Consortium for Longitudinal Studies of Child Abuse and Neglect
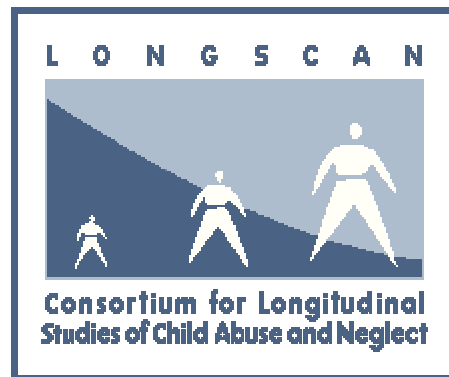

LONGSCAN Research Briefs

Volume 2
April 2006
LONGSCAN Investigators

Acknowledgments

Principal Investigators:

Howard Dubowitz, MD, MS
Diana English, PhD
Jonathan Kotch, MD, MPH
Alan Litrownik, PhD
Desmond Runyan, MD, DrPH
Richard Thompson, PhD

Co-Principal Investigators:

Maureen Black, PhD
Richard Calica, AM, LCSW
Jon M. Hussey, PhD, MPH
Rae Newton, PhD
R.H. Starr, Jr, PhD

Co-Investigators:

Shrikant Bangdiwala, PhD
Ernestine Briggs, PhD
Mark Everson, PhD
J. Christopher Graham, PhD
Elizabeth D. Knight, MSW
John Landsverk, PhD
Terri Lewis, PhD

Produced with the help of:

Contents

PROLOGUE

The Longitudinal Studies Consortium on Child Abuse and Neglect (LONGSCAN) is a 20-year longitudinal study examining the antecedents and consequences of child maltreatment utilizing an ecological-developmental model of factors believed to be associated with child maltreatment. In its 16th year, LONGSCAN has collected and analyzed data from its five local study sites across the country (see Runyan et al., 1998, for a complete description of the LONGSCAN study).

A primary commitment of LONGSCAN is to disseminate findings through journal publications, presentations at conferences and meetings, and a Research Brief series. In 1998, LONGSCAN Research Briefs, Volume 1 was published summarizing major research findings from the early years of LONGSCAN. The first volume of Research Briefs addresses a number of questions ranging from risk and protective factors for young at-risk children, to system response in identifying children most at risk, to the impact of early intervention. It includes three separate analyses, independently conducted at different LONGSCAN sites that document the risk to children in homes where there is domestic violence. In the earlier volume of briefs, the consortium also placed special emphasis on understanding the significance of fathers and father-surrogates in the lives of LONGSCAN children. LONGSCAN Research Briefs, Volume 1 (1998) is available on our study website (visit http://www.iprc.unc.edu/longscan/pages/researchbriefs). This volume of Research Briefs is the second in the series and summarizes findings from 45 studies published since the first Briefs, covering analyses of the LONGSCAN data through the Age 8 data collection cycle.

Background

In their review of child maltreatment research, the National Research Council (NRC) recommended a developmental, longitudinal approach to the examination of the effect of abuse and neglect on children's growth and development (NRC, 1993). According to ecological/developmental theory, a child develops within a series of multiple, nested social systems beginning with direct interaction with the family and extending through indirect influence from cultural traditions (Bronfenbrenner, 1979; 1993). Furthermore, from a developmental perspective, these nested social systems can have differential effects based on the developmental period within which the child experiences them.

LONGSCAN is a multi-disciplinary collaboration among leading investigators in the field of child maltreatment research from pediatric medicine, public health, sociology, psychology, social work, and biostatistics. In 1990, following a national competition, funding was awarded to the LONGSCAN Consortium consisting of a coordinating center and five independent but overlapping prospective, longitudinal studies of maltreatment. The study was designed utilizing an ecological/development paradigm (see Figure 1 on the next page).

LONGSCAN consists of three urban sites, one suburban site, and one statewide site that includes urban, suburban, and rural communities. The studies are linked through a coordinating center (University of North Carolina at Chapel Hill) and an agreement to share objectives, data collection strategies, and data management. LONGSCAN is a longitudinal follow-through

design which began with children at four years of age or younger and continues to follow them at regularly scheduled intervals (Ages 4, 6, 8, 12, 14, 16, and 18) using extensive face-to-face interviews with the primary caregiver(s) and the child. During each intervening year there are annual telephone interviews designed to enhance sample retention and to track antecedents, moderators, mediators and outcomes of maltreatment. Data collection is designed to measure the onset and progression of children's social, emotional and behavioral outcomes from preschool through young adulthood (for additional information about LONGSCAN measures, visit http://www.iprc.unc.edu/longscan/).

Figure 1. LONGSCAN Ecological Development Model
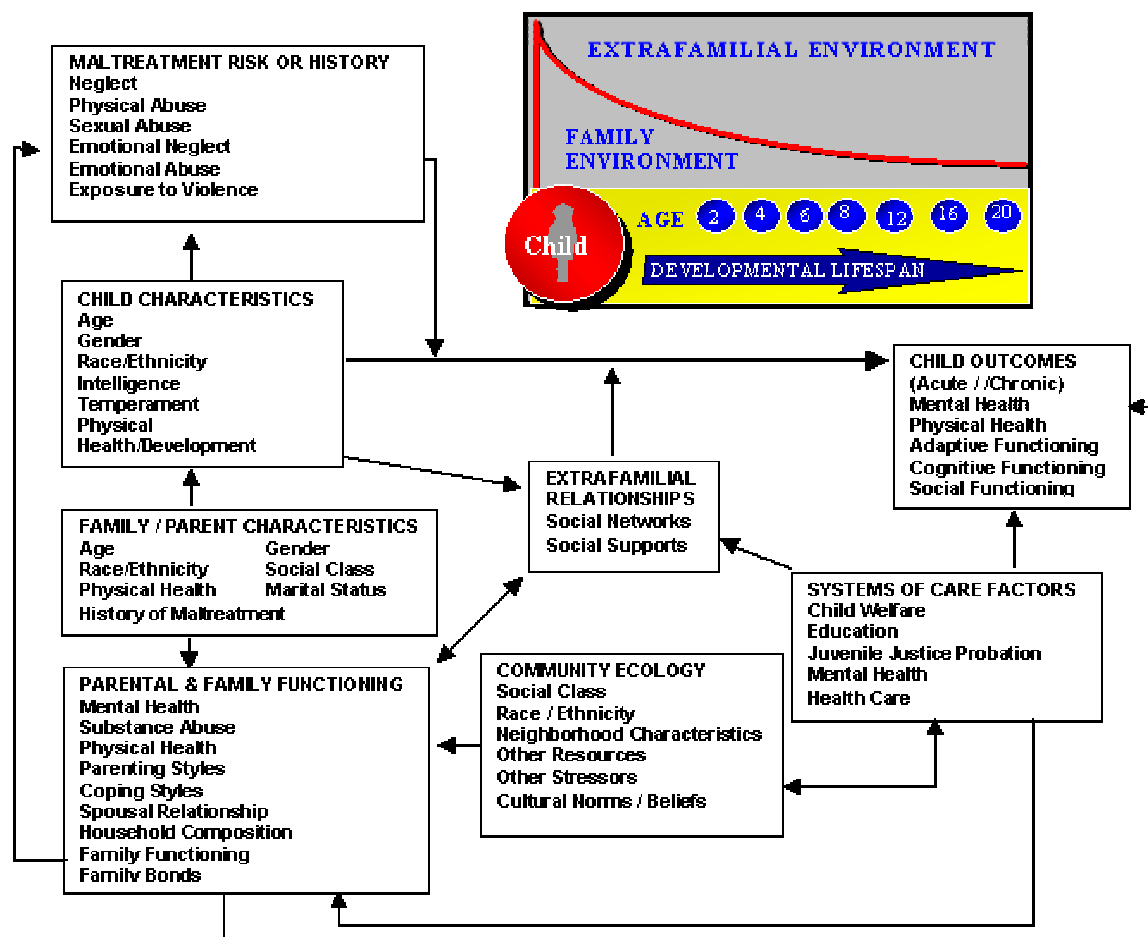
In the following sections, findings, and policy and practice implications for LONGSCAN studies published between 1999 and 2005 are presented. Topics or factors covered include:

➢ Risks, protective factors and consequences of maltreatment
➢ Fathers, child maltreatment and child development
➢ Intimate partner violence, child maltreatment and child outcomes
➢ Assessments and placement of children in out-of-home care
➢ Ethical issues
➢ Dimensions of maltreatment

RISKS, PROTECTIVE FACTORS,
AND CONSEQUENCES OF CHILD MALTREATMENT

Overview

In this chapter, we review research on the factors that increase or decrease the likelihood that a child will be maltreated or have mental health, behavioral, or cognitive problems as a consequence of maltreatment. We have combined these topics in the same chapter because many of the same factors that increase the risk of maltreatment are also risk for adverse child social, emotional or behavioral development as a consequence of maltreatment. Therefore, the findings from these studies tend to complement each other.

Risk and Protective Factors and Child Maltreatment.

Studies and Findings. Two studies from the Southern (SO) site examined factors that increase or decrease the risk that a child will be maltreated. The SO sample was recruited by hospital staff immediately following the delivery of an infant, targeting families with risk factors for medical or social problems. Of the original sample of 788 North Carolina mother-infant pairs, 243 were selected for LONGSCAN. One-third had been reported for maltreatment and two-thirds had not (matched for age, race, sex and SES). Two-thirds of the families reported incomes under $15,000, almost two-thirds (65 percent) were African American, and most (52 percent) were single mother-headed households.

Kotch, Browne, Dufort, Winsor and Catellier (1999) examined the significance of neonatal risk factors from individual, family, social, and parenting domains in predicting maltreatment reports in the first four years of life. They also looked at how stressful life events and social support modified the effects of those risk factors. The study was based on interviews with 708 of the 788 mothers soon after the birth of their 708 predominantly high-risk infants. Child abuse and neglect reports were obtained from state central registry data for the subjects up to their fourth birthdays. The study found that maltreatment reports were more likely in households where the mothers were depressed, complained of psychosomatic symptoms, consumed alcohol, participated in public income support programs, cared for more than one dependent child, had not graduated from high school, or were separated from their own mothers by the age of 14 years. Risk factors measured soon after birth continued to be associated with child maltreatment reports through the fourth year of life. In general, families with low levels of social support had a higher risk of a maltreatment report. When mothers were less depressed or had fewer stressful life events, low social support almost quadrupled the risk of a maltreatment report.

The second SO study looked at harsh physical punishment, a surrogate measure of abuse, to describe maternal discipline of children in at-risk families. The analysis (Socolar, Winsor, Hunter, Catellier & Kotch, 1999) was based on 186 maternal caregivers of 7 to 9 year-old children who had completed interviews at age 8. The study found that the most severe punishment, which included hitting or spanking with an object, slapping, grabbing, jerking, shaking, or throwing an object at the child, was used by 12% of the maternal caregivers as the primary response to a child's disrespectful behavior. That is about twice as likely as its use for lying, disobeying, or stealing, and three times as likely as its use for fighting with a younger

child. These types of harsher physical punishments were used somewhat more often as a secondary strategy if the parents' first efforts were unsuccessful. Although the findings suggest that in some at-risk families mothers justify the use of severe corporal punishment on the basis of their children's behavior, the authors did not attempt to associate the self-reported discipline strategies with official reports of maltreatment.

Risk and Protective Factors, Child Maltreatment, and Child Outcomes

Studies and Findings. Seven studies analyzed the consequences of child maltreatment, or compared the consequences of maltreatment among children with and without other risk factors and poverty, failure to thrive, or witnessing violence, which may also influence the mental health, behavior, and cognitive development of the child.

Two such studies were based on combining samples from the SO site with samples from the Northwest (NW), Midwest (MW), and Eastern (EA) LONGSCAN sites. The children from the NW site had been reported to Child Protective Services (CPS) and were judged to be at moderate or high risk of maltreatment, but maltreatment was not necessarily substantiated. There were three groups of MW children. Two groups had been reported to CPS. One of these was in a therapeutic intervention program, and the other was receiving standard care. The third group were from the same neighborhoods but not reported for maltreatment. They were matched to the maltreated children in terms of age, ethnicity, and socioeconomic status. EA study children were recruited from three pediatric primary care clinics serving inner-city families, and most were low-income and African American. One of the clinics served families with infants with failure to thrive (FTT), another clinic served children at risk for HIV infection, and the third served a general community population.

In one of these studies, Black and colleagues (Black, Papas, Hussey, Hunter, Dubowitz, Kotch, et al., 2002a) included all 194 children of teenage mothers from the four sites, comparing children who lived in 3-generation households (grandmother-mother-child) to children living in two-generation households (24% vs. 76 % respectively). The study was limited to families with mothers who were 19 years of age or younger when their children were born and whose children at age 4 or 5 years old were living with their biological mothers. More than one-third (39 percent) of the children had been reported to Child Protective Services (CPS) by four years of age. Most of the mothers were single, separated or divorced (82 percent), had not completed high school (57 percent), and were receiving public assistance through Food Stamps (76 percent), AFDC (72 percent), and/or Medicaid (76 percent). The authors failed to find a protective effect of living in a 3-generation household for children with the highest risk, those who had been maltreated and whose mothers were depressed. Given that this study is cross-sectional, it does not indicate whether children with risk factors living in 3-generation households are more vulnerable to behavior problems, or whether children with behavior problems are more likely to live with their grandmothers.

In the second study Black, Papas, Hussey, Dubowitz, Kotch, and Starr (2002b) assessed a sub-sample of 139 adolescent mothers who reported having a partner compared to 55 without a partner. Seventy six (76) % of the mothers were not married, 73% were receiving Food Stamps, 69% AFDC, 74% Medicaid. Maltreatment before the age of four involved 40% of the families,

and 33% of the teenage mothers were depressed. Teen mothers with more negative perceptions of their partner relationship were more likely to report their own depressive symptoms and more behavior problems among their children, regardless of the child's maltreatment status. However, the study also found that maternal perceptions of positive partner interactions were not associated with fewer behavior problems if there was a maltreatment report.

Three studies of the consequences of maltreatment were based on children from the SO site. Zolotor, Kotch, Dufort, Winsor, and Catellier (1999) examined the relationship between substantiated maltreatment reports and school performance among 223 of the SO sample's 243 child subjects. The study found that children with a substantiated report were more likely to have poor academic performance and classroom functioning (measured in terms of appropriate behavior, working hard, learning, and child's happiness) at ages 6 and 8 compared to children who were not reported for maltreatment. Maltreatment was not associated with the teachers' evaluation of how well liked the child was by other children. Independent of substantiated maltreatment, poor school performance was also more likely if the child was born at a young gestational age, if the mother was younger, if the mother was unemployed, if the biological father was absent, or if the child was more anxious or depressed. Also independent of substantiated maltreatment, teachers were more likely to report that a child was functioning less well if the caregiver reported that the child was aggressive, the biological father was not in the home, and the child was a boy. An unrelated father figure in the home did not protect against these adverse outcomes.

Using 167 children from the SO sample with complete interview data for both the age 6 and age 8 interview cycles, Johnson, Kotch, Catellier, Winsor, Dufort, Hunter, and Amaya-Jackson (2002) examined mental health outcomes of depression, anger and anxiety of children who had witnessed violence in their home or community or had a CPS report or caregiver self-report for physical abuse. A majority of the children were female (57 percent) and non-white (64 percent). Twenty-nine percent had been physically abused and 77 percent of the children reported that they had witnessed moderate to high levels of violence, such as seeing a person arrested or beaten up more than once, seeing adults in the home hit each other, ever seeing someone stabbed or shot or a dead body (not in the context of a funeral or wake). In contrast, less than half the mothers reported that the children had witnessed such violence. The discrepancy between the children's memory of witnessing violence and caregiver reports of their children's witnessing violence might reflect the mothers' not being aware or acknowledging their children's exposure to violence, or children's reporting violence in the media (which nevertheless may be associated with negative mental health and behavioral effects). Despite the discrepancy, Johnson et al.'s (2002) results confirmed that being a victim of maltreatment and witnessing violence are both associated with children's behavioral and emotional functioning. Children who experienced moderate or severe physical abuse tended to be more aggressive and depressed according to their caregivers. Children whose caregivers reported that their children had witnessed moderate or severe violence were more depressed and anxious. When the children self-reported witnessing more violence, they also reported increases in all four outcomes: depression, anger, anxiety and aggression.

Utilizing a sample of 215 mother-child pairs from the SO sample, Saluja , Kotch and Lee (2003) examined social capital (measured by concepts such neighborhood safety, perceived helpfulness

of neighbors and connectedness among neighbors) and emotional and instrumental social support offered by friends or family, such as people who help with the tasks of cooking or caring for a sick child. The study examined whether the social capital and social support variables mediated the relationship between child maltreatment and emotional and behavioral outcomes, such as depression, anxiety, and aggression, in 6 year-old children. More than 40% of the children in the study had had at least one maltreatment report before the age 6 interview. Caregivers in this sample were primarily African American (64.5%), 38% had not completed high school, and about 46% were receiving AFDC. The study found that social capital and emotional support did not affect the impact of maltreatment, but maltreated children were less aggressive if their families had more instrumental support.

Five other studies on this topic were based on the LONGSCAN sample from the EA site. Study children were recruited from three pediatric primary care clinics serving inner-city families, and most were low-income and African American. One of the clinics served families with infants with failure to thrive (FTT), another clinic served children at risk for HIV infection, and the third served a general community population. Most of the mothers were in their 20s and had limited education; 79 percent were not married. Data were collected through tests administered in the clinic setting, videotaped observation of parent-child interaction, parent interviews, and a home visit. School information was obtained from teachers identified by the mothers through a mailed questionnaire. Sample sizes varied from 136 to 226.

Kerr, Black, and Krishnakumar (2000) looked at the combined effects of failure to thrive (FTT) and maltreatment in a study of the 193 EA families when the children were 6 years old, comparing children with and without Failure to Thrive (FTT). They found that children with both FTT and a history of maltreatment had more behavior problems at home and school and worse cognitive performance on standardized tests than children with either FTT or a history of maltreatment alone. These findings support the proposition that, despite similarities in risk factors for maltreatment and other adverse childhood experiences such as FTT, maltreatment can compound the negative impacts on a child experiencing of other challenges such as poverty, illness or racism.

Krishnakumar and Black (2002) examined the relationship of several risk factors to child problem behaviors and cognitive performance at ages 5 and 6. Risk factors examined included: family economic hardship, perceived neighborhood threats, intensity of negative life events, maternal alcohol abuse, maternal depression, and poor quality of the home environment. The study included 217 low-income, inner-city, African American mothers and their children from the EA LONGSCAN site. The data were collected at ages 5 and 6 through caregiver interview, child evaluation and a home visit at age 5. Quality of the home environment (such as affection, language stimulation, and safety) and maternal depression predicted children's level of competence. The researchers concluded that if the home environment could be enriched and mother's depression treated during the pre-school years, the early behavior and development of children would improve. The research did not specifically examine the role of child maltreatment.

Dubowitz, Papas, Black, and Starr, (2002) examined the effect of child neglect on preschool children's behavior and cognitive development in a sample of 136. They found that 3 year-old

children who had been emotionally neglected tended to have more behavior problems. Children who experienced more than one type of neglect (emotional, physical, environmental) had more internalizing problems, such as depression and withdrawal. Neglect was not associated with changes in children's behavior or development between ages 3 and 5. However, cognitive development of the entire sample of children – both those with and without maltreatment reports – was below average at age 5. The authors link this finding to the high poverty rate of the sample and the resulting exposures (hunger, violence, poor health care) that are known to have a detrimental impact on child development. The study also found that depressed mothers were significantly more likely to have children with internalizing (such as depression) and externalizing (such as aggression) behavior problems at the age of three and the age of five, as well as lower cognitive performance at the age of five.

Mackner, Black and Starr (2003) compared the cognitive development of children living in poverty who had normal growth and those with a history of FTT, following the children from infancy though age 6. One hundred twenty eight children with FTT and 98 that were not FTT, matched for age, race and gender, were identified from the EA sample. The FTT group was more likely to have been involved with Child Protective Services, 37.5% vs. 10.7%, X2 = 24.8, p<.01. After initially lagging behind, the FTT group caught up to the non-FTT group, although both groups had cognitive scores that were substantially below average. Children in child-centered homes or with smaller families tended to have better cognitive performance. Although maternal IQ and education level did not have a direct impact on their child's cognitive performance, more educated and intelligent mothers tended to have fewer children and more child-centered homes.

Morrel, Dubowitz, Kerr, and Black (2003) examined the impact of maternal victimization on the behavioral, social, emotional and cognitive development of 206 four to six-year old children from the EA site. Mothers who had been victims of physical or sexual abuse reported more behavior problems in their children compared to mothers who had not been victimized. The mothers who had been abused were also more verbally aggressive to their children. However, mother's history of victimization was not related to teachers' reports of the children's behaviors, children's scores on standardized cognitive tests, or the children's own descriptions of their social competence or feelings about themselves. It is not clear if the children are behaving differently at home, if the mothers are harsher critics than the teachers, or if the teachers are less aware of problems than the mothers. The authors concluded that mothers who had been victimized were more likely to have depressive symptoms and engage in harsh parenting practices, contributing to behavior problems in their children. The study does not distinguish between childhood victimization and victimization experienced as an adult.

Given consistent findings from research that child maltreatment is associated with adverse social, emotional, and behavioral outcomes, and that risk or protective factors may moderate those outcomes, English and Graham (2000) used LONGSCAN and CPS data from the NW site to examine whether CPS workers' ratings of risk on nine risk factors correlated with independent measures of the same types of risks collected by research interviewers. This sample included 261 children ages 4 and younger who were referred to CPS from 1991 to 1994. Data included the baseline interview of the child, the baseline interview with the primary caregiver, and a summary of CPS case records. The CPS determinations of caregiver risk factors such as drug abuse or

other physical, mental, or emotional impairment were modestly but significantly correlated with similar determinations based on the research interviews. The researchers found risk factors that the CPS workers did not, or vice versa. There was little or no correlation between CPS worker and research measures of children's developmental or behavioral problems on tests like the Child Behavior Checklist, nor evaluations of parents' stress or social support. The researchers suggested that one possible explanation for the lack of correlation may be that CPS workers do not have the necessary training to assess early child development or behavior and parents' stress and social support.

Policy and Practice Implications and Recommendations

A general summary of the findings from these 11 LONGSCAN studies on risk and protective factors indicate several consistent themes:

- ➢ Children (whether in one or two parent families) living in adverse circumstances (poverty, poor health, poor living conditions) with known family/caregiver risk factors (caregiver young age at first birth, caregiver depression, substance use, negative partner relationships, low educational attainment, history of past or current victimization, low social supports and inappropriate disciplinary practices) are at higher risk for adverse outcomes (lower cognitive and academic functioning, more aggression, anxiety and depression) regardless of maltreatment status, although the data suggest that maltreatment adds to the disadvantage.
- ➢ The presence of other adults (three-generation households or partner relationships) did not necessarily serve as a protective factor for the child if other risk factors were present (maltreatment, domestic violence, history of victimization as a child, caregiver depression, substance abuse, caregiver young age at first birth).
- ➢ Social and emotional support of the child's caregiver did not mediate the effect of maltreatment on the child's emotional (depression, anxiety) or behavioral (aggression) functioning, but did impact the degree of the effect.

Partners and Social Supports. The benefits of a supportive mother-partner relationship suggest the need to develop programs that are effective at helping adolescent mothers develop or maintain positive relationships with an adult partner. Grandmothers are also important to children's mothers, but as the children approach school age the presence of a grandmother may no longer buffer the adverse effects of maltreatment and maternal depression. The findings regarding the protective impact of social support, especially people who will help in practical and not just emotional ways, indicate that mothers of children at risk for maltreatment need help in developing social supports through their partners, friends and relatives. In addition, programs that help young parents define caregiving roles for themselves may have positive effects on the behavior of their preschool children. Kotch et al. (1999) suggest that mothers' problems that predated or occurred around the time of the birth of their child, including poverty, not living with their own mothers at age 14, alcohol use, depression, and having another child to care for, increase the chances that their children will be maltreated in subsequent years. Mothers who complete high school and have social supports are less likely to have children who are reported for maltreatment. Saluja et al. (2003) found that, if reported for maltreatment, children were less aggressive if their caregivers had people in their lives who helped them with daily tasks,

reducing stress and enabling them to provide more support to their children. However, while reducing stress and providing emotional support helped the child's primary caregiver, it was instrumental support that mitigated the effect of maltreatment on the child, suggesting a need for service plans that address the child's needs as well as the caregiver's. That the English and Graham (2000) study found that CPS workers were not accurate at identifying caregiver risk factors or child functioning suggests that more work needs to be done before CPS workers will be able to prescribe the most appropriate service plans.

Research by Black et al. (2002a) raises serious questions about current policies that encourage 3-generation household arrangements. The assumption is that these arrangements would protect high-risk adolescent mothers and their young children from negative outcomes. The findings from this and other studies suggest that, 3-generation households may be at risk of especially serious dysfunction or may be an indicator of pre-existing problems that increase a child's risk of behavioral and developmental problems. Some research suggests that the presence of a grandmother in a household where domestic violence is present may reduce the risk of child maltreatment (Cox, Kotch, & Everson, 2003), but for a maltreated child with a depressed mother who was in her teens when the child was born, the presence of a grandmother may not be protective.

Some of the potential policy and practice implications suggested from the findings regarding partners and social support are listed below:

> Interventions to develop and strengthen protective factors in teen parent families should begin early, because problems in children's emotional and behavioral functioning develop early and persist over time.
> Social service agencies should assess the need for systems of support and reductions in stress for at-risk mothers and help mothers develop relationships that foster practical daily support from partners, friends, and relatives, and that facilitate higher quality home environments.
> Findings suggest that three-generation households are associated with more problems among the maltreated children of high-risk adolescent mothers. Public policy should not require all teen mothers to live with their own mothers in order to qualify for social benefits such as TANF. For some teen moms and their children, additional services supplementing support from grandma may improve child outcomes.
> CPS systems should assess the need for instrumental support among families of maltreated children in order to provide the child's caregiver with assistance with household tasks and in building their own social support networks.
> Risk factors such as domestic violence, maternal depression, substance use, history of victimization as a child should continue to be evaluated and addressed in individual case planning.
> Federal support for CPS system improvements should include funding for the above.

Mothers' Victimization and Depression. Several studies present strong findings of the link between maternal depression and negative outcomes for maltreated children. Studies by Black et al. (2002b), Kotch et al. (1999), and Krishnakumar and Black (2002) indicate that mother's history of alcohol use and mental health problems (especially depression) is likely to increase the

risk of child maltreatment or of children's behavioral or cognitive problems. Black et al. (2002b) also found that depressed mothers perceive more problems in their relationships with partners or spouses. Therefore, screening and services to diagnose, treat, and decrease mother's depression can help those mothers as well as potentially decrease the risks of child maltreatment and of behavioral and cognitive problems.

In addition to screening for mothers' depression, substance abuse, mental health problems, relationship status, and disrupted relationships with their own mothers, several studies indicated that mothers should be screened for a history of childhood and adult abuse, because these also are risk factors for their children's maltreatment and children's behavior problems. Mothers who had been physically or sexually abused reported more behavior problems in their own children, regardless of how teachers and researchers rated children's behavior. This suggests that mothers who have been victims of abuse as children or young adults need parenting skills training to help them establish age-appropriate expectations of their children, teach them effective nonviolent discipline methods, and treat their depression (Morrel et al., 2003).

The following policy recommendations are based on findings regarding mother's victimization, depression, and mental health.

- ➢ Parenting programs for teens and other at-risk mothers should offer social supports and provide prevention, screening, diagnosis, and referral for mothers' depression, substance abuse, and past or current victimization.
- ➢ Primary care health services for women and children should improve identification and screening of at-risk mothers for depression, substance abuse, and past or current victimization. The professional associations of women's and children's primary care providers should study and recommend which patients (adult and child) should be screened, and how to screen them.
- ➢ CPS should provide screening for depression, substance abuse, and past victimization of all mothers of children referred for maltreatment, offering services or referrals to treat depression, substance abuse, and other problems stemming from mothers' own abuse as children.
- ➢ CPS systems should provide improved parenting training for mothers who have a history of past or concurrent maltreatment or other victimization experiences. These should include training in effective disciplinary techniques to use in situations that may cause the parent to feel especially angry or frustrated.
- ➢ The Center for Mental Health Services and other federal and state programs should support and evaluate programs that aim to diagnose and treat a range of mental health and substance abuse problems among adolescent and other at-risk mothers involved with CPS.

Screening Children for Risk Factors and Providing Needed Services. The research also supports routine screening for children for risk factors such as FTT and maltreatment, so that those at highest risk for negative behavioral and developmental outcomes can be identified and offered services (Dubowitz et al., 2002; Kerr et al., 2000). These studies also indicate the need for intervention programs to help improve the cognitive and behavioral development of maltreated children. Findings that substantiated maltreatment predicts poor academic performance in 6 and

8 year-old children indicate the importance of including academic remediation and counseling in support services provided to the child and family. Age-appropriate interventions need to be developed, implemented and carefully evaluated for their effectiveness in mitigating the long-term effects of maltreatment (Zolotor et al., 1999).

The findings of Socolar et al. (1999) suggest that corporal punishment, including harsh physical discipline, is a relatively accepted strategy among high-risk families in response to certain childhood infractions. Parents will acknowledge their use, but efforts to screen for harsh discipline need to include specific questions regarding each individual child and type of behavior subject to punishment, rather than general questions.

Based on findings regarding the need for early identification of risk factors and the need to provide services to young children, recommendations include:

> Child health providers should assess at-risk families for disciplinary practices and problems in the parent/child relationship.
> Parenting programs should offer practical guidance aimed at teaching age-appropriate disciplinary strategies, reducing corporal punishment, helping young parents cope with frustration and anger.
> CPS should improve evaluation of parenting skills and knowledge and offer services aimed at improving age-appropriate expectations, disciplinary strategies, and coping with anger.
> CPS should screen referred children for a range of for negative developmental and behavioral outcomes so that interventions can be targeted towards those who are in highest need. However, English and Graham (2000) discovered that CPS workers are not accurately assessing risk factors, behavior problems or parents' stress or social support, compared to researchers' assessments. To insure that CPS systems are identifying the most at-risk families, assessment strategies should be continually examined to make sure they are measuring what they are purported to measure.
> CPS systems should provide comprehensive intervention and treatment programs for maltreated children that include emotional, academic, and social support services.
> Communities, through public and private institutions, should offer education and parenting training to all new parents, not just those involved with social services.

Welfare and Poverty. The link between poverty and maltreatment is well-established. Additionally, participation in public income support programs increases the risk of maltreatment. The Kotch et al. (1999) local site study corroborated the increased risk of a maltreatment report among subjects participating in AFDC (the predecessor of TANF). The reasons include: 1) poverty itself increases the risk of child maltreatment; 2) public income support programs often fail to lift families out of poverty; and 3) families who are involved in these programs are exposed to a system of formal and informal surveillance, increasing the likelihood that they would be reported.

In addition to the increased risk of maltreatment among poor families, and the increased likelihood of a maltreatment report among families participating in public income support programs, being poor can exacerbate the adverse outcomes of maltreatment. In Hussey,

Marshall, English, Knight, Lau, Dubowitz et al. (2005) cross-site analysis of the lack of an association between the substantiation of a child maltreatment report and child behavioral outcomes (in the "Dimensions" chapter), socio-demographic factors, including income, predict child outcomes more strongly that maltreatment status. Poverty or maltreatment alone may be bad for children. The combination of poverty and maltreatment is worse.

LONGSCAN subjects are predominantly poor, making comparisons of poor and non-poor children and families impossible. Among the families of LONGSCAN, participation in welfare services varies. Nevertheless, the data presented here do allow the researchers to offer policy and practice recommendations regarding poverty and income assistance programs that include:

> Anti-poverty and income support programs should offer services such as parenting education and training and instrumental support in addition to cash payments to support parents and families at risk of maltreatment.
> CPS needs to focus on intervening to prevent adverse behavioral outcomes for children who are both maltreated and poor.
> Since the adverse consequences of poverty and maltreatment appear to be additive, social services designed to address child poverty need to be sure that the risks to children associated with poverty are not compounded by the presence of maltreatment, and conversely CPS services should focus not only on ameliorating the consequences of maltreatment but must also consider the presence of child poverty.

FATHERS AND CHILD
MALTREATMENT AND DEVELOPMENT

Overview

The role of fathers and father figures in the maltreatment of children is an important issue, but there has been limited research in this area. Four LONGSCAN studies on the role of fathers and father figures are included in this report. Father figures include a variety of arrangements, relationships and levels of involvement. The term "father" will be used, unless specifying a finding related to father figures.

Dubowitz, Black, Kerr, Starr, and Harrington (2000) found that inner-city families with fathers who reported a greater sense of effectiveness as a parent and who were more involved with household tasks were less likely to have children who were neglected. Approximately half the children who were not neglected as well as those who were "probably neglected" did have fathers in their lives. Thus, father presence or absence per se was not associated with risk of neglect; rather, it was the nature of the father's involvement that was important. The sample included 244 five-year-old African American children and their families; 72% of the families included a father, and 72% of them saw the child every day. Interviews were conducted with mothers, fathers and children. Fathers and mothers were videotaped playing with their child. A home visit included an assessment for child neglect. CPS records were also utilized. Data from four measures were used to develop a composite Neglect Index: the Child Well-Being Scales, Home Observation for Measurement of the Environment, CPS data, and a videotaped Mother-Child Observation,

Dubowitz, Black, Cox, Kerr, Litrownik, Radhakrishna, et al. (2001) found that children who described receiving more support from their fathers reported fewer depressive symptoms and a greater sense of competence and social acceptance. This study includes 855 African American and white 6-year-olds and their primary caregivers from the five LONGSCAN sites. The study examined: 1) whether presence of a father (or father figure) was associated with better child functioning and 2) whether children's perceptions of fathers' support was associated with better child functioning. The data are based on interviews of the primary caregivers and the children, including the following measures: Inventory of Supportive Figures, Child Behavior Checklist, Preschool Symptom Self-Report, Wechsler Preschool and Primary Scale of Intelligence, and the Pictorial Scale of Perceived Competence and Social Acceptance for Young Children.

Marshall and English (2001) found that the presence of a father figure was associated with lower levels of aggression and depression in 6-year-olds. This study examined the possible effects of the presence and quality of interaction of fathers and father-figures on the behavior of young children, in a sample of families reported to CPS. The study included 182 primarily white and African American families in the Northwestern LONGSCAN site. The data were collected from caregiver interviews, teacher reports and CPS records.

While the three articles described above studied the effect of fathers on children's development, the fourth study by Radhakrishna, Bou-Saada, Hunter, Catellier, and Kotch (2001) examined the effect of fathers and father figures living in the child's home on the incidence of child

maltreatment. They found that children with a father figure living in the home were twice as likely to be reported for maltreatment as those with either a biological father or no father figure in the home. Between the ages of one and four, 79% of the children with an unrelated father figure in the home were maltreated, compared to approximately one in three of those with a biological father or no father figure. Between 4-6 years of age, 20% of the children with an unrelated father figure in the home were maltreated, compared to 11 percent with a biological father and 15 percent with no father figure. Between 6-8 years of age, 27% of those with an unrelated father figure in the home were maltreated compared to 4% with biological fathers. The study was based on 182 low-income families from the Southern LONGSCAN site. Data were collected through primary caregiver interviews and CPS reports. The study did not identify whether the father figure perpetrated the maltreatment, or how this family structure led to more CPS reports.

Policy and Practice Implications and Recommendations

Overall, the results support the important role of fathers for children's well-being (e.g., less depressive symptomatology, less aggression, greater social competence). One study identified an increased risk of maltreatment for children living with father figures. However, most father figures do not maltreat their children – it was not known in this study who was responsible – and most father figures may contribute substantially to children's well-being. The findings also suggest that encouraging fathers and father figures to be involved in children's lives should be accompanied by efforts to enhance their competence and sense of effectiveness as parents. Encouraging the positive involvement of fathers in children's lives, even if they do not live with the child, can improve children's emotional and behavioral functioning.

In general, the four studies are consistent with previous research, supporting the protective nature of a nurturing father in the children's lives. Three of the studies found that when fathers feel that they are effective parents and when they have sustained involvement, their children were less likely to be neglected and more likely to have better cognitive development.

The following policy and practice recommendations are aimed at increasing the positive participation of fathers and father figures:

> A cultural change is needed to increase expectations of fathers. As part of its marriage promotion efforts, the federal government could mount a public education campaign portraying men as important in children's lives and as nurturing parents. It might include showing men how they too can benefit by being involved in children's lives.

> Public and private agencies should support the development of programs that enhance men's parenting skills. In addition, such programs might address men's various needs, such as those related to education and employment. Training for fathers and parenting should also be offered in foster care programs, school health classes, and programs for pregnant women and their partners.

> Parenting programs for men should be carefully evaluated so that we can learn what really works. This can be accomplished by linking community agencies with universities or researchers to provide the evaluation expertise. It is critical that adequate funds be

allocated for these evaluations, and that federally funded demonstration programs include rigorous evaluations.

➢ Remove policy disincentives in TANF, Food Stamp, other safety net programs and tax policies for low-income, single mothers to live with the fathers of their children.

➢ Use child support enforcement programs to foster positive involvement of biological fathers in their children's lives, when appropriate, and not primarily as a punitive measure or deterrent to procreation.

➢ Pediatric health care providers and other professionals serving mothers and their children in a variety of settings should explain to mothers the valuable roles that fathers can play, and, for example, involve fathers in the pediatric visit. The health care system can play an important role enhancing the knowledge and skills of fathers (and mothers). This requires time that needs to be reimbursed through health insurance.

➢ Support and parent training for fathers, and especially father figures, may reduce maltreatment. CPS workers should consider the increased risks to children living with father figures, to assess the circumstances, and to facilitate support and training when needed. Marriage promotion policies should include funding for this type of support and training.

➢ When fathers or father figures perpetrate maltreatment, CPS substantiation policies should ensure that he, and not the mother, be identified in the official central registry database (Radhakrishna et al., 2001). This would require changes in state policies in some states.

➢ Providing financial support to single mothers to reduce the economic incentive to bring violent or abusive partners into the home should help protect children from maltreatment. This could include providing opportunities for economic self-sufficiency, such as affordable childcare, affordable health insurance, educational opportunities, and job training.

➢ TANF requirements that teen mothers live with their own mothers in order to be eligible for welfare should include safeguards (or exceptions) to reduce teen mothers' exposure to their mothers' male partners, thus protecting teens from maltreatment.

➢ Ensure that TANF and other programs aimed at promoting marriage not encourage poor single women to marry abusive men. Without careful safeguards, marriage promotion policies have the potential to increase the risk of maltreatment of children and teens living with unrelated males. Therefore, such policies and programs must also offer parenting classes and other services to reduce the risk of child maltreatment.

FAMILY VIOLENCE

Overview

There is clear research evidence linking intimate partner violence to child maltreatment and poor child outcomes, but difficult questions remain about the implications for families and for public policy. Five LONGSCAN studies were published on these issues in recent years. Two studies focused on the relationship between intimate partner violence and child maltreatment, while the other three studies examined the relationship between such violence and child development and behavioral outcomes.

Link between Intimate Partner Violence and Child Maltreatment

Lee, Kotch and Cox (2004) and Cox, Kotch and Everson (2003) examined the association between physical domestic violence and reported child maltreatment for 219, 6 – 8 year old children and their caregivers from the SO LONGSCAN site. This group was predominantly low income and African American, and more than half were single-mother households. In both studies, domestic violence was assessed by combining caregivers' self-reports and children's reports, and child maltreatment was based on official state records and included any maltreatment, regardless of whether it was by the mother, father, or other adult in the home.

Lee et al. (2004) found that physical domestic violence was a significant risk factor for child maltreatment, but only in families on welfare (AFDC). Other risk factors for maltreatment were lower maternal education (less than high school), mother's (or maternal caregiver's) experience of childhood sexual abuse, and lack of church attendance. They also found that in households experiencing physical domestic violence, social supports such as the positive involvement of grandmothers may protect children from maltreatment.

Cox et al. (2003), in a similar study, found that, although children of mothers who were separated were at significant risk of maltreatment, in those separated families where intimate partner violence had occurred previously, children were at significantly *lower* risk for maltreatment. Other factors that protected children in homes with intimate partner violence from maltreatment included mothers' involvement in a religious community and child reports of mother as being supportive. When intimate partner violence occurred, children of young mothers, lower-educated mothers, and low-income mothers were especially at risk of maltreatment.

Policy and Practice Implications and Recommendations

Overall, the LONGSCAN studies examining the link between intimate partner violence and child maltreatment find that this link is very strong. The studies also identified a number of factors that can potentially protect children in homes where there is intimate partner violence. Agencies that intervene to help victims of intimate partner violence need to be aware of the risk of maltreatment, when children are involved. Beyond this, the findings on the relationship between

intimate partner violence and maltreatment highlight a number of important policy and practice implications, specifically:

> ➢ Given the degree to which intimate partner violence and child maltreatment co-occur, preventing intimate partner violence among couples with children will help prevent child maltreatment.
> ➢ Agencies that serve victims of intimate partner violence need to provide referrals or services aimed at protecting children and helping victims of this violence adequately care for their children. They should also carefully assess children for experiences of maltreatment. These issues are especially important for agencies serving victims of intimate partner violence who have few social resources (such as social networks, education, and finances). Young families may be especially vulnerable.
> ➢ Among victims of intimate partner violence, involvement in community and social networks appears to help protect children. Such involvements should be encouraged, where feasible.
> ➢ Agencies and professionals that assist maltreated children need training to understand and recognize the potential role of intimate partner violence in the lives of maltreated children and of resources to coordinate their efforts with agencies that serve victims of intimate partner violence. Traditionally, there is little coordination or communication between services for victims of intimate partner violence and child maltreatment; efforts to bridge this gap should be supported and developed.

Link between Intimate Partner Violence and Child Outcomes

Three studies examined the effect of intimate partner and other family violence on child outcomes. All three studies measured violence directed at a child and violence witnessed by a child through parent and child interviews. Parents were also interviewed about their own histories of victimization, parenting style, and depression, as well as their child's behavior. Child outcomes related to social, emotional and behavioral outcomes were measured via standardized measures in addition to the parent report.

Dubowitz, Black, Kerr, Hussey, Morrel, Everson, and Starr (2001) examined the effects of mothers' victimization histories on their own mental health and parenting and on their children's behavior. The sample of 419 included families from the Southern and Eastern sites. The study concluded that mothers who had either child or adult victimization experiences were more likely to be have symptoms of depression, and more likely to be harsher parents. The children of depressed, anxious and harsh mothers were more likely to be anxious and to have either internalizing (such as withdrawal or depression) or externalizing (such as aggression or delinquency) behavior problems. Mothers victimized both as children and as adults had worse outcomes than those victimized during only one of those periods.

Litrownik, Newton, Hunter, English, and Everson (2003) examined how exposure to specific dimensions of family violence (i.e., whether child was a witness or a victim, whether aggression was physical or psychological) influenced children's aggression and depression/anxiety in a sample of 682 4- and 6-year-old at-risk children. Both caregivers and children were asked about

children's experiences with family violence. This study included children from four of the LONGSCAN sites (SO, NE, SW, and NW). Most of the children were ethnic minorities living below the poverty line, in AFDC households, with mothers who were not married. LONGSCAN children were exposed to a great deal of family violence. Both witnessing and experiencing physical and psychological aggression were associated with aggression and anxiety/depression. Outcomes for children were especially poor when parents and children agreed that children had witnessed family violence.

A study of the NW sample by English, Marshall and Stewart (2003) examined the link between intimate partner violence and child outcomes in greater detail. Specifically, they examined a number of factors that could potentially explain the relationship between intimate partner violence and child outcomes. They found that domestic violence affected family functioning, caregivers' interactions with children, and caregivers' general health and well-being. It was these factors that explained the impact of intimate partner violence on children's behavior problems and impaired health.

Policy and Practice Implications and Recommendations

The findings that family violence has an impact on parenting capacity, and that young children exposed to family violence are more aggressive, anxious, or depressed, points to the need for more effective interventions for at-risk families with young children. Because family violence has such a negative impact on parenting and is significantly associated with maltreatment, the findings suggest that interventions should be directed to homes where such violence is likely, whether or not harm to the children has already been identified.

➢ Given the association between family violence and poor child outcomes, proactively developing and providing services to children who have already witnessed or experienced family violence is an important priority.
➢ Caregiver history of violence as a child and adult effects a mothers' capacity to parent and should be considered in assessment and service planning
➢ Legal and health care systems need to develop more effective early interventions for violent couples and those at risk for violence, to prevent and reduce children's exposure to violence and to help children after such exposure even if the negative impact of the exposure is not yet obvious.
➢ For children who are already in the CPS system, therapeutic and behavioral services that focus on the primary caregiver in turbulent and violent households help ensure protection and appropriate parenting responses to children, at least up to age 6.
➢ Children's and women's health care providers and emergency room physicians need guidance based on research regarding who, when, and how to screen and intervene for mothers with childhood or recent history of victimization to reduce maternal depression and improve parenting, thus reducing the incidence of behavior problems in children.

FOSTER CARE RESEARCH

Overview

Empirical evidence is accumulating that suggests children who are removed from their homes due to maltreatment and placed in substitute care suffer from a myriad of problems. Though research is needed to differentiate the short- and long-term effects due to the maltreatment experience versus removal and out-of-home care, a number of policy initiatives have targeted the foster care system (e.g., Child and Family Services Reviews mandated by Congress in 1994 and the Adoption & Safe Families Act of 1997). With the goals of foster care being expanded by these initiatives beyond safety and permanence to include child well-being, a number of specific policy and practice recommendations have been provided for the Child Welfare System (e.g., *The Future of Children*, Volume 14, Winter 2004). Eight recent published studies coming from LONGSCAN provide empirical support for many of these recommendations, as well as having their own implications. Four of these studies address the experiences of children during the period when they were first removed, made dependents of the court, and placed in substitute care up to the time when a permanent plan should have been in place (i.e., 18-months post-removal). The remaining four studies address experiences and child adjustment following this 18-month period, when caregivers were expected to be permanent.

Foster Care Experiences from Initial Removal to 18-month Permanent Plan

Studies by Leslie, Landsverk, Esset-Lofstrom, Tschann, Slymen, and Garland (2000), Leslie, Landsverk, Horton, Ganger, and Newton (2000), Newton, Litrownik, and Landsverk (2000), and Besinger, Garland, Litrownik, and Landsverk (1999) examined problems of caregivers at the time their children were removed, mental health adjustment of children at removal, mental health service receipt, and stability of placements in children 16 years and younger from the SW LONGSCAN site who entered out-of-home care from May, 1990 to October, 1991. This diverse (29% Caucasian, 37% African American, 16% Hispanic, 15% mixed and 3% Asian/Other) group of over 1200 children and youth remained in out-of-home care for at least 5 months, initially being placed in either kin or non-kin substitute care.

Besinger et al. (1999) examined substance abuse among the previous caregivers of 639 maltreated children placed in out-of-home care. They found that 79% of the parents and others who took care of the children before they were removed from their homes had substance use problems. These problems were more likely among parents and caregivers of white children, compared to African Americans, Latinos, Asian/Pacific Islanders and American Indians. Children who were removed from homes where there was a substance-abusing adult were more likely removed because of neglect rather than physical or sexual abuse. Finally, the higher prevalence rate found in the current study compared to previous reports is attributed to restrictive definitions of caregiver substance abuse utilized in earlier studies.

Leslie et al. (2000) found that almost one-half of the 480 children who had been in foster care for at least 5 months needed mental health services based on the Total Problem Scale of the Child Behavior Check List. While the majority of them (42%) did receive services based on this need, there were a number of disparities. Specifically, boys tended to use more mental health

outpatient services, and the number of outpatient mental health visits increased with age. In addition, after taking into account the impact of behavior problems, age, gender, and maltreatment history, a child's race/ethnicity and type of placement were associated with the extent of mental health services they received. Specifically, Latino and Asian American children had fewer mental health service visits than the Caucasian and African American children in the study, and children residing in kinship care received fewer mental health services.

Newton, Litrownik, and Landsverk (2000) examined the relationship between change in placement and problem behaviors over a 12-month period among 415 foster children. This longitudinal study is the first to attempt to disentangle the previously observed relationship between number of placements and child functioning. First, it was found that children who were initially more aggressive were likely to experience more subsequent placements. This finding supports the claim that placement failures/changes are due to the problem behaviors of children.

At the same time, it was found that children who did not have behavior problems when they first entered out-of-home care were at risk of developing them when they experienced more subsequent placements. This finding supports claims that the Foster Care System can have iatrogenic effects (i.e., can cause children to develop behavior problems).

Leslie et al. (2000) focused on children who experienced kinship care during the 18-month period following their entry into out-of-home care. They described 92 children who experienced kinship care only, 348 children who were in both kinship and non-kinship foster care, and 44 children who experienced kinship care and more restrictive settings such as group homes or a psychiatric hospital. African American children were more likely to be placed in kinship care only; Latino children tended to be placed in both kinship care and non-kinship foster care, and Asian and Caucasian children tended to have placements in both kinship care and restrictive settings. As might be expected, those children in kinship care only stayed in their initial placements longer and had fewer placement changes overall. There were no differences in how many children were reunified from kinship care only versus kinship/non-kinship care, while children in kinship/restricted care were one-third as likely to be reunified.

Policy and Practice Implications and Recommendations

In sum, these LONGSCAN studies indicate that 1) parental substance abuse is a major problem associated with children being removed from their homes because of neglect, 2) children who enter out-of-home care are in need of mental health services, 3) foster children in general, and those in kinship care more specifically, do not get the services they need, and 4) the foster care system needs to be more concerned about stability of substitute care as multiple moves can lead to the development of child behavior problems. A number of general recommendations are offered in the Executive Summary of volume 14 of *The Future of Children* (Winter, 2004), based in part on these LONGSCAN studies. Some of the recommendations are to measure child well-being, provide services for birth families and foster families (kin and non-kin), and coordinate services. A number of more specific, or expanded recommendations based on the LONGSCAN studies include:

Substance Abuse Screening of Caregivers and Interventions:

➢ CPS and others working with maltreating parents need to screen and assess parents for substance use.
➢ Intervention approaches for substance-using parents who abuse or neglect their children need to have a holistic focus. Services that treat the substance use habits of these parents, and also prevent their future abusive and neglectful behavior, need to be identified and provided. These programs may need to be distinctly different from those for pregnant, drug-using mothers.
➢ Children and other family members of caregivers that abuse drugs also need services, including drug education and intervention, to help safeguard them from future harm.

Mental Health Screening of Children and Services:

➢ Since they are at risk for mental health problems, all children entering the foster care system, regardless of their apparent problems, need behavioral and mental health screenings as soon as possible after the initial adjustment to their placement. Comprehensive assessments should be available when screening indicates problems.
➢ CPS needs to develop guidelines to systematically link foster children who have behavioral problems to appropriate services and monitoring, and to evaluate the effectiveness of those guidelines.
➢ Kinship care providers and children in their care should be monitored as carefully as non-kin foster parents and children in their care.
➢ Children in kinship care should be provided with the same array of services and resources as children in foster care.
➢ CPS needs to make sure that girls and minority children receive appropriate mental health services when the need is identified during screening and follow-up assessments.
➢ Models should be developed and evaluated for providing an integrated system of care for foster children, including HMOs, case management, and joint planning and coordination between relevant government agencies.

Assessments of Children and Placements:

➢ CPS needs to focus more staff and resources earlier in the placement process, improving assessments prior to and during initial placements. Although temporary or transitional placements are necessary in emergency situations, it is cost-effective to maximize the chances of success of the first non-emergency placement through better assessment and more support services. Multiple placements increase a child's problems, reduce the chances of a subsequent successful placement, and cost more as additional services are needed.
➢ Federal funds for child welfare services are dependent on federal approval of State plans. The Child Abuse Prevention and Treatment Act (CAPTA) or Title IV-E should require that State plans include strategies for improving initial placement decisions, and evaluate the outcomes of those strategies as measured by length of initial placement and percentage of children in multiple placements.

Caregiving Environment and Long-Term Adjustment of Foster Children

Four studies (Lau, Litrownik, Newton, & Landsverk, 2003; Litrownik, Newton, Mitchell, & Richardson, 2003; Tripp DeRobertis & Litrownik, 2004; Romney, Litrownik, Lau, & Newton, in press) are based on a sub-sample of the larger sample of children from the SW LONGSCAN site. Specifically, these studies focus on 330 children who were 3 ½ years old or younger when they first entered out-of-home care and are being followed through young adulthood as part of LONGSCAN.

Litrownik et al. (2003) examined the quality of permanent placements at 6 years of age for 254 children in the sub-sample who had been removed from their homes before the age of 3 ½ years. They found that reunified children and their parents reported more family violence (either directed against the child or witnessed by the child) than did caregivers and their children who were not reunified. Parents who were reunified with their children also reported using more violent physical and psychological discipline, compared to adoptive parents, who reported using more than foster parents. In contrast, adopted children reported witnessing significantly less physical violence in the home than foster children.

Lau et al. (2003) studied the effects of subsequent reunification among 218 of these children. It was found that children who were reunified by age 4 were exposed to more adverse life events, including family dysfunction, instability, and harm to self or others, compared to children who were not reunified. Although reunification was not directly associated with children's depression or other internalizing problems, these stressful life events were associated with greater internalizing problems reported at age 6. Thus there was some evidence that reunification was indirectly related to internalizing problems. Despite the increase in adverse events for children who were reunified, they were less likely to receive mental health services than other children. There was some good news for reunified children. They were less likely to feel socially isolated than children who were not reunified. Thus, there appeared to be both positive and negative consequences of reunification, though the negative appeared to predominate.

DeRobertis and Litrownik (2004) examined the relationship between 33 non-kinship and 37 kinship foster parents' disciplinary approaches and the aggressive behavior of 8 year old children placed with these substitute caregivers. Kinship foster parents were significantly more likely than unrelated foster parents to report that they would use harsh discipline. In addition, there was some evidence suggesting that foster parent-reported harsh discipline strategies were related to more child-reported use of aggressive strategies to solve social problems. Thus it appears that the foster parenting environment can have a significant impact on children's social adjustment.

Romney et al. (in press) studied 277 children to determine the relationship between disabilities of children placed out of home prior to age 3 ½ years and subsequent permanent placements. Children who were described by their parents or caregivers as having cognitive, emotional, behavioral or physical disabilities were over four times more likely to be permanently living in non-kinship foster care than reunified, compared to children who were not described as having any of these types of disabilities.

Policy and Practice Implications and Recommendations

These LONGSCAN studies provide information about the long-term adjustment of children who had entered out-of-home care, the family context in which they now live, and the relationship between the two. Reunified children and their parents report more family violence and the use of harsher disciplinary techniques than do non-reunified children and their caregivers. More importantly, this exposure to an array of stressful family circumstances (e.g., family conflict, changes in family composition, legal problems, mobility, injury, illness, and exposure to violence) appears to be related to increases in internalizing problems. Though the reunified children report less social isolation, the observed stressful living environment and poorer adjustment of reunified children raise questions about the relative benefits of reunification compared to permanent placement with non-kin.

Despite need, the reunified children appear to receive less attention (i.e., fewer mental health services) from the Welfare System. Questions or concerns are also raised about the emphasis on placing children with relatives without providing additional support. Again, the Executive Summary from the Winter 2004 issue of *The Future of Children* (2004) offers some general recommendations addressing these concerns. For example, the summary suggests that Child Welfare agencies need to provide more support in an effort to preserve permanence and to ensure child well-being after exit from the system. It also urges Child Welfare agencies to develop and provide services and supports for foster families that match their needs. More specific recommendations based on the LONGSCAN studies include:

Permanent Placement: Reunification:

➢ CPS needs to carefully monitor reunified families to ensure that the children are not endangered.
➢ CPS or other agencies need to provide long-term services to reunified families to ensure that the children and their families receive adequate mental health treatment and other social services.
➢ State agencies should be required to evaluate their implementation of criteria for reunification and to examine the implications for children's safety. Stricter standards for reunification may be warranted in light of research findings indicating that reunified children are at greater risk for harsh disciplinary practices, stressful family situations, injury, illness, upheavals, and exposure to violence when compared to children who are adopted, in non-kinship care or in kinship care.
➢ CPS workers need the resources and policies to better evaluate whether the benefits of reunification outweigh those risks for each child.
➢ Early intervention services, respite care, and parent education should be offered to increase the chances for reunification for children with developmental delays and disabilities and to reduce the likelihood of multiple foster care placements.

Permanent Placement: Kinship Care:

> ➢ CPS needs to monitor kinship families to ensure that the children are not endangered.
> ➢ CPS or other agencies need to provide long-term services to kinship families to ensure that the children and their families receive adequate mental health treatment and other social services.
> ➢ CPS needs to provide child welfare staff and kinship care providers with better training in child development and positive disciplinary techniques.

Federal Incentives and Funding for Policy Recommendations

While the work of LONGSCAN did not directly address legislative actions, financial resources, or service funding, the evidence for potential child dysfunction suggests that there should be federal support provided to ensure that these recommendations are implemented. This support could be assured through federal mechanisms such as The Child Abuse Prevention and Treatment Act (CAPTA), Title IV-E, SAMHSA block grants, and Medicaid benefits. Specific examples include:

> ➢ Provision of substance use services for birth parents could be funded in part through SAMHSA block grants, CAPTA, or Title IV-E.
> ➢ Medicaid benefits for children should be available immediately after removal from their home to facilitate behavioral assessments and provision of mental health services.
> ➢ Through SAMHSA block grants, CAPTA, or Title IV-E grants to the State, agencies should support improvements in access to mental health care, services for children with behavioral problems, and an integrated system of care.
> ➢ Monitoring of families, and provision of support and services for children and their families after a permanent placement has been determined should be assured through CAPTA or Title IV-E.

ETHICAL ISSUES

Overview

Runyan (2000) described the ELM conference (<u>E</u>thical, <u>L</u>egal, and <u>M</u>ethodological issues related to asking children for self report of maltreatment), a national conference convened by LONGSCAN at Chapel Hill in 1994 to consider ethical and other issues related to directly asking children about their maltreatment histories. He described how conference participants strongly disagreed about whether it was necessary to provide services for children who revealed maltreatment and whether confidentiality if there was a clear risk of harm could ever be promised in the context of research. The paper also summarized four LONSCAN articles that examined the ethical challenges of conducting research on child maltreatment (Amaya-Jackson, Socolar, Hunter, Runyan, & Colindres, 2000; Black, Ponirakis, 2000; Knight, Runyan, Dubowitz, Brandford, Kotch, Litrownik, & Hunter, 2000; Kotch, 2000). The main concern is how researchers can preserve confidentiality and privacy and yet ensure that maltreated children are safe. The article served as the introduction to a special issue of *Journal of Interpersonal Violence* that included the four papers and was published in July 2000. His summary included the following recommendations for federal policy:

 ➢ The federal government shall establish an advisory body on ethical and legal aspects of child abuse and violence exposure research. This advisory body would examine how best to ask children about maltreatment, disclose the intent of the research, use surrogate decision makers, and reduce barriers to participants of participating in maltreatment research.
 ➢ The Children's Bureau of the U.S. Department of Health and Human Services (DHHS) should facilitate research and lower barriers to including child maltreatment in federal and private studies.
 ➢ Public Health Service certificates of confidentiality should be automatically awarded for research funded by DHHS, and the Children's Bureau should require all grantees to obtain a certificate of confidentiality.
 ➢ Public Health Service certificates of confidentiality should be amended to include protection of data and of participant identity.
 ➢ Legislation authorizing certificates of confidentiality should be amended to describe the protection this certificate offers regarding the reporting of child maltreatment.
 ➢ Data collected under a Public Health Service certificate of confidentiality should be inadmissible in all legal proceedings.
 ➢ Researchers protected by certificates of confidentiality should be permitted to aid participants through recommendations of services or by encouraging participants to report to protective agencies.
 ➢ Professional societies in psychology, social work, medicine, and law should become involved in modifying certificates of confidentiality regulations.
 ➢ Federally supported studies of child health and crime victimization should be encouraged to include exposure to child maltreatment.

IMPORTANCE OF UNDERSTANDING THE CHARACTERIZATION
AND DIMENSIONS OF MALTREATMENT

Overview

The issue of how maltreatment is conceptualized and defined is important because it helps determine the incidence and prevalence of maltreatment, whether maltreatment once reported is substantiated, whether or not services to maltreating families will be provided, and the types of services provided, including whether or not children will be removed from parental custody. Definitions of different types of maltreatment including type, severity and chronicity have implications for policies related to Child Protective Services (CPS) and other programs providing services to children, youth and families. Although research on definitions does not usually attract policy attention, the findings of the LONGSCAN articles on characterization, conceptualization and dimensions of maltreatment have implications for child maltreatment policy and practice. Five studies addressed the issue of conceptualization and classification of maltreatment, and 4 studies examined the dimensions of maltreatment in relationship to child social, emotional and behavioral functioning.

All the studies utilized the same sample, that is, a sub-sample of 806 children (261 of the children did not have reports of maltreatment, and 545 children who did have reports to CPS). Papers in this section used different subsamples from the overall sample of 806 based on the research question of interest. Details of the sample selection process and individual research questions are available in the Special Issue of *Child Abuse and Neglect,* May, 2005.

Link between Classification and Conceptualization of Maltreatment and Child Social, Emotional and Behavioral Functioning

Runyan, Cox, Dubowitz, Newton, Upadhyaya, Leeb, et al. (2005) first compared the classification of maltreatment utilizing CPS designations compared to two other classification systems, the MMCS, a modified version of the Maltreatment Classification System first developed by Barnett, Manly, & Cicchetti (1993) and a classification system developed for the Second National Incident Study (NIS-2). While few differences were found classifying child maltreatment referrals using the MMCS or the NIS-2 classification system, there were significant differences compared to CPS designation, especially with regard to neglect and sexual abuse reports. When comparing classification of maltreatment to child outcomes, this study found that a general categorization of neglect by CPS predicted more emotional and behavioral problems among children, and the MMCS or NIS-2 classifications of physical abuse and sexual abuse were stronger predictors of emotional and behavioral problems.

Dubowitz, Pitts, Litrownik, Cox, Runyan, and Black (2005) examined whether categorizing neglect into nine subtypes (failure to provide food, medical, clothing shelter, hygiene, sanitation, and three types of supervision), improved the ability to predict differences in child outcomes based on classification of type. This study did not find a strong association between subtypes of neglect and child outcomes. Similar to the findings in the Runyan et al. (2005), study reported above, CPS classification of general neglect was the best predictor of child behavior problems and poor socialization. When a case of alleged maltreatment comes to the attention of CPS,

approximately 40% are screened out and never investigated (U.S. Department of Health and Human Services, 2001), and of those investigated, approximately 29% are substantiated or indicated for maltreatment.

Hussey et al. (2005) examined whether outcomes differed for children not reported, those reported/investigated and not substantiated, and children reported, investigated and substantiated for maltreatment. This study found modest differences in emotional and behavioral functioning between children who were not reported and those reported whether substantiated or not substantiated. There were no differences in emotional and behavioral functioning between children who were reported for maltreatment and not substantiated and those who were reported and substantiated. This lack of difference in emotional and behavioral functioning between reported but unsubstantiated and reported and substantiated children remained after adjusting for other factors such as prior reports to CPS and socio-demographic traits. The authors concluded that "unsubstantiated reports should not be dismissed or discounted" and find "little evidence" in their analysis that "substantiation status is a distinction with a difference" in terms of child emotional and behavioral functioning (Hussey et al, p. 490).

English, Upadhyaya, Litrownik, Marshall, Runyan, Graham et al. (2005c) examined the relationship of child experiences identified conceptually as neglectful from infancy to toddler hood based on child developmental needs, regardless of whether classified as neglect by CPS systems. Child need was identified within categories of physical and psychological safety and security. A lack of a safe, clean or stimulating home environment predicted impairments in language development and cognitive functioning for young children. Multiple changes in residence and exposure to verbal aggression predicted child behavior problems.

The Dubowitz et al. (2005) study also examined a conceptual model of neglect based on children's developmental needs related to support, affection and safety. The relationship of these latent constructs of neglect to child functioning at age 8 was then examined. Level of support from mothers, a child's experience of little early affection, and exposure to family conflict were associated with child social and behavior problems.

An approach to defining neglect based on child need delineates specific targets for change such as increasing parental behaviors that would be interpreted by the child as affectionate and supportive, improving caregiver parenting practices to reduce verbally aggressive disciplinary techniques, or assisting families in non-violent methods of conflict resolution.

Policy and Practice Implications and Recommendations

Overall, the LONGSCAN classification and conceptualization of maltreatment studies demonstrate the importance of the method of classifying maltreatment, especially physical and sexual abuse, in relation to child social, emotional and behavioral functioning.. The conceptualization studies of neglect indicate the potential for improvement in classification of maltreatment when utilizing alternative conceptualizations outside the current legal standard. Furthermore, the results of the Hussey et al. study (2005) indicate that, in terms of child well-being, there is little difference in child outcomes based on whether or not a CPS referral is substantiated. Important policy and practice implications from these studies include:

> To promote a more accurate understanding of the incidence and prevalence of maltreatment, current methods of classifying maltreatment by CPS systems should be re-examined and improved.
> How a CPS case is classified (e.g., whether physical or sexual abuse, neglect or emotional maltreatment) can make a difference in terms of how the case is handled by CPS. Federal and state policies should promote accurate classification of maltreatment.
> Substantiation of maltreatment is often the basis on which provision of services to children and families is determined. However, as indicated by the Hussey et al. study (2005), there is little difference in child outcomes based on whether or not a CPS referral is substantiated. Policies and procedures related to assessment, substantiation and service provision should be re-examined to improve services to children and families in need regardless of their substantiation status.
> Current definitions of neglect should be re-examined to include child need based on developmental stage and a consideration of cumulative harm associated with patterns of caregiver "omissions".
> Primary and secondary interventions should be developed to target specific aspects of caregiver "omissions" associated with a child's need for psychological and physical safety and security.

Link between Classification of Type, Severity and Chronicity of Maltreatment and the Social, Emotional and Behavioral Functioning of Children

Lau, Leeb, English, Graham, Briggs, Brody et al. (2005) focused on different ways to classify the "predominant" type of maltreatment. Overall, the researchers found that most of the children in this study were victims of more than one type of maltreatment. The researchers also found that different types of maltreatment are associated with different types of social, emotional and behavioral problems in young children. Distinctions between types of maltreatment could potentially be useful in determining how to target limited resources to help maltreated children. Each method of classifying type of maltreatment in this study predicted child developmental, emotional or behavioral problems; however, the method used to identify the "predominant" type of maltreatment was the best at predicting risk of poor social, emotional or behavioral problems in children.

Litrownik, Lau, English, Briggs, Newton, Romney et al. (2005) examined different ways to measure the severity of child maltreatment and its relationship to social, emotional and behavioral functioning of young children. Overall, this study found that severity of maltreatment between the ages of 4 and 8 predicted child behavior problems and anger at age 8. When examining severity of specific types of maltreatment the study found that the severity of physical abuse predicted child behavior problems and that "failure to provide" neglect predicted lower levels of adaptive functioning at age 8.

English, Graham, Litrownik, Everson, and Bangdiwala (2005b) examined different methods of classifying the chronicity of a child's maltreatment experience and the relationship of chronicity to child social, emotional and behavioral functioning. Each method of classifying chronicity was found to be related to children's social, emotional and behavioral functioning; however, the

developmental method of classifying maltreatment (related to the extent and continuity of maltreatment across different developmental stages from birth to age 8) was the best method of classifying the chronicity of a child's experience of maltreatment.

Finally, English et al. (2005c) examined a combined model of the dimensions of maltreatment (type, severity, chronicity and age of first report to CPS) in relationship to children's social, emotional, and behavioral functioning. First, the social, emotional and behavioral functioning of children in the LONGSCAN study who had never been reported to CPS was compared to a sample of reported children. Children never reported to CPS had significantly higher scores on all measures of social, emotional and behavioral functioning. When examining the dimensions model of the sample of maltreated children it was found that type, severity and chronicity had differential effects on a child's social, emotional and behavioral functioning. For example, the longer the maltreatment lasted, the more likely the child had poor socialization skills at age 8, or a single type of severe maltreatment at an early age could have a long-term negative impact on a child's behavior and social skill development. In order to determine the most appropriate and targeted interventions the authors recommend a comprehensive assessment of the dimensions of maltreatment that includes type, severity, age of onset of maltreatment and the pattern of maltreatment over time.

Policy and Practice Implications and Recommendations

The findings from the four studies in this section suggest that how maltreatment is classified in terms of type, severity and chronicity can make a difference in understanding the impact of maltreatment on children's social, emotional and behavioral functioning. First, compared to non-maltreated children, children who are referred to CPS (whether substantiated or not) have worse social, emotional and behavioral outcomes than children who are not reported. Furthermore, differences in the "dimensions" of a child's maltreatment experience are important in terms of understanding the impact of maltreatment on children's social, emotional and behavioral functioning. Policy and practice implications from these studies include:

➢ Assessments of child maltreatment should include examination of the dimensions of maltreatment including type, severity, chronicity and age of onset.
➢ A comprehensive assessment of maltreatment should lead to improved services for children and families to address both the risks associated with maltreatment, the consequences of specific dimensions of maltreatment of child growth and development, and interventions necessary to reduce risk and promote healthy child growth and development.

References

Amaya-Jackson, L., Socolar, R. R. S., Hunter, W. M. Runyan, D. K., & Colindres, R. (2000). Directly Questioning Children and Adolescents about Maltreatment: A Review of Survey Measures Used. *Journal of Interpersonal Violence, 15,* 725-759.

Barnett, D., Manly, J. T., & Cicchetti, D. (1993). Defining Child Maltreatment: The interface between policy and research. In: D. Cicchetti and S. L. Toth (Eds.), *Advances in Applied Developmental Psychology: Child Abuse, Child Development and Social Policy* (pp. 7-73). Norwood, NJ: Ablex.

Besinger, B. A., Garland, A. F., Litrownik, A. J., & Landsverk, J. A. (1999). Caregiver Substance Abuse among Maltreated Children Placed in Out-of-Home Care. *Child Welfare, 78,* 221-239.

Black, M. M. & Ponirakis, A. (2000). Computer-Administered Interventions with Children about Maltreatment: Methodological, Developmental, and Ethical Issues. *Journal of Interpersonal Violence, 15,* 682-695.

Black, M. M., Papas, M. A., Hussey, J. M., Dubowitz, H., Kotch, J. B., & Starr, R. H., Jr. (2002a). Behavior Problems among Preschool Children Born to Adolescent Mothers: Effects of Maternal Depression and Perceptions of Partner Relationships. *Journal of Clinical Child and Adolescent Psychology, 31,* 16-26.

Black, M. M., Papas, M. A., Hussey, J. M.**,** Hunter, W.**,** Dubowitz, H., Kotch, J., English, D., & Schneider, M. (2002b). Behavior and development of preschool children born to adolescent mothers: Risk and 3-generation households. *Pediatrics, 109,* 573-580.

Center for the Future of Children, The David and Lucile Packard Foundation. (2004) *Children, Families, and Foster Care.* The Future of Children, 14(1), Los Altos, CA.

Cox, C. E., Kotch, J. B., & Everson, M. D. (2003). A longitudinal study of modifying influences in the relationship between domestic violence and child maltreatment. *Journal of Family Violence, 18,* 5-17.

De Robertis, M. T. & Litrownik, A. J. (2004). The experience of foster care: Relationship between foster parent disciplinary approaches and aggression in a sample of young foster children. *Child Maltreatment*, *9,* 92-102.

Dubowitz, H., Black, M. M., Kerr, M., Starr, R. H., Jr., & Harrington, D. (2000). Fathers and child neglect. *Archives of Pediatrics and Adolescent Medicine, 154,* 135-141.

Dubowitz, H., Black, M. M., Kerr, M., Hussey, J., Morrel, T., Everson, M., & Starr, R. H., Jr. (2001). Type and Timing of Mothers' Victimization: Effects on Mothers and Children. *Pediatrics*, 107(4) 728-735.

Dubowitz, H., Black, M. M., Cox, C. E., Kerr, M. A., Litrownik, A. J., Radhakrishna, A., English, D. J., Schneider, M. W., & Runyan, D. K. (2001). Father Involvement and Children's Functioning at Age 6 Years: A Multi-site Study. *Child Maltreatment, 6,* 300-309.

Dubowitz, H., Papas, M. A., Black, M. M., & Starr, R. H., Jr. (2002). Child neglect: Outcomes in high- risk urban preschoolers. *Pediatrics, 109,* 1100-1107.

Dubowitz, H., Pitts, S. C., Litrownik, A. J., Cox, C. E., Runyan, D., & Black, M. M. (2005). Defining Child Neglect Based on Child Protective Services Data. *Child Abuse and Neglect,* 29(5), 493-511.

English, D. J. & Graham, J. C. (2000). An Examination of Relationships between Children's Protective Services Social Worker Assessment of Risk and Independent LONGSCAN Measures of Risk Constructs. *Children and Youth Services Review, 22,* 1-23.

English, D. J., Marshall, D. B., & Stewart, A. J. (2003). Effects of Family Violence on Child Behavior and Health during Early Childhood. *Journal of Family Violence*, 18, 43-57.

English, D. J., Bangdiwala, S. I., & Runyan, D. K. (2005a). The Dimensions of Maltreatment: Introduction, *Child Abuse and Neglect,* 29(5), 441-460.

English, D. J., Graham, J. C., Litrownik, A. J., Everson, M. & Bangdiwala, S. I. (2005b). Defining maltreatment based on chronicity: Are there differences in child outcomes? *Child Abuse and Neglect,* 29(5), 575-595.

English, D. J., Upadhyaya, M. P., Litrownik, A. J., Marshall, J. M., Runyan, D. K., Graham, J. C., & Dubowitz, H. (2005c). Maltreatment's Wake: The relationship of maltreatment dimensions to child outcomes. *Child Abuse and Neglect,* 29(5), 597-619.

Hussey, J., Marshall, J. M., English, D., Knight, E., Lau, A.S., Dubowitz, H., & Kotch, J. B. (2005). Defining maltreatment according to substantiation: Distinction without a difference? *Child Abuse and Neglect, 29,* 279-92.

Johnson, R. M., Kotch, J. B., Catellier, D. J., Winsor, J. R., Dufort, V., Hunter, W., & Amaya-Jackson, L. (2002). Adverse Behavioral and Emotional Outcomes from Child Abuse and Witnessed Violence. *Child Maltreatment*, 7, 179-186.

Kerr, M., Black, M. M., & Krishnakumar, A. (2000). Failure-to-Thrive, Maltreatment and the Behavior and Development of 6-Year-old Children from Low-Income Families: A Cumulative Risk Model. *Child Abuse & Neglect, 24,* 587-598.

Knight, E. D., Runyan, D. K., Dubowitz, H., Brandford, C., Kotch, J., Litrownik, A., & Hunter, W. M. (2000). Methodological and Ethical Challenges Associated with Child Self-Report of Maltreatment: Solutions Implemented by the LONGSCAN Consortium. *Journal of Interpersonal Violence, 15,* 760-775.

Kotch, J. B., Browne, D., Dufort, V., Winsor, J., & Catellier, D. (1999). Predicting Child Maltreatment in the First Four Years of Life from Characteristics Assessed in the Neonatal Period. *Child Abuse & Neglect, 23,* 305-319.

Kotch, J. B. (2000). Ethical Issues in Longitudinal Child Maltreatment Research. *Journal of Interpersonal Violence, 15,* 696-709.

Krishnakumar, A. & Black, M. M. (2002). Longitudinal predictors of competence among African American children: The role of distal and proximal risk factors. *Journal of Applied Developmental Psychology, 23,* 237-266.

Lau, A., Litrownik, A., Newton, R., & Landsverk, J. (2003). Going Home: The Complex Effects of Reunification on Internalizing Problems among Children in Foster Care. *Journal of Abnormal Child Psychology*, *31,* 345-359.

Lau A. S., Leeb R. T., English D. J., Graham J. C., Briggs E. C., Brody K. E., & Marshall J. M. (2005). "What's in a name? A comparison of methods for classifying predominant type of maltreatment." *Child Abuse and Neglect*, 29(5), 533-551.

Lee, L-C., Kotch, J. B., & Cox, C. (2004). Child Maltreatment in Families Experiencing Domestic Violence. *Violence & Victims*, *19*, 573-591.

Leslie, L. K., Gordon, J., Ganger, W., & Gist, K. (2002). Developmental Delay in Young Children in Child Welfare by Initial Placement Type. *Infant Mental Health Journal, 23,* 496-516.

Leslie, L. K., Landsverk, J., Ezzet-Lofstrom, R., Tschann, J. M., Slymen, D. S., & Garland, A.F. (2000). Children in Foster Care: Factors Influencing Outpatient Mental Health Service Use. *Child Abuse & Neglect, 24,* 465-476.

Leslie, L. K., Landsverk, J., Horton, M. S., Ganger, W., & Newton, R. (2000). The Heterogeneity of Children and Their Experiences in Kinship Care. *Child Welfare, 79,* 315-334.

Litrownik, A. J., Newton, R., Mitchell, B. E., & Richardson, K. K. (2003). Long-Term Follow-Up of Young Children Placed in Foster Care: Subsequent Placements and Exposure to Family Violence. *Journal of Family Violence, 18,* 19-28.

Litrownik, A. J., Newton, R., Hunter, W. M., English, D. E., & Everson, M. D. (2003). Exposure to Family Violence in Young At-Risk Children: A Longitudinal Look at the Effects of Victimization and Witnessed Physical and Psychological Aggression. *Journal of Family Violence, 18,* 59-73.

Litrownik, A. J., Lau, A., English, D. J., Briggs, E., Newton, R. R., Romney, S., & Dubowitz, H. (2005). Measuring the Severity of Child Maltreatment. *Child Abuse and Neglect, 29(5),* 553-573.

Mackner, L., Black, M. M., & Starr Jr., R. H. (2003). Cognitive Development of Children in Poverty with Failure to Thrive: A Prospective Study through Age 6. *Journal of Child Psychology and Psychiatry, 44,* 743-751.

Marshall, D. B. & English, D. J. (2001). The Effect of Fathers or Father Figures on Child Behavioral Problems in Families Referred to Child Protective Services. *Child Maltreatment, 6,* 290-299.

Morrel, T. M., Dubowitz, H., Kerr, M. A., & Black, M. M. (2003). The Effect of Maternal Victimization on Children: A Cross-Informant Study. *Journal of Family Violence, 18,* 29-41.

Newton, R., Litrownik, A. J., & Landsverk, J. A. (2000). Children and Youth in Foster Care: Disentangling the Relationship between Problem Behaviors and Number of Placements. *Child Abuse & Neglect, 24,* 1363-1374.

Radhakrishna, A., Bou-Saada, I., Hunter, W., Catellier, D., & Kotch, J. B. (2001). Are Father Surrogates a Risk Factor for Child Maltreatment? *Child Maltreatment, 6,* 281-289.

Romney, S., Litrownik, A. J., Lau, A. S., Newton, R. R. (In press). The Relationship Between Child Disability and Living Arrangement in Child Welfare. *Child Welfare*.

Runyan, D. K., Curtis, P., Hunter, W. M., Black, M. M., Kotch, J. B., Bangdiwala, S., Dubowitz, H., English, D., Everson, M., & Landsverk, J. (1998). LONGSCAN: A consortium for longitudinal studies of maltreatment and the life course of children. *Aggression and Violent Behavior: A Review Journal, 3,* 275-85.

Runyan, D. K. (2000). The Ethical, Legal, and Methodological Implications of Directly Asking Children about Abuse. *Journal of Interpersonal Violence, 15,* 675-681.

Runyan, D. K., Cox, C., Dubowitz, H., Newton, R. R., Upadhaya, M., Kotch, J. B.**,** Leeb, R., Everson, M. D., & Knight, E. D. (2005). Describing maltreatment: do child protective service reports and research definitions agree? *Child Abuse and Neglect, 29,* 461-77.

Saluja, G., Kotch, J. B., & Lee L-C. (2003). Effects of child abuse and neglect: Does social capital really matter? *Archives of Pediatric and Adolescent Medicine, 157,* 681-686.

Socolar, R., Winsor, J., Hunter, W., Catellier, D., & Kotch, J. B. (1999). Maternal Disciplinary Practices in an At-Risk Population. *Archives of Pediatric and Adolescent Medicine, 153,* 927-934.

US Department of Health and Human Services, Administration on Children, Youth and Families. (2001) *Child maltreatment: 1999.* Washington, DC: US Government Printing Office.

Zolotor, A., Kotch, J. B., Dufort, V., Winsor, J., & Catellier, D. (1999) School Performance in a Longitudinal Cohort of Children at Risk of Maltreatment, *Maternal and Child Health Journal, 3,* 19-27.