





## PACKAGING OF ISABGOL



## **AATMANIRBHAR BHARAT**

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

## IMPORTANCE OF PACKAGING

- Packaging is an important part of food manufacturing process. It protect the food products from physical ,chemical, biological damages.
- Without packaging, materials handling would be a messy, inefficient and costly exercise and modern consumer marketing would be virtually impossible.
- Packaging Institute International defined packaging as the enclosure of products, items or packages in a wrapped pouch, bag, box, cup, tray, can, tube, bottle or other container form to perform one or more of the following functions: containment, protection, preservation, communication, utility and performance. If the device or container performed one or more of these functions, it was considered a package.

## **CONCEPT OF PACKAGING**

- ✓ Packaging is the science, art and technology of enclosing or protecting products for distribution, storage, sale, and use.
- ✓ Packaging also refers to the process of designing, evaluating, and producing packages.
- ✓ Packaging contains, protects, preserves, transports, informs, and sells

## **NEED OF PACKAGING**

**CONTAINMENT:** protecting the environment from the myriad of products that are moved from one place to another.

**PROTECTION:** to protect its contents from outside environmental influences such as water, water vapor, gases, odors, microorganisms, dust, shocks, vibrations and compressive forces.

**CONVENIENCE**: Products designed to increase convenience include foods that are prepared and can be cooked or reheated in a very short time, preferably without removing them from their primary package.

### **TYPES OF PACKAGING**

- **PRIMARY PACKAGING:** Primary packaging is the packaging in direct contact with the product itself and is sometimes referred to as a consumer unit. The main purpose of primary packaging is to contain, protect and/or preserve the finished product, particularly against contamination. This is the first layer containing the finished product, such as a plastic pouch holding whole-grain cereal or the cardboard box containing the pouch of cereal.
- This type of packaging is often intended for the end user or consumer. In addition to making it easier for consumers to handle products, it makes the products look more appealing and can be used for communication purposes to convey printed information about the products to consumers.

## **SECONDARY PACKAGING**

- his type of packaging is used outside of primary packaging to group a certain number of products to create a stock-keeping unit, commonly referred to as a SKU.
- It facilitates the handling of smaller products by collating them into a single pack. This type of packaging also provides supplementary protection to help maintain the integrity of the primary packaging.
- In addition, it can serve as a shipping container for small shipments, making
  it highly useful in e-commerce. Secondary packaging is frequently made up
  of multiple components (box, padding, separators, reinforcements, bags,
  paper, etc.).

## **TERTIARY PACKAGING**

- Often also referred to as bulk or transit packaging, this type of packaging is
  used to group larger quantities of SKUs to transport them from point A to
  point B (e.g. from production facility to point of sale). During this stage,
  products are handled as distribution units.
- This type of packaging makes it easier to transport large and/or heavy loads safely and securely. In addition to helping prevent damage, it consequently facilitates the handling, storage and transport of goods.
- An example of tertiary packaging is a stretch-wrapped pallet containing a quantity of cardboard boxes (secondary packaging) to enable efficient product shipping.

# PACKING MACHINES USING IN ISABGOL PROCESSING

- ✓ Processed quality products are packed in flexible and cost-effective packaging solutions under total hygienic control regions, while ensuring that the product is kept safe during transit and in storage at the customer end.
- ✓ Different types of packing machines are used for packing isabgol. In market, isabgol is normally available in two forms,
- 1. Isabgol husk
- 2. Isabgol husk powder
- ✓ Packaging of isabgol husk and husk powder incorporates uncoated and covered Uv balanced out PP woven texture without liner, HDPE laminated paper sacks with inner poly-liner, laminated PP woven sacks with internal poly, fiber paper drum and silver plated ring with inward poly-liner.

## **SEED PACKING MACHINE**





# AUTOMATIC HUSK POWDER PACKING MACHINE



# ISABGOL HUSK ZIPPER POUCH PACKING MACHINE



## PACKAGING AND LABELING

- ✓ Isabgol Husk will be pressed in new, perfect and dry jute packs, fabric sacks, paper packs and card board containers with internal coating of food grade material, food grade High Density Polyethylene overlaid paper sacks, food grade plastic compartments or in glass bottles or such other sort of holders as might be endorsed by the Agricultural Marketing Adviser or an official approved by him for this benefit as per rule 11 of the General Grading and Marking Rules.
- ✓ The pressing material will be liberated from creepy crawly or parasitic pervasion and ought not give any poisonous substance or bothersome scent or flavor to the item.

- ✓ Isabgol Husk will be pressed in pack measures according to arrangements of the Legal Metrology (Packaged Commodities) Rules, 2011 made under sub-segment (1), read with provisos (j) and (q) of sub-segment (2) of area 52 of the Legal Metrology Act, 2009 (1 of 2010) or according to the guidelines gave by Agricultural Marketing Adviser every once in a while.
- ✓ Graded material of little pack sizes of a similar parcel or group and grade will be stuffed in an expert holder with complete subtleties consequently alongside grade assignment mark.

### SELECTION OF PACKAGING MATERIAL

- **❖Tensile Strength & Elongation:** Tensile Strength and Elongation properties of materials need to be studied as their running on high-speed machines should be suitable.
- ❖Tear Strength: For a processed product, tear strength is of importance as low tear values are necessary and useful for opening packages by hands.
- ❖ Heat Seal Strength: The performance of a finished package is determined by the effectiveness of the package seal i.e. the permeability to water vapor, gases and volatiles increase if the seal is not perfect. Thermoplastic films such as polyethylene give excellent heat seals.

## SELECTION OF PACKAGING MATERIAL

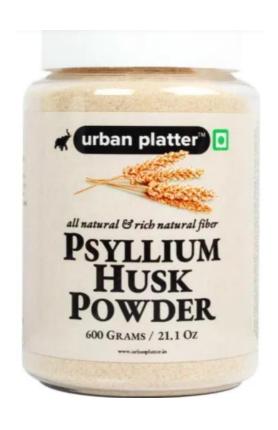
- ❖Performance Properties: Apart from the above mentioned important properties, a material has to perform well on machines; therefore knowledge of physical properties like slip, stiffness, blocking resistance is also necessary.
- ❖Twist retention for twist wrap is also of importance. The initial function of packaging is to protect. However, the emotional role played by packaging is also of importance, especially when the confection is a gift. A sophisticated packaging using deluxe materials is often used as a way of expressing feelings.

## NORMAL KINDS OF BUNDLING INCLUDES

















## TYPES OF PACKAGING

#### CONSUMER PACKAGING

 Designed for consumer convenience & appeal, marketing consideration & display

Is on marketing

#### INDUSTRIAL PACKAGING

 industrial packaging is focuses on the handling convenience & protection during transportation

 the main emphases is on logistics

## Brand Packaging



# **Brand Packaging**











#### Strategy Policies And Strategic

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## Family Packaging

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### Ecological Packaging

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#### Re-Use Packaging

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#### Multiple Packaging

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## **GRADE SPECIFICATIONS OF ISABGOL**

Properties	Grade			
	85% Pure	95% Pure	98% Pure	99% Pure
Colour	Light Brown to Pale Bluff			
Taste	Bland			
Odour	Faint Distinct			
Moisture	12% Max			
<b>Mucilloid content</b>	86% min	95% min	98% min	99% min
Light Extraneous	15% max	5% max	2% max	1% max
Matter				
<b>Heavy</b> Extraneous	1.1.% max	1.1.% max	1.1.% max	1.1.% max
Matter				
Swell Volume/gm	35 ml/min	40 ml/min	40 ml/min	50 ml/min

## **PACKAGING & LABELING LAWS - FSSAI**

- Labeling should contain following information:
- ✓ Name of the food product.
- ✓ List of ingredients.
- ✓ Nutritional information.
- ✓ Declaration of VEG and NON VEG.
- ✓ Declaration of added food additives.
- ✓ Name and address of manufacturer.



## **PACKAGING & LABELING LAWS - FSSAI**

- ✓ Net quantity
- ✓ Code number
- ✓ Lot number/ Batch number.
- ✓ Date of manufacturing.
- ✓ Best before date
- ✓ Country of origin.
- ✓ .Number of pieces
- ✓ Bar Code
- ✓ Brand Name etc





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