

LESSON 5: CELL PHONE APPS AND MILE RUN/WALK

Grade-Level Outcomes

Primary Outcome

Fitness knowledge: Uses available technology to self-monitor quantity of exercise needed for a minimal health standard and/or optimal functioning based on current fitness level. (S3.M8.8)

Embedded Outcome

Engages in physical activity: Participates in a self-selected lifetime sport, dance, aquatic or outdoor activity outside of the school day. (S3.M5.8)

Lesson Objectives

The learner will:

- use a heart rate monitor to self-monitor the amount of exercise in which he participates.
- use a smartphone application to self-monitor the amount of exercise in which he participates.
- participate in a mile run/walk.

Equipment and Materials

- Overhead LCD projector
- Students' smartphones (depending on school policy)
- IHT heart rate monitors that estimate Calories (kcal) burned (for students without smartphones)

Introduction

Today, we are continuing our module of study where you will use available technology to self-monitor the quantity of exercise needed for a minimal standard and for optimal functioning. This time, you will use a smartphone app to monitor the quantity of exercise you do during class today.

Instructional Task: Cell Phone App Demonstration

■ PRACTICE TASK

With an overhead LCD projector, demonstrate the features of a fitness or physical activity tracker. Make sure to demonstrate how to locate the number of Calories (kcal) that are expended. Other features to point out include:

- Distance traveled
- Speed
- Map

Students can follow along with their own cell phone app and share with others in the class.

Extensions

- A number of students can share apps that you may not be familiar with and the features they like most about them.
- Hand out a data sheet from someone's workout using one or two of the apps. Have students point out the important pieces of data on the data sheet.
- Introduce other physical activity tracking devices (e.g., Fitbits) as well.

Student Choices/Differentiation

- Students can use various smartphone apps.
- Provide examples of data printouts from workouts using the apps.
- Students can work in groups when analyzing the reports.

What to Look For

Make sure that students can locate the features of the app they are using, specifically the total number of Calories.

Instructional Task: Mile Run/Walk

■ PRACTICE TASK

Have students wear heart rate monitors if they do not have a cell phone app.

Students who have cell phone apps should turn them on and select running.

Using the physical activity tracker of choice, have students track their fitness on a mile run/walk.

Extension

Discuss the purpose of the mile/run walk.

Refinement

Make sure students know how to use the technology before starting the mile run/walk.

Student Choices/Differentiation

- Students can run, walk, or do both.
- Students without a cell phone app can pair up with a partner who runs or walks at their approximate speed.

What to Look For

Students should use their cell phone apps to keep track of their running distance.

Formal and Informal Assessments

Mile run/walk homework

Closure

Today, you used technology to track how much physical activity you were able to obtain in a typical physical education class. Based on the data you collected and the amount of physical activity you determined necessary, what can you conclude? Do you think the data was the same even though you used a different device?

- Students should conclude that we need additional physical activity outside of physical education if we want to be healthy (i.e., a typical physical education class does not provide enough time to get enough physical activity).
- Ask students if their use of technology provided them with additional motivation.

Reflection

- Based on the data collected, does it appear as though any students are having issues with putting on the heart rate monitor correctly?
- Do students seem to be more engaged when they are able to use their own smartphone technology and app?

Homework

Compare the quantity of exercise you obtained today during the mile/run walk with the guidelines you calculated the other day.

EMBEDDED OUTCOME: S3.M5.8. Participate in a self-selected activity that will allow you to obtain the guideline of your choice (either a minimal standard or optimal functioning standard).

Resources

Corbin, C., Pangrazi, R., & Welk, G. (1994). Toward an understanding of appropriate physical activity levels for youth. *Physical Activity and Fitness Research Digest*, 1(8), 1-8.

Interactive Health Technologies Spirit System (heart rate monitor supplier and cloud management system)