

Minimally processed/cost  
effective foods with  
functional and  
therapeutic features

**Manufacturer to adopt and ensure quality and safe food to  
consumers**



**Implement new quality (ISO 9001:2000) and food safety  
system (HACCP) during various stages of supply chain  
from milch animal to consumer.**

**Globalization of food supply chain, increasing importance of Codex Alimentarius Commission and obligations emerging from World Trade Organization (WTO) agreements results in unprecedented interest in development of food standards and regulation, and strengthening of food control infrastructure at the country level**

# Challenges for food control authorities



**Increasing burden of food borne illness and emergence of new food borne hazards**

**Rapidly changing technologies in food production, processing and marketing**

**Growing consumer awareness of food safety and quality issues**

**International food trade and need for harmonization of food safety and quality standards**

# National Food Control System

1. Essential to protect health and safety of domestic consumers.
2. Assure safety and quality of foods entering international trade and ensure imported foods conform to national requirements.
3. To comply with international requirements, Food Safety and Standard Act, 2006 has been enacted by government of India to ensure quality and safe food to consumers.
4. **Food Safety and Standard Authority of India (FSSAI)** has been mandated by the FSS Act 2006 for orders that handle food related issues in various ministries and departments. FSSAI lay down science based standards for food articles and regulate their manufacture, storage, distribution, sale and import to ensure safe and wholesome food.

# Food Control:

1.

- Mandatory regulatory activity of enforcement by national/local authorities to provide consumer protection and ensure that all foods during production, handling, storage, processing, and distribution are safe, wholesome and fit for human consumption

2.

- Confirm to safety and quality requirements

3.

- Accurately labeled as prescribed by law

**Enforce food law(s) protecting consumer against unsafe, impure and fraudulently presented food by prohibiting the sale of food, substance or quality demanded by purchaser.**

**Improper agricultural practices**

**Poor hygiene at all stages of the food chain**

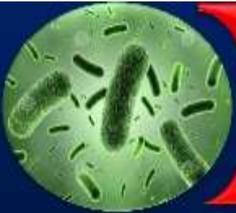
**Lack of preventive controls in food processing and preparation operations**

**Misuse of chemicals**

**Contaminated raw materials**

**Inadequate/improper storage**

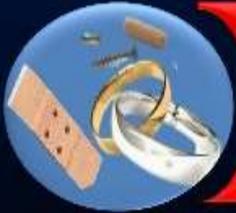
**Factors which contribute to potential hazards in foods**



Biological



Chemical

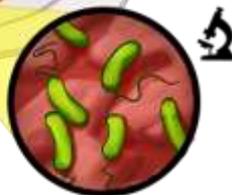
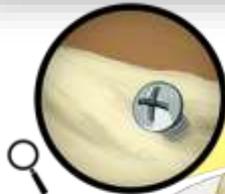
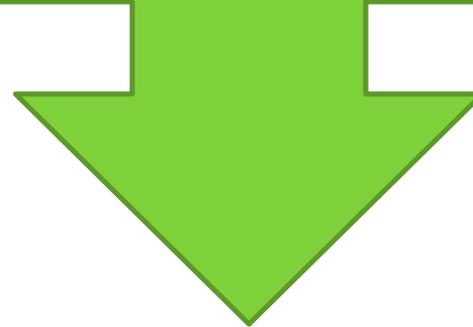


Physical

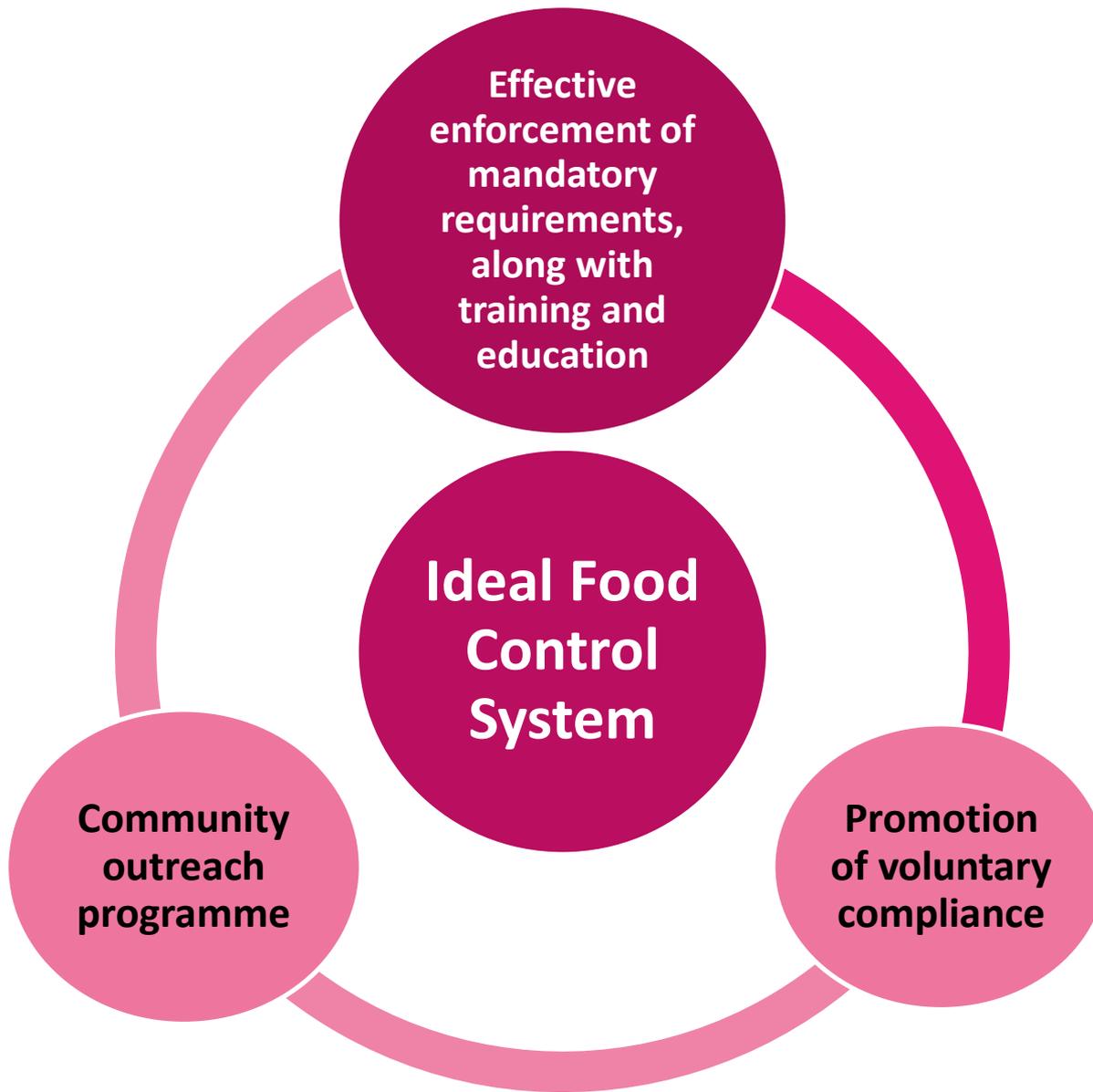


Allergenic

1. Microbiological hazards
2. Xenobiotic residues including synthetic pesticides, drugs, antibiotics, plastics etc.
3. Misuse of food additives
4. Chemical contaminants including biological toxin
5. Artificial foods
6. Allergens/process induced toxicants



**Specific Concern on Food Hazards**



**Introduction of preventive approaches (Hazard Analysis Critical and Control Point (HACCP) system have resulted in industry taking greater responsibility and control of food safety risks. This integrated approach facilitates improved consumer protection, effectively stimulates agriculture and the food processing industry and promotes domestic and international food trade.**



## **Global Considerations**

- With an expanding world economy, liberalization of food trade, growing consumer demand, developments in food science and technology and improvements in transport and communication international trade in fresh and processed food will continue to increase.
- Access of countries to food export markets will continue to depend on their capacity to meet the regulatory requirements of importing countries.
- Creating and sustaining demand for their food products in world markets relies on building trust and confidence of importers and consumers in integrity of their food systems.

# **Codex Alimentarius Commission**

- 1. CAC is an inter-governmental body that coordinates food standards at international level.**
- 2. Main objectives are to protect the health of consumers and ensure fair practices in food trade.**
- 3. Successful in achieving international harmonization in food quality and safety requirements.**
- 4. Formulated international standards for food products and specific requirements covering pesticide residues, food additives, veterinary drug residues, hygiene, food contaminants, labelling etc.**
- 5. Codex recommendations are used by governments to determine policies and programmes under their national food control system.**
- 6. Codex work created worldwide awareness of food safety, quality and consumer protection issues.**

# **SPS and TBT Agreements**

- 1. Conclusion of the Uruguay Round of Multilateral Trade Negotiations in Marrakech led to establishment of the WTO on 1 January 1995 and to coming into force of the Agreement on Application of Sanitary and Phytosanitary Measures (SPS) and Agreement on Technical Barriers to Trade (TBT).**
- 2. Both these Agreements are relevant in understanding the requirements for food protection measures at national level, and rules under which food is traded internationally.**
- 3. SPS Agreement confirms right of WTO member countries to apply measures to protect human, animal and plant life and health. Covers all relevant laws, decrees, regulations; testing, inspection, certification and approval procedures; and packaging and labelling requirements directly related to food safety.**

4. The agreement encourages use of international standards, guidelines or recommendations where they exist and identifies those from Codex (relating to food additives, veterinary drugs and pesticide residues, contaminants, methods of analysis and sampling and codes and guidelines of hygienic practices) to be consistent with provisions of SPS.
5. Codex standards serve as a benchmark for comparison of national sanitary and Phytosanitary measures. While it is not compulsory for member states to apply Codex standards, it is to harmonize their national food standards with those elaborated by Codex.
6. TBT Agreement requires that technical regulations on traditional quality factors, fraudulent practices, packaging, labelling etc. imposed by various countries will not be more restrictive on imported products than they are on domestic products. Encourages use of international standards.