

AN INVESTIGATION OF RISK TAKING AND FEAR OF FAILURE
IN MARRIED AND DIVORCED WOMEN

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Chapter 1

Introduction

Underlying the decision making behavior common to everyday life is a pervasive though often unacknowledged element of risk. The aspects which lend a risky character to the process of decision making are a lack of certainty in achieving a desired outcome and the prospect of failure or loss, entailing in some instances harsh penalties (Kogan & Wallach, 1967). Thus, the concept of risk taking refers to choosing from among alternatives as course of action which is perceived as having some probability of failure, as well as more attractive consequences. Individuals vary widely in their approach to risk taking situations. At one end of the continuum are those who are excessively cautious and avoid all risk. Persons who consistently make choices involving high degrees of risk are at the other extreme. In more adaptive risk taking behavior, uncertainties are considered along with personal abilities and the likelihood of success is evaluated using problem solving skills. Based on early studies of achievement motivation, Atkinson (1957) developed a model to explain how the motive to approach success (hope of success) and the motive to avoid failure (fear of failure) influence risk taking behavior. He predicted that the person

who is high in the hope of success will select tasks where there is moderate risk, while the person in whom the fear of failure is stronger will choose extremely low risk tasks or extremely high risk tasks. Atkinson claims that the individual motivated primarily by the fear of failure is more concerned with avoiding failure than with being a success. Therefore, he chooses low risk tasks since the chance of failure is small or high risk tasks because no one can blame him if he fails. The orientation toward hope of success or fear of failure is determined largely by self-attitudes that have developed through success and failure experiences. (Heckhausen, 1967). The individual who is unsuccessful in his past experience will learn to fear failure and tend to avoid the risk of competition.

Bequaert (1976) suggests that women may regard divorce as the "ultimate experience of failure." The most parsimonious explanation of this observation is that females are more likely than males to be ego-involved in making a success of the marriage (Hardy & Cull, 1974). Marriage is usually regarded as the most important life task for a woman, and Freund (1974) has pointed out that divorced females may expect to meet with more social disapproval than their male counterparts. Furthermore, adherence to prescribed social norms appears to be of greater concern to females than to males, according to Mehrabian (1969).

The foregoing considerations appear to be congruent with the development of fear of failure, and with recent explanations concerning the basis for the fear of failure motive. It has been contended that the fear of failure might be more specifically defined as fear in situations where potential negative evaluation by others is prominent (Becker, Cohen & Teevan, 1975).

The implications of the relationship between fear of failure and risk taking are of particular concern in regard to the social and psychological adjustment of the individuals considered here. Although this adjustment may be more difficult for those who are older at the time of divorce (Blair, 1970), it poses a challenge to most divorced women. Confronted with changes in life style, increased parental and financial responsibilities, and the task of rebuilding her life, the divorced woman's risk taking strategy is an important part of her coping behavior. She must develop the confidence and ability to respond adaptively to decisions involving risk if she is to move in the direction of a more satisfying life.

The purpose of this research is to explore relationships between risk taking, fear of failure, and certain related variables among individuals whose prior experience of divorce may be relevant to the development of a fear of failure orientation.

Chapter 2

Background

Studies designed to investigate the relationship between risk taking and fear of failure as a level of achievement motivation have, in large part, been conducted under two conditions that are pertinent to the present research:

(1) in most instances male subjects have been used, (2) the experimental situations assessing achievement motivation have stressed evaluation in a competitive sense, usually with respect to intellectual and leadership characteristics (French & Lesser, 1964). Attempts to use females as subjects in these studies have produced inconsistent results, and with few exceptions have been abandoned (Weinstein, 1969). Mehrabian (1969) has suggested that females, because of early training procedures, are more socially oriented and thus achievement has a different meaning for women as compared to men. Perhaps, for women, fear of failure may be more clearly evidenced within a social context where cues are perceived as more relevant to feminine goals. This approach to fear of failure in women is compatible with recent research viewing the achievement motive as social in nature, and conceptualizing fear of failure as essentially the fear of evaluation by others according to their standards (Birney, Burdick &

Teevan, 1969). The question to be investigated in this study is whether divorced women are more likely to be motivated by fear of failure, and thus handicapped in their ability to make decisions in situations involving risk. The risk taking propensity of divorced women will be compared with that of married women, taking into consideration fear of failure and stress.

Risk Taking

Early theorists in decision making chose gambling situations, where probabilities and values were easily quantified, as a format for the development and testing of a variety of mathematical models. Edwards (1955) discusses four of these models, all of which state that the individual will select the alternative of maximum value for him. The alternative of maximum value can be discovered by taking each bet, listing the values of the possible outcomes, multiplying each by the probability of its occurrence and summing the products. The alternative providing the largest positive product is the alternative of maximum value for the decision maker.

In the earliest model, expected value (EV), only the objective face value of probabilities of occurrence and monetary amount were considered. Choosing an alternative from the standpoint of EV theory would consist of making a rational

decision based on objective information. The EV model was not supported by the empirical evidence gathered by Edwards (1954a; 1954b) since subjects often showed preferences for bets which did not have the highest expected values. Later models tried to account for these individual gambling decisions by introducing elements of subjectivity. In the first modification, the subjectively expected money (SEM) model, the objective probabilities of the EV model were replaced with subjective probabilities. The SEM model offered little improvement in predicting gambling choices and subsequently the model of expected utility (EU) was developed. The EU model retained the objective probabilities of the EV model while it replaced the objective value of the money with utility. Utility is the subjective worth of a thing. The EU model, while an improvement over the EV model did not adequately predict gambling decisions, and its use presented measurement problems. The final model described by Edwards (1955), the model of subjectively expected utility (SEU), replaced both objective probabilities and values with their subjective form. The SEU model like its predecessors has been only moderately successful in predicting choices between bets, and it continues the complex measurement problems of the EU model.

Among the problems which have emerged in the application of the mathematical models are those concerned with the

assumption of independence, which has the effect of limiting their generality. When the context changes from chance to skill, the value of success becomes greater as the probability of success decreases, that is the attractiveness of the outcome increases with the difficulty of attainment. This has been confirmed experimentally by Feather (1959). Another problem is raised by the consideration that the subjective probability of success seems to increase when success has greater value. Irwin (1953) found that people will believe an event is more likely to occur when the consequences are considered favorable.

It is clear that individuals do not all perceive probabilities in the same way and may often behave differently in a risk taking situation. A part of this variation may be due to differences in personality or motivational factors that account for a generalized disposition toward risk or conservatism. The question of generality is one that has been studied extensively in relation to risk taking. Kogan and Wallach (1967) have pointed out that the usefulness of a risk taking construct is in doubt unless it is consistent in an individual over a variety of situations. Although their findings (Kogan & Wallach, 1964) do not support a general trait of risk taking propensity in their sample as a whole, they found a consistency across situations for certain subgroups. Specifically, individuals high in anxiety and

defensiveness displayed a high degree of generality in situations with diverse content. Support for a position of generality in risk taking has been provided more recently by Knowles, Cutter, Walsh, and Casey (1973). They reported consistencies across a variety of situations using thirteen risk taking and related measures. In another approach to the study of generality, Jackson, Hourany, and Vidmar (1972) examined four major categories of risk taking: monetary risk, physical risk, ethical risk and social risk, in a format of appropriate situational dilemmas. Their results provided evidence for a generalized personality dimension of risk taking not specific to any single type of risk, as well as independence between the four facets of risk under consideration. Along the same line, research conducted by Steiner (1972) showed a degree of generality across such varied areas as driving, money, danger, social risk, drink and drugs. In contrast, studies by Knox and Safford (1976) and Heilizer and Cutter (1971) produced findings that indicated marked changes in risk taking behavior in different contexts. Slovic (1964; 1972) contends that there is not enough evidence to support a position of a generalized disposition toward risk that is consistent across situations. A multi-dimensional interpretation (Jackson et al., 1972) is one possible explanation for the conflicting evidence surrounding the question of generality. Other considerations

discussed by Slovic (1964) include: (1) adequacy of the measures used to assess risk, (2) individual differences in the perception of what is risky, (3) failure on the part of the measures to provide the subject with ego involvement or arousal necessary for feelings of risk, (4) discrepancies between subjects' self-report of riskiness and their actual risk taking behavior.

Along with the aspect of generality, there is some question concerning the relevance of risk taking tasks in experimental settings to real life situations. Research has been conducted using real vs hypothetical payoffs (Lafferty & Higbee, 1974; Myers & Katz, 1962) and real life problems vs role played problems (Yinon, Shoham & Lewis, 1974). Findings from these studies suggest that subjects are less risky in real as opposed to imaginary decision making situations, and this reluctance to take risks increases with the size of the potential gain or loss (Myers & Katz, 1962). Other research indicates that there is no difference with respect to risk level in real and hypothetical situations (Cameron & Myers, 1966; Runyan, 1974). The attempt to bridge the gap between the hypothetical and the real has led researchers to investigate risk taking in natural settings involving such activities as horse racing (McGlothlin, 1956), driving and athletics (Cohen, 1964), and industrial marketing (Reingen, 1973). McClelland (1961) and Ziller (1957) compared

individual risk taking levels and vocational choice and found they were related.

Kogan and Wallach (1964) have conducted extensive research into the area of risk taking and personality. As was previously mentioned, they were able to demonstrate a consistency in risk taking behavior among individuals scoring high in defensiveness and high in anxiety. Defensiveness and anxiety were used as moderator variables and subjects were grouped according to other personality factors. Persons who were high in defensiveness, anxiety, independence, and self-sufficiency and low in rigidity were likely to choose high risks. Those who were high in anxiety and defensiveness, but low in independence and self-sufficiency, and high in rigidity were at the conservative end of the risk taking continuum. The authors emphasize that these are not direct linear relationships.

Steiner (1972) has proposed that risk taking attitudes in subjects at either extreme on the continuum may mask similar problems and conflicts. The striking differences between the subject who has a very cautious attitudes toward risk and the subject who recklessly chooses the most extreme risks may stem primarily from the defensive styles they have adopted. The cautious strategy may indicate "an internalization of conflicts which are avoided in reality and dealt with symbolically so that control and avoidance of risk is

paramount" while the extremely risky strategy of the reckless subject may be an attempt "to master problems by going out to meet them as though fate were being tested and reassurance gained by getting away with it" (p. 371).

Findings in the Kogan and Wallach (1964) study are basically in agreement with Steiner. Both studies point out that subjects high in defensiveness tend to take relatively higher or lower risks than less defensive individuals.

Subjects who choose moderate risks may be more likely to conceive of outcomes as under their personal control, according to Liverant and Scodel (1960). In contrast, those who select extremely high or low risks tend to do so because they believe relatively more in luck as the determiner of outcomes.

A number of researchers have approached the study of risk taking and personality factors by attempting to build a descriptive characterization of individuals who take relatively higher and lower risks. Plax and Rosenfeld (1976) found the high risk taker to be confident, efficient and one who requires little order in his life. He feels little guilt for wrong doing, and is characterized most by a high degree of social presence. The composite picture of the risky decision maker is that of a "dynamic task oriented leader, aggressive and manipulative, independent and radical, an individual who moves others about as if they were objects

placed before him to satisfy his own personal needs" (p. 417). The high risk taker has also been described as aggressive, exhibitionistic and dominating (Cameron & Myers, 1966), as tough-minded (Rim, 1964), as more secure, less responsible and as showing a relatively greater discrepancy between inner and outer self than lower risk takers (Morris, 1957). Sheridan and Shack (1970) reported that high risk takers are more accepting of themselves and more self-actualizing.

The conservative risk taker has been represented by Cameron and Myers (1966) as high in autonomy and endurance and as showing high levels of striving for the present and the future (Harvey, 1976). It is worth noting that most of the preceding descriptions tend to support cultural stereotypes. The apparent inconsistencies in the findings relating personality dimensions to levels of risk taking may stem from a lack of general consensus as to what is "high" and "conservative" risk taking, and what is "extremely risky" and "cautious" risk taking, as well as from the different risk taking measures used. The terminology in the studies may also reflect the subjective appraisal of the experimenter as to which levels of risk taking are most desirable or optimal for adaptation.

Fear of Failure

Fear of failure has become one of the major concepts in studies concerned with risk taking, due primarily to the work of Atkinson (1957). Through his work, individual differences were introduced into decision making in the form of motivational constructs derived from the factor of need achievement. According to Atkinson's model of risk preference two motives are present in achievement situations; the need for achievement called the motive to approach success, and an inhibitory motive which came to be known as the motive to avoid failure. An individual may want to succeed at a task and be motivated to perform it, but worried about failure and also inclined to avoid it. Atkinson posed his model in mathematical form. The tendency to work for a particular goal as it is expressed behaviorally is called the resultant achievement motivation or tendency (T_R). The resultant tendency is the outcome of the conflict between two opposing tendencies, the tendency to approach success (T_S) and the tendency to avoid failure (T_{AF}). Each of these opposing tendencies is determined by three factors: the motive, a relatively stable personality characteristic; the expectancy, or subjective probability; and the incentive.

The terms for the model include: (a) a relatively stable motive to approach success (M_S) or to avoid failure (M_{AF}); (b) a subjective probability or perceived likelihood

of success (P_S) or failure (P_F); and (c) the positive incentive value of success (I_S) or negative incentive value of failure ($-I_F$). The product of the three success variables ($M_S \times P_S \times I_S$) is the tendency to approach success (T_S) and the product of the three failure variables ($P_F \times M_{AF} \times -I_F$) is viewed as the tendency to avoid failure (T_{AF}). Since (T_{AF}) is always a negative quality, the resultant tendency equals (T_S) + (T_{AF}) and is either positive indicating a success orientation, or negative predicting a failure orientation.

To measure individual differences in the motive to achieve success (hope of success), the Thematic Apperception Test (TAT) (Murray, 1943) is commonly used. Subjects are shown a series of ambiguous pictures and asked to write a short story about what is happening in each picture. The index for hope of success is obtained by analyzing the story content for achievement imagery.

The motive to avoid failure (fear of failure) can be assessed using the Text Anxiety Questionnaire (TAQ) (Mandler & Cowen, 1958), which provides a self-report measure of how anxious a person feels in a test situation. Scores on the TAT and the TAQ have been used both simultaneously and separately to predict risk taking preference (Atkinson & Litwin, 1960).

To predict behavioral tendencies in risk taking, Atkinson used the constructs of hope of success and fear of failure, along with the assumption that the incentive value of a task varies with the probability of success. That is the value placed on succeeding increases or decreases with the difficulty of the task. From the above, predictions concerning risk choices were made. When an individual is motivated by the hope of success he is attracted to risk taking tasks of intermediate difficulty where the subjective probability of success is at or near .50. If a person is motivated by a fear of failure he will avoid tasks of intermediate difficulty. Instead he tends to choose low risk tasks, where rewards are small but there is little chance he will fail; or high risk tasks because he cannot be expected to succeed at these and consequently does not experience self-blame or embarrassment. The Atkinson theory of risk preference has been confirmed many times experimentally (Atkinson & Litwin, 1960; Moulton, 1965) and in a number of non-experimental studies (Isaacson, 1964; Mahone, 1960).

Although the Atkinson model was intended to include only skill situations, it has been demonstrated in chance situations as well (Hancock & Teevan, 1964; Littig, 1962). Weinstein (1969) suggests that both chance and skill are components in most risk taking situations, and the degree of skill or chance involved depends on the individual's

perception. He may picture a skill task as primarily under the influence of chance or overestimate his own control in a situation that is determined mainly by chance.

The risk taking behavior of the individual high in fear of failure is understood most easily "in terms of what he is trying not to do" (Atkinson, 1964, p. 261). He is motivated "not to perform" a task in which the outcome could be failure. His interest in achieving is negligible, yet his anxiety about failing may be intense. His tendency to be anxious about failure may lead him to view all situations where his performance may be evaluated as threatening. Consequently his behavior tends to be of either an avoidant or defensive nature. The high fear of failure individual is most concerned with avoiding intermediate risk, but is not positively motivated to perform achievement oriented activity at any level (Atkinson, 1964). The motive to avoid failure acts as an inhibitor on any activity which might lead to failure. Consequently, he will only act, if his fear of failure is overcome by other sources which he perceives as providing satisfaction. In the event he decides to undertake the activity, he will be attracted to tasks that are either very easy or very difficult since, as was mentioned previously, the probability of success is respectively very high or so low that failure is no cause for embarrassment.

Individuals high in fear of failure often react atypically to success or failure. They may raise their level of aspiration after failure and lower it after success (Moulton, 1965). According to Kogan and Wallach (1967) the high fear of failure person may be attending to himself in a way that causes him to neglect features of the task and as a result he frequently performs poorly.

With few exceptions (Roberts, 1975), studies examining hope of success and fear of failure in relation to risk taking preferences have used males as subjects. The reluctance to use females for research in this area has stemmed from the inconsistencies found for female subjects in earlier studies (Atkinson, 1957). Although males in these investigations showed a clear preference for intermediate risks when motivated by hope of success and a preference for extreme risks when motivated by fear of failure, this relationship was not indicated for females.

As an explanation for these inconsistencies, Horner (1969) posed a third achievement motive, the motive to avoid success (fear of success). She contended that women are worried about success as well as failure in achievement oriented situations:

Thus consciously or unconsciously the girl equates intellectual achievement with loss of femininity. A bright woman is caught in a double bind. In testing and other achievement oriented situations she worries not

only about failure, but also about success. If she fails she is not living up to her own standards of performance; if she succeeds she is not living up to societal expectations about the female role For women, then, the desire to achieve is often contaminated by what I call the motive to avoid success. (Horner, 1969, p. 38)

Horner demonstrated the motive to avoid success in female subjects using a hypothetical dilemma related to an academic situation. Findings from this study suggest that the fear of success may combine with the fear of failure and hope of success to alter the effects for women, particularly when intellectual performance is being evaluated in a competitive situation.

It appears then that many women may be in conflict about achievement in provinces traditionally considered a man's domain. French and Lesser (1964) have suggested that a proper area for investigation might be the relevance of goals in relation to achievement motivation in women. There is some evidence to suggest that males and females may be characteristically different with respect to achieving tendencies. Mehrabian (1969) concluded that high achievement motivation (hope of success) in males tends to be associated with independence from current norms and the invention of new ones, while in females high achieving tendencies appear to be related to the acceptance and continuation of the present norms. The viewpoint that achievement in females is more

likely to be expressed through attachment to social norms is congruent with findings by Anastasi (1958) that females are more socially oriented. French and Lesser (1964) found that college women holding high social and homemaking values were more likely to respond to achievement measures when the cues were relevant to goals appropriate for the woman's role. Mehrabian (1969) attributes the difference in achieving tendencies among males and females to early socialization processes. Males are expected to find success through personal achievement in intellectual, occupational or athletic activities while females are encouraged to define their success in terms of interpersonal relationships and eventually in the role of wife and mother. Sears, Maccoby and Lewin (1957) have shown that mothers tend to reinforce their sons for aggressiveness, independence and self-assertion and their daughters for conformity, dependence and submissiveness.

Returning to achievement motivation in males, the assumption has been that it is expressed in intellectual or leadership activities. Evidence supports this position in that fear of failure in males can frequently be measured in terms of the anxiety aroused when the individual is confronted with potential evaluation of his performance in competitive intellectual tasks. If achievement for females is manifested in the continuation of existing norms and values in the interpersonal sphere, then fear of failure in females.

should have a related mode of expression. A parallel consideration of fear of failure, as it appears in males, suggests that fear of failure in females might be measured in terms of anxiety aroused, when the individual is confronted with potential evaluation of her performance in the interpersonal sphere and with respect to her adherence to social norms.

A slightly different perspective on fear of failure has been offered by other researchers; one that embraces the commonalities in failure avoidance for both males and females. Birney, Burdick and Teevan (1969) have pointed out that the fear of failure in achievement situations may be more accurately described as a fear of the negative evaluation of others according to their standards, rather than the fear of task failure based on one's own standards of excellence. In support of this position Kates and Barry (1970) found that performance decreases in high fear of failure subjects under conditions of public evaluation. High failure avoidance negatively affected performance on difficult concept problems when the subject was required to verbalize a solution in the presence of the experimenter. On the other hand, the high fear of failure subjects were more successful than low failure avoidance subjects under conditions of mechanical feedback where public indication of failure was eliminated.

If fear of failure is in essence a fear of negative evaluation by others, then the study of fear of failure in women might be more fruitfully pursued in a context where the prospect of evaluation is more uniformly perceived as relevant to society's expectations for them.

Age

Marmor (1967) discusses the crises that a middle-aged individual must face: physical evidences of aging in a society which places a high value on youth, the loss of children who leave home for college or marriage, the realization that many hopes will not be fulfilled, the loss through death of relatives and friends, and the confrontation with one's own mortality. For a number of reasons, both psychological and cultural, women may be more vulnerable than men to crises during this period of life. Specifically, more importance is attached to beauty and youth in women than in men. At the same time, the woman must contend with the loss of her reproductive capacity which is more definitive of her role than a similar capacity in the male. A diminished sense of usefulness in her role as wife and mother accompanies the loss of children, particularly when these roles have been the primary ones. These problems may assume even greater magnitude should she find herself involved in the process of divorce during this period in her life.

Studies relating age and risk preference generally show a tendency for level of risk taking to decline with increasing age (Robins, 1969; Vroom and Pahl, 1971), although in some instances no relationship has been demonstrated (Fongberg, 1971). Findings by Botwinick (1969) indicate that young and elderly subjects respond similarly in decisions involving risk, unless they are given the option of not responding at all. Under these conditions the older subjects chose the non-response option, the younger subjects did not. Botwinick interprets this as a tendency for the elderly to simply avoid decisions where risk is a factor, rather than a cautious attitude toward problem solving.

One of the more intensive studies of age and risk taking was conducted by Kogan and Wallach (1964) among elderly adults and college students of both sexes. To assess risk taking levels, the authors developed the Choice Dilemma Questionnaire, an instrument consisting of a variety of imaginary situations involving risk. The subject is asked to state for each situation the minimum odds he would require for choosing the more attractive but riskier alternative. Their findings indicated that the older subjects were significantly more conservative in their choices than the students, particularly on items involving financial gain and loss. The older subjects, both male and female, also displayed more consistency in risk taking level for varying

content than did the college students. In this same study the authors observed a steady decline in risk taking in women in later years as opposed to a more abrupt change for men. These results, along with findings obtained in studies of risk taking among children (Slovic, 1966) point to the possibility of differential changes in risk taking for males and females across the life span (Kogan & Wallach, 1967).

Stress

Changes in normal life patterns require varying degrees of readjustment. According to Holmes and Rahe (1967), it is these changes in life patterns rather than the undesirability of the change that causes the stress. Rahe, Meyer, Smith, Kjaer, and Holmes (1964) established a relationship between clusters of life events requiring change in organized living patterns and the time of onset of physical and mental illness. They used an interview technique to ascertain the number and type of events. In later work, Holmes and Rahe (1967) constructed the Stress Readjustment Rating Scale (SRRS) to measure the magnitude of adjustment required for specific life events. The events considered are derived from social transactions involving the areas of marriage and family, occupation, economics, residence and interpersonal relationships, among others. The commonality among these life events is the significant change in the normal life pattern of the

individual that follows their occurrence. This change invariably requires some coping behavior on the part of the individual. Dohrenwend (1973) has investigated the stressfulness of life events from the standpoint of both life change and the undesirability of events. Her findings indicate that stressfulness defined as life change is a better predictor of psychological impairment than stressfulness conceived of as undesirability of events. This is in agreement with the concept behind the construction of the SRRS.

The stress that occurs as a result of life change may alter cognitive and behavioral functioning, according to Selzer and Vinokur (1974). Lauer (1973) administered the SRRS and the Taylor Manifest Anxiety Scale to a large sample of American and English subjects and reported a significant positive relationship between SRRS score and a generalized state of anxiety. As was previously mentioned anxiety is a primary component in the fear of failure construct (Atkinson, 1964). Findings from other research show social stress events to be related to psychological impairment (Aponte and Miller, 1972; Dohrenwend, 1973) and automobile accidents (Selzer, 1969; Selzer, Rogers & Kern, 1968). However, Daniel (1973) has reported favorable psychological changes among subjects in the process of adapting to stress over an extended period of time.

Experimentally induced stress, in the form of contingent and non-contingent shock has been shown to increase risk taking in female college students (Lieblich, 1968). However, the study of stress in a laboratory situation is qualitatively different than social stress, and it is necessarily brief and relatively harmless where human subjects are involved. Consequently, long term changes in anxiety level and behavior changes due to stress are not suitable subjects for laboratory studies. Dohrenwend (1961) contends that experimental stress situations contrived to study human behavior are "relatively impotent" and have little in common with major stress events that occur naturally in the social environment. Since divorce usually precipitates a number of major changes in life style, the amount of social stress experienced by the divorced individual is likely to be relatively high when compared to that of her married counterpart.

Divorce

The increasing prevalence of divorce has been accompanied by a more slowly developing recognition of the problems it creates for the individuals involved. The paucity of literature on divorce is demonstrated in the limited attention given to related research in the professional journals. Freund (1974) has observed that in the period from 1939 to 1962 less than one article per year on divorce appeared in

the Journal of Marriage and Family, and most of these were statistical, dealing with sociological and legal aspects. From 1963 to 1969 the articles were more likely to deal with the emotional side of divorce, but had increased little in number. In the Family Coordinator only one article on divorce appeared in the period from 1968 to 1972. Until recently studies in this area have seemingly ignored the aftermath of divorce and have concentrated instead on causes and preventative measures. Research concerned with the effects of marital disruption on children have been the exception.

The incidence of divorce has been conservatively estimated as involving three to four out of every ten marriages (Defazio & Klenbort, 1975; Herman, 1974) and is steadily increasing (Norton & Glick, 1976). Although divorce is no longer uncommon and is viewed by some segments of society as a viable alternative, it is still regarded in most quarters as a counter-normative phenomenon (Hill, 1976). The divorced individual is no longer within the mainstream of society, and commonly experiences varying degrees and forms of social censure. The ideal of family life in our culture leads many to view unmarried adults as incomplete or even as failures (Herman, 1974). Freund (1974) has observed that the divorced woman in particular may meet with hostility, rejection or disapproval. According to

traditional views of appropriate sex role behavior, men are regarded as task specialists, better equipped to deal with the external world. Women on the other hand are considered to have "innate" capacities for emotional responsiveness. This presumably fits them for the task of providing the emotional support and nurturance which is viewed as the central function of the family (Feldberg & Kohen, 1976). Therefore, if the marriage fails she is more likely to be the one considered responsible. Brandwein, Brown and Fox (1974) have commented on the forms of stigmatization subscribed to in reference to divorced women. Families headed by a divorced female are often referred to as "broken" or "disorganized." The woman herself may be viewed as one who was unable to keep her mate, and there may be expectations that her children will have more problems or get into trouble.

Aside from the implications of social deviancy associated with divorce, the dissolution of the marriage often precipitates an onslaught of new problems: social isolation, economic hardship, changes in life style and strained relations with one's children. At the time these immediate practical problems are demanding attention, the newly divorced individual may also be going through an emotional crisis. Both partners are likely to experience considerable emotional distress some time during the process of divorce, even though one partner may sincerely desire the

divorce (Goode, 1956; Weiss, 1976). Defazio and Klenbort (1975) describe three stages in the divorce process. The initial stage is often one of shock, accompanied by feelings of confusion, disbelief and anxiety. It is not uncommon for one partner to react by denying the reality of the impending divorce until legal procedures force its recognition. Loneliness can be intense during this period and may be accompanied by rage at the partner for abandonment. In the second stage depression and rage are paramount although anger may not be expressed or even experienced. The hurt and anger must be dealt with, however, if the individual is to pass through this phase. The third stage may bring a new or stronger sense of being an individual, separate and alone, along with feelings of exhilaration and sometimes anxiety as he attempts to reconstruct his life.

Weiss (1976) drew on evidence from studies of individuals who have been widowed or separated to show that loss of attachment figures may be the component that causes much of the emotional turmoil when the marriage comes to an end. He compares this bonding to the spouse with the attachment bond of children to their parents as it is described by Bowlby (1961). In noting the similarities among these two syndromes, Weiss cites the persistence in both cases of the distress and grief experienced regardless of whether the relationship has been happy or unhappy, and whether or not the individual has

initiated the disruption. In both instances the prospective separation or absence may produce feelings of anxiety, fear, even terror. Just as the child may want to return to a parent with whom he has been unhappy, the individual who has decided against a continued relationship with the spouse may feel drawn to him or her. Children reacting to loss of a parent may experience rage over desertion as well as anxiety. They may hold on to the lost parent in fantasy or try persistently to reestablish the relationship, not unlike estranged mates.

Morris and Prescott (1975) found common feelings and concerns among the divorced individuals in their Transition Groups. Members reported experiencing feelings of rejection and wounded pride, along with a loss of self-esteem. They evidenced a "sense of failure, and fear that something was terribly wrong with themselves because of the divorce" (p. 236). Although feelings and attitudes among the "leavers" and the "left" in the divorce process seemed to differ initially, this distinction lessened and eventually the two groups appeared to be very similar.

The most prevalent state of mind among the recently divorced appears to be a sense of failure (Edwards & Hoover, 1974). Hardy and Cull (1974) ask,

How can any couple get a divorce without some sense of failure? Failure in marriage makes one more conscious of failure. Failure always brings on a feeling

of isolation, as if to say, "Others are successful-- I have failed." One is prone to be more self-conscious about failure in relationships with children or at work and in association with the opposite sex. (p. 173)

Since the responsibility for the emotional life of the family often belongs to the woman, women are more likely than men to regard divorce as a personal failure (Freudenthal, 1959). Edwards and Hoover (1974) note that the initial sense of failure may develop into "an all-pervasive sense of worthlessness" as a result of the inability to cope with the conflicting emotions that follow divorce.

Bohannon (1970) states that the emotional impact of divorce is so great that usual ways of acting or responses are not adequate. He describes six different experiences of separation that combine to make divorce complex. Society has not developed ways to help the divorcee handle any of these satisfactorily. The personal experiences are: (1) the emotional divorce and the resolution of grief, (2) the legal divorce, or grounds, (3) the economic divorce which deals with the division of money and property, (4) the co-parental divorce, involving custody and visitation rights as well as the establishment of one-parent homes, (5) the community divorce, centering on changes in friends, social life, and perhaps residence, and (6) the psychic divorce which involves establishing or reestablishing autonomy.

It has been known for some time that poverty and divorce are related, in that divorce is more likely to occur in poorer families (Carter & Glick, 1970). Brandwein et al. (1974) cite evidence indicating that poverty, particularly for the woman, may follow from divorce. They point out that women as a whole, regardless of marital status, do not earn the incomes that are available to men, and they are expected to depend upon a husband for the major portion of their support. For the divorced woman with small children, divorce may lead to a chain of circumstances ending in severe economic hardship. Although men are required by law to provide support for their children after divorce, there is evidence that many do not (Brandwein et al., 1974; Goode, 1948). Consequently, the woman, in many instances, must assume major responsibility for their support, even though she is less capable of providing for them. If she is able to find a job, her wages may be low due to a lack of education or training, or to a loss of skill through disuse while caring for her family during the marriage. She may find it disillusioning to deal with job discrimination in regard to pay and promotions. Even if she has worked prior to the divorce, it is probable that her husband was bringing in the major portion of the income, and her pay was used for luxuries and extras.

Since taking a job interferes in most instances with her availability for child care and homemaking, reliable day care

must be obtained. In some cases, women are not able to find jobs that justify costs of child care, and must turn to public welfare. Under these circumstances the income provided is minimal, and the family is likely to remain at a poverty level until the mother remarries or the children are old enough to dispense with the requirement of day care.

Baquaert (1976) has argued that money, at least a minimal financial security, can be a crucial variable in post divorce adjustment. Economic status also appears to be related to risk taking, at least where substantial differences in income are being considered. In a study comparing risk taking in unemployed welfare recipients and college students, Fleming (1973) found that welfare recipients were less likely to choose high risk alternatives than were the college students.

In sum then, the divorced woman may need to adapt the life style of her family to a drastically lowered income. The resources she needs to build an independent life for herself are usually difficult to obtain, particularly if she has dependent children. If she receives income from her former spouse or from the welfare agency, it may be contingent upon certain behavior on her part. Thus she may feel strings are attached to her income regarding her personal choices. It would seem that one who is continuously reminded of their

dependent state would have difficulty developing a healthy attitude toward risk taking.

The presence of children may be both a comfort and a reminder of failure, as the woman wonders how she will cope as a single parent, and what consequences the divorce may have on her children's development. She may be concerned about disciplining them, particularly if she feels she must compensate for the absence of the father. According to Freudenthal (1959) the single parent feels a sense of incompleteness, a sense of failure and guilt, and a lack of companionship. She envies women who have a mate to assume joint responsibility for decisions concerning children. In studying the effects of divorce in women, Bequaert (1976) found that their overriding concern seems to be how the children will react. Having heard and read from many sources that divorce is "bad" for the children involved, the divorced mother is likely to be apprehensive concerning their future. The children, too, must adjust to many changes other than the father's physical absence. The new life style may involve a move to a different neighborhood or even another city. In some instances the relationship with relatives on the father's side is terminated. Children of divorced parents may be handicapped in finding playmates or developing close friends, because they feel "different" from their peers.

The divorced woman must also begin a new social life and find a way to develop sexual relationships. Although activities of this nature may sound attractive as a solid step toward building a new life, they are often experienced as threatening. Divorced people may feel particularly inadequate as they attend social events alone in a coupled society. Consequently a reentry into social life as a single person often begins with attendance at functions planned by various singles organizations. Hunt (1966) speaks of the subculture of the formerly married and their tendency to band together. The divorced woman may find that the social skills required for a single person are weak from disuse, and appropriate dating behavior may need to be relearned. Though her self-esteem has hit a low point, she feels she must try to be attractive to men. If her self-worth has been severely shaken the divorced woman may tend to withdraw from life. At the other extreme she may embark on a strenuous round of activity and social life to escape, momentarily, feelings of hurt, anger and self-doubt. Occasionally this results in premature second marriage, with the problems of the first, before the individual has had time to understand her contribution to the breakdown of the first marriage.

Society does little to aid divorced mothers. Inflexible hours of work and school do not coincide (Brandwein et al., 1974). She must attend to the psychological concerns of her

family, as well as her own personal needs, within a framework of priorities which typically give first place to arrangements for meeting these schedules.

In many instances the divorced individual must revise her identity in terms of occupation and work, sexuality and social relationships, sometimes from a very weak base. Women who married while very young may have perceived their own identity as merely an extension of their husband's, and never developed a personal identity (Hardy and Cull, 1974). Older women may have grown up during a period when role definitions were quite rigid, and matters outside the home were left to the husband. Reiss (1971) has noted that husbands and wives tend to be responsible for different areas of decision making within the marriage. Wives, for instance, select the family's food, while husbands choose the family car. Men usually make the decisions that are regarded as important in our society and those involving the greater risk.

Brandwein et al. (1974) have noted that the divorced woman must be the main liaison between her family and the community. However, our society grants to the male the authority to represent the family, and the divorced female head of the household may find that her efforts to act on her family's behalf, outside the home, are ignored or rejected. Her "powerlessness" and lack of status within the community can effect areas as diverse as her relationships with her

neighbors, with landlords and service people, and indirectly her authority over her children.

Thus, in the process of divorce, there is a drastic and simultaneous change in most areas of life that may bring on anxiety for a woman. There is the very absence of her spouse, often a lower standard of living, less time for the children, and that time may be marred by fatigue and feelings of failure. Though she may be employed outside the home, she has the marketing and shopping, housework, and the psychological, social and physical care of the children. Frequently, there is increased responsibility in unfamiliar areas.

Many women appear to cope with the divorce process, reexamine their value system and life goals, and emerge with a new and more satisfying sense of self and a stronger social and personal identity. Heritage and Daniels (1974) studied the post divorce adjustment of divorced persons and found the difference between the "better adjusted" and poorer adjusted could be attributed most to Apprehension and Tenseness as measured by the 16 PF Questionnaire. Findings by Blair (1970) indicate that breaking old habits is the most difficult part of adjusting for divorced women. Adjustment was more difficult for those who were older at the time of the divorce, had been married a longer period of time and those divorced a shorter period of time. A low self-concept and high levels of anxiety were also shown to be obstacles to

adjustment. Women who had a divorce at the suggestion of the husband and those who had inadequate financial support and a limited education also indicated more problems after the divorce. Barringer (1974) found adjustment was easier for those who dated frequently, who had been physically separated for a longer period of time, and those who attended church.

Divorce appears to be not only a stressful experience but one carrying strong connotations of failure. Even brief experiences of failure have been shown to increase negative self-assessments and reports of worry and fear (Fry, 1976). However, the links between incidents involving perceived failure and the fear of failure motive have not been clearly established. Research into fear of failure using divorced individuals as subjects provides an occasion to study a population who have shared a common experience of some magnitude that frequently evokes negative social evaluation from others, feelings of failure, and emotional distress.

Statement of the Problem

The purpose of the present research was fourfold:

- (1) to assess fear of failure in divorced and married women,
- (2) to compare risk taking in divorced and married women,
- (3) to explore the relationship between fear of failure and

(4) to investigate the relationship between social stress and risk taking behavior.

In part, this study was concerned with measuring fear of failure in subjects under circumstances where failure is associated with the individual's independent behavior. Women who have been divorced may perceive themselves as having failed in a major life task. The effects of failure have been demonstrated previously, using devices such as failure oriented instructions (Hartnett & Barber, 1974). Subjects under this procedure responded by making high risk decisions. However, Child and Whiting (1949) have suggested that, in some instances, experimental techniques used to produce fear of failure do not obtain ego involvement, and thus do not lead to the conclusions that would be reached in an investigation of failure orientation in every day life. An experience such as divorce may be more likely to arouse a fear of failure, particularly in women, since the ego involvement of the subject is usually ensured. Should this be the case, women who have been divorced might be expected to show more anxiety and fear of failure, principally in interpersonal and social situations.

It was the purpose of this research, also, to examine risk taking tendencies in divorced women, divorce having been established as an experience involving considerable emotional distress (Bohannon, 1970; Morris & Prescott, 1975).

Emotional experiences, particularly those of a traumatic nature, may alter attitudes toward risk taking. Steiner (1972) reports that preferences for risk seem to be determined by recent experience as well as by stable personality dispositions and the characteristics of the situation. Extremes in risk taking have been shown to be related to the fear of failure (Atkinson, 1964). Less effective patterns of risk taking may also be associated with life style changes that frequently accompany divorce, particularly those necessitated by lowered economic status.

Although the relationship between fear of failure and risk taking has been confirmed many times for males, studies using females as subjects have produced ambiguous results. Weiner and Kukla (1970) have indicated this may be due to the inadequacy of measuring instruments. Other research (French & Lesser, 1964) suggests that the achievement motive may be associated with performance in social situations for some females rather than in an intellectual context as it is for males. Cronbach (1970) has noted that it may be necessary to alter the theory underlying the assessment of achievement motives, if instruments are to be used that will account for these motives in women. Whether the lack of consistent results for females in achievement studies is due to developmental factors that alter the direction of the achievement motive in women or to an inadequate means of assessing the

motive, there is a need for further research in this area. Consequently a number of fear of failure instruments were employed in this study in an effort to supplement and refine the literature dealing with fear of failure and risk taking in females.

Finally the relationship between stress and risk taking was studied on the premise that experiences of a stressful nature other than divorce may also be related to extremes in risk taking. It was anticipated that the different life styles likely to be represented by divorced and married women would result in a sample that was heterogeneous with respect to experiences of social stress.

Need for the Study

The magnitude of change that occurs as a result of divorce calls for rational decision making skills and effective risk taking. Since married women often rely on their husbands to make the important decisions (Reiss, 1971), the newly divorced woman may have had little preparation for this increased responsibility. Yet her personal adjustment as well as that of her children may depend in part on her ability to make decisions in situations involving risk. Brandwein et al. (1974) have studied the social and psychological situation of divorced mothers and the effect it is likely to have on their families. They point out that if the single parent

adapts, or fails to adapt, the children tend to follow suit. It is difficult for the divorced mother to meet the emotional demands of her family when she is not coping effectively with present social and economic problems.

Payne and Pittard (1969) have reported that divorce among middle-aged couples is increasing relative to divorce among younger couples. A woman in this age group may be confronted for the first time with the need to support herself, invest and manage money and perhaps locate a new residence. She is more likely to be influenced by the cautiousness which comes with age, and may emphasize security and predictability to the detriment of growth.

Information concerning risk taking tendencies in divorced women has implications for therapy. DuCette and Wolk (1972) have suggested that persons who choose extremes in risk taking behavior will probably benefit little from therapy, since either very risky or very cautious behavior will give the individual only limited feedback about his abilities. The divorced woman's attitude toward risk taking will need to be considered in therapy since her willingness to take appropriate risks will probably affect both her physical environment and her psychological adjustment. McClelland contends that risk taking activities have their source in a strong achievement motive. In a study with businessmen (McClelland and Winter, 1969) he implemented a

program to increase achievement motivation and hence risk taking effectiveness. Although the project was successful, the pragmatic approach adopted by McClelland left some question as to which of the techniques used were most useful.

Hypotheses

Hypothesis I: There is a relationship between divorce and fear of failure. Divorced women may be expected to score higher in fear of failure than married women, since the experience of divorce is generally regarded both personally (Feldberg & Kohen, 1976) and socially (Freund, 1974) as a significant failure experience.

Hypothesis II: There is a relationship between divorce and risk taking. It may be expected that the social, economic and parental problems that arise in the context of divorce, along with fear of failure, will be reflected in more extreme risk taking scores among divorced women, in contrast with more moderate scores among married women.

Hypothesis III: There is a relationship between divorce, age and risk taking. It may be expected that extreme scores among older divorced women will fall at the low end of the continuum, relative to those of younger divorced women, due to the effect of greater caution in risk taking with increasing age.

Hypothesis IV: There is a relationship between social stress and risk taking. The related research is not sufficient to support a prediction in this instance.

Hypothesis V: There is a relationship between fear of failure and risk taking in both married and divorced women. It may be expected that subjects scoring high in fear of failure will tend to choose either extremely high or extremely low risks, while low fear of failure subjects will choose intermediate risks. Although this hypothesis is consistent with Atkinson's (1957) model of risk preference, it has not been supported for females. However the measures of fear of failure used in this study are believed to be more appropriate for women.

Operational Definitions

In order to examine the relationships among the variables described, it was necessary to represent each of them in measurable terms. Those under consideration here include fear of failure, risk taking and stress.

The construct fear of failure has been defined as an individual's fear of being evaluated by others according to their standards, and has been described as more "socially sensitive" than the achievement motive (Birney et al., 1969). Approaching the concept of fear of failure from this perspective requires another look at instruments commonly used

to assess fear of failure. Weiner and Kukla (1970) have pointed out that failure to achieve consistent results with females in achievement motivation research is due to the inadequacy of measuring instruments. Studies concerned with achievement motivation and risk preference commonly use a form of the TAT or a measure of test anxiety to assess fear of failure. In the former case TAT stories are analyzed for Hostile Press imagery. High and low scores indicate fear of failure and hope of success respectively. However, Weinstein (1969) has noted that the scoring procedure for Hostile Press was standardized using male subjects. More often fear of failure is represented by a measure of the anxiety experienced on tests and examinations. Two of the most widely used instruments for measuring test anxiety are the Test Anxiety Questionnaire (TAQ) (Madler & Cowan, 1958) and the Debilitating Anxiety Questionnaire (DAQ) (Alpert & Haber, 1960). A high score is indicative of high fear of failure. Test anxiety has not been a useful measure of fear of failure in females. As findings by Mehrabian (1969) and Horner (1969) have suggested, fear of failure for males and females may have different determinants that are related to their sex role development. While for males test anxiety may provide a role relevant cue for social evaluation, it is likely that a more valid index of fear of failure in women would be

obtained in a context where perceived social evaluation is congruent with traditional feminine values.

Fear of failure was examined in this study using four instruments. Two of the measures, the Social Avoidance and Distress (SAD) scale and the Fear of Negative Evaluation (FNE) scale, were developed by Watson and Friend (1969) to measure social-evaluative anxiety. These scales purport to measure anxiety in social situations in much the same way the TAQ and the DAQ assess anxiety in testing situations. According to Watson and Friend the FNE scale is similar to measures of test anxiety in that both are concerned with measuring fear of negative evaluation. It differs from test anxiety in the sense that it is not limited to testing situations but is applicable in a variety of social-evaluative situations.

The first scale, the SAD, includes two subscales, social avoidance and social distress. Social avoidance is described as avoiding being with or talking to others; social distress as being tense, anxious or upset in interpersonal situations. Both subscales have been validated experimentally (Watson & Friend, 1969). The second scale, the FNE, measures the fear of negative evaluation, defined as "apprehension about other's evaluations, distress over their negative evaluations, avoidance of evaluative situations and the expectation that others would evaluate oneself negatively" (Watson & Friend,

1969, p. 449). Individuals who score high on FNE appear, by other measures, to be defensive and low in dominance and autonomy. Both the SAD and FNE scales are moderately related to a measure of general anxiety, the Manifest Anxiety Scale, and have a low correlation with the DAQ. This is desirable since it indicates that these scales are measuring anxiety specific to social situations as the authors intended. SAD also correlated negatively with achievement, and this was interpreted as demonstrating the social nature of the achievement motive. Both scales show correlations with other scales involving behavior in social-evaluative situations (Endler & Hunt, 1966). The authors found test-retest reliability for the FNE to be .78 and that of the SAD to be .68. Higher reliability figures were obtained for both scales in another instance involving a smaller sample. The SAD scale has been employed by Byrne (1971) to assess individual differences in social anxiety.

The Mehrabian Achievement-Risk Preference Scale (MARPS) is a test of resultant achievement motivation. Mehrabian (1968) developed this measure using Atkinson's (1957) concept of resultant achievement motivation, which is based on the difference between hope of success and fear of failure. Separate scales have been constructed for males and females based on the assumption that males and females do not view achievement in the same way. Reliability coefficients for

the female scale average about .60. The MARPS has been used extensively in studies of achievement motivation (Weiner & Kukla, 1970; Wolk & DuCette, 1973). However, Mehrabian (1975) has commented on the lack of consistency in findings where the female scale has been employed.

The fourth measure used as a fear of failure instrument was the State-Trait Anxiety Inventory (STAI) developed by Spielberger, Gorsuch and Lushene (1970). Trait anxiety (A-Trait) is described as an "anxiety proneness." This is manifested in a tendency to react to threatening situations with a corresponding degree of state anxiety. Test-retest reliability for the trait scale is .77 for female subjects. Spielberger et al. (1970) report correlations on A-Trait of .80 with the Manifest Anxiety Scale (MAS) (Taylor, 1953) and have concluded that MAS and A-Trait on the STAI can be considered alternate measures of trait anxiety. Gentile and Schipper (1966) were not successful in their attempt to establish a relationship between the MAS and risk taking. However Atkinson (1964) has indicated that the MAS may be a valid measure of fear of failure. Spielberger et al. (1970) contend that A-Trait is similar in character to the motives described by Atkinson (1964), in that it remains latent until it is activated by situational cues. It should be noted that Atkinson and Litwin (1960) used both hope of success and fear of failure measures in their research, but the fear of

failure measure, the TAQ, alone produced significant results. Hancock and Teevan (1964) have also confirmed Atkinson's theory of risk preference using a single measure, Hostile Press.

A wide variety of risk taking measures have been used by researchers attempting to validate Atkinson's (1957) theory of risk taking. Weinstein (1969) noted that laboratory studies tend to employ two types of skill tasks: problem solving such as puzzle tracing, and athletic tasks, including variations of ring toss or basketball. Most of these are clearly of a competitive nature. As was mentioned previously, gambling tasks are most frequently used in chance contexts.

It is difficult to establish adequate motivation in a laboratory where tasks involving risk taking are usually of a trivial nature. Individuals may also differ considerably in their willingness to adopt a game strategy that reflects the theory of the game (Kaufman & Becker, 1961). Steiner, Jarvis and Parrish (1970) found that subjects participating in a gambling game approached the game in different ways, sometimes adopting unlikely strategies which did not reflect their attitudes toward risk taking in everyday life. In some instances, researchers have employed as a measure of risk taking the frequency of guessing on an objective test, where the subject is penalized for guessing incorrectly. Ziller (1957) was able to relate this index of risk taking to

preferences for risky occupations among students. At any rate, such a measure would be inappropriate for the heterogeneous non-student sample to be used in this study.

The present research employed an approach to risk taking assessment that more nearly replicates risk taking as it appears in the circumstances surrounding everyday life. The Choice Dilemma Questionnaire (CDQ), devised by Kogan and Wallach (1964), consists of 12 hypothetical situations, each involving a choice between two alternative courses of action. The choice entailing the greater risk of failure is always presented as the more attractive should the outcome be successful. Subjects are asked to state for each situation the lowest probability at which the risk should be accepted. The CDQ is semi-projective, in that the subject is asked to make an advisory decision for a fictional person in a problem involving risk. It is assumed that his answers will reflect his own regard for the desirability of success relative to the undesirability of failure.

Kogan and Wallach (1964) concede that the subject's ego involvement in a hypothetical situation may be a problem. However, Runyan (1974) investigated the generalization from hypothetical to consequential situations in groups using the CDQ and found that real and hypothetical situations did not differ with respect to risk level, and other research (Wilke & Meertens, 1973) has shown that the individual takes

as much risk for himself as for someone else. The construct validity of the CDQ was established by Machr and Videbeck (1968). The CDQ has been used in 80% of all research involving the risky-shift effect (Dion, Baron & Miller, 1970), and has been employed extensively in studies investigating individual risk taking (Machr & Videbeck, 1968; Reed, Miller, Sensenig & Haley, 1972; Vroom & Pahl, 1971).

Hartnett and Barber (1974) demonstrated the effects of success and failure "sets" on the CDQ by altering the instructions so that they were either success oriented or failure oriented. Subjects given the failure oriented instructions made riskier decisions than their counterparts under the success oriented instructions. The authors noted that the subjects with whom failure was emphasized reacted similarly to persons high in "fear of failure."

The Social Readjustment Rating Scale (SRRS) was implemented to evaluate the variable of social stress. Designed by Holmes and Rahe (1967) for the purpose of evaluating life changes, the SRRS consists of a checklist of life events. Subjects indicate which events have happened to them within a specified period of time. For the purpose of this study, events occurring in the past year were considered.

The basis for the SRRS was a questionnaire containing 43 life events suggested by clinical data. Subjects were

asked to rate each item as to the relative amount and duration of change in accustomed life patterns resulting from the event. Marriage was given an arbitrary value of 500, and subjects assigned values for other events on the basis of their requiring proportionately more or less readjustment. The SRRS was constructed by dividing the mean score for each item by ten and arranging the items in rank order. There was a consensus of agreement about the values to be assigned to each event even when raters varied on age and cultural background. Since social readjustment is defined as the intensity and length of time needed to accommodate to a life event (Holmes & Rahe, 1967), the SRRS was designed to measure change from the "existing steady state" rather than the psychological significance of the event. Values for each event were based on the turmoil, upheaval and readjustment on the average that accompanied each event rather than the pleasantness or unpleasantness of the experience.

The SRRS provides a means to determine if life changes such as divorce, death in the family and financial reverses, and the adjustment they necessitate are related to behavioral changes. Using a modified version of the SRRS, McMurray (1970) studied the accident rate of individuals undergoing divorce. His findings indicated that the accident rate for the group doubled during the six months before and after the

divorce date. However, there were no female subjects in the sample.

A pilot study was conducted to establish correlations among the fear of failure measures under consideration for use in the present research and to investigate the relationship between the fear of failure measures and the risk taking instrument. Subjects were 27 female psychology students at North Harris County College, ranging in age from 19 to 42 years of age. Nearly half of the students were married. Correlations were calculated among the fear of failure instruments using the Pearson product moment correlation coefficient. The correlation between the SAD and A-Trait scales was .49. The FNE and A-Trait scales showed a correlation of .69. Split-half reliabilities for the SAD and the FNE were .84 and .89 respectively. Of the four measures used to assess fear of failure, only the MARPS was significantly related to risk taking (CDQ) ($p < .02$). Results on the FNE, SAD and A-Trait scales, when related to the CDQ, were in the appropriate direction, but did not reach significance. Since it was one of the concerns of the present research to examine instruments that may account for fear of failure in females, all four of the instruments considered in the pilot study were employed in this investigation.

In summary, four measures of the fear of failure: the FNE and SAD scales, the MARPS, and the A-Trait scale of the

STAI, were related to divorce. Risk taking as measured by the CDQ was related to divorce and age, to the four fear of failure measures, and to social stress as measured by the SRRS.

Chapter 3

Method

Subjects

Subjects for the study consisted of 40 married women and 40 divorced women. Volunteers were obtained from a variety of sources, including educational and recreational groups, church organizations and individual contacts. An effort was made to select married and divorced subjects from organizations that were similar in character. Participants in the divorced group were limited to women who had been legally divorced for at least one year and had not remarried. It was anticipated that this restriction on selection of subjects would exclude from the study women who are in the crisis period immediately following divorce. Since it was the intent of this research to investigate stable, long-term tendencies, this qualification was considered necessary. Subjects in the married group were selected from volunteers who had been married one time only, for at least five years. For married couples who eventually divorce, five years appears to be the median period of time from marriage to separation (Nye & Berardo, 1973).

The presence or absence of children is likely to influence life style and perhaps the variables being studied,

therefore subjects in both groups were restricted to those having at least one and no more than four children. Family income among subjects in the two groups was kept approximately equal. Since all subjects were employed outside the home, family income for the married subjects included income from two employed individuals. Divorced subjects relied primarily on one salary and, in some instances, child support. Brandwein et al. (1974) have cited evidence indicating that downward economic mobility following divorce is a common occurrence among women regardless of their socioeconomic status prior to divorce. Based on 1969 figures, 9% of all families headed by women, compared to 55% of two-parent families, had incomes over \$10,000. In the present study, income for the married and divorced groups was balanced by basing family income for divorced subjects on income prior to divorce.

The point for assigning both married and divorced subjects to the "older" or "younger" group was arbitrarily set at 40 years of age. Half of the divorced subjects and half of the married subjects used in this research were under 40 years of age. Cells were balanced with 20 subjects per cell for younger married, older married, younger divorced and older divorced groups to make a total of 80 subjects.

It should be noted that the necessity for using volunteers in a study where fear of failure is a variable may introduce

some bias. Feij (1976) validated a fear of failure measure, using as a behavioral index the tendency to avoid participation in a psychological experiment. Since the present study was concerned with comparing relative fear of failure orientation among married and divorced women, the postulated higher fear of failure in the latter group would probably tend to minimize differences between the two groups.

Procedure

Data required for this research was obtained by administering a battery of tests and a questionnaire requesting biographical and social data. To measure the variable fear of failure, four instruments were used: the Mehrabian Achievement-Risk Preference Scale (MARPS), the Social Avoidance and Distress Scale (SAD), the Fear of Negative Evaluation Scale (FNE), and the A-Trait scale of the State-Trait Anxiety Inventory (STAI). The Choice Dilemma Questionnaire (CDQ) was employed to measure risk taking. Social stress was assessed using the Stress Readjustment Rating Scale (SRRS). Sample items for each test are given in Appendix A. The MARPS consists of 26 items and employs a Likert-type response format. Subjects indicate their extent of agreement or disagreement with each item by responding with an appropriate number from plus four to minus four. The SAD scale and the FNE scale use a true-false format. The SAD

has 28 items. To minimize response bias one-half of the items are phrased so that a true response is indicative of some aspect of social anxiety. The remaining 14 items are phrased for a false response. The FNE scale has a total of 30 items of which 17 are answered as true and 13 as false to indicate a fear of negative evaluation.

The STAI A-Trait scale consists of 20 statements. Responses to each item are made on a modified Likert scale with four options: Almost Never, Sometimes, Often, and Almost Always. On 13 of the items, a response of Almost Never indicated low anxiety. The wording is reversed on the other 7 items, so that a response of Almost Never is indicative of high anxiety. The CDQ is composed of 12 hypothetical situations. The subject responds to each item by circling the appropriate number, 1, 3, 5, 7, 9, or 10, to indicate the chances in 10 that would make the situation described an acceptable risk. A biographical-social questionnaire was also administered to obtain demographic data and general information such as the length of time married, the length of time divorced, and the extent of social and sexual activity (see Appendix B). The order in which the measures were administered was varied.

Since the women who were subjects for this study had family obligations and were employed outside the home as well, they had little free time available. Consequently it was

necessary to arrange testing sessions to fit individual time schedules. The urban location required that travel time also be taken into consideration. Therefore testing sessions were held in a location as near to the subject's residence as was feasible. As a result of these limitations, environmental conditions varied during testing. Subjects were tested individually or in small groups. Sessions were held in church rooms, club rooms, school rooms or in homes.

At each session the following instructions were given verbally:

Thank you for being a subject in this study. I will pass around a sheet of paper and if you would like to have a summary of this research mailed to you when it is completed, please sign your name and address. You each have a packet of test materials and also a form requesting your consent to participate in this experiment. Please take a moment and look over the contents of your packet and read the consent form. If you have any questions, I'll be glad to answer them.

When you have completed your questionnaire, please return them to the envelope and place them on the table. I will collect your consent forms as soon as you have read and signed them. If at any time, you should decide that you do not want to participate in this study and would like to stop, please feel free to do so.

Plan of Analysis

Scoring procedures for all measures were in accordance with those outlined by the respective authors. In order to examine statistically the relationships among the variables under investigation, it was necessary to alter the format of the scores for risk taking obtained on the CDQ. Response

alternatives for the CDQ are phrased in the form, "chances are 5 in 10." The probability choices provided for the success of the risky alternative are 1 in 10, 3 in 10, 5 in 10, 7 in 10, and 9 in 10. If the subject refuses the risky alternative regardless, a score of 10 in 10 is assigned as the probability. Plax and Rosenfeld (1976) have noted that when these items are summed algebraically on the CDQ, a part of the response variation is lost. Since it is the variation in terms of moderate or extreme choices that is the main focus of interest in this study, each subject's raw score on the CDQ was converted to a Subject Risk Deviation Score (SRDS). The SRDS is similar to the Average Deviation score developed by Litwin (1958) and used in a study by Atkinson and Litwin (1960) to score risk taking in a ring toss game. The SRDS is the subject's mean deviation over the 12 items with respect to the median for all 80 subjects. Thus the SRDS indicates the tendency of individuals to prefer moderate as opposed to extreme risks. A three step procedure was followed in computing the SRDS for each subject. First the Average Deviation from the Median (ADM) was calculated.

$$ADM = \frac{\sum_{j=1}^{80} \sum_{i=1}^{12} (X_{ij} - Mdn)}{960}$$

where:

ADM = Average deviation from the median for all 12 items
from all 80 subjects

X_{ij} = The i th item score for the j th subject

Mdn = The median item score.

Next, an Item Deviation Score (IDS) was computed for each individual item.

$$IDS_i = \frac{|X_{ij} - Mdn|}{ADM}$$

where:

IDS_i = the i th item deviation score for the j th subject

X_{ij} , Mdn, ADM are defined above.

Finally, the Subject's Risk Deviation Score (SRDS) over all items was found.

$$SRDS = \frac{\sum_{i=1}^{12} IDS_i}{12}$$

where:

SRDS = subject's risk deviation score

IDS_i is defined above.

The SRDS values for each subject were then ranked from smallest to largest, a high rank indicating a high SRDS value.

To test the first hypothesis that fear of failure scores for married and divorced subjects are equal, the Kolmogorov-Smirnov test was used. The alternate hypothesis is that

fear of failure scores are higher among divorced subjects. Each of the four measures of fear of failure, the SAD, the FNE, the MARPS, and the STAI A-Trait scale, were considered separately in relation to the subject's marital status. A unit interval was used in the computation of the K_D values.

The second hypothesis concerns the relationship between divorce and risk taking. In this instance, the null hypothesis states that risk taking scores for married subjects and divorced subjects are equal. The alternate hypothesis is that risk taking scores among divorced subjects are more extreme. Married and divorced subjects were compared on risk taking using the Subject Risk Deviation Scores derived from the CDQ scores. The Mann-Whitney U statistic was employed to test for significance.

The null form of the third hypothesis concerning age, divorce and risk taking states that risk taking scores for younger married, older married, younger divorced and older divorced subjects are equal. The alternate hypothesis is that risk taking scores will be lower among older divorced women, higher among younger divorced women, and more moderate among married women. Since previous research suggests that age and risk taking may be related inversely (Kogan & Wallach, 1964), raw scores on the CDQ rather than deviation scores were used to test this hypothesis. The distribution of CDQ scores for all subjects was obtained, then classified,

using the interquartile range to divide the data into low, moderate, and high regions of risk taking. In accordance with the design of the instrument, a high score is indicative of a preference for low risk, while a low score tends to represent a preponderance of high risk responses. The three levels of risk denoted were related to the subject categories of: (1) younger married, (2) older married, (3) younger divorced, and (4) older divorced, with ties assigned by the procedure producing the most conservative outcome. The Chi-square test was used to determine the significance of differences among these groups. It should be noted, as a limitation of the foregoing procedure, that a moderate score on the CDQ does not necessarily indicate a large number of moderate responses. A moderate score may also be produced in instances where the subject chooses an approximately equal number of both high and low responses.

The variables of stress and risk taking considered in the fourth hypothesis were examined using a nonparametric correlational technique. The null hypothesis in this case states that risk taking scores and stress scores are unrelated in the population from which the sample was drawn. The alternate is that risk taking scores and stress scores are related in the population being considered. The Kendall rank correlation coefficient was used to correlate Average Deviation scores on the CDQ and the scores on the SRRS.

Finally in the fifth hypothesis concerning the relationship between fear of failure and risk taking, the null hypothesis states that risk taking scores for subjects both high in fear of failure and low in fear of failure are equal. The alternate hypothesis is that subjects high in fear of failure choose extreme risks, while those low in fear of failure choose moderate risks. To test this hypothesis, a Kendall rank correlation coefficient was employed to correlate Average Deviation scores on the CDQ and scores for each of the four fear of failure measures: the FNE scale, the SAD scale, the MARPS, and the STAI A-Trait scale.

Correlations among the fear of failure instruments were computed to determine if the same concept was being measured. The Pearson product-moment correlation coefficient was used in the foregoing procedure, and was employed further to assess the reliability of each of the fear of failure instruments. In previous research (Atkinson & Litwin, 1960; Hancock & Teevan, 1964; Litwin, 1958), the concept of fear of failure as it relates to risk taking has been treated as other than interval data, even though the instruments measuring fear of failure produced data which is interval in nature. However, these instruments have been regarded as interval measurement when used in studies unrelated to risk taking (Byrne, 1971; Mehrabian, 1968; Spielberger et al., 1970; Watson & Friend, 1969). Consequently it seems proper

to use a parametric procedure to compute correlations among the instruments as well as reliabilities on each instrument.

An in-depth statistical analysis of the information reported on the biographical and social questionnaire was beyond the scope of this study. Data from the questionnaire were tabulated and used to describe the groups under consideration. Certain characteristics (e.g., age, education) were tested to verify homogeneity of groups.

Chapter 4

Results

Initially the 40 married subjects and 40 divorced subjects were described using their group medians and ranges on social and biographical variables. Subjects in the married group ranged in age from 26 to 54 years. Those in the divorced group were from 26 to 51 years of age. Half of the subjects in each of the groups were under 40 years of age. Table 1 shows group medians for age among the respective groups, along with the medians and ranges for other biographical variables. Responses for social data according to marital status are presented in Table 2, and social data related to divorce appears in Table 3. Although statistical analysis of the biographical and social data generally was beyond the scope of this study, the median test was used to explore possible differences in age, education and number of children among the married and divorced groups as a whole, and also among the younger married and divorced groups, and older married and divorced groups. Only the difference in years of education (Table 1) among younger married and younger divorced subjects was significant ($p < .05$; $\chi^2 = 4.95$; $df = 1$). As was anticipated, considerable discrepancy existed between the present family income of married subjects and present family

Table 1

Biographical Data by Age and Marital Status

Biographical Data	YM	OM	YD	OD	M	D	Total
<u>Mdn. Age</u>	34.2	45.5	33.8	42.8	37.5	39.5	39.5
Range:							
Married 26-54							
Divorced 26-51							
<u>Mdn. Years Married</u>	12.5	24.0	10.8	17.8	18.5	15.9	16.7
Range:							
Married 5-32							
Divorced 1-25							
<u>Mdn. Years Divorced</u>	--	--	2.7	4.5	--	3.0	--
Range:							
1-12							
<u>Mdn. Number of Children</u>	2.4	3.0	1.7	2.9	2.7	2.3	2.5
Range:							
1-4							
<u>Mdn. Age of Children</u>	10.2	18.5	11.5	18.1	14.6	15.2	14.7
Range:							
1-30							
<u>Mdn. Family Income</u>	18,400	20,000+	11,700	12,800	19,300	11,800	15,000
Married							
10,000-20,000+							
Divorced							
7,000-20,000+							
<u>Proportion of Income Contributed by Respondent</u>	.452	.292	.825	.688	.375	.780	.612
Range:							
Married 0-.875							
Divorced .125-1							

Table 1 (Continued)

Biographical Data	YM	OM	YD	OD	M	D	Total
<u>Mdn. Years of</u> <u>Education</u>	12.4	13.2	14.5	12.3	12.6	13.2	12.9
Range:							
Married 10-16+							
Divorced 12-16+							
<u>Proportion Employed</u> <u>in Supervisory or</u> <u>Professional</u> <u>Position</u>	.200	.250	.350	.400	.225	.375	.300
Total N	20	20	20	20	40	40	80

Mdn. = Median
 M = Married
 D = Divorced
 Y = Younger
 O = Older

Table 2

Percent of Respondents by Marital Status for Social Data

Social Data	Total % Responding	% Married	% Divorced
Church Attendance:			
Frequently	51.3	67.5	35.0
Occasionally	25.0	17.5	32.5
Hardly Ever	23.7	15.0	32.5
Social Life:			
Very Active	22.5	12.5	32.5
Active	46.3	50.0	42.5
Not Active	31.2	37.5	25.0
Sexual Life:			
Very Active	10.0	10.0	10.0
Active	61.3	80.0	42.5
Not Active	28.7	10.0	47.5

Table 3

Percent of Divorced Respondents by Age for Social Data

Social Data	Total % Responding	% Younger Divorced	% Older Divorced
Decision to Divorce Made by:			
Respondent	55.0	55.0	55.0
Spouse	25.0	30.0	20.0
Both	20.0	15.0	25.0
Contact with Former Spouse:			
Frequently	20.0	30.0	10.0
Occasionally	25.0	25.0	25.0
Hardly Ever	55.0	45.0	65.0
Contact with Relatives:			
Frequently	55.0	60.0	50.0
Occasionally	37.5	35.0	40.0
Hardly Ever	7.5	5.0	10.0
Dates with Male Friends:			
Not at all	12.5	15.0	10.0
Occasionally	30.0	20.0	40.0
Several Times/Mo.	17.5	30.0	5.0
Every Week	40.0	35.0	45.0
Self Report of Post-Divorce Adjustment:			
Satisfactory	82.5	80.0	85.0
Unsatisfactory	17.7	20.0	15.0

income of those in the divorced group (Table 1). However, subjects were selected so that present family income of married subjects was approximately equal to family income prior to divorce for members of the divorced group. The proportion of income contributed to family income was considerably higher for divorced subjects, and compared to married subjects they were more often employed in supervisory or professional positions (Table 1). Most of the divorced subjects reported a satisfactory post-divorce adjustment (Table 3).

Hypothesis I

To determine whether there were any significant differences between married and divorced subjects in fear of failure, the Kolmogorov-Smirnov test was used. The expectation was that divorced subjects would score higher than married subjects on all four measures of fear of failure. Results were not significant for any of the measures used. Table 4 shows the actual K_D values obtained and the critical K_D values. The failure to find significant differences on the Kolmogorov-Smirnov tests is also illustrated in Table 5 which shows the number of subjects scoring above the median (High), and below the median (Low) on each fear of failure instrument.

Table 4

Values of K_D for Fear of Failure in Married and Divorced Subjects

Groups ^a	<u>Actual K_D</u>				<u>Critical K_D^*</u>
	MARPS	SAD	FNE	A-Trait	
M vs D	8	8	7	8	13
YM vs OM	5	4	5	4	9
YM vs YD	4	5	4	5	9
YM vs OD	5	5	6	6	9
OM vs YD	5	3	3	6	9
OM vs OD	6	5	5	6	9
YD vs OD	2	4	5	8	9

*None of the K_D values were significant.

^aM = Married
 D = Divorced
 Y = Younger
 O = Older

Hypothesis II

The Mann-Whitney U test (two-tailed) was employed to compare married and divorced subjects on risk taking scores using the Subject Risk Deviation Scores (SRDS). The tendency toward extreme (both high and low) risk taking is reflected by the SRDS. The value obtained was not significant ($p=.10$; $U=628.5$ converted to $z=1.65$). Each individual's SRDS was

Table 5

Number of Married and Divorced Subjects Scoring High (Above the Median) and Low (Below the Median) on Four Measures of Fear of Failure

Instrument	Level	Married	Divorced
MARPS	High	22	18
	Low	18	22
SAD	High	22	18
	Low	18	22
FNE	High	21	19
	Low	19	21
A-Trait	High	19	21
	Low	21	19

was based on her item deviations, relative to the group median and deviation for all items. The method used for computing the SRDS has been described previously. Table 6 shows the median ranked SRDS values.

Table 6

Comparison of Risk Taking (CDQ) Subject Risk Deviation Scores by Marital Status

Marital Status	Mdn. Rank Risk Taking Deviation Score	U	z	p
Married	35	628.5	1.65	.10*
Divorced	50			

*Non-significant

Hypothesis III

To determine the relationship between age, marital status and the three levels of risk taking (low, moderate and high) a 3 x 4 contingency table was tested for independence. No significant difference was found ($p < .95$; $\chi^2 = 2.00$; $df = 6$) among the number of low, moderate and high risk scores made by younger married, older married, younger divorced and older divorced subjects (Table 7). It was anticipated that, relative to the married groups, divorced participants would select more extreme risks with the younger divorced showing high risk scores and the older divorced low risk scores. Compared to divorced subjects, married subjects were expected to have moderate risk scores. When the proportion of low, moderate and high risk items selected by each of the four groups is observed (Table 8), group preferences for certain levels of risk are suggested. Since the analysis of data based on subjects' individual scores indicated no preference for low, moderate or high risk according to age and marital status, it appears that many subjects did not stay with any one specific category of risk, but made choices from all three categories. Since the relationship between age, marital status and risk taking failed to show any significance no post hoc tests were necessary.

Table 7

Distribution of Risk Taking Scores on the CDQ by Age
and Marital Status Using the Interquartile Range

	Younger Married	Older Married	Younger Divorced	Older Divorced	Totals
High (Score 38-61)	3	6	5	6	20
Moderate (Score 62-79)	11	9	11	9	40
Low (Score 80-98)	6 —	5 —	4 —	5 —	20 —
Totals	20	20	20	20	80

$p < .95$; $\chi^2 = 2.00$; $df = 6$.

Table 8

Proportion of Item Choices on the CDQ by Age and Marital
Status Using the Approximate Interquartile Range

	Younger Married	Older Married	Younger Divorced	Older Divorced	Totals
High (1 and 3 in 10)	.194	.242	.264	.300	.284
Moderate (5 and 7 in 10)	.302	.238	.249	.211	.439
Low (9 and 10 in 10)	.226	.278	.237	.259	.277

Hypothesis IV

The Kendall rank correlation coefficient was used to correlate risk taking (deviation scores) with stress. The value obtained was not significant ($p < .35$; $\text{Tau} = .03$, transformed to $z = .38$). Stress scores were also examined in relation to marital status in a post hoc procedure using the Mann-Whitney U test. No significant differences were found ($p < .13$; $U = 917$, transformed to $z = 1.13$).

Hypothesis V

The relationship between fear of failure and risk taking was analyzed using the Kendall Rank Correlation Coefficient. Subjects high in fear of failure were expected to take more extreme risks, those low in fear of failure more moderate risks. No significant differences were demonstrated when the four respective measures of fear of failure were related to Subject Risk Deviation Scores (Table 9).

Subsidiary Tests

All correlations among the four fear of failure measures were significant (Table 10), and were in the expected direction. Reliabilities for the four measures of fear of failure were computed using the split half method. The correlation coefficients obtained were .76 for the FNE scale and .85 for the SAD scale. For the MARPS and the STAI A-Trait scale the reliability coefficients were .54 and .83 respectively. The

Table 9

Correlations Between Risk Taking (Subject Risk Deviation Scores for CDQ) and Fear of Failure (Four Measures of Fear of Failure)

Measure	n	Tau	p	Significance
MARPS	80	.047	.538	NS
SAD	80	-.077	.332	NS
FNE	80	-.073	.347	NS
STAI A-Trait	80	-.005	.950	NS

Table 10

Correlations Between Fear of Failure Measures

Measure	FNE	SAD	STAI A-Trait
MARPS	.29*	.34**	.27*
FNE		.38***	.60***
SAD			.42***

*p<.02
 **p<.01
 ***p<.001

low reliability on the MARPS may explain its lower relationship to the other measures.

Chapter 5

Discussion

The present research was directed toward clarification of the relationship between fear of failure and risk taking in females. Fear of failure, according to Atkinson and Litwin (1960) results in more extreme risk taking. Since divorce is often viewed as a culturally and personally defined failure of some magnitude, it was postulated that divorced subjects would subsequently develop a fear of failure orientation and hence a propensity for extreme risk taking. Neither the fear of failure orientation and preference for extreme risk expected among divorced subjects, or the relationship between fear of failure and risk taking among females, were demonstrated in the findings of the present study.

In consideration of the fact that fear of failure measures used in this study did not differentiate between married and divorced subjects, three explanations are offered as possible contributors: (1) divorced women may experience no more fear of failure than married women; (2) the divorced subjects in this study may not be representative of divorced women as a whole; and (3) the measures used to define fear of failure in this research may not have been suitable measures

of fear of failure in women. Although the literature suggests that both personally and culturally divorce is frequently viewed as a failure experience, it is conceivable that divorce may not predispose the individual toward a fear of failure orientation. Perhaps this experience is not perceived as a failure, or at least not as a failure to the extent that it affects motivational disposition. The increasing prevalence of divorce in the past few years has resulted in a corresponding increase in the number of organizations available that offer encouragement and guidance to divorced individuals who are in the process of reestablishing their lives as single persons. Possibly perception of divorce, as a potential growth experience as it is presented by these groups and disseminated in current popular literature, enables women to exorcise feelings of failure and view the experience of divorce from a more positive perspective. Subjects in the present research reported their post-divorce adjustment as satisfactory in most instances.

Since opportunities for facilitating post-divorce adjustment are found more frequently in urban areas, such as the one where subjects in this study reside, a second consideration must be the degree to which the subjects of this study are representative of divorced women in general. Certainly, proximity to an urban area and the numerous social functions that are sponsored by organizations of single people

provides occasions for divorced women to be relatively active socially. It is possible that fear of failure particularly as measured by social-evaluative anxiety is minimized by frequent attendance at group social functions. In view of the fact that subjects in this study were contacted through these organizations, they may represent a somewhat biased sample, particularly when compared to divorced women in rural areas, where social events planned for mature single people tend to be limited. On this basis, any attempt to generalize beyond urban areas would be inappropriate. It should be noted also that the subjects in the present study have been divorced for a period of from one to twelve years, and may have had the opportunity to overcome any existing fear of failure and feelings of inadequacy. Cattell and Scheier (1961) suggest that anxiety in females might be alleviated if they had more opportunity for dealing with concrete challenges. Perhaps the numerous obstacles encountered by the divorced woman with children enable her, after a period of time, to affirm her ability to cope and reduce anxiety regarding failure.

Thirdly, married and divorced subjects may have demonstrated no difference in fear of failure because the instruments employed were not suitable measures of that variable. While test anxiety is generally accepted as a useful measure of fear of failure in males, no measure of

fear of failure in females has been substantially supported by research. Based on the literature, there was reason to believe that the measures used in this study would differentiate between high and low fear of failure among married and divorced women. However, the lack of findings raises considerable doubt as to their usefulness for this purpose. Although one of the measures, the MARPS, was constructed specifically for measuring the achievement motives in women, the author (Mehrabian, 1975) has noted that results have generally been inconclusive in studies where the female form was used. Cronbach (1970) has suggested that a female might be able to construct a more valid instrument for assessing those motives in women. The difficulties in constructing such a measure on the basis of uncertain information concerning achievement motives in women may account for the low reliability of the MARPS. It was also noted, in connection with fear of failure measures, that social anxiety may be particularly subject to bias in the testing situation. In some instances individuals who were being tested together were acquainted prior to the study, and it is conceivable that the subject's perception of herself as being among strangers, as opposed to that of having familiar faces present, may have influenced scores on the social evaluative anxiety scales (the FNE and the SAD). Furthermore, the subjects' perceptions of the testing session as an evaluative

or nonevaluative situation may have influenced their answers, particularly on the FNE scale. There is, however, less reason to believe that the other two fear of failure measures, the MARPS and the STAI A-Trait scale, would be sensitive to these particular situational factors. In summing then, though it is probable that divorced women are no more likely to experience fear of failure than married women, other explanations for the findings should be considered.

Results in the present study did not support the expectation that divorced subjects would show a greater tendency toward extreme risk taking than their married counterparts. Caution must be used, however, in applying these findings on risk taking to other married and divorced women. As was noted earlier, sampling procedures used limit the generalizability and, in addition, the nature of the variables being studied increases the likelihood that they will be particularly sensitive to some problems of subject selection. The women who volunteered for the present study indicated some degree of willingness to take risks, by their participation. It is reasonable to assume that there are subjects, both married and divorced, who prefer very low risks and did not respond because they perceived participation in research as too risky. In any case, findings in the present research offer no indication that there are

differences in the risk taking patterns of married and divorced subjects.

There is a lack of evidence among previous research for a relationship between stress and risk or between stress and divorce. Results in the present study do not show relationships in either instance. In their discussion of stress and divorce, Nye and Berardo (1973) concluded that the stress resulting from changes accompanying divorce is confined primarily to the first year. Since this study was limited to women who had been divorced for at least a year, and no relationship between stress and divorce was indicated, the findings are in agreement with those reported by Nye and Berardo.

Results obtained concerning the relationship between fear of failure and risk taking did not lend support to Atkinson's (1964) model of risk taking. The lack of evidence for a relationship between fear of failure and risk taking suggests that: (1) no such relationship exists; (2) the relationship between fear of failure and risk taking in women is more complex than in males, and may involve to a greater degree other variables; (3) the instruments used were not adequate for assessing fear of failure and risk taking in women.

Although the probability of a relationship between fear of failure and risk taking in males has been established,

research findings in this area have been confusing when female subjects are used. Accordingly, consideration should be given to the possibility that such a relationship just does not exist. However, in view of the difference in socialization patterns for males and females it is not unlikely that the relationship may be complicated by other variables that may interact with fear of failure to determine risk taking propensity in females. Horner (1969) has suggested that a fear of success may also be a determinant in risk taking behavior for some females. Some of the difficulty in demonstrating a relationship between fear of failure and risk taking in women may be due to conflicting views regarding role expectations for women. It is likely that ambiguity in this area has increased in the past few years, with the growth of influence from the feminist movement.

The four measures of fear of failure used in this study were selected for the purpose of exploring the relationship between fear of failure and risk taking among women. Correlations indicate that although the same construct is being measured in part by all the fear of failure instruments, each has unique characteristics as well. Two different aspects of social anxiety are measured by the FNE scale and the SAD scale. The STAI A-Trait scale, which is a measure of general anxiety, purports to be a measure of the latent disposition toward fear of failure as well. The subject is asked to

evaluate his feelings about himself as they are most of the time. The MARPS measures resultant achievement motivation, and is less substantially related to the other instruments. Thus, a number of areas in which fear of failure in females might be demonstrated were represented. In considering the fear of failure measures individually, it should be noted that the STAI A-Trait scale may elicit a socially desirable response from subjects who are overly concerned about how they will be evaluated by others. Defensiveness, observed by Kogan and Wallach (1964) and Steiner (1972) as common among extreme risk takers, could also conceivably influence responses of subjects on the FNE, SAD and A-Trait scales. The MARPS, due to its underlying construct, is less likely to elicit either socially desirable or defensive responses. The MARPS also shows the lowest correlations with other fear of failure measures, suggesting that it may be measuring to a greater extent than the other instruments, a characteristic not common among all four of the fear of failure instruments. Unfortunately the reliability coefficient for the MARPS was low relative to those for the other instruments.

The mean score for all subjects on the risk taking measure (CDQ) was slightly above the norm for females (Kogan & Wallach, 1964). A higher score is indicative of more caution in risk taking. This difference is not unlikely, since subjects in this study were considerably older than the norm

group (college students), and there is some support for the general belief that age is related to conservatism in risk taking. Kogan and Wallach (1964) have suggested that among women, a decline in risk taking with age tends to be continuous rather than sudden as it appears to be with males. Although the CDQ has been used extensively with females as well as males, only male characters are described in the hypothetical situations presented. The subject is instructed to act as though he were advising the character in the situation. For some female subjects, these situations may appear too distant from their field of interest to elicit sufficient involvement in the testing situation. Others with strong feminist inclinations may experience some resentment, since the questionnaire is concerned with risk taking from the viewpoint of the male only. Slovic (1964) has suggested that it is important for risk taking measures to provide the subject with ego involvement necessary for feelings of risk. There may be some question as to whether the CDQ can secure this involvement with female subjects.

Finally, consideration should also be given to the finding that subjects who are high in fear of failure may be reluctant to participate in research (Feij, 1976). The terms "high" and "low" fear of failure, as they have been conceptualized in this study and in previous investigations, are relative to the subjects in the sample being tested. If

subjects who are high in fear of failure in an absolute sense are not represented in the sample, the range of fear of failure is shortened at the high end and the groups defined as high and low in a relative sense are probably moderate and low in an absolute sense. Assuming this is the case, differences among high and low fear of failure subjects would be minimized, and a relationship between fear of failure and risk taking would be difficult to demonstrate.

Chapter 6

Conclusions

One of the more difficult tasks confronting researchers in the field of achievement motivation has been the delineation of the relationship between fear of failure and risk taking in females. Attempts to demonstrate this relationship in the present research have not been successful. Nor was fear of failure found to be higher among women who were divorced. However, several potential measures of fear of failure were examined, and some of the problems encountered in selecting an appropriate instrument for females were considered. The significant though relatively low correlations among the four measures of fear of failure employed suggests that these are four different domains that do not have a great deal in common. The maximum variance shared by any of these instruments was .36. Although they all measure anxiety, they are different in other respects. Among the four instruments were a measure of general anxiety, a measure of resultant achievement motivation, and measures of social anxiety, included because of their congruence with qualities associated with the feminine role. None of the measures were effective in predicting risk taking (CDQ) scores in women. Since role definitions for females encompass the range from

career woman to wife and mother, it is possible that fear of failure is more complex and difficult to identify in females, and will require an instrument wide enough in scope to include fear of failure in a variety of contexts. Development of an instrument to accurately assess fear of failure appears to be of prime importance in investigating the relationship between fear of failure and risk taking in females.

A second consideration might be the construction of an instrument for the purpose of measuring risk taking in females. Such an instrument could follow the format of the CDQ, yet include content that is more relevant and hence conducive to arousal of feelings of risk. It might be well also to evaluate further the effect of fear of success on risk taking, both alone and in conjunction with fear of failure. However, in this instance also the lack of adequate instrumentation presents a problem.

Since the sample used in this study was selected within the framework of specific demographic characteristics, subjects were difficult to obtain and randomization procedures were not used. Consequently, the results cannot be generalized to other married and divorced subjects. A major obstacle to employing divorced individuals as subjects in research is the problem of involving the full spectrum of the population. It is unlikely that this can be accomplished through contacting singles organizations, since it is probable that there

are those among the divorced who, for varying reasons, do not participate in these groups. Since many people remarry, or move to another address, official records do not offer a satisfactory solution. In addition to locating subjects who meet the necessary qualifications, one must obtain their consent to participate. This difficulty, of course, is not limited to divorced subjects. In their discussion of risk taking, Kogan and Wallach (1967) have commented on the difficulty of obtaining subjects who are "beyond college and not yet eligible for gerontological research," essentially those persons who are in the 30 to 60 year age range. Because of employment and family obligations, these individuals are often unavailable for participation in research investigations.

Since both fear of failure and risk taking scores may be subject to a truncating effect that is likely to occur when subjects high in fear of failure or low in risk taking avoid participation in research, it is recommended that in the future, studies of this nature offer a small monetary incentive to encourage participation among those high in fear of failure or low in risk taking. Atkinson (1964) has suggested that high fear of failure subjects may take risks they would otherwise avoid if external sources provide satisfaction.

While the obstacles involved in obtaining representative samples of divorced subjects must be acknowledged, this population offers unique opportunities for exploring fear of failure in females and males as well. It might be of benefit to compare fear of failure in both sexes using subjects who are contemplating divorce, those who are in the process of obtaining a divorce, and subjects who have been recently divorced as well as those who have been divorced for longer periods. Another approach to the questions posed in this study might include a comparison of fear of failure and risk taking in females by relating fear of failure to marital status, using single (never married) as well as married and divorced women.

Appendix A

Sample Items on Test Administered

For me, the pain of getting turned down after a job interview is greater than the pleasure of getting hired.

a. Sample Item: MARPS

I often feel nervous or tense in casual get-togethers in which both sexes are present.

b. Sample Item: SAD

If someone is evaluating me, I tend to expect the worst.

c. Sample Item: FNE

I wish I could be as happy as others seem to be.

d. Sample Item: STAI A-Trait

Mr. A, an electrical engineer, who is married and has one child, has been working for a large electronics corporation since graduation from college five years ago. He is assured of a lifetime job with a modest, though adequate, salary, and liberal pension benefits upon retirement. On the other hand, it is very unlikely that his salary will increase much, before he retires. While attending a convention, Mr. A is offered a job with a small, newly founded company which has a highly uncertain future. The new job would pay more to start and would offer the possibility of a share in the ownership if the company survived the competition of the large firm.

Imagine that you are advising Mr. A. Listed below are several probabilities or odds of the new company's proving financially sound.

Please circle on the answer sheet the lowest probability that you would consider acceptable to make it worthwhile for Mr. A to take the new job.

The chances are 1 in 10 that the company will prove financially sound.

The chances are 3 in 10 that the company will prove financially sound.

The chances are 5 in 10 that the company will prove financially sound.

The chances are 7 in 10 that the company will prove financially sound.

The chances are 9 in 10 that the company will prove financially sound.

Circle 10 if you think Mr. A should not take the new job no matter what the probabilities.

e. Sample Item: CDO

Taking on a mortgage or loan less than \$10,000 (e.g., purchasing a car, TV, freezer, etc.)

f. Sample Item: SRRS

Appendix B

Biographical-Social Questionnaire

Please answer all of the following questions:

1. Present marital status: ☐ Married ☐ Divorced
2. If married, how long have you been married? _____
Is this the first time? ☐ Yes ☐ No
3. If divorced, how long have you been divorced? _____
Is this the first time? ☐ Yes ☐ No
How long were you married, prior to your divorce? _____
4. Age _____ 5. Ages of children _____
6. Circle the highest grade of school you have completed:
5 6 7 8 9 10 11 12 College 1 2 3 4 More
7. Are you employed outside the home? (Please check one)
☐ Full-time ☐ Part-time ☐ Not at all.
8. Occupation _____
9. Your family's net income: (Please check one below)
☐ \$ 0-\$4,000 ☐ \$10,000-\$15,000
☐ 4,000- 7,000 ☐ 15,000- 20,000
☐ 7,000-10,000 ☐ 20,000- more
10. What proportion of the family income do you provide?
(Please check one) ☐ 100% ☐ 75-100% ☐ 50-75%
☐ 25-50% ☐ 0-25% ☐ None
11. Do you attend church? (Check one) ☐ Frequently
☐ Occasionally ☐ Hardly ever
12. Would you describe your social life as: (Please check one)
☐ Very active ☐ Active ☐ Not active
13. Would you describe your sexual life as:
☐ Very active ☐ Active ☐ Not active

If you are divorced:

14. Your family's net income prior to divorce: (Please check one)
____ \$ 0-\$4,000 ____ \$10,000-\$15,000
____ 4,000- 7,000 ____ 15,000- 20,000
____ 7,000-10,000 ____ 20,000- more
15. Do you feel the decision to divorce was made primarily
by: (Please check one) ____ You ____ Your former spouse
 ____ Both of you
16. Do you see your former spouse or talk with him on the
phone: (Please check one) ____ Frequently
 ____ Occasionally ____ Hardly ever
17. Do you have contact with relatives (other than your
children): (Please check one) ____ Frequently
 ____ Occasionally ____ Hardly ever
18. Do you have dates with male friends: (Please check one)
____ Not at all ____ Occasionally
____ Several times a month ____ Every week
19. Would you describe your post-divorce adjustment in most
ways to be: (Please check one)
____ Satisfactory ____ Unsatisfactory

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