

KEEP A CLOSE WATCH ON YOUR FOOD

While more than 90% of cases involving food poisoning are mild, the type of contaminated food and the amount eaten can have adverse outcomes. Dr Cheong Wei Kuen, Consultant Gastroenterologist & Physician, Mt Elizabeth Medical Centre, looks at the significance of food poisoning to those with diabetes, how to prevent and manage it.

Food poisoning occurs when contaminated food or water is consumed. The contaminating agent may be a chemical, a toxin or an infection by either viruses, bacteria or even parasites. The source of contamination is most commonly through faeces of an infected person coming into contact with food and/or water under unhygienic conditions.

Viruses are the most common cause of food poisoning, followed by bacteria and least commonly by parasites. Bacteria can cause food poisoning by either directly invading the intestines or through the production of toxins.

The severity of food poisoning depends on the type of contaminant and the amount eaten. Symptoms can develop within 30 minutes to six hours of consuming the contaminated item, or alternatively come on only days later, worsening over the following days or even weeks. Nausea, vomiting, diarrhoea, and abdominal cramping are the most commonly experienced symptoms. There may also be fever, headaches, muscle aches, and even passage of blood. Some bacterial food poisoning can cause liver and kidney failure, bleeding tendencies and even brain, heart and nerve related damage.

Pre-existing background medical problems (e.g. kidney failure, diabetes, cancer) can further exacerbate what might have been a fairly mild attack in a healthy individual.

More than 90% of food poisonings are mild, with the illness lasting for only 24 to 48 hours. Recovery is usually spontaneous with little need for specific medications nor even a trip to the clinic. Antibiotics are usually neither needed nor helpful. Maintenance of oral hydration is the most important and often, the only treatment needed in addition to simple medications to relief abdominal cramps and control the frequency of diarrhoea and vomiting.



However, some cases of food poisoning can have adverse outcomes and it is therefore important to identify situations where particular care and vigilance is called for, before serious complications set in. The following scenarios should receive consideration for early medical attention:

- Symptoms are not showing any signs of abatement or are getting worse even after the next two to three days
- There is severe abdominal pain or distension
- There is high fever (more than 38° to 39°C) especially if there is shivering
- Blood is noted in the stools
- Vomiting is severe and the person cannot keep oral any fluids down
- Extremely frequent large volume watery stools accompanied by reduction in urine output. This is indicative of severe dehydration
- The affected person is getting weaker, more drowsy or lethargic
- The affected person is an infant, young child of less than 10 years or elderly. These individuals tolerate dehydration poorly and can rapidly deteriorate
- There is pre-existing serious underlying illness (e.g. diabetes mellitus, kidney disease, cancer, person is taking medications that depress the immune system). This is particularly so if vomiting is preventing the person from taking his usual medications for the other illnesses
- Pregnancy



In the case of diabetic patients, be especially vigilant.

- Diabetic sugar control usually worsens when there is superimposed illness or infection of any sort and often, this can precipitate a diabetic emergency (e.g. ketosis, hyperosmolar coma)
- Sugar control becomes erratic and more difficult because of unpredictable intake and irregularly timed meals, in addition to the inability to take the usual diabetic medications
- Diabetic patients who have concomitant kidney damage are at higher risk as kidney function may worsen very rapidly with dehydration

It is therefore advisable that early medical consultation is obtained unless the food poisoning is very mild and is showing signs of improvement within the next 24 hours.

While diabetic patients are generally at higher risk of getting infections, there is no evidence that they are particularly prone to getting food poisoning as long as the usual precautions are observed.

Precautions for reducing the risk of food poisoning

Cleanliness

- Wash your hands, cutting or food processing surfaces, especially before and after handling raw meat and poultry
- Cleaning sponges should be cleaned with detergent and hot water after use

Avoid cross contamination

- Avoid contact between raw meats or meat juices with other

food especially fruits, vegetables, cooked food or other ready-to-eat foods e.g. cheese

Proper storage and handling of food

- Refrigerator should be maintained at least 4°C with the freezer at 10°C
- Defrost frozen foods and marinate meat and poultry in the refrigerator. Cook meat and poultry immediately after thawing
- Do not repeatedly freeze and thaw food
- Do not leave food at room temperature for more than two hours, and only an hour if the room temperature is 30°C or higher
- Pick up raw foods last during your shopping trip. Get them home quickly. Unload perishable foods first to the refrigerator

Cook foods at proper temperatures

- Use a food thermometer to check the internal temperatures of cooked meat. Cook meats till internal temperature is at least 70° to 80°C

Other Issues

- Food poisoning tends to occur at picnics, school cafeterias, and large social functions as food tends to be left out of the refrigerator too long or food preparation techniques may not be clean
- When travelling, eat only hot, freshly cooked food. Drink water only if it has been boiled. DO NOT eat raw vegetables or unpeeled fruit.
- Never use ice unless you are sure it is made from adequately boiled or filtered water