Rural Education and Specialized Services: An Introduction to Conjoint Behavioral Consultation via Distance Delivery (CBC-D)\textsuperscript{1}

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Introduction

- Children from rural communities experience a number of educational difficulties (Lenardson et al., 2010).

- Specifically, rural children experience more problems transitioning to kindergarten and display lower self-control behaviors relative to children from urban settings (Rimm-Kaufman et al., 2000; Bender et al., 2011).

- Children experiencing behavior problems early in their education are at an increased risk for negative long-term academic, behavioral and social-emotional outcomes (Bub et al., 2007; Lopes, 2007).

- Unfortunately, rural communities face unique challenges accessing specialized intervention services for children (Owens et al., 2008).
  - Lack of availability (e.g., lack of specialized service providers).
  - Lack of accessibility (e.g., geographic or financial barriers to seeking outside services).
  - Lack of acceptability (e.g., low trust of service providers from other communities, stigma associated with services).

- Tele-education, specifically web-based videoconferencing, holds promise as a cost-effective method of service delivery by:
  - Increasing accessibility to service providers from across the world.
  - Decreasing distance and costs associated with travel.
  - Allowing for personalized and confidential services.

Conjoint Behavioral Consultation via Distance delivery (CBC-D)

- CBC-D is an adaptation of Conjoint Behavioral Consultation (CBC; Sheridan & Kratochwill, 2008). See Figures 1 and 2 for a graphical depiction of the two models.

- CBC is an indirect, cross-system problem-solving intervention wherein parents and teachers work as partners and share responsibility for promoting positive and consistent outcomes related to child development with the help of a behavioral consultant.

- CBC is an evidence-based indirect intervention for addressing common childhood educational problems.
• Preliminary results of an ongoing randomized controlled trial of CBC in rural settings are promising (Sheridan et al., 2013); however, the costs of implementation are high and may not be feasible for rural schools without external funding.

• There are three overarching goals of CBC:
  • To promote academic, social-emotional and behavioral outcomes for children through conjoint, collaborative problem-solving.
  • To promote meaningful caregiver and teacher participation and engagement in their children’s education.
  • To establish and strengthen family-school partnerships.

• The four stages of CBC-D are conducted over computers using web-based videoconferencing software in a split-screen fashion so all parties remain visible while allowing for documents to be shared.

• Rural parents and teachers meet at the child’s school and the CBC consultant joins the meeting from another location.

**CBC-D Stages and Objectives**

• Stage 1: Conjoint Needs Identification Interview (CNII)
  • Identify the student, family and teacher strengths.
  • Prioritize, select and define a target behavior(s) and setting.
  • Establish a procedure for the collection of baseline data.

• Stage 2: Conjoint Needs Analysis Interview (CNAI)
  • Review collected data to inform decision making.
  • Establish jointly determined goals.
  • Develop a shared understanding of behavior function.
  • Collaboratively design effective strategies across settings that are sensitive to setting-specific variables.

• Stage 3: Plan Implementation
• Provide direct instruction, modeling and opportunities for consultees to practice plan steps and receive feedback.

• Provide individual, brief fidelity support meetings consisting of web-based observation of plan implementation at home or school and additional instruction, modeling and feedback.

• Stage 4: Conjoint Plan Evaluation Interview (CPEI)
  
  • Examine collected data to determine if student behavior goals have been met.
  
  • Evaluate what about the plan worked and what did not.
  
  • Discuss next steps for the behavior plan (e.g., continuation, termination, generalization to other settings).
  
  • Discuss continuation or termination of consultation.

**Practical Considerations**

• A number of practical issues must be considered prior to delivering services using tele-education technology such as videoconferencing software (Bischoff, 2004; Gibson et al., 2010).

• Quality of Transmission
  
  • The hardware (e.g., web-cams), software (e.g., WebEx) and internet connectivity of all parties must be up to minimal standards to allow for quality, uninterrupted teleconferencing.
  
  • Procedures should be developed for how to handle technological troubles (e.g., connection difficulties).

• Financial Cost
  
  • Costs to service providers and those receiving services must be considered.
  
  • Technology hardware continues to improve; however, costs remain relatively low and affordable.
  
  • Other potential expenditures to consider include increased bandwidth to support the technology as well as additional technological assistance.

• Selecting the Right Equipment
• Service providers should carefully consider all possible objectives they plan to meet and ensure that the hardware and software will allow them to meet those objectives.

• In CBC-D, software such as WebEx are needed because the consultant and consultees need to share documents and review data graphs.

• Confidentiality
  • It is possible for telecommunications to be intercepted by outside parties, increasing the risks of confidentiality being breached.
  • Secure software that guarantees telecommunications are encrypted should be used to deliver services.
  • Given the added risks and novelty of distance delivery, service providers should ensure that confidentiality is thoroughly discussed and time be given to address questions.

• Ethical and Legal
  • Local and district policies regarding internet and videoconferencing usage should be consulted prior to accessing or providing services.
  • Consultants should be familiar with the technology prior to service delivery.
  • Professional standards and ethics from relevant organizations (e.g., American Psychological Association, American Telemedicine Association) should be reviewed and followed.

**Implications**

• Identifying effective methods of using tele-education to deliver specialized services to rural areas has great implications for the future of rural service delivery.

• Specifically, rural educators would have access to a wide array of specialized services that are not typically available due to distance or the need for specialized training.

• By gaining access to a greater number of services, rural educators can better meet the diverse needs of their students by individualizing each student’s treatment.

• Rural educators can increase their involvement in research practices through distance partnerships with universities interested in assessing interventions within rural populations.
• The following section provides an example of how rural educators can take advantage of research partnerships.

**Future Research**

• A concurrent multiple baseline across participants design will be used to evaluate the efficacy of CBC-D on rural students’ noncompliant behavior.

• The social acceptability of CBC-D to rural parents and teachers and effect of CBC-D on the caregiver-teacher relationship will be also evaluated.

• Participants will be six parent-teacher pairs sharing concerns about a student’s noncompliant behavior.

• CBC will be conducted through WebEx videoconferencing software.

• Results will provide preliminary information on the efficacy of CBC-D as a potential method of service delivery for at-risk children in rural communities.
References


Figure 1. Traditional CBC Model
Figure 2. CBC-D Distance Model