

رسالة الفخر



Hazard Analysis and Critical Control Points (HACCP)

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References

- **GENERAL PRINCIPLES OF FOOD HYGIENE, CAC/RCP 1-1969, Adopted 1969. Amendment 1999. Revisions 1997, 2003 and 2020. Editorial corrections 2011.**
- **GUIDELINES FOR THE VALIDATION OF FOOD SAFETY CONTROL MEASURES - CAC/GL 69 - 2008 - Editorial amendments 2013.**

References (cont.)

- استاندارد ملی ایران شماره 4557- تجدد نظر اول – ” راهنمای سیستم تحلیل خطر و کنترل نقاط بحرانی“

Objective of the course

- To improve knowledge of experts and assist commercial and food industry compliance with the current requirements for food safety by using HACCP system.

A photograph of an astronaut in a white spacesuit standing on the moon's surface, with the lunar landscape and sky in the background. The image is overlaid with a semi-transparent blue filter.

HISTORY OF HACCP

A brief history of HACCP

- HACCP stands for Hazard Analysis and Critical Control Points.
- The concept of HACCP was developed **in the 1960s** by a team of scientists and engineers from the Pillsbury Company, NASA and the US Army laboratories.

A brief history of HACCP (cont.)

- **Their aim was to produce “zero defects” food products for NASA astronauts. But the first HACCP standard was issued in late 80s by the U.S. National Advisory Committee on the Microbiological Criteria for Food (NACMCF). After the first revision in 1992, it was adopted by the Codex Alimentarius Commission and published as the first international HACCP standard.**


INTRODUCTION

People have the right to expect the food they eat to be safe and suitable for consumption. Foodborne illness and foodborne injury are at best unpleasant; at worst, they can be fatal.

Codex General Principles of Food Hygiene- CXC 1-1969

Introduction (cont.)

- HACCP is a tool to assess hazards and establish control systems that focus on prevention rather than relying mainly on end-product testing.



GENERAL GUIDELINES FOR THE APPLICATION OF THE HACCP SYSTEM

Introduction

- Prior to application of a HACCP system by any FBO in the food chain, that FBO should have in place prerequisite programs, including good hygienic practices (**GHPs**) and in accordance with relevant **food safety requirements set by competent authorities**.

Introduction (cont.)

- HACCP application will not be effective without prior implementation of prerequisite programs including GHPs.

Introduction (cont.)

- For all types of food businesses, management awareness and commitment to food safety are necessary for implementation of an effective HACCP system.
- The effectiveness will also rely upon management and personnel having the appropriate HACCP training and competency. Therefore, ongoing training is necessary for all levels of personnel, including managers.

Introduction (cont.)

- A HACCP system identifies and enhances control of significant hazards, where necessary, over that achieved by the GHPs that have been applied by the establishment.
- The intent of the HACCP system is to focus control at Critical Control Points (CCPs).

Introduction (cont.)

- FBOs need to be aware of hazards that may affect their food.
- FBOs need to understand the consequences of these hazards for consumer health and should ensure that they are properly managed.

FIVE KEYS TO SAFER FOOD MANUAL



KEEP CLEAN

SEPARATE RAW AND COOKED

COOK THOROUGHLY

KEEP FOOD AT SAFE TEMPERATURES

USE SAFE WATER AND RAW MATERIALS

Five keys to safer food

Keep clean



- ✓ Wash your hands before handling food and often during food preparation
- ✓ Wash your hands after going to the toilet
- ✓ Wash and sanitize all surfaces and equipment used for food preparation
- ✓ Protect kitchen areas and food from insects, pests and other animals

Why?
While most microorganisms do not cause disease, dangerous microorganisms are widely found in soil, water, animals and people. These microorganisms are carried on hands, wiping cloths and sponges, especially cutting boards and the slightest contact can transfer them to food and cause foodborne diseases.

Separate raw and cooked



- ✓ Separate raw meat, poultry and seafood from other foods
- ✓ Use separate equipment and utensils such as knives and cutting boards for handling raw foods
- ✓ Store food in containers to avoid contact between raw and prepared foods

Why?
Raw food, especially meat, poultry and seafood, and their juices, can contain dangerous microorganisms which may be transferred onto other foods during food preparation and storage.

Cook thoroughly



- ✓ Cook food thoroughly, especially meat, poultry, eggs and seafood
- ✓ Bring foods like soups and stews to boiling to make sure that they have reached 70°C. For meat and poultry, make sure that juices are clear, not pink. Ideally, use a thermometer
- ✓ Reheat cooked food thoroughly

Why?
Proper cooking kills almost all dangerous microorganisms. Studies have shown that cooking food to a temperature of 70°C can help ensure it is safe for consumption. Foods that require special attention include minced meats, rolled meats, large joints of meat and whole poultry.

Keep food at safe temperatures



- ✓ Do not leave cooked food at room temperature for more than 2 hours
- ✓ Refrigerate promptly all cooked and perishable food (preferably below 5°C)
- ✓ Keep cooked food piping hot (more than 60°C) prior to serving
- ✓ Do not store food too long even in the refrigerator
- ✓ Do not thaw frozen food at room temperature

Why?
Microorganisms can multiply very quickly if food is stored at room temperature. By holding at temperatures below 5°C or above 60°C, the growth of microorganisms is slowed down or stopped. Some dangerous microorganisms still grow below 1°C.

Use safe water and raw materials



- ✓ Use safe water or treat it to make it safe
- ✓ Select fresh and wholesome foods
- ✓ Choose foods processed for safety, such as pasteurized milk
- ✓ Wash fruits and vegetables, especially if eaten raw
- ✓ Do not use food beyond its expiry date

Why?
Raw materials, including water and fish, may be contaminated with dangerous microorganisms and chemicals. Some chemicals may be formed in damaged and mouldy foods. Care in selection of raw materials and simple measures such as washing and peeling may reduce the risk.

Knowledge = Prevention

Food Safety World Health Organization

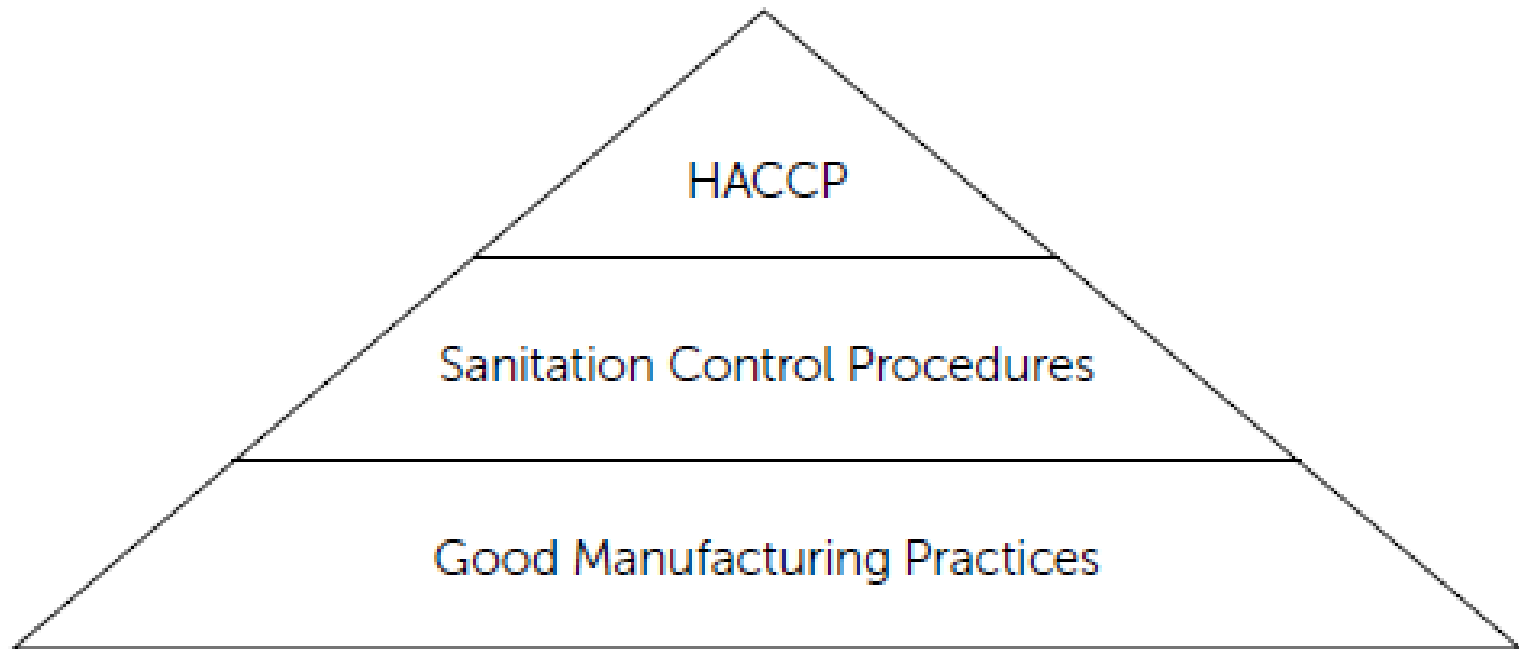
Is HACCP a stand-alone program?



Is HACCP a stand-alone program?

- HACCP is not a stand-alone program, but part of a larger system of control procedures to ensure food safety.
- For HACCP to function effectively, it needs to be accompanied by what are called “prerequisite programs”.

HACCP is not a stand-alone system.
HACCP is built on a foundation of Good Manufacturing Practices.



Elements of a Food Safety Management System (FSMS)

FOOD SAFETY MANAGEMENT SYSTEM

