



Healthy Generations

Maternal & Child Health Program
School of Public Health

School Environment
and Health

UNIVERSITY OF MINNESOTA

Volume 6: Issue 1
June 2005

The School Environment and Health: Public Health Challenges and Achievements

Inside this Issue:

- 3 Bullying in Schools
- 5 Relational Aggression
- 5 Olweus Bullying Prevention Program
- 6 School-Based Interventions
- 8 Working in Schools
- 9 MN Youth Community Learning Initiative
- 10 Narrow Focus of No Child Left Behind
- 11 ND Contemplates Measuring Height & Weight
- 13 Sex Ed for Disabled Students
- 15 Working with the Legislature to Promote Teen Sexual Health

Jeanne Rogge Steele, PhD
Guest Editor

America's public schools are a microcosm of American society. They reflect the complex interplay of diverse ideals, ideologies and resources—individual and societal—that our forefathers hoped would meld into a world where “life, liberty and the pursuit of happiness” would be equally accessible to all. From John Dewey to George W. Bush, education has been seen as the cornerstone of democracy. But unlike most cornerstones, the school environment is anything but immovable, strong and capable of carrying heavy weights. On the contrary, the school environment today often seems fragile, ever-changing and besieged by a host of external and internal pressures.

During the three-plus months it took to pull together this issue of *Healthy Generations*, news headlines called attention to school shootings in Red Lake, Minnesota, unsupported school proposals at the Capitol, the shortage of school counselors, tense



times in school hallways, and too many students left behind. Rounding out this bleak picture were articles about intolerance of new immigrants, cutbacks in school funding, a kindergartner killed by a school bus, increases in childhood obesity accompanied by decreases in physical education time for students, and a Feb 21 *Time Magazine* cover story about “pushy dads, hovering moms, and parents who don't show up at all.”

Continued on page 2

There are more than 54 million children in K-12 schools in the United States. The school environment is complex, filled with multiple activities, people, and experiences. The curriculum—and the physical and social environments of a school—have a tremendous impact on the health of children. While there are many debates about curriculum content, they are generally fueled by a commitment to nurture youth and encourage an intellectual curiosity that will sustain a productive adulthood. The physical attributes of a school matter because children are susceptible to environmental risk factors. They need an environmentally clean, safe, and well designed setting in which to learn. The social environment is critical because children spend most of their non-home time at school. A school with a positive climate and culture can foster school connectedness, which in turn may be related to health behaviors and academic achievement. It is also often in the school setting that students develop social competency and initiate emotionally sustaining relationships with non-family members.

In this issue of *Healthy Generations* we attempt to describe some of the multiple influences that contribute to creating and sustaining a healthy school environment. Dedicated schoolteachers, administrators, nurses, and counselors are the heart of any school. Vibrant schools also depend upon engaged students, involved families, effective administrators, compassionate politicians, innovative child health researchers, creative public health workers, insightful curriculum development experts, and informed school board members. This investment of so many people is warranted, given the value we should place on the health and safety of our youth.

We hope you enjoy this issue and that we have conveyed our respect for the many programs and people featured in it. We were fortunate to have a talented and dedicated guest editor for this volume, Dr. Jeanne Steele. Our collaboration with her has stimulated many MCH faculty, staff, and students to think more deeply about the school environment and to reflect on our ongoing commitment to foster productive and enriching experiences for children and youth.

Wendy L. Hellerstedt, MPH, PhD

Back Page:

Promoting Healthy Communities
for Children
September 26-27, 2005

www.epi.umn.edu/mch

However, the news is certainly not all negative. Other headlines point to declines in drug use, crime and teen pregnancy among students, later school start times for teens whom studies show need more sleep, consideration of a statewide anti-bullying policy, healthier school lunches, and two top teacher finalists in Minnesota who share a love for children and education.

The purpose for citing these headlines is not to ask readers to do the calculus between positive and negative school news, nor to point out that the positive headlines owe much to public health interventions. Rather, it is to underscore the varied and complex factors that lie behind each of these school-related stories.

A variety of stakeholders take an interest in the school environment and health. They include parents, students, principals, teachers, school nurses, counselors, coaches, school volunteers, school board members, legislators, health-care practitioners, and public health educators and researchers. The individual self-interests of these stakeholders compete with mind-boggling systemic pressures.

Take the case of urban school principals who, in any one day, are besieged by demands that can range from shoring up a leaky roof to meeting with faculty who have just received notice that their contracts will not be renewed for the coming year. Or, consider the demands on school nurses who are responsible for the daily health needs of literally hundreds of students and staff. Most often working alone, school nurses are expected to provide direct health care (e.g., check blood sugar levels of children with diabetes, hand out medications, test vision and hearing); coordinate homework and homebound requests for students with medical reasons for being out of school; give first aid to students injured on the playground, during gym class, playing sports or in a fight; advocate for—and enforce—compliance with immunization laws; and meet with committees about attendance, crisis response, school safety, and Individual Education Plans. The list of responsibilities is long; the case load incredibly large. The nurse at one St. Paul high school is responsible for 2100+ students. The National Association of School Nurses (NASN) recommends a school nurse-to-student ratio of 1:750!

Because the school environment is so complex, it is tempting to tackle the challenges of physical health, mental health, nutrition, physical exercise, air quality and safety in a piecemeal fashion. And, it is equally tempting to believe that the various stakeholders operate in a vacuum. But, as *Healthy People 2010* makes clear, such a narrow view is incapable of producing change and fails to recognize the broader realities school personnel deal with on a daily basis.

Public health can exert a positive influence on the quality of the school environment—and the promotion of healthy youth development—by addressing problems through the ecological view espoused by the Institute of Medicine. This view assumes that “health and well being are affected by interaction among multiple determinants including biology, behavior, and the environment.” Some school districts have adopted such an orientation. For example, MCH student Bree Richards talks with pride about the school-based initiative her rural school district

(Morris (MN) Area Independent School District #769) launched in 1971. Called the Healthy Communities/Healthy Youth Initiative, its mission is: “To mobilize the entire community to provide developmental assets to every child and young adult in Stevens County.” (www.morris.k12.mn.us/commed/pages/hchy.html) With help from Morris area educators, city officials, Jaycees, Kiwanians, and other community members, this rural farming community has built an array of school and community services for residents of all ages and in all walks of life. Its Early Childhood Family Education program focuses on parent education for families of infants through pre-kindergarten. The Learning is Fun Preschool and School Readiness programs target families of young children to help ensure that all children are ready to learn when they enter kindergarten. The Youth Development/Youth Service program helps middle-school and high-school students develop to their full potential as leaders and learners, and the Adult Basic Education program helps adults 18 and older achieve their educational goals. An active

School Volunteer Program and widely supported recreational opportunities, including a Regional Fitness Center, round out the picture.

The Iowa Department of Education, with help from the Iowa Collaboration for Youth Development Steering Committee, has taken an even more ambitious approach. The Department has adopted a statewide plan to strengthen “systems of supports” for development and learning. “Safe, healthy, and caring learning environments...that create the psychologi-

cal and physical settings needed for teachers to provide quality instruction and for students to take full advantage of that instruction” figure prominently in the plan. Importantly, the plan also emphasizes the need to view children and youth as *partners* in the process of creating such environments.

Understanding the association between the school environment and health sheds light on tremendous public health challenges coupled with laudable achievements. The terrain is rocky, but fascinating. “It burns a hole in you,” Sharon Eichten, a long-time high school principal now serving as Principal on Special Assignment for St. Paul Public Schools special education programs, said about her reaction to the Red Lake shootings. But then she explained what keeps educators going: “We all hold each other up,” she said. “Either you choose to live in fear, or you can choose to live in hope.” Her philosophy is a fitting umbrella for this *Healthy Generations* issue on the school environment and health.

Dr. Steele holds a PhD in Mass Communication Research from the School of Journalism and Mass Communication, University of North Carolina, Chapel Hill. She will begin a post-doctoral fellowship in Pediatric Cancer Epidemiology at the University of Minnesota in June 2005. Earlier in her career, she served as statewide education writer for The Bangor Daily News, Maine’s second largest daily newspaper.



Bullying in Schools: Definition, Prevalence, and Prevention Strategies



Marla Eisenberg, ScD, MPH and Elizabeth Radel, BA

Increasingly recognized as an important issue in school health, bullying caught the attention of the nation in the wake of the March 2005 school shootings in Red Lake, Minnesota. Print and televised news coverage—from the *New York Times* to CNN—examined how bullying might have contributed to school violence in this case and others. One lesson from this tragedy is that society urgently needs to address the issue of youth bullying.

Bullying Defined

Peer harassment or victimization is behavior that has three specific attributes: 1) it is aggressive or intended to harm; 2) it is carried out repeatedly and over time; and 3) it occurs in an interpersonal relationship where a power imbalance exists.¹ This definition encompasses physical or verbal attacks and aggression (direct bullying) as well as threats to social connections and relationships (indirect or relational bullying). Although boys and girls participate in both forms of bullying behavior, boys are more likely to be involved in direct bullying and girls are more likely to be involved in relational bullying.

Prevalence of Bullying

Only a small number of studies have examined the prevalence and scope of bullying in our nation's schools. In one of the most complete studies, Nansel et al. examined data from a 1998 survey of more than 15,000 sixth- to tenth-grade students enrolled in public and private schools in the United States. They found that 30% of the students surveyed were involved in moderate or frequent bullying: 13% as a bully, 11% as a target of bullying, and 6% as both a bully and a target of bullying.² The U.S. Department of Justice also collects self-report data on bullying for its "Indicators of Crime and Safety" publication. In 2003, 7.2% of 12- to 18-year olds surveyed reported having been bullied at school in the previous six months.³

Characteristics of Bullying Targets and Aggressors

Boys are more likely than girls to report being a target or aggressor of bullying and younger students are more likely to report being a target of bullying than older students.^{2,3} Children are more likely to be targets of bullying when they are seen as physically weaker or as having fewer friends than their peers.⁴⁻⁶ Lesbian, gay, and bisexual youth are more likely to be bullied than heterosexual youth.⁷ Overweight and obese youth, especially girls, are more likely to be victimized than their normal-weight peers.⁸ Youth from rural areas are more likely to report ever being an aggressor of bullying than their urban and suburban counterparts.² Aggressors of bullying also are more likely to have conduct problems⁹ and to be involved in violent behaviors including weapon carrying and frequent fighting.

Environmental Factors Associated with Bullying

Bullying occurs in environments where aggression and victimization are considered "normal"—whether at home, with friends, or in school.¹¹⁻¹³ Childhood experiences with aggression, such as physical discipline (e.g., spanking, inconsistent punishment, family violence, victimization by siblings, paternal bullying) are positively associated with bullying.^{10,11,14,15} Other family characteristics associated with bullying include low family cohesion, low parental warmth and involvement, and single-parent households.¹⁶⁻²⁰ Youth with positive adult role models are less likely to engage in bullying.¹¹

Consequences of Bullying

Bullying is associated with short-term and longer-term effects on the psychological and physical well-being of victims. Compared with those not involved in bullying, victims show increased rates of depression, suicidal intention, and loneliness;^{2,21} decreased rates of academic success measured by lower grades, disliking school, and increased absenteeism;^{22,23} and increased rates of violent behaviors.²⁴ The effects of being bullied linger even after the period of victimization has ended. Studies have shown that being bullied in middle adolescence predicts poorer physical health in later adolescence²⁵ and lower self-esteem and higher depressive symptoms in young adulthood.²⁶ Being an aggressor is also associated with increased psychological problems. Bullies are more likely to have conduct problems and experience depression compared with those not involved in bullying.⁹ Bullies are also more likely to be involved in violent behaviors later in life.²⁷

Nansel et al. note that 6% of students are both targets and aggressors of bullying.² This population may be at especially high risk for the negative effects of bullying.^{28,29}

What Can be Done to Prevent Bullying Behavior in Schools?

The best way to avoid the negative consequences of bullying (for targets and aggressors) is to prevent bullying from ever occurring. Comprehensive school-based interventions are one important way that this issue is addressed nationwide. These interventions aim to change the school environment so that bullying is not considered an acceptable behavior.

In March 2004, a nationwide bullying campaign aimed at middle-school students was launched by the Health Resources and Service Administration (HRSA) of the U.S. Department of Health and Human Services. "Take a Stand. Lend a Hand. Stop Bullying Now!" aims to teach Americans ways to prevent bullying and youth violence.³⁰ Two websites—one for adolescents, the other for adults—are key campaign components. The website for adolescents is an interactive site that features games and regularly updated "webisodes" that teach ways young people can prevent and deal with bullying. The site for adults features a number of resources on how families, teachers, the media, and community groups can work to prevent bullying. Both websites can be accessed at: <http://www.stopbullyingnow.hrsa.gov>.

People who work with youth have unique opportunities to help reduce bullying and its negative consequences. However, other concerned citizens also can play an important role. In their 2005 article

Continued on page 4

in the *Journal of Adolescent Health*, Eisenberg and Aalsma outline the Society for Adolescent Medicine's (SAM) positions on bullying:

- Bullying may be a common behavior, but it is not an acceptable social behavior. Simple awareness of this fact is one of the first steps to prevent bullying among youth.
- Adults who work with youth can help prevent bullying. Health care providers should know the characteristics of bullying targets and along with school personnel, they should provide leadership and education to students, parents, and community members. Community organizations that serve youth should incorporate anti-bullying messages in their programs.
- SAM endorses HRSA's National Bullying Prevention Campaign goals of reducing bullying behaviors, identifying interventions for pre-teens, and fostering relationships between education, public health, and other disciplines.
- More rigorous research on bullying and victimization is needed to inform prevention and intervention efforts. It is unknown how long the effects of bullying persist; consequently, longitudinal research is needed to evaluate long-term social, psychological, and health effects.

To create more effective school-based intervention programs, Eisenberg and Aalsma call for research to determine which components of existing programs have been most effective for communities, schools, and individuals. Additionally, they suggest that more research on the bio-psychosocial characteristics of bullies and the social contexts in which bullying occurs may help to create better prevention programs.

References

1. Eisenberg ME, Aalsma MC. Bullying and peer victimization: Position paper of the Society for Adolescent Medicine. *J Adolesc Health* 2005;36:88-91.
2. Nansel TR, Overpeck M, Pilla RS, Ruan WJ, Simons-Morton BG. Bullying behavior among the U.S. youth: Prevalence and association with psychological adjustment. *JAMA* 2001;285:2094-100.
3. US Department of Justice, Bureau of Justice Statistics, School Crime Supplement (SCS) to the National Crime Victimization Survey, 1999, 2001, and 2003. Available from: URL:http://nces.ed.gov/pubs2005/crime_safe04/tables.asp. Accessed 5/16/05.
4. Olweus D. *Bullying at school: what we know and what we can do*. Oxford: Blackwell; 1993.
5. Pellegrini AD. The rough play of adolescent boys of differing sociometric status. *Int J Behav Dev* 1994;17:525-40.
6. Perry DG, Kusel SJ, Perry LC. Victims of peer aggression. *Dev Psychol* 1988;24:807-14.
7. Garofalo R, Wolf RC, Kessel S, Palfrey SJ, DuRant RH. The association between health risk behaviors and sexual orientation among a school-based sample of adolescents. *Pediatrics* 1998;101:895-902.
8. Janssen I, Craig WM, Boyce WF, Pickett W. Associations between overweight and obesity with bullying behaviors in school-aged children. *Pediatrics* 2004;113:1187-94.
9. Junger-Tas J, Van Kesteren J. *Bullying and delinquency in a Dutch school population*. The Hague, The Netherlands: Kugler Publications; 1999.
10. Duncan RD. Peer and sibling aggression: An investigation of intra and extra-familial bullying. *J Interpers Violence* 1999;14:871-86.
11. Espelage DL, Bosworth K, Simon TR. Examining the social context of bullying behaviors in early adolescence. *J Couns Dev* 2000;78:326-33.
12. Pellegrini AD, Bartini M, Brooks F. School bullies, victims and aggressive victims: factors relating to group affiliation and victimization in early adolescence. *J Educ Psychol* 1999;91:216-24.
13. Rodkin PC, Hodges EVE. Bullies and victims in the peer ecology: Four questions for psychologists and school professionals. *School Psych Rev* 2003;32:384-400.
14. Farrington D. Understanding and preventing bullying. In: Tonry M. (ed). *Crime and justice: a review of research*. Chicago: University of Chicago Press; 1993. p. 381-458.
15. Strassberg Z, Dodge KA, Pettit GS, Bates JE. Spanking in the home and children's subsequent aggression towards kindergarten peers. *Dev Psychopathol* 1994;6:445-61.
16. Berdondini L, Smith PK. Cohesion and power in the families of children involved in bully/victim problems at school: An Italian replication. *J Fam Ther* 1996;18:99-102.
17. Bowers L, Smith PK, Binney V. Cohesion and power in the families of children involved in bully/victim problems at school. *J Fam Ther* 1992;14:371-487.
18. Flouri E, Buchanan A. The role of mother involvement and father involvement in adolescent bullying behavior. *J Interpers Violence* 2003;18:634-44.
19. Rigby K. School children's perceptions of their families and parents as a function of peer relations. *J Genet Psychol* 1993;154:501-13.
20. Rigby K. Psychosocial functioning in families of Australian adolescent schoolchildren involved in bully/victim problems. *J Fam Ther* 1994;16:173-87.
21. Van der Wall MF, De Wit CAM, Hirasing RA. Psychosocial health among young victims and offenders of direct and indirect bullying. *Pediatrics* 2003;111:1312-7.
22. Juvonen J, Nishina A, Graham S. Peer harassment, psychological adjustment, and school functioning in early adolescence. *J Educ Psychol* 2000;92:349-59.
23. Eisenberg ME, Neumark-Sztainer D, Perry C. Peer harassment, school connectedness and school success. *J Sch Health* 2003;73:311-6.
24. Nansel TR, Overpeck MD, Haynie DL, Ruan WJ, Scheidt PC. Relationships between bullying and violence among US youth. *Arch Pediatr Adolesc Med* 2003;157:348-53.
25. Rigby K. Peer victimization at school and the health of secondary school students. *Br J Educ Psychol* 1999;69:95-104.
26. Olweus D. Victimization by peers: Antecedents and long term outcomes. In: Rubin KH, Asendorf JB, (eds). *Social withdrawal, inhibition and shyness in children*. Hillsdale, NJ: Erlbaum, 1993b. p. 315-41.
27. Olweus D. Bullying among school children: Intervention and prevention. In: Peters RD, McMahon RJ, Quinsey VL, (eds.) *Aggression and violence through the lifespan*. London: Sage Publications, 1992. p. 100-25.
28. Austin S, Joseph S. Assessment of bully/victim problems in 8 to 11 year-olds. *Br J Educ Psychol* 1996;66:447-56.
29. Juvonen J, Graham S, Schuster MA. Bullying among adolescents: The strong, the weak and the troubled. *Pediatrics* 2003; 112(6):1231-37.
30. HRSA Press Office. HHS Launches Campaign to Prevent Youth Bullying. March 1, 2004. Available from: URL:<http://www.hhs.gov/news/press/2004pres/20040301.html>. Accessed 5/16/05.

Marla E. Eisenberg, ScD, MPH is an Assistant Professor of Pediatrics in the Division of General Pediatrics and Adolescent Health and Project Director of Project EAT-II in the Division of Epidemiology and Community Health at the University of Minnesota School of Public Health. She was recognized by the Society for Adolescent Medicine as the 2003 New Investigator of the Year for her work on teasing.

Elizabeth Radel, BA is a MPH candidate in Maternal and Child Health Program in the Division of Epidemiology and Community Health, School of Public Health, University of Minnesota.



“Sugar and spice and everything nice—that’s what little girls are made of.”

Society might like to believe that little ditty, but Nikki Crick, PhD, director of the University of Minnesota’s Institute of Child Development, and her colleagues have found that girls can be just as aggressive as boys. They simply tend to express their aggression in different ways.

Boys typically use physical (hitting, kicking) or verbal (name calling) aggression to harm someone, whereas girls tend to direct their aggression at the social relationships of the person they wish to hurt. Crick calls this kind of aggressive behavior “relational aggression” because it strikes at the friendships and feelings of belonging and acceptance that girls value.¹

Observed in children as young as 3 years-old, patterns of relational aggression can get particularly nasty during the middle school years when belonging to a group of friends who share similar interests, idols and insider jokes is an important developmental stage. Giving a friend the “silent treatment,” excluding someone from the group’s preferred table in the cafeteria, spreading nasty rumors, and placing prank phone calls are all part of the relational aggression repertoire.

Although the temptation for parents and teachers alike is to say “that’s just the way girls are,” Crick and her colleagues caution that ignoring the behavior is a mistake—particularly when it is chronic. They have found that both the perpetrators and targets of relational aggression suffer social and emotional consequences that can endure into adulthood.²

Crick and her team have been conducting longitudinal research on aggressive behavior among girls since 1992. They have followed two cohorts of pre-schoolers into kindergarten and conducted observational assessments of students in third grade through sixth grade. This spring, Crick and her team received a \$789,000 grant from NICHD to study social and academic outcomes of relational aggression during the transition from preschool to kindergarten.

For more information about Dr. Crick’s work, go to <http://education.umn.edu/icd/SocialDevelopment>.

References

1. Crick NR, Grotpeter JK. Children’s treatment by peers: Victims of relational and overt aggression. *Development and Psychopathology* 1996;8:367-380.
2. Crick NR, Nelson DA, Morales JR, Cullerton-Sen C, Casas JF, Hickman S. Relational victimization in childhood and adolescence: I hurt you through the grapevine. In J. Juvonen & S. Graham (Eds.), *Peer Harassment in School: the Plight of the Vulnerable and Victimized*. New York: Guilford Press; 2001, p. 196-214.

Public officials in Minnesota, Wisconsin, South Dakota and Iowa have turned to a U.S. Substance Abuse and Mental Health Services Administration (SAMHSA) Model Program called the Olweus Bullying Prevention Program to address the very real problem of bullying in schools. Developed by Professor Dan Olweus of the University of Bergen in Norway, the program is neither a curriculum nor a ‘quick fix.’ Rather, it is a multi-level, multi-component school-based program that focuses on changing the school environment so that bullying is no longer tolerated. Research suggests the approach works.

The Program

Marlene Snyder, PhD, characterizes the Olweus approach as more of an “initiative” than a program. She coordinates Olweus training programs in the United States through the Institute on Families and Neighborhood Life at Clemson University. “It’s something you work on year after year after year,” she said during a recent telephone interview. “Every student and adult in the school building has to be concerned—not just for a day, or a month, but for the long haul.”

The program begins by defining bullying—giving everyone a common language to talk about it. That’s a huge help, teachers say. It gives them a peg on which to hang discipline policies and procedures. “Remember, that’s bullying, and that’s not allowed here,” one teacher relates in a video produced by a participating health department. American schools embracing the Olweus approach tackle bullying on four levels:

- **Schoolwide** interventions include administering a baseline survey to all students; formation of a bullying prevention coordinating committee whose members meet at least once a month; staff training, ideally for every adult who works in the building; development of schoolwide rules against bullying; and development of a coordinated system for supervising students at all times during the school day.
- **Classroom-level** interventions include regularly scheduled class time to talk with students about bullying and peer relations. Students learn to talk about what they see and what they can do if they witness or are involved in a bullying situation. Class meetings with parents also are encouraged so that the social skills learned at school can be reinforced at home.
- **Individual-level** interventions include meeting individually with children who bully or who are the targets of bullying and meeting with the parents of children involved.
- **Community-level** interventions involve reaching out to parents, local businesses and organizations so that everyone who interacts with young people understands what bullying is and can work creatively to prevent it.



Olweus, continued

An Example of Implementation in the Midwest

Concern among county commissioners brought the Olweus program to Minnesota's Hennepin County schools. The county decided to do something about bullying in 2003 because the Minnesota Student Survey pointed to bullying behaviors as one of the main predictors of poor mental health among elementary, middle and junior high school students. Health Department personnel looked at a variety of programs and decided on Olweus because it was "vigorously evaluated and research-based," according to Kate Bauer, MS, who explains the selection in a video produced by the department.

With funding from Hennepin County, five suburban schools piloted the Olweus approach during 2004; another six schools were introduced to the program this year. School staff are largely responsible for introducing and implementing the program in these schools, according to Cathy Stahl, MPH, senior health promotion specialist for the Hennepin County Human Services and Public

Health Department, but the Olweus program and the county provide the structure, initial training and ongoing support.

Although survey data from year one are not yet available, feedback from the County's pilot study suggests progress toward school environments where students show more respect for one another, value one another and accept differences. The ultimate goal, according to one participating junior high school principal, is "to promote that feeling of safety and security so that every student will want to come to school."

With that hope in mind, Iowa has allocated funding to train trainers in their educational service units, effectively making the program available to schools throughout the state, according to Olweus coordinator Snyder. The program also is being used in Wisconsin and South Dakota, and school districts in North Dakota have requested information, according to Snyder.

For more about Olweus and related research visit www.clemson.edu/olweus.

Division of Epidemiology and Community Health Faculty: Developing School-Based Interventions to Create a Better World for Youth

Elizabeth Ralston, BS

This overview highlights the intervention research of some faculty who advise and teach in the Maternal and Child Health Program, as well as other training programs in the Division of Epidemiology and Community Health. Like their counterparts across the country, these faculty have turned to the nation's schools to address health concerns in nutrition, obesity prevention, physical activity, alcohol and tobacco use. Under the direction of Dr. Cheryl Perry, the Center for Youth Health Promotion was established to reduce barriers to the dissemination and implementation of evidence-based youth health promotion initiatives in schools and communities (www.epi.umn.edu/cyhp).

The following are a few of the studies that have been conducted in local, national, and international school settings during the past 15 years.

Project Northland

The largest randomized, school-based community trial ever conducted for the prevention of adolescent alcohol use was created at the University of Minnesota: Project Northland. This comprehensive alcohol use prevention curriculum was developed in 1990 by Dr. Cheryl Perry and Dr. Carolyn Williams. Initially designed for rural, northeastern Minnesota students, the program recently was adapted to reach culturally and ethnically diverse urban students in Chicago by Dr. Kelli Komro. Targeted at sixth-, seventh-, and eighth-grade students, Project Northland addresses both individual and environmental change to reduce young adolescents' use of alcohol—the drug of choice for American teenagers. The Project was effective in changing peer influence to



Dr. Cheryl Perry

use alcohol, normative expectations about how many young people drink, and parent-child communication about the consequences of alcohol and reasons for not using alcohol. And, compared to controls, Northland participants were less likely to be users of alcohol and cigarettes at the end of the eighth grade. Additionally, students in intervention communities were significantly less likely to increase their alcohol use and engage in binge drinking during high school. These findings and the success of sustained participation in the project have resulted in Project Northland's recognition as a model program by the Substance Abuse and Mental Health Services Administration and as an exemplary program by the U.S. Department of Education. Hazelden Publishing and Educational Services distributes the Project Northland curriculums, which have been implemented in over 1,500 schools around the country. (www.epi.umn.edu/projectnorthland/)

MYTRI

Inspired by frequent family travel to India and the increasing rates of tobacco use in the country, Dr. Cheryl Perry decided to take her tobacco prevention expertise abroad. With help from Health Related Information Dissemination Amongst Youth, a non-profit organization based in New Delhi, Perry spearheaded MYTRI—Mobilizing Youth for Action Against Tobacco in India. (*Mytri* means 'friendship' in Hindi, the official language of India.) MYTRI's goal is to develop, conduct, and evaluate a multi-component tobacco prevention intervention for Indian adolescents in grades 6-9. The project team, with Project Director Dr. Melissa Stigler, also is working to build networks and teach Indian scientists how to implement similar large-scale health promotion interventions. MYTRI involves a sample of about 12,000 students from 32 private and government schools in New Delhi and Chennai. During the first two years of the five-year project, focus group discussions with Indian school children produced rich qualitative findings that are being used to

develop the intervention phase of the program. In the third year, the trial began, with a 94% student participation rate for the survey, and very high school completion rates.

GEMS

The national Girl's Health Enrichment Multi-site Studies (GEMS) addresses the need for culturally-sensitive obesity prevention approaches for children. GEMS is a collection of studies designed to develop and test interventions to prevent excessive weight gain by African-American girls as they enter and proceed through puberty. The University of Minnesota is one of four national GEMS field centers that work interdependently with local communities to reach out to adolescent girls. Dr. Mary Story implemented a 24-month, after-school GEMS intervention in community centers located near three Minneapolis elementary schools. Twice a week, 54 girls participated in *Girlfriends for KEEPS*, the "club meeting" format for the program. KEEPS stands for "Keys to Eating, Exercising, Playing, and Sharing." The program was designed to model and teach skills to prevent obesity by involving the girls in activities such as jump rope games, healthy cooking classes, and nutrition-label reading games. A family component included weekly "Take Home Packs" of nutritious snacks and two Family Fun Nights. Process evaluation of a 12-week pilot study demonstrated that the program was well attended and well received by girls and their parents. Although body mass index did not differ between control and intervention groups during the pilot study, research results suggest that after-school obesity prevention programs for low-income African-American girls offer a promising model.



Dr. Mary Story

TAAG

The Trial of Activity for Adolescent Girls (TAAG) is a national research study to help middle-school girls gain confidence as they become active, strong, and physically fit. The school is an integral part of the trial, which tests the effectiveness of a coordinated school- and community-based intervention. TAAG's goal is to reverse the current decline in physical activity when girls reach middle-school. Since 2000, the University of Minnesota, one of six national field centers, has partnered with a local middle school to implement the intervention under the guidance of Dr. Leslie Lytle. TAAG fosters school and community environments that encourage and support the full involvement of girls in every aspect of physical activity, including physical education, recreation, leisure time activities, and organized sports. (www.csc.unc.edu/taag/desc.php).



Dr. Leslie Lytle

CATCH

The Child and Adolescent Trial for Cardiovascular Health (CATCH) is a multi-component, multi-year coordinated school health promotion program to decrease fat, saturated fat, and sodium in children's diets, increase physical activity, and prevent tobacco abuse. CATCH's main trial, conducted from 1991-1994,

included more than 5100 culturally and ethnically diverse students from 96 schools. CATCH, led by Drs. Perry, Luepker, and Lytle (among others), was the largest elementary-school-based intervention ever conducted. The intervention included modifications in the school environment related to food consumption, physical activity, and tobacco use. CATCH cafeterias served foods lower in fat, saturated fat, and sodium. Physical education teachers increased moderate to vigorous physical activity to fill at least 50% of class time. Additionally, CATCH schools implemented tobacco-free school policies. The program targeted third- to fifth-grade students with home-based and in-school activities. CATCH succeeded in producing changes in dietary and physical activity behaviors, but not in tobacco use. CATCH students consumed less fat, participated in more physical activity outside of school, and were more physically active during physical education. The intervention succeeded in changing the school environment because CATCH school cafeterias provided meals that were lower in fat. A three-year follow up study showed that the original CATCH students maintained lower fat intakes and higher levels of physical activity compared to students who had not participated. In 1999 the long-term follow-up CATCH-ON, led by Dr. Leslie Lytle, examined the institutionalization of the school-based programs. Findings indicate that the classroom curriculum of the CATCH project was more likely to be continued if the school climate was generally more open and more supportive of health promotion.

TACOS

Trying Alternative Cafeteria Options in Schools (TACOS) was an environmental intervention intended to increase sales of low-fat foods among secondary school students by increasing the availability of low-fat food choices in schools. Led by Dr. Simone French, this study randomized 20 high schools in the Twin Cities to intervention or control groups for a two-year period. In the 10 intervention schools, TACOS staff worked with food service staff to make more low-fat choices available to students in snack bars, vending machines and *a la carte* sections of school cafeterias. Student groups promoted healthier eating during the intervention by conducting taste tests and creating media campaigns that included posters, videos, and articles in school newspapers. Cafeteria sales of low-fat and high-fat foods were documented electronically, and food choices were measured by surveying a random sample of 75 students at each high school at baseline and after two years. The study found that school-based environmental interventions to increase availability and promotion of lower-fat foods can increase the purchase of these foods among adolescents. The study was novel in that it did not have a supportive curriculum specifically targeting food choices. Instead, school environmental changes alone, including low-fat choices and creative student-led nutritional promotions, produced positive effects on student food choices.



Dr. Simone French

New Moves

New Moves is a school-based program designed to promote physical activity, healthy eating behaviors, and a positive self-image among adolescent girls at risk for becoming overweight due to sedentary lifestyles. Under the direction of Dr. Dianne Neumark-Sztainer, it is currently being offered to high school students for credit

Continued on page 8

Faculty, continued

during school hours as an alternative to the regular physical education program. The program includes physical activity, nutritional guidance, and social support while focusing on modifying personal, socio-environmental, and behavioral factors. New Moves includes daily activities during one school quarter and booster activities during three school quarters. Two hundred 9th-12th grade girls from urban high schools in the Twin Cities took part in the study evaluating the program. Outcome measures included body mass index,



Dr. Dianne Neumark-Sztainer

body fat, physical fitness, eating behaviors, physical activity, and a range of personal and socio-environmental factors. Further intervention and evaluation activities are planned for the near future.

Elizabeth Ralston, BS is a MPH candidate in the Maternal and Child Health Program in the Division of Epidemiology and Community Health, School of Public Health, University of Minnesota.

Photographs by Paul Bernhardt, Division of Epidemiology and Community Health, School of Public Health, University of Minnesota.



Working in Schools: Insight and Advice from Veteran Researchers

University of Minnesota faculty in the Division of Epidemiology and Community Health have worked with thousands of children in hundreds of schools for nearly three decades. Here's a sampling of their combined wisdom.

What's the return on investment for researchers?

"Schools provide a captive audience of ethnically and socio-economically diverse youths. Through working with schools, we have the opportunity to reach out to everyone, not just to the children who have the resources to get to community centers or clinics." —Dianne Neumark-Sztainer

"First, these kinds of research programs establish relationships between the researcher (and the University) and schools, which can then provide more opportunities to continue research, tailor the research to fit the needs of a specific setting, or create opportunities for community service. Second, the research itself is very interesting and, we hope, important. . . In cross-cultural research, the benefits of viewing the world through the circumstances of other peoples and settings are profound." —Cheryl Perry

"It's fun to be around kids. I'm still as interested and excited about it as I was 15 years ago. Working in schools keeps you energized, in touch with what's changing in our world. The questions get more and more interesting as the public health problems that confront us get more complicated." —Leslie Lytle

What's the return on investment for schools and their constituencies—students, teachers, parents, administrators, taxpayers?

"When the research that we do finds its way to people and places where it can be used to improve health." —Leslie Lytle

"Awareness. Bigger questions flow down into day-to-day reality when they are the focus of a research study. For example, our work with schools focused a lot more attention on the importance of providing healthy school food environments. And once people get interested, action can be taken at a lot of levels. . . Parents can get active through the PTA. A lot of times just a few individuals can make a difference by pushing for more nutritious food choices, fewer soft drinks." —Simone French

What is the biggest challenge associated with conducting research in schools?

"One major challenge is to implement an effective program within the time and resource constraints that schools now face. In India, class sizes can be as large as 60-80 students. Working out how our programs, which are interactive and involve peer leaders and ample discussion, can be implemented in large classes has been a real challenge." —Cheryl Perry

"Schools are incredibly strapped for resources right now. They're under funded; they're dealing with No Child Left Behind requirements and all kinds of academic requirements. . . Their plates are really overflowing, and health and research issues are really very secondary." —Leslie Lytle

"One of the biggest challenges is getting into the schools. Schools need to make sure that they are providing their students with enough learning time. . . so they are cautious about adding one more 'thing' to the curriculum. In my experience, though, schools are very receptive once they see that you are offering a good program to their students." —Dianne Neumark-Sztainer

Continued on page 9

What's your advice for people new to conducting research in schools?

"My advice is to start small and get it right. . . even if you don't have adequate statistical power. This is what we have done with New Moves (an alternative physical education class for girls) and VIK (Very Important Kids, a dissertation project that has involved collaborating with a local theater group to develop an educational play for elementary students around teasing). Get the kinks out, be creative, have fun. . . and then go for a larger study."
—Dianne Neumark-Sztainer

"Ultimately, we need to fund our schools. We need to generate enough money to keep things going. A lot of schools are offering a la carte choices that don't follow nutritional guidelines because they need to make sure they have enough funding. . . Soft drink vending machines in schools are another issue driven by funding concerns. Such programs are attractive to schools that don't have money for basic supplies." —Simone French

"Spend some time as a volunteer in schools (there are many opportunities) in order to get a good sense of how schools operate, what the rhythm of a school day entails. How discipline problems are handled, etc."
—Cheryl Perry

"Exercise due diligence up front. Talk to people. Get their opinions. Tell them, 'We think we're going to do this. Is that right? How would you feel if we asked to draw blood from your daughter?' Make sure you're being incredibly sensitive. . . And talk to other researchers, or friends who are in your target group."
—Leslie Lytle

Konopka Institute Launches Minnesota Youth Community Learning Initiative



As a group, adolescents are physically healthy. Various risk factors, however, can have an impact on their health. Research has shown that the biggest threats to adolescents' health come from risky behaviors, including drinking and driving, violence, early and unprotected sex, and sedentary lifestyles. School connectedness and academic success, on the other hand, help to protect adolescents from risks that threaten their health. The University of Minnesota's Konopka Institute for Best Practices in Adolescent Health is building upon these protective factors through community-driven research partnerships. The Institute recently formed a Minnesota Youth Community Learning (MYCL) Initiative to achieve one straightforward goal: "Our youth finish school."

A \$2.6 million award from the W.K. Kellogg Foundation will fund the three-year MYCL Initiative, which will be realized through partnerships with seven Minnesota communities. Specifically, MYCL communities will work to re-engage middle and high school students who are disconnected from learning by linking them with a community teacher. The Initiative also will assist parents by providing positive parenting and educational support for their middle and high school students, and it will work with schools to find ways to build a stronger sense of connectedness among youth.

Chosen for their long history of successful programming and strong advocacy for youth, all seven communities will serve as

partners in the design and implementation of the MYCL Initiative. The communities are Cass Lake, McGregor, Fergus Falls, Faribault, Maple River, Worthington, and the Near North and Camden communities of Minneapolis. Within each MYCL Initiative commu-

nity, a multi-sector coalition will address the needs of all youth in the community. Although their work is just beginning, the community coalitions are ready, as one member explains, "to take that next big step forward for kids."

Inspired by the pioneering work of Dr. Gisela Konopka, the Institute's goal is to get reliable information into the hands of

everyone who is in a position to help adolescents. In keeping with that goal, lessons learned from the MYCL process will be fed back to participating communities and integrated into university education and outreach programs. Paul Snyder, Initiative director, says that lessons learned from MYCL will be used to influence youth policy and programs at the local, state and national levels. In addition, he anticipates that coalition findings will generate new best practices for culturally sensitive, community-based youth development that can be shared throughout the nation. An underlying goal, he said, is to strengthen the way the University works with communities.

For more information visit www.konopka.umn.edu.

"Adolescence is usually described as 'pre' or 'in between'—a stage between childhood and adulthood. It is seen as a turmoil because one moves from a protected state into a state of independence. I prefer to see adolescence as a significant stage in itself, an 'adolescenthood' with new experiences and new strengths, not merely an interim period and a problem."

Dr. Gisela Konopka, D.S.W.



The Narrow Focus of No Child Left Behind: No Focus on Special Education or Health

Minnesota State Senator Steve Kelley

One of the worst consequences of the federal No Child Left Behind Act (NCLB) has been the pressure it puts on schools to narrow the purpose of public education to just the subjects being tested. Under NCLB, schools are required to test students in three subjects (reading, writing, and arithmetic) in grades three through eight and ensure that students are showing “adequate yearly progress” or face sanctions from the federal government.

While it is worthwhile for schools to focus on teaching the basics, our students also need to learn how to lead healthy lives and be productive citizens of our state and nation. Under-funding of NCLB has forced schools to put those efforts on the sidelines.

Special Education Concerns

Two inconsistent federal laws govern children with disabilities in our schools. The Individuals with Disabilities Education Act (IDEA) requires that disabled students be taught according to ability level. NCLB, on the other hand, requires testing all students at grade level, standardizing expectations and punishing schools if students with disabilities do not achieve the proficiency levels of their grade-level peers. Up to now, the federal government has said that only 1% of all students (equal to an estimated 10% of students with disabilities) can be excused from meeting NCLB’s grade-level testing mandate, even though its own website acknowledges that “research suggests that there are about 1.8 to 2.5% of children who are not able to reach grade-level standards, even with the best instruction.” (www.ed.gov)

States repeatedly have told the U.S. Department of Education that the 1% exemption is too narrow and the individualized education plans mandated under IDEA should determine the appropriate level of testing under NCLB. Although Education Secretary Spellings has made minor changes in the percentage of students (including students with disabilities) that can be exempt from reaching grade-level testing proficiencies, her new policies seem confusing and, at best, will likely create more paperwork for schools. Unfortunately, the changes do not go far enough to help schools achieve “Adequate Yearly Progress” and avoid sanctions under NCLB.

Cut-backs in Physical Education Courses

Despite the Centers for Disease Control and Prevention’s estimates that 16% of children in the U.S. are overweight and that the rate of overweight children has tripled in the last 20 years, fewer than 35% of students currently attend daily physical activity classes. Many schools do not require physical education courses at all.

With increasing educational demands and tightening budgets, one of the first targets for cuts has been physical education. After the Profile of Learning was repealed in Minnesota, physical education lost its “required” status. However, in response to constituent concerns, the Minnesota Senate in 2003 passed legislation requiring at least some physical education for students. But that action did not address budget constraints.

In 2004, the state’s Legislative Auditor estimated that it would cost Minnesota \$19 million a year to implement the tests required by



NCLB. It remains to be seen if the federal government will live up to its mandate and provide schools with the necessary funding. If not, the burden will fall on the state, and will continue to directly affect school district budgets. Most recent figures show that the federal government has under-funded NCLB by about \$104 million in Minnesota and \$8 billion nationwide.

Effects on Nutrition

Budget constraints have played a role in another critical area: nutrition. Minnesota lunch and milk programs were pared back in 2003, leaving school districts to fund gaps caused by inflation. A staple of American school life for many years, school lunch and breakfast programs help combat poverty and hunger in America by filling empty stomachs so students can learn. However, as school budgets are squeezed, schools have been compelled to sell popular but unhealthy foods as part of their lunch programs just to break even. And, most middle and high schools in Minnesota offer vending machine soda pop to students because the money generated by those sales helps pay for programs that the schools might otherwise have to cut.

What’s interesting is that if students are offered good-tasting, healthy food, they will eat it. In Hopkins, for example, a re-vamped lunch program provides healthy lunch alternatives to students, and they are gobbling up the lunches at better rates than before. Other districts are falling in line with the new lunch programs, but money remains a problem for many districts.

So where’s the good news for our students? The Minnesota Senate continues to support physical education requirements for students, and it also has proposed increased funding for the school lunch and milk programs that were cut in 2003. More importantly, the state Senate is proposing to increase state funding for schools by 9% over the next two years—a proposal that will provide districts with the first funding increase since 2001 and will give them the flexibility to fund programs they have had to cut in previous years.

Our duty to our children goes beyond the classroom. We must teach students healthy habits and how to live healthy lives outside of school. It should be a priority for all of us.

Senator Kelley represents Hopkins, St. Louis Park and parts of Golden Valley in the Minnesota State Senate. He is chair of the Senate’s Education Policy Committee. He was first elected to the Minnesota House of Representatives in 1992 and to the Minnesota Senate in 1996. The Senator signed off on this article on May 12, 2005.

North Dakota Contemplates How to Measure Height and Weight in Schools



Editor's note: This article is based on a draft set of guidelines being prepared by The North Dakota Healthy Weight Council. It hopes to finalize its guidelines by July 2005. The Council is part of Governor John Hoeven's "Healthy North Dakota" initiative—a framework supporting North Dakotans in their efforts to make healthy choices by focusing on wellness and prevention in schools, workplaces, senior centers, homes and anywhere people live, work and play.

By fall 2005, the North Dakota Healthy Weight Council hopes schools across the state will adopt a set of guidelines designed to counteract what they see as the potentially harmful effects of taking body mass index (BMI; weight adjusted for height) measurements in schools. The Council, part of Gov. John Hoeven's "Healthy North Dakota" initiative, is working on a position paper that recommends schools **do not** measure heights and weights of students unless they meet the criteria specified below. When schools meet any of these criteria, measuring the height and weight of students is encouraged:

- The school is involved in an approved research project;
- The school has established a comprehensive school health program to identify and refer children with health concerns related to height and weight to trained professionals, i.e., a physician, psychologist, or nutritionist;
- Students are involved in extracurricular activities such as wrestling in which weight must be monitored; and
- Students are involved in hot-weather sports. In this case, coaches are encouraged to weigh students before and after games and practice sessions during particularly hot weather so that no one suffers the ill effects of dehydration.

If schools or students do not fall into one of these categories, the recommendation is: *Don't weigh!*

The catalyst that moved the Council to action was a case of "good intentions and new technology gone awry," according to Council member Pat Anderson of the North Dakota Department of Public Instruction. Apparently in response to concerns about the increasing number of children who are overweight, a wellness center in one North Dakota community decided to put its new Tri-Fit machine to work in the schools. Wellness center staff took height, weight and fitness measures on every child in kindergarten through 12th grade and then sent the reports home to parents. The center's goal was commendable: to alert parents whose children might be at risk for health problems related to weight—not just overweight, but also underweight. The only problem was that very little preliminary information had gone out, and many students received incorrect information. The result, according to Anderson, was "confusion and a lot of upset children and parents." Subsequently, it was discovered that the Tri-Fit—a sophisticated machine that can generate extensive, computerized reports—had been calibrated incorrectly, making it necessary to re-weigh many students.

Although this community's experience was a worst-case scenario, it underscored the need for guidelines. Anderson, along with Loris Freier, Department of Public Instruction, and Katherine Black (MCH) and Jill Leppert (WIC), both with the North Dakota Department of Health, took the lead. They gathered

research on effective childhood obesity treatment and prevention programs, explored what other states were doing, and concluded that the potential risks of taking heights and weights in school may be more serious than the potential benefits. Although still in draft form, the Council's position paper is expected to emphasize the following points:

1. **Taking heights and weights in schools can harm students, provide inaccurate information and result in inaccurately labeling some children.** An over-emphasis on weight, the position paper authors found, "can increase the poor body image and over-concern that children and teens of all sizes and shapes are already feeling about their bodies in our weight-obsessed culture." This concern, in turn, can lead to a host of related problems—nutrient deficiencies, dangerous weight loss efforts, eating disorders, and weight cycling among them.¹ Documenting weight, often publicly, can stigmatize students who are larger or shorter than their peers.² "In too many cases, the heavy child has already experienced discrimination from peers, teachers, and even parents."³ Labeling children as *too thin* can be equally damaging. Relying on BMI alone can result in mislabeling as many as one in four children as "at risk for overweight," while missing other children who have high body fat.⁴ Tables for interpreting BMI assume that higher weight means higher body fat, but that is not always the case. Children grow and mature in different ways, particularly during puberty. Fat is deposited, and then depleted with every growth spurt.
2. **Money used to weigh and measure students would be better spent on health education.** In keeping with guidelines developed by the Weight Realities Division of the Society for Nutrition Education (2002),⁵ the North Dakota Healthy Weight Council thinks schools should invest scarce resources in programs that create a nurturing environment for students of all shapes and sizes. They urge schools to develop education programs that stress *healthy weight* (not being too fat or too thin); emphasize healthy eating patterns both at school and at home; and increase opportunities for students to be active and discourage sedentary activities like watching too much television. Schools should be measuring and tracking factors related to nutrition, physical activity, and attitudes and behaviors related to healthy lifestyles, not just heights and weights.
3. **If height and weights are taken in schools, specific safeguards and procedures need to be followed.** Screening heights and weights in schools is a policy matter, one that should be carefully considered by a school's governing board. If the benefits do not outweigh the risks, screening should not be endorsed. Before electing to conduct screenings, school boards should make sure that three important safeguards are in place:
 - **Step-by-step referral system** to ensure that students with identified weight concerns know where to go and how to get additional help;

Continued on page 12

- **Staff training** for all school staff involved in height-weight screening to ensure proficiency in all hands-on techniques, assessments and interpretations of results; and
- **Respectful screening protocol** that protects the self-esteem and privacy of students. Before any screening takes place, schools need to educate students about body image issues and why screening will be conducted. In addition, parents should receive ample notice about screening and be given an opportunity to provide input and exempt their child from participating, if they wish.

Ultimately, the North Dakota Healthy Weight Council hopes schools will embrace a health-centered, rather than weight-centered, “health at any size” approach, that will *do no harm*.⁶ This approach shifts the emphasis to living actively; eating in normal, healthy ways; respecting each individual; and health and well-being for all at whatever size they may be.⁵

For more information, contact Patrice Anderson, Healthy Weight Council member: psanderson@state.nd.us

References

1. Croll J, Neumark-Sztainer D, Story M, Ireland M. Prevalence and risk and protective factors related to disordered eating behaviors among adolescents: Relationship to gender and ethnicity. *J Adoles Health* 2002;31:166-175.
2. Latner JD, Stunkard A. Getting worse: Stigmatization of obese children. *Obes Res* 2003;11:452-456.
3. Petersmarck K. Size acceptance: Shaming heavy kids at school body composition as part of fitness testing. *Healthy Weight J* 1999;13:3:45-46.
4. Federal update: BMI poor indicator of body fat in individual kids. *J Am Diet Assoc* 2000;100:628.
5. Society for Nutrition Education (2002). Guidelines for childhood obesity prevention programs: Promoting weight in children. Available from: URL:<http://www.sne.org> and <http://www.healthyweight.net>. Accessed 5/15/05.
6. O’Dea JA. Prevention of child obesity: ‘First, do no harm’. In *Health Education Research*. Oxford Univ Press; 2004.

Interested in making a difference?

Consider a Master’s in Public Health (MPH) Degree in Maternal and Child Health (MCH)



For more than 20 years, Gloria Ferguson has worked in maternal and child health, focusing primarily on adolescent health and child abuse prevention. While teaching sexuality education to junior high and high school students, she has made sexual orientation an integral part of the curriculum, as opposed to an isolated subject taught one day per year. She

also has taught childbirth and prenatal classes, developed parenting projects, and worked to raise awareness about the needs of gay, lesbian, bisexual and transsexual (GLBT) youth.

As the mother of two gay children, Gloria has a special interest in the difficulties that GLBT youth face. She has shared her knowledge and experiences with the community in many ways. For example, she recalls teaching one particular group of hard-to-manage boys. When she started talking about sexual orientation, the boys initially responded with homophobic and hateful comments. “These are exactly the type of kids who might hurt my child,” she remembers thinking. Her voice started to tremble, she says, and she got tears in her eyes as she told them about her older daughter who knew she was gay when she was 13. At the end of the class, the “most wonderful thing happened,” she said. “Several of the boys came up to me, touched me on the arm, apologized for their comments, and told me not to worry about it. They thanked me for coming and sharing.” It is through unexpected situations like this that Gloria has realized the rewards of making a difference.

Not only is Gloria concerned with the well-being of adolescents, but also with the well-being of families. She works full time as program director at HealthStart, a non-profit program of West Side Community Health Services that operates nine school-based clinics and one community clinic in St. Paul. From 1998-2003, Gloria provided direct service and oversaw management of HealthStart’s child abuse prevention projects, including a 12-year project with families affected by maternal substance abuse. She is a frequent speaker on topics such as parent/child attachment, the role of parents in sexuality education, fatherhood, and providing support for

GLBT youth. In 1999, she wrote *The Dad Book: A Guide to Pregnancy, Labor, Birth, and Parenting*.

A part-time MCH MPH student since 2001, Gloria takes one or two classes each semester. She should graduate in about one year. Her practical experience in the field of adolescent health education enriches the classroom experience for fellow MCH students and instructors alike. One classmate notes, “You can count on Gloria to bring alive a concept or theory with an example of a success, or even a failure, that she has witnessed in the real world of public health. This type of insight cements an idea for those of us with less experience.” Working on her degree has changed Gloria little by little. She feels more confident about what she says to colleagues, legislators, students and their parents, and she enjoys learning the academic theory behind her practice. “I just love ideas, and there are plenty of them to be had.”

What is the Maternal and Child Health Program? An MPH training program about promoting and preserving the health of families, women, children, and adolescents. It is in the Division of Epidemiology and Community Health in the School of Public Health at the University of Minnesota.

Who are the faculty? The MCH faculty is multidisciplinary (e.g., epidemiology, medicine, nursing, psychology, sociology, nutrition) and focuses on children with chronic health conditions; reproductive health and family planning; pregnancy outcomes; social inequities in health; women’s health; infectious diseases; substance use; and child, adolescent, family, and community health promotion, risk reduction, and resiliency.

Who should apply? People who care about vulnerable populations and want careers in program planning and development, evaluation, surveillance, assessment, teaching, or research. The program offers a special emphasis on MCH epidemiology for interested students. Clinical professionals, and others with advanced degrees may have the option of completing the two-year MPH Program in one year.

For further information about the MCH Program, call 612-626-8802 or 1-800-774-8636; e-mail gradstudies@epi.umn.edu; or visit www.epi.umn.edu/mch/academic/ or www.sph.umn.edu



School nurse Mary Yackley, RN, LSN, is a woman with a mission. Her goal? To make sure that every St. Paul Public Schools (SPPS) student receiving special education services learns what he or she needs to know about sex. After nearly three years of reviewing literature, previewing curriculum, and talking with colleagues, parents and youth, she and a committee of special educators have come up with a sex education plan for students with disabilities that they believe will help achieve that goal. The plan's purpose is to help every SPPS special education student older than 13 years old learn how to: 1) be safe; 2) avoid any unwanted pregnancy and infection; 3) prevent sexual victimization; and 4) develop healthy sexual relationships.

Background

During her five years as a nurse for Focus Beyond-Programs in Transition, Yackley has become aware that many special education students are getting short-changed when it comes to sexuality education. (Focus Beyond is an umbrella program responsible for making sure that special education students get the education and services they need to transition from school to adulthood.) "Some kids have had no health education since 5th or 6th grade," she said during a recent interview. "They may get pulled out for special resource classes during health education or drop out for a semester or two." Other students, she said, sit through classes that move too fast or are impractical for them, given the nature of their disability. End result: many special education students leave school without the social skills and health knowledge they need as adults.

Yackley decided to do something about the problem a few years ago after a conversation with colleagues who were working to design Individual Education Plans (IEP) for two special education students who also were fathers. "Teen parenthood is difficult enough without a disability," she said. "Imagine what it's like when you add a disability to all the other challenges associated with raising a young child—especially when you're still a child yourself."

At the time, teen pregnancy rates were declining nationwide, Yackley said, but she had seen no change in the rate for students with disabilities. The discrepancy troubled her. She knew that school staff—teachers, childcare coordinators, school nurses and social workers—shared her concerns.

The need for additional sex education is not limited to one or two students: Yackley estimates that of the approximately 400 students she deals with in the Transition program, around 10% are parents. Learning for these students is complicated by disabilities that range from physical impairments, developmental and cognitive disabilities, emotional and behavioral disorders, and attention deficit hyperactive disorder.

Although sparse, research supports Yackley's observation that physically disabled youth are just as sexually experienced as their peers.¹ Similarly, young people with developmental disabilities have the same desire for relationship and sexual gratification as their non-disabled counterparts.² As Goldfarb noted in a 1993 article about the Glen Ridges sexual assault case: "The need to be loved can be a trap for the most capable. For the least capable, it can be an invitation to disaster." In 1996, the American Academy of Pediatrics

published its position on the subject. The Academy's goals mirror Yackley's: "Children [with disabilities] need to be provided sexuality education to help them attain a life with more personal fulfillment and to protect them from exploitation, unplanned pregnancy, and sexually transmitted diseases."⁴ *Healthy People 2010* underscores the importance of involving families in "decision making at all levels" to achieve its goal of achieving "family-centered, culturally competent, comprehensive, and coordinated systems of services for all children and youth with special health needs, in every community, by the year 2010."⁵

Developing Tool Kits: Accountability, Training and Resources

Despite agreement from public health and medical professionals about the need for sexuality education for children with disabilities, national standards do not exist. The reason: individual differences make it impossible to develop a single, all-inclusive approach. Yackley recognized this, and that is why she worked with community leaders in sexuality education to develop resources. Staff from the MN Department of Education, Family Tree Clinic, HealthStart school-based clinics, Minnesota Organization on Adolescent Pregnancy, Prevention and Parenting and the Birds and Bees Project all provided recommendations about what should be included to support this education effort.

The new plan is three-pronged and consists of assigning accountability, providing training and expanding resources—many of which will be housed in bright red "tool kits" that will be distributed this summer to the approximately 25 St. Paul middle schools, junior high schools and high schools that offer a special education component. **Accountability** will lie with the special education coordinator at each school. These educators will receive **training** in fall 2005 to help them understand the need for tailoring learning to students' developmental, physical and emotional needs and teach them methods for teaching this "sometimes difficult subject." Myths about the sexuality of youth with special needs will be debunked and replaced by the Sex Ed toolkits that contain a variety of **resources** that can be used by parents, health educators, special educators, and students. Increasing the comfort level and competence of staff and parents who do not normally see themselves as sexuality educators is a secondary goal of the plan. Each toolkit will include:

- Videos about basic hygiene;
- Pamphlets for parents about sexual health for boys and girls and St. Paul area resources for sexual health education;
- Two SIECUS' reports: "Sexuality Education for People with Disabilities" and "Meeting the Special Needs of People with Disabilities;"
- Information and references developed by Planned Parenthood of Northern New England, Minnesota's PACER Center, Inc., the National Information Center for Children and Youth with Disabilities, and the now-defunct National Center for Youth with Disabilities;

- A selection of books for youth at various stages of cognitive development; and
- A packet of sanitary supplies for demonstration purposes.

“The health education content should not be new,” Yackley says. “But, special educators hopefully will feel empowered by the new resources and knowledge and embrace sexuality education as part of their students’ individual education plans.” Financial support for the project came primarily from within Focus Beyond – Programs in Transition, along with a small grant from the Minnesota Department of Health.

For more information contact Mary.Yackley@spps.org

References

1. Cheng MM, and Udry JR. Sexual behaviors of physically disabled adolescents in the United States, *J Adoles Health* 2002;31(1):45-58.
2. Harris et al. Emotional well-being among adolescents with and without chronic conditions. *J Adolesc Health* 1994;15:199-204.
3. Goldfarb M. Who won in Glen Ridge, NJ? . . . No one. *AHRC Chronicle*, 1993;Spring/Summer.
4. American Academy of Pediatrics. Sexuality education of children and adolescents with developmental disabilities, *Ped* 1996;97(2):275-278.
5. U.S. Department of Health and Human Services. *Healthy People 2010* (conference edition in two volumes). Washington: Department of Health and Human Services. 2000.



Further information on sexual health education for youth

- **Advocates for Youth:** www.advocatesforyouth.org
- **Alan Guttmacher Institute:** www.guttmacher.org
- **Coordinated School Health Resources:** www.mnschoolhealth.com
- **Information to assist parents in talking to their children about sensitive issues:** www.talkingwithkids.org
- **Kaiser Family Foundation:** www.kff.org
- **Minnesota AIDS Project (MAP):** www.mn aidsproject.org
- **Minnesota Organization on Adolescent Pregnancy, Prevention and Parenting (MOAPPP):** www.moappp.org
- **National Campaign to Prevent Teen Pregnancy:** www.teenpregnancy.org
- **Planned Parenthood:** www.plannedparenthood.org/pp2/portal/medicalinfo/teensexualhealth/
- **Pro-Choice Resources’ Web site for youth and parents:** www.birdsandbees.org
- **Rep. Henry A. Waxman’s 2004 report on the content of federally funded abstinence-only programs:** www.democrats.reform.house.gov/Documents/20041201102153-50247.pdf
- **Sexuality for Life-Minnesota:** www.sexedforlife.org
- **SIECUS Fact Sheet — Public Support for Comprehensive Sexuality Education, available at:** www.siecus.org/pubs/fact/fact0017.html
- **SIECUS Report —The Politics of Sexuality Education, Vol. 32, No. 4, available at:** www.siecus.org/pubs/srpt/srpt0050.html



Minnesota is tackling the challenge of teen sexual health through the state legislature. Spearheaded by the Minnesota Organization on Adolescent Pregnancy, Prevention, and Parenting (MOAPPP) and the Minnesota AIDS Project (MAP), a coalition of youth advocates is pushing for passage of a comprehensive sex education bill that would provide for a **uniform, age appropriate, medically accurate** approach to teaching Minnesota students in grades 7 through 12 about sex. The coalition also is urging passage of a companion finance bill to establish up to eight training centers, deemed essential for developing, implementing and evaluating comprehensive family life and sex education programs statewide.

If the coalition succeeds in winning passage of both bills, Minnesota will become one of the first states in the country to mandate comprehensive sex education through state statute, according to Joy Miciano, education and policy coordinator at MOAPPP (and MCH student). When *Healthy Generations* went to press in late May, she was cautiously optimistic. On May 5, the Senate unanimously passed an education omnibus bill that contained the Comprehensive Family Life and Sexuality Education language. The law's next hurdle is adoption by the state's K-12 Education Conference Committee, comprised of five House members and five Senate members.

Getting to that point took a lot of legwork by key supporters, including MOAPPP and MAP, who co-convene the Sexuality Education for Life-Minnesota coalition. Made up of educational, religious, health, social service, and advocacy organizations, along with like-minded individuals, the coalition is dedicated to lobbying for policies on comprehensive sexuality education and access to confidential health care services for young people. "The coalition has been in existence since 1999 and a change in state statute regarding sex education is something we've been working on for the past five years," Miciano said.

The sex education fight in Minnesota, like the national debate, has been between proponents of abstinence-only-until-marriage programs and proponents of a comprehensive approach to sex education. "Our position has always been that comprehensive sex education should include 'abstinence-first,' but not to the exclusion of other **age appropriate, medically accurate** information young people need to make healthy choices," Miciano explained. The coalition-supported bill aims to "clearly define what schools

need to be teaching when they teach sex education," she says. With that goal in mind, the coalition's strategy has been to add words that clarify the law's intent and to include guidelines that are based on what research says works to prevent unintended pregnancy and sexually transmitted infections. Sticking points like the grade at which sex education should be introduced into the curriculum—mandatory in grade 7; left up to the choice of individual school districts for children in kindergarten through grade 6—and the right of parents to decide whether they want their children to participate in sex education classes are clearly specified.

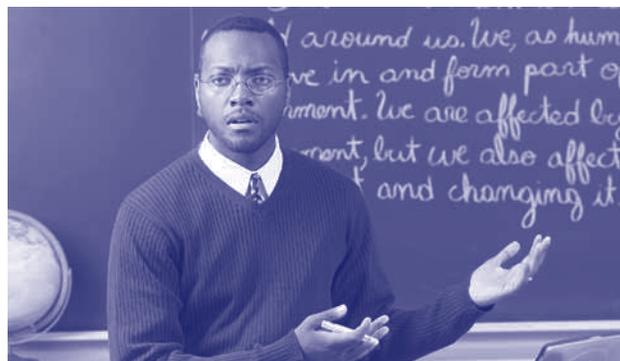
Age appropriate, according to the proposed legislation, "refers to topics, messages, and teaching methods suitable to particular ages or age groups of children and adolescents, based on developing cognitive, emotional, and behavioral capacity typical for the age or age group."

Medically accurate "means verified or supported by research conducted in compliance with scientific methods and published in peer-reviewed journals, where appropriate, and recognized as accurate and objective by professional organizations and agencies in the relevant field, such as the federal Centers for Disease Control and Prevention, the American Public Health Association, the American Academy of Pediatrics, or the American College of Obstetricians and Gynecologists."

Before accepting her current position at MOAPPP, Miciano worked with a Ramsey County teen pregnancy prevention program. "The past two years have taught me how tremendously important public policy is, and that change *can* be affected from the grassroots level," she said. "People in public health have become politically astute over the years. The people we've worked with really knew what to do and how to do it."

Along with MOAPPP and MAP, the key leaders of the Sexuality Education for Life-Minnesota coalition included: Planned Parenthood of Minnesota, North Dakota and South Dakota; NARAL Pro-Choice Minnesota; the University of Minnesota's Healthy Youth Development Prevention Research Center; Minneapolis Department of Health and Family Support; Teen Age Medical Services (Children's Hospital); HealthStart—St. Paul Public Schools school-based clinics; and Saint Paul-Ramsey County Department of Public Health.

For more information visit www.moappp.org.



Promoting Healthy Communities for Children: The Social and Physical Environments

September 26-27, 2005
Continuing Education and Conference Center
University of Minnesota St. Paul Campus



UPCOMING
EVENT

What is the purpose of the conference? From conception through adolescence, children are disproportionately affected by exposure to environmental risks because they have greater physiological and psychological vulnerabilities during stages of rapid and formative development, and they have less power to influence and shape their environment.

This conference will examine critical aspects of the environment as they affect the health and well-being of children and adolescents. Conference plenary and breakout sessions will be organized around three broad themes:

- the **natural** environment – including the quality of our air, water, and soil; exposure to lead, environmental tobacco smoke, and noise; industrial waste disposal;
- the **built** environment – including parks, sidewalks, bikeways, schools, transportation networks, urban/suburban/rural planning and development, and housing codes; and
- the **social** environment – including social processes and conditions related to economic and political power and decision making; human connections at an ecological level, such as social capital; family relationships; safe schools; and discrimination.

Who should attend? This conference is intended for a multidisciplinary audience, reflecting the variety of conference co-sponsors. Researchers, practitioners, public health professionals, community members, and graduate students are welcome.

Co-sponsors: School of Public Health, College of Architecture and Landscape Architecture, Medical School, School of Nursing, School of Social Work, and the Joint Degree Program in Law, Health and Life Sciences.

For further information: Registration will begin in July 2005. Information will be available on www.epi.umn.edu/mch.

Registration fees will be minimal and continuing education credits will be available.

Maternal and Child Health Program
School of Public Health
Division of Epidemiology and Community Health
University of Minnesota
1300 So 2nd St Suite 300
Minneapolis, MN 55454

Nonprofit Org.
U.S. Postage
PAID
Mpls., MN
Permit No. 155



Supported in part by the
Maternal and Child Health Bureau
Health Resources and Services Administration
US Department of Health and Human Services

