

Single-System Evaluation of Child Protective Services Training

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Protective services workers handle the bulk of child abuse and neglect cases and are frequently the first, last, and only professionals who work with abusive and neglectful families (Howing & Wodarski, 1992; Miller, Shiremena, Burke, & Brown, 1982). Besides their regular duties of case finding, screening, and referral, protective services workers increasingly have clinical responsibilities of assessment, counseling, and treatment (Leung, 1994; Rycraft, 1994; Young, 1994). In light of these increased responsibilities, the development and evaluation of behavioral training methods for protective services workers are insufficient (Barber-Madden, 1983; Birmingham, 1996; Young, 1994). Clinical training for child protective services in America is more art than science. Many workers go into protective services with inadequate clinical training (Denning, 1993; Lieberman, 1988; Pecora, 1989). On-the-job training may largely concern department regulations and reporting requirements (Fauri, 1982; Starr, 1982). Clinical skills for protective services are typically learned informally, vicariously, and by trial and error (Daley, 1982; Denning, 1993). Additionally, high rates of worker turnover and burnout in protective services agencies may contribute to and result from poor clinical training (Rycraft, 1994).

The development of clinical training methods for child protective services staff faces challenges. Since many workers do not plan to enter the field there is a need for in-service workshops rather than pre-service training (Wolock, 1982), and training for workers must be brief and timely (Groeneveld & Giovannoni, 1977; Polanski, Doroff, Kramer, Hess, & Pollance, 1978). Because incentives for professional advancement are few, staff training must be intrinsically rewarding (Gregoire, 1994; Sharma, 1997). Procedures to assess protective services staff training demand creativity (Denning,

1993; Miller, 1991; Young, 1994). Evaluation designs must control threats to external validity without harming the training curriculum. In addition, the administration of measurement instruments to document workers' clinical gains should not jeopardize the training mission. Many in-services occur in brief workshop formats. This format presents evaluators with an unusual set of programmatic and methodological demands (Smith & Schinke, 1985). The present study addressed these unique challenges using a mixture of nomothetic and idiographic designs. The study's aims were to design, implement, and evaluate an intensive in-services workshop for child protective services workers.

Methods

Participants

Study subjects were child protective services workers ($n = 34$) who took part in a 5-day clinical training program. The 16 women and 18 men had a mean age of 35.7 (S.D. = 10.72) years. Subjects had a mean educational level of 16.97 years (S.D. = 1.45), and they reported a mean of 7.75 years' (S.D. = 5.93) experience in child protective services. Twenty-nine subjects were protective services caseworkers, four subjects were protective services group workers, and one subject was a protective services supervisor. All subjects expressed a need for training in the delivery of child protective services.

Educational Procedures

A social worker taught the five, 8-hour clinical training sessions. The instructor had direct practice, research, and teaching experience in clinical skills for child protective services. Clinical training content was introduced with films, professional and lay guest speakers, didactic presentations, group discussions, and experiential exercises. As outlined

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Table 1. Multiple probe design across teams

Team	1	2	3	4	5
1	Baseline	Instruction Specificity Reinforcement Modeling	Modeling Specificity Reinforcement Modeling	Practice Specificity Reinforcement Modeling	Practice Specificity Reinforcement Modeling
2	Baseline	Baseline	Instruction Specificity Reinforcement Modeling	Modeling Specificity Reinforcement Modeling	Practice Specificity Reinforcement Modeling
3	Baseline	Baseline	Baseline	Practice Specificity Reinforcement Modeling	Practice Specificity Reinforcement Modeling

in the research design, members of Teams I-III and all remaining subjects received staff training methods of instruction, modeling, and practice.

Instruction

Separately, each team and all other subjects viewed a videotaped discussion of social-learning methods to assess, treat, and prevent child abuse and neglect (Schilling, 1981). Two child protective services workers in the videotape discussed behavior specificity, data gathering, and interventive methods. The workers mentioned, but did not demonstrate, behavioral principles of reinforcement, modeling, rehearsal, feedback, and coaching.

Modeling

Individual teams and all other subjects saw a videotape of a protective services interview with a referred female client. According to a neighbor, the client had slapped her 4-year-old boy until the boy became physically ill. The worker asked the client to role play how she interacted with her son in routine problem situations. The worker showed the client how to ignore her son's misbehavior and how

to reward his desirable responses (Gambrill, 1983). The client and worker discussed the demonstration.

Practice

Practice sequentially involved the three teams and was concurrently presented to all other subjects. Individual team members met with Mr. and Mrs. Schmidt, who were recently referred to protective services. The instructor knelt alongside and gave the worker helpful suggestions, feedback, and praise.

Research Design

At the onset of the five-day program, all 34 subjects completed pretest measures. Six subjects were randomly selected and additionally given the first of five measurement probes. Clinical training was evaluated with a multiple-probe across the six subjects that measured their performance on four behavioral measures: specificity, reinforcement, modeling, and rehearsal (Horner & Baer, 1978). These subjects were paired into three teams - I, II, and III. Team I members were instructed in behav-

ioral techniques of specificity, social reinforcement, modeling, rehearsal, feedback, and coaching. All teams completed a second measurement probe. Team I members received a modeled demonstration of the behavioral techniques, and Team II members were instructed in the techniques. All teams were given the third probe. Team I members practiced the behavioral techniques, Team II members received the modeled demonstration, and Team III members were instructed in the behavioral techniques. After a fourth probe, Team II members practiced the behavioral techniques, and Team III members received the modeled demonstration. All teams then completed the fifth measurement probe. Finally, all 34 subjects completed posttest measures.

Six of the 34 subjects were divided into 3 teams and completed pretest and posttest measures, as well as participating in the multiple-probe evaluation procedure. In it, each of four skills (i.e., specificity, reinforcement, modeling, rehearsal) was assessed during different phases of workshop teaching activities (i.e., instruction, modeling, practice). Instruction, modeling, and practice were the procedures used to teach the four skills listed above. The remaining 28 subjects completed a pretest and posttest measurement battery, but were not involved in the multiple-probe evaluation procedures. This strategy allowed the authors to provide training to all participants, while conducting rigorous single-system evaluation with a randomly selected subset of subjects.

Outcome Measures

All 34 subjects completed the following measures at pretest and posttest levels.

Behavioral Principles Test

This instrument's 50 questions measured fundamentals of child development and principles of behavior change. The test has a Kuder-Richardson reliability coefficient of 0.94, and it has been cross-validated with other measures (O'Dell, Tarler-Benlolo, & Flynn, 1979).

Child Abuse Scale

The 35 items on this measure quantified each subject's knowledge of clinical child protective services work. The instrument has $r=.86$ test-retest reliability, and had yielded a Cronbach's alpha of .83. Content validity had been sought with baccalaureate and graduate protective services workers (Cultoff & Laks, 1978).

Self-Control Schedule

This instrument asked subjects 36 questions on their perceived control of negative emotions and behaviors. The measure's reliability is indicated by alpha coefficients of 0.78 to 0.84. The schedule has been cross-validated with instruments that measure parallel constructs of self-control (Rosenbaum, 1980).

Anger Control Inventory

Thirty items on this measure quantified each subject's ability to manage frustration, stress, pressure, and anger. The instrument has a Cronbach alpha of 0.93, and it has been validated with clinical samples (Novaco, 1979).

At posttest, all subjects completed one additional measure.

Consumer Satisfaction Checklist

This checklist asked subjects 12 questions on the training program's quality and value (Kazdin, French, & Sherick, 1981).

Each probe for the six subjects on the three teams included the following measure:

Performance Test

Individual team members were videotaped in five clinical interviews with a child protective services client. An experienced graduate student was recruited to be the client-confederate who followed rehearsed scripts to elicit comparable and representative clinical performances from each subject. Videotaped interviews were coded, randomly arranged, and scored (Kent, O'Leary, Dietz, & Diament, 1979; Schinke, Blythe, Gilchrist, & Smith, 1980). Computations for a 33% random sample of videotaped interviews, independently scored by two research assistants, yielded a reliability coefficient (kappa) of +0.90 (Hubert, 1978).

Counselor Effectiveness Scale

Subjects completed this 25-item measure after each interview to quantify their warmth, clarity, and professional demeanor with the protective services client. The measure has a parallel-form reliability coefficient of 0.98. The scale has been validated with clinical human services professionals (Ivey & Authier, 1978).

Realism, Anxiety, and Success Scale

Also following each interview, subjects answered 12 questions to assess the realism of their clinical performance, to quantify their anxiety in the protective services interview, and to predict their future success with the child protective services client (Higgins, Alonzo, & Pendelton, 1979; Bellack, Turner, Hersen, & Luber, 1980).

Results

Pretest to Posttest Analyses

Pretest to posttest changes for all subjects were analyzed with dependent t-tests. Scores on the Behavioral Principles Tests, Child Abuse Scales, Self-Control Schedules, and Anger Control Inventory all showed significant changes. On each of four measures, subjects' mean scores showed impressive gains.

Interview Observations

The upper graphs in Figure 1 provide Performance Test observational data for the three teams at each interview probe. Low mean baseline rates were seen for all team members' specificity, reinforcement, modeling, and use of rehearsal with

the child protective services client. At the second interview probe, after Team I members were instructed, their observed specificity and reinforcement with the protective services client increased, and Team II and Team III members' rates of both behaviors continued at near baseline levels. Instruction for members of Team II was followed by their greater specificity and reinforcement with the child protective services client. Low rates of specificity and reinforcement were observed for Team III members until they were instructed. At the third interview probe and further modeling for Team I members, these subjects increased their modeling with the protective services client. Members of Teams II and III were observed to model more with the client after their modeling training. First Team I members, then Team II members showed greater use of rehearsal with the protective services client once workers had practiced their clinical skill.

Interview Responses

The lower graphs in Figure 1 give results from team members' responses after each interview. The data indicate that all subjects regarded the five child protective services interviews as realistic. Baselines for the three teams showed high anxiety, low reported effectiveness, and low predictions of success with the protective services client. After Team I members were instructed, they reported less anxiety, more effectiveness, and greater expectations for success than members of Teams II and III. Team II members reported parallel changes

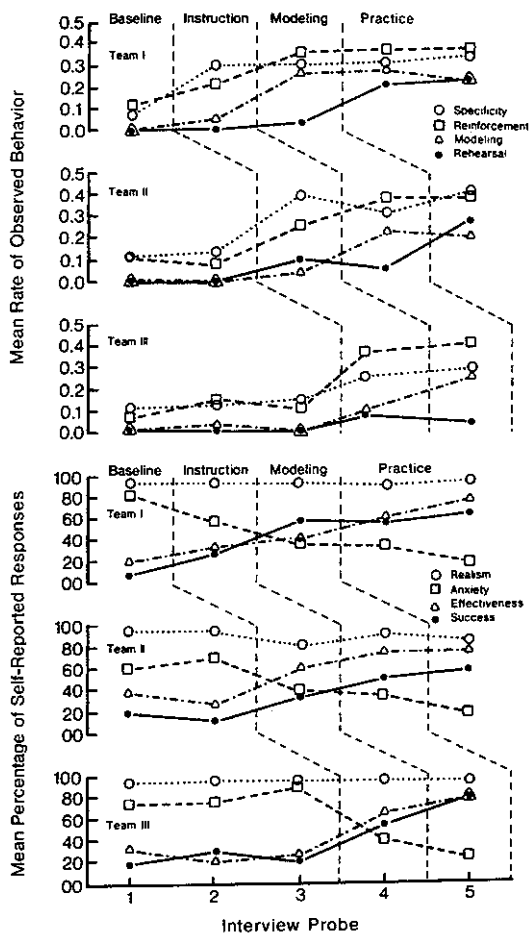
Table 2. Pretest to Posttest Gains on Four Written Measures

	Pretest		Posttest		t(33)
	X	SD	X	SD	
Behavioral Principles Test	22.07	8.67	43.82	7.28	3.26***
Child Abuse Scale	20.33	7.76	29.58	9.32	2.90**
Self-Control Schedule	18.64	10.18	25.82	12.43	2.35*
Anger Control Inventory	12.17	5.42	21.53	6.78	3.74*

* p .05 ** p .01 *** p .005

Figure 1.

Mean rates of observed behaviors and mean percentages of self-reported responses for each child protective services worker team at baseline and after instruction, modeling, and practice across five client interview probes.



at the third interview once they were instructed. Modeling training for Team I members was followed by their increased positive responses on measures of anxiety, effectiveness, and success predictions with the child protective services client. At the fourth interview, once they had received modeling training, Team II members reported reduced anxiety, improved effectiveness, and enhanced perception of future success with the

client. Team III members' responses similarly improved with their instruction. After practicing their clinical skill, members of Team I at the fourth and fifth interview, and members of Team II at the fifth interview, were reportedly less anxious, more effective, and more likely to say that they would succeed with the protective services client. Team III members at the final interview probe, and following their modeling training, reported additionally reduced anxiety, increased effectiveness, and higher predictions of success with the client.

Consumer Satisfaction

Consumer Satisfaction Checklist results yielded a mean of 8.80, on a 10-point scale, for the instructor's understanding of the clinical demands on child protective services workers. Subjects rated the instructor as prepared (M = 8.65), organized (M = 9.25), for their clients (M = 8.15), and for their co-workers (M = 9.45). Most (97%) subjects said they would immediately apply the training to their child protective services caseload. Many (91%) subjects intended to teach their protective services worker colleagues two or more of the clinical techniques they learned. Eighty-eight percent of the subjects rated the program as equal to or better than the best prior training they had received. Subjects evaluated clinical training as enjoyable (M = 9.60). Subjects assigned the staff training program an overall grade of B+ (3.40 on a 4-point scale).

Discussion and Application in Social Work Practice

Results from this study can inform efforts to develop behavioral training programs for child protective services workers. Study findings suggest that five days of training enhanced behavioral skills for the delivery of child protective services. Post-training gains were seen for protective services workers' knowledge of child development and behavior change principles, facts about child abuse and neglect, and self-control and anger management abilities. Behavioral training methods of instruction, modeling, and practice were evaluated with a subset of protective services workers. Observations of these workers in child protective services interviews revealed progressively more specificity, reinforce-

ment, modeling, and rehearsals with a client as the workers learned each training method. Concurrent with their observed clinical skill, workers in the subset reported decreased anxiety, increased effectiveness, and higher predictions of future success with the protective services client. Protective services workers indicated that their training was relevant, applicable, and worthwhile.

Besides its programmatic findings, the study suggests methodological improvements to child protective services staff training. The introduction of posttests may have held workers accountable for training content (Reid & Beard, 1980). Although the multiple-probe research design provided a partial isolation of the curriculum's main elements, it did not impede the clinical training mission. Videotape procedures served to consistently deliver instruction and modeling, and to capture samples of workers' clinical performance (Hudson, 1982). Team members' ratings of interview realism and consumer satisfaction evaluations from all workers were aids to training and evaluation. Data from these measures strengthened the external validity of interview results and supported the practice wisdom of research outcomes (Bloom, Fischer, & Orme, 1995; Reid & Smith, 1981).

The study has limitations. The convenience sample may not mirror all child protective services workers. Despite being randomly selected from all workshop participants, the sample of six workers may hold systematic bias. This possible systematic bias argues against unthinkingly generalizing the evaluation to other samples of workers in other settings. The pretest to posttest design cannot rule out effects from testing, history, and maturation (Bloom, Fischer, & Orme, 1995). The multiple-probe design partially controlled confounding effects for the three teams. Yet, a small sample and lack of follow-up probes raises questions about the maintenance of team members' behavioral gains (Bloom, Fischer, & Orme, 1995). Although the use of single-system evaluations somewhat controls threats to internal validity, the findings from this

study are largely exploratory and should be viewed with caution.

On the whole, the study augurs well for better behavioral training of child protective services workers. Pretest measures established a sample of child protective services workers without information and abilities integral to their jobs. Pre and post data on all workers, along with multiple data on a worker subset, describe learning that apparently was due to didactics, instruction, modeling, and practice. Perhaps these modest findings will lead to refined training and measurement protocols. Future work could also explore the way education, pre-employment preparation, and on-the-job experience affect services workers. Sensitive measures might be designed to warn supervisors of impending crises among their staff. Investigators could study behavioral training as a means to redirect protective services workers who may otherwise leave the field to escape from a frustrating job. This study should encourage others to improve staff training for child protective services.

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