Chinese Herbs 102: Ma Huang (Ephedra) Friend or Foe

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Has ma huang become victim to a bad reputation or is the reputation deserved? How has an herb that has improved health for thousands of years in China resulted in U.S. deaths associated with its use for weight loss?

The history of ma huang is no mystery. The herb is an evergreen plant with yellow flowers and red berries. Although the herb has been used by various cultures for different ailments, it has been used to treat asthma in China as far back as 5000 B.C, according to <u>Herbal Healing Through the Ages</u>.

Ancient Chinese herbal doctors used *Ephedra sinica* and, without the technology of today, were able to determine the effectiveness of utilizing ma haung for conditions like asthma, cough, profuse sputum, acute edema, and for colds with fever, headache and no sweat. The application of the herb was customized to a particular patient's needs and constitution. This herb use has further applications depending on preparation and part of herb used.

According to Chinese medicine, there are certain conditions in which ma haung is used with caution or contraindicated. These cases include, but are not limited to, hypertension, palpitations, spontaneous or night sweating and deficiency type asthma as described by Chinese medicine. From a Chinese Medicine application standpoint, the previous considerations are paramount in determining if the application of this herb is proper.

Ephedrine, an alkaloid in ephedra was isolated in 1887 by Nagayoshi Nagai. It did not receive much attention until researchers at Peking Union Medical College injected the extract into dogs. The experiment indicated that the substance affected the central nervous system and raised blood pressure. One of ephedrine's most important functions is to dilate bronchial passages and relieve mild bronchial tube spasms. Clearly the previous functions are beneficial in treating asthma.

Although, all species of this plant do not have pharmacological effects, technology has determined ma haung's biochemical constituents as ephedrine, pseudoephedrin, 1-N methylephedrine, ephedrine, 1-norephedrine, d-Npseudomethylephedrine, d-dimethylpseuoephedrine, benzyl-methlamine and 1alpha-d-terpineol. Pseudoephedrine, a chemical constituent of ma haung, is now synthesized by pharmaceutical companies as a decongestant in Actifed, Contact, Tylenol Cold & Flu, Ny Quil, Formula 44 and other cold formulas and allergy products. One brand, Sudafed, even takes its name from pseudoephedrine.

Unfortunately, ma haung has not only been used in the method to treat asthma or cold and allergies as indicated previously. Certain research indicated that ma haung had certain effects which could enhance weight loss, especially if combined with caffeine. Given the previous information regarding the finding that ephedra increases CNS excitation and blood pressure, it would seem adding this substance to caffeine could pose potential problems if consumption with no consideration of medical history occurred.

Apparently, previous findings were not a consideration. The limited weight loss research findings resulted in the introduction of ma haung en masse to a uniformed population in a manner unintended and untested by time. Ma haung or ephedra was subsequently mass produced, marketed, and turned into a weight loss supplement featured in Ephedra Plus, Metabolife 356, Metabolift, Pro-Ripped Ephedra, Xenadrine and the like.

Clearly, based on the information I have provided you, an individual with high blood pressure, for example, should not be ingesting this substance; but it did occur. Ma haung's mass public consumption has been associated with arrhythmia, tachycardia (increased heart rate) and hypertension to name a few. Large pharmacological amounts of ephedrine can cause excitation, nervousness and tremors due to its' stimulation of cerebral cortex and subcortical centers.

The use of this herb for weight loss resulted in unnecessary loss of life; and an attack on ma haung ensued rather than on those who misapplied the herb. In February, 2003, when Steve Bechler, a Baltimore Orioles' baseball pitcher's death was associated with the use of ephedra, a celebrity face became attached to the prior deaths and toxicity reports. With the misapplication for weight loss and increasing criticism, ma haung was eventually banned by the FDA and became foe.

The application of ma haung is not used in TCM for weight loss; and, in my clinical experience, I have used ma haung in herbal formulation for adults and infants with success. The side effects associated with ma haung can be decreased or ameliorated with proper herbal combination and assessment of the patient **before** application to determine if the patient is a candidate. However, I am a trained and educated herbal professional. For this reason, ma haung is not banned for practitioners of Chinese medicine and in its proper application, friend.

I am a strong advocate of health empowerment; but I am not an advocate of individuals randomly purchasing herbs simply because an article was read or a commercial was televised. I've witnessed individuals combining herbs and vitamins that should not be taken in concert. I mean you wouldn't grab a scalpel to perform surgery on yourself or attempt to give yourself anesthesia after reading one or two articles on the procedure would you? The same should apply to herbs and in some countries herbs are regulated to the same degree as pharmaceuticals.

Natural and safe are not synonyms. Misapplication or improper dosing can result in an unwanted side effect. For example, Vitamin C is a powerful antioxidant. However, if you take a dose that is too high for your body weight, the result could be soft stool or diarrhea.

So my fellow herb enthusiasts, I ask what determines if ma haung is friend or foe? The answer is simply proper application.

"I have Lupus. I always had a tired feeling. After I drank the herbal tea Dr. Hotep prescribed, my energy level doubled. I was able to do my housework, and even clean my venetian blinds!" ~SS Female 50 San Antonio, Tx

We are here to get Phoenix residents on the correct herbal path. To better ensure your herbal application is on the right track call Qi Acupuncture and Wellness at 602.462.1115 to schedule an herbal appointment today!

Disclaimer: Not written as complete source of herbal information, but as an informational snap shot.

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