Book Review

A Review of *Marital Interaction: Analysis and Modification*¹ Edited by Kurt Hahlweg and Neil S. Jacobson

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Both experimental and applied behavior analysts have largely ignored the area of marital interaction and marital distress. This is clearly indicated by the lack of a single article on this topic in the *Journal of Applied Behavior Analysis* in the 17 volumes that have been published to the end of 1984. It is not exactly clear why this is so, but several possibilities exist. Psychologists conducting research in this area are likely to have their training rooted in clinical behavior therapy, whereas behavior analysts' roots are in experimental or animal research. Behavior analysts may not have been impressed with the more speculative and less controlled research that characterized early clinical efforts to treat maritally distressed couples. Marital relationships also involve much greater complexity when compared to parent-child or teacher-student interaction; the dependent and controlling variables are not easily identifiable, and the reinforcement contingencies are more likely to be viewed as bidirectional than unidirectional.

Behavior analysts, however, have not been deterred from investigating other complex behavioral phenomena, such as large-scale environmental/ecological problems (see Tusso & Geller, 1976, for a review), prison systems (e.g., Milan & McKee, 1976), and creativity (e.g., Glover & Gary, 1976). Thus, their apparent

lack of enthusiasm for the study of marital interaction remains somewhat of a mystery. Despite this, adults continue to be involved in marital relationships and many seek assistance from a host of professionals to help deal with distressing and long-standing interpersonal difficulties. Marital distress has also been associated with a long list of other serious social and psychological problems, such as maternal depression (Biglan, Hops, Sherman, Friedman, Arthur, & Osteen, in press) and child behavior problems (Porter & O'Leary, 1980).

Inspired by behavior analytic concepts, some researchers did attempt interventions with maritally distressed couples beginning in the late 1960's and early 1970's. Stuart's (1969) use of token systems to increase the communication and sexual behavior of four couples was the first attempt to manipulate mutual reinforcement contingencies to improve marital satisfaction in both spouses. The zeitgeist was right and other researchers built upon this early attempt to conceptualize marital interaction from a reinforcement perspective (Azrin, Naster, & Jones, 1973; Goldstein & Francis, 1969; Lazarus, 1968; Weiss, Hops, & Patterson, 1973). Generally, couples were taught a set of skills that was presumed to be related to marital happiness or satisfaction. For example, couples were taught to pinpoint each other's behavior using nonaversive language. Training in problem-solving and negotiation skills was provided so that changes in each other's behavior could be negotiated using some form of contingency contracting. Over the last decade, an increasing number of researchers have significantly ex-

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tended both treatment and assessment procedures, much beyond the simple reinforcement and punishment contingencies that marked the earlier period. The current emphasis on cognitivism in behavior marital therapy, however, may be creating a greater schism between concepts based on a behavior analytic model and behavior therapy in general.

SUMMARY OF TEXT

Marital Interaction: Analysis and Modification, edited by Kurt Hahlweg and Neil S. Jacobson, is the outcome of a conference on behavioral marital therapy (BMT) held in 1981 in West Germany and sponsored by the Max-Planck-Institutes of Munich. The editors indicate that the five-fold goals of the symposium were to present data and to discuss the following: (a) the current international state of BMT research, (b) future theoretical and procedural developments in BMT, (c) the scope and implementation of prevention programs designed to reduce future marital distress, (d) the use and implications of more sophisticated dyadic interaction analysis, and (e) the feasibility of cooperative international research. To these ends, the organizers of the conference, Dirk Revenstorf, Ludwig Schindler, and Kurt Hahlweg, brought together an impressive group of clinical researchers currently conducting BMT studies in West Germany, Holland, England, and the United States. The book is organized into three major sections: Part one focuses on treatment outcome research, part two on the assessment and analysis of marital interaction, and part three on clinical extensions and innovations.

Part One: Treatment Outcome Research

Part One contains eight chapters, six of which are studies of the effectiveness of treatment procedures. Three of the chapters present the outcome of studies involving a component analysis of the standard BMT package. Hahlweg and his colleagues present a description and the results of the large scale Munich study involving 85 couples. They compared their version of the standard Behavioral

Marital Treatment package with one component of BMT, communication skills training, in which the focus is placed on teaching the dyad both speaker and listener skills. The other three components contained in the BMT package included (a) discrimination training in which spouses were taught to focus on identifying positive behaviors in the spouse, (b) problem-solving training during which couples were taught to negotiate behavior change contracts with each other, and (c) "crisis management," an attempt to establish generalization of the skills previously taught by providing training under simulated conditions for situations that were likely to be problematic in the natural environment.

In the study reported by Emmelkamp and his colleagues in Holland, contingency contracting and communication skills were compared with a system-theoretic (insight) approach. Baucom presented data comparing the effectiveness of various combinations of problem-solving, communication training, contingency contracting, and the full package. The balance of Part One consists of Bogner and Zielenbach-Coenen's report on the maintenance of change following BMT, Baucom and Mehlman's comparison of various conceptual models of marital relationships for their power to predict therapeutic outcome, Crowe's demonstration of how to perform a manipulation check on therapist behavior within a comparative outcome study, and Reuben, Wiech, and Zimmer's application of BMT to a new target population, people living in communal households.

The results of the comparative and component analysis studies were quite consistent. BMT is usually shown to be superior to other methods. Within BMT, however, there are generally no statistical differences in outcome regardless of whether the components are used alone, the order of components is controlled, or the entire package is used. All appear to have the same level of effectiveness. The similarity in results may be due to one or more unknown variables, a set common to all treatments, or a variety of other possibilities. Although most of the

studies did use direct observation data to assess couples' interactive behavior, self-report data obtained via questionnaires were heavily emphasized.²

In a thoughtful summary chapter at the end of this section, Jacobson, Follette, and Elwood provide an excellent review of the current status of BMT, a critique of the methodology, and some recommendations for future research. Several of their conclusions and recommendations are worth noting. First, in spite of the relative superiority of BMT, individual couple or spouse response to the standard package or its components has been highly variable. Future research reports should present individual data for couples and spouses. Second, clinically significant improvement must be differentiated from statistically significant improvement. Because no generally accepted criteria are available for the former, we must generate some objective procedures for noting clinical success. Third, the use of standardized programs has considerable disadvantages: They reduce the flexibility that is an effective component of clinical practice. Unfortunately, as Jacobson, Follette, and Elwood point out, the current data base for conducting effective idiographic treatment is based primarily on clinical lore and intuition. Thus, we need to examine the treatment process more carefully, perhaps matching couples to treatment. Fourth, research needs to examine a variety of other variables, such as age, that may be related to the effectiveness of the different components in BMT. Fifth, the spate of measures used in the assessment of BMT, whether self-report or obser-

vational, fails to speak to the issue of the couple's presenting problems. Thus, specific assessment of each couple's marital difficulties is more likely to be based on experimenter inferences rather than on its actual problematic behavior. More care should be taken to examine the impact of treatment on the dyad's presenting problems. The ultimate goal of research, they note, is to predict the response of a particular couple to treatment. Following such recommendations would appear to move current research in marital interaction methodologically closer to a behavior analytic model; however, the heavy reliance on cognitions as explanatory variables makes a rapprochement still unlikely.

Part Two: Assessment and Analysis of Marital Interaction

Part Two contains six chapters. Schaap provides a review of the marital literature on assessment, discusses a number of methodological issues, and provides data from a study comparing distressed and nondistressed couples on several direct observation measures. He points out that much of the research to date has been confounded by inconsistencies, such as length of relationship, presence or absence of children in the home, recruitment procedures, and the assessment of marital adjustment. He also provides some data on various types of reciprocity analysis comparing correlations between the overall rates for husbands and wives with a sequential analysis of reciprocity.

Revenstorf, Hahlweg, Schindler, and their colleagues account for two chapters on the use and analysis of direct observations to assess marital interaction. They present reliability and validity data on a new coding system for marital interaction that is designed to record some of the skills they include in their training program. What I was most pleased to see was the inclusion of some process data in an interesting chapter on time series analysis by the same authors. They had 50 couples rate their satisfaction in six areas of their relationship each day for approximately 100 days. Although inter-

² Notwithstanding the current controversy about the role of observational measures to assess the outcome of behavior therapy (Gottman, in press; Jacobson, in press-a, in press-b; Weiss & Frohman, in press), I have taken the position that, in the functional analysis of behavior, observations of behavior by external observers are a necessary prerequisite for identifying the controlling environmental variables. Self-monitoring procedures, however, can provide critical information about private events that can be shown to be related to other environmental stimuli, and to the control of both overt and covert behavior, and should not be discounted.

observer agreement on these ratings cannot be assessed, such data can still be useful by providing a daily summary of each spouse's reactions to the other to reflect the ongoing effect of therapy. With few exceptions (e.g., Jacobson, 1979) ongoing process data are not readily available in the marital literature. In the same chapter, the authors provide a good rationale for within-subject designs, and examine individual spouse data from distressed and nondistressed couples comparing visual inspection of the data with statistical procedures. Their examination of within- and between-spouse variability as a predictor of marital adjustment proved noteworthy. They found that these daily ratings were a better predictor of summary ratings of marital adjustment 12 months after therapy than they were of immediate posttherapy ratings.

Weiss examined the relationship between a couple's previous interactive history (context), the current interactive contingencies (process), and their own ratings of their just concluded interaction (outcome). The goal of the study was to examine whether couples' expectations, presumably derived from their history (i.e., context), predict their interactive behavior and how well their interactions predict their ratings of their own behavior. Methodologically, self-report measures were used to assess both context and outcome, whereas coding of direct observations by trained coders was used to measure dyadic interaction. Thus, the study, in part, examined couples' verbal behavior on assessment instruments with their performance during problem-solving interactions. Because the assessment procedures occurred over a period of time, the impact of prior measures on those obtained later could be examined and causal inferences made. For example, couples' predictions about how well they would do were positively correlated to their rates of positive interaction; similarly, the rates of couples' positive and negative interactive behavior were moderate predictors of how well they thought they did after the session. These results are interesting, in showing a relationship

between couples' verbal behavior on questionnaires and their social behavior during ongoing interactions. The author's use of hypothetical constructs (e.g., sentiment override, efficacy expectation, and perceived competence), however, to explain the couple's joint history precludes more parsimonious interpretations of the data.

Markman's chapter on the longitudinal study of marital adjustment provides an interesting overview of problems involved in follow-up studies, as well as some provocative results. The goal was to examine whether current communication skill levels could predict later marital adjustment. His primary assessment procedure was a variation of Gottman's "talk-table" (Gottman, Notarius, Markman, Bank, Yoppi, & Rubin, 1976). Couples, sitting across the table from each other, complete several interactive tasks during which they operate two panels of buttons to record the sender's intended impact (from "superpositive" to "super-negative") and the actual impact as recorded by the listener. Impact, but not intent, had been shown to discriminate between distressed and nondistressed couples. Impact scores were also the best predictor of the couples' marital adjustment based on self-report data collected 2.5 and 5.5 years later. The correlations are based on only 9 couples, hence replication is certainly required. Nevertheless, the data suggest that the effect of a response is more important than the label the sender is asked to give it. This is also consistent with the data reported by Revenstorf and his colleagues in the time series chapter using daily ratings of couples' relationships as the predictor variable. This should not come as a surprise to those who have argued for a functional analysis to determine the effect of specific response classes.

Part Three: Clinical Extensions and Innovations

Part Three contains eight chapters, all of them at one level or another arguing for the inclusion of assessment and treat-

ment methods that speak to the importance of cognitive processes in marital interaction. This section of the book also contains a wealth of clinical evidence from some able practitioners. These chapters, however, are not generally data based—they are opportunities for the authors to speculate and conjecture about how to improve existing treatment models.

For example, Jacobson concludes that BMT as currently conceptualized and practiced is limited in effectiveness. After reviewing the literature on perceptual biases of distressed couples, he recommends that we need to expand our procedures not only to change behavior but to change spouses' cognitions and perceptions of each other as well. Schindler and Vollmer suggest that the task of therapy is not only to train skills, but to change stimulus qualities so that the skills can be used effectively. To this end they suggest a set of procedures, primarily self-instructional, for changing the "cognitive processes" that are presumed to govern the controlling stimuli. They also make the distinction between lower-level cognitive processes, such as private speech, and higher-order structures such as values and attitudes. Revenstorf hypothesizes three different processes that may be causally related to the escalation of aversive interactive patterns among maritally distressed couples that he and his colleagues have demonstrated. He suggests that aversive responding may be due to a basic automatic response to stress, the learning history of the individual, and mutual stimulus control. Problems due to stimulus control may be modified using cognitive restructuring and communication skills. Weiss continues the refrain. He recommends that BMT be split into performance-based and cognitive-based components. The former assumes that skill training will affect "attitude" change. Couples, however, "do not respond to behavioral inputs but rather to some affective-cognitive representation of one another that sets the 'value' of any particular bit of behavior" (p. 338). Thus, a cognitive-based component would alter their expectations of values and presum-

ably lead to behavior change and to improved marital happiness.

In other chapters in Part Three, Ben-nun suggests that providing marital therapy for only one spouse may be necessary in some cases and also effective. Following a review of the literature, Methorst concludes that women are far more likely to become psychiatric patients than men and discusses the implications for diagnosis and marital therapy. Appelt criticizes the distinction between marital therapy and sex therapy for couples and argues for the integration of behavioral and cognitive concepts and methods to provide a more comprehensive treatment for both sexual and nonsexual difficulties. In the final chapter of the book, Markman, Floyd, Stanley, and Jamieson present a cognitive-behavioral model they are currently using in a large-scale research project to prevent marital distress. They assume, of course, that sufficient knowledge is available on what constitutes well-functioning, happy marriages to provide a focus for the creation of a set of prevention procedures. The rest of the chapter presents their prevention program in considerable detail and discusses the potential impact of providing couples with specific skills on the assumption that these skills are valuable in the long run.

A BEHAVIOR ANALYTIC PERSPECTIVE

This book needs to be examined in relation to several fundamental characteristics defining radical behaviorism, its philosophy, its methodology, and its analysis of scientific behavior (Day, 1969). Philosophically, radical behaviorism has a foremost interest in the control of behavior, that is, the functional relationships between specific variables and behaviors of interest. Much of behavior is also assumed to be under environmental control. Both behavior and its controlling variables are also observable, publicly or privately. All of these assumptions have pragmatic as well as scientific value. Research that identifies controlling environmental and observa-

ble variables will allow us to manipulate them more effectively towards therapeutic ends.

Methodologically, radical behaviorism has concentrated on the experimental analysis of the behavior of single subjects. This narrow but precise methodology provides a clear examination of the functional relationship between targeted behaviors and environmental antecedents and consequences.

Finally, radical behaviorism also assumes that the verbal behavior of the scientist is no different from the behavior of subjects or patients. Therefore, it too can be examined in terms of those environmental variables which control scientific thought and behavior.

Criterion for Marital Satisfaction

Probably one of the most perplexing issues facing behaviorally oriented researchers and practitioners of marital therapy is the absence of clear external criteria for judging marital happiness or marital distress. Thus, most researchers have depended upon social validation measures, such as self-report. Individual spouses are asked to complete one or more instruments that purport to measure marital satisfaction. These have ranged from simple ratings of satisfaction on a 10-point scale (Azrin et al., 1973) to more comprehensive scales with better psychometric properties. Several validity studies provide support for two of the most commonly used instruments—the Marital Adjustment Scale (Locke & Wallace, 1959) and the Dyadic Adjustment Scale (DAS) (Spanier, 1976). For example, the DAS was validated by comparing the scores of married and newly divorced couples. In general, a mean couple score of 100 on either of these instruments discriminates between distressed and non-distressed couples. Unfortunately, such a distinction is not without error. As Baucom indicated in his chapter on different conceptual models, a mean couple score may be made up of a “satisfied” and a “dissatisfied” spouse. In addition, the scores themselves do not help to identify specific problematic functioning within

each dyad or the variables that control satisfaction in either of the spouses.

Consequently, one major goal of marital research is to identify specific behavioral patterns and contingencies that are functionally related to marital distress. This can be done in at least one of two ways. First, marital satisfaction would be conceptualized as a function of a comprehensive set of situation-specific skills (e.g., those required to prepare meals or be affectionate). Next, a series of task analyses of specific situations within the marital relationship would be performed to identify the specific skills that are required in each setting. Finally, increases in specific skills for couples who have been shown to be deficient in these settings would be shown to be functionally related to successful adjustment in each setting. A second way to identify the behaviors and contingencies that control marital distress is to conceptualize marital satisfaction as being functionally related to a set of skills generalizable to the entire relationship (e.g., problem-solving and communication skills), to demonstrate that these skills discriminate between satisfied and dissatisfied couples, and to demonstrate empirically that those couples receiving training in these skills improve on measures of marital satisfaction.

Research conducted within each of these frameworks would significantly contribute to our understanding of marital satisfaction and interaction. Unfortunately, the majority of the research that has been conducted so far has been based on the second model. Little work has been conducted to perform task analyses of specific situations within a marital relationship that may contribute to marital dissatisfaction and dysfunction. We need to conduct functional analyses of those situation-specific antecedents and consequences that may be accounting for verbal reports of satisfaction or distress.

Experimental Design Issues

Some therapists may argue that the disproportionate use of group designs in the marital literature has interfered with

the development of more precise treatment procedures. Behavioral differences that have been shown between distressed and nondistressed couples are based on group means. Treatment has been directed at groups of maritally distressed couples, with no regard for their individual differences, and success has been determined by group improvements. As Jacobson has argued in this volume, this information tells us little about the effect on the individual couple or individual spouse within each dyad.

The identification of functional relationships between interactional behavior and controlling variables in a single spouse or couple has been sadly lacking. This also reflects the lack of interest in this important area of research by behavior analysts. While several authors in this volume (e.g., Jacobson, and Revenstorf et al.) have hinted about individualizing treatment and collecting data on individual subjects, this has not received much attention. As I read through the volume, I thought, frequently, of the advantages that single subject designs could have for bringing more precision to this area. I find it interesting that a similar recommendation was made almost 10 years ago (Patterson, Weiss, & Hops, 1976).

In this volume, Hahlweg and his colleagues have developed a new coding system for assessing communication skills more precisely. These include both speaker skills (e.g., the use of "I" messages), pinpointing specific behaviors and antecedents, and listener skills (e.g., paraphrasing, giving positive feedback, and self-disclosures). With this improved coding system, Hahlweg needs to conduct research that will demonstrate that the introduction of each component of a communication skills module directly and immediately increases the rate of these skills, one at a time; this will also focus attention on the skill levels of individuals. Training would not be provided in a specific skill, unless that individual showed a deficit in that area. For some, the problem may not be one of a skill deficit, but of a performance deficit

in the presence of specific antecedents (cf. Patterson, 1982). Treatment would be directed at transferring stimulus control of the skills from the therapist to the natural environment. For example, a multiple baseline design across sets of these behaviors could evaluate the power of the interventions. The impact of the acquisition of these skills could then be evaluated on the spouse reports of marital satisfaction. Thus, the relationships between the interventions, the behaviors acquired during interventions, and the social validation measures used as the external criterion could be more precisely evaluated.

Behavioral patterns that have been found to discriminate between maritally distressed and nondistressed groups could be further explored for the functional value they might have for individual couples within single-subject designs. Revenstorf and his colleagues have shown that distressed couples tend to have longer negative interchanges than do nondistressed couples. One goal of therapy would then be to reduce the frequency of these negative chains by teaching different styles of interacting. For example, Revenstorf et al. presented some data showing that the presentation of a problem by one spouse tends to be punished by the other. Although this is true in nondistressed couples as well, the latter's negative interchange ends more quickly. Thus, treatment for distressed couples might focus precisely on teaching them to reduce their rate of punishment for bringing up problems and to focus more on alternate, more productive means of responding. Shifts in such contingencies would provide evidence about the stimuli that are controlling both prosocial and aversive behaviors among the dyad. Demonstrating a statistical effect of treatment via group designs does not provide clear evidence that the effect occurred in all cases or that couples were deficient in the specific targeted behavior prior to treatment.

Group designs can and do serve important purposes. For example, the contrast group designs that are often used can

provide important information about potential controlling variables in a cost-efficient manner. A large number of successful replications of single subjects would be required to provide the same type of data. Although mean group differences do not reflect the effect of every member, they may provide leads for other researchers to follow. In addition, group designs provide data on the relative effectiveness of treatment strategies or packages which cannot be answered within single-subject designs.

The Role of Cognitive Processes

The frequent use of hypothetical constructs to explain marital interaction and/or distress presents several problems. First, the use of such constructs is based on the assumption that subject awareness is a necessary precondition for the effects of social contingencies to occur (e.g., Bandura, 1974). This assumption suggests that people are aware of and can describe the impact of the reinforcement contingencies that impinge upon them at any given moment. Sufficient evidence is available, however, to show that learning can occur without subjects being able to label the actual contingencies (Gewirtz & Boyd, 1977; Rosenfeld & Baer, 1969). As Patterson (1982) has so eloquently argued, the likelihood that we are able to identify and provide verbal labels for the subtle changes in contingencies that occur continuously within social interactions is quite low. The probability is higher that we provide verbal labels (e.g., for the intent or impact of our behavior) when we are prompted to do so, as we are when we participate in studies during which we are asked to complete questionnaires about our marital relationship, prior history, and expectations.

Second, the use of explanatory hypothetical constructs tends to cloud what really is going on. Biglan and Dow (1981), for example, have shown the existence of many similarities between "behavioral" and "cognitive" treatments for depression when examined for their content and procedures, and not for their rationale as explicated by authors with differing the-

oretical positions. Similarly, in reading *Marital Interaction: Analysis and Modification*, if "private verbal events" is substituted for many of the descriptions of cognitive processes, a considerable amount of verbiage can be stripped away to reveal simpler explanations of marital interaction and distress. For example, many of the "cognitive" differences between distressed and nondistressed couples can be reinterpreted as problems related to stimulus control, as Revenstorf and others have shown. Among maritally distressed couples, one spouse's "positive" behavior (i.e., positive to objective observers, cognitive researchers, and others) may have a high probability of setting the occasion for an aversive response from the other member of the dyad. Both covert responses (i.e., negative labelling of the other's behavior) and overt responses (i.e., direct counterattack) are likely to be controlled in this way. Among nondistressed couples, similar behaviors are not discriminative stimuli for the same rate of covert labeling or overt aversive reactions. The therapeutic goal for maritally distressed couples would appear to be to change the stimulus function of the spouse's "positive" behavior so that it ceases to provoke either overt or covert aversive behavior. Thus, postulating hypothetical cognitive constructs that show no relationship to external variables and for which a large proportion of the variance is due to similar methods of measurement (e.g., self-report) may detract from a more precise functional analysis of behavior.

Data presented by Revenstorf, Hahlweg, and their colleagues suggest that another characteristic of maritally distressed couples is their longer aversive interchanges. Thus, we might conclude that the probability of an aversive response following another one is very high and that aversive responses in one member have powerful control over the aversive responding of the other. Rather than postulating cognitive or perceptual deficits, we might borrow from the work of Patterson (1982) who developed the "coercion" hypothesis to account for

similar findings in families of aggressive children. He suggests that aversive responding may be strengthened in families via positive and negative reinforcement paradigms. Aversive interaction occurs until one member of the dyad submits. The termination of aversive behavior in the attacker negatively reinforces the aversive behavior in the victim; at the same time, submission by the victim positively reinforces the aversive behavior of the aggressor. Patterson's simpler hypothesis about the nature of aversive escalation is testable compared to those involving internal cognitive processes that are several levels removed from their controlling external environmental variables. Manipulations of the observable social behaviors that are hypothesized to be reinforcing would quickly provide information about the validity of the hypothesis. The risk in the frequent use of descriptive cognitive terminology to infer relationships between observable variables, in spite of researchers' best intentions, is that it becomes too easy to slip into invalid explanatory and mentalistic mechanisms (cf. Morris, Higgins, & Bickel, 1982). The fundamental issue regarding the value of a cognitive concept is whether it is useful for identifying specific aspects of an individual's behavior that would lead to procedures for instituting behavior change (Biglan & Kass, 1977).

As indicated earlier, the verbal behavior of scientists must also be examined as a function of environmental variables. In one sense, this book reflects the likelihood that researchers in marital therapy appear to be heavily reinforcing one another for postulating cognitive variables to explain less than desirable treatment effects. It does not appear necessary to jump ship, so to speak, and conclude that variance in treatment effects is either due to internal or external processes. More precise investigations on single subjects that identify controlling variables that are observable and that can be manipulated and tested appear to be a reasonable alternative response. In fact, Jacobson, in a cautionary note, identifies a similar danger for patients involved in

treatments which emphasize cognitive strategies. He suggests that couples may be taught "to intellectualize and analyze their problems instead of modifying their behavior" (p. 305). In other words, cognitive treatments may simply manipulate the couples' verbal behavior, which will also be reflected on those instruments purporting to measure cognitive functioning. This has already been shown to be the case (see Baucom). Several other authors in this volume (e.g., Weiss and Schindler) also caution the reader about accepting their recommendations for the integration of cognitive and behavioral strategies too quickly. All agree that the data in support of cognitive strategies are not yet in and much further research is still required.

CONCLUSION

In a sense, this volume represents the history of the development of a behavioral approach to the treatment of marital distress. Its history is not different from other developments of intervention procedures that have occurred. First, we acknowledge that a problem exists: Marital distress is a real problem, the divorce rate continues to increase, and practitioners are asked to assist distressed couples. Next, researchers develop and evaluate intervention programs and assessment instruments based on their theoretical orientations; for instance, behaviorally oriented researchers focus on the development of specific conflict resolution skills and behavioral observation coding systems that are presumed to measure such skills. The interventions and the assessment procedures are based on face validity and armchair speculation about the nature of marital interaction and distress. Based on the data obtained, modifications in the procedures are made to improve further our ability to assist couples in conflict. The process may continue indefinitely.

The development of assessment instruments had lagged behind the development of intervention procedures. This is aptly represented in this volume with the presentation of assessment instru-

ments described in Part Two rather than Part One. Since intervention is inexorably tied to assessment within a behavioral framework, progress in the former cannot proceed beyond progress in the latter. The volume presents some interesting new developments in assessment instruments and in methods for interpreting these data that may provide better guidelines for future researchers. One example is Revenstorf, Hahlweg, Schindler, and their colleagues' attempts to use sequential analysis procedures to identify the behavioral contingencies in the husbands' and wives' social behavior that may be controlling each other's behavior.

The only other difficulties with the book that might be mentioned here are structural. The writing is at times quite choppy. Introductions in some chapters are all too brief, and discussions and interpretations of their results are on occasion wanting, but this is not true of all chapters. I would have liked to have seen a summary chapter at the end of Parts Two and Three similar to Jacobson's at the end of Part One. This might have created more cohesion for each section and for the book as a whole.

At the very least, this book presents an excellent summary of the current conceptualization of marital interaction, distress, and therapy from a behavioral perspective with clear indications of what the immediate future promises in terms of methodological and conceptual innovations. Consequently, anyone interested in examining a behavioral model of marital therapy would profit from reading this work. Behavior analysts should read it as a necessary prompt for further design and conduct of research in this important area of research and practice.

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