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I am submitting herewith a dissertation written by Carolyn Jo Callahan Johnson entitled "The Relationship Between Gender, Potential for Change, and the Selection of Coping Strategies." I have examined the final copy of this dissertation for form and content and recommend that it be accepted in partial fulfillment of the requirements for the degree of Doctor of Philosophy, with a major in Education.

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THE RELATIONSHIP BETWEEN GENDER, POTENTIAL FOR CHANGE,
AND THE SELECTION OF COPING STRATEGIES

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ABSTRACT

Gender and the possibility for change were studied to determine their effect on the type of coping preferred in two hypothetical work situations. Twenty-five male and twenty-five female teachers from the same metropolitan high school served as subjects. Each participant read two scenarios of stressful school situations, representing a high and a low potential for change. Immediately following the reading of each scenario, subjects completed The Ways of Coping Checklist (Lazarus and Folkman, 1984), and answered the appraisal question and two evaluation questions. It was hypothesized that in the high change situation, males would use significantly more problem-focused coping than females and significantly less emotion-focused coping. Gender differences in the appraisal of the potential for change in the two situations was also expected with more males than females perceiving possibilities for action or a need for information. None of the hypothesized effects was supported by the data; however, further investigation revealed a significant main effect of the type of situation on certain types of coping. Significantly more problem-focused coping and self-blame were evident in the high potential for change situation, while detachment, focusing on the positive, and keeping to self were used significantly more in the low potential for change situation. The results are discussed with regard to Richard Lazarus' theory of stress and coping, and suggestions for further research are given.

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CHAPTER I

REVIEW OF THE LITERATURE

Cognitive-Phenomenological Theory of Stress and Coping

There is currently a strong interest in the processes by which people handle everyday life stresses. One major source of daily stress is the work place. This study is concerned with the ways people handle stress on the job. The study is based on a cognitive-phenomenological theory of stress and coping developed by Richard Lazarus and his colleagues (Coyne, Aldwin, & Lazarus, 1981; Folkman & Lazarus, 1980; Lazarus, 1966, 1981; Lazarus, Averill, & Opton, 1974; Lazarus & Launier, 1978). In this model, stress is defined as "any significant event in which environmental or internal demands (or both) tax or exceed the adaptive resources of an individual and endanger his/her well-being" (Lazarus & Launier, 1978, p. 296). Thus, stress arises through the particular relationship between the person and the environment. One's reaction to stress events is mediated by one's perception of the severity of the life event and one's ability to meet the demand. The person-environment relationship and the emphasis on coping as a process are the key features of the definition. This transactional perspective on stress and coping is dynamic and bi-directional. The person is viewed not as a passive responder, but through appraisal he or she becomes an active participant in determining the psychological outcome of the stressful event. The

person and the environment are constantly interacting and mutually affecting each other; neither can be the sole determinant of an effect since they maintain a reciprocal relationship.

It is likely that some type of self-selective process operates in most of the choices people make at each stage of the life cycle . . . each decision having significance for the vulnerability of the person to certain kinds of stressful experiences. In sum, we cannot sensibly consider the stress response as solely dependent on events external to the person, since humans are not passive responders to whatever happens. Rather, they perceive, evaluate, and therefore select and shape their environments to some extent, thus contributing to or preventing certain kinds of stress from ever happening (Lazarus & Launier, 1978, p. 295).

Lazarus identifies appraisal and coping as the two processes through which the person interprets the situation and his/her role in it. Appraisal is divided into primary and secondary appraisals. Primary appraisal deals with one's evaluation of well-being, or what is at stake, and is determined by several factors including values, beliefs, and goals. There are three forms of primary appraisal: 1) irrelevant, 2) benign-positive, and 3) harmful, stressful. An irrelevant appraisal occurs when the person has become aware of the event, but does not consider it significant for his/her well-being. It is neither threatening nor rewarding. A benign-positive appraisal is given by a person who regards an event as satisfying; no coping strategy is required to meet the demand. Appraisals of stressful or harmful can be further divided into three types: harm-loss, threat, and challenge. Harm-loss refers to damage that has already occurred, such as loss of

a job, a loved one, or an opportunity. A harm or loss that has not happened, but is anticipated, is termed a threat. The least negative of the stressful or harm appraisals is challenge. Although suggesting risk and difficulty, challenge emphasizes the positive tone, the possibility of growth or mastery.

Secondary appraisal differs from primary appraisal in that it is a person's appraisal of his/her possible coping resources. It addresses the question, "What can I do in this situation?" Coping resources, such as physical, social, psychological, and material assets are evaluated with respect to the demands of the situation (Folkman, 1984). Secondary appraisals shape the coping strategies used by the person in stress and also help in the formation of the primary appraisal. Primary and secondary appraisals influence each other, much like the reciprocal relationship of the person and environment. For example, if a person identifies a situation as challenging (primary appraisal) and selects a successful strategy for coping (secondary appraisal), the primary appraisal of the situation will then be changed. This feedback loop continues with reappraisals of the changed situation and further coping efforts.

Coping is the second process involved in the person-environment transaction. Lazarus defines coping as "efforts, both action-oriented and intrapsychic, to manage (i.e., master, tolerate, reduce, minimize) environmental and internal demands, and conflicts among them, which tax or exceed a person's resources" (Lazarus & Launier, 1978, p. 31). In Lazarus' paradigm, the two major types of coping are problem-focused

coping and emotion-focused coping. Problem-focused coping is action taken to alter one's own behavior, the environment, or both in order to deal with stressful situations. Actions taken to control the stressful person-environment relationship can be direct action, problem-solving or decision-making. Emotion-focused coping reflects either cognitive or behavioral efforts to relieve internal emotional distress and restore equilibrium. No evaluations are made as to which type is better or more mature. Strategies are evaluated only in terms of outcome, i.e., the extent to which the strategy helps the person manage, minimize or tolerate demands of the situation and regulate emotions.

Within the two main coping processes, four modes of coping are identified: information-seeking, direct action, inhibition of action, and intrapsychic modes. In the first mode, information-seeking, the individual appraises the situation to form a basis for action. The information gained may help the person to change the environment, change the self, understand past trauma, or affirm a decision already made. The second mode, direct action, includes all acting-out behavior aimed at changing the environment or regulating emotions. When the individual realizes that direct action could be detrimental, the third mode of coping, inhibition of action, might occur. Impulses are held back in the interest of social, moral, or physical limitations. In the fourth and final mode of coping, intrapsychic mode, Lazarus includes all cognitive processes that one uses to create a sense of control and to feel better about oneself. Examples include defense mechanisms (avoidance, projection, regression, etc.) and self-assurances.

The individual's decision in the choice of coping mode depends on environmental constraints and individual differences. Each situation has its own unique features which shape the appropriate actions, yet for persons in the same problem situation, different coping modes may seem appropriate. In effect, the proportion of problem- and emotion-focused coping varies according to the individual's appraisal of the situation and beliefs about his or her ability to make changes in the situation, self, or both. If the event is appraised as providing opportunity for personal control, theoretically, increased amounts of problem-focused coping will be expected compared to situations where little or no opportunities for change are perceived. On the other hand, greater use of emotion-focused coping is predicted in situations that are appraised as offering little or no opportunities for change compared to situations where some or many opportunities for change are perceived.

In summary, Lazarus' cognitive-phenomenological theory of stress and coping provides a transactional model for understanding the process involved when stress occurs in the relationship between the person and the environment. Its process-orientation allows for describing what the person thinks or does when faced with a specific situation that taxes or exceeds the person's adaptive resources. According to the theory, the person's reactions to stressful events are mediated by his/her perception of the severity of the event, the possibility for change in the situation, and his/her ability to meet the demand. The two major functions, appraisal and coping, are the transactional variables and the mediators of the interdependent person-environment relationship.

Current Relevant Literature

The review of the current relevant literature will be divided into two sections: literature relevant to gender differences in coping, and literature relevant to appraisal and gender differences in appraisal.

Gender Differences in Coping

Research based on Lazarus' definition of coping has shown that people use both problem- and emotion-focused coping in handling stressful events. To investigate how people cope with stress, Folkman and Lazarus (1980) analyzed the ways 100 adult community residents coped with the stressful events of daily living. Through monthly interviews and completion of the Ways of Coping Checklist (Lazarus & Folkman, 1984) on 13.3 episodes per participant, they found that 98% of the people used a combination of problem- and emotion-focused coping in stressful situations. In their 1985 study, Folkman and Lazarus compared the coping techniques of 108 undergraduate psychology students on three different occasions: two days before a college examination, five days after the exam, and two days before grades were announced. They found that 94% of the students used both problem- and emotion-focused coping.

While these studies indicated that people use both problem- and emotion-focused coping, several studies have shown that men and women differ in their preference for coping strategies. Studies consistently have found that women use more emotion-focused coping than men; studies examining gender differences in the use of problem-focused coping

however, have produced contradictory results. Some studies have found men to be more analytic and task-oriented than women, while other studies have shown women using more problem-solving strategies than men.

In their 1980 study, for example, Folkman and Lazarus examined gender differences in coping and found a significant difference in the contexts of reported stressful episodes. Women reported more stressful episodes relating to health and family, and men reported more stressful work episodes. In the three contextual areas of health, work, and family, men were found to use more problem-focused coping than women in the work area. No significant gender differences were found in emotion-focused coping. The authors suggested that the difference in problem-focused coping could be explained by the difference between jobs typically held by men and those held by women. Women are employed more often in jobs which allow few opportunities for problem-solving processes.

In an extensive study, Pearlin and Schooler (1978) studied areas of stress, methods of coping, and efficacy of coping modes in a sample of 2,300 Chicago residents. The contexts of inquiry represented four areas of daily living: marriage, parenting, economics, and occupation. Psychological coping resources (self-esteem, self-denigration, and mastery) and seventeen coping responses (e.g., substitution of reward, optimistic action, selective ignoring) were considered and compared as to their effectiveness in reducing stress in the four problematic areas

of daily life. Coping responses were categorized into responses that changed the situation and those that controlled the meaning of the experience. These functional categories are analogous to the problem-focused and emotion-focused coping categories defined by Lazarus.

In their examination of gender differences, Pearlin and Schooler (1978) found a pronounced imbalance between the sexes in the possession and use of effective coping resources and responses. Males more frequently employed responses that inhibited stressful outcomes, such as positive comparisons, exercise of potency, and optimistic action. These responses parallel three of Lazarus' problem-focused coping strategies: "I was in a similar situation before," "Stand my ground," and "Make a plan of action." Pearlin and Schooler found that such responses were associated with minimization of stress in the four areas of daily living. Selective ignoring was the significant response preferred by women in all four areas. Examples of this response category, "overlook spouse's faults" and "look for positive attributes," are analogous to Lazarus' emotion-focused categories: Emphasizing the Positive and Detachment. Selective ignoring was found to be slightly beneficial in the area of economics, but in the areas of marriage and parenting it tended to exacerbate stress. At work this response had insignificant effects. Although selective ignoring was the preferred coping response of women, negotiation and self-assertion versus passive forbearance were also used significantly by women and found to be effective in inhibiting stress in the marriage role only.

Also of interest to the current study is Pearlin and Schooler's conclusion that individual's coping interventions are most effective when dealing with problems in the areas of marriage and parenting and least effective when dealing with problems at work. The coping responses most used at work to handle stress were substitution of rewards, positive comparisons, and optimistic actions and selective ignoring; however, bivariate regression coefficient of stress on strain was not reduced by any of these four responses. This resistance to coping efforts appears throughout the study and leads Pearlin and Schooler to conclude that coping is least effective in areas such as work, where people have little personal control. These findings are not consistent with Folkman and Lazarus' (1980) findings, which indicated that work-related episodes had higher amounts of problem-focused coping than family- or health-related episodes. The fact that Pearlin and Schooler investigated how people typically dealt with relatively enduring sources of stress rather than areas where stress had been relieved or resolved may have affected the results.

Drawing upon another sample of Chicago residents, Ilfeld (1980) studied the sources of stress, coping means, and psychological status of 2,299 adults. In all four role areas studied, marriage, parenting, finances, and job, dominant patterns of coping were found to be "taking direct action" and "avoidance." Women more than men sought social support and employed rationalization/avoidance which were considered to be emotional forms of coping.

Two additional studies corroborating males' preference for problem-focused coping and females' preference for emotion-focused coping were conducted by Burke and Weir (1979) and Stone and Neale (1984). Burke and Weir (1979) found a male preference for problem-focused coping in a study of the coping responses of 85 husband-wife pairs. In stressful situations of daily living, men preferred to cope by problem-solving and talking with others, while women preferred emotional forms of coping: distraction, suppression, prayer, and meditation. In studying the coping differences of sixty married couples, Stone and Neale (1984) found that men used significantly more direct action in stressful situations than women. Women used a significantly greater number of strategies than men and more emotion-focused strategies: distraction, catharsis, relaxation, and religion.

A study conducted by Shinn and colleagues (1984) is of particular relevance to the present research because of the homogeneity of the participants' employment. Responding to Folkman and Lazarus' recommendation that to study gender differences in coping more rigorously, males' and females' coping behaviors should be studied in the same environment, Shinn et al. examined the effects of coping on the psychological strain and burnout of 141 human service workers. In the reduction of job strain, social support was shown to be significantly effective, and there was some indication of the ameliorative effects of problem-focused coping strategies as opposed to emotion-focused strategies. In examining gender differences, women were found to be

slightly higher on all measures (job stress, psychological and somatic symptoms, and coping) than men. No significant gender differences were found on any measures of individual coping, except level of social support. Women reported significantly higher levels of social support than men. The lack of gender differences in coping for this sample, all of whom were employed in human service professions (albeit different settings: private practice, university counseling centers, hospitals, etc.), lends support to Folkman and Lazarus' suspicion that apparent gender differences found in previous studies of coping may in fact be due to differences between the situations in which coping has been studied. In other words, differences in coping attributed to gender may be related more to context and familiarity of situation than to gender.

In the previous studies, emotion-focused coping was preferred by women and problem-focused coping was preferred by men. A number of studies, however, which support the preference for emotion-focused coping by women also show women using certain problem-focused coping strategies as often as, or more than, men. One such study was conducted by Billings and Moos (1981) to investigate the coping responses of 194 couples in stressful situations. Coping responses were classified into methods of coping: active cognitive coping, active behavioral coping, and avoidance. Lazarus' categories of problem- and emotion-focused coping were also employed. Statistically significant gender differences in coping showed women reporting more frequent use of active-behavior, avoidance, and emotion-focused coping than men. The use of active-behavioral

coping included taking some positive action, which is analogous to Lazarus' problem-focused coping. In active-cognitive coping and problem-focused coping, men and women did not differ significantly.

Women were also found to have higher problem-focused coping scores than men in two other studies. Heppner and his colleagues (1983) found women using more problem-focused coping than men on the Ways of Coping Checklist. Examining the relationship between self-perceived problem-solving efficacy and the use of problem-focused coping of 52 psychology students, Heppner found women using significantly more problem-focused coping, avoidance, and emotional support. In a study of 425 medical school students, Vitaliano and his colleagues (1985) found that women had significantly higher coping means than men on five scales of the Ways of Coping Checklist: Problem-focused, Wishful Thinking, Avoidance, Seeks Social Support, and Blamed Self.

Appraisal and Gender Differences in Appraisal

Another variable which affects coping is the individual's perception of the possibilities for change in the stressful situation. In Lazarus' model, this process is referred to as appraisal. Empirical evidence for the relationship between appraisal and coping has been provided by several of the studies discussed in the previous section. In Folkman and Lazarus' (1980) study of the ways 100 adults coped with stress, the situation and how it was appraised were the two most significant factors in determining whether problem- or emotion-focused coping was used. Episodes appraised as having the possibility for change, thereby

holding the potential for control, and those situations needing more information generated significantly more problem-focused coping. Episodes appraised as having to be accepted, thus not being amenable to change, generated significantly more emotion-focused coping. In the examination of gender differences in appraisal, males were found to use more problem-focused coping than females in situations appraised as requiring acceptance and needing more information. This finding led the authors to suggest that men may persevere longer than women in solving problems in stressful situations perceived as needing to be accepted or needing more information.

The influence of cognitive appraisal on coping was further investigated by Folkman and Lazarus (1985) with 108 undergraduate psychology students. Students were asked to describe their state of mind before and after an exam and again two days before grades were announced. Subjects used more problem-focused coping during the anticipation stage of the exam, while emotion-focused coping was more salient during the waiting-for-the-results period. These findings were interpreted as supporting Lazarus' theory, because in the preparation period the students thought they could do something constructive and used more problem-solving strategies for coping with their stress. After the exam, they felt that little could be done and the results would have to be accepted, thus explaining their use of more emotion-focused coping. Gender differences in appraisal were not reported in this study.

In the most recent study by Folkman and colleagues (1986), results from a sample of 75 couples studied over a six-month period corroborated

earlier findings regarding appraisal. In situations appraised as changeable, subjects used more problem-focused coping. In situations appraised as requiring more information, subjects sought social support and used more self-control and problem-solving. In situations appraised as having to be accepted and having to hold back, subjects used more emotion-focused strategies, such as distancing and escape/avoidance. There were no significant gender differences in secondary appraisal, but there were significant gender differences in primary appraisal: wives expressed concern for a loved one's well-being more often than their husbands did, while husbands showed concern about a goal at work more often than their wives did. All subjects also were found to use more problem-focused than emotion-focused coping in encounters at work.

Confirmation of the theoretical and empirical relationship between appraisal and coping was provided in studies by Vitaliano and his colleagues (1985) and Stone and Neale (1984) using the Ways of Coping Checklist. In Vitaliano's study of the coping behavior of medical students, situations appraised as "changeable" and "need to know more" produced more problem-focused coping than emotion-focused coping, and appraisals of "accept" and "hold back" yielded significantly more emotion-focused coping than problem-focused coping. The category, "Seeks Social Support," which contains mixed problem- and emotion-focused coping strategies, was also related to situations appraised as changeable. In their study of sixty married couples, Stone and Neale (1984) found that increased control over the problem was associated

with the use of fewer coping styles, while decreased control was associated with the use of more emotion-focused coping: catharsis and acceptance. In this study, however, the control question results could have been affected by the wording of the question which asked about control over the occurrence -- rather than the resolution -- of the problem.

Statement of Problem

Much of the research on stress and coping has been designed to identify both the situations that lead to stress and the particular techniques people use to cope with these situations. A secondary concern has been to identify the characteristics of individuals that influence their responses to stress. For example, it has been assumed that women and men cope differently. Bem (1974) and Pines and Aronson (1981) report that typical descriptions of coping characterize men as analytic and task-oriented and women as emotionally responsive and sensitive. Studies examining gender differences, however, have produced divergent results, with some results supporting the stereotype and others finding exactly the opposite. Some researchers theorize that these contradictions may be the result of investigation procedures (Folkman & Lazarus, 1980). For instance, men were often asked about stress on the job, while women were questioned about stress in the home (Burke & Weir, 1979; Folkman & Lazarus, 1980; Pearlin & Schooler, 1978; Stone & Neale, 1984). Even surveys questioning both men and

women about stress on the job pose difficulties when the men and women perform different kinds of work or are employed in different settings. In these studies, evidence for gender differences in coping have been confounded with familiarity of the situation and resulted in findings which reflect more about familiarity with the situation than the coping strategies of the subjects. Consequently, Folkman and Lazarus (1980) recommend that to examine gender differences in coping more rigorously, samples must be drawn from the same stressful situations.

The theoretical relationship between appraisal and coping preferences has earned strong support in the empirical studies of Folkman and Lazarus (1980, 1985, 1986) and Stone and Neale (1984) and Vitaliano et al. (1985). Unfortunately, with the exception of the early research of Folkman and Lazarus (1980), gender differences in appraisal have had little attention. The question of gender differences in appraisal is relevant in the study of coping to determine if coping preferences, assuming they do exist, are related to perception of change, i.e. control, or some other variable such as coping skill deficit. In addition to the absence of studies examining gender differences in appraisal, no studies have examined the perception of change by directly manipulating the situation.

Statement of Purpose

The purpose of this study is to examine the effects of gender and characteristics of the situation on coping. Richard Lazarus' cognitive-

phenomenological theory of stress and coping provides the theoretical basis to explore two major questions:

1. Do males and females in similar job situations differentially use emotion-focused and problem-focused coping for high and low change situations?

2. If there are gender differences in the type of coping strategies selected for high and low change situations, do these differences reflect different appraisals of the situation?

Two issues, familiarity and changeability, are examined in the first question. In previous studies of coping these issues have posed difficulties because evidence for gender differences have been confounded with familiarity of situation. If familiarity with the environment does affect the selection of coping strategies, then holding the situation constant should eliminate familiarity as a significant variable. To eliminate the confounding of gender with familiarity, all of the participants in the present study came from the same working environment, and only coping behaviors used in that setting were examined. Secondly, in the current research the possibility for change was deliberately manipulated to test directly the assumption that the type of coping response is related to the person's perception of changeability in the situation. Theoretically, in high change situations a preference for problem-focused coping should be evident, whereas in low change situations emotion-focused coping should be preferred.

If appraisal of the situation is a critical factor in coping as Lazarus suggests, then evidence of this should be found when familiarity

is held constant and changeability is manipulated. This will be tested in the second question, which examines the appraisal process of males and females as it affects coping. Do men and women perceive differently the possibility for change in situations? If there are coping differences, are they a function of appraisal differences?

Briefly summarizing, the study is an investigation of the coping preferences of twenty-five males and twenty-five females in two hypothetical, stressful work situations representing high and low possibilities for change. The two work situations were selected from ten scenarios that had been rated for realism, amount of stress, and possibility for change.

Hypotheses

The following hypotheses were tested in this research.

1. In high change situations, males will use significantly more problem-focused coping than females.
2. In high change situations males will use significantly less emotion-focused coping than females; no gender differences are expected in either mode when the situation is one of low potential for change.
3. Males will appraise both high potential for change and low potential for change situations as having more possibilities for action or needing more information than females.
4. Females will appraise both high and low potential for change situations as having to be accepted or requiring one to hold back from acting more than males.

CHAPTER II

METHODOLOGY

Subjects

Participants were twenty-five male and twenty-five female teachers from the same Los Angeles public high school who volunteered to participate. To ensure homogeneity among subjects with respect to teaching experience, only teachers with a minimum of three years' experience were asked to volunteer. Subject selection was restricted to one school to control for familiarity of situation and to eliminate a confounding of gender with familiarity of situation if more than one school were to be used.

Materials

The Ways of Coping Checklist (WCC) (see Appendix A) provided data on the dependent variables. The WCC (Lazarus & Folkman, 1984) measures the process of coping in one specific stressful situation. The revised 66-item self-report contains a broad range of cognitive and behavioral strategies people use to manage stressful demands. They include items of defensive coping (e.g. avoidance, isolation, intellectualization), information-seeking, problem-solving, inhibition of action, wishful thinking, and direct action. The WCC is answered with a specific stressful event in mind, and answers are recorded on a four-point Likert scale (0 = does not apply; 1 = Used somewhat; 2 = Used quite a

bit; 3 = Used a great deal). Scores for each scale are found by summing ratings.

Several studies have been done to assess reliability of the WCC (Folkman & Lazarus, 1980 and 1985; Parkes, 1984; Revenson, 1981; Vitaliano et al., 1985). All studies report high reliability with alpha coefficients ranging from .70 to .89. In the study by Folkman and Lazarus (1980), the mean alpha across two administrations was .80 for the problem-focused subscale and .81 for the emotion-focused subscale. Modest correlations were found between the problem-focused and the emotion-focused subscales (mean $r_2 = .19$). The factor analytic studies cited above in support of the reliability of the WCC also support the scale's validity. Studies with various samples have generated findings consistent with the theory (Folkman & Lazarus, 1980, 1985; Heppner et al., 1983; Lazarus & DeLongis, 1983; Revenson, 1981). In a critical review of the WCC, Tennen and Herzberger (1985) conclude that "it is the best constructed instrument of its kind" (p. 695).

The Ways of Coping Checklist categorizes coping strategies into eight scales which are then further grouped into two types of coping: problem-focused and emotion-focused. The problem-focused category includes items that are directed toward changing the problem, and the emotion-focused category includes items directed at regulating emotional responses. The following is a brief description of each scale and its corresponding alpha.

Scale 1 - Problem-focused Coping -- ($\alpha = .88$). Measures coping where direct action is taken to change the person-environment relationship: "Stand my ground and fight for what I want."

Scales 2, 3, 5, 6, 7, and 8 - Emotion-focused Coping -- Contain defensive processes used to alter emotional reaction to demanding situations.

Scale 2 - Wishful Thinking -- ($\alpha = .86$). "Hope a miracle will happen."

Scale 3 - Detachment -- ($\alpha = .74$). "Try to forget the whole thing."

Scale 5 - Focusing on the Positive -- ($\alpha = .70$). "Rediscover what is important to me."

Scale 6 - Self-blame -- ($\alpha = .76$). "Criticize or lecture myself."

Scale 7 - Tension-reduction -- ($\alpha = .59$). "Jog or exercise."

Scale 8 - Keep to Self -- ($\alpha = .65$). "Try to keep things to myself."

Scale 4 - Seeking Social Support -- ($\alpha = .82$). Includes both problem- and emotion-focused coping involved in calling upon another for assistance: "Ask a relative or friend I respect for advice."

On the final page of the WCC, subjects choose one of four statements which best describes their thoughts about the possibilities for change in the situation. This is referred to as the appraisal question (see Appendix A) and was developed by Lazarus to be used with

the WCC. In this question responses 1 and 3 are appraisals of high change potential where the person perceives many possibilities for amelioration of the situation. Responses 2 and 4 indicate low potential for change where few, if any, possibilities for change are perceived available.

Determination of Scenarios

Two scenarios representing low and high possibilities for change were selected through a process explained in Experiment One (see Appendix B). The scenario identified as "Class Size" (number 5 in School Scenarios, Appendix B) was selected to represent low change, and the scenario identified as "Disruptive Group" (number 7 in School Scenarios, Appendix B) was chosen to represent high change. Thirty-one teachers at the high school where the major study was conducted participated in the validation of the scenarios. Explanation of the selection procedure and the results and tables for Experiment One are provided in Appendix B.

Procedure

Subjects completed the questionnaire packet during their one-hour conference period at school. Possible locations included the teacher's classroom, the library, and the teacher's lounge. Subjects needed approximately thirty minutes to complete the Ways of Coping Checklist and the appraisal question on the two scenarios.

Subjects read one scenario of a stressful school situation; immediately following the reading, subjects completed The Ways of Coping

Checklist and the appraisal question with regard to the scenario just read. The subjects then repeated the process, reading the second scenario and completing the WCC and the appraisal question. To counterbalance for order effect, the scenarios were randomly arranged.

CHAPTER III

RESULTS

Design

A two-factor, split-plot factorial analysis of variance (ANOVA) was used to analyze the data (Linton & Gallo, 1975; Kirk, 1982). The between-subjects variable was gender with two levels, male and female; the within-subjects variable was the changeability of the situation with two levels, high and low. Eight separate split-plot ANOVAs were performed, one for each of the eight scales of the Ways of Coping Checklist (WCC).

In addition to the eight ANOVAs, chi-squares were used to analyze the appraisal differences between males and females separately for the high potential for change situation and for the low potential for change situation.

Furthermore, because of gender and situation main effects for stressfulness and a situation main effect for realism in Experiment One (see Appendix B), two additional questions were added to Experiment Two. All subjects rated the stressfulness and realism of each scenario on seven-point Likert scales. Two separate split-plot ANOVAs, one for stress and one for realism, were used to analyze the results.

The summary table of means is presented in Appendix C; summary tables for all of the ANOVAs are presented in Appendix D. Tables 1 and 2 present the means for males and females in each type of situation for

Table 1
Means for Males and Females on the WCC
in the High Change Situation

Scale	Male	Female
Problem-focused	20.32	22.52
Wishful Thinking	3.24	4.56
Detachment	3.36	3.16
Social Support	9.40	11.36
Focus on Positive	4.12	4.88
Self-blame	1.80	1.80
Tension-reduction	2.08	2.76
Keep to Self	1.88	1.48
Realism	5.72	6.00
Stressfulness	4.76	5.04

Table 2
Means for Males and Females on the WCC
in the Low Change Situation

Scale	Male	Female
Problem-focused	17.52	19.96
Wishful Thinking	3.20	4.72
Detachment	6.36	6.48
Social Support	8.40	10.52
Focusing on Positive	5.08	5.64
Self-blame	1.40	1.00
Tension-reduction	2.36	2.80
Keep to Self	2.48	1.56
Realism	5.76	5.84
Stressfulness	4.36	4.80

all eight scales of the WCC and for the realism and stressfulness variables. Tables 3 and 4 present the appraisal data for males and females for each type of situation.

Findings

Hypothesis I proposed that there would be a significant interaction between gender and changeability for problem-focused coping, i.e. males would use significantly more problem-focused coping in high change situations than females, with no differences between males and females in low change situations. As indicated in Appendix D, the interaction was not significant, and hypothesis I was not supported.

Hypothesis II proposed that there would be a significant interaction between gender and changeability for emotion-focused coping, i.e. males would use significantly less emotion-focused coping in high change situations than females, with no differences between males and females in low change situations. As indicated in Appendix D, the interactions for all seven emotion-focused coping scales were not significant; thus hypothesis II was not supported.

Hypothesis III proposed that males would appraise both types of situations as having more possibilities for action or as needing more information than females. As indicated in Tables 3 and 4, the results of the chi-square analyses for both types of situations indicated that there were no significant differences between the appraisals of either situation by males or females. Thus, hypothesis III was not supported.

Table 3

Frequency Distribution on Appraisal Question for Males
and Females in High Potential for Change Situation

Sex	Could Change	Accept	Know More	Hold Back	Total
M	18	1	4	2	25
F	22	1	2	0	25
Total	40	2	6	2	50

Chi-square = 3.067, df = 3, n.s.

Table 4

Frequency Distributions on Appraisal Question for Males
and Females in Low Potential for Change Situation

Sex	Could Change	Accept	Know More	Hold Back	Total
M	9	9	6	1	25
F	4	12	7	2	25
Total	13	21	13	3	50

chi-square = 2.762, df = 3, n.s.

Hypothesis IV proposed that females would appraise both types of situations as requiring more acceptance or holding back than males. As indicated above, the results of the chi-square analyses were not significant, and hypothesis IV was not supported.

Additionally, as indicated in the summary tables presented in Appendix D, there was a significant main effect on the type of situation on five of the eight WCC scales. Both males and females used significantly more problem-focused coping in the high change situation than in the low change situation. This suggests that in high potential for change situations, both males and females used more problem-focused coping than emotion-focused coping. In the low potential for change situation, significantly more detachment, focusing on the positive, and keeping to self were used than in the high change situation. Additionally, significantly less self-blame was used in the low change than in the high change situation.

As indicated in Appendix D, there were no significant main effects or interactions for either stress or realism ratings. Inspection of the mean ratings presented in Tables 1 and 2 indicates that, based on the seven-point response scale, both situations were perceived as realistic and moderately stressful.

CHAPTER IV

DISCUSSION

General Results

All results are concerned with the coping of males and females in two stressful work situations with which males and females were equally familiar. One situation represented high potential for change, while the other represented low potential for change. The results can be summarized as follows:

1. In the high potential for change situation, no significant gender differences were found in the use of problem-focused coping.
2. In the high potential for change situation, no significant gender differences were found in the use of emotion-focused coping.
3. In the low potential for change situation, no significant differences were found in either the problem-focused coping or emotion-focused coping of males and females.
4. No significant differences were found in the way males and females appraised the potential for change in the two stressful situations.
5. Significantly more problem-focused coping was evident in the high potential for change situation than in the low change situation.
6. Three emotion-focused strategies (detachment, focusing on the positive, and keeping to self) were used significantly more often in the low change situation than in the high change situation. Self-blame,

also an emotion-focused strategy, was used more in the high change situation than in the low change situation.

Implications

In general, the expectations that in high change situations males would use more problem-focused coping than females and that females would use more emotion-focused coping than males were not supported by the results of the study. Conclusions drawn from studies reporting that women use more passive or avoidance coping, while men use more direct action (Bem, 1974; Pines & Aronson, 1981; Solomon & Rothblum, 1986) failed to be supported by the data. The lack of significant differential effects of gender within types of situation may be explained by this study's elimination of the confounding variable of familiarity of situation that was evident in earlier studies (Burke & Weir, 1979; Folkman & Lazarus, 1980; Pearlin & Schooler, 1978; Stone & Neale, 1984). In these studies where the coping of males and females was compared across situations (e.g. home, work, health, finances), gender differences in coping appeared. The findings of the current study in which the situation was held constant lend support to Folkman and Lazarus' belief that the differences in their study may have been related more to the source of stress than to gender.

In the one study cited in which the subjects were limited to professionals in mental health services (Shinn et al., 1984), no significant gender differences were found in problem-focused coping,

but women did report seeking social support more often than men did. In addition, social support was negatively associated with stress and strain on the job. Similarly, in the current study, a marginally significant gender difference was found, with women seeking social support somewhat more than men. This marginally significant gender difference in the use of social support is consistent with results from other studies by Billings and Moos (1981), Turner and Noh (1983), and Stone and Neale (1984). Billings and Moos (1981) and Turner and Noh (1983) found that using social resources provided a buffer against stress for women. Stone and Neale (1984) reported that women sought more social support than men did and that there was a positive relationship between seeking social support and using direct action to cope with stress.

In order to investigate whether coping was influenced by appraisal, males' and females' appraisals of stressful situations were investigated. It was expected that males would evaluate both situations as capable of being changed more than women, and that women would appraise situations as having to be accepted more often than men. However, no significant gender differences in appraisal were found. The lack of significant differential effects for gender supports the theoretical relationship between appraisal and coping. Since no significant differences were found in the comparison of males' and females' coping strategies, then theoretically no differences should be expected in their appraisals either. If differences in coping had been found and no differences in

appraisal were evident -- or conversely, if no coping differences were found, but appraisal differences were evident -- then the influential relationship of appraisal on coping would be questionable. In either case, some other variable such as a skill deficit or socialization might have been in effect.

In comparing coping in the high and low change situations, significantly more problem-focused coping and self-blame were evident in the high potential for change situation, while three emotion-focused strategies (detachment, focusing on the positive, and keeping to self) were used significantly more in the low change situation. These results are consistent with Lazarus' transactional theory (Lazarus & Launier, 1978). Problem-focused coping and more self-blame are generated when one feels in control, i.e. when the person has confidence in his or her coping skills to effect a change in the stressful situation. A majority of the participants in this study (80%) thought that they could change the disruptive classroom situation. As expected, they used problem-focused strategies, such as analyze the problem, draw on past experiences, come up with a couple of solutions, and make a plan of action. In contrast, only 26% of the participants thought that they could change the classroom situation involving an overcrowded class, while 42% thought that this situation had to be accepted. As expected, significantly higher levels of emotion-focused strategies (detachment, focusing on the positive, and keeping to self) were used in the low change situation compared to the high change situation. These results

suggest that in situations which are viewed as unchangeable, people cope by ignoring the problem and withdrawing from the situation. They may rationalize this behavior to themselves by focusing on the positive: "looking for the silver lining," or "rediscovering what is important in life." These results are consistent with findings in studies by Folkman et al., 1986; Folkman and Lazarus, 1980; Stone and Neale, 1984; and Vitaliano et al., 1985).

Although the effectiveness of different coping strategies in adaptation was not directly measured in this study, it is interesting to note that the results of previous studies on success of coping strategies seem to be partially supported by the present study. In examining the coping response and its relation to emotional stress, Pearlin and Schooler (1978) found that having a favorable attitude toward one's self and a sense that one is in control of a situation, together with possessing a repertoire of coping skills, best equipped the person to face emotional stress in the areas of marriage, parenting, and economics, but not in occupation. They concluded that coping strategies were least effective on the job because people felt less personal control, i.e. they could do less to change the situation. The most effective type of coping to reduce stress at work was devaluing the work and keeping it in a place of secondary importance. Withdrawal, avoidance, and the substitution of extrinsic rewards for the intrinsic rewards of work were the most successful strategies. Shinn et al. (1984) found similar results and concluded, as Pearlin and Schooler did, that

individual coping with stress on the job is ineffective because the influential factors are beyond the control of the individual.

The conclusions of these two studies are supported and expanded by the results of the present study. When faced with stressful situations which they could not change, the participants did use emotion-focused strategies similar to those used in the studies conducted by Pearlin and Schooler and Shinn. However, and most importantly, the participants in this study differed from the subjects in the other studies in that they preferred to use problem-focused strategies in the work situation in which they perceived they could make a change. Admittedly, no measure of efficacy is included in this study, but the fact that the participants all had more than three years' experience and indicated that they would employ a significant level of problem-focused coping in the high change situation suggests that they had experienced some success with such strategies. It is unlikely that the participants would have used strategies that had proved unsuccessful in previous encounters.

Limitations

Several features of this study limit the generalizability of the results. All of the subjects were teachers with more than three years' experience who were currently employed at one public high school in Los Angeles. Although this could be considered a limiting factor, this investigator strongly believes that the results of this study would

be replicated by the responses of men and women in other occupations if their coping with stress were examined in a similar manner.

Another limitation is the fact that the subjects volunteered to participate, which could have contributed to a selection effect. No examination of differences between participants and nonparticipants could be made, because the questionnaires were anonymous. However, because of the high rate of participation (81%), it is believed that there were not significant identifying differences between participants and nonparticipants, and that the anonymity contributed to the validity of the self-reports.

The possible discrepancy between the self-report and actual behavior is always a concern with the research design used in studies such as this one (Lazarus, 1981; Moos, 1974). Although there is no guarantee that teachers will perform as they indicated, the fact that the scenarios were created from actual events at the high school where the study took place means that teachers had probably dealt with these or similar problems before; thus, they may have been describing past coping behaviors as well as predicting future coping responses. Validation of the realism of the two scenarios is provided by the means on the realism evaluations (5.80 and 5.86 on the seven-point Likert scale). Several teachers added comments to their questionnaires, such as "This is my fifth period class!" and "My situation exactly." In addition to the anonymity of the questionnaire and the high realism rating given the scenarios, participants' comments such as these contribute to the validity of the self-reports.

Although an instrument effect was feared because of the repeated use of the WCC, no difference in the number of questions answered was found between the first and second questionnaires completed by each participant. Apparently, the teachers had adequate time to complete both questionnaires and did not become bored enough with the task for the repetition to affect their concentration.

To reduce the confounding variable of familiarity and increase the internal validity, the study was restricted to one high school setting. Inherent in this design decision was the concomitant limitation of sample size in both Experiment One and the major study. Thirty-one subjects (14 males and 17 females) participated in the validation of the scenarios in Experiment one, and fifty subjects (25 males and 25 females) participated in the major study for a total of 81 participants. Excluding those teachers with fewer than three years' experience, this total represented 81% of the full-time teachers at the high school. Including teachers from different high schools in the subject pool would have meant that the teachers would not have had equal familiarity with the stressful situations. In other words, situations that caused stress at one high school might not be as realistic or stressful for teachers at another high school. It was paramount to the integrity of the study to maximize the feature of subject familiarity with both the job and the setting. Therefore, with the recognition of internal validity as a priority and the understanding that external validity would be reduced, this sample size was considered adequate for the study.

Conclusions

The present study is an initial attempt to investigate the relationship between gender, potential for change, and selection of coping strategies. The results show that when coping is measured in situations with which males and females are equally familiar, no significant gender differences occur in the appraisal of stressful situations or in the selection of coping strategies. Coping is related to appraisal in that situations appraised as changeable generate problem-focused coping while situations appraised as having to be accepted generate emotion-focused coping. Although an evaluation of the effectiveness of coping strategies was not included in this study, the fact that problem-focused coping was preferred in the high change situation, suggests that occupational stress is not impervious to problem-focused coping when the employee perceives that he or she can make a difference in the situation.

Suggestions for Future Research

It is hoped that this study will help to clarify the issue of gender differences in appraisal and coping, and will facilitate further research in coping. Replications of this study with participants in other occupations is recommended and encouraged. In the future, research could be designed to study actual coping behaviors in stressful situations through on-site observations, reports from significant others, or perhaps through less obtrusive methods, such as those

described by Thoresen and Eagleston (1985). These researchers suggest that people be trained to report their subjective experiences over time using ambulatory equipment, such as a tape recorder, to record their thoughts or feelings. This possibility for collecting in vivo cognitive data in natural settings with a minimum of disruption could greatly aid the study of coping.

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APPENDIXES

APPENDIX A

SUBJECT QUESTIONNAIRE PACKET

Dear Colleague:

Thank you for volunteering to help me in this research project. Please read the short classroom scenario and imagine that **you** are the teacher in the situation. Then complete the questionnaire indicating how you would respond in this situation. Repeat the process, reading the second scenario and completing the questionnaire again. Most people take about 30 minutes to complete both questionnaires. Your answers will be anonymous and confidential.

When you finish, please return the questionnaire packet to my mail box in the Main Office. Thank you again for your participation; I look forward to reporting the results to you at the April 14 faculty in-service meeting.

Sincerely yours,

Carrie Jo Johnson

WAYS OF COPING CHECKLIST

CIRCLE YOUR SEX: MALE FEMALE

SCENARIO: Three new students have been assigned to your classroom which already exceeds the district's recommended maximum class size. The semester is half over and the new students are known to be on "opportunity transfers." There are no desks or books available. The principal has advised teachers to accept all new students and make them feel welcome.

DIRECTIONS: Read each item below and indicate, by circling the appropriate category, to what extent you would use it in the situation you have just read.

	Does not apply and/or not used	Used somewhat	Used quite a bit	Used a great deal
1. Just concentrate on what I have to do next--the next step.	0	1	2	3
2. I try to analyze the problem in order to understand it better.	0	1	2	3
3. Turn to work or substitute activity to take my mind off things.	0	1	2	3
4. I feel that time will make a difference--the only thing to do is wait.	0	1	2	3
5. Bargain or compromise to get something positive from the situation.	0	1	2	3
6. I'm doing something which I don't think will work, but at least I'm doing something.	0	1	2	3
7. Try to get the person responsible to change his or her mind.	0	1	2	3
8. Talk to someone to find out more about the situation.	0	1	2	3
9. Criticize or lecture myself.	0	1	2	3
10. Try not to burn my bridges but leave things open somewhat.	0	1	2	3

	Does not apply and/or not used	Used somewhat	Used quite a bit	Used a great deal
11. Hope a miracle will happen.	0	1	2	3
12. Go along with fate; sometimes I just have bad luck.	0	1	2	3
13. Go on as if nothing is happening.	0	1	2	3
14. I try to keep my feelings to myself.	0	1	2	3
15. Look for the silver lining, so to speak; try to look on the bright side of things.	0	1	2	3
16. Sleep more than usual.	0	1	2	3
17. I express anger to the person(s) who caused the problem.	0	1	2	3
18. Accept sympathy and understanding from someone.	0	1	2	3
19. I tell myself things that help me feel better.	0	1	2	3
20. I am inspired to do something creative.	0	1	2	3
21. Try to forget the whole thing.	0	1	2	3
22. I'm getting professional help.	0	1	2	3
23. I'm changing or growing as a person in a good way.	0	1	2	3
24. I'm waiting to see what will happen before doing anything.	0	1	2	3
25. Apologize or do something to make up.	0	1	2	3
26. I'm making a plan of action and following it.	0	1	2	3
27. I accept the next best thing to what I want.	0	1	2	3
28. I let my feelings out somehow.	0	1	2	3

	Does not apply and/or not used	Used somewhat	Used quite a bit	Used a great deal
29. Realize I brought the problem on myself.	0	1	2	3
30. I'll come out of the experience better than when I went in.	0	1	2	3
31. Talk to someone who can do something concrete about the problem.	0	1	2	3
32. Get away from it for awhile; try to rest or take a vacation.	0	1	2	3
33. Try to make myself feel better by eating, drinking, smoking, using drugs or medication, etc.	0	1	2	3
34. Take a big chance or do something risky.	0	1	2	3
35. I try not to act too hastily or follow my first hunch.	0	1	2	3
36. Find new faith.	0	1	2	3
37. Maintain my pride and keep a stiff upper lip.	0	1	2	3
38. Rediscover what is important in life.	0	1	2	3
39. Change something so things will turn out all right.	0	1	2	3
40. Avoid being with people in general.	0	1	2	3
41. Don't let it get to me; refuse to think too much about it.	0	1	2	3
42. Ask a relative or friend I respect for advice.	0	1	2	3
43. Keep others from knowing how bad things are.	0	1	2	3
44. Make light of the situation; refuse to get too serious about it.	0	1	2	3
45. Talk to someone about how I am feeling.	0	1	2	3

	Does not apply and/or not used	Used somewhat	Used quite a bit	Used a great deal
46. Stand my ground and fight for what I want.	0	1	2	3
47. Take it out on other people.	0	1	2	3
48. Draw on my past experiences; I was in a similar situation before.	0	1	2	3
49. I know what has to be done, so I am doubling my efforts to make things work.	0	1	2	3
50. Refuse to believe it will happen.	0	1	2	3
51. Make a promise to myself that things will be different next time.	0	1	2	3
52. Come up with a couple of different solutions to the problem.	0	1	2	3
53. Accept it, since nothing can be done.	0	1	2	3
54. I try to keep my feelings from interfering with other things too much.	0	1	2	3
55. Wish that I can change what is happening or how I feel.	0	1	2	3
56. Change something about myself.	0	1	2	3
57. I daydream or imagine a better time or place than the one I am in.	0	1	2	3
58. Wish that the situation would go away or somehow be over with.	0	1	2	3
59. Have fantasies or wishes about how things might turn out.	0	1	2	3
60. I pray.	0	1	2	3
61. I prepare myself for the worst.	0	1	2	3
62. I go over in my mind what I will say or do.	0	1	2	3

	Does not apply and/or not used	Used somewhat	Used quite a bit	Used a great deal
63. I think about how a person I admire would handle this situation and use that as a model.	0	1	2	3
64. I try to see things from the other person's point of view.	0	1	2	3
65. I remind myself how much worse things could be.	0	1	2	3
66. I jog or exercise.	0	1	2	3
67. In general, is this situation one (check <u>one</u> only)				
___1. that you could change or do something about?				
___2. that must be accepted or gotten used to?				
___3. that you needed to know more about before you could act?				
___4. in which you had to hold yourself back from doing what you wanted to do?				

DIRECTIONS: Circle the number from 1-7 that best indicates how you would feel.

68. This situation is:

Not at all realistic ----- Extremely realistic

1 2 3 4 5 6 7

69. In this situation I would feel:

Completely relaxed ----- Extremely stressed

1 2 3 4 5 6 7

CIRCLE YOUR SEX: MALE FEMALE

SCENARIO: A small group of four or five students consistently disrupts the class by throwing paper wads, talking aloud and making obscene comments, moving their desks and refusing to do their assignments. As the teacher, you have reprimanded the students and referred them to the dean, but the behavior continues.

DIRECTIONS: Read each item below and indicate, by circling the appropriate category, to what extent you would use it in the situation you have just read.

	Does not apply and/or not used	Used somewhat	Used quite a bit	Used a great deal
1. Just concentrate on what I have to do next--the next step.	0	1	2	3
2. I try to analyze the problem in order to understand it better.	0	1	2	3
3. Turn to work or substitute activity to take my mind off things.	0	1	2	3
4. I feel that time will make a difference--the only thing to do is wait.	0	1	2	3
5. Bargain or compromise to get something positive from the situation.	0	1	2	3
6. I'm doing something which I don't think will work, but at least I'm doing something.	0	1	2	3
7. Try to get the person responsible to change his or her mind.	0	1	2	3
8. Talk to someone to find out more about the situation.	0	1	2	3
9. Criticize or lecture myself.	0	1	2	3
10. Try not to burn my bridges but leave things open somewhat.	0	1	2	3

	Does not apply and/or not used	Used somewhat	Used quite a bit	Used a great deal
11. Hope a miracle will happen.	0	1	2	3
12. Go along with fate; sometimes I just have bad luck.	0	1	2	3
13. Go on as if nothing is happening.	0	1	2	3
14. I try to keep my feelings to myself.	0	1	2	3
15. Look for the silver lining, so to speak; try to look on the bright side of things.	0	1	2	3
16. Sleep more than usual.	0	1	2	3
17. I express anger to the person(s) who caused the problem.	0	1	2	3
18. Accept sympathy and understanding from someone.	0	1	2	3
19. I tell myself things that help me feel better.	0	1	2	3
20. I am inspired to do something creative.	0	1	2	3
21. Try to forget the whole thing.	0	1	2	3
22. I'm getting professional help.	0	1	2	3
23. I'm changing or growing as a person in a good way.	0	1	2	3
24. I'm waiting to see what will happen before doing anything.	0	1	2	3
25. Apologize or do something to make up.	0	1	2	3
26. I'm making a plan of action and following it.	0	1	2	3
27. I accept the next best thing to what I want.	0	1	2	3
28. I let my feelings out somehow.	0	1	2	3

	Does not apply and/or not used	Used somewhat	Used quite a bit	Used a great deal
29. Realize I brought the problem on myself.	0	1	2	3
30. I'll come out of the experience better than when I went in.	0	1	2	3
31. Talk to someone who can do something concrete about the problem.	0	1	2	3
32. Get away from it for awhile; try to rest or take a vacation.	0	1	2	3
33. Try to make myself feel better by eating, drinking, smoking, using drugs or medication, etc.	0	1	2	3
34. Take a big chance or do something risky.	0	1	2	3
35. I try not to act too hastily or follow my first hunch.	0	1	2	3
36. Find new faith.	0	1	2	3
37. Maintain my pride and keep a stiff upper lip.	0	1	2	3
38. Rediscover what is important in life.	0	1	2	3
39. Change something so things will turn out all right.	0	1	2	3
40. Avoid being with people in general.	0	1	2	3
41. Don't let it get to me; refuse to think too much about it.	0	1	2	3
42. Ask a relative or friend I respect for advice.	0	1	2	3
43. Keep others from knowing how bad things are.	0	1	2	3
44. Make light of the situation; refuse to get too serious about it.	0	1	2	3
45. Talk to someone about how I am feeling.	0	1	2	3

	Does not apply and/or not used	Used somewhat	Used quite a bit	Used a great deal
46. Stand my ground and fight for what I want.	0	1	2	3
47. Take it out on other people.	0	1	2	3
48. Draw on my past experiences; I was in a similar situation before.	0	1	2	3
49. I know what has to be done, so I am doubling my efforts to make things work.	0	1	2	3
50. Refuse to believe it will happen.	0	1	2	3
51. Make a promise to myself that things will be different next time.	0	1	2	3
52. Come up with a couple of different solutions to the problem.	0	1	2	3
53. Accept it, since nothing can be done.	0	1	2	3
54. I try to keep my feelings from interfering with other things too much.	0	1	2	3
55. Wish that I can change what is happening or how I feel.	0	1	2	3
56. Change something about myself.	0	1	2	3
57. I daydream or imagine a better time or place than the one I am in.	0	1	2	3
58. Wish that the situation would go away or somehow be over with.	0	1	2	3
59. Have fantasies or wishes about how things might turn out.	0	1	2	3
60. I pray.	0	1	2	3
61. I prepare myself for the worst.	0	1	2	3
62. I go over in my mind what I will say or do.	0	1	2	3

	Does not apply and/or not used	Used somewhat	Used quite a bit	Used a great deal
63. I think about how a person I admire would handle this situation and use that as a model.	0	1	2	3
64. I try to see things from the other person's point of view.	0	1	2	3
65. I remind myself how much worse things could be.	0	1	2	3
66. I jog or exercise.	0	1	2	3
67. In general, is this situation one (check <u>one</u> only)				
___ 1. that you could change or do something about?				
___ 2. that must be accepted or gotten used to?				
___ 3. that you needed to know more about before you could act?				
___ 4. in which you had to hold yourself back from doing what you wanted to do?				

DIRECTIONS: Circle the number from 1-7 that best indicates how you would feel.

68. This situation is:

Not at all realistic ----- Extremely realistic

1 2 3 4 5 6 7

69. In this situation I would feel:

Completely relaxed ----- Extremely stressed

1 2 3 4 5 6 7

APPENDIX B

DETERMINATION OF SCENARIOS: EXPERIMENT ONE

Method

The purpose of the Experiment One was to identify two equally realistic scenarios of stressful school situations that could be used in Experiment Two: one to represent situations perceived as nearly impossible to change (Low Change) and another to represent situations perceived as changeable (High Change).

A review of the literature relevant to teacher stress (Cichon & Koff, 1978; Kyriacou & Sutcliffe, 1978; Landsmann, 1978; Lortie, 1975; Moracco, 1982; Olander & Farrell, 1970; Wilson, 1979) indicated that five areas were consistently rated as most stressful: 1) discipline, managing disruptive students, 2) task overload, 3) poor working environment, 4) relations with principal, and 5) relations with parents. From these five stressful areas, the investigator created ten scenarios (see School Scenarios in Appendix B) based on actual events which had occurred at the school in which the major study was to be conducted. The investigator had worked for two years previously at the school as a teacher and counselor and had the opportunity to become familiar with the school and the stresses faced by the teachers.

Fourteen male and seventeen female teachers from the high school volunteered to participate in validation of the scenarios. During their conference period at school, each teacher read the ten scenarios

and responded to three evaluation questions for each scenario (see Scenario Questionnaire in Appendix B). Participants evaluated the realism and stressfulness of the scenarios on two seven-point Likert scales (This situation is: Not at all realistic--Extremely realistic; In this situation I would feel: Completely relaxed--Extremely stressed). To indicate their perception of the possibility for change in each situation, respondents chose one of four options: I see (no, few [1-2], some [3-4], many [5+]) possibilities for change in this situation. To counterbalance for order effect, the ten scenario questionnaires were arranged in a randomly determined order.

Results

Since perception of change was the most critical factor in selecting the two scenarios to be used in the study, the scenarios with greatest disparity on the change scale were identified. The scenarios "Classroom Scuffle" (see number 1 in Appendix B) and "Disruptive Group" (see number 7) had the highest possibility for change, while the scenarios "Class Size" (see number 5) and "Mentor" (see number 4) had the lowest possibility for change. The four scenarios were then examined for realism. Of the two high change scenarios, the "Disruptive Group" scenario had the higher Realism mean score. Of the two low change scenarios, "Class Size" not only had a higher Realism mean score than "Mentor," but it was considered to be relevant to more teachers than "Mentor" which affects only a small percentage of teachers. "Disruptive Group," representing high change, and "Class Size," representing low

change, were then examined for stressfulness. Both scenarios were rated moderately stressful.

The change, realism, and stress ratings for the "Class Size" and "Disruptive Group" scenarios were then analyzed with a split-plot factorial ANOVA with sex of the teacher as the between subjects variable and type of scenario as the within subjects variable. Table B-1 presents the means and standard deviations of the ratings. The results of the ANOVA for the change ratings are presented in Table B-2; the results of the realism and stress ratings are presented in Tables B-3 and B-4, respectively. The results indicated that the scenarios were rated as significantly different in their possibilities for change by both male and female teachers ($F(1,29) = 20.10, p < .0001$). Marginally significant differences were found for realism ($F(1,29) = 4.01, p < .056$). For the rating of stress, two significant differences were found. Males perceived both situations as significantly less stressful than females ($F(1,29) = 6.29, p < .018$); the "Class Size" scenario (Low Change) was perceived as significantly less stressful than the "Disruptive Group" scenario (High Change) by both males and females ($F(1,29) = 4.64, p < .039$).

Based on Experiment One, two scenarios, "Disruptive Group" and "Class Size," were chosen to represent situations high or low in potential for change in the major study. Due to the gender and situation main effects on stressfulness and a main effect for situation on realism, two additional questions (Questions 68 and 69) were added

Table B-1

Means and Standard Deviations of Ratings of Realism, Stress, and Change of
 "Class Size" and "Disruptive Group" Scenarios by Male and Female Teachers

Sex	Scenario	Mean			Standard Deviation		
		Realism	Change	Stress	Realism	Change	Stress
Male	Size	6.36	2.50	4.43	.842	.651	1.55
	Disrupt	5.43	3.36	5.07	1.741	.745	1.49
Female	Size	5.71	2.41	5.53	1.687	.618	1.23
	Disrupt	5.53	2.83	6.00	1.736	.809	1.06

Table B-2

Split-plot Factorial ANOVA of the Change Ratings of the "Class Size"
 and "Disruptive Group" Scenarios

Source	SS	df	MS	F	p
Sex	1.484	1	1.484	2.11	.1569
Error	20.387	29	.703		
Scenario	6.181	1	6.181	20.10	.0001
Interaction	.762	1	.762	2.48	.1264
Error	8.916	29	.307		

Table B-3

Split-plot Factorial ANOVA of the Realism Ratings of the "Class Size"
and "Disruptive Group" Scenarios

Source	SS	df	MS	F	p
Sex	1.163	1	1.163	.31	.582
Error	108.708	29	3.749		
Scenario	4.687	1	4.687	4.01	.056
Interaction	2.172	1	2.172	1.87	.182
Error	33.699	29	1.162		

Table B-4

Split-plot Factorial ANOVA of the Stress Rating of the "Class Size"
and "Disruptive Group" Scenarios

Source	SS	df	MS	F	p
Sex	15.809	1	15.809	6.29	.0180
Error	72.867	29	2.512		
Scenario	4.759	1	4.759	4.64	.0396
Interaction	.113	1	.114	.11	.7412
Error	29.724	29	1.025		

to the major study. All subjects rated the stressfulness and realism of each scenario on two seven-point Likert scales. If significant differences had occurred, analysis of covariance would have been used to examine the differences with the factors of stress and/or realism as the covariate(s). Significant differences did not occur, however, in the major study.

SCHOOL SCENARIOS

1. Classroom Scuffle

The teacher notices a scuffle in the back of the classroom and realizes that the two students involved are members of two opposing gangs. The students in the class begin to align themselves with one member or the other.

2. Accusation of Molestation

The teacher has been called in by the principal and notified that a student has accused the teacher of sexual molestation. The parents have already contacted the police and the school board. The teacher has been tutoring the student after school.

3. Violent Film

The teacher has been asked by the principal to resign because of previous evaluations of poor performance. The teacher has recently shown classes a video tape of a currently popular violent film which resulted in complaints from parents and students.

4. Mentor Teacher

The teacher has been selected as a mentor teacher which requires the teacher to transfer from the current location of employment in a suburban school to an inner-city school known for its violent student disruptions.

5. Class Size

Three new students have been assigned to a classroom which already exceeds the school district's recommendation for maximum class size. The semester is half over and the students are known to be on "opportunity transfers." There are no desks or books available. The teachers have been advised by the principal to accept all new students and make them feel welcome.

6. Parent Conferences

The teacher has called a student's parents to report the student's disruptive behavior in class and poor grades on tests. The parents say they work during the day and expect the teacher to be responsible for the education of their child.

7. Disruptive Group

A small group of four or five students consistently disrupts the class by throwing paper wads, talking aloud and making obscene comments, moving their desks and refusing to do their assignments. The teacher has reprimanded the students and referred them to the dean, but the behavior continues.

8. Substitute Teach

The teacher has been asked to substitute for another teacher during the preparation period. Final semester grades are due at noon and the teacher has planned to use the prep period to finish marking final exams and assigning grades.

9. Auditorium Class

The teacher has been assigned to teach five classes in the auditorium. The 35-40 students in each class will sit in theatre-type seats using lap boards to write on. The lighting is very poor and there are no windows, fans, heat or air conditioning.

10. Marijuana

The teacher finds a group of students smoking marijuana and writing graffiti in the restroom. When the teacher tries to talk to the students, they flush the evidence down the toilets, throw the teacher against the wall, and run out of the restroom.

SCENARIO QUESTIONNAIRE

DIRECTIONS: Read the scenario and try to imagine you are the teacher in the situation described. Then, put an X under the number from 1-7 to indicate how you would feel in this situation.

Three new students have been assigned to your classroom which already exceeds the district's recommended maximum class size. The semester is half-over and the new students are known to be on "opportunity transfers." There are no desks or books available. The principal has advised teachers to accept all new students and make them feel welcome.

1. This situation is:

1 2 3 4 5 6 7

Not at all realistic Extremely realistic

2. In this situation I would feel:

1 2 3 4 5 6 7

Completely relaxed Extremely stressed

3. Put an X beside the statement which best describes what you think about the possibilities for change in this situation.

 I see no possibility to change this situation for the better.

 I see few possibilities (1-2) to change this situation for the better.

 I see some possibilities (3-4) to change this situation for the better.

 I see many possibilities (5+) to change this situation for the better.

APPENDIX C

Table C-1

Summary Table of Means by Sex and Situation for the Ways of Coping Scales

Scale	Sex		F	Situation		F
	Male Mean	Female Mean		Low Mean	High Mean	
Problem-focused	18.92	21.24	2.96	18.74	21.42	28.07***
Wishful thinking	3.22	4.64	2.12	3.96	3.90	.03
Detachment	4.86	4.82	0.00	6.42	3.26	40.25***
Social support	8.92	10.94	3.12	9.48	10.38	3.29
Focus on positive	4.60	5.26	0.72	5.36	4.50	12.72***
Self-blame	1.60	1.40	0.26	1.20	1.80	9.19**
Tension-reduction	2.22	2.78	1.09	2.58	2.42	0.79
Keep to self	2.18	1.52	1.98	2.02	1.68	4.21*
Realism	5.74	5.92	.38	5.80	5.86	.10
Stressfulness	4.56	4.92	1.56	4.58	4.90	1.68

*p < .05

**p < .01

***p < .001

APPENDIX D

Table D-1

Summary Table for Analysis of Variance of Differences between Males and
Females across Situations on Scales of the Ways of Coping Checklist

Source of Variance	Sum of Squares	df	Mean Square	F	p
<u>Analysis of Variance for Problem-focused Coping</u>					
Between subjects					
Gender (G)	134.56	1	134.56	2.96	0.09
Error	2179.80	48	45.41		
Within subjects					
Situation (S)	179.56	1	179.56	28.07	0.01
G x S	0.36	1	0.36	0.06	0.81
Error	307.08	48	6.40		
<u>Analysis of Variance for Wishful Thinking</u>					
Between subjects					0.15
Gender (G)	50.41	1	50.41	2.12	0.15
Error	1139.60	48	23.74		
Within subjects					
Situation (S)	0.09	1	0.09	0.03	0.85
G x S	0.25	1	0.25	0.10	0.76
Error	126.16	48	2.63		
<u>Analysis of Variance for Detachment</u>					
Between subjects					
Gender (G)	0.04	1	0.04	0.00	0.96
Error	1003.40	48	20.90		
Within subjects					
Situation (S)	249.64	1	249.64	40.25	0.01
G x S	0.64	1	0.64	0.10	0.75
Error	297.72	48	6.20		

Table D-1 (continued)

Source of Variance	Sum of Squares	df	Mean Square	F	p
<u>Analysis of Variance for Seeking Social Support</u>					
Between subjects					
Gender (G)	102.01	1	102.01	3.12	0.08
Error	1569.00	48	32.68		
Within subjects					
Situation (S)	20.25	1	20.25	3.29	0.08
G x S	0.09	1	0.09	0.01	0.90
Error	295.16	48	6.15		
<u>Analysis of Variance for Focusing on the Positive</u>					
Between subjects					
Gender (G)	10.89	1	10.89	0.72	0.40
Error	729.12	48	15.19		
Within subjects					
Situation (S)	18.49	1	18.49	12.72	0.01
G x S	0.25	1	0.25	0.25	0.68
Error	69.76	48	1.45		
<u>Analysis of Variance for Self-blame</u>					
Between subjects					
Gender (G)	1.00	1	1.00	0.26	0.61
Error	183.00	48	3.812		
Within subjects					
Situation (S)	9.00	1	9.00	9.19	0.01
G x S	1.00	1	1.00	1.02	0.32
Error	47.00	48	0.98		
<u>Analysis of Variance for Tension-reduction</u>					
Between subjects					
Gender (G)	7.84	1	7.84	1.09	0.30
Error	345.16	48	7.19		
Within subjects					
Situation (S)	0.64	1	0.64	0.79	0.38
G x S	0.36	1	0.36	0.44	0.51
Error	39.00	48	0.81		

Table D-1 (continued)

Source of Variance	Sum of Squares	df	Mean Square	F	p
<u>Analysis of Variance for Keep to Self</u>					
Between subjects					
Gender (G)	10.89	1	10.89	1.98	0.17
Error	264.36	48	5.51		
Within subjects					
Situation (S)	2.89	1	2.89	4.21	0.05
G x S	1.69	1	1.69	2.46	0.12
Error	32.92	48	0.66		
<u>Analysis of Variance for Realism</u>					
Between subjects					
Gender (G)	0.81	1	0.81	0.38	0.54
Error	101.80	48	2.12		
Within subjects					
Situation (S)	0.09	1	0.09	0.10	0.75
G x S	0.25	1	0.25	0.28	0.60
Error	43.16	48	0.89		
<u>Analysis of Variance for Stressfulness</u>					
Between subjects					
Gender (G)	3.24	1	3.24	1.56	0.22
Error	100.00	48	2.08		
Within subjects					
Situation (S)	2.56	1	2.56	1.68	0.20
G x S	0.16	1	0.16	0.10	0.75
Error	73.28	48	1.53		

VITA

Carolyn (Carrie) Jo Callahan Johnson was born in Berryville, Arkansas on August 21, 1942. She attended public schools in Tulsa, Oklahoma and graduated from Tulsa Central High School in May 1960. The following September she entered Oklahoma State University, and in June 1964 she completed a Bachelor of Arts degree in English. She married Dixon Clark Johnson and in the Fall of 1964 she began a Master of Education degree at the University of Oregon. This degree was awarded in August 1965.

After twelve years of teaching literature and composition in public high schools and at The University of Tennessee, Knoxville, the author entered the Graduate School of The University of Tennessee, Knoxville, in September 1979. She completed a year of a counseling psychology internship at the Student Counseling Center of The University of Tennessee, Knoxville in June 1983. That summer she moved with her husband and son to Los Angeles, California and completed a second year of internship at the Student Counseling Center of the University of Southern California. Ms. Johnson is employed by the Los Angeles Unified School District as a guidance counselor. She received the Doctor of Philosophy Degree in June 1987.