



## Possibilities and Causes of Food Poisoning

## Zhang Guo<sup>\*</sup>

Department of Food Microbiology, Federal University of Minas Gerais, Belo Horizonte, Brazil

## ABOUT THE STUDY

Foodborne illness, most commonly known as food poisoning, is an illness that occurs by eating contaminated, spoiled, or toxic food. They are usually viruses, bacteria, or parasites. When a source of such infection is food, it is called food poisoning and it can contaminate food at any stage of processing or production. Contamination can also occur at home through improper handling and cooking of food. Symptoms of food poisoning which can start within hours of eating contaminated food include nausea, vomiting, diarrhea, and abdominal pain. It also can lead to dehydration, especially in vulnerable people such as the very young and very old. Most of the cases related to food poisoning seem to be mild and gets settle without any treatment. But some people have to go to the hospital.

Food poisoning is the leading cause of gastroenteritis, resulting in a well-known set of unpleasant symptoms. Gastroenteritis is also known as "stomach flu" or "gastric flu". Gastroenteritis usually gets cured without taking any medication, but in some cases it leads to complications. Gastroenteritis is a disease in which the lining of the gut, especially of the stomach and intestines, become inflamed. This is usually caused by a pathogen that infects a person and causes symptoms. Food poisoning generally occurs when food is not cooked properly or when the food is reheated thoroughly, when food is not stored properly like If it is not frozen or refrigerated and is left out for too long, handled by a sick person or someone who has not washed their hands, and also if it is consumed after the expiration date.

Symptoms of foodborne illness usually appears within hours or one to two days or several weeks later after eating infected or contaminated food with the pathogen, but the incubation period can be much longer depending on the involved pathogen. Causes include diarrhea (loose stools), nausea (feeling uneasy), vomiting, abdominal pain (stomach cramps), loss of appetite, fever or rising temperature and chills, weakness, and muscle pain. These symptoms can occur in any combinations and are usually sudden (acute) but can vary in severity of symptom. Vomiting usually occurs earlier in the illness. The latent life threatening symptoms of food poisoning include diarrhea usually lasts for more than 3 days but may last longer depending on the organism causing the symptoms, difficulty seeing or speaking, etc. Severe dehydration symptoms such as fever over 102°F (38.9°C), dry mouth, passing little or no urine, inability to hold fluids, blood in the urine.

Bacteria are the most common cause of food poisoning. Bacteria that cause food poisoning include: *E. coli*, especially Shiga Toxinproducing *E. coli*, (STEC), *Listeria*, *Salmonella*, *Campylobacter*, *Clostridium botulinum*, *Staphylococcus aureus*, *Shigella*, *Vibrio vulnificus*. Parasitic food poisoning is less common than bacterial food poisoning, but parasites that spread through food are still very dangerous. They include: *Toxoplasma gondii*, *Giardia lamblia*. Various tapeworms such as: *Taenia saginata* (beef tape worm), *Taenia solium* (pork tapeworm), *Diphyllobothrium latum* (fish tapeworm), *Cryptosporidium*, *Ascaris lumbricoides*, roundworm species, flukes (flatworms) such as *Opisthorchiidae* (liver fluke) and *Paragonimus* (lung fluke), Pinworm infection, Trichinellosis. Food poisoning which can also be caused by viruses such as:

*Norovirus* is also known as Norwalk virus, *Rotavirus*, Hepatitis A virus, and *Sapovirus*. Viral infections commonly cause diarrhea with blood or mucus, also watery diarrhea being the predominant symptom.

Correspondence to: Zhang Guo, Department of Food Microbiology, Federal University of Minas Gerais, Belo Horizonte, Brazil, E-mail: Guozg@91.br

Received: 12-Sep-2022; Manuscript No. JFMSH-22-19596; Editor assigned: 15-Sep-2022; PreQC. No. JFMSH-22-19596 (PQ); Reviewed: 29-Sep-2022; QC. No. JFMSH-22-19596; Revised: 06-Oct-2022; Manuscript No. JFMSH-22-19596 (R); Published: 12-Oct-2022, DOI: 10.35248/2476-2059.22.7.180.

Citation: Guo Z (2022) Possibilities and Causes of Food Poisoning. Food Microbial Saf Hyg. 7:180.

**Copyright:** © 2022 Guo Z. This is an open-access article distributed under the terms of the Creative Commons Attribution License, which permits unrestricted use, distribution, and reproduction in any medium, provided the original author and source are credited.