

The Three Laws of Training by Julian Hopkins (Former Nat. Event Coach)

Do you ever stop and think 'why am I doing this session?' Or do you train out of habit doing almost the same training day in, day out? I am sure that many race walkers fall into this trap. As a result they fail to prepare themselves properly for racing, probably finding training less interesting than it can be. It is easy to get stuck in a groove and let your sessions become stereotyped. The result is that your physical and mental reactions to training become stereotyped, and you fail to improve. I would like to look at some of the basic principles of training — principles which apply to training for virtually all sports. There are three laws of training - the word law is not too strong — which should be understood by all athletes.

THE LAW OF OVERLOAD

This simply means that if you want to improve your fitness then you must repeatedly challenge your present level of fitness. This is perhaps understood best by most people in the area of strength training. If a man can lift a 100 pound barbell, he will not become much stronger if he continues to lift the same weight over and over again. Once he is strong enough to lift this barbell a small number of times, he needs to increase its weight. In this way he challenges his body to improve. Once the body has adapted to this overload, the weight is increased again. The body is always trying to catch up with the increasing work load. Exactly the same idea can be applied to your walking training. You can gradually make your sessions harder in several ways. Firstly, you can keep the speed the same but cover a greater distance. If you start in November with a 15 km session at 11 km per hour it would be gradually increased to a 20 km session in January at the same speed. In a repetition session, you can slowly increase the number of repetitions so that 4 x 1km in 5 minutes in December might become 8 x 1km by April. This type of progression is usually employed in the build-up to the season. In the summer, the second method of increasing the load is used. This consists of increasing the speed but keeping the distance the same. So, a 20 km session covered in 1hr 50min in March could be improved to about 1hr 45min in June. Similarly, the repetition session mentioned before could stay at 8 x 1km but with the speed of each kilometre raised to 4 min 45 over a period of several months. There is a third method of increasing the work load. This consists of doing more training in a given time - more sessions per week is an obvious way of doing this. Another way is to cut down the recovery period between repetitions in a session. A three minute recovery between 2km repetitions in March could be reduced to two minutes by June for example. This method is only really suitable for advanced athletes who have a number of years of solid training behind them. One thing is certain. You will not improve as you should if you do not keep asking your body to do more. Of course some sessions need to be less challenging to allow for recovery after a particularly hard session. These sessions should not appear too frequently in your schedule however!

THE LAW OF SPECIFICITY

A little hard to say perhaps but all it means is that your training must be closely geared to your event — the technique needed, the endurance required, the speed demanded, the suppleness wanted and the strength desired. It seems obvious when stated like this but athletes make mistakes in their training quite frequently. Either they use the wrong method to develop one aspect of their fitness or they neglect to develop another area altogether. Let us look at this in a little more detail.

Firstly, with regard to technique, this must be developed to suit the event. It is no good having a near perfect technique at 10km per hour if this breaks down in a race because the speed required is in excess of 12 km per hour. Technique must be worked on at racing speed. The endurance required to race a particular distance also needs consideration. A 50km. walker must firstly make himself fit enough to race walk for 4 - 5 hours. He must build up his endurance until this becomes comfortable - both in a

physical and mental- sense. Then he can start to consider walking the distance faster. This is important - endurance must now be developed to match the event. If 100 minutes for 20 km is your target then you must prepare yourself to walk at 5 minutes per kilometre for this time period. To achieve this, plenty of walking at close to this speed over various distances must be included in your schedule. Basic speed too has to be related to the event. Some people think that you must increase your basic speed at all costs — the greater your basic speed, the faster you will go in the race. This would only be true if you had as much endurance as the other walkers - than your greater speed would tell. If you are a 50 km walker is it necessary to be able to walk a lap in 1min 40 sec when even 2 minutes per lap will give you 4hr 10 min for the full distance. It would be futile to spend much time walking at speeds faster than about 1min 50sec per lap. Not only is it unnecessary but the fatigue produced will stop you from doing sufficient training to increase your endurance. The message is clear — do not use excessive speed in your training. Suppleness is one of those frequently neglected areas of fitness. I am not sure why this should be but many British Athletes seem loath to do any suppling exercises. That a considerable degree of suppleness is needed in race walking is obvious to even the casual observer. The range of movement in the ankle, hip and shoulder joints must be increased in the directions in which they are used during race walking.

The muscles at the rear of the leg must be made more elastic to accommodate a smooth leg action. At first stretching exercises of the usual sort can be undertaken but more experienced walkers can use drills of the Mexican type to great effect. These drills are very specific because they are carried out whilst walking and involve extensions of the normal joint movements. When we come to strength, we need to consider the walker's requirements carefully. Certainly he does not need the great explosive strength of a thrower or jumper. Nor does he need the combination of strength and speed of muscular action ('fast strength') of a sprinter or hurdler. Rather the walker needs a combination of strength and endurance ('strength endurance') to maintain a good posture and a powerful arm action throughout the race. He needs to toughen up his trunk using many repetitions with lightweights or his own bodyweight. Press-ups, sit-ups, leg raises, dips, chins, back extensions - all these could prove useful for most walkers. The most specific strengthening effect will come from actually race walking against a greater resistance than usual. This could be a strong headwind or an uphill gradient - perhaps both!

THE LAW OF REVERSIBILITY

This requires little explanation. It just means that if you stop doing a certain type of training you will gradually lose the fitness you have gained from that training. This seems obvious enough but it is sometimes overlooked. You have the walker who increases his strength endurance in the winter months by training, say, three times a week in the gym and then drops this form of training altogether. As a result his strength endurance gradually declines throughout the racing season just when he needs it most! Indeed he should maintain this type of training throughout the year perhaps doing one session per week in the racing season. This way he might not increase his strength endurance but will at least keep it at its new found level. Again you have the walker who decides to do a big endurance build-up in the winter. He does nothing but walk relatively slowly. When he comes to compete he finds he cannot handle the pace of the race, something he was able to do comfortably the previous season. He has gradually lost his specific endurance through a lack of training in this area.

I hope that this article will perhaps encourage you to look at your training in a new light. Does it obey the three laws of training? Does it give you the improvement you want? Does it provide you with an interesting challenge? I can best end by summarising the three laws of training simply as follows:· firstly, never let training become easy! Secondly, gear your training closely to the event you are training for, thirdly, never completely drop any aspect of your training.

