Schools have the potential to instill healthy life-long habits within children and adolescents through nutrition education, healthy school meals, snacks and beverages, and opportunities for physical education and activity. Research indicates nutritional adequacy and physical activity in children and adolescents yield a decrease in absenteeism and an increase in academic performance. It can also be concluded that school administrators committed to creating and sustaining a healthy school environment can positively impact the obesity trends among children and adolescents.

In an attempt to address the ever increasing obesity epidemic in the United States, Congress enacted the Child Nutrition and Women, Infants and Children (WIC) Reauthorization Act of 2004 (Pub. L. No. 108-265, § 204), mandating that all local education agencies (LEAs) participating in the National School Lunch Program establish a local wellness policy (LWP) by July 2006. The law specifies that wellness policy components are to include goals for nutrition education, physical activity, and extra-curricular, school-related activities promoting student wellness. Additionally, schools must ensure that reimbursable school meals are in compliance with the Child Nutrition Act and Richard B. Russell National School Lunch Act, and all foods served and sold on campus during the school day must follow nutrition guidelines established by the LEA that promote student health with the intent of reducing childhood obesity. Districts also need to establish procedures to measure implementation of the policy and appoint an individual to oversee the implementation of and adherence to the policy. Finally, each district is required to have a committee consisting of parents, students, school nutrition (SN) personnel, the school board, school administrators, and public representation to develop and implement a school wellness policy.

The mandate for an LWP presents a unique opportunity for schools to form partnerships with health professionals, community organizations, food vendors, and parents to promote not only child and adolescent health, but also a healthy school environment. Principals, district administrators, and others having direct oversight with the planning, implementation, and assessment of an LWP are the gatekeepers to a healthier school environment. Their influence on nutrition and vending policies can impact the overall environment of health in each school. The focus of an LWP provides schools numerous opportunities to model healthy behaviors, and promotes a healthy school environment in the elementary school setting.

While principals, teachers, SN professionals, and parents can reinforce the nutrition curriculum by modeling and incorporating healthy behaviors into their daily activities, their efforts will be ineffective without appropriate training and education to implement healthy practices and policies.

Researchers at the National Food Service Management Institute, Applied Research Division (NFSMI, ARD) recognized the importance of a team approach, and conducted a study to identify attitudes of SN directors, principals, teachers, and parents regarding implementation of and perceived barriers to an LWP in the elementary
This study was initiated approximately eight months after the July 2006 date for implementation of the LWP. Researchers also explored their views toward school meals, healthy food options, dining environments, and nutrition education.

**OBJECTIVES**
The objectives of this study were to:
• Identify SN directors’, principals’, teachers’, and parents’ attitudes toward school wellness in the elementary school setting;
• Determine the importance of school meals, healthy food options, pleasant dining environment, and nutrition education in the elementary school setting;
• Identify barriers related to implementation of a school wellness policy; and
• Provide recommendations for successful implementation of an LWP in the elementary school setting.

**METHODS**

Research Plan
Focus groups with SN directors, principals, teachers, and parents were conducted to identify attitudes toward the wellness policy and perceptions of a healthy school environment. The qualitative data gained from the focus groups were used to develop a survey that encompassed all of the research objectives. The survey was pilot tested to evaluate the content of the instrument. After revisions were made, the final survey was mailed to a national sample.

Phase I - Focus Group Interviews
• Focus groups were conducted in four school districts, each representing a different USDA region.
• Focus group discussion questions were used to obtain information regarding attitudes and perceived benefits and barriers related to implementation of the wellness policy.
• The themes gathered during the focus group discussions were used to develop a quantitative survey instrument. The focus group questions and themes are presented as identified by participants.

Phase II

Survey Development
• NFSMI researchers reviewed the information from Phase I and developed a quantitative survey that included six sections: goals of the wellness policy; respondents’ roles and responsibilities; issues related to implementation; components of a healthy school environment; training and resources needed; and program and personal characteristics.

Pilot Testing the Survey
• The SN director who hosted each of the focus groups in Phase I participated in the Phase II pilot test of the survey. To test the protocol for the final survey distribution, one set of four surveys was mailed to the SN director for
each of the four school districts visited. Each SN director was instructed to complete a survey and distribute the remaining three identical surveys to a principal, a parent, and a teacher, representing the groups of the study respondents.

• State agency directors representing the seven USDA regions and serving as a committee representing all state agency directors overseeing the National School Lunch Program, participated in the pilot testing of the survey.

• Participants were asked to complete an evaluation form to assess the clarity and readability of the survey and cover letters. Modifications were incorporated based on the assessment findings.

Survey Distribution

• The final survey was mailed to 700 SN directors, representing the seven USDA regions. Each packet contained a total of four identical surveys, for a total of 2800 surveys being distributed nationwide.

• No identifying codes were placed on the surveys, preserving the anonymity of all respondents, and a postage-paid, self-addressed return envelope was included with each participant’s survey.

• Participants were given approximately one month to return the completed survey.

RESULTS AND DISCUSSION

SURVEY

Of the 2,800 surveys mailed and distributed, 575 were returned (20.5%). A healthy school environment was perceived by participants to be inclusive of all areas of school activities from the playground, classroom and cafeteria to fundraising, adult-student interactions, and adults modeling healthy behaviors. With high levels of agreement for every healthy environment survey statement, it is clear that the groups represented in the present study (principals, teachers, SN directors, and parents) play a valuable role in keeping the school environment healthy, emphasizing the need for a team approach. However, support from administration, teachers, and parents was viewed as a necessary component to achieving success in implementing an LWP. Without a supportive team to implement, manage, and evaluate the LWP, the potential for excellence would be challenging. Adequate training and credible resources serve as best practices for laying a foundation for achieving the LWP goals and fostering the need for an LWP team.

The groups of respondents were almost equally represented, with principals representing the majority of the respondents (30.4%) and parents representing the smallest group (20%). More than half (57.5%) of those returning the survey had an active role in implementation of the wellness policy, while nearly one-fourth (22.3%) had never heard of the wellness committee. Sixty-one percent of the respondents reported the LWP in their school as fully or partially implemented, while 2.5% indicated that implementation had not begun. Regarding methods to evaluate the effectiveness of the LWP, the majority of respondents (55%) indicated that they were unsure how to go about this task. Over one quarter of respondents (29%) believed having discussions at PTO meetings and staff meetings was an effective way to evaluate the effectiveness of an LWP, while surveying teachers, students and/or parents ranked at 21.7%.

Goals

Participants were asked to rank by importance nine goals for wellness policy implementation, with 4 as the highest rating of importance, 1 the lowest. “School meals meet USDA requirements” was ranked as the most important goal. “Physical education is included in the curriculum” was ranked second in importance, followed by “physical activity is part of the elementary school day.” The goal with the lowest ranking was “nutrition education is part of the elementary school day.” However, it should be noted that all mean values were above 3.0, which indicates all nine goals addressed were considered important.

When the same nine goals were used to assess attainment of the wellness policy, “not applicable” was added as an option, based on the assumption that some respondents would not know the level of attainment. The goal ranked with the highest level of attainment was “school meals meet USDA requirements.” “Physical education is included in the curriculum” and “physical activity is part of the elementary school day” were ranked as second and third in attainment. “Foods sold on campus include healthy

Data Analysis

• Surveys were analyzed using the statistical package SPSS Version 12.0 for Windows.

• Descriptive statistics included means, standard deviations, and frequencies of total responses.

• One-way Analysis of Variance was used to evaluate the differences in responses based on degree of implementation of the wellness policy, participant groups, and level of participation in the wellness committee.
benefits to implementation of an lwp

1. improved physical fitness among students (4.35)
2. promote life-long eating habits (4.29)
3. increased intake of healthy foods (4.28)
4. improved learning ability (4.15)
5. increased academic performance (4.12)
6. decreased illness (4.10)
7. decreased risk of chronic disease (4.05)
8. improved physical fitness among teachers and staff (4.01)
9. improved attendance (3.99)
10. improved behavior in the classroom (3.88)
11. improved eating habits at home (3.79)

barriers to implementation of an lwp

1. need the support of school administration (4.58)
2. need the support of teachers (4.57)
3. need the support of parents/families (4.47)
4. takes time to implement (4.34)
5. need funding to implement adequately (3.92)
6. limits choices of food students like (3.09)
7. decreased revenue from vending (3.06)
8. leave less time for “no child left behind” program (2.86)
9. will demand a lot of time from teachers (2.83)
Training and Resources Needed to Aid in Attaining School Wellness

In an effort to produce desirable outcomes, appropriate resources and adequate training are necessary elements when implementing school-based programs. Using a 5-point scale (5 = strongly agree to 1 = strongly disagree), respondents most strongly agreed that they needed training on “strategies to implement the school wellness policy.” The top five resources needed to implement the LWP are as follows: A nurse in every school, physical education instructors, parent education materials, current information on wellness issues, and exercise equipment.

CONCLUSION

SN directors, principals, teachers, and parents/guardians all play an important role in helping create a healthy environment for school-aged children. A team approach could be key to maximizing the effectiveness of an LWP. Each individual contributes a unique perspective valuable to the processes of planning, implementing, and evaluating an LWP. This team approach could lead to program sustainability, and ultimately, a healthy school environment with healthier students. This shared responsibility requires the commitment of all members associated with the school community.

PRACTICAL USE OF THIS INFORMATION

- Parents and teachers have a direct influence upon the students. Training resources designed specifically for parents and teachers, particularly nutrition education resources with a consistent wellness message, are needed. Also, open discussion at PTO meetings would help open lines of communication and foster involvement and support for LWP implementation.
- Information is needed for school administrators regarding leadership skills necessary to support, promote, and effectively form internal and external partnerships for enhancing school wellness.
- Train-the-trainer modules are needed for SN professionals to train staff on operational approaches regarding their role in supporting a healthy school environment.
- Creditable training resources providing strategies for effective implementation and assessment would be advantageous.
- Wellness and nutrition education teaching aids (computer aids, Web-based modules) are needed to support the nutrition education goal of an LWP.
- A best practice resource could provide a model for members of the school community to implement, manage, and assess an LWP that effectively impacts children’s health and wellness.