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## thesis entitled

Consumer Attitudes Toward Beef Consumption:
Operationalizing The Functionalists' Approach To Attitudes

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# CONSUMER ATTITUDES TOWARD BEEF CONSUMPTION: OPERATIONALIZING THE FUNCTIONALISTS' APPROACH TO ATTITUDES

Ву

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#### **ABSTRACT**

CONSUMER ATTITUDES TOWARD BEEF CONSUMPTION:
OPERATIONALIZING THE FUNCTIONALISTS' APPROACH TO ATTITUDES

By

## David N. Fine

This study, using Q-technique, identified three factors or groups of persons exhibiting similar reasons for their beef consumption habits. They were:

- I. The Confident Shopper. Factor I is a shopper who knows what she wants. She carefully selects beef cuts.

  Among her most important reasons for selecting a particular type of meat are price and variety; variety includes fish, chicken, and vegetarian.
- II. The Beef Lover. Factor II finds eating beef a sensual pleasure. She is not satisfied with just any beef and will shop at a store which sells only "good" beef. She also feels that beef is extremely important to the family diet.
- III. The Passive Provider. Factor III gets minimally involved in influencing family beef consumption. The Passive Provider is concerned with the taste of the meal and how he feels at the end of the meal, but not with purchasing or preparation.

#### **ACKNOWLEDGEMENTS**

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My heart goes out to my wife, Marti, who patiently guided and pressured me when and where it was necessary.

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#### CHAPTER I

#### INTRODUCTION

The majority of Americans consume beef on a regular basis. In a study done by the United States Department of Agriculture Economic Research Service only four per cent of their sample did not eat beef. 1

Beef consumption is on the increase. Between 1960 and 1970 there was an average annual consumption increase of about two per cent per person. As recently as 1974 beef consumption increased six per cent.<sup>2</sup>

The increase in beef consumption is due mostly to rising sales of 'good' grade beef as opposed to 'choice' grade beef. "All the old rules (about consumer meat-buying) are out," says William Tomek, a Cornell University professor of Agricultural Economics. "We are now operating in a state of ignorance." Supply was increasing while demand was unchanged. Prices remained high and consumers refused to buy.

United States Department of Agriculture-Economic Research Service, Consumer Satisfaction with Food Products and Marketing Services, Agriculture Economic Report No. 281, 1974 Survey Result, p. 23.

<sup>&</sup>lt;sup>2</sup>"Lean Times for Cattleman," <u>Business</u> <u>Week</u>, March 17, 1975, p. 94.

<sup>&</sup>lt;sup>3</sup>Joseph M. Wincki, "Balky Consumers Cause Lower Prices and Bigger Supplies of Beef and Pork," <u>Wall Street Journal</u>, March 22, 1974, p. 32.

In order to bring beef prices down, product changes were made. The American consumers were being weaned away from top-graded beef cuts. They were introduced to a lower fat, non-grain-fed cut of beef which had the grade of 'good' by the United States Department of Agriculture. Previously most Americans were buying the higher fat content and more tender USDA 'choice' grade of beef.

Occurences since 1972, which may be traced to Nixon's price freeze, have radically changed the beef industry. These changes have affected the ultimate buyer in the marketing chain---the consumer. She has changed some of her behavior patterns concerning the purchase of beef.

Presently, the market is in a state of flux. The American consumer is purchasing a lower grade of beef more frequently. This change presents a major marketing problem for distributors. We are at a point when we need to learn more about the consumer. This study is meant to present a fresh outlook of the beef consumer so we can understand the above stated problem and other purchasing habits of the consumer.

# A Statement of the Problem

Many factors influence the amount of beef which is consumed in the United States. Marketing values, such as the type of product, and economic factors, such as inflation, influence the success or failure of any product or service. The factor in which we are most interested in this study is promotion.

<sup>4&</sup>quot;High Hopes for Low Fat Beef," Business Week, September 21, 1974, p. 32.

Many factors in turn influence the effectiveness of the promotion. Advertising decisions, such as the type of media chosen or the wording of the copy, are one such factor. Another, and more important factor, is understanding the people who consume beef.

This study is concerned with how people experience beef from pre-purchase decisions to post-consumption decisions.

Naturally, in a mass market, the promoter is interested in predicting and influencing aggregate consumer behavior. However, a prerequisite to the prediction of group behavior and/or the initiation of persuasive communications intended to influence such groups is an understanding of the individual case. 5

This study: (1) examines how <u>individual</u> people experience beef, and (2) seeks to identify <u>pattern</u> relationships. Attitude measurement techniques generate the data; the ratings of each respondent are related to those of every other respondent, and clusters of individuals with similar patterns are grouped. For a given product or service, several consumer segments can usually be identified, each representing a potentially productive focal point for promotional efforts. 6

<sup>&</sup>lt;sup>5</sup>Thomas S. Robertson, <u>Consumer Behavior</u> (Glenview, Illinois: Scott, Foresman, and Company, 1970), p. 14.

<sup>&</sup>lt;sup>6</sup>Russel I. Haley, "Benefit Segmentation: A Decision Oriented Research Tool," <u>Journal of Marketing</u>, Vol. 22, (July, 1968), pp. 30-35.

## THEORY RATIONALE

Ultimately the marketer desires to influence the consumer. Thus there is a need for: (1) consumer orientation to marketing decision-making and (2) a general theory of consumer behavior.

The individual's behavior is based on his perceptions which are formed by many personal factors such as needs, moods, past experiences, and memory. There are no two people with the <u>same</u> set of perceptions.

Kretch and Crutchfield suggest four characteristics

of perception: 8 (1) "Perception is organized and meaningful."
The individual finds meaning and organization in all perceptions. The "rules" for such perceptions are internalized and based on past experiences. (It is these "rules" that we are trying to seek out in social science research.)

(2) "Perception is functionally selective." No one can perceive everything in his stimulus-environment, so he selects from what is available according to an immediate purpose for the individual. (3) "Perceptions of the substructure are determined in large measure by the properties of the structure of which it is part." Individuals' perceptions of single events and situations are determined by

other related events. Our cognitive field is not based on

<sup>7</sup>David Krech and Richard S. Crutchfield, "Perceiving The World," Behavioral Science Foundations of Consumer Behavior, ed. Joel B. Cohen, (New York: Free Press, 1972),

<sup>&</sup>lt;sup>8</sup>Ibid., p. 148.

each other tend to be apprehended as parts of a common structure." The way an individual constructs his environment determines which stimuli within the environment are related to one another. Thus, if an individual values symbols of wealth as important, he will group people according to such symbols as a large house, an expensive car, etc.

Each person is different. The marketer, in order to be successful, must find and exploit the different patterns of consumer behavior.

These differences brought the growth and development of the concept of market segmentation. It is based on the idea that groups of persons do purchase similarly. This is not to say that consumers want exactly the same things. The concept of market segmentation is intended to mean that people perceive products in such a way that a single promotional approach will make the product appear beneficial to many people.

The goal of segmentation research is to determine how heterogeneous individual consumers may be grouped into relatively homogeneous segments. Segments can be further understood by examining, ex post facto, demographic variables, socio-economic status, and attitude variables to see if

<sup>9</sup>Ronald E. Frank, William F. Massey, and Yorman Wind, Market Segmentation (Englewood Cliffs, N. J.: Prentice-Hall, Inc., 1972), p. 13.

significant pattern relationships exist. These relationships are tested for their predictive value.

Thus we need a comprehensive theory of consumer behavior. The components may be summarized as follows: (1)
The consumer should be the focal point of marketing efforts.

(2) All individuals perceive their environment differently and their behavior is shaped by their perceptions. (3)
The same products are perceived by consumers as satisfying different needs. If we can agree on the first three propositions, then we must call a theory into action which can operationalize the relative importance of product benefits.

## THE FUNCTIONAL APPROACH TO ATTITUDES

The functionalists assert that people take action based upon certain needs. The course of action which they decide upon is the course which will maximize their gains while minimizing their losses. If the action taken is considered successful by the individual, it is likely that given similar circumstances, he will take the same action. The reverse is also true. If the action were unsuccessful, we can expect a person to plan other action if the circumstances reoccur.

At the heart of the theory is the definition of attitude. The definition contains components important to understanding the theory.

According to Rosenberg, "When some object or class of objects (or symbols) regularly and dependably <u>elicits</u> an affective evaluation set that can be characterized as either

'pro' or 'con,' 'positive' or 'negative,' the individual is said to hold an attitude." Thus, if a person indicates a positive or negative feeling toward an object, then we know he has an attitude concerning that object.

There are concepts within the definition which need to be explained. First, the definition of objects will be discussed. Second, the definition of an affective evaluation will be discussed.

In the definition of attitude, the concept of objects and symbols was introduced. Simply, an object is a tangible thing which serves as a cue for some response for an individual. A symbol is something which represents an object. For example, a place setting at a dinner table is a cue that dinner will be served although the actual object, food, is not on the table. According to the definition, it takes an object or symbol to elicit an attitude.

The functionalists distinguish between affective evaluations (statements of feeling) and cognitive evaluations (statements of fact) arguing that the former alone make up attitudes. "Judgements which are purely cognitive would not fall into the category of attitudes." 11

<sup>10</sup>Milton J. Rosenberg, "A Structural Theory of Attitude Dynamics," The Public Opinion Quarterly, XXIV, (Summer, 1960), p. 319.

<sup>11</sup> Daniel Katz and Ezra Stotland, "A Preliminary Statement to a Theory of Attitude Structure and Change, in Psychology: A Study of a Science, ed. Sigmund Koch (New York: McGraw Hill, 1959), p. 429.

Daniel Katz suggests four functions that attitudes serve. In terms of this study, these functions are important in order to have a better grasp of the theory. The functions are:

- 1. The adjustment function. Essentially this function is a recognition of the fact that people strive to maximize the rewards in their external environment and to minimize the penalties.
- 2. The ego-defensive function in which the person protects himself from acknowledging the basic truths about himself or the harsh realities in his external world.
- 3. The value-expressive function...attitudes (which) have the function of giving positive expression to his central values and to the type of person he conceives himself to be.
- 4. The knowledge function based upon the individual's need to give adequate structure to his universe. 12

  It may also be important to understand these functions for analyzing attitudes and attempting to cause attitude change or attitude reinforcement.

Ultimately, the attitude is analyzed in terms of the function it is performing. If it can be decided that a person is employing the value-expressive function then marketing strategy could be made accordingly. For example, a person who wants to see himself as wealthy is expected to

<sup>12</sup>Daniel Katz, "The Functional Approach to the Study of Attitudes," The Public Opinion Quarterly, XXIV, (Summer, 1960), pp. 169-172.

react more favorably to an advertisement about Porterhouse Steak than he would to Hamburger. Thus, understanding the function aids in strategy design.

Attitudes do not exist independent of other attitudes and events in the environment. Everyone has a frame of reference. The frame of reference is best described as a conglomeration of attitudes organized in a fashion which makes decision-making easier. ". . .Its (frame of reference) presence means that the individual has an organized system with some 'logical' subordination and superordination of attitudes." Basically, this means that people have a hierarchy of attitudes. Certain actions taken are deemed more important or appropriate at a particular time. Thus, the frame of reference offers an immediate referral point to an individual so he may make a quick decision.

Furthermore, people desire and strive for group acceptance. Thus, an individual's attitudes are organized in terms of their relative importance to him in gaining group acceptance. Striving to remain a group member, he acts upon the attitudes which are most acceptable to the group.

In addition, the marketer must realize ". . .what you (the marketer) add to somebody's belief system must be mixed with beliefs that are already in there." 14 The marketer

<sup>13</sup>Katz and Stotland, "Theory of Attitude," p. 432.

<sup>14</sup>Walter A. Armbruster, "The Dynamics of Belief Dynamics," Journal of Advertising, III, No. 3 (1974), p. 26.

needs to account for this additional change when introducing new information to a consumer.

In review, the assumption made by the functionalists is that people structure and restructure their psychological field to <a href="mainto:maximize">maximize</a> the attainment of their goals. 15 So, to explain need-related goals or functions one must know that people have certain needs which must be satisfied and that there are often many alternative solutions. An individual then will choose the goal or function which maximizes his gain or minimizes his losses. In addition, Katz and Stotland point out, "...however, we assume a priority of the affective and behavioral components over the cognitive components. Need gratification is tied more specifically to the affective and behavioral components than to the cognitive content of the attitude. "16

The marketer's goal is to analyze his consumer then offer a product, which corresponds to the analysis. D. Cartwright writes, "To induce a given action by mass persuasion, this action must be seen by the person as a path to some goal that he has." The functionalist approach dictates that the marketer approach the consumer in such a way that the product suggests the attainment of a goal.

<sup>15</sup> Irving Sarnoff and Daniel Katz, "The Motivational Bases of Attitude Change," <u>Journal of Abnormal and Social Psychology</u>, XLIX, (1954), p. 115.

<sup>16</sup>Katz and Stotland, "Theory of Attitude," p. 446.

<sup>&</sup>lt;sup>17</sup>Ibid., p. 436.

Finally, promotional strategy is often intended to change attitudes. Attitude change can occur when "an audience member's beliefs about the value-serving and valueblocking powers of an 'object' (such as a consumer product, a social policy, or a political candidate) can be reorganized; his feelings toward that object, and ultimately his behavior toward it, will undergo corresponding change."18 Naturally, if the feelings of an individual concerning an object cannot be reorganized, the attitude is not expected to change. If it can be shown that the attitude is still related to the same need gratifications which elicited a particular response in the past then the attitude can be re-enforced by strengthening a person's need to make that response. For example, if a person chooses beef over pork because he feels beef is more nutritious and we can continue giving him evidence that beef is better for him, we can expect his attitude to be strengthened and become even more resistant to change.

#### **OPERATIONALIZING**

Q-technique is the method chosen to operationalize the theory. It was chosen for three reasons. First, it is concerned with <u>subjective</u> information. Second, the respondent <u>ranks</u> opinion statements making his attitudes very clear. Third, it offers a rational means of <u>generalizing</u> from individuals to groups.

<sup>18</sup>Milton J. Rosenberg, "Theory of Attitude Dynamics,"
p. 324.

According to Katz and Stotland, "A direct operational measure of an attitude would be the elicitation of verbal statements of goodness or badness about some object or symbol." In Q-technique, respondents are interviewed in open-ended fashion, so that a number of verbal statements concerning the 'goodness' or 'badness' about beef from the respondents' point of view, can be gathered. It is from their <u>subjective</u> statements that the final instrument is constructed. Purely cognitive (factual) statements are eliminated making all statements in the sort based on feelings.

Second, the subject when responding to the 'array' of statements is asked to rank order them. The subject ranks the statements on a continuum from 'most approved' to 'least approved'. There is also a neutral pile for those statements about which the subject has no strong subjective reaction. According to the functional approach to attitude theory, a person's actions can be predicted by how the subject ranks the attitude statements on the continuum. As a rule of thumb, according to Rosenberg, ". . . the 'stronger' the attitude, the more likely it will be that the subject will take consistent action toward the attitude object." Thus, if the subject puts a statement in the most agreed upon column of the instrument, we can expect him to take favorable action upon the object. This permits behavior prediction resulting in behavior reinforcement or change.

<sup>&</sup>lt;sup>19</sup>Katz and Stotland, "Theory of Attitude," p. 429.

<sup>20</sup>Milton J. Rosenberg, "Theory of Attitude Dynamics,"
p. 336.

The functionalists assume that people in general belong to groups. An individual will often choose a group based upon common interest. This common interest is termed a 'frame of reference'. A person's frame of reference is based on group norms and group acceptance. So, it is logical to assume that when people rank statements in the sort, they are using internalized group norms to some degree. According to Rosenberg, "when attitudes are highly normative for a given group, it is likely that there will be considerable similarity not only in their overall affective response to the attitude object but also in their beliefs (both consistent and inconsistent) about it."21 Thus, if a person answers a sort in a particular way, we may be able to assume that he is a representative of his 'frame of reference' group. This would permit the researcher to make a generalization from the individual to a group. However, one cannot determine the size of this group from this type of deduction.

As a final point, the information gathered from the study should have some enduring qualities. "An attitude is a stable or fairly stable organization of cognitive and effective processes around some object or referent." Even though events change, attitudes about things usually remain. A present-day example is peoples' attitudes concerning large

<sup>&</sup>lt;sup>21</sup>Ibid., p. 339.

<sup>&</sup>lt;sup>22</sup>Sarnoff and Katz, "Attitude Change," p. 116.

cars. Although the economics of owning a large car have changed, many people still prefer to buy and own a larger automobile.

## LIMITATIONS

There are limitations with the research design used in this study, primarily that the relatively small sample and non-random subject selection prevent generalization to the numbers of each attitude type in the population. In most marketing applications, designs of the present type are followed by studies that use large numbers of randomly selected subjects.

Psychometricians disagree about a number of technical procedures used. For example, some psychometricians have argued that ipsative measures (with non-free-floating means) and forced-choiced sorting distort the metric characteristics of the phenomena under study. Nunnally, on the other hand, provides evidence that both these characteristics are advantages, given a sufficiently large number of items. 23

In the present study, subjects were chosen to provide attitudinal heterogeneity and not randomly chosen, so it must be regarded as "conclusive" only in terms of the kinds of attitudes that emerged, not in terms of statistical generalization to any population.

<sup>23</sup>Jum C. Nunnally, <u>Psychometric Theory</u> (New York: McGraw-Hill, Inc., 1967).

#### CHAPTER II

#### METHODOLOGY

The rationale for Q-technique was explained in Chapter I, p..12. Briefly restated, the procedures in Q-technique offer operations for the functional approach to attitudes.

The functionalists define attitudes as a set of opinions or beliefs about an object. Opinions are functional, that is, opinions differ in importance to individuals based on how valuable the individual believes they are in helping that person in achieving instrumental, ego-defensive, value-expressive, and knowledge goals. Functionalists point out that attitudes change over time. Furthermore, attitudes do not exist independent of other attitudes or events in the environment.

Q-technique is useful in operationalizing the several basic assumptions of the theory. Q-technique involves the collection of an operant sample of opinion statements about an object - in this case, beef. In sorting these statements, subjects rank opinions, hence this measures their relative importance to the individual, both positive and negative. A limitation of the present design is that it measures attitudes at a single point in time, therefore not allowing for changes in attitudes over time. A strength of the

ment is affected by the ranking of all others. Thus, the subject must not just decide the value of each statement, but the relative value of each item.

# Selection of the Q-Sample

The subjects for the in-depth interviews were chosen to reflect a variety of incomes, age, and employment status. Men and women were interviewed. The subjects who had incomes from three thousand to over fifty thousand dollars, were aged from 23 to 61, and were employed either full or parttime or as homemakers.

The interview schedule was designed to elicit a wide range of opinions about beef. The first questions were very general; the respondent was asked about his general feelings concerning the uses of beef products. The latter questions were more direct——dealing with specific cuts of beef, features of stores, preparation alternatives, nutrition, etc.

All interviews were arranged in advance and conducted in the respondents' homes. No person refused an interview request. Interviews ranged in length from one hour to two and a half hours. The questions were presented with an objective of limiting interviewer bias and with minimal direction given. Notes taken during the interview were transcribed shortly after each interview was completed.

Four hundred opinion statements were chosen from notes taken in the ten interviews. These statements were

self-referent and "synthetic" in the sense that they were not statements of fact but were open to conjecture. The four hundred statements were reduced to fifty-five by eliminating duplications and idiosyncratic statements and by combining several clearly related statements.

The Q-sample included opinion statements dealing with the entire process of choosing and using beef. Statement 3, for example, dealt with a preference for discussing beef purchases with "a knowledgeable butcher". Statement 25 expressed a post-purchase condition, liking "the feeling of being stocked up on beef". Other statements dealt directly with preferred characteristics of beef and benefits associated directly with the consuming experience. Statement 27, for example, expresses the opinion that "the family determines the success of a meal".

The fifty-five statements which appear in the Q-sample are broadly representative of the opinions of the persons interviewed. The sorting of these statements is done to permit each subject to model his or her own attitude toward beef. Statements in the sort were randomly numbered.

The Q-sample was pretested using five persons. In addition to sorting the statements, each person was asked to indicate his or her neutral statements in order to determine the balance of positive and negative statements in the distribution. The distribution of the statements made by the respondents showed equal weights on the negative and the positive sides of the distribution, showing that

the wordings of negative- and positive-oriented statements need not be changed to balance the sort. All of the state-ments were understood by the respondents and none were modified as a result of the pre-test.

# Selection of Respondents

Respondents were chosen by quota control sampling; that is, respondents were chosen using variables thought to be relevant about beef consumption. The "P-sample" variables were age, sex, total years of education, marital status, occupation, number of children, and family income.

Some influence on consumption patterns was expected due to total years of education or occupation. Thus, a broad range of education levels and occupational groups were represented. The study included seven persons with high school degrees, sixteen with some college and twenty-three who have at least a bachelor's degree. Their diverse occupations include homemaking, interior designing, and audiology.

The subjects ranged in age from twenty-one to sixtyone with the mean age being forty-two. Twenty-seven of the
subjects, more than half of the sample, were between the
ages of forty and fifty-five. Twenty-nine subjects had
children ranging from less than a year to 18 years.

The variables deemed most important in influencing consumption patterns and buying behavior were sex and income.

It is assumed that women usually do the actual shopping thus giving them the greatest amount of influence at the point of purchase. Due to this fact, women compromise forty of the fifty-five subjects.

Income was also considered an important variable. It was felt that people's consumption patterns are heavily influenced by their ability to buy what they want to buy when they want to buy it. The distribution of incomes was nearly equal for each of the income brackets. There were eighteen subjects earning between zero and nineteen thousand dollars, thirteen earning between twenty and thirty-nine thousand, and thirteen earning forty thousand or more.

# Administration of the Q-Sample

The Q-sample was administered to fifty-five persons.

Two classes of undergraduate advertising students administered thirty-four of the sorts. Another thirteen of the sorts were administered by the author. The other eight subjects were given the sorts to do on their own; they were given a brief explanation of the sort and written instructions.

The statements in the sort were shuffled. Then each subject was instructed to sort the statements into three piles: one containing those statements with which he agreed, another containing those with which he disagreed, and the last containing those about which he was neutral or undecided.

Subjects then sorted the statements into piles that satisfied the following frequency distribution:

N=55	Most Disagr		·			<del></del>						Mos Agre	
Value:	-6	-5	-4	-3	-2	-1	0	+1	+2	+3	+4	+5	+6
Pile Number	1	2	3	4	5	6	7	8	9	10	11	12	13
Number of Statement		3	4	4	5	6	7	6	5	4	4	3	2

Respondents were asked to "explain why" they had placed statements at the extremes (-6 and +6). These comments, together with demographic data and information on food expenditures and purchasing habits, aided the researcher in interpreting the data.

# Analysis of the Data

Fifty-five completed Q-sorts were processed by the computer using the QUANAL program developed at the University of Iowa by N. Van Tubergen. Each sort was correlated with all sorts to provide a correlation matrix, which the computer then factored using the principle-axes method. The different factors which are obtained are groups of individuals who sorted the statements in a similar manner. Next, the factors were rotated orthogonally through a varimax solution to obtain mathematically a maximum number of "pure

loadings,"24 on one and only one factor. Several hand rotations were then performed in order to improve the solution.

The Spearman Weighting Formula<sup>25</sup> was then applied to the factor loadings; individual sorts for each factor were weighted according to the factor loading. The computer then added the weighted ranking across each statement, producing a representative sort for each factor. The program calculated Z-scores for the statements and then arrayed the statements on a "most-agree, most-disagree" continuum for each factor, based on the Z-scores.

The QUANAL factor analysis gave three factors which were "interpretable". Two criteria used to decide which factors are interpretable are as follows: one, only factors with a certain number of persons with significant "pure" loadings are interpreted. The number chosen for this study was four. Two, the QUANAL program computes eigenvalues (the amount of variance accounted for by each factor). It is customary in Q-studies to reject a factor when the amount of variance is less than a minimum, represented by a designated eigenvalue. Factors with eigenvalues of less than 1.000 are commonly rejected for interpretation and that criteria was used in this study.

<sup>24</sup> "Pure" or significant factor loadings are determined by computing the standard error for a zero correlation coefficient: SE=1/ $\sqrt{n}$ , where n=number of statements. In this study SE=1/ $\sqrt{55}$  = .135. Loadings greater than .338 (2 1/2 SE) are significant at p < .01.

 $<sup>\</sup>frac{25}{1-r^2}$ . Charles Spearman, The Abilities of Man (New York: Macmillan Co., 1927), Appendix xix.

#### CHAPTER III

#### INTERPRETATION

## Introduction

In a study using Q-technique subjects are asked to sort a group of operant statements into a prescribed distribution representing their attitude toward the subject matter of the set of opinion statements. Each subject's sort is correlated with the sorts of all other subjects, and those which correlate beyond a selected level of significance are grouped. Each group of sorts, or factor, is then averaged to produce a single sort representative of the factor. Each factor represents a pattern or way of sorting the statements which is systematically different from the way in which the statements were sorted by other factors, and the "typal array" or typical sort for each factor best represents the way in which the statements were sorted by persons loaded on that factor.

The process of interpretation of the sort for each factor is abductive, in that one seeks an "explanation" which accounts for the distribution of statements representative of the factor. The abductions are limited, however; the explanation must fit the operant evidence, the data. The data are not subjective, and the arrays of statements representing

factors are mathematically arrived at and based on the operations of respondents. The reader who is not satisfied with the interpretation here-offered is encouraged to review the data provided in the appendices of this study and make his own interpretation.

The interpretation involves both finding explanations and communicating these explanations. A full examination of each factor, together with detailed references to the supportive data, is included. A brief "thumbnail sketch" of each factor is given first, without reference to the data. These sketches are given so that the reader might comprehend the interpretations in general before detailed interpretations and evidence are given.

Each factor is assigned a label (Factor I - The Confident Shopper; Factor II - The Beef Lover; and Factor III - The Passive Provider). These alliterative appelations are meant to offer the reader an easy "cognitive handle"---a readily recallable association of the factor with its most significant or unique characteristics. These are not meant to be taken literally as interpretations.

Lastly, the consensus items---those statements about which all factors essentially agree---are important in any Q-study; they provide the basis for knowing what is important to all of the subjects, in both a positive and negative way. This study had nineteen consensus items, which are examined before the detailed interpretations are given.

## Brief Sketches

The factor analysis identified three factors. A
"thumbnail sketch" of each is presented before the presentation of the consensus items and the detailed interpretation of each factor. Because the sort for each factor represents a "typical" attitude, and because the interpretation of each factor is a description of a hypothetical person representing that attitude (the Confident Shopper, the Beef Lover, the Passive Provider), the factor is often referred to in third person singular. The reader is cautioned that the "he" or "she" used in the interpretations will refer to both men and women who loaded on the factor.

# Factor I: The Confident Shopper

The Confident Shopper is a shopper who knows what she wants. She carefully selects beef cuts, without assistance from a butcher. Among her most important reasons for selecting a particular type of meat are price and variety. She wants a low price and a variety of meal types including fish, chicken, and vegetarian. The final important selection criterion for the Confident Shopper is the nutritional value of the beef. The Confident Shopper is careful not to select beef with too much fat.

## Factor II: The Beef Lover

The Beef Lover finds eating beef a sensual pleasure. She is not satisfied with just any beef and will shop at a store which sells only "good" beef. She also feels that

meat, especially beef, is extremely important to the family diet. The Beef Lover's major complaint is about her preference for more expensive cuts of beef than she can now afford.

# Factor III: The Passive Provider

The Passive Provider gets minimally involved in influencing family beef consumption. The Passive Provider is concerned with the taste of the meal and how he feels at the end of the meal, but not with purchasing or preparation. He wants to eat a well-prepared cut of beef.

## Consensus Items

Consensus items——those statements about which every—one agrees——can be used to develop communication strategy to appeal to all factors. The items given high positive scores are important because the factor groups not only agree but highly value these statements. The negative items indicate themes which should be avoided in a communication program, or positive versions of these statements could be used as themes. Neutral items are of least value for developing communication themes.

Nineteen statements were consensus items: eight positive and eleven negative. Of the positive ones, one was highly positive and two were moderately positive. These are:

Statement	<u>FI</u>	FII	FIII	Average Z-score
(22) Good quality beef is especially important on special occasions such as entertaining.	1.10	1.50	1.50	1.38
<pre>(40) I prefer to buy cuts of beef that are familiar to me.</pre>	1.10	0.60	1.20	0.94
(47) When there's good beef on the table the family appreciates it.	0.40	1.10	1.20	0.89

Statement #22 reflects a desire to buy and serve the best for special occasions. The beef consumer is like most consumers and prefers to purchase products of which he has some knowledge (#40). Statement #47 shows that the family can distinguish and appreciate good beef when it is served.

Of the negative statements, three were highly negative and two were moderately negative. They are:

Statement	<u>FI</u>	<u>FII</u>	FIII	Average Z-score
(20) A good steak sauce makes a steak just that much better.	-1.50	-1.90	-1.80	-1.75
(15) It's the shop- per's fault if he ends up with beef that is not satisfactory.	-1.80	-1.90	-1.00	-1.56
(10) I do not bother selecting beef cuts; if it looks good I get it.	-1.70	-1.10	-1.10	-1.29
(31) In my opinion freezer beef is quite as good as fresh beef.	-0.80	-1.40	-0.70	-0.97
(19) It's very satis- fying to prepare and serve an expensive meal.	-0.90	-0.50	-1.20	-0.87

Statement #10 shows that people carefully choose a piece of beef that looks good. If the cut selected is not good, the consumer will hold the store responsible for selling inferior meat (15). Statements #20 and #31 suggest that people want the flavor of beef to be natural and not changed by storage or sauces. Number 19, for communication purposes, should be interpreted as: it is satisfying to eat a good meal but the preparation and serving is a necessary evil.

The other eleven items are considered neutral consensus items. These are, ranging from most positive to most negative:

<u>Statements</u>	<u>FI</u>	FII	FIII	Average Z-score
(55) The better the quality of beef sold the more I appreciate a store.	0.70	0.60	0.40	0.57
(26) A delicious meat dish is a tribute to the person who cooked it.	0.70	-0.10	0.90	0.52
(12) I like cuts of beef that don't take much time or trouble to prepare.	0.10	0.20	1.00	0.43
(3) I like to talk with a good knowledgeable butcher when I'm buying beef.	-0.40	0.40	0.10	0.03
(54) I like to experiment with ground beef. It's so flexible you can do anything with it.	0.60	-0.10	-0.40	0.02
(4) It's irritating to see a store display beef with too much fat around the outside.	0.10	-0.30	0.00	-0.06

Statements	FI	FII	FIII	Average Z-score
(51) When you have hungry stomachs you nee cuts of beef and recipe that go a long way.	s	-0.40	0.30	-0.08
(21) I want a butcher I can trust to satisfy what I want.	-0.50	-0.10	0.30	-0.10
(28) Eating out is a good time to try an unusual cut of beef or novel recipe.	0.10	-0.60	-0.30	-0.28
(48) I buy beef that's wrapped. It's easier to handle and more sanitary.		-0.70	-0.70	-0.58
(35) I don't like experimenting. I prefer to cook beef in a way I'm familiar with.	-0.70	-0.40	-0.70	-0.61

The neutral consensus statements cover a broad range of categories. Statements #55, #4, and #48 are concerned with the store at which a person shops. The statements reflect a type of merchandising and display of beef about which all people are concerned. Statements #3 and #21 show that the beef consumer wants to talk to a knowledgeable butcher while taking his advice with caution. The typical American consumer does not want to spend much time in the kitchen; this is supported in this study by statement #12. Credit is given to the cook for a delicious meal (26). The consumer needs help for those occasions when people are especially hungry. She seeks out recipes that stretch beef usage (51).

All factors like to experiment with their cooking (#35). They do not prefer experimenting when they eat out (#28).

# <u>Factor I: The Confident Shopper</u> <u>Demographic Data</u>

Thirty-eight subjects loaded on Factor I including thirty females and eight males. The subjects on this factor ranged in age from 21 to 61; their mean age is 42. Thirty of the subjects are married. Four men between the ages of 21 and 30 are single. Of the five unmarried women two are widowed, two are divorced, and one is single. Respectively their ages are 45, 56, 57, 39, and 28. This factor included five people earning over \$50,000; two earn \$40,000 - \$50,000; two earn \$30,000 - \$40,000; two earn \$20,000 - \$30,000; twelve earn \$10,000 - \$20,000; and six earn 0 - \$10,000. 26

Their mean income is \$24,000. 27

The subjects represent a broad range of occupations and educational backgrounds. Thirteen of the 38 subjects are homemakers. Ten others are working in non-professional capacities. For example, four of the subjects are secretaries. The remaining fifteen reflect various professions: two are in administrative capacities, four are college professors, two are teachers, three are lab technicians, and four others an audiologist, an engineer, an interior

<sup>&</sup>lt;sup>26</sup>One individual did not report her income.

 $<sup>^{27}{</sup>m The}$  mean income was obtained using the reported incomes.

designer, and a salesman. Their educational levels are represented by eleven high school graduates, twelve with some college, and fifteen with at least a college degree. Four of the subjects had post graduate degrees in a food related field. One of these subjects was interested in the grading of beef products and one of them was interested in consumer behavior concerning beef. The average educational level for the factor is 14 years.

Twenty-four of the thirty-eight subjects had children under the age of twenty-one. The average number of children is 1.3. Only five of the respondents report having no children at all.

Factor I persons estimated that they spend approximately 20 per cent of their income on food. About 19 per cent of their total food dollar goes for the purchase of beef. This contrasts with the 29 per cent which Factor II reported for beef expenditures.

The people in this factor do not follow ads very closely, but they do look at ads more than other factors. Only five of the thirty-eight subjects look at the ads all the time. Eleven other Factor I subjects usually check the ads. A smaller percentage of the other two factors usually check the ads. On an average, approximately five meals per week include beef for the subjects of this factor. 28 This also appears to be an average across factors.

<sup>&</sup>lt;sup>28</sup>Since all meals were not specified, answers varied. Some people included beef for lunch, e. g. bologna, others only thought of dinner.

Also on the average, Factor I's feel they have a moderately strong influence upon purchasing and cooking decisions. As a group they feel they have the strongest influence in deciding where to buy, next, in what cuts to buy, followed by influences in what cuts to prepare, which recipes to use, and how much to spend for beef. Their least amount of influence is upon how much to spend for food.

The men in Factor I feel only a moderate degree of influence. They feel they have more influence in deciding how much to spend for beef and least influence in deciding which recipes to use and what cuts to prepare.

The subjects in this factor are at an age and income level where a small percentage of their income is used for food. Their food selection is hardly limited due to lack of funds; they can shop for food by taste alone.

A third of the factor, being homemakers, spend much time on meal planning and preparation. This may account for the large variety of foods within their diets.

It is interesting to point out that all the food experts who were interviewed fell into this factor. The mean educational level of this factor does indicate a probable knowledge of nutritional benefits.

Usually, one store will not have a reputation of selling good quality meat, fish, or chicken. In order for a
subject in this factor to get quality and variety, she needs

to shop at several markets. Due to her need for shopping around, she may have a tendency to follow ads more closely than the other factors.

## Attitudinal Data

The Confident Shopper is a decided shopper. She does not want any assistance from a butcher (#41, #3). One subject's response to statement #41 clearly points out her independent decision-making process: "The butcher doesn't know what I like my beef to look like." Even further, she places no trust in a butcher (#21). She thinks she probably knows enough about meat to make the best selection (#42). Her decision is not rushed; she will take her time, weigh the different qualities of the meat displayed, then make her decision (#10).

Statement	Factor I Z-score		Difference (Z-Z average)
(41) I don't want the butcher to pick out meat for me; I want to see it and select it myself.	0.84	-0.51	1.34
<pre>(3) I like to talk with a good know- ledgeable butcher when I'm buying beef.</pre>	-0.42	0.25	-0.68
(21) I want a butcher I can trust to satisfy what I want. Who the butcher is really makes a difference.	-0.50	0.09	-0.59

Statement	Factor I Z-score		Difference (Z-Z average)
(42) I feel that I know enough about beef to be able to make the best selection.	0.18	-0.89	1.08
(10) I don't really bother about selecting beef cuts. If it looks good to me, I get it.	-1.67	-1.10	-0.57

The Confident Shopper enjoys meals with meat as well as without. She feels that good meals do not have to include meat. Also, her satisfaction with a meal can come from a variety of sources, either chicken or fish (18, 29, 16). The Confident Shopper will become tired of even high quality beef if she eats it too often (52). If the slogan, "Variety is the spice of life," were created in regard to beef, I would venture to say the author was from this group.

Statement		Average of Other Z's	Difference (Z-Z Average)
(18) I don't feel like I've really had a meal unless I've had meat.	-1.90	0.60	-2.50
(29) A person ought to have good meals, and for me that includes beef.	-1.23	0.87	-2.10
(16) To me, there's something special about beef. It's better than just having chicken or fish.	-1.80	1.04	-1.83
(52) Good beef is good almost anytime. It's a taste I don't get tired of.	-0.09	0.93	-1.03

The Confident Shopper does not think of beef as having outstanding sensual qualities. She responded negatively to all the sensual pleasure statements in the study (1, 7, 5). The most important consideration for the Confident Shopper is the price of the meat (23). She will buy the lower grade, less tender cuts without expecting disappointment (33). She doesn't believe one must pay the price for good meat (37). This is because she feels she has the know-how to prepare cuts of meat in the most advantageous way, no matter the grade or the cut.

Statement	Factor I Z-score		Difference (Z-Z Average)
(1) Eating a tender, juicy steak is a sensual pleasure, just close your eyes and enjoy.	-0.64	0.73	-1.42
(7) I like a hearty steak, beef you can really sink your teeth into.	0.02	0.80	0.78
(5) I like to eat beef in a leisurely way, savoring every bite.	-0.21	0.51	-0.72
(23) The meat prices of stores are an important consideration in choosing which store to shop.	1.14	-0.48	-1.62
(33) If I were to buy economy beef, I'd expect to be somewhat disappointed.	-0.78	0.22	-1.00
(37) Finally, you get what you pay for. And to get good beef, you have to be willing to pay the price.	0,03	0.83	- 0, 80

The Confident Shopper wants a cut of beef which is lean, yet tender (38). In order to make lean meat tender, it is important to put in additional preparation time and have the proper cooking knowledge. The Confident Shopper feels that she knows how to prepare various cuts of beef, as exemplified by this statement, "I've been cooking for thirty years and am comfortable in cooking beef" (43). She enjoys taking extra time to add the special touch to a meal. She realizes that her family appreciates a better cut of beef (47). In addition, she wants to know the different cuts of beef and exactly how to prepare them (44, 43).

Statement	Factor I Z-score	_	Difference (Z-Z Average)
(38) A really good cut of beef would be both lean and tender.	1.37	-0.10	1.48
(44) It's nice to do something extra with beef, the little extra preparation that makes a meal something special.	1.13	0.12	1.01
(43) It's important to know the various cuts of beef and how to cook them.	1.85	0.93	0.92
(47) When there's good quality beef on the table, the family really appreciates it.	0.40	1.14	-0.74

The Confident Shopper believes that all beef, expensive or inexpensive, has the same nutritional value (24). She is concerned with the amount of fat in her family's diet and feels that the less fat one eats while eating beef the better

off they are (34). People in Factor I do not feel that a certain amount of beef each week is necessary to supplement their diets (53).

2.20	0.91	1.29
1.36	0.25	1.11
-0 58	0 52	-1.10
-		1.36 0.25

The Confident Shopper does not shop separate stores for her groceries and meat (30). Since she is confident, she probably feels she could make the proper meat selection at any store. Thus, she does not need to rely upon a store's reputation to get the quality beef she desires. The Confident Shopper prefers buying beef that is pre-wrapped. She likes to examine it and feels it's more sanitary (48). She does, however, appreciate a store for the quality of the beef sold (55).

Statement	Factor I Z-score		Difference (Z-Z Average)
(30) I want to buy my meats where I buy my groceries; I don't like to shop in several	0 <b>.</b> 75	<b>-0.</b> 09	0.84
places.	0.75	- <b>0.</b> 03	0.04

Statement	Factor I Z-score		Difference (Z-Z Average)
<pre>(48) I prefer to buy beef that't wrapped. It's easier to handle and it's more sanitary.</pre>	-0.36	-0.69	0.33
(55) The better the quality of beef sold, the more I appreciate a store.	0.68	0.51	0.17

Factor II: The Beef Lover

#### Demographic Data

Eleven subjects loaded on Factor II---eight females and three males. The subjects ranged in age from 21 to 43; their average age is 37. Eight of the eleven subjects are married. Two of the men are single and one woman is divorced.

The subjects' income levels ranged from under \$10,000 to \$50,000+. The factor was represented by two people earning over \$50,000; four earn \$20,000 to \$30,000; two earn \$10,000 to \$20,000; and three earn less than \$10,000. Similar to factor one, a little more than half of the subjects earn between ten and thirty thousand dollars, averaging \$24,000 a year.

The average level of education was 14 years, the same as for Factor I. Also, approximately one third of the subjects were homemakers. The other occupations were varied. This factor had three people with 16 or more years of education, four persons with 13 to 15 years of education, and

three with 12 years.<sup>29</sup> In terms of occupations, none of the subjects were presently in an occupation to make them beef experts in any way.

Seven of the subjects have children under the age of 21. The average number of children under 21 years per subject is 1.5. Only two of the subjects, both single males, have never had children.

This factor reports that 26 per cent of their income is spent on food. Factor I reported 20 per cent; Factor III, 17 per cent. Of that 26 per cent, Factor II estimated that they spent 29 per cent of their food dollar on beef. Once again, this is compared to the 19 per cent for Factor I and the 20 per cent for Factor III.

In the past year, this factor shopped at an average of five stores to purchase beef. That is one more than either other factor. The Beef Lover probably shops at as many stores for their grocery needs as the other factors. Their desire for quality beef may lead them to a specialty store which has a reputation for quality. This may account for their higher average. As did the other factors, they sometimes check the ads before they go shopping.

As reported in the demographic data for Factor I, Factor II also figured that they ate five meals per week which include beef. Although the average of weekly meals including beef are the same for both groups, it is unlikely that the Confident Shoppers eat as much beef as the Beef Lovers. The

<sup>&</sup>lt;sup>29</sup>One subject did not report educational level.

Confident Shopper, who is more concerned with a 'nutritional, well-balanced diet', probably thought of her entire week's meal schedule and not just dinner. The Beef Lover, who thinks of beef as being thick and juicy, probably did not include her all-beef luncheon bologna in her thinking process while answering this question. In light of this difference, it may be assumed that the Beef Lover consumes a good deal more beef than the other factors.

As a group, the subjects felt they had equal influence over all of the family influence factors except which recipes to use. They feel when it comes to choosing recipes the family unit influences their choice.

The men in this factor feel they have the strongest influence in deciding what cuts to buy and what to prepare. Upon the other consumption decisions, he has a somewhat weaker, but equal, influence. These include which recipes to use, where to buy beef, how much to spend for beef, and how much to spend for food.

The women feel they have the strongest influence in deciding where to buy beef, how much to spend for beef and how much to spend for food. Their next strongest influence is deciding which cuts to buy and which cuts to prepare.

Finally, their weakest influence is in which recipe to choose.

The subjects in this factor indicate a desire to have good beef. They spend the greatest percentage of their total food dollar on beef. They shop, on the average, at five stores, which is more than the other two factors. They

exert a strong influence upon consumption decisions, possibly indicating a need for less family input; this may be due to the lack of desire for having a great variety in their diets. They love beef for taste and nutrition.

Attitudinal Data

Factor II is the Beef Lover. She likes to sit down to a large, thick steak, the kind you can really sink your teeth into (14, 7). From the strength of her response to statement #2, she not only loves a large steak but she dislikes a small steak (2). The Beef Lover describes the pleasure of eating a beef meal in the highest terms available in this study. She describes eating a tender juicy steak as a sensual pleasure, savoring every bite (1, 5). The Beef Lover, unlike subjects of Factor I, says good beef has a taste she never tires of (52).

Statement	Factor II Z-score		Difference (Z-Z Average)
(14) My idea of a good steak is one that's reall thick.	y 0.90	-1.22	2.12
(7) I like a hearty stea beef you can really sink your teeth into.	k, 1.47	0.07	1.40
(2) I like a petite stea one that's not too large.		0.89	-2.31
(1) Eating a tender juic steak is a sensual pleasu Just close your eyes and enjoy.		-0.41	2.00

Statement	Factor II Z-score		Difference (Z-Z Average)
(5) I like to eat beef in a leisurely way, savoring every bite.	1.14	-0.17	1.31
<pre>(52) Good beef is good almost anytime. It's a taste I don't get tired of.</pre>	1.09	0.34	0.75

The Beef Lover will buy her meat in a different place than she buys her groceries, indicating her desire for purchasing meat at a specialty store (30). She is not concerned with the price of meat, only the quality (23). And she is a person who would enjoy buying more expensive cuts than she now does (13). The Beef Lover, who is sure to shop at a reliable meat market, does not expect to get inconsistent quality beef. If one does end up with unsatisfactory beef, it is the store's fault (46, 15).

Statement	Factor II Z-score		Difference (Z-Z Average)
(30) I want to buy my meats where I buy my groceries; I don't like to shop in several places.	-0.52	0.55	-1.07
(23) The meat prices of stores are an important consideration in choosing which store to shop.	-0.81	0.49	-1.30
(13) I'd really like to buy more expensive cuts of beef than I feel I can afford.	0.42	-0.84	1.26

Statement	Factor II Z-score		Difference (Z-Z Average)
(46) Once in a while you get inconsistent quality beef from most any store. You can't expect to get the beef you really want every time.	-0.67	0.44	-1.11
(15) It's the shopper's own fault if he or she ends up with beef that isn't satisfactory.	-1.87	-1.40	-0.47

She feels that she can judge beef quality by looking at the meat (45). Unlike Factor I, she desires a know-ledgeable butcher to whom she can talk. It seems she believes a store which sells good beef would employ a knowledgeable butcher (3).

Statement	Factor II Z-score		Difference (Z-Z Average)
(45) I don't feel I can really judge beef quality just by looking at the meat.	-1.08	0.30	-1.38
(3) I like to talk with a good knowledgeable butcher when I'm buying beef.	0.43	-0.18	0.61

The Beef Lover wants to buy a bright red piece of meat (11). She prefers it fresh and not frozen (31). She does not like pre-wrapped meat; pre-wrapping is not the way better meat stores display beef (48).

Statement	Factor II Z-score	Average of Other Z's	Difference (Z-Z Average)
<pre>(11) I prefer to buy beef that has a nice, bright red color.</pre>	1.66	0.17	1.49

Statement	Factor II Z-score		Difference (Z-Z Average)
(31) In my opinion, freezer beef is quite as good as fresh beef.	-1.41	-0.75	-0.66
<pre>(48) I prefer to buy beef that's wrapped. It's easier to handle, and it's more sanitary.</pre>	-0.70	-0.53	-0.17

Referring to health, the Beef Lover considers beef to be an important part of one's diet and believes it is necessary to have some beef each week (53). Good meals, for taste and nutrition, include beef (29).

Statement	Factor II Z-score		Difference (Z-Z Average)
(53) Beef is an important part of one's diet, and we should get at least a certain amount of beef each week.	1.25	-0.40	1.65
(29) A person ought to have good meals, and for me, that includes beef.	1.10	-0.30	1.40

The Beef Lover recognizes the importance of marbling or fat within the beef to give it flavor. Economy beef with less marbling leaves something to be desired. The Beef Lover wants enough fat to have that good beef flavor (34).

Statement	Z-score	Average of Other Z's	Difference (Z-Z Average)
(34) The less fat a person eats in their beef, the better off			
they are.	<b>-0.</b> 50	1.18	-1.68

The Beef Lover believes it is a good meal simply because the entire family likes it (27). She does not credit

the cook for a delicious meal, perhaps because she credits the quality of the meat (26).

Statement	Factor II Z-score		Difference (Z-Z Average)
(27) A meat dish is a success if the entire family likes it.	0.31	1.12	-0.81
(26) A delicious meat dish is a tribute to the person who cooked it.	-0.06	0.81	-0.87

The Beef Lover enjoys cooking outdoors; this results in a better steak (39). She doesn't enjoy steak sauce, probably thinking that it masks the flavor (20).

Statement	Factor II Z-score	Average of Other Z's	Difference (Z-Z Average)
(39) There's something about cooking outside that results in a better steak.	1.81	-0.18	1.99
(20) A good steak sauce makes a steak just that much better.	-1.94	-1.65	-0.28

Proper food preparation is important to taste. The Beef Lover realizes that enjoyment depends on knowing how to cook various cuts of meat (43).

Statement	Factor II Z-score		Difference (Z-Z Average)
(43) It's important to know the various cuts of beef and how to cook them.	0.74	1.49	-0.74

## Factor III: The Passive Provider

## Demographic Data

Factor III had the fewest number of subjects---two females and four males. It is the only factor with a male majority. Factor III has the smallest age spread, ranging from 35 to 55 years old; their average age is the highest at 48 years. Five of the subjects are married. One of the women is a widow and has five children.

Factor III's self-reported incomes ranged from below ten thousand to fifty thousand dollars a year. One person earned below ten thousand; two persons earned \$10,000 to \$20,000; three persons earned \$40,000 to \$50,000. Factor III's earn the most money per year on an average - \$28,000. Across factors, the average incomes probably make little difference due to the high average income each group earns. It is unlikely that their buying habits are curtailed by their incomes.

The most interesting demographic information is that of the five subjects who reported their occupations all are employed outside of the home. It is quite possible that the subject who did not report her occupation is employed because she has seventeen years of education and her children are old enough to be left alone.

Factor III's have the highest average level of education. They average seventeen years as compared to the other factors' fourteen years. Only one subject has just a high school education.

All of the subjects have children. The two oldest do not have children under twenty-one years old. Their average was the same as the other factors, 1.6.

Factor III reported that they spent 17 per cent of their income on food. This is the lowest of the three factor groups. Of that amount, they believed 20 per cent went to beef. These figures are quite similar to Factor I.

Factor III averaged shopping at twelve stores. If the extraordinarily high answer of 50 given by one subject is disregarded, an average of four is obtained. Once again, this is the same answer given by Factor I.

Similar to the other factors, this group sometimes looks at the advertising. Two of the subjects always look at ads; two others look at them sometimes; the final two never look at ads.

These subjects eat approximately seven meals a week which include beef. This would be two more than either of the other factors. If, once again, the extraordinarily high answer given by subject #15 is removed, it is found that this factor averages five beef meals per week.

Overall, Factor III's feel that they have the weakest influence upon beef consumption within the family. They feel they have between a strong and moderate influence upon deciding what cuts to buy, deciding what cuts to prepare, and deciding where to buy. The subjects feel they have a moderate influence in deciding how much to spend for food and beef and weak or no influence upon choice of recipes. The most

interesting distinction is that while the other two factors feel they exert moderate influence over recipe decisions, Factor III subjects feel they have no influence over them. This is an indication that these people do little, if any, of the food preparation.

The subjects of this group are quite similar to the Confident Shoppers in many of their responses: in size of their families, in per cent of income spent on food, in per cent of money spent on beef, in the number of stores shopped, and the frequency of checking ads. Factor III differs in that of those that reported occupations, all were employed; this is an indication that they do not have the time to make shopping decisions.

## Attitudinal Data

The Passive Provider does not want to get involved in meal preparation. He prefers cuts of beef which do not take long to prepare and he does not agree that cooking outdoors results in a better steak (12, 39). The Passive Provider may not really mean that he wants cuts of meat which don't take long to prepare but he seems to be saying, "I want my meal ready when I arrive home."

Also, in light of the demographic data, one must question if this group truly dislikes the <u>taste</u> of charcoaled beef or if they dislike the <u>preparation</u> of charcoaled beef. The people of Factor III are probably the family members who take on the responsibility of cooking outdoors. Through experience it seems cooking chores are broken down into two

categories: the person who takes care of the everyday meals in the home and the working partner who is responsible for outdoor meal preparation. The objection of this factor to charcoaled beef may simply be a lack of desire to prepare the meal.

Statement	Factor III Z-score		Difference (Z-Z Average)
(12) I like cuts of beef that don't take much time or trouble to prepare.	0.94	-0.16	1.10
(39) There's something about cooking outside that results in a better steak.	-1.82	1.64	-3.45

The Passive Provider does not like to <u>prepare</u> meat proportions so that there are leftovers (6). As was pointed out in the demographic data, the Passive Provider does not get involved in the preparation of meals - leftovers to him mean eating the same thing tomorrow.

Statement	Factor III Z-score		Difference ( <u>Z-Z Average</u> )
(6) I like to prepare meat proportions so that	1 12	0.60	1 00
I don't have leftovers.	1.12	-0.68	1.80

The Passive Provider judges the 'success' of a meat dish by the family's appreciation of it. Apparently, his personal judgements of meals are tied into the family's conception of 'good' and 'bad'. This may be due to the fact that he is the breadwinner in the home and the preparer of the family meals has his main likes and dislikes in mind while preparing the meal (27, 47).

Statement	Factor III Z-score		Difference (Z-Z Average)
(27) A meat dish is a success if the entire family likes it.	1.49	0.53	0.96
(47) When there's good quality beef on the table the family really appreciates it.	, 1.15	0.76	0.39

The Passive Provider does give credit where credit is due. He will give credit to the cook for a good meal (26).

Statement	Factor III Z-score		Difference (Z-Z Average)
(26) A delicious meat dish is a tribute to the person who cooked			
it.	0.90	0.33	0.57

Although he is not the primary shopper for the family, the Passive Provider has several ideas about qualities of beef. He knows that it is the fat content of the beef which gives it the flavor (50). He realizes it takes extra preparation to make economy beef taste good (32). He prefers fresh red meat over aged, grey-tinted beef (17).

Statement	Factor III Z-score		Difference (Z-Z Average)
(50) Beef can be too lean, in my opinion. I like beef with enough fat to taste good.	1.58	-0.54	2.12
(32) I prefer the economy beef. It takes longer to cook, but if you do the right things with it, people won't know the difference.	-0.52	-1.68	1.16

Statement	Z-score	_	(Z-Z Average)
(17) Beef with a slight grey tint is best. It's a sign the beef has aged, and aged beef is best.	-1.13	-2.19	1.06

Even though he knows what he wants in beef, he doesn't think he can pick it out of the meat case himself. He does not feel he can judge beef quality nor does he feel he has the knowledge to make the best selection (45, 42). The Passive Provider prefers to rely on the expert at the meat market - the butcher (41). And he holds the butcher responsible for his satisfaction with the beef (15).

Statement	Factor III Z-score		Difference (Z-Z Average)
(45) I don't feel I can really judge beef quality just by looking at the meat.	0.66	-0.57	1.23
(42) I feel that I know enough about beef to be able to make the best selection.	-1.47	-0.07	-1.40
(41) I don't want the butcher to pick out meat for me; I want to see it and select it myself.	-1.19	0.51	-1.70
(15) It's the shopper's own fault if he or she ends up with beef that is not satisfactory.	-1.01	-1.83	0.81

In order to get good beef, one must be willing to pay the price (37). The Passive Provider is not disappointed by high beef prices and he doesn't need to know how much to spend at the meat market (8, 36). Since he has only moderate influence over the food budget, he leaves the concern of beef prices to the one in the family budgeting the food money.

Statement	Factor III Z-score		Difference (Z-Z Average)
(37) Finally, you get what you pay for. And to get good beef, you have to be willing to pay the price.	1.06	0.32	0.74
(8) I'm disappointed every time I see the prices I have to pay for beef.	-0.56	0.45	-1.01
(36) I like to know about how much I plan to spend on beef before I get to the meat department.	-0.99	-0.03	-0.96
par ancire.	0.33	3.03	0.70

The Passive Provider wants to be satisfied and not too full at the end of a meal (9). He prefers a petite steak, never a large, thick one (2, 14).

<u>Statement</u>	Factor III Z-score		Difference (Z-Z Average)
(9) I like the feeling at the end of the meal of being satisfied, but not too full.	1.96	1.09	0.87
<pre>(2) I like a petite steak, one that's not too large.</pre>	1.14	-0.40	1.54
(14) My idea of a good steak is one that's really thick.	-1.35	-0.09	-1.26

The Passive Provider is satisfied in terms of the quality of beef he generally eats as it relates to his income. He does not want to buy more expensive cuts than he can afford (13).

Statement	Factor III Z-score	-	Difference (Z-Z Average)
(13) I'd really like to buy more expensive cuts of beef than I feel I			
can afford.	-1.07	-0.09	-0.98

Since the Passive Provider does not do the cooking or meal planning, he is not concerned with having an abundance of meat in the refrigerator or the freezer (25, 49). He does not realize the convenience that comes with storing meat in the home.

Statement	Factor III Z-score		Difference (Z-Z Average)
(25) I like the feeling of being stocked up on beef, of looking in the refrigerator and seeing an abundance of beef.	-2.12	-0.52	-1.60
(49) I like having all the meal options that come with having beef in the freezer.	-0.63	0.23	-0.86

#### CHAPTER IV

#### CONCLUSIONS

This study was undertaken to discover and explain patterned attitudes toward beef consumption. The study was intended to further the examination of Q-technique as it relates to consumer behavior, and to consider ways the data might enter into communication strategy to promote the consumption of beef. The conclusion has been divided into theoretical and practical sections. The theoretical section examines the evidence for propositions contained in the functional approach to attitudes. The practical section contains implications for the promotion of beef to consumers.

## Theoretical Implications

## Existence of Attitudes

The definition of attitudes is given by Rosenberg (Chapter I, pages 6 and 7): "When some object or class of objects (or symbols) regularly and dependably elicits an affective evaluation set that can be characterized as either 'pro' or 'con', 'positive' or 'negative', the individual is said to hold an attitude." The Q-study was constructed with statements which were meant to resemble 'symbols' about beef

consumption. The Q-sort requires the respondent to react to and evaluate the opinion statements by either agreeing or disagreeing. All of the subjects interviewed were able to react to all of the statements positively or negatively, applying their particular use-patterns concerning beef.

## Functions of Attitudes

A key to understanding the factors is an awareness of the differing functions which attitudes serve. Unfortunately, the Q-sort does not offer adequate information for discussing different functions attitudes perform: adjustment, eqodefensive, value-expressive, or knowledge (Chapter I, page 7). Each of the functions is quite complex. A single attitude appears to reflect a number of functions or a combination of functions. For example, statement #39: "There is something about cooking outside that results in a better steak", exemplifies the difficulty of applying attitude functions to groups. Factor II loves to eat their beef after it has been cooked outside. Simply, some of them may be expressing the adjustment function. That is to say, they have tried cooking their beef both indoors and outdoors and prefer it cooked outdoors. Other Factor II's may be perceiving themselves as 'great outdoorsmen' and want to express this function by cooking outside, thus - the value-expressive function. Yet, there still may be a third group which expresses both of the functions at the same time. They may prefer beef cooked outside for its flavor but may also enjoy cooking outside to express their feelings about the great outdoors.

These functions are better suited for explaining an individual's case and not a group of individuals. An individual can be deeply scrutinized and his reasons for acting in a particular manner can be learned.

# <u>Verification of the Frame of Reference</u>

The frame of reference is an arrangement of beliefs and opinions in order of importance (Chapter I, page 9). The frame of reference is a hierarchy of opinions. This hierarchy is empirically supported in this study by the manner in which the subjects loaded upon the different factors. The factor groups were formed by the computer, based on the placement of the opinion statements on the grid. Simply through successfully and correctly completing the instructions of sorting, the individual is forced to create a hierarchy of opinions, ranging from most-agree to most-disagree.

The fact that different operant factors exist is evidence that people have different attitudes and that their attitudes represent different functions. Individuals have different ways of relating to beef or fitting beef into their life style. For example, the Beef Lover enjoys the flavor of beef like some people enjoy their leisure time. The Confident Shopper, on the other hand, eats beef because it offers a change from daily eating routines.

## Practical Implications

# Implications for Promoting Beef

Beef is promoted to mass audiences. The results of this study indicate that the promoter may choose to appeal to the mass audience or any of the three factor groups identified herein. Nineteen consensus items resulted. This indicates a commonality among the segments providing a basis for themes that may serve in communicating with all segments at once. There were also three distinct opinion groups which may be appealed to directly. These strategies will be examined.

# Mass Audience Appeal

Eight of the nineteen statements in the neutral category scored high either in the negative or positive columns. If we accept the functionalist approach to attitudes and agree that an attitude must 'elicit an affective evaluation' then only the neutral statements which had the highest scores within the neutral column should be examined. These are:

Statement	<u>FI</u>	FII	FIII	Average Z-score
(22) Good quality beef is especially important on special occasions such as entertaining.	1.10	1.50	1.50	1.38
(40) I prefer to buy cuts of beef that are familiar to me.	1.10	0.60	1.20	0.94
(47) When there's good beef on the table the family appreciates it.	0.40	1.10	1.20	0.89

Statement	FI FI	<u>FIII</u>	Average Z-score
<pre>(19) It's very satisfy- ing to prepare and serve an expensive meal.</pre>	-0.90 -0.5	50 -1.20	-0.87
(31) In my opinion free- zer beef is quite as good as fresh beef.	-0.80 -0.9	50 -1.20	-0.97
(10) I do not bother selecting beef cuts; if it looks good I get it.	-1.70 -1.3	10 -1.10	-1.29
(15) It's the shopper's fault if he ends up with beef that is not satisfactory.	-1.80 -1.9	90 -1.00	-1.56
(20) A good steak sauce makes a steak just that much better.	-1.50 -1.9	90 -1.80	-1.75

The promoter has the option of incorporating several or only one attitude in any advertisement. For example, a television ad might show a shopper carefully selecting her fresh beef (31, 10). The camera could give a close-up of the meat with a clearly marked and recognizable label (40). The scene could be changed to a family gathering with guests. The guests and the family comment upon the quality of the beef prepared for this obvious special occasion (22, 47). The announcer concludes the ad with the store's guarantee concerning their beef (15). If the second option is chosen, any one of the above scenes may be singled out. We might see the shopper selecting her beef from a well-displayed case offering easy access and small crowds (10). Or a scene of appraisal of beef quality at a special occasion, such as entertaining guests, may be shown (22).

## Segmenting Strategies

An appeal can be made to the Confident Shopper by showing her a wide open meat counter which offers many choices of the same cut of meat. The Confident Shopper wants to select her own cut because she feels she is the only one who knows what her meat should look like. The ad could show or say that our store offers an accessible meat counter, with a wide selection of beef of similar cuts so you can choose the best for yourself.

In order to make an appeal to this group, one should be sure to remember that they are confident. They know what they want in a cut of meat. They know about nutrition. And they have been "cooking for 30 years", so they know about recipes. In any approach, let the Confident Shopper feel she is making the total decision.

The Beef Lover is an easy sale because she is already sold. Most any approach would be effective to this
group. The promotion should take a positive approach and
can emphasize flavor, nutritional quality, and the store's
desire to help the consumer with her selection.

The Passive Provider does not get involved in the purchasing or preparing of the meal. The factor is comprised of working men and women who support a family and do not want to spend the time or energy with promotions. The men's participation is probably limited to stopping at the store and buying an item described by his wife.

Since the Passive Provider is not the primary decision maker, a direct approach to this group may be a waste of money. However, it is interesting to note that many of the demographic characteristics indicate a similarity between Factor I and Factor III. For example, they feel they spend 20 per cent of their food dollars on beef and 17 per cent of their income goes to food. They differ greatly though in the characteristics which concern shopping and cooking. In these categories the Passive Provider feels he exerts little influence while the Confident Shopper exerts greater influence.

It may be hypothesized that the characteristics exhibited by the Passive Provider are similar to the mates of the Confident Shopper. If this is the case, the Passive Provider should be appealed to through the Confident Shopper. The Confident Shopper must be reminded of the desires of the Passive Provider. The Passive Provider does not like making shopping decisions. He does not feel he knows enough about meat that he can make the right selection (42). An ad should convey to the Confident Shopper that anybody can get the 'right' cut of meat at their store. Possibly a guarantee could be given and/or the promise that a meat market manager is always on duty to assist the customer. In times of need, the Confident Shopper could pass these thoughts along to the Passive Provider so he won't feel that he can make the wrong decision.

## Suggestions for Further Study

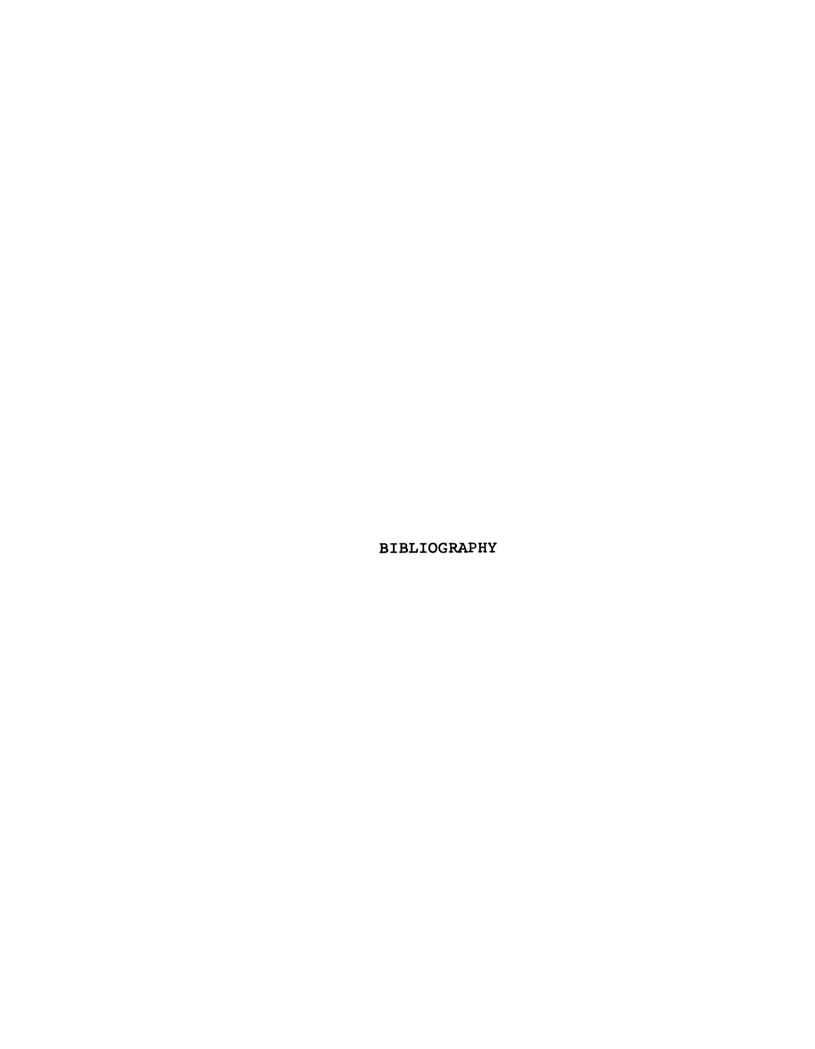
Hopefully, this study suggests as many questions as it offers answers. A strength of Q-technique is that the data help to generate hypotheses. The evidence lends itself to a particular interpretation; however, the information gathered from the opinion statements and the demographic data could suggest another interpretation than given herein.

The study suggests other avenues to be explored. The same Q-sort administered to husbands and wives or to entire family units may result in a new factor or a different interpretation. It may be found that the strengths of different family members upon purchasing decisions have been overlooked. For example, the husband may have more influence on what to buy than his wife, or he just might have more than she gives him credit for having.

Another possibility is to have professional meat people, those who work with and know the different cuts and qualities of beef, complete the sort. The result of the study may show their attitudes about merchandising and advertising, which in turn, may affect consumer attitudes. A combined knowledge of professional and consumer attitudes may enhance a store's ability to satisfy consumer demands. If it were known that most consumers enjoyed petite steaks and that most butchers believed consumers preferred large steaks, then one could apply this knowledge to satisfy consumer demands.

As mentioned as a limitation, Q-technique does not permit generalizing about the relative proportion of the factors in the general population. By use of a large enough random sample, the proportions of the factor groups to the population at large could be identified. This would permit marketers to aim their marketing strategies at the most profitable groups.

Actual advertising can be used to test the original hypotheses. One might develop a series of advertisements for each of the three factors identified in this study, employing the segmenting strategies used earlier in this chapter. The ads would be sorted by a small group of people representing each factor, who have been selected by their ranking of items from the original Q-sort. Their responses to the ads could be predicted by the researcher based upon attitude type. This would test the utility of Q-technique for developing communication themes and strategies.



#### **BIBLIOGRAPHY**

#### Books

- Frank, Ronald E., William F. Massey, and Yoram Wind.

  Market Segmentation. Englewood Cliffs, N. J.:

  Prentice-Hall, Inc., 1972.
- Kerlinger, N. Fred. <u>Foundations of Behavioral Research</u>.

  New York, New York: Holt, Rinehart, and Winston,
  Inc., 1964.
- Robertson, Thomas S. <u>Consumer Behavior</u>. Glenview, Ill.: Scott, Foresman and Company, 1970.
- Spearman, Charles. The Abilities of Man. New York: MacMillan Co., 1927.
- United States Department of Agriculture Economic Research Service. Consumer Satisfaction with Food Products and Marketing Services. Washington, D. C.: U.S. Government Printing Office, 1974.

## Essays and Articles in Collections

- Katz, Daniel and Ezra Stotland. "A Preliminary Statement to a Theory of Attitude Structure and Change."

  In Sigmund Koch (ed.), Psychology: A Study of a Science. New York: McGraw Hill, 1959.
- Krech, David and Richard S. Crutchfield. "Perceiving the World." In Joel B. Cohen (ed.), Behavioral

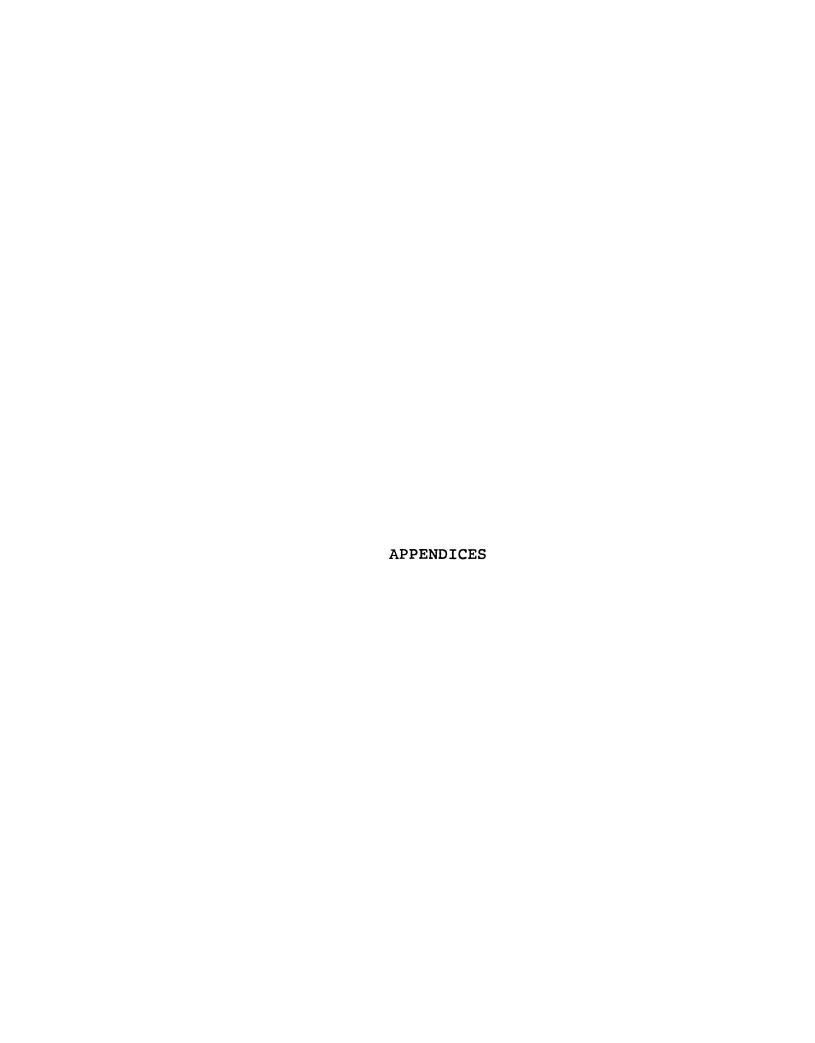
  Science Foundations of Consumer Behavior. New York: Free Press, 1972.

## Periodicals

- Armbruster, Walter A. "The Dynamics of Belief Dynamics."

  Journal of Advertising, III (No. 3, 1974), 26.
- Haley, Russel I. "Benefit Segmentation: A Decision-Oriented Research Tool." <u>Journal of Marketing</u>, XXII (July, 1968), 30-35.

- "High Hopes for Low Fat Beef," Business Week, September 21, 1974, 32.
- Katz, Daniel. "The Functional Approach to the Study of Attitudes." The Public Opinion Quarterly, XXIV (Summer, 1960), 169-172.
- "Lean Times for Cattleman." Business Week, March 17, 1975, 94.
- Osgood, Charles E. "Cognitive Dynamics in the Conduct of Human Affairs." The Public Opinion Quarterly, XXIV (Summer, 1960), 343.
- Rosenberg, Milton J. "A Structural Theory of Attitude Dynamics." The Public Opinion Quarterly, XXIV (Summer, 1960), 319-339.
- Sarnoff, Irving and Daniel Katz. "The Motivational Bases of Attitude Change." Journal of Abnormal and Social Psychology, XLIX (Vol. 49, 1954), 115-124.
- Wincki, Joseph M. "Balky Consumers Cause Lower Prices and Bigger Supplies of Beef and Pork." Wall Street Journal, (March 22, 1974), 32.



# APPENDIX A

STATEMENTS IN THE Q-SAMPLE

#### APPENDIX A

#### STATEMENTS IN THE Q-SAMPLE

- 1. Eating a tender, juicy steak is a sensual pleasure.
  Just close your eyes and enjoy.
- 2. I like a petite steak, one that's not too large.
- 3. I like to talk with a good knowledgeable butcher when I'm buying beef.
- 4. It's irritating to see a store display beef with too much fat around the outside.
- 5. I like to eat beef in a leisurely way, savoring every bite.
- 6. I like to prepare meat proportions so that I don't have leftovers.
- 7. I like a hearty steak, beef you can really sink your teeth into.
- 8. I'm disappointed every time I see the prices I have to pay for beef.
- 9. I like the feeling at the end of the meal of being satisfied, but not too full.
- 10. I don't really bother about selecting beef cuts. If it looks good to me, I get it.
- 11. I prefer to buy beef that has a nice, bright red color.
- 12. I like cuts of beef that don't take much time or trouble to prepare.
- 13. I'd really like to buy more expensive cuts of beef than I feel I can afford.
- 14. My idea of a good steak is one that's really thick.
- 15. It's the shopper's own fault if he or she ends up with beef that isn't satisfactory.

- 16. To me, there's something special about beef. It's better than just having chicken or fish.
- 17. Beef with a slight gray tint is best. It's a sign the beef has aged, and aged beef is best.
- 18. I don't feel like I've really had a meal unless I've had meat.
- 19. It's very satisfying to prepare and serve an expensive meal.
- 20. A good steak sauce makes a steak just that much better.
- 21. I want a butcher I can trust to satisfy what I want. Who the butcher is really makes a difference.
- 22. Having good quality beef is especially important to me on special occasions—such as entertaining.
- 23. The meat prices of stores are an important consideration in choosing which store to shop.
- 24. You don't have to buy expensive beef to get the nutritional value of beef.
- 25. I like the feeling of being stocked up on beef, of looking in the refrigerator and seeing an abundance of beef.
- 26. A delicious meat dish is a tribute to the person who cooked it.
- 27. A meat dish is a success if the entire family likes it.
- 28. Eating out is a good time to try an unusual cut of beef or a novel recipe.
- 29. A person ought to have good meals, and for me, that includes beef.
- 30. I want to buy my meats where I buy my groceries; I don't like to shop in several places.
- 31. In my opinion, freezer beef is quite as good as fresh beef.
- 32. I prefer the economy beef. It takes longer to cook, but if you do the right things with it, people won't know the difference.

- 33. If I were to buy economy beef, I'd expect to be somewhat disappointed.
- 34. The less fat a person eats in their beef, the better off they are.
- 35. I don't like experimenting with beef. I prefer to cook beef in ways I'm familiar with.
- 36. I like to know about how much I plan to spend on beef before I get to the meat department.
- 37. Finally, you get what you pay for. And to get good beef, you have to be willing to pay the price.
- 38. A really good cut of beef would be both lean and tender.
- 39. There's something about cooking outside that results in a better steak.
- 40. I prefer to buy cuts of beef that are familiar to me.
- 41. I don't want the butcher to pick out meat for me; I want to see it and select it myself.
- 42. I feel that I know enough about beef to be able to make the best selection.
- 43. It's important to know the various cuts of beef and how to cook them.
- 44. It's nice to do something extra with beef, the little extra preparations that make a meal something special.
- 45. I don't feel I can really judge beef quality just by looking at the meat.
- 46. Once in a while you get inconsistent quality beef from most any store. You can't expect to get the beef you really want every time.
- 47. When there's good quality beef on the table, the family really appreciates it.
- 48. I prefer to buy beef that's wrapped. It's easier to handle, and it's more sanitary.
- 49. I like having all the meal options that come with having beef in the freezer.
- 50. Beef can be too lean, in my opinion. I like beef with enough fat to taste good.

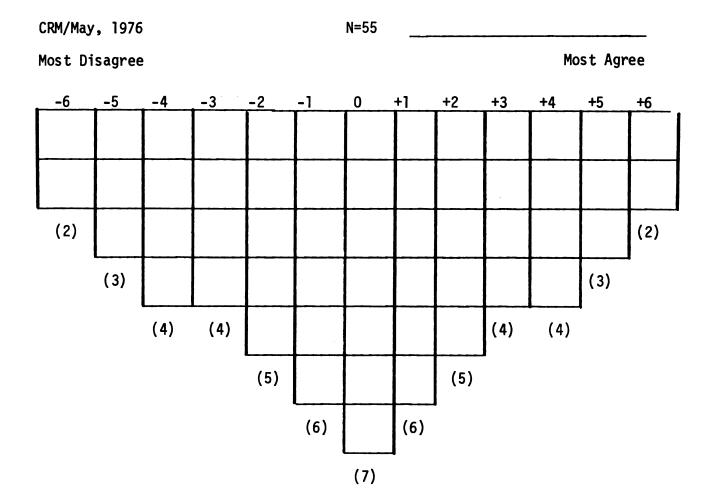
- 51. When you have hungry stomachs to fill, you need cuts of beef and recipes that go a long way.
- 52. Good beef is good almost anytime. It's a taste I don't get tired of.
- 53. Beef is an important part of one's diet, and we should get at least a certain amount of beef each week.
- 54. I like to experiment with ground beef. It's so flexible, you can do anything with it.
- 55. The better the quality of the beef sold, the more I appreciate a store.

# APPENDIX B

SAMPLE SCORE SHEET AND RESPONDENT QUESTIONNAIRE

APPENDIX B

SAMPLE SCORE SHEET AND RESPONDENT QUESTIONNAIRE



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# SAMPLE SCORE SHEET AND RESPONDENT QUESTIONNAIRE - Page 2

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6.	In	what ways do you exert	t influence on b	eef consumption i	n your family?
			Strong Influence	Moderate Influence	Weak or no Influence
	a.	Deciding what cuts to buy			
	b.	Deciding what cuts to prepare	-		
	c.	Deciding what recipes to use	· · · · · · · · · · · · · · · · · · ·		
	d.	Deciding where to buy beef			
	e.	Deciding how much to spend for food			
	f.	Deciding how much to spend for beef			-

# APPENDIX C

ADMINISTERING Q-SORT

#### APPENDIX C

#### ADMINISTERING Q-SORT

- 1. Pick a respondent.
- 2. Have them fill in the first page questions.
- 3. Cut out statements and shuffle.
- 4. Have respondent put statements in three (3) piles.

Agree Neutral Disagree (1) (2) (3)

- 5. Within each pile, have the respondent organize the statements.
  - A) Agree Pile Most agree to most disagree
  - B) Neutral Pile Most agree to most disagree
  - C) Disagree Pile Most disagree to most agree
- 6. Beginning with the agree pile, at the upper left of the diagram begin to fill in the little boxes. Next, take the disagree statements, and begin to fill those in at the far right of the diagram. Last, fill in the neutral statements, beginning at the most agreed side of the diagram.
- 7. Meanwhile, have the respondent fill in the third page.

# APPENDIX D

INSTRUCTIONS FOR SORTING

#### APPENDIX D

#### INSTRUCTIONS FOR SORTING

Step 1: Read through the 55 statements and sort them into three piles:

Pile A -- Those statements with which you agree Pile B -- Those statements with which you dis-

agree

Pile C -- Those statements towards which you feel neutral or "don't know"







Disagree

Neutral

Agree

Step 2: Using the distribution diagram as a guide, pick the two statements with which you most agree and write their numbers in the diagram under (+6)
"Most agree." Then, take the three statements with which you next mostly agree and place their numbers in the (+5) column. And so on, for the rest of your agree statements. For example:



Step 3: When you run out of agree statements, do the same thing with your "disagree" pile. Choose the two statements with which you most disagree and place their numbers under (-6) "Most disagree." Then, take the three statements with which you next mostly disagree and place their numbers in the (-5) column. And so on, for the rest of your disagree statements. For example:

Step 4: When you run out of disagree statements, choose the statements from the "neutral" pile with which you most agree and continue filling in the "agree" side of the distribution diagram. Then fill in the rest of the "disagree" side of the diagram with those "neutral" statements which you find most disagree-able.

Remember that you can change the order and placement of these statements whenever you wish until you're satisfied with the result. When you're done, you should have numbers in all the boxes of the distribution diagram, representing a range of statements from "most agree" to "most disagree."

### APPENDIX E

DEMOGRAPHIC DATA ON RESPONDENTS

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Factor I (continued)	No. of stores shopped	ო	2	10	2	9	က	2	က	က	2	2	2	2
r I (	% Food dollar to beef	35	12	52	50	10	20	20	6	52	2	20	15	25
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	Education	13	12	17	11	17	16	16	16	13	14	15	16	16
	no ijaquooO	Housewife	Housewife	Professor	Professor	Audiologist	Teacher	Lab. Tech.	Engineer	Housewife	Lab. Tech.	Housewife	Lab. Tech.	Sales Clerk
	Children S rabnu	<b>,</b>	2	2	7	7	0	0	0	7	0	_	7	က
	Income (in thousands)	20+	20+	20+	20+	20+	10+	10+	10+	10+	10+	10+	10+	<u>1</u> 0+
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	₽ĜĄ	45	45	33	30	25	12	28	23	27	22	52	33	34
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Factor I (continued)	No. of stores shopped	4	2	2	က	က	7	∞	7	4	က	4	2
)	to beef	10	_	0	2	10	0	0	0	0	10	17-20	_
tor	% Food dollar	15	10	20		15	10	30	5 40	10	52		20
Fact	% Income to food	20	20	30	15	40	20	20	30-35	7	15	12	9
	Education	13	15	14	16	12	19	Ξ	12	18.5	18	20	12
	no it aquoo0	Secretary	Secretary	Secretary	Student	Unemployed	Unemployed	Mechanic	Painter	Teacher	Administrator	Professor	Housewife
	Children under 21	_	0	0	0	0	0	_	2	0	2	2	က
	Income (in thousands)	÷	t	÷	<del>+</del> 0	t	+0	10+	10+	10+	10+	20+	<i>د</i> ٠
	Marital Status	Σ	Σ	Σ	S	S	S	Σ	Σ	S	Σ	Σ	Σ
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Meals including	2	ည	4	5	9	œ	4	9	2	က	2
среска вда	2	7	က	2	_	က	2	7	_	_	_
No. of stores shopped	7	2	ည	4	က	10	က	2	4	10	2
% Food dollar to beef	25	٠.	7	09	52	30	35	52	15	52	40
of Smcome to	∞	<i>د</i> ٠	20	9	20	20	25	30	40	30	33
Education	12	17	14	13	12	<i>~</i> ٠	13	19	12	9[	15
Occupation	Housewife	Teacher	Housewife	Housewife	Housewife	Bank Teller	Bookkeeper	Lab. Tech.	Foreman	Pilot	Student
Children under 21	2	2	_	0	4	2	0	_	2	0	0
Income (in thousands)	50+	<del>20+</del>	20+	20+	20+	10+	<del>+</del> 0	<del>+</del> 0	50+	10+	+0
Sutat2 [atinaM	Σ	Σ	Σ	Σ	Σ	Σ	Σ	S	Σ	S	S
	46	33	47	47	48	35	43	27	39	56	21
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noitaguss0	٠	Bookkeeper	Sales	Engineer	Photographer	State Employee	*					
Children under 21	2	2	0	0	2	_	_	2	က	4		
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Age	46	45	55	53	55	35	Never	Sometimes	Usually	Always		
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# APPENDIX F

PRINCIPAL COMPONENTS

FACTOR MATRIX

APPENDIX F
PRINCIPAL COMPONENTS FACTOR MATRIX

Variables	I	II	III	IV	V
1	.327	.178	137	113	007
2	.156	.235	298	.164	171
3	.204	.494	185	331	.110
4	.417	113	075	330	.252
5	.315	217	.489	005	.061
6	.236	.257	.420	.264	074
7	.350	.151	.053	.370	.050
8	.478	313	269	.210	.109
9	.307	.065	005	.042	.207
10	.214	.440	.053	369	301
11	.171	222	208	174	157
12	.436	300	225	124	067
13	.237	.060	.038	107	.072
14	.402	.098	219	.103	173
15	.482	089	.487	135	.262
16	.314	455	.035	225	.188
17	.423	278	436	.029	057
18	.109	102	068	.088	208
19	.386	236	399	010	.069
20	.328	261	248	.061	109

Variables	I	II	III	IV	v
21	.459	.014	.034	.027	408
22	.198	081	.462	197	097
23	.535	.043	344	.167	140
24	.460	203	234	386	.121
25	.406	.414	190	.020	.128
26	.436	346	.073	221	.038
27	.484	.401	.091	.147	062
28	.429	.375	134	100	142
29	.251	.539	097	022	.078
30	.334	.180	284	.170	.292
31	.657	.211	.231	099	.078
32	.481	125	.062	.034	446
33	.508	.193	000	.442	198
34	.551	.234	075	.142	109
35	.402	288	.215	.312	.070
36	.626	109	.038	.329	.069
37	.146	.106	004	.197	.069
38	.201	.179	.460	101	042
39	.473	.558	008	233	.082
40	.481	088	131	.285	.127
41	.405	.209	338	.241	.367
42	.454	009	.186	285	233
43	.187	238	.028	418	.341
44	.535	.100	.265	.104	.057
45	.467	257	096	119	447
46	.312	.077	209	.267	.293

Variables	I	II	III	IV	V
47	.396	.050	.231	010	139
48	.427	282	071	002	112
49	.478	075	060	054	312
50	.286	.391	139	450	051
51	.665	229	.009	114	122
52	669	027	076	.300	082
53	.513	.075	238	360	041
5 <b>4</b>	.164	.568	181	.151	.368
55	.557	105	.023	172	036
56	.499	245	.353	.160	.017
57	.339	.490	.243	.140	080
58	.534	139	.191	.087	.126
59	.162	334	.231	.072	130
60	.316	.150	.107	.027	084
61	.482	031	157	.100	159
62	.300	374	302	.163	071
63	.381	309	048	063	.480
64	.521	022	.216	.171	.125
65	.499	168	.165	.128	.081
66	.550	.141	.183	.234	.277
67	.413	.078	170	.082	177
68	.482	176	007	230	.067
69	.487	126	084	423	080
70	.114	210	.147	.119	.163
71	.374	.190	.314	098	.076
72	.627	.008	.028	301	.193
73	.292	.062	.046	.147	381

APPENDIX G

STANDARD SCORES

#### APPENDIX G

### STANDARD SCORES

# Factor I Standard Scores

	Statement	Score
24.	You don't have to buy expensive beef to get the	
	nutritional value of beef.	2.20
43.	It's important to know the various cuts of beef	
	and how to cook them.	1.85
9.	I like the feeling at the end of the meal of	
	being satisfied, but not too full.	1.49
39.	There's something about cooking outside that	
	results in a better steak.	1.46
38.	A really good cut of beef would be both lean	
	and tender.	1.37
34.	The less fat a person eats in their beef, the	
	better off they are.	1.36
23.	The meat prices of stores are in important con-	
	sideration in choosing which store to shop.	1.14
44.	It's nice to do something extra with beef, the	
	little extra preparations that make a meal some-	
	thing special.	1.13
22.	Having good quality beef is especially important	
	to me on special occasions such as entertaining.	1.10
40.	I prefer to buy cuts of beef that are familiar	
	to me.	1.06
41.	I don't want the butcher to pick out meat for	
	me; I want to see it and select it myself.	.84
30.	I want to buy my meats where I buy my groceries;	
	I don't like to shop in several places.	.75
8.	I'm disappointed every time I see the prices I	
	have to pay for beef.	.75
27.	A meat dish is a success if the entire family	
	likes it.	.74
26.	A delicious meat dish is a tribute to the person	
	who cooked it.	.71
55.	The better the quality of beef sold, the more I	
	appreciate a store.	.68
2.	I like a petite steak, one that's not too large.	.61
11.	I prefer to buy beef that has a nice, bright red	
	color.	.59

	Statement	Score
54. 49.	I like to experiment with ground beef. It's so flexible, you can do anything with it.	.58
	I like having all the meal options that come with having beef in the freezer.	.46
47.	When there's good quality beef on the table, the family appreciates it.	.40
36.	I like to know about how much I plan to spend on beef before I get to the meat department.	.36
46.	Once in a while you get inconsistent quality beef from most any store. You can't expect to	
42.	get the beef you really want every time. I feel that I know enough about beef to be able	.23
12.	to make the best selection. I like cuts of beef that don't take much time or	.18
28.	trouble to prepare.  Eating out is a good time to try an unusual cut	.11
	of beef or a novel recipe.	.09
4.	It's irritating to see a store display beef with too much fat around the outside.	.07
37.	Finally, you get what you pay for. And to get good beef, you have to be willing to pay the price.	03
7.	I like a hearty steak, beef you can really sink your teeth into.	.02
45.	I don't feel I can really judge beef quality just by looking at the meat.	06
6.	I like to prepare meat proportions so that I don't have leftovers.	09
52.	Good beef is good almost anytime. It's a taste I don't get tired of.	09
51.	When you have hungry stomachs to fill, you need cuts of beef and recipes that go a long way.	11
5.	I like to eat beef in a leisurely way, savoring every bite.	21
48.	I prefer to buy beef that's wrapped. It's easier to handle, and it's more sanitary.	36
50.	Beef can be too lean, in my opinion. I like beef	36
3.	with enough fat to taste good. I like to talk with a good knowledgeable butcher when I'm buying beef.	42
21.	I want a butcher I can trust to satisfy what I want. Who the butcher is really makes a dif-	• 12
53.	ference.	50
12 '	each week.	58
	I'd really like to buy more expensive cuts of beef than I feel I can afford.	61
1.	pleasure. Just close your eyes and enjoy.	69
35.	I don't like experimenting with beef. I prefer to cook beef in ways I'm familiar with.	72

	Statement	Score
33.	If I were to buy economy beef, I'd expect to be somewhat disappointed.	78
31.	In my opinion, freezer beef is quite as good as	70
<b>.</b>	fresh beef.	78
25.	I like the feeling of being stocked up on beef, of looking in the refrigerator and seeing an	
	abundance of beef.	88
19.	It's very satisfying to prepare and serve an expensive meal.	95
14.	My idea of a good steak is one that's really thick.	-1.09
32.	I prefer the economy beef. It takes longer to cook, but if you do the right things with it,	
	people won't know the difference.	-1.10
29.	A person ought to have good meals, and for me, that includes beef.	-1.23
20.	A good steak sauce makes a steak just that much	
	better.	-1.51
10.	I don't really bother about selecting beef cuts.  If it looks good to me, I get it.	-1.67
15.	It's the shopper's own fault if he or she ends	
	up with beef that isn't satisfactory.	-1.79
16.	To me, there's something special about beef.	
	It's better than just having chicken or fish.	-1.80
18.	I don't feel like I've really had a meal unless I've had meat.	-1.90
17.	Beef with a slight gray tint is best. It's a	
	sign the beef has aged, and aged beef is best.	-2.09

### Factor II Standard Scores

	Statement	Score
39.	There's something about cooking outside that results in a better steak.	1.81
11.	I prefer to buy beef that has a nice, bright red color.	
1.	Eating a tender, juicy steak is a sensual	1.66
22.	pleasure. Just close your eyes and enjoy. Having good quality beef is especially im-	1.59
	portant to me on special occasions such as entertaining.	1.54
7.	I like a hearty steak, beef you can really sink your teeth into.	1.47
53.	Beef is an important part of one's diet, and we should get at least a certain amount of beef	
5.	each week.  I like to eat beef in a leisurely way, savoring	1.25
	every bite.	1.14
47.	When there's good quality beef on the table, the family really appreciates it.	1.12
29.	A person ought to have good meals, and for me, that includes beef.	1.10
52.	Good beef is good almost anytime. It's a taste I don't get tired of.	1.09
18.	I don't feel like I've really had a meal unless I've had meat.	1.06
14.	My idea of a good steak is one that's really thick.	.90
38.	A really good cut of beef would be both lean and tender.	.87
43.	It's important to know the various cuts of beef and how to cook them.	
9.	I like the feeling at the end of the meal of	.74
37.	being satisfied, but not too full. Finally, you get what you pay for. And to get	.70
	good beef, you have to be willing to pay the price.	.61
33.	If I were to buy economy beef, I'd expect to be somewhat disappointed.	.60
55.	The better the quality of beef sold, the more I appreciate a store.	.59
40.	I prefer to buy cuts of beef that are familiar to me.	. 58
3.	I like to talk with a good knowledgeable butcher when I'm buying beef.	.43
13.	I'd really like to buy more expensive cuts of beef than I feel I can afford.	.42
27.	A meat dish is a success if the entire family	
	likes it.	.31

	Statement	Score
12.	I like cuts of beef that don't take much time	
•	or trouble to prepare.	.21
41.	I don't want the butcher to pick out meat for	•==
	me; I want to see it and select it myself.	.18
8.	I'm disappointed every time I see the prices I	• 10
٥.	have to pay for beef.	.15
16.	To me, there's something special about beef.	.13
10.	It's better than just having chicken or fish.	.09
44.		.09
44.	It's nice to do something extra with beef, the	
	little extra preparations that make a meal	0.0
4.0	something special.	.00
49.	I like having all the meal options that come	
	with having beef in the freezer.	01
26.	A delicious meat dish is a tribute to the person	
	who cooked it.	06
21.	I want a butcher I can trust to satisfy what I	
	want. Who the butcher is really makes a dif-	
	ference.	12
54.	I like to experiment with ground beef. It's so	
	flexible, you can do anything with it.	15
25.	I like the feeling of being stocked up on beef,	
	of looking in the refrigerator and seeing an	
	abundance of beef.	16
24.	You don't have to buy expensive beef to get the	
	nutritional value of beef.	18
4.	It's irritating to see a store display beef with	
	too much fat around the outside.	29
42.	I feel that I know enough about beef to be able	•
	to make the best selection.	31
35.	I don't like experimenting with beef. I prefer	
	to cook beef in ways I'm familiar with.	38
36.	I like to know about how much I plan to spend	• 5 5
•	on beef before I get to the meat department.	43
51.	When you have hungry stomachs to fill, you need	. 13
JI.	cuts of beef and recipes that go a long way.	45
34.	The less fat a person eats in their beef, the	45
J4.	better off they are.	50
19.		50
19.	It's very satisfying to prepare and serve an	51
20	expensive meal.	51
30.	I want to buy my meats where I buy my groceries;	F 2
0.0	I don't like to shop in several places.	52
28.	Eating out is a good time to try an unusual cut	
	of beef or a novel recipe.	61
46.	Once in a while you get inconsistent quality	
	beef from most any store. You can't expect to	_
	get the beef you really want every time.	67
48.	I prefer to buy beef that's wrapped. It's	
	easier to handle, and it's more sanitary.	70
50.	Beef can be too lean, in my opinion. I like beef	
	with enough fat to taste good.	72

	Statement	Score
23.	The meat prices of stores are an important	
	consideration in choosing which store to shop.	81
45.		
	just by looking at the meat.	-1.08
10.		
	cuts. If it looks good to me, I get it.	-1.15
6.	I like to prepare meat proportions so that	
	I don't have leftovers.	-1.27
31.	In my opinion, freezer beef is quite as good	
	as fresh beef.	-1.41
2.	I like a petite steak, one that's not too	
	large.	-1.42
15.	It's the shopper's own fault if he or she ends	
	up with beef that isn't satisfactory.	-1.85
20.	A good steak sauce makes a steak just that	
	much better.	-1.93
32.	I prefer the economy beef. It takes longer to	
	cook, but if you do the right things with it,	
	people won't know the difference.	-2.25
17.	Beef with a slight gray tint is best. It's a	
	sign the beef has aged, and aged beef is best.	-2.28

# Factor III Standard Scores

	Statement	Score
24.	You don't have to buy expensive beef to get the nutritional value of beef.	2.00
9.	I like the feeling at the end of the meal of being satisfied, but not too full.	1.96
50.	Beef can be too lean, in my opinion. I like	
27.	beef with enough fat to taste good.  A meat dish is a success if the entire family	1.58
	likes it.	1.49
22.	Having good quality beef is especially important to me on special occasionssuch as entertaining.	1.48
40.	I prefer to buy cuts of beef that are familiar to me.	1.17
47.	When there's good quality beef on the table,	
2.	the family really appreciates it. I like a petite steak, one that's not too	1.15
	large.	1.14
43.	It's important to know the various cuts of beef and how to cook them.	1.13
6.	I like to prepare meat proportions so that I	
37.	don't have leftovers. Finally, you get what you pay for. And to get	1.12
	good beef, you have to be willing to pay the	1 06
34.	price. The less fat a person eats in their beef, the	1.06
	better off they are.	1.00
12.	I like cuts of beef that don't take much time or trouble to prepare.	.96
26.	A delicious meat dish is a tribute to the person who cooked it.	.90
52.	Good beef is good almost anytime. It's a taste	
45.	I don't get tired of. I don't feel I can really judge beef quality just	.78
	by looking at the meat.	.66
46.	Once in a while you get inconsistent quality beef from most any store. You can't expect to	
	get the beef you really want every time.	.65
29.	A person ought to have good meals, and for me, that includes beef.	.64
55.	The better the quality of beef sold, the more I	
30.	appreciate a store. I want to buy my meats where I buy my groceries;	. 44
	I don't like to shop in several places.	.34
51.	When you have hungry stomachs to fill, you need cuts of beef and recipes that go a long way.	.31
21.	I want a butcher I can trust to satisfy what I	
	want. Who the butcher is really makes a dif- ference.	.31
44.	It's nice to do something extra with beef, the little extra preparations that make a meal some-	
	thing special.	.23

	<u>Statement</u>	Score
18.	I don't feel like I've really had a meal unless I've had meat.	.15
7.	I like a hearty steak, beef you can really sink your teeth into.	.12
3.	I like to talk with a good knowledgeable butcher when I'm buying beef.	.07
4.	It's irritating to see a store display beef with	
16.	too much fat around the outside. To me, there's something special about beef. It's	.04
5.	better than just having chicken or fish.  I like to eat beef in a leisurely way, savoring	02
1.	every bite.	12
	Eating a tender, juicy steak is a sensual pleasure. Just close your eyes and enjoy.	13
23.	The meat prices of stores are an important consideration in choosing which store to shop.	16
33.	If I were to buy economy beef, I'd expect to be somewhat disappointed.	17
53.	Beef is an important part of one's diet, and	•=•
	we should get at least a certain amount of beef each week.	21
11.	I prefer to buy beef that has a nice, bright red color.	<b></b> 25
28.	Eating out is a good time to try an unusual cut of beef or a novel recipe.	33
54.	I like to experiment with ground beef. It's so	38
32.	flexible, you can do anything with it. I prefer the economy beef. It takes longer to	30
	cook, but if you do the right things with it, people won't know the difference.	52
8.	I'm disappointed every time I see the prices I have to pay for beef.	56
49.	I like having all the meal options that come	
48.	with having beef in the freezer. I prefer to buy beef that's wrapped. It's	63
31.	easier to handle, and it's more sanitary.  In my opinion, freezer beef is quite as good as	69
35.	fresh beef. I don't like experimenting with beef. I prefer	71
	to cook beef in ways I'm familiar with.	74
36.	I like to know about how much I plan to spend on beef before I get to the meat department.	99
15.	It's the shopper's own fault if he or she ends up with beef that isn't satisfactory.	-1.01
10.	I don't really both about selecting beef cuts.	-1.05
13.	If it looks good to me, I get it. I'd really like to buy more expensive cuts of	
38.	beef than I feel I can afford. A really good cut of beef would be both lean	-1.07
	and tender.	-1.08

	Statement	Score
17.	Beef with a slight gray tint is best. It's a	
	sign the beef has aged, and aged beef is best.	-1.13
19.	It's very satisfying to prepare and serve an	
	expensive meal.	-1.15
41.	I don't want the butcher to pick out meat for	
	me; I want to see it and select it myself.	-1.19
14.	My idea of a good steak is one that's really	
	thick.	-1.35
42.	I feel that I know enough about beef to be able	
	to make the best selection.	-1.47
20.	A good steak sauce makes a steak just that much	•
	better.	-1.80
39.		
	results in a better steak.	-1.82
25.	I like the feeling of being stocked up on beef,	
	of looking in the refrigerator and seeing an	
	abundance of beef.	-2.12

