Swimming Susan Findlay

Swimming can be the weakest event in a Triathlon for various reasons. Unlike running and cycling, swimming generally does not get the same amount of attention for reasons of time, finances and conditions of training. The amateur sports person usually has to work a full or part time job, so there is this issue of trying to fit it all in. With running and cycling, it is much easier to incorporate these two disciplines into a daily routine such as using these to get to and from work. With swimming, it is a bit more time intensive. There is the matter of finding a venue that has the appropriate size pool, as well as finding a time that fits the schedule. In addition there needs to be a certain amount of training that mimics the type of environment they will be competing in. Many get on their wetsuits and take themselves down to the Thames, the ocean or lake, but obviously the frequency in which this can be done is not the same as in the other two disciplines. So it is hardly surprising that for most of these triathletes, swimming is their weakest event. They then try to make up for it by doing other types of training that mimic the muscular and cardiovascular demands of the sport, but unfortunately, due to a lack of knowledge and correct advice it does not always go to plan.

Training under the guidance of a coach is often considered to be an extra, partially due to the cost, but also because a great many feel they do not need it. A high percentage copy what they see others doing, and pick up bits of information from one another in conversation. Some read books, watch videos or attend classes. For the most part, there isn't one person overseeing their training and giving appropriate individualized advice. Due to the lack of support and advice, poor training habits develop, and the development of injury from micro trauma and muscle imbalance is common. It might start off with general muscle tension, leading to a minor injury which is left to heal itself without intervention, then another follows, then the niggles become chronic, or a variety of things might start to go wrong. This is the point at which I usually meet the client for the first time. Acute injuries are relatively low in swimming because of the slow speed and the lack of bodily contact with other athletes (unless you are dealing with water polo), typically it is an overuse injury that is often related to poor training habits.

Unlike the other two disciplines, the swimmers train in a fluid medium, in which they must propel themselves through. In running you have the ground serving as a solid base, cycling uses the bicycle as its form of resistance. In swimming there is not a firm surface to aid in the act of propulsion, rather there is considerable resistance in the forward motion through water. The power of the stroke mostly comes from the upper body/shoulders, the legs act as stabilisers and provide some propulsion. It is the combination of the resistance of the water and the repetitive nature of the action that often leads to the development of an overuse injury.

Common swimming injuries include: Swimmer's Shoulder, Breaststroker's Knee, Butterfly Back and Overtraining Syndrome.

Swimmers' Shoulder

Also known as painful arc/rotator cuff tendonitis or shoulder impingement is the most common injury in swimmers. This painful condition is likely due to a combination of factors such as poor biomechanics in swimming efficiency and technique, or incorrectly incorporating other forms of training ie weights, insufficient preparation and/or recovery.

Breaststrokers' Knee

Is a chronic strain of the medial collateral ligament that stabilizes the inside of the knee. This is due to the repetitive kicking actions of the leg, and the forces required to produce the movement.

Butterfly Back

It results from the repeated hyperextension of the lower back, stressing the spinal column leading to a stress fracture.

Overtraining Syndrome

Is not exclusive to swimming. As in most sports there is this belief that training to the point of tiredness is what is required in order to be an elite athlete is simply not true. There are more effective ways of training, such as allowing the body to recover and adapt to the changes, training specifically for the sport, receiving correct advice and having supportive therapies such as Sport & Remedial Massage, will lead to better results.

In theory, triathletes should have fewer overuse injuries compared to endurance athletes who concentrate on one sport such as running, since triathletes routinely cross train. Yet it appears that this is not true. Each discipline has a higher incidence of injury which is related to each sport, swimming, as we see above has a higher risk of shoulder pain while cyclist have a higher ratio of lower back problems. It is thought that because of the number of training sessions a triathlete has to do each week to train adequately for each event, that this leads to the increased incidence of injuries.

Generally as a therapist, it is best to do a whole body assessment initially, exploring the whole musculoskeletal system and not to limit your treatment to the site of the complaint. It is important to explore the whole of the body to determine if there are other structural influences affecting the condition. Testing for muscle imbalances, assessing for micro trauma, taking a thorough case history are but just a few of the initial approaches of investigative work that needs to be done. As a Sport & Remedial massage therapist this "detective" aspect of the work is both enjoyable and challenging. It gets even more interesting when dealing with triathletes, working through the actions of the three disciplines and determining the appropriate treatment from a large bag of techniques.

Competitive swimming includes speed swimming, diving, water polo, synchronized swimming and long distance (open water) swimming. In speed swimming there are four recognised strokes, Freestyle, Backstroke, Butterfly and Breaststroke. There is also a Medley which combines all four strokes.

Currently the Olympic swimming events are:

50m, 100m, 200m, 400m, 800m (female), 1500m (male) Freestyle 100m, 200m Backstroke 100m, 200m Butterfly 100m, 200m Breaststroke 200m, 400m Individual Medley 4 x 100m, 4 x 200m Freestyle Medley 4 x 100m Medley Relay

Triathlon Event Distances

Swim	Cycle	Run
0.75 Kilometres	20 Kilometres	5 Kilometres
1.5 Kilometres	40 Kilometres	10 Kilometres
2.5 Kilometres	80 Kilometres	20 Kilometres
3.8 Kilometres	180 Kilometres	42 Kilometres
	0.75 Kilometres 1.5 Kilometres 2.5 Kilometres	0.75 Kilometres 20 Kilometres 1.5 Kilometres 40 Kilometres 2.5 Kilometres 80 Kilometres

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