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Alcohol use

Definition:

Alcohol use involves drinking alcohol, which is produced by fermenting the starch or sugar in fruits and grains.

Alternative Names:

Beer consumption; Wine consumption; Hard liquor consumption

Information:

People have been drinking alcoholic beverages since prehistoric times. The discovery of the distillation process during the 12th century made it possible to make drinks with higher alcohol content (hard liquor) than can be achieved by fermentation alone.

Alcoholic drinks have different amounts of alcohol in them -- beer is about 5% alcohol, wine is usually 12 - 15% alcohol, and hard liquor is about 45% alcohol.

Alcohol and [caffeine](#) are the two most widely used drug substances in the world. Alcohol use is NOT ONLY an adult problem. Most American high school seniors have consumed an alcoholic drink within the past month, despite the fact that the legal drinking age is 21 years old in the U.S.

About 20% of teens are "problem drinkers." This means that they:

- Get drunk
- Have accidents related to alcohol use
- Get into trouble with the law, family members, friends, school, or dates due to alcohol

Studies have shown that up to 6% of teens in the United States can be considered dependent or abusing alcohol. This means they have withdrawal symptoms when they try to stop or reduce their drinking, and they drink compulsively despite negative consequences.

A person's alcohol use is primarily influenced by attitudes developed during the childhood and teen years. It is impacted by:

- Family relationships
- Parents' attitudes and behaviors toward drinking
- Peer influence

- Society

There is likely a genetic (hereditary) tendency to alcohol use-related disorders.

THE IMMEDIATE EFFECTS OF ALCOHOL

Alcohol is absorbed into your bloodstream quickly. The absorption rate depends on the amount and type of food in your stomach. For example, high- [carbohydrate](#) and high- [fat](#) foods lessen the absorption rates. A carbonated alcoholic drink, like champagne, will be absorbed faster than a non-carbonated drink.

The effects of alcohol may appear within 10 minutes and peak at approximately 40 - 60 minutes. Alcohol stays in the bloodstream until it is broken down by the liver. If a person consumes alcohol at a faster rate than the liver can break it down, the blood alcohol concentration level rises.

Each state has its own legal definition for [alcohol intoxication](#), which is defined by blood alcohol concentration. The legal limit usually falls between 0.08 and 0.10 in most states. Different levels lead to different effects:

- 0.05 -- reduced inhibitions
- 0.10 -- slurred speech
- 0.20 -- euphoria and motor impairment
- 0.30 -- confusion
- 0.40 -- stupor
- 0.50 -- coma
- 0.60 -- respiratory paralysis and death

Alcohol depresses your breathing rate, [heart rate](#), and the control mechanisms in your brain. The effects include:

- Impaired motor coordination
- Impaired short-term memory
- Less ability to drive and perform complex tasks
- Prolonged reaction time
- Reduced attention span
- Reduced inhibitions, which may lead to embarrassing behavior
- Slower thought processes

If a pregnant woman drinks, alcohol can adversely affect the developing fetus. Alcohol can cause birth defects or [fetal alcohol syndrome](#) (a disorder marked by mental retardation and behavior problems).

HEALTH RISKS

Alcohol increases the risks of:

- Alcoholism or alcohol dependence
- Chronic [liver disease](#)
- Falls, drownings, and other accidents
- Fetal alcohol syndrome if a pregnant woman drinks

- Head, neck, stomach, and breast cancers
- Increased risk for homicide
- Motor vehicle accidents
- Risky sex behaviors, unplanned or unwanted pregnancy, and sexually transmitted diseases (STDs)
- Suicide and homicide

WHEN ABUSE BECOMES DEPENDENCE

People who drink alcohol (or who live with individuals who consume alcohol) may want to seek help for themselves or their loved ones if the following occur with drinking:

- Decreased interest or performance levels at work, school
- Defensive or hostile when asked about personal alcohol use
- Driving citations or accidents (DUI)
- Inability to decrease or stop drinking alcohol
- Increased absenteeism from work, school
- Increased social isolation
- Increased tolerance to amount of alcohol consumed: more alcohol is needed to produce the same effect
- Involved in violence, either as perpetrator or victim
- Lying or being secretive about alcohol use
- Neglecting appearance
- Neglecting proper nutrition
- Signs of withdrawal, such as tremors, appear when attempting to stop

It is also important to remember that some people are at higher risk for alcoholism due to:

- Family history of alcoholism
- Peer or cultural influences
- Psychological factors such as anxiety, [depression](#), or low self-esteem
- Stressful lifestyles

CALL YOUR HEALTH CARE PROVIDER IF:

- You are concerned about your personal alcohol use or that of a family member.
- You are interested in more information regarding alcohol use, [alcohol abuse](#), or support groups.
- You are unable to reduce or stop your alcohol consumption, in spite of attempts to stop drinking.

Other resources include:

- Local Alcoholics Anonymous or Al-anon/alateen groups (see [alcoholism - resources](#))
- Local hospitals
- Public or private mental health agencies
- School or work counselors
- Student or employee health centers

References:

Foster SE, Vaughan RD, Foster WH, Califano Jr. JA. Alcohol consumption and expenditures for underage drinking and adult excessive drinking. JAMA. 2003;289:989-995