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December 10, 1942.

Mr. Melvin L. Hayes,
524 North 4th St.,
Iola, Kansas.

Dear Melvin:

I am happy to reply to your favor of the 7th instant. I am heartily in accord with the program of every healthy individual walking at least three miles a day, and five if possible. Certainly no one can keep in good physical condition without using the large muscle group of the body. When you walk you "breathe with your legs". Walking, running, jumping, leaping, vaulting, climbing and crawling are the fundamental activities of the human animal.

The reason that so many boys have their knees and ankles injured in athletic contests is because the boys have practically quit using their legs and have resorted to the automobile in getting to school and the movies. When the legs are used in walking the large fundamental muscle groups are used, causing a muscular activity and thereby stimulating metabolism.

Metabolism is that process of building up and tearing down that is constantly going on in our bodies when we are active. Catabolism is tearing down and anabolism is building up. Both processes are known as metabolism. When the oxygen is depleted in the tissues after exercise it doubles carbon dioxide and other waste products. This stimulates the nerves to activity and causes a reaction which causes increased breathing and heart action. Oxygenated blood is pumped by the heart through the arteries and capillaries to the depleted area so that the tissues can be replenished with food and oxygen. Therefore, we build up by tearing down.

As the roots of a giant oak sends tentacles into the earth to fasten themselves around a giant boulder to make the tree more secure in its attachments, so do the ligaments and tendons attached to the rough bony prominences to make more secure the muscular attachments in our bodies. By developing strong muscles we are enabled to stand off the ravages of disease and old age much more effectively than when we fail to take regular systematic and fatiguing exercise.

No person should undergo strenuous or long fatiguing exercise until he has an examination by a physician. But if the vital organs are pronounced in good physical condition by a physician, an individual can exercise strenuously without hurt to themselves.