

A New Paradigm for Child Protection: Begin at the Beginning

Wanda M. Hunter, MPH

The Merriam-Webster dictionary defines “protection” as the act of shielding from harm. Yet, for most of us, the words “child protection” conjure up an image of a child who has been abused or neglected, because in the United States, as in most developed countries, society does not get involved in “child protection” until maltreatment is suspected. The papers in this issue of the *North Carolina Medical Journal* consider whether it is possible to really protect children from ever experiencing abuse or neglect by their parents or other trusted caregivers. Is it possible to begin at the beginning, that is, at the time of pregnancy and birth to protect new lives and provide strong public support for the healthy upbringing of all our children?

Those of us who work in the field of child maltreatment realize that among the most important barriers to prevention are strong societal norms about family privacy and parental rights. While we may no longer believe that children are the “property” of parents to treat as they please, we do believe that children are solely the responsibility of their parents and that society should not intervene until evidence of abuse or neglect is reported.

This is when the state develops an interest in child protection because we believe that it is inappropriate to get involved until we know there is a problem. Is it possible to change this norm?

One might argue that we are already doing so. In the last 50 years, there has been a consistent move toward societal intervention to protect the physical health of pregnant mothers, infants, and children through emphases on prenatal care, screening for perinatal health problems, regular well-child visits, required immunizations, and laws stating that infants and young children must be properly restrained during vehicular transport. These policies and standards are less often viewed as intrusive and increasingly viewed as societal expectations related to assuring the well-being of pregnant women and young children.

Historically communities have informally set acceptable

standards of care for children that were communicated and enforced by extended family members and neighbors. Changes in family structure and patterns of mobility have now isolated most families from the informal helping networks that once aided parents in the care and nurture of their children, while also transmitting messages related to minimal standards of care. Yet, humanitarian and economic concerns still dictate an interest in bringing up strong and healthy children who will realize their potential and contribute to society. Preventing mental and physical health problems among children who may ultimately

“The earliest years of life are accompanied by the highest risk for physical abuse and neglect and almost all fatalities due to child maltreatment occur in the first three years of life.”

become a drain on community resources or possibly spread illness to others benefits us all. But we are not adequately protecting children or communities if we continue to address child maltreatment only after it has occurred. Preventing child maltreatment will necessitate a shift in policy toward maximizing and normalizing early assistance to parents to support family environments that nurture and protect children from physical and psychological harm.

Critical Period for Prevention

Pregnancy and early childhood are critical periods for attending to the needs of new parents and promoting the health and development of their newborns. The earliest years of

Wanda M. Hunter, MPH, is a public health consultant and an Adjunct Associate Professor of Social Medicine at the University of North Carolina School of Medicine. She can be reached at whunter@med.unc.edu or at CB#7240. Telephone: 919-929-9655.

life are accompanied by the highest risk for physical abuse and neglect, and almost all fatalities due to child maltreatment occur in the first three years of life.¹ This is also the time when the quality of care and nurturing has the greatest impact on subsequent development. Neglect and trauma experienced during the first years of life have far-reaching and often irreversible consequences.^{2,3,4} Yet, caring for infants and young children is a challenging endeavor, even for those who are well prepared. All expectant and new parents require special attention and support during the perinatal period. Some parents who are at higher risk for poor parenting will require more help. Child maltreatment and a host of other social problems could be substantially reduced if all parents were given the help they need starting during the prenatal care period and continuing for as long as the need exists.

What Do Parents Need?

Extensive research examining the impact of parenting on child health and development suggests at least four areas in which primary prevention efforts should be focused: (1) providing basic parent education about normal child development and effective childrearing strategies; (2) enhancing social support and community connectedness; (3) addressing current psychosocial risk factors, such as maternal depression, parental substance abuse, and intimate partner violence; and (4) assuring sufficient economic resources to meet the basic needs of families.

Basic parent education. Parenting practices have serious and lifelong effects on child development and well-being,⁵ but very few of us receive any training in parenting, other than what we learned in our families of origin, which runs the gamut from exceptionally good to exceptionally poor. Lack of parenting skills and knowledge about normal child development, unrealistic expectations of a child's capabilities, and ignorance of successful strategies for managing a child's behavior are all associated with child maltreatment.⁶

Social support and community connectedness. Research has shown that mothers with low social support are at higher risk of maltreating their children.^{7,8} At an ecological level, neighborhoods with high rates of maltreatment are characterized by social impoverishment, with fewer social exchanges and lower use of community resources.⁹ Social support may include close and nurturing relationships, availability of help on short notice, and participation in supportive groups.

Psychosocial risk factors. As detailed in the Issue Brief by Hughes et al.,¹⁰ research has identified a number of risk factors for poor parenting and child maltreatment that exist at every level. Maternal depression, substance abuse, and intimate partner violence are especially strong risk factors¹⁰⁻¹⁸ and the prevalence rates for these conditions during pregnancy are not insignificant. Reported depression rates in pregnant women and new mothers have been found to range from 8%-28% with poor women manifesting the higher rates;¹⁹⁻²² substance abuse rates are estimated at 11%;²³ and prevalence rates for intimate partner violence during pregnancy range from 0.9%-20%, with higher prevalence rates reported in studies where questions about violence were

asked more than once.²⁴ We know that no single risk factor results in maltreatment, but as risk factors accumulate and interact, the risk for child abuse and neglect increases.¹¹ Unfortunately, these three conditions frequently co-occur.¹⁵⁻¹⁸ Developing effective services to identify and reduce depression, substance abuse, and intimate partner violence in pregnant women and new mothers is an important prevention strategy.

Insufficient economic resources. We have long known that health problems predominate among the poor. Child maltreatment is no exception. According to the third National Incidence Study, children from low-income families (i.e., annual incomes <\$15,000) were over 22 times more likely to experience some form of abuse, as compared to children from families with annual incomes above \$30,000 per year.²⁵ Studies consistently have found child maltreatment rates to be higher among those with low education, low income, and unemployment.²⁶⁻²⁹ Factors that have appeared directly related to maltreatment (e.g., maternal depression, substance abuse, low education, single parenthood, lack of social support) are all related to poverty.³⁰ Neighborhood researchers have found that communities in which maltreated children live are seriously disadvantaged and often dangerous.³¹ State-level data confirm this relationship. A recent study examining relationships between state socioeconomic indicators and substantiated child maltreatment found a significant positive association between poverty rates and the number of substantiated child maltreatment reports, and a negative association between the generosity of state welfare benefits and state rates of neglect and foster placements.³²

Services for Expectant and New Parents

Currently we have a number of services in North Carolina to address the needs of expectant and new parents. The problem is that the best evidence-based services are not widely available, and the services that are widely available lack the resources and intensity to address the need. In addition, special efforts to address family needs during pregnancy and in the first years of a child's life are not normative and thus, may be stigmatized. For many parents, enhanced preventive services provided in routine prenatal care and well-child visits would provide the guidance and support necessary. For others, additional services delivered through home visiting and parent support groups would provide additional opportunities for developing skills and social support, while addressing parental or family problems that place children at risk. A coordinated community approach that avoids duplication of services and service gaps, while reducing the number of "providers" with which families are required to interact is ideal.

Enhanced prenatal care. Prenatal care provides an opportunity to not only monitor maternal and fetal health and prepare for childbirth and delivery, but to activate a comprehensive system of support to prepare expectant mothers and fathers for the joys and challenges of parenthood. Pregnancy is an opportune time to begin training in normal child development and parenting skills. It is not uncommon for expectant parents to enroll in prenatal classes. Most of these focus on preparing for childbirth and teaching some

very basic skills related to newborn care. Such classes could be expanded to begin basic parent training in infant development and care. For example, learning about peak periods for infant crying and practicing strategies for coping with a crying baby may give parents more confidence in facing such situations and reduce the occurrence of shaken baby syndrome. Parenting classes can address issues related to social and community support, while providing a new support network consisting of the class members themselves.

It is also important to identify and address psychosocial risks that jeopardize the pregnancy and the health and development of the newborn as a part of prenatal care. The best methods for determining the level of risk and providing expectant parents with effective treatment are still being explored, but it is clear that many pregnant mothers do not divulge such problems out of fear of being reported to some authority or deemed unfit for parenthood.³³⁻³⁴ Finally, there is the issue of how to address identified problems. Screening serves no purpose and may do more harm than good if accessible and effective treatment or support options are not readily available.

In North Carolina, some enhancements in prenatal care are being realized for the Medicaid population. The Division of Public Health (DPH) now requires that all prenatal care delivered in health departments include screening for maternal depression, substance abuse prevention, and intimate partner violence. In addition, Medicaid-reimbursed prenatal care works closely with the Maternity Care Coordination Program (a component of the Division of Public Health's Baby Love services) that provides pregnant women with case management services related to a variety of concerns, often through referrals to community services. Yet, services to address identified concerns vary widely across the state. Parenting education during the prenatal and postpartum periods, once funded by Medicaid, is no longer reimbursable. It is unknown to what extent prenatal care in the private sector is addressing psychosocial risks and the need for parenting education.

Enhanced well-child visits. Pediatric healthcare practitioners can play an important role in family support during the early years of a child's life through provision of preventive services during regularly scheduled well-child visits. Like prenatal care, primary pediatric care settings are normative health-promoting environments that all parents are expected to frequent. Yet, in a national survey more than 94% of parents reported unmet needs for parenting guidance, education, and screening in visits with pediatric clinicians.³⁵ More significantly, among a Medicaid population, only one-fifth of children received preventive and developmental services that met a basic standard of care.³⁶ Extensive modifications have been called for in well-child visits to better address identified needs for parental education and attention to psychosocial problems, as well as to perform routine developmental screenings of young children to identify problems as early as possible.³⁷ Significant, but not insurmountable, barriers exist to achieving the systemic changes that would be required to provide preventive care services that address more than childhood diseases. A recent UNC School of Medicine project, Linkages for Prevention, demonstrated that system-level changes in pediatric preventive care, which included family-level interventions and improved links to other community

services, are achievable and result in positive family outcomes.³⁸

North Carolina is fortunate to have the benefit of the Linkages project and two additional innovative ventures into improved delivery of preventive pediatric services: the Assuring Better Child Health and Development (ABCD) Project and Healthy Steps.

ABCD, a Medicaid-based program that was first piloted in Guilford County, is structured to address the health, social, and developmental needs of children through five components: (1) routine developmental screening, (2) teaching parents about healthy development, (3) identifying and responding to family concerns, (4) securing local community involvement in the delivery of developmental services, and (5) integrating services to assure the best use of resources.³⁹ An early intervention specialist supplements the work of the healthcare providers by conducting home visits to address family concerns and needs for parent education. ABCD is gradually spreading across the state as practices incrementally add components of the model. Medicaid now requires developmental screenings for all pediatric patients and is piloting maternal depression screening in some of its networks.⁴⁰

Healthy Steps, another promising program being implemented in pediatric practices in 14 states, incorporates preventive, developmental, and behavioral sciences into well-child care for children from birth to age three.⁴¹ Similar to Linkages and ABCD, Healthy Steps supplements pediatric practice with a child development specialist to assist with monitoring development and responding to parental concerns. Healthy Steps sites in North Carolina are in Chapel Hill and Lumberton. Significantly, Healthy Steps is also attempting to change pediatric practice through medical education. The Healthy Steps Residency Training program is now being implemented in all four North Carolina medical schools.

Home visiting programs. Home visitation has emerged as one of the most promising strategies for preventing child maltreatment and other poor family outcomes.^{42,43} Regular visits to the home provide an opportunity to learn about family's day-to-day functioning, cultural beliefs and affiliations, strengths, and problems. Furthermore, many families feel more comfortable and empowered in their own homes than in clinic or office settings.

A number of home visiting models have been developed and tested with varying results. Models, such as the Nurse-Family Partnership Program⁴⁴ and Project SafeCare^{45,46} that have demonstrated success in reducing poor maternal and child outcomes, including child maltreatment, tend to be more intense (in terms of frequency of visits and program duration) with well-trained personnel and structured protocols for developing parenting strengths, building social support, and addressing risks. Fidelity to implementation standards can be crucial to success. In addition, tailored approaches to link the most high-risk families with specific services or treatment plans may be necessary. The absence of successful strategies to identify and address mental illness, substance abuse, and domestic violence have been shown to undermine efforts to reduce child maltreatment.^{47,48}

Home visiting programs, scattered throughout the state, comprise a number of different models. The only current Nurse-Family Partnership program is in Guilford County. There are a number of Healthy Families programs, a paraprofessional-based model that aims to prevent child abuse and neglect by improving family functioning, in general, and parenting, in particular. Programs are given flexibility in service delivery and evaluation results have been mixed.⁴⁹⁻⁵²

Parents As Teachers, another model that is being utilized in multiple sites throughout the state, serves parents from the pre-natal period until age five, and includes the prevention of child maltreatment as one of its goals. While this program has demonstrated success in increasing parent knowledge and child school readiness, its impact on preventing child maltreatment remains unevaluated.⁵³

The Divisions of Public Health and Medical Assistance of the North Carolina Department of Health and Human Services sponsor two statewide case management programs that incorporate some home visiting. Baby Love, developed to improve birth outcomes, and the Child Service Coordination Program, developed to improve child health and development outcomes, serve Medicaid-eligible families in every county. Aside from infant mortality, specific outcome indicators have not been identified or monitored, so it is difficult to know which needs are being successfully addressed and how. But training is minimal, case loads are large, and contact hours with families are restricted to one hour and a half per month. Furthermore, community resources to which families can be referred are scant in many areas of the state. This is especially true for mental health and substance abuse services. Enhancements to the Baby Love and Child Service Coordination programs are being tested in some counties.

Parenting education and support programs. Parenting education programs, often directed at populations considered at risk for child abuse and neglect, generally aim to teach normal child development, positive strategies for parent-child interaction, including child discipline techniques and how to access community supports. These programs are offered to individual parents or groups of parents, in a variety of settings, including home visits, clinic visits, or in the community. Some parenting programs focus more on the provision of mutual support, especially as relates to parenting challenges. Evidence that group-based parent training programs can improve the psychosocial health of the mother, including reductions in depression,⁵⁴ suggests that these programs may provide effective social support while increasing knowledge and skills. Following is a list of well-known examples of parenting programs that have demonstrated some effectiveness in preventing child abuse and neglect.

- Parents As Teachers is an early childhood family support and parenting education program that is delivered through home visits beginning in the prenatal period and extending until the child reaches age five.
- The Nurturing Program, a parenting education and support program, targets families who have been reported for child maltreatment or who are considered at high risk. The

Nurturing Program tends to be offered more for parents who have already been reported to the Child Protective Service system.

- The Triple-P or Positive Parenting Program was developed as a universal parenting program with multiple levels that provide increasing amounts of skill-development tailored to need. This program, which aims to prevent poor outcomes

“With state leadership, communities can again become invested in the welfare of their youngest residents through enhanced pre-natal care, well-child visits, and other available services that provide parents with the training, resources, and support they need to nurture their children and to prevent child maltreatment from ever occurring.”

in children by enhancing the knowledge, skills, and confidence of parents, is currently being tested and evaluated at the University of South Carolina.

- Parents Anonymous is a parent mutual support program available weekly on a drop-in basis. The focus is to transform attitudes, learn behaviors, and create long-term positive changes in families.
- The Circle of Parents® Program is another mutual support program that is described elsewhere in this issue.⁵⁵

Parenting programs are proliferating across North Carolina, but are not yet universally available or normative for all parents. The North Carolina Parenting Education Network (NCPEN), an unfunded collaborative of parenting education organizations and agencies, is working to credential and build the field of parenting education in North Carolina.

Economic and workplace policies. Community-based services for all new and expectant parents are important aspects of child

maltreatment prevention. Yet, even when such services are available and affordable, they may still be underutilized by the families that most need them. Impoverished families that are at the highest risk of maltreatment²⁶⁻²⁹ struggle with unmet needs for adequate education, employment, income, housing, transportation, and healthcare. These day-to-day struggles to meet basic needs may make it difficult to prioritize participation in programs or to use proffered services even when they are free. Public responsibility for supporting families must also consider the relationship between economic resources, economic policies, and poor parenting, especially in the current context of welfare reform.²⁹ Welfare-to-work agendas may need to be adjusted to ensure that families are able to obtain the help and support they need, while also ensuring that the family is able to manage economically. Job readiness programs could also work to connect these families with each other to foster the creation of new and positive social networks.

Also important are workplace policies that support families by allowing sufficient parental leave following the birth of a baby to support bonding and optimal nurturing for the newborn, time off for healthcare visits and participation in parenting programs, flex time to accommodate family needs, and leave to attend to sick children and family emergencies. Support for families through workplace policies has been found to benefit families and employers, but never considered specifically in relation to preventing child maltreatment. Ironically, family-friendly workplace policies in North Carolina tend to be concentrated in higher-wage businesses or institutions, and not available to low-wage employees who need them most. With the vast majority of parents now employed outside the home, the workplace must be considered a crucial partner in changing norms related to child protection.

Discussion

States have an important role to play in preventing child maltreatment. Through systemic changes in the way normative services, such as prenatal care and well-child care, are delivered, expectations about the types of support and community involvement that parents need in caring for their children will gradually change. In North Carolina, we are making in-roads into these systems, especially for Medicaid patients. This is good news, because these patients are at highest risk, and Medicaid-reimbursed services address the socioeconomic disparities in the availability of resources. It is important, however, that these changes in service delivery become universal to decrease the stigma that can be attached to being screened and referred, and because a significant proportion of non-Medicaid patients will also require additional assistance with parenting or with psychosocial problems. Careful screening beginning in pregnancy and repeated periodically in well-child visits, followed by titrated services where the type and amount of service are tailored to the need, should be available for all expectant and new parents. Special populations of expectant and new parents who are known to be at higher risk (e.g. adolescents) will require more intense services.

Another societal norm—not addressed in this paper, but deserving of attention—is that interventions designed to improve pregnancy, birth, and child rearing outcomes should be directed only to pregnant women and mothers. From pregnancy onward, women are considered to be the primary caretakers of children and by default, the primary ones to blame for child maltreatment, despite evidence that fathers play important roles both as protectors and offenders.^{56,57} Public interest in fostering fathers' involvement is increasing because of the recognized benefits of fathers' contributions to their families.⁵⁸ Teenaged and young adult males may need extra help to assume the full fatherhood role, but many, if aided, will work hard to be successful parents. As we begin to change norms related to society's role in preparing and supporting young parents, we may need programs that are targeted to males or that are explicitly tailored for fathers as well as mothers.

State investments in prevention have been shown to result in savings in terms of avoiding lost earning potential and the medical, mental health, educational, welfare, and criminal justice costs associated with child maltreatment. In a study conducted by the Michigan Children's Trust Fund, costs of providing preventive services to all first-time parents were compared to costs expended for child abuse and neglect treatment, with the conclusion that "investments in prevention can be cost-effective if they result in even modest reductions in abuse events."⁵⁹ Similarly, the state of Washington conducted an analysis of early intervention programs and found that some programs (e.g., Nurse-Family Partnership Home Visiting and Parents as Teachers) give taxpayers a good return on their dollar, while other programs fail to generate more benefits than costs. The authors caution that states should not only track program objectives and results, but assure quality control, through program monitoring and implementation fidelity to evidence-based models.⁶⁰

There is substantial commitment to the prevention of child maltreatment in North Carolina, as demonstrated by the number of public and private programs for expectant and new parents that are currently being implemented across the state. Guided by the North Carolina Institute of Medicine Task Force plan,⁶¹ we can move closer to a real state-wide comprehensive, coordinated approach that is based on scientific evidence about successful approaches to prevention. Normalizing the concept of family support may require public awareness efforts concerning the importance of parenting, especially during the early years, as well as changes in service delivery to accommodate the needs of all new parents. With state leadership, communities can again become invested in the welfare of their youngest residents through enhanced pre-natal care, well-child visits, and other available services that provide parents with the training, resources, and support they need to nurture their children and to prevent child maltreatment from ever occurring. **NCMedJ**

Acknowledgments: Gratitude is expressed to the following persons who provided information about current programs in North Carolina: Vienna Barger, MSW, Baby Love Program Manager; Marian Earls, MD, FAAP, Medical Director of Guilford Child Health; Michelle Hughes, MA, MSW, Vice-President of Program

REFERENCES

- 1 US Department of Health and Human Services, Children's Bureau. Child maltreatment 2002. Washington, DC: US Government Printing Office. 2004.
- 2 Guterman NB. Early prevention of physical child abuse and neglect: Existing evidence and future directions. *Child Maltreat* 1997;2:12-34.
- 3 Wekerle C, Wolfe DA. Prevention of child physical abuse and neglect. *Clin Psych Rev* 1993;13:501-540.
- 4 Cicchetti D. How research on child maltreatment has informed the study of child development: Perspectives from developmental psychology. In Cicchetti D, Carlson V (eds). *Child Maltreatment: Theory and Research on the Causes and Consequences of Child Abuse and Neglect*. New York, NY: Cambridge University Press. 1990:377-421.
- 5 Landry SH, Smith KE, Swank PR. The importance of parenting during early childhood for school-age development. *Dev Neuropsychol* 2003;24:559-591.
- 6 Daro D, McCurdy K. Preventing child abuse and neglect: Programmatic considerations. *Child Welfare* 1994;73:405-430.
- 7 Kotch JB, Browne DC, Dufort V, Winsor J, Catellier D. Predicting child maltreatment in the first 4 years of life from characteristics assessed in the neonatal period. *Child Abuse Negl* 1999;23:305-319.
- 8 Cooley C. Spotlight on practice child maltreatment: Testing the social isolation hypothesis. *Child Abuse Negl* 1996;20:241-254.
- 9 Garbarino J, Sherman D. High risk neighborhoods and high risk families: The human ecology of child maltreatment. *Child Dev* 1980;51:188-189.
- 10 Hughes M, et al. Preventing child maltreatment in North Carolina: New directions for supporting families and children. *NC Med J* 2005;66(5):343-359.
- 11 Brown J, Cohen P, Johnson JG, Salsinger S. A longitudinal analysis of risk factors for child maltreatment: Findings of a 17-year prospective study of officially recorded and self-reported child abuse and neglect. *Child Abuse Negl* 1998;22:1065-1078.
- 12 Chaffin M, Kelleher K, Hollenberg, J. Onset of physical abuse and neglect: Psychiatric, substance abuse, and social risk factors from prospective community data. *Child Abuse Negl* 1996;20:191-203.
- 13 Edleson JL. The overlap between child maltreatment and woman battering. *Violence Against Women* 1999;5:134-154.
- 14 Johnson JL, Leff M (1999). Children of substance abusers: Overview of research findings. *Pediatrics* 1999;103:1085-1099.
- 15 Amaro H, Fried LE, Cabral H, Zuckerman B. Violence during pregnancy and substance use. *AJPH* 1990;80:575-579.
- 16 Barnett B, Duggan AK, Wilson MD, Joffe A. Association between post-partum substance use and depressive symptoms, stress, and social support in adolescent mothers. *Pediatrics* 2000;96:659-666.
- 17 Hans SL, Bernstein VJ, Henson LG. The role of psychopathology in the parenting of drug dependent women. *Dev Psychopathology* 1999;11:957-977.
- 18 Swartz MS, Swanson JW, Hiday VA, Borum R, Wagner HR, Burns BJ. Violence and severe mental illness: The effects of substance abuse and non-adherence to medication. *Am J Psychiatry* 1998;155:226-231.
- 19 Bruce ML, Takeuchi DT, Leaf PJ. Poverty and psychiatric status. *Arch Gen Psychiatr* 1991;48:470-474.
- 20 Campbell SB, Cohn JF. Prevalence and correlates of postpartum depression in first-time mothers. *J Abnorm Psychol* 1991;100:594-599.
- 21 Campbell SB, Cohn JF, Meyers, TA. Depression in first-time mothers: Mother infant interaction and depression chronicity. *Dev Psychol* 1995;31:349-357.
- 22 Hobfoll SE, Ritter C, Lavin J, Hulsizer MR, Cameron R. Depression prevalence and incidence among inner-city pregnant and postpartum women. *J Consult Clin Psych* 1995;63:445-453.
- 23 Blau GM, Whewell MC, Gullotta TP, Bloom M. The prevention and treatment of child abuse in the households of substance abusers: A research demonstration progress report. *Child Welfare* 1994;73:405-430.
- 24 Gazmararian JA, Lazorick S, Spitz AM, Ballard, TJ, Saltzman LE, Marks JS. Prevalence of violence against pregnant women. *JAMA* 1996;277:1915-1920.
- 25 Sedlak A, Broadhurst D. Third National Incidence Study of Child Abuse and Neglect. Washington, DC: US Department of Health and Human Services. 1996.
- 26 Aber L. Poverty, violence, and child development: Untangling family and community level effects. In Nelson CA (ed.) *Threats to optimal development: Integrating biological, psychological, and social risk factors*. The Minnesota Symposium on Child Psychology, Vol. 27. Hillsdale, NJ: Erlbaum. 1994:229-272.
- 27 Hampton R, Newberger E. Child abuse incidence and reporting by hospitals: Significance of severity by class and race. *AJPH* 1985;75:56-60.
- 28 Pelton L. The Role of Material Factors in Child Abuse and Neglect. In Melton G, Barry F (eds). *Protecting Children from Abuse and Neglect*. New York, NY: Guilford Press. 1994:131-181.
- 29 Berger LM. Income, family characteristics, and physical violence toward children. *Child Abuse Negl* 2005;29:107-133.
- 30 Bradley RH, Corwyn RF. Socioeconomic status and child development. *Annual Review of Psychology* 2002;53:371-399.
- 31 Coulton CJ, Korbin JE, Su M. Neighborhoods and child maltreatment: A multi-level study. *Child Abuse Negl* 1999;23:1019-1040.
- 32 Paxon C, Waldfogel .Work, welfare, and child maltreatment. *J Labor Econ* 2002;20:435-474.
- 33 Dowd MD, Kennedy C, Knapp JF, Stallbaumer-Rouger J. Mothers' and health providers' perspectives on screening for intimate partner violence in a pediatric emergency department. *Arch Pediatr Adolesc Med* 2003;156:794-799.
- 34 Heneghan AM, Mercer M, DeLone NL. Will mothers discuss parenting stress and depressive symptoms with their child's pediatrician? *Pediatrics* 2004;113:460-467.
- 35 Bethell C, Reuland CP, Halfon, N, Schor EL. Measuring the quality of preventive and developmental services for young children: National estimates and patterns of clinicians' performance. *Pediatrics* 2004;113(suppl):1973-1983.
- 36 Bethell, C, Peck C, Abrams M, Halfon N, Sareen H, Collins KS. Partnering With Parents to Promote the Healthy Development of Children Enrolled in Medicaid. New York, NY: The Commonwealth Fund; 2002.
- 37 Schor EL. Rethinking well-child care. *Pediatrics* 2004;114:210-216.
- 38 Margolis P, Stevens R, Bordley WC, et al. From concept to application: The impact of a community-wide intervention to improve the delivery of preventive services to children.

- Pediatrics 2003;108:e42.
- 39 Pelletier H, Abrams M. The North Carolina ABCD Project: A New Approach for Providing Developmental Services in Primary Care Practice. Portland, ME: National Academy for State Health Policy, 2002. Available at: http://nashp.org/_docdisp_page.cfm?LID=5D118FB2-A2E8-11D6-BD1700A0CC76FF4C. Accessed July 27, 2005.
 - 40 Earls M. The Role of Primary Healthcare Providers in Preventing Child Maltreatment. *NC Med J* 2005;66(5):370-372.
 - 41 Minkovitz CS, Hughart N, Strobino D, et al. A practice-based intervention to enhance quality of care in the first 3 years of life: the Healthy Steps for Young Children Program. *JAMA* 2003;290:3081-3091.
 - 42 Guterman NB. Enrollment strategies in early home visitation to prevent physical child abuse and neglect and the "universal versus targeted" debate: A meta-analysis of population-based and screening-based programs. *Child Abuse Negl* 1999; 23:863-890.
 - 43 MacLeod J, Nelson G. Programs for the promotion of family wellness and the prevention of maltreatment: A meta-analytic review. *Child Abuse Negl* 2000;9:1127-1149.
 - 44 Olds DL, Eckenrode J, Henderson CR et al. Long-term effects of home visitation on maternal life course and child abuse and neglect. Fifteen-year follow-up of a randomized trial. *JAMA* 1997;278:637-643.
 - 45 Lutzker JR, Bigelow KM, Doctor RM, Kessler ML. Safety, health care, and bonding within an ecobehavioral approach to treating and preventing child abuse and neglect. *J FamViolence* 1998;13:163-185.
 - 46 Lutzker JR, Rice JM. Using recidivism data to evaluate Project 12-Ways: an ecobehavioral approach to the treatment and prevention of child abuse and neglect. *J FamViolence* 1987;2:283-290.
 - 47 Duggan A, Fuddy L, Burrell L. et al. Randomized trial of a statewide home visiting program to prevent child abuse: Impact in reducing parental risk factors *Child Abuse Negl* 2004;28:623-643.
 - 48 Eckenrode J, Ganzel B, Henderson CR, et al. Preventing child abuse and neglect with a program of nurse home visitation: The limiting effects of domestic violence. *JAMA* 2000;284:1385-1391.
 - 49 Daro D, McCurdy K, Harding K. The role of home visiting in preventing child abuse: An evaluation of the Hawaii Healthy Start Program. Chicago, IL: National Committee to Prevent Child Abuse, 1998.
 - 50 Duggan A, McFarlane E, Windham AM, et al. Evaluation of Hawaii's Healthy Start Program. *The Future of Children* 1999;9:66-90.
 - 51 Duggan A, McFarlane E, Fuddy L et al. Randomized trial of a statewide home visiting program: Impact in preventing child abuse and neglect. *Child Abuse Negl* 2004;28:597-622.
 - 52 Duggan A, Windham A, McFarlane E, et al. Hawaii's Healthy Start Program of home visiting for at risk families: Evaluation of family identification, family engagement and service delivery. *Pediatrics* 2000;105:250-259.
 - 53 Constantino JN, Hashemi N, Solis E, et al. Supplementation of urban home visitation with a series of group meetings for parents and infants: Results of a 'real-world' randomized, controlled trial. *Child Abuse Negl* 2001;25:1571-1581.
 - 54 Barlow J, Coren E. Parent-training programmes for improving maternal psychosocial health. *Cochrane Database Syst Rev* 2004;1:CD002020.
 - 55 Gay K. The Circle of Parents Program: Increasing Social Support for Parents and Caregivers. *NC Med J* 2005;66(5):386-388.
 - 56 Johnson D. Father presence matters: A review of the literature 1999. Philadelphia, PA: University of Pennsylvania, Center on Fathers and Families. Available at <http://www.ncoff.gse.upenn.edu/litrev/fpmlr.htm>. Accessed September 12, 2005.
 - 57 Daniel B, Taylor J. The rhetoric versus the reality: A critical perspective on practice with fathers in child care and protection work. *Child Fam Social Work* 1999;4:209-220.
 - 58 US Department of Health and Human Services. The Fatherhood Initiative. Available on-line at <http://fatherhood.hhs.gov/index.shtml>. Accessed August 22, 2005.
 - 59 Caldwell, RA. The costs of child abuse vs. child abuse prevention: Michigan's experience. Michigan Children's Trust Fund and Michigan State University, 1992. Available on-line at http://www.preventchildabuse.org/learn_more/research_docs/cost_analysis.pdf. Accessed on August 23, 2005.
 - 60 Aos S, Lieb R, Mayfield, J, Miller M, Pennucci A. benefits and costs of prevention and early intervention programs for youth. Olympia, WA: Washington State Institute for Public Policy, 2004. Available on-line at <http://www.wsipp.wa.gov/rptfiles/04-07-3901a.pdf>. Accessed August 22, 2005.
 - 61 North Carolina Institute of Medicine Task Force on Preventing Child Maltreatment Report: 2005. North Carolina Institute of Medicine and Durham, NC. 2005.

Information and Support
Within Your Reach

1-800-367-2229

NC Family Health Resource Line

NC Child Care Health and Safety Resource Center
 Services in English and Spanish
 Monday – Friday, 8 am – 5 pm (closed on holidays)
 TTY for the hearing impaired: 1-800-976-1922