DECLARATION

I hereby declare that the Thesis entitled Gambling and Decision Making: A Study on Selected Games is a record of bonafide research work done by me, under the supervision of Dr. Thomas Paul Kattookaran. I further declare that no part of the thesis has been presented before fully or partially for any degree, diploma or other similar title of the University.

Date: 30.11.2020

Thrissur

Divya George

(Research Scholar)

Acknowledgements

The research *Gambling and Decision Making:* A Study on Selected Games, is a humble attempt to know the socioeconomic influences of gambling among Keralites. Even though gambling has its own pros and cons, here the researcher attempts to help the Keralites to take decisions, which will be beneficial for their future. This study is concentrated on two games, that is lottery and sweepstakes, one is Voluntary Gambling and the other is Non-voluntary Gambling. Here the researcher has focused on to create an awareness among the Kerala population, regarding their participation in selected gambling activities. Generating a characteristic of rational decision making among the Kerala population is another goal of the research.

In course of this study I am given inspiration, encouragement, and cooperation by several individuals and institutions in one way or other. I wish to thank them all. Of course, at the top of this long list stands my supervisor Dr. Thomas Paul Kattookaran, Associate Professor and Head (Retd), of the Research Department of Commerce, St. Thomas College, (Autonomous), Thrissur. I specially acknowledge all the support given by him for the completion of my research work. The nobility and the uncompromising attitude towards quality and discipline of Dr. Thomas Paul Kattookaran, facilitated me to complete this research on time. I sincerely express my deep sense of gratitude and obligation to him.

I express my deep sense of gratitude to the management of St. Thomas' College (Autonomous), Thrissur, especially to the Manager, Mar Tony Neelankavil and Executive Manger Rev Fr. Varghese Kuthur for opening several avenues for me by facilitating a good research environment in the research centre.

I express my thanks to the Doctoral Committee members Dr. M.A. Joseph, Department of Commerce and Management Studies, University of Calicut; Dr. Joy K.L, Principal, St. Thomas College, Thrissur, V C Nominees Dr. Xaviour Joseph, Christ college, Irinjalakuda, Sr. Dr. Magie Jose CMC, Principal, St. Mary's College, Thrissur and Dr. Joby Thomas K, Vice Principal and Coordinator of the Research Council of St. Thomas' College, Thrissur, for their valuable feedback and support which helped me to improve my research in many ways. I also extend my gratitude

to Rev. Dr. Martin Kolambrath and Sr. Dr. Alphonsa Mathew, Vice Principals of St. Thomas' College, (Autonomous) Thrissur, for their whole hearted support and encouragement to make my research a reality.

I extend my sincere thanks to Dr. K P Mani, former H.O.D. of Economics, Dr. John Mathai Centre, Thrissur; Dr. Jenson P O, Dr, Ignatius Antony former Principals of St. Thomas' College (Autonomous), Thrissur, for their constant encouragement towards my research.

I also deeply acknowledge my sincere gratitude to Dr. Sajesh T A, Research Department of Statistics, St. Thomas' College, (Autonomous), Thrissur, for all the statistical support extended for the completion of my thesis.

I extend my gratefulness to Dr Fessy Louis T, Associate Professor, Amrutha Research Institute of Medical Science and Adv. Jommy Thariyan, for their whole hearted support and advice on medical and legal aspects covered under the scope of my research

I express my sincere gratitude to my fellow research scholars, Dr. Febina K, Dr. Tom Jacob, Dr. Haresh Kumar A G, Ms. Nishija Unnikrishnan and Prof. Sijo Jacob for all the valuable suggestions and supports during my research.

With deep gratitude I remember the whole hearted helps extended by Dr. Biju John M, H.O.D. and my colleagues of the Department of Commerce, St. Thomas' College, (Autonomous) Thrissur. I also thank Mr. Sanjo Jose, Librarian, St. Thomas College, (Autonomous) Thrissur, and Prof. Preema Paul, St. Mary's College, Thrissur my beloved English teacher, for their invaluable help and the interest showed in my work. I owe my thanks to my husband Er. Thomas Anto, for all the moral and academic support, I also extend my gratitude to my children Antony Thomas and George Thomas, Father P J George, Mother Sheeju George, Sisters Amrutha and Mariya for their loving and prayerful support in all my endeavours.

Once again, I thank all those who are directly or indirectly involved in the preparation of this thesis.

Divya George

CONTENTS

Acknowledgements		i
List of	Γables	XV
List of	Figures	xxii
Abbreviations		xxiv
1	Introduction	
1.1	Introduction to Gambling and Decision Making	1
1.2	Lottery	2
1.3	History of Gambling (Lottery)	3
1.4	History of Gambling in India	4
1.5	History of Gambling in Kerala	5
1.6	Decision Making	9
1.7	Voluntary Gambling	10
1.8	Non-Voluntary Gambling	10
1.9	Sales Promotion	10
1.10	Gambling Related Sales Promotion	11
1.11	Sweepstakes	11
1.12	Saving Habits	12
1.13	Spending Culture	12
1.14	Consumer Buying Behaviour	13
1.15	Statement of the Problem	14
1.16	Significance of the Study	15
1.17	Objectives of the Study	16
1.18	Scope of the Study	16
1.19	Hypotheses of the Study	17

1.20	Research Methodology	18
	1.20.1 Frame	18
	1.20.2 Data	19
	1.20.3 Sampling	19
	1.20.4 Data Sources	20
	1.20.5 Tools	22
1.21	Period of Study	23
1.22	Limitations of the Study	23
1.23	The Scheme of the Report	23
2	Review of Literature and Theoretical Framework	25
2.1	Introduction	25
2.2	The Reviews Related to the Social and Economic Influence of Gambling	25
2.3	The Reviews Based on the Influence of Various Gambling Related Sales Promotion Tools on the Buying Behaviour of Customers	63
2.4	Research Gap	79
2.5	Theoretical Reviews Based on Gambling, Sweepstakes and Consumer Buying Behaviour	80
	2.5.1 Theoretical Review	80
	2.5.2 Theory of Demand for Gambles	81
	2.5.3 Expected Utility Theory	83
	2.5.4 Prospect Theory Vs Cumulative Prospect Theory	85
	2.5.5 Cumulative Prospect Theory	87
	2.5.6 The Friedman–Savage Utility Function	88
	2.5.7 e.marketing Theory of Customer Behaviour Response	90
	2.5.8 Conceptual and Empirical Relationship between	92

3	Factors Attracting People Towards Gambling	95
3.1	Introduction	95
3.2	General Demographic Profile and the Analysis of the Research	95
	3.2.1 Gender	96
	3.2.2 Age	97
	3.2.3 Income Level	98
	3.2.4 Education Qualification	99
	3.2.5 Occupational Status	100
	3.2.6 Marital Status	101
	3.2.7 Religion	102
3.3	Reliability Test of the Research Instrument	103
3.4	Factors Attracting People Towards Gambling	104
	3.4.1 Greediness	106
	3.4.2 Reference Group	106
	3.4.3 Selling Style	106
	3.4.4 Government Policies	107
	3.4.5 Perception/Attitude	107
	3.4.6 Addiction	108
	3.4.7 Insecurity Factor	109
	3.4.8 Entertainment Factor	109
	3.4.9 Escapism	109
	3.4.10 Advertisement	109
	3.4.11 Prize Amount	110
3.5	Exploratory Factor Analysis	110
	V	

	3.5.1 Exploratory Factor Analysis to Categorise the Factors	111
3.6	Ordinal Logistic Regression Model (OLRM)	117
	3.6.1 Ordinal Logistic Regression Model (OLRM) for Identifying the Significance of Factors Attracting People towards Gambling	120
	3.6.2 Case Processing Summary of OLRM for Gambling Factors	120
	3.6.3 Model Fitting Information of OLRM for Gambling Factors	121
	3.6.4 Parameter Estimates of OLRM for Gambling Factors	121
	3.6.5 Test of Parallel Lines for Gambling Factors	124
3.7	One-Sample Kolmogorov-Smirnov Test for Normality for Gambling Factors	124
3.8	Influence of Gender on Factors	127
3.9	Influence of Age on Gambling Factors	127
	3.9.1 Pair wise Comparison of Different Age Groups and Gambling Factors	128
3.10	Influence of Annual Income on Gambling Factors	129
	3.10.1 Pair wise Comparison of Different Income Groups and Gambling Factors	130
3.11	Influence of Education on Gambling Factors	131
	3.11.1 Pair wise Comparison of Different Education Level and Gambling Factors	132
3.12	Influence of Occupational Status on Gambling Factors	132
	3.12.1 Pair wise Comparison of Different Occupational Status and Gambling Factors	134
3.13	Influence of Marital Status on Gambling Factors	134
	3.13.1 Pair wise Comparison of Different Marital Status and Gambling Factors	135
3.14	Influence of Religion on Gambling Factors	136

	3.14.1 Pair wise Comparison of Different Religion and Gambling Factors	137
4	Influence of Lottery and Sweepstakes on Saving Habits of Keralites	138
4.1	Introduction	138
	4.1.1 Change in Life Style	139
	4.1.2 Financial attitude	140
	4.1.3 Social Attitude	140
	4.1.4 Comfortability Inclination	141
4.2	Ordinal Logistic Regression Model for measuring the significance of variables on the Saving Habits of Keralites	141
	4.2.1 Case Processing Summary of OLRM on the Saving Habits of Keralites	142
	4.2.2 Model Fitting Information of OLRM on the Saving Habits of Keralites	142
	4.2.3 Parameter Estimates of OLRM on the Saving Habits of Keralites	143
	4.2.4 Test of Parallel Lines of OLRM on the Saving Habits of Keralites	144
4.3	One-Sample Kolmogorov-Smirnov Test for Normality to Analyse the Influence of Lottery and Sweepstakes on Saving Habits	145
4.4	Influence of Gender on Saving Habits of Keralites	147
4.5	Influence of Age on Saving Habits of Keralites	148
	4.5.1 Pair wise Comparison of Different Age Groups and Saving Habits	150
4.6	Influence of Annual Income on Saving Habits of Keralites	150
	4.6.1 Pairwise Comparison of Different Annual Income Groups and Saving Habits	151

4.7	Influence of Education Level on Saving Habits of Keralites	152
	4.7.1 Pairwise Comparison of Different Education Level and Saving Habits	153
4.8	Influence of Occupational Status on Saving Habits of Keralites	154
	4.8.1 Pairwise Comparison of Different Occupational Status and Saving Habits	155
4.9	Influence of Marital Status on Saving Habits of Keralites	156
	4.9.1 Pair wise Comparison of Different Marital Status and Saving Habits	157
4.10	Influence of Religion on Saving Habits of Keralites	158
4.11	Influence of Demographic Profile of Keralites on their Saving Habits because of Participation in Lottery	158
4.12	Categorical order of scores based on the Spending and Saving Attitudes and Behaviors Questionnaire, from Psyc Tests, a database of the American Psychological Association	159
4.13	Influence of Demographical Variableson Saving Habits of Keralites because of their Participation in Kerala State Government Lottery	160
	4.13.1 Influence of Gender on Saving Habits of Keralites Due to Lottery Participation	160
	4.13.2 Influence of Age on Saving Habits of Keralites, because of Lottery Participation	161
	4.13.3 Influence of Income on Saving Habits of Keralites, because of Lottery Participation	162
	4.13.4 Influence of Education on Saving Habits of Keralites, because of Lottery Participation	164
	4.13.5 Influence of Occupation Status on Saving Habits of Keralites, because of Lottery Participation	165
	4.13.6 Influence of Marital Status on Saving Habits of Keralites, because of Lottery Participation	167

	4.13.7 Influence of Religion on Saving Habits of Keralites, because of Lottery Participation	168
4.14.	Influence of Demographic Variables on Saving Habits of Keralites due to their Participation in Sweepstakes	169
	4.14.1 Influence of Gender on Saving Habits of Keralites, because of Participation in Sweepstakes	170
	4.14.2 Influence of Age on Saving Habits of Keralites, because of Participation in Sweepstakes	171
	4.14.3 Influence of Annual Income Level on Saving Habits of Keralites, because of Participation in Sweepstakes	172
	4.14.4 Influence of Education Status on Saving Habits of Keralites, because of Participation in Sweepstakes	173
	4.14.5 Influence of Occupation Status on Saving Habits of Keralites, because of Participation in Sweepstakes	175
	4.14.6 Influence of Marital Status on Saving Habits of Keralites, because of Participation in Sweepstakes.	176
	4.14.7 Influence of Religion on Saving Habits of Keralites, because of Participation in Sweepstakes	177
5	Spending Pattern of Disposable Income of Keralites in Lottery and Sweepstakes	179
5.1	Introduction	179
	5.1.1 Spending Style	180
	5.1.2 Spending Attitude	181
	5.1.3 Beliefs and Culture	181
5.2	Ordinal Logistic Regression Model for Measuring the Significance of Variables on the Spending Culture of Disposable Income of Keralites	182
	5.2.1 Case Processing Summary of OLRM on the Spending Culture of Keralites	182

	5.2.2 Model Fitting Information of OLRM on the Spending Culture of Keralites	182
	5.2.3 Parameter Estimates of OLRM on the Spending Culture of Keralites	183
	5.2.4 Test of Parallel Linesof OLRM on the Spending Culture of Keralites	184
5.3	One-Sample Kolmogorov-Smirnov Test for Normality of Spending Culture of Keralites, on Lottery and Sweepstakes	185
5.4	Influence of Gender on Spending Culture of Keralites in Lottery and Sweepstakes	187
5.5	Influence of Age on Spending Culture of Keralites in Lottery and Sweepstakes	188
	5.5.1 Pairwise Comparison of Different Age Groups and Spending Culture of Keralites in Lottery and Sweepstakes	189
5.6	Influence of Annual Income on Spending Culture of Keralites in Lottery and Sweepstakes	190
	5.6.1 Pairwise Comparison of Different Income Groups and Spending Culture of Keralites in Lottery and Sweepstakes	191
5.7	Influence of Education Level on Spending Culture of Keralites in Lottery and Sweepstakes	192
	5.7.1 Pairwise Comparison of Different Education Levels and Spending Culture of Keralites in Lottery and Sweepstakes	193
5.8	Influence of Occupation Statuson Spending Culture of Keralites in Lottery and Sweepstakes	193
	5.8.1 Pairwise Comparison of Different Occupation Status and Spending Culture of Keralites in Lottery and Sweepstakes	195
5.9	Influence of Marital Status on Spending Culture of Keralites in Lottery and Sweepstakes	195
	5.9.1 Pairwise Comparison of Different Marital Status and Spending Culture of Keralites in Lottery and Sweepstakes	197

5.10	Influence of Religion on Spending Culture of Keralites in Lottery and Sweepstakes	197
5.11	Influence of Demographic Variables on Spending Culture of the Disposable Income of Keralites in Kerala State Government Lottery	198
5.12	Categorical order of scores based on the Spending and saving attitudes and behaviors questionnaire, from Psyc Tests, a database of the American Psychological Association	199
5.13	Influence of Gender on Spending Culture of Keralites, in Lottery	199
5.14	Influence of Age on Spending Culture of Keralites, in Lottery	200
5.15	Influence of Income Level on Spending Culture of Keralites, in Lottery	201
5.16	Influence of Education Level on Spending Culture of Keralites, in Lottery	203
5.17	Influence of Occupation Status on Spending Culture of Keralites, in Lottery	204
5.18	Influence of Marital Status on Spending Culture of Keralites, in Lottery	206
5.19	Influence of Religion on Spending Culture of Keralites, in Lottery	207
5.20	Influence of Demographic Variables on Spending Culture of Disposable Income of Keralites in Gambling Related Sales Promotion tools (Sweepstakes).	207
5.21	Influence of Gender on Spending Culture of Keralites, in Sweepstakes	208
5.22	Influence of Age on Spending Culture of Keralites, in Sweepstakes	209
5.23	Influence of Income Level on Spending Culture of Keralites, in Sweepstakes	211

5.24	Influence of Education Level on Spending Culture of Keralites, in Sweepstakes	212
5.25	Influence of Occupation status on Spending Culture of Keralites, in Sweepstakes	214
5.26	Influence of Marital Status on Spending Culture of Keralites, in Sweepstakes	216
5.27	Influence of Religion on Spending Culture of Keralites, in Sweepstakes	217
6	The Influence of Sweepstakes on the Consumer Buying Behaviour of Keralites	220
6.1	Introduction	220
	6.1.1 Stock Piling	220
	6.1.2 Repeated Purchase behavior	221
	6.1.3 Purchase acceleration/delay	221
	6.1.4 Brand/Shop Switching	222
	6.1.5 Buying Initiation	222
6.2	Ordinal Logistic Regression Model for Measuring the Significance of Variables on Consumer Buying Behaviour of Keralites	223
	6.2.1 Case Processing Summary of OLRM Applied to analyse the Influence of Sweepstakes on CBB of Keralites	223
	6.2.2 Model Fitting Information of CBB	224
	6.2.3 Parameter Estimates of Consumer Buying Behaviour	224
	6.2.4 Test of Parallel Lines on Consumer Buying Behaviour	225
6.3	One-Sample Kolmogorov-Smirnov Test for Normality, on the changes in CBB because of the Influence of Sweepstakes	226
6.1	Influence of Gender on Consumer Ruying Rehaviour	220

6.5	Influence of Age on Consumer Buying Behaviour	230
	6.5.1 Pairwise Comparison of Different Age Groups and Consumer Buying Behaviour of Keralites	230
6.6	Influence of Income Level on Consumer Buying Behaviour	231
	6.6.1 Pairwise Comparison of Different Income Level and Consumer Buying Behaviour of Keralites	232
6.7	Influence of Education Level on Consumer Buying Behaviour	233
	6.7.1 Pairwise Comparison of Different Education Level and Consumer Buying Behaviour of Keralites	234
6.8	Influence of Occupation Status on Consumer Buying Behaviour	234
	6.8.1 Pairwise Comparison of Different Occupation Status and Consumer Buying Behaviour of Keralites	236
6.9	Influence of Marital Status on Consumer Buying Behaviour	236
6.10	Influence of Religion on Consumer Buying Behaviour	237
6.11	Addiction Level of Keralites towards Gambling	238
	6.11.1 Parameter Estimates of Addiction Level of Keralites towards Gambling	239
	6.11.2 Case Processing Summary of Addiction Level of Keralites towards Gambling	240
	6.11.3 Model Fitting Information of Addiction Level of Keralites towards Gambling	240
	6.11.4 Test of Parallel Lines of Addiction Level of Keralites towards Gambling	241
7	Findings, Suggestions and Conclusion Introduction	244
7.1	Major Findings of the Study	244
7.2	7.2.1 Findings Based on the Factors Attracting People of Kerala	246
	Towards Gambling	246

	7.2.2 Findings Based on the Influence of Kerala State	248
	Government Lottery and Gambling Related Sales Promotion Tools (Sweepstakes), on the Saving Habits of	2-10
	Keralites	
	7.2.3 Findings based on the Spending Pattern of Disposable	• • •
	Income of Keralites in Kerala State Lottery and Gambling	250
	Related Sales Promotion(GRSP) Tools (Sweepstakes)	
	7.2.4 Findings Based on The Influence of Gambling Related	
	Sales Promotion (GRSP), Tools on the Consumer Buying	253
	Behaviour of Keralites	
7.3	Specific Suggestions	255
7.4	General Suggestions	258
7.5	Scope of Further Research	259
7.6	Conclusion	260
	Bibliography	
	Annexures	

LIST OF TABLES

1.1	The Legislative History of Public Gambling Act 1867	4
1.2	Revenue and Profit of Kerala State Government Lottery	7
1.3	The Legislative History of Consumer Protection Act 1986	12
1.4	Variables Selected Under the Four Dimensions	21
2.1	Theoretical Comparisons and Variances Between Gambling, Speculation, and Investment	93
3.1	Gender-Wise Classification of Customers	96
3.2	Age-Wise Classification of the customers	97
3.3	Classification of Annual Income of Customers	98
3.4	Education Qualification of the Respondents	99
3.5	Occupation-Wise Classification of Respondents	100
3.6	Marital Status of the Respondents	101
3.7	Religion of the Respondents	102
3.8	Results of Cronbach's Alpha Test for Reliability	104
3.9	KMO and Bartlett's Test	111
	3.9.1 Total Variance Explained	113
	3.9.2 Component Matrix ^a	114
	3.9. 3 Rotated Component Matrix ^a	115
	3.9.4 Categorisation of Factors	116
3.10	Categorical Order for Ordinal Logistic Regression Model for Factors Attracting People to Gambling	120
	3.10.1 Case Processing Summary	120
	3.10.2 Model Fitting Information for Factors Attracting People to Gambling	121

	3.10.3 Parameter Estimates for Factors Attracting People to Gambling	121
	3.10.4 Test of Parallel Lines for Factors Attracting People to Gambling	124
3.11	One-Sample Kolmogorov-Smirnov Test for Normality for Factors Attracting People towards Gambling	124
3.12	Mann-Whitney U Test shows the Influence of Gender on Factors Attracting People to Gambling	127
3.13	Kruskal - Wallis Test Shows the Influence of Age on Factors Attracting People to Gambling	128
	3.13.1 Post hoc Test for Pairwise Comparisons Between Different Age Group and Factors Attracting Towards Gambling	128
3.14	Kruskal - Wallis Test Shows the Influence of Income on Factors Attracting People Towards Gambling	129
	3.14.1 Post Hoc Test for Pairwise Comparisons Between Different Income Group	130
3.15	Kruskal - Wallis Test Shows the Influence of Education Level on Factors Attracting People Towards Gambling	131
	3.15.1 Post hoc Test for Pairwise Comparisons Between Different Education Category	132
3.16	Kruskal - Wallis Test Shows the Influence of Occupational Status on Factors Attracting People Towards Gambling	133
	3.16.1 Post Hoc Test for Pairwise Comparisons Between Different Occupational Status	134
3.17	Kruskal - Wallis Test Shows the Influence of Marital Status on Factors Attracting People Towards Gambling	135
	3.17.1 Post Hoc Test for Pairwise Comparisons Between Different Marital Status	135
3.18	Kruskal - Wallis Test shows the Influence of Religion on Factors Attracting People Towards Gambling	136

	3.18.1 Post Hoc Test for Pairwise Comparisons Between Different Religion	137
4.1	Categorical Order of Ordinal Logistic Regression Model	141
	4.1.1 Case Processing Summary	142
	4.1.2 Model Fitting Information	142
	4.1.3 Parameter Estimates	143
	4.1.4 Test of Parallel Lines	144
4.2	One-Sample Kolmogorov-Smirnov Test for Normality for Analysing the Influence of Lottery and Sweepstakes on Saving Habits of Keralites	145
4.3	Mann-Whitney U Test Shows the Influence of Gender on Saving Habits of Keralites	148
4.4	Kruskal - Wallis Test Shows the Influence of age on saving Habits of Keralites	149
	4.4.1 Post Hoc Test For Pairwise Comparisons Between Different Age Groups and Influence on Savings of Keralites	150
4.5	Kruskal - Wallis Test shows the Influence of Annual Income on Saving Habits of Keralites	150
	4. 5.1 Post hoc test for Pairwise Comparisons Between Different Annual Income Group And Influence on Savings of Keralites	151
4.6	Kruskal - Wallis Test Shows the Influence of Education Level on Saving Habits of Keralites	152
	4.6.1. Post hoc test for Pairwise Comparisons between different Education Level and Influence on Saving Habit of Keralites	153
4.7	Kruskal - Wallis Test Shows the Influence of Occupational Status on Saving Habits of Keralites	154
	4.7.1 Post Hoc Test for Pairwise Comparisons Between	155

Different Occupational Status and Influence on Saving Habits of Keralites

4.8	Kruskal - Wallis Test Shows the Influence of Marital Status on Saving Habits of Keralites	156
	4.8.1: Post Hoc Test for Pairwise Comparisons Between Different Marital Status and Influence on Saving Habits of Keralites	157
4.9	Kruskal - Wallis Test shows the Influence of Religion on Saving Habits of Keralites	158
4.10	Classification of Scores on the Basis of Categorical Order	159
4.11	Chi Square Test Shows the Influence of Gender on the Saving Habits of Keralites Due to the Purchase of Lottery	160
4.12	Chi Square Test Shows the Influence of Age on the Saving Habits of Keralites Due to the Purchase of Lottery	161
4.13	Chi Square Test Shows the Influence of Income Level on the Saving Habits of Keralites Due to the Purchase of Lottery	162
4.14	Chi Square Test Shows the Influence of Education Level on the Saving Habits of Keralites Due to the Purchase of Lottery	164
4.15	Chi Square Test Shows the Influence of Occupational Status on the Saving Habits of Keralites Due to the Purchase of Lottery	165
4.16	Chi Square Test Shows the Influence of Marital Status on the Saving Habits of Keralites Due to the Purchase of Lottery	167
4.17	Chi Square Test Shows the Influence of Religion on the Saving Habits of Keralites Due to the Purchase of Lottery	168
4.18	Chi Square Test Shows the Gender Wise, Influence on the Saving Habits, Because of the Involvement in Sweepstakes	170
4.19	Chi Square Test Shows the Age Wise Influence, on the Saving Habits, Because of the Involvement in Sweepstakes	171
4.20	Chi Square Test Shows the Income Wise, Influence on the Saving Habits, Because of the Involvement in Sweepstakes	172
4.21	Chi Square Test Shows the Educational Level Influence on the Saving Habits, Because of the Involvement in Sweepstakes	174

4.22	Chi Square Test Shows the Occupational Status Influence on the Saving Habits, Because of the Involvement in Sweepstakes	175
4.23	Chi Square Test Shows the Marital Status Influence on the Saving Habits, Because of the Involvement in Sweepstakes	176
4.24	Chi Square Test Shows Religion Wise Influence on the Saving Habits, Because of the Involvement in Sweepstakes	177
5.1	Categorical Order of Ordinal Logistic Regression Model for the Spending Culture of Keralites	182
	5.1.1 Case Processing Summary of the Spending Culture of Keralites	182
	5.1.2 Model Fitting Information on the Spending Culture of Keralites	183
	5.1.3 Parameter Estimates on the Spending Culture of Keralites	183
	5.1.4 Test of Parallel Lines on the Spending Culture of Keralites	184
5.2	One-Sample Kolmogorov-Smirnov Test for Normality of Spending Culture of Keralites, on Lottery and Sweepstakes	185
5.3	Mann-Whitney U Test Shows the Influence of Gender on Spending Culture of Keralites in Lottery and Sweepstakes	187
5.4	Kruskal - Wallis Test Shows the Influence of Age on Spending Culture of Keralites in Lottery and Sweepstakes	188
	5.4.1 Post Hoc Test for Pairwise Comparisons Between Different Age Group and Influence on Spending Culture of Keralites in Lottery and Sweepstakes	189
5.5	Kruskal-Wallis Test Shows the Influence of Annual Income on Spending Culture of Keralites on Lottery and Sweepstakes	190
	5.5.1 Post Hoc Test for Pairwise Comparisons Between Different Income Category and Influence on Spending Culture of Keralites in Lottery and Sweepstakes	191
5.6	Kruskal - Wallis Test Shows the Influence of Educational Level on Spending Culture of Keralites in Lottery and Sweepstakes	192

	5.6.1 Post Hoc Test for Pairwise Comparisons Between Different Education Class and Influence on Spending Culture of Keralites in Lottery and Sweepstakes	193
5.7	Kruskal - Wallis Test Shows the Influence of Occupation Status on Spending Culture of Keralites in Lottery and Sweepstakes	194
	5.7.1 Post Hoc Test for Pairwise Comparisons Between Different Occupational Group and Influence on Spending Culture of Keralites in Lottery and Sweepstakes	195
5.8	Kruskal -Wallis Test Shows the Influence of Marital Status on Spending Culture of Keralites in Lottery and Sweepstakes	196
	5.8.1 Post Hoc Test for Pairwise Comparisons Between Different Marital Status and Influence on Spending Culture of Keralites in Lottery and Sweepstakes	197
5.9	Kruskal - Wallis Test Shows the Influence of Religion on Spending Culture of Keralites in Lottery and Sweepstakes	197
5.10	Categorical Order of Scores for Spending Pattern of Keralites	199
5.11	Chi Square Test Shows Gender Wise Influence on Spending Culture of Keralites in Lottery	199
5.12	Chi Square Test Shows Age Wise Influence on Spending Culture of Keralites in Lottery	200
5.13	Chi Square Test Shows Income Level Influence on Spending Culture of Keralites in Lottery	202
5.14	Chi Square Test Shows Educational Level Influence on Spending Culture of Keralites in Lottery	203
5.15	Chi Square Test Shows Occupational Status Influence on Spending Culture of Keralites in Lottery	204
5.16	Chi Square Test Shows Marital Status Influence on Spending Culture of Keralites in Lottery	206
5.17	Chi Square Test Shows Religion Wise Influence on Spending Culture of Keralites in Lottery	207
5.18	Chi Square Test Shows Gender Wise, Influence on the Spending Pattern of Keralates in Sweepstakes	208

5.19	Chi Square Test Shows Age Wise, Influence on the Spending Pattern of Keralates in Sweepstakes	209
5.20	Chi Square Test Shows Income Level, Influence on the Spending Pattern of Keralates in Sweepstakes	211
5.21	Chi Square Test Shows Educational Level, Influence on the Spending Pattern of Keralates in Sweepstakes	213
5.22	Chi Square Test Shows Occupation Status,, Influence on the Spending Pattern of Keralates in Sweepstakes	214
5.23	Chi Square Test Shows Marital Status Influence on the Spending Pattern of Keralates in Sweepstakes	216
5.24	Chi Square Test Shows Religion Wise Influence on the Spending Pattern of Keralates in Sweepstakes	217
6.1	Categorical Order of Ordinal Logistic Regression Model for CBB	223
	6.1.1 Case Processing Summary on Consumer Buying Behaviour of Keralites	223
	6.1.2 Model Fitting Information of CBB	224
	6.1.3 Parameter Estimates of Cbb	224
	6.1.4 Test of Parallel Lines	226
6.2	One-Sample Kolmogorov-Smirnov Test for Normality, on the Changes in Consumer Buying Behaviour Because of the Influence of Sweepstakes	227
6.3	Mann-Whitney U Test Shows The Influence of Gender on the Consumer Buying Behaviour of Keralites Because of Participation in Sweepstakes	229
6.4	Kruskal - Wallis Test Shows the Influence of Age on the Consumer Buying Behaviour of Keralites Because of Participation In Sweepstakes	230
	6.4.1 Post Hoc Test for Pairwise Comparisons Between Different Age Group and Influence of Sweepstakes on the Consumer Buying Behaviour of Keralites	231

6.5	Kruskal - Wallis Test Shows the Influence of Income Level on the Consumer Buying Behaviour of Keralites Because of Their Participation in Sweepstakes	231
	6.5.1 Post Hoc Test For Pairwise Comparisons Between Different Income Level and Influence of Sweepstakes on the Consumer Buying Behaviour of Keralites	232
6.6	Kruskal - Wallis Test Shows the Influence of Educational Level on the Consumer Buying Behaviour of Keralites Because of Their Participation in Sweepstakes	233
	6.6.1 Post Hoc Test for Pairwise Comparisons Between the Different Education Categories and Influence of Sweepstakes on the Consumer Buying Behaviour of Keralites	234
6.7	Kruskal - Wallis Test Shows the Influence of Occupational Status on the Consumer Buying Behaviour of Keralites Because of Their Participation in Sweepstakes	235
	6.7.1 Post Hoc Test for Pairwise Comparisons Between Different Occupational Status and Influence of Sweepstakes on the Consumer Buying Behaviour of Keralites	236
6.8	Kruskal - Wallis Test Shows the Influence of Marital Status on the Consumer Buying Behaviour of Keralites Because of Their Participation in Sweepstakes	237
6.9	Kruskal -Wallis Test Shows the Influence of Religion on the Consumer Buying Behaviour of Keralites Because of Their Participation in Sweepstakes	237
6.10	Parameter Estimates of Addiction Level	239
	6.10.1 Case Processing Summary of Addiction Level	240
	6.10.2 Model Fitting Information of Addiction Level	240
	6.10.3 Test of Parallel Lines of Addiction Level	241

LIST OF FIGURES

1.1	Revenue and Profit, Graph of Kerala State Government Lottery	8
2.1	Concave Utility Function of Risk Aversion	82
2.2	Convex Utility Function of Risk Seekers	83
2.3	The Value Function that Permits Through the Reference Point is S-Shaped and Asymmetrical	86
2.4	A Typical Weighting Function in Cumulative Prospect Theory	88
2.5	The Friedman and Savage Utility Function	89
2.6	Theory of Customer Cognitive and Behavior Responses to e-Mail Marketing	91
2.7	Theory of Customer Cognitive and Behavior Responses to e-mail Marketing with Sweepstakes Offer	92
3.1	Gender-Wise Classification of Customers	96
3.2	Age-Wise Classification of the Customers	97
3.3	Classification of Annual Income of Customers	98
3.4	Education Qualification of the Respondents	99
3.5	Occupation-Wise Classification of Respondent	100
3.6	Marital Status of the Respondents	101
3.7	Religion of the Respondents	102
3.8	Scree Plot to Depict the 11 Gambling Factors into Two	112

ABBREVIATIONS

AIFLTAI : All India Federation of Lottery Trade and Allied Industries

CBB : Consumer Buying Behaviour

EFA : Exploratory Factor Analysis

GBQ : Gambler's Belief questionnaire

GF : Gambling Factors

GRSP. : Gambling Related Sales Promotion

OLRM : Ordinal Logistic Regression Model

SH : Saving Habits

SHL : Saving Habits and Lottery

SHS : Saving Habits and Sweepstakes

SP : Spending Pattern

SPL : Spending Pattern and Lottery

SPS : Spending Pattern and Sweepstakes