# Alcohol Body and Soul







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This is an educational document for the benefit of patients and families in primary care and hospital settings.

It discusses the harmful effects of alcohol on both the body and mind/soul.

It is available free of charge.

Please download as many pages as you feel necessary.

If you are concerned about your drinking discuss it further with your Doctor.

# Developed by:

Mater Misericordiae University Hospital, Eccles Street, Dublin 7

Phone: 01 803 2880 Email: clpsych@mater.ie

The Irish College of General Practitioners, 4/5 Lincoln Place, Dublin 2

Phone: 01 6763705 Email: info@icgp.ie





## ALCOHOL – Standard Drinks

# A Standard Drink in Ireland is 10gm of alcohol

#### Standard drink

1 pint of beer = 2 standard drinks 1 can lager = 2 standard drinks 1 can strong lager = 3 standard drinks 1 measure of spirits = 1 standard drink 1 glass of sherry = 1 standard drink

1 small glass of wine = 1 standard drink (100mls)

1 bottle of wine = 7-9 standard drinks

(all approx depending on volume% of alcohol)

# **Definitions**

**Hazardous Drinking** A level of consumption or pattern of drinking that is likely to result in

> harm should current drinking habits persist. This includes any drinking by pregnant and nursing women, children and people who are ill or receiving treatment or who perform activities that are not advised when

drinking.

Harmful Drinking A level of consumption or a pattern of drinking that causes damage to

health, either physical or mental.

Dependence A chronic form of harmful drinking. Formerly known as alcoholism. A

condition in which the use of alcohol takes on a much higher priority for a given individual than other behaviours that once had greater value. Usually involves increased tolerance of alcohol, withdrawal symptoms, drinking to avoid withdrawal symptoms, loss of control of drinking and persistence in drinking despite negative consequences. Refers to many

people who appear to be functioning and not just those on "skid row".

**Heavy Episodic Drinking** Sometimes called binge drinking. Is definitely hazardous and can also

be harmful. Regular consumption (at least once per week) of six or more standard drinks. In Irish culture binge drinking often refers to regularly

'drinking to get drunk'.

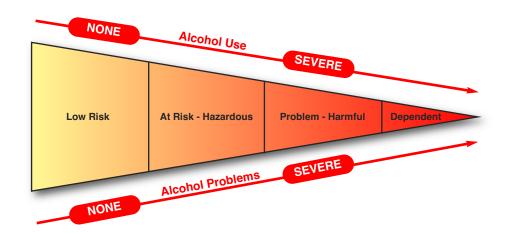


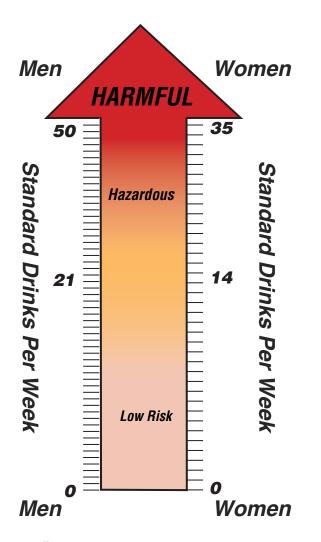


# **Continuum of Risk**

There is a continuum of risk, which is depicted in the following diagram. Hazardous drinkers are usually advised to cut back while harmful drinkers are often advised to abstain as are dependent drinkers.

# Relationship Between Alcohol Use and Alcohol Problems





# Weekly Alcohol Consumption and The Risk of Physical Harm

#### Notes:

- This arrow is designed for adults aged 18 65.
   Younger and older people should drink even less.
- Consumption in standard drinks is only a rough guideline to physical health risk.
- Females are more vulnerable to alcohol.
- Regular drinkers should have at least two or three non-drinking days per week. On drinking days, females could consume no more than two to three standard drinks and males three to four standard drinks to minimise risk.
- Some people should not drink at all for example, pregnant and nursing women, people on certain medications, those with certain mental and physical health problems, those diagnosed with alcohol dependence and many harmful drinkers.





# **Brain and Nervous System (1)**

#### Alcohol affects the brain and nervous system

Alcohol impairs judgement, memory and co-ordination. It slows down thinking and the ability to react quickly, which is why it is dangerous to drink and drive. In large amounts, alcohol acts like an anaesthetic inducing sleepiness and slowing down breathing. It can cause coma or even death. It can induce extreme mood swings and emotional outbursts including aggression. Long term drinking may result in permanent brain damage.

#### **Excessive drinking causes hangovers**

A hangover is a sign of alcohol poisoning. Alcohol is broken down in the liver into a number of substances, which are poisonous to the cells in the body. These substances cause the kidneys to produce more urine leading to dehydration. Symptoms of a hangover include nausea, vomiting, sweating, headache, irritability and shaking.

#### Alcohol can cause withdrawal symptoms

Some people become physically dependent on alcohol and experience withdrawal symptoms when they reduce their consumption or stop drinking. Symptoms vary and may be **mild** e.g. tremor, shaking, sweating, irritability and problems sleeping; **moderate** e.g. anxiety, cramps, vomiting; or **severe** e.g. fearfulness, hallucinations, convulsions (the "**D**elerium **T**remens"). The "DTs" can be fatal.

Signs of physical dependence on alcohol include a compulsion to drink or craving for alcohol, having to drink more to obtain the same effect, losing the ability to stop or control one's drinking, continuing to drink even though the alcohol is causing harm and consuming alcohol first thing in the morning (to avoid withdrawal symptoms).

#### Alcohol can cause memory blackouts

A blackout is a period of memory loss. If your friends can tell you what you were doing last night but you can't remember then you have had a blackout. It is often confused with passing out or losing consciousness.





# **Brain and Nervous System (2)**

#### Alcohol can damage the brain and nerves

Signs of damage include:

#### Korsakoff's Syndrome

A person with Korsakoff's syndrome loses the ability to remember things that have happened recently. Instead (s)he makes up stories to fill in the blanks in memory. It is rare and a sign of serious brain damage.

#### Dementia

Harmful alcohol consumption can lead to severe brain failure known as dementia.

- · 'Fits' or Seizures
- Peripheral Neuropathy

A person loses feeling, develops numbness and/or "pins and needles" in the hands and feet as the nerves to the feet and hands are damaged.

# Alcohol can affect your mood

**Depression** is very common among harmful drinkers and is a direct effect of alcohol on the brain.

Many people who attempt suicide have taken alcohol before the event.

Many people who complete suicide have also taken alcohol prior to the event.

Withdrawal symptoms mimic anxiety and panic attacks

Alcohol can cause hallucinations and delusions (psychosis)





#### Liver

#### Alcohol causes serious, life threatening diseases of the liver.

Symptoms often don't occur until the disease is already well advanced. At that stage, it may be too late to repair the liver.

#### **Fatty Liver**

Chronic harmful drinking causes the cells in the liver to become swollen and filled with fat. This is known as 'fatty liver' and this can cause liver failure. It is reversible if the person stops drinking.

# **Alcoholic Hepatitis**

Harmful drinking may cause 'alcoholic hepatitis'. When this happens the liver becomes inflamed and many of the cells are damaged. The symptoms include jaundice, weakness, loss of appetite, nausea, vomiting, fever, dark urine and weight loss. Alcoholic hepatitis can lead to liver failure and can be fatal. It is usually reversible if alcohol use is stopped.

#### Cirrhosis

'Cirrhosis' of the liver is a severe form of liver damage. Cells in the liver die and the liver becomes scarred and liver failure can develop. Cirrhosis is irreversible and unless drinking is stopped it is fatal.

#### Liver Failure

The symptoms of 'liver failure' include fatigue, jaundice (yellowish colour of the skin and whites of the eyes), itchy skin, and confusion. Skin bruises easily and uncontrolled bleeding can occur. Fluid is retained and the face, hands and legs become swollen. It is fatal unless treated early.

#### Cancer

Harmful drinkers are at risk of developing cancer of the liver.





# Stomach, Intestines and Pancreas

#### Stomach

Alcohol irritates the lining of the stomach and causes 'gastritis'. The symptoms include nausea, vomiting, stomach pain, sweating and loss of appetite. Vomiting blood (haematemesis) can also occur.

'Peptic ulcers' in the stomach and first part of the small bowel commonly develop in harmful drinkers.

**'Oesophageal varices'** are veins in the gullet which become engorged with blood in harmful drinkers. They can suddenly burst causing very heavy bleeding and sometimes death.

#### Intestines

The lining of the intestines is irritated by alcohol. Inflammation, ulcers and cancer can result. Symptoms include nausea, vomiting, stomach pain, sweating and diarrhoea.

Poor diet and inflammation of the stomach and intestines leads to malnutrition.

#### **Pancreas**

The pancreas is a large gland beside the stomach. Inflammation of the pancreas is called 'pancreatitis'. This condition is associated with severe abdominal pain and weight loss. It may be associated with malnutrition and can be fatal.

Harmful drinkers are at risk of developing cancer of the mouth, tongue, throat / gullet, oesophagus, pancreas, stomach or colon.





# Heart, Lungs and Blood

Harmful drinking causes serious, life threatening diseases of the heart and lungs.

#### Heart

Harmful drinking causes high blood pressure, which increases the risk of strokes and heart attacks.

Alcohol weakens the heart muscle causing 'cardiomyopathy', which can cause heart failure (beer-drinkers heart).

Alcohol can cause **palpitations** with an irregular heartbeat known as **atrial fibrillation** (holiday heart syndrome).

#### Lungs

Large amounts of alcohol causes the breathing to slow down. Rarely, breathing may stop altogether resulting in death.

Harmful drinking causes vomiting. People who are unconscious (caused by alcohol) may inhale their vomit. This causes a serious chemical form of **pneumonia** (aspiration) which is life threatening.

Alcohol can cause **obstructive sleep apnoea** which is associated with episodes of stopping breathing during sleep, snoring, daytime fatigue and drowsiness.

Alcohol is also associated with an increased risk of lung infections including tuberculosis (T.B.) and a slower recovery from infection.

#### **Blood**

Malnutrition and liver disease, both resulting from alcohol, cause **anaemia**. Alcohol itself damages the bone marrow and reduces the body's ability to make white blood cells which normally fight infections.

Harmful drinkers are more susceptible to infection.





# Eyes, Ears, Nose and Throat

Alcohol affects vision and makes it harder to adjust to changes in light, for example when going from a bright room to a dark room or when driving at night. Harmful drinkers often have red eyes and pinpoint pupils.

Alcohol reduces the ability to distinguish between sounds and perceive their direction.

Alcohol dulls taste and smell, which reduces the desire to eat.

Speech becomes slurred.

Irritation of the lining of the throat causes pain, vomiting and difficulty swallowing.

## Harmful drinkers are at risk of developing throat cancer.

#### Skin

Alcohol directly and indirectly affects the skin. It makes psoriasis and eczema worse. Blood vessels become swollen (spider naevi).

#### **Muscles and Bones**

Alcohol weakens the muscles and causes cramps, pain and tenderness (myopathy).

A bout of harmful drinking can cause a rare condition called 'rhabdomyolysis' which results in some of the muscles being broken down very rapidly. The 'breakdown products' can block the kidneys and cause kidney failure and death.

Alcohol interferes with the body's ability to absorb calcium resulting in soft, thin brittle bones, 'osteoporosis'. Hazardous / Harmful alcohol use is also associated with falls and fractures. Older people are more at risk.





### **Reproductive System**

#### Men

Impotence, enlarged breasts, reduced sex hormones and infertility are found in harmful drinkers, and may become irreversible if drinking is continued.

Alcohol, in the short term, can "increase the desire but decrease the performance". In the long term, it reduces "the desire" and is associated with shrinkage of the testicles (testicular atrophy).

#### Women

Alcohol is associated with menstrual irregularities and infertility.

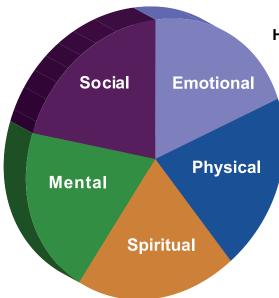
Harmful drinking during pregnancy damages the baby. Babies with 'foetal alcohol spectrum disorder' or 'foetal alcohol syndrome' may be born with small heads, abnormal facial features and even brain damage. They suffer retarded growth and development.

Harmful alcohol use in women is associated with breast cancer.





The harmful consumption of alcohol impacts severely on ALL areas of health.



Hazardous, Harmful and dependent drinkers are at greater risk of

- · Breaking the law and arrest
- Relationship breakdown
- Mental health problems
- Absenteeism, poor job prospects and unemployment
  - Incidents and accidents
- Sexually transmitted diseases
- Unplanned pregnancies
- · General ill-health
- Family problems
- Other drug use

# **Alcohol and Cancer**

# Harmful alcohol consumption is associated with a wide range of cancers

Mouth

Tongue

Voice Box (larynx)

Throat / Gullet

Oesophagus

Stomach

Liver

**Breast** 

Pancreas

# Harmful alcohol use increases the risk of developing other cancers

Colon

Rectum

Lung

Prostate

Ovary

Skin





# Advice to people who want to reduce alcohol consumption

- Set a date to cut down and look for support
- Keep a weekly diary of consumption
- Water down alcohol and drink slowly
- Take smaller drinks have a glass instead of a pint
- Drink water and/or soft drinks between alcoholic drinks
- Put alcohol on least favoured hand at meals and have a glass of water on the favoured hand in order to consume less alcohol
- Avoid solitary or secretive drinking
- Avoid the round system
- Never drink and drive
- Keep active and develop interests
- Continue to ask for help from family, friends and professionals.

# Advice to people who want to stop or who are advised to stop drinking

- Discuss methods of stopping and how to stay off alcohol with your Doctor
- Set a date to stop drinking and look for support
- Undergo detoxification, or arrange same, if appropriate
- Drink water and/or soft drinks instead of alcohol
- Attend a specialist Counsellor and/or a Psychiatrist as appropriate
- Consider taking specific medication that reduces craving or is a deterrent, if appropriate
- Attend support groups such as Alcoholics Anonymous and ANEW (for women only), if appropriate
- Talk to someone in recovery. Ask your Doctor to recommend someone
- Take vitamins as necessary
- Read recommended literature including leaflets
- Keep active and develop interests
- Continue to ask for help from family, friends, self-help groups and professionals.

# Some of the advantages of reducing or stopping alcohol consumption

You will have more energy.

You will sleep better.

Food will taste better.

You are more likely to develop leisure activities and get involved in exercising.

You will have more disposable income.

You will not put on as much weight.

Your memory and intellect will be sharper.

Your emotions will be more stable.



