

PACKAGING OF PETHA



AATMANIRBHAR BHARAT

**PM Formalisation of Micro Food Processing
Enterprises Scheme (PM FME Scheme)**

Shelf Life of Product:

The following factors affect the shelf life of the product

Shelf Life of Product:

- **Blemishes:** Scars, change in colors, burn, dark spots, black nose, or similar anomalies affect a wider region than the circle 7 mm diameter and affects the quality directly.
- **Dirt-**preparation of packaging in an open area can lead to this problem. dirt can reduce the quality of petha.
- **Insects and mites-** It can be damaged by insects or mites or contaminated by the presence of dead insects or mites, fragments of insects or mites, or their excreta.
- **Scouring-** Breakdown of the sugars into alcohol and acetic acid by yeasts and bacteria.

Need for Packaging:

- It's not possible to imagine food without a packet!
- Food packaging is everywhere. Being such a large industry, packaging has its own principles, technology, advantages and disadvantages, processes, toxic effects and cost.
- Packaging which used to be a mere necessity few decades back has now turned into an art and a science.



Need for Packaging:

- It also refers to the process of design, evaluation, and production of packages.
- While appropriate packaging is important to maintain the basic attributes of food (temperature, color, taste, texture, etc.), maintaining food safety is an important function of packaging.



Features of Packaging



Profitability

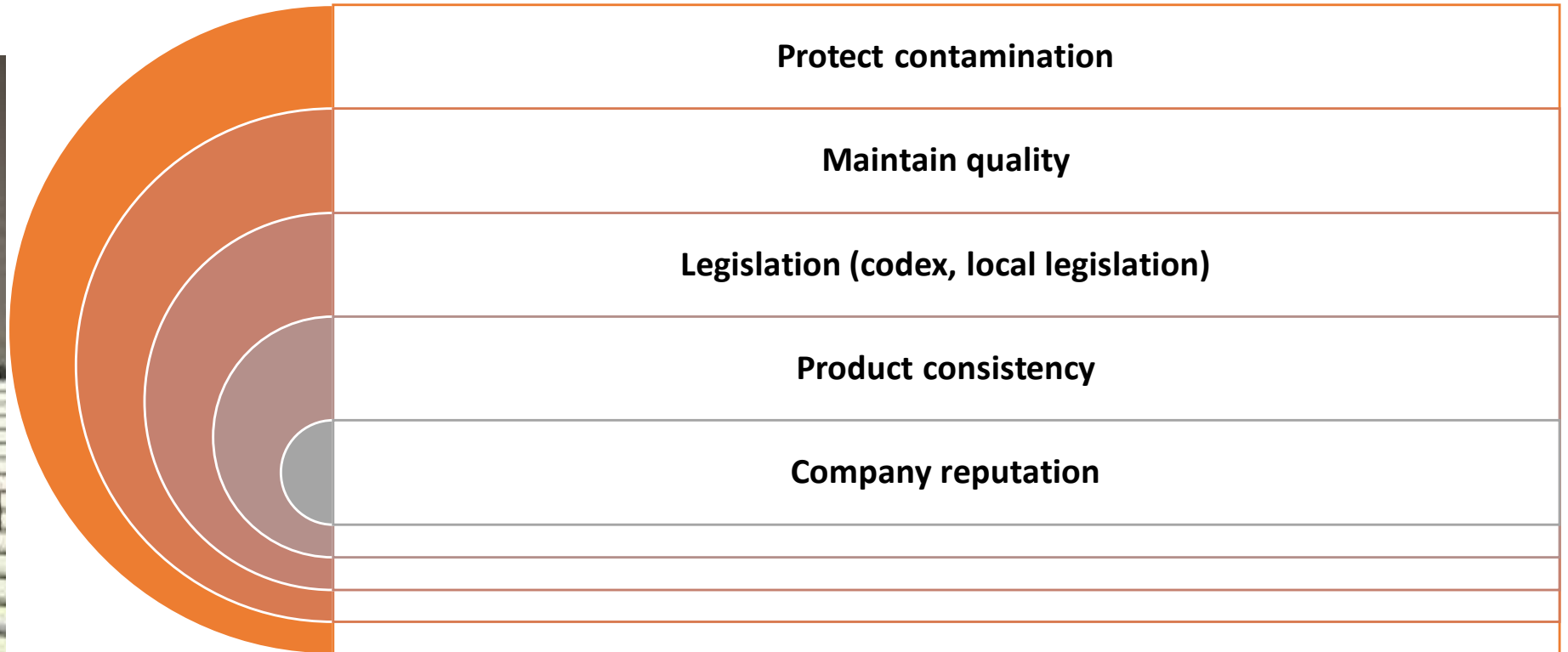
Consistency

Company reputation

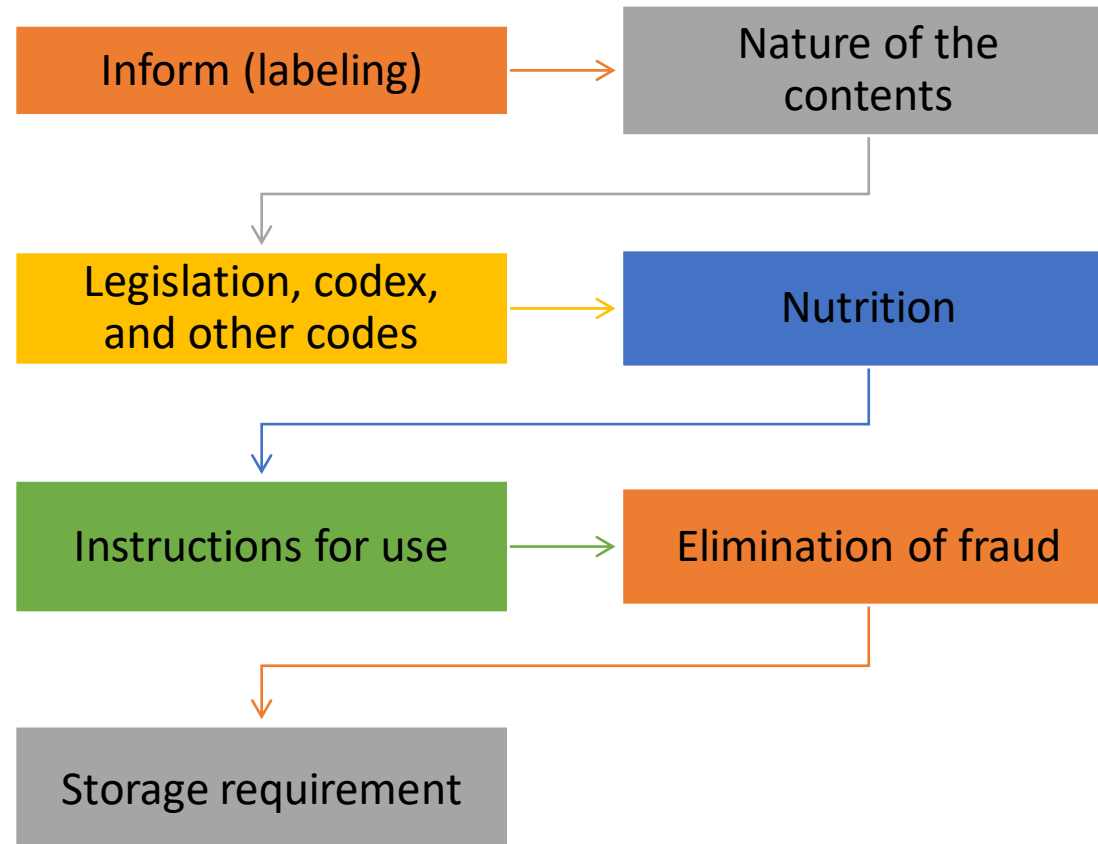
Consumer expectation

Consumer convenience

Features of Packaging



Features of Packaging



Type of packaging

Primary packaging

- It refers to the product's immediate container.
- It is the packaging that most closely protects the product.
- It can also be referred to as retail or consumer packaging.
- E.g. tin cans, glass jar



TYPE OF PACKAGING

Secondary Packaging

- Secondary packaging is the packaging that holds the individual units of products.
- Secondary packaging makes it easier for retailers to display and handle products.
- Secondary packaging may be removed from the item without changing the qualities or attributes of the good.
- Common examples include cardboard cartons, cardboard boxes, paperboard cartons, shrink-wrapped bundles Etc.

TYPES OF PACKAGING

Tertiary packaging

- It refers to the further packaging necessary for storage or transportation.
- It may contain a number of products within a cardboard box for easy transportation.
- Mostly curtain box are used for final packaging



CHARACTERISTICS OF PACKAGING MATERIAL

The material selected must have the following characteristics:

- Must meet tamper-resistance requirements
- Must not reactive with the product
- They must protect the preparation from environmental conditions
- Must be non-toxic
- Must not impart odor/taste to the product
- Must be approved by government body.



Wood, cardboard, and papers

- Products derived from wood are widely used in the packaging of petha in the form of paper and cardboard.
- Paper is a very cheap, lightweight product with excellent printing capacity.
- Although it is very sensitive to moisture.
- it can be corrected with a combination of paper and other materials such as plastic or paraffin.
- Cardboard is a material made up of several superimposed layers of paper, making it thicker, harder, and more resistant than paper.



Glass

- Glass is impermeable to gas and vapor.
- It is an outstanding and totally neutral barrier of oxygen.
- However, it is a fragile, heavy material that needs a lot of energy to produce.
- it is a recyclable product since it can be used as a container repeatedly.



Metals (Steel, Tin, Aluminium)

- Preservation of canned food and drinks is the primary application of these metals.
- Tin-coated steel and Aluminium bowls are most widely used.
- It is an opaque material that gives a light-sensitive advantage to food.
- Petha is nowadays consecrated for export and in this industrial metal coating is widely used.
- Tin cans are composed of steel-coated steel sheets, in particular when containing items of low pH as a measure of protection from corrosion by steel.



Material:

Plastic material for packaging of Petha

The printed flexible packets are generally laminates of various compositions. Some of the commonly used laminates are:

- Polyester/metallised polyester/LDPE
- BOPP/LDPE
- BOPP/metallised polyester/LDPE
- Polyester/Al foil/LDPE



Quality considerations during packing

Quality control of packed products is the last time the petha product is checked before reaching the customer.

Documented checking of the packages entails:

- Weight of the package
- Weight of the Petha
- Arrangement of the petha
- Uniformity
- Damage to the product
- Defects; and Moisture content.



Factor Affecting Fruit Processed Products

- 1) Atmospheric humidity
- 2) Light (UV)
- 3) Temperature
- 4) Rain

- 1) Handling
- 2) Transport
- 3) Sampling
- 4) Stacking

- 1) Insects
- 2) Moulds
- 3) Mites
- 4) Bacteria
- 5) Rodents & Birds

- 1) Pilferage
- 2) Price
- 3) Types of stores
- 4) Customer appeal
- 5) Chemical control measures

Packaging machine

Tray sealing machine

The tray sealing machine is used for sealing the containers or boxes for final packaging.



FSSAI Labelling Requirements

1. Name of the Food
2. List of Ingredients
3. Nutritional information
4. Declaration Non-Vegetarian or Vegetarian
5. Information regarding food additives
6. Addition of colors and flavors
7. Net quantity
8. Name and complete address of the manufacturer
9. A lot no., Code no., and Batch number details
10. Date of manufacture or packing
11. Best before
12. Country of origin for imported food
13. Instructions for use shall be included in the label if necessary.



FOOD SAFETY AND STANDARDS (PACKAGING AND LABELLING) REGULATIONS, 2011

Packaging requirements for Fruits Products

- Every container in which any fruit product is packed shall be so sealed that it cannot be opened without destroying the licensing number and the special identification mark of the manufacture to be displayed on the top or neck of the bottle.
- For Canned fruits, juices and vegetables, sanitary top cans made up of suitable kind of tin plates shall be used.

FOOD SAFETY AND STANDARDS (PACKAGING AND LABELLING) REGULATIONS, 2011

- For Bottled fruits, juices and vegetables, only bottles/ jars capable of giving hermetic seal shall be used.
- Juices, squashes, crush, cordials, syrups, barley waters and other beverages shall be packed in clean bottles securely sealed.
- These products when frozen and sold in the form of ice shall be packed in suitable cartons. Juices and Pulpes may be packed in wooden barrels when sulphated.



FOOD SAFETY AND STANDARDS (PACKAGING AND LABELLING) REGULATIONS, 2011



- For packing Preserves, Jams, Jellies, and Marmalades, new cans, clean jars, new canisters, bottles, chinaware jars, and Aluminium containers may be used and it shall be securely sealed.
- For Pickles, clean bottles, jars, wooden casks, tin containers covered from inside with polythene lining of 250 gauge or suitable lacquered cans shall be used.

FOOD SAFETY AND STANDARDS (PACKAGING AND LABELLING) REGULATIONS, 2011

- For Tomato Ketchups and Sauces, clean bottles shall be used. If acidity does not exceed 0.5% as acetic acid, open top sanitary cans may also be used.
- Candied fruits and peels and dried fruits and vegetables can be packed in paper bags, cardboard or wooden boxes, new tins, bottles, jars, aluminium and other suitable approved containers.
- Fruits and Vegetable products can also be packed in aseptic and flexible packaging material having good grade quality conforming to the standards laid down by BIS.



PM-FME Scheme

The objectives of the scheme are:

- Support for capital investment for up-gradation and formalization with registration for GST, FSSAI hygiene standards and Udyog Aadhar;
- Capacity building through skill training, imparting technical knowledge on food safety, standards & hygiene and quality improvement;
- Hand holding support for preparation of DPR, availing bank loan and up-gradation;
- Support to Farmer Producer Organizations (FPOs), Self Help Groups (SHGs), producers cooperatives for capital investment, common infrastructure and support branding and marketing.
- <https://mofpi.nic.in/pmfme/docs/SchemeBrochure1.pdf>



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