Advanced Questionnaire Design

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What a questionnaire is and is not

A questionnaire is a gestalt

One definition of questionnaire, provided by the *American Heritage Dictionary of the English Language*, points up the underlying problem with the current state of the art in questionnaire design. The dictionary definition is: “A printed form containing a set of questions, especially one addressed to a statistically significant number of subjects by way of gathering information, as for a survey.”

Notice that even here, in a definition of *questionnaire*, the sampling and statistical significance are emphasized. Sampling is what researchers and their clients scrutinize for possible “error” or “bias” of results, with only a passing glance at error in questionnaire design, which can falsify the results more thoroughly than any fraction of sampling error.

The dictionary definition of a questionnaire is hopelessly incomplete. A questionnaire is much more than a set of questions. It is a totality, a gestalt that is greater than the sum of its individual questions. A questionnaire is organic, with each part vital to every other part, and all parts must be handled simultaneously to create this whole instrument.

A questionnaire resembles a painting in its handling and development. While a painting consists of such components as lines, lights and darks, forms, composition, colors, and actual application of the paint, the artist cannot use a step-by-step sequence, handling one component entirely, followed by the next. All the components must be integrated and handled simultaneously, for if the artist becomes too preoccupied with a specific color, for example, the composition or balance of the painting will be skewed. Similarly, the color may overshadow the delicacy of the forms or obliterate the subtlety of the line. A painting in its totality conveys more than the individual parts, and so does a good questionnaire. While art educators attempt to interpret a painting by discussing its line, its chiarosuro, and its composition, these individual components really explain nothing to the viewer about the inherent beauty of a Botticelli Venus, a Rembrandt self-portrait, or a Van Gogh sunflower.

Similarly, to explain only the individual components of a questionnaire—closed versus open-ended questions, dichotomous versus multiple choice, implied alternatives, scaling techniques—is to fail to understand or anticipate the impact of the total questionnaire structure on the search for meaningful results. This book will concentrate on the use of this total structure or gestalt in understanding the respondent’s conceptual structure and the meaning of his answers.

A questionnaire is not a place to cut the budget

During the development phase of a survey, the questionnaire becomes many other objects in the minds of the researchers and the client. Questionnaires often bear the brunt of political, economic, and social pressures aroused during the development and implementation of a survey. Because questionnaires appear to be so fluid, so imprecise compared to samples, for example, compromises are more likely to occur here than in other parts of the overall project.

It is axiomatic in the survey research business that the greatest proportion of controllable costs lies in the interviewing phase. Thus, while on a theoretical level questionnaires are supposed to be written to gain a true picture of respondent reality, in practice questionnaires are often written in response to cost pressures, with the result that respondents are not allowed to tell you about
reality as they perceive it. Questionnaires are shortened; interviews are transformed from in-person to telephone or to self-administered mailed forms to cut costs. Free-response questions are eliminated and replaced by closed-end questions with answer categories concocted by the researcher. The questionnaire is designed to provide a format that only keypunchers can readily follow to facilitate punching and tabulation of the data, ignoring the impact of this format on respondent answers. All of these actions may be necessary because of cost constraints or, as we shall see, may even be desirable for other reasons, but too often questionnaires are designed with these cost goals in mind rather than the goal of probing the respondent’s mind and behavior.

Because a good questionnaire is conceived of and written as an integrated whole, it is virtually impossible to delete questions randomly without destroying the integrity of the instrument. After several cuts by committees of clients, the rationale behind the questionnaire may be so ravaged that the questionnaire ceases to function as an instrument and becomes only a series of sporadic shots at data collection. Its usefulness as a research tool, as a means of communication between respondent and researcher, and its final utility in producing data for meaningful analysis become so diluted, so incoherent, that the entire purpose of the project is undermined.

A questionnaire is not a political football

In addition to cost considerations, questionnaires are often designed in response to the politics surrounding the study itself. Because they are written in English (I use the term advisedly), questionnaires can become political instruments more easily and are more subject to political strife than any other phase of a project, except perhaps the interpretation of the data. Because there are no hard and fast rules governing questionnaire design, the researcher cannot defend his questionnaire against political sharpshooting in the same way he can defend his sample. A typical example of political controversy affecting questionnaire wording is the following: “This is a Catholic state. We cannot use the words ‘birth control’ in this questionnaire. We must use ‘family planning.’”

As a result of this stricture, actual use of family planning in households was severely underreported, based on other available data used for comparison. Citizens of the state obviously do not regard “family planning” and “birth control” as synonyms. In fact, in a later study, when people were asked to define the meaning of the phrase “family planning,” a considerable number defined it as budgeting for the future and financial management. This definition was also more often given by male respondents than female respondents.

Other examples of political problems are:

Please don’t use the question, “How old are you?” in this questionnaire. My boss thinks it’s too blunt. Can’t we ask something along the lines of, “Could I ask you how old you are?” [Yes, you can, but the respondent will probably simply answer, “No,” and then where does that leave you?]

We have a large Spanish population in this state and a Spanish member on our advisory board, so we’ve got to ask about bilharzia [schistosomiasis] and whether they use the services of a spiritualist for counseling help.

I don’t want to spend any time on this banking survey asking people whether they want this service or not. Management decided four years ago to go ahead with it, and we’ve already spent several million dollars on data-processing equipment, so we are going to do it whether they like it or not. Just concentrate on how well customers like this type of statement or that type, this type of check register or that type, colors, and whether they want to list their balance figures horizontally or vertically.

To argue effectively against arbitrary and capricious gutting of questionnaires for budgetary and political reasons, the researcher must be able to justify his individual questions and his entire questionnaire in terms of a systematic theory of questionnaire design with as much strength and validity as the theory backing up the sampling experts. One purpose of this book is to provide the foundation for such a theory, to provide a more systematic approach to questionnaire design beyond issues affecting individual words or individual questions.
A questionnaire is designed around systematic, theoretic principles

The great weakness of questionnaire design is lack of theory. A theory of questionnaire design of necessity begins to deal with a theory of human nature, and this leads to veritable tar pits of sticky problems. Stanley Payne's *The Art of Asking Questions* is still a basic work in the field, although written in 1951. His book and derivatives of it concentrate on problems of wording and types of questions, while giving some passing attention to format and to problems of position effects within the total questionnaire. However, he and others do not deal with a questionnaire as a means of predicting behavior, which leads into issues of human nature: psychology, attitude, and behavior. Certainly, no overall theory or systematic approach to questionnaire design is presented, nothing comparable to the body of sampling theory that now exists to guide survey design. This lack of theory is glaring when texts on survey design or methods are examined. By far the bulk of any such text in the field concentrates on sampling and techniques of data analysis, areas replete with theory.

Early in his book Stanley Payne emphasizes that writing a questionnaire is an art, not a science, a view I strongly endorse. Nonetheless, artists are trained. They do not just happen. They are educated in theories of art, technique, and aesthetics. Survey researchers are also trained, and the goal of this book is to begin to train them to increase the predictability of the data they gather using questionnaires by designing questionnaires systematically around some basic principles of human nature as it responds to the interviewing format.

A questionnaire is either descriptive or predictive

Two issues that affect the theory of questionnaire design concern the distinction between accuracy and precision in survey research, and descriptive versus predictive research projects.

While a questionnaire can combine both approaches, generally surveys are designed to be either descriptive or predictive. The U.S. Census is an example of a descriptive or fact-finding study. Studies conducted by the U.S. Department of Energy simply to find out how many miles people drive their cars each day or at what temperature their thermostats are set are also descriptive and fact finding.

The distinction between the two types of surveys can often be seen in the titles applied to them. Fact-finding studies usually have static titles: “The Incidence of Use of Hospital Services,” “Travel Habits of the U.S. Public,” “Current Use of Financial Services.” Policymaking projects, on the other hand, often contain active verbs in their titles which imply or specifically state that some action will be taken or behavior predicted as a result of the study: “An Evaluation of the Nutrition Project Among the Elderly,” “Bank Customers React to a New Savings Service,” “Potential Students Outline Educational Needs.”

Whether we choose to recognize it or not, our society is basically marketing oriented. None of our institutions exists indefinitely on public sufferance; each must perform. Each must respond to need. As a consequence, every policymaker must know what the need is and try to learn the best way of providing the service or product to meet the need. The days of seat-of-the-pants decision making are passing, if they have not already passed. This is true especially for the large corporations and government organizations now closely scrutinized for responsiveness to the needs of society in such areas as civil rights, employment, and the environment. When competing organizations struggle for public support and limited tax dollars, they have to be able to sell their positions both to the public that supports them and to their immediate superiors. Polling provides a major means of documenting their positions and types of needs. Thus, most studies now go beyond mere description and are commissioned to provide actionable policymaking information. This means prediction of human behavior under altered circumstances.

This book deals primarily with the research problems posed by a predictive survey questionnaire. We are interested in predicting behavior when conditions change. However, attitudes change when conditions change. Therefore, current attitudes cannot be used to predict future behavior. This is the research problem at the heart of predicting behavior from polls. We can't wait to see what will actually happen, so we try to construct the situation or scenario
in advance and ask people to respond to it. The questionnaire is the tool used to construct this scenario in advance, and the extent to which we can accurately construct this picture and enable the respondent to react and express his reactions to it determines the accuracy with which we can then predict behavior.

**A questionnaire should be accurate rather than precise**

Another factor which often leads to poor questionnaire design is a preoccupation with precision rather than accuracy. Accuracy in questionnaire design can be defined as obtaining a true report of the respondent’s position. Obtaining an accurate understanding of the respondent’s position allows the researcher to predict behavior and attitude with greater consistency. Data are accurate when they provide a description of the true state of affairs. For data to give an accurate picture, questions must be constructed to obtain a total picture rather than a fragment.

Precision, on the other hand, has to do with the reproducibility of the results. A census, by definition, gives total precision. However, if the questions asked do not deal with respondent reality, a survey can be completely reproducible but give false results.

One example of misplaced precision in questionnaire design occurs when attitudes or behaviors are being tracked over long periods of time. Gradually, the questions used to measure the attitudes or behaviors become dated in their relevance, meaning, or even vocabulary. After a few years, such questions can end up eliciting meaningless information. The studies are very precise but very inaccurate.

Similarly, while a client or a researcher would rarely dream of lopping off one quadrant of a national sample, these same people will often delete an offensive question or one that they regard as too expensive without any sense at all of what this may do to the study’s accuracy. In fact, good samples may give great precision, but they may or may not affect a study’s accuracy. Precision should not be the determining factor in a survey design. Precision is a concept more applicable to the physical sciences, while accuracy is a concept more in harmony with the social sciences.

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**What is in people’s minds, and how do we find it?**

O, what a world of unseen visions and heard silences, this insubstantial country of the mind! What ineffable essences, these touchless remembrings and unshowable reveries! And the privacy of it all!

Julian Jaynes, *The Origin of Consciousness in the Breakdown of the Bicameral Mind*

The poetic invocation above not only is apt as an introduction to Jaynes’s thoughtful book, but applies equally well as a description of a fundamental problem of survey research: how do we find out what is in people’s minds, and what does it mean in terms of its effects on human behavior? Any useful theory of questionnaire design must grapple with this question, which ultimately leads to psychology and personality theory.

**Limitations of personality theory**

Many questionnaires contain elements of psychology in the wording of specific questions and in the hypotheses underlying these questions. Such psychological approaches are used to try to explain why people may vary on a factor beyond what can be explained by demographics alone. For example, in an article on social attitudes toward the computer, Robert Lee makes the following statements based on personality theory:

People tend to react with awe and a sense of inferiority to this latter conception [of the computer as a relatively autonomous machine that can perform the functions of human thinking]. Individual variations
in the strength of these reactions to the computer are related to certain personality factors and life orientations that are highly pervasive in character.

To explore this issue, in addition to the usual demographic questions we also included in the questionnaire six potentially relevant psychosocial attitude scales: familiarity with the world of business, interest in current affairs, receptivity to the new and different, intolerance of uncertainties, and ambiguities, trustful optimism, and alienation.1

Another example of the prevalence of personality theory comes from a story in The New York Times of July 24, 1979, and the headline underscores the basic problem of applying personality theory in surveys: “Behavioral Scientists Argue Guilt’s Role.” The article gives quotes from eminent psychologists describing guilt as either “a destructive form of self-hate,” or “a guardian of our goodness.”

This type of approach as it applies to surveys means that the survey researcher, depending upon which view of guilt he holds, will design questions reflecting his perception of the meaning of guilt in human behavior. Or he will incorporate into his questionnaire a theory of guilt or violence or authoritarianism which he has picked up from a staff psychologist, leading psychology books, or other sources. Each psychological theory exemplifies the theorist’s peculiar preoccupation. Ernest Becker’s theory concentrates on man’s society building and blind following of leaders as a denial of death. Rollo May emphasizes ennui and alienation as failures of love and will. Freud partially explains women’s problems of identity in terms of penis envy. Abraham Maslow develops some theories of human behavior in terms of self-actualization.

It is very worthwhile to use surveys as a tool in developing personality theory or extending current knowledge of human personality. There is much psychological survey research designed for precisely these purposes, and it can be very valuable. However, random inclusion of personality theory in questionnaires not devoted primarily to development of theory raises many serious problems of questionnaire design, including excessive length, potential respondent abuse, and the costs involved in computer analysis which tries to make sense out of incomplete or incomprehensible questions dealing with respondent psychology.


Although personality theory enriches our understanding of human behavior and tantalizes us with the complexity of human motivation, there is no single theory of personality which comes close to predicting all of human behavior. Because of this lack of a unified personality theory, questionnaires are often taken up with long series of items attempting to provide some theory to explain behavior, thus excessively lengthening the questionnaire while very often also failing to provide such a coherent theory. Listed below are typical statements which provide no predictive insight into the behavior of respondents or their attitudes. The items come from a study on perceptions of crime and the police on the part of the elderly.

It bothers me when I have to swallow my pride and defer to the opinion of someone who has not had the experiences in life that I have had.

Many times I feel that we might just as well make many of our decisions by flipping a coin.

Most people don’t realize the extent to which their lives are controlled by accidental happenings.

Often I feel that I have little influence over the things that happen to me.

Trusting to fate has never turned out as well for me as making a decision to take a definite course of action.

In fact, one of the most important findings to come out of this study resulted from actual behavior questions: the more time that people spent watching TV crime programs, the more likely they were to have unrealistic expectations of the police.

Throughout this book, I emphasize that the purpose of most surveys is to predict behavior. It has been our experience that personality theory rarely facilitates actual prediction of behavior when used in quantitative surveys.

Limitations of attitude theory

If current personality theories do not really help us predict human behavior, perhaps attitude theory can. Once again, however, we encounter serious problems, which include the volatility of atti-
tudes, the effects of conflicting attitudes, and the lack of a clear relationship between attitude and behavior.

One indication of the volatility of attitudes is provided by the Gallup Poll. In the following example a national probability sample of the U.S. public was asked to state the most important problem facing the nation today. The responses were given over a period of months. (Only the top five answers are shown.)

<table>
<thead>
<tr>
<th>Date</th>
<th>Issue</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>June 18, 1970</td>
<td>Campus unrest</td>
<td>27%</td>
</tr>
<tr>
<td></td>
<td>Vietnam/Cambodia</td>
<td>22%</td>
</tr>
<tr>
<td></td>
<td>International problems</td>
<td>14%</td>
</tr>
<tr>
<td></td>
<td>Racial strife</td>
<td>13%</td>
</tr>
<tr>
<td></td>
<td>Cost of living</td>
<td>10%</td>
</tr>
<tr>
<td>March 18, 1971</td>
<td>Vietnam</td>
<td>28%</td>
</tr>
<tr>
<td></td>
<td>Economic problems</td>
<td>24%</td>
</tr>
<tr>
<td></td>
<td>Other international problems</td>
<td>12%</td>
</tr>
<tr>
<td></td>
<td>Crime, lawlessness</td>
<td>7%</td>
</tr>
<tr>
<td></td>
<td>Race relations</td>
<td>7%</td>
</tr>
<tr>
<td>December 19, 1971</td>
<td>Economy</td>
<td>41%</td>
</tr>
<tr>
<td></td>
<td>Vietnam</td>
<td>15%</td>
</tr>
<tr>
<td></td>
<td>Other international problems</td>
<td>8%</td>
</tr>
<tr>
<td></td>
<td>Drug abuse and use</td>
<td>8%</td>
</tr>
<tr>
<td></td>
<td>Racial problems</td>
<td>6%</td>
</tr>
<tr>
<td>August 6, 1972</td>
<td>Vietnam</td>
<td>25%</td>
</tr>
<tr>
<td></td>
<td>Cost of living</td>
<td>23%</td>
</tr>
<tr>
<td></td>
<td>Drug abuse and use</td>
<td>9%</td>
</tr>
<tr>
<td></td>
<td>International problems</td>
<td>5%</td>
</tr>
<tr>
<td></td>
<td>Crime, lawlessness</td>
<td>5%</td>
</tr>
<tr>
<td>May 20, 1973</td>
<td>Cost of living</td>
<td>62%</td>
</tr>
<tr>
<td></td>
<td>Crime, lawlessness</td>
<td>17%</td>
</tr>
<tr>
<td></td>
<td>Drug abuse and use</td>
<td>16%</td>
</tr>
<tr>
<td></td>
<td>Watergate, government corruption</td>
<td>16%</td>
</tr>
<tr>
<td></td>
<td>Pollution</td>
<td>9%</td>
</tr>
<tr>
<td>January 31, 1974</td>
<td>Energy crisis</td>
<td>46%</td>
</tr>
<tr>
<td></td>
<td>Cost of living</td>
<td>25%</td>
</tr>
<tr>
<td></td>
<td>Dissatisfaction with government</td>
<td>15%</td>
</tr>
<tr>
<td></td>
<td>Watergate/government corruption</td>
<td>7%</td>
</tr>
<tr>
<td></td>
<td>International problems</td>
<td>7%</td>
</tr>
</tbody>
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Aside from the general problem of volatility of attitudes, these polls demonstrate that a significant variable affecting attitudes is saliency, in this case represented by the amount of time devoted to a topic in the daily press. Ironically, rather than demonstrating a relationship of attitudes affecting behavior, the above data seem to indicate that behavior affects attitudes: reading the daily newspaper determines how important a problem is perceived to be, and thus what attitude a person should take.

A clearer example of the tenuousness of any relationship between attitudes and behavior is that of the cigarette smoker who realizes that smoking is injurious to his health. He urges his children not to smoke. He admits that smoking is a dirty, expensive habit. His attitude toward smoking is distinctly negative, yet he keeps smoking. The whys of his smoking extend beyond his mere attitudes into personality theory. Does he smoke because of inner conflict, because it is self-fulfilling, or because he is fixated at the oral stage? None of these theories adequately predicts or even
explains why a person who has a totally negative attitude toward smoking continues to smoke. They certainly do not predict if or when this person may quit smoking. All they indicate is that conflict in attitudes raises a key problem in predicting behavior using attitude questions in a survey.

Problems of priorities among attitudes

Even if attitudes were stable and related in some predictable way to behavior, we would still face the problem of measuring priority of attitudes among competing attitudes. The automobile driver maintains a very stable attitude toward his car, even though he belongs to the Sierra Club and writes letters to his congressman urging creation of new wilderness systems and supporting anti-pollution legislation. Yet he drives his car daily to work regardless of the escalating costs of gasoline and the pollution to the environment. If he were to give up his car, he would suffer withdrawal symptoms. Then OPEC raises prices and, more importantly, cuts supplies. Lines of cans snake for blocks around open gasoline stations. Our driver’s attitude toward his car has not changed. He still prefers his car above all other means of transportation, but when faced with a choice between waiting in long gasoline lines or waiting at a bus stop, he finally capitulates and chooses the bus stop if that alternative exists. How can these priorities of attitude be measured when the situations that provoke activation of attitudes change so incessantly?

The relationship between attitudes and behavior

Milton Rokeach in his article, “Attitude Change and Behavioral Change,” provides important insight into this problem of attitudes and behavior. He identifies two sets of attitudes: those held toward a specific object, such as a man, a group, an institution, or an issue; and those held toward a situation, event, or activity. He states that people’s attitudes can be activated by an object, by a situation, or by an object within a given situation. Public opinion polls measuring attitudes usually fail to make these distinctions or to analyze the data in terms of them.

A preferential response to an object cannot occur in a vacuum. It must necessarily be elicited within a context of some situation toward which a respondent will also have an attitude. As outlined by Rokeach, defining two sets of attitudes, which may or may not be independent of one another, leads to the following research problems:

1) How can we tell which set (the object set or the situation set) of attitudes is more important in predicting behavior at any given time?

2) How can we obtain a behavioral measure of a given attitude toward an object that is uncontaminated by interaction with a person’s attitudes toward the situation?

3) When there is a change in behavior, how can we tell whether or not there has been a corresponding change in attitude?

4) If there has been a change in attitude, which attitude was changed—the attitude toward object or the attitude toward situation?

Rokeach defines an attitude as a relatively “enduring organization” of beliefs about an object or a situation predisposing one to respond in some preferential manner. However, an enduring organization of beliefs presupposes human awareness or consciousness of those beliefs, their sources, and their results. While personality theory as begun by Freud has grappled with the problems of the “unconscious” or the “subconscious” or repressed states of mind, research based on expressed attitudes usually evades or ignores this problem of consciousness or lack of consciousness, and rarely attempts to cope with problems of mere salience and its impact on so-called attitudes.

Consciousness, a definition

Salience can be defined as that thought, idea, or action which is uppermost in people’s minds at any given time. The data quoted above on attitudes toward important problems facing the United

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States present a classic example of mere salience masquerading as behavior prediction, or "attitude." The very act of interviewing a respondent makes an issue salient and creates respondent attitudes. Consciousness, on the other hand, goes much deeper than salience.

I depend upon the definition of consciousness outlined in great detail by Julian Jaynes in *The Origin of Consciousness in the Breakdown of the Bicameral Mind.* Consciousness, to summarize Jaynes briefly, is a process whereby a person is able to arrange events and ideas together into new orders within his head as they may never actually have occurred either physically or in present reality. A person is able to excerpt pieces of knowledge or awareness and put them together into a story or narration that makes these pieces compatible with each other. A person is able to see himself in his imagination doing various things, and then this person is able to make decisions on the basis of imagined outcomes before the outcomes actually have occurred in his real experience. A person is able to plot, to plan, and to visualize the outcomes of his future behavior.

At the conclusion of his development of a theory of what consciousness is and is not, Jaynes postulates, "If our reasonings have been correct, it is perfectly possible that there could have existed a race of men who spoke, judged, reasoned, solved problems, indeed did most of the things that we do, but who were not conscious at all." While Jaynes does not apply that definition to twentieth century inhabitants of the United States, the responses obtained on thousands of surveys support the reverse conclusion: by and large, people may know what they have done, but they cannot explain why they have done it or what their behavior means. More importantly, from the point of view of predictive polling, most respondents cannot imaginatively put disparate pieces of information together into new patterns and then imaginatively visualize what their behavior would or would not be in response to this hypothetical information. This is why so-called measurement of attitudes by polls is ultimately so fruitless and puzzling to policymakers and so hazardous to people whose future depends on the predictability of such polls.

All of our research experience indicates that on any given issue, few people have the ability to go through these conscious mental processes when suddenly asked, over the telephone and without prior notice, to expound on complex issues, such as those surrounding the Panama Canal treaties. In short, in a very deep sense, people cannot add. For example, at the height of the recent gasoline crunch, an acquaintance excitedly described a new electric vehicle, shaped like a bar stool, that had been developed. It could go 100 miles without needing its batteries recharged. Think how much gas would be saved! I asked her how the batteries would be charged. If they were charged through a standard electric outlet, that implied power provided by the local utility, and the power to run the local utility was provided by oil, and oil in an energy sense is equivalent to gas. Her face went slightly blank, and then she looked puzzled. "Well, I don't know about that," she said and ended the conversation.

We are all too familiar with the housewife who drives from store to store to pick up grocery "specials" to save a few dollars a week, and who does not consider the cost of gas and auto upkeep in calculating the price of the groceries. Or there is the person who drives his car to New York every day from South Jersey because it’s cheaper and because he has not added the costs of gas, tolls, parking, insurance, upkeep, and wear and tear to his driving costs.

Corporate executives with supposedly superior intelligence often exhibit no greater consciousness. In recent conversations with the corporate marketing executive of a major bank, I discussed increasing market share at the rate of 1 to 2 percent per year, which at the end of five years could result in a 5 to 10 percent increase in market. This executive remarked that he had never really thought of it that way, and that I should make this point much more explicit in my report to his staff because they had not really thought of it that way either.

These types of calculations are rudimentary yet beyond most people's comprehension. More complex issues, which demand mental piecing together of information to form a total picture of an event or situation that has not even occurred, present problems even for well-educated, well-informed people.

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5. Ibid., p. 47.
Questionnaires and consciousness

If we analyze standard survey research questions in terms of need for consciousness, attitude toward object, and attitude toward situation, we can immediately see the shortcomings of this approach to determining human behavior.

Here is a typical attitude question from a survey conducted to predict human behavior:

"If you knew that one of the commercial banks in this area was part of a bank holding company, would this fact make you feel more like doing business with them, make you feel less like doing business with them, or wouldn't it make much difference to you one way or the other?"

Analyzing this question from the point of view of respondent consciousness, we can discern that for a respondent to give a meaningful answer, one that is close to being true and predictive of subsequent behavior, he must first be able to project himself mentally into a particular picture. First, what is a bank holding company, and how does this affect him as a bank customer? Second, does a bank holding company mean a bank is bigger, has more regulations to follow, provides more services to customers, builds more banks, or what? If a bank holding company does all of these things, how does that affect him? Does it affect him positively or negatively? What is meant by positively or negatively? Assume that positive means more services at lower costs, and negative means higher charges for checking account usage.

If we analyze this question with regard to attitude toward object, it is apparent that the respondent must be conscious of his feelings or have feelings with regard to bank holding companies. That is, he must think they are either good or bad in order to answer this question meaningfully. To know this, he must have thought about bank holding companies. The respondent may think bank holding companies are good for banks but bad for corporations, or bad for small business owners, or bad for checking account customers. Or he may think that they lessen overall banking competition, or that they have a greater chance of making large, speculative loans and then going bankrupt. Or he may believe that bank holding companies provide more services to the average citizen, that they insure the average depositor against losing money in a bank failure and so forth.

If we analyze this question from the point of view of attitude toward situation, the respondent must be aware of the situation in his geographic area. Are all the banks in his area part of a holding company, and therefore the question is moot? If not, how convenient is the bank we are discussing? Is it more convenient to him than one that is not part of a holding company? If so, is convenience of more importance to the respondent than the fact that the bank is part of a holding company? Maybe he would feel more like doing business with the bank holding company if it also offered free checking accounts. If there is no drive-in window, he may never deal with a bank that is part of a holding company.

Obviously, the chance of any respondent’s being sophisticated enough to know all of the above and then being able to weigh the pros and cons and give an intelligible, meaningful answer to an interviewer in the space of fifteen seconds is extremely remote. However, the respondent will give an answer anyway, and this answer will tell nothing about whether the corner bank’s being part of a bank holding company will cause a decrease or an increase in customer volume, which is what the average bank client is most concerned about.

Such a question approach probes a respondent’s “image” of a bank and gives expression to inchoate “impressions” of banks, which are then assumed to affect people’s actual behavior toward banks or their actual support for restrictive legislation affecting banks, and so forth. This may be true, although I have seen little documentation that this in fact occurs when respondents are faced with a direct decision that bears immediately on their perceived self-interest. People may have a poor image of banks, but they still deal with them, and convenience (on the next corner) is a more important consideration to them than their subliminal image in determining actual behavior.

Another example of the problem of consciousness as it affects survey design concerns state government planning. A few years ago, New Jersey sponsored a social services needs survey. As a small part of this study, the state planning agency wanted to obtain some idea of levels of public support for social services needs within the state. A series of attitude questions was asked, one of which was:
"Do you think New Jersey is doing too much, too little, or about the right amount to help needy people?"

To give a meaningful answer to this (one that would reasonably predict how residents might vote on appropriations for social services needs), on the level of basic consciousness, the respondent would have to carry some mental picture of "needy" people. Are they people walking around without shoes, crippled people, alcoholic people, people without automobiles or without television sets, old people, people who are deaf and blind? Perhaps the respondent considered people like himself needy and that all people who could not afford to buy a steak for dinner that day were very needy. Then he would have to hold some idea of how many needy people there were in New Jersey. Were there 20, 20,000, or 200,000? If there were millions of needy people in New Jersey, maybe there was no way to do enough for all of them, and the issue was hopeless. If there were only two needy people, that wouldn't be a problem.

Then the respondent would have to view the issue in terms of government aid to the needy—the attitude toward object. Maybe this respondent thinks that need is a sign from God that a person is guilty of sin. Maybe this respondent thinks that needy people are needy because they are lazy and that, therefore, the government has no responsibility at all to help needy people. Perhaps he feels that the government should not provide aid but that private social service agencies should. Maybe he feels that the government should help but that the gradual increase in government services is getting out of hand and costing him too much in tax dollars.

Then we come to the attitude toward situation. Maybe our respondent favors government aid only to needy blacks, to needy women without husbands, to people who are physically crippled, or to people who are mentally retarded, but not to young people looking for jobs or old people who have families to look after them.

With all of these considerations, there is no possible way of really learning whether this person will in fact vote to support social service expenditures and absorb the resulting increase in taxes if we rely only on one or two general attitude questions on a poll.

Still other examples come from public policy on the national level. At the present time, considerable polling effort is aimed at developing public policy for lowering consumption of energy, whether electricity, automobile gasoline, or heating oil. All questions asked in this area of "would you be willing" face the same problems of consciousness and attitude outlined above. In terms of consciousness, now that the gasoline lines have shortened, people have again begun to increase their driving. The newspapers report a continued increase in the volume of traffic on major turnpikes and bridges and in tunnels, and parking lots in major cities once again are filled with cars each working day. The only consciousness that is now operating in people's minds is, "I don't have to wait in line for gas; therefore, there is enough gas for me to drive my car to work." Any further consciousness regarding continued consumption of gasoline increasing the rate of oil imports, thus increasing our balance of payments problems, and thus provoking higher prices from OPEC, which in turn increases our inflation rate, absolutely escapes most people. Yet they will say that inflation and the cost of living are the most important problems facing the United States today. In effect, their consciousness about the implications of their behavior does not extend beyond their ability to drive to and from work. Their attitude toward gasoline is, "If I can buy it easily, it's there." Their attitude toward the situation is, "If there are no lines at the gas station, I'll continue to drive my car regardless of the price of gasoline." However, a sudden cutoff in supplies would change this behavior immediately, as shown by recent events. The possibility that excess use of automobile gasoline in the summer may cut down available supplies of heating oil this winter does not occur to most people unless it is highly publicized by the media. Next winter they will berate the government for not providing enough heating oil.

The above examples deal only with questions where behavior would necessarily follow. I have not even attempted to discuss straight attitude questions in the area of public policy where no immediate or future behavior is even expected from respondents. These types of questions are even more likely to be plagued with huge discrepancies between level of consciousness, attitude toward object, and attitude toward situation. Nevertheless, presidents stake their political careers on responses to these types of global questions, while Congress makes policy, keeping similar polls in mind.
Summary of behavior-predicting components

Frustrated with the lack of predictability of purely attitudinal questions, and rather stunned by the huge gap between what people say and what they then do, I felt it necessary to re-evaluate the role of these types of questions within surveys and to find alternatives to them which could be used in predicting behavior. Consequently, attitude questions have become a minute part of surveys I design. They are replaced by questions that respondents can truthfully answer: questions concerning their environment, their knowledge, and their actual current behavior. To learn what is going on in people's minds and to relate it to potential behavior and present the alternative scenarios, I have incorporated Jaynes's concern about the existence of consciousness, Rokeach's categories of attitude toward object and attitude toward situation, and my own experience in conducting and analyzing data from surveys. The environment, knowledge, and actual behavior, as well as the level of consciousness in the respondent, all form the parameters of the total picture of the respondent's operating reality, and they comprise the total questionnaire. A questionnaire that incorporates only one or two of these concepts or parameters or deals only with respondent attitudes toward object without any concern for attitude toward situation or level of respondent consciousness can lead to policymaking disaster.

The environment: the surrounding situation or structures

I have rather narrowly defined Rokeach's attitude toward situation as the physical operating environment of a respondent. For example, while a respondent's attitude toward mass transit may be very favorable, the key determinant of whether he will use it or not is whether it exists in his environment. Similarly, while there may be many psychological reasons why old people will not go out at night, a major environmental factor is that old people commonly cannot see well at night. If I am old, I am also going to be more concerned about issues affecting Social Security payments and less concerned about education. If I am child-bearing age, I am going to be more concerned about maternity benefits or contraception than if I am male or over sixty years old. In other words, the environment or physical determinants of behavior and attitude include such things as age, sex, health status, race, locale, and mobility—the physical aspects of his life over which the respondent has little control but which impinge on his ability to act or respond in specific ways regardless of his attitudes.

Respondent consciousness

By respondent consciousness, or awareness, I mean more than simply knowing that something exists in a subliminal way. I may be aware that it is hot outside without being really conscious of it. This mere level of awareness, such as an awareness that there is a Panama Canal, provides no insight into respondent behavior and is of little value in understanding these issues. By consciousness, I mean: does the respondent see or understand the implications of his answers to the questions? Can he add or fit pieces together to form a coherent picture? Where does he contradict himself, which indicates a lack of consciousness or lack of understanding of the issues? For example, if a respondent says he opposes abortion under any circumstances, and then proceeds to answer that he favors abortion to save the mother's life, favors abortion if the baby is a result of incest or rape, or favors abortion to prevent birth of a deformed child, we immediately discern a major discrepancy of consciousness on the part of the respondent. He does not see the implications or understand the meaning of "no abortions under any circumstances." He has given an unconscious or emotional response to the question.

Behavior

Documenting actual behavior serves several research functions. First, people are much better able to tell you what they have done compared with what they might do. Behavior sorts out the priorities among competing attitudes. Regardless of how important the environment is to a respondent according to his own testimony, his behavior—littering the roadsides, driving high-polluting automobiles, supporting industrial development over preservation of open spaces—indicates more surely what his priorities are, what his scale of values is. If there is a conflict of attitudes, the respondent favors one over the other by what he actually does.
rather than what he says. The smoker smokes, regardless of what he says to you about his other attitudes.

Knowledge
Does the respondent really know what you are asking him about? Knowledge, or lack of knowledge, occurs on several different levels, all of which must be determined by the researcher before he can be sure his data are useful in predicting behavior. First, does the respondent know what the words themselves mean? Does he know what the word “inflation” means when you ask him, “How serious a problem is inflation?” Is his definition the same as yours? Does he say, “Inflation is higher meat prices,” while you say, “Inflation is too much demand and too low productivity”? Are you both speaking from a common ground of understanding and common word definition? Does he know the United States imports oil? Does he know what the Panama Canal is? These may seem like ridiculous questions to you, the researcher, but if you ask respondents to define such facts or meanings on your surveys, you will soon learn that substantial numbers of people do not know the simple facts, and lack of this knowledge colors their attitudes and behavior and casts doubt on the usefulness of reporting such attitudes as a source of data for policy decisions.

Why do we need hypotheses?

The role of hypotheses
Several years ago, at the beginning of my survey research career with Opinion Research Corporation of Princeton, New Jersey, I learned the first principle underlying questionnaire design from Timothy D. Ellard, now senior vice-president of the company. Early one morning, clutching a cup of hot coffee, I meandered into his office to pick his brains and to pass a few minutes talking about malamutes, Norman Treigle (the outstanding singer at the New York City Opera), and Tim’s daughter’s progress with her tuba lessons. Tim had already drunk his coffee, and he was propped in an absolutely characteristic position: legs stretched out across the top of his desk, body leaning far back in his chair, gazing thoughtfully out his office windows into the gathering sunlight. I no longer recall how the conversation began, but I remember the most important principle Tim so casually dropped that early morning: the hypothesis is the basic building block of a well-written questionnaire. Developing the hypothesis provides the key ingredient to structure all subsequent parts of the project: the questionnaire, the sample, the coding, the tabulation forms, and the final report itself. If you develop your hypothesis and build your questionnaire around it, your data, as you collect them from the survey, exist to refute or support that hypothesis. “The most important work I do is to
run, number of engineers on payroll, and so forth) affect demand for industrial products, as well as insight into the most effective subsequent design and implementation of the ad campaign which was trying to reach certain types of engineers.

The two cases above illustrate the hazards of delegating all of the recruiting for group sessions to standard telephone interviewers, who have not been trained to be suspicious of types of refusals, and who have not been trained to pick up on offhand comments made by potential respondents when they refuse to participate. In particular, if respondents needed for a focus group are members of some special public, the researcher should plan to conduct some of the recruiting himself if he wishes to insure that systematic nonresponse will not jeopardize his study. While researchers are well acquainted with systematic nonresponse as a problem of mail interviewing techniques, similar nonresponse can have even more serious repercussions when it occurs in the hypothesis or design phase of a project.

In summary, hypothesis development is not some esoteric scientific exercise conducted by academicians. It usually takes no particular technical skill to develop hypotheses, but it does demand constant self-exploration, constant openness to new perceptions, and constant awareness of other people and their habits and life cycles. Everything is grist for the hypothesis mill—the newspapers, the magazines, casual conversations with your neighbors and colleagues. In fact, the chief prerequisite for hypothesis development is to have a garbage-can mind. That is, you need the type of head that collects every piece of apparently useless information for its own sake, because someday you will probably need it to formulate a study hypothesis. Hypotheses form the very spine of your daily work in questionnaire design. A hypothesis is like a Christmas tree, and all other research concerns of sample design, question wording, and analytical techniques become ornaments hanging from it. Without the tree itself, these ornaments cease to have any meaning or purpose. You will need hypotheses to understand the nature of the problem to be researched, to guide you in determination of the methodology to be used, to understand the nature of the respondents to be interviewed, and to understand and deal with the client who will ultimately accept or reject your study.

The problem of attitudes

In Chapter Three I discussed the theoretical research problems inherent in a questionnaire which consists almost solely of attitude questions, or a study of attitudes. From a research point of view, studying attitudes means trying to distinguish between attitudes toward an object, attitudes toward a situation, and attitudes toward a specific object within a changing situation. Furthermore, any study of attitudes is complicated by the problem of respondent consciousness and respondent knowledge. Does the respondent understand what he is telling us? Does he see the implications of his attitudes? Does he even know what he is talking about factually?

Beyond these problems, perhaps the central issue is, how do we cope with volatility of attitudes, and how is volatility related to salience? How do we measure conflicts in attitudes and problems of priorities of attitudes? Most importantly, how do we establish a firm relationship between attitudes and specific behaviors? How accurately do attitudes predict future behavior?

My answer to the above questions is that at this time, in most cases, we cannot determine future behavior from a study of present attitudes. There is no way that we can separate out attitudes toward objects, toward situations, toward objects within situations using questionnaire techniques. Indeed, in most cases, we cannot truly identify a solid link between attitudes and subsequent
behavior. The relationship between what people tell you they will do and what they in fact will do cannot be depended upon.

Nonetheless, we can impute or identify the solidity and significance of attitudes if we wish, but not by asking attitude questions. We can begin to predict behavior, but not by asking attitude questions or hypothetical behavior questions. Instead, we must concentrate on asking questions in the following topic areas:

1) Determination of levels of respondent consciousness.
2) Delineation of the structures or environments affecting behavior.
3) Determination of levels of respondent knowledge, both factual and computational.
4) Determination of present respondent behavior in specific situations.

Using these research tools, the researcher can approach the problem of attitudes as an analytical problem grounded in facts lying outside the respondent's invisible, unreachable, and unfathomable feelings or impulses. If necessary or desirable, he can, through analysis, impute specific attitudes to people, but whether or not he chooses to make this leap, he has at hand solidly grounded data reflecting the visible and apprehendable world from which to make policy decisions and predictions of future human behavior. The researcher no longer has to produce some vague or hypothetical proof of a relationship between attitude and behavior. He has learned what the respondent knows, what environment the respondent lives in, and what the respondent actually does. With this knowledge, the researcher can make better predictions of behavior than is possible through only a study of attitudes.

What do my answers mean?

When examining texts on survey methodology and approach, the reader becomes aware of a very strange omission, one of those silences that is so crucial. In all this discussion of research methodology, the authors emphasize problems of bias, which is defined as question wording that produces a favored answer or makes one response more likely than another, regardless of the respondent's real feelings. Then we encounter problems of reliability. Evidence is considered reliable to the extent that similar findings would be obtained if the question were asked repeatedly of the same respondent over a period of time. And we encounter the issue of validity. Does the question actually measure the concept which is being investigated?

But nowhere do we encounter the problem of meaningfulness. Are the data meaningful? Data can be reliable, unbiased, and valid, and still not be meaningful, still not tell us what the respondent really feels, believes, or is likely to do. Answers can be meaningless, and they can be meaningless for several reasons.

First, the respondent can simply lie. He can lie to protect his real feelings, or he can lie because he does not want to appear stupid to the interviewer.

Second, a respondent may not give a meaningful answer because the questions as they were phrased and presented to him did not allow him to tell what he really thought, felt, or was likely to do.

Third, the respondent may not really know what he feels or thinks about the issue posed in the question. This is a salience problem and a consciousness problem. Or he may attempt to answer one question after another truthfully without realizing the inconsistencies or implications of his answers.

Fourth, the respondent can be giving us meaningful answers, but we may misunderstand what he is telling us because it is only a piece of a total picture. We may have failed to explore all relevant factors and features of the entire issue.

Fifth, a respondent can tell us how he feels or what he believes, but his answers will not be meaningful if his current attitudes and beliefs are derived from a basic lack of knowledge about the issues under discussion. More knowledge would change his basic attitudes.

Finally, we as researchers can be misled by respondent answers because we impute meaningfulness to them when in fact the answers may have no importance or salience to the respondent whatsoever.

In spite of all the possibilities of meaningless answers described above, the respondent will still answer questions, and those questions may be unbiased, valid, and reliable. Yet the answers to those questions will give us meaningless and even misleading information.

The client is paying for answers to his question, "What should
I do?” To answer this question, we must be able to determine the predictiveness of our data. How can we assess the meaningfulness of our answers? How can we know what we have when we have a lot of answered questions?

At this point, questionnaire design and data analysis merge. We must analyze our answers, but unless the questionnaire itself has been constructed with the built-in tools for this analysis to distinguish meaningless from meaningful answers, we cannot analyze the data and know what our results stand for. The remainder of this book describes ways of building analytical tools into the construction of the questionnaire in order to determine with greater accuracy actual respondent meaning, and I define one major aspect of meaning as predictiveness of actual behavior.

**Constructing the questionnaire**

Thus far, I have talked about what the survey researcher must do before he begins to write a questionnaire. Now comes the actual construction of the questionnaire. In the next chapters I will emphasize several basic concepts which clarify respondent answers and provide tools for analysis of these answers. These concepts are:

1. Determining levels of respondent consciousness.
2. Determining the influence of structures on attitudes and behavior.
3. Determining how knowledge affects respondent behavior and respondent answers.
4. Determining the importance of past behavior as a predictor of future behavior.
5. Defining the inherent multidimensionality of a problem.

Notice that there is nothing here about attitudes. Determining levels of consciousness helps identify whether people are aware of what they are saying or doing. We assume that policymakers would prefer to be guided by respondents who know what they are doing and saying, and whose responses are thus reasonably predictive of their future behavior, since respondents who are totally unconscious of the meaning or implications of what they currently say and do may exhibit more volatile and unpredictable behavior. Lack of consciousness is often indicated by answers that are inconsistent, not based in objective reality, purely emotional, ignorant, or misleading. If our data reflect a low level of respondent consciousness, no amount of fancy statistical analysis or data massaging will provide us with genuine guides to predicting behavior. Therefore, we have as much obligation to measure variations in level of respondent consciousness as we do to measure sampling variations and their impact on the reliability of our data.

Determining the influence of structures helps the researcher understand the context of respondent answers and the influences conditioning those answers. If respondents are unconscious, they are more likely to be heavily influenced by their environment. They are reactive rather than active. Determining structures places limits and boundaries on respondent answers. Many answers to questions can only be understood in a total respondent context. Without this context, answers may appear illogical, irrelevant, contradictory, or self-defeating. Without a thorough knowledge of the respondent’s environment, the researcher can overestimate or underestimate the importance of some answers he receives.

Determining respondent knowledge and behavior are both methods used to learn the salience to the respondent of his own answers. Clients and researchers suffer from the occupational hazard of believing the problem they are surveying is vital and of huge significance to the public they are interviewing. In fact, this is rarely the case. Only by determining the salience of the issue to the respondent himself can we gain the necessary perspective on the problem to make sound recommendations to the client. Knowledge and behavior also indicate respondent priorities and values, help define sensitive topics, and deflate the prevalence of socially acceptable answers.

Problems which are inherently multidimensional pose special research problems which draw together questionnaire design and data analysis to identify complex ideas, such as levels of need and perceived importance of a topic versus perceived differences.

Thus, a suitable technique is of primary importance for determining respondent priorities and for defining sensitive topics and issues. This technique is based upon using respondent testimony that is found in actual behavior and actual knowledge rather than attitudes. All of the concepts listed above must be built into the questionnaire simultaneously with the hypotheses in an
attempt to answer the question every decent researcher must ask himself: "What do my answers mean? How much credibility do they really have?" In other words, the researcher must design the questionnaire not only to obtain answers to questions, but as a means of distinguishing between meaningful and meaningless answers.

Determining respondent consciousness

The basic hypothesis underlying most survey research is that respondents know what they are saying and are conscious of the meaning and implications of their answers. In fact, people are assumed to be conscious in the conduct of most aspects of their lives. Although psychology has given great credence to the ideas of the "unconscious" and subconscious behavior, generally these are regarded as aberrant states. The major departure of this book, therefore, lies in the belief that people—twentieth century people—are essentially unconscious, using Julian Jaynes's definition of consciousness. Only on this basis have we been able to account for many of the discrepancies that continually occur in respondent testimony on public opinion surveys. Only on this basis can we account for the huge gap between what people say and what they do. Since our most important research hypothesis is that most people are unconscious most of the time, according to Jaynes's definition, the major problem in the design of questionnaires becomes that of determining levels of consciousness in order to measure the meaningfulness of respondent answers. In surveys we now believe there is a problem of sampling error, which has been defined and is generally easily solved, and a problem of respondent error, which has not been defined, is not easily solved,
but accounts for the major error in applying survey techniques to problem solving.

Thus, the first concept or method used to distinguish between meaningful and meaningless answers to survey questions concerns this uncharted realm of consciousness. There are two research factors involved in the problem of respondent consciousness:

1) Determining whether the respondent is conscious.
2) Determining for respondents who appear to be giving unconscious answers whether there is a framework, which we have not correctly identified, within which the respondent is giving conscious, meaningful answers.

Thus, we need to design a questionnaire which will determine whether each individual respondent is conscious or unconscious, or whether we have failed to understand the meaning and framework of a respondent’s conscious statements. The answers received during an interview may appear to be meaningless or illogical unless we have designed some tools into the questionnaire which begin to tell us the source of the lack of logic.

The factors involved in developing a questionnaire which will illuminate the respondent’s level of consciousness and his framework for answers include the following:

1) Does the respondent know what he feels or believes, or is he simply answering the questions? Even if he knows what he believes, upon what experience are these beliefs based?
2) Does the respondent foresee the implications inherent in what he says, and is he consistent in his answers over a series of related questions that probe different aspects of the same problem? Does he see the whole problem or only a series of unrelated pieces?
3) If the respondent is inconsistent in his answers over a series of questions, does this inconsistency result from unconsciousness on his part, or does it result from aspects of the problem or of the framework of the problem that are important to the respondent but that the researcher has not yet exposed or obtained from the respondent?

Does the respondent know what he feels or believes?

As a rule, people have not thought about and do not know their feelings about most issues that have not directly affected them. The Panama Canal issue, described earlier in this book, is one such issue for most people. Indeed, we have found that only on some specific, highly publicized, personal issues, such as abortion, do people know what they believe. They have thought about it, puzzled over it, and have arrived at some fairly definite and grounded opinions on the issue. The Vietnam War was another example of such an issue, although one in which opinions did significantly change over time, especially as more and more people in the country were directly affected by the war. These types of national issues have in common that they deeply and personally affect people.

In 1978, 32 percent of the general public said that they personally had known someone who had had an abortion. Among people between the ages of eighteen and twenty-nine, 50 percent said they had known someone personally who had had an abortion. Among those who were sixty or over, only 7 percent said that they had known anyone personally who had had an abortion. These figures help explain the greater support for legal abortions to be found among the younger age groups. Direct experience has led to greater consciousness and greater perceived need. As the Vietnam War expanded, affecting more and more families personally, a similar change in perspective occurred, until finally a majority of the U.S. public swung from support of the war to opposition to it.

Thus, the first rule of survey research is to attempt to determine what the respondent feels about an issue and how deeply he feels about it. However, you cannot do that simply by asking the respondent, “How do you feel about such and such?” and then, “How deeply do you feel about it?” One way for the re-

searcher to deal with this problem of gauging the impact of an issue or problem on respondent consciousness is to determine how close to the issue the respondent is, and closeness for survey purposes is almost equivalent to firsthand (or secondhand, but fairly direct) personal experience. A person who has fought in Vietnam will probably know his feelings about that issue more thoroughly than a person who only had a friend in the war but did not actually fight. The second person will be more likely to know his feelings on the issue than a person who has never been in the war and does not know anyone personally who was fighting in it. Similarly, a person who has actually had an abortion will probably know her feelings more clearly on that issue than someone who has not had an abortion. However, someone who has not had an abortion but who knows a friend who has had one will probably know her feelings better on that issue than someone who has not had an abortion and does not know of anyone who has had one. I have found that feelings based on experience are much more stable than either feelings based on salience as a result of media exposure or feelings based simply on habit not related to any direct personal experience. In the area of sex education, a person with children receiving sex education in the schools is more likely to have thought deeply about the issue than a person whose children are grown and are no longer in the public school system.

Examples of experience-related questions to be included on surveys are:

"Have you personally ever had an abortion?"

"Has your girlfriend or wife ever had an abortion?"

"Have you ever used an automatic teller machine?"

"How often do you usually attend church or temple services?" (religious or moral commitment)

"I am going to read to you a series of things that people can do to make their opinions known. Please tell me whether you have ever done it. Have you done it within the past two years?" (political commitment)

1) Written a letter to your congressman or senator.
2) Voted in a primary election.
3) Voted in any election.

4) Passed out literature or worked on a political campaign.
5) Walked in a protest march or participated in an organized protest demonstration.
6) Belonged to or contributed money to a special interest organization, such as one supporting civil rights, the environment, or birth control.

"Have you ever called the police for any of these reasons in the past? Tell me which of these things have happened to you personally during the past year." (attitudes toward and experience of crime)

1) Been beaten up at home.
2) Been robbed of money or other property when you were at home.
3) Had property stolen from your home while you were away.
4) Been bothered by prowlers.
5) Been vandalized or had property destroyed at home.
6) Been harassed or taunted by teenagers while at home.

These experience-related questions can then be used as a scale to analyze evaluation questions, such as favorability toward abortion, favorability toward the police, favorability toward the political system. For example, a person who has been beaten up and robbed is more likely to have thought about the role of the police and to have a conscious opinion of the role of the police or of the problem of crime in his area than a person who has never had firsthand experience with either crime or the police.

Is the respondent giving you a coherent picture?

One of the best ways of determining whether the respondent is conscious of his beliefs and their meaning is to ask a series of questions which will expose any logical inconsistencies in these beliefs. We have found that a logical progression of answers from a respondent indicates that the respondent has thought about a
problem, rather than simply imbibed beliefs about it from his environment. Thus, a positive answer to the first question should logically be followed by a negative answer to the second, and so forth, if the respondent understands the meaning of the questions and the meaning and implications of his own beliefs. Random beliefs do not have direction, and behavior based on random beliefs is also likely to be random rather than directional. Part of the subsequent data analysis is to examine answers for direction, for logical progression or inconsistencies in progression which indicate lack of consciousness.

The following series of questions dealing with abortion was designed specifically to pinpoint logical inconsistencies and to follow them up for greater insight into the respondent's level of consciousness:

1) "What types of people do you think most need abortions?"
2) "When would you favor legal abortion?"
3) "If you favor abortion to save the life of the mother, why do you regard the life of the fetus as less important than the life of the mother?"

Some people answered as follows:

1) "Only unwed teenagers need abortions."
2) "I oppose abortion under any circumstances."
3) "I favor abortion to save the life of the mother."
4) "The mother should be saved rather than the fetus, because mothers are needed for other family responsibilities (they already have children, a husband, etc.)."

Note the importance of the progression and order of these questions. The answers show a completely inconsistent, illogical position, but reveal that the respondent was answering random questions based on random feelings rather than a coherent picture of the problem of abortion. The respondent is giving attitudes about teenagers, about killing, and about the importance of mothers. He is not giving a coherent picture of his feelings about the issue of abortion, because he has no coherent feelings about the entire issue, only about isolated facets of it. If public policy were to be made on the basis of the above answers, abortions would be made available only to married women because only teenagers need abortions.

Note also the importance of not accepting the first answer to a question at face value. People will say that they oppose abortion under any circumstances and then go on to say they favor it to save the life of the mother, in cases where the baby will be retarded, and in cases of rape.

Answers are typically inconsistent and unconscious in the area of voting preferences:

1) "I vote for the man, not the party."
2) "What are the characteristics of the man you vote for?"
   Answer: "Honesty."
3) "How do you define honesty?" Answer: "An honest man is one who votes on my side of the issues."
4) "How do you know he votes on your side of the issues?"
   Answer: "Because he is a Democrat."

Subsequent analysis of voting behavior shows without doubt that although this voter says he votes for the man, in fact he votes for the party. Experience shows that whether a person has voted Democrat or Republican in past elections is a much better predictor of future voting behavior than anything he may say about a specific candidate. In this case, the respondent is unconscious of his reasons for his own behavior.

Another example of unconscious answers occurred in a study of people with motor vehicle driving violations. The purpose of the study was to determine the effects on traffic violators of educational campaigns to change driving habits. When asked whether their emotional state affected their driving at all, respondents would reply that their emotions had very little effect on their driving habits. Then, when asked to describe the circumstances surrounding their last traffic violation, respondents typically replied, "I was mad at my girlfriend," or "I had a quarrel with my wife," or "We had a family quarrel," or "I was angry with my boss." Yet emotions did not affect their driving, they said.

These respondents are unconscious in three important ways. The first consists of an inability to see a total picture and respond to it rather than to isolated parts. This is a very common phenomenon. The second way in which people are unconscious
concerns the reasons underlying actual behavior. People often do not know or understand why they do things. They just do them. A third form of lack of consciousness consists of the inability to visualize the results of an action. This is part of the basic inability to see a total picture rather than isolated parts. A perfect example of this type of lack of consciousness arises when people are asked about taxes and government programs. People consistently answer that they favor increases in funding for education, national health insurance, Social Security for the elderly, and unemployment programs. Yet when asked to support these programs with tax dollars, they veto such an approach under the guise that increased services could be provided without increased taxes if only the government were more “efficient.” When you pursue this idea of efficiency, you learn that, yes, people recognize that their own companies are inefficient, that inefficiency occurs with increases in the size of organizations, that the government is a huge bureaucracy, and that bureaucracies are usually inefficient. Another example occurs when people say that they oppose nuclear power plants, oppose loosening air pollution controls to allow more fossil fuel power plants to be built, and then insist that the utilities are not doing enough to insure that there is adequate electricity available for the future.

All of these respondents are unconscious. They do not see the contradictions in their answers. They do not add or connect isolated pieces of information into a coherent picture. As a consequence, we cannot be sure of what their actual behavior would be under any circumstances. We cannot predict their probable behavior with any degree of certainty, because they do not know what they think, why they do things, or what they would do, whatever they may tell us on a questionnaire. In spite of all this, the answer to any one question would fulfill the requirements of being valid, reliable, and unbiased. However, we would not know the meaning of the answer. We would not have any picture of the respondent’s operating reality, which could at best be described as unconscious and confused. We are dealing with a respondent who is giving us a purely emotional reaction to specific words and phrases in questions. This is very important to know before we recommend specific courses of action to clients. The meaning of these data lies not in what respondents said per se, but in the pattern of their responses, the inconsistencies and non sequiturs in their answers.

Logical inconsistencies as a reflection of a complex respondent framework

While logical inconsistencies appearing over a series of questions can indicate unconsciousness in the respondent, they can also indicate consciousness of a very complex framework surrounding his answer. (It is a standing joke in the survey research business that an intelligent, thoughtful, detailed answer to a simple question is classified as “other” and obliterated.) It then becomes important for the researcher to identify this framework in order to understand the meaning of the respondent’s apparently inconsistent answers.

In my preliminary conversations with people during the hypothesis formation stage of the abortion study, people would respond, “Yes, abortion is killing,” “I don’t condone killing,” “I favor abortion.” This answer series presents a classic example of logical inconsistency that plagues any polling dealing with this sensitive topic. In this case, however, the inconsistency arises because of the definition of the words “life” and “killing.”

I began my attempts to understand these inconsistencies by questioning myself (self-examination) and others as to the meaning of the words “killing,” “life,” and “death.” These words appear to be unambiguous, but in fact, when discussing abortion issues, people use these words ambiguously and respond to them ambiguously. If people oppose abortion on the grounds that it is killing, how do they justify killing the fetus instead of allowing the woman to die? Perhaps there are different definitions of “killing” depending upon the nature of the object being killed, and perhaps there are different definitions of “living” depending on the nature of the object that is alive.

Answers that pinpointed the semantic problem were:

1) “Abortion is killing.”
2) “I oppose killing.”
3) “I favor abortion, even though it is killing, because the mother is already alive.”

In other words, people were making an important distinction between stages of life: developed life in the mother and undeveloped life in the fetus. Furthermore, they were making a value
judgment about the relative quality and merits of each type of life. While respondents would not absolutely deny the life rights of the fetus, if a choice were to be made between the life of the mother and the life of the fetus, the mother's life should be saved because she is "more alive."

Textbooks tend to emphasize that respondents, when exposed to a series of questions, will deliberately try to answer consistently, whether they mean it or not. My experience indicates that a respondent's efforts to be consistent are often not the problem. In fact, a respondent often responds to issues illogically, not because he is lying, but because either he is simply unaware of what he has said and what it means, or the researcher has not explored the respondent's internal framework thoroughly enough to understand the logical inconsistencies. The researcher has an obligation to resolve this research problem. When subsequent data analysis shows that 24 percent of those people who said they would not favor abortion under any circumstances also go on to say (in a different part of the same questionnaire) that they would support abortion to save the life of the mother, and abortion to prevent birth of retarded children, and abortion in the case of rape or incest, you as the researcher are confronted with an analytical problem which you had better be prepared to discuss and understand. Designing a questionnaire in which identification of the problem of consciousness is built into question sequence is one way of beginning to cope with this research problem.

Too often these types of research inconsistencies are deliberately left out of the analysis and simply ignored. All respondents are treated as equal, and all answers are treated as equally meaningful. It is much easier for all concerned to say that respondents are conscious and rational and that their testimony can be accepted at face value than to admit that we don't know what we are doing or how to explain these inconsistencies.

The following are basic questionnaire techniques that can be used to identify problems of respondent consciousness:

1) Gauge the depth of understanding of an issue or problem by determining the nearness of a respondent to it through actual experience or levels of experience. Those people who have actual experience are more likely to be conscious of their answers, because the experience has forced them to think more about the problem or feel more deeply about it.

2) Determine the respondent's ability to see an entire picture rather than random parts by asking a series of questions outlining the different facets of the issue, and then check answers to see that the respondent answered all the different questions logically and consistently.

3) Determine the respondent's framework within which he is answering questions by asking a series of questions to outline the framework, and by asking open-ended questions which allow the respondent to tell you more of what is inside his own head, and allow the respondent to explain to you what he means by his answers. (The topic of open-ended questions is discussed at greater length in Chapter Thirteen.)

4) Determine the respondent's ability to understand his own behavior by concentrating on the respondent's actual behavior: what he did, when he did it, what the circumstances surrounding his behavior were. Analyze his answers in terms of actual behavior. Do his stated reasons for his behavior correspond to his actual behavior, or do they seem unrelated?
to eliminate legal abortions was underway in her state, would that make her more likely to become politically active to maintain legal abortions? If people really knew what the word “profit” meant and if they knew how to calculate percentages correctly, would they be more likely to support the activities of large corporations?

After consciousness, environment, and knowledge, behavior is the fourth research tool automatically designed into a questionnaire in order to deal with the problem of the meaning of attitudes—our present inability to define, measure, or otherwise accurately determine respondent potential behavior based only on what respondents can or do tell us. Behavior questions can be used in a variety of ways, all of which are aimed primarily at determining potential future behavior.

Behavior as a means of dealing with lack of consciousness

When survey researchers ask for people’s attitudes or opinions, they make the following key assumptions about respondent consciousness:

1) That people can analyze the problem and the situation being explored in the interview. By analyze, I mean that they can see the different parts and also see how they fit into a total picture.

2) That people do analyze problems and situations.

3) That after they have analyzed a problem or situation, people have enough command of the language to be able to talk about or describe the problem or situation.
4) That people will then tell you about the problem or situation.

5) That people can project themselves imaginatively into the future and relate their present situation to some hypothetical future situation, and then they can describe their potential feelings or behavior in the new situation.

6) That they can also visualize alternative courses of action that might be available to them in the future.

7) That they can visualize the implications to themselves of any alternative modes of action they might take in the future.

All of the assumptions listed above presume respondent consciousness as theorized by Julian Jaynes. I have found that analysis of current behavior is another method of measuring and analyzing the problem of lack of consciousness among respondents.

Perhaps the best way to underline the problem of consciousness in attitude questions is to analyze individually the assumptions of consciousness underlying specific questions that have been asked of the general public on surveys. The question below has actually been used. It can be used with the first situation (of the four listed) simply to obtain people's "gut" reactions or top-of-mind responses for the purposes of developing advertising themes. However, if it is to be used to develop data for determining under what circumstances people really believe women in these categories should carry life insurance for purposes of careful marketing of products, the question raises very serious problems of respondent consciousness.

"Here is a list of women in different situations. For each type listed, please tell me whether it is very important for her to carry life insurance, somewhat important, or of little or no importance?"

1) A woman who is the sole support of her family.
2) A single career woman over fifty years old.
3) A single career woman under thirty years old.
4) A woman who is a full-time housewife with children under eighteen.

In order to respond consciously to these items, a person must make several imaginative projections or narratizations, both into the future and into the past. First, the respondent will have to be able to imagine the effects of a person's death under each of the conditions listed. That is, if a woman who is the sole support of her family dies, what will then happen to that family? If a woman who is single dies, and she is over fifty, who will that affect? After trying to figure out who will be affected by the death of the particular woman, then the respondent will have to visualize what types of effects or problems that death will provoke. In the case of a woman who is the sole support of her family, the respondent will have to imagine whether that woman is married with children, or whether she might be supporting an elderly father and mother. (Family has not been accurately defined here, so the respondent will have to define for himself what he means by the word "family," which may or may not correlate with what the researcher means by the word.)

The respondent will have to guess whether the children of such a woman have alternative guardians available. More importantly, if such guardians are available, the respondent will have to deduce that insurance on the life of that woman will be necessary to pay her burial costs and estate settlement costs, and also possibly to provide money to the alternative guardians to care for her orphaned children. The respondent will then have to decide whether these orphaned children are of college age and able to support themselves if necessary, teenagers, or preschoolers, which plays a role in determining both short-term and long-term financial needs that could be provided by insurance. All of these factors must be considered before a respondent can consciously decide how important life insurance would be for such a woman.

Similar types of visualizations and projections would be necessary for the other examples provided in this particular question. Does the single career woman over fifty have an estate or heirs that she wishes to leave money to? Does she have enough savings to pay for her own burial and settlement fees? Does it even matter to her whether she leaves an estate or not?

Is the single career woman under thirty going to be interested in building an estate for potential children? Is her health good enough to establish insurability now, or can she afford to wait until she gets married? Will she ever get married or have children? Today many women decide to do neither.

In case 4, above, the respondent will have to deduce the re-
placement costs of a full-time housewife with children in terms of housekeeping costs, baby-sitting costs, day care costs, and so forth.

There were a total of eight such items asked about women and a total of seven such items asked about men on this one survey questionnaire. I myself do not feel competent to provide intelligent, realistic, conscious answers to these extremely complicated questions, which place severe demands on one's intelligence, knowledge, and imaginative abilities. Do you think the average person with a high school education could perform these mental tasks as well as you could? A further question in this particular study asked people for a self-assessment of their knowledge about life insurance. In the 1978 study, 59 percent admitted that they were not too well informed or not at all informed about life insurance. What does a low level of admitted knowledge do to the accuracy or meaning of the data obtained in this questionnaire?

The behavioral approach to the same study would ask a series of easily answered questions, somewhat as follows:

1) Number of wage earners in the household.
2) Number of children and/or dependents and their ages.
3) Type of insurance existing on each wage earner, if any.
4) Approximate face value of life insurance on each wage earner. (“Face value” is a problem here, and a knowledge question about its meaning would also be important to the analysis of this question.)
5) Family income.
6) Existence of a will.
8) Provision of financing for guardians of children.
9) Monthly housing costs (mortgage or rent) as a rough measure of replacement income absolutely necessary.
10) If only one wage earner, employability of other adults in household based on past working experience, if any.
11) Ages of wage earners or household adults.
12) Amount of cash on hand and in savings.
13) Size of home mortgage.
14) Alternative sources of aid to the family—wealthy grandparents, other relatives, and so forth.
15) Other liquid assets in the estate.

Behavior questions cannot be thought of or asked independently of the sample stratification and design and the analytical task posed by the research problem being investigated. To obtain a truer picture of what people really think or know about life insurance, the researcher should begin by stratifying his sample and using a respondent selection table or screening questions to obtain a cross-section of enough respondents in key types of household structures, such as married with and without children and single by specific age categories. Then the questionnaire would consist of behavior questions which could be analyzed by household structures. In this way, the researcher would obtain a true picture of what each individual household does on a projectable sample, which would then tell the researcher what people in each type of household believe, without demanding that respondents project themselves imaginatively into differing household structures and situations that they have not actually experienced. Thus, actual behavior plus sampling plus data analysis act as a surrogate for all of those attitudinal or imagination questions asked above. The data analysis would then concentrate on the problem of household vulnerability to a sudden death of a member of the household in terms of current and potential income loss, possible ways of raising cash within the household in the event there is no life insurance, and so forth.

The behavior analysis in this example becomes synonymous with respondent knowledge. We assume that people do what they know, and that if they do not know, they do not do. Behavior also acts as a measure of importance. People who have taken the maximum number of insurance steps regard the problem of financial security seriously, while those who have not taken such steps are not conscious of the seriousness of the problem. In rare cases, steps will not have been taken because families simply cannot afford the extent of protection they may need. Here again, however, analysis of the household's financial situation plus actual respondent behavior is a surer indicator that financial problems are the cause of low insurance coverage than respondent testimony alone saying, "We can't afford it."

As the above example shows, attitude questions which demand respondent projection and narratization simply transfer the analytical task from the researcher to the respondent. The attitude questions about insurance listed above ask the respondent, rather than
the researcher, to analyze the issues and potential problems. The opposite should be true. Behavior questions provide data for analysis. The respondent can accurately describe what he does. The researcher, however, designs the sample and the questionnaire to allow the respondent to describe fully what he does, and then the researcher, not the respondent, analyzes and projects the meaning. The researcher, with the help of the client, is certainly in a better position to know all the variables affecting the purchase of and need for life insurance for any type of household. The respondent’s actual purchase of life insurance is a more accurate representation of what he believes about his life insurance needs than anything he might say in response to a direct question. Attitude questions demanding that the respondent imagine experienced, hypothetical situations are often simply a shifting of the responsibility for analysis from the researcher to the respondent, a lazy researcher’s way of handling difficult thinking, which more often than not provides very weak data.

None of the behavior questions listed above demands imaginative skill or projectable consciousness on the part of the respondent. These questions also place minimal demands on actual knowledge of insurance, a complex subject indeed.

Behavior versus socially acceptable answers

Behavior questions also avoid the problem of socially acceptable answers, that is, answers the respondent provides that are consistent with his perceptions of what the interviewer wants or consistent with the mores of his society. By definition, what people already do is generally perceived by them to be socially acceptable, and, therefore, behavior questions are much less likely to encourage inflated or unrealistic answers prompted by unknown or unstated but implicit social pressures.

As an example of socially acceptable answers which may not constitute reliable data, consider the answers given by three respondents to the question, “Which one of the following do you feel is most to blame for the energy problems the United States is having?” The three possible answers were: the consumer, the oil companies, government regulation. All three respondents answered, “the consumer.” As a follow-up to their selection of the consumer, these respondents were asked, “Is there any one thing the consumer could do to really help our energy problems?” The three respondents answered as follows:

1) “Hopeless, up to the powers that be.”
2) “Use of car pooling.”
3) “Kids should walk more. Public transportation. Be conservative by car pooling, solar heat, insulation, turn heat down, air conditioning up.”

Except for the first answer, all of the answers are socially acceptable. But what do these respondents actually do, these respondents who say “the consumer” is most responsible for the energy shortage? We do not know. The questions were not asked. Based on these answers, we could erroneously assume that the respondents are socially conscious, perhaps self-sacrificing. In fact, each respondent was asked whether he would use his car significantly less if gasoline were increased to $1.10, $1.50, $2.00, or $2.25 per gallon. All said, no, they would not decrease the use of their cars if the price went up. Although not strictly a behavior question, the fact that they would not change their behavior suggests that they have not altered their behavior. Thus, their answers indicate social consciousness or conserving behavior and attitudes, as long as it’s someone else doing the conserving. Make the kids walk more.

If instead behavior questions had been asked about what this respondent has actually done to conserve gasoline—do his children walk more, does he participate in a car pool, has he installed more insulation or solar heat, at what temperature was his thermostat set at the time of the interview?—then we would obtain a definite view of his actual energy-conserving priorities, if any, and thus the relative importance of energy conservation in his life beyond what he says it is. The most fundamental assumption behind these types of behavior questions is that if the respondent is serious with his answers, he will not only have talked about it, he will have done something about it.

I have mentioned three isolated respondents, but this type of answer pattern is typical; spread over 100 respondents out of 1,000, for example, the data can become extremely soft, a cause
of greater error than that associated with sampling error. In questionnaire design, as perhaps nowhere else, talk is cheap. The purpose behind behavior questions is to find out exactly how cheap that respondent talk is. Can the answers be believed, or even taken seriously, or are they all hot air?

**Behavior as a means of defining sensitive problems**

Behavior questions can also define sensitive issues more readily than attitude questions. For example, people may not be able to define what a “battered” child is or what excessive drinking is. Furthermore, questions on these topics will almost certainly elicit socially acceptable answers at variance with what people actually do. After all, how many people will admit to an interviewer that they drink too much or that they beat their kids? Behavior questions, while not a panacea, can provide very valuable insight into these complex issues and further refine definitions of touchy topics. As mentioned several times earlier, at this stage of questionnaire design, the design must mesh with subsequent analysis; they cannot be handled independently of one another. Some examples below indicate the relationship.

One problem encountered in a survey was to try to define “battered children” and also to attempt to learn if there was a social standard of what is legitimate and what is unacceptable punishment of children. To deal with this research problem, respondents were provided with a long list of punishments, increasing in severity as the list progressed. The respondent was asked which of those punishments had been meted out to him as a child. Then the respondent was asked whether he felt he had been dealt with too harshly, too leniently, or about right. Subsequent analysis did indeed indicate that there was a social standard of acceptable punishment unrelated to ethnic differences or cultures.¹

Another difficult word to define is “loneliness” or “isolation.” Respondents cannot define it. However, the researcher can include in his questionnaire a series of behavior questions, covering such activities as going out of the home during the day, going out at night, going out on weekends, receiving telephone calls, making telephone calls, number of hours spent watching TV, ability to drive, and ability to walk. Each one of these detailed behavior items can then be included in a simple score, which classifies people into categories of high social activity, moderate activity, and low activity. The researcher, since he has defined these categories, knows exactly what is meant by his definition of loneliness without being dependent upon the spontaneous and perhaps pressured definitions provided by hundreds of respondents to interviewers. While people may argue with the researcher about his definition of loneliness, at least it is a concrete definition to argue about, with clear parameters for all to view and acknowledge. No one has to argue about what the respondents really meant when they said they were “very lonely” in response to a vague general survey question.

With answers from 1,000 respondents who have detailed their actual social behavior in terms of a series of small, but concrete, behaviors as the data base, not only is the researcher provided with a behavior-based definition of loneliness rather than a subjective definition, but he can develop norms of social activity by age groups, household structures, and so forth. Using precisely this type of series of detailed behavior questions, we have consistently learned that single heads of household with children are more likely than the elderly to suffer from loneliness or isolation.

**Present behavior leads to similar future behavior**

Behavior questions are particularly important in areas where potential future behavior is under study. We have little data to support the idea that people will radically change their present behavior unless some serious structural change forces a behavior change. For example, lack of gasoline causes people to use mass transit more. However, in voluntary circumstances people tend to

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grow into new behavior out of similar or related past behavior.

For example, in a study of car pooling and use of buses versus use of personal automobiles, we found that people who already participate in car pools are better candidates for mass transit use than people who do not. Thus, installation of buses on these same routes would be likely only to transfer people from car pools into buses, but would have little impact on transferring single car drivers into users of buses.

Similarly, banks which are concerned about effective introduction of electronic funds transfer (EFT) services have learned that people who are already using such specific automated services as automatic teller machines or who are heavy credit card users consistently show greater favorability toward and higher usage of more general EFT services when they are introduced.

When designing a questionnaire aimed at determining potential future behavior, the most important design problem is to include a battery of behavior questions detailing present behavior that is similar to or related in some way to the potential behavior under study. The most obvious example of present behavior dictating future behavior occurs in election projections. People who have voted in the past for a specific party overwhelmingly repeat this behavior, regardless of the candidate involved. This is why primary election projections become so difficult. The actual number of people voting can be predicted, but since all candidates come from the same party, accurately predicting a primary winner in a field of four or more becomes extremely difficult.

**Some behavior can falsify answers**

In one important area actual behavior regularly inflates answers. This area, dear to the hearts of many advertisers and politicians, concerns sources of information about a candidate or a topic. We usually advise the client not to waste his money on such a question, because people, when asked to list the sources of their information about a topic, routinely answer, “television.” Since television is the most important information-disseminating medium in the United States at present, and since people spend enormous numbers of hours watching television, they automatically assume that, whatever it is, they saw it or heard it on TV.

In this case, the overwhelming behavior pattern of watching TV dictates the respondents' answers, whether true or not.

**Behavior indicates what people know or don't know**

This problem is similar to that of lack of consciousness. Often behavior results from what people don't know, as well as from what they do know. In this case, what people don't do can be more important than what they do. The hound of the Baskervilles is silent.

During the past few years several research firms have designed and conducted a series of energy consumption monitoring experiments. These experiments have been implemented to learn exactly how different types of households, living in identical types of housing (newly constructed townhouses), use energy, and what key variables correlate with differing rates of energy usage. As part of these studies, respondents in each household were given instruments which provided them with immediate feedback about their energy usage. This immediate knowledge of the effects of their energy usage behavior caused many households to adjust their behavior. They could see that bathing in a full tub used more energy than showering. They could see that closing draperies and curtains in the summer during the day lowered the need for air conditioning. They could see how a constant opening and closing of doors by children could substantially increase energy consumption by the constant flow of heated or cooled air to the out-of-doors. These types of experiments provide important support to the idea that much human behavior indicates lack of knowledge rather than knowledge.

Once again, the concomitant design of questions in terms of the subsequent analysis, in this case, analysis of lack of knowledge as indicated by current behavior, emphasizes that the researcher, not the respondent, is responsible for the analysis. Regardless of what the respondent tells you of his attitudes toward conserving energy, the experiments discussed above provide a true indication of respondent reality and priorities undistorted by lack of consciousness, lack of knowledge, social pressures, or undefined complex terms. Behavior tells a complete story. Respondent testimony provides an incomplete story.
4) Public disclosure of the poll in its entirety, including the project's goals. The total context of the poll must be available. Only in this way can charges of bias be refuted.

Needless to say, all of these steps demand severe intellectual honesty on the part of both clients and researchers.

All of the previous chapters of this book have dealt with questionnaire construction as a totality, emphasizing the importance of multiple questions working together to build a body of knowledge, sequence of questions to deal with routing and leading of the respondent, and types of questions (behavioral, knowledge, structural). This chapter treats the next level of questionnaire construction: actual question formulation.

Basically there are three types of questions:

1) Open-ended questions which allow the respondent to give a totally free answer.

2) Open questions with precoded answer categories. This type of question appears completely open to the respondent and allows the respondent to give a totally unstructured answer, but the interviewer codes the answer into prestated answer categories provided by the researcher on the questionnaire.

3) Closed questions. The actual answer categories are provided to the respondent, and the respondent is expected to choose the answer category which comes closest to or best represents his feelings, beliefs, attitudes, opinions, behavior, or knowledge of a situation.

In this chapter I will discuss the advantages and disadvantages of these three basic types of questions, and how they can be used to understand and predict respondent behavior.
Open-ended questions without precoded answer categories

In The Art of Asking Questions Stanley Payne lists several varieties of open-ended or free-response questions, specifically:

1) Introductory questions to help the respondent settle into the interview.
2) Suggestions or recommendations for action on a specific topic.
3) Follow-up for further elaboration of preceding questions.
4) Reasons why, usually in response to a preceding choice question.
5) Argument questions.
6) Knowledge or memory tests.
7) Sources of respondent knowledge.
8) Factual information.

While these classifications may be helpful, the more important point is that these types of questions (open-ended) are indispensable to a thorough understanding of complex issues and topics. The main advantage to free-response or open-ended questions is that they are the only way the researcher can give the respondent the opportunity to "have his own say." Presumably, although this is often forgotten, the main purpose of an interview, the most important goal of the entire survey profession, is to let the respondent have his say, to let him tell the researcher what he means, not vice versa. If we do not let the respondent have his say, why bother to interview him at all?

In spite of this vital role, open-ended questions now receive a very bad press in the survey profession. Over the past several years, the disadvantages of free-response questions, especially coding costs associated with processing and tabulating answers, have apparently seemed overwhelming to survey research firms. Many questionnaires are now designed without any totally open questions (questions without precoded answer categories).

As a result of this trend, I believe that coding costs have now been transferred into data-processing costs. To substitute for open questions, researchers lengthen their questionnaires with endless lists of multiple choice and agree/disagree statements, which are then handled by sophisticated data-processing analytical techniques to try to massage some pattern or meaning out of this huge mass of precoded and punched data. I have found that a well-written open-ended question can eliminate the need for several closed questions, and that subsequent data analysis becomes clear and easy compared to the obfuscation provided by data massaging. However unsophisticated actual respondent answers may be, if questions have been well formulated, either open or closed questions, the answers of the respondents will be closer to the truth of actual respondent attitudes and opinions than any preformulated, pseudoscientific scaling items devised by researchers and manipulated by computer operators. I advocate free-response questions because this is the only way I can really let my respondent "have his say."

When precoded or closed questions are used to the exclusion of open-ended questions, the researcher demonstrates one or more of the following research attitudes, all of which suggest poor research behavior:

1) I don't want to know what my respondent thinks.
2) I want to know what my respondent thinks, but I can do a better job of phrasing his statements and thoughts than he can.
3) I can anticipate everything my respondent thinks or feels in advance, and thus I need ask only precoded questions.
4) I don't know how to code my respondent's answers meaningfully, even if I do let him tell me what he means.
5) I can't phrase the question well enough to get a meaningful answer from my respondent.
6) I don't want to be bothered coding my respondent's answers, because it is either too expensive or too time-consuming.

Obviously, I do not believe that all questions on a questionnaire should be open, but several types of issue complexity make such questions especially valuable if not absolutely indispensable to a complete understanding of respondent attitudes.

Uses of open-ended questions
The primary purposes of open-ended questions as I use them are to learn:

1) How the respondent actually defines a preceding closed question. For example, when the respondent says the energy
shortage is "very serious," what does he mean by those words, and what objective data, if any, does he use to indicate that there is a very serious energy shortage?

2) To learn how involved or concerned the respondent is with an issue. Is the respondent merely answering questions, or does he understand the issues in a meaningful sense?

3) To define ambiguous terms. For example, in a study for a Jewish volunteer organization devoted to the cause of Zionism, members were asked, "What does Zionism mean to you personally?" The following types of answers were given, any one of which has important implications for the organization's leadership in its formulation and presentation of membership goals and materials:

"A homeland for the Jewish people."
"Supporting Israel, insuring the right of Israel to exist."
"It means to be a good Jew."
"Jewish liberation movement."
"A belief in the state of Israel that conflicts with many American ideals."
"The central meaning of my life."
"Being a Jew is one thing, but being a Zionist is another. Zionists are very pushy, and I don't like that."

Open-ended questions and complex issues

Open-ended questions provide absolutely indispensable insight into how respondents interpret complex but apparently single-issue questions. For example, "What are your feelings toward abortion?" is phrased as a single-issue question—abortion. However, the issue of abortion itself is not single; it is multifaceted. It is an issue with many ambivalent positions. It deals with the issues of killing and murder, it deals with the issues of mental and physical health, it deals with the issues of sexual morality, it deals with the issues of the economics of poor families, and it deals with issues of world overpopulation and limited food supply, among others.

Another example of a complex issue that appears to be a single issue is favorability toward Israel. A person could favor the idea of a Jewish homeland, the idea of providing opportunities for the Palestinians, and the immigration policies of Israel, and yet could oppose the religious conservatism of Israel, the country's policy of settlement on the West Bank, and so forth.

Any major social issue, such as the arms race and nuclear armaments, installation of nuclear power plants, coal mining and land use issues, and distribution of federal money to different population groups, contains many facets that preclude a simple yes or no, favorable or unfavorable answer by respondents.

These complex issues can be handled in two ways. First, the issue can be broken into several questions, each one embodying one discrete aspect of the issue. This approach is valuable and necessary. However, to be completely effective it depends on very extensive prior knowledge on the part of the researcher to insure that all of the important aspects have been covered in the questionnaire. The second approach is to use open questions to get the respondent to verbalize his ambivalence, if it exists, on the issue.

It is true that many respondents may simply not be able to discuss a complex issue. However, you will have a positive, statistically reliable measure of this nonresponse when you have actually given the respondent an opportunity to say the equivalent of "I don't know" or "I won't say." When you use open-ended questions, you will not provoke easy, glib, or unthoughtful answers from the respondent as readily as you will by using pre-coded answers that you have articulated and provided in the questionnaires. The problem of refusal or inarticulate answers will occur frequently only on those issues about which people indeed know nothing or show virtually no interest. On important issues, such as abortion or the energy shortage, people may have ambivalent feelings, but this very ambivalence results from their having thought about it and having deep feelings about it, all of which lead to extensive answers to open-ended questions. (In fact, we had to instruct interviewers working on the abortion study to prevent the respondents from talking too extensively, which did become a problem because of interest in the topic.)

Measuring intensity of feeling

Open-ended questions allow the respondent to indicate the depth of his feelings on controversial issues. Depth of feeling does not show up accurately on a standard scale used to measure it. For
example, in an abortion study respondents were asked a routine overall favorability question about abortion—strongly or somewhat favorable, or strongly or somewhat opposed, to allowing legal abortions. Following this, they were asked to summarize their feelings about abortion.

In hundreds of interviews respondents answered that they generally favored abortion (either strongly or somewhat),

1) To save the life of the mother.
2) In cases of incest or rape.

Similarly, hundreds of other respondents on the same study answered that they strongly or somewhat opposed abortion. When asked the follow-up open question, “Why do you say that?” they answered:

1) To save the life of the mother.
2) In cases of incest or rape.

Thus, in the case of favorability toward abortion, without this open-ended follow-up question, the researcher would be in serious danger of overstating public favorability toward abortion based on the favorability scale provided to respondents. The open-ended follow-up allowed the respondents to report the limits they had placed on their answers of strongly or somewhat favorable. On the other hand, the researcher would also have been in danger of overstating opposition to abortion. This open question allowed the respondents to report the limits they had placed on both favorability and opposition, which in this case happened to be exactly the same limits.

This open question also allowed other ambivalent people to state their position more accurately:

1) “I am personally opposed to abortion, but it is a necessary evil and poor people may need it.”
2) “I favor abortion, but not to be used as contraception, not to be used just like walking into a store.”

This great middle ground of conflict and ambivalence underlies any major public issue and only free-response questions will allow it to surface.

Open-ended questions to define terms and identify lack of understanding

Open-ended questions can indicate to the researcher whether the respondent has understood the terminology used by the researchers. Such questions may reveal not only a problem of “generic” words, but a problem of phrasing of questions which the researcher may not have anticipated. In a bank study the respondents were asked to describe why they felt their particular bank was “superior” to other banks in the area. One respondent answered, “Because my bank is not humble.” Granted, this is not a significant source of respondent error, but it brings the researcher back to reality, an awareness that he has to be more conscious of the multiple meanings of the words he routinely uses in his questions. This type of misunderstanding of commonly used words can cause as much distortion of your data as sampling error, but you will never know it unless you allow the respondent to define key words for you.

Open-ended questions can be used to ask for definitions of concepts or ideas commonly used in advertising or marketing approaches. I have found that definitions of such concepts vary by socioeconomic subgroup and other important demographic and marketing variables. Nonetheless, perhaps one of the most important uses of open-ended questions is to give the respondent the opportunity to tell you when he does not understand your terms. When asked to define “fair pricing” of bank services, many respondents candidly answered, “I don’t know what you mean by that.” Similar answers were given when people were asked to define “competent” bank service. Thus, far from lying, many people will tell you what they don’t know if you will give them the opportunity.

Coding of open-ended questions

One important criticism of open-ended questions emphasizes the difficulty of “constructing meaningful variables for statistical analysis.” I believe that this problem reflects the standard practice of entrusting the coding operation to nonprofessional clerical staff. This is no knock on these people, but with rare exceptions,

meaningful coding is extremely difficult and demands professional levels of knowledge of the problem being researched, the client's information needs, and the issues the open question is attempting to answer. Coders are rarely fully acquainted with all of these issues, and thus they have no sense of appropriate selectivity in their coding, no sense of priorities. The solution for coders is thus to code everything as finely as possible, whether it is meaningful or not.

In my years of working with coders I have found that the task itself becomes so tedious, so boring, that coders tend to reach the lowest common denominator of coding—word coding. That is, when the coder spots certain words in a phrase, he automatically slots it into a category without really attempting to decipher the content, or the context, or the total meaning of the respondent's answer. With rare exceptions, this type of coding provides little insight to the researcher and does not lead to construction of meaningful variables for data analysis. Of recent studies I have worked on, only one case, a banking study, stands out as an important example of the value of word coding. When respondents were asked about fair pricing of bank services, a very large number simply answered, “free checking accounts.” I deliberately kept this word code separate from all other answers to obtain an exact count of how many people see this as the criterion for fair pricing of bank services. This issue of free checking was very significant to the client’s problems with marketing new retail products; that is, if a bank offers a free service once and then retracts it, this creates credibility and marketing problems for the bank in the introduction of subsequent new products.

Rather than word coding, the objective is to code concepts, and this presents an entirely different coding task. The more complex the concepts, the more complex the coding task, and it seems unreasonable to ask that minimum wage coders be expected to perform Ph.D.-level coding. In our office professional staff members handle virtually all of the coding, and we do not consider it a misplaced use of professional time. In fact, our professional staff members have been subjected to gibes and teasing by other professionals in the field because we do our own coding and do not hire coders to do it—a form of professional snobbery that often results in providing the client with inferior work. We find that preliminary coding by professional staff members prepares the researcher for writing the subsequent interpretive report. In fact, by reading hundreds of verbatim responses, the researcher can interpret the data, can understand its meaning and significance, much more deeply than he can by reporting simple percentages attached to rather vague answer categories.

The concepts used to form a code depend upon a thorough understanding of the client’s information needs. This, as well as insuring meaningful reporting of respondent answers, is one of the most important criteria for developing code concepts. Unfortunately, in many large research firms, when an account person deals directly with the client, comes back to the shop and tells the researcher what the client’s problems are, and then that researcher in turn tries to tell the coder what the client’s problems are, something is definitely lost in transmission. This is why coded questions so frequently provide mushy data. The problem lies not so much with the question form itself—open-ended—but with the way in which these types of questions are processed within the research firm.

Concept codes need not be voluminous. The simplest concept can consist of two punch categories: “respondent understood the question” and “respondent did not understand the question.” This type of code was used in a recent study of interest-bearing checking accounts. The client wanted to know if the term, “NOW accounts,” had become generic to the general public. We first asked a closed question, “Have you heard or read anything about a new service called a NOW account?” For those respondents who answered yes, we then asked an open question, “As far as you know, what is a NOW account?” About 20 percent of those who had heard of it had no idea what it was, according to their free-response answers. We had no interest in coding and did not need to code the different categories or descriptions of lack of knowledge provided by these respondents, only whether they indicated a basic level of knowledge of the principles of such accounts.

This raises another important problem with coding as it is usually handled: misplaced precision. When I was taught coding principles, I was told to try to keep the “other” answer category to less than 10 percent and lower if possible. This results in creation of too many codes that are too fine to provide usable information. It also encourages word coding instead of concept
coding. I fail to understand why it is necessary to provide fifteen categories of respondent answers when five will provide the information the client really needs, even if this selectivity does result in a 25 percent "other" answer category. Certainly, the client will find four or five actionable code categories much more meaningful than twenty categories that account for every answer but only satisfy idle curiosity about the wide variety of possible respondent answers.

In a recent bank marketing study for a trust department close acquaintance with the client's marketing problems led to the following brief concept codes in response to the question: "Why would you choose that person/organization for your executor?"

PROBE: "What were your most important considerations?" The concept codes were developed from a marketing viewpoint, not from the viewpoint of precise accounting of all respondent answers. These codes were developed to help the client design advertising themes, and also they were developed to help tell the bank what approaches their account executives should use in dealing with potential trust customers. The concepts developed and percentage of respondent answers applying to each were as follows:

1) Importance of knowledge, expertise to potential customer. 16%
2) Importance of history, habit, past relationships with the bank. 3%
3) Importance of trust, honesty, confidence in the bank. 37%
4) Importance of personal knowledge of client's needs, intimacy with client. 33%
5) All other answers 29%

(Answers add to more than 100% because of multiple answers.)

Analysis of these four basic concept codes by key demographics, including a financial sophistication scale and a financial assets scale, provided extremely meaningful variables for statistical analysis and, more importantly, helped provide the client with concrete marketing approaches which could be used for different market segments.

Notice that there were only four basic codes in response to this question. As mentioned before, I believe the greatest problem with most coding is that coders separate answers into too many fine categories simply to account for all the available answers. This also results from an inability to distinguish the meaningful concepts from the meaningless ones from the client's point of view. Only the researcher has enough knowledge of the client's needs to make these distinctions, unless he sits with the coder day after day to insure that the coder thoroughly understands the coding issues. Furthermore, emphasis on coding minutiae is instrumental in making coding the expensive, time-consuming operation it usually is, but does not have to be.

Open-ended questions with precoded answers

Although many surveys apparently include open-ended questions, the benefits of such questions are lost because researchers insist on inserting precoded answers for the interviewers to circle during the interview. Such precoded answers present many opportunities for serious error to be introduced into the survey results because they:

1) Depend upon the interviewer to listen very carefully to the response.
2) Depend upon the interviewer to interpret the response correctly.
3) Depend upon the interviewer to interpret correctly what the researcher intended to be included under the precoded answer categories he provided.
4) Depend upon the interviewer to circle the correct answer category.

Expecting the average field interviewer to make this complex set of judgments while maintaining the attention of the respondent is also inviting serious error. This type of error introduced into the survey findings can never be identified or measured. The researcher must simply take a leap of faith that the entire interviewing process has been handled accurately. This blind assumption makes the researcher's distorted concern over sampling variance seem ludicrous on its face.
Shown below is an example of precoding demanded of interviewers in a study of unemployment. A typical respondent could have answered the stated question, “Why didn’t you look for a job?” with the following answer:

“I had a new job lined up, but my mother fell down the stairs. I had to take care of her, and when I went back to that job, they said I couldn’t have it. I didn’t have enough schooling. I haven’t been looking around much anymore because I’ve had asthma.”

Now, using the actual answer precodes given below, how would you code the above answer during the course of a one-hour interview without losing the attention of your respondent? Would you code only one salient part of the respondent’s answer? Would you code his mother’s illness under “family reasons” or under “health or disability”? If you code only salience, as interviewers often do, you underrepresent some answers and overstate others.

**CIRCLE ALL RESPONSES THAT APPLY:**

- Had a job/new job to begin
- Expected to be recalled or have hours reinstated
- Believed could not find a job
- Believed no suitable jobs available
- Retired/not interested in working anymore
- Not employable, nontransferable skills, unskilled
- Return to school/obtain training
- Not employable: age
- Family reasons: day care/family care, spouse objections
- Health or disability
- Vacation
- Other (specify)

A further serious problem with precoded answer categories is that the researcher assumes he is competent, qualified, and knowledgeable enough to provide all the relevant and meaningful answer categories in advance. In fact, there is absolutely no way that I, the researcher, can clearly anticipate and enunciate every possible nuance of feeling or answer that may be provided by 1,000 people interviewed on a national probability sample poll. My respondents will tell me something I don’t know, if I let them, and if I am truly a researcher rather than a propagandist. Can I really anticipate the appropriate answer categories to the question, “You said you favored abortion to save the life of the mother. Why is the mother’s life more important than that of the fetus?” This is an open-ended question that gives the respondent an opportunity for wide latitude of response that has not been strictly imposed from the outside by the researcher, and careful reading of responses and coding of these answers by the researcher will provide analytical insight that cannot be obtained in any other way.

**Closed questions**

Closed questions have become the mainstay of survey researchers. They appear to be inexpensive to administer and to process because they demand no coding and no extensive handwritten answers by interviewers. They also allow easy statistical analysis. However, closed questions have a serious drawback. In many cases the researcher cannot really know what the answers actually meant to the respondent. In other words, the researcher treats the data from closed questions as representing how people really feel, when in actuality he is reporting data on how people answer when forced to answer a question. The major criticism leveled against open-ended questions, that they are too difficult to answer, leads to the opposite and equally valid criticism of closed questions, that they are too easy to answer.

In an open-ended question situation two points of interpretation are brought out into the open for critical examination if necessary by both the researcher and the client:

1) The inferences that the respondent made about what the question actually meant to him.

2) The inferences made by the researcher about what the respondent’s answer actually meant.

Verbatim answers, even allowing for the inadequacy of interviewers in writing down complete verbatim answers, permit these inferences to be seen. In closed questions, however, the inferences
are obliterated, although they are still there. Because they are hidden, the researcher can ignore them. In an open-ended question the verbalization of the answer by the respondent allows the researcher (and the client) to peer into the respondent's head and learn whether the respondent understands the researcher's question and whether the researcher understands the respondent's answer.

When the researcher asks a closed question, he has no way of knowing whether the respondent understands the question, nor does he know whether the respondent actually understands the answer categories, and consequently he does not really know the meaning of the respondent's answer.

I have emphasized throughout this book that a questionnaire is a means of communication between the researcher and the respondent, that the ultimate goal of every questionnaire should be to provide a means of letting the respondent tell the researcher truthfully and as accurately as possible what the respondent knows, thinks, feels, and does. In closed questions this two-way communication process may be clouded by the following types of misunderstanding:

**Researcher to respondent**

1) The researcher does not say what he means (wording problems, multiple concepts per question, poorly phrased questions, poor hypotheses).

2) The researcher says what he means, but it is open to interpretation (a specific word may have several different meanings, a concept may have several different aspects).

**Respondent to researcher**

1) The answer categories provided by the researcher may not be adequate to allow the respondent to express the depth or breadth of his true feelings, behavior, or knowledge.

2) The answer categories provided by the researcher may mean something different to the respondent than they do to the researcher.

3) The respondent may never have thought about the issues being raised by the question, and therefore his answers will be completely uninformed or misinformed.

4) The respondent may not care about the issues being raised by the question, and therefore his answers may reflect salience rather than any concern or thought of his own.

These objections may not be serious if the researcher and client intend to treat the data frivolously. However, in most studies I have worked on the client intends to take the data very seriously indeed, and therefore he wants and needs answers that reflect some true state of reality. However, most instruction in the art of writing questions is directed only to one side of the above equation: *how the researcher communicates to the respondent*. Equally important is *how the respondent communicates to the researcher*. Closed questions can disguise the fact that there may be no communication going on at all, just an exchange of questions and answers.

As a researcher, you take it for granted that you know what the respondent means by his answers because you wrote the questions, and you know what the questions mean and what you expect in the way of rational answers. Closed questions enhance this illusion, but open-ended questions often bring the lack of communication out into the open.

Closed questions can entail three kinds of problems which are also common to open-ended questions:

1) Finding words to convey accurately what you mean to the respondent.

2) Finding words that the respondent understands on a grammatical level.

3) Understanding what the respondent means when he says, "very favorable" or "not too familiar." Ostensibly, this type of meaning is handled by rank ordering, but as shown on the abortion questions discussed earlier, rank ordering does not always convey a uniform gradation of meaning.

Here is an image question often used in retail bank marketing studies. These types of closed questions provide some of the best examples of the inherent weaknesses of closed questions. They are extremely easy for respondents to answer and provide meaningless data.

"Now I would like to get your impressions of the various banks and savings institutions in this area. Please tell me which bank or savings institution comes to your mind first when you hear the following statements. There are no right or wrong answers; we just want to find out how you feel from what you know or have heard."
If 45 percent of my respondents name my client’s bank as one which does more for the man in the street, it may mean they think the bank has a resuscitator handy at the information desk for anyone who collapses in the street.

Now carry this exercise to the next step. As a customer, which banks in your area would you apply these answers to? Would you apply them only to the banks you actually use, or would you quite objectively recall the major competing banks in your area and include them in your consciousness as you answer each image item above? Would you just randomly spout off the name of some bank to please the interviewer and get off the phone more quickly? This raises a third issue concerning closed questions: what does the respondent have in his head when he gives you an answer? Does his answer reflect genuine thought, random response, or politeness to the interviewer, or does it mean what it appears to mean—that he does indeed hold a discernably different image for each competing bank in his geographic area? Researchers assume (but in fact should simply pray for) the latter case.

After you have asked yourself these questions of meaning from a respondent’s point of view, the next step is to ask these questions from the client’s point of view. Of what earthly value are the answers to these questions in helping a bank client solve his retail marketing problems? In fact, at a recent meeting this was precisely the question we asked our bank client when he urged us to trend the above image questions on a statewide retail banking study. If we find that 68 percent of respondents say that their bank is the largest, how does that help the bank’s marketing efforts? We have data from other studies that indicate that for young business managers, largeness is an asset, but for the elderly in small towns, largeness is a liability. The bank can’t do a great deal to become large in any sense of the word. It cannot go out and immediately build a series of new branches. It is not going to add five stories to its downtown office building. It cannot increase its assets 15 percent during the next year. So how does this information help the client?

Further discussion with the client revealed that in fact he had one serious issue that he wanted to know more about. As deliberate policy, the bank does not immediately institute new products and services simply to be the leader in the community.
It is not a large bank (does not have the most assets), and it is concerned about the faddishness of many new services, as well as their potential profitability or lack thereof. Was this slower pace of introduction of new services hurting the bank among its present customers? This is an answerable question, but it cannot be answered by using the twenty-one image items from the image study which had been conducted three years earlier.

While wording, meaning of respondent answers, and ability to act on the study findings are all serious issues affecting closed questions, actual statistical analysis of closed questions presents a much more serious research problem, which I have never seen discussed. That is, statistical variables can be constructed and reported for these closed questions which encourage people to give answers when they do not know what they are talking about. Statistical handling of closed questions gives equal weight to people who know what they are talking about and to people who do not. Why should researchers knowingly lump together knowledgeable and unknowledgeable, caring and uninterested respondents? Researchers as a rule do not willingly lump together old people and young people, blacks and whites, poorly educated and highly educated respondents. Yet they automatically lump together disparate answer groups, and the result—an averaging out of answers—falsifies the survey results as surely as sample bias.

In fact, survey researchers can legitimately be accused of overemphasizing the importance of asking unbiased questions in order to evade the problem of creating bias by treating all respondents equally in the statistical distribution of answers across closed-question answer categories. Researchers refuse to treat some answers as more important than others. Rank ordering on a simple Guttman scale does not distinguish important answers from unimportant ones. In fact, Dillman’s very criticism of open-ended questions shows this unwillingness to grapple with respondent variance:

Perhaps the biggest disadvantage is that these kinds of questions can be very demanding. People are asked to recall past experiences, reorganize them, and find the terms with which to express them. The task of creating and articulating answers is difficult for most respondents, especially those with low educational attainment or who lack experience in communicating ideas to other people.  

The implied next step, which is in fact what closed questions do, is to fill in this respondent lack, deliberately give the respondent the “answers,” and then treat these answers as though the respondent had given them.

Closed questions are conceived of as performing a “counting” function. All answers must be included, and all answers must be counted as equal, whether they are or not. This is why data based solely on closed questions can be so unstable. All answers are not equal. As discussed and emphasized throughout this book, some respondents are conscious, some are knowledgeable, and some are involved. People who show these characteristics tend to be more stable in their attitudes toward an issue than those who do not. When only attitudes or salience are measured, without measurement of the above three respondent characteristics, the data are unstable and can be influenced by many extraneous variables. One major goal of this book has been to emphasize this need to view some respondent answers as more valuable than others in solving the client’s problems, and to provide approaches to eliciting answers of superior value.

In an article entitled “Interviewing Changes Attitudes—Sometimes” Bridge et al. ask, “Does the mere asking of questions motivate a respondent to form attitudes which were previously absent, or to change the direction or intensity of extant attitudes?”3 The authors conclude, among other things, that when issues “are already salient to respondents, no attitude change or information seeking is stimulated by the interview. . . . But when issues are poorly understood, respondents are encouraged to rethink their opinions so that their beliefs about the importance of an issue will come into line with the importance that the interviewer evidently ascribes to the issue.”4

In effect, closed questions raise salience. This becomes the obvious purpose of many closed questions which are prefaced by a long explanation of the issues presented by the question. For example, the following is a typical attempt not to bias by insuring that all respondents are ostensibly on an equal knowledge footing:

An increasing number of countries who do not have enough energy are turning to nuclear power as a major source of energy. However, only

2. Dillman, Mail and Telephone Surveys, p. 88.


4. Ibid., p. 63.
a few countries in the world have the technical know-how to build nuclear power plants. The new Carter Administration is worried that if too many countries have nuclear power plants, they can convert that nuclear know-how into producing atom bombs. Do you approve or disapprove the building of nuclear power plants in countries that don't have them now?  

Under the guise of not biasing the results, the researcher systematically introduces bias by educating all respondents and then treating all answers as equal, when they in fact are not. Furthermore, by forcing the respondent to answer closed questions with prescribed answer categories, the researcher evades the problem of dealing with the 70 percent of respondents who frankly don't give a damn. No wonder reliance upon this kind of poll data is so hazardous, and skepticism about the survey profession overall is increasing.

Further evidence of the importance of differential weights in treating respondent answers comes from election polling, which has become very accurate compared with other social issue polling. Political pollsters know and admit that election outcomes reside in the huge number of uncommitted or uninvolved voters. Only die-hard party workers and very committed party members know who they are going to vote for, routinely vote in elections, and cannot easily be swayed in their decisions. It is the uncommitted voter who can be swayed by charm and bunches of wavy brown hair on the TV screen, or who will switch a vote because of a social gaffe publicly uttered by a candidate from a railroad station or airport runway. No survey can indeed measure whether the uncommitted voter will care enough about this particular election to bother to vote at all. Therefore, political polls attempt to probe the likelihood of voting first by asking about past voting behavior and intensity of feelings about candidates, then by asking about intensity of feelings about issues, and finally by asking about the likelihood of actually voting in the upcoming election.

Compare this in-depth exploration of uncommitted voters with routine social interest and many marketing surveys that rarely pursue the problem of intensity of feeling. For example, a typical poll asked, “How serious do you feel the energy shortage is here in the U.S.—very serious, only somewhat serious, or not serious at all?” This question appears to measure intensity, but in fact we need the following information to determine what level of intensity is being revealed by the respondent:

1) Respondent definitions of his own rating of serious—“What does the word ‘serious’ or ‘shortage’ mean to you?”

2) Respondent knowledge of an energy shortage. What is a shortage, upon what facts does the respondent base his opinion that there is or is not a shortage? Has he had trouble getting gas? Has he been unable to heat his home?

The polling business, as a social science, suffers from a mental approach that works for physical science investigation, that is, the idea of a constant in nature. The physical sciences predicate that such a constant exists, and the scientific task is to locate it. The social sciences cannot do this. Certainly, pollers should not make this assumption. If a researcher insists that such a constant exists—that every respondent has a solid point of view and all the researcher must do is locate it—he will deliberately falsify his data. Surveys that refuse to deal with the fact that there is often nothing there fail to provide the information their clients need and are paying for.

Combining open and closed questions

The most obvious solution to identification of respondent meaning to dealing with the unequal importance of respondent answers, is to use open-ended and closed questions in immediate combination. The closed questions give the statistical count, and the open-ended questions give the meaning of the statistical count.

Here are some very simple but effective ways to use this one-two combination. As discussed earlier, in the abortion study a closed question concerning favorability toward abortion was followed immediately by the open-ended question. “Under what circumstances, if any, would you allow legal abortions?” In a study of organization membership the closed question was, “How would you rate the competence of your chapter leader—


6. Ibid., p. 402.
ship—very good, fairly good, fairly poor, or very poor?” It was followed by, “Why do you say that?” In a bank trust study the closed question was, “Who would you personally be most likely to choose as the executor of your will?” It was followed by, “Why would you choose that person/organization for your executor? PROBE: What were your most important considerations?” In a bank retail study of NOW accounts the closed question was, “Keeping in mind the possible service charges and the minimum balance requirements, overall, how interested would you be in opening an interest-bearing checking account?” The open-ended question that followed was, “Why do you say that?”

The coded answers to the open-ended questions are always analyzed by cross-tabulating the preceding answers to the closed questions. Then these answers are broken out by important demographic variables. Thus, we can define what people mean when they say they are “very favorable,” and we can then see if the definitions attached to “very favorable” vary by important subgroups. Usually, astonishingly different meanings for the same words show up by key demographic subgroups, as discussed in the next chapter in regard to generic words.

One final example of the importance of closed and open questions in combination with questions regarding actual behavior rather than only attitude will illustrate the importance of designing the questionnaire as a totality rather than as a bunch of questions. In a study of homeowner’s insurance in a large city among inner-city ghetto residents, the basic research problem concerned the issue of “redlining” and the difficulty faced by inner-city residents in obtaining homeowner’s insurance. When people were asked, “How easy would you say it is to find the type of home insurance you want—is it very easy, somewhat easy, somewhat difficult, or very difficult to find home insurance?”, substantial numbers answered that it was “very difficult” to find homeowner’s insurance. People were then asked the follow-up question, “Why do you say that?” Answers included the following:

“Because certain companies don’t like to insure certain neighborhoods.”

“Because of the area—some people have a hard time getting insurance because of the neighborhood.”

“People around the area have said it’s difficult. It is a changing area.”

“Everyone’s having trouble. If you have a fire in your house, the insurance company wants to drop you.”

“Well, it is hard for a black person to get insurance in my neighborhood. That’s why I said that. That’s all.”

“I hear people complain. I don’t know why they say it’s difficult to get insurance.”

“Insurance companies will not insure inner-city homes.”

“They don’t like to give blacks homeowner’s insurance, for reasons I don’t want to go into.”

“In this area a lot of people don’t qualify because of the area.”

All respondents were asked if they personally had homeowner’s insurance and how much difficulty they had actually experienced in obtaining it for themselves. Although people believed it was very difficult to get insurance, in fact most people had obtained the insurance they wanted with relatively little difficulty. Thus, if only the attitude question had been asked without the follow-up question, which indicated that much of the perception of difficulty was based on hearsay, the recommendations to the client would have been vastly different. Recommendations would have included greater effort to provide insurance to counter criticisms of redlining. Instead, the recommendations to the client emphasized the need for education to change the perceptions of residents, which were not borne out by the facts. These perceptions were detrimental to the community itself, as well as to the insurance industry.