January 1999

Patterns of Relational Communication in Conjoint Behavioral Consultation

William P. Urchul
North Carolina State University

Susan M. Sheridan
University of Nebraska - Lincoln, ssheridan2@unl.edu

Deiredre A. Ryan
Spectrum Center for Educational and Behavioral Development, Berkeley, CA

Priscilla F. Grissom
North Carolina State University

Cynthia E. Killough
North Carolina State University

See next page for additional authors

Authors

William P. Urchul, Susan M. Sheridan, Deiredre A. Ryan, Priscilla F. Grissom, Cynthia E. Killough, and Deborah W. Mettler

Patterns of Relational Communication in Conjoint Behavioral Consultation

William P. Erchul, *North Carolina State University*

Susan M. Sheridan, *University of Nebraska–Lincoln*

Deiredre A. Ryan, *Spectrum Center for Educational and Behavioral Development, Berkeley, CA*

Priscilla F. Grissom, Cynthia E. Killough, & Deborah W. Mettler, *North Carolina State University*

Corresponding author: William P. Erchul, Department of Psychology, North Carolina State University, Raleigh, NC 27695-7801. E-mail: erchul@poe.coe.ncsu.edu.

Abstract

Conjoint behavioral consultation (CBC) is a structured model of service delivery that joins parents and teachers in collaborative problem-solving with the assistance of a consultant-psychologist (Sheridan, Kratochwill, & Bergan, 1996). CBC is carried out through the conduct of problem identification, problem analysis, and treatment evaluation interviews. In this CBC process study, interpersonal relationship patterns occurring within interviews were examined using the Family Relational Communication Control Coding System (Heatherington & Friedlander, 1987). Four CBC cases, consisting of 9,696 individual messages, were coded from audiotapes and verbatim transcripts. Scores on the variables "domineeringness" and "dominance" were calculated for each participant in order to assess patterns of relational control. Results suggested that consultants and consultees were generally consistent with each other in their levels of domineeringness and dominance. Consultants received slightly higher scores than consultees in their attempts to structure the CBC interactions (domineeringness), and consultees received slightly higher scores than consultants with respect to influence (dominance).

121

Conjoint behavioral consultation (CBC) is a structured model of service delivery that joins parents and teachers in collaborative problem-solving with the assistance of a consultant-psychologist. In this model, the relationship between home and school is viewed as a cooperative and interactive partnership with shared ownership and responsibility for problems and solutions. Among the assumptions of CBC are that parents and teachers will share information, learn from each other, value each other's input, and incorporate each other's insights into intervention plans. As such, collaborative problem-solving between home and school systems is believed to afford the greatest benefits (Sheridan & Kratochwill, 1992).

CBC is implemented in four stages (problem identification, problem analysis, treatment implementation, treatment evaluation), and is operationalized via a series of behavioral interviews (Bergan & Kratochwill, 1990; Sheridan, Kratochwill, & Bergan, 1996). By involving individuals from various systems within a child's life (*i.e.*, home and school), a comprehensive problem definition is likely; identifying setting events that are contextually or temporally distal to target behaviors is also possible. Further, cross-setting intervention strategies are believed to control behavioral side effects and enhance generalization and maintenance of treatment effects. To date, CBC outcome studies conducted have yielded positive results (*e.g.*, Colton & Sheridan, 1998; Galloway & Sheridan, 1994; Myers, Haskett, & Erchul, 1998; Sheridan, Kratochwill, & Elliott, 1990).

Within the school psychology literature there exists a body of research, conducted since the mid-1970s, which has examined the face-to-face communication that occurs during the psychologist/teacher consultation. Although a comprehensive review of this literature is beyond the scope of this article, it is useful to acknowledge the distinction between research that used content coding methodology versus relational coding methodology (Martens, Erchul, & Witt, 1992; Witt, 1990). Content coding systems emphasize individuals' isolated verbal behaviors, as well as the literal meanings of exchanged messages (Heatherington & Friedlander, 1990). Bergan's (1977) Consultation Analysis Record (CAR)—with the exception of its message control category—is an example of a content coding system. Representative studies of consultation that have employed the CAR have been conducted by Bergan and Tombari (1975, 1976), Gutkin (1996), and Martens, Lewandowski, and Houk (1989).

In contrast, relational coding systems emphasize the connectedness of individuals as well as the pragmatic (*i.e.*, control-related) aspects of messages (Heatherington & Friedlander, 1990). At least six relational coding systems have been reported in the speech communication literature, each based on Bateson's (1958) theory of schismogenesis and its associated concepts of complementarity and symmetry (Erchul, 1987). (Definitions of these and other terms related to relational communication theory and research may be found in Table 1.) Consultation research studies that have employed relational coding systems are Erchul

(1987), Erchul and Chewning (1990), Erchul, Covington, Hughes, and Meyers (1995), Martens *et al.* (1992), and Witt, Erchul, McKee, Pardue, and Wickstrom (1991).

Perhaps the best known of the relational coding systems is Rogers and Farace's (1975) relational communication control coding system (RCCCS). Within the RCCCS, each message is assigned a three-digit code. The first digit indicates the speaker and the second digit refers to the grammatical form of the message (*e.g.*, assertion or question). The third digit indicates the metacommunicational function that the message serves, relative to the message preceding it (*e.g.*, topic change or answer). After these message codes have been assigned, control codes are specified for each message. Control codes, based on second- and third-digit message code combinations, are either one-up, one-down, or one-across. A *one-up* code signifies a bid for dominance and an attempt to control the relationship. Examples of one-up messages include instructions, orders, and topic changes. A *one-down* code reflects an acceptance of, or request for, another's definition of the relationship. Examples of one-down messages are those offering support or agreement. A *one-across* code signifies a message that is not concerned with defining control issues or one that seeks to neutralize relational control. An example of a one-across message is an assertion that continues the theme of the current discussion. Control codes are then analyzed in the context of previous and succeeding messages in order to operationalize complementarity (*e.g.*, one-up, one-down exchanges) and symmetry (*e.g.*, one-up, one-up exchanges) (Heatherington & Friedlander, 1987; Rogers & Farace, 1975).

In a process-outcome study of behavioral consultation, Erchul (1987) used the RCCCS to examine eight psychologist–teacher dyads. The variables investigated were domineeringness (percentage of Person A's total messages that are coded as one-up) and dominance (percentage of Person A's one-up messages that are followed by one-down messages by Person B). These variables derive from relational communication research conducted by Courtright, Millar, and Rogers-Millar (1979) and Rogers-Millar and Millar (1979). Erchul's key results were the following: (a) consultants controlled the process across all three consultation interviews, suggesting that behavioral consultation is characterized by a complementary relationship between consultant and teacher; (b) consultee domineeringness scores correlated –.81 with consultant perceptions of consultee willingness to collect baseline data, suggesting that more domineering consultees were viewed by consultants as less willing to participate in a significant behavioral consultation activity; and (c) consultant dominance scores correlated .65 with consultee perceptions of consultant effectiveness, suggesting that more dominant consultants were viewed more favorably by consultees. Although this last finding was not statistically significant using a conventional .05 alpha level, a follow-up study by Erchul and Schulte (1990) obtained a correlation of .65 (*p* < .05) between variables using a larger sample.

Table 1. Definitions of Key Terms Used in Relational Communication Theory and Research

Term	Definition
Terms from Bateson's (1958) Theory of Schismogenesis	
Symmetry	A relationship type characterized by a minimization of differences between individuals (*e.g.*, A and B both attempt to seek control or give up control to the other). Symmetry becomes dysfunctional, or schismogenic, when escalation and/or competition occur.
Complementarity	A relationship type characterized by a maximization of differences between individuals (*e.g.*. Person B usually complies with Person A's demands). Complementarity becomes dysfunctional, or schismogenic, when these relational differences become too rigid and/or exaggerated, thus polarizing individuals.
Reciprocity	A relationship type that is balanced with respect to symmetry and complementarity; represents the best way to avoid schismogenesis.
Schismogenesis	A process triggered by extreme types of symmetry or complementarity that results in poor relational outcomes; can be corrected through the development of a reciprocal relationship.
Terms from Rogers and Farace's (1975) RCCCS and Heatherington and Friedlander's (1987) FRCCCS Coding Systems	
Assertion	A completed referential statement, either declarative or imperative in form.
Closed question	A direct question that limits a person's answer to a small set of response options.
Open question	An open-ended question that is phrased to permit a range of possible answers.
Talkover	An interruption, used by a speaker to enter a conversation.
Incomplete	A message that is started but not finished.
Intercept	In conversations involving three or more speakers, an interruption of an ongoing dyadic message exchange by a third person.
Support	A message that gives or seeks agreement, assistance, acceptance, or approval.
Nonsupport	A message indicating disagreement, rejection, or challenge.
Extension	A message that continues the flow or theme of the preceding message.
Disconfirmation	A message that ignores another speaker's request for information, action, opinion, etc.
Topic change/ shift	A message that introduces a new idea immediately after some discussion of a different idea.
One-up ($\Uparrow$)	A control code assigned to a message indicating an attempt to assert definitional rights and to control the relationship by directing the communication process.
One-down ($\Downarrow$)	A control code assigned to a message indicating an acceptance of, or request for, another person's definition of the relationship.
One-across ($\Rightarrow$)	A control code assigned to a message indicating a nondemanding, nonaccepting, leveling movement that has no implications for relational control.

Table 1. Continued

Term	Definition
Terms from Courtright, Millar, and Rogers-Millar's (1979) and Rogers-Millar and Millar's (1979) Research Studies	
Domineeringness	A monadic, or individually defined, measure of a person's attempts to control and/or define a relationship; operationally defined as the number of a person's one-up ($\Uparrow$) messages divided by the total number of his or her messages. In consultation research, domineeringness may be considered more appropriately as a measure of directiveness.
Dominance	A dyadic measure of complementarity and, more specifically, relational control. For Person A, operationally defined as the proportion of one-down ($\Downarrow$) messages given by Person B to all one-up ($\Uparrow$) messages offered by A. In consultation research, dominance may be considered more appropriately as a measure of one's demonstrated influence over another, thereby indicating the presence of a "give and take" pattern of cooperation (Erchul & Chewning, 1990), teamwork (Erchul *et al.*, 1992), cooperative partnership (Zins & Erchul, 1995), partnership (Gutkin, 1996), and/or collaboration (Gutkin, 1997).

Terminology remains a major stumbling block for those wishing to understand the consultant–consultee relationship. For example, Erchul's (1987) use of the terms domineeringness and dominance to characterize aspects of this relationship has not always been welcomed, due to negative connotations associated with social power and interpersonal control (Erchul, 1992; Erchul & Martens, 1997). Negative connotations aside, it should be noted that domineeringness and dominance have very specific, operationalized meanings within relational communication research (Courtright *et al.*, 1979; Rogers-Millar & Millar, 1979), most of which has investigated communication between spouses. Although the study of domineeringness and dominance may have advanced consultation research efforts, these variables unfortunately have not been well translated into concepts that consultation practitioners can readily understand and use.

To help remedy this situation we propose that, with respect to school consultation, domineeringness be considered an index of a person's directiveness or his or her *attempts* to structure or define relationships in consultation. However, because domineeringness is an individual measure of relational communication, it cannot offer any information on how Person B responded to Person A's attempts to direct or structure the course of the interview. We therefore propose that dominance be considered an index of a person's demonstrated influence or *success* in defining relationships in consultation. This conceptualization is consistent with sev-

eral concepts: what Erchul and Chewning (1990) described as "cooperation" (*i.e.*, when there is a leader and a follower and each understands the other's role); what Erchul, Hughes, Meyers, Hickman, and Braden (1992) termed "teamwork" (*i.e.*, the presence of cooperation, plus the possibility that leader and follower roles may change over the course of consultation); what Zins and Erchul (1995) described as a "cooperative partnership" (*i.e.*, when participants work jointly but realize their differing levels of need and expertise necessitate a complementary relationship); and what Gutkin (1996) delineated as a "partnership" (*i.e.*, when participants share communication leadership). Furthermore, neither dominance nor any of these four terms seem inconsistent with certain operational definitions of "collaboration" (*e.g.*, Gutkin, 1997).

It is realized that some alternative meanings may result from these translations. We believe, however, that advancing this view of domineeringness and dominance is necessary in an attempt to place it more appropriately in the context of consultation. Although studies assessing the construct validity of the RCCCS within consultation exchanges have not been conducted to date, sufficient differences exist between marital and consultative relationships to suggest the importance of such translations. Further, the terminology used in the original RCCCS promotes an unfortunate depiction of school consultation as necessarily involving a "power struggle" between consultant and consultee (Erchul, 1993). It may be more accurate and constructive to study relational issues within consultation in terms of a neutral interactional view of psychologist–teacher communication.

Despite the presence of empirical studies that have examined interpersonal communication in psychologist–teacher consultation, there have been almost no comparable studies within conjoint behavioral consultation. Perhaps the relatively recent introduction of CBC explains the fact that only one study (Sheridan, 1997) has attempted to describe how consultants, teachers, and parents communicate during CBC. However, the need for such research becomes readily apparent when one considers the importance of understanding group functioning for the effective practice of school psychology (Gutkin & Nemeth, 1997). Sheridan's (1997) descriptive study using the CAR revealed that CBC consultants directed more of the discussion than did consultants involved in psychologist-teacher consultation. Specifically, CBC consultants initiated 56% of the total interview statements, compared to 26% for consultants involved in teacher-only consultation. Another finding illustrating consultant directiveness was that 79% of all elicitors (*i.e.*, messages with interpersonal control implications that request information) occurring during the problem identification interview in CBC were made by the consultant. Also of interest was that parents and teachers appeared to contribute approximately equally to CBC problem identification interviews, as indicated by total statements made by each participant.

The use of the RCCCS to code CBC interviews—minimally involving consultant, teacher, and parent—would appear problematic because the cod-

ing system was designed to assess dyadic rather than small group interaction. Fortunately, the RCCCS has been extended to group and family contexts by Heatherington and Friedlander (1987), who created the Family Relational Communication Control Coding System (FRCCCS). In developing the FRCCCS, Heatherington and Friedlander identified features unique to group communication, including: (a) the use of indirect targets as recipients of messages; (b) the use of intercepts—a "speaker's intrusion on the previous two speakers' exchange" (Heatherington & Friedlander, 1989, p. 142); and (c) the occurrence of particular kinds of discontinuation, such as when a speaker bypasses the previous speaker by addressing a different party. In other words, the FRCCCS allows for the analysis of group interactions in which speakers may speak to more than one person at a time, and in which preceding and subsequent speaking turns are not necessarily reciprocal messages.

The purpose of this study was to understand more completely the patterns of relational communication that unfold during CBC by using the FRCCCS to code CBC interviews. Our intent was to "map" patterns of relational communication that exist within CBC cases by investigating who is speaking to whom and with what degree of relational control. Given prior research (Erchul, 1987; Sheridan, 1997), it was hypothesized that consultants would exhibit a higher degree of directiveness (*i.e.*, domineeringness) and successful influence (*i.e.*, dominance) than either teachers or parents.

METHOD

Settings and Participants

Original data collection took place at two different sites. Major reasons for including cases from more than one site were to consider the implementation of CBC in different settings and to enhance the potential generalizability of results.

Two cases were conducted as part of dissertation research at Alfred University (Ryan, 1995). These consultants were selected upon professor recommendation as possessing strong consultation and interpersonal skills. Both consultants were female doctoral students.

Two additional cases were selected from ongoing CBC research at the University of Utah (Sheridan *et al.*, 1996). These cases were also conducted by female doctoral students, and were part of their respective dissertation research. They were selected based on the high degree of CBC process integrity demonstrated by consultants, and in an effort to explore relational patterns under variable case characteristics (*i.e.*, the nature of the cases at Utah was social and academic, whereas the cases from Alfred presented primarily behavioral concerns). Further, cases at the University of Utah were selected partly due to the availability of complete transcripts at the time of this study.

Consultant Training

Consultants at both sites were trained in the CBC procedures, as outlined in Sheridan *et al.* (1996), which generally emphasizes CBC as an extension and application of behavioral consultation's problem-solving techniques (Bergan & Kratochwill, 1990) to home-school partnerships. Both outcome and process goals of CBC are outlined in Sheridan *et al.* (1996). Examples of outcome goals include improving client behaviors and consultee skills. Process goals encompass enhancing home-school relationships and co-equal sharing in problem resolution.

The training of Alfred University consultants was conducted on a weekly basis during the fall semester of the 1994–1995 academic year. Consultants were trained in the behavioral and conjoint models of consultation by the third author, using procedures found to be effective in teaching consultation skills (Kratochwill, Van Someren, & Sheridan, 1989; Sheridan, 1992). Specifically, the training materials consisted of a behavioral consultation manual (Kratochwill & Bergan, 1990); a CBC manual (Sheridan *et al.*, 1996); an interpersonal skills training manual (Carrington Rotto, Sheridan, & Salmon, 1987); and videotapes depicting the three interviews of both behavioral and conjoint behavioral consultation. Materials were reviewed and discussed with both consultants during the course of the weekly sessions.

In addition to these materials, each consultant conducted a practice case. Following each interview, the consultants met with the third author and received supervision and feedback. Consultants also maintained a log of interpersonal skills and goals (Carrington Rotto *et al.*, 1987) during the duration of the practice cases. Concurrent with the weekly training, the consultants read research articles in the areas of behavioral consultation, CBC, home-school collaboration, and behavioral interventions. At the conclusion of their training, the consultants conducted a presentation on CBC to a graduate class.

The University of Utah consultants received training through their involvement in competency-based behavioral consultation training programs. Specifically, each consultant underwent extensive didactic and field-based training on the principles and procedures of behavioral consultation (see Kratochwill, Sheridan, Carrington Rotto, & Salmon, 1992, and Sheridan, Salmon, Kratochwill, & Carrington Rotto, 1992, for reviews of the training model). Materials used for training were identical to those used in the Alfred training program. Upon attainment of an 85% mastery of consultation objectives (as determined by independent raters), each consultant completed field-based cases involving either consultant–teacher dyads or consultant–teacher–parent triads. These field cases were closely supervised by experts in the field of behavioral consultation and CBC. Cases reviewed in the present study were completed following their respective consultation training programs.

Case Descriptions

Alfred University. The first case concerned "Earl," a 4-year-old child who had been involved in an early childhood special education program for 10 months. He displayed noncompliance to requests at home and school. Specifically, his mother and teacher reported that Earl did not immediately respond to instructions to stop inappropriate or potentially dangerous behavior (*e.g.*, running out of the house or classroom, standing on the furniture, and playing roughly with his peers). Earl's parent and teacher reported incidences of noncompliance approximately three and four times daily across home and school, respectively. The goal was to increase Earl's compliance from a baseline level of 20-60%. Data collected after 4 days of positive reinforcement-based treatment indicated that Earl made some progress toward the goal of 60%. That is, school data indicated an overall average of 38% compliance, with a range of 25–50%. Treatment data reported by Earl's mother suggested an overall compliance rate of 25%. The mother and consultant recognized that the intervention required several modifications in order to be more successful, which were attempted. However, because it was the end of the school year, no follow-up data were collected. It is possible that greater treatment gains may have been evident had the intervention been implemented over a longer period of time.

The second case at Alfred University was "Art," a 4-year-old child who had been involved in early childhood special education programming for 1 year and 4 months. Art exhibited difficulties in sharing toys and food with others at home and school. During CBC, a target goal was established in which Art was to share at least once daily in both settings. An intervention plan was developed in which Art received a material reinforcer (*i.e.*, one penny) each time he shared at home, and verbal and material reinforcers for sharing at school. A larger reward was given if Art demonstrated at least five instances of sharing behavior by the end of the week. An evaluation after approximately 1 week of treatment implementation revealed that Art met the school goal (*i.e.*, he shared between two and four times daily at school) and approached meeting his home goal (*i.e.*, he shared four out of six days at home). It was decided that Art's mother, with the assistance of his summer school teacher, would continue with a similar intervention plan over the summer months.

University of Utah. The first case involved "Jane," an 8-year old girl who consistently failed to complete assigned homework in math. When she did complete assignments (only 35% of the time), her accuracy rates were very low (mean of 26.5%). During CBC, a goal of 80% was established for both work completion and accuracy. The intervention was a home-school note program that provided daily feedback concerning Jane's success in performing specific behaviors related to task completion and work skills during math. Also, for each day that completion and accuracy goals were met, Jane received a reinforcer from a "grab bag."

Jane was successful for 2 days but then refused to participate because she was not receiving reinforcers at home, due to a misunderstanding of the criteria for reinforcement by her mother. Following clarification of the intervention with Jane and her mother, her performance improved and remained stable. A 7-week follow-up evaluation indicated that Jane completed an average of 96.8% of assignments with an accuracy average of 96.2%.

The second Utah case concerned "Sherry," a 9-year old girl whose initiation of interactions with peers was infrequent. "Initiation" was defined as "approaching a peer and emitting a question or making a statement, clearly suggesting mutual participation in an activity, or requesting a response from the peer." One week of baseline data showed that Sherry made only one peer initiation at school and one at home. The goals were to increase Sherry's initiations to three at school and one at home each day. The components of the CBC intervention were goal-setting, self-monitoring, positive reinforcement, and home-school communication. An evaluation held after 8 days of the intervention revealed an average of seven initiations per day at school and an average of two initiations per day at home. A 4-month follow-up evaluation indicated that Sherry had maintained the level of these behaviors.

More information pertaining to Jane and Sherry may be found in Sheridan *et al.* (1996, pp. 102–114; pp. 123–138). To facilitate comparisons. Table 2 summarizes major features of all four cases.

Family Relational Communication Control Coding System (FRCCCS)

The Family Relational Communication Control Coding System (FRCCCS; Heatherington & Friedlander, 1987) summarizes verbal interaction in family and other group contexts. The FRCCCS focuses on the interpersonal control functions of speech turns between participants in a conversation (*i.e.*, process) rather than on the meaning of specific messages made by group members (*i.e.*, content). The FRCCCS is an extension of the Rogers and Farace (1975) relational communication coding system (RCCCS), used previously in consultation research by Erchul (1987) and Martens *et al.* (1992).

Before coding with the FRCCCS begins, verbatim transcripts of group interactions are prepared from audiotapes or videotapes (preferred). The smallest unit of analysis within the FRCCCS is a message, defined as a speech act that serves as a response to a previous speaker—as well as a stimulus for the next speaker. Using transcripts, each conversational turn is marked, thus specifying the number and location of messages in the dialogue to be coded. Talkovers or speaker interruptions are also marked at this time (Heatherington & Friedlander, 1987).

Following transcript preparations, trained judges assign codes to each message along three dimensions: participant, format, and response mode. *Participant refers* to the speaker, direct target(s) (a person whom the speaker addresses), and indirect target(s) (a person, physically present, whom the

Table 2. Characteristics of Client Participants

	Earl	Art	Jane	Sherry
Site	Alfred University	Alfred University	University of Utah	University of Utah
Age	4	4	8	9
Gender	Male	Male	Female	Female
Grade	Preschool	Preschool	3	3
Regular Education/ Special Education Status	Identified special needs student	Identified special needs student	General education student	General education student
Target Behavior	Complying with instructions	Sharing	Work completion and accuracy	Social initiations
Goal	Increase compliance with instructions from 20-60%	Demonstrate one sharing behavior per day at home and one per day at school	Improve work completion from 25–80% and accuracy from 26.5–80%	Increase daily social initiations from 1–3 per day at school, and one per day at home
Nature of Intervention	Positive reinforcement during high preference activities	Positive reinforcement with immediate and back-up reinforcers	Home-note and positive reinforcement	Goal-setting, self-monitoring, and positive reinforcement
Outcome	38% compliance at school; 25% compliance at home	2-4 daily sharing behaviors at school; sharing behaviors on 4 of 6 days at home	94.8% completion; 86.5% accuracy	seven daily initiations at school; two daily initiations at home
Goal met at school?	Partially met	Yes	Yes	Yes
Goal met at home?	No	Partially met	NA	Yes

speaker mentions but does not address). *Format* is the grammatical or structural form of the message (*e.g.*, open or closed question). *Response mode* refers to the pragmatic or metacommunicational function that the message serves relative to the preceding message (*e.g.*, answer, topic shift; Heatherington & Friedlander, 1987). After all messages are coded, control codes (one-up, one-down, or one-across) are assigned to each message code according to rules specified in the FRCCCS manual. Table 3, which contains the matrix of FRCCCS code categories and control code assignments, highlights aspects of the preceding discussion.

After all messages have been assigned control codes, frequencies or percentages of types of messages may be placed in a matrix of messages sent and messages received. This matrix facilitates detection of certain patterns, such as the proportion of one-up messages sent by Person A to Person B. It is also helpful in approximating values of monadic (individual) variables such as domineeringness. To analyze relational patterns of interaction, the list of sequential, paired message control codes is examined to identify the number and kinds of reciprocal exchanges. These patterns either can be complementary (*e.g.*, one-up followed by one-down), symmetrical (*e.g.*, one-up followed by one-up), or transitory (*e.g.*, one-up followed by one-across). After reciprocal exchanges are identified, dyadic variables such as dominance can be calculated. Additionally, patterns of triadic relational control moves, in which a speaker sends a message to more than one target, can be analyzed. Examples of such moves are simple triadic moves, complex triadic moves, parallel triadic moves, and coalitionary moves (Heatherington & Friedlander, 1987, 1990). It should be noted that the present study did not include any triadic analyses; for this reason, definitions of the triadic moves were not included in Table 1.

Adequate reliability and validity exist for the FRCCCS. In an investigation of family communication using the FRCCCS, Heatherington and Friedlander (1989) obtained high levels of intercoder reliability, with Cohen's kappa ranging from .52 to .97 ($M = .82$). The RCCCS, the original dyadic coding method, has been used extensively to study individual psychotherapy and couples' communication; in these contexts, intercoder agreement rates have been reported at 86% (Ericson & Rogers, 1973) and 92% (Mark, 1971), and kappas at .66 (Tracey & Miars, 1986) and .90 (Heatherington, 1985). In a study of relational communication in school consultation, Erchul (1987) obtained kappa intercoder reliabilities of .93 for message format categories and .85 for response mode categories.

With respect to validity, Siegel, Friedlander, and Heatherington (1992) demonstrated criterion-related validity of the FRCCCS. Their overall design contained verbal and nonverbal components and focused on measures of "observer accuracy," established through correspondence between observer judgments and predetermined coded interactions. Findings having implications for verbal coding supported the one-up code assignments made in the FRCCCS. Gaul, Si-

Table 3. FRCCCS Message Code Categories and Control Code Assignments (as Used in this Study)

Format	Support	Nonsupport	Extension	Answer to Open Question	Answer to Closed Question	Instruction	Order	Disconfirmation	Topic Shift
								Response Mode	
Assertion	⇒	⇐	⇑	⇐	⇒	⇐	⇐	⇐	⇐
Closed Question	⇒	⇐	⇐	⇐	⇐	⇐	0	⇐	⇐
Open Question	⇒	⇐	⇐	⇐	⇐	⇐	0	⇐	⇐
Talkover	⇒	⇐	⇐	⇐	⇒	⇐	⇐	⇐	⇐
Incomplete	⇒	⇐	⇑	⇐	⇐	⇐	⇐	0	⇐
Intercept	⇒	⇐	⇐	⇐	⇐	⇐	⇐	⇐	⇐

Note. "Indistinguishable" is omitted from this table. Cells with "0" signify that the particular format/response mode combination is impossible. Certain aspects of the FRCCCS have been changed from Heatherington and Friedlander (1987); see text for details. Definitions of terms and symbols are found in Table 1.

mon, Friedlander, Cutler, and Heatherington (1991) showed support for the validity of the FRCCCS and its ability to detect triadic communication patterns by documenting a significant correspondence between the perceptions of family therapists and FRCCCS control code assignments. Other studies of the original RCCCS have provided reasonable demonstrations of the coding system's predictive and criterion-related validity, including those by Ayres and Miura (1981), Folgerand Sillars (1980), Heatherington (1988), and O'Donnell-Trujillo (1981). For example, Heatherington (1988) demonstrated criterion validity of the RCCCS by documenting that outside observers' perceptions of control dynamics generally matched those constructed by the researcher, according to the RCCCS control code assignments. Of interest to the present study was Heatherington's unexpected finding that observers tended to perceive questions that extend dialogue as more controlling than the RCCCS would indicate.

It should be noted that research investigating the psychometric qualities of the FRCCCS and RCCCS has been conducted primarily within the context of marital communication or counseling relationships (with the exception of Erchul's research). Thus, generalization of constructs investigated in these studies to consultation-based interactions is relatively uncertain.

Measures

The two summary measures of interest in this study were domineeringness and dominance. Domineeringness for Person A is the number of A's one-up messages divided by the total number of A's messages. Domineeringness is a monadic (*i.e.*, individual) variable that is considered a measure of a person's directiveness or attempts to define a relationship. Dominance for Person A is the proportion of one-down messages given by Person B to all of Person A's one-up messages. Dominance is a dyadic variable and may be considered a measure of influence or success in defining a relationship (Courtright, Millar, & Rogers-Millar, 1979; Erchul, 1987; Rogers-Millar & Millar, 1979).

Procedure

The transcripts analyzed for this study were generated from cases that were part of larger CBC outcome studies. At both sites, and under appropriate supervision, consultants conducted cases that consisted of the three CBC interviews. Interviews typically were 50-60 minutes in length, although several lasted about 90 minutes. All sessions were audiotaped and the audiotapes were transcribed verbatim—including any verbal utterances made by each participant in the interviews.

The integrity with which consultants conducted CBC interviews (*i.e.*, process integrity) was assessed directly, using procedures suggested in previous research (Kratochwill *et al.*, 1992; Sheridan, 1992). Checklists of interview objectives were adapted from Kratochwill and Bergan (1990) and used in previous research (Gallo-

way & Sheridan, 1994; Sheridan et al, 1990). At both sites, independent, trained observers listened to all audiotapes and recorded the extent to which consultants achieved criterion objectives that were previously identified for the successful completion of each of the three interviews (*i.e.*. Problem Identification [PII], Problem Analysis [PAI], and Treatment Evaluation [TEI]). On average, consultants exceeded the recommended 80% competency level across all interviews. Specifically, the Alfred consultants demonstrated 100% and 97% attainment of interview objectives for the cases of Earl and Art, respectively. Utah consultants met 85% and 98% of the CBC interview objectives for the cases of Jane and Sherry, respectively. Separate sets of independent observers at the two universities listened to the tapes and achieved an average of approximately 90% interrater agreement of the interview objectives.

Coding

Three coders at North Carolina State University received approximately 30 hours of individual and supervised group practice with the FRCCCS. The coding of actual interviews from audiotapes and verbatim transcripts began after pairwise coder agreement reached 91 % for second digit (format) categories and 75% for third digit (response mode) coding categories. Each coder then coded four interviews independently, with a reliability check occurring after the first two were completed. All together, 9,696 separate messages were coded; of these, 9,545 were direct messages and 151 were indirect. Because less than 2% of all coded messages were of the indirect type, these messages were deleted from further analysis. After messages were coded, control codes were assigned to messages and domineeringness and dominance scores for each participant were computed.

With four exceptions, coding procedures were followed as specified by Heatherington and Friedlander (1987). First, because audiotapes rather than videotapes were used (thereby minimizing the number of cues available to identify speakers and listeners), the first author specified all direct and indirect targets for each message prior to coding. Second, Heatherington and Friedlander's format category of "unsuccessful talkover" was not used for two reasons: Rogers and Farace (1975) did not designate this category in their original description of the RCCCS and, although during the coding process it was not generally difficult to specify who executed a successful talkover, at times the poorer quality of the audio recordings made it difficult to identify a speaker whose talkover was unsuccessful.

Third, we assigned a control code of one-up to open question-extension messages (See Table 3); in contrast, Heatherington and Friedlander consider open questions that extend dialogue as one-down messages. Our reasoning was based on a number of factors. First, the tradition of behavioral consultation—the theo-

retical and procedural basis for CBC—holds that controlling consultee verbal behavior is an important goal, and one best accomplished through strategic use of elicitors, which often are open questions. As Bergan and Kratochwill (1990) have stated: "The central function of the elicitor in consultation is to influence the verbal behavior of the consultee" (p. 62). Second, in a study of the counseling process, Heatherington and Alien (1984) noted that the RCCCS's coding of questions as one-down perhaps is not valid. The authors based their conclusion on the frequent and counterintuitive result that the RCCCS views the party who seeks assistance—the client—as more controlling mainly because he or she asks fewer questions than does the therapist. In their opinion, a valid relational coding system should reveal the therapist to be the one who is more controlling. Third, Heatherington (1988), in a validity study of the RCCCS, commented, "[i]n the counseling process...it can be argued that asking certain kinds of *extending questions* [emphasis added] is a means of attempted control of the conversation by [implicitly] demanding information from the other, who complies by answering [one down] and then waits for the next question" (p. 45). Finally, our modification to the FRCCCS was implemented in order to make the present research more comparable to prior consultation research.

Fourth, we created a decision rule that, when pairing messages for the purpose of determining dominance scores, a coder may consider only up to four previous speaking turns as the first message in the paired message exchange. Heatherington and Friedlander (1987) instead indicate that the coder rely on contextual cues to determine which noncontiguous messages should be paired, however widely separated in the interview they may be. This decision rule was prompted by a sense that message pairings needed to occur more reliably and that imposing this structure on pairings would perhaps reduce some arbitrariness. Given that the present CBC interviews consisted of only three participants (compared to Heatherington and Friedlander's much larger family therapy groups), we believe the decision rule improved reliability in this regard, yet did not compromise the FRCCCS's intent of placing statements in their relational context.

Intercoder Reliability

Using three actual interviews, intercoder reliability was determined based on simple percent agreement and Cohen's kappa between pairs of coders. Pairwise agreement rates ranged from 98.8% to 99.2% ($M = 99.1\%$) for message format categories and from 93.7% to 95.4% ($M = 94.5\%$) for response mode categories. Kappa coefficients ranged from .82 to .98 ($M = .92$) for message format categories and from .88 to .93 ($M = .91$) for response mode categories. The relatively few coding discrepancies were generally resolved using the decision trees for coding priorities contained in the FRCCCS manual.

Table 4. Mean Proportion of Direct Messages Sent and Received by Dyad across Cases

Messages Sent	Messages Received			
	Consultant	Teacher	Parent	Sender Total
Consultant		One-up .11 One-down .27 One-across .04	One-up .13 One-down .37 One-across .07	One-up .24 One-down .64 One-across . 11
Teacher	One-up .11 One-down .11 One-across .56		One-up .07 One-down .07 One-across .09	One-up .17 One-down .18 One-across .65
Parent	One-up .14 One-down .12 One-across .53	One-up .06 One-down .05 One-across .10		One-up .20 One-down .17 One-across .63

RESULTS

Relational Control Characteristics

Table 4 presents the matrix of control codes corresponding to messages sent and received within each dyad for all cases. These matrices represent the unidirectional flow of relational communication at the level of the individual (Heatherington & Friedlander, 1987). As seen in the table, 64% of all messages given by consultants to teachers and parents were of the one-down type, with 24% representing one-up messages and 11% one-across messages. Teachers and parents appeared to relate to consultants and each other in similar ways, as about two-thirds of both participants' messages were one-across; nearly 20% were one-up; and slightly less than 20% were one-down.

Relational Communication Measures

Several descriptive analyses were conducted to glean relational patterns within and across cases. First, average domineeringness and dominance scores by participant were computed to determine the general roles adopted by individual participants in relation to other participants combined. Second, domineeringness and dominance scores for each dyadic combination within a case (investigating all possible dyadic combinations among consultants, teachers, and parents) were analyzed. Standard deviations were computed in each analysis to determine the degree of variability across dyads.

Domineeringness. As noted previously, domineeringness scores reflect an individual's attempts (both successful and unsuccessful) to structure or define working relationships in CBC. In other words, domineeringness scores are concerned with an individual's *directiveness* within consultation. Patterns of domineeringness for each dyad by case are reported in Table 5. The overall average consultant dom-

Table 5. Mean Domineeringness Scores by Dyad for Individual Cases[a]

Dyad	Earl	Art	Jane	Sherry	Overall[b]
Consultant[c]-to-Teacher	.20	.17	.43	.39	.30 (.13)
Teacher[d]-to-Consultant	.17	.15	.24	.19	.19 (.04)
Consultant-to-Parent	.41	.17	.57	.25	.35 (.18)
Parent[e]-to-Consultant	.24	.15	.27	.20	.22 (.05)
Teacher-to-Parent	.55	.33	.32	.18	.35 (.15)
Parent-to-Teacher	.24	.31	.22	.27	.26 (.04)

[a] Entries by case are weighted by number of messages within interview type rather than by total number of messages across all three interviews. Thus, Table 5 entries differ somewhat from Table 4's one-up category entries, which were calculated by dividing a speaker's total one-up messages by his or her total messages across the three interviews.
[b] Numbers in parentheses reflect standard deviations across cases.
[c] Consultant total domineeringness scores averaged .33.
[d] Teacher total domineeringness scores averaged .27.
[e] Parent total domineeringness scores averaged .24.

ineeringness score, determined by averaging consultant-to-teacher and consultant-to-parent interactions, was .33. Teacher domineeringness scores averaged .27 and parent domineeringness scores averaged .24. Although consultants presented higher average domineeringness scores than did teachers or parents, attempts to direct the CBC process were generally shared among participants.

In their dyadic interactions with teachers and parents (*i.e.*, consultant-to-teacher, consultant-to-parent), consultants also presented slightly higher domineeringness scores than either teachers or parents (see Table 5). Further, parents tended to be recipients of the highest percentage of domineeringness (*i.e.*, one-up) statements. It should also be noted that there was some variability in consultant-to-parent, consultant-to-teacher, and teacher-to-parent interactions across cases. This is evident by standard deviations of .18, .15, and .13 for these pairwise analyses, respectively.

Dominance

Dominance scores, defined as an individual's proportion of one-up/one-down paired message exchanges, provide an index of the extent to which he or she succeeded in defining the working relationship in CBC. Dominance scores thus may be considered an index of one person's demonstrated influence over another person. Patterns of dominance for each individual and each dyad within cases are displayed in Table 6. The somewhat restricted range of individual participants' average dominance scores (.35–.41) suggested that no one participant played a highly dominant role within cases when taken together. Dominance scores were slightly higher for consultees than for consultants (teacher dominance = .41; parent dominance = .41; consultant dominance = .35), although the meaningfulness of these differences is unknown.

Table 6. Mean Dominance Scores by Dyad for Individual Cases

Dyad	Earl	Art	Jane	Sherry	Overall[a]
Consultant[b]-to-Teacher	.23	.31	.51	.39	.36 (.12)
Teacher[c]-to-Consultant	.70	.67	.40	.43	.55 (.16)
Consultant-to-Parent	.30	.41	.25	.38	.34 (.07)
Parent[d]-to-Consultant	.58	.79	.38	.56	.58 (.17)
Teacher-to-Parent	.26	.32	.21	.25	.26 (.04)
Parent-to-Teacher	.32	.19	.17	.29	.24 (.07)

[a] Numbers in parentheses reflect standard deviations across cases.
[b] Consultant total dominance scores averaged .35.
[c] Teacher total dominance scores averaged .41.
[d] Parent total dominance scores averaged .41.

Pairwise analyses suggest that, with the partial exception of Jane, consultee (teacher and parent) interactions with consultants were characterized as higher in dominance than vice versa. With their overall dyadic dominance scores differing on average by only .02, teachers and parents seemed to influence each other to a similar degree. Finally, the degree to which parents and teachers exerted influence over consultants varied across cases, as evidenced by standard deviations of .17 for parent-to-consultant interactions and .16 for teacher-to-consultant interactions. In contrast, the manner in which consultants and teachers interacted with parents tended to be consistent across cases (*SD*s = .07 and .04).

Relational Communication Measures by Interview

Descriptive analyses were conducted to identify potential patterns within and across CBC interviews. Average domineeringness and dominance scores based on each interview in CBC (PII, PAI, TEI) were computed for each possible dyadic combination. Standard deviations were computed in each analysis to determine the degree of variability in relational patterns across interviews.

Domineeringness. Domineeringness scores for all possible pairs were analyzed by interview in CBC, with the results reported in Table 7. In general, trends similar to those observed in case analyses emerged. For example, parents tended to be the recipients of domineeringness statements made by consultants and teachers, especially in PAIs. However, little variability overall was evident across the interviews as noted by small standard deviations (ranging from .01 to .05), suggesting that patterns tended to be relatively stable across consultation stages.

Dominance. Dominance scores by pairs of participants and interviews are presented in Table 8, and appear similar to those discerned when analyzed by case. The greatest differences between consultants and consultees were noted during PIIs and PAIs, and parent-consultant exchanges continued to reflect high parent dominance in TEIs. (Teacher-to-consultant and consultant-to-teacher interactions

Table 7. Mean Dyadic Domineeringness Scores by Interviews

Dyad	PII	PAI	TEI	Overall[a,b]
Consultant-to-Teacher	.30	.31	.29	.30 (.01)
Teacher-to-Consultant	.15	.21	.21	.19 (.04)
Consultant-to-Parent	.31	.41	.33	.35 (.05)
Parent-to-Consultant	.20	.18	.27	.22 (.05)
Teacher-to-Parent	.32	.39	.32	.34 (.04)
Parent-to-Teacher	.31	.22	.26	.26 (.05)

[a] Numbers in parentheses reflect standard deviations across interviews.
[b] The overall averages of domineeringness scores are the same as reported in Table 5, although the standard deviations differ because data were broken down by interview rather than case.

Table 8. Mean Dyadic Dominance Scores by Interviews

Dyad	PII	PAI	TEI	Overall[a,b]
Consultant-to-Teacher	.38	.35	.36	.36 (.02)
Teacher-to-Consultant	.64	.69	.33	.55 (.20)
Consultant-to-Parent	.36	.36	.29	.34 (.04)
Parent-to-Consultant	.60	.58	.55	.58 (.03)
Teacher-to-Parent	.26	.34	.19	.26 (.08)
Parent-to-Teacher	.27	.34	.12	.24 (.11)

[a] Numbers in parentheses reflect standard deviations across interviews.
[b] The overall averages of dominance scores are the same as reported in Table 6, although the standard deviations differ because data were broken down by interview rather than case.

reflected approximately equal dominance patterns in TEIs). Interestingly, teacher-parent interactions were nearly identical across all stages of CBC, suggesting consistently equal influence over each other. The greatest variability is evident in teacher-to-consultant exchanges (*SD* = .20), possibly suggesting changes in dominance roles across the consultation interviews.

Summary of Results

Together, the relational communication patterns suggest that, on average: (a) there were generally low levels of domineeringness (attempts to unilaterally define the relationship) across CBC participants; (b) there were minimal differences in domineeringness across individuals in CBC, with consultants exhibiting slightly higher domineeringness toward both teachers and parents than teachers and parents exhibited toward consultants; (c) consultants' domineeringness toward parents and teachers varied across cases; (d) there were minimal differences in dominance (success at exerting differential influence) across CBC participants, with consultees displaying slightly higher dominance in CBC case interactions than consultants; (e) parents' and teachers' dominance toward consultants varied across cases, and to a lesser extent, across interviews; and (f) relative to other interactional patterns, parents tended to be the recipient of domineering (*i.e.*, one-up) messages by both consultants and teachers.

DISCUSSION

The intent of this study was to examine and describe patterns of relational communication that occur within conjoint behavioral consultation (CBC; Sheridan *et al.*, 1996). Toward that end, 4 CBC cases consisting of 12 interviews were audiotaped, transcribed, and coded—using the Family Relational Communication Control Coding System (FRCCCS; Heatherington & Friedlander, 1987). In this section, we discuss results with respect to prior research, limitations of the study, and implications for future CBC research.

The major hypothesis of this study was that CBC consultants would be (a) more directive/domineering and (b) more influential/dominant than either teachers or parents. Although we shall discuss the evidence shortly, the verdict is relatively straightforward: There is some support for (a) and little or no support for (b).

It may be useful to begin by looking at our findings relative to those obtained by Erchul (1987, Table 5). This comparison allows for an analysis of teacher and consultant domineeringness and dominance scores in CBC versus psychologist/teacher behavioral consultation (BC), using relational coding systems that measure identical constructs. First, with respect to domineeringness scores, consultants and teachers who participate in CBC tend to display levels of domineeringness roughly similar to their BC counterparts (.33 *vs.* .39 for consultants; .27 *vs.* .18 for teachers). Second, with respect to dominance scores, CBC consultants appear to be far less dominant (by about half as much) than BC consultants (.35 *vs.* .73). In contrast, the levels of dominance seen for teachers tend to be rather similar regardless of their participation in CBC or BC (.41 *vs.* .51). Thus, teacher mean dominance scores appear to exceed consultant mean dominance scores somewhat in CBC, but not in BC.

Bringing these results back to relational communication theory and Bateson's (1958) terminology, one might say that relationships found within CBC are at least symmetrical and perhaps reciprocal (Table 1). In contrast to BC, which Erchul (1987) characterized as involving a complementary relationship between consultant and consultee, CBC apparently involves no single individual attempting to direct or influence others at disproportionate levels. Rather, bidirectional or reciprocal patterns of directiveness and influence are present. The exchanges overall may be further characterized as *collaborative* in that (a) there were generally low proportions of one-up statements across participants, (b) there were generally low levels of domineeringness across participants, and (c) all participants shared nearly equally in their overall influence. This notion of collaboration is supported by Leaper (1991), who has conceptualized collaborative speech acts as those high on influence and involvement, and by Caplan, Caplan, and Er-

chul (1994), who have advanced a model of collaboration that specifies influence as a key element. It is important to note that both Leaper and Caplan *et al.* recognize exchanges in which influence is shared among participants as collaborative; perhaps this explicit consideration of the role of influence in operational definitions of collaboration will help move the collaboration "debate" (Gutkin, 1997) forward.

Another noteworthy finding was that consultants tended to be more consistent in their domineeringness and dominance patterns than were teachers or parents: Consultants' communication patterns and the roles they assumed in CBC encompassed both domineeringness and dominance at similar levels (.33 and .35, respectively). Differences between consultees' levels of domineeringness (.27 for teachers and .24 for parents) and dominance (.41 for both) suggest that their roles within CBC were to contribute meaningfully and influence CBC interactions—with a lesser role of attempting to direct the process. This was especially true for parents, who tended to be the most frequent recipients of domineering messages from both consultants and teachers.

Importantly, the result that teachers and parents in CBC exerted somewhat greater influence (*i.e.*, had higher dominance scores) than consultants does not necessarily imply that consultants failed to implement CBC effectively. This was a study of CBC processes only; there is simply not enough information available to state with certainty which relational patterns predict optimal consultation outcomes. Further, given that CBC goals extend beyond improvement in client behavior and encompass "relational" objectives, such as increasing parental involvement and strengthening home–school collaborative partnerships (Sheridan, 1997; Sheridan *et al.*, 1996), different communication patterns may be expected, and in fact desired, in CBC versus traditional BC. For example, it is possible that the role of a consultant in CBC is to exert some structure and guidance in the interviews, but remain effective at sharing or even giving up some of the overall influence and decision making that occurs during the process. As such, it is possible that the structure of CBC creates conditions that elicit in teachers and parents a greater need or opportunity to participate more equally in influencing the nature of the relationship.

There were numerous limitations inherent to this study's methodology that may lead future researchers to make different and perhaps more informed choices. A primary drawback to the design was our use of only four cases. Although we coded nearly 10,000 separate messages, the CBC triad constituted the unit of analysis. This aspect provided the opportunity for an in-depth study of relational control patterns in CBC, but precluded the use of significance tests and limited the ability to generalize to other cases of CBC. Another problem that affected our ability to interpret results with greater confidence is that no research to date has established what are "high" and "low" levels of domineeringness and dominance. Thus, interpretations of domineeringness and dominance levels and the meaningfulness of differences between participants are somewhat subjective.

A second limitation concerns our decision to alter an FRCCCS control code assignment, specifically the coding of open question-extension messages as one-up, rather than one-down as Heatherington and Friedlander (1987) specified. We concede the following: The issue of whether questions serve as a means to exercise control over another party in consultation or as means to give up control to another party remains unresolved (Erchul *et al.*, 1992); questions may be used for a variety of purposes within consultation (Hughes, Erchul, Yoon, Jackson, & Henington, 1997); and questions may be interpreted in different ways by participants in consultation (Erchul *et al.*, 1995). Thus, other researchers may make reasonable interpretations that differ from those stated here. As an empirical matter, however, it should be noted that less than 5% (46 of 9696) of the messages coded in the present study were labeled open question-extension messages. Of these, 36 were spoken by consultants, 3 by teachers, and 7 by parents. Even if these messages had been coded one-down as the FRCCCS indicates, the overall impact on our findings and subsequent conclusions would have been negligible.

Third, the FRCCCS is a feasible system with which to code CBC interviews, but we advise that researchers consider the use of videotapes rather than audiotapes in order to realize more fully the coding scheme's potential. Among other considerations, the need to employ videotapes would seem to expand as the sheer number of participants in CBC increases. For example, in our experience, interviews involving only consultant, teacher, and parent may be coded adequately from audiotapes. However, if this group were enlarged to include a teaching assistant, a second parent, and one or more clients, the critical question, "Who is speaking to whom?" may not always be answered confidently using only audiotapes.

Fourth, because this was the first application of the FRCCCS to CBC, we transcribed and coded the 12 interviews in their entirety. A few of the interviews lasted about 90 minutes, resulting in an enormous amount of dialogue requiring transcription and coding. Given this experience, we recommend that future coding occur *over samples* of dialogue rather than complete interviews. This sampling issue with respect to the FRCCCS has been examined empirically in a generalizability study by Friedlander *et al.* (1988) who found that an entire family therapy session could be accurately represented by selecting a one-quarter segment that began in the middle of the interview. A similar methodology was used by Erchul and Schulte (1990), who determined the "best" samples of behavioral consultation interviews to select when using the original RCCCS to study domineeringness and dominance. Conducting a comparable study is advisable for CBC researchers in order to reduce the tediousness associated with transcription and coding, and to facilitate the completion of process-outcome research in CBC.

A fifth limitation is that we analyzed data only at monadic (*i.e.*, domineeringness) and dyadic (*i.e.*, dominance) levels rather than at a triadic level so as to permit comparisons with prior behavioral consultation research. A triadic level of analysis, as proposed by Heatherington and Friedlander (1987), involves a closer examination of messages for which there are two or more targets. Unfortunately,

our interviews involved only three speakers, a configuration that resulted in relatively few messages having two targets. CBC interviews that involve more than three participants will offer a better opportunity to explore a triadic level of analysis. In addition, Heatherington and Friedlander have recommended other ways of displaying data obtained from the FRCCCS, such as through spatial maps and sequential analyses that illustrate the "pattern of patterns" present in family and small group interaction. These types of analyses would seem to offer a more intricate and in-depth depiction of relational patterns in CBC.

A sixth and final limitation relates to the lack of information currently available for CBC (and other forms of consultation) that links various communication processes with important case outcomes. In other words, virtually no research exists that determines the optimal relationship dynamics (as defined by various relational coding systems) or personal role characteristics for achieving maximal consultation goals (*e.g.*, client behavior change). The relationship between various relational elements and CBC outcomes is thus a fertile area for research.

In conclusion, consultants received slightly higher scores than teachers and parents in their attempts to structure CBC interactions (domineeringness), and teachers and parents received slightly higher scores than consultants with regard to their influence (dominance). In comparing our results to those of Erchul (1987), it appears that the CBC consultant is equally domineering but in general is less dominant compared to the consultant engaged in teacher-only BC. Perhaps the interpersonal dynamics of a CBC triad, compared to a BC dyad, lead to influence being shared to a greater degree among all participants. Using terms from relational communication theory, CBC appears to be a collaborative means of delivering psychological services that involves symmetrical and perhaps reciprocal relationships, whereas BC is perhaps better characterized as involving a complementary relationship between consultant and consultee.

REFERENCES

Ayres, J., & Miura, S. Y. (1981). Construct and predictive validity of instruments for coding relational control communication. *Western Journal of Speech Communication, 45,* 159–171.

Bateson, G. (1958). *Naven* (2nd ed.). Stanford, CA: Stanford University Press.

Bergan, J. R. (1977). *Behavioral consultation.* Columbus, OH: Merrill.

Bergan, J. R., & Kratochwill, T. R. (1990). *Behavioral consultation and therapy.* New York: Plenum.

Bergan, J. R., & Tombari, M. L. (1975). The analysis of verbal interactions occurring during consultation. *Journal of School Psychology, 13,* 209–226.

Bergan, J. R., & Tombari, M. L. (1976). Consultant skill and efficiency and the implementation and outcomes of consultation. *Journal of School Psychology, 14,* 3–13.

Caplan, G., Caplan, R. B., & Erchul, W. P. (1994). Caplanian mental health consultation: Historical background and current status. *Consulting Psychology Journal: Practice and Research, 46*(*4*)*,* 2–12.

Carrington Rotto, P. J., Sheridan, S. M., & Salmon, D. (1987). *Interpersonal considerations in the consultative relationship: A manual.* Unpublished manual, University of Wisconsin-Madison, Wisconsin Center for Education Research, Madison, WI.

Colton, D., & Sheridan, S. M. (1998). Conjoint behavioral consultation and social skills training: Enhancing the play behaviors of boys with attention deficit hyperactivity disorder. *Journal of Educational and Psychological Consultation, 9,* 3–28.

Courtright, J. A., Millar, F. E., & Rogers-Millar, L. E. (1979). Domineeringness and dominance: Replication and expansion. *Communication Monographs, 46,* 179–192.

Erchul, W. P. (1987). A relational communication analysis of control in school consultation. *Professional School Psychology, 2,* 113–124.

Erchul, W. P. (1992). On dominance, cooperation, teamwork, and collaboration in school-based consultation. *Journal of Educational and Psychological Consultation, 3,* 363–366.

Erchul, W. P. (1993). Selected interpersonal perspectives in consultation research. *School Psychology Quarterly, 8,* 38-49.

Erchul, W. P., & Chewning, T. G. (1990). Behavioral consultation from a request-centered relational communication perspective. *School Psychology Quarterly, 5,* 1–20.

Erchul, W. P., Covington, C. G., Hughes, J. N., & Meyers, J. (1995). Further explorations of request-centered relational communication within school consultation. *School Psychology Review, 24,* 621–632.

Erchul, W. P., Hughes, J. N., Meyers, J., Hickman, J. A., & Braden, J. P. (1992). Dyadic agreement concerning the consultation process and its relationship to outcome. *Journal of Educational and Psychological Consultation, 3,* 119–132.

Erchul, W. P., & Martens, B. K. (1997). *School consultation: Conceptual and empirical bases of practice.* New York: Plenum.

Erchul, W. P., & Schulte, A. C. (1990). The coding of consultation verbalizations: How much is enough? *School Psychology Quarterly, 5,* 256–264.

Ericson, P. M., & Rogers, L. E. (1973). New procedures for analyzing relational communication. *Family Process, 12,* 245–267.

Folger, J. P., & Sillars, A. (1980). Relational coding and perceptions of dominance. In B. W. Morse & L. A. Phelps (Eds.), *Interpersonal communication: A relational approach* (pp. 322–333). Minneapolis: Burgess.

Friedlander, M. L., Ellis, M. V., Siegel, S. M., Raymond, L., Haase, R. F., & Highlen, P. S. (1988). Generalizing from segments to sessions: Should it be done? *Journal of Counseling Psychology, 35,* 243–250.

Galloway, J., & Sheridan, S. M. (1994). Implementing scientific practices through case studies: Examples using home-school intervention and consultation. *Journal of School Psychology, 32,* 385–413.

Gaul, R., Simon, L., Friedlander, M. L., Cutler, C., & Heatherington, L. (1991). Correspondence of family therapists' perceptions with FRCCCS coding rules for triadic interactions. *Journal of Marital and Family Therapy, 17,* 379–393.

Gutkin, T. B. (1996). Patterns of consultant and consultee verbalizations: Examining communication leadership during initial consultation interviews. *Journal of School Psychology, 34,* 199–219.

Gutkin, T. B. (1997, August). *Collaborative versus directive/expert school-based consultation: Reviewing and resolving a false dichotomy.* Paper presented at the annual convention of the American Psychological Association, Chicago, IL.

Gutkin, T. B., & Nemeth, C. (1997). Selected factors impacting decision making in prereferral intervention and other school-based teams: Exploring the intersection between school and social psychology. *Journal of School Psychology, 35,* 195–216.

Heatherington, L. (1985, August). *Descriptive and lag analysis of relational control in counseling.* Paper presented at the annual convention of the American Psychological Association.

Heatherington, L. (1988). Coding relational control in counseling: Criterion validity. *Journal of Counseling Psychology, 35,* 41–46.

Heatherington, L., & Alien, G. J. (1984). Sex and relational communication patterns in counseling, *Journal of Counseling Psychology, 31,* 287–294.

Heatherington, L., & Friedlander, M. L. (1987). *Family Relational Communication Control Coding System Manual.* (Available from Laurie Heatherington, Psychology Department, Williams College, Williamstown, MA 01267).

Heatherington, L., & Friedlander, M. L. (1989). Analyzing relational control in family therapy interviews. *Journal of Counseling Psychology, 36,* 139–148.

Heatherington, L., & Friedlander, M. L. (1990). Complementarity and symmetry in family therapy communication. *Journal of Counseling Psychology, 37,* 261–268.

Hughes, J. N., Erchul, W. P., Yoon, J., Jackson, T., & Henington, C. (1997). Consultant use of questions and its relationship to consultee evaluation of effectiveness. *Journal of School Psychology, 35,* 281–297.

Kratochwill, T. R., & Bergan, J. R. (1990). *Behavioral consultation in applied settings: An individual guide.* New York: Plenum.

Kratochwill, T. R., Sheridan, S. M., Carrington Rotto, P., & Salmon, D. (1992). Preparation of school psychologists in consultation service delivery: Practical, theoretical, and research considerations. In T. R. Kratochwill, S. N. Elliott, & M. Gettinger (Eds.), *Advances in school psychology* (Vol. VIII, pp. 115–152). Hillsdale, NJ: Erlbaum.

Kratochwill, T. R., Van Someren, K. R., & Sheridan, S. M. (1989). Training behavioral consultants: A competency-based model to teach interview skills. *Professional School Psychology, 4,* 41–58.

Leaper, C. (1991). Influence and involvement in children's discourse: Age, gender, and partner effects. *Child Development, 62,* 797–811.

Mark, R. (1971). Coding communication at the relationship level. *Journal of Communication, 21,* 221–232.

Martens, B. K., Erchul, W. P., & Witt, J. C. (1992). Quantifying verbal interactions in school-based consultation: A comparison of four coding schemes. *School Psychology Review, 21,* 109–124.

Martens, B. K., Lewandowski, L. J., & Houk, J. L. (1989). Correlational analysis of verbal interactions during the consultative interview and consultees' subsequent perceptions. *Professional Psychology: Research and Practice, 20,* 334–339.

Myers, L. W., Haskett, M. E., & Erchul, W. P. (1998). *Conjoint behavioral consultation as an intervention with young children having disruptive behaviors.* Unpublished manuscript. North Carolina State University.

O'Donnell-Trujillo, N. (1981). Relational communication: A comparison of coding systems. *Communication Monographs, 48,* 91–105.

Rogers, L. E., & Farace, R. V. (1975). Analysis of relational communication in dyads: New measurement procedures. *Human Communication Research, 1,* 222–239.

Rogers-Millar, L. E., & Millar, F. E. (1979). Domineeringness and dominance: A transactional view. *Human Communication Research, 5,* 238–246.

Ryan, D. A. (1995). *Parents as collaborative change agents in early intervention: An examination of conjoint behavioral consultation.* Unpublished doctoral dissertation, Alfred University, Alfred, New York.

Sheridan, S. M. (1992). Consultant and client outcomes of competency-based behavioral consultation training. *School Psychology Quarterly, 7,* 245–270.

Sheridan, S. M. (1997). Conceptual and empirical bases of conjoint behavioral consultation. *School Psychology Quarterly, 12,* 119–133.

Sheridan, S. M., & Kratochwill, T. R. (1992). Behavioral parent-teacher consultation: Conceptual and research considerations. *Journal of School Psychology, 30,* 117–139.

Sheridan, S. M., Kratochwill, T. R., & Bergan, J. R. (1996). *Conjoint behavioral consultation: A procedural manual.* New York: Plenum.

Sheridan, S. M., Kratochwill, T. R., & Elliott, S. N. (1990). Behavioral consultation with parents and teachers: Delivering treatment for socially withdrawn children at home and school. *School Psychology Review, 19,* 33–52.

Sheridan, S. M., Salmon, D., Kratochwill, T. R., & Carrington Rotto, P. J. (1992). A conceptual model for the expansion of behavioral consultation training. *Journal of Educational and Psychological Consultation, 3,* 193–218.

Siegel, S. M., Friedlander, M. L., & Heatherington, L. (1992). Nonverbal relational control in family communication. *Journal of Nonverbal Behavior, 16,* 117–139.

Tracey, T. J., & Miars, R. D. (1986). Interpersonal control in psychotherapy: A comparison of two definitions. *Journal of Clinical Psychology, 42,* 585–592.

Witt, J. C. (1990). Face-to-face verbal interaction in school-based consultation: A review of the literature. *School Psychology Quarterly, 5,* 199–210.

Witt, J. C., Erchul, W. P., McKee, W. T., Pardue, M. M., & Wickstrom, K. F. (1991). Conversational control in school-based consultation: The relationship between consultant and consultee topic determination and consultation outcome. *Journal of Educational and Psychological Consultation, 2,* 101–116.

Zins, J. E., & Erchul, W. P. (1995). Best practices in school consultation. In A. Thomas & J. Grimes (Eds.), *Best practices in school psychology-III* (pp. 609–623). Washington, DC: National Association of School Psychologists.

❖   ❖   ❖