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Benchmarks in Child Abuse and Neglect Prevention and Treatment Programs

Philip Mamalakis
Purdue University

Shelley MacDermid
Purdue University

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BENCHMARKS IN CHILD ABUSE AND NEGLECT PREVENTION AND TREATMENT PROGRAMS

Project Intern: Philip Mamalakis
Project Director: Shelley M. MacDermid

Project EASE:
Evaluation Assistance Services

A partnership with the United Way of Greater Lafayette
1998

Strengthening services to families with research, education, and outreach
December 30, 1998

United Way Agency Directors
Greater Lafayette

As you might remember, The Center for Families at Purdue University and the United Way of Greater Lafayette embarked on a partnership during 1998 to provide assistance to local agencies regarding outcome-based evaluation.

There was strong interest across programs in the measurement of (1) Two indicators of individual functioning (self-esteem and stress); and (2) Two indicators of relationship functioning: (parenting skills and family functioning). There also was strong interest in state-of-the-art research about two different types of interventions: (1) Preventing and treating child abuse and neglect; and (2) Preventing and treating adolescent substance abuse.

Four graduate student interns worked during the summer and fall to compile reports dealing with each of the above topics, and I am pleased to submit copies of their reports for each agency to the United Way of Greater Lafayette.

Please note that appendices were compiled to accompany each report. Because of their length, only a single copy of each appendix was provided to the United Way, that agencies can share at their convenience.

We thank you for your input into this process, and hope that you find the results helpful.

Best wishes,

Shelley M. MacDermid
Associate Professor and Director
The Center for Families at Purdue University
Benchmarks in Child Abuse and Neglect Treatment and Prevention Programs: A Review of the Literature

Project EASe II
Summer 1998
Philip Mamalakis

INTRODUCTION

The field of prevention and treatment of child abuse and neglect is more generally called child maltreatment and includes child neglect, physical abuse, sexual abuse, psychological maltreatment, and ritualistic abuse. In the literature on child maltreatment, prevention and treatment of child sexual abuse has received the most attention. Most studies of effectiveness in prevention and treatment address child sexual abuse. Historically, there has been limited research on the effectiveness of programs which address either prevention or treatment of child neglect or physical abuse. Child abuse prevention literature is organized in three levels: primary intervention, targeting the general population in an attempt to reduce or stop a particular problem; secondary intervention, which targets a specific high-risk group in order to avoid the spread of a problem; and tertiary intervention, targeting victims of the problem to minimize negative consequences and prevent re-incidence. Consequently, child abuse prevention ranges from public awareness campaigns, to parent education and support, safety education for children, and therapy for perpetrators, victims, and their families. This report will summarize what is known about treating and preventing child physical abuse and neglect.

Some authors have identified a need for more research on physical abuse treatment and prevention programs. In addition, Graziano and Mills (1992) state that there is little attention paid to direct services to children victims of physical abuse. In a review of 1500 articles on child abuse and neglect, few were found that evaluated the effectiveness of treatment and only two were designed well enough to produce reliable findings. As a result, it is more difficult to establish benchmarks for child abuse treatment and prevention programs. Most programs are aimed at treating the parents, rather than the psychological needs of the children. One reason may be because of this three-tiered approach to prevention and treatment. First and second tier programs are broad, targeting broad populations. Outcome studies on these programs are difficult. In addition, the broad outcomes targeted relate more to the environmental and familial factors related to child abuse including family poverty, parental stress management, parental education and awareness, etc. Also, the psychological effects of child physical abuse vary from child to child. Children show the effects of maltreatment in different ways. Some victims might turn to delinquent behaviors or substance abuse, for example, while others might show signs of depression or withdrawal. Finally, child abuse victims are not the only ones who are delinquent or depressed. There might be separate research on the treatment of delinquent behavior or substance abuse, for example, but no studies were found which evaluated intervention strategy outcomes specifically with children of abuse.
SUMMARY

A number of studies have found positive short-term outcomes and evidence of effectiveness for child abuse prevention programs (1,2). Evidence exists that prevention efforts have resulted in positive gains in parental behavior, as indicated by measures of parenting knowledge and attitudes and, to a lesser extent, in indicators of child maltreatment such as child abuse reports (4).

Outcome information is not available at the primary prevention level because most primary prevention efforts have no strategies for measuring effectiveness. For example, public service announcements aimed at raising awareness about the risks associated with shaking babies is a primary level child abuse prevention program, but there is no research on the effectiveness of this program. Other primary level prevention efforts include press releases, town meetings, cable television call-in programs, and publicity in the news media (1).

Outcome data are available for secondary prevention programs. Secondary level interventions include programs which seek to improve parental functioning and reduce stress factors which hurt parents’ relationships with their children (Kolko, 1996). The majority of these programs, which fall under the heading of family support programs, target specific high-risk groups such as teenage mothers, single parents, and low-income families. Interventions include, but are not limited to, free transportation to prenatal and well-baby clinics, home-visits by a nurse for mothers during pregnancy and the first two years of their child’s life (1,2,3). These studies have found short-term positive gains in reduced maltreatment reports, reduced child punishment, and fewer emergency room visits. Treatment groups on average made more use of social services, improved their level of social support, and decreased smoking. Treatment groups had longer gestation periods and gave birth to babies with higher birth weights than control groups. Similar results were reported with programs which included parenting education, emotional support and counseling, job training and employment services, and drop-in services (1,2,3,4).

The literature indicates that program interventions that do produce changes have the following three common factors: multifaceted services, home visits, and active social support systems. Programs which span from 0-3 years and provide personalized attention (home visits) stand out as most successful in achieving desired outcomes, and most successful with high-risk individuals. Findings generally support the utility and cost-benefit of a) home visits, prior to onset of maltreatment, b) specific skills training that addresses parental misperceptions and false expectations of young children, c) specific skills training that promotes alternatives to physical punishment and the use of more prosocial, developmentally relevant activities for parents to engage in with children, d) parental competency programs broadly aimed at nonidentified individuals, and e) preschool-based programs for child victims which emphasize developmental gains and prosocial peer interactions (1,3).

One unique study assessed the needs of high-risk families and then made recommendations to the family for treatment (4). this program demonstrated significant compliance rates from participating families. This approach is particularly effective with high-risk families within the

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1Numbers refer to the studies reviewed in this report, summarized in Appendix A.
highly complex and overlapping medical, legal, social service and judicial systems (4). Support groups and child-care facilities are also common second level interventions. Although no specific outcome data are available, some authors have maintained that families who take advantage of these services experience significant benefit (2).

There is limited research on tertiary prevention programs. This level of maltreatment prevention involves treating victims of abuse to prevent repeated abuse and minimize the negative impact of abuse. Interventions include parenting education, education and skills development, lay therapy and peer support (1,2). Group and family therapy tend to be preferable although individual therapy is required in some cases (1).

The clinical complexities of working with abusive families often necessitate multiple services to stabilize the home environment and promote improvements in parent-child relations (4; Kolko, 1996). Programs which address the problem of child abuse with diverse strategies hold promise for preventing child abuse.
REFERENCES


APPENDIX

The studies included in this report appendix represent the best evidence of positive effects of child abuse treatment and prevention programs. Although there is variability in program design and outcome measures, each study represents different attempts at addressing prevention and treatment. The summaries are organized with a brief synopsis of the intervention including the outcomes, or factors targeted, and then the significant results are reported.


In 1989 the National Center on Child Abuse and Neglect funded nine community programs to encourage communities to work together to prevent child abuse and neglect. The report summarizes the ways the programs strengthened families by enhancing community resources and partnerships. The report presented the results as a group and did not break down which program did which approach, with which measure, and for which outcomes.

The summary reports that: Prevention efforts have resulted in positive gains in parental behaviors such as parenting knowledge and attitudes, and not as much in indicators of child maltreatment such as reports of child abuse. Multilevel programs that offer additional services over a long period of time appear to be worth the effort for high-risk families. Home visitation programs have been shown to be effective. The earlier that programs are offered to parents, or potential parents, the more effective they are. Prevention services which produce changes have the following characteristics: multifaceted services, home based, and active social support systems.

The report summarizes the five prevention strategies which all nine programs used: Public awareness, parenting education and support, home visitation, community-based task forces, and mini-grants to community organizations.

Public awareness included community forums, conferences, fairs and festivals. Other public awareness strategies included developing resource lists, information packets, giveaway items etc. Some programs published or translated community resources. Public awareness programs were not evaluated for effectiveness.

Parenting education and support: Programs offered parenting education and support as a separate program or in conjunction with home visits or school-based initiatives. In some cases, parenting courses focused on specific child age groups to provide more appropriate developmental information. Other programs targeted specific populations for education such as teenage mothers, African-American parents, first-time parents, etc.

Seven programs implemented home visitation programs providing health services, child development activities, parenting education, family support, substance abuse intervention, and case management.
All nine programs used community-based task forces or advisory boards to help shape and direct their operations. They guided, monitored, and/or delivered the initiatives’ activities throughout the grant period and, in many cases, helped the communities sustain the programs after NCCAN funding ceased.

Four programs used a portion of their funding to support small grants to community organizations. These grants were designed to encourage the development of local programs that would strengthen families and reduce the incidence of child maltreatment. Community organizations used the grants to provide parenting education programs, neighborhood resource centers, scouting and group activities, after-school programs and programs for teenagers, and parent-child play activities.

Some public awareness activities were labor intensive (such as monthly newsletters and large community fairs). In general, effective public awareness campaigns were those which were based on a good understanding of their target communities’ information needs and information seeking behavior.

Effective parenting education required multiple approaches to meet diverse needs of target populations. Surveys and focus groups revealed that parents benefited from the parenting education programs. School based parenting programs were an effective way of engaging parents in school activities. Non-interactive sources of parenting information such as libraries and resource centers were underutilized; home visits, parenting support groups, and other interactive forms of information sharing tended to be the most effective.

Using a multidisciplinary team of nurses, lay volunteers, and family support workers appeared to be an effective way to deliver home visits. Integrating home visits with primary health care services provided continuity between center-based care and home-based family support. Family service plans, which prioritized goals and objectives and were periodically reviewed with the families, were especially important in achieving progress with the client families.


The author analyzed existing research on maltreatment prevention. The author breaks down his analysis into primary, secondary, and tertiary prevention efforts. Again, the author points out that few experimental or quasi- experimental studies exist. He summarizes some of the findings:

Primary

Different outcome measures were developed for different studies making comparisons difficult. Actual behavior was examined in only one study which involved sexual abuse prevention.
Secondary

These interventions are based on knowledge and assumptions concerning risk factors for child maltreatment and target groups considered to be high risk such as teenage mothers, or poor and single parent families. Goals are to enhance parenting capabilities and family functioning.

Programs for new mothers: One study, in a randomized clinical trial, four treatment groups were provided with different combinations of developmental screening for children, free transportation to prenatal and well-child clinics, home-visits by a nurse during pregnancy and the first two years of child’s life. The treatment group reported 15% fewer maltreatment reports than the control group. The treatment group punished child less and had fewer emergency room visits. Treatment group made significantly more use of social services, improved their level of social support, decreased smoking, and babies had improved birth weights and gestation periods.

A similar study with similar intervention also reported that treatment group had fewer hospitalizations for injuries thought to be inflicted.

Programs for teenage mothers: Programs were aimed at addressing poverty, lack of nutrition and health care, halted education, developmental delays, and inadequate parenting skills. Most programs enrolled mothers at delivery of child. Services included parenting education, emotional support and counseling, job training and employment services, and drop-in centers. Also special workshops and interest groups, recreational activities, group meetings, leaflets, day care and day trips were offered. Program duration ranged between 20 weeks and three years. The first study mentioned under new mothers is the best illustration of benefits accrued by mothers, the author states.

Programs providing day care services, another form of prevention: Effectiveness in preventing child abuse not evaluated with respect to day care services.

Programs for latch-key children: Typical programs are usually conducted at a school. Children discuss feelings of being left alone and receive instruction in personal safety, family rules, discriminating between emergencies and non-emergencies, and responsibilities for siblings. Sessions with parents address parental concerns and potential problem situations. There is evidence that participants acquire knowledge and skills but effectiveness in reducing child abuse in uncertain.

Programs providing support groups, a key component in many programs: Support groups facilitate friendship and social support networks. Other self-help groups include Parents Anonymous. The author states that significant benefit is accrued by high-risk families who seek assistance through this approach.

Tertiary

The author lists common tertiary programs and states that effectiveness of these programs are rarely evaluated. Parenting education, education and skill development, lay therapy and peer support groups may achieve the best outcomes. Family and group therapy tend to be preferable to individual, although some participants require individual counseling.

Wolfe describes the approaches of several programs but none of them have outcome data. He summarizes another research review source: Most of the programs fall under the heading of family support programs which are geared towards enhancing parental competence and reducing stress factors that impair formation of positive and healthy parent-child relationships. These studies have found short-term positive outcomes particularly for parent outcome measures and for mothers deemed at greatest risk. Several studies have found improvements in observed parental behaviors and, to lesser extent, indicators of maltreatment. Also, these studies show that family support programs improve general maternal functioning rather than specific dimensions of personal adjustment. He also reports that there is good evidence that multilevel programs offering additional services as parents require them over time to be worth the additional effort compared to less intensive services to at-risk families.

Another study referenced concluded that the programs which span from 0-3 years and provide personalized attention (home visits) stand out as most successful in achieving desired outcomes, and most successful with high-risk individuals. Findings generally support the utility and cost-benefit of a) home visits, prior to onset of maltreatment, b) specific skills training that addresses parental misperceptions and false expectations of young children, c) specific skills training that promotes alternatives to physical punishment and the use of more prosocial, developmentally relevant activities for parents to engage in with children, d) parental competency programs broadly aimed at nonidentified individuals, and e) preschool-based programs for child victims which emphasize developmental gains and prosocial peer interactions. These findings are based on what Wolfe considers good evidence from the studies reviewed.


This article shows empirical evidence for the effectiveness of a multidisciplinary treatment team approach to assessing children and families suspected of abuse. The treatment team assessed the at-risk, or suspected, families and then made recommendations for further treatment. The study was designed to evaluate how many of the families acted on the recommendations of the treatment team. Based on the one-year follow-up, measuring how many services where delivered to families, there was strong evidence that treated families made use of the services recommended by the treatment team. Recommendations of the team were followed 100% regarding placement of the child, for example. In general outpatient psychological service recommendations were not followed as frequently as other service recommendations. The study demonstrated that this approach is effective with high-risk families within the highly complex and overlapping systems (medical, social services, protective services, judicial and legal).
LESSONS LEARNED: INTRODUCTION

Child abuse and neglect is a serious social problem with complex causes and tragic results. Because of the suffering and loss of life it incurs, the costs of treating the resulting physical and psychological trauma, and the linkage of child maltreatment to other social problems such as substance abuse and criminal activity, a wide variety of efforts to prevent child abuse and neglect are urgently needed and have been undertaken. The strategies undertaken have targeted diverse groups, ranging from entire communities to selected subgroups, such as low-income unmarried parents, with a wide assortment of services, such as programs to teach parenting skills, raise awareness about positive parenting techniques, relieve stress among parents, provide counseling, and train children on safety skills.

The National Center on Child Abuse and Neglect (NCCAN), established in 1974 by the Child Abuse Prevention and Treatment Act, has funded and supported many prevention efforts through its research, demonstration, services, and clearinghouse programs. In 1989 NCCAN began providing support for planning and developing nine model comprehensive community-based projects to encourage community groups to work together to prevent physical child abuse and neglect. NCCAN underscored its intent to have the projects be both community based and comprehensive and to network with and encourage the involvement of many community service providers. The following lists the nine projects, their grantees, and their locations:

- Dorchester CARES, Massachusetts Committee for Children and Youth, Inc., Boston, Massachusetts;
- PARE (Physical Abuse and Neglect Reduction Effort), ESCAPE (Exchange Club Center for the Prevention of Child Abuse), Carolina, Puerto Rico;
- NLFSI (North Lawndale Family Support Initiative), National Committee to Prevent Child Abuse, Chicago, Illinois;
- I CARE, Crittenton Family Services, Columbus, Ohio;
- Families First in Fairfax, Fairfax County Department of Human Development, Fairfax, Virginia;
- CLP (Community Lifelines Program), Cornell University Family Life Development Center, Ithaca, New York;
- CCAPP (Community Coalition Acting for Positive Parenting), Temple University Center for Social Policy and Community Development, Philadelphia, Pennsylvania;
- Family Care Connection, Children's Hospital of Pittsburgh, Pittsburgh, Pennsylvania; and
- Project Maine Families, Cumberland County Child Abuse and Neglect Council, Portland, Maine.

CSR, Incorporated, conducted a cross-site evaluation of the nine prevention projects to examine and document their experiences and contribute to an understanding of ways to strengthen families through enhancing community resources and partnerships. This report presents highlights of the experiences of the nine grantees and discusses the policy recommendations derived from those experiences.

CHILD ABUSE AND NEGLECT IN THE UNITED STATES
Research indicates that the incidence of child maltreatment in the United States is increasing. According to the third National Incidence Study of Child Abuse and Neglect (NIS-3), the number of abused and neglected children doubled between 1986 and 1993, from 1.4 million to more than 2.8 million (Sedlak and Broadhurst, 1996). The study estimated that the number of children who were seriously injured during that period quadrupled from approximately 143,000 to nearly 570,000.

The researchers state that these increases in child abuse and neglect probably are due to increased awareness and recognition, as well as real increases in the scope of the problem (Sedlak and Broadhurst, 1996). The magnitude of the increase in the number of seriously injured children indicates a true rise in the scope and severity of child abuse and neglect in the United States. However, the study estimated that the number of physically abused children under the stringent Harm Standard increased 42 percent, while the number under the more inclusive Endangerment Standard increased 97 percent; the researchers suggested that the sharper rise in the number of children endangered_many of whom were not yet harmed by maltreatment_points to an improvement in professionals' recognition of subtle cues associated with children experiencing not-yet-injurious abusive actions (Sedlak and Broadhurst, 1996).

Child neglect is the most commonly reported and substantiated form of maltreatment of children in the United States. Neglected children often die because they are left unattended when a house fire breaks out, lack medical treatment, or are left alone with insufficient food or water. One researcher found that approximately 65 percent of child abuse and neglect reports were for neglect (DiLeonardi, 1993). The NIS-3 study found that the number of physically neglected children under the Harm Standard increased 102 percent, to 338,900 in 1993, while the number of emotionally neglected children increased 333 percent, to 212,800 (Sedlak and Broadhurst, 1996). The researchers noted that neglect warrants more attention because it affects the greatest number of maltreated children, and their injuries often are serious.

It is sobering to realize that an estimated 2,000 infants and young children die annually from abuse or neglect (Advisory Board on Child Abuse and Neglect, 1995). Research by the Centers for Disease Control and Prevention suggests that abuse and neglect kills 5.4 out of every 100,000 children ages 4 and younger; however, because children's deaths often are misclassified, the researchers stated that a less conservative estimate could be as high as 11.6 per 100,000 (McClain, Sacks, and Frohlike, 1993). Data from other studies corroborate that statement, strongly suggesting that many cases classified as accidental death, child homicide, or sudden infant death syndrome might more appropriately be labeled child maltreatment deaths, if more comprehensive investigations were conducted (Lung and Daro, 1996).

The NIS-3 found that only a minority of the children who were abused or neglected received attention from child protective services (CPS). While the number of children investigated by CPS remained constant from 1986 to 1993, the percentage of children who received investigation decreased significantly, from 44 percent to 28 percent of children under the Harm Standard, indicating that a larger percentage of them did not receive CPS investigations of their maltreatment. Sedlak and Broadhurst (1996) suggested that this finding indicated that the CPS system has reached its capacity to respond to reports of maltreated children. This interpretation strongly points to the need for continued emphasis on prevention initiatives similar to the nine projects that are the focus of this report.

The human, social, and fiscal costs to society of child abuse and neglect are difficult to estimate. These include lost human life, criminal detentions, institutionalization, special education, and emergency and therapeutic services. Near-fatal child abuse and neglect leaves 18,000 children in the United States permanently disabled each year (Advisory Board on Child Abuse and Neglect, 1995). Tens of thousands of victims suffer psychological trauma that may scar them for life, and siblings and other family members are traumatized by the victims' maltreatment. Furthermore, in many families, child maltreatment becomes a pattern that is repeated in each new generation.
LINKAGES BETWEEN CHILD MALTREATMENT AND OTHER CONDITIONS

The causes of child maltreatment in the United States are complex. Important contributing factors include family structure and size, poverty, alcohol and substance abuse, domestic violence, and community violence.

Family Structure and Size

The NIS-3 study found that children of single parents were at higher risk of physical abuse and of all types of neglect and that children living with only their fathers were approximately one and two-thirds times more likely to be physically abused than those living with only their mothers (Sedlak and Broadhurst, 1996). The study also found that children in the largest families were physically neglected at nearly three times the rate of those who came from one-child families. The researchers point out that the added responsibilities and stresses associated with single-parenting and with numerous children in a household probably at least partially explain the relationship between incidence of maltreatment and family structure and size (Sedlak and Broadhurst, 1996).

Poverty

Although the literature on child maltreatment suggests that most poor parents do not abuse their children, there does appear to be a link between poverty and child maltreatment, and it is clear that some social and demographic characteristics do increase the likelihood that poverty will lead to abuse or at least to the reporting of abuse. The NIS-3 study found that family income was significantly related to incidence rates in nearly every category of maltreatment; children whose families had annual incomes below $15,000 were more than 22 times more likely to experience maltreatment, more than 44 times more likely to be neglected, and more than 22 times more likely to be seriously injured by maltreatment under the Harm Standard than children in families with incomes of $30,000 or more (Sedlak and Broadhurst, 1996). The researchers pointed out that a number of problems associated with poverty may contribute to a higher child maltreatment rate, including more transiency in residence, poorer education, higher rates of substance abuse and emotional disorders, and less adequate social support systems. They added that decreased economic resources among poor families and the increase in the number of children living in poverty may at least partially explain the increase in the child maltreatment incidence rate since 1986.

Alcohol and Substance Abuse

Alcohol is the most commonly abused substance in the United States. Evidence shows that alcohol is related to violence in general and to family violence in particular. Research on homicide, assault, child abuse, and spouse abuse indicates substantial associations between alcohol abuse and violence (Gelles, 1992). The NIS-3 researchers were struck by how often illicit drug use was noted in the narrative descriptions on the NIS data forms, and they pointed out that the increase in illicit drug use since 1986 may have contributed to the rise in child maltreatment incidence observed in 1993 (Sedlak and Broadhurst, 1996).

Children with drug-addicted parents are at extremely high risk for maltreatment from infancy through adolescence because of the physiological, psychological, and sociological nature of addiction. The National Committee to Prevent Child Abuse's (NCPCA's) 1995 Annual Fifty State Survey (Lung and Daro, 1996) estimated that 10 million children in the United States are being raised by addicted or alcoholic parents and that at least 675,000 children are seriously maltreated each year by an alcoholic or drug-abusing caretaker.
According to the President's 1990 National Drug Control Strategy Report, as many as 100,000 cocaine-exposed babies are born annually (Cook, Peterson, and Moore, 1990). The NCPCA study estimated that at least 11 percent of pregnant women nationwide are using illegal drugs (Lung and Daro, 1996). A 1991 study conducted for the Advisory Board on Child Abuse and Neglect concluded that services for substance-abusing parents were inadequate in most parts of the Nation (Advisory Board on Child Abuse and Neglect, 1991).

**Domestic Violence**

Some experts believe that a clear link exists between assaults on women and child abuse, with domestic violence as the single major precursor to child abuse and neglect fatalities in the United States (Advisory Board on Child Abuse and Neglect, 1995). Many observers have noted that infants and toddlers become distressed during parental arguments, and more serious forms of domestic violence have even more ominous implications for infant development (Osofsky and Fenichel, 1994). Several cases have been reported of young children (ages 2 to 4) having witnessed parent-parent homicide, which is considered a catastrophic psychological trauma for a young child (Schetky, 1978; Zeanah and Burk, 1984).

Estimates vary on the number of abused children living in homes in which their mothers also are being physically abused. For example, in the NCPCA survey, seven State liaisons (19 percent) reported that a significant percentage of their adult clients experienced domestic violence and had their own history of battering (Lung and Daro, 1996). Child protection workers in the Massachusetts Department of Social Services reported that an average of 32.5 percent of their cases statewide involved domestic violence (Hangen, 1994). A survey conducted by Straus and Gelles (1990) found that 50 percent of men who frequently assaulted their wives also frequently physically abused their children. This study also found that mothers who were beaten were at least twice as likely to physically abuse their own children as mothers who were not abused.

**Community Violence**

Community violence has reached epidemic proportions in urban areas of the United States (Osofsky and Fenichel, 1994). According to Garbarino, Kostelny, and Dubrow (1991) and Osofsky and Fenichel (1994), many children living in major U.S. cities experience conditions similar to a war zone, and many children living in inner cities report that they do not expect to live beyond their teenage years. A recent survey at Boston City Hospital found that one of every 10 children younger than age 6 attending the Pediatric Clinic had witnessed a shooting or stabbing. Half of these incidents occurred in the home, and the other half took place outside the home or in the street (Osofsky and Fenichel, 1994). A survey conducted by Chicago's Community Mental Health Council found that nearly 40 percent of 1,000 Chicago high school and elementary school students had witnessed a shooting; more than 33 percent, a stabbing; and 25 percent, a murder (Garbarino et al., 1991).

Although young children usually are not participants in criminal activity, their presence in a violent environment increases their risk of being physically and psychologically harmed. Homicide accounts for 10 percent of all deaths of children ages 1 to 4 (Osofsky and Fenichel, 1994). According to the American Humane Association (1996), 13 children are killed and 30 children are wounded by guns every day in the United States. Since 1988 American teenage boys have been more likely to die from gunshot wounds than from all other causes combined. According to the Children's Defense Fund (1996), firearm violence_whether homicide, suicide, or accidental shooting_killed 5,367 children (ages 1 to 19) in 1992.

**CHILD ABUSE AND NEGLECT PREVENTION**
In general, evidence on the effectiveness of child abuse and neglect prevention programs is mixed. Studies have found that some programs produce positive short-term outcomes, but many programs have failed to demonstrate stable, long-term improvements. Much can be learned from programs that do appear to produce positive changes. However, researchers have identified major shortcomings in many evaluations that make it difficult to document program success and prove program effectiveness.

**Evidence of Effectiveness**

A number of studies have found positive short-term outcomes and evidence of effectiveness for child abuse prevention programs (General Accounting Office [GAO], 1992; Advisory Board on Child Abuse and Neglect, 1993). Evidence exists that prevention efforts have resulted in positive gains in parental behavior, as indicated by measures of parenting knowledge and attitudes and, to a lesser extent, in indicators of child maltreatment such as child abuse reports. Some types of programs, such as multilevel programs that offer additional services over a longer period of time for higher risk families, appear to be worth the additional effort and expense, compared with less intensive services (Advisory Board on Child Abuse and Neglect, 1993).

Home visitation programs have been shown to be effective (Gray and Halpern, 1989; Rosenberg and Reppucci, 1985; Olds, 1983; Olds and Henderson, 1989). Programs for families with children ages 1 to 3 that provide a personalized approach stand out as most successful in achieving the desired outcomes, especially with higher risk families. One project that provided nurse home visits to poor, unmarried teenage mothers found an abuse rate 50 percent lower among its program participants than among those who did not receive such services (Olds, 1983). In addition, these mothers experienced an 82-percent increase in the number of months they were employed and a 43-percent reduction in subsequent pregnancies within the first 4 years after the birth of their first child. However, Olds (1983) points out that for mothers who were more specifically at risk of maltreatment because of traumatic childhoods, comprehensive therapy and broader neighborhood-wide changes were needed in addition to the support services of the nurse home visitor.

Gray and Halpern’s (1989) meta-analysis of early parenting intervention programs noted that the earlier parenting education programs are offered to parents or potential parents, the more effective they are; however, whether these effects are long lasting has not been tested. Programs with self-selected or voluntary clients were shown to be more effective than programs with compulsory participation, and programs that sought to encourage or change particular parental behaviors appeared to be more effective than programs that targeted attitudes or perceptions. For programs that aimed to change parenting attitudes, the more specific the program was in targeting participants, the more effective it was.

Cost-benefit studies suggest that although prevention can be costly, it pays for itself in the long run. For example, the Michigan Children’s Trust Fund study showed that providing a year-long parenting education and home visitation program to every Michigan family with a new, firstborn baby would cost approximately $43 million per year (GAO, 1992). By contrast, the estimated total State cost of dealing with the results of child abuse and low-birthweight babies exceeded $823 million annually.

A review of programs directed at families in which child maltreatment already had occurred found only limited evidence of usefulness of child-focused interventions but a greater degree of effectiveness in parent-focused treatments with cognitive-behavioral approaches (Wolfe, 1993). A review of Federal child abuse treatment evaluations (Daro, 1988) and other studies of child maltreatment intervention programs (Berkeley Planning Associates, 1977; Cohn, 1979; Pecora, Whittaker, and Maluccio, 1992) found that intervention programs generally have failed to demonstrate stable, long-term improvement in parent_child
relations and child welfare outcomes.

Program interventions that do produce changes have the following three common factors: multifaceted services, home visits, and active social support systems (Vondra, 1993). After reviewing studies of comprehensive multiservice treatment programs, Wolfe (1993) concluded that interventions initiated during crisis situations may have more impact due to the family's heightened motivation to change. That study also found that a detailed contract between clients and therapists may permit more accurate and complete assessment and may facilitate maximum responsiveness of the treatment program to families' needs.

**Shortcomings in the Program Evaluations**

A review of the literature reveals that large gaps exist in the quality of child abuse prevention evaluations. Fink and McCloskey (1990) identified the following shortcomings: inadequate definition of child abuse and neglect; paucity of valid measurements; lack of specification of the characteristics of families who benefit the most from programs; and omission of important topics, such as consequences and costs of medical neglect and cost-benefit analysis. Indirect (e.g., parenting attitudes and behavior) as well as direct (e.g., agency reports) measures of child abuse prevention need to be examined (Advisory Board on Child Abuse and Neglect, 1993). In addition, there is a lack of studies pertaining to the broader neighborhood and community contexts of child maltreatment; the importance of culture; the relationships between social isolation, social support, and child maltreatment; and the child or family characteristics that predict the efficacy of alternative interventions (Thompson and Wilcox, 1995).

**CONCLUSION**

Despite a wide variety of prevention efforts, child maltreatment remains a serious problem. The available data show that the incidence appears to be increasing and often is connected to other social problems, such as domestic and community violence, substance abuse, and poverty. Prevention programs must take into account the communities in which their target populations live and the stresses and dangers they face.

The nine child abuse prevention projects discussed in this report built on research findings, some of which were summarized above, and experimented with new services and approaches to develop comprehensive responses to local needs. Each of the projects incorporated NCCAN's recognition of the need to develop longer term, multifaceted projects that encourage networking and promote the involvement of many community service providers. In addition to the basic framework established by NCCAN that the projects were to be comprehensive and community based, the approach taken by each project was shaped by the geographic, ethnic, demographic, and economic context of each community. The projects also reflected the philosophy of their own architects, their history in the community, and the requirements of other sources of funding.

This grant program provided NCCAN and the prevention field a singular opportunity to learn about the strategies that work best to focus community resources on preventing child maltreatment. By highlighting the lessons learned by these nine communities and presenting policy recommendations based on their experiences, CSR hopes to contribute to an understanding of ways to strengthen families through solid partnerships with their communities.

Chapter 2, Prevention Components, discusses promising program components implemented by the nine projects. Chapter 3, Conclusions, summarizes the lessons learned by the projects and presents policy recommendations.
LESSONS LEARNED: PREVENTION COMPONENTS

Under the National Center on Child Abuse and Neglect (NCCAN) demonstration grant program, all nine projects implemented components aimed at providing (1) public awareness programs about positive parenting and positive family support; (2) parenting education and support programs, including home visitation programs, that acknowledged and reinforced parents’ responsibility for their children; and (3) community-based task forces that planned, developed, implemented, and oversaw the projects. In addition, four of the nine projects provided minigrants to support community organizations in conducting child abuse prevention activities. This chapter summarizes those five prevention strategies—public awareness, parenting education and support, home visitation program, community-based task forces, and minigrants to community organizations. Because parenting education and support and home visitation were implemented by the projects as distinct components, they are discussed separately, even though the program announcement treated them as a single component. Minigrant programs are included, even though they were not mentioned in the program announcement, because of their potential to deliver a wide range of community-based services at minimal cost to the projects.

- Public Awareness Programs
- Parenting Education and Support Programs
- Home Visitation Programs
- Community-Based Task Forces
- Minigrants to Community Organizations
- Summary

Public Awareness Programs

All nine projects implemented at least minimal public awareness components. Some used well-established media strategies such as frequent press releases and public service announcements (PSAs), while others used highly innovative approaches such as town meetings and cable television call-in programs. Most projects put considerable effort into establishing relationships with local media, including radio and television stations and newspapers.

Some projects generated considerable media attention in their communities and were the topics of numerous newspaper articles or were regularly interviewed on radio or television programs. All the projects made staff available to the local media to provide information on topics pertaining to child maltreatment or family support, and several regularly distributed media releases to local newspapers and radio and television stations to increase public awareness of parenting issues and of community programs available to help with parenting efforts. Two projects wrote their own articles about positive parenting and the prevention of child abuse and neglect for publication in local newspapers and newsletters.

Two projects developed major PSA campaigns about positive parenting that were broadcast on local radio and television stations. One of these projects conducted two widespread public awareness campaigns using the slogans "Only you can prevent child abuse" and "Put yourself in their place." These campaigns aimed to raise awareness about physical child abuse and encourage nurturing rather than authoritarian childrearing practices. Another project developed approximately 70 one-minute PSAs and obtained broadcast time for 300 PSAs per month from 10 radio stations. The PSAs conveyed information on positive parenting, provided tips on how the community could be supportive of parents and families, and
included a toll-free "warm" line number parents could call for parenting information and support.

The town meeting approach developed by one project was an interactive forum for public awareness. Town meetings provided information about child abuse and neglect issues and highlighted various agencies' activities to support families. They also provided opportunities for residents to express their concerns and become more involved in child abuse and neglect prevention efforts. Another interactive strategy was a cable television show featuring guest speakers; listeners were encouraged to call in with their questions and share their experiences. This effort expanded the public awareness component in a creative way to reach an even larger audience while providing residents with a forum to voice their concerns.

The interviews, media releases, newspaper articles, PSAs, and cable television shows made use of local media to publicize the projects' missions and interventions and to establish project staff as community experts on child maltreatment and positive parenting. Projects also used the following additional media strategies:

- "Don't Shake the Baby" campaigns, for which projects issued press releases, conducted community forums and symposia, placed posters in local businesses and health care providers' offices, and distributed flyers;
- Newsletters disseminated to community professionals and concerned residents through mailings and local publications, such as Penny Saver, that covered topics pertaining to child maltreatment and prevention, publicized interventions, and introduced staff of the projects and other community agencies;
- Media kits distributed to radio and television stations during Child Abuse Prevention Month that provided general information about child abuse and neglect as well as specific information about the project and other prevention programs in the community;
- Spotlight in an AT&T commercial about using cellular telephones to safeguard families (this project was one of 13 organizations awarded free cellular telephone service for home visitors);
- Short video, providing an overview of one project's components, that was broadcast on local cable television and was shown at community meetings; and
- Financial support of community businesses to cover the costs of broadcasting PSAs during prime time.

To achieve public awareness, five projects sponsored community forums, conferences, fairs, and festivals. One project convened an annual conference to heighten awareness of the need for positive community approaches to the problems facing children and families and to provide an arena for highlighting community-based prevention approaches to social problems. Another project implemented countywide family fairs and smaller neighborhood festivals to provide families with useful prevention information and create opportunities for positive family interaction. The popular character Spiderman appeared at events hosted by two of the projects; the project took advantage of this character's popularity to call attention to the problem of child maltreatment and the need for community action. Two other projects hosted community forums on family communication, reduction of violence, and the community's role in helping new parents. One project held small neighborhood festivals, such as Back-to-School Night, which emphasized the importance of education and encouraged the parents' and community's involvement in children's education.

Other public awareness strategies included developing resource lists, information packets, and giveaway items. Four projects published or translated community resource lists or directories that provided information on community resources for parents and families. One project developed information packets for new parents and county day care centers that provided information in an easy-to-read format on infant
care, child behavior management, community resources, and local child abuse prevention organizations. One project provided small giveaway items, such as balloons and photo magnets, that were imprinted with the project's name and telephone number; these items were distributed at community events and inserted into mailings with other prevention materials. The project also produced a brightly colored 5-by-8-inch list of community resources to distribute at festivals and other neighborhood events.

**Lessons Learned**

Several of the NCCAN projects found that public awareness campaigns were unexpectedly labor intensive. One project that produced a newsletter experienced difficulties in maintaining a bimonthly schedule and scaled publication back to a quarterly schedule. Another project held countywide family fairs during its early years and then shifted its focus to smaller neighborhood festivals because they required less staff time and fewer project resources but fostered greater participation by community residents.

One project that used a collaborative structure and approach to all its programming reported that the media initially tried to characterize the project in short "soundbites" or snippets. The project staff had to work patiently with reporters to get them to understand the complexities of the project's processes, partnerships, and services and to find a way to succinctly convey the project's essence.

Two projects discovered that effective public awareness campaigns require an understanding of the target population's information needs and information-seeking behavior as well as the ability to responsively design or adapt public awareness activities. One project held a series of focus group discussions with parents to examine how and where parents looked for information and assistance, the types of parenting information they needed, and the effectiveness of radio and television in transmitting information. One project reporting that public awareness activities were its most effective component believed that effectiveness was due to the staff's ability to listen to the target community and adjust their activities accordingly.

In general, the projects did not evaluate their public awareness components and, therefore, had no evidence of effectiveness. Only one project attempted to measure radio listeners' recall rate for its media campaign. It found that approximately 17 percent of the radio listeners recalled having heard one of the PSAs, either with or without prompts (i.e., hearing a PSA replay). However, the evaluators cautioned that the figure might be inflated because some respondents may have wanted to please the interviewer and may not have actually recalled hearing the PSAs. In addition, use of the toll-free number by callers in the listening area did not increase, even though the PSAs included the toll-free number and encouraged listeners to use it.

The projects used focus group discussions, participant evaluations, and key informant interviews to document the effectiveness of their public awareness activities. One of the most effective ways projects conveyed child abuse prevention messages in the target communities involved providing activities that encouraged interaction between community residents and child abuse professionals, such as town meetings, youth conferences, and call-in cable television programs. One project that included these interactive public awareness strategies found that developing solutions is the whole community's responsibility. Residents wanted to get information from community professionals who were aware of community problems and had suggestions but who did not attempt to provide solutions. The projects also found that different groups required distinctly different formats for public awareness activities. For example, youth responded most favorably to small group discussions, and broadcasts during the predinner hour garnered the widest variety of callers to the cable television show.

**Parenting Education and Support Programs**
All nine NCCAN projects provided some form of parenting education as either primary or secondary child abuse and neglect prevention. These programs aimed to achieve the following goals:

- Increasing parent knowledge about general child development, child management techniques, and positive family functioning;
- Improving overall childrearing skills;
- Increasing empathy for and awareness of others' needs;
- Improving the positive self-concept and self-esteem of all family members;
- Improving family and parent–child communication;
- Building family support and cohesion;
- Increasing parental knowledge about the triggers of abuse; and
- Increasing parents' use of nonviolent approaches to child discipline.

The projects offered parenting education and support as either a separate program component or in conjunction with home visits or school-based initiatives. In some cases, parenting courses focused on specific child age groups to provide more appropriate developmental information and child management techniques. For example, one project provided four age-specific courses under its Parent Nurturing Program, another project developed and implemented a prenatal parenting curriculum in public health clinics, and several projects provided parenting programs specifically for families with teenagers. In other projects, parenting programs were targeted toward specific parent populations, such as teenage parents, African-American parents, first-time parents, and substance-abusing parents.

Parenting education also was provided through home visitation programs. In a few instances, the demonstration projects developed specific educational materials, such as the Child Behavior Management Cards or curricula, to facilitate parent education during home visits. In most cases, however, parenting education was an informal but regular aspect of home visits, whether the visits were conducted by a health professional, an outreach staff person, or a community volunteer who primarily focused on mentoring or providing parent-to-parent support for at-risk parents. Most home-based educational efforts were targeted toward prenatal families or those with newborns and infants.

Several projects developed unique school-based components that offered parenting education and support opportunities by helping teenage parents complete their schooling while learning parenting skills; providing the family component of life skills training for youth; and encouraging better parent–child communication and interaction through in-school and afterschool programs.

Parenting education and support frequently was provided through parent-to-parent or volunteer mentoring programs and parent cooperatives, even in projects that conducted more formal parenting classes. These efforts were particularly helpful as ongoing exchanges of information between parents and people who were more like family friends than community professionals. Almost all of these informal efforts were conducted by community volunteers or parents participating in the demonstration projects, and they embodied skills and resources developed by the prevention projects that remained in the community beyond the demonstration period.

Lessons Learned

Over the demonstration period, the projects learned that effective parenting education often required multiple approaches to meet the diverse needs of the target populations. Some parents were best served by attending parenting groups where they could hear from and interact with other parents with similar problems, which facilitated their learning. Parents who were distrustful of traditional group settings or who were unwilling to attend meetings far from home could be served best by having parenting information
provided through home visits and other forms of information sharing. One important lesson was learned from providing parenting education through home visits, however. Even with the home visitor's best intentions, the educational component often took a backseat because family problems were more of a priority at the time of the visit. The projects also learned that noninteractive sources of parenting information, such as libraries and resource centers, often were underutilized.

Although the projects collected very little data regarding the direct impact of parenting education on child abuse prevention, strong evidence was found that parents benefited from the various formal and informal parenting education programs. In various surveys and focus group sessions, parents stated that they were pleased with what they learned and encouraged by the emphasis on personal growth and development. Many parents stated that they had increased their use of nonviolent child management techniques, experienced enhanced self-confidence and better parent–child communication, and developed problemsolving and other life skills as a result of their participation in parenting programs. Evidence also was found that parenting education increased parents' confidence in their parenting skills, which helped relieve stress within the family. Even when the program format was as simple as having an informed guest speaker, parents stated that they benefited from and enjoyed attending the sessions.

Not surprisingly, the projects found that most parenting education program participants, as well as parent volunteers, were women. One project decided that it should make a special effort to increase male participation by using mentoring couples (in addition to mothers and grandmothers) to draw men into the mentoring program, hosting events targeted to males only, and encouraging males to take on leadership roles.

In many cases, parenting programs produced ripple effects; that is, the program had an impact on others besides the direct participants. Family members who did not participate in the programs often began using the new techniques, sometimes at the suggestion of the children. One project provided a valuable story about a parent who had recently completed the Nurturing Program with her four children. While she was out one day, she received a call from her husband, who was at home caring for their 4-year-old child. In a distraught voice he asked, "What the hell is timeout?!" The child had told him that instead of hitting her, he should "put her in timeout." In addition, those trained to conduct parenting education became valuable community resources and often found additional opportunities to use their skills through their churches and other institutions.

Several projects learned that school-based parenting programs were an effective way of engaging parents in school activities and their child's education, even if the parents previously had not been involved. Engaging parents benefited the child's school performance and behavior and increased quality child–parent interactions. Teachers and school administrators reported that the parents involved in school-based parent programs were less defensive and better able to engage in problemsolving with school personnel, more open to receiving support during family crises, and more willing to volunteer for school activities. One project believed that mass distribution of age-specific parenting information through the schools was an effective way to reach a broad and interested population; the parents confirmed that they were interested in and pleased with the information, but the project did not measure changes in parents' behavior, attitudes, or parenting styles.

Reaching new parents and teenage parents required special effort from the NCCAN projects targeting these populations. Several projects in urban and suburban locations had difficulty reaching parents of newborns because local hospitals had regulations against providing client information to outside agencies or were unwilling to distribute new baby packets that contained information on child abuse prevention. In these cases, the projects found it more effective to locate families expecting babies through health clinics and doctors serving the target communities.
Providing parenting and support services to teenage parents required targeting services directly to that age group because many teenage parents did not feel comfortable in traditional parent settings. Even then, success with this target population often depended on individual circumstances. For example, school-based parenting programs designed to help teenage parents complete their education while gaining needed childrearing skills were geared specifically toward their current circumstances and future needs. However, their success at completing these educational programs was strongly influenced by the degree of support they had prior to beginning the program. Most of the projects found that a 6- or 10-week parenting program was just a beginning; parents required some form of ongoing parenting support following their formal educational program.

Parent support groups allowed parents to continue working on their skills development and provided contact with other parents experiencing similar problems. Several projects found that parent cooperatives also were an effective way of responding to unmet needs or specific issues of a small group of parents. Two of the most frequently mentioned effects of participation in these special-issue groups were improved relationships among family members and more effective parenting strategies. The projects discovered, however, that facilitating parent support groups and maintaining parent cooperatives were highly labor-intensive interventions; without adequate staff support, the meetings became infrequent and finally ceased.

Having volunteers working one on one with at-risk families was found to be an effective strategy in parenting education. One project concluded that because of the close relationships that developed between volunteers and families, the volunteers often were better able than professional staff to identify possible risky conditions leading to child abuse or neglect, such as overcrowded conditions, poor parenting skills, and poor nutrition. In addition, volunteers often served as role models who offered new perceptions and attitudes for program participants.

**Home Visitation Programs**

Seven projects implemented home visitation programs, and two of the seven implemented two distinct programs, for a total of nine home visitation programs. These programs provided health services, child development activities, parenting education, family support, substance abuse intervention, and case management. Overall, there were nine different types of home visitation programs. Five programs were operated directly by the projects, two were subcontracted to community agencies, and two were collaborative efforts with community agencies.

The number of families served by the programs ranged from 15 to 215, with much of the difference based on how long the programs had been in operation. All the projects limited their home visitation programs to families who lived within their geographic target locations, which had high proportions of residents living in poverty and experiencing other problems. Additional eligibility criteria varied by project.

Seven of the programs served pregnant or new parents. Two programs screened parents to focus on those most at risk for child abuse, two programs limited themselves to serving only Hispanic or teenage parents, and two programs served parents only until the child was age 1 to 3. Other target populations included families living in a housing project where there were allegations of sexual offenses between children, those being investigated or served by child protective services (CPS), those experiencing domestic violence, those with a developmentally disabled child, and those who were at risk because of alcohol and other drug abuse.

Families were recruited from a wide variety of sources. All programs received referrals from health
facilities, including hospitals or maternity clinics, health departments or centers, and physicians' offices. Five programs recruited from a wide variety of community agencies, such as crisis nurseries, parenting programs, and family support centers. Families also were referred by school nurses and by suicide prevention line workers. Three programs obtained referrals from child maltreatment or domestic violence agencies, such as the county CPS agencies or battered women's shelters. Other sources included staff outreach (including distribution of flyers in several languages), parent volunteers, neighborhood residents, and program participants who helped spread the word.

The frequency of home visits varied widely. Initially, home visits occurred frequently—even weekly—but visits were reduced over time, depending on family need and progress.

Six of the programs used a multidisciplinary team approach. Key staff included nurses, lay volunteers, and family support workers. All six indicated they had a program coordinator or supervisor. Two home health visitation programs collaborated closely with family support workers who were part of other components of their NCCAN project (e.g., a family cooperative or resource center).

Family support staff provided a variety of services depending on the program, including early identification of child health or developmental problems, outreach, parenting education, advocacy, brokering of services, and counseling. Four programs used paraprofessionals to provide family support or health services, and three of these programs hired bilingual/bicultural staff for this role.

Six programs provided information on the supervision and training of team members. These programs reported that they conducted extensive training or maintained regular supervision of their home visitation staff. Programs used methods involving team training sessions, parent-to-parent notebooks for home visitors, required home visitor progress reports, and weekly group meetings between supervisors and staff.

The home visitation programs employed the following creative approaches:

- A staff person from a battered women's shelter accompanied the home visitor on visits to a family facing domestic violence.
- A program that focused on serving families at risk because of alcohol or other drug use offered rapid response and 24-hour availability.
- One project integrated its home health visitation program with primary health care services to provide continuity between center-based care and home-based family support.
- One project held an annual birthday party and picnic each summer to recognize milestones for participating families; families with babies turning 2 years old were given a certificate of achievement and graduated from the program.
- A "play pal" or high school student who accompanied the home visitor engaged in play activities with the siblings of the target child so the home visitor could focus on the parent and infant receiving the primary intervention.

**Lessons Learned**

Two projects reported that the personal characteristics of their staff were at least as important as knowledge and experience. One project emphasized the need to hire staff who were nonjudgmental, compassionate, and able to communicate with families from all educational and social backgrounds without becoming overly identified with them.

One project that used volunteers as home visitors noted that its volunteers were primarily women. Thus, the project revised its marketing strategy by stressing that its home visitation program was open to all new
parents, incorporating male mentors and mentoring couples into the volunteer pool, and offering parents a choice of male or female mentors. These strategies resulted in increased involvement of males in the home visitation program.

Projects learned that family problems could be enormously complex. One project found that families needed services beyond short-term monitoring of their infants’ health status, such as crisis support, parenting education, and assistance in securing social services. This same project found that many families were dealing with as many as six separate major issues, such as loss of employment, drug addiction, serious health problems, and impending eviction. These issues needed to be addressed before a family could focus on parenting education techniques. Another project serving both open CPS cases and new parents found that the open-case families were a distinct population requiring more kinds of services. Because of the differences in these two types of families, two distinct staffing teams were used to serve them.

One project stressed that its family service plans were critical to the success of its home visitation program. Its home visitation team believed that prioritization of goals and objectives and periodic review of a written family-centered workplan were the most effective ways to document and monitor progress with a family and were especially important in a long-term model.

Eight of the nine home visitation programs reported positive impacts on children and families. One indication of success was the fact that eight of the nine programs continued in some form after the NCCAN grant ended—often through State or local government funding—and one target community became the site of a new home visitation program funded by other sources immediately following the demonstration period. The following illustrates how one mother benefited from the home visitation program:

...whenever I needed them, they were all there for me. The health center, the home visiting nurse, they help me cope with a lot of problems...and if I don’t have transportation they offer it to me...if I need to relax, they come right over and take over for me for a little bit....I don’t feel all alone.

Community-Based Task Forces

All nine projects used community-based task forces or advisory boards to help shape and direct their operations. These task forces generally met on a monthly basis and were entrusted with full decisionmaking and policymaking responsibility. They guided, monitored, and/or delivered the initiatives’ activities throughout the grant period and, in many cases, helped the communities sustain the programs after NCCAN funding ceased. Most projects believed that the affiliations represented on these task forces were necessary to establish a presence within the community, obtain referrals, and reduce the duplication of services. Cohesive, collaborative working relationships were formed instead of the competitive relationships that often result from initiation of new prevention efforts.

The composition of the task forces varied greatly among the nine projects. If existing task forces were available, interested, and able to provide guidance in family support and child abuse and neglect prevention, the projects developed working relationships with them. In one case, the existing community task force was the creative organization that developed the original project proposal to NCCAN. Many of the projects created new advisory boards at the beginning of the grant period, and one project used both an existing and a newly created board. The projects developed their advisory councils so they could benefit from the experience and guidance of a diverse pool of public and private agencies, organizations, and individuals within the local communities that had not previously worked together. One advisory board
member described the effects of bringing together diverse community organizations as follows:

I'm impressed with the amount of cooperation that exists now, compared with before. [The Board is] really a consortium of different agencies. That in itself is a success. It's not often you can pull together people who aren't used to working together on an issue.

The mission statements for most of these collaborations stated that their objectives were to design strategies and workplans that would result in a high degree of community involvement and ownership. As one project emphasized, with today's changing political climate and social service trends, only community-owned programs will be institutionalized.

Only five of the projects sought to include community residents on their task forces, and only two established quotas regarding the mix of professional and local resident board members. As reported by one project, the issue of including community residents was complicated by the fact that residents often expressed discomfort and a lack of confidence in their ability to participate with professionals; they were unsure of their qualifications and ability to advance the project's causes, secure additional funding, and effect community-level changes.

The projects that included community residents in their advisory organizations stressed that the residents' involvement with the planning and decisionmaking aspects of the project was crucial in identifying needs and appropriate programs for the target population, as well as in achieving a sense of community ownership. The community residents also benefited from their participation in these leadership experiences. Most of the projects sought community representation by involving residents and program participants in program-specific committees or advisory councils that dealt with programs such as the family resource centers, family and school events, and parent support programs rather than serving on the primary task force.

**One commonly held assumption was that having a governing body with representatives of a wide range of organizations encouraged community networking to identify and secure additional assistance and funding for the projects. At least one project attributed its success in obtaining additional funding to the composition of the task force. In addition, task force members noted that their participation in the community-based demonstration projects helped them more comprehensively address family support and child abuse and neglect prevention in their communities and avoid costly duplication of services to local families.**

**Lessons Learned**

Some of the major obstacles encountered by the projects in developing and maintaining working relationships between their task force or advisory board members and agency members included turf issues over clients and funding sources, difficulty in persuading community residents to serve as members, and strained relations between staff and board members. Community agencies found they had differing agendas and priorities, which led to a high turnover in board positions, thus creating leadership gaps, which in turn influenced overall project effectiveness. Projects also reported attrition problems resulting from a lack of clear direction and delineation of responsibilities.

One project's solution to reducing competition and increasing incentives for agency involvement was to have participating agencies hire staff and serve as fiscal agents for programmatic funding, with half of the indirect expense going to the collaborating agency. Most projects found that to reduce member resistance as well as resistance from other community constituents, they needed to stress the collaborative nature of the effort. They also reported a need to place a high priority on open communication between board
members, which allowed members to air their differences and find solutions. Those projects that were able to communicate well and clearly define duties and operational directions maximized the effectiveness of their community-based interagency task forces. Several of these governing bodies chose to continue meeting after the NCCAN demonstration grant funding ended.

Minigrants to Community Organizations

Four projects used a portion of their NCCAN funding for small grants to community organizations designed to encourage the development of local programs that would strengthen families and reduce the incidence of child maltreatment. These community organizations used the grants to provide parenting education programs, neighborhood resource centers or safehouses, scouting and group activities, afterschool programs and programs for teenagers, and parent-child play activities. Other programs focused on literacy, cultural activities, Court Appointed Special Advocate volunteers, tenant empowerment and legal rights, hotline services, and vocational training. The four projects varied in the size of the grants they awarded and differed on requiring a competitive request for proposal (RFP) process. Two projects had formalized grant programs, and two did not.

The largest minigrant program was carried out over 4 years, used a formal RFP process, and awarded more than $100,000 to 57 grantees (48 organizations). Another project also used a formal RFP process but implemented the minigrant strategy during the final 2 years of the project, awarding $42,500 to 19 grantees (14 organizations).

The two less-structured projects did not use a formal RFP process; rather they provided ad hoc grants to community groups for carrying out prevention programs that could not be funded in other ways. For example, as a result of input from the community, one demonstration project collaborated with another community organization to provide startup funding for implementing a home visitation program. Small amounts of funding were provided for several community-based parenting education initiatives. The other project provided financial support to already established community groups if they lacked adequate funding to carry out a specific activity (e.g., a family fair).

The projects with formal minigrant initiatives developed RFPs outlining the criteria and requirements for receiving a minigrant, selected the recipients based on the formal criteria, and monitored and provided technical assistance to the minigrant recipients. One of the projects formed a team that included representatives from the county human service and contracts departments to select and support the recipients, while the other project used a council of community representatives to review and implement the minigrants. Both projects required that the minigrant organizations cooperate with site visits by project staff prior to the grant awards, sign a Memorandum of Agreement, submit budget reports, and cooperate with the projects' evaluation efforts.

In implementing its minigrant program, one project determined that many of its grantees needed additional assistance to develop their program capacity and accountability; thus, a community development person was added to the staff to provide technical assistance and to manage the needs of the grant recipients. This person established a personal relationship with the grantees and offered assistance with fiscal management, program planning and development, networking with other minigrant recipients, and proposal development. The project also used graduate students from its university grantee agency to provide technical assistance to the minigantees.

In each of the four grantmaking projects, funds were available to organizations working in the target areas that demonstrated programmatic support for the prevention of child maltreatment. As with all the prevention strategies, program categories were interpreted broadly. For example, the projects funded
safehouses and afterschool recreational and tutoring activities for children, life skills training programs, and intervention counseling for parents on drug and alcohol abuse prevention. All of these activities helped to reduce some of the stress that contributes to child maltreatment. Grantee programs demonstrated a variety of different perspectives of the family and community. Some were Afro-centric; some targeted Latino populations; and others were based in churches, schools, recreation centers, and homeless shelters.

**Lessons Learned**

The migrant programs tried to foster a neighbor-to-neighbor attitude in helping program participants deal with child development issues. Migrant staff often came from the target communities and usually were volunteers, activists, or community leaders who engaged at the grassroots level with the people they helped. In most cases, target parents and families accepted these staff as role models.

The project that provided a community development specialist to assist the migrant organizations found that the grantees needed this type of sustained support and welcomed and consistently requested aid from this staff person. Many of the minigrants reported increased numbers of clients seeking help and expanded their programs beyond the original grant award. Some grantees attributed their success, in part, to the project’s responsiveness to the needs of their program.

The projects also learned that successful implementation required that organizations be able to exercise basic managerial control. Some organizations that were awarded grants were unable to accept the awards because they lacked the accounting skills and organizational structure necessary to meet accountability requirements. Migrant organizations were required to keep track of their expenses, secure a programming site, track participants served, and observe and document changes in their target populations.

All of the projects found that the migrant organizations had difficulty evaluating their programs. The structure of many migrant organizations tended to be informal, not well organized, and not conducive to being monitored or evaluated. Project staff encouraged the grantees to keep records for reporting purposes but were never able to collect adequate data on program activities. The use of standardized pretests and posttests for individual participants also did not work well because of the loose structure of the grantees’ programs; the tests either were not administered, or their administration was flawed (e.g., no identifying numbers were assigned so pretests and posttests could not be matched).

The two projects with formal migrant programs experienced some organizational barriers with regard to their grantmaking processes. In both cases, the structure of their parent agencies—a university and a county government—caused difficulties regarding grant disbursement. In one case, initial migrant funds were delayed while, in the other, accountability requirements delayed quarterly disbursement. Because the receiving agencies often were small, resident-controlled groups and organizations, delays in receiving program funds represented considerable hardship. The migrant strategy allowed organizations and agencies to develop child maltreatment prevention interventions that worked in diverse settings with widely varying clientele. The projects felt that their migrant initiatives were successful and reported that the strategy encouraged experimentation with a broad array of prevention interventions, fostered collaborative partnerships, and was able to reach target populations who were at risk for child maltreatment.

**Summary**

The nine NCCAN projects implemented five types of programs—public awareness, parenting education and support, home visitation, community-based task forces, and minigrants to community organizations—that were essential to achieving the community changes that they sought or that were
particularly promising in terms of potential cost-effectiveness. Through their experiences, they learned a number of lessons about what was effective and what was problematic in implementing or operating a program.

Public Awareness

In implementing public awareness campaigns to increase awareness of positive parenting, the projects found that it was important to develop contacts with local media, distribute regular PSAs, and establish project staff as community experts on child maltreatment and parenting skills. Other public awareness activities involved developing and distributing newsletters, media kits, posters, flyers, resource lists, small giveaway items, and other sources of information about positive parenting. Interactive forms of public awareness activities, such as community forums, call-in cable television shows, conferences, fairs, and festivals, were popular methods of providing families with prevention information.

The projects also found that some public awareness activities (such as monthly newsletters and large community fairs) were unexpectedly labor intensive, and they had to scale back the scope of their activities. In general, effective public awareness components required that the project have an understanding of their target communities' information needs and information-seeking behavior.

Parenting Education and Support

Parenting education and support was provided through the Parent Nurturing Program, Child Behavior Management Cards, and specialized curricula developed for specific populations of parents. The projects focused parenting education programs on parents of children within specific age groups or on parents from specific populations such as teenage parents, African-American parents, first-time parents, and substance-abusing parents. Using nonprofessional community volunteers to work with at-risk families often proved to be an effective way to impart parenting skills.

The projects found that parenting education often had to take a back-seat to other more urgent family problems. They also found that noninteractive sources of parenting information, such as libraries and resource centers, often were underutilized; home visits, parenting support groups, and other interactive forms of information sharing tended to be the most effective.

Home Visitation Programs

Using a multidisciplinary team of nurses, lay volunteers, and family support workers appeared to be an effective way to deliver home visits. Integrating home visits with primary health care services provided continuity between center-based care and home-based family support. Family service plans, which prioritized goals and objectives and were periodically reviewed with the families, were especially important in achieving progress with the client families.

Home visitors also had to face complex problems in their target families; they found that the families often needed crisis support, parenting education, and assistance in securing social services beyond the kinds of short-term services (e.g., monitoring their infant's health status) that were the primary purpose of the home visits.

Community-Based Task Forces

The projects found that the community-based task forces were necessary to establish a presence within the community, obtain referrals, reduce duplication of services, and achieve community ownership of the
projects. When the task forces included community residents, the residents benefited because they had opportunities to become leaders, and the projects benefited because they had input from the community, which helped them with program development and implementation. Another result of forming community-based task forces was that competitive working relationships were replaced with cohesive, collaborative relationships and cooperation between agencies was created where there had been little or no cooperation.

The projects found that including community residents in the task forces often was difficult because the residents expressed discomfort and lacked confidence in their ability to participate with professionals to advance the project's causes, secure additional funding, and effect community-level changes. Other difficulties included turf issues between agency members over clients and funding sources, strained relationships between staff and task force members, and turnover in task force membership. However, the projects generally found that working through these problems resulted in enhanced community ownership and was worth the effort.

Minigrants to Community Organizations

Four projects found that awarding small grants to community organizations was a good way to deliver services at minimal cost to the projects. Minigrants were used to provide parenting education programs, neighborhood resource centers, group activities for children, afterschool programs, parent–child play activities, literacy programs, cultural activities, and other types of services. Because the minigrants were awarded to grassroots community-based organizations, they were able to achieve urgently needed services for a wide variety of families at minimal cost.

The projects found that the organizations receiving minigrants needed sustained support and technical assistance in addition to funding. They also found that some minigrant organizations lacked basic managerial control and organizational structure, and all the minigrant organizations had difficulty evaluating their programs. In addition, delays in grant disbursement from the projects caused some hardship among the minigrant organizations.
LESSONS LEARNED: CONCLUSIONS

One of the goals of the National Center on Child Abuse and Neglect (NCCAN) demonstration program was to produce compelling evidence for policy and program decisions regarding which community-based, collaborative activities successfully focus resources on preventing child maltreatment and why. The nine projects learned a number of important lessons through implementing program components, as previously described. In addition, the findings of CSR, Incorporated's cross-site evaluation point to several issues as being paramount in implementing prevention programs. The findings also suggest several themes that have important policy implications. This chapter presents these implementation issues and policy implications.

VITAL PROGRAM ELEMENTS

The experiences of the nine NCCAN projects strongly support the finding that the following program practices are important ingredients in community-based prevention programs: emphasizing community involvement and ownership, employing a positive approach, starting on a small scale, and implementing a strong evaluation and using it as a program management tool.

Be of the Community, Not Just in the Community

Community collaboration and ownership must be an integral part of a project's design. Community residents and community-based organizations must contribute ideas and be involved in choosing, designing, and implementing services throughout the life of the project so the project reflects community values and norms as well as addresses the real needs of the community. Community organizations must be enlisted as collaborators to avoid service fragmentation and to enhance rather than duplicate existing resources. The projects found that achieving the necessary collaborative relationships required them to stress, from the beginning, that they were a collaborative effort; to emphasize the resources that the community already had; and to strive to enhance the use of the existing resources.

The nine projects implemented the following strategies for achieving community collaboration and ownership and encountered several barriers to be overcome.

Use a Community-Based Advisory Council.—All the projects reported that the development of and ongoing commitment to an independent community-based advisory council or task force was a key element in achieving community cooperation, involvement, and ownership. These advisory councils were responsible for guiding and monitoring all project activities, and they helped to ensure that communities were involved in making decisions about the projects' interventions. The projects used the following strategies to create effective advisory councils:

- Require members to participate in developing goals and objectives, ask them to take responsibility and, in some cases, share the costs for at least one objective;
- Maintain a strong commitment to empowering other community agencies to better coordinate and deliver services to the community;
- Include members from all levels of organizations, not just executive directors;
- Include parents and community members who are not staff with other agencies;
- Develop a spirit of camaraderie and gain cooperation through annual weekend retreats; and
- Require members to attend a mandatory number of meetings to remain in good standing.

Reflect Community Characteristics.—Another element critical to programmatic success was that the project interventions, staff, evaluation methods, and program implementation and adaptation acknowledged the cultural, linguistic, and social uniqueness and characteristics of the target communities.
The projects found that it was advantageous to hire staff indigenous to the community, people who were known to the community and who had community organizing and outreach skills. These individuals shared the experiences of the target populations they lived in the same neighborhoods, were ethnically and socially compatible with the target populations, and knew what would be successful. The projects often hired people who "graduated" from the project itself because these individuals were accepted by the families in the community and knew how the target community was likely to respond to the interventions. The projects also confirmed that curricula developed for parenting education and for school-based programs must be culturally appropriate. When a curriculum fostered cultural awareness and pride among participants, it met with greater acceptance and appeared to have more impact.

**Develop Partnerships by Crossing Boundaries.**—Becoming an integral part of the target community often required crossing agency and hierarchical boundaries. It required attitude shifts on the part of staff, community organizations, neighborhoods, and families. Staff had to move beyond understanding their role as experts to thinking of themselves as partners with the families and with other organizations. Community residents and families had to shift from being recipients of services to being participants in the program's design and implementation. One project included, as part of the program structure, periodic focus group discussions with various groups of parents (e.g., working parents, teenage parents, new parents, and low-income parents) to find out what the parents' concerns and needs were and the best ways to address them. Another project maintained its collaborative structure by not becoming an incorporated entity; member organizations served as fiscal agents for the collaborative's funding, and decisions were reached through the consensus of all collaborative members.

**Devise Creative Strategies.**—The NCCAN projects used many other creative ways to involve the communities and enhance community ownership. These included the following strategies:

- Awarding ministrants to grassroots community-based organizations to enable the organizations to provide needed community services and activities;
- Using community volunteers in neighbor-to-neighbor approaches, town meetings, cable television programs, parent support groups, community events, and conferences planned and implemented by local youth;
- Developing close collaborations or partnerships with organizations that the target communities held in high esteem and that could vouch for the project;
- Establishing partnerships with and placing services in local schools and churches;
- Obtaining donations and involvement from the local business community;
- Co-sponsoring community events and other programs with community organizations, especially those providing positive family experiences at little or no cost to participants;
- Participating in community referral networks, including agencies involved with the task forces or advisory councils;
- Employing a sensitive, friendly approach in all contacts with community organizations;
- Making all project activities easily accessible to the target community and including transportation and/or child care; and
- Addressing pressing needs of the target families, such as food, housing, laundry, and recreation.

**Use Patience and Consistency in Overcoming Barriers.**—In many economically stressed communities, service providers jealously guard their turf and fiercely compete for limited resources. In addition, community residents often are distrustful of new programs because they have seen many programs come and go due to the vagaries of funding. In some cases, the NCCAN projects found that the community distrusted the grantee organization (i.e., they perceived insensitivity to or lack of involvement in important community issues), which hampered their ability to implement and operate their programs. Finally, the projects found that the involvement of some community agencies often depended on the interest,
personality, and contacts of particular individuals in the agencies; if those individuals left or their interest or availability decreased, the involvement of that agency ceased.

These factors made collaboration a slow process that required patience, time, consistency, and a constant focus on visibility and credibility in the community. In addition, some projects decided to refrain from implementing services until they were certain they could provide them on a long-term basis, so as not to exacerbate community suspicions about the "fly-by-night" nature of social service programs. These factors presented barriers to the projects in achieving their long-term goals.

**Emphasize the Positive**

The NCCAN projects found that positive programming that identified and built on family and community strengths was more effective than prescriptive approaches. The following strategies were used to emphasize the positive.

**Use a Positive-Sounding Name.**—The NCCAN projects confirmed that a positive approach began with their project name. They found that they had to avoid using a name that contained the term "child abuse" because many people would not associate with a program with such a name. They also had to avoid using the term "prevention" in their names because people would wonder what the program intended to prevent. Many of the grantees recast their names to more positive forms that connoted support and collaboration. Projects began using such names as "Project Maine Families," "Families First," "Family Support Initiative," and "I CARE." The name changes indicated a broadening of the programs' focus—from preventing child abuse to providing support for the entire family. The projects viewed this shift as a critical step toward achieving their goals and objectives within their communities.

**Recognize and Build on Community Strengths.**—The projects emphasized that even at-risk, highly stressed communities had strengths and resources that could support the projects' efforts. Although it may have required concerted efforts to uncover these strengths, the payoff in community empowerment made the efforts worthwhile. Community strengths brought out by the projects included (1) strong neighbor networks built on the sharing of a cultural background; (2) energetic and dedicated volunteers who were determined to make a difference in their communities; (3) struggling families who cared deeply about raising healthy children; (4) influential and respected community leaders who believed in the importance of family issues; and (5) vibrant and creative community organizations (e.g., churches, health centers, drug treatment programs, Head Start programs, and social service agencies) that were providing urgently needed services under difficult conditions. Recognizing and accessing these community resources was critical in establishing effective projects.

**Provide Family Recreational Opportunities.**—The projects found that incorporating fun and recreational events geared toward the entire family into their programs was essential to building program participation and achieving program goals. People were not likely to participate in activities that were held in a place where they were uncomfortable (e.g., many target parents did not feel comfortable in schools), nor were they likely to attend programs that focused on difficult topics such as disciplining children, unless there were opportunities for enjoyment and relaxation. Project staff found that sharing fun and laughter strengthened their bonds with the families and enhanced their sense of community. These events also encouraged growth of informal friendships and development of stronger social networks, which decreased the social and geographical isolation that often correlated with child maltreatment.

**Anticipate Potential Negative Consequences.**—The projects' efforts sometimes were sabotaged in unanticipated ways. For example, public service announcements about child maltreatment raised public awareness about child abuse but, in some cases, upset children or created a judgmental atmosphere about
"good" and "bad" parents that drove parents away from the programs. Several projects held activities in local schools, believing that the schools were a convenient, familiar, and comfortable location, but some found that target parents were uncomfortable in schools and avoided the projects' activities because of their own unpleasant experiences as students. Finally, CSR's findings suggest that the involvement of the local police department and the presence of police officers at project activities helped families in some communities feel safer and thus increased program participation but, in other communities, drove away families who felt uncomfortable with or suspicious of the police.

**Think Big and Start Small**

Implementing comprehensive community-based prevention programs such as the nine NCCAN projects was a complex undertaking. Developing relationships with community organizations and families required a great deal of time, patience, and persistence. The projects found that it was necessary to "think big and start small" so that goals would be manageable and staff would not be overwhelmed. Starting one neighborhood at a time, obtaining the involvement of that neighborhood, discovering its unique resources and needs, and making mistakes and then adjusting the program allowed projects to work out strategies and interventions targeted at the neighborhood and led to successful program implementation. Success in one neighborhood generated interest in other parts of the community.

The projects found that a community would find a way to continue the project's activities beyond the NCCAN grant period if the activities were built on a small enough scale to be consistent with the community's level of resources and if community institutions were involved in their development. Six of the nine projects institutionalized at least some of their activities so that the prevention efforts they began continued after NCCAN funding ceased.

**Design, Implement, and Use a Strong Evaluation**

The nine projects encountered a number of difficulties with their evaluations that prevented them from persuasively demonstrating the effectiveness of their program interventions. They found that the information obtained through their evaluations (especially their process evaluations) was useful as an ongoing project management tool but, due to the difficulties encountered, the outcome evaluation findings were inconclusive regarding program performance. The projects did, however, provide compelling narrative and anecdotal evidence attesting to their positive effects in the communities. The lessons learned from their experiences in evaluating their projects are instrumental for any community-based project interested in designing a strong evaluation.

First, implementing an evaluation was problematic for some projects because they had budgeted too little money for evaluation activities, even with additional funding provided by NCCAN specifically for evaluation. This problem emphasizes the need to develop an evaluation plan and realistic budget concurrently with the initial program design and to have a program evaluator working with the project at startup.

Project staff, although enthusiastic about their programs, were not necessarily skilled in measurement, data collection, or analysis. This often resulted in resistance to responding, or responding fully, to technical assistance and other research suggestions from NCCAN, CSR, or their local evaluators. This problem emphasizes the need to fully convey evaluation requirements to project staff and to provide the necessary support, training, and supervision so that project staff can respond appropriately.

The projects had difficulty finding research instruments that measured what they were trying to achieve and that were valid, reliable, and culturally appropriate and age appropriate. Seven of the projects located
or developed research instruments that they felt were appropriate, but the instruments were inconsistently or incorrectly administered by at least four projects. In general, the projects that did administer research instruments to program participants found that extremely small sample sizes prevented any meaningful data analysis. Even paying participants for completing pretests and posttests was not enough to achieve a sufficiently large sample size. In addition, projects often experienced sizable attrition rates so that the pool of project participants became very small.

A sound outcome evaluation design must include the use of matched comparison subjects or longitudinal designs, valid and reliable outcome measures that are culturally appropriate and age appropriate, and statistical analysis techniques that examine interrelationships among key outcome variables. To understand the complex interrelationships that exist among risk factors for child maltreatment, an evaluation should measure intermediate variables, such as family relationships and social networks, as well as terminal variables, such as child discipline practices and child protective services reports.

To ensure that the outcome evaluation of a demonstration project has a chance to identify measurable program effects, the outcome evaluation should not be conducted until program implementation has stabilized (i.e., until delivery of program services has become consistent). Findings from this study suggest that when a project attempted to evaluate outcomes while the intervention was still unstable, evaluation findings were inconclusive. This does not mean, however, that the project should wait until stabilization has been achieved to begin working with an evaluator or to develop an evaluation plan; the evaluator and the evaluation plan should be in place from the beginning.

Finally, to monitor and improve program performance and to understand positive, negative, or no program outcome results, the process evaluation and the outcome evaluation should be given equal importance.

All these issues—evaluation plan and design, a realistic budget, skillful and well-informed staff, appropriate research instruments, and evaluation timing—should be addressed in the early stages of program design. Program design should specify funding criteria that allow evaluation requirements to be met while enabling the kind of individuality, creativity, and flexibility that may be necessary for adapting to differences in community populations and practices.

**POLICY IMPLICATIONS**

The results presented in this report do not provide unequivocal answers to the questions of what works to prevent child maltreatment and why. However, the projects' experiences in implementing their prevention programs suggest several general themes that have important implications for NCCAN program and policy development.

**Program Scope**

The broad scope of the original grant announcement encouraged the grantees to implement a wide range of components and target a large number of families. This scope reflected findings from recent research suggesting that effective prevention requires multiple strategies to reduce family and community stressors, improve parents' understanding of developmentally appropriate behavior, enhance the functioning of social networks, and increase the entire community's level of understanding about how to develop and support resiliency in families. In response to the announcement, some grantees incorporated a broad family support focus, which made it difficult to focus on and attain the key program objectives geared toward reduction of child abuse and neglect. The broad scope of the grant announcement was not feasible for some grantees because they had limited budgets, institutional barriers, and other priorities; at times, their attempts to be responsive resulted in a diffusion of focus and effort.
It is recommended that NCCAN focus future grant programs on fewer components or more narrowly defined target populations. For example, the focus could be on one type of prevention (i.e., primary, secondary, or tertiary) or on only a few types of interventions, such as services for parents under stress and associated support services. Although such an approach would not address all the risk factors that contribute to child abuse, resources would be focused and would have a greater impact on some of the risk factors.

In addition to a narrower focus, it is recommended that the program scope explicitly incorporate a neighborhood-based approach to providing services to target populations. Both researchers and practitioners have emphasized the importance of the neighborhood in human service interventions (Advisory Board on Child Abuse and Neglect, 1993; Barry, 1992; Cochran, Larner, Riley, Gunnarsson, and Henderson, 1990; National Commission on Child Welfare, 1990). Prevention programs should focus on strengthening neighborhoods both physically and socially to promote the healthy development of children and families. This follows the recommendation of the Advisory Board on Child Abuse and Neglect (1993) to incorporate a comprehensive neighborhood-based approach that will have a positive effect on community safety, mental health, education, family welfare, and possibly the local economy.

Although a narrower scope is recommended, the 5-year funding period should be retained. The projects found that the 5-year period gave them an opportunity to make changes to be responsive to the needs and characteristics of the target community; shorter grant periods allow little opportunity to adapt in response to what is learned after program implementation. Demonstration projects generally exhibit a four-phase lifecycle including (1) the startup phase; (2) the growth, development, or transformational phase; (3) the stable/mature phase; and (4) the institutionalization phase. Some projects need to go through the lifecycle more than once to discover what works in the community and what does not. If the lifecycle is cut short, a project will be unable to achieve its goals, and little will be learned from experience. The 5-year period was long enough to enable the majority of the projects to complete the lifecycle and institutionalize at least some of their services within their target communities so that services could continue beyond the NCCAN funding.

**Community Involvement**

All nine projects found that to reach their target families and create genuine changes in the communities, they had to involve the communities in the planning, implementation, and operation of their projects. All nine projects used community-based advisory councils to achieve community involvement, although doing so was optional in the grant program announcement. They also found that it was important to reflect the unique cultural, linguistic, and social characteristics of the target communities and to find creative ways to engender a sense that the project was owned by the community. Comprehensive, community-based projects such as these should be required to use a community task force, reflect the language and culture of the target community, and address in their grant proposals the ways that they plan to achieve community ownership of the project because community involvement is essential for success. Requiring new demonstration projects to incorporate community task forces into their initial program design and to describe their plan for achieving community involvement and ownership early on would save time and effort later on.

**Program Evaluation**

The experiences of the nine projects suggest several steps that NCCAN could take to improve the quality of prevention projects' evaluations and help the prevention field to better understand what works.
Assess Available Instruments and Develop Recommendations. In view of the problems NCCAN projects encountered in finding or developing measures of key intermediate and terminal outcomes, CSR recommends that a systematic assessment of available measures of intermediate and terminal prevention outcomes be undertaken. This effort should focus on developing recommendations of instruments that are valid and reliable in a wide variety of settings and situations (e.g., measures appropriate for different cultural groups, different languages, different ages and developmental stages, and different locations). These recommendations then should be incorporated into future grant programs.

Specify Evaluation Requirements. CSR recommends that NCCAN provide grantees with a research framework and priorities delineating key research questions on child maltreatment; grantees should be required to implement rigorous process and outcome evaluation designs to answer the research questions. CSR also recommends that NCCAN thoroughly assess (1) each potential grantee’s familiarity with the theoretical underpinnings of the proposed intervention and their relationship to anticipated outcomes and (2) the quality of each potential grantee’s evaluation design.

CSR recommends that NCCAN provide specific guidelines on the various aspects of the evaluation process to potential grantees and require them to fully address how they would implement these guidelines. These guidelines should include, but not be limited to, the following areas:

- The types of evaluations required (e.g., process and outcome);
- Suggested or required research designs and methodologies to be used and valid and reliable research instruments and measurement strategies relevant to the prevention of child maltreatment; and
- A proportion of the budget to be committed to the evaluation effort (a minimum requirement might be 15 percent).

CSR recommends that NCCAN require prospective grantees to fully discuss in their proposals the timing and use of an outside evaluator who is not connected to the grantee agency as well as how the potential grantee plans to work with this evaluator so that communication between program and evaluation staff will be an ongoing and effective process. In addition, it would be very useful for NCCAN to provide a clear delineation of the roles of any technical assistance provider and the grantee agency with regard to the evaluation.

Finally, CSR supports the requirement that demonstration grantees participate in a national cross-site evaluation. CSR’s conclusions also support extending cross-site evaluation for 1 year beyond the projects’ demonstration period, and CSR recommends that future cross-site evaluations be similarly designed.

Require Rigorous Process Evaluation. Rigorous process evaluation is needed and should be planned during the program design phase and begun at project startup. Process evaluation is important for at least two reasons. First, it can identify important variables necessary for understanding how and why prevention interventions work or how program outcomes occurred. Second, it provides the grantees and the Federal Government an assessment of program readiness for outcome evaluation. Demonstration prevention program development should be closely monitored and outcome evaluation, unlike process evaluation, should be undertaken only after determining that the program has reached a relatively stable state.

Move the Prevention Field Forward by Balancing Rigor and Innovation. In calling for more rigorous evaluation requirements, CSR recognizes that there are vast differences in target communities and that new prevention approaches must be explored. The Federal Government must strike a balance between specifying requirements for program evaluation and allowing for the programmatic differences that are necessary for serving various target populations as well as incorporating diverse and innovative prevention strategies. However, without strong program evaluation, including both process and outcome evaluations,
projects that might have made a positive difference in their communities have a difficult time proving their effectiveness. The Federal Government, as the source of funding for many prevention projects, plays a crucial role in requiring and assisting projects' evaluation efforts to produce convincing, valid, and reliable findings. Conclusive research findings are critical in guiding program development and making policy decisions that incorporate effective prevention approaches and, ultimately, move the prevention field forward.
LESSONS LEARNED: REFERENCES


____. 1996f. Preventing Child Abuse and Neglect: A Case Study of I CARE. Washington, DC: CSR,
Incorporated.


HOW EFFECTIVE IS THE MULTIDISCIPLINARY APPROACH? A FOLLOW-UP STUDY

NEIL J. HOCHSTADT, PH.D.

Director, Behavioral Science Department, La Rabida Children's Hospital and Research Center and Assistant Professor, Pritzker School of Medicine, Department of Pediatrics, University of Chicago, East 65th Street at Lake Michigan, Chicago, IL 60649

NEIL J. HARWICKE, PH.D.

Senior Psychologist, Behavioral Science Department, La Rabida Children's Hospital and Research Center, Chicago

Abstract—The multidisciplinary approach to diagnose, evaluate, and plan the treatment of victims of child abuse and neglect has been widely advocated and adopted by hospitals and community-based protective service teams. Despite the increasing prevalence of this approach, few if any studies have looked at its effectiveness. In the current study the effectiveness of the multidisciplinary approach was assessed by looking at the number of recommended services obtained by a sample of 180 children one year after evaluation by a multidisciplinary team. The results indicate that a large percentage of services recommended by the multidisciplinary team were obtained. This compares with the very low probability of service acquisition reported in samples of abused and neglected children identified by CPS teams but not having access to a multidisciplinary evaluation. The multidisciplinary team plays a central role in acquiring the services needed to reduce the deficits and sequelae suffered by the victims of child abuse and neglect.

Résumé—Les auteurs ont voulu évaluer la valeur de l'approche multidisciplinaire, ce qui n'a pas été fait souvent jusqu'à présent. Cette approche est recommandée, en général, par les spécialistes de la question, mais la preuve de son efficacité manque en grande partie. Le sort de 180 enfants souffrant de mauvais traitements ou de négligence a été évalué dans le but de mesurer la valeur de l'approche multidisciplinaire. Contrairement à ce qui se passe dans les situations où ce genre de tactique n'est pas la règle, l'approche multidisciplinaire a l'avantage de mobiliser un nombre de services plus élevé et de les mettre au bénéfice des enfants. Le résultat, de ce côté-là, est donc positif. Il faut cependant faire une nuance en ce qui concerne les enfants victimes de négligence. Malgré le fait que la vie de ces enfants est en danger (en particulier les cas de déficits nutritionnel et de croissance) on a trop tendance à remettre ces enfants, une fois déposés, entre les mains de leurs parents. Il semble que l'on assume que, dans les cas de négligence, la situation est moins dangereuse que dans les cas de mauvais traitements, ce qui est faux. Il apparaît donc que l'approche multidisciplinaire est fructueuse en ce qui concerne le nombre et la qualité des services mis à la disposition des familles, mais qu'elle n'a pas évité, jusqu'à présent, le piège qui consiste à considérer la négligence comme moins dangereuse que la violence.

Key Words—Child abuse and neglect; Multidisciplinary; Follow-up.

INTRODUCTION

IT HAS BEEN REPORTED that abused and neglected children suffer from a wide range of deficits and many sequelae of their trauma. Early treatment planning and the provision of requisite services and treatment are essential if these children are to have a chance to attain...
normal growth and development. Recently, there has been an emphasis on the need for early diagnosis and consultation by multidisciplinary teams, but little effort has been made to determine if these efforts lead to the provision of the required services for this high risk population. In response to the lack of research in this area, the current study evaluated the effect of a multidisciplinary child abuse and neglect program on service delivery.

The multidisciplinary approach to diagnose, evaluate, and plan the treatment of victims of child abuse and neglect has been widely advocated [1–5], and has been widely adopted by hospitals and community-based protective service teams in the recent past. Despite the increasing prevalence of this model, there have been few, if any, follow-up studies of its effects on service delivery, especially in the child abuse field [6]. Follow-up studies have looked at emotional sequelae [7], intellectual deficits [8–12] and neurological impairments [8, 11, 13]. The difficulties in conducting follow-up research in this area are many, and include methodological problems (e.g., the inability to define abuse and neglect, and the choice of dependent variables), time constraints, cost to follow-up of a large number of patients, and difficulty in obtaining data due to issues of confidentiality and poor interagency cooperation [14].

One of the primary purposes of the multidisciplinary approach is to reduce the fragmentation of the service delivery system [15]; yet there are no indicators that fragmentation has decreased as the result of the increased use of the multidisciplinary approach [16]. In studies of protective service agencies and court systems, Terr and Watson [17], Purviance and Ryan [18], Burt and Bayley [19], Poiler [20], and Cain [21] found evidence of fragmented service delivery, lack of planning, duplication of services and failure to deliver the requisite services. The importance of articulating the multidisciplinary evaluation with follow-up services is highlighted by the fact that 50% of the estimated 420,000 children in foster care in the United States will spend their pre-adult lives in out-of-home placement, much of which has been attributed to the lack of adequate case planning [22].

A basic measure of the success of the multidisciplinary approach is whether the services recommended by the process are obtained. In this study we sought to determine how successful our multidisciplinary program was in obtaining the requisite services for abused and neglected children and their families.

Background

La Rabida Children's Hospital and Research Center is a 77-bed pediatric specialty hospital, affiliated with the University of Chicago and staffed by physicians from the Department of Pediatrics, University of Chicago. It provides both inpatient and outpatient services to children with chronic illnesses and rehabilitative needs. In 1977 a modest child abuse and neglect program was undertaken based on the following premises:

1. The Child Protective Service units (CPS) of the Illinois Department of Children and Family Services (DCFS), the legally mandated reporting agency in Illinois, generally lacked the data base upon which to make decisions regarding the children they serve. Decisions concerning children in need of protective services were commonly based on the expediencies of the CPS system rather than on the needs of the children.

2. Interventions made on the child's behalf must be made early in the protective service/ juvenile court system, immediately after identification of the suspected abuse, but prior to court involvement. Once court action was taken, we thought it would be difficult or impossible to make meaningful changes on behalf of the child or the family.


4. A Diagnostic/Consultation/Community Outreach Model would be a more effective and cost efficient approach than the traditional approach that is based on counseling.

The Program

Initially the La Rabida program consisted of a comprehensive, multidisciplinary evaluation of children referred by CPS units for suspicion of abuse or neglect. The evaluation consisted of inpatient medical and psychological evaluations of the child (or evaluation of development in children under 3 years of age), documentation of the abuse/neglect (via x-rays, bone surveys, photographs, etc.), psychosocial assessment of the family, educational assessment, and extended behavioral assessments and other ancillary evaluations as indicated (e.g., psychiatric evaluations, speech, language and hearing evaluations, etc.). A case conference with the child's CPS worker and the DCFS hospital liaison in attendance was held following the completion of the multidisciplinary evaluation. Specific recommendations and treatment plans were made at this case conference. While the components of the above diagnostic program were in themselves remarkable, to our knowledge La Rabida Children's Hospital was, and still is, the only facility in Chicago to offer these comprehensive services to abused and neglected children.

In the second year of the program, a grant from the Chicago Community Trust provided for the addition of a community outreach worker to facilitate the follow-up by home visits, serve as facilitator and ombudsman to these families in the general pediatric clinics and monitor the progress that the CPS teams were making in obtaining the specific services recommended by the multidisciplinary evaluation. Follow-up of our sample was through the community worker's liaison to the families (natural and foster) and to the CPS workers, and through pediatricians and others in the hospital's outpatient clinics.

METHODS

Procedure

One year following discharge the recommendations made by the multidisciplinary team were reviewed by the community worker who contacted the child's CPS worker, parent(s), and/or the foster parent(s) to ascertain whether the services recommended had been received. Two independent sources (e.g., case worker and parent) were required to corroborate whether services had been obtained.

Retrospective review of records identified twelve categories of recommendations (services):

- return to the natural home,
- foster placement,
- residential psychiatric placement,
- individual psychotherapy (child),
- special education classroom placement,
- family therapy,
- additional psychiatric/psychological diagnostic services,
- individual psychotherapy (family member),
- additional diagnostic services,
- infant stimulation programs (0–3 years old),
- in-home support services (e.g., homemaker services),
- visiting nurse services.

The number and type of recommendations varied from case to case, i.e., in some cases no recommendations were made regarding placement (return to natural home, foster placement or residential placement), but recommendations were made regarding other services (special education placement, additional diagnostic services, etc.). Where the hospital-based multidis-
The multidisciplinary team offered no recommendations regarding placement, the recommendation of the state CPS team determined the placement. This study looked only at those recommendations made by the multidisciplinary team.

Subjects

Approximately 200 children were evaluated during a two plus-year period of time, all having been reported to DCFS as suspected of being abused or neglected. Of this number, 180 children were located for inclusion in this study. There were no specific referral criteria to the program other than the case having been reported to the CPS unit for investigation of suspected child abuse or neglect. Individual CPS workers made the decision to refer each child to the program. Retrospective review of records revealed that children fell into one of five categories: (1) no documented medical or historical evidence of abuse or neglect (N = 36); (2) medical evidence of abuse (N = 27); (3) medical or historical evidence of neglect (N = 46); (4) medical evidence of abuse and neglect (N = 30), and (5) failure-to-thrive (FTT), children under 3 years old with a history of delayed or arrested physical growth (below the 3rd percentile for weight), with no organic etiology, who gained weight during hospitalization (N = 41). The mean age at admission for the total sample was 4.36 years. The mean age for the FTT children was 0.99 years and 5.36 years for the non-FTT sample. Ninety-seven children were male and 83 female; 13 children were white, 163 black and 4 latino.

Outcome Measures

The primary goal of the study was to ascertain the effect of the multidisciplinary team on service delivery, as measured by determining the number of recommendations that were followed/obtained by the child's CPS worker one year following the multidisciplinary evaluation. Other factors surveyed were: the legal status of the child at discharge and at follow-up (e.g., return home with full rights restored to the parents, temporary custody, ward of the state, etc.), and the place of residence of the child at follow-up. The legal status of the child and the place of residence are thought to provide an indirect measure of the effect of the multidisciplinary evaluation.

RESULTS

Follow-up after one year revealed that a surprisingly high percentage of the recommendations made by the multidisciplinary team had been obtained by the children and families (Table 1). The effectiveness of the multidisciplinary team is seen most clearly in the placement decisions (return home or foster care), where the recommendations of the multidisciplinary team were followed 100% of the time (return home) and 92% of the time (foster care). [The 10 children recommended for foster care in the no-abuse/neglect category (Table 2) represent an artifact of the evaluation process and of the protective services system. These children were being evaluated while allegations of abuse/neglect were under investigation. The retrospective review of their medical records revealed no evidence (by medical exam or history) of abuse/neglect. The protective services investigation determined that the initial allegation was not substantiated. However, during the evaluation deficits in the family's ability to care for the child were noted and foster care was recommended.]

Other services were obtained less frequently ranging from 76% (visiting nurse) to 29% (additional psychological and psychiatric assessment). In general, outpatient psychological service recommendations were not followed as frequently as other service recommendations. Family psychotherapy, individual psychotherapy (child), and addition psychological/psychiatric assessment were obtained 44%, 35% and 29% of the times they were recommended, respectively. The type of abuse suffered by the child did not influence the number of recommended services obtained (Table 2), but the type of abuse/neglect suffered by the child did influence the type of service(s) recommended. For example, the multidisciplinary team was more likely to recommend additional medical assessment, infant stimulation programs and visiting nurses for the FTT group than for other groups.

Other outcome measures of the effectiveness of the multidisciplinary approach, albeit indirect, are the legal status of the child at discharge, at follow-up, and the place of residence at follow-up (Tables 3 and 4 respectively). Data related to legal status and residence was collected for the first year of the study only. The legal status at discharge differed between the groups significantly (p < .0003; Table 3). This difference was accounted for, in large measure, by the high number of FTT children sent home rather than being placed in temporary custody. At follow-up (Table 3) the children's legal status had shifted to guardianship from predominantly temporary custody at discharge. This legal maneuver makes the child's legal status as a ward of the state somewhat permanent. The shift in legal status between

### Table 1. Percentage of Recommended Services Obtained 1 Year After Multidisciplinary Evaluation

<table>
<thead>
<tr>
<th>Recommendation(s)</th>
<th>Number of Recommendations</th>
<th>% Obtained</th>
</tr>
</thead>
<tbody>
<tr>
<td>Return Home</td>
<td>18</td>
<td>100</td>
</tr>
<tr>
<td>Foster Care</td>
<td>78</td>
<td>92</td>
</tr>
<tr>
<td>Visiting Nurse</td>
<td>33</td>
<td>76</td>
</tr>
<tr>
<td>Additional Medical Assessment</td>
<td>56</td>
<td>66</td>
</tr>
<tr>
<td>Infant (0-3) Stimulation Program</td>
<td>36</td>
<td>64</td>
</tr>
<tr>
<td>Individual Psychotherapy (family member)</td>
<td>28</td>
<td>64</td>
</tr>
<tr>
<td>Residential (Psychiatric) Treatment</td>
<td>17</td>
<td>59</td>
</tr>
<tr>
<td>In-home Supports</td>
<td>7</td>
<td>57</td>
</tr>
<tr>
<td>Special Education Class</td>
<td>27</td>
<td>52</td>
</tr>
<tr>
<td>Family Therapy</td>
<td>18</td>
<td>44</td>
</tr>
<tr>
<td>Individual Psychotherapy (child)</td>
<td>37</td>
<td>35</td>
</tr>
<tr>
<td>Additional Psychological/Psychiatric Assessment</td>
<td>14</td>
<td>39</td>
</tr>
</tbody>
</table>

### Table 2. Percentage of Recommended Services Obtained 1 Year After Multidisciplinary Evaluation X Type of Abuse/Neglect

<table>
<thead>
<tr>
<th>Recommended Services</th>
<th>No Abuse/Neglect</th>
<th>Neglect</th>
<th>Abuse</th>
<th>Abuse and Neglect</th>
<th>F.T.T.</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>n = 36</td>
<td>n = 46</td>
<td>n = 27</td>
<td>n = 30</td>
<td>n = 41</td>
</tr>
<tr>
<td>Return Home</td>
<td>100 (4)*</td>
<td>100 (2)</td>
<td>100 (7)</td>
<td>100 (1)</td>
<td>100 (4)</td>
</tr>
<tr>
<td>Foster Care</td>
<td>80 (10)</td>
<td>100 (17)</td>
<td>84 (19)</td>
<td>91 (22)</td>
<td>100 (10)</td>
</tr>
<tr>
<td>Visiting Nurse</td>
<td>86 (7)</td>
<td>66 (3)</td>
<td>50 (6)</td>
<td>100 (1)</td>
<td>81 (16)</td>
</tr>
<tr>
<td>Additional Medical Assessment</td>
<td>69 (13)</td>
<td>79 (14)</td>
<td>79 (14)</td>
<td>44 (9)</td>
<td>33 (6)</td>
</tr>
<tr>
<td>Infant (0-3) Stimulation Program</td>
<td>50 (8)</td>
<td>50 (4)</td>
<td>100 (6)</td>
<td>100 (2)</td>
<td>56 (16)</td>
</tr>
<tr>
<td>Individual Psychotherapy (family member)</td>
<td>50 (4)</td>
<td>33 (3)</td>
<td>66 (12)</td>
<td>100 (3)</td>
<td>66 (6)</td>
</tr>
<tr>
<td>Residential Psychiatric Treatment</td>
<td>100 (1)</td>
<td>100 (2)</td>
<td>50 (5)</td>
<td>50 (4)</td>
<td>—</td>
</tr>
<tr>
<td>In-home Supports</td>
<td>100 (1)</td>
<td>0 (1)</td>
<td>0 (1)</td>
<td>100 (1)</td>
<td>66 (3)</td>
</tr>
<tr>
<td>Special Education Class</td>
<td>60 (5)</td>
<td>73 (5)</td>
<td>20 (5)</td>
<td>44 (9)</td>
<td>—</td>
</tr>
<tr>
<td>Family Therapy</td>
<td>29 (70)</td>
<td>50 (2)</td>
<td>50 (6)</td>
<td>100 (2)</td>
<td>0 (1)</td>
</tr>
<tr>
<td>Individual Psychotherapy (child)</td>
<td>43 (7)</td>
<td>40 (5)</td>
<td>37 (16)</td>
<td>22 (9)</td>
<td>—</td>
</tr>
<tr>
<td>Additional Psychological/Psychiatric Assessment</td>
<td>0 (1)</td>
<td>75 (4)</td>
<td>0 (1)</td>
<td>0 (1)</td>
<td>17 (6)</td>
</tr>
</tbody>
</table>

**Note:** Number in parenthesis represents total number of recommendations made in each category.
discharge and follow-up differed significantly as a function of the type of abuse/neglect (χ² = 35.28, p < .0002). More children in the no-abuse/no-neglect group were likely to be returned home in that interval, whereas substantially more abused children were still in temporary custody at follow-up. FTT children were more likely to have been returned home than children in any of the other categories except no-abuse/no-neglect.

Residence at follow-up is largely influenced by the child's legal status. That is, the child is more likely to be living out of the home if he has been placed in guardianship than if he remains in temporary custody. Table 4 presents the child's place of residence at follow-up. This table presents data related to the child's place of residence at follow-up as a function of the type of abuse and the place of residence. Significant differences between the groups emerged. Many more children in the no-abuse/no-neglect group were living with their parents at follow-up than in the group as a whole (p < .0004). More neglected children were still living in foster care at follow-up than would have been expected.

**DISCUSSION**

Abused children, their families, and the multidisciplinary team function within highly complex and overlapping systems (medical, social service, protective service, judicial and legal). Given the complexity of the multiple systems within which the multidisciplinary team functions, the current study demonstrates that this approach can have a very positive effect on the delivery of requisite services to abused and neglected children and their families. Although the current study did not use a control group, a previous study conducted by the New York State Assembly’s Select Committee on Child Abuse [23] found that only 1.2% of the protective services cases surveyed received services beyond the initial CPS involvement.

**REFERENCES**

ABUSED CHILDREN ADMITTED TO A PEDIATRIC IN-PATIENT SERVICE IN SWITZERLAND: A TEN-YEAR EXPERIENCE AND FOLLOW-UP EVALUATION

P. E. Ferrer, M. Schaller and I. Girardet

(PED Clinique de Pédiatrie, Hôpital Cantonal Universitaire, 1211 Genève 4, Switzerland)

Abstract—In a period of 10 years (1974-1983) 82 children were admitted to our pediatric in-patient service because of child abuse or neglect. In 1984 the records of these children were examined to obtain a follow-up of 34 children who were less than 10 years of age at the time of their admission for non-accidental trauma. Thirty-eight percent of these children were less than 2 years old at the time of abuse, 30% from 2-3 years (68% less than 3 years) and 32% between 3-10 years. The lesions were described in the literature. There was a greater proportion of children of foreign origin than would be expected from the general population of Geneva. At the time of hospital admission the majority of the parents were legally married and the majority of the children were cared for at home by a parent or relative. The perpetrator in most situations remained unknown; universal denial was the rule and therapeutic treatment of the family difficult to establish. The general policy of the protective services in Geneva is to maintain the abused child with his biological family. Over time, however, there is a tendency for abused children to be either removed from their homes and placed in foster care or to receive stricter supervision within their families. A large proportion of the study children were experiencing school difficulties and attended special classes. A relatively large number had left the country, either with or without their parents. Risk factors recorded in the literature were identified: Social isolation experienced by families of foreign workers, intrafamilial violence, violence experienced by parents during their own childhood, post-natal separation of the infant or child from the mother, unemployment and drug or alcohol addiction appeared to be more potent risk factors than prematurity and early mother-infant separation.

Résumé—De 1975 à 1983, 82 enfants maltraités ou négligés ont été hospitalisés à la Clinique de Pédiatrie de l’Hôpital Cantonal Universitaire de Genève. En 1984, nous avons décidé de revoir les dossiers de ces enfants et de faire une enquête sur le devenir et les conditions de vie de 34 d’entre eux, qui avaient moins de 10 ans lors de leur hospitalisation pour sèvices. Le 38% de ces enfants avaient moins de 2 ans et le 68% moins de 3 ans lors de l’admission. Les lésions constatées étaient comme clairement décrites dans la littérature. Les enfants issus de familles étrangères étaient en excès par rapport à la proportion d’étrangers résidant à Genève. Lors de l’admission à l’Hôpital, la majorité des parents étaient légalement mariés et la majorité des enfants étaient sous la garde de leurs parents ou d’un membre de la famille (le nombre d’enfants fréquentant des crèches était relativement élevé mais pas excessif par rapport aux enfants à Genève en général). Dans le règlement qui s’est passé déterminer avec certitude qui était l’agresseur, le déni était quasi universel, ce qui rendait difficile toute tentative d’établir une alliance thérapeutique. La politique des services de protection de l’enfant, à Genève, est de maintenir autant que possible l’enfant maltraité au sein de sa famille biologique. Il apparaît à l’évidence toutefois qu’après un certain nombre d’années un nombre élevé de ces enfants font l’objet d’un placement nourricier ou de mesures de contrôle plus strictes : celles envisagées au début. Au point de vue scolaire, davantage d’enfants ayant été maltraités fréquentaient des classes spéciales ou avaient des difficultés que normalement. Une fraction relativement importante des enfants maltraités avaient quitté le pays, soit avec leurs parents soit seuls, renvoyés chez des membres de la famille vivant encore dans le pays d’origine. On a recherché et identifié un certain nombre de facteurs de risque. L’isolement socio-culturel (enfants de travailleurs étrangers), la violence intra-familiale, la violence subie par les parents dans l’enfance, la séparation mère-enfant après la période néonatale, le chômage et les toxicomanies paraissent tous être des facteurs de risque plus puissants que la prématurité ou la séparation mère-enfant précoce.

IN SWITZERLAND very few statistical data on child abuse and neglect (CAN) have been published. Denial, taboo and cultural factors combine negatively to affect any attempt to evaluate the importance of the problem in this country. This is not to imply that child
PREVENTION OF CHILD NEGLECT
Emerging Issues

DAVID A. WOLFE
University of Western Ontario and the Institute for the Prevention of Child Abuse

Research studies conducted over the past decade involving maltreating families largely confirm that the vast majority of parents lack competence in their role because of inadequate availability of resources, poor preparation and support in their role as parents, and impairment in coping due to overwhelming sources of stress present in the family and community. This article presents an overview of some of the risk factors that have been identified and that especially pertain to child neglect. Suggestions of ways to conceptualize prevention goals follow from these identified risk factors. Examples of some of the more promising programs that have emerged in recent years, based on a family support model of prevention and early intervention, are discussed. Recent programs directed at prevention of child neglect have primarily built on successful treatment approaches and applied them to a much broader segment of the parenting population at an earlier point in time. Several conclusions and suggestions for prevention planning in the area of child maltreatment follow from this discussion.

Although intervention models have greatly improved in recent years and have contributed to encouraging gains in treatment outcomes, the field of child abuse and neglect remains split between promising research findings, on the one hand, and the realities of child protection and welfare, on the other hand. Unfortunately, the dominant theme in most services to maltreating families remains that of protection, not treatment or assistance (Azar & Wolfe, 1989). Because most intervention tends to occur only after a major identified incident of abuse or neglect, parents must be identified and labeled in order to receive some level of assistance. Current laws and priorities focus largely on the most serious indicators of risk to the child, leaving child protection agencies with few resources to assist families who have not, as yet, violated any community standard. Understandably, to offer services at an earlier point in time to the many families that could benefit requires a retooling of our priorities and procedures within the child welfare system, to encourage parents to seek assistance early on for their important role (Wolfe, 1990).

Psychological interventions with reported maltreating parents have developed gradually from an individually based pathology model to an all-encompassing ecological model, with an evolving emphasis on the importance of the parent-child relationship and its context. Simultaneously, the orientation toward the treatment issue, that is, how such behavior is viewed, has shifted gradually away from a parent-focused, deviance viewpoint and more toward one that accounts for the vast number of stress factors that impinge on the developing parent-child relationship. This shift toward a more process-oriented, contextual theory of maltreatment places greater emphasis on the importance of promoting parental competence and reducing the burden of stress on families. As Belsky (1984) explains, parental competence (i.e., sensitivity to the child's developing abilities and communications) is influenced by such factors as (a) parental resources (e.g., education, attitudes about childrearing, parents' background experiences), (b) the child's characteristics (e.g., temperament, health, developmental level), and (c) the family context (e.g., the marital relationship, the quality of social networks and supports, and community resources).

Despite theoretical advances, recent reviews of interventions with abusive and neglectful parents raise some doubt as to the effectiveness of treatment efforts (and adequacy of research efforts) that are delivered well after negative patterns of parent-child interaction have been established (Azar & Wolfe, 1989; Cohn & Daro, 1987; Fink & McCloskey, 1990; Mash & Wolfe, 1991; Videka-Sherman, 1989; Wekerle & Wolfe, 1992). Some of the prominent factors contributing to this lackluster success with tertiary treatment of child maltreatment have to do with the nature of the target population and our general tendency to miss the mark in servicing their needs. First of all, there is a marked tendency for parents to be unwilling to seek help until it is forced on them or the problem becomes major. Avoidance of
services makes sense, however, in light of our current strategy for combating child maltreatment. Currently, our child welfare system functions on the basis of reaction to crises and conflicts, and consequently little effort is directed toward the “front-end” of the child welfare system. Those families who are most in need often receive very little support and assistance until they commit a major violation of childcare practices. This article explores some of the factors that could form the basis for alternative service delivery for abusive and neglectful families, and provides an overview of the more promising programs that have emerged in recent years based on a family support model of prevention and early intervention.

IDENTIFYING PREVENTION OBJECTIVES: WHO AND WHAT ARE THE TARGETS OF PREVENTATIVE SERVICES?

CRITICAL PERIODS FOR PREVENTION ACTIVITIES

Greater attention is needed to address the concern of how some parents gradually acquire the preconditions that lead to the rather sudden onset of abusive behavior, or the more gradual onset of neglect. Rather than focusing on observable factors that are often present once a family has been labeled or reported, this viewpoint looks at the process by which the more subtle, preexisting factors associated with the individual parent, child, or family situation become transformed over time into a high-risk or maltreating situation.

The transitional model of child maltreatment (Wolfe, 1987) was formulated to describe such a course of development in terms that have relevance to prevention and early intervention. The model is based on two presuppositions. First, the development of inappropriate child-rearing patterns is presumed to follow a somewhat predictable course in the absence of intervention or major compensatory factors. This course is described in reference to stages, which serve to underscore the contention that abuse and neglect develop from a gradual transformation in the parent-child relationship from mild to very harmful interactions. Accordingly, the initial stage is relatively benign in comparison to later stages, in that the parent has not as yet behaved in the manner that significantly interferes with the parent-child relationship. However, this viewpoint suggests that failure to deal effectively with the demands of their role early on can readily lead to increased pressure on the parent-child relationship and a concomitant increase in the probability of abusive or neglectful behavior.

The second presupposition of this model relates to the importance of psychological processes that are linked to the expression of anger, arousal, and coping reactions in adults. Specifically, these processes include operand and respondent learning principles for the acquisition or maintenance of behavior, cognitive-attributational processes that influence an individual’s perception and reaction to stressful events, and emotional conditioning processes that determine the individual’s degree of physiological arousal, perceived discomfort, and self-control under stressful circumstances.

The initial stage in this model, labeled “reduced tolerance for stress and disinhibition of aggression,” begins with the parent’s own preparation for this role (in terms of psychological and social resources, attributional style, modeling, and similar learning experiences from childhood), and his or her current style of coping with daily demands that compete with the parenting role. Parents’ responses during this period, in which their roles and responsibilities are gradually being acquired, are based largely on their own family of origin and their preparation for this role by their previous childcare experiences. For those who are at risk of inappropriate childcare, training is often inadvertently accomplished over the course of childhood through the modeling of aggressive problem-solving tactics and an external attributional style, rehearsal and reinforcement of aggressive behavior with siblings and peers, the absence of opportunities to learn prosocial behavior, and/or the reliance on avoidance strategies as a means of coping with stress. For those at risk of neglectful parenting style in particular, we often see a family background of deficient maternal-child interaction, lack of maternal availability, and inconsistent parental affect and response to the child (Drotar, 1992).

Several factors may play a critical role in mediating the expression of aggressive and/or avoidant behavior once the individual becomes a parent. In particular, the degree of control, feedback, and predictability that parents perceive in relation to stressful life events can
influence their behavior. For example, if they are able to achieve some success in controlling stressful aspects of their life, they are more likely to adopt a purposeful, planned approach to childrearing. In addition, compensatory factors such as a supportive spouse, socioeconomic stability, success experiences at work or school, and positive social supports that the individual can draw on for information or assistance (Belsky, 1984; Cicchetti & Rizley, 1981) may serve to buffer some parents from the effects of major stressors during this stage.

The second stage in this model, titled "poor management of acute crises and provocation," represents the hypothetical point in the development of poor parenting style in which the adult's current attempts or methods of handling life stress or child behavior begin to fail significantly. The parent often experiences feelings of losing control, and at this juncture the risk of child maltreatment (and other forms of poor coping reactions) begins to increase. A parent may step up the intensity of power-assertive methods that he or she believes are necessary to reestablish a semblance of control, or if predisposed to neglect/avoidance, he or she may develop a diminished pattern of social exchange with the child. Conditioned emotional responding (i.e., prior reactions of anger and irritation related to the child) may overtake, or impair, the parent’s rational behavior at this point. Feelings of extreme agitation and irritation, which may have originated from other sources of anger besides the child (e.g., an employer, a neighbor, or a spouse) are (mis)attributed to the child, because the parent has learned (through months or years of interaction with the child) to associate feelings of discomfort or irritation with child provocation (also, the child is often the easiest party to blame for such unpleasant feelings of arousal). Consequently, when the child cries or fusses to seek attention (for example), the parent may distort the seriousness or potential harm posed by the situation. This appraisal, in turn, may lead him or her to conclude that excessive countermeasures are justified to gain control of the child’s aversive behavior.

Once again, the degree of stress experienced by the parent may be offset by compensatory factors. In particular, improvement in the child’s behavior or the involvement of community programs to assist parents in coping with difficult family-related issues, hold promise for reducing the acute crisis situation.

The third and most unyielding stage in the transitional model of maltreatment, titled “habitual patterns of arousal and aggression with family members,” represents a chronic pattern of irritability, arousal, and/or avoidance of responsibility on the part of the parent. By this time, the parent may maintain that the use of excessive punishment and force is absolutely necessary to control the child’s behavior, or (in the case of neglect), he or she may have established a pattern of inappropriate avoidance of responsibility. Provocative stimuli, such as child behavior problems, frustration, and emotional arousal are commonplace by this point, and the parent’s response to such events (such as abusive interchanges or neglectful avoidance) continues to escalate in intensity, duration, and frequency.

By this third stage, parents often perceive that they are trapped into continuing to use harsh or extreme methods to control their children or to avoid the stress associated with child care. Although this perception is somewhat accurate (due to the fact that children can habituate to the higher level of punishment and thus may not respond as well to it), this belief justifies their use of further force/avoidance. A parent is now caught in the vicious cycle of using coercive methods to diminish tension and irritation, and he or she may receive some short-term gain through such methods by the reduction of the child’s aversive behavior.

Unfortunately, reversal of this process is very difficult by this stage, and is aided by very few compensatory factors. Although treatment efforts may be directed toward families at this point in time, the method of interacting with one’s children has become so ingrained that it becomes very difficult to rely on anything but coercive and avoidant methods. Thus treatment providers are faced with the dilemma of introducing ways to change well-established patterns of family interaction in such a manner that the parent will recognize that the benefits (e.g., a well-behaved child, or more pleasant family interaction) outweigh the costs (e.g., efforts needed to learn different disciplinary methods, pronounced increases in child problem behavior in the short term).

The challenging task for professionals becomes one of interrupting this deterioration and intervening in such a way as to restore the family’s ability to cope with external demands and provide for the
developmental and socialization needs of their children. According to this view, the parent-child relationship was either never well-established from the beginning, or it began to disintegrate during periods of developmental change or family stress. Therefore an overriding goal of preventing child maltreatment from the perspective of healthy child development is the establishment of positive socialization practices that are responsive to situational and developmental changes. Such healthy practices serve to buffer the child against other socialization pressures that can be stressful or negative, and reduce the need for the parent to rely on power-assertive or neglectful methods to control or avoid their childcare responsibilities.

DEVELOPING CHILD-FOCUSED PREVENTION PRIORITIES

From a developmental perspective, maltreated children’s experiences with their caregivers may have their greatest significance in terms of the formation of positive relationships with others and contentment in their social environment. For example, the formation of attachment is one of the most critical early developmental tasks, which is believed to set the stage for subsequent relationship formation (Sroufe & Fleeson, 1986). In the field of child maltreatment, the attachment concept has been theoretically linked to the perpetuation of maltreatment across generations (Kaufman & Zigler, 1989), the failure of these children to form subsequent relationships with others (Erickson, Sroufe, & Egeland, 1985), and their vulnerability to additional developmental failures that rely to some extent on early attachment success (Aber & Allen, 1987). Not surprisingly, Cicchetti, Toth, and Bush (1988) report that the vast majority of maltreated infants form insecure attachments with their caregivers (70% to 100% across studies). This poor resolution of attachment may be most significant in terms of influencing a child’s relationship formation with peers, future partners, and future offspring.

Such findings regarding the broad and diverse developmental disabilities of maltreated children point to the importance of studying abuse and neglect in terms of socialization practices, rather than in terms of individual acts of commission or omission. Accordingly, the impact of maltreatment on a child’s development must be considered in relation to the overall quality of care that the child is exposed to over time.

An important challenge to our understanding of the effects of maltreatment and our concomitant response to this problem lies in our recognition that the effects are dependent on different stages of the child’s development and the presence or absence of health-promoting factors (e.g., family stability, alternatives to physical punishment). Such a view provides special attention to developmental limitations and abilities of children who have experienced various forms of maltreatment, and is an optimistic framework for establishing early prevention and intervention goals.

If we accept the theoretical and philosophical argument that maltreatment is indirectly responsible for a myriad of developmental problems, then our understanding of the behavioral and emotional adjustment problems shown by maltreated children rests on an awareness of their developmental deficits (in addition to some direct effects of maltreatment or insensitive parenting). Such a position carries with it important implications for establishing intervention and prevention goals. First of all, it is important to recognize the developmental differences that may emerge as a function of maltreatment. An individual child’s symptoms may be an understandable result of his or her efforts to learn social behaviors without the benefit of sensitive parenting or careful guidance. Accordingly, the identified “referral concern” may shift from one that assesses current problematic behavior alone toward one that identifies the developmental concerns that underlie such expressions. This premise directs intervention to the strengthening of developmentally relevant tasks or skills, in addition to specific presenting complaints.

A developmentally guided intervention and prevention strategy works on the principle of providing the least intrusive, earliest assistance possible, instead of relying on aversive contingencies. The focus of intervention can be shifted away from identifying misdeeds of the parent, and more toward promoting an optimal balance between the needs of the child and the abilities of the parent.

The developmental course of children from such family environments typically proceeds unabated. Maltreated children are more likely to associate with delinquent peers and engage in antisocial
behaviors (Malamuth, Sockloskie, Koss, & Tanaka, 1991; Patterson, DeBaryshe, & Ramsey, 1989), which further serves to impair their ability to master important developmental tasks. Moreover, such associations perpetuate attitudes, motivations, emotions, and beliefs that encourage the likelihood of coercive behavior. This course, combined with added cultural stereotypes for men and women, may lead to both sexual and nonsexual forms of acting out during adolescence and young adulthood in attempts to control and coerce others (Dutton, 1988).

STRENGTHENING PARENTAL COMPETENCY

Most families require some degree of assistance in child rearing today, especially during the child’s early years. This view derives from the simple principle that a parent who is well-prepared for the life changes associated with child rearing is less likely to succumb to the increasing stress factors that prevail. This viewpoint supports the principles of preventive mental health—skills, knowledge, and experiences that boost the individual’s coping abilities (e.g., their sense of mastery and control over stressful aspects of their role) will increase their resistance to the forces that oppose their healthy adjustment (Dohrenwend, 1978). Such parents are said to be socially competent, in that they are able to apply interpersonal skills to meet the demands of the situation and provide positive outcomes for all persons involved. Socially competent parents display interpersonal strengths (e.g., praising, complimenting, or showing affection), and they are able to observe the demands of a situation in order to choose the appropriate response (Burgess, 1985). The parent who is socially incompetent, on the other hand, fosters incompetence in the child who, in turn, reacts averisively to the parent. A vicious cycle of rejection, depression, or low self-esteem may result, leading to child maladjustment and parent-child conflict.

Developmental research informs us that a style of cooperation tends to develop reciprocally among parents and children from a very early point in time. Parents who are themselves cooperative and attentive to their child’s needs and capabilities tend to have children who are similarly cooperative and easier to manage. In sharp contrast, parents who rely on intrusive and power assertive methods of control are more likely to have offspring who reciprocate in kind with annoying and disruptive behavior, and who will fail to acquire prosocial behaviors. Thus it is important to consider the major factors associated with the development of healthy versus high-risk parent-child relationships, and to investigate intervention methods that promote such relationships from the earliest point in time.

Prenatal Factors

The importance of proper prenatal care in establishing the early beginnings of the parent-child relationship is supported by both medical and psychological research. In terms of intrauterine care, serious disturbances in fetal growth and development, as well as later disturbances of the newborn, can be affected prenatally by maternal nutrition, age, substance abuse, and viral and bacterial infections. Mother’s (and perhaps father’s) use of drugs, alcohol, and cigarettes have been linked to infant prematurity, low birth weight, slowed development, and the “difficult child syndrome.” These health factors, in addition to genetic endowment, can lead to physical and mental handicaps that impair the mother’s and child’s later abilities to establish strong ties. Fortunately, there is emerging evidence that many of these problems can be prevented by proper education, medical care, and assistance provided during the prenatal period.

Maternal adjustment and preparation for parenthood are also believed to affect complications during pregnancy, labor, and delivery. This is a grave concern among mothers who experience extreme stress or depression during pregnancy, due either to exogenous conditions (such as relationship conflict or violence, financial instability) or endogenous factors (such as hormonal changes or personality functioning). In addition, how well both parents prepare for their role certainly affects their degree of success with the newborn. Prospective studies (e.g., Brunnquell, Crichton, & Egeland, 1981; Egeland, Breitenbucher, & Rosenberg, 1980) have shown that high life stress and change during pregnancy are linked to abuse and related problems, especially among mothers who were anxious, unknowable about children, and ill-prepared. Once again, such negative outcomes can be prevented during this period of development. The provision of an adequate support system (e.g., family members, nurse visitors, etc.) seems to
mitigate the effects of life stress and personal adaptation to a significant degree.

Postnatal/Infancy Factors

The formation of healthy infant-caregiver attachment represents a major task during this developmental period, which may have a significant effect on the quality of subsequent patterns of care. Parents who were poorly adjusted or prepared before the child’s birth are more likely to have negative outcomes with their child, regardless of the child’s birth status (e.g., prematurity, illness, etc.). Furthermore, children who receive poor quality of care during early infancy have been found to show interactional patterns of avoidance or anxious attachment to their caregivers, which leads to further developmental decline (Egeland & Sroufe, 1981). In contrast, the parent who is well-prepared for life changes associated with child rearing is less likely to succumb to the increasing stress factors that prevail. Skills, knowledge, experiences, and support that boost the individual’s coping abilities will increase their resistance to forces that oppose their healthy adjustment. The same holds true for the infant, whose temperament and responsiveness contribute in important ways to his or her own treatment.

Infancy and Early Childhood

During this stage of development, parental resources and responses to the child, as well as the child’s opportunity and ability to develop adaptive behavior, appear to be critical determinants of the parent-child relationship. Specific qualities that reflect competence in the parenting role, and thereby enhance the parent-child relationship, include such actions as verbal communication that provides information and stimulation to the infant, physical freedom for the infant to explore his or her environment, responsiveness to the infant’s needs in a manner that is consistent with his or her developmental level, and positive affect that accompanies all supportive verbal and physical interactions (Cicchetti et al., 1988).

In brief, if the parent’s responses to the young child are age appropriate, peer supported, and otherwise successful from the perspective of the parent’s wishes and the child’s needs, the risk of relying on power assertive control tactics or avoidance may be reduced, and the child’s development of adaptive abilities will be enhanced. The value of early assistance and support programs for new families and disadvantaged families is apparent from these findings.

ILLUSTRATIVE PREVENTION PROGRAMS

Prevention and early intervention programs for adults and teens who have not been specifically identified as abusive or neglectful are founded primarily on the premise that promoting a positive and responsive parent-child relationship is both a desirable intervention target as well as a viable child maltreatment-prevention strategy. The rationale for such programs is straightforward: Many families with very young children (under 24 months of age) are not yet experiencing the serious child behavior management problems that bring their counterparts with preschool and school-age children to the attention of child protection agencies. Parent-child interactions are still relatively benign although subtle indications of future problems may be present. If parents can be assisted in their role at this early stage, the chances of influencing patterns of parenting and promoting healthier parent-infant relationships are improved. Ipso facto, the likelihood of relational failure and signs of child abuse and neglect are diminished (Wekerle & Wolfe, 1992).

A common feature in many programs aimed at early intervention of child maltreatment and/or developmental delay is the home-visitor component, in which a professional or trained lay person visits the family home to provide parenting-related instruction and to act as a liaison with other community and health care systems. Thus, chiefly through education and support, these programs strive to enhance adult competency to help parents gain control over their lives (Pransky, 1991). Family support programs may be directed at various types of parents who are at risk of maltreatment, such as parents who have been identified and referred for assistance, new parents who require or request support in their role, and teen parents who lack the maturity and resources necessary for adequate childcare.

Wekerle and Wolfe (1992) recently reviewed 24 studies that involved parents and young adults who represented various degrees of
risk status regarding maltreatment and child development, and which used adequate evaluation procedures. Most of these studies fall under the heading of “family support programs,” which are philosophically committed to enhancing parental competence and reducing stress factors that impair the formation of a positive and healthy parent-child relationship. In the main, family support studies of at-risk parents have found short-term positive outcomes, particularly for parental outcome measures and for those mothers deemed at greatest risk (e.g., poor, single, young; Booth, Mitchell, Barnard, & Speiker, 1989; Frankel, 1988; Seitz, Rosenbaum, & Apfel, 1985). Although positive gains have been found in terms of indirect measures of parental behavior (knowledge and attitudes), several studies have also found improvements in observed parental behavior and, to a lesser extent, indicators of maltreatment (e.g., child abuse reports). Also, these studies show that family support programs improve general maternal functioning rather than specific dimensions of personal adjustment (e.g., Gaudin, Wodarski, Arkinson, & Avery, 1991; Teleen, Herzog, & Kilbane, 1989).

There is initial, but persuasive, evidence to suggest that multilevel programs (i.e., offering additional services as parents require them over a longer period of time) are worth the additional effort and expense, compared to less intensive services for higher risk families (Olds & Kitzman, 1990). For example, the Resource Mother program, which provided pre- and postnatal care to disadvantaged teens (Unger & Wandersman, 1988), found that the earlier in pregnancy the teens were recruited, the more likely it was that they would continue participation once their child was born. Consistent with the principles of community mental health noted above, it is reasonable to assume that greater involvement in intervention may lead to greater identification with and ownership of the growth process set in motion by preventive efforts.

Overall, Wekerle and Wolfe (1992) conclude that those programs that span from 1 to 3 years and provide a personalized approach (e.g., home visits) stand out as most successful in achieving the desired outcomes and most successful with higher risk individuals, a conclusion shared by Roberts, Wasik, Casto, and Ramey (1991) in their review of informal and formal home visiting programs. This apparent intervention-population matching may be best understood by consid-

ering the often isolated, unskilled, and impoverished characteristics of these mothers. That is, their need for support, parenting instruction, and resource linkage seems to be fulfilled by the more personalized, outreach nature of the home visitor approach.

Findings reported in their review also generally support the utility and cost-benefit of (a) home visits, especially those begun prior to the onset of maltreatment, (b) specific skills training that addresses parental misperceptions and false expectations of young children, (c) specific skills training that promotes alternatives to physical punishment and the use of more prosocial, developmentally relevant activities for the parent to engage in with his or her child, (d) parental competency programs broadly aimed at nonidentified individuals, a strategy that reduces concerns due to labeling and detection, and (e) preschool-based programs for child victims, which emphasize developmental gains and prosocial peer interactions.

RESEARCH NEEDS AND FUTURE DIRECTIONS

SELECTION OF PARTICIPANTS

A current roadblock to the implementation of effective early intervention and prevention programming is the lack of information pertaining specifically to the nature of the population. Unfortunately, little specificity is provided by researchers that allows one to match intervention type to individual needs of persons or families.

The decision as to who should receive preventive services is often a difficult and ambiguous one. Concerns for the efficient use of funds have often popularized a narrow definition of the target population to include only those individuals having specific “risk indicators.” Although understandable, this practice raises some precautions regarding the identification and participation of individuals determined to be at risk. The problem of determining risk status is complicated by the absence of clearcut guidelines for identification procedures, the lack of complete knowledge concerning risk factors, and the relatively low incidence of child maltreatment in the general population (Caldwell, Bogat, & Davidson, 1988). Thus, if identification procedures are faulty, those identified as at risk may be subjected to a variety of
SPECIAL ARTICLES


Howard Dubowitz, MD

From the Department of Pediatrics, University of Maryland Medical School, Baltimore

ABSTRACT. There has been increasing awareness of the need to prevent child maltreatment. In this review, prevention programs that have been evaluated are critically assessed. This is based on computer searches of the relevant literature spanning the last decade and final reports regarding prevention programs to state and federal agencies. Although many programs have been implemented, relatively few have been evaluated, and of those that have been, many have serious methodologic flaws. Interventions that do appear promising include home visiting, lay counseling, group and family therapy, and education about sexual abuse. In addition, comprehensive programs that address the multiple contributory factors of child maltreatment appear to be a valuable approach. Suggestions are made as to how the practicing pediatrician might play a preventive role. Finally, there is a need for good evaluation research of prevention programs. Pediatrics 1989;33:570-577; abuse, maltreatment prevention.

There has been an increasing awareness of the need to prevent child maltreatment. A panel reiterating the 1979 US Surgeon General's report concerning health promotion and disease prevention wrote: "By 1990, injuries and deaths to children inflicted by abusing parents should be reduced by at least 25%."1 In 1985, the National Committee for the Prevention of Child Abuse enunciated a similar goal: "We can prevent child abuse and we will prove it. Our goal is to reduce child abuse by at least 20% by 1990."2 Both the financial and human costs associated with child maltreatment, although crudely estimated, are staggering.3 Prevention is, therefore, attractive as a way of reducing these costs of child maltreatment. In addition, there is the possibility that early efforts to enhance family functioning could be more effective than interventions after maltreatment has already occurred. Accordingly, a wide array of prevention programs have been developed in the United States.

Prevention is a central focus in pediatric practice, and pediatricians are well placed to intervene early in high-risk situations to prevent possible maltreatment. For this review, what is known about interventions aimed at preventing child maltreatment is examined.

Prevention is commonly categorized as primary, secondary, or tertiary. Primary prevention addresses a sample of the general population, e.g., a program administered to all students in a school district regarding how to prevent sexual abuse. Secondary prevention focuses on specific subsets of the population, who are thought to be at high risk for child maltreatment. Typically, these efforts are directed at poor, single mothers or families with a new infant. Tertiary prevention, or treatment, involves situations in which child maltreatment has already occurred, and the goal is to decrease recidivism and avoid the harmful effects of child maltreatment. Five years ago, Helfer4 evaluated what was known about the prevention of child maltreatment. He found that little scientific evaluation of interventions had been conducted and recommended that good evaluation research of prevention efforts should be conducted. The review reported here is based on a background paper prepared for the Office of Technology Assessment of the US Congress, and current knowledge of the effectiveness of programs to prevent child maltreatment is examined.

METHOD

Computer searches were conducted using the Child Abuse and Neglect computerized data base,
PsychInfo, and Medline for the last decade. Several final reports concerning major studies funded by the National Center on Child Abuse and Neglect were reviewed. The different kinds of preventive interventions and program evaluations are presented in this review. Although this is representative of current knowledge, it was not possible to describe all programs.

FINDINGS

Primary Prevention

In the United States, most social services only become available after child maltreatment has already occurred, and little primary prevention exists. In addition to the specific programs that will be discussed, there are a number of activities at the state and federal levels that probably do have a primary preventive role. Examples include legislation banning the use of corporal punishment in schools, the federal Aid to Families With Dependent Children program, and the Women, Infants, and Children nutrition program. These serve to enhance family functioning and indirectly help protect children, but their effectiveness in reducing child maltreatment has not been assessed.

Prevention of Sexual Abuse. Conte et al. and Finkelhor et al. summarized the key components of efforts to prevent child sexual abuse. Programs, mostly implemented in the school systems, have focused on teaching children about sexual abuse, how to recognize abusive situations, and how to respond assertively. Programs range in length from a single half hour to a curriculum of 38 sessions, and trainers include teachers, police officers, rape crisis counselors, mental health professionals, and community volunteers. A variety of materials have been used, including videotapes, audio tapes, printed matter, coloring books, and anatomically correct dolls. Whereas some programs focus specifically on preventing abuse, others address related areas such as child development, family and life management, parenting, and methods of seeking help.

An experimental or quasiexperimental design to evaluate their interventions was used in relatively few programs. Those that did usually used pre- and posttests to assess the effectiveness of a single prevention strategy. Different outcome measures were developed for different projects, making comparisons difficult. Typically, the child's knowledge and feelings about sexual abuse and the children's prediction of his or her response to a hypothetical abusive situation were assessed with these measures. Actual behavior was assessed in only one study, in which one of the researchers simulated a potentially abusive situation, and the child's response was videotaped and rated. The occurrence of subsequent sexual abuse was not assessed, and outcomes were usually determined immediately or soon after the intervention.

The evaluation of child sexual abuse prevention classes revealed mixed results. Some studies have demonstrated an increase in knowledge of safety rules and awareness of local resources in the event of abuse. Studies of preschool children have noted the limited retention of information after only 1 week. A concern is the distinction between knowledge and actual behavior. This was illustrated in one study in which children learned the textbook definition of assertiveness but were unable to give an example of how they could act assertively (A. Downer, unpublished data). Another study demonstrated that greater self-esteem and knowledge predicted a decreased vulnerability in simulated abuse situations.

There are possible untoward consequences of these programs. One study found that 93% of children recognized the potential for coercive sexual assault, and 88% for violent sexual assault, within their own families. The effects on children's fearfulness, understanding of their bodies, sense of security, and family relationships have not been assessed. Anecdotal evidence suggests that research is needed to evaluate these areas.

Sexual abuse prevention programs and the evaluation of effectiveness are recent developments. Because measurement of the occurrence of subsequent sexual abuse is problematic, proximate and proxy outcomes such as knowledge and attitudinal change have been assessed in most studies. This represents a reasonable first step but does not address the critical question of whether abuse is prevented.

Community Services. Communities provide a variety of services that have a primary preventive role. One format is public education concerning child maltreatment prevention, using media announcements. Public awareness campaigns convey to parents that "parenting can be rough" and that "its OK to get help." Typically, information regarding local resources is then given. Although these services have not been evaluated, it is reasonable to expect that some benefit is accrued to those who use them.

Inter-Act: Street Theater for Parents. In this program, live theater or videotapes are used to communicate parenting information to audiences that would be difficult to reach through more traditional channels. The skits portray realistic situations that demonstrate problem-solving skills, using support systems, and alternatives to physical punish-
ment. Presentations are made in settings such as well-child clinics, shopping centers, and state fairs. This program has been evaluated by randomly pre- or posttesting different audiences. Audiences were classified into three groups: high risk, general public, and professional, and each experimental group was compared with a control group. High-risk groups consisted of single parents waiting at an unemployment office, and the general public was targeted in shopping centers and fairs. The general audiences were found to alter their attitudes most significantly, whereas skits concerning child behavior management had most impact on the high-risk group. Longer term attitudinal and behavioral changes need to be evaluated.

Secondary Prevention

Most interventions aimed at preventing child maltreatment occur in the category of secondary prevention. These interventions are based on knowledge and assumptions concerning risk factors for child maltreatment and target groups considered to be high risk, such as teenage mothers or poor and single-parent families. The goals are to enhance parenting capabilities and family functioning, thereby enabling families to more adequately care for their children and avoid possible maltreatment.

Programs for Families With New Infants. These programs aim to improve child care practices, to protect the infants’ health and safety, to improve the parents’ mental health, and to enhance parent-infant interaction and healthy family functioning. Many programs begin during the prenatal period; others begin after the birth of the baby. Possible services include pre- and postnatal medical care, psychotherapy, parenting education, and perinatal support programs to enhance parent-infant bonding. These include childbirth procedures that involve both parents, rooming-in, and unlimited visiting privileges for parents with their infants, a home health visitor, and free transportation to pediatric clinics. The duration of programs varies from a targeted intervention regarding birthing, rooming-in, and visitation procedures in the hospital to a project that offers a home health visitor for the first 2 years of the baby’s life.

The best evaluation of such programs has been the work of Olds and colleagues in their assessment of a family support program during pregnancy and the first 2 years after birth. In a randomized clinical trial, four treatment groups were provided with different combinations of the following services: developmental screening of the children, free transportation to prenatal and well-child clinics, home visits by a nurse during pregnancy, and home visits by a nurse during the child’s first 2 years of life. The sample consisted of 400 women having their first baby and who were younger than 19 years of age or single or of low socioeconomic status. The nurse-visited and comparison group of women were equivalent in all standard sociodemographic characteristics, and the few differences in psychologic and social support variables were controlled for in the analyses.

Olds et al. found that 19% of the comparison group at highest risk (poor, unmarried teenage mothers) maltreated their children, compared with 4% of the mothers who were visited by a nurse for the extended period (P = .07). The same high-risk group members who were visited by a nurse punished their infants less when assessed at 10 and 22 months of age (P = .007, and P = .04, respectively), and they had fewer emergency room visits (P = .04). These and other marginally significant differences constitute a clear pattern of improvements made by the highest risk group of poor, unmarried, teenage mothers. Perhaps most important was the finding of diminished maltreatment in the intervention group, supported by social service records, maternal reports, observations of maternal caregiving, the children’s developmental tests, and emergency room records. Moreover, during the pregnancy phase of the study, nurse home visitation led to significant (P ≤ .05) improvements in the women’s use of community services, their levels of informal social support, their dietary and smoking habits, and the birth weight and duration of gestation of babies born to young adolescents and smokers.

A similar project involved intensive pediatric primary care and weekly home visits by public health nurses. High-risk families were randomly selected to receive the intervention or to serve as controls. The intervention group had significantly fewer hospitalizations for injuries thought to be inflicted, but there were no differences in the other outcome measures. The sample size was small and outcomes were assessed in only half the subjects, perhaps contributing to the paucity of significant findings.

Programs for Teenage Mothers. These programs aim to address the multiple problems of many teenage parents: poverty, inadequate nutrition and health care, halted education, developmental delays, and inadequate parenting skills. Programs also attempt to strengthen the parent-infant relationship and foster the infant’s development. Most programs enroll teenage mothers at approximately the time of delivery, although some programs begin during the prenatal period, and a few have succeeded in including fathers. Services are offered at home and in program centers, and they include
parenting education, emotional support and counseling, job training and employment services, and drop-in centers. In addition, there are special workshops and interest groups, recreational activities, group meetings, meals, leaflets, day-care and field trips. The duration of programs varies between 20 weeks and until the parent no longer has a child between 0 and 3 years of age. The intensity of programs also varies from a single weekly session to approximately ten hours per week. Generally, staff are a mix of full- and part-time lay volunteers and professionals with widely varying backgrounds. The study by Olds et al.\textsuperscript{12,13} is the best illustration of the benefits accrued by teenage mothers.

Child Care. Attempting to balance work demands, career goals, and child care responsibilities can cause anxiety and stress.\textsuperscript{15} Day care is valuable to the stressed parent whose patience is taxed by the demands of continuous child care. In addition to offering the parents some respite, child care programs can provide the child with a rich and stimulating environment, either in day-care centers, familial day-care homes, or the child's own home.

Unfortunately, the quality of child care varies enormously. Although it is evident that day care is a valuable and necessary support for many families, its effectiveness in preventing child maltreatment has not been evaluated.

Interventions for "Latch Key" Children. These are programs for school-aged children of working parents, who return home from school and no adults are present. Without supervision, these children are at increased risk of being abused and, in addition, may have important needs neglected. In a typical program, usually conducted in a school, children discuss their feelings about being left alone and they receive instruction in personal safety skills, family rules, discriminating between emergencies and nonemergencies, emergency procedures, and responsibilities for siblings. Sessions with the parents address parental concerns and potential problem situations. Participants in these programs acquire knowledge and skills,\textsuperscript{16} but the effectiveness in reducing child maltreatment remains uncertain.

Support Groups. Support groups are a key ingredient in many programs. Such groups offer an opportunity for people in similar situations to share experiences and information, thereby facilitating friendships and social networks. Given the multiple problems many maltreating families have, a supportive group can provide a buffer and help develop coping skills.

In addition to groups led by professionals, there are self-help groups such as Parents Anonymous and similar groups for the children. Whereas many of the participants join after having maltreated their children, some who recognize their propensity for abuse use the group as a preventive intervention. It appears that substantial benefit is accrued to the high-risk families who have both the insight and motivation to seek assistance through this approach.\textsuperscript{17}

Crisis Services. Many cities and towns have resources available on a 24-hour basis to handle crisis situations. Generally, this consists of a telephone hot (or warm) line offering comfort and guidance to a desperate parent. Additional resources that may be available are baby-sitters for use in a crisis, nurseries, and counseling. The crisis service is generally able to refer clients to longer term resources when necessary. This is another intervention that appears to be a valuable resource, but its effectiveness in preventing child maltreatment has not been evaluated.

Tertiary Prevention

Tertiary prevention refers to those interventions that aim to decrease the likelihood of further maltreatment after the problem has already been identified. This includes different strategies that are monitoring, supportive, therapeutic, restrictive, or punitive. Several of the interventions that were described for secondary prevention are also used in treatment and rehabilitative efforts. In adults, the goal is to enhance healthy functioning and thereby decrease their propensity for future maltreatment. In children, treatment aims to ameliorate the psychologic trauma associated with abuse, to foster their healthy growth and development, and to diminish the risk that they, in turn, will maltreat their own children. The effectiveness of tertiary interventions in meeting these goals has rarely been assessed.

Case Work. In all 50 states, child protection services within the states' departments of social services are designated by law to respond to reports of alleged child maltreatment, and their mandate is to ensure the protection and adequate care of children. Case work involves regular monitoring of the family and efforts to enhance family functioning, such as supportive counseling and referrals to local resources. In instances of serious injury or risk to the child, child protection services have the authority, after obtaining judicial consent, to remove children from their families and temporarily place them in substitute care.

A number of problems impede the work of child protection agencies. Given their reputation for working with maltreating families, a stigma is attached to these agencies, making client families
resistant to accept their services. As reporting criteria have been steadily broadened during the last two decades, the number of case reports has steadily increased, but legislators have not appropriated the funds for sufficient resources to address the identified problems. Consequently, these agencies are frequently underfunded and overwhelmed, with limited resources and demoralized staff, resulting in a poor quality of professional work.

A third issue concerns the fundamental nature of the social services system. Suida described the mismatch of what these agencies offer and what clients need. Decent housing, job training, employment, and money could make a substantial difference in the functioning of many high-risk families, but these are not usually included in the armamentarium of these agencies. In addition, even counseling and therapeutic skills are often lacking, and the major responsibility has become that of policing the family. In fact, extensive collaboration with law enforcement agencies is now commonplace.

Substitute Care. Substitute care refers to care not provided by the biologic family. The most common is foster care; in 1981, 269,191 children were in foster care in the United States. In 1983, More than 75% of children entering substitute care were placed because of “parent-related deficiencies” or some form of maltreatment.

There might be continued visitation with the biologic family depending on the circumstances, because a goal is to work toward the eventual reunification of the family. The foster care system is required by federal law to review cases on a regular basis, assess progress, and, within 1 year of the child’s placement, make a definitive “permanency” plan. The juvenile justice system is also responsible for monitoring the child’s placement. This legislation has led to some improvement in the system in which, all too often, children have been placed in inappropriate foster homes, where they have lingered for extended periods (mean duration 33 months), and limited services have been available to foster and biologic families. If after reasonable efforts have been made it becomes evident that reunification of the family is not feasible, the child might be placed for adoption.

Psychotherapy. Although psychopathologic problems have been found to contribute only modestly to child maltreatment, psychotherapy frequently is a major component of treatment programs. For adults and children, individual, couples, family, or group therapy might be offered. For preschool children, day care, particularly therapeutic day care, where staff are skilled in helping children with their developmental and emotional problems resulting from maltreatment, appears to be a helpful inter-

vention. In addition, counseling or psychotherapy may play a valuable preventive role for children with psychiatric disturbances who are not abused. Maltreatment might be prevented by providing their parents with an understanding of and an approach to their children’s behavior problems.

Family Support Services. Family advocates, parent aides, home health visitors, and support groups are interventions that are also used in treatment programs. The goal is to enhance family functioning and thereby reduce recidivism by addressing the contributory etiologic factors of maltreatment.

Legal Approaches. Although severe forms of child abuse have long been considered crimes, there has been a trend in recent years to further criminalize the problem of child maltreatment. Law enforcement personnel and district attorneys are increasingly willing to enforce the laws and more cases are being brought to court.

A major goal of these initiatives is to punish the perpetrator for the “crime” of child maltreatment and explicitly demonstrate that child maltreatment will not be tolerated in this society. This is intended to have a deterrent effect.

Legal approaches are also considered necessary at times to mandate that maltreating families participate in recommended interventions. Frequently, these families deny their problems and refuse to comply with social service agencies and other professional staff. Court authority and the threat of removing the child(ren) or prosecution are thought to be necessary to persuade resistant clients to accept help, and many professionals support this approach. Other professionals are less sanguine about the utility and ramifications of legal approaches that have not been evaluated.

It is evident that multiple factors contribute to child maltreatment, and consequently, most programs involve packages of different services. The following evaluations were done on such projects.

Lutzker’s Project-12 Ways. This program aims to reduce recidivism of child maltreatment by providing a variety of services to families referred to the program by the Illinois Child Protective Agency. The program’s “ecobehavioral” approach includes parent-child training, stress reduction, self-control, social support, assertiveness training, basic skills, leisure time, health maintenance and nutrition, home safety, job placement, couples’ counseling, alcoholism referral, money management, and a variety of pre- and postnatal prevention services for young and unwed mothers. Several of these services are offered in the home, and treatment plans are tailored according to the needs of individual clients.

In an evaluation of this program, 50 maltreating families were randomly selected from the client
populations and compared to 47 families not involved in the program. All families were protective service clients who either had at least one maltreatment incident or were considered to be high risk. The researchers were able to assess the number of substantiated incidents of maltreatment. The results indicated that the project led to fewer cases of maltreatment during treatment compared to the comparison group (2% vs 11%, P < .05), but there were similar rates following treatment (8% vs 11%). Thus, it is apparent that the program's major impact occurred during treatment, when families were under surveillance, and there was little evidence of enduring program effects.

Evaluation of the Nationwide Demonstration Program in Child Abuse and Neglect, 1974 to 1977. In one of the few federally funded evaluations of child abuse programs, Berkeley Planning Associates assessed 11 treatment programs between 1974 and 1977. Although called treatment programs, subjects included high-risk families who had not been identified for maltreatment. There was no random assignment to programs and typically subjects were referred to the program that was available locally.

Programs were classified into five different service models: individual counseling/social work, lay therapy, group treatment, children's program, and family treatment. Each model consisted of "basic services," such as intake and diagnosis, case management, and review, and also differing interventions making each program model unique. For example, interventions in the lay therapy programs included basic services, lay counseling, and a self-help group, Parents Anonymous; the family treatment programs had basic services, a "children's program," and individual, family, and group therapy.

The key outcome measure was the clinician's judgment of the client's propensity for future maltreatment, assessed at the end of the intervention. The recurrence of maltreatment during treatment was also assessed by the primary clinician, and the child protection agencies informed program staff of clients who were reported to them.

The evaluators found that, of the 1,724 parents studied, 30% were reported to have "severely" abused or neglected their child during treatment. The severity of the case at the start of treatment was the strongest predictor of recurrence. Severity of the case was assessed by a previous history of maltreatment, recent severe maltreatment, and families rated as seriously stressed. Recurrence was lowest in projects in which highly trained workers were used to manage cases.

Of 1,190 parents assessed by clinicians at the end of treatment, 42% were judged to have a reduced potential for maltreatment. Whereas parental age, employment status, and race did not predict outcomes, improvement was more likely in clients who did not abuse alcohol or drugs. In addition, a reduced propensity for maltreatment occurred more often in cases of physical abuse than when neglect was involved.

Exploration of Client Characteristics, Services, and Outcome: Evaluation of the Clinical Demonstration of Child Abuse and Neglect. A second federally funded national evaluation of 19 clinical demonstration projects was conducted by Berkeley Planning Associates between 1979 and 1981. Standardized instruments were used to gather information concerning demographic characteristics of families and individual clients, clinical assessments of client functioning at the start and end of study, and the types and patterns of maltreatment involved, and a summary of services provided. The sample consisted of 986 families, comprising 1,250 adults, 710 adolescents, and 975 children. The programs offered a wide array of services including crisis intervention, remedial services for children, temporary shelter, infant stimulation, parent education, psychotherapy, and services such as assistance in finding housing or employment.

Clinical progress was assessed at termination of treatment by assessing the recurrence of maltreatment during treatment and the primary clinician's rating of the client's propensity for future maltreatment and of overall progress. Families and individuals with similar characteristics were compared to assess the effectiveness of different types of services.

Adult clients showed substantial improvement in various problem areas during treatment: 57% improved in their knowledge of child development, 55% in understanding their child's needs, 49% decreased their "excessive need" for their child to obey commands, and 47% had greater self-esteem. However, more than 50% of adult clients were judged, when leaving the program, as likely to maltreat their children in the future. Seventy percent of the adult clients in the sexual abuse treatment programs were judged by their clinicians to be "overall improved," compared with 40% in the neglect programs, with the other groups occupying intermediate positions.

Abused adolescents benefited most from skill development classes, temporary shelter, and group counseling. From start to end of treatment, adolescents improved in: sleeping problems (63%), eating problems (42%), feeling maltreatment deserved (72%), depression (70%), suicides gestures (68%), and violent behavior (58%). Children achieved maximum gains through individual or group coun-

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