ISOLATED SOY PROTEIN

a concern among Sunriders

Dear Friends:

Thank you for this important question - it is one that has been searching for an answer many years now! I hope you don't mind me sharing the answer with a few leading Sunriders.

Isolated Soy Proteins are very digestible. Millions are eating these fractionated amino acids everyday. Whether they are better than whole food soy powder - is debatable, of course.

Scientific documentation? The short answer is no. This kind of documentation does not (or very seldom) exist in the current scientific literature for six simple reasons:

first: there can be no patents on whole foods and whole herbs and so the financial incentive to study them is nil - this is fairly well known and recognized even in the scientific literature. Even so there is a fairly large information base that gives us the scoop on carrots, spinach, Echinacea, goldenseal, etc. from empirical (commanded by the emperor) evidence which is primarily outcome based. Recently there has been a slow resurgence by certain groups of scientists to study whole foods but the financial incentives are just not available.

second: the biochemical and physiological function of whole foods and whole herbs is largely, and for some, completely individual (according to one's individual biochemistry) and much more subtle, long-term (and not necessarily positive or negative) than scientific information gathered from isolated fractions - and therefore not only difficult to study and document but much more difficult to summarize (and get paid for!); If Chinese diagnostic criteria are used we come up with even greater variables!

third: the soil on which these foods or herbs are grown has EVERYTHING to do with their function. Some soils are rich in and therefore emphasize a specific set of trace elements and others soils do not. This forces the "scientist" in us to find the "active" ingredient and measure it. Thus the birth of "standardized" medicinal herbs which are grown in "standardized" conditions so as not to be soil and climatologically different. These clones of what the pharmaceutical industry deems to be essential satisfies the needs of distributors that combine fractions and the "measure" becomes the common denominator in all people instead of serving those that live in the region in/for which it was biodynamically grown. Since our American soil has been so incredibly damaged we are fortunate that the soil on which Sunriders' raw material is grown is wholly owned by Dr. Chen and maintained by some of the best bio-ionized soil experts in the world. This puts Dr. Chen in the drivers seat and in full control of his products from the raw material to the finished products - and exactly the point that won my heart over to the SR family;

fourth: the combinational effect of isolated fractions are much different from the combinational effects of whole foods. For instance: most health food store combination are so rarely ever found in Nature that the body will do its utmost to get rid of this hotchpotch - by stimulating the adrenal glands and get the liver going. The kidneys join in and soon the entire body is aware that there is a gigantic biochemical movement afoot to expel something that resembles food but is definitely not. What the patient feels when they say "this makes me feel really good" is a dose of adrenal stimulation followed by a rush of temporary detoxification activity that eventually leaves the person more drained of energy and nourishing resources than before.

fifth: in my opinion this is by far the most compelling argument why Sunrider Foods are superior to all others - owner expertise. Without the previous five points this might seem like an idle boast - instead it becomes a huge point in our favor. The Heavens must have smiled when he first became a compounding pharmacist while already having a thorough orientation in Oriental herbs. Thus the school training was already vectored into his life work - herbology. This brings us to the heart of his expertise - which is not limited to pharmacology and herbology but also includes the Oriental philosophy of combining food herbs. The fact that he has in his possession an ancient (emperor-commissioned) document handed down from generation to generation (and that must have that taken a few generations to write) that literally and neatly spelled out the Chinese philosophical principles of outcome based Chinese herbology...obviously helped - a lot! His previous experience with network marketing came in as another huge blessing in disguise for all (the rest) of us. Dr. Chen - through no fault of his own(?) - was the right man in the right place at the right time. Then last but not (even close to) least he marries a physician (that was) destined to organize his talents into the winning combination that we, and our constituents, profit from today.

sixth: there is much disagreement of terms - definitions. Common sense dictates the axiom - that the more complete (less pure) the substance - the more individualized its function. The more isolated, concentrated (more pure) the fraction - the more uniform its effect - hence drugs work pretty much the same on all people where food might not. Only when we agree on definitions can we have an intelligent discussion.

Unfortunately the words "isolates" and "concentrates" have been used almost interchangeably because the moment you "isolate" (a) protein into individual amino acids (or small peptides) you have "concentrated" the amino acid ("protein") by removing the carbohydrates and the fats. Thus the confusion. To make it more confusing: protein differs completely from "isolates" or "concentrates". Protein is the original AND functional plant or animal unbroken chain of amino acids. As soon as the chains are broken into isolated fractions you no longer have a "functional" protein. These fractions may now combine again to create a functional neurotransmitter or a functional hormone, enzyme or even a functional virus. Isolated amino acids have their own, sometimes deleterious or healthful function(s).

Soybeans are first denuded, flaked, and de-fatted to make "white flakes." These white protein flakes are made into defatted grits or flours, soy "concentrates", or have their flavor compounds and flatulence-producing sugars extracted to produce soy protein "isolates". Whole soybeans are approximately 30 percent carbohydrate (of which 15 percent is fiber), 18 percent oil (85 percent unsaturated), 14 percent moisture and 38 percent "protein".

Soy Protein "Concentrates":

are made by removing a portion of the carbohydrates from defatted and dehulled soybeans. Alcohol extraction is the method most commonly used to manufacture soy protein concentrates even though it results in the loss of isoflavones. The amounts of alcohol-soluble compounds, such as isoflavones and saponins that remain in the soy concentrates depend on whether water or alcohol was used in the extraction process. Soy protein concentrates retain almost all of the fiber in the original soybean and must by law contain at least 65% "protein" (really, amino acids) on a moisture-free basis.

"Isolated" Sov Protein:

Is the most concentrated source of soy "protein" which is required by law to be at least 90% protein on a moisture-free basis. Since most isolated soy "protein" is manufactured by water extraction from defatted and dehulled soybeans, it retains the natural isoflavones. It is heat-treated during processing to insure inactivation of trypsin inhibitors - which is an important enzyme. Since Isolated soy "protein" is 90 percent amino acids on a dry weight basis, with

virtually all of the fat and carbohydrates removed this is too much "protein" and not nearly enough carbohydrates and fats. It throws the ratios off by so much that it makes the isolates even less healthy to eat over a long period of time.

Whole Soy Beans:

are primarily used for animal "finishing" feed.

Some investigators have focused on the specific impact of increased soy consumption on human nutrition, and concluded that, while phytic acid content appears to inhibit zinc availability, the situation is more complex and may involve many other components. The combination of dietary phytate and a high calcium intake may have a greater impact on availability of trace minerals, such as iron and zinc, than phytate in combination with lower dietary calcium levels. Hence, the total diet must be considered in assessing the nutritional significance of phytate content of food and its relationship to mineral availability. In human studies, ingestion of soy concentrate at a level equivalent to about 23 grams of protein a day did not result in any unfavorable trends in calcium, magnesium, zinc or iron assimilation.

When taking whole bean soy products it is thus essential to take calcium and metabalance-44 to sustain the necessary elements and minerals that offset the phytic acid content.

Hope this helps:

Warmly,

Dr. Van Beveren, Ph.D.CNS, CNC. Health Integration Centers, LLC 609-924-7337 (Phone) 609-924-7828 (Fax)

---- Original Message -----

From:

To: OSR A Van Beveren Ph D;

Cc:

Sent: Sunday, January 28, 2001 2:28 PM

Subject: AGH! Isolated Soy Protein!

This seems like a valid question -is there documentation beyond the basic concept of wholeness vs. elements removed form their natural community (isolates)? Can you help.

---- Original Message -----

From: To:

Sent: Sunday, January 28, 2001 10:26 AM

Subject: AGH! Isolated Soy Protein! ~

Just wanted you to know that I am truly trying to find anything that states how isolated or concentrated soy protein is not digestable. I was in the middle of 7000 listings on the internet - but nothing addresses this. Just because says that it's not digestable on her tape isn't enough for me to help other people with this. I need some scientific research and proof.

Please help me with this. Because if there isn't any real study done (on paper, backed up by educated people, etc..., then what should prevent anyone from purchasing their "health" products full of this stuff.

I know all about soy protein being okay, but the isolated form being "separated," etc... It's enough for me to hear it from you - verbally - but I'm going to need much more for my further work in Sunrider.