

THE SCIENCE BIT

WHAT HAPPENS WHEN YOU MAX YOUR MUSCLE

➔ Why resistance training is key to improving your all round fitness and strength

Factors such as genetics, exercise, nutrition, hormones and environment all interact to regulate skeletal muscle mass and strength development, but resistance and weight training will help. As muscles are overloaded and become stronger, they normally grow larger. This process of muscle hypertrophy involves increased protein synthesis with resulting myofibril thickening, proliferation of connective tissue cells and a rise in the number of satellite cells that surround each fibre. Beyond the aesthetic, there are many physiological adaptations that occur in response to resistance training. Not only do muscle fibres increase in size, but inside lots of great chemical changes occur. Enzyme activity and fuel storage increase means you can ride harder even after you run out of breath. Ligaments and tendons get stronger and bone mineral content rises, decreasing the risk of injury. More neural muscular pathways are formed and there are benefits in central nervous system activation and synchronization of motor units, making you more coordinated and improving reflex reactions.

If you want to involve resistance training in your program don't do too much too soon, you must build up gradually to get your body used to the different type of training.



Muscle up this Winter,
feel the benefits
come Spring