Strength Training: How Often Should One Train?

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One is constantly bombarded with strength training information such as Lee Haney's 7:00 a.m. bicep workout and 7:00 p.m. tricep workout to the Bulgarian 3 times daily workout. Many trainees feel if they only had more time to train then they too could have championship results.  
  
The truth, however, is quite different. There have been a few scientific research studies performed which have looked at the importance of training frequency. Gillam (1) compared five groups training at different frequencies. Resistance training 3 days/week and 5 days/week were found to be superior to training 2 days/week. However, the training program was impractical in that it consisted of 18 sets of one rep maximum of the bench press. How many people do you know to max out each workout? How somebody can max bench press 5 times per week for nine weeks and not experience shoulder problems is amazing.  
  
In a more recent study by Braith et al. (2) they evaluated the effectiveness of strength training performed either 2 days/week or 3 days/week. Training consisted of a single set of variable resistance bilateral knee extensions performed to volitional fatigue with a weight load that allowed seven to ten reps. When the subjects could perform more than ten repetitions, the weight load was increased by approximately 5%. The subjects performed the concentric contraction phase of each rep in 2 seconds and the eccentric phase in 4 seconds. Forty four subjects trained for 10 weeks and 47 subjects trained for 18 weeks. Twenty six subjects served as controls and did not train. the group which trained 3 days/week derived better results than the 2 days/week. However, these data indicate that one training 2 days/week may derive approximately 80% of the isometric strength benefits achieved by those training 3 days/week.  
  
One may take the results of this investigation and say "I have to train 3 days/week". Remember the above study just looked at leg extension. Who is to say if the subjects squatted or leg pressed the results would be similar?  
  
Also, what happens when one trains the entire body relative to results and recovery ability? I recently finished a research project here at the Hammer Research Center which evaluated the effectiveness of training 3 days/week and 2 days/week. The subjects trained their whole body each workout. Each exercise was performed to a point of failure. It should be noted that these training sessions were highly supervised to insure that nobody was "wimping out". The study lasted 7 weeks. The subjects were evaluated for body composition, maximal strength in the bench press and leg press, and basal metabolic rate. At present, all the data have not been statistically analzyed. But I don't believe that there was much of a difference between the two groups. The kids busted their butts and obtained gains in strength and size despite being "trained subjects".  
  
From a subjective point of view, the group which trained three times started to have problems getting motivated towards the end of the study. How anyone can train hard, attentively, and productively 2-3 times a day, six or seven days a week is beyond me. From an empirical research point of view, I have trained top players in the NFL, NBA, and numerous major college football players and they have obtained excellent results training 2-3 times/week. I seriously doubt that their bodies could recover from more frequent workouts over a period of time.  
  
One of the ironies of strength training is that many divergent methods of training can all yield results. Sure, I know people who train 4-6 days/week while performing 4-5 sets per exercise and get good results in the short term. However, what many trainee's who train 4-6 days per week find out over time is that half their weekly workouts must be sub-maximal. In other words, 2 or 3 hard workouts a week and 2 or 3 going through the motion workouts a week.  
  
Training 2 or 3 days/week are as effective training frequencies as any as long as intensity is high. There does not exist any scientific literature to my knowledge that would suggest that the more advanced trainee needs to train more frequently, although some do. There are a number of factors (nutrition, lifestyle, emotional stress, sports/practice, injury, number of exercises performed in a workout, type of exercises performed in a workout, level of trainee, volume of work performed per workout) which can influence training frequency recommendations. One of the groups of trainees which may require increased training frequency are individuals rehabilitating an injury (3). Olympic lifters may train more frequently because much of their work is skill work using light training loads. They may train more frequently to fine tune their execution. Such training sessions are of no practical value to any other population. Training hard...training for results and improvement should be done not so infrequent that adaptation processes are inhibited. If you don't feel recovered don't train. More exercise sessions per week in and of themselves will not produce better results because there will be less time available for recovery. Recovery is an important component of the results equation...Progressive resistance workouts + Proper Nutrition + Recovery=Results.  
  
References  
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