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ABSTRACT

In order to study procedures for increasing the return of mailed questionnaires, several types of cover letters were sent to groups of potential subjects. The three experimental variables were: (1) appeals to the potential respondent; (2) threat of a follow-up letter; and (3) stationery letterhead. Four types of appeals to the subject to participate in the research were: (1) appeal to professionalism; (2) appeal to the importance of the respondent; (3) token compensation (25 cents); and (4) appeal to humor. The results indicated that the use of monetary inducement or token compensation and several followup letters will produce a substantial return rate. Several suggestions were offered as strategies for future research: (1) use of follow-up postcards; (2) use of "play money" as a combination humorous-token compensation appeal; (3) promise of monetary incentive to those who actually return completed questionnaires; and (4) establishment of a lottery for which only respondents would be eligible. (Author/TC)

STRATEGIES FOR INCREASING RESPONSE RATES TO MAILED QUESTIONNAIRES: AN EXPERIMENTAL STUDY

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PREFACE

Rarely do social scientists have the opportunity to plan and perform experimental research which is "neat and clean." Too often we are encumbered with problems, confounding variables and sources of error which are obvious but for which no ready solution is available. Compromise is a frustrating but often necessary action when performing research in the "real" world.

For these reasons and because we were able to involve several dedicated students, this research endeavor - from beginning to end - was fun. (Most students don't believe that research can be fun). Of course, the excitement related to potential discovery of real "answers" to the mailed questionnaire return-rate dilemma was also very present (until the data was fully analyzed).

To all the rehabilitation counselors who thought they were volunteering to participate in a study concerned with job satisfaction - we express our appreciation for your volunteering instinct and our regrets for having to disguise the purpose of the research. We know that most of our subjects will recognize that research dealing with the return rate of mailed questionnaires cannot be declared as such. The probability for confounding the results was too great.

We also wish to express our sincere appreciation to the following persons for their long hours of folding-stamping-sealing assistance and for their humor and good will: Donald E. Shrey, J. William Underwood, Albert Zbik - research assistants. A special note of appreciation goes to Mrs. Elizabeth Swayze, secretary par-excellence, and to Sam Wang, statistician.

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CHAPTER I

INTRODUCTION

Mailed questionnaire surveys have been a popular method of data collection for several decades. They provide an economically efficient data collection procedure, especially when subjects are dispersed over a large geographical area, as contrasted with personal interviews or telephone surveys. The mailed questionnaire approach also has the advantage of allowing the respondent to reply at his or her leisure rather than feeling obligated to respond at a specific time or location.

However, serious questions have been raised concerning the use of a mailed questionnaire as an alternative to other standardized data collection procedures. The importance in research of maximizing response rates to mailed questionnaires needs little elaboration. One of the prime concerns of many researchers conducting mail surveys is to receive the highest possible response rate. A high response rate is critical since lower return rates are associated with limited sample representativeness and a greater chance for sampling bias. Kerlinger (1973) noted the severity of this bias problem and indicated that one should not use a mailed survey unless an unusually high percentage of returns can be secured.

When the percentage of returns from a questionnaire are high, the problem of sampling bias is diminished. There is greater representation of those subjects originally selected from the population and therefore the small number of non-respondents will not, to any extent, jeopardize the generalizability of the results. Thus, the sensitivity of an experiment can be increased and the chances for random error decreased if the sample size is as large as possible.

Within the literature pertaining to mailed questionnaires, there have been two major areas of study. The first research area focuses on the development of a better understanding respondent bias by assessing the differences of respondents and non-respondents on various personality and demographic characteristics (Gannon, Northern & Carrol, 1971; Oginbene, 1970; Schwirian & Blaine, 1967; Wallace, 1954). Secondly, there are a number of studies which examine cover letter variables and other techniques which may substantially increase subject response rates. The variable which has stimulated the greatest interest among researchers has been that of monetary inducement or, as it has been labeled in the present investigation, "token compensation" (Bevis, 1948; Erdos, 1970; Kephart & Bressler, 1958; Robinson & Agism, 1951; Watson, 1965; Wotruba, 1966). The results of these studies showed, generally, that token compensation of a quarter (25 cents) or more, included with the cover letter, will result in greater questionnaire returns than will a lesser sum of money, or no monetary inducements.

The type of postage used on the cover letters has also been found to increase the response rates of mailed surveys. Martin and McConnell (1970) indicated that the use of commemorative stamps significantly increased their response rates. Other studies compared classes of stamps and business replies, finding first class and airmail stamps to have the most substantial effect on return rates (Gullahorn & Gullahorn, 1963; Robinson & Agism, 1951; Russell & Kulerzmy, 1970).

Donald (1960) found that his response rates on a mailed survey study were increased from 46.2% to 67.2% after two follow-up mailings. Eckland (1965), Hochstim & Athanasapoulas (1970), and Huck & Gleason (1974) reported similar results in their findings using different follow-up letter techniques.

Purpose of the Study

The present study addressed itself to the general question: Which techniques will substantially increase the response rates of subjects to mailed questionnaires? The purpose of this study was to examine the extent to which subject response rates were effected by combinations of several specific experimental variables. These treatment variables are divided into three areas:

I. Appeals to the Potential Respondent

   A. Professionalism
   B. Humor
   C. Importance of the Respondent
   D. Token Compensation

II. Follow-up

   A. Threat of Follow-up Letter, plus two follow-ups
   B. No Threat of Follow-up Letter, plus two follow-ups

III. Stationery

   A. Research-University letterhead
   B. Blank, no letterhead

Research Questions

1. Which combination of cover letter variables (appeals, threat of follow-up, letterhead) would result in the highest return rate of subjects indicating willingness to participate in a study (respond to a questionnaire)?
2. Which of the four types of appeals to subjects (Professionalism, Humor, Importance of the Respondent, Token Compensation) would result in the highest return rate of subjects indicating willingness to participate in the study?
3. Does a threat of a follow-up letter, as compared to the exclusion of such a threat, result in a higher return rate of subjects indicating

willingness to participate in the study?

4. Does the use of research project-university letterhead stationery and envelope, as compared to blank stationery and envelope, result in a higher return rate of subjects indicating willingness to participate in the study (respond to a questionnaire)?
5. What percentage of return of postcards, from each of the sixteen groups, can be attributed to first and second follow-up letters? Do such follow-up letters merit the added expense of time and money?
6. In general, what were the demographic and professional characteristics of the total sample? Were any substantial differences noted, between the sixteen groups, over such characteristics?
7. What differences were noted, if any, between subjects who were willing to participate in the research and those who were not willing (but provided personal information), concerning age, sex, and years of counseling experience?

Limitations

Several methodological limitations, not readily subject to control, are noted below:

1. Two of the 16 groups received specific assignment to treatments rather than random assignment. This was due to the concentration of Ss in one major metropolitan area, and because of the possibility that two or more of these Ss, being employed at the same agency, might receive different cover letters and somehow share this information. The possibility of such confounding was minimized by specifically assigning these two subject groups to similar experimental groups.

2. Due to the expense of certified mailing, the mailings were sent

first class, with a return address. The researchers were then unable to be certain if all of the mailed letters reached their destination. Some letters were returned (N=35), but some might have been discarded. The Ss appeared to be highly mobile since many envelopes were returned with no forwarding address.

3. One limitation to be considered in all mail survey research is that of respondent bias. There are some Ss who usually respond to questionnaires and those who rarely do, for unknown reasons. In the present research, an attempt was made to study the demographic characteristics of persons willing to participate in the research and individuals not willing to do so.

4. With regard to generalizability, the results of this study are presently limited to persons holding professional status. No claim is made that the results are applicable to the general, non-college population.

Summary

One of the major problems in using a mailed questionnaire is the obtainment of a large and representative response. Such surveys have often been criticized because of their small proportion of returns and the possibility that non-respondents may differ substantially from respondents on important but unknown personal characteristics.

It is clear that numerous variables may effect the rate and quality of mailed questionnaire returns. Since the results of many previous studies are conflicting and incomplete, this research was designed to discover which combinations of experimental variables could deliver the highest percentage of returns.

CHAPTER II

LITERATURE REVIEW

Introduction

An extensive review of the literature concerning mailed questionnaire surveys revealed two major categories of study. As indicated earlier, these are: 1) the study of respondent bias as a function of differences between respondents and non-respondents, and 2) the assessment of different techniques used to increase response rates. Only those studies related to the second area of investigation will be considered in this review.

Variables which may contribute to increased response rates and which have received substantial research attention, can be subdivided into six categories:

a. contents of cover letter

b. token compensation

c. subject interest in topic area

d. follow-up letters

e. personalization of letters

f. type of postage

Cover Letter Appeal

Other than the subject matter and length of the questionnaire, the most important variable relevant to high response rates to mailed surveys is the contents of the cover letter (Erdos, 1970). Its purpose is to convince the reader to complete and return the questionnaire. There have been several research studies which have used various approaches in the cover letter as independent variables (Champion & Sear, 1969; Frazier & Bird, 1958; Linsky, 1965; Slocum, Empry & Swanson, 1956; Watson, 1965).

Generally, cover letters which are very respondent-centered have better chances for high return rates. As a research variable, the emphasis of the importance of the respondent to the specific study (or to research in that field) produced a significantly greater return rate than did the approach which appeals to the altruistic tendencies of subjects (Champion & Sear, 1969; Linsky, 1965). Erdos (1970) stressed over twenty considerations which good cover letters should include, and recommended the respondent-centered approach over others.

Earlier, Goode and Hatt (1952) recommended the more altruistic approach which attempts to influence the subjects to respond to the researcher's pleas for help. Similarly, Frazier and Bird (1958) used a postscript that was altruistic in nature as their only independent variable, and their results showed it to be more effective than no postscript in increasing the percentage of returns.

In a study closely paralleling the current investigation, Linsky (1965) noted the effects of the cover letter content on response rates. The four variables used in his 2 x 2 x 2 x 2 experimental design were personalization, social utility, respondents' importance, and a plea to help the researchers. (Personalization and token compensation appeal will be considered in later sections of this review.) The results of Linsky's study showed significantly higher return rates for those groups in which the respondents' importance was the experimental variable than for those groups which received other cover letter treatments.

Similar results were reported by Slocum (1956) who described four studies performed at the Department of Rural Sociology at the State College of Washington. By emphasizing the role of each respondent in the studies,

the researchers were able to increase the response rates significantly. Slocum concluded by indicating that efforts to establish an image of a special role for each respondent will maximize response rates to mailed surveys.

In the present study, one of the three independent variables was the appeals or content of the cover letter. One of the experimental treatments within the appeals variable attempted to establish an important image for each individual as a respondent.

Token Compensation

Whether it is labeled monetary inducements or economic incentives, the notion of token compensation has had the greatest impact on the study of mailed questionnaire returns. Some researchers have devalued the use of these monetary inducements, while others have raised some ethical questions. Nevertheless, several studies have shown that the inclusion of such incentives with a questionnaire or cover letter can increase response rates by as much as 40 or 50 percent (Bevis, 1948; Erdos, 1970; Franbel, 1960; Kimbal, 1961; Robinson & Agism, 1951). Huck and Gleason (1974) combined monetary inducements with follow-up letters to non-responders. A return rate of 80% - 90% was achieved using three mail-outs for groups which either received a 25 cent piece with the original letter, or with a follow-up letter.

Money has most often been included as the incentive. However, postage stamps and war year gas stamps have also been used (Bevis, 1948; Kephart & Bressler, 1958). In general, money has been found to be the most effective and least biasing incentive, being the most useful to all subjects. If the researcher was to send foreign postage stamps or collector's stamps as incentive, his sample may be biased towards stamp collectors. The use of

money incentives eliminates, to an extent, this type of bias in which an appeal is made only to persons with particular interest or motivations.

Using money as an incentive is not to be considered payment or reward, rather it is an attention getter or a token of appreciation. In the present economic market, the worth of a 25 cent piece is much less than 25 years ago, yet current studies show that its inclusion in a questionnaire may contribute to higher response rates (Watson, 1965; Wotruba, 1966). In Wotruba's study, one experimental group was sent a questionnaire with a 25 cent piece included, a second group was sent a promise to receive a 50 cent piece (if they returned the completed questionnaire), and a third group received no incentive. There was a significant difference in the response rates between the first and second group with the response to that group receiving the 25 cent piece being greater, while there was no difference between the second and third groups. Prior to this research, Bevis (1948) found no significant difference in response rates between the two groups receiving monetary inducement of 25 and 50 cent pieces. However, the response rate for a third group which received a 10 cent piece were significantly lower than for the other two groups. Thus, it may be that up to a point it is the attraction of the coin and the psychological impact it makes rather than the monetary value which is of importance.

Although the results of most studies have indicated that the 25 cent piece is most effective in increasing response rates, Kimbal (1961) reached different conclusions While not studying the level of monetary inducements, Kimbal did include a ten cent piece with some groups while other groups received none. The results of his study showed a larger response rate for the group which received the 10 cent piece than for the groups which received no token compensation.

Certainly the results of these investigations do not totally agree. Yet, most studies found that token compensation makes a substantial impact on the subjects, whether the comparison groups received more money, less money, or no monetary inducements at all. For reasons unclear to researchers, a monetary inducement of 25 cents included with a questionnaire or cover letter will substantially increase the response rate to mailed questionnaires. The implications for the current study are clear; the 25 cent piece is token compensation for the subjects' time, interest and efforts, and, in addition, it is a tangible representation of the researchers' appreciation.

Interest of Subject in the Topic Area

An important variable that has been researched much more infrequently than token compensation is that of the interest of the subject matter covered in the questionnaire to the potential respondent. Following a mailed survey, Alutto (1969) interviewed the non-respondents and found that one very common explanation for their lack of cooperation in returning the questionnaire was their general disinterest with the topic area being researched. Alutto concluded that the selection of the sample and the destination of the data collection package has a positive effect on increasing the percentage of responses. More specifically, if a researcher makes contact with a subject at his place of work and the subject matter of the questionnaire is related to that work, then the chances are increased that the subject will respond to and return the questionnaire.

While this variable has not received a great deal of attention in mailed questionnaire research, a number of researchers have found that subject interest in the questionnaire topic has a substantial effect on the

percentage of responses (Donald, 1960; Terness, 1951; Rocker, 1963; Tallent, 1959). Generally, it was found that a higher percentage of return was associated with subjects who were professional persons actively involved in the topic area covered by the questionnaire. Tallent (1959) received 90% return from over 1,500 Ss with an initial letter and two follow-ups. In noting this unusually high return rate, he concluded that it was because the subjects were all professionals (psychiatrists, psychologists and social workers within the Veterans Administration), and that the subject matter was one of real concern to them.

Thus, it seems clear that the researchers' awareness regarding the extent to which his Ss are interested or concerned with the topic area of the questionnaire will have positive effects on the response rates. In the current investigation, the sample chosen and the research issues explained in the cover letter reflected this awareness.

Follow-up Mailings

There are two general purposes for using follow-up mailings in survey research which uses the mailed questionnaire. First, follow-up letters may reduce the number of non-respondents and make the results of the study more representative of the population being studied. The second purpose for follow-up letters, noted by Erdos (1970), is to establish a curve of the responses to key demographic questions which return with each successive mailing. Thus, the researcher may reach some conclusions regarding the differences between respondents to the initial mailing and respondents to second or third mailings.

The use of follow-up mailings has been found to be of significant value in maximizing response rates (Donald, 1960; Eckland, 1965; Hochstim, 1970;

Huck & Gleason, 1974: Robinson & Agism, 1951; Tallent, 1959). There are several forms that follow-up mailings can take. For example, the mailing may be a postcard reminder, a telephone contact, a follow-up letter only or a follow-up letter with an additional copy of the questionnaire enclosed. Recently, Etzel and Walker (1974) found that a follow-up letter without a duplicate questionnaire produced a greater return rate than with a duplicate questionnaire. Each researcher must make the decision regarding what follow-up technique to use based on the financial limitation of that particular study and his expectations of the additional S responses which may result.

In a study of the 2,000 members of the League of Women Voters, Donald (1960) used a three-step follow-up progression with positive results. The first two steps of the follow-up were letters to those who had not yet responded, while the third step was telephone contact. The results revealed that after receiving 46.2% of the sample in response to the initial mailing, the researchers found an increase of 12.2, 8.8 and 10.1% respectively with the three follow-up steps for a total of 77.3% return rate.

Similar results were found in studies by Eckland (1965) and Hochstim (1970), who used a two-step follow-up approach. First a telegram was sent to those non-respondents of the initial mailing, and then a home visit was made to those still in the non-respondent category. The researchers also compared respondents and non-respondents and found no significant differences over several demographic variables.

The present research used much of the information outlined in the previous discussion of the literature. First, the specific follow-up technique used was decided upon following careful consideration of the other independent variables being studied and realistic financial limitations. Secondly, the

time period allowed for each return was compared to those of previous works, and postal handling time was considered.

Personalization

Personalizing a written communication has long been considered an important step in creating or continuing warm, cooperative relationships whether they be inter-office memos or cover letters in mailed surveys. Thus, researchers who used mailed questionnaire techniques often made the assumption that using some form of a personalization would increase response rates. Previous to the mid-60's, this assumption was not based on empirical research. However, within the last decade it has generally been found that the use of personalization techniques has no significant bearing on the percentage of returns (Andreasen, 1970· Kewash & Aleamoni, 1971: Simon, 1967). Conversely, Linsky's (1965) results were that personalization techniques resulted in more responses on two out of three groups. He found a significant difference in response rates between those who receive the personalized cover letter and those receiving a mimeographed copy. Further analysis revealed that, when combined with other variables such as importance of the respondent and appeals for help, the response rates were even greater. However, these differences were not great enough to discount the contribution of chance factors. In an explanation of these findings, Andreason (1970) suggested that persons who did not respond to the personalized letter may do so because of the threat to their anonymity. He concluded by noting that the costs of personalization in time and money are usually not justified by their benefits in terms of increased response rates.

Kewash and Aleamoni (1971) obtained similar results when they attempted to induce faculty members of various universities to respond to a mailed questionnaire. They found that the use of personal signature on the cover

letter had no return rate advantage over a mimeographed copy and concluded that such personalizing procedures did not justify the additional efforts in time and expense.

The present study included several experimental variables and the use of a personalized, blue-ink signature on a mimeographed letter.

Postage

The use of various types of stamps, as well as different class mailings, have been studied for their effects on increasing response rates to mailed surveys. In one study the class of postage, as well as stamps versus business reply, were studied for main effects and interaction (Gullahorn & Gullahorn, 1963). In another, commemorative stamps were compared with standard postage to assess the possibility of increased response rates (Martin & McConnell, 1970). Recently, Veiga (1974) compared stamped envelopes, business reply envelopes and an interplant mail system for return rates. There have been numerous attempts to clarify research results using these specific variables since the economic implications may be substantial.

In studying the effects of several factors on the response rates to mail questionnaires, Gullahorn and Gullahorn (1965) used a 2 x 2 x 2 factorial design. The first of the three variables they studied was class of postage; half of the questionnaires were sent by first class mail, half by third class mail. A second variable used in this study was that of standard postage stamps versus a business permit reply envelope. The third variable was color of paper used, green or white. Using an adaptation of Chi Square tests, the results were that the use of first class postage and standard postage stamps produced greater response rates than third-class mailing, or the business permit reply envelopes. There were no

significant interactions between the three variables.

Similar results regarding the use of stamps over business reply envelopes were found by Robinson and Agism (1951), but Kernan (1971), in a similar study, found no significant increase by using first class postage. Veiga (1974) found that the questionnaire response rate was greatest when subjects could use an interplant mail system, next best with a stamped envelope and poorest using a business reply envelope.

In a study by Martin and McConnell (1970), the use of a commemorative stamp on the cover letter showed a significant increase in response rates over a standard postage stamp. These results have several implications for further study in that commemorative stamps cost no more than standard postage. Their inducement value, it might be concluded, comes from attraction or their interesting design or appearance. One important factor previously discussed is that the use of such stamps as incentive or inducement may increase the chance for bias. Possibly, the philatelic subject may be positively influenced to return the questionnaire.

Because previous studies have shown the commemorative stamp to be an effective agent in increasing response rates and because the possibility of a unique response bias seemed remote, the commemorative stamp was included with the cover letter in the current research. First class mailings were also used since the weight of research evidence supported this procedure.

Summary

While revealing the existence of two major areas of research, the available literature on mailed questionnaire surveys is often contradictory. There was much research agreement supporting the inclusion of some monetary

inducement (token compensation) with mailed questionnaires. However, concerning other variables which might affect response rates, each researcher is cautioned to review the available literature and to assess the quality of the research. In addition, it should be noted that few of the studies reviewed here came from social science journals; the preponderance were found in the marketing and advertising journals.

Although it was a difficult task to decide which research variables would most probably result in increased response rates to mailed questionnaires, the literature review seemed to point to a "best" combination of variables, and they were chosen for the present study.

CHAPTER III

METHODOLOGY

This section provides: 1) a description of the sample, 2) a description of the data gathering procedures, 3) the operational definitions, 4) a description of the research design, and 5) the statistical procedures used in the data analysis.

Sample

A total of 1,320 subjects were used for this investigation. These Ss comprised a sample that was abstracted from a total population of approximately 1,900 members of the American Rehabilitation Counseling Association (ARCA) on October 1, 1973. ARCA is a professional counseling association and is a division of the American Personnel and Guidance Association. This population was chosen since a large number of Ss were needed for the current study, ARCA represents a group of professionals, and their names and addresses were available.

Of the original population (1900) approximately 580 potential Ss were omitted. First, there were too few ARCA members with Ph.D., Dr. or university addresses, and their inclusion as Ss would jeopardize sample homogeneity. Secondly, those members who are friends and acquaintances of the researchers were omitted on the assumption that their responses might be biased. Lastly, only persons with continental United Stat addresses were considered; individuals with foreign or APO mailing addresses were excluded from the sample.

The continental United States was then divided into sixteen geographic areas using zip codes as a guide, and subject groups of approximately equal

size were selected. This procedure was used so that no two Ss from the same city or agency might receive different experimental treatments.

Fourteen of the sixteen groups were each randomly assigned one of the experimental treatments (variable combinations). For two groups of subjects living in highly populated metropolitan areas the assignment of experimental treatment was not random. The two groups were assigned similar experimental treatments to control potential extraneous systematic variance (Kerlinger, 1973) associated with the social interactions of counselor colleagues who received dissimilar treatment appeals from the current investigators. The randomization procedures were designed to provide a random distribution of those uncontrolled variables that may differentiate respondents and non-respondents.

Table 1 outlines the combination of experimental variables for each of the sixteen groups and indicates the number of subjects in each group.

Data Collection Procedures

The subjects were mailed a data collection package consisting of a cover letter and stamped self-addressed postcard, and a total of 10 weeks was allowed for the return of the postcard. At the end of the first three week period, a follow-up letter was sent to those whose response had not yet been received. Following another three-week period, a second follow-up letter was sent to those Ss who had not responded to either the initial letter or the first follow-up letter. Four weeks after the second follow-up letter was mailed, data collection was concluded. Postcards received after that date were not included in the study.

It should be noted that from the inception of this research there was no intention of actually sending a mailed questionnaire to subjects. The

TABLE 1

Experimental Treatments and Number of Subjects for Each Group

Original Group No.	Sample Size	Experimental Variables
1	81	Professionalism, threat, letterhead
7	84	Professionalism, threat, no letterhead
16	79	Professionalism, no threat, letterhead
12	82	Professionalism, no threat, no letterhead
5	80	Humor, threat, letterhead
10	79	Humor, threat, no letterhead
8	78	Humor, no threat, letterhead
2	81	Humor, no threat, no letterhead
3	82	Importance of Respondent, threat, letterhead
11	79	Importance of Respondent, threat, no letterhead
4	80	Importance of Respondent, no threat, letterhead
15	82	Importance of Respondent, no threat, no letterhead
6	79	Token Compensation, threat, letterhead
13	81	Token Compensation, threat, no letterhead
14	79	Token Compensation, no threat, letterhead
9	79	Token Compensation, no threat, no letterhead

rationale for this plan was: 1) the type of questionnaire Ss received (and returned or discarded) was itself a variable which could confound the research results, 2) it could be argued that agreement to participate in a study and to answer a questionnaire was, in essence, similar to actually performing the tasks, 3) additional postage expense would be incurred by mailing questionnaires to and from subjects, and 4) a relevant questionnaire for the particular research population was not readily available since the primary interest of the current investigators, for this study, was the return rate problem not vocational development and/or job satisfaction.

Cover Letter

The initial paragraph of the cover letter explained that the intent of the study was to investigate the relationship of several vocational development and job satisfaction variables. This paragraph was used for all sixteen experimental groups. In addition, it provided a brief statement about the questionnaire they would receive should they agree to participate in the study.

The second paragraph contained one of the four Appeals variables: Professionalism, Humor, Importance of Respondent, and Token Compensation. Although they were different in content, the paragraphs all consisted of four sentences, approximately the same length.

The third paragraph again explained the purpose of the letter and the purpose of the enclosed postcard. In this paragraph the only variation was that for 8 of the 16 treatment groups one sentence was extended to include a threat of a follow-up letter.

All of the cover letters were personalized with a handwritten signature in blue ink. Eight of the sixteen cover letters were mimeographed on blank

stationery with no letterhead or identifying labels. The other eight cover letters were on stationery that had research project letterhead and Syracuse University identification.

For those Ss receiving the Token Compensation (TC) appeal, there was one addition to their initial package. A shined 25 cent piece taped to a 3 x 5 card was enclosed.

The initial cover letters, postcard and follow-up letters were mailed in either blank or letterhead envelopes, matching the stationery of the cover letter. The blank envelopes did, however, have a return address stamped in the corner. The postage used on these initial letters was a commemorative stamp rather than the ordinary eight ¢ stamp. For the envelopes used in the follow-up letter, regular 8 ¢ stamps were used. The envelopes matched the letterhead of the enclosed follow-up letter.

Postcard

Enclosed with each cover letter was a stamped pre-addressed postcard. In the third paragraph of the cover letter, the Ss were asked to respond to the questions on the card. The first question requested that they check whether or not they were willing to participate in the study. Additional questions requested: name and address, age, sex, educational level, field of advanced education, years of counseling experience, years employed in current position, type of agency of employment, professional affiliations, and desire to receive a copy of the results. For this study, only those Ss who responded affirmatively on the question concerning willingness to participate were identified as "respondents."

Operational Definitions

The following are those terms used in this study that need an operational definition. These definitions are identical to the second paragraphs used in the different cover letters:

Appeal to Professionalism:

> As a counselor and a professional, it should be your responsibility to participate in research as well as to provide direct service to clients. Through involvement in research you can help expand the knowledge and skills of those in the counseling field and, thereby, broaden and improve services available to clients. Since it is the obligation of every professional to help in this knowledge expansion process, we hope you will participate in this research.

Appeal to Humor:

> Having read this far no doubt you are a patient person (also wise, friendly and good looking). We know that answering questionnaires can be a pain -- but ours will be reee-ally interesting -- maybe -- even enjoyable? So we'll stop pleading and just say: H -- E -- L -- P --! But seriously --

Appeal to Importance of Respondent:

> Your involvement is essential to this research since you are one of a carefully selected random sample of counselors. Every response is needed to complete the sample. Your cooperation is vitally needed for the successful completion of this research.

Appeal to Token Compensation:

> We know from personal experience that a request such as ours, if not handled shortly after it is received, tends to get put off. We also know that such a request takes your valuable time and effort. Enclosed you will find a twenty-five cent piece as token compensation for this time and effort.

No Threat of Follow-up Letter:

> There are also a few demographic questions which you are asked to complete. Please take just a few moments now to complete the card and return it at your earliest convenience.

Threat of Follow-up Letter:

> There are also a few demographic questions which you are asked to complete. If you will just take a few moments now to complete the card and return it at your earliest convenience, it will not be necessary to trouble you with a follow-up letter.

Research Design and Statistical Procedures

In order to study the independent and interactive effects of the three independent variables (appeal, threat of follow-up, letterhead) on the dependent variables (response of S: return - no return of card; willing - not willing to participate), a 4 x 2 x 2 factorial design was used (Kerlinger, 1973). To elaborate, tests of the main effects of the independent variables are important to compare the four Appeal treatments in terms of S response, to assess the impact of a follow-up letter threat and to ascertain whether the use of research letterhead affects Ss differentially.

Prior to those main effects tests (and to subsequent planned comparisons of paired contrasts, where appropriate), tests of the significance of the interaction between the three treatments were performed. Briefly, the interaction tests provide information concerning the effect of combinations of treatment variables on subject responses. For example, the combination of TC and Threat might result in a greater "willingness to participate" response by Ss than Token Compensation alone, or TC and research letterhead.

Thus, the data was initially analyzed to discover the presence of an interaction effect between the three experimental variables and, subsequently, main effects tests were run. Since the data was categorical in nature (participate - not participate; return card - no return), the usual parametric analysis of variance was not possible. A procedure described by Grizzle, Starmer and Koch (1969) to analyze categorical data using a linear model,

for testing the goodness-of-fit of the model, was used.

The independent variables in this 4 x 2 x 2 design were as follows:

A. Appeal to the Potential Respondent

- A_1 Professionalism
- A_2 Humor
- A_3 Importance of Respondent
- A_4 Token Compensation

B. Follow-up

- B_1 Threat of Follow-up Letter, plus two follow-up letters
- B_2 No Threat of Follow-up Letter, plus two follow-up letters

C. Stationery

- C_1 Research-University Letterhead
- C_2 Blank, No Letterhead

Following the non-parametric analysis of variance procedures for data analysis, descriptive statistical procedures were also used. The initial procedure was to tally the frequency of rate of postcard return and "willingness to participate" and to compute relevant percentages for each of the 16 groups. Only those Ss who responded affirmatively to the question of "willingness to participate" were designated as respondents (to a hypothetical questionnaire). The percentages were then subdivided into several categories: 1) response to original letter, 2) response to first follow-up letter, 3) response to second follow-up letter, and 4) total response. From these data comparisons were made between groups.

Data analyses were also performed: a) to compare the demographic characteristics of persons who were willing to participate in the study (respond to a questionnaire) and persons who were not willing to participate (but who

provided demographic data on the return postcard), b) to study the demographic characteristics of Ss (using the ten questions/answers on the postcards), and c) to answer the research questions enumerated in Chapter I of this research report.

CHAPTER IV

RESULTS AND DISCUSSION

Before detailing the results and discussing them it is important to note that two parallel analyses will be considered. First, there is interest in the impact of the treatments on the return rate of postal cards -- without regard to whether subject indicated willingness to participate. The fact that an "unwilling" subject returned a completed postcard (providing personal and professional information) and, often, asked that the research results be sent may point to circumstances mitigating against involvement in this research only. For example, many persons who indicated unwillingness to participate in this research dealing with job satisfaction noted that they were currently unemployed (being retired, in school or between jobs). Such persons were, more likely, unable rather than unwilling to participate. Thus, we are interested in the postcard return rate - by itself - as related to treatment groups.

Secondly, the extent to which subjects express a "willingness to participate' in the research, as related to particular combinations of experimental variables, is of prime importance. Such willingness is interpreted as equivalent to the actual completion and return of a mailed questionnaire. Thus, it seemed important to discover those combinations of Appeals-Follow-up-Threat-Letterhead which resulted in large "willing to participate" responses. Besides such combinations, we are also interested in the influence of each experimental variable, by itself, on the subjects' "willingness' responses.

Interactions

As was implied in the previous chapter, if the interaction between two

or more experimental variables is significant such information may point to combinations of variables (rather than a single type of appeal, for example) which may result in greater return rates, or in greater willingness to complete a questionnaire.

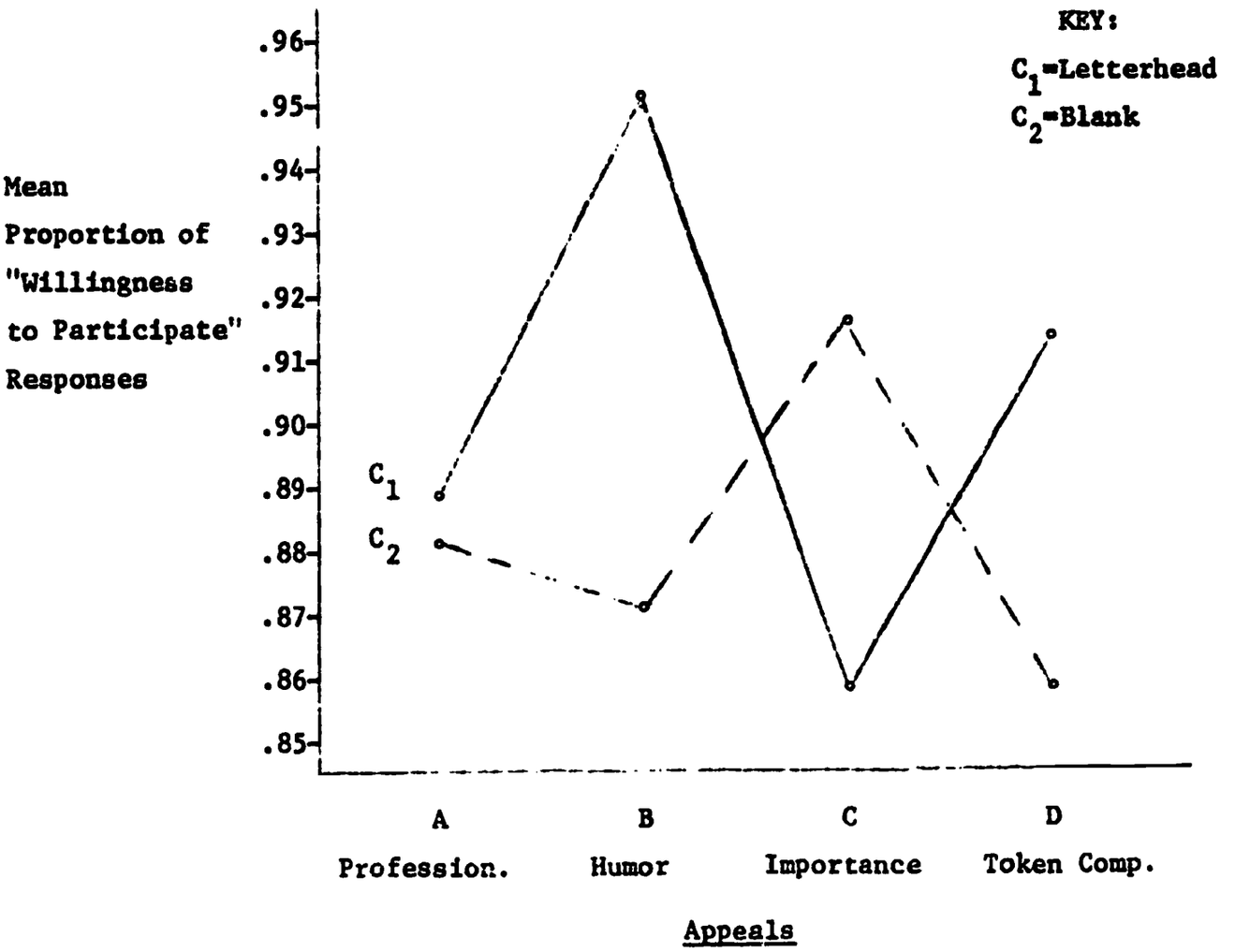
An analysis of variance procedure to discover significant interactions between the three dependent variables concerning subjects' willingness to participate produced negative results, with one modest exception. The calculated X^2 value for the Appeals-Letterhead interaction was 7.45; the tabled X^2 value, at the .05 level, is 7.82. Thus, although the AC interaction was not significant at the .05 level, it approached this level and, as such, merits some commentary.

Figure 1 provides a comparison of subjects who received letterhead stationery and those who received blank stationery, over the four Appeal treatments, in terms of their stated willingness to participate in the research. As can be seen, for all Appeal conditions - except Importance of the Respondent, a greater proportion of subjects who received letterhead stationery indicated a willingness to participate as compared to those who received blank stationery. There also are substantial differences between the letterhead-no letterhead groups for each Appeal treatment, except for the Appeal to Professionalism. Lastly, for subjects who received the "Importance" Appeal, more persons who were sent letters on blank stationery responded positively than those who received letterhead stationery. Perhaps the argument that "your involvement is essential to this research" makes a substantial impact on the subject if the letter sender is perceived as a student or a practicing counselor (who uses no-letterhead stationery), than if the sender is important enough to use fancy stationery.

Other tests of interactions between the three experimental variables in terms of overall postcard return rates, and regarding "willingness to participate" responses were not statistically significant. Similarly, analyses to investigate differences in return rates after the original letter, the first follow-up letter, and the second follow-up letter revealed no significant interactions.

Figure 1

Interaction of Appeal Treatments and Type of Letterhead Stationery



Return Rates of Post Cards

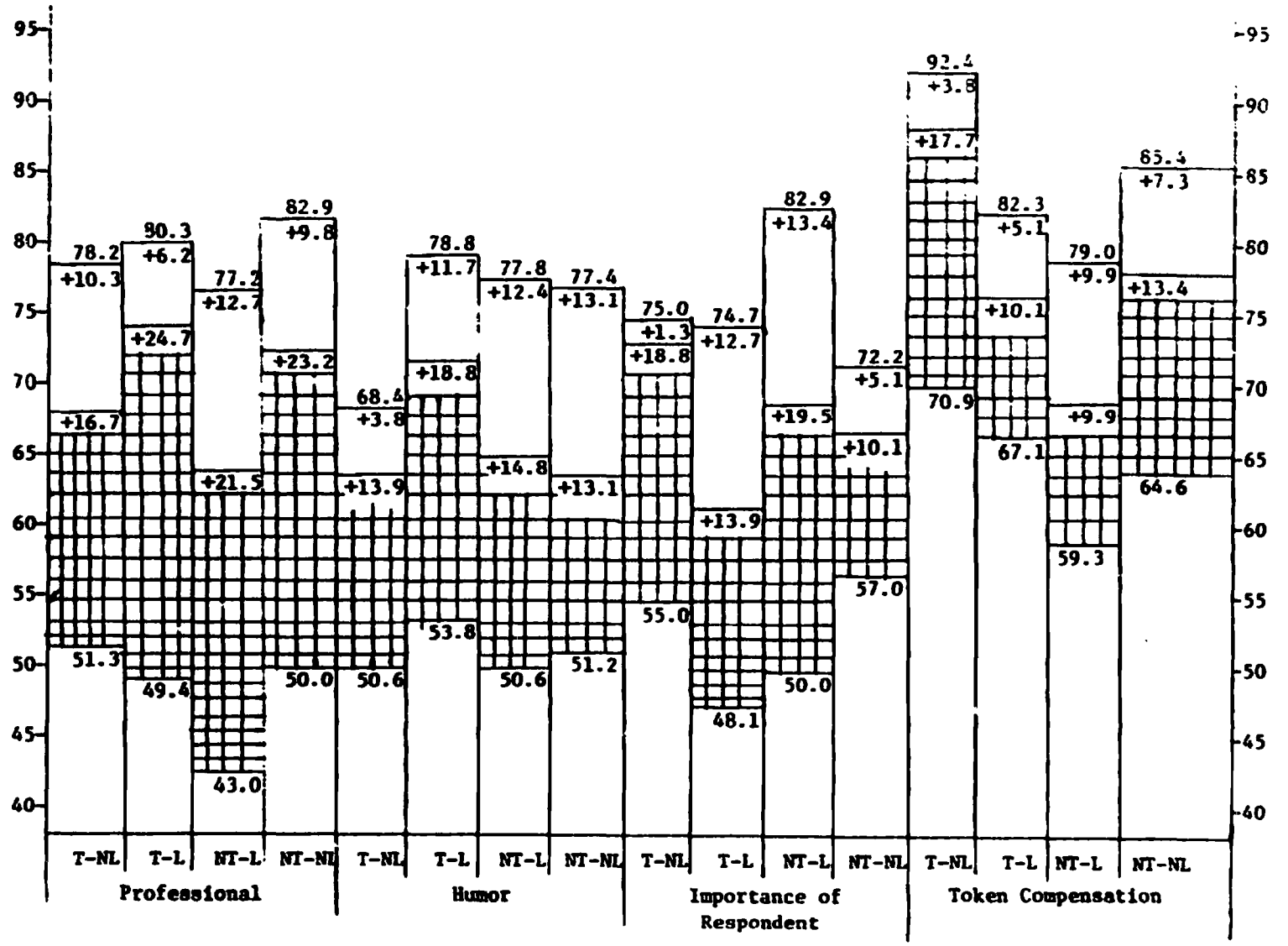
A 4 x 2 x 2 analysis of variance (Appeals-by- Followup Threat-by-Letterhead) to compare the return rate of postcards, without regard to a subject's "willingness" response, was performed to determine whether any of the three experimental conditions had a differential effect on the Ss. It has already been noted that no significant interactions between the three dependent variables were found.

One result of the analysis was a X^2 of 14.98, significant at or beyond the .05 level, for the main effect - Appeals. This result indicates that a statistically significant difference exists between the Appeal treatments over (i.e., without regard to) the letterhead treatments, and the threat of followup treatments. Further analyses to contrast the four Appeals with each other revealed but one significant result. The Token Compensation appeal used with the sample of professional counselors produced a greater return rate (of postcards) than did the "Importance" appeal ($\chi^2 = 8.63$). This result is more clearly presented in Figure 2 which shows the total return rates for each of the 16 experimental groups. Parenthetically, the overall return rate for Token Compensation groups was 84.8%; for "Importance" group - 76.2%. Table 2 provides this information and also indicates that the overall return rates for the Professionalism, and Humor appeals were 79.6% and 76.9%, respectively.

Another analysis of variance was performed on the return-no return data (without regard to "willingness" responses) to compare differences between experimental groups in terms of their return rates following a) the original letter, b) the first follow-up letter, and c) the second follow-up letter. The results were that: 1) no significant interactions were

Figure 2

Comparison of Return Rates of Experimental Groups
After Original Letter, First, and Second Follow-up Letters



Appeals

KEY:
T-Threat of Follow-up
NT-No Threat
L-Letterhead
NL-No Letterhead

Bar Graph KEY:
Original letter, bottom bar
First Follow-up, cross-hatch bar
Second Follow-up, top bar

Table 2

Return Rate Percentage Attributed to the Original Letter and to Followup Letters as Related to Appeals

	Appeal Variable			
	Professional	Humor	Importance	Token Compensation
Original Letter	48.43	51.55	52.52	65.47
First Follow-up	21.50	15.15	15.58	12.79
Subtotal	69.93	66.70	68.10	78.26
Second Follow-up	9.71	10.24	8.10	6.52
Total Return Rate	79.64%	76.94%	76.20%	84.78%

Table 3

Analysis of Variance of the Return Rate Following the Original, First, and Second Followup Letter for All Groups

Source of Variation	Sum of Squares	Degrees of Freedom
A: Appeals	13.114*	3
B: Threat of Followup Letter	4.956*	1
C: Type of Letterhead	3.732	1
AxB Interaction	1.341	3
B:C Interaction	.200	1
A:C Interaction	.680	3

* Significant at or beyond the .05 level. $X^2_{.05(3)} = 7.82$; $X^2_{.05(1)} = 3.84$

discovered, 2) significant ($p < .05$) main effects for Appeals, and Threat of Followup letter were found, and 3) the main effect for Letterhead-type approached significance at the .05 level (see Table 3).

Since the Appeals main effect was significant, all paired comparisons between levels were tested and the mean return rate for each appeal, for each letter, was calculated (Table 2). The result was that although the Token Compensation appeal produced more returns than the Professionalism appeal after the original letter (65.5% vs. 48.4%), the reverse was true for each of the two followup letters. For followup letter #1, the return rate for the Professionalism appeals was 21.5%; for the TC appeal - 12.8%. For the second followup letter, the Professionalism return rate was 9.7% and the TC return rate was 6.5%. Nevertheless, the overall difference in return rates favored the Token Compensation appeal; TC - 84.8%, Professionalism - 79.6%.

These results seem to indicate that the use of monetary inducement has a very great initial impact but little lasting effect. They suggest that the researcher planning a mailed questionnaire should consider using a TC appeal in his original letter but, in subsequent followup letters switch to the Professionalism appeal. The use of several different types of appeals - for example, original letter-Token Compensation, first followup letter-Professionalism, second followup letter-Humor, may be warranted if the researcher can afford the time and money to test such a procedure. This plan also merits further research investigation.

As was previously noted, analysis of the return rate of postcards after each of the three letters received by the subjects showed a significant main effect (Table 3) for the variable - Threat of Followup letter. To further

analyze this result, Table 4 shows the mean percentage return rate following each letter sent to subjects for the Threat and No-Threat experimental conditions (over the Appeal and Letterhead variables). These results indicate that, except for a possible influence with the second followup letter, threatening a subject with a followup letter had little impact on the overall return rate of postcards. In fact, the "no threat" subject groups returned substantially more postcards (10.4% vs. 6.8%), after the second followup letter, than did the "threat" groups.

Table 4

Return Rate Following the Original, First, and Second Followup Letters as a Function of the Threat-No Threat of Followup Letter Variable

	Threat	No-Threat
Original Letter	55.77*	53.21
First Follow-up	16.82	15.69
Second Follow-up	6.84	10.44
Total Return Rate	78.74%	79.35%

* Each number is a mean percentage, and reflects eight experimental groups

This result may be explained (very tentatively) by focusing on the method used to construct the two followup letters. The first followup letter: a) started with "this is a followup letter", b) stressed the importance of the subject's response, c) repeated the purpose (disguised)

of the research, and d) promised that results of the study would be sent to those who returned the postcard and checked a certain box. The second followup letter was identical to the first (with or without letterhead) except a short paragraph, as follows, was dittoed onto the letter at the top right side:

> PLEASE, PLEASE - Won't you respond to our request? Please read this letter carefully and RETURN the enclosed postcard. SOON!!
>
> MUCHOS GRACIAS.

Perhaps a certain empathic-humorous feeling was generated by the second followup letter from among those subjects who had not been initially threatened with a barrage of such letters. Whatever the reason for the noted differences, it would be interesting to interview recipients of several followup letters to assess their attitudes about such letters and about the impact of a particular appeal approach.

Response Rates - Willingness to Participate

The major finding, concerning the use of various appeals and the impact of followup letter threat and stationery letterhead, is that there were no statistically significant differences between the sixteen experimental groups in terms of willingness to participate in the stated research project. Table 5 provides detail concerning the "willingness" return rate for each group. It also indicates the percentage of "willing" returns, as related to the total number of returned postcards, and as compared to the total sample for each group. One overall result is that a large percentage (89.3%) of Ss who returned the postcard were willing to participate in the research. The extent to which such "willingness" is a commitment to participate will

soon be assessed by studying the return rate results of a separate mailed questionnaire study in which approximately 300 "willing" subjects were recently sent two inventories to complete (Zbik, in progress)[1].

Figure 3 illustrates the "willingness to participate" return rate by providing information concerning the effect of the original cover letter, the first followup letter, and the second followup letter. The experimental groups are also placed together so that a visual comparison can be made between the four types of appeals. Figure 3 shows that the Token Compensation appeal produced the largest, initial "willing" response by subjects. Thereafter, the Professional appeal groups had the largest responses from the first and second followup letters.

Table 6 provides the reader with an overall impression of the "willing" response rates, for each appeal, after each of the three letters sent to subjects. The results in this table would support the suggestion, made previously, that an experimenter with enough financial resources should consider using a combination of different appeals over two or three letters. For the experimenter who could not sent a monetary reward, the results in Table 6 suggest a Humor, then Professional combination, or an Importance, then Professional combination.

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[1]Zbik, A. A comparison of the counseling orientation and vocational personality of rehabilitation counselors. Research in progress, Syracuse University Rehabilitation Counselor Education Program, 1974.

TABLE 5

Comparison of Experimental Groups on "Willing to Participate" Response Rate

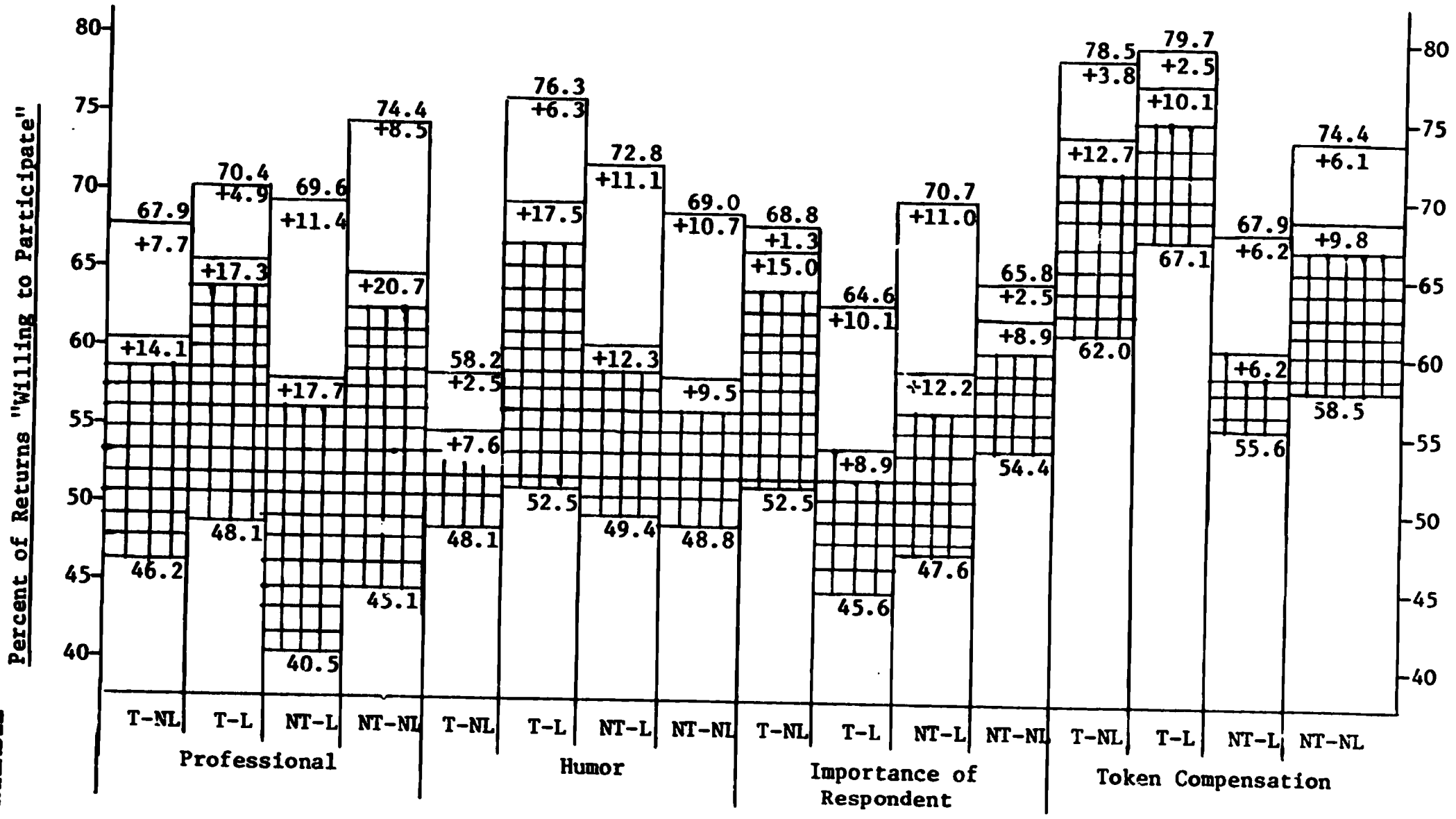
Response of Subject: Willingness to Participate in the Research	Type of Stationery Used															
	C_1: Letterhead - Research, Univ.								C_2: No Letterhead - Blank							
	B_1: Followup Threat				B_2: No Followup Threat				B_1: Followup Threat				B_2: No Followup Threat			
	Appeals				Appeals				Appeals				Appeals			
	A	B	C	D	A	B	C	D	A	B	C	D	A	B	C	D
Willing to Participate: N	57	61	51	63	55	59	58	55	53	46	55	62	61	58	52	61
Not Willing: N	8	2	8	2	6	4	10	9	8	8	5	11	7	7	5	9
N Returned	65	63	59	65	61	63	68	64	61	54	60	73	68	65	57	70
Percent Returned,	87.7		86.4		90.2		85.3		86.9		91.7		89.7		91.2	
Willing to Participate		96.8		96.9		93.7		85.9		85.2		84.9		89.2		87.1
Total Sub-Sample N	81	80	79	79	79	81	82	81	78	79	80	79	82	84	79	82
Percent of Total N,	70.4		64.6		69.6		70.7		67.9		68.8		74.4		65.8	
Willing to Participate		76.3		79.7		72.8		67.9		58.2		78.5		69.0		74.4

Key: Appeals - A. Professionalism
B. Humor
C. Importance of Respondent
D. Token Compensation

Figure 3

Comparison of Experimental Groups on "Willing to Participate" Response Rate

After Original Letter, First, and Second Follow-up Letters



KEY:
T-Threat of Followup
NT-No Threat
L-Letterhead
NL-No Letterhead

Bar Graph KEY:
Original Letter, bottom bar
First Followup, cross-hatch bar
Second Followup, top bar

Table 6

Percentage of "Willing to Participate" Response Rate Attributed to the Original Letter and to Followup Letters, over the Appeals

	Appeal Variable			
	Professional	Humor	Importance	Token Comp.
Original Letter	44.98	49.70	50.02	60.80
First Followup	17.45 (31.77)*	11.73 (23.62)	11.25 (22.64)	9.70 (25.38)
Subtotal	63.43	61.43	61.27	70.50
Second Followup	8.13 (21.48)	7.65 (20.32)	6.30 (15.31)	4.65 (14.20)
Total Willingness Return Rate	70.56%	69.08%	67.57%	75.15%

* Numbers in parentheses indicate the "willingness" response rate as a percentage of subjects who had not yet responded to letters.

Another plan which permits a combination of appeal strategies was proposed, in part, by Huck and Gleason (1974). These researchers suggested that a monetary incentive should not be used with the original letter, but should be sent to nonrespondents. This procedure "saves about 50% of the cost of the financial incentive but does not significantly decrease the response rate." Thus, the researcher using mailed questionnaires might use a plan as follows: Original letter-Humor appeal (estimated return rate - 50%), first followup letter - Token Compensation appeal (estimated return rate - 25%), and second followup letter - Importance appeal.

An alternative strategy which bridges the TC and Humor appeals is to use play money dollar bills with the original cover letter. It is conceivable, though untested at this time, that a "counterfeit" dollar bill may induce a cooperative reaction from subjects (if presented in a combined serious-humorous manner) similar to their response to the Token Compensation appeal in the current research (61% return - overall). Similarly, perhaps other two-appeal combinations might be used in the original cover letter (or followup letters) with more positive results than can be obtained with single appeal letters.

Returning to analysis of variance results, a significant difference between "willingness" response rates of subjects receiving letterhead and no-letterhead stationery, for the original letter, was found. Persons who received our original letter on project-university stationery were more likely to check the "willing to participate" box on the return postcard than individuals who were sent the same letter on blank stationery. In several instances, subjects who had received no-letterhead stationery indicated a current unwillingness to participate because they could not identify the researcher with a reputable institution or agency. Often such persons expressed a desire for more information about the researchers and offered to participate should such information be supplied.

Although we would recommend the use of letterhead stationery to researchers using mailed questionnaires, Table 7 furnishes information which indicates that a substantial increment in return rates cannot be expected. Of course, this table does not separate the effect of the other two dependent variables - appeals and followup threat - on "willingness" response rates. In fact, a separate analysis of the effect of two followup letters on the "willingness" response rate produced results indicating that

a significant interaction (X^2= 9.48) exists between type of stationery letterhead and type of appeal. For example, it was discovered that the Token Compensation groups who did not receive letterhead stationery were more likely to participate than those who were sent followup letters with letterhead.

Table 7

Percentage of "Willingness to Participate" Responses as Related to Type of Letterhead Stationery

	Letterhead	No Letterhead
Original Letter	50.79%	51.96%
First Followup	12.78%	12.28%
Second Followup	7.94%	5.39%
Total Willingness Return Rate	71.50%	69.63%

Finally, when the data was reviewed some curiosity was aroused concerning the extent to which each of the three letters, over all the groups, resulted in the subjects' willing to participate. For all the subjects who returned a postcard after the original cover letter, 94.3% expressed willingness to participate in the research. After the first and second followup letters, 76.5% and 76.4%, respectively, of those who returned the card expressed such willingness. Apparently, persons who are unwilling to participate (or to complete a questionnaire) will refuse to respond no matter how many

letters are sent or which research strategies are used. The persistent (and affluent) researcher will telephone these individuals to obtain cooperation in the research or to learn the subject's reasons for declining to participate. Telephone followup, as a last resort, has been shown to be a relatively effective approach to increasing response rates.

Demographic Characteristics of the Sample

The reader will recall that subjects were asked to respond to several professional and personal questions on the return postal card, whether or not they agreed to participate in the stated research project. Most persons who declined to participate but who returned the card, provided the data we requested. Thus, it was possible to compare the participants ("willing to participate") and the non-participants over several demographic variables. Of course, no data was available concerning those subjects who refused to acknowledge our letters, or those who declined to participate and also did not consent to provide personal or professional information.

Several preliminary analyses of the data were completed to compare participants and non-participants over: 1) age, 2) sex, 3) extent of counseling experience, and 4) desire to receive research results. The results showed that persons who were willing to participate tended to be younger than those who declined to do so (t=-1.99, significant at the .05 level, 2 tailed test). The mean age for the "willing" groups was 37.3 years (standard deviation = 11.2); for the "unwilling" group the mean age was 44.1 years (standard deviation = 13.2).

To assess sex differences between the "willing" and "unwilling" groups, a 2 x 2 contingency table was formed and the association of the frequency counts was tested using the Chi-square test. The result, X^2= 2.11, was not

significant at the .05 level, indicating that the male/female proportions for the two groups were not substantially different. A similar result of no significant difference between the "willing" and "unwilling" groups regarding the extent of their counseling experience was discovered (t=-.06). The mean number of years of counseling experience for the group willing to participate in the research was 8.7 years (S.D. = 8.2); for the non-participants the figure was 9.8 years (S.D. = 5.3). It was not unexpected that the older "unwilling" subjects would, in general, have more counseling experience, but apparently this difference was not very substantial.

Lastly, we were curious about the relationship, if any, between one's willingness to participate and one's desire to receive a summary of the research results. As was noted in Chapter Three, all persons who returned the postcard could check a box, yes or no, to request feedback concerning the research. The results were that a large majority (98.7%) of those willing to participate wished to receive the research results, and a substantial proportion (.78) of the "unwilling" group checked "no" to our question about sending such feedback. This result is statistically significant (X^2= 672.1, .05 level) and, explained in another way, it indicates that whereas only approximately 1 "willing" person in 100 declines to request the results, 78 "unwilling" persons in 100 are disinterested in such research results.

This result, we believe, reflects a certain commitment or ownership which was, apparently, experienced by persons who were willing to participate. They wished to become informed of the results, it seems, since the results would reflect their participation. It also seems credible to assume that this result supports, in part, the initial assumption related to the research that persons who are "willing" to participate (as indicated by their postcard

response) are likely to fulfill their commitment by actually completing questionnaires which are mailed to them.

Tables 8 through 13 provide some information concerning the personal and professional characteristics of the sample of professional counselors used in this research. Each table was constructed to allow the reader to compare the demographic features of each of the 16 experimental groups. Further statistical analysis of between-group differences are planned, but have not been carried out to date.

Information is provided in Table 8 which shows the geographical distribution of subjects in each experimental group. For example, examination of the table reveals that, for the most part, each group contains a mixture of persons from several states and from urban-suburban-rural areas.

Table 9 provides the mean age, male-female percentage, mean years of counseling experience, and mean years of employment in the current job for each of the 16 groups. While the overall mean age of the sample was 37.9 years, the range was 31.5-40.9 years. Also, Table 9 shows that, overall, the sample contained 62.1% male and 37.9% female counselors. The sex range, when comparing groups, was 42.5-72.9% male and 29.5-47.5% female. The group which had the highest percentage of female subjects were selected from the New York City area. (This group also tallied the highest number of years of counseling experience). Conversely, the group with the lowest percentage of female subjects were selected from the South Atlantic states. Other between-group observations concerning age differences or sex differences can be made by closely examining Table 9. Lastly, this table shows that the overall mean for years of counseling experienced was 7.9 (range = 5.3-10.3 years), and that the average number of years in one's current position was 4.2 (range = 2.8-5.9 years).

Table 8

Distribution of U.S. Geographic Areas for
Sample Assignment to Experimental Groups

Group	Geographic Areas of the United States
P-T-L	New England - Mass., R.I., Me., Conn., N.H., Vt.; Oklahoma
P-T-NL	South Atlantic - W. Va., Va., Fla., Ga., N.C., S.C., Wash.D.C.
P-NT-L	California - most
P-NT-NL	Mid-West - Minn., N.D., Mich-parts, Iowa, S.D., Wisc., New Mex.
H-T-L	New York - upstate: Pittsburgh area, Penn.-parts, Colorado
H-T-NL	Mid-West - Ohio, Ind., Mich.-parts, Penn.-parts, Utah-SLC.
H-NT-L	Virginia, Maryland, Wash.D.C.
H-NT-NL	New York - upstate, New Jersey, Las Vegas, Nev.
I-T-L	New York City - Brooklyn, Bronx
I-T-NL	Michigan - most, Utah
I-NT-L	New York-parts, Va., Missouri-parts, Calif.-parts
I-NT-NL	Texas, Colorado, Wyoming, La., Calif.-parts
TC-T-L	Penn.-parts, Philadelphia area, Del., Reno, Nev.
TC-T-NL	Illinois, Missouri - most, Arkansas
TC-NT-L	Texas, Oregon, Ariz., Idaho, Kansas, Washington
TC-NT-NL	Tenn., Ohio, Ala., Fla., Kentucky, Neb., Miss.

* Many states were split in order to reach an approximate, balanced number of subjects for each of the sixteen experimental groups.

Table 9

Demographic Characteristics of the Sample

Groups	Age		Sex (%)		Years Coun. Exp.		Yrs. in Current Job	
	Mean	Stand. Dev.	Male	Female	Mean	Stand. Dev.	Mean	Stand. Dev.
P-T-L	38.1	11.2	63.1	36.9	8.0	5.8	3.8	4.5
P-T-NL	37.9	11.2	70.5	29.5	7.9	7.0	3.5	5.2
P-NT-L	39.7	11.3	57.4	42.6	8.9	8.6	4.2	5.0
P-NT-NL	38.8	12.0	57.4	42.7	9.3	8.3	5.9	6.3
H-T-L	33.7	9.0	61.9	38.1	5.7	5.7	2.6	3.4
H-T-NL	40.5	12.8	57.4	42.6	9.2	9.1	4.7	5.0
H-NT-L	38.5	12.7	54.8	45.2	6.7	6.7	3.9	4.0
H-NT-NL	36.5	10.5	53.9	46.2	7.6	7.5	4.4	5.1
I-T-L	40.0	13.1	52.5	47.5	10.3	8.2	5.3	5.5
I-T-NL	36.4	9.0	66.7	33.3	8.0	8.0	3.7	5.4
I-NT-L	38.4	12.0	69.1	30.9	8.2	7.6	5.2	5.5
I-NT-NL	39.9	0.4	54.4	45.6	7.5	7.4	4.5	4.5
TC-T-L	31.5	8.6	67.7	32.3	5.3	5.7	2.8	3.0
TC-T-NL	37.4	10.8	60.3	39.7	8.4	6.7	4.4	5.0
TC-NT-L	38.4	10.6	70.3	29.7	7.4	5.8	3.3	2.5
TC-NT-NL	40.9	12.7	72.9	27.1	8.5	7.2	4.3	5.0
Overall Results	37.9	10.5	62.1%	37.9%	7.9	7.2	4.2	4.7

* All numbers are rounded to one decimal place.

The employment setting of counselors in the sample is shown in Table 10. Overall, 21.7% were employed by state rehabilitation agencies, 26.4% worked in private agencies or in private practice (see the footnote to Table 10), 8.9% held jobs in hospitals, 12.1% were employed in educational settings and 29.5% worked in other settings. The relatively low percentage of counselors working in state VR agencies is attributable, in part, to the membership characteristics of APGA and ARCA. Although there is some overlap in ARCA-NRCA membership, there seems to be a national trend such that state VR counselors tend to join NRCA (which is affiliated with the National Rehabilitation Association) and rehabilitation facility counselors tend to join ARCA (which is affiliated with APGA).

Table 11 provides information concerning the professional affiliation of subjects in each of the 16 groups. Overall, 77.1% belong to ARCA and 35.9% also belong to NRCA, 92.2% claim membership in APGA, 40.4% belong to NRA, and 4.6% checked the "other" box. The reader will recall that the sample was drawn from an ARCA mailing list -- which should imply that all of the Ss held membership in ARCA and APGA. This discrepancy between claimed membership and "actual" membership probably reflects a degree of counselor confusion (or forgetfulness) concerning various, often competing, associations.

Information concerning the levels of attained education and the fields of education can be found in Tables 12 and 13. Surprisingly, the large majority of the sample claimed an educational level at or greater than the Master's degree. Overall, the figures were: B.A. - 6.7%, M.A. - 32.8%, MA plus additional credits - 47.1%, and Ph.D. - 12.9%. The largest number of Ph.D. subjects were from the Washington, D.C. area and the smallest number from Upstate New York and New Jersey. These results may be due, in part, to our sampling method which called for the exclusion of doctoral-level persons

Table 10

Percentage of Sample Rehabilitation Counselors Employed in Various Settings

	State VR	Private*	Hospital	Educational	Other
P-T-L	33.3	26.7	8.3	11.7	20.0
P-T-NL	23.6	16.4	10.9	10.9	36.4
P-NT-L	32.7	25.5	10.9	9.1	20.0
P-NT-NL	31.3	26.6	10.9	14.1	15.5
H-T-L	10.9	34.5	14.5	7.3	32.8
H-T-NL	17.8	24.4	6.7	11.1	37.8
H-NT-L	24.6	14.0	7.0	12.3	40.3
H-NT-NL	17.7	23.1	9.7	14.5	21.0
I-T-L	11.0	37.0	9.3	11.1	27.8
I-T-NL	24.6	22.8	5.3	17.5	29.8
I-NT-L	20.0	30.0	6.7	11.7	28.3
I-NT-NL	30.4	21.4	7.1	7.1	32.2
TC-T-L	8.3	38.3	10.0	15.0	28.4
TC-T-NL	13.2	25.0	10.3	11.8	36.8
TC-NT-L	19.0	22.4	10.3	20.7	25.9
TC-NT-NL	27.4	19.4	4.8	6.5	41.9
Overall Mean	21.7%	26.4%	8.9%	12.1%	29.5%

* "Private" - was intended to represent private agencies, including rehabilitation centers, sheltered workshops, etc. However, it may have been interpreted as private practice and rehabilitation counselors may have checked "other" to include rehabilitation facilities.

** A very small percentage (1.4%) of rehabilitation counselors identified the State Commission for the Blind as an employment setting.

Table 11

Professional Affiliations of the Sample Rehabilitation Counselors

	ARCA	NRCA	APGA	NRA	Other
P-T-L	82.8	34.5	93.1	34.5	1.7
P-T-NL	84.2	36.8	91.2	43.9	1.8
P-NT-L	70.7	31.0	91.4	51.7	0
P-NT-NL	80.0	41.5	98.5	52.3	9.2
H-T-L	84.7	23.7	94.9	37.3	1.7
H-T-NL	73.5	36.7	93.9	46.9	6.1
H-NT-L	77.4	38.7	90.3	32.3	3.2
H-NT-NL	80.0	27.7	90.8	33.8	3.1
I-T-L	74.1	50.0	90.7	42.6	0
I-T-NL	75.0	32.1	94.6	33.9	3.6
I-NT-L	72.3	50.1	93.8	47.7	3.1
I-NT-NL	75.9	35.2	85.2	38.9	16.7
TC-T-L	82.3	37.1	88.7	32.3	3.2
TC-T-NL	73.9	33.3	92.8	43.5	4.3
TC-NT-L	78.3	26.7	90.8	31.7	3.3
TC-NT-NL	69.1	38.2	94.1	42.6	11.8
Overall Mean	77.1%	35.9%	92.2%	40.4%	4.6%

* Multiple memberships result in percentages which sum to greater than 100%.

Table 12

Educational Level of Rehabilitation Counselors in the Sixteen Experimental Groups

	B.A.+	M.A.	M.A.+	Ph.D.
P-T-L	1.7	28.3	60.0	10.0
P-T-NL	5.3	15.8	52.6	26.3
P-NT-L	15.3	39.0	33.9	11.8
P-NT-NL	7.8	32.8	45.3	12.5
H-T-L	3.2	43.5	38.7	13.0
H-T-NL	10.0	26.0	56.0	8.0
H-NT-L	9.7	30.6	40.3	19.4
H-NT-NL	6.2	40.0	46.3	6.2
I-T-L	7.3	34.5	47.3	9.1
I-T-NL	5.2	31.0	55.2	8.6
I-NT-L	4.5	28.4	56.7	10.4
I-NT-NL	10.9	36.4	41.8	10.9
TC-T-L	3.2	46.0	41.3	9.5
TC-T-NL	7.5	26.9	52.2	11.9
TC-NT-L	5.0	25.0	46.7	23.3
TC-NT-NL	5.9	38.2	41.2	14.7
Overall Mean	6.7%	32.8%	47.1%	12.9%

* A very small percentage (0.5%) claimed a Bachelor's degree only.

from the study. The authors could very readily exclude such persons known to them (Upstate New York) but were only partially successful in identifying Ph.D.s who lived elsewhere since they may not include this information on their APGA mailing label.

Table 13 shows that, overall, 42.1% of the sample received advanced education in rehabilitation counseling, 27.2% in guidance and counseling, and so forth. The rather high number of counselors who were guidance and counseling majors may indicate that a substantial proportion of ARCA members are school counselors or, alternatively, it may indicate that many persons prepared for school counseling enter the field of rehabilitation counseling. Lastly, the table provides evidence that (rehabilitation) counselors come from many and diverse backgrounds. Those backgrounds and experiences lend strength to the field and suggest much capacity for change and growth.

Table 13

Fields of Advanced Education Indicated by the Sample Rehabilitation Counselors

	Rehab.Coun.	Guid.&Coun.	Psych.	Coun.Psych.	Coun.Educ.	Other*
P-T-L	56.0	28.0	1.8	3.5	3.5	6.4
P-T-NL	33.9	37.6	8.9	8.9	10.7	0
P-NT-L	64.8	18.4	3.7	5.5	0	7.6
P-NT-NL	44.4	25.4	9.5	9.5	0	11.2
H-T-L	69.5	13.6	1.7	1.7	5.0	8.5
H-T-NL	25.5	33.0	9.8	9.8	9.8	11.8
H-NT-L	47.4	28.0	10.5	8.8	5.3	0
H-NT-NL	47.5	18.6	5.0	10.2	6.8	9.9
I-T-L	33.3	29.4	11.8	7.8	3.9	13.8
I-T-NL	41.0	30.4	8.9	12.5	0	7.2
I-NT-L	41.9	25.8	3.3	19.4	0	9.6
I-NT-NL	49.1	18.9	13.2	7.5	0	11.3
TC-T-L	40.3	17.8	1.6	16.2	11.3	12.8
TC-T-NL	20.9	37.3	17.8	4.5	6.0	14.5
TC-NT-L	30.5	30.5	10.2	22.0	1.7	5.1
TC-NT-NL	30.8	40.0	6.2	10.8	4.6	7.6
Overall Mean	42.1%	27.2%	7.7%	10.3%	4.3%	8.6%

*Other fields of advanced education noted by subjects included: special education, education, social work, sociology, administration, social service fields, and other.

CHAPTER V

FURTHER DISCUSSION AND RESEARCH SUGGESTIONS

If the reader has perservered through this monograph and has arrived (finally?) to this last chapter, he/she may very well ask: "Well, what does it all mean and what should I do if I wish to use the mailed questionnaire approach?" In this chapter implications will be drawn from the major results and practical suggestions will be made for use by researchers interested in using mailed questionnaires. Also, suggestions will be offered to researchers who are interested in studying strategies for increasing the return rates of mailed questionnaires.

The major result - that there were no significant differences between the 16 experimental groups in terms of their "willingness to participate" - needs further consideration. It is clear that threatening the subject with a followup letter will not help increase the "willingness" or return rate and, indeed, may reduce the return rate if such a threat were combined with a Humorous appeal. It also seems evident that the TC approach and, in general, the use of letterhead stationery helps increase the return by subjects. Yet, the results do not distinguish any groups over others in terms of "willingness"/return rates. Leaving aside the usual feeble explanations which focus on the research methodology or statistics, the clear explanation for these results is that the particular appeal simply did not make a great impact in the life of the counselor (subject). The counselor will respond to a questionnaire, we venture to guess, because: a) he/she finds it interesting, b) it appeals to him/her for other reasons (i.e., the source of the research, the length of the questionnaire, the time it arrives at the office), c) he/

she is interested in research more or less, d) he/she is an orderly, perhaps somewhat compulsive person who does not like to leave tasks undone, and e) other intangible reasons. It may be that the type of counselor personality is the key to a returned questionnaire and that some appeals fit some personalities and others do not. For example, a "humorous" appeal may be totally ineffective with those counselors who are overly serious, dedicated or just plain frumpish or ill-humored. (We've all known someone like that!).

The "negative" results discussed above notwithstanding, there were positive results from this study that can be used by other researchers. For example, it was clear that the use of a monetary incentive produces a substantial, initial return. The TC return rate, after the initial letter, was 65.5% (11-12% higher than Humor or Importance). This rate can be explained in a number of ways: 1) Ss felt that they had been "paid" and were, thus, obliged to respond, 2) Ss responded to the novelty of receiving money, and 3) by accepting the coin, subjects felt a sense of commitment (limited) which, to a [illegible] cognitive dissonance, required them to respond. Political organizations often use the last-given rationale to assure votes for their candidates by inducing individuals (in a telephone conversation) to pledge their vote or by soliciting a small sum (less than a dollar) from a household. The potential voter has, so to speak, committed himself to a political candidate and would experience a degree of personal dissonance if he considered voting for another candidate.

However, it is also clear (in retrospect) that few researchers can afford to provide token compensation to all subjects. Alternative appeals which were almost as effective need to be emphasized, and alternative followup procedures should be explored.

The results in Table 2, and other results, suggest that the best alternative to a monetary incentive would be: 1) Humor appeal with letterhead stationery, 2) first followup letter - combination Professional-Importance appeal, and 3) second followup - a postcard with Humorous appeal. The researcher using the mailed questionnaire who wishes to "experiment" a bit might use realistic play money with the initial letter as a combination Humor-TC appeal. This idea will be further explored in the next section: "Suggestions for Future Research."

Several additional comments must be made concerning the use of followup letters. First, careful consideration should be given to the time elapsed between the original letter and the first followup letter, and the time for postal delivery should be realistically estimated. Since many subjects indicated that they had previously responded, the followup letter should comment on this possibility. Secondly, the use of followup postcards, especially if the Humor appeal is planned, should be considered. Postcards are least expensive, easy to handle and less likely to be assigned to the "junk-mail" or "for later attention" pile. Last, postcards are all that are really required to communicate the reminder message. Followup letters should not include a duplicate questionnaire (Etzel & Walker, 1974), but may note their availability if the subject will request a duplicate.

To summarize:

1. Token Compensation works best,
2. Threat of followup doesn't help (with a Humor appeal it is counterproductive),
3. Letterhead stationery seems to help (especially in combination with the Humor or TC appeals),
4. Followup letters definitely increase return rates,

5. Younger counselors seem more willing to participate in mailed questionnaire research than older persons, and
6. If TC money is not available try the Humor or "Importance" appeal, with a Professional appeal followup letter and then a Humor appeal followup postcard.

Suggestions for Future Research

As was noted in the literature review, the use of monetary incentives has been shown to be the most effective procedure for increasing mailed questionnaire return rates. However, except for industrial research which is sponsored by affluent businesses or companies few researchers will be financially able to offer token compensation to their subjects. Approaches which minimize the expenditure of researcher capital and other types of appeals which do not use monetary incentives must be explored and tested. Huck and Gleason (1973) suggested that incentives should be used with the first followup letter, to non-respondents, not to the entire sample. This procedure could reduce the TC costs by 40-50%. Another strategy would be to offer the TC to all respondents as a token of appreciation following the receipt of the questionnaire. However, unless the research can offer $1 or some unique item, it seems unlikely the Ss can be motivated by a moderate monetary incentive like a 25¢ piece.

As was previously suggested, perhaps realistic (i.e., not Monopoly-type)play money can be used in a combination TC-Humor appeal. For example, if it were legal to do so perhaps a xeroxed copy of a dollar bill - with George Washington's portrait being replaced with a picture of Howard Cosell - might be used. This dollar, or a play money dollar might retain a residual, monetary incentive - in addition to the Humor appeal. The suggestion here is to make use of the psychological "principle" that almost-real is almost as rewarding

as real (i.e., fake diamonds, art reprints, "sporty" American cars, etc.)

Another suggestion for research dealing with return rates of mailed questionnaires is to try a lottery approach. Instead of sending 400 Ss each 25¢, they can be promised a chance in a $100 lottery . . . should they return the completed questionnaire. Would this procedure produce a very large return? Would the return be biased? Would the lottery approach be more effective with blue collar workers, for example, than with professionals? These and other questions will require careful consideration before a "lottery" is planned in conjunction with mailed questionnaires.

Besides variations on the monetary incentive theme, other novel approaches should be studied. For example, a) "gifts" of a humorous nature might be promised or sent, b) professionals might be promised useful materials (i.e., a list of common drugs and their side effects), c) the size of the letter might be varied - from 24" x 24" to 4" x 4", d) messages on the outside of the envelope might be an experimental variable, e) a "mail-gram" type followup letter might be tried, and so forth.

Whichever experimental variables are used, the future researcher is cautioned to plan the experimental design carefully and to gather together, in advance, his folding-stuffing-sealing-stamping team. This part of research - which includes much joking and camaraderie - can be fun, too.

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