**North East School Division**



**Unpacking Outcomes**

|  |
| --- |
| **Unpacking the Outcome** |
| **Analyze 🡪 physiological principles****Analyze 🡪 biomechanical principles** |
| **Outcome** (circle the verb and underline the qualifiers) |
| **PE 30.8 Physiology and Biomechanics – Analyze physiological and biomechanical principles of movement.** |
| **KNOW** | **UNDERSTAND** | **BE ABLE TO DO** |
| * Short and long term effects of over-training – lack of muscle growth and degeneration of joints
* Vocabulary – physiological, biomechanics, analyze, over-training, atrophy, degeneration, complex skill, critique, **proper execution,** anatomical
* Difference between short term training program and long term training program
 | * Proper biomechanical execution will lead to desired outcomes
* Improper biomechanical execution will lead to injury/less than desirable results
* Proper physiology can influence your biomechanical execution
* Participating in multiple activities is important to physiological development
* Proper nutrition is a key component of physiological change
* Rest and active recovery are critical for movement proficiency
 | * Analyze the physiological benefits of short and long term training programs.
* Identify, through participation, the steps required to execute self-selected movement patterns and complex skills.
* Critique, for self and others, various movement patterns and complex skills for proper biomechanical (e.g., rotation of a wrist, flexion of a joint and body position) execution.
* Identify, through participation, the movement patterns required to execute self-selected weight training exercises (e.g., proper form for bench press) and fitness activities (e.g., proper foot plant for long distance running).
* Critique, for self and others, various weight training exercises and fitness activities for proper biomechanical execution.
* Discuss the potential long-term effects of using improper movement patterns in a specific activity.
* Investigate the importance of rest and active recovery as part of a fitness or training plan.
* Discuss the possible short- and long-term effects (e.g., lack of muscle growth and degeneration of joints) of over-training on an individual’s physiology.
* Explore the importance of participating in multiple activities to support physical development.
 |
| **ESSENTIAL QUESTIONS** |
| **How do I know when I am, or someone else is executing a complex skill properly?****What are the physiological developmental benefits of participating in multiple activities?****What are long and short term effects of proper and improper execution of skills?****How are biomechanical execution and physiology connected?****How can I get better? How do biomechanics and physiological principles help me get better?****What are the roles of rest, recovery and nutrition in movement development?** |