7.4	5.9	9.3
50-54	94	66,252	5.0	3.9	6.5
55-59	70	48,384	4.7	3.5	6.3
60-64	37	28,536	3.7	2.5	5.4
65-69	26	19,218	3.9	2.4	6.2
70-74	18	15,512	4.2	2.4	7.4
75+	13	11,218	2.6	1.4	4.9
<b>Ethnicity</b>					
Malay	857	784,254	5.5	5.0	6.1
Chinese	206	281,799	4.4	3.7	5.4
Indian	108	104,060	5.7	4.0	7.9
Bumiputera Sabah	165	203,035	9.5	6.5	13.8
Bumiputera Sarawak	64	73,278	6.5	4.9	8.7
Other Bumiputera	4	3,274	6.5	4.4	9.6
Others	107	96,298	6.2	4.3	8.8

Sociodemographic Characteristics	Count	Estimated Population	% (Prevalence)	95% CI	
				Lower	Upper
<b>MALAYSIA</b>	1,511	1,545,998	5.7	5.2	6.2
<b>Marital Status</b>					
Never Married	404	510,443	6.5	5.5	7.6
Married	723	692,361	6.0	5.4	6.6
Separated	4	8,290	7.3	2.3	20.9
Divorcee	19	14,279	4.9	2.8	8.5
Widow/er	41	29,764	3.8	2.6	5.5
<b>Education Level</b>					
No formal education	96	88,752	7.3	5.5	9.5
Primary	418	388,846	5.4	4.7	6.3
Secondary	547	605,412	6.2	5.5	7.1
Tertiary	242	273,345	6.4	5.4	7.6
Unclassified	75	69,720	4.3	3.2	5.8
<b>Occupation</b>					
Government	136	109,596	7.0	5.6	8.8
Semi-government	12	10,704	4.2	2.0	8.6
Private	355	447,419	6.4	5.5	7.4
Self-employed	189	196,886	5.9	4.5	7.7
Unpaid worker/homemaker	184	171,502	6.2	5.2	7.5
Retiree	66	50,093	3.8	2.8	5.0
<b>Household Income Group (RM)</b>					
Less than RM400	100	100,170	5.0	3.8	6.4
RM400 – RM499	23	27,085	6.5	4.0	10.5
RM500 – RM699	59	51,735	5.5	3.8	7.8
RM700 – RM999	95	88,838	5.4	4.1	7.0
RM1000 – RM1999	277	289,371	5.7	4.4	7.3
RM2000 – RM2999	268	265,252	5.8	4.9	6.8
RM3000 – RM3999	185	184,212	5.0	4.1	6.1
RM4000 – RM4999	142	148,665	5.6	4.4	7.0
RM5000 and above	362	390,670	6.3	5.4	7.3

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

**Table 4.2: Prevalence of oral health problems without any other illness in the last 2 weeks**

Sociodemographic Characteristics	Count	Estimated Population	% (Prevalence)	95% CI	
				Lower	Upper
<b>MALAYSIA</b>	478	460,683	1.7	1.5	1.9
<b>State</b>	478				
Johor	54	73,649	2.3	1.7	3.1
Kedah	24	23,191	1.3	0.7	2.2
Kelantan	17	14,557	1.0	0.6	1.5
Melaka	25	10,304	1.3	0.7	2.3
Negeri Sembilan	23	16,647	1.7	1.0	2.8
Pahang	22	19,207	1.4	0.8	2.4
Penang	21	17,636	1.2	0.7	1.9
Perak	32	44,699	2.0	1.4	2.9
Perlis	21	3,322	1.5	0.9	2.5
Selangor	53	59,355	1.1	0.8	1.5
Terengganu	35	17,472	1.7	1.1	2.6
Sabah/Labuan	74	73,572	2.3	1.7	3.1
Sarawak	40	50,486	2.2	1.6	3.0
WP Kuala Lumpur	22	35,332	2.2	1.3	3.6
WP Putrajaya	15	1,256	1.8	1.0	3.2
<b>Location</b>					
Urban	274	316,992	1.6	1.4	1.9
Rural	204	143,692	1.8	1.5	2.2
<b>Sex</b>					
Male	213	219,630	1.6	1.3	1.9
Female	265	241,054	1.8	1.6	2.1
<b>Age Group</b>					
0-4	16	14,522	0.6	0.4	1.1
5-9	78	71,690	2.8	2.1	3.6
10-14	39	32,601	1.2	0.9	1.8
15-19	48	51,814	1.9	1.3	2.6
20-24	34	40,456	1.5	1.0	2.2
25-29	37	53,876	2.1	1.4	3.0
30-34	36	35,669	1.7	1.2	2.6
35-39	38	33,807	1.8	1.3	2.6
40-44	33	26,996	1.6	1.0	2.4
45-49	41	32,729	2.1	1.4	3.1
50-54	37	32,879	2.5	1.7	3.7
55-59	19	13,218	1.3	0.7	2.2
60-64	6	4,315	0.6	0.2	1.3
65-69	7	7,824	1.6	0.7	3.7
70-74	6	5,708	1.6	0.5	4.5
75+	3	2,577	0.6	0.2	2.3
<b>Ethnicity</b>					
Malay	270	227,002	1.6	1.4	1.9
Chinese	82	111,125	1.8	1.4	2.2
Indian	26	25,091	1.4	0.8	2.2
Bumiputera Sabah	20	24,589	2.2	1.4	3.5
Bumiputera Sarawak	48	41,098	1.9	1.3	2.8
Other Bumiputera	2	689	1.4	0.2	9.3
Others	30	31,090	2.0	1.2	3.3
<b>Marital Status</b>					
Never Married	111	131,435	1.7	1.3	2.1
Married	230	204,781	1.8	1.5	2.1
Separated	1	4,032	3.5	0.5	21.0
Divorcee	2	2,140	0.7	0.2	3.1
Widow/er	8	6,524	0.8	0.4	1.9

Sociodemographic Characteristics	Count	Estimated Population	% (Prevalence)	95% CI	
				Lower	Upper
<b>MALAYSIA</b>	478	460,683	1.7	1.5	1.9
<b>Education Level</b>	478				
No formal education	25	23,752	1.9	1.1	3.3
Primary	133	112,169	0.2	1.3	1.9
Secondary	177	174,721	1.8	1.5	2.2
Tertiary	68	76,639	1.8	1.4	2.4
Unclassified	31	31,701	2.0	1.3	3.0
<b>Occupation</b>					
Government	42	29,598	1.9	1.3	2.8
Semi-government	2	1,203	0.5	0.1	2.8
Private	112	130,450	1.9	1.5	2.3
Self-employed	55	50,441	1.5	1.1	2.1
Unpaid worker/homemaker	59	51,062	1.9	1.4	2.6
Retiree	19	17,290	1.3	0.7	2.3
<b>Household Income Group (RM)</b>					
Less than RM400	31	29,995	1.5	1.0	2.1
RM400 – RM499	5	7,923	1.9	0.8	4.6
RM500 – RM699	21	19,870	2.1	1.2	3.5
RM700 – RM999	22	19,316	1.2	0.7	1.9
RM1000 – RM1999	94	84,093	1.7	1.3	2.1
RM2000 – RM2999	92	98,196	2.1	1.7	2.7
RM3000 – RM3999	57	49,652	1.3	1.0	1.9
RM4000 – RM4999	46	42,273	1.6	1.1	2.4
RM5000 and above	110	109,366	1.8	1.4	2.2

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

**Table 4.3: Prevalence of oral health problems with at least one other illness in the last 2 weeks**

Sociodemographic Characteristics	Count	Estimated Population	% (Prevalence)	95% CI	
				Lower	Upper
<b>MALAYSIA</b>	1,033	1,085,314	4.0	3.6	4.4
<b>State</b>					
Johor	140	193,734	6.1	5.0	7.4
Kedah	54	61,286	3.3	2.1	5.2
Kelantan	11	7,184	0.5	0.3	0.9
Melaka	45	19,574	2.5	1.6	3.9
Negeri Sembilan	51	30,660	3.1	1.8	5.5
Pahang	44	40,599	2.9	2.0	4.3
Penang	19	13,675	1.4	0.9	2.1
Perak	64	91,197	4.1	2.8	5.9
Perlis	36	5,854	2.7	1.9	3.8
Selangor	163	200,484	3.7	3.0	4.6
Terengganu	25	13,675	1.4	0.9	2.1
Sabah/Labuan	209	224,736	7.0	4.9	9.9
Sarawak	76	88,181	3.8	2.8	5.1
WP Kuala Lumpur	50	90,686	5.6	4.1	7.6
WP Putrajaya	46	3,891	5.5	3.9	7.8
<b>Location</b>					
Urban	564	725,621	3.7	3.2	4.3
Rural	469	359,693	4.6	4.0	5.4
<b>Sex</b>					
Male	445	498,238	3.6	3.1	4.1
Female	588	587,076	4.4	3.9	5.0
<b>Age Group</b>					
0-4	42	37,041	1.6	1.1	2.2
5-9	101	93,466	3.6	2.8	4.6
10-14	95	94,675	3.6	2.8	4.6
15-19	98	130,061	4.7	3.4	6.6
20-24	110	153,748	5.7	4.4	7.3
25-29	92	126,183	4.8	3.7	6.3
30-34	75	93,423	4.5	3.5	5.9
35-39	70	68,401	3.7	2.7	5.1
40-44	84	82,216	4.8	3.7	6.2
45-49	86	83,504	5.3	4.1	6.9
50-54	57	33,372	2.5	1.8	3.5
55-59	51	35,166	3.4	2.4	4.9
60-64	31	24,220	3.1	2.0	4.8
65-69	19	11,395	2.3	1.3	4.0
70-74	12	9,804	2.7	1.4	5.1
75+	10	8,641	2.0	1.0	4.1
<b>Ethnicity</b>					
Malay	587	557,252	3.9	3.5	4.4
Chinese	124	170,674	2.7	2.1	3.5
Indian	82	78,969	4.3	3.0	6.1
Bumiputera Sabah	117	161,937	7.6	4.7	12.1
Bumiputera Sarawak	44	48,689	4.3	3.0	6.2
Other Bumiputera	2	2,585	5.1	3.0	8.8
Others	77	65,208	4.2	2.6	6.2
<b>Marital Status</b>					
Never Married	293	379,008	4.8	3.9	5.8
Married	493	487,580	4.2	3.7	4.8
Separated	3	4,258	3.7	0.9	13.5
Divorcee	17	12,140	4.2	2.2	7.6
Widow/er	33	23,240	3.0	2.0	4.5

Sociodemographic Characteristics	Count	Estimated Population	% (Prevalence)	95% CI	
				Lower	Upper
<b>MALAYSIA</b>	1,033	1,085,314	4.0	3.6	4.4
<b><i>Education Level</i></b>					
No formal education	71	65,000	5.3	3.9	7.2
Primary	285	276,676	3.9	3.2	4.6
Secondary	370	430,691	4.4	3.8	5.2
Tertiary	174	196,707	4.6	3.7	5.7
Unclassified	44	38,020	2.3	1.6	3.4
<b><i>Occupation</i></b>					
Government	94	79,998	5.1	3.9	6.7
Semi-government	10	9,501	3.7	1.7	8.1
Private	243	316,969	4.5	3.8	5.4
Self-employed	134	146,445	4.4	3.1	6.1
Unpaid worker/homemaker	125	120,440	4.4	3.5	5.4
Retiree	47	32,803	2.5	1.7	3.5
<b><i>Household Income Group (RM)</i></b>					
Less than RM400	69	70,175	3.5	2.5	4.8
RM400 – RM499	18	19,162	4.6	2.5	8.5
RM500 – RM699	38	31,866	3.4	2.3	5.0
RM700 – RM999	73	69,522	4.2	3.1	5.6
RM1000 – RM1999	183	205,278	4.0	2.9	5.6
RM2000 – RM2999	176	167,056	3.6	3.0	4.4
RM3000 – RM3999	128	134,560	3.6	2.9	4.6
RM4000 – RM4999	96	106,392	4.0	3.0	5.3
RM5000 and above	252	281,304	4.5	3.8	5.4

Note: Some cells have respondent count < 30. Results should be interpreted with caution



**Table 4.4: Prevalence of oral health problems with at least one health illness in the last 2 weeks, with daily activities affected**

Sociodemographic Characteristics	Count	Estimated Population	% (Prevalence)	95% CI	
				Lower	Upper
<b>MALAYSIA</b>	372	400,395	36.9	33.2	40.7
<b>State</b>					
Johor	53	78,759	40.7	31.1	51.0
Kedah	16	16,731	27.3	18.0	39.1
Kelantan	2	1,220	17.0	3.8	51.4
Melaka	13	4,282	21.9	9.6	42.3
Negeri Sembilan	23	13,125	15.9	8.9	26.7
Pahang	16	14,259	35.1	20.0	54.0
Penang	6	5,726	42.2	12.7	78.5
Perak	23	35,667	39.1	23.5	57.3
Perlis	12	1,865	31.9	16.4	52.7
Selangor	64	78,491	39.2	30.9	48.1
Terengganu	8	4,341	31.7	15.5	54.2
Sabah/Labuan	78	84,561	37.6	30.3	45.5
Sarawak	26	30,581	34.7	23.4	47.9
WP Kuala Lumpur	19	29,729	32.8	23.0	44.4
WP Putrajaya	13	1,058	27.2	16.0	42.3
<b>Location</b>					
Urban	194	267,675	36.9	32.2	41.8
Rural	178	132,719	36.9	31.3	42.9
<b>Sex</b>					
Male	168	180,397	36.2	30.0	42.9
Female	204	219,998	37.5	32.2	43.1
<b>Age Group</b>					
0-4	22	21,320	57.6	40.8	72.7
5-9	44	40,165	43.0	30.4	56.6
10-14	42	42,838	45.2	33.0	58.1
15-19	25	28,530	21.9	13.1	34.3
20-24	36	68,791	44.7	32.5	57.7
25-29	37	46,355	36.7	25.7	49.4
30-34	22	27,393	29.3	19.4	41.6
35-39	19	18,310	26.8	15.8	41.5
40-44	29	32,160	39.1	26.8	53.0
45-49	32	30,699	36.8	25.5	49.7
50-54	20	11,322	33.9	20.5	50.6
55-59	16	10,587	30.1	16.9	47.8
60-64	11	8,007	33.1	17.9	52.8
65-69	5	3,439	30.2	10.9	60.4
70-74	8	7,114	72.6	39.8	91.4
75+	4	3,365	38.9	12.0	74.9
<b>Ethnicity</b>					
Malay	214	206,790	37.1	32.4	42.1
Chinese	34	48,976	28.7	21.0	37.8
Indian	36	38,117	48.3	29.4	67.6
Bumiputera Sabah	42	55,995	34.6	26.5	43.7
Bumiputera Sarawak	18	22,658	46.5	29.7	64.2
Other Bumiputera	2	2,585	100	100	100
Others	26	25,274	38.8	23.3	56.9
<b>Marital Status</b>					
Never Married	96	135,067	35.6	28.8	43.1
Married	165	163,496	33.5	28.4	39.0
Separated	2	1,508	35.4	4.5	86.3
Divorcee	7	4,669	38.5	15.5	68.0
Widow/er	14	10,958	47.1	28.8	66.3

Sociodemographic Characteristics	Count	Estimated Population	% (Prevalence)	95% CI	
				Lower	Upper
<b>MALAYSIA</b>	372	400,395	36.9	33.2	40.7
<b><i>Education Level</i></b>					
No formal education	30	30,285	47.3	32.3	62.8
Primary	103	104,485	37.8	30.4	45.8
Secondary	118	143,487	33.3	27.3	39.9
Tertiary	60	71,028	35.9	28.0	44.7
Unclassified	22	16,355	43.0	27.1	60.5
<b><i>Occupation</i></b>					
Government	31	24,083	30.1	18.8	44.5
Semi-government	3	3,322	35.0	7.4	78.2
Private	85	121,112	38.2	31.1	45.9
Self-employed	44	42,756	29.2	18.3	43.2
Unpaid worker/homemaker	37	37,196	30.9	21.7	41.9
Retiree	19	16,024	48.8	33.5	64.4
<b><i>Household Income Group (RM)</i></b>					
Less than RM400	34	35,676	50.8	36.0	65.7
RM400 – RM499	8	7,630	39.8	17.2	67.9
RM500 – RM699	11	7,869	24.7	11.3	45.7
RM700 – RM999	21	17,143	24.7	14.9	37.9
RM1000 – RM1999	74	94,621	46.1	37.0	55.5
RM2000 – RM2999	52	49,725	29.8	22.2	38.6
RM3000 – RM3999	50	50,072	37.2	28.7	46.6
RM4000 – RM4999	34	43,074	40.5	28.9	53.2
RM5000 and above	88	94,584	33.6	26.7	41.4

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

**Table 4.5: Mean number of days where activities were affected by oral health problems in the last 2 weeks**

Sociodemographic Characteristics	Count	Estimated Population	Mean	95% CI		Min.	Max.
				Lower	Upper		
<b>MALAYSIA</b>	259	257,781	2.7	2.4	3.0	1.0	14.0
<b>State</b>							
Johor	28	34,954	2.6	1.8	3.3	1.0	7.0
Kedah	11	10,886	3.4	1.9	4.8	1.0	7.0
Kelantan	3	2,303	7.3	0.0	22.5	2.0	14.0
Melaka	9	1,936	1.6	1.0	2.1	1.0	3.0
Negeri Sembilan	9	6,595	5.0	0.8	9.2	1.0	14.0
Pahang	12	10,202	3.8	1.2	6.4	1.0	14.0
Penang	8	7,479	3.4	0.0	7.0	1.0	14.0
Perak	21	25,226	2.1	1.2	3.0	1.0	7.0
Perlis	8	1,750	2.9	0.7	5.0	1.0	7.0
Selangor	42	50,841	2.3	1.6	3.0	1.0	14.0
Terengganu	8	4,078	3.0	1.5	4.5	1.0	7.0
Sabah/Labuan	60	62,026	2.3	1.9	2.7	1.0	7.0
Sarawak	25	28,835	3.4	2.0	4.9	1.0	14.0
WP Kuala Lumpur	6	9,998	-	-	-	-	-
WP Putrajaya	9	672	1.2	0.9	1.6	1.0	2.0
<b>Location</b>							
Urban	119	154,993	2.2	1.9	2.6	1.0	14.0
Rural	140	102,787	3.0	2.5	3.5	1.0	14.0
<b>Sex</b>							
Male	114	115,459	2.6	2.2	3.1	1.0	14.0
Female	145	142,322	2.7	2.2	3.2	1.0	14.0
<b>Age Group</b>							
0-4	16	15,701	2.7	2.1	3.3	1.0	5.0
5-9	40	37,021	2.5	1.7	3.3	1.0	14.0
10-14	30	26,722	2.2	1.7	2.7	1.0	7.0
15-19	21	23,993	2.3	1.4	3.3	1.0	7.0
20-24	24	33,144	2.3	1.5	3.0	1.0	7.0
25-29	25	30,775	2.3	1.6	3.1	1.0	7.0
30-34	17	20,556	1.7	1.3	2.1	1.0	3.0
35-39	11	10,281	2.5	0.0	5.1	1.0	14.0
40-44	18	21,174	2.3	1.5	3.2	1.0	7.0
45-49	16	11,637	3.1	1.2	5.0	1.0	14.0
50-54	14	7,313	3.4	0.8	6.1	1.0	14.0
55-59	10	5,613	5.8	2.4	9.2	1.0	14.0
60-64	6	5,967	5.2	0.2	10.2	1.0	14.0
65-69	4	3,459	2.8	0.0	7.3	1.0	7.0
70-74	5	2,929	3.8	1.0	6.6	1.0	7.0
75+	2	1,498	3.5	0.0	9.9	3.0	4.0
<b>Ethnicity</b>							
Malay	137	123,250	2.8	2.4	3.3	1.0	14.0
Chinese	21	25,084	2.3	1.0	3.6	1.0	14.0
Indian	23	20,321	2.5	1.2	3.7	1.0	14.0
Bumiputera Sabah	37	47,062	2.3	1.7	2.8	1.0	7.0
Bumiputera Sarawak	20	24,830	3.7	1.9	5.5	1.0	14.0
Other Bumiputera	1	2,396	-	-	-	-	-
Others	20	14,839	2.0	1.6	2.3	1.0	3.0
<b>Marital Status</b>							
Never Married	65	78,485	2.8	2.2	3.4	1.0	14.0
Married	106	98,763	2.5	2.0	3.1	1.0	14.0
Separated	2	1,508	2.5	0.0	8.9	2.0	3.0
Divorcee	5	2,623	5.4	0.0	12.0	1.0	14.0
Widow/er	6	5,135	4.8	0.0	10.1	1.0	14.0

Sociodemographic Characteristics	Count	Estimated Population	Mean	95% CI		Min.	Max.
				Lower	Upper		
<b>MALAYSIA</b>	259	257,781	2.7	2.4	3.0	1.0	14.0
<b>Education Level</b>							
No formal education	20	19,322	5.1	2.8	7.4	1.0	14.0
Primary	82	78,219	2.7	2.1	3.3	1.0	14.0
Secondary	74	80,117	2.3	1.8	2.8	1.0	14.0
Tertiary	32	39,374	2.1	1.5	2.7	1.0	7.0
Unclassified	17	11,038	2.8	1.7	3.9	1.0	7.0
<b>Occupation</b>							
Government	23	20,763	2.1	1.3	2.8	1.0	7.0
Semi-government	4	1,772	2.8	.0	6.3	1.0	6.0
Private	56	69,819	1.9	1.5	2.4	1.0	7.0
Self-employed	34	35,769	3.1	2.1	4.2	1.0	14.0
Unpaid worker/homemaker	17	18,137	4.8	1.8	7.7	1.0	14.0
Retiree	10	8,678	3.2	1.5	4.9	1.0	7.0
<b>Household Income Group (RM)</b>							
Less than RM400	24	24,977	4.1	2.4	5.9	1.0	14.0
RM400 – RM499	9	9,278	4.6	1.3	7.8	1.0	14.0
RM500 – RM699	10	10,891	2.5	1.2	3.8	1.0	7.0
RM700 – RM999	20	17,790	2.5	1.8	3.1	1.0	7.0
RM1000 – RM1999	53	57,866	3.1	2.4	3.8	1.0	14.0
RM2000 – RM2999	35	31,354	2.5	1.5	3.6	1.0	14.0
RM3000 – RM3999	29	23,706	2.6	1.5	3.6	1.0	14.0
RM4000 – RM4999	25	26,534	1.8	1.3	2.4	1.0	7.0
RM5000 and above	54	55,384	2.0	1.6	2.3	1.0	7.0

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

**Table 4.6: Mean number of days where activities were affected by oral health problems with at least one other illness in the last 2 weeks**

Sociodemographic Characteristics	Count	Estimated Population	Mean	95% CI		Min	Max
				Lower	Upper		
<b>MALAYSIA</b>	238	231,928	2.6	2.2	2.9	1.0	14.0
<b>State</b>							
Johor	27	34,123	2.6	1.8	3.4	1.0	7.0
Kedah	11	10,886	2.7	1.5	4.0	1.0	7.0
Kelantan	2	1,220	10.0	-	20.5	2.0	14.0
Melaka	8	1,787	1.8	1.5	2.1	1.0	3.0
Negeri Sembilan	8	4,583	3.7	0.7	6.6	1.0	14.0
Pahang	12	10,202	3.5	0.9	6.0	1.0	14.0
Penang	7	5,942	2.2	1.2	3.1	1.0	14.0
Perak	18	21,855	2.1	1.0	3.2	1.0	7.0
Perlis	8	1,750	3.8	1.5	6.0	1.0	7.0
Selangor	40	48,049	2.3	1.4	3.2	1.0	14.0
Terengganu	5	2,973	2.0	1.4	2.6	1.0	3.0
Sabah/Labuan	58	59,483	2.7	1.9	3.4	1.0	7.0
Sarawak	21	21,379	2.9	2.0	3.9	1.0	14.0
WP Kuala Lumpur	5	7,142	1.0	1.0	1.0	-	-
WP Putrajaya	8	553	1.2	0.9	1.6	1.0	2.0
<b>Location</b>							
Urban	107	139,534	2.4	1.8	2.9	1.0	14.0
Rural	131	92,394	2.9	2.4	3.4	1.0	14.0
<b>Sex</b>							
Male	106	102,286	2.6	2.0	3.0	1.0	14.0
Female	132	129,642	2.6	2.0	3.0	1.0	14.0
<b>Age Group</b>							
0-4	16	15,701	2.6	1.8	3.4	1.0	5.0
5-9	38	35,120	3.0	1.6	4.4	1.0	14.0
10-14	29	25,450	2.0	1.4	2.6	1.0	7.0
15-19	18	20,204	2.4	1.4	3.5	1.0	7.0
20-24	22	30,524	2.3	1.4	3.2	1.0	7.0
25-29	20	23,568	2.6	1.6	3.6	1.0	7.0
30-34	14	17,194	1.6	1.0	2.2	1.0	3.0
35-39	10	10,161	1.3	0.8	1.8	1.0	14.0
40-44	15	15,782	2.4	1.1	3.6	1.0	7.0
45-49	16	11,637	3.2	1.2	5.3	1.0	14.0
50-54	14	7,313	3.8	1.2	6.4	1.0	14.0
55-59	10	5,613	4.1	2.2	6.1	1.0	14.0
60-64	6	5,967	5.2	1.7	8.6	1.0	14.0
65-69	4	3,459	2.1	0.4	3.8	1.0	7.0
70-74	4	2,737	3.9	0.9	6.9	1.0	14.0
75+	2	1,498	3.6	3.6	3.6	3.0	4.0
<b>Ethnicity</b>							
Malay	125	109,647	2.9	2.3	3.4	1.0	14.0
Chinese	20	23,812	1.8	1.2	2.3	1.0	14.0
Indian	23	20,321	1.8	1.3	2.2	1.0	14.0
Bumiputera Sabah	15	16,102	3.3	2.0	4.5	1.0	7.0
Bumiputera Sarawak	36	45,790	2.7	1.7	3.6	1.0	14.0
Other Bumiputera	1	2,396	1.0	1.0	1.0	-	-
Others	18	13,860	2.1	1.7	2.5	1.0	3.0
<b>Marital Status</b>							
Never Married	55	62,235	2.7	2.0	3.4	1.0	14.0
Married	98	92,333	2.3	1.8	2.8	1.0	14.0
Separated	2	1,507	2.7	2.0	3.3	2.0	3.0
Divorcee	5	2,623	4.7	1.2	8.2	1.0	14.0
Widow/er	6	5,135	5.1	0.8	9.4	1.0	14.0

Sociodemographic Characteristics	Count	Estimated Population	Mean	95% CI		Min	Max
				Lower	Upper		
<b>MALAYSIA</b>	238	231,928	2.6	2.2	2.9	1.0	14.0
<b><i>Education Level</i></b>							
No formal education	16	13,812	4.4	2.2	6.7	1.0	14.0
Primary	79	75,968	2.6	1.9	3.4	1.0	14.0
Secondary	66	71,052	2.4	1.8	3.1	1.0	14.0
Tertiary	28	32,554	2.0	1.2	2.7	1.0	7.0
Unclassified	15	8,831	3.0	1.9	4.1	1.0	7.0
<b><i>Occupation</i></b>							
Government	20	17,182	2.1	1.3	2.8	1.0	7.0
Semi-government	2	569	2.0	2.0	2.0	1.0	7.0
Private	49	60,233	2.1	1.5	2.8	1.0	14.0
Self-employed	33	32,345	2.7	1.9	3.5	1.0	14.0
Unpaid worker/homemaker	1	614	1.0	1.0	1.0	1.0	14.0
Retiree	10	8,678	2.9	1.3	4.5	1.0	7.0
<b><i>Household Income Group (RM)</i></b>							
Less than RM400	21	21,726	3.5	2.0	5.0	1.0	14.0
RM400 – RM499	9	9,278	4.0	1.7	6.2	1.0	14.0
RM500 – RM699	8	7,014	2.3	1.6	2.9	1.0	3.0
RM700 – RM999	19	16,860	2.1	1.4	2.9	1.0	7.0
RM1000 – RM1999	51	56,403	3.2	2.5	3.9	1.0	14.0
RM2000 – RM2999	30	23,926	2.2	1.2	3.1	1.0	14.0
RM3000 – RM3999	27	22,808	2.5	1.4	3.5	1.0	14.0
RM4000 – RM4999	23	23,726	1.9	1.1	2.7	1.0	7.0
RM5000 and above	50	50,187	2.0	1.4	2.5	1.0	7.0

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

**Table 4.7: Prevalence of self care/self medicating oral health behavior in the last 2 weeks**

Sociodemographic Characteristics	Count	Estimated Population	Prevalence (%)	95% CI	
				Lower	Upper
<b>MALAYSIA</b>	117	129,552	28.1	23.1	33.7
<b>State</b>					
Johor	21	28,969	39.3	26.0	54.5
Kedah	4	4,579	19.7	7.9	41.3
Kelantan	5	4,654	32.0	14.1	57.4
Melaka	3	1,814	17.6	5.5	43.9
Negeri Sembilan	3	3,397	20.4	5.7	52.2
Pahang	4	2,989	15.6	5.7	35.8
Penang	5	4,880	27.7	6.8	66.7
Perak	8	10,242	22.9	11.7	40.0
Perlis	1	112	3.4	0.4	21.9
Selangor	9	12,877	21.7	11.7	36.7
Terengganu	6	2,509	14.4	6.0	30.6
Sabah/Labuan	29	33,518	45.6	31.1	60.8
Sarawak	12	13,463	26.7	13.8	45.3
WP Kuala Lumpur	3	5,305	15.0	4.4	40.7
WP Putrajaya	4	244	19.5	5.2	51.8
<b>Location</b>					
Urban	64	82,941	26.2	20.4	32.9
Rural	53	46,611	32.4	23.8	42.5
<b>Sex</b>					
Male	52	65,997	30.0	23.0	38.3
Female	65	63,555	26.4	20.1	33.7
<b>Age Group</b>					
0-4	6	6,126	42.2	19.2	69.2
5-9	10	15,872	22.1	11.7	37.8
10-14	9	9,581	29.4	15.0	49.6
15-19	16	14,494	28.0	16.4	43.5
20-24	11	14,553	36.0	19.8	56.2
25-29	9	14,330	26.6	12.5	48.0
30-34	7	7,876	22.1	10.9	39.7
35-39	8	7,338	21.7	10.3	40.1
40-44	9	9,374	34.7	16.4	59.0
45-49	14	13,858	42.3	24.0	63.1
50-54	7	4,925	15.0	5.7	34.0
55-59	5	3,946	29.9	12.2	56.5
60-64	1	516	12.0	1.5	54.4
65-69	-	-	-	-	-
70-74	3	4,543	79.6	35.1	96.6
75+	2	2,219	86.1	33.8	98.7
<b>Ethnicity</b>					
Malay	57	54,713	24.1	18.5	30.7
Chinese	23	33,734	30.4	20.0	43.2
Indian	1	592	2.4	0.3	15.7
Bumiputera Sabah	7	10,294	41.9	18.6	69.5
Bumiputera Sarawak	18	17,191	41.8	25.5	60.1
Other Bumiputera	1	529	23.2	1.8	83.0
Others	10	12,499	40.2	20.2	64.2
<b>Marital Status</b>					
Never Married	33	38,874	29.6	20.9	40.1
Married	55	54,157	26.4	19.7	34.5
Separated	-	-	-	-	-
Divorcee	2	3,786	3.5	1.0	11.2
Widow/er	3	3,786	58.0	22.2	87.0

Sociodemographic Characteristics	Count	Estimated Population	(%)	95% CI	
			Prevalence	Lower	Upper
<b>MALAYSIA</b>	117	129,552	28.1	23.1	33.7
<b><i>Education Level</i></b>					
No formal education	12	15,390	64.8	37.9	84.8
Primary	31	28,706	25.6	17.3	36.1
Secondary	38	44,006	25.2	17.8	34.3
Tertiary	17	17,506	22.8	13.1	36.8
Unclassified					
<b><i>Occupation</i></b>					
Government	9	4,575	15.5	6.4	32.9
Semi-government	-	-	-	-	-
Private	27	40,348	30.9	21.0	43.1
Self-employed	16	17,625	34.9	20.6	52.7
Unpaid worker/homemaker	15	12,139	23.8	12.9	39.5
Retiree	6	7,602	44.0	19.1	72.3
<b><i>Household Income Group (RM)</i></b>					
Less than RM400	7	6,079	20.3	9.3	38.7
RM400 – RM499	2	2,163	27.3	5.2	71.9
RM500 – RM699	6	7,426	37.4	14.6	67.6
RM700 – RM999	4	2,951	15.3	4.9	38.6
RM1000 – RM1999	26	24,186	28.8	18.0	42.6
RM2000 – RM2999	32	36,874	37.6	26.8	49.7
RM3000 – RM3999	10	12,008	24.2	12.2	42.3
RM4000 – RM4999	7	9,641	22.8	10.3	43.1
RM5000 and above	23	28,222	25.8	16.5	37.9

Note: Some cells have respondent count < 30. Results should be interpreted with caution.



**Table 4.8: Prevalence of seeking treatment or advice from health care providers in the last 2 weeks**

Sociodemographic Characteristics	Count	Estimated Population	%	95% CI	
				(Prevalence)	Lower
<b>MALAYSIA</b>	112	101,027	21.9	17.7	26.8
<b>State</b>					
Johor	8	10,953	14.9	7.4	27.6
Kedah	4	3,568	15.4	6.6	31.8
Kelantan	2	1,639	11.3	2.7	37.1
Melaka	5	984	9.6	4.1	20.7
Negeri Sembilan	8	6,527	39.2	19.2	63.7
Pahang	9	7,531	39.2	18.6	64.5
Penang	9	7,686	43.6	17.8	73.4
Perak	7	9,331	20.9	9.3	40.4
Perlis	1	129	3.9	0.5	24.7
Selangor	9	11,366	19.1	10.2	33.0
Terengganu	14	6,185	35.4	18.9	56.3
Sabah/Labuan	23	17,990	24.5	13.8	39.5
Sarawak	6	9,254	18.3	7.9	36.9
WP Kuala Lumpur	4	7,585	21.5	7.1	49.6
WP Putrajaya	3	300	23.9	9.9	47.4
<b>Location</b>					
Urban	65	73,183	23.1	17.9	29.3
Rural	47	27,844	19.4	13.1	27.8
<b>Sex</b>					
Male	51	52,375	23.8	17.3	31.8
Female	61	48,653	20.2	15.2	26.3
<b>Age Group</b>					
0-4	5	4,953	34.1	13.4	63.5
5-9	20	15,956	22.3	13.3	34.7
10-14	6	4,433	13.6	5.5	29.9
15-19	8	8,125	15.7	7.1	31.1
20-24	8	12,484	30.9	15.9	51.2
25-29	9	12,113	22.5	10.8	40.9
30-34	10	8,553	24.0	12.3	41.4
35-39	8	4,614	13.6	5.3	30.7
40-44	9	5,098	18.9	8.6	36.6
45-49	8	3,996	12.2	4.8	27.6
50-54	14	14,483	44.1	25.4	64.5
55-59	3	2,363	17.9	4.9	48.0
60-64	1	603	14.0	1.8	58.8
65-69	2	3,061	39.1	9.3	80.1
70-74	1	192	3.4	0.4	24.0
75+	-	-	-	-	-
<b>Ethnicity</b>					
Malay	61	51,102	22.5	17.1	29.0
Chinese	22	28,005	25.2	15.8	37.7
Indian	7	4,770	19.0	7.4	40.7
Bumiputera Sabah	14	11,160	27.2	14.0	46.0
Bumiputera Sarawak	3	3,154	12.8	3.7	36.2
Other Bumiputera	-	-	-	-	-
Others	5	2,836	9.1	2.1	31.8
<b>Marital Status</b>					
Never Married	24	29,684	22.6	14.6	33.2
Married	57	46,419	22.7	16.6	30.2
Separated	-	-	-	-	-
Divorcee	-	-	-	-	-
Widow/er	1	566	8.7	1.1	45.1

Sociodemographic Characteristics	Count	Estimated Population	% (Prevalence)	95% CI	
				Lower	Upper
<b>MALAYSIA</b>	112	101,027	Prevalence	17.7	26.8
<b>Education Level</b>					
No formal education	1	192	0.8	0.1	5.9
Primary	29	21,899	19.5	12.7	28.9
Secondary	46	40,290	23.1	16.6	31.2
Tertiary	20	24,555	32.0	20.2	46.7
Unclassified	-	-	-	-	-
<b>Occupation</b>					
Government	15	12,633	42.7	24.8	62.7
Semi-government	1	120	9.9	0.7	64.2
Private	32	34,529	26.5	17.8	37.5
Self-employed	10	6,878	13.6	5.6	29.5
Unpaid worker/homemaker	10	7,074	13.9	6.6	26.8
Retiree	3	3,032	17.5	4.1	51.2
<b>Household Income Group (RM)</b>					
Less than RM400	4	3,862	12.9	4.6	31.2
RM400 – RM499	-	-	-	-	-
RM500 – RM699	3	2,318	11.7	2.9	37.0
RM700 – RM999	8	7,366	38.1	18.0	63.4
RM1000 – RM1999	26	22,644	26.9	17.3	39.3
RM2000 – RM2999	16	18,644	19.0	10.6	31.5
RM3000 – RM3999	10	5,264	10.6	4.4	23.3
RM4000 – RM4999	13	14,413	34.1	18.6	54.0
RM5000 and above	32	26,516	24.2	16.1	34.8

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

Table 4.9: Prevalence of seeking oral health care for recent oral health problems without any other illness in the last 2 weeks

Sociodemographic Characteristics	Sought oral healthcare				Did not seek oral healthcare					
	Count	Estimated Population	%		Count	Estimated population	%			
			(Percentage)	95 % CI			(Percentage)	95 % CI		
			Lower	Upper			Lower	Upper		
<b>MALAYSIA</b>	112	101,027	21.9	17.7	26.8	259	272,581	59.2	53.3	64.8
<b>State</b>										
Johor	8	10,953	14.9	7.4	27.6	43	59,275	80.5	66.4	89.6
Kedah	4	3,568	15.4	6.6	31.8	5	3,606	15.5	4.0	44.7
Kelantan	2	1,639	11.3	2.7	37.1	13	11,425	78.5	51.2	92.7
Melaka	5	984	9.6	4.1	20.7	17	7,941	77.1	50.4	91.8
Negeri Sembilan	8	6,527	39.2	19.2	63.7	13	9,192	55.2	32.3	76.1
Pahang	9	7,531	39.2	18.6	64.5	12	11,032	57.4	31.7	79.7
Penang	9	7,686	43.6	17.8	73.4	10	9,734	55.2	25.7	81.4
Perak	7	9,331	20.9	9.3	40.4	21	30,238	67.6	46.4	83.5
Perlis	1	129	3.9	0.5	24.7	4	464	14.0	4.5	35.8
Selangor	9	11,366	19.1	10.2	33.0	23	29,886	50.4	37.0	63.2
Terengganu	14	6,185	35.4	18.9	56.3	12	5,457	31.2	15.2	53.5
Sabah/Labuan	23	17,990	24.5	13.8	39.5	45	48,290	65.6	48.6	79.4
Sarawak	6	9,254	18.3	7.9	36.9	24	30,719	60.8	41.1	77.6
WP Kuala Lumpur	4	7,585	21.5	7.1	49.6	9	14,737	41.7	20.2	67.0
WP Putrajaya	3	300	23.9	9.9	47.4	8	583	46.4	19.8	75.3
Missing	-	-	-	-	-	-	-	-	-	-
<b>Location</b>										
Urban	65	73,183	23.1	17.9	29.3	151	184,750	58.3	50.9	65.3
Rural	47	27,844	19.4	13.1	27.8	108	87,832	61.1	51.5	70.0
Missing <sup>1</sup>	-	-	-	-	-	-	-	-	-	-
<b>Sex</b>										
Male	51	52,375	23.8	17.3	31.8	109	127,125	57.9	49.2	66.1
Female	61	48,653	20.2	15.2	26.3	150	145,457	60.3	53.0	67.2
Missing <sup>1</sup>	-	-	-	-	-	-	-	-	-	-
<b>Age Group</b>										
0-4	5	4,953	34.1	13.4	63.5	10	9,445	65.0	36.0	86.0
5-9	20	15,956	22.3	13.3	34.7	33	38,478	53.7	40.0	66.8
10-14	6	4,433	13.6	5.5	29.9	20	18,909	58.0	40.1	74.0
15-19	8	8,125	15.7	7.1	31.1	29	31,972	61.7	44.7	76.3
20-24	8	12,484	30.9	15.9	51.2	19	22,508	55.6	36.8	73.0
25-29	9	12,113	22.5	10.8	40.9	23	35,722	66.3	46.6	81.6
30-34	10	8,553	24.0	12.3	41.4	19	20,040	56.2	38.3	72.6



Sociodemographic Characteristics	Sought oral healthcare				Did not seek oral healthcare				
	Count	Estimated Population	% (Percentage)	95 % CI	Count	Estimated population	% (Percentage)	95 % CI	
			Lower	Upper			Lower	Upper	
<b>MALAYSIA</b>	112	101,027	21.9	17.7	259	272,581	59.2	53.3	64.8
<b>Occupation</b>									
Government	15	12,633	42.7	24.8	22	13,773	46.5	27.2	67.0
Semi-government	1	120	9.9	0.7	1	1,083	90.1	35.8	99.3
Private	32	34,529	26.5	17.8	55	70,356	53.9	42.7	64.8
Self-employed	10	6,878	13.6	5.6	38	38,910	77.1	60.6	88.1
Unpaid worker/ homemaker	10	7,074	13.9	6.6	34	32,274	63.2	48.8	75.6
Retiree	3	3,032	17.5	4.1	12	10,462	60.5	30.7	84.1
Missing <sup>1</sup>	-	-	-	-	-	-	-	-	-
<b>Household Income Group (RM)</b>									
Less than RM400	4	3,862	12.9	4.6	20	18,464	61.6	40.1	79.3
RM400 – RM499	-	-	-	-	4	5,757	72.7	22.1	96.1
RM500 – RM699	3	2,318	11.7	2.9	14	16,109	81.1	57.7	93.1
RM700 – RM999	8	7,366	38.1	18.0	10	8,461	43.8	22.7	67.4
RM1000 – RM1999	26	22,644	26.9	17.3	49	49,671	59.1	46.4	70.6
RM2000 – RM2999	16	18,644	19.0	10.6	56	62,055	63.2	50.2	74.5
RM3000 – RM3999	10	5,264	10.6	4.4	32	34,474	69.4	51.8	82.8
RM4000 – RM4999	13	14,413	34.1	18.6	23	20,929	49.5	30.6	68.6
RM5000 and above	32	26,516	24.2	16.1	51	56,661	51.8	39.2	64.2
Missing <sup>1</sup>	-	-	-	-	-	-	-	-	-

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

<sup>1</sup>Missing includes fields coded "Don't know", "Refuse to answer" and "No answer"

Table 4.10: Reasons for choice of preferred oral healthcare facility

Reason for choice of preferred oral healthcare facility	Main reason				2 <sup>nd</sup> reason				3 <sup>rd</sup> reason			
	Count	Estimated Population	Percentage (%)	95% CI LL UL	Count	Estimated Population	Percentage (%)	95% CI LL UL	Count	Estimated Population	Percentage (%)	95% CI LL UL
1.Near	6,128	5,929,503	33.3	31.7 34.9	504	486,875	2.7	2.4 3.2	63	73,195	0.4	0.3 0.6
2.Cheap	4,721	4,318,954	24.2	22.8 25.7	3,666	3,283,107	18.4	17 20	43	48,870	0.3	0.2 0.4
3.Enough space or clean	162	225,816	1.3	1.0 1.6	146	156,430	0.9	0.7 1.1	168	140,779	0.8	0.6 1.1
4. Able to choose health provider	364	413,583	2.3	1.9 2.8	133	142,369	0.8	0.6 1.0	38	42,535	0.2	0.2 0.4
5.Short waiting time	2,885	2,887,718	16.2	15.2 17.2	414	511,051	2.9	2.3 3.5	114	143,205	0.8	0.6 1.1
6.Convenient operating hours	258	271,789	1.5	1.3 1.8	381	436,523	2.4	2.1 2.9	123	157,311	0.9	0.6 1.2
7.Used to the facility	2,345	2,408,873	13.5	13 15	953	865,288	4.9	4.4 5.4	844	876,349	4.9	4.1 5.9
8.Competent healthcare provider	767	741,446	4.2	3.7 4.7	469	566,275	3.2	2.7 3.7	263	302,956	1.7	1.4 2.1
9.Treated respectfully	303	318,736	1.8	1.5 2.1	198	210,553	1.2	1.0 1.4	306	355,530	2.0	1.6 2.4
10.Missing <sup>1</sup>	-	-	-	- -	1,1370	11,161,376	62.6	1.0 60.6	16272	15679118	88.0	0.8 86.3

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

<sup>1</sup>Missing includes fields coded "Don't know", "Refuse to answer" and "No answer"

LL = Lower Limit , UL = Upper Limit

Table 4.11: Preferred oral healthcare provider in the last 12 months

Sociodemographic Characteristics	Government Dental Facility					Private Dental Facility				
	Count	Estimated Population	Percentage (%)	Lower	Upper	Count	Estimated Population	Percentage (%)	Lower	Upper
<b>MALAYSIA</b>	19,280	17,275,478	63.3	61.6	65.0	8,872	9,669,897	35.4	33.8	37.1
<b>State</b>										
Johor	1,526	1,940,126	60.7	56.2	64.9	919	1,221,332	38.2	34.0	42.6
Kedah	1,190	1,251,399	68.1	62.5	73.3	499	573,435	31.2	26.1	36.9
Kelantan	1,512	1,168,914	79.6	74.7	83.8	377	294,148	20.0	15.9	24.9
Melaka	1,075	527,747	66.9	60.5	72.7	513	257,116	32.6	26.8	39.0
Negeri Sembilan	1,122	684,560	70.2	65.5	74.4	397	281,983	28.9	24.6	33.6
Pahang	1,252	1,063,314	76.6	71.9	80.8	364	306,529	22.1	18.1	26.7
Penang	1,053	754,908	49.4	41.9	57.0	724	758,085	49.6	42.2	57.1
Perak	985	1,310,532	58.4	52.5	64.1	573	885,250	39.5	33.7	45.5
Perlis	1,133	174,900	80.6	76.2	84.3	271	40,322	18.6	15.0	22.7
Selangor	2,146	2,673,803	49.5	44.9	54.2	1,903	2,664,559	49.4	44.8	54.0
Terengganu	1,323	722,484	71.4	66.9	75.5	505	284,315	28.1	23.9	32.7
Sabah/Labuan	2,430	2,379,360	74.0	69.0	78.3	733	784,745	24.4	20.2	29.1
Sarawak	1,602	1,855,512	80.1	73.8	85.2	322	415,105	17.9	13.2	23.8
WP Kuala Lumpur	447	725,712	44.8	36.8	53.0	452	875,873	54.1	45.9	62.0
WP Putrajaya	484	42,206	59.8	54.2	65.2	320	27,101	38.4	33.0	44.2
<b>Location</b>										
Urban	9,965	11,137,130	57.1	54.9	59.3	6,239	8,147,850	41.8	39.7	43.9
Rural	9,315	6,138,348	78.9	76.8	80.8	2,633	1,522,047	19.6	17.7	21.6
<b>Sex</b>										
Male	9,337	8,825,598	63.2	61.4	65.0	4,251	4,965,946	35.6	33.8	37.4
Female	9,943	8,449,880	63.4	61.6	65.3	4,621	4,703,952	35.3	33.5	37.2
<b>Age Group</b>										
0-4	1,991	1,656,358	70.0	67.1	72.8	747	684,159	28.9	26.2	31.8
5-9	2,218	1,902,426	73.3	70.3	76.0	672	683,658	26.3	23.5	29.3
10-14	2,327	2,022,944	76.6	74.2	78.9	567	583,415	22.1	19.9	24.5
15-19	1,902	2,036,384	74.2	71.3	76.8	512	669,114	24.4	21.7	27.2
20-24	1,342	1,599,307	59.0	55.5	62.3	738	1,079,847	39.8	36.6	43.1
25-29	1,246	1,441,386	55.3	52.1	58.5	825	1,124,896	43.2	40.0	46.4
30-34	1,050	1,086,315	52.6	49.3	55.8	812	956,087	46.3	43.1	49.5
35-39	985	901,290	48.9	45.4	52.4	795	928,936	50.4	46.8	53.9
40-44	1,093	943,472	54.7	51.2	58.1	722	754,981	43.8	40.3	47.2

Sociodemographic Characteristics	Government Dental Facility						Private Dental Facility					
	Count	Estimated Population	Percentage (%)		95 % CI		Count	Estimated Population	Percentage (%)		95 % CI	
			Lower	Upper	Lower	Upper			Lower	Upper		
<b>MALAYSIA</b>	19,280	17,275,478	63.3	61.6	65.0	8,872	9,669,897	35.4	33.8	37.1		
45-49	1,074	874,206	55.7	52.1	59.2	710	673,621	42.9	39.4	46.4		
50-54	1,050	758,128	57.7	54.3	61.1	612	537,301	40.9	37.5	44.4		
55-59	966	639,243	62.2	58.4	65.9	480	378,204	36.8	33.1	40.7		
60-64	718	516,750	66.9	62.8	70.7	266	247,902	3.2	28.2	36.2		
65-69	491	331,255	66.4	60.8	71.5	169	156,386	31.3	26.2	36.9		
70-74	410	259,508	70.5	63.3	76.8	118	100,252	27.2	21.0	34.5		
75+	417	306,505	72.0	66.3	77.0	127	111,139	26.1	21.2	31.6		
<b>Ethnicity</b>												
Malay	12,104	9,695,343	68.0	66.0	70.0	4,737	4,444,073	31.2	29.2	33.2		
Chinese	2,252	2,647,161	41.8	38.6	45.1	2,630	3,606,304	56.9	53.6	60.2		
Indian	1,474	1,255,550	68.4	64.1	72.5	629	563,946	30.7	26.7	35.1		
Bumiputera Sabah	1,573	1,748,078	82.2	77.1	86.3	294	343,889	16.2	12.3	20.9		
Bumiputera Sarawak	881	1,024,657	91.2	85.7	94.7	77	79,779	7.1	4.0	12.3		
Other Bumiputera	59	48,563	96.7	83.0	99.4	1	618	1.2	0.1	11.9		
Others	937	856,126	55.0	48.5	61.2	504	631,290	40.5	34.5	46.9		
<b>Marital Status</b>												
Never Married	4,835	5,063,792	64.1	61.9	66.3	2,054	2,727,041	34.5	32.4	36.7		
Married	7,645	6,559,344	56.7	54.9	58.6	4,636	4,866,026	42.1	40.2	44.0		
Separated	84	78,058	68.4	55.6	78.9	29	33,363	29.2	19.2	41.8		
Divorcee	245	194,304	66.7	59.6	73.1	107	89,036	30.6	24.2	37.7		
Widow/er	827	563,282	72.1	68.2	75.7	258	203,584	26.1	22.6	29.8		
Missing <sup>1</sup>	6	5,605	25.3	10.4	49.7	1	1,080	4.9	0.7	28.2		
<b>Education Level</b>												
No formal education	1,255	962,568	78.9	75.2	82.2	256	214,788	17.6	14.6	21.1		
Primary	6,090	5,174,623	72.3	70.2	74.2	1,868	1,896,779	26.5	24.6	28.5		
Secondary	6,147	5,932,758	61.1	59.2	63.0	3,254	3,674,658	37.9	36.0	39.7		
Tertiary	1,726	1,690,551	39.7	37.2	42.4	2,126	2,534,763	59.6	56.9	62.2		
Unclassified	1,289	1,200,771	73.9	70.3	77.3	337	376,003	23.1	19.9	26.8		



Sociodemographic Characteristics	Government Dental Facility					Private Dental Facility				
	Count	Estimated Population	Percentage (%)	95 % CI		Count	Estimated Population	Percentage (%)	95 % CI	
				Lower	Upper				Lower	Upper
<b>MALAYSIA</b>	19,280	17,275,478	63.3	61.6	65.0	8,872	9,669,897	35.4	33.8	37.1
<b>Occupation</b>										
Government	1,127	909,501	58.4	55.1	61.7	769	637,755	41.0	37.8	44.2
Semi-government	112	108,861	42.7	34.6	51.3	130	142,935	56.1	47.6	64.3
Private	3,223	3,545,280	50.6	48.2	53.1	2,523	3,352,125	47.9	45.5	50.3
Self-employed	2,318	1,952,826	58.1	55.4	60.8	1,330	1,372,682	40.9	38.2	43.6
Unpaid worker	32	31,427	69.4	45.5	86.1	11	10,572	23.4	11.5	41.6
Homemaker	2,209	1,810,342	66.7	64.2	69.1	940	882,447	32.5	30.2	35.0
Retiree	1,262	898,944	67.6	63.9	71.1	446	407,771	30.7	27.2	34.4
<b>Household Income Group (RM)</b>										
Less than RM400	1,641	1,455,251	72.2	68.2	75.8	476	518,822	25.7	22.2	29.6
RM400 – RM499	398	378,452	91.0	86.0	94.3	46	34,328	8.3	5.1	13.0
RM500 – RM699	980	789,854	83.9	79.3	87.5	149	136,556	14.5	11.1	18.6
RM700 – RM999	1,544	1,363,822	82.4	78.7	85.6	295	269,246	16.3	13.2	19.9
RM1000 – RM1999	4,727	3,896,515	76.5	74.2	78.6	1,136	1,134,738	22.3	20.2	24.5
RM2000 – RM2999	3,468	3,165,149	68.9	66.2	71.5	1,270	1,379,045	30.0	27.5	32.7
RM3000 – RM3999	2,362	2,176,372	59.0	55.7	62.2	1,304	1,466,665	39.8	36.6	43.0
RM4000 – RM4999	1,475	1,534,035	57.7	53.7	61.5	980	1,102,784	41.5	37.6	45.4
RM5000 and above	2,685	2,516,029	40.5	37.6	43.5	3,216	3,627,714	58.4	55.4	61.3

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

<sup>1</sup>Missing includes fields coded "Don't know", "Refuse to answer" and "No answer"

Table 4.11: Preferred oral healthcare provider in the last 12 months (cont.)

Sociodemographic Characteristics	Traditional or Complementary Medicine Premise or Practitioner			Others				
	Count	Estimated Population (%)	95% CI	Count	Estimated Population (%)	95% CI		
		Lower	Upper		Lower	Upper		
<b>MALAYSIA</b>	46	31,949	0.1	0.1	61,597	0.2	0.2	0.3
<b>State</b>								
Johor	6	6,932	0.2	0.1	9,472	0.3	0.1	1
Kedah	1	889	0	0	2,145	0.1	0	0.6
Kelantan	2	1,558	0.1	0	833	0.1	0	0.4
Melaka	4	597	0.1	0	2,332	0.3	0.1	1.1
Negeri Sembilan	5	4,089	0.4	0.2	1,746	0.2	0	0.7
Pahang	2	972	0.1	0	7,167	0.5	0.2	1.2
Penang	3	2,221	0.1	0	588	0.04	0	0.3
Perak	4	5,167	0.2	0.1	2,185	0.1	0	0.4
Perlis	2	322	0.1	0	1,400	0.6	0.1	4.6
Selangor	3	2,441	0	0	3,973	0.1	0	0.2
Terengganu	9	673	0.1	0	1,722	0.2	0	1.2
Sabah/Labuan	3	3,041	0.1	0	17,800	0.6	0.2	1.4
Sarawak	1	1,274	0.1	0	7,459	0.3	0.1	0.7
WP Kuala Lumpur	1	1,773	0.1	0	2,672	0.2	0	1.1
WP Putrajaya	-	-	-	-	103	0.1	0	1.1
<b>Location</b>								
Urban	19	23,600	0.1	0.1	37,661	0.2	0.1	0.3
Rural	27	8,349	0.1	0.1	23,937	0.3	0.2	0.5
<b>Sex</b>								
Male	20	14,641	0.1	0.1	28,488	0.2	0.1	0.3
Female	26	17,308	0.1	0.1	33,109	0.2	0.1	0.4
<b>Age Group</b>								
0-4	3	1,026	0	0	4,673	0.2	0.1	0.5
5-9	2	68	0	0	3,746	0.1	0	0.5
10-14	5	2,110	0.1	0	3,727	0.1	0	0.4
15-19	4	5,763	0.2	0.1	4,218	0.2	0.1	0.5
20-24	-	-	-	-	10,745	0.4	0.1	1.7
25-29	2	79	0	0	9,084	0.3	0.2	0.8
30-34	1	24	0	0	3,441	0.2	0.1	0.5
35-39	2	1,756	0.1	0	3,385	0.2	0.1	0.6
40-44	4	5,733	0.3	0.1	2,964	0.2	0	1
45-49	3	1,937	0.1	0	7,501	0.5	0.1	2
50-54	3	1,987	0.2	0	1,108	0.1	0	0.3

Sociodemographic Characteristics	Traditional or Complementary Medicine Premise or Practitioner				Others			
	Count	Estimated Population	Percentage (%)	95 % CI	Count	Estimated Population	Percentage (%)	95 % CI
			Lower	Upper			Lower	Upper
<b>MALAYSIA</b>	46	31,949	0.1	0.1	70	61,597	0.2	0.2
55-59	3	2,428	0.2	0.1	4	2,617	0.3	0.1
60-64	2	1,180	0.2	0	3	941	0.1	0
65-69	1	340	0.1	0	3	1,742	0.3	0.1
70-74	4	2,967	0.8	0.2	3	1,706	0.5	0.1
75+	7	4,552	1.1	0.4	3	-	-	1.5
<b>Ethnicity</b>								
Malay	18	12,692	0.1	0.1	25	20,550	0.1	0.1
Chinese	14	14,682	0.2	0.1	6	5,265	0.1	0
Indian	2	1,265	0.1	0	1	588	0	0
Bumiputera Sabah	-	-	-	-	4	3,706	0.3	0.1
Bumiputera Sarawak	1	683	0	0	5	10,734	0.5	0.1
Other Bumiputera	9	270	0.5	0.1	1	773	1.5	0.2
Others	2	2,357	0.2	0	28	19,983	1.3	0.6
<b>Marital Status</b>								
Never Married	7	6,173	0.1	0	15	17,381	0.2	0.1
Married	21	13,472	0.1	0.1	33	27,365	0.2	0.1
Separated	1	2,746	2.4	0.3	-	-	-	-
Divorcee	2	1,900	0.7	0.1	6	3,362	1.2	0.5
Widow/er	6	4,471	0.6	0.2	3	1,345	0.2	0.04
<b>Education Level</b>								
No formal education	13	5,373	0.4	0.2	13	9,618	0.8	0.3
Primary	14	10,532	0.1	0.1	23	13,779	0.2	0.1
Secondary	10	11,995	0.1	0.1	19	22,126	0.2	0.1
Tertiary	4	2,317	0.1	0.0	5	8,813	0.2	0.1
Unclassified	1	673	0.0	0.0	2	2,007	0.1	0.0
<b>Occupation</b>								
Government	2	1,641	0.1	0	2	5,550	0.4	0.1
Semi-government	2	1,756	0.7	0.1	1	1,177	0.5	0.1
Private	8	10,623	0.2	0.1	29	27,646	0.4	0.2
Self-employed	5	2,573	0.1	0	8	3,839	0.1	0.1
Unpaid worker	-	-	-	-	-	-	-	-
Homemaker	7	5,130	0.2	0.1	7	4,217	0.2	0.1
Retiree	8	4,243	0.3	0.1	4	1,262	0.1	0

Sociodemographic Characteristics	Traditional or Complementary Medicine Premise or Practitioner				Others			
	Count	Estimated Population	Percentage (%)	95 % CI Lower Upper	Count	Estimated Population	Percentage (%)	95 % CI Lower Upper
<b>MALAYSIA</b>	46	31,949	0.1	0.1 0.2	70	61,597	0.2	0.2 0.3
<b>Household Income Group (RM)</b>								
Less than RM400	13	4,180	0.2	0.1 0.6	9	6,106	0.3	0.1 0.8
RM400 – RM499		-	-	- -	3	1,374	0.3	0.1 1.3
RM500 – RM699	3	1,087	0.1	0 0.6		-	-	- -
RM700 – RM999	4	3,013	0.2	0.1 0.5	5	3,698	0.2	0.1 0.7
RM1000 – RM1999	13	8,689	0.2	0.1 0.4	15	19,727	0.4	0.2 0.9
RM2000 – RM2999	6	4,290	0.1	0 0.2	15	5,948	0.1	0.1 0.3
RM3000 – RM3999	4	6,818	0.2	0.1 0.5	6	8,153	0.2	0.1 0.5
RM4000 – RM4999	1	1,640	0.1	0 0.4	8	3,641	0.1	0.1 0.4
RM5000 and above	2	2,232	0	0 0.1	9	12,949	0.2	0.1 0.6

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

Table 4.12: Reasons for choosing government outpatient healthcare facility for oral healthcare

Reasons for choosing government oral healthcare facility	Main reason			2 <sup>nd</sup> reason			3 <sup>rd</sup> reason				
	Count	Estimated Population	Percentage (%)	Count	Estimated Population	Percentage (%)	Count	Estimated Population	Percentage (%)	95% CI	
										LL	UL
1. Near	5,081	4,476,479	43.5	6,504	5,957,388	57.9	10,159	9,082,553	88.3	87.0	90.0
2. Cheap	4,503	4,051,793	39.4	-	-	-	-	-	-	-	-
3. Enough space or clean	58	74,236	0.7	3	5,159	0.1	3	5,159	0.1	0.0	0.2
4. Able to choose health provider	66	63,172	0.6	419	378,700	3.7	45	45,384	0.4	0.3	0.6
5. Short waiting time	89	96,985	0.9	3,480	3,014,524	29.3	40	43,620	0.4	0.3	0.6
6. Convenient operating hours	49	56,061	0.5	97	92,813	0.9	139	106,240	1.0	0.8	1.4
7. Used to the facility	1,078	976,457	9.5	41	32,269	0.3	9	7,398	0.1	0.0	0.2
8. Competent healthcare provider	331	325,060	3.2	65	58,025	0.6	35	32,856	0.3	0.2	0.5
9. Treated respectfully	78	84,754	0.8	55	77,563	0.8	37	37,627	0.4	0.2	0.6

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

LL = Lower Limit , UL = Upper Limit

Table 4.13: Reasons for choosing private outpatient healthcare facility for oral healthcare

Reasons for choosing private oral healthcare facility	Main reason						2 <sup>nd</sup> reason						3 <sup>rd</sup> reason					
	Count	Estimated Population	Percentage (%)	95% CI		Count	Estimated Population	Percentage (%)	95% CI		Count	Estimated Population	Percentage (%)	95% CI				
				LL	UL				LL	UL				LL	UL			
1. Near	1,021	1,427,376	19.6	17.8	21.4	80	104,092	1.4	1.1	1.9	18	27,811	0.4	0.2	0.7			
2. Cheap	196	240,471	3.3	2.7	4.1	178	261,083	3.6	2.8	4.6	3	5,249	0.1	0.0	0.3			
3. Enough space or clean	103	150,106	2.1	1.5	2.8	47	62,023	0.9	0.6	1.2	27	33,085	0.5	0.2	0.9			
4. Able to choose health provider	293	343,629	4.7	3.9	5.7	91	109,095	1.5	1.1	2.0	29	35,138	0.5	0.3	0.8			
5. Short waiting time	2,792	2,788,032	38.2	36.2	40.3	347	446,553	6.1	5.0	7.6	78	108,859	1.5	1.0	2.1			
6. Convenient operating hours	206	212,491	2.9	2.4	3.5	325	356,214	4.9	4.1	5.8	84	117,616	1.6	1.1	2.4			
7. Used to the facility	1,235	1,412,863	19.4	17.7	21.2	418	415,031	5.7	4.8	6.7	151	205,729	2.8	2.1	3.8			
8. Competent healthcare provider	434	415,268	5.7	4.9	6.6	327	423,342	5.8	4.8	7.0	121	165,943	2.3	1.7	3.1			
9. Treated respectfully	223	232,794	3.2	2.6	4.0	113	125,791	1.7	1.3	2.2	186	233,517	3.2	2.5	4.1			

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

LL = Lower Limit , UL = Upper Limit

Table 4.14: Prevalence of outpatient oral healthcare utilisation in the last 12 months

Sociodemographic Characteristics	Yes				No					
	Count	Estimated Population	Prevalence (%)		Count	Estimated Population	Prevalence (%)			
			Lower	Upper			Lower	Upper		
<b>MALAYSIA</b>	6,536	6,098,501	22.4	21.4	23.3	21,839	21,064,818	77.2	76.2	78.2
<b>State</b>										
Johor	690	877,417	27.4	24.6	30.4	1,774	2,314,966	72.4	69.4	75.2
Kedah	342	365,728	19.9	16.7	23.5	1,338	1,449,906	78.9	75.4	82.1
Kelantan	289	224,891	15.3	12.5	18.7	1,605	1,240,797	84.5	81.2	87.4
Melaka	434	219,902	27.9	23.7	32.4	1,162	567,122	71.9	67.4	76.0
Negeri Sembilan	439	296,987	30.4	26.5	34.7	1,087	677,413	69.4	65.2	73.3
Pahang	298	254,644	18.4	15.5	21.7	1,330	1,120,176	80.7	77.6	83.5
Penang	489	424,890	27.8	24.3	31.6	1,292	1,094,231	71.6	67.8	75.2
Perak	455	700,956	31.2	28.1	34.6	1,135	1,532,886	68.3	65.0	71.4
Perlis	348	53,747	24.8	20.9	29.0	1,073	162,937	75.1	70.8	78.9
Selangor	814	991,972	18.4	16.4	20.6	3,264	4,382,189	81.2	79.0	83.2
Terengganu	350	199,103	19.7	16.2	23.7	1,484	806,817	79.7	75.6	83.3
Sabah/Labuan	667	584,194	18.2	15.3	21.4	2,534	2,629,097	81.7	78.5	84.5
Sarawak	343	397,435	17.2	13.9	20.9	1,612	1,909,447	82.4	78.6	85.7
WP Kuala Lumpur	283	482,687	29.8	24.8	35.4	624	1,130,574	69.8	64.1	74.9
WP Putrajaya	295	23,948	34.0	29.5	38.7	525	46,260	65.6	60.8	70.1
<b>Location</b>										
Urban	3,798	4,389,707	22.5	21.4	23.7	12,506	15,031,198	77.1	75.9	78.3
Rural	2,738	1,708,794	22.0	20.5	23.5	9,333	6,033,619	77.5	75.9	79.0
<b>Sex</b>										
Male	2,932	2,841,550	20.4	19.3	21.5	10,768	11,063,052	79.2	78.1	80.3
Female	3,604	3,256,951	24.5	23.3	25.7	11,071	10,001,765	75.1	73.9	76.3
<b>Age Group</b>										
0-4	165	144,645	6.1	5.1	7.4	2,595	2,215,353	93.6	92.4	94.7
5-9	1,382	1,175,944	45.3	42.4	48.2	1,513	1,413,078	54.4	51.5	57.3
10-14	1,426	1,207,972	45.8	42.8	48.8	1,486	1,417,344	53.7	50.7	56.7
15-19	744	794,792	28.9	26.5	31.5	1,696	1,938,023	70.6	68.0	73.0
20-24	321	390,724	14.4	12.4	16.7	1,775	2,307,913	85.1	82.8	87.1
25-29	402	441,029	16.9	14.9	19.1	1,689	2,150,750	82.5	80.3	84.6
30-34	365	395,934	19.2	16.9	21.7	1,511	1,661,201	80.4	77.9	82.7
35-39	381	394,632	21.4	18.9	24.1	1,414	1,446,692	78.4	75.8	80.9
40-44	348	331,439	19.2	17.1	21.5	1,487	1,384,346	80.2	77.9	82.4

Sociodemographic Characteristics	Yes					No				
	Count	Estimated Population	Prevalence (%)	95% CI		Count	Estimated Population	Prevalence (%)	95% CI	
				Lower	Upper				Lower	Upper
45-49	338	297,980	19.0	16.7	21.5	1,455	1,264,362	80.5	77.9	82.9
50-54	263	202,946	15.5	13.3	17.8	1,411	1,105,404	84.2	81.8	86.3
55-59	175	128,462	12.5	10.3	15.1	1,283	896,874	87.3	84.7	89.5
60-64	101	81,873	10.6	8.5	13.2	888	684,451	88.6	86.0	90.8
65-69	55	52,774	10.6	7.6	14.6	616	443,870	88.9	84.9	92.0
70-74	37	28,141	7.6	5.2	11.2	498	338,575	92.0	88.3	94.5
75+	33	29,213	6.9	4.7	10.0	522	396,582	93.1	90.0	95.3
<b>Ethnicity</b>										
Malay	4,130	3,399,578	23.9	22.7	25.1	12,768	10,780,034	75.6	74.4	76.8
Chinese	1,109	1,507,628	23.8	21.8	25.9	3,813	4,805,468	75.9	73.8	77.9
Indian	530	440,983	24.0	21.4	26.9	1,584	1,387,659	75.7	72.7	78.4
Bumiputera Sabah	420	444,766	20.9	17.4	24.9	1,465	1,676,936	78.9	74.8	82.4
Bumiputera Sarawak	164	199,876	17.8	13.4	23.3	808	920,938	82.0	76.5	86.4
Other Bumiputera	11	9,891	19.7	15.7	24.3	59	40,333	80.3	75.7	84.3
Others	172	95,779	6.1	4.7	7.9	1,342	1,453,449	93.3	91.4	94.8
<b>Marital Status</b>										
Never Married	1,745	1,815,663	23.0	21.5	24.5	5,207	6,047,223	76.6	75.0	78.0
Married	2,149	2,036,866	17.6	16.6	18.7	10,229	9,483,182	82.0	81.0	83.0
Separated	10	8,415	7.4	3.0	16.9	104	10,575	92.6	83.1	97.0
Divorcee	40	35,415	12.2	8.3	17.5	327	255,797	87.8	82.5	91.7
Widow/er	90	68,203	8.7	6.7	11.3	1,008	710,724	91.0	88.4	93.0
<b>Education Level</b>										
No formal education	101	73,810	6.1	4.8	7.7	1,454	1,143,293	93.7	92.0	95.0
Primary	2,393	2,041,933	28.5	26.7	30.4	5,642	5,088,351	71.1	69.2	72.9
Secondary	1,833	1,823,401	18.8	17.8	19.9	7,621	7,850,227	80.9	79.8	81.9
Tertiary	1,033	1,100,864	25.9	23.8	28.1	2,829	3,140,926	73.8	71.6	75.9
Unclassified	629	589,989	36.3	32.0	40.8	1,012	1,002,398	61.7	57.2	66.1
<b>Occupation</b>										
Government	556	426,984	27.4	24.8	30.2	1,345	1,128,118	72.5	69.7	75.1
Semi-government	46	46,434	18.2	13.2	24.6	198	206,197	80.9	74.7	86.0
Private	957	1,155,272	16.5	15.1	18.0	4,865	5,823,795	83.2	81.7	84.6
Self-employed	494	478,802	14.3	12.6	16.1	3,177	2,866,309	85.3	83.5	87.1
Unpaid worker / homemaker	504	420,847	15.5	14.0	17.2	2,666	2,287,064	84.3	82.6	85.8
Retiree	171	146,545	11.0	9.3	13.0	1,564	1,183,272	88.9	87.0	90.7



Sociodemographic Characteristics	Yes				No					
	Count	Estimated Population	Prevalence (%)	95% CI	Count	Estimated Population	Prevalence (%)	95% CI		
								Lower	Upper	
<b>Household Income Group (RM)</b>										
Less than RM400	423	413,513	20.5	18.0	23.3	1,736	1,592,265	79.0	76.2	81.5
RM400 – RM499	73	74,047	17.8	13.6	22.9	375	341,854	82.2	77.1	86.4
RM500 – RM699	211	173,946	18.5	15.5	21.8	925	761,426	80.8	77.5	83.8
RM700 – RM999	333	273,956	16.6	14.0	19.5	1,522	1,374,101	83.0	80.1	85.6
RM1000 – RM1999	1,309	1,084,532	21.3	19.6	23.1	4,593	3,992,706	78.3	76.5	80.1
RM2000 – RM2999	1,087	972,401	21.2	19.3	23.1	3,684	3,594,715	78.3	76.3	80.1
RM3000 – RM3999	845	840,582	22.8	20.9	24.8	2,840	2,823,732	76.6	74.5	78.5
RM4000 – RM4999	607	631,062	23.7	21.2	26.5	1,864	2,018,107	75.9	73.1	78.5
RM5000 and above	1,648	1,634,461	26.3	24.3	28.4	4,300	4,565,912	73.5	71.4	75.5

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

Table 4.15: Timing of last visit for outpatient oral healthcare

Sociodemographic Characteristics	Between 1 year to less than 2 years			Between 2 years to less than 3 years			Between 3 years to less than 5 years									
	Count	Estimated Population	Percentage (%)	Count	Estimated Population	Percentage (%)	Count	Estimated Population	Percentage (%)							
			LL			UL			LL	UL	LL	UL				
<b>MALAYSIA</b>	3,092	3,023,466	11.1	10.4	11.8	2,138	2,163,888	7.9	7.5	8.4	1,454	1,405,067	5.2	4.8	5.6	
<b>State</b>																
Johor	280	339,544	10.6	9.1	12.3	188	256,709	8.0	6.9	9.3	119	153,877	4.8	3.9	6.0	
Kedah	225	247,456	13.5	11.7	15.5	115	138,793	7.6	6.0	9.5	68	71,720	3.9	3.0	5.1	
Kelantan	196	158,800	10.8	8.9	13.2	124	102,242	7.0	5.5	8.8	112	90,314	6.2	4.7	8.0	
Melaka	189	94,945	12.0	9.7	14.8	122	58,818	7.5	5.7	9.6	96	45,244	5.7	4.2	7.8	
Negeri Sembilan	184	119,822	12.3	10.1	14.8	103	71,077	7.3	5.6	9.5	77	43,840	4.5	3.3	6.1	
Pahang	139	121,174	8.7	6.7	11.3	115	102,248	7.4	6.2	8.7	99	84,271	6.1	4.8	7.6	
Penang	170	138,417	9.1	7.0	11.6	123	101,334	6.6	4.9	9.0	74	69,711	4.6	3.3	6.2	
Perak	191	285,683	12.7	11.0	14.7	141	222,933	9.9	8.1	12.2	79	101,695	4.5	3.7	5.6	
Perlis	224	36,629	16.9	14.4	19.6	101	17,430	8.0	6.3	10.2	75	11,457	5.3	3.9	7.0	
Selangor	515	715,586	13.3	11.4	15.3	406	541,244	10.0	8.9	11.3	258	373,236	6.9	5.9	8.1	
Terengganu	167	99,824	9.9	7.9	12.3	100	53,116	5.2	4.2	6.5	78	48,771	4.8	3.8	6.1	
Sabah/Labuan	301	313,200	9.7	7.7	12.3	212	199,853	6.2	5.0	7.6	153	133,290	4.1	3.2	5.3	
Sarawak	109	130,211	5.6	4.2	7.5	102	131,147	5.7	4.2	7.5	44	52,552	2.3	1.7	3.1	
WP Kuala Lumpur	105	213,836	13.2	9.7	17.7	88	158,339	9.8	7.5	12.7	63	119,872	7.4	5.1	10.7	
WP Putrajaya	97	8,340	11.8	9.5	14.7	98	8,603	12.2	10.2	14.5	59	5,216	7.4	5.5	9.8	
<b>Location</b>																
Urban	1,905	2,297,362	11.8	10.9	12.7	1,362	1,691,127	8.7	8.1	9.3	895	1,053,87	5.4	4.9	5.9	
Rural	1,187	726,104	9.3	8.5	10.2	776	472,760	6.1	5.5	6.7	559	351,180	4.5	4.0	5.1	
<b>Sex</b>																
Male	1,350	1,389,807	10.0	9.2	10.8	978	1,071,487	7.7	7.1	8.3	700	715,827	5.1	4.6	5.7	
Female	1,742	1,633,659	12.3	11.4	13.1	1,160	1,092,400	8.2	7.6	8.9	754	689,240	5.2	4.7	5.7	
<b>Age Group</b>																
0-4	71	53,546	2.3	1.7	3.1	20	19,969	0.8	0.5	1.5	13	13,390	0.6	0.3	1.2	
5-9	318	299,513	11.5	9.9	13.4	91	88,682	3.4	2.6	4.5	20	14,144	0.5	0.3	0.9	
10-14	462	415,927	15.8	13.9	17.8	173	159,954	6.1	5.0	7.3	74	67,814	2.6	1.9	3.4	
15-19	431	462,148	16.8	15.0	18.9	236	249,196	9.1	7.6	10.8	136	155,321	5.7	4.6	6.9	
20-24	221	271,626	10.0	8.2	12.2	221	276,113	10.2	8.7	11.9	206	248,326	9.2	7.7	10.8	
25-29	261	293,348	11.3	9.5	13.3	226	265,728	10.2	8.6	12.1	146	160,724	6.2	5.1	7.5	
30-34	241	257,273	12.5	10.7	14.5	205	214,804	10.4	8.8	12.3	143	152,668	7.4	6.0	9.0	
35-39	232	241,554	13.1	11.1	15.4	205	210,464	11.4	9.6	13.5	123	120,386	6.5	5.3	8.1	
40-44	204	190,683	11.1	9.4	12.9	193	202,452	11.7	9.9	13.9	134	118,929	6.9	5.7	8.3	
45-49	197	166,752	10.6	8.9	12.7	178	159,129	10.1	8.5	12.1	126	107,258	6.8	5.3	8.7	
50-54	175	146,289	11.1	9.3	13.2	137	112,750	8.6	7.1	10.4	113	80,932	6.2	4.9	7.7	
55-59	123	80,161	7.8	6.2	9.8	119	90,870	8.8	7.2	10.9	85	71,570	7.0	5.4	9.0	
60-64	74	67,949	8.8	6.6	11.7	60	58,644	7.6	5.6	10.3	55	36,177	4.7	3.3	6.7	
65-69	45	38,759	7.8	5.3	11.3	33	24,225	4.9	3.2	7.4	34	18,920	3.8	2.4	5.9	
70-74	17	21,550	5.9	2.0	16.0	26	19,546	5.3	3.1	8.9	28	19,584	5.3	3.1	8.9	
75+	20	16,388	3.8	2.3	6.5	15	11,359	2.7	1.5	4.8	18	18,925	4.4	2.3	8.4	

Sociodemographic Characteristics	Between 1 year to less than 2 years				Between 2 years to less than 3 years				Between 3 years to less than 5 years							
	Count	Estimated Population	Percentage (%)		Count	Estimated Population	Percentage (%)		Count	Estimated Population	Percentage (%)					
			LL	UL			LL	UL			LL	UL				
<b>MALAYSIA</b>	3,092	3,023,466	11.1	10.4	11.8	2,138	2,163,888	7.9	7.5	8.4	1,454	1,405,067	5.2	4.8	5.6	
<b>Ethnicity</b>																
Malay	1,956	1,702,239	11.9	11.2	12.8	1,265	1,139,347	8.0	7.4	8.6	888	798,378	5.6	5.1	6.1	
Chinese	548	733,067	11.6	10.3	13.0	453	607,372	9.6	8.6	10.7	260	351,928	5.6	4.7	6.5	
Indian	256	227,230	12.4	10.3	14.9	187	184,216	10.0	8.3	12.1	115	96,025	5.2	4.2	6.5	
Bumiputera Sabah	184	224,352	10.5	7.9	13.9	116	121,241	5.7	4.5	7.2	98	93,176	4.4	3.2	5.9	
Bumiputera Sarawak	46	51,688	4.6	2.8	7.4	46	51,252	4.6	3.2	6.5	22	19,094	1.7	1.0	2.8	
Other Bumiputera	7	8,640	17.2	11.7	24.6	4	4,891	9.7	5.6	16.4	6	5,798	11.5	8.1	16.2	
Others	95	76,251	4.9	3.4	6.9	67	55,570	3.6	2.4	5.3	65	40,668	2.6	1.7	4.1	
<b>Marital Status</b>																
Never Married	2	1,611	7.3	1.7	26.1	1	727	3.3	0.4	20.6	-	-	-	-	-	-
Married	984	1,053,709	13.3	12.2	14.6	674	764,909	9.7	8.7	10.7	483	548,819	6.9	6.2	7.8	
Separated	1,348	1,289,709	11.2	10.3	12.1	1,172	1,130,988	9.8	9.1	10.5	834	746,552	6.5	5.9	7.1	
Divorcee	12	9,907	8.7	3.5	20.0	10	15,841	13.9	7.1	25.5	3	1,446	1.3	0.3	4.6	
Widow/er	26	19,244	6.6	4.2	10.3	36	30,251	10.4	7.0	15.2	14	13,739	4.7	2.6	8.5	
<b>Education Level</b>																
No formal education	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Primary	911	779,750	10.9	9.9	11.9	476	447,809	6.3	5.6	7.0	343	288,210	4.0	3.5	4.6	
Secondary	1,209	1,246,234	12.8	11.9	13.9	989	998,506	10.3	9.5	11.1	683	687,802	7.1	6.4	7.8	
Tertiary	580	640,841	15.1	13.3	17.0	495	554,223	13.0	11.6	14.6	312	337,946	7.9	6.9	9.2	
Unclassified	171	171,217	10.5	7.6	14.4	82	81,748	5.0	3.9	6.6	38	32,723	2.0	1.4	2.9	
<b>Occupation</b>																
Government	283	226,926	14.6	12.5	17.0	244	206,097	13.2	11.1	15.7	126	87,824	5.6	4.5	7.1	
Semi-government	38	40,668	16.0	11.3	22.1	26	26,389	10.4	6.4	16.5	21	20,697	8.1	4.5	14.4	
Private	647	765,425	10.9	9.8	12.1	630	756,447	10.8	9.7	12.1	448	516,315	7.4	6.6	8.3	
Self-employed	340	305,809	9.1	7.9	10.5	307	292,008	8.7	7.6	10.0	259	228,214	6.8	5.8	7.9	
Unpaid worker	7	7,130	15.8	6.5	33.4	3	1,496	3.3	0.8	13.3	5	3,997	8.8	3.0	23.3	
Homemaker	375	345,838	12.7	11.2	14.4	297	266,918	9.8	8.6	11.2	195	151,126	5.6	4.7	6.5	
Retiree	100	92,450	6.9	5.0	9.6	81	68,415	5.1	4.0	6.7	90	72,340	5.4	4.1	7.2	
<b>Household Income Group (RM)</b>																
Less than RM400	184	173,614	8.6	7.0	10.5	133	132,922	6.6	5.2	8.3	84	86,402	4.3	3.3	5.6	
RM400 – RM499	36	27,013	6.5	4.0	10.3	16	17,079	4.1	2.4	7.0	19	17,200	4.1	2.5	6.9	
RM500 – RM699	105	96,469	10.2	7.8	13.3	65	57,187	6.1	4.3	8.5	49	40,399	4.3	3.0	6.0	
RM700 – RM999	178	154,159	9.3	7.7	11.2	85	72,340	4.4	3.4	5.7	84	67,302	4.1	3.0	5.5	
RM1000 – RM1999	563	447,340	8.8	7.8	9.8	380	327,062	6.4	5.6	7.3	273	235,426	4.6	4.0	5.4	
RM2000 – RM2999	546	544,886	11.9	10.5	13.3	379	381,810	8.3	7.3	9.5	263	234,753	5.1	4.4	6.0	
RM3000 – RM3999	429	439,930	11.9	10.4	13.6	312	325,281	8.8	7.7	10.1	189	195,520	5.3	4.4	6.4	
RM4000 – RM4999	287	301,411	11.3	9.7	13.2	196	213,504	8.0	6.8	9.5	148	152,590	5.7	4.6	7.1	
RM5000 and above	764	838,643	13.5	12.1	15.1	572	636,704	10.2	9.2	11.4	345	375,475	6.0	5.2	7.0	

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

LL = Lower Limit , UL = Upper Limit

Table 4.15: Timing of last outpatient oral healthcare visit (cont.)

Sociodemographic Characteristics	More than 5 years				Never				
	Count	Estimated Population	Percentage (%)		Count	Estimated Population	Percentage (%)		
			Lower	Upper			Lower	Upper	
<b>MALAYSIA</b>	4,968	4,596,155	16.8	16.2	9,440	9,176,820	33.6	32.2	35.1
<b>State</b>									
Johor	479	603,886	18.9	16.8	671	913,008	28.5	24.8	32.6
Kedah	292	300,498	16.4	13.2	553	598,965	32.6	27.1	38.7
Kelantan	354	264,732	18.0	15.2	701	526,814	35.9	28.4	44.2
Melaka	365	157,065	19.9	17.4	364	202,968	25.7	21.6	30.4
Negeri Sembilan	324	208,934	21.4	18.2	380	223,663	22.9	19.6	26.6
Pahang	235	199,326	14.4	12.0	696	574,530	41.4	36.3	46.7
Penang	345	299,909	19.6	16.9	563	478,297	31.3	27.9	34.9
Perak	369	476,975	21.3	18.4	320	389,085	17.3	15.3	19.6
Perlis	220	31,603	14.6	12.5	410	58,837	27.1	22.4	32.4
Selangor	610	824,322	15.3	13.9	1,394	1,815,271	33.6	30.2	37.3
Terengganu	295	145,386	14.4	11.8	731	400,105	39.5	32.1	47.5
Sabah/Labuan	553	492,454	15.3	13.5	1,262	1,429,785	44.4	39.1	50.0
Sarawak	295	336,232	14.5	12.6	1,030	1,213,893	52.4	47.2	57.6
WP Kuala Lumpur	136	246,049	15.2	11.8	202	337,247	20.8	17.1	25.1
WP Putrajaya	96	8,785	12.5	9.6	163	14,352	20.3	17.0	24.1
<b>Location</b>									
Urban	2,748	3,261,455	16.7	15.9	5,182	6,235,392	32.0	30.3	33.7
Rural	2,220	1,334,700	17.1	16.0	4,258	2,941,428	37.8	35.1	40.5
<b>Sex</b>									
Male	2,433	2,479,964	17.8	16.8	4,932	5,032,573	36.1	34.3	37.8
Female	2,535	2,116,191	15.9	15.1	4,508	4,144,247	31.1	29.6	32.6
<b>Age Group</b>									
0-4	8	5,372	0.2	0.1	2,464	2,105,186	89.0	87.2	90.5
5-9	26	24,942	1.0	0.6	1,013	946,759	36.5	33.8	39.3
10-14	98	93,559	3.5	2.8	619	612,319	23.2	20.7	25.8
15-19	259	292,957	10.7	9.1	547	688,918	25.1	22.5	27.8
20-24	491	634,573	23.4	21.1	575	800,792	29.5	26.4	32.8
25-29	441	524,093	20.1	18.0	553	837,647	32.1	29.0	35.5
30-34	376	406,170	19.7	17.5	490	575,005	27.8	25.0	30.8
35-39	342	360,339	19.5	17.2	471	477,440	25.9	23.0	29.0
40-44	417	392,239	22.7	20.3	481	436,395	25.3	22.6	28.2
45-49	402	332,993	21.2	18.8	489	447,033	28.5	25.8	31.3
50-54	470	363,805	27.7	25.1	465	361,319	27.5	24.6	30.6
55-59	530	349,255	34.0	30.8	388	275,984	26.9	23.8	30.2
60-64	376	286,612	37.1	33.4	285	205,215	26.6	23.3	30.1
65-69	263	194,285	38.9	34.1	220	147,714	29.6	25.0	34.7
70-74	207	145,408	39.5	33.6	198	117,971	32.0	26.6	38.0
75+	262	189,552	44.5	38.9	182	141,125	33.1	27.9	38.8

Sociodemographic Characteristics	More than 5 years						Never					
	Count	Estimated Population	Percentage (%)		95 %CI		Count	Estimated Population	Percentage (%)		95 %CI	
			Lower	Upper	Lower	Upper			Lower	Upper		
<b>MALAYSIA</b>	4,968	4,596,155	16.8	16.2	17.6	9,440	9,176,820	33.6	32.2	35.1		
<b>Ethnicity</b>												
Malay	2,847	2,368,571	16.6	15.7	17.6	5,293	43,335	30.4	28.7	32.2		
Chinese	1,050	1,184,810	18.7	17.2	20.3	1,388	17,838	28.2	25.9	30.5		
Indian	408	364,964	19.9	17.4	22.6	588	4,908	26.8	23.3	30.5		
Bumiputera Sabah	313	332,315	15.6	13.5	18.0	528	6,266	55.8	49.3	62.1		
Bumiputera Sarawak	148	152,657	13.6	10.7	17.1	723	8,634	40.6	35.3	46.1		
Orang Asli	4	1,818	3.6	1.9	6.7	37	1,769	35.2	26.5	45.0		
Others	198	191,021	12.3	9.6	15.6	883	10,608	68.1	63.0	72.8		
<b>Marital Status</b>												
Never Married	1	1,051	4.7	0.6	27.9	1,713	2,109,366	26.7	24.8	28.6		
Married	1,134	1,337,784	16.9	15.8	18.2	3,344	3,234,993	28.0	26.3	29.7		
Separated	3,162	2,761,993	23.9	22.8	25.0	37	37,575	32.9	22.6	45.1		
Divorcee	37	38,409	33.6	23.6	45.4	122	99,525	34.2	22.6	45.1		
Widow/er	113	81,429	28.0	22.5	34.2	361	262,886	33.7	30.0	37.5		
<b>Education Level</b>												
No formal education	1	1,316	19.8	2.7	69.0	693	621,629	51.0	45.9	56.0		
Primary	1,480	1,230,399	17.2	15.9	18.5	2,233	2,166,189	30.3	28.2	32.4		
Secondary	2,111	2,088,562	21.5	20.4	22.7	2,306	2,523,110	26.0	24.4	27.7		
Tertiary	753	825,531	19.4	17.7	21.2	608	702,706	16.5	14.7	18.5		
Unclassified	93	99,030	6.1	4.8	7.8	574	552,887	34.0	29.9	38.4		
<b>Occupation</b>												
Government	359	296,825	19.1	16.9	21.5	284	267,995	17.2	14.6	20.1		
Semi-government	52	54,835	21.5	15.7	28.7	50	48,031	18.9	12.9	26.7		
Private	1,323	1,501,149	21.4	19.9	23.0	1,657	2,125,252	30.4	27.9	32.9		
Self-employed	1,011	898,732	26.8	24.8	28.8	1,126	1,025,460	30.5	28.0	33.1		
Unpaid worker/ Homemaker	854	678,611	25.0	23.0	27.1	861	776,202	28.6	26.2	31.1		
Retiree	706	504,066	37.9	34.9	41.0	524	392,744	29.5	26.4	32.8		
<b>Household Income Group (RM)</b>												
Less than RM400	390	334,389	16.6	14.4	19.0	876	79,928	39.6	36.1	43.3		
RM400 – RM499	87	73,552	17.7	13.4	23.0	197	19,114	46.0	37.7	54.5		
RM500 – RM699	217	167,288	17.8	15.1	20.8	453	37,526	39.8	35.5	44.3		
RM700 – RM999	368	305,870	18.5	16.2	21.0	759	72,818	44.0	39.7	48.4		
RM1000 – RM1999	1,080	885,711	17.4	16.1	18.8	2,119	195,197	38.3	35.9	40.8		
RM2000 – RM2999	813	773,101	16.8	15.5	18.3	1,550	153,043	33.3	31.0	35.7		
RM3000 – RM3999	701	681,193	18.5	16.9	20.2	1,121	109,178	29.6	27.0	32.4		
RM4000 – RM4999	439	471,783	17.7	15.6	20.1	738	82,382	31.0	26.9	35.3		
RM5000 and above	873	903,269	14.5	13.3	15.9	1,627	168,491	27.1	25.1	29.3		

Note: Some cells have respondent count < 30. Results should be interpreted with caution.



Sociodemographic Characteristics	One facility						2 - 3 facilities						More than 3 facilities							
	Count	Estimated Population	% (Percentage)		Count	Estimated Population	%	(Percentage)		Count	Estimated Population	%	(Percentage)		Count	Estimated Population	%	(Percentage)		
			LL	UL				LL	UL				LL	UL				LL	UL	
<b>MALAYSIA</b>	6,334	5,912,536	95.1	94.3	95.8	141	132,302	2.1	1.7	2.7	7	9,400	0.2	0.1	0.4					
<b>Ethnicity</b>																				
Malay	4,002	3,289,105	94.7	93.5	95.7	91	81,348	2.3	1.7	3.1	4	2,543	0.1	0.0	0.2					
Chinese	1,080	1,468,615	96.1	94.7	97.2	18	23,799	1.6	0.9	2.7	3	6,857	0.4	0.1	1.5					
Indian	510	423,269	94.8	91.7	96.7	14	12,608	2.8	1.5	5.4	-	-	-	-	-	-	-	-	-	
Bumiputera Sabah	405	429,218	95.4	92.3	97.3	10	11,708	2.6	1.3	5.1	-	-	-	-	-	-	-	-	-	
Bumiputera Sarawak	162	198,107	97.7	94.6	99.0	1	1,420	0.7	0.1	3.8	-	-	-	-	-	-	-	-	-	
Other Bumiputera	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Others	164	94,330	90.5	79.2	95.9	7	1,419	1.4	0.4	4.0	-	-	-	-	-	-	-	-	-	
<b>Marital Status</b>																				
Never Married	1,696	1,767,634	95.5	94.0	96.7	42	41,895	2.3	1.5	3.4	2	1,815	0.1	0.0	0.6					
Married	2,078	1,974,668	95.0	93.5	96.1	62	50,915	2.4	1.7	3.5	5	7,586	0.4	0.1	1.1					
Separated	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Divorcee	39	35,375	99.9	99.2	100	1	40	0.1	0.0	0.8	-	-	-	-	-	-	-	-	-	
Widow/er	86	65,337	92.8	83.6	97.0	2	2,014	2.9	0.6	12.1	-	-	-	-	-	-	-	-	-	
<b>Education Level</b>																				
No formal education	96	69,524	90.9	82.5	95.4	3	3,434	4.5	1.4	13.4	-	-	-	-	-	-	-	-	-	
Primary	2,336	1,987,492	96.0	94.8	96.9	30	34,482	1.7	1.1	2.5	-	-	-	-	-	-	-	-	-	
Secondary	1,781	1,766,262	95.3	93.7	96.5	43	45,008	2.4	1.6	3.6	4	7,870	0.4	0.1	1.3					
Tertiary	982	1,062,080	95.4	93.6	96.7	44	33,540	3.0	2.0	4.5	3	1,530	0.1	0.0	0.5					
Unclassified	61	575,340	92.5	89.0	94.9	1	7,748	1.2	0.6	2.7	-	-	-	-	-	-	-	-	-	
<b>Occupation</b>																				
Government	529	411,675	96.1	93.3	97.8	24	13,399	3.1	1.6	6.0	2	733	0.2	0.0	0.9					
Semi-government	46	46,434	95.7	75.0	99.4	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Private	920	1,113,957	94.6	92.6	96.1	34	35,675	3.0	2.0	4.7	1	3,757	0.3	0.0	2.2					
Self-employed	485	472,186	95.9	93.3	97.6	6	4,405	0.9	0.4	2.3	2	2,182	0.4	0.1	1.9					
Unpaid worker / homemaker	2	673	100	100	100	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Retiree	165	140,679	95.7	90.3	98.2	4	5,014	3.4	1.2	9.2	-	-	-	-	-	-	-	-	-	
<b>Household Income Group (RM)</b>																				
Less than RM400	410	404,794	95.5	92.4	97.3	8	7,190	1.7	0.7	3.9	-	-	-	-	-	-	-	-	-	
RM400 – RM499	71	72,721	98.2	92.1	99.6	1	976	1.3	0.2	8.8	-	-	-	-	-	-	-	-	-	
RM500 – RM699	207	171,194	94.9	87.6	98.0	3	2,581	1.4	0.3	6.6	-	-	-	-	-	-	-	-	-	
RM700 – RM999	323	267,128	95.1	91.6	97.2	4	2,433	0.9	0.3	2.6	-	-	-	-	-	-	-	-	-	
RM1000 – RM1999	1,279	1,058,215	95.9	94.1	97.2	20	19,550	1.8	1.0	3.1	2	1,815	0.2	0.0	1.0					
RM2000 – RM2999	1,064	946,696	94.8	92.4	96.4	13	15,553	1.6	0.6	3.7	1	1,385	0.1	0.0	1.0					
RM3000 – RM3999	808	803,157	92.9	90.3	94.9	30	30,957	3.6	2.3	5.5	1	1,013	0.1	0.0	0.8					
RM4000 – RM4999	595	615,451	95.9	92.8	97.7	8	9,037	1.4	0.5	3.8	-	-	-	-	-	-	-	-	-	
RM5000 and above	1,577	1,573,179	95.6	94.2	96.6	54	44,025	2.7	1.9	3.8	3	5,188	0.3	0.1	1.4					

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

LL = Lower Limit , UL = Upper Limit

**Table 4.17: Type of outpatient healthcare facilities/providers where oral healthcare was sought in the last 12 months**

Type of facility	Government					Private				
	Count	Estimated Population	%	95% CI		Count	Estimated Population	%	95% CI	
				Lower	Upper				Lower	Upper
Medical Clinic	334	287,998	4.6	3.9	5.4	66	69,150	1.1	0.8	1.5
Dental Clinic	4,048	3,545,619	56.7	55.2	58.3	1570	1,663,920	26.6	25.3	28.0
Pharmacy	4	2,978	0.0	0.0	0.1	9	8248	0.1	0.1	0.3
Hospital	285	271,295	4.3	3.7	5.1	20	15,054	0.2	0.1	0.4
TCM	-	-	-	-	-	2	2,485	0.0	0.0	0.2
Others	5	7,562	0.1	0.0	0.3	3	1,892	0.0	0.0	0.1
Missing	94	71,542	1.1	0.9	1.5	190	242,352	3.9	3.3	4.6
<b>All facilities combined</b>	<b>4,770</b>	<b>4,186,994</b>	<b>67.0</b>	<b>65.5</b>	<b>68.4</b>	<b>1860</b>	<b>2,003,102</b>	<b>32.1</b>	<b>30.6</b>	<b>33.5</b>

Note: Some cells have respondent count < 30. Results should be interpreted with caution.



Table 4.18: Variables associated with seeking oral healthcare at outpatient facilities in the last 12 months

Variable	Count	Estimated Population	Mean	95%CI		Median	(IQR)
				Upper	Lower		
<b>Frequency of visit (times)</b>							
<b>Total</b>	6,510	6,069,660	1.26	1.24	1.29	1.0	1.0 - 1.0
<b>Sector</b>							
Government facility	4,660	4,076,688	1.23	1.20	1.25	1.0	1.0 - 1.0
Private facility	1,850	1,992,972	1.34	1.29	1.40	1.0	1.0 - 1.0
<b>Location</b>							
Urban	3,802	4,387,091	1.27	1.24	1.31	1.0	1.0 - 1.0
Rural	2,707	1,682,569	1.24	1.21	1.28	1.0	1.0 - 1.0
<b>Region</b>							
Peninsular Malaysia	5,520	5,113,910	1.25	1.22	1.27	1.0	1.0 - 1.0
Sabah / Labuan	664	582,187	1.34	1.27	1.40	1.0	1.0 - 1.0
Sarawak	326	373,563	1.42	1.29	1.55	1.0	1.0 - 1.0
<b>Distance to facility (km)</b>							
<b>Total</b>	5,513	5,237,710	7.20	15.58	16.90	3.0	0.5 - 8.0
<b>Sector</b>							
Government facility	3,871	3,443,097	5.31	13.32	14.73	2.0	0.2 - 5.0
Private facility	1,642	1,794,613	10.84	18.02	20.53	5.0	2.0 - 10.0
<b>Location</b>							
Urban	3,297	3,877,160	6.66	14.63	16.25	3.0	1.0 - 8.0
Rural	2,216	1,360,549	8.75	17.73	20.03	2.0	0.2 - 9.0
<b>Region</b>							
Peninsular Malaysia	4,720	4,451,366	6.61	14.21	15.50	3.0	0.5 - 8.0
Sabah / Labuan	529	478,864	11.62	21.97	28.64	4.3	1.5 - 9.0
Sarawak	264	307,480	8.90	19.12	25.70	5.0	2.0 - 10.0
<b>Travel time to facility (minutes)</b>							
<b>Total</b>	4,267	4,207,196	16.24	6.69	7.71	10.0	5.0 - 20.0
<b>Sector</b>							
Government facility	2,635	2,432,649	14.03	4.82	5.79	10.0	5.0 - 15.0
Private facility	1,632	1,774,547	19.27	9.63	12.04	15.0	10.0 - 20.0
<b>Location</b>							
Urban	2,725	3,227,215	15.44	6.07	7.25	10.0	5.0 - 20.0
Rural	1,542	979,981	18.88	7.74	9.77	10.0	5.0 - 20.0
<b>Region</b>							
Peninsular Malaysia	3,652	3,577,436	14.85	6.16	7.06	10.0	5.0 - 15.0
Sabah / Labuan	407	371,009	25.30	8.16	15.08	20.0	10.0 - 30.0
Sarawak	208	258,751	22.41	7.29	10.51	15.0	10.0 - 30.0

Note: any case with missing value was excluded from the analysis; SD=standard deviation, IQR=inter quartile range

Table 4.19: Frequency of visit to government outpatient healthcare facilities in the last 12 months

Sociodemographic Characteristics	Once			Twice			More than twice									
	Count	Estimated Population	%	Count	Estimated Population	%	Count	Estimated Population	%							
	LL	UL	95% CI	LL	UL	95% CI	LL	UL	95% CI							
<b>MALAYSIA</b>	4,168	3,591,962	85.8	84.3	87.2	297	299,488	7.2	6.0	8.5	195	185,238	4.4	3.8	5.2	
<b>State</b>																
Johor	450	549,353	86.6	83.0	89.5	28	38,537	6.1	4.2	8.7	21	28,534	4.5	2.8	7.1	
Kedah	230	228,874	87.3	81.1	91.7	18	24,647	9.4	5.5	15.6	5	3,895	1.5	0.5	4.0	
Kelantan	217	166,140	98.0	94.7	99.2	-	-	-	-	-	2	1,781	1.1	0.3	4.1	
Melaka	307	150,850	89.8	84.3	93.6	11	2,871	1.7	0.7	3.9	4	1,433	0.9	0.2	3.6	
Negeri Sembilan	326	217,840	90.0	86.0	93.0	20	10,788	4.5	2.7	7.4	13	6,864	2.8	1.4	5.7	
Pahang	204	179,786	87.1	82.3	90.7	17	13,162	6.4	3.9	10.2	11	8,571	4.2	2.2	7.5	
Penang	314	237,051	86.5	78.6	91.8	19	19,991	7.3	4.1	12.7	6	4,269	1.6	0.4	5.7	
Perak	273	432,273	87.0	82.5	90.5	22	31,694	6.4	3.9	10.2	18	22,253	4.5	2.7	7.4	
Perlis	278	44,241	96.4	93.0	98.2	5	542	1.2	0.5	3.0	3	666	1.5	0.4	5.4	
Selangor	397	447,127	84.6	80.4	88.0	35	39,823	7.5	5.2	10.8	28	34,277	6.5	4.3	9.7	
Terengganu	261	146,612	96.4	93.1	98.1	3	1,766	1.2	0.3	3.8	3	1,199	0.8	0.3	2.4	
Sabah/Labuan	401	328,855	78.4	70.1	85.0	49	57,441	13.7	7.7	23.3	39	29,115	6.9	4.9	9.8	
Sarawak	205	226,875	73.1	66.3	78.9	28	31,994	10.3	6.5	15.9	27	32,585	10.5	7.1	15.3	
WP Kuala Lumpur	144	223,019	85.3	78.8	90.1	18	24,329	9.3	5.6	15.0	6	8,979	3.4	1.5	7.7	
WP Putrajaya	161	13,065	81.1	74.6	86.3	24	1,901	11.8	7.8	17.5	9	816	5.1	2.6	9.7	
<b>Location</b>																
Urban	2,191	2,361,925	85.5	83.4	87.3	171	209,385	7.6	6.1	9.4	99	116,024	4.2	3.3	5.3	
Rural	1,977	1,230,036	86.4	84.5	88.2	126	90,103	6.3	5.1	7.9	96	69,214	4.9	3.9	6.0	
<b>Sex</b>																
Male	1,910	1,684,660	86.2	83.7	88.4	119	128,991	6.6	4.8	9.0	88	82,742	4.2	3.3	5.4	
Female	2,258	1,907,302	85.4	83.5	87.1	178	170,497	7.6	6.4	9.1	107	102,496	4.6	3.7	5.7	
<b>Age Group</b>																
0 - 4	118	94,290	87.6	74.9	94.3	7	9,396	8.7	3.0	22.8	1	1,075	1.0	0.1	6.8	
5 - 9	1,107	914,541	88.6	86.1	90.6	61	56,384	5.5	4.0	7.3	26	23,331	2.3	1.4	3.6	
10 - 14	1,219	997,953	88.9	86.5	90.9	53	57,014	5.1	3.6	7.0	29	28,396	2.5	1.7	3.8	
15 - 19	607	617,199	86.3	80.4	90.6	38	53,054	7.4	3.8	14.0	30	34,885	4.9	3.3	7.2	
20 - 24	142	172,220	83.9	75.7	89.7	19	16,821	8.2	4.6	14.1	10	15,491	7.5	3.6	15.2	
25 - 29	179	163,262	81.1	71.8	87.9	19	20,055	10.0	5.7	16.8	12	8,616	4.3	2.1	8.6	
30 - 34	146	144,593	87.2	79.9	92.1	16	16,787	10.1	5.7	17.2	6	3,938	2.4	0.9	6.2	
35 - 39	134	107,497	82.3	73.0	89.0	16	14,820	11.4	6.1	20.2	7	8,236	6.3	2.9	13.2	
40 - 44	124	101,814	77.6	68.8	84.5	20	16,924	12.9	7.9	20.5	14	12,463	9.5	5.3	16.5	
45 - 49	125	101,288	81.9	73.4	88.2	17	8,836	7.1	3.4	14.5	14	10,525	8.5	4.7	14.9	
50 - 54	97	63,285	71.0	59.2	80.6	15	12,494	14.0	8.0	23.3	12	13,310	14.9	7.6	27.1	
55 - 59	66	39,616	70.1	57.4	80.3	9	7,663	13.6	6.7	25.4	11	6,727	11.9	6.4	21.2	
60 - 64	43	30,637	67.5	51.6	80.2	4	5,121	11.3	4.2	26.7	10	9,130	20.1	10.4	35.2	
65 - 70	26	19,353	82.6	61.1	93.5	1	1,420	6.1	0.9	32.7	4	1,821	7.8	2.1	25.3	
70 - 74	20	12,151	70.6	46.1	87.0	-	-	-	-	-	5	3,002	17.4	6.8	37.9	
75+	15	12,262	63.7	38.5	83.1	2	2,700	14.0	3.4	43.0	4	4,292	22.3	8.0	48.6	

Sociodemographic Characteristics	Once						Twice						More than twice					
	Count	Estimated Population	%	95% CI		%	Count	Estimated Population	%	95% CI		Count	Estimated Population	%	95% CI			
				LL	UL					LL	UL				LL	UL		
<b>MALAYSIA</b>	4,168	3,591,962	85.8	84.3	87.2	297	299,488	7.2	6.0	8.5	195	185,238	4.4	3.8	5.2			
Malay	2,792	2,177,233	87.4	85.9	88.8	174	154,324	6.2	5.2	7.4	101	90,352	3.6	2.9	4.5			
Chinese	550	677,764	86.6	82.9	89.7	28	38,466	4.9	3.2	7.4	35	43,592	5.6	3.8	8.1			
Indian	344	280,130	86.6	81.0	90.8	28	30,256	9.4	5.8	14.7	12	8,255	2.6	1.1	5.6			
Bumiputera Sabah	110	132,286	74.4	65.5	81.7	17	17,040	9.6	5.7	15.7	12	16,421	9.2	5.1	16.1			
Bumiputera Sarawak	270	271,972	76.8	66.8	84.4	40	56,138	15.8	8.7	27.2	28	23,518	6.6	4.4	9.8			
Other Bumiputera	10	9,541	96.5	76.3	99.6	1	350	3.5	0.4	23.7	-	-	-	-	-			
Others	92	43,035	87.7	75.7	94.3	9	2,915	5.9	2.2	14.9	7	3,100	6.3	2.0	18.5			
<b>Marital Status</b>																		
Never Married	1,224	1,169,730	87.1	83.6	89.9	85	96,149	7.2	4.8	10.5	52	57,251	4.3	3.1	5.9			
Married	861	720,012	80.4	77.2	83.2	98	90,513	10.1	8.0	12.7	85	74,202	8.3	6.5	10.5			
Separated	1	395	11.1	1.1	58.1	2	3,150	88.9	41.9	98.9	0	0	0.0	0.0	0.0			
Divorcee	15	11,619	74.4	49.2	89.7	3	2,601	16.7	5.2	42.1	1	711	4.6	0.6	26.7			
Widow/er	47	32,530	76.3	62.0	86.4	9	6,079	14.3	6.5	28.4	6	3,723	8.7	3.5	20.1			
Others	1	1,080	100	0.0	0.0	-	-	-	-	-	-	-	-	-	-			
<b>Education Level</b>																		
No formal education	82	52,694	78.4	66.5	86.9	11	10,826	16.1	8.8	27.6	4	2,201	3.3	1.2	8.9			
Primary	1,929	1,598,983	88.6	86.8	90.2	102	94,079	5.2	4.1	6.6	62	52,525	2.9	2.2	3.9			
Secondary	986	922,679	83.0	79.0	86.3	88	105,837	9.5	6.6	13.5	71	70,820	6.4	4.9	8.3			
Tertiary	314	280,592	79.6	73.3	84.7	48	34,920	9.9	6.8	14.2	29	26,788	7.6	4.8	11.9			
Unclassified	488	436,620	85.6	81.8	88.7	28	29,409	5.8	3.9	8.5	25	30,091	5.9	3.9	8.8			
<b>Occupation</b>																		
Government	240	177,169	83.1	76.8	88.0	35	25,063	11.8	7.6	17.7	15	6,662	3.1	1.6	5.9			
Semi-government	13	14,725	82.3	54.3	94.8	2	2,110	11.8	2.4	42.6	2	1,053	5.9	1.1	26.4			
Private	326	356,641	83.8	79.0	87.7	43	37,015	8.7	6.1	12.3	24	30,342	7.1	4.5	11.2			
Self-employed	193	156,778	71.8	57.4	82.8	23	41,916	19.2	8.9	36.6	20	16,763	7.7	4.6	12.6			
Unpaid worker/ homemaker	247	188,165	80.2	74.1	85.2	27	23,696	10.1	6.4	15.5	24	22,032	9.4	6.2	13.9			
Retiree	81	56,679	71.0	58.9	80.7	6	7,792	9.8	4.3	20.6	16	11,942	15.0	8.3	25.5			
<b>Household Income Group (RM)</b>																		
Less than RM400	276	255,976	79.8	73.4	84.9	22	22,635	7.1	4.4	11.1	18	16,371	5.1	3.1	8.4			
RM400 – RM499	54	50,237	87.3	74.9	94.1	3	3,049	5.3	1.5	16.6	3	2,889	5.0	1.6	14.5			
RM500 – RM699	164	133,750	91.4	86.2	94.8	9	6,330	4.3	2.1	8.6	9	6,237	4.3	2.1	8.5			
RM700 – RM999	265	207,789	89.2	84.1	92.8	15	11,940	5.1	2.9	8.8	12	9,703	4.2	1.9	8.8			
RM1000 – RM1999	952	732,064	82.0	77.3	86.0	70	87,453	9.8	6.3	14.9	48	53,512	6.0	4.4	8.2			
RM2000 – RM2999	766	645,851	89.2	86.2	91.6	30	27,870	3.8	2.5	5.9	33	32,348	4.5	3.0	6.7			
RM3000 – RM3999	561	529,274	87.9	84.4	90.7	44	43,598	7.2	5.1	10.2	18	12,893	2.1	1.1	4.0			
RM4000 – RM4999	358	358,088	86.9	82.4	90.4	26	30,347	7.4	4.8	11.1	16	16,702	4.1	2.3	7.2			
RM5000 above	772	678,932	85.0	81.8	87.7	78	66,266	8.3	6.2	11.0	38	34,581	4.3	3.0	6.2			

Note: Some cells have respondent count < 30. Results should be interpreted with caution. LL = Lower Limit, UL = Upper Limit



Sociodemographic Characteristics	Once				Twice				More than twice						
	Count	Estimated Population	% (Percentage)	95% CI	Count	Estimated Population	% (Percentage)	95% CI	Count	Estimated Population	% (Percentage)	95% CI			
			LL	UL			LL	UL			LL	UL			
<b>MALAYSIA</b>	1,522	1,617,309	80.7	78.3	83.0	227	262,778	13.1	11.3	15.2	102	114,122	5.7	4.4	7.3
<b>Ethnicity</b>															
Malay	870	806,084	83.6	80.7	86.2	122	112,176	11.6	9.5	14.2	49	40,677	4.2	3.0	6.0
Chinese	400	577,159	76.4	71.4	80.7	60	112,514	14.9	11.4	19.2	34	61,930	8.2	5.6	11.9
Indian	115	101,723	79.2	70.8	85.7	25	18,862	14.7	9.3	22.4	11	7,865	6.1	3.1	11.8
Bumiputera Sabah	14	14,533	77.6	43.4	94.0	2	4,206	22.4	6.0	56.6	-	-	-	-	-
Bumiputera Sarawak	69	77,463	87.5	77.4	93.4	7	8,067	9.1	4.1	18.9	4	3,029	3.4	1.2	9.6
Other Bumiputera	54	40,346	84.2	69.6	92.5	11	6,953	14.5	6.5	29.4	4	622	1.3	0.4	3.7
Others	331	398,044	77.9	72.2	82.8	54	76,555	15.0	11.0	20.0	24	32,421	6.3	3.7	10.6
<b>Marital Status</b>															
Never Married	941	966,176	80.7	77.6	83.5	143	155,058	13.0	10.6	15.7	65	70,857	5.9	4.3	8.0
Married	3	1,594	33.6	8.0	74.6	3	3,148	66.4	25.4	92.0	-	-	-	-	-
Separated	19	18,918	95.4	75.5	99.3	1	79	0.4	0.1	3.0	1	839	4.2	0.6	25.6
Divorcee	24	23,760	87.0	67.4	95.6	3	3,093	11.3	3.4	31.5	1	458	1.7	0.2	11.4
Widow/er	1	1,709	100	0.0	0.0	-	-	-	-	-	-	-	-	-	-
Others	1	1,973	87.1	29.6	99.1	-	-	-	-	-	1	293	12.9	0.9	70.4
<b>Education Level</b>															
No formal education	28	28,307	89.1	68.5	96.9	3	1,458	4.6	1.2	15.5	1	2,003	6.3	0.9	33.3
Primary	241	245,223	82.7	77.0	87.3	35	35,350	11.9	8.2	17.0	14	13,634	4.6	2.5	8.4
Secondary	576	600,773	79.0	74.9	82.6	98	113,017	14.9	11.9	18.4	42	44,881	5.9	3.9	8.8
Tertiary	557	626,893	80.0	75.7	83.7	84	102,582	13.1	10.1	16.8	40	50,556	6.5	4.4	9.5
Unclassified	53	49,863	87.7	69.7	95.7	3	5,268	9.3	2.6	27.9	-	-	-	-	-
<b>Occupation</b>															
Government	234	187,870	83.3	76.8	88.2	37	23,476	10.4	6.8	15.7	15	11,033	4.9	2.5	9.5
Semi-government	25	23,918	83.8	63.0	94.0	3	3,210	11.2	3.5	30.5	1	1,418	5.0	0.7	28.1
Private	472	586,434	76.6	71.9	80.7	86	130,183	17.0	13.5	21.3	32	48,047	6.3	4.1	9.5
Self-employed	220	226,671	84.5	78.6	89.0	27	28,465	10.6	6.9	15.9	14	12,400	4.6	2.5	8.5
Unpaid worker/homemaker	185	167,076	85.9	79.6	90.5	24	22,277	11.5	7.3	17.6	9	4,965	2.6	1.1	5.9
Retiree	51	51,743	73.9	58.7	84.9	8	12,280	17.5	8.3	33.2	7	6,018	8.6	3.5	19.7
<b>Household Income Group (RM)</b>															
Less than RM400	75	80,565	84.2	73.0	91.3	11	12,007	12.5	6.4	23.2	3	3,166	3.3	0.9	11.7
RM400 – RM499	6	4,165	49.5	17.0	82.4	4	4,256	50.5	17.6	83.0	-	-	-	-	-
RM500 – RM699	25	23,955	89.3	67.9	97.1	3	1,985	7.4	1.4	30.9	1	884	3.3	0.5	20.2
RM700 – RM999	36	38,893	95.6	74.3	99.4	1	1,808	4.4	0.6	25.7	-	-	-	-	-
RM1000 – RM1999	189	172,228	82.7	75.8	87.9	29	23,288	11.2	7.1	17.1	13	12,444	6.0	3.1	11.1
RM2000 – RM2999	200	216,650	83.0	76.2	88.2	28	31,584	12.1	7.8	18.4	12	10,261	3.9	1.8	8.3
RM3000 – RM3999	188	209,148	80.4	73.4	85.9	35	42,482	16.3	11.3	23.1	7	8,441	3.2	1.5	7.1
RM4000 – RM4999	164	183,451	82.8	75.6	88.1	22	20,355	9.2	5.6	14.7	16	16,170	7.3	3.9	13.4
RM5000 above	639	688,255	78.2	74.1	81.8	94	125,014	14.2	11.2	17.8	50	62,756	7.1	5.0	10.2

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

LL = Lower Limit , UL = Upper Limit

Table 4.21: Distance to the government outpatient healthcare facilities in the last 12 months

Sociodemographic Characteristics	Less than 5 km						Between 5-10 km						More than 10 km					
	Count	Estimated Population	%		Count	Estimated Population	%		Count	Estimated Population	%		Count	Estimated Population	%			
			(Percentage)	UL			LL	UL			LL	UL			LL	UL		
<b>MALAYSIA</b>	2,696	2,303,001	55.0	53.2	56.8	770	779,593	18.6	17.2	20.1	405	360,503	8.6	7.6	9.7			
<b>State</b>																		
Johor	323	396,643	62.5	57.9	66.9	59	79,566	12.5	9.7	16.1	37	45,013	7.1	5.0	9.9			
Kedah	153	158,738	60.6	53.8	67.0	33	30,984	11.8	8.2	16.8	10	12,914	4.9	2.4	9.8			
Kelantan	113	86,185	50.8	44.2	57.4	8	6,300	3.7	1.9	7.3	3	2,511	1.5	0.5	4.6			
Melaka	245	126,293	75.2	66.1	82.5	30	15,406	9.2	5.7	14.4	26	10,203	6.1	3.5	10.5			
Negeri Sembilan	268	178,418	73.7	67.8	78.9	48	34,111	14.1	9.9	19.6	32	13,557	5.6	3.9	8.1			
Pahang	117	102,238	49.5	42.9	56.1	26	22,910	11.1	7.4	16.3	14	11,886	5.8	3.3	9.7			
Penang	255	187,246	68.3	60.0	75.7	32	14,990	5.5	3.0	9.7	12	8,222	3.0	1.2	7.2			
Perak	149	221,386	44.6	38.4	50.9	103	175,616	35.4	29.2	42.0	45	63,474	12.8	9.2	17.4			
Perlis	144	23,410	51.0	44.8	57.2	29	4,213	9.2	6.2	13.3	12	1,676	3.7	2.1	6.4			
Selangor	266	308,539	58.4	53.3	63.3	95	99,439	18.8	15.2	23.1	67	74,703	14.1	11.0	18.0			
Terengganu	135	75,633	49.7	43.5	56.0	32	19,956	13.1	9.2	18.3	14	7,557	5.0	2.8	8.7			
Sabah/Labuan	213	194,995	46.5	39.7	53.4	106	94,986	22.7	18.2	27.9	66	48,165	11.5	8.6	15.2			
Sarawak	106	119,978	38.6	32.1	45.6	61	70,042	22.6	17.6	28.5	38	42,305	13.6	9.3	19.6			
WP Kuala Lumpur	68	112,113	42.9	34.7	51.5	74	107,945	41.3	33.4	49.7	12	16,941	6.5	3.6	11.5			
WP Putrajaya	141	11,186	69.5	62.1	75.9	34	3,130	19.4	14.1	26.2	17	1,376	8.5	5.1	14.0			
<b>Location</b>																		
Urban	1,429	1,535,954	55.6	53.2	58.0	475	581,045	21.0	19.1	23.1	187	214,506	7.8	6.6	9.1			
Rural	1,267	767,047	53.9	51.3	56.4	295	198,549	14.0	12.3	15.8	218	145,997	10.3	8.7	12.0			
<b>Sex</b>																		
Male	1,291	1,125,909	57.6	54.9	60.3	328	341,889	17.5	15.6	19.6	184	174,110	8.9	7.5	10.6			
Female	1,405	1,177,092	52.7	50.2	55.2	442	437,704	19.6	17.6	21.8	221	186,394	8.3	7.1	9.8			
<b>Age Group</b>																		
0 - 4	59	46,907	43.6	33.2	54.6	29	29,356	27.3	18.5	38.3	14	10,894	10.1	5.6	17.7			
5 - 9	784	645,681	62.5	59.1	65.8	119	132,571	12.8	10.5	15.6	46	43,842	4.2	3.1	5.8			
10 - 14	879	723,970	64.5	61.3	67.5	113	120,148	10.7	8.8	13.0	42	36,892	3.3	2.3	4.7			
15 - 19	439	441,915	61.8	56.8	66.5	83	103,287	14.4	11.2	18.4	35	42,648	6.0	3.9	9.0			
20 - 24	72	73,650	35.9	26.8	46.0	53	74,566	36.3	26.4	47.6	25	32,059	15.6	9.3	25.0			
25 - 29	90	76,035	37.8	29.6	46.7	58	55,889	27.8	20.8	36.0	43	40,357	20.0	13.9	28.0			
30 - 34	67	68,020	41.0	32.4	50.2	49	45,610	27.5	20.3	36.1	31	29,192	17.6	11.7	25.5			
35 - 39	69	52,486	40.2	31.2	49.9	44	43,928	33.6	25.1	43.5	30	23,835	18.3	12.0	26.8			
40 - 44	58	52,640	40.1	30.5	50.6	50	36,829	28.1	20.4	37.2	35	26,930	20.5	14.2	28.7			
45 - 49	58	37,320	30.2	20.9	41.5	54	45,415	36.7	26.9	47.8	32	26,468	21.4	14.4	30.6			
50 - 54	49	36,032	40.4	30.1	51.7	40	29,983	33.7	24.1	44.8	22	14,003	15.7	9.6	24.8			
55 - 59	29	19,448	34.4	22.9	48.2	29	20,761	36.7	25.2	50.0	21	11,760	20.8	12.5	32.6			
60 - 64	18	15,345	33.8	20.9	49.7	22	15,622	34.4	21.5	50.1	11	8,526	18.8	9.6	33.6			
65 - 70	11	5,857	25.0	11.3	46.5	13	12,171	52.0	30.3	72.9	7	5,235	22.4	9.5	44.0			
70 - 74	9	4,529	26.3	12.3	47.5	7	6,438	37.4	18.5	61.1	6	4,185	24.3	9.6	49.4			
75+	5	3,164	16.4	5.5	40.0	7	7,021	36.5	17.6	60.7	5	3,677	19.1	7.4	41.0			

Sociodemographic Characteristics	Less than 5 km					Between 5-10 km					More than 10 km					
	Count	Estimated Population	%		Count	Estimated Population	%		Count	Estimated Population	%		Count	Estimated Population	%	
			LL	UL			LL	UL			LL	UL			LL	UL
<b>MALAYSIA</b>	2,696	2,303,001	55.0	53.2	56.8	770	779,593	18.6	17.2	20.1	405	360,503	8.6	7.6	9.7	
<b>Ethnicity</b>																
Malay	1,848	1,419,639	57.0	54.9	59.1	446	417,532	16.8	15.1	18.5	242	200,762	8.1	6.9	9.4	
Chinese	370	436,131	55.7	50.9	60.5	126	174,085	22.3	18.6	26.4	37	50,641	6.5	4.5	9.2	
Indian	226	175,735	54.4	47.2	61.3	69	68,844	21.3	15.2	29.0	41	37,682	11.7	8.1	16.5	
Bumiputera Sabah	53	67,432	37.9	29.0	47.8	27	34,280	19.3	13.1	27.5	23	24,385	13.7	7.9	22.8	
Bumiputera Sarawak	151	177,345	50.0	42.4	57.7	67	65,397	18.5	14.0	24.0	48	42,516	12.0	8.7	16.4	
Other Bumiputera	7	6,105	61.7	23.6	89.4	1	2,083	21.1	3.0	70.0	-	-	-	-	-	
Others	41	20,614	42.0	28.3	57.1	34	17,373	35.4	23.2	49.9	14	4,517	9.2	3.7	21.0	
<b>Marital Status</b>																
Never-Married	841	781,792	58.2	54.6	61.7	191	228,103	17.0	14.3	20.0	100	99,339	7.4	5.7	9.5	
Married	415	343,237	38.3	34.6	42.2	325	281,228	31.4	28.0	35.0	205	176,328	19.7	16.8	22.9	
Separated	-	-	-	-	-	2	1,795	50.6	7.6	92.8	-	-	-	-	-	
Divorcee	6	4,736	30.3	12.2	57.7	5	6,740	43.2	20.1	69.7	8	3,456	22.1	9.1	44.6	
Widow/er	25	14,478	34.0	21.9	48.6	19	14,439	33.9	21.4	49.1	7	5,296	12.4	5.7	24.9	
Others	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
<b>Education Level</b>																
No formal education	38	22,089	32.9	22.8	44.8	22	16,029	23.8	15.0	35.7	14	7,718	11.5	6.4	19.9	
Primary	1,358	1,122,504	62.2	59.6	64.7	238	245,327	13.6	11.8	15.6	116	101,719	5.6	4.6	7.0	
Secondary	603	561,988	50.5	46.5	54.5	248	255,145	22.9	19.7	26.5	145	141,392	12.7	10.3	15.5	
Tertiary	150	120,001	34.0	27.8	40.9	131	121,406	34.4	28.4	41.0	80	64,652	18.3	14.0	23.7	
Unclassified	320	290,201	56.9	52.0	61.7	77	83,304	16.3	13.0	20.4	16	15,004	2.9	1.7	5.1	
<b>Occupation</b>																
Government	120	74,614	35.0	27.5	43.3	96	75,607	35.5	28.3	43.3	66	47,302	22.2	16.4	29.3	
Semi-government	5	5,015	28.0	10.4	56.6	5	3,882	21.7	7.5	48.7	5	7,288	40.7	16.7	70.2	
Private	155	159,643	37.5	31.7	43.6	121	144,039	33.8	28.1	40.0	74	79,470	18.7	14.3	24.0	
Self-employed	103	108,586	49.7	39.0	60.5	61	53,052	24.3	17.6	32.6	44	34,237	15.7	10.8	22.2	
Unpaid worker																
/homemaker	123	99,925	42.6	35.9	49.6	85	69,292	29.5	23.6	36.2	46	32,562	13.9	10.0	19.0	
Retiree	39	27,077	33.9	23.8	45.8	36	28,527	35.7	25.2	47.9	21	14,997	18.8	11.5	29.2	
<b>Household Income Group (RM)</b>																
Less than RM400	174	180,551	56.3	49.7	62.6	48	42,494	13.2	9.6	18.0	23	18,750	5.8	3.7	9.2	
RM400 – RM499	32	29,212	50.8	36.5	64.9	6	7,142	12.4	5.6	25.3	5	5,948	10.3	3.9	24.8	
RM500 – RM699	100	79,472	54.3	46.0	62.4	23	17,053	11.7	7.4	17.8	12	8,903	6.1	3.1	11.5	
RM700 – RM999	169	130,084	55.9	49.0	62.5	37	35,833	15.4	10.6	21.7	23	18,706	8.0	5.0	12.7	
RM1000 – RM1999	614	505,752	56.7	52.5	60.7	155	145,871	16.3	13.3	19.9	78	65,651	7.4	5.7	9.5	
RM2000 – RM2999	500	407,292	56.2	51.9	60.5	140	135,142	18.7	15.5	22.3	73	57,465	7.9	6.0	10.4	
RM3000 – RM3999	399	381,369	63.3	58.6	67.9	85	84,379	14.0	11.0	17.7	46	42,412	7.0	4.8	10.3	
RM4000 – RM4999	215	200,276	48.6	42.8	54.4	74	88,054	21.4	16.8	26.8	48	49,631	12.0	8.6	16.6	
RM5000 above	493	388,994	48.7	44.5	53.0	202	223,626	28.0	24.2	32.2	97	93,037	11.6	9.1	14.8	

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

LL = Lower Limit , UL = Upper Limit

Table 4.22: Distance to the private outpatient healthcare facilities in the last 12 months

Sociodemographic Characteristics	Less than 5 km						Between 5-10 km						More than 10 km					
	Count	Estimated Population	%		Count	Estimated Population	%		Count	Estimated Population	%		Count	Estimated Population	%			
			(Percentage)	UL			LL	UL			LL	UL			(Percentage)	LL	UL	
<b>MALAYSIA</b>	603	725,441	36.2	33.5	39.0	593	644,746	32.2	29.6	34.9	446	424,425	21.2	19.0	23.6			
<b>State</b>																		
Johor	80	116,070	44.8	37.2	52.7	62	80,314	31.0	24.4	38.6	37	50,268	19.4	13.8	26.5			
Kedah	36	60,924	52.9	40.5	65.0	24	25,374	22.0	13.8	33.3	26	27,160	23.6	15.2	34.8			
Kelantan	23	16,942	30.6	21.4	41.8	13	10,703	19.4	11.4	31.0	6	4,855	8.8	3.9	18.4			
Melaka	19	10,527	19.5	11.0	32.2	47	24,784	45.9	33.0	59.3	27	14,569	27.0	16.5	40.8			
Negeri Sembilan	19	16,204	27.5	16.8	41.6	31	27,402	46.5	34.1	59.4	19	11,170	19.0	11.7	29.3			
Pahang	23	18,069	34.1	23.2	47.1	15	10,583	20.0	11.9	31.6	16	14,379	27.1	16.8	40.7			
Penang	56	69,294	43.7	33.1	55.0	43	45,589	28.8	20.0	39.5	34	29,894	18.9	11.4	29.6			
Perak	47	81,444	36.5	28.0	45.8	52	81,944	36.7	28.3	45.9	34	46,423	20.8	14.4	29.0			
Perlis	15	2,037	26.9	16.2	41.2	21	2,655	35.1	23.2	49.0	18	2,410	31.8	20.8	45.4			
Selangor	131	172,890	36.1	30.8	41.7	115	152,738	31.9	26.8	37.4	89	114,867	24.0	19.4	29.3			
Terengganu	20	12,042	27.4	17.9	39.4	16	10,102	23.0	14.2	34.9	15	7,277	16.5	9.9	26.2			
Sabah/Labuan	36	44,713	26.8	18.4	37.3	60	58,002	34.7	26.8	43.7	48	38,003	22.8	16.7	30.3			
Sarawak	26	30,240	35.5	24.2	48.7	18	27,119	31.8	20.2	46.3	15	17,796	20.9	12.3	33.3			
WP Kuala Lumpur	37	70,983	30.4	22.1	40.3	45	84,935	36.4	27.2	46.7	20	41,998	18.0	11.3	27.4			
WP Putrajaya	35	3,062	31.5	23.2	41.3	31	2,502	25.8	18.2	35.1	42	3,354	34.6	26.0	44.2			
<b>Location</b>																		
Urban	505	665,660	39.0	35.9	42.2	449	568,575	33.3	30.4	36.4	252	311,421	18.2	15.8	20.9			
Rural	98	59,782	20.2	16.0	25.2	144	76,171	25.8	21.5	30.6	194	113,004	38.2	33.2	43.6			
<b>Sex</b>																		
Male	250	316,928	34.2	30.3	38.5	250	306,890	33.2	29.2	37.3	216	228,357	24.7	21.1	28.6			
Female	353	408,513	37.9	34.3	41.7	343	337,856	31.4	28.0	35.0	230	196,068	18.2	15.5	21.2			
<b>Age Group</b>																		
0 - 4	16	14,897	43.2	26.2	62.0	10	11,672	33.9	18.2	54.2	3	1,606	4.7	1.2	15.9			
5 - 9	62	69,739	46.0	36.9	55.4	47	48,968	32.3	24.4	41.5	23	18,333	12.1	7.4	19.2			
10 - 14	28	29,070	36.9	25.8	49.6	26	27,559	35.0	23.9	47.9	12	10,996	14.0	7.1	25.5			
15 - 19	24	32,670	35.6	23.9	49.4	21	24,025	26.2	16.6	38.8	17	25,318	27.6	16.3	42.7			
20 - 24	47	67,893	33.5	24.9	43.4	54	69,995	34.5	25.8	44.5	33	33,038	16.3	10.5	24.4			
25 - 29	58	75,246	30.0	22.0	39.5	62	78,366	31.3	23.5	40.3	59	61,361	24.5	17.8	32.7			
30 - 34	65	85,479	35.8	27.9	44.5	60	66,381	27.8	21.0	35.8	55	62,005	26.0	19.4	33.8			
35 - 39	66	92,848	33.5	26.5	41.3	81	89,929	32.4	25.4	40.4	60	66,268	23.9	17.8	31.3			
40 - 44	65	74,826	36.1	28.3	44.8	62	68,858	33.3	25.7	41.8	55	52,597	25.4	18.4	34.0			
45 - 49	66	80,635	43.4	34.4	52.8	65	55,769	30.0	22.9	38.2	47	37,670	20.3	14.1	28.2			
50 - 54	50	43,213	36.0	27.0	46.1	45	39,918	33.3	24.3	43.6	38	28,820	24.0	16.0	34.5			
55 - 59	25	26,018	35.6	24.2	48.9	29	26,666	36.5	24.8	50.0	26	14,446	19.8	12.0	30.8			
60 - 64	12	10,512	27.6	14.8	45.4	14	13,678	35.9	21.2	53.8	10	7,409	19.4	10.0	34.4			
65 - 70	9	13,414	43.6	22.8	66.8	10	14,766	48.0	26.1	70.6	4	2,499	8.1	2.8	21.3			
70 - 74	7	7,233	57.2	24.6	84.6	3	4,008	31.7	9.1	68.2	2	1,359	10.7	2.4	37.5			
75+	3	1,749	18.1	5.0	47.9	4	4,189	43.3	16.0	75.4	2	699	7.2	1.2	32.5			



Sociodemographic Characteristics	Less than 5 km						Between 5-10 km						More than 10 km					
	Count	Estimated Population	%	95% CI		Count	Estimated Population	%	95% CI		Count	Estimated Population	%	95% CI				
				LL	UL				LL	UL				LL	UL			
<b>MALAYSIA</b>	603	725,441	36.2	33.5	39.0	593	644,746	32.2	29.6	34.9	446	424,425	21.2	19.0	23.6			
<b>Ethnicity</b>																		
Malay	339	338,466	35.1	31.7	38.7	309	294,155	30.5	27.2	34.1	267	215,339	22.3	19.4	25.5			
Chinese	173	292,658	38.7	33.7	44.0	192	275,477	36.5	31.6	41.6	85	125,763	16.6	13.0	21.1			
Indian	52	48,646	37.9	28.8	47.9	39	32,865	25.6	18.1	34.9	48	38,508	30.0	21.5	40.2			
Bumiputera Sabah	5	4,514	24.1	9.3	49.4	4	4,231	22.6	7.3	51.8	4	6,588	35.2	14.1	64.2			
Bumiputera Sarawak	16	26,032	29.4	16.8	46.3	25	24,771	28.0	18.1	40.5	29	27,151	30.7	20.6	43.0			
Other Bumiputera	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-			
Others	18	15,125	31.6	17.7	49.7	24	13,248	27.6	16.3	42.8	13	11,077	23.1	10.9	42.6			
<b>Marital Status</b>																		
Never-Married	134	182,489	35.7	30.1	41.8	119	147,298	28.8	23.6	34.7	106	114,633	22.4	17.7	28.0			
Married	353	419,597	35.0	31.6	38.7	386	402,740	33.6	30.3	37.1	291	267,282	22.3	19.5	25.4			
Separated	4	2,549	53.8	15.3	88.2	1	638	13.5	1.7	58.6	-	-	-	-	-			
Divorcee	5	6,426	32.4	11.5	63.9	3	2,559	12.9	3.2	40.0	9	9,659	48.7	22.5	75.7			
Widow/er	9	7,846	28.7	13.2	51.5	10	14,638	53.6	31.4	74.5	5	3,294	12.1	4.1	30.5			
Others	-	-	-	-	-	-	-	-	-	-	1	1,709	100	0.0	0.0			
<b>Education Level</b>																		
No formal education	11	10,162	32.0	17.3	51.5	9	11,902	37.5	20.5	58.2	7	3,995	12.6	5.5	26.2			
Primary	103	120,200	40.5	33.8	47.7	97	99,522	33.6	27.5	40.3	58	48,779	16.5	12.0	22.1			
Secondary	223	265,097	34.9	30.6	39.3	218	223,679	29.4	25.6	33.6	181	187,197	24.6	20.9	28.8			
Tertiary	210	270,947	34.6	30.1	39.4	229	269,188	34.4	29.8	39.2	183	174,086	22.2	18.6	26.3			
Unclassified	19	20,765	36.5	23.5	51.8	21	19,774	34.8	22.5	49.5	7	6,545	11.5	5.3	23.2			
<b>Occupation</b>																		
Government	98	94,393	41.8	34.1	50.0	87	64,074	28.4	21.9	36.0	83	50,556	22.4	16.7	29.4			
Semi-government	6	6,236	21.8	8.8	44.8	11	11,856	41.5	22.4	63.6	9	6,975	24.4	10.9	46.1			
Private	185	256,319	33.5	28.9	38.4	182	256,552	33.5	28.9	38.4	161	186,212	24.3	20.5	28.6			
Self-employed	67	83,770	31.2	24.2	39.2	91	83,227	31.0	24.7	38.2	73	75,842	28.3	21.6	36.0			
Unpaid worker /homemaker	73	81,740	42.0	34.2	50.3	65	50,639	26.0	19.9	33.4	46	34,518	17.8	12.4	24.8			
Retiree	26	27,064	38.6	26.2	52.8	23	30,174	43.1	30.0	57.2	9	7,278	10.4	5.0	20.2			
<b>Household Income Group (RM)</b>																		
Less than RM400	24	30,057	31.4	21.0	44.1	34	41,405	43.2	31.3	56.0	13	7,651	8.0	4.0	15.3			
RM400 – RM499	3	3,592	42.7	12.5	79.5	1	121	1.4	0.2	10.8	5	3,629	43.1	14.0	77.9			
RM500 – RM699	6	2,554	9.5	3.3	24.7	7	7,808	29.1	14.1	50.7	9	7,234	27.0	13.4	46.9			
RM700 – RM999	13	16,328	40.1	22.6	60.5	7	10,024	24.6	10.6	47.3	8	6,109	15.0	5.9	33.0			
RM1000 – RM1999	68	67,249	32.3	24.9	40.6	84	72,231	34.7	27.3	42.8	47	43,789	21.0	14.7	29.2			
RM2000 – RM2999	89	99,669	38.2	30.6	46.4	57	65,595	25.1	18.8	32.7	53	49,273	18.9	13.5	25.8			
RM3000 – RM3999	78	106,305	40.9	33.2	49.0	69	81,187	31.2	24.2	39.2	61	57,380	22.1	16.4	29.1			
RM4000 – RM4999	79	93,985	42.4	34.4	50.8	63	66,212	29.9	23.0	37.8	47	48,067	21.7	15.9	28.9			
RM5000 above	243	305,703	34.7	30.6	39.1	271	300,164	34.1	30.1	38.3	203	201,293	22.9	19.3	26.8			

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

LL = Lower Limit , UL = Upper Limit

Table 4.23: Distance to the urban outpatient healthcare facilities in the last 12 months

Sociodemographic Characteristics	Less than 5 km						Between 5-10 km						More than 10 km					
	Count	Estimated Population	%	95% CI		UL	Count	Estimated Population	%	95% CI		UL	Count	Estimated Population	%	95% CI		UL
				LL	UL					LL	UL					LL	UL	
<b>MALAYSIA</b>	1,941	2,215,067	49.1	47.2	51.1	926	1,151,552	25.5	23.9	27.3	439	525,928	11.7	10.5	13.0			
<b>State</b>																		
Johor	259	363,076	57.2	52.3	62.0	84	124,616	19.6	15.9	23.9	36	60,005	9.5	6.7	13.1			
Kedah	88	141,859	63.0	54.0	71.2	21	30,350	13.5	8.6	20.6	11	22,099	9.8	5.3	17.4			
Kelantan	77	55,850	55.4	46.6	63.8	13	9,932	9.9	5.8	16.3	2	1,638	1.6	0.4	6.4			
Melaka	107	113,434	60.9	52.0	69.1	40	35,958	19.3	13.9	26.1	21	21,155	11.4	7.3	17.3			
Negeri Sembilan	167	139,924	63.6	56.5	70.1	62	54,486	24.8	19.0	31.6	17	10,442	4.7	2.8	7.9			
Pahang	65	50,297	38.8	31.3	46.8	24	18,717	14.4	9.7	20.9	17	14,238	11.0	6.8	17.2			
Penang	136	229,243	58.2	51.0	65.2	35	54,334	13.8	9.7	19.3	19	34,414	8.7	5.3	14.0			
Perak	113	216,775	41.4	35.1	48.0	99	203,139	38.8	32.4	45.7	36	69,153	13.2	9.4	18.4			
Perlis	101	15,065	49.2	41.7	56.7	28	3,607	11.8	7.9	17.2	14	1,785	5.8	3.4	9.8			
Selangor	304	431,849	48.2	44.1	52.4	148	216,665	24.2	20.8	28.0	104	161,988	18.1	15.0	21.6			
Terengganu	70	49,332	40.5	33.2	48.2	28	20,979	17.2	12.1	24.0	8	6,022	4.9	2.4	9.9			
Sabah/Labuan	111	139,417	45.2	36.1	54.6	108	105,693	34.2	27.2	42.1	43	34,816	11.3	7.9	15.9			
Sarawak	62	71,602	33.5	26.3	41.6	52	74,563	34.9	27.2	43.5	20	24,504	11.5	6.9	18.5			
WP Kuala Lumpur	105	183,096	36.8	30.7	43.3	119	192,881	38.7	32.6	45.2	32	58,939	11.8	8.1	16.9			
WP Putrajaya	176	14,247	55.2	49.4	60.9	65	5,632	21.8	17.3	27.2	59	4,731	18.3	14.2	23.4			
<b>Sex</b>																		
Male	868	1,023,794	49.2	46.3	52.1	388	522,228	25.1	22.7	27.7	196	266,761	12.8	11.0	15.0			
Female	1,073	1,191,273	49.1	46.5	51.7	538	629,325	25.9	23.7	28.3	243	259,166	10.7	9.2	12.4			
<b>Age Group</b>																		
0 - 4	35	40,164	42.1	30.3	55.0	30	35,870	37.6	26.4	50.3	7	6,648	7.0	3.1	15.0			
5 - 9	431	474,168	61.0	56.7	65.1	107	139,525	17.9	14.8	21.6	33	33,765	4.3	2.9	6.4			
10 - 14	486	504,692	62.4	58.3	66.3	84	107,247	13.3	10.6	16.4	32	32,235	4.0	2.6	6.0			
15 - 19	242	320,147	57.8	51.5	63.9	63	94,179	17.0	12.8	22.2	28	51,724	9.3	6.1	14.0			
20 - 24	79	110,228	35.2	27.8	43.3	69	121,702	38.9	30.6	47.8	30	42,957	13.7	9.0	20.3			
25 - 29	112	131,371	36.6	29.5	44.4	85	108,166	30.2	23.7	37.5	54	71,458	19.9	14.7	26.5			
30 - 34	105	136,659	40.0	33.3	47.1	80	96,333	28.2	22.5	34.7	55	73,074	21.4	16.2	27.7			
35 - 39	92	121,313	37.2	30.5	44.5	83	109,914	33.7	27.1	41.1	50	65,923	20.2	14.9	26.8			
40 - 44	92	107,246	41.0	33.5	49.1	80	90,818	34.8	27.8	42.4	43	50,549	19.3	13.6	26.8			
45 - 49	95	106,846	42.8	34.8	51.3	83	81,796	32.8	25.8	40.6	35	38,530	15.4	10.5	22.2			
50 - 54	82	70,529	42.2	33.8	51.0	59	59,231	35.4	27.5	44.3	28	26,495	15.8	9.9	24.3			
55 - 59	41	41,038	40.2	30.0	51.3	44	38,805	38.0	28.0	49.1	24	14,974	14.7	8.8	23.5			
60 - 64	19	20,662	33.6	21.7	48.0	24	24,349	39.6	26.9	53.9	9	8,388	13.6	6.7	25.8			
65 - 70	15	16,617	36.4	20.7	55.6	18	24,926	54.6	36.0	72.0	5	4,132	9.0	3.3	22.3			
70 - 74	11	10,036	45.2	23.0	69.5	6	7,482	33.7	14.8	59.7	4	3,286	14.8	4.4	39.6			
75+	4	3,351	14.6	4.9	36.1	11	11,210	48.9	27.5	70.8	2	1,790	7.8	1.7	28.8			

Sociodemographic Characteristics	Less than 5 km				Between 5-10 km				More than 10 km			
	Count	Estimated Population	%	95% CI LL UL	Count	Estimated Population	%	95% CI LL UL	Count	Estimated Population	%	95% CI LL UL
<b>MALAYSIA</b>	1,941	2,215,067	49.1	47.2 51.1	926	1,151,552	25.5	23.9 27.3	439	525,928	11.7	10.5 13.0
<b>Ethnicity</b>												
Malay	1,185	1,175,073	50.7	48.3 53.2	467	537,579	23.2	21.1 25.4	238	250,278	10.8	9.3 12.5
Chinese	421	675,035	47.3	43.6 51.1	265	422,685	29.6	26.3 33.1	88	160,959	11.3	9.0 14.0
Indian	199	202,439	49.3	43.1 55.5	79	90,856	22.1	16.8 28.6	58	69,405	16.9	12.9 21.9
Bumiputera Sabah	23	23,428	29.4	18.8 42.7	21	26,528	33.2	21.8 47.1	8	6,885	8.6	3.4 20.0
Bumiputera Sarawak	69	107,409	55.6	43.4 67.1	48	47,248	24.4	16.8 34.2	31	26,543	13.7	8.8 20.8
Other Bumiputera	1	134	10.7	1.0 58.4	-	-	-	-	-	-	-	-
Others	43	31,549	39.5	27.5 52.8	46	26,657	33.4	23.1 45.5	16	11,857	14.8	7.0 28.7
<b>Marital Status</b>												
Never Married	570	700,524	50.8	46.9 54.6	213	311,605	22.6	19.4 26.1	113	156,018	11.3	9.0 14.1
Married	569	653,496	39.8	36.7 43.0	490	561,332	34.2	31.3 37.2	250	295,268	18.0	15.7 20.5
Separated	3	1,754	23.4	5.6 61.3	3	2,433	32.5	8.6 71.2	-	-	-	-
Divorcee	9	9,574	35.7	16.5 61.0	6	6,383	23.8	9.9 47.1	11	9,507	35.5	16.0 61.4
Widow/er	19	17,692	34.6	21.7 50.3	22	25,202	49.4	33.8 65.0	3	2,248	4.4	1.2 14.4
Cohabiting	-	-	-	-	-	-	-	-	1	1,709	100.0	100.0 100.0
Others	2	3,053	100.0	100.0 100.0	-	-	-	-	-	-	-	-
<b>Education Level</b>												
No formal education	24	23,334	37.9	25.7 51.9	25	24,896	40.5	27.6 54.8	5	2,779	4.5	1.6 11.9
Primary	804	854,791	59.7	56.6 62.8	199	252,912	17.7	15.3 20.3	76	81,920	5.7	4.4 7.4
Secondary	533	642,042	45.9	42.2 49.6	308	383,851	27.5	24.3 30.9	159	214,734	15.4	12.8 18.3
Tertiary	295	352,663	36.1	31.9 40.4	275	343,242	35.1	31.0 39.4	162	188,997	19.3	16.2 22.9
Unclassified	153	192,271	52.6	46.2 58.8	67	80,522	22.0	17.3 27.5	16	17,300	4.7	2.8 7.9
<b>Occupation</b>												
Government	181	147,421	44.1	37.5 50.9	124	102,462	30.6	24.9 37.1	76	59,886	17.9	13.2 23.8
Semi-government	8	8,711	23.1	10.5 43.5	11	13,152	34.9	18.7 55.6	10	12,688	33.7	17.2 55.3
Private	252	373,093	36.4	32.4 40.7	231	361,242	35.3	31.2 39.6	141	204,222	19.9	16.8 23.5
Self-employed	98	147,227	43.4	34.7 52.6	93	104,348	30.8	24.3 38.2	48	64,262	19.0	13.5 26.0
Unpaid worker	141	147,234	48.9	42.4 55.5	101	93,392	31.0	25.4 37.3	33	29,681	9.9	6.5 14.6
/homemaker	49	47,706	37.5	28.2 47.7	48	52,263	41.1	31.5 51.4	19	16,500	13.0	7.8 20.8
Retiree	106	133,134	50.2	42.3 58.1	56	65,145	24.6	18.5 31.9	11	9,877	3.7	1.8 7.5
<b>Household Income Group (RM)</b>												
Less than RM400	27	32,044	64.0	46.2 78.7	4	4,701	9.4	3.4 23.4	3	2,646	5.3	1.6 16.2
RM400 – RM499	39	33,469	49.5	36.2 62.8	15	14,140	20.9	12.3 33.2	5	5,592	8.3	3.2 19.9
RM500 – RM699	92	88,079	59.9	49.7 69.3	22	28,057	19.1	11.9 29.2	10	10,408	7.1	3.3 14.5
RM700 – RM999	303	330,247	50.3	44.9 55.8	135	152,878	23.3	18.9 28.3	54	60,881	9.3	6.7 12.7
RM1000 – RM1999	357	385,354	52.2	47.4 56.9	124	158,244	21.4	17.8 25.5	64	70,139	9.5	7.1 12.6
RM2000 – RM2999	302	376,768	57.6	52.7 62.5	110	136,181	20.8	17.0 25.3	55	66,089	10.1	7.5 13.6
RM3000 – RM3999	204	249,203	48.0	42.5 53.5	105	135,123	26.0	21.5 31.2	48	64,466	12.4	9.1 16.7
RM4000 – RM4999	511	586,769	41.6	38.2 45.1	355	457,084	32.4	29.2 35.8	189	235,830	16.7	14.2 19.6

Note: Some cells have respondent count < 30. Results should be interpreted with caution. LL = Lower Limit , UL = Upper Limit

Table 4.24: Distance to the rural outpatient healthcare facilities in the last 12 months

Sociodemographic Characteristics	Less than 5 km				Between 5-10 km				More than 10 km			
	Count	Estimated Population	% (Percentage)	95% CI LL UL	Count	Estimated Population	% (Percentage)	95% CI LL UL	Count	Estimated Population	% (Percentage)	95% CI LL UL
<b>MALAYSIA</b>	1,375	833,927	47.9	45.6 50.2	440	275,405	15.8	14.2 17.5	416	261,828	15.0	13.4 16.8
<b>State</b>												
Johor	145	151,472	57.2	50.7 63.5	38	35,950	13.6	9.8 18.5	38	35,275	13.3	9.6 18.2
Kedah	103	79,162	51.4	44.3 58.4	36	26,007	16.9	12.2 22.9	25	17,976	11.7	7.8 17.1
Kelantan	59	47,277	37.9	30.5 45.9	8	7,071	5.7	2.8 11.0	7	5,728	4.6	2.2 9.4
Melaka	157	23,387	65.5	59.2 71.3	37	4,232	11.9	8.3 16.6	32	3,618	10.1	7.0 14.5
Negeri Sembilan	121	55,710	67.8	60.2 74.6	17	7,028	8.6	5.2 13.8	34	14,285	17.4	12.2 24.1
Pahang	76	70,893	53.9	45.1 62.5	17	14,777	11.2	6.6 18.4	13	12,028	9.1	5.1 15.8
Penang	178	27,597	66.8	60.5 72.5	40	6,244	15.1	11.1 20.3	27	3,702	9.0	5.9 13.3
Perak	84	87,097	43.3	36.2 50.6	56	54,420	27.0	21.1 33.9	44	41,967	20.8	15.6 27.3
Perlis	59	10,508	44.5	36.2 53.2	22	3,260	13.8	9.1 20.5	17	2,446	10.4	6.4 16.4
Selangor	95	52,596	42.1	35.3 49.3	63	36,756	29.4	23.3 36.4	53	28,221	22.6	17.2 29.1
Terengganu	86	38,925	49.8	42.3 57.4	21	9,768	12.5	8.2 18.7	21	8,812	11.3	7.3 17.1
Sabah/Labuan	141	109,773	37.7	31.9 43.9	58	47,294	16.2	12.2 21.2	72	52,174	17.9	13.8 22.9
Sarawak	71	79,530	42.1	33.3 51.4	27	22,599	12.0	7.9 17.8	33	35,597	18.8	12.5 27.3
WP Kuala Lumpur	-	-	-	-	-	-	-	-	-	-	-	-
WP Putrajaya	-	-	-	-	-	-	-	-	-	-	-	-
<b>Sex</b>												
Male	683	429,165	51.7	48.2 55.1	192	128,485	15.5	13.2 18.0	206	136,489	16.4	13.9 19.3
Female	692	404,762	44.4	41.3 47.5	248	146,920	16.1	14.0 18.5	210	125,339	13.8	11.8 16.0
<b>Age Group</b>												
0 - 4	41	22,175	44.8	32.8 57.5	9	5,159	10.4	4.5 22.4	10	5,851	11.8	5.7 22.8
5 - 9	424	253,450	58.8	54.2 63.3	61	43,947	10.2	7.6 13.5	38	29,776	6.9	4.8 9.8
10 - 14	425	251,662	61.7	57.2 66.1	56	41,146	10.1	7.6 13.3	23	16,476	4.0	2.5 6.4
15 - 19	222	156,274	60.3	54.0 66.3	41	33,133	12.8	9.2 17.4	24	16,242	6.3	3.9 9.9
20 - 24	40	31,315	32.8	21.2 47.0	38	22,859	23.9	16.1 33.9	28	22,139	23.2	13.4 37.1
25 - 29	36	19,910	21.3	14.3 30.5	35	26,088	27.9	19.6 38.0	48	30,260	32.4	23.3 43.0
30 - 34	28	18,595	27.9	18.3 40.0	29	15,657	23.5	14.8 35.1	31	18,123	27.2	18.3 38.4
35 - 39	43	24,021	28.5	20.4 38.4	42	23,943	28.4	20.3 38.3	41	24,819	29.5	21.0 39.6
40 - 44	31	20,221	26.3	17.9 36.8	32	14,869	19.3	13.0 27.8	47	28,979	37.7	28.2 48.1
45 - 49	30	12,024	19.4	12.6 28.7	36	19,388	31.3	22.1 42.3	44	25,609	41.4	31.0 52.6
50 - 54	17	8,716	20.8	12.0 33.6	26	10,671	25.5	16.3 37.5	32	16,328	39.0	27.1 52.3
55 - 59	13	4,429	15.7	7.7 29.5	14	8,621	30.6	17.6 47.7	23	11,232	39.9	25.7 55.9
60 - 64	11	5,195	23.5	11.8 41.6	12	4,951	22.4	10.9 40.6	12	7,547	34.2	19.2 53.2
65 - 70	5	2,655	26.7	8.7 58.1	5	2,011	20.2	6.8 46.7	6	3,602	36.2	15.4 63.9
70 - 74	5	1,726	22.6	8.0 49.5	4	2,963	38.8	16.2 67.5	4	2,258	29.6	11.4 57.8
75+	4	1,561	24.7	7.5 57.0	-	-	-	-	5	2,585	41.0	16.2 71.4
<b>Ethnicity</b>												
Malay	1,014	593,976	50.8	48.1 53.4	289	174,797	14.9	13.2 16.9	274	167,828	14.3	12.6 16.3
Chinese	122	53,754	45.4	37.3 53.7	55	28,807	24.3	17.9 32.2	34	15,445	13.0	8.5 19.4
Indian	81	22,068	51.2	40.8 61.5	29	10,853	25.2	16.8 35.9	31	6,785	15.7	9.8 24.4

Sociodemographic Characteristics	Less than 5 km					Between 5-10 km					More than 10 km				
	Count	Estimated Population	%	95% CI		Count	Estimated Population	%	95% CI		Count	Estimated Population	%	95% CI	
				LL	UL				LL	UL				LL	UL
<b>MALAYSIA</b>	1,375	833,927	47.9	45.6	50.2	440	275,405	15.8	14.2	17.5	416	261,828	15.0	13.4	16.8
Bumiputera Sabah	35	48,518	39.9	28.7	52.3	10	11,983	9.9	5.1	18.2	19	24,087	19.8	11.4	32.2
Bumiputera Sarawak	101	105,450	40.1	33.4	47.2	44	42,919	16.3	12.0	21.8	47	43,947	16.7	12.4	22.1
Other Bumiputera	6	5,971	69.1	23.8	94.1	1	2,083	24.1	3.3	74.8	0	0	0.0	0.0	0.0
Others	16	4,191	24.3	11.6	43.8	12	3,964	22.9	11.1	41.5	11	3,736	21.6	9.2	42.8
<b>Marital Status</b>															
Never Married	406	265,593	55.1	50.6	59.6	97	63,796	13.2	10.6	16.4	93	57,954	12.0	9.4	15.3
Married	201	112,007	24.3	20.8	28.3	221	122,636	26.6	23.0	30.5	247	148,982	32.3	28.2	36.7
Separated	1	795	86.1	27.8	99.0	-	-	-	-	-	-	-	-	-	-
Divorcee	2	1,588	18.4	4.3	52.9	2	2,916	33.7	8.8	72.9	6	3,608	41.7	15.9	73.1
Widow/er	15	4,632	24.2	12.4	41.8	7	3,875	20.2	9.4	38.4	9	6,342	33.1	17.5	53.5
Others	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
<b>Education Level</b>															
No formal education	25	8,917	22.8	13.6	35.5	6	3,034	7.7	3.1	18.2	16	8,934	22.8	13.5	35.8
Primary	665	393,056	57.0	53.4	60.5	137	92,621	13.4	11.1	16.1	99	69,401	10.1	8.1	12.5
Secondary	295	188,633	38.8	34.5	43.3	158	94,974	19.5	16.4	23.1	167	113,855	23.4	19.6	27.7
Tertiary	65	38,284	23.8	16.9	32.4	85	47,352	29.4	23.1	36.6	102	50,380	31.3	25.0	38.4
Unclassified	187	119,578	58.8	52.2	65.1	31	22,555	11.1	7.5	16.1	7	4,250	2.1	0.9	4.9
<b>Occupation</b>															
Government	37	21,586	20.1	11.9	31.9	59	37,219	34.7	26.0	44.5	73	37,972	35.4	27.0	44.7
Semi-government	3	2,540	29.0	9.5	61.4	5	2,587	29.5	11.6	57.1	4	1,576	18.0	6.0	42.9
Private	89	44,623	25.6	19.6	32.7	72	39,349	22.6	17.2	29.0	95	62,098	35.6	28.3	43.7
Self-employed	73	46,043	31.0	24.2	38.7	59	31,931	21.5	16.0	28.2	69	45,816	30.8	24.1	38.5
Unpaid worker /homemaker	55	34,432	26.7	19.7	35.1	49	26,539	20.6	14.9	27.8	59	37,399	29.1	21.9	37.4
Retiree	16	6,435	26.5	14.2	43.9	11	6,438	26.5	14.0	44.3	11	5,776	23.8	12.9	39.7
<b>Household Income Group (RM)</b>															
Less than RM400	95	78,181	50.3	42.3	58.2	27	19,998	12.9	8.5	19.0	26	17,346	11.2	7.3	16.7
RM400 – RM499	10	9,478	38.0	19.8	60.3	3	2,562	10.3	2.7	32.0	7	6,931	27.8	12.0	52.1
RM500 – RM699	68	48,683	44.7	35.9	53.9	15	10,721	9.8	5.6	16.7	16	10,545	9.7	5.6	16.1
RM700 – RM999	90	58,332	45.1	37.2	53.3	22	17,799	13.8	8.7	21.2	21	14,407	11.1	7.0	17.4
RM1000 – RM1999	382	244,287	54.1	49.6	58.6	104	65,224	14.4	11.7	17.8	71	48,559	10.8	8.2	14.0
RM2000 – RM2999	234	123,413	49.0	43.0	54.9	73	42,493	16.9	12.9	21.7	63	36,743	14.6	10.9	19.2
RM3000 – RM3999	178	114,887	52.2	45.2	59.2	44	29,385	13.4	9.5	18.5	53	34,925	15.9	10.8	22.7
RM4000 – RM4999	92	46,984	38.8	31.0	47.2	32	19,144	15.8	10.4	23.2	47	33,232	27.4	20.3	36.0
RM5000 above	226	109,682	39.3	34.2	44.7	120	68,080	24.4	20.0	29.4	112	59,139	21.2	17.2	25.9

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

LL = Lower Limit , UL = Upper Limit

Table 4.25: Travelling time to government to outpatient healthcare facilities in the last 12 months

Sociodemographic Characteristics	30 minutes or less						Between 31 to 60 minutes						More than 1 hour					
	Count	Estimated Population	%	95% CI		Count	Estimated Population	%	95% CI		Count	Estimated Population	%	95% CI				
				LL	UL				LL	UL				LL	UL			
<b>MALAYSIA</b>	2,280	2,097,344	50.1	48.3	51.9	324	307,912	7.4	6.2	8.7	31	27,392	0.7	0.4	1.0			
Johor	311	397,389	62.6	58.2	66.9	31	39,076	6.2	4.2	9.0	2	3,378	0.5	0.1	2.2			
Kedah	110	113,088	43.2	36.6	50.0	6	7,827	3.0	1.2	7.3	-	-	-	-	-			
Kelantan	60	47,466	28.0	22.3	34.5	2	1,097	0.6	0.2	2.6	-	-	-	-	-			
Melaka	182	88,037	52.4	43.5	61.2	13	3,951	2.4	1.1	5.2	3	1,600	1.0	0.3	3.4			
Negeri Sembilan	157	109,962	45.4	39.4	51.6	23	10,388	4.3	2.5	7.2	1	456	0.2	0.0	1.3			
Pahang	114	103,053	49.9	43.3	56.5	10	8,268	4.0	2.1	7.6	1	1,286	0.6	0.1	4.3			
Penang	154	133,320	48.6	40.7	56.7	6	5,325	1.9	0.7	5.2	1	148	0.1	0.0	0.4			
Perak	152	235,646	47.4	41.1	53.8	6	34,726	7.0	4.2	11.3	-	-	-	-	-			
Perlis	119	20,161	44.0	37.8	50.3	5	649	1.4	0.6	3.4	-	-	-	-	-			
Selangor	222	275,927	52.2	47.1	57.3	43	44,923	8.5	6.1	11.7	3	5,008	0.9	0.3	3.5			
Terengganu	100	62,848	41.3	35.2	47.7	12	6,485	4.3	2.3	7.7	-	-	-	-	-			
Sabah/Labuan	177	149,885	35.8	30.1	41.8	67	69,065	16.5	10.2	25.6	9	4,801	1.1	0.6	2.3			
Sarawak	99	128,752	41.5	34.6	48.6	42	44,939	14.5	10.0	20.5	9	9,021	2.9	1.5	5.6			
WP Kuala Lumpur	142	216,948	83.0	76.1	88.3	20	30,375	11.6	7.4	17.8	1	1,574	0.6	0.1	4.2			
WP Putrajaya	181	14,861	92.3	87.3	95.4	12	819	5.1	2.7	9.5	1	120	0.7	0.1	5.1			
<b>Location</b>																		
Urban	1,362	1,492,538	54.0	51.6	56.4	163	201,891	7.3	5.8	9.2	8	9,635	0.3	0.1	0.8			
Rural	918	604,806	42.5	40.0	45.1	161	106,021	7.4	6.1	9.0	23	17,757	1.2	0.8	1.9			
<b>Sex</b>																		
Male	985	963,240	49.3	46.6	52.0	110	115,401	5.9	4.2	8.3	14	15,171	0.8	0.4	1.5			
Female	1,295	1,134,104	50.8	48.3	53.2	214	192,512	8.6	7.3	10.1	17	12,221	0.5	0.3	0.9			
<b>Age Group (years)</b>																		
0 - 4	17	18,171	16.9	9.8	27.5	4	3,740	3.5	1.2	9.6	-	-	-	-	-			
5 - 9	149	150,765	14.6	12.3	17.2	7	5,663	0.5	0.2	1.3	1	734	0.1	0.0	0.5			
10 - 14	475	411,836	36.7	33.6	39.9	19	12,288	1.1	0.6	1.9	1	801	0.1	0.0	0.5			
15 - 19	560	570,861	79.8	74.0	84.6	49	75,918	10.6	6.5	16.9	3	3,527	0.5	0.2	1.6			
20 - 24	141	167,648	81.7	72.4	88.3	24	27,020	13.2	7.5	22.0	2	5,101	2.5	0.6	9.6			
25 - 29	169	142,621	70.8	61.2	78.9	39	48,550	24.1	17.1	32.8	2	1,464	0.7	0.2	3.2			
30 - 34	136	140,956	85.0	78.3	89.9	27	21,565	13.0	8.4	19.6	3	1,490	0.9	0.2	3.3			
35 - 39	131	110,930	85.0	76.8	90.6	20	15,311	11.7	6.8	19.5	5	2,926	2.2	0.8	6.5			
40 - 44	121	99,667	76.0	67.2	83.0	31	25,678	19.6	13.2	28.0	2	2,068	1.6	0.4	6.1			
45 - 49	120	94,082	76.1	66.9	83.4	33	24,528	19.8	13.3	28.6	3	3,586	2.9	0.9	8.9			
50 - 54	97	71,644	80.4	70.1	87.8	25	15,676	17.6	10.6	27.8	-	-	-	-	-			
55 - 59	64	41,490	73.4	60.8	83.1	17	10,408	18.4	10.5	30.3	5	4,081	7.2	2.7	17.7			
60 - 64	43	31,322	69.0	53.1	81.4	11	9,595	21.1	11.2	36.2	-	-	-	-	-			
65 - 70	24	18,407	78.6	57.8	90.8	7	4,855	20.7	8.8	41.6	1	154	0.7	0.1	4.7			
70 - 74	18	12,452	72.3	51.4	86.6	6	3,301	19.2	7.8	39.8	3	1,462	8.5	2.6	24.7			
75+	15	14,491	75.3	52.5	89.4	5	3,817	19.8	7.8	42.1	-	-	-	-	-			

Sociodemographic Characteristics	30 minutes or less					Between 31 to 60 minutes					More than 1 hour					
	Count	Estimated Population	% (Percentage)	95% CI		Estimated Population	% (Percentage)	95% CI		Count	Estimated Population	% (Percentage)	95% CI			
				LL	UL			LL	UL				LL	UL		
<b>MALAYSIA</b>	2,280	2,097,344	50.1	48.3	51.9	324	307,912	7.4	6.2	8.7	31	27,392	0.7	0.4	1.0	
<b>Ethnicity</b>																
Malay	1,517	1,249,548	50.2	48.0	52.3	171	153,103	6.1	5.1	7.4	13	11,262	0.5	0.2	0.9	
Chinese	334	436,410	55.8	51.0	60.4	33	40,843	5.2	3.5	7.6	3	4,494	0.6	0.1	2.4	
Indian	194	173,269	53.6	46.6	60.4	37	28,817	8.9	5.7	13.6	-	-	-	-	-	
Bumiputera Sabah	54	76,303	42.9	33.7	52.7	20	21,319	12.0	6.5	21.2	6	6,835	3.8	1.7	8.5	
Bumiputera Sarawak	123	131,958	37.2	30.5	44.5	44	53,937	15.2	8.3	26.4	8	4,693	1.3	0.6	2.7	
Other Bumiputera	2	2,850	28.8	6.1	71.6	1	134	1.4	0.2	10.4	-	-	-	-	-	
Others	56	27,005	55.1	40.4	68.9	18	9,759	19.9	10.0	35.7	1	108	0.2	0.0	1.6	
<b>Marital Status</b>																
Never Married	1,125	1,092,135	81.3	77.7	84.4	104	121,829	9.1	6.5	12.6	8	11,247	0.8	0.4	1.8	
Married	825	701,152	78.3	75.0	81.2	190	163,836	18.3	15.5	21.5	18	12,963	1.4	0.9	2.4	
Separated	3	3,545	100	0.0	0.0	-	-	-	-	-	-	-	-	-	-	
Divorced	15	13,418	85.9	64.2	95.4	5	2,201	14.1	4.6	35.8	-	-	-	-	-	
Widow/er	47	30,509	71.6	56.9	82.8	11	7,942	18.6	10.1	31.8	4	2,448	5.7	1.9	16.4	
Others	1	1,080	100	0.0	0.0	-	-	-	-	-	-	-	-	-	-	
<b>Education Level</b>																
No formal education	41	27,999	41.7	30.5	53.7	15	8,778	13.1	7.5	21.7	5	3,933	5.9	2.2	14.9	
Primary	728	636,746	35.3	32.8	37.9	81	62,712	3.5	2.7	4.5	9	6,277	0.3	0.2	0.7	
Secondary	954	905,961	81.4	77.4	84.9	134	144,238	13.0	9.7	17.1	10	8,190	0.7	0.4	1.4	
Tertiary	311	265,371	75.3	68.7	80.8	71	66,628	18.9	14.4	24.5	5	6,684	1.9	0.6	5.7	
Unclassified	195	217,334	42.6	37.8	47.5	15	17,825	3.5	2.0	6.0	1	1,574	0.3	0.0	2.2	
<b>Occupation</b>																
Government	242	171,658	16.9	73.8	85.9	45	36,094	1.2	11.9	23.5	5	2,531	1.3	0.4	3.4	
Semi-government	12	12,170	68.0	36.1	88.9	5	5,718	32.0	11.1	63.9	-	-	-	-	-	
Private	301	332,475	78.1	72.7	82.7	78	79,964	18.8	14.4	24.1	6	4,766	1.1	0.5	2.7	
Self-employed	193	169,131	77.5	61.8	88.0	33	40,047	18.3	8.3	35.7	7	7,250	3.3	1.5	7.0	
Unpaid worker																
/homemaker	235	183,692	78.3	72.4	83.2	54	42,667	18.2	13.6	23.9	5	3,716	1.6	0.6	4.1	
Retiree	83	63,759	79.9	69.9	87.2	19	12,855	16.1	9.6	25.7	2	836	1.0	0.2	5.3	
<b>Household Income Group (RM)</b>																
Less than RM400	123	122,475	7.9	32.1	44.6	29	25,490	7.9	5.2	11.9	-	-	-	-	-	
RM400 – RM499	22	20,010	34.8	22.4	49.6	3	3,258	5.7	1.8	16.4	3	3,090	5.4	1.7	15.5	
RM500 – RM699	76	61,962	42.3	34.4	50.7	9	7,392	5.1	2.4	10.2	2	2,786	1.9	0.5	7.3	
RM700 – RM999	110	94,392	40.5	34.0	47.4	11	7,295	3.1	1.6	6.0	2	1,106	0.5	0.1	2.1	
RM1000 – RM1999	477	427,882	48.0	43.8	52.1	83	82,907	9.3	6.0	14.1	9	8,649	1.0	0.4	2.3	
RM2000 – RM2999	444	404,269	55.8	51.5	60.0	53	40,036	5.5	4.0	7.7	4	3,382	0.5	0.2	1.2	
RM3000 – RM3999	330	311,163	51.7	46.8	56.5	31	38,860	6.5	4.1	10.0	3	1,490	0.2	0.1	0.9	
RM4000 – RM4999	208	221,671	53.8	47.9	59.5	39	39,151	9.5	6.5	13.7	4	3,193	0.8	0.2	2.9	
RM5000 above	490	433,521	54.3	50.0	58.5	66	63,523	8.0	5.8	10.9	4	3,696	0.5	0.1	1.4	

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

Table 4.26: Travelling time to private outpatient healthcare facilities in the last 12 months

Sociodemographic Characteristics	30 minutes or less					Between 31 to 60 minutes					More than 1 hour				
	Count	Estimated Population	%	95% CI		Count	Estimated Population	%	95% CI		Count	Estimated Population	%	95% CI	
				LL	UL				LL	UL				LL	UL
<b>MALAYSIA</b>	1,269	1,409,356	70.4	67.8	72.8	323	330,224	16.5	14.4	18.8	40	34,968	1.7	1.2	2.5
<b>State</b>															
Johor	138	195,731	75.6	68.3	81.6	31	44,266	17.1	11.7	24.3	3	2,360	0.9	0.2	3.4
Kedah	62	84,493	73.4	61.3	82.8	16	17,891	15.5	8.5	26.7	-	-	-	-	-
Kelantan	47	39,071	70.7	58.8	80.3	8	6,616	12.0	6.1	22.3	1	757	1.4	0.2	9.3
Melaka	75	40,468	75.0	61.4	84.9	21	8,999	16.7	9.0	28.8	2	1,227	2.3	0.5	9.2
Negeri Sembilan	57	44,973	76.4	64.1	85.4	9	5,706	9.7	4.7	19.0	2	1,112	1.9	0.4	7.6
Penang	36	28,768	54.3	41.2	66.8	10	9,605	18.1	9.3	32.4	3	3,367	6.4	1.9	18.9
Penang	97	96,487	60.9	49.1	71.5	32	44,261	27.9	18.1	40.5	1	1,824	1.2	0.2	7.8
Perak	101	162,446	72.7	64.2	79.8	16	20,556	9.2	5.3	15.6	3	3,675	1.6	0.5	5.8
Perlis	46	6,052	79.9	67.1	88.6	10	1,248	16.5	8.8	28.6	-	-	-	-	-
Selangor	242	329,419	68.7	63.3	73.7	54	71,443	14.9	11.2	19.5	1	1,639	0.3	0.0	2.4
Terengganu	52	32,052	72.8	60.9	82.2	11	5,827	13.2	7.1	23.4	1	290	0.7	0.1	4.6
Sabah/Labuan	100	95,659	57.3	48.0	66.1	44	41,127	24.6	17.5	33.5	10	10,471	6.3	3.2	11.9
Sarawak	39	50,126	58.9	45.4	71.2	17	22,963	27.0	16.6	40.7	2	2,949	3.5	0.8	13.3
WP Kuala Lumpur	98	196,866	84.4	76.4	90.0	16	27,634	11.8	7.0	19.5	3	4,665	2.0	0.6	6.2
WP Putrajaya	79	6,743	69.5	60.2	77.4	28	2,083	21.5	14.7	30.3	8	632	6.5	3.2	12.7
<b>Location</b>															
Urban	985	1,256,006	73.6	70.7	76.3	187	250,198	14.7	12.4	17.2	20	16,947	1.0	0.5	1.8
Rural	284	153,349	51.9	46.5	57.3	136	80,026	27.1	22.4	32.3	20	18,021	6.1	3.8	9.6
<b>Sex</b>															
Male	512	629,014	68.0	63.9	71.8	146	164,281	14.6	14.6	21.4	17	16,245	1.8	1.0	3.1
Female	757	780,342	72.4	69.0	75.6	177	165,943	12.8	12.8	18.4	23	18,723	1.7	1.1	2.8
<b>Age Group</b>															
0 - 4	8	6,363	18.5	8.6	35.3	-	-	-	-	-	-	-	-	-	-
5 - 9	31	32,955	21.8	14.7	31.0	6	3,332	0.8	0.8	6.1	1	93	0.1	0.0	0.4
10 - 14	22	24,584	31.2	20.8	44.0	5	4,972	2.3	2.3	16.0	-	-	-	-	-
15 - 19	53	67,095	73.2	60.0	83.2	17	20,168	12.9	12.9	34.9	-	-	-	-	-
20 - 24	123	162,257	80.1	71.5	86.6	33	32,459	10.2	10.2	24.2	5	6,908	3.4	1.3	8.8
25 - 29	155	190,226	75.9	67.1	83.0	41	49,139	13.1	13.1	28.4	5	5,281	2.1	0.8	5.2
30 - 34	159	183,874	77.0	69.5	83.0	40	46,767	13.9	13.9	26.9	4	4,572	1.9	0.7	4.9
35 - 39	184	220,432	79.5	72.5	85.1	38	40,738	9.9	9.9	21.3	5	7,603	2.7	1.1	6.6
40 - 44	149	158,603	76.6	68.1	83.4	40	43,528	14.5	14.5	29.5	7	3,306	1.6	0.6	4.2
45 - 49	150	147,698	79.4	71.1	85.8	33	31,818	11.3	11.3	25.1	4	3,165	1.7	0.4	6.9
50 - 54	106	91,781	76.5	66.6	84.1	31	24,556	13.2	13.2	30.4	4	1,332	1.1	0.3	3.9
55 - 59	62	54,691	74.9	62.0	84.4	21	15,591	12.3	12.3	34.3	3	1,270	1.7	0.5	5.5
60 - 64	29	26,208	68.7	52.1	81.6	10	7,525	9.7	9.7	35.9	2	1,437	3.8	0.9	14.2
65 - 70	19	24,495	79.5	49.9	93.8	4	6,185	5.9	5.9	50.1	-	-	-	-	-
70 - 74	10	9,117	72.1	35.0	92.6	2	2,748	4.4	4.4	62.4	-	-	-	-	-
75+	9	8,975	92.8	67.5	98.8	2	699	1.2	1.2	32.5	-	-	-	-	-



Sociodemographic Characteristics	30 minutes or less						Between 31 to 60 minutes						More than 1 hour					
	Count	Estimated Population	% (Percentage)	95% CI		Count	Estimated Population	% (Percentage)	95% CI		Count	Estimated Population	% (Percentage)	95% CI				
				LL	UL				LL	UL				LL	UL			
<b>MALAYSIA</b>	1,269	1,409,356	70.4	67.8	72.8	323	330,224	16.5	14.4	18.8	40	34,968	1.7	1.2	2.5			
<b>Ethnicity</b>																		
Malay	701	667,219	69.2	65.8	72.5	187	152,040	13.2	13.2	18.7	19	11,213	1.2	0.6	2.1			
Chinese	363	562,904	74.5	69.7	78.8	71	118,267	12.0	12.0	20.1	9	9,178	1.2	0.6	2.6			
Indian	107	91,153	71.0	61.3	79.1	28	20,959	10.5	10.5	24.4	1	2,162	1.7	0.2	11.0			
Bumiputera Sabah	9	8,119	43.3	20.3	69.6	5	8,119	19.4	19.4	70.8	1	1,944	10.4	1.4	48.0			
Bumiputera Sarawak	46	49,943	56.4	42.8	69.1	18	21,287	14.6	14.6	37.0	9	9,238	10.4	5.0	20.3			
Other Bumiputera	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-			
Others	43	30,017	62.6	44.9	77.5	14	9,551	10.2	10.2	35.4	1	1,233	2.6	0.4	16.3			
<b>Marital Status</b>																		
Never Married	305	389,512	76.3	70.8	81.0	88	99,963	15.2	15.2	24.8	10	11,592	2.3	1.1	4.6			
Married	884	938,976	78.4	75.3	81.3	210	207,087	14.7	14.7	20.3	29	23,283	1.9	1.2	3.0			
Separated	6	4,742	100.0	0.0	0.0	-	-	-	-	-	-	-	-	-	-			
Divorcee	12	14,551	73.4	47.1	89.5	7	5,205	10.3	10.3	52.5	-	-	-	-	-			
Widow/er	19	15,855	58.1	33.5	79.2	8	11,123	19.8	19.8	65.7	-	-	-	-	-			
Cohabiting	-	-	-	-	-	1	1,709	0.0	0.0	0.0	-	-	-	-	-			
Others	1	1,973	87.1	29.6	99.1	1	293	0.9	0.9	70.4	-	-	-	-	-			
<b>Education Level</b>																		
No formal education	19	19,057	60.0	39.5	77.5	3	2,745	2.4	2.4	26.8	1	641	2.0	0.3	13.2			
Primary	143	145,088	48.9	42.0	55.9	39	29,721	6.6	6.6	14.9	4	3,943	1.3	0.5	3.7			
Secondary	542	573,209	75.4	71.2	79.1	146	160,679	17.6	17.6	25.2	15	11,828	1.6	0.8	2.9			
Tertiary	524	625,956	79.9	75.8	83.5	125	126,210	12.8	12.8	20.0	18	16,747	2.1	1.2	3.8			
Unclassified	16	20,419	35.9	22.8	51.5	9	9,652	8.5	8.5	31.0	1	1,715	3.0	0.4	18.5			
<b>Occupation</b>																		
Government	214	177,583	78.7	71.3	84.6	58	38,506	11.7	11.7	24.3	13	7,716	3.4	1.6	7.0			
Semi-government	24	21,249	74.4	49.4	89.7	5	7,297	10.3	10.3	50.6	-	-	-	-	-			
Private	445	589,937	77.0	72.7	80.9	119	147,260	15.6	15.6	23.4	9	10,813	1.4	0.7	2.9			
Self-employed	196	199,251	74.3	66.6	80.7	56	62,134	16.9	16.9	30.9	5	2,485	0.9	0.3	2.9			
Unpaid worker/homemaker	167	154,206	79.3	72.6	84.7	37	27,732	9.8	9.8	20.4	8	7,626	3.9	1.9	8.1			
Retiree	54	59,550	85.0	73.4	92.1	8	7,848	5.2	5.2	22.6	1	641	0.9	0.1	6.3			
<b>Household Income Group (RM)</b>																		
Less than RM400	56	62,257	65.0	52.5	75.8	9	9,917	4.6	4.6	21.7	6	5,421	5.7	2.3	13.3			
RM400 – RM499	6	5,353	63.6	26.8	89.3	4	3,068	10.7	10.7	73.2	-	-	-	-	-			
RM500 – RM699	17	16,351	61.0	40.2	78.4	6	5,538	8.9	8.9	41.0	2	2,833	10.6	2.6	34.3			
RM700 – RM999	25	27,537	67.7	46.4	83.5	9	9,875	10.6	10.6	46.5	-	-	-	-	-			
RM1000 – RM1999	164	142,926	68.6	60.2	75.9	41	41,077	13.6	13.6	27.6	3	3,476	1.7	0.4	6.5			
RM2000 – RM2999	168	187,353	71.8	64.2	78.4	45	41,846	10.9	10.9	23.1	6	6,111	2.3	0.9	5.8			
RM3000 – RM3999	160	186,740	71.8	64.0	78.5	46	51,366	13.8	13.8	27.5	3	1,671	0.6	0.2	2.1			
RM4000 – RM4999	147	160,841	72.6	64.8	79.2	33	36,040	11.1	11.1	23.2	5	4,195	1.9	0.7	5.3			
RM5000 above	526	619,997	70.4	66.4	74.2	130	131,496	12.0	12.0	18.4	15	11,260	1.3	0.6	2.5			

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

Table 4.27: Travelling time to urban outpatient healthcare facilities in the last 12 months

Sociodemographic Characteristics	30 minutes or less						Between 31 – 60 minutes						More than 60 minutes					
	Count	Estimated Population	%	95% CI		Count	Estimated Population	%	95% CI		Count	Estimated Population	%	95% CI				
				LL	UL				LL	UL				LL	UL			
<b>MALAYSIA</b>	2,349	2,751,515	61.0	59.2	62.9	350	452,089	10.0	8.7	11.5	28	26,582	0.6	0.4	1.0			
<b>State</b>																		
Johor	312	452,362	71.3	66.7	75.5	36	58,455	9.2	6.5	12.9	2	3,486	0.5	0.1	2.2			
Kedah	79	127,572	56.6	47.5	65.4	7	14,685	6.5	3.0	13.8	-	-	-	-	-			
Kelantan	64	48,740	48.3	39.7	57.0	4	2,767	2.7	1.0	7.4	-	-	-	-	-			
Malaka	114	110,412	59.2	49.9	68.0	11	10,156	5.4	2.9	10.0	4	2,674	1.4	0.5	3.9			
Negeri Sembilan	136	119,707	54.4	47.5	61.1	14	9,781	4.4	2.4	8.1	2	1,112	0.5	0.1	2.1			
Pahang	74	59,945	46.2	38.3	54.3	11	10,225	7.9	4.1	14.5	1	1,286	1.0	0.1	6.7			
Penang	127	210,127	53.4	46.2	60.4	22	45,940	11.7	7.3	18.2	1	1,824	0.5	0.1	3.2			
Perak	161	315,089	60.2	53.6	66.5	17	31,479	6.0	3.3	10.6	1	2,162	0.4	0.1	2.9			
Perlis	99	14,916	48.7	41.2	56.3	7	792	2.6	1.2	5.4	-	-	-	-	-			
Selangor	356	540,963	60.4	56.3	64.4	68	100,752	11.3	8.8	14.2	2	4,694	0.5	0.1	2.2			
Terengganu	91	65,603	53.9	46.2	61.3	8	6,312	5.2	2.6	10.1	-	-	-	-	-			
Sabah/Labuan	159	145,728	47.2	38.6	55.9	46	67,374	21.8	13.4	33.6	2	2,354	0.8	0.1	4.8			
Sarawak	76	103,718	48.5	40.2	57.0	23	32,459	15.2	9.8	22.9	-	-	-	-	-			
WP Kuala Lumpur	241	415,031	83.3	78.3	87.4	36	58,009	11.6	8.3	16.2	4	6,239	1.3	0.5	3.3			
WP Putrajaya	260	21,604	83.7	79.0	87.5	40	2,901	11.2	8.1	15.5	9	751	2.9	1.5	5.6			
<b>Sex</b>																		
Male	967	1,243,961	59.8	56.9	62.6	130	198,259	9.5	7.5	12.1	18	20,024	1.0	0.5	1.7			
Female	1,382	1,507,554	62.1	59.6	64.6	220	253,830	10.5	8.9	12.2	10	6,557	0.3	0.1	0.7			
<b>Age Group</b>																		
0 - 4	21	20,751	21.8	13.3	33.5	2	2,572	2.7	0.7	10.3	-	-	-	-	-			
5 - 9	149	154,195	19.8	16.7	23.4	6	3,842	0.5	0.2	1.4	1	93	0.0	0.0	0.1			
10 - 14	300	311,085	38.4	34.5	42.5	12	9,686	1.2	0.6	2.4	-	-	-	-	-			
15 - 19	329	431,749	77.9	70.6	83.9	32	68,957	12.4	7.2	20.6	1	1,574	0.3	0.0	2.0			
20 - 24	171	265,323	84.7	77.9	89.7	26	34,554	11.0	6.8	17.3	6	10,775	3.4	1.4	8.1			
25 - 29	221	265,943	74.2	66.4	80.7	49	77,779	21.7	15.9	28.9	2	1,444	0.4	0.1	1.6			
30 - 34	221	284,233	83.2	77.5	87.7	42	52,767	15.4	11.2	21.0	1	108	0.0	0.0	0.2			
35 - 39	211	269,773	82.8	76.4	87.7	28	40,366	12.4	8.1	18.4	6	7,073	2.2	0.9	5.2			
40 - 44	187	210,331	80.5	73.2	86.2	35	45,805	17.5	12.0	24.9	5	1,951	0.7	0.2	2.8			
45 - 49	190	203,005	81.4	74.4	86.8	38	40,073	16.1	11.1	22.7	2	2,291	0.9	0.1	6.0			
50 - 54	146	135,523	81.1	72.7	87.3	30	28,736	17.2	11.2	25.5	2	147	0.1	0.0	0.4			
55 - 59	93	80,663	79.0	68.5	86.7	23	19,163	18.8	11.4	29.3	2	1,127	1.1	0.3	4.5			
60 - 64	42	44,592	72.5	58.7	83.0	13	12,117	19.7	11.0	32.7	-	-	-	-	-			
65 - 70	34	38,116	83.5	60.5	94.3	4	7,558	16.5	5.7	39.5	-	-	-	-	-			
70 - 74	16	15,974	71.9	47.1	88.0	7	5,470	24.6	9.7	49.8	-	-	-	-	-			
75+	18	20,259	88.5	67.9	96.5	3	2,642	11.5	3.5	32.1	-	-	-	-	-			

Sociodemographic Characteristics	30 minutes or less					Between 31 – 60 minutes					More than 60 minutes				
	Count	Estimated Population	Percentage (%)	95% CI		Count	Estimated Population	Percentage (%)	95% CI		Count	Estimated Population	Percentage (%)	95% CI	
				LL	UL				LL	UL				LL	UL
<b>MALAYSIA</b>	2,349	2,751,515	61.0	59.2	62.9	350	452,089	10.0	8.7	11.5	28	26,582	0.6	0.4	1.0
<b>Ethnicity</b>															
Malay	1,372	1,393,849	60.2	57.8	62.5	168	191,336	8.3	6.9	9.9	16	9,467	0.4	0.2	0.8
Chinese	564	944,037	66.2	62.6	69.6	83	148,485	10.4	8.2	13.1	9	12,599	0.9	0.4	1.9
Indian	226	244,122	59.5	53.3	65.3	45	45,467	11.1	7.9	15.4	1	2,162	0.5	0.1	3.6
Bumiputera Sabah	25	30,882	38.7	26.5	52.5	10	10,812	13.5	6.5	26.2	-	-	-	-	-
Bumiputera Sarawak	87	87,696	45.4	33.5	57.7	24	41,136	21.3	9.8	40.2	1	2,246	1.2	0.2	7.9
Other Bumiputera	1	767	61.3	11.7	95.0	1	134	10.7	1.0	58.4	-	-	-	-	-
Others	74	50,162	62.8	49.5	74.3	19	14,719	18.4	10.3	30.7	1	108	0.1	0.0	1.0
<b>Marital Status</b>															
Never Married	856	1,104,966	80.1	76.3	83.4	109	167,563	12.1	9.3	15.8	9	14,840	1.1	0.5	2.2
Married	1,176	1,340,908	81.6	79.0	84.0	213	257,324	15.7	13.4	18.2	18	11,648	0.7	0.4	1.4
Separated	8	7,491	100.0	100.0	100.0	-	-	-	-	-	-	-	-	-	-
Divorcee	22	23,091	86.1	65.9	95.2	6	3,635	13.6	4.6	34.0	-	-	-	-	-
Widow/er	40	35,408	69.3	51.0	83.1	11	13,931	27.3	14.2	45.9	-	-	-	-	-
Cohabiting	0	0	0.0	0.0	0.0	1	1,709	100.0	100.0	100.0	-	-	-	-	-
Others	2	3,053	100.0	100.0	100.0	-	-	-	-	-	-	-	-	-	-
<b>Education Level</b>															
No formal education	34	33,127	53.9	39.7	67.4	9	6,819	11.1	5.4	21.4	-	-	-	-	-
Primary	527	566,237	39.6	36.5	42.7	60	58,198	4.1	3.0	5.5	1	108	0.0	0.0	0.1
Secondary	955	1,136,245	81.3	77.6	84.4	132	202,371	14.5	11.5	18.1	11	7,681	0.5	0.3	1.2
Tertiary	637	779,714	79.7	75.9	83.1	130	159,967	16.4	13.3	19.9	13	15,410	1.6	0.8	3.2
Unclassified	136	179,504	49.1	42.9	55.2	15	19,582	5.4	3.1	9.0	2	3,289	0.9	0.2	3.5
<b>Occupation</b>															
Government	339	278,871	83.4	77.4	88.0	54	50,509	15.1	10.6	21.0	7	1,766	0.5	0.1	2.1
Semi-government	25	25,700	68.2	45.7	84.5	7	11,970	31.8	15.5	54.3	0	0	0.0	0.0	0.0
Private	540	812,601	79.4	75.7	82.6	119	176,343	17.2	14.2	20.8	9	10,438	1.0	0.5	2.2
Self-employed	217	265,292	78.3	67.0	86.5	38	69,482	20.5	12.4	32.0	3	571	0.2	0.0	0.8
Unpaid worker /homemaker	264	257,990	85.7	80.9	89.5	45	38,641	12.8	9.3	17.5	1	764	0.3	0.0	1.8
Retiree	101	105,637	83.0	74.9	88.9	22	18,150	14.3	8.9	22.1	1	683	0.5	0.1	3.7
<b>Household Income Group (RM)</b>															
Less than RM400	113	127,201	48.0	40.2	55.8	20	22,090	8.3	4.9	13.7	-	-	-	-	-
RM400 – RM499	18	16,084	32.1	18.3	50.0	4	4,337	8.7	3.2	21.6	-	-	-	-	-
RM500 – RM699	42	39,739	58.8	45.0	71.3	8	8,571	12.7	6.1	24.3	1	1,715	2.5	0.4	15.9
RM700 – RM999	71	77,137	52.4	42.6	62.1	6	8,154	5.5	2.0	14.4	-	-	-	-	-
RM1000 – RM1999	332	357,760	54.5	49.0	60.0	59	80,204	12.2	7.7	18.8	4	5,406	0.8	0.2	3.1
RM2000 – RM2999	408	476,418	64.5	59.9	68.8	50	56,669	7.7	5.5	10.7	4	4,199	0.6	0.2	1.8
RM3000 – RM3999	41	403,884	61.8	56.8	66.6	41	62,837	9.6	6.7	13.6	3	1,671	0.3	0.1	0.8
RM4000 – RM4999	267	329,622	63.5	58.0	68.7	38	52,705	10.2	7.2	14.2	3	2,259	0.4	0.1	2.5
RM5000 above	757	923,670	65.5	62.2	68.7	124	156,522	11.1	9.0	13.7	13	11,331	0.8	0.4	1.6

Note: Some cells have respondent count < 30. Results should be interpreted with caution. LL = Lower Limit , UL = Upper Limit

Table 4.28: Travelling time to rural outpatient healthcare facilities in the last 12 months

Sociodemographic Characteristics	30 minutes or less						Between 31 – 60 minutes						More than 60 minutes					
	Count	Estimated Population	% (Percentage)	95% CI		Count	Estimated Population	% (Percentage)	95% CI		Count	Estimated Population	% (Percentage)	95% CI				
				LL	UL				LL	UL				LL	UL			
<b>MALAYSIA</b>	1,205	760,093	43.6	41.3	46.0	299	188,522	10.8	9.4	12.4	43	35,778	2.1	1.5	2.8			
<b>State</b>																		
Johor	137	140,759	53.2	46.6	59.6	27	26,722	10.1	6.8	14.8	3	2,252	0.9	0.2	3.1			
Kedah	94	70,833	46.0	39.0	53.1	15	11,032	7.2	4.2	11.9	-	-	-	-	-			
Kelantan	43	37,798	30.3	23.3	38.3	6	4,945	4.0	1.8	8.6	1	757	0.6	0.1	4.2			
Melaka	143	18,093	50.7	44.1	57.2	23	2,794	7.8	5.0	12.1	1	154	0.4	0.1	3.0			
Negeri Sembilan	78	35,228	42.9	35.4	50.7	18	6,313	7.7	4.6	12.6	1	456	0.6	0.1	3.9			
Pahang	76	71,876	54.7	45.9	63.2	9	7,648	5.8	2.8	11.5	3	3,367	2.6	0.7	8.4			
Penang	124	19,680	47.6	41.3	54.0	23	3,646	8.8	5.7	13.3	1	148	0.4	0.1	2.5			
Perak	92	83,003	41.2	34.4	48.4	24	23,802	11.8	7.9	17.4	2	1,513	0.8	0.2	3.0			
Perlis	66	11,298	47.9	39.5	56.4	8	1,105	4.7	2.2	9.6	-	-	-	-	-			
Selangor	109	66,138	53.0	45.8	60.0	30	16,253	13.0	8.8	18.9	2	1,953	1.6	0.4	6.0			
Terengganu	61	29,297	37.5	30.4	45.3	15	6,000	7.7	4.5	12.7	1	290	0.4	0.1	2.6			
Sabah/Labuan	119	100,014	34.3	28.7	40.5	65	42,819	14.7	11.1	19.2	17	12,919	4.4	2.7	7.3			
Sarawak	63	76,075	40.3	31.5	49.7	36	35,444	18.8	12.5	27.1	11	11,970	6.3	3.4	11.5			
WP Kuala Lumpur	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-			
WP Putrajaya	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-			
<b>Sex</b>																		
Male	533	351,786	42.4	38.9	45.8	127	82,062	9.9	7.9	12.4	13	11,392	1.4	0.8	2.5			
Female	672	408,307	44.8	41.7	47.9	172	106,460	11.7	9.8	13.8	30	24,386	2.7	1.8	3.9			
<b>Age Group</b>																		
0 - 4	4	3,784	7.6	2.5	21.1	2	1,167	2.4	0.6	9.1	-	-	-	-	-			
5 - 9	33	31,566	7.3	5.0	10.6	7	5,152	1.2	0.5	2.7	1	734	0.2	0.0	1.2			
10 - 14	197	125,335	30.7	26.4	35.4	12	7,574	1.9	0.9	3.6	1	801	0.2	0.0	1.4			
15 - 19	285	206,406	79.7	73.9	84.5	35	28,964	11.2	7.7	15.9	2	1,953	0.8	0.2	3.0			
20 - 24	93	64,582	67.6	54.4	78.5	31	24,925	26.1	16.0	39.6	1	1,234	1.3	0.2	8.6			
25 - 29	103	66,905	71.5	61.1	80.1	31	19,910	21.3	13.8	31.3	5	5,301	5.7	2.2	13.6			
30 - 34	75	42,351	63.5	51.6	74.0	25	15,565	23.3	14.7	35.0	6	5,953	8.9	4.0	18.7			
35 - 39	104	61,590	73.2	63.3	81.2	31	16,323	19.4	13.0	28.0	4	3,456	4.1	1.2	13.0			
40 - 44	83	47,939	62.3	51.6	72.0	36	23,400	30.4	21.5	41.1	4	3,424	4.4	1.6	11.5			
45 - 49	81	39,689	64.1	52.8	74.1	28	16,273	26.3	17.6	37.3	5	4,459	7.2	2.8	17.4			
50 - 54	57	27,902	66.6	53.7	77.4	26	11,496	27.4	17.6	40.1	2	1,186	2.8	0.7	11.0			
55 - 59	33	15,518	55.1	39.2	70.0	15	6,836	24.3	13.5	39.6	6	4,224	15.0	6.1	32.3			
60 - 64	30	12,938	58.6	39.9	75.2	8	5,002	22.7	10.5	42.2	2	1,437	6.5	1.6	22.8			
65 - 70	9	4,786	48.1	23.0	74.2	7	3,482	35.0	14.8	62.5	1	154	1.5	0.2	10.8			
70 - 74	12	5,595	73.3	45.3	90.1	1	579	7.6	1.1	38.8	3	1,462	19.1	5.9	47.1			
75+	6	3,207	50.8	22.3	78.8	4	1,873	29.7	10.0	61.5	-	-	-	-	-			

Sociodemographic Characteristics	30 minutes or less					Between 31 – 60 minutes					More than 60 minutes				
	Count	Estimated Population	% (Percentage)	95% CI		Count	Estimated Population	% (Percentage)	95% CI		Count	Estimated Population	% (Percentage)	95% CI	
				LL	UL				LL	UL				LL	UL
<b>MALAYSIA</b>	1,205	760,093	43.6	41.3	46.0	299	188,522	10.8	9.4	12.4	43	35,778	2.1	1.5	2.8
<b>Ethnicity</b>															
Malay	850	527,628	45.1	42.5	47.7	192	116,282	9.9	8.4	11.7	16	13,008	1.1	0.6	1.9
Chinese	133	55,278	46.7	38.6	54.9	21	10,625	9.0	5.2	15.0	3	1,073	0.9	0.3	3.1
Indian	75	20,299	47.1	36.9	57.5	20	4,309	10.0	5.8	16.7	-	-	-	-	-
Bumiputera Sabah	38	53,540	44.1	32.6	56.2	15	18,626	15.3	7.8	27.9	7	8,778	7.2	3.3	14.9
Bumiputera Sarawak	82	94,206	35.8	29.2	43.0	38	34,088	13.0	9.3	17.8	16	11,685	4.4	2.6	7.4
Other Bumiputera	1	2,083	24.1	3.3	74.8	-	-	-	-	-	-	-	-	-	-
Others	26	7,059	40.9	23.7	60.5	13	4,591	26.6	12.4	48.1	1	1,233	7.1	1.0	36.4
<b>Marital Status</b>															
Never Married	574	376,681	78.2	74.2	81.8	84	56,064	11.6	9.0	14.9	9	7,999	1.7	0.8	3.2
Married	536	302,088	65.6	61.2	69.7	188	114,239	24.8	21.0	29.0	29	24,597	5.3	3.6	7.9
Separated	1	795	86.1	27.8	99.0	-	-	-	-	-	-	-	-	-	-
Divorcee	5	4,878	56.4	25.3	83.2	6	3,771	43.6	16.8	74.7	0	0	0.0	0.0	0.0
Widow/er	26	10,956	57.2	38.4	74.1	8	5,134	26.8	13.1	47.1	4	2,448	12.8	4.2	32.6
Others	-	-	-	-	-	1	293	100.0	100.0	100.0	0	0	0.0	0.0	0.0
<b>Education Level</b>															
No formal education	26	13,929	35.5	23.3	50.0	9	4,704	12.0	5.8	23.3	6	4,573	11.7	4.8	25.7
Primary	347	217,926	31.6	28.2	35.2	60	34,235	5.0	3.7	6.7	12	10,112	1.5	0.8	2.7
Secondary	542	344,679	70.9	66.4	75.0	149	104,381	21.5	17.8	25.7	14	12,337	2.5	1.4	4.4
Tertiary	198	111,613	69.3	62.1	75.8	67	33,510	20.8	15.5	27.3	10	8,021	5.0	2.5	9.7
Unclassified	75	58,248	28.6	22.8	35.3	9	7,896	3.9	1.8	8.0	-	-	-	-	-
<b>Occupation</b>															
Government	117	70,370	65.6	55.6	74.3	49	24,091	22.4	15.8	30.8	11	8,482	7.9	4.0	14.9
Semi-government	11	7,718	88.1	65.4	96.7	3	1,045	11.9	3.3	34.6	-	-	-	-	-
Private	208	111,763	64.1	56.1	71.4	79	51,521	29.5	22.6	37.6	6	5,142	2.9	1.3	6.6
Self-employed	173	104,004	70.0	62.4	76.6	51	32,699	22.0	16.2	29.2	9	9,165	6.2	3.2	11.6
Unpaid worker /homemaker	138	79,908	62.1	53.6	69.9	46	31,758	24.7	18.0	32.8	12	10,578	8.2	4.5	14.6
Retiree	36	17,672	72.7	54.8	85.5	5	2,553	10.5	4.0	24.7	2	794	3.3	0.6	15.2
<b>Household Income Group (RM)</b>															
Less than RM400	66	57,531	37.0	29.5	45.2	18	13,318	8.6	5.2	13.8	6	5,421	3.5	1.4	8.4
RM400 – RM499	10	9,280	37.2	19.1	59.7	3	1,989	8.0	1.8	28.5	3	3,090	12.4	4.0	32.6
RM500 – RM699	51	38,573	35.4	27.1	44.7	7	4,358	4.0	1.8	8.7	3	3,903	3.6	1.2	10.5
RM700 – RM999	64	44,792	34.7	27.2	43.0	14	9,016	7.0	3.9	12.2	2	1,106	0.9	0.2	3.8
RM1000 – RM1999	311	214,070	47.4	42.8	52.1	65	43,780	9.7	7.3	12.8	8	6,719	1.5	0.7	3.1
RM2000 – RM2999	204	115,205	45.7	39.8	51.7	48	25,214	10.0	6.9	14.3	6	5,294	2.1	0.9	4.7
RM3000 – RM3999	149	94,019	42.8	36.0	49.8	37	29,224	13.3	8.5	20.2	3	1,490	0.7	0.2	2.4
RM4000 – RM4999	89	53,804	44.4	36.2	53.0	34	22,487	18.6	12.6	26.4	6	5,129	4.2	1.7	10.1
RM5000 above	261	132,819	47.6	42.2	53.1	73	39,137	14.0	10.7	18.2	6	3,625	1.3	0.5	3.2

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

LL = Lower Limit , UL = Upper Limit

Table 4.29: Mode of transport to outpatient healthcare facilities in the last 12 months

Mode of transport	Government facility				Private Facility			
	Count	Estimated Population	(Percentage)	95% CI	Count	Estimated Population	(Percentage)	95% CI
			Lower	Upper			Lower	Upper
<b>TOTAL</b>	4,770	4,186,994	100	100	1,860	2,003,102	100	100
Own car	1,344	1,209,320	28.9	27.3	1,383	1,500,391	74.9	72.4
Own motorcycle	591	536,780	12.8	11.7	225	241,559	12.1	10.4
Own bicycle	39	35,749	0.9	0.6	4	6,633	0.3	0.1
Own boat	1	1,261	0.0	0.0	-	-	-	-
Public transport	457	455,553	10.9	9.6	94	90,611	4.5	3.6
Walking	2,148	1,748,405	41.8	40.1	66	73,100	3.6	2.7
Ambulance	4	3,380	0.1	0.0	-	-	-	-
Missing <sup>1</sup>	186	196,547	4.7	4.0	88	90,808	4.5	3.5

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

<sup>1</sup> Missing include fields coded "Don't know", "Refuse to answer" & "No answer"

Table 4.30: Prevalence of recommendation of oral healthcare providers to others

Recommended facility	Government healthcare facility				Private healthcare facility			
	Count	Estimated Population	(Percentage)	95% CI	Count	Estimated Population	(Percentage)	95% CI
			Lower	Upper			Lower	Upper
<b>TOTAL</b>	4,770	4,186,994	100	100	1,860	2,003,102	100	100
Yes	3,283	2,890,987	69.0	67.3	1,376	1,469,516	73.4	70.8
No	1,317	1,132,028	27.0	25.4	454	501,547	25.0	22.7
Missing <sup>1</sup>	170	163,980	3.9	3.3	30	32,039	1.6	1.1

<sup>1</sup> Missing include fields coded "Don't know", "Refuse to answer" & "No answer"

#### 4.9 DEFINITION OF VARIABLES

Variable name	Variable in SPSS	Weight	Definition	SPSS variable definition
Oral health problems in last 2 weeks	ohp2wks	weight4	Persons reported oral health problems within the last 2 weeks.	ohp2wks EXECUTE.
Oral health problems only in last 2 weeks	onlyoralhealth	weight4	Persons reported oral health problems without any other illness within the last 2 weeks. Yes=1; No=0	DO IF (B1010 ~= 1 & B1012 ~= 1 & B1013 ~= 1 & B1015 ~= 1 & B1016 ~= 1 & B1017 ~= 1). RECODE ohp2wks (ELSE=Copy) INTO onlyoralhealth. END IF.
Oral health problems with at least one illness	PREVALENCE_L	weight4	Persons reported oral health problems with at least one other illness within the last 2 weeks. Yes=1; No=0	IF (B1010.2ORAL = 1   B1012.2ORAL=1   B1011.2ORAL = 1   B1013.2ORAL = 1   B1015.2ORAL = 1   B1016.2ORAL = 1   B1017.2ORAL = 1 ) b1010_b1017=1.
	Onlyoralhealth B1100.2	weight4	Prevalence of oral health problems without any other illness in the last 2 weeks where daily activities were affected.	COMPUTE filter_\$=(onlyoralhealth = 1) B1100.2 EXECUTE.
	B1100.2 PREVALENCE_L	weight4	Prevalence of oral health problems with at least one other illness in the last 2 weeks where daily activities were affected. Yes=1; No=0	COMPUTE filter_\$=(B1100.2 = 1) Prevalence_L (1=yes, 2=NO)
Number of days where activities were affected by oral health problems	ohp2wks_d2	weight4	Mean number of days where activities were affected by oral health problems in the last 2 weeks	DO IF (ohp2wks = 1 & B1101.2 ~= 0). RECODE B1101.2 (ELSE=Copy) INTO ohp2wks_d2. END IF.
Number of days where activities were affected by oral health problems only	prevalence0_d2	weight4	Mean number of days where activities were affected by oral health problems without any other illness in the last 2 weeks.	DO IF (onlyoralhealth = 1 & B1101.2 ~= 0). RECODE B1101.2 (ELSE=Copy) INTO prevalence0_d2. END IF.
	PREVALENCE_LB1101.2	weight4		COMPUTE filter_\$=(PREVALENCE_L = 1). EXECUTE.

Variable name	Variable in SPSS	Weight	Definition	SPSS variable definition
				B1101.2 EXECUTE.
	Onlyoralhealth B1200	weight4	Self care/self medicate for oral health illness in last two weeks.	COMPUTE filter_\$(onlyoralhealth = 1). EXECUTE. B1200
Sought care from healthcare providers	Onlyoralhealth B1201	weight4	Sought care from healthcare providers for oral health illness in last two weeks	COMPUTE filter_\$(onlyoralhealth = 1). EXECUTE. B1201
Purchased medication	Onlyoralhealth B1202	weight4	Purchased medication for oral health illness in last two weeks after advise from pharmacist Yes=1; No=0	COMPUTE filter_\$(onlyoralhealth = 1). EXECUTE. B1202
Sought advise other than from a healthcare provider	Onlyoralhealth B1203	weight4	Sought advise, other than from a healthcare providers for oral health illness in last two weeks Yes=1; No=0	COMPUTE filter_\$(onlyoralhealth = 1). EXECUTE. B1203
Other health seeking behavior	Onlyoralhealth B1204	weight4	Practised other health seeking behavior, other than the above Yes=1; No=0	COMPUTE filter_\$(onlyoralhealth = 1). EXECUTE. B1204
Perceived need for oral healthcare	perneednew	weight4	Perceived need for treatment or advice from healthcare provider for oral health illness in last two weeks, for those who did not seek care Yes=1; No=0	COMPUTE filter_\$(onlyoralhealth = 1). EXECUTE. RECODE B1230_ORAL (ELSE=Copy) INTO perneednew. EXECUTE.
With oral health problems in last 2 weeks but not seek care	onlyoralhealth B1201.oral	weight4	Persons reported with oral health problems only within the last 2 weeks	COMPUTE filter_\$(onlyoralhealth = 1). EXECUTE.



Variable name	Variable in SPSS	Weight	Definition	SPSS variable definition
Three main reasons of not seeking care for oral health problems in the last 2 weeks	onlyoralhealth B123a B123b B123c	weight4	but did not seek care	CSTABULATE B B1201.oral  COMPUTE filter_\$(onlyoralhealth = 1). EXECUTE. CSTABULATE B1231a B1231b B1231c
Reasons for choosing oral healthcare facility	B3011.1 B3011.2 B3011.3	weight4		CSTABULATE
Preferred oral health provider by sector in the last one year	B3010	weight4	Reported preferred oral health provider by sector in the last one year <ul style="list-style-type: none"> <li>• Government dental facility = 1</li> <li>• Private dental facility = 2</li> <li>• Traditional or complementary medicine premise or practitioner=3</li> </ul>	CSTABULATE B3010
Reasons for choosing government oral healthcare facility	B3010 B3011.1 B3011.2 B3011.3	weight4	Reasons for choosing government oral healthcare facility <ul style="list-style-type: none"> <li>• Government dental facility = 1</li> <li>• Private dental facility = 2</li> <li>• Traditional or complementary medicine premise or practitioner=3</li> </ul>	COMPUTE filter_\$(B3010 = 1). EXECUTE. CSTABULATE B3011.1 B3011.2 B3011.3
Reasons for choosing private oral healthcare facility	B3010 B3011.1 B3011.2 B3011.3	weight4	Reasons for choosing private oral healthcare facility <ul style="list-style-type: none"> <li>• Government dental facility = 1</li> <li>• Private dental facility = 2</li> <li>• Traditional or complementary medicine premise or practitioner=3</li> </ul>	COMPUTE filter_\$(B3010 = 2). EXECUTE. CSTABULATE B3011.1 B3011.2 B3011.3
Reasons for choosing Traditional or complementary medicine premise or practitioner	B3010 B3011.1 B3011.2 B3011.3	weight4	Reasons for choosing Traditional or complementary medicine premise or practitioner <ul style="list-style-type: none"> <li>• Government dental facility = 1</li> <li>• Private dental facility = 2</li> <li>• Traditional or complementary medicine premise or practitioner=3</li> <li>• Others = 4</li> </ul>	COMPUTE filter_\$(B3010 = 3). EXECUTE. CSTABULATE B3011.1 B3011.2 B3011.3

Variable name	Variable in SPSS	Weight	Definition	SPSS variable definition
When was the last time received dental care	B3101	weight4	Persons reported of last dental visit <ul style="list-style-type: none"> <li>• Between 1 till less than 2 years ago=1</li> <li>• Between 2 till less than 3 years ago = 2</li> <li>• Between 3 till less than 5 years ago=3</li> <li>• More than 5 years ago=4</li> </ul>	COUNT B3101
Prevalence of outpatient dental utilisation in the last one year	B3100	weight4	Persons reported received any dental care in the last 12 months	CSTABULATE 3100
Oral health problems in last 2 weeks and had sought care	Onlyoralhealth B1201.oral	weight4	Persons reported with oral health problems within the last 2 weeks and sought care	COMPUTE filter_\$(=onlyoralhealth = 1). EXECUTE. CSTABULATE B1201.oral
Number of dental facilities visited in the last one year	B3200	weight4	Number of dental facilities visited in the last one year	CSTABULATE B3200
Type of outpatient healthcare facilities/providers where oral healthcare was sought in the last 12 months	B3301.2 code of place * B3302 own by government or private	weight4	Type of outpatient healthcare facilities/providers where oral healthcare was sought in the last 12 months Medical clinic = 1 Dental clinic = 2 Pharmacy = 3 Hospital = 4 Chinese herbalist = 6	CSTABULATE B3301.2 BY B3302 CELLS POPSIZE TABLEPCT
Frequency of visit to dental outpatient care in government facilities	B3100 Sector visit_no2	weight4	Number of visit to government dental facility Sector: <ul style="list-style-type: none"> <li>• Government=1</li> <li>• Private=2</li> </ul> visit_no2 (Frequency of visit ): <ul style="list-style-type: none"> <li>• Once = 1</li> <li>• 2 = 2</li> <li>• &gt; 2 = 3</li> </ul>	COMPUTE filter_\$(=B3100 = 1). CSTABULATE sector by visit_no2

Variable name	Variable in SPSS	Weight	Definition	SPSS variable definition
Frequency of visit to dental outpatient care in private facilities	B3100 Sector visit_no2	weight4	Number of visit to government dental facility Sector: <ul style="list-style-type: none"> <li>Government=1</li> <li>Private=2</li> </ul> visit_no2 (Frequency of visit ): <ul style="list-style-type: none"> <li>Once =1</li> <li>2 = 2</li> <li>&gt;2 =3</li> </ul>	COMPUTE filter_\$(B3100 = 1). CSTABULATE sector by visit_no2
Mean frequency of visit to dental outpatient care ,by location	visit2 strata	weight4	strata: <ul style="list-style-type: none"> <li>Urban =1</li> <li>Rural =2</li> </ul>	sum visit2 if (b3302==1   b3302==2) & strata==1 [aweight=weight4], detail sum visit2 if (b3302==1   b3302==2) & strata==2 [aweight=weight4], detail
Mean frequency of visit to dental outpatient care, by region	visit2 state3	weight4	state3: <ul style="list-style-type: none"> <li>Peninsular Malaysia =1</li> <li>Sabah =2</li> <li>Sarawak =3</li> </ul>	sum visit2 if (b3302==1   b3302==2) & (state3==1   state3==2   state3==3) [aweight=weight4], detail sum visit2 if (b3302==1   b3302==2) & state3==1 [aweight=weight4], detail sum visit2 if (b3302==1   b3302==2) & state3==2 [aweight=weight4], detail sum visit2 if (b3302==1   b3302==2) & state3==3 [aweight=weight4], detail
Distance to government oral healthcare facility	sector distance 2	weight4	Distance to government oral healthcare facility distance2 <ul style="list-style-type: none"> <li>&lt;5km =1</li> <li>5-10km = 2</li> </ul>	CSTABULATE sector by distance2
Distance to private oral healthcare facility	sector distance 2	weight4	Distance to private oral healthcare facility distance2 <ul style="list-style-type: none"> <li>&lt;5km =1</li> <li>5-10km = 2</li> </ul>	CSTABULATE sector by distance2
Distance to urban oral healthcare facility	strata distance2	weight4	Strata <ul style="list-style-type: none"> <li>urban =1</li> <li>rural = 2</li> </ul>	svy: tab state2 distance2 if strata==1, obs count format (%10.2gc) svy: tab state2 distance2 if strata==1, ci format (%3.1f) row percent

Variable name	Variable in SPSS	Weight	Definition	SPSS variable definition
Distance to rural oral healthcare facility	strata distance2	weight4	Strata <ul style="list-style-type: none"> <li>urban =1</li> <li>rural = 2</li> </ul>	svy: tab state2 distance2 if strata==2, obs count format (%10.2gc) svy: tab state2 distance2 if strata==2, ci format (%3.1f) row percent
Mean distance to dental outpatient care, by location	distance2 strata	weight4	strata: <ul style="list-style-type: none"> <li>Urban =1</li> <li>Rural =2</li> </ul>	sum distance2 if (b3302==1   b3302==2) & strata==1 [aweight=weight4], detail sum distance2 if (b3302==1   b3302==2) & strata==2 [aweight=weight4], detail
Mean distance of visit to dental outpatient care, by region	distance2 state3	weight4	state3: <ul style="list-style-type: none"> <li>Peninsular Malaysia =1</li> <li>Sabah =2</li> <li>Sarawak =3</li> </ul>	sum distance2 if (b3302==1   b3302==2) & (state3==1   state3==2   state3==3) [aweight=weight4], detail sum distance2 if (b3302==1   b3302==2) & state3==1 [aweight=weight4], detail sum distance2 if (b3302==1   b3302==2) & state3==2 [aweight=weight4], detail sum distance2 if (b3302==1   b3302==2) & state3==3 [aweight=weight4], detail
Travel time to government oral healthcare facility	Sector time2	weight4	Travel time to government oral healthcare facility time2: <ul style="list-style-type: none"> <li>&lt;30 minutes =1</li> <li>30-60 minutes =2</li> </ul>	CSTABULATE sector by time2
Travel time to private oral healthcare facility	Sector time2	weight4	Travel time to government oral healthcare facility time2: <ul style="list-style-type: none"> <li>&lt;30 minutes =1</li> <li>30-60 minutes =2</li> </ul>	CSTABULATE sector by time2
Travel time to urban oral healthcare facility	strata time2	weight4	Strata <ul style="list-style-type: none"> <li>urban =1</li> <li>rural = 2</li> </ul>	svy: tab state2 time2 if strata==1, obs count format (%10.2gc) svy: tab state2 time2 if strata==1, ci format (%3.1f) row percent
Travel time to rural oral healthcare facility	strata time2	weight4	Strata <ul style="list-style-type: none"> <li>urban =1</li> <li>rural = 2</li> </ul>	svy: tab state2 time2 if strata==2, obs count format (%10.2gc) svy: tab state2 time2 if strata==2, ci format (%3.1f) row percent

Variable name	Variable in SPSS	Weight	Definition	SPSS variable definition
Mean distance to dental outpatient care , by location	time2 strata	weight4	strata: <ul style="list-style-type: none"> <li>Urban = 1</li> <li>Rural = 2</li> </ul>	sum time2 if (b3302==1   b3302==2) & strata==1 [aweight=weight4], detail sum time2 (b3302==1   b3302==2) &.strata==2 [aweight=weight4], detail
Mean travel time of visit to dental outpatient care, by region	time2 state3	weight4	state3: <ul style="list-style-type: none"> <li>Peninsular Malaysia = 1</li> <li>Sabah = 2</li> <li>Sarawak = 3</li> </ul>	sum time2 if (b3302==1   b3302==2) & (state3==1   state3==2   state3==3) [aweight=weight4], detail sum time2 if (b3302==1   b3302==2) & state3==1 [aweight=weight4], detail sum distance2if (b3302==1   b3302==2) & state3==2 [aweight=weight4], detail sum time2 if (b3302==1   b3302==2) & state3==3 [aweight=weight4], detail
Mode of transport to government and private oral healthcare facility in the last one year	B3600.1 sector	weight4	Mode of transport used to the government and private oral healthcare facility  B3600.1 (mode of transport): <ul style="list-style-type: none"> <li>car = 1</li> <li>motorcycle = 2</li> <li>bicycle = 3</li> <li>boat = 4</li> <li>public transport = 5</li> <li>walking = 6</li> </ul>	CSTABULATE B3600.1 SUBPOP TABLE=sector DISPLAY=LAYERED
Recommend healthcare providers to others	B3700 sector	weight4	Recommendation of oral healthcare providers to others Yes=1	CSTABULATE B3700 SUBPOP TABLE=sector DISPLAY=LAYERED



# TOPIC 5

## HEALTHCARE EXPENDITURE





## 5.0 HEALTHCARE EXPENDITURE

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### 5.1 GENERAL OBJECTIVE

To estimate the total household out-of-pocket (OOP) health expenditure.

#### 5.1.1 Specific Objectives

1. To determine the quantum and the distribution of household out-of-pocket expenditure by sociodemographic and demographic factors.
2. To determine the distribution of households with private health insurance by socio economic and demographic factors and the quantum of premium paid.

Out of pocket (OOP) household health expenditures are categorised as household direct spending for services that fall into 2 categories:

1. Core functions of health care
2. Health-related functions

Services in these 2 categories are delivered by health providers that produce and provide health care goods and services, which benefits individuals or population group.

### 5.2 FINDINGS

#### 5.2.1 Household Spending

Average overall household monthly spending was RM1721 (SD, 2168) with a median of RM1250 (IQR, 700-2000). Household expenditures were mainly for food (mean, RM563.20; SD, 494.85) and utilities (mean, RM501.99; SD, 752.24). Monthly health expenditure was estimated at RM62.75 (SD, 178.42) (**Table 5.1**).

## 5.2.2 Sources of Payment for Health Care

### 5.2.3 Household Financial sources to pay for health

The main financial source to pay for any form of health care was from the household's current income (90.0%; 95% CI, 88.6-91.2). About a third of the population (27.7%; 95% CI, 25.7-29.8) said payment was using household savings. The use of health insurance to pay for health care was reported in 10.3% (95% CI, 9.1-11.5) of households (**Table 5.2**).

The Chinese (20.0, 95% CI, 16.8-23.6) reported the highest proportion for 'insurance reimbursement' as source for health care payment while the Indians and other ethnic groups reported using 'other sources' relatively more frequently than other ethnic groups (7.8%, 95% CI, 5.1-11.6; 9.3%, 95% CI, 4.3-19.1 ).

### 5.2.4 Usual Payer Who Would Pay for Health Care

On an individual level, 86.6% (95% CI, 86.1-87.1) had paid for their own for health care by themselves, or through family or other household members. Government, employer/panel clinic and personal health insurance contributed to 15.0% (95% CI, 14.5-15.5), 14.7% (95% CI, 14.1-15.2) and 14.1% (95% CI, 13.6-14.7) respectively (**Table 5.3** and **Table 5.4**).

Urban areas showed significantly higher proportion for employer/panel clinic (17.5%; 95% CI, 16.8-18.2), personal health insurance (17.4%, 16.7-18.1), government (15.7%; 95% CI, 15.0-16.3) and employer-sponsored insurance (7.6%; 95% CI, 7.1-8.2) as the usual payer who would cover health care related expenditure.

Among the age groups, respondents aged 30-39 years had higher proportion for having personal health insurance (21.5%, 95% CI, 18.9-24.3).

About a third (30.1%, 95% CI, 27.2-33.2) of the Chinese were covered by personal health insurance. Those who categorised as other ethnicities showed higher proportion for having employer/panel clinic payer (22.8%; 95% CI, 16.4-30.8).

Private employees have higher proportion for employer/panel clinic (35.1%; 95% CI, 32.9-37.4) and employer-sponsored insurance (16.8%; 95% CI, 15.2-18.5).

Those who earned RM5000 and higher tends to have a higher proportion for employer/panel clinic (22.3%, 95% CI, 20.0-24.7), personal health insurance (28.7%, 26.1-31.4), government (19.5%; 95% CI, 16.9-22.5) and employer-sponsored insurance (10.7%; 95% CI, 9.2-12.3).

### 5.2.5 Financial Coverage for Health

The highest financial coverage for health care was by private personal health insurance (21.9%; 95% CI, 20.5-23.3). While, financial coverage by government guarantee letter (GL) contributed to 19.2% (95% CI, 17.6-20.9) of the population (**Table 5.5**).

Wilayah Persekutuan Putrajaya showed a higher proportion for government GL (79.0%; 95% CI 69.8-86.0). Three industry-based states namely Wilayah Persekutuan Kuala Lumpur, Selangor and Penang shows higher population coverage for employer-sponsored insurance and personal health insurance ranging from 23.7% to 25.4% and 31.0%-35.8% respectively.

Government GL mostly covered those who aged 50-54 years old. Whereas employer sponsored insurance and private personal health insurance covered those in younger age groups which are 25-39 and 35-39 years old respectively.

The Malay has the highest proportion for government GL (28.5%, 26.3-30.9). Employer-sponsored insurance covered 19.7% (95% CI, 16.8-22.8) of the Indian population whereas the Chinese were having the highest proportion (44.6%, 41.6-47.7) of personal private health insurance coverage.

Those with tertiary education as their highest education level attained have the highest proportion of having coverage by government GL (28%; 95% CI, 25.5-30.8), employer-sponsored insurance (31.4%; 95% CI, 28.9-34.1) and personal health insurance (41.9%; 95% CI, 39.2-44.7).

As expected government employees are mostly covered by government GL (82.6%; 95% CI, 79.4-85.3), however they also have the highest proportion for having personal health insurance (39.1%; 95% CI, 36.1-42.3).

### 5.2.6 Out-of-Pocket Expenditure for Health Care

#### 5.2.6.1 Out-of-Pocket Health Expenditure

Total OOP health expenditure for the whole population (estimated at 27,278,956 million people in 2011) was estimated at RM16,556 million (95% CI, RM9,411 million–RM12,650 million). The per capita OOP health expenditure for Malaysia was estimated to be RM 606.92 (95% CI, RM525.22-RM688.62) (**Table 5.6**).

Wilayah Persekutuan Kuala Lumpur had the highest per capita OOP spending with RM1545.15 (95% CI, RM468.58-RM2621.72) in contrast to Kelantan with only RM173.98 (95% CI, RM125.39-RM222.58).

There was significantly more OOP spending among the Chinese compared to other ethnic groups (RM1197.32; 95% CI, RM901.12-RM1493.52), as well as in those with tertiary education as their highest education attainment (RM1242.70; 95% CI, RM1013.26-RM1472.13).

Household with household income of RM5000 and higher had higher OOP spending with RM1284.65 (95% CI, RM993.34-RM1575.96). In terms of occupation, government workers showed higher OOP spending (RM942.33; 95% CI, RM757.98-RM1126.68). Referring to the Malaysia's poverty line, the poor per capita OOP spending was RM294.82 (95% CI, RM229.45-RM360.20) compare to the RM665.93 (95% CI, RM570.25-RM761.60) for non-poor population.

#### 5.2.6.2 Inpatient Care

The total OOP health expenditure for inpatient for the whole population was estimated at 1,515 million (95% CI, RM1,106–RM1,993 million). The per capita OOP for inpatient was RM55.52 (95% CI, RM40.73-RM70.31) (**Table 5.7**).

For those who sought inpatient care the mean OOP spending was RM848.06 (95% CI, RM629.16-RM1066.96).

Urban population doubled the inpatient care's OOP spending (RM65.63; 95% CI, RM47.63-RM83.64) compare to the rural population (RM30.19; RM4.59-RM55.79). OOP spending among female population was RM79.34 (95% CI, RM53.28-RM105.47) twice than male OOP spending of RM32.76 (95% CI, RM18.99-RM46.53). Population of 75 years old and above paid more than the other age groups (RM322.26; 95% CI, RM107.16-RM537.35). Widows and divorcees on average spent RM98.62 (95% CI, RM45.76-RM151.49). The Chinese showed higher OOP expenditure compare to the other ethnics (RM106.69; 95% CI, CI RM56.60-RM156.79). Population who has tertiary education as their highest education pays more than others (RM105.97; 95% CI, RM55.14-RM156.80).

In term of occupation, retiree spent more than others for hospitalisation (RM127.51; 95% CI, RM55.35-RM199.66). On the other hand, household with household income of RM5000 or more and the fifth quintiles of

household total expenditures showed higher per capita OOP spending with RM124.31 (95% CI, RM72.69-RM175.93), and RM150.72 (95% CI, RM87.50-RM213.94) respectively. Referring to the Malaysia's poverty line, the poor population per capita OOP spending was estimated at RM17.63 (95% CI, RM4.71-RM30.55).

The breakdown of the total OOP for inpatient care is divided into two categories i.e. total paid for all admission and total paid for medication or appliances from outside the hospital upon advised by the health care provider. The total paid for all admission was RM1,465 million (95% CI, RM1,059-RM1,872 million). RM49 million (95% CI, RM24-RM73 million) were also paid for medication or appliances such as implants, intra-ocular lenses or others purchased outside the hospital upon advised by the health care provider. The inpatient care per capita OOP expenditure for total paid for all admission and total paid for medication or appliances were estimated at RM53.71 (95% CI, RM39.01-RM68.42) and RM1.81 (95% CI, RM0.91-RM2.70) respectively.

#### 5.2.6.3 Oral Health Care

Total OOP health expenditure for oral health care for the whole population was estimated at RM351 million (RM271–RM432 million) (**Table 5.8**) and the per capita OOP was estimated to be RM12.88 (RM9.94–RM15.82). The cost of oral health care is 2.1% of the total OOP health expenditure. For those who sought oral health care the mean OOP spending was RM58.44 (95% CI, RM45.44-RM71.44).

The urban population per capita oral health care expenditure was RM16.52 (95% CI, RM12.43-RM20.62). The population aged 15-19 years old had the highest OOP spending estimated at RM23.77 (95% CI, RM4.89-RM42.65). Likewise in inpatient care, the Chinese spent more than others with RM24.78 (95% CI, RM14.52-RM35.05). Population who has tertiary education as their highest education also paid more than others (RM30.12; 95% CI, RM0.18-RM19.53). Government employees had the highest oral OOP oral health care expenditure (RM17.79; 95% CI, RM14.13-RM21.46).

Similar to inpatient care, household with household income of RM5000 or more, and the fifth quintiles of household total expenditures showed higher per capita OOP oral health expenditure with RM32 (95% CI, RM20.71-RM43.28) and RM37.47 (95% CI, RM23.95-RM50.99) respectively. The poor population showed RM8.19 (95% CI, RM2.71-RM13.67) per capita OOP spending for oral health care.

In terms of the breakdown of the oral health care OOP expenditure, the total paid for all visit to dental health facilities was RM338 million (95% CI, RM260-417 million). The remaining RM13 million (95% CI, RM2-24 million) were spent on buying medication or appliances from outside the clinics upon advised from the health care providers. The oral health care per capita OOP expenditure for total paid for all visit and total paid for medication or appliances were estimated at RM12.41 (95% CI, RM9.55-RM15.26) and RM 0.48 (95% CI, RM0.07-RM0.88) respectively.

#### 5.2.6.4 Outpatient Care

The population spent RM2,847million (95% CI, RM2,216-RM3,478 million) for outpatient care via OOP payment (**Table 5.9**) or 17.2% of the total OOP spending. The per capita OOP spending for outpatient was RM104.37 (95% CI, RM81.57-RM127.17). For those who sought outpatient care the mean OOP spending was RM857.10 (95% CI, RM671.69-RM1042.50).

Likewise to inpatient and oral health care, besides the total paid (RM2,686 million; 95% CI, RM2,068-RM3,303 million) to the providers during the visit, they also spent RM162 million (95% CI, RM98-RM225 million) for medication or appliances recommended by the health care providers. Outpatient care per capita OOP expenditure for total paid for all outpatient visit and total paid for medication or appliances were estimated at RM98.45 (95% CI, RM76.11-RM120.79) and RM5.92 (95% CI, RM3.61-RM8.24) respectively.

From the total OOP outpatient care spending, the urban population per capita OOP spending was RM124.97 (95% CI, RM93.49-RM156.45) whereas the rural population per capita OOP spending was only RM52.78 (95% CI, RM40.26-RM65.29). The population aged 45-49 years old had higher spending at RM314.21 (95% CI, RM73.49-RM554.94). Similar to inpatient and oral health care, the Chinese also showed to have higher per capita OOP spending (RM176.91; 95% CI, RM98.77-RM255.05) for outpatient care.

The unpaid worker or homemaker paid more with per capita OOP spending of RM149.60 (95% CI, RM14.70-RM284.51). Whereas for household income group of RM4000-RM4999, and the fifth quintiles of the total expenditures quintiles showed higher outpatient per capita OOP spending with RM213.57 (95% CI, RM68.08-RM359.06), and RM181.51 (95% CI, RM114.21-RM248.81) respectively. The Malaysia's poor population per capita OOP spending for outpatient care was estimated at RM59.22 (95% CI, RM34.77-RM83.68).

### 5.2.6.5 Medical Appliances

The total OOP payment for health appliances was estimated at RM1,170 million (95% CI, RM987-RM1,362 million) with per capita spending of RM42.91 (95% CI, RM35.88-RM49.93) (**Table 5.10**). This is 7.1% of the total OOP spending. Expenditure for eye appliances was estimated at RM992 million (95% CI, RM920-RM1,065 million) whereas, RM178 million (95% CI, RM5-350 million) were spent for other health appliances. The per capita OOP spending for eye appliances and other health appliances were RM36.37 (95% CI, RM33.84-RM38.91) and RM6.53 (95% CI, RM0.20-RM12.86) respectively.

The urban population spent twice than the rural population with per capita OOP spending of RM50.64 (95% CI, RM40.88-RM60.40) and RM23.53 (95% CI, RM20.43-RM26.62) respectively. The Chinese was also spending more for health appliances (RM71.27; RM44.22-RM98.31). Those that highest education was tertiary education, had higher per capita OOP spending (RM105.06; 95% CI, RM65.10-RM145.03). Government employees had higher per capita OOP spending (RM73.49; 95% CI, RM62-RM84.98). On the other hand, household with income of RM5000 or more and household in the fifth quintiles of total household expenditures had higher spending with RM83.69 (RM56.08-RM111.31) and RM77.14 (95% CI, RM63.74-RM90.53) respectively. The poorest segment of the population had OOP spending estimated at RM22.53 (RM17.35-RM27.70).

### 5.2.6.6 Promotive & Preventive Care

Spending for promotive and preventive care were the largest OOP expenditure portion estimated at RM10,672 million (95% CI, RM8,672-RM12,673 million) or 64.5% of the total OOP health expenditure (**Table 5.11**). The overall per capita spending was RM391.24 (95% CI, RM319.27-RM463.21). Of these, the breakdown of spending arranged in descending order showed spending for vitamin and supplement was the largest estimated at RM202.55 (95% CI, RM 170.27-RM234.83) followed by medical check-up (RM103.44; 95% CI, RM63.62-RM143.27), family planning (RM27.98; 95% CI, RM13.63-RM42.34), vaccination (RM26.43; 95% CI, RM18.49-RM34.37), pap smear examination (RM21.71; 95% CI, RM15.65-27.78) and mammogram (RM9.12; 95% CI, RM5.53-RM12.70).

The Chinese had significantly spent more for promotive and preventive care (RM817.65; 95% CI, RM547.03-RM1088.27). Those with tertiary education as their highest education attained, paid significantly more than the other education levels (RM879.54; 95% CI, RM679.61-RM1079.47). Households in



the largest household expenditure quintiles also spent more for this (RM806.25; 95% CI, RM548.50-RM1064.01). Those who were government employees had the highest OOP spending with RM688.38 (95% CI, RM523.18 RM853.59). The OOP spending for the poor were estimated at RM187.25 (95% CI, RM132.69-RM241.81).

### 5.3 CONCLUSION

Back in NHMS 1996, the total OOP was estimated at RM3,820 million with per capita spending of RM180. This includes spending on hospitalisation, ambulatory care, oral health care and spending on health appliances. For NHMS 2011, OOP was estimated at RM 16,556 million. The per capita spending was RM 607. More than half of it was spent on promotive and preventive care. Only 9.1% was spent for inpatient care.

Between the three types of services, outpatient care per capita OOP spending was higher (RM104.37) than inpatient (RM55.52) and oral health care (RM12.88).

### 5.4 RECOMMENDATIONS

The OOP health expenditure was clearly had increased and the trend was in-line with National Health Account's estimate of OOP expenditure. Large OOP payment is common in low and middle income country and often associated with a risk of financial disruption and worse eventually impoverishment. However, the OOP health expenditure must be interpreted with cautious as it didn't clearly defined the component in the promotive and preventive spending which constituents more than half of the expenditure. This might be overestimated as some expenditure details might also include other charges not directly related to the intended care such as medical check-up package that associated with other non-health charges that comes in a package.

This finding however, gives valuable information for policymakers to tabled policies that aim for better mechanism to meet the ever-growing need of care especially those with no financial aid and living under the poverty line.



## 5.5 TABLES OF FINDINGS

**Table 5.1: Household Expenditure**

Type of Expenditure	Mean	(±SD)	Median	(IQR)	Count	Estimated Population
<b>MALAYSIA</b>	1,721.24	2168.00	1,250.00	700-2000	27,180	25,886,732
Food	563.20	494.85	5,000.00	300-700	27,621	26,336,968
Utilities	501.99	752.24	397.51	100-600	27,929	26,695,373
Educational fee	211.77	495.24	950.00	0-300	27,777	26,508,750
Healthcare cost	62.75	178.42	0.00	0-50	27,642	26,397,105
Insurance premiums	101.38	369.62	0.00	0-35	27,529	26,243,067
Others	275.88	1496.53	172.41.00	0-300	27,166	25,952,976

Note: Any case with missing value was excluded from the analysis

\*SD=standard deviation, IQR=inter quartile range

**Table 5.2: Source of payment for health**

Source of payment for health	Current income (%)	Savings (%)	Insurance Reimbursement (%)	Sold Items (%)	Family members / friends (%)	Borrowed from bank / money lender (%)	Others (%)
<b>MALAYSIA</b>	90.0	27.7	10.3	1.3	9.8	1.3	5.4
<b>State</b>							
Johor	91.6	32.1	11.0	3.6	14.8	1.2	6.0
Kedah	78.4	39.6	9.6	0.7	20.7	-	3.5
Kelantan	96.3	9.8	6.1	0.3	94.8	-	3.5
Melaka	91.7	31.1	6.2	0.8	9.5	0.2	2.9
Negeri Sembilan	96.9	22.6	8.6	1.0	6.2	0.8	5.0
Pahang	90.2	17.8	9.1	1.1	8.5	1.2	3.2
Penang	92.4	20.5	33.8	0.9	12.0	10.6	5.7
Perak	92.6	13.0	4.6	0.3	6.4	0.1	4.0
Perlis	72.1	28.8	1.0	-	8.0	-	5.8
Selangor	88.3	34.1	13.9	0.7	6.4	0.3	7.1
Terengganu	96.9	13.0	10.1	0.7	6.4	0.8	3.5
Sabah/Labuan	94.4	28.3	3.9	2.6	11.0	1.7	5.3
Sarawak	88.9	31.4	3.5	2.0	10.3	1.6	2.5
WP Kuala Lumpur	80.0	40.8	14.5	-	9.0	-	13.3
WP Putrajaya	85.3	13.6	4.4	0.4	0.9	-	9.6
<b>Location</b>							
Urban	90.2	29.6	13.0	1.2	8.7	1.5	6.3
Rural	89.5	23.0	3.4	1.6	12.5	0.7	3.4
<b>Sex</b>							
Male	90.1	27.6	10.2	1.4	9.4	1.1	5.6
Female	89.8	27.8	10.3	1.2	10.3	1.5	5.3
<b>Age Group</b>							
0-4	90.7	27.4	10.5	1.1	7.6	1.4	6.1
5-9	91.8	26.7	10.4	1.6	8.1	1.4	5.4
10-14	90.8	26.0	9.1	1.8	8.0	1.2	5.3
15-19	90.8	26.3	8.3	1.6	9.5	1.1	4.8

Source of payment for health	Current income (%)	Savings (%)	Insurance Reimbursement (%)	Sold Items (%)	Family members / friends (%)	Borrowed from bank / money lender (%)	Others (%)
<b>MALAYSIA</b>	90.0	27.7	10.3	1.3	9.8	1.3	5.4
20-24	86.7	29.9	8.9	1.4	13.0	1.0	6.3
25-29	89.3	29.1	11.6	1.1	9.1	1.7	5.9
30-34	90.8	27.3	12.9	1.5	6.6	1.5	5.6
35-39	90.4	26.7	13.7	0.9	6.2	1.5	6.5
40-44	91.2	27.8	12.7	1.2	6.1	1.2	5.2
45-49	91.4	26.8	10.1	1.3	7.5	1.4	4.9
50-54	91.7	28.5	11.9	0.8	10.7	1.3	4.6
55-59	91.0	31.5	9.5	2.1	13.4	0.6	3.2
60-64	86.6	31.1	5.6	0.5	18.2	0.7	5.1
65-69	86.6	27.2	5.6	1.2	21.4	0.8	5.4
70-74	84.7	28.4	7.7	0.9	27.0	0.4	4.2
75 and above	80.6	24.4	4.9	0.4	29.6	1.2	6.7
<b>Ethnicity</b>							
Malays	89.6	26.9	7.6	1.04	9.6	0.6	6.0
Chinese	91.5	28.5	20.0	0.85	9.1	2.8	3.2
Indians	89.9	30.4	12.2	2.27	12.0	1.4	7.8
Other Bumiputeras	91.2	28.6	3.1	1.75	11.6	1.5	4.1
Others	85.2	27.4	8.0	3.45	8.6	0.8	9.3
<b>Marital Status</b>							
Single	88.9	42.8	3.9	-	4.1	1.6	0.3
Married	90.3	28.3	9.3	1.3	11.2	1.4	5.7
Widow/Widower/Divorcee	86.6	27.8	11.3	1.2	9.2	1.1	5.4
<b>Education level</b>							
No formal education	85.6	23.3	5.0	2.0	16.9	1.0	5.2
Primary	91.0	25.9	8.4	1.8	11.7	1.2	4.5
Secondary	90.7	28.1	9.6	1.2	9.2	1.4	5.3
Tertiary	87.6	29.5	16.6	0.5	6.3	1.0	7.1
<b>Occupation</b>							
Government employee	91.2	24.6	11.4	0.5	4.6	0.8	6.6
Private employee	89.7	28.8	13.2	1.4	8.5	1.4	6.5
Self employed	93.6	27.1	7.4	1.4	9.7	1.2	2.3
Unpaid worker/home maker	89.4	27.9	9.5	1.1	12.0	1.4	4.9
Retiree	85.2	29.0	6.2	1.2	21.7	0.9	5.4
<b>Household Income</b>							
<RM400	80.9	27.5	5.3	1.5	20.7	1.1	4.0
RM400-RM499	88.3	31.5	-	3.1	12.5	0.6	4.0
RM500- RM699	88.6	25.0	1.8	2.8	16.9	0.4	3.1
RM7000- RM999	88.9	25.2	2.0	0.6	13.4	0.3	3.6
RM1000- RM1999	90.9	26.8	3.1	1.6	11.6	1.2	4.3
RM2000- RM2999	91.4	25.5	6.8	1.5	9.5	0.8	6.0
RM3000- RM3999	92.8	26.4	12.4	1.2	8.4	1.7	4.9
RM4000- RM4999	87.6	28.6	12.1	0.8	6.8	1.0	10.7
RM5000 & above	91.0	31.3	22.4	1.0	5.0	2.0	5.4

**Table 5.3: “Who would usually pay for healthcare?”**

Payer for Health Care	Government						Employer-sponsored insurance						Personal health insurance						
	Count	Estimated population	95% CI		%	Count	Estimated population	95% CI		%	Count	Estimated population	95% CI		%	Count	Estimated population	95% CI	
			Lower	Upper				Lower	Upper				Lower	Upper				Lower	Upper
<b>MALAYSIA</b>	5,226	4,080,076	15.0	14.5	15.5	1,379	1,691,679	6.2	5.8	6.6	3,547	3,854,644	14.1	13.6	14.7				
<b>State</b>																			
Johor	245	313,636	9.8	7.0	13.5	124	186,952	5.8	4.3	8.0	422	544,454	17.0	13.6	21.1				
Kedah	326	363,920	19.8	15.5	25.0	58	86,889	4.7	3.0	7.4	186	239,649	13.0	9.5	17.7				
Kelantan	1,574	241,846	16.5	12.1	22.1	6	4,874	0.3	0.1	0.8	116	87,226	94.1	90.8	96.2				
Malaka	389	187,008	23.7	17.2	31.8	56	24,625	3.1	2.1	4.6	213	113,046	14.3	9.9	20.2				
Negeri Sembilan	370	253,343	26.0	20.1	32.9	64	47,206	4.8	3.2	7.4	252	165,429	17.0	13.4	21.3				
Pahang	236	188,792	13.6	9.7	18.7	80	61,321	4.4	2.6	7.3	205	188,016	13.5	10.4	17.4				
Penang	437	367,039	24.0	14.6	36.9	210	253,692	16.6	12.3	22.1	433	519,881	34.0	26.1	43.0				
Perak	338	510,226	22.7	17.4	29.1	30	45,590	2.0	1.2	3.5	99	164,401	7.3	5.2	10.2				
Perlis	384	57,060	73.7	67.1	79.4	21	2,911	98.7	97.7	99.2	1,238	190,360	87.7	84.1	90.6				
Selangor	421	439,218	8.1	6.5	10.2	384	560,071	10.4	8.7	12.3	717	981,075	18.2	15.6	21.1				
Terengganu	277	160,983	15.9	12.6	19.9	51	32,853	3.2	1.7	6.2	147	79,235	7.8	5.8	10.5				
Sabah/Labuan	380	308,066	9.6	6.7	13.4	106	117,987	3.7	2.7	5.0	227	202,837	6.3	4.5	8.7				
Sarawak	350	378,381	16.3	11.1	23.4	90	101,431	4.4	3.0	6.4	129	190,641	8.2	5.7	11.8				
WP Kuala Lumpur	179	260,618	16.1	9.9	25.1	73	163,066	10.1	6.5	15.3	157	347,079	21.4	16.4	27.5				
WP Putrajaya	572	49,941	70.8	63.1	77.5	26	2,212	3.1	1.8	5.5	58	4,966	7.0	4.9	9.9				
<b>Location</b>																			
Urban	3,275	3,054,115	15.7	15.0	16.3	1,019	1,490,130	7.6	7.1	8.2	2,561	3,386,500	17.4	16.7	18.1				
Rural	1,951	1,025,960	13.2	12.5	13.9	360	201,550	2.6	2.3	3.0	986	468,144	6.0	5.6	6.5				
<b>Sex</b>																			
Male	2,485	2,049,007	14.7	13.3	16.2	851	1,059,703	7.6	6.8	8.5	1,806	2,061,183	14.8	13.6	16.1				
Female	2,741	2,031,069	15.2	13.8	16.8	528	631,976	4.7	4.1	5.5	1,741	1,793,461	13.5	12.3	14.7				
<b>Age group</b>																			
<1	103	68,441	17.6	13.8	22.3	13	8,583	2.2	1.1	4.2	50	4,658	12.0	8.9	16.1				
1-4	440	296,574	15.0	12.9	17.4	61	59,865	3.0	2.1	4.3	277	288,097	14.6	12.3	17.1				
5-9	561	414,005	15.9	13.8	18.4	74	76,539	2.9	2.0	4.4	389	363,600	14.0	11.9	16.4				
10-14	539	430,647	16.3	14.0	19.0	55	63,831	2.4	1.7	3.5	293	267,568	10.1	8.6	11.9				
15-19	342	333,706	12.2	10.2	14.5	41	66,665	2.4	1.6	3.6	189	226,376	8.2	6.8	9.9				
20-24	289	279,072	10.3	8.2	12.8	132	186,122	6.9	5.4	8.6	201	292,234	10.8	9.0	12.8				
25-29	387	308,419	11.8	9.8	14.2	215	342,676	13.2	10.9	15.7	304	460,497	17.7	15.1	20.6				
30-34	345	317,857	15.4	12.8	18.4	210	278,955	13.5	11.4	16.0	363	443,121	21.5	18.8	24.3				
35-39	284	241,054	13.1	10.8	15.7	164	184,804	10.0	8.3	12.0	356	395,775	21.5	18.9	24.3				
40-44	283	222,905	12.9	10.7	15.6	145	157,185	9.1	7.4	11.1	318	328,303	19.0	16.3	22.1				
45-49	367	276,382	17.6	14.8	20.8	119	129,782	8.3	6.6	10.4	305	294,326	18.7	16.1	21.7				
50-54	370	247,309	18.8	16.4	21.5	92	84,099	6.4	5.0	8.1	248	224,283	17.1	14.4	20.1				
55-59	331	214,465	20.9	17.9	24.2	42	37,012	3.6	2.4	5.3	160	131,353	12.8	10.4	15.6				

Payer for Health Care	Government						Employer-sponsored insurance						Personal health insurance						
	Count	Estimated population	95% CI		%	Count	Estimated population	95% CI		%	Count	Estimated population	95% CI		%	Count	Estimated population	95% CI	
			Lower	Upper				Lower	Upper				Lower	Upper				Lower	Upper
60-64	236	177,687	23.0	19.2	27.3	7	9,054	1.2	0.5	2.9	57	60,453	7.8	5.6	10.8				
65-69	139	102,812	20.6	16.5	25.3	7	5,755	1.2	0.5	2.9	22	20,897	4.2	2.4	7.2				
70-74	111	67,895	18.4	14.5	23.2	1	650	0.2	0.0	1.2	6	4,814	1.3	0.3	4.8				
75 and above	99	80,847	81.0	75.1	85.8	1	102	0.0	0.0	0.2	9	6,366	1.5	0.7	3.4				
<b>Ethnicity</b>																			
Malay	4,279	3,190,205	22.4	20.4	24.5	767	859,770	6.0	5.2	7.0	1,616	1437,758	10.1	9.1	11.1				
Chinese	287	309,664	4.9	3.9	6.1	267	442,383	7.0	5.6	8.7	1,378	1907,864	30.1	27.2	33.2				
Indian	252	203,995	11.1	8.4	14.6	125	124,175	6.8	5.3	8.7	381	330,383	18.0	14.9	21.6				
Other Bumiputeras	363	356,313	10.8	8.3	14.0	99	111,566	3.4	2.4	4.7	116	133,200	4.0	2.9	5.6				
Others	45	19,898	1.3	0.6	2.5	121	153,786	9.9	6.6	14.5	56	45,439	2.9	1.9	4.5				
<b>Marital Status</b>																			
Single	977	842,045	10.6	9.3	12.2	379	548,432	6.9	5.9	8.1	735	955,208	12.1	10.7	13.6				
Married	2,563	2,019,094	17.3	15.7	19.0	792	939,082	8.0	7.2	9.0	1,829	1,964,520	16.8	15.5	18.3				
Widow/Widower/Divorcee	247	170,563	15.9	13.4	18.8	24	19,760	1.8	1.2	2.9	74	67,901	6.3	4.9	8.2				
<b>Education level</b>																			
Primary	1,212	854,667	11.9	10.7	13.4	168	197,089	2.8	2.2	3.5	698	674,230	9.4	8.3	10.7				
Secondary	1,699	1,448,222	14.9	13.2	16.8	588	727,096	7.5	6.7	8.4	1,239	1,405,894	14.5	13.2	15.9				
Tertiary	1,179	946,612	22.2	19.8	24.9	454	603,361	14.2	12.5	16.1	964	1,133,701	26.6	24.3	29.1				
No formal education	123	68,274	5.6	4.3	7.2	15	17,710	1.5	0.7	3.0	26	19,140	1.6	1.0	2.5				
Unclassified	262	242,371	14.9	11.7	18.8	54	50,559	3.1	2.1	4.5	145	140,369	8.6	6.6	11.3				
<b>Occupation</b>																			
Government employee	1,577	1,266,843	69.95	66.36	73.31	156	164,709	9.09	7.4	11.1	520	448,633	24.77	22.08	27.68				
Private employee	264	212,323	3.03	2.45	3.74	905	1,173,766	16.76	15.2	18.5	945	1,278,803	18.26	16.41	20.27				
Self employed	261	178,125	5.3	4.4	6.3	37	48,067	1.4	1.0	2.1	489	523,106	15.6	13.6	17.8				
Unpaid worker/home maker	483	370,204	13.4	11.6	15.5	34	31,631	1.1	0.7	1.8	264	258,442	9.4	7.9	11.1				
Retiree	495	362,617	27.3	24.2	30.6	3	4,181	0.3	0.1	1.0	61	53,698	4.0	2.9	5.5				
<b>Household Income Group (RM)</b>																			
Less than RM400	224	181,035	9.0	6.9	11.5	35	41,380	2.1	1.1	3.7	142	147,921	7.3	5.4	9.8				
RM400 – RM499	32	25,526	6.1	2.4	14.6	4	4,934	1.2	0.4	3.6	11	7,805	1.9	0.8	4.5				
RM500 – RM699	78	64,028	6.8	4.7	9.6	10	13,733	1.5	0.6	3.3	26	30,269	3.2	1.8	5.8				
RM700 – RM999	173	128,559	7.8	6.0	10.0	43	42,295	2.6	1.6	4.0	40	47,506	2.9	1.7	4.7				
RM1000 – RM1999	802	598,019	11.7	10.1	13.6	151	175,526	3.4	2.6	4.6	319	288,354	5.7	4.7	6.8				
RM2000 – RM2999	880	711,951	15.5	13.0	18.4	190	221,772	4.8	3.9	5.9	444	476,282	10.4	8.8	12.2				
RM3000 – RM3999	854	665,922	18.1	15.5	20.9	230	296,979	8.1	6.6	9.8	527	556,688	15.1	12.7	17.8				
RM4000 – RM4999	605	492,735	18.5	15.3	22.3	188	233,437	8.8	7.0	11.0	448	519,011	19.5	16.7	22.7				
RM5000 and above	1,578	1,212,302	19.5	16.9	22.5	528	661,622	10.7	9.2	12.3	1,590	1,780,808	28.7	26.1	31.4				

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

Table 5.4: “Who would usually pay for healthcare?” (cont’)

	Employer/Panel Clinic				Self/ Family/ household member				Other							
	Count	Estimated population	95% CI		Count	Estimated population	95% CI		Count	Estimated population	95% CI					
			Lower	Upper			Lower	Upper			Lower	Upper				
<b>Malaysia</b>	3,571	4,004,369	14.7	14.1	15.2	24,866	23,627,848	86.6	86.1	87.1	62	71,811	0.3	0.2	0.3	
<b>State</b>																
Johor	347	540,283	16.9	13.7	20.6	2,203	2,791,724	87.3	83.6	90.2	4	4,828	0.2	0.1	0.4	
Kedah	129	182,896	10.0	7.5	13.1	1,551	1,660,036	90.4	87.0	92.9	2	3,521	0.2	0.0	0.7	
Kelantan	61	51,238	3.5	1.9	6.4	1,637	1,269,285	86.5	81.0	90.6	1	979	0.1	0.0	0.5	
Melaka	238	137,225	17.4	12.1	24.4	1,392	676,847	85.8	82.1	88.8	-	-	-	-	-	
Negeri Sembilan	221	149,285	15.3	12.0	19.3	1,366	880,831	90.3	87.1	92.7	3	1,894	0.2	0.0	1.0	
Pahang	162	128,255	9.2	6.4	13.2	1,477	1,249,898	90.1	86.6	92.7	3	2,890	0.2	0.1	0.8	
Penang	419	403,916	26.4	19.4	35.0	1,477	1,246,036	81.6	76.9	85.5	2	2,499	0.2	0.0	1.1	
Perak	176	240,529	10.7	7.8	14.6	1,362	1,902,795	84.8	81.6	87.5	5	7,467	0.3	0.1	1.1	
Perlis	82	13,018	6.0	4.4	8.1	1,345	204,945	94.4	92.6	95.8	1	211	0.1	0.0	0.7	
Selangor	942	1,348,821	25.0	22.0	28.3	3,418	4,498,095	83.3	80.5	85.8	19	27,930	0.5	0.3	0.9	
Terengganu	130	83,937	91.7	86.7	94.9	1,585	858,622	84.8	78.8	89.4	5	1,631	0.2	0.0	0.5	
Sabah/Labuan	220	268,889	8.4	6.6	10.5	2,977	2,976,973	92.5	90.4	94.2	13	13,446	0.4	0.2	0.8	
Sarawak	147	159,992	6.9	4.0	11.8	1,662	1,965,573	84.8	79.6	89.0	2	2,567	0.1	0.0	0.8	
WP Kuala Lumpur	141	282,599	17.4	13.6	22.0	777	1,391,721	85.9	82.6	88.6	2	1,947	0.1	0.0	0.5	
WP Putrajaya	156	13,487	19.1	14.5	24.8	637	54,467	77.2	73.2	80.8	-	-	-	-	-	
<b>Location</b>																
Urban	2,549	3,404,989	17.5	16.8	18.2	14,098	16,714,025	85.7	85.1	86.4	33	48,873	0.3	0.2	0.4	
Rural	1,022	599,381	7.7	7.1	8.4	10,768	6,913,824	88.8	88.1	89.6	29	22,938	0.3	0.2	0.4	
<b>Sex</b>																
Male	1,927	2,266,124	16.2	14.9	17.7	11,816	11,906,247	85.3	83.9	86.5	38	44,269	0.3	0.2	0.5	
Female	1,644	1,738,246	13.1	11.9	14.3	13,050	11,721,601	88.0	87.0	88.9	24	27,542	0.2	0.1	0.3	
<b>Age group</b>																
<1	57	44,651	11.5	8.6	15.2	429	343,869	88.6	84.7	91.7	1	1,351	0.3	0.0	2.4	
1-4	270	246,437	12.5	10.5	14.7	1,991	1,717,273	86.8	84.7	88.7	4	4,443	0.2	0.1	0.9	
5-9	274	253,474	9.8	8.1	11.7	2,577	2,292,510	88.3	86.3	90.0	1	786	0.0	0.0	0.2	
10-14	217	217,944	8.3	6.8	10.0	2,601	2,341,880	88.7	86.9	90.3	2	3,047	0.1	0.0	0.5	
15-19	176	228,196	8.3	6.6	10.3	2,223	2,478,907	90.3	88.4	91.9	8	10,673	0.4	0.2	0.9	
20-24	378	502,003	18.5	15.7	21.6	1,820	2,318,170	85.5	82.6	87.9	6	10,467	0.4	0.2	0.9	
25-29	502	666,568	25.6	22.6	28.8	1,748	2,181,810	83.7	81.3	85.9	4	5,959	0.2	0.1	0.7	
30-34	427	515,033	24.9	22.2	27.8	1,559	1,704,096	82.5	80.0	84.8	6	7,235	0.4	0.1	0.8	
35-39	399	481,562	26.1	23.1	29.4	1,518	1,526,307	82.7	80.1	85.1	4	6,261	0.3	0.1	0.9	
40-44	313	336,254	19.5	17.1	22.2	1,599	1,482,319	85.9	83.5	88.1	3	2,527	0.1	0.0	0.5	
45-49	237	239,614	15.3	13.1	17.7	1,575	1,364,535	86.9	84.4	89.0	2	1,169	0.1	0.0	0.3	
50-54	206	168,670	12.8	10.9	15.1	1,454	1,129,957	86.0	83.7	88.1	4	4,337	0.3	0.1	1.0	
55-59	77	64,100	6.2	4.7	8.3	1,282	892,957	86.9	84.5	89.0	8	5,778	0.6	0.3	1.2	
60-64	20	22,724	2.9	1.8	4.8	898	694,793	89.9	87.2	92.2	1	979	0.1	0.0	0.9	

Payer for Health Care	Employer/Panel Clinic					Self/Family/household member					Other					
	Count	Estimated population	95% CI		%	Count	Estimated population	95% CI		%	Count	Estimated population	95% CI		%	
			Lower	Upper				Lower	Upper				Lower	Upper		
65-69	14	13,688	2.7	1.4	5.4	597	441,912	88.6	84.9	91.4	2	1,160	0.2	0.1	1.0	
70-74	3	2,554	0.7	0.2	2.5	489	334,972	91.0	87.3	93.7	5	5,218	1.4	0.3	5.9	
75 and above	1	898	0.2	0.0	1.5	506	381,580	89.6	85.1	92.9	1	422	0.1	0.0	0.7	
<b>Ethnicity</b>																
Malay	2,237	2,302,394	16.2	14.6	17.9	14,639	12,159,572	85.3	84.0	86.6	30	36,146	0.3	0.2	0.4	
Chinese	500	759,256	12.0	10.4	13.8	4,445	5,643,395	89.1	87.6	90.5	6	11,206	0.2	0.1	0.5	
Indian	368	352,069	19.2	16.3	22.4	1,838	1,582,073	86.2	83.6	88.5	9	7,514	0.4	0.2	0.9	
Other Bumiputeras	197	235,440	7.1	5.4	9.4	2,667	2,999,604	90.9	88.5	92.8	12	12,923	0.4	0.2	0.8	
Others	269	355,210	22.8	16.4	30.8	1,277	1,243,204	79.8	71.5	86.2	5	4,021	0.3	0.1	0.8	
<b>Marital Status</b>																
Single	975	1,247,373	15.8	14.2	17.5	6,106	6,878,847	87.0	85.6	88.2	27	36,658	0.5	0.3	0.7	
Married	1,781	2,008,401	17.2	15.9	18.6	10,825	9,968,986	85.4	84.1	86.6	23	25,200	0.2	0.1	0.4	
Widow/Widower/Divorcee	70	62,673	5.8	4.5	7.6	1,334	971,981	90.6	88.4	92.5	6	3,373	0.3	0.1	0.7	
<b>Education level</b>																
Primary	586	602,388	8.4	7.3	9.7	7,254	6,433,793	89.9	88.6	91.0	15	16,286	0.2	0.1	0.4	
Secondary	1,407	1,642,913	16.9	15.5	18.4	8,234	8,356,976	86.1	84.8	87.3	13	17,751	0.2	0.1	0.3	
Tertiary	969	1,166,732	27.4	25.1	29.9	3,155	3,464,392	81.4	79.3	83.3	8	14,180	0.3	0.1	0.8	
No formal education	51	65,959	5.4	3.6	8.2	1,416	1,089,641	89.4	86.2	91.9	13	8,903	0.7	0.3	1.5	
Unclassified	134	140,415	8.6	6.4	11.5	1,443	1,385,911	85.2	82.2	87.7	8	8,897	0.5	0.2	1.3	
<b>Occupation</b>																
Government employee	311	305,024	16.84	14.15	19.93	1,684	1,395,186	77.0	74.2	79.7	1	1,916	0.11	0.01	0.75	
Private employee	1,998	2,456,165	35.08	32.85	37.38	4,788	5,708,837	81.5	79.4	83.5	8	11,496	0.16	0.07	0.37	
Self employed	97	101,373	3.0	2.3	4.0	3,408	3,105,355	92.5	91.0	93.7	7	8,511	0.25	0.11	0.57	
Unpaid worker/home maker	158	150,225	5.4	4.3	6.9	2,971	2,534,681	91.9	90.3	93.2	7	5,717	0.21	0.09	0.49	
Retiree	18	12,706	1.0	1.0	1.8	1,523	1,166,738	87.7	85.3	89.7	6	3,141	0.24	0.09	0.61	
<b>Household Income Group (RM)</b>																
Less than RM400	112	117,261	5.8	4.0	8.3	1,957	1,817,802	90.2	88.0	91.9	11	11,333	0.6	0.2	1.4	
RM400 – RM499	12	14,006	3.4	1.5	7.5	410	379,861	91.3	85.9	94.8	4	4,120	1.0	0.3	3.5	
RM500 – RM699	34	33,541	3.6	2.2	5.6	1,044	851,341	90.4	87.8	92.5	2	2,428	0.3	0.0	1.8	
RM700 – RM999	113	132,688	8.0	6.0	10.6	1,652	1,444,695	87.3	83.7	90.2	7	8,587	0.5	0.2	1.2	
RM1000 – RM1999	485	472,592	9.3	7.7	11.2	5,304	4,556,762	89.4	87.8	90.8	13	15,264	0.3	0.1	0.6	
RM2000 – RM2999	599	632,923	13.8	12.0	15.8	4,234	4,036,816	87.9	86.2	89.4	7	8,403	0.2	0.1	0.4	
RM3000 – RM3999	575	678,008	18.4	16.1	21.0	3,188	3,138,615	85.1	83.1	86.9	7	7,700	0.2	0.1	0.5	
RM4000 – RM4999	444	540,760	20.3	16.7	24.5	2,101	2,220,464	83.5	79.2	87.0	4	4,435	0.2	0.1	0.5	
RM5000 and above	1,197	1,382,590	22.3	20.0	24.7	4,976	5,181,493	83.4	81.4	85.2	7	9,540	0.2	0.1	0.4	

Note: Some cells have respondent count < 30. Results should be interpreted with caution.

Table 5.5: Financial coverage for healthcare

Financial coverage	Government Guarantee Letter (GL)				Employer-sponsored insurance				Private personal health insurance							
	Count	Estimated population	95% CI		Count	Estimated population	95% CI		Count	Estimated population	95% CI					
			Lower	Upper			Lower	Upper			Lower	Upper				
<b>MALAYSIA</b>	6,457	5,246,189	19.2	17.6	20.9	3,485	4,098,788	15	14	16.1	5,442	5,964,688	21.9	20.5	23.3	
<b>State</b>																
Johor	331	429,317	13.4	10.1	17.6	340	507,559	15.9	13.3	18.9	627	840,324	26.3	22.5	30.4	
Kedah	370	410,253	22.3	17.2	28.5	135	200,243	10.9	8	14.8	250	325,049	17.7	13.7	22.6	
Kelantan	375	280,768	19.1	14.1	25.5	40	32,955	2.2	1.5	3.4	149	114,040	7.8	5.3	11.2	
Melaka	473	231,605	29.4	22.2	37.8	244	133,534	16.9	12.4	22.7	377	189,372	24	18.3	30.8	
Negeri Sembilan	391	273,417	28	21.8	35.2	208	149,197	15.3	11.4	20.2	398	268,846	27.6	22.6	33.1	
Pahang	343	280,186	20.2	15	26.6	139	111,737	8.1	5.4	11.9	242	218,524	15.7	12.1	20.2	
Penang	459	386,196	25.3	15.5	38.5	383	387,242	25.4	19.1	32.8	449	533,277	34.9	26.9	43.9	
Perak	492	731,358	32.6	25.4	40.7	209	289,502	12.9	10	16.5	261	411,173	18.3	15.1	22	
Perlis	457	68,112	31.4	25.4	38.1	66	10,377	4.8	3.6	6.4	271	38,525	17.7	14	22.2	
Selangor	665	713,244	13.2	10.8	16.1	943	1,358,089	25.2	22.3	28.2	1,226	1,703,333	31.6	28.1	35.2	
Terengganu	343	197,168	19.5	16	23.5	115	72,556	7.2	4.3	11.7	175	93,262	9.2	7.1	11.9	
Sabah/Labuan	516	433,715	13.5	10.1	17.8	216	250,180	7.8	6	10	381	334,776	10.4	7.8	13.8	
Sarawak	402	441,261	19	13.2	26.6	169	203,479	8.8	6.4	12	211	300,521	13	9.2	18	
WP Kuala Lumpur	212	313,848	19.4	11.8	30.2	188	383,977	23.7	18.3	30.1	266	579,375	35.8	28.3	44	
WP Putrajaya	628	55,740	79	69.8	86	90	8,159	11.6	8.3	15.9	159	14,294	20.3	16.2	25.1	
<b>Location</b>																
Urban	4,010	3,878,297	19.9	17.8	22.1	2,502	3,529,342	18.1	16.7	19.5	3,922	5,179,574	26.6	24.8	28.4	
Rural	2,447	1,367,892	17.6	15.6	19.7	983	569,446	7.3	6.3	8.5	1,520	785,114	10.1	8.9	11.4	
<b>Sex</b>																
Male	3,077	2,624,861	18.8	17.2	20.6	1,956	2,380,181	17.1	15.8	18.3	2,756	3,184,680	22.8	21.3	24.4	
Female	3,380	2,621,328	19.7	18	21.5	1,529	1,718,607	12.9	11.8	14.1	2,686	2,780,008	20.9	19.5	22.4	
<b>Age Group</b>																
0-4	685	490,116	20.7	18.1	23.6	245	223,974	9.5	7.9	11.3	464	469,680	19.9	17.5	22.5	
5-9	749	590,753	22.7	20	25.8	229	219,419	8.4	7	10.2	518	483,692	18.6	16.4	21.1	
10-14	721	603,484	22.9	20	26	196	199,942	7.6	6.2	9.3	461	426,228	16.1	14.2	18.4	
15-19	466	476,842	17.4	14.9	20.1	164	217,827	7.9	6.4	9.8	314	386,043	14.1	12.1	16.2	
20-24	343	346,808	12.8	10.5	15.5	390	561,991	20.7	18	23.7	342	521,552	19.2	16.7	22.1	
25-29	469	405,059	15.5	13.2	18.2	506	724,023	27.8	24.8	30.9	509	727,357	27.9	25	31	
30-34	434	404,817	19.6	16.8	22.7	421	537,435	26	23.3	28.9	555	665,256	32.2	29.2	35.4	
35-39	357	307,130	16.7	14.2	19.5	396	459,614	24.9	22.1	28	541	639,495	34.7	31.6	37.9	
40-44	346	279,178	16.2	13.6	19.1	337	374,188	21.7	19.3	24.3	490	514,959	29.9	26.8	33.1	
45-49	424	329,038	21	17.9	24.3	261	278,225	17.7	15.3	20.5	460	440,396	28	25.2	31.1	
50-54	454	313,584	23.9	21	27	202	183,606	14	11.9	16.4	365	325,352	24.8	21.7	28.1	
55-59	372	239,968	23.4	1.7	20.1	88	72,409	7	5.4	9.2	241	193,824	18.9	15.9	22.2	
60-64	249	184,111	23.8	20	28.2	21	21,896	2.8	1.7	4.7	98	101,836	13.2	10.4	16.6	
65-69	164	118,372	23.7	19.5	28.5	20	18,970	3.8	2.2	6.4	40	37,139	7.4	4.8	11.4	
70-74	111	68,523	18.6	14.6	23.4	6	3,187	0.9	0.3	2.5	20	13,498	3.7	2	6.7	
75 and above	113	88,407	20.8	16.3	26.1	3	2,084	0.5	0.1	1.8	24	18,380	4.3	2.5	7.4	

Financial coverage	Government Guarantee Letter (GL)					Employer-sponsored insurance					Private personal health insurance				
	Count	Estimated population	%	Lower	Upper	Count	Estimated population	%	Lower	Upper	Count	Estimated population	%	Lower	Upper
<b>MALAYSIA</b>	6,457	5,246,189	19.2	17.6	20.9	3,485	4,098,788	15	14	16.1	5,442	5,964,688	21.9	20.5	23.3
<b>Ethnicity</b>															
Malay	5,249	4,068,781	28.5	26.3	30.9	2,106	2,257,268	15.8	14.3	17.5	2,469	2,229,518	15.6	14.4	16.9
Chinese	351	410,473	6.5	5.2	8	602	997,627	15.8	13.8	18	2,050	2,824,079	44.6	41.6	47.7
Indian	309	251,467	13.7	10.4	17.8	363	360,631	19.7	16.8	22.8	612	580,841	31.7	27.9	35.7
Other Bumiputeras	474	480,910	14.6	11.5	18.3	201	227,659	6.9	5.4	8.7	211	235,039	7.1	5.4	9.3
Others	74	34,559	2.2	1.1	4.3	213	255,604	16.4	12.1	21.8	100	95,211	6.1	4.2	8.8
<b>Marital Status</b>								0	0	0					
Single	1,247	1,143,974	14.5	12.8	16.3	974	1,339,067	16.9	15.4	18.6	1,210	1,582,898	20	18.2	21.9
Married	3,049	2,448,456	21	19.2	22.9	1,847	2,133,335	18.3	17	19.6	2,811	3,048,062	26.1	24.4	27.8
Widow/Widower/Divorcee	267	183,754	17.1	14.6	20	59	52,228	4.9	3.6	6.5	145	118,275	11	9.2	13.2
<b>Education level</b>															
No formal education	206	138,372	10	7.9	12.6	47	53,618	3.9	2.5	6.1	91	79,092	5.7	4.4	7.5
Primary	1,570	1,184,342	16.4	14.7	18.2	558	590,007	8.2	7.1	9.3	1,121	1,101,514	15.2	13.8	16.8
Secondary	2,032	1,793,197	18.5	16.6	20.5	1,433	1,717,332	17.7	16.4	19.1	1,928	2,209,940	22.8	21.2	24.5
Tertiary	1,447	1,194,421	28	25.5	30.8	1,023	1,338,643	31.4	28.9	34.1	1,504	1,783,552	41.9	39.2	44.7
Unclassified	321	291,580	20	15.8	25	114	108,631	7.5	5.5	10.1	173	167,784	11.5	9	14.6
<b>Occupation</b>															
Government	1,834	1,495,472	82.6	79.4	85.3	323	347,725	19.2	16.6	22.1	820	709,020	39.1	36.1	42.3
Private	431	396,278	5.7	4.8	6.7	2,062	2,603,535	37.2	35.1	39.4	1,492	2,050,927	29.3	27	31.7
Self-employed	320	234,895	7	5.9	8.2	113	145,006	4.3	3.4	5.5	743	802,623	23.9	21.4	26.6
Unpaid worker	572	430,486	15.6	13.7	17.8	140	133,208	4.8	3.9	6	433	428,606	15.5	13.7	17.6
Retiree	506	374,055	28.1	24.9	31.6	19	16,161	1.2	0.7	2.3	112	87,147	6.6	5.2	8.3
<b>Income Group</b>															
Less than RM400	291	233,798	11.6	9.2	14.6	110	125,780	6.2	4.4	8.8	230	243,370	12.1	9.5	15.2
RM400-RM499	39	33,933	8.2	3.8	16.8	13	16,054	3.9	2	7.5	22	17,873	4.3	2.3	7.9
RM500 – RM699	97	78,293	8.3	5.9	11.5	37	35,702	3.8	2.5	5.8	47	55,846	5.9	3.8	9
RM700 – RM999	196	150,058	9.1	7.2	11.4	110	111,366	6.7	5	9.1	81	82,268	5	3.4	7.1
RM1000 – RM1999	954	723,253	14.2	12.4	16.3	435	442,452	8.7	7.3	10.3	471	428,374	8.4	7.2	9.8
RM2000 – RM2999	1,050	884,404	19.3	16.4	22.4	554	620,595	13.5	11.9	15.3	683	746,635	16.3	14.3	18.4
RM3000 – RM3999	1,050	860,617	23.3	20.3	26.6	581	693,288	18.8	16.6	21.2	795	881,430	23.9	21	27.1
RM4000 – RM4999	769	649,416	24.4	20.5	28.7	448	558,700	21	18.1	24.3	691	772,689	29.1	25.8	32.5
RM5000 and above	2,011	1,632,417	26.3	23	29.9	1,197	1,494,851	24.1	21.9	26.4	2,422	2,736,203	44	41.2	46.9

Note: Some cells have respondent count < 30. Results should be interpreted with caution.



Table 5.6: Total Out-of-Pocket Health Expenditure by Sociodemographic for All Respondents

Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>MALAYSIA</b>	28,498	27,278,956	16,556,116,374.00	606.92	0.00	0.00	132,198.00	525.22	688.62	0.00	200.00
<b>State</b>											
Johor	2,469	3,198,775	1,871,442,101.00	585.05	0.00	0.00	72,800.00	454.53	715.57	0.00	260.00
Kedah	1,700	1,836,622	758,785,271.40	413.14	0.00	0.00	52,170.00	262.31	563.97	0.00	150.00
Kelantan	1,896	1,467,639	255,343,575.80	173.98	0.00	0.00	16,200.00	125.39	222.58	0.00	0.00
Melaka	1,600	788,972	438,297,514.60	555.53	0.00	0.00	31,975.00	340.08	770.98	0.00	200.00
Negeri Sembilan	1,529	975,602	398,837,766.20	408.81	0.00	0.00	26,240.00	307.06	510.56	0.00	140.00
Pahang	1,641	1,387,621	433,979,987.60	312.75	0.00	0.00	13,820.00	239.37	386.13	0.00	52.00
Pulau Pinang	1,788	1,527,315	1,332,467,340.00	872.42	0.00	0.00	80,600.00	621.04	1,123.81	0.00	300.00
Perak	1,599	2,243,870	1,598,015,603.00	712.17	0.00	0.00	58,080.00	421.64	1,002.70	0.00	200.00
Perlis	1,424	217,069	65,661,186.50	302.49	0.00	0.00	35,350.00	224.17	380.81	0.00	50.00
Selangor	4,101	5,398,672	3,889,887,725.00	720.53	0.00	0.00	65,000.00	597.17	843.88	0.00	300.00
Terengganu	1,846	1,012,044	338,654,589.90	334.62	0.00	0.00	132,198.00	138.20	531.05	0.00	26.00
Sabah & Labuan	3,208	3,217,431	1,617,007,241.00	502.58	0.00	0.00	100,026.00	352.24	652.91	0.00	100.00
Sarawak	1,962	2,316,783	994,407,051.80	429.22	0.00	0.00	34,310.00	277.94	580.49	0.00	86.00
WP Kuala Lumpur	911	1,620,013	2,503,169,125.00	1,545.15	0.00	0.00	117,500.00	468.58	2,621.72	0.00	620.00
WP Putrajaya	824	70,529	60,160,296.53	852.98	0.00	0.00	78,000.00	589.68	1,116.29	0.00	600.00
<b>State</b>											
Peninsular Malaysia	23,328	21,744,743	13,944,702,081.30	641.29	0.00	0.00	132,198.00	542.64	739.94	0.00	220.00
Sabah	3,208	3,217,431	1,617,007,240.70	502.58	0.00	0.00	100,026.00	352.24	652.91	0.00	100.00
Sarawak	1,962	2,316,783	994,407,051.80	429.22	0.00	0.00	34,310.00	277.94	580.49	0.00	86.00
<b>Location</b>											
Urban	16,372	19,496,298	14,245,079,857.10	730.66	0.00	0.00	132,198.00	842.90	618.41	0.00	260.00
Rural	12,126	7,782,659	2,311,036,516.70	296.95	0.00	0.00	100,026.00	248.18	345.71	0.00	38.00
<b>Sex</b>											
Male	13,757	13,959,955	5,509,475,092.00	394.66	0.00	0.00	117,500.00	304.09	485.23	0.00	60.00
Female	14,741	13,319,001	11,046,641,281.90	829.39	0.00	0.00	132,198.00	722.94	935.84	0.00	364.00
<b>Age group</b>											
0-4	2,772	2,366,121	1,122,931,216.60	474.59	0.00	0.00	16,900.00	409.69	539.49	0.00	416.00
5-9	2,904	2,596,837	1,085,719,953.20	418.09	0.00	0.00	52,170.00	281.06	555.13	0.00	286.00
10-14	2,926	2,639,932	586,881,818.90	222.31	0.00	0.00	18,200.00	170.31	274.30	0.00	26.00
15-19	2,450	2,746,005	445,017,346.90	162.06	0.00	0.00	18,200.00	120.19	203.93	0.00	5.00
20-24	2,108	2,712,661	1,021,459,572.80	376.55	0.00	0.00	100,026.00	267.92	485.18	0.00	90.00
25-29	2,101	2,605,575	1,718,756,901.70	659.65	0.00	0.00	35,022.00	432.68	886.62	0.00	200.00

Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>MALAYSIA</b>	28,498	27,278,956	16,556,116,374.00	606.92	0.00	0.00	132,198.00	525.22	688.62	0.00	200.00
30-34	1,885	2,065,596	1,891,044,112.90	915.50	0.00	0.00	80,600.00	657.15	1,173.84	0.00	260.00
35-39	1,799	1,844,496	1,845,136,054.80	1,000.35	0.00	0.00	132,198.00	749.11	1,251.58	0.00	312.00
40-44	1,844	1,725,055	1,714,795,343.00	994.05	0.00	0.00	58,080.00	701.45	1,286.65	0.00	300.00
45-49	1,801	1,570,079	1,556,197,023.60	991.16	0.00	0.00	63,620.00	683.97	1,298.34	0.00	380.00
50-54	1,681	1,313,353	1,070,324,864.70	814.96	0.00	0.00	53,080.00	612.14	1,017.77	0.00	300.00
55-59	1,463	1,027,597	723,193,682.70	703.77	0.00	0.00	35,350.00	539.49	868.05	0.00	300.00
60-64	997	772,562	851,281,671.40	1,101.89	0.00	0.00	117,500.00	61.72	2,142.06	0.00	240.00
65-69	673	499,048	272,280,058.00	545.60	0.00	0.00	65,000.00	367.83	723.37	0.00	200.00
70-74	538	368,196	182,516,555.30	495.70	0.00	0.00	51,200.00	271.31	720.10	0.00	100.00
75 and above	556	425,843	468,580,197.20	1,100.36	0.00	0.00	44,200.00	617.19	1,583.53	0.00	255.00
<b>Marital Status</b>											
Single	6,983	7,908,495	2,664,056,275.60	336.86	0.00	0.00	100,026.00	253.01	420.71	0.00	31.00
Married	12,537	11,676,560	10,461,744,174.50	895.96	0.00	0.00	132,198.00	753.97	1,037.96	0.00	300.00
Widow/Widower/Divorcee	1,470	1,072,354	722,311,951.40	673.58	0.00	0.00	65,000.00	471.66	875.49	0.00	250.00
<b>Ethnicity</b>											
Malay	16,975	14,253,318	6,202,094,460.40	435.13	0.00	0.00	132,198.00	383.85	486.42	0.00	160.00
Chinese	4,944	6,332,970	7,582,581,200.90	1,197.32	0.00	0.00	117,500.00	901.12	1,493.52	0.00	480.00
Indian	2,122	1,834,300	1,180,632,090.90	643.64	0.00	0.00	80,600.00	395.53	891.76	0.00	240.00
Other Bumiputeras	2,933	3,300,636	1,072,631,190.60	324.98	0.00	0.00	54,000.00	207.19	442.76	0.00	30.00
Others	1,524	1,557,733	518,177,431.10	332.65	0.00	0.00	21,866.00	236.90	132,198.00	0.00	26.00
<b>Education</b>											
No formal education	1,559	1,218,847	413,496,777.90	339.25	0.00	0.00	44,200.00	231.45	447.06	0.00	26.00
Primary	8,065	7,159,469	2,826,444,340.90	394.78	0.00	0.00	63,620.00	317.72	471.85	0.00	80.00
Secondary	9,485	9,704,547	6,085,218,484.80	627.05	0.00	0.00	117,500.00	500.36	753.74	0.00	160.00
Tertiary	3,873	4,255,316	5,288,069,683.00	1,242.70	0.00	0.00	132,198.00	1,013.26	1,472.13	0.00	600.00
Unclassified	1,675	1,627,575	400,863,200.40	246.29	0.00	0.00	21,050.00	182.54	310.05	0.00	26.00
<b>Occupation</b>											
Government employee/Semi	2,148	1,811,075	1,706,623,307.60	942.33	0.00	0.00	47,710.00	757.97	1,126.68	0.00	450.00
Private Employee	5,843	7,001,658	4,977,424,201.70	710.89	0.00	0.00	72,800.00	559.15	862.63	0.00	208.00
Self Employed	3,686	3,358,458	2,570,371,221.90	765.34	0.00	0.00	132,198.00	498.60	1,032.09	0.00	100.00
Unpaid worker/home maker	3,224	2,758,938	2,432,098,481.80	881.53	0.00	0.00	78,000.00	658.03	1,105.04	0.00	312.00
Retiree	1,738	1,330,270	934,501,569.20	702.49	0.00	0.00	65,000.00	530.64	874.34	0.00	200.00

Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>MALAYSIA</b>	28,498	27,278,956	16,556,116,374.00	606.92	0.00	0.00	132,198.00	525.22	688.62	0.00	200.00
<b>Household income group</b>											
Less than RM400	2,166	2,016,214	710,898,850.40	352.59	0.00	0.00	57,500.00	255.15	450.03	0.00	58.00
RM400-RM499	448	415,901	154,092,747.00	370.50	0.00	0.00	44,200.00	61.96	679.05	0.00	26.00
RM500- RM699	1,141	941,916	189,373,063.20	201.05	0.00	0.00	14,480.00	107.07	295.04	0.00	0.00
RM700- RM999	1,865	1,655,090	352,808,906.90	213.17	0.00	0.00	16,895.00	124.88	301.46	0.00	26.00
RM1000- RM1999	5,927	5,096,306	1,268,765,499.10	248.96	0.00	0.00	24,028.00	209.05	288.87	0.00	40.00
RM2000- RM2999	4,797	4,593,572	1,830,971,701.70	398.59	0.00	0.00	78,000.00	322.54	474.65	0.00	130.00
RM3000- RM3999	3,704	3,688,019	2,090,148,328.80	566.74	0.00	0.00	65,000.00	420.21	713.27	0.00	200.00
RM4000- RM4999	2,484	2,659,738	1,978,581,236.90	743.90	0.00	0.00	63,620.00	557.47	930.33	0.00	300.00
RM5000 & above	5,966	6,212,201	7,980,476,039.80	1,284.65	0.00	0.00	132,198.00	993.34	1,575.96	0.00	650.00
<b>Household Income Quintiles</b>											
Q1 (lowest)	6,336	5,610,825	1,565,859,015.20	279.08	0.00	0.00	57,500.00	224.61	333.54	0.00	26.00
Q2	5,068	4,369,713	1,088,712,440.50	249.15	0.00	0.00	24,028.00	208.67	289.63	0.00	45.00
Q3	5,779	5,630,419	2,640,274,033.10	468.93	0.00	0.00	78,000.00	348.73	589.13	0.00	150.00
Q4	5,730	5,837,958	3,877,862,314.00	664.25	0.00	0.00	80,600.00	547.20	781.30	0.00	260.00
Q5 (highest)	5,585	5,830,042	7,383,408,571.00	1,266.44	0.00	0.00	132,198.00	965.80	1,567.08	0.00	650.00
<b>Malaysia Poverty Line*</b>											
Poor	4,742	4,337,545	1,278,812,083.50	294.82	0.00	0.00	57,500.00	229.45	360.20	0.00	26.00
Non-poor	23,756	22,941,412	15,277,304,290.40	665.93	0.00	0.00	132,198.00	570.25	761.60	0.00	250.00
<b>Highest education of the head of household</b>											
No formal education	545	399,241	169,661,245.70	424.96	0.00	0.00	44,200.00	171.34	678.58	0.00	50.00
Primary education	2,099	1,752,378	607,526,300.60	346.69	0.00	0.00	51,200.00	264.82	428.56	0.00	52.00
Secondary education	3,105	3,137,065	2,121,197,826.90	676.17	0.00	0.00	117,500.00	381.93	970.42	0.00	130.00
Tertiary education	1,518	1,624,204	1,771,130,469.30	1,090.46	0.00	0.00	53,820.00	729.36	1,451.56	0.00	500.00
Unclassified	86	91,910	23,695,920.50	257.82	0.00	0.00	7,950.00	-13.59	529.23	0.00	0.00
<b>Total Expenditures Quintiles</b>											
Q1 (lowest)	5,669	5,101,158	932,664,162.90	182.83	0.00	0.00	25,040.00	147.69	217.98	0.00	26.00
Q2	5,620	4,822,026	1,605,003,491.70	332.85	0.00	0.00	24,200.00	264.42	401.27	0.00	52.00
Q3	5,616	5,201,695	2,406,936,998.90	462.72	0.00	0.00	132,198.00	362.76	562.68	0.00	150.00
Q4	5,703	5,697,863	3,851,514,581.10	675.96	0.00	0.00	65,000.00	542.29	809.63	0.00	300.00
Q5 (highest)	5,567	6,125,546	7,554,770,041.80	1,233.32	0.00	0.00	117,500.00	952.38	1,514.26	0.00	620.00

\* Poverty line for Poor Household income : Peninsular Malaysia - RM763 and below per month; Sabah - Household income RM1048 and below per month; Sarawak - Household income RM912 and below per month

Table 5.7: Total Out-of-Pocket Health Expenditure for Inpatient Care by Sociodemographic for All Respondents

Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>MALAYSIA</b>	28,498	27,278,956	1,514,503,540.20	55.52	0.00	0.00	1,000,000.00	40.73	70.31	0.00	0.00
<b>State</b>											
Johor	2,469	3,198,775	192,376,773.60	60.14	0.00	0.00	390,000.00	16.37	103.92	0.00	0.00
Kedah	1,700	1,836,622	74,496,762.10	40.56	0.00	0.00	110,000.00	6.99	74.14	0.00	0.00
Kelantan	1,896	1,467,639	14,256,615.80	9.71	0.00	0.00	139,000.00	2.22	17.21	0.00	0.00
Malaka	1,600	788,972	56,883,155.90	72.10	0.00	0.00	300,000.00	5.31	138.89	0.00	0.00
Negeri Sembilan	1,529	975,602	52,147,598.60	53.45	0.00	0.00	100,000.00	27.42	79.48	0.00	0.00
Pahang	1,641	1,387,621	55,664,445.80	40.12	0.00	0.00	68,000.00	10.12	70.11	0.00	0.00
Pulau Pinang	1,788	1,527,315	139,300,212.10	91.21	0.00	0.00	150,000.00	41.87	140.55	0.00	0.00
Perak	1,599	2,243,870	163,683,270.40	72.95	0.00	0.00	160,000.00	21.04	124.85	0.00	0.00
Perlis	1,424	217,069	4,195,972.20	19.33	0.00	0.00	98,000.00	1.05	37.61	0.00	0.00
Selangor	4,101	5,398,672	407,054,267.20	75.40	0.00	0.00	508,000.00	39.41	111.39	0.00	0.00
Terengganu	1,846	1,012,044	12,363,449.30	12.22	0.00	0.00	160,000.00	3.57	20.86	0.00	0.00
Sabah & Labuan	3,208	3,217,431	135,621,987.70	42.15	0.00	0.00	1,000,000.00	-18.31	102.62	0.00	0.00
Sarawak	1,962	2,316,783	33,519,509.20	14.47	0.00	0.00	80,000.00	2.74	26.19	0.00	0.00
WP Kuala Lumpur	911	1,620,013	170,607,679.10	105.31	0.00	0.00	300,000.00	-13.24	223.86	0.00	0.00
WP Putrajaya	824	70,529	2,331,841.30	33.06	0.00	0.00	50,300.00	2.62	63.50	0.00	0.00
<b>State</b>											
Peninsular Malaysia	23,328	21,744,743	1,345,362,043.30	61.87	0.00	0.00	508,000.00	45.67	78.07	0.00	0.00
Sabah	3,208	3,217,431	135,621,987.70	42.15	0.00	0.00	1,000,000.00	-18.31	102.62	0.00	0.00
Sarawak	1,962	2,316,783	33,519,509.20	14.47	0.00	0.00	80,000.00	2.74	26.19	0.00	0.00
<b>Location</b>											
Urban	16,372	19,496,298	1,279,567,946.30	65.63	0.00	0.00	508,000.00	47.63	83.64	0.00	0.00
Rural	12,126	7,782,659	234,935,594.00	30.19	0.00	0.00	1,000,000.00	4.59	55.79	0.00	0.00
<b>Sex</b>											
Male	13,757	13,959,955	457,315,941.60	32.76	0.00	0.00	508,000.00	18.99	46.52	0.00	0.00
Female	14,741	13,319,001	1,057,187,598.60	79.37	0.00	0.00	1,000,000.00	53.28	105.47	0.00	0.00
<b>Age group</b>											
0-4	2,772	2,366,121	123,489,018.90	52.19	0.00	0.00	150,000.00	23.41	80.97	0.00	0.00
5-9	2,904	2,596,837	12,710,113.00	4.89	0.00	0.00	93,000.00	0.23	9.56	0.00	0.00
10-14	2,926	2,639,932	18,853,754.50	7.14	0.00	0.00	65,000.00	-1.19	15.48	0.00	0.00
15-19	2,450	2,746,005	57,876,908.90	21.08	0.00	0.00	110,000.00	3.78	38.37	0.00	0.00

Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>MALAYSIA</b>	28,498	27,278,956	1,514,503,540.20	55.52	0.00	0.00	1,000,000.00	40.73	70.31	0.00	0.00
20-24	2,108	2,712,661	183,515,662.50	67.65	0.00	0.00	1,000,000.00	-11.44	146.74	0.00	0.00
25-29	2,101	2,605,575	200,388,104.10	76.91	0.00	0.00	200,000.00	33.60	120.22	0.00	0.00
30-34	1,885	2,065,596	163,228,189.30	79.02	0.00	0.00	220,000.00	35.63	122.41	0.00	0.00
35-39	1,799	1,844,496	125,811,936.40	68.21	0.00	0.00	300,000.00	25.06	111.36	0.00	0.00
40-44	1,844	1,725,055	135,989,673.40	78.83	0.00	0.00	390,000.00	14.31	143.36	0.00	0.00
45-49	1,801	1,570,079	163,070,188.20	103.86	0.00	0.00	300,000.00	-15.93	223.65	0.00	0.00
50-54	1,681	1,313,353	38,192,077.60	29.08	0.00	0.00	60,000.00	9.44	48.72	0.00	0.00
55-59	1,463	1,027,597	33,059,060.40	32.17	0.00	0.00	160,000.00	10.45	53.89	0.00	0.00
60-64	997	772,562	31,284,167.60	40.49	0.00	0.00	90,000.00	2.69	78.30	0.00	0.00
65-69	673	499,048	37,535,537.20	75.21	0.00	0.00	70,000.00	21.64	128.79	0.00	0.00
70-74	538	368,196	52,267,863.60	141.96	0.00	0.00	508,000.00	-24.48	308.39	0.00	0.00
75 and above	556	425,843	137,231,284.80	322.26	0.00	0.00	160,000.00	107.16	537.35	0.00	0.00
<b>Marital status</b>											
Single	6,983	7,908,495	235,944,171.80	29.83	0.00	0.00	1,000,000.00	2.37	57.30	0.00	0.00
Married	12,537	11,676,560	1,017,798,235.20	87.17	0.00	0.00	508,000.00	59.11	115.22	0.00	0.00
Widow/Widower/Divorcee	1,470	1,072,354	105,757,843.60	98.62	0.00	0.00	151,000.00	45.76	151.49	0.00	0.00
<b>Ethnicity</b>											
Malays	16,975	14,253,318	620,615,163.40	43.54	0.00	0.00	508,000.00	27.45	59.64	0.00	0.00
Chinese	4,944	6,332,970	675,679,909.10	106.69	0.00	0.00	1,000,000.00	56.60	156.79	0.00	0.00
Indians	2,122	1,834,300	149,780,013.20	81.66	0.00	0.00	200,000.00	30.31	1,330.00	0.00	0.00
Other Bumiputeras	2,933	3,300,636	35,357,131.20	10.71	0.00	0.00	50,000.00	4.60	16.82	0.00	0.00
Others	1,524	1,557,733	33,071,323.30	21.23	0.00	0.00	98,000.00	4.38	38.08	0.00	0.00
<b>Education</b>											
No formal education	1,559	1,218,847	61,832,876.80	50.73	0.00	0.00	151,000.00	11.43	90.03	0.00	0.00
Primary	8,065	7,159,469	245,002,826.50	34.22	0.00	0.00	508,000.00	18.50	49.94	0.00	0.00
Secondary	9,485	9,704,547	613,674,805.40	63.24	0.00	0.00	1,000,000.00	35.27	91.20	0.00	0.00
Tertiary	3,873	4,255,316	450,946,515.60	105.97	0.00	0.00	300,000.00	55.14	156.80	0.00	0.00
Unclassified	1,675	1,627,575	10,338,215.20	6.35	0.00	0.00	50,000.00	-0.88	13.59	0.00	0.00
<b>Occupation</b>											
Government employee/Semi	2,148	1,811,075	87,359,719.00	48.24	0.00	0.00	100,000.00	19.94	76.53	0.00	0.00
Private employee	5,843	7,001,658	597,046,122.20	85.27	0.00	0.00	390,000.00	44.95	125.60	0.00	0.00
Self-employed	3,686	3,358,458	90,259,538.70	26.88	0.00	0.00	180,000.00	13.54	40.21	0.00	0.00
Unpaid worker/ home maker	3,224	2,758,938	214,702,347.10	77.82	0.00	0.00	300,000.00	45.45	110.19	0.00	0.00
Retiree	1,738	1,330,270	169,617,410.70	127.51	0.00	0.00	508,000.00	55.35	199.66	0.00	0.00

Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>MALAYSIA</b>	28,498	27,278,956	1,514,503,540.20	55.52	0.00	0.00	1,000,000.00	40.73	70.31	0.00	0.00
<b>Household income group</b>											
Less than RM400	2,166	2,016,214	55,018,571.70	27.29	0.00	0.00	160,000.00	0.74	53.84	0.00	0.00
RM 400 - 499	448	415,901	4,647,180.90	11.17	0.00	0.00	49,560.00	-0.45	22.80	0.00	0.00
RM 500 - 699	1,141	941,916	9,695,500.30	10.29	0.00	0.00	33,000.00	-4.73	25.32	0.00	0.00
RM 700 - 999	1,865	1,655,090	28,022,555.30	16.93	0.00	0.00	100,000.00	1.64	32.22	0.00	0.00
RM 1000 - 1999	5,927	5,096,306	191,613,577.50	37.60	0.00	0.00	200,000.00	15.02	60.18	0.00	0.00
RM 2000 - 2999	4,797	4,593,572	132,079,775.50	28.75	0.00	0.00	508,000.00	11.80	45.70	0.00	0.00
RM 3000 - 3999	3,704	3,688,019	156,644,342.80	42.47	0.00	0.00	220,000.00	15.81	69.14	0.00	0.00
RM 4000 - 4999	2,484	2,659,738	164,519,999.60	61.86	0.00	0.00	390,000.00	16.29	107.42	0.00	0.00
RM 5000 and above	5,966	6,212,201	772,262,036.50	124.31	0.00	0.00	1,000,000.00	72.69	175.93	0.00	0.00
<b>Household Income Quintiles</b>											
Q1 (lowest)	6,336	5,610,825	153,367,702.60	27.33	0.00	0.00	200,000.00	8.49	46.18	0.00	0.00
Q2	5,068	4,369,713	135,151,693.90	30.93	0.00	0.00	153,500.00	13.48	48.38	0.00	0.00
Q3	5,779	5,630,419	174,753,989.10	31.04	0.00	0.00	508,000.00	16.05	46.02	0.00	0.00
Q4	5,730	5,837,958	315,305,692.90	54.01	0.00	0.00	390,000.00	27.46	80.56	0.00	0.00
Q5 (highest)	5,585	5,830,042	736,027,843.40	126.25	0.00	0.00	1,000,000.00	71.51	180.99	0.00	0.00
<b>Malaysia Poverty Line*</b>											
Poor	4,742	4,337,545	76,480,201.90	17.63	0.00	0.00	160,000.00	4.71	30.55	0.00	0.00
Non-poor	23,756	22,941,412	1,438,023,338.30	62.68	0.00	0.00	1,000,000.00	45.24	80.13	0.00	0.00
<b>Highest education of the head of household</b>											
No formal education	545	399,241	21,146,436.10	52.97	0.00	0.00	151,000.00	-39.09	145.03	0.00	300,000.00
Primary education	2,099	1,752,378	124,006,820.30	70.76	0.00	0.00	508,000.00	20.44	121.09	0.00	300,000.00
Secondary education	3,105	3,137,065	138,980,346.00	44.30	0.00	0.00	200,000.00	11.28	77.32	0.00	300,000.00
Tertiary education	1,518	1,624,204	172,659,907.30	106.30	0.00	0.00	300,000.00	-6.93	219.53	0.00	300,000.00
Unclassified	86	91,910	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
<b>Total Expenditures Quintiles</b>											
Q1 (lowest)	6,092	5,457,328	59,047,862.30	10.82	0.00	0.00	70,000.00	5.65	15.99	0.00	0.00
Q2	6,413	5,606,701	187,488,736.10	33.44	0.00	0.00	200,000.00	12.17	54.71	0.00	0.00
Q3	5,779	5,237,628	201,358,520.00	38.44	0.00	0.00	220,000.00	17.52	59.37	0.00	0.00
Q4	5,032	5,261,943	254,069,149.70	48.28	0.00	0.00	508,000.00	28.21	68.36	0.00	0.00
Q5 (highest)	4,859	5,384,689	811,601,587.80	150.72	0.00	0.00	1,000,000.00	87.50	213.94	0.00	0.00

\* Poverty line for Poor Household income : Peninsular Malaysia - RM763 and below per month; Sabah - Household income RM1048 and below per month; Sarawak - Household income RM912 and below per month

Table 5.8: Total Out-of-Pocket Health Expenditure for Oral Health Care by Sociodemographic for All Respondents

Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>MALAYSIA</b>	28,498	27,278,957	351,397,521.30	12.88	0.00	0.00	100,000.00	9.94	15.82	0.00	0.00
<b>State</b>											
Johor	2,469	3,198,775	25,373,978.60	7.93	0.00	0.00	7,000.00	6.01	9.85	0.00	0.00
Kedah	1,700	1,836,622	6,847,024.40	3.73	0.00	0.00	5,000.00	1.35	6.11	0.00	0.00
Kelantan	1,896	1,467,639	6,811,877.40	4.64	0.00	0.00	50,000.00	0.05	9.23	0.00	0.00
Melaka	1,600	788,972	6,025,215.90	7.64	0.00	0.00	30,000.00	4.56	10.71	0.00	0.00
Negeri Sembilan	1,529	975,603	8,223,734.10	8.43	0.00	0.00	17,000.00	3.25	13.61	0.00	0.00
Pahang	1,641	1,387,621	5,140,885.60	3.70	0.00	0.00	9,500.00	1.97	5.44	0.00	0.00
Pulau Pinang	1,788	1,527,315	26,102,650.90	17.09	0.00	0.00	40,000.00	7.44	26.74	0.00	0.00
Perak	1,599	2,243,870	24,157,781.50	10.77	0.00	0.00	30,000.00	5.78	15.75	0.00	0.00
Perlis	1,424	217,069	770,009.60	3.55	0.00	0.00	6,200.00	1.75	5.34	0.00	0.00
Selangor	4,101	5,398,672	138,245,292.40	25.61	0.00	0.00	100,000.00	16.73	34.49	0.00	0.00
Terengganu	1,846	1,012,044	3,811,567.60	3.77	0.00	0.00	6,000.00	1.76	5.77	0.00	0.00
Sabah & Labuan	3,208	3,217,431	25,817,747.10	8.02	0.00	0.00	25,000.00	4.64	11.41	0.00	0.00
Sarawak	1,962	2,316,783	9,692,712.60	4.18	0.00	0.00	8,000.00	2.35	6.02	0.00	0.00
WP Kuala Lumpur	911	1,620,013	62,172,941.50	38.38	0.00	0.00	60,000.00	2.38	74.37	0.00	0.00
WP Putrajaya	824	70,529	2,204,102.30	31.25	0.00	0.00	50,000.00	10.43	52.07	0.00	0.00
<b>State</b>											
Peninsular Malaysia	23,328	21,744,743	315,887,061.70	14.53	0.00	0.00	100,000.00	10.88	18.18	0.00	0.00
Sabah	3,208	3,217,431	25,817,747.10	8.02	0.00	0.00	25,000.00	4.64	11.41	0.00	0.00
Sarawak	1,962	2,316,783	9,692,712.60	4.18	0.00	0.00	8,000.00	2.35	6.02	0.00	0.00
<b>Location</b>											
Urban	16,372	19,496,298	322,167,990.60	16.52	0.00	0.00	100,000.00	12.43	20.62	0.00	0.00
Rural	12,126	7,782,659	29,229,530.80	3.76	0.00	0.00	40,000.00	2.82	4.69	0.00	0.00
<b>Sex</b>											
Male	13,757	13,959,955	145,192,766.90	10.40	0.00	0.00	100,000.00	7.62	13.18	0.00	0.00
Female	14,741	13,319,002	206,204,754.50	15.48	0.00	0.00	80,500.00	10.82	20.14	0.00	0.00
<b>Age group</b>											
0-4	2,772	2,366,121	968,254.70	0.41	0.00	0.00	2,000.00	0.18	0.64	0.00	0.00
5-9	2,904	2,596,837	10,769,555.60	4.15	0.00	0.00	5,550.00	2.40	5.89	0.00	0.00
10-14	2,926	2,639,932	27,439,083.10	10.39	0.00	0.00	60,000.00	0.06	20.73	0.00	0.00
15-19	2,450	2,746,005	65,275,092.70	23.77	0.00	0.00	60,000.00	4.89	42.65	0.00	0.00

Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>MALAYSIA</b>	28,498	27,278,957	351,397,521.30	12.88	0.00	0.00	100,000.00	9.94	15.82	0.00	0.00
20-24	2,108	2,712,661	21,835,977.50	8.05	0.00	0.00	30,000.00	5.58	10.52	0.00	0.00
25-29	2,101	2,605,575	38,681,346.70	14.85	0.00	0.00	50,000.00	10.29	19.40	0.00	0.00
30-34	1,885	2,065,596	27,742,299.30	13.43	0.00	0.00	35,000.00	7.27	19.59	0.00	0.00
35-39	1,799	1,844,496	35,501,025.40	19.25	0.00	0.00	26,000.00	12.43	26.06	0.00	0.00
40-44	1,844	1,725,055	29,962,473.40	17.37	0.00	0.00	25,000.00	12.59	22.14	0.00	0.00
45-49	1,801	1,570,079	35,363,630.80	22.52	0.00	0.00	80,500.00	12.79	32.26	0.00	0.00
50-54	1,681	1,313,353	25,929,262.60	19.74	0.00	0.00	100,000.00	3.07	36.42	0.00	0.00
55-59	1,463	1,027,597	9,808,120.60	9.54	0.00	0.00	20,000.00	4.80	14.29	0.00	0.00
60-64	997	772,562	8,433,153.40	10.92	0.00	0.00	11,000.00	4.51	17.32	0.00	0.00
65-69	673	499,048	8,373,440.60	16.78	0.00	0.00	9,000.00	6.06	27.50	0.00	0.00
70-74	538	368,197	3,137,311.50	8.52	0.00	0.00	8,500.00	-0.55	17.59	0.00	0.00
75 and above	556	425,843	2,177,493.60	5.11	0.00	0.00	4,000.00	0.80	9.42	0.00	0.00
<b>Marital status</b>											
Single	6,983	7,908,495	136,440,772.30	17.25	0.00	0.00	60,000.00	9.67	24.83	0.00	0.00
Married	12,537	11,676,560	191,596,690.10	16.41	0.00	0.00	100,000.00	13.16	19.65	0.00	0.00
Widow/Widower/Divorcee	1,470	1,072,354	7,598,185.20	7.09	0.00	0.00	7,000.00	2.70	11.48	0.00	0.00
<b>Ethnicity</b>											
Malays	16,975	14,253,318	152,153,832.70	10.67	0.00	0.00	100,000.00	7.60	13.75	0.00	0.00
Chinese	4,944	6,332,970	156,959,711.10	24.78	0.00	0.00	60,000.00	14.52	35.05	0.00	0.00
Indians	2,122	1,834,300	17,252,410.80	9.41	0.00	0.00	40,000.00	5.29	13.52	0.00	0.00
Other Bumiputeras	2,933	3,300,636	15,998,840.30	4.85	0.00	0.00	6,200.00	2.20	7.49	0.00	0.00
Others	1,524	1,557,733	9,032,726.50	5.80	0.00	0.00	80,500.00	-0.70	12.30	0.00	0.00
<b>Education</b>											
No formal education	1,559	1,218,847	3,125,959.70	2.56	0.00	0.00	7,000.00	0.99	4.14	0.00	0.00
Primary	8,065	7,159,469	65,015,598.30	9.08	0.00	0.00	60,000.00	4.53	13.64	0.00	0.00
Secondary	9,485	9,704,547	134,945,718.10	13.91	0.00	0.00	60,000.00	8.63	19.18	0.00	0.00
Tertiary	3,873	4,255,316	128,173,102.80	30.12	0.00	0.00	100,000.00	0.18	19.53	0.00	0.00
Unclassified	1,675	1,627,575	16,038,705.10	9.85	0.00	0.00	80,500.00	0.18	19.53	0.00	0.00
<b>Occupation</b>											
Government employee/Semi	2,148	1,811,075	32,225,908.20	17.79	0.00	0.00	50,000.00	14.13	21.46	0.00	0.00
Private employee	5,843	7,001,658	117,810,863.00	16.83	0.00	0.00	100,000.00	12.19	21.46	0.00	0.00
Self-employed	3,686	3,358,458	36,707,036.10	10.93	0.00	0.00	50,000.00	7.52	14.34	0.00	0.00
Unpaid worker/ home maker	3,224	2,758,939	28,030,489.70	10.16	0.00	0.00	80,500.00	5.84	14.48	0.00	0.00
Retiree	1,738	1,330,270	18,381,598.40	13.82	0.00	0.00	24,000.00	7.72	19.92	0.00	0.00



Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>MALAYSIA</b>	28,498	27,278,957	351,397,521.30	12.88	0.00	0.00	100,000.00	9.94	15.82	0.00	0.00
<b>Household income group</b>											
Less than RM400	2,166	2,016,214	22,542,506.30	11.18	0.00	0.00	60,000.00	2.86	19.51	0.00	0.00
RM 400 - 499	448	415,901	1,744,603.30	4.19	0.00	0.00	7,000.00	-0.69	9.08	0.00	0.00
RM 500 - 699	1,141	941,916	10,715,506.20	11.38	0.00	0.00	50,000.00	-6.28	29.03	0.00	0.00
RM 700 - 999	1,865	1,655,090	3,008,101.60	1.82	0.00	0.00	4,500.00	0.43	3.20	0.00	0.00
RM 1000 - 1999	5,927	5,096,306	21,922,265.40	4.30	0.00	0.00	30,000.00	3.10	5.50	0.00	0.00
RM 2000 - 2999	4,797	4,593,572	23,241,027.70	5.06	0.00	0.00	11,000.00	3.74	6.38	0.00	0.00
RM 3000 - 3999	3,704	3,688,019	39,371,333.30	10.68	0.00	0.00	50,000.00	6.93	14.42	0.00	0.00
RM 4000 - 4999	2,484	2,659,738	30,085,818.00	11.31	0.00	0.00	35,000.00	6.42	16.20	0.00	0.00
RM 5000 and above	5,966	6,212,201	198,766,359.60	32.00	0.00	0.00	100,000.00	20.71	43.28	0.00	0.00
<b>Household Income Quintiles</b>											
Q1 (lowest)	6,336	5,610,825	41,595,585.30	7.41	0.00	0.00	60,000.00	3.10	11.72	0.00	0.00
Q2	5,068	4,369,713	18,136,854.90	4.15	0.00	0.00	30,000.00	3.18	5.12	0.00	0.00
Q3	5,779	5,630,419	30,390,201.90	5.40	0.00	0.00	11,000.00	4.18	6.61	0.00	0.00
Q4	5,779	5,630,419	67,762,180.30	11.61	0.00	0.00	50,000.00	8.33	14.88	0.00	0.00
Q5 (highest)	5,730	5,837,958	193,512,698.90	33.19	0.00	0.00	100,000.00	21.20	45.18	0.00	0.00
<b>Malaysia Poverty Line*</b>											
Poor	4,742	4,337,545	35,538,025.40	8.19	0.00	0.00	60,000.00	2.71	13.67	0.00	0.00
Non-poor	23,756	22,941,412	315,859,495.90	13.77	0.00	0.00	100,000.00	10.43	17.10	0.00	0.00
<b>Highest education of the head of household</b>											
No formal education	545	399,241	380,619.20	0.95	0.00	0.00	1,200.00	0.25	1.66	0.00	0.00
Primary education	2,099	1,752,378	11,664,012.40	6.66	0.00	0.00	17,500.00	2.41	10.90	0.00	0.00
Secondary education	3,105	3,137,065	33,079,538.90	10.54	0.00	0.00	20,000.00	7.94	13.15	0.00	0.00
Tertiary education	1,518	1,624,205	55,882,728.90	34.41	0.00	0.00	100,000.00	19.86	48.95	0.00	0.00
Unclassified	86	91,910	776,472.90	8.45	0.00	0.00	2,400.00	1.25	15.65	0.00	0.00
<b>Total Expenditures Quintiles</b>											
Q1 (lowest)	6,092	5,457,328	14,253,541.90	2.61	0.00	0.00	9,500.00	1.87	3.36	0.00	0.00
Q2	6,413	5,606,701	35,327,757.60	6.30	0.00	0.00	20,000.00	4.48	8.12	0.00	0.00
Q3	5,779	5,237,628	36,841,441.50	7.03	0.00	0.00	30,000.00	5.62	8.45	0.00	0.00
Q4	5,032	5,261,943	61,455,552.20	11.68	0.00	0.00	50,000.00	8.33	15.03	0.00	0.00
Q5 (highest)	4,859	5,384,689	201,768,384.90	37.47	0.00	0.00	100,000.00	23.95	50.99	0.00	0.00

\* Poverty line for Poor Household income : Peninsular Malaysia - RM763 and below per month; Sabah - Household income RM1048 and below per month; Sarawak - Household income RM912 and below per month

Table 5.9: Total Out-of-Pocket Health Expenditure for Outpatient Care by Sociodemographic for All Respondents

Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>MALAYSIA</b>	28,498	27,278,956	2,847,116,786.40	104.37	0.00	0.00	728,000.00	81.57	127.17	0.00	0.00
<b>State</b>											
Johor	2,469	3,198,775	531,100,854.00	166.03	0.00	0.00	728,000.00	76.38	255.69	0.00	0.00
Kedah	1,700	1,836,622	138,114,321.40	75.20	0.00	0.00	390,000.00	15.84	134.56	0.00	0.00
Kelantan	1,896	1,467,639	32,211,221.00	21.95	0.00	0.00	156,000.00	2.77	41.12	0.00	0.00
Melaka	1,600	788,972	94,405,758.20	119.66	0.00	0.00	156,000.00	39.48	199.83	0.00	0.00
Negeri Sembilan	1,529	975,602	75,325,789.70	77.21	0.00	0.00	71,760.00	46.40	108.02	0.00	0.00
Pahang	1,641	1,387,621	52,120,367.70	37.56	0.00	0.00	52,000.00	18.66	56.46	0.00	0.00
Pulau Pinang	1,788	1,527,315	221,592,763.20	145.09	0.00	0.00	260,000.00	33.06	257.11	0.00	0.00
Perak	1,599	2,243,870	290,264,856.70	129.36	0.00	0.00	442,000.00	66.30	192.41	0.00	0.00
Perlis	1,424	217,069	6,852,492.50	31.57	0.00	0.00	130,000.00	17.36	45.78	0.00	0.00
Selangor	4,101	5,398,672	472,177,069.40	87.46	0.00	0.00	260,000.00	62.69	112.24	0.00	0.00
Terengganu	1,846	1,012,044	24,147,072.70	23.86	0.00	0.00	104,000.00	12.85	34.87	0.00	0.00
Sabah & Labuan	3,208	3,217,431	392,477,029.50	121.98	0.00	0.00	520,000.00	25.78	218.19	0.00	0.00
Sarawak	1,962	2,316,783	95,424,895.40	41.19	0.00	0.00	226,200.00	23.28	59.10	0.00	0.00
WP Kuala Lumpur	911	1,620,013	411,735,842.00	254.16	0.00	0.00	570,700.00	41.05	467.27	0.00	0.00
WP Putrajaya	824	70,529	9,166,453.00	129.97	0.00	0.00	104,000.00	89.47	170.46	0.00	0.00
<b>State</b>											
Peninsular Malaysia	23,328	21,744,743	2,359,214,861.50	108.50	0.00	0.00	728,000.00	83.83	133.16	0.00	0.00
Sabah	3,208	3,217,431	392,477,029.50	121.98	0.00	0.00	520,000.00	25.78	218.19	0.00	0.00
Sarawak	1,962	2,316,783	95,424,895.40	41.19	0.00	0.00	226,200.00	23.28	59.10	0.00	0.00
<b>Location</b>											
Urban	16,372	19,496,298	2,436,387,095.00	124.97	0.00	0.00	728,000.00	93.49	156.45	0.00	0.00
Rural	12,126	7,782,659	410,729,691.30	52.77	0.00	0.00	520,000.00	40.26	65.29	0.00	0.00
<b>Sex</b>											
Male	13,757	13,959,955	1,408,647,189.30	100.91	0.00	0.00	728,000.00	67.88	133.93	0.00	0.00
Female	14,741	13,319,001	1,438,469,597.10	1,080.00	0.00	0.00	570,700.00	76.97	139.03	0.00	0.00
<b>Age group</b>											
0-4	2,772	2,366,121	330,864,836.80	139.83	0.00	0.00	78,000.00	109.17	170.50	0.00	0.00
5-9	2,904	2,596,837	160,898,853.30	61.96	0.00	0.00	67,600.00	48.41	75.51	0.00	0.00
10-14	2,926	2,639,932	83,472,108.30	31.62	0.00	0.00	98,800.00	17.70	45.54	0.00	0.00
15-19	2,450	2,746,005	78,079,005.50	28.43	0.00	0.00	52,000.00	17.50	39.37	0.00	0.00

Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>MALAYSIA</b>	28,498	27,278,956	2,847,116,786.40	104.37	0.00	0.00	728,000.00	81.57	127.17	0.00	0.00
20-24	2,108	2,712,661	179,510,065.50	66.17	0.00	0.00	104,000.00	40.60	91.75	0.00	0.00
25-29	2,101	2,605,575	252,798,987.60	97.02	0.00	0.00	260,000.00	36.27	157.77	0.00	0.00
30-34	1,885	2,065,596	325,283,015.80	157.48	0.00	0.00	728,000.00	22.63	292.33	0.00	0.00
35-39	1,799	1,844,496	179,817,109.40	97.49	0.00	0.00	234,000.00	44.39	150.59	0.00	0.00
40-44	1,844	1,725,055	299,437,647.20	173.58	0.00	0.00	520,000.00	-70.00	354.16	0.00	0.00
45-49	1,801	1,570,079	493,339,335.80	314.21	0.00	0.00	570,700.00	73.49	554.94	0.00	0.00
50-54	1,681	1,313,353	106,490,270.20	81.08	0.00	0.00	260,000.00	22.80	139.37	0.00	0.00
55-59	1,463	1,027,597	101,316,037.80	98.60	0.00	0.00	260,000.00	35.80	161.39	0.00	0.00
60-64	997	772,562	44,093,522.50	57.07	0.00	0.00	46,800.00	28.36	85.78	0.00	0.00
65-69	673	499,048	42,259,358.20	84.68	0.00	0.00	226,200.00	14.42	154.94	0.00	0.00
70-74	538	368,196	40,519,815.70	110.05	0.00	0.00	74,100.00	25.88	194.22	0.00	0.00
75 and above	556	425,843	128,936,816.70	302.78	0.00	0.00	442,000.00	34.97	570.59	0.00	0.00
<b>Marital status</b>											
Single	6,983	7,908,495	411,214,037.80	520.00	0.00	0.00	260,000.00	31.15	72.84	0.00	0.00
Married	12,537	11,676,560	1,771,066,562.30	151.68	0.00	0.00	728,000.00	101.63	201.73	0.00	0.00
Widow/Widower/Divorcee	1,470	1,072,354	112,457,441.70	104.87	0.00	0.00	442,000.00	27.04	182.70	0.00	0.00
<b>Ethnicity</b>											
Malays	16,975	14,253,318	984,349,721.00	69.06	0.00	0.00	390,000.00	56.51	81.62	0.00	0.00
Chinese	4,944	6,332,970	1,120,379,398.90	176.91	0.00	0.00	728,000.00	98.77	255.05	0.00	0.00
Indians	2,122	1,834,300	244,540,884.60	133.32	0.00	0.00	130,000.00	88.03	178.60	0.00	0.00
Other Bumiputeras	2,933	3,300,636	342,694,887.90	103.83	0.00	0.00	520,000.00	9.53	198.12	0.00	0.00
Others	1,524	1,557,733	155,151,894.00	99.60	0.00	0.00	156,000.00	41.46	157.74	0.00	0.00
<b>Education</b>											
No formal education	1,559	1,218,847	106,202,566.10	87.13	0.00	0.00	442,000.00	16.70	157.57	0.00	0.00
Primary	8,065	7,159,469	590,622,581.60	82.50	0.00	0.00	570,700.00	31.46	133.53	0.00	0.00
Secondary	9,485	9,704,547	1,175,170,765.70	121.09	0.00	0.00	728,000.00	73.67	168.52	0.00	0.00
Tertiary	3,873	4,255,316	519,073,616.30	121.98	0.00	0.00	390,000.00	84.84	159.12	0.00	0.00
Unclassified	1,675	1,627,575	48,640,934.00	29.89	0.00	0.00	26,000.00	17.55	42.22	0.00	0.00
<b>Occupation</b>											
Government employee/Semi	2,148	1,811,075	207,222,247.60	114.42	0.00	0.00	390,000.00	55.21	173.62	0.00	0.00
Private employee	5,843	7,001,658	950,595,549.90	135.77	0.00	0.00	728,000.00	74.50	197.04	0.00	0.00
Self-employed	3,686	3,358,458	319,587,067.80	95.16	0.00	0.00	260,000.00	44.36	145.96	0.00	0.00
Unpaid worker/ home maker	3,224	2,758,938	412,750,582.30	149.60	0.00	0.00	570,700.00	14.70	284.51	0.00	0.00
Retiree	1,738	1,330,270	183,845,275.00	138.20	0.00	0.00	442,000.00	60.92	215.48	0.00	0.00

Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>MALAYSIA</b>	28,498	27,278,956	2,847,116,786.40	104.37	0.00	0.00	728,000.00	81.57	127.17	0.00	0.00
<b>Household income group</b>											
Less than RM400	2,166	2,016,214	112,583,719.90	55.84	0.00	0.00	104,000.00	35.54	76.14	0.00	0.00
RM 400 - 499	448	415,901	64,852,071.90	155.93	0.00	0.00	442,000.00	-51.71	363.57	0.00	0.00
RM 500 - 699	1,141	941,916	28,021,960.50	29.75	0.00	0.00	36,400.00	11.15	48.35	0.00	0.00
RM 700 - 999	1,865	1,655,090	86,460,389.60	52.24	0.00	0.00	68,900.00	29.79	74.69	0.00	0.00
RM 1000 - 1999	5,927	5,096,306	259,304,887.00	50.88	0.00	0.00	156,000.00	34.76	670.00	0.00	0.00
RM 2000 - 2999	4,797	4,593,572	352,644,344.30	76.77	0.00	0.00	520,000.00	50.26	103.28	0.00	0.00
RM 3000 - 3999	3,704	3,688,019	303,859,389.20	82.39	0.00	0.00	260,000.00	54.81	109.97	0.00	0.00
RM 4000 - 4999	2,484	2,659,738	568,039,239.00	213.57	0.00	0.00	570,700.00	68.08	359.06	0.00	0.00
RM 5000 and above	5,966	6,212,201	1,071,350,785.00	172.46	0.00	0.00	728,000.00	99.99	244.92	0.00	0.00
<b>Household Income Quintiles</b>											
Q1 (lowest)	6,336	5,610,825	327,993,739.30	58.46	0.00	0.00	442,000.00	38.33	78.58	0.00	0.00
Q2	5,068	4,369,713	222,561,279.67	50.93	0.00	0.00	104,000.00	33.30	68.57	0.00	0.00
Q3	5,779	5,630,419	446,162,861.21	79.24	0.00	0.00	520,000.00	54.79	103.69	0.00	0.00
Q4	5,730	5,837,958	789,002,770.62	135.15	0.00	0.00	570,700.00	67.16	203.14	0.00	0.00
Q5 (highest)	5,585	5,830,042	1,061,396,135.58	182.06	0.00	0.00	728,000.00	104.93	259.18	0.00	0.00
<b>Malaysia Poverty Line*</b>											
Poor	4,742	4,337,545	256,881,431.10	59.22	0.00	0.00	442,000.00	34.77	83.68	0.00	0.00
Non-poor	23,756	22,941,412	2,590,235,355.20	112.91	0.00	0.00	728,000.00	85.91	139.90	0.00	0.00
<b>Highest education of the head of household</b>											
No formal education	545	399,241	72,269,168.20	181.02	0.00	0.00	442,000.00	-31.07	393.11	0.00	0.00
Primary education	2,099	1,752,378	138,972,870.90	79.31	0.00	0.00	104,000.00	36.32	122.29	0.00	0.00
Secondary education	3,105	3,137,065	473,489,767.30	150.93	0.00	0.00	399,880.00	48.31	253.56	0.00	0.00
Tertiary education	1,518	1,624,204	222,799,786.20	137.17	0.00	0.00	390,000.00	65.10	209.25	0.00	0.00
Unclassified	86	91,910	65,534.40	0.71	0.00	0.00	7,800.00	-0.29	1.72	0.00	0.00
<b>Total Expenditures Quintiles</b>											
Q1 (lowest)	6,092	5,457,328	245,707,630.00	45.02	0.00	0.00	226,200.00	30.27	59.78	0.00	0.00
Q2	6,413	5,606,701	275,973,180.70	49.22	0.00	0.00	103,480.00	36.54	61.91	0.00	0.00
Q3	5,779	5,237,628	608,146,611.30	116.11	0.00	0.00	520,000.00	51.07	181.15	0.00	0.00
Q4	5,032	5,261,943	732,027,389.30	139.12	0.00	0.00	570,700.00	66.76	211.48	0.00	0.00
Q5 (highest)	4,859	5,384,689	977,355,612.00	181.51	0.00	0.00	728,000.00	114.21	248.81	0.00	0.00

\* Poverty line for Poor Household income : Peninsular Malaysia - RM763 and below per month; Sabah - Household income RM1048 and below per month; Sarawak - Household income RM912 and below per month

Table 5.10: Total Out-of-Pocket Health Expenditure for Appliances by Sociodemographic for All Respondents

Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>MALAYSIA</b>	28,498	27,278,956	1,170,453,552.70	42.91	0.00	0.00	242,000.00	35.88	49.93	0.00	0.00
<b>State</b>											
Johor	2,469	3,198,775	123,168,319.10	38.50	0.00	0.00	80,000.00	32.32	44.69	0.00	0.00
Kedah	1,700	1,836,622	60,355,832.60	32.86	0.00	0.00	14,000.00	25.99	39.73	0.00	0.00
Kelantan	1,896	1,467,639	22,581,983.50	15.39	0.00	0.00	35,000.00	9.47	21.30	0.00	0.00
Melaka	1,600	788,972	35,221,398.60	44.64	0.00	0.00	30,000.00	34.17	55.11	0.00	0.00
Negeri Sembilan	1,529	975,602	29,398,181.80	30.13	0.00	0.00	42,500.00	21.22	39.04	0.00	0.00
Pahang	1,641	1,387,621	37,836,825.20	27.27	0.00	0.00	16,000.00	21.68	32.85	0.00	0.00
Pulau Pinang	1,788	1,527,315	107,373,781.70	70.30	0.00	0.00	110,000.00	32.88	107.72	0.00	0.00
Perak	1,599	2,243,870	76,299,022.20	340.00	0.00	0.00	18,000.00	27.30	40.71	0.00	0.00
Perlis	1,424	217,069	8,262,656.80	38.06	0.00	0.00	20,000.00	28.68	47.45	0.00	0.00
Selangor	4,101	5,398,672	299,643,068.20	55.50	0.00	0.00	60,000.00	46.44	64.57	0.00	0.00
Terengganu	1,846	1,012,044	32,963,221.50	32.57	0.00	0.00	30,000.00	24.80	40.34	0.00	0.00
Sabah & Labuan	3,208	3,217,431	171,297,233.20	53.24	0.00	0.00	242,000.00	0.38	106.10	0.00	0.00
Sarawak	1,962	2,316,783	69,680,979.50	30.08	0.00	0.00	36,000.00	19.35	40.80	0.00	0.00
WP Kuala Lumpur	911	1,620,013	90,577,323.60	55.91	0.00	0.00	29,000.00	42.20	69.62	0.00	0.00
WP Putrajaya	824	70,529	5,793,725.10	82.15	0.00	0.00	25,000.00	60.33	103.97	0.00	0.00
<b>State</b>											
Peninsular Malaysia	23,328	21,744,743	929,475,340.00	42.74	0.00	0.00	110,000.00	38.81	46.68	0.00	0.00
Sabah	3,208	3,217,431	171,297,233.20	53.24	0.00	0.00	242,000.00	0.38	106.10	0.00	0.00
Sarawak	1,962	2,316,783	69,680,979.50	30.08	0.00	0.00	36,000.00	19.35	40.80	0.00	0.00
<b>Location</b>											
Urban	16,372	19,496,298	987,352,947.30	50.64	0.00	0.00	242,000.00	40.88	60.40	0.00	0.00
Rural	12,126	7,782,659	183,100,605.50	23.53	0.00	0.00	80,000.00	20.43	26.62	0.00	0.00
<b>Sex</b>											
Male	13,757	13,959,955	566,190,139.80	40.56	0.00	0.00	242,000.00	28.25	52.86	0.00	0.00
Female	14,741	13,319,001	604,263,413.00	45.37	0.00	0.00	110,000.00	39.82	50.91	0.00	0.00
<b>Age group</b>											
0-4	2,772	2,366,121	1,281,402.70	0.54	0.00	0.00	8,500.00	-0.16	1.24	0.00	0.00
5-9	2,904	2,596,837	19,827,129.60	7.64	0.00	0.00	7,000.00	5.65	9.62	0.00	0.00
10-14	2,926	2,639,932	74,370,817.70	28.17	0.00	0.00	60,000.00	21.57	34.77	0.00	0.00
15-19	2,450	2,746,005	142,764,957.10	51.99	0.00	0.00	110,000.00	29.85	74.13	0.00	0.00

Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>MALAYSIA</b>	28,498	27,278,956	1,170,453,552.70	42.91	0.00	0.00	242,000.00	35.88	49.93	0.00	0.00
20-24	2,108	2,712,661	88,902,120.20	32.77	0.00	0.00	14,000.00	26.80	38.74	0.00	0.00
25-29	2,101	2,605,575	112,896,161.60	43.33	0.00	0.00	20,000.00	34.30	52.36	0.00	0.00
30-34	1,885	2,065,596	77,098,514.10	37.33	0.00	0.00	20,000.00	30.17	44.48	0.00	0.00
35-39	1,799	1,844,496	153,260,872.20	83.09	0.00	0.00	242,000.00	-5.88	172.07	0.00	0.00
40-44	1,844	1,725,055	97,429,560.60	56.48	0.00	0.00	30,000.00	47.41	65.55	0.00	0.00
45-49	1,801	1,570,079	103,796,990.20	66.11	0.00	0.00	42,500.00	53.85	78.37	0.00	0.00
50-54	1,681	1,313,353	98,046,066.40	74.65	0.00	0.00	22,000.00	62.57	86.74	0.00	0.00
55-59	1,463	1,027,597	76,772,728.20	74.71	0.00	0.00	30,000.00	58.16	91.26	0.00	0.00
60-64	997	772,562	46,023,856.00	59.57	0.00	0.00	35,000.00	45.61	73.54	0.00	0.00
65-69	673	499,048	38,301,384.10	76.75	0.00	0.00	30,000.00	34.88	118.62	0.00	0.00
70-74	538	368,196	12,245,792.20	33.26	0.00	0.00	15,000.00	21.26	45.26	0.00	0.00
75 and above	556	425,843	27,435,199.80	64.43	0.00	0.00	80,000.00	37.12	91.73	0.00	0.00
<b>Marital status</b>											
Single	6,983	7,908,495	437,496,406.00	55.32	0.00	0.00	242,000.00	32.78	77.86	0.00	0.00
Married	12,537	11,676,560	617,091,903.70	52.85	0.00	0.00	42,500.00	48.42	57.28	0.00	0.00
Widow/Widower/Divorcee	1,470	1,072,354	56,643,629.60	52.82	0.00	0.00	80,000.00	40.66	64.99	0.00	0.00
<b>Ethnicity</b>											
Malays	16,975	14,253,318	559,422,013.00	39.25	0.00	0.00	110,000.00	34.08	44.42	0.00	0.00
Chinese	4,944	6,332,970	451,322,972.50	71.27	0.00	0.00	242,000.00	44.22	98.31	0.00	0.00
Indians	2,122	1,834,300	69,302,608.00	37.78	0.00	0.00	12,000.00	30.47	45.09	0.00	0.00
Other Bumiputeras	2,933	3,300,636	76,778,415.40	23.26	0.00	0.00	36,000.00	15.48	31.04	0.00	0.00
Others	1,524	1,557,733	13,627,543.80	8.75	0.00	0.00	15,000.00	4.46	13.04	0.00	0.00
<b>Education</b>											
No formal education	1,559	1,218,847	33,114,846.70	27.17	0.00	0.00	80,000.00	16.83	37.51	0.00	0.00
Primary	8,065	7,159,469	180,102,949.70	25.16	0.00	0.00	15,000.00	22.59	27.72	0.00	0.00
Secondary	9,485	9,704,547	442,262,597.60	45.57	0.00	0.00	50,000.00	40.68	50.47	0.00	0.00
Tertiary	3,873	4,255,316	447,068,124.60	105.06	0.00	0.00	242,000.00	65.10	145.03	0.00	0.00
Unclassified	1,675	1,627,575	64,232,670.80	39.47	0.00	0.00	110,000.00	6.02	72.91	0.00	0.00
<b>Occupation</b>											
Government employee/Semi	2,148	1,811,075	133,099,415.60	73.49	0.00	0.00	30,000.00	62.00	84.98	0.00	0.00
Private employee	5,843	7,001,658	343,901,636.60	49.12	0.00	0.00	22,000.00	43.22	55.02	0.00	0.00
Self-employed	3,686	3,358,458	214,878,167.80	63.98	0.00	0.00	242,000.00	15.06	112.90	0.00	0.00
Unpaid worker/ home maker	3,224	2,758,938	105,103,762.70	38.10	0.00	0.00	30,000.00	33.15	43.05	0.00	0.00
Retiree	1,738	1,330,270	94,477,679.30	71.02	0.00	0.00	35,000.00	52.11	89.93	0.00	0.00

Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>MALAYSIA</b>	28,498	27,278,956	1,170,453,552.70	42.91	0.00	0.00	242,000.00	35.88	49.93	0.00	0.00
<b>Household income group</b>											
Less than RM400	2,166	2,016,214	64,886,685.40	32.18	0.00	0.00	60,000.00	22.25	42.11	0.00	0.00
RM 400 - 499	448	415,901	4,651,749.10	11.18	0.00	0.00	10,000.00	3.47	18.89	0.00	0.00
RM 500 - 699	1,141	941,916	14,141,811.90	15.01	0.00	0.00	16,000.00	8.98	21.05	0.00	0.00
RM 700 - 999	1,865	1,655,090	23,753,599.30	14.35	0.00	0.00	8,000.00	10.36	18.35	0.00	0.00
RM 1000 - 1999	5,927	5,096,306	110,701,633.30	21.72	0.00	0.00	17,000.00	18.92	24.52	0.00	0.00
RM 2000 - 2999	4,797	4,593,572	130,800,559.50	28.47	0.00	0.00	42,500.00	24.05	32.90	0.00	0.00
RM 3000 - 3999	3,704	3,688,019	131,773,752.60	35.73	0.00	0.00	22,000.00	30.32	41.14	0.00	0.00
RM 4000 - 4999	2,484	2,659,738	169,815,548.50	63.85	0.00	0.00	110,000.00	41.89	85.80	0.00	0.00
RM 5000 and above	5,966	6,212,201	519,928,213.20	83.69	0.00	0.00	242,000.00	56.08	111.31	0.00	0.00
<b>Household Income Quintiles</b>											
Q1 (lowest)	6,336	5,610,825	120,084,358.40	21.40	0.00	0.00	60,000.00	17.28	25.53	0.00	0.00
Q2	5,068	4,369,713	94,308,542.90	21.58	0.00	0.00	17,000.00	18.56	24.61	0.00	0.00
Q3	5,779	5,630,419	170,902,489.10	30.35	0.00	0.00	42,500.00	26.29	34.42	0.00	0.00
Q4	5,730	5,837,958	289,174,536.00	49.53	0.00	0.00	110,000.00	38.73	60.34	0.00	0.00
Q5 (highest)	5,585	5,830,042	495,983,626.20	85.07	0.00	0.00	242,000.00	55.76	114.39	0.00	0.00
<b>Malaysia Poverty Line*</b>											
Poor	4,742	4,337,545	97,705,054.10	22.53	0.00	0.00	60,000.00	17.35	27.70	0.00	0.00
Non-poor	23,756	22,941,412	1,072,748,498.70	46.76	0.00	0.00	242,000.00	38.54	54.99	0.00	0.00
<b>Highest education of the head of household</b>											
No formal education	545	399,241	7,321,037.80	18.34	0.00	0.00	7,000.00	9.83	26.85	0.00	0.00
Primary education	2,099	1,752,378	51,900,467.80	29.62	0.00	0.00	15,000.00	24.38	34.86	0.00	0.00
Secondary education	3,105	3,137,065	148,443,349.80	47.32	0.00	0.00	29,000.00	39.87	54.77	0.00	0.00
Tertiary education	1,518	1,624,204	146,016,967.10	89.90	0.00	0.00	30,000.00	76.07	103.73	0.00	0.00
Unclassified	86	91,910	1,187,764.40	12.92	0.00	0.00	3,700.00	1.61	24.24	0.00	0.00
<b>Total Expenditures Quintiles</b>											
Q1 (lowest)	6,092	5,457,328	86,016,903.80	15.76	0.00	0.00	18,000.00	13.31	18.21	0.00	0.00
Q2	6,413	5,606,701	249,160,041.10	44.44	0.00	0.00	242,000.00	15.17	73.71	0.00	0.00
Q3	5,779	5,237,628	172,558,155.20	32.95	0.00	0.00	20,000.00	28.89	370.00	0.00	0.00
Q4	5,032	5,261,943	238,491,687.70	45.32	0.00	0.00	80,000.00	38.68	51.97	0.00	0.00
Q5 (highest)	4,859	5,384,689	415,348,834.90	77.14	0.00	0.00	110,000.00	63.74	90.53	0.00	0.00

\* Poverty line for Poor Household income : Peninsular Malaysia - RM763 and below per month; Sabah - Household income RM1048 and below per month; Sarawak - Household income RM912 and below per month

Table 5.11: Total Out-of-Pocket Health Expenditure for Promotive and Preventive Care by Sociodemographic for All Respondents

Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>MALAYSIA</b>	28,498	27,278,956	10,672,541,591.60	391.24	0.00	0.00	1,304,160.00	319.27	463.21	0.00	0.00
<b>State</b>											
Johor	2,469	3,198,775	999,414,165.80	312.44	0.00	0.00	260,000.00	240.58	384.29	0.00	0.00
Kedah	1,700	1,836,622	478,971,330.90	260.79	0.00	0.00	520,000.00	144.99	376.59	0.00	0.00
Kelantan	1,896	1,467,639	179,481,878.00	122.29	0.00	0.00	161,200.00	84.96	159.62	0.00	0.00
Melaka	1,600	788,972	245,761,986.00	311.50	0.00	0.00	130,000.00	177.27	445.72	0.00	0.00
Negeri Sembilan	1,529	975,602	233,742,462.10	239.59	0.00	0.00	260,000.00	149.09	330.09	0.00	0.00
Pahang	1,641	1,387,621	283,217,463.40	204.10	0.00	0.00	130,000.00	152.74	255.46	0.00	0.00
Pulau Pinang	1,788	1,527,315	838,022,438.10	548.69	0.00	0.00	806,000.00	372.46	724.93	0.00	0.00
Perak	1,599	2,243,870	1,043,610,672.30	465.09	0.00	0.00	572,000.00	241.35	688.84	0.00	0.00
Perlis	1,424	217,069	45,580,055.30	209.98	0.00	0.00	351,000.00	131.35	288.61	0.00	0.00
Selangor	4,101	5,398,672	2,572,768,027.70	476.56	0.00	0.00	650,000.00	380.76	572.35	0.00	0.00
Terengganu	1,846	1,012,044	265,369,278.90	262.21	0.00	0.00	1,304,160.00	72.41	452.01	0.00	0.00
Sabah & Labuan	3,208	3,217,431	891,774,040.80	277.17	0.00	0.00	226,200.00	184.28	370.06	0.00	0.00
Sarawak	1,962	2,316,783	786,088,955.20	339.30	0.00	0.00	340,600.00	202.67	475.93	0.00	0.00
WP Kuala Lumpur	911	1,620,013	1,768,075,338.40	1,091.40	0.00	0.00	1,170,000.00	62.33	2,120.46	0.00	0.00
WP Putrajaya	824	70,529	40,663,498.70	576.55	0.00	0.00	780,000.00	324.35	828.75	0.00	0.00
<b>State</b>											
Peninsular Malaysia	23,328	21,744,743	8,994,678,595.60	413.65	0.00	0.00	1,304,160.00	325.69	501.61	0.00	0.00
Sabah	3,208	3,217,431	891,774,040.80	277.17	0.00	0.00	226,200.00	184.28	370.06	0.00	0.00
Sarawak	1,962	2,316,783	786,088,955.20	339.30	0.00	0.00	340,600.00	202.67	475.93	0.00	0.00
<b>Location</b>											
Urban	16,372	19,496,298	9,219,527,708.10	472.89	0.00	0.00	1,304,160.00	373.58	572.19	0.00	0.00
Rural	12,126	7,782,659	1,453,013,883.50	186.70	0.00	0.00	538,200.00	149.18	224.22	0.00	0.00
<b>Sex</b>											
Male	13,757	13,959,955	2,932,128,378.30	210.04	0.00	0.00	1,170,000.00	128.69	291.39	0.00	0.00
Female	14,741	13,319,001	7,740,413,213.30	581.16	0.00	0.00	1,304,160.00	491.65	670.66	0.00	0.00
<b>Age group</b>											
0-4	2,772	2,366,121	666,327,027.30	281.61	0.00	0.00	169,000.00	239.15	324.08	0.00	257.00
5-9	2,904	2,596,837	881,514,301.60	339.46	0.00	0.00	520,000.00	204.96	473.95	0.00	0.00
10-14	2,926	2,639,932	382,746,055.30	144.98	0.00	0.00	182,000.00	97.81	192.15	0.00	0.00
15-19	2,450	2,746,005	101,021,382.70	36.79	0.00	0.00	182,000.00	18.69	54.89	0.00	0.00



Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>MALAYSIA</b>	28,498	27,278,956	10,672,541,591.60	391.24	0.00	0.00	1,304,160.00	319.27	463.21	0.00	0.00
20-24	2,108	2,712,661	547,695,747.10	201.90	0.00	0.00	260,260.00	137.97	265.83	0.00	0.00
25-29	2,101	2,605,575	1,113,992,301.80	427.54	0.00	0.00	338,000.00	219.77	635.32	0.00	0.00
30-34	1,885	2,065,596	1,297,692,094.40	628.24	0.00	0.00	806,000.00	422.41	834.07	0.00	0.00
35-39	1,799	1,844,496	1,350,737,102.10	732.31	0.00	0.00	1,304,160.00	521.02	943.59	0.00	0.00
40-44	1,844	1,725,055	1,151,900,494.80	667.75	0.00	0.00	540,800.00	448.85	886.64	0.00	0.00
45-49	1,801	1,570,079	760,626,878.60	484.45	0.00	0.00	234,000.00	386.46	582.44	0.00	0.00
50-54	1,681	1,313,353	801,667,187.90	610.40	0.00	0.00	278,200.00	439.06	781.74	0.00	0.00
55-59	1,463	1,027,597	502,237,735.80	488.75	0.00	0.00	351,000.00	342.20	635.30	0.00	0.00
60-64	997	772,562	721,446,972.00	933.84	0.00	0.00	1,170,000.00	-102.93	1,970.61	0.00	0.00
65-69	673	499,048	145,810,338.00	292.18	0.00	0.00	650,000.00	139.82	444.53	0.00	0.00
70-74	538	368,196	74,326,570.00	201.87	0.00	0.00	119,600.00	105.95	297.78	0.00	0.00
75 and above	556	425,843	172,799,402.30	405.78	0.00	0.00	260,000.00	203.75	607.81	0.00	0.00
<b>Marital status</b>											
Single	6,983	7,908,495	1,442,960,887.80	182.46	0.00	0.00	338,000.00	111.33	253.59	0.00	0.00
Married	12,537	11,676,560	6,864,107,280.20	587.85	0.00	0.00	1,304,160.00	463.22	712.49	0.00	0.00
Widow/Widower/Divorcee	1,470	1,072,354	439,835,648.90	410.16	0.00	0.00	650,000.00	249.17	571.15	0.00	0.00
<b>Ethnicity</b>											
Malays	16,975	14,253,318	3,885,545,044.80	272.61	0.00	0.00	1,304,160.00	230.75	314.47	0.00	0.00
Chinese	4,944	6,332,970	5,178,163,715.50	817.65	0.00	0.00	1,170,000.00	547.03	1,088.27	0.00	0.00
Indians	2,122	1,834,300	699,756,174.30	381.48	0.00	0.00	806,000.00	176.08	586.89	0.00	0.00
Other Bumiputeras	2,933	3,300,636	601,782,713.50	182.32	0.00	0.00	226,200.00	110.70	253.95	0.00	0.00
Others	1,524	1,557,733	307,293,943.50	197.27	0.00	0.00	182,000.00	134.06	260.48	0.00	0.00
<b>Education</b>											
No formal education	1,559	1,218,847	209,201,326.20	171.64	0.00	0.00	124,800.00	110.54	232.73	0.00	0.00
Primary	8,065	7,159,469	1,745,700,384.80	243.83	0.00	0.00	520,000.00	194.77	292.89	0.00	0.00
Secondary	9,485	9,704,547	3,719,156,588.50	383.24	0.00	0.00	1,170,000.00	274.76	491.71	0.00	0.00
Tertiary	3,873	4,255,316	3,742,732,830.00	879.54	0.00	0.00	1,304,160.00	679.61	1,079.47	0.00	0.00
Unclassified	1,675	1,627,575	261,612,675.40	160.74	0.00	0.00	130,000.00	241.47	358.64	0.00	0.00
<b>Occupation</b>											
Government employee/Semi	2,148	1,811,075	1,246,716,017.00	688.38	0.00	0.00	468,000.00	523.18	853.59	0.00	0.00
Private employee	5,843	7,001,658	2,968,070,030.00	423.91	0.00	0.00	54,080.00	298.31	549.51	0.00	0.00
Self-employed	3,686	3,358,458	1,908,863,918.00	568.38	0.00	0.00	130,416.00	313.48	823.27	0.00	0.00
Unpaid worker/ home maker	3,224	2,758,938	1,671,503,291.00	605.85	0.00	0.00	78,000.00	447.36	764.34	0.00	26.00
Retiree	1,738	1,330,270	468,160,404.00	351.93	0.00	0.00	65,000.00	213.92	489.94	0.00	0.00

Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>MALAYSIA</b>	28,498	27,278,956	10,672,541,591.60	391.24	0.00	0.00	1,304,160.00	319.27	463.21	0.00	0.00
<b>Household income group</b>											
Less than RM400	2,166	2,016,214	455,867,367.00	226.10	0.00	0.00	572,000.00	143.39	308.81	0.00	0.00
RM 400 - 499	448	415,901	78,177,939.40	187.97	0.00	0.00	260,000.00	143.39	308.81	0.00	0.00
RM 500 - 699	1,141	941,916	126,798,284.30	134.62	0.00	0.00	143,000.00	47.49	221.74	0.00	0.00
RM 700 - 999	1,865	1,655,090	211,564,261.20	127.83	0.00	0.00	143,000.00	45.50	210.15	0.00	0.00
RM 1000 - 1999	5,927	5,096,306	685,215,126.60	134.45	0.00	0.00	208,000.00	107.91	1,610.00	0.00	0.00
RM 2000 - 2999	4,797	4,593,572	1,192,130,501.00	259.52	0.00	0.00	780,000.00	196.14	322.90	0.00	0.00
RM 3000 - 3999	3,704	3,688,019	1,458,499,510.90	395.47	0.00	0.00	650,000.00	257.60	533.34	0.00	0.00
RM 4000 - 4999	2,484	2,659,738	1,046,120,631.80	393.32	0.00	0.00	267,800.00	312.80	473.83	0.00	0.00
RM 5000 and above	5,966	6,212,201	5,418,167,969.40	872.18	0.00	0.00	1,304,160.00	609.07	1,135.29	0.00	0.00
<b>Household Income Quintiles</b>											
Q1 (lowest)	6,336	5,610,825	922,817,629.60	164.47	0.00	0.00	572,000.00	121.42	207.52	0.00	0.00
Q2	5,068	4,369,713	618,554,069.10	141.55	0.00	0.00	208,000.00	111.69	171.42	0.00	0.00
Q3	5,779	5,630,419	1,818,064,491.80	322.90	0.00	0.00	780,000.00	210.23	435.57	0.00	0.00
Q4	5,730	5,837,958	2,416,617,134.20	413.95	0.00	0.00	806,000.00	335.69	492.21	0.00	0.00
Q5 (highest)	5,585	5,830,042	4,896,488,266.90	839.87	0.00	0.00	1,304,160.00	565.99	1,113.76	0.00	0.00
<b>Malaysia Poverty Line*</b>											
Poor	4,742	4,337,545	812,188,168.60	187.25	0.00	0.00	572,000.00	132.69	241.81	0.00	0.00
Non-poor	23,756	22,941,412	9,860,353,422.90	429.81	0.00	0.00	1,304,160.00	345.61	514.01	0.00	0.00
<b>Highest education of the head of household</b>											
No formal education	545	399,241	49,838,067.50	124.83	0.00	0.00	83,200.00	55.39	194.27	0.00	0.00
Primary education	2,099	1,752,378	186,713,986.50	106.55	0.00	0.00	260,000.00	61.11	151.99	0.00	0.00
Secondary education	3,105	3,137,065	1,102,067,086.50	351.31	0.00	0.00	1,170,000.00	82.91	619.70	0.00	0.00
Tertiary education	1,518	1,624,204	842,413,939.50	518.66	0.00	0.00	538,200.00	291.65	745.67	0.00	0.00
Unclassified	86	91,910	6,806,455.40	74.06	0.00	0.00	36,400.00	-37.08	185.19	0.00	0.00
<b>Total Expenditures Quintiles</b>											
Q1 (lowest)	5,669	5,101,158	560,102,180.40	109.80	0.00	0.00	248,300.00	80.12	139.48	0.00	0.00
Q2	5,620	4,822,026	938,342,986.90	194.60	0.00	0.00	234,000.00	143.94	245.25	0.00	0.00
Q3	5,616	5,201,695	1,479,863,627.10	284.50	0.00	0.00	1,304,160.00	212.72	356.27	0.00	0.00
Q4	5,703	5,697,863	2,569,739,701.80	4510.00	0.00	0.00	650,000.00	339.39	562.61	0.00	0.00
Q5 (highest)	5,567	6,125,546	4,938,738,818.50	806.25	0.00	0.00	1,170,000.00	548.50	1,064.01	0.00	0.00

\* Poverty line for Poor Household income : Peninsular Malaysia - RM763 and below per month; Sabah - Household income RM1048 and below per month; Sarawak - Household income RM912 and below per month

**Table 5.12: Total Out-of-Pocket Health Expenditure for Transportation, Accommodation & Other Expenditures for All Respondents**

Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>Inpatient care</b>											
Transportation	28,498	27,278,956	30,031,918.10	1.10	0.00	0.00	10,350.00	0.87	1.33	0.00	0.00
Accommodation	28,498	27,278,956	15,810,476.50	0.58	0.00	0.00	75,000.00	0.09	1.07	0.00	0.00
Others	28,498	27,278,956	28,060,511.50	1.03	0.00	0.00	31,000.00	0.55	1.51	0.00	0.00
<b>Dental care</b>											
Transportation	28,498	27,278,956	32,636,180.60	1.20	0.00	0.00	7,500.00	0.88	1.52	0.00	0.00
Accommodation	28,498	27,278,956	132,802.60	0.00	0.00	0.00	900.00	0.00	0.01	0.00	0.00
Others	28,498	27,278,956	4,973,220.10	0.18	0.00	0.00	3,000.00	0.14	0.23	0.00	0.00
<b>Outpatient care</b>											
Transportation	28,498	27,278,956	485,126,724.20	17.78	0.00	0.00	210,600.00	15.96	19.60	0.00	0.00
Accommodation	28,498	27,278,956	5,195,552.20	0.19	0.00	0.00	10,400.00	0.11	0.27	0.00	0.00
Others	28,498	27,278,956	5,195,552.20	0.19	0.00	0.00	10,400.00	0.11	0.27	0.00	0.00

**Table 5.13: Total Out-of-Pocket Health Expenditure for Promotive and Preventive Care by Type of Spending for All Respondents**

Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
Overall	28,498	27,278,956	10,672,541,591.60	391.24	0.00	0.00	1,304,160.00	319.27	463.21	0.00	0.00
Medical check-up	28,498	27,278,956	2,821,861,493.50	103.44	0.00	0.00	1,170,000.00	63.62	143.27	0.00	0.00
Family planning	28,498	27,278,956	763,397,066.50	27.98	0.00	0.00	1,300,000.00	13.63	42.34	0.00	0.00
Vaccination	28,498	27,278,956	720,977,407.40	26.43	0.00	0.00	234,000.00	18.49	34.37	0.00	0.00
Pap smear	28,498	27,278,956	592,360,170.60	21.71	0.00	0.00	780,000.00	15.65	27.78	0.00	0.00
Mammogram	28,498	27,278,956	248,666,488.20	9.12	0.00	0.00	182,000.00	5.53	12.70	0.00	0.00
Vitamin & supplement	28,498	27,278,956	5,525,278,965.40	202.55	0.00	0.00	780,000.00	170.27	234.83	0.00	0.00

**Table 5.14: Total Out-of-Pocket Health Expenditure for Those Who Sought Care**

Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
Inpatient care	1,862	1,785,970	1,514,503,540.23	848.06	300.00	0.00	1,000,000.00	629.16	1,066.96	0.00	2,000.00
Oral health care	6,448	6,012,975	351,397,521.34	58.44	0.00	0.00	100,000.00	45.44	71.44	0.00	400.00
Outpatient care	3,615	3,321,821	2,847,116,786.37	857.10	260.00	0.00	728,000.00	671.69	1,042.50	0.00	7,800.00

Table 5.15: Total Out-of-Pocket Health Expenditure for Inpatient Care by Sociodemographic

Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>MALAYSIA</b>	1,862	1,785,970	1,514,606,921.80	848.06	30.00	0.00	100,000.00	629.16	1,066.96	0.00	2,000.00
<b>State</b>											
Johor	177	227,549	192,384,783.00	845.47	500.00	0.00	390,000.00	245.59	1,445.27	0.00	2,300.00
Kedah	92	99,530	74,496,762.10	748.49	240.00	0.00	110,000.00	207.78	1,289.19	0.00	2,400.00
Kelantan	77	60,885	14,256,615.80	234.15	270.00	0.00	139,000.00	61.79	406.52	0.00	850.00
Malaka	143	66,034	56,883,155.90	861.42	300.00	0.00	300,000.00	28.80	1,694.05	0.00	1,500.00
Negeri Sembilan	144	93,703	52,147,598.60	556.52	350.00	0.00	100,000.00	282.64	830.41	0.00	1,500.00
Pahang	89	85,199	55,664,445.80	653.35	10.00	0.00	68,000.00	172.14	1,134.55	0.00	2,000.00
Pulau Pinang	145	152,715	139,300,212.10	912.16	350.00	0.00	150,000.00	383.24	1,441.08	0.00	10,000.00
Perak	117	147,982	163,683,270.40	1,106.10	250.00	0.00	160,000.00	458.98	1,753.23	0.00	5,500.00
Perlis	77	11,887	4,195,972.20	352.99	0.00	0.00	98,000.00	52.13	653.85	0.00	300.00
Selangor	302	383,986	407,054,267.20	1,060.08	480.00	0.00	508,000.00	596.46	1,523.69	0.00	4,000.00
Terengganu	101	54,310	12,363,449.30	227.65	90.00	0.00	160,000.00	74.11	381.18	0.00	400.00
Sabah & Labuan	189	188,365	135,621,987.70	7,200.00	290.00	0.00	1,000,000.00	-314.82	1,754.81	0.00	1,070.00
Sarawak	97	104,992	33,519,509.20	319.26	320.00	0.00	80,000.00	83.16	555.35	0.00	500.00
WP Kuala Lumpur	67	105,023	170,607,679.10	1,624.47	170.00	0.00	300,000.00	-2,330.00	3,481.94	0.00	5,000.00
WP Putrajaya	45	3,810	2,331,841.30	611.96	0.00	0.00	50,300.00	92.63	1,131.30	0.00	1,500.00
<b>State</b>											
Peninsular Malaysia	1,576	1,492,613	1,345,362,043.30	901.35	300.00	0.00	508,000.00	675.26	1,127.43	0.00	2,500.00
Sabah	189	188,365	135,621,987.70	7,200.00	290.00	0.00	1,000,000.00	-314.82	1,754.81	0.00	1,070.00
Sarawak	97	104,992	33,519,509.20	319.26	320.00	0.00	80,000.00	83.16	555.35	0.00	500.00
<b>Location</b>											
Urban	1,080	1,322,188	1,279,567,946.30	967.77	380.00	0.00	508,000.00	713.49	1,222.04	0.00	3,000.00
Rural	782	463,781	234,935,594.00	506.57	200.00	0.00	1,000,000.00	77.40	935.73	0.00	800.00
<b>Sex</b>											
Male	724	693,777	457,315,941.60	659.17	10.00	0.00	508,000.00	387.77	930.57	0.00	1,450.00
Female	1,138	1,092,193	1,057,187,598.60	967.95	500.00	0.00	1,000,000.00	658.26	1,277.63	0.00	3,000.00
<b>Age group</b>											
0-4	260	235,430	123,489,018.90	524.53	150.00	0.00	150,000.00	247.40	801.65	0.00	1,000.00
5-9	95	78,675	12,710,113.00	161.55	0.00	0.00	93,000.00	7.67	315.43	0.00	170.00
10-14	70	62,340	18,853,754.50	302.43	0.00	0.00	65,000.00	-25.42	630.29	0.00	10.00
15-19	95	114,043	57,876,908.90	507.50	30.00	0.00	110,000.00	106.87	908.14	0.00	770.00
20-24	116	143,414	183,515,662.50	1,279.62	400.00	0.00	1,000,000.00	-201.09	2,760.33	0.00	1,500.00
25-29	223	257,504	200,388,104.10	778.19	630.00	0.00	200,000.00	367.56	1,188.82	0.00	2,950.00

Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>MALAYSIA</b>	1,862	1,785,970	1,514,606,921.80	848.06	30.00	0.00	100,000.00	629.16	1,066.96	0.00	2,000.00
30-34	198	201,685	163,228,189.30	809.32	490.00	0.00	220,000.00	374.65	12,440.00	0.00	3,500.00
35-39	127	129,844	125,811,936.40	968.95	300.00	0.00	300,000.00	394.78	1,543.12	0.00	3,000.00
40-44	108	104,975	135,989,673.40	1,295.45	660.00	0.00	390,000.00	271.84	2,319.06	0.00	3,000.00
45-49	108	100,240	163,070,188.20	1,626.80	500.00	0.00	300,000.00	-155.64	3,409.23	0.00	6,000.00
50-54	92	72,832	38,192,077.60	524.39	350.00	0.00	60,000.00	206.86	841.92	0.00	3,000.00
55-59	99	61,516	33,059,060.40	537.41	0.00	0.00	160,000.00	198.52	876.30	0.00	2,000.00
60-64	80	72,371	31,284,167.60	432.27	630.00	0.00	90,000.00	50.68	813.87	0.00	2,400.00
65-69	62	50,719	37,535,537.20	740.06	0.00	0.00	70,000.00	216.75	1,263.37	0.00	1,500.00
70-74	54	32,832	52,267,863.60	1,591.99	0.00	0.00	508,000.00	-220.89	3,404.88	0.00	4,100.00
75 and above	75	67,550	137,231,284.80	2,031.55	750.00	0.00	160,000.00	836.84	3,226.27	0.00	20,000.00
<b>Marital status</b>											
Single	244	261,291	235,944,171.80	902.99	40.00	0.00	1,000,000.00	82.74	1,723.25	0.00	1,500.00
Married	1,079	1,056,481	1,017,798,235.20	963.39	500.00	0.00	508,000.00	666.69	1,260.08	0.00	3,000.00
Widow/Widower/Divorcee	137	111,235	105,757,843.60	950.76	500.00	0.00	151,000.00	466.34	1,435.18	0.00	3,050.00
<b>Ethnicity</b>											
Malays	1,141	986,794	620,615,163.40	628.92	60.00	0.00	508,000.00	404.67	853.17	0.00	1,200.00
Chinese	249	337,089	675,679,909.10	2,004.46	1,500.00	0.00	1,000,000.00	1,107.82	2,901.09	0.00	20,000.00
Indians	210	186,118	149,780,013.20	804.76	800.00	0.00	200,000.00	323.59	1,285.93	0.00	4,000.00
Other Bumiputeras	197	213,956	35,357,131.20	165.25	300.00	0.00	50,000.00	81.45	249.06	0.00	690.00
Others	65	62,012	33,071,323.30	533.30	850.00	0.00	98,000.00	166.40	900.21	370.00	6,500.00
<b>Education</b>											
No formal education	113	80,162	61,832,876.80	771.35	600.00	0.00	151,000.00	205.12	1,337.59	0.00	2,500.00
Primary	430	375,679	245,002,826.50	652.16	250.00	0.00	508,000.00	365.45	938.87	0.00	1,500.00
Secondary	685	714,764	613,674,805.40	858.57	450.00	0.00	1,000,000.00	483.28	1,233.86	0.00	2,000.00
Tertiary	291	309,309	450,946,515.60	1,457.92	300.00	0.00	300,000.00	782.22	2,133.62	0.00	15,000.00
Unclassified	42	40,559	10,338,215.20	254.89	0.00	0.00	50,000.00	-22.70	532.49	0.00	1,000.00
<b>Occupation</b>											
Government employee/Semi	175	158,986	87,359,719.00	549.48	0.00	0.00	100,000.00	231.01	867.96	0.00	350.00
Private employee	353	425,422	597,046,122.20	1,403.42	700.00	0.00	390,000.00	790.72	2,016.12	0.00	6,000.00
Self-employed	158	137,574	90,259,538.70	656.08	500.00	0.00	180,000.00	352.41	959.75	0.00	3,000.00
Unpaid worker/ home maker	378	359,063	214,702,347.10	597.95	500.00	0.00	300,000.00	357.89	838.01	0.00	2,000.00
Retiree	172	140,771	169,617,410.70	1,204.92	600.00	0.00	508,000.00	549.10	1,860.74	0.00	3,800.00

Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>MALAYSIA</b>	1,862	1,785,970	1,514,606,921.80	848.06	30.00	0.00	100,000.00	629.16	1,066.96	0.00	2,000.00
<b>Household income group</b>											
Less than RM400	140	130,230	55,018,571.70	422.47	180.00	0.00	160,000.00	16.19	828.76	0.00	700.00
RM 400 - 499	31	29,688	4,647,180.90	156.53	300.00	0.00	49,560.00	2.43	310.64	0.00	1,800.00
RM 500 - 699	63	56,235	9,695,500.30	172.41	0.00	0.00	33,000.00	-69.82	414.64	0.00	500.00
RM 700 - 999	102	80,413	28,022,555.30	348.48	370.00	0.00	100,000.00	43.98	652.99	0.00	1,440.00
RM 1000 - 1999	378	320,148	191,613,577.50	598.52	380.00	0.00	200,000.00	251.56	945.47	0.00	1,190.00
RM 2000 - 2999	318	314,387	132,079,775.50	420.12	200.00	0.00	508,000.00	177.35	662.89	0.00	1,100.00
RM 3000 - 3999	227	239,585	156,644,342.80	653.81	350.00	0.00	220,000.00	264.91	1,042.72	0.00	2,500.00
RM 4000 - 4999	187	207,825	164,519,999.60	791.63	390.00	0.00	390,000.00	229.89	1,353.36	0.00	1,600.00
RM 5000 and above	416	407,459	772,262,036.50	1,895.31	650.00	0.00	1,000,000.00	1,148.48	2,642.15	0.00	17,500.00
<b>Household Income Quintiles</b>											
Q1 (lowest)	389	337,355	153,367,702.60	454.62	270.00	0.00	200,000.00	148.33	760.91	0.00	1,070.00
Q2	309	263,548	135,151,693.90	512.82	350.00	0.00	153,500.00	234.19	791.44	0.00	1,180.00
Q3	384	387,472	174,753,989.10	451.01	260.00	0.00	508,000.00	238.08	663.94	0.00	1,500.00
Q4	388	412,891	315,305,692.90	763.65	350.00	0.00	390,000.00	403.98	1,123.32	0.00	2,300.00
Q5 (highest)	392	384,703	736,027,843.40	1,913.24	600.00	0.00	1,000,000.00	1,126.21	2,700.27	0.00	16,000.00
<b>Malaysia Poverty Line*</b>											
Poor	281	252,726	76,480,201.90	302.62	250.00	0.00	160,000.00	85.28	519.96	0.00	660.00
Non-poor	1,581	1,533,244	1,438,023,338.30	937.90	350.00	0.00	1,000,000.00	686.56	1,189.23	0.00	2,500.00
<b>Highest education of the head of household</b>											
No formal education	37	22,122	21,146,436.10	955.92	10.00	0.00	151,000.00	-633.36	2,545.20	0.00	2,050.00
Primary education	152	122,351	124,006,820.30	1,013.53	400.00	0.00	508,000.00	326.95	1,700.11	0.00	2,500.00
Secondary education	182	184,778	138,980,346.00	752.15	180.00	0.00	200,000.00	209.45	1,294.85	0.00	2,000.00
Tertiary education	72	74,594	172,659,907.30	2,314.66	350.00	0.00	300,000.00	-78.08	4,707.41	0.00	18,000.00
Unclassified	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
<b>Total Expenditures Quintiles</b>											
Q1 (lowest)	355	299,130	59,047,862.30	197.40	200.00	0.00	70,000.00	109.39	285.40	0.00	800.00
Q2	394	337,738	187,488,736.10	555.13	320.00	0.00	200,000.00	208.78	901.48	0.00	1,100.00
Q3	419	393,967	201,358,520.00	511.10	270.00	0.00	220,000.00	247.14	775.07	0.00	1,460.00
Q4	337	341,716	254,069,149.70	743.51	300.00	0.00	508,000.00	454.60	1,032.41	0.00	3,000.00
Q5 (highest)	345	399,331	811,601,587.80	2,032.40	800.00	0.00	1,000,000.00	1,232.17	2,832.64	0.00	19,000.00

\* Poverty line for Poor Household income : Peninsular Malaysia - RM763 and below per month; Sabah - Household income RM1048 and below per month; Sarawak - Household income RM912 and below per month

Table 5.16: Total Out-of-Pocket Health Expenditure for Oral Health Care by Sociodemographic

Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>MALAYSIA</b>	6,448	6,012,975	351,397,521.30	58.44	0.00	0.00	100,000.00	45.44	71.44	0.00	400.00
<b>State</b>											
Johor	681	866,966	25,373,978.60	29.27	0.00	0.00	7,000.00	22.57	35.96	0.00	250.00
Kedah	337	359,764	6,847,024.40	19.03	0.00	0.00	5,000.00	7.18	30.89	0.00	100.00
Kelantan	287	223,748	6,811,877.40	30.44	0.00	0.00	50,000.00	1.54	59.35	0.00	60.00
Melaka	432	219,677	6,025,215.90	27.43	0.00	0.00	30,000.00	16.25	38.60	0.00	30.00
Negeri Sembilan	432	292,408	8,223,734.00	28.12	0.00	0.00	17,000.00	10.83	45.42	0.00	20.00
Pahang	292	249,719	5,140,885.60	20.59	0.00	0.00	9,500.00	10.32	30.85	0.00	20.00
Pulau Pinang	482	411,329	26,102,650.90	63.46	0.00	0.00	40,000.00	28.02	98.90	0.00	400.00
Perak	447	694,355	24,157,781.50	34.79	0.00	0.00	30,000.00	19.08	50.51	0.00	300.00
Perlis	347	53,603	770,009.60	14.37	0.00	0.00	6,200.00	7.85	20.89	0.00	10.00
Selangor	801	975,441	138,245,292.40	141.73	20.00	0.00	100,000.00	92.63	190.82	0.00	800.00
Terengganu	340	194,259	3,811,567.60	19.62	0.00	0.00	6,000.00	10.31	28.94	0.00	20.00
Sabah & Labuan	661	580,736	25,817,747.10	44.46	0.00	0.00	25,000.00	28.56	60.36	0.00	450.00
Sarawak	336	389,974	9,692,712.60	24.85	0.00	0.00	8,000.00	15.30	34.41	0.00	30.00
WP Kuala Lumpur	280	477,223	62,172,941.50	130.28	20.00	0.00	60,000.00	16.22	244.34	0.00	900.00
WP Putrajaya	293	23,772	2,204,102.30	92.72	0.00	0.00	50,000.00	34.27	151.16	0.00	800.00
<b>State</b>											
Peninsular Malaysia	5,451	5,042,265	315,887,061.70	62.65	0.00	0.00	100,000.00	47.29	78.01	0.00	400.00
Sabah	661	580,736	25,817,747.10	44.46	0.00	0.00	25,000.00	28.56	60.36	0.00	450.00
Sarawak	336	389,974	9,692,712.60	24.85	0.00	0.00	8,000.00	15.30	34.41	0.00	30.00
<b>Location</b>											
Urban	3,750	4,326,011	322,167,990.50	74.47	0.00	0.00	100,000.00	56.59	92.36	0.00	500.00
Rural	2,698	1,686,964	29,229,530.80	17.33	0.00	0.00	40,000.00	13.09	21.56	0.00	20.00
<b>Sex</b>											
Male	2,888	2,799,468	145,192,766.90	51.86	0.00	0.00	100,000.00	38.18	65.54	0.00	400.00
Female	3,560	3,213,507	206,204,754.50	64.17	0.00	0.00	80,500.00	45.22	83.12	0.00	410.00
<b>Age group</b>											
0-4	162	139,688	968,254.70	6.93	0.00	0.00	2,000.00	3.25	10.61	0.00	10.00
5-9	1,362	1,162,200	10,769,555.60	9.27	0.00	0.00	5,550.00	5.43	13.11	0.00	0.00
10-14	1,402	1,182,997	27,439,083.10	23.19	0.00	0.00	60,000.00	0.22	46.17	0.00	0.00
15-19	732	780,419	65,275,092.70	83.64	0.00	0.00	60,000.00	17.86	149.43	0.00	0.00
20-24	316	387,724	21,835,977.50	56.32	60.00	0.00	30,000.00	41.21	71.42	0.00	700.00
25-29	395	429,120	38,681,346.60	90.14	360.00	0.00	50,000.00	650.00	115.28	10.00	1,000.00

Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>MALAYSIA</b>	6,448	6,012,975	351,397,521.30	58.44	0.00	0.00	100,000.00	45.44	71.44	0.00	400.00
30-34	363	393,648	27,742,299.30	70.47	300.00	0.00	35,000.00	39.46	101.49	10.00	800.00
35-39	380	392,993	35,501,025.40	90.33	400.00	0.00	26,000.00	61.60	119.07	20.00	900.00
40-44	346	330,607	29,962,473.40	90.63	450.00	0.00	25,000.00	68.93	112.33	20.00	950.00
45-49	334	294,603	35,363,630.80	120.04	400.00	0.00	80,500.00	71.91	168.17	20.00	1,000.00
50-54	261	200,522	25,929,262.60	129.31	300.00	0.00	100,000.00	22.39	236.22	10.00	700.00
55-59	173	127,392	9,808,120.60	76.99	400.00	0.00	20,000.00	41.58	112.41	10.00	800.00
60-64	99	81,330	8,433,153.40	103.69	120.00	0.00	11,000.00	49.47	157.91	10.00	1,000.00
65-69	54	52,661	8,373,440.60	159.01	500.00	0.00	9,000.00	69.66	248.36	10.00	1,800.00
70-74	37	28,141	3,137,311.50	111.48	450.00	0.00	8,500.00	13.17	209.79	0.00	1,000.00
75 and above	32	28,927	2,177,493.60	75.28	80.00	0.00	4,000.00	21.49	129.06	20.00	1,000.00
<b>Marital status</b>											
Single	1,722	1,787,828	136,440,772.30	76.32	0.00	0.00	60,000.00	43.22	109.41	0.00	200.00
Married	2,139	2,029,372	191,596,690.10	94.41	350.00	0.00	100,000.00	77.11	111.72	10.00	810.00
Widow/Widower/Divorcee	128	102,999	7,598,185.20	73.77	40.00	0.00	7,000.00	32.41	115.12	10.00	600.00
<b>Ethnicity</b>											
Malays	4,075	3,350,410	152,153,832.70	45.41	0.00	0.00	100,000.00	32.36	58.47	0.00	180.00
Chinese	1,092	1,486,670	156,959,711.10	105.58	50.00	0.00	60,000.00	64.95	146.20	0.00	800.00
Indians	524	434,678	17,252,410.80	39.69	0.00	0.00	40,000.00	22.91	56.47	0.00	50.00
Other Bumiputeras	589	649,594	15,998,840.20	24.63	0.00	0.00	6,200.00	12.63	36.63	0.00	20.00
Others	168	91,623	9,032,726.50	98.59	150.00	0.00	80,500.00	-10.12	207.30	0.00	600.00
<b>Education</b>											
No formal education	100	73,524	3,125,959.70	42.52	20.00	0.00	7,000.00	19.61	65.42	10.00	500.00
Primary	2,360	2,010,843	65,015,598.30	32.33	0.00	0.00	60,000.00	16.25	48.41	0.00	0.00
Secondary	1,811	1,803,089	134,945,718.10	74.84	20.00	0.00	60,000.00	46.74	102.94	0.00	500.00
Tertiary	1,021	1,087,344	128,173,102.80	117.88	500.00	0.00	100,000.00	91.97	143.79	10.00	1,200.00
Unclassified	620	580,928	16,038,705.10	27.61	0.00	0.00	80,500.00	0.48	54.74	0.00	0.00
<b>Occupation</b>											
Government employee/Semi	598	470,610	32,225,908.20	68.48	300.00	0.00	50,000.00	56.02	80.93	0.00	800.00
Private employee	948	1,144,781	117,810,863.00	102.91	400.00	0.00	100,000.00	76.72	129.10	10.00	1,000.00
Self-employed	489	474,864	36,707,036.10	77.30	300.00	0.00	50,000.00	55.25	99.35	10.00	700.00
Unpaid worker/ home maker	501	419,521	28,030,489.70	66.82	60.00	0.00	80,500.00	39.31	94.32	10.00	600.00
Retiree	168	145,632	18,381,598.40	126.22	400.00	0.00	24,000.00	75.05	177.39	10.00	1,000.00



Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>MALAYSIA</b>	6,448	6,012,975	351,397,521.30	58.44	0.00	0.00	10,000.00	45.44	71.44	0.00	400.00
<b>Household income group</b>											
Less than RM400	412	397,123	22,542,506.30	56.76	0.00	0.00	6,000.00	14.19	99.34	0.00	0.00
RM 400 - 499	71	73,235	1,744,603.20	23.82	0.00	0.00	700.00	-3.30	50.94	0.00	0.00
RM 500 - 699	209	173,620	10,715,506.20	61.72	0.00	0.00	5,000.00	-32.97	156.40	0.00	0.00
RM 700 - 999	326	266,754	3,008,101.60	11.28	0.00	0.00	450.00	2.81	19.74	0.00	0.00
RM 1000 - 1999	1,291	1,071,196	21,922,265.40	20.47	0.00	0.00	3,000.00	14.89	26.05	0.00	0.00
RM 2000 - 2999	1,068	957,600	23,241,027.70	24.27	0.00	0.00	1,100.00	18.38	30.16	0.00	0.00
RM 3000 - 3999	836	830,787	39,371,333.30	47.39	0.00	0.00	5,000.00	31.44	63.34	0.00	0.00
RM 4000 - 4999	600	621,505	30,085,818.00	48.41	0.00	0.00	3,500.00	27.24	69.57	0.00	0.00
RM 5000 and above	1,635	1,621,155	198,766,359.60	122.61	30.00	0.00	10,000.00	80.89	164.33	0.00	30.00
<b>Household Income Quintiles</b>											
Q1 (lowest)	1,162	1,022,362	41,595,585.30	40.69	0.00	0.00	6,000.00	17.11	64.26	0.00	20.00
Q2	1,123	918,377	18,136,854.90	19.75	0.00	0.00	3,000.00	15.25	24.25	0.00	20.00
Q3	1,292	1,200,629	30,390,201.90	25.31	0.00	0.00	1,100.00	19.90	30.73	0.00	200.00
Q4	1,329	1,351,378	67,762,180.30	50.14	0.00	0.00	5,000.00	36.39	63.89	0.00	500.00
Q5 (highest)	1,542	1,520,230	193,512,698.90	127.29	50.00	0.00	10,000.00	83.06	171.52	0.00	800.00
<b>Malaysia Poverty Line*</b>											
Poor	834	757,764	35,538,025.40	46.90	0.00	0.00	6,000.00	15.58	78.21	0.00	10.00
Non-poor	5,614	5,255,211	315,859,495.90	60.10	0.00	0.00	10,000.00	45.92	74.29	0.00	450.00
<b>Highest education of the head of household</b>											
No formal education	33	24,891	380,619.20	15.29	20.00	0.00	120.00	5.37	25.21	10.00	80.00
Primary education	181	150,095	11,664,012.40	77.71	40.00	0.00	1,750.00	30.63	124.79	10.00	600.00
Secondary education	483	495,772	33,079,538.90	66.72	300.00	0.00	2,000.00	51.52	81.93	10.00	700.00
Tertiary education	406	424,324	55,882,728.90	131.70	500.00	0.00	10,000.00	78.12	185.28	20.00	1,100.00
Unclassified	14	13,412	776,472.90	57.89	400.00	0.00	240.00	20.40	95.39	0.00	1,000.00
<b>Total Expenditures Quintiles</b>											
Q1 (lowest)	985	827,991	14,253,541.90	17.21	0.00	0.00	950.00	12.21	22.22	0.00	20.00
Q2	1,332	1,101,677	35,327,757.60	32.07	0.00	0.00	2,000.00	23.07	41.07	0.00	60.00
Q3	1,359	1,196,819	36,841,441.50	30.78	0.00	0.00	3,000.00	25.01	36.55	0.00	250.00
Q4	1,325	1,310,770	61,455,552.20	46.89	0.00	0.00	5,000.00	33.71	60.06	0.00	400.00
Q5 (highest)	1,396	1,530,986	201,768,384.90	131.79	20.00	0.00	10,000.00	85.83	177.75	0.00	750.00

\* Poverty line for Poor Household income : Peninsular Malaysia - RM763 and below per month; Sabah - Household income RM1048 and below per month; Sarawak - Household income RM912 and below per month

Table 5.17: Total Out-of-Pocket Health Expenditure for Outpatient Care by Sociodemographic

Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>MALAYSIA</b>	3,615	3,321,821	2,847,116,786.40	857.10	260.00	0.00	728,000.00	671.69	1,042.50	0.00	7,800.00
<b>State</b>											
Johor	365	438,276	531,100,854.00	1,211.79	3,120.00	0.00	728,000.00	556.08	1,867.51	260.00	9,100.00
Kedah	181	193,922	138,114,321.40	712.22	260.00	0.00	390,000.00	166.11	1,258.32	0.00	6,500.00
Kelantan	130	93,458	32,211,221.00	344.66	0.00	0.00	156,000.00	52.94	636.38	0.00	2,600.00
Melaka	233	99,206	94,405,758.20	951.61	260.00	0.00	156,000.00	358.90	1,544.33	0.00	9,100.00
Negeri Sembilan	268	166,767	75,325,789.70	451.68	260.00	0.00	71,760.00	301.41	601.96	0.00	6,760.00
Pahang	162	140,808	52,120,367.70	370.15	0.00	0.00	52,000.00	198.63	541.67	0.00	5,200.00
Pulau Pinang	217	169,531	221,592,763.20	1,307.10	260.00	0.00	260,000.00	281.11	2,333.08	0.00	7,280.00
Perak	300	411,648	290,264,856.70	705.13	260.00	0.00	442,000.00	375.54	1,034.72	0.00	6,500.00
Perlis	164	25,964	6,852,492.50	263.92	260.00	0.00	130,000.00	155.52	372.32	0.00	1,300.00
Selangor	472	563,489	472,177,069.40	837.95	260.00	0.00	30,000.00	637.01	1,038.90	0.00	11,700.00
Terengganu	139	67,574	24,147,072.70	357.34	260.00	0.00	104,000.00	206.31	508.37	0.00	5,200.00
Sabah & Labuan	463	440,065	392,477,029.50	891.86	260.00	0.00	520,000.00	199.65	1,584.08	260.00	7,800.00
Sarawak	212	224,637	95,424,895.40	424.80	260.00	0.00	226,200.00	240.42	609.17	0.00	3,640.00
WP Kuala Lumpur	163	273,218	411,735,842.00	1,506.99	7,800.00	0.00	570,700.00	184.76	2,829.21	260.00	13,000.00
WP Putrajaya	146	13,259	9,166,453.00	691.32	0.00	0.00	104,000.00	530.56	852.08	0.00	10,400.00
<b>State</b>											
Peninsular Malaysia	2,940	2,657,120	2,359,214,861.50	887.88	260.00	0.00	728,000.00	687.26	1,088.51	0.00	9,100.00
Sabah	463	440,065	392,477,029.50	891.86	260.00	0.00	520,000.00	199.65	1,584.08	260.00	7,800.00
Sarawak	212	224,637	95,424,895.40	424.80	260.00	0.00	226,200.00	240.42	609.17	0.00	3,640.00
<b>Location</b>											
Urban	2,040	2,356,592	2,436,387,095.00	1,033.86	260.00	0.00	728,000.00	775.72	12,920.00	0.00	9,880.00
Rural	1,575	965,229	410,729,691.30	425.53	260.00	0.00	520,000.00	327.27	523.78	0.00	5,200.00
<b>Sex</b>											
Male	1,651	1,593,691	1,408,647,189.30	883.89	260.00	0.00	728,000.00	602.84	1,164.94	0.00	7,800.00
Female	1,964	1,728,130	1,438,469,597.10	832.38	260.00	0.00	570,700.00	595.07	1,069.70	0.00	8,320.00
<b>Age group</b>											
0-4	618	536,822	330,864,836.80	616.34	260.00	0.00	78,000.00	495.18	737.50	0.00	7,800.00
5-9	382	341,152	160,898,853.30	471.63	520.00	0.00	67,600.00	389.28	553.98	0.00	7,800.00
10-14	215	199,297	83,472,108.30	418.83	260.00	0.00	98,800.00	250.73	586.94	0.00	6,500.00
15-19	204	218,211	78,079,005.50	357.81	260.00	0.00	52,000.00	239.96	475.67	0.00	6,500.00
20-24	210	268,395	179,510,065.50	668.83	260.00	0.00	104,000.00	438.48	899.18	0.00	9,100.00
25-29	258	295,751	252,798,987.60	854.77	260.00	0.00	260,000.00	341.37	1,368.17	0.00	10,140.00

Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>MALAYSIA</b>	3,615	3,321,821	2,847,116,786.40	857.10	260.00	0.00	728,000.00	671.69	1,042.50	0.00	7,800.00
30-34	209	247,059	325,283,015.80	1,316.62	520.00	0.00	728,000.00	232.22	2,401.02	0.00	10,400.00
35-39	199	192,809	179,817,109.40	932.62	260.00	0.00	234,000.00	438.97	1,426.27	0.00	9,100.00
40-44	221	206,502	299,437,647.20	1,450.05	260.00	0.00	520,000.00	-9.66	2,909.76	0.00	10,400.00
45-49	246	197,835	493,339,335.80	2,493.70	1,300.00	0.00	570,700.00	668.74	4,318.65	260.00	15,600.00
50-54	214	161,964	106,490,270.20	657.49	260.00	0.00	260,000.00	197.25	1,117.74	0.00	4,160.00
55-59	208	135,931	101,316,037.80	745.35	260.00	0.00	260,000.00	286.81	1,203.89	0.00	9,100.00
60-64	136	96,151	44,093,522.50	458.59	260.00	0.00	46,800.00	262.33	654.85	0.00	7,800.00
65-69	101	68,287	42,259,358.20	618.85	260.00	0.00	226,200.00	120.93	1,116.76	0.00	4,940.00
70-74	87	64,303	40,519,815.70	630.13	260.00	0.00	74,100.00	129.53	1,130.74	0.00	1,300.00
75 and above	107	91,352	128,936,816.70	1,411.42	260.00	0.00	442,000.00	223.38	2,599.46	0.00	10,400.00
<b>Marital status</b>											
Single	607	668,953	411,214,037.80	614.71	260.00	0.00	260,000.00	376.70	852.73	0.00	7,800.00
Married	1,656	1,488,473	1,771,066,562.30	1,189.85	260.00	0.00	728,000.00	807.28	1,572.43	0.00	9,880.00
Widow/Widower/Divorcee	225	163,768	112,457,441.70	686.69	260.00	0.00	442,000.00	175.60	1,197.78	0.00	7,800.00
<b>Ethnicity</b>											
Malays	2,157	1,800,343	984,349,721.00	546.76	260.00	0.00	390,000.00	451.90	641.62	0.00	7,800.00
Chinese	521	597,343	1,120,379,398.90	1,875.60	6,500.00	0.00	728,000.00	1,052.51	2,698.70	260.00	13,000.00
Indians	374	325,855	244,540,884.60	750.46	260.00	0.00	130,000.00	516.74	984.18	0.00	9,100.00
Other Bumiputeras	418	459,839	342,694,887.90	745.25	260.00	0.00	520,000.00	78.22	1,412.27	0.00	3,900.00
Others	145	138,441	155,151,894.00	1,120.70	6,500.00	0.00	156,000.00	566.75	1,674.66	0.00	13,000.00
<b>Education</b>											
No formal education	209	146,966	106,202,566.10	722.63	260.00	0.00	442,000.00	146.35	1,298.92	0.00	6,500.00
Primary	893	728,513	590,622,581.60	810.72	260.00	0.00	570,700.00	316.34	1,305.11	0.00	7,800.00
Secondary	1,104	1,080,656	1,175,170,765.70	1,087.46	260.00	0.00	728,000.00	663.28	1,511.64	0.00	9,100.00
Tertiary	479	524,562	519,073,616.30	989.54	260.00	0.00	390,000.00	696.71	1,282.36	0.00	10,400.00
Unclassified	140	152,879	48,640,934.00	318.17	260.00	0.00	26,000.00	211.14	425.20	0.00	6,500.00
<b>Occupation</b>											
Government employee/Semi	281	241,157	207,222,247.60	859.28	260.00	0.00	390,000.00	425.84	1,292.72	0.00	9,100.00
Private employee	752	872,445	950,595,549.90	1,089.58	260.00	0.00	728,000.00	603.86	1,575.29	0.00	10,400.00
Self-employed	359	304,241	319,587,067.80	1,050.44	1,300.00	0.00	260,000.00	516.83	1,584.05	260.00	10,400.00
Unpaid worker/ home maker	421	326,986	412,750,582.30	1,262.29	260.00	0.00	570,700.00	143.46	2,381.12	0.00	7,800.00
Retiree	273	200,822	183,845,275.00	915.47	260.00	0.00	442,000.00	404.39	1,426.54	0.00	9,100.00

Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>MALAYSIA</b>	3,615	3,321,821	2,847,116,786.40	857.10	260.00	0.00	728,000.00	671.69	1,042.50	0.00	7,800.00
<b>Household income group</b>											
Less than RM400	274	222,526	112,583,719.90	505.94	260.00	0.00	104,000.00	333.93	677.94	0.00	7,800.00
RM 400 - 499	58	53,447	64,852,071.90	1,213.39	260.00	0.00	442,000.00	-399.71	2,826.48	0.00	260.00
RM 500 - 699	135	114,554	28,021,960.50	244.62	260.00	0.00	36,400.00	100.79	388.45	0.00	98.80
RM 700 - 999	221	190,003	86,460,389.60	455.05	260.00	0.00	68,900.00	281.41	628.69	0.00	6,500.00
RM 1000 - 1999	712	597,723	259,304,887.00	433.82	260.00	0.00	156,000.00	303.86	563.78	0.00	5,200.00
RM 2000 - 2999	615	584,527	352,644,344.30	603.30	260.00	0.00	520,000.00	398.51	808.08	0.00	7,800.00
RM 3000 - 3999	504	467,429	303,859,389.20	650.07	260.00	0.00	260,000.00	444.42	855.71	0.00	8,060.00
RM 4000 - 4999	334	344,750	568,039,239.00	1,647.69	1,300.00	0.00	570,700.00	513.36	2,782.01	0.00	10,400.00
RM 5000 and above	762	746,863	1,071,350,785.00	1,434.47	5,200.00	0.00	728,000.00	867.85	2,001.09	0.00	11,700.00
<b>Household Income Quintiles</b>											
Q1 (lowest)	777	654,215	327,993,739.30	501.35	260.00	0.00	442,000.00	332.70	670.01	0.00	5,720.00
Q2	611	499,632	222,561,279.70	445.45	260.00	0.00	104,000.00	302.05	588.85	0.00	5,720.00
Q3	721	700,235	446,162,861.20	637.16	260.00	0.00	520,000.00	440.41	833.92	0.00	7,800.00
Q4	771	740,506	789,002,770.60	1,065.49	260.00	0.00	570,700.00	528.40	1,602.58	0.00	9,100.00
Q5 (highest)	735	727,234	1,061,396,135.60	1,459.50	5,200.00	0.00	728,000.00	878.18	2,040.82	0.00	11,700.00
<b>Malaysia Poverty Line*</b>											
Poor	591	504,796	256,881,431.10	508.88	260.00	0.00	442,000.00	302.58	715.18	0.00	5,720.00
Non-poor	3,024	2,817,025	2,590,235,355.20	919.49	260.00	0.00	728,000.00	703.58	1,135.41	0.00	9,100.00
<b>Highest education of the head of household</b>											
No formal education	81	53,596	72,269,168.20	1,348.40	260.00	0.00	442,000.00	-186.26	2,883.06	260.00	7,800.00
Primary education	269	219,628	138,972,870.90	632.76	260.00	0.00	104,000.00	325.99	939.53	0.00	7,800.00
Secondary education	400	397,147	473,489,767.30	1,192.23	260.00	0.00	399,880.00	398.71	1,985.75	0.00	9,360.00
Tertiary education	185	201,768	222,799,786.20	1,104.24	260.00	0.00	390,000.00	535.89	1,672.59	0.00	13,000.00
Unclassified	3	906	65,534.40	72.32	260.00	0.00	7,800.00	-32.35	176.99	260.00	260.00
<b>Total Expenditures Quintiles</b>											
Q1 (lowest)	736	616,676	245,707,630.00	398.44	260.00	0.00	226,200.00	269.16	527.72	0.00	3,900.00
Q2	754	673,014	275,973,180.70	410.06	260.00	0.00	103,480.00	319.13	500.98	0.00	5,720.00
Q3	790	691,143	608,146,611.30	879.91	260.00	0.00	520,000.00	413.89	1,345.94	0.00	7,800.00
Q4	696	700,754	732,027,389.30	1,044.63	520.00	0.00	570,700.00	504.76	1,584.50	0.00	9,880.00
Q5 (highest)	604	613,589	977,355,612.00	1,592.85	6,500.00	0.00	728,000.00	1,013.10	2,172.60	0.00	13,000.00

\* Poverty line for Poor Household income : Peninsular Malaysia - RM763 and below per month; Sabah - Household income RM1048 and below per month; Sarawak - Household income RM912 and below per month

Table 5.18: Total Out-of-Pocket Health Expenditure for Appliances by Sociodemographic

Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>MALAYSIA</b>	3,628	3,675,318	1,170,453,552.70	318.46	2,000.00	0.00	242,000.00	270.58	366.34	1,500.00	3,500.00
<b>State</b>											
Johor	395	506,557	123,168,319.10	243.15	2,000.00	0.00	80,000.00	217.92	268.38	1,000.00	3,000.00
Kedah	199	220,119	60,355,832.60	274.20	2,400.00	0.00	14,000.00	234.92	313.47	1,600.00	3,600.00
Kelantan	112	84,154	22,581,983.50	268.34	2,500.00	0.00	35,000.00	202.23	334.46	1,400.00	3,000.00
Melaka	258	121,266	35,221,398.60	290.45	2,500.00	0.00	30,000.00	246.16	334.73	1,500.00	3,600.00
Negeri Sembilan	189	122,512	29,398,181.80	239.96	1,900.00	0.00	42,500.00	194.11	285.81	1,200.00	2,800.00
Pahang	157	129,992	37,836,825.20	291.07	2,000.00	0.00	16,000.00	237.47	344.67	1,500.00	3,650.00
Pulau Pinang	246	279,752	107,373,781.70	383.82	2,300.00	0.00	110,000.00	213.81	553.83	1,600.00	3,200.00
Perak	211	303,816	76,299,022.20	251.14	2,000.00	0.00	18,000.00	213.75	288.52	1,000.00	3,000.00
Perlis	161	25,512	8,262,656.80	323.87	2,500.00	0.00	20,000.00	272.07	375.67	1,500.00	4,500.00
Selangor	640	876,136	299,643,068.20	342.01	2,500.00	0.00	60,000.00	304.50	379.51	1,500.00	4,000.00
Terengganu	169	96,585	32,963,221.50	341.29	2,500.00	0.00	30,000.00	281.65	400.93	1,500.00	4,000.00
Sabah & Labuan	349	321,284	171,297,233.20	533.16	2,000.00	0.00	242,000.00	34.55	1,031.78	1,000.00	3,500.00
Sarawak	220	274,645	69,680,979.50	253.71	1,800.00	0.00	36,000.00	178.80	328.63	1,000.00	2,800.00
WP Kuala Lumpur	146	298,554	90,577,323.60	303.39	2,500.00	0.00	29,000.00	260.06	346.71	1,500.00	4,000.00
WP Putrajaya	176	14,433	5,793,725.10	401.43	2,500.00	0.00	25,000.00	345.45	457.42	1,400.00	5,000.00
<b>State</b>											
Peninsular Malaysia	3,059	3,079,389	929,475,340.00	301.84	2,200.00	0.00	110,000.00	280.65	323.03	1,500.00	3,500.00
Sabah	349	321,284	171,297,233.20	533.16	2,000.00	0.00	242,000.00	34.55	1,031.78	1,000.00	3,500.00
Sarawak	220	274,645	69,680,979.50	253.71	1,800.00	0.00	36,000.00	178.80	328.63	1,000.00	2,800.00
<b>Location</b>											
Urban	2,413	2,984,415	987,352,947.30	330.84	2,200.00	0.00	242,000.00	272.21	389.46	1,500.00	3,500.00
Rural	1,215	690,903	183,100,605.50	265.02	2,000.00	0.00	80,000.00	241.18	288.86	1,000.00	3,000.00
<b>Sex</b>											
Male	1,557	1,682,947	566,190,139.80	336.43	2,000.00	0.00	242,000.00	239.19	433.66	1,400.00	3,500.00
Female	2,071	1,992,371	604,263,413.00	303.29	2,200.00	0.00	110,000.00	271.67	334.91	1,500.00	3,500.00
<b>Age group</b>											
0-4	9	5,807	1,281,402.70	220.65	1,000.00	0.00	8,500.00	42.67	398.64	91.40	5,000.00
5-9	100	106,939	19,827,129.60	185.41	1,700.00	0.00	7,000.00	165.74	205.07	1,400.00	2,000.00
10-14	327	325,256	74,370,817.70	228.65	1,800.00	0.00	60,000.00	184.09	273.22	1,400.00	2,500.00
15-19	352	439,546	142,764,957.10	324.80	2,000.00	0.00	110,000.00	195.60	454.01	1,500.00	3,000.00

Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>MALAYSIA</b>	3,628	3,675,318	1,170,453,552.70	318.46	2,000.00	0.00	242,000.00	270.58	366.34	1,500.00	3,500.00
20-24	276	361,542	88,902,120.20	245.90	2,300.00	0.00	14,000.00	220.98	270.82	1,500.00	3,000.00
25-29	273	352,779	112,896,161.60	320.02	2,800.00	0.00	20,000.00	279.18	360.86	1,800.00	4,000.00
30-34	218	243,488	77,098,514.10	316.64	3,000.00	0.00	20,000.00	277.82	355.46	1,500.00	4,000.00
35-39	204	220,127	153,260,872.20	696.24	3,000.00	0.00	242,000.00	-23.82	1,416.29	1,600.00	4,500.00
40-44	308	325,829	97,429,560.60	299.02	2,400.00	0.00	30,000.00	264.04	3,340.00	1,500.00	4,000.00
45-49	385	350,460	103,796,990.20	296.17	2,200.00	0.00	42,500.00	256.29	336.05	1,000.00	4,000.00
50-54	382	323,639	98,046,066.40	302.95	2,500.00	0.00	22,000.00	268.90	3,370.00	1,000.00	4,000.00
55-59	279	216,518	76,772,728.20	354.58	2,500.00	0.00	30,000.00	2,950.00	414.16	1,000.00	4,500.00
60-64	204	154,039	46,023,856.00	298.78	2,000.00	0.00	35,000.00	241.97	355.59	1,000.00	4,000.00
65-69	131	100,997	38,301,384.10	379.23	2,000.00	0.00	30,000.00	192.48	565.99	1,200.00	3,800.00
70-74	83	57,378	12,245,792.20	213.42	2,000.00	0.00	15,000.00	157.93	268.92	80.00	2,500.00
75 and above	97	90,973	27,435,199.80	301.58	1,800.00	0.00	80,000.00	179.50	423.65	180.00	3,080.00
<b>Marital status</b>											
Single	993	1,196,172	437,496,406.00	365.75	2,000.00	0.00	242,000.00	222.04	509.46	1,500.00	3,300.00
Married	2,103	1,989,710	617,091,903.70	310.14	2,500.00	0.00	42,500.00	291.18	329.11	1,300.00	4,000.00
Widow/Widower/Divorcee	242	189,153	56,643,629.60	299.46	2,200.00	0.00	80,000.00	241.34	357.58	1,000.00	3,800.00
<b>Ethnicity</b>											
Malays	1,974	1,681,958	559,422,013.00	332.60	2,500.00	0.00	110,000.00	297.15	368.05	1,500.00	3,980.00
Chinese	1,016	1,399,634	451,322,972.50	322.46	2,000.00	0.00	242,000.00	205.12	439.80	1,300.00	3,500.00
Indians	293	259,850	69,302,608.00	266.70	2,300.00	0.00	12,000.00	237.53	295.87	1,400.00	3,500.00
Other Bumiputeras	261	274,889	76,778,415.40	279.31	2,000.00	0.00	36,000.00	214.99	343.62	900.00	2,990.00
Others	84	58,987	13,627,543.80	231.03	1,900.00	0.00	15,000.00	146.38	315.67	500.00	3,000.00
<b>Education</b>											
No formal education	162	128,154	33,114,846.70	258.40	1,700.00	0.00	80,000.00	165.50	351.29	250.00	2,800.00
Primary	994	871,782	180,102,949.70	206.59	1,800.00	0.00	15,000.00	194.38	218.80	1,000.00	2,700.00
Secondary	1,424	1,504,336	442,262,597.60	293.99	2,000.00	0.00	50,000.00	270.34	317.64	1,500.00	3,500.00
Tertiary	904	1,017,793	447,068,124.60	439.25	3,000.00	0.00	242,000.00	278.80	599.71	1,700.00	4,700.00
Unclassified	127	137,361	64,232,670.80	467.62	1,900.00	0.00	110,000.00	85.84	849.39	1,500.00	2,500.00
<b>Occupation</b>											
Government employee/Semi	473	382,656	133,099,415.60	347.83	3,000.00	0.00	30,000.00	307.75	387.92	1,600.00	4,500.00
Private employee	872	1,106,198	343,901,636.60	310.89	2,500.00	0.00	22,000.00	2,900.00	331.77	1,500.00	4,000.00
Self-employed	530	470,143	214,878,167.80	457.05	2,000.00	0.00	242,000.00	1,170.00	797.10	1,000.00	3,400.00
Unpaid worker/ home maker	454	387,747	105,103,762.70	271.06	2,500.00	0.00	30,000.00	249.97	292.16	1,500.00	3,700.00
Retiree	334	278,772	94,477,679.30	338.91	2,000.00	0.00	35,000.00	262.14	415.68	550.00	4,000.00

Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>MALAYSIA</b>	3,628	3,675,318	1,170,453,552.70	318.46	2,000.00	0.00	242,000.00	270.58	366.34	1,500.00	3,500.00
<b>Household income group</b>											
Less than RM400	238	229,254	64,886,685.40	283.03	2,000.00	0.00	60,000.00	213.90	352.17	990.00	3,000.00
RM 400 - 499	31	26,969	4,651,749.10	172.48	1,000.00	0.00	10,000.00	87.28	257.68	300.00	2,500.00
RM 500 - 699	69	53,330	14,141,811.90	265.18	2,000.00	0.00	16,000.00	182.58	347.78	1,000.00	3,000.00
RM 700 - 999	135	108,001	23,753,599.30	219.94	2,000.00	0.00	8,000.00	182.99	256.89	1,430.00	3,000.00
RM 1000 - 1999	559	480,817	110,701,633.30	230.24	2,000.00	0.00	17,000.00	211.62	248.86	1,200.00	3,000.00
RM 2000 - 2999	537	522,705	130,800,559.50	250.24	2,000.00	0.00	42,500.00	226.13	274.34	1,280.00	3,000.00
RM 3000 - 3999	479	511,833	131,773,752.60	257.45	2,000.00	0.00	22,000.00	228.69	286.22	1,000.00	3,000.00
RM 4000 - 4999	427	494,006	169,815,548.50	343.75	2,400.00	0.00	110,000.00	240.69	446.81	1,500.00	3,500.00
RM 5000 and above	1,153	1,248,402	519,928,213.20	416.47	2,500.00	0.00	242,000.00	283.99	548.96	1,500.00	4,000.00
<b>Household Income Quintiles</b>											
Q1 (lowest)	546	480,984	120,084,358.40	249.66	2,000.00	0.00	60,000.00	212.63	286.70	1,000.00	3,000.00
Q2	471	401,395	94,308,542.90	234.95	2,000.00	0.00	17,000.00	214.50	255.40	1,200.00	3,000.00
Q3	668	665,377	170,902,489.10	256.85	2,000.00	0.00	42,500.00	234.51	279.19	1,300.00	3,200.00
Q4	852	942,234	289,174,536.00	306.90	2,000.00	0.00	110,000.00	250.05	363.76	1,200.00	3,500.00
Q5 (highest)	1,091	1,185,328	495,983,626.20	418.44	2,500.00	0.00	242,000.00	278.88	557.99	1,500.00	4,000.00
<b>Malaysia Poverty Line*</b>											
Poor	412	369,113	97,705,054.10	264.70	2,000.00	0.00	60,000.00	217.94	311.46	900.00	3,000.00
Non-poor	3,216	3,306,205	1,072,748,498.70	324.47	2,200.00	0.00	242,000.00	271.47	377.46	1,500.00	3,500.00
<b>Highest education of the head of household</b>											
No formal education	63	45,234	8,516,826.60	188.28	1,700.00	0.00	16,000.00	125.65	250.92	300.00	2,300.00
Primary education	327	268,966	55,871,588.90	207.73	1,700.00	0.00	15,000.00	181.75	233.71	300.00	3,000.00
Secondary education	516	520,932	153,875,980.00	295.39	2,000.00	0.00	29,000.00	262.99	327.78	1,300.00	3,700.00
Tertiary education	351	389,883	156,865,207.60	402.34	3,000.00	0.00	30,000.00	341.35	463.33	2,000.00	5,000.00
Unclassified	8	6,704	1,570,247.00	234.24	3,000.00	0.00	3,700.00	153.17	315.32	1,000.00	3,000.00
<b>Total Expenditures Quintiles</b>											
Q1 (lowest)	502	408,387	86,016,903.80	210.63	1,800.00	0.00	18,000.00	189.73	231.52	700.00	3,000.00
Q2	682	613,817	249,160,041.10	405.92	2,500.00	0.00	242,000.00	144.55	667.28	1,500.00	3,500.00
Q3	717	668,447	172,558,155.20	258.15	2,000.00	0.00	20,000.00	239.47	276.83	1,490.00	3,200.00
Q4	714	815,666	238,491,687.70	292.39	2,200.00	0.00	80,000.00	263.58	321.20	1,500.00	3,500.00
Q5 (highest)	977	1,132,430	415,348,834.90	366.78	2,300.00	0.00	110,000.00	310.40	423.15	1,500.00	4,000.00

\* Poverty line for Poor Household income : Peninsular Malaysia - RM763 and below per month; Sabah - Household income RM1048 and below per month; Sarawak - Household income RM912 and below per month

Table 5.19: Total Out-of-Pocket Health Expenditure for Promotive and Preventive Care by Sociodemographic

Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>MALAYSIA</b>	21,130	19,206,490	10,672,541,591.60	555.67	0.00	0.00	130,416.00	454.10	657.25	0.00	0.00
<b>State</b>											
Johor	1,852	2,278,429	999,414,165.80	438.64	0.00	0.00	260,000.00	339.46	537.82	0.00	260.00
Kedah	1,267	1,343,769	478,971,330.90	356.44	0.00	0.00	520,000.00	199.92	512.95	0.00	0.00
Kelantan	1,360	1,021,123	179,481,878.00	175.77	0.00	0.00	161,200.00	122.34	229.20	0.00	0.00
Melaka	1,185	568,937	245,761,986.00	431.97	0.00	0.00	130,000.00	240.81	623.12	0.00	0.00
Negeri Sembilan	1,156	704,396	233,742,462.10	331.83	0.00	0.00	260,000.00	198.88	464.78	0.00	0.00
Pahang	1,163	941,200	283,217,463.40	300.91	0.00	0.00	130,000.00	229.64	372.18	0.00	260.00
Pulau Pinang	1,343	1,099,053	838,022,438.10	762.49	0.00	0.00	806,000.00	507.08	1,017.91	0.00	260.00
Perak	1,193	1,640,252	1,043,610,672.30	636.25	0.00	0.00	572,000.00	330.24	942.26	0.00	0.00
Perlis	1,107	158,941	45,580,055.30	286.77	0.00	0.00	351,000.00	180.77	392.78	0.00	0.00
Selangor	3,056	3,741,967	2,572,768,027.70	687.54	0.00	0.00	650,000.00	553.18	821.91	0.00	520.00
Terengganu	1,312	683,678	265,369,278.90	388.15	0.00	0.00	130,416.00	105.20	671.10	0.00	0.00
Sabah & Labuan	2,398	2,268,702	891,774,040.80	393.08	0.00	0.00	226,200.00	261.89	524.26	0.00	0.00
Sarawak	1,373	1,522,984	786,088,955.20	516.15	0.00	0.00	340,600.00	309.74	722.56	0.00	260.00
WP Kuala Lumpur	699	1,175,635	1,768,075,338.40	1,503.93	0.00	0.00	117,000.00	108.68	2,899.18	0.00	2,210.00
WP Putrajaya	666	57,423	40,663,498.70	708.14	0.00	0.00	780,000.00	402.02	1,014.26	0.00	0.00
<b>State</b>											
Peninsular Malaysia	17,359	15,414,804	8,994,678,595.60	583.51	0.00	0.00	130,416.00	460.23	706.78	0.00	0.00
Sabah	2,398	2,268,702	891,774,040.80	393.08	0.00	0.00	226,200.00	261.89	524.26	0.00	0.00
Sarawak	1,373	1,522,984	786,088,955.20	516.15	0.00	0.00	340,600.00	309.74	722.56	0.00	260.00
<b>Location</b>											
Urban	12,240	13,774,457	9,219,527,708.10	669.32	0.00	0.00	130,416.00	529.78	808.87	0.00	260.00
Rural	8,890	5,432,034	1,453,013,883.50	267.49	0.00	0.00	538,200.00	214.07	320.91	0.00	0.00
<b>Sex</b>											
Male	7,499	7,051,402	2,932,128,378.30	415.82	0.00	0.00	117,000.00	256.56	575.08	0.00	0.00
Female	13,631	12,155,088	7,740,413,213.30	636.80	0.00	0.00	130,416.00	538.22	735.38	0.00	0.00
<b>Age group</b>											
0-4	2,709	2,311,220	666,327,027.30	288.30	0.00	0.00	169,000.00	244.91	331.69	0.00	2,600.00
5-9	2,822	2,530,125	881,514,301.60	348.41	0.00	0.00	520,000.00	210.33	486.48	0.00	780.00
10-14	2,097	1,890,031	382,746,055.30	202.51	0.00	0.00	182,000.00	136.39	268.63	0.00	0.00
15-19	816	899,530	101,021,382.70	112.30	0.00	0.00	182,000.00	58.03	166.58	0.00	0.00
20-24	1,308	1,617,799	547,695,747.10	338.54	0.00	0.00	260,260.00	232.54	444.55	0.00	0.00
25-29	1,417	1,633,725	1,113,992,301.80	681.87	0.00	0.00	338,000.00	355.96	1,007.78	0.00	0.00



Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>MALAYSIA</b>	21,130	19,206,490	10,672,541,591.60	555.67	0.00	0.00	130,416.00	454.10	657.25	0.00	0.00
30-34	1,316	1,380,125	1,297,692,094.40	940.27	0.00	0.00	80,600.00	635.51	1,245.03	0.00	260.00
35-39	1,309	1,262,885	1,350,737,102.10	1,069.56	0.00	0.00	130,416.00	765.11	1,374.02	0.00	1,300.00
40-44	1,356	1,213,442	1,151,900,494.80	949.28	0.00	0.00	54,080.00	634.15	1,264.41	0.00	260.00
45-49	1,341	1,114,540	760,626,878.60	682.46	0.00	0.00	23,400.00	545.94	818.97	0.00	260.00
50-54	1,275	954,547	801,667,187.90	839.84	0.00	0.00	27,820.00	608.17	1,071.51	0.00	260.00
55-59	1,166	780,101	502,237,735.80	643.81	0.00	0.00	35,100.00	455.30	832.32	0.00	260.00
60-64	773	592,623	721,446,972.00	1,217.38	0.00	0.00	117,000.00	-129.50	2,564.26	0.00	260.00
65-69	536	395,352	145,810,338.00	368.81	0.00	0.00	65,000.00	178.45	559.17	0.00	260.00
70-74	418	280,440	74,326,570.00	265.04	0.00	0.00	11,960.00	140.42	389.65	0.00	0.00
75 and above	471	350,007	172,799,402.30	493.70	0.00	0.00	26,000.00	250.13	737.28	0.00	0.00
<b>Marital status</b>											
Single	3,183	3,506,538	1,442,960,887.80	411.51	0.00	0.00	33,800.00	252.33	570.68	0.00	0.00
Married	9,320	8,310,350	6,864,107,280.20	825.97	0.00	0.00	130,416.00	652.89	999.05	0.00	260.00
Widow/Widower/Divorcee	1,351	977,007	439,835,648.90	450.19	0.00	0.00	65,000.00	274.43	625.95	0.00	0.00
<b>Ethnicity</b>											
Malays	12,764	10,315,117	3,885,545,044.80	376.68	0.00	0.00	130,416.00	319.52	433.85	0.00	0.00
Chinese	3,526	4,302,705	5,178,163,715.50	1,203.47	0.00	0.00	117,000.00	812.15	1,594.79	0.00	3,900.00
Indians	1,615	1,337,696	699,756,174.30	523.11	0.00	0.00	80,600.00	243.28	802.93	0.00	0.00
Other Bumiputeras	2,183	2,323,029	601,782,713.50	259.05	0.00	0.00	22,620.00	157.74	360.36	0.00	0.00
Others	1,042	927,943	307,293,943.50	331.16	0.00	0.00	18,200.00	228.27	434.04	0.00	0.00
<b>Education</b>											
No formal education	1,290	930,333	209,201,326.20	224.87	0.00	0.00	12,480.00	146.39	303.34	0.00	3,640.00
Primary	5,969	5,037,388	1,745,700,384.80	346.55	0.00	0.00	52,000.00	277.43	415.67	0.00	7,800.00
Secondary	6,050	5,861,828	3,719,156,588.50	634.47	0.00	0.00	117,000.00	455.28	813.66	0.00	13,260.00
Tertiary	2,875	3,017,435	3,742,732,830.00	1,240.37	0.00	0.00	130,416.00	961.06	1,519.68	0.00	31,200.00
Unclassified	1,204	1,131,043	261,612,675.40	231.30	0.00	0.00	13,000.00	161.53	301.07	0.00	5,200.00
<b>Occupation</b>											
Government employee/Semi	1,680	1,342,618	1,246,716,017.00	928.57	0.00	0.00	46,800.00	710.33	1,146.81	0.00	260.00
Private employee	3,520	4,037,836	2,968,070,030.00	735.06	0.00	0.00	5,408.00	522.66	947.47	0.00	0.00
Self-employed	2,164	1,839,285	1,908,863,918.00	1,037.83	0.00	0.00	130,416.00	577.33	1,498.32	0.00	260.00
Unpaid worker/ home maker	3,128	2,652,736	1,671,503,291.00	630.11	0.00	0.00	7,800.00	465.69	794.52	0.00	260.00
Retiree	1,416	1,048,810	468,160,403.50	446.37	0.00	0.00	6,500.00	273.16	619.58	0.00	0.00

Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>MALAYSIA</b>	21,130	19,206,490	10,672,541,591.60	555.67	0.00	0.00	130,416.00	454.10	657.25	0.00	0.00
<b>Household income group</b>											
Less than RM400	1,760	1,561,473	455,867,367.00	291.95	0.00	0.00	572,000.00	184.61	399.28	0.00	0.00
RM 400 - 499	338	311,815	78,177,939.40	250.72	0.00	0.00	260,000.00	22.02	479.42	0.00	0.00
RM 500 - 699	843	666,866	126,798,284.30	190.14	0.00	0.00	143,000.00	66.64	313.64	0.00	0.00
RM 700 - 999	1,350	1,140,610	211,564,261.20	185.48	0.00	0.00	143,000.00	65.82	305.14	0.00	0.00
RM 1000 - 1999	4,304	3,474,197	685,215,126.60	197.23	0.00	0.00	208,000.00	158.96	235.50	0.00	0.00
RM 2000 - 2999	3,492	3,203,782	1,192,130,501.00	372.10	0.00	0.00	780,000.00	282.13	462.07	0.00	0.00
RM 3000 - 3999	2,728	2,568,884	1,458,499,511.00	567.76	0.00	0.00	650,000.00	367.95	767.56	0.00	0.00
RM 4000 - 4999	1,835	1,851,289	1,046,120,632.00	565.08	0.00	0.00	267,800.00	451.91	678.25	0.00	260.00
RM 5000 and above	4,480	4,427,574	5,418,167,969.00	1,223.73	0.00	0.00	130,416.00	860.98	1,586.48	0.00	6,240.00
<b>Household Income Quintiles</b>											
Q1 (lowest)	4,820	4,079,741	922,817,629.60	226.20	0.00	0.00	572,000.00	166.84	285.55	0.00	0.00
Q2	3,668	2,983,100	618,554,069.10	207.35	0.00	0.00	208,000.00	164.28	250.43	0.00	0.00
Q3	4,209	3,905,842	1,818,064,492.00	465.47	0.00	0.00	780,000.00	303.90	627.04	0.00	0.00
Q4	4,238	4,084,097	2,416,617,134.00	591.71	0.00	0.00	806,000.00	480.45	702.98	0.00	260.00
Q5 (highest)	4,195	4,153,711	4,896,488,267.00	1,178.82	0.00	0.00	130,416.00	800.60	1,557.04	0.00	5,200.00
<b>Malaysia Poverty Line*</b>											
Poor	3,652	3,189,372	812,188,168.60	254.65	0.00	0.00	130,416.00	180.11	329.20	0.00	0.00
Non-poor	17,478	16,017,119	9,860,353,423.00	615.61	0.00	0.00	572,000.00	495.94	735.29	0.00	260.00
<b>Highest education of the head of household</b>											
No formal education	399	268,123	67,348,195.50	251.18	0.00	0.00	83,200.00	138.23	364.14	0.00	0.00
Primary education	1,209	937,889	277,011,008.10	295.36	0.00	0.00	260,000.00	206.04	384.67	0.00	260.00
Secondary education	1,771	1,657,608	1,321,772,195.00	797.40	0.00	0.00	117,000.00	287.25	1,307.55	0.00	0.00
Tertiary education	945	966,233	1,162,847,346.00	1,203.48	0.00	0.00	538,200.00	655.83	1,751.14	0.00	260.00
Unclassified	43	39,978	21,283,666.10	532.38	0.00	0.00	78,000.00	-52.72	1,117.49	0.00	260.00
<b>Total Expenditures Quintiles</b>											
Q1 (lowest)	4,060	3,407,817	560,102,180.40	164.36	0.00	0.00	248,300.00	120.24	208.47	0.00	0.00
Q2	4,149	3,398,579	938,342,986.90	276.10	0.00	0.00	234,000.00	205.13	347.06	0.00	0.00
Q3	4,151	3,652,699	1,479,863,627.00	405.14	0.00	0.00	130,416.00	302.92	507.36	0.00	0.00
Q4	4,299	4,061,002	2,569,739,702.00	632.78	0.00	0.00	650,000.00	476.06	789.51	0.00	520.00
Q5 (highest)	4,231	4,451,322	4,938,738,819.00	1,109.50	0.00	0.00	117,000.00	759.81	1,459.19	0.00	5,200.00

\* Poverty line for Poor Household income : Peninsular Malaysia - RM763 and below per month; Sabah - Household income RM1048 and below per month; Sarawak - Household income RM912 and below per month

Table 5.20: Total Out of Pocket Health Expenditure for Transportation, Accommodation &amp; Others by Type of Care

Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>Inpatient care</b>											
Transportation	1,757	1,667,174	30,031,918.10	18.01	100.00	0.00	10,350.00	14.49	21.53	50.00	150.00
Accommodation	1,849	1,777,624	15,810,476.50	8.89	0.00	0.00	75,000.00	1.41	16.38	0.00	0.00
Others	1,852	1,779,116	28,060,511.50	15.77	0.00	0.00	31,000.00	8.55	22.99	0.00	0.00
<b>Dental care</b>											
Transportation	6,235	5,799,393	32,636,180.60	5.63	10.00	0.00	7,500.00	4.15	7.11	0.00	50.00
Accommodation	6,376	5,932,769	132,802.60	0.02	0.00	0.00	900.00	-0.01	0.06	0.00	0.00
Others	6,373	5,926,259	4,973,220.10	0.84	0.00	0.00	3,000.00	0.63	1.05	0.00	0.00
<b>Outpatient care</b>											
Transportation	3,419	3,143,775	485,126,724.20	154.31	1,040.00	0.00	210,600.00	140.46	168.16	260.00	1,820.00
Accommodation	3,584	3,291,891	5,195,552.20	1.58	0.00	0.00	10,400.00	0.89	2.26	0.00	0.00
Others	3,589	3,292,996	106,772,168.10	32.42	0.00	0.00	104,000.00	25.15	39.70	0.00	0.00

Table 5.21: Total Out of Pocket Health Expenditure for Promotive &amp; Preventive Care by Type of Spending

Sociodemographic characteristics	Count	Estimated population	Sum	Mean	Median	Min	Max	95% CI		Q1	Q3
								Lower	Upper		
<b>Overall</b>	21,130	19,206,490	10,672,541,591.60	555.67	0.00	0.00	1,304,160.00	454.10	657.25	0.00	0.00
Medical check-up	7,923	7,093,775	2,821,861,493.50	397.79	0.00	0.00	1,170,000.00	247.15	548.44	0.00	0.00
Family planning	741	700,034	763,397,066.50	1,090.51	0.00	0.00	1,300,000.00	542.12	1,638.91	0.00	2,080.00
Vaccination	3,170	3,018,946	720,977,407.40	238.82	0.00	0.00	234,000.00	168.27	309.37	0.00	0.00
Pap smear	1,152	1,019,239	592,360,170.60	581.18	0.00	0.00	780,000.00	425.04	737.32	0.00	0.00
Mammogram	521	465,359	248,666,488.20	534.35	0.00	0.00	182,000.00	330.68	738.03	0.00	0.00
Vitamin & supplement	16,808	14,967,193	5,525,278,965.40	369.16	0.00	0.00	780,000.00	310.44	427.88	0.00	0.00

\* Poverty line for Poor Household income : Peninsular Malaysia - RM763 and below per month; Sabah - Household income RM1048 and below per month; Sarawak - Household income RM912 and below per month

## 5.6 DEFINITION OF VARIABLES

Variable name	Variable in SPSS	Weight	Definition of Variable	SPSS variable definition
Total paid for all admission	B2510abcd	pweight	Total OOP payment for admission/hospitalisation in all health facilities	COMPUTE B2510abcd=SUM(B2510a,B2510b,B2510c,B2510d). VARIABLE LABELS B2510abcd 'Annual B2510abcd'. EXECUTE.
Total paid for all admission	B2510abcd_allrespondent	pweight	Total paid for admission/hospitalisation in all health facilities; All missing and other values were coded as 0.	RECODE B2510abcd (-44=0) (-7=0) (-5=0) (-8=0) (-9=0) (ELSE=Copy) INTO B2510abcd_allrespondent. EXECUTE.
Total paid for medication/ appliances	B2511abcd	pweight	Total OOP payment for medication/appliances outside all the health facilities upon advised by the health care provider	COMPUTE B2511abcd=SUM(B2511a,B2511b,B2511c,B2511d). VARIABLE LABELS B2511abcd 'Annual B2511abcd'. EXECUTE.
Total paid for medication/ appliances	B2511abcd_allrespondent	pweight	Total OOP payment made outside the hospital upon advised by the health care provider; All missing and other values were coded as 0.	RECODE B2511abcd (-44=0) (-7=0) (-5=0) (-8=0) (-9=0) (ELSE=Copy) INTO B2511abcd_allrespondent. EXECUTE.
Total OOP for inpatient care	inpatient	pweight	Overall total OOP payment for inpatient care which includes total paid for all admission/hospitalisation & total paid for medication/ appliances	COMPUTE inpatient=Sum(B2510abcd, B2511abcd). VARIABLE LABELS inpatient 'inpatient spending B2510 + B2511'. EXECUTE.
Total OOP for inpatient care	inpatient_allrespondent	pweight	Overall total OOP payment for inpatient care which includes total paid for all admission/hospitalisation & total paid for medication/ appliances; All missing and other values were coded as 0.	RECODE inpatient (SYSMIS=0) (ELSE=Copy) INTO inpatient_allrespondent. EXECUTE.
Total paid for all visit	B3510abcd	pweight	Total OOP payment for visits in all health facilities	COMPUTE B3510abcd=SUM(B3510a,B3510b,B3510c,B3510d). VARIABLE LABELS B3510abcd 'Annual B3510abcd'. EXECUTE.
Total paid for all visit	B3510abcd_allrespondent	pweight	Total OOP payment for visits in all health facilities; All missing and other values were coded as 0.	RECODE B3510abcd (SYSMIS=0) (ELSE=Copy) INTO B3510abcd_allrespondent. EXECUTE.
Total paid for medication/ appliances	B3511abcd	pweight	Total OOP payment for medication/appliances outside the health facilities upon advised by the health care provider	COMPUTE B3511abcd=SUM(B3511a,B3511b,B3511c,B3511d). VARIABLE LABELS B3511abcd 'Annual B3511abcd'. EXECUTE.
Total paid for medication/ appliances	B3511abcd_allrespondent	pweight	Total OOP payment for medication/appliances outside the health facilities upon advised by the health care provider; All missing and other values were coded as 0.	RECODE B3511abcd (SYSMIS=0) (ELSE=Copy) INTO B3511abcd_allrespondent. EXECUTE.
Total OOP for oral health care	dental	pweight	Overall total OOP payment for inpatient care which includes total paid for visits & total paid for medication/ appliances	COMPUTE dental=Sum(B3510abcd, B3511abcd). VARIABLE LABELS dental 'dental spending B3510 + B3511'. EXECUTE.

Variable name	Variable in SPSS	Weight	Definition of Variable	SPSS variable definition
Total OOP for oral health care	dental_allrespondent	pweight	Overall total OOP payment for inpatient care which includes total paid for visits & total paid for medication/ appliances; All missing and other values were coded as 0.	RECODE dental (SYSMIS=0) (ELSE=Copy) INTO dental_allrespondent. EXECUTE.
Total paid for 1 <sup>st</sup> outpatient visit	B4510a_annual	pweight	Total OOP payment for the visit in the 1 <sup>st</sup> health facility	COMPUTE B4510a_annual=B4510a*26. VARIABLE LABELS B4510a_annual 'Annual B4510a'. EXECUTE.
Total paid for 2 <sup>nd</sup> outpatient visit	B4510b_annual	pweight	Total OOP payment for the visit in the 2 <sup>nd</sup> health facility	COMPUTE B4510b_annual=B4510b*26. VARIABLE LABELS B4510b_annual 'Annual B4510b'. EXECUTE.
Total paid for 3 <sup>rd</sup> outpatient visit	B4510c_annual	pweight	Total OOP payment for the visit in the 3 <sup>rd</sup> health facility	COMPUTE B4510c_annual=B4510c*26. VARIABLE LABELS B4510c_annual 'Annual B4510c'. EXECUTE.
Total paid for 4 <sup>th</sup> outpatient visit	B4510d_annual	pweight	Total OOP payment for the visit in the 4 <sup>th</sup> health facility	COMPUTE B4510d_annual=B4510d*26. VARIABLE LABELS B4510d_annual 'Annual B4510d'. EXECUTE.
Total paid for all outpatient visit	B4510abcd_annual	pweight	Total OOP payment for visit to all the health facilities	COMPUTE B4510abcd_annual=SUM(B4510a_annual,B4510b_annual,B4510c_annual,B4510d_annual). VARIABLE LABELS B4510abcd_annual 'Annual B4510abcd'. EXECUTE.
Total paid for all outpatient visit	B4510abcd_annual	pweight	Total OOP payment for visit to all the health facilities; All missing and other values were coded as 0.	RECODE B4510abcd_annual (SYSMIS=0) (ELSE=Copy) INTO B4510abcd_annual_allrespondent. EXECUTE.
Total paid for medication/ appliances for 1 <sup>st</sup> outpatient visit	B4511a_annual	pweight	Total OOP payment for medication/appliances outside the 1 <sup>st</sup> health facility upon advised by the health care provider	COMPUTE B4511a_annual=B4511a*26. VARIABLE LABELS B4511a_annual 'Annual B4511a'. EXECUTE.
Total paid for medication/ appliances for 2 <sup>nd</sup> outpatient visit	B4511b_annual	pweight	Total OOP payment for medication/appliances outside the 2 <sup>nd</sup> health facility upon advised by the health care provider	COMPUTE B4511b_annual=B4511b*26. VARIABLE LABELS B4511b_annual 'Annual B4511b'. EXECUTE.
Total paid for medication/ appliances for 3 <sup>rd</sup> outpatient visit	B4511c_annual	pweight	Total OOP payment for medication/appliances outside the 3 <sup>rd</sup> health facility upon advised by the health care provider	COMPUTE B4511c_annual=B4511c*26. VARIABLE LABELS B4511c_annual 'Annual B4511c'. EXECUTE.
Total paid for medication/ appliances for 4 <sup>th</sup> outpatient visit	B4511d_annual	pweight	Total OOP payment for medication/appliances outside the 4 <sup>th</sup> health facility upon advised by the health care provider	COMPUTE B4511d_annual=B4511d*26. VARIABLE LABELS B4511d_annual 'Annual B4511d'. EXECUTE.
Total paid for medication/ appliances	B4511abcd_annual	pweight	Total OOP payment for medication/appliances outside all the health facilities upon advised by	COMPUTE B4511abcd_annual=SUM(B4511a_annual,B4511b_annual,B4511c_annual,B4511d_annual). EXECUTE.

Variable name	Variable in SPSS	Weight	Definition of Variable	SPSS variable definition
for all outpatient visit			the health care provider	1c_annual,B4511d_annual). VARIABLE LABELS B4511abcd_annual 'Annual B4511abcd'. EXECUTE.
Total paid for medication/ appliances for all outpatient visit	B4511abcd_annual_allrespondent	pweight	Total OOP payment for medication/appliances outside all the health facilities upon advised by the health care provider; All missing and other values were coded as 0.	RECODE B4511abcd_annual (SYSMIS=0) (ELSE=Copy) INTO B4511abcd_annual_allrespondent. EXECUTE.
Total OOP for outpatient care	outpatient	pweight	Overall total OOP payment for outpatient care which includes total paid for visits & total paid for medication/ appliances	COMPUTE outpatient=Sum(B4510abcd_annual, B4511abcd_annual). VARIABLE LABELS outpatient 'outpatient spending B4510 + B4511'. EXECUTE.
Total OOP for outpatient care	outpatient_allrespondent	pweight	Overall total OOP payment for outpatient care which includes total paid for visits & total paid for medication/ appliances; All missing and other values were coded as 0.	RECODE outpatient (SYSMIS=0) (ELSE=Copy) INTO outpatient_allrespondent. EXECUTE.
Total paid for all outpatient visit in the past 2 weeks	B4510abcd	pweight	Total OOP payment for visits to all the health facilities in 2 weeks	COMPUTE B4510abcd=SUM(B4510a,B4510b,B4510c,B4510d). VARIABLE LABELS B4510abcd '2 weeks B4510abcd'. EXECUTE.
Total paid for all outpatient visit in the past 2 weeks	B4510abcd	pweight	Total OOP payment for visits to all the health facilities in 2 weeks; All missing and other values were coded as 0.	RECODE B4510abcd (SYSMIS=0) (ELSE=Copy) INTO B4510abcd_allrespondent. VARIABLE LABELS B4510abcd_allrespondent '2 weeks outpatient for B4510abcd for all respondent'. EXECUTE.
Total paid for medication/ appliances for all outpatient visit	B4511abcd	pweight	Total OOP payment for medication/appliances outside all the health facilities upon advised by the health care provider in 2 weeks	COMPUTE B4511abcd=SUM(B4511a,B4511b,B4511c,B4511d). VARIABLE LABELS B4511abcd '2 weeks B4511abcd'. EXECUTE.
Total paid for medication/ appliances for all outpatient visit	B4511abcd_allrespondent	pweight	Total OOP payment for medication/appliances outside all the health facilities upon advised by the health care provider in 2 weeks; All missing and other values were coded as 0.	RECODE B4511abcd (SYSMIS=0) (-44 thru -5=0) (ELSE=Copy) INTO B4511abcd_allrespondent. VARIABLE LABELS B4511abcd_allrespondent '2 weeks outpatient for B4511abcd for all respondent'. EXECUTE.
Total OOP for outpatient care in the past 2 weeks	outpatient_2_weeks	pweight	Overall total OOP payment for outpatient care which includes total paid for visits & total paid for medication/ appliances in 2 weeks	COMPUTE outpatient_2_weeks=SUM(B4510abcd,B4511abcd, B4511abcd). EXECUTE.
Total OOP for outpatient care in the past 2 weeks	outpatient_2_weeks	pweight	Overall total OOP payment for outpatient care which includes total paid for visits & total paid for medication/ appliances in 2 weeks; All missing and other values were coded as 0.	RECODE outpatient_2_weeks (SYSMIS=0) (-44 thru -5=0) (ELSE=Copy) INTO outpatient_2_weeks_allrespondent. VARIABLE LABELS outpatient_2_weeks_allrespondent '2 weeks outpatient for all respondent'. EXECUTE.

Variable name	Variable in SPSS	Weight	Definition of Variable	SPSS variable definition
Total OOP for health appliances	appliances	pweight	Overall total OOP payment for health appliances which includes total paid for eyes appliances & total paid for other health appliances	COMPUTE appliances=SUM(B5011, B5021). VARIABLE LABELS appliances 'Annual B5011 & B5021'. EXECUTE.
Total OOP for eye appliances	B5011_allrespondent	pweight	Total OOP payment for eye appliances; All missing and other values were coded as 0.	RECODE B5011 (-44=0) (-7=0) (-5=0) (-8=0) (-9=0) (ELSE=Copy) INTO B5011_allrespondent. EXECUTE.
Total OOP for other health appliances	B5021_allrespondent	pweight	Total OOP payment for other health appliances; All missing and other values were coded as 0.	RECODE B5021 (-44=0) (-7=0) (-5=0) (-8=0) (-9=0) (ELSE=Copy) INTO B5021_allrespondent. EXECUTE.
Total OOP for health appliances	appliances_allrespondent	pweight	Overall total OOP payment for health appliances which includes total paid for eyes appliances & total paid for other health appliances; All missing and other values were coded as 0.	RECODE appliances (SYSMIS=0) (-44 thru -5=0) (ELSE=Copy) INTO appliances_allrespondent. VARIABLE LABELS appliances_allrespondent 'B5011 & B5021 for all respondent'. EXECUTE.
Total OOP for medical check-up	B6011_annual	pweight	Total OOP payment for medical check-up in the past 1 year	COMPUTE B6011_annual=B6011*26. VARIABLE LABELS B6011_annual 'Annual B6011'. EXECUTE.
Total OOP for medical check-up	B6011_annual_allrespondent	pweight	Total OOP payment for medical check-up in the past 1 year; All missing and other values were coded as 0.	RECODE B6011_annual (SYSMIS=0) (ELSE=Copy) INTO B6011_annual_allrespondent. EXECUTE.
Total OOP for family planning	B6021_annual	pweight	Total OOP payment for family planning in the past 1 year	COMPUTE B6021_annual=B6021*26. VARIABLE LABELS B6021_annual 'Annual B6021'. EXECUTE.
Total OOP for family planning	B6021_annual_allrespondent	pweight	Total OOP payment for family planning in the past 1 year; All missing and other values were coded as 0.	RECODE B6021_annual (SYSMIS=0) (ELSE=Copy) INTO B6021_annual_allrespondent. EXECUTE.
Total OOP for vaccination	B6031_annual	pweight	Total OOP payment for vaccination in the past 1 year	COMPUTE B6031_annual=B6031*26. VARIABLE LABELS B6031_annual 'Annual B6031'. EXECUTE.
Total OOP for vaccination	B6031_annual_allrespondent	pweight	Total OOP payment for vaccination in the past 1 year; All missing and other values were coded as 0.	RECODE B6031_annual (SYSMIS=0) (ELSE=Copy) INTO B6031_annual_allrespondent. EXECUTE.
Total OOP for pap smear examination	B6041_annual	pweight	Total OOP payment for pap smear examination in the past 1 year	COMPUTE B6041_annual=B6041*26. VARIABLE LABELS B6041_annual 'Annual B6041'. EXECUTE.
Total OOP for pap smear examination	B6041_annual_allrespondent	pweight	Total OOP payment for pap smear examination in the past 1 year; All missing and other values were coded as 0.	RECODE B6041_annual (SYSMIS=0) (ELSE=Copy) INTO B6041_annual_allrespondent. EXECUTE.

Variable name	Variable in SPSS	Weight	Definition of Variable	SPSS variable definition
Total OOP for mammogram	B6051_annual	pweight	Total OOP payment for mammogram in the past 1 year	COMPUTE B6051_annual=B6051*26. VARIABLE LABELS B6051_annual 'Annual B6051'. EXECUTE.
Total OOP for mammogram	B6051_annual_allrespondent	pweight	Total OOP payment for mammogram in the past 1 year; All missing and other values were coded as 0.	RECODE B6051_annual (SYSMIS=0) (ELSE=Copy) INTO B6051_annual_allrespondent. EXECUTE.
Total OOP for promotive & preventive care	annual_promotive_preventive	pweight	Total OOP payment for medical check-up, family planning, vaccination, pap smear examination and mammogram in the past 1 year	COMPUTE annual_promotive_preventive=SUM(B6011_annual, B6021_annual, B6031_annual, B6041_annual, B6051_annual). VARIABLE LABELS annual_promotive_preventive 'Annual B6011, B6021, B6031, B6041, B6051'. EXECUTE.
Total OOP for promotive & preventive care	annual_promotive_preventive_allrespondent	pweight	Total OOP payment for medical check-up, family planning, vaccination, pap smear examination and mammogram in the past 1 year; All missing and other values were coded as 0.	RECODE annual_promotive_preventive (SYSMIS=0) (ELSE=Copy) INTO annual_promotive_preventive_allrespondent. EXECUTE.
Total OOP for promotive & preventive care in the past 2 weeks	promotive_preventive_2_weeks	pweight	Total OOP payment for medical check-up, family planning, vaccination, pap smear examination and mammogram in the past 2 weeks	COMPUTE promotive_preventive_2_weeks=SUM(B6011, B6021, B6031, B6041, B6051). VARIABLE LABELS promotive_preventive_2_weeks '2 weeks B6011, B6021, B6031, B6041, B6051'. EXECUTE.
Total OOP for medical check-up in the past 2 weeks	B6011_allrespondent	pweight	Total OOP payment for medical check-up in the past 2 weeks; All missing and other values were coded as 0.	RECODE B6011 (SYSMIS=0) (-44 thru -5=0) (ELSE=Copy) INTO B6011_allrespondent. VARIABLE LABELS B6011_allrespondent 'B6011-medical check up for all respondent'. EXECUTE.
Total OOP for family planning in the past 2 weeks	B6021_allrespondent	pweight	Total OOP payment for family planning in the past 2 weeks; All missing and other values were coded as 0.	RECODE B6021 (SYSMIS=0) (-44 thru -5=0) (ELSE=Copy) INTO B6021_allrespondent. VARIABLE LABELS B6021_allrespondent 'B6021-family planning for all respondent'. EXECUTE.
Total OOP for vaccination in the past 2 weeks	B6031_allrespondent	pweight	Total OOP payment for vaccination in the past 2 weeks; All missing and other values were coded as 0.	RECODE B6031 (SYSMIS=0) (-44 thru -5=0) (ELSE=Copy) INTO B6031_allrespondent. VARIABLE LABELS B6031_allrespondent 'B6031-vaccination for all respondent'. EXECUTE.



Variable name	Variable in SPSS	Weight	Definition of Variable	SPSS variable definition
Total OOP for pap smear examination in the past 2 weeks	B6041_allrespondent	pweight	Total OOP payment for pap smear examination in the past 2 weeks; All missing and other values were coded as 0.	RECODE B6041 (SYSMIS=0) (-44 thru -5=0) (ELSE=Copy) INTO B6041_allrespondent. VARIABLE LABELS B6041_allrespondent 'B6041-pap smear for all respondent'. EXECUTE.
Total OOP for mammogram in the past 2 weeks	B6051_allrespondent	pweight	Total OOP payment for mammogram in the past 2 weeks; All missing and other values were coded as 0.	RECODE B6051 (SYSMIS=0) (-44 thru -5=0) (ELSE=Copy) INTO B6051_allrespondent. VARIABLE LABELS B6051_allrespondent 'B6051-mammogram for all respondent'. EXECUTE.
Total OOP for promotive & preventive care in the past 2 weeks	promotive_preventive_2_weeks_allrespondent	pweight	Total OOP payment for medical check-up, family planning, vaccination, pap smear examination and mammogram in the past 2 weeks; All missing and other values were coded as 0.	RECODE promotive_preventive_2_weeks (SYSMIS=0) (-44 thru -5=0) (ELSE=Copy) INTO promotive_preventive_2_weeks_allrespondent. VARIABLE LABELS promotive_preventive_2_weeks_allrespondent 'B6011 to B6051 for all respondent'. EXECUTE.
Total OOP	totoop	pweight	Overall annual total OOP payment for inpatient care - admission/ hospitalisation in all health facilities & medication/appliances outside all the health facilities upon advised by the health care provider; Oral health care - visits in all health facilities & medication/appliances outside all the health facilities upon advised by the health care provider; Outpatient care- visits in all health facilities & medication/appliances outside all the health facilities upon advised by the health care provider; Health appliances- total paid for eyes appliances & total paid for other health appliances; Promotive & preventive care medical check-up, family planning, vaccination, pap smear examination, mammogram and vitamin & supplement.	COMPUTE totoop = SUM (B2510abcd, B2511abcd, B3510abcd, B3511abcd, B4510abcd, B4511abcd, B5011, B5021, B6011, B6021, B6031, B6041, B6051, B6060, B6060). VARIABLE LABELS totoop 'Annual total oop'. EXECUTE.
Total OOP	totoop_allrespondent	pweight	Overall annual total OOP payment for inpatient care, oral health care, outpatient care, health appliances and promotive & preventive care; All missing and other values were coded as 0.	RECODE totoop (SYSMIS=0) (ELSE=Copy) INTO totoop_allrespondent. VARIABLE LABELS totoop_allrespondent 'Annual total oop for all respondent'. EXECUTE.

Variable name	Variable in SPSS	Weight	Definition of Variable	SPSS variable definition
Total inpatient OOP for transport & travel	B2531abcd	pweight	Total inpatient expenditure for transport and travel to all health facilities	COMPUTE B2531abcd=SUM(B2531a,B2531b,B2531c,B2531d). VARIABLE LABELS B2531abcd 'Annual transport & travel for inpatient (B2531abcd)'. EXECUTE.
Total inpatient OOP for transport & travel	B2531abcd_allrespondent	pweight	Total inpatient expenditure for transport and travel to all health facilities; All missing and other values were coded as 0.	RECODE B2531abcd (SYSMIS=0) (ELSE=Copy) INTO B2531abcd_allrespondent. VARIABLE LABELS B2531abcd_allrespondent 'Annual transport & travel for inpatient (B2531abcd) for all respondent'. EXECUTE.
Total inpatient OOP for accommodation	B2532abcd	pweight	Total inpatient expenditure for accommodation to all health facilities	COMPUTE B2532abcd=SUM(B2532a,B2532b,B2532c,B2532d). VARIABLE LABELS B2532abcd 'Annual accommodation for inpatient (B2532abcd)'. EXECUTE.
Total inpatient OOP for accommodation	B2532abcd_allrespondent	pweight	Total inpatient expenditure for accommodation to all health facilities; All missing and other values were coded as 0.	RECODE B2532abcd (SYSMIS=0) (ELSE=Copy) INTO B2532abcd_allrespondent. VARIABLE LABELS B2532abcd_allrespondent 'Annual accommodation for inpatient (B2532abcd) for all respondent'. EXECUTE.
Total inpatient OOP for others	B2533abcd	pweight	Total inpatient expenditure for other expenses to all health facilities	COMPUTE B2533abcd=SUM(B2533a,B2533b,B2533c,B2533d). VARIABLE LABELS B2533abcd 'Annual other expenses for inpatient (B2533abcd)'. EXECUTE.
Total inpatient OOP for others	B2533abcd_allrespondent	pweight	Total inpatient expenditure for other expenses to all health facilities; All missing and other values were coded as 0.	RECODE B2533abcd (SYSMIS=0) (ELSE=Copy) INTO B2533abcd_allrespondent. VARIABLE LABELS B2533abcd_allrespondent 'Annual other expenses for inpatient (B2533abcd) for all respondent'. EXECUTE.
Total dental OOP for transport & travel	B3531abcd	pweight	Total dental care expenditure for transport and travel to all health facilities	COMPUTE B3531abcd=SUM(B3531a,B3531b,B3531c,B3531d). VARIABLE LABELS B3531abcd 'Annual transport & travel for dental (B3531abcd)'. EXECUTE.
Total dental OOP for transport & travel	B3531abcd_allrespondent	pweight	Total dental care expenditure for transport and travel to all health facilities; All missing and other values were coded as 0.	RECODE B3531abcd (SYSMIS=0) (ELSE=Copy) INTO B3531abcd_allrespondent. VARIABLE LABELS B3531abcd_allrespondent 'Annual transport & travel for dental (B3531abcd) for all respondent'. EXECUTE.
Total dental OOP for accommodation	B3532abcd	pweight	Total dental care expenditure for accommodation to all health facilities	COMPUTE B3532abcd=SUM(B3532a,B3532b,B3532c,B3532d). VARIABLE LABELS B3532abcd 'Annual accommodation for dental (B3532abcd)'. EXECUTE.

Variable name	Variable in SPSS	Weight	Definition of Variable	SPSS variable definition
Total dental OOP for accommodation	B3532abcd_allrespondent	pweight	Total dental care expenditure for accommodation to all health facilities; All missing and other values were coded as 0.	RECODE B3532abcd (SYSMIS=0) (ELSE=Copy) INTO B3532abcd_allrespondent. VARIABLE LABELS B3532abcd_allrespondent 'Annual accommodation for dental (B3532abcd) for all respondent'. EXECUTE.
Total dental OOP for others	B3533abcd	pweight	Total dental care expenditure for other expenses to all health facilities	COMPUTE B3533abcd=SUM(B3533a,B3533b,B3533c,B3533d). VARIABLE LABELS B3533abcd 'Annual other expenses for dental (B3533abcd)'. EXECUTE.
Total dental OOP for others	B3533abcd_allrespondent	pweight	Total dental care expenditure for other expenses to all health facilities; All missing and other values were coded as 0.	RECODE B3533abcd (SYSMIS=0) (ELSE=Copy) INTO B3533abcd_allrespondent. VARIABLE LABELS B3533abcd_allrespondent 'Annual other expenses for dental (B3533abcd) for all respondent'. EXECUTE.
Total outpatient OOP for transport & travel	B4531abcd_2_weeks	pweight	Total outpatient care expenditure for transport and travel to all health facilities in the past 2 weeks	COMPUTE B4531abcd_2_weeks=SUM(B4531a,B4531b,B4531c,B4531d). VARIABLE LABELS B4531abcd_2_weeks '2 weeks transport & travel for outpatient (B4531abcd)'. EXECUTE.
Total outpatient OOP for transport & travel	B4531abcd_2_weeks	pweight	Total outpatient care expenditure for transport and travel to all health facilities in the past 2 weeks; All missing and other values were coded as 0.	RECODE B4531abcd_2_weeks (SYSMIS=0) (ELSE=Copy) INTO B4531abcd_2_weeks_allrespondent. VARIABLE LABELS B4531abcd_2_weeks_allrespondent '2 weeks transport & travel for outpatient (B4531abcd) for all respondent'. EXECUTE.
Total outpatient OOP for transport & travel	B4531abcd_annual	pweight	Total outpatient care expenditure for transport and travel to all health facilities in the past 1 year	COMPUTE B4531abcd_annual=SUM(B4531a_annual,B4531b_annual,B4531c_annual,B4531d_annual). VARIABLE LABELS B4531abcd_annual 'Annual transport & travel for outpatient (B4531abcd)'. EXECUTE.
Total outpatient OOP for transport & travel	B4531abcd_annual_allrespondent	pweight	Total outpatient care expenditure for transport and travel to all health facilities in the past 1 year; All missing and other values were coded as 0.	RECODE B4531abcd_annual (SYSMIS=0) (ELSE=Copy) INTO B4531abcd_annual_allrespondent. VARIABLE LABELS B4531abcd_annual_allrespondent 'Annual transport & travel for outpatient (B4531abcd) for all respondent'. EXECUTE.
Total outpatient OOP for accommodation	B4532abcd_2_weeks	pweight	Total outpatient care expenditure for accommodation to all health facilities in the past 2 weeks	COMPUTE B4532abcd_2_weeks=SUM(B4532a,B4532b,B4532c,B4532d). VARIABLE LABELS B4532abcd_2_weeks '2 weeks accommodation for outpatient (B4532abcd)'. EXECUTE.

Variable name	Variable in SPSS	Weight	Definition of Variable	SPSS variable definition
Total outpatient OOP for accommodation	B4532abcd_2_weeks_allrespondent	pweight	Total outpatient care expenditure for accommodation to all health facilities in the past 2 weeks; All missing and other values were coded as 0.	RECODE B4532abcd_2_weeks (SYSMIS=0) (ELSE=Copy) INTO B4532abcd_2_weeks_allrespondent. VARIABLE LABELS B4532abcd_2_weeks_allrespondent '2 weeks accommodation for outpatient (B4532abcd) for all respondent'. EXECUTE.
Total outpatient OOP for accommodation	B4532abcd_annual	pweight	Total outpatient care expenditure for accommodation to all health facilities in the past 1 year	COMPUTE B4532abcd_annual=SUM(B4532a_annual,B4532b_annual,B4532c_annual,B4532d_annual). VARIABLE LABELS B4532abcd_annual 'Annual accommodation for outpatient (B4532abcd)'. EXECUTE.
Total outpatient OOP for accommodation	B4532abcd_annual_allrespondent	pweight	Total outpatient care expenditure for accommodation to all health facilities in the past 1 year; All missing and other values were coded as 0.	RECODE B4532abcd_annual (SYSMIS=0) (ELSE=Copy) INTO B4532abcd_annual_allrespondent. VARIABLE LABELS B4532abcd_annual_allrespondent 'Annual accommodation for outpatient (B4532abcd) for all respondent'. EXECUTE.
Total outpatient OOP for other	B4533abcd_2_weeks	pweight	Total outpatient care expenditure for other expenses to all health facilities in the past 2 weeks	COMPUTE B4533abcd_2_weeks=SUM(B4533a,B4533b,B4533c,B4533d). VARIABLE LABELS B4533abcd_2_weeks '2 weeks other expenses for outpatient (B4533abcd)'. EXECUTE.
Total outpatient OOP for other	B4533abcd_2_weeks_allrespondent	pweight	Total outpatient care expenditure for other expenses to all health facilities in the past 2 weeks; All missing and other values were coded as 0.	RECODE B4533abcd_2_weeks (SYSMIS=0) (ELSE=Copy) INTO B4533abcd_2_weeks_allrespondent. VARIABLE LABELS B4533abcd_2_weeks_allrespondent '2 weeks other expenses for outpatient (B4533abcd) for all respondent'. EXECUTE.
Total outpatient OOP for other	B4533abcd_annual	pweight	Total outpatient care expenditure for other expenses to all health facilities in the past 1 year	COMPUTE B4533abcd_annual=SUM(B4533a_annual,B4533b_annual,B4533c_annual,B4533d_annual). VARIABLE LABELS B4533abcd_annual 'Annual other expenses for outpatient (B4533abcd)'. EXECUTE.
Total outpatient OOP for other	B4533abcd_annual_allrespondent	pweight	Total outpatient care expenditure for other expenses to all health facilities in the past 1 year; All missing and other values were coded as 0.	RECODE B4533abcd_annual (SYSMIS=0) (ELSE=Copy) INTO B4533abcd_annual_allrespondent. VARIABLE LABELS B4533abcd_annual_allrespondent 'Annual other expenses for outpatient (B4533abcd) for all respondent'. EXECUTE.

Variable name	Variable in SPSS	Weight	Definition of Variable	SPSS variable definition
Total OOP	<p>OOP variables:</p> <ul style="list-style-type: none"> <li>▪ tooop_allrespondent</li> <li>▪ inpatient_allrespondent</li> <li>▪ B2510abcd_allrespondent</li> <li>▪ B2511abcd_allrespondent</li> <li>▪ dental_allrespondent</li> <li>▪ B3510abcd_allrespondent</li> <li>▪ B3511abcd_allrespondent</li> <li>▪ outpatient_allrespondent</li> <li>▪ B4510abcd_annual_allresp ondent</li> <li>▪ B4511abcd_annual_allresp ondent</li> <li>▪ appliances_allrespondent</li> <li>▪ B5011_allrespondent</li> <li>▪ B5021_allrespondent</li> <li>▪ annual_promotive_prevent ive_allrespondent</li> <li>▪ B6011_annual_allresponde nt</li> <li>▪ B6021_annual_allresponde nt</li> <li>▪ B6031_annual_allresponde nt</li> <li>▪ B6041_annual_allresponde nt</li> <li>▪ B6051_annual_allresponde nt</li> <li>▪ B2531abcd</li> <li>▪ B2531abcd_allrespondent</li> <li>▪ B2532abcd</li> <li>▪ B2532abcd_allrespondent</li> <li>▪ B2533abcd</li> <li>▪ B2533abcd_allrespondent</li> <li>▪ B3531abcd</li> <li>▪ B3531abcd_allrespondent</li> <li>▪ B3532abcd</li> <li>▪ B3532abcd_allrespondent</li> <li>▪ B3533abcd</li> <li>▪ B3533abcd_allrespondent</li> </ul>	pweight	<p>OOP component:</p> <ul style="list-style-type: none"> <li>▪ Total OOP for inpatient care (total paid for all admission)</li> <li>▪ Total OOP for inpatient care (total paid for medication/ appliances)</li> <li>▪ Total OOP for oral health care (total paid for all admission)</li> <li>▪ Total OOP for oral health care (total paid for medication/ appliances)</li> <li>▪ Total OOP for outpatient care (total paid for all admission)</li> <li>▪ Total OOP for outpatient care (total paid for medication/ appliances)</li> <li>▪ Total OOP for health appliances (total paid for eyes appliances)</li> <li>▪ Total OOP for health appliances (total paid for other health appliances)</li> <li>▪ Total OOP for promotive &amp; preventive care (medical check-up)</li> <li>▪ Total OOP for promotive &amp; preventive care (family planning)</li> <li>▪ Total OOP for promotive &amp; preventive care (vaccination)</li> <li>▪ Total OOP for promotive &amp; preventive care (pap smear examination)</li> <li>▪ Total OOP for promotive &amp; preventive care (mammogram)</li> <li>▪ Total OOP for promotive &amp; preventive care (vitamin &amp; supplement)</li> <li>▪ Total OOP for inpatient care</li> <li>▪ Total OOP for oral health care</li> <li>▪ Total OOP for outpatient care</li> <li>▪ Total OOP for health appliances</li> <li>▪ Total OOP for promotive &amp; preventive care</li> <li>▪ Total OOP</li> <li>▪ Total OOP for outpatient (transportation)</li> <li>▪ Total OOP for outpatient (accommodation)</li> <li>▪ Total OOP for outpatient (other)</li> </ul>	<p>CSDESCRIPTIVES /PLAN FILE=:analysis in spss\program\CS analysis plan.csaplan' /SUMMARY VARIABLES= tooop_allrespondent /MEAN /SUM /STATISTICS SE COUNT POPSIZE CIN(95) /MISSING SCOPE=ANALYSIS CLASSMISSING=EXCLUDE. EXAMINE VARIABLES=tooop_allrespondent /PLOT NONE /PERCENTILES(5, 10, 25, 50, 75, 90, 95) HAVERAGE /STATISTICS DESCRIPTIVES /CINTERVAL 95 /MISSING LISTWISE /NOTOTAL.  CSDESCRIPTIVES /PLAN FILE=:G:\analysis in spss\program\CS analysis plan.csaplan' /SUMMARY VARIABLES=tooop_allrespondent /SUBPOP TABLE=state DISPLAY=LAYERED /MEAN /SUM /STATISTICS SE COUNT POPSIZE CIN(95) /MISSING SCOPE=ANALYSIS CLASSMISSING=EXCLUDE. EXAMINE VARIABLES=tooop_allrespondent BY state /PLOT NONE /PERCENTILES(5, 10, 25, 50, 75, 90, 95) HAVERAGE /STATISTICS DESCRIPTIVES /CINTERVAL 95 /MISSING LISTWISE /NOTOTAL.</p>

Variable name	Variable in SPSS	Weight	Definition of Variable	SPSS variable definition
	<ul style="list-style-type: none"> <li>▪ B4531abcd_annual</li> <li>▪ B4531abcd_annual_allresp</li> <li>ondent</li> <li>▪ B4532abcd_annual</li> <li>▪ B4532abcd_annual_allresp</li> <li>ondent</li> <li>▪ B4533abcd_annual</li> <li>▪ B4533abcd_annual_allresp</li> <li>ondent</li> </ul> <p>Sociodemographic variables:</p> <ul style="list-style-type: none"> <li>▪ state2</li> <li>▪ state3</li> <li>▪ strata</li> <li>▪ gender</li> <li>▪ agegp</li> <li>▪ race3</li> <li>▪ maritalgp</li> <li>▪ edu</li> <li>▪ work3</li> <li>▪ hhincomegroup</li> <li>▪ pli_all</li> <li>▪ edu_hhhead</li> <li>▪ totextQ</li> </ul>		<ul style="list-style-type: none"> <li>▪ Total OOP for dental (transportation)</li> <li>▪ Total OOP for dental (accommodation)</li> <li>▪ Total OOP for dental (other)</li> <li>▪ Total OOP for inpatient (transportation)</li> <li>▪ Total OOP for inpatient (accommodation)</li> <li>▪ Total OOP for inpatient (other)</li> </ul> <p>Display result by socio-demographic characteristics:</p> <ul style="list-style-type: none"> <li>▪ state</li> <li>▪ state (Peninsular/ Sabah/ Sarawak)</li> <li>▪ strata (Urban/ Rural)</li> <li>▪ gender</li> <li>▪ age group</li> <li>▪ race</li> <li>▪ marital status</li> <li>▪ education</li> <li>▪ occupation</li> <li>▪ household income group</li> <li>▪ Malaysian poverty line</li> <li>▪ highest education of the household head</li> <li>▪ total expenditure quintiles</li> </ul>	





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