

Name:

Date:

Topic 5.1 #2

IB SEHS



The Stability of the environment

The Size of the musculature



Open -----Closed

Fine -----Gross

The distinctiveness of movement characteristics



State the relationship between: skill, ability & technique

5.1.5 Outline Ability

- The term “_____” is often confused with the term _____, however, although they are related, they are _____ the same thing.
 - As mentioned in the previous section, skills are largely _____ by their _____, goal or objective, and by the fact that they _____ practice.
 - **Abilities, however, are the _____ that we are born with.**
 - They are the _____ and _____ attributes, inherited from our parents that enable us to perform skills. Abilities give us the capacity to perform skills.
 - **Perceptual-motor abilities** are _____ that enable the individual to _____ information about how and when to move.
 - For example, in order to _____ a skill such as a forehand groundstroke in tennis.
 - **Motor abilities** are those abilities relating to the actual _____.
 - For example, in order to perform a skill such as the 100 meter sprint individuals require _____ abilities such as _____ strength and speed of limb movement.
- Abilities are the _____ that enable individuals to perform the skill and, compared to skills, they are much more stable and _____.
- Other examples of the abilities that enable us to perform sports skills are _____ endurance, _____, flexibility, _____ and balance.
- Individuals _____ in the strength of their abilities.
 - Those individuals who have _____ abilities that benefit a _____ skill or activity will appear to demonstrate _____ in that activity with relative ease.
 - However, it is only with practice that someone becomes truly _____
 - It is important to _____ that ability is not the only factor that contributes to _____ performance.
 - Failure to _____ in practice time may also result in a below-par (low skill level) performance.

Factors affecting abilities

1. An individual’s abilities are shaped by biological and physiological factors (Fleishman, 1964).
2. The composition of an individual’s muscular tissue is certainly going to affect their physical proficiency motor abilities such as strength, endurance, and flexibility.
3. Physiological deficits in the development of rods and cones (in eyes) would also limit an individual’s perceptual-motor abilities, potentially affecting reaction time.
4. Abilities are also affected by environmental factors. For example, children who are afforded formal education will continue to develop their verbal and reasoning abilities throughout their academic years, just as children who participate in physical fitness- or sport-related programs will develop their motor abilities.
5. The rate at which abilities develop varies across childhood and adolescence, both within individuals and across individuals. This is largely due to growth and maturation changes. The rate of development levels out between the ages of 18 and 22 years, remaining relatively stable throughout adulthood (Fleishman, 1964)

5.1.6 Distinguish between Fleishman's physical proficiency abilities & perceptual motor abilities

- One of the major researchers into abilities was Edwin _____ . Using a _____ method called factor analysis **Fleishman** identified a number of abilities.
 - **Physical proficiency abilities** consist of _____ movements/use of _____ muscle groups (ex physical factors).
 - **Perceptual motor abilities** are a _____ of how we make sense of our _____ (perception) and how we act (motor control) (ex psychomotor factor).

PERCEPTUAL-MOTOR ABILITIES	PHYSICAL PROFICIENCY ABILITIES
Control precision (control over fast, accurate movements that use large areas of the body)	Extent (or static) flexibility
Multi-limb coordination	Dynamic flexibility
Response orientation (selection of the appropriate response)	Static strength
Reaction time	Dynamic strength
Speed of arm movement	Explosive strength
Rate control (coincidence-anticipation)	Trunk strength
Manual dexterity	Gross body coordination
Arm–hand steadiness	Gross body equilibrium
Wrist–finger speed (coordination of fast wrist and finger movements)	Stamina (cardiovascular fitness)
Aiming	
Postural discrimination (coordination when vision is occluded)	
Response integration (integration of sensory information to produce a movement)	

5.1.7 Define the term technique

5.1.8 State the relationship between ability, skill and technique

- We have used the words “ _____ control” to describe how we act or move.
 - Another word that can be used to describe how we move is “ _____”.
 - When physical educators and _____ talk about technique they are commenting on the way the _____ controls his or her limbs.
 - It is a part of what we mean by skill but not the only part.
 - In order to perform _____ the **person must have the _____ technique** or techniques and **choose the _____ one to use in any particular situation.**
- In other words: **Skill = Ability + Selection of the correct technique**

5.1.9 Discuss the differences between a skilled and a novice performer

- Skilled
 - Watching highly skilled performers is uplifting.
 - Everything they do looks _____.
 - Their movements are _____, they know what they want to achieve and how to achieve their goals.
 - They are very efficient, energy is not _____ and there is great _____ in their performances

- Novice
 - Novices are _____.
 - They can and do _____ produce a good performance but _____ they do not.
 - They are far from _____ and appear to lack _____.
 - Their _____ are inefficient and often we cannot tell what they are trying to do.
 - Sometimes they do not _____ what they are trying to do.

Are genetics the most important factor in becoming a skilled performer?