Protein

In the two decades between 1990 and 2010, the leading causes of death and disability remained relatively constant. <u>Heart disease</u> remains the leading cause of loss of health and life, but among the diseases whose incidence has increased the most over the past generation is chronic <u>kidney disease</u>. The number of deaths has doubled.

Our "meat-sweet" diet has been implicated in this escalation. Excess table sugar and high-fructose corn syrup consumption is associated with increased <u>blood pressure</u> and <u>uric acid</u> levels, both of which can damage the kidney. The saturated fat, trans fat, and cholesterol found in animal products and junk food are also associated with impaired kidney function, and meat protein increases the acid load to the kidneys, boosting ammonia production and potentially damaging our sensitive kidney tissue. This is why a restriction of protein intake is often recommended to chronic kidney disease patients to help prevent further functional decline.

Is all protein created equal? No—not all protein has the same effect on your kidneys. Our kidneys appear to handle plant protein very differently from <u>animal protein</u>. Within hours of consuming meat, our kidneys rev up into hyperfiltration mode, dramatically increasing the kidneys' workload. This is true of a variety of animal proteins—beef, chicken, and fish appear to have similar effects. But an equivalent amount of plant protein causes virtually no noticeable stress on the kidneys. Eat some tuna, and within three hours, your kidney filtration rate can shoot up 36 percent. But eating the same amount of protein in the form of tofu doesn't appear to place any additional strain on the kidneys.

Why does animal protein cause the overload reaction while <u>plant protein</u> doesn't? Researchers discovered that after giving subjects a powerful anti-inflammatory drug along with animal protein, the hyperfiltration response disappeared, suggesting the hyperactive response was triggered by <u>inflammation</u>.

Animal protein may also play a role in <u>cancer</u> risk. IGF-1, insulin-like growth factor 1, is a cancerpromoting growth hormone that is released in excess when we eat animal protein. This is presumably why those who eat less <u>meat</u>, <u>egg</u> white, or <u>dairy</u> proteins have significantly lower levels circulating within their bodies within weeks of making the dietary switch. This lowering of IGF-1 levels is thought to be why the blood of men and women eating plant-based diets suppresses prostate and breast cancer growth *in vitro* significantly better than those eating the Standard American Diet.