

Inquiry Plan—Grade 10 Active Living: Physical Fitness

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Curriculum Expectations (Grade 10)

1.1 - use self-awareness and self-monitoring skills to help them understand their strengths and needs, recognize sources of stress, take responsibility for their actions, and monitor their own progress as they participate in physical activities, develop movement competence, and acquire knowledge and skills related to healthy living

1.5 - use a range of critical and creative thinking skills and processes to assist them in making connections, planning and setting goals, analysing and solving problems, making decisions, and evaluating their choices in connection with learning in health and physical education

A2.2 - describe factors that affect personal fitness, and explain the benefits of developing fitness as part of an overall healthy active way of life [PS,CT]

A2.3 - assess their level of health-related fitness during various physical activities, and monitor changes in their health-related fitness over time [PS, CT]

A2.4 - develop, implement, and revise a personal fitness plan [PS, CT]

Big Ideas

1. Being fit helps to improve one's quality and enjoyment of life and there are many factors that can affect personal fitness.
2. Your decisions and actions affect your level of fitness.
3. Understanding yourself and being aware of your personal fitness including changes over time can help when setting goals to improve various aspects of fitness.

Possible Inquiry Question:

What does being fit mean for me?

How will being physically fit benefit me now and in the future?

How will I continue to develop different aspects of my fitness to benefit my overall health?

What Students Need to Know

- Factors that affect personal physical fitness
- Benefits of developing fitness as a part of healthy active living
- How to design, implement, and revise personal fitness plans
- Identify components of health-related fitness
- Methods to personally assess health-related fitness and monitor it over time

What students need to be able to do

- Assess levels of personal health-related fitness during physical activity
- Describe the factors that affect their personal fitness
- Demonstrate activities to help improve at least one of the health-related components of fitness
- Set goals to improve personal health-related fitness
- Create a personal fitness plan to reach those goals as a part of an overall personal fitness plan
- Monitor goals over time and revise goals as needed

Inquiry Plan—Grade 10 Active Living: Physical Fitness (cont.)

Culminating Assessment (Assessment of Learning)

Students explore and investigate the benefits of health-related components of fitness, factors affecting personal physical fitness, and ways to assess and monitor health-related components of fitness by developing, implementing, and revising a personal fitness plan.

Students communicate their findings through:

- Creating a personal fitness plan based on personal assessment results and current needs
- Revising this plan based on information gathered through monitoring over time
- Creating a written, visual, or audio public service announcement for the school community showing awareness of the factors that affect physical fitness, to promote the benefits of being physically active to youth

Reflection: After completing a culminating task students revisit and complete their KWLHQ Chart, reflecting about what they have learned, what new questions they have as a result of their findings, and what next steps they can take.

Activating Prior Knowledge

Alphaboxes (Appendix M)

Working in a large group, students fill in a word related to the health-related components of fitness starting with each letter of the alphabet as identified on Appendix M. A word can be an activity, fitness-related vocabulary term, whatever comes to mind when thinking about fitness (e.g., A—aerobic, B—breath rate, C—crunches). Consider having students complete the chart while they are entering the activity space, getting equipment ready, and preparing to warm-up.

KWLHQ Chart for Health-Related Physical Activity (Appendix N)

Working individually at the beginning of the unit/inquiry, students fill in what they already know about health-related fitness, what they want to know, and how they'll find the answers using Appendix N. Students revisit and complete their KWLHQ chart to reflect on what they have learned and what new questions have occurred to them throughout the different parts of the inquiry process.

Infographics

Working in pairs, students examine a variety of age-appropriate infographics related to the health-related components of fitness. As appropriate, model questioning for students to support various learner needs. For example:

- Why is it bad for your health to exceed your maximum heart rate?
- Why are 50% of youth not physically active on a regular basis? What's stopping them?
- What components of fitness do I work the most when I play hockey on my league team?

Questions could be recorded in their KWLHQ Chart, on a “Wonder Wall” in the activity area, or on an online message board used for ongoing class reflections.

Exploring Health-Related Components of Fitness

Create a circuit with various fitness assessments to be completed and recorded by the students. Intersperse four discovery stations each with information about one of the health-related components of fitness and a piece of chart paper. Place different pieces of equipment (pylons, weights, skipping ropes, hula hoops, balls, etc.) at these stations. Students examine the equipment and brainstorm physical activities that can be used to work on and improve that component of fitness and record them on the chart paper on the wall.

Inquiry Plan—Grade 10 Active Living: Physical Fitness (cont.)

Instructional Activities

Effect of physical activity on the body

Students perform three different physical activities for 1 minute each, such as walking, jogging, and jumping jacks, and record their observations about their heart rate, rate of breath, and other feelings and evidence of exertion.

Exploring and assessing health-related components of fitness

Students investigate the different components of health-related fitness at stations exploring the different types of equipment and physical activities that can be used to work on and improve each health-related component.

Students try out a variety of fitness assessments for the different components and record their results. Students then analyse the results to determine their areas of strength and areas for improvement.

Factors affecting physical fitness

In small groups, students brainstorm different factors that affect a person's level of fitness (heredity, cultural background, finances, time, physical challenges, etc.). Have students create two lines facing each other, and then pair up with the person across from them. Have pairs perform on-the-spot warm-up activities for 30 seconds per activity. Call out one factor that affects a person's level of fitness and have pairs discuss. Repeat the sequence for as long as desired to achieve an effective warm-up and for students to discuss some of the factors.

Personal Fitness Plan

Students learn about developing a personal fitness plan, the F.I.T.T. (Frequency, Intensity, Time, Type) principle, SMART (Specific, Measurable, Achievable, Results-Oriented, Time-Bound) goals, and how these applies to developing, implementing, and revising a fitness plan as needed.

Students practise setting a goal as one component of their overall personal fitness plan, and they exchange goals with a peer to assess based on criteria established at the start of the task.

Students create Action Plan statements to help them meet their SMART goals and support their overall personal fitness plan. (E.g., "If I engage in additional cardiovascular activity, then my body will adapt and I will improve my results on the 12-minute run test, thus improving my cardiovascular fitness.")

Assessment For/As Learning

Physical Activity Assessment Results Tracking sheet (Appendix O)

Teacher observations using Anecdotal Recording Chart (Appendix P)

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Goal Setting Checklist Peer Assessment (Appendix Q)

Inquiry Plan—Grade 10 Active Living: Physical Fitness (cont.)

Possible Reflection Questions for Unit

- How do I develop an appropriate fitness program and find the motivation to commit to it?
- How does participating in physical activity make me feel?
- What are the physical and social benefits of participating in physical activity?
- What affects my personal fitness?
- Why is lack of physical activity unhealthy?
- What do I need to do to be physically fit?
- How did I challenge myself today?
- What adjustments do I need to make tomorrow?
- How do you measure physical fitness?
- How do you maintain physical fitness?
- How can goal setting improve personal fitness levels?

Note: A fitness inquiry folder/notebook could be used for students to record:

- questions they have
- information gathered about factors affecting health and physical activity
- health-related components
- assessment results
- reflections about how they feel and impact on their physical, mental, social, and emotional health
- questions about what they might consider changing or adjusting
- conclusions about their fitness level and improvements
- decisions made in creating their personal fitness plan, and
- reflections about any part of the process.

Appendix M: Alphaboxes

In each box, try to write any words that begin with that letter and are related to Health-Related Fitness.

A	B	C	D	E
F	G	H	I	J
K	L	M	N	O
P	Q	R	S	T
U	V	W	X	YZ

Appendix N: KWLHQ Chart for Health-Related Physical Activity

What do I <u>k</u> now?	What do I <u>w</u> ant to know?	<u>H</u> ow will I find out?	What did I <u>l</u> earn?

What questions do I have now?

A large, light blue rectangular area intended for students to write their questions.

Appendix O: Physical Activity Assessment Results Tracking Sheet

Do each activity for 1 minute. Record your observations. Rest 1 minute between each activity.

Activity	Heart Rate • Beats per minute	Breathing • No change • I can hear my breath • I'm breathing hard	Talk Test • Can't talk • Can talk with some gasping • Can talk easily	How hard are you working? • Going easy • Medium hard • Working my hardest	Other effects you feel
Walking around pylons					
Jogging around pylons					
Jumping Jacks					
Running full speed around pylons					
Plank (partial or full)					
Squats					
Push Ups (partial of full)					
Downward dog					

What activity challenged you the most?

What helps you determine whether the intensity of an activity is moderate or vigorous?

Appendix P: Anecdotal Recording Chart

Success Criteria:

- Identifies how being fit helps to improve the quality and enjoyment of life
- Identifies that there are many factors that can affect personal fitness
- Identifies how decisions and actions affect someone’s level of fitness
- Demonstrates an understanding of personal fitness including how changes over time can help when setting goals to improve various aspects of fitness

Student Name					
Evidence					
Student Name					
Evidence					
Student Name					
Evidence					
Student Name					
Evidence					

Appendix Q: Goal Setting Checklist Peer Assessment

Glow

Identify glowing ways your partner met the success criteria for the task.

Grow

Identify areas of growth your partner needs to work on to meet the success criteria for the task.