Neural Adaptation

Abstract

According to Specificity and Specific Adaptation to Imposed Demands (SAID) principles, many adaptations occur in response to strength training within muscle. Three major adaptations include: neural, muscular and metabolic. The initial adaptation is neural one.

At first we discuss about various theories, which are defined as probable mechanism of neural adaptation, in this article. Temporal relationship between muscular and neural adaptations and influencing factors on them in healthy and pathological conditions will be also reviewed. Furthermore, principles of strength training regarding to physiotherapy will be explained.

Key words: Neural adaptation / Strength training