Alcoholism

People who aren't alcoholic probably don't understand why an alcoholic can't just use a little willpower to stop drinking. The truth is, alcoholism has little to do with willpower. Alcoholics are in the grip of a powerful craving or uncontrollable need for alcohol that overrides their ability to stop drinking. Indeed, this can be as strong as the need for food or water.

According to the National Institutes of Health (NIH) and The National Institute on Alcohol Abuse and Alcoholism (NIAAA), alcoholism, also known as "alcohol dependence," is a disease that includes four symptoms:

- Craving: A strong need or compulsion to drink.
- Loss of control: The inability to limit one's drinking on any given occasion.
- Physical dependence: Withdrawal symptoms, such as nausea, sweating, anxiety and shakiness occur when alcohol use is stopped after a period of heavy drinking.
- Tolerance: The need to drink greater amounts of alcohol in order to "get high."

Alcoholism is not to be confused with alcohol abuse. Alcohol abuse does NOT include an extremely strong craving for alcohol, loss of control over drinking or physical dependence. However, alcohol abuse is defined as a pattern of drinking that results in one or more of the following situations within a 12-month period:

- Failure to fulfill major work, school or home responsibilities.
- Drinking in situations that are physically dangerous, such as while driving a motor vehicle or operating machinery.
- Having recurring alcohol-related legal problems, such as being arrested for driving under the influence of alcohol or for physically hurting someone while drunk.
- Continued drinking despite having ongoing relationship problems that are caused or worsened by the drinking.

While alcohol abuse is different from alcoholism, many effects of alcohol abuse also are experienced by alcoholics.

Physiological consequences of alcoholism

Alcohol disrupts liver function and therefore metabolism. From the moment alcohol enters the body, it is treated as if it has special privileges. Unlike foods, which require digestion, alcohol needs no digestion and is quickly absorbed. Approximately 20 percent is absorbed directly across the walls of an empty stomach and can reach the brain within a minute. Consequently, a person can immediately feel drunk. Alcohol is rapidly absorbed in the small intestine and it is from this point on that alcohol receives VIP treatment: It gets absorbed and metabolized before most nutrients.

Alcohol affects every organ of the body but most dramatically the liver. If liver cells could talk, they would describe alcohol as demanding, egocentric and disruptive of the liver's efficient way of functioning. The production of fatty acids accelerates with exposure to alcohol. (Nothing raises serum triglyceride levels like alcohol!) Fatty liver, which interferes with the distribution of nutrients and oxygen to liver cells, is the first stage of deterioration seen in heavy drinkers. The second stage of deterioration is called fibrosis, where liver cells die and form fibrous scar tissue. Some liver cells can regenerate with good nutrition and abstinence from alcohol, but in the most advanced state, cirrhosis, damage is the least reversible.

Sugar and the concept of allergic addiction

The common addictions change throughout life often starting in childhood with sugar but progressing on to caffeine, chocolate, nicotine, alcohol, solvents (such as glue sniffing), cannabis and hard drugs.

Too often I have seen patients who are successful recovering alcoholics but have since become sugar addicts. What I believe has transpired is that the addiction has refocused to what the biochemical pathway for craving was originally set up for in nature—sugar. This may explain the sweets and sugary cups of coffee much sought after by recovering alcoholics as witnessed during and after AA meetings. This strengthens the concept of allergic addiction where people get "hooked" to the very foods that cause them the most problems. In the short term, these foods will relieve symptoms but worsen them in the long term. In this context, allergy and addiction are synonymous.

Along with abstinence, a high protein and fat diet geared toward restabilizing blood sugar with nutrient-dense, low-glycemic foods and supplementation is critical. Nutrients such as alpha lipoic acid, milk thistle, L-Cysteine, thiamine, benfotiamine, Super B-Complex, CoQ10, GPLC, NT Factor, Ester-C, chromium, magnesium, taurine and Orthomega help to correct deficiencies and support the liver with detoxification and regeneration. To help control intense cravings, 5-Hydroxytryptophan and L-Glutamine have proven successful. Phosphatidylcholine from lecithin and betaine (or trimethylglycine) has been shown to confer some protection to the liver in the face of continued alcohol challenge.

A familiar trait in addiction is the imbalance of the neurotransmitters dopamine, serotonin and GABA. Neurotransmitter testing is extremely useful in revealing deficiencies of dopamine—the addiction neurotransmitter. Low serotonin levels are associated with depression and low GABA levels with anxiety. Depression and anxiety often run concurrently with addiction. Use of a "Neurotransmitter IV" rich in B vitamins, magnesium and other neurotransmitter precursors is helpful in assisting patients through detox but good behavioral support from an experienced addiction specialist, usually a psychiatrist, psychologist or social worker, is a prerequisite for success.

References:

Alcoholism: Getting the Facts (Online). June 15, 2006. Available at: www.nih.gov.

Whitney EN, Rolfes SR. *Understanding Nutrition*, 9th edition. Belmont, CA: Wadsworth/Thomson Learning; 2002.

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