Fit In PE: An Interdisciplinary Approach to Elementary Physical Education

Stephanie Raymond
Graduate School of Education, Touro University – California

Introduction

With extensive budget cuts to physical education programs across the nation, elementary school classroom teachers are being called upon more frequently to provide physical education instruction to their students. However, because many classroom teachers have not received professional preparation in physical education, they are reluctant to incorporate the subject into their curriculum (California Endowment, 2008). Additionally, increasing pressure to meet standardized testing benchmarks for core subjects often leads teachers to sacrifice physical education in order to make more time for more "academic" studies. For these reasons, daily physical education has become a rarity in elementary schools.

As physical education has declined, childhood obesity has increased to alarming rates. As of 2013, obesity was considered the most critical health problem facing children (CDC, 2013). Physical education classes in elementary schools are crucial for preventing obesity and improving health among youth because they have the potential to provide 97% of children in the United States with regular physical activity (Sallis et al., 1997). In addition to combating obesity, physical education can improve academic performance, decrease discipline problems, and increase concentration (ADDitude Editors, 2007/2008; California Endowment, 2008; Mitchell, 2009; PHIT America, 2013c; Sallis, McKenzie, Kolody & Curtis, 1996; Taras, 2005; Trudeau & Shephard, 2008). With so many health, academic, and physiological benefits to be gained, the role of schools in providing daily physical activity needs to be reevaluated and expanded (Pate, Davis, Robinson, Stone, McKenzie, & Young, 2006).

Project Background

After learning that many teachers avoid physical education because they fear taking time away from academic subjects will result in lowered test scores, I was inspired to create a tool to help this situation. Even though studies suggest reducing time spent on academic subjects by as much as an hour each day does not negatively affect standardized testing scores and increasing physical education time can actually increase academic success, teachers are still reluctant to dedicate class time to physical education. , teachers are still reluctant to dedicate class time to physical education (Trudeau & Shephard, 2008).

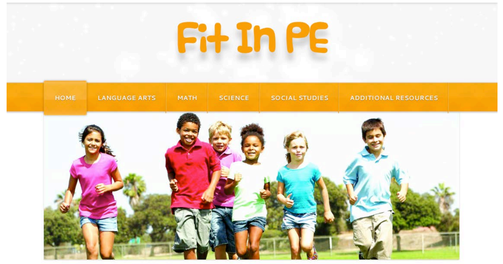
Because a lack of time is one of the biggest deterrents, it seems teachers would be more likely to incorporate physical education if it could be taught at the same time as academic subjects. An interdisciplinary approach was a solution that would increase physical education without taking time away from other subjects.

After researching interdisciplinary physical education, it was evident that there was a shortage of resources for this methodology. The few websites and books available were not easy to locate and consisted mainly of full lesson plans. Because teachers would have to go through the effort of replacing their existing lesson plans, it seemed likely that they might not use a resource that provides full lesson plans. Based on this assumption, a conclusion was made that a website that offers strategies for incorporating physical education into existing lesson plans could be a helpful resource.

Project Design

The website, which was named Fit In PE, was designed for kindergarten through third grade classroom teachers. The website lists strategies teachers can use to incorporate physical education elements into their existing language arts, math, science, and social studies lesson plans.

Content for the website was gathered from Interdisciplinary Elementary Physical Education by Cone, Werner, and Cone, Dynamic Physical Education for Elementary School Children by Robert Pangrazi, and the website PECentral.org. Strategies were chosen based on how easily they could be incorporated into existing lesson plans.

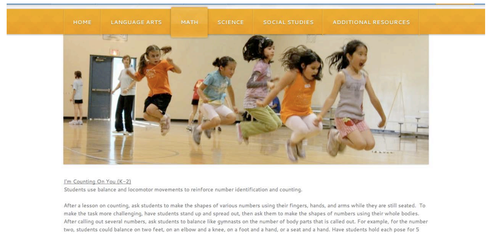


Strategies For Incorporating More PE Into Your Classroom

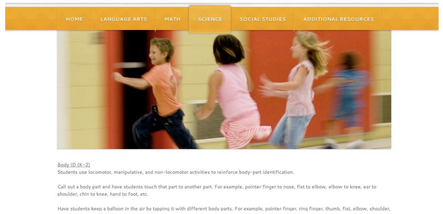
The website was established using the website builder Weebly. Tabs were created for language arts, math, science, and social studies and strategies for each subject were added to their respective tabs. Tabs were also created to explain the benefits of both physical education and an interdisciplinary approach. An additional tab with links to helpful physical education resources was also included.

The Language Arts tab contains a variety of strategies teachers can use to incorporate physical education into their existing language arts lessons. For example, 'Action Vocabulary' involves reading Where the Wild Things Are and then having students act out the actions, such as hopping, skipping, and jumping, which occurred during the wild rumpus. Then students create their own rumpus dances and share them with their classmates. This lesson idea can be adapted for any book that contains action vocabulary words.

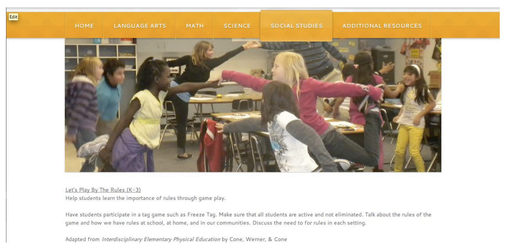
Another strategy example is 'Alphabet Gymnastics'. With this strategy, students use balance and locomotor movements to form and hold the shapes of letters using their bodies. This activity reinforces letter recognition and reproduction and can be adapted for use with almost any lesson plan that involves letter recognition.



The Math tab contains strategies teachers can use to incorporate physical education into their existing math lessons. For example, there is a description of how students can perform physical activities as a way to gather data to use for problem solving. For example, students could time how long it takes them to run around a lap around the track. Then they can use the data to make calculations such as miles per hour, average pace, feet per second, etc.



The Science tab contains strategies teachers can use to incorporate physical education into their existing science lessons. For example, 'Body ID' gives several ideas on how locomotor, manipulative, and non-locomotor activities can be used to reinforce body-part identification. For example, have students keep a balloon in the air by tapping it with different body parts, such as their pointer fingers, ring fingers, thumbs, fists, elbows, shoulders, feet, heads, noses, wrists, knees, etc. Have them count have many times they can keep the balloon up with each part. To make it more challenging, use beach balls.



The Social Studies tab contains strategies teachers can use to incorporate physical education into their existing social studies lessons. For example, 'Let's Play By The Rules' helps students learn the importance of rules through game play. Students participate in a tag game such as Freeze Tag where all students are active and not eliminated. Before or after playing the game, the teacher can have a discussion with the class about the rules of the game and why we have rules at school, at home, and in our communities.

Conclusions

The original objectives of the project were:

- To create a website with interdisciplinary physical education lesson plans and activities that are aligned with the Common Core standards for fifth grade.
- To survey teachers to determine if the website is complete, easy to use, helpful, and clear.
- To determine and execute any improvements that need to be made to the website.

Throughout the course of study, these objectives were modified. For the first objective, the original idea was to post full interdisciplinary physical education lesson plans for the fifth grade level. However, it was later determined that full lesson plans may not be a particularly helpful resource because teachers would have to go through the effort of replacing their existing lesson plans. Based on this assumption, the conclusion was made that the website should instead offer strategies for incorporating physical education into existing lesson plans. Also, because the modified objective was broader than the original, the grade level was changed from fifth grade to kindergarten through third grade. The second and third objectives were omitted because the time frame of the study was not long enough to allow for their completion.

Literature Cited

ADDitude Editors. "Exercise: An alternative ADHD treatment without side effects". *ADDitude Magazine* December 2007/January 2008: 1-3. Online.

California Endowment. (2008). *Physical education matters: A full report.* Retrieved from http://www.calendow.org/uploadedFiles/Publications/By_Topic/Disparities/Obesity_ and_Diabetes/PE%20Matters%20Long%20VersionFINAL.pdf

Center for Disease Control and Prevention. (2013). *Childhood obesity facts.* Retrieved from http://www.cdc.gov/healthyyouth/obesity/facts.htm

Mitchell, M. (2009, March 31). *Physical activity may strengthen children's ability to pay attention.* Retrieved from http://news.illinois.edu/news/09/ 0331activity.html

Pate, R., Davis, M., Robinson, T., Stone, E., McKenzie, T., & Young, J. (2006). Promoting physical activity in children and youth : A leadership role for schools. *Circulation*, *114*, 1214-124. Doi: 10.1161/CIRCULATIONAHA.106.177052

PHIT America Foundation. (2013c). *Four breakthrough studies: Physical activity reaps report card results.* Retrieved from http://www.phitamerica.org/News_Archive/ More_Sweat ___Better_ Academics.htm

Sallis, J., McKenzie, T., Kolody, B., & Curtis, P. (1996). Assessing district administrators' perceptions of elementary school physical education. *Journal of Physical Education, Recreation, and Dance*, *67*(8), 25-29.

Sallis, J., McKenzie, T., Alcaraz, J., Kolody, B., Faucette, N., Hovell, M., & Curtis, P. (1997). The effects of a 2-year physical education program (spark) on physical activity and fitness in elementary school students. *American Journal of Public Health*, *87*(8), 1328-1334.

Taras, H. (2005). Physical activity and student performance at school. *Journal of School Health*, *75*(6), 214-218.

Trudeau, F., & Shephard, R., (2008). Physical education, school physical activity, school sports, and academic performance. *International Journal of Behavioral Nutrition and Physical Activity, 5 (10)*, 1-12. Doi:10.1186/1479-5868-5-10.

Acknowledgments

Thank you to Roger Pence for his guidance over the course of this project. Thank you also to my parents and Alex for their assistance and encouragement and Jessup Cellars for their support and flexibility.

TOURO UNIVERSITY
CALIFORNIA