AGE Study

Main Study Question

To conduct a controlled dietary intervention trial of high versus low dietary intake of advanced glycation end products (AGEs).

Motivation for Research

Advanced glycation end products (AGEs), bioactive molecules formed by the non-enzymatic glycation of proteins, are emerging as a possible dietary risk factor for many key adverse health outcomes related to obesity and to aging. When food is heated to high temperatures, the characteristic "browning" generates AGEs. The Western diet is rich in AGEs that are formed when food is processed at high temperatures, for example, fried chicken, french fries, hamburgers, hot dogs, sausages, potato chips, pretzels, heated milk products, and processed cheeses.

Although AGEs have been implicated in various chronic diseases, the possible adverse effects of dietary AGEs have not been well characterized in humans. This study will investigate the effects of a high and low AGE diet on risk factors of cardiovascular disease, within the context of a controlled diet.

This study ran from early October to mid-November 2011.