

CHAPTER 3 : RESEARCH METHODOLOGY

3.0 Introduction

In this chapter, the research design will be described, followed by choice of instruments and measures. Sampling design, data collection procedure and data analysis techniques will be detailed in this section too.

3.1 Research Design

This study employed a deductive approach whereby it started with examination of literature to derive propositions and hypotheses, followed by testing the propositions and hypotheses with the data gathered. It was designed to be conducted in which data were gathered in a cross sectional manner for a period of one month by using self-administered survey questionnaire. Sampling method used was probability convenience sampling.

3.2 Instruments and Selection of measures

A self-administered survey questionnaire was developed for the purposes of this study. The items in the questionnaire were adopted from previous research studies by various authors and minor adjustment has been made according to Malaysian context.

The questionnaire consisted of five parts.

Part A

Respondents were asked to provide their demographics information which consisted of gender, age, marital status, education level, ethnic group, occupation, household income,

household size, number of coupon redeemed per month and coupon redeemed product category.

Part B

This section was used to examine the respondents’ purchase motivation profile based on their psychological attributes. Measures on Coupon Proneness (eight items) and Value Consciousness (seven items) were adopted from Lichtenstein et al. (1990); Price Consciousness (four items) was adopted from Wells & Tigert (1971) and Brand Involvement (six items) was adopted from Laurent & Kapferer (1985). Each of the twenty five items was evaluated using 7- points Likert scales from 1 indicates “*strongly disagree*” and 7 indicates “*strongly agree*”. All the scale items were coded so that the higher score reflect higher levels of the measured construct.

Table 3.1 : Items Adopted for Psychological Variables in Questionnaire

Variable	Measures/Items		Developed from
Coupon Proneness	CP1	Redeeming coupons makes me feel good	Lichtenstein et al. (1990)
	CP2	I enjoy clipping coupons out of the newspaper	
	CP3	When I use coupons, I feel that I am getting a good deal	
	CP4	I enjoy using coupons, regardless of the amount I save by doing so	
	CP5	I have favourite brands, but most of the time I buy the brand I have a coupon for	
	CP6	I am more likely to buy brands for which I have a coupon	
	CP7	Coupons have caused me to buy products I normally would not buy.	
	CP8	Beyond the money I save, redeeming coupons give me a sense of joy.	

Price Consciousness	PC1	I shop a lot for “specials”	Wells & Tigert (1971)
	PC2	I find myself checking the prices in the grocery store / supermarket / hypermarket even for small items	
	PC3	I usually watch the advertisements for announcement of sales	
	PC4	A person can save a lot of money by shopping around for bargains	
Value Consciousness	VC1	I am very concerned about low prices, but I am equally concerned about product quality	Lichtenstein et al. (1990)
	VC2	When grocery shopping, I compare the prices of different brands to be sure I get the best value for the money.	
	VC3	When purchasing a product, I always try to maximize the quality I get for the money I spend	
	VC4	When I buy products, I like to be sure that I am getting my money’s worthy	
	VC5	I generally shop around for lower prices on products, but they still must meet certain quality requirements before I will buy them.	
	VC6	When I shop, I usually compare the price per gram/ml information for brands I normally buy.	
	VC7	I always check prices at the grocery store/ supermarket / hypermarket to be sure I get the best value for the money I spend.	
Brand Involvement	BI1	The brand I buy using coupons should be important to me	Laurent & Kapferer (1985)
	BI2	I am really interested in brand I buy even without coupons	

	BI3	The brand I buy using coupons should be enjoyable to me (even without coupon)	
	BI4	The brand I buy using coupons should be valuable to me	
	BI5	It will be a big deal for me if I make a mistake by buying couponed brand which I am not familiar with	
	BI6	It will be a high chances for me to make a mistake by buying couponed brand which I am not familiar with	

Part C

This section was used to examine the respondents' attitudinal characteristics toward the act of redeeming coupons. Measures on Attitude (five items) and Subjective Norms (five items) toward act of redeeming coupon were adopted from Shimp & Kavas (1984). Respondents were asked to express their attitudes and subjective norms toward the act of redeeming coupon. Each of the ten items was evaluated using 7- points Likert scales from 1 indicates "strongly disagree" and 7 indicates "strongly agree". All the scale items were coded so that the higher score reflect higher levels of the measured construct.

Table 3.2 : Items Adopted for Attitudinal Variables in Questionnaire

Variable	Measures/Items		Developed from
Attitude towards the act of redeeming coupon	AA1	I think redeeming coupons is wise	Shimp & Kavas (1984)
	AA2	I think redeeming coupons is useful	
	AA3	I think redeeming coupons is wise use of time	
	AA4	I think redeeming coupons is valuable	
	AA5	I think redeeming coupons is good	

Subjective Norms toward the act of redeeming coupon	SN1	Most people who are important to me probably consider my use of coupons to be wise
	SN2	Most people who are important to me probably consider my use of coupons to be useful
	SN3	Most people who are important to me probably consider my use of coupons to be wise use of time
	SN4	Most people who are important to me probably consider my use of coupons to be valuable
	SN5	Most people who are important to me probably consider my use of coupons to be good.

Part D

This section was used to examine the respondents' perception on coupon characteristics. The four items on Coupon Value were adopted from Mittal (1994); while three items on Coupon Expiration Date were adopted from Lee & Yeu (2010). Each of the four items for Coupon Value was evaluated using 7- points Likert scales from 1 indicates “*strongly disagree*” and 7 indicates “*strongly agree*”, while three items of Coupon Expiration Date were measured using semantic-differential scales. Scale anchors were short/long, dissatisfied/satisfied and unsuitable/suitable. As for Coupon Type, dichotomous scales (Yes/No) were being used.

Table 3.3 : Items Adopted for Coupon Characteristics Variables in Questionnaire

Variable	Measures/Items		Developed from
Coupon Value	FV1	Coupon usage saves money	Mittal (1994)
	FV2	Coupon usage helps the household budget	

	FV3	Coupon usage is a rational consumption behaviour	
	FV4	Coupon usage is worth the effort	
Coupon Expiration Date	CE1	I think coupon expiration date / validity period is.....for me to redeem (short / long)	Lee & Yeu (2010)
	CE2	I amwith the coupon expiration date / validity period (dissatisfied / satisfied)	
	CE3	I think coupon expiration date / validity period is.....for me (unsuitable / suitable)	
Coupon type (Coupon distribution vehicle)	Normally, I will take up the coupon from		Bawa et al.(1997) Reinstein & Traver (1982)
	CT1	Free Standing Insert	
	CT2	Newspaper or Magazine Cut out/ Rip-off page	
	CT3	Hypermarket/ Supermarket loyalty programme	
	CT4	E-coupon (Electronic coupon)	
	CT5	M-coupon (Mobile coupon)	

Part E

This section was used to examine the respondents' behavioural intention to redeem coupons.

The five items on Redemption Intentions were adopted from Lichtenstein et al. (1990).

Each of the five items for Redemption Intentions was evaluated using 7- points Likert scales from 1 indicates “*strongly disagree*” and 7 indicates “*strongly agree*”.

All the scale items were coded so that the higher score reflect higher levels of the measured construct.

Table 3.4 : Items Adopted for Behavioural Variable in Questionnaire

Variable	Measures/Items		Developed from
Redemption Intentions	RI1	I have a preferred brand, but I buy brands with coupons most of the time	Lichtenstein et al. (1990)
	RI2	I am more likely to buy brands with coupons	
	RI3	Due to coupons, I may buy brands that I rarely buy at the usual time	
	RI4	If I have coupons, this may be the reason why I buy this product (brand)	
	RI5	We should try to buy products (brands) with coupons	

3.3 Sampling Method

Probability convenience sampling was used for this study.

3.4 Unit of Analysis

The unit of analysis for this research was the individual consumer in Malaysia.

3.5 Data collection procedures

The data was collected using self delivery and collection of the survey questionnaires through ‘mall intercept’ to the shoppers in shopping malls within Petaling Jaya and Kuala Lumpur. Due to resource constraints, the questionnaires were also being distributed to the offices in Petaling Jaya and Kuala Lumpur areas; postgraduate students in City Campus, University Malaya in order to gather the sufficient number of responses within the limited time frame. Although convenience sampling was applied in this study, the ethnic and

gender composition of the population was used as guide to ensure sufficient Malays, Chinese and Indians respondents were included, as well as both male and female respondents. The survey questionnaire was pre-tested with 20 respondents to check for any ambiguity before being distributed out.

3.6 Data analysis techniques

The data collected was analyzed by using Statistical Package for Social Science (SPSS) Version 16.0.

First of all, descriptive statistics such as frequency, distributions, means and standard deviations were used to develop a profile of the respondents and to summarize the variables. From the respondents' profile developed, demographic-based segments were identified. This was followed by derivation of psychological-based segments. The psychological-based segments derivation began with Exploratory Factor Analysis with principal component extraction method to explore the underlying interrelationship among items adopted and developed for the psychological variables and the means to reduce items by eliminating those that have low factor loading.

In order to test Proposition 1, 2, 3, 4, 6 and 7, ANOVA with Post-Hoc test was used to explore the mean scores differences between segments (both psychological-based segments and demographic-based segments) based on:

- 1) their attitude and subjective norms toward the act of redeeming coupon (P1 and P2)
- 2) their perception on coupon value and coupon expiration date (P3 and P4)
- 3) their redemption intentions (P6 and P7)

Exception was made on demographic-based segments (Gender); independent sample t-test was conducted instead of ANOVA with Post-Hoc as there were only two segments involved (Male & Female).

As for Proposition 5, it was tested by using the frequency in descriptive statistics. The frequency of each coupon types uptake by respondents for all five types of coupon under investigation were then determined.

In order to test on the four hypotheses developed, Hierarchical Multiple Regression was used to assess the relationship between the four independent variables to dependent variable. It was also being used to assess the ability of the four independent variables: Attitude, Subjective Norms, Coupon Value and Coupon Expiration Date to predict the Redemption Intentions; as well as the strength of the relationships.

The results and interpretations of the analyses will be discussed in the next section.