

## DEPARTMENT OF HOME SCIENCE

### **B.A (Prog) Food Technology**

## GENERIC ELECTIVE COURSES (GE)

### **GENERIC ELECTIVE – GE-1-FT: BASIC BAKING**

#### **CREDIT DISTRIBUTION, ELIGIBILITY AND PRE-REQUISITES OF THE COURSE**

Course Title & Code	Credits	Credit distribution of the course			Eligibility criteria	Pre-requisite of the course (if any)
		Lecture	Tutorial	Practical/ Practice		
Basic Baking	4	3	0	1	Class XII	NIL

#### **LEARNING OBJECTIVES:**

1. To impart students with knowledge related to baking technology.
2. To introduce and equip students to the techniques and skills of cakes, biscuits and pastry making.

#### **COURSE OUTCOMES:**

Upon successful completion of this course, students will be able to:

1. Familiarize themselves with present and future trends of baking industry.
2. Describe the role of ingredients in bakery industry.
3. Demonstrate the skills in preparing cakes, pastries and biscuit, cost control and marketing.
4. Recognize the significance of factors which influence safety of food. Conduct sensory evaluation of bakery products.

#### **SYLLABUS OF GE-1-FT**

##### **THEORY**

**(Credits 3: 45 Hours)**

##### **UNIT I: Baking Industry**

**(10 Hours)**

- *Unit Description:* This unit will introduce the students to the field of Food Bakery Science. It will also give information on nutrition facts of Bakery products.
- *Subtopics:*
  - History of bakery - present trends and prospects

- Nutrition facts about bakery products
- Food safety aspects of baked products

## **UNIT II: Cake Processing**

**(14 Hours)**

- *Unit Description:* The unit is about processing of various types of cakes, their labelling, packaging and evaluation.
- *Subtopics:*
  - Preparation of cakes – Ingredients, types of cakes, methods of batter preparation, steps in cake making, balancing of cake formula, evaluation of the baked cake, operational faults in cake processing and the remedial measures.
  - Packaging, labelling, and costing

## **UNIT III: Pastry Processing**

**(6 Hours)**

- *Unit Description:* The unit is about processing of various types of pastries, and their evaluation.
- *Subtopics:*
  - Preparation of pastry – Ingredients, types of pastries (short crust, puff/flaky and choux pastry), processing and evaluation, faults and remedies.

## **UNIT IV: Biscuit and Cookies Processing**

**(15 Hours)**

- *Unit Description:* The unit is about processing of various types of biscuits, cookies and their evaluation.
- *Subtopics:*
  - Preparation of biscuits and cookies – types, ingredients, processing and evaluation.

### **PRACTICAL (Credits 1: 30 Hours)**

*No. of Students per Practical Class Group: 10-15*

1. Weights and measures, selection of raw material.
2. Preparation, sensory evaluation and packaging of cakes.
  - Fatless sponge cakes
  - Shortened cakes
  - Eggless cakes
  - Muffins and brownies
3. Preparation, sensory evaluation and packaging of pastries-
  - Short crust
  - Puff/flaky
  - Choux pastry
4. Preparation, sensory evaluation and packaging of biscuits.

### ESSENTIAL READINGS (Theory and Practical):

- Dubey, S. C. (2016). *Basic Baking: Science and Craft*. Delhi: The Society of Indian Bakers.
- Edward, W. P. (2007). *The Science of Bakery Products*. Cambridge: RSC Publishing.
- Faridi, H. (2004). *The Science of Cookie and Crackers Production*. Delhi: CBS Publishers.
- Ketrappaul, N., Grewal, R.B., Jood, S. (2005). *Bakery Science and Cereal Technology*. Delhi: Daya Publishing House.
- Matz, A. (2008). *Bakery Technology and Engineering*, 10<sup>th</sup> Edition. Delhi: CBS Publishers.
- Suri, S. & Malhotra, A. (2014). *Food Science, Nutrition and Safety*. Delhi: Pearson India Ltd.

### SUGGESTED READINGS:

- Cornell, Hugh, J. & Hoveling, Alber. W. (1998). *Wheat Chemistry and Utilization*, Delhi: CRC Press.
- Edward, W. P. (2007). *The Science of Bakery Products*. Cambridge: RSC Publishing.
- Kent, N.L. (2004). *Technology of Cereals*. London: Pergamon Press.
- Khanna, K., Gupta, S., Seth, R., Mahana, R., & Rekhi, T. (2004). *The Art and Science of Cooking*. Delhi: Phoenix Publishing House Private Limited.
- Matz A. (2004). *The Chemistry and Technology of Cereals as Food and Feed*. Delhi: CBS Publishers.
- Matz, A. (1998). *Bakery Technology and Engineering*. Delhi: CBS Publishers.
- Raina, U., Kashyap, S., Narula, V., Thomas, S., Suvira, Vir, S., & Chopra, S. (2005). *Basic Food Preparation – A Complete Manual*. Delhi: Orient Longman.

**Note: Examination scheme and mode shall be as prescribed by the Examination Branch, University of Delhi, from time to time.**