# Market Segmentation & Consumer Behaviour

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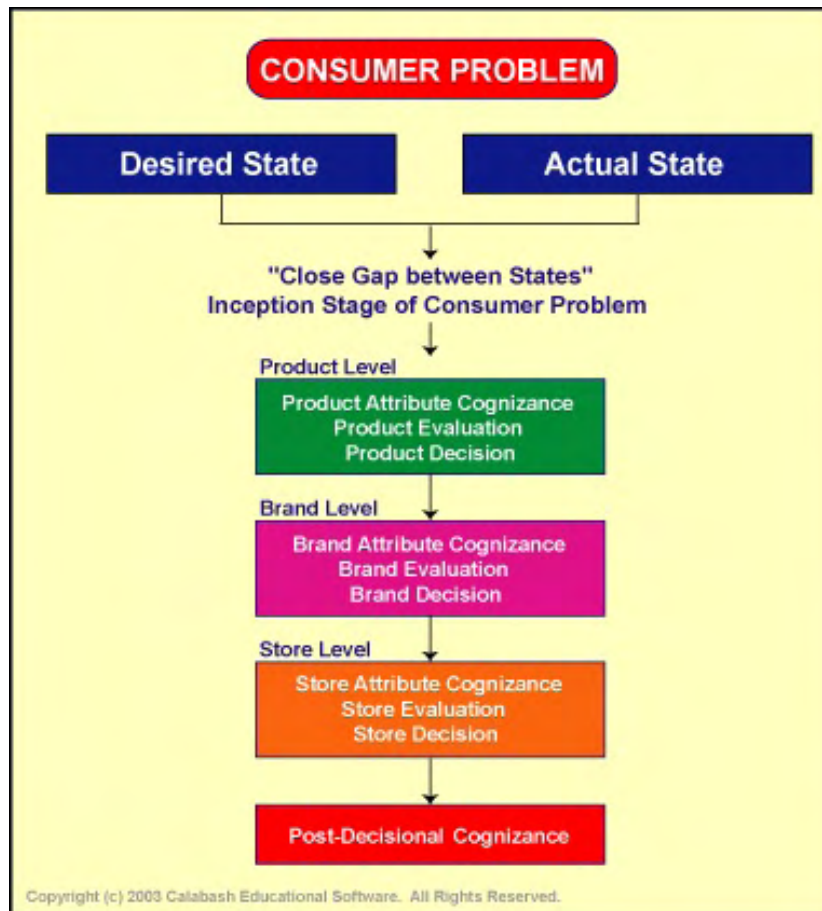
[1] Consumer Problem. The *Consumer Purchase Decision Model* identifies the stages the consumer goes through with respect to a purchase decision. The stages of this model are shown in the accompanying diagram (adapted from Chaffee & McLeod, 1973). The time and complexity involved in moving through this model is a function of the consumer's experience in the decision area (i.e., initial purchase versus repeat purchase).

Actual state: The current state of the individual (e.g., hungry, thirsty, out of cigarettes, in a given city).

Desired state: The consumer's preferred state (e.g., not to be hungry, not to be thirsty, to have cigarettes, to be in a different city).

Consumer problem: A consumer problem exists when there is a difference between the consumer's *actual state* and *desired state* and the consumer decides to take action to close the "**gap**" between the two states. If a consumer is hungry and decides to find a way to satisfy this hunger, then a consumer problem is said to exist. If the consumer is hungry and does not decide to anything about it (i.e.,

decides to remain hungry), then a consumer problem does not exist. If a consumer has a toothache and decides to do something about the pain, then a consumer problem is said to exist. If the consumer decides to do nothing about the pain, then a consumer problem does not exist. If a consumer problem does not exist, then the consumer will not be motivated to become an active participant in the market place.

The *inception stage* is the start of the consumer's behaviour to achieve the desired state.. The normal sequence followed by the consumer to achieve the desired state is to first decide on the appropriate product category, then decide on the brand within the product category, and then to decide on the store at which to buy the product-brand. However, for any particular situation and consumer, any sequence may be followed.

Notice that at the product, brand, and store levels, there are three stages: *Attribute Cognizance*, *Evaluation*, and *Decision*. **Attribute Cognizance** means that the consumer is aware of the attributes to consider when evaluating the object (i.e., product, brand, or store). **Attribute Evaluation** means that the consumer evaluates the each object using the set of attributes identified. **Decision** means that the consumer makes a choice decision with respect to the object (i.e., selects the desired product, brand, or store) in order to satisfy the consumer need.

At each level, the consumer first needs to identify the different products, brands, or stores that can solve the identified consumer problem. This can be done via an internal search (i.e., from one's memory) or via an external search [i.e., seek information from others (e.g., friends, travel agents) and the media]. If a consumer is in Toronto and wants to get to Vancouver, the different modes of transport need to be identified. In this case, the normal commercial options are bus, train, plane. Once this is accomplished, the consumer then needs to determine which product attributes need to be considered to evaluate each of the product alternatives. The consumer then moves to the evaluation stage and evaluates each alternative on each of the attributes and arrives at a "summary score" (i.e., overall attitude). Once this is accomplished, the consumer moves to the decision stage. At this point, based on the summary score for each alternative, the consumer selects the alternative that meets the consumer's choice criterion. Normally, consumers seek to maximize utility when participating in the marketplace.

Once the consumer has completed the complete process and purchase the desired product and brand at the desired store, the consumer must deal with Post-Decisional Cognizance. After a choice, the consumer may feel uneasy because of the existence of **cognitive dissonance**. The consumer may decide to try to return the product or deal with the cognitive dissonance in a number of ways. If the consumer actually uses the product, the consumer will evaluate choice in terms of how well it satisfies the consumer's need. If the need is well satisfied, the likelihood of the consumer of making the same decision the next time the same consumer problem arises increases.
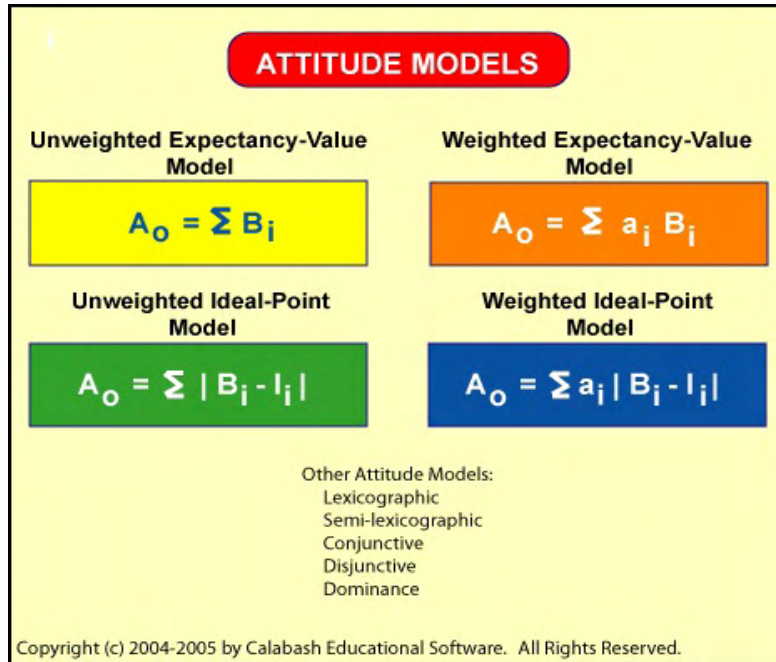
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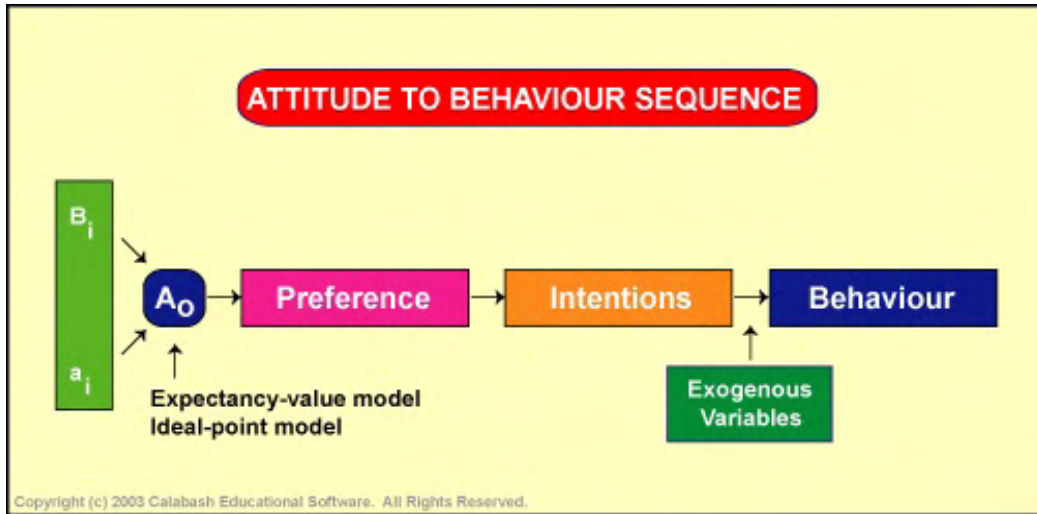
[2] Attitude-to-Behaviour Sequence. The ultimate goal of the marketer is to lead the consumer to carry out a specific *behaviour*: to make a purchase. However, products are normal produced before the behaviour takes place; therefore, the marketer needs to predict the consumer's behaviour. One surrogate measure of behaviour is to ask the consumer about future purchase *intentions* (i.e., How likely is it that you will buy a new car in the next 12 months?; who do you intend to vote for in the next election?).

If the consumer is telling the "truth" and there are no *exogenous variables*, then it is expected that the consumer makes the intended purchase. An exogenous variable, however, can lead to different behaviour (e.g., another brand was on sale at the time of the purchase). An exogenous variable is an external factor (variable) that influences the decision of a consumer (e.g., stock out of desired brand, another brand on sale, new brand on market).

Since intentions don't provide the marketer with much information, a measure of consumer *preference* is taken. The consumer is ask to rank a set of products, brands, or stores in order of preference. The most preferred object (e.g., brand) is expected to be consistent with intentions and behaviour. While preference measures provides the marketer with a little more information, it still is not enough.

The marketer therefore needs to obtain the consumer's *attitude* toward the different products, brands, and stores. The "summary score" mentioned above is the attitude measure. This measure explains a consumer's preference. One's attitude toward an object is expected to be a good predictor of preference, intention, and behaviour. The components of an attitude are the *belief scores* (one's belief about the nature of an object - e.g., taste) and the *importance scores* (how important is the attribute with respect to selecting the object). A number of different attitude models that consumers use in the marketplace have been identified. The expectancy-value and ideal-point models are just two of the models.

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ATTITUDE MODELS

Unweighted Expectancy-Value Model

$$A_O = \Sigma \, B_i$$

Weighted Expectancy-Value Model

$$A_O = \Sigma \, a_i \, B_i$$

Unweighted Ideal-Point Model

$$A_O = \Sigma \, | \, B_i - I_i \, |$$

Weighted Ideal-Point Model

$$A_O = \Sigma \, a_i \, | \, B_i - I_i \, |$$

Other Attitude Models:
Lexicographic
Semi-lexicographic
Conjunctive
Disjunctive
Dominance

[3] Attitude Models. Attitude models focus on how consumers process information about products, brands, and stores (i.e., how combine importance and belief scores to arrive at an overall or summary evaluation of the object.). Which approach is used depends on the consumer and the situation.

Lexicographic: Consumer identifies most important attribute and seeks the alternative that is best on that attribute (e.g., almost out of gas - most important attribute is availability - first gas station one finds is selected). Other attributes are not considered.

Semi-Lexicographic: Consumer starts with lexicographic approach, but then switches to some other model with the remaining alternatives. For example, a car must be made in Canada, believing that these are the best cars. Other cars are not considered. The consumer then evaluates the remaining cars using a different attitude model in order to make a final choice.

Conjunctive: Consumer seeks a brand that at least meets the minimum requirement on each of the attributes considered (e.g., thirsty! - anything that will quench one's thirst).

Disjunctive: Consumer seeks a brand that meets the required utility level on each attribute (i.e., maximizes), but it does not matter if the utility level is above the minimum level desired, since this minimum level is also the maximum required of the consumer (i.e., a minimax solution). Consumer defines point (level) of attribute that provides the maximum level of utility. As long as a brand performs at this level, it is acceptable. A brand that provides more utility (i.e., above the consumer's cutoff) is not considered to be any better

(e.g., consumer wants a computer with 100 mb of hard drive space. A larger hard drive would not provide any more utility to this consumer.

Dominance: Consumer seeks the best brand on each and every attribute considered - unlikely to find such a brand. A large car is not going to have the best gas mileage.
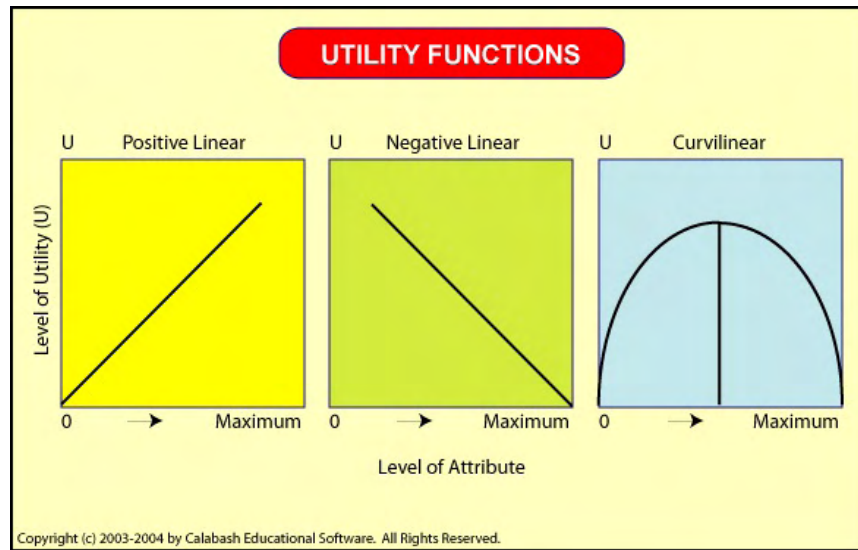
[4] Utility Functions. Each attribute (characteristic) of an object has an underlying utility function. A positive linear utility function means that the more of something, the better (e.g., greater gas mileage, more pleasant taste, more economic value). A negative linear utility function means the less of something, the better (e.g., lower calories, less salt, lower price). A curvilinear utility function means that it is not more of something or less of something that is better, but, rather, something in between (e.g., If you like 5 teaspoons of sugar in your coffee, no sugar provides little utility, as does 10 teaspoons. As you deviate from your ideal-point on an attribute, the less you like the product, whether it is more or less of something. When measuring attitudes, you have to make sure the mathematic scale used is consistent with the conceptual nature of the utility function. For a positive linear situation, greatest utility is provided at the top right of the line. For a negative linear situation, greatest utility is provided at the top left of the line. For a curvilinear utility function, greatest utility if provided at the top of the line (curve).
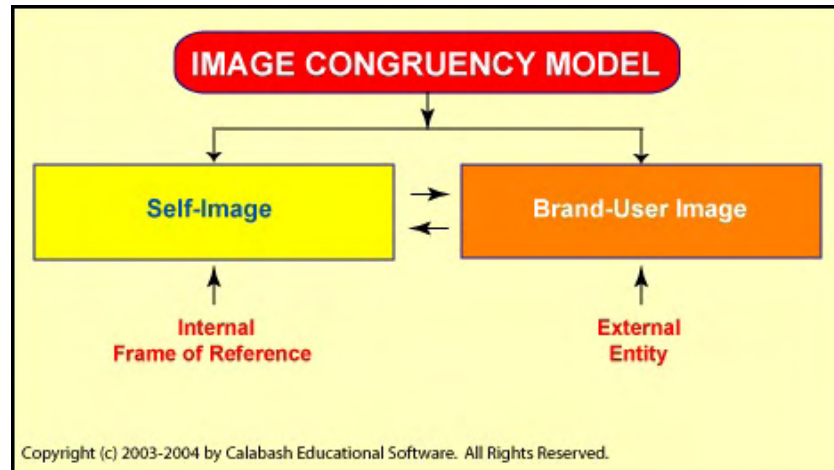
When the underlying utility functions within a product are mixed, it is best to use the ideal-point model instead of the expectancy-value model, in order to get a better, and meaningful, measure of attitude.

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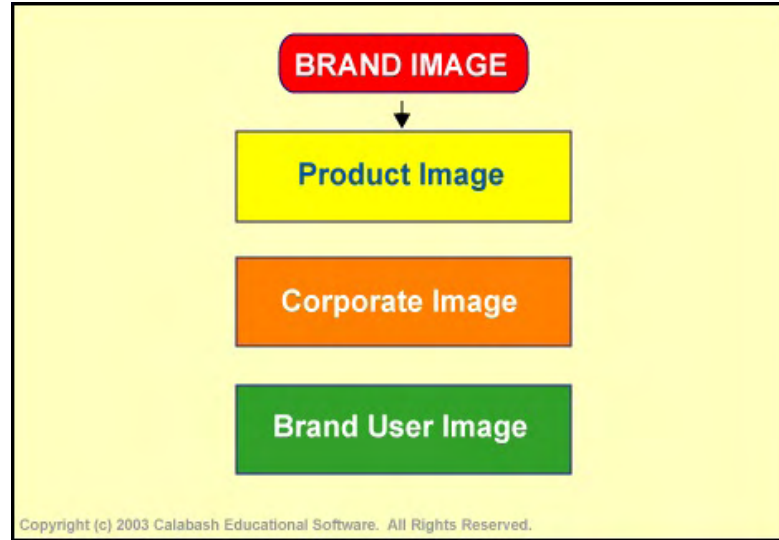
[5] Brand Image. Brand image comprises three components: Product image (an individual's perception of the physical characteristics of the product - e.g., taste); Corporate image (an individual's perception of the company that produces the product - e.g., reliable, trustworthy); and brand user image (an individual's perception of the typical user of a product, brand, or store - e.g., tough, young). A consumer may select a brand or store based on any or a combination of these images. These images relate to external entities (i.e., a brand or store).
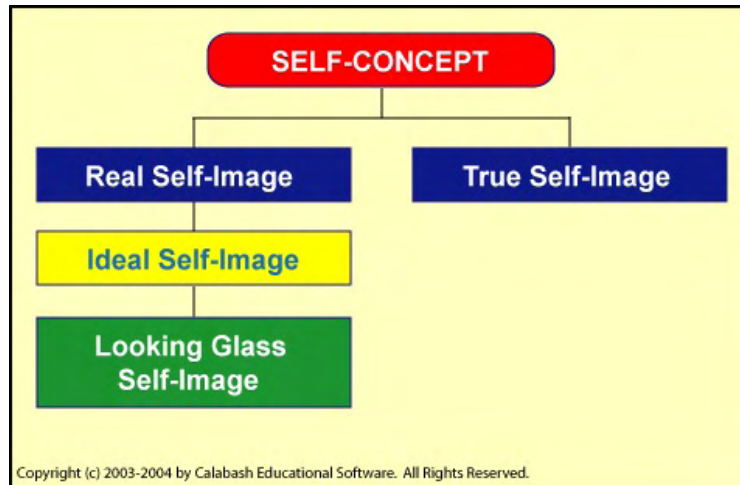
[6] Self-Concept. A consumer has three subjective self-images: real self-image (an individual's perception of the way he/she is as an individual); ideal self-image (an individual's perception of the way they would like to be); looking-glass self-image (an individual's perception of how he/she thinks other see him/her). A consumer may use any of these internal entities when seeking appropriate brands. The true self-image is the objective self-image (the sum of all of one's experiences during one's life). Since an individual is not aware of the true self-image, it is of no relevant to the marketer. An individual distorts reality (i.e., the components of the true self) in order to protect the real self-image.
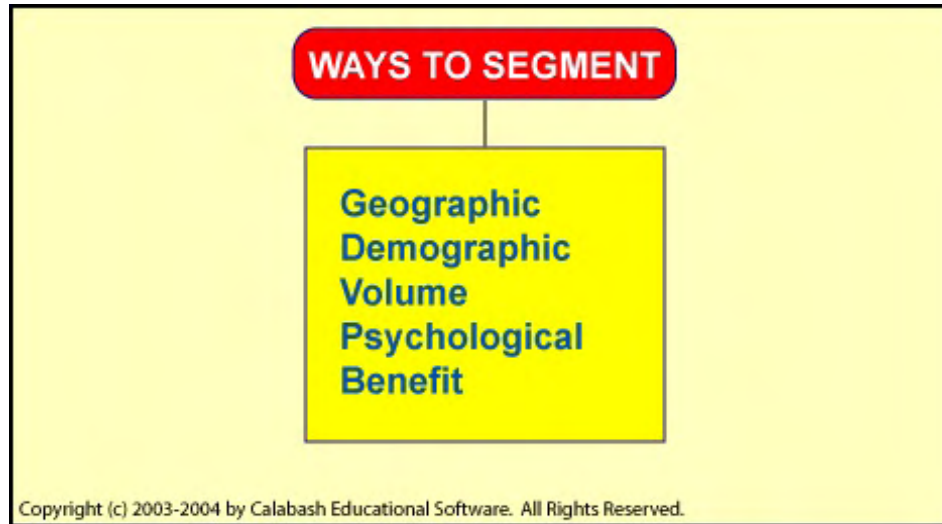
IMAGE CONGRUENCY MODEL

Self-Image → ← Brand-User Image

Internal
Frame of Reference

External
Entity

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[7] Image-Congruency Model. The consumer uses the self-image as an internal frame of reference to seek out brands which have brand-user-images which are more similar to the self-image to be expressed than other brands. The similarity between a similarity between a self-image and a brand image is referred to as the level of image congruency (i.e., similarity). The greater the level of image congruency, the greater is the level of brand preference.
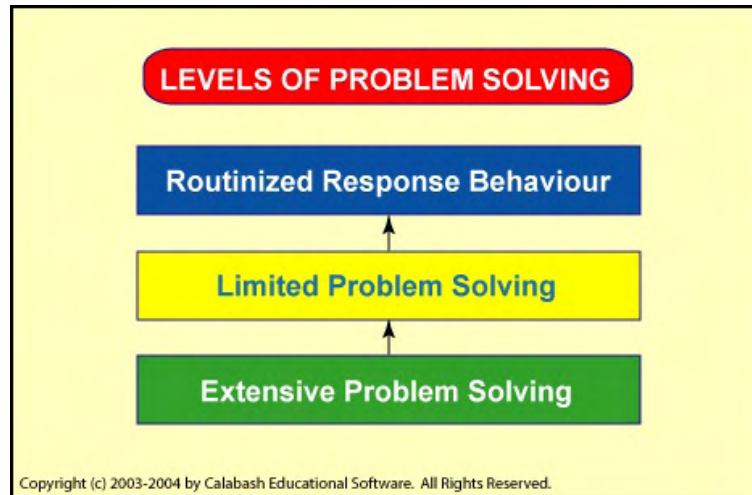
[8] Levels of Problem Solving. There are three levels of consumer problem solving: routinized response behaviour (habitual response behaviour) - the consumer has complete information to make a decision; limited problem solving - the consumer has most of the information to make a decision; extensive problem solving - the consumer has very little information to make a decision. Most of the choices made by consumers in a supermarket reflect routinized response behaviour - consumer buys same brands/products over and over. If a new brand or attribute exists or if a product/brand has changed in some way, the consumer may reconsider past choices and re-evaluate the alternatives and make a choice. The first time you buy a product, you are at the extensive problem solving level - e.g., go buy a helicopter! The over issue relates to the amount of internal (i.e., within the mind) vs. external (i.e., media, friends) information search is required to make a decision.
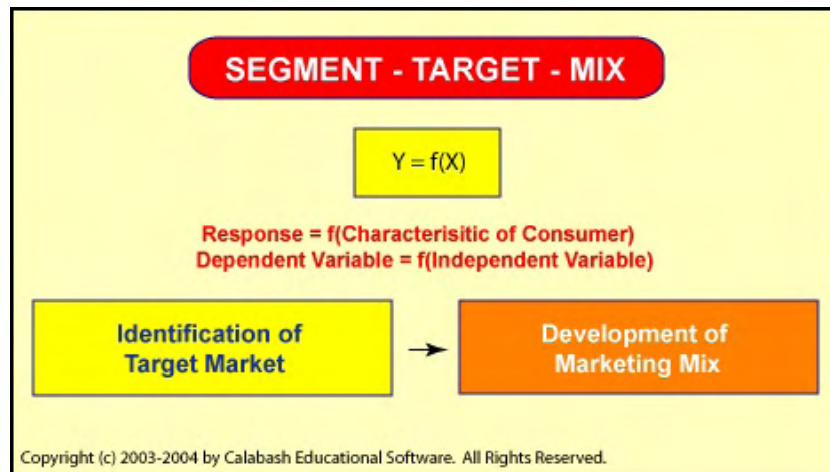
ADOPTION PROCESS

Unawareness

Awareness

Interest

Evaluation

Trial

Decision

Confirmation

[9] Adoption Process. The adoption process identifies the different stages an individual consumer goes through with respect to the adoption of a product. Unawareness is not considered to be part of the model, but this state must exist before there can be awareness. Interest means the consumer focuses on information about the product/brand. The evaluation stage refers to the formation of an attitude toward the object (i.e., brand/product). Trial means the first time a consumer uses a given product/brand. Decision refers to the stage where the consumer, after initial trial, decides to buy the product on a regular basis. After a time, a consumer may get tired of a product and may re-evaluate the "decision" to adopt the product - this re-evaluation is the confirmation stage - a decision to stay with the current choice or make a change.

WAYS TO SEGMENT

Geographic
Demographic
Volume
Psychological
Benefit

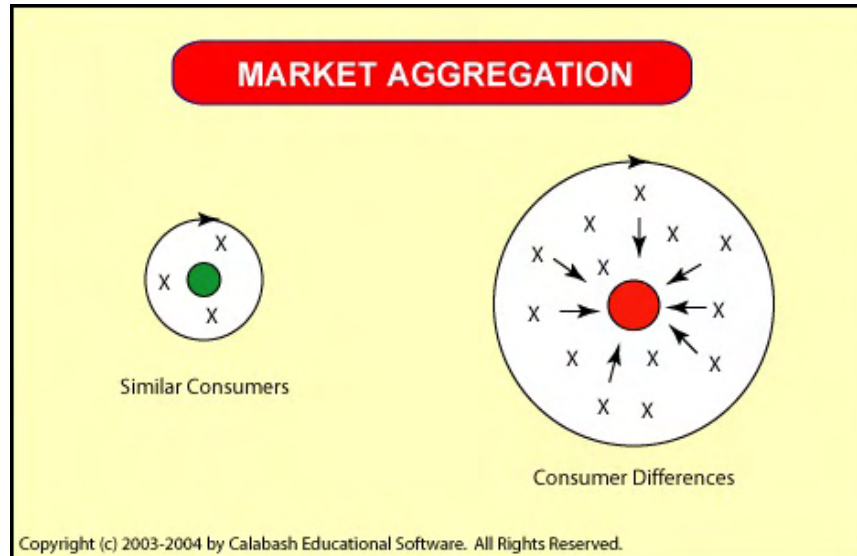Copyright (c) 2003-2004 by Calabash Educational Software. All Rights Reserved.

[10] Ways to Segment. Market segmentation means to divide up the consumer market (heterogeneous) into homogeneous groups based on organismic variables. These variables, inherent to the individual, can be of the following nature: geographic (location), demographic (age, income, height, hair colour), volume (consumption level), psychological (self-image, lifestyle, psychographic), benefit (decay prevention capability). Psychographic includes demographic and lifestyle measures. Lifestyle is measured using AIO measures - activities, interests, and opinions (i.e., what activities does the individual engage in, what are the individual's interests and opinions). The 80/20 rule reflects volume segmentation - 80% of the volume of a product is consumed by 20% (really more like 50%) of the consumers of the product - this is how you identify heavy users vs. light users. Once the segments are identified, the marketer then selects a segment to sell to (target market) and then develops a marketing mix for this homogeneous group. By segmenting, the marketing identifies homogeneous groups that are different (i.e., heterogeneous) from other groups.

MARKET SEGMENTATION

Multi-dimensional
Cognitive Space
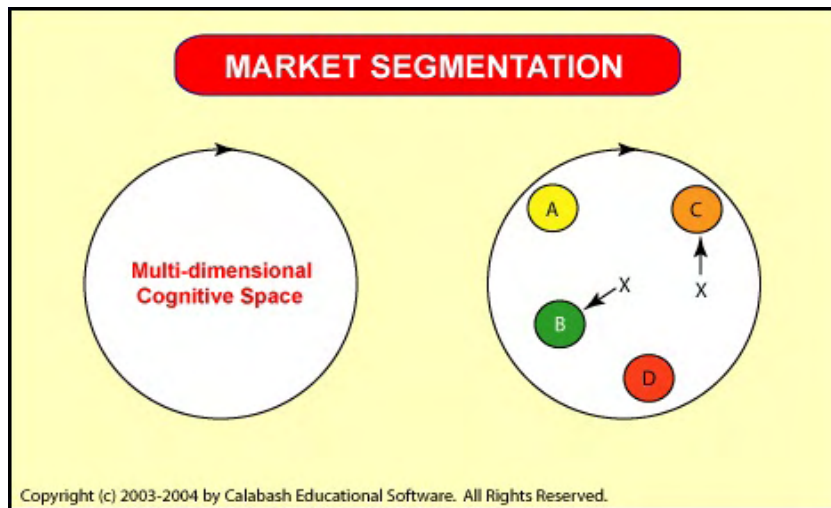
[11] Market Segmentation.   Market segmentation involves dealing with a multi-dimensional cognitive space (i.e., how one describes a market). Within this space, consumers are identified as being different. Segmentation involves grouping similar consumers together (e.g., Group A, Group B, Group C, Group D).   The consumers within each group are similar to one another (i.e., homogeneous) but different from those in the other groups (i.e., heterogeneous). The "x's" represent consumers not placed within a segment.

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SEGMENT - TARGET - MIX

$Y = f(X)$

Response = f(Characterisitic of Consumer)
Dependent Variable = f(Independent Variable)

Identification of Target Market → Development of Marketing Mix

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[12] Market Segmentation - Target Marketing - Marketing Mix Development Sequence. The variables selected for the purpose of segmenting a market must be related to some response. One segments based on gender (males, females) because there is an expectation that the two groups will respond differently to a particular marketing mix, otherwise, why segment. The sequence is as follows: segment the market, select desired target market then develop marketing mix for that target market (e.g., deodorant for males vs. females). The expected response (e.g., buy vs. not buy) is the dependent variable because its nature depends on the independent variable (e.g., gender).

MARKET AGGREGATION

Similar Consumers

Consumer Differences

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[13] Market Aggregation. Instead of using market segmentation, a marketer may seek to sell to everyone, thereby using market aggregation. This approach may be used if all consumers are similar to one another (small cognitive space on left) and segmenting would serve no purpose. This approach may also be used even if there are consumer differences (larger cognitive space on right), but the marketer chooses not to segment - i.e., just go after the "average" consumer, whoever that is. The market entry of new innovations reflect the latter approach (e.g., first computers, first spreadsheets, first TVs). Once the market develops and consumers accept the new innovation, market segmentation may then be used in order to better satisfy consumers versus just trying to get market acceptance of the initial product.

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MARKET MIX DIFFERENTIATION
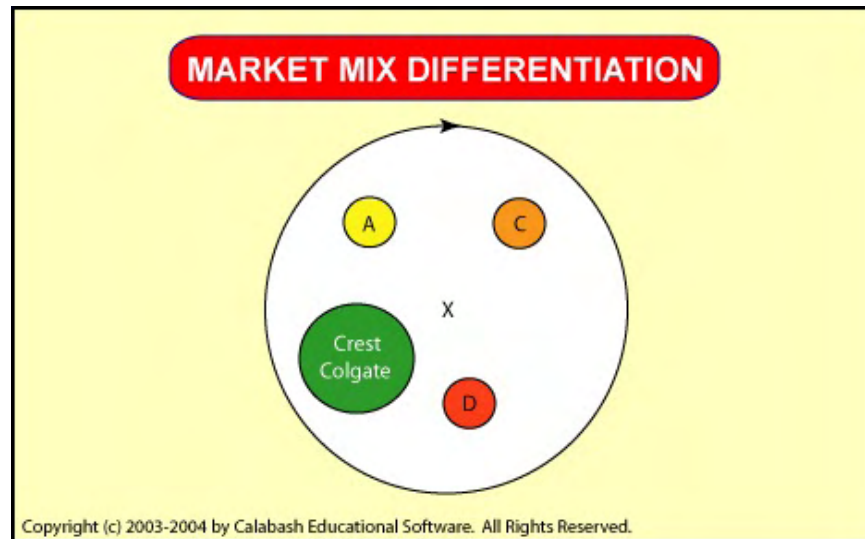
[14] Marketing Mix Differentiation. What sometimes happens when a marketer selects a given target market is that other marketers select the same target market. Initially, Crest toothpaste went after those who were concerned with tooth decay. They added fluoride to the toothpaste in order to satisfy this market. Colgate then did the same. As a result, the two companies are going after the same consumers. In this case, each marketer needs to make its marketing mixes look different from that of the other - i.e., different product, price, place, promotion.   The latter effort refers to marketing mix differentiation.

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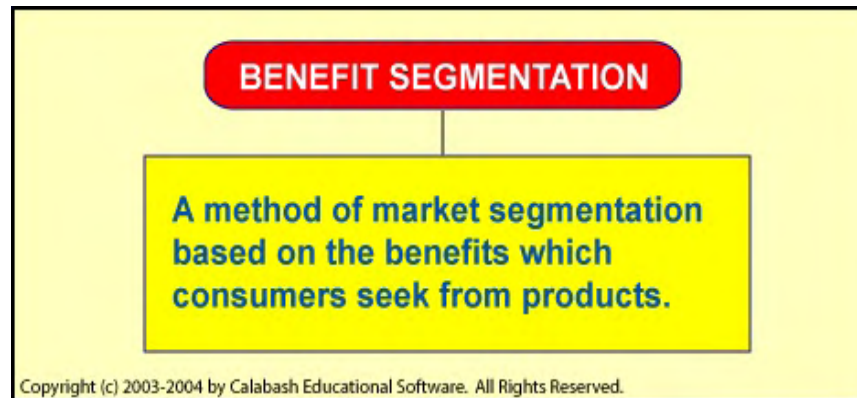
[15] Benefit Segmentation. An examination of this type of segmentation indicates that it is based on the "benefits" which consumers "seek" (e.g., decay prevention capability, whitening capability, breath freshening capability, economic price) from a product - not what a product offers (i.e., the marketing mix - toothpaste with fluoride, toothpaste with a whitener, toothpaste with mouthwash, a low cost price).

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