What to Eat? The Omega-6 vs. Omega-3 Challenge

Are you eating your fish? No? O.K., maybe you’re one of those downing cod liver oil or taking fish oil supplements. Not that either? Well, it’s clear you haven’t jumped on the omega-3 bandwagon. But should you? Let’s see if we can sort through the information.

Omega-3 Fatty Acids, along with omega-6 and omega-9, are unsaturated fats. Omega-3 and omega-6 fatty acids must be consumed through your diet. The Omega-9 fatty acid is found in olive oil but is not required in the diet because your body can make these fatty acids from scratch. All three kids of fatty acids (3, 6, and 9) help protect us from heart disease so it is helpful to eat foods that contain all three.

The problem in our American Diet is the imbalance between omega-3’s and omega-6’s – too many omega-6’s and not enough omega-3’s. Research is beginning to suggest that this imbalance contributes to cancer, heart disease, diabetes, arthritis, skin disorders, and more. Conversely, diets rich in omega-3 reveal less incidence of Alzheimer’s disease and dementia, ADHD, rheumatoid arthritis, and hypertension. It’s anti-inflammatory effects reduce the risk of stroke and heart attack.

So why the imbalance? Sources of omega-6 fatty acids are numerous in modern diets. They are found in seeds and nuts, and the oils extracted from them. Refined vegetable oils, such as soy oil, are used in most of the snack foods, cookies, crackers, and sweets in the American diet as well as in fast food. Soybean oil (usually labeled vegetable oil) is now so ubiquitous in fast foods, margarines, and processed foods that an astounding 20 percent of the calories in the American diet are estimated to come from this single source.

In contrast, modern diets contain few sources of omega-3 fatty acids, mainly the fat of cold water fish such as salmon, sardines, herring, mackerel, black cod, and bluefish. There are two critical omega-3 fatty acids, (eicosapentaenoic acid, called EPA and docosahexaenoic or DHA), that the body needs. Vegetarian sources, such as walnuts and flaxseeds contain a precursor omega-3 (alpha-linolenic acid called ALA) that the body must convert to EPA and DHA. EPA and DHA are the building blocks for hormones that control immune function, blood clotting, and cell growth as well as components of cell membranes.

So what is a healthy balance of omega-3 and omega-6? The ideal proportion is not really known but some investigators believe that a ratio of 6:1 is best for heart health. Some will go so far as to say a 1:1 ratio of omega 6 to omega-3 fatty acid consumption. American diets typically contain 30 times more omega-6 than omega-3, even more in people who eat a lot of foods fried in oils. The enzymes needed to assimilate omega-6 and omega-3’s into the body are the same. So when a diet contains high amounts of omega 6’s, the enzymes compete against one another making it difficult for the body to assimilate the benefits of omega-3’s.
So, What to Eat? All of us would benefit by limiting our intake of omega-6 fatty acids. That means cutting down on processed foods, fried foods, margarines, and vegetable oils such as corn, peanut, and safflower oil. The proportion of omega-6 to omega-3 in these oils ranges from 32:1 (peanut) up to 75:1 (safflower).

Just as important is our need to increase our consumption of omega-3 fatty acids. As stated above, the body needs two critical omega-3’s - eicosapentaenoic acid (called EPA) and docosahexaenoic acid (DHA). Sources of these omega-3’s are cold-water fish, some marine mammals, and seaweed. A great source of EPA and DHA is cod liver oil. It also provides a rich supply of vitamins A and D. Our parents and grandparents somehow knew the rich benefits of a tablespoon of cod liver oil each day.

There is one more piece to understand about increasing our intake of EPA and DHA omega-3 fatty acids. Most people are able to convert the fatty acid Alpha-linolenic (ALA) into EPA and DHA. ALA is found in walnuts, different green vegetables, and flaxseed. Remember, however, that a diet rich in omega-6’s will compete for the enzymes that enable the body to convert ALA into the much needed omega-3’s, EPA and DHA. Furthermore, some people are unable to convert ALA to omega-3. Therefore, rather than focus in increasing your intake of ALA (walnuts, flax), concentrate on eating sources of EPA and DHA – cold water fish. Many nutritionists now recommend eating wild fish, especially wild salmon, 1-2 times per week.

Next week’s W3 – The Dangers of High Fructose Corn Syrup followed by a Lunch and Learn seminar on April 23 with NaTasha Schiller titled the same. Info on the seminar can be found under the Classes and Programs tab.