General Training Principles

Any athlete who competes at a national and international level is a highly trained individual who excels in a specific sport after accumulation of many years of extensive physical and psychological training. Such athletes take their physical performance to new levels.

Training is a process of repetitive exercising that is designed to increase the level of the athlete's skills and strength in increments. Part of training involves learning new skills and modifying old skills with the ultimate goal of improving and optimizing their physical performance.

The key to improvement in athletic performance is to develop a comprehensive and well organized system of training. A training program must understand and support training phases that are structured and sport-specific to enhance the athlete's energy requirements of the sport.

Technique is considered to be critical in the sport of figure skating because of their complex nature. Strength and flexibility are tools that allow skaters to respond well to training. However, the fatigue factor requires muscles to rest and recover as part of the training, plan.

Training is a form of stressing the body, which causes it to adapt and respond to future demands at a higher performance threshold. If the stress of training is consistently and correctly applied, the body will adapt in a positive way. Stress improperly and/or inconsistently applied will cause the body to either not adapt or adapt negatively.

Successful coaches prescribe drills that are based on the following commonly accepted Principles of Training:

- 1. **Progressive Overload** manipulates the training load by combining intensity and volume. Increasing either over time produces adaptation to the specific exercise activity promoting physiological improvement. Volume and intensity are mutually exclusive as it is not possible to pursue both simultaneously.
- 2. **Specificity** of any sport, including figure skating, places specific demands on the body:
 - a) Specific patterns of joint and muscle co-ordination.
 - b) Specific adaptation of the cardiovascular system to the activity with little or no crossover benefits to other sports
 - c) Targeting a particular muscle for training to perform a specific activity does not generalize to all muscle fibers.
- 3. **Variability** in the sport figure skating is exhibited by the proficiency in the variety of movements by those in the sport seeking to increase their agility and over-all co-ordination. Advances in sports medicine have helped reduce the risk of injury and forms the foundation for the continuing the expanded artistic expression in the sport.
- 4. **Individual Differences** exist between individuals exposed to an equivalent training program. Progress will occur at different rates and levels achieved will vary because of genetic differences

and training programs must be individualized to maximize result for each individual.

5. **Reversibility** is the body naturally de-conditioning when training ceases. This process can occur rapidly when skaters stop training and pushing their body to achieve higher performance levels.

Both test and elite track figure skaters need to participate in a training program that is based on these training principles.

Everyone who competes should train properly, but it is more important that a skater with a limited practice schedule take full advantage of all available training time.

Reference Sources

Bompa, Tudor: Power Training for

Sports. Mosaic Press 1996