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Secondary Growth Factors

Regardless of how much growth stimulation is induced, little in the way of results will be produced unless the requirements of several other factors are also provided. Basically these factors are as follows: (1) nutritional, (2) provisions for adequate rest, (3) the avoidance of overwork, and (4) psychological (various).

Most of these factors have been mentioned in the preceding chapters, and it now remains necessary only to view them together; but it should be clearly understood from the start that – in the author's carefully considered opinion – nothing even bordering upon any form of fanaticism is required by any of these factors. Yet such fanaticism exists on a wide scale in weight training circles today; primarily, I think as a direct result of commercialized fraud – the carefully calculated encouragement of fanaticism, performed for the sole purpose of selling worthless products.

Literally thousands of weight trainees are almost entirely existing upon diets of nearly pure protein, others completely stop or greatly curtail their sexual activities, and quite a number are taking various forms of so-called "growth drugs." And none of these things can be justified in any slightest degree. Maximum possible gains from any sort of training program can be produced while living a completely normal life; and, in fact, there is great weight of evidence that supports the contention that a normal existence is actually a requirement for best possible gains.

A man on a program of heavy physical training will obviously require enough extra calories to supply the energy required by such training – or, at least, he will if he hopes to maintain his existing bodyweight; and if he wishes to gain additional bodyweight, then he will require even more in the way of nutritional factors. But such requirements can come – and, indeed, should come – from a fairly normal diet; such a diet should be well rounded in makeup, and should contain enough protein to meet the requirements of the moment. Absolutely nothing else in the way of a special diet is required.

There is little or no evidence to support the need for supplementary vitamins – if a well balanced diet is provided; indeed, the great weight of available evidence clearly indicates that such vitamin intake is of absolutely no value.

Where additional protein is required – in the case of a trainee that wishes to gain weight rapidly as a result of his training – this can easily and cheaply be provided from commonly available sources; raw eggs, powdered, non-fat milk solids (powdered milk), and soy powder will provide enough protein for any possible requirements. Two or three daily "milkshakes" made according to the following recipe will provide enough protein for a 250 pound man that is anxious to gain weight rapidly – if taken in addition to a well rounded, normal diet. 1. Four raw eggs 2. One-half cup of soy powder 3. One and one-half cups of powdered milk, non-fat 4. Enough chocolate powder to provide suitable taste 5. Enough skim milk to bring mixture to proper liquid state.

Mixed in a blender, the above mixture provides a very heavy load of well-balanced protein – at a very low price. For a trainee who wishes to gain weight as rapidly as possible, three such milkshakes should be consumed daily – one shortly after a normal breakfast, a second immediately after work or school, and a third just before retiring for the night.

While the soy powder is the cheapest ingredient in the above mixture -costing only about 40¢ per pound retail - it should be limited to the above ratio; taken by itself, soy protein is not complete, and cannot be utilized by the body properly unless it is mixed with elements provided by the milk and eggs.

But – for some people – soy powder presents a problem; should it be found that it is causing excessive amounts of intestinal gas, then discontinue its use – and in that case, replace it in the mixture with an addition half-cup of milk powder.

Unflavored gelatin is another good source of protein at a low price, but it is a bit difficult to consume in large quantities – simply because, if mixed with cold water, it almost instantly solidifies, and if mixed with hot water it is unpalatable for most people.

Far too much freely available literature exists on the subject of making up a well rounded diet for me to devote any space to it here, so I will simply refer you to any one of several thousand books on the subject. But some care should be exercised in order to make certain that such books do not contain commercial bias.

The requirements for adequate rest are no more involved than those dictated by common sense and good health habits; some people require more sleep than others – so get as much as is normal for you as an individual. Your results will obviously be less if you make a common practice of getting too little rest – but excessive amounts of sleep probably retard your progress also; so simply continue with your normally practiced good habits in regard to sleep.

Other activities should continue as before; better progress will almost always be shown by an individual that is regularly employed in some sort of full-time activity, such as a normal job or a normal load of schoolwork. But – to many weight trainees – the above statement probably borders on heresy; such people thinking – as thousands of them do – that activities should be strictly limited to workouts, eating and sleeping.

Insofar as other sports activities are concerned, their effect upon training progress can be either good or bad; so it becomes a simple matter of "first thing is first". It will be almost impossible for a man to gain bodyweight rapidly if he makes a daily practice of running several miles; but if such running is a necessary part of his training, then it obviously should be done. The same rule is equally applicable to any other sort of activity – do that which is necessary, or desirable, and the weight training program will markedly increase your strength and improve your overall condition even if it doesn't result in great increases in muscular size or bodyweight under such conditions.

However, many coaches make the mistake of trying to get all things out of the same individual – and this, of course, is literally impossible; if it is considered desirable for a particular athlete to gain forty pounds of bodyweight for football, then such an individual should not involve himself in a heavy program of track activities. Some running should be done weekly – at least twice weekly – by all trainees, but this should be limited to the amount that will maintain the required amount of endurance for running and the existing degree of speed, or it should be, at least, if it is desirable for such subjects to gain weight rapidly.

In the case of overweight or "out of condition" subjects, then almost any amount of running should be employed until such time that the subject has removed the surplus fatty tissue he is carrying; but it should be realized that such an individual will almost never have much in the way of an existing endurance or energy level at the start of such a program – and thus great care must be exercised in order to prevent such a subject from working himself to the point of nervous exhaustion.

It is neither necessary nor desirable to work any individual to a point of such muscularity that no visible fatty tissue remains on the body; on the contrary, better performances will almost always be provided by subjects that show at least some slight degree of fatty tissue in some areas of the body.

Removing the last traces of such fatty tissue almost always involves overwork - and if this is carried to extremes, such overwork can, and probably will, lead to nervous exhaustion. In this respect, individuals vary, of course, but do not expect a well-conditioned athlete who weighs over 200 pounds at a normal height to show no traces of fatty tissue.