



## Healthy Students = Successful Learners

*“You cannot educate a child who is not healthy and you cannot keep a child healthy who is not educated.”*

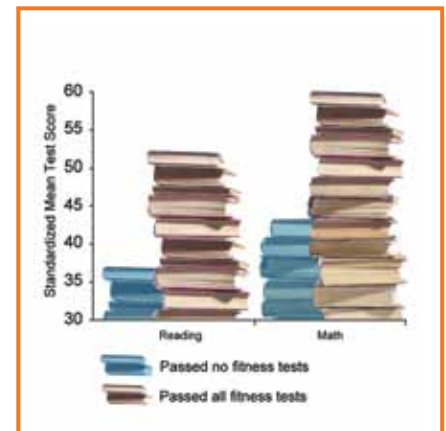
*- Dr. Joycelyn Elders, former US Surgeon General*

### Healthier Children Achieve Higher Test Scores

It’s intuitive—when students are physically healthy, their minds are better prepared to learn. What follows is mounting evidence of the academic value of providing children with good nutrition and adequate physical activity during the school day.

*Students who are more physically fit tend to have better grades and achieve higher test scores.*

- The Texas Education Agency reports that in a study of more than 2.4 million students, physically fit students (as measured by FITNESSGRAM®) were more likely to do well on the state’s standardized tests.<sup>1</sup>
- A 2009 study using public school data in Massachusetts revealed that the odds of passing the state math and English tests increased as a student’s fitness increased.<sup>2</sup>
- According to a 2005 study from California, which focused on the importance of physical education in schools, students with higher fitness scores had better SAT/9 test scores for reading and math.<sup>3</sup>
- In a 2005 study of Illinois children (third- through fifth-graders), researchers found that aerobic fitness, usually a result of being more physically active, was positively associated with cognitive function.<sup>4</sup>



Note. From: Physical Fitness and Academic Achievement  
Pediatric Exercise Physiology, Grissom, J., 2005; 8(1): 11-25.

*Healthy eating habits, including participation in school breakfast programs, are associated with higher academic test scores, improved daily attendance, and better classroom behavior.*

- A 2005 review of 22 research studies concluded that eating breakfast daily may enhance students’ cognitive function (particularly memory), academic performance, school attendance rates, psychosocial function, and mood.<sup>5</sup>
- A research study of third- through fifth-graders participating in a school breakfast program found that those students had significant gains in math, reading, and vocabulary test scores and reduced rates of tardiness and absenteeism.<sup>6</sup>
- A 2009 study of fifth-grade students showed a positive association between both overall diet quality and fruit/vegetable consumption and academic performance. Students with higher overall diet quality and fruit and vegetable intake were less likely to fail standardized reading and writing assessments.<sup>7</sup>

### Healthy Students are More Attentive and Better Behaved

Instructional time is a valuable commodity. All too often, precious moments of instructional time are lost on classroom management activities. Research suggests that providing students with opportunities to refuel with nutritious snacks and burn off some energy with physical activity can help maximize instructional time by improving attentiveness and decreasing disciplinary problems.

*Opportunities for healthy snacks and physical activity during the school day can help students to be more attentive during instruction.*

- A 2006 study showed that children participating in 10-minute, classroom-based Energizers showed up to 20% improvement in on-task behavior during academic instruction.<sup>8</sup>
- A 2009 research study of pre-adolescent children found that 20 minutes of moderate intensity walking on a treadmill was associated with improved attention and performance on academic achievement tests.<sup>9</sup>
- In the USDA Fresh Fruit and Vegetable Pilot Program, 107 schools offered free fruits and vegetables to their students, either in class, in the lunchroom, or in hallways. As a result, teachers reported an increase in students' attention during class and better student eating behaviors.<sup>10</sup>

*School-based programs that support healthy eating and physical activity have a positive impact on student behavior and are associated with decreases in disciplinary incidents.*

- In a Wisconsin school district, a comprehensive wellness program featuring healthy foods in the cafeteria and vending machines along with physical activity promotion was reported to substantially improve classroom behavior. Benefits reported by teachers and principals included fewer cases of student interruptions, fidgeting, and foul language as well as improved concentration and attendance. In addition, vandalism, drug and weapons violations, and expulsions were described as “nonexistent.”<sup>11</sup>
- A 2009 national study concluded that at least one daily recess period of more than fifteen minutes for 8 to 9 year old students was associated with improved class behavior, according to teacher ratings.<sup>12</sup>
- The same Texas study that showed a connection between physical fitness and academic performance also revealed that higher fitness levels were associated with better school attendance and fewer disciplinary incidents, such as truancy, violence, drugs, and alcohol.<sup>1</sup>

### What Can You Do?

Research consistently supports the connection between health and student success in school. So for schools, creating and promoting a healthy environment for children and youth is a wise investment. Districts can take action by implementing comprehensive school wellness policies that

- **improve access to healthy foods (and limit unhealthy foods) throughout the school campus;**
- **expand opportunities for physical activity during the school day; and**
- **provide comprehensive health and nutrition education.**

For more information on what you can do to make Delaware's kids the healthiest in the nation, please visit us at [www.GrowUpHealthy.org](http://www.GrowUpHealthy.org)

### References

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