# Digestion & Detox Promoting Digestive Health to Improve Overall Health

A healthy digestive system is a crucial foundation to true health, as it helps the body to digest food and absorb nutrients, allowing for optimal functioning of the body and overall health and wellbeing. A healthy digestive system is when every function of the gut is working at its best – good digestion and absorption, efficient elimination of toxins, a healthy balance of gastrointestinal (GI) microflora, and normal bowel regularity.

This is where USANA's digestion and detox products come in. Together, these specialised food supplements, developed based on science evidence, work together to help maintain good digestive health in different aspects.

### **Digestion & Absorption**

Optimal digestion of food and absorption of nutrients rely on the optimal functioning of digestive enzymes. However, the number of digestive enzymes undergoes a natural decline as we age; this may contribute significantly to a poor digestive system.

USANA's Digestive Enzyme lends a hand to the digestive system by providing a healthy dose of enzymes that help to break down cellulose (from fruits and vegetables), fats, proteins, carbohydrates and starches from food, so the body can receive more nutrients from the food consumed. One of the ingredients in USANA's Digestive Enzyme is spirulina. Besides rich in amino acids, several vitamins and minerals, spirulina also contains chlorophyll, which may also bond with certain toxins from food ingested, to help promote the natural elimination of toxins from the body. Additional benefits of USANA's Digestive Enzyme include:

- Help alleviate the feeling of fullness after eating a large meal
- Help reduce the symptoms of occasional indigestion, including occasional heartburn, gas, and bloating

#### **Bowel Regularity**

Normal bowel regularity helps remove wastes and toxins out of the colon quickly and efficiently, thereby maintaining a healthy colon and overall health. To maintain bowel regularity, adequate daily dietary fibre intake is a must. The Institute of Medicine Dietary Reference Intakes recommends a daily fibre intake of 21-38 grams.

USANA<sup>®</sup> Fibergy<sup>™</sup> Plus is a low-calorie, flavourless fibre blend that contains 10 grams of dietary fibre per serving to help you achieve the recommended fibre intake. One of the fibres in Fibergy Plus is psyllium, a soluble fibre that helps "sweep" the GI tract to promote bowel regularity. Taken together with USANA

Probiotic<sup>™</sup>, both supplements work in a symbiotic relationship to maintain sufficient levels of healthy bacteria and support healthy digestion. Other health benefits of Fibergy Plus include:

- Inulin, a prebiotic found in Fibergy Plus, promotes the growth of healthy bacteria in the digestive system
- Soluble fibres in Fibergy Plus, as part of a diet low in saturated fat and cholesterol, may assist in maintaining heart health
- High fibre content promotes satiety, making it easy to skip unhealthy snacks throughout the day

#### **Gut Microflora**

The GI system is a prominent part of our immune system and houses trillions of microorganisms, including the "good" and "bad" bacteria. A healthy balance of these microorganisms in the GI tract (ie, gut microflora) is essential to sustaining a healthy digestive system and thus maintaining a healthy immune function. Many factors can negatively impact the gut microflora balance, including age, stress, antibiotics and poor diet. The consequences can range from poor digestion and stomach upset, to conditions that are potentially harmful to long-term health.

USANA Probiotic is designed to help replenish beneficial bacteria in the gut to re-establish a healthy microflora balance. The unique blend of probiotic bacteria in USANA Probiotic has been proven in numerous clinical studies to survive transit through the stomach, to establish robust growth in the intestines, and to support digestive health and immune function. USANA® Probiotic uses the proprietary 50/50 mixture of Lactobacillus rhamnosus GG, LGG® and Bifidobacterium, BB-12®, and each stick pack is filled with 12 billion viable bacteria, which is a proven effective dose. Most adults can benefit from using USANA's Probiotic, but it is especially recommended for those:

- Who travel regularly
- Who have depleted their good bacteria due to antibiotic use
- With less than ideal eating habits

## **Elimination of Toxins**

Efficient waste elimination is another key to good digestive health. Many harmful toxins can be absorbed into the bloodstream from food, water or air. The liver, in addition to its roles in digestion and metabolism, serves as a chemical filtration plant where detoxification occurs. Digestive and detoxifying enzymes from the liver modify toxic metabolites and foreign chemicals to reduce their toxicity before they are eliminated from the body. Since the liver has so many vital functions to perform, it certainly deserves your utmost care.

USANA's Hepasil DTX<sup>™</sup> supports the liver's natural detoxification power while fending off oxidative stress that accompanies the

In an exclusive interview with Medical Grapevine, Dr Tim Wood, Consultant to USANA's Scientific Advisory Council, sheds some insights on the health benefits of USANA's Digestive Health range of products.



**MG:** The growth forecast for dietary supplements is excellent. Where do you think is the biggest potential for nutritional supplements – for disease prevention or as a therapeutic support?

Dr Wood: I think both are going to be realised, but from our standpoint, we first and foremost designed our products to keep healthy people healthy. It's really all about prevention. In the US, we spend upwards of 2.5-3 trillion on healthcare. About 97-98% of that spending goes to managing and treating diseases, and only 3% goes into preventing diseases. I think it should be the reverse and believe that's where the real potential for nutritional supplements lies. What would happen if we spent 20% of our healthcare expenditure on prevention as opposed to 2-3%? I think we would see a drastic improvement in overall health, and overall reduction in healthcare expenses. That's not to say, however, that our products can't help manage certain diseases. There are plenty of cases that show that they could be effective in helping manage certain diseases, and I would hope that licensed healthcare professionals will realise that nutrition plays an important role not just in keeping healthy people healthy, but also in addressing some disease conditions and that they will consider the use of high quality products such as ours in their practices as an adjunct to classic therapies.

**MG:** Scientists speculate that plant extracts such as milk-thistle and turmeric exert their beneficial effects by inducing a mild stress-response (hormesis) on the liver, up-regulating the production of antioxidant enzymes, most of which are under control of the Phase II response. Do you think the hormesis theory also explains, at least, partly the health-beneficial effects of Hepasil DTX?

**Dr Wood:** I've never thought of it as a stress response. What happens is that the liver perceives them as a xenobiotic, and

detoxification process. It is the first product of its kind made using USANA's innovative nutritional hybrid technology. Its proprietary antioxidant blend that includes turmeric extract and patented Olivol<sup>®</sup> olive-fruit extract is excellent for liver support. Other healthful ingredients in Hepasil DTX include:

- Choline helps process dietary fat and transport it from the liver
- Milk-thistle extract strong antioxidant properties to help defend against oxidative stress generated by the detoxification process
- Alpha-lipoic acid supports important enzymes both inside and outside the cells

 N-acetyl-L-cysteine – scavenges free radicals inside and outside the cell and promotes detoxification



induces the Phase I and Phase II enzyme production in the liver. At the same time, it has an overall health effect in inducing and balancing both systems and promotes the detoxification processes overall.

Curcumin is a component of a common food ingredient; and I've never heard anybody refer to curcumin as a toxin, or turmeric as a toxic food. But it has this benefit of turning on those enzyme systems. The same is true of many bioflavonoids. I suppose you could look at it as a stress response to the liver, but the fact of the matter is that we're ingesting these sorts of things almost anytime we eat a normal healthy well-balanced diet, and it's just kind of a normal process in the liver. I think the key here is that turning both the Phase I and Phase II provides the balance that the liver needs to actually run the entire detoxification process.

**MG:** There have been studies that increased (lipid) absortion may be responsible, at least in part, for obesity progression and hyperlipidaemia. Won't taking digestive enzymes compound this?

**Dr Wood:** This is certainly an aspect that has been considered in the formulation of our product. One of the issues we were very concerned about was glycaemic stress. Most digestive enzyme supplements contain a fair amount of amylase to break down starches. We looked into that and decided not to put too much of amylase into the formula, as there aren't many people who have problems in breaking down starch to begin with. Also, the last thing we want to happen is to break down a large amount of starch quickly, which will produce spikes in blood sugar levels.

As for lipid absorption, I think a lot of this boils down to the kind of diet one eats; if you're eating a high-fat diet, you're not doing yourself any good, with or without digestive enzyme supplements. Our whole philosophy to supplementation is to use it as a component of a programme in optimal nutrition, the foundation of which has got to be a healthy well-balanced diet that's low in saturated fats, and contain the proper amounts of the right kinds of fats.

\*First published in Medical Grapevine July 2011