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## Dissertation

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#### ADULT ATTITUDES TOWARD LEARNING AS A

DETERMINANT OF PARTICIPATION

IN CONTINUING EDUCATION

Bу

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Submitted to the Faculty of the Graduate College of the Oklahoma State University in partial fulfillment of the requirements for the Degree of DOCTOR OF EDUCATION December, 1985





ADULT ATTITUDES TOWARD LEARNING AS A DETERMINANT OF PARTICIPATION IN CONTINUING EDUCATION

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Dean of the Graduate College

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By

Dennis Michael Neil

No.

December,85

#### ACKNOWLEDGEMENTS

This comparison survey field study of adult attitudes toward learning was performed on four selected groups consisting of randomized samples from the population of all members of the Professional Insurance Agents of Texas at the time of this study. The four groups were composed of: (1) those members who are graduate designates of the Certified Insurance Counsleor Program; (2) those who have not completed the Certified Insurance Counselor Program, part thereof, nor any other recognized insurance industry professional continuing education program; (3) those who possessed a baccalaureate or higher degree of formal education; and (4) those who did not possess baccalaureate or higher degree of formal education.

The attitude component consisted of each respective group's view toward learning. In this study, learning was defined to mean participation in recognized professional continuing education programs in the insurance industry. Attitude differences toward learning were measured by a researcher-developed instrument based on the theoretical constructs developed by Osgood, Suci, Tannenbaum et al.

The difference in group attitudes as measured gave positve verification of certain of the hypotheses. Those who participate in such professional continuing education

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programs have a more positive attitude toward learning than those who do not participate in such educational programs. Furthermore, graduates of the professional continuing education program involved in the study, both degreed and nondegreed, displayed a more positive attitude toward learning than their non-participant counterparts, both degreed and non-degreed. Those in the study who were "non-degreed" outscored those who were "degreed." Lastly, such adult attitudes toward learning can be measured to some degree of significance using an instrument utilizing the semantic differential technique based on the theoretical frameworks developed by Osgood and his associates (1957).

The results of the study were promising, and future applications appear inevitable as a viable research-base. The extension of this research effort to cover other groups is heavily encouraged with appropriate modifications as may be deemed necessary by the researchers involved in such replicative or continued investigative studies. The findings of this study further substantiate the postulate that "attitudes toward learning" can objectively be measured to a substantial degree by the use of proper instrumentation and research procedures.

Accordingly, such instrumentation could logically be developed with the intent to further increase their validity and reliability through extensive use and establishing normative data. Potentially, they could prove to be extremely valuable not only in ex post facto research, but

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also in ongoing action research projects such as may exist in business and industrial settings. Examples of these applications could conceivably involve the following:

 determining pre-selection attitudinal criteria as a basis for hiring new employees where continually learning new skills is an essential characteristic;

(2) pre-determining the learning readiness of existing employees involved in company training or other educational programs;

(3) gathering marketing research data by educational or training organizations desiring to analyze their market and develop more viable marketing plans, or, otherwise improving their instructional methodologies commensurate with the receptiveness of their market clientel.

At this time, I wish to express my sincere gratitude to all of the people who assisted me in this effort at Oklahoma State University. I am especially indebted to my major advisor, Dr. Clyde B. Knight and, Dr. Linda Vincent who served as my interim major advisor during Dr. Knight's absence. Their helpful guidance and counsel were greatly appreciated.

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Also, I am most thankful to the other members of the committee, Dr. William M. Kincaid and Dr. Jerry G. Davis.

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Finally, thanks be to God for without Him I would have given up long ago. He gave me the strength and purpose to go on when I had no strength or vision left.

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#### CHAPTER I

#### INTRODUCTION

Insurance industry leaders and trainers alike have long realized the vital importance of professional continuing education learning activities for their employees (Rokes, 1967 et al.). In this respect, they are probably no different from other professions in their desire to improve the professional competencies of their employees through professional learning efforts (Houle, 1980 et al.).

This concern in the highly competitive and rapidly changing technical field of insurance poses a particular problem for the insurance industry since it is one "affected with the public interest" (Mehr and Cammack, 1980). It has been observed by some that the need for professional training exists both prior to insurance employment, and on a continuing basis thereafter (American Management Association, 1960 et al.).

The need for continuing education and other related professional development activities has grown to a level of unparralled importance in recent times. Houle (1980, p.6) observes that "Since about 1965, the general public has been more deeply aroused over professional inadequacies than ever before." In all eventuality, this trend will

likely continue in our competitive and consumersitic era. In general, there appears to be a continual growth trend toward more demanding educational and professional requirements for insurance personnel (Pfeffer and Klock, 1974).

Further complicating the heavily documented need for participation in continuing education beyond that of formal schooling is the present lack of sufficient understanding of the various attitudinal processes involved. Present evidence indicates that this area may have even greater ramifications than those which are readily observable and, as such, may substantially affect the participation and learning processes of adults involved in such activities.

For example, Verner (1964, p. 22) observes that "a desire to learn and an interest in the material to be learned appear to exert a greater impact upon ability to learn than any other factors." Yet, at the same time, evidence also indicates that this characteristic of adult learners has often been presumptuously taken for granted by those who are involved in the instructional process of teaching adults (Knowles, 1970; Kidd, 1971 et al.).

In addition, the respective roles of adult attitudes and continuing learning activities takes on even more significance when examined in light of their specific educational purpose and environmental setting. In business and industry, such professional continuing education learning efforts are usually performance-oriented (Connellan, 1978

et al.) and could conceivably take on specialized meanings as an integral part of this important educative task.

Current research findings also indicate a lack of coherent understanding of the specific role, and significance of, adult attitudes toward such professional continuing education learning activities (Houle, 1961). Obstensibly, insufficient research has been conducted beyond the present confines of earlier, more required formal education resulting in this particular area of adult learning not having been sufficiently studied in depth even though there have been considerable social-psychology research studies involving the role of attitudes and learning (Robson, 1966; Trenaman, 1957 et al.).

The present evidence indicates that much of the of the failings of research in this area has in part been due to their emphasis to date. In her comprehensive work on adult learning, Cross (1981) cites that most research has been directed toward sociological demographic analysis in adult education. Knowles (1973) notes that most adult research concerning learning has been limited by being primarily conducted on a cross-sectional rather than longitudinal basis which has decreased its utilitarian applications.

Also plausible is that the basic purpose of research efforts in such learning areas may sometimes become too structured and self-serving, omitting other areas of needed research such as adult attitudes and learning. In one study, Parsons (1978, pp. 7-8) maintains that "Research

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related to learning can easily be classified into two categories: philosophical/practitioner and empirical." He subsequently states

Only occasionally writers attempted to use data from both categories and in these cases they used empirical research data to justify their philosophical/ practitioner orientation.

Thus, such research findings can, in turn, be limited by their very own intrinsic thrusts and/or omissions. Semantic misinterpretations may pose problems as well, further confounding a thorough understanding of the research in this area. Schroeder (Smith, Aker, and Kidd, 1970, p. 28) stated that

There has been some confusion in defining the terms adult education and continuing education. Some people tend to use the the terms synonymously; some draw sharp lines of distinction between them; and still others seem unable to decide.

Learning, itself, it seems, is not easy to define because we can never actually see "learning" taking place since it is an internal process, but rather are relegated to observing human behavioralisms as indices of learning (Logan, 1970). Attitudes, as well, retain a very ambiguous and nebulous nature defying adequate, as well as logical, explanation (Rokeach, 1970 et al.).

Present research findings sufficiently indicate the need for additional research needed in this area to explain any possible causal relationships. In a major study by Anderson and Darkenwald (1979), it was found that such participation in learning activities as a function of the variables of race, sex, age, income, education, place of residence, et seq. only accounted for ten percent of the variance associated with such activities. Accordingly, the real explanations lie elsewhere. Hence, the possibility of attitude-learning causal relationships as a factor.

In a dissertation study of "learning-prone personalities," Armstrong (1971) attempted to seek the difference between "high-learning" adults and "low-learning" adults. And, according to Cross (1981, p. 67),

Armstrong's study is unique and important because it attempts to answer the question of who participates in adult learning by looking at personality characteristics and attitudes. Few studies of either self-directed learning or surveys of participation in organized instruction, have done that.

In conclusion, the words of Houle (1961, p. 10) best sum up the need for additional research in this area who maintains that

If we are ever to understand the total phenomenon of continuing education, we must begin by understanding the nature, the beliefs, and the actions of those who take part to the highest degree.

#### Statement of the Problem

Current literature suggests that there is a lack of research data which sufficiently explains adult attitudinal relationships toward learning and any subsequent behavioral characteristics that may be involved regarding the participation of adults in professional continuing education activities. Possible "causal-relationships" have not been sufficiently explained in depth. Evidence also indicates that most of the information collected about adults and their reasons for participation in adult and continuing education is almost exclusively descriptive. Even though important, this does not explain "why" people participate in such programs as has been indicated by some researchers (Grotelueschen and Caulley, 1977 et al.).

As a result of the deficiencies in this area of presently amassed empirical evidence, the formidable task of identifying and/or measuring such personal attitude variables in this area has been made all the more difficult. Such information, if available, might logically be useful for those in business or industry who are charged with the direct responsibility of identifying and focusing upon the professional development needs of existing employees, or, assessing the potentiality of possible new-hires to the organization. Accordingly, this area remains a particularly elusive one to date for those who are involved in such educational and training processes, thereby complicating or, at the very least, impeding their efforts.

#### Statement of the Purpose

The purpose of this study was to compare the adult attitudinal relationship differences, if any, between graduates of an officially recognized, professional continuing education program in the insurance industry and those who have not participated in such related continuing education learning activities. In order to determine any existent

causal relationships involved, the questions which were researched are as follows:

1. Do Certified Insurance Counselor Designates have a more positive attitude toward learning than non-designates?

2. Do those who are not Certified Insurance Counselor Designates nor graduates of other professional insurance education program have a less positive attitude toward learning than Certified Insurance Counselor Designates?

3. Do those who have a bachelor's degree of education possess a more positive attitude toward learning?

4. Do those who have less than a bachelor's degree of education possess a less positive attitude toward learning?

5. Is it possible to measure such attitudinal differences toward learning with validity and reliability using the "semantic differential technique" as a basis?

#### Delimitations

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This study primarily involved the attitudes of members of the insurance industry and was necessarily delimited to: (a) those who were official members of the Professional Insurance Agents of Texas (hereafter refered to as PIAT) at the time of the study; (b) those PIAT respondents who actively participated in the research study; (c) those PIAT members who possessed a baccalaureate or higher degree of formal academic degree preparation; (d) those PIAT members who possessed less than a baccalaureate degree of formal academic education preparation; (e) those PIAT members who

have officially received the Certified Insurance Counselor designation (hereafter referred to as CIC Designates); (f) those PIAT members who have not officially received the Certified Insurance Counselor designation (hereafter referred to as Non-CIC Designate) nor any other professional insurance designation; and (g) the conceptual framework it is based on, i.e., attitudes of adult participants toward a professional continuing education program in the insurance industry as representative of attitude toward learning.

In summarizing, this study is necessarily delimited by its own particular focus. A major concern of this study was to study general attitude variables toward learning between those PIAT members who display educative behavior and those who do not based on their participation levels in a recognized professional continuing education program (i.e., CIC Designates versus Non-CIC Designates). It was, in nowise, meant to be an evaluation of such insurance industry professional continuing education programs.

Secondarily, the purpose of the study was to examine differences, if any, between these selfsame participants with regard to varying formal educational levels achieved. Other related factors alluded to or reported herein were for the basic purpose of providing additional information for the reader and enlarging the informational researchbase in this area. Serendipitous information not intentionally sought resulting from the study was likewise a no less desirable outcome, however might be the case.

In the study, no distinction was made between the research hypotheses with regard to sex, age, employment affiliation, job function or industry experience. It was the hope of the researcher that this would lend itself better to a "representative sampling" since the randomized technique was employed utilizing the systematic selection process. Although such demographic research data was concurrently collected by the questionniare in the study, this specific intention was for reporting purposes only so that further research investigations of any possible correlational relationships might be enhanced through the conventional analyses of such available research data.

#### Limitations

The particular identified population as used in this study was in turn dependent upon the information supplied by the Society of Certified Insurance Counselors of Austin, Texas which inherently involved only those members who are residents of the state of Texas, and who were also members of the Professional Insurance Agents of Texas (PIAT) at the time of this study. The authenticity of the collected data was predicated on the accuracy of participant responses as verified by the particular questionniare utilized.

The reader should also realize that this study and any generalizations which might be forthcoming from the data and subsequent analyses is therefore limited by its own specificity to the population in question involving this

particular geographical area and industry sample. It was not a purpose of this study to offer any other generalized statements of facuality which might feasibly apply to other sections of the country, populations, businesses, or industries, however may be the case.

Furthermore, the researcher-developed instrument used in this study which utilized a series of "bipolar adjective pairs" based on the earlier theoretical constructs proposed by Osgood, Suci, Tannenbaum (1957) et al., was assumed to be a valid measure of adult attitudes toward learning in this study. Likewise, it was not designed to measure other attributes, or, necessarily have general applications to other areas beyond the scope of this research study.

#### Definitions of Terms

For the purposes of this particular study, the following operational definitions were utilized:

<u>Professional Continuing Education Program</u>. The Certified Insurance Counselor (hereafter referred to as CIC) designation program designed for those who are presently involved in various professional capacities in the insurance industry (Appendix A).

<u>CIC Designates</u>. Those who have completed the fivepart CIC Program under the auspices of the Society of Certified Insurance Counselors headquartered in Austin, Texas, and who were current members of the Professional Insurance Agents of Texas (PIAT) at the time of this study. <u>Non-CIC Designates</u>. Those non-participants in the insurance industry who have not completed the CIC Program, portion thereof, nor any other recognized professional continuing education program in the insurance industry.

<u>Degreed</u>. Those who have completed a four-year baccalaureate degree program of formal college preparation, and, who may also have subsequently achieved higher levels of formal college education and/or degrees.

<u>Non-Degreed</u>. Those who have not completed a fouryear baccalaureate program of formal college preparation, and, who have consequently completed less formal college education or subordinate degrees, if any, in this respect.

<u>Attitude</u>. The preconceived mental set of feelings, emotions, beliefs, opinions, intentions, or other predispositions within the individual toward any person, place, or thing. In this study, this refers to the particular attitude of those who are involved in some professional capacity of the insurance industry within the population studied.

<u>Attitude Scales</u>. This refers to the 15-pairs of bipolar adjectives in the researcher-developed instrument (Appendix G) based on the theoretical constructs proposed by Osgood, Suci, Tannenbaum (1957) et al. designed to measure the attitude of the identified population in the study against the single concept of learning (i.e., "Professional Continuing Education Programs" in the insurance industry).

Learning. As defined and utilized in this study, learning refers to "Professional Continuing Education Programs" as currently practiced by officially recognized insurance industry associations. The particular example used in this study was the "Certified Insurance Counselors Program" sponsored by the Society of Certified Insurance Counselors headquartered in Austin, Texas (Appendix A). The program is coordinated by each respective state affiliate association, i.e., the Professional Insurance Agents (PIA) in each state. In this study, this organization is the Professional Insurance Agents of Texas (PIAT) which is also headquartered in Austin, Texas.

A major reason for the selection of this particular program for research purposes was due to its professional reputation in the insurance industry, and its authenticity as a true professional continuing education program due to its voluntary nature and requirement component for yearly updating by every member in order to maintain their CIC Designation, once achieved. In general, professional continuing education programs do not mandate future ongoing continuing education after completion of their initial program designation requirements (Smith, Aker, and Kidd, 1970).

#### CHAPTER II

#### REVIEW OF THE LITERATURE

The primary purpose of this chapter was to provide a research base for this study and examine any existent relationships regarding the attitudes of adults toward learning and their participation activities in professional continuuing education. Such learning efforts were delimited in this study to professional continuing education programs in the insurance industry. Even so, it is the hope of the researcher that a general approach to these questions can be presented in this review of literature for the reader as the commonalities involved transcend and apply to business and industry at large.

Particular emphasis will be placed on attitudes and the problematical role they present regarding adult participation in adult learning activities. The review will be approached in a commentary fashion for the reader to facilitate identification of some of these problem areas.

Secondarily, this review of literature is intended to offer insight for the reader into the very intricate and complex relationships involved in adult attitudes and their subsequent participation levels in professional continuing education programs. It is hoped by the writer of this

paper that this information may encourage other similar studies or applications of this knowledge on either a practical or theoretical basis.

#### Research Base

The major studies which provided a research base for this study were the Seaman (1968) and the Grotelueschen and Caulley (1977) studies. As noted previously, considerable research has been conducted in the areas of attitudes and, certainly learning and education, however, very few studies have adequately examined any existent relationships between such variables as adult learning and their participation in continuing education (Cross, 1981 et al.).

The purpose of the Seaman dissertation study was to analyze the relationships between extent of educative behavior and attitudes toward continuing education. In this study, Seaman conducted his research on the industrial employees of the Florida Power Corporation in the Tampa and St. Petersburg area of Florida. One hundred employees were selected as the population sample for the study which were stratified into four occupational levels according to their job titles and positions. Particularly noteworthy is that it involved a 98% response-rate of all the initial subjects sampled which was accomplished through diligent follow-up.

To determine extent of participation in educative behavior, the Leisure Activity Survey (Litchfield, 1965) was administered. The instrument, of reportably good validity and reliability (Seaman, 1968), consisted of 99 leisure activity items, 46, of which, were considered to be educational in nature.

Scoring of the items as dependent upon (1) the relative educative value of each activity as determined by a panel of experts, and (2) how often the individual participates in that particular activity. Participation scores were subsequently determined by compiling the total sums across the 46 educationally-related items.

To determined attitudes toward continuing education, the semantic differential technique was employed. Seaman asserts that this particular technique "assumes that there is a relationship between learning and the operations of measurement" (p. 94). The semantic differential utilizes adjective pairs of words opposite in meaning (bipolar), and which have have undergone extensive research as to the dimensionality of their meanings by empirical and normative investigations (Osgood, Suci, and Tannenbaum, 1957). Seaman (p. 94) observes (based on these theoretical constructs) that

In terms of learning theory, the meaning of a word in a particular situation consistently produces certain reactions and behaviors in human experience. This indicates that predictable associations of words and behavior are possible if the meanings can be identified and indexed. In measurement terms, the meaning of a sign is defined as a point in semantic space designated by a sequence of judgments when each judgment represents a selection among a set of given alternatives. This point in space has two essential properties--direction from the origin (quality of meaning) and distance from the origin (intensity of meaning).

In continuing, Seaman notes that attitude indexing can by achieved by the process of "subjecting the obtained judgments to factor analytic procedures through which emerging primary factors are usually determined to be an 'evaluative factor'" (p. 94). As a result of their previous research in this area, Osgood, Suci, and Tannenbaum (1957) confirm the existence of at least eight such dimensional factors, with varying degrees of "loadings" which can be attributed to each, relative to each pair of bipolar adjective scales in question. A list of these dimensions are presented below (pp. 62-64):

Ι.	Evaluative	, V.	Tautness
II.	Potency	VI.	Novelty
III.	Oriented Activity	VII.	Receptivity
IV.	Stability	VIII.	Agressiveness

Seaman (p. 94) also notes that

The judgments which correlate with this factor [evaluative] have been shown to reflect the individual's attitude, the kind of attitude reflected being dependent upn the kind of correlation achieved.

Seaman's contention is obstensively well-supported by Osgood, Suci, and Tannenbaum (1957, pp. 194–195) who cite findings that

the evaluative factor of the semantic differential is an index of attitude. It is, moreover, a method of attitude assessment that is relatively easy to administer and easy to score.

In his study, Seaman selected eight concepts which related closely with the term "continuing education." These were selected from a list submitted to a panel of experts consisting of professional adult educators and training directors in business and industry. A ten-scale differential was then in turn selected to judge the eight different concepts with appropriate pretesting before arriving at the final form. In the data-reduction process, Seaman eliminated two of his concepts (leisure and change), and five of the scales (valuable-worthless, active-passive, pleasant-unpleasant, cautious-rash, and large-small). The original eight concepts and ten scales selected by Seaman (pp. 118-121) to be used for instrumentation purposes are as follows:

#### CONCEPTS

- 1. Skill
- 2. Education
- 3. Self-Improvement
- 4. Learning
- 5. Change
- 6. Instructor
- 7. Leisure
- 8. Knowledge

#### <u>SCALES</u>

- 1. Valuable-Worthless
- 2. Weak-Strong
- 3. Pessimistic-Optimistic
- 4. Active-Passive
- 5. Pleasant-Unpleasant
- 6. Cautious-Rash
- 7. Low-High
- 8. Large-Small
- 9. Negative-Positive
- 10. Slow-Fast

Each concept was tested against each of the scales, with each subsequent concept being tested by the same scales, but with the scales being rotated each time to minimize any patterned responses which might conceivably occur. Participants were to check that point on the scale (showing direction and intensity) indicating how they feel it describes the concept in question. Although not indicated for participants, each space between the scales carried a numerical value of 1 to 7 to measure degrees of intensity toward the direction, and to allow mathematical tabulation and statistical analysis of the composite attitude scores of responses. Seaman (p. 64) gives a conceptual illustration of the scale structure he utilized in his instrumentation which indicates the numerical values of each scale position reproduced as follows:

(concept)

polar term A  $\frac{1}{(1)}$   $\frac{1}{(2)}$   $\frac{1}{(3)}$   $\frac{1}{(4)}$   $\frac{1}{(5)}$   $\frac{1}{(6)}$   $\frac{1}{(7)}$  polar term B

The scale positions are defined as follows:

(1)	extremely A	(7)	extremely B
(2)	quite A	(6)	quite B
(3)	slightly A	(5)	slightly B
(4)	neither A nor B; equally A and B		

Within the limitations of his study, Seaman (p. 98) concluded the following (i.e., regarding those conclusions which specifically dealt with attitude):

3. The relationship between an individual's attitude toward continuing education and the extent of his participation in educative behavior is not influenced to any degree by his age or level of formal education. The findings of this study show that the effects of the two variables upon this relationship are negligible.

4. Factors in a individual's environmental situation can and do influence his overt behavior to an extent that his attitudes are not always reflected. The participants in this study indicated rather strong, positive attitudes toward continuing education. However, for the most part, they scored rather low on the participation scale. In view of the fact that the characteristics of the individual were shown to have little influence upon this relationship, then situational factors must be considered as influential variables.

In his concluding remarks about the implications for further research, Seaman (p. 103) states that

This exploratory study has barely touched upon the total problem of determining the relationship between those variables classified as affective--attitudes, values, opinions, motives --and overt behavior. The need for more extensive research in this area is overwhelming, particularly in the rapidly emerging field of adult and continuing education.

In commenting at this point, it should also be recognized that Seaman (p. 90) had identified earlier another important, as well as paradoxical, aspect of research in this area by stating

Continuing education has become an important enterprise for millions of adults and the effectiveness of this education is a matter of utmost social and national importance. However, much of the previous research in adult and continuing education has been devoted to adult characteristics, program planning, participation in educational activities, and other related areas. There has been little systematic effort to collect evidence of growth or development of adults in the 'affective' domain of human behavior, particularly in the area of attitudes and their related phenomena.

The conceptual model which Seaman used to predicate his study upon was theoretically based on an earlier theory formulated by Rosenberg (1960) who postulated the existence of an attitude structure in "which the various affective and cognitive components are so interrrelated that a change in one will produce a change in another" (Seaman, p. 37). In Seaman's study, and a subsequent article related to this same study (Seaman and Schroeder, 1970), this theoretical framework was illustrated with its cognitive, affective, and behavioral components. This latter model is presented in Figure 1 to ameliorate the reader's efforts in visually conceptuallizing the intricate complexity of these attitudinal components and their respective interdependent roles in influencing individual attitudes.

#### Research Model

The other study which was used as a research base for this study was performed by Grotelueschen and Caulley (1977) who were seeking a theoretical model for research into the determinants of a professional's intention to participate in continuing education. Their study was based upon general theoretical frameworks proposed by Fishbein and Ajzen (1975). The three major components of this framework are summarized as follows:

 The professional's attitude toward participating in continuing education which is considered dependent on what the professional believes will be the consequences of such participation and the values placed on them.

2. The professional's perception of what most people who are important to the professional think about his or her participation in such activities, including the importance placed on these perceived expectations by the professional.

3. The professional's personal beliefs regarding whether he or she should participate in such activities, and, motivation to comply with these personal beliefs.

One distinguishing feature of the Grotelueschen and Caulley study is that it is one of the few studies in this area that has addressed the question of "why" people participate in adult and continuing education programs. The basic rationale for their study was founded on social psychological theory. Another influencing factor was based on



Figure 1. Schematic of the Seaman-Schroeder Model Based on Rosenberg's (1960) Earlier Theory Depicting the Highly Interdependent Structure of Attitudes and Their Affective, Cognitive, and Behavioral Components

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practicality. As an explanation, they go on to state that their purpose was to

guide empirical inquiry which would contribute to fundamental knowledge about professional participation in continuing education activities. Nearly 50 percent of all professionals participate in a continuing education activity in a given year, and nearly 25 percent of all participants in continuing education activities are employed in a professional or technical occupation (p. 23).

In their study, Grotelueschen and Caulley assumed that the participation of professionals in continuing education is influenced in some measure by specific intentions to participate. Hence, "a professional's attitude toward participating in continuing education can predict actual participation" (p. 23). In their model, however, they suggest that actual "participation or non-participation in continuing education cannot be predicted from knowledge of a professional's attitude toward participation." Based on their distinction among beliefs, attitudes, intentions, and behavior, they continue with the statement that "Instead, ` participation is viewed as determined by the professional's intention to participate" (p. 23). As the reader may infer from the Figure 2 illustration of the Grotelueschen-Caulley model, this is a complex, integral process which involves many interactive components based on each professional's individual situation and perceptions.

An important facet of Grotelueshcen and Caulley's article is that it stresses the significance of first recognizing the important role of "information processing" as an underlying factor in one's belief formation and state that


Legend: \_\_\_\_\_ Influence

----- Feedback

Figure 2. Schematic of the Grotelueschen-Caulley Model Which Illustrates Their Distinctions Among Beliefs, Attitudes, Intentions, and Behavior With Respect to the Belief Formation Process

a person forms beliefs about himself, about other people, about institutions, behaviors, and activities based on direct experience, through direct experience, mediated information, or logical inference (p. 24).

Consequently, these beliefs ultimately influence a person's attitude toward an object regardless of how they are actually obtained. Summarily, they state "Attitude is thus instrumental in predisposing a set of intentions toward behaviors associated with an object" (p. 24).

Personal intentions, then, are not completely accurate predictors of a behavior according to the findings offered by Grotelueschen and Caulley. While a professional may wish to participate in continuing education, obstacles (real or perceived as such) may prevent him or her from actually doing so. Participation in continuing education is usually voluntary; the element of free choice makes this involvement less predictable.

Another complicating factor is attitude change during participation. Grotelueschen and Caulley maintain "participation in continuing education provides feedback to a person's beliefs about participation. Thus, a person's beliefs before and after participation may be different" (pp. 24-25). Other studies lend support (Verner, 1964).

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Grotelueschen and Caulley (based on the framework proposed by Fishbein and Ajzen) postulate that

as a professional forms beliefs about participation, he or she automatically and simultaneously acquires an attitude towards participation. Each belief links participation to some attribute or consequence of participation. A professional's attitude is dependent on his or her judgement of the worth of these consequences (p. 25).

Accordingly, the attitudes of professionals toward participation in continuing education activities stem from personal beliefs, and, the evaluations of those beliefs on an ongoing basis through experience. As a consequence, it is an individual phenomenon being internalized within each individual based upon their perceptions about participation.

Another notable feature of the Grotelueschen and Caulley study is its substantial examination of the "saliency of beliefs." The review of literature indicates that very few studies have adequately examined this obscure area. Grotelueschen and Caulley note that a professional may have many beliefs about participation in continuing education and its consequences, however, "only a relatively small number of beliefs will likely serve as determinants of a professional's attitude at any given moment" (p. 26). Identifying and separating these from total beliefs about continuing education becomes a critical problem. Usually the first nine or ten are the most salient, with the first two or three usually being the most salient. However, even one salient belief may influence the individual to participate in a continuing education activity, e.g., mandatory professional continuing education.

To deal with the relationships between beliefs and attitudes, Grotelueschen and Caulley indicate that Fishbein has proposed an "expectancy-value model" to address this aspect. Accordingly, it is also applicable to any set of

beliefs, regardless of their saliencey, but does not assume any causal relationships since it deals only with beliefs and attitudes. "According to the expectancy-value model a professional's attitude (A) toward participating in continuing education can be calculated by the following formula (p. 27):

$$A = b_i \hat{e}_i \qquad (2.1)$$
$$i = 1$$

where b = the professional's subjective probability of occurence of consequence i, e = the value placed on a consequence i by the professional, and n = the number of consequences listed in the measuring instrument.

According to Grotelueschen and Caulley, this formula is designed to estimate a professional's attitude toward participating in a continuing education experience. This can theoretically be achieved

by multiplying his or her evaluation of each of the consequences of the experience by the value he or she places on the subjective probability that participating in the experience will lead to that consequence, and then summing the products for the total set of consequences (p. 27).

As a result, Grotelueschen and Caulley offer a model for the prediction of intentions to participate in such professional continuing education activities, and suggest "that there are three major factors which determine behavioral intentions" (p. 33). Restated, these are: the attitudinal factor (A); a subjective social normative factor (SSN); and a subjective personal normative factor (SPN). In order to calculate the social normative and personal

normative factors to be used in their model (which have not been addressed in this review), they give formulas which can be utilized in this regard (pp. 30-31, respectively). Grotelueschen and Caulley's (p. 33) mathematical attitude model for the "prediction of intentions" is presented as follows for the benefit of the reader's comprehension:

$$B \frown I = w_1 (A) + w_2 (SSN) + w_2 (SPN)$$
(2.2)

where B = the behavior, I = the intention to perform behavior B, A = the attitude toward performing behavior B, SSN = the subjective social norm, SPN = the subjective personal norm, and  $w_1$ ,  $w_2$ ,  $w_3$  = empirically determined weights

In their conclusion, Grotelueshen and Caulley (p. 36) appropriately state that "Even though there has been considerable empirical inquiry based on Fishbein's model, none has been conducted in the field of continuing education." Therefore, due to this void, they infer that there are many underlying questions which still remain unanswered in this area that need to be resolved, including the respective role which attitudes play in adult participation in continuing education activities. Additional research inquiry which will provide empirical or normative data is highly recommended.

#### Attitudinal Research

In general, literature indicates that the specific and interactive roles of attitude and continuing education learning activities have oftentimes been relegated to those of less major significance and seen as part of an overall

research effort. For example, in a study conducted by an international consortium of vocational psychologists in a dozen countries involving the Work Importance Study (WIS), Super and Nevill (1983, p. 1) stated that

The objective of the study (WIS) was to develop better methods of assessing motivation work and to play other career roles, and thus to throw light on career commitment and job involvement, on motivation to be a student, to work, to be a homemaker, and to pursue leisure activities and on the subjective quality of life.

As a direct consequence, such attitudinal and continuing education learning elements were incorporated into the greater span and purpose of this rather notable and comprehensive project without particular delineation or emphasis. The literature subtly implies that this is not an unusual happenstance, but rather the expected norm.

Another limiting factor in research efforts to date to which fail to sufficiently explain such attitudinal relationships with adult learning efforts has been their particular focus. For the most part, they have been of a reporting or documentary nature and, as such, have not sufficiently explained any possible "causal relationship factors" which may be involved. Seaman (1968, p. 81) noted that

In addition, most of the participation studies in adult and and continuing education have been concerned with such independent variables as level of formal edcation, economic status or income, age, occcupation, etc. However, they have not been able to explain why many of those individuals who would be expected to participate really do not, or why some people who would not be expected to participate do so, many to a great extent.

In attitude research, Rokeach (1970, p. 118) observes that

Attitude theorists have generally been more interested in the theory and measurement of attitude objects, across situations, than in the theory and measurement of attitudes toward situations, across objects.

In Rokeach's opinion, this has severely retarded the growth of attitude theory since it has resulted in the failure to appreciate that an attitude-object is always encountered with some situation, about which we each also have a set of organized attitudes toward.

Our knowledge of human growth and development and, consequently, the respective roles that adult attitudes play in continuing education play may be lacking as well. Knowles (1973) maintains that while our knowledge of early childhood development is even more critically lacking. He goes on to explain that the principle reason for this sad state of affairs is due to the fact that most knowledge we have gained in this area has been due to its acquisition through cross-sectional, rather than longitudinal studies.

# Attitude Definitions

In examining the literature, it appears that the very nature of attitude is one which defies adequate definitive description. Precise definitions of attitudes do not exist (Halloran, 1967 et al.). Although it is generally accepted that there are numerous differing definitions of learning as well, one might reasonably infer that there appears to

be somewhat more of a "common basis of agreement" than in the more nebulous attitudinal areas.

As an example, Rokeach (1970, p. 112) defines an attitude as "a relatively enduring organization of beliefs around an object or situation predisposing one to respond in some preferential manner." Windholz (1976, pp. 94-95), as well, holds a similar definition also noting that "We may have certain attitudes about a concept, or object, and have still other attitudes about the social situation which they occur." Halloran (1967, p. 14), appears to accept Allport's definition, i.e., that it is a type of "mental and neural state of readiness."

In another example, Ellensen (1973, p. 142) maintains that "An attitude may be defined as a learned inclination or group of ideas which usually affects your actions or behavior." Ellensen maintains that you are not born with attitudes but learn and develop them throughout life, and that through our positive and negative learning experiences to situations we carry them over in the form of our expectations in later life. They literally become habits to such an extent we automatically rely on them to respond to future objects or situations.

#### Attitude Components

In addition to definitive agreement, the character of attitudes are such that there is the proclivity to digress in different directions and emphasize the various attitu-

dinal components involved. Some envision attitudes to be inextricably connected with our value system. Manning and Reese (1984, p. 424) suggest that

Values respresent the ultimate reason people have for acting as they do. Sidney Simon, noted author in the field of values clarification, has said ""There's no place to hide from your values. Everything you do reflects them. Values serve as a foundation for our attitudes, and our attitudes serve as a foundation for our behavior."'

Still others such as Rokeach (1970, p. 115) agrees with Krech and Crutchfield who hold the view that "all attitudes incorporate beliefs, but not all beliefs are necessarily a part of attitudes." Rokeach sufficiently notes that there is considerable conceptual disagreement over how the concept of attitude should be distinguished from other closely related concepts, and that this is a major source of confusion. In following, Rokeach (p.124) purports that others such as Thomas and Znaniecki, see the concept value as having at least three distinct meanings, i.e., sociological, natural object with social meaning, and "is or may be an object of activity." To Rokeach (p. 124), "a value is seen to be a disposition of a person just like an attitude, but more basic than an attitude, often underlying it." In concluding, Rokeach (p. 124) states that "An adult probably has tens or hundreds of thousands of beliefs, thousands of attitudes, but only dozens of values."

Thus, semantic meanings and interpretations may pose problems for researchers and practitioners alike. Rokeach (1970) suggests that despite its central position in social psychology and personality, this particular concept has been plagued with ambiguity. For the reader, it becomes very difficult to differentiate these, and decide how conceptually different or similar they are to each other. Rokeach (p. 110) comments on this inconsistency by stating "Even more important, it is difficult to assess what difference these variations in conceptual definitions make."

## Attitude and Learning

Clarification problems may exist, as well, between the terminologies of learning and attitude. An appreciative understanding of their separate yet synergistic functions may possibly be found by examining any distinguishing interrelationships involved. In his major work on professional continuing education, Houle (1980, p. xi) defines learning as "the process by which people gain knowledge, sensitiveness, or mastery of skills through experience or study. Verner (1964, p. 24) comments that "A desire to learn and an interest in the material to be learned appear to exert a greater impact upon ability to learn than any other factors." More specifically, in the area of attitudes, Verner later continues with the conclusion that

Attitudes and interests exert a profound effect upon an adult's involvement in further learning; however, both are, for the moment, imperfectly understood and inadequately handled by adult educators (p. 25).

Other evidence as well, amply supports the fact that there is a very close and interdependent relationship of

attitude to learning, although likewise difficult to ascertain. According to Bloom (1956, p. 7), attitude specifically belongs in the affective domain of learning which "includes objectives which describe changes in interest, attitudes, and values, and the development of appreciations and adequate adjustment." Bloom also notes the greater difficulty of the affective domain as opposed to the other two domains of learning (i.e., cognitive and psychomotor).

In their classic handbook dealing with the affective domain, Bloom and associates (Krathwohl and Masia, 1964), also indicate some of the major problems and complexities they observed in this area such as the erosion of affective objectives over time, and the emphasis in grading on cognitive over affective elements. In effect, there appears to be a natural tendency to digress from the affective toward the cognitive domain. In part, this may be due to the fact that the cognitive area is more easily implemented from an instructional and/or evaluative aspect, and, the presumption that affective learning will automatically occur as a byproduct of the cognitive learning process.

Bloom, Krathwohl, and Masia (1964, p. 20), however, forsee an inherent danger in this premise and state "there still persists an implicit belief that if cognitive objectives are developed, there will be a corresponding development of appropriate affective behavior." They indicate that research summarized by Jacob (1957) raises serious questions about the tenability of this assumption.

Jacob suggests that affective behaviors develop when appropriate learning experiences are provided for students much the same as cognitive behaviors develop from appropriate learning experiences.

Other models and theories, as well, support the attitudinal implications involved in learning. The expectancyvalence theory proposed by Bergsten (1980) inextricably involves attitudes to the extent that attitudes may be considered "beliefs" or, at the very least, influentially interrelated to a substantial degree. Here, "Expectancy is defined as a belief in the probability that particular actions will lead to certain outcomes. Valence is defined in that particular actions will lead to certain outcomes" (Long, 1983, p. 130). This theory proposes that behavior is a result of the interplay between the direction and magnitude of beliefs toward learning as follows:

The theoretical position is that people who view participation in adult education as a means of satisfying certain needs and believe that they have a possibility of completing the study will participate, while those who do not have positive beliefs will not participate (pp. 130-131).

In his monumental work on adult learning activities, Tough (1971, p. 175) states "Many of the person's current personality or psychological characteristics will also influence the amount of time he spends at learning." Tough lists ten categories of such characteristics he found in his research. Several of these relate closely to the attitudinal areas, particularly "(8) positive perceptions regarding the pleasure, usefulness, and appropriateness of

learning." Subsequently, he indicates four other related characteristics which are necessary for predicting adult learning behaviors. Most notable of these were "(1) his concept of self" and "(3) his values, attitudes, and beliefs." The role importance of a positive self-concept in the learning process is well-supported in the literature (Armstrong, 1971 et al.), although there may be some limitations in making generalizations based on such a premise (Long, 1983).

In the COR model proposed by Cross (1981), attitudes toward learning play a crucial role. In a review by Long (1983, p. 133), it is noted that "The model is based on the premise that participation in adult education is the result of several related responses." Cross's model contains seven key elements as identified by Long (p. 133) below:

- 1. Self-evaluation
- 2. Attitudes about education
- Importance of goals and expectations that participation will meet goals
- 4. Life transitions
- 5. Opportunities and barriers
- 6. Information
- 7. Participation

The first two major elements of Cross's model, selfevaluation and attitude toward education, appear to be assumptively intertwined as interpreted by Long (p. 133) who subsequently comments

Self-evaluation as defined by Cross seems to concentrate upon personal confidence and achievement motivation.

Attitudes about education are the direct consequences of an individual's own past and arise indirectly from attitudes and experiences of significance of others. The above two elements of the model are linked by Cross's assumption of a relatively stable characteristic stance toward learning which may be positive or negative. Consequently, she proposes a consistent reinforcing interaction between selfevaluation and attitudes about education.

To the degree education and learning can be considered "interchangeable" in meaning, it would appear feasible that Cross's model would logically support a derivative premise of "attitude toward learning" in the COR model as well with their commensurate positive and negative attitude elements.

However, in inferring a positive correlation between "high self-esteem" and "positive attitude," one runs into difficulty. In his critique, Long (p. 134) introduces evidence suggesting any implications in this regard are possibly tenuous as "it is implied that individuals with a high self-esteem will always have positive attitudes toward education. Such an assumption can be questioned."

## Problem Areas

One perplexing bulwark to adequately understanding the existence of any causality relationships between attitude and learning is the inherent lack of individual conformity and wide variances toward learning in the human organism. If effect, this characteristic impedes the ready identification, measurement, or predictable standardization efforts in this area. Houle (1961, p. 21) also indicates that the desire to learn is not equally shared by everyone stating that

To judge from casual observation, most people possess it only fitfully and in modest measure.

But in a world which sometimes seems to stress the pleasures of ignorance, some men and women seek the rewards of knowledge---and do so to a marked degree.

Purcel and Knaack (1975) also offer evidence which suggest that attitude evaluation is also a problem area oberving that

> Attitude evaluation is one of the more complex types of evaluation. People have attempted to evaluate attitudes for years and have developled very complex assessment procedures which have met with minimal success ( p. 186).

In addition, Pucel and Knaack maintain that behaviors to be observed and the criteria associatied with attitude assessment instruments are not as precise as those used in performance tests. Hence, attitudes retain a more evasive nature defying the same measurable characteristics germane to other, more readily identifiable performance elements.

Cognitive dissonance, first formulated by Festinger, brings to light no less a problem in the accurate identification and measurement of such attitudinal relationships. The basic underlying assumtion in Festinger's (1957) theory is that (1) the existence of dissonance is pyschologically uncomfortable which will motivate the person to reduce it and, in addition, the person will actively avoid any situation or information likely to increase dissonance.

Based on Festinger's theory, Timm and Peterson (1982, p. 50) surmised

When people perceive new, incoming information, they tend to categorize it (1) as unrelated to what is 'already known,' (2) as supporting other 'knowledge,' or (3) as conflicting with what is 'already known.' In essence, people seek balance or "homeostasis" in their environment and tend to view situations in light of their own knowledge and experience in a rational effort to justify their own personal actions. In describing this volatile phenomenon inexorably involving attitudes, Timm and Peterson (p. 51) later conclude

Cognitive dissonance frequently results when one realistically thinks that a particular goal can be achieved, but for some reason it is not achieved. The results of cognitive dissonance can be a change in attitude, perhaps toward the "reachability" of the original goal or toward oneself ('I am a failure').

DeHart (1984, p. 2) describes the critical implication of the cognitive dissonance phenomenon in his statement "people will rationalize in an attempt to make their attitudes match their behavior--after the fact." Logically, it might be inferred that such varying aspects of human behavior do not conceivably lend themselves will to generalizations or predictable standards of behavior. Moreover, this would tend to nullify or, at the very least, complicate any legitimate efforts to qualify or quantify any accurate behaviorisms involving the attitudes of adults and their learning endeavors.

In a related vein, possibly human actions are the most valid measure of attitude since the truth may otherwise be obscured. In an effort to extend Cattell's earlier work of psychophysical methods in the measurement of social values, Thurstone (1929) proceeded to measure attitudes based on equal-appearing interval scales. In the course of his research, he admitted to the uncertainty of using "opinion" as an index of attitude," and cited the difficulties in distinguishing between these two terminologies. Consequently, Thurstone (p. 7) theorized "that a man's actions is a safer index of his attitude that what he says. But, his actions may also be distortions of his attitude." A person's expressed attitude, then, may merely be stating that which is socially acceptable or politically expedient in view of the situation. Actual behavior, then, might be a more accurate reflection of attitude. Irregardless, attitude would be an integral factor in either situation.

Other evidence appears to be highly supportive of Thurstone's premise since, if so, one might naturally infer that those who believe in adult learning activities with a positive attitude would demonstrate such educative behavior by following through and participating according to their personal beliefs. Grotelueschen and Caulley objectively report from their study of determinants concerning adult learning participation that

An individual's attitude toward participation in continuing professional education, for example, is a function of his beliefs about participation in continuing education. If the totality of a person's beliefs is associated with mostly favorable attributes of this activity, his attitude toward the activity will tend to be favorable or positive (p. 24).

In reality, participation may be representative of one's attitude toward learning with the individual "selfactualizing," as it were, to the degree that these experiences are positive and reinforcing. Seemingly, Bergsten's

(1980) expectancey-valence theory et al. would support this premise as well. Verner and Newberry (1958) offer very notable documentation, along with many others in the literature, that

The most significant determinant of participation seems to be the amount of earlier formal school experience. Education breeds the desire for more education, therefore, those with more education, rather than less, seek further education in adult life (p. 218).

#### Summary

Despite the differences in semantic interpretations and points of emphasis in attitudes and learning relationships, a review of the literature indicates little disagreement among theorists and practitioners alike with regard to the underlying importance of attitudes in adult learning activities (Verner, 1964 et al.). In an unpublished needs-assessment involving insurance industry training and educational needs (Neil, 1984), "attitude toward learning and continuing education" was rated high in importance ( $\overline{x} = 6.83$ ) on a Likert-type rating scale of 1-7 based on 10% responses from the 250 agency and company personnel sampled.

The centrality of attitude and its effects on human behavior and learning have been more than adequately supported by scholars in this area (Rokeach, 1970 et al.). Marx and Tombaugh (1967, p. 228) noted that "Dewey also emphasized the desire to continue to learn as being the most important attitude to be formed in school..." Due to its immense complexity and importance, it may appear insufficient at best to state that attitude is a critical and integral element in the learning process.

Literature, as well, suggests that attitudes not only have a dynamic and important influence on adult learning activities, but likewise affect individual human behavior in general. For example, Allport (1968, p. 59) suggests that attitude is "the most distinctive and indispensable concept in contemporary American psychology." Kossen (1984, p. 475) indicates that "Attitudes strongly influence how we cope with our environmental pressures. We can influence our lives by altering such factors as attitudes." Maltz (1960), in his best-seller on "psycho-cybernetics," holds a similar view in what he terms as "attitude-goals" which he maintains can be life-altering in an equally positive or negative self-reinforcing manner, depending on the attitudinal inclination of the individual.

A review of the literature also denotes a substantial lack of documented evidence regarding "causal" relationship factors in the area of learning and attitudes of adults (Seaman, 1968 et al.). Perhaps, this may be due in part to the difficulties which have been encountered in attempts to both identify and measure such attitudinal relationships Early pioneers in the area of attitudinal research measurement such as Cattell, Thurstone and Chave et al. obstensively met with varying degrees of success. Nevertheless, they provided the intitial impetus and theoretical foun-

dations for others to follow and develop to its present level of sophistication.

Literature, as well, supports evidence that there are existent social psychological methodologies to measure the attitudes of adults (Osgood, Suci, and Tannenbaum, 1957 et al.). One of the most viable attitudinal measurement instruments revealed by a review of the literature appears to be the "semantic differential technigue" developed by Osgood and his associates (1957). Their research indicates that "there is no general 'semantic differential test' as such" (p. 77). However, they go on to say that, given a specific situation, it is entirely possible to formulate a valid and reliable instrument to measure attitudes through the proper selection of concepts and scales based on their proposed theoretical constructs.

#### CHAPTER III

# PROCEDURE AND METHODOLOGY

The basic purpose of this chapter was to (1) show permission to conduct the study; (2) insure instrumentation validity by utilizing a panel of experts and through literature; (3) describe the procedures used in the determination of the population and sample; (4) further insure instrument validity and reliability by conducting a pilot study; (5) outline the method used in the collection of research data; (6) state the dependent and independent variables of the study; and (7) describe the procedures used in analyzing the data.

# Permission to Conduct Study

Initially, telephone contact was made with the national president of the Society of Certified Insurance Counselors, Dr. William T. Hold, in Austin, Texas. A face-to-face meeting was then arranged which involved a discussion of potential research topics in the attitudinal and other areas. A formal letter of request ensued, outlining the specific area to be researched and the sampling technigue to be employed which was then later revised (Appendix B). Permission was then granted (Appendix C) to

conduct the study using the proposed sampling methodology involving the entire membership of the Professional Insurance Agents of Texas (PIAT) which included those who were Certified Insurance Counselors (CIC) who were also one of subject groups of the study.

### Panel of Experts

A rough draft of the survey instrument was initially distributed to a panel of experts who were chosen by the researcher for their expertise in this area (Appendix D). It was determined by the researcher that a broad crosssection of those currently involved in adult and higher education, training in business and industry, and managerialadministrative capacities would provide the most appropriate balance and perspective in this advisory capacity. The "practical" nature emphasis of the professional continuing education program utilized as one of the independent variables (CIC Designates) in the study strongly necessitated input from those professionally involved in insurance industry training programs.

Feedback was obtained from each member of the panel of experts regarding their constructive criticisms of the instrument, which included face-to-face meetings where convenient. For the most part, criticisms were very favorable toward the proposed instrument necessitating only moderate modifications. Panel recommendations were likewise incorporated into the instrument to the extent possible. Con-

flicting suggestions were settled at the researcher's discretion who compromised accordingly in the development of the final instrument (Appendix G).

Population and Sample

The population of this study consisted of all members of the Professional Insurance Agents of Texas (PIAT) at the time of this study (approximately 22,000 members). This professional state-wide professional insurance organization is comprised of managers, customer service representatives, agents, brokers, and other professional personnel in the Texas insurance industry.

The professional continuing education program example used in this study was the Certified Insurance Counselor Program (hereafter referred to as CIC). In the identified population, there were approximately 6,700 members who held the CIC designation. The CIC Program is a professional continuing education program sponsored by the Society of Certified Insurance Counselors and headquartered in Austin, Texas (Appendix A). This national organization is specifically designed for professional insurance personnel and is well-established in all fifty states including the Virgin Islands and Puerto Rico. Each affiliate state Professional Insurance Agents association (PIA) coordinates each of the five-part series of seminars leading to the CIC designation in cooperation with the Society of Certified Insurance Counselors. As a true professional continuing education association with empahsis on current industry topics and practival application, it requires each of its designates to continue their education via annual updating by attending one of the Society's seminars in order to Keep their CIC designation once it is awarded.

Four sample groups were formed from the population consisting of (1) those who were Certified Insurance Counselor Program Desigates (CIC Designates); (2) those who were not Certified Insurance Counselor Designates, nor, have completed any part thereof including any other officially recognized professional continuing education designation program in the insurance industry (Non-CIC Designates); (3) those who were college graduates possessing a bachelor's or higher degree (Degreed); and (4) those who were not four-year college graduates or higher level (Non-Degreed). Under the direction of Dr. William T. Hold, CIC, computer print-outs of each of these respective membership categories were derived and made available from the computerized data-base of the Professional Insurance Agents of Texas headquartered in Austin, Texas.

Each sample category was formed by its criterion requirements from the total membership roster of the Professional Insurance Agents of Texas, forming individual subgroups within the total population itself. Thus, the entire population was consequently categorized into the four previously described sample categories. It was the opinion of the researcher that this procedure would (1) assist

sampling efforts by providing a total population sampling stratum of each categorized population sub-group within the total population itself; (2) provide a sampling category verification check by means of comparison of the category coded response form by the researcher with the collected data from the questionniare; and (3) assist mailout efforts in the major study based on the number of responses per category in the pilot study.

Specific sampling procedures included the following: Duplications occurring among the four categories were subsequently eliminated during the selection process, and additionally needed samples were in turn selected from the remaining population in that particular category. Sampled subjects were then selected by the randomized systematic selection process within each sample category's population grouping. Additional responses above the necessary equal n per category were eliminated by this selfsame process. A large effect (.40) was assumed by the researcher, and the power tables were used to select a power of .80 at the .05 level of confidence which necessitated 21 subjects per cell category (21 n) yielding a total subject N of 84 which would be required for the study.

## Pilot Study

In order to enhance the validity and reliability of the "researcher-developed" instrument, a pilot study was conducted for this purpose. It was arbitrarily decided by

the researcher that a total mailout of 100 would be made, 25 equally from each of the respective four categories. In support, it was reasoned that it would be "theoretically" possible to achieve the 84 subjects reguired even in the pilot study given this numerical quantity if those sampled responded sufficiently (i.e., an 84% response-rate).

In addition, it was hoped that the particular numerical sample chosen would yield sufficient responses to establish viable data. Research data from such a trial-run could be used to (1) enhance validity and/or reliability by suggesting any needed modifications to the instrumentation or procedures currently being employed; and (2) indicate the number of mailouts necessary by category for the main mailing based on response-rates of the pilot study.

A cover letter (Appendix E) was enclosed with the instrument to explain the purpose of the study and to indicate that permission to conduct the study had been granted under the auspices of the Society of Certified Insurance Counselors and Dr. William T. Hold, national president. A request to complete the instrument was included, with a promise to send a factual summary of the findings to those participating in the study. Letter quality word-processing was used to produce the cover letter for a more professional and personalized effect. Each instrument was numerically coded to each mailee's name to both identify and verify the respondent with a minimum of ease by classification, and to more easily identify non-respondents for

future follow-up as may be deemed necessary. In order to encourage efficient initial responses, a preaddressed, postage-paid envelope was provided with a request for returning the survey form within seven days. A total of 52 responded (52%) well above an anticipated 30%, and 5 were returned due to incorrect addresses. Thus, 57 (57%) of the 100 mailees were accounted for, leaving only 43 who did not respond. Due to the high initial response-rate yielding sufficient data for the pilot study, a second follow-up request letter, though anticipated, was not implemented. The small-group statistics obtained was considered sufficient by the researcher for the purposes of the pilot Based on the power tables, the statistical sample study. size was 23.8% of that anticipated in the major study and involved a power of .07.

# Results of the Pilot Study

A 2 X 2 two-way ANOVA was used to analyze the data where the two independent variables, with two levels of each, were the the achieved levels of professional continuing education by group (1 = CIC Designate; 2 = Non-CIC Designate). The second-levels of the independent variables consisted of formal academic educational achievement (3 = Degreed; 4 = Non-Degreed). The dependent variable was the overall composite "attitude-score" from the administered researcher-developed instrument used in the study (Appendix G). A test of the interaction between the independent var-

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iables and their second-levels (i.e., ROWS X COLUMNS) was found to be not significant (F = 3.15); (df = 1, 16); (P >.05) where the critical value is 4.49.

The test for main effects indicated that the CIC Designate grouping was significant (critical value = 4.49) over the Non-CIC designate grouping (F = 12.04); (df = 1, 16); ( P  $\langle$  .05). Also significant were the following post hoc comparisons between unconfounded means: CIC, Degreed, to Non-CIC, Non-Degreed, ( $\overline{x}$  difference = 4.00); (df = 4, 16); (P  $\langle$  .05) where the critical value is 15.75. For confounded means, the following were found significant: CIC, Non-Degreed, to Non-CIC, Non-Degreed, ( $\overline{x}$  difference = 20.40); (df = 8, 16); (P  $\langle$  .05) where the critical value is 19.06.

The post hoc comparisons between the Degreed and Non-Degreed levels of the independent variables were found not significant (F = 0.56); (df = 1, 16); (P > .05). Also, the remaining groups compared were found not significant: CIC, Degreed, to Non-CIC, Degreed, ( $\overline{x}$  difference = 10.60); (df = 4, 16); (P > .05); CIC, Non-Degreed, to CIC, Degreed, ( $\overline{x}$ difference = 4.00); (df = 8, 16); (P > .05); Non-CIC, Degreed to Non-CIC, Non-Degreed, ( $\overline{x}$  differrence = 9.8); (df = 8, 16); (P > .05); and CIC, Degreed, to Non-CIC, Degreed, ( $\overline{x}$  difference = 6.60); (df = 8); (P > .05).

A measure of the strength of association for the main effects was determined less than appreciative (.16) for the ROWS (CIC Designates compared to Non-CIC Designates). An

examination of the group means indicated that the CIC grouping scored the highest attitude toward learning ( $\overline{x}$  = 31.4) with the Non-CIC grouping scoring the lowest ( $\overline{x}$  = 17.9) of the four major groupings of the independent variables and their second-levels. CIC, Non-Degreed, ( $\overline{x}$  = 33.4) outscored CIC, Degreed, ( $\overline{x}$  = 29.4), as well as the two remaining groups, Non-CIC, Degreed, and Non-CIC, Non-Degreed, ( $\overline{x}$  = 22.8; 13.0, respectively). The Degreed CIC group ( $\overline{x}$  = 29.4) outscored Non-CIC, Degreed, and Non-CIC, Non-Degreed, ( $\overline{x}$  = 22.8; 13.0, respectively). Non-CIC, Non-Degreed, ( $\overline{x}$  = 22.8; 13.0, respectively). Non-CIC,

# Collection of Data

The collection of data for the main study was acquired in the same manner as the pilot study. The main mailout consisted of 240 survey forms being mailed predicated on the previous response-rate experience of the pilot study per category. Due to adequate responses, a follow-up letter to non-respondents was not implemented. Results yielded an adequate number of responses per subject category, with additional responses above 21 being randomly eliminated. The original responses were as follows:

Group Category	Number	Responding
(1) CIC Designates, Degreed		38
(2) CIC Designates, Non-Degreed		33
(3) Non-CIC, Degreed		27
(4) Non-CIC, Non-Degreed		23
	_	

Total 121

## Selection of Instrumentation

The survey instrument utilized in this study was developed by the researcher commensurate with the literature in this area. The theoretical frameworks utilized in its construction were based on the concepts proposed by Seaman (1968); Osgood, Suci, and Tannenbaum (1957); Grotelueschen and Caulley (1977); Fishbein, Martin, Icek, and Ajzen (1975); and Issac and Michael (1981). Other supporting literature included the works of Guilford (1936); Goode and Hatt (1952); Thurstone and Chave (1929); Pucel and Knaak (1975); Best (1981); and Jenkins and Russell (1958).

A background information questionniare (Appendix F), was also utilized to (1) verify the correct classification of the subject-responses relative to that sample category in order to minimize any possible sampling errors due to such improper classification, and (2) provide additional information for facilitating any future statistical analyses and correlational comprarisons which might be forthcoming from such a demographic data-base. No part of the demographic data collected was utilized in this study other than for verification of each sample category. Included, in this form were the following independent variables:

- 1. Sex
- 2. Employment affiliation
- 3. Primary job function
- 4. Date of birth
- 5. Years of professional experience completed
- 6. Formal education completed
- 7. Professional continuing education completed

# Method of Scaling

Based on the major precepts fostered by Osgood, Suci, and Tannenbaum (1957); Seaman (1968); and Fishbein and associates (1975), ten bipolar scales were selected from the Thesaurus Study of unrotated square root factor analysis conducted by Osgood and associates (pp. 53-61) after also reviewing other scales compiled by Russell and Suci (1958). An additional five undocumented scales were also determined after consultation with a member of the panel of experts. Criteria used in this selection process included (1) factorial composition; (2) practical relevance to the concept being tested; (3) semantic stability; (4) balance (i.e., representation of other dimensions besides "evaluative").

Particular emphasis was placed on those scales with the highest "loadings" on the evaluative dimension factor which have been indicated to best reflect the attitudinal measure for a single concept (Fishbein, Martin, IceK, and Ajzen, 1975). Emphasis, as well, was placed on selecting those scales with practical "face value" to the concept being tested (Issac and Michael, 1981). The principle design of the test was meant to be evaluative in character, testing only one concept in question. However, balance in the selection process was an important consideration as was inferred by Osgood and associates (1957). Scales were also randomly arranged to minimize the possibility of habitual response pattern effects by responding subjects.

#### Scoring

A Likert summated rating scale technigue was utilized with egual-interval scaling as was recommended by Issac and Michael (1981) to be the most appropriate scaling method in behavioral research. Accordingly, egual-interval scales tend to lend themselves well to obtaining variance which in turn facilitates mathematical tabulations as well as other statistical procedures. Although they had apparent reservations as to the validity of this method, Thurstone and Chave (1929), as well, preferred equal-interval scaling in their efforts to further the earlier efforts of Cattell in the measurement of attitude.

As suggested by Fishbein and associates (1975), bipolar scale values were used rather than unipolar due to the one concept being tested since "bipolar scoring leads to the same directional inference, but unipolor scoring does not" (p. 85). The seven whole-number numerical scores chosen ranged from -3 to +3, with "O" as the point of neutrality. Numbers were indicated directly on the instrument scaling as suggested by a member of the panel of experts to best elicit subject responses and minimize errors since they are more familiar to, and can easily be circled by, the respondent (checking unidentified "place-values" known only to the researcher can prove problematical). Actual scale positions depicting "intensity" and "direction," were developed from a modification of the Seaman (1968) study and are conceptually presented for the reader as follows:

#### (concept)

polar +3 +2 +1 0 -1 -2 -3 polar term <-----> term A

where the numerical positions represent the following:

(1)	extremely A	(7)	extremely B
(2)	quite A	(6)	quite B
(3)	slightly A	(5)	slightly B
(4)	neither A nor B; equally A and B		-

#### <u>Reliability</u>

In view of the quideline that an item-analysis is absolutely necessary in substantiating the reliability of such constructed instruments (Fishbein and his associates, 1975), Cronbach's (1951) formula was selected to accomplish this task. In defense, the Cronbach general formula is quite similar to the Kuder-Richardson formula 20 estimate of reliability, but compensates for cases which have a variable number of possible scores other than "O" or "1" such as is the case in the researcher-developed instrument utilized. Although there were no established coefficients concerning the reliability measures of the internal consistency of the instrumentation used, reliability was expected to be relatively high as opposed to other tests due to the uniformity of item difficulty in a relatively narrow range (Guilford and Fruchter, 1978). The formula served as the basis to calculate reliability factors for each scale as well as the overall instrument. Overall reliability for the instrument was calculated at .856.

Reliability for individual scale-items ranged from .710 to .933 in the pilot study. Operationally, item reliability of the instrument (pilot and main study) was achieved by:

 Developing an "item-score matrix" with appropriate subtotals for each of the fifteen scales by the respective sampling categories.

2. Summing all of the respondents' answers per scaleitem from the available matrix subtotals for a grand total.

3. Calculating an unbiased "item reliability" by adjusting each scale-item total from the grand total.

Reliability of individual scale-items was determined by calculating the variance in total score which could then be attributed to any internal inconsistencies. This particular variance was then expressed as a portion of the total variance of the the total score obtained.

On this basis, instrument reliability (.856) was considered substantial since it is the consensus among many statisticians that coefficients of approximately .90 or above are accurate estimates of reliability (Guildford and Fruchter, 1978). Item reliability varied on a per item basis from moderate to substantial (i.e., .710 to .933).

In summarizing, the following were used to establish reliability of the instrument and individual scale-items:

 An "item-score matrix" by sample category consisting of each respondents' overall scale-item test score by identification number, total test score, mean response, variance of response, and scale-item score sub-totals. 2. An "item-analysis summary" of each scale-item consisting of each scale-item by name, total scale-item scores, mean response, variance of responses, and item reliability.

3. An "instrument analysis summary" of the instrument consisting of cumulative total scores, overall mean score, and overall instrument reliability.

## Variables

The independent variables in this study consisted of the following, with groups 3 and 4 being differentiated second-levels of each of the two independent variables in groups 1 and 2:

 The existent attitude toward learning of those who are Certified Insurance Counselor Designates (CIC) in the identified population;

2. The existent attitude toward learning of those who are not Certified Insurance Counselor Designates (Non-CIC) and have not completed any program part thereof, nor hold any other similar professional continuing education designation(s) in the insurance industry within the identified population;

3. The existent attitude toward learning of those who possess a baccalaureate degree (Degreed) of formal academic education or more in the identified population;

4. The existent attitude toward learning of those who possess less than a baccalaureate degree (Non-Degreed) of formal academic education in the identified population.

5. The dependent variable of the study consisting of the composite "attitude scores" revealed by the researcherdeveloped instrument designed to measure the attitude of participants toward learning in the identified population.

An illustration of the factorial research design used in the study is presented in Figure 3 for the reader which visually depicts the relationships between the two independent variables (ROWS) and their two respective secondlevels (COLUMNS).

## Procedures for Analyzing Data

Statistical procedures were derived by utilizing the guidelines established by Linton and Gallo (1975), Guilford and Fruchter (1978), and Isaac and Michael (1981). The following questions were investigated in this study:

 What are the attitudes toward learning of those who are Certified Insurance Counselor designates (CIC) in the identified population?

2. What are the attitudes toward learning of those who are not Certified Insurance Counselor designates (Non-CIC), part thereof, nor any other similar professional designation in the identified population?

3. What are the attitudes toward learning of those who possess a baccalaureate or higher degree (Degreed) of formal education in the identified population?

4. What are the attitudes toward learning of those who possess less than a baccalaureate degree of formal edu-


Figure 3. Schematic Model of the 2 X 2 Two-Way ANOVA Factorial Research Design Utilized in This Study With its Independent Variables (CIC Designates and Non-CIC Designates); Their Second-Levels (Degreed and Non-Degreed); and Division Into Group Categories (Groups 1, 2, 3, and 4)

cation (Non-Degreed) in the identified population?

5. Is it possible to measure the attitudes of adult learners who are graduates of a professional continuing education utilizing the "semantic differential technique?"

The following statistical procedures were utilized to measure the attitudinal responses for each of the four categorized groups against the concept of "PROFESSIONAL CON-TINUING EDUCATION" in the 15-scale instrument developed:

a. A grouped frequency and percentage distribution table was constructed from the collected raw data.

b. Freguency polygons of the independent variables and their second levels were constructed based on derived data from the frequency distribution and percentage table.

c. A source table summary was developed from the test statistics used which included the Sum of the Squares (SS), degrees of freedom (df), Mean Squares (MS), and calculated-F values (F) of the interactive and main effects.

d. Post hoc tests were performed on those significant statistical findings involving the main effects.

e. A graph of the means was used to depict the interaction and relationships between the groupings and groups.

f. Item-score matrix and item-analysis summary tables of scores were developed with reliability coefficients.

g. A strength of association measure was used to ascertain the degree of relationship of significant findings.

h. An analysis summary of the statistical findings of the study was presented.

#### CHAPTER IV

## PRESENTATION OF FINDINGS

The purpose of this study as to identify possible causal relationship factors involved between the attitudes of adults and their participation in professional continuing education. Current literature suggests that there is a lack of research data which sufficiently explains adult attitudinal relationships toward learning and any subsequent behavioral characteristics that may be involved regarding the participation of adults in professional continuing education activities. The following sections addressed in the chapter include: (1) description of the population; (2) sampling methodology; (3) response-rates of participants; (4) presentation of data; and (4) summary.

#### Description of Population

The population of the study consisted of the entire membership of the Professional Insurance Agents of Texas (PIAT) headquartered in Austin, Texas. This professional insurance industry organization consists of approximately 22,000 members involved in management, customer service, sales, and various other professional employment capacities within the insurance industry in Texas. The Certified In-

surance Counselors (CIC Designates) sample category was likewise derived from the same source, and consisted of approximately 6,700 members within this parent population of which it is a substratum group.

The population information for the study was made available on April 25, 1985 (Appendix C) under the direction of Dr. William T. Hold, CIC, CPCU, CLU, National President of the Society of Certified Insurance Counselors, through its computerized data-base of member information.

#### Sampling Methodology

The entire population of the identified population was subsequently divided up into four categorized groups predetermined as follows:

- 1. CIC Designates, Degreed
- 2. CIC Designates, Non-Degreed
- 3. Non-CIC Designates, Degreed
- 4. Non-CIC Designates, Non-Degreed

Thus, the entire membership of the population was subsequently placed into one of these four categories through the computerized process employed to accomplish this task based on the category criterions. Each of the four substratum groups formed representing the population was then randomly sampled using the systematic selection technique. A proportionate sampling procedure by group category was utlized in the main study based on the response-rates of the pilot study to increase returns by respondents.

#### Response Rates of Participants

On September 23, 1985, 240 survey forms were mailed to the identified population substratum sample groups (Appendix E, F, and G). Enclosed was a cover letter stating the general purpose of the approved study under the auspices of the Society of Certified Insurance Counselors and national president Dr. William T. Hold, CIC, which solicited the cooperation of those sampled. As an incentive, a factual summary was promised to participants which would also be made available to members of the Society. In addition to the survey form containing directions and examples, a questionniare was enclosed to (1) verify correct responses by category, and (2) collect research data to be used for future analyses not a part of this particular research study. A preaddressed, postage-paid envelope was provided to encourage responses. Results were as follows:

1. 121 of the respondents returned completed and usable survey forms.

 3 returned forms which were determined incomplete or otherwise judged unusable by the researcher.

3. 13 envelopes were returned due to incorrect or insufficient addresses.

In summarizing, the response-rate of usable responses involved 50.4% (see p. 51) of the sampled population, with 6.7% being accounted for otherwise. Due to the high initial response rate, an anticipated follow-up letter to those not responding was not implemented. Excess responses above the 21 per cell category required for the sample size were also eliminated by the random systematic selection process.

#### Presentation of the Data

The research question dealt with in this study was the attitude differences of the sample groups in the identified population against the single concept of learning (i.e., "PROFESSIONAL CONTINUING EDUCATION PROGRAMS" in the insurance industry). The measure of attitudes consisted of the overall composite score of the administered researcherdeveloped instrument consisting of 15-bipolar adjective scales (Appendix G). Each scale within the instrument utlized a Likert-type rating scale ranging from -3 to +3. The summation of each respondent's scores of the 15 scaleitems was, in turn, considered representative of their overall attitude toward the tested concept, with -45 being the maximum negative attitude and +45 the maximum positive attitude scores measurable by the instrument.

### Statistical Hypotheses

The following statistical hypotheses were used in the course of this study:  $H_0$ :  $X_1 = X_2 = X_3 = X_4 = \dots \times 8$  for all groups and groupings;  $H_{\dot{A}} = X_i$ , for some i.

#### <u>Assumptions</u>

It was assumed by the researcher that the particular random sampling technique used in the selection of subjects

for the study was properly conducted for randomized subject selection, and that the groups in question were normally distributed. Homogeniety of variance was assumed based on "robustness." The two independent variables involving the subject group categories were independent of each other, as were the two second-levels of the independent variables.

#### Frequency and Percentage

A frequency and percentage distribution (TABLE I) was prepared based on the number of score responses to better illustrate scores, score ranges, and proportionment for the reader with regard to each of the four respective category samples. A 3-class interval was used after tallying the frequencies as recommended by some sources (Guilford and Fruchter, 1978). In addition, frequency polygons were subsequently developed to graphically depict the sample of individuals as a whole based on the groupings of the two independent variables and their two levels (Figures 4 and 5).

# <u>Statistical Analysis</u>

A 2 X 2 two-way Analysis of Variance (ANOVA) statistical procedure was used to analyze the research data in the study where the two independent variables were the dichotomous levels of completion and non-completion of professional continuing education by the following groupings: CIC Designates (Group 1 = CIC Designates, Degreed; Group 2 = CIC Designates, Non-Degreed); and Non-CIC Designates

# TABLE I

FREQUENCY AND PERCENTAGE DISTRIBUTION OF THE ATTITUDE SCORES OF THE FOUR GROUPS IN THE STUDY BY CATEGORY AND AS A PART OF TOTAL N (84) USING A 3-INTERVAL RANGE

Scores	Gro	oup 1	Gro	oup 2	Gr	oup 3	Gr	oup 4	Totals*		
(+/-)	(f)	(P)	(f)	(P)	(f)	(P)	(f)	(P)	(f)	(P)	
+45	0	0	0	0	0	0	0	0	0	0	
+41-44	0	0	1	4.8	0	0	0	0	1	1.2	
+37-40	4	19.4	5	23.8	0	0	2	9.5	11	13.1	
+33-36	1	4.8	2	9.5	2	9.5	7	33.3	12	14.3	
+29-32	4	19.0	5	23.8	2	9.5	3	14.3	14	16.7	
+25-28	4	19.0	4	19.0	З	14.3	2	9.5	13	15.5	
+21-24	6	28.6	2	9.5	1	4.8	1	4.8	10	11.9	
+17-20	1	4.8	1	4.8	З	14.3	2	9.5	7	8.3	
+13-16	1	4.8	1	4.8	′ 3	14.3	2	9.5	7	8.3	
+09-12	0	0	0	0	5	23.8	0	0	5	6.0	
+05-08	Ο	0	о	0	0	0	2	9.5	2	2.4	
+01-04	0	0	0	0	0	0	0	0	Ο	0	
-03-00	0	0	0	0	2	9.5	0	0	2	2.4	
-07	Ο	0	0	0	0	0	0	0	0	0	
Sums	21	100%	21	100%	21	100%	21	100%	84	100%	

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\* Expressed as a percent of total N (84)



Figure 5. Frequency Polygon of the Two Second Levels of the Independent Variable Samples (Degreed and Non-Degreed) With Their Respective Frequencies and Scores Graphed to Depict the Whole Population

(Group 3 = Non-CIC Designates, Degreed; Group 4 = Non-CIC Designates, Non-Degreed).

The second-levels of the independent variables were categorized by formal academic education achievement, i.e., degreed (bachelor's degree or higher attainment), or nondegreed (less than a bachelor's degree of attainment). The groupings used were as follows: Degreed (Group 1 = CIC Designates, Degreed; Group 3 = Non-CIC Designates, Degreed); Non-Degreed (Group 2 = CIC Designates, Non-Degreed; Group 4 = Non-CIC Designates, Non-Degreed).

The dependent variable was the total composite score of each respondent in the study. Individual scores were compiled by totaling the 15 scale-items for each response form resulting from the administration of the researcherdeveloped instrument (Appendix G) designed to measure attitude toward learning as herein operationally defined.

#### <u>Results</u>

The results from the statistical analysis of the data (TABLE II) are presented as follows:

A test of the interaction between the two independent variables (CIC and Non-CIC Designates) and their second levels (Degreed and Non-Degreed) as indicated by TABLE II was found to be not significant (F = 2.5); (df = 1, 80); (P > .05) where the critical value = 3.96.

2. The test for main effects indicated that the two independent variables by level of professional continuing

SECOND LEVELS (ROWS X COLUMNS); THE TWO INDEPENDENT VARIABLES (ROWS); AND THE SECOND LEVELS OF THE INDEPENDENT VARIABLES (COLUMNS)										
	(SS)	(df)	(MS)	(F)						
ROWS	917.0	1	917.0	11.9*						
COLUMNS	590.1	1	590.1	7.7*						
ROWS X COLUMNS	189.4	1	189.4	2.5						
ERROR	6,147.7	80	76.9							

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7,844.2

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TOTALS

ANALYSIS OF VARIANCE OF ATTITUDE SCORES TOWARD LEARNING

TABLE II

\*P < .05

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education was found to be significant (F = 11.9); (df = 1, 80); (P  $\langle .05 \rangle$  where the critical value = 3.96. Also significant were the second levels of the independent variables involving formal educational achievement (F = 7.7); (df = 1, 80); (P  $\langle .05 \rangle$  where the critical value = 3.96.

An examination of the means shows that the CIC Designate grouping (Groups 1 and 2) possessed the highest scores of the two independent variables (CIC Designates,  $\overline{x} = 29.3$ ; Non-CIC Designates,  $\overline{x} = 22.5$ ). In addition, the Non-Degreed grouping (Groups 2 and 4) scored higher than the Degreed Grouping (Groups 1 and 3) with the instrument ( $\overline{x} = 28.5$ ; x = 23.3, respectively). Non-CIC Designates, Degreed, were the lowest scoring of the groups ( $\overline{x} = 18.3$ ), followed by Non-CIC Designates, Non-Degreed, ( $\overline{x} = 26.6$ ).

# Post Hoc Results

Post hoc comparison tests were not performed on the interactive effects since the interaction between the two independent variables and their two levels was found to be not significant. Such comparisons were, however, performed on the main effects which were found to be significant between the two independent variables themselves, as was the case between the second-levels of the independent variables. Tukey's (a) tests for unconfounded and confounded means were used for this purpose (Linton and Gallo, 1975). The intergroup comparison results among the four groups are as follows: 1. For confounded means (neither same row or column): The results for the CIC Designates, Non-Degreed, ( $\overline{x} = 30.5$ ) compared to Non-CIC Designates, Degreed, ( $\overline{x} = 18.3$ ) were found to be significant ( $\overline{x}$  difference = 12.21); (df = 80); (P < .05) where the critical mean difference = 5.37). The results for CIC Designates, Degreed, ( $\overline{x} = 28.2$ ) compared to Non-CIC Designates, Non-Degreed, ( $\overline{x} = 26.6$ ) were found not significant ( $\overline{x}$  difference = 1.6); (df = 80); (P > .05) where the critical mean value difference = 5.37).

2. For unconfounded means (either same row or column): The results for the CIC Designates, Degreed, ( $\overline{x} = 28.2$ ) compared to Non-CIC Designates, Degreed, ( $\overline{x} = 18.3$ ) were found to be significant ( $\overline{x}$  difference = 9.9); (df = 80); (P < .05) where the critical mean value difference = 5.37. The Non-CIC Designates, Non-Degreed, ( $\overline{x} = 26.6$ ) compared to Non-CIC Designates, Degreed, ( $\overline{x} = 18.3$ ) were also found significant ( $\overline{x}$  difference = 8.3); (df = 80); (P < .05) where the critical mean value difference = 5.37. The results for the CIC Designates, Non-Degreed, ( $\overline{x} = 30.5$ ) compared to Non-CIC Designates, Non-Degreed, ( $\overline{x} = 26.6$ ) were found not significant ( $\overline{x}$  difference = 3.9; (df 1= 80); (P > .05) where the critical mean value difference = 5.37).

A table of the means and mean differences (TABLE III) pictorially depicts the relationship differences for the reader between the independent variables and their secondlevels which were obtained from the post hoc examination. In addition, a graph of the means may be found in Figure 6

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# TABLE III

# THE MEANS AND MEAN DIFFERENCES BETWEEN THE TWO INDEPENDENT VARIABLES OF THE STUDY AND THEIR TWO RESPECTIVE SECOND-LEVELS ILLUSTRATING THEIR RELATIONSHIP DIFFERENCES

	CIC Non-Degreed	CIC Degreed (28.2)	Non-CIC Non-Degreed	Non-CIC Degreed (18.3)
CIC Non-Degreed	i 0	2.3	3.9*	12.2*
CIC Degreed (28.2)	•	0	1.6	9.9*
Non-CIC Non-Degreec (26.6)	3	·	0	8.3
Non-CIC Degreed (18.3)				0



Figure 6. A Graph of the Means of the Two Independent Variables in the Study (CIC and Non-CIC Designates) and Their Two Second-Levels (Degreed and Non-Degreed) Showing Their Ordinal Relationships which illustrates the ordinal relationships between the two independent variables (CIC and Non-CIC Designates) in the study and their second-levels (Degreed and Non-Degreed).

#### <u>Reliability</u>

Reliability estimates were calculated based on the internal consistency of the collected data. Again, as in the pilot study, the Cronbach (1951) formula was utilized due to its apparent appropriateness over other possible formulae such as the Kuder-Richardson formula 20 (K-R formula 20), etc. Cronbach's general design (which is a modification of the K-R 20 formula) is particularly suited in situations where there are multi-variable scores other than 1 or 0 (Guilford and Fruchter, 1978).

Due to the extensive number of computations involved in such a item-analysis (based on the collected numerical data) to determine internal consistency for reliability purposes, only one of the four groups in the study was randomly selected for this computational function. As a representative sample involving an entire sample group within the study (and 25% of the collected data), it was thought by the researcher that this would provide a respectable basis for inferring any estimates of reliability at large involving the study and instrumentation aspects.

The overall composite reliability for the instrument was computed at .830. The item-analysis also revealed a range of reliability coefficients from .785 to .983 for the

15 scale-items. An item-score matrix was developed along with a table summary of the item analysis (TABLES IV and V, respectively) to illustrate this computational procedure and to provide additional attitude-score and reliability information on an "individual respondent" to "individual scale-item" basis.

### Strength of Association

A strength of association measure was used to estimate the degree of relationship of the significant findings found in the main effects. Due to the "equal n" of the four cell categories involved in the study, the Omega Squared formula coefficient was selected for this purpose. The results of these calculations are as follows: (1) .105 (10.5%) for the two independent variables; and (2) .064 (6.4%) for the second-levels of the independent variables.

# SUMMARY

As a result of the findings, it may be stated that (at the .05 level of confidence):

 There was no significant interaction between the independent variables (CIC and Non-CIC Designates) and their second-levels (Degreed and Non-Degreed).

2. The "attitude-score" recorded by the researcherdeveloped instrument used to establish the differences of attitudes toward learning was significant between the two independent variables, as well as their two second-levels.

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	a	D	С	đ	e	+	g	n	1	J	ĸ	Į	m	П	0	Sums
i	0	1	1	1	i	1	1	1	2	1	1	1	1	2	1	+16
2	-1	1	0	3	2	0	2	2	2	1	0	1	2	2	1	+18
3	-1	1	0	1	1	1	0	0	0	0	i	0	i	1	1	+7
4	-2	2	0	2	1	0	2	1	2	2	2	2	3	3	3	+23
5	-1	2	З	2	3	-1	3	3	3	2	2	3	Ũ	2	3	+29
6	0	2	2	3	2	2	3	3	2	2	2	2	2	2	2	+31
7	1	0	3	3	3	2	3	0	3	3	3	3	3	3	3	+36
8	-2	3	3	3	3	Ū	3	0	3	3	3	3	3	3	3	+34
9	-2	1	-2	2	2	0	2	3	1	-i	i	0	2	2	2	+13
10	0	2	2	3	3	0	3	3	3	3	3	3	3	3	3	+37
<u>i i</u>	0	2	З	З	2	0	3	2	3	3	3	2	3	3	2	+34
12	0	2	2	3	1	1	3	1	2	2	2	1	2	3	1	+26
13	2	2	0	3	2	2	3	2	3	2	2	З	2	2	3	+33
14	0	1	3	3	3	2	3	3	3	2	2	3	3	2	3	+36
15	-1	2	3	3	3	2	3	3	3	2	3	3	3	2	3	+37
16	1	0	2	3	2	2	3	2	3	3	2	2	2	2	2	+31
17	-1	1	-3	2	2	2	3	2	3	2	2	2	-2	3	3	+21
18	0	2	2	3	З	2	3	2	3	2	3	2	2	3	З	+35
19	-1	-2	-2	2	2	2	2	2	2	2	2	2	2	2	2	+19
20	-1	1	1	3	3	3	3	2	3	2	2	3	3	3	3	+34
21	-3	0	-2	1	1	-1	2	0	2	-2	2	3	3	2	0	+8
	$   \begin{array}{c}     1 \\     2 \\     3 \\     4 \\     5 \\     6 \\     7 \\     8 \\     9 \\     10 \\     11 \\     12 \\     13 \\     14 \\     15 \\     16 \\     17 \\     18 \\     19 \\     20 \\     21 \\   \end{array} $	$\begin{array}{c cccccc} & a \\ \hline 1 & 0 \\ \hline 2 & -1 \\ \hline 3 & -1 \\ \hline 4 & -2 \\ \hline 5 & -1 \\ \hline 4 & -2 \\ \hline 5 & -1 \\ \hline 6 & 0 \\ \hline 7 & 1 \\ \hline 8 & -2 \\ \hline 9 & -2 \\ \hline 7 & 1 \\ \hline 8 & -2 \\ \hline 7 & 1 \\ \hline 6 & 0 \\ \hline 7 & 1 \\ \hline 7 & -1 \\ \hline 8 & -2 \\ \hline 7 & -1 \\ \hline 7 & -1 \\ \hline 16 & 1 \\ \hline 17 & -1 \\ \hline 18 & 0 \\ \hline 19 & -1 \\ \hline 20 & -1 \\ \hline 21 & -3 \\ \end{array}$	a         b           1         0         1           2         -1         1           3         -1         1           4         -2         2           5         -1         2           6         0         2           7         1         0           8         -2         3           9         -2         1           10         0         2           11         0         2           12         0         2           13         2         2           14         0         1           15         -1         2           16         1         0           17         -1         1           18         0         2           19         -1         -2           20         -1         1           21         -3         0	a         b         c           1         0         1         1           2         -1         1         0           3         -1         1         0           4         -2         2         0           5         -1         2         3           6         0         2         2           7         1         0         3           8         -2         3         3           9         -2         1         -2           10         0         2         2           11         0         2         3           9         -2         1         -2           10         0         2         2           11         0         2         3           12         0         2         2           13         2         2         0           14         0         1         3           15         -1         2         3           16         1         0         2           19         -1         -2         -2           20         -1<	a         b         c         d           1         0         1         1         1           2         -1         1         0         3           3         -1         1         0         1           4         -2         2         0         2           5         -1         2         3         2           6         0         2         2         3           7         1         0         3         3           7         1         0         3         3           9         -2         1         -2         2           10         0         2         3         3           12         0         2         2         3           13         2         2         0         3           14         0         1         3         3           15         -1         2         3         3           14         0         1         3         3           17         -1         1         -3         2           18         0         2         2         3	a         b         c         d         e           1         0         1         1         1         1           2         -1         1         0         3         2           3         -1         1         0         1         1           4         -2         2         0         2         1           5         -1         2         3         2         3           6         0         2         2         3         2           7         1         0         3         3         3           8         -2         3         3         3         3           9         -2         1         -2         2         2           10         0         2         3         3         2           12         0         2         2         3         3           13         2         2         0         3         2           14         0         1         3         3         3           15         -1         2         2         3         3           16         1	a         b         c         d         e         f           1         0         1         1         1         1         1         1           2         -1         1         0         3         2         0           3         -1         1         0         1         1         1         1           4         -2         2         0         2         1         0           5         -1         2         3         2         3         -1           6         0         2         2         3         2         2           7         1         0         3         3         3         0           9         -2         1         -2         2         0         1         1           10         0         2         2         3         3         2         0           11         0         2         3         3         2         0           10         0         2         3         3         2         2           14         0         1         3         3         3         2	a       b       c       d       e       f       g         1       0       1       1       1       1       1       1       1         2       -1       1       0       3       2       0       2         3       -1       1       0       1       1       1       1       0         4       -2       2       0       2       1       0       2         5       -1       2       3       2       3       -1       3         6       0       2       2       3       2       2       3         7       1       0       3       3       3       2       3         7       1       0       3       3       3       0       3         9       -2       1       -2       2       0       2       2       0       3         10       0       2       3       3       2       0       3       1       1       3         11       0       2       3       3       2       3       3       2       3         12	a       b       c       d       e       f       g       h         1       0       1       1       1       1       1       1       1       1       1         2       -1       1       0       3       2       0       2       2         3       -1       1       0       1       1       1       1       0       0         4       -2       2       0       2       1       0       2       1         5       -1       2       3       2       3       -1       3       3         6       0       2       2       3       2       2       3       3         7       1       0       3       3       3       0       3       0         8       -2       3       3       3       0       3       3       0       3       3         10       0       2       2       3       3       2       0       3       2         11       0       1       3       3       2       3       3       1         13       2	a         b         c         d         e         f         g         h         i           1         0         1	SCALE-ITEMS*         a       b       c       d       e       f       g       h       i       j         1       0       1       1       1       1       1       1       1       1       2       1         2       -1       1       0       3       2       0       2       2       2       1         3       -1       1       0       1       1       1       0       0       0       0         4       -2       2       0       2       1       0       2       1       2       2         5       -1       2       3       2       3       -1       3       3       2       2         6       0       2       2       3       2       2       3       3       2       2         7       1       0       3       3       3       0       3 <t< td=""><td>a         b         c         d         e         f         g         h         i         j         k           1         0         1         1         1         1         1         1         1         2         1         1           2         -1         1         0         3         2         0         2         2         2         1         0           3         -1         1         0         1         1         1         0         0         0         1         1           4         -2         2         0         2         1         0         2         1         2         2         2           5         -1         2         3         2         3</td></t<> <td>SCALE-ITEMS*         a       b       c       d       e       f       g       h       i       j       K       1         1       0       1       <t< td=""><td>Scale         Scale         <th< td=""><td>a         b         c         d         e         f         g         h         i         j         k         l         m         n           1         0         1         1         1         1         1         1         1         1         2         1         1         1         1         2         1         1         1         1         2         2         1         0         1         2         2           3         -1         1         0         1         1         1         0         0         0         1</td><td>SCALE-ITEMS*           a         b         c         d         e         f         g         h         i         j         K         l         m         n         o           1         0         1         1         1         1         1         1         1         2         1         1         1         1         2         1         1         1         2         1         1         1         2         1         1         1         2         1</td></th<></td></t<></td>	a         b         c         d         e         f         g         h         i         j         k           1         0         1         1         1         1         1         1         1         2         1         1           2         -1         1         0         3         2         0         2         2         2         1         0           3         -1         1         0         1         1         1         0         0         0         1         1           4         -2         2         0         2         1         0         2         1         2         2         2           5         -1         2         3         2         3	SCALE-ITEMS*         a       b       c       d       e       f       g       h       i       j       K       1         1       0       1 <t< td=""><td>Scale         Scale         <th< td=""><td>a         b         c         d         e         f         g         h         i         j         k         l         m         n           1         0         1         1         1         1         1         1         1         1         2         1         1         1         1         2         1         1         1         1         2         2         1         0         1         2         2           3         -1         1         0         1         1         1         0         0         0         1</td><td>SCALE-ITEMS*           a         b         c         d         e         f         g         h         i         j         K         l         m         n         o           1         0         1         1         1         1         1         1         1         2         1         1         1         1         2         1         1         1         2         1         1         1         2         1         1         1         2         1</td></th<></td></t<>	Scale         Scale <th< td=""><td>a         b         c         d         e         f         g         h         i         j         k         l         m         n           1         0         1         1         1         1         1         1         1         1         2         1         1         1         1         2         1         1         1         1         2         2         1         0         1         2         2           3         -1         1         0         1         1         1         0         0         0         1</td><td>SCALE-ITEMS*           a         b         c         d         e         f         g         h         i         j         K         l         m         n         o           1         0         1         1         1         1         1         1         1         2         1         1         1         1         2         1         1         1         2         1         1         1         2         1         1         1         2         1</td></th<>	a         b         c         d         e         f         g         h         i         j         k         l         m         n           1         0         1         1         1         1         1         1         1         1         2         1         1         1         1         2         1         1         1         1         2         2         1         0         1         2         2           3         -1         1         0         1         1         1         0         0         0         1	SCALE-ITEMS*           a         b         c         d         e         f         g         h         i         j         K         l         m         n         o           1         0         1         1         1         1         1         1         1         2         1         1         1         1         2         1         1         1         2         1         1         1         2         1         1         1         2         1

## AN ITEM-SCORE MATRIX OF THE NON-CIC DESIGNATE, NON-DEGREED, GROUP ATTITUDE SCORES IN THE STUDY WITH INDIVIDUAL ITEM AND RESPONDENT TOTALS

TABLE IV

Sums <u>-12 26 21 52 45 22 53 37 51 36 43 44 43 50 47 +558</u> \*Letters represent the ordered scales of the instrument

# TABLE V

# A TABLE SUMMARY OF THE ITEM-ANALYSIS PERFORMED ON THE NON-CIC DESIGNATES, NON-DEGREED, GROUP IN THE STUDY INCLUDING RESPECTIVE DERIVED MEANS, SUM OF THE SQUARES, VARIANCES, AND RELIABILITY COEFFICIENTS

(In ordered arrangement)	x	Σ×	SD <sup>2</sup>	r <sub>tt</sub>
a. CHEAP-EXPENSIVE	0.57	27.04	1.29	.925
b. LEADING-FOLLOWING	1.24	23.86	1.14	.934
c. THEORETICAL-PRACTICAL	1.00	76.00	3.62	.785
d. GOOD-BAD	2.48	11.23	0.53	.971
e. MEANINGLESS-MEANINGFUL	2.14	12.58	0.60	.967
f. PLEASURABLE-PAINFUL	1.05	26.90	1.28	.926
g. WORTHLESS-VALUABLE	2.52	13.23	0.63	.965
h. UNTIMELY-TIMELY	1.76	23.86	1.14	.934
i. IMPORTANT-UNIMPORTANT	2.43	13.04	0.62	.966
j. INTERESTING-BORING	1.71	34.02	1.63	.905
k. SUCCESSFUL-UNSUCCESSFUL	2.05	12.90	0.61	.966
1. FOOLISH-WISE	2.10	19.81	0.94	.946
m. REPUTABLE-DISREPUTABLE	2.05	30.90	1.47	.915
n. POSITIVE-NEGATIVE	2.38	06.86	0.33	.983
o. DEGRADING-PRESTIGIOUS	2.24	17.86	0.85	.952
THE 21 COMPOSITE SCORES	26.57	1917.04	91.29	.830

3. As a result of the findings, the null hypotheses involving the two independent variables (CIC Designates and Non-CIC Designates) and their second-levels (Degreed and Non-Degreed), must be rejected due to their significance at the .05 level of confidence. Therefore, the alternate hypotheses must be accepted for these variables and their respective groupings.

4. The post hoc examination for confounded means indicated that CIC Designates (Non-Degreed) compared to Non-CIC Designates (Degreed) were found significant at the .05 level of confidence. Regarding unconfounded means, CIC Designates (Degreed) compared to Non-CIC Designates (Degreed) were also found significant, as were Non-CIC Designates (Non-Degreed) compared to Non-CIC Designates (Degreed) at the .05 level of confidence. No other group comparisons were found to be significant at the .05 level of confidence.

5. The strength of association measure used indicated a less than appreciable degree of association between the the two independent variables or their two second levels in the study. Results also suggest that there appears to be a stronger degree of association between the two independent variables than there is between the two second-levels of the independent variables.

#### CHAPTER V

# SUMMARY, CONCLUSIONS, AND RECOMMENDATIONS

The purpose of this chapter was to present the summary, findings, conclusions, and future recommendations of the study. The sections presented in this chapter are: (1) summary of the study; (2) conclusions based on the study; and (3) future recommendations involving the study.

#### Summary

The purpose of this study was to compare the adult attitudinal differences, if any, between graduates of an officially recognized, professional continuing education program in the insurance industry and those who have not participated in such continuing education learning activities. The current literature suggests that there is an overall lack of quantitative and qualitative research data regarding adult attitudinal relationships toward learning and subsequent behavioral characteristics that may possibly be involved regarding participation in professional continuing education activities. Possible causal relationships have not been sufficiently explained.

The research base used in this study consisted of the Seaman (1968) and Groteleuschen and Caulley (1977) studies

which pursued similar concerns involving the relationship of attitudes of adults and their participation levels in continuing education. In addition, there was a substantial review of the literature involving attitudes and learning.

The population of the study consisted of the entire membership of the Professional Insurance Agents of Texas (PIAT), a professional organization designed for those employed in various professional employment capacities in the Texas insurance industry. A population sample of 240 was drawn, based on the results of an earlier pilot study involving a sample of 100.

The independent variables of the study involved the various levels of professional continuing education. One independent variable consisted of those who had received the Certified Insurance Counselors Designation (CIC), a professional continuing education program designed for insurance personnel. The other independent variable consisted of those who had not completed any such professional continuing education in the insurance industry.

The survey instrument utilized in this study was developed by the researcher based on the earlier theoretical constructs proposed by Osgood, Suci, and Tannenbaum (1957) et al. involving the "semantic differential technigue." The instrument, with its attitude-scale composition, was constructively criticized by a panel of experts comprised of a broad cross-section of experts in adult and higher education, and those in training in business and industry.

As a result, the study experienced a 50.4 % (121) response-rate from the sampled population. Additional responses above 84 (21 per group category were required based on the statistical procedure) were eliminated using the random systematic selection process.

#### Conclusions

The results from the study indicated the following deductions by the researcher:

1. Those who are "CIC Designates" in the identified population possess a significantly more positive attitude toward learning (as operationally defined and measured by the researcher-developed instrument) than those who are "Non-CIC Designates" in the study.

2. Those who are "Non-Degreed" in the identified population possess a more positive attitude toward learning (as operationally defined and measured by the researcher developed instrument) than those who are "Degreed" in the study.

3. Those who are "CIC Designates, Degreed," in the identified population possess a more positive attitude toward learning (as operationally defined and measured by the researcher-developed instrument) than those who are "Non-CIC Designates, Degreed or Non-Degreed," in the study.

4. Those who are "CIC Designates, Non-Degreed," in the identified population possess a more positive attitude toward learning (as operationally defined and measured by the researcher-developed instrument) than any other of the four groups in the study.

5. It is possible to measure adult attitudes toward learning (as operationally defined) utilizing the "semantic differential technique" with some degree of validity and reliability based on the theoretical constructs proposed by Osgood, Suci, and Tannenbaum (1957) et al.

In summarizing, the findings of the study were substantially supported and confirmed by the literature in this area (Seaman, 1968 et al.). Three of the five hypotheses in the study were supported by the findings and must therefore be accepted as indicated in the previous conclusions. However, there appears to be a contradictory finding of the study based on the literature which infers that those with more education possess a more positive attitude toward learning. Accordingly, it was hypothesized in question form by the researcher that those who have completed more formal academic education possess a more positive attitude toward learning (as herein operationally defined). Such was not borne out by the investigation as conducted and concluded. In both of the second-levels of the two independent variables (degreed and non-degreed) it was found that those with less formal academic education, not more, possessed a significantly more positive attitude toward learning. The two hypotheses involving these levels of the independent variables must therefore be rejected in this particular study.

#### Recommendations

Based on the findings, the researcher makes the following recommendations:

1. A replicative study of similar nature should be performed to further confirm the findings of this and that of potential future studies. Included, should be sampling procedures which utilize methodologies involving large, randomized samples (30 n per cell category minimum). Other population bases may be worthy of consideration as well, with contrastive comparisions to be made with the findings of this study. The gathering of additional empirical and normative data in this area is strongly recommended.

2. Additional applications involving the use of the instrumentation should be conducted. Included, should be appropriate modifications of the instrument as may be necessary in accordance with the intent of the study and characteristics of the population to be studied. Special emphasis should be placed on developing further validity and reliability of the instrument commensurate with acceptable methodologies and current literature available in this particular area.

3. An area strongly indicating further investigation is the apparent conflict of the findings of the study with literature involving those who are non-degreed apparently possessing a more positive attitude toward learning than those who are degreed. The literature states that those who possess more formal education, rather than less, pursue

further education to a greater extent during adult life. Education breeds the desire for more education. One might reasonably infer, as did the researcher in this study, that those with more formal education have a more positive attitude toward such learning activities involving professional continuing education than those who possess less education. The findings of this study do not support this particular postulate. Do those who are degreed actually possess a more negative attitude toward learning, or is this aspect due to other explicatives such as constructive criticism of the type, content, or practical-orientation of the professional continuing education selected in this particular study? It is highly recommended that this seemingly paradoxical phenomenon resulting from this study be thoroughly investigated and sufficiently explained.

4. Future implications of the study involve, among other aspects, the need to thoroughly analyze the demographic data obtained from the general questionniare form conducted for reporting purposes only, and which was not a part of this study other than being used for verification of group categories. Perhaps such data could provide valuable information or insight into the findings of this study. For example, what are the attitude differences toward learning with sex as a factor? What about age? Could it be that those with more professional experience have a more positive attitude toward learning? What would be the attitudinal differences, if any, toward learning

between those with undergraduate degrees as compared to those with graduate degrees...or others? Is employment capacity or organizational affiliation an influencing factor? Many questions still remain and need to be specifically addressed.

5. The value and future application of the information gained from this study appear, in the researcher's opinion, to be substantial. For example, such instrumentation and procedures developed and used in the study may have further applications into future research into this problem area as previously stated, or, have appropriate applications in ongoing "action-research" projects such as may exist in business or industry. Such information might prove to be of benefit to those charged with the responsibility for determining pre-selection criteria of new-hires or their training needs. Possibly, it may serve as a basis for hiring new employees where continually learning new job skills is a major requisite. It could also be used in predetermining the learning readiness of existing employees being considered for, or those already involved in, company training programs. Lastly, such methodologies could be used for gathering marketing research data by educational or training organizations desiring to analyze their market in order to improve their marketing strategies or instructional approaches commensurate with the needs or learning receptiveness of their market clientel.

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APPENDIX A

# CERTIFIED INSURANCE COUNSELOR PROGRAM

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3 - C - C

# Independence Means Determining Your Own Destiny.

THE SOCIETY OF CENTRICO INSUMMALE CONTRACT OF

# A Continuing Education Program

What do the letters "C.I.C." stand for? "C.I.C" means Certified Insurance Counselor. It is usually written as simply CIC.

What is a Certified Insurance Counselor?

A Certified Insurance Counselor is an insurance professional who has demonstrated his competence through a combination of experience, formal training, and a series of rigorous written examinations covering all major fields of insurance and agency management.

#### How does an individual become a CIC?

An individual becomes a CIC after he has attended a series of five highly specialized and advanced formal institutes and has passed five separate written examinations.

#### Who awards the CIC designation?

The designation CIC is awarded by the Society of Certified Insurance Counselors, a national non-profit organization dedicated to professional insurance education.

Suppose an individual "misses" a particular institute; must he wait a whole year to take it? No. The CIC program is national in concept and the institutes are held at different times of the year Any one may be attended and credit is given toward successful completion of all five institutes. You may attend one of the institutes anywhere else in the country.

#### What are these five seminars?

 COMMERCIAL PROPERTY COMMERCIAL CASUALTY AGENCY MANAGEMENT PERSONAL LINES • LIFE & HEALTH

- Do all five of these seminars have to be attended during one calendar year to get the CIC designation? No, all five must be attended and passed within FIVE years. All, however, could be taken in one year depending on the individual's knowledge, dedication, and conflicts with the schedule of the various seminars.
- is there any order in which the five seminars must be taken?

No. They can be attended in any order so you can begin your CIC education almost anytime.

Does a person have to be a member of the association to sign up for one or more of the institutes? No. The only requirement is that the individual must be a licensed agent.

#### Is an individual a CIC for life?

No. To be entitled to use of the CIC designation, the individual must continually update his insurance knowledge by attending at least one James K. Ruble Seminar or state sponsored institute each year

#### What does working with an individual holding the designation CIC mean to the insureds?

It means that the insured is working with an individual who recognizes that a professional insurance and risk management service requires a continuing professional education. It means that the insured can count on the CIC having a greater knowledge of his problems.

> Some people never stop learning. They are the men and women who seek the best. They are professionals.

APPENDIX B

PERMISSION REQUEST TO CONDUCT STUDY

1810 Thompson Avenue Dodge City, Kansas 67801 January 5, 1985

Dr. William T. Hold, CPCU, CLU, CIC The Society of Certified Insurance Counselors 3630-C North Hills Drive Austin, Texas 78731

Dear Dr. Hold:

This letter is in response to my telephone call yesterday regarding the type and number of listings that I would need to conduct my research.

Specifically, I would need the four categories listed below to be chosen at random. I am not aware of the capabilities of your computer system in this regard, and I hope that this poses no problems.

The subjects would have to be chosen, randomly, given any category listing that a sample needs to be drawn from. This systematic selection process would consist of determining the total listing of any category and dividing it by 60 to determine which "nth." term needs to be selected.

SAMPLE CATEGORIES NEEDED: (60 SAMPLES EACH)

- 1. Non-CIC, CPCU, CLU, etc. (i.e., non-completers of any recognized professional education program)
- 2. CIC-Designates
- 3. College Graduates (i.e., those who have completed a bachelor's degree or higher)
- 4. Non-College (i.e., those who possess less than a bachelor's degree. This would include those who have only completed high school or GED, as well as those who possibly have a two-year college degree.)

Ideally, the subjects should be chosen from as wide a geographic area as possible such as nationally (e.g., at least 1 from state, etc.). If not, a region (e.g., the southwest, 4-state area, etc., would be acceptable).

Thanks in advance for your help in this regard. If you have any questions, please feel free to contact me.

Dennis M. Neil

Phone: 316-225-1321, #300
# APPENDIX C

## PERMISSION APPROVAL TO CONDUCT STUDY



# SOCIETY OF CERTIFIED INSURANCE COUNSELORS

National William T. Hold, Ph.D., CIC, CPCU, CLU President 3630-C North Hills Drive Austin Texas 78731 512 345-7932 April 25, 1985

Mr. Dennis M. Neil Associate Professor of Business Technology Coordinator of Insurance Technology Dodge City.Community College 2501 North 14th Avenue Dodge City, KS 67801

#### Dear Dennis:

Enclosed you will find a printout with the names and addresses of the various individuals to be included in your study. As agreed, we have provided you with the names of the entire population of Texas CIC participants. You will note that the same individuals appear in several listings. This results from the fact that the categories you chose are not mutually exclusive. You should also note that the listings have been provided in alphabetical order.

I have marked each listing to indicate into which category they fall:

- #1 no designations.
- #2 CIC designees.
- #3 those with college degrees.
- #4 no college degree.

Dennis, allow me to cauthon you that only the top page of each group has been labeled. If the cover page is lost there will be no way to determine which group the individuals fall within. You might wish to immediately label each and every page of each group.

In order to avoid any misunderstanding, I will need to review and approve the letter which you send out to the individuals included in your study. Until such letter is approved, we cannot allow you to utilize this material. I would very much appreciate it if you would initial a copy of this letter and return it to me.

Sincerely,

William T. Hold, CIC President

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# APPENDIX D

### PANEL OF EXPERTS: INSTRUMENT VALIDITY

#### PANEL OF EXPERTS: INSTRUMENT VALIDITY

Dr. Eddie D. Estes, President Western Kansas Manufacturers Association P.O. Box 1382 Dodge City, KS 67801

Dr. Ralph G. Field, Head Department of Adult & Occupational Education Kansas State University Manhattan, KS 66506

Mr. Richard Foulke, Personnel Director & Vice President Alliance Insurance Companies (Educational Consultant for Certified Insurance Counselors) 1122 North Main McPherson, KS 67460

Dr. Michael W. Galbraith, Visiting Assistant Professor School of Occupational & Adult Education Oklahoma State University Stillwater, OK 74078

Dr. William T. Hold, CIC, CPCU, CLU President, Society of Certified Insurance Counselors 3630-C North Hills Drive Austin, TX 78731

Mr. Jim Lenz, Director D.C.C.C. Adult Learning Center 1201 First Avenue Dodge City, KS 87801

Dr. Kathleen McKinney, Assistant Professor Department of Sociology Oklahoma State University Stillwater, OK 74078

Dr. Larry C. Moeller Academic Director of Career Programs Dodge City Community College 2501 North 14th. Ave. Dodge City, KS 67801

Dr. Robert C. Newhouse, Professor Department of Administration & Foundations Kansas State University Manhattan, KS 66506

Mr. Donald L. Norris, CIC President, Norris Training Systems, Inc. 400 North Woodlawn - Suite #113 Wichita, KS 67208

#### PANEL OF EXPERTS, continued:

Dr. Jerry E. Parsons State Leader of 4-H and Youth Programs Cooperative Extension Service Iowa State University Ames, IA 50011

Dr. Ronald G. Payne Manager of Audio-Visual Center Oklahoma State University Stillwater, OK 74078

Dr. Michael F. Perl, Professor Department of Curriculum & Instruction Kansas State University Manhattan, KS 66506

Dr. Don F. Seaman Director of Interdisciplinary Education Texas A & M University College Station, TX 77843-4224

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SURVEY COVER LETTER

APPENDIX E

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1810 Thompson Avenue Dodge City, KS 67801 September 23, 1985

Dear \_\_\_\_:

You have been selected to be a VOLUNTARY PARTICIPANT in an independent major research study project which has been approved by the Society of Certified Insurance Counselors headquartered in Austin, Texas under the direction of Dr. William T. Hold, CIC. The information obtained will initially be used in a doctoral dissertation, with further analyses and research applications to follow which will be made available to the Society and you. As a part of this important effort, your input will provide valuable information vital to this study's success.

We will send you a FACTUAL SUMMARY of the research findings after the study is completed. The research form has been coded to enable us to follow up with non-respondents. Please return the questionnaire in the enclosed pre-addressed, postage-paid envelope within the next seven days.

PLEASE BE ASSURED THAT ALL INFORMATION WILL BE HELD IN CONFIDENCE!

You should find the enclosed survey form easy to complete, requiring only five minutes or less of your time. Your most sincere and candid responses will be deeply appreciated. Should you have any questions, please feel free to contact me at 316-225-1321, Ext. 300, or my business address below:

> Dennis M. Neil, Associate Professor Coordinator of Insurance Technology Dodge City Community College 2501 North 14th Avenue Dodge City, KS 67801

Thank you in advance for your attention to this request, and I shall look forward to your participation in this major study.

Sincerely,

Dennis M. Neil

APPENDIX F

SURVEY INFORMATION QUESTIONNIARE

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GENERAL INFORMATION QUESTIONNIARE:

(Please check the appropriate categories indicated. This information will be used for further statistical analyses and comparison purposes.)

SEX:	PRIMARY AFFILIATION:	PRIMARY FUNCTION:							
Maie	Company	Man agemen t							
Female	Agency	Customer Service							
	Other (specify be	lcw) Sales							
		Other (specify below)							
DATE OF BIRTH:									
Cmon chy	(Uay) (year)								
PROFESSIONAL EX	(PERIENCE: (Insurance emp	loyment only)							
years	/								
FORMAL EDUCATIO	N: (Check the highest le	vel of education received)							
High Sc	hool Diploma or GED	Bachelor's Degee							
1 year	of college	5 years of college							
2 years	of college	Master's Degree							
Associa	ite Degree	6 years or more							
3 years	of college	Other (please specify)							
4 years	of college								
PROFESSIONAL CONTINUING EDUCATION: (Insurance Association Programs)									
INS Prog	ram (Prin., Cas. Ins.)	AAI (all 3-parts)							
	ints 1 & 2)	CIC (all 5-parts)							
CLU (all	10-parts)	Other (please specify)							
CPCU (al	1 10-parts)								

APPENDIX G

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SURVEY INSTRUMENT

#### DIRECTIONS

The purpose of this survey is to measure the meaning of "PROFESSIONAL CONTINUING EDUCATION PROGRAMS" in the insurance industry according to new <u>you</u> feel about them. THIS IS NOT A TEST, THERE ARE NO RIGHT OR WRONG ANSWERS' If you are not candid and sincere as bossible in completing this form, you will be defeating its purpose.

THE CONFIDENTIALITY OF YOUR RESPONSES WILL BE RESPECTED. YOUR NAME WILL NOT BE RELEASED TO ANY OTHER PARTY WITHOUT YOUR SPECIFIC PERMISSION'

A series of descriptive words will be presented in which you are to circle the number on each line toward the word which you feel best describes the way you truly feel about "PROFESSIONAL CONTINUING EDUCATION PROGRAMS" in the insurance industry. Again, only "your" personal opinions are desired...

Examples of how to complete this form are given below. Please circle the number in the direction of the word which best represents how you feel toward such educational programs. (The larger the number you choose, the stronger degree of feeling you have that this word describes such programs, and the smaller the number you choose, the less degree of feeling in this regard.)

I personally feel that such "PROFESSIONAL CONTINUING EDUCATION PROGRAMS" are:

EKAMPLE #1:

З 2 1 0 2 З ----> ЫFAK STRONG <-----

(This response would indicate a "neutral" degree of feeling that neither of these words describe such "PROFESSIONAL CONTINUING EDUCATION PROGRAMS.")

EXAMPLE #2:

	з	2	1	Ũ	1	2	3	
PASSIVE	<							CTIVE

This response would indicate an "extremeley strong" degree of feeling that such "PROFESSIONAL CONTINUING EDUCATION PROGRAMS" are "ACTIVE.")

EXAMPLE	#3:	1						
	(3)	2	1	Ū	1	2	3	
USELESS							,	USEFUL

\This response would indicate an "extremely strong" degree or feeling that such "PROFESSIONAL CONTINUING EDUCATION PROGRAMS" are "USELESS.")

: personally	1961	that	EUCh .	FPUFES	SIUNAL (	JUNITAUT	NG EDOL	JALION	FROOMHITS ALL
CHEAP	/	:	3	1	0	1	3	3 	EKPENSICE
LEADING	<	3	2	1	6	1	2	3	FOLLOWING
THEORETICAL	( — —	3	2	1	0	1	2	>	PRACTICAL
C005		3	2	1	0	1	2	3	BAD
6000	<	3	2	1	0	1	2	з	ыл
MEANINGLESS	<	3	2		. <b></b>			>	MEANINGFUL
PLEASURABLE	<							>	PAINFUL
WORTHLESS	<	3 	2	1				3	VALUABLE
UNTIMELY	<	3 	2	1	0	1	2	3	TIMELY
IMPORTANT	<	3 	2	1	0	1	2	3	UNIMPORTANT
INTERESTING	<	3	2	1	0	1	2	3	BORING
SUCCESSFUL	<	3	2	1	0	1	2	3	UNSUCCESSFUL
FOOLISH	<	3	2	1	0	1	2	3	WISE
REPUTABLE	<	3	2	1	0	1	2	3	DISREPUTABLE
POSITIVE	; 	3	2	1	0	1	2	3	NEGATIVE
DECRADING		3	2	1	0	1	2	з (	PRECEICIONS
DEORHDING	·							>	LKE21101002

I personally teel that such "PPOFESSIONAL CONTINUING EDUCATION PROGRAMS" are:

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VITA

1.

Dennis Michael Neil

Candidate for the Degree of

Doctor of Education

### Thesis: ADULT ATTITUDES TOWARD LEARNING AS A DETERMINANT OF PARTICIPATION IN CONTINUING EDUCATION

Major Field: Occupational and Adult Education

Biographical:

Personal Data: Born in Carthage, Missouri, August 7, 1944, the son of Albert Lewis and Dorothy McGill Neil. Married to Mary Anne Burns on June 1, 1968.

- Education: Graduated from Carthage Senior High School, Carthage, Missouri, May, 1962; received Associate of Arts degree from Joplin Junior College, June, 1964; received Bachelor of Science in Business Administration degree from Pittsburg State University, January, 1967; received Master of Science degree from Kansas State University, May, 1980; received second Master of Science degree from Kansas State University in a combined Master's and Ph.D. Doctoral Program, December, 1982; completed requirements for the Doctor of Education degree at Oklahoma State University, December, 1985.
- Professional Experience: Teacher, Carl Junction Public Schools 1967-1968; Senior Sales Representative, Scott Paper Company of Philadelphia, 1968-1971; Teacher, Avilla Public Schools, 1972-1974; Sales Representative, Liberty Mutual Insurance Company of Boston, 1974-1978; Associate Professor and Coordinator, Dodge City Community College, 1978present; Graduate Research Assistant, Oklahoma State University, 1983.