

# Food Safety Requirements at Food Facilities and Application of HACCP System

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## The Topics

- Food Safety and aims of the food safety.
- Benefits of good food safety.
- Costs of poor food safety and food contamination.
- Prevalence of Food poisoning
- Hazard of food safety
- Initial Questions
- Flow food diagram- catering operation
- Food storage.
- Food Safety Tips
- Tips for food handlers hand washing.
- **Principles of HACCP implementation**
- Corrective actions of HACCP
- Regulations of Food Quality and Safety.

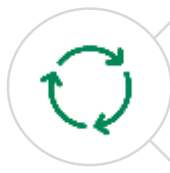
# Food Safety



Food Safety refers to handling, preparing and storage food in a way to reduce the risk of individuals becoming sick from foodborne illnesses.



The principles of food safety aim to Prevent food contamination.



Reduce food spoiling and Prevent food poisoning



## The aims of Food Quality and Safety

- Health control of foodstuffs.
- Health control of workers in the field of food handling
- Health control over the food trading venues directly related to the health of the individuals.





Having a healthy meals for the consumers.



Satisfied customers (taste, textures and confident customers ).



Healthy consumers and healthy employees



Reducing food waste, food loss and save money (profit gain)



Compliance with the programs such as HACCP, Iso 22000, procedures, recommendations of food safety.



Pleasant working environment.

## Benefits of good food safety

## The costs of poor food safety



Operating costs increase – employee absenteeism and reduced productivity.



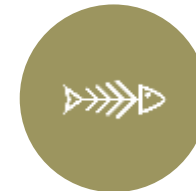
Hospitalizations and even death,  
Personal pain and suffering.



Loss of confidence  
and bad publicity.



Lawsuit  
damages.



Food wasting  
Profit loss.



# HAZARDS

## Three Hazards



### Biological

**Bacteria & viruses  
(microorganisms)**

Biggest threat to food safety,  
responsible for majority of  
food borne illness outbreaks.



### Chemical

**Cleaning  
supplies**



### Physical

**foreign objects, i.e.,  
dirt, hair, glass**



# Prevalence of Food Poisoning Worldwide

- There were an estimated 582 million cases of 22 different foodborne enteric diseases
- Food poisoning causes 351 000 associated deaths worldwide.
- The most deaths were from Salmonella Typhi (52 000 deaths), enteropathogenic E. coli (37 000) and norovirus (35 000).
- Over 40% people suffering from enteric diseases caused by contaminated food were children



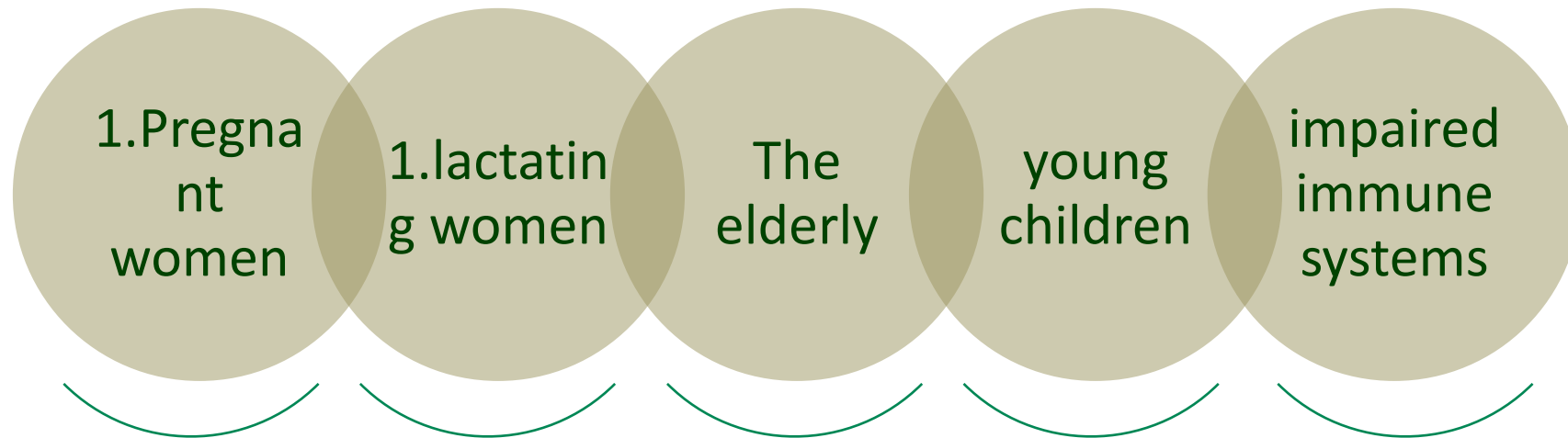


## Prevalence of Food Poisoning in USA

- CDC estimates that each year roughly 1 in 6 Americans (or 48 million people) get sick.
- 128,000 are hospitalized due to food contamination or poisoning.
- Estimated 3,000 die of foodborne diseases annually in USA due to food contamination or poisoning.



## Those most at risk include





## Initial Questions

How does food become contaminated?

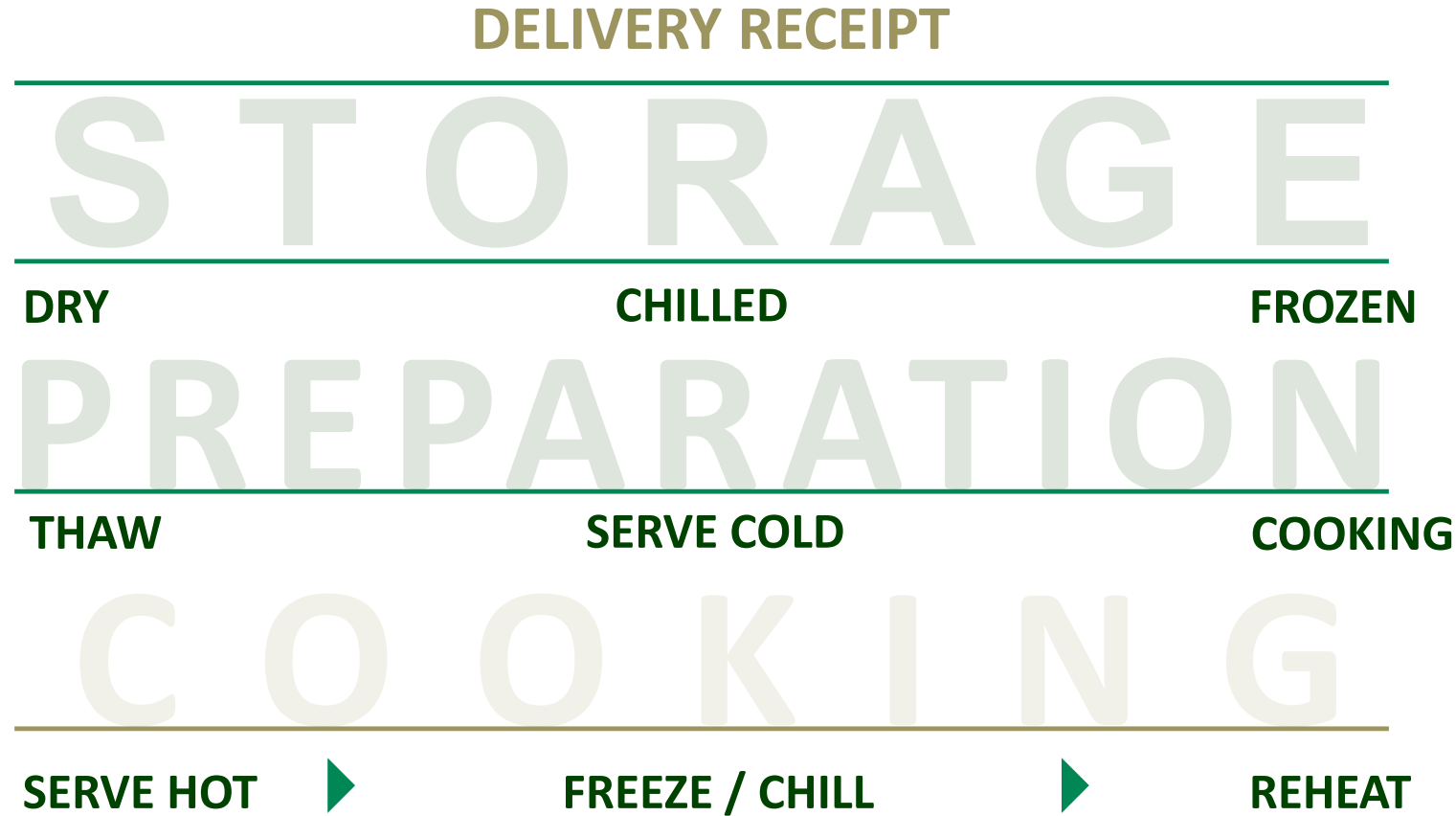
Cross - contamination is the contamination of a food product from another source.

Bacteria also need to grow before they become a foodborne threat

Proper food handling practices are important to reduce the likelihood that bacteria will be allowed to grow and contaminate food

- **FOOD STORAGE**
- **TEMPERATURE**
- **TIME**
- **HYGIENE**
- **SANITATION**

## Food flow diagram – catering operation



# Food Storage

*Food can be divided into four main groups:*



- **Dry Food**

flour, sugar, pasta, rice



- **Semi - Dry Food**

potatoes, apples, oranges, bread



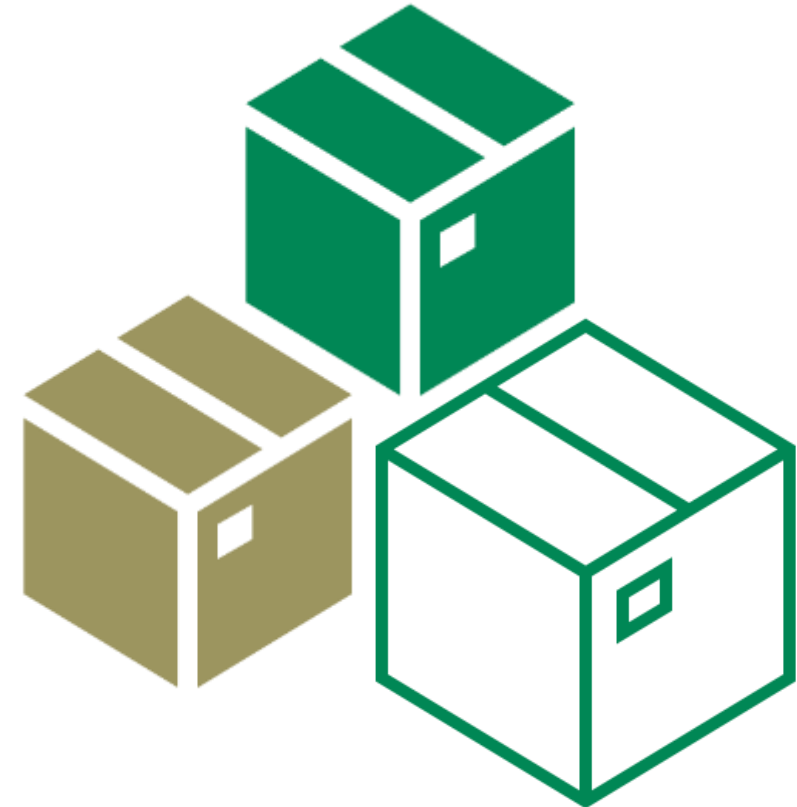
- **Perishable foods**

that should be kept in the fridge.



- **Frozen foods**

foods to be kept for a longer time in the freezer.





## FOOD SAFETY TIPS

KEEP	Keep the inside of the refrigerator very cold. The lowest shelves being the coldest.
NEVER	<b>NEVER</b> stuff the meat, turkey or fish until you are ready to cook them.
COOK	After thawing foods, you must cook them before refreezing.
CAUTION	Any food containing mayonnaise must be always kept cold.
WASH	Wash all fruits and vegetables before eating them.



# Tips for Food Handlers -Steps to Prevent Food Poisoning

## Hand Washing

The single most important means of preventing the spread of infection and illness, and cross contamination



## *Proper Hand Washing Procedure*

Wet your hands with running water as hot as you can comfortably stand



Apply Soap then Vigorously scrub hands and arms for ten to fifteen seconds



Rinse thoroughly under running water



Dry hands and arms with a single-use paper towel or warm-air hand dryer

## When to wash hands

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Before, during, and after preparing any food.

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After handling uncooked meat, chicken or other poultry, seafood, flour, or eggs.

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Before and after using gloves to prevent germs from spreading to food and the hands.

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Before eating.

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After touching garbage.

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After wiping counters or cleaning other surfaces with chemicals.

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After going to the toilet.



## Protective clothing

### *Employee responsibilities*

- Wear the correct clothing for the work.
- Food safe gloves and hair nets help to hygienically prepare food and prevent foreign objects in falling into food.
- Clean aprons, gloves, towels and more will help to hygienically prepare food, protecting your customers from food poisoning or injury.
- Change clothing as soon as it becomes soiled, torn or damaged.
- Tell manager if protective clothing is torn or damaged.

# Principles of HACCP implementation

- Hazard analysis
- Determine of Identify the Critical Control Points (CCP)
- Establish critical control point and limits
- Monitor the Critical Control Point (CCP)
- Corrective actions
- Establish verification procedures verify that the HACCP system is working
- Record keeping procedures (Document the HACCP system)



## Critical Control Point

Points may be identified as critical points (CCP) when hazards can be prevented, for example:

- Microbiological or chemical poisoning agents can be removed by proper cleaning of the surfaces.
- Pathogenic bacteria growth can be controlled by refrigerated storage or chilling.
- Chemical residue or contamination can be prevented by control at the receiving stage.



## Regulations of Food Quality and Safety

HACCP System and ISO 22000 Food Safety Management System

Specifications and regulations of foods and food products issued by Saudi Food and Drug Authority.

Any recommendations issued by international organizations and recognized scientific societies



THANK  
YOU!  
Thank you!