

# THE CHALLENGE



Childhood obesity is a costly public health issue with over \$14 billion spent annually on healthcare related to this epidemic.<sup>1</sup> More than 20% of children in the United States between the ages of two and five are overweight, and the prevalence of obesity among infants under two years of age has increased by 60% over the past three decades.<sup>2</sup> These statistics are particularly troubling, as weight in early childhood closely predicts weight in later childhood<sup>3</sup>, as well as adulthood.<sup>4</sup>

75% of children ages three to five are in childcare full time, spending an average of 29 hours per week in childcare centers. Given the widespread and increasing use of childcare, it is important to understand the current practices and policies in place to influence healthy habits in children. To reduce childhood obesity, it is important to establish healthy habits early in life, when eating and physical activity habits are developing. 

Implementing effective wellness policies and establishing best practices for physical activity and nutrition have been shown to promote healthy weight for young children in, and out of, the childcare setting.

Beyond regulations for Head Start programs and other centers participating in the Child and Adult Care Food Program (CACFP), there is no federal regulation regarding nutrition or physical activity for children ages three to five years in childcare facilities. Because of this, little is known about the the nutritional quality of foods served, physical activity levels of children, or promotion of healthy behaviors in these centers. The purpose of this brief is to explain results of an assessment used to understand the barriers and current practices in the promotion of healthy behaviors in the childcare setting.

## THE PURPOSE



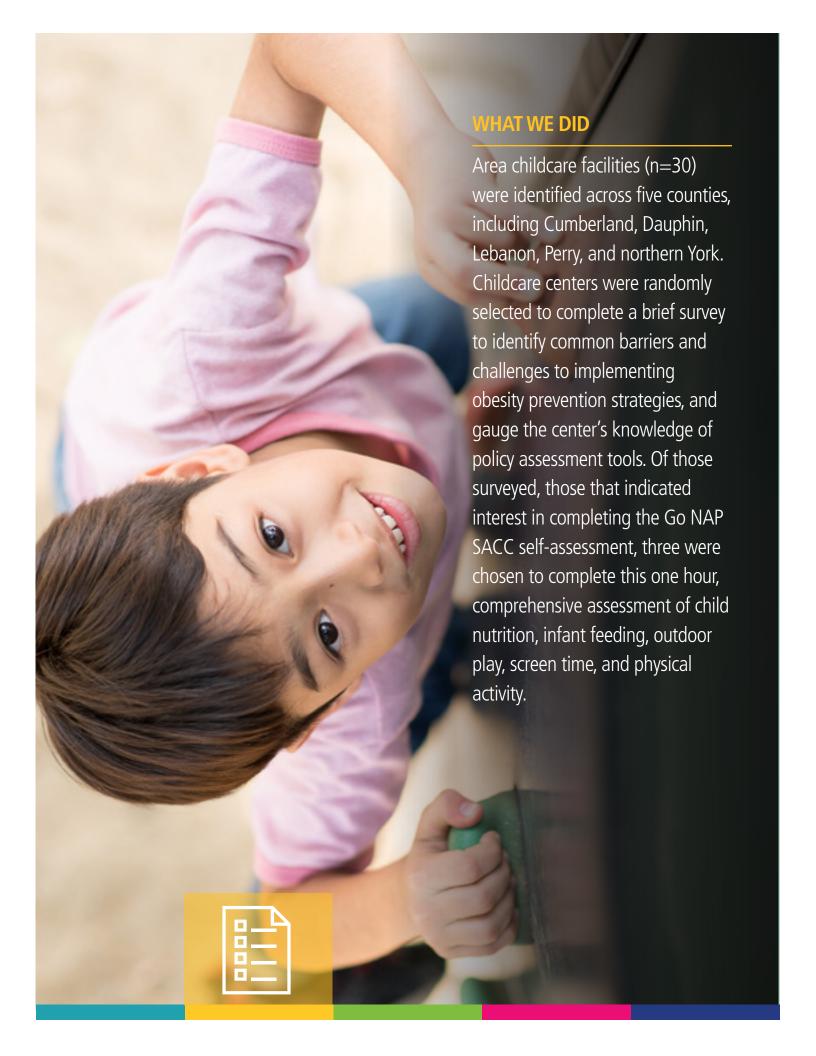
Penn State PRO Wellness sought to determine if childcare facilities were utilizing validated assessment tools to improve and promote wellness in their centers. We hoped to understand barriers to maintaining a healthy environment in childcare centers, and highlight awareness of assessment tools to further refine practices.

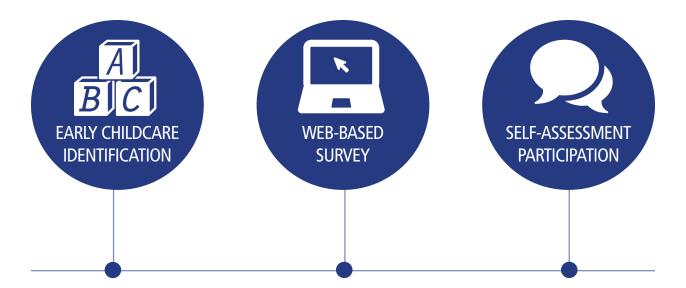
**PHASE 1:** We surveyed area childcare facilities (n=30) in five counties in central Pennsylvania to understand common barriers to obesity prevention and to determine awareness of evidence-based assessment tools for the nutrition and physical activity environment.

PHASE 2: Using the Go Nap SACC self-assessment tools, we surveyed three childcare facilities to collect additional practice and policy information in the topic areas of child nutrition; breastfeeding and infant feeding; infancy and child physical activity; outdoor play and learning; and screen time.

of children ages 3-5 are in childcare full time, spending an average 29 HOURS PER WEEK in childcare centers.







30 early childcare centers were identified in the state of Pennsylvania, representing Cumberland, Dauphin, Lebanon, Perry, and northern York Counties.

Childcare centers were asked to answer questions regarding local wellness policy, knowledge of self-assessment tools, and barriers to maintaining a healthy school environment.

Twenty-nine of the 30 childcare centers completed the entire survey.

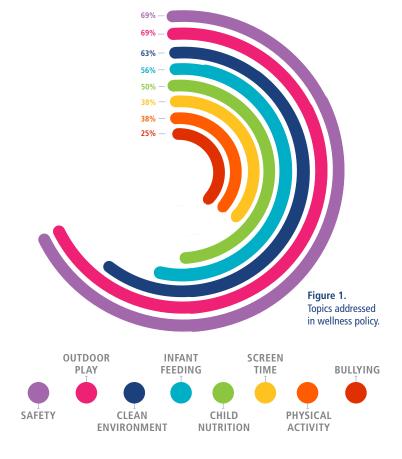
Participants were asked if they would be willing to participate in a self-assessment.

Of those that expressed interest, three were selected to complete a self-assessment.

## **CENTER WELLNESS POLICIES**

Sixteen of the 30 early childcare centers surveyed had a wellness policy. Those sixteen centers were then asked to select the topics addressed in their wellness policies. Topics included: bullying, child nutrition, clean environment, infant feeding and breastfeeding, infant and child physical activity, outdoor play and learning, safety, and screen time.

**Figure 1** shows the percentages of topics addressed in each center's policy. The most underrepresented topics within existing wellness policies included bullying, physical activity, and screen time. Only four of the 16 policies addressed bullying and six of the wellness policies included physical activity and screen time.



"Public school is constantly giving out 'rewards' to the children that are not healthy (ice cream parties, candy, cakes, etc.)."

FEEDBACK ABOUT CHALLENGES FACED



## **PHASE 1 SURVEY RESULTS**



#### **HEALTHY EATING**

Childcare centers identified children not liking the taste of healthy foods as the most common barrier to healthy eating, followed by lack of money to cover healthy food and snacks. Our web-based survey also provided a section for anecdotal responses, allowing centers the opportunity to identify additional barriers and challenges or to expand on their ranked choices. Other barriers to healthy eating included storage space, time and allergies. One director noted that she is responsible for buying the snacks and that it is a challenge to find the time each week to purchase fresh and healthy produce. Two additional childcare employees expanded on the challenge stating that "a lack of control due to parents providing foods," and "unhealthy packed lunches provided by parents is their biggest challenge." Another response noted that children are hesitant to try healthy foods prepared by the center.



# **PHYSICAL ACTIVITY**

The most common barriers to physical activity included lack of money and safety concerns. When prompted to expand on these barriers and challenges to physical activity, centers included physical disabilities, behavior problems, and lack of outdoor equipment. One center reported parents as a barrier, explaining that parents occasionally do not want their children to go outside in cooler weather of if they have a cold. Two centers expanded on staff barriers. One center said that a lack of enthusiasm and participation, namely on the part of older staff members, is a common barrier. Another center felt lack of staff training prevented staff from promoting new ideas or recommendations regarding physical activity.



"Parents don't want their child to go outside if they have a cold, in cooler weather."

FEEDBACK ABOUT CHALLENGES FACED



# **PHASE 1 SURVEY RESULTS**



### **SCREEN TIME**

The most common barriers to regulating screen time included the lack of parental support as well as children not wanting to play outside. When asked if there were any other barriers and challenges to regulating screen time, one center indicated screen time regulation was not required by their center and another stated, "We don't regulate." Two centers felt that electronic device use at home hindered their ability to limit screen time within the center. One staff member replied, "Parents promote devices at home and that conditions kids." Another center explained that screen time prior to lunch was necessary so staff could prepare lunch, citing that funding prevented them from increasing their staff. Similarly, a center director said that it is difficult to police each room for teachers who use movies as a way of taking a daily break.



### **OVERALL OBESITY PREVENTION**

The most common barrier to overall obesity prevention was lack of parental involvement, with seven of the centers ranking it as "most challenging." In addition to the six common barriers, centers also found lack of role modeling, unhealthy rewards, and lack of wellness incentive programs as barriers to overall obesity prevention. The director of one center felt that because staff are overweight themselves, they do not set a great example for fitness and activity within the center. Interestingly, centers indicated wellness policy enforcement as the least challenging barrier to obesity prevention in their centers.



Centers indicated having the most difficulty addressing screen time, as well as outdoor play and learning. Improvements in the practices in childcare settings and operation policies can directly affect what children eat and drink and influence their physical activity.

**PHASE 2 SELF-ASSESSMENT RESULTS** 



# PHASE 2 SELF-ASSESSMENT RESULTS



The Nutrition and Physical Activity Self-Assessment for Child Care (Go NAP SACC) was developed by researchers at the UNC Center for Health Promotion and Disease Prevention and was designed to help early care and education programs compare their nutrition and physical activity practices to best practice standards.8 The five-part assessment was administered to three randomly chosen childcare facilities that indicated interest in participation during the initial survey. This tool helped us to further determine the needs of childcare facilities and gain a greater understanding of current nutrition and physical activity practices in local centers.

The self-assessment allowed centers to examine their current practices and policies in the topic areas of child nutrition; breastfeeding and infant feeding; infancy and child physical activity; outdoor play and learning; and screen time. According to our phase two self-assessment results, centers demonstrated lowest scores in screen time, as well as outdoor play and learning.

Interestingly, centers indicated in the phase one web-based survey that lack of parental support was their most common barrier in regulating screen time; however, none of three centers that completed the selfassessment in phase two provided screen time education opportunities to parents. Further, one center provided no professional development (PD) for teachers and another center provided screen time PD less than one time per year. Centers also indicated that teachers rarely/sometimes talk with children about what they are seeing and learning during screen time.

Parental support was not assessed as a common barrier for physical activity in the phase one survey, but self-assessment responses indicated that parental education was lacking in the area of outdoor play and learning. Two centers offered no education for families on outdoor play and learning, and the third center provided outdoor play and learning education less than one time per year. One center offered no PD to teachers and staff related to outdoor play and learning, one center offered PD less than one time per year, and the remaining center only provided PD one time per year.





### **IMPLICATIONS AND NEXT STEPS**



Primary barriers to obesity prevention efforts in the 30 surveyed childcare centers included lack of parental support, funding, and time/effort dedicated to obesity prevention efforts. Parental support was one of the biggest barriers to overall obesity prevention in the surveyed centers, including regulation of screen time and outdoor play and learning (physical activity), which also happened to be the most under-represented topics addressed in wellness policies. Weak state standards, combined with weak or non-existent wellness policies governing physical activity and nutrition represent a missed opportunity to combat childhood obesity.

Centers may be able to gain the parental support needed to regulate screen time by offering education to parents that includes the recommended amounts of screen time for young children, appropriate types of programming for young children, appropriate supervision and use of screen time by caregivers, and the center's policies on screen time. Education on outdoor play and learning may include recommended amounts of outdoor play, using the outdoors to encourage children's physically active play, safety, and the center's policies on outdoor play and learning. Lack of education, and perhaps communication, on the part of the center creates a barrier between the parent and the center, affecting the overall practice of essential early childcare center policies.

Improvements in the practices in childcare settings and the policies under which they operate can directly affect what children eat and drink and influence their physical activity. Simple additions that could help promote healthful habits in children include:

- specifying how much time children should be physically active each day,
- preventing children from bringing electronic devices to the center, and
- regulating the nutritional quality of foods served.

We know that in school districts, the quality of the policy language is a strong predictor of successful implementation<sup>9</sup>, and that, often times, school districts require assistance in developing quality policy language.<sup>9-11</sup> The provision of technical assistance through local agencies may help to establish or provide recommendations for improvement of wellness policies, deliver effective obesity prevention programming, develop communication and outreach for families, and forge partnerships for sustainability of programming. Based on similarities in structure, administration, and population; application of these same principles would benefit early childcare centers.

A recent report released by the Centers for Disease Control and Prevention, provides information concerning state policy and system supports for obesity prevention in early care and education (ECE) settings. The first-ever ECE State Indicator Report<sup>12</sup> contains a framework that outlines 11 unique avenues by which states or communities have successfully changed childcare centers to incorporate obesity prevention through improved nutrition and physical activity, along with guidance on other wellness topics such as breastfeeding, screen time, and environment. This report is intended to be used by state health departments and ECE stakeholders to guide future ECE obesity prevention efforts and inform decision makers about existing policy and system support for ECE obesity prevention.

To address the barriers mentioned in this brief and recommendations in the ECE State Indicator Report, future work should include the development of educational materials and programming for parents and staff, delivery of professional development opportunities, and provision of technical assistance to establish community connections, coordinate programming, develop and implement wellness policies, and provide needed resources.



#### ABOUT PENN STATE PRO WELLNESS

Penn State PRO Wellness is committed to educating and inspiring youth and their families to eat well, engage in regular physical activity, and become champions for bringing healthy choices to life. PRO Wellness provides healthy eating and active living strategies to nearly 1,000 schools in Pennsylvania, as well as communities and corporate business partners. Advised by over 40 corporate, government and academic officials, PRO Wellness is highly visible in the health and wellness arena and positioned as a statewide thought leader in obesity prevention. As an integral component of Penn State Health Milton S. Hershey Medical Center's community service mission, our approach of prevention, research and outreach provides schools, communities and like-minded organizations with program development and implementation, assessment and evaluation, capacity building, technical assistance, collaborative partnerships and access to proven wellness interventions. For more information, visit med.psu.edu/PROwellness.

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