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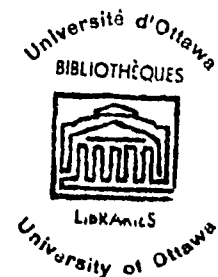
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Effects of Communication Training
and
Contracting on Disturbed Marital Relationships

Steven J. Stein

Thesis presented to the School of
Graduate Studies of the University
of Ottawa as partial fulfillment
of the requirements for the
degree of Doctor of Philosophy

Ottawa, Canada, 1978



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ABSTRACT

This study investigated the effects of the two kinds of marital therapy programs on couples volunteering to improve their relationships. Two groups of couples participated in the Minnesota Couples Communication Program. One of these groups was posttested immediately after treatment while the other was posttested six weeks following treatment. A third group of couples played the Family Contract Game which was adapted for couples in the present study. Finally, there was a waiting list Control group who received the same pretest and posttest procedures as the previous groups. All groups self-monitored throughout the 5 weeks during which treatment occurred as well as for 6 weeks following the termination of the treatment phase. A series of self-report, self-monitoring, and behavioural measures of all spouses were taken at the beginning and end of the treatment program. Couples in the Communications Program tested immediately following treatment decreased in the number of positive responses they gave while discussing problem issues, reported being less happy with their relationship, but spent more time together. Communications couples tested 6 weeks after treatment gave fewer negative responses when discussing a problem issue, received fewer pleasing and displeasing behaviours from their spouse, and spent more time together. Contracting couples gave more positive responses when discussing a problem issue, increased

their reported happiness with their relationship and decreased in the number of displeasing behaviours received. Control couples decreased in their reported happiness with their relationship during the self-monitoring period, and at the time of posttesting reported spending more time together; they also requested fewer changes of their spouse in problem areas, and requested less change in the number of activities they wanted to do with their spouse. These results suggest that, at best, Communications Skills training has minimal behavioural change consequences for marital relationships, and at most, such training can result in iatrogenic effects. The Contracting procedure was the most effective in producing behavioural and subjective changes in marital relationships and would seem to hold the greatest promise for understanding and treating certain disturbed marital relations.

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CURRICULUM STUDIORUM

Steven J. Stein was born December 28, 1950 in Toronto, Ontario, Canada. He received the Bachelor of Science (4 year) degree from the University of Toronto, Toronto, Ontario, Canada in 1973. The title of his honours thesis was Physical Attractiveness and Manipulative Interpersonal Behaviour in Children. He received the Master of Arts degree in Psychology at the University of Ottawa, Ottawa, Ontario, Canada, in 1976. The title of his Masters thesis was A Comparison of Three Cognitive Strategies in the Experimental Reduction of Stress.

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CHAPTER I

INTRODUCTION AND REVIEW OF THE LITERATURE

A large number of theories and therapies related to the treatment of disturbed dyadic relationships have arisen within the last 20 years, however, relatively few have provided substantive empirical evidence to support either their clinical validity or their treatment effectiveness. The empirical investigation of marital therapies and their derivatives has only begun within the last few years, and excellent reviews of published work in the field leading up to the early 1970's have been presented by Olson (1970, 1976) and Gurman (1971, 1973; Gurman & Rice, 1975). What comes out of these writings is the fact that while marital therapy is far from being a unitary treatment, the therapy allows for a full range of theoretical orientations to be presented in studying the treatment of disturbed marital relations.

One very novel and unique way of looking at dysfunctioning relationships, believed by some researchers to be the most promising theoretical language available in the area (Brown, 1975; Gottman, Notarius, Gonso & Markham, 1976; Jacobson & Martin, 1976) centres on behaviour or social exchange theory as developed by Thibault and Kelley (1959).

According to social exchange theory it is hypothesized that a relationship between two people will continue if the

rewards, defined as "pleasures, satisfactions, and gratifications the person enjoys", from the relationship are greater for each person than the costs, defined as "factors which operate to inhibit or deter the performance of a sequence of behaviour" (Thibault & Kelley, 1959, p. 12). They go on to explain that over time the interaction between members of a dyad becomes governed by a set of norms reflecting a balance between these rewards and costs. If one member happens to violate the norm by withholding rewards, the other member attempts to reestablish equilibrium, perhaps by coercing the other through punishment until equilibrium is again obtained.

This hypothesis about behaviour was extended by Homans (1961), Blau (1964) and Edwards (1969) to include both groups and individuals. Homans (1961) extended the operant nature of the theory by postulating that the frequency of social interaction was a function of the number of mutual rewards exchanged in the relationship. Blau (1964) stipulated that in order for interpersonal behaviour to be viewed in terms of social exchange, the following two conditions were necessary: 1) behaviour had to be oriented towards ends that were only achieved through mutual interaction in a relationship with other persons, and 2) behaviour had to seek to accommodate means to further the achievement of these ends.

One way of interpreting payoffs in the behaviour exchange matrix (Gottman, Notarius, Gonso & Markman, 1976)

is in terms of conceiving that in a satisfying relationship each member receives behaviours that he or she codes as positive. Stuart (1973) describes Thibault and Kelley's method of predicting individual choices in social situations by reference to the absolute standards by which a person evaluates the adequacy of his or her alternatives, or comparison level, and the relative superiority of one existing alternative over the other. Stuart (1973) illustrates this procedure:

For example, a husband might spend more evening time working than with his family, being nagged by his wife to stay home and seduced by his employers to put in more hours. The exchange theorist would identify the husband's absolute preference to relax at home rather than work, and would also demonstrate that his actual experience nevertheless presents more powerful inducements for work instead of spending more time with his family. The functional analyst can then formulate a hypothesis that a change in the husband's use of his evening hours can occur through an increase in the value of reinforcements mediated by the wife relative to the constant level of work-mediated reinforcements. (p.81)

Another marital therapy orientation which has just recently appeared in the literature is that of operant reinforcement.

Operant Approaches

The first studies suggesting the use of operant procedures for marital problems were by Goldiamond (1965), Stuart (1969), Liberman (1970) and Azrin, Naster and Jones (1973). In one of these (Stuart, 1969) three assumptions are made concerning the use of operant-interpersonal approaches to marital therapy. First, it is assumed that the pattern of interaction occurring between spouses at any point in time represents the most rewarding of all available alternatives. The second assumption concerns the reciprocity of the relationship; specifically, it states that most married adults expect to enjoy reciprocal relationships with their partners. This leads to the quid pro quo or "something for something" arrangement underlying satisfactory marriages (Jackson, 1965; Lederer & Jackson, 1968). Thirdly, in order to modify an unsuccessful marriage it is essential to develop the power of each partner to modify rewards for the other. Stuart (1969) describes the goals of marital therapy this way:

In successful marriage, both partners work to maximize mutual rewards while minimizing individual costs. A reciprocal exchange of potent reinforcement is established in which each partner controls sufficient

rewards to compensate the other for the rewards which are expected or received from him. In an unsuccessful marriage, both partners appear to work to minimize individual costs with little apparent expectation of mutual reward. In an effort to trim costs, few positive rewards are dispensed, and positive reinforcement, as a strategy of behavioural control, is replaced by negative reinforcement (removal of an aversive event following expected response). (p. 676)

Stuart goes on to describe the two patterns of behavioural control that are likely to occur in unsuccessful marriages. The first, coercion, occurs when one member of the relationship seeks to gain positive reinforcement from the other in exchange for negative reinforcement. For example, the husband wishing affection from his wife may become quite abusive towards her until she gives in to him. However, by using this coercive approach the husband is less likely to receive affection. Furthermore, to the extent that he has made himself unpleasant, he has degraded his wife's affection thus reducing her reinforcing properties; and finally, the affection offered appears to be given more as appeasement rather than as a genuine expression of affection (Haley, 1963). The second pattern, withdrawal, often demands the spouse to retaliate somehow, but to the extent that the spouse becomes devalued for behaving in such a fashion, an alternative form of retaliatory behaviour

becomes necessary. Stuart (1969) presents the situation as follows:

Withdrawal has the advantage of denying satisfaction to his wife while at the same time creating a situation requiring her to continue to behave assertively. Thus this is a low-risk tactic of control. The reinforcement for approach behaviour on the wife's part would be termination of the husband's withdrawal. At the same time that the husband is withdrawn from his wife, however, he may also find other social and nonsocial reinforcers in his cronies, mistress, or can of beer. (p. 676)

The operant approach attempts to restructure the situation in such a way that the frequency and intensity of mutual positive reinforcement increases. According to Levinger (1965), the strength of a marital relationship is a direct function of the attractions within as well as barriers around the marriage, and an inverse function of such attractions and barriers from other relationships. In this connection, Stuart (1973) points out that any efforts to modify marital behaviours had better make use of a theoretical approach permitting prediction of spousal interaction taking into account the relationship between spouses, between each spouse and the social environment outside the marriage. To be suitable for an operant-interpersonal approach, the theory must present challengeable hypothesis

that can test the effectiveness of the interventions predicted by the theory.

A slightly modified version of the operant approach has been presented by Azrin, Naster and Jones (1973). They begin with the premise that two individuals married at a time when each expected to obtain more reinforcement from the married than the unmarried state. Some examples of reinforcers include sex, status, companionship, children, financial gain, and social approval. While individuals may marry intending to increase their overall reinforcement, the nature of marriage itself may create new sources of positive and negative reinforcers and rearrange the existing positive and negative reinforcers.

Azrin, Naster and Jones (1973) list the following as sources of marital discord:

- 1) The reinforcers received from the marriage are too few in number.
- 2) The reinforcers are only for one or two states of need (i.e. sexual and financial).
- 3) The reinforcers given by one spouse are not recognized as originating with that spouse (taking person for granted).
- 4) Previous reinforcers are no longer satisfying (rigid marital patterns).
- 5) Newly emergent desires and their associated reinforcers are not recognized (discrimination

problem).

- 6) More satisfactions are given than are received (extinction).
- 7) Inhibition or inadequacy of communication about a source of satisfaction as in sexual matters.
- 8) The demands of marriage interfere greatly with non-marital sources of reinforcement (insufficient personal independence).
- 9) Aversive control rather than positive reinforcement is used to obtain satisfactions (criticism, nagging).

Perhaps the most productive research work in the area of marital therapy has been that arising from the Marital Studies Program at the University of Oregon (Margolin, Christensen & Weiss, 1975; Patterson & Hops, 1972; Weiss, Hops & Patterson, 1973). The major concepts identified with this program include those of behavioural exchange à la Thibault and Kelley (1959), the coercion process described by Patterson and Reid (1970) and Patterson and Cobb (1973), and situational control of behaviour (Mischel, 1968; Weiss, 1968). This approach, described as "social learning" (Margolin, Christensen & Weiss, 1975), teaches skills based upon:

- 1) the use of positive reinforcement rather than the more typical aversive control;
- 2) shaping and extinction procedures;

- 3) contingency management; and
- 4) contracting and negotiation training. (p. 15)

Patterson and Hops (1972) believe that many marital difficulties result from faulty behaviour change operations. While each day, partners attempt to bring about changes in each other's behaviour, such as the acceleration or deceleration of a particular behaviour rate, eventually, some requests for change are met with noncompliance and this results in a coercion process in which aversive stimuli are attached to the request. If aversion stimuli persist until the demands for the request are met, then one spouse has been reinforced for acting unpleasantly while the other has been reinforced for complying. Margolin, Christensen and Weiss (1975) describe the process this way:

Since spouses rarely resolve their disagreements, each new occasion for problem solving functions as a discriminative stimulant (SD) for pain control and little positive benefit is derived from actually accomplishing a resolution of difference. (p. 16)

Birchler, Weiss and Vincent (1975) have provided some evidence in support of these assumptions. Their study found that distressed couples exchanged more aversive and fewer positive behaviours than nondistressed couples, and elsewhere Vincent, Weiss and Birchler (1975) showed that a couple's rate of problem solving statements are

significantly lower in distressed than in non-distressed couples. Also, Margolin, Christensen and Weiss (1975) reported a case demonstration in which the training of couples to be reinforcing during communications was associated with a pre- post-change in problem solving statements, and this, even though these kinds of statements had not even been targeted for intervention.

The work of Weiss and his associates (Weiss, Birchler & Vincent, 1974; Weiss, Hops & Patterson, 1975) has lead to the development of the Family Contract Game by Blechman (1974; Blechman & Olson, 1976; Blechman, Olson, Schornagel, Halsdorf & Turner, 1976). This board game, played by any number of family members to resolve specific intrafamilial problems, is designed to reduce family conflict and to permit an antagonistic family to reach a mutually acceptable problem solution in the form of a contingency contract (Stuart, 1969, 1971). The game squares prompt and at the same time contingently reinforce a chain of dyadic interaction behaviour, beginning with selection of a problem to be solved and ending with a detailed agreement signed by both players. This is all accomplished without the help of a therapist.

The Family Contract Game, in being similar to the techniques of teaching contingency contracting, operationalizes the following problem-solving steps:

- 1) pinpointing of the problem in observable,

quantifiable terms,

- 2) tracking of the problem behaviour's frequency,
- 3) selection of a pleasing replacement behaviour,
- 4) selection of a reward for pleasing behaviour, and
- 5) tracking of the pleasing behaviour's frequency.

The Family Contract Game is designed to promote and support a problem-oriented discussion. At each step in the problem-solving, an opportunity for difference of opinion and constructive modification of a suggestion is provided. Quick resolution of disagreement and progress is massively rewarded. Humorous bonus and risk cards are included to elicit laughter and joking -- responses incompatible with ill will. A mutual agreement results along with some behaviour change from all participants as well as rewards to all participants. In terms of application, the Game has been found to promote significant increases in problem-solving behaviour between adolescents and single parents (Blechman et. al., Blechman & Olson, 1976).

Communication Approaches

Other explanations of marital dysfunction have focused on the ambiguous, vague and inconsistent nature of communication between spouses. Although not extensively researched, this focus has taken many forms in the literature. Systems theories reflect various notions of how communication processes are implicated in disturbed marital relationships. Stuart (1975) points out that the theoretical speculations

of "systems theorists" such as those of Haley (1963), Jackson (1965), Lederer and Jackson (1968), Satir (1964) and Watzlawick, Beavin and Jackson (1967) have contributed greatly to this communications perspective.

Most people would agree that in communication theory the focus is on meta-communication, or, the communication about communication. It has been pointed out that one cannot not communicate just as one cannot not behave. Jackson (1965) states that families operate by a set of implicit and explicit rules which regulate most of their behaviours. No linear cause-effect relationship is said to exist, but rather a circular one is present in that a response to a stimulus becomes a stimulus to further responses. According to the systems model one does not learn much about the total family system by simply observing one stimulus response pattern between two family members. Instead, it is argued that the therapist must focus on many aspects of the relationship, that is, on a multidimensional view of the system and that this involves the total context in which the system interacts as well as the complex patterns of relationships that may form within the system. This multidimensional functioning of the system is referred to as the transaction of the system. This is differentiated from the inter-acts or interaction which occurs in the system. The interaction focuses more on the process, that is, the way in which rules are carried out, instead of the product or outcome of these rules

Jackson (1965) describes communication in terms of game theory. According to Jackson, the family is a rule-governed system. While the family may behave in a wide variety of ways, he maintains that the family is best understood by learning the limited number of rules that the family follows.

Consistent with these observations, Haley (1963) claims that indeed a large number of family conflicts centre around problems related to what the rules are and who determines them. Since most of the family rules remain implicit as opposed to explicit, an important role of the family therapist is to make implicit rules more explicit so that they can be dealt with more directly.

As mentioned previously there are a number of different conceptual approaches for understanding family communication. One of these is presented by the work of Watzlawick, Beavin and Jackson (1967). They break down communication into three component parts: syntactics, semantics and pragmatics. The problems of transmitting information, and the capacity and noise in the system are referred to as syntactics. Semantics has to do with the meaning of a communication and the idea here is that while it may be possible to have syntactical accuracy you can still have a meaningless message. Some attempt has been made to study empirically the rules of syntax in ordinary conversations (Kukla, Kent and Stein, Note 1), however, there has been little applied work stemming

from these concepts.

Another communications classification system is that advanced by Jackson (1965). His focus is on report and command components. The content of the message being communicated forms the report component while the nature of the relationship between the two parties forms the command. Jackson states that in every message there contains both types of information and he maintains that many communication problems occur because the command component (the relationship) is not clearly worked out. Olson (1970) gives the following illustration of this:

For example, if a husband asked his wife if she would like to go out to supper (report) the reason for the invitation could be interpreted many different ways by the wife, depending on the nature of their relationship (command) at that time. (p. 519)

Olson (1970) points out that one of the major difficulties of family therapists using the systems approach has been the lack of operational concepts to describe the family processes, both the functional and dysfunctional ones. One popular concept is that of the double bind (Bateson, Jackson, Haley, and Weakland, 1956), originally developed as an explanation for schizophrenia; another is pseudo-mutuality (Wynne, 1958), which refers to two human processes, that of relating to others and of developing a personal identity; another is, undifferentiated family ego mass (Bowen, 1965,

1966), describing an emotional oneness or ego fusion in the family and consequently, minimal differentiation of the individuals in the family; and still another is, schism and skew (Lidz, Cornelison, Fleck and Terry, 1957) where schism refers to families in which there is chronic undercutting of the other spouse and severe marital difficulties, and marital skew to a relationship where one spouse is severely disturbed.

Olson (1970) summarizes the conceptual development in family therapy as follows:

...it is readily apparent that most of the concepts have been derived from work with families of schizophrenics and there has been little attempt to test the generality of these concepts when applied to other types of families ... the writers have generally failed to deal with the common themes running through other's work. One example is the concern with the lack of individualism caused by certain types of families. Wynne et. al. refer to the process as pseudo-mutuality, Bowen describes it as undifferentiated family ego mass and Hess and Handel (1959) refer to it as connectiveness. None of these theorists, with the exception of Bowen, have attempted to operationalize their terminology. When others have attempted this task, most have found it so difficult that they either gave up investigating the concept or settled

for an operational framework which had little relationship to the actual concept. The result has been that the concepts have not been empirically studied to even determine their validity or generality. (p. 520-521)

Olson (1970) goes on to state that clinical validation exists for only some of these concepts, and even then, it appears questionable as to whether another clinician could readily understand or use the concept in actual treatment.

Communication and Relationship Skills

Several different versions or "schools" of communication skills have emerged recently in the literature. One approach to communication skills training has been called the Conjugal Relationship Enhancement Program (Rappaport, 1976). This program follows the educational model developed by Guerney (1964, 1970, 1971a, 1971b, 1977) and emphasizes Rogerian client-centered therapeutic principles. The program emphasizes the training of dyads in the interpersonal skills of communication through maximization of direct expression of feeling and empathic listening. Rappaport maintains that if couples successfully learn to employ these techniques in their marriage, a more trusting and satisfying relationship will result, and this, without the continuing dependency of the therapist-educator.

The Communication skills approach also draws upon work in marital dynamics related to the importance of communication in marriage (Bernard, 1964, Burgess & Wallin, 1953; Cutler

& Dyer, 1975; Locke, Sabagh & Thomas, 1956; Shipman, 1960; Terman, 1938). These studies, while offering poor operational definitions of the concept "communication" and "marital adjustment", have reported on a high positive correlation between effective communication and good marital adjustment as well as a common association of poor communication with poor marital adjustment. (For reviews of the literature on the importance of communication in marriage see Bienvenu (1970), Glick and Gross (1975) and Rappaport (1976)). In his research on developing a "Marital Communication Inventory" Bienvenu (1970) concludes that:

.... Although the amount of communication is important, selective communication is preferable to sheer volume; some feelings and attitudes are destructive when communicated. It is the effective control and direction of the communication process which distinguishes satisfying marriages. (p. 28)

Bienvenu, along with Udry (1966) and Levinger and Senn (1967) seem to support the notion that the "selective communication" of feelings in marriage is more beneficial than high frequency, rate, or even simple catharsis.

Elsewhere, Brammer and Shostrum (1960) discuss a model for improving dyadic communication based on client-centered therapy principles in which one client repeats what the first person says, rephrasing it in his or her own words and in the other person's frame of reference: One person goes

through the exercise of stating his or her own feelings. Following this, that person's partner repeats the procedure by stating their own feelings on an issue. While a regular time for communication is established for the couple (even if no problems are present), no systematically structured program for training couples in this process has been established.

One review of communication theory as it applies to the marital dyad has been presented by Broderick (1969) (see Rappaport, 1976). In addition to presenting and clarifying the classic concepts of communication that have been previously elucidated by Satir (1965, 1968) and Jackson (1959, 1965), three recurrent factors related to ineffective communication are brought out:

- 1) lack of skill as a speaker and listener
- 2) unshared meanings, and
- 3) ambiguous messages. (Rappaport, 1976, p.44)

Broderick then goes on to suggest that the client-centered technique of "reflection" is the strategy to use in trying to resolve these difficulties of communication.

In another focus, Bach and Wyden (1968) deal with the importance of communicating negative and aggressive feelings in an intimate relationship. They instruct couples in the art of "expressing constructive aggression" or fighting. While they present an interesting approach, there is, as yet, no empirical evidence to support the utility of their model.

There have been at least three empirical studies directly related to the importance of communication in marital relationship. In one of these, Hickman and Baldwin (1970) analysed the effectiveness of a programmed text to enhance marital communication. The effectiveness of a booklet entitled, Improving Communication in Marriage (Human Development Institute, 1967) was compared to conjoint marital counseling which emphasized communication problems. It was found that the counseling alone was more effective than the book alone, and that the book was more effective than no counseling.

A second study by Hinkle and Moore (1971) examined a relationship enrichment program for married and engaged couples. This program emphasized verbal and nonverbal communication and the constructive expression of aggression, intimacy and affection. The model has been described by Rappaport (1976) as a two step communication program:

The first step for the receiver (is) to repeat the verbal message. The second step (is) to verbalize how the receiver feels about the message. Basic criteria for good feedback are as follows:

- a) Descriptive of one's feelings rather than evaluative of the other person.
- b) Delivery of specific rather than general information.
- c) Feedback about behaviours that can be changed

whenever possible.

This teaching of client-centered skills to husbands and wives has been prevalent in the literature for several years. For example, Ely, Guerney and Stover (1973) used the Conjugal Relationship Enhancement Program as an eight week training program with married couples at Rutgers University. Also, Collins (1971) used this model with married couples in a six month teaching program at The Pennsylvania State University. Finally, Rappaport (1976) utilized the CRE Program with some modification, at The Pennsylvania State University. In his latter study, twenty married couples completed four intensive CRE treatment sessions in two months. The program, designed to enhance marital communication, produced significant improvement in marital relationships according to self-report measures. "Improvement" here, was defined as "the perceived enhancement of marital adjustment, marital satisfaction, marital communication, trust, intimacy and the ability to successfully resolve relationship problems". There was also a reported improvement in the clients' speaking and listening abilities according to several behavioural scales. Rappaport (1976) lists the main implications of this study as:

Couples wanting to enhance their marital relationships did not improve by simple waiting for expected help; married couples could learn and utilize communication skills to enhance their relationships;

and graduate students in the mental health field could be systematically trained within a few months to help couples improve their marital relationships. (p. 60)

One other study using the Rogerian approach to teaching communication skills to conflicted marital couples is that of Wells, Figurel and McNamee (1975). Again, positive changes in marital adjustment were found following training in client-centered principles of communication.

Minnesota Couples Communication Program

Another recent project that has borrowed heavily from Watzlawick et. al. (1967) and from the systems theory characterization of families as being "rule-governed" is the Minnesota Couples Communication Program (MCCP). This program was developed in 1968 by a small group of family theorists, researchers and therapists from the University of Minnesota Family Study Centre and the Family and Children's Services in Minneapolis.

This program, described by Miller, Nunally and Wackman (1976) is based on the belief that couples need two sets of skills to provide for both stability and change in the system. Their rationale for asserting that two sets of skills are necessary is derived from the fact that the process of communication can serve both as an index for understanding the system and as a vehicle for altering it. In a similar vein they argue that relationships which are defined and

confirmed too quickly and those which are formed without procedures for reordering, have a limited capacity for coping with internal and external system demands for changes over time. Miller, Nunally and Wackman believe it necessary to develop a skills-training regimen which allow people to establish rules for the relationship as well as equip the partners with the skills to cope with changing relationships. More specifically stated these skills are:

- 1) Skills to enable them to understand their rules and interaction patterns, i.e. awareness skills.
- 2) Skills to enable them to change their rules and interaction patterns, i.e. communication skills.

In the M CCP it is necessary for members to simultaneously participate in and monitor the system. In this way, it is argued, people learn to metacommunicate (Watzlawick et. al. 1967) in that they step out of the relationship or system and look at "how we talk", "how we make decisions," or "how we deal with tension between us". Miller, Nunally and Wackman summarize this point as follows:

In the process of learning how to metacommunicate effectively, couples establish procedures for self-monitoring, regulating, and directing the rules of their relationship, and consequently, the relationship itself. (p. 23)

There are a number of dimensions which, when in-

tegrated, form the basis of the MCCP. The program involves skill learning in six dimensions: 1) An educational-development orientation, 2) Focus on system, 3) Skill oriented, 4) Presentation of conceptual frameworks, 5) Voluntarism and participant choice, and 6) Group context as learning environment.

Although theories and methods abound in the areas of marital therapy, little solid experimental evidence testifying unequivocally to their effectiveness and conceptual validity can be found. Very few studies in marital therapy have made use of a control period or a control group that would indicate whether or not the mere passage of time, or discussions about marriage alone would provide equal benefits. Some important exceptions to this were three studies in marital behaviour therapy by Stuart (1969), Azrin, Naster and Jones (1973) and Jacobson (1977), and a report by Miller, Nunally and Wackman (1976) on the MCCP.

Purpose of the Present Investigation

The present investigation was designed to provide some answers to a number of interesting questions which arose out of the review of the literature. One of these questions focuses upon the use of an experimental design that would provide as much control over extraneous sources of variance as possible. This would be to specify as concretely as possible what factors, if any, were promoting self-report and/or behavioural change in a couple's relationship.

Specifically, the present investigation incorporated control over time, participation in an experiment, and the presentation of one therapy or another. The two therapy techniques that served as the interest of the present investigation were Behavioural Contracting and the Minnesota Couples Communications Program. The major purpose of the study was to assess the extent to which one or the other of these techniques produced behaviour change and change in a couple's relationship. The possibility that the various treatments might have a delayed as opposed to an immediate psychological impact on the individuals was examined by assessing some subjects immediately after the treatment was over and assessing other subjects several weeks after the treatment. This was designed to allow time for the treatment effectiveness to materialize if it was time dependent.

In order to obtain some index of where the changes were taking place (if they were taking place at all) the experiment required the participants to complete a wide array of self-report instruments, checklists, monitoring scales of behaviour, and other inventories. It was hoped that by obtaining as much information as possible through the use of a wide ranging number of dependent measures that the psychological impact of the treatment manipulations could be more thoroughly and comprehensively assessed. Some of the scales that were included measured dyadic adjustment,

dyadic cohesion, dyadic consensus, dyadic satisfaction and happiness, affectional expression, power in decision-making, communication effectiveness, sexual satisfaction, child management, and optimism and commitment to the relationship as well as the number of activities done together. However, it was not felt that self-report inventories alone would be sufficient to present an adequate account of what transpired within the relationships, consequently a series of behavioural measures were included.

There were basically two kinds of behavioural data that were collected. The first consisted of self-monitored behavioural information. Spouses reported on the observed pleasing and displeasing actions of their partners and the frequency of their occurrence. The second kind of behavioural measure involved the analysis of actual samples of behaviour while the couples were interacting with each other. This measure sampled some concrete behaviours that were broken into thirty possible categories. Thus, as many dependent measures as possible were used to give a fair chance for the techniques under study to demonstrate their psychological impact. It was thought that if the techniques were indeed going to be effective in promoting changes in any relationship, then a widely cast net to encompass as many possibly relevant dependent measures had to be included if it was to pick up whatever changes were taking place.

Now, it was assumed that if indeed the operant and/or behavioural approaches are instrumental in altering relationships or marriage, then these changes could conceivably be represented in the behavioural transactions of the couples involved. It was hypothesized that if favourable or unfavourable changes were to occur in dyadic adjustment and marital happiness, then these could seem to have behavioural counterparts -- specifically interpersonal behaviours such as those recorded in samples of social transactions. In a very real sense, the interest in this study involves mixing two paradigms. On the one hand, it could be argued that the self report and subjective changes in the relationship are the relevant dependent variables requiring attention and focus; on the other hand, from a behavioural point of view, it would be maintained that it is the interpersonal behaviour between partners in a relationship that should serve as the crucial dependent measure and that self-report and subjective measures should be displaced in the interest of behavioural analysis. In the present investigation we can view self-report of marital happiness, dyadic adjustment, etc. as the "real" dependent measures to be altered. When looked at this way, attention paid to behavioural changes can be justified to the extent that they are of curious interest in seeing which interpersonal behaviours are

altered as a result of the treatment and to see which changes in interpersonal behaviours seem to be correlated with changes in certain self-report and subjective measures. An alternative perspective entails the study of the behavioural changes prompted by the treatment manipulations. Thus, it could be argued that from a behaviourist standpoint the intent of the study was to assess behavioural changes following various treatment manipulations and that since behaviours are at the crux of functional marital relationships, subjective changes and many self-report indices are "by-products" of these behaviours and should be relegated to a second order of importance.

It is conceivable that there may not be that much functional difference between communications training and contracting. The rationale for this came from the fact that both the MCCP and the Family Contract Game focus on providing stimulus control over the aversive events in the relationships. Thus, a comparison between groups could prove illuminating.

Secondly, it was argued that to the extent that a treatment manipulation has beneficial effects in a relationship, then the potency of the intervention strategy should be measured by its stability over time. In this sense, we could ask the question, "To what extent does one treatment or another produce long lasting changes in a marital relationship?" For example, does the communications training equip individuals with the tools needed to maintain the positive changes once the treatment skill acquisition period is over? and, does contracting produce stable relationship changes over time, and is the contracting procedure sufficient to maintain the contracted behaviour changes? The importance of obtaining follow-up data for a period after treatment has terminated and the experimenters/therapists are no longer monitoring behaviour has to do with exploring the extent to which one or another technique could produce long lasting effects.

It was hypothesized that communication training could provide couples with useful skills that could change interaction patterns and alter the nature of an existing relationship. In this connection some of the measures that were expected to be particularly sensitive to communications skill training included such things as measures of affectional expression, dyadic consensus, discrepancies between the desired areas of change in spouse, self-reported satisfaction with communication, number of positive responses made while

attempting to understand major areas of conflict, number of recorded pleasing behaviours in the areas of affection, consideration and communication processes, and self-reported satisfaction concerning communication. It was hypothesized that if indeed the MCCP is capable of equipping couples with skills to focus on changing patterns of relationships over time, then the results should be maintained at least one and one half months after treatment. This specific question was assessed by obtaining reports on various dependent measures shortly after the treatment program was completed for some people and obtaining the same reports from other couples six to eight weeks after the treatment program had terminated.

It was hypothesized that contracting would help relationships to the extent that undesirable behaviours were reduced in frequency and desirable behaviours were increased in frequency. For example, it was expected that with this treatment the measures showing the most change would include those that are behavioural and instrumental in nature, such as conflict scores, areas of change scores, ratio of shared marital activities, happiness with household responsibilities, or more generally those behaviours that were instrumental or tied to the contract.

Other areas that were to be studied included such notions as: (1) the possibility that some techniques may produce differential change in marital happiness, and (2) the possibility that subjective and self-perceived changes in marital happiness and adjustment could take place without producing any behavioural counterparts; in other words, people may change in their marital relationships without there necessarily being any observable behavioural change occurring either in terms of the self-monitored frequency of certain activities or in terms of the behavioural interactions. Without addressing the issue of mixing paradigms, it was hoped that the present experiment would shed some light on the extent to which this might be a relevant dynamic phenomenon.

In the present experiment 4 groups of six couples each (24 couples randomly assigned to conditions) participated in an assessment and treatment follow-up program of more than five months duration. All couples were asked to complete a large number of questionnaires and inventories concerning their marriage prior to the start of their treatment participation. Following this, all subjects were asked to monitor daily the type and frequency of interactions with their spouse for one week. After the daily monitoring of their interactions and levels of marital happiness, they then formally entered the treatment phase(s) of the investigation. Groups 1 and

2 were involved in a five week session of communications skill training (MCCP); Group 3 was exposed to Behavioural Contacting over a period from four to six weeks; and Group 4 continued self-monitoring on their levels of marital happiness every day for 7 weeks. At the end of the treatment program Groups 1 and 2 were differentiated on the basis of when the dependent measures were to be obtained. Group 1 was post-tested one week after the termination of the treatment manipulation, i.e., MCCP, while Group 2 was post-tested on all the dependent measures six weeks after the end of the treatment manipulation.

In order to be fair to both treatment techniques it can be argued that because of the complex nature of dyadic interactions, any treatment effect could conceivably not materialize until sometime after the termination of the treatment manipulation. Alternatively, it could be reasonably argued that under conditions where the treatment effects are obtained immediately after the treatment manipulation such effects may dissipate over time. Therefore, the delay in post-testing served as a crucial manipulation in order to allow for both of these possibilities to be tested.

This design relies heavily on the randomization assumption for testing immediate vs. delayed (short-term vs. durable) effects. An alternative design could have made use of a repeated measures format where post-testing is completed immediately following the treatment manipulation

and again at follow-up six weeks later. The latter possibility was rejected for practical reasons. Specifically, post-testing assessment involved such heavy time and effort commitment on the part of the couples as to threaten the voluntary participation of the couples at the very beginning.

CHAPTER IIMETHODSubjects

Display advertisements were placed four times in both of Ottawa's daily newspapers asking for couples who would be willing to take part in a research program designed to improve their marriages. A copy of the advertisement can be found in Appendix A. The ad read:

COUPLES

. Do you have a good marriage?

Would you like to make it better?

. Do you have a bad marriage that you would like to make good?

The Faculty of Psychology at the University of Ottawa has prepared a research program designed for couples who want to discover new ways to be happier in their marriage. This 5-10 week program is presently being offered at no charge to all eligible couples.

For more information call:

Social Relations Program

733-1260

between 10AM & 5PM

Ask for details on "couples program"

The author also took part in an interview on a local radio program advertising the "Couple's Program". Couples interested in participating in the program were requested to call the advertised telephone number. There were 110 calls received in response to the media advertisements. All callers were asked to discuss the program with their spouse in order to determine whether or not they were interested in participating in the program, if this had not already been done. The information about the program given to the caller at this time was very general in nature and can be found in Appendix B. All callers expressing interest in the program were mailed a cover letter about the program (Appendix C), along with the Marital Status Inventory, the Stuart Pre-Counseling Inventory and a short biographical questionnaire, all of which was to be completed and mailed back in the self-addressed stamped envelope (one set for the husband and one for the wife).

On the basis of having eliminated couples who did not meet the following criteria: 1) non-alcoholic and no alcoholic first degree relatives, 2) not involved currently in some form of psychotherapy, and 3) no first degree relatives who were psychotic. Couples were then stratified according to the following criteria: 1) number of years married, 2) whether or not they had children, 3) whether or not one spouse

had a first degree relative that had been previously hospitalized for psychiatric reasons, 5) scores on the Marital Status Inventory, 6) Education level, and 7) marital optimism as measured on the Stuart Marital Pre-Counseling Inventory. Subjects who themselves were alcoholic or previously hospitalized for psychiatric reasons were asked to withdraw from the program. Twenty six couples were selected for participation and were randomly assigned to one of four treatment conditions.

Participating husbands averaged 40.81 years of age; the mean age for wives was 38.34 years. The age range for all spouses was 24 to 54. Couples had been married or lived together between 1 and 30 years with a mean duration of 14.87 years. Twenty-three of the 26 participating couples had at least one child. Both husband and wife were college graduates in 38.46% of the marriages, and 22 of the 26 couples had at least one member who had attained a college degree. Eleven of the 26 (42.31%) couples had previous marital therapy.

A comparison of Social-economic status among groups was carried out using Blishen's scale (1967). It was found that there was no significant difference between groups, ($F = .36, p > .05$) on SES (mean = office managers or draughtmen).

Procedure

Initial meeting All couples met in their respective groups with three therapist/experimenters involved in the

study. This initial meeting was designed to clarify some of the questions couples might have about the program as well as to present them with additional pre-test materials. Each couple signed up for a video-tape session in which a 10 minute sample of interpersonal behaviour was to be recorded. During the initial meeting, couples completed the Dyadic Adjustment Scale, the Marital Activities Inventory, and were given the Spouse Observation Checklist and Happiness Scales to complete each night at home. Treatment couples received a brief explanation of the treatment program they were to receive. Control couples were informed that they would have to wait two and one half months before beginning the treatment phase, but that an important component of the program necessitated their cooperation in completing daily self-report scales up to the time of their next meeting 10 weeks later.

All couples were asked to participate in a video-taping session where they were to be video-taped interacting with their spouse. When subjects arrived at this session they were asked to complete the Areas of Change Scale from which the issues to be discussed were selected. The nature of the issues for discussion focused on a relatively major problem that they were experiencing at the time. In order to get them accustomed and familiar to interacting behind a one-way mirror, they were first asked to discuss a minor problem area. The camera was hidden behind the one-way

mirror and couples were left alone while they interacted. All couples were taped by the same experimenter (SS). Couples were allotted 5 minutes for the minor problem and 10 minutes for the major problem. Only the major problem discussions were taped and this served as the pre-test interpersonal behaviour assessment.

Couples Communication Program The week following the initial meeting 12 couples met to begin the Couples Communication Program. This group was lead by a Ph.D. psychologist with 7 years experience (MG). There were also two Ph.D. candidates with over two years clinical experience who were present and contributed to the sessions (one female, S.D., one male, S.S.). All material was presented by tape and followed the program as outlined in Alive and Aware (1976). Homework assignments were selected from the Couple Workbook: Increasing Communication and Awareness Skills (1977) and can be found in Appendix D. All couples were given tape recorders and cassettes to record the taped excercises. Homework excercises were taken up from the previous week and discussed at the beginning of each session, after which the homework forms were collected. Sessions lasted for 3½ hours a week for 5 treatment weeks.

In the first session couples were taught about awareness skills and were presented with the awareness wheel. They were given examples and were taught to identify different dimensions of sensing, thinking, feeling,

intending, and acting. The importance of identifying their feelings and becoming more aware about how these can be disclosed and shared was examined. Couples learned to identify five self-disclosure skills: a) making sense statements, b) making interpretive statements, c) making feeling statements, d) making intention statements, and e) making action statements.

In homework assignments, couples practised identifying intentions, both long term and short term, and for oneself and for the relationship. They practiced using their awareness skills by sending each other short "telegrams" expressing all dimensions of their awareness wheels. In order to provide practice using the self-disclosure skills, short discussions were audio-taped involving current concerns or issues in the relationship. Couples were also encouraged to disclose their awareness about the process of their talking together (meta-communicate). Two other skills that couples were taught included speaking for self and speaking for other. They were then given practice in "documenting" their interpretations with data.

In the second week couples learned to identify emotions that their partner experienced and to document what made them think their partner experienced this emotion. At home, as part of their assignments, spouses shared their examples or "checked out" their accuracy with their partner. They then dealt with their "procedure setting methods" for discussing issues. Issues that we

dealt with successfully and unsuccessfully were compared in terms of the procedures used in the situations. Practice was given in tuning into their partner's self-awareness and in listening. Couples then practiced using the "Shared Meaning Process" which included all the skills taught thus far. They exchanged at least two shared meanings concerning something positive about themselves and about themselves in relation to their partner. In this process one partner sent a message, following which the sender confirmed the receiver's accuracy or clarified the original message.

The third session dealt with communication styles. Four styles of communication were presented: a) Style I - sociable, friendly, conventional, b) Style II - directing, persuading, blaming, demanding, c) Style III - tentative, exploring, elaborating, speculating, and d) Style IV - aware, active, congruent, accepting, responsible. For homework, partners practiced identifying each of the four styles, as well as mixed styles. The importance of vocal characteristics such as pitch, tone, rate of speech, were also emphasized. Partners practised using the various styles, with the emphasis on Style IV in dealing with significant issues.

The fourth session concentrated on building self-and other esteem. Information from the previous sessions were drawn upon and brought together to build up to this final session. Definitions were provided for self-concept,

self-esteem, other esteem, and esteem of the relationship. The importance of self-concept and self-esteem were discussed and related to the awareness wheel. The four self and other esteem positions were presented: 1) I count myself, 2) I don't count myself, 3) I count you, and 4) I don't count you. Also, the four basic counting positions were discussed: 1) I don't count/I don't count you, 2) I don't count/I count you, 3) I count/I don't count you, and 4) I count/I count you. The importance of building self and other esteem was also presented. At home, partners practiced trouble shooting exercises and applied the concept of mini-contracting (not to be confused with contracting as a treatment manipulation). Mini-contracting occurs when both partners express the intention to work, i.e., explore and discover, aspects of their relationship at that moment in that situation. Other concepts that were presented included the work process, work pattern communication, "take-aways", and resolving relationship issues. Subjects returned for a fifth meeting a week later when the entire program was reviewed.

Family Contract Game The Family Contract Game (Blechman, 1974) was adapted for the couples in the present study. Once again, the week following the initial meeting six couples met individually with a leader to play the Contract game. This group of subjects were all seen by S.S.. All couples were given a revised form of the programmed learning manual "All Together Now" before commencing the first session. The manual began by defining

behaviour, and then distinguished between those behaviours that presented problems, or were displeasing, and those behaviours that were pleasing. It was shown how problem behaviours could be changed into pleasing behaviours. The idea of first describing a problem in clear and concrete terms was presented, as well as for counting how often the behaviour occurred. Partners were then taught to ask for pleasing behaviours, that is, to specify the behaviour, and how often it was desired. The next section dealt with making pleasing behaviour happen and introduced the notion of rewarding desired behaviours. Social rewards were distinguished from material rewards and both of these rewards were distinguished from bribes. The manual then discussed the importance of tracking behaviours, specifically in regard to counting the occurrence of pleasing behaviours. Partners were then introduced to the technique of contracting. Five steps were involved: 1) Stating the displeasure, 2) Re-stating the problem as a please, 3) Choosing a reward, 4) Counting the pleasing behaviour, and 5) Writing the contract. Some general rules to remember about good contracts were then provided.

During the first session couples discussed the programmed manual with the leader who dealt with any questions they might have had regarding the technique of contracting. The Family Contract Game was then introduced to the couple. A copy of the game board can be found in

Appendix E. The game board is broken into 14 squares. Each square instructs one of the players, identified as either red or blue, to carry out a particular action (i.e., "Red, draw a problem card."), or to make a statement (i.e., "Red, tell Blue what to do more of and when."), or to ask a question (i.e., "Blue, ask Red if he agrees to the reward you chose.").

There are four basic components to the 14 squares that constitute the problem solving process. These are: 1) Problem Choice - a target behaviour is selected for negotiation, 2) Please Description - a pleasing behaviour is selected to replace the problem behaviour, 3) Consequence Choice - a decision on how the more pleasing behaviour should be rewarded is made, and 4) Contract Settlement - the agreeing, writing and signing of the contract is affected. Couples move on to the next section only once they have reached agreement on the previous section.

Upon complying with the question posed by the square under play, the board instructs the players to award themselves play money and draw humorous bonus cards. When players disagree, they are instructed to begin the unresolved unit again, to pay play-money fines, and select a humorous risk card. Thus, the game contingently rewards cooperative problem solving behaviour and assists players in requesting their desires in a constructive way.

When couples were ready to commence playing the Family Contract Game, each spouse rolled a dice to determine who would be red (the problem presenter and writer of the contract) and which partner would be blue (the target of the complaint and the banker during the game). During the first session partners selected important marriage problems from a large item pool. In this and all subsequent sessions, the dyad discussed and tried to solve two of these problems. During treatment sessions, problem discussions were structured by the game.

At each weekly treatment session, the couple played the game twice, each game averaging 15 minutes, the session lasting 50 minutes. The previous weeks contracts were reviewed each time before starting a new game session. For each session one game dealt with a problem raised by the husband and one game concerned a problem raised by the wife. The solution of a marital problem took the form of a contingency contract written and signed by both partners. The couple attempted to carry out not more than one new contract each week. Other contracts, written, but not carried out were considered practice contracts. When a couple agreed to carry out a contract but did not follow through on it during the week, the contract was reintroduced into the game the following session and was renegotiated. Each couple was to successfully carry out three contracts for at least one week in order to successfully complete

this phase of the treatment program.

Self-Monitoring Control These six couples met with the three therapist/experimenters for an initial briefing as had the couples in the other Groups. They also received the same pre-test assessment, including the video-taped session. These couples were told, however, that due to the large number of couples entering the program, the actual treatment section of the program could not be presented to them for at least eight weeks. These couples were requested to self-monitor during this time as part of the assessment procedure. They were allowed to participate in the program at no charge once the investigation was completed. All of these couples, except one, later participated in the Minnesota Couples Communications Program. The data for these couples during their participation in the Couples Communication Program was not presented due to the many variations in the treatment presentation received by these subjects and since an accurate comparison between groups that included the treatment given to the Control group could not be justified.

Posttest All couples were posttested with the same assessment instruments as in pretest. The only exceptions were the MSI which is a pretest only instrument, and the Stuart Pre-Counseling Inventory was shortened to contain only the psychometric categories. The measures were given at the end of treatment for all Contracting

couples and for Group 1 couples. Group 2 communications couples were re-assessed at the end of the follow-up period, that is, one and one-half months following treatment termination.

Measures

Dyadic Adjustment Scale (DAS) This scale, developed by Spanier (1976) consists of 32 items assessing the quality of a relationship in marriage and other similar dyads. The scale was derived empirically through factor analysis after thoroughly examining 17 other such scales that were cited in the literature. The 32 items assess four components or subscales of dyadic adjustment: dyadic satisfaction, dyadic cohesion, dyadic consensus, and affectional expression. Evidence has been presented (Spanier, 1976) supporting content, criterion-related, and construct validity, as well as high scale reliability. An analysis of the superiority of this particular scale over previous measures of dyadic functioning (such as the widely used Locke-Wallace Marital Adjustment Scale) has been presented by Spanier (1976). The DAS was completed by couples during the first meeting with the program leaders and following the final treatment session for Groups 1, 3 and 4. Group 2 couples completed the scale, 6 weeks after the termination of the program. Control couples (Group 4) completed the inventory immediately after their M CCP participation.

Area of Change Scale (A.C.) This 34-item inventory

of specific spouse behaviours asks each spouse to indicate on a 7-point scale (Very much less, -3, to Very much more, +3) whether he/she, 1) desires spouse to change ("I want my spouse to show appreciation for the things I do well") and then 2) whether it would please his/her partner if the respondent were to change as indicated ("It would please my partner if I have his (her) appreciation for things he (she) does well"). The same content was responded to in each of these two forms. The congruence between "I want my partner to..." and "It would please my partner if I..." between husband-wife and wife-husband combinations of the two modes lead to conflict agreement and disagreement scores. An agreement was scored if both spouses indicated a desired change, whereas disagreements were scored as directional differences for change. For example, a disagreement may occur such as, Wife: "I want my partner to do X very much more", and Husband: "Spouse wants me to do X very much less". Thus, a conflict score was obtained by summing the scale values for each spouse separately. Deviations from "no change" indicated reported dissatisfaction and presumed to reflect attempts at behaviour change. An original sample of the A-C scale was reported by Birchler, Weiss and Vincent (1975) and an additional set of norms consisting of 100 couples was reported by Birchler and Webb (1975). In these studies total mean conflict scores (agreement plus disagreement) for husband

and wife dyads were 28.0 for distressed and 6.9 for non-distressed couples. Further information about the scale has been presented by Birchler and Webb (1977), Birchler, Weiss and Vincent (1975), Greer and D'Zurilla (1975), Margolin, Christenson and Weiss (1975), and Weiss, Hops and Patterson (1973).

The A-C Scale was given to all couples upon their arrival to their pre-test video-tape session. Recall also that items from this scale served to select a major problem area for the recorded interactions. All couples were given this scale again before the posttest taping session. For Groups 1, 3 and 4 couples this took place one week following treatment and for Group 2 couples this occurred one week following the follow-up (7 week after treatment).

Marital Activities Inventory (MAITAI) This inventory sampled 85 common recreational, self-enhancing, affectional, or utilitarian activities which could be engaged in alone, or with another person, either a spouse or someone else. Examples of these activities included playing cards, watching TV, sunbathing, going to a museum or art exhibit, etc. In each activity the respondent was asked to estimate the frequency of occurrence of the event (alone, with spouse, and with others) during the past month. This gave a sample of the activities available to the spouse and presented an indication of the relative amount of time spent in mutually

satisfying activities versus that spent by self and with nonspouse others. Weiss, Hops and Patterson (1973) reported two doctoral dissertations (Birchler, 1972, Vincent, 1972) in which it was found that distressed, relative to non-distressed couples, reported a significantly lower mean percentage of recreational activities with spouse ($p < .005$). Thus, while distressed couples were avoiding mutual activities, the groups did not differ significantly in absolute range of activities, indicating that marital distress in this instance was not indicative of greatly withdrawn or isolated individuals. Further information about this measure has been presented by Birchler and Weiss (1977); Birchler, Weiss and Vincent (1975); Greer and D'Zurilla (1975); Margolin, Christenson and Weiss (1975); and Weiss, Hops and Patterson (1973).

This inventory was given to all couples at the time of their first meeting with the three program leaders. It was re-administered to all couples at the time of their respective post-testing.

Marital Status Inventory (MSI) This inventory was developed by Weiss and Cerreto (1975) and discussed by Margolin, Christensen and Weiss (1975). It is a Guttman scale of cognitive and overt behavioural steps one takes towards the goal of divorce. This 14-item True-False inventory ranges from "I occasionally have thoughts of divorce..." to "I have sought advice from outside sources

about how to file..." to "I have consulted a lawyer and/or filed for divorce." It has mainly been used for sample description since after one has engaged in a behaviour it is not possible to "improve" by indicating at a later time that the same behaviour had not occurred. The MSI was completed by all couples before entering the program.

Stuart Marital Pre-Counseling Inventory (SMPCI)

This inventory, developed by Stuart (1972) collects (socially) and self-monitored behavioural data, measures evaluative reactions to multiple areas of marital functioning, assesses commitment to the marriage, provides a means for determining the extent to which one partner concurs with and understands the views of the other in many areas, and provides data on the sources for interactional change available to the couple. More information about this inventory has been provided by Stuart, 1973; 1975; 1976. All couples completed this inventory before attending the first session.

The preceding instruments are all paper-and-pencil retrospective self-reports for assessing marital interaction status. The following measures sample either laboratory behaviours as observed by trained raters, or on-going daily events in the home, as observed by the spouses themselves.

Marital Interaction Coding System (MICS) This coding system was developed to provide sequential coding of couple interactions (Hops, Wills, Patterson & Weiss, 1971;

Margolin, Christensen & Weiss, 1975). It was realized that when reviewing a video tape of marital conversation, communication occurs at all levels and the uninitiated outsider (therapist) has enough difficulty keeping track of content without also tracking the nuances of the interaction (Weiss, Hops and Patterson, 1973). Thus, the necessity of developing a coding system embodying those aspects of the interaction was of importance in the development of the MICS.

In this technique, short (10-minute) interactions of a husband and wife trying to solve problems selected from the A-C were videotaped and played back for scoring by trained coders. Both verbal and nonverbal aspects of the behaviour of both spouses were scored for each of the twenty 30-second units. There are thirty behavioural categories or codes. Some examples are Agree, Approval, Problem Description, Problem Solving, and Put Down. Some nonverbal codes include Attention, Laugh, Positive Physical Contact, and Compliance. One laboratory observation session was recorded for each couple during a one-week, pre-treatment baseline and one more following treatment for treatment (Groups 1 and 3) and control (Group 4) couples, and at follow-up for (Group 2) communications couples. This coding system has been extensively studied and further information is available from the following sources: Birchler, Weiss and Vincent, 1975; Greer and D'Zurilla,

1975; Hops, Patterson & Weiss, 1973; Hops, Wills, Patterson & Weiss, 1971; Margolin, Christensen & Weiss, 1975; Patterson & Hops, 1972; Patterson, Hops & Weiss, 1975; Vincent, Weiss & Birchler, 1975; Weiss, Hops & Patterson, 1973; and Weiss, Patterson & Hops, 1973.

Spouse Observation Checklist (SOC) This checklist contains an extremely comprehensive listing of specific pleasant or aversive behaviours in several marital categories. Subjects complete the SOC with the instruction to record frequency of each of these behaviours over a one-week baseline period. Pleases and displeases were defined as responses associated with a spouse which the other finds pleasing or displeasing, quite independent of the intention of the actor. (Weiss and Patterson, 1971; Patterson & Hops, 1972; Birchler et. al., 1975; Margolin et. al., 1975; and Wills, Weiss & Patterson, 1974).

The recording of P's and D's was done on a daily basis from the SOC which included a wide range of P's and D's, some of which were or were not specific to a spouse. In addition to the P's and D's a concomitant daily self-rating of relationship satisfaction on a seven point scale was included (Wills, Weiss & Patterson, 1974). Spouses set aside a fixed time each day for filling out the checklist, such as some time each evening within the hour from 10:00 to 11:00 p.m. All couples filled out the checklist

for one week at pre-treatment and for one week post-treatment with the exception of Group 2 communication subjects who filled out the checklist 6 weeks after the end of their M CCP participation.

All P and D events were grouped into 12 categories thought to be important for marital exchange, i.e. Communication, Companionship, Household Management. This technique of reporting events has been one of the most extensively studied marital measures. Further information describing its utility has been provided by Birchler, 1972; Greer and D'Zurilla, 1975; and Vincent, 1972.

Marital Happiness Scale This last measure was developed by Azrin, Naster and Jones (1973). It consists of 10-point scales of marital happiness in each of nine areas considered inherently relevant in most marriages. A category of general or overall happiness is also added. The areas listed are: 1) Household Responsibilities; 2) Rearing of Children; 3) Social Activities; 4) Money; 5) Communication; 6) Sex; 7) Academic or Occupational Progress; 8) Personal Independence; 9) Spousal Independence; and 10) General Happiness. A brief description of each of these categories was provided with the questionnaire. Each problem area was rated separately from the others in order to prevent global negative judgements. The importance of current as opposed to the past occurrences was stressed. Each spouse was given a 1-week's supply

(seven) of the Marital Happiness Scale forms and told to complete one every evening prior to retiring during the pre-treatment baseline, throughout the treatment period, during the week post treatment, and for at least four more weeks following that. At the end of the treatment program, couples completed scales designed to evaluate various aspects of the program and their perceptions of the leaders. This scale can be found in Appendix F.

CHAPTER III

RESULTS

Firstly, a description of the subject population in terms of demographic variables and scale assessments will be given. The degree and extent of these interrelationships will also be reported. These statistics were derived from the pre-test assessment data, including data from the demographic variables. A summary of the questionnaires used can be found in Table 1. Secondly, the results of the treatment manipulations in terms of the changes produced in one or another of the dependent variables will be presented. Finally, the evaluation of the program and its leaders by the couples will be presented together with correlations between these evaluations and changes on the various dependent measures.

Demographic Measures

The group data on the demographic measures is presented in Table 2. The overall means on these measures and their standard deviations can also be found in this Table. None of these measures were significantly different between the groups.

As can be seen in Table 3 there were a great many correlations among the demographic variables and between the demographic variables and the subjective scales.

Summary of Dependent Measures

<u>Questionnaire</u>	<u>Subscales</u>	<u>Abbrev.</u>	<u>Range</u>	<u>Direction</u>
Blishen		SES	0-76.69	Forward
Marital Status Inventory		MSI	0-14	Reverse
Stuart Marital Pre-Counseling Inventory	Power in Decision-Making	Deci	0-64	Reverse
	Areas of Satisfaction	Satis	12-60	Reverse
	Communication Effectiveness	Commun	10-50	Forward
	Sexual Satisfaction	Sex Sat	5-15	Reverse
	Child Management	Child	6-30	Reverse
	Optimism and Commitment	Optim	0-100	Forward
Dyadic Adjustment Scale		DAS	0-151	Forward
	Dyadic Consensus	D.Con.	0-65	Forward
	Affectional Expression	A.E.	0-12	Forward
	Dyadic Satisfaction	D.Sat.	0-50	Forward
	Dyadic Cohesion	D.Coh.	0-24	Forward
Areas of Change Inventory		A.C.	0-68	Reverse
Marital Activities Inventory	Change in Marital Activities	MAI	0-100	Forward
	Household Responsibilities	CMAI	0-200	Reverse
Happiness Scale		HapHR	0-10	Forward
	Rearing of Children	HapChil	0-10	Forward

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Summary of Dependent Measures (Cont.)

<u>Subscales</u>	<u>Abbrev.</u>	<u>Range</u>	<u>Direction</u>
Social Activities	HapSA	0-10	Forward
Money	HapMon	0-10	Forward
Communication	HapComm	0-10	Forward
Sex	HapSex	0-10	Forward
Academic/Occupational Progress	HapAc	0-10	Forward
Personal Independence	HapPI	0-10	Forward
Spouse Independence	HapSI	0-10	Forward
General Happiness	HapGen	0-10	Forward
Total Pleases	Pleasure	0-	Forward
Total Displeases	Displeasure	0-	Reverse
Time Spent Together	TimTo	0-	Forward
Satisfaction Rating	Satis	1-9	Forward
Pleasant Thoughts About Spouse	Thots	0-	Forward
Companionship	IP	0-	Forward
Affection	IIP	0-	Forward
Consideration - Pleases	IIIP	0-	Forward
Consideration - Displeases	IIID	0-	Reverse
Sex - Pleases	IVP	0-	Forward

Spouse Observation Checklist

Summary of Dependent Measures (Cont.)

Questionnaire

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<u>Subscales</u>	<u>Abbrev.</u>	<u>Range</u>	<u>Direction</u>
Sex - Displeases	IVD	0-	Reverse
Communication Process - Pleases	VP	0-	Forward
Communication Process - Displeases	VD	0-	Reverse
Coupling Activities - Pleases	VIP	0-	Forward
Coupling Activities - Displeases	VID	0-	Reverse
Child Care/Parenting - Pleases	VIIP	0-	Forward
Child Care/Parenting - Displeases	VIID	0-	Reverse
Household Management - Pleases	VIIIP	0-	Forward
Household Management - Displeases	VIIID	0-	Reverse
Financial Decision-Making - Pleases	IXP	0-	Forward
Financial Decision-Making - Displeases	IXD	0-	Reverse
Employment/Education - Pleases	XP	0-	Forward
Employment/Education - Displeases	XD	0-	Reverse
Personal Habits/Appearance - Pleases	XIP	0-	Forward
Personal Habits/Appearance - Displeases	XID	0-	Reverse
Self/Spouse Independence - Pleases	XIIP	0-	Forward
Self/Spouse Independence - Displeases	XIID	0-	Reverse

Table 2
Group Mean Scores on Demographic Variables

Variable	Group				Total	SD
	1	2	3	4		
Age	39.08	37.50	37.25	43.21	39.50	8.30
Years of School	15.25	16.00	16.07	16.58	15.98	2.69
SES	61.97	56.23	56.06	55.34	57.40	13.34
Income/person	3.25	3.00	3.25	3.64	3.29	1.96
Years Married	13.67	11.20	12.83	18.86	14.14	7.85
Number of Children	2.80	2.50	2.83	2.33	2.62	.79
MSI	3.17	2.50	3.67	2.71	3.01	2.41

Note: Income \$0 - 5,000 = 1
 \$5 - 10,000 = 2
 \$10 - 15,000 = 3
 \$15 - 20,000 = 4
 \$20 - 25,000 = 5
 Above \$25,000 = 6

Pearson Product-Moment-Correlation Coefficients Among
Demographic Variables and Subjective Scales

	Sex	Age	Years School	SES	Income	Years Married	Number Children
Years School	-.41**	.06					
SES	-.59**	.29*	.48*				
Income	-.82**	.25*	.51**	.68**			
Years Married	0	.90**	-.03	.18	.13		
Number of Children	0	.50**	.18	.16	.09	.53**	
MSI	.22	-.12	.08	.00	-.15	.06	
Deci	.05	.39**	.16	-.04	.06	.28*	.31*
Marsat	.14	.24*	.35**	.05	-.03	.13	.38**
Commun	.01	-.22	-.25*	-.14	-.04	-.12	-.49**
SexSat	-.20	-.02	.32*	.12	.16	-.25*	.17
ChildMan	.20	.30*	.00	-.02	-.11	.27*	.21
Optim	-.05	-.28*	-.38**	-.22	-.09	-.30*	-.33*
DAS	-.13	-.09	-.24	-.16	-.01	-.05	-.31*
DCon	-.1	-.07	-.17	-.15	-.04	.00	-.19

* $p < .05$

** $p < .01$

	Sex	Age	Years School	SES	Income	Years Married	Number Children
AffEx	.08	.28*	-.37**	-.15	-.01	.34*	-.09
DySat	-.21	-.06	-.19	-.07	.07	-.06	-.30*
DCoh	-.08	-.29*	-.13	-.15	-.06	-.29*	-.33*
AC	.12	.01	.07	.01	.00	-.18	.02
MAI	-.24	.15	-.01	.14	.19	.05	-.34*
HapHR	-.18	-.05	-.09	-.03	.07	-.01	-.33*
HapChil	-.16	-.02	-.05	.06	.10	-.04	-.46**
HapSA	-.12	.05	-.19	.03	.02	.14	-.14
HapMon	.02	.06	-.29*	-.12	-.10	.02	-.14
HapCom	-.16	.11	-.19	.04	.08	.11	-.24
HapSex	-.02	.04	-.12	-.01	-.02	.18	-.07
HapAcad	-.09	.00	-.32*	.12	-.02	.02	-.01
HapPI	.21	-.04	-.33*	-.18	.17	.04	-.06
HapSI	.09	.10	-.37**	-.04	-.11	.19	.01
HapGen	-.14	-.05	-.32**	.02	.03	-.01	-.27*
Please	-.13	-.13	-.27*	-.13	.02	-.17	-.37**
Displease	-.05	.01	.02	.09	.04	-.09	.32*
TimeTo	.01	-.08	-.03	-.04	-.10	-.18	-.44**

	Sex	Age	Years School	SES	Income	Years Married	Number Children
Satis	-.03	-.01	-.15	-.01	.06	-.07	-.25
Thots	.02	.02	-.11	-.05	.12	-.08	-.31*
IP	-.11	-.19	-.15	-.01	-.01	-.21	-.59**
IIP	.02	-.41**	-.18	-.22	-.04	-.44**	-.61**
IIIP	-.11	-.04	-.24	-.11	.11	-.07	-.35**
IIID	-.02	.02	.03	.02	-.04	-.08	.25*
IVP	-.01	.06	-.19	-.11	.06	.01	-.20
VIP	-.06	.37**	-.29*	.09	-.06	.31*	-.05
VID	-.31*	-.08	.11	.19	.32	-.14	.06
VIIP	-.09	-.31*	.00	-.10	-.06	-.26*	.23
VIID	-.01	.03	-.10	-.06	-.05	.03	.42*
VIIIP	-.34*	.09	-.16	.06	.25*	.09	-.01
VIIID	-.33*	-.01	.13	.30	.30*	-.14	.18
IVD	.01	-.05	.16	.00	.04	-.17	.12
VP	.03	.11	-.09	.02	-.09	-.03	-.24
VD	-.14	.09	-.02	.08	.04	-.02	.25*
IXP	.20	-.28	-.27*	-.35**	-.29*	-.24	-.30*
IXD	.04	.07	.06	.11	.02	-.03	.21

	Sex	Age	Years School	SES	Income	Years Married	Number Children
XP	.04	-.35**	.02	-.10	-.04	-.39**	-.33*
XD	.01	-.12	-.02	.00	.03	-.10	.02
XIP	.28	.18	-.43*	-.22	-.09	.37**	-.07
XID	.14	-.01	-.03	.03	-.05	-.02	.25*
XIIP	-.03	-.02	.09	-.14	-.12	.06	.22
XIID	-.12	-.03	.16	.16	.21	-.08	.05

While all of these can be found in Table 3, we can summarize them as follows:

Sex: It was found that males had more years of schooling, higher SES, more income, received more pleasing coupling activities and more pleasing household management behaviours, but also received more displeasing household management behaviours compared with females.

Age: Older subjects had higher SES, income, were married longer, had more children, expressed more affection (DAS), and received more pleasing coupling activities. They were also more dissatisfied with their marriage decision making process, less satisfied with their marriage (SMPCI), and with child management, were less optimistic about their spouse and relationship, and reported less dyadic cohesion (DAS). They received fewer affectional behaviours, fewer pleasing child care and parenting behaviours, and fewer pleasing educational-employment behaviours.

Education: Subjects with more years of schooling had higher SES, greater income, less marital satisfaction (SMPCI), less satisfaction with their communication process (SMPCI), and were less satisfied with the way in which they have sex. They were less optimistic about their spouse and their relationship, expressed less affection (DAS), were less happy with the areas of money, academic-employment, personal independence, their spouse's independence, and their relationship in general.

They received fewer pleasing behaviours from their spouse, especially in the area of coupling activities, finances, and personal habits and appearance.

Socio-Economic Status: SES was correlated positively with income, receipt of more displeasing household management behaviours, and the receipt of fewer pleasing financial behaviours.

Income: High income was positively correlated with displeasing coupling activity behaviours, pleasing household management activities, displeasing household management activities, and negatively related to pleasing financial behaviours.

Years Married: The number of years of marriage was positively correlated with their number of children, their satisfaction with sexual behaviours (SMPCI), the amount of affectional expression given and received in the relationship (DAS), the number of pleasing coupling behaviours received, and the number of pleasing personal habit and appearance behaviours received. There were also negative correlations between the number of years married and spouses' happiness with their decision making process (SMPCI), happiness with child management (SMPCI), optimism about their spouse and relationship, their scores on dyadic cohesion (DAS), the number of affectionate pleasing behaviours received, pleasing child care and parenting behaviours, and employment-educational pleases received.

Number of Children: The number of children in a family was significantly positively correlated with the number of displeasing behaviours received, more specifically, the number of "considerate" displeasing behaviours received, number of communication displeasing behaviours, child care and parenting displeases, and personal habit and appearance displeasing behaviours. The number of children was also negatively correlated with spouses' satisfaction with their decision-making process, marital satisfaction, satisfaction with communication processes (SMPCI), optimism about their spouse and the relationship, scores on dyadic adjustment (DAS), dyadic satisfaction (DS), dyadic cohesion, number of activities done with spouse, happiness with household responsibilities, children, and the relationship in general. It was also correlated negatively with pleasing behaviours received, time spent together, pleasant thoughts about their spouse, and the following pleasing behaviours received: affectionate, considerate, financial, and employment-educational behaviours.

To summarize, it can be seen that many demographic variables are correlated with one another. In a subsequent analysis of the foregoing, to be reported elsewhere, further computations will be made to determine the extent to which one or more variables and their subsets are related to each other. More computations will be undertaken later on, especially in connection with the multiple regression

analysis that is discussed (see below - Subjective Scales). At this point the data are merely presented in order to describe the population under investigation.

Subjective Scales

There were a large number of intercorrelations between the self-report scales given at pre-test. It is the object of a subsequent study to analyse all these correlations via a multiple regression model and therefore these statistics and findings will not be reported at this time. For the reader interested in the nature of these intercorrelations, Appendix G to M lists tables of intercorrelations between all of the subjective scales.

The mean score for the Groups on each of the scales can be found in Table 9. There were no significant differences between groups on any of the demographic variables. There were pre-test differences, however, on three of the subjective scale measures. First, there was a significant difference in the self-report of happiness with child management between the groups, $F(3, 38) = 3.14, p < .05$. A comparison between means (Scheffe $F = 4.14, p < .05$) revealed that Group 4 (Control) couples were happier with their child management than Group 1 (Communication) couples. Second, there was a significant difference in the number of displeasing behaviours received before treatment, $F(3, 42) = 2.93, p < .05$. This difference was found to occur between Group 1 (Communication), who received more displeasing behaviours,

and Group 4 (Control) (Scheffe $F=4.12$, $p < .05$). Thirdly, when the SOC was examined to locate where any differences occurred, a significant difference was found between the groups in the number of pleasing behaviours received in the area of child care and parenting, $F(3, 44) = 4.23$, $p < .05$. It was found that Group 3 (Contracting) couples were receiving more pleasing child care and parenting behaviours than Group 4 (Control) couples (Scheffe $F = 4.12$, $p < .05$) prior to receiving their treatment.

Marital Interaction Coding System The results of the intercorrelations of the MICS are presented in Table 4 for the information of the reader. The codes and their abbreviations are in Table 5.

MICS and Levels The correlations between each of the Levels of the MICS and the individual items are presented in Table 6. Level 1, as presented by Hops, Wills, Weiss, and Patterson (1971), was composed of the total rates of responses in the following categories: Accept Responsibility, Compromise, Paraphrase/Reflect, and Problem Solving. This Level was referred to as Problem Solving. The present study found the following codes significantly positively correlated with Problem Solving: Paraphrase/Reflect, Problem Solving, Talk, Agree, Assent, and Attend. According to Hops, et. al. (1971), Level 2, entitled "Positive Verbal" was composed of the totals of the following codes: Agree, Approval, and Humour. In the present investigation this Level was

Table 4

Pearson Product-Moment Correlation

Coefficients Among MICS Items

	AP 1	AR 2	CM 3	CP 4	CR 5	CS 6	DR 7	EX 8	HM 9	MR 10	NS 11	PD 12	PR 13
AR 2													
CM 3	-.06												
CP 4	-.10	.01											
CR 5	-.02	-.02	.12										
CS 6	-.10	-.16	-.09	.72**									
DR 7	-.06	.30*	.17	.45**	.05								
EX 8	-.10	.13	.03	.22	.00	.42**							
HM 9	-.06	.30*	.17	.45**	.05	1.00**	.42**						
MR 10	-.06	.08	.21	-.17	-.08	-.06	-.12	-.06					
NS 11	-.09	-.10	.25*	.47**	.51**	-.11	-.05	.03	.03				
PD 12	-.07	-.10	-.06	-.07	-.07	-.03	-.06	-.08	-.08	.17			
PR 13	.00	-.26*	.11	-.26*	-.22	-.15	-.07	-.15	.13	-.04			
PS 14	.07	-.14	-.09	-.09	-.09	-.03	-.08	-.03	-.10	.05	-.04	.18	
PU 15	.16	-.07	-.20	-.06	-.04	.09	.00	.09	.10	-.03	-.05	-.07	.40**
QU 16	-.10	-.11	.06	.52**	.56**	-.03	.03	.06	-.11	.60**	-.05	-.07	-.06
TA 17	-.09	-.25*	-.15	-.05	-.11	.06	.15	.67**	-.10	-.03	.03	.44**	.19
AG 18	-.09	.38**	.03	.41**	.13	.67**	.22	.13	.09	-.01	-.09	-.07	-.11
AS 19	.24	-.16	-.21	-.18	-.09	-.13	.04	-.13	-.20	-.14	-.15	.21	.24
AT 20	-.08	.32*	.10	-.19	-.14	-.12	-.01	-.12	.34*	-.05	-.13	.11	.08
CO 21	.02	.03	-.03	.12	.05	.34*	.38**	.34*	.08	.01	.07	.32*	.20
PP 22	-.09	-.01	-.14	.37**	.51**	-.06	-.05	-.06	-.16	.20	-.06	-.05	-.08
SL 23	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
DG 24	-.08	.16	.05	-.14	-.13	-.09	.09	-.09	.37**	.02	-.08	.48**	-.13
IN 25	-.03	.17	.03	.23	.22	.16	.61**	.16	-.12	.17	-.06	-.29*	-.18
	.06	-.19	.18	-.05	-.07	.02	.00	-.02	-.15	-.08	.40**	.52**	.14

* p < .05

** p < .01

Table 4 (cont'd.)

	AP 1	AR 2	CM 3	CP 4	CR 5	CS 6	DR 7	EX 8	HM 9	MR 10	NS 11	PD 12	PR 13
NC 26	-.06	.20	-.05	-.06	-.06	-.02	-.05	-.02	-.06	-.03	-.02	-.12	-.03
NO 27	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
NR 28	.47**	.01	-.01	-.03	-.10	-.03	.00	-.03	.23	-.02	-.04	.27*	-.05
NT 29	-.18	.17	-.07	.10	.06	.00	-.08	.00	-.20	.00	-.01	-.07	-.08
TO 30	-.11	-.15	-.10	.62**	.72**	-.04	-.09	-.04	-.11	.40**	-.04	-.23	-.06

Table 4 (cont'd.)

	PS 14	PU 15	QU 16	TA 17	AG 18	AS 19	AT 20	CO 21	PP 22	SL 23	DG 24	IN 25	NC 26
QU 16	.00	.08											
TA 17	.23	.14	.10										
AG 18	.30*	-.10	.14	-.23									
AS 19	.25*	-.14	.04	-.07	.33*								
AT 20	.31*	.07	.21	.31*	.26*	.18							
CO 21	.02	.55*	.00	.14	-.09	.00	.03						
PP 22	.00	.00	.00	.00	.00	.00	.00	.00	.00				
SL 23	-.08	-.03	.15	.00	.08	.19	.40**	-.07	.00	.19	.00		
DG 24	.02	.12	-.20	.07	.00	-.03	.36**	.17	.00	.15	.09		
IN 25	.13	-.08	-.01	-.21	.31*	.28*	.38**	.02	.00	.02	.09	-.04	.00
NC 26	-.05	-.04	-.16	.02	.16	-.12	.04	-.06	.00	.00	.00	.00	.00
NO 27	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
NR 28	.02	.12	.21	.31*	-.05	-.08	.07	.03	.00	.17	-.10	-.15	-.03
NT 29	.09	.07	.20	.29*	-.15	.10	-.31*	.28*	.00	-.09	.10	-.16	-.07
TO 30	-.14	.70**	-.12	.12	-.10	-.20	-.05	.61**	.00	-.14	.10	-.14	-.04

Table 4 (cont'd)

	NO	NR	NT
	27	28	29
NO 27	.00		
NR 28	.00	.00	
NT 29	.00	.18	.00
TO 30	.00	-.06	.09

Summary of Codes for Marital Interaction
Coding System

1	AP	Approval	16	QU	Question
2	AR	Accept Responsibility	17	TA	Talk
3	CM	Command	18	AG	Agree
4	CP	Complaint	19	AS	Assent
5	CR	Criticize	20	AT	Attend
6	CS	Compromise	21	CO	Compliance
7	DR	Deny Responsibility	22	PP	Positive Physical Contact
8	EX	Excuse	23	SL	Smile/Laugh
9	HM	Humour	24	DG	Disagree
10	MR	Mind Read	25	IN	Interrupt
11	NS	Negative Solution	26	NC	Noncompliance
12	PD	Problem Description	27	NO	Normative
13	PR	Paraphrase/Reflect	28	NR	No Response
14	PS	Problem Solving	29	NT	Not Tracking
15	PU	Put Down	30	TO	Turn Off

Level 1 - Problem Solving (AR CS PR PS)

Level 2 - Positive Verbal (AG AP HM)

Level 3 - Positive Non-Verbal (AS AT SL PP)

Level 4 - Negative Verbal (CP CR DR EX MR PU)

Level 5 - Negative Non-Verbal (NR NT TO)

Pearson Product-Moment Correlation Coefficients
Among MICS Items and MICS Levels

Levels	1	2	3	2+3	1+2+3	4	5	4+5
Items								
1 (AP)	.16	.44**	.04	.13	.16	-.05	-.15	-.13
2 (AR)	.17	-.07	.20	.16	.19	-.01	.16	.10
3 (CM)	-.18	-.19	.00	-.05	-.09	.12	-.08	.02
4 (CP)	-.03	-.22	.02	-.04	-.03	.88**	.15	.66**
5 (CR)	-.08	-.10	-.03	-.04	-.06	.78**	.11	.56**
6 (CS)	.23	-.15	.24	.19	.22	.38**	.00	.23
7 (DR)	.05	-.01	.34**	.31*	.29*	.34**	-.09	.15
8 (EX)	.23	-.15	.24	.19	.23	.38**	.00	.23
9 (HM)	.01	.00	.21	.20	.18	-.14	-.18	-.22
10 (MR)	.06	-.16	.01	-.05	-.06	.65**	.04	.43*
11 (NS)	-.19	-.18	.01	-.03	-.07	-.10	-.01	-.07
12 (PD)	-.09	.18	.37**	.38*	.31*	-.24	-.06	-.19
13 (PR)	.43**	.22	.14	.18	.26*	-.08	-.07	-.11
14 (PS)	.96**	.29*	.26*	.30*	.51**	-.04	-.09	.04
15 (PU)	-.07	-.15	.02	-.01	-.03	.78**	.13	.58**
16 (QU)	-.04	.08	.20	.20	.17	.02	.21	.16
17 (TA)	.33**	-.24	.24	.17	.23	.37**	.31*	.45**
18 (AG)	.25*	.95**	.27*	.45**	.46**	-.16	-.16	-.22
19 (AS)	.28*	.36**	.35**	.40**	.43**	-.18	.07	-.06
20 (AT)	.33**	.21	.93**	.90**	.88**	.20	-.30*	-.09
21 (CO)	.00	-.14	.00	-.03	-.03	.46**	.32*	.51**
22 (PP)	.00	.00	.00	.00	.00	.00	.00	.00
23 (SL)	-.06	.13	.64**	.62**	.53**	-.08	-.08	-.10
24 (DG)	.04	-.05	.33*	.30*	.27*	.35**	.10	.29*
25 (IN)	.08	.25*	.38**	.40**	.38**	-.08	-.18	-.18
26 (NC)	-.01	.14	-.05	-.02	-.02	-.07	-.07	-.09
27 (NO)	.00	.00	.00	.00	.00	.00	.00	.00
28 (NR)	.01	.05	.09	.09	.09	.00	.25*	.18
29 (NT)	.11	-.22	-.28*	-.30*	-.24	.05	.99**	.74**
30 (TO)	-.17	-.14	-.12	-.14	-.17	.67**	.15	.53**

* $p < .05$

** $p < .01$

significantly correlated with: Problem Solving, Agree, Assent, Approval, and Interrupt. Level 3, "Positive Non-Verbal", according to Hops et.al. (1971) consisted of Assent, Attend, Smile/Laugh, and Positive Physical Contact responses. In the present study Level 3 was positively correlated with Deny Responsibility, Problem Description, Problem Solving, Agree, Assent, Attend, Smile/Laugh, Disagree, and Interrupt, and negatively with Not Tracking. The total Level 2 plus Level 3 responses correlated positively with: Deny Responsibility Problem Description, Problem Solving, Agree, Assent, Attend, Smile/Laugh, Disagree, Interrupt and negatively with Not Tracking. The total of Level 1, 2 and 3 responses correlated with all of the preceding positively correlated responses plus Paraphrase/Reflect. Hops et. al. (1971), presented Level 4 responses, referred to as "Negative Verbal", as consisting of the following: Complaint, Criticize, Deny Responsibility, Excuse, Mind Read, and Put Down. Level 4 in the present investigation correlated positively with: Complaint, Criticize, Compromise, Deny Responsibility, Excuse, Mind Read, Put Down, Talk, Compliance, Disagree and Turn Off. Finally, Hops, et. al. (1971), presented Level 5, "Negative Non-Verbal" responses, as consisting of: No Response, Not Tracking, and Turn Off. In the present study, Level 5 correlated positively with Talk, Compliance, No Response, and Not Tracking, and negatively with Attend.

Levels 4 and 5 correlated positively with Complaint, Criticize, Mind Read, Put Down, Compliance, Disagree, Not Tracking, and Turn Off. Thus, to a large degree, the present study substantiated the Levels as they were created, however, some additional codes correlated with the Levels. Group means on the Levels and each of the 30 MICS codes are presented in Table 9. The correlations between the Levels are found in Table 7. As can be seen, the Positive and Negative levels are distinct from each other.

Levels of MICS and Subjective Scales The correlations between each of the Levels of the MICS and the subjective scales are presented in Table 8. Of particular interest to the present study is the relationship between the Levels of the MICS and the behaviours recorded on the SOC. Interestingly, it can be seen that the number of Pleasing behaviours on the SOC is significantly correlated positively with Levels 3, 2 + 3, and 1 + 2 + 3 and negatively with Levels 4 and 4 + 5. A significant positive correlation was obtained between Level 1 (Problem Solving) and the number of Displeasing Behaviours received. It was found that Problem Solving (Level 1) was also significantly positively correlated with the following displeasing behaviours: Consideration, Communication process, Coupling Activities, Household Management, and Financial Decision Making. Once again, these are behaviours that spouses reported as having occurred and that were experienced as

Table 7
Pearson Product-Moment Correlations
Among Levels of the MICS

	Levels					
	2	3	2+3	1+2+3	4	5
Level 2	.27*					
Level 3	.31*	.28*				
Level 2 + 3	.34**	.47**	.98**			
Level 1 + 2 + 3	.55**	.49**	.94**	.97**		
Level 4	-.01	-.20	.11	.06	.05	
Level 5	.10	-.22	-.27*	-.29*	-.24	.11
Level 4 + 5	.06	-.29*	-.12	-.17	-.14	.70** .78**

* $p < .05$

** $p < .01$

Note: Level 1 - Problem Solving (AR CS PR PS)

Level 2 - Positive Verbal (AG AP HM)

Level 3 - Positive Non Verbal

(AS AT AL PP)

Level 4 - Negative Verbal (CP CR DR EX MR PU)

Level 5 - Negative Non-Verbal (NR NT TO)

Pearson Product-Moment Correlation Coefficients
Among Levels of MICS and Subjective Scales

Subjective Scales	Levels							
	1	2	3	2+3	1+2+3	4	5	4+5
Sex	-.17	-.07	-.21	-.20	-.22	.27*	.07	.22
Age	-.01	-.25*	-.21	-.25*	-.22	-.21*	.12	-.05
Yrs Sch	-.02	-.20	-.21	-.24	-.23	.01	.16	.12
SES	.27*	-.14	-.01	-.03	.04	.05	.01	.04
Inc	.21	-.24	.13	.07	.11	-.19	-.01	-.03
YrsMar	-.18	-.30*	-.13	-.19	-.21	-.06	.15	.07
NoChil	-.05	-.35*	-.08	-.15	-.14	.12	.09	.14
MSI	-.08	.09	.08	.10	.06	.36**	.08	.29*
Deci	-.15	-.05	-.18	-.17	-.19	-.03	.18	.12
Msat	.09	.02	-.22	-.20	-.15	.08	.16	.17
Com	-.16	.05	-.03	-.02	-.06	-.12	-.27*	-.27*
SexSat	.22	.17	.02	.06	.11	-.07	.00	-.05
ChMan	.04	.30*	-.26*	-.19	-.16	.07	.07	.10
Opt	-.04	.09	-.01	.01	-.01	-.27*	-.32**	-.40**
DAS	-.12	.01	.10	.09	.05	-.28*	-.17	-.30*
DCoh	-.16	-.02	.10	.09	.04	-.20	-.15	-.24
AEx	.03	-.02	.09	.07	.07	-.06	.08	.02
DSat	-.03	-.03	.02	-.1	.00	-.30*	-.01	-.19
DCoh	-.08	.11	.08	.10	.07	-.22	-.28*	-.34**
AC	.11	.04	-.32*	-.28*	-.23	.00	-.03	-.02
MAI	.04	.23	-.09	-.03	-.02	-.42**	-.14	-.36**
CMAI	.04	.13	-.19	-.15	-.12	-.19	-.19	-.26*
HapHR	-.19	.06	.32*	.30*	.22	-.18	-.13	-.21
HapChil	-.13	.04	.21	.21	.15	-.34**	-.03	-.24
HapSA	-.21	.04	.24	.23	.15	.02	-.19	-.15
HMon	-.19	.05	.16	.15	.09	.03	-.16	-.13
HCom	-.17	.10	.21	.21	.15	-.26*	-.16	-.28*
HSex	-.33**	-.07	.28*	.24	.13	.05	-.27*	-.16
HAC	.07	.10	.20	.21	.20	.05	-.16	-.08
HPI	-.03	-.06	.15	.12	.10	.12	.09	.14
HSI	.10	.11	.25*	.25*	.25*	.00	-.14	-.10
HGen	-.12	.01	.22	.20	.15	-.18	-.27*	-.30*
Please	-.02	.20	.32*	.33**	.29*	-.26*	-.19	-.30
Disp.	.35**	.16	.05	.08	.16	.14	-.04	.06
TimTo	.10	.29*	.05	.11	.12	-.23	-.22	-.31*
Satis	-.14	.04	.12	.11	.07	-.32*	-.34**	-.45**
Thots	-.07	-.12	-.02	-.04	-.06	-.18	-.14	-.22

* $p < .05$ ** $p < .01$

Table 8 (cont'd)

Subjective Scales	Levels							
	1	2	3	2+3	1+2+3	4	5	4+5
IP	.04	.28*	.09	.14	.14	-.18	-.10	-.18
IIP	.02	.22	.12	.16	.14	-.17	-.27*	-.30*
IIIP	.05	.19	.32*	.33**	.31*	-.24	-.08	-.20
IIID	.35*	.22	.02	.06	.14	.10	.02	.08
IVP	-.06	.07	.21	.21	.17	-.22	-.29*	-.34**
IVD	.04	.11	-.27*	-.23	-.19	-.09	.03	.03
VP	.17	.15	.24	.25	.27*	-.13	.12	.17
VD	.39**	.20	.09	.13	.21	.12	.00	.07
VIP	.19	.10	-.01	.01	.06	-.21	-.01	-.14
VID	.34**	-.10	.04	.02	.10	.20	.21	.28*
VIIP	-.15	-.06	.22	.19	.13	.05	-.02	.02
VIID	.17	.04	.20	.19	.21	.11	.11	.15
VIIIP	-.08	-.02	.19	.17	.13	-.22	-.13	-.24
VIIID	.40**	.11	.10	.12	.20	-.02	-.20	-.15
IXP	-.05	.23	-.14	-.08	-.08	-.10	.15	.04
IXD	.44**	.13	.12	.14	.23	-.07	.00	-.05
XP	.11	.28*	.01	.07	.09	-.12	-.02	-.09
XD	.17	-.03	.10	.08	.12	.06	.04	.06
XIP	-.17	.03	.14	.13	.08	-.21	-.01	-.13
XID	.02	.00	-.01	-.01	.00	.23	-.17	.03
XIIP	-.17	-.03	.10	.08	.03	.11	.14	.17
XIID	.18	.09	-.05	-.02	.02	.03	.01	.03

* $p < .05$ ** $p < .01$

Mean Scores and F Values of Marital Measures
at Pre and Post Test

Variable	Commun 1		Commun 2		Contract		Control		F	F
	Pre	Post	Pre	Post	Pre	Post	Pre	Post	(ANCOVA)	(Change Score)
Deci (R)	8.6	7.0	7.6	5.3	6.7	6.3	6.6	6.5	.64	.89
MarSat (R)	34.3	29.8	33.1	30.4	36.1	33.6	29.8	30.0	.76	.68
Commun	32.1	33.2	34.8	37.8	30.5	31.6	37.8	39.0	1.27	.36
SexSat (R)	17.7	17.9	17.6	17.4	15.3	14.0	14.8	13.7	1.51	.44
Child (R)	16.2	14.3	11.0	10.8	13.2	14.2	11.5	10.7	1.78	1.57
Optim	68.1	71.4	70.1	71.8	66.4	70.5	73.3	74.3	.01	.14
DAS	88.0	92.7	96.6	99.2	89.7	89.9	102.0	102.2	.64	.81
D.Con.	41.4	42.8	42.2	43.3	39.6	39.3	47.3	48.2	.49	.34
A.E.	5.8	6.8	5.4	6.1	6.3	6.4	6.9	6.9	.41	.76
D.Sat.	30.1	31.4	35.1	35.7	32.7	31.5	34.3	34.7	.97	.99
D.Coh.	10.7	11.7	13.8	14.1	11.7	12.7	13.0	12.4	.64	.88
A.D. (R)	8.4	7.6	5.8	6.5	7.9	7.6	7.6	6.0+	1.07	1.30
MAI	38.0	46.5	37.6	42.3	37.2	26.7	46.4	47.0	1.71	1.62
CMAI (R)	40.0	32.4	29.0	16.5	21.7	19.6	43.5	35.3+	1.43	.50
HapHR	6.6	6.7	7.1	6.5	6.6	6.7	7.8	7.6	.96	.50
HapChil	6.3	7.5	6.9	6.9	6.5	6.9	8.1	7.8	.25	.74
HapSA	6.4	6.3	6.8	6.9	5.9	6.3	7.4	7.1	.31	.91

(R) = Scale is reversed

* $p < .05$
** $p < .01$
+++ $p < .001$

Correlated t
+ $p < .05$
++ $p < .01$
+++ $p < .001$

Table 9 (cont'd)

Variable	Commun 1		Commun 2		Contract		Control		F (ANCOVA)	F (Change Scores)
	Pre	Post	Pre	Post	Pre	Post	Pre	Post		
HapMon	7.4	6.9	6.4	6.1	6.7	6.5	7.7	7.5	.35	.11
HapComm	6.3	6.1	6.4	5.9	5.8	6.1+	7.5	6.1	.61	1.11
HapSex	5.1	5.8	5.8	5.4	5.7	6.4+	7.1	6.6	1.11	1.94
HapAC	6.8	5.8+	6.6	6.0	5.9	6.0	6.8	6.8	1.71	1.50
HapPI	7.0	6.1	6.9	6.7	6.9	6.6	7.8	7.7	1.21	.54
HapSI	7.4	6.4+	7.0	6.7	6.1	6.4	7.8	7.5	1.76	2.16
HapGen	6.5	6.6	6.9	6.3	6.3	6.6	7.5	6.9+	.92	
Please	22.1	24.8	33.2	21.6+++	22.3	14.9	30.0	27.4	2.21	2.67
Displse	6.8	5.4	4.4	2.8+	4.3	2.8+	1.8	2.1	.64	1.13
TimTO	5.4	10.1+	4.0	6.2+	7.1	7.4	6.8	7.9+	2.35	2.98*
Satis	6.1	6.6	5.5	5.9	5.7	6.1	6.7	6.3	.41	.91
Thots	1.9	1.5	1.4	2.0	2.2	4.7	4.5	2.5		
Level 1	1.4	.8	1.1	1.3	.8	1.4	.5	.6	3.10*	2.51
Level 2	1.5	1.0	1.0	.7	.6	1.0+	.7	.9	.57	2.97*
Level 3	7.6	6.1	8.0	7.4	5.9	7.8	5.2	6.0	2.75	4.27*
Level 2+3	9.0	7.1+	9.1	8.1	6.5	8.8	5.8	6.9	2.52	5.58**
Level 1+2+3	10.4	7.9+	10.2	9.4	7.3	10.2+	6.4	7.4	2.89*	5.88**
Level 4	.2	.1	1.3	.5+	.7	.5	.1	.3	1.20	3.79*
Level 5	.3	.3	.3	.4	1.2	1.3	.3	.9	1.05	.31
Level 4+5	.5	.4	1.6	.8	1.9	1.8	.4	1.1	1.46	1.74

Variable	Commun 1		Commun 2		Contract		Control		F	F
	Pre	Post	Pre	Post	Pre	Post	Pre	Post	(ANCOVA)	(Change Scores)
AP	.07	.09	.04	.04	.02	0.0	0.0	.08	2.0	1.25
AR	.07	.07	.15	.11	.05	.02	.11	.13	1.37	.17
CM	0.00	0.00	.02	0.00	.04	0.00	.03	.01	1.43	1.05
CP	0.00	0.00	.21	.02	.21	.01	0.00	0.00	.26	2.57
CR	.04	0.00	.27	.03	.14	.06	0.00	.05	1.55	3.06*
CS	0.00	0.00	.05	0.00	0.00	0.00	0.00	0.00	0.00	1.22
DR	.03	.01	.19	.15	.08	.17	0.00	.12	.97	1.24
EX	0.00	0.00	.13	0.00	0.00	0.00	0.00	.01	.91	1.27
HM	.02	.01	.12	.05	.07	.07	.02	.05	.60	1.05
MR	.10	.07	.23	.11	.19	.09	.08	.07	.04	.70
NS	0.00	.01	0.00	.03	0.00	.02	.05	.03	.30	.65
PD	.01	.07	3.09	3.55	3.21	4.41+	4.11	4.63	1.76	2.09
PR	.06	.20	0.00	.03	0.00	.07	0.00	0.00	2.84*	.74
PS	1.24	.53+	.94	1.13	.73	1.08	.43	.43	2.80	2.96*
PU	0.00	0.00	.24	.17	.14	.09	.02	.03	.07	.29
QU	.61	.68	.82	.75	.60	.88	.59	.91	.26	.42
TA	.02	.16	.16	.09	.08	.05	.05	.03	1.43	1.84
AG	1.29	.95	.89	.63	.47	.75	.64	.74	.23	1.50
AS	.40	.27	.89	.38	.28	.13	.34	.48	2.16	1.78

Variable	Commun 1		Commun 2		Contract		Control		F (ANCOVA)	F (Change Score)
	Pre	Post	Pre	Post	Pre	Post	Pre	Post		
AT	6.35	5.40	7.06	6.32	5.20	6.08	4.70	5.18	.98	2.24
CO	0.00	0.00	.02	0.00	.03	0.00	.02	.03	1.03	1.12
PP	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
SL	.56	.43	.57	.43	.43	.54	.15	.33	.20	.53
DG	.31	.12	.52	.50	.43	.38	.09	.19	2.15	.62
IN	2.29	1.48++	1.04	.84	1.36	1.72+	1.85	1.02+	5.23**	6.58***
NC	0.00	0.00	.02	0.00	0.00	0.00	0.00	0.00	0.00	1.22
NO	0.00	.02	0.00	0.00	0.00	0.00	0.00	.02	0.00	.61
NR	0.00	0.00	.05	.02	.03	.02	0.00	.09	1.95	2.11
NT	.30	.28	.18	.33	1.11	1.14	.35	.79	.92	.22
TO	0.00	0.00	.05	.01	.03	.01	.02	0.00	.44	.43

displeasing. Some examples of displeasing "Consideration" behaviours would include, "Spouse said something unkind to me" or "Spouse criticized my body". Level 2 (Positive Verbal) responses were positively correlated with pleasing Companionship and Employment-Education behaviours received. Positive Non-Verbal responses were correlated positively with Consideration pleases and negatively correlated with Sexual Displeasing behaviours. The total Level 2 plus 3 responses were positively correlated with pleasing Consideration and Communication behaviours received, as was the total of Levels 1, 2 and 3. Level 5 (Negative Non-Verbal) responses were negatively correlated with pleasing Affection and Sex behaviours received. The total Negative responses (Levels 4 and 5) were correlated negatively with the number of pleasing Affection and Sex behaviours received and positively with the number of displeasing Coupling Activities.

TREATMENT EFFECTS

In order to examine differences among the treatment groups, analyses of covariance were carried out on the post-test scores. In these analyses, pretest scores were used as the covariates and post hoc procedures included Scheffe Simultaneous Confidence Intervals (F), Newman-Keuls (q), Tukey (q), and Duncan's Multiple Range Test (qr). In order to examine changes within groups (pre-post changes) correlated t tests were carried out. An analysis of change

scores or gain scores was also carried out through one way analyses of variance between groups on these pre-test-posttest differences. The scores are summarized in Table 9. A summary of all ANOVAS and ANCOVAS that were significant can be found in Appendices N to P.

Communications Group 1

On the MICS it was found that Communications Group 1 couples decreased significantly from pretest to posttest in their total number of positive verbal plus non-verbal responses (Level 2 + 3), $t(11) = 2.60, p < .05$. Also, these couples significantly decreased in the number of Level 1 + 2 + 3 responses (positive verbal, positive non-verbal and problem solving combined) from the pretest to the posttest, $t(11) = 2.69, p < .05$. Upon examination of the individual items of the MICS it was found that these subjects significantly decreased in the number of positive solutions they gave from pretest to posttest, $t(11) = 2.21, p < .05$. These subjects also significantly decreased in the number of interruptions made from pretest to posttest, $t(11) = 3.35, p < .05$.

The subjective scales were then analysed for differences before and after treatment. Significant differences were found on the Happiness Scale. These subjects reported lower General Happiness scores at the third treatment week compared with the first treatment week, $t(11) = 2.28, p < .05$. It was found that General Happiness was still lower

3 weeks following treatment, $t(11) = 2.30, p < .05$, and 4 weeks following treatment, $t(11) = 2.70, p < .05$, compared with the first week of treatment. The other items of the Happiness Scale were examined at pretest and posttest. Pre-Post test analysis revealed that Communications Group 1 couples significantly decreased in their happiness with academic-employment aspects of their relationship, $t(11) = 2.37, p < .05$, and with their spouse's independence, $t(11) = 2.51, p < .05$.

The Spouse Observation Checklist revealed one difference in these subjects before and after treatment. The only difference found was that these subjects spent more time together at the end of treatment than before, $t(8) = -2.93, p < .05$.

Communications Group 2

These subjects, it will be remembered, received the same treatment as the previous group, but were posttested six weeks following the last treatment session. Upon examining within group effects, it was found that Communications Group 2 subjects significantly decreased in their rate of negative verbal (Level 4) responses, $t(9) = 3.07, p < .05$ from pretest to posttest. These subjects also significantly decreased their rate of total negative responses (Level 4 + 5), $t(9) = 2.32, p < .05$, from pre to posttest. Upon examining the Spouse Observation Checklist it was found that Communications Group 2 subjects spent

more time together at six weeks after treatment terminated than at pre-test, $t(4) = -2.82, p < .05$. Also, these subjects decreased in the total number of pleasing behaviours received from pretesting to 6 weeks after the end of treatment, $t(7) = 5.86, p < .001$. They also decreased in the total number of displeasing behaviours received, $t(7) = 2.41, p < .05$.

These couples showed no significant differences in their General Happiness nor in any of the items of the Happiness Scale.

Contracting Group

These subjects, like the Communications Group 1 couples, were assessed one week following treatment. A summary of the Contracts made by these couples can be found in Appendix Q. On the MICS, it was found that Contracting subject gave more positive verbal responses (Level 2) after training compared to pre-training, $t(11) = 2.55, p < .05$. Pre-post test differences also revealed that increases of Positive Non-Verbal response (Level 3) approached significance, $t(11) = -1.98, p = .07$. Significant increases from pre to posttest were found in the total of Level 1 + 2 + 3 responses, $t(11) = -2.29, p < .05$. Upon examining individual items of the MICS it was found that Contracting subjects significantly increased in the number of problem description statements they made following treatment, $t(11) = -2.80, p < .05$. They also increased in the number of interruptions made at

posttest, $t(11) = -2.24, p < .05$.

When subjective scales were examined it was found that during the second week of treatment, $t(11) = -2.33, p < .05$, the two weeks after treatment, $t(6) = -2.61, p < .05$, and three weeks following treatment, $t(4) = -2.84, p < .05$ the Contracting Group reported themselves to be more happy in their marriage compared with the pretest scores. Also, these couples were generally happier with their marriage two weeks after treatment, $t(6) = -3.34, p < .05$, and three weeks after treatment, $t(4) = -3.16, p < .05$, than they were during the final (fourth) week of treatment. Interestingly enough, pre-post test analysis revealed that Contracting couples significantly increased in their reported happiness with communications, $t(9) = -3.16, p < .05$, and with how happy they were with sex, $t(9) = -2.86, p < .05$.

On the Spouse Observation Checklist Contracting couples decreased in their total displeasing behaviours received from pre to posttest, $t(7) = 2.74, p < .05$.

Control Group

The Control Group couples were post-tested with the MICS at the same time as Communications 1 and Contracting couples, that is, 5 weeks after pretesting. The only significant pre-posttest difference on the MICS for these subjects was a decrease in their number of interruptions $t(11) = 2.71, p < .05$.

These couples continued filling out the Happiness Scales up to 11 weeks after the pretest. On the General Happiness measure it was found that Control couples were less happy 3 weeks after pre-testing, $t(11) = 2.96$, $p < .05$, 4 weeks after pre-testing, $t(11) = 2.48$, $p < .05$, 6 weeks following pre-test, $t(11) = 2.27$, $p < .05$, and 8 weeks after pre-testing, $t(11) = 2.75$, $p < .05$, compared with the pre-test week. Other differences occurred between weeks 2 and 9 with these couples less happy 8 weeks after the pretest compared with one week following pre-test, $t(11) = 2.21$, $p < .05$.

The Spouse Observation Checklist revealed that after 5 weeks of self-monitoring for Happiness, Control subjects spent more time together than at pre-test, $t(10) = 2.63$, $p < .05$.

On the Areas of Change Scale it was found that Control couples requested fewer changes of their spouse after 5 weeks of self-monitoring on the Happiness Scale, $t(11) = 2.41$, $p < .05$. The Marital Activities Inventory, it will be remembered, was re-administered 11 weeks after the pretest, as it sampled a greater time period than the other measures. There was a significant difference in the amount of change requested by Control couples 11 weeks after the pretest on the Marital Activities Inventory, $t(11) = 2.38$, $p < .05$ with these couples requesting less change in their spouse at the eleventh week.

Between Groups

A series of one way analyses of covariance (pretest scores serving as the covariate) were carried out on all of the measures. Also, one way analyses of variance on the change scores were carried out between the groups. A summary of these analyses are presented in Table 9.

The Levels of the MICS were the first measure to be examined. Upon examining positive responses, it was found that there was a significant main effect for Groups in Level 1, i.e., problem solving behaviours, $F(3, 41) = 3.10, p < .05$. Post hoc analyses with Newman-Keuls ($q = 3.79, p < .05$) Confidence Intervals for simple contrasts of means revealed that Contracting couples displayed more problem solving statements than Control couples. A one way analysis of variance on change scores (post - pre) revealed that generally, Contracting subjects came up with more problem solutions compared with Communications Group 1 couples, who tended to give less problem solutions after treatment, $F(3, 42) = 2.51, p < .07$, Tukey, $q = 3.78, p < .05$.

When Level 2 (Positive Verbal) responses were examined, it was found (ANCOVA) that there were no significant differences between the groups, $F(3, 41) = 1.46, n.s.$ However, a one way analysis of variance on change scores revealed differences in the amount of change between groups, $F(3, 42) = 2.97, p < .05$. Contracting couples gave significantly more positive verbal responses at posttest

than either Communications 1 and 2 couples (Duncan, $q_r = 3.0, 3.10, p < .05$).

When Level 3 responses were examined (Positive Non-verbal) by ANCOVA no significant differences were found between the Groups, $F(3, 41) = 2.75, p < .055$. A one way analysis of change scores, however, revealed differences in the amount of change made between groups, $F(3, 42) = 4.27, p = .01$. A post hoc test (Scheffe $F, 4.12, p < .05$) revealed that Contracting couples increased more in positive non-verbal responses than Communication Group 1 couples. Pre-post test differences revealed that the increase by Contracting couples approached significance, $t(11) = -1.98, p = .07$.

It was found that the total positive verbal plus non-verbal responses did not show significant differences overall between Groups (ANCOVA), $F(3, 41) = 2.52, p = .07$, however, there was a significant difference in change scores between Groups, $F(3, 42) = 5.58, p < .005$. Contracting couples increased more in their total positive responses than did Communications Group 1 and 2 couples (Tukey $q, = 3.78, p < .05$).

An ANCOVA on Level 1 + 2 + 3 responses (problem solving, positive verbal and non-verbal) revealed significant differences among the groups, $F(3, 41) = 2.89, p < .05$. A post hoc analysis (Newman-Keuls, $q = 3.43, 3.78, p < .05$), revealed that Contracting couples gave more of these responses

than Communications 2 and 1 couples. Communication 1 couples (Newman-Keuls, $q = 3.43$, $p < .05$), gave fewer Level 1 + 2 + 3 verbalizations than Control couples. An analysis of change scores showed significant differences among the groups, $F(3, 42) = 5.88$, $p < .005$. It was found that Contracting and Control couples increased in problem solving plus total positive responses more than Communications 1 couples, and Contracting couples went up in Level 1 + 2 + 3 responses more than Communications 2 couples (Newman-Keuls, $q = 3.78$, 3.43 , $p < .05$).

Negative Verbal (Level 4) responses were then analysed through ANCOVA and yielded no significant differences among groups, $F(3, 41) = 1.20$, n.s. However, analysis of change scores did reveal some differences between the groups, $F(3, 42) = 3.79$, $p < .05$. It was found that Communications 2 couples gave less negative verbal responses than did Control couples (Newman-Keuls, $q = 3.78$, $p < .05$).

One way analysis of covariance found no difference among groups in the rate of negative non-verbal responses, $F(3, 41) = 1.05$, n.s. Change score analysis also found no significant differences on this response.

There were no differences in the total negative responses between groups, $F(3, 41) = 1.46$, n.s. Change scores analysis also revealed no significant differences, $F(3, 42) = 1.74$, n.s.

The individual items of the MICS were then examined in

order to find out if any specific changes occurred between treatment groups. (Only those items of the MICS that showed significant differences in the one way ANCOVA or change score analysis are discussed.)

While there were no pretest differences on MICS 5 (criticize), after treatment Communications 2 couples criticized less than Controls, $F(3, 32) = 3.06, p < .05$ (Scheffe, $F = 4.12, p < .05$). There were no significant differences found in change scores on MICS 12 (problem description), $F(3, 42) = 2.09, n.s.$, however, Duncan's procedure ($qr = 3.10, p < .05$) showed more problem description with Contracting compared to Communications 1 couples following treatment.

On MICS 13 (paraphrase/reflect) there were found to be significant differences among the groups with an ANCOVA, $F(3, 41) = 2.84, p < .05$. Post hoc analysis revealed (Newman-Keuls statistic, $q = 3.78, p < .05$) that Communications 1 couples gave more paraphrase/reflect statements than Control Couples.

An analysis of the number of positive solutions (MICS 14) approached significance by ANCOVA, $F(3, 41) = 1.57, p = .052$. An analysis of change scores found significant differences among the Groups, $F(3, 42) = 2.96, p < .05$. Communications 2 and Contracting couples gave more positive solutions from pre-post differences than Communications 1 couples (Duncan, $qr = 3.0, 3.10, p < .05$).

There were significant differences in the number of interruptions (MICS 25) made between groups following treatment (ANCOVA), $F(3, 41) = 5.23, p < .005$. A post hoc analysis (Newman-Keuls, $q = 3.79, p < .05$) revealed that the number of interruptions were higher in Contracting than in either Control, Communications 1 and Communications 2 couples. An examination of change scores also revealed significant differences, $F(3, 42) = 6.58, p < .001$. Post hoc analysis (Schéffe, $F = 4.12, p < .05$) showed that Contracting couples increased significantly in the number of interruptions made compared to Control and Communications 1 couples.

While the analysis of variance for MICS 28 (No response) did not reach significance (change scores), $F(3, 42) = 2.11, n.s.$, Duncan's $qr = 3.10, (p < .05)$ showed an increase of "no responses" for Control couples compared to Communication 2 couples.

The Spouse Observation Checklist (SOC) revealed no significant differences in Pleases, Displeases, amount of time together, satisfaction, and pleasant thoughts about spouse when analysed with ANCOVAS. However, there was a significant difference in the change between groups in the amount of time couples spent together, $F(3, 27) = 2.98, p < .05$. It was found (Duncan, $qr = 3.10, p < .05$) that Communications 1 couples increased in time together more than Control and Contracting couples. Once again, the means for these

measures are presented in Table 9.

General happiness was monitored by couples throughout the treatment program and for at least 4 weeks following treatment. A graph of happiness ratings over time is presented in Figure 1. Analysis of covariance at various weeks throughout treatment, using the pretest week as a covariate, found significant differences between groups at the second treatment week and at two weeks after treatment ended. At the second week of treatment (with all subjects included in the analysis) it was found, $F(3, 41) = 3.35$, $p < .05$, that Contracting couples were more happy than Communications 1 and Communications 2 couples (Newman-Keuls, $q = 3.79$, $p < .05$). Two weeks after treatment ended (with a reduced number of subjects per cell due to missing data), it was found, $F(3, 34) = 3.90$, $p < .05$, that Contracting couples were happier with their relationship than Control and Communications 2 couples (Newman-Keuls, $q = 3.79$, $p < .05$). No significant differences were found among the groups on any of the other items of the happiness scales.

Couples' Evaluation of Treatment Program and Leaders

The mean scores for the treatment program and leader evaluation scales are presented in Table 10. Each of the items on the program evaluation questionnaire were subjected to t-test analyses in order to examine whether there were any differences between the leaders of the two treatment modalities. There were no significant differences in the

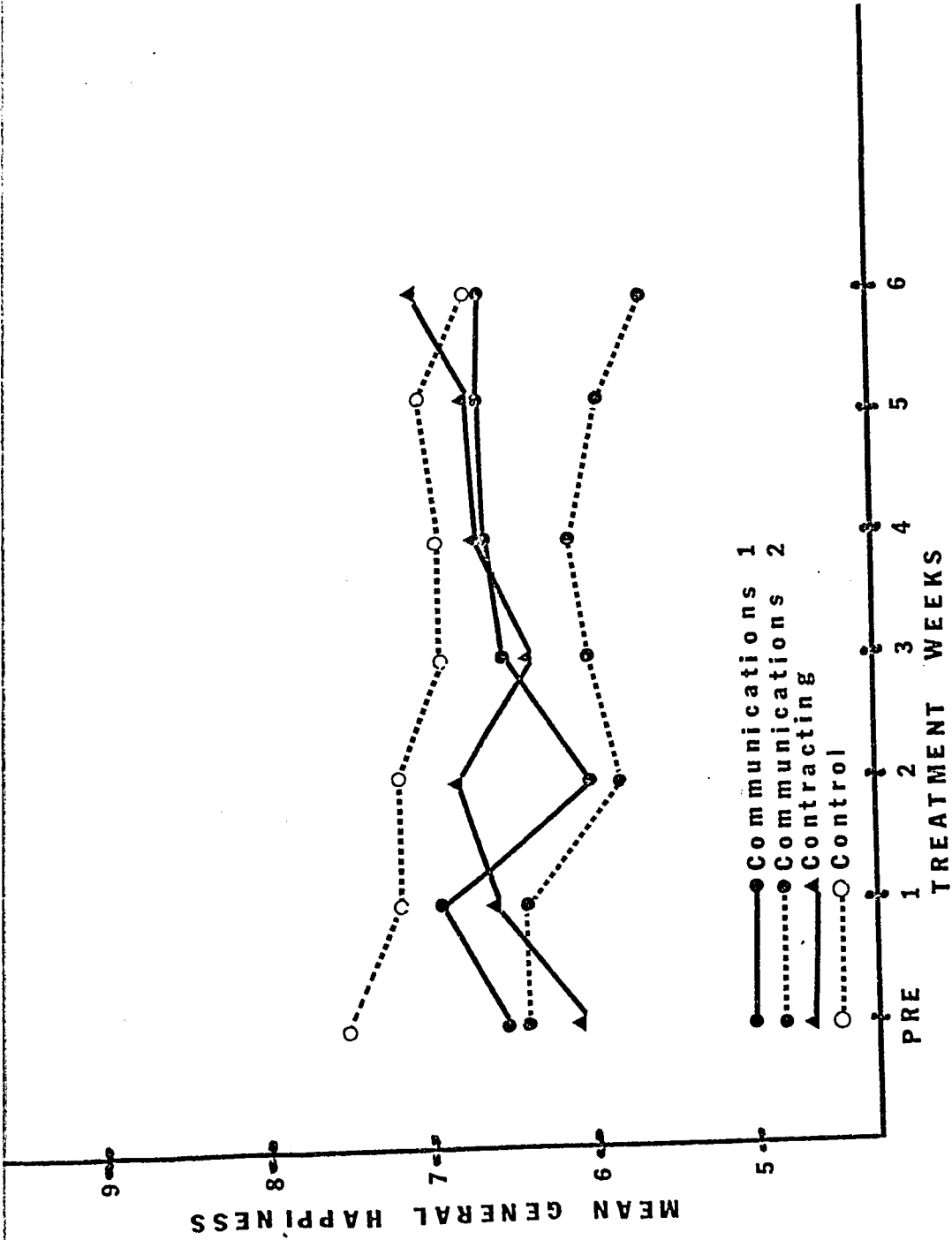


FIGURE 1

Mean Scores on General Happiness Over Time (Weeks) For Couples in Each of the Four Groups

Table 10
 Mean Scores and t Values of Couple Evaluations
 of Treatment Group Leaders

Measure	Scale	Communications Group	Contracting Group	<u>t</u>	P
Enjoyment of program	1 - 7	5.00	4.00	3.86	.06
Reported benefit of program	1 - 7	4.82	3.78	5.44*	.03
Helpfulness: Self-monitoring	1 - 7	4.32	3.44	1.94	.17
Helpfulness: Weekly meeting	1 - 7	5.41	4.67	3.06	.09
Helpfulness: Homework	1 - 7	4.64	3.56	7.92	.009
Leader Evaluation:					
Enthusiasm	1 - 5	4.41	3.22	9.71	.004
Ideas expressed clearly	1 - 5	4.00	4.22	.31	.58
Interested	1 - 5	4.55	3.89	4.89*	.04
Warm	1 - 5	4.41	3.33	11.10**	.002
Democratic	1 - 5	4.14	4.11	.005	.94
Approachable	1 - 5	4.45	4.11	1.19	.28
Spoke too much	1 - 5	3.14	2.33	4.18*	.05
Made me feel at ease	1 - 5	4.45	4.00	1.97	.17

amount that couples claimed to have enjoyed the program. Couples in the Communications 1 and 2 Groups believed that they benefitted more from the treatment, $t(30) = 5.44$, $p < .05$, than the Contracting couples. There were no differences in how helpful they believed the self-monitoring or weekly meetings were, however, Communications 1 and 2 couples found their homework more helpful, $t(30) = 7.92$, $p < .005$, than Contracting Couples did.

The leader variables were then examined. There were no differences found between the clearness, democraticness, approachability, or at-easeness of the two leaders. However, the leader of the Communications treatment was rated as more interesting, $t(30) = 4.89$, $p < .05$, warmer, $t(30) = 11.10$, $p < .005$, and as tending to speak more, $t(30) = 4.18$, $p < .05$, compared with the leader of the Contracting Group.

A series of correlations were carried out between change scores in the Marital Interaction Coding System Levels and evaluations of the leader. It was found that enjoyment of the program was negatively correlated with change in Level 1 (problem solving), $r = -.35$, $p < .05$, and Level 5 (negative non-verbal), $r = -.32$, $p < .05$, responses. The amount of helpfulness couples reported the self-monitoring to be was positively correlated with the change in Level 1 + 2 + 3 (problem solving plus positive verbal plus positive non-verbal), $r = .31$, $p < .05$. The reported help-

fulness of the meetings was negatively correlated with the change in problem solving responses, $\underline{r} = -.30$, $\underline{p} < .05$.

The rated enthusiasm and warmth of the leader was negatively correlated with change in Level 3 (positive non-verbal), $\underline{r} = -.39$, $\underline{r} = -.31$, $\underline{p} < .05$, Level 2 + 3 (Positive verbal plus non-verbal), $\underline{r} = -.55$, $\underline{r} = -.34$, $\underline{p} < .05$, and Level 1 + 2 + 3 (problem solving plus positive verbal plus non-verbal), $\underline{r} = -.58$, $\underline{p} < .001$, $\underline{r} = -.31$, $\underline{p} < .05$. The clarity of the leader was negatively correlated with total negative responses, $\underline{r} = -.30$, $\underline{p} = .05$, i.e., the less clear the leader, the more negative responses, and the more democratic the leader, the less the increase in negative verbal responses, $\underline{r} = -.30$, $\underline{p} = .05$. Finally, the more at ease the leader, the less the increase of Level 5 (negative non-verbal), $\underline{r} = -.34$, $\underline{p} < .05$, and Levels 4 ± 5 (negative verbal plus non-verbal), $\underline{r} = -.43$, $\underline{p} < .01$, responses.

SUMMARY OF TREATMENT MANIPULATION RESULTS

It was found that after treatment Communications Group 1 gave fewer positive responses on the MICS (verbal plus non-verbal) and fewer total positive plus problem solving responses. Some of the specific kinds of statements that these subjects reduced in frequency were positive solutions and the number of interruptions. These couples also continually went down in their General Happiness throughout the program and follow-up period. Following treatment these couples reported being less happy with academic-employment

aspects of their relationship and their spouse's independence. Finally, these subjects spent more time together following the treatment.

The Communications couples that were assessed six weeks after treatment showed decreases in their rate of negative verbal responses and total negative responses as measured by the MICS. These couples spent more time together at this period than they did before the program and they reported receiving fewer pleasing and fewer displeasing behaviours from their partners.

Couples undergoing Contracting, when assessed by the MICS, gave more positive verbal responses following treatment as well as more positive non-verbal responses. There was an increase in total positive responses plus problem solving responses. Some of the specific changes in MICS items include: more problem description statements and more interruptions. These couples showed continuous increases in their general happiness throughout and following the program. Interestingly, these couples also increased in their reported happiness with sex and with communications. This was unexpected in light of the fact that these couples were not given communication training. Finally, these couples decreased in number of displeasing behaviours received following treatment. There were no changes from pretest to posttest in the number of pleasing behaviours received in the Contracting Group.

The Control couples were found to decrease in the number of interruptions as assessed by the MICS. These subjects steadily and continually decreased in General Happiness throughout the duration and follow-up period of the program. At the time of posttesting the couples spent more time together than they did before. At posttesting these couples were requesting fewer changes of their spouse in problem areas, and six weeks following the treatment period these couples requested less change in the number of activities they wanted to do with their spouse.

In terms of the design which allowed for giving the MICS six weeks after the treatment terminated, the results obtained from the MICS and all of the subjective scales showed that in comparison with Communications Group 1, Communications Groups 2 couples gave more positive solutions on the MICS.

CHAPTER IVDISCUSSION

There were a number of interesting changes which occurred in the Areas of Change Inventory and the Spouse Observation Checklist and these are worthy of comment from the start. First of all, recall that the measure "time spend together" was the only factor that was altered in the Spouse Observation Checklist and that this occurred for Communications Groups 1, 2 and the Control group. Couples in these three groups all ended up by reporting an increase in time spent together following the treatment manipulation or pre-post time interval change. The only common denominator

underlying what these three groups underwent is self-monitoring and it could be said that the measure "time spent together" is responsive to general or unspecified independent variables connected with the self-monitoring. It could be that the simple act of self-monitoring itself is enough to increase "time spent together" in a couple, however, since this effect was not also obtained in couples involved in contracting it casts some doubt on this interpretation.

The measure of "Pleases/Displeases" offered the greatest potential for examining the relevance of social exchange theory for disturbed marital relationships. Only couples involved in contracting altered the number of pleases and displeases received at the end of treatment; specifically, following four weeks of contracting couples in this group reported receiving fewer displeasing behaviours from their spouse compared with what they had received before the treatment program began and these data testify to the specific effects associated with the contracts. Indeed, lack of significance in the results is also reflected in the Marital Activities Inventory and Areas of Change where it was hoped that this measure would be sensitive to changes in the relationship and could in this way provide some documentation that could testify to the relevance of social exchange theory in this context. Ironically, the Control subjects were the only subjects to change on the Areas of Change Inventory and the Marital Activities Inventory,

and this, in a direction which was not entirely expected. There was not enough data change reported in this regard and the data that was obtained did not go along with casting the findings in the context of social exchange theory.

With respect to the specific hypothesis of the experiment, that is, the extent to which one treatment manipulation might be more effective than another in producing changes in the marital relationship, the data obtained from the present experiment can be discussed in the following way. It was interesting to find that in the Communications 1 group a general effect of decreasing the positive verbal and non-verbal responses exchanged between partners was obtained. It is possible that this effect was due to the fact that couples were forced into carrying out specific homework assignments which asked each partner to independently raise an issue of concern to them for discussion. Perhaps what the MICS data reflects is a carry-over effect of this forced interaction when couples asserted themselves in presenting their issues. We can say that this might be a possible carry-over effect of communications training since when we examine Communications 2 couples we fail to see such a decrease in positive verbal and non-verbal responses suggesting that couples "recover" from the treatment in time. There are other data which might lend further support to such an interpretation. Recall that couples

in Communications 1 obtained lower general happiness scores throughout their participation in the treatment. Upon close examination of these data, it was found that the item contributing most to a decrease in general happiness was a lowered happiness over the spouses' independence. Now it was found that the ratings of happiness with spouses' independence was positively correlated with the positive Levels of the MICS suggesting that these two measures were closely tied to one another. Consequently, it could be argued that the decrease in the positive verbal and non-verbal behaviours between couples in Communications 1 could have been due to a change in happiness over their perception of their spouse's independence, and that this was prompted by the interactions the members were asked to engage in as part of the homework assignments.

The fact that both Communications groups ended up by spending more time together immediately after treatment and six weeks after treatment would seem to suggest that the treatment manipulations had a long lasting effect upon the couples in the sense that it got them together and got them to stay together for a long period of time after the treatment period ended. However, as mentioned previously, this interpretation must be looked upon with caution since the same effect was also obtained for Control couples who did not undergo any treatment and who reported spending an increased amount of time together following the six week wait period.

Overall, it cannot be said that the MCCP as presented in this study has any great impact on the positive behaviours exchanged between couples, only that it has an adverse effect on the positive behaviours interchanged and that this deleterious effect dissipates over time, and, if we can say anything favourable about the unique and therapeutic effects of the MCCP, it will have to be based on finding that there was a decrease in the negative behaviours exchanged interpersonally between the partners in the relationship. We see this in the Communications Group 2 couples who decreased in their negative verbal and total negative responses six weeks following treatment. This is interesting in the sense that this result was not obtained for Communications Group 1 couples. Thus, it seems as if there was a delayed effect associated with Communications training suggesting that the impact of the MCCP may not materialize until sometime after couples have either "recovered" from their treatment sessions, or have had an opportunity to make use of these skills on their own after training.

How does a decrease in negative verbal and total negative responses relate to marital happiness? If the results bear any relevance to marital adjustment or marital happiness, it was not manifested in the data obtained from the other dependent measures. Recall that general happiness did not change significantly for Communications 2 couples throughout the

treatment sessions, and in the six weeks after the treatment sessions were over. If general happiness is a reliable and/or valid index of how satisfied or happy people are in their relationship, then it can be argued that the decrease in negative verbal behaviour exchanged among partners is a behaviour change which bears only a remote connection with general marital happiness.

Some of the most interesting results were obtained from couples involved in Contracting. Recall that these couples gave more positive verbal and non-verbal and positive total responses following their contracting sessions. This is interesting from several standpoints. In the first place, Contracting couples were not taught any specific communication skills that would generalize or carry over to the kind of dyadic interaction prompted in the video-taping yet, significant changes in interaction styles were manifested as a result of the Contracting. Secondly, Contracting couples increased in "problem description" as well as in the number of "interruptions" made from pre-test to post-test. Now, the number of interruptions made during the course of the interaction was, peculiarly enough, positively correlated with Levels 2, 3 and 1+2+3 responses. Conceivably, this correlation could be due to the fact that the more couples are involved in the process of their interactions, the more they tend to interrupt each other. This increase in "interruptions", while potentially damaging to

communication processes and happiness with communication, may not have had such an adverse effect on the relationship. Recall that these Contracting couples increased in their general happiness from pre-test through the contracting sessions and even maintained this higher level of happiness two and three weeks post contracting. Of particular interest is the increase in reported "happiness with communications". In view of this and the absence of a correlation between number of interruptions and the negative Levels of the MICS we could justifiably raise the question concerning the validity of the assumption that effective and happy communication styles are those which are the least disruptive or interfering in the exchange of information. The MCCP emphasizes the development of those listening and speaking skills that would reduce such things as "interruptions"; yet, the data suggests that there may be little connection between "interruptions" and other communication parameters that could disrupt communication.

It was surprising that only Contracting couples reported an increased happiness with their communications, especially when we consider that the MCCP couples were given specific and extensive training in communication skills, and yet failed to indicate an increase in happiness with their communications. What constitutes satisfying communications? What kind of communication is required to make communication happy? Suffice it to say that whatever patterns of communication Contracting

couples used they reported being happier with that style than did subjects in any other group. Unfortunately, we have no data to report on what it was about their communications in their home and natural setting that made them happier about it. If we use the sample of communication obtained from the MICS as an index of what could have gone on at home we see that there was an increase in problem descriptions (as well as the increase in the number of interruptions), but it is difficult to integrate these findings into a statement of the dynamic process that might describe what occurred and that could help account for why these people reported an increase in happiness with their communication.

We were equally surprised to see that Contracting couples reported an increase in happiness with their sex life. Since no specific "sex therapy" was given to Contracting couples it was a little surprising to see that people could so easily show an increase in happiness with their sex life. However, when we examine closely the nature of the contracts made with each other we find a close resemblance between the affectionate behaviours that were requested in the contract and the kinds of sexual foreplay behaviours that would lead up to and culminate in sexual activity. Thus it could be argued that the successful contracting of affectionate, touching, warm, sensual, and sexual physical responses in many cases lead up to sexual behaviour and that this was sufficient for them to

report an increase in happiness with their sexual life. If by increased happiness in sexual life, couples were also reporting something other than an increase in frequency, but rather were reporting on the subjective or qualitative aspects of their sexual activity, then the above interpretation is even more plausible. However, we cannot rule out a dynamic explanation for this increase in happiness with sex. For instance, looking at the changes in the Spouse Observation Checklist we find that the Contracting couples were the only subjects to report lower Displeasing and total Displeasing behaviours following treatment. Now, if qualitative and positive aspects of sexual relations are tied to the absence of negative feelings such as anger, guilt, hostility, resentment, frustration, etc., then lowering the rate of displeasing behaviours might be the factor which allows the removal of some of the roadblocks which interfere with satisfying sexual relations.

We were surprised to find that Control subjects changed as much as they did over their eleven weeks of self-monitoring. As Communications 1 and Communications 2 couples reported, Control couples also reported an increase in time spent together. The reasons for this are not immediately clear and it is difficult to integrate this in the context of other findings obtained from Control subjects. For example, at post-test on the MICS, Control couples make fewer interruptions throughout

the course of their conversation, and on the Area of Change Questionnaire we see them requesting less change in their spouse, and furthermore, in the Marital Activity Inventory we find Control couples making fewer demands for changes in the kinds of marital activities they would like together. When we look at the general happiness scores across the eleven weeks of self-monitoring we found that Control subjects tended to decrease in their general happiness over time. The fact that these Control couples get less happy over time, make fewer demands on their spouse, wish less change in their relationship, and make fewer interruptions on the MICS suggests some kind of lowering of standards or possibly a decrease in the psychological involvement with their spouse. If this is correct it is solely the product of self-monitoring.

What could it be about self-monitoring that would allow subjects to want fewer changes in their relationship and at the same time make them less happy in the relationship? Perhaps what was needed in the investigation was to have controls for self-monitoring, and this could have been done by a simple test-retest (no self-monitoring) group. In this way the reactive and disruptive effects of self-monitoring could have been more accurately assessed. As it stands, we are left with the suggestion that self-monitoring is adversely reactive. It is possible that self-monitoring forced partners to be continually aware of the things that make them unhappy, and that the self-

monitoring served as a constant reminder of their marital dissatisfaction and marital unhappiness. If this is the case the only natural and psychologically adjustive process to engage in is a lowering of standards for what one would like in a relationship. If this "self-control" process was engaged it cannot account for the lowered general happiness scores over the eleven weeks. This interpretation of self-monitoring does not agree with the findings from the Spouse Observation Checklist which revealed that Control couples end up by spending more time together at the sixth week. It is difficult to conceive of how people can withdraw from each other psychologically and at the same time spend more time together.

In summary we can say that the effects of the MSCP were unimpressive. While it was interesting to find that there was a delayed effect associated with the Communications Skill training, there is some doubt as to what extent decreasing negative verbal behaviours in the course of an interaction is tied to marital satisfaction, dyadic adjustment and marital adjustment. Probably these MICS Levels are unrelated to these measures of marital relations. The most interesting findings of course came from the Contracting treatment where more positive behavioural changes occurred and where there was an increase in general happiness in the relationship as well as a decrease in the displeasing activities that contribute to marital dissatisfaction.

In terms of the couples' evaluation of the leaders and the programs it was interesting to find that couples involved in the Communications training thought that they benefited more from the program compared with what Contracting couples reported. In actual fact, as far as the data are concerned, the reverse was true; Contracting couples benefited more from the treatment than did Communications Skill training couples. It was also interesting to find the Communications couples reporting that their homework was more beneficial compared with Contracting couples' assessment of their own homework.

Other interesting findings relate to the couples' enjoyment ratings. It seems as if the more the couples enjoyed their participation in the program the less they emitted positive verbal behaviours in their interactions with each other. Similarly, the more they enjoyed participating in the program the less they gave negative non-verbal behaviours. We could interpret these data to mean that the more enjoyment couples got out of participating in the program the less they tended to change either in terms of positive or in terms of negative verbal and non-verbal behaviours. Conversely, it could be argued that the less couples enjoyed their respective programs the more they changed in their verbal and non-verbal behaviours. Conceivably, if a couple is not enjoying the program it could be due to the fact that they are actively involved, participating and trying hard to effect changes in

their relationship, and as such, they would probably not enjoy their participation compared with someone who was not as involved and consequently as implicated in the turbulence of changing marital relations.

The leader variables in terms of warmth, clarity, and democraticness, at easeness, and enthusiasm of the leader are related in a strange kind of way with the behaviours manifested on the MICS. The more enthusiastic and warm the leader the fewer positive non-verbal responses partners gave in the course of their interaction sample. Also, with respect to the clarity, democraticness and at easeness of the leader the more the leader was rated high on these characteristics the less the couples exchanged negative verbal, non-verbal and total negative responses between each other. The extent to which these correlations are incidental or whether indeed the rated characteristics of the leader were instrumental in producing the behaviours is open to question at the moment. This question will be raised subsequently in a multiple regression analysis of all the variables in the study.

Conjectures and Directions for Future Research

While our impression is that not all couples are suited for Communications Skill training, we can go further and suggest that some couples can suffer from being exposed to Communications Skill training, especially since it can be very disruptive to "natural" and habitual styles of communicating. A great deal more research has to be done in uncovering which couples require changes in which specific communication style and which do not. This question is most urgent in view of iatrogenic effects associated with the program. Fortunately, no couple "divorced" or got worse and remained worse than when they started. But we are still faced with the issue of ethics and with the possibility that some day our "experimental" treatments may result in irreversible effects.

As far as Contracting is concerned it seems as if this treatment strategy offers the greatest promise for altering unsatisfactory marital relations. The fact that there can be significant changes in reported satisfaction with communication due to contracting may be directly attributed to the ways in which contracting couples were instructed to talk to one another. These couples were instructed to alter and translate their requests from stating displeases into asking for an increase in pleases, and this simple instruction and practice may be enough to significantly alter their level of happiness about the way they are communicating. The structuring of

verbal responses in the sense of asking one member to ask more of something positive instead of asking for less of something negative may be a very useful communication strategy and may indeed count for more variance in changing communication happiness scores than any other Communication Skills training approach. This possibility is exciting and more research will be done in this direction. Specifically, we could ask what would be the effect of having couples contract with one another without instructing them to request the changes in the ways they were induced to request them. Contracting seems to have a relatively strong impact on marital behaviour and interpersonal parameters and studying the effects of contracting over a longer period of time with possibly more contracts may bring about behavioural and other relationship changes that could be cast in the context of social exchange theory.

If there are any similarities between M CCP and contracting it may be found in the stimulus control each technique forces upon the couple. While the M CCP forces a discussion of important issues in the relationship it does not provide a solution to the conflict. On the other hand, contracting forces a discussion of problem areas but at the same time provides for a resolution for decreasing the aversive stimulus. Perhaps it could be said that the M CCP is iatrogenic for that reason.

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Appendix A

Newspaper Advertisement

COUPLES

- Do you have a good marriage?
Would you like to make it better?
- Do you have a bad marriage that
You would like to make good?

The faculty of Psychology at the University Of Ottawa has prepared a research program designed for couples who want to discover new ways to be happier in their marriage.

This 5-10 week program is presently being offered at no charge to all eligible couples.

**For more information call:
Social Relations Program**

733-1260

between 10AM & 5PM

Ask for details on "couples program"

SOCIAL RELATIONS PROGRAM

COUPLES PROGRAM

1. Have you discussed this program with your spouse?
2. If interested in participating would you be willing to commit yourselves to a period of 5-10 weeks, once per week, at a time agreeable to everyone - probably 1 evening per week or on the weekend.

This program lasts from 5-10 weeks, depending on the couples involved. The program focuses on concepts that have been recently developed and found successful for people looking for better ways to deal with the state of marriage that they're in now and who are interested in finding creative ways for changing aspects of their relationship in any direction they so wish. This is not a form of psychotherapy, but rather a system of methods designed to allow couples to be more comfortable about suggesting and producing creative change.

This program normally costs \$150 to \$250, however, we are offering it at no charge if couples are willing to give us a service in return. This service would be in the form of completing scales and doing an assessment and various kinds of recordings of various events that go on from day to day while people are in the program. This is for purely scientific interests on the part of the investigators.

(QUESTIONS)

If you like I can send you more information describing in more formal terms the nature of the program and at the same time ask you to complete brief questionnaires which you can return to us if you're interested in participating.

(Get NAME, ADDRESS, & PHONE (home, work))

A FACULTÉ DE PSYCHOLOGIE

UNIVERSITÉ D'OTTAWA

1245, AVE KILBORN

OTTAWA CANADA

K1H 6K7



THE FACULTY OF PSYCHOLOGY

UNIVERSITY OF OTTAWA

1245 KILBORN AVE

OTTAWA, CANADA

K1H 6K9

March, 1977

SOCIAL RELATIONS PROGRAMS

Thank you kindly for expressing interest in the "Couples Program". I know both you and your spouse or partner are eager to find out what the Program is all about and whether you'd like to commit yourself as participants.

First, please let me assure you that we have no interest in keeping any information from you concerning the specific details of what the complete program entails. Nevertheless, I am sure there will still be "unanswered questions" even when you do decide to participate. I hope the reasons for this will be evident after you've read the descriptions below.

To start, let me say that this Program usually costs participants from \$150.00 to \$250.00, yet, we are offering it to "eligible" couples at no charge. Why? We would like you to give us a service in return. This service is for pure scientific reasons and involves your cooperation in completing various forms of assessment. These range from completing questionnaires and scales, recording (on sheets to be provided) the kinds of activities you both engage in from day to day over the period of a week, to the opportunity of allowing us to record on tape a 10 minute sample of a conversation between you and your spouse. I hurry to add at this point that all information you will give us will be kept in the strictest confidence and will only be available to three primary members of the Program. Once the documentation has been recorded and analyzed, all original sources that would identify you with the data will be destroyed. In keeping with professional code of ethics (Canadian Psychological Association) should you like to obtain information on the nature of our scientific inquiry, the findings obtained, and implications for psychology and social science, we will be pleased to pass this on to you at the completion of the program and after a study of the results.

What constitutes an "eligible" couple? Briefly, we must exclude persons who are presently under the personal care of a psychologist or psychiatrist, or who are receiving counselling or therapy for marital problems from a social worker, psychiatrist, or psychologist. Regretably, we must also exclude persons for whom there is or has been a history of alcoholism in either their own lives or those of their first degree relatives (mother, father). Some of the people who respond to our ad may have a pretty good marriage going already, and may want to participate simply out of curiosity; our program will not be flexible enough to accommodate such couples. Other people we will have to exclude are: (a) couples who are not really committed to trying

Letter to Couples

to make their marriage work; (b) couples where only one member is willing and/or able to attend all sessions; and (c) persons who may want to "prove" that they can't get along with their spouse (such people generally sabotage any and all beneficial aspects of such a program and use the absence of gains in their relationship as an excuse for raising the issue of separation/divorce). Should any of these conditions apply to you or your spouse, please advise us in advance and/or disqualify yourself as being "eligible" for the program.

Does the program involve "groups"? On a few occasions some couples will be meeting in groups. These will never contain more than 10 couples and are only for the express purpose of presenting a method as economically as possible. Should you be in these groups, you will see that they do not involve any disclosure or "spilling out" your feelings etc... in front of others. Any exercises or tasks you may be asked to carry out will be done either as you alone or with your spouse. The program is not "psychotherapy", or any other activity which might be embarrassing.

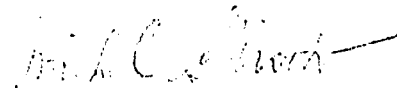
Why 5-10 weeks? Not everyone will be getting exactly the same program. People differ and progress at different rates. Couples also differ and may find one method of the skills to be taught more suited to them; other methods, completely inappropriate. The early screening and questionnaire completion is in part designed to determine how to best "tailor" the program to your needs.

Please remember that to benefit from the program you will have to "work at" the various aspects of the methods you will be receiving and this will involve work during the sessions as well as outside of our formal weekly meetings. We hope that if you agree to join, you will put into it your best effort.

The meetings (singly as couples, or in a small group) should take place in the evenings at a time that is as mutually convenient as possible. Both spouses must attend all regularly scheduled meetings.

I shall be meeting with you on a number of occasions, before, during, and after the program. I shall be happy to answer any particular questions you may have about the program at our first meeting.

Sincerely,



Michel Girodo, Ph.D.
Associate Professor
Director, Couples Program,
Social Relations Programs
733-1260

MG/sd

Letter to Couples

Each partner, please complete separately the enclosed questionnaires and return in the self-addressed envelope as soon as possible.

Appendix D
Homework Assignments

Individual 134

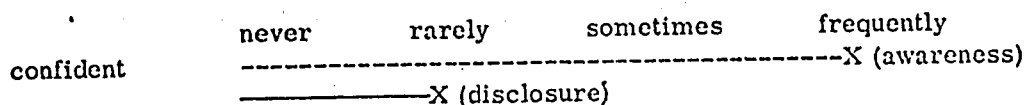
This exercise provides practice in using your Awareness Wheel. Think back to something that happened today--interesting, puzzling, bothersome, etc. Ask yourself these questions and answer them in the space provided.

- a. What did I sense--see, hear, smell, etc.?
- b. What did I think--what interpretation did I make?
- c. What did I feel--what was my emotional reaction?
- d. What were my intentions--what did I want, if anything?
- e. What did I do--verbally and/or nonverbally?

Listed below are feelings (emotions) that most people have in different situations. The purpose of this exercise is to help you identify your feelings and become more aware about how you do or do not share them.

For each feeling, draw two X-s and two lines. Let a dotted line represent how often you are aware of experiencing the feeling and a solid line represent how often you disclose the feeling to your partner.

There may be some variation between awareness and disclosure. For example, I may frequently be aware of feeling confident, but rarely express this to my partner, as shown below:



Whatever you experience, we hope you'll be honest with yourself and accept your feelings as your own. We find it more useful to think of feelings in terms of what is, rather than what should or shouldn't be, or what's good or bad.

FEELINGS	never	rarely	sometimes	frequently	FEELINGS	never	rarely	sometimes	frequently
stubborn					contented				
loving					sad				
weary					excited				
calm					sympathetic				
angry					fearful				
elated					bored				
jealous					proud				
disappointed					depressed				
grateful					satisfied				
embarrassed					shy				
cautious					lonely				
daring					tender				
confused					solemn				
uneasy					pleased				
sexy					guilty				
frustrated					appreciative				
surprised					happy				

Individual

The fifteen statements below represent each of the five dimensions of the Awareness Wheel and illustrate five self-disclosure skills. Can you identify which skill each statement represents?

- a) sense statement
- b) interpretive statement
- c) feeling statement

- d) intention statement
- e) action statement

Answer

1. I'd like to get some time to talk about our vacation coming up. _____
2. I get angry and frustrated when you don't follow through with what you say you'll do. _____
3. You don't even care. _____
4. Wow, I was excited to hear from you. _____
5. I'll bet you don't know what I want from you. _____
6. I didn't go last week. _____
7. I notice you're leaning back in your chair, not smiling. _____
8. I think you misunderstood her. _____
9. I'll call Jim tomorrow morning. _____
10. I'm confident about it. _____
11. I'd like to let you know what I'm thinking. _____
12. I smell your perfume. _____
13. I want to start soon. _____
14. I'm listening. _____
15. Yesterday at supper, I heard you say you were interested in going. _____

This exercise will help you think about your intentions. In the spaces below, list all the intentions you have for yourself and your relationship with your partner for each time period. Take a risk and list both positive and any negative intentions.

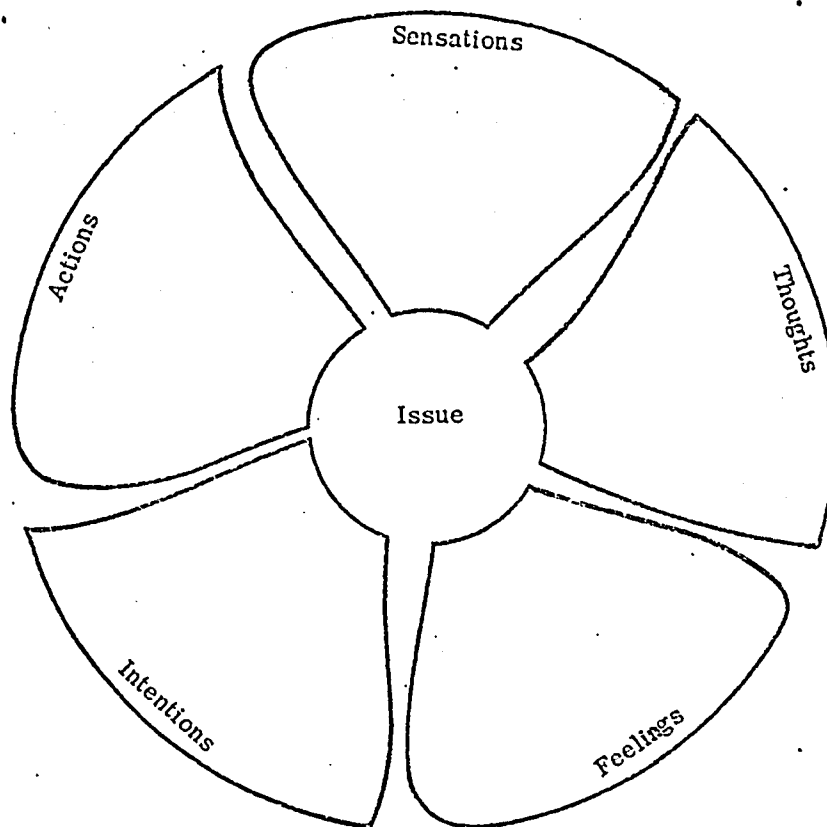
<u>For yourself</u>	<u>For your relationship</u>
Today	
This week	
This month	
The next three months	

Look back over the lists. Are some of your intentions in conflict? Between intentions for yourself and those for your relationship. Within the same period? Across time periods?

Send your partner two "telegrams" this week expressing all dimensions of the Awareness Wheel in 25 words or less.

Together with your partner, choose a current concern or issue in your relationship and talk about it for five minutes, using the self-disclosure skills. Before discussing the issue, however, each of you may want to spend a few minutes organizing your awareness about the issue. The form below will help you to do this.

Try to keep your discussion to about five minutes. In addition to disclosing your awareness about the issue, feel free to disclose any awareness you have about the process of your talking together, as you discuss the issue.



Using audio tape.

This exercise is a good one to tape. After you have finished your five minute discussion, replay the tape and listen for your use of the skills. Be sure to focus on your own contribution to the discussion--your use of skills--not on your partner's. You may want to use a Skills Observation Sheet from Section 1 to keep track of your use of the skills.

Skills Observation Sheet

This sheet is provided to help you listen to tapes you and your partner made and monitor your own behavior. As you are listening to a tape, jot down words or phrases that will help you document when you used a particular skill or behavior.

TapeSpeaking for
selfSpeaking for
otherSense
statementsInterpretive
statementsFeelings
statementsIntention
statementsAction
statements

Here's an exercise to help you assess your own progress in learning communication skills. Rate yourself by placing an X in the blank to indicate where you think you presently are in the process of learning each of the skills, processes, and frameworks presented in Section 1. This exercise is basically a self-review; share it with your partner.

<u>Skills</u>	Beginning Awareness	Awkward	Consciously Skilled	Integrated-- spontaneous, comfortable
1. Speaking for self				
2. Making sense statements				
3. Making interpretive statements				
4. Making feeling statements				
5. Making intention statements				
6. Making action statements				
<u>Processes</u>				
1. Documenting interpretations with data				
<u>Applying Frameworks</u>				
1. The Awareness Wheel				

List five emotions you think your partner experiences frequently. For each emotion, give an example to document when you thought your partner was experiencing this emotion.

<u>Emotion</u>	<u>Example</u>
1.	
2.	
3.	
4.	
5.	

Share your list and examples with your partner, him/her.

Check out your accuracy with

Think back to when you and your partner tried to deal with an issue recently. Pick one successful time and one unsuccessful one, and answer these questions:

	<u>Successful</u>	<u>Unsuccessful</u>
a. What was the issue?		
b. Whose issue was it?		
c. Where did you talk?		
d. When did you talk?		
e. How long did you talk?		
f. How did you stop the discussion?		

Now compare the procedures you used in these two situations. Any similarities? Any differences? What factor(s) do you think made the difference between success and lack of success? Were the procedures you used in these two situations similar to the typical procedures you and your partner use when you deal with issues? If not, how do your typical procedures differ?

You may want to share your perceptions with your partner and talk to him/her about the typical procedures you use.

Choose two topics from those listed below and check out your partner's views. Be sure to ask what s/he thinks, feels, wants, etc., regarding the topics.

This exercise is designed to help you tune into your partner's self-awareness and to practice listening. After your partner has given a complete picture of his/her awareness, you may want to share your perspective. If differences between the two of you occur, try not to become persuasive--rather, see if you can allow and appreciate these differences. Spend no more than 5 minutes per topic.

Topics

relating to your children

personal goals

how you see me trying to control you

things you enjoy about me

handling or saving money

how you see my commitment to you

a spiritual experience

ways we compete with each other

friends of the opposite sex

This exercise provides practice using the Shared Meaning Process and all the skills you have learned so far. Exchange two shared meanings with your partner concerning something positive about (a) yourself, and (b) you in relation to your partner.

One partner be sender and the other receiver. First, one partner sends a positive message about him/herself, keeping these things in mind:

1. Be certain of the meaning you intend.
2. Remember what you mean and how you say it.
3. Make a brief statement--one or two sentences--including several dimensions of your Awareness Wheel.
4. Try to send the message clearly and directly--this exercise is designed to share a meaning with your partner, not confuse him/her.

Receiving partner reports back sender's message, keeping these things in mind:

1. Restate in your own words all the meanings you receive, documenting with sense data.
2. Use the following language in your restatement: "I hear you saying...;" "I see you...and the meaning I make out of that is..."
3. Do not respond to the sender's statement.
4. Do not guess at your partner's meaning (e.g., "Do you mean...?", "You mean...", or "I think you mean..."). If you don't understand, simply tell your partner you don't and ask him/her to send the same message again.

The sending partner then confirms the receiver's accuracy or clarifies his/her original message, being careful not to add to it. Continue reflecting back and clarifying until sender confirms accuracy.

Switch roles with sender becoming receiver, and vice versa, and continue exercise until each partner has shared two messages.

Using audio tape

This exercise is a good one to tape. Listen for the use of the shared meaning skills (particularly reporting back and confirming) and the self-disclosure skills. You may want to use a Skills Observation Sheet to help you listen for skills. Again, pay particular attention to your own contribution to the discussion, rather than your partner's.

Skills Observation Sheet

As you listen to tapes from exercises in Section 2, jot down words or phrases that indicate your use of the various communication skills and behaviors.

<u>Tape 1</u>	<u>Tape 2</u>
Speaking for self	
Speaking for others	
Making sense statements	
Making interpretive statements	
Making feeling statements	
Making intention statements	
Making action statements	
Checking out	
Stating intention and asking for acknowledgement	
Acknowledging sender's message	
Confirming/clarifying	

Skills Observation Sheet

As you listen to tapes from exercises in Section 2, jot down words or phrases that indicate your use of the various communication skills and behaviors.

Tape 1

Tape 2

Speaking for self	
Speaking for others	
Making sense statements	
Making interpretive statements	
Making feeling statements	
Making intention statements	
Making action statements	
Checking out	
Stating intention and asking for acknowledgement	
Acknowledging sender's message	
Confirming/clarifying	

Appendix D (cont'd)

Individual

For each of the statements below, indicate which style you think the statement represents-- Style I, II, III, or IV.

Answers

1. You know you like it when I kid you about that. _____
2. How can you do this to me? _____
3. I'm wondering if the tension between us is because we see so little of each other lately. _____
4. It's about 1200 miles from here to Maine. We can probably make that in three days. _____
5. I'd rather have the apple pie, thanks. _____
6. I feel pleased about the way we handled that. I was feeling more and more frustrated trying to get the thing going, and I could hear you swearing under your breath. But during the whole time, neither one of us yelled at each other. Wow! I think that's quite an achievement! I just want to let you know how good I feel. _____
7. You're really very good at organizing and managing. You'd probably feel more satisfied if you kept track of money and expenses instead of me. That way, you'd always feel on top of things and know just where you are. _____
8. I was probably mad at you when you didn't show up. _____
9. What would happen if we just let things ride for a while? _____
10. I feel content with where we've gotten so far, so I'd like to stop talking about this now and come back to it later tonight. _____
11. I notice you're wearing a new sweater. _____
12. I'm avoiding the issue because I'm scared. When we got into a discussion about that last week we wound up yelling at each other, and I don't want that. _____

Think back to your conversations in the last day or so. List two or three messages you sent in each of the four styles, and also mixed messages you sent.

Style I

Style II

Style III

Style IV

Mixed Messages

Take one of the tapes of yourself and your partner, play it back and listen to your own voice. An important part of communication styles is the vocal characteristics used--pitch, tone, rate of speech, etc. So for this exercise, try to forget your words; instead listen to your vocal characteristics for clues to the style(s) you are using. After listening, answer these questions:

- a. Is your voice high pitched or low, or does it vary?
- b. Is your tone pleasant or harsh? Does it have other tonal qualities?
- c. Do you speak rapidly or slowly, or does your rate vary?
- d. Do your vocal characteristics change when you shift styles?

Next, apply the Awareness Wheel:

- a. Describe how you hear your voice.
- b. What interpretations do you make about yourself from what you hear?
- c. What feelings do you have as you hear your voice?

Finally, answer these questions:

- a. How do you like listening to your voice?
- b. What do you like about your voice?
- c. What do you dislike about your voice?

5. One partner sends a message in any style. Second partner tries to identify the style being used, documenting his/her interpretation. Trade off sending and receiving. Continue until each partner has sent at least two messages in every style.

In this exercise, try not to argue about the "correctness" of an interpretation. Instead, pay particular attention to what you hear (documentation) that leads you to your interpretation. Remember, messages seldom represent a "pure" style.

Partner

6. Choose a topic to discuss, then pick a style and have your partner pick a different style. Discuss the topic for a minute or two. Continue this exercise by picking two different styles and discuss the same topic, or a new one, for a minute or two. Repeat this three or four times.

This exercise is designed to help you and your partner practice different styles and heighten your awareness of the different styles. Perhaps you will discover that it's impossible to really deal with and resolve an issue when the two of you are in different styles.

Using audio tape

7. Have a discussion of about five minutes in which you (or your partner) tell the other about some change occurring in your life. Try to use Style IV to disclose your complete awareness concerning this change and to help your partner disclose his/her complete awareness. As part of your disclosure, you may want to make an action statement to tell your partner about a specific action you will take related to this change. After one partner has described a change, the second partner does the same.

Before doing this exercise, tune into and disclose to your partner your intention(s) for telling him/her about this change--to share, to persuade, to clarify, to demand, etc.

Using audio tape

If you tape your discussion, pay attention to your own use of skills when listening to the tape. All of the self-disclosure skills are appropriate when describing your own change, and the checking out and shared meaning skills are appropriate when listening to your partner's change. Both sets of skills are involved in Style IV. You may want to use the Skills Observation Sheet for monitoring your behavior. Sometimes there is a temptation to focus on your partner's behavior. Don't! Keep focused on your own---this is the behavior you can do something about.

Partner

8. Pick something that your partner does that you turn on to (like) or that you turn off to (dislike). Discuss this for about five minutes, using the work styles--Style III and IV. Next, talk about the discussion, using the Awareness Wheel to answer these questions:

1. What were your feelings during the discussion?
2. What were your intentions toward your partner during the discussion?
3. What actions did you take to express these feelings and intentions?

Now trade roles and repeat the exercise and the discussion of your interaction.

Using audio tape

This is a good exercise to tape. When you listen to the tape, look for examples of styles III and IV, shifts to non-work styles (I and II) and mixed messages. Focus on your own communication. Pay attention to your responses to your partner's messages, particularly when s/he shifts to the non-work styles. You may want to use the Styles Observation Sheet to assist you in monitoring your behavior.

BUILDING SELF- AND OTHER ESTEEM

I. Definitions	Notes
<p>A. <u>Self-concept</u> is the collage of attributes and repeated patterns of action seen by you as being yourself.</p> <p>B. <u>Self-esteem</u> is the set of accumulated feelings and evaluations about yourself that comprise your sense of self-worth.</p> <p>C. <u>Other esteem</u> is your evaluation of your partner's worth to you.</p> <p>D. <u>Esteem of the relationship</u> is an accumulation of evaluation reflecting the worth of the relationship to you.</p>	
<p>II. Importance of Self-Concept and Self-Esteem</p> <p>A. Your self-concept and self-esteem influence what you experience in your Awareness Wheel.</p> <ol style="list-style-type: none"> 1. Sensations experienced 2. Meanings made 3. Feelings held 4. Intentions entertained 5. Actions chosen <p>B. Self-concepts and self-esteem are <u>not static</u> structures but are <u>dynamic processes</u>.</p> <ol style="list-style-type: none"> 1. <u>Acceptance of self-awareness</u>, whether painful or pleasurable, plays a major role in development. 2. In every situation <u>you</u> can decide and act in ways that value or devalue both self and others. What you decide: <ol style="list-style-type: none"> a. Has major impact on dynamics of your self-evaluation process b. Has major impact on how your relationship with others develops 	
<p>III. Esteem Positions</p> <p>A. Every situation can be approached from a position of <u>valuing or not valuing</u> yourself and of <u>valuing or not valuing</u> your partner.</p> <p>B. Self-esteem positions.</p>	

1. I count myself when:
 - a. I am in contact with my self-awareness
 - b. I accept awareness of who I really am
 - c. I pay attention to my congruence
2. I don't count myself when:
 - a. I do not keep in touch with my self-awareness
 - b. I do not accept responsibility for my self-awareness
 - c. I accept incongruence and don't try to do anything about it
 - d. I don't enjoy and appreciate myself

C. Other-esteem positions.

1. I count you when:
 - a. I pay attention to your expressions of awareness
 - b. I respect and trust your self-disclosure
 - c. I help create congruent solutions rather than seek to impose incongruent ones
 - d. I check out my assumptions about your thoughts, feelings and wants
 - e. I let you know where I am coming from
 - f. I leave room for and appreciate differences
 - g. I provide feedback
 - h. I cooperate and share
2. I don't count you when:
 - a. I pay no attention to your expressions of awareness
 - b. I refuse to accept and believe your self-disclosure
 - c. I assume I know what you think, want, feel
 - d. I do not share my self-information with you
 - e. I attempt to force agreement
 - f. I compete rather than cooperate
 - g. I concentrate on your liabilities
 - h. I withhold my enjoyment of you

IV. Counting Postures--Self-Other Orientations

- A. Combinations of self- and other-esteem positions form basic self-other orientations, or counting postures.
- B. There are four basic counting postures.
 1. I don't count/I don't count you:
 - a. Devalues my own self-information
 - b. Devalues my partner's self-information
 - c. Feelings of hopelessness and despair
 - d. Leaves destiny to chance

I. The Mini-Contract

Notes

A. Five parts of a mini-contract

1. An issue is explicitly identified for discussion.
2. Both partners' intention is to deal seriously with the issue now.
3. Consensus exists on your procedures.
4. Both partners share complete and congruent awareness.
5. Both communicate in ways to build self- and other esteem.

B. Non-agreement about any of the five parts may disrupt effective communication about an issue.

1. If your mini-contract is not working, you and your partner may want to renegotiate it explicitly.

II. Work Process**A. A work process occurs when two partners:**

1. Identify an issue
2. Have a mini-contract to work
3. Deal with the issue by using Style III and IV messages, or Style IV alone

B. Work process is useful when you want to:

1. Learn about yourself with partner's help
2. Heighten your awareness of and resolve an issue
3. Deal with tension as it occurs
4. Create change in your relationship
5. Openly acknowledge positives in your relationship

C. Work process starts with movement by both partners from nonwork--Styles I and II--to work--Styles III and IV.**III. Work Pattern Communication****A. Three steps in developing work pattern communication.**

1. Extending an invitation to work on an issue using Style III or IV
2. Partner accepts invitation by replying with a Style III or IV message
3. Using Style III or IV message to confirm

- B. A work pattern exists when an invitation is made, accepted and confirmed.
- C. A work pattern initiates a work process that may continue for some time:
 - 1. Until the issue is mutually and satisfactorily resolved
 - 2. Until one partner wishes to end the discussion for the moment

IV. "Take-Aways"

- A. Take-aways happen when work patterns stop short, after the invitation or acceptance step.
 - 1. A nonwork avoidance pattern occurs with a Style I irrelevant conversation or joking used to respond to a work invitation.
 - 2. A nonwork conflict pattern occurs when Style II take-aways are used consistently.
- B. Decision to work or not to work on an issue is a voluntary choice.
 - 1. A clear statement in Style IV declining to work is not a take-away.

V. Resolving Relationship Issues

- A. When an issue arises:
 - 1. Both partners often send Style II messages
 - 2. Tension increases
 - 3. Awareness of tension combined with intentions to deal effectively with issues result in shift into Style IV and a work process
 - 4. Issue then is free to move to a resolution, involving action statements from each partner
- B. Full disclosure, understanding and commitment to act are essential for resolving relationship issues.
 - 1. To focus directly on an issue, substantial use of Style IV communication is necessary.
 - 2. If the process is unproductive, check out procedures and other parts of the mini-contract.

2. I don't count/I count you:
 - a. Depreciates myself to placate and please partner
 - b. Tries to build partner's esteem at my own expense
 - c. Acts subserviently
 - d. Lures partner into rescuing my self-esteem
3. I count/I don't count you:
 - a. Puts down partner; label and demand
 - b. Tries to build self-esteem at expense of partner
 - c. Right/wrong; win/lose orientations
 - d. Overemphasizes my perceptions; underemphasizes partner's
 - e. Typical quarrel pattern--often both partners adopt this counting posture
4. I count/I count you:
 - a. Tunes in to self- and other awareness
 - b. Accepts my awareness
 - c. Builds self-esteem and other esteem equally
 - d. We both are important and can work together
 - e. Essential to relationship growth

V. Building Self/Other Esteem

- A. Remember that process (how I go about it) is as important as content (what I say).
 1. Keep tuned into your intentions for self, partner, and relationship.
- B. Learn to stay with intention to value yourself and your partner.
 1. Avoid win/lose intention
 2. Avoid trying to assign blame
 3. Low-esteem messages limit growth--more frequent in troubled relationships
- C. High-esteem messages nurture relationships--help relationships grow
 1. I count/I count you messages important because, unless this is your intention in communicating with your partner, you won't be able to really talk openly and productively.
- D. If you do not like the esteem positions you frequently assume and maintain, you can change them.
 1. Requires changing intentions and behaviors

Individual

1. Think back to a recent discussion you had with your partner that was not productive. Now trouble shoot the discussion by reviewing your mini-contract during the discussion. Answer these questions:

1. What was the issue? Was it explicitly identified, or was the issue unclear, or were there several issues involved?

2. Was your intention to deal with the issue seriously, or did you have a different intention? What do you think your partner's intention was?

3. Did a consensus exist on your procedures--who, where, when, how long, etc.? Did you or your partner disagree about some procedure? If so, which one(s)?

4. Did you share your complete awareness regarding the issue, or did you withhold some of your awareness? How about your partner?

5. Did you use an I count/I count you posture, or some other one? How about your partner?

Note: You may want to do this exercise with your partner. If so, each of you complete this form separately, then get together to compare your perceptions.

2. Select one issue you and your partner indicated you want to work on in the previous exercise. Develop a contract for dealing with the issue by answering the questions listed below:

1. What is the issue? Whose issue is it?
2. Do you both want to work on it?
3. When do you want to work on it--now or at a specific time in the future?
4. Who will be included in the discussion--others besides ourselves?
5. Where will the discussion take place?
6. How long do you plan to talk?
7. How will you stop the discussion?

Note: When you have completed this form to your mutual satisfaction, you will have completed the first three parts of a mini-contract. The last two parts--sharing complete and congruent awareness and maintaining mutual I count/I count you postures--will emerge during your discussion of the issue.

Think back to situations or conversations with your partner in the last few days. Provide specific examples of verbal or nonverbal messages you sent using each of the four counting postures.

I don't count/I don't count you

1.

2.

3.

I count/I don't count you

1.

2.

3.

I don't count/I count you

1.

2.

3.

I count/I count you

1.

2.

3.

For two or three minutes, disclose to your partner things you like about yourself--try not to qualify your statements, or disqualify them. Next, partner reports back what s/he understands, sharing a meaning with you about things you like about yourself. Then partner tells you for two or three minutes things s/he likes about you, followed by sharing a meaning about his/her message.

After this process is completed, reverse roles and repeat.

Partner

Give your partner one--and only one--piece of critical feedback. In your feedback, be sure to disclose from each dimension of your Awareness Wheel. Try to maintain an I count/I count you posture as you give the feedback. Partner then reflects back your message and shared meaning continues until message sent equals message received. Partner then shares his/her awareness regarding your criticism.

Next, reverse roles and repeat the process. Stop exercise after one criticism by each partner.

Using audio tape

This is a good exercise to tape. As you listen to the tape, pay attention to your own communication, looking particularly for instances when you may have shifted from an I count/I count you position. If you did shift, note your partner's response. You may want to use the Counting Postures Observation Sheet to help monitor your behavior.

Pick an issue of importance to your relationship which you and your partner are in conflict about. Try to resolve the issue with both you and your partner sending mutual I count/I count you messages using your complete and congruent Awareness Wheels. Discuss the issue for about four or five minutes. If you cannot resolve it in this time-frame, stop, leave the issue, and come back to it later when new/different self-awareness emerges.

Talk about your discussion, using the Awareness Wheel to review your sensations, thoughts, feelings, intentions, and actions during the discussion.

Using audio tape

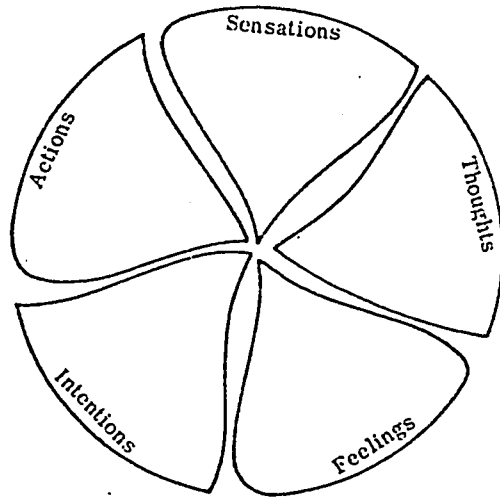
This is also a good exercise to tape. When you listen, pay attention to your own messages, particularly your use of the self-disclosure skills and whether you stayed in, or shifted out of, an I count/I count you posture. You may want to use the Skills Observation Sheet to monitor your behavior.

The forms included in this Appendix are to help you and your partner deal with issues in your relationship. Use them before beginning your discussion or during a discussion which isn't going very well.

Mini-Contracting on Old/New Issues

1. Identify Issue:
 - a. What is the issue?
 - b. Whose issue is it?
2. Intentions:
 - a. Do you want to work on the issue? yes no
 - b. Does your partner want to work on the issue? yes no
3. Procedures:
 - a. When?
 - b. Who's included?
 - c. Where?
 - d. How long discuss?
 - e. How stop discussing?
4. Complete and Congruent Awareness:

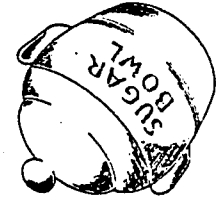
Take a couple of minutes to tune into your Awareness Wheel around the issue before starting the discussion.



5. Building Self/Other Esteem:

Before and during your discussion, tune into your intentions for counting yourself and your partner.

Appendix E
Family Contract Game Board



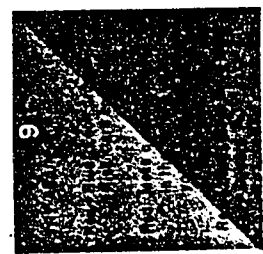
POT OF GOLD
Blue: Choose a Reward Card. If you perform Red's please, Read the reward to Red.
Red + Blue: Move to Square 8.

PAY OFF
Banker: Pay Red \$50.
Blue: Draw a Bonus Card and read it.
Red + Blue: Move to Square 7.

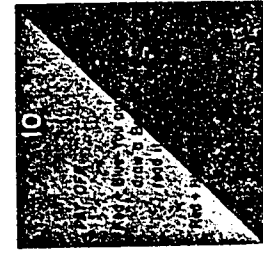
TRY AGAIN
Red + Blue: Each draw a Risk Card and read it.
Blue: Make a small change in the please so that you agree with it.
Red + Blue: Move back to Square 3.

Bonus 8
If Red says yes, both move to Square 9.
If Red says no, both move to Square 5.

Bonus Cards



Problem Cards



Reward Cards

Risk Cards

11
Red: Write a Contract. State:
a) Your please
b) When Blue should perform the please
c) What will be Blue's reward
d) How often Blue must perform the please
e) When the reward will be given
f) Who will track the please
Red + Blue: Move to Square 12.

Contract



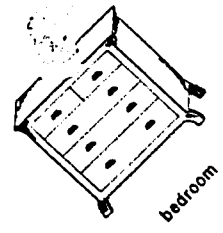
4
Red: Ask Blue if Blue likes the please.
If Blue says yes, both move to Square 6.
If Blue says no, both move to Square 4.

3
Red: Change the problem to a please. Tell Blue what to do more of and when.
Red + Blue: Move to Square 4.

2
Red: Read your Problem Card to Blue.
Red + Blue: Move to Square 3.

1
Red: Draw a Problem Card.
Red + Blue: Move to Square 2.

© 1971, 1973



12
Red: Ask Blue if Blue agrees to the Contract.
If Blue says yes, both move to Square 14.
If Blue says no, both move to Square 13.



14
Red + Blue: Sign the Contract. Move to Go.
Red: You will now be Blue.
Blue: You will now be Red.

Go
Take \$300 from the bank.

PROGRAM EVALUATION QUESTIONNAIRE

We sincerely wish to develop Programs which will benefit Couples in their relationships. We would appreciate if you would provide us with your ideas about what aspects of the Program you found most helpful, what aspects you think we should keep, what aspects we should drop, and what aspects we should change. Your comments may be directed to any of the following areas or to any other areas you feel are important.

Circle the appropriate number to indicate how you personally feel.

- 1) Did you enjoy your participation in this phase of the Couples Program?

1	2	3	4	5	6	7
Not at all						Very much

- 2) Did you benefit from this phase of the Program (learn more about yourself, improve your relationship)?

1	2	3	4	5	6	7
Not at all						Very much

- 3) To what extent were each of the following aspects of this phase of the Program helpful to you?

	Not at all					Very much	
a) The self-monitoring: (i.e. Happiness, Spouse obs. checklist)	1	2	3	4	5	6	7
b) The weekly meetings:	1	2	3	4	5	6	7
c) The homework	1	2	3	4	5	6	7
d) The discussions with Dr. Girodo:	1	2	3	4	5	6	7

- 4) The length of the Program should be:

_____ increased

_____ decreased

_____ stay the same

5) What changes would you recommend?:

6) Any additional comments:

Please be sure your number is on each sheet. All responses will, of course, be confidential.

NAME: _____

LEADER EVALUATION QUESTIONNAIRE

We would like you to evaluate the leader of this phase of the Program on a number of different categories. For each of the items below, please place one check mark anywhere along the dimensions defined by each scale, to describe your leader's behavior.

- | | | | | | | |
|-------------------------------|-------|-------|-------|-------|-------|-----------------------------|
| 1. Lacked enthusiasm | _____ | _____ | _____ | _____ | _____ | Very enthusiastic |
| 2. Expressed ideas
clearly | _____ | _____ | _____ | _____ | _____ | Unclearly |
| 3. Interested | _____ | _____ | _____ | _____ | _____ | Disinterested |
| 4. Warm & supportive | _____ | _____ | _____ | _____ | _____ | Cold & distant |
| 5. Authoritarian | _____ | _____ | _____ | _____ | _____ | Democratic |
| 6. Approachable | _____ | _____ | _____ | _____ | _____ | Unapproachable |
| 7. Spoke too little | _____ | _____ | _____ | _____ | _____ | Spoke too much |
| 8. Made me feel
at ease | _____ | _____ | _____ | _____ | _____ | Made me feel
ill at ease |

Please add any additional comments about the leader below:

NAME: _____

Pearson Product-Moment Correlations Between
Marital Status Inventory and Subjective Scales

Subj. Scales	MSI	Subj. Scales	MSI
Deci	.21	TimTog	.05
Marsat	.44**	Satis	-.34*
Commun	-.33*	Thots	-.23
Sex	-.17	IP	-.20
ChildMan	.35*	IIP	-.27*
Optim	-.55*	IIIP	-.29*
DAS	-.56**	IIID	.17
DCon	-.41**	IVP	-.28*
Aff.Ex	-.15	IVD	-.18
D.S.	-.66**	VP	-.19
D.Coh	-.39**	VD	-.02
A.C.	.23	VIP	-.38**
MAI	-.26*	VID	-.10
CMAI	.08	VIIP	-.02
HapHr	-.14	VIID	.08
HapChild	-.07	VIIIP	-.16
HapSocAct	-.24	VIIID	-.04
HapMon	-.23	IXP	.05
HapCom	-.26*	IXD	.18
Hap Sex	.17	XP	.09
HapAcad	-.17	XD	.32**
HapPl	-.14	XIP	.09
HapSl	-.11	XID	.09
GenHap	-.36**	XIIP	-.15
Please	-.33*	XIID	.18
Displease	.11		

* $p < .05$

** $p < .01$

Pearson Product-Moment Correlation Coefficients Among
Subscales of Stuart Marital Pre-Counseling Inventory
and Subjective Scales

Subj. Scales	<u>Decision</u>	<u>MarSat</u>	<u>Commun</u>	<u>SexSat</u>	<u>Child</u>	<u>Optim</u>
Deci						
Marsat	-.67**					
Comm	-.49**	-.71**				
SexSat	.33*	.35**	-.37**			
ChildMan	.45**	.57	-.39**	-.09		
Optim	-.54**	-.74**	.73**	-.22	-.46**	
DAS	-.59**	-.84**	.70**	-.29*	-.57**	.72**
DCon	-.54**	-.76**	.58**	-.19	-.63**	.56**
AffEx	-.06	-.25*	.17	-.46**	.18	.05
DS	-.48**	-.72**	.61**	-.21	-.50**	.67**
DCoh	-.53**	-.67**	.66**	-.23	-.43**	.75**
A.C.	.41**	.62**	-.37**	.34**	.44**	-.34**
MAI	-.13	-.17	.38**	-.30*	.02	.31*
CMAI	.30*	.43**	-.25*	.35**	.27*	-.10
HapHr	-.34**	-.47**	.41**	-.17	-.40**	.33**
HapChild		-.35*	.29*	-.08	-.43**	.22
HapSocAct	-.43**	-.65**	.50**	-.30*	-.33*	.46**
HapMon	-.41**	-.56**	.39**	-.24	-.38**	.50**
HapCom	-.32*	-.56**	.39**	-.22	-.33	.37**
HapSex	-.29*	-.28*	.24	-.54**	-.26*	.10
HapAcad	-.39**	-.51**	.35**	-.19	-.29*	.46**
HapPl	-.33**	-.47**	.36**	-.25*	-.24	.35
HapSl	-.35**	-.47**	.36	-.30*	-.29	.37
GenHap	-.50**	-.68**	.57**	-.36	-.43**	.58**
Please	-.32*	-.49**	.44**	-.17	-.42**	.52**
Displease	.21	.36**	-.31*	.29	.35**	-.19

* $p < .05$

** $p < .01$

Appendix H (cont'd)

Subj. Scales	<u>Decision</u>	<u>MarSat</u>	<u>Commun</u>	<u>SexSat</u>	<u>Child</u>	<u>Optim</u>
TimTog	-.17	-.12	.13	.00	-.01	.19
Satis	-.28*	-.43**	.35**	-.17	-.32*	.48**
Thots	-.15	-.16	.14	-.23	-.05	.26
IP	-.34*	-.44**	.42**	-.15	-.30*	.44**
IIP	-.40**	.43**	-.42**	.19	-.25	.52**
IIIP	-.25*	-.44**	.36	-.18	-.33*	.47**
IIID	.27	.48**	-.43**	.31*	.45**	-.30*
IVP	-.13	-.19	.22	-.29*	-.14	.28*
IVD	.18	.08	-.04	.41**	.12	.15
VP	-.06	-.11	-.01	-.01	-.22	.07
VD	.12	.23	-.31*	.38**	.25	-.12
VIP	-.20	-.32**	.31*	-.24	-.07	.41**
VID	.00	-.05	.01	.20	-.09	.01
VIIP	-.07	-.12	.06	.16	-.40**	.12
VIID	.01	.21	-.33**	.05	.31*	-.24
VIIIP	-.181	-.36**	.36**	-.03	.26*	.28*
VIIID	.06	.16	-.10	.32*	.13	-.02
IXP	-.18	-.18	.14	.00	.03	.21
IXD	.19	.38**	-.26*	.06	.30*	-.21
XP	.06	-.01	.16	.09	.10	.16
XD	.11	.19	.07	-.10	.16	-.14
XIP	-.23	-.43**	.45**	-.43**	-.21	.29*
XID	.16	.15	-.09	.08	.15	-.05
XIIP	.03	-.08	.09	.05	-.13	.08
XIID	.17	.18	-.06	.19	.07	-.13

Pearson Product-Moment Correlation Coefficients Among
Subscales of Dyadic Adjustment Scale and Subjective Scales

Subj. Scales	DAS (Total)	Dyadic Consensus	Affectional Expression	Dyadic Satisfaction	Dyadic Cohesion
DCon	.88**				
AffEx	.33*	.15			
DSat	.87**	.61**	.30		
DCoh	.81**	.59**	.06	.68**	
AC	-.65**	-.58**	-.13	-.61**	-.50**
MAI	.33*	.10	.24	.37**	.41**
CMAI	-.46**	-.45**	-.13	-.38**	-.36**
HapHr	.46**	.41**	.12	.41**	.29*
HapChil	.35*	.38**	.10	.31*	.14
HapSA	.60**	.52**	.13	.57**	.42**
HapMon	.45**	.47**	-.01	.39**	.30*
HapComm	.58**	.48**	.30*	.56**	.37**
HapSex	.36**	.34*	.32*	.22	.22
HapAcad	.32*	.35**	-.16	.28*	.26*
HapPI	.38**	.33*	.11	.36**	.30*
HapSI	.43**	.44**	.05	.32*	.36**
HapGen	.65**	.52**	.21	.66**	.46**
Please	.60**	.42**	.13	.64**	.53**
Displease	-.42**	-.44**	-.12	-.26*	-.29*
TimeTo	.24	.07	-.03	.30*	.35**
Satis	.45**	.28*	.04	.48**	.39**
Thots	.21	-.02	.30*	.20	.28*

* $p < .05$

** $p < .01$

Subj. Scales	DAS (Total)	Dyadic Consensus	Affectional Expression	Dyadic Satisfaction	Dyadic Cohesion
IP	.51**	.27*	.11	.62**	.47**
IIP	.47**	.24**	.20	.48**	.54**
IIIP	.51**	.39**	.18	.50**	.40**
IIID	-.48**	-.50**	-.07	-.34**	-.33*
IVP	.35**	.17	.29*	.37**	.32*
IVD	-.12	-.21	-.25*	.06	-.02
VP	.25*	.18	-.04	.34**	.17
VD	-.30*	-.33*	-.04	-.15	-.27*
VIP	.47**	.29*	.26*	.56**	.37**
VID	-.09	-.07	-.03	.05	-.15
VIIP	.11	.20	-.18	.07	.12
VIID	-.21	-.22	.05	-.10	-.18
VIIIP	.36**	.30*	.10	.32*	.27*
VIIID	-.23	-.21	-.25*	-.17	-.14
IXP	.18	.16	.04	.14	.19
IXD	-.40**	-.47**	-.12	-.33*	-.12
XP	.03	-.13	-.13	.14	.24
XD	-.20	-.22	.03	-.17	-.07
XIP	.44**	.38**	.30*	.42**	.23
XID	-.23	-.21	-.10	-.17	-.19
XIIP	.10	.02	-.13	.18	.22
XIID	-.25*	-.19	-.23	.14	-.21

* $p < .05$

** $p < .01$

Pearson Product-Moment Correlation Coefficients
Between Areas of Change Inventory Scores and
Other Dependent Scales

Scales	Areas of Change	Scales	Areas of Change
MAI	-.22	IIID	.42**
CMAI	.67**	IVP	-.11
HapHR	-.40**	IVD	.22
HapChild	-.21	VP	-.34*
HapSA	-.60**	VD	.31*
HapMon	-.35**	VIP	-.41**
HapComm	-.43**	VID	.20
HapSex	-.36**	VIIP	-.08
HapAcad	-.29*	VIID	.16
HapPI	-.30*	VIIIP	-.21
HapSI	-.41**	VIIID	.33*
HapGen	-.51**	IXP	-.04
Please	-.45**	IXD	.31*
Displease	.41**	XP	.06
TimTo	-.16	XD	.15
Satis	-.32*	XIP	-.46
Thots	.03	XID	.19
IP	-.37**	XIIP	-.27*
IIP	-.21	XIID	.28*
IIIP	-.40**		

* $p < .05$

** $p < .01$

Pearson Product-Moment Correlation Coefficients Among
Marital Activities Inventory and Change Desired in
Marital Activities and Other Scales

Scales	Marital Activities Inventory	Change Desired
HapHr	.23	-.16
HapChil	.07	.03
HapSA	.21	-.34*
HapMon	.04	-.20
HapComm	.32*	-.28*
HapSex	.20	-.26*
HapAcad	.05	-.33*
HapPI	-.06	-.30*
HapSI	-.03	-.26*
HapGen	.34**	-.27*
Please	.40**	-.21
Displease	-.24	.39**
TimeTo	.41**	-.02
Satis	.41**	-.20
Thots	.43**	.05
IP	.48**	-.11
IIP	.38**	-.01
IIIP	.44**	-.23

* $p < .05$

** $p < .01$

Appendix K (cont'd)

Scale	Marital Activities Inventory	Change Desired
IIID	-.25*	.53**
IVP	.46**	-.13
IVD	-.10	.20
VP	.27*	-.31*
VD	-.13	.47**
VIP	.41**	-.13
VID	-.22	.14
VIIP	-.27*	.03
VIID	-.30*	.05
VIIIP	.05	-.03
VIIID	-.13	.35**
IXP	.07	.14
IXD	.08	.03
XP	.05	.14
XD	-.21	.10
XIP	.17	-.37**
XID	-.19	.15
XIIP	-.06	-.16
XIID	-.08	.07

* $p < .05$

** $p < .01$

Appendix I

Pearson Product-Moment Correlation Coefficients Among Happiness Scales and Remaining Scales

Scales	Household Responsi- bility	Children	Social Activities	Money	Commun- ication	Sex	Academic	Personal Indepen- dance	Spouse Indepen- dance	General
HapChild	.75**									
HapSA	.75**	.62**								
HapMon	.60**	.45**	.77**							
HapComm	.79**	.78**	.86**	.63**						
HapSex	.54**	.56**	.63**	.48**	.62**					
HapAcad	.40**	.35*	.59**	.62**	.50**	.18				
HapPI	.55**	.50**	.71**	.64**	.66**	.43**	.59**			
HapSI	.43**	.44**	.72**	.62**	.57**	.42**	.59**	.76**		
HapGen	.78**	.66**	.89**	.71**	.87**	.63**	.59**	.64**	.58**	
Please	.63**	.58**	.67**	.48**	.71**	.49**	.31*	.48**	.51**	.78**
Displease	-.37**	-.29**	-.20	-.17	-.32*	-.29*	-.06	-.19	-.07	-.26*
TimeTo	.34**	.19	.25*	.20	.36**	.22	-.08	.11	.15	.34**

* $p < .05$ ** $p < .01$

Scales	Household Responsi- bility	Children	Social Activities	Money	Commun- ication	Sex	Academic	Personal Indepen- dance	Spouse Indepen- dance	General
Satis	.72**	.58**	.70**	.56**	.80**	.44**	.45**	.54**	.41**	.81**
Thots		.12	.18	.28	.28	.20	-.15	.07	-.02	.30*
IP	.52**	.51**	.53**	.29*	.57**	.26*	.17	.26*	.28*	.60**
IIP	.41**	.34*	.37**	.32*	.39**	.25*	-.08	.18	.17	.48**
IIIP	.63**	.53**	.62**	.50**	.66**	.43**	.33**	.51**	.50**	.68**
IIID	-.50**	-.34*	-.37**	-.29*	-.47**	-.39**	-.27*	-.37**	-.12	-.48**
IVP	.18	.23	.31*	.25*	.36**	.43**	.12	.16	.19	.41**
IVD	-.20	-.13	-.03	.02	-.04	-.43**	.06	-.02	-.18	-.08
VP	.31*	.32*	.35**	.20	.44**	.27*	.18	.20	.27*	.43**
VD	-.20	-.35*	-.15	-.07	-.25*	-.36**	-.03	-.21	-.10	-.22
VIP	.34*	.18	.52**	.39**	.43**	.25*	.23	.30*	.53**	.53**
VID	-.19	-.19	-.07	-.07	-.03	-.20	.09	-.07	-.07	-.07

Scales	Household Responsi- bility	Children	Social Activities	Money	Commun- ication	Sex	Academic	Personal Indepen- dance	Spouse Indepen- dance	General
VIIP	.19	.27*	.13	.07	.13	.17	.15	.17	.15	.20
VIID	-.20	-.17	-.03	-.07	-.11	.05	.06	.09	.17	-.05
VIIIP	.49**	.46**	.51**	.34**	.53**	.39**	.20	.45**	.44**	.52**
VIIID	-.07	-.11	-.10	-.16	-.22	-.26*	.07	-.17	.02	-.09
IXP	.33*	.14	.18	.28*	.19	.04	-.01	.28*	.23	.22
IXD	-.20	-.17	-.30*	-.33*	-.17	-.16	.05	-.02	.01	-.16
XP	-.07	.01	.00	-.07	-.05	-.11	-.21	-.07	-.01	-.02
XD	-.45**	-.18	-.37**	-.38**	-.40**	-.17	-.19	-.30*	-.13	-.38**
XIP	.35**	.35*	.49**	.40**	.48**	.44**	.29*	.44**	.48**	.55**
XID	-.15	-.11	.06	.06	-.09	.03	.00	.03	.00	.00
XIIP	-.06	-.11	.12	.11	-.08	-.12	.09	.01	.06	-.04
XIID	-.15	-.02	-.03	-.02	-.09	-.09	.04	-.08	-.12	-.10

Pearson Product-Moment Correlation Coefficients Among Items of Spouse Observation Checklist

Scales	Please	Displeas	Time To- gether	Satis- faction	Pleasant Thoughts	IP	IIP	IIIP	IIID	IVP	IVD	VP
TimTo	.53**	-.24										
Satis	.70**	-.37**	.50**									
Thots	.35*	-.27*	.48**	.43**								
IP	.77**	-.24	.65**	.60**	.32*							
IIP	.65**	-.20	.58**	.52**	.65**	.72**						
IIIP	.88**	-.28*	.47**	.67**	.39**	.67**	.61**					
IIID	-.31*	.82**	-.22	-.55**	-.19	-.27*	-.21	-.39**				
IVP	.60**	-.13	.25*	.44**	.46**	.39**	.39**	.57**	-.14			
IVD	-.06	.55**	-.02	.02	-.11	-.01	-.04	-.11	.30*	-.06		
VP	.62**	-.18	.63**	.50**	.31*	.49**	.30*	.56**	-.19	.49**	-.05	
VD	-.19	.81**	-.10	-.37**	-.17	-.11	-.16	-.19	.75**	-.15	.44**	-.14
VIP	.56**	.09	.41**	.30*	.22	.53**	.32*	.46**	.02	.30*	.02	.42**
VID	-.11	.57**	-.23	-.34*	-.18	-.15	-.19	-.11	.42**	-.14	.34**	-.14
VIIP	.32*	.17	-.17	.08	-.26	-.06	-.12	.09	.02	-.04	.04	-.06
VIID	-.02	.62**	-.27*	-.24	-.24	-.22	-.19	-.15	.50**	.05	.08	-.13
VIIIP	.48**	-.05	.10	.35*	-.02	.21	-.14	.30*	-.21	-.02	-.03	-.03

* $p < .05$ ** $p < .01$

Scales	Please	Displeas	Time To- gether	Satis- faction	Pleasant Thoughts	IP	IIP	IIIP	IIID	IVP	IVD	VP
VIIID	-.10	.73**	-.19	-.11	-.29*	-.16	-.14	-.11	.50**	-.18	.35**	-.16
IXP	.23	-.09	.36**	.22	.25	.34*	.38**	.31*	-.08	-.18	-.04	-.03
IXD	-.05	.33*	-.05	.08	-.19	-.12	-.12	-.12	.20	-.08	-.01	-.04
XP	.20	.45**	.30*	.00	.04	.30*	.38**	.13	.28*	-.04	.45**	.07
XD	-.26*	.39**	-.27*	-.54**	-.21	-.26*	-.21	-.34**	.55**	-.11	-.05	-.17
XIP	.49**	-.28*	.13	.32	.06	.33*	.13	.39**	-.34**	.25*	-.22	.16
XID	-.02	.73**	-.14	-.10	-.17	-.15	-.06	-.07	.36**	-.05	.54**	-.06
XIIP	.04	.21	-.34*	-.20	-.22	-.07	-.14	-.13	.30*	.07	.12	-.12
XIID	-.15	.59**	-.10	-.15	-.15	-.18	-.17	-.12	.25*	-.15	.54**	-.07

Scales	VD	VIP	VID	VIIP	VIID	VIIIP	VIIID	IXP	IXD	XP	XD	XIP	XID	XIIP	XIID
VIP	.22														
VID	.57**	.02													
VIIP	.01	-.07	.20												
VIID	.40**	.06	.25*	.36**											
VIIIP	-.12	.33*	.00	.45**	.12										
VIIID	.61**	.04	.51**	.22	.30*	.10									
IXP	.07	.18	-.07	.04	-.02	.06	-.03								
IXD	.10	-.01	-.05	.18	.47**	.07	.28	-.11							
XP	.21	.14	.30*	.02	.03	.02	.37**	.26*	.03						
XD	.19	-.13	.30*	.03	.31*	-.17	.07	-.19	.14	.28*					
XIP	-.30*	.40*	-.15	.15	.09	.47**	-.36**	.24	.02	-.13	-.03				
XID	.43**	.10	.34*	.15	.27*	.06	.51**	-.13	.09	.52**	.11	-.15			
XIIP	.19	.15	.08	.22	.23	.06	-.05	-.21	-.05	-.05	.29*	.10	.05		
XIID	.38**	-.10	.60**	.02	.11	-.01	.58**	-.05	.11	.57**	.10	-.19	.68**	-.14	

Summary of One-Way Analysis of Variance
for Pretest Scores Between Groups

	Source	<u>df</u>	<u>MS</u>	<u>F</u>
Happiness with Child Management (Happiness Scale)	Between	3	7.81	3.14*
	Within	38	2.49	
	Total	41		
Total of Displeasing Behaviours Received (SOC)	Between	3	40.83	2.93*
	Within	42	13.94	
	Total	45		
Pleasing Child Care and Parenting Behaviours Received (SOC)	Between	3	40.87	4.23*
	Within	44	9.67	
	Total	47		

* $p < .05$

Summary of ANCOVA for Dependent Measures
Between Groups with Pretest Scores As
Covariate

	Source	<u>df</u>	<u>MS</u>	<u>F</u>
Level 1 on MICS	Covariate	1	.011	.019
	Main Effect	3	1.76	3.10 *
	Residual	41	.056	
	Total	45	.634	
Level 1+2+3 on MICS	Covariate	1	27.41	3.57
	Main Effect	3	22.19	2.89 *
	Residual	41	7.68	
	Total	45	9.09	
Paraphrase/ Reflect on MICS	Covariate	1	.01	.33
	Main Effect	3	.12	2.84 *
	Residual	41	.04	
	Total	45	.05	
Interrupt on MICS	Covariate	1	7.09	19.46 **
	Main Effect	3	1.91	5.23 **
	Residual	41	.37	
	Total	45	.617	

* $p < .05$

** $p < .01$

Summary of One-Way Analysis of
Variance for Change Scores on
Dependent Measures Between Groups

	Source	<u>df</u>	<u>MS</u>	<u>F</u>
Time Together (SOC)	Between	3	29.10	2.98*
	Within	27	9.76	
	Total	30		
Level 2 on MICS	Between	3	2.09	2.97*
	Within	42	.71	
	Total	45		
Level 3 on MICS	Between	3	26.13	4.27*
	Within	42	6.12	
	Total	45		
Level 2+3 on MICS	Between	3	42.92	5.58**
	Within	42	7.70	
	Total	45		
Level 1+2+3 on MICS	Between	3	65.16	5.88**
	Within	42	11.08	
	Total	45		
Level 4 on MICS	Between	3	1.78	3.79*
	Within	42	.47	
	Total	45		

* $p < .05$
 ** $p < .01$
 *** $p < .001$

Appendix P (cont'd)

	Source	<u>df</u>	<u>MS</u>	<u>F</u>
Criticize on MICS	Between	3	.16	3.06*
	Within	42	.05	
	Total	45		
Problem Solving on MICS	Between	3	2.56	2.96*
	Within	42	.87	
	Total	45		
Interrupt on MICS	Between	3	3.88	6.58***
	Within	42	.59	
	Total	45		

Appendix Q

Contracts Made by Couples

<u>Couple No.</u>	<u>Blue (Performs Please)</u>	<u>Please</u>	<u>Red (Rewarder)</u>	<u>Reward</u>
113	W	Play with the kids and I after supper 1 hour on Mondays & Wednesdays.	H	Prepare one dinner on the weekend.
113	H	When I am talking on the phone you should leave the room.	W	Some new sexual behaviour.
113	W	Leave me alone for an hour in the evening.	H	Having a shower or bath together.
114	H	Flushing the toilet every morning.	W	A hug.
114	W	To positively reinforce an opinion on a domestic matter.	H	A massage.
114	H	Handle independently some household chores.	W	Spontaneous positive event.
115	H	Thanking and appreciating more of the effort the W put into doing your hair.	W	Doing the dishes.
115	H	Accept explanations as truthful (regarding jealous suspicions). If any doubts say "I have doubts".	W	More hugging and kissing.
115	W	Speak mildly to the children when feeling out of sorts.	H	More help with the gardening.

<u>Couple</u> <u>No.</u>	<u>Blue (Performs</u> <u>Please)</u>	<u>Please</u>	<u>Red</u> <u>(Rewarder)</u>	<u>Reward</u>
116	H	Please let children decide whether to eat meal or leave table.	W	Sewing on buttons.
116	W	Please adhere to your diet.	H	To get up and make us tea Sat. or Sunday morning
116	H	Please wash your hair.	W	To greet you affectionately upon arriving home
117	H	Come home in a good mood.	W	Rubdown two evenings a week.
Revised to:				
117	H	Keep a happy face and your voice down during the evening meal.	W	Rubdown of my choice for at least 10 minutes long.
117	W	Please do not be repetitious in stating problems or errors.	H	Take her out for fun once per week
117	W	Please pick up any of your clothes or shoes you will not wear next day.	H	Show affection on arrival home (hug and a kiss)
118	W	Please limit the number of complaints.	H	Cut the lawn.
118	H	Discussion daily after listening to the news (initiated by husband).	W	Summary of discussion.
118	H	Clean the pool or work on kitchen.	W	Watch husband work (to show that you notice.

Appendix R

Power of the Major Analysis of Variance

<u>Scale</u>	<u>δ</u>	<u>Power</u>
Please (ANCOVA)	1.1	.34
Displease (ANCOVA)	.59	< .30
Areas of Change (ANCOVA)	.26	< .30
MAI (ANCOVA)	.72	< .30
DAS (ANCOVA)	.57	< .30

Note: Number of subjects needed per cell for Power to equal .80 is 16.